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GROWTH AND DEVELOPMENT OF COUNTRY TOWNS: THE CASE OF EASTERN YORKSHIRE c. 1700-1850

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Growth and Development of Country Towns: the Case of Eastern Yorkshire c. 1700-1850

Although smaller urban communities accounted for as much as 50% of urban living throughout the eighteenth and nineteenth centuries their importance is not proportionately represented in the considerable body of literature directed towards analysing towns and urban growth in this critical transitional period. This thesis attempts to go some way towards bridging this gap by focusing attention on the country towns of eastern Yorkshire. The study investigates the forces behind and the operation of the process of selectivity of growth in the urban system, placing particular emphasis on towns at the lower end of the size hierarchy.

Part one of the thesis analyses the growth and development of the region's urban system in respect of selected demographic economic and social variables. During the period 1700 to 1850 the regional structure of urban settlement was subject to considerable fluctuation and change with distinct spatial variations occurring in both the timing and pattern of growth. This temporal analysis points to a growing complexity in regional urban structure and a variety of growth experiences affecting component towns. Chapter four thus proposes a typology of country towns based on growth experience. Four types - dynamic, expanding, stable and declining - are identified and the second part of the thesis analyses the characteristics of the first three types through a series of case studies based on six East Riding towns.

The case studies suggest that different forces were operative both upon and within the individual growth types, leading to distinct structural and spatial manifestations. Dynamic centres were characterised by a well developed location and nodal position, high levels of externality, considerable demographic expansion, a diversified economic structure and differentiated space. Similar processes and patterns of change were operative in expanding centres but their more tempered growth experience due to competition resulted in less marked structural and spatial change. Locational disadvantages were a major deterrent to the development of stable towns. Their demographic expansion was limited by high levels of mortality and outmigration, their economy did not diversify in any great measure and spatial differentiation at only the weakest level characterised these centres.

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PREFACE

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ABBREVIATIONS

Ag Hist Rev	Agricultural History Review
Am Hist	Amateur Historian
B.B.D.	Bailey's British Directory, 1784
B.I.H.R.	Borthwick Institute of Historical Research, York
B.M.	British Museum
B.P.P.	British Parliamentary Papers
B.Y.	Edward Baine's Yorkshire Directory, 1823
Econ Geog	Economic Geography
Econ Hist Rev	Economic History Review
E.Y.L.H.S.	East Yorkshire Local History Society
F.W.E.R.	Francis White's East Riding Directory, 1851
Geog Rev	Geographical Review
H.A.	Hull Advertiser
H.C.R.O.	Humberside County Record Office, Beverley
H.H.C.R.	Hedon Haven Commissioners' Records
H. of L.	House of Lords
H.U.A.	Hull University Archives Office
Jour Hist Geog	Journal of Historical Geography
L.P.S.	Local Population Studies
M.W.D.B.	Market Weighton Drainage Board, Pocklington
N.Y.C.R.O.	North Yorkshire County Record Office, Northallerton
P.R.O.	Public Record Office
PR	Parish Registers
Prof Geog	Professional Geographer
PRT	Parish Register Transcripts
S.Y.	William Slater's Yorkshire Directory, 1849
T.I.B.G.	Transactions of the Institute of British Geographers
U.B.D.	Barfoot and Wilke's Universal British Directory, 1791
W.E.R.	William Whites East Riding Directory, 1840
Y.A.J.	Yorkshire Archaeological Journal
Y.A.S.R.S.	Yorkshire Archaeological Society Record Series
Y.C.	York Courant
Y.G.	Yorkshire Gazette
Y.P.R.S.	Yorkshire Parish Register Society

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INTRODUCTION : SELECTIVE URBAN GROWTH

Of the 795 towns identified by Gregory King for England in the late seventeenth century only thirty, or 4%, had populations in excess of 5,000 persons[1]; a century later more than 62% of the 256 towns with populations of 2,500 or more were inhabited by fewer than 5,000 persons. Even in 1901, 30% of all towns with populations of 2,500 or more still contained less than 5,000 inhabitants and over 50% less than 10,000[2]. Small towns were thus 'strong' in the urban structure of England, but despite their numbers and regional importance they have rarely received their due degree of academic attention. The balance of interest among historical geographers and workers in related disciplines has remained tipped well towards the more specific provincial and county capitals, major ports and the emerging towns and cities of the Industrial Revolution.

Work on the smaller towns of England and Wales, and in particular on the relationship of these communities within a systems context, lies with relatively few authors. The main contributions have been made by Carter in his studies of the evolution and growth of the Welsh City system, Caroe on East Anglian towns and by Lewis's work on towns of Mid-Wales and the Middle-Welsh borderland[3]. Studies of individual small towns are, however, more numerous; Ashbourne, Eccleshall, Malvern, Durham, and Beverley, to name but a few, have been the focus of some academic attention[4] but only rarely, as in Royle's analysis of four Leicestershire towns in the period 1837-1871 and Constable's study of three market towns at mid-nineteenth century[5], have they been placed in a comparative context. Other scholars have sought less to analyse the total structure of the community than to direct

their attention to individual urban elements, following the suggestion made by Everitt that topography, building, population structure, patterns of landownership, the structure of occupation and society, and family, religous and cultural life, are all aspects worthy of academic attention[6].

Some of these matters have been pursued by Patten using apprentice indentures and freemen's records for the analysis of occupational structure and migration in East Anglian towns[7]. Housing has been studied by Gauldie, population change by Martin, cultural and social life by Borsay, and economic structure by Daunton[8]. Against a background of population change and migratory movements, Marshall, using Kendal as his example, has investigated the spread of housing, social structure, social leadership and physical growth, arguing that the urban market area must be closely examined if economic development is to be fully understood[9].

The reason why smaller towns have received comparatively little attention would seem to be the paucity of requisite information sources. Official town records are seldom available because a majority of these centres did not enjoy borough status and, although after the turn of the eighteenth century one can draw on such valuable sources as directories, Parliamentary Reports and the Census, even these pose analytical problems. Country towns are often omitted from governmental records, while in the case of the census and directories, data for small towns is generally less informative. Early trade directories, for example, only rarely record individuals by street or house number, while in the 1851 census comprehensive house numbering schemes are seldom found rendering the precise analysis of socio-economic structure difficult. For the eighteenth century, data problems are even more acute, for such well-used information sources as freemens' records, apprentice indentures, militia lists, town surveys and newspapers, commonly employed in studies of large towns, are seldom available

for smaller urban centres without corporate status. Accordingly reliance has to be placed upon sources less frequently employed in an urban context such as parish registers, manorial rolls and the Land Tax Returns. These sources are known to present problems in rural areas; in an urban context these difficulties are compounded principally because of the large number of entries involved.

The greater availability of documentary evidence for larger urban centres may in part explain their attraction for research enquiries, a further, and equally important, reason being the usually spectacular nature of their growth. Both these factors have led, furthermore, to a concentration of scholarship on nineteenth century urban growth and to a neglect of the critical period of the eighteenth century. Even today there is still a considerable vacuum in our understanding of the transition from the pre-industrial to the industrial age, especially in respect of smaller urban communities. Several studies, notably those by Chalklin and Butlin[10], have attempted to place smaller towns with a conceptual framework of urban change, but all too often the lack of empirical evidence has made for hypotheses that are both tentative and inconclusive.

While knowledge of the forces determining the process of selective urban growth in the eighteenth century town remain to be elucidated, a considerable body of research has been directed towards the late medieval and early pre-industrial town. For periods preceding the Industrial Revolution, the elements of urban change have been researched by writers such as Holderness, Corfield, Langton, Everitt, Dyer and Reynolds, while Patten has recently produced an extensive work on sixteenth and seventeenth century towns[11]. Perhaps the main contribution to work on the pre-industrial town has been undertaken by Clark and Slack[12], providing the basis for much of the subsequent debate on the fortunes of these communities[13]. They identify the period between

1500 and 1700 as one of transition and, more specifically, suggest that pre-industrial towns were characterised by unusual concentrations of population, specialist economic functions, and complex social structures. They were also characterised by a sophisticated political order with a distinctive cultural influence that extended well into the surrounding countryside. Clark and Slack, moreover, propose a five-phase model of urban development and conclude that between 1500 and 1700 many towns underwent changes large enough to transform traditional urban living, affecting not only their economic and demographic structure but also their functional and organisational character. Within the apparently ordered framework of pre-industrial society they argue that many communities underwent a reorientation that touched on all sectors of urban life[14]. Their broad schema has received some general acceptance but has also given rise to considerable debate. Phythian-Adams, for example, justifiably distinguishes between short term urban crises, such as those of the 1620s, and serious persistent problems[15], while Reynolds and Dobson question the whole nature of urban decline in late medieval England[16].

The literature on the sixteenth and seventeenth century town may therefore form a standpoint from which the whole problem of selective urban growth in the ensuing centuries can be considered. The conclusion drawn by scholars of the pre-industrial town is that while the sixteenth and seventeenth centuries were a time of general crisis for many larger provincial towns and regional centres, for country towns and market towns it was a time of limited expansion largely occasioned by the rapid growth of inland trade. Progressing into the eighteenth century, however, pre-industrial researchers argue that smaller towns entered a phase of decay and eclipse as agriculture stagnated and as inland trade tended to move in favour of larger towns, limited revival occuring towards the close of the eighteenth century associated with renewed

agricultural expansion[17]. If the premise suggested by this argument is accepted, i.e. that towns - mostly high ordered centres - which suffered more sharply in the sixteenth and seventeenth centuries tended to enjoy greater relative prosperity in the eighteenth and nineteenth centuries, then the fortunes of a large body of low order towns in the period after 1750 are difficult to explain. Certainly, as far as they are concerned, the early eighteenth century was an unhealthy time, but their recovery, development and expansion in the ensuing hundred years would suggest that a period of preceding structural crisis was rarely a precondition of growth.

While studies of the pre-eighteenth century town provide a basis upon which the subsequent development of urban centres can be evaluated, knowledge of the evolution of the urban system in the transitional period between pre-industrial and industrial ages is scarce and available studies largely concern the fortunes of individual provincial towns and emerging industrial cities[18]. For the modern industrial age, however, the character and development of the urban system is well researched. The early work of Bracey and Smailes[19], has been followed by comprehensive studies of both central place patterns and size distribution among systems of cities by writers such as Preston, Berry, Parr, Pred and Hall and Hay[20]. Most systems studies, however, have been conducted in a largely static context and, Pred and Davies's work apart[21], have seldom encompassed the use of more than one or two study dates. For the industrialising age work rests largely with two authors, Robson and Lawton, concentrating principally on demographic changes at a national scale[22]. Functional change in the urban system of East Anglia has been analysed by Caroe for the early nineteenth century, and similar studies have been undertaken by Lewis in Wales and Parton in Surrey[23]. Few attempts, however, have been made to trace through the development of the urban system at the regional level

in respect of several variables, and the work of Carter on the growth of the Welsh City System remains isolated in this respect[24]. Two early studies of the functional interrelationships of towns in a historical context by Rodgers and O'Dell have not been developed, despite the attention drawn to the absence of research in this field by geographers[25]. There has still to emerge, therefore, a scheme or methodology to explain the process of selective urban growth, particularly among the lower order urban centres.

This thesis will attempt to bridge this gap by directing attention on the neglected field of country towns. A major aim will thus be to analyse selectivity of growth in the urban system placing particular emphasis on towns at the lower end of the urban hierarchy. The study will seek to elucidate and to analyse the main forces behind selectivity, - economic, demographic and social, - in order that the operation of the lower levels of the system be more fully understood. Through looking at change in the total urban system of eastern Yorkshire, the aim will be to establish some approaches for studying the eighteenth and nineteenth century town which might be usefully applied and tested in other areas and which, furthermore, may add to the existing body of knowledge for larger urban centres in the same period. By analysing change over a fairly lengthy period, viz. 1700 to 1850, the thesis will seek to explore continuity of growth in the urban system before and during the period of 'revolutionary' economic change in England and Wales, namely the agricultural and industrial revolutions. Through the analysis of the regional urban structure and its component parts, a typology of country towns will be formulated on the basis of their growth experience and an analysis of the internal and external structure of the different town types undertaken. Using case studies of different 'growth-types' of towns it is hoped that the forces behind selectivity, already elucidated at the more general regional level,

will be more fully understood.

Decisions regarding the choice of historical and geographical setting were governed by several considerations; - first, the accessibility of the region for study; second, the availability of requisite information sources; and third, the existence throughout the eighteenth and nineteenth century of a diffuse urban settlement structure. Each of these conditions are well satisfied in eastern Yorkshire, a region which moreover bridged the balance between rural and urban change. Although it was largely rural and highly agricultural it had a significant proportion of urban inhabitants and was not totally devoid of industry.

Eastern Yorkshire is a large rural area encompassing parts of all three Ridings of Yorkshire; not dominated by industrialisation it, nevertheless, contains a diversity of economic activity. The region also contained a diversity of town types, in terms of size, economy, social structure and political organisation, that experienced continuity of growth throughout the study period. Furthermore, it is well provided with documentary sources; the existence of Archbishop Herring's Visitation Returns of 1743 are of particular value for demographic analysis, and the widespread recording of occupations in the parish registers (rarely encountered in many regions) enable detailed analysis of the economic structure and functional base of the eighteenth century town to be pursued, in addition to the availability of other widely used documentary evidence[26].

The thesis divides into two main parts. Part 1 seeks to analyse the development of the regional structure of urban settlement in the period 1700 to 1850. Following a static analysis of urban structure at the start of the study period, the thesis focuses on change in the urban system in respect of selected demographic and economic variables. On the basis of this analysis,

chapter four proposes a typology of country towns formulated on the basis of their growth experience. The second part of the study examines, through a series of case studies, the different town types identified in the typology. To provide a comprehensive picture of the forces behind selectivity and their manifestation in the internal structure of these towns, the case studies cover a wide range of urban elements. Although the adoption of this approach produces difficulties, it nevertheless enables a more comprehensive structural synthesis of change in small towns to be made. By focusing on more than one aspect of urban change (the antithesis of which would present far fewer problems to the researcher), it is hoped that the study will provide the most suitable framework for the investigation of the selectivity of urban growth, and will thereby form a basis for comparison with studies of larger urban centres.

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CHAPTER 1

THE REGIONAL STRUCTURE OF URBAN SETTLEMENT c. 1700

At the turn of the seventeenth century England was still a predominantly rural country, with an estimated population of some six million persons. Of this number approximately one and a half million, or 25%, lived in the country's 800 towns[1], the remainder dwelt in 20,000 villages containing on average 180 inhabitants apiece[2]. There were few large towns at this time, the mass of the settlement system comprised small urban centres whose primary function was as market centres for the surrounding countryside. However, among these 'countryside' towns there was variety both in type and regional distribution; two qualities which have given rise to the formulation of general frameworks of the national settlement system seeking to interpret broad variations in urban structure over the country as a whole. As table 1.1 indicates, the general accord among writers such as Clark, Slack, Everitt, Corfield, Chalklin and Patten is for the existence of a three tier hierarchy characterised by 'provincial towns', 'regional centres' and 'market towns', and broadly dividing at population thresholds of 5,000 and 2,000[3]. Furthermore, these writers each identify certain attributes common to towns at each level of the hierarchy in 1700[4].

For the lowest level of the hierarchy - market towns - it is suggested that they usually exhibited two or three determining characteristics; namely an agglomerated settlement and hence density of population, a significant non-agricultural function, and distinctive political or social organisation in the form of a borough charter or some form of municipal government. The primary

Table 1:1 The Urban Hierarchy in England c. 1700

Author	Level 1		Level 2		Level 3	
	Town Type	Size	Town Type	Size	Town Type	Size
Everitt	Provincial	7,000-12,000	Country and Expanding Manufacturing	3,000-7,000	Market	500-1,500
Chalklin	Provincial (Ports)	5,000 +	Regional	2,000-5,000	Market	400-1,800
Clark and Slack	Provincial	5,000 +	Regional	2,000-5,000	Market (Country)	500-1,500
Corfield	Provincial	5,000 +	Regional	2,000-5,000	Market	< 2,000
Patten	Regional/Provincial Capitals	5,000 +	County	2,000-5,000	Market	< 2,000

Source: Everitt, A.H. 'The Food Market of the English Town, 1660-1760', Proceedings of the Third International Conference of Economic History, vol.1, 1965, pp. 57-71; Chalklin, C.W. The Provincial Towns of Georgian England : a Study of the Building Process 1740-1840. London, 1974; Clark, P. and Slack, P. English Towns in Transition 1500-1700. Oxford, 1976; Corfield, P. 'Urban Development in England and Wales in the Sixteenth and Seventeenth Centuries', in Coleman, D.C. ed. Trade, Government and Economy in Pre-Industrial England. London, 1976, pp. 214-232; Patten, J. English Towns 1500-1700. London, 1978.

role of these places was as centres for trade, and some specialisation in trade, principally through their markets and fairs, was a distinctive attribute. Their sphere of influence was primarily local, rarely extending beyond a six mile radius, but they were important centres of contact between the local producer and consumer, enabling them to function as collection and distribution points for wider regional markets[5].

The next level, regional towns, possessed all these attributes and in addition had a broader sphere of influence than the average market town, for their hinterlands usually included several smaller centres. Frequently these towns also performed specialised functions for their 'regions' as ports or inland commercial centres. Their specialist economic role was reflected in the diversity of occupations they contained and in their possession of a service sector and a significant amount of professional activity. There were 40 to 50 towns in this category in 1700, several of which were emerging manufacturing towns or towns serving as distributing and collecting points for their industrial hinterlands[6].

The highest order towns - provincial centres- dominated whole regions and possessed not only all the aforementioned characteristics of market towns and regional centres, but also provided a range of services which other towns could not rival; obvious examples of such towns are York, Exeter, Norwich and Shrewsbury[7]. Approximately 10% of England's population lived in provincial centres in 1700, their wide variety of specialised functions enabling them to support significantly higher populations than lower order centres. These towns had all the five characteristics attributed by Sjoberg to the pre-industrial town:- an unusual concentration of population, specialist economic functions, a complex social structure, a sophisticated

political order, and a distinctive influence beyond their immediate physical boundaries[8]. York is a particularly good example of such a centre for it was the political capital of the north, the social capital for gentry life and an inland distribution centre of more than regional importance[9].

The selective factors that to a large extent determined the structure of the country's settlement system have been identified by Corfield as a gradual, but distinct, process of urbanisation, the continued growth of the capital city and the expansion and changing location of provincial urban society[10]. In addition, Clark and Slack suggest that five variables acted to determine a town's relative standing within the settlement system. These were, the general population trend, the related state of the rural economy, the pattern of internal trade, developments in international commerce and last, the level of political order[11].

Within the different regions of England and Wales there is evidence to suggest a degree of conformity with these general frameworks, but by 1700 the simple three-tier structure of urban settlement was clearly becoming more complex as industrial towns and ports grew rapidly in importance[12]. Carter, in his analysis of the urban hierarchy of Wales during the sixteenth and seventeenth centuries, also identified a three-tier hierarchy of settlement, although he did not invoke the use of a size threshold to differentiate the various levels. Instead he employed the following:- a market, a chancery or exchequer, assize courts, grammar schools and general descriptions provided by contemporary writers[13]. On the basis of the latter, he suggested that among the lower-order centres there was further diversity and he distinguished the following sub types: (a) thriving, (b) intermediate, (c) small and (d) declining country towns. He went on to argue that the three-tier framework is too simplistic for more detailed studies of regional urban structure[14].

1. Urban Experience c. 1500 - 1700

The pattern of urban settlement in 1700 had its foundations in the preceding centuries when urban expansion was neither a continuous nor universal process and for which period the fortunes of towns present topics of considerable academic debate. Arguments by Dobson, Phythian-Adams and Palliser for urban decline in late medieval England all rest on the hypothesis that a fall in population in the later middle ages caused a decline in economic activity[15]. Reynolds, however, has recently argued that even if towns were smaller and less wealthy at the start of the sixteenth century than they had been two centuries earlier, this does not mean that all towns were in decline by the turn of the fifteenth century nor that long term demographic trends determined the fortunes of individual places[16].

For the sixteenth and seventeenth centuries, the debate among academics has been more lengthy with perhaps even less accord. Clark, Slack and Phythian-Adams conclude that the sixteenth and seventeenth centuries were a period of intense structural crisis for many larger towns, but for smaller towns it was a healthier period due principally to the rapid growth of inland trade[17]. Dyer and Patten, on the other hand, contend that relatively few communities experienced continued growth or decline, but rather that these centuries were a time during which town fortunes were subject to continued fluctuation with no clear pattern emerging[18]. Corfield argues on balance for growth in all sectors of urban life for, although the experience of different towns varied, the expansion of trade and the strengthening of the country's manufacturing base was reflected in the growth of towns at all levels of the settlement system[19].

The sixteenth and seventeenth centuries seem to suggest, therefore, three types of urban experience affecting towns within the settlement system. First of all, the experience of growth (above the general rate of population increase for the country as a whole) was associated principally with larger provincial or regional centres acquiring a specialist function, such as a major social, political or commercial role, which enabled them to attract and sustain an increasing population[20]. In the period 1500 to 1700 growth could be seen in a number of specialist categories of towns; for example, York, an administrative, political and social centre whose population rose from 8,000 to 12,000 at this time, or Hull, where one measure of a growing port function is evidenced by the figures for the export of Yorkshire cloth:- £109,000 in 1609 rising to £320,000 in 1700[21].

Secondly, some towns remained stable; perhaps because their agricultural hinterlands were only sparsely populated and thus unable to generate a great amount of business, or because they had no specialist economic function that might promote growth in addition to their market activities[22]. Furthermore, these centres frequently suffered periods of short-term crisis due to changes in their geographic environment and shifting patterns of commercial and industrial life. Cases in point are the silting and braiding of the river Dee which inhibited further growth of the port of Chester[23], the fire and plague that affected Banbury in the second quarter of the seventeenth century[24], and commercial competition from Lichfield and the effects of the Civil War which restricted the growth of Stafford[25].

Thirdly, came a large number of 'declining' towns. In his study of Wales, Carter attributed the decline of several middle-order towns such as Beaumaris and Monmouth to their lack of centrality or accessibility, a poor or thinly populated hinterland,

and competition from other towns[26]. To these must be added the additional inhibiting factors of fire, plague, the weather, natural catastrophes, physical changes, and warfare[27]. Dudley, affected by plague and the civil war, Bere Regis by fire, and a number of the cinque ports of the Kent and Sussex coast suffering from sea retreat, are typical cases in point, each suffering considerable population decline from 1500 to 1700[28].

Within the individual regions of England and Wales these experiences are well demonstrated. Patten has examined the changing fortunes of East Anglian towns, arguing that on balance the sixteenth and seventeenth centuries were a period of relative stability for the region, but that individual towns enjoyed markedly different growth experiences[29]. In Sussex, Cowley found that by 1700 most of the smaller market centres had either decayed or were in advanced stages of decay and that it was the older traditional centres with the advantages of good communications which survived and flourished into the eighteenth century[30]. Eastern Yorkshire provides an additional testing ground for the fortunes of the pre-industrial town and an area in which the subsequent evolution of the urban system can be elucidated.

2. Definitional Problems

(a) Regional

Considerable debate will surround any regional delimitation, whichever criteria - political, economic, cultural and administrative - are used[31]. In a historical context, definitional problems arguably become more acute for limited information bases and the lack of requisite data sources compound problems of subjectivity and the delineation of appropriate boundaries. Until the Poor Law Reform Act of 1834, Wapentakes were one of the most

widely adopted administrative areas in all regions of England. Official data sources such as the Hearth Tax Returns, the Land Tax and the early Census Reports all recorded information on individual settlements by Wapentake. In this thesis, Wapentake boundaries have been employed to fix the local limits of eastern Yorkshire. Nineteen Wapentakes comprised the study area of eastern Yorkshire (table 1.2 and figure 1.1); all towns falling within their boundaries were incorporated into the analysis and in only two instances was it necessary to partition these administrative regions. The town of Thorne lay in the extensive Wapentake of Strafforth and Tickhill South, which also included the towns of Sheffield and Rotherham. Thorne Poor Law Union, however, showed the town to be the centre for several parishes in this extensive area, namely Hatfield, Stainforth, Fishlake and Sykehouse; accordingly these were included in the regional analysis, the remaining parishes and townships in the Wapentake of Strafforth and Tickhill South were excluded. The second case concerned the town of Scarborough which was occasionally incorporated into returns made for Whitby Strand. The Poor Law Union of Scarborough indicated that the town served many parishes and townships lying in the Wapentake of Pickering Lythe (part of the region of eastern Yorkshire), and in the extensive parish of Hackness (including the townships of Harwoodale and Silpho, Broxa, and Suffield cum Everley) in Whitby Strand; the aforementioned were thus all incorporated into the study region.

As far as this study is concerned, eastern Yorkshire will be taken to comprise some 1,341,120 acres, 714,000 of which were contained in the administrative county of the East Riding, 485,000 in the North Riding and 142,000 in the West Riding. The region as defined (figure 1.1) contained a diversity of physical and agricultural types and can be divided into several sub regions; its unifying feature being the predominantly rural landscape. The

Table 1.2 The Delineation of Eastern Yorkshire

ADMINISTRATIVE REGION	AREA (acres)	POPULATION c. 1700
East Riding (including York)	714,080	81,856
North Riding		
Wapentakes:		
(i) Bulmer	113,300	12,389
(ii) Pickering	142,570	10,278
(iii) Ryedale	121,970	10,287
(iv) Birdforth	92,330	8,779
(v) Whitby Strand (parishes of Scarborough, Falgrave & Hackness)	14,890	3,114
West Riding		
Wapentakes:		
(i) Osgoldcross lower	58,230	5,706
(ii) Barkstone Ash lower	45,600	6,152
(iii) Strafforth and Tickhill South (parishes of Thorne, Hatfield, Stainforth, Fishlake, Sykehouse)	38,160	3,231
TOTAL	1,341,120	141,792

See figure 1.1

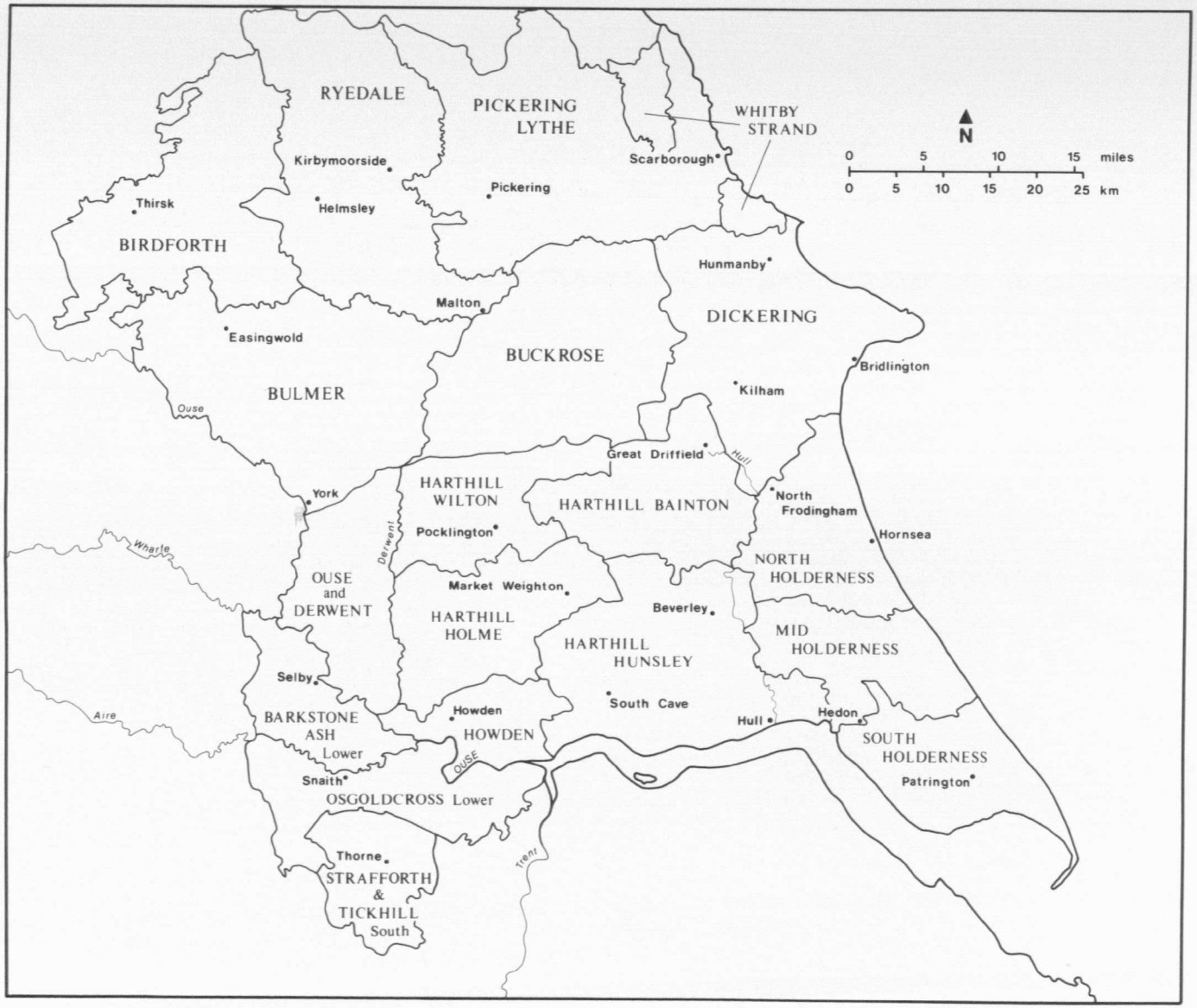

Fig.1.1 The Region of Eastern Yorkshire

north of the region is formed by the Corallian escarpment which stretches from Black Hambleton in the west to the Hackness Hills behind Scarborough in the east. These limestones then dip gently beneath the thick mass of clay that underlies the Vale of Pickering and reappear west of Malton. To the northwest, a narrow line of Jurassic rocks, the Howardian Hills, form a slim plateau linking the Hambleton Hills and the Yorkshire Wolds. (figure 1.2). These Corallian limestones form a band of arable land, with a peripheral loop of villages and interspersed market centres edging the Vale of Pickering. The low-lying Vale floor, overmantled by deposits of sand and gravel and lacustrine clay, comprises an area of predominantly mixed farming, dairying being of particular importance towards the coast[32].

Moving south, the great chalk mass of the Wolds, dissected by winding steep-bottomed dry valleys, forms a broad crescent from Flamborough in the northeast to Brough in the south. The sparse distribution of settlement reflects in a large measure the unattractiveness in pre-enclosure periods of the thin dry soils of the high Wolds. Open fields, rabbit warrens and sheep walks which characterised the pre-enclosure landscape were replaced in the wake of widespread parliamentary enclosure by hedgerows, arable fields, wide straight roads, shelter belts and plantations[33]. Between the Wold scarp and the Vale of York lies a narrow Jurassic outcrop of varied character and varied soils. Stretching from Malton in the north to Broomfleet in the south, this foothill belt is characterised by a combination of grassland and arable[34], with many of the heavier soils to the north of Pocklington providing considerable obstacles to cultivation.

From these hills westwards stretches the level expanse of the Vale of York, owing its origin to river erosion and capture along the weakly resistant Triassic sands and marls, and its present relief and drainage to glacial and post-glacial filling[35]. Much

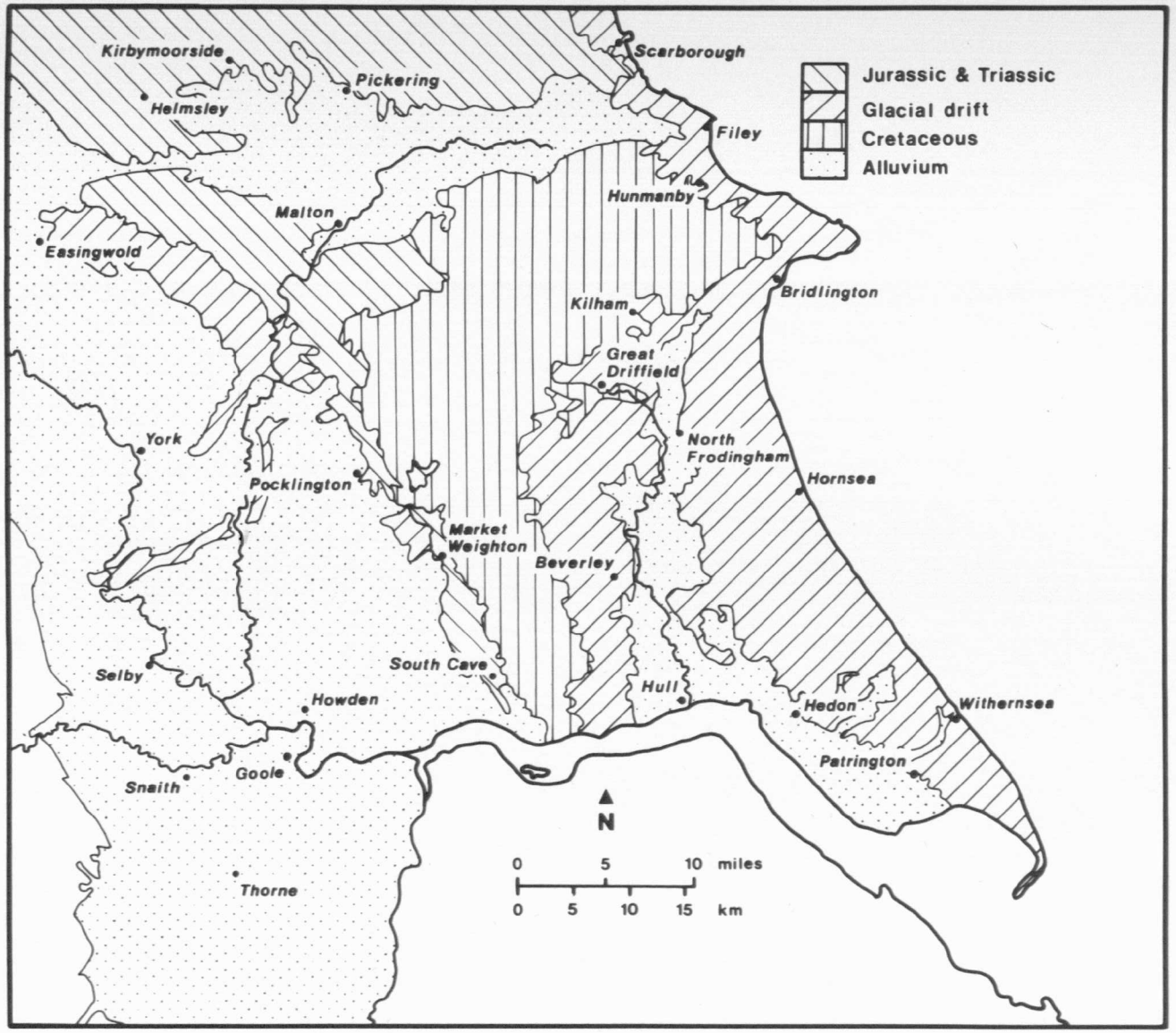

Fig.1.2 The Physical Geography of Eastern Yorkshire

of the Vale is covered by a mantle of glacial deposits - sands and gravels, silts and clays -, a succession of terminal moraines evidencing glacial retreat. The Vale contains a great variety of landscape, agriculture and settlement. Parkland and mixed farming characterise the northern and western edges defined by the river Ouse, intensive cash cropping the warplands and sands in the south, while woodlands, heaths and root cultivation occupy the areas of outwash sands to the east. Much of the Vale is just above sea-level and until comparatively late remained ill-drained. In the early eighteenth century large areas of common pasture, formed by the commons of Bishopsoil, Holme Moor and Wallingfen, supported large numbers of livestock. Drainage improvements did, however, lead to a considerable intensification of agricultural production and to horticultural development particularly in that area south of the Humber[36].

The Hull Valley was another ill-drained area in the early eighteenth century, the principal settlement occuring on ridges and hills of gravels and boulder clay left as the ice retreated. Until modern times there was much marshy 'carr' ground unsuitable for either settlement or cultivation[37]. The eastern boundaries of the region are formed by the glacial plain of Holderness, its hummocks of boulder clay, winding streams and paucity of woodland vegetation, forming a distinctive landscape. Livestock husbandry and arable farming characterise northern and middle Holderness, but below the string of villages marking the southern edges of the boulder clay, a different landscape emerged. Reclamation of the silts and saltmarshes of the Sunk Island area began in 1670, giving rise to a landscape of hedgeless arable fields studded with isolated farms by the twentieth century[38].

While there are clear physical differences in the sub-regions of eastern Yorkshire, the settlement structure of the area was of a more homogeneous character comprising farms, villages and market

towns, with only two large urban centres, York and Hull, disturbing this pattern. The region's population of approximately 142,000 persons in 1700 was widely and fairly evenly distributed in the region with the notable exception of the Wolds. Defoe's description of the area is particularly apt:-

> "I observed the middle of this....division of Yorkshire is very thin of towns, and consequently of people, being overspread with Woulds.... on which they feed great numbers of sheep, and breed also a great many black cattle and horses; especially in the northern part, which runs more mountainous, and makes part of the North Riding of York. But the east and west part is populous and rich, and full of towns, the one lying on the sea coast and the other upon the River Derwent, as above..." [39].

(b) Urban

Following the delimitation of the region, the next consideration becomes to identify the study towns. Defining urban areas has remained a somewhat intractable problem of geographical research and debate over the application of a variety of definitional criteria in both present day and historical contexts has occasioned a considerable body of literature on the subject[40]. In contemporary contexts the debate concerns not only the delineation between urban and rural areas, but also the whole question of standardising urban definitions across national boundaries[41]. In a historical context it has been argued that spatial definitions of urban areas can be more confidently predicted, for the divorce between urbanisation and the urban process, i.e. between the number of people living in towns and the numbers involved in urban ways of life irrespective of whether they are actually urban dwellers[42], had progressed significantly less far in the eighteenth and nineteenth centuries than it had in the twentieth[43]. Although eighteenth century towns may be considered fairly discrete spatial entities, the problem of identification still remains if concern is with the settlements'

role as a service centre for the surrounding countryside.

Distinction must be made between the formal and the functional town, the former referring to the physical extent of the built-up area and the latter to the linkages between town and hinterland[44]. It is with the latter that geographers are most concerned for

> "the very essence of urban character is the function of service for a tributary area.... it is this grouping of centralised services in a clustered settlement which is the essence of a town and which, at a higher grade is the hallmark of a city."[45].

Both contemporary and historical definitions of urban status, whether dealing with the formal or functional town, do, however, share common elements. Corfield, in her study of the pre-eighteenth century town, suggests that a town is

> "a relatively large, dense and permanent settlement of socially heterogenous individuals, whose economic fortunes are prevailingly non-agricultural"[46].

Several of the criteria suggested in this statement, namely, a minimum population threshold, a minimum level of population density, the settlement's role as a central place and the occupation of the majority of inhabitants in activities that are prevailingly non-agricultural, have been employed in numerous studies focusing on the nature of towns and cities. Weber, for example, refers to the town as a market place, Sjoberg to the greater size, density and heterogeneity of such centres, and Lampard to the relatively permanent concentration of population, diverse habitations, social arrangements, discrete site and cultural importance[47].

Law, in his analysis of urban growth in nineteenth-century England, adopts three main criteria to identify the study towns. These are a minimum population threshold of 2,500 persons, a population density of at least one person per acre, and a degree of morphological clustering. These criteria were also accepted by Robson and applied in his study of nineteenth-century urban

growth[48]. While these criteria may be acceptable for large scale studies of urbanisation in the nineteenth century, for the eighteenth century and earlier - and for analyses of the urban structure of predominantly rural regions and thereby lower-order centres - their application poses considerable difficulties. For example, the use of a minimum density limit of one person per acre loses much of its validity in the extensive parishes that were characteristic of many unincorporated towns in rural areas. Indeed Bowley, also working on the nineteenth century, suggested a figure as low as 0.3 persons per acre to delimit urban from rural areas[49], and it would seem plausible to argue that for eighteenth-century studies this figure is more realistic.

The third criterion, that of spatial clustering, also raises difficulties in the context of eighteenth-century studies: maps and plans of smaller towns are seldom available on a uniform basis and accordingly this criterion is in danger of becoming a largely subjective measure of urban status. A further widely adopted element of town status, that a majority of inhabitants should be engaged in non-agricultural pursuits, can be easily measured in the nineteenth century; but for earlier time periods the measurement of this variable becomes increasingly difficult due to severe information constraints, especially regarding total occupational structure. Furthermore, before 1800 a significant proportion of manufacturing activity in rural regions was not concentrated in towns and a significant number of persons having close ties with the land resided within urban areas[50]. There are thus considerable drawbacks in using these criteria to identify towns in the eighteenth century and earlier, and it is suggested that additional more 'basic' criteria need to be adopted to define towns before 1800.

In pre-industrial England the legal possession of a market

virtually defined a town and it was largely the process of industrialisation that brought into being settlements that were neither villages, nor towns - in the sense of serving the surrounding countryside[51]. For the eighteenth century and earlier, the simplest definition of urban status may be provided by the right to hold a market on a regular basis; a criterion adopted by writers such as Everitt, Patten and Carter[52]. Several sources evidence the existence of markets and fairs from Domesday to the twentieth century and although at various dates there is occasional disagreement between sources, there is generally a consistency of identification.

In the thirteenth and fourteenth centuries eastern Yorkshire was served by as many as 54 market centres, widely distributed throughout the region (figure 1.3). Of this number listed in the Calendar of Charter Rolls of the thirteenth to fifteenth centuries, more than forty disappeared in the ensuing four centuries while eleven new towns emerged in the regional urban structure; incisive evidence of the operation of the processes of selective urban growth and spatial sorting (see Appendix I). These processes were far from simple. Following an initial phase of urban genesis in the period circa 1200-1400, a secondary genesis phase occured in juxtaposition to a process of rationalisation in the number of towns. Of the original 54 market towns, only twelve retained their status and emerged intact at the start of the sixteenth century, while eight towns had been 'born' into the regional urban system in the same period. Furthermore, if we adjudge Everitt's list of known market centres in the sixteenth century to be correct, then three of the original number, namely Easingwold, Patrington, and Hornsea, appear to have temporarily lost their market status at this time; a fact borne

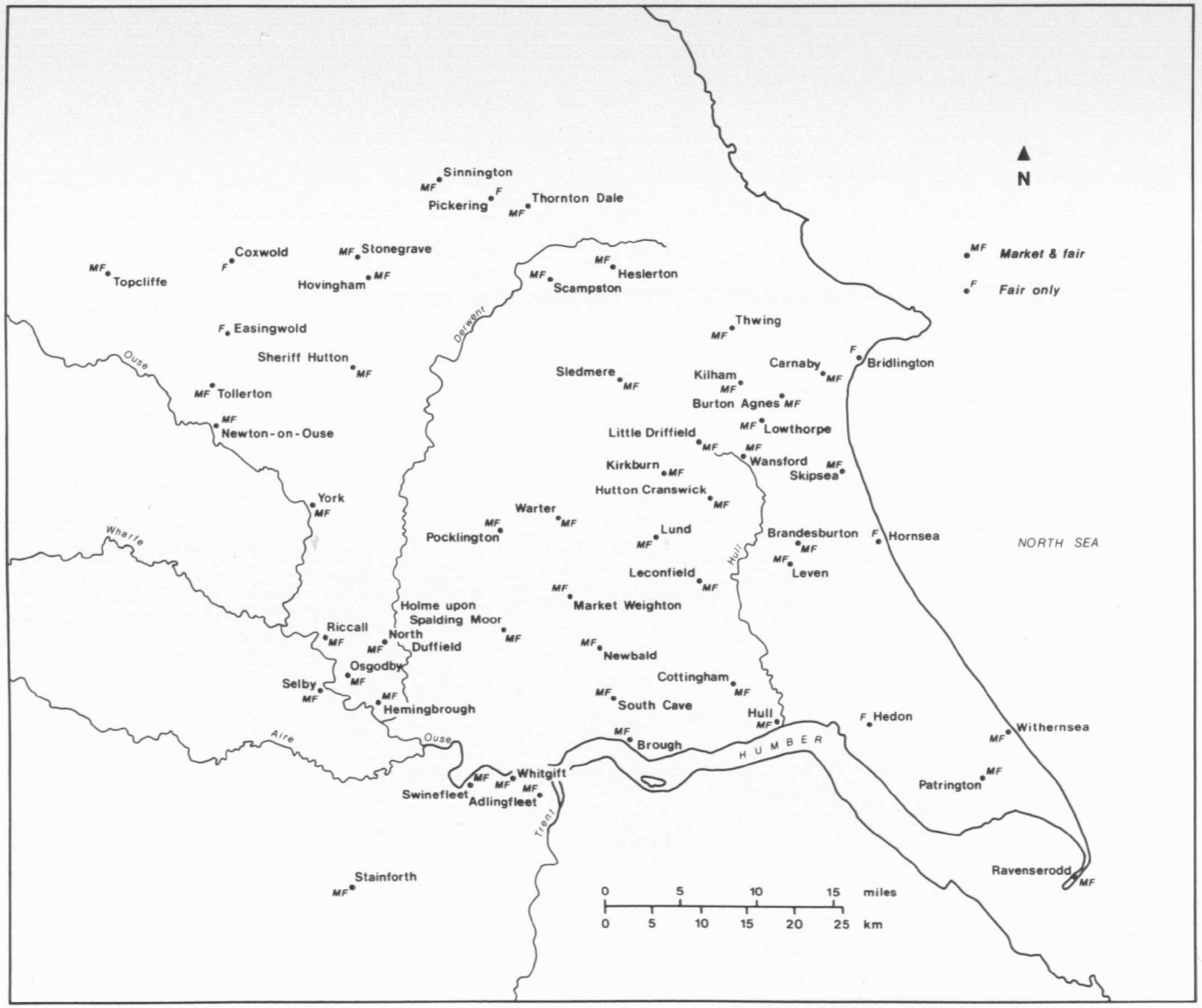

Fig.1.3 Market Centres in Eastern Yorkshire, c.1400

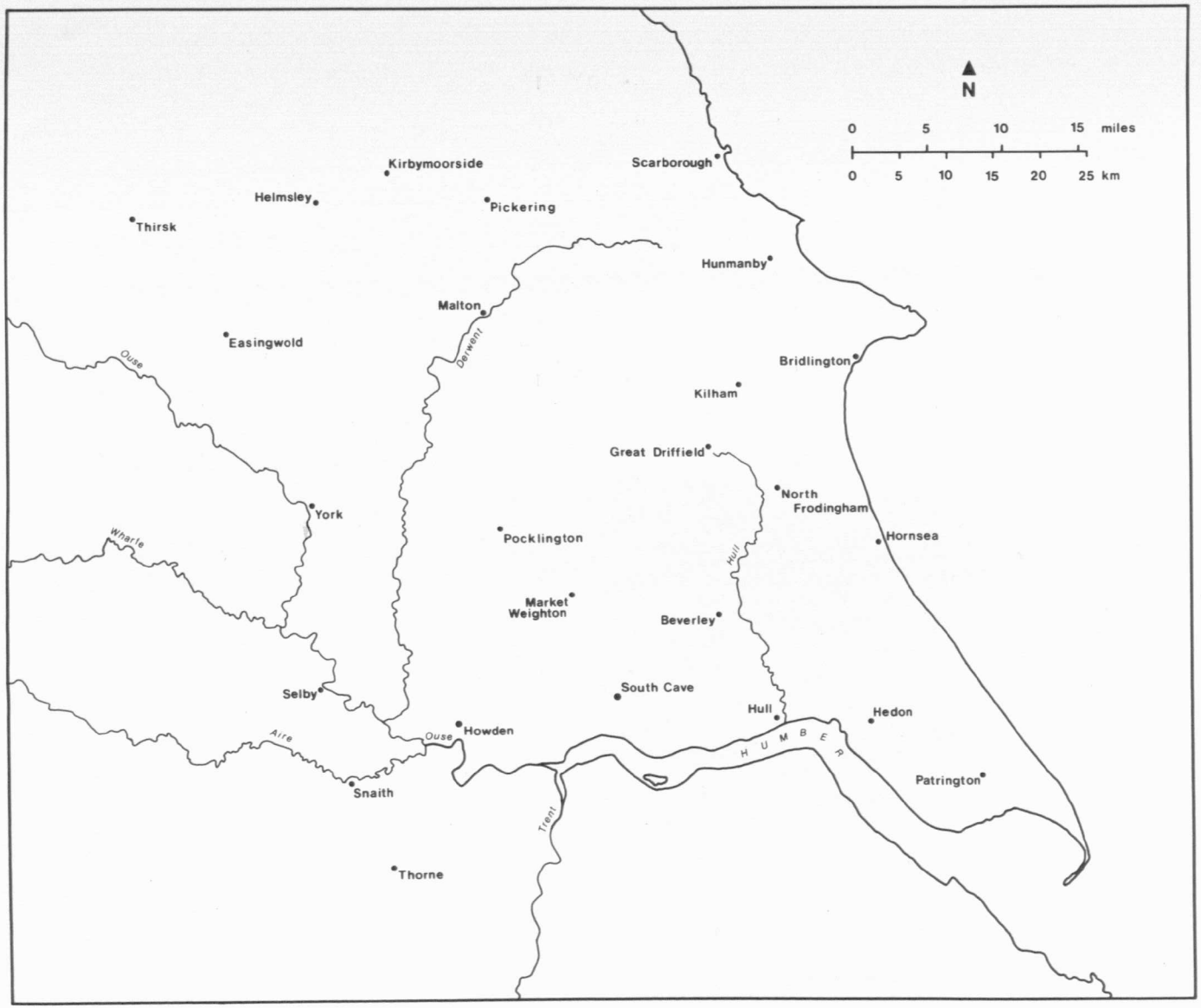

Fig.1.4 Market Centres in Eastern Yorkshire, c.1700

out by contemporaries such as Leland who described Patrington as a haven town yet having no market[53]. The disappearance of hundreds of markets in the country as a whole after the Black Death was followed by little subsequent revival of numbers. Between 1500 and 1700 the number of market centres in eastern Yorkshire only marginally increased; John Adam's Index Villaris of 1670 suggests that only Hunmanby, Thorne and North Frodingham were added to the existing urban system[54].

In 1700 eastern Yorkshire was served by twenty-five market centres (figure 1.4) accounting for just over one quarter, or 27%, of the region's population[55]. These towns had enjoyed mixed fortunes in the preceding period. In common with towns in other regions of England some had undergone a certain degree of structural crisis. In 1560 Elizabeth I forgave the burgesses of Beverley their portion of certain 15th's and 10th's given to her by parliament, because there were then in the town 400 houses "utterly decayed and uninhabited" and the corporation was burdened with a great number of paupers and the maintenance of orphans; Beverley also suffered a hurricane in 1608 and a plague in 1610[56]. A serious fire burnt down forty-two houses in Hedon in 1657[57], while Leland observed that in 1534 Scarborough harbour was "sore decayed"[59]. Other towns appear to have faired rather better, neither prospering nor decaying in the period. Kirkby Moorside for example was described by Camden as "one of the most inconsiderable market towns"[60], Malton was accounted by Celia Fiennes to be a "pretty large town but...poor", and in Blome's Brittannia of 1673 Pocklington was described as a little town with a "meane market on Saturdays"[61]. By the turn of the seventeenth century, however, towns which had undergone 'crises' were displaying sure signs of recovery, while other country towns appeared to be strengthening their demographic and economic base. Both Beverley and Hedon were accounted by Gibson to have undergone

a considerable degree of rebuilding, while Selby, Thorne, Thirsk and Pickering were all described as populous towns[62].

None of these towns, however, were of large population at this time; only two of their number had populations in excess of three thousand persons. Small towns which acted as local centres of commerce and distribution were thus of particular importance in the regional settlement system. Although the proportion of the urban population residing in these communities declined in the following century and a half, the percentage of the total regional population inhabiting them increased, from 15% to 20%[63], thereby strengthening their regional position. At the start of the eighteenth century the towns of eastern Yorkshire were not highly differentiated in terms of size or function but it is possible, in line with other studies, to identify a hierarchy of settlements in terms of their demographic, economic and social structure.

Studies of hierarchies for periods before the nineteenth century are few due to the absence of adequate data bases upon which to evaluate the relative standing of individual towns. The principal work in this field has been undertaken by Carter in his analysis of the towns of Wales and by Patten for East Anglian towns, while an early paper by Rodgers also touched on the nature of the urban hierarchy in sixteenth and seventeenth-century Lancashire[64]. Certainly, before directory information becomes available toward the turn of the eighteenth century, requisite data sources for any form of central place analysis are few. One is also faced with the problem that town functions change over time so that for any given temporal perspective it becomes necessary to adopt different criteria. In his study of the growth and decline of Welsh towns Carter concludes that

> "Before the nineteenth century there is virtually no data available for the whole country in standard form, so that the consideration of all cities in an operating system is extremely difficult..... In order to generate some comparative study of .....

> towns, one is forced to either employ data becoming available in the early nineteenth century in a retrospective fashion, or use the comments of many travellers...."[65].

However, through the use of the Hearth Tax Returns, parish registers and the comments of contemporaries it is possible to glean something of the urban settlement structure at the start of the eighteenth century.

3. Demographic Characteristics

The analysis of demographic structure in the period before official registration began and before the taking of the first census in 1801 poses considerable problems. While the Anglican church parish registers are undoubtedly one of the best sources for the detailed analysis of population, aggregative analysis is a time consuming approach that seldom yields reliable estimates of total population. If we are interested primarily in aggregate totals for specific time periods then equally, if not more, reliable estimates can be obtained from a variety of sources. Several have been employed for the eighteenth century and earlier and have provoked much discussion and debate[66]. Some researchers seeking to establish population trends for the eighteenth century have utilised the parish register abstracts compiled by John Rickman at the taking of the first four censuses. Flinn, however, has voiced doubts as to the validity of these estimates and has drawn attention to the considerable discrepancies that may result from their use[67]. Glass is in agreement and states that

> "any further serious attempt to investigate population growth in the eighteenth century on the basis of parish register material must break away from the Rickman series"[68].

The recent volume by Wrigley and Schofield provides further conclusive evidence of the unreliability of these abstracts for the detailed investigation of the nature of demographic change in the period before 1800[69].

One of the more widely used sources, and that employed by King in his demographic analysis of England, are the Hearth Tax Returns of the final quarter of the seventeenth century. Some academic debate has surrounded their use, principally concerning the application of multipliers in order to make satisfactory numerical counts of the population of the settlement or region in question. King applied different multipliers according to the number of hearths per household[70]. Others such as Foster and Patten, however, have argued for the use of a constant multiplier of between 4 and 6 and have proposed that lower multipliers be applied only in the case of households too poor to be subject to the tax[71]. The determination of multipliers is thus in danger of becoming a rather subjective process and unless detailed information of the household structure of the community is available, the use of any set of varying multipliers must be treated with caution. In his analysis of the Hearth Tax Returns for Yorkshire, Purdy suggests that the true estimate of population is likely to fall somewhere between a multiplier of 4 and 5[72], a suggestion supported by Crafts[73]. Accordingly, in this study of eastern Yorkshire a multiplier of 4.5 has been used.

The Hearth Tax Returns can provide reasonable estimates of town populations at the close of the seventeenth century. Within eastern Yorkshire urban settlements and market centres (including York and Hull) ranged in size from 400 to 10,000; although in most cases variations in size were not of a large magnitude, small, but significant, breaks in the size hierarchy can be recognized (figure 1.5). The most significant breaks occur at 1,600 and 5,000 which conform to the accepted idea of a three-tier urban hierarchy. Further examination of the graph, however, indicates additional breaks at 1,100 and 600, suggesting that among the lower levels of the system a further subdivision of country towns into thriving, intermediate and declining centres,

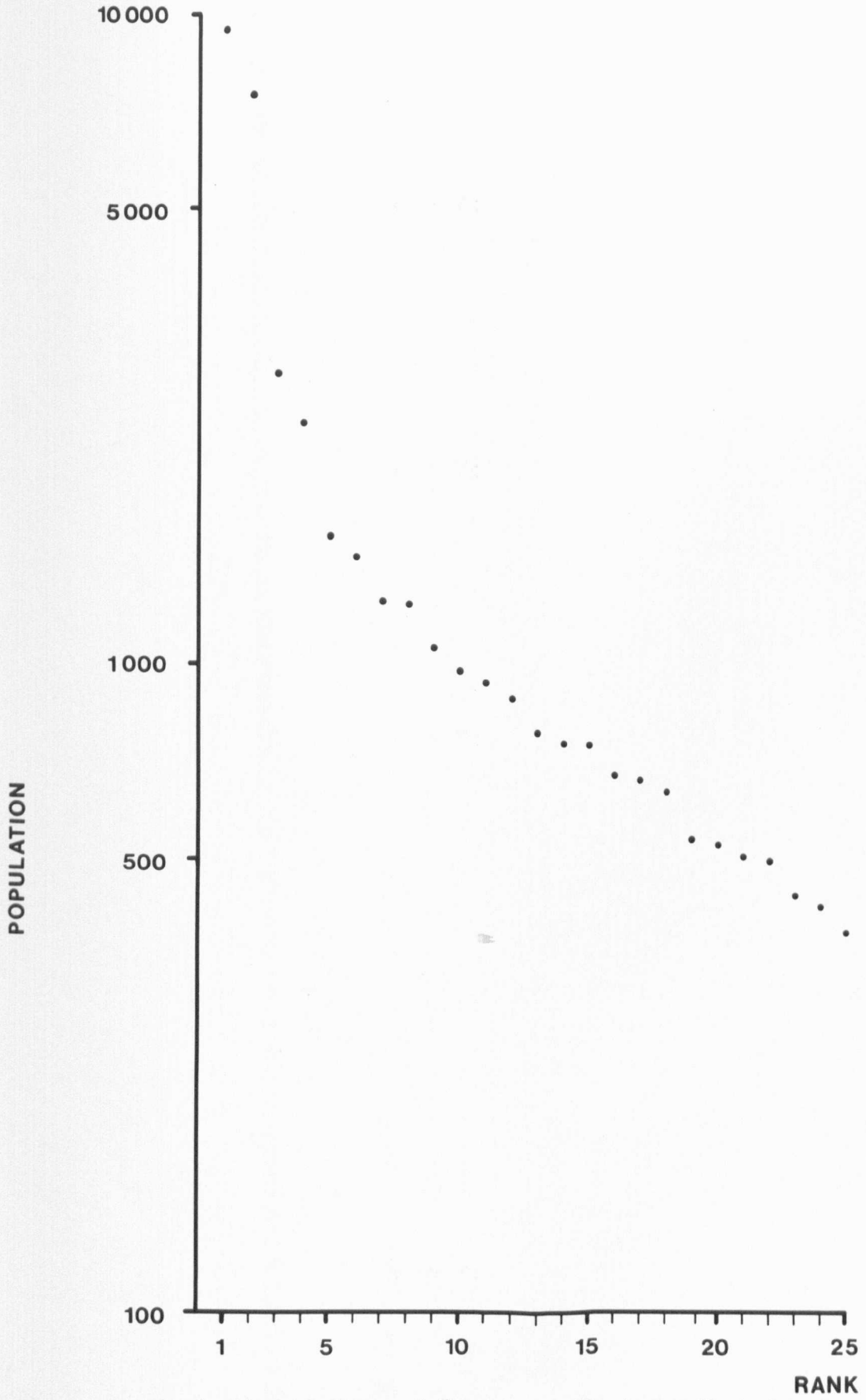

Fig.1.5 Rank-Size Array of Towns in Eastern Yorkshire, c.1700

in common with that argued by Carter for Wales[74], was occurring and that the emergence of a more complex settlement system was in an embryonic stage.

A further measure of the demographic status of settlements provided by the Hearth Tax Returns is that of population density. If Bowley's 'qualifying' figure of 0.3 persons per acre is applied to eastern Yorkshire towns at the close of the seventeenth century, then approximately half of their number did not qualify for urban status (table 1.3). Of these all, except Pickering and Thorne, fall toward the lower end of the size hierarchy and had populations of less than 900 persons. At the upper levels of the size hierarchy there was a strong correlation between density ratio and town size (table 1.3), but at lower levels the relationship breaks down with a Pearsonian Product Moment correlation coefficient of -0.03. It would appear that this criterion can only be weakly applied in analysing the early-eighteenth-century town.

A more appropriate, if more general, demographic measure of the relative standing of individual towns is provided by analysis of the density of households per thousand acres. If household density ratios are used to accord urban status we are, however, still faced with the problem of the determination of a dividing line between rural and urban settlements. Purdy, in his analysis of the Hearth Tax Returns for Yorkshire, calculated household density ratios for all parishes and Wapentakes of the county. These produced averages of: East Riding 18.0, North Riding 18.8 and West Riding 22.5, and a mean for the whole of Yorkshire of 19.8. Because the West Riding contained a larger proportion of towns than either the East or North Ridings, and as only three eastern Yorkshire towns lay in the administrative region of the West Riding, the critical density ratio applied to delimit urban and rural settlements was nineteen households per thousand acres, a

Table 1.3 Demographic Structure of Eastern Yorkshire Towns c. 1700

Town (ranked by size)	No of Households	Population Estimate	Density Persons per Acre	Density Households per 1,000 Acres
York	2,121	9,545	3.5	779.8
Hull	1,369	7,510	6.7	1228.9
Beverley	620	2,790	1.3	279.3
Scarborough	514	2,315	2.0	450.9
Bridlington	352	1,585	0.5	115.0
Malton	326	1,465	1.1	241.5
Pickering	276	1,240	0.1	19.3
Selby	274	1,235	0.4	86.2
Thorne	232	1,045	0.1	21.4
Thirsk	219	985	0.3	72.3
Howden	207	930	0.3	73.4
Helmsley	197	890	0.1	24.0
Easingwold	176	790	0.1	27.0
Pocklington	168	755	0.3	66.7
Hunmanby	167	750	0.1	23.2
Kirkby Moorside	150	675	0.2	40.2
Great Driffield	147	660	0.1	29.9
Market Weighton	141	635	0.1	23.5
Patrington	119	535	0.2	37.4
Hedon	117	525	0.4	81.3
South Cave	112	505	0.1	24.2
Kilham	110	495	0.1	14.4
Hornsea	97	435	0.1	30.7
Snaith	93	420	0.6	127.4
North Frodingham	85	380	0.1	29.5

Correlation with town size.

All towns	Pearsons r	0.48	0.91
Towns ranked 1-9	"	0.84	0.87
Towns ranked 10-25	"	-0.03	0.02

high value for rural areas but low for urban areas. If a household-density ratio of nineteen is taken as the dividing line between urban and rural status, all but one of the study towns qualified as urban. Among the region's towns there is a strong positive correlation between size and household density, with an associated probability greater than 0.01 (table 1.3). A few towns, however, greatly distort this overall relationship. Both Hedon and Snaith were borough towns of small areal extent and thus produced high scores; but for the extensive urban parish of Pickering (comprising over 16,000 acres), where the precise areal extent of the settlement cannot be estimated, the score is of a very low magnitude. This was also the case for Kilham, - an urban parish of some 8,500 acres -, the only market centre not qualifying for urban status on the basis of this variable. As in the case of the density of persons per acre, the relationship between household density and size was most closely developed among the higher order towns, breaking down among the lower order centres. It is possible, however, to identify broad groupings of density. Towns at the head of the settlement hierarchy generally had densities in excess of 200 households per thousand acres, middle order towns densities of between 40 and 100, and the lowest order towns densities of below 40 although, as table 1.3 shows, there was measurable inter-urban variation in respect of this variable.

Demographically the regional structure of urban settlement was well differentiated in 1700. Although most towns were small, having populations of less than 3,000 persons, their distribution throughout the region can hardly be considered homogeneous (figure 1.6). York, on the banks of the Ouse, and Hull, on the bank of the Humber, dominated the region, while Beverley, Scarborough, Bridlington and Malton stand out amongst the other towns. It is interesting to note that at the start of the

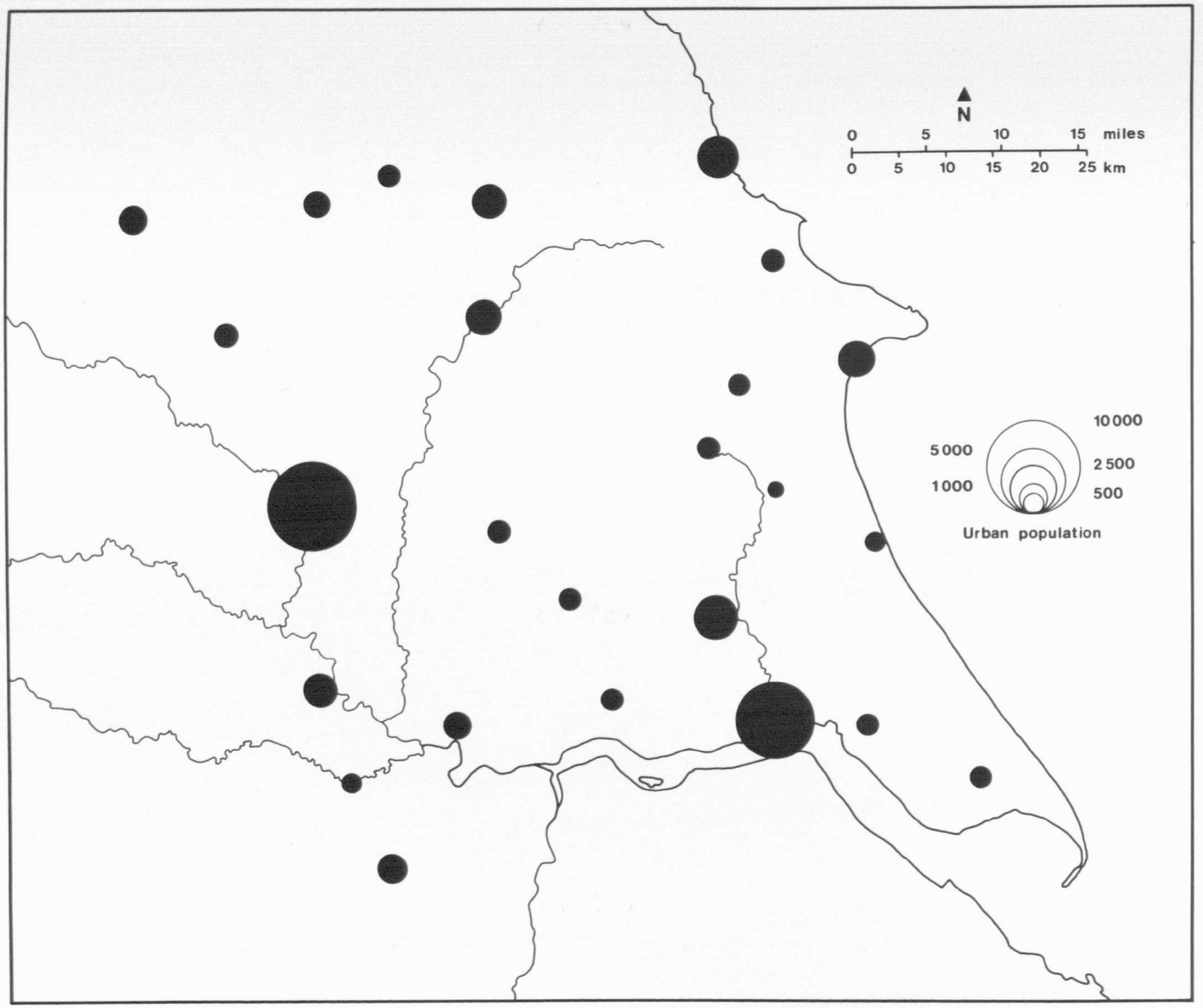

Fig.1.6 Population Size of Eastern Yorkshire Towns, c.1700

eighteenth century it was the coastal ports, or towns with access to navigational links which demographically 'dominated' the regional settlement structure. The High Wolds, lacking any form of natural river drainage, was noticeably the area least well served by towns. According to Ogilby's survey of 1675 there were few good roads in eastern Yorkshire and Kitchen's map of 1749 shows only one main road in the East Riding running through from Hull to Bridlington. It must be concluded then that many settlements which lay remote from the sea and good harbourage facilities or at some distance from navigable rivers were, because of the poor nature of the road system, effectively isolated.

4. Social Characteristics

In their analyses of the pre-eighteenth century town, Clark, Slack, Phythian-Adams and Corfield all suggest that an administrative, political or social role was an important hallmark of towns at every level of the country's settlement system[75]. Although the social characteristics of towns were not necessarily particularly well developed, extremes of social structure were more obvious than in the average rural community[76]. The principal source available for the analysis of social structure at the close of the seventeenth century are the Hearth Tax Returns of the 1660's and 1670's; for householders are generally listed in a manner determined by their social position while the number of hearths provides an important measure of the total social structure of the community. The labouring classes, together with smaller artisans, tradesmen and husbandmen, were listed by their christian name; the upper social classes were recorded with the addition of a title, and many schoolmasters and clergy were also identified in the returns[77]. Several authors have suggested that the number of hearths belonging to each household can be broadly

equated to socio-economic groups; this has been well demonstrated by Hoskins in Exeter, Butlin in Dublin and Langton in Newcastle[78]. They have shown that households with one or two hearths belonged principally to labourers, small farmers and artisans; those with three to five hearths usually belonged to the yeomanry, 'medium' farmers and more prosperous artisans and traders; houses with six to nine hearths were owned largely by the gentry, by a selection of the squirearchy and by more substantial merchants and manufacturers. Those households with more than nine hearths were principally those of squires, manorial lords and, in large towns, those of the commercial aristocracy of wealthy merchants, manufacturers, professional men and the gentry[79]. Analysis of the hearth structure of individual communities and the number and constitution of upper social classes in them may thus provide detailed insight into the social standing of these places within the regional settlement system. As with the analysis of demographic characteristics, we need to determine the level at which rural settlements can be adjudged distinct from country towns.

Of the three Yorkshire Ridings, the West was the most populous and prosperous followed by the North and East. At the close of the seventeenth century eastern Yorkshire contained some 31,500 households, 78% of which were taxed. Of this number 62.3% had only one hearth, 19% two hearths, 14.3% three to five hearths, 2% six to eight hearths and 2.6% more than that number. (For a detailed breakdown of the region's hearth structure see Appendix II). If these are taken as broadly characteristic of a rural region then it would be expected that towns would exhibit greater extremes of social structure. Tables 1.4 and 1.5 indicate the social profiles of eastern Yorkshire towns ranked by size.

The proportion of households not subject to the tax averaged

Table. 1.4 Social Profile of Eastern Yorkshire Towns and Eastern Yorkshire c. 1700

Town (ranked by size)	Number of Hearths % 1-2	3-5	6-8	over 9	Not Charged
York	44.1	36.2	12.6	7.0	20.5
Hull	50.3	35.2	10.6	3.8	19.6
Beverley	49.0	38.3	10.4	2.3	30.2
Scarborough	63.5	31.2	3.7	2.3	36.2
Bridlington	69.2	28.2	2.0	1.0	34.6
Malton	71.3	24.2	2.6	1.8	31.6
Pickering	93.2	5.8	0.5	0.5	26.1
Selby	54.7	42.7	2.1	0.4	12.8
Thorne	71.9	24.5	2.6	1.0	19.0
Thirsk	70.7	26.8	2.4	-	25.1
Howden	59.2	35.5	4.5	0.7	24.1
Helmsley	87.0	10.0	2.0	1.0	49.2
Easingwold	88.5	10.7	0.8	-	26.1
Pocklington	84.8	12.0	1.6	1.6	25.6
Hunmanby	89.1	9.1	0.9	0.9	34.1
Kirkby Moorside	75.5	21.5	3.0	-	32.0
Great Driffield	91.5	5.6	1.4	1.4	51.7
Market Weighton	86.0	12.3	1.6	-	14.2
Patrington	80.0	17.4	2.6	-	37.0
Hedon	58.7	35.9	5.4	-	21.4
South Cave	83.0	14.2	1.8	0.9	6.3
Kilham	75.9	22.7	1.3	-	28.8
Hornsea	81.9	16.8	1.2	-	14.4
Snaith	63.3	29.6	5.6	1.4	23.6
North Frodingham	90.6	7.8	1.6	-	24.7
MEAN	73.3	22.2	3.4	1.1	26.7
S.D.	14.5	11.4	3.2	1.5	10.4
VAR	206.7	125.3	10.0	2.3	105.2
Eastern Yorkshire	81.2	14.3	3.0	1.6	21.8

Table 1.5

Social Profiles of Eastern Yorkshire Towns, c.1700

Town (ranked by Size, c.1700)	No. of Hearths															
	1	2	3	4	5	6	7	8	9	10	11	12	Over 12	Total Charg.	Total Non Charg.	Total Households
York	297	447	277	215	120	98	69	45	34	35	16	10	24	1,687	434	2,121
%	17.6	26.5	16.4	12.7	7.1	5.8	4.1	2.7	2.0	2.1	0.9	0.6	1.4		20.5	
Hull	238	316	156	138	94	57	44	15	8	14	6	4	10	1,108	261	1,369
%	21.6	28.7	14.2	12.5	8.5	5.2	4.0	1.4	0.7	1.3	0.5	0.4	0.9		19.6	
Beverley	110	102	81	52	33	23	12	10	5	1		1	3	433	187	620
%	25.5	23.5	18.7	12.0	7.6	5.3	2.8	2.3	1.2	0.2		0.2	0.7		30.2	
Scarborough	121	87	48	38	16	6	5	1	2	1	2	1		328	186	514
%	37.0	26.5	14.6	11.6	5.0	1.9	1.5	0.3	0.6	0.3	0.6	0.3			36.2	
Bridlington	100	59	32	23	10	3	1				1	1		230	122	352
%	43.5	25.7	13.9	10.0	4.3	1.3	0.5				0.5	0.5			34.6	
Malton	111	48	28	20	6	3	3		3				1	223	103	326
%	49.8	21.5	12.5	9.0	2.7	1.3	1.3		1.3				0.5		31.6	
Pickering	159	31	4	6	2		1		1					204	72	276
%	78.0	15.2	1.9	2.9	1.0		0.5		0.5						26.1	
Selby	63	68	53	38	11	3	1	1					1	239	35	274
%	26.3	28.4	22.2	16.0	4.5	1.3	0.4	0.4					0.4		12.8	
Thorne	80	55	27	15	4	3	2		1	1				188	44	232
%	42.6	29.3	14.4	8.0	2.1	1.6	1.0		0.5	0.5					19.0	
Thirsk	71	45	24	13	7	4								164	55	219
%	43.3	27.4	14.6	7.9	4.3	2.4									25.1	
Howden	53	40	29	15	12	4	2	1	1					157	50	207
%	33.8	25.4	18.4	9.5	7.6	2.5	1.3	0.7	0.7						24.1	
Helmsley	62	25	4	5	1	1	1						1	100	97	197
%	62.0	25.0	4.0	5.0	1.0	1.0	1.0						1.0		49.2	
Easingwold	91	24	10	2	2		1							130	46	176
%	70.0	18.5	7.7	1.5	1.5		0.8								26.1	

Table 1.5 (continued)

Social Profiles of Eastern Yorkshire Towns, c.1700

Town		No. of Hearths												Over 12	Total Charg	Total Non Charg	Total Households
		1	2	3	4	5	6	7	8	9	10	11	12				
Pocklington		82	24	11	3	1	1	1		1		1			125	43	168
	%	65.6	19.2	8.8	2.3	0.8	0.8	0.8		0.8		0.8				25.6	
Hunmanby		84	14	9		1	1					1			110	57	167
	%	76.4	12.7	8.2		0.9	0.9					0.9				34.1	
Kirkby Moorside		62	15	9	10	3	1	1	1						102	48	150
	%	60.8	14.7	8.8	9.8	2.9	1.0	1.0	1.0							32.0	
Great Driffield		51	14	2	2		1						1		71	76	147
	%	71.8	19.7	2.8	2.8		1.4						1.4			51.7	
Market Weighton		84	20	11	2	2	2								121	20	141
	%	69.4	16.6	9.1	1.6	1.6	1.6									14.2	
Patrington		39	21	8	3	2	1	1							75	44	119
	%	32.0	28.0	10.7	4.0	2.7	1.3	1.3								37.0	
Hedon		26	28	18	9	6	4	1							92	25	117
	%	28.3	30.4	19.6	19.8	6.5	4.3	1.1								21.4	
South Cave		70	17	13	1	1	1	1						1	105	7	112
	%	66.7	16.3	12.4	0.9	0.9	0.9	0.9						0.9		6.3	
Kilham		46	14	13	5		1								79	31	110
	%	58.2	17.7	16.4	6.3		1.3									28.2	
Hornsea		44	24	10	3	1	1								83	14	97
	%	53.0	28.9	12.0	3.6	1.2	1.2									14.4	
Snaith		28	17	9	5	7	3	1						1	71	22	93
	%	39.4	23.9	12.7	7.1	19.8	4.2	1.4						1.4		23.6	
North Frodingham		47	11	3	2		1								64	21	85
	%	73.4	17.2	4.7	3.1		1.6									24.7	

approximately one-quarter in all towns, but the standard deviation of 10.4 indicates that there was measurable variation between the centres. Generally, as in the case of Driffield and Helmsley, the poorer hearthed settlements displayed the highest levels of untaxed households, but noticeable exceptions to this general trend are found in three towns; Scarborough and Bridlington where more than one-third of all households were untaxed and in South Cave where this number was as low as 6% (table 1.5). The greatest inter-urban variation, in terms of social structure, occurred in the number of households in each town of between three and five hearths, the mean value being 22.2% and the standard deviation 11.4. Several smaller communities, in particular Hedon, Snaith and Kilham, had significant numbers of households in this category. Households with six or more hearths could be found in all the towns of the region, but below the four largest towns they accounted for no more than 5% of households in any centre[80].

Comparing the social structure of eastern Yorkshire towns to the region as a whole, it is evident that collectively they were better hearthed (table 1.4). A higher percentage of households within eastern Yorkshire, however, contained nine or more hearths; probably explained by the existence of large country houses which were the seats of gentry and nobility within several of the wholly rural parishes. The higher level of uncharged households within the region's towns is possibly explained by the large numbers of labouring poor living in cramped and overcrowded dwelling places, often yards behind the main street frontages. Although some towns were of poorer social status than the region, the mean percentage of households of between three and eight hearths (representing artisans, traders, merchants and manufacturers) evidence the higher social status of towns. Almost 26% of all town taxable households contained between three and eight hearths compared with a little over 17% in the region. Conversely the region had a

higher percentage of households of only one or two hearths, 81.2% compared with 73.3%, indicating the larger number of small farmers and rural labourers in the region. Reference to the number of titled inhabitants made in the Returns, supplemented by similar information listed by Adams in his Index Villaris[81], provides additional information on the social status of towns.

Clearly a town's social profile could reflect its relative standing within the regional urban system. Titled inhabitants have been divided into four groups of peers, esquires, gentry and masters[82], with an additional column for clergy (table 1.6). As would be expected, the largest towns score in respect of all four variables and were inhabited by more than three gentry[83]. Towns with populations of between 1,100 and 1,600 persons contained, on average, more than ten titled inhabitants. The lower order towns displayed only weak patterns of differentiation, although those centres of less than 600 persons, with the exception of Hedon and Snaith, each had fewer than five titled inhabitants (table 1.6). This would thus suggest that there was a degree of correlation between population size and social status. Correlating the number of titled inhabitants with town size, a Pearsons r of 0.88 is obtained with an associated probability of p 0.01. As in the case of household density and size, the correlation becomes weaker among the lower order towns, a vital distinction being apparent between corporated and unincorporated towns. If town 'hearth category' percentages are related to town size similar patterns emerge. Towns at the head of the urban settlement system not surprisingly attained the higher social rank, having lower percentages of households in the small hearth categories and higher percentages in the better hearthed classes. As is demonstrated by figure 1.6, this relationship is only clearly developed for the four largest towns of York, Hull, Beverley and Scarborough; among the middle and lower order centres the

Table 1.6 Social Status of Eastern Yorkshire Towns c. 1700

Town (ranked by size)	Peers etc	Esquires	Gentry	Masters	Clergy	Total
York	15	16	3@	375	14	423
Hull	2	3	3@	84	-	89
Beverley	5	4	3@	47	-	59
Scarborough	2	1	3@	20	-	26
Bridlington	1	-	2	9	-	12
Malton	1	-	-	14	-	15
Pickering	-	-	2	2	3	7
Selby	-	1	2	26	-	29
Thorne	-	-	2	19	-	21
Thirsk	-	-	2	5	-	7
Howden	-	-	2	11	-	13
Helmsley	-	-	2	8	-	10
Easingwold	-	1	2	4	-	7
Pocklington	-	1	1	5	-	7
Hunmanby	-	1	2	2	-	5
Kirkby Moorside	-	-	1	3	2	6
Great Driffield	-	1	-	1	-	2
Market Weighton	-	-	1	3	-	4
Patrington	1	-	2	2	-	5
Hedon	-	-	2	9	-	11
South Cave	-	-	-	2	-	2
Kilham	-	-	1	1	-	2
Hornsea	-	-	1	-	-	1
Snaith	1	-	1	4	2	8
North Frodingham	-	-	-	2	-	2

Correlation with town size

All towns	Pearsons r	0.88
Towns ranked 1-9	"	0.86
Towns ranked 10-25	"	0.67

@ = more than 3

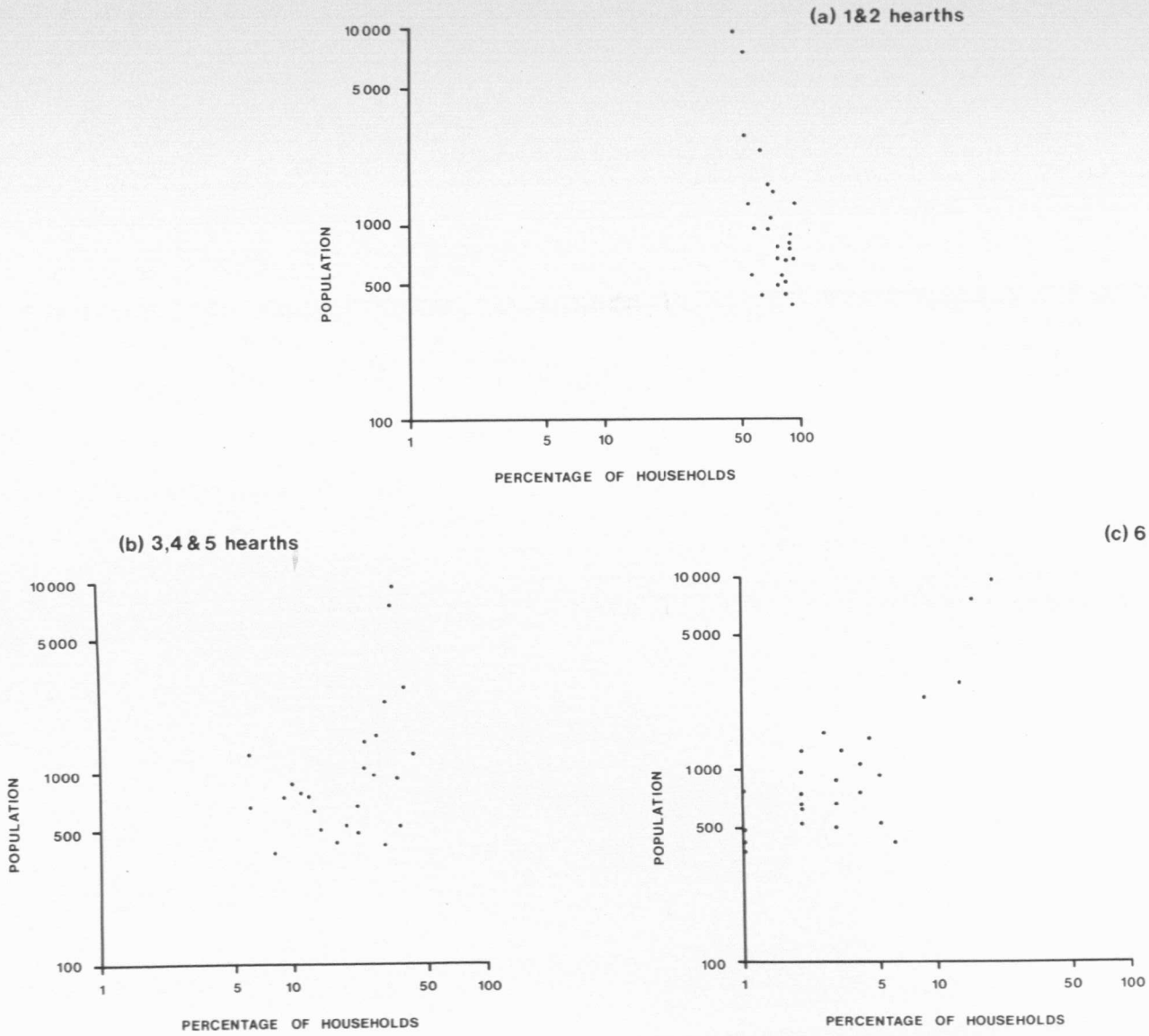

Fig.1.7 The Relationship between Population Size and Hearth Structure

correlation is weaker with several very small towns, in particular those with borough status, being well hearthed. While there was clearly an important relationship between social status and town size, other determinants such as landownership structure and the historical antecedents of town growth are arguably of some significance.

5. Economic Characteristics

If demographically and socially the lower levels of the region's settlement system displayed a fairly high level of homogeneity, economically there was rather greater diversity, for the sixteenth and seventeenth centuries had seen marked and sometimes violent fluctuations in the level of economic activity in most English towns[84]. Between 1500 and 1700 there was often a sharp divergence between the demographic and economic fortunes of urban centres. Decisive elements of local experience were the changing relationship between the town and hinterland, the relationship of the town with other local centres and the relationship between the town and other leading local landowners. Fluctuations in the economy could also be brought about by catastrophic events: war, fire, plague and physical change[85]. In the seventeenth century there was some polarisation in the economic fortunes of towns as demographic change, the rationalization of agricultural production and the growing concentration of rural wealth in the hands of the country landowners channelled trade towards the larger centres[86]; but most small towns did become more economically viable and were ready to emerge as stronger communities within the regional settlement system. The decline in the number of urban places and the emergence of a new economic balance between the remaining towns ensured this.

The functional basis of these inland country towns was strongly related to the rural economy and an expanding

agricultural base was arguably an essential prerequisite for urban economic expansion and a major determinant of urban function. At the turn of the seventeenth century, however, agriculture was limited both by the range of crops and stock available, by patterns of landownership and by the organisation of agrarian systems[87]. For the country as a whole, the most obvious sign of change in the period before 1800 was enclosure; the most palpable means of modifying both the landscape and the organisation of agricultural production. It was a process which played an important part in "drawing together the counties of England into an agrarian market"[88]. In eastern Yorkshire, however, enclosure was not widespread before 1750. Although several changes had taken place in the agricultural system of the region in the course of the sixteenth and seventeenth centuries, agriculture was not particularly well advanced by 1700[89].

At the start of the eighteenth century the Wolds formed a great expanse of bare upland about two-thirds of which was enclosed after 1730. Common pastures, extensive sheep walks and rabbit warrens were common, with barley occupying the largest share of available cropland[90]. Holderness was also dominated by open field farming especially on the better drained areas of boulder clay; large common pastures and ill-drained meadow, pasture and carr land prohibiting the development of a highly productive agricultural system[91]. The generally low-lying and often ill-drained area of the Vale of York had been less favourable to the development of open-field arable land. Nowhere else in eastern Yorkshire were common pastures so extensive and the total number of livestock must have been very large[92]. To the north and northwest, in the Vale of Pickering and on the Howardian Hills, few open fields remained, and about one-third of all land was under tillage. Problems of drainage, and the over-large size of many of the newly enclosed fields, however,

served to restrict agricultural development and it was generally considered that the area was capable of substantial improvement[93]. While by the turn of the seventeenth century some of the region's fields had been laid to pasture, and some enclosed, the majority of land remained unenclosed and the adoption of new crops and techniques had yet to become widespread. Changes in the agricultural system in the following centuries were to have a profound bearing on the urban economy and, more fundamentally, on town trade which remained sensitive to agricultural fluctuations.

At the start of the eighteenth century, the economy of eastern Yorkshire was devoted largely to agricultural production. Natural resources were few and the only industrial activity came in the form of quarries, brickworks and various extractive industries. The marketing of agricultural produce was the principal motive force in the region's economy, and all towns depended upon a degree of commercial activity and upon a basic network of trade for their economic survival. For the early eighteenth century country town, trade in agricultural products was the most important function for it emphasised their role as central places for the surrounding countryside. Most of the towns of eastern Yorkshire had been granted markets and fairs in the medieval period; these grants provided towns with an array of economic services that could not be found in the average village. Either weekly or fortnightly, the market served as an exchange centre for the immediate rural area, while the less frequent fair extended trade over far greater distances.

The spatial extent of market areas at this time is not altogether clear; most studies have suggested that trade was generally confined to the immediate locality, rarely extending beyond a six mile radius[94]. With many towns having other equally well provisioned market centres impinging on their 'own' sphere of influence, trading was inevitably restricted. Working on the

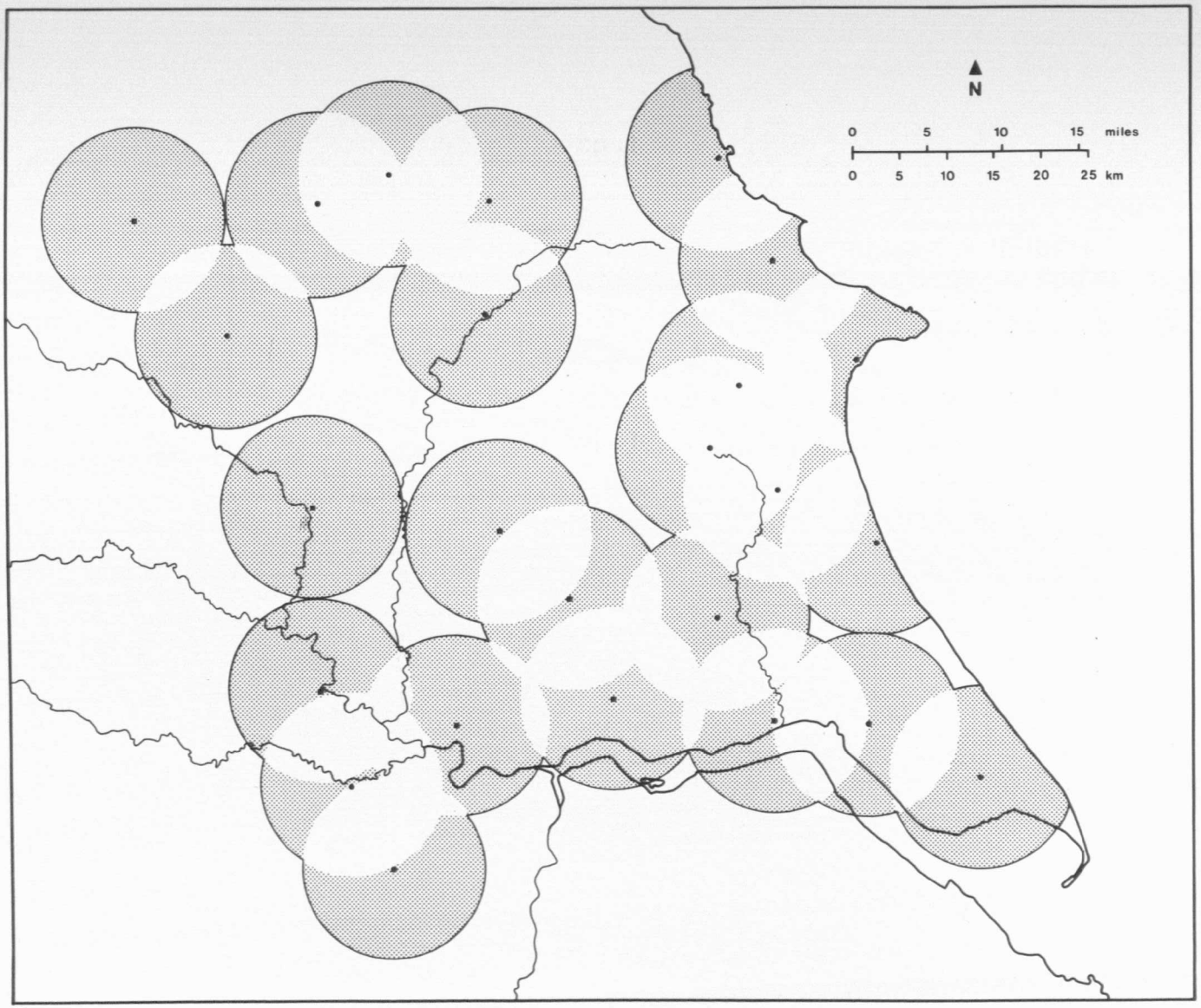

Fig.1.8 Potential Market Areas of Eastern Yorkshire Towns, c.1700 (based on a six mile radius)

basis of a 'six-mile' market area, figure 1.8 indicates the potential market areas of the twenty-five study towns circa 1700. In certain parts of the region there would appear to have been considerable overlap and 'impingement' of market areas. If the possible sphere of influence is extended to eight miles, suggested by O'Dell and Rodgers to be a more realistic estimate of a town's market area[95], then theoretically the area of overlap is further increased. The shaded area indicates the spatial range over which a town may have had unrivalled influence, a factor determined in part by geographical location. On this basis clear intra-regional variations occur. Towns on the northern and western fringes of the region would appear to have had the most singular market areas, while on the southern boundary Snaith's sphere of influence was apparently of limited areal extent, the town facing competition from Selby, Thorne and Howden. The area of greatest 'congestion' was arguably middle and north Holderness, served by eight market centres. Clearly there was not room for all these places to service the region and retain their status, indicating the need for a further phase of spatial sorting in the regional settlement system. Of these Holderness towns, those proving able to serve the developing agriculturally productive Wold area would arguably have a better chance of survival in the ensuing period. The southeast of the region, focusing on the River Hull, was also well served by towns, but this area contained a large element of the region's population and therefore required, and could support, a larger number of market centres. The analysis of potential market areas would suggest that towns which possessed a largely unrivalled sphere of influence might prove able to retain, or improve, their standing in the regional settlement system in a period of rapid demographic and economic change. Those centres possessing only small, mostly intersecting, market areas might, however, have a less assured future; the processes of selective urban growth and

spatial sorting would act 'strongly' upon these places.

Urban spheres of influence in the early eighteenth century were fairly narrow. This in part must be attributable to the fact that most market towns were subject to relatively little specialisation and only rarely did they assume regional hegemony for a particular product[96]. Of the twenty-five people who owed money at his death to the wealthy tanner and maltster John Radcliffe of Pocklington, only two lived without a six mile radius of the town[97]. For larger centres, as Rodgers demonstrated for Preston, the spatial extent of the market area was inevitably greater and involved higher levels of inter and intra-regional contact. Contemporary accounts indicate that Lincolnshire farmers frequently crossed the Humber in order to purchase goods at Beverley and later resold them in the markets of Brigg and neighbourhood, while the town of Selby traded in linen and woollen cloth with the West Riding[98]. Although avenues of communication were restricted by a poor transportational infrastructure within the region, contemporary sources suggest that a significant chain of economic interaction was in limited operation, linking certain of the region's market centres to those in other parts of Yorkshire and in adjacent counties[99].

The average distance travelled to market in the north of England was, as table 1.7 indicates, greater than the average seven miles for England as a whole[100]. The thousands of quarters of corn sold annually at York and Hull markets were not purchased by local dealers, but by merchants who travelled through Yorkshire and Lincolnshire and who subsequently transported grain to other markets in the North Midlands and the woollen markets of the Pennines[101]. For the smaller towns, distances travelled were proportionately less, but market areas were neither sharply defined nor mutually exclusive and even these towns could attract long-distance agricultural traffic which subsequently channelled

Table 1.7

Average Distance Travelled to Market in the Regions of England c. 1700

Area	Distance (miles)			
	1-5.5	6-9.5	10-19.5	Over 20
		%		
North	17	13	20	50
South	31	38	31	6
East	60	25	13	2
West	25	35	25	15
Midlands	36	14	29	21
All England	39	26	20	15

Source: EVERITT A. 'The Market Town' op.cit., p.193.

trade towards the larger regional centres. While regular trade occurred largely within a relatively small area of some thirty-five to forty square miles, fairs complemented the town's role as a market centre by periodically extending trading contact over a wider area. Howden horse fair, for example, served an international market and was normally attended by several foreigners, and London merchants were reported to be in regular attendance at Beverley's fairs[102]. For smaller centres, fairs frequently served to widen their regional influence. Market Weighton's September fair, noted for its sale of "handsome leane beastes, leene weetons, old ewes and the most timely sorts of lambs", attracted farmers from throughout eastern Yorkshire who annually stocked their winter feeding grounds at this fair[103].

The importance of the role of country towns as trading centres within the region was reflected to a large measure in their occupational structure, characterised by the diversion of a majority of inhabitants from full-time direct contact with the land and by the presence of a service sector. Inherent difficulties face any attempt to analyse the occupational structure of towns in periods before the taking of the first census. Although good sources are frequently available for one town, they rarely exist for a group of towns. Within any sampling frame it is important to ensure as much uniformity between data sources as possible, a criterion that becomes increasingly difficult to adhere to as analyses are undertaken for earlier time periods. Conceivably the best source available is the occupations recorded in the Anglican Church parish registers. A fuller discussion of the use of these documents for the analysis of urban economic structure and central place functions will be made in chapter three, but suffice it to say that they, together with contemporary accounts, provide the clearest indication of the nature of town economy at the start of the eighteenth century.

Occupations are first recorded in the parish registers of certain of the towns of eastern Yorkshire in the second decade of the eighteenth century, with recordings being made for an increasing number of places as the century progressed. For the six year period 1720 to 1725 recordings exist for eight of the region's towns; the percentage of entries relating to each major occupational category are shown in table 1.8. Mean percentages of occupational recordings for these towns would suggest the dominance of five main sectors of economic activity; namely, agriculture, building trades, retail and service, and textile and leather working. Maritime activity was also of particular significance in those centres with coastal locations or navigational links.

Agricultural activity accounted for approximately one-sixth of occupational recordings, but as table 1.8 indicates, there was considerable inter-urban variation. Three of the study towns, Patrington, Market Weighton and Thorne, emerge as particularly agriculturally based with more than one-quarter of all entries relating to some form of agricultural activity: these were each extensive urban parishes without borough status. Conversely the corporate towns of Beverley, Bridlington, Hedon, Malton and Thirsk, all of limited areal extent, exhibited a much lower level of agricultural activity, in no case accounting for more than 10% of recorded occupations. Building trades also emerged fairly strongly, accounting for almost 12% of all entries. The reasons for the apparent strength of this sector are not altogether clear for, at a time of limited demographic expansion and urban improvement, demand for new building cannot have been high. It may, however, have been the case that urban craftsmen served the requirements of neighbouring rural settlements.

Manufacturing and processing trades and crafts occupied the largest percentage of the workforce, giving a mean of 42.3% for

Table 1.8

Occupational Structure of Eastern Yorkshire Towns 1720-1725

Occupation	Bev	Brid	Hed	Mal	MW	Pat	Thi	Tho	$\bar{X}$
Agriculture	2.9	9.2	3.5	7.8	48.0	30.0	5.8	25.9	16.6
Building	11.3	10.8	8.1	20.5	7.8	16.0	4.0	14.8	11.7
Transport	1.1	-	-	-	-	-	0.4	-	0.2
Retail/Service	21.9	10.6	13.9	16.9	7.8	18.0	12.1	-	12.6
Manufacturing									
Textiles	4.0	2.2	2.3	8.2	9.1	-	24.2	22.2	9.0
Clothing	6.2	3.6	7.0	7.7	6.5	2.0	10.8	-	5.4
Leather	19.9	8.4	36.0	21.9	13.0	4.0	20.6	7.4	16.4
Rope	0.4	-	-	-	-	-	-	3.7	0.5
Milling/Brewing	4.0	4.1	1.2	1.8	-	10.0	0.9	-	2.7
Woodworking	1.1	1.2	2.3	6.4	2.6	2.0	3.6	7.4	3.3
Metalworking	2.4	4.3	3.5	2.7	2.6	4.0	6.3	3.7	3.7
Miscellaneous	2.0	0.7	1.2	0.4	2.6	-	3.6	-	1.3
Professional	8.8	3.4	18.6	2.3	-	4.0	4.0	-	5.1
Maritime	7.3	41.0	-	0.4	-	8.0	-	18.5	9.4
Miscellaneous	6.6	0.5	2.3	2.7	-	2.0	3.6	-	2.2
Labourers as % of all entries	10.7	13.7	16.5	2.2	24.5	23.1	20.1	27.0	17.2

Source: B.I.H.R.: - PR, PRT.

H.C.R.O.: - PR, PRT.

N.Y.C.R.O.: - PR, PRT.

the towns under review. Within this sector, two trades, leather working and textiles, were of particular significance for the region's towns. Approximately one-sixth of all entries, or one-third of manufacturing occupations, related to leather trades. Contemporary writers also noted the importance of leather working in the urban economy; Defoe, for example, accounted the principal industries of Beverley to be "making malt, oatmeal and tann'd leather"[104]. The degree of specialisation varied between the towns. In Malton, cordwainers, curriers, saddlers, glovers, fellmongers and skinners formed the nexus of the industry in contrast to Market Weighton where mention is made only of saddlers and shoemakers[105]. Examination of probate inventories indicates that leather workers, and in particular tanners, were among the wealthiest of town inhabitants. In Pocklington four inventories give an average of £110 for the value of tanners goods, compared with £30 for retailers and £13 for weavers[106].

The working of textiles in eastern Yorkshire, and more especially in the East Riding, was affected by developments further west; but it remained an important, if declining, industry in the early eighteenth century. Textile trades were noticeably strongest in towns situated on the fringes of the West and North Ridings. In both Thirsk and Thorne they accounted for one-third and one-half of manufacturing activity respectively. Celia Fiennes noted that a linen manufactory employed many of the poorer inhabitants of Malton[107], and Dr Richard Pococke, the importance of wool and linen manufacture in the town of Selby[108]. But textile workers were mostly poor; producing cloth, hempen sheets and coverlets, the average value of their goods at death rarely exceeded £13 and few owned more than one loom[109].

While most country towns could support a wide range of processing and producing crafts there were, in 1700, few specialised centres. Manufacturing operated on a small scale and

was organised largely on a domestic basis with the family as the primary unit of production. Furthermore, at this time, industry remained intimately tied with the agricultural economy and the concentration of processing crafts in urban areas could hardly be considered widespread. It follows therefore that retail and service trades occupied an important place in town economy. As Pococke observed in Thirsk, the chief support of most of the small towns of the region was provided by their markets and fairs and hence their role as service centres[110].

Retail trades accounted for an average of 12.5% of all occupational recordings, being noticeably most significant in Beverley, an important regional centre. Despite its apparent strength, this sector was not particularly well developed and, by late-eighteenth century standards, the range of services was limited. The average number of different occupations recorded for this sector in the registers was 6.5, the highest number, sixteen, being found in Beverley. As a group the mercers and grocers were probably the wealthiest and most influential retailers. When the mercer Christopher Moor of Pocklington died in 1699, his will indicated clearly the extent of his trade in groceries and drapery. He purchased cloth from Wakefield and from the London merchants at Beverley fair, and white wine, salt and other goods from York. Other leading traders of Pocklington, such as the Plaxtons, Hewitts and Crosses, were also fairly wealthy for they purchased land locally and rose to become landed gentry in the course of the eighteenth century[111].

Professional services were less well developed and accounted for little more than 5% of all occupational recordings: in two of the study towns there was an apparent absence of this sector. The much discussed rise of the gentry following the Restoration of 1660 and the emergence of a pseudo-gentry of leisured, well-to-do, urban families had yet to make its mark[112]. Although

characteristic of many larger regional centres and provincial towns, this group had little impact on most country towns before the turn of the eighteenth century.

For country towns, it is difficult to discern other than a general and unspecialised economy for the early eighteenth century. Although there was measurable inter-urban variation in the level and character of economic activity, most small-town urban wealth was invested in agriculture: in few towns was there any noticeable separation between the trading community and the land. Of the 155 inventories examined by Neave for Pocklington for the period 1660 to 1730, one-sixth were purely agricultural, but the remainder - those of craftsmen and tradesmen - usually included some items of husbandry[113]. In the early eighteenth century, the specialist economic role was performed by the regional capitals of York and Hull with second order towns playing a supporting role. There was insufficient demand for widespread servicing of the region in terms of its economic and social requirement.

6. The Settlement Hierarchy

In common with studies made for other regions in the seventeenth and early eighteenth centuries, it is possible, on the basis of three main groups of variables - viz. demographic, social and economic -, to identify a settlement hierarchy within eastern Yorkshire. At the head of the system stood York and Hull, with populations of 9,500 and 7,500 respectively, whose commercial and cultural functions dominated the entire area. At the second level were the towns of Beverley, Bridlington, Malton, Scarborough, Selby, and Pickering; with populations ranging between 1,100 and 3,000, and household densities of over 80 per thousand acres. Furthermore, they each possessed distinctive social profiles in terms of their 'hearth structure', and in that

their number of titled inhabitants, with one exception[114], numbered twelve or more. The hinterlands of these second order towns (if an eight mile market radius is assumed) also included some smaller market centres. Among the remaining seventeen towns of the region, with population ranging between 400 and 1,100 persons, there was a degree of homogeneity unparalleled in the larger centres.

If the rank-size array of towns is examined in respect of demographic, social and economic variables, the clearest break thus occurs between the nine largest towns and the remainder. However, the identification of a three-tier hierarchy in common with other studies[115], may be too simplistic for, as the preceding analysis of measures of urban status has shown, beneath the apparent continuum of size, type and structure, additional breaks in the regional settlement system were appearing. In terms of demographic status, a distinction lay between towns with populations of 600 to 1,100 and those with less than this number; the latter being declining towns on the margins of urban status. In respect of social standing also, a break is observable between towns in the aforementioned size categories. Centres with populations of less than 600 persons generally had fewer than five titled inhabitants and those with populations between 600 and 1,100 between five and ten. A fairly simple urban system related to distance controls, the physical nature of the countryside and the economic demands of a traditional and localised community was demonstrably becoming more complex. In the sixteenth and seventeenth centuries, a low level of population density and poor communications networks had served to restrict the processes of differentiation and spatial sorting. In the ensuing period increasing population density, transportational developments and a growing complexity in economy and society brought the forces of selective urban growth into play more strongly. Scale shifts in

the economy caused a transference of urban function, differential growth in the importance of centres, and a selective thriving of central place patterns.

The following analysis focuses primarily on the twenty-three country towns of eastern Yorkshire. The two largest towns - the regional centres of York and Hull - will, for the large part, be excluded. This is for two main reasons, first, because the nature of their growth experience is already well documented and understood[116]; second, because their position at the head of the regional urban hierarchy remained unchallenged and unchanged in the course of the study period. While some of the market centres of eastern Yorkshire were clearly on the margins of urban status in 1700 - namely North Frodingham, Hornsea, Kilham and South Cave -, they will be included in the analysis.

The study of the urban settlement system of eastern Yorkshire in the period 1700 - 1850 will be undertaken in two main areas, demographic and economic. In the former the main emphasis will be on urban growth and size distributions, and in the latter on the relative standing of individual settlements within the central place system. The following chapters do not seek to explain the process of selective urban growth among country towns but rather to measure it; the explanation being provided by in-depth case studies in the second part of the thesis.

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114. The exception to this trend is the town of Pickering situated in an extensive parish of more than 16,000 acres and thus giving rise to low scores. Contemporary accounts such as those of Camden, however, attest the importance of the town in regional urban structure.

115. See note 3 and table 1.1.

CHAPTER 2

THE DEMOGRAPHIC DIMENSION TO CHANGE 1700 - 1851

Low population growth rates of less than 0.3% per annum characterised England and Wales until the second quarter of the eighteenth century. But from mid-century they rose sharply, reaching 0.6% to 0.8% per annum by 1780, 1.45% at the turn of the century and reaching a peak of 1.8% per annum in the decade 1811-21[1]. Associated with this demographic transition was an unprecedented process of urbanization by which a predominantly late medieval urban system, characterised by several hundred market towns and no more than thirty provincial centres[2], was replaced by a system dominated by larger towns and decreasing numbers of small urban communities. In 1700 only one-quarter of the population of England lived in towns, by 1800 this had risen to one-third, to more than one-half by the mid-nineteenth century and over three-quarters by the turn of the century[3]. Smaller towns came to account for a decreasing share of the total urban population. In the early eighteenth century as many as 80% of all urban dwellers lived in centres of less than 5,000 persons, by 1801 this percentage had declined to 62.5% and by 1851 to 45%[4]. Conversely, larger towns came to dominate urban living; the number of places with populations of more than 20,000 persons increased from one in 1700 to seventeen in 1801 and 67 in 1851, by the latter date accounting for almost 13% of the urban population[5].

The process of demographic urbanisation for the country as a whole was not, however, uniform, and distinct spatial variations between rural and industrial areas and between metropolitan and non-metropolitan areas are apparent[6]. Clear contrasts exist

between the emerging industrial areas of the North-East and the North Midlands and the more rural areas of the East and South-West of the country which recorded consistently lower rates of urban growth[7]. Not surprisingly it is the former, in addition to the older established industrial areas, which have received the greatest degree of academic attention and much less is known and understood about the process of demographic urbanisation in the more rural areas of the country[8]. Within these agriculturally dominated regions, however, similar, if more tempered, processes were operating as in their industrial counterparts; but the acknowledgement of the former as predominantly rural has tended to obscure the significance of the growth of country towns, and hence limit study of the process of urbanisation in these areas.

Within eastern Yorkshire, in common with the country as a whole, the proportion of the total population residing in urban communities steadily rose throughout the eighteenth and first half of the nineteenth century (table 2.1). The percentage of urban population rose from 27.6% in 1700 to 43% in 1851, although the total number of towns in the region did not increase. While the percentage of the region's population resident in country towns expanded from 15.5% to 19.7% during the study period, at the same time their share of the total urban population declined, from 56% in 1700 to 52% in 1800 and 45.8% in 1850, suggesting that there was an increasing concentration of population in larger urban communities and a process of rationalisation among the smallest of their number.

Although a good deal is know about the regional growth of urban settlement in the nineteenth century[9], there remains a considerable gap in our knowledge of the changing structure of urban settlement below the more general national level for the eighteenth century and earlier. Few studies have sought to examine the process of demographic change in the eighteenth

Table 2.1 Demographic Urbanisation in Eastern Yorkshire 1700-1850

Area	Population			
	1700	1750	1801	1851
EAST RIDING (including York)	81,856	85,626	139,433	254,352
NORTH RIDING				
Bulmer	12,389	44,515*	13,106	14,451
Pickering	10,278		11,942	19,324
Ryedale	10,287		15,122	19,261
Birdforth	8,779		10,797	14,595
Whitby Strand (parishes of Scarborough & Falgrove, Hackness)	3,114		7,293	13,583
WEST RIDING				
Osgoldcross (lower)	5,706	26,066*	8,412	15,900
Barkstone Ash (lower)	6,152		8,870	13,544
Strafforth & Tickhill (parishes of Thorne, Hatfield, Stainforth, Fishlake & Sykehouse).	3,231		5,616	7,740
TOTAL EASTERN YORKSHIRE	141,792	156,207	220,591	372,750
TOTAL ALL TOWNS	39,095	57,025	81,445	160,494
TOTAL COUNTRY TOWNS	22,040	33,080	42,438	73,521
% OF TOTAL POPULATION	27.6	36.5	36.9	43.0
URBAN (ALL TOWNS)				
% OF POPULATION	15.5	21.1	19.2	19.7
URBAN (COUNTRY TOWNS)				
% OF URBAN POPULATION IN COUNTRY TOWNS	56.4	58.0	52.1	45.8

* estimated.

century, although earlier periods have received rather more attention from authors such as Patten, Munby and Sheail[10]. Carter, for example, in his study of the Welsh urban system focuses only to a limited extent on demographic measure, invoking economic and socio-cultural indicators as surrogate measures of urban status[11]. One of the principal reasons why studies of urban growth have concentrated on the nineteenth century is the availability of census data for that period and its absence in the preceding centuries.

For the study of larger settlements, and in particular provincial towns and regional centres, sources such as local census material and returns of official public records have enabled authors such as Clark, Slack, Phythian-Adams, Corfield and Chalklin to arrive at population estimates for the larger towns of England and Wales for a number of dates in the sixteenth to eighteenth centuries[12]. Estimates for smaller urban communities are, however, more difficult to obtain for the aforementioned sources are rarely available. Accordingly most writers have sought only to broadly define the demographic limits of this group, the more detailed examination of the changing size of individual settlements within regional urban systems being rarely undertaken[13]. Despite the paucity of demographic data for countryside towns in the period before 1801, sources are available which, although they must be treated with caution, give a clear indication of the relative strength of individual centres within the settlement system.

1. Sources and Methodological Approaches

For any detailed examination and monitoring of the pattern and process of population change in the period before the taking of the first census, it becomes necessary to resort to the Anglican parish registers with all their inherent difficulties. Of the

two main methods of exploiting the registers, family reconstitution and aggregative analysis, even the latter is a time consuming process when more than a handful of settlements are subject to review. In the past the analysis of individual registers for the eighteenth century was avoided through the utilisation of the parish register abstracts compiled by John Rickman, director of the first census, on the basis of collected register returns. These returns or abstracts have been widely used and have formed the basis for well known demographic studies by Deane and Cole, Brownlee, Griffith, Ohlin and Krause[14]. The abstracts, however, were employed primarily to study population change at a national or regional scale and only seldom to study the demographic fortunes of individual settlements[15]. Studies that sought to fully utilise the abstracts, such as that by Chambers for the city of Nottingham[16], revealed some disturbing discrepancies between Rickman's figures and the actual entries in the parish registers. Furthermore, poor registration and nonconformity present additional problems. As Flinn points out in his review of British historiography, and as the recent work of Wrigley and Schofield has shown, alternatives to the use of the Parish Register Abstracts are strictly limited, unless analysis is made of the original registers[17]. There are, however, certain sources which can be employed to study the fortunes of individual settlements at a general aggregate level and which, furthermore, conform to the requirements of any sampling frame in that the data is of a uniform and equally measurable scale. Two such sources which present themselves are the Hearth Tax Returns of the 1660's and 1670's and Archbishop Herring's Visitation Returns for Yorkshire of 1743.

These two sources have been utilised in the analysis of the demographic structure of eastern Yorkshire towns in the period before 1801. In the Hearth Tax Returns information relates to

the number of households in any settlement and in Archbishop Herring's returns to the number of families; in both cases a multiplier of 4.5 (the application of which was discussed in chapter 1) was employed to give a population estimate for individual settlements for c.1700 and c.1750 respectively. Although some twenty-five years elapse between the compilation of the Hearth Tax and the turn of the seventeenth century, aggregative analysis undertaken for six of the study towns in the period 1675 to 1700 indicated a baptism/burial ratio of approximately one, and thus no discernible population growth or decline in the last quarter of the century. This observation is substantiated by demographic studies at the national scale which argue for a stabilisation, or stagnation, in population growth at this time[18].

While both these sources can be usefully employed to give numerical counts of town populations, these must be treated as relative rather than absolute, for the accuracy and precise reliability of these estimates must at times be questioned. Whereas the Hearth Tax Returns normally identify the hearth structure of component townships in the more extensive parishes of the region, the Visitation returns often fail to adopt such an approach, resulting in over-large estimates for certain settlements. Two cases in point occur for Snaith and Howden. The former lay within an extensive parish comprising twelve townships; the returns giving an estimate of 355 families or 1,600 persons[19]. In Howden parish none of the component townships were identified in the returns, giving an over-large estimate for this town of some 1,500 persons, while aggregative analysis of the Howden parish registers suggested that the true estimate was nearer 800[20]. The Visitation returns are also hindered by missing entries which necessitates the use of derived estimates for two of the study towns. Aggregative analysis of

Table 2.2 Population of Eastern Yorkshire Towns 1700-1851

Town	1700	1750	1801	1851
Beverley	2,790	4,000	5,401	8,915
Bridlington	1,584	2,370	3,130	5,839
Easingwold	790	1,080	1,467	2,240
Great Driffield	660	700	1,411	3,963
Hedon	525	450	592	1,027
Helmsley	890	1,810	1,449	1,481
Hornsea	435	220	533	945
Howden	930	800	1,152	2,491
Hunmanby	750	540	757	1,291
Kilham	500	450	588	1,247
Kirkby Moorside	675	975	1,396	1,835
Malton	1,465	2,170	3,662	6,156
Market Weighton	635	740	1,183	2,001
North Frodingham	380	300	365	846
Patrington	535	450	894	1,827
Pickering	1,240	2,250	1,994	3,112
Pocklington	755	1,050	1,052	2,545
Selby	1,235	1,350	2,861	5,340
Scarborough	2,315	6,750	6,409	12,158
South Cave	505	650	707	937
Snaith	420	600	688	840
Thirsk	985	1,800	2,092	3,001
Thorne	1,045	1,575	2,655	3,484
Hull	7,510	11,945	22,161	50,670
York	9,545	12,000	16,846	36,303

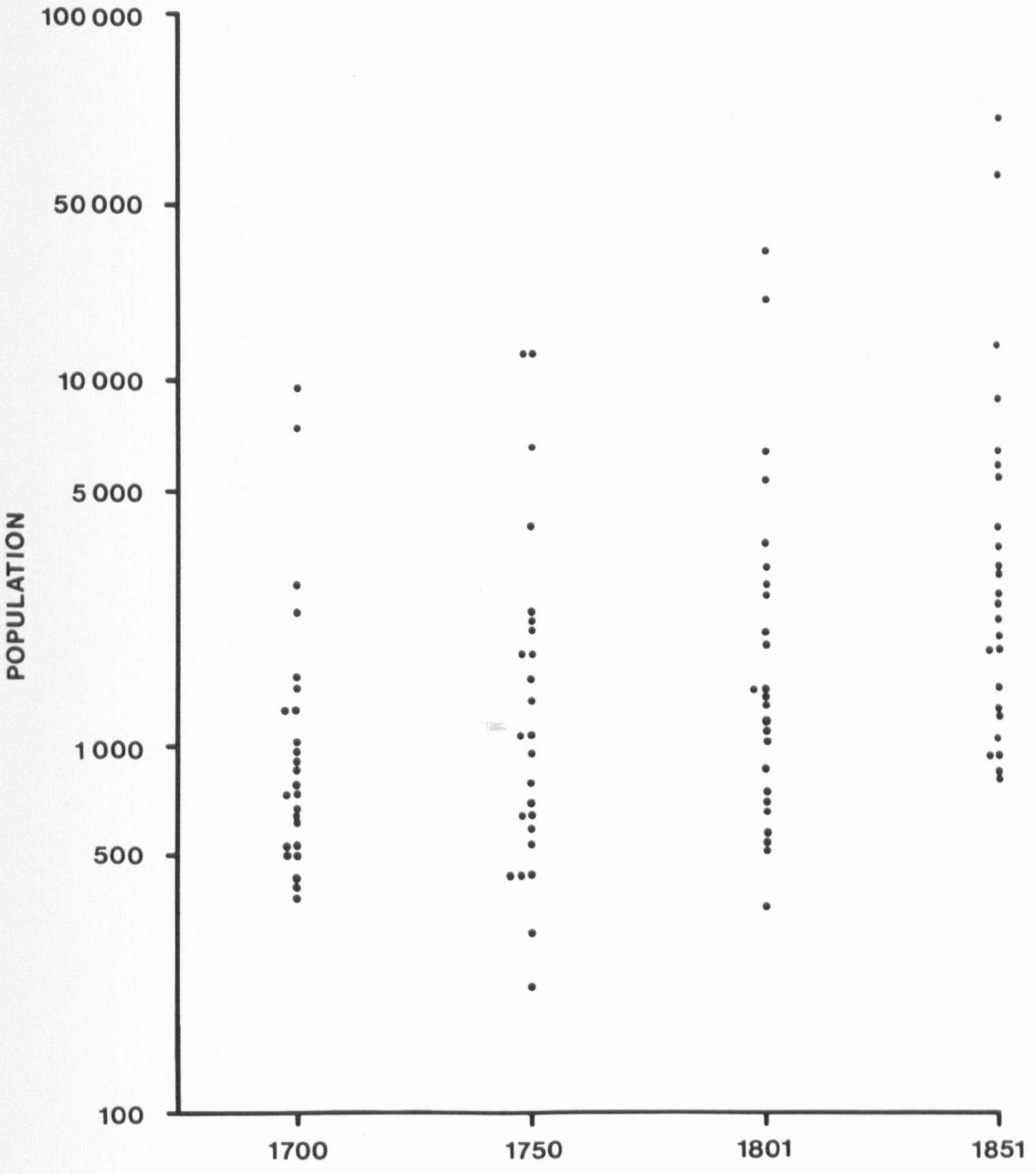

Fig.2.1 Population Thresholds of Eastern Yorkshire Towns, 1700-1851

the parish registers of six of the region's towns has, however, indicated that these returns give fairly reliable estimates of the relative demographic strength of towns in the region, and of their broad pattern of growth or decline in the eighteenth century[21].

Using the two population estimates derived from these sources for the dates 1700 and 1750 in conjunction with estimates obtained from the printed census returns for 1801 and 1851, four study dates are obtained which may form the basis for analysing demographic change in the urban system of eastern Yorkshire. Table 2.2 gives the population estimates for each of the region's towns for the four study dates and figure 2.1 plots the population thresholds of these towns for the same dates. At the start of the eighteenth century a well defined size-hierarchy is difficult to identify, especially among the lower order centres, but the following period witnessed a gradual diversification in the population thresholds of towns and by 1800 a noticeable size-hierarchy had emerged, accelerating forcibly over the next fifty years. Explanation of this differential and selective growth process is thus of considerable importance. Here, concern is directed towards an investigation of the regional structure of urban settlement in the eighteenth and early nineteenth centuries with a view to establishing some approaches and methodologies for the study of demographic change in this transitional period.

Methodologies for studying the demographic fortunes of nineteenth century towns have been numerous; Law, Weber, Chisholm, Lawton, Welton and Carter have all adopted statistical approaches to analyse population change[22]. The most notable contribution in recent years has been made by Robson. In his analysis of urban growth he reviews and tests the possibility of using a variety of methodologies for studying towns with populations of 2,500 or more in nineteenth century England and

Wales. Robson considers the growth of towns and cities under the headings of city systems and size disbributions, analysis of actual and spatial growth of these systems and explanations of the nature of urban growth[23]. For the eighteenth century such approaches have not been developed, but in order to provide some continuity to analysis between the two centuries one is forced to either develop completely new methodologies, or to employ those formulated for the nineteenth century in retrospective fashion.

There are, however, inherent difficulties in adopting nineteenth century approaches to studying the eighteenth century urban system, primarily attributable to the limitations of the requisite information sources. In rural regions, where concern is focused on relatively small urban centres, the problems are further compounded due to the more limited range of sizes. Using simple numerical estimates for the eighteenth and nineteenth centuries, however, it is possible to pursue approaches similar to those employed at the national scale, in modified form, at the local regional level. The demographic dimension to change in the urban settlement system of eastern Yorkshire will be examined in two main areas; first, the structure of the system and size distribution, and second, spatial growth and sorting within the system.

2. The Urban System and Size Distribution in Eastern Yorkshire

Numerous studies have adopted a systems approach to the demographic analysis of towns, resulting in a variety of theories seeking to explain city-size distributions[24]. Inherent in the application of a systems approach has been the idea of a regularity in the distribution of the population sizes of component centres[25]. Although Zipf was not the first person to recognise the regularity of town sizes, his formulation of the 'rank-size rule' provided a starting point and impetus for subsequent

empirical and theoretical studies of urban growth[26]. Zipf's theory stood in contrast to earlier studies, such as that by Jefferson, which argued for the existence of primate cities and not a continuum of city sizes. Clark and Berry, however, have both suggested that more than one type of city size distribution may be found according to the economic circumstances of the country or region in question[27]. Clark, for example, differentiates between three main types of distributional pattern, viz, primacy, oligarchic and counter-primate, and Berry between primate and lognormal[28]. Stewart, Rosing, Gibbs and Quandt have also tested the rank-size rule and suggested alternative theoretical formulations[29].

Robson argues that explanations of the distribution of city-sizes fall into three main categories of; first, concepts derived from central place theory exemplified by the work of Beckmann and Berry[30]; second, ideas based on principles of maximization and optimization embodied in studies by Curry, Evans, and Nordbeck[31]; and third, explanations that argue that the growth of city population is a random process determined by a random proportion of either the existing or previous population, supported by authors such as Simon and Thomas[32]. Richardson similarly distinguishes between hierarchical, stochastic and quasi-economic models of the distribution of city sizes[33]. He concludes that

> "There are so many influences interacting to mould the relative size of cities that it would be too difficult to include them all within a single model.....a satisfactory explanation needs to draw on both systematic and random factors and the weakness of some theories stem from the exclusive reliance on one rather than the other"[34].

A neglected question that emerges from both theoretical and empirical studies is the relationship between the distribution of city sizes and urbanization, for population size is related to almost every other measure of urbanization[35]. The range of population sizes and the growth rates of individual towns are

limited by the structural characteristics of the urban system as a whole and by its spatial organization[36]. As Robson suggests a profitable avenue of enquiry would be

> "the study of the dynamics of the urban growth which underlies city sizes.... It is the way in which the component cities grow or decline which determines the shape of the size distribution curves"[37].

Richardson also points to the need to investigate the dynamics of growth within urban systems more fully and concludes that

> "the relative growth rates of cities - and ultimately the distribution of city sizes - depend on the stage of development at which new cities appear, the sequence in which they appear and how they cluster in time. In general terms there is a manifestation of the fact that the size of any city depends on the size and location of all other cities not only at that point in time but also historically. It is feasible to devise a model based on the hypothesis that the size distribution of cities is a function of the age distribution of cities"[38].

Studies of the dynamics of urban growth, however, rest with relatively few authors. Bell has undertaken such a study in Israel, Pred in America, Berry for the Third World and Carter for the towns of Wales, while Robson's analysis of nineteenth-century urban growth in England and Wales provides a comprehensive picture at the national level[39]. Several studies have approached the question of the dynamics of growth through analyses of shifts in the ranks of cities over time, for such analyses can reveal much about the demographic fortunes of individual towns and the way in which growth occurs in a set of places[40]. Studies examining changes in the rank-size relationship of towns have all suggested the stability at the upper end of the hierarchy and the great fluctuation in sizes at the lower end[41].

There are, however, inherent difficulties in this type of analysis as the ability of towns to change rank differs between the ranks of towns, and because the absolute difference in population between adjacent ranks at the upper and lower end of the hierarchy will be quite different. Accordingly small

differences in the growth rate of the lower order centres might lead to marked change in ranks, whereas very large differences among the higher order centres may lead to no such change in position. The distribution of city sizes is thus likely to be highly skewed[42]. Robson is, therefore, rather dismissive of this approach to studying changes in the urban system; but, certainly for the eighteenth century when precise measurements of the growth rates of individual centres are unobtainable, analysis of rank changes may indicate a good deal about the changing character of the urban system within any region.

(a) Rank Changes

Within eastern Yorkshire there were no really massive changes in the demographic urban hierarchy over this 150 year period except in the case of one town, Great Driffield, which, ranked seventeenth in 1700, eventually rose to become the eighth largest town by 1850. Table 2.3 shows the ranks of eastern Yorkshire towns for the four study dates, the rank changes that occurred between the dates, and the cumulative change in rank for the whole period. Not unexpectedly, total changes in ranks were small, for, in a rural agricultural region subject to the injection of little new industry or capital for enterprises other than those directly connected with the land, and possessing no mineral resources, the opportunities that prevailed in other regions for the development of mining and manufacturing centres were not present.

If the total changes in the ranks of towns are considered for the study period, it is evident that the upper and lower ranks of the urban system were subject to only minor fluctuations, but that among the middle orders considerable changes of position occurred. In many ways this is an understandable observation for the largest place cannot increase its rank, it can only either retain its position or fall to a lower rank, while the smallest centre can conversely only retain or increase its rank. It thus follows that

Table 2.3 Population Rank of Towns in Eastern Yorkshire 1700-1851

Town	1700	1750		1801		1851		Total Change
	rank	r.	rank change	r.	rank change	r.	rank change	
York	1	1	0	2	-1	2	0	-1
Hull	2	2	0	1	1	1	0	1
Beverley	3	4	-1	4	0	4	0	-1
Scarborough	4	3	1	3	0	3	0	1
Bridlington	5	5	0	6	-1	6	0	-1
Malton	6	7	-1	5	2	5	0	1
Pickering	7	6	1	10	-4	10	0	-3
Selby	8	11	-3	7	4	7	0	1
Thorne	9	10	-1	8	2	9	-1	0
Thirsk	10	9	1	9	0	11	-2	-1
Howden	11	15	-4	16	-1	13	3	-2
Helmsley	12	8	4	12	-4	18	-6	-6
Easingwold	13	12	1	11	1	14	-3	-1
Pocklington	14	14	0	17	-3	12	5	2
Hunmanby	15	20	-5	19	1	19	0	-4
Kirkby Moorside	16	13	3	14	-1	16	-2	0
Great Driffield	17	17	0	13	4	8	5	9
Market Weighton	18	16	2	15	1	15	0	3
Patrington	19	21	-2	18	3	17	-1	2
Hedon	20	21	-1	22	-1	21	1	-1
South Cave	21	18	3	20	-2	23	-3	-2
Kilham	22	21	1	23	-2	20	3	2
Hornsea	23	25	-2	24	1	22	2	1
Snaith	24	19	5	21	-2	25	-4	-1
North Frodingham	25	24	1	25	-1	24	1	1
CUMULATIVE CHANGE			41		41		41	

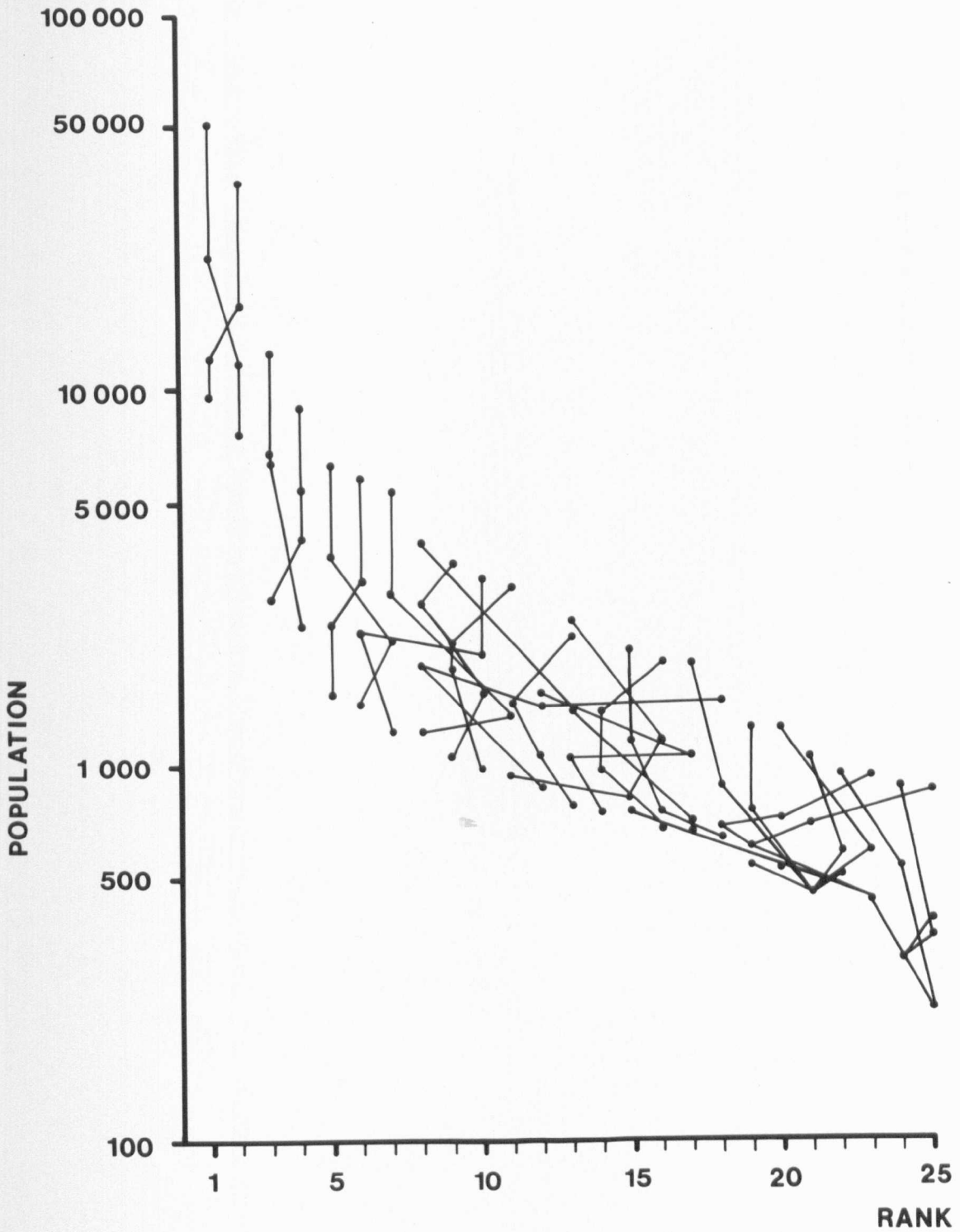

Fig.2.2 Changes in Rank Order among Eastern Yorkshire Towns, 1700-1851

only that place in the centre of the array has an even probability of upward or downward movement[43]. Nevertheless, changes in rank order are of considerable importance for they reflect demographic forces affecting towns within the system.

Figure 2.2 shows, according to population size with the towns ranked in their 1700 positions, the subsequent changes of rank that occurred. Those settlements subject to the smallest changes in their regional position were the largest towns; the regional centres of York and Hull and the country towns of Beverley, Bridlington, Scarborough and Malton. At the lower end of the hierarchy the settlements experiencing the smallest shifts in their regional position were those market centres whose urban status was marginal and whose economic viability was highly vulnerable. These centres of Kilham, North Frodingham, South Cave, Hornsea and Snaith remained very small in the ensuing period and changed rank position only among their own number. None of these very small urban centres ever attained a rank higher than eighteen in the regional hierarchy. It was among the middle order centres with ranks between approximately seven and twenty that the greatest change in relative positions occurred. This group comprised the market towns or countryside towns of the region and it is among this group that the greatest interest must lie. Surprisingly, however, this group has received comparatively little academic attention although several studies of individual settlements which fall into the category of middle order towns in rural regions have been made[44].

The rank-size array of towns in eastern Yorkshire (figure 2.3) over the period 1700 to 1850, in contrast to that for the country as a whole[45], indicates no horizontal shift as no new towns entered the system in the course of this period. The vertical shift in the graph, indicating the growth of individual members, does, however, suggest that a process of urban system development was in

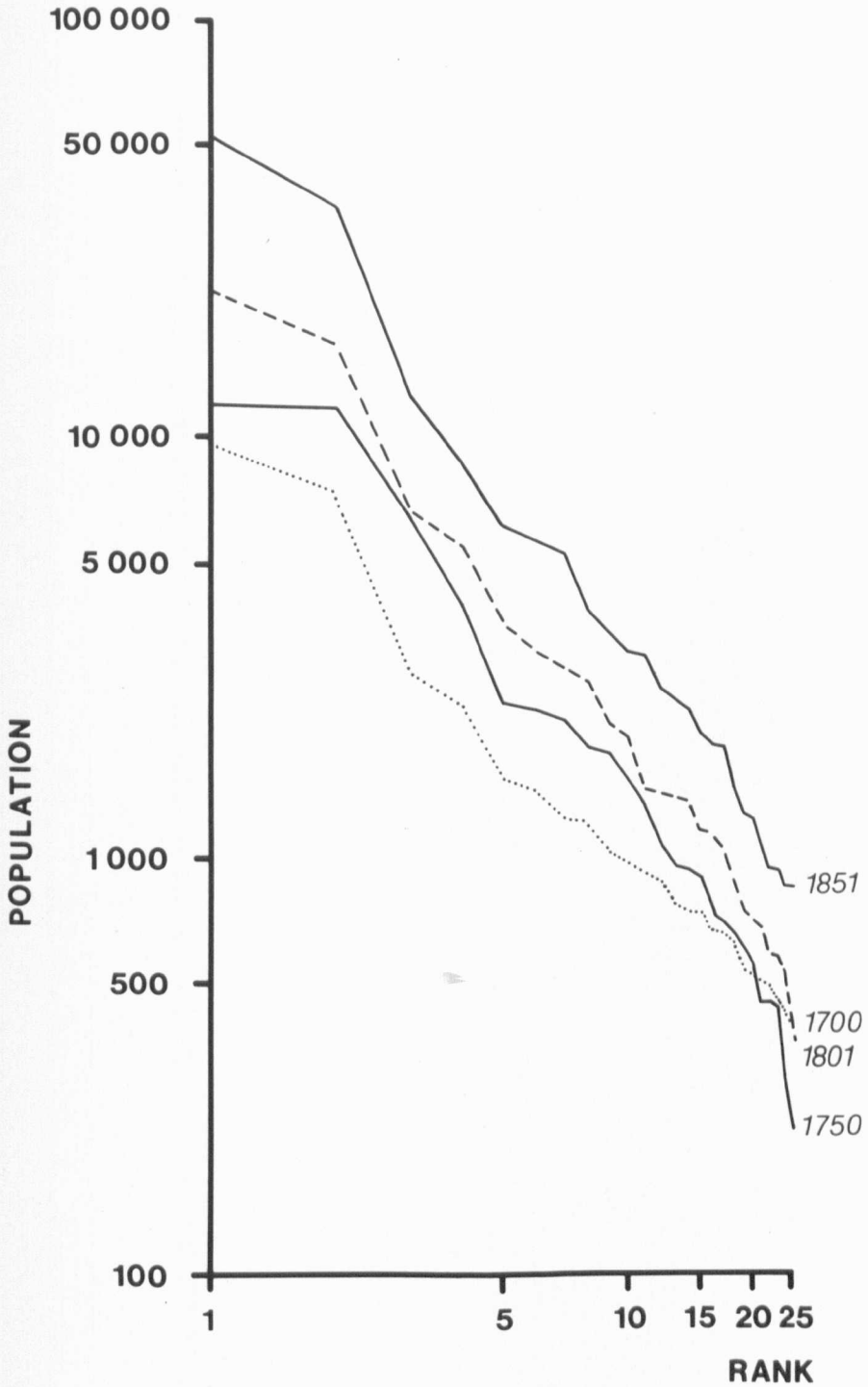

Fig.2.3 Rank-Size Array of Towns in Eastern Yorkshire, 1700-1851

operation. At the general level the urban settlement system of eastern Yorkshire divides itself into three component parts, among which self-contained changes of position occurred with only a few settlements transcending their own group to pass into an upper or lower group during the course of the eighteenth and early nineteenth century. The upper group consisting of the largest centres ranked from one to six comprised regional centres and county towns; the middle group represented a more homogeneous body of market towns; and the lower group was made up from the small declining market centres with only rudimentary urban status. Clearly, however, the settlement system was more complex than this simple three-tier hierarchy would suggest. To investigate the degree of differentiation and complexity within the system we need to analyse the changing size distribution of the component centres in greater detail.

(b) Size Distribution

Whereas many regions of England and Wales experienced a significant phase of urban genesis in the late eighteenth and nineteenth centuries as technological change stimulated the growth of industrial centres and mining towns, within eastern Yorkshire no new towns emerged in the urban system[46]. The dominant process, therefore, was that of sorting and selective rationalisation among the existing number. If the towns are divided into different size-classes and the number and growth rates of towns in each class analysed for the study dates, then it becomes possible to investigate the changing structure of the urban system of eastern Yorkshire. Each size class is a constant factor of twice that of the previous class[47]; the lower and upper class limits being selected on the basis of the distribution of town sizes within the region. A total of seven classes were used with open-ended upper and lower classes; the class limits being centres with less than 500 inhabitants, 500 - 999, 1,000 - 1,999, 2,000 - 3,999, 4,000 -

7,999, 8,000 - 15,999 and over 16,000 (table 2.4).

While the total number of towns in the urban system did not increase, there were significant changes in the hierarchical structure. In an era of rapid population growth, the number of towns with very small populations declined in number, while the numbers falling in the larger size groups showed a corresponding increase. In 1700 almost half of the region's towns had populations of no more than 1,000 persons, but by 1851 this proportion had been cut by two-thirds, so that only 16% of all towns fell in this size group. Conversely the number of larger centres had risen; centres with populations in excess of 4,000 persons increased from 8% of all towns in 1700, to 28% in 1851 (table 2.4). Although this pattern of the greater relative rise of the number of larger places at the expense of the smaller was akin to that found for the country as a whole[48], rural regions like eastern Yorkshire were in some measure unique for structural changes occurred among a fairly static body of towns with the 'birth' of few or no new towns into the system.

Transition matrices calculated for the three periods 1700 - 1750, 1750 - 1801 and 1801 - 1851 indicate the movement of towns between the different size classes (table 2.5). As can be seen, the range of movement between the different classes was fairly significant, for in each period more than one-half of the towns moved into a higher or lower size group, although no town moved up or down more than one class interval in any fifty year period. Furthermore, most of the towns cluster along the diagonals of the tables, suggesting that urban growth occurs at a rate common to the whole set of towns[49]. Clearly it was among the middle and lower order centres that the highest growth rates and most movement occurred, for it is easier for a small town to double its population than a larger centre. The analysis would thus suggest that a concentration of the urban population came to characterise

Table 2.4 Numbers and Percentages of Towns in Different Population Size Groups 1700-1851

	Group Size	1700		1750		1801		1851	
		No	%	No	%	No	%	No	%
1.	Under 500	4	16	5	20	1	4	0	0
2.	500 - 999	12	48	7	28	7	28	4	16
3.	1,000 - 1,999	5	20	6	24	8	32	6	24
4.	2,000 - 3,999	2	8	3	12	5	20	8	32
5.	4,000 - 7,999	1	4	2	8	2	8	3	12
6.	8,000 - 15,999	1	4	2	8	0	0	2	8
7.	over 16,000	0	0	0	0	2	8	2	8
	TOTAL	25	100	25	100	25	100	25	100

Table 2.5 Transition Matrices for Eastern Yorkshire Towns 1700-1851

		No. in 1750							
Size Group	0	1	2	3	4	5	6	7	Total
	0								
	1		2	1					4
	2		3	6	4				12
No. in	3				2	3			5
1700	4						2		2
	5							1	1
	6							1	1
	7								0
Total		5	7	6	3	2	2	0	25/25

		No. in 1801							
Size Group	0	1	2	3	4	5	6	7	Total
	0								
	1		1	4					5
	2			3	4				7
No. in	3				3	3			6
1750	4				1	2			3
	5						2		2
	6							2	2
	7								0
Total		1	7	8	5	2	0	2	25/25

		No. in 1851							
Size Group	0	1	2	3	4	5	6	7	Total
	0								
	1			1					1
	2			3	4				7
No. in	3				2	6			8
1801	4					2	3		5
	5							2	2
	6								0
	7							2	2
Total		0	4	6	8	3	2	2	25/25

the settlement system of the region, with smaller urban communities accounting for a declining percentage of urban population.

One way of measuring the degree of concentration that was occurring in the system is through the application of Lorenz curves which, although they are more traditionally used in the analysis of economic data[50], show the visual effect of concentration as the area contained between the curve and the line depicting an even distribution of sizes[51]. It has already been demonstrated that the most significant changes of rank were associated with smaller towns and not with the larger regional centres. Urban concentration may therefore be investigated in two ways; first for all towns, and, second, for smaller urban communities. Figure 2.4 indicates the degree of concentration for the total urban population and for the country towns of eastern Yorkshire (i.e. the region's towns excepting Hull and York). Population concentration was relatively greater among the former than the latter, becoming more marked throughout the study period as the regional centres of York and Hull came to account for an increasing share of both regional and urban population. By 1750 the relative strengths of individual towns within the regional settlement system were already apparent, with a further marked increase in concentration taking place after 1800 associated principally with transportational improvements and industrialisation.

The summation of the cumulative percentage totals given in table 2.6 provides a simple numerical index, or measure, of the degree of population concentration; absolute concentration, - i.e. the concentration of all frequencies in one category - with twenty-five towns would give a total of 2,500. Absolute concentration would not be expected, as this would indicate the disappearance of all but one town from the regional settlement system. Nevertheless, the index does provide a measure of the

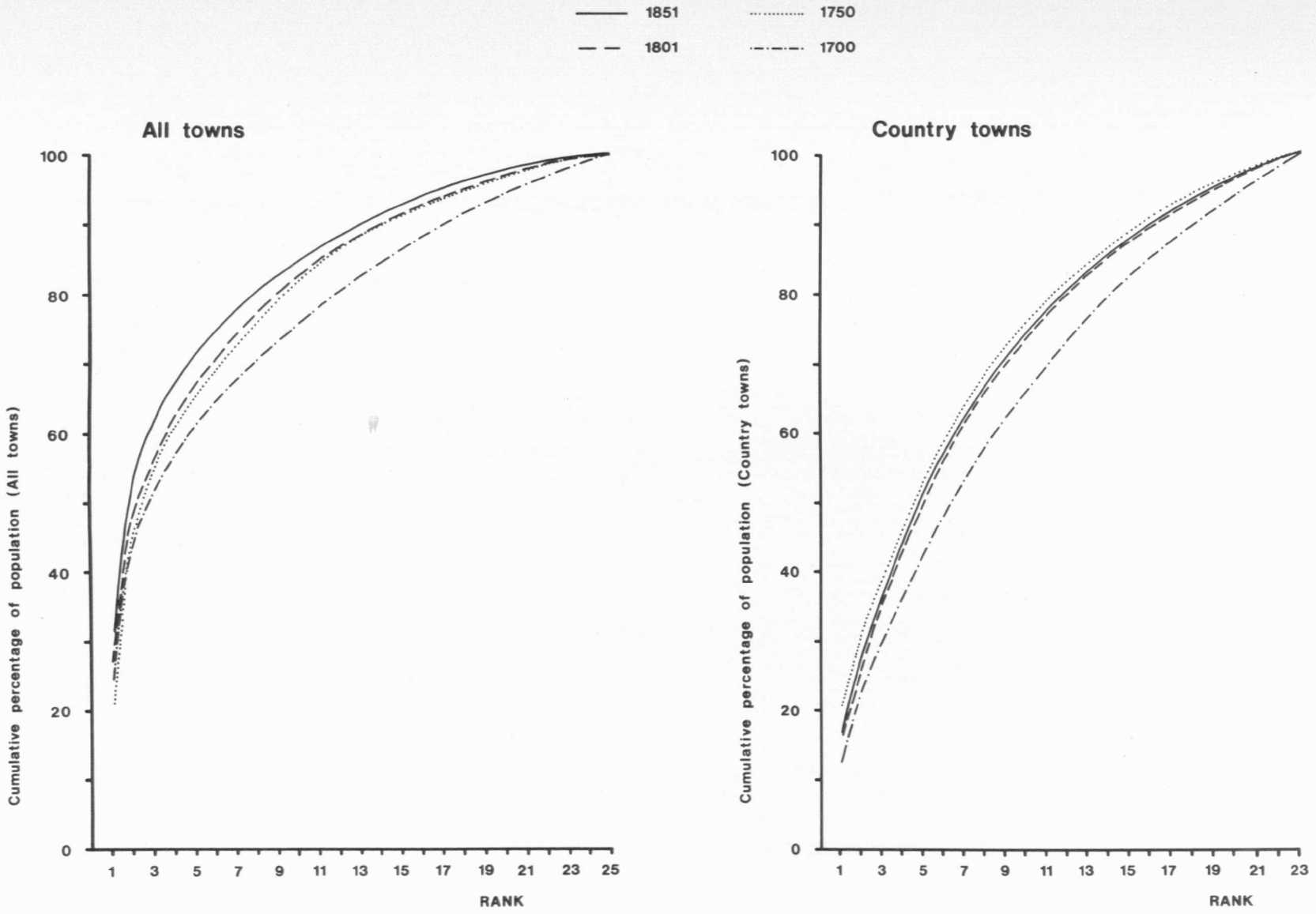

Fig.2.4 Population Concentration among Eastern Yorkshire Towns, 1700-1851

Table 2.6 Population Concentration in Eastern Yorkshire Towns 1700-1851

(i) All Towns	1700	1750	1801	1851
(a) Total Population	39,095	57,025	81,445	160,494
(b) Possible Total Score	2,500	2,500	2,500	2,500
(c) Cumulative % Total	1,945	2,025.7	2,050.5	2,106.6
(c) as a % of (b)	77.8	81.0	82.0	84.3

(ii) Country Towns	1700	1750	1801	1851
(a) Total Population	22,040	33,080	42,438	73,521
(b) Possible Total Score	2,300	2,300	2,300	2,300
(c) Cumulative % Total	1,552.6	1,723.9	1,681.3	1,689.4
(c) as a % of (b)	67.5	74.9	73.1	73.4

character and level of population concentration over a given period. The index for all towns indicates that concentration of the urban population became more marked during the course of the eighteenth and first half of the nineteenth centuries, particularly between 1700 and 1750, and 1801 and 1851. For the countryside towns a rather different picture emerges for, although a concentration of the resident population into the largest of these communities also characterised the period, the operation of this process followed a more complex course. Between 1700 and 1750 growth in the concentration of the urban population was relatively marked, perhaps attributable to the widespread high mortality rates and incidence of epidemic disease that affected the demographic structure of many communities at this time[52]; but the latter half of the century saw a slight reversal of this process, with relative stability characterising the settlement system of country towns in the early nineteenth century. A further explanation of this pattern may, however, be found in the statistics, for the returns made to Archbishop Herring cannot be used to give precise quantitative measurements. Within eastern Yorkshire, therefore, larger towns did come to account for an increasing share of the urban population, this increase being concentrated primarily in two towns, York and Hull. Among the smaller urban communities, particularly after 1750, the situation remained fairly stable suggesting that a degree of equilibrium had entered the system.

(c) Growth Rates

The concentration of the urban population is perhaps best viewed as a function of the differing growth rates of towns; only if there is no fluctuation of individual town growth and a common rate of growth will concentration not occur[53]. Clearly therefore an examination of the growth rates of the region's towns may serve to throw some light on the changing size distribution. Robson

demonstrated for England and Wales that growth and size are not directly related. He argued that the experience of urban growth is better understood if the idea of a stochastic growth process is less rigidly adhered to and if sub-sets rather than the totality of urban places within any area are examined[54]. Further, this might profitably lead to additional evidence to either support or refute the stochastic growth models which have been commonly employed to explain urban growth[55].

Urban population growth, or the rate of growth, is a result of two distinct processes, natural increase on the one hand and migration on the other. In the period before civil registration, only aggregative analysis of parish register data can throw light on the former while levels of in- and out-migration can only be effectively estimated if data on natural increase is available. In the absence of the aforementioned for the region's towns in the study period, growth rates have been calculated on the basis of actual population increase or decrease. Table 2.7 gives the average decennial population increase/decrease between the four study dates. As would be expected, urban growth accelerated forcibly after 1750 averaging 9% in the latter half of the eighteenth century and almost double that rate in the first fifty years of the nineteenth. The standard deviation, however, indicates some considerable variation around this mean value. After 1750, Great Driffield and Hull were the only towns to consistently increase their populations at a rate of more than one standard deviation above the mean value, while Patrington, Selby and Pocklington also enjoyed relatively healthy rates of growth. South Cave, Snaith and Kirkby Moorside, on the other hand, experienced little revival of their demographic fortunes after 1750, and Helmsley averaged growth rates of greater than one standard deviation below the mean throughout this hundred year period. The question thus becomes to what extent did town size

Table 2.7 Average Decennial Population Growth in Eastern Yorkshire Towns 1700-1851

Town	1700-1750	1751-1801	1801-1851
Beverley	8.7	7.0	13.0
Bridlington	9.9	6.4	17.4
Easingwold	7.3	7.2	10.3
Great Driffield	1.2	20.4*	36.2*
Hedon	-2.8	6.4	14.8
Helmsley	20.8*	-4.0*	0.4*
Hornsea	-10.0*	28.4*	14.6
Howden	-2.8	8.8	23.2
Hunmanby	-5.6	8.0	14.2
Kilham	-1.8	6.2	22.4
Kirkby Moorside	8.8	8.6	6.2*
Malton	9.7	13.8	13.6
Market Weighton	3.4	12.0	13.8
North Frodingham	-4.2	4.3	26.4*
Patrington	-3.2	19.8*	20.8
Pickering	16.3*	-2.2*	11.2
Pocklington	5.2	-0.5	28.4*
Scarborough	38.3*	-1.0	18.0
Selby	1.9	22.4*	17.4
South Cave	5.7	1.6	6.6*
Snaith	8.6	2.9	4.4*
Thirsk	16.5*	3.2	8.8
Thorne	10.1	13.8	6.2*
Hull	12.4	17.2*	25.8*
York	5.1	8.0	23.2
All Towns			
Mean	6.1	8.7	15.9
Standard Deviation	10.2	8.1	8.5
Country Towns			
Mean	5.9	8.4	15.1
Standard Deviation	10.6	8.3	8.4

* = Score greater than +1 or -1 S D's around the mean.

have a bearing upon the growth rate of any town?

Ranking the study towns in respect of these two variables - size and growth rate - between each pair of study dates and applying a Spearmans Rank Correlation provides some indication of the degree of association between these variables. The results of this analysis give correlation coefficients of rs 0.51 (significant at 0.01) for 1700 - 1750; rs -0.1 for 1750 - 1801, indicating no association between growth and size; and 0.0 for 1801 - 1851. The calculated coefficients would thus suggest that while town size had a determining influence on the rate of demographic growth in the early eighteenth century, in the ensuing period other forces may have assumed greater importance[56]. As the economic forces operating within the country developed, factors other than natural increase determined the rate of urban growth. Complex ebbs and flows of migratory movement and the capitalisation of industry became of profound significance[57]. Additional variables must thus be sought to explain the processes governing the selective growth of towns. However, looking at all towns may prove to be in some measure misleading, for it is much harder for a large town such as York, for example, to double its population in a ten year period than for a smaller settlement to achieve such a rate of growth. It might, therefore, be more fruitful to examine growth rates in respect of sub-sets of town sizes.

In the early eighteenth century the highest rates of growth were associated principally with towns with populations of between 2,000 and 4,000 persons with declining growth rates characterising the smaller centres. The following hundred years saw a greater uniformity in the growth rates of the respective size groups (table 2.8). High rates of growth were, in the period 1750 - 1801, generally experienced by smaller centres which had suffered more sharply in the years of demographic crisis in the early eighteenth century, while in those centres with populations of over 2,000

Table 2.8 Means and Dispersions of Growth Rates of Towns in Different Size Groups

Date	Size Group						
	1	2	3	4	5	6	7
1700-1750							
Mean	-1.85	4.0	9.6	23.5	12.4	5.1	-
SD	7.8	8.4	5.1	20.9	-	-	-
Var	45.3	64.6	20.9	219.0	-	-	-
1750-1801							
Mean	13.0	8.9	7.0	6.0	3.0	12.6	-
SD	10.6	6.2	9.7	8.0	5.6	6.5	-
Var	89.8	33.2	79.2	42.7	16.0	21.2	-
1801-1851							
Mean	26.4	13.9	16.2	12.7	15.5	-	24.5
SD	-	6.6	12.0	5.1	3.5	-	1.8
Var	-	37.8	126.6	20.5	6.3	-	1.7

persons - York and Hull apart - rates were significantly lower. In the first half of the nineteenth century high growth rates were associated with towns in each size group, rates averaging 13% to 16% being common for all but the smallest and two largest centres. The fairly high standard deviations for all size groups for each of the study dates do, however, suggest a more complex situation and are additional evidence of the process of selectivity of growth among towns at all levels of the hierarchy. These figures, however, must be treated with a degree of caution for the relatively small number of towns in the sample (i.e. the region) and the occasional empty classes render the calculation of the standard deviation at times inappropriate, while biased or freak values have not been suppressed by the calculation of means.

These figures are based on actual growth rates; the scatter of growth rates being wide for small places but relatively narrow for large places. The calculation of some form of standard score akin to that applied by Robson[58] might provide a more useful measure of the selectivity of growth. As in the preceding analysis, the calculation and computation of such scores is rendered difficult due to the relatively small numbers of towns falling within each size group. An alternative approach has of necessity been adopted, whereby standardised scores are calculated not only on the basis of the individual size groups but also on the basis of the common growth rate for all of the region's towns. Table 2.9 gives the standardised scores for the study towns based on a common rate of growth, and table 2.10 shows the scores calculated according to the mean and standard deviation of the respective size groups. The standardised rates were calculated using the following formula:

$$Zi = \frac{Gin - Gn}{\sigma n}$$

where Gin is the growth rate of the ith town whose population

Table 2.9 Standardised Growth Rates for Eastern Yorkshire Towns 1700-1851: Common Rate of Growth

Town	1700-1750	1750-1801	1801-1851
Beverley	0.3	-0.2	-0.3
Bridlington	0.4	-0.3	0.2
Easingwold	0.1	-0.2	-0.7
Great Driffield	-0.5	1.4	2.4
Hedon	-0.9	-0.3	-0.1
Helmsley	1.4	-1.6	-1.8
Hornsea	-1.6	2.4	-0.2
Howden	-0.9	0.01	0.9
Hunmanby	-1.1	-0.1	-0.2
Kilham	-0.7	-0.3	0.8
Kirkby Moorside	0.3	-0.01	-1.1
Malton	0.4	0.6	-0.3
Market Weighton	-0.9	0.4	-0.2
North Frodingham	-1.0	-0.5	1.2
Patrington	-0.9	1.4	0.6
Pickering	1.0	-1.3	-0.6
Pocklington	-0.1	-1.1	1.5
Scarborough	3.2	-1.2	0.2
Selby	-0.4	1.7	0.2
Snaith	0.2	-0.7	-1.3
South Cave	-0.4	-0.8	-1.1
Thirsk	1.0	-0.7	-0.8
Thorne	0.4	0.6	-1.1
Hull	0.6	1.0	1.2
York	-0.1	-0.1	0.9
All Towns			
Mean	6.1	8.7	15.9
SD	10.2	8.1	8.5
Var	100.5	63.4	69.3
Country Towns			
Mean	5.9	8.4	15.1
SD	10.6	8.3	8.4
Var	107.5	65.7	68.2

Table 2.10 Standardised Growth Rates of Eastern Yorkshire Towns by Group Size

	1700 - 1750		1750 - 1801		1801 - 1851	
Group	Town	Score	Town	Score	Town	Score
1	Hornsea	01.0	Hornsea	1.5	Nth Frod	-
< 500	Kilham	0.01	Kilham	-0.6		
	Nth Frod	-0.3	Nth Frod	-0.8		
	Snaith	1.3	Hedon	-0.6		
			Patrington	0.6		
2	Driffield	-0.3	Driffield	1.9		
500-999	Easingwold	0.4				
	Hedon	-0.8			Hedon	0.6
	Helmsley	2.0			Hornsea	0.6
	Howden	-0.8	Howden	-0.2		
	Hunmanby	-1.1	Hunmanby	-0.1	Hunmanby	0.5
	Kirk Moor	0.6	Kirk Moor	-0.5	Kilham	1.1
	Mkt Weigh	-0.9	Mkt Weigh	0.5		
	Patrington	-0.9			Patrington	1.0
	Pocklington	0.1				
	South Cave	0.2	South Cave	-1.2	South Cave	0.0
	Thirsk	1.5	Snaith	-1.0	Snaith	-0.2
3	Bridlington	0.06	Easingwold	0.02	Easingwold	-0.5
1,000 - 1,999	Malton	0.02	Helmsley	-1.1	Helmsley	-1.3
	Pickering	1.3	Pocklington	-0.8	Pocklington	1.0
	Selby	-1.5	Selby	1.6	Kirk Moor	-0.8
	Thorne	0.1	Thorne	0.7	Pickering	-0.4
			Thirsk	-0.4	Mkt Weigh	-0.2
					Driffield	1.7
					Howden	0.6
4	Scarborough	0.7	Bridlington	0.05	Bridlington	0.9
2,000 - 3,999	Beverley	-0.7	Malton	1.0	Malton	0.2
			Pickering	-1.0	Selby	0.9
					Thirsk	-0.8
					Thorne	-1.3

Group	Town	Score	Town	Score	Town	Score
5	Hull	-	Beverley	0.7	Beverley	-0.7
4,000 - 7,999			Scarborough	-0.7	Scarborough	0.7
6	York	-	York	-0.7		
8,000 - 15,999			Hull	0.7		
7					York	0.7
over 16,000					Hull	0.7

Table 2.11 Towns with Different Standardised Scores Between Size Group and Region

1700 - 1750			1750 - 1801			1801 - 1851		
	G	R		G	R		G	R
Selby	L	M						
Snaith	H	M	Snaith	L	M	Snaith	M	L
Nth Frodingham	M	L				Nth Frodingham	M	H
Scarborough	M	H	Scarborough	M	L			
			Malton	H	M			
			Pocklington	M	L			
			South Cave	L	M	South Cave	M	L
			Hull	M	H	Hull	M	H
			Patrington	M	H	Patrington	H	M
						Kilham	H	M
						Kirkby Moorside	M	L

G Size group

R Region i.e.all towns

L Low growth rate

M Medium growth rate

H High growth rate

places it within the nth size group of towns, and Gn and σn are the mean and standard deviation of the nth size group[59].

The growth scores have been broadly grouped into three divisions. High rates of growth refer to those towns whose score was greater than one standard deviation above the mean value for all towns or for that particular size group, medium to where the score fell in the range of plus or minus one standard deviation from the mean value, and low to those centres whose score was greater than one standard deviation below the mean[60]. As can be seen from table 2.11, a significant number of towns showed different standard scores when computed on both a regional and size group basis. Thus although a town could have a growth rate that was, for example, high in relation to the scatter of growth rates of towns in the same size group, this did not mean that its percentage rate of growth was high by regional standards, nor that the town would experience gain in its regional position. The converse could also be true; towns experiencing a high rate of growth by regional standards were frequently growing at a rate common to towns of a comparable size. What emerges from this analysis is that, over the study period as a whole, it was certain of the middle order towns of the region broadly comprising size groups two and three - i.e. those centres with populations of between 500 and 2,000 before 1800 - which experienced the significantly higher and fluctuating growth rates; the extremes of the urban hierarchy - Hull apart - experienced common, and more modest, rates of growth. The analysis does, however, point to the considerable fluctuations in the growth experience of towns at all levels of the hierarchy, suggesting that selectivity of growth was a function of a variety of variables among which demographic were but one group.

The calculation of standard growth rates reveals clearly that high levels of growth were not necessarily associated with

larger communities. Chalklin, in his analysis of the provincial towns of Georgian England[61], contended that settlements which experienced demographic growth in excess of the nationwide pace of population expansion were concentrated in industrial centres and ports, while locally important centres and market towns in agricultural counties grew no faster than the surrounding countryside. Chalklin suggested that a rather different growth experience for inland country towns might have been expected, for the eighteenth century saw a growing centralisation of inland trade[62]. Although he is able to support this hypothesis of slow growth with data from Lincolnshire, Bedfordshire, Dorset and Pembrokeshire, the evidence is not wholly conclusive[63]. Indeed the evidence from eastern Yorkshire would suggest that, in percentage terms, growth rates of all of the market towns were generally higher than those of the surrounding countryside and often higher than those of regional centres, resorts and county towns.

3. Spatial Patterns of Urban Growth

Examining the growth rates of towns within the study region, we might expect three broad spatial patterns of growth to emerge. First a regional pattern in which a broadly uniform development in eastern Yorkshire can be identified; second, sub-regional variations determined by local and physical characteristics of the area; and, third, those determined by locational effect with a decline in the level of growth with increasing distance from the major regional centres. Most studies which have sought to examine the spatial patterns of urban growth have been conducted at a national level such as that by Robson and Lawton for the nineteenth century and Lukerman, Berry and Perloff for the twentieth[64]. Although it has been recognised that sub-regional, or sub-system, patterns of growth

are characteristic of contemporary urban growth[65], only rarely have these been investigated for historical time periods. The most notable exception has been the work of Carter on Wales, while Swansonn has looked at urban concentration and structural change in the Mid-Western states of America[66].

The simplest way in which the spatial structure of urban settlement can be investigated is through mapping the size of component settlements within their regional setting. This can be achieved in two main ways; first, through plotting the actual size of urban centres as a series of proportional circles; second (if we are primarily interested in the systems relationship of centres) by mapping the percentage population contribution of individual towns to the total urban structure of the region. It is this latter approach which has been adopted in figures 5(a), 5(b), 5(c) and 5(d). From a cursory examination, it would appear that the regional urban system was subject to relatively little change, but closer investigation of these four maps reveals that a significant process of selectivity and rationalisation was taking place. In 1700 two centres, York and Hull, dominated the region, accounting for almost 44% of the region's urban population. These apart, the remaining centres were fairly small, the majority housing between 1% and 3% of eastern Yorkshire's urban dwellers. The towns were fairly widely scattered throughout the region, but it is noticeable that the larger centres were situated in close proximity to navigable rivers and coasts while inland locations were served by very small centres.

By 1750 the system had not been subject to any large measure of change; but it is noticeable that several of the more remote inland centres such as North Frodingham, Kilham, Patrington and Hunmanby had suffered a decline in their share of the region's urban population while the inland and coastal ports had further strengthened their position. At the turn of the eighteenth

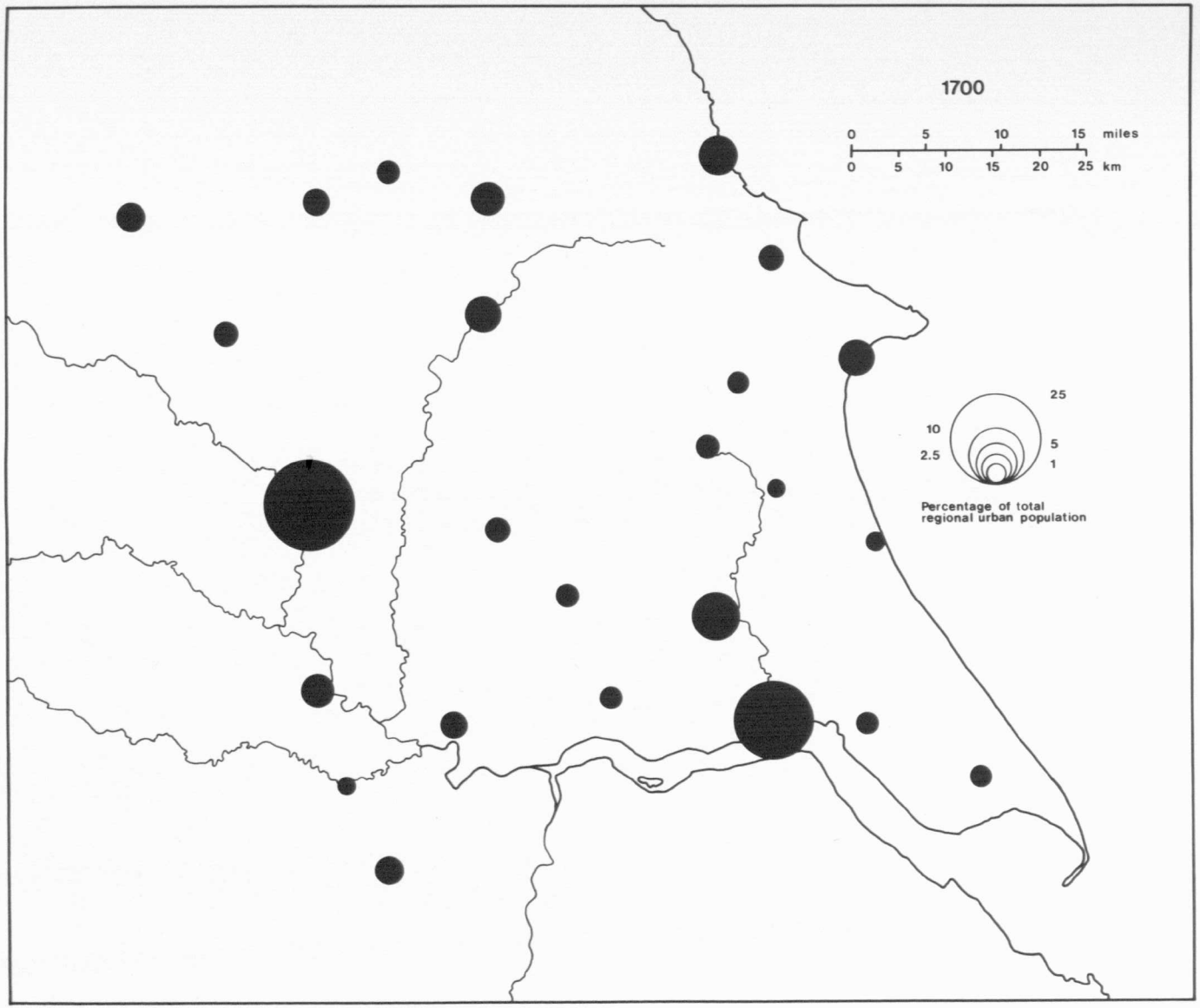

Fig.2.5 Percentage of Total Regional Urban Population Resident in Eastern Yorkshire Towns, 1700-1851
(a)

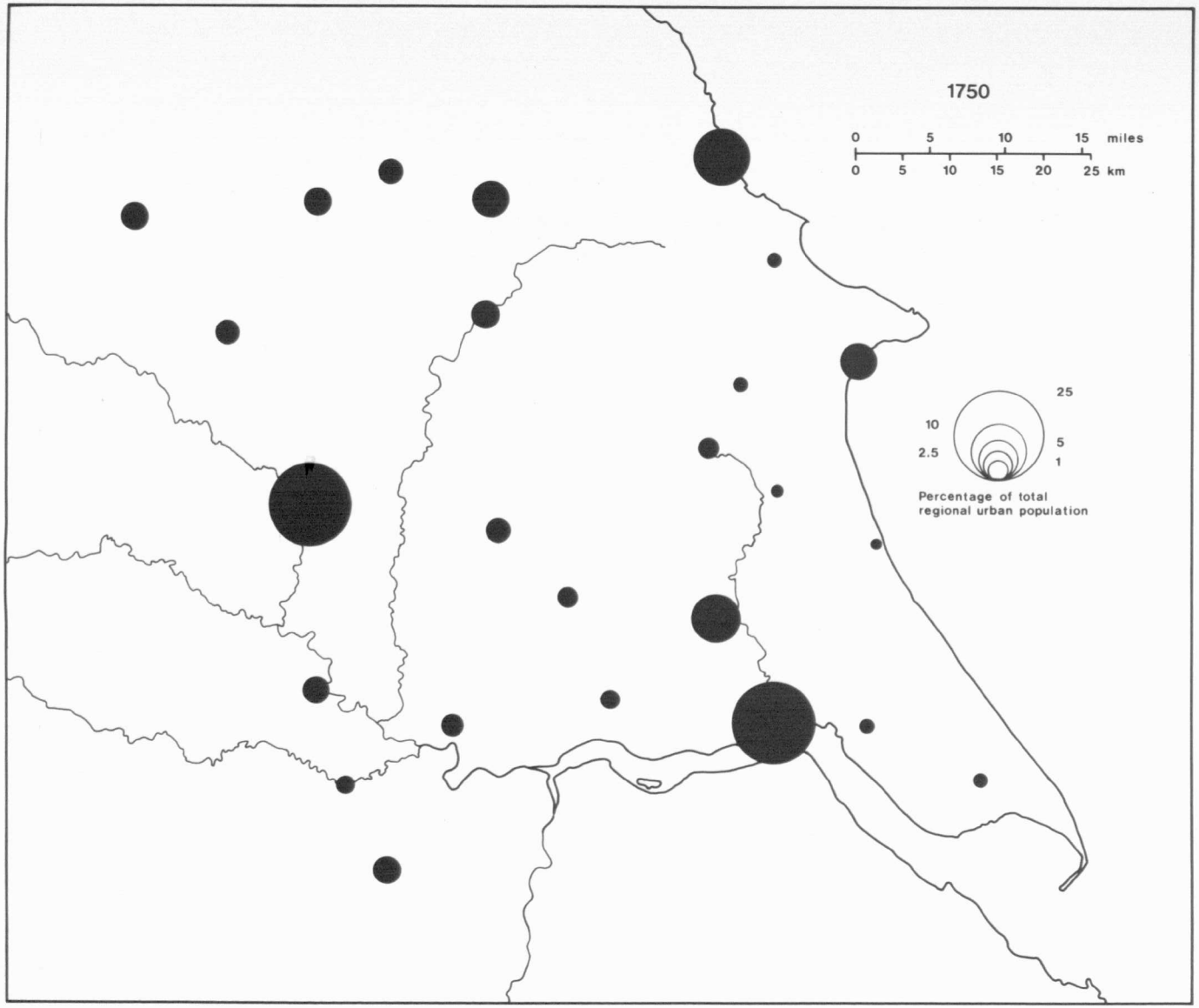
1750
0 5 10 15 miles
0 5 10 15 20 25 km
25
10
5
2.5
1
Percentage of total
regional urban population

Fig.2.5 (b)

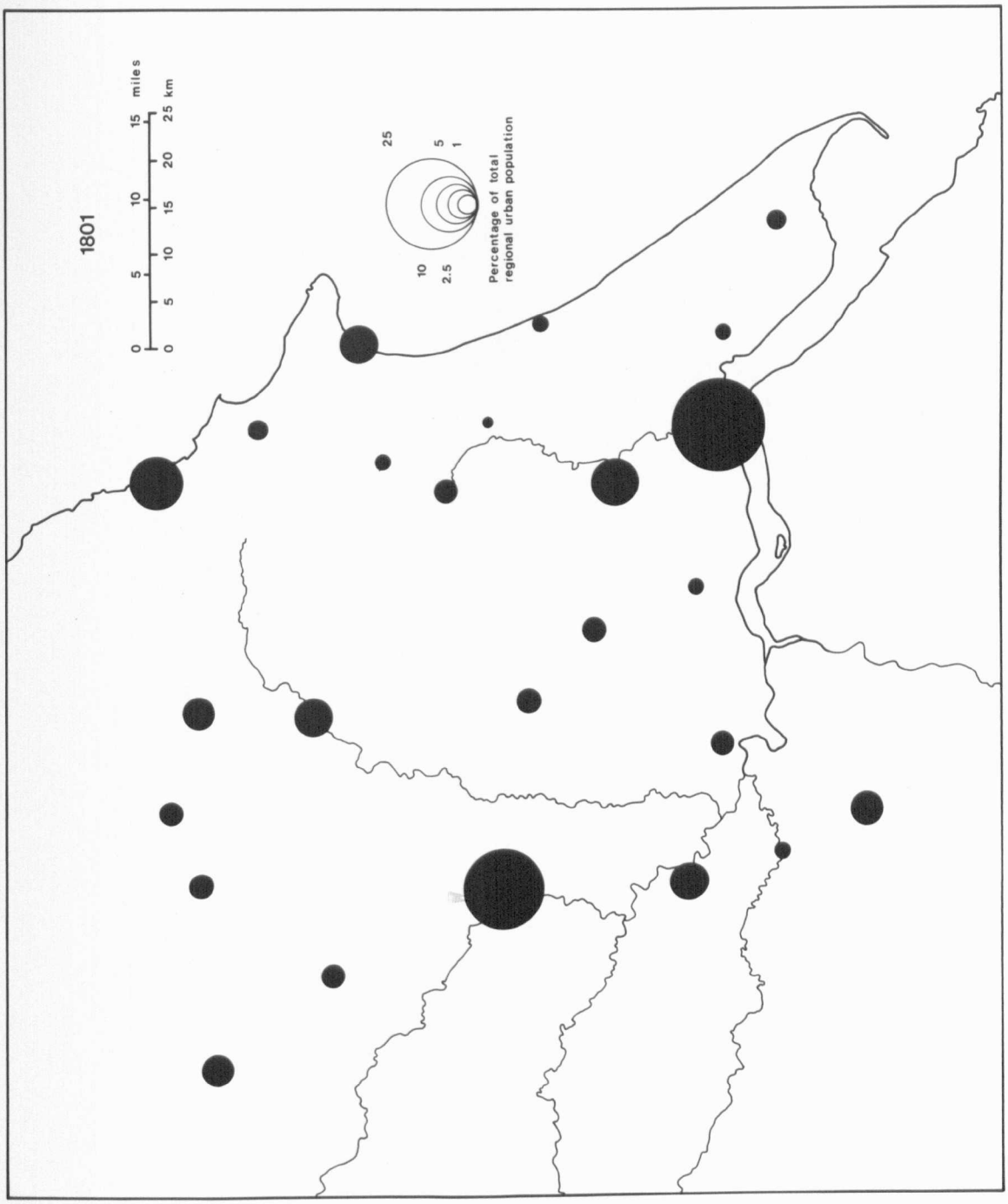
1801
0 5 10 15 miles
0 5 10 15 20 25 km
25
10
5
2.5
1
Percentage of total regional urban population

Fig.2.5 (c)

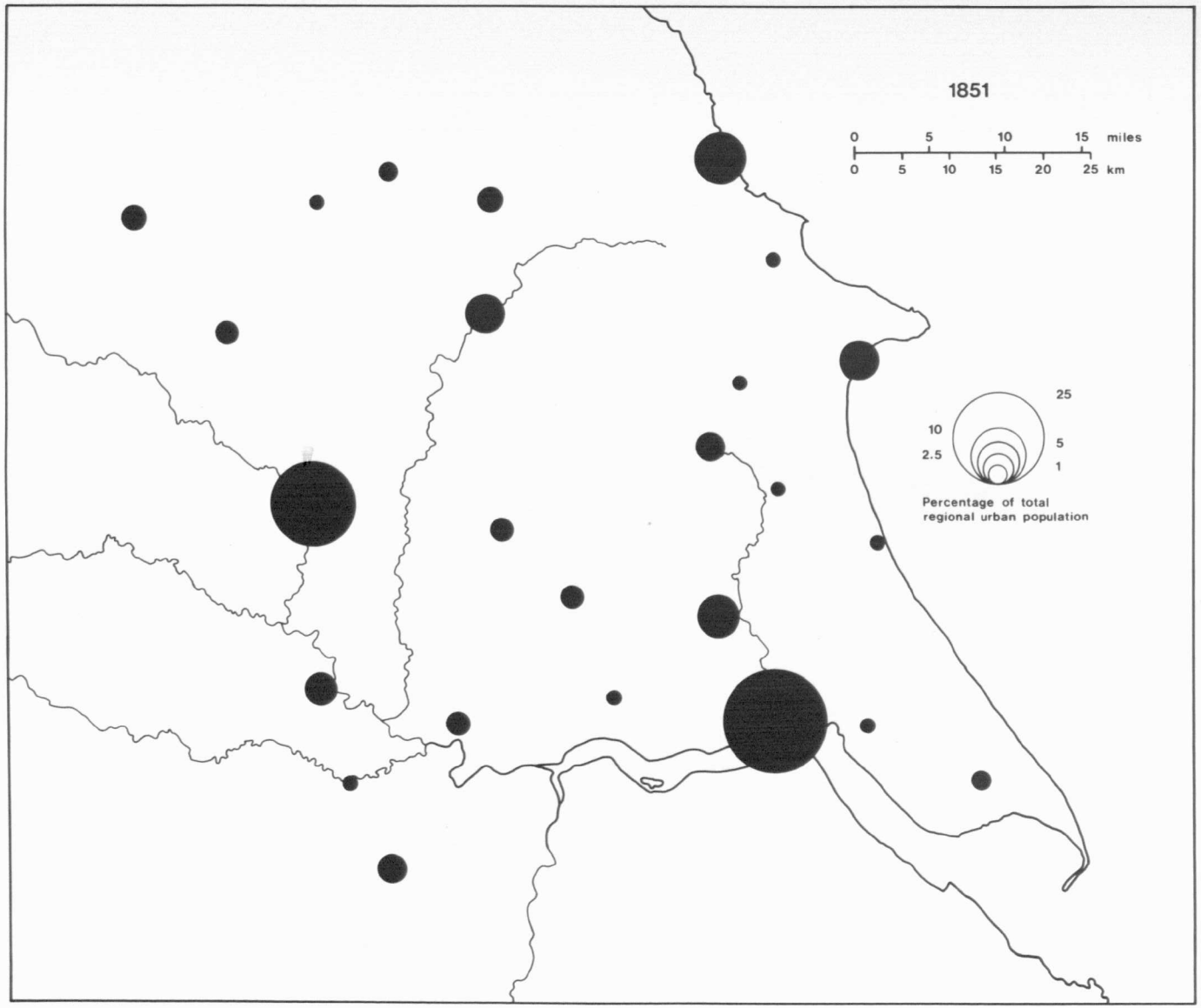
1851
0 5 10 15 miles
0 5 10 15 20 25 km
25
10
5
2.5
1
Percentage of total
regional urban population

Fig.2.5 (d)

century the dominant towns of the region were clearly emergent. The settlements in the northwest of the region (the towns of Kirkby Moorside, Pickering, Helmsley and Easingwold), which had hitherto made a strong showing, were now losing their share of the urban population to be overtaken by Malton and Thirsk. At the same time, towns within the administrative county of the East Riding, particularly Pocklington and Great Driffield, were experiencing significant growth rates while certain other of their number proved unable to strengthen their regional position. Two other towns, Selby and Thorne, situated in the southeast corner of the region were also increasing their share of the urban population at this time. By 1800 then, a more distinct pattern of regional centres and sub-regional centres was emergent, serving extensive areas of eastern Yorkshire. The ensuing fifty year period witnessed further development of this pattern and by 1851 the dominance of certain centres was marked. York, Hull, Beverley, Scarborough, Malton, Bridlington, Driffield and Selby all accounted for a significant proportion, 81%, of the region's urban population, supported by a handful of smaller settlements. If the geographical location of these leading towns is examined in greater detail, it is clear that all had a degree of 'port' status enjoying either a coastal, river or canal location. This factor would thus suggest that in a region whose natural boundaries were extensively defined by water, the presence or absence of some form of navigational link was an important determinant of the whole process of selective urban growth.

The mapping of standardised growth rates provides further insight into spatial variations in the selectivity of urban growth in eastern Yorkshire. Figure 2.6 plots the spatial pattern of urban growth between each pair of study dates. The two symbols on each map indicate firstly the standard score (low, medium or high) calculated on the basis of the growth rate common to a

particular size group, and secondly, on the basis of the common rate for all towns. In the first half of the eighteenth century, high rates of growth were concentrated primarily in the northwest of the region, the seaport and resort of Scarborough also growing significantly at this time. Other towns neither expanded nor declined in this period, although the two Holderness market towns of Hornsea and North Frodingham and the town of Hunmanby suffered sharply. The overall pattern for the early eighteenth century was, however, one of stability with no centre making any real bid for regional or sub-regional hegemony.

The second half of the century witnessed a change in this pattern as certain growth centres began to emerge. These can be noted as Selby, Driffield, and Malton, while the towns of Patrington and Hornsea which had suffered from the demographic crises of the 1720s and 1730s were making a strong bid for recovery at this time. At the same time, certain of the region's towns were losing their relative standing within the settlement system. Pickering and Helmsley in the northwest of the region, which had enjoyed good growth rates in the preceding period, were exhibiting signs of decline, while Snaith and South Cave in the south both had growth rates below the average for their particular size group. By the early nineteenth century these patterns became further enhanced. The towns in the northwest of the region continued to lose their relative standing in the settlement system as also did Snaith, Thorne and South Cave in the south. Growth above the rate common to both the region and the size group was concentrated in two towns, Great Driffield and Pocklington, while the south Holderness town of Patrington continued to strengthen its local position, although proving unable to make much headway within the total urban system.

Viewing the region as a whole, it is evident that certain localities were, in the course of the eighteenth and nineteenth

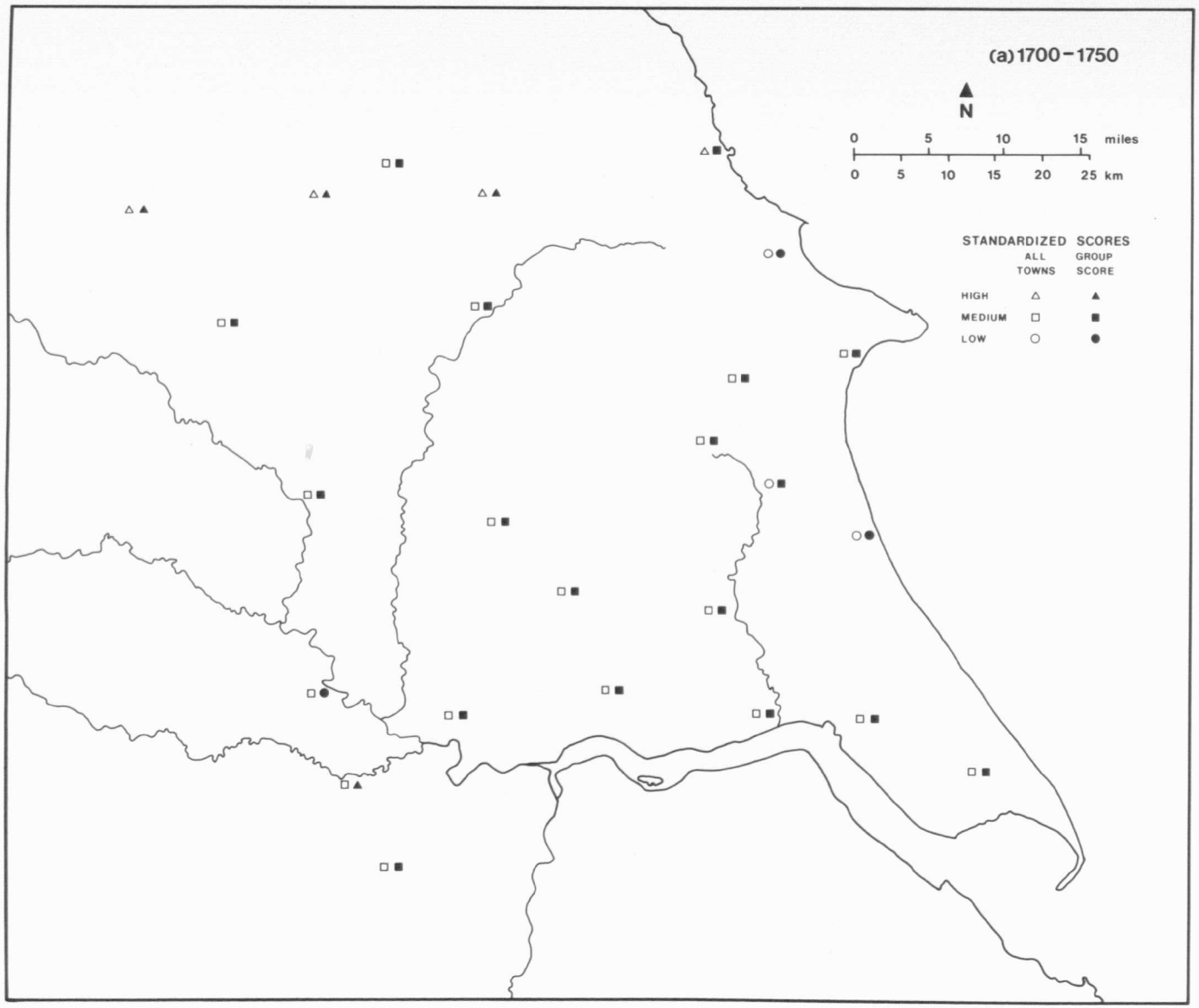

Fig.2.6 Standardised Growth Scores for Eastern Yorkshire Towns, 1700-1851

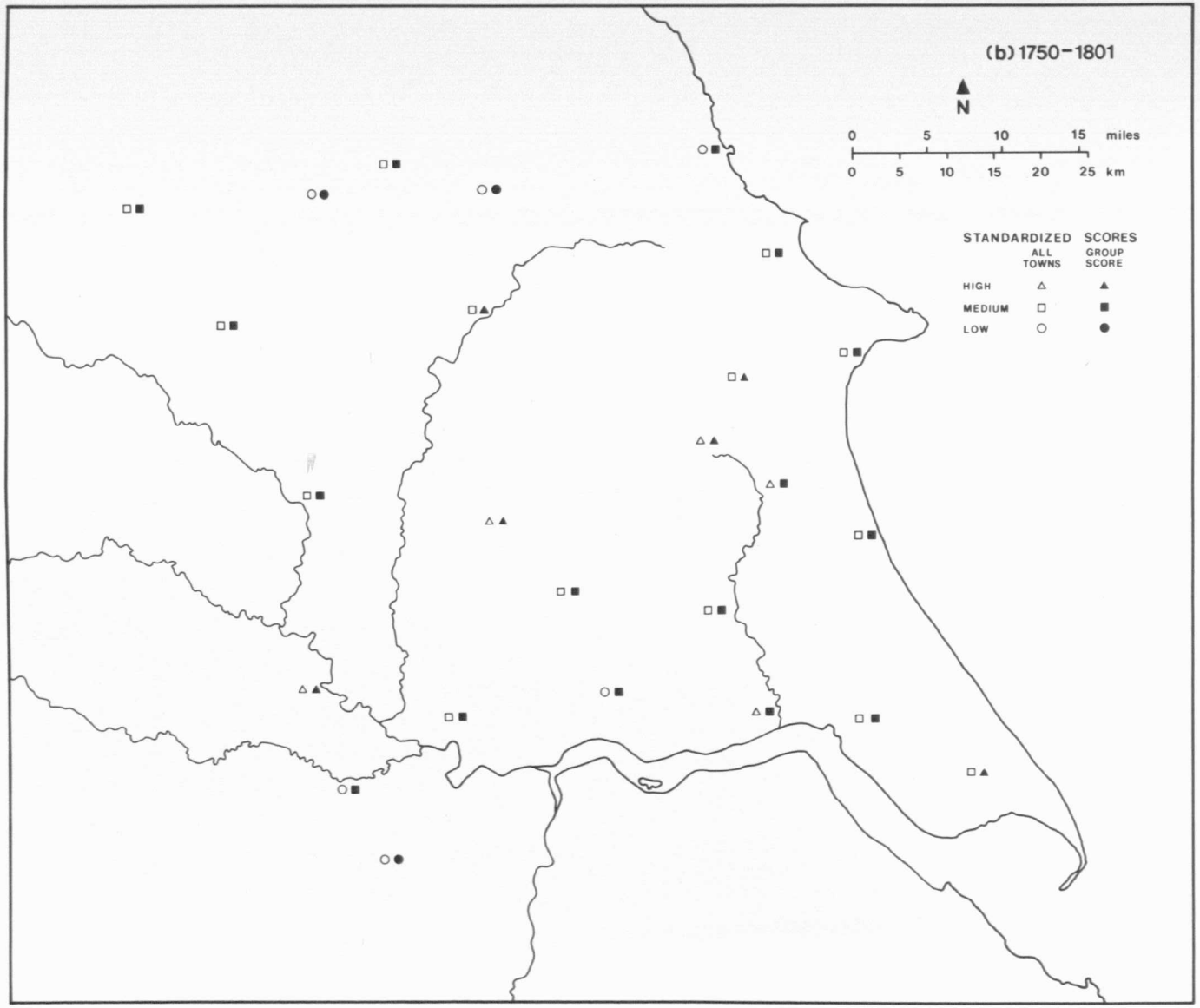

Fig.2.6 (Continued)

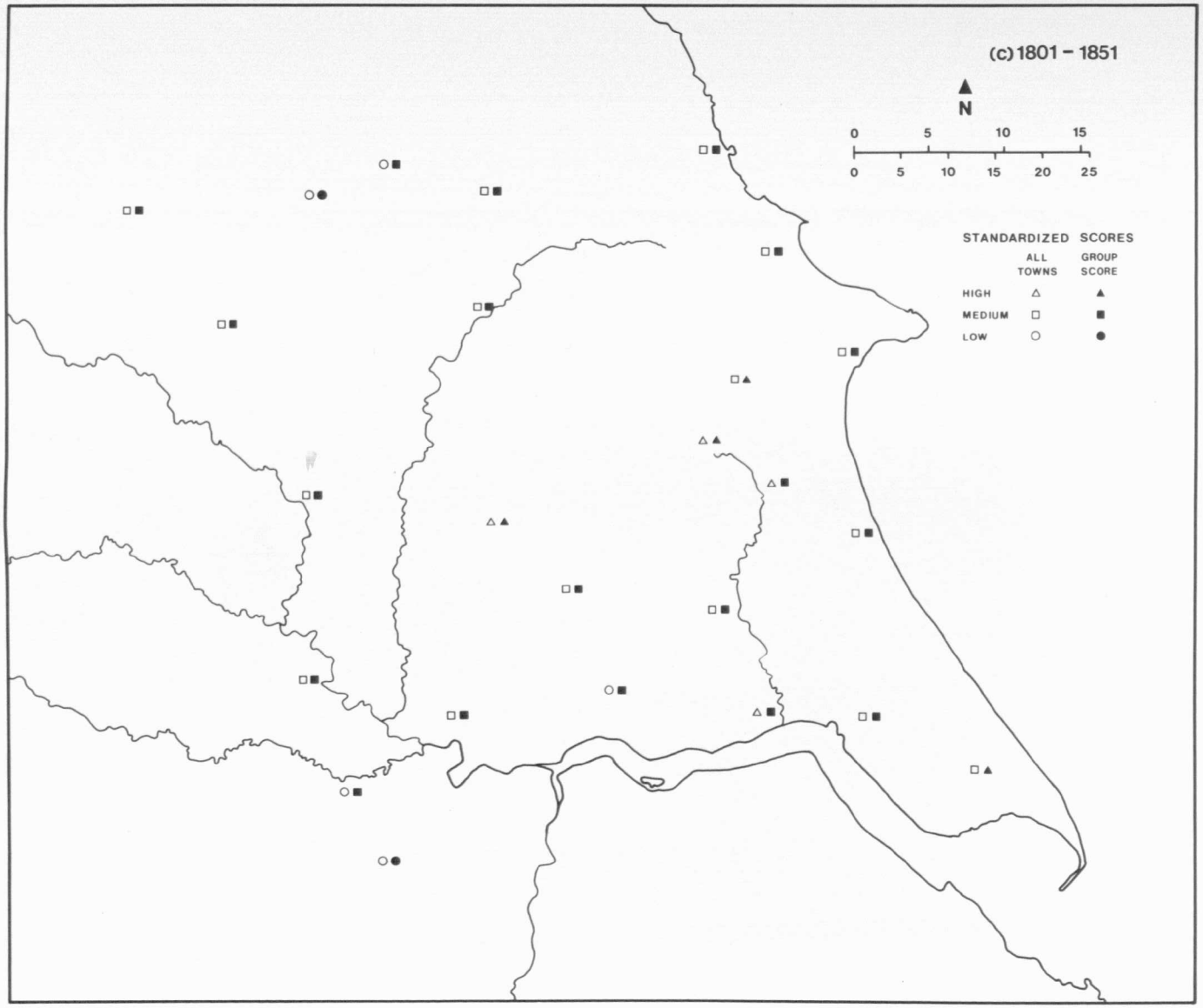

Fig.2.6 (Continued)

centuries, subject to far stronger forces of selective urban growth than others. In the southwest of the region, the settlement system was comparatively stable and over the course of the study period the demographic rankings of the towns of Selby, Snaith and Thorne were subject to little change, although there was considerable fluctuation in the growth rates of each centre. In the southeast of the region the Holderness towns of Patrington and Hedon, also maintained a fairly stable demographic position. In the northwest the urban system was subject to greater degrees of fluctuation for, while the total number of urban centres did not decline, their share of the urban population did. Easingwold, Pickering, Helmsley and Kirkby Moorside all lost rank, primarily attributable to the significant economic and cultural development of Scarborough and Malton and the continuing dominance of York. The area experiencing the greatest degree of change was the central portion of eastern Yorkshire comprising a large part of the administrative region of the East Riding. Here there were some nine country towns serving the area in 1700, but clearly all could not attain the same growth rate in a period of rapid change. The main growth nodes in this area were concentrated in settlements which lay in juxtaposition to two contrasting physical or natural regions of the Wolds, Holderness and the Vale of York. Driffield, for example, was located between the Wolds and Holderness and Pocklington and Market Weighton, although experiencing growth to a lesser degree, were both situated between the Wolds and the Vale of York.

The analysis would thus suggest that processes of selectivity were operative throughout the region. Centres on the regional fringe of eastern Yorkshire and subject to the pull of forces and influences from northern and southern Yorkshire were, however, rather more stable than those in the east central area. In the former the dominant growth patterns were established and

maintained in the 'century' after 1750, but in the latter changes of position occurred throughout this hundred year period and there was clearly greater variety in the growth experience of the component centres than in other areas.

When compared with the industrial regions of the country the growth patterns of eastern Yorkshire's towns are not of a spectacular nature, for no town grew at rates comparable to those of towns in the North East of the country and in the West Riding[67]. Nevertheless, they were of particular significance for regional urban structure, for very high rates of growth would not be expected in a region with a highly agricultural economy and absence of large scale capital investment in sectors other than agriculture. The overall picture of urban demographic growth for the period 1700 to 1850 was one of selectivity with concentration of growth in both a spatial and a size-context characterising the system. The critical period of change can be identified as the century between 1750 and 1850 for the first fifty years of the eighteenth century were a time of relative stability, although the process of rationalisation was clearly underway. Change in particular dominated the first half of the nineteenth century as any continuum between the hierarchy of towns began to break down. The period witnessed a widening out of relative sizes due to differential and selective growth. It is interesting to note, however, that a high group growth rate was not always consistent with a high regional growth rate especially among many of the very small centres. Furthermore a town experiencing an average growth rate relative to its particular size group could still lose ground or rank position within the regional urban system.

While it is evident that both spatial and demographic shifts were occurring in the settlement system at this time, explanation of the selectivity of growth cannot be sought in demographic factors alone. In a recent paper on regional urbanization and

the selective growth of towns in certain north American regions, Muller identifies a number of key economic variables, among them location, transportation, central place relationships, and manufacturing role, which he suggests must all be examined if the selectivity of growth particularly among smaller urban communities is to be understood[68]. Chapter three will seek to investigate some of these key variables with a view toward building a more comprehensive understanding of the processes and patterns underlying the selectivity of growth among country towns.

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CHAPTER 3

THE ECONOMIC DIMENSION TO CHANGE 1700 - 1850

Studies of central place systems and in particular of the functional bases and organisation of regional urban structure are prolific in contemporary geographical literature. Berry, Preston, Curry, Abiodun and Pred, among others, have all investigated the urban hierarchy for a variety of countries and regions in the twentieth century[1]. Most of these authors, however, have been essentially static in their analyses, failing to examine development and change in the hierarchy over time. Similarly, analyses of the economic base of the urban system for earlier time periods, notably the nineteenth century, have also largely concentrated on one or occasionally two study dates as witness the studies by Caroe, and O Dell[3]. At a time when a degree of interest was being shown in the analysis of the central place system for past periods, Carter called for the need to analyse the growth of such systems for temporal rather than static contexts[4]. His plea, however, met with little response and indeed the 1970's saw the publication of very few studies seeking to extend that work which had begun in the previous decade. Accordingly there remains a considerable gap in our knowledge and understanding of the development of the urban system for the nineteenth century and earlier.

The analysis of regional urban systems during the nineteenth century is a far less formidable task than for the eighteenth. Trade directories, which became widespread after the turn of the eighteenth century, are now recognised as an invaluable source not only for studying hierarchical change in urban systems but also in providing detailed insight into the occupational structure and

economic base of towns[5]. For the eighteenth century such widespread and well used documents are seldom available; requisite information sources are generally sparsely distributed and often of a poor quality with respect to their total information content. This poses considerable problems for any study seeking to analyse change in the economic structure of the urban system at this time. A major requirement of such hierarchical analysis, and indeed any rigorous statistical enquiry, is that sources be widely available and of a uniform nature for all towns. This criteria is, however, not easily met for the eighteenth century town and in the case of smaller urban communities becomes especially difficult. Apart from contemporary accounts of travellers and the occasional local census or visitation, the only widely available source are the Anglican parish registers. The latter have been shown by a variety of authors such as Pickles, Wrigley, Kenyon and Wild to be an important tool in the analysis of occupational change in both urban and rural communities[6]. Accordingly they have been applied here in the investigation of economic change in the urban system of eastern Yorkshire in the eighteenth century, while directories and the census have been employed for the analysis of the first half of the nineteenth century. Due to the different information content of each source, analysis has of necessity been divided into two parts although there is an overlap of some thirty years (1790 - 1820) in the use of the sources.

1. The Data

(a) Parish Registers

Occupational recordings in the Anglican Church parish registers generally began in the first quarter of the eighteenth century and continued, except in the case of burials, into the twentieth century. Occupational entries are fairly consistently

recorded in marriage registers from 1754 following the passing of Hardwicke's Marriage Act, and in all baptismal registers after 1813. Before these dates, however, the recording of occupational information in both baptismal and marriage registers, and in burial registers, was left to the discretion of the incumbant. Not surprisingly his conscientiousness varied, and there is often considerable inter- and intra- urban variation in the information recorded in the registers both spatially and temporally. Within ecclesiastical administrative districts, however, there was usually a degree of uniformity in the keeping of the registers perhaps due to some directive from the diocese[7]. Within eastern Yorkshire, for example, the registers of towns in the archdeaconry of the East Riding are generally found to be more informative than those of towns lying in neighbouring administrative areas.

Baptism and marriage registers have been the most widely used of the parish registers in the analysis of occupational change and economic structure of communities, (although arguably the latter fail to give a balanced view of the range of occupations due to the age-specific nature of the documents). The former, despite the attendant problems of differential fertility both between and among different occupational groups[8], provide a more balanced picture of economic structure, especially if the major concern is with the relative strength of each occupational group. For more detailed studies baptism registers can be supplemented with occupations recorded in the burial registers as witness the studies by Wrigley and Noble[9]. Burial registers often record not only the occupation of the deceased, but also, in the case of the death of adolescents, the occupation of the male parent.

One of the principal problems facing any analysis utilising these sources is how to extract information without giving rise to distortion. Conceivably the answer to this problem would be to extract data for as many years as are available, for over a period

of several decades distortion, due among other things to differential fertility, would be ironed out[10]. In practice, and particularly for comparative purposes, such a task is onerous involving several thousand entries and thus it becomes necessary to adopt a sampling framework which will measure the relative functional and occupational change of the settlements in question with a fair degree of accuracy. Wild in his study of the Yorkshire parish of Saddleworth adopted a five year sampling frame on a decadal cycle, Wrigley used four, nine and fifteen year periods in his analysis of the occupational structure of Colyton between 1600 and 1850, and Pickles twenty years in her analysis of Wharfedale[11]. In order to ensure that analysing recorded occupations for a short time period would yield results comparable to those obtained for analyses conducted for longer time spans, results from eastern Yorkshire were compared with an earlier study undertaken for six East Riding towns[12]. The results of this investigation suggested that the number of different occupations recorded in any twenty year period were equally likely to be recorded for a five year period and, furthermore, the resulting occupational balance was very similar.

If one accepts that analysing occupations for a given time period of five years will yield acceptable levels of accuracy[13], the choice of interval between study dates becomes an important consideration. During the eighteenth and nineteenth centuries it is generally accepted that the pattern of economic growth fell into distinct phases[14]. Between 1720 and 1740 population and economy were almost stagnant and there was arguably a deceleration in the British economy at this time[15]. From 1740 a process of rapid structural change in the economy began, with growth rates of 2% per annum in the country as a whole, despite the retention of a good deal of its pre-industrial character. The years between 1770 and the turn of the eighteenth century witnessed considerable

changes in the economy as reorganisation of labour, capital investment, new industries, diversification of agriculture and transportational improvements manifested themselves on a scale of unprecedented proportion[16]. After 1800, the industrialisation of the British economy gathered pace as capital and finance became more readily available, providing channels through which further developments could be achieved[17]. Thus it would seem plausible to adopt a sampling cycle that reflects these changes in the economy.

As 1720 was generally the first year from which occupations were recorded in the parish registers of eastern Yorkshire towns in any consistent manner, the years 1720 - 1725 were taken as the first sample. Using a thirty year interval, the second sample period became 1750 - 1755, falling at the mid-point of the second phase of economic growth; the third became 1780 - 1785, and the last 1810 - 1815. After 1815 the analysis of occupational entries in the parish registers was not pursued due to the availability of census and directory information, and because of the widely acknowledged reduction in the comprehensiveness of parish registers with the growth of non-conformity after this time[18].

(b) Directories

From the last quarter of the eighteenth century, trade directories recording entries for eastern Yorkshire towns became available. The first of these is Baileys British Directory of 1784; this is not very comprehensive in its coverage, but is followed by Barfoot and Wilkes Universal British Directory published in six volumes from 1791[19]. These early national directories were followed by the widespread publication of local directories from the second quarter of the nineteenth century onwards. Despite their limitations, the use of these sources has been widespread and their potential for geographical enquiry outlined in two early papers by Davies and Oliver and in a more

recent one by Shaw[20]. Lewis in his analysis of the central place pattern of Mid-Wales and the Middle-Welsh borderland utilised trade directories as did Davies in a similar study relating to South Wales[21].

The use of directories makes practicable the application of a greater variety of techniques than is possible with eighteenth century sources and thus permits the analysis of regional urban systems in far greater depth. Caroe, working on East Anglian towns, conducted an association analysis based on directory entries, O'Dell calculated indices of service provision and service concentration in his study of Leicestershire towns, while Parton utilises a number of techniques, among them indices of dissimilarity, in his analysis of town and country relationships in Surrey[22].

Three directories were chosen to analyse economic change in the urban system of eastern Yorkshire, again on a thirty year cycle. The first available national directory with comprehensive coverage of eastern Yorkshire towns was the Universal British Directory of 1791 and this formed the first study date. Baines' Yorkshire directory published for all three Ridings in 1823 (the first local directory for Yorkshire) formed the second study date, and Slater's Yorkshire directory of 1849 the third[23].

(c) Occupational Classification

Studies of urban occupations and the functional bases of towns utilising a variety of sources such as probate inventories, muster rolls, parish registers and directories have given rise to a large body of classificatory schemes[24]. Kenyon, in his analysis of Petworth, divided occupations into five groups, - merchants, processors, creative craftsmen, wood workers and labourers, and those selling knowledge. Conversely, Pickles adopted a classification by trade, although all industries, save leadmining and textiles, were grouped together. Wrigley analysed

Table 3.1 Occupational Classification

1. Agriculture

2. Building and associated trades

3. Retail, Wholesale, Service

4. Maritime and transport trades

5. Manufacturing
   - (a) Textiles
   - (b) Clothing trades
   - (c) Leatherworking
   - (d) Milling/Brewing
   - (e) Ropemaking
   - (f) Metalworking
   - (g) Woodworking
   - (h) Miscellaneous

6. Professional Services

7. Domestic Service

8. Labouring

9. Other

occupations by type of goods processed such as wood, metal, leather and textiles, while Lawton, in his study of Craven, used six groups, namely agriculture, extractive industry, textiles and crafts, trade and commerce, services and professions, and servant labour[25].

The broad classifications adopted by many authors obscure details that need to be sought if the range and diversity of town functions are to be analysed. A classification is thus needed that is not too lengthy so as to preclude grouping, but that at the same time highlights the strengths and weaknesses of town economy. Furthermore, in any study of change, a classification is needed that has both flexibility and continuity and which can be applied to more than one documentary source. Accordingly, the classification adopted was largely by function allowing for the combining of individual groups where necessary (table 3.1).

2. Eighteenth-Century Change, 1720 - 1815

(a) Occupational Structure

For the twenty-three country towns of eastern Yorkshire baptism registers were analysed for each of the four study periods[26]. Seven towns had occupational entries for the period 1720-25, eleven for 1750-55, sixteen for 1780-85 and for the years 1810-1815 each study town had occupational entries for all or part of the period (Appendix III (a)). As the years for which information was collected included both starting and closing dates it gave six years to each sample. The percentages of occupations falling in each of the classificatory groups were calculated enabling analysis of the broad occupational structure of towns and an assessment of their functional base to be made.

As table 3.2 shows, there was, within all the region's towns, relatively little total decline in the level of agricultural activity over the period. The high standard deviations and

Table 3.2 Percentage of Entries Relating to Agricultural Activities, 1720-1815

Town	1720-25	1750-55	1780-85	1810-15
Beverley	2.9	6.0	6.7	8.7
Bridlington	9.2	12.1	NA	5.2
Easingwold	NA	28.8	28.7	28.5
Great Driffield	NA	NA	8.3	4.4
Hedon	3.5	0.0	7.5	11.7
Howden	NA	NA	8.5	8.3
Hornsea	NA	31.3	NA	31.9
Hunmanby	NA	NA	NA	50.0
Helmsley	NA	NA	6.1	6.3
Kilham	NA	52.8	44.6	38.1
Kirkby Moorside	NA	NA	19.4	14.8
Malton	7.8	0.0	4.0	4.8
Market Weighton	48.1	17.5	36.4	16.9
Patrington	30.0	17.9	14.4	17.4
Pickering	NA	NA	NA	23.8
Pocklington	NA	NA	NA	4.8
North Frodingham	NA	NA	NA	32.3
Scarborough	NA	NA	NA	6.9
Selby	NA	0.0	6.3	7.1
Snaith	NA	NA	5.6	3.1
South Cave	NA	NA	NA	29.8
Thirsk	5.8	3.4	2.3	8.7
Thorne	25.9	14.5	13.8	6.9
MEAN	16.65	15.4	14.2	16.1
S.D.	16.3	15.9	12.7	13.1
VAR.	233.3	233.1	151.4	163.7

NA = Not Available.

See Appendix III (a) for details of availability and methodology.

coefficients of variation indicate, however, that there was considerable inter-urban variation in the level of agricultural employment; some towns, such as Thorne, Patrington, Market Weighton and Bridlington, saw a significant reduction in their agricultural base, while no town experienced any marked increase in the level of this activity. Towns that indicated falling levels of agricultural employment can be identified as those centres which acquired other important functions during the course of the century; Thorne and Bridlington as ports and Market Weighton and Patrington as developing market towns and thereby centres of local trade. In the smallest towns of the region agricultural involvement remained largely static and at fairly high levels. Law, Robson and Dickinson, among others, have each suggested that a measure of urban status is provided by the percentage of the workforce engaged in non-agricultural pursuits[27]. If 30%, a value of over one standard deviation above the mean value, is adopted as a rough guideline for distinguishing rural from urban centres then by the turn of the eighteenth century five of the region's towns were on the margin of urban status: namely Hornsea, Kilham, South Cave, Hunmanby and North Frodingham. Although experiencing some demographic expansion at this time[28], they can be considered as declining urban centres for their geographical location, poor transportational links and small mostly intersecting market areas rendered them unable to improve their relative standing within the regional settlement system.

A further measure of urban status is provided by the analysis of percentages of the workforce engaged in different economic sectors, especially those related to the servicing of the surrounding countryside, viz. retailing and professional activity. In the course of the eighteenth century there was a small percentage increase in all towns in the number of register entries relating to retailing, while the number of different occupations

recorded for this sector also rose. As retailing activity is an important service provided by any town, few centres emerged as dominant within the region in this respect. One way in which the strength of a particular economic sector in any town can be measured is through the computation of a standard score based on the mean value and standard deviation. Towns with a level of economic activity of one standard deviation or more above the mean value may be taken as being significant centres of that particular activity within the region. Carter adopted such a scheme in his functional classification of Welsh towns and Nelson in his service classification of American cities[29]. Within eastern Yorkshire several towns, among them Great Driffield, Selby, Malton and Kirkby Moorside, each registered retailing/service scores higher than one standard deviation above the mean for one or more of the study dates; but this evidence must be treated with a degree of caution for the data suggests that the strength of individual economic sectors was subject to much fluctuation. Of greater importance is the number of different occupations recorded for this sector in each town, and in this respect emerging patterns of regional dominance are more evident. Two towns, Beverley and Malton, consistently recorded scores of more than one standard deviation above the mean and by the early nineteenth century the available evidence would suggest that Driffield and Selby had been added to their number (table 3.3).

A further element of the service economy of towns is indicated by the size of the professional sector. Within the region this sector grew only marginally in the course of the eighteenth century; from 5.4% to almost 7% of all economic activity. The standard deviations for all towns do, however, indicate considerable inter-urban variation in the servicing of the region. Towns with high professional scores surprisingly included several of the inland country towns of Driffield, Market

Table 3.3 Percentage of Entries Relating to Retail/Wholesale Trades, 1720-1815

Town	1720-25		1750-55		1780-85		1810-15	
	%	D.O	%	D.O	%	D.O	%	D.O
Beverley	21.9	16	20.0	8	17.6	13	16.9	20
Bridlington	10.6	7	14.9	6	NA		12.6	11
Easingwold	NA		14.4	5	14.8	3	12.5	6
Great Driffield	NA		NA		24.2	5	22.4	12
Hedon	13.9	6	26.3	6	17.9	8	17.0	6
Helmsley	NA		NA		10.4	3	10.8	3
Hornsea	NA		12.5	2	NA		10.6	4
Howden	NA		NA		25.4	8	17.9	8
Hunmanby	NA		NA		NA		11.4	4
Kilham	NA		3.8	1	12.2	2	8.3	3
Kirkby Moorside	NA		NA		14.9	4	22.0	11
Malton	16.9	6	16.1	8	23.1	9	16.7	13
Market Weighton	6.2	4	19.0	5	18.7	6	12.0	5
North Frodingham	NA		NA		NA		9.7	2
Patrington	18.0	5	19.2	6	9.6	3	7.2	3
Pickering	NA		NA		NA		15.7	7
Pocklington	NA		NA		NA		14.3	3
Scarborough	NA		NA		NA		10.2	11
Selby	NA		27.8	3	15.0	7	10.5	14
Snaith	NA		NA		3.8	2	23.4	5
South Cave	NA		NA		NA		24.6	3
Thirsk	12.1	8	12.6	4	16.4	10	19.6	6
Thorne	0.0	0	7.2	5	12.2	6	6.0	5
MEAN	12.5	6.5	16.2	4.9	15.7	5.9	14.4	7.2
S.D.	7.0	4.5	7.0	2.1	5.8	3.2	5.3	4.6
VAR.	42.5	18.0	44.5	4.2	31.5	9.8	27.4	20.2

NA = Not Available.

DO = Number of Different Occupations.

Table 3.4 Percentage of Entries Relating to Professional Activities, 1720-1815

Town	1720-25		1750-55		1780-85		1810-15	
	%	D.O	%	D.O	%	D.O	%	D.O
Beverley	8.8	8	5.7	10	5.1	8	5.8	10
Bridlington	3.4	6	4.7	5	NA		8.5	7
Easingwold	NA		1.3	2	5.7	6	11.1	8
Driffield	NA		NA		9.2	5	7.4	7
Hedon	18.6	3	11.9	2	6.0	3	8.5	7
Helmsley	NA		NA		7.8	2	0.9	1
Hornsea	NA		6.3	2	NA		10.6	3
Howden	NA		NA		4.6	3	8.2	6
Hunmanby	NA		NA		NA		4.3	1
Kilham	NA		3.8	2	12.2	2	3.6	2
Kirkby Moorside	NA		NA		3.0	2	2.2	2
Malton	2.3	3	4.2	3	8.0	8	5.1	9
Market Weighton	0.0	0	3.2	1	1.9	1	13.2	5
North Frodingham	NA		NA		NA		0.0	0
Patrington	6.0	1	7.7	2	1.0	1	5.8	2
Pickering	NA		NA		NA		7.0	6
Pocklington	NA		NA		NA		28.6	7
Scarborough	NA		NA		NA		7.1	6
Selby	NA		11.1	1	3.0	7	3.7	8
South Cave	NA		NA		NA		0.0	0
Snaith	NA		NA		5.7	2	4.7	3
Thirsk	4.0	5	3.4	4	5.0	4	4.6	3
Thorne	0.0	0	3.9	3	4.2	4	6.0	6
MEAN	5.4	3.25	5.6	3.1	5.5	3.8	6.8	4.7
S.D.	6.1	2.9	3.2	2.5	2.9	2.4	5.8	3.0
VAR.	32.5	7.4	9.4	5.6	7.9	5.4	32.4	8.6

NA = Not Available.

DA = Number of Different Occupations.

Weighton, Pocklington and Hedon, with Beverley registering a value measurably different from the mean value only at the first study date, (table 3.4). However, the data on professional activity would seem to suggest that during the eighteenth century professional services remained largely concentrated in the regional centres of Hull and York. The urban gentry, having already made their mark in the larger urban centres of the country, were largely absent in smaller centres, and the main demand for professional services came from a wealthy leisured county landowning class, several of whom had residences in urban parishes[30].

On balance, most of the country towns of eastern Yorkshire had well diversified economic bases in the eighteenth century and few had gained regional dominance in respect of particular functions. The percentage of the workforce involved in manufacturing and craft industries declined in the course of the eighteenth century from 42% to 34% of all activity. At the same time, however, diversity within this sector increased, evidenced by the steady rise in the number of different occupations recorded in the parish registers (table 3.5). The dominant craft industry in the majority of the region's towns was the leather trade, although there was measurable decline in its dominance towards the close of the century. Within the region few towns emerged as important manufacturing or craft centres in their own right, indicating the region's lack of natural resources and the agricultural nature of the economy. The most significant levels of manufacturing activity were found in towns situated in the northwest of the region which were all of particular importance for the textile trade. Thirsk, Helmsley, Malton and Kirkby Moorside were all significant textile manufacturing centres for part of the eighteenth century. Overall, the level and character of manufacturing and craft activity was subject to considerable

Table 3.5 Percentage of Entries Relating to Manufacturing Activity, 1720-1815

Town	1720-25		1750-55		1780-85		1810-15	
	%	D.O	%	D.O	%	D.O	%	D.O
Beverley	40.0	27	44.1	32	41.2	40	37.5	36
Bridlington	24.5	12	42.1	15	NA		23.3	21
Easingwold	NA		42.5	16	37.6	15	32.8	20
Driffield	NA		NA		42.5	13	36.4	21
Hedon	53.1	10	35.8	7	35.9	7	37.1	7
Helmsley	NA		NA		62.7	13	55.2	16
Hornsea	NA		40.7	5	NA		10.6	4
Howden	NA		NA		41.6	16	41.8	18
Hunmanby	NA		NA		NA		22.8	5
Kilham	NA		26.4	5	16.2	5	26.2	4
Kirkby Moorside	NA		NA		53.7	11	37.5	20
Malton	49.2	23	55.3	19	42.8	23	33.2	33
Market Weighton	36.4	9	52.3	12	25.5	9	43.2	15
North Frodingham	NA		NA		NA		48.3	5
Patrington	22.0	6	32.0	7	46.2	13	39.0	10
Pickering	NA		NA		NA		35.4	12
Pocklington	NA		NA		NA		35.6	8
Scarborough	NA		NA		NA		19.8	21
Selby	NA		38.9	5	33.7	21	28.1	35
South Cave	NA		NA		NA		36.6	8
Snaith	NA		NA		49.0	14	43.9	10
Thirsk	70.0	22	70.0	25	56.8	20	43.3	19
Thorne	44.4	6	28.4	14	27.6	18	24.1	15
MEAN	42.5	14.4	42.4	13.5	40.9	15.8	34.4	15.8
S.D.	15.6	8.3	12.2	8.6	12.3	8.3	10.1	9.5
VAR.	213.1	60.7	137.3	68.1	140.3	65.2	97.4	86.9

NA = Not Available.

DO = Number of Different Occupations.

Table 3.6 Percentage of Entries Relating to Building and Transport/Maritime Trades, 1720-1815

Town	1720-25		1750-55		1780-85		1810-15	
	BUL	MAR	BUL	MAR	BUL	MAR	BUL	MAR
Beverley	11.3	8.4	13.5	6.8	10.4	7.3	10.1	6.6
Bridlington	10.8	41.0	5.1	20.6	NA		14.8	29.2
Easingwold	NA		11.8	0.0	9.8	0.9	6.9	3.6
Driffield	NA		NA		11.7	1.6	14.0	2.2
Hedon	8.1	0.0	9.5	11.9	19.4	6.0	19.0	5.4
Helmsley	NA		NA		6.9	5.2	26.1	0.0
Hornsea	NA		3.1	3.1	NA		14.9	10.6
Howden	NA		NA		13.8	4.6	8.7	5.9
Hunmanby	NA		NA		NA		2.8	2.8
Kilham	NA		11.3	0.0	14.9	0.0	14.3	2.4
Kirkby Moorside	NA		NA		7.5	0.0	20.0	0.9
Malton	20.3	0.5	14.0	7.0	12.7	7.6	20.1	12.5
Market Weighton	6.2	0.0	7.9	0.0	13.9	0.0	7.2	3.6
North Frodingham	NA		NA		NA		3.2	6.4
Patrington	16.0	8.0	11.5	10.3	8.6	15.3	5.8	17.4
Pickering	NA		NA		NA		13.4	1.7
Pocklington	NA		NA		NA		9.5	7.1
Scarborough	NA		NA		NA		9.6	40.6
Selby	NA		11.1	5.6	9.3	29.4	12.4	34.8
Snaith	NA		NA		18.9	9.5	7.8	12.5
South Cave	NA		NA		NA		0.0	3.5
Thirsk	4.0	0.4	8.7	0.5	15.0	2.3	15.5	2.8
Thorne	14.8	18.5	9.8	34.8	8.3	31.7	4.3	49.7
MEAN	11.4	9.6	9.8	8.4	12.1	8.1	11.3	11.4
S.D.	5.4	14.2	3.2	10.3	3.9	10.1	6.4	13.8
VAR.	25.6	177.6	9.5	98.0	14.2	94.4	39.3	182.1

NA = Not Available.

BUL = Building Trades.

MAR = Transport/Maritime Trades

fluctuation reflecting the changing popularity of occupations in a period when town economy was being placed on a new basis[31].

The building trade was of special significance at a time of general population expansion. Numbers engaged in this sector were high in the early part of the century, but declined following the demographic crisis of the second quarter before enjoying renewed prosperity with the onset of demographic expansion after 1770. Inter-urban variation in the character and level of this sector was not particularly marked and thus there were few dominant centres (table 3.6). The most significant centres of building activities were those towns which acted as supply points for the surrounding countryside. In the northwest of the region the towns of Helmsley, Kirkby Moorside and Malton all recorded a large number of masons and also higher percentages of carpenters and joiners, perhaps due to the greater availability of stone and wood for building than farther east and south.

Numbers engaged in maritime and transport trades were on the whole small, although there was a marked increase around the turn of the century as inland ports and inland transport nodes emerged. Widespread transport improvements in the form of harbour schemes, canals and turnpikes had an undoubted effect on town economy; by the start of the nineteenth century almost all of the region's towns had a small number of persons engaged in transport activities of some kind. Towns that emerge with activity levels of more than one standard deviation above the mean value are not surprisingly the coastal ports of Scarborough and Bridlington and the Humber ports of Selby and Thorne (table 3.6).

For the eighteenth century some regional patterns of economic specialisation do emerge but they were subject to much fluctuation. It is evident that the period was one of selective growth and sorting in the regional urban system in which the economic hegemony of certain centres was becoming established. By

the turn of the century three town types are recognisable, the predominantly agricultural towns comprising those centres at the base of the settlement hierarchy, the manufacturing towns of the northwest corner of the region, and the port towns. In the central portion of the region, however, few towns had assumed any clear cut economic direction. The economy of most inland country towns was subject to considerable fluctuation at this time, with different sectors of their economy emerging as dominant at different dates. By the start of the nineteenth century, there is evidence to suggest that more distinct patterns of economic and functional dominance were beginning to emerge.

(b) Central Place Patterns

Although a detailed study of the central place system of the region in the eighteenth century is not possible due to the unavailability of appropriate data sources, the number of different occupations recorded in the parish registers may tell us something about the functional role of towns and about their relative standing within the settlement system. Table 3.7 lists the number of different occupations recorded in each town's registers for each sample date and their regional rank on the basis of this score. Because of the different number of towns with occupational entries for each study date, a simple scheme to indicate a town's relative standing within the regional urban system was devised. The range of towns at each study date were divided into four parts, or quartiles, on the basis of the median so that at any date the number of towns in each quartile were equal. If a town were losing, or conversely gaining, status it would be expected that it might move either up or down a quartile, a stable position would be indicated by no change; table 3.7 tabulates the results.

While this simple measure must be regarded with caution, it does provide some indication of the relative standing of the region's towns during the eighteenth century. The upper and lower

Table 3.7 Number of Different Occupations Recorded in Parish Registers 1720-1815, and Ranks of Towns

Town	Date											
	1720-25			1750-55			1780-85			1810-15		
	D.O	R	Q	D.O	R	Q	D.O	R	Q	D.O	R	Q
Beverley	78	1	I	81	1	I	90	1	I	113	1	I
Bridlington	43	4	II	38	4	II	NA	-	-	64	10	II
Easingwold	NA			32	5	II	33	8	II	49	7	II
G Driffield	NA			NA			37	7	II	57	6	I
Hedon	24	5	III	19	9	III	30	9	III	29	15	III
Helmsley	NA			NA			26	10	III	25	17	III
Hornsea	NA			14	11	IV	7	16	IV	19	21	IV
Howden	NA			NA			38	6	II	49	7	II
Hunmanby	NA			NA			NA			24	18	III
Kilham	NA			15	10	IV	16	15	IV	20	20	IV
K Moorside	NA			NA			22	14	IV	46	9	II
Malton	44	3	II	40	3	I	57	3	I	87	2	II
M Weighton	19	7	IV	23	7	III	25	13	IV	35	12	II
N Frodingham	NA			NA			NA			11	23	IV
Patrington	20	6	III	23	7	III	26	10	III	35	12	III
Pickering	NA			NA			NA			34	14	III
Pocklington	NA			NA			NA			23	19	IV
Selby	NA			13	12	IV	62	2	I	87	2	I
South Cave	NA			NA			NA			18	22	IV
Scarborough	NA			NA			NA			67	4	I
Snaith	NA			NA			26	10	III	28	16	III
Thirsk	46	2	I	41	2	I	46	4	I	42	10	II
Thorne	11	8	IV	32	5	II	40	5	II	41	11	II

D.O. = Number of different occupations

R = Rank

Q = Rank quartile position.

I = First Quartile
II = Second Quartile
III = Third Quartile
IV = Fourth Quartile

ends of the early eighteenth century hierarchy of country towns remained fairly stable; Beverley and Bridlington were consistently found in the first and second quartiles respectively and Hornsea and Kilham in the fourth quartile. Among the main body of country towns, however, changes of position were more common. In the first half of the eighteenth century only minor fluctuations occurred, probably attributable to the demographic crisis affecting many towns at this time. Malton, Thorne and Market Weighton each improved their position, these three towns enjoying demographic expansion at this time. The following thirty year period was also a time of relative stability with only Selby gaining ground. The last quarter of the eighteenth century witnessed a greater degree of change suggesting that this may have been a period of structural transition for many of the region's towns. One town, Thirsk, lost rank while four others, Driffield, Patrington, Market Weighton and Kirkby Moorside gained rank.

The analysis of the total number of occupations recorded in the parish registers is, however, only a crude measure of the strength of towns within the region; more detailed information concerning their functional role in the servicing of the region may be derived from closer analysis of the key service sectors of retailing and professional activity.

It is widely accepted that the essence of urban character is the servicing of the tributary areas and accordingly studies of central place functions and of the central place hierarchy have become a highly developed and specialised field of urban geography[32]. Most of these studies have, however, been conducted for contemporary periods and in Carter's view,

> "There has been a sad lack of the adaptation of these methods for the analysis of historical data and until this is done one could well argue that studies of the dynamic process in the city system are inadequately based"[33].

Although he does recognise that some attempts have been made to

establish hierarchies for past times using trade directories[34], Carter is dismissive of any possibility of adopting such approaches before the turn of the eighteenth century because,

> "there is little that can be used other than the descriptive accounts of travellers or, reverting to population totals, the sorts of figures that can be derived from the hearth tax"[35].

It is suggested here, however, that a limited form of central place analysis can be attempted using data obtained from the parish registers.

The application of hierarchical analysis to the study of the urban system in the nineteenth century poses considerable problems, discussed by Lewis in his study of changes in urban status in the towns of mid-Wales and the middle-Welsh borderland[36]. One of the most frustrating of these is the variable coverage of centres in the available data sources and the increasing complexity that characterised the functional basis of the urban system over time[37]. Nevertheless through the computation of new sets of standardised functional indices for each of the study dates, these problems can arguably be overcome[38].

In common with other studies of the hierarchical ordering of settlements, retailing and professional functions provided the basis for the analysis of changes in the status of eastern Yorkshire towns in the eighteenth century. Due to the limitations of the data source previously discussed[39], information is only available concerning the presence or absence of a particular function and its relative rather than absolute strength. For each town, and at each study date, the number and range of service functions was recorded and a scoring system devised in order that the relative importance of any function within the regional urban system be ascertained. If a service was provided by each centre for which information was available at any particular date, then a value of one was assigned to that service. Conversely if a service was provided by only one of that number

then a score equal to the number of centres in the sample was allocated. Accordingly a range of values fell between these two extremes, with several services being allocated the same score dependant upon the frequency of their provision within the region. The total functional score for each town was calculated, and towns were ranked on the basis of this variable. Although centrality scores, as calculated by Davies and Lewis, conceivably provide a more comprehensive picture of the central place system[40], the absence of information on the actual number of functional units precluded such an approach.

Because of the different numbers of towns in the sample at each of the study dates, the simple scheme employed earlier in the analysis of the total number of different occupations recorded was first applied. The picture that emerges from this analysis (table 3.8) is one of considerable change. At the head of the hierarchy Beverley, Bridlington and Malton retained their regional dominance but among the lower ranked towns there was significant jockeying for position. Thirsk, Patrington, Thorne, Helmsley and Snaith all appear to have lost position while Market Weighton, Selby, Easingwold, and Great Driffield gained ground. At the foot of the hierarchy there is evidence to suggest that the smallest centres such as Kilham and Hornsea proved unable to improve their relative standing. A more comprehensive picture of the changes that were occurring in the settlement system is gained through the calculation of sets of standardised functional indices, tracing towns which appeared at different dates as separate sets through time. Lewis suggests that an acceptable standardized form is achieved by converting the functional indices to percentages[41]. Within the study region six towns could be traced for the whole period, eleven between 1750 and 1810 and fourteen between 1780 and 1815. Functional indices were calculated for each set of towns at each date and converted to percentages of the total possible

Table 3.8 Functional Scores and Ranks - Retailing and Professional Activity, 1720-1815

Town	Date											
	1720-25			1750-55			1780-85			1810-15		
	S	R	Q	S	R	Q	S	R	Q	S	R	Q
Beverley	89	1	I	110	1	I	183	1	I	416	1	I
Thirsk	44	2	I	42	6	II	118	4	I	86	15	III
Bridlington	34	3	II	59	3	I	NA	-	-	185	6	I
Malton	26	4	II	66	2	I	144	2	I	291	2	I
Hedon	20	5	III	57	4	II	96	5	II	131	11	II
Patrington	18	6	III	44	5	II	23	15	IV	36	19	IV
M Weighton	5	7	IV	21	10	IV	49	10	III	91	14	III
Selby	NA			21	10	IV	119	3	I	278	3	I
Thorne	NA			42	6	II	62	8	II	108	13	III
Hornsea	NA			23	9	III	NA			54	18	III
Kilham	NA			1	12	IV	26	14	IV	82	21	IV
Easingwold	NA			37	8	III	62	8	II	150	8	II
Helmsley	NA			NA			35	12	III	37	20	IV
K Moorside	NA			NA			36	11	III	154	7	II
Snaith	NA			NA			34	13	IV	84	16	III
G Driffield	NA			NA			82	7	II	264	4	I
Howden	NA			NA			90	6	II	132	10	II
Hunmanby	NA			NA			NA			61	17	III
N Frodingham	NA			NA			NA			9	23	IV
South Cave	NA			NA			NA			24	22	IV
Pickering	NA			NA			NA			135	9	II
Scarborough	NA			NA			NA			193	5	I
Pocklington	NA			NA			NA			131	11	II

S = Score
R = Rank
Q = Quartile I = First Quartile III = Third Quartile
II = Second Quartile IV = Fourth Quartile

Table 3.9 Standardised Functional Indices of Eastern Yorkshire Towns 1720-1815

(a) 1720-1815 : 6 towns

	1720-25		1750-55		1780-85		1810-15	
				%				
No. of Functional Types	23		21		28		30	
	%	R	%	R	%	R	%	R
Beverley	78.4	1	57.7	1	55.2	1	88.9	1
Malton	40.2	2	34.0	2	44.9	2	60.3	2
Thirsk	22.5	3	16.7	5	35.4	3	16.7	5
Hedon	18.6	4	24.7	3	29.9	4	26.2	3
Market Weighton	4.9	6	11.3	6	14.2	5	21.4	4
Patrington	16.7	5	20.6	4	6.3	6	5.5	6

(b) 1750-1815 : 10 towns

	1750-55		1780-85		1810-15	
		%				
No. of Functional Types	21		29		36	
	%	R	%	R	%	R
Beverley	62.3	1	54.4	1	65.8	1
Malton	37.1	2	46.5	2	44.5	2
Thirsk	24.5	4	34.9	3	12.5	8
Thorne	23.9	5	18.1	6	15.8	6
Hedon	30.5	3	28.8	5	18.8	5
Easingwold	21.5	6	17.2	7	22.4	4
Market Weighton	12.6	7	13.5	8	14.3	7
Patrington	12.6	7	6.0	10	4.4	9
Selby	12.6	7	33.0	4	44.5	2
Kilham	0.6	10	7.0	9	4.0	10

R = Rank.

Table 3.9 (Continued)

(c) 1780-1815 : 14 towns

	1780-85		1810-15	
	%			
No. of Functional Types	29		36	
	%	R	%	R
Beverley	54.4	1	66.3	1
Malton	43.0	2	45.5	2
Thirsk	35.5	3	12.6	11
Thorne	18.6	7	17.1	8
Hedon	25.7	5	20.3	7
Easingwold	17.9	8	23.8	6
Market Weighton	14.3	9	14.4	9
Patrington	6.8	14	5.3	12
Selby	34.8	4	44.1	3
Kilham	7.1	13	4.8	14
Helmsley	9.8	12	5.1	13
Kirkby Moorside	10.7	10	24.0	5
Snaith	10.7	10	12.8	10
Great Driffield	23.1	6	42.2	4

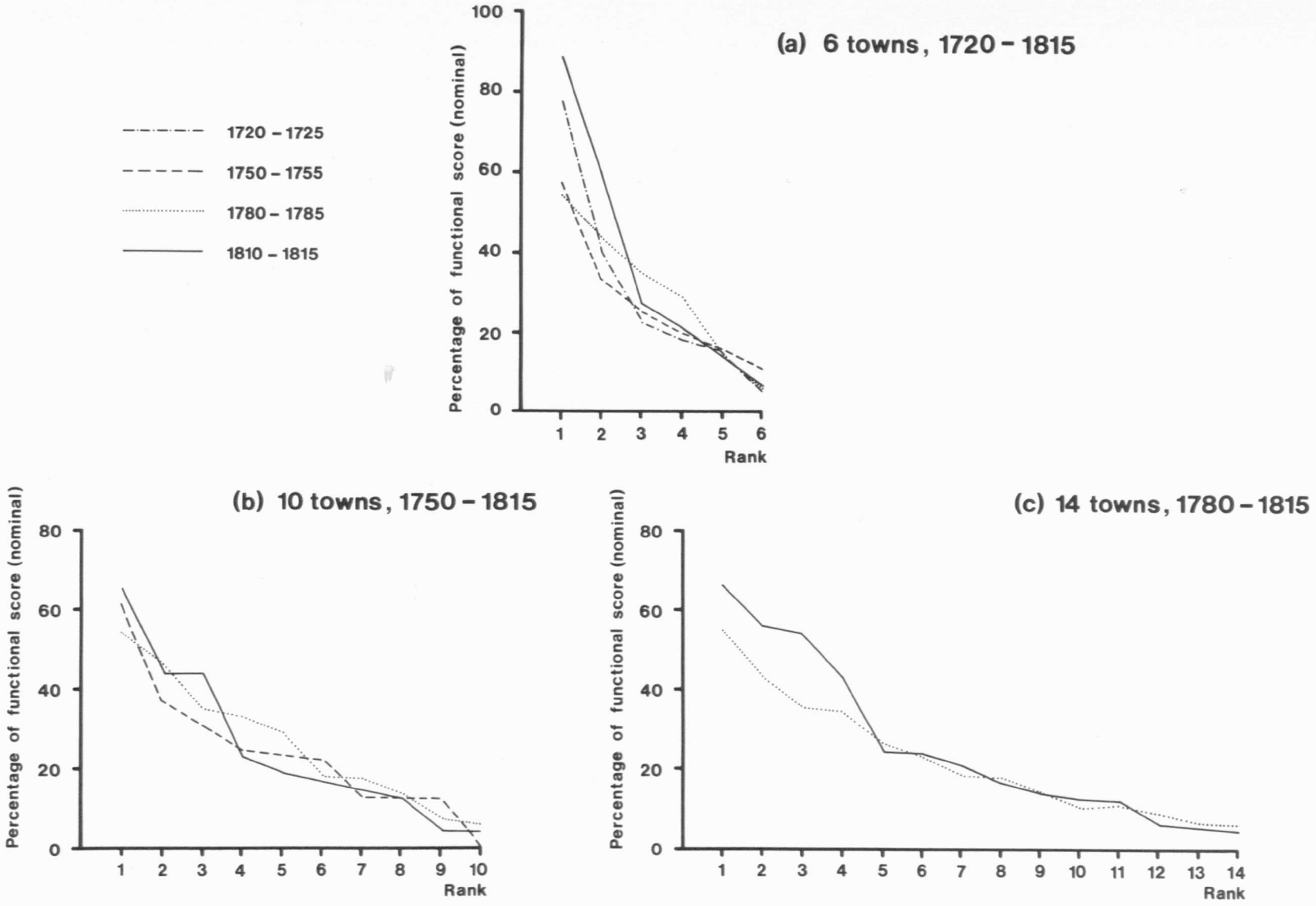


Fig.3.1 Standardised Functional Indices for Eastern Yorkshire Towns, 1720-1815

nominal functional score, utilising the same scoring technique as employed in the analysis for all towns. The results are given in table 3.9. While the results must be treated with a degree of caution due to the variable nature of the data source, they suggest that the eighteenth century, and in particular the period after 1750, was a time of significant changes in the urban system.

Of the towns for which information is available in the eighteenth century, the highest ranked centres, Beverley and Malton, retained their dominance, at the same time increasing their functional status. Contrary to the experience noted by Lewis for the towns of mid-Wales and the middle-Welsh borderland in the nineteenth century[42], there was no measurable widening of status differences over time, but rather a situation in which the servicing of the region appeared to become more equitably shared between the towns as many expanded their functional base, certainly in the period before 1800 (figure 3.1). From the latter date, however, the higher ranked centres appeared to be increasing their functional dominance, although among the lower order centres there was little measurable widening of status differences. This aggregate picture of the hierarchy of servicing among the region's towns does, however, mask several quite significant compositional and structural changes in the functional urban system. As table 3.9 and figure 3.2 demonstrate, for some towns the eighteenth century was a period of increasing functional status within the region, but for others a time of relative stability or decline.

Among the towns of the northwest corner, a process of selectivity appears to have been in operation, Malton and Easingwold strengthening their functional base while Helmsley and Thirsk declined in importance, particularly after 1785. In the southwest, Thorne lost ground to Selby, and in Holderness Patrington and Hedon each saw some reduction in their regional standing after 1755. Within the central area of the region,

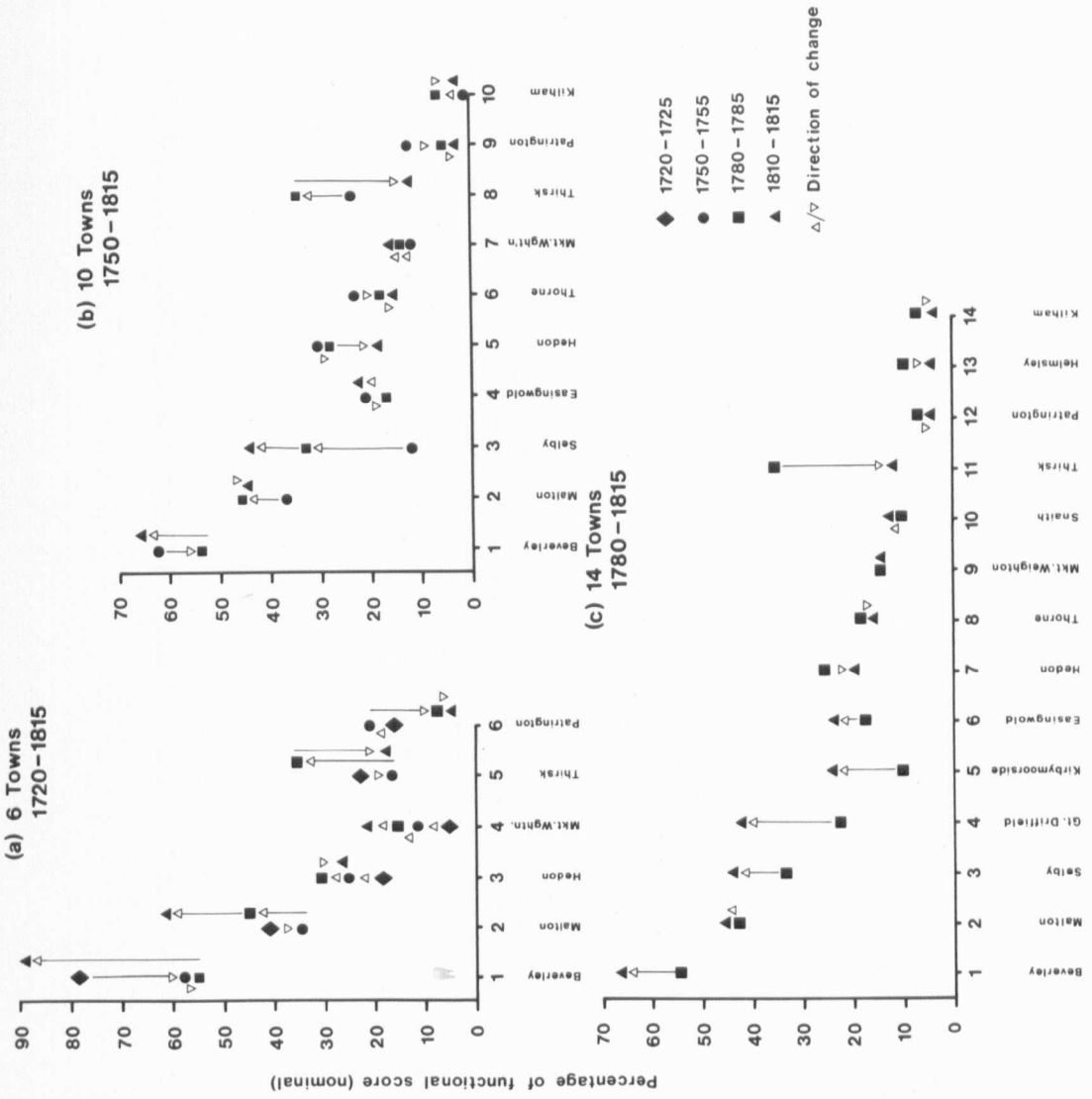


Fig.3.2 Changes in Urban Status, 1720–1815

comprising the Wolds, north Holderness and the eastern portion of the Vale of York, selectivity was also in evidence. While Market Weighton retained a fairly stable functional base after mid-century, Kilham declined to be replaced by Great Driffield which, almost doubling its functional base between 1780 and 1815, emerged as one of the most significant growth centres in the region. It may thus be argued that the eighteenth century, and in particular the second half, saw the initiation of a period of selectivity in which the settlement system of the region, although retaining a balance in its servicing structure, underwent significant development as the importance of individual centres changed.

3. Nineteenth-Century Change, 1790 - 1850

While the central place system (of any region) cannot be adequately investigated for the eighteenth century, for the nineteenth century the task, although difficult, is easier; as demonstrated by Carter and Lewis for Wales and O'Dell for Leicestershire[43]. Employing trade directories, at the simplest level, the system can be investigated on the basis of the broad occupational structure of component towns (providing a degree of continuity to the earlier parish register analysis), while at a higher level the hierarchical structuring of the system and changes in urban status can become the nexus of enquiry. For the study towns, approximately 7% of the total population was represented in the Universal British directory and almost 10% in the two nineteenth century directories used, although for the former, there was considerable inter-urban variation in the comprehensiveness of coverage (Appendix III (b)).

(a) Occupational Structure

The percentage of entries relating to agricultural activities is undoubtedly underestimated, but nevertheless directories do indicate that in most centres the level continued

to fall and only in the smallest towns of Kilham and Hunmanby did it remain high. Two towns which had been predominantly agricultural in the eighteenth century saw some reduction in this level of activity after 1800. Hornsea was quickly gaining status as an east coast resort and South Cave was experiencing some resurgence in its trading functions with the building of a market hall and corn exchange, and with the introduction of a new fair in the 1830's[44]. This picture of falling levels of agricultural employment is substantiated by the census returns (table 3.10). Standardised scores calculated from the census returns between 1801 and 1831 indicate that predominantly agricultural centres, ie. towns with a level of employment of more than one standard deviation above the mean value for all towns, numbered just four; namely Kilham, North Frodingham, South Cave and Hunmanby.

While agricultural employment declined, manufacturing activity registered a small net gain and more importantly increasingly diversified, indicated by the steady rise in the number of different occupations recorded in this sector in the directories (table 3.11). The 'textile towns' of the northwest of the region remained important manufacturing centres, with Hedon and Howden emerging as significant centres for leather working and its associated trades. Large scale manufacturing among the region's towns was, however, largely absent. The 1831 census returns indicate that the total number of males over the age of twenty employed in manufacturing or the making of manufacturing machinery, was very small; the highest recorded percentage being 3.3% for Selby.

Retail trades occupied a similar percentage of the work force to manufacturing, averaging approximately one-third of economic activity according to the directories[45]. Increasing diversity also characterised this sector of town economy, the mean number of recorded occupations rising from 8.7 to 18.0 between 1791 and

Table 3.10 Percentage of Population Engaged in Agricultural Activities, 1801-1831

Town	1801[1]	1811[2]	1821[2]	1831[3]
Beverley	2.2	7.5	11.2	11.4
Bridlington	7.1	36.9	20.9	21.4
Easingwold	11.6	34.8	33.8	34.3
Driffield	10.3	29.5	29.1	21.9
Hedon	5.9	17.3	15.1	8.5
Helmsley	8.9	24.0	8.7	42.1
Hornsea	18.4	40.8	39.6	39.0
Howden	3.8	28.4	26.4	26.2
Hunmanby	21.9	69.6	55.2	56.5
Kilham	26.5	63.5	68.2	51.5
Kirkby Moorside	43.2	20.2	37.5	34.2
Malton	14.7	64.1	9.2	11.9
Market Weighton	15.5	17.9	36.3	43.2
North Frodingham	21.1	67.5	70.4	68.3
Patrington	24.2	55.4	36.4	47.9
Pickering	21.7	20.4	31.4	50.8
Pocklington	10.7	38.9	29.6	25.8
Scarborough	1.4	4.2	2.2	5.2
Selby	4.3	22.7	23.8	30.1
Snaith	2.3	21.6	25.3	28.2
South Cave	12.7	65.5	64.4	68.3
Thirsk	6.9	22.2	31.6	18.3
Thorne	33.4	30.4	27.7	29.2
MEAN	14.3	34.9	31.9	33.6
SD	10.7	19.9	18.4	17.9
VAR	110.3	381.0	324.8	306.5

1 % of all population

2 % of families

3 % of males over 20

Table 3.11 Percentage of Entries Relating to Manufacturing Activities, 1791-1849

Town	1791		1823		1849	
	%	D.O	%	D.O	%	D.)
Beverley	30.2	28	31.3	38	30.7	49
Bridlington	49.6	30	25.7	35	22.1	29
Easingwold	54.3	24	27.3	24	28.8	20
Driffield	31.5	18	33.5	30	35.0	25
Hedon	8.1	3	26.5	13	22.2	16
Helmsley	42.3	7	39.1	18	39.6	21
Hornsea	NA		21.8	8	35.6	12
Howden	29.3	15	37.4	28	31.4	28
Hunmanby	34.8	12	20.2	8	41.1	11
Kilham	18.5	9	23.5	7	40.6	10
Kirkby Moorside	40.3	12	34.7	18	47.6	24
Malton	NA		30.5	35	36.5	39
Market Weighton	31.6	23	29.9	19	32.4	21
North Frodingham	NA		23.5	7	NA	
Patrington	35.5	12	31.4	11	34.8	12
Pickering	14.3	6	32.4	27	36.7	26
Pocklington	26.2	24	29.5	31	32.2	25
Scarborough	19.8	20	19.5	44	17.3	36
Selby	20.0	7	40.7	45	28.1	35
Snaith	33.8	15	33.7	21	28.8	17
South Cave	NA		28.4	11	34.8	9
Thirsk	37.6	26	39.7	41	33.9	29
Thorne	18.5	5	34.5	25	30.8	20
MEAN	30.3	15.6	30.2	23.6	32.3	23.4
SD	11.9	8.4	6.1	12.3	6.9	10.3
VAR	135.2	67.6	35.7	144.8	46.2	100.9

DO = Number of Different Occupations.

Table 3.12 Percentage of Directory Entries Relating to Retail/Wholesale Trades, 1791-1849

Town	1791		1823		1849	
	%	D.O	%	D.O	%	D.O
Beverley	33.5	22	36.7	30	28.4	33
Bridlington	49.6	27	43.1	23	47.8	22
Easingwold	21.2	12	23.4	13	32.7	16
Great Driffield	35.8	16	28.7	17	33.1	18
Hedon	45.9	5	28.3	12	31.3	15
Helmsley	30.7	8	32.6	10	25.1	13
Hornsea	NA		21.8	5	42.1	6
Howden	34.6	17	37.9	24	35.1	25
Hunmanby	15.9	4	21.2	10	26.0	6
Kilham	7.4	3	16.5	7	21.7	7
Kirkby Moorside	4.7	2	33.0	11	26.2	17
Malton	NA		45.6	19	34.7	27
Market Weighton	27.2	20	32.2	13	30.9	16
North Frodingham	NA		17.6	4	NA	
Patrington	40.0	10	20.0	9	40.9	14
Pickering	4.7	2	23.6	12	26.8	17
Pocklington	34.1	15	34.8	20	34.1	21
Scarborough	44.0	21	40.5	35	45.5	35
Selby	35.5	5	38.7	25	39.3	30
Snaith	32.3	15	27.5	15	33.6	15
South Cave	NA		27.0	9	37.7	9
Thirsk	31.2	10	36.6	22	32.9	18
Thorne	33.3	5	36.3	28	23.5	17
MEAN	29.5	11.5	30.6	16.2	33.2	18
SD	13.2	7.6	8.3	8.4	7.0	8.1
VAR	165.1	54.8	65.7	67.3	47.0	62.4

DO = Number of Different Occupations.

1849 (table 3.12). Within the country as a whole, inland and coastal resorts enjoyed unprecendented expansion in the early nineteenth century and eastern Yorkshire, like most other coastal regions, participated in this boom. By virtue of their developing function as resorts - marked by the appearance of hotels and boarding houses - Bridlington, Scarborough and Hornsea came in certain respects to be important retail centres within the regional urban system. Compared with other economic sectors, in terms of the number of people engaged, retail and wholesale activities were subject to relatively little regional imbalance for if standardised scores are calculated, the resorts apart, only Malton in 1823 and the south Holderness town of Patrington in 1849 had levels of activity significantly higher than the mean.

Professional services, although revealing a pattern of high inter-urban variation at the close of the eighteenth century, appeared by the mid-nineteenth century to have reached a degree of equilibrium in terms of percentage of the workforce listed as being of professional status, indicated by the small standard deviation (table 3.13). Of the study towns, only Pickering, Thorne and Snaith recorded levels of more than one standard deviation above the mean value for two or more directories, while information from the 1831 census returns suggests that Easingwold, Hedon and Hornsea should be added to this list. More important than the total number engaged in, or belonging to, this sector of town economy was its degree of diversification, and in this respect levels of inter-urban variation were high. If the study towns are analysed in respect of their providing a number of services greater than one standard deviation above the mean value, then quite different towns emerge as dominant; namely the larger centres of Beverley, Scarborough and Malton.

The trade directories give very little indication of the extent of maritime or transport activities within the region's

Table 3.13 Percentage of Entries Relating to Professional Activities, 1791-1849

Town	1791		1823		1849	
	%	D.O	%	D.O	%	D.O
Beverley	15.9	9	18.4	19	26.5	20
Bridlington	15.0	6	16.4	10	19.9	16
Easingwold	11.8	8	18.2	9	27.3	13
Driffield	20.6	5	18.9	14	20.5	10
Hedon	24.3	9	25.7	9	22.9	11
Halmsley	7.7	4	13.0	8	18.2	9
Hornsea	NA		23.1	6	21.0	6
Howden	18.0	7	15.1	13	20.5	14
Hunmanby	10.1	5	10.1	4	15.1	6
Kilham	25.9	3	18.8	5	20.3	5
Kirkby Moorside	12.5	6	19.8	10	18.9	10
Malton	NA		16.0	14	19.4	18
Market Weighton	17.7	7	14.7	8	19.3	12
North Frodingham	NA		7.8	4	NA	
Patrington	13.3	5	14.3	7	13.0	10
Pickering	61.9	8	18.5	15	26.1	12
Pocklington	15.8	7	17.6	9	19.9	14
Scarborough	14.5	11	13.4	15	20.9	19
Selby	44.4	8	12.9	11	18.9	15
Snaith	17.6	6	23.5	8	28.0	11
South Cave	NA		16.2	6	23.2	8
Thirsk	23.6	8	14.6	14	20.1	14
Thorne	37.0	5	17.9	10	29.2	18
MEAN	21.4	6.7	16.7	9.9	21.3	12.3
SD	13.3	2.0	4.1	3.9	4.0	4.3
VAR	167.8	3.7	16.4	14.9	15.6	17.3

DO = Number of Different Occupations.

Table 3.14 Percentage of Entries Relating to Building and Maritime Trades, 1791-1849

Town	% 1791		% 1823		% 1849	
	BUL	MAR	BUL	MAR	BUL	MAR
Beverley	11.8	2.0	6.1	0.2	6.3	1.1
Bridlington	4.1	0.0	4.2	3.5	6.9	1.4
Easingwold	10.2	0.8	6.9	0.4	6.8	1.5
Driffield	6.5	4.3	7.5	2.6	9.4	0.0
Hedon	0.0	0.0	13.3	0.0	10.1	0.0
Helmsley	3.8	0.0	7.6	0.0	12.6	1.9
Hornsea	NA		9.0	0.0	9.0	0.0
Howden	6.7	0.7	6.4	0.0	8.1	1.6
Hunmanby	4.3	0.0	9.1	0.0	17.8	0.0
Kilham	9.8	0.0	12.9	0.0	17.4	0.0
Kirkby Moorside	12.5	0.0	5.8	0.0	5.6	0.4
Malton	NA		5.5	0.0	4.5	0.8
Market Weighton	0.6	0.0	7.3	0.0	12.6	0.5
North Frodingham	NA		5.9	0.0	NA	
Patrington	8.8	0.0	8.6	0.9	9.6	0.0
Pickering	0.0	0.0	10.9	0.4	5.1	2.7
Pocklington	6.3	0.8	7.0	0.4	10.3	1.6
Scarborough	5.3	12.6	4.8	14.0	5.0	9.2
Selby	0.0	0.0	6.3	0.0	5.6	6.5
Snaith	4.4	1.5	10.2	4.1	7.2	1.6
South Cave	NA		4.0	0.0	4.3	0.0
Thirsk	5.4	2.1	2.5	0.3	6.3	1.3
Thorne	0.0	0.0	8.3	0.6	8.8	5.0
MEAN	5.3	1.3	7.4	1 .2	8.6	1.7
SD	4.0	3.0	2.7	3.0	3.8	2.3
VAR	15.5	8.3	7.0	8.8	13.6	5.3

towns for, except in their listing of carrier and coach services, only scant mention is made of these activities. Building trades, the last general economic sector to be considered, are, however, better documented and indicate that over the period 1790 to 1850 the percentage of entries relating to building activities rose from 5% to almost 9% (table 3.14). While, as demonstrated by the parish registers, towns is the northwest of the region still dominated this sector, there was considerable intra and inter-urban variation, both temporally and spatially, reflecting in a large measure demographic and social change within the towns. The importance of building trades in Beverley at the close of the eighteenth century may reflect the considerable programme of urban improvement then taking place in that town[46]; its significance in the smaller centres of Kilham and Hunmanby toward mid-century is probably attributable to the high rates of population growth experienced by these towns following a preceding period of stagnation and decline[47].

As conducted for the earlier parish register analysis, the total number of different occupations recorded in the directories may be employed to give some indication of the standing of towns within the regional urban system. Table 3.15 gives the results of this analysis for the three study dates. During the first three-quarters of the eighteenth century few towns had improved or lost status within the settlement system, but the last quarter of that century and the first half of the nineteenth century witnessed a far more fluid situation. The smallest centres, those with a predominantly agricultural economic base, were unable to improve their relative standing and consistently remained in the lowest quartile. Several centres which were demographically stable, or subject to only low rates of population growth, such as Kirkby Moorside, Patrington and Helmsley, also retained a consistent position. For some towns the period was one of

Table 3.15 Number of Different Occupations Recorded in Directories 1791-1849, and Rank of Towns

Town	Date								
	1791			1823			1849		
	D.O	R	Q	D.O	R	Q	D.O	R	Q
Beverley	79	1	I	108	2	I	126	1	I
Bridlington	71	2	I	88	4	I	81	6	I
Easingwold	54	5	II	57	12	II	58	13	III
Great Driffield	45	8	II	78	6	I	94	5	I
Hedon	13	19	IV	45	15	III	50	16	III
Helmsley	20	15	III	41	17	III	51	15	III
Hornsea	NA			26	22	IV	30	19	IV
Howden	45	8	II	73	9	II	80	7	II
Hunmanby	24	14	III	31	19	IV	27	21	IV
Kilham	27	13	III	27	21	IV	25	22	IV
Kirkby Moorside	32	11	III	45	15	III	57	14	III
Malton	NA			77	7	II	102	3	I
Market Weighton	60	4	I	47	14	III	60	12	II
North Frodingham	NA			19	23	IV	NA		
Patrington	31	12	III	41	18	III	41	18	III
Pickering	17	18	IV	68	11	II	64	11	II
Pocklington	51	6	II	70	10	II	72	9	II
Selby	20	16	IV	88	4	I	95	4	I
Scarborough	68	3	I	124	1	I	120	2	I
South Cave	NA			30	20	IV	28	20	IV
Snaith	44	10	III	50	13	III	48	17	III
Thirsk	49	7	II	90	3	I	78	8	II
Thorne	18	17	IV	74	8	II	67	10	II

D.O. = Number of different occupations

R = Rank

Q = Rank quartile.

I = First Quartile
II = Second Quartile
III = Third Quartile
IV = Fourth Quartile

continued economic growth, Driffield, Selby, Thorne, Malton and Pickering each improving their relative standing; while others, notably Market Weighton, Thirsk and Easingwold, experienced fluctuating fortunes. At the head of the system the dominance of the largest centres remained unchallenged. As discussed for the parish register analysis, this is, however, only a crude measure of the relative standing of towns, and only detailed investigation of the service sectors of town economy indicates and measures the true nature of the urban system.

(b) Measuring Urban Status

Many of the constraints imposed on measurements of functional importance and centrality by the limited information content of the parish registers are removed in analyses based on directory information. As stated earlier, directories have now become an accepted source for the study of the central place system in past time periods and have given rise to accepted methodological approaches utilising these sources[48]. In common with other studies, and with the preceding parish register analysis, investigation of the hierarchical structuring of the urban system in eastern Yorkshire is based on an analysis of retail and professional service provision. Thirty-nine functions were considered for retail and wholesale trades and twenty-eight for professional activity totalling sixty-seven in all (Appendix III (c)). North Frodingham was omitted from this part of the analysis as it had entries in only one of the three directories used, leaving twenty-two country towns.

It is widely accepted that there are three levels at which services may be analysed, viz, establishments, functions and functional units[49], although in practice, as shown in table 3.16, the former and latter could approximate very closely in number. In the analysis, it was decided to use the number of functional units as the basis for the investigation of the level of service

Table 3.16 (a) Retailing in Eastern Yorkshire Towns, 1791-1849

Town	1791			1823			1849		
	E	F	FU	E	F	FU	E	F	FU
Beverley	82	17	82	205	30	223	248	33	269
Bridlington	76	20	98	236	25	275	283	22	302
Easingwold	27	9	28	54	14	60	67	16	67
Driffield	33	16	44	88	19	114	159	20	161
Hedon	17	4	17	32	15	40	37	17	48
Helmsley	8	6	9	30	9	35	40	13	45
Hornsea	-	-	-	17	6	24	56	7	63
Howden	46	12	54	83	22	90	113	25	122
Hunmanby	11	4	11	21	10	21	19	8	26
Kilham	6	3	6	14	6	17	15	7	23
Kirkby Moorside	23	10	32	40	10	46	61	16	64
Malton	-	-	-	157	20	190	209	28	237
Market Weighton	43	17	43	57	13	72	64	18	79
Patrington	18	10	19	21	8	31	47	12	61
Pickering	2	3	3	65	12	72	78	20	89
Pocklington	43	12	44	85	19	98	106	24	120
Scarborough	91	22	94	354	31	374	649	34	670
Selby	16	5	16	117	20	117	204	30	227
Snaith	22	12	22	27	16	39	42	16	51
South Cave	-	-	-	20	9	21	26	10	29
Thirsk	29	8	36	130	20	147	126	18	136
Thorne	9	4	8	61	23	78	61	17	72

E - Establishments

F - Functions

FU - Functional Units

Table 3.16 (b) Professional Services in Eastern Yorkshire Towns, 1791-1849

Town	1791			1823			1849		
	E	F	FU	E	F	FU	E	F	FU
Beverley	39	5	15	103	16	69	231	17	81
Bridlington	29	5	11	90	8	44	118	14	55
Easingwold	15	4	8	42	7	17	56	11	22
G. Driffield	19	4	12	58	11	33	80	15	59
Hedon	9	2	5	29	6	13	27	10	20
Helmsley	6	2	4	12	5	9	29	7	19
Hornsea	-	-	-	18	3	5	28	4	9
Howden	24	6	16	33	11	24	66	12	37
Hunmanby	7	6	4	10	2	2	11	4	7
Kilham	21	1	1	16	2	3	14	3	7
Kirkby Moorside	9	7	11	24	8	12	44	8	21
Malton	-	-	-	55	11	36	117	16	59
Market Weighton	28	4	7	26	6	15	40	10	22
Patrington	6	3	4	15	4	8	15	8	11
Pickering	26	5	8	51	12	29	76	9	32
Pocklington	20	4	9	43	7	22	62	17	41
Scarborough	30	8	19	117	12	62	299	12	103
Selby	20	5	8	39	8	23	98	12	49
Snaith	12	4	4	23	6	10	35	9	18
South Cave	-	-	-	12	4	7	16	6	13
Thirsk	22	6	12	52	9	36	77	15	43
Thorne	10	3	6	30	7	15	76	12	40

E - Establishments

F - Functions

FU - Functional Units

provision in the region's towns. A similar scoring scheme was used to that employed in the parish register analysis assigning a score of one to a function performed by all the study towns and conversely a score of twenty-two to a function performed by only one of the centres. For the eighteenth century analysis it was only possible to calculate nominal scores because the precise number of functional units was not known; for the nineteenth century data it was possible, however, to calculate the scores on an aggregate basis as well. Nominal scores reflect only the presence or absence of a particular service in any town, while aggregate scores measure the strength of that provision. The region's towns were ranked on the basis of both nominal and aggregate scores for each of the directory study dates and a Spearmans rank correlation applied to test for any significant difference. All the correlations proved highly positive indicating no significant difference between the total rank of towns on nominal as opposed to aggregate scores, accordingly the analysis proceeded using the latter.

(c) Changes in Urban Status 1791 - 1849

(i) Aggregate Changes. The study towns were ranked according to their aggregate retail and professional scores and also on the combined scores; the results are shown in table 3.17. The last quarter of the eighteenth and first half of the nineteenth century saw greater fluidity in the central place structure of the region than had the preceding period. Fluctuation in the status levels of the region's towns was greatest around the turn of the century clearly reflecting the period of demographic growth for many of these centres. Comparing retailing and professional services there appeared to be a higher level of fluctuation in the status of towns in respect of the latter. Important growth centres for professional services emerge as Driffield, Bridlington, Thorne and Hedon and declining centres

Table 3.17 (a) Aggregate Retailing Scores and Rank of Eastern Yorkshire Towns, 1791-1849

Town	Date					
	1791		1823		1849	
	Score	Rank	Score	Rank	Score	Rank
Bridlington	702	1	1455	3	1033	5
Scarborough	639	2	1909	1	2858	1
Beverley	466	3	1565	2	1970	2
Malton	NA	4*	1297	4	1496	4
Driffield	322	5	807	6	864	6
Howden	311	6	505	8	782	7
Pocklington	281	7	701	7	719	8
Market Weighton	264	8	337	11	407	11
Kirkby Moorside	153	9	167	17	288	14
Easingwold	141	10	268	13	221	16
Snaith	139	11	173	15	202	17
Hedon	135	12	195	14	230	15
Patrington	129	13	126	18	369	12
Thirsk	127	14	838	5	630	9
Selby	72	15	479	9	1567	3
Helmsley	65	16	170	16	194	18
Kilham	56	17	36	22	73	21
Hunmanby	50	18	91	20	84	20
Thorne	36	19	417	10	338	13
Pickering	17	20	305	12	471	10
Hornsea	NA	21*	40	21	57	22
South Cave	NA	22*	93	19	97	19

* = estimated.

Table 3.17 (b) Aggregate Professional Scores and Rank of Eastern Yorkshire Towns, 1791-1849

Town	Date					
	1791		1823		1849	
	Score	Rank	Score	Rank	Score	Rank
Scarborough	180	1	465	2	733	1
Howden	180	2	197	7	169	10
Beverley	135	3	664	1	477	2
Malton	NA	4*	286	3	353	4
Thirsk	112	5	244	5	190	8
Driffield	100	6	247	4	890	3
Kirkby Moorside	95	7	102	11	81	16
Market Weighton	84	8	72	14	116	14
Pocklington	76	9	110	10	180	9
Selby	73	10	146	9	257	7
Easingwold	65	11	97	12	125	12
Pickering	65	12	179	8	117	13
Bridlington	50	13	241	6	297	5
Hunmanby	50	14	2	22	16	21
Thorne	37	15	91	13	278	6
Snaith	35	16	50	17	99	15
Helmsley	34	17	55	15	79	17
Patrington	34	18	34	18	63	18
Hedon	26	19	54	16	131	11
Kilham	11	20	3	21	14	22
Hornsea	NA	21*	11	20	23	20
South Cave	NA	22*	29	19	58	19

* = estimated.

Table 3.17 (c) Combined Retailing and Professional Scores and Rank of Eastern Yorkshire Towns, 1791-1849

Town	Date					
	1791		1823		1849	
	Score	Rank	Score	Rank	Score	Rank
Scarborough	819	1	2374	1	3592	1
Bridlington	752	2	1696	3	1330	5
Beverley	601	3	2229	2	2447	2
Malton	NA	4*	1583	4	1849	3
Howden	461	5	702	8	951	7
Great Driffield	422	6	1054	6	1254	6
Pocklington	357	7	811	7	899	8
Market Weighton	348	8	409	12	523	11
Kirkby Moorside	248	9	209	14	369	14
Thirsk	239	10	1082	5	820	9
Easingwold	206	11	365	13	346	16
Snaith	174	12	223	17	301	17
Patrington	163	13	160	18	432	13
Hedon	161	14	249	15	361	15
Selby	145	15	625	9	1824	4
Hunmanby	100	16	93	20	100	20
Helmsley	99	17	225	16	273	18
Pickering	82	18	484	11	488	12
Thorne	73	19	508	10	616	10
Kilham	67	20	39	22	87	21
Hornsea	NA	21*	51	21	80	22
South Cave	NA	22*	122	19	155	19

* = estimated.

Thirsk, Kirkby Moorside and Howden. For retail activities the growth centres can be identified as Selby, Pickering and Thorne, while no town experienced marked decline in its relative retail standing within the region; although Bridlington, Snaith and Kilham all lost some ground. In respect of both scores (table 3.17(c)) some similar patterns emerge. The smallest centres of Kilham, Hornsea and South Cave retained their eighteenth-century position at the base of the hierarchy, and the larger centres of Scarborough, Beverley and Malton their dominance. Not unexpectedly, it was among the middle-order centres that the most significant changes in rank position occurred. Selby, ranked only fifteenth in 1791, rose to become the fourth centre by mid-century, while its neighbour Thorne increased its rank from nineteen to ten. Other towns lost rank, Kirkby Moorside, for example, fell from nine to fourteen and Easingwold from eleven to sixteen; the remainder experienced less marked alterations in their overall position. The picture that emerges from this analysis is one of considerable complexity with no clear cut spatial patterning. The main observation that can be made is that the growth centres tended to predominate on the periphery of the region particularly around the Humber, while towns enjoying mixed fortunes tended to occupy a more central location.

Rank-size analysis does, however, have some severe limitations as outlined previously with regard to changing demographic fortunes: it is axiomatic that middle-order ranks will fluctuate most for only they have equal opportunity to move either up or down the hierarchy. In relative terms the movement or fluctuation may appear greater than is the case in absolute terms as the figures in table 3.17 indicate; quite often differences in the functional indices of towns were of very small magnitude. The conversion of these indices to percentages eradicates this problem, enabling comparisons to be made between both towns and study

dates and analysis of the changing contribution made by centres to the servicing of the region to be undertaken. Lorenz curves are one of the best indicators of the sharing of servicing by the region's towns[50], and were constructed for retail and professional indices and for a combination of the two (figure 3.3). Not unexpectedly, the larger of the country towns contributed the greatest amount to the servicing of the region: if servicing were shared equally between all towns then a straight line relationship would result. In terms of their functional indices then, the contribution of towns in their rank position to the total servicing of the region changed relatively little over the sixty year period, the greatest change being shown in respect of professional activities. But while the aggregate level (ie. the contribution of individual rank positions) did not change markedly, the experience of individual centres and their status did. Figure 3.4 plots the changes in status levels of individual towns ranked in their 1849 positions over the three study dates.

As can be seen, there was measurable alteration in status differences over the course of the study period, widening occurring particularly among the higher order centres. Many of the lower ranked centres lost status particularly in the period between 1791 and 1823[51], although some, such as Snaith, Kirkby Moorside, and Hedon, experienced a slight increase in their contribution to the servicing of the region in the following quarter century. The most marked changes occur in Selby and Bridlington, the former increasing its relative contribution from 2.6% to 9.5% and the latter suffering a loss of contribution of the order of 6.5%. In contrast to the situation found by Lewis in Wales, there was not, in eastern Yorkshire, an ongoing process of widening of status differences over time. Status differences were clearly greatest at the close of the eighteenth century with the following half-century witnessing a process whereby greater

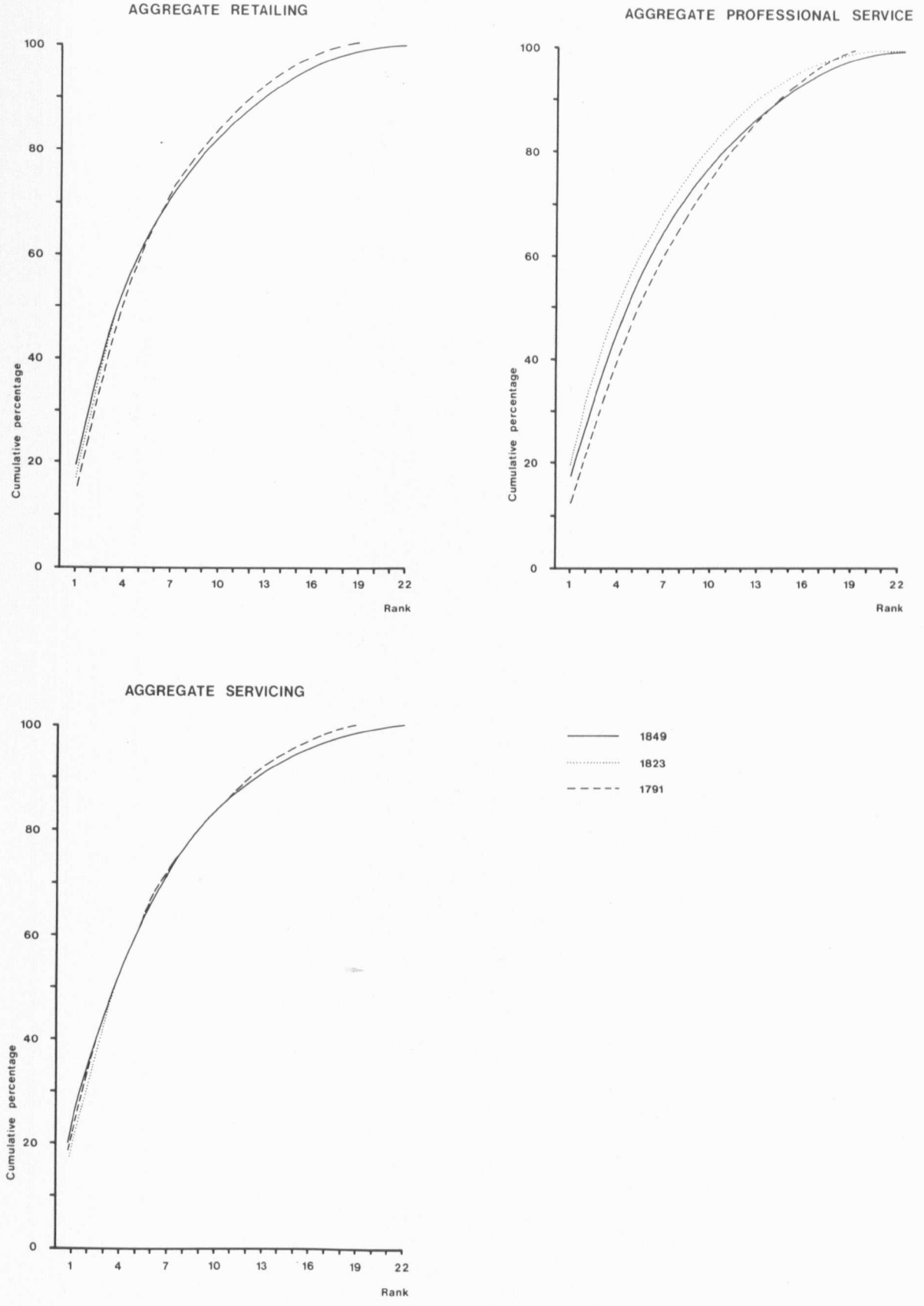


Fig.3.3 Lorenz Curves of Aggregate Servicing among Eastern Yorkshire Towns, 1791-1849

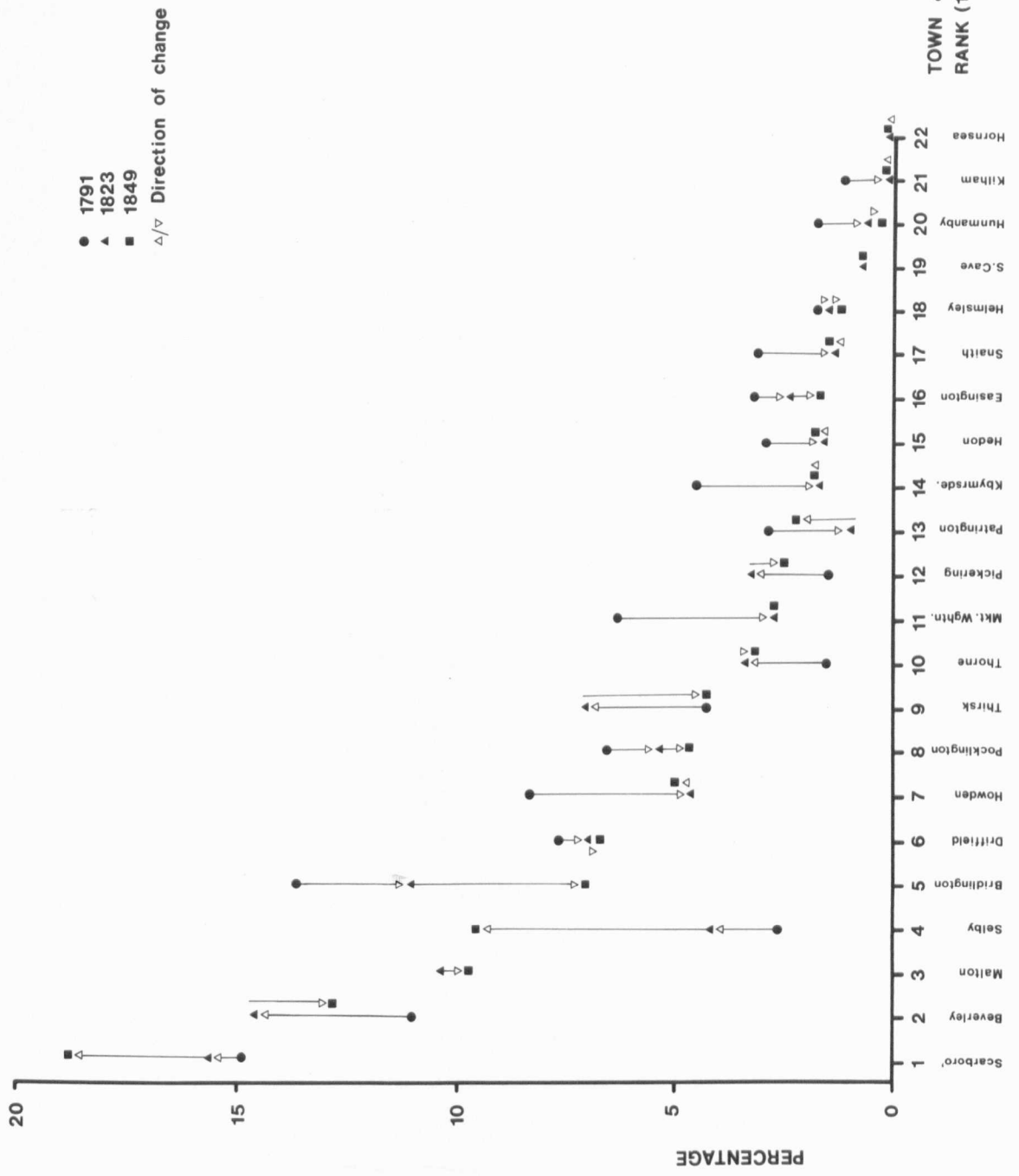


Fig.3.4 Changes in Urban Status - Aggregate Functional Scores, 1791-1849

equilibrium characterised the servicing of the region. Over time the hierarchy of service centres in eastern Yorkshire arguably became less well defined, indicating that a greater degree of complexity came to characterise the regional urban system, distinct breaks in the hierarchy becoming less discernable.

(ii) Centrality Changes. While the calculation of functional scores or indices can tell us a good deal about the servicing of the region, it does not provide a measure of that concept upon which central place theory is based, that of centrality. Numerous studies have measured this concept using variables such as newspaper circulation, branch firm dominance and banking, as demonstrated by Preston in his study of the Pacific South West[52], or employing retail sales or consumer surveys, adopted by Abiodun and Rowley in their studies of Nigeria and Wales respectively[53]. In a historical context, much of this information is not available and the application of sophisticated multivariate statistical techniques, although demonstrated by Caroe to have some applicability for studies of past periods[54], pose severe restraints especially if the study seeks to analyse the urban system for more than one study date[55]. A simple but effective measure which may be usefully employed, however, is the centrality index devised by Davies and subsequently used by Davies and Lewis in their studies of the towns of Wales. The centrality index is given by the formula :

$$C = \frac{t}{T} \times 100$$

In this, C is the location coefficient of function t, t is one outlet of function t, and T is the total number of outlets of function t in the whole system. If the number of outlets of each functional type are multiplied by C then a centrality score for each settlement with regard to a particular function is obtained, while the summation of all the centrality coefficients gives a

total centrality score for any centre[56]. Centrality scores were calculated in respect of both professional and retail activity, the resulting totals are given in table 3.18.

The calculation of centrality scores demonstrates clearly that some towns dominated retailing within the region and others professional servicing. In respect of the latter Beverley, Scarborough and Selby were consistently the most important centres along with Malton. The early dominance of Howden, Thirsk and Kirkby Moorside declined after the turn of the century to be overtaken in some measure by Driffield and Bridlington. Retailing was again dominated by the regional centres of Beverley and Scarborough, with Bridlington and Malton playing a strong supportive role. Market Weighton and Snaith, important retail centres at the close of the eighteenth century, subsequently lost ground to be replaced by Selby and Thorne. Combining the scores, the picture that emerges is similar (table 3.18(c)); Scarborough and Beverley, not surprisingly, were the dominant centres throughout the study period while Kilham, South Cave and Hornsea retained their place at the foot of the hierarchy. Growth centres emerge as Selby, Driffield and Thorne, with Bridlington, Market Weighton and Helmsley all losing ground. In the light of these observations the question arises as to the extent to which the balance in the servicing of the region changed over time and to what extent restructuring occurred within the existing urban system.

In common with the preceding analysis of functional scores, Lorenz curves were constructed of centrality values for retailing and professional activity and for the combined scores (figure 3.5). In relation to retailing it is evident that the first quarter of the nineteenth century saw an alteration in the servicing of the region; the less steep slope of the Lorenz curve suggests that a greater degree of equilibrium was established among the region's

Table 3.18 (a) Centrality Scores and Ranks - Retailing

Town	Date					
	1791		1823		1849	
	Score	Rank	Score	Rank	Score	Rank
Scarborough	486.8	1	621.9	1	786.1	1
Bridlington	462.3	2	358.3	3	197.0	6
Great Driffield	254.0	3	128.6	9	161.1	8
Market Weighton	213.0	4	94.1	11	82.8	14
Beverley	172.7	5	453.9	2	490.2	2
Malton	NA	6*	251.8	5	364.5	3
Pocklington	133.5	7	138.4	8	153.6	9
Howden	126.2	8	138.9	7	283.2	5
Snaith	104.9	9	47.4	16	102.7	12
Kirkby Moorside	71.5	10	32.0	17	53.8	16
Thirsk	61.1	11	261.8	4	119.6	11
Easingwold	57.8	12	74.5	13	54.9	15
Helsmley	54.5	13	27.9	19	44.2	18
Patrington	50.1	14	75.3	12	88.5	13
Hedon	46.6	15	70.7	14	49.3	17
Selby	30.0	16	139.1	6	358.9	4
Thorne	27.5	17	121.3	10	168.7	7
Kilham	16.7	18	13.4	22	11.5	22
Hunmanby	14.1	19	26.5	20	23.8	19
Pickering	9.5	20	56.0	15	142.5	10
South Cave	NA	21*	28.9	18	18.7	20
Hornsea	NA	22*	14.3	21	15.6	21

* = estimated.

Table 3.18 (b) Centrality Scores and Ranks - Professional Services

Town	Date					
	1791		1823		1849	
	Score	Rank	Score	Rank	Score	Rank
Beverley	179.3	1	570.4	1	276.4	2
Scarborough	162.3	2	209.3	2	440.5	1
Howden	94	3	110.9	5	95.7	11
Selby	88.6	4	69.4	10	251.8	3
Thirsk	86.3	5	92.8	6	92.8	12
Malton	NA	6*	170.4	3	186.6	6
Kirkby Moorside	81.9	7	64.6	12	56.7	15
Market Weighton	70.1	8	32.5	17	149.6	8
Easingwood	57.1	9	43.3	15.5	111.8	9
Pocklington	52.9	10	79.8	9	102.0	10
Great Driffield	40.7	11	119.4	4	245.8	4
Pickering	38.6	12	80.9	8	50.9	16
Bridlington	37.2	13	84.2	7	190.2	5
Hunmanby	24.9	14	2.0	22	8.4	21
Patrington	24.8	15	43.3	15.5	36.6	18
Thorne	17.9	16	61.5	13	149.8	7
Snaith	15.2	17	47.8	14	90.0	13
Helmsley	13.8	18	68.2	11	44.5	17
Hedon	12.0	19	25.7	18	62.1	14
Kilham	5.9	20	3.2	21	7.6	22
South Cave	NA	21*	9.0	19	30.7	19
Hornsea	NA	22	8.0	20	14.5	20

* = estimated.

Table 3.18 (c) Combined Centrality Scores and Ranks

Town	Date					
	1791		1823		1849	
	Score	Rank	Score	Rank	Score	Rank
Scarborough	649.1	1	831.2	2	1226.6	1
Bridlington	499.5	2	442.5	3	387.2	6
Beverley	352.0	3	1024.3	1	766.6	2
Great Driffield	294.0	4	248.0	7	406.9	5
Market Weighton	283.1	5	126.6	12	232.4	10
Malton	NA	6*	422.2	4	551.1	4
Howden	220.2	7	249.8	6	378.9	7
Pocklington	186.4	8	218.2	8	255.6	9
Kirkby Moorside	153.4	9	96.6	15	110.5	17
Thirsk	147.4	10	354.6	5	212.4	11
Snaith	120.1	11	95.2	18	192.7	13
Selby	118.6	12	208.5	9	610.7	3
Easingwold	114.8	13	117.8	14	166.7	14
Patrington	74.9	14	118.6	13	139.4	15
Helmsley	68.3	15	96.1	17	88.7	18
Hedon	58.6	16	96.4	16	111.4	16
Pickering	48.1	17	136.9	11	193.4	12
Thorne	45.4	18	182.8	10	318.5	8
Hunmanby	39.0	19	28.5	20	32.3	20
Kilham	22.6	20	16.6	22	19.1	22
South Cave	NA	21*	37.9	19	49.4	19
Hornsea	NA	22*	22.3	21	30.1	21

* = estimated.

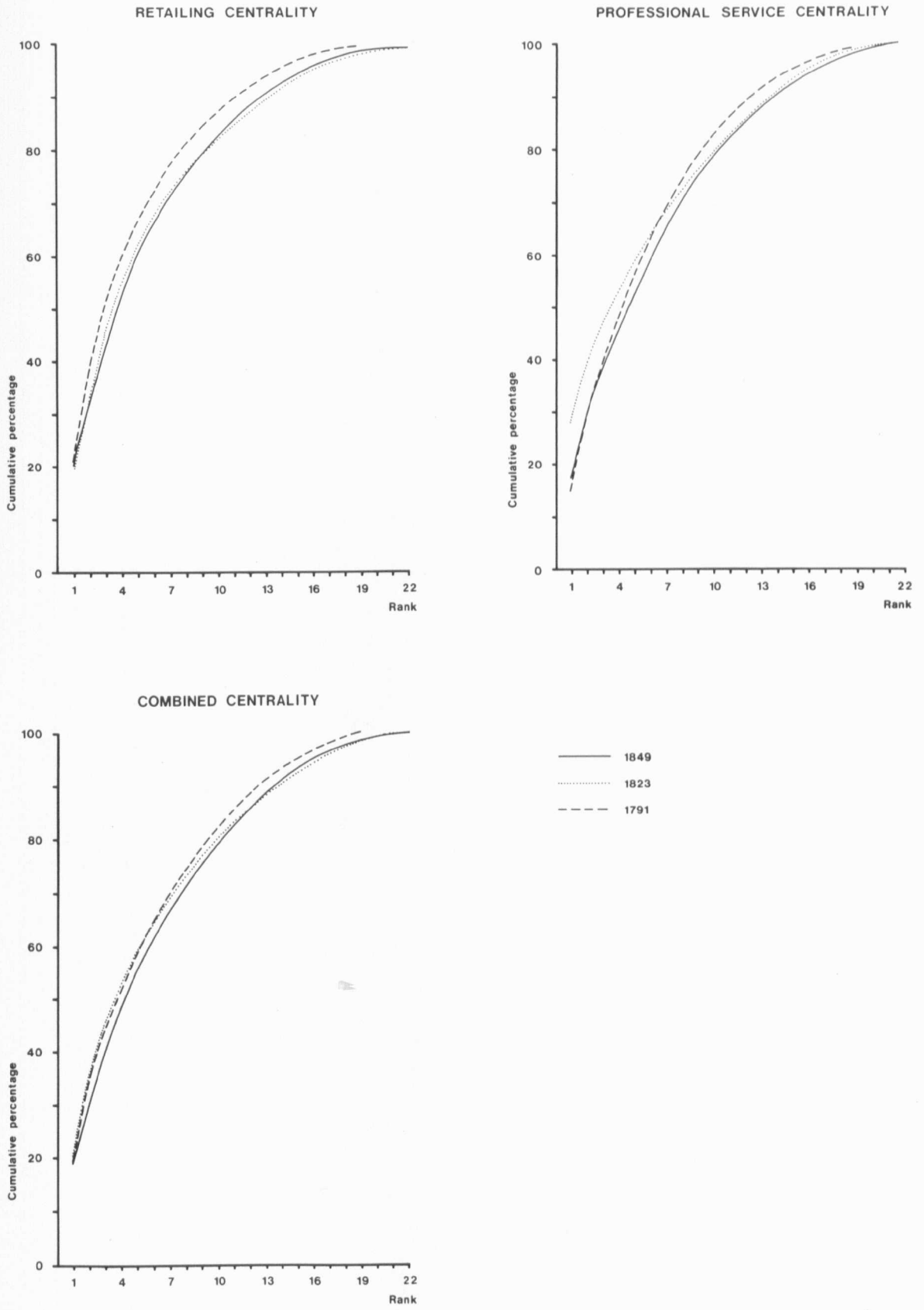


Fig.3.5 Lorenz Curves of Centrality Values, 1791-1849

towns with this position being consolidated in the following quarter century. For professional services a rather more complex picture emerges. In contrast to the evidence pertaining to retail activity, the first quarter of the nineteenth century saw a relative concentration of professional services particularly among the higher order centres, and it was only in the following period that a more equitable balance was achieved. Combining both centrality scores, further observations can be made. Although servicing did become more evenly shared over time, greatest equilibrium was achieved in the early decades of the nineteenth century, with a relative strengthening of the dominance of the higher order centres occurring towards mid-century. The analysis would thus suggest that over time there were small but significant shifts in the balance of servicing within the region giving rise to greater complexity in the structure of the regional urban system. Ranking the combined scores for each of the study dates substantiates this point (figure 3.6). To enable comparisons to be made over time the scores have been converted to percentages as was the case for the compilation of the aggregate functional scores[57].

For the first study date, 1791, two distinct breaks in the hierarchy are evident suggesting the existence of three orders of settlement at the close of the eighteenth century; although evidence of additional breaks was becoming evident at the upper and lower levels of the hierarchy. By the second study date further orders had been added to the system (figure 3.6), suggesting the existence of five orders of settlement. At mid-century the system that emerged was one of considerable complexity for while there was, as the Lorenz curves indicated, perhaps greater equilibrium in the servicing of the region, closer examination of the graph indicates that additional but more 'subtle' breaks in the hierarchy of centres had emerged. The

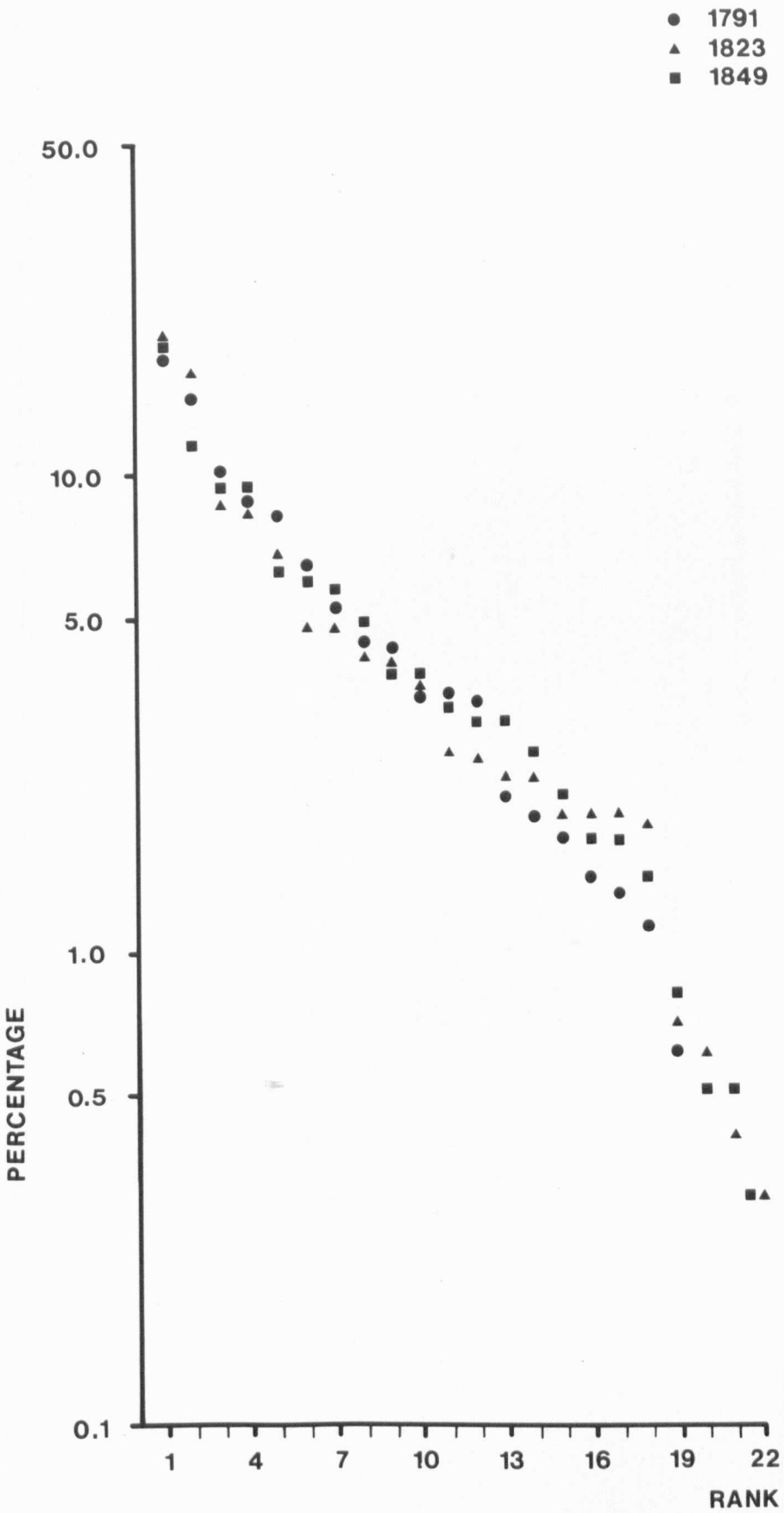


Fig.3.6 Rank-Array of Centrality, 1791-1849

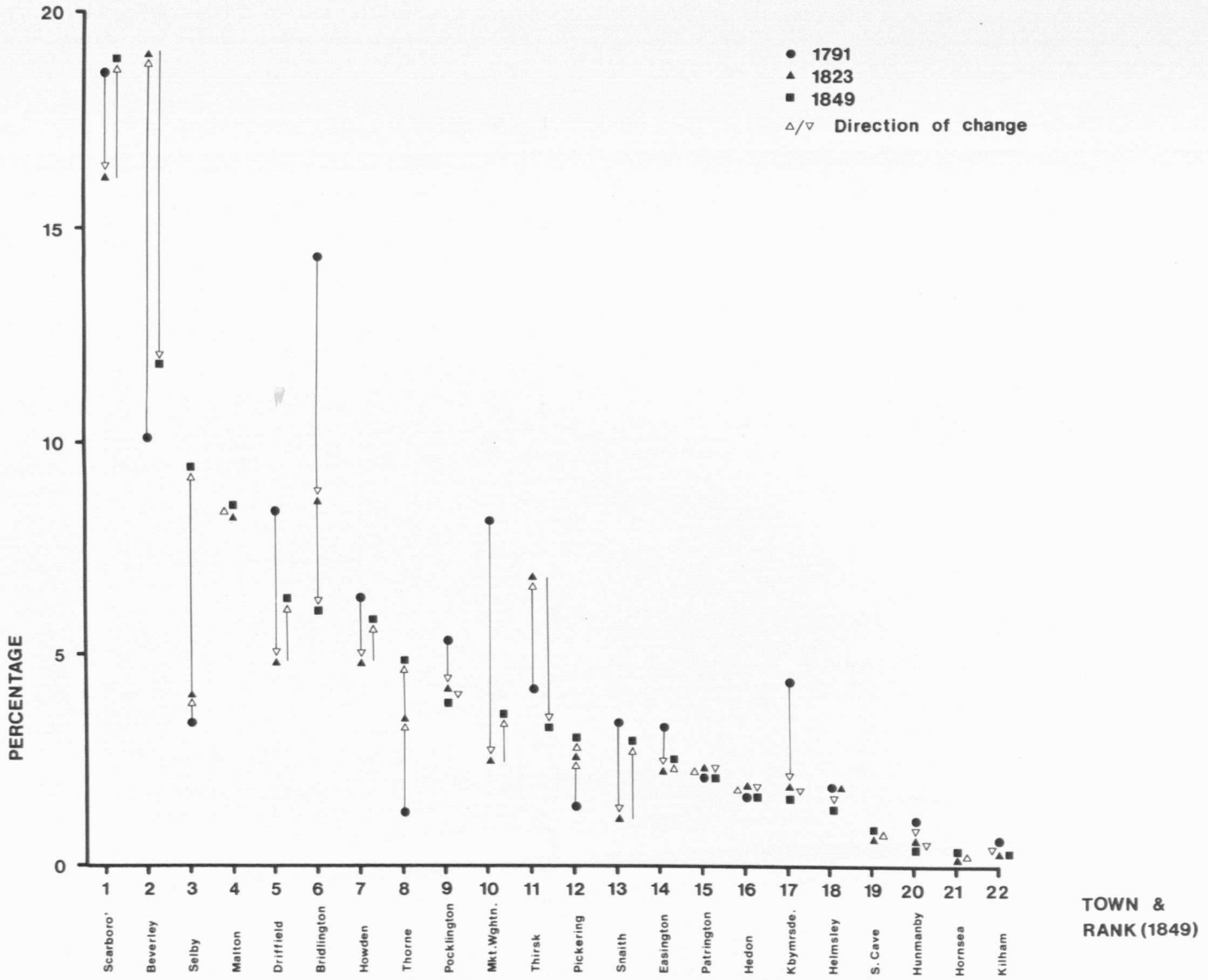


Fig.3.7 Changes in Urban Status - Centrality Scores, 1791-1849

largest centre, Scarborough, although not increasing its percentage share of centrality, now stood out as a first order centre with three towns, Beverley, Selby and Malton emerging as second order centres. While there was a considerable degree of continuity among the middle order towns, breaks are discernible between ranks eight and nine and ranks fourteen and fifteen, with the four lowest order centres each contributing less than 1% to the servicing of the region.

The increasing complexity in the regional structure of urban settlement is reflected in the centrality status levels of the component centres. As figure 3.7 demonstrates, certain towns experienced considerable change in their regional status over this sixty year period. While the data must be treated with some caution, due firstly to the aforementioned difficulties of trade directories as a historical source[58], and secondly to the slight variation in the number of recorded towns between the first and the second study dates, it is evident that among the middle-order centres there was measurable fluctuation in their regional role. Selby, Thorne, Driffield and Pickering all improved their relative standing while Bridlington, Pocklington and Kirkby Moorside all lost ground; with other centres, for example Thirsk, Howden, Snaith and Easingwold, experiencing mixed fortunes. At the highest level it is also interesting to note the changes of position that occurred between the towns of Beverley and Scarborough. Beverley, ranked only third at the close of the eighteenth century, rose to become the first town by 1823 before dropping to second place by mid-century. The explanation for Beverley's dominance in the first quarter of the nineteenth century lies in the town's function as a professional service centre and in its developing retail role. The former role was overtaken by Scarborough in the second quarter of the nineteenth century as the town acquired the functions needed by a rapidly

developing upper class coastal resort[59]. Among the lowest order centres there was considerable stability, these towns neither increasing nor losing their share of servicing within the region.

(d) Spatial Patterns of Functional Change

The eighteenth and nineteenth centuries witnessed significant alterations in the structure of the regional urban system in eastern Yorkshire. Although on the surface there was an apparent movement towards greater equilibrium in the servicing of the region by the component centres - the percentage contribution among the middle order centres in particular becoming more equitably shared -, small but significant breaks had occurred in the hierarchy. A simple three-tier hierarchy of service centres, dominant for much of the eighteenth century, was gradually replaced by a system of growing complexity. By the second quarter of the nineteenth century, five orders of country towns were distinguishable and by mid-century, six.

The eighteenth century was a period of selectivity of growth in which the economic dominance of certain centres was becoming established; the towns of the northwest corner for textile trades and building activities, Driffield, Scarborough, Beverley and Malton for servicing and Selby and Thorne as inland ports. These processes were further developed in the first half of the nineteenth century. Spatially patterns of regional dominance were associated with transportation links within the region. The first, second and third order service centres of Beverley, Scarborough, Bridlington, Driffield, Selby and Malton all had access to good water communications, links that facilitated the concentration of functions in these towns. Of the other towns in the region, few had any other distinctive characteristics such as strong industries or resort function that could enable them to greatly increase their standing within eastern Yorkshire. All but the lowest order centres did, however, have functions which

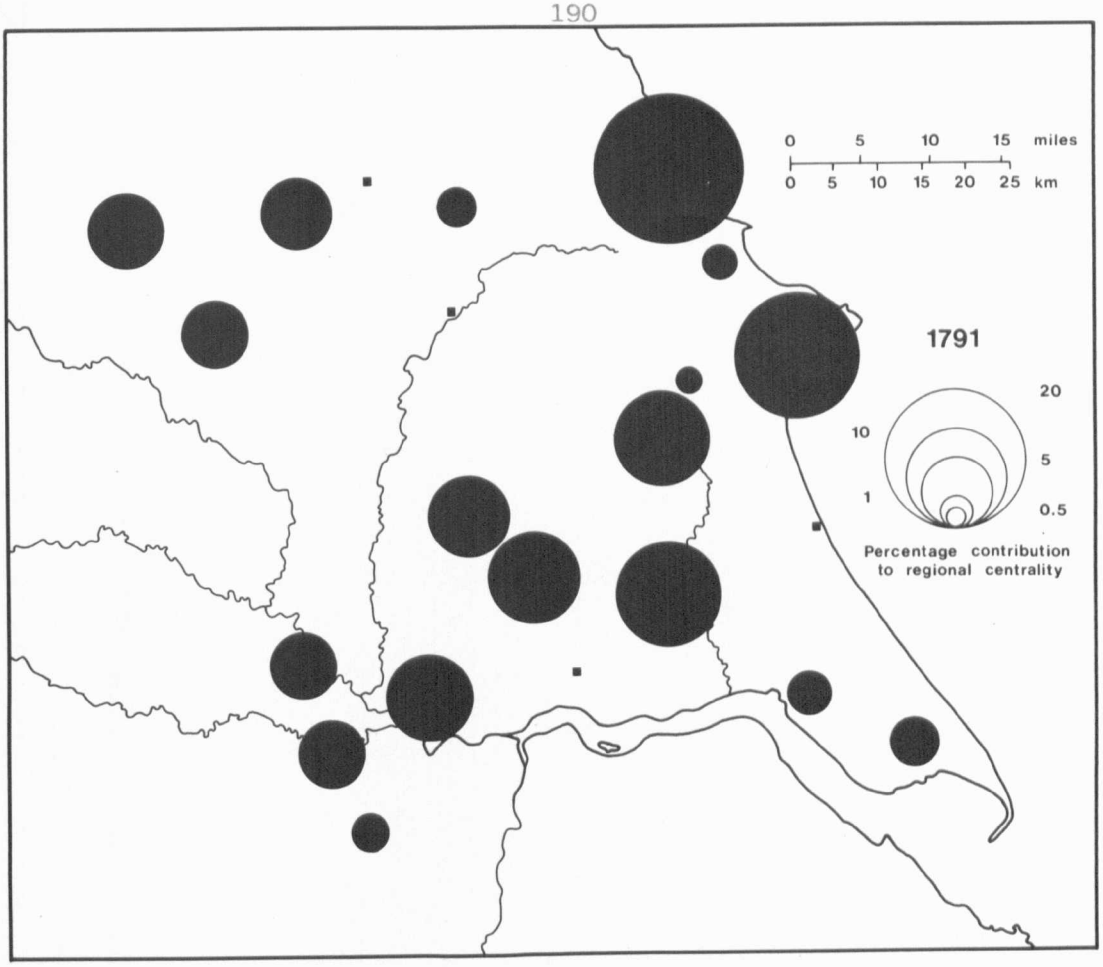
rendered them significant, but not dominant, service centres largely through the trade generated at their weekly markets and less frequent fairs. Thirsk market for example was accounted to be,

> "Well supplied with the necessaries of life ..... a great quantity of poultry, butter and eggs are brought here by dealers and conveyed into the populous towns of the West Riding where they are resold .... the fairs which are numerous tend considerably to enrich the town and its immediate vicinity",[60]

and Market Weighton to be,

> "a great corn market although one sees little of that commodity exposed for sale for some thousands of bushels are weekly disposed of by sample"[61].

By means of plotting percentage centrality scores, it is evident that there were some quite significant locational shifts in the importance of individual centres within the regional settlement system (figure 3.8). Changes in the importance of component centres were clearly greatest around the turn of the eighteenth century, the time of most rapid demographic expansion in all towns, reaching a level of apparent stability by the second quarter of the nineteenth century. At the close of the eighteenth century the coastal ports of Scarborough and Bridlington dominated the central place hierarchy in eastern Yorkshire, with several towns in the central area bounded by the Wolds and the Vale of York playing a strong supportive role[62]. Over the period 1791 - 1823 Bridlington's contribution to regional centrality was cut by almost 6%, while in the northwest of the region Easingwold and Helmsley suffered smaller losses as Malton and Thirsk grew in importance. In the southwest, Selby and Thorne both increased their contribution to the servicing of the region while the town of Snaith lost ground. As was the case in demographic terms, the greatest changes and most marked fluctuation occurred in the central area. Pocklington and Market Weighton both suffered some loss in their regional centrality while Beverley greatly



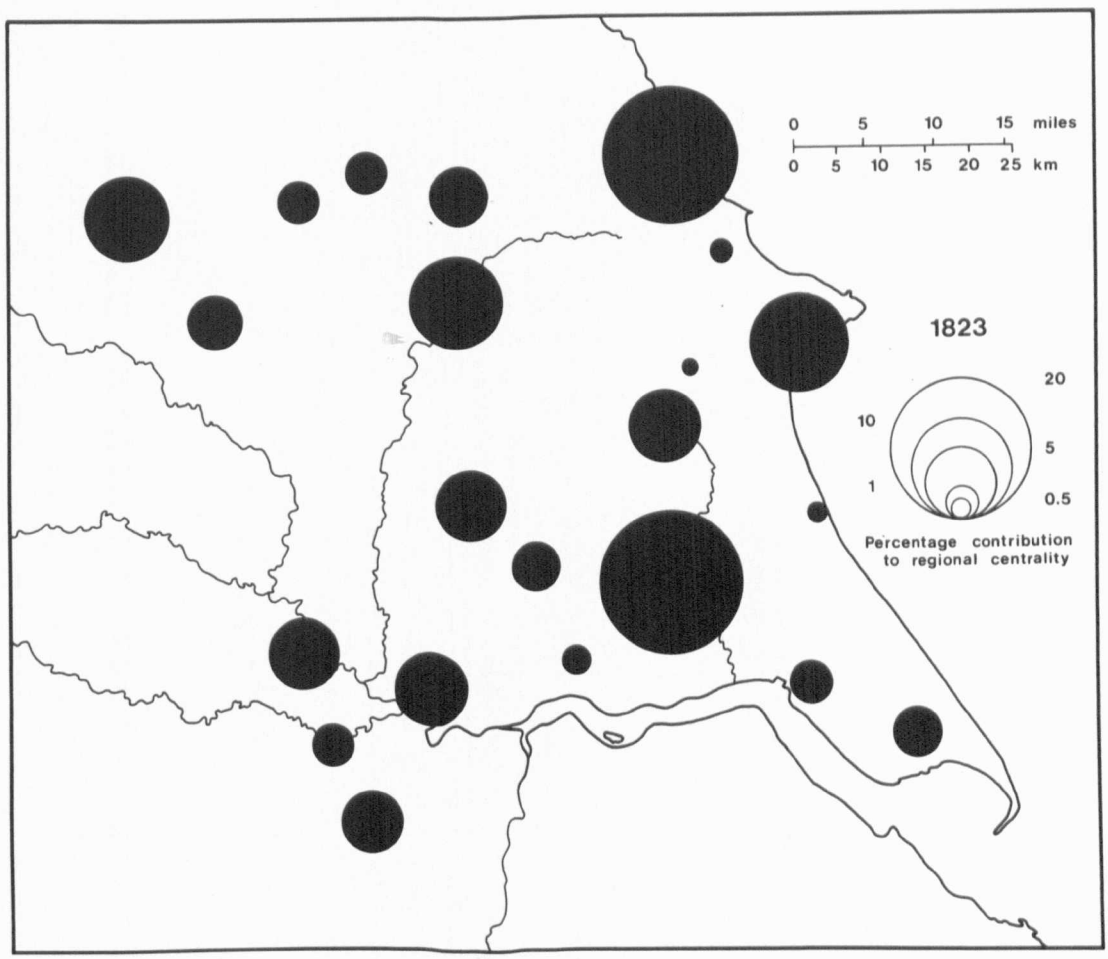


Fig.3.8 Percentage Contribution to Regional Centrality among Eastern Yorkshire Towns, 1791-1849

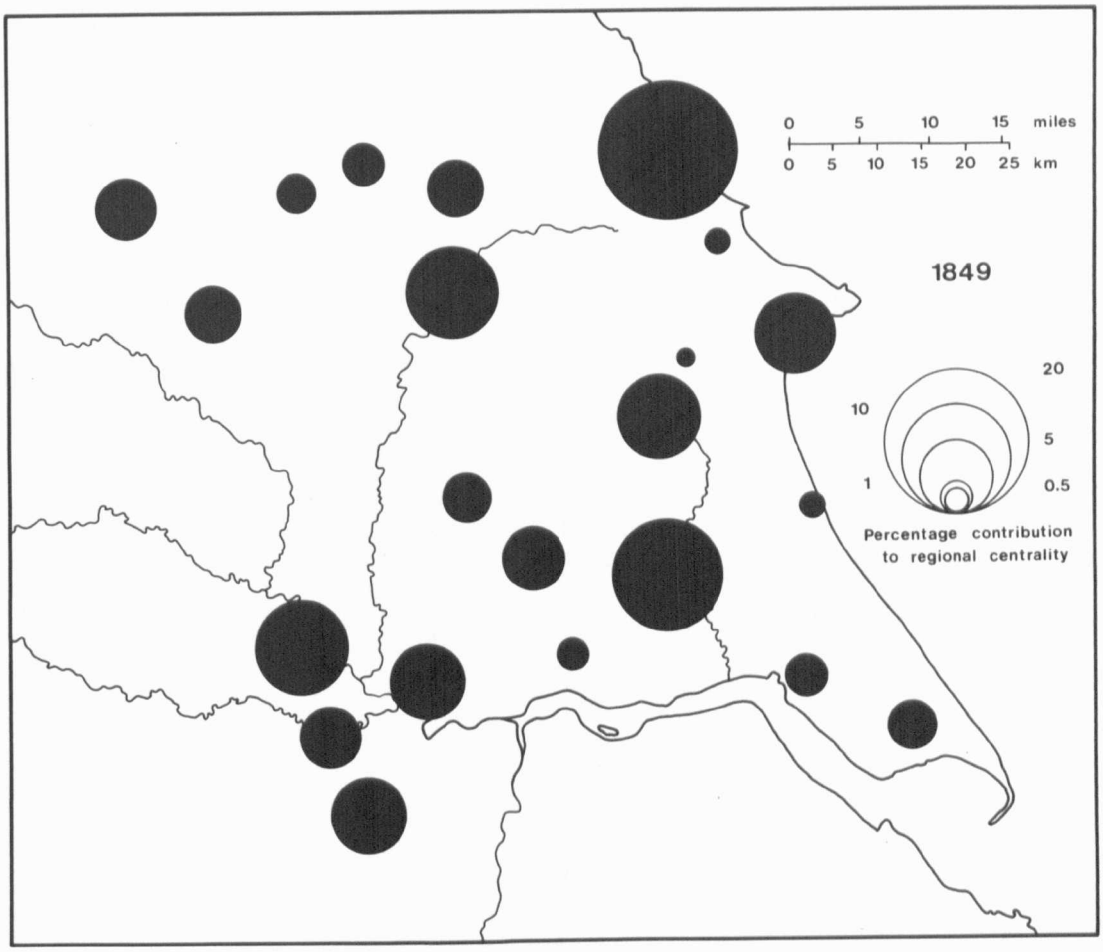


Fig.3.8 (Continued)

strengthened her functional base to emerge as the most important service centre within the region. The following quarter century witnessed less marked change as early nineteenth century patterns were consolidated.

In the northwest, further small losses in functional importance were experienced by Kirkby Moorside and Helmsley, Easingwold and Pickering remained largely stable, while Thirsk lost some of the ground it had gained in the previous decades; only the town of Malton proved able to make much headway within the regional urban system. Selby and Thorne, in the southwest, continued to improve their relative standing but Snaith, like the south Holderness towns of Patrington and Hedon, retained a largely stable position of limited importance. In the central area Market Weighton and Driffield both strengthened their regional position while Beverley, although remaining dominant, had seen some reduction in her regional importance as other, lower order, centres such as Howden and Pocklington expanded their functional base.

The picture that emerges from this analysis is similar to that found in the analysis of the demographic dimension to change, although there was perhaps rather greater fluctuation in the economic experience and functional importance of component centres. Processes of selectivity were clearly operative throughout the eighteenth and nineteenth centuries, but particularly so in the century after 1750. How therefore did the economic and demographic fortunes of towns combine to create distinctive growth experiences among country towns?

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21. LEWIS, C.R. 'The Central Place Pattern of Mid-Wales and the Middle Welsh Borderland', in CARTER, H. and DAVIES, W.K.D. eds. Urban Essays Studies in the Geography of Wales. London, 1970, pp.228-68; LEWIS, C.R. 'The Analysis of Changes in Urban Status: a Case Study in Mid-Wales and the Middle Welsh Borderland', T.I.B.G., No.64, 1975, pp.49-66; DAVIES, W.K.D. 'Towards an Integrated Study of Central Places: a South Wales Case Study', in CARTER and DAVIES, op.cit., pp.193-227.

22. CAROE, op.cit.; O'DELL, op.cit.; PARTON, A.G. Town and Country in Surrey c.1800-1870: a Study in Historical Geography. (Unpublished Ph.D.Thesis, University of Hull) 1973.

23. For the town of Great Driffield a relatively small number of entries were made in Slater's directory of 1849. For Driffield, therefore, data was obtained from WHITES East Riding directory of 1851. Checking the other study towns with the entries recorded in the latter indicated that Slater's directory gave similar coverage to these towns.

24. LAWTON, R. 'The Economic Geography of Craven in the Early Nineteenth Century', T.I.B.G., No.20, 1954, pp.93-111; PATTEN, J. 'Village and Town an Occupational Study', Ag Hist Rev, vol.20, 1972, pp.1-17; KENYON, op.cit.; WRIGLEY, 'Changing Occupational', op.cit; PICKLES, op.cit.; For a review of a number of classificatory schemes see PATTEN, J. 'Urban Occupations in Pre-Industrial England', T.I.B.G., vol.2, No.3, 1977, pp.296-313.

25. ibid.

26. Information was collected from the following sources:- H.C.R.O. PR; B.I.H.R. PR and PRT; N.Y.C.R.O. PR see Appendix III (a) for availability and a discussion of methodology.

27. LAW, C.M. 'The Growth of Urban Population in England and Wales 1801-1911', T.I.B.G., No.41, 1967, pp.125-43; ROBSON, B.T. Urban Growth an Approach. Cambridge, 1973; DICKINSON, R.E. City, Region and Regionalism. London, 1947.

28. See chapter 2.

29. CARTER, H. The Towns of Wales: a Study in Urban Geography. Cardiff, 1966, chapter 5; NELSON, H.J. 'A Service Classification of American Cities', Econ. Geog, No.31, 1955, pp.189-210.

30. EVERITT, A. 'The Food Market of the English town', 1660-1760', Proceedings of the Third International Conference of Economic History, vol.1, 1965, pp.57-71; ALLISON, K.J. East Riding of Yorkshire Landscape. London, 1976.

31. PATTEN, 'Urban Occupations', op.cit.; ASHTON T.S. Economic Fluctuations in England, 1700-1800. Oxford, 1959.

32. JOHNSTON, R.J. City and Society. London, 1980, chapter 1; CARTER, 'Urban Geography', op.cit., chapters 5 - 7 contain a review of work to date.

33. CARTER, 'Urban Geography', op.cit., p.113.

34. ibid.

35. ibid.

36. LEWIS, 'Analysis of Changes', op.cit., pp.52-56.

37. ibid., p.53.

38. ibid., p.56.

39. i.e. those of differential fertility, poor recording of information, and impossibility of determing the exact number engaged in any given economic sector.

40. DAVIES, W.K.D. 'Centrality and the Central Place Hierarchy', Urban Studies, No.4, 1967, pp.61-79; DAVIES, 'Towards an Integrated', op.cit.; LEWIS, 'Central Place Patterns', op.cit.; LEWIS, 'Analysis of Change', op.cit.

41. LEWIS, 'Analysis of Change', op.cit., p.56.

42. ibid, pp.57-60.

43. ibid.; CARTER, 'Growth of the Welsh', op.cit.; CARTER, Towns of Wales', op.cit.; CARTER, H. 'The Urban Hierarchy and Historical Geography: a Consideration with Reference to North-East Wales', Geographical Studies, No.3, 1956, pp.85-101; O'DELL, op.cit.

44. HA 13/10/1831; NEAVE, D. South Cave: a Market Village Community in the Eighteenth and Nineteenth Centuries. South Cave, 1974.

45. The directories undoubtedly tend to over-inflate this sector as they are essentially concerned with details of services performed by the community. Labourers and craftsmen journeyman, which formed a significant body of the workforce in any centre, are seldom recorded and thus their relative dispersion between the different economic sectors is not known.

46. HALL, I. and E. Historic Beverley. York, 1972; BROWN, G.P. A Beverley Chronology. (unpublished manuscript deposited in Beverley Local History Library).

47. See chapter 2.

48. These are demonstrated in the papers by Lewis, Davies, O'Dell and Caroe previously cited.

49. STAFFORD, H.A. 'The Functional Basis of Small Towns', Econ Geog, vol.39, 1963, pp.165-175.

50. See, for example, WILD, M.T. and SHAW, G. 'Population Distribution and Retail Provision: the Case of the Halifax-Calder Valley Area of West Yorkshire During the Second Half of the Nineteenth Century', Jour Hist Geog, vol.1, No.2, 1975, pp.193-210.

51. This may in part be attributable to the increase in the number of recorded centres between the two study dates.

52. PRESTON, op.cit.

53. ABIODUN, op.cit.; ROWLEY, G. The Middle Order Towns of Wales (unpublished Ph.D. thesis,University of Wales, 1967).

54. CAROE, op.cit.

55. LEWIS, 'Analysis of Change', op.cit.; the principal problems relate to the introduction of additional centres into the system, the increasing complexity of urban functions over time, and the variable recording of entries for centres between different study dates.

56. DAVIES, 'Centrality', op.cit.

57. LEWIS, 'Analysis of Changes', op.cit. p.56.

58. See note 55 above.

59. For example, a theatre, museum, billiards room, eating houses, etc.; PIMLOTT, J.A.R. The Englishman's Holiday. London, 1947.

60. B.Y. 1823.

61. U.B.D. 1791.

62. These figures must be regarded with a degree of caution due to three centres not having entries in the Universal, British Directory. There is therefore a tendency for centrality percentages at this date to be slightly over-inflated.

CHAPTER 4

A TYPOLOGY OF COUNTRY TOWNS

Analysis of a variety of documentary and published sources relating to the eighteenth and nineteenth century town suggests that a hierarchical ordering of settlements occurs in respect of a number of variables. The preceding analysis has shown, in common with other studies of urban systems in past time periods, that within a region, settlements can be grouped into types or clusters on the basis of their demographic and economic characteristics and growth experience[1]. Furthermore these types are usually arrayed in a hierarchical form as is demonstrated by the towns comprising the regional settlement system in eastern Yorkshire.

At the start of the eighteenth century a simple three-tier urban hierarchy existed in eastern Yorkshire, differentiated largely by the demographic and social standing of component centres, although economically they also exhibited varying degrees of specialisation. While at this time there was evidence to suggest that among the middle and lower order centres, the country towns of the region, additional breaks in the hierarchy might soon appear, the process took a century to effect itself. The deceleration that occurred in the economy in the first half of the eighteenth century, and the accompanying demographic crises that affected many towns, held back any widespread change until the close of the century. From the last decade of the eighteenth century the regional urban system of eastern Yorkshire became more complex. By the first quarter of the nineteenth century five orders of country towns are readily identifiable and by mid-century at least six. What, therefore, were the characteristics of towns

at each level of the hierarchy and what criteria can be meaningfully applied to distinguish them by type? As Carter has pointed out, explanation of town distributions cannot rely solely on methods related to central place analysis, but needs to be integrated with interpretations derived from specialized activities[2]. While central place functions form the essence of urban character in that they are associated with a town's role as a service centre for a tributary area, transport functions and specialized functions, particularly those performed for a non-contiguous area, also assume a degree of importance influencing a settlements relative standing within a regional settlement system[3].

1. Nodality

If transport functions are important, it is axiomatic that nodality as a concept of central place theory cannot be ignored in any explanation of the selectivity of urban growth. Frequently, however, the two concepts of centrality and nodality are confused, and in Preston's view this leads to inadequate determination of the central place importance of each settlement[4]. He argues that nodality refers to the absolute importance of a settlement, measured by both the settlement's role as a provider of goods and services for the complementary region and the agglomeration of services and population in the town as a self consuming unit. Centrality on the other hand is synonymous with relative importance, ie. the settlements function solely for the surrounding region. In the operational model that Preston constructs, nodality is measured using retail sales and data on median family income[5]. Clearly these measures cannot be invoked in a historical context, but as in behavioural terms, a nodal location is that place where the individual has the greatest freedom to interact, population density, functional availability and areal accessibility all become

measures of nodality. Areal accessibility and functional availability are both a function of transport linkages within the urban system, settlements with maximum direct linkages attaining a higher rank position than those with fewer communications flows[6]. Analysing the accessibility of, and the connectivity between, component centres immediately leads to the concept of a town's complementary region or sphere of influence; although it is axiomatic that no centre will have a single sphere of influence for it will vary according to the good or service being offered. A settlement's area of influence for an accountant or solicitor will clearly be of greater extent than for a general grocer or butcher.

(a) Spheres of Influence

Two major approaches have been adopted towards identifying the nodality and sphere of influence of a particular settlement; the first looks outward from the town employing variables such as local newspaper circulation and the area over which a bank draws its customers to identify the areas served, while the second looks inward from the countryside focusing principally on consumer behaviour[7]. In contemporary studies the latter approach has become dominant, but in a historical context it is impossible to apply and one is forced to revert to the former. Several studies attest the possibility of establishing the degree of nodality of a settlement for past time periods. Carter and O'Dell have both used carriers' carts journeys to market to identify spheres of influence, while Rodgers employed data on the location of out-burgesses recorded in the Burgess Rolls in his study of Preston[8]. Other possible sources of information would be a monitoring of the area from which newspaper advertisements were placed, or through utilisation of administrative boundaries such as Poor Law unions which were based on roughly defined spheres of influence. Difficulties, however, arise in the employment of these data sources for the study of country towns. Many smaller urban communities did not possess

corporate status and thus did not have burgesses, while their often small size and proliferation, particularly in the more rural counties, meant that only the highest order centres had any administrative importance; furthermore, most country towns did not gain their own newspaper until the latter half of the nineteenth century. One is forced, therefore, to resort largely to data on transport flows, for this was widely available for settlements at all levels of the hierarchy from the last quarter of the eighteenth century when trade directories became widespread; although supplementary data on administrative areas can also be employed.

As table 4.1 indicates, movement between town and town and town and country increased markedly between the last quarter of the eighteenth century and the mid-nineteenth century. The average increase in the number of places served by each settlement was of the order of 600% between the first and last study date, while the towns of Selby and Great Driffield registered increases of a far greater magnitude. Likewise the frequency of services also generally increased by an average of 680%: from eight to ninety per week in Great Driffield and from two to thirty-nine in Market Weighton. Although there was considerable inter-urban variation in the development of transport services, it is evident from the table that the most significant linkage developments occurred around the turn of the eighteenth century and were clearly related to the wave of turnpike trust creation then taking place. The motives behind (and the result of) road improvements were an increase in the volume of trade, improved accessibility and an extension of the urban market area. Better roads encouraged greater mobility by reducing transport costs and travel time and thus also facilitated the wider distribution of market products.

Mapping the range over which eastern Yorkshire towns were served by carriers carts for each study date is additional evidence of the considerable widening of market areas and spheres of

Table 4.1 Carrier Services to Eastern Yorkshire Towns, 1791-1849

Town	No. of Places Served			No. of Services per Week		
	1791	1823	1849	1791	1823	1849
Beverley	NA	40	40	NA	67	79
Bridlington	4	22	32	14	53	65
Easingwold	1	2	2	1	7	3
Great Driffield	3	21	45	8	44	90
Hedon	1	6	1	4	10	4
Helmsley	1	6	7	2	9	16
Hornsea	NA	2	2	NA	12	6
Howden	2	10	18	1	12	31
Hunmanby	NA	3	2	NA	8	9
Kilham	NA	4	2	NA	4	6
Kirkby Moorside	3	4	8	2.5	8	33
Malton	NA	9	37	NA	28	76
Market Weighton	2	11	21	2	25	39
Patrington	1	1	2	2	5	7
Pickering	3	6	8	4	16	19
Pocklington	2	4	18	4	11	36
Scarborough	NA	9	33	NA	33	56
Selby	1	9	28	1	54	55
Snaith	NA	5	6	NA	11	8.5
South Cave	NA	2	2	NA	4	9
Thirsk	4	14	10	5	27	15
Thorne	1	1	8	2	9	18
North Frodingham	NA	4	4	NA	8	5
MEAN	2.07	8.47	14.6	3.82	20.2	29.8
S.D.	1.1	8.92	14.3	3.47	18.24	27.4
VAR.	1.2	76.1	195.2	11.2	318.3	717.8

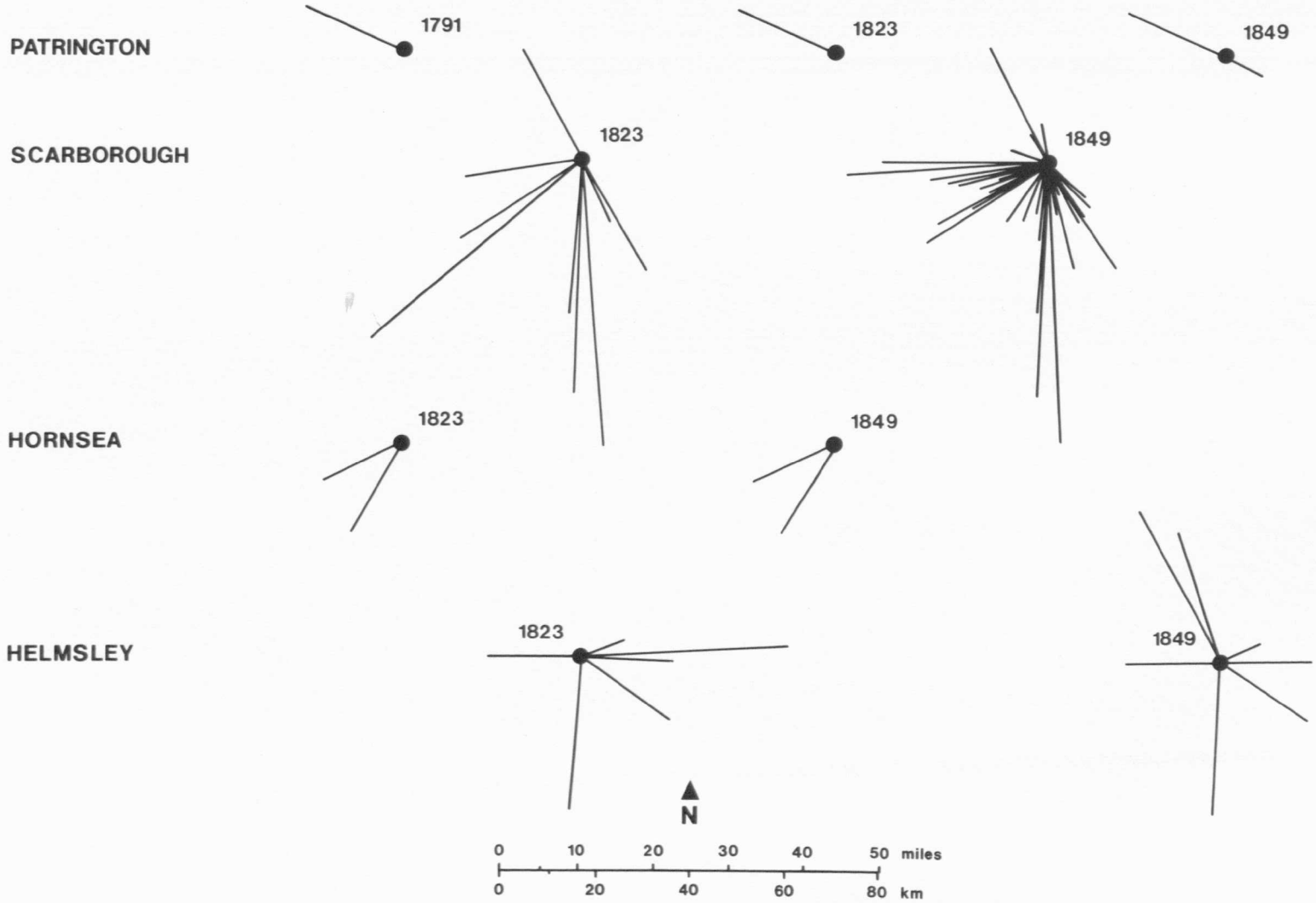

Fig.4.1 Carrier Services to Eastern Yorkshire Towns, 1791-1849

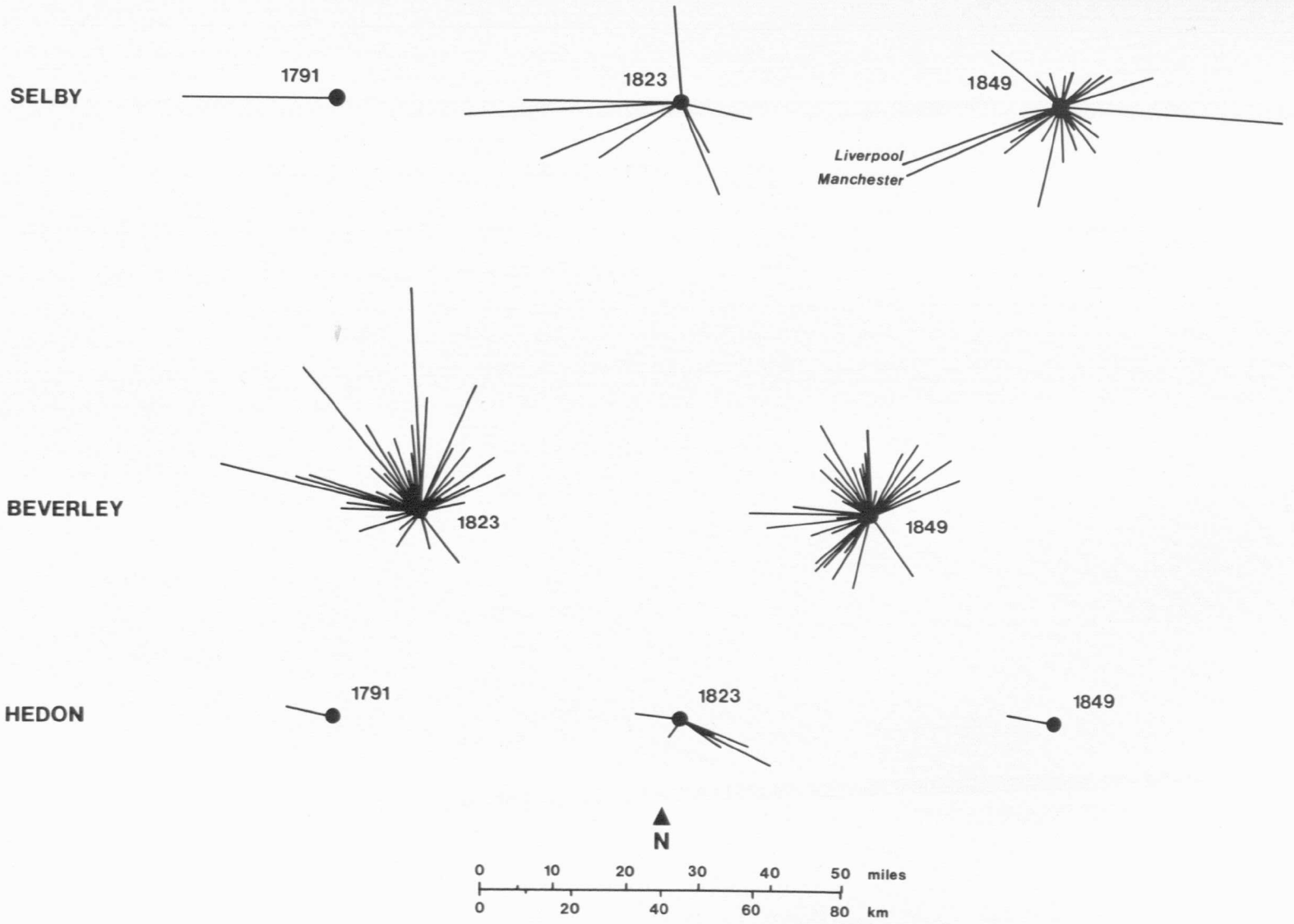

Fig.4.1 Carrier Services to Eastern Yorkshire Towns, 1791-1849

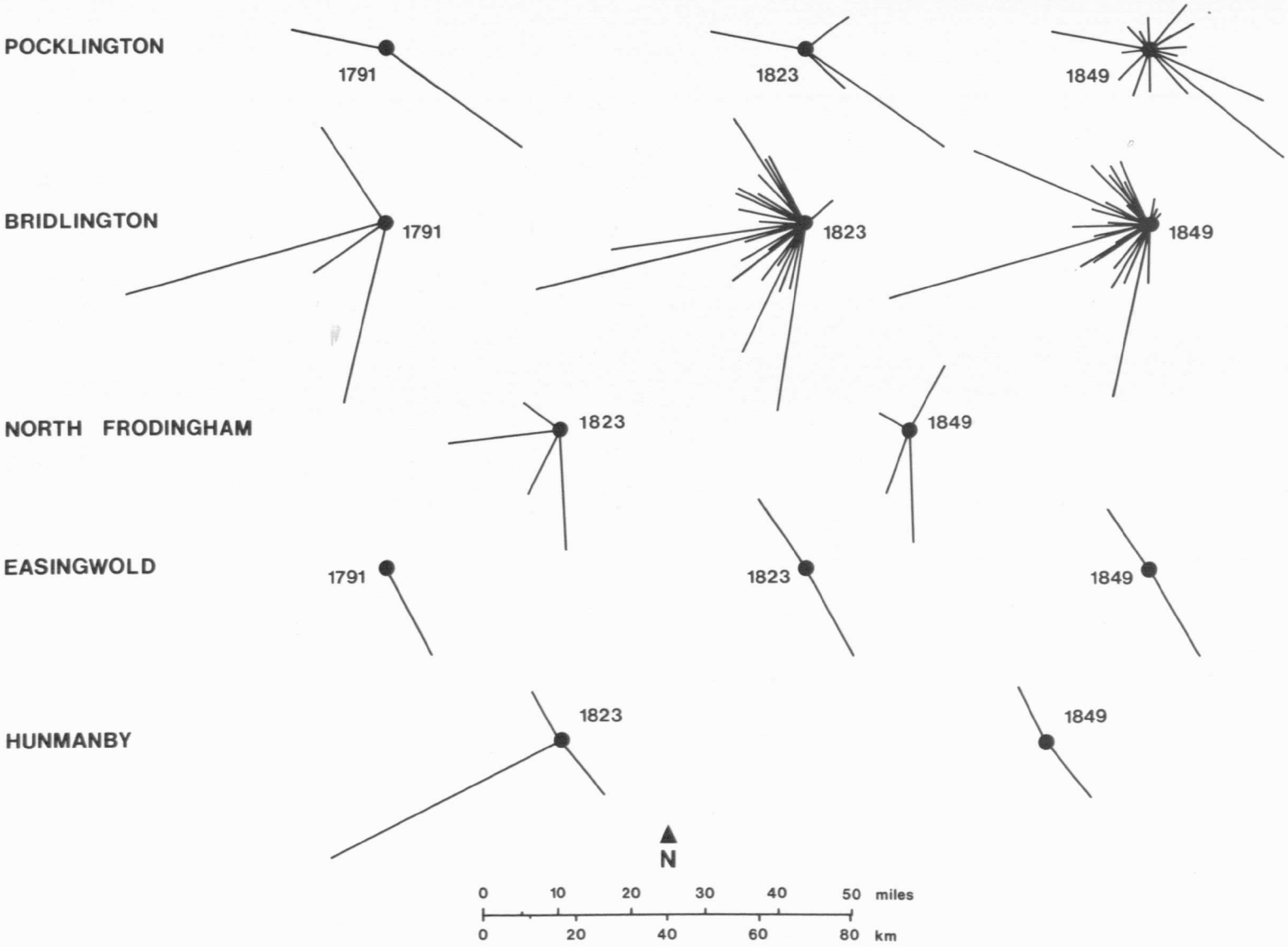

Fig.4.1 Carrier Services to Eastern Yorkshire Towns, 1791-1849

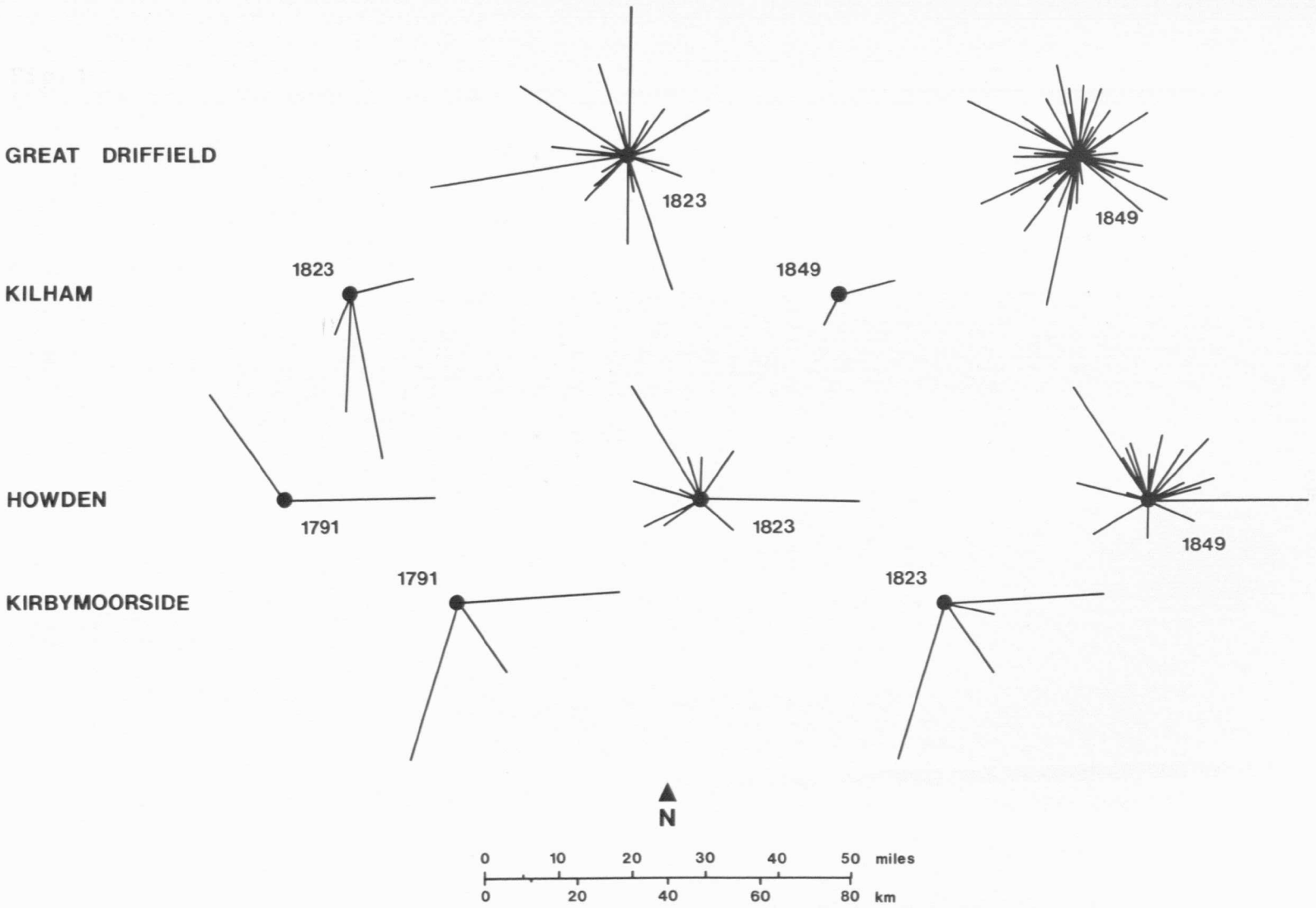

Fig.4.1 Carrier Services to Eastern Yorkshire Towns, 1791-1849

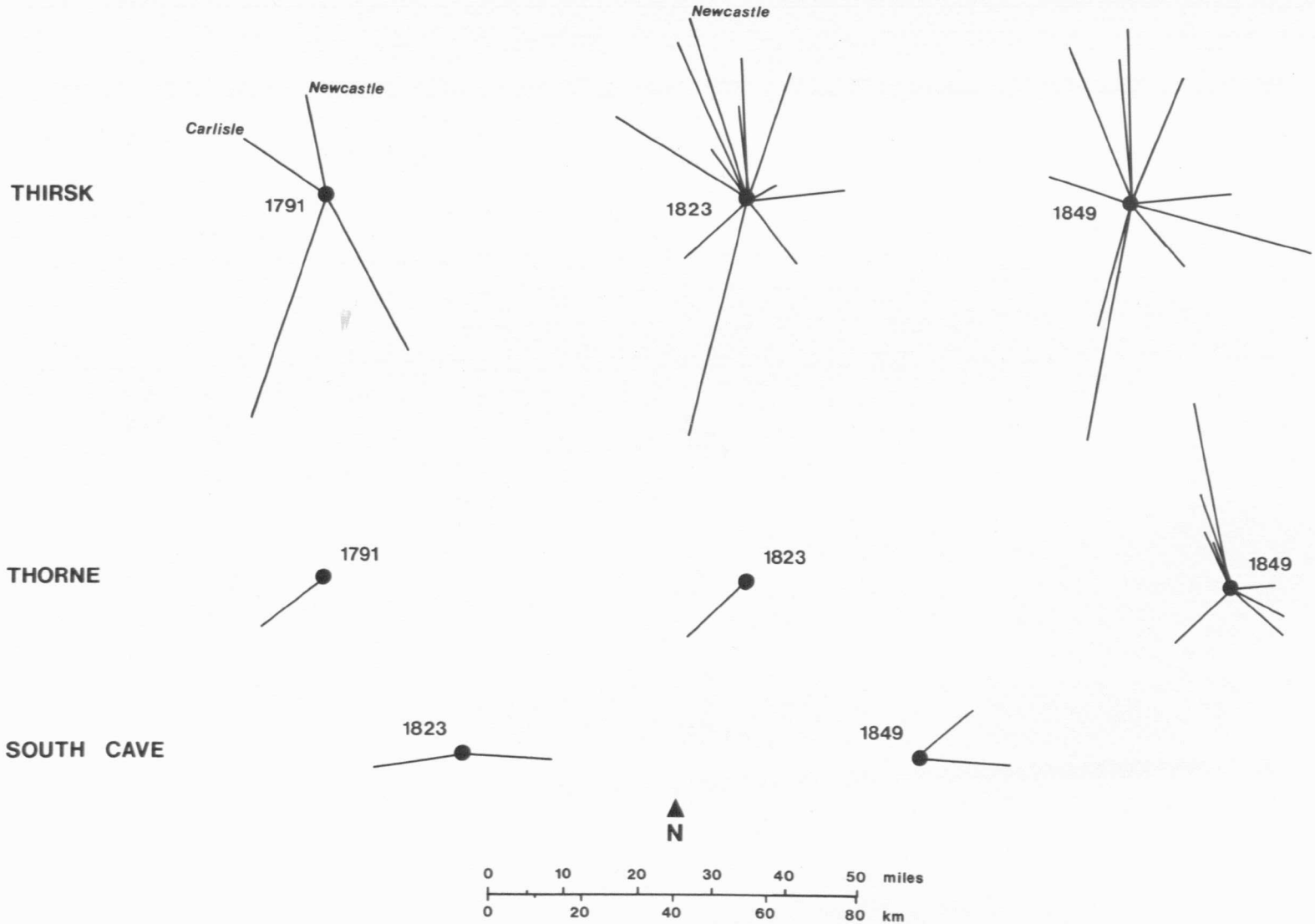

Fig.4.1 Carrier Services to Eastern Yorkshire Towns, 1791-1849

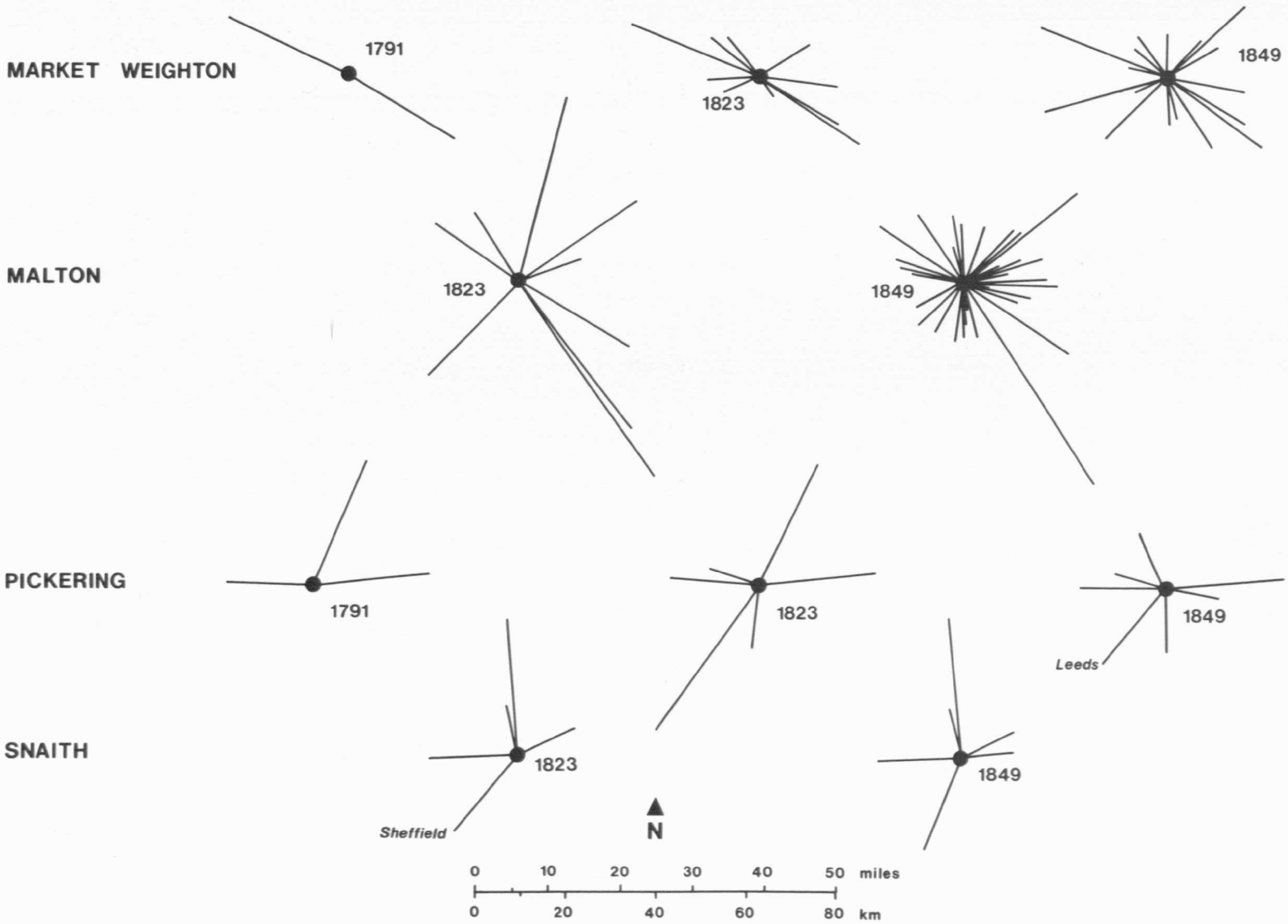

Fig.4.1 Carrier Services to Eastern Yorkshire Towns, 1791-1849

influence that occurred in the sixty years before 1850 (figure 4.1). In the last quarter of the eighteenth century market areas were essentially confined to within a six to eight-mile radius of the town; but several of the larger centres who had already attained a degree of specialisation in the marketing of certain products possessed more extensive areas. The market areas of Beverley, Bridlington and Pickering, for example, reached as far as the regional capitals of Hull and York. In 1791, however, the available information would suggest that market or trading areas were not sharply differentiated. The thirty years around the turn of the century witnessed a marked change to this eighteenth century pattern. As the diagrams on figure 4.1 show, by 1823 there was considerable inter-urban variation in the spatial extent of market areas. Hedon, Thorne, North Frodingham, Hornsea, Patrington and Easingwold each had fairly restricted market areas in the range of up to fifteen miles which, furthermore, were largely unidirectional. Other centres, for example, Thirsk, Selby, Market Weighton, Pickering and Pocklington, had developed fairly wide market areas encompassing places as far as forty miles distant and had established multi-directional trading links, although there were still observable gaps in their trading flows. Only a handful of settlements had developed both short-range links with the contiguous market area - a comprehensive and dense network of services occurring within a fifteen-mile radius - and numerous long-distance links of up to fifty miles with other regional towns. Towns in this category are indentifiable as Beverley, Bridlington and Driffield.

The widening of market areas continued in the second quarter of the nineteenth century giving certain towns an enhanced regional role. Beverley, Driffield and Bridlington further consolidated their market areas, - the town of Driffield in particular obtaining numerous additional trading links - but they saw increased

competition from other centres. Several towns considerably extended their market area at this time, emulating the position achieved by the three aforementioned settlements almost thirty years earlier. Selby, Thorne, Market Weighton, Malton, Pocklington, Howden and Scarborough each underwent expansion of their trading area, developing further multi-directional flows and extending the range of contact (figure 4.1). Other towns, however, failed to participate in this trend, their market areas remaining largely stable or, in certain cases, declining. Thirsk, South Cave, Pickering, Snaith, North Frodingham, Kirkby Moorside, Helmsley and Patrington proved unable to develop the spatial extent of their market; the situation reached in the early nineteenth century remained unchanged. Hedon, Hunmanby and Kilham experienced decline, each centre losing one or more of the three to four vital links they had previously held.

(b) Measuring Nodality

Combining the scores for the number of places served and the total number of carrier services to a settlement within one week provides an index of nodality for each town. As shown in table 4.2, the mean index rose steeply between 1791 and 1849, from 5.7 to 44.7, the most marked increase occurring in the thirty years around the turn of the century. At the close of the eighteenth century there was little measurable inter-urban variation in the index of nodality. Towns on average were regularly connected only to two or three other centres with a mean of almost four services a week. Only Bridlington stood in major contrast to other regional towns; although the inavailability of information for other towns, Beverley and Scarborough in particular, must render this observation rather tentative. By the first quarter of the nineteenth century, however, there was measurable inter-urban variation between the region's towns, indicated by the high standard deviation in relation to the mean value. Four towns, Beverley, Bridlington, Driffield

Table 4.2 Index of Nodality and Rank of Eastern Yorkshire Towns, 1791-1849

Town	Date					
	1791		1823		1849	
	I	R	I	R	I	R
Beverley	NA	-	107	1	119	2.5
Bridlington	18		75	2	97	4
Great Driffield	11		65	3	135	1
Selby	2		63	4	83	6
Scarborough	NA		42	5	89	5
Thirsk	9		41	6	25	13
Malton	NA		37	7	119	2.5
Market Weighton	4		36	8	60	7
Howden	4		22	9.5	49	9
Pickering	7		22	9.5	27	11
Hedon	5		16	11	5	22.5
Helmsley	3		15	12.5	23	14
Pocklington	6		15	12.5	54	8
Hornsea	NA		14	14	8	20.5
Kirkby Moorside	5.5		12	15	41	10
Snaith	NA		11	16.5	14.5	15
Hunmanby	NA		11	16.5	11	16.5
Thorne	3		10	18	26	12
Easingwold	2		9	19	5	22.5
Kilham	NA		8	20.5	8	20.5
North Frodingham	NA		8	20.5	9	18.5
South Cave	NA		6	22.5	11	16.5
Patrington	3		6	22.5	9	18.5
MEAN	5.73		28.3		44.67	
S.D.	3.96		26.62		42.0	
VAR	14.76		677.7		1687.5	

I = Index R = Rank

and Selby, had nodality indices of greater than one standard deviation above the mean value and while no town had a score of more than one standard deviation below the mean, South Cave and Patrington made only a limited contribution to regional accessibility explained partly by their geographical location.

The nodal position of the region's towns remained relatively unchanged at mid-century; a Spearman's rank correlation computed for the ranks of the two dates giving a value of 0.79 with an associated probability of 0.05. Five Towns, Beverley, Bridlington, Driffield, Malton and Scarborough had indices of more than one standard deviation above the mean value, while, as at the previous date, no town had a score smaller than one standard deviation below the mean. Within the overall accordance between the rankings for the two dates, however, there had been some small, but significant, changes. Beverley had lost its position as the most important nodal centre in the region to Great Driffield, surprising in that Driffield was only the sixth largest country town at this date and was ranked only eighth in the provision of retail services and fourth for professional services. Bridlington had lost ground to Malton, while Selby had also lost ground although, as figure 4.1 shows, the town had extended its market area. At the lower end of the hierarchy Hornsea and Hedon had both suffered an apparent decline in their nodal importance, while the towns of Patrington, South Cave and Kirkby Moorside had increased their share.

(c) Connectivity

Of equal importance to a settlements' relative standing within the regional hierarchy is the degree of connectivity attained between that centre and other component centres of the system. As previously stated, settlements with a greater number of maximum direct linkages will be of higher order than those with indirect and poor communication flows. Contemporary studies of connectivity within regional urban systems have frequently employed telephone

communication data, extending the earlier work of Christaller which had utilised the ratio of telephones to population as one measure of centrality. Davies and Lewis, for example, incorporated this type of data into their analysis of urban connectivity in Wales, and Davies employed telephone calls in his multivariate analysis of connectivity in Montana[9]. Other, and earlier, studies in this field, for example those of Green and Carruthers, utilised cruder measures, such as motorbus services, to indicate the nodality of individual centres[10]. For temporal studies of the nineteenth century and earlier more sophisticated measures are unavailable and it is to simpler data bases, principally those relating to transport flows, that resort must be made.

Figure 4.2 maps inter-urban communications flows as evidenced by information on carriers' carts for each of the study dates. At the close of the eighteenth century inter-urban linkages were ill developed, many towns not being connected on any regular basis to other towns; the most important routes and main lines of communication focusing on the regional centres of York and Hull. Within thirty years, however, a comprehensive system of linkages had become established with even the smallest centre being connected to two or more of its regional counterparts. While many of the linkages still focused on eastern Yorkshire's two regional centres, individual country towns were displaying an unprecendented degree of nodality. Driffield, Beverley, Scarborough and Malton were each developing as significant intra-regional nodal points, while on the periphery of the region Selby and Thirsk were clearly becoming of inter-regional importance. While by 1850 this earlier pattern had been consolidated, there had also been a small degree of rationalisation. Some of the inter-regional links, particularly those in the northwest of the region which had previously operated from Thirsk and that in the south of the region between Selby and Manchester, had been cut or reduced in number, while the importance

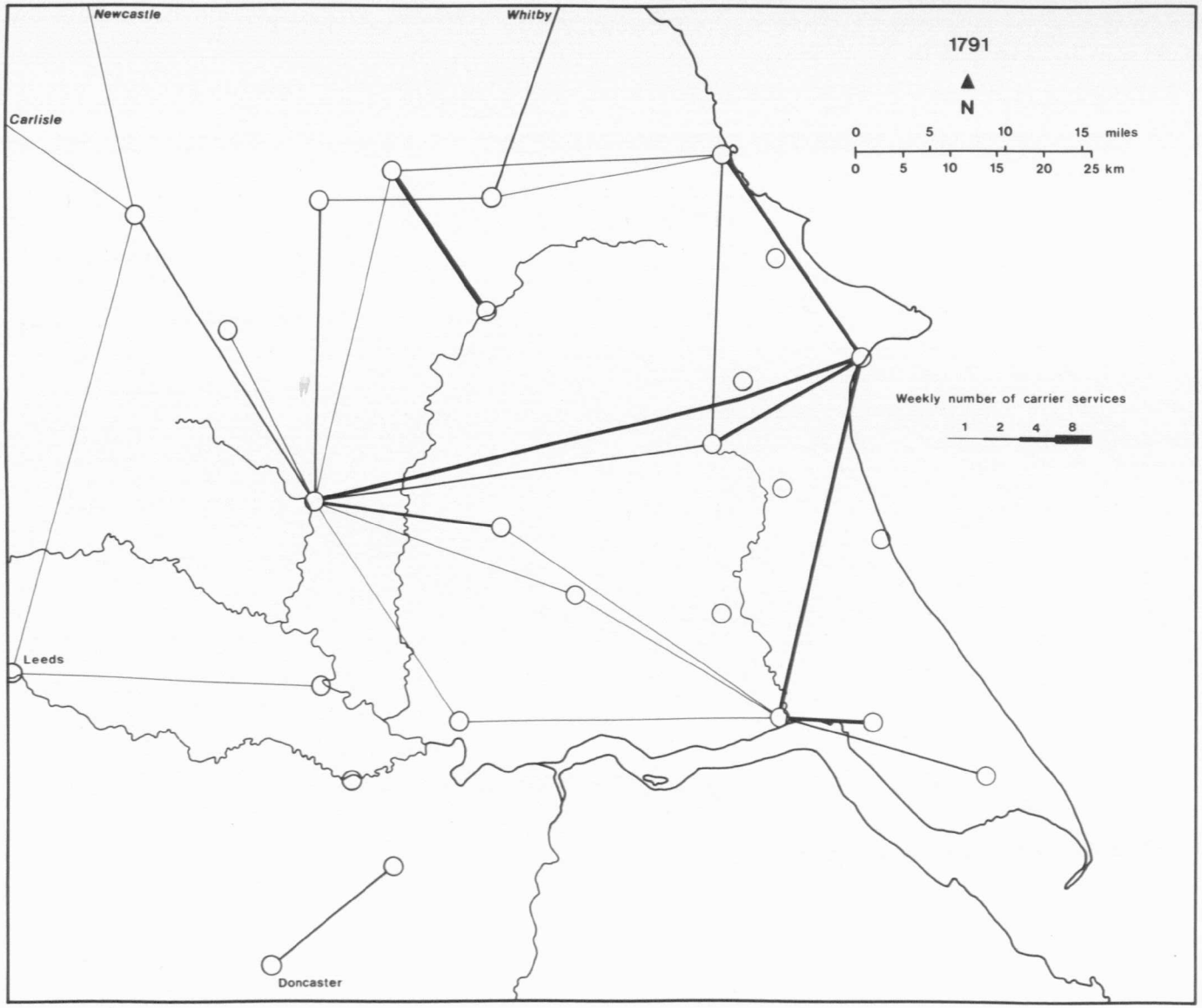

Fig.4.2 Inter-Urban Communication as Evidenced by Carriers Carts, 1791-1849

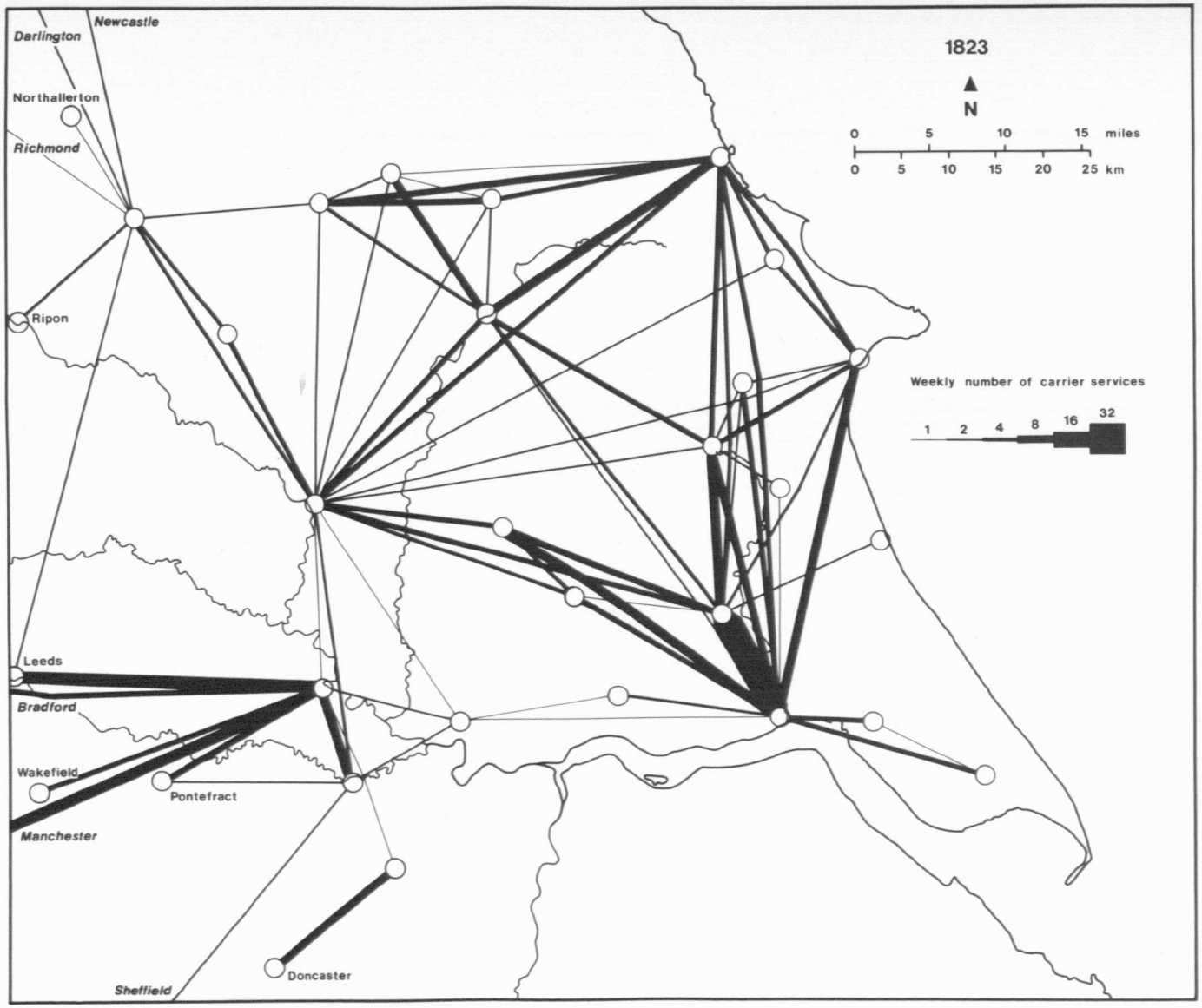

Fig.4.2 (Continued)

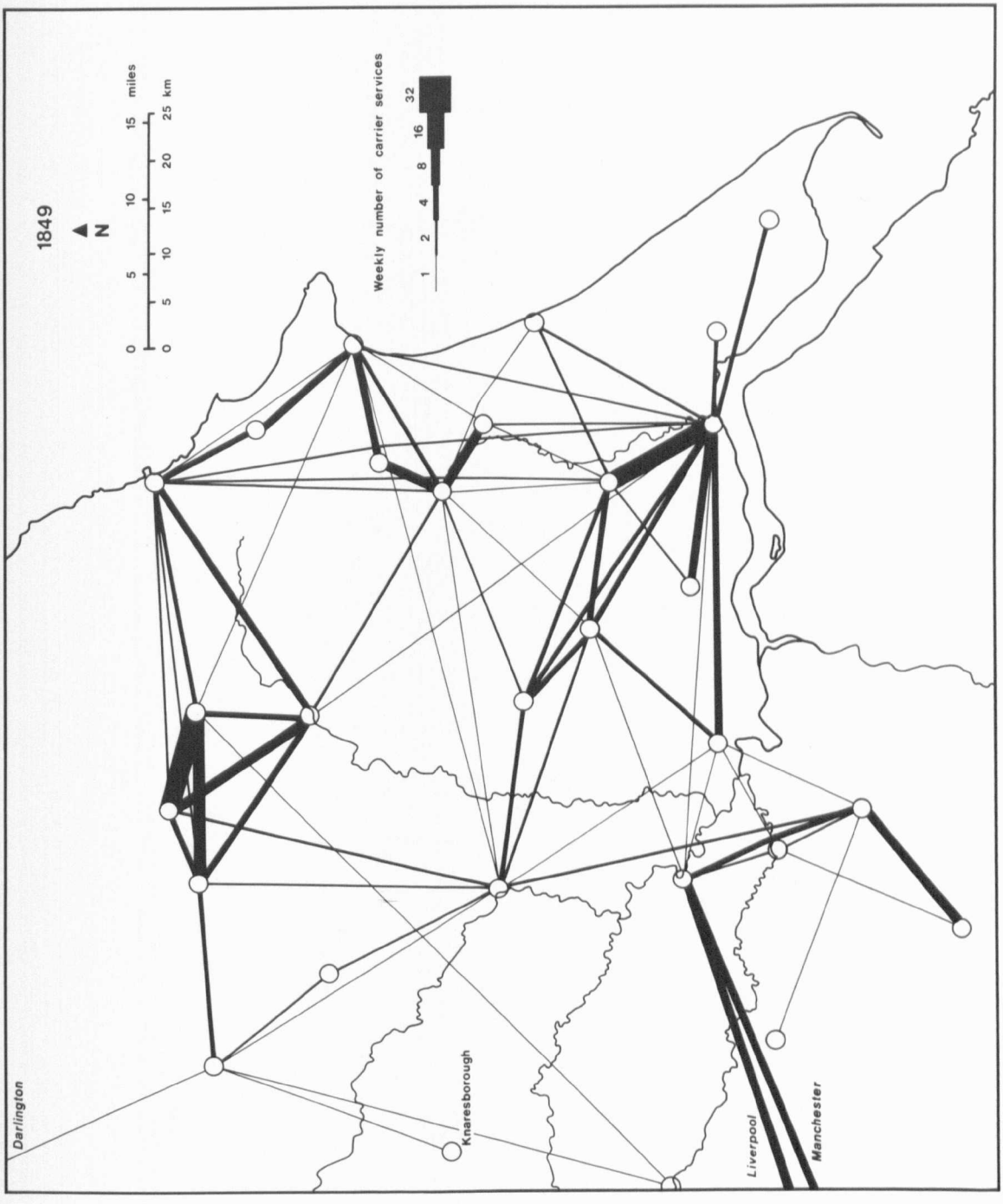

Fig.4.2 (Continued)

of road links to York appeared of lesser significance: the direct service from Hunmanby to York had disappeared as had that from Pickering to the same city. Explanation of this rationalisation must principally be attributed to the growing importance of rail links within the region; the Leeds-Selby line, for example, having opened in 1834 and that from Selby to Hull in 1840. Within the more rural part of eastern Yorkshire, however, road links remained of considerable importance. The most important inter-urban focal point by mid-century was Great Driffield, aptly dubbed as the 'Capital of the Wolds' by contemporaries[10]. The town had developed direct links with almost every town in eastern Yorkshire east of York and through its link with Malton was also connected indirectly to centres in the northwest of the region. Several other middle-order centres, in terms of size and functional provision, were also emerging as significant nodal points; in particular Market Weighton, Pocklington and Howden, each situated within the administrative area of the East Riding.

(d) Nodal Hierarchy

In terms of nodality, therefore, as well as centrality, country towns form a distinct hierarchical structure (figure 4.3). In the early decades of the nineteenth century five orders of settlements are clearly distinguishable with a continuum characterising towns ranked from eleven to twenty-three. By mid-century the nodal structure of the region was clearly becoming more complex, constituting six orders of settlement and a much less marked continuum among the lower ranked centres. This picture of the nodal hierarchy of settlements in eastern Yorkshire is further substantiated by information on coaching services and administrative functions.

Coaching services to towns in all parts of England and Wales became widespread with the advent of turnpike trusts from the early eighteenth century[11]. As table 4.3 shows, towns in eastern

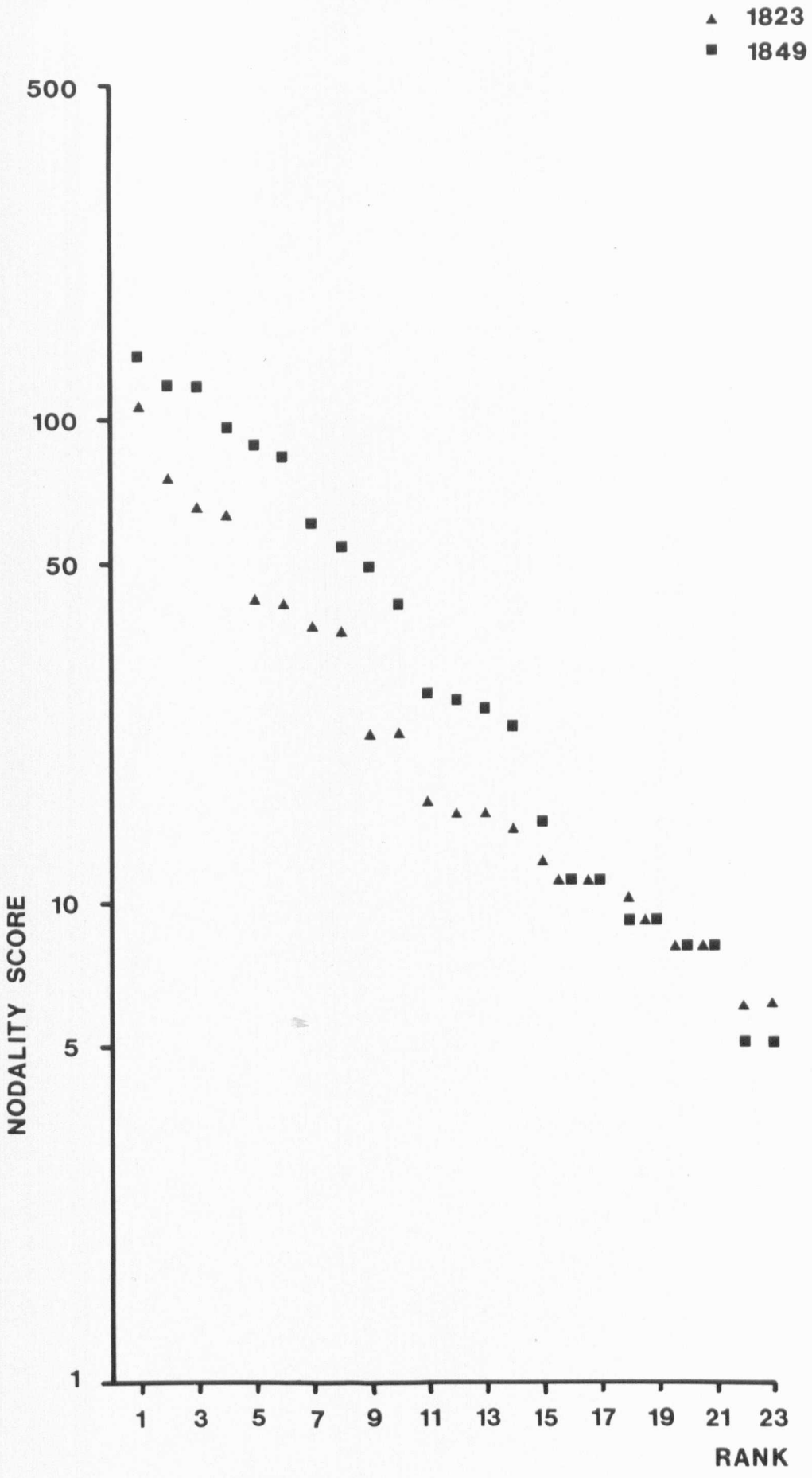

Fig.4.3 Rank-Array of Nodality, 1823-1849

Table 4.3 Coach Services to Eastern Yorkshire Towns, 1791-1849

	1791		1823		1849	
Town	NPS	NPW	NPS	NPW	NPS	NPW
Driffield	4	10	2	14	0	0
Beverley	NA	NA	3	65	2	20
Selby	0	0	5	47	2	12
Thirsk	4	5	17	154	0	0
Thorne	0	0	3	28	2	7
Bridlington	0	0	2	21	0	0
Howden	0	0	2	14	0	0
Patrington	1	2	1	1	1	16
Market Weighton	2	30	2	35	1	7
Helmsley	1	2	0	0	1	3
Pickering	2	6	2	6	0	0
Easingwold	1	7	3	49	0	0
Scarborough	NA	NA	8	63	0	0
South Cave	0	0	2	14	1	7
Hedon	0	0	2	10	2	30
Hornsea	0	0	1	6	1	16
Malton	NA	NA	3	30	0	0
Pocklington	0	0	0	0	0	0
Snaith	0	0	0	0	0	0
Kilham	0	0	0	0	0	0
Hunmanby	0	0	0	0	0	0
Kirkby Moorside	0	0	0	0	0	0
North Frodingham	0	0	0	0	0	0

NPS = Number of places served

NPW = Number of services per week

Yorkshire participated in this trend. At the close of the eighteenth century services were generally fairly limited, but within three decades, all but the smallest centres of the region had coaching links to two or more centres. The nodal hierarchy for coaching services does, however, display some differences to that found for carriers carts. While Malton, Selby, Driffield, Scarborough and Beverley remained among the best served towns, the most important nodal centre emerges as the North Riding town of Thirsk, not surprising in that its situation on the Great North Road gave the town links to a large number of centres stretched in a north-south axis from London to Edinburgh. Easingwold, with a similar location, was also well served by coaches although connected to far fewer places than its neighbour Thirsk. The hierarchy of 'coaching' nodality had largely broken down by mid-century due to the acquisition of rail links by most of the region's towns. It is notable that by this date the best served towns were Hedon, Hornsea, Patrington and South Cave each of which had still to be connected to a regional railway.

Odell has demonstrated that administrative areas can also be of some use in investigating the degree of nodality and the sphere of influence attributable to a particular town[12]. One of the most satisfactory employable units are the Poor Law unions which were set up between 1835 and 1838 and equated closely with polling districts[13]. Various official records indicate that the variables employed in determining the spatial extent of Poor Law unions included local convenience, local communications, the movement of farmers and others into local market towns and, occasionally, detailed local surveys of the area served by a town for marketing[14]. Other factors that may have been included in the decision were the size of the local population, the extent of pauperism and the available workhouse accommodation[15]. Poor Law unions may, therefore, provide a measure of the possible extent of the

Table 4.4 Poor Law Unions and Eastern Yorkshire Country Towns

Union Head	Union Areal Extent (Acres)	Population Town 1851	Population Union 1851
Scarborough	81,460	12,158	24,615
Beverley	78,434	8,915	20.040
Malton	112,407	6,156	23,128
Bridlington	67,984	5,839	14,322
Selby	53,764	5,340	15,429
Great Driffield	105,114	3,963	18,265
Thorne	71,946	3,484	15,886
Pickering	88,062	3,112	9,978
Thirsk	62,444	3,001	12,760
Pocklington	107,636	2,545	16,098
Howden	72,253	2,491	14,436
Easingwold	68,623	2,240	11,450
Patrington	88,872	1,827	9,279
Helmsley	150,487	1,481	12,455
MEAN -	86,392		15,582
S.D. -	25,396		4,598
Subdistrict of Unions			
Market Weighton (Pocklington)	32,400	2,001	5,145
Hedon (Skirlaugh)	8,948	1,027	2,109
Snaith (Selby)	11,829	840	2,552
Hunmanby (Bridlington)	30,257	1,291	3,829
Hornsea (Skirlaugh)	14,327	945	2,309
Kirkby Moorside (Helmsley)	58,631	1,835	5,623
South Cave (Beverley)	20,354	937	3,283
MEAN -	25,250		3,550
S.D. -	17,222		1,890
Country Towns not designated Union Heads or Subdistricts			
Kilham		1,247	
North Frodingham		846	

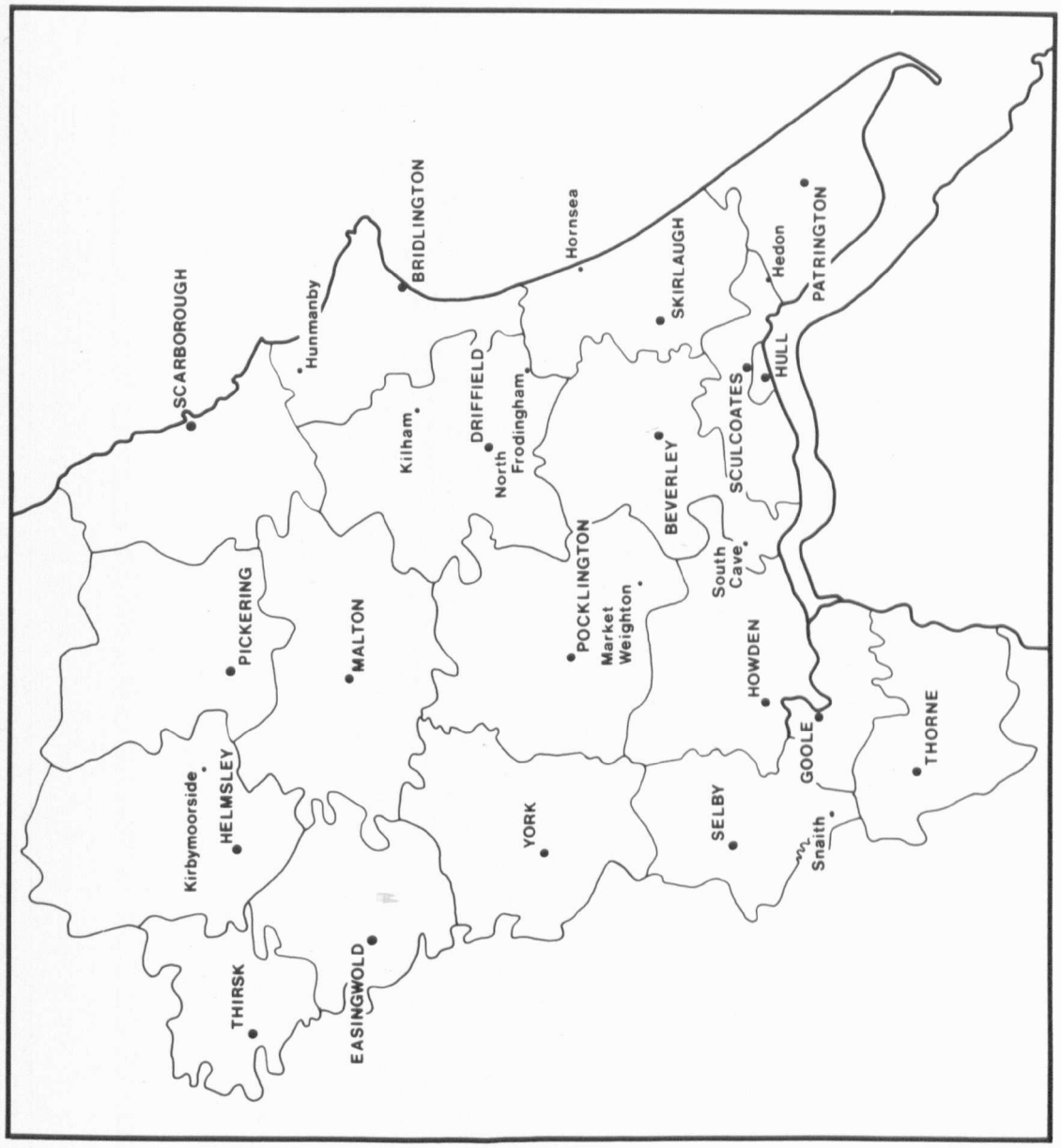

Fig.4.4 Poor Law Unions of Eastern Yorkshire

hinterland of country towns.

Of the twenty three country towns of eastern Yorkshire, fourteen were heads of Poor Law unions covering areas ranging from 53,700 acres for Selby to 150,000 for the North Riding town of Helmsley, and each having hinterland populations of the order of 15,600 persons (figure 4.4 and table 4.4). Towns designated as union heads were the largest of the region's country towns in terms of size with one notable exception. In the northwest of the region Kirkby Moorside with a population of 1,800 at mid-century was a subdistrict of Helmsley union, yet the town of Helmsley only had a population of 1,500 at the same date. There was an obvious correlation between town population and that of its union, calculation of the Pearsonian Product moment-correlation coefficient giving a value of 0.81 significant at 95%. The relationship between areal extent and town size, however, showed little apparent correlation, the coefficient being -0.218. Among the subdistricts of the unions similar relationships are substantiated. Clearly, therefore, in terms of the areal designation of Poor Law unions, the hinterland population was one of the most significant factors, an area extensive enough to give a catchment population approaching 10,000 persons or more being a major consideration.

Evidence from the Poor Law union administrative areas thus provides additional support for the nodality rankings obtained from the analysis of carrier and coach services to eastern Yorkshire towns. Scarborough, Beverley, Bridlington, Malton, Great Driffield and Selby served the largest hinterland populations[16] and attained the highest nodal scores for the two nineteenth century study dates. A centre's nodality or accessibility must, therefore, be seen as a further important aspect of selective urban growth among country towns in the eighteenth and nineteenth centuries.

The analysis so far has suggested that towns can be grouped into a hierarchy on the basis of their economic and demographic experience as measured by centrality, nodality and population growth; but a synthesis still needs to be made of the characteristics of towns at each level of the hierarchy, which demonstrably became more complex over the study period. Furthermore, not all towns attained the same level in respect of each variable and this adds further complexity to the analysis of eastern Yorkshire's urban settlement system. In attempting to 'characterise' towns at each level of the hierarchy and to separate distinct types over a span of a century and a half, a major consideration becomes the nature of the typology to be adopted.

2. Classifying Towns - Urban Typologies

The classification of towns has rested largely on an examination of their functions, in particular focusing on the nature of their specialized functions performed for a non-contiguous and non-local area[17]. While researchers adopting classificatory procedures to analyse towns would argue that their schema have both a scientific approach and a theoretical base, Smith in his review paper states

> "After a thorough review of a large number of these studies, one is drawn to the conclusion that specific geographic objectives usually are difficult to discern in the statements of purpose appearing in functional classifications of towns..... Too often it appears that a major purpose of these studies has been the development and presentation of a different classificatory methodology as an end in itself..... If functional classifications of towns are to be justified geographically, the groups derived should display characteristics in addition to their functional similarity."[18].

He concludes that two accessory and dominantly spatial characteristics must be associated with town function; first, distributional characteristics of towns in certain classes that are peculiar to those functional classes, and second, that different functional classes should be associated with different hinterland areas[19]. Smith is thus providing support for the view that

central-place analysis alone is insufficient to fully explain town distribution, but needs to be integrated with explanations derived from specialized activities[20].

As in other branches of geography, the functional classification of towns has passed through distinct methodological stages, each characterised by an increasing degree of complexity. The first studies, such as that of Aurousseau[21], were based on simple general description and were subsequently followed by more statistical descriptive analyses undertaken by, for example, Harris, and Duncan and Reiss[22]. The subjectivity of such approaches was, however, recognisably a draw back and the next stage witnessed functional classification based on statistical analysis derived from the raw data. In this approach, there was usually some attempt to relate the ratio of local employment to some county or national average[23]. Pownall, Nelson, Dick, and Carter, in his study of the towns of Wales, each adopted such an approach identifying communities as mining, manufacturing or multi-functional for example[24]. The major objection to this type of analysis is that it seldom has universal application, for the diagnostic ratios are clearly related to the character of the area under study[25]. Similar criticisms also apply to the related approach, that of employing the concept of the economic base of a settlement - as introduced by Hoyt in 1939[26] - as a means of classifying towns. Studies such as those by Alexandersson, and Ullman and Dacey seek to define the basic and non-basic ratios in their respective centres, the latter compiling an Index of Diversity as a method for determining the degree of specialisation in any town[27].

More recently classifications based on multivariate statistical analysis have become the norm, partly in response to criticisms of earlier schemes that were based on only one set of data. One of the earliest examples of such an approach is the

study made by Moser and Scott of British towns in 1961. They analysed all towns in the British Isles with populations in excess of 50,000 persons in 1951 in respect of 57 variables grouped into, (a) population size and structure, (b) population change, (c) households and housing, (d) economic character, (e) voting behaviour, (f) social class, and (g) health and education[28]. After conducting a principal components analysis on the data, they obtained a broad three-fold classification of towns: (i) resorts, administrative and commercial towns, (ii) industrial towns and (iii) suburbs and suburban type towns, each further divisible into a number of sub types[29]. A similar study was undertaken by Berry in the United States[30]. Working from the postulate that the similarities of cities are due to certain fundamental 'latent' traits such as social status and culture, he employs factor-analysis to search for

> "these causal factors, by separating and identifying clusters of closely interdependant variables whose interpretation is keyed to latent structure and process"[31].

He finds twelve latent dimensions of the American S.M.S.A.'s; the four most significant loadings relating to socioeconomic status, age and size, population composition and recent service orientated growth[32]. He concludes his analysis with five hypotheses which he argues provide a much needed basis for a systematic comparative classification of cities.

(a) "The economic base of urban centres tends to act independantly of other urban structural features..... each broad economic function will lead to its own distinctive economic town type."

(b) "Every urban system is an organised system made into a hierarchy of centres based on aggregate economic power."

(c) "The principal determinants of socio-economic differentiation are social status and age structure."

(d) "Culturally homogenous societies will be characterised by separate ethnic or racial dimensions if the cultural groups are clustered in particular cities."

(e) "Each new stage of growth will act independantly of prior structural features if it is based on innovative growth leading to structural transformations."[33].

Berry thus lends little support to schemes which distinguish towns by their economic base, except in the case of market-orientated activities, but argues that it is the broader socio economic dimensions which should be utilised as the real bases for contrast[34].

Few classificatory or grouping schemes, however, have sought to break away from the centrality approach or the functional approach: thus, Davies points out,

> "Most workers have been content to establish functional classifications of places and/or their spheres of influence. Certainly the diurnal functioning of the system, or the growth and development of the system have received short shrift"[35].

Furthermore, most studies have concentrated on the characteristics of individual centres rather than treating the whole network[36]. Davies perhaps stands alone in seeking to combine measures of population change, centrality and functional specialisation in one analysis, incorporating additionally a temporal element seldom encountered in other studies of settlement systems[37]. As yet there still remains to be formulated any classification or typology for towns based on the related elements of economic status and demographic change in a temporal context, although clearly the studies of Moser and Scott and Berry go some way towards meeting this requirement[38]. It is suggested here that, in the light of the variables analysed, any typology formulated in a temporal perspective must be based not on functional classification or centrality rankings but on the nature of the growth experience, both demographic and economic, of the towns functioning as an integrated system.

3. A Typology of Eastern Yorkshire Country Towns

The analysis of selected demographic and economic variables for eastern Yorkshire towns in the period 1700 to 1850 suggests that the fortunes of towns and their growth experience varied both

temporally and spatially. A process of selectivity of growth was clearly operative, giving certain centres increased demographic status and economic power, whilst rendering other towns unable to maintain their relative standing within the regional settlement system, leading to stagnation or decline and in certain cases loss of urban status. As has already been stated, eastern Yorkshire was an area that saw no phase of urban genesis in the course of the eighteenth and nineteenth centuries; the only new town entering the system being the canal port town of Goole which in fact did not achieve recognisable urban status until the period after 1840[39].

Demographic analysis, functional and centrality scores, and nodality scores each testify to the growing complexity of the system over time. The simple three-tier hierarchy that characterised towns at the start of the eighteenth century was replaced by a five-order hierarchy a century later and one comprising seven orders by the mid-nineteenth century if the provincial centres are included in the analysis. At the head of the hierarchy were the regional centres of York and Hull and the county towns of Beverley and Scarborough, while at the base were the smallest centres of North Frodingham, Hunmanby, Kilham, Hornsea and South Cave, centres that had only marginal urban status in 1700 and which subsequently saw a further erosion of their regional position in the ensuing period. It has been demonstrated that there were considerable changes of position among the country towns of the region, particularly those that comprised levels three-to-five of the demographic and economic hierarchy in 1850; yet it is this group, namely market towns, that have received the least attention in academic literature[40]. The fortunes of regional centres, or provincial centres, are generally well documented as they enjoyed, along with emerging industrial towns, unparalleled growth in the period after 1750[41], while the larger country towns such as the county town of Beverley and the resort and spa of

Scarborough have also received a fair amount of academic attention[42]. It is among the mass of country towns that the whole process of selective urban growth is least understood in this critical transitional period of the eighteenth and first half of the nineteenth century. A typology is therefore proposed that may shed some new light on the growth experience of country towns in this period in relation to what was happening in the total urban system.

It must be emphasised at this point that any typology is of necessity an over-simplification of reality, for in practice it would be possible to identify as many types as there are towns. Formulation of simple typologies, however, have inherent advantages in that they allow comparative generalisation to be incorporated into the analysis, but at the same time also permit the designation of sub-types within the broadly defined groups. Carter, for example, in his study of the towns of Wales, considers his classification, 'market towns' to be a heterogeneous group capable of further division into thriving, intermediate, small and declining towns, although this typology is not based on analysis of the growth experience of component centres but on the presence or absence of previously defined attributes[43]. Furthermore, any typology relating to a temporal perspective, particularly the eighteenth century and earlier, faces difficulties in that because requisite information sources are seldom uniformly available for all towns under consideration, there are unavoidable gaps in the data base.

Country towns, (incorporating into this broad heading both county towns and declining market centres) underwent one of four growth experiences in the period 1700 to 1850; dynamic growth, expansion, stability, or decline. Accordingly four 'labels' can be attached to these towns of 'dynamic centres', 'expanding centres', 'stable centres' and 'declining centres'. Into what category, therefore, do each of the country towns of eastern

Table 4.5 Designation of Country Towns by Type

Town	Variables				
	Economic	Demographic	Nodal	Social	Designation
Scarborough	D	D	D/E	D	D
Driffield	D/E	D	D	D	D
Malton	D	D	D	D	D
Selby	D	D/E	D	E	D
Beverley	E	E	E	E	E
Bridlington	E	E	E/D	E/D	E
Market Weighton	E	E	E	E	E
Pocklington	E	E	E	E	E
Thorne	E	E	S	E/D	E
Patrington	S	S	S	S	S
Kirkby Moorside	S/De	S	E	S	S
Howden	S	S	S	S	S
Thirsk	S	S	S/De	S	S
Easingwold	S	S	S/De	S	S
Pickering	S	S	S	S	S
Hedon	S	S	S/De	S/De	S
Helmsley	S	De	S	S	S
Snaith	S	De	S	S	S
Kilham	De/S	De	S	De	De
South Cave	De/S	De	S	De	De
North Frodingham	De	De	S	NA	De
Hunmanby	De	De	S	De	De
Hornsea	De	De	De	S	De

D - Dynamic De - Declining E - Expanding S - Relatively Stable

Yorkshire fall, and what were the characteristics of each town type? The designation of towns into each type is based on a synthesis of the previously analysed demographic and economic variables, incorporating additionally a measure of community or social status based on information recorded in the study directories relating to the provision of social services, religious and cultural societies and public utilities within each centre[44]. (See Appendix IV). The country towns of eastern Yorkshire divide rather unevenly among the four types. Four towns can be designated dynamic centres, five as expanding, nine as relatively stable and five as declining (table 4.5).

(a) Dynamic Centres

Four towns, Scarborough, Malton, Selby and Great Driffield underwent a dynamic process of growth in the course of the eighteenth and nineteenth centuries. Demographically they experienced the highest rates of growth among the region's towns and significantly increased the percentage of the regional urban population dwelling within them. Economically their functional status within eastern Yorkshire was subject to considerable expansion, while they also emerged as social and nodal centres of regional significance. Although other centres experienced dynamism in certain sectors, only these four towns demonstrated sustained growth across all sectors of urban life.

In population terms, each centre represented a distinct level of the size hierarchy of all towns, Scarborough being the largest of the country towns, Malton and Selby occupying the third level in 1850 and Great Driffield the fourth. Significantly these towns frequently experienced growth rates in excess of those of the regional capitals of Hull and York. For example, average decennial growth in Hull was 12.4% in the period 1700 - 1750 while that for Scarborough was 38.3%, while in the first half of the nineteenth century the decennial growth rate for the former was almost 26% but

in the Wolds town of Great Driffield it was more than 36%. Over the study period, the population of Great Driffield increased sixfold and that of Scarborough, Malton and Selby fivefold. Each centre also increased its share of the regional urban population concentration by an amount well in excess of the mean value. This stood in contrast to other towns whose total share generally declined and if increased, was of less than one percent (table 4.6).

The functional role of these four towns also dramatically expanded during the course of the study period. By the close of the eighteenth century each had come to occupy a fairly important position with regard to the servicing of eastern Yorkshire; a position that was reinforced in the following half century. In each town the percentage increase in retailing units over the period 1790 to 1850 was in excess of 250%, reaching a staggering 1,300% in Selby. Development of professional functions was of even greater magnitude, the centres registering fourfold increases. Not surprisingly the contribution made to regional centrality by each town also rose; the exception being the town of Scarborough which lost some of its regional hegemony as other towns developed their functional role.

Spatially these settlements were all placed at some distance from each other, they were each able to draw on trade from more than one geographical region and they all had access to a navigable link of some kind: Scarborough by sea, Malton and Selby by river and Great Driffield by canal. The comments of contemporaries attest to the reasons for the dynamic growth of these towns. For Malton, Selby and Driffield the primary reason was trade, stimulated in all three cases by the development of navigable links. The opening of the Derwent Navigation in 1702 was said to have afforded Malton

> "a facility for the transmission of corn, butter, hams and other articles of provision to Hull, Leeds and various places"45;

Table 4.6 Characteristics of Eastern Yorkshire Towns by Type

Key to Variables.

RC = Total rank change in population status, 1700-1851.

SGRR = Standard population growth rate by region.

SGRG = Standard population growth rate by group size.

a = 1700-1751

b = 1750-1801

c = 1801-1851

H = High growth rate, i.e. over 1 S.D. above mean value.

M = Medium growth rate, i.e. between +1 and -1 S.D.s around mean value.

L = Low growth rate, i.e. more than 1 S.D. below mean value.

SG = Movement through size groups (no. of groups moved).

PC = % increase in share of regional urban population concentration 1700-1851.

* = Score of over 1 S.D. above mean.

x = Score of over 1 S.D. below mean.

FSR = Functional score rank c.1810-1815.

IFUR = % Increase in number of retailing functional units (1791-1849).

IFUP = % Increase in number of professional functional units (1791-1849).

RRC = Total rank change in aggregate position for retailing and professional activity 1791-1849)

IC = % Increase in regional centrality contribution, (1823-1849).

SSR = Total rank change in social rank, (1791-1849).

NS = Nodal Score - 1849.

Table 4.6 Characteristics of Eastern Yorkshire Towns by Type

Sample Variables

Town	RC	SGRR a	SGRR b	SGRR c	SGRG a	SGRG b	SGRG c	SG	PC	FSR	IFUR	IFUP	RRC	IC	SSR	NS
Scarborough	1	H	L	M	M	M	M	2	6.0*	5	612.7	442.1	0	-4.3[x]	0	89*
Malton	1	M	M	M	M	H	M	2	2.2*	2	24.7[(1)]	63.9[(1)]	1	0.3	4.5	119*
Great Driffield	9	M	H	H	M	H	H	2	2.4*	4	266	391.7	0	1.5	10	135*
Selby	1	M	H	M	L	H	M	2	1.7	3	1,318.7	512.5	11	5.4*	3.5	83
Beverley	-1	M	M	M	M	M	M	2	-0.6	1	228	440	1	-8.0[x]	2	119*
Bridlington	-1	M	M	M	M	M	M	2	0.7	6	106.1	400	-3	-2.6	9	97*
Market Weighton	3	M	M	M	M	M	M	2	-0.2	14	83.7	214.3	-3	1.1	-6.5	60
Pocklington	2	M	L	H	M	M	H	2	0.1	11	172.7	355.5	-1	-0.3	4	54
Thorne	0	M	M	L	M	M	L	1	0.0	13	-7.7[(1)]	566.6	8	1.1	10	26

(1) 1823-1849 only.

Table 4.6 (continued) Sample Variables

Town	RC	SGRR a	SGRR b	SGRR c	SGRG a	SGRG b	SGRG c	SG	PC	FSR	IFUR	IFUP	RRC	IC	SSR	NS
Patrington	2	M	H	M	M	M	H	1	-0.1	19	221	175	0	-0.2	- 5	9
Kirkby Moorside	0	H	M	L	M	M	M	1	-0.5	7	100.0	90.9	-5	-0.2	6.5	41
Howden	-2	M	M	M	M	M	M	2	-0.8	10	125.9	131.2	-3	-1.0	- 3	49
Thirsk	-1	H	M	M	H	M	M	2	-0.4	15	277.8	258.3	0	-3.5[x]	- 9	25
Easingwold	-1	M	M	M	M	M	M	2	-0.6	8	139.3	175	-5	0.3	- 1	5
Pickering	-3	H	L	M	H	L	M	1	-1.4	9	23.6[(1)]	300	7	0.4	- 8.5	27
Hedon	-1	M	M	M	M	M	M	1	-1.0	11	182.3	300	-1	-0.2	- 4.5	5
Helmsley	-6	H	L	L	H	L	L	1	-2.0[x]	20	27,6[(1)]	375	-1	-0.5	- 2	23
Snaith	-1	M	M	L	H	L	M	1	-0.8	16	131.8	350	-5	1.2	- 2.5	14.5
Kilham	2	M	M	M	M	M	H	1	-0.5	21	283.3	600	-1	0.0	-10.5	8
South Cave	-2	M	M	L	M	L	M	0	-1.0	22	38.0[(1)]	85.7[(1)]	3	0.1	- 2	11
North Frodingham	1	L	M	H	M	M	M	1	-0.5	23	NA	NA	NA	NA	NA	9
Hunmanby	-4	L	M	M	L	M	M	1	-1.6	17	136.4	75.0	-4	-0.1	- 2	11
Hornsea	1	L	H	M	L	H	M	1	-0.7	18	162.5[(1)]	80.0[(1)]	-1	0.1	1.5	8

(1) 1823-1849 only.

over 56,000 quarters of corn having been shipped from Malton as early as 1796[46]. The "brisk market town" of Selby[47], situated in close proximity to the Ouse and having a navigable canal to Leeds, had the advantages of being an unloading point of the West Riding and a principal thoroughfare to Hull, giving the town a flourishing trade and

> "an expeditious intercourse of commerce between the great manufacturing districts and Hull"[48].

By the mid-nineteenth century the town had the additional advantage of direct rail links with the West Riding.

Scarborough's dynamism was less attributable to trade than to the towns development as a principal east coast resort, frequently dubbed the 'queen of watering places'[49]. Certainly by the early-nineteenth century the trade of Scarborough was said to be on a contracted scale, the town's lack of navigable communication with the interior of east and north Yorkshire being an impediment to further commercial development of the town[50]. Nevertheless, Scarborough enjoyed sustained growth, despite a declining commercial role, for the dual advantages of mineral springs and sea bathing brought a great influx of visitors in the summer months who were said to be a "stimulus to the internal trade of the place"[51].

(b) Expanding Centres

Beverley, Bridlington, Thorne, Market Weighton and Pocklington also increased their economic, demographic and social status, but on a lesser scale; growth not necessarily being sustained across all aspects of urban living. Demographically, like dynamic centres, they each rose through two size groups in the course of the study period but their growth rate was average, only the town of Pocklington ever having a rate in excess of regional or group average, in the first half of the nineteenth century (table 4.6). The towns in this group were by no means homogeneous, they included a county town, a port and resort and three market towns, each type occupying different levels of the urban size hierarchy throughout

the period. Population expansion in these towns over the period 1700 - 1851 was three and a half times, but only Bridlington and Pocklington made small net increases in their share of regional urban population concentration.

Functionally they also occupied distinct levels in the regional urban system and each witnessed a significant expansion in their service activities. Increase in retailing establishments generally more than doubled while professional services expanded by more than 350% in four of their number. In certain respects, measures of aggregate servicing and centrality mask the development that was taking place in these expanding centres, for while contribution to regional centrality and aggregate servicing declined in three of the five towns, it was of relatively small magnitude and led to no erosion of regional status. Within an apparently stable functional standing in eastern Yorkshire, towns in this group experienced continued accumulation of specialist retail and professional outlets. Change, as revealed by these figures, is relative, for in absolute terms there was continued expansion of their functional role and status. Herein lies an essential distinction between dynamic and expanding centres. The former increased both their relative and absolute standing in respect of all variables while the latter saw mainly absolute increase, relative increase occurring in respect of only one or two variables. Information on the community status, or growing social role of centres, is evidence of one area in which relative increase took place; all towns, except Market Weighton[52], experiencing a rise in their social standing within the region.

Similar factors to those stimulating the growth of dynamic centres operated in these towns. As an important county town in eastern Yorkshire the continued expansion of Beverley needs little explanation, but the town did obtain an efficient navigable link to the river Hull with the cutting of Beverley Beck in 1727 which

considerably stimulated both inter- and intra-regional links[53]. In 1823 it was noted that

> "the canal affords great facilities to trade by opening up a communication with the Humber and coals are brought in large quantities to the staiths for the interior supply of the East Riding. Here is likewise a trade in malt and leather..[54].

Thorne was by the mid-nineteenth century also considered to be

> "a place of considerable trade, which is much improved by its navigation"[55],

vessels trading regularly between the town and London[56]. Similar accounts attest to the importance of the navigational links obtained by Pocklington and Market Weighton in the course of the eighteenth and nineteenth centuries[57]. One of the most important factors leading to the expansion of these towns was, therefore, their degree of nodality. Market Weighton's situation on the principal thoroughfare and post route between York and Hull brought considerable trade to the town, rendering its market and fairs of more than local importance[58].

Bridlington enjoyed a similar if tempered position to that of Scarborough, the town also suffering from the inadequacy of its communications with the interior of the East Riding. It was noted at the turn of the eighteenth century that

> "the opening of the navigable canal to Driffield and the central situation of that place have caused the corn trade at Bridlington to decline"59.

By the mid-nineteenth century the principal commerce of the town related to retailing[60]; the developing function of the town as "a considerable resort of genteel company in the summer season"[61] having replaced in some measure the traditional trading role of the community. But all these expanding towns had fairly well developed communications systems with other towns of eastern Yorkshire (figure 4.2), although not of the extent of the dynamic centres whose contacts stretched to almost all corners of the region.

(c) Stable Centres

The majority of the country towns of eastern Yorkshire, nine in number, fell in this category. This is not surprising for, in a region bereft of any major industrial development, there was clearly room for only a small number of centres to further their regional position. The towns comprising this group, namely Patrington, Kirkby Moorside, Howden, Thirsk, Easingwold, Pickering, Hedon, Helmsley and Snaith (table 4.5), enjoyed mixed fortunes over the period 1700 - 1850. Demographically they all increased their population, but, apart from the first half of the eighteenth century, growth rates were never over the range of one standard deviation above the mean, and in the case of Helmsley, Snaith and Pickering were frequently one standard score or more below the mean value (table 4.6). Seven of the nine towns lost rank in respect of their population totals, Helmsley falling six places. Their contribution to regional urban population concentration also fell, by one per cent or more in Pickering, Hedon and Helmsley, and between 0% and 1% in the remainder. On average, the percentage of regional urban population residing in these places by the mid-nineteenth century was between only one and two percent.

Economically many of these towns experienced a relative loss of functional standing within the regional settlement system, but like their expanding counterparts they still accumulated additional service functions over this transitional period. Total percentage increase in retailing functional units was over 100% in all towns[62], and in professional service units more than 250% in five of their number. The greatest loss of functional status seemed to occur around the turn of the eighteenth century; but in the second quarter of the nineteenth century many of these settlements regained, in small measure, some of the lost ground, rendering the return to a more stable functional role. (Figures 3.4 and 3.7).

Some explanation is perhaps needed as to why settlements which

were apparently losing a measure of relative standing within the urban system should be dubbed 'stable'. Although they all experienced relative loss, in absolute terms each gained in population and in functional strength, additionally acquiring community and social functions for the first time. All these towns maintained their position as middle to low-order centres in the regional urban hierarchy, generally occupying demographic and functional rank positions of between nineteen and ten, any jockeying for position occurring largely among their own number.

The trade and commerce of these places was not attested by contemporaries to be of any particular significance for the region. All were described as 'small market towns'[63] and one comment made for the North Riding town of Thirsk is particularly apt.

> "As a place of trade or manufacture Thirsk does not take on an elevated station. Linen weaving is carried on to a limited extent as are also brewing and malting and there are some mills for grinding corn"64.

It was frequently noted that the manufactures of these places were inconsiderable[65], with agricultural commerce being their chief support. Several of their number, notably Hedon, Pickering and Thirsk, had formerly been of far greater importance, but the growth of neighbouring towns - Hull in the case of Hedon and Scarborough in the case of Pickering - had seriously affected their regional role.

Just as nodal advantages (particularly those associated with navigation) led to the growth of expanding and dynamic towns, the absence of such links for these stable centres rendered them incapable of expansion on any large scale. Easingwold, with its "inland situation without any navigable communication", was described as having "no great trade except in bacon and butter of which considerable quantities are sent to York and forwarded by water to London"[66]. With the advent of the railway in the second quarter of the nineteenth century even the stability of these towns

was threatened. Easingwold and Thirsk, both lying on the main road from London to York and Edinburgh, were accounted to have been "wholly deprived of this advantage" with the construction of the Great Northern Railway[67].

Spatially the location of these stable towns is interesting; five were situated in the northwest of the region, two in the southwest and two in the southeast. Lying on the periphery of the region, but frequently lacking the degree of nodality necessary to make them inter-regional communication points, their geographical location inhibited the development of intra-regional links. In the northwest of the region early importance of these towns had been closely related to the textile industry but,

> "the introduction of machinery has destroyed the domestic system..... this change has deprived Helmsley of its manufacture and rendered the town almost exclusively dependant on agriculture"[68].

In the southeast it was the continual silting of Hedon and Patrington havens - havens which might have provided both towns with a greater degree of commercial prosperity - that rendered them largely stable; in the southwest the disadvantageous location of Snaith and Howden in close proximity to, but not on, the important navigable routes of the river Aire, and Knottingley to Goole canal, and the Humber respectively, significantly reduced their potential participation in water borne trade.

(d) Declining Centres

The final type of town that can be identified is the declining centre of which there were five in eastern Yorkshire; namely Kilham, North Frodingham, South Cave, Hunmanby and Hornsea. All of these centres had gained market status between the thirteenth and sixteenth centuries[69], but by 1700 many of them could only be considered on the margins of urban status (see chapter 1) for, their markets and fairs apart, they possessed few attributes that set them apart from the rural society which they were designed to serve. The ensuing century and a half saw further reduction in

their relative standing in the urban system of eastern Yorkshire, although there was no uniformity to the timing of their decline. South Cave, for example, in the early nineteenth century made a bid to become a more viable market town; the inhabitants erecting a new market hall and the town acquiring an additional livestock fair in 1831[70].

In population terms the growth of these centres was of very small magnitude during the study period. Four of their number moved upwards through only one size group while South Cave remained in the same population band throughout. Their growth rates were frequently lower than those for the region (table 4.6) and occasionally lower than for their size group. Each centre also saw a reduction in it's percentage share of regional urban population of the order of 0.5% or more, decline being especially marked in Hunmanby. By the mid-nineteenth century less than 1.5% of the region's country-town population resided in each place, and if the regional capitals of York and Hull are included in the analysis, less than 0.6%. These declining towns entered and left the study period at the base of the size-hierarchy with minor changes of position occuring only among their number.

Economically the picture is similar and both the parish register and directory analyses point to the low-order functional role of these settlements. This is not to say, however, that they did not acquire additional functions, but generally the number of new functions accrued was very small. Kilham, for example, increased the number of professional services from one to three between 1791 and 1849 and Hornsea from three to four between 1823 and 1849, while the town of Hunmanby lost services (see chapter 3). Retail functions also generally increased, but again only marginally. The number of retail services performed by South Cave rose from nine to ten during the second quarter of the nineteenth century, and in Kilham from six to seven; Hunmanby again

registering decline with a fall in the number of retail functions from ten to eight. Thus while, as table 4.6 demonstrates, there was an absolute increase in service activity among these centres, it was not accompanied by increased economic diversity characteristic of the higher-order centres. As chapter 3 has shown, the economic structure of these communities was heavily biased towards agriculture and they saw little alteration in the level of agricultural employment at a time when such activity was sharply declining in most country towns[71].

At the start of the eighteenth century, these towns had only small parts of their theoretical market areas not subject to competition from other centres. The low nodality scores attributed to the towns a century and a half later indicate that they had been unable to transcend this situation to develop their market potential. Indeed there is evidence to suggest that, as early as 1790, several of their market trading functions were already in decline, principally due to the close proximity of other better provisioned market towns. The market at Kilham was described as

> "at present dwindled away, excepting for butchers meat, and now and then a little butter owing to the vicinity of Bridlington and Driffield"[72],

and that at Hunmanby as "partly declined"[73]. Sixty years later this position had been consolidated. Hornsea's market had completely disappeared and the principal importance of the settlement was as a bathing place during the summer season[74]. North Frodingham had also lost its market and most of the attendant craft industries, and it was only South Cave which had maintained trading links with other towns and villages in the region with any measure of success.

> "The principal trade of Cave is corn, considerable quantities of which are purchased on the market day and shipped on the Humber for many of the towns in the West Riding, the back cargoes consisting of firestone, lime, flags and coal together with commodities for domestic use and consumption"[75].

The reasons for the maintenance of trade at South Cave, but its

decline at comparable centres are not altogether clear, but much of the explanation must lie in the geographical location of the place. Located at some distance from the neighbouring market centres of Market Weighton and Beverley, and separated from Howden by marsh and the Jurassic belt, South Cave was able to draw on a small, but unrivalled and highly productive agricultural area. Therefore, as the town did not - in contrast to its low-order counterparts - lie within the market area of a large town such as Beverley, Bridlington or Great Driffield, it had a comparative advantage but was still unable to transcend its low-order position.

It is evident, therefore, that country towns underwent different growth experiences in the course of the eighteenth and nineteenth centuries that led to rationalisation within the urban system accompanied by increasing complexity as new and distinct levels were created. Of the four town types identified, it is among the dynamic, expanding and stable centres that the greatest interest lies; for the declining centres were making only a limited contribution to the operation of the urban system in 1700, a contribution that was significantly reduced in the following 150 years, leading to a cessation of their functioning as central places. Analysis of the urban system at the aggregate level, suggests some of the operative processes leading to selectivity of growth, - in particular the stimulus of transport developments on the accumulation and concentration of service activities at selected places within the region -, but cannot fully explain the real determinants of selective urban growth. Clearly, to simply view towns as distribution points in space is to ignore the pattern and process of change acting upon and within the town; change which undoubtedly was one of the main determinants of the role that individual places came to play in the settlement system of any region[76].

In order to understand the nature of selective urban growth, it is necessary to change the focus of analysis from the general structure of the urban system towards the internal and external structure of the component towns. It would be impossible to examine the structure of each of the twenty-three country towns of the region over a fairly extensive period, so it is proposed to analyse selected towns from three of the designated types. The one exception is represented by the declining towns which will not be included in any in-depth analysis. This is for reasons already stated; namely, that in the period after 1700 they made only a negligible contribution to the functioning of the urban system, and selectivity of growth could hardly be considered a factor in their development. An important decision therefore becomes the identification of the towns to form the case studies.

4. The Choice of the Study Towns

The preceding analysis has shown that although country towns can be classified according to their growth experience, the component centres of each town 'type' were of diverse character and size. The expanding county town of Beverley, for example, stands in sharp contrast to the small market centre of Pocklington, and the stable town of Pickering is markedly different to Snaith. In this respect it is difficult to generalise about towns of each 'growth type'; clearly similar growth experiences would have different structural and spatial manifestations according to the character and size of the settlement in question. However, by focusing attention upon case studies from the mass of country towns, it is hoped that the processes behind, and the results of, selectivity of growth will be elucidated.

It was demonstrated in the analysis of demographic and economic change that it was towns in the central area of the region that were subject to the most fluctuating fortunes and greatest

changes of position; having the opportunity to develop an extensive nodal field and also having access to two or more contrasting geographical areas. Conversely towns in peripheral, and sometimes disadvantaged, geographical locations generally maintained a stable position within the regional urban system, frequently suffering a relative loss in their regional status[77]. Within eastern Yorkshire, the East Riding towns of Pocklington, Market Weighton, Bridlington, Beverley and Great Driffield, for example, were each able to trade with two contrasting geographical areas: they underwent different growth experiences to the more peripherally located Hedon, Patrington and Howden which each had locational disadvantages. The East Riding might, therefore, serve as a testing ground for the anaylsis of urban structure and investigation of the determinants of selective urban growth. The use of case studies from one administrative area also has the inherent advantage of a uniformity of source material, enabling comparative investigation to take place with a far greater degree of reliability.

Of the eight East Riding country towns at mid-nineteenth century one can be designated as dynamic, - Great Driffield; four - Market Weighton, Bridlington, Pocklington and Beverley - as expanding; and three - Hedon, Howden and Patrington - as stable, while the region also contained all five declining market centres. Of these country towns, the fortunes of the county town of Beverley are already well documented[78], while east coast resorts such as Bridlington have also received a fair degree of academic attention[79], the reasons for their expansion being well understood. Knowledge of the changing structure of other country towns who enjoyed neither resort nor county status is, however, a somewhat grey area of both urban history and historical geography: accordingly the case studies will focus on the remaining six country towns.

The elements of urban structure to be examined will be wide ranging in order to provide a comprehensive picture of the causative factors of selective urban growth. Investigation of the external and internal structure of the sample towns is intended to shed new light on the pattern and process of change among different growth types of towns and provide a testing ground for comparison with larger urban centres. The variables to be analysed will divide into six broad areas of location, externality, demography, economy, morphology and socio-economic structure, although there will be no attempt to systematically analyse the areas in the same depth for each centre. Rather the focus will be on an investigation of the structural significance of the different components for each centre.

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63. SLATER, op.cit.; BIGLAND, op.cit.; BAINES, op.cit.; BARFOOT and WILKES, op.cit.

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CHAPTER 5

DYNAMIC CENTRES

The prominence of most of a region's larger towns, particularly in the early years of settlement, generally indicates the importance and strength of initial site advantages. But over time the significance of the latter often diminishes to be replaced by other factors; for example, adjustment to the evolving regional transportation network, changing resources and service demands, and the development of industrial activity[1]. Many of these 'other' factors are, however, dependant for their successful operation on a favourable or advantageous geographical location, for it is this which determines a settlement's accessibility and hence degree of nodality. It was seen in the preceding analysis that each of the dynamic centres of the region had locational advantages over their counterparts. Scarborough was both a coastal town and spa; Malton was situated on the Derwent on the boundary of the two administrative and widely different geographical areas of the East and North Ridings; Selby had a favourable location on the major navigational route between northern Europe and the interior of the country, and Great Driffield lay in juxtaposition to the two highly productive agricultural areas of Holderness and the Wolds. Analysing the locational advantages of the East Riding town of Great Driffield may thus lead to some explanation of the settlement's growth experience in the course of the eighteenth and nineteenth centuries.

1. Locational Advantages

In the sixteenth and seventeenth centuries, the locational

advantages of Great Driffield were ill developed, due principally to the generally low level of agricultural production on the High Wolds and in Holderness, the town's lack of any navigational link with Hull and the Humber - for the river Hull was navigable only as far as Frodingham Beck some seven miles downstream -, and the poor state of many of the region's roads. The period after 1700 witnessed marked changes in the locational advantages of the town due to the very reversal of the factors that had previously held development in check.

(a) Agriculture

Wide-scale parliamentary enclosure in the period after 1730, transformed the face of the countryside and placed agriculture and agricultural production on a new basis. Within East Yorkshire, the two regions which benefitted most from enclosure were the Wolds and Holderness. Two-thirds of all land on the former had been enclosed by 1850, and 68,000 acres in Holderness alone in the period 1730 - 1810[2]. Enclosure brought fundamental alterations to land use. On the Wolds the conversion of old pasture to tillage was especially striking, for not only were commons enclosed, but land that proprietors had previously considered only fit for rabbits was now put to the plough[3]. According to Strickland's agricultural report of 1812, almost two out of every three acres on the Wolds were under tillage; a rotation of turnips, barley, seeds and wheat being widely practised[4]. In Holderness immediate improvement was less apparent, for, until the widespread introduction of drainage schemes in the second quarter of the nineteenth century, many of the heavier soils were left uncultivated. Accordingly, in the early nineteenth century, only about one-third of the land was under tillage, but the region was of particular significance for grassland and cattle[5].

Enclosure had a deep and lasting effect upon the agriculture of the region. The conversion of grassland to arable on the Wolds

brought to prominence crops such as wheat, oats and beans; but the widespread introduction of turnips and clover meant that sheep continued to form as essential an element in the new husbandry as they had in the old[6]. While enclosure was clearly the most obvious method of increasing output, it was not the sole means of intensifying the growth of agricultural resources. The spread of better farming methods and the greater sensitivity of farmers to market conditions brought a new degree of flexibility to husbandry, particularly in the diversification of arable crops and in the use of leys. Innovations required large capital outlays and accordingly farming developments in East Yorkshire owed much to the activity of local landowners. Furthermore, farmers' clubs and agricultural societies, such as the Holderness Agricultural Society founded in 1796, greatly aided improvement by encouraging improved stock breeding, the introduction of new machinery and crops, and the sponsorship of new markets[7].

Corn and sheep, roots and seeds, all became part of an integrated farming system, increased output and productivity characterising all sectors. Higher crop yields owed much to the introduction of fertilisers, particularly the application of bones, while the manufacture of cattle and oil cake enabled greater numbers of livestock to be reared on fewer acres[8]. On the Wolds, for example, between 1810 and 1850 the quantity of wheat produced rose from twelve to twenty-four bushels per acre, to twenty-four to thirty-two bushels per acre, while production of oats doubled and barley quadrupled[9]. Productivity increases clearly meant higher trade flows and it was those towns best able to participate in this trade which enjoyed prosperity.

With the demise of the small market centres of Kilham, North Frodingham, Hunmanby and Hornsea, Great Driffield, by the close of the eighteenth century, had a potential market area that extended up to, and on the west beyond, a ten-mile radius around the town,

giving the place unrivalled access to most of the trade from the High and East Wolds and from North Holderness. The locational advantage of the town at the centre of a highly productive agricultural region, however, would have been of considerably less importance if other locational factors in the form of transport linkages had not also accrued to the town.

(b) Transport

In the early eighteenth century, transportation linkages in the whole of eastern Yorkshire were poorly developed: the East Riding in fact was served by only two main roads, one running from Hull to York and the other running from Hull to Flamborough[10]. Turnpiking activity was generally slow to begin, and the first turnpike in the East Riding came as late as 1744[11]. As elsewhere, the development of certain roads was determined by the relative economic and social standing of the more important local centres and not surprisingly activity centred initially on York, Hull and the county town of Beverley[12]. Certainly, in the first half of the eighteenth century, Great Driffield did not rank as one of the more important market centres of the region and accordingly the road north from Beverley received a turnpike act only in 1764. By the third decade of the nineteenth century a coherent turnpike network had developed in East Yorkshire linking all towns and most large villages to local centres of importance, and either directly or indirectly to the regional centres of Hull and York, and to neighbouring counties[13]. While the development of road transport within the region had proven results on trade and urban growth, in a region whose natural boundaries are extensively defined by water, access to some form of navigational link was also an important, if not essential ingredient for urban growth.

The early success of canals such as the Bridgewater canal and the Trent and Mersey canal, serving growing towns in the North and Midlands where they played an essential part in the process of

industrialisation, led to their extension into other areas where their immediate relevance was rather less apparent. Of the 165 canal acts passed between 1758 and 1803, 137 served mines and ironworks[14], but a rising demand for fuel was not the overriding motive in the formation of East Yorkshire's waterways as it was further west. Motives were essentially local, coming from two main groups: first, landlords who were eager to extend the market for produce from their estates - a desire enforced by the need of farmers for larger quantities of marl, lime and manure; secondly, town tradesmen who recognised that canals could provide a direct boost to the urban economy through the cheaper supply of raw materials, the export of finished products and the establishment of links with ports and other inland waterways. Great Driffield was the first of eastern Yorkshire's towns to acquire a canal link in 1767, although the navigational improvements on the Derwent and the cutting of a beck to Beverley from the River Hull had provided Malton and Beverley respectively with the navigational links in the early part of the century[15].

Navigational schemes coupled with a greatly improved road network gave certain towns a new degree of nodality and ensured a century or more of economic development. Following the construction or improvement of communications, industries were expanded, population increased, new buildings were erected and urban trade and markets gained in significance making towns centralised trading centres. Great Driffield, perhaps more than any other centre, was able, through the new agriculture and the acquisition of good communications links, to develop its locational advantages and hence to establish an important nodal position within the regional settlement system.

2. Nodality

Nodality, therefore, may be seen as the direct result of the

development of a settlement's locational advantages. As an inclusive view of location, the concept of nodality encompasses not only simple transport connectivity, but also actual patterns of movement within and beyond the region and accessibility to major regional activities[16]. It is evident from the preceding analysis that the greatest amount of urban growth occurred at nodal locations within areas of rapid rural expansion. Here, nodality could be further enhanced through the spatial parcelling of commercial and service functions. With its advantageous nodal position, from the mid-eighteenth century, Great Driffield quickly achieved hinterland hegemony and regional prominence in respect of trade, usurping the position of many smaller centres whose failure to attract a canal or local investment in a turnpike (and later railways) led to a stifling of their growth. The dynamism of the growth of Driffield is clearly reflected in the trading experience of the town and its developing linkages with other centres.

(a) Trade

In the early eighteenth century, Great Driffield had only one market. Although there was some trade in grain at this time, the market was devoted largely to the sale of general retail goods such as butchers meat, poultry, cloth, hardware, sweetmeats, toys, rope, butter, fruit and vegetables, and shoes[17]. The town did not possess its own fairs, these were held at the neighbouring hamlet of Little Driffield, noted for trade in cattle, sheep, horses and leather[18]. Trade was, therefore, general and of fairly low-order, offering little to distinguish the town from its regional counterparts; but in an era of improving agriculture and communications, only those centres that offered a service superior to that of the more general market could survive and hope to enjoy economic fortunes above the regional average. Agricultural improvement, the turnpiking of the road northward from Beverley,

and the cutting of the Driffield canal just three years later, gave the necessary fillip to the town's economy, bringing it a degree of specialisation unrivalled in the northern part of the region.

Although specialisation had been a feature of some markets in the sixteenth and seventeenth centuries, it had been largely characteristic of larger urban centres[19], and it was not until the latter half of the eighteenth century that trading specialisation made grounds among the mass of country towns. Indeed the marketing of particular products was to become an essential prerequisite of urban growth and economic expansion, and towns failing to develop specialised trade were likely to lose their economic and social standing within the regional urban system. Clearly there was room for only a handful of specialised markets within the region, and only a selective few towns could be of more than local importance.

In the hundred years between 1750 and 1850 Great Driffield became increasingly important as a specialised market centre within the region, the town undergoing a considerable degree of market improvement at this time. Two aspects of agricultural trade became of particular importance for the town - namely grain and livestock; particularly the former for changes in crop husbandry made greater quantities of grain available for marketing while the conversion of approximately one-third of the region's grassland to arable put large areas under tillage[20].

Malton had been a principal corn market for eastern Yorkshire since the seventeenth century and the improvement of the Derwent Navigation at the close of the same century served to further enhance the importance of the town[21]. Bridlington was the second most important grain market of the region, grain being transported there by packhorse, for either conveyance to London or export[22]. William Porter, one of the chief instigators of the Driffield

Navigation, wrote in 1762

> "If a canal could be made from here to Hull, Driffield would soon become one of the best market towns in the East Riding"[23].

He had good foresight, for between 1750 and 1780 Driffield emerged as the most important corn market of eastern Yorkshire; the central location of the town in a rich agricultural district and the cutting of the canal in 1767 enabling the town to draw a good deal of trade from Bridlington and some also from Malton. By 1798 over 20,000 quarters of grain were annually exported from Great Driffield, and the weekly corn market was said to be frequented by more agriculturalists than any other market town of eastern Yorkshire[24]. The dealers who attended the market were mostly factors who purchased by commission. Although a low commission of 6d a quarter was charged, the annual income received by these factors averaged between £300 and £400, striking evidence of both the large quantities of grain produced on the Wolds and in North Holderness and the volume of trade conducted in the town[25]. Driffield's influence began to spread far and wide, and by the first quarter of the nineteenth century, even Bridlington market had fallen largely into the hands of the Driffield factors[26]. By the time the corn exchange was built in 1841, over 70,000 quarters of grain were annually shipped from the town in addition to large quantities of corn converted to flour in the mills of the town and neighbourhood; by 1860 this figure had risen to 100,000[27]. The regional importance and dynamic growth of Driffield as a grain market is further attested by grain returns on the Driffield navigation (table 5.1). These registered a threefold increase in the 1820's, with exports of flour increasing eightfold in the following decade.

While grain came to dominate Great Driffield's market trade, the early nineteenth century also saw the town develop its role as a livestock trading centre for the region. Prior to this time,

Table 5.1 Grain Exported from Great Driffield, 1819-1846

Date	Wheat (Qr)	Oats (Qr)	Barley (Qr)	Flour (Sacks)
1819	8,000	15,000	5,000	NA
1820 (1)	8,554	15,067	NA	245
1821 (2)	7,858	15,700	NA	1,913
1823 (2)	17,170	22,414	NA	2,688
1825	24,712	27,999	10,467	4,311
1830	25,377	11,086	34,653	5,964
1833 (2)	18,173	7,745	19,396	4,555
1838	15,000	5,200	20,000	32,000
1844	26,000	13,000	9,000	19,700
1846	20,000	8,000	8,000	23,000

Qr = Quarter.

(1) Figures for old navigation only.

(2) Figures for new navigation only.

Source. B.F. Duckham Inland Waterways of East Yorkshire (E.Y.L.H.S. No.29). York, 1973, p.30.

C. Hadfield Canals of Yorkshire and North East England. London, 1972, p.305.

G.Legard 'Farming of the East Riding of Yorkshire'. Journal of the Royal Agricultural Society of Great Britain, vol.9, 1848, p.108.

most livestock trade had been handled at the local fairs at Little Driffield and Kilham, or had been channelled south to the livestock market held weekly at Beverley. The first serious attempt to establish a regular livestock market at Driffield was made in 1833 under the initiative of a local solicitor William Scotchburn. In anticipation of the market held for the first time in April of that year it was noted

> "From the immense volume of sheep and cattle which the modern system of husbandry on the Wolds has enabled the farmers to rear and feed; and from the town being in the centre of the East Riding, there appears to be every prospect of it being well attended by buyers and sellers".[28]

This early attempt to establish a specialised livestock trade at Driffield was not, however, particularly successful and appears to have endured for only a few months. The reasons for this would appear to be twofold: first, it received only a limited amount of financial support, total subscriptions amounted to less than £20[29]; and second, the difficulties associated with establishing a new livestock centre in a highly traditional society whose trade was organised around established markets.

At about the same time a pig market was started in Driffield as a separate venture and appears to have been very successful. As many as 300 pigs were sold weekly, comparing favourably with other regional markets, and it was well attended[30]. There were far fewer markets for the sale of pigs in the region and this may offer some explanation as to the success of this market, but the initial failure of the cattle market. However, attempts to establish a permanent and diverse livestock trade at Driffield were maintained, and in 1846 William Jarratt, a local hotelier, established a new market that lasted for nine years[31]. This market, described in 1850 as "the best for cattle and pigs in the East Riding"[32], brought a significant amount of trade to the town, but like its predecessors was not altogether free of difficulties.

Problems were experienced for three principal reasons; first, because a significant number of the region's cattle were now sent to larger markets at Leeds and Wakefield; secondly, the organisational cost, for the buildings alone required a capital sum of £8,000; thirdly, because Jarratt based his system of tolls upon those of the larger corporations of Leeds and York[33]. In country towns it was necessary for tolls to be higher as overheads were usually greater and consequently Jarratt's tolls were too low to be remunerative[34].

By the early nineteenth century, therefore, Driffield had emerged as one of the most important trading centres in the region, second only to Hull and York in the volume of trade handled. But, not only had the town developed its nodal position with respect to regional trade, it had also developed inter-regional and inter-urban linkages on a scale unparalleled amongst many of its regional counterparts. Incisive evidence of this fact is provided by trading returns from the Driffield Navigation and the frequency and direction of carrier flows.

(b) Communication Flows

While all towns that played a role in the developing regional transportation infrastructure participated in inter- and intra-regional contact to some extent, dynamic centres commonly gained levels of trade and linkages in excess of those of other eastern Yorkshire towns. Of the twelve turnpike roads that affected towns in the East Riding of Yorkshire, the Beverley-Kendale House Trust, running from Beverley northward through Driffield, received the second highest annual income according to the official returns of 1834. At £1,928 this figure was surpassed only by revenue accrued on the trust covering the road between Hull and Beverley[35]. Unfortunately, no records survive as to the type and volume of traffic plying the region's roads, the only detailed information

available relates to land carriage.

As already demonstrated in the preceding chapter, few eastern Yorkshire towns were well served by carriers before the turn of the eighteenth century. In the face of a well developed turnpike system this may seem surprising, but many of the minor roads remained poor and services were restricted to long distance routes connecting country towns with regional centres. Population growth, coupled with a decisive movement towards urbanisation, necessitated an increase in agricultural output and a greater movement of commodities towards the urban market. This became reflected in the growing significance of market-carrier activity, increased specialisation, and the widening of urban trading horizons after 1800. While most of the region's towns participated in this trend[36], Driffield became of greater nodal importance than any other town, save Hull and York. From serving just three different settlements in 1791, this figure rose to twenty-one in 1823 and further doubled by mid-century, the number of services per week showing a corresponding increase. As figure 5.1 demonstrates, the market area of Great Driffield was, by 1850, extensive, encompassing linkages with places both within and beyond the region. The town's canal, through the link it afforded with Hull and the Humber, served to extend contact and trade over a far wider area.

Most of the town's trade, via the navigation, was inter-regional. An undated Hull Guildhall manuscript of the late eighteenth century lists twenty-seven vessels, averaging 43 tons, regularly trading between the town and the West Riding[37], and Legard, in his prize essay on farming in East Yorkshire, noted the considerable amount of trade that occurred between Driffield and Wakefield: grain which had been marketed at the former being resold at the latter[38]. Financial returns from the Driffield Navigation were higher than for any other comparable scheme in the

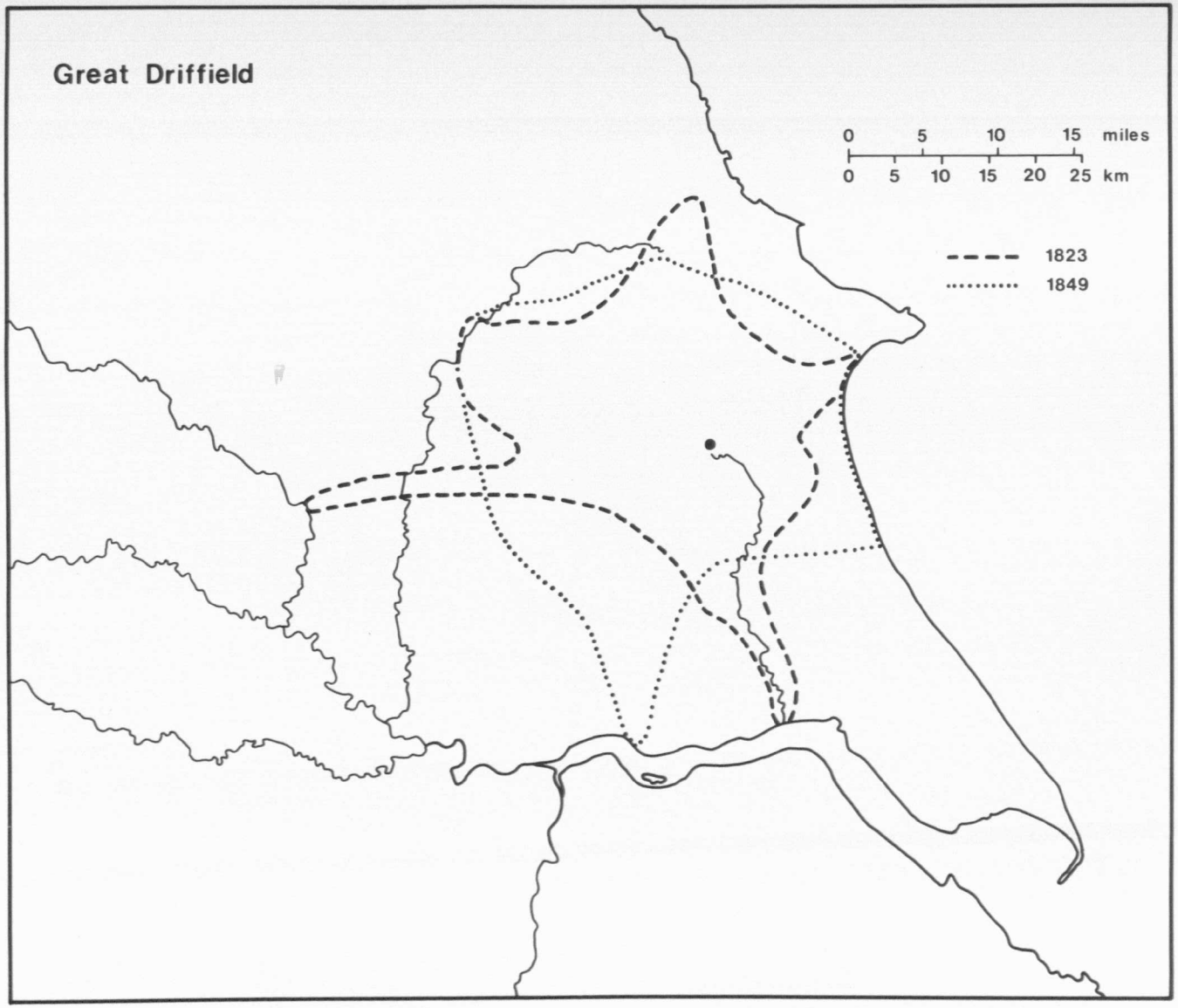

Fig.5.1 The Market Area of Great Driffield, 1823-1851

region, reaching £1,600 in 1825 (table 5.2)[39]. Tonnages carried were also greater. The available evidence would suggest that imports and exports via the Driffield Navigation were almost double those on the Market Weighton canal and four times higher than those on the Pocklington canal(table 5.3). Although the demand for fuel had never been cited as a principal rationale for the improvement of the region's navigational network, coal came to dominate trade, accounting for as much as 75% of all tonnage. It is evident that imports of coal were most significant on navigations whose basin was situated within the built urban area. Imports of coal to Beverley which had stood at some 2,300 tons in 1730 had risen to more than 15,500 tons a century later, and at Driffield over 30,000 tons were imported into the town at the latter date. In both Pocklington and Market Weighton, where their canal basins were situated at some two miles from the built area, imports in 1830 were 4,000 and 7,000 tons respectively[40]. These figures clearly attest the importance of Great Driffield as a break of bulk point for much of eastern Yorkshire.

One further measure of the developed nodality of the town is provided by the number of farm servants attending the annual statute hirings held in November. A total of twenty-one statute hirings were held in the East Riding, handling in the region of 10,500 farm labourers. Of this number, more than 2,500, or 24%, attended Driffield's hiring, 1,000 more than at the next most important centre, Howden, and 1,300 more than at the hiring held in neighbouring Bridlington[41].

The development of locational advantages and the resulting nodality thus provided Great Driffield with a level of trade and trading linkages unparalleled among the mass of country towns. The strength of locational advantage and nodality on the nature of growth in Driffield was, it can be argued, in a large measure

Table 5.2 Financial Returns on East Yorkshire Urban Navigations, c 1730-1855

Annual Income £'s

Date	Beverley Beck	Driffield Navigation	Market Weighton Navigation	Pocklington Canal	Patrington Haven	Hedon Haven
1730	79	-	-	-	NA	NA
1735	109	-	-	-	NA	NA
1740	111	-	-	-	NA	NA
1745	174	-	-	-	NA	NA
1750	102	-	-	-	NA	NA
1755	110	-	-	-	NA	NA
1760	110	-	-	-	NA	NA
1765	110	-	-	-	NA	NA
1770	129	NA	-	-	NA	NA
1775	140	NA	-	-	NA	37
1780	150	NA	192	-	NA	91
1785	180	NA	522	-	NA	90
1790	182	NA	NA	-	NA	90
1795	190	NA	NA	-	NA	90
1800	190	NA	NA	-	NA	135
1805	314	NA	NA	-	NA	236
1810	372	NA	NA	-	NA	236
1815	330	1,083	NA	NA	NA	277
1820	362	1,125	NA	656	NA	352
1825	405	1,616	NA	1,281	NA	430
1830	435	1,218	NA	1,159	67	455
1835	435	1,355	NA	1,416	67	NA
1840	620	NA	1,432	1,260	68	NA
1845	635	NA	NA	1,374	57	NA
1850	NA	NA	802	1,067	55	302
1855	680	NA	820	620	51	318

Source: H.C.R.O. DDMW 7/463, 319.

DDPK 6/3, 4.

DDHE 30.

Hadfield, 'Canals of Yorkshire', op.cit., pp.86, 305, 332.

H.H.C.R. Account Books, 1775-1855.

Table 5.3 Imports and Exports via Inland Navigations to three East Yorkshire Country Towns

	Driffield		Pocklington		M. Weighton
	% (Tonnage)		% (Tonnage)		% (Tonnage)
	1820	1830	1835	1845	1845
PREDOMINANT IMPORTS					
Coal	73.5	66.3	25.6	37.5	49.3
Slack/Cinders/Soot	1.1	3.7	-	-	2.3
Lime	-	-	24.5	23.2	11.6
Bone Dust/Rough Bones	-	-	5.2	2.4	1.6
Stones	-	-	0.8	5.1	-
Gravel/Sand	-	-	3.9	12.2	9.3
Manure	-	-	-	-	8.9
Timber	-	-	4.3	4.7	4.0
Bark	-	-	1.1	0.2	-
TOTAL (Tons)	30,289	32,558	5,561	10,667	13,382
PREDOMINANT EXPORTS					
Wheat	9.5	12.1	6.8	2.3	9.8
Oats	12.3	4.8	2.4	0.2	1.6
Barley	2.0	14.0	5.0	1.2	1.4
Beans/Peas	0.5	0.5	0.3	-	-
Malt	0.4	0.6	5.4	0.6	0.01
Potatoes	-	-	1.1	6.4	0.2
Flour	0.4	1.5	-	-	-
Shelling	-	-	13.5	4.1	-
Other (rapeseed, mustard shelled oats, etc.)	0.3	0.8	-	-	-
TOTAL (Tons)	10,309	13,961	2,940	1,841	14,870
TOTAL TONNAGE	40,598	46,519	8,501	12,508	28,252
% IMPORTS	74.6	70.0	65.4	85.3	47.4
% EXPORTS	25.4	30.0	34.6	14.7	52.6

Source: H.C.R.O. DDMW 7/463; DDIN 1,2. P.R.O. RAIL 1112/46.

attributable to the forces of externality and their operation both within and around the centre.

3. Externality

Externality in this context refers to the type, amount and level of influence a town drew from outside the built environment and from other than its own inhabitants during the course of the study period. It is contended that external forces played a significant role in the whole process of selectivity of growth. This is not to say, however, that individuals within the town did not play a major part in promoting urban growth, for it is evident that a fluid and enterprising landownership and social structure was an important element in determining the nature and character of growth.

Although directly benefitting the towns that they served, turnpike trusts received little financial support from the inhabitants of any local town except Beverley. Many town inhabitants appeared reluctant to invest in schemes which they viewed as largely external to the urban economy, for toll revenue accrued not to the town which generated much of the trade using the roads but to the trustees. Turnpikes in eastern Yorkshire remained schemes that were sponsored largely by landed gentry and wealthy industrialists. This pattern of support, however, served to benefit towns for it ensured that a volume of trade over and above that of the immediate hinterland would accrue to the centre. The investment in local schemes, such as that covering the road from Beverley to Driffield, by large landowners like John Grimston of Kilnwick and the Reverend John Wilson of Etton ensured that produce from their estates would utilise the road and pass through the towns[42].

Even more important external influences were associated with the development of the region's navigational network; it can be argued that the level of external, or non-resident, support for

these ventures had an important bearing upon their success and hence on the developing nodality of a centre[43]. Analysis of the sources of capital in greater detail may serve to substantiate this point. It has already been demonstrated that Driffield's navigation enjoyed a greater degree of success and was a greater stimulus to trade than those of its regional counterparts: this 'separateness' is also reflected in the character and level of support given to the venture. Of the thirty-three subscribers to the Driffield canal, eight were town residents and the remaining twenty-five were non-residents; a higher percentage of external support than accrued to any other regional navigations (table 5.4)[44]. The greatest numerical support comprised gentry and esquires with the residue of subscribers, 40%, being fairly evenly distributed among other occupational classes (table 5.5). The financial contribution of the various occupational classes, however, reveals a rather different picture, landed interest providing a disproportionate amount of financial support. Almost 90% of the capital was provided by the peers and gentry, with two subscribers realising over one-third of the sum of £15,297. Tradesmen, farmers and professional men, on the other hand, made only a small contribution to the venture. If these percentages are compared with those calculated by Ward for other agricultural canals[45], it is evident that the financial contribution of manufacturers, capitalists and the professions was significantly lower on the Driffield canal and the contribution of landed interest higher.

External subscribers outnumbered internal, or resident, subscribers and financially a similar, but more extreme, picture emerges; town residents realised only 8% of all capital, a lower level than on other navigations of the region[46]. While the fairly high levels of external support are not surprising and accord with the nature of investment in comparable schemes in

Table 5.4 Inland Navigations and East Yorkshire Country Towns

(a) General Details

Town	Population c.1750	Population c.1801	Date of Navigation	No. of Shareholders	Capital £
Beverley	4,000	5,410	1727	8	1,395
Patrington	450	894	1761	NA	NA
Driffield	700	1,411	1767	33	15,297
Market Weighton	740	1,183	1772	44	12,765
Hedon	450	592	1774	14	2,720
Pocklington	1,050	1,052	1814	82	31,000

Table 5.4

(b) Internal and External Support for East Yorkshire Navigation

Town	% of Subscribers Resident	% of Subscribers Non-Resident	% of Capital Resident	% of Capital Non-Resident
Beverley	100%	0	100%	0
Patrington	NA	NA	NA	NA
Driffield	21.2	78.8	8.0	92.0
Market Weighton	47.7	52.3	31.4	68.6
Hedon	57.0	43.0	37.5	62.5
Pocklington	48.8	51.2	34.7	65.3

Source: H.C.R.O. DDIV 1, DDMW 7/195

P.R.O. RAIL 858/3,4

H.C.C.R. Account Book 1775 - 1830

M.W.D.B. Account Book 1772 - 1784

B.C.M.B. Account Book 1728 - 1746

Table 5.5 Subscriptions to Driffield Canal, c 1767

	Occupational Class	% of all subscribers	% of money subscribed
I	Peers	6.1	34.2
II	Landed gentlemen	57.5	55.6
III	Yeomen, Graziers, Tenant Farmers	9.1	2.3
IV	Capitalists	3.0	1.1
V	Manufacturers	-	-
VI	Tradesmen	9.1	1.4
VII	Professional men	6.1	2.4
VIII	Clergy	-	-
IX	Women	9.1	3.0

	% of all subscribers		% of money subscribed	
Occupational Class	Resident	Non-Resident	Resident	Non-Resident
I	-	6.1	-	34.2
II	15.1	42.4	7.2	48.4
III	-	9.1	-	2.3
IV	-	3.0	-	1.1
V	-	-	-	-
VI	6.1	3.0	0.7	0.6
VII	-	6.1	-	2.4
VIII	-	-	-	-
IX	-	9.1	-	3.0

Source: H.C.R.O. DDIV 1.

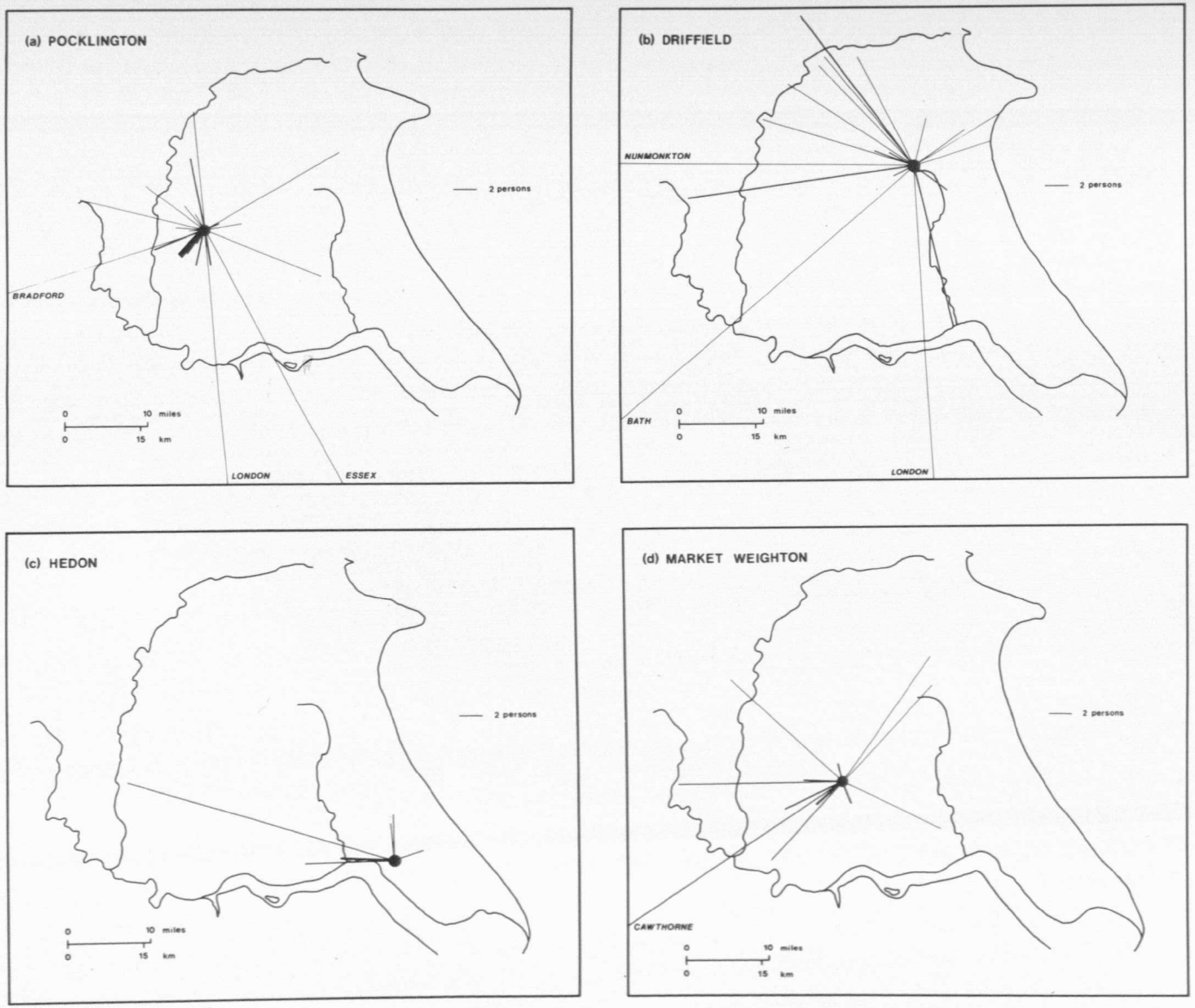

Fig.5.2 Spatial Location of External Subscribers Residences to Four East Yorkshire Urban Navigations

other parts of the country[47], the level of this external support had an important bearing on the success of the navigation. It may be argued, therefore, that schemes which relied less on urban investors had a greater impact on regional trade than schemes which attracted lower levels of rural support. By the close of the eighteenth century, eastern Yorkshire was developing into a highly productive agricultural region, and those navigations able to harness the support of landed interest over a wide area had hopes of securing the export of considerable quantities of agricultural produce, thereby encouraging and participating in higher trade flows. It follows, therefore, that the location of external subscribers' residences may also have had a bearing on the success of the schemes. As table 5.4(b) and figure 5.2 demonstrate, the highest levels of external support and the greatest distances were associated with the Driffield navigation. Although the reasons for the apparent correlation between 'externality' and navigational success are not altogether clear, it is suggested that the involvement of non-urban residents in the scheme ensured that an area more extensive than the immediate hinterland became linked to the town. Such a link extended and developed existing urban trade through inter and intra-regional contact. Continuation of this support after the initial call for funds was, therefore, also of significance.

Ward has demonstrated that on most canals the annual turnover of shares rarely averaged more than 10%, although in the early war years it was quite high[48]. Where share registers have survived, as in the case of Driffield, covering a number of years, it is possible to measure the movement of the balance of interest among internal and external subscribers in a venture.

Improvements to the Driffield canal were proposed in 1797 and a second subscription was opened. Support was provided by fewer men, just eight subscribers raising a total of £15,000. Of these,

four had subscribed to the initial venture and significantly all eight were non-resident. The second subscription also saw the involvement of banking interests. Pease and Knowsley, the Hull banking firm, provided one-third of the necessary capital and were appointed treasurers and trustees of the navigation[49]. The movement of the balance of interest even further towards external residents clearly benefitted the canal and town, for high levels of externality ensured greater financial stability and higher trade flows. As a financial venture, however, the Driffield canal did little more than promise a sound investment at a rate 1-2% above that being paid on government consols at the time[50]. Many of the investors must have been disappointed, for, whereas other 'first generation' canals, such as the Oxford Canal and the Trent and Mersey Canal, paid dividends of well over 30%, returns on the Driffield canal rarely averaged more than 4%[51]. It is evident that the venture was primarily concerned with efficiency in the means of communication; the trustees chose to reduce tolls as an inducement to trade, rather than pay high dividends. Tolls were reduced in 1817 and the average rental received from the Hull Bridge 1/- toll rose from £17 in 1810 to £93 in 1825 and £104 in 1834, incisive evidence of the success of this policy for town trade[52].

While the importance of externality for the dynamic growth of a centre is perhaps most clearly demonstrated by information relating to transport, externality also had a significant effect on internal developments within such centres.

The principal inhabitants of any country town comprised land and property owners who by virtue of their status generally played a significant role in urban government and hence urban affairs. At the time of enclosure, one-quarter of Great Driffield's landowners were non-resident and including the Lord of the Manor held over 40% of all parish land: higher percentages than are

found in other East Riding towns[53]. The 86 landowners of the parish owned, on average, 57 acres apiece. Almost a century later at the time of the tithe apportionment, the number of landowners in the town had increased to 252, the average acreage held having fallen to just over twenty acres. This change in the landownership structure of the town was demonstrably of some significance in the settlement's growth and development. As can be seen from table 5.6, while the largest landowners retained and even increased their share of land, there was considerable change among the lesser landowning groups. In particular there was a marked fall in the amount of land and number of landowners holding between 100 and 500 acres, and a corresponding increase among the lesser property owning groups, While a fluidity in landownership structure characterised other towns of the region also at this time[54], the increase in the number of landowners in Driffield was of greater magnitude. Arguably this fluid situation was of importance as it ensured a fairly high rate of land turnover and continually brought new men to the fore of town society. Furthermore, the intrusion of new landowners was an important factor in stimulating the transactions of the land market, making new land available for urban expansion, and in creating a socially mobile society.

The large landowners who held substantial tracts of both parish and urban land, for example Richard Langley, lord of the manor, and John Drinkrow and Thomas Stork, both 'gentlemen', each had sizeable property interests and residences in other parishes of the region. Their attention became focused, therefore, on regional rather than local developments. This regional interest had an important bearing on urban growth, for it ensured that external interest became involved in town affairs. While their involvement in agricultural enterprise is perhaps the most obvious example, the establishment of industry associated with the cutting

Table 5.6 Landownership Structure of Great Driffield, 1742, and 1839

Acres Held		1742 %	1839 %
1000 +	Land	35.8	40.1
	Landowners	1.2	0.4
500-999	Land	-	22.6
	Landowners	-	0.8
100-499	Land	48.5	13.1
	Landowners	11.7	2.0
50-99	Land	4.1	4.7
	Landowners	3.4	1.2
10-49	Land	5.8	14.2
	Landowners	12.8	9.5
3-9	Land	4.8	3.4
	Landowners	44.2	11.9
Under 3	Land	1.3	1.7
	Landowners	26.7	73.0

Total No. of Landowners	86	252
% of Non-resident Landowners	25.0	NA
Average Acreage per Landowner	57.1	20.1
No. of Acres Listed in Award	4,910	5,058 (includes Little Driffield)
Listed Acreage as a % of all parish land	100%	100%
Acreage of Parish	4,910	4,910

Source: H.C.R.O. RDB B/1/153/42

H.C.R.O. PR 999, TA

of the Canal may serve to further substantiate this point. As commissioners of the Driffield Navigation, these larger landowners were keen to encourage industrial development in the district by offering concessionary rates to would-be industrialists. In 1789 the recently established carpet manufacturing firm of Bainton, Boyes and Co., situated at Wansford just 2½ miles south of the town, were granted concessionary rates on the import of raw materials and the export of the manufactured product via Driffield: Sheepshanks, Porter and Co., textile and carpet weavers operating from the Bell Mills in Driffield, were given similar treatment[55]. It appears that such a policy had significant economic repercussions within the town, for there followed the introduction of several new factories such as Arkwright's paper mill established in 1796, Thomas Holtby's Albion Street Mills and Harrison's and Sons River Head Mills[56].

While externality was of utmost importance in bringing an area more extensive than the immediate hinterland into direct contact with the town, in country towns few non-resident landowners acted as direct instigators and innovators of internal change; although clearly internal changes often accrued as a direct result of external events. The prime instigators of urban change were the lesser, land and property owners who formed a sizeable share of the town's inhabitants. It was to this group that much of the day to day running of urban affairs passed after 1750 and it was this group who formed the essential fulcrum in the change in landownership structure. It may be argued that greater fluidity in landownership was a characteristic that came to distinguish dynamic and expanding centres, from static and declining centres in the process of selective urban growth.

The central question, therefore, becomes, how were locational advantage, nodality and externality reflected in the pattern and process of change within dynamic centres, and how did the

entrepreneurial spirit of certain individuals interact or combine with these variables to create a distinctive structure? It is suggested that analysis of the demographic, economic, social and spatial structure of Great Driffield over the course of the study period may provide some insight.

4. Demographic Structure

Within the regional urban system the demographic experience of Great Driffield was more extreme than in any other centre; the town gaining nine rank positions over the period 1700 - 1850 and consistently experiencing rates of growth higher than the regional average (chapter 2). Aggregative analysis of the Anglican Church parish registers of Driffield, sheds further light on the demographic fortunes of the town.

For most of the eighteenth century growth rates in Great Driffield were low, but, nevertheless, higher than those experienced by most other towns in the region. Average annual rates of natural increase/decrease averaged no more than 4% in the period up to 1760, and showed a net loss of almost 2% in the twenty year period 1741 - 1760 (table 5.7). From 1760, however, there was a sharp upward turn in the demographic fortunes of the town, annual rates of natural increase rising to and staying at 10% and over until the mid-nineteenth century. The slow population growth of the first half of the eighteenth century was in accord with the general trend in the region and in England and Wales as a whole[57]. But Great Driffield perhaps suffered rather less than many of its regional counterparts, for few epidemics and diseases appear to have affected the town save for a widespread general fever in December 1728[58]. Whereas a considerable excess of burials over baptisms characterised many other towns at this time, the calculation of annual totals of burials and baptisms as nine-year moving averages shows this seldom to have been the case

in Driffield (figure 5.3). This trend is further reflected in baptismal, burial and marriage rates for the town (figure 5.4). Burial rates only exceeded baptismal rates in the decades 1720 to 1740 and then by only 1.9 per thousand population, whereas in other eastern Yorkshire towns, such as Howden and Hedon, baptismal rates were a third lower than burial rates leading to a degree of demographic crisis in such centres.

The fact that Great Driffield emerged relatively 'unscathed' from the demographic crisis of the early eighteenth century was to have an important bearing on subsequent growth. From increasing its population by only some eighty persons in the first 60 years of the eighteenth century the town's population doubled in the remaining 40 years (table 5.8). The reasons for the acceleration in population growth that occurred in Britain after 1750 have been, and are still being, debated by demographers and economic and social historians; the major hypotheses of increasing birth rates, falling death rates, inoculation, a lowering in the age at first marriage and general medical and dietary improvements being well known[59]. Clearly in Great Driffield several of these variables were at work, for the town saw both a substantial reduction in mortality and an increased birth rate (table 5.7), while local newspapers evidence the availability of inoculation in the region[60].

The highest rates of population growth in Driffield occurred in the early nineteenth century, particularly in the decades 1801 - 1820 when the baptism/burial ratio was at its highest. Decennial population increase at this time was of the order of 20% - 30%. Natural increase alone was insufficient to account for all the demographic expansion in Driffield: much of it, therefore, was attributable to inmigration. It must be mentioned, however, that the gap between actual population increase and natural increase has often, in part, been explained by underregistration

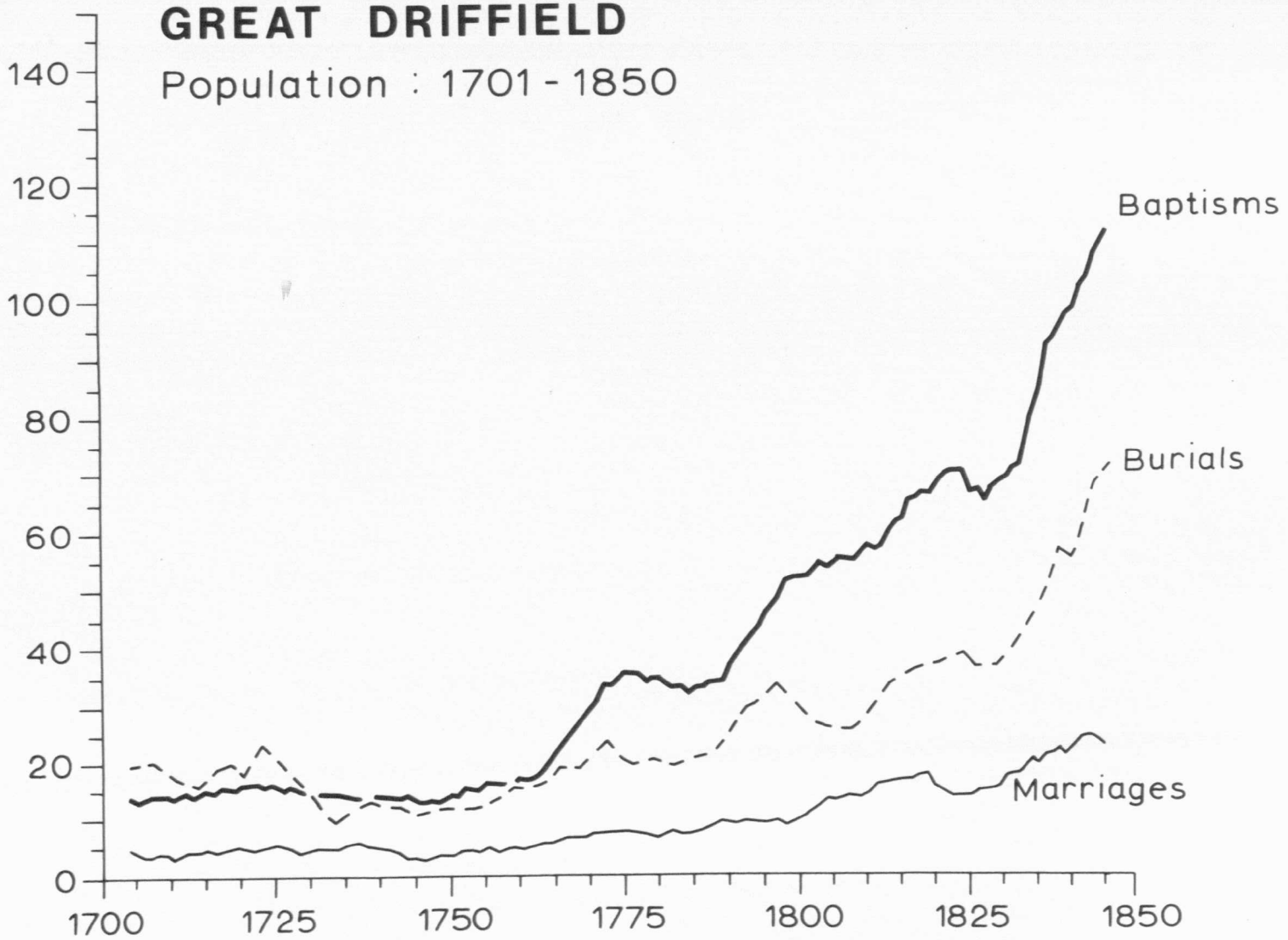

Fig.5.3 Population Change in Great Driffield, 1701-1850: Nine Year Moving Average

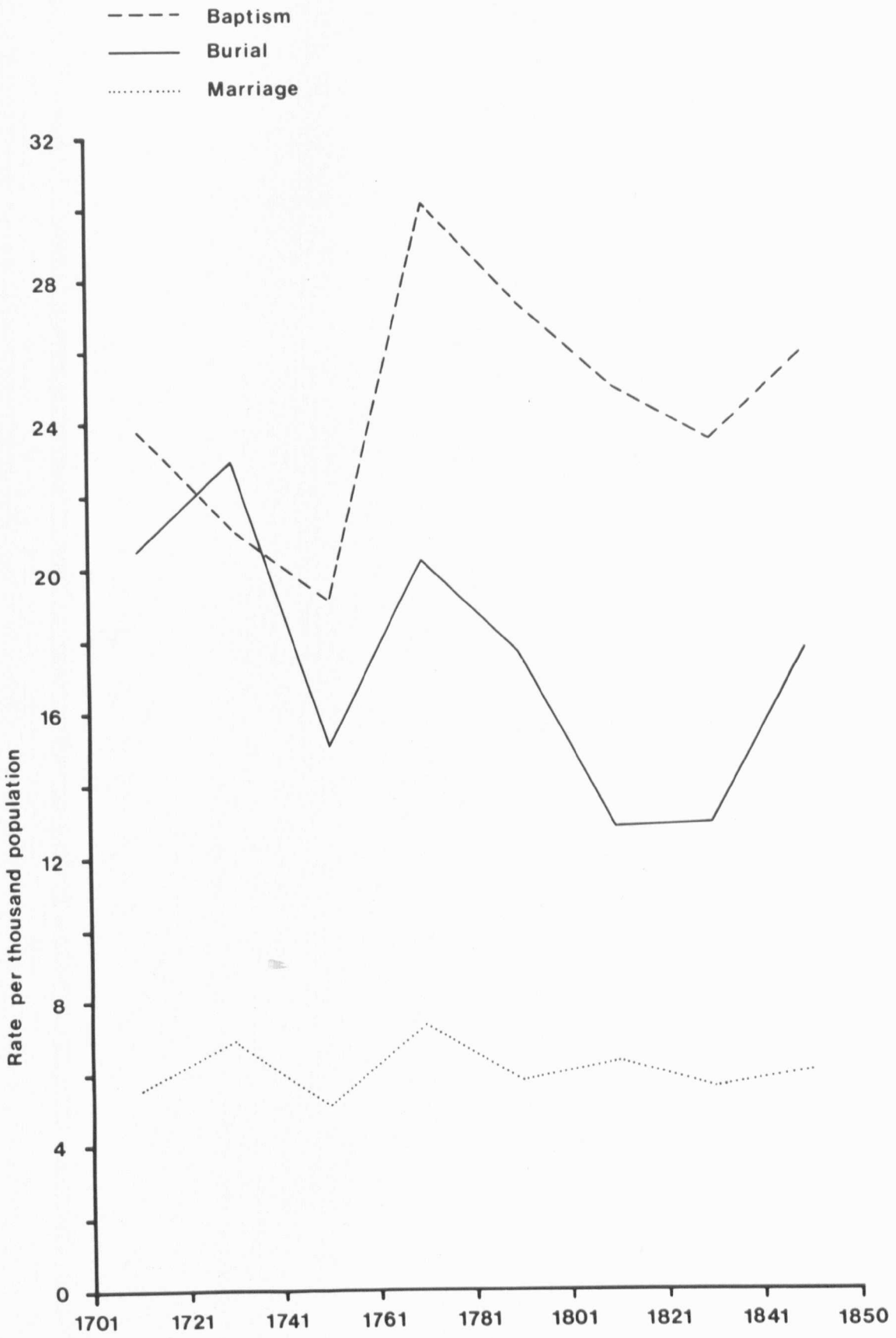

Fig.5.4 Average Annual Baptism, Burial and Marriage Rates in Great Driffield, 1701-1851

Table 5.7 Average Annual Baptism, Burial, Marriage and Natural Increase Rates in Great Driffield, 1701-1850

Date	Per 1,000 Population			
	Burial Rates	Baptism Rate	Marriage Rate	Natural Increase/ Decrease
1701-1720	20.5	23.8	5.6	3.3
1721-1740	22.9	21.0	6.9	-1.9
1741-1760	15.1	19.1	5.1	4.0
1761-1780	20.2	30.1	7.2	10.1
1781-1800	17.7	27.1	5.7	9.4
1801-1820	12.8	24.9	6.4	12.1
1821-1840	12.9	23.4	5.4	10.5
1841-1850	17.7	25.9	5.9	8.2

Table 5.8 Population Estimates for Great Driffield, c 1700-1851

Date	Parish Register Analysis	Census
c 1700	661	NA
1720	706	
1740	682	
1760	742	
1780	924	
1800	1,190	
1801	-	1,411
1811	-	1,857
1820	1,750	
1821	-	2,303
1831	-	2,660
1840	2,057	
1841	-	3,223
1851	2,426	3,963

Table 5.9 Migration to Great Driffield, 1700-1851

Date	Population	Difference	Baptism-Burial	Inferred Migration
c 1700	661			
1801	1,411	750	529	+ 221
1811	1,857	446	279	+ 167
1821	2,303	446	281	+ 165
1831	2,660	357	307	+ 50
1841	3,223	563	369	+ 194
1851	3,963	740	356	+ 384

which Krause, Wrigley and others argue became widespread in the period after 1780[61]. Unpublished population returns from the 1811 census, however, suggest that the average annual number of unentered baptisms or burials in Great Driffield's registers was just three[62]; clearly before the second quarter of the nineteenth century underregistration was not a significant factor in the demographic experience of the town.

Unlike other towns of the region, Great Driffield, as a dynamic centre, lost none of its natural increase through outmigration, but consistently gained population through inmigration. As table 5.9 illustrates, there is evidence to suggest that inmigration played an important part in the growth of the town in the eighteenth century, particularly significant in the light of the fact that the East Riding lost considerable numbers of inhabitants through outmigration at this time[63]. But it was the first half of the nineteenth century that was most significant for migration. In the period 1801 - 1851, 37.6% of the population increase in the town can be attributed to inmigration, it being particularly important in the 1840's and of least significance in the 1820's; the latter decade being a time of agricultural depression which undoubtedly encouraged many agricultural labourers to leave the region[64]. The high rate of increase in the 1840's probably reflects the new economic and employment opportunities offered in the town with the establishment of several milling and bone-dust manufactories[65]. Indeed, inmigration may have been of a greater magnitude than is suggested by these figures, for contemporary accounts attest to outmigration from the region, particularly to the 'New World', at this time. It must have been of some importance in Driffield, for by 1855 an emigration officer had established a business there [66].

While the detailed migrational patterns of urban and rural

inhabitants remain somewhat obscure, from 1750 a major transformation had occurred in the character, direction and distance of movement. Apart from apprentice indentures, there is little in the period before the compilation of the census enumerators' notebooks in the second quarter of the nineteenth century to attest the pattern and process of migratory movement[67]. Marriage distances, however, have been shown to provide valuable insight into the probable distance and direction of movement[68]. A crucial aspect of differential population growth and migratory movement was greater mobility which appeared with improvements in transport and more favourable employment opportunities. Mobility was a key factor in the social and spatial transformation of population, and it is mobility, or rather potential mobility, that marriage distances demonstrate.

Unfortunately data on marriage distances for Great Driffield becomes available only in the period after 1760; but data for other local towns indicates that in the first half of the eighteenth century most marriage partners were found locally with few coming from without a seven-mile radius of any town[69]. The onset of more rapid population growth rates in the period after 1760 witnessed some divergence from the pattern of earlier years, although the really massive changes came only after the turn of the century. From the mid-eighteenth century, contact with more distant urban and rural areas became widespread and Driffield participated in this trend. As figure 5.5 shows, by the late eighteenth century the mobility of Driffield residents spread from Hunmanby in the north to Hull in the south, covering much of the eastern Wolds and North Holderness, contact having been established with forty different townships and parishes. In the period 1790 - 1840 this number had more than doubled to eighty-four; the town's sphere of influence now covering most of the Wolds and Middle and North Holderness (figure 5.6). Although

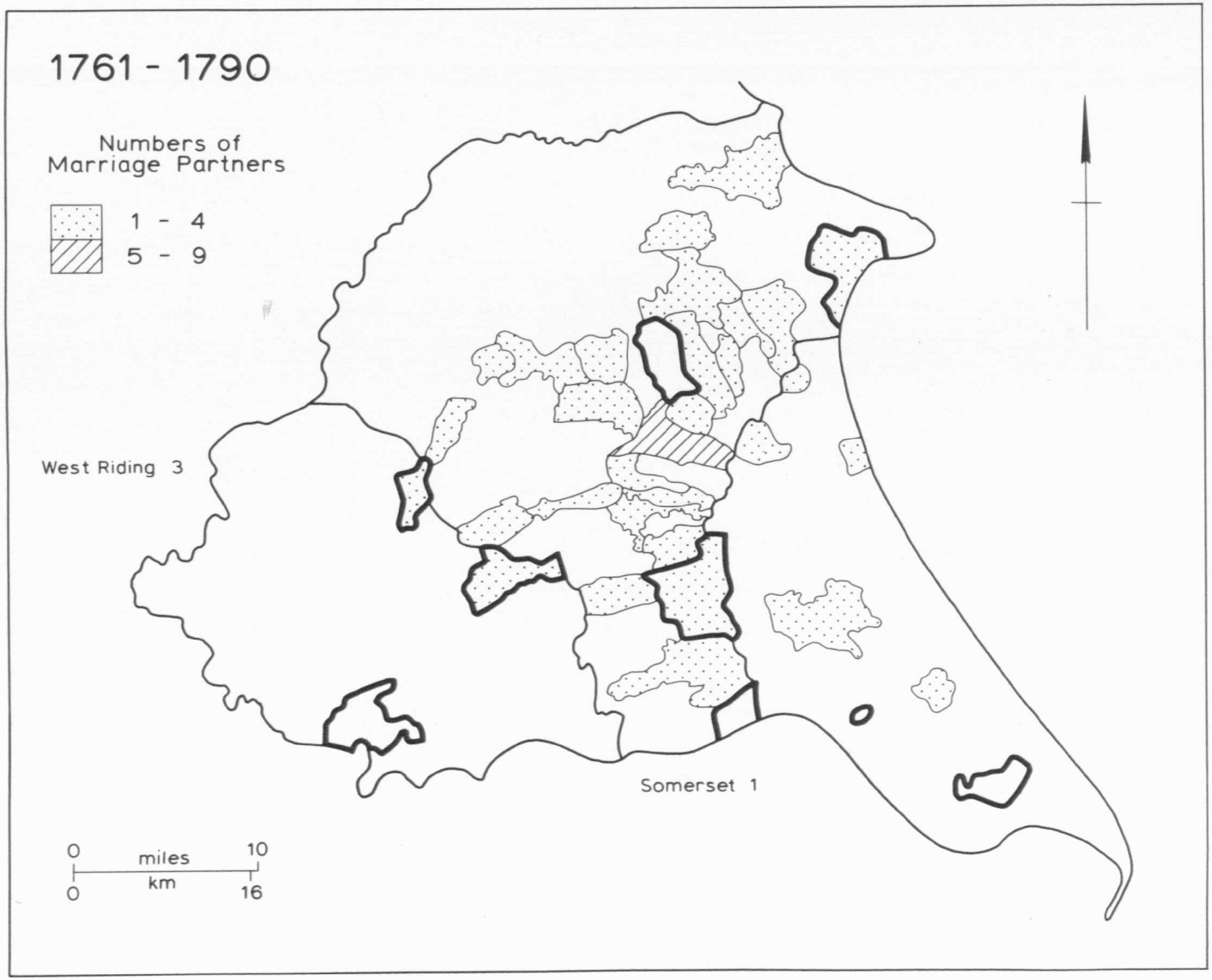

Fig.5.5 Marriage Distances of Great Driffield, 1761-1790

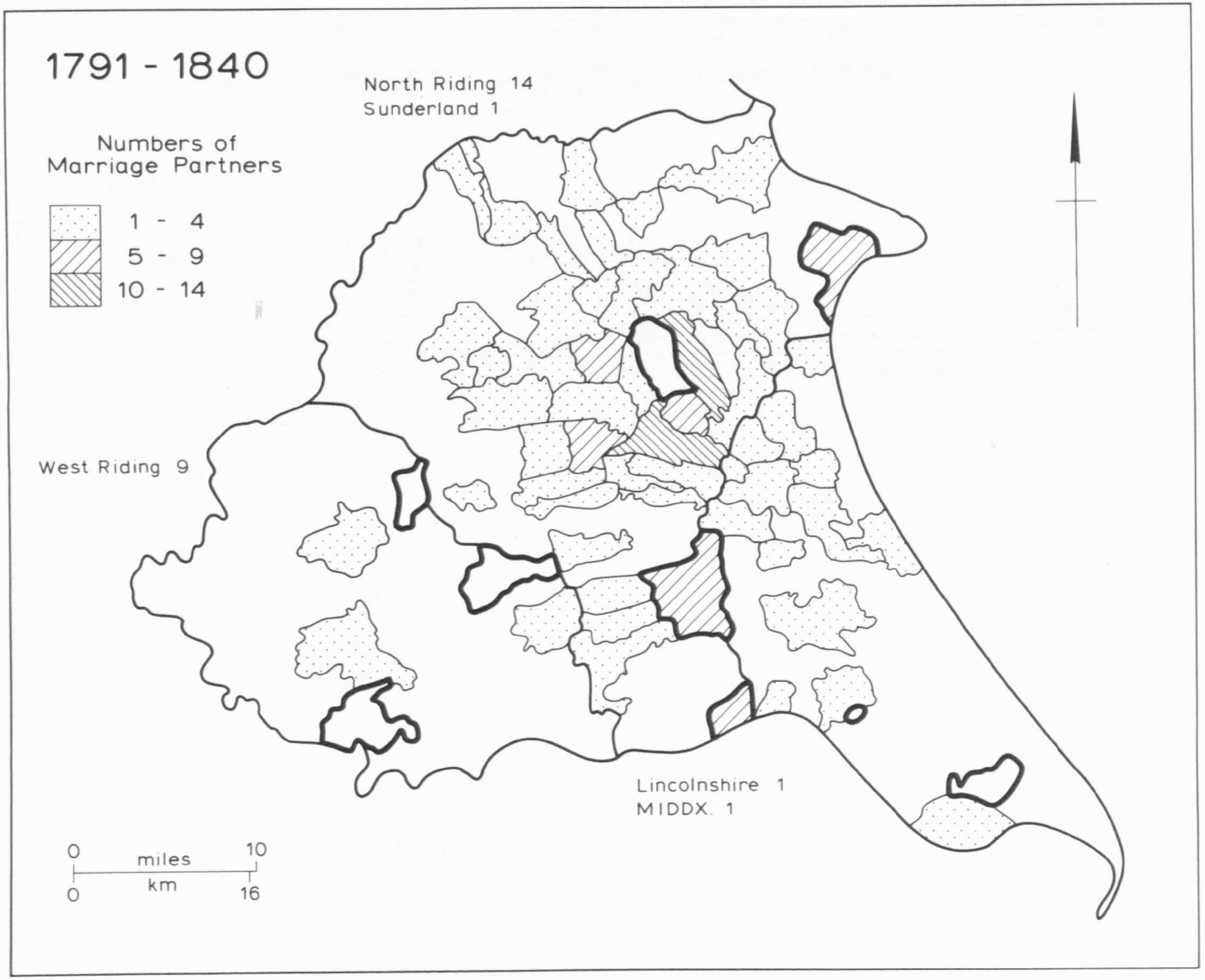

Fig.5.6 Marriage Distances of Great Driffield, 1791-1840

Table 5.10 Marriage Distances of Great Driffield, 1761-1840

	1761-1790		1791-1850	
	No	%	No	%
Number of Marriages	197	-	736	-
Number and % of Extraparochial Marriages (E.M.)	70	35.5	178	24.2
Number and % of E.M. partners from West Riding	3	4.3	9	5.0
Number and % of E.M. partners from North Riding	-	-	14	7.8
Number and % of E.M. partners from Lincolnshire	-	-	1	0.6
Number and % of E.M. partners from other British Counties	1	1.5	4	2.2
Number and % of E.M. partners from other East Riding Towns	13	18.5	25	14.0
Number and places with which contact was made	40	-	84	-

85% of all extraparochial partners were still found in the administrative area of the East Riding, contact with neighbouring regions had risen. Almost 8% of all extraparochial marriages involved partners from the North Riding and 5% partners from the West Riding, considerably higher percentages than for the preceding period (table 5.10). This increased mobility undoubtedly reflects the developed economic and social standing of Great Driffield, and its nodal importance within eastern Yorkshire.

The central location of the town meant that it became a focal point for much migratory movement within the region, and it is evident that Driffield owed much of its demographic dynamism to this regional relationship. In 1851, only 15% of all town residents had recorded birthplaces outside the East Riding with just 7% of this number coming from towns and counties other than Yorkshire. Intra-regional migratory movement was clearly of importance in the process of selective urban growth. Comparing Great Driffield with other East Riding country towns, a higher percentage of Driffield residents had recorded birthplaces in East Yorkshire - 41% compared with an average of 30% - and a lower percentage had been born in the town. Economically the dynamism of Driffield also depended on a well developed regional relationship, but in this sphere of urban activity interaction with neighbouring areas assumed greater significance.

5. Economic Structure

Everitt's comment on the economic fortunes of market towns in the eighteenth and nineteenth centuries is perhaps a pertinent starting point for a consideration of the economic structure of a dynamic centre.

> "...revolution took place not only in the Manchesters and Birminghams of England, but also under a different and more modest guise in its more numerous Maidstones and Banburys,.....the evolution of manufactures in the market towns of England that did not develop into factory cities is unfortunately one of the most neglected aspects

> of industrial history.....these towns have been overshadowed by the goliaths of the industrial revolution"70.

Characteristic of all country towns in the period after 1700 was a degree of economic specialisation and a relatively low level of direct agricultural contact that set them apart from larger rural villages. In dynamic centres these differences were highly marked, towns in this group acquiring in some measure attributes generally associated with provincial centres and emerging industrial towns, in terms of both functions and spatial structure.

During the eighteenth and nineteenth centuries, the pattern of British economic growth falls into separate phases. In the first forty years of the eighteenth century a recognisable deceleration in both demographic and economic growth occurred[71], but between 1740 and 1770 there was rapid growth in both these sectors[72]. From 1770 the much-discussed and debated 'take off' into sustained economic growth took place, rising agricultural prices and demographic expansion creating an economic environment favourable to capital accumulation and risk taking[73]. After 1770, towns acquired the attributes or pre-requisites needed for economic growth, namely capital outlay, reorganisation of labour, new industries, diversification of agriculture and transport developments, that manifested themselves on a scale of unprecedented proportion. New stimuli in the urban economy sprung in necessary response to the rapid rise in population and the rapid rate of industrial change in the country as a whole. But although in some measure many towns in predominantly rural areas such as eastern Yorkshire underwent an industrialising experience, the most direct effects of the industrial revolution bypassed the mass of country towns. In a region largely deficient in natural resources - quarries, brickworks and various extractive industries being the major 'heavy' industrial activity - it was natural that developments in the economy of the region should focus on

agriculture. The expense of introducing industries based on imported raw materials proved too great and only Hull, through its trade with a vast hinterland, was able to industrialise its economy on a scale comparable with large towns in other parts of the country[74]. Economic development among the region's towns thus remained closely tied to the agricultural basis of regional economy but emerged into the nineteenth century on a different, more industrialised, scale.

While a decline in the proportion of the town's workforce employed directly in agriculture came to characterise most country towns in the course of the eighteenth and nineteenth centuries, it was most marked in dynamic centres. Arguably the extent of this 'divorce' from the land was an important factor governing the selectivity of urban growth, for it enabled such towns to acquire more specialised functions that set them apart from their regional counterparts. The earlier analysis of economic change in the urban system of eastern Yorkshire illustrates this point.

Scarborough, Driffield, Selby and Malton each had levels of agricultural employment well below the mean for all towns, averaging 6% in the last quarter of the eighteenth century and 5% in the first quarter of the nineteenth, with directory entries recording an even lower level[75]. In Great Driffield analysis of all occupational entries in the burial and baptism registers, in the period for which they are available after 1770, indicates that there was a fairly sharp fall in the level of direct agricultural activity in the early-nineteenth century, stabilising around 6% by mid-century (table 5.11). The continuing economic diversification left little room for agricultural activity as shops, workshops and other retailing and manufacturing units occupied space once devoted to town farms. Furthermore, within this economic sector there was also occupational change, with farmers, yeomen and husbandmen constituting a smaller percentage

Table 5.11 Occupational Structure of Great Driffield

Occupational Group	1	2	3	4	5	6	7	8
Agriculture	13.3	10.2	6.7	NA	6.4	4.9	15.6	10.7
Building	10.1	17.8	16.5	7.3	7.0	5.9	7.3	6.1
Retail/Service	16.3	15.7	15.8	32.3	24.1	26.7	13.6	9.6
All Manufacturing	40.1	35.2	42.6	37.4	34.6	28.7	28.8	27.2
(a) Textiles	1.8	1.7	0.7	-	1.2	0.7	0.1	0.4
(b) Clothing	3.6	5.7	7.8	10.4	9.6	8.7	6.4	10.0
(c) Leatherworking	13.9	9.9	12.6	8.3	7.0	5.4	6.3	5.1
(d) Ropemaking	1.0	0.3	-	1.0	0.6	0.2	0.1	0.1
(e) Milling/Brewing	6.9	5.7	6.6	2.1	5.1	3.6	4.6	3.2
(f) Wood working	1.0	3.3	4.1	4.1	4.5	4.0	4.4	2.9
(g) Metal working	8.6	6.5	7.3	6.2	4.1	3.8	3.8	3.2
(h) Other	3.3	2.1	3.5	5.2	2.5	2.3	3.1	3.3
Professions	10.5	9.8	8.6	15.6	23.0	25.0	12.0	9.3
Maritime/transport	1.1	1.3	1.4	NA	NA	NA	5.0	3.8
Domestic	-	-	-	NA	NA	NA	2.1	18.7
General Labouring	(30.7)*	(35.5)*	(32.7)*	NA	NA	NA	6.0	4.2
Miscellaneous	4.6	7.7	3.6	-	-	6.5	9.3	9.0

1. 1771-1800 (PR)
2. 1801-1820 (PR)
3. 1821-1840 (PR)
4. c.1791 (U.B.D.)
5. 1823 (B.Y.)
6. 1851 (F.W.E.R.)
7. 1851 Census Enumerators' Returns - Household Heads
8. 1851 " " " - All persons

()* As a % of all entries. See Appendix III.

of the workforce, and market gardeners, nurserymen and seedsmen registering a corresponding increase. Parish register analysis indicates that over the period 1771 to 1840 the former group declined from 89% to 59% of all agricultural entries while the latter increased from 5% to 36%.

The decline in agricultural activity was offset by increase in other economic sectors. Inter-urban differentiation in respect of sectors other than agriculture was determined in part by the extent to which agriculture remained a major occupational activity. It was towns which shed much of their direct agricultural employment which began to develop specialised trades and services.

More than any other local town, Great Driffield developed its manufacturing base in the period after 1750. In a large part, manufacturing development in the town must be seen as a result of the improvement of locational advantages, occasioned by the acquisition of good transportation links and the development of the 'new agriculture'. Manufacturing and craft industry was more structurally diverse than any other sector of town economy, occupying well over one-third of the workforce for most of the study period (table 5.11). The decline in manufacturing activity in the second quarter of the nineteenth century was accompanied by a transfer of employment into the service sector of town economy. Within the town no single branch of manufacturing or craft industry predominated, but within individual sectors there is evidence to suggest that a degree of specialisation existed which was unparallelled in other local centres. While it has been argued that specialisation was a major factor governing the selectivity of urban growth, the dominance of one or, at the most, two industries in any town failed to provide the necessary degree of diversity if that centre was to emerge as a central place within the region. The towns of the northwest of the region - Helmsley, Kirkby Moorside and Easingwold - attest this, for their

over-reliance on textile trades and crafts provided them with no subsequent base for expansion and development when they faced fierce competition from mechanised textile industries in the West Riding after 1750. This would appear to be a special case for rural areas, for certainly in more industrialised regions of the country the growth of towns such as Middlesbrough and Stoke on Trent witness the role that a single industry could play in stimulating growth[76].

Industry in Great Driffield remained closely linked with agriculture and indeed attempts to sever this relationship within the town proved mostly abortive; but it is interesting to note that the major attempts made within East Yorkshire to mechanise traditional craft industries became focused to a large extent on Great Driffield. In an age of rapid industrialisation, it appears that local entrepreneurs were anxious to harness whatever water power was available and place at least one manufacturing trade on a factory basis. Most attempts at mechanization within the region focussed on the textile trade, taking a lead from the West Riding. The availability of water power resources in the vicinity of Great Driffield made the town the focus of several attempts to introduce and industrialise textile working within the region, although Driffield had little tradition of textile working[77].

In 1769 George Strickland built a factory just outside the town to manufacture paper and carpets and to provide work for unemployed farm labourers. Although the mill's paper production appears to have been successful, the manufacturing of carpets failed[78]. By 1812 the mill was largely disused and it was subsequently converted to a flour mill[79]. A further attempt at placing textile working on a factory basis was made in 1790 when a large new cotton and worsted mill was erected next to an existing fulling mill at Wansford. The site was bought by Sir Christopher Sykes, like Strickland also an important East

Yorkshire landowner, in 1787 and let for manufacturing purposes the following year. The chief product of the mill was carpets, but it also had facilities for spinning and weaving, and for bleaching and dyeing cotton[80]. In its early days it enjoyed a degree of success, providing employment for upwards of 100 people. It attracted several migrant families from the West and North Ridings in addition to pauper children who were brought from London and housed near the factory[81]. The factory remained in operation until at least 1823, but the demand for cotton goods declined and after 1816 the venture fell into serious financial difficulties[82]. The introduction of steam as a motive power proved disastrous at Wansford, for lack of capital and high costs of imported coal placed it at a disadvantage. In 1833 the building was let to a corn miller and as a corn and bone mill it continued profitably throughout the nineteenth century[83].

The Bell Mills, old established corn mills on Driffield Beck, were rebuilt in 1792 as another textile and carpet manufactory; flax dressing and paper making also being pursued at the plant. Textile working, however, met with little success and the mills were eventually converted to crush bones and subsequently to flour milling[84]. The Bell Mills were initially the property of two Leeds merchants, Whittel York and John Sheepshanks, again witnessing the role of 'external' interest in town development. However, it was eventually Samuel Milburn a gentleman of Driffield who purchased the site and converted it to process agricultural products[85]. A further mill known as Walk Mill was built in 1790 to make spindles and wooden bobbins, perhaps as a supportive venture to the larger enterprises. Certainly this venture enjoyed a degree of success for it was converted to corn milling only in 1847[86].

By the early nineteenth century Great Driffield could be considered one of the most industrialised of eastern Yorkshire's

country towns, but over the long term none of the attempts to place textile working on a factory basis proved very successful. The town could not hope to compete in the face of districts whose comparative advantages were superior in so many respects. It is significant that all of these ventures eventually reverted to the agricultural basis of town economy; Driffield possessing six corn mills by the second quarter of the nineteenth century[87]. There was also diversification within the milling industry particularly in the extraction of oil from imported Baltic linseed and in the development of cattle, cake and paint industries as offshoots from seed crushing. Outside of Hull, few country towns participated in this trend, but both Beverley and Driffield had acquired seed and bone crushing mills and artificial manure manufactories by the mid-nineteenth century[88].

An important characteristic of the economic structure of the town was therefore the development of larger scale economic units replacing the individual and small craft workshop. The census enumerators' returns of 1851 indicate that a greater proportion of tradesmen and craftsmen employed labour in Driffield than in other local and less dynamic towns (table 5.12). Altogether sixty-four persons employed labour in the town, twenty-five of this number employing three or more men. While these numbers appear small and of a low magnitude when compared with economic organisation in industrial regions, this move towards larger-scale organisation was of significance and a characteristic feature of dynamic centres.

The eleven traders employing labour in the tertiary sector of the economy are indicative of Driffield's role as a central place within the region. The analysis of the economic dimension to change in the urban system of eastern Yorkshire indicated that, in the last half of the eighteenth century, Driffield quickly emerged as a service centre of some importance. By the early nineteenth

Table 5.12 (a) Number of Persons Employing Labour, by Occupational Group, 1851

Occupational Group	Great Driffield	Pocklington	Howden	Market Weighton	Patrington	Hedon
Building	15	4	13	1	2	3
Retail Service	9	3	6	2	-	-
Transport	1	-	-	-	-	-
Agriculture	-	-	2	-	-	-
Industry	36	10	30	1	6	5
a) Leather	6	3	16	-	1	3
b) Milling	6	2	1	-	2	-
c) Wood	1	4	1	-	1	-
d) Metal	9	-	3	1	1	-
e) Rope	-	-	-	-	-	1
f) Clothing	9	1	5	-	1	1
g) Textiles	-	-	1	-	1	-
h) Other industrial	5	-	3	-	-	-
Maritime	1	-	-	-	-	-
Professional	2	-	2	-	-	-
TOTAL	64	17	53	4	9	8

Source: 1851 Census Enumerators' Returns.

Table 5.12 (b) Number of Persons Employing Labour, and Numbers Employed, 1851

Number Employed	Great Driffield	Pocklington	Howden	Market Weighton	Patrington	Hedon
Under 3	39	9	29	2	3	3
3 - 5	17	5	16	1	4	5
6 - 10	4	3	6	1	1	-
11 - 15	1	-	1	-	-	-
16 - 20	2	-	-	-	-	-
Over 20	1	-	1	-	1	-
TOTAL	64	17	53	4	9	8

Source: 1851 Census Enumerators' Returns

century, the town had acquired many specialised services such as confectioners, fishmongers, fruiterers, furniture dealers, vets, auctioneers and fire and life insurance offices, present in many provincial centres almost a century earlier[89]. The accumulation of capital and financial support in the town was reflected in some measure in the growth of service functions and in the provision of services to handle investment.

The first banking enterprise in Driffield had been opened by Machell, Pease and Lidell of Beverley in 1790 and was followed by the East Riding Bank in 1812, and Pease, Dunn and Pease's Bank which lasted from 1816 - 1820. These were followed by the opening of a branch of the Malton and North Riding Bank which collapsed in the commercial crisis of 1825-6[90]. Further banks were opened by Hardy and Co, the Yorkshire Union Bank and the Yorkshire District Bank between 1824 and 1835, but like their predecessors many of these enterprises proved ephemeral[91]. In part, this must be atrributed to the concentration of capital in the larger centres of York, Hull and Beverley, and to the relatively short-term financial demands of industry within a predominantly agricultural area. Nevertheless, the numerous banking enterprises and the presence of brokers and other financial services by the nineteenth century indicate the importance of Driffield within the region. The developing economic role of the town had repurcussions also on its social structure and relative social standing within eastern Yorkshire.

6. Social Structure

In the hundred years following 1750 the social cohesiveness of urban society became less marked. In larger towns and cities the evolution of social groups, social differentiation and resulting residential segregation have been widely researched spects of enquiry; but far less is known about the changing social structure

of smaller urban communities. Carter and Wheatley, and Royle have both directed their attention to this, but as yet their findings have not been widely tested elsewhere[92].

From the date at which the census enumerator's notebooks become available, the social structure of individual communities can be readily analysed, but for preceding periods no precise measurement can be made. While the parish registers, and later the directories, can be employed to evidence the probable social balance in a community, the generally uninformative nature of the data base prohibits the stratification of town society into social classes or groups. Both the aforementioned sources do, however, provide a general indication of the strength of the upper and lower strata of town society. Driffield's parish registers suggest that about one in every ten persons were of professional or upper social status, while the trade directories indicate that by the early nineteenth century this proportion may have been as high as one in five. Clearly from the late eighteenth century the town began to emerge as a place of fashionable residence. Just seven resident gentry are recorded in the Universal British Directory of 1791; but later numbered forty in 1823 and fifty by mid-century[93]. At the other end of the social spectrum the lower social groups also constituted a significant proportion of Driffield's inhabitants; in the eighteenth and early decades of the nineteenth century labourers constituted approximately one-third of all occupational entries in the town's parish registers (table 5.11). The clearest picture of the social structure of the town is, however, provided by analysis of the 1851 census enumerator's returns.

The five-tier socio-economic classification developed by Armstrong in his study of York, and based on the General Register Office's classification of occupations, has been the most widely used schema in studies of urban social stratification[94]. In this

scheme, class I comprises professional occupations and all persons who employed twenty-five or more persons; class II intermediate occupations and, additionally, tradesmen employing one or more persons; class III skilled occupations; class IV semi-skilled occupations; and class V unskilled occupations. Although this schema was formulated for, and has subsequently been adopted in, studies of large towns, it has been employed here in order to facilitate comparison with larger centres. Of necessity some modifications have been made; for example, ropemakers and maltsters were placed in group III, nurserymen, seedsmen and gardeners in group IV and domestic servants in group V; furthermore, no sub-groups were identified.

In 1851 4.7% of Driffield's population was of social class I, 22.2% class II, 38.2% class III, 20.8% class IV and 14.1% class V; similar percentages to those found by Lawton and Cowlard, among others, in their analysis of social stratification in large towns and cities in England and Wales[95]. Great Driffield was, however, of slightly higher social status, although it is significant that class V households comprised a similar percentage to those of industrial towns such as Merthyr Tydfil and Wigan[96]. This would suggest that, as a dynamic town and growth centre within the region, Driffield was in some measure paralleling the pattern and process of change found in large towns. Certainly other towns in East Yorkshire, whose growth was less marked and whose industry remained largely individually based, had on average less than 9% of all households in this category. A further indication of the growing social status of the town is provided by figures relating to the employment of domestic servants. Almost one-fifth of all employment in the town was found in domestic service and one-fifth of all households also employed servants: over 60% of class I households employed domestic help and almost 40% of class II.

The developing social standing of the town, (a natural consequence of demographic and functional expansion) is further evidenced by a 'sophistication' of urban life and urban improvement. The town possessed few public buildings before 1750 as it performed few functions that needed them. In the larger provincial towns and regional centres of England and Wales such facilities had already appeared by the close of the seventeenth century[97], but they did not appear in country towns for a further century. Urban improvement, instigated largely by wealthier town residents, occupied three distinct areas; the improvement of town appearance through the provision of lighting, paving and sanitation; the building of public amenities, such as market halls and corn exchanges; and the provision of theatres, assembly rooms and sporting facilities. Table 5.13 shows the known dates at which Driffield acquired these various improvements.

One of the key elements in urban improvement and in the shaping of urban culture and consciousness was the appearance of leisure and service facilities designed to cater for the growing upper and middle classes of urban society. One such facility was educational provision which had been concentrated in the endowed grammar schools of the region in the pre-industrial period. These schools, however, were in a poor state by 1800 and the role of educational provision was largely taken over by private academies and boarding schools. Dynamic centres took the lead. Driffield, Malton and Selby had ten, fifteen and fourteen such institutions respectively by the mid-nineteenth century in contrast to one or two apiece sixty years earlier[98].

The new urban elite of developing country towns also demanded leisure facilities of a comparable nature to those of regional centres. This demand was met in Great Driffield through the building of an assembly room, the provision of sporting facilities and the development of the theatre (table 5.13). A Hunt Room was

Table 5.13 Chronology of Urban Improvement in Driffield

Hunt	c 1770
Horse Races	c 1770
Post Office	1772
Hunt Room	1773
Theatre	c 1775
Farmers Club	1795
Dispensary	1816
National School	1818
Book Club	1822
Savings Bank	1831
Anglers Club	1833
Gas Lighting	1835
Mechanics Institute	1837
Infant School	1839
Public Rooms	1841
Corn Exchange	1841
Court	1844
Driffield and East Riding Agricultural Association	1853

built in 1773 and became, thereafter for a time, the scene of "gay assemblies, theatricals and social gatherings"[99], a permanent assembly room being erected in 1841. The appearance of the theatre in the town dates from the last quarter of the eighteenth century, some 50 years after the appearance of permanent theatrical companies in the provincial towns of York and Bath[100]. At this time, however, the town boasted no permanent theatre; a warehouse on the corner of Beverley Road, the Hunt Room, a room behind the Buck Hotel and later the corn exchange, all sufficing as temporary theatres before the first permanent building was erected in 1858[101]. Other social provision was in the form of institutions and societies designed to improve the intellectual capabilities of town inhabitants. As an important central place within East Yorkshire, developments in Driffield closely followed those in the county town of Beverley and were generally some ten years in advance of similar developments in other local towns. Agricultural societies and farmers' clubs were established in the town at the turn of the eighteenth century and religious and educational societies in the first decades of the nineteenth. The Religious Tract Society and the Auxiliary Bible Society founded in the second decade of the nineteenth century, were followed by the Book Club in 1822 and the Mechanics Institute in 1837[102].

At the other extreme of the social spectrum was the problem of the poor; a problem that was generally of greater magnitude in the fastest growing towns, particularly where inmigration had been a significant element in the growth experience of these places[103]. Workhouses, which had been opened in the eighteenth century to cater for the poor, were generally ill-suited to meet demand: the one at Driffield housed just three inmates in 1795, for the town found it cheaper to pay the paupers relief, or to farm them out, than to place them in care. Following the Poor Law reform act of 1834, a new and larger workhouse was built in Middle

Street North with accommodation for 200. There is evidence to suggest, however, that this may in some measure have increased social problems in the town. Following its construction the number of illegitimate births rose sharply to 135 out of a total of 1131 in the decade 1841 - 1851, and in the period from March 1847 to March 1848 more than 2,000 vagrants were received at the workhouse, a 100% increase over the previous year[104].

The increasing polarisation of urban society became most clearly reflected in the morphological and spatial structure of the community. Social stratification was determined and intensified by industrialisation and concomitant increases in the division of labour. Landownership, land-tenure, and the building process led to various areas of the town being made available by town proprietors to different types of household, giving rise to distinct physical, social and residential spatial patterns.

7. Spatial Structure

(a) Morphology

Among the majority of country towns there was little physical extension of the built area in the period before 1850, infilling being the characteristic process in most centres. Herein lies an important distinction between dynamic centres and expanding and stable towns, for the former saw considerable alteration to the physical urban environment in the same period. In all country towns the century between 1750 and 1850 witnessed the erection of several hundred new dwelling units, the principal processes at work being the demolition and rebuilding of existing properties, infilling of vacant plots and the subdivision of plots to provide additional elements in the building frame. To the long established pattern of two or three main streets were usually added numerous lanes, alleys, courts and yards. In Great Driffield, however, the dynamic nature of population growth necessitated

physical expansion of the built area and, as figure 5.7 shows, the town had undergone a considerable degree of restructuring by the mid-nineteenth century. Although the concepts of fixation lines and fringe belts, introduced by Conzen and subsequently developed by Whitehand[105], cannot be easily applied to explain the pattern and process of morphological change in unincorporated towns (which generally possessed a loosely compacted physical structure), they are demonstrably of some validity. In the period 1750 to 1850 both intra-mural and extra-mural development occurred in Great Driffield. Within the loosely defined early eighteenth century fixation line formed by Westgate, the beck and Dye House Garth Lane, new streets were laid and infilling took place as former smallholdings and garden plots were encroached upon. Extra-mural development occurred in two main areas, to the east of the beck in Eastgate, Washington Street and New Road, and to the south of the town around the canal basin. The former area developed as a result of two factors; first, the dispersion of formerly centrally located agricultural activity as pressure for space within the central area grew; and second, the desire of high status households to physically distance themselves from the remainder of the population. The other main foci of extra-mural growth, the canal basin, marked an important phase in the development of the town. It was the first area to acquire a distinctive land-use in terms of both the dominance of commercial and industrial activity and the separation of economic and residential function. The inception of the railway in 1846 further stimulated development of Driffield's southern margins.

In country towns most land for development was provided by lesser landowners who released small units of land within the town. Furthermore, it was largely this group who were active in the building process[106]. In the dynamic town of Great Driffield, however, larger landowners also came to play a part in acquiring

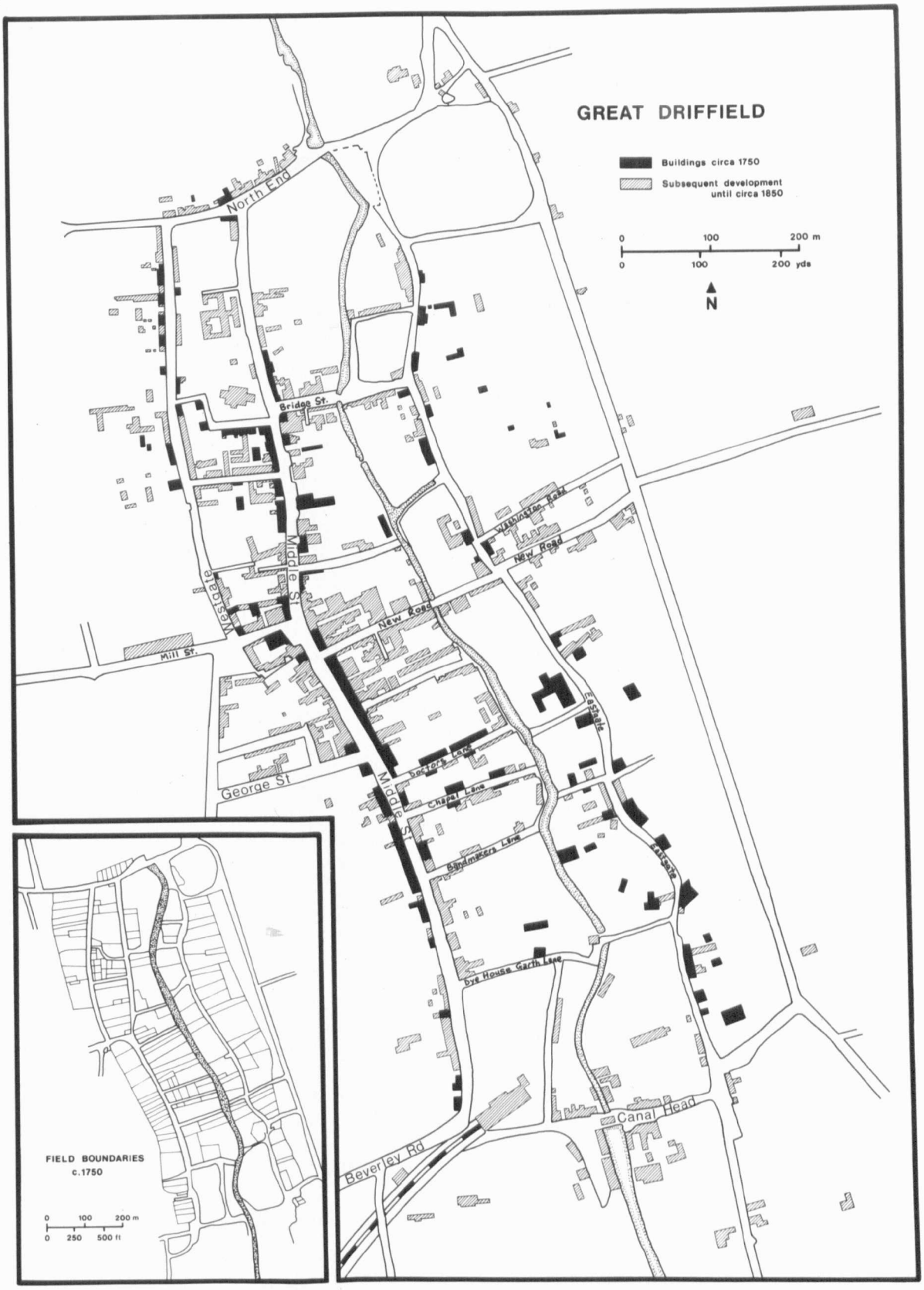

Fig.5.7 The Expansion of the Built Area in Great Driffield, c.1750-1850

and developing land. From the Land Tax returns of the period 1782-1832, it is possible to identify three broad land and property owning groups. Landowners taxed at over £5 generally owned little town land; their property was largely confined to extensive tracts of agricultural land outside the built area. Landowners paying between £1 and £5 tax commonly owned land on the urban fringe and more extensive tracts of town land, whilst the holdings of those owners taxed at less than £1 could generally be found within the urban area. In Great Driffield small property owners were clearly of importance in urban development for between 1792 and 1832 the number of taxpayers paying between 10/- and £1 declined from 14.6% to 7.4% and at the same time the number of owners taxed at less than 4/- increased from 29% to 41%. But contrary to the experience of less dynamic towns, intermediate property owners increased their share of property; the number of taxpayers paying between £1 and £5 rising from 13% to 17% of all property owners in the same period[107]. (Appendix V (a))

The development of the town is further reflected in the increase in the number of dwellings; numbering 320 in 1801 they rose to 646 in 1841,an increase of just over 100%. The provision of new dwellings at a fairly fast and consistent rate meant that the problem of overcrowding, characteristic of larger industrial cities, was never a problem in the town. The census returns record a very low level of shared dwellings, just seventeen in 1831, and the Land Tax returns evidence only a small proportion of multiple tenancies[108]. Indeed occupance rates remained low, and although they slowly increased in the first half of the nineteenth century, were only 5 to 1 in 1841.

The expansion of Driffield, as in other towns in England and Wales, involved considerable change in the nature of the urban fabric. Low one-storey houses of mud and thatch, that characterised the town in the early-eighteenth century, were

replaced by brick and tile houses. Three main building processes were at work in the town: demolition, new building and the refurbishing of older houses. These processes, as elsewhere, had clear social links. The gentry and professions were largely responsible for building new houses, and merchants and manufacturers for remodelling existing ones; the working classes occupied small cottages. While Beverley, more than any other East Riding town, attracted a wealthy residential class which became reflected in the emulation of current architectural fashion[109], Great Driffield with its developing middle- and upper class also participated in this trend. Between 1800 and 1840 all the houses in Middle Street (between the Market Place and the railway station), and also in New Road, Mill Street and George Street were either refurbished or newly built. In this period it was estimated that only about one dozen houses in the town remained unaltered[109]. Over the period from 1830 to 1850, the 259 properties built in the town comprised twenty-seven houses with shops, five industrial premises, 47 medium to large dwelling houses and 180 workers cottages[110].

The restyling of much of the urban fabric led to new levels of residential segregation, the town mirroring in miniature many of the patterns found in larger towns and cities at this time. In a town of only 4,000 inhabitants at mid-century sharp patterns of differentiation found by, for example, Pooley in Liverpool and Shaw in Wolverhampton[111], would not be expected but, as Carter and Wheatley found in the mid-Wales town of Aberystwyth, socio-economic segregation was becoming an established pattern within smaller towns[112].

(b) Socio-economic patterns

While the degree to which homes became separated from workplaces is not clear, there is evidence to suggest that by the first quarter of the nineteenth century certain areas in Driffield

had been given over to industry and trade while other areas had assumed a more residential character[113]. The limited transition from domestic to factory industry in the town had, among other things, led to the emergence of specific functional concentrations; namely trading areas with few inhabitants and residential zones characterised by lower levels of industrial activity, and the dominance of professional services. Analysis of the location of tradesmen and the professions recorded in Baines' directory of 1823 (although unfortunately only general street locations are given), suggests something of the socio-economic structure of Great Driffield at this time. Within the town the market place and surrounding streets naturally became the focus of the retail and service trades while a large number of craft industries, particularly producer-retailers, also occupied the central area. The area around the canal head had become an important subsidiary manufacturing area and the centre of the wholesale trade on account of the merchants, factors and dealers who leased or built warehouses there (figure 5.8). The wealthier inhabitants and professions chose to reside principally to the east and the south of the town in Bridge Street, New Road and Washington Street, and on Beverley Road. Evidence from the 1851 census enumerators' returns demonstrates in a more comprehensive manner, the detailed patterns of social and economic differentiation present in the town by mid-century.

By 1851 a complex pattern of socio-economic areas existed. There was a marked division between the central area and the urban margins, but within the former there was also a clear distinction between the central axis formed by the main street frontages, and the small back lanes, courts and yards of inferior housing stock. Economically one of the most significant developments within the town was the emergence of a clearly recognisable commercial core stretching along the east side of Middle Street from Bandmakers

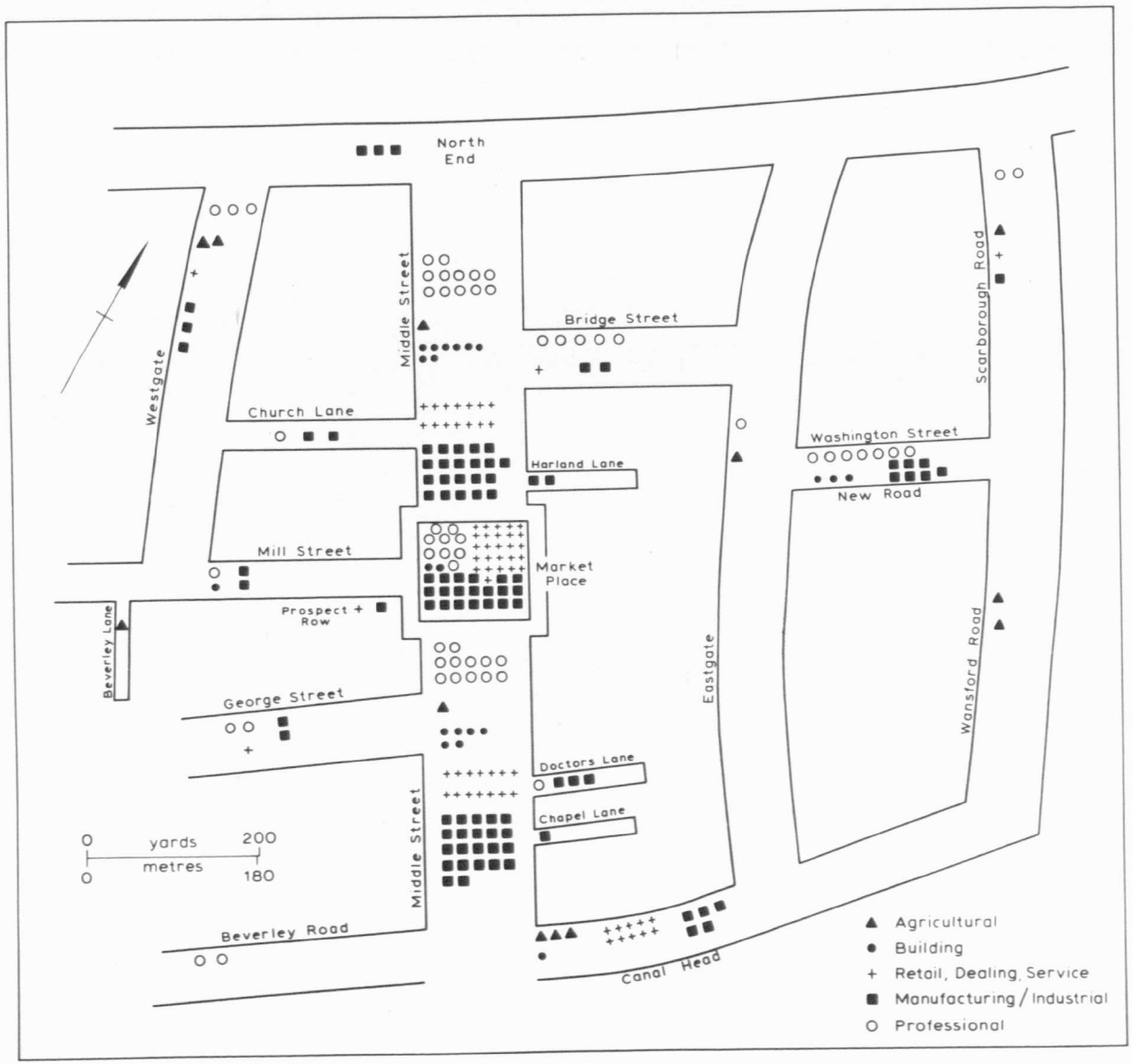

Fig.5.8 Location of Economic Activity in Great Driffield, 1823

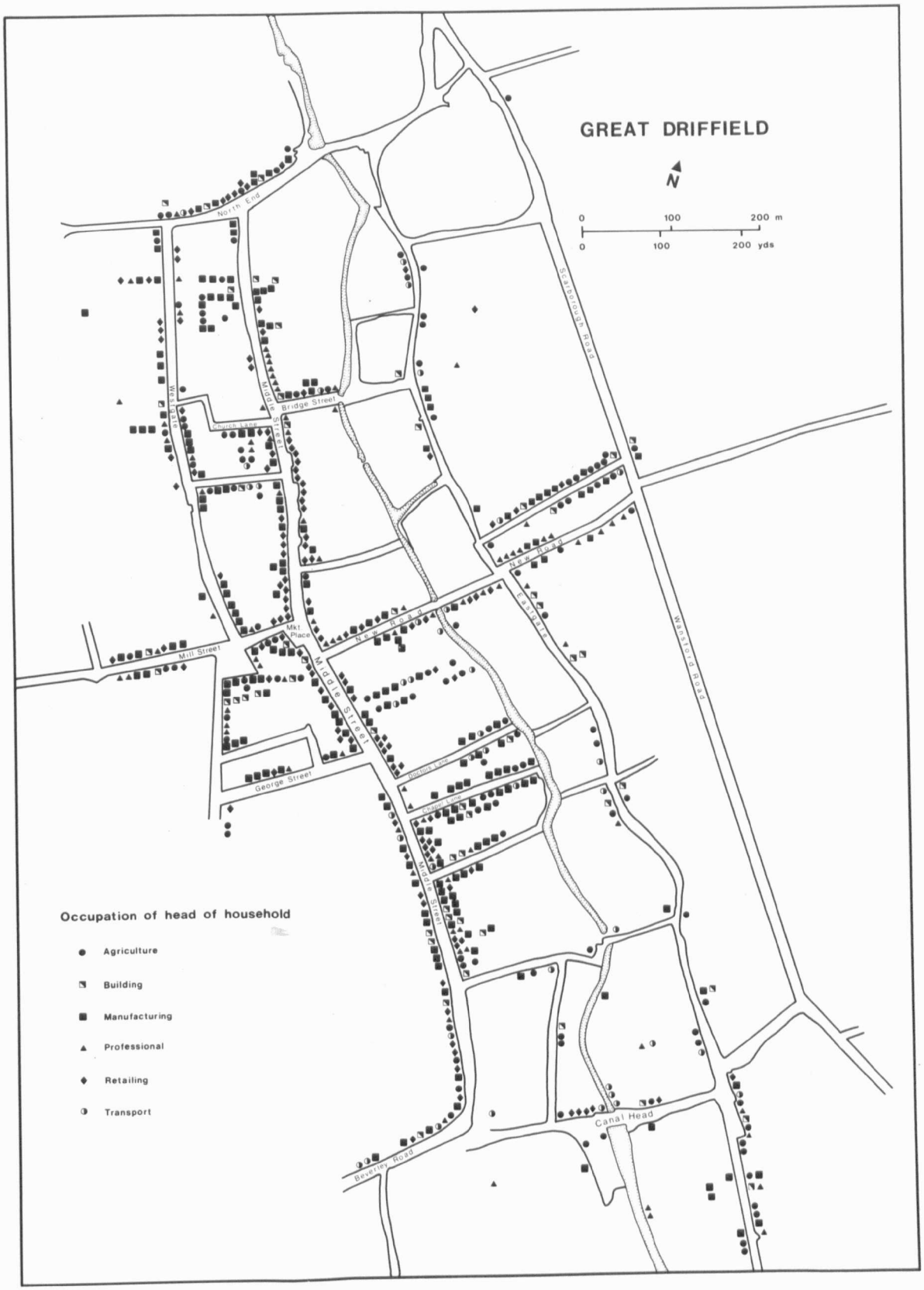

Fig.5.9 Location of Households Engaged in Selected Economic Activities in Great Driffield, 1851

Lane to Bridge Street (figure 5.9). The west side of Middle Street was also characterised by a high proportion of retailers; but a considerable number of craftsmen, particularly producer-retailers, continued to occupy this central location. Almost 50% of all retailing in the town was in fact found in Middle Street (see Appendix V (b)), the remainder being widely dispersed around the town. Professional services were few within this commercial core: most favoured a location at the northern or southern end of Middle Street, or to the east of the town along Bridge Street and New Road, specific functional concentrations within this sector of tertiary activity being quite marked.

Location quotients can be usefully employed to suggest the degree and significance of different economic sectors within various streets and areas of the town. As table 5.14 indicates, location quotients for retailing were 2.0 and 3.4 for Middle Street and the Market Place respectively, and 3.2 and 2.0 for professional activity in New Road and Bridge Street. Areas such as Brewery Lane, Promise Square, Beverley Lane, and Union Street, which displayed high concentrations of manufacturing and craft workers, were noticeably under-represented by one or more areas of tertiary activity.

Not surprisingly agricultural activity showed a clear leaning towards the urban margins, particularly Eastgate, and clearly the developing commercial importance of Driffield left little room for agricultural activity within the central area, a feature that characterised the less dynamic towns of the region on a smaller scale. The location of manufacturing and craft industry presents a less distinct picture. As can be seen from figure 5.9, manufacturing was widely dispersed throughout the town, the most characteristic feature being the tendency for craft industry to occupy the small lanes, alleys, courts and yards that had been built to infill the central area. Leatherworking dominated

Table 5.14 Location Quotients of Socio-Economic Groups in Great Driffield, 1851 (Heads of Households)

	Social Class					Economic Activity				
Street/Area	I	II	III	IV	V	Ag	Buil	Retail	Prof	Man
1. Beverley Lane, George Street, Union Street, Prospect Row, Pinfold Place.	0.4	0.2	0.5	1.9	1.5	1.1	2.1	0.2	1.1	1.2
2. Beverley Road.	-	0.6	1.9	0.6	-	1.7	2.1	1.1	-	0.5
3. New Road.	4.1	0.9	1.1	0.7	-	0.4	0.3	1.8	3.2	0.8
4. Brewery Lane, Promise Square, Church Lane.	1.6	0.9	0.8	1.5	1.2	2.0	0.7	0.2	0.4	1.1
5. North End.	-	0.4	1.2	0.6	2.0	0.9	1.3	1.0	-	0.7
6. Bridge Street.	5.7	2.6	2.3	1.9	0.6	0.8	-	0.7	2.0	0.9
7. Mill Street, Kings Mill Cottages.	0.7	1.3	1.4	0.7	-	1.0	0.5	1.6	1.5	1.3
8. Westgate, Dossers Place.	0.2	0.4	1.0	0.5	2.5	0.4	0.4	0.7	0.8	1.0
9. Washington Street.	0.6	0.1	1.0	1.8	0.4	1.9	1.2	0.6	0.5	0.9
10. Eastgate.	1.1	0.8	0.8	1.5	1.2	1.6	1.4	0.3	0.9	0.6
11. Middle Street.	1.1	1.9	1.0	0.3	0.4	0.3	1.2	2.0	1.5	1.2
12. Market Place.	-	2.2	0.5	0.5	-	0.6	1.6	3.4	-	1.2
13. Canal Basin.	1.5	1.3	0.8	0.9	-	1.5	0.9	2.0	0.5	0.9
14. St. John's Street, Dye House, Garth Lane.	-	0.5	1.4	2.9	4.2	2.8	1.7	- 0.8	-	
15. East Cottages, Wansford Road.	-	0.3	2.0	0.8	-	1.0	-	-	-	3.0
16. Bandmakers Lane, Chapel Lane, Doctor's Lane, Brook Row, Providence Place.	-	0.2	0.1	1.6	1.4	1.1	1.1	1.3	0.1	1.3

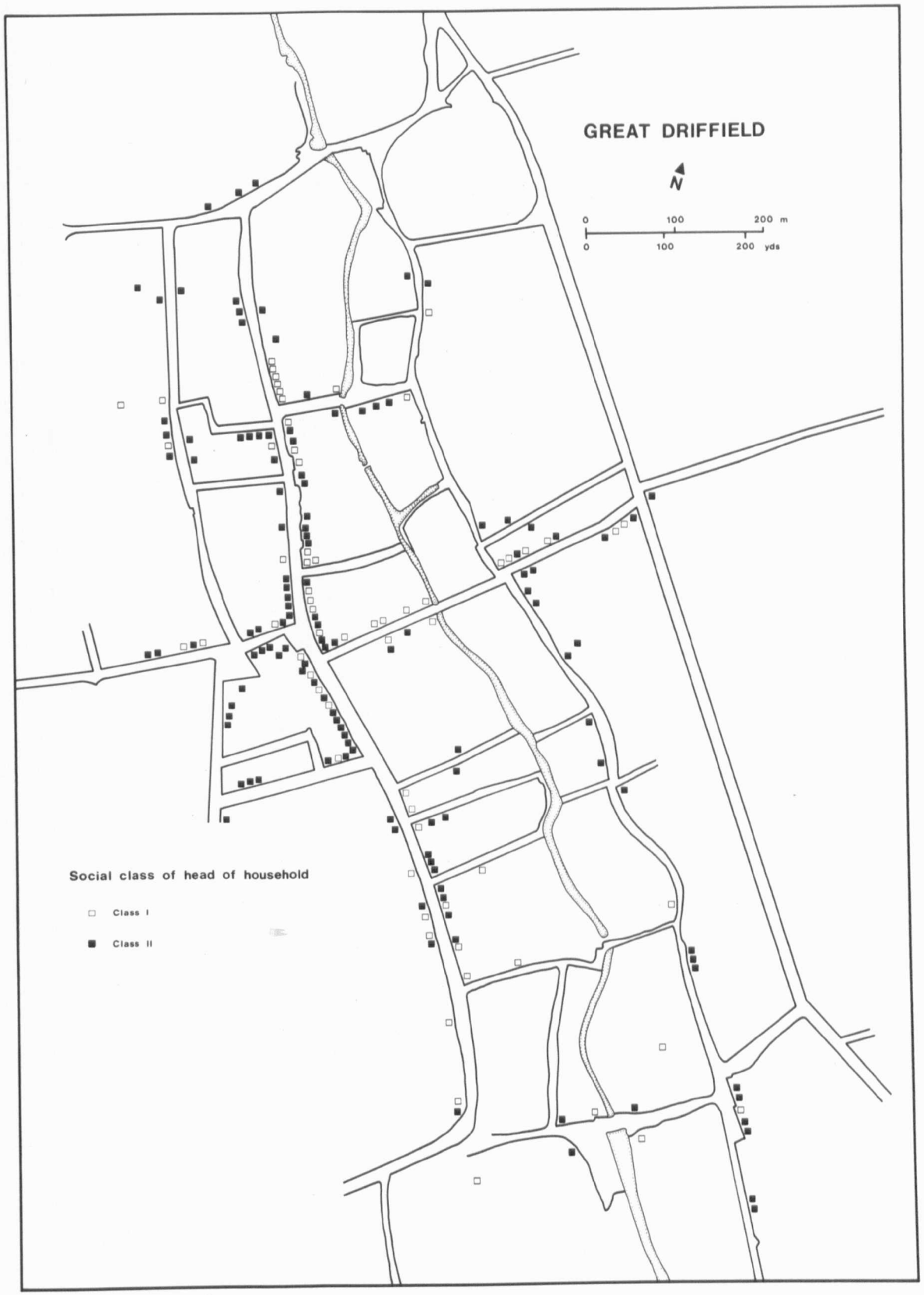

Fig.5.10 Location of Class I and II Households in Great Driffield, 1851

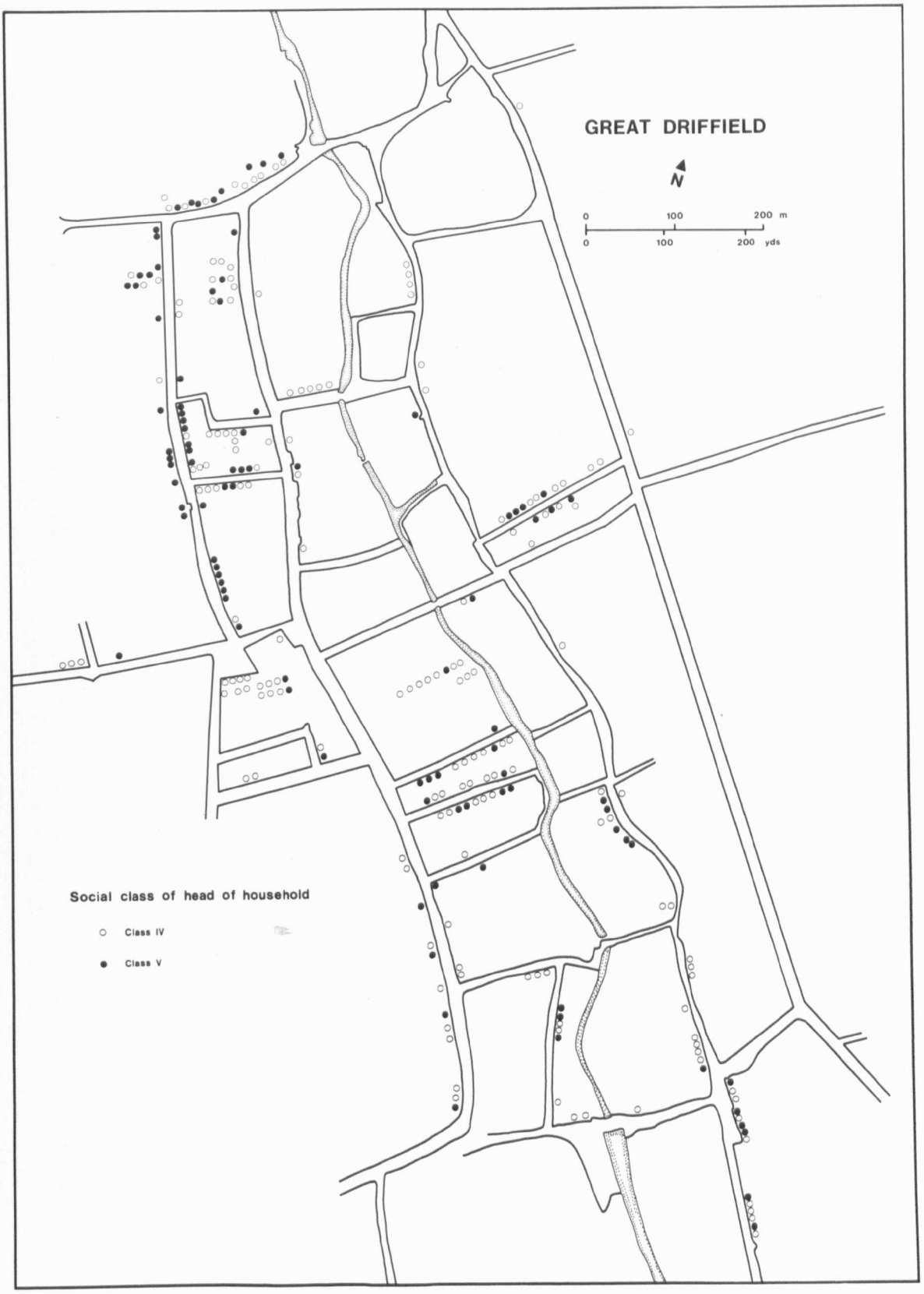

Fig.5.11 Location of Class IV and V Households in Great Driffield, 1851

Bandmakers Lane, and wood and metal working Chapel Lane and Doctors Lane; clearly small industrial nuclei were present within the town, but on a scale far less marked than in towns where a specific industry dominated much of the urban economy[114]. Milling, although only occupying between 3% and 5% of the workforce in 1851, had two distinct locations, Mill Street and Kings Mill Road to the west of the town and the Canal-side area to the south.

The spatial differentiation of economic activity was closely linked to social structure. High status residential areas showed a close correlation with professional service, low-status residences with agricultural and labouring activity, and middle-class residences with manufacturing and retail trades. The infilling of much of the central area of Great Driffield reduced much of its attractiveness and from the turn of the eighteenth century there was a clear tendency for many of the wealthier residents, both professions and tradesmen, to move towards the margins. As in her larger counterparts, upward social mobility tended to be reflected in residential mobility[115], leading to the development of high-status residential areas. Within even the most dynamic of country towns it would appear that this move was nowhere complete by the middle of the nineteenth century. While nuclei of high status households are recognisable along New Road and Bridge Street, the remaining class I residents were fairly well dispersed as were those in class II. Most noticeable is the virtual absence of households in these groups in locations other than the main street frontages, and this must be seen as a distinctive socio-spatial pattern within country towns (figure 5.10). Unlike larger towns, these centres were too small to create distinct zones of high-status households but rather, through the operation of a distinctive building process, witnessed a developing dichotomy between the principal street axes and infill of interstices. Accordingly very few households of class IV or V

were located on Middle Street or on New Road or Bridge Street; they predominated in the small lanes to the east of the former and in the northwest of the town on Westgate and in the surrounding streets, one being aptly named Dossers Place (figure 5.11). Again the use of location quotients may serve to substantiate these points.

Location quotients of 4.1 and 5.7 for class I households in New Road and Bridge Street attest the emergence of both locations as socially distinct residential areas. At the other end of the spectrum Westgate and all the small lanes and alleys to the east and west of the central axis of the town, formed by Middle Street, were over-represented by households in classes IV and V (table 5.14). The principal street axes were characterised by a more balanced social structure although here, with the exception of the more agriculturally dominated Eastgate, low status households were generally few.

The spatial structure of Great Driffield that emerged at mid-century was clearly reflective of the towns dynamic growth experience. More than any other East Riding town, Driffield had undergone a degree of morphological restructuring largely occasioned by population pressure and the forces of externality operating upon the town. This in turn gave rise to a distinct spatial structure in which a parallelism was able to develop between physical and social distance in terms of the principal axes and interstitial infill. In this respect the experience of Great Driffield had begun to approach that of larger and far more dynamic centres. While it would be wrong to overemphasise the parallels between large centres and dynamic country towns, it is evident that some can be drawn. The regional importance of the latter and the nature of their growth experience meant that in

certain respects they came to mirror in miniature the pattern and process of change in their larger counterparts.

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58. All demographic information concerning the town is drawn from H.C.R.O. PR 943 - 947, and from the printed census returns of the Registrar General.

59. For Example, RAZZELL, P.E. 'Population Change in Eighteenth Century England', Econ Hist Rev, vol.18, 1965, pp.312-332; KRAUSE, J.T. 'English Population Movements between 1700 and 1850', in DRAKE, M. ed Population in Industrialisation. London, 1969, pp.118-127; KRAUSE, J.T. 'Some Neglected Factors in the English Industrial Revolution', Journal of Economic History, vol.19, 1959, pp.528-540. WRIGLEY, E.A. 'Family Limitation in Pre-industrial England', Econ Hist Rev, vol.19, 1966, pp.82-109; MARTIN, J.M. The Rise of Population in Eighteenth Century Warwickshire. (Dugdale Society Occasional Papers No.23) Oxford, 1976; The debate is well summarised in FLINN, M.W. British Population Growth. London, 1970, and in WRIGLEY and SCHOFIELD, op.cit.

60. For Example, Y.C. 24/5/1768; H.A. 20/12/1794.

61. See note 59.

62. B.M. Add Ms, 6896.

63. Deane and Cole estimate that 3,500 people left the administrative region of the East Riding between 1700 and 1750; DEANE, P. and COLE, W. British Economic Growth 1688-1959. Cambridge, 1964, pp.109, 115.

64. B.P.P. VIII part 1, 1836, Report of The Select Committee on Agricultural Distress.

65. F.W.E.R., 1851; H.C.R.O. DDX 17/15.

66. H.A. 25/4/1849; MELVILLE, J. Directory and Gazetteer of Kingston Upon Hull. Hull, 1855.

67. See for example the study by PATTEN, J. Rural-Urban Migration in Pre-Industrial England. (University of Oxford, Department of Geography, Research Papers No.6). Oxford, 1973.

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69. NOBLE, 'Change', op.cit.; all marriage distance information is from parish registers, see note 58.

70. EVERRITT, A. 'The Primary Towns of England', Local Historian, vol.11, No.5, 1977, pp.263-275, p.273; EVERITT, A. 'The Banbury's of England', Urban History Yearbook 1974, Leicester, 1974, pp.28-38.

71. LITTLE, A.J. Deceleration in the Eighteenth Century British Economy. London, 1976, passim.

72. DEANE and COLE, op.cit., pp.78-80.

73. ibid., chapter 8; MATTHIAS, P. The First Industrial Nation: An Economic History of Britain 1700-1914. London, 1969; MUSSON, A.E. The Growth of British Industry, London, 1977.

74. JACKSON, G. The Economic Development of Hull in the Eighteenth Century. (Unpublished Ph.D thesis, University of Hull, 1959); GILLET, E. A History of Hull. Oxford, 1980.

75. See chapter 3.

76. BRIGGS, A. Victorian Cities. London, 1964, chapter 6; CHALKLIN, C.W. The Provincial Towns of Georgian England. London, 1974.

77. There is evidence to suggest that some textile working was pursued in the seventeenth century as the manorial court of Driffield prohibited the retting of hemp except in the old hemp dyke, the dyeing of hemp in the oven or by the fireside and the retting of linen, but the parish registers record few textile workers. H.U.A. DDCV 42/10; H.C.R.O. PR.

78. BARLEY, M.W. The History of Great and Little Driffield. Hull, 1938. (Published by the Department of Adult Education, University of Hull).

79. ibid.

80. ALLISON, K.J. East Riding Water Mills, (E.Y.L.H.S., No.26) York, 1970, p.20.

81. H.C.R.O. DDX 129/27.

82. ALLISON, 'Water Mills', op.cit., pp.20-21.

83. ibid.

84. H.C.R.O. DDX 17/15.

85. ibid.

86. ibid.

87. F.W.E.R. 1851.

88. H.C.R.O. DDX 17/15.

89. ALEXANDER, D. Retailing in the Industrial Revolution. London, 1970.

90. H.C.R.O. DDX 17/15.

91. ibid.

92. CARTER, H. and WHEATLEY, S. 'Fixation Lines and Fringe Belts; Land Uses and Social Areas: Nineteenth Century Change in the Small Town', T.I.B.G., New Ser, vol.4, No.2, 1979, pp.214-238; ROYLE, S.A. Aspects of Social Geography of Leicestershire Towns 1837-1871. (Unpublished Ph.D thesis, University of Leicester, 1976).

93. U.B.D. 1791; B.Y. 1823; F.W.E.R. 1851; In addition the directories list numerous 'untitled' persons who were obviously of some social standing within the town.

94. ARMSTRONG, W.A. Stability and Change in an English Country Town. Cambridge, 1974; ARMSTRONG, W.A. Social Structure of York 1841-51. (Unpublished Ph.D thesis, University of Birmingham, 1967); ARMSTRONG, W.A. 'The Use of Information About Occupation', in WRIGLEY, E.A. ed Nineteenth-Century Society. London, 1972, pp.191-310; See also LAWTON, R. ed The Census and Social Structure. London, 1978.

95. LAWTON, R. and POOLEY, C. The Social Geography of Merseyside in the Nineteenth Century. (Final Report to S.S.R.C.) 1977. COWLARD, K.A. 'The Identification of Social Class Areas and their Place in Nineteenth Century Urban Development', T.I.B.G., New Ser, vol.4, No.2, 1979, pp.239-57; ARMSTRONG, 'Stability', op.cit.

96. CARTER, H. and WHEATLEY, S. The Spatial Structure of Merthyr Tydfil. (University College of Wales, Aberystwyth, Department of Geography, Working Papers Nos.1-2), Aberystwyth, 1978; JACKSON, J. Aspects of Housing Development and Social Structure in the Mid-Victorian Period in St.Helens and Wigan. (Unpublished Ph.D. Thesis, University of Liverpool, 1977).

97. BORSAY, P. 'The English Urban Renaissance: the Development of Provincial Urban Culture c.1689-1760', Social History, vol.19, 1977, pp.581-604.

98. LAWSON, J. The Endowed Grammar Schools of East Yorkshire. (E.Y.L.H.S., No.14). York, 1962; U.B.D., 1791; S.Y., 1849.

99. Beverley took the lead among East Yorkshire country towns, the assembly rooms there for example being built in 1761. H.C.R.O. DDX 17/15.

100. BORSAY, op.cit.; SHEPPARD, T. The Evolution of Drama in Hull and District. Hull, 1927, p.194.

101. H.C.R.O. DDX 17/15.

102. Census of Population 1851; ROSS, F. Contributions Towards a History of Driffield and the Surrounding Wolds District. Driffield, 1898.

103. It is significant that as a dynamic centre Driffield had a higher proportion of inhabitants in class V, clearly reflecting the large numbers of labourers that had come to work in the town.

104. MITCHELSON, N. The Old Poor Law in the East Riding of Yorkshire. (E.Y.L.H.S., No.2), York, 1953; H.C.R.O. PR 947; H.A. 24/3/1848.

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106. NOBLE, M. 'Land Tax Returns and Urban Development', The Local Historian, vol.15, No.2, 1982, pp.86-91.

107. H.C.R.O. QDE, LTA.

108. It appears to be the case, however, that groups of properties held by one proprietor were not always listed separately in the returns and thus the number of multiple tenancies, ie. those properties tenanted by more than one individual, may have been higher than the Land Tax returns suggest.

109. H.C.R.O. DDX 17/15.

110. ibid.

111. LAWTON and POOLEY, op.cit.; SHAW, M. 'Reconciling Social and Physical Space: Wolverhampton, 1871', T.I.B.G. New Ser, vol.4, No.2, 1979, pp.192-213.

112. CARTER and WHEATLEY, 'Fixation Lines', op.cit.; This was also found to be the case in the four Leicestershire towns studied by Royle, ROYLE, op.cit.

113. This is similar to the pattern found by Warnes in Chorley. WARNES, A.M. 'Early Separation of Homes from Workplaces and Urban Structure of Chorley, 1780-1850', Transactions of the Lancashire and Cheshire Historical Society. No.122, 1970, pp.105-135; WARNES, A.M. 'Residential Patterns in an Emerging Industrial Town', in CLARK, B.D. and GLEAVE, M.B. eds. Social Patterns in Cities. (I.B.G. Special Publication, No.5). London, 1973, pp.169-190.

114. For Example iron working in Merthyr Tydfil; CARTER and WHEATLEY, 'Spatial Structure', op.cit.; and textile working in Chorley, WARNES, 'Early Separation', op.cit., 'Residential Patterns', op.cit.

115. LAWTON, R. 'Population and Society 1730-1900', in DODGSHON, R.A. and BUTLIN, R.A. eds An Historical Geography of England and Wales. London, 1978, p.355; TUNBRIDGE, J.E. 'Spatial Change in High Class Residence: the Case of Bristol', Area, No.9, 1977, pp.171-174.

CHAPTER 6

EXPANDING CENTRES

Many of the factors that brought to prominence Dynamic Centres were also operative within Expanding Centres, but on a more tempered scale. Locational advantage, nodality and externality were all present giving access to expanding and intensifying local hinterlands; but these towns, with the exception of Beverley, developed sub-regional influence as opposed to the regional influence characteristic of dynamic centres. As sub-regional centres they became intermediate points within the urban system, but nevertheless had access to sufficiently large market areas to develop specialised services and to provide a degree of competition with other local towns[1]. As was the case with dynamic centres, the towns falling within this group were diverse, comprising a county town - Beverley, a port cum developing resort - Bridlington, and three inland market towns - Thorne, Pocklington and Market Weighton. The nature of their growth gave them a common experience, yet they each occupied distinct levels of the urban hierarchy. Beverley perhaps stands out amongst this group for it occupied the first tier of the hierarchy of country towns throughout the course of the study period. But although the town experienced expansion in all sectors of urban life and retained its regional dominance due to its county status, rates of demographic and economic growth were lower than in dynamic centres and accordingly the town saw little increase in either its share of regional urban population or contribution to regional centrality. Likewise Bridlington, also a high order country town, underwent little change in its regional standing, but the three inland towns each witnessed positive change in their regional position. As previously noted, it is this latter

type of town, the middle and lower order inland country town, concerning which the forces behind, and the results of, the process of selectivity of growth are least well understood. It seems pertinent, therefore, to focus attention on two towns in this latter group, namely Pocklington and Market Weighton, where the reasons for expansion are less obvious than in a county town or port[2].

One of the major, or predominant, characteristics of dynamic centres was their ability to compete successfully within the region, establishing a degree of hegemony over an extensive area. In many ways it can be argued that it was competition from these dynamic towns and an inability to compete as successfully due to locational and nodal constraints that held other towns in 'check', limiting their growth experience to one of expansion as opposed to dynamism.

1. Competition

(a) Location

Like Great Driffield, both Market Weighton and Pocklington had few locational advantages in the period before 1750; an ill-developed regional transportation infrastructure and the unimproved state of agriculture in many areas served to restrict growth. The reversal of these factors in the ensuing century gave both towns the opportunity to participate in regional development.

Situated in juxtaposition to two contrasting agricultural areas of the Wolds and the Vale of York, Market Weighton and Pocklington each drew trade from a fairly extensive area. While the Wolds benefitted most from the 'new agriculture', the Vale of York was rather less affected[3]. The general low-lying and often ill-drained country of the Vale had not been favourable to the development of extensive open field arable land. Nowhere else in the East Riding were common pastures so extensive. The large commons of Bishopsoil, Holme Moor and Wallingfen, together with the adjacent commons of

Weighton, Cliffe, Hotham and Cave, formed a great expanse of common pasture at best partially drained and largely unenclosed. Only about one-quarter of the East Riding part of the Vale of York was enclosed after 1730, leaving the area as one in which grazing land predominated[4]. Poor drainage of the heavier soils hindered improvement and it was largely the lighter soils that benefitted from the new husbandry: flax and rye becoming of particular importance[5]. Only by enclosure were the full benefits of the new husbandry enjoyed and the more limited extent of enclosure in the Vale (44,000 acres in the period 1730 - 1810)[6], meant that alterations in land use were less marked; accordingly the amount and type of agricultural produce available for marketing were subject to less change.

While both towns had the 'potential' to become market centres of more than local importance by virtue of their location, the slower development of agriculture in the Vale, and the fact that Driffield was in a better position to draw much of the trade from the highly productive High Wolds, served to limit their participation in regional trade. The eighteenth and nineteenth centuries also saw both towns develop their transport linkages but, as in the case of agriculture, certain factors operated to restrict the full impact of these developments.

The turnpike road connecting both towns to Beverley was instigated in 1764 and a further turnpike linking them to York was formed in the following year. The building of the bridge over the Ouse at Selby in 1792 gave Market Weighton additional nodal importance, for in the following year a trust was set up to turnpike the road from the bridge through Barlby, North Duffield and Bubwith to Market Weighton thus joining up with the Beverley-Kexby Bridge Trust [7]. Although these turnpikes provided both towns with important intra and inter-regional linkages, there is evidence to suggest that the quality of the roads was not enduringly improved.

As late as 1814 the road through Pocklington was said to be 'much rutted', while the road to the west of the town was 'very bad and cut up'[8]. Additional locational importance was given to the towns with their acquisition of navigational links. The canal project started at Market Weighton in 1772, just five years after the cutting of the Driffield canal, was an attempt to coalesce the often conflicting interests of land drainage and reclamation on the one hand and those of navigation on the other[9]. Pocklington acquired its canal more than 40 years later in 1814, eighteenth century attempts to provide the town with a navigational link having proved abortive[10]. While, as will be demonstrated, these navigations did much to encourage economic expansion in the towns, it occurred on a contracted scale. The reason for this lay in the failure of both ventures to raise sufficient capital to enable the canals to be brought into the town. In part this failure must be explained by 'financial competition' from other already successful regional navigations. As a consequence, both canal basins were eventually located some two miles from their respective town centres, and that at Market Weighton was also half a mile from the nearest turnpike road.

The economic benefits in the form of industrial development that usually accrued with navitational schemes were, as a result, fewer in Market Weighton and Pocklington than at Beverley and Driffield. Although warehouses were built in the 1790's at Market Weighton canal basin[11], its geographical situation rendered it an unattractive proposition to would be industrialists. The main economic benefit other than trade to accrue from the navigation came not to the town which it was designed to serve but to the small township of Newport, seven miles downstream, where several brick and tile manufacturers were established, generating a considerable volume of trade. By 1840 more than 4.5 million bricks and tiles were annually exported from the settlement via the navigation[12].

Likewise at Pocklington the situation of the canal head some distance from the town precluded the development of any new industries at the basin. A large granary was erected in 1818, but no further additions were made for twenty years and by 1850 it was largely wholesalers and merchants who had established businesses there[13].

In the 1840's, with the inception of the railways, further locational advantages accrued to both centres. Pocklington and Market Weighton were connected by rail to Hull and York in 1847, the importance of Market Weighton being further enhanced with the building of a line from the town to Selby in 1848. A branch line from Pocklington to Driffield was also promised. However, subscriptions failed and the abandonment of these plans came as a blow to Pocklington, for they denied the town the status of a rail junction[14]. As in the case of Driffield, therefore, agricultural developments and the acquisition of communication links gave both towns a new and important degree of nodality.

(b) Nodality

The development of locational advantages gave expanding towns the opportunity to provide more than just basic goods and commercialized services for the local area; their intersection with local and regional transportation arteries enabling them to participate fully in central place patterns within the region. Their growth experience was, however, controlled to some extent by competition from dynamic centres possessing more advantageous nodal positions; but, nevertheless, their trade and linkages was subject to considerable expansion in the hundred years between 1750 and 1850.

Specialisation in trade also became characteristic of expanding centres for, as has already been argued, a degree of specialisation was necessary to make a town of more than merely local importance[15]. In the course of the eighteenth century Market

Weighton emerged as the second most important grain market in the East Riding, handling thousands of quarters weekly[16]. Published newspaper returns for Howden's grain market indicate that grain fetched on average £2 a quarter[17]; if similar prices are assumed for Market Weighton, the weekly revenue brought to the town by the grain market must have been of the order of several thousand pounds. The spatial location of market specialisation within East Yorkshire is of some interest for the three market towns lying on the major route between Hull and York specialised in different products, largely for competitive reasons. Beverley's fortnightly cattle market was noted for the sale of horned cattle and sheep and by the last quarter of the eighteenth century had assumed the status of a regular fair[18]; Market Weighton's principal trade was in grain, and Pocklington, like Beverley, specialised in livestock. Trade at the latter, however, was mainly in calves, fattened for veal in the vicinity of the town and supplied at the town's market for resale at York, Hull and Beverley markets[19].

A further important aspect of trade in these expanding centres was that conducted at their annual fairs. While population change, the extension of road, river and coastal traffic and changing production encouraged more frequent exchange and a transition in the methods of marketing stock and farm produce, livestock fairs remained an important element in regional trade throughout the nineteenth century. Fairs were clearly of greater relative importance in the less dynamic towns of the region, for in the fastest growing towns, such as Malton, Selby and Driffield, the proliferation of specialised markets reduced the importance of the local fair to pleasure[20]. In expanding towns where competition from larger and more dynamic urban centres restricted regular specialisation to one product, the existence or emergence of the periodic fair provided these towns with an additional specialised trading element that gave a temporary but important fillip to the

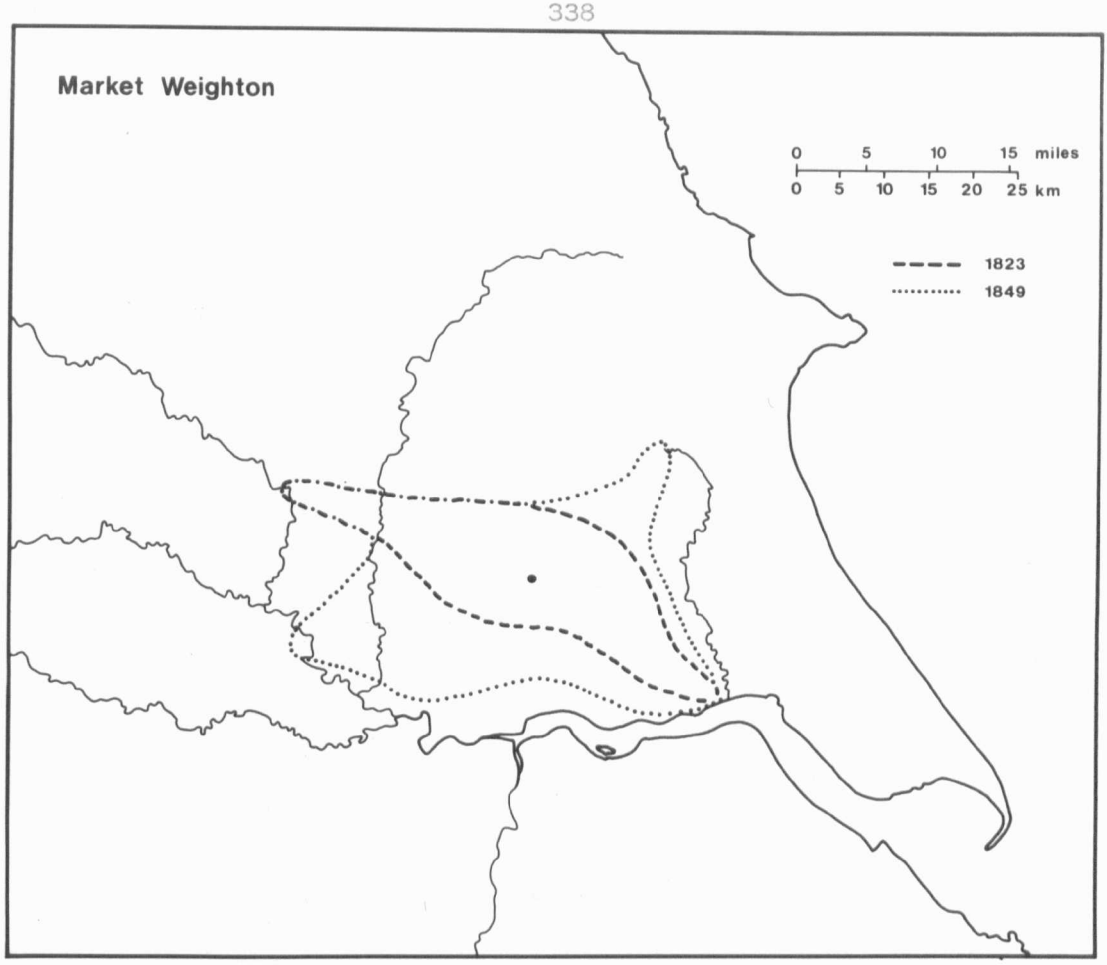
urban economy.

Specialisation became a key element in the success of many urban fairs as more general products, which had for centuries been traded on such occasions, were transferred to markets or to fixed retail outlets as the demand for regular supplies increased. Certainly from the last quarter of the eighteenth century, a decreasing proportion of farm produce passed through the fair as traders began to order goods more directly and on a more regular basis from professional factors and merchants who travelled the countryside securing orders in advance of the harvest and entering into long term commitments[21]. General trade in goods such as pewter, tin, leather wares, millinery and toys was generally transferred to fairs held in declining towns, for example, Kilham and North Frodingham[22]. Failure to specialise in trade, and hence failure to attract buyers from far and wide, deprived towns of an important source of income, for the principal source of profit came not from trade in general goods but from trade in livestock[23].

The six fairs held annually at Pocklington specialised in the sale of sheep, cattle and horses; that held on St James day, for example, being especially noted for trade in 'poor and sickly sheep'[24]. The importance of sheep in the livestock husbandry of much of the Wolds and the Vale of York is reflected in the considerable sheep trade conducted at Market Weighton's September fair. By the early nineteenth century it was said to be,

> "the largest and most valuable sheep fair in the North of England with as many as 70,000 to 80,000 animals exposed for sale"[25].

This fair was clearly of inter-regional importance and was regularly attended by jobbers and turnip growers from the West Riding who purchased sheep for feeding before reselling them at Wakefield[26]. The annual hiring fairs held in both towns were also of some importance, that at Pocklington being attended by 600 servants and that at Market Weighton by 850[27].



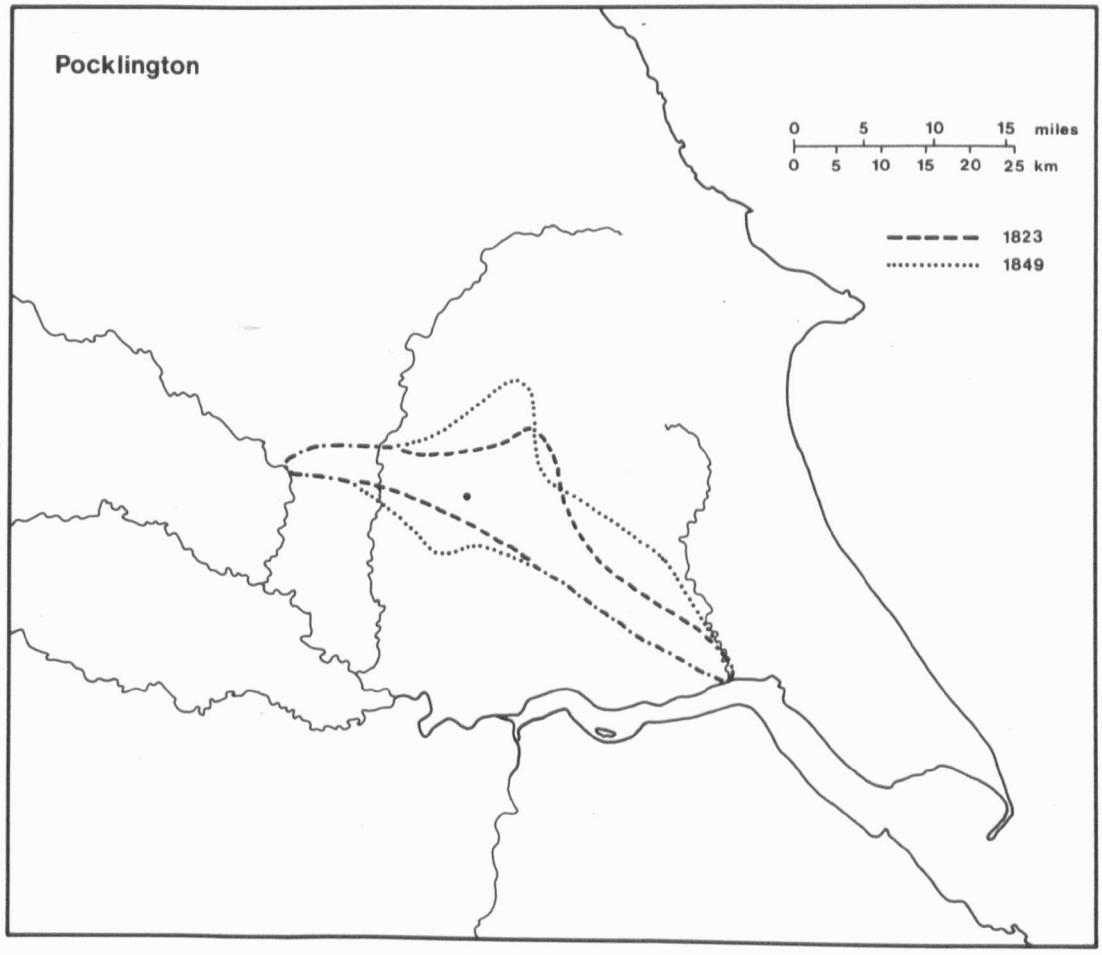


Fig.6.1 The Market Areas of Pocklington and Market Weighton, 1823-1849

Further evidence of the emerging nodality of both centres is provided by data relating to communication linkages within the region. Toll income from the Beverley - Kexby Bridge and York-Kexby Bridge turnpike trusts in 1834 was of the order of £1,500 each, and was the third highest revenue earned on any of the region's roads at that date[28]. Although no documentary evidence survives concerning the volume and type of traffic that plied these roads, information relating to market-carrier activity suggests that an increasing volume of trade was channeled towards Market Weighton and Pocklington from the late eighteenth century. In 1790 they were connected to only two different places apiece, but by 1850 this number had risen to twenty-one for Market Weighton and eighteen for Pocklington. At the same time the number of services had also increased from two to thirty-nine in Market Weighton and from four to thirty-six in Pocklington[29]. As figure 6.1 shows, the market areas of both towns had extended considerably. While their market areas were not mutually exclusive, their specialisation in different products meant that both towns were able to enjoy a considerable degree of unrivalled trade.

The returns from their respective navigations also indicates the rising volume of trade handled by these expanding centres. Although figures for the Market Weighton navigation are patchy, there is evidence to suggest that, from its inception until the construction of the railway in 1847, toll income rose steadily to reach £1,432 by 1840, a figure only £200 less than the maximum toll revenue received on the Driffield Canal (table 5.2). These figures are more striking when it is considered that in 1790 the tolls on the navigation had been substantially reduced as an inducement to trade[30]. Certainly among East Yorkshire's inland waterways, that serving Market Weighton was the most financially stable with dividends often being paid well above the guaranteed 5%[31]. Toll revenue from the Pocklington canal also rose sharply from the time

of its construction until the coming of the railway. Between 1825 and 1850 annual toll income was consistently over £1,000 reaching more than £1,400 in the peak years of 1835-45 (table 5.2). Dividend returns were, however, lower and never exceeded 4%[32], the success of the navigation being more measurable in terms of economic benefits and the role that it played in stimulating urban growth.

In economic terms the navigations were perhaps of greater importance than roads for they enabled raw materials and produce to be imported and exported from the towns they served more cheaply and in larger quantities. The average barge could carry a load of 50 tons at an average cost of approximately 10/- a ton. Wagons, on the other hand, were allowed to draw a maximum weight of only six tons and charged, on average, between £1 and £1 5/- a ton at the turn of the eighteenth century[33]. The main advantage of carriers, however, was their speed and Pocklington canal in particular suffered from road competition. Following the construction of the canal three local carriers who operated regularly between the town and Hull cut their charges from £1 to 15/- a ton and appeared to have attracted considerable trade. In competition to them, Pocklington tradesmen and merchants, with a financial stake in the navigation, purchased a packet in January 1822 to convey goods to and from Hull. The Union Packet capable of carrying fifty tons sailed to Hull weekly. At 10/- a ton it considerably undercut the cost of road carriage, but whereas the carriers made the journey in a day the packet took five days[34].

Trade on both the Pocklington and Market Weighton canals consisted chiefly of imports of coal, lime, timber and other building materials and exports of agricultural produce (table 5.3). As was the case at Driffield, coal tonnage dominated trade, but it was of less importance in both towns. It is interesting to note that there was a more equitable balance between imports and exports, the latter exceeding the former on the Market Weighton navigation

in 1845. Total tonnage handled was, however, far smaller than that carried on the navigations serving the dynamic towns of Malton and Driffield and along the Ouse via Selby[35]. Whereas Driffield was exporting upwards of 70,000 quarters of grain via her canal in the 1840's, grain exports from Market Weighton were a mere tenth of that amount, bringing a toll revenue of only £160 to the town[36]. In the light of the considerable amounts of grain accounted to be sold weekly at Market Weighton's corn market, it is evident that much of this grain must have been moved within the region by road, while Great Driffield dominated most of the inter-regional grain export trade from country towns.

Although smaller, these trade flows were of particular significance, and it is evident that certain town industries benefitted from the facility of a canal. A case in point is the leather industry in Pocklington which occupied one in every six workers in 1840. The Wilson family owned two large tanyards in the town containing a total of 91 pits and vats, a bark house and bark mill, drying sheds and a workhouse. In 1833 both tanyards were purchased from the Wilson family by Robert Denison, Lord of the Manor of Pocklington and a principal canal shareholder. He immediately began to enlarge the industry using the canal to import large quantities of bark. Imports of bark rose from 93 tons in 1835 to 500 in 1838 and 956 in 1839, but then fell sharply to just 25 tons with the failure of the enterprise one year later. Clearly for a short time the industry was efficient and highly productive, the reasons for its demise being unclear[37].

A new and higher degree of nodality was, therefore, obtained by these expanding centres in the course of the eighteenth and nineteenth centuries, but failure to bring the canals into both towns, competition from other more centralised and hence specialised markets, and the less marked agricultural development of the eastern portion of the Vale of York served to restrict the growth experience

of these places. A further important factor operating to restrict growth was the lower levels of externality associated with expanding centres.

(c) Externality

As in Great Driffield, external forces played a significant role in stimulating the nodal importance of these towns. As has already been mentioned in the previous chapter, the initial level of external support and the range over which it was drawn were arguably important factors influencing the 'success' of inland navigations serving country towns. In both Pocklington and Market Weighton 48% of the subscribers were town residents and 52% non-residents, while financially a more extreme picture emerges. In Market Weighton just over 31% of the £12,765 capital raised was provided by town residents, and in Pocklington almost 35% of the capital sum of £31,000[38]; lower levels of external support than were given to the Driffield Navigation (table 5.4). The detailed share registers of the Pocklington canal indicate in a more precise manner the nature of investment.

In Pocklington numerical support for the venture was strongest among tradesmen, with gentry and farmers forming the second and third largest groups (table 6.1). The financial contribution of the various occupational classes, however, reveals a rather different picture, landed interest providing a disproportionate amount of financial support. Almost two-thirds of the capital for the canal was raised by classes I and II, with tradesmen, although numerically the strongest group, realising only one-sixth of the capital. As at Driffield, dominance of the landed interest in Pocklington canal was marked. Although share records do not survive for the Market Weighton navigation, the identification of subscribers from the Enclosure Award and the Land Tax returns substantiates this dominance, for many of the shareholders had landed interests in the locality[39]. The balance of internal and

Table 6.1 Subscriptions to Pocklington Canal, 1814

		% of all subscribers	% of money subscribed
	Occupational Class		
I	Peers	2.4	12.9
II	Landed gentlemen	32.9	50.6
III	Yeomen, Graziers, Tenant Farmers	18.3	5.9
IV	Capitalists	2.4	1.3
V	Manufacturers	-	-
VI	Tradesmen	34.1	15.4
VII	Professional men	3.6	1.4
VIII	Clergy	1.2	3.2
IX	Women	4.9	9.3

	% of all subscribers		% of money subscribed	
	Resident	Non-Resident	Resident	Non-Resident
Class				
I	-	2.4	-	12.9
II	17.4	17.4	10.9	39.7
III	4.9	13.4	1.8	4.0
IV	-	-	-	1.3
V	-	-	-	-
VI	21.9	12.2	8.2	7.2
VII	1.2	2.4	0.4	1.0
VIII	1.2	-	3.2	-
IX	2.4	2.4	8.7	0.6

Source: P.R.O. RAIL 858/3,4.

external support among the different occupational classes is also of some interest. In Driffield the seven resident subscribers to that canal comprised five gentry and two tradesmen, but in Pocklington a more equitable balance is found. Almost half the gentry supporting the venture were town residents, and more than two-thirds of the tradesmen. Financially, however, the situation was reversed for the rural gentry made a larger capital investment than their urban counterpart, and rural tradesmen, although numerically fewer, made an almost equal contribution (table 6.1).

Spatially the location of external-subscribers residences were diverse, but not as widely located as at Driffield. Many of the external investors in both schemes had landed interests in the vicinity, and undoubtedly hoped to benefit from both improved waterways and the drainage benefits that often accompanied them. The Market Weighton Drainage and Navigation attracted subscribers from a large part of East Yorkshire. The town's central position between the Wolds and the Vale of York is indicated by the location of external subscribers residences: they were drawn from the Vale, the Wolds and the Hull Valley. Pocklington Canal, lacking any accompanying drainage legislation, attracted most subscribers from within a five-mile radius, but a few did come from farther afield (figure 5.2).

Over the first three decades of both ventures there was a measurable shift in the balance of interest among internal and external investors. Initially, internal interest in Pocklington canal had been fairly high, but between 1815 and 1848 the number of shareholders was almost halved and the balance of interest moved further towards external residents, 62% compared to 51%, with the financial stake of these shareholders accounting for equal percentages. In 1848 one-third of the present shareholders had made an initial contribution to the canal while a further 25% of the capital had been the subject of direct inheritance. This suggests

that almost 60% of the capital at mid-century represented continued interest in the venture, while 40% of the shares had been subject to purchase[40]. From the 1848 list of shareholders it is evident that it was town tradesmen, the brewers, bricklayers, drapers, grocers and ironmongers with an initial investment in the scheme, who had sold their shares, while the interest of landowners and gentry had been retained. The financial involvement of the landed interest had increased from 72% to 80%, while that of tradesmen had been cut from 15% to 8%. Likewise, during the first thirty years of the Market Weighton navigation, internal interest, although initially lower, also fell[41]. The development of a higher level of non-urban support was of considerable importance; the movement of the balance of interest towards external residents tended to benefit the canals by ensuring greater financial stability and higher trade flows. The explanation for the declining urban interest in both schemes must to a large extent be attributable to 'financial competition' from other ventures that resulted in the failure to raise sufficient capital to bring the canals right into the towns. While this failure was detrimental to industrial expansion in both centres, the higher levels of external interest that resulted had a beneficial effect on trade. Navigations with more external support had more significant trade flows than their counterparts.

Within the towns, external interest was also present but on lesser scale than in Great Driffield. At enclosure, fewer landowners were non-resident and the gentry held a smaller percentage of parish land. In Pocklington, for example, almost 50% of landowners who owned three acres or more at enclosure were employed in retail and service trades or in manufacturing and craft industries, compared to just 13% in Great Driffield[42]. Large landowners were of less significance in Market Weighton and Pocklington than at Driffield[43]; the balance of landownership in

Table 6.2 Landownership Structure of Pocklington and Market Weighton

Acres Held		Pocklington	Market Weighton	
		1759	1776	1846 *
1000+	Land	-	30.3	-
	Landowners	-	1.0	-
500-999	Land	-	11.5	-
	Landowners	-	1.0	-
100-499	Land	35.6	21.6	-
	Landowners	2.3	5.2	-
50-99	Land	25.0	16.3	-
	Landowners	6.8	10.3	-
10-49	Land	27.6	16.7	36.5
	Landowners	25.0	34.0	1.7
3-9	Land	9.5	2.3	29.1
	Landowners	44.8	19.6	6.7
Under 3	Land	2.3	1.3	34.3
	Landowners	21.6	28.9	91.5
Total no. of Landowners		88	97	118
Average Acreage per Landowner		20.7	47.5	1.1
No. of Acres Listed in Award		1,826	4,616	134 *
Listed Acreage as a % of all Parish land		72	77	2.2
Acreage of Parish		2,520	6,000	

* Town Land only.

Source: H.C.R.O. DDBD 56/1(a), DDBD 45/6, B.I.H.R. TA 378 S.

both urban parishes was well tipped towards the smaller landowners, the majority of whom were residents (table 6.2). The tithe apportionment data for Market Weighton indicates clearly that within the town lesser proprietors also predominated, although over 60% of town land (larger plots of three acres or more) was held by just 8.4% of all proprietors. In the hundred years between 1750 and 1850 the landownership structure of both towns was fairly fluid with considerable numbers of new and additional property owners appearing. The land tax returns suggest that the number of landowners in Pocklington increased from 121 in 1782 to 143 in 1832, while in Market Weighton the increase was from 96 to 127 between the same dates[44].

In the expanding centres of Market Weighton and Pocklington, perhaps more so than in Driffield, the organisation of town society became vested in the inhabitants at large, with larger landowners, observably of less significance in these places, playing a less active role in the management of urban affairs. Over the period 1782 to 1832, property owners taxed at £1 or more declined from 24% to 17% in Market Weighton, and from 16% to 14% in Pocklington, the lower taxpaying groups showing a corresponding increase (Appendix VI (a))[45]. As a property qualification was often regarded as the passport to the right of community involvement, this shift in the basis of authority had implications for urban growth. The removal of larger landowners from the property-ownership structure of both towns also meant the withdrawal of a certain degree of wealth; wealth that became invested in schemes of regional as opposed to distinctly urban importance. While this investment in regional schemes had important repercussions in respect of trade, it meant that expansion within the towns became more reliant on town inhabitants of lesser means. In an age when, following the decline of manorial control, there was little formal management of town society, scope for free enterprise was plentiful. But in both

Pocklington and Market Weighton, the declining proportion of larger landowners, the existence of relatively few land and property owners with interests in other areas that might have promoted economic linkages and growth, and the resulting general absence of wealth, served as limiting factors on the nature and extent of growth in these places.

Certainly the available data sources suggest that few enterprises on a comparable scale to those initiated in Driffield from the latter decades of the eighteenth century were ever instigated in these towns. Most economic development, for example, took place within the inherited framework of traditional craft industry under the entrepreneurship of local tradesmen with little, if any, outside help. New developments in Pocklington's tanning industry were initiated by a local family, the Wilsons, from the 1770's in Union Street, and the expansion of the towns textile trade with the establishment of worsted spinning by machinery in the 1780's, was largely the responsibility of two local men, william Briggs and Thomas Mann[46]. Externality associated with expanding towns rested principally on schemes of more than local importance. This, therefore, may be seen as a major difference in the growth experience of dynamic and expanding towns. In the former externality was present on both a regional and local scale, but in the latter on a regional scale only. The growth experience of expanding centres was more reliant on trade, considered by contemporaries to be the 'principal support' of these places[47]. What therefore were the structural and spatial manifestations of the growth experience of expanding towns?

2. Demographic Structure

As expanding towns, the demographic experience of Pocklington and Market Weighton was more extreme than in stable or declining country towns. Over the period 1700 to 1850 both towns increased their

population rank and experienced no reduction in their share of regional population concentration, whereas stable towns scored negatively in respect of both these variables[48].

In the first half of the eighteenth century, the population of both towns was subject to very little expansion, Market Weighton's population increased by just 50 persons in the period 1700 - 1740, while Pocklington lost in the region of 40 persons (table 6.3)[49]. In common with the country as a whole, town growth during the last two decades of the seventeenth century had slowed to the point of stagnation by the start of the eighteenth, and by 1720 had begun to enter a phase of mortality and epidemics. While Pocklington and Market Weighton suffered less sharply from demographic crises than many other towns in the region, they each lost approximately 5% of their natural increase in the 1720's. Mortality rates rose in the 1720's, but not nearly as steeply as in the stable towns of Hedon, Howden and Patrington, rising birth rates serving to offset much of the increase (table 6.4). From 1740 the baptism-burial ratio increased, and after 1760 there was a marked acceleration in growth. While the demographic trends in the two towns did not run parallel, rates of natural increase averaged more than seven per thousand until the mid-nineteenth century. Epidemics, however, still acted as an occasional check to sustained growth. Outbreaks of smallpox, measles and whooping cough caused the burial rate to rise substantially in Pocklington in the last two decades of the eighteenth century, while a widespread outbreak of cholera in the 1840's more than halved average annual rates of natural increase in Market Weighton[50] (figure 6.2).

The factors that explain population growth in the dynamic towns of the region were also operative in expanding centres. Death rates declined, although not as markedly, and birth rates rose, with improvements in general living standards undoubtedly also playing an important role. It was noted of Market Weighton in 1790 that

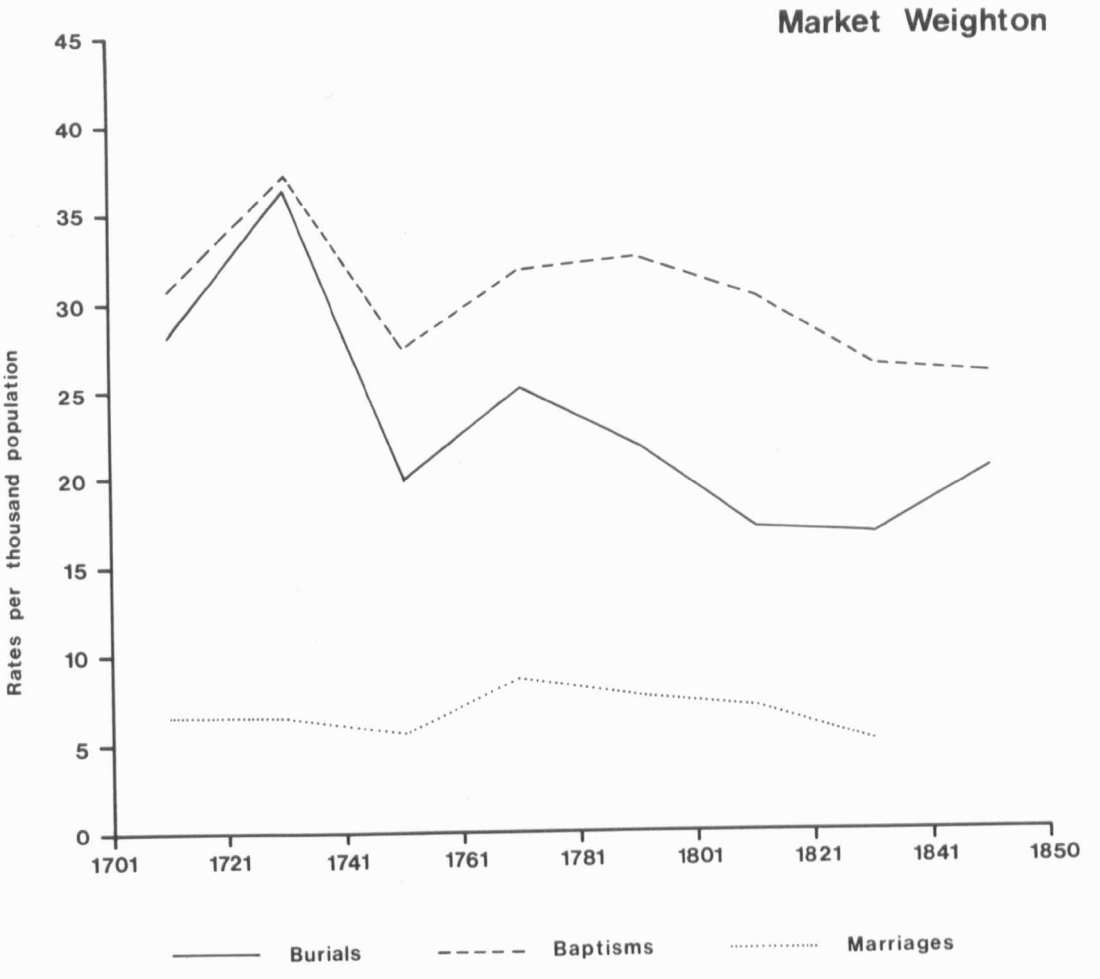
Table 6.3 Population Estimates for Market Weighton and Pocklington, c 1700 - 1851

Date	Parish Register Analysis				Census	
	M.W.		P.		M.W.	P.
c 1700	634		756			
1720	670		727			
		Herring		Herring		
1740	682	540	715	1057		
1760	803	661	812	1154		
1780	927	785	999	1341		
1800	1179	1037	1077	1419		
1801	-		-		1183	1052
1811	-		-		1508	1539
1820	1636	1494	1510	1852	-	
1821	-				1724	1962
1831	-				1821	2048
1840	2007	1865	2022	2364		
1841	-				1947	2323
1851	2130	1988	2308	2650	2001	2545

Note. Figures underlined refer to continuing calculations made by parish register analysis using Archbishop Herring's Visitation Returns of 1743 as a starting total.

Table 6.4 Annual Average Baptism, Burial, Marriage and Natural Increase Rates in Pocklington and Market Weighton, 1700 - 1851

Date	Rates per 1,000 Population							
	Baptism		Burial		Marriage		Natural Increase	
	P.	M.W.	P.	M.W.	P.	M.W.	P.	M.W.
1701-20	30.7	30.7	32.7	28.0	6.2	6.6	-2.0	2.7
1721-40	37.9	37.2	38.8	36.3	7.1	6.3	-0.9	0.9
1741-60	34.5	27.3	28.6	19.8	6.3	5.6	5.9	7.5
1761-80	40.4	31.9	29.4	25.2	9.1	8.6	11.0	6.7
1781-1800	38.8	32.4	35.1	21.8	10.3	7.6	3.7	10.6
1801-20	27.8	30.3	16.8	17.0	6.1	6.7	11.0	13.3
1821-40	28.2	26.3	17.8	16.7	3.2	5.0	11.0	9.6
1841-51	23.6	26.1	15.7	20.5	NA	NA	7.9	4.6



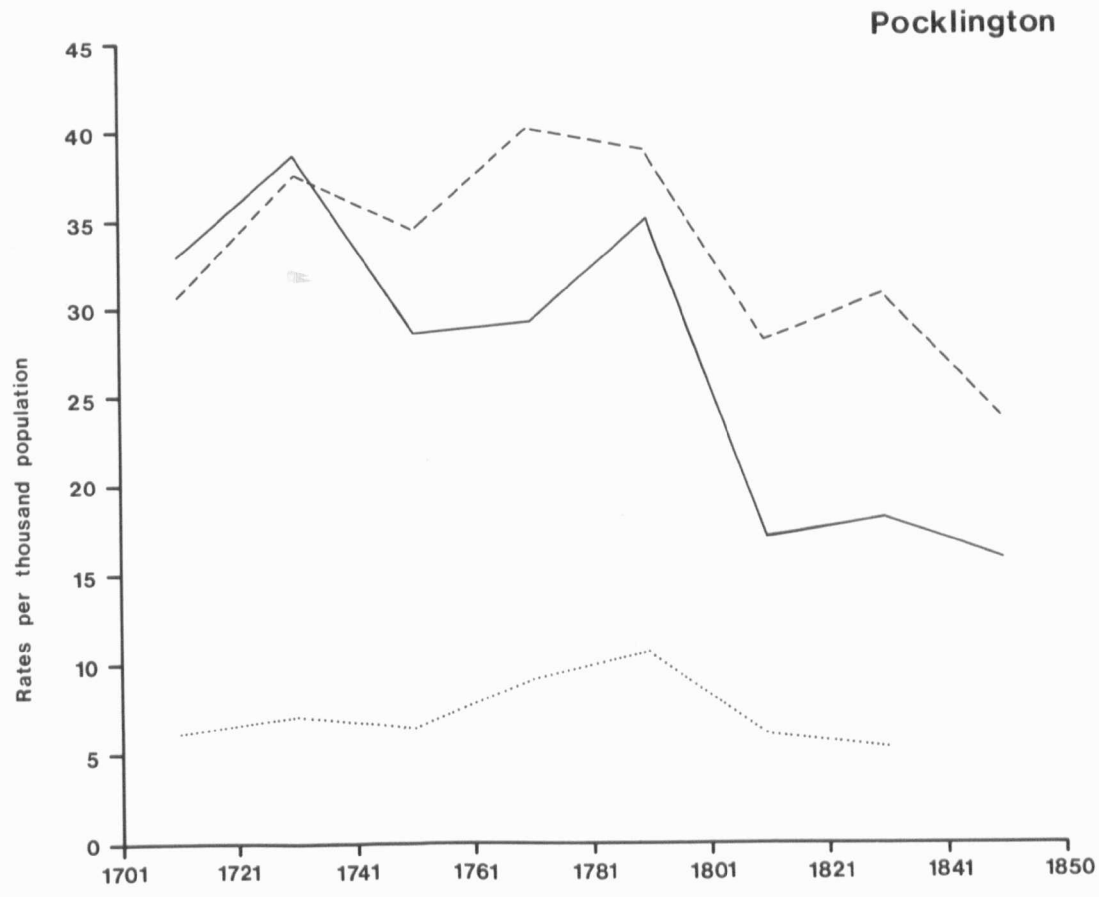


Fig.6.2 Average Annual Baptism, Burial and Marriage Rates in Pocklington and Market Weighton, 1701-1851

many low and meanly built houses had recently been replaced by more elegant structures, the town beginning to "assume an air of neatness and convenience united"[51]. Inoculation must also have played a part, for in addition to advertisements placed in newspapers indicating its availability in East Yorkshire, unpublished population returns from the 1811 census report that it had greatly reduced deaths from smallpox in several communities of the region[52]. Of the six East Riding towns in which aggregative analysis of the parish registers has been undertaken, the last recorded outbreak of smallpox was in Pocklington in 1807[53]. Although expanding towns did not completely escape the demographic crises that affected a large number of towns in the first half of the eighteenth century, they emerged into the second half less affected than many of their regional counterparts. This was an important factor in ensuring their continued demographic expansion.

While considerable population gains were made in both towns after 1760, the acceleration in the growth of their population was greatest around the turn of the century (figure 6.3). Between 1801 and 1820, average annual rates of natural increase were 11 per thousand in Pocklington and 13.3 per thousand in Market Weighton, decennial population increase being 46.3% in the former in the decade 1801-11 and 27.4% in the latter. From 1820 these rates of growth began to decline, for although, as table 6.4 shows, rates of natural increase remained high, actual decennial population growth fell to 5.6% in the 1820's in Market Weighton and 4.4% in Pocklington. Although the latter recovered to some extent, actual population increase being over 13% in the following decade, the high rates of increase of the early part of the century were not repeated and indeed in Market Weighton population increase remained at a fairly low level. Much of the explanation of the fluctuating demographic fortunes of these towns lies in the forces of migration.

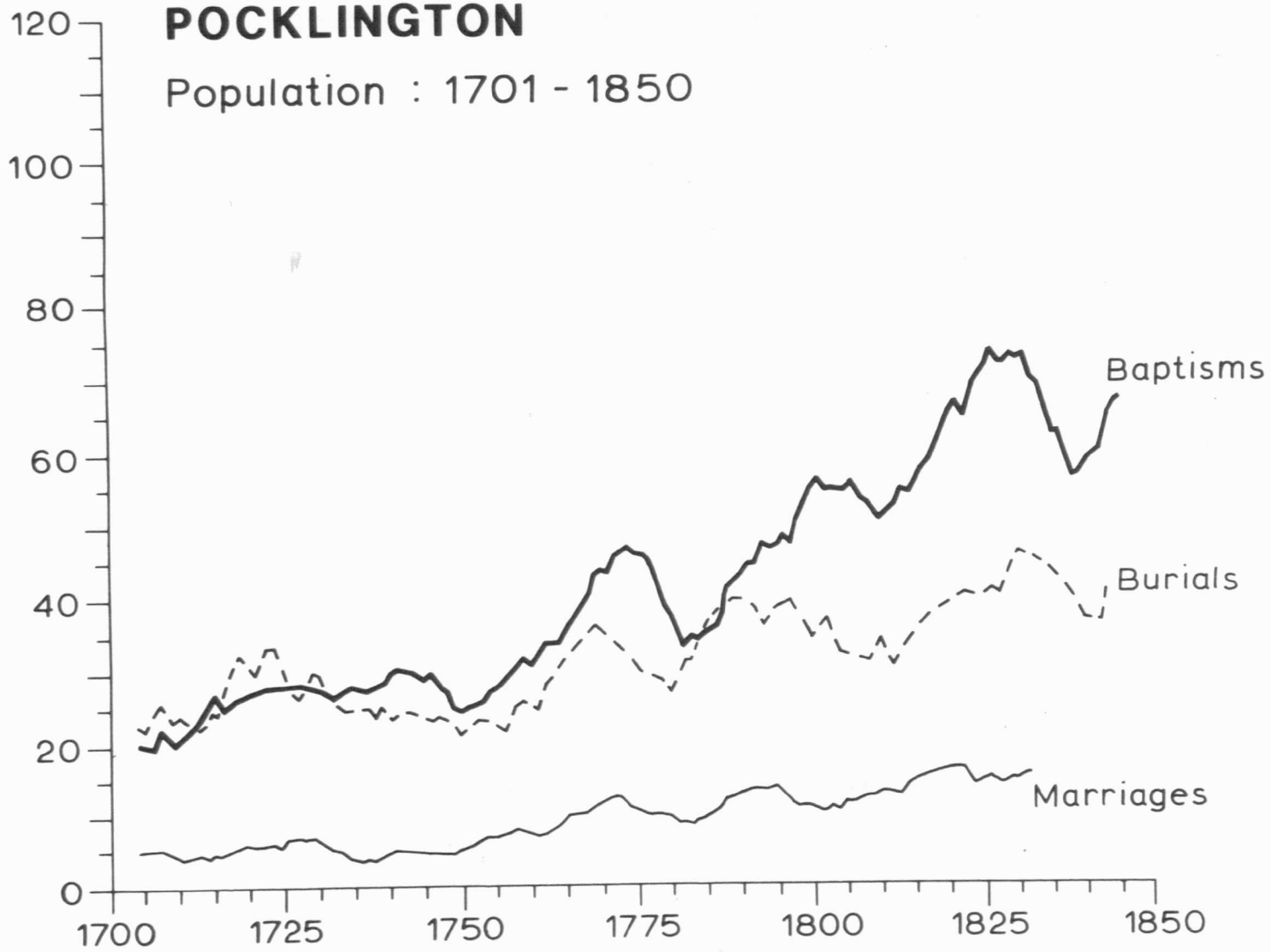


Fig.6.3 Population Change in Pocklington and Market Weighton, 1701-1851: Nine Year Moving Averages

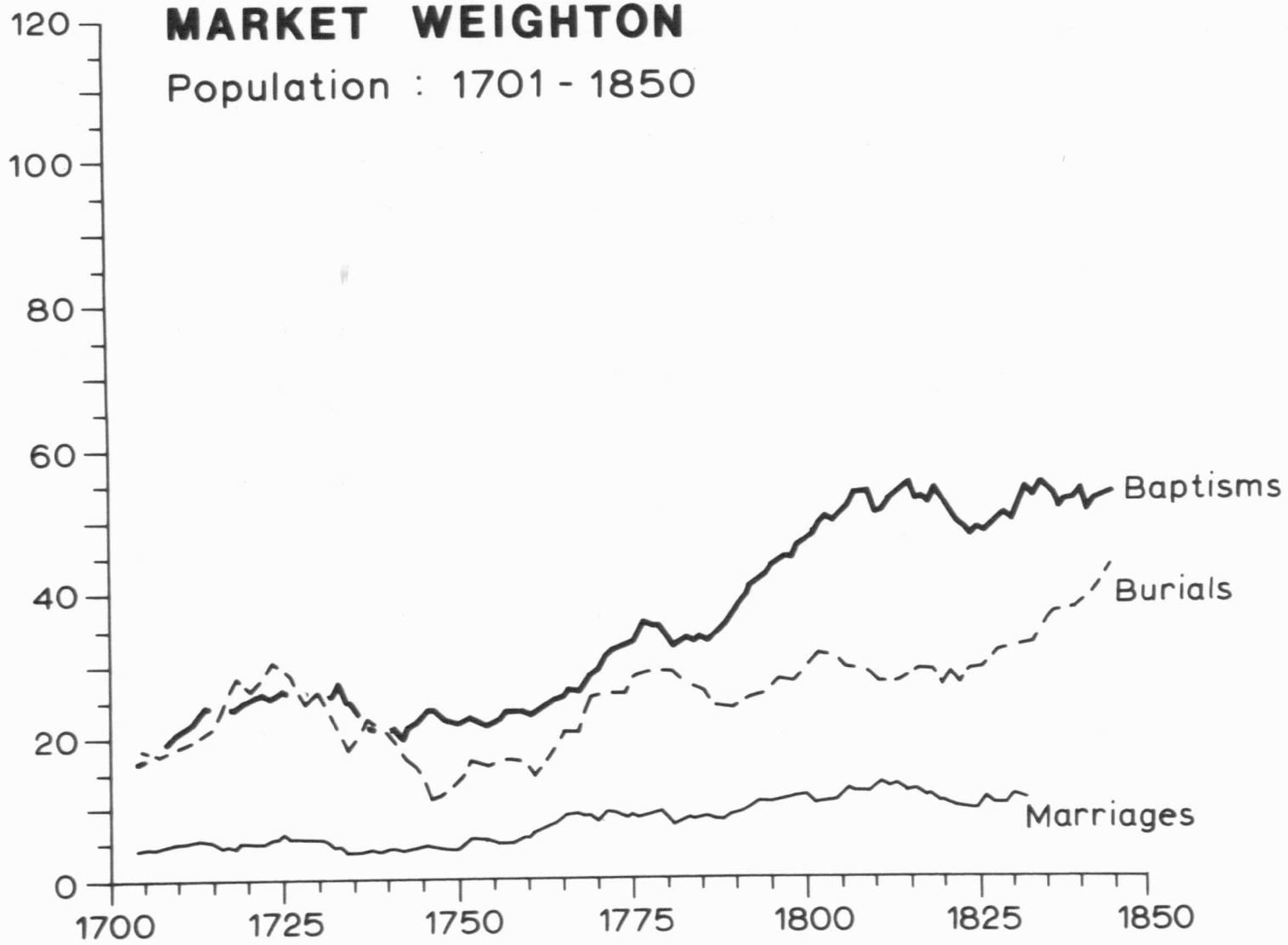

MARKET WEIGHTON
Population : 1701 - 1850
120
100
80
60
40
20
0
1700
1725
1750
1775
1800
1825
1850
Baptisms
Burials
Marriages

Fig.6.3 (b)

In the eighteenth century the available evidence suggests that migration was a negligible factor in the growth experience of both Market Weighton and Pocklington (table 6.5), but from the turn of that century it became a significant force. While the calculation of inferred migration does not take account of possible underregistration in the Anglican parish registers[54], underregistration does not appear to have been widespread in East Yorkshire towns. Archbishop Herring's Visitation returns of 1743 indicate that the level of dissent in most towns was low; there were just four Roman Catholic families in Market Weighton and two in Pocklington, and no families of other religious persuasions[55]. The early rise of nonconformity in East Yorkshire was accompanied by the use of meeting houses rather than permanent chapels, and between 1818 and 1843 twenty-two applications were made for their establishment in the six East Riding towns in which aggregative analysis was undertaken[56]. These institutions rarely performed their own baptisms and burials, and this is reflected in the returns of the number of unentered baptisms and burials in the Anglican registers made with the 1811 census[57]. In Pocklington the annual average number of missed entries was just one, and in Market Weighton the total number of missed entries for the period 1801-11 was fifteen[58]. Even when dissenting groups kept their own registers the numbers involved were generally small. On the 6-10 baptisms annually recorded in the Methodist Registers of Pocklington between 1830 and 1850, two-thirds were inhabitants of neighbouring villages such as Everingham, Sancton and Shipton: a similar pattern existed with burials[59]. The evidence would therefore suggest that, although nonconformity was, by the nineteenth century, a significant element in the religious life of country towns, the numbers buried or baptised by these persuasions were few, and those ceremonies performed rarely escaped registration by the Anglican Church.

Although for most of the eighteenth century population change was largely a reflection of demographic factors, after 1780 it was attributable also to fundamental economic circumstances often external to the town. These can be identified as migration and changes in mobility largely occasioned by transport improvements and the changing tempo of economic and social activity. In the early-nineteenth century natural increase alone was insufficient to account for population increase and inmigration was a significant element in the growth experience of both Pocklington and Market Weighton in the period 1801-11. From the latter date, however, there was a divergence in their demographic fortunes for whereas in the period up to 1851 (with the exception of the decade 1821-31) Pocklington attracted new migrants, Market Weighton continually lost a significant percentage of its natural increase through outmigration, although on a scale much less marked than in the stable towns of the region (table 6.5). The reasons why certain towns attracted migrants appear to be two-fold. First they offered a wide range of employment opportunities through their small workshop-dominated industries and craft trades; and second, transport improvements of the turnpike and canal ages brought new jobs to rural areas in addition to giving a new nodality to country towns[60]. The reasons for the trend for outmigration from Market Weighton would appear to be a certain loss of nodality. It was noted in 1849 that its position as a major thoroughfare town in East Yorkshire had undergone some decline with the establishment of steam boats on the Humber, for the latter were said to have considerably reduced the number of travellers passing through the town[61]. It was hoped at mid-century that the recent acquisition of rail connections with York, Beverley and Selby would reverse this trend: but this does not appear to have been the case, for, whereas in most towns the 1840's saw a reversal of the trend for outmigration, it continued in Market Weighton[62]. Clearly by 1850

Table 6.5 Migration to Pocklington and Market Weighton, 1700 - 1851

(a) Pocklington

	Population	Difference	Baptisms-Burials	Inferred Migration	% of Nat. Increase Lost
1700	752				
1801	1052	296	321	- 25	7.7
1811	1539	487	225	+262	-
1821	1962	423	208	+215	-
1831	2048	86	308	-222	72.1
1841	2823	275	204	+ 71	-
1851	2546	223	286	+ 63	-

(b) Market Weighton

1700	634				
1801	1183	549	545	+ 4	-
1811	1508	325	182	+143	-
1821	1724	216	275	- 59	21.4
1831	1821	97	190	- 93	49.0
1841	1947	126	181	- 55	30.3
1851	2001	54	123	- 69	56.1

the expansionary phase in this town's growth experience was coming to an end.

Despite losses of potential increase through outmigration (16.2% of natural increase in Pocklington in the period 1801-51 and 14% in Market Weighton), these were less severe than in the stable towns of the region where losses averaged well over 20%. In expanding towns the forces of migration and mobility were more complex than in dynamic centres, for no clearly sustained trends are observable over the course of the study period. While in the early decades of the nineteenth century they were dependant on inmigration to sustain growth, after 1820 the pattern became less clear cut. In one respect widening avenues of mobility may be seen as detrimental to the process of growth, for they provided town inhabitants with an unprecedented ease of movement towards larger towns and cities whose economic and social attributes were superior in so many respects. The mobility of town inhabitants was much greater than might be supposed: this is well demonstrated by data relating to marriage distances[63].

In the first sixty years of the eighteenth century the proportion of marriages involving an extraparochial partner was low, 6.5% of all marriages in Pocklington and 14.0% in Market Weighton (table 6.6). Despite inter-urban variation in the level of exogamy, the spatial range over which partners were drawn was similar, with the majority of partners being found locally and contact being limited to a relatively small number of places (figure 6.4). From 1760, with the turnpiking of major roads and the cutting of canals, the economic and social horizons of towns began to widen, and contact with more distant urban and rural areas became widespread. It is interesting to note, however, that Pocklington had not developed its avenues of mobility to the same extent as Market Weighton at this time, perhaps due to its absence of a navigational link. It was after 1790 that the full effects of demographic, economic and

Table 6.6 Marriage Distances of Pocklington and Market Weighton, 1701 - 1840

	1701 - 1760				1761 - 1790				1791 - 1840			
	P.		M.W.		P.		M.W.		P.		M.W.	
	No	%	No	%	No	%	No	%	No	%	No	%
No of Marriages	246		265		278		237		614		508	
No and % of Extraparochial (EM) Marriages	16	6.5	37	14.0	24	8.6	61	25.7	141	22.9	143	28.1
No and % of EM partners from West Riding	-	-	1	2.7	-	-	3	4.9	8	5.7	8	5.5
No and % of EM partners from North Riding	-	-	3	8.1	3	12.5	2	3.3	19	13.5	6	4.2
No and % of EM partners from Lincolnshire	-	-	-	-	-	-	-	-	2	1.4	1	0.7
No and % of EM partners from other British Counties	-	-	-	-	1	4.2	-	-	7	5.0	4	2.8
No and % of EM partners from other East Riding Towns	6	37.5	10	37.0	3	12.5	12	19.7	20	14.2	24	16.8
No of places with which contact was made	13		26		22		40		76		70	

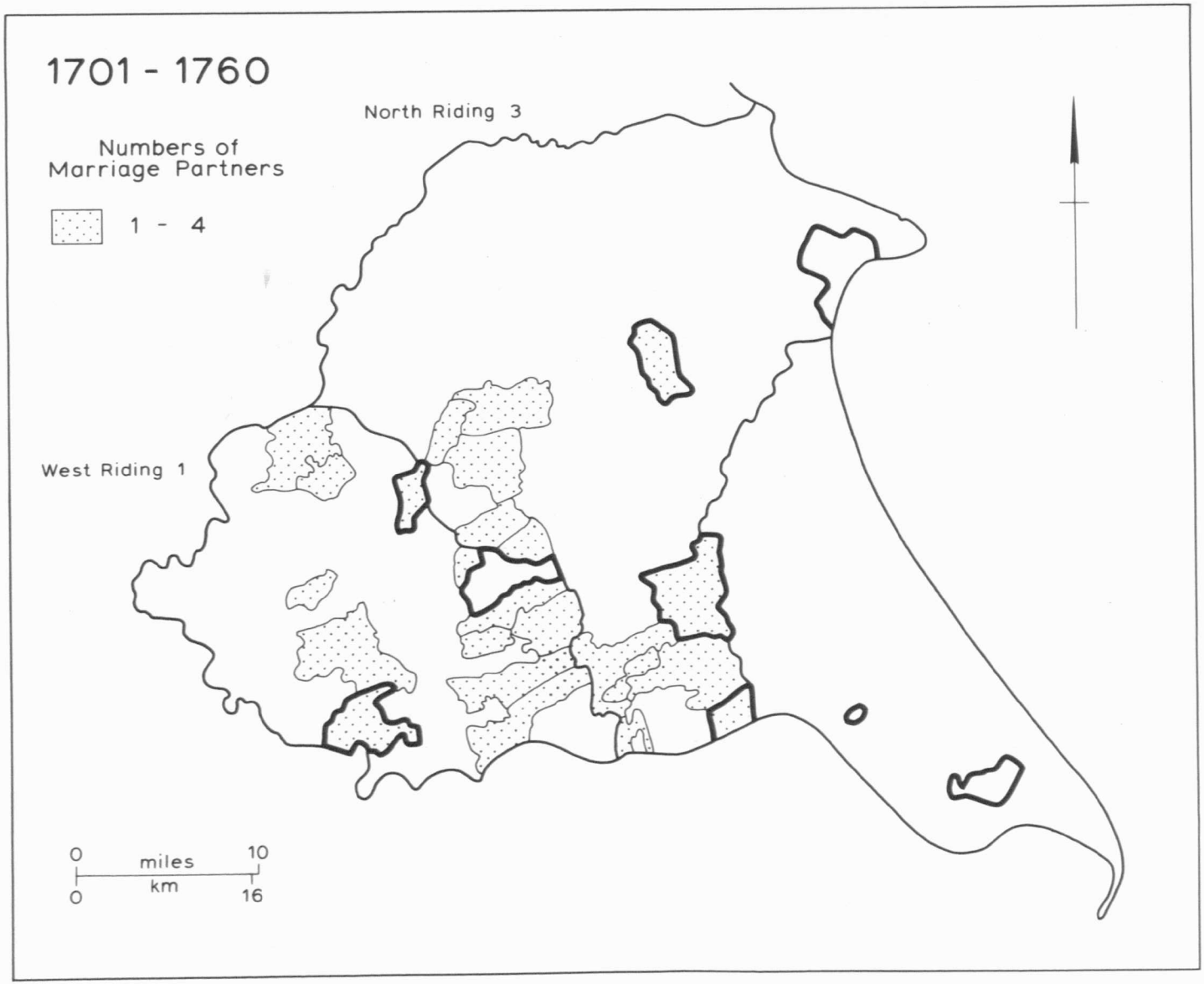


Fig.6.4 Marriage Distances of Market Weighton, 1701-1760

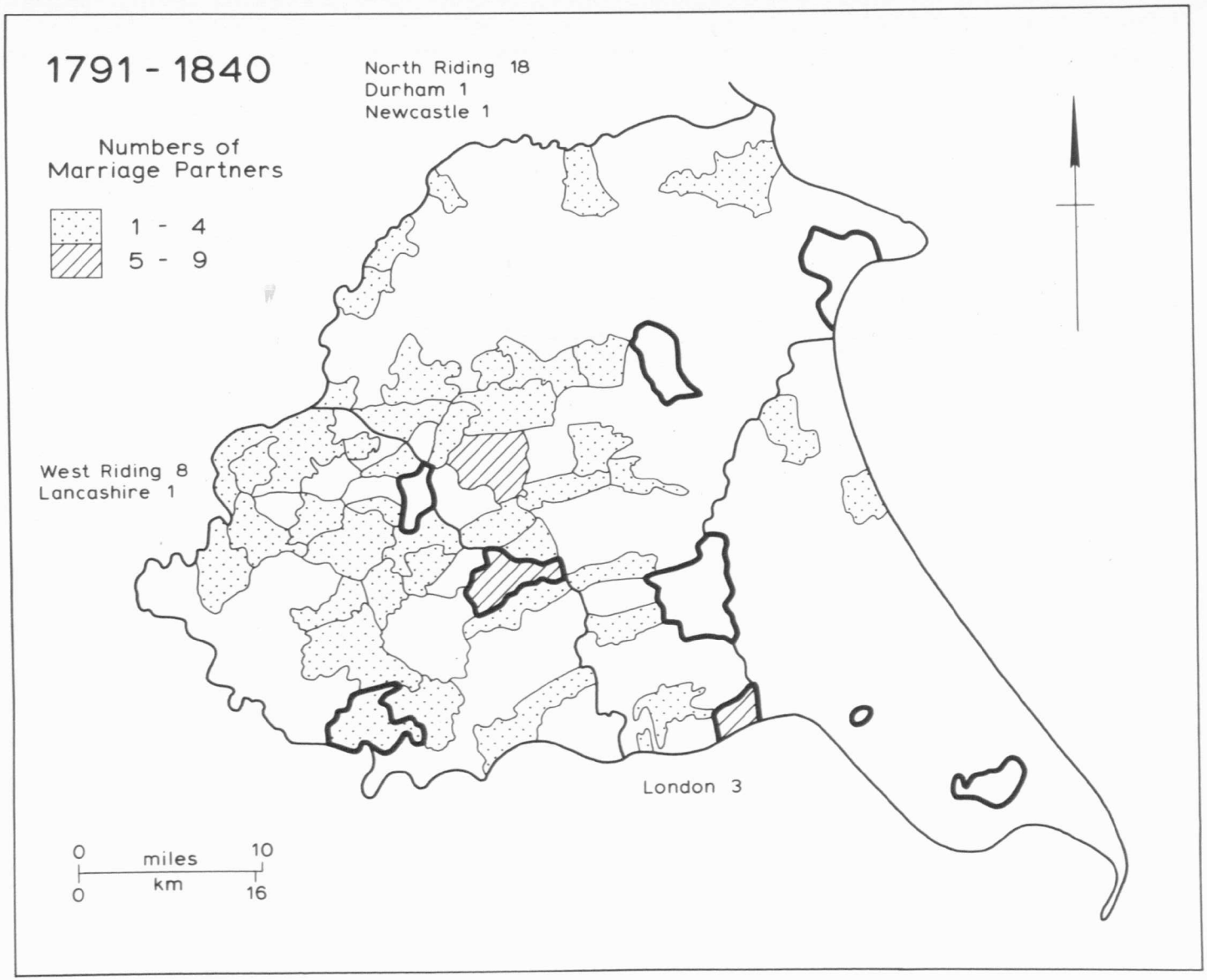


Fig.6.5 Marriage Distances of Pocklington, 1791-1840

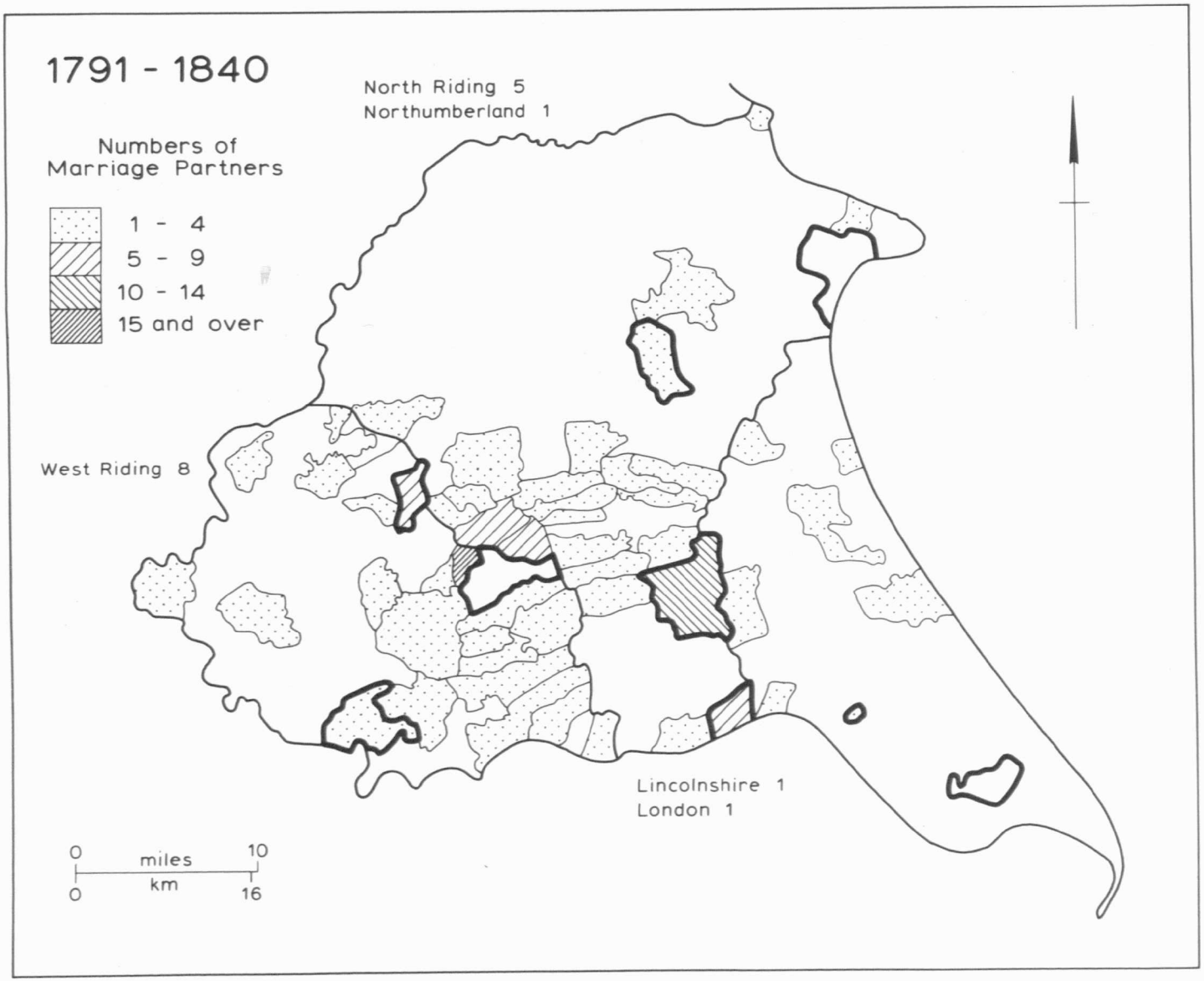


Fig.6.6 Marriage Distances of Market Weighton, 1791-1840

social change became evident.

In both towns the proportion of marriages involving an extraparochial partner increased, this increase being particularly marked in Pocklington (table 6.6). More important than higher levels of exogamy was the dramatic widening of the area of urban influence and mobility. Although the highest proportion of extraparochial marriage partners was still found in adjacent parishes and townships, contact had been established with two-to-three times more places than in the previous decades. In particular, contact and movement to more distant places within East Yorkshire and to areas outside the East Riding had risen steeply. Mobility now extended well beyond the normal trading hinterland of seven miles[64], and far in excess of the four-mile marriage distance demonstrated by Perry for a later date[65]. The spatial range over which partners were drawn must in part be explained by geographical location which was a principal causal factor determining the degree and range of external contact. In Pocklington more than one-quarter of extraparochial partners came from outside the East Riding. Situated in close proximity to the North Riding, the town found 13% of its extraparochial partners in that district, its sphere of mobility extending to cover much of the western half of the East Riding, impinging also on West Yorkshire (figure 6.5). Towns more centrally located like Market Weighton and Driffield (see chapter 5) drew a larger number of partners from other East Riding towns and villages. The seventy places with which Market Weighton had established contact were largely situated in the East Riding and only sixteen partners were found elsewhere (figure 6.6). As expanding towns, both Market Weighton and Pocklington had established contact with more places than their stable counterparts. The explanation of differing spatial mobility among dynamic, expanding and stable towns rests on four principal factors; - first the level of urban economic and social development; secondly, the

proximity of towns to axes of communication; thirdly, the geographical situation of towns and their proximity to other settlements; and, fourthly, their size and demographic structure[66].

As was the case in Driffield, the expansion of both these towns owed much to their relationship with East Yorkshire. But their more limited role as focal inmigratory points within the region is reflected in the lower number of inhabitants (30%) with recorded birthplaces in the East Riding in 1851, and the higher percentages (50%) born in the town[67]. In economic terms also, interaction with the region provided an important stimulus to growth.

3. Economic Structure

In the course of the eighteenth and nineteenth centuries, Market Weighton and Pocklington became centres of agriculturally based trades and local commerce. As in the preceding centuries, agricultural contacts pervaded the life of these towns, although direct association with the land was considerably reduced. Agriculture was of greater importance in expanding centres than in dynamic ones, but of less significance than in many stable and declining towns[68]. Throughout the period country towns retained a characteristic economy of their own; - an economy of trades, crafts, manufactures and commercial functions.

Aggregate figures of employment in different economic sectors must be treated with a degree of caution, for the problems of differential fertility among individuals and occupational classes can affect the level of accuracy of parish register analysis, while in the case of directories the tertiary sector is frequently overrepresented. The real interest, however, lies in changes within the key economic sectors, changes that are well demonstrated through analysis of occupational and technological developments.

The decline in the level of agricultural activity was marked. The analysis of occupations recorded in both baptism and burial

registers for each town suggests a cut of almost two-thirds in the importance of this sector (table 6.7 (a)). By the early nineteenth century few farmers conducted their business from within the built up area; many of their number had moved out to sites within, or close to, their holdings, while others had become market gardeners or nurserymen. Both the directories and the parish registers indicate a rise in the number of ancillary agricultural occupations after 1800. Cowkeepers, poulterers and gardeners increased from 5% to 20% of all agricultural entries in Pocklington parish registers and from 4% to 15% in Market Weighton, with cattle dealers and various other livestock merchants also finding a niche in the town economy[69]. Decline in levels of direct agricultural employment were offset by increases in other economic sectors, particularly retail and service trades.

Both the directories and parish registers evidence an increase in the importance of tertiary economic activity in the period after 1770 (table 6.7 (a)(b)). The analysis of the economic dimension to change showed that the percentage increase in the number of retailing and professional functional units was 172.7% and 355.5% in Pocklington, and 83.7% and 214.3% in Market Weighton respectively during the period 1790 to 1850[70]. Although neither town experienced any significant rank-change in their regional service position, importantly both retained their level of contribution to regional centrality, and the percentage increase in their service scores was greater than in the stable towns of the region[71].

At a time of rapid population change it was natural that the tertiary sector should expand. In the period 1770 to 1800 the ratio of inhabitants to retailers fell sharply from around 45:1 to 30:1, remaining at the latter level until mid-century. Widening markets, created by transport improvements in particular, led to developments in urban retail and wholesale functions. Indeed,

Table 6.7 (a) Occupational Structure of Pocklington and Market Weighton

(a) Parish Register Analysis

Occupational Group	1		2		3		4		5	
	P.	M.W.	P.	M.W.	P.	M.W.	P.	M.W.	P.	M.W.
Agriculture	25.6	36.2	22.5	28.4	16.0	27.9	14.6	17.8	9.5	14.4
Building	17.9	5.9	9.8	5.4	14.2	14.0	15.3	9.2	15.2	12.5
Retail/Service	17.9	12.0	15.5	15.6	13.8	16.3	16.7	18.0	20.8	20.8
All Manufacturing	28.1	40.4	40.7	43.8	46.7	33.2	37.8	38.2	39.8	37.3
(a) Textiles	7.7	4.7	2.8	2.8	5.0	2.1	2.9	1.4	0.4	1.2
(b) Clothing	5.1	9.5	1.4	9.7	9.8	7.1	8.1	6.9	7.0	6.6
(c) Leatherworking	7.7	13.8	19.7	19.4	17.7	16.3	12.2	14.7	15.1	9.1
(d) Ropemaking	2.5	3.3	1.4	0.5	1.2	2.3	0.3	3.5	1.4	1.6
(e) Milling/Brewing	-	-	2.8	1.7	5.5	3.1	5.6	3.0	5.3	3.5
(f) Woodworking	-	6.5	2.8	2.1	2.6	0.8	1.6	2.3	3.9	5.6
(g) Metalworking	5.1	2.0	7.0	6.7	3.9	1.0	3.0	3.6	4.5	5.4
(h) Other	-	0.7	2.8	0.9	1.0	0.5	4.1	2.8	2.2	4.0
Professions	7.7	3.6	8.4	3.5	7.7	5.4	10.6	10.6	3.5	4.7
Maritime/Transport	-	-	-	0.2	0.3	-	0.5	0.6	2.2	0.9
Miscellaneous	2.8	1.9	2.8	3.0	0.7	2.1	2.0	4.0	6.3	6.8
Labouring as a % of all occupations	17.0	28.2	21.1	30.0	24.3	31.1	29.6	39.1	33.4	42.5

1. 1710-1740
2. 1741-1770
3. 1771-1880
4. 1801-1820
5. 1821-1840

P. = Pocklington

M.W. = Market Weighton

Table 6.7 (b) Occupational Structure of Pocklington and Market Weighton

(b) Directories

Occupational Group	1		2		3	
	P.	M.W.	P.	M,W.	P.	M.W.
Agriculture	15.8	20.8	7.8	15.3	6.5	15.9
Building	6.0	5.3	7.0	7.1	7.5	4.7
Retail/Service	34.6	22.0	25.5	27.8	27.4	24.5
All Manufacturing	25.5	33.5	34.7	30.5	31.6	26.9
(a) Textiles	1.5	2.3	0.8	0.5	0.3	0.4
(b) Clothing	2.2	5.9	9.0	9.3	9.6	6.9
(c) Leatherworking	10.5	10.7	7.8	3.8	7.5	7.3
(d) Ropemaking	0.7	1.7	0.8	2.7	0.3	1.7
(e) Milling/Brewing	4.5	4.1	3.5	5.4	2.7	1.7
(f) Woodworking	1.5	4.1	5.8	2.2	4.4	3.4
(g) Metalworking	3.0	3.5	5.5	4.4	4.1	3.8
(h) Other	1.5	1.2	1.5	2.2	2.7	1.7
Professions	13.5	16.0	22.7	15.8	24.0	23.3
Maritime/Transport					1.0	1.3
Miscellaneous					2.0	3.4

1. c 1791
2. 1823
3. 1851

Table 6.7 (c) Occupational Structure of Pocklington and Market Weighton

(c) Census, 1851.

	Heads of Households		All Employed Persons	
Occupational Group	P.	M.W.	P.	M.W.
		%		
Agriculture	24.9	35.3	19.4	28.0
Building	7.9	6.6	7.0	4.0
Retail/Service	14.5	12.3	9.6	8.5
All Manufacturing	26.3	17.7	29.0	17.5
(a) Textiles	0.2	0.2	0.2	0.2
(b) Clothing	5.8	5.3	10.6	6.6
(c) Leatherworking	7.7	5.1	7.1	4.2
(d) Ropemaking	-	1.1	0.2	1.5
(e) Milling/Brewing	2.2	1.7	1.8	0.8
(f) Woodworking	3.4	0.7	3.7	0.3
(g) Metalworking	4.8	2.1	3.4	2.1
(h) Other	2.2	2.1	2.0	-
Professions	11.3	10.7	10.0	9.1
Maritime/Transport	2.0	1.6	1.2	2.1
Domestic	3.0	1.8	12.6	16.5
Miscellaneous	8.5	11.2	10.0	13.1
General Labouring	2.0	0.5	1.1	1.2

Source: Census Enumerators' Returns, 1851.

> "It was inconceivable that such a massive growth of population, rapid urbanisation and accumulating changes in transport, communications and techniques and organisation of production could leave unchanged the way in which producers marketed their goods and consumers purchased them"[72].

In the course of the nineteenth century considerable changes took place in retailing within an established framework of markets, the household, and producer-retailer structures. Within country towns, the shop gradually superseded the market as the main retail outlet for specialised trades: Pocklington had nineteen shopkeepers by 1840 and Market Weighton nine[73].

Although specialised services were less well developed in these expanding towns than in the county town of Beverley, and the dynamic towns of Driffield, Selby and Malton, each acquired a significant number of high order functions from the turn of the eighteenth century. Wool and linen drapers, fishmongers, toy dealers, and glass and china dealers, among others, appeared in the towns for the first time, and a range of specialised wholesale merchants dealing in cheese, butter, bacon, wines and spirits, and a variety of agricultural fertilisers and feedstuffs also established businesses[74]. While the shops of these smaller towns never became as competitive as those of their larger counterparts, by mid-century their retailing experience had parallels with those of larger communities such as Hull, York and Halifax[75].

Few retail or wholesale functions in Pocklington or Market Weighton were dependent on any corporate enterprise. The 1851 census enumerators returns indicate that only three such service units employed additional labour in the former, and only two in the latter (table 5.12 (a)). It was the individual, the small businessman, who became the principal economic mainstay of this sector in these country towns. The inventory of Thomas Hewson (1802) a draper of Market Weighton reveals him to have been a fairly wealthy man. The goods in his house were valued at more than £19 and those in his shop at over £30. His trade must have

been fairly brisk for there were many yards of calico, flannel and foreign cloth, in addition to numerous haberdashery items, in both his house and shop[76]. Although retailers occasionally continued to perform two, and sometimes three, functions, they were largely superseded as the demand for luxury items grew, giving rise to a wide variety of fixed retail outlets located about the market place and along the principal streets.

Expansion in professional service provision was also marked at this time. Both the parish registers and the decennial census returns suggest that professional service accounted for one-tenth of all occupations by the second quarter of the nineteenth century; while such occupations constituted almost one-quarter of all directory entries by the same date (table 6.7). Functions performed by larger towns and cities a century earlier[77] had begun to make an appearance in country towns by the late eighteenth century. From that date, capital and financial support became more readily available and, in the country as a whole, the rate of capital investment had reached 6% - 7% of national income by 1800, and 10% in the 1830's[78]. Institutions to deal with that money became widespread. Banking developments in both Pocklington and Market Weighton were slower to begin than in either dynamic towns, or in the incorporated towns and parliamentary boroughs of the region such as Howden and Thirsk. Banking enterprises appeared in both towns only after 1820. The Market Weighton Savings Bank, for example, was established in 1833 under the patronage of the Duke of Devonshire (lord of the manor) and under the trusteeship of two M.P.s, a wealthy landowner and two wealthy town proprietors. Like other local banks it was designed to serve both the town and surrounding countryside, the directors of the institution being drawn from Everingham, Easthorpe, South Cave and Londesborough as well as Market Weighton[79]. Local banks such as this provided small businesses with facilities for small scale capital accumulation, the

really large transactions were handled by banks in York and Hull[80].

Rising income from land, trade and industry caused sources of lending to become mobilized not only through banks but through other financial intermediaries which in small but, nevertheless, expanding towns such as these often assumed greater importance than banking institutions. According to White's 1840 directory there were two fire and life insurance offices in Pocklington and three in Market Weighton, while each town had also acquired a land agent[81]. Their emerging regional standing is further reflected in the growing number of gentry who took up residence. Resident gentry who numbered five in Pocklington in 1791 were 45 by 1840: in Market Weighton - whose nodality had given the town economic and social standing at an earlier date - the increase in the same period was from sixteen to twenty-three[82]. The growth of a professional class in both towns brought a corresponding increase in employment in domestic service. In 1831 over one in eight of the population of Pocklington were so engaged, and one in ten in Market Weighton, the latter figure having risen to one in six by mid-century[83].

Economic expansion in Market Weighton and Pocklington was most marked in the area of tertiary activity and trade; manufacturing and craft industry, although diversifying to a limited extent within several sectors, underwent no fundamental change in the course of the study period. In Pocklington, in 1851, only ten manufacturing craftsmen employed labour and in Market Weighton just one[84]. Herein lies an important distinction between this type of expanding country town and its dynamic counterparts; for whereas several notable attempts were made to industrialise the economy of Driffield, few such measures were undertaken in either Pocklington or Market Weighton. The largest and most industrialised industry in Pocklington was tanning, mention of which has already been made. As table 6.7 shows, it employed a significant percentage of the workforce from the last quarter of the eighteenth century,

coinciding with the development of tanning in the town by the Wilson family[85]. William Watson's map of the town of 1854 shows the location of a flax factory in Pocklington and a later newspaper report notes the sale of the factory, machinery and appendant cottages[86]. However, with textile workers accounting for just 0.2% of the town's workforce in 1851 it must be adduced that this venture was established only after that date.

Other manufacturing-related developments in these towns rested on diversification within traditional crafts. In the clothing sector, for example, the parish registers, directory entries and the census indicate the emergence of more specialised crafts to meet the demands of a new social elite; hosiers, milliners and straw hat manufacturers being added to the more traditional dressmakr and staymaker. Woodworking trades also developed, following the movement of significant quantities of timber via town navigations. Middlemen became a characteristic feature of the trade as timber merchants established businesses, while the appearance of carvers and gilders and upholsterers provides additional evidence of the emergence of a new urban elite in these places[87]. It was, however, in trade and in their development as central places that structural change in the economy was most evident. Unlike dynamic centres these towns did not experience expansion across all sectors of urban economic life, expansion that might have rendered their growth experience more dynamic. Their more limited, but nevertheless significant, expansion within the region had clear manifestations in the pattern and process of spatial change.

4. Spatial Structure

(a) Morphology

Davies and Carter have both convincingly argued that the form of a central place reflects its function[88]. It might be expected,

therefore, that Pocklington and Market Weighton, as less functionally-complex centres than dynamic towns and towns at the head of the central place hierarchy, would display distinct morphological processes.

Over the period 1750 to 1850 the general tendency in the physical growth of both towns was inward. As Marshall found in the small town of Kendal[89], the predominant process was one of infill with outward expansion occurring only to a limited extent. The concept of fringe-belt analysis cannot be easily applied to either town for, certainly before the mid-nineteenth century, processes of alternating 'still-stand' and advance were not in operation at the urban edge[90]. Furthermore, neither Pocklington nor Market Weighton had early medieval or corporate origins: they were organic centres of the later middle ages whose developed urban status is attributable largely to their acquisition of markets and fairs in the thirteenth and fourteenth centuries. The existence of an original core is not evident in these towns and the available cartographic evidence for the late seventeenth and early eighteenth centuries points to a very loosely compacted built environment. The absence of any real core and the loose nature of the urban fabric had morphological implications, for it meant that structural change took place largely within the established frame of the built area.

As figures 6.7, 6.8 and 6.9 show, infilling was marked in both towns with considerable pressure being exerted on the central area by the second quarter of the nineteenth century. Numerous yards, such as Horse Shoes Yards, Linton Yard and Robert Thomas Yard, built behind Church Lane, Pocklington, and Skeltons Yard and Langrick Yard off North Gate in Market Weighton, came to characterise the town centre, this area becoming a core of high density housing. While much of the explanation for the process of morphological expansion must lie in the nature of the inherited frame, the way in

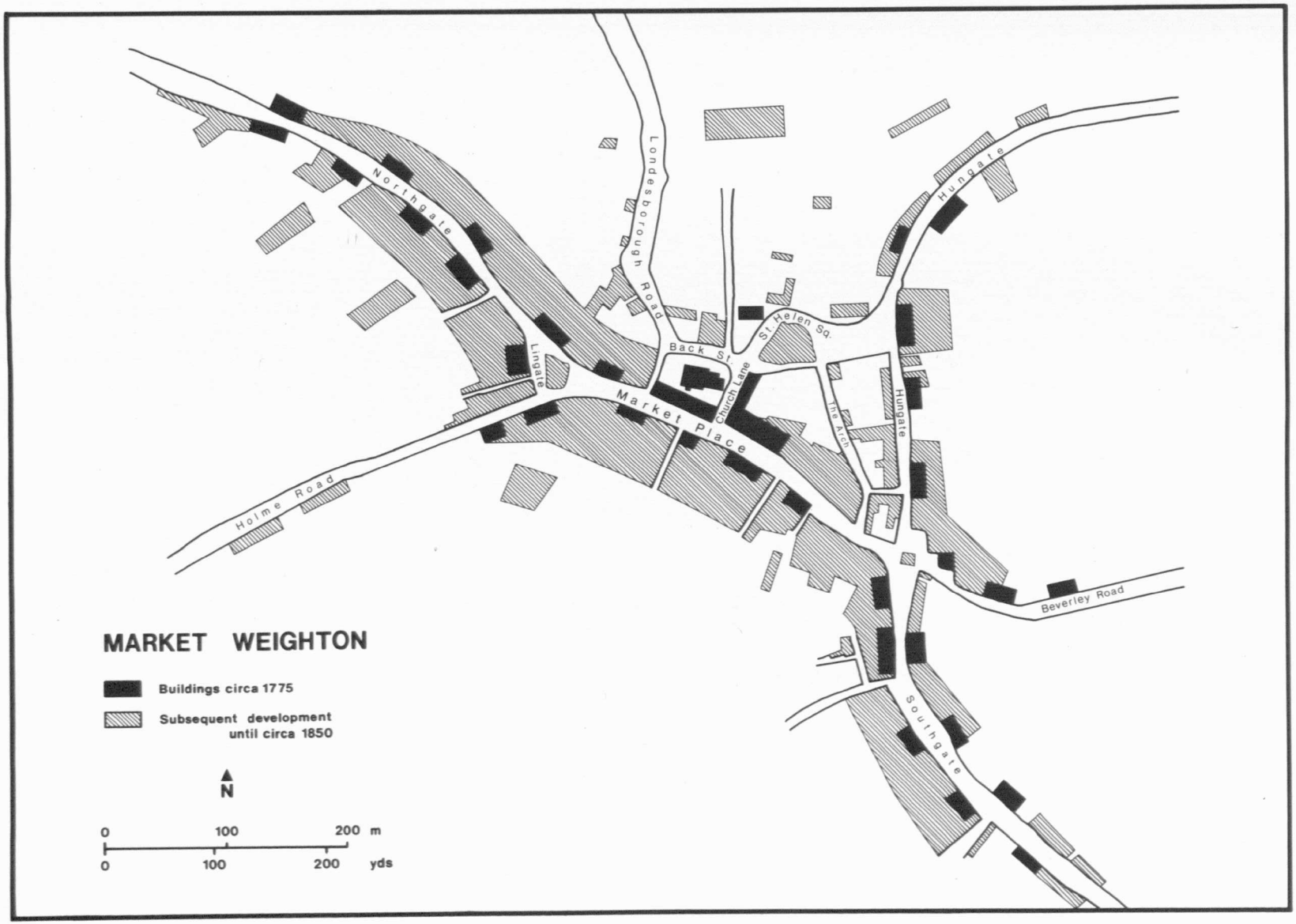


Fig.6.7 Extension of the Built Area in Market Weighton, c.1775-1850

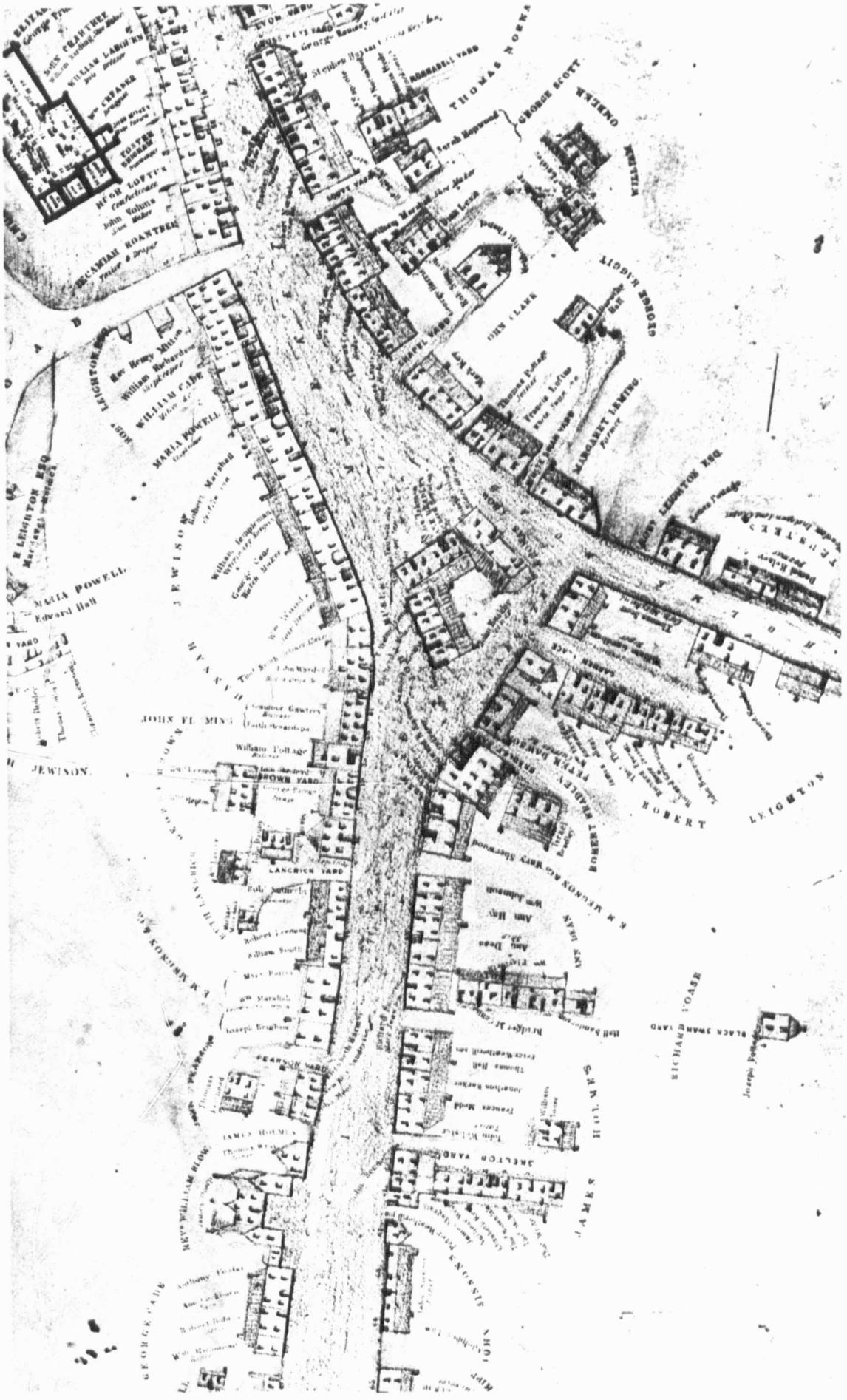


Fig.6.8 Extract from William Watson's Map of Market Weighton, 1848

Fig.6.9 Extract from William Watson's Map of Pocklington, 1854

Table 6.8 Landowners and Taxable Properties in Pocklington and Market Weighton, 1782 - 1832

Date		Pocklington	Market Weighton
1782	L.	121	96
	T.P.	130	139
1792	L.	127	91
	T.P.	140	126
1802	L.	157	118
	T.P.	198	141
1812	L.	153	110
	T.P.	209	148
1822	L.	156	105
	T.P.	236	150
1832	L.	143	127
	T.P.	301	257

L. = Landowners

T.P. = Taxable Properties

Source: H.C.R.O. QDE, LTA.

which land was provided for development also assumes a degree of importance; the limited role played by larger landowners in urban growth meant that little land on the urban fringe was ever released for development.

Evidence from the Land Tax returns of 1782-1832 may be employed to indicate the manner in which land was provided for development[91]. Over this period the number of taxable properties increased from 130 to 301 in Pocklington and from 139 to 257 in Market Weighton and, at the same time, the number of landowners steadily rose, (table 6.8). Development land was provided not by the release of intermediate units of agricultural land, held by the wealthier landowners on the periphery, but by smaller units of town land generally owned by those who paid between 4/- and £1 tax; land which was subsequently divided to form still smaller units. The relationship between the total number of landowners and the numbers who paid under 4/- tax was strongly developed in both towns, the calculation of Pearsons Product Moment Correlation Coefficient giving an $\underline{r}$ value of 0.90 with an associated probability of 0.01. Any change in landownership clearly involved small plots of land. The land of the smaller proprietors was encroached upon and divided to form building space, while the land of the more prosperous merchants and craftsmen, the squirearchy and the gentry remained virtually intact (figure 6.7). Undoubtedly the latter had little need to sell their land, while in an age of rapid agricultural development and rising land prices, they may have been anxious to retain all their holdings. The Land Tax returns further suggest that it was not larger proprietors who purchased building land but rather men of lowlier means, craftsmen, artisans and lesser merchants, in contrast to the situation in Great Driffield. In Market Weighton the most marked decline was among landowners who paid between 4/- and 10/- tax who, as a group, declined from 57% to 34% of all taxpayers over the period

1782 to 1832, while those paying less than 4/- increased from 5% to almost 27% of all taxpayers. In Pocklington, where at enclosure smaller landowners already constituted a significant proportion of all proprietors (table 6.2), the period after 1782 saw a further strengthening of their numbers. Between 1782 and 1832 the percentage of land and property owners taxed between 10/- and £1 declined from 16.5% to 11%, while the number paying 4/- to 10/- increased from 32% to 41% (Appendix VI (a)).

Urban change in these expanding towns most closely involved the smaller landowning groups among whom there was considerable fluctuation in both their number and constitution throughout the late eighteenth and early nineteenth centuries. Decennial land and property turnover in Pocklington and Market Weighton was high (between 40% and 50%) in the period 1780 and 1800, declined to around 30% between 1812-22, returning to its former level from the latter date[92]. This continued fluctuation was important in two respects for it ensured that new land was made available for urban expansion and played a significant role in creating a socially mobile society.

The expansion of both towns is further evidenced by the rate of new building. Over the period 1801-41, 147 new dwellings were erected in Pocklington and 227 in Market Weighton[93]. Overcrowding was never a problem in either town save in Market Weighton at the turn of the eighteenth century when 95 families out of a total of 270 were recorded as living in shared dwellings. An active spate of building in the first decade of the nineteenth century soon overcame this problem and by 1811 the town had no housing shortage[94]. The considerable process of expansion, particularly infill, did much to change the character of the urban fabric.

Before 1750 the fabric of both towns had differed little from the farms and cottages of the surrounding countryside; the majority of houses were low one-storey structures of mud and thatch

with one or two rooms in the loft. Developments in the following hundred years altered the physical character of these places. For both Pocklington and Market Weighton two very detailed maps of the urban area drawn by William Watson, a surveyor from the neighbouring township of Seaton Ross, provide an invaluable insight into the nature of the built environment in the mid-nineteenth century[95]. Extracts from both maps are reproduced as figures 6.8 and 6.9. As can be seen, few one-storey structures remained at this date, most had been replaced by two-storey terrace houses of brick and tile, although notably in the areas surrounding both market places and on the urban fringe three storey houses were common. The growth of a professional class and the growing numbers of wealthy tradesmen and craftsmen had a direct bearing upon town architecture and building styles. In 1791, it was noted of Market Weighton that

> "About eighteen or twenty years ago the houses were, in general, low and mean and covered with thatch, but since that period a number of elegant buildings have been raised by spirited individuals on the sites of old ones and considerable improvements are daily making"[96].

The restyling of much of the urban fabric led to a segregation in housing types. While social segregation was not a new element of urban living for the larger country towns such as Beverley[97], it was for many of the smaller centres who only achieved any regional social status in the period after 1750. The rising role of Pocklington and Market Weighton, as focal points not only of geographical space but also social space, gave rise to a demand for superior living conditions. As the Market Place and surrounding streets assumed the role of a commercial core, older houses were converted into shops and offices and new workers cottages were crammed into courts and yards behind the main street frontages (figures 6.8 and 6.9). In this respect the experience of these places was comparable with that of other, more prosperous or more industrialised, small towns like Hinckley and Melton

Mowbray and with many larger towns such as Bristol and Merthyr Tydfil[98]; the result was that many of the better residences previously located in the central area relocated towards the urban fringe. In Market Weighton, therefore, by mid century there is evidence to suggest the emergence of an outer fringe belt of good quality housing encomapssing the peripheral parts of Northgate and Southgate. In Pocklington also, Great George Street and South Parade had begun to develop as high status residential areas but in neither town was this process well developed in 1851.

(b) Socio-Economic Structure

Market Weighton's and Pocklington's regional social status remained relatively undeveloped before the second quarter of the nineteenth century. It was from that date that public buildings such as theatres, temperance halls and news rooms were erected and societies like the Mechanics Institute and Society of Oddfellows were established (table 6.9). Certainly until this time expanding market towns without corporate status played a relatively minor role in regional social provision. The principal social functions of Pocklington, for example, were the endowed grammar school and the annual horse races held in the town since 1750[99]. Most eighteenth and early nineteenth century social life had centred on the inn and alehouse which numbered thirty in Pocklington and seventeen in Market Weighton as early as 1750[100]. They remained an important element in the social life of most country towns well into the nineteenth century; both Pocklington and Market Weighton still possessed eighteen such institutions apiece in 1840[101]. Social expansion came late to many expanding towns, their demographic and economic development being an important prerequisite to the acquisition of social functions and urban improvements.

Adopting the same social classes as employed in the analysis of Great Driffield, it is evident that the social structure of both

Table 6.9 Known Dates of Acquisition of Urban Improvements in Pocklington and Market Weighton

Social Function/Improvement	Date	
	Pocklington	Market Weighton
Grammar School	1514	-
Horse Races	c 1750	-
Royal Brotherly Society	1789	-
Theatre	1818-19	1818
National School	1819	1841
Gasworks	1834	-
Temperance Hall	1839	1841
Society of Oddfellows	1840	-
Railway Station	1847	1848
Mechanics Institute	-	1848
Agricultural Association	1849	-

Table 6.10 Social Structure of Pocklington and Market Weighton 1851

Class	% of Households	
	Pocklington	Market Weighton
I	6.4	4.6
II	13.3	15.7
III	40.5	35.8
IV	28.4	35.3
V	9.7	8.5
Unclassified	1.6	1.8

Source: Census Enumerators' Returns, 1851.

communities was fairly well balanced. In 1851 classes I and II comprised approximately one-fifth of all inhabitants and class V one-tenth, the majority of residents being skilled and semi-skilled artisans and craftsmen of groups III and IV (table 6.10). One-sixth of households in each town employed domestic servants, a proportionately smaller number than in the more dynamic towns of the region with higher social standing, and in corporate towns such as Beverley and Hedon. Almost half the class I households employed domestic servants and 40% of class II, but few of these employed more than two servants[102]. The more equitably balanced social structure of these centres is reflective of their expansionary growth experience within the region, but one, which in both social and economic terms, had still to be fully developed. It might be expected therefore that whereas dynamic centres, with their dominant economic and social position within the region, were, by the mid-nineteenth century, developing complex spatial structures in terms of both landuse and social areas[104], expanding market towns would be subject to weaker processes of spatial differentiation. Nevertheless, the similar, but more tempered, growth experience of the latter would result in the development of organisational patterns that had clear parallels with those found in larger and more dynamic centres[104].

In the first quarter of the nineteenth century socio-economic patterns in both Market Weighton and Pocklington were weakly developed and there remained a considerable intermix of residential and economic functions. The central areas were still dominated by craft industry and retailing, while the more peripheral streets such as Chapmangate in Pocklington and North and Southgate in Market Weighton were usually the focus of a variety of economic activities (figures 6.10 and 6.11). There is some evidence to suggest at this date, however, that functional concentrations were beginning to emerge; leather workers for example clustered in

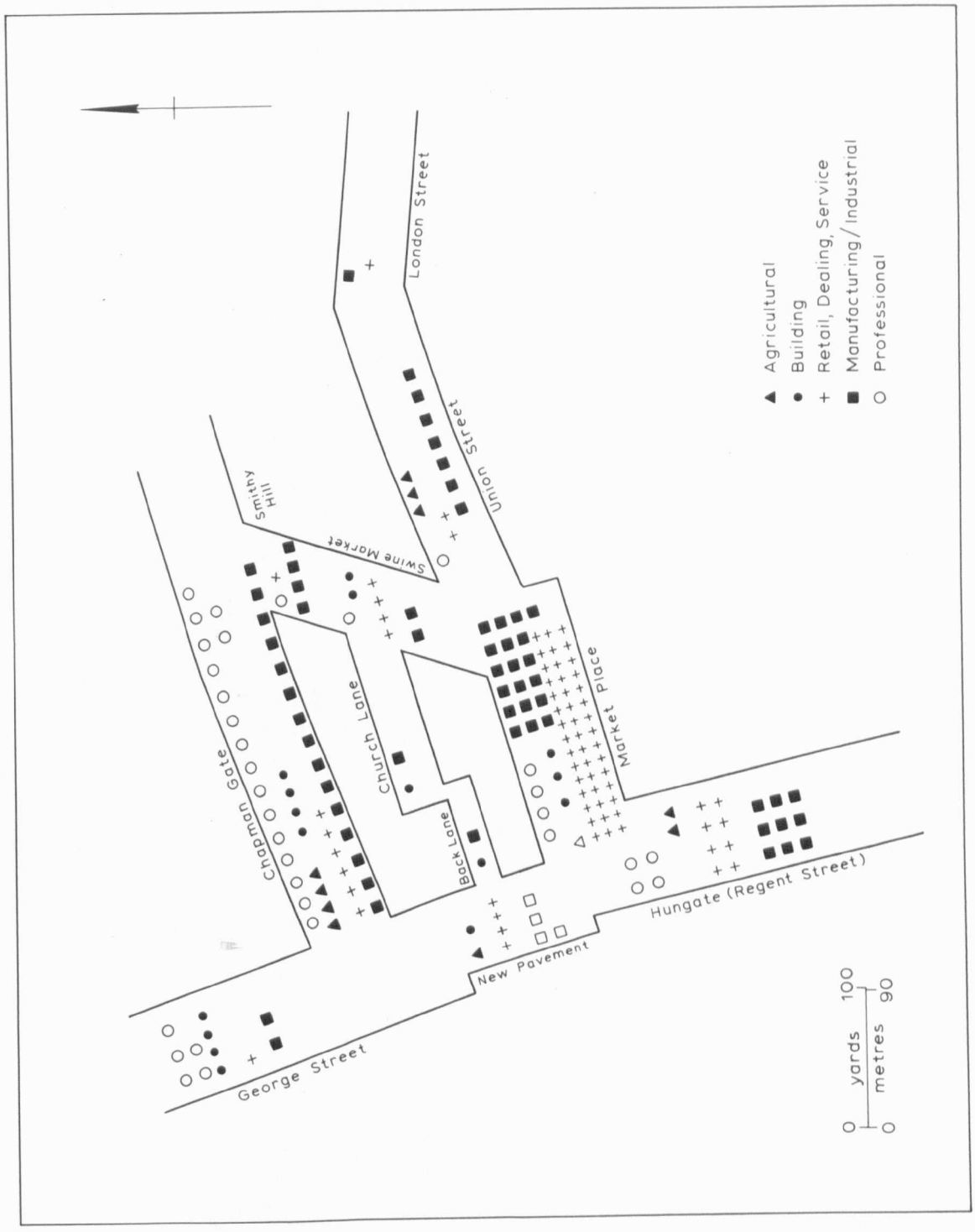


Fig.6.10 Location of Economic Activity in Pocklington, 1823

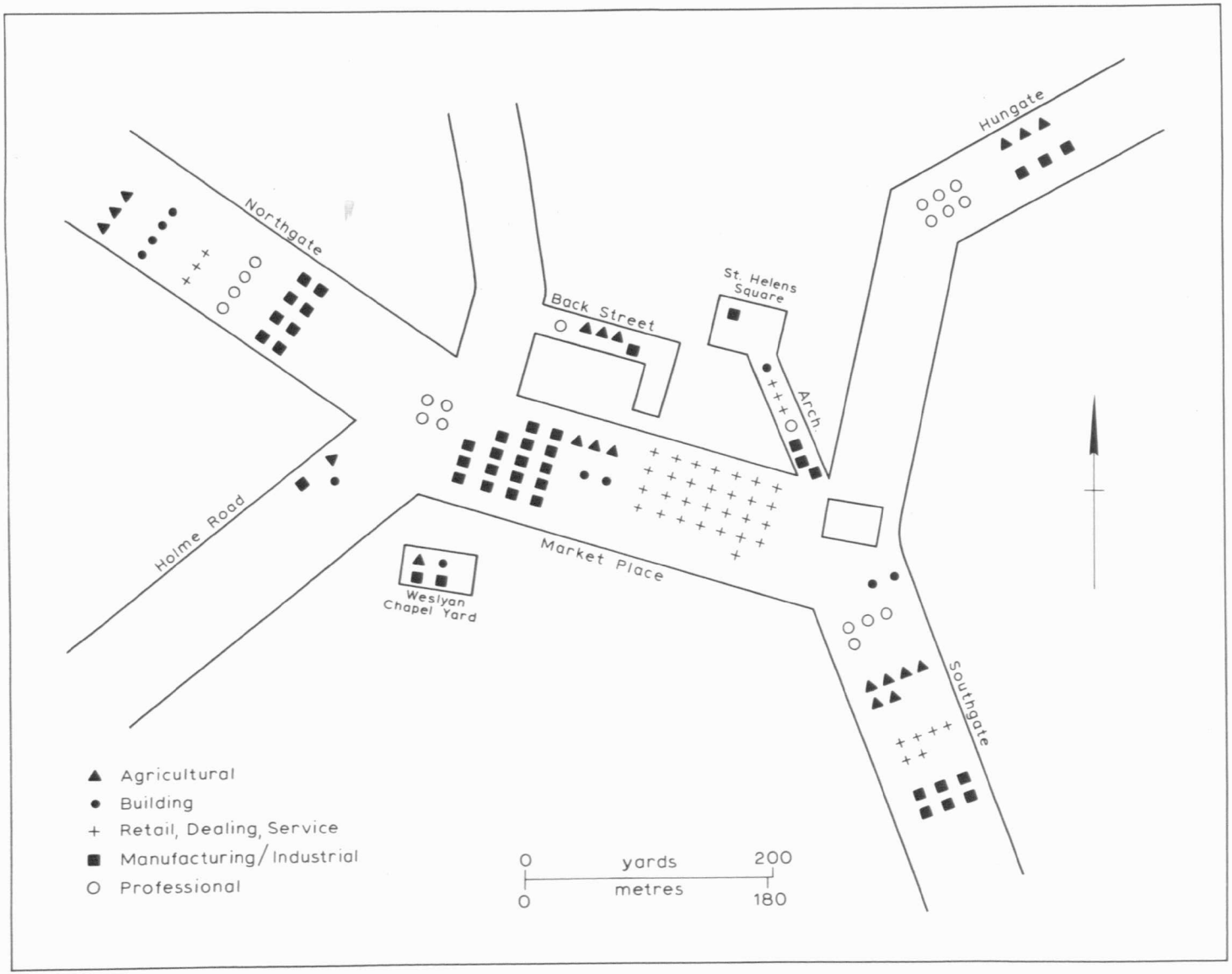


Fig.6.11 Location of Economic Activity in Market Weighton, 1823

Union Street and metal workers in Hungate in Pocklington[105]. By the mid-nineteenth century, earlier patterns were superseded by new forms of spatial organization.

The morphology of the centre undoubtedly had an important influence on spatial structure. Many eastern Yorkshire towns such as Driffield, Market Weighton and Easingwold were predominantly linear in form, characterised by a simple structure of two or three main streets. More complex forms were associated largely with planned or corporate towns where a more regular street layout was common. Carter contends that physical urban structure has a significant bearing on the disposition of landuses and the organisation of social space[106]. Using the medieval castle town of Aberystwyth as his example, he suggests that greater emphasis should be placed on investigating the relationship between the structure of urban form and urban society[107]. It might, therefore, be argued that the 'simple' structure of many country towns would give rise to less distinct spatial patterns, for here there was less opportunity for a parallelism to develop between physical and social distance. Analysis of the spatial location of household heads in key economic sectors and in different social groups may serve to substantiate or refute this point.

Unfortunately the precise location of individual households as identified in the census enumerators returns of the mid-nineteenth century is not always possible in small country towns. Comprehensive address schemes are seldom adopted and individual lanes and yards which were such an important morphological element in many of these places are often unnamed. In the case of Market Weighton, for example, only six different street names are used in the whole of the schedule whereas William Watson's map of 1848 attests to the existence of a far more complex urban structure[108]. In Pocklington, however, the enumerators returns are more comprehensive and it is possible to locate individual households with some precision.

Evidence from the 1851 census suggests that functional concentrations were less marked in the expanding country towns of the region. The dominant economic pattern in Pocklington was the development of a commercial core surrounding the market place with very few craftsmen or producer-retailers retaining a central location by mid-century (figure 6.12). The latter had largely been pushed into more peripheral streets surrounding the central area such as Chapmangate, New Street and Church Lane. A further functional concentration comprised the dominance of agricultural workers in two main areas, viz the yards and alleys to the north of Church Lane, and London Street. This indicates that the shift of agricultural activity towards the urban margins was already in progress. Other economic activities were distributed widely throughout the urban area but within this broad spatial distribution small pockets of similar activity are evident. Building tradesmen, for example, were found in Grape Lane and on the eastern side of Great George Street, and professional persons located principally in York Terrace, Regent Street and South Parade. Clearly similar processes to those operating in larger and more dynamic centres were present, but were nowhere complete by mid-century[109]. Location quotients attest to the less distinct separation of economic function in this type of expanding country town.

As table 6.11 shows, economic activity was widely distributed throughout Pocklington, but three distributions stand out in particular. First, the dominance of the Market Place in respect of retail activity; secondly, the importance of the building trade in Railway Street and Grape Lane; thirdly, the concentration of professional activity in Regent Street and South Parade. These apart, the available evidence suggests that there was a considerable intermix of functions within most of the urban area. Clearly the pattern that characterised Great Driffield, whereby a clear economic dichotomy existed between the main axes and

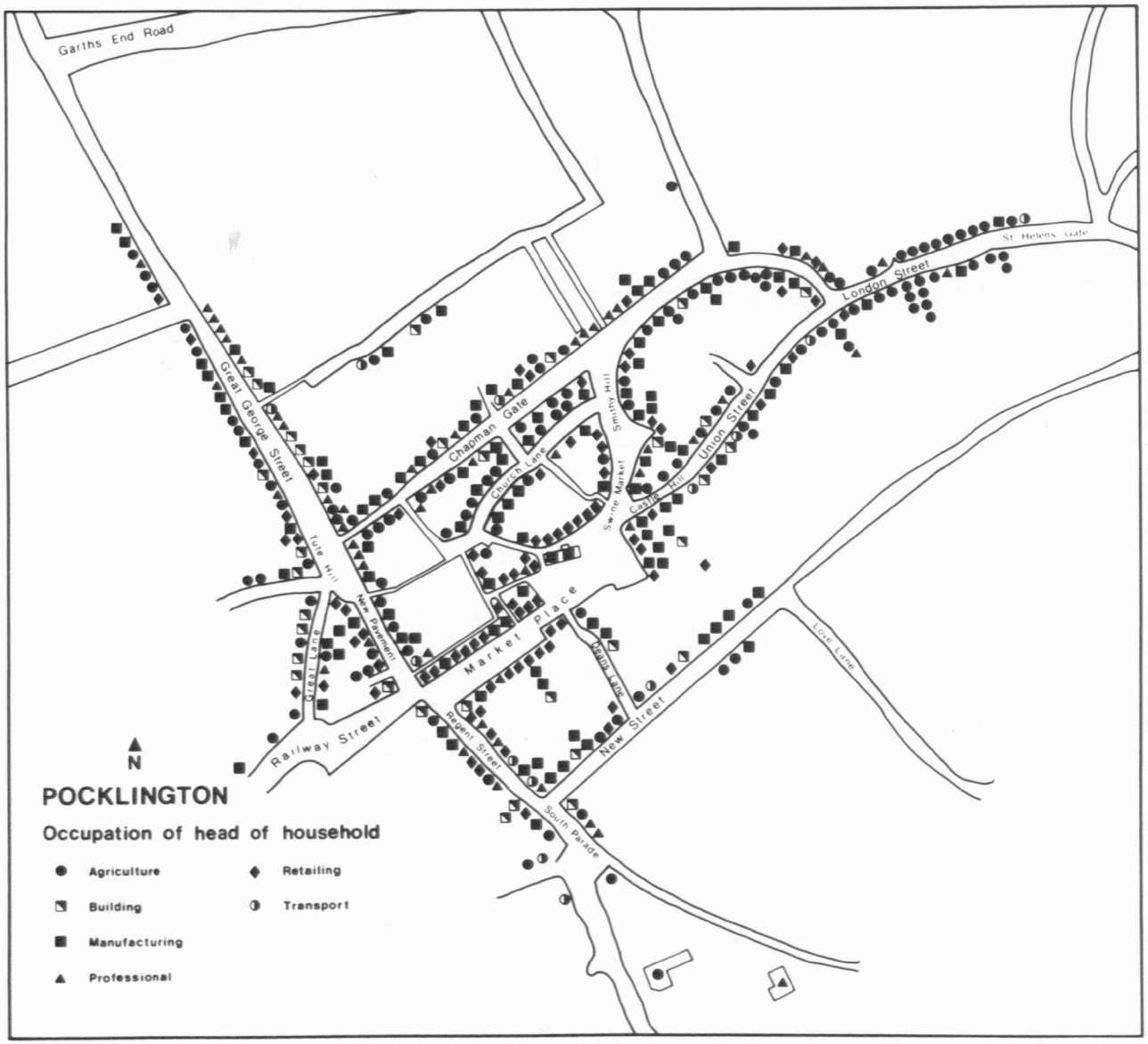


Fig.6.12 Location of Households Engaged in Selected Economic Activities in Pocklington, 1851

Table 6.11 Location Quotients of Social and Economic Groups - Pocklington, 1851

		Heads of Households									
		Social Class					Economic				
	Street/Area	I	II	III	IV	V	Ag	Buil	Retail	Prof	Man
1.	Great George Street, York Terrace	1.4	1.1	1.0	0.8	0.9	0.8	1.8	0.6	1.8	0.8
2.	New Pavement, Tute Hill	0.5	1.1	1.2	0.7	0.4	0.8	0.5	1.3	-	1.0
3.	Chapmangate, Smithy Hill	1.7	0.6	0.7	1.3	1.7	1.2	0.5	0.6	1.3	0.0
4.	New Street, Dean's Lane, Peter Lane, Peter Square	-	-	1.5	1.0	-	0.7	1.7	1.6	-	1.5
5.	Regent Street, South Parade	1.9	0.7	1.2	0.6	0.2	0.5	1.3	0.7	1.9	1.1
6.	Market Place	0.5	1.4	1.7	0.2	0.2	-0.05	1.0	2.7	0.4	1.6
7.	Swine Market, Church Lane, Brass Castle Hill	0.2	1.0	1.2	0.9	1.2	0.9	0.8	1.2	0.6	1.4
8.	Union Street	1.0	0.2	1.0	1.4	0.7	1.1	1.3	1.0	1.2	0.7
9.	London Street	0.7	0.3	0.2	2.3	1.4	2.5	-	0.2	0.6	0.3
10.	Railway Street, Grape Lane	-	0.5	0.8	1.0	2.3	1.0	2.6	0.5	0.4	0.9

See Appendix VI (b) for a breakdown of the location of economic and social groups in Pocklington and Market Weighton.

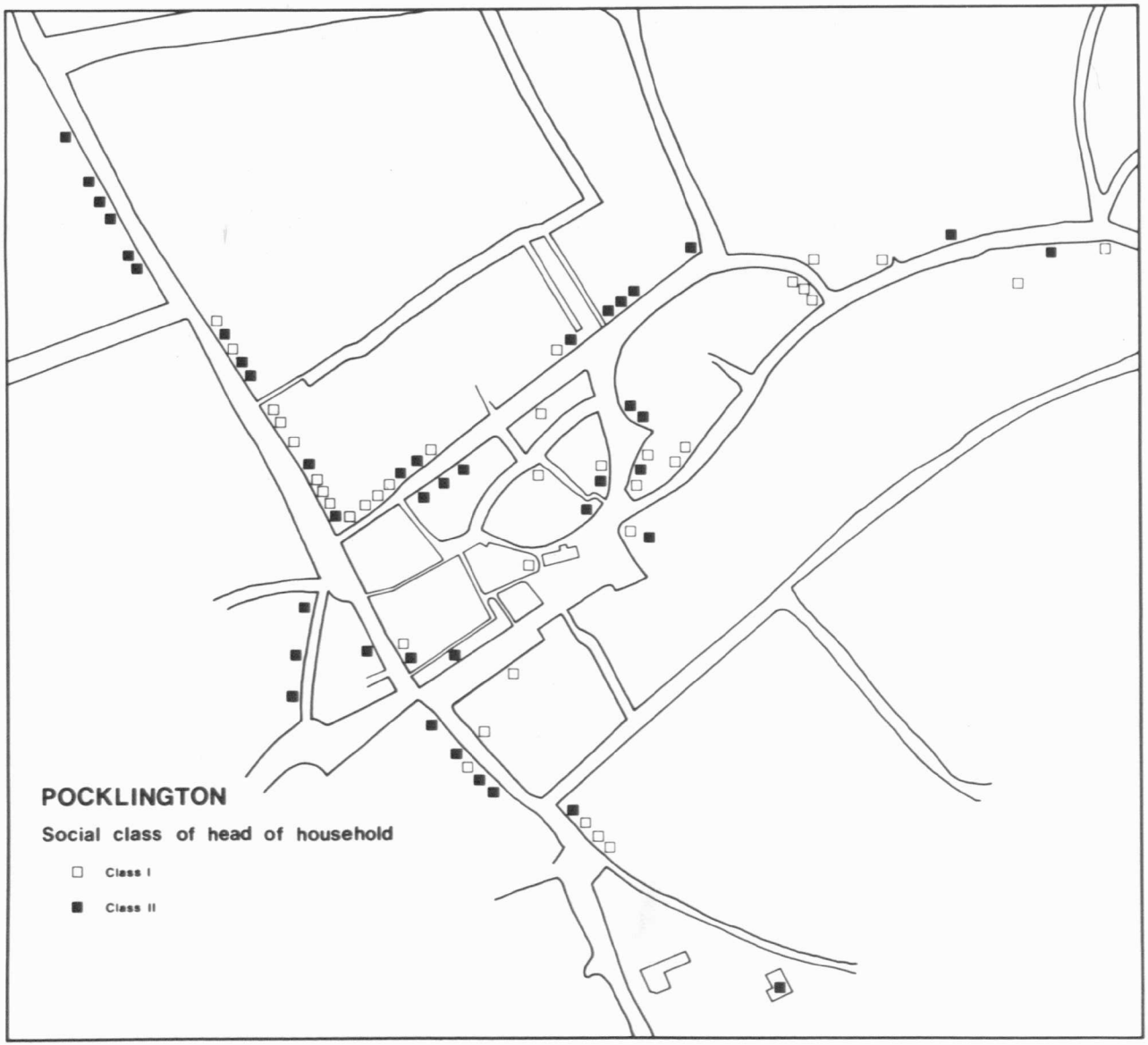


Fig.6.13 Location of Class I and II Households in Pocklington, 1851

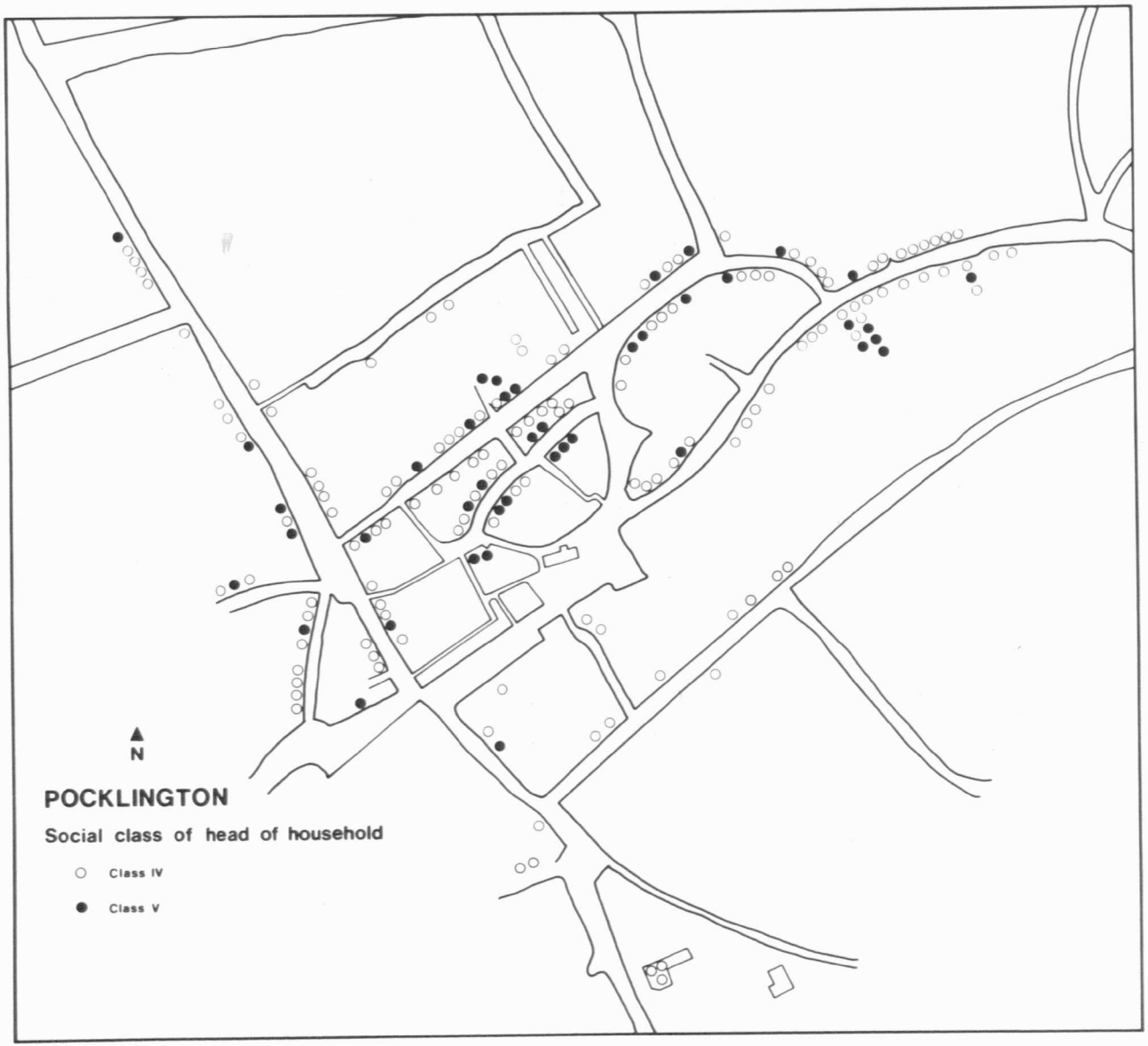


Fig.6.14 Location of Class IV and V Households in Pocklington, 1851

interstitial infill, was only slowly developing in Pocklington. In part this must be explained by morphology for the narrow streets of the town radiating from the church and the Market Place led to a high density of houses and buildings and hence to more limited opportunity for distinct functional zones to develop; but the more limited growth experience of the town is also of significance. Less marked physical extension of the town in the period after 1750 meant that functions tended to retain many of their early eighteenth-century locations, while the smaller number of high order or specialised functions acquired by expanding centres exerted less pressure on traditional patterns of economic organisation.

If in economic terms the spatial structure of Pocklington was not well developed by mid-century, social differentiation was more marked. The clearest dichotomy was between the east and west of the town, the latter being an area favoured by the higher status social groups (figure 6.13). Class I and II households clustered predominantly along the western axis of the town formed by Great George Street, New Pavement, Regent Street and South Parade, while small numbers were also found around Swine Market and Smithy Hill. The lower social groups, households in social classes IV and V, dominated the eastern half of the town locating principally in Union Street and London Street, not surprising in view of the fact that several town lodging houses were found in these streets. These groups were also strongly represented in the area north of the Market Place between Church Lane and Chapmangate, much of which comprised late-eighteenth and early-nineteenth-century infill. The centre of the town, the commercial core, was overwhelmingly dominated by social group III with very few high status households retaining a central location. Location quotients provide additional evidence of emerging social differentiation in the town.

Location quotients of 1.4 and over for Great George Street,

Chapmangate, Smithy Hill, Regent Street and South Parade, substantiate the growing importance of these areas for high class residence; but, as table 6.11 shows, in all but Regent Street and South Parade considerable numbers of lower-status households were also found in these areas. Referring to figure 6.13, it is evident that it was principally small groups of dwellings within each street that were occupied by high status households. Likewise the poorer areas of the town, namely Union Street, London Street, Railway Street and Grape Lane, although underrepresented, were not totally devoid of middle to upper-class households; the process of social and residential segregation had still to fully effect itself. Only in the central area, the commercial core of the town, was the domination of one group of households marked; for here households other than class II or III had location quotients of 0.5 or less.

Clearly in Pocklington, morphology was an important determining influence on the emergent spatial structure. The relatively simple form of the town and the limited physical expansion of the urban area served to restrict the opportunity for the development of clearly defined socio-economic areas[110]. In middle order expanding country towns, therefore, it might be argued that their distinguishing spatial features were the existence of a centrally located and clearly defined commercial core with the residue of economic activity being widely dispersed but, nevertheless, having small pockets of specific nuclei. Likewise in social terms there was only limited opportunity for the upper social groups to distance themselves physically from the remainder of the population, so that nucleations of high status households characterised groups of houses rather than whole streets or areas of the town. Physical compactness encouraged intermix, and the more limited demographic and economic experience of these expanding centres presented less pressure for morphological

restructuring, resulting in weaker patterns of social and economic differentiation.

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37. H.C.R.O. DDBD 56/2; P.R.O. RAIL 1112/46; NEAVE, op.cit., p.28.

38. P.R.O. RAIL 858/3,4; M.W.D.B. Account Book 1772/1784.

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40. P.R.O. RAIL 858/5.

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42. H.C.R.O. RDB B/153/42, DDBD 56/1(a), RDB Y/230/39.

43. At enclosure almost 85% of land in Great Driffield was held in units of 100 acres or more by 13% of all landowners in contrast to Market Weighton where the respective percentages were 63% and 7% and Pocklington 35.6% and 2.3%.

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63. See note 68, chapter 5.

64. This is the general extent of the trading area argued for by EVERITT, A.M. 'The Market Towns' in CLARK, P. ed. The Early Modern Town. London, 1976, pp.168-204; but O'Dell does postulate a wider distance, O'DELL, P. 'Urban Spheres of Influence in Leicestershire in the Mid-Nineteenth Century', Geographical Studies, vol.4, 1956/57, pp.30-45.

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68. This statement must, however, be qualified for certain stable centres within the region, such as Hedon and Howden, were corporate and collegiate towns whose economic structure was distinctly urban, yet they had been unable to retain their regional dominance characteristic of the medieval age.

69. These figures are calculated from both baptism and burial registers, occupational entries were analysed for each available year between 1710 and 1840. See Appendix III (a).

70. See table 3.16, chapter 3, and table 4.6, chapter 4.

71. Most of the stable towns of the region saw a decline in their percentage contribution to regional centrality, see chapters 3 and 4.

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CHAPTER 7

STABLE CENTRES

In contrast to both dynamic and expanding centres, stable centres proved unable to improve or retain their standing within the regional urban system and generally experienced a reduction in both their share of regional concentration of urban population and contribution to regional centrality. This is not to say, however, that expansion was not characteristic of these towns, but a variety of factors operated to considerably restrict their growth experience and hence regional importance. Towns falling in this group were diverse, but it is noticeable that they were all relatively small centres and none of the larger country towns had similar growth experiences. A common characteristic of many of these towns was their antiquity and the possession of corporate or borough status, two attributes which had given them earlier political and administrative importance within the region; an importance which was in decline by the mid-eighteenth century. Their stability, or in many cases stagnation, became reflected in their role as local service centres and their inability to gain access to more than purely local markets. The selectivity of growth depended on location within areas of rapid rural expansion and on the maintenence and enhancement of nodality[1], and it was absence of such factors that determined the fortunes of stable towns.

Three East Riding towns can be classified as stable, viz Howden, Patrington and Hedon, each occupying distinct levels of the size hierarchy of towns by the mid-nineteenth century. They may therefore serve as useful testing grounds for analysing the forces operating on and within stable centres, and for

investigating the structural and spatial manifestations of these forces. It was argued that in the case of dynamic centres it was locational advantage which largely determined their growth experience; in stable centres locational disadvantage became a major deterrent to growth.

1. Locational Disadvantages: Deterrents to Growth

(a) Geographical Location

The geographical location of each of these East Riding towns could not be considered particularly favourable. Howden, like all the settlements that lie close to the river Ouse, was established where slightly rising ground offered a dry site, and the layout of the town owes much to the changing course of rivers and streams in the locality in past time periods. The surrounding region was marshy and subject to much flooding and although rich and extensive post-glacial deposits of silt, warp, peat and alluvium are found along the rivers Humber, Ouse and Derwent, problems of flooding considerably reduced the agricultural potential of the area. While some successful attempts were made at draining this area during the eighteenth century, much of Howdenshire continued to be frequently inundated by flood waters from the Ouse and Derwent. Consequently the agriculture of this part of the Vale of York became rather less developed than to the north, having inevitable repurcussions on trade. The agriculture that developed rested principally on the cultivation of flax and rye and on the rearing of sheep[2]. The less diversified nature of agricultural production in the area of Howdenshire thus served to reduce the market potential of the town.

Hedon and Patrington are situated in Middle and South Holderness respectively: each had access to the developing agriculture of that region. The introduction of widespread drainage schemes in the early nineteenth century meant that many

of the heavier soils could be cultivated for the first time, while also enabling pasture to be used for a longer period each year[3]. Whereas in the early nineteenth century only one-third of Holderness was under tillage, by 1850 arable acreages accounted for two-thirds of all land, and the region was said to be "altogether dependent on the price of corn"[4]. Although of secondary importance on many farms, livestock were found in large numbers on the eastern lowlands[5]. A further important development affecting Holderness was the reclamation of land adjacent to the Humber. Between 1668 and 1850, upwards of 10,000 acres were reclaimed and converted into valuable farms in the vicinity of Patrington, Ottringham and Sunk Island: this land was rich in soils and capable of producing large crops[6]. Such developments increased the volume of potential trade, but both towns met with barriers that restricted their full participation in regional trade.

The principal barrier to the development of the market potential of Patrington was physical. Situated towards the southern tip of Holderness its geographical location meant that it had access to a much smaller hinterland than many of its regional counterparts. Although the town did, in the course of the eighteenth and nineteenth centuries, achieve hinterland hegemony over southern Holderness, Patrington had no opportunity to further develop its regional position in respect of trade. Competition from Hull was the major barrier to the trading potential of Hedon, while there is evidence to suggest that Beverley also affected the town's trade. The former's superior location on a deep water haven of the Humber reduced the medieval prosperity of Hedon to that of a local market centre, while the more central location of Beverley put that town in a better position to draw on much of the trade from Middle Holderness[7]. The locational disadvantages experienced by each town were further

affected by transport linkages.

Howden's location remained the least developed of the three towns, for in the course of the eighteenth and early-nineteenth centuries the town failed to acquire either a turnpike road or a navigational link. This provided a serious setback to the regional standing of the town, for road improvement eased travel and helped to break down urban and rural isolation by giving a new nodality to certain settlements. A scheme to turnpike the road from Newport to Doncaster, via Howden, was proposed in 1781, but failed owing to competition from river traffic and the difficulties of maintaining roads in the marshlands of Howdenshire[8]. The harshness of this blow to Howden might have been softened if attempts to make a navigable cut from the town to the Humber had proved successful[9]; but competition from the burgeoning town of Selby and later from the canal-created river port of Goole rendered attempts to develop the nodality of Howden largely abortive[10]. Hedon and Patrington arguably fared rather better than Howden for they each obtained turnpike roads and improved navigational links in the eighteenth century.

The turnpike road between Hedon and Hull, via Preston, was initiated in 1745 and was of particular importance for two reasons. First, it marked the initial stage in the improvement of communications between Hull and the towns of Holderness and, secondly, it promised the possibility of a revival of trade at Hedon and Patrington havens. Much of Hedon's medieval prosperity had been based on its tidewater outlet to the Humber, and at one time ships from many ports of Europe had found harbourage at the 2,130 yard long quay. But as early as the sixteenth century, Leland described the haven as "blocked up and useless" with "few botes and no marchauntes of any estimation"[11]. Patrington's cut to the same river, probably made in the late fifteenth century[12], was also in a poor state by the early eighteenth century for, as

at Hedon, silting and warping were considerably reducing the carrying capacity, and disputes were rife over the responsibility for upkeep[13]. Problems of silting at Patrington were further exacerbated by schemes of local landlords to drain the marshlands of Holderness, particularly in the region of Sunk Island[14].

By the mid-eighteenth century, it was recognised that the potential of both towns could be developed by attention to their respective havens and by the improvement of road communications generally. Consequently plans made in 1760-61 for turnpiking the road from Hedon to South Holderness included a scheme for improving Patrington Haven[15]. Certainly the act led to some revival of the fortunes of Patrington and also led to the promotion of the Hedon Haven Improvement Bill of 1773[16]. Both projects, however, experienced serious technical difficulties connected with silting which were never overcome, and which, furthermore, had a distinct bearing upon trading levels. A further transport link was obtained by Hedon in 1833, with the establishment of a new and direct turnpike road to Hull. This road, however, had a detrimental affect on the town for it brought Hull market closer to the valuable corn producing regions of South Holderness, thereby drawing much potential trade away from Hedon.

Whereas in the case of dynamic and expanding centres agricultural developments and the acquisition of transport links gave these towns a new degree of nodality, in stable centres the results were distinctly less advantageous. Physical and competitive barriers, lack of agricultural diversification, and poorly developed or absent transport links served to restrict the nodal importance of these towns.

(b) Nodality

Stable towns became distribution points of limited importance in the hierarchy of central places. The failure of these centres to become integrated into the regional transportation system

rendered their major function the provision of little more than basic goods and commercialized services for local areas. Their role as localised district trade centres was reflected in the character of their trade.

Specialisation in trade was less characteristic of stable centres, although most of these places did become noted for the sale of a particular product by the early nineteenth century. But trade, whether general or in a specific product, was essentially limited. Both Patrington and Howden came to specialise in the marketing of grain but there is evidence to suggest that this was on a fairly restricted scale. Published newspaper returns for Howden market reveal that on average little over 400 quarters of wheat, barley, oats and beans were sold weekly, bringing a revenue in the region of £850[17]. This stands in sharp contrast to the thousands of quarters handled weekly at Driffield and Market Weighton markets. The small town of Hedon came to trade principally in livestock following the establishment of a weekly cattle market in the town by the Holderness Agricultural Society in 1796: prior to that time most trade had been in grain and general products[18]. The market enjoyed a certain degree of success until the mid-nineteenth century; it was well attended and large numbers of animals were regularly sold. It was only after 1855 that livestock trade at Hedon declined. With the construction of the Hull to Withernsea railway in 1854 there was a gradual reduction in the number of livestock marketed as trade became channelled principally towards Hull, Beverley and Driffield[19]. When the trade figures for Hedon are compared with known totals for livestock markets held in more 'dynamic' towns of the region, the relatively low level of trade conducted in the town became apparent. By the mid-nineteenth century over 13,500 sheep and 3,200 pigs were marketed through Hedon annually, while a small number of animals were also

Table 7.1 Animals Sold and Slaughtered at Hedon Livestock Market, 1851-1866

Date	No of Sheep Sold	No of Pigs Sold	Animals Slaughtered (1)
1851-2	13,586	3,254	507
1855-6	15,032	1,924	578
1865-6	10,618	4,023	NA

(1) Includes Calves, Oxen, Sheep, Lambs and Pigs.

Source: H.C.R.O. DDIV 33/3.

regularly slaughtered (table 7.1). At the same date, five times this volume of trade was conducted at Great Driffield's livestock market; a large proportion of the 150,000 sheep dipped annually in the vicinity of Driffield were marketed through the town, while an average of 300 pigs were also sold weekly[20].

While less-frequent fairs were demonstrably of some importance in expanding centres, in stable centres they assumed a greater significance, for the low level of trade transacted on a regular basis could be supplemented as much as three to four times a year by the fair[21]. In addition, fairs gave these towns temporary nodal importance over and above their normal level. This temporary nodality could, in certain cases, raise the relative standing of the town from local to sub-regional and occasionally regional dominance.

Howden's October horse fair, for example, was accounted by contemporaries "the greatest horse fair in the British Isles", and it often lasted for up to a fortnight[22]. Business was not confined to the town alone, but was conducted in every surrounding community, bringing many thousands of pounds to Howdenshire annually. Individual horses sold at the fair could fetch as much as 200 guineas, and as early as 1800 total sales topped £10,000[23]. Howden's sphere of influence in this respect was far reaching. The fair had been attended by foreigners since the Middle Ages and in the nineteenth century it continued to draw agents from Prussia, Russia, Germany, France and Spain. Extra-local influences were the mainstay of the fair. The contract made in 1841 by a Mr Elmore on behalf of the French government for the supply of 200 cavalry horses was said to have encouraged large numbers to attend the fair[24]. In 1843 a Mr Coleus of London purchased over 100 horses at prices ranging between £80 to £100, while Messrs Dyson, Knight and Harris, also of London, regularly made extensive purchases, Dyson buying 200 horses for the British

army in 1844[25]. European dealers were perhaps of greater importance than the London dealers. Messrs Creimer and Benedict of Brandenburg, Paris and Vienna regularly purchased carriage and hunting horses; a local buyer bought several horses for Baron Rothschild, and Fustenberg of Berlin purchased forty horses for the Prussian Government[26]. The benefits of Howden horse fair were felt over much of the Riding. Many of the horses traded at the fair were bred locally and brought wealth to their breeders. Livestock subsequently requiring shipment to London or Europe provided local ports with a fair amount of trade. In the first decade of the nineteenth century almost 400 horses were exported from Hull to Russia, Prussia and other parts of Europe. After 1840 horses were also sent by rail to London, Manchester, Liverpool, Derby and Coventry[27].

Clearly these fairs could temporarily raise the status of towns in which they were held. The spring fair in Howden gave the town sub-regional influence and was attended by dealers from the Midlands and London[28]. Another striking example of the importance of fairs in stable and declining towns is provided by information relating to South Cave's Trinity Monday fair. The 1841 census which was taken on the Sunday before Cave fair records the presence of 300 visitors in the town and 800 more in the surrounding villages[29]. Many of the visitors were cattle and horse dealers who were said to have transformed the trade of a large market village into that of a busy town[30]. Despite temporary fillips to nodality provided by infrequent trade, the nodal importance of stable towns remained at a fairly low level and this is clearly reflected in data relating to inter- and intra-regional trade flows to and from these communities.

As table 7.2 shows, the revenue accrued on the turnpike road between Hedon and Patrington was one of the lowest on roads serving country towns in the region of East Yorkshire: revenue from the

Table 7.2 Toll Revenue from Four East Yorkshire Turnpike Trusts, c1770-1865

Date	Trust			
	York-Kexby Bridge Garrowby Hill	Brough Ferry - Newbald Holmes	Hedon-Hull	Hedon-Patrington[1]
	Annual Income £'s			
1772	NA	116	-	NA
1784	NA	72	-	NA
1786	NA	63	-	NA
1806	NA	66	-	NA
1812	NA	81	-	NA
1814	NA	82	-	NA
1823	1,062	NA	-	NA
1825	1,102	NA	-	NA
1830	NA	104	-	NA
1832	1,417	109	-	NA
1835	1,257	132	NA	NA
1838	1,419	126	697	NA
1840	1,523	183	NA	34
1843	1,136	NA	789	45
1845	1,240	NA	776	56
1847	1,230	NA	793	64
1849	1,067	NA	NA	81
1853	1,155	NA	NA	NA
1855	1,105	NA	NA	NA
1860	969	NA	NA	NA
1865	1,116	132	NA	NA

Source: H.C.R.O. TTBF 2/1,3 9/5

H.C.R.O. TTYK 1/2

H.C.R.O. DDHE 30/E.14 32/M 1-11

(1) Receipts from weighing engine.

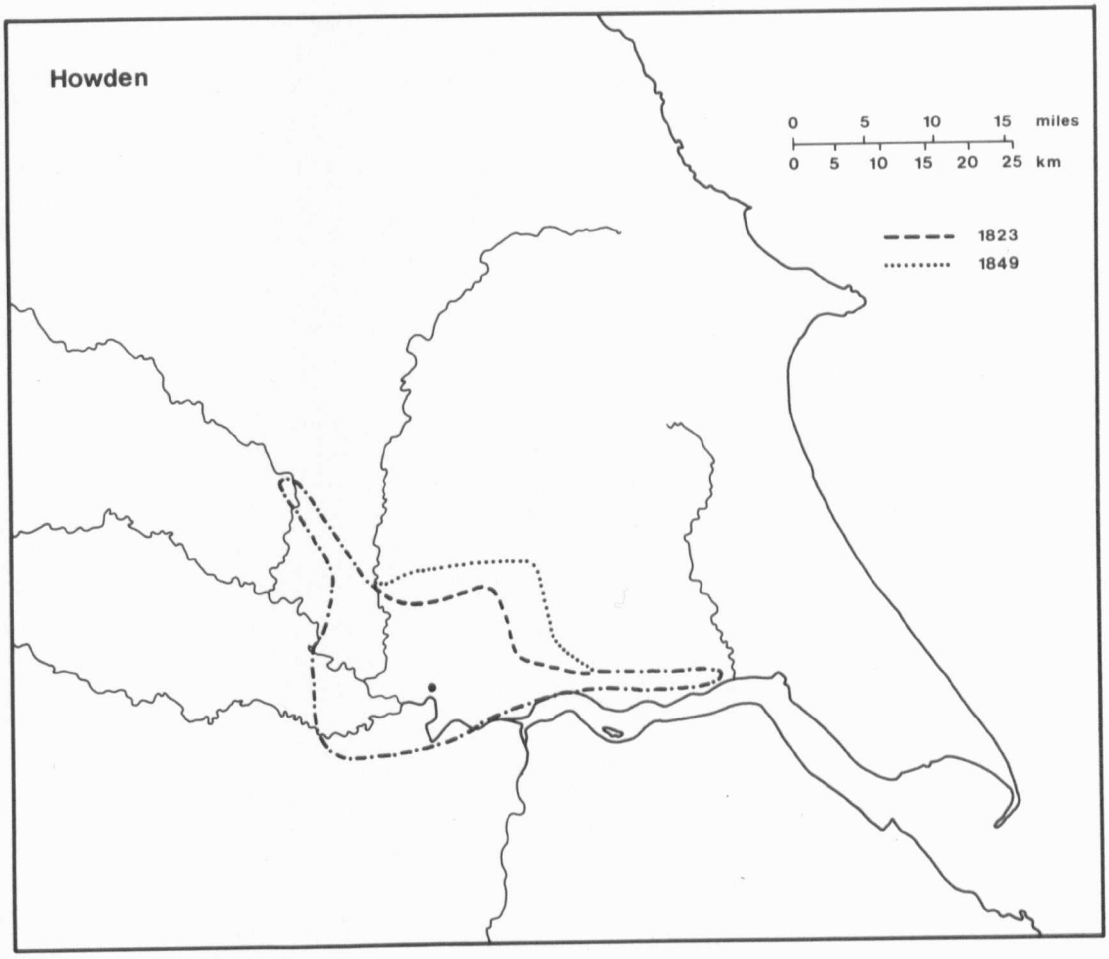
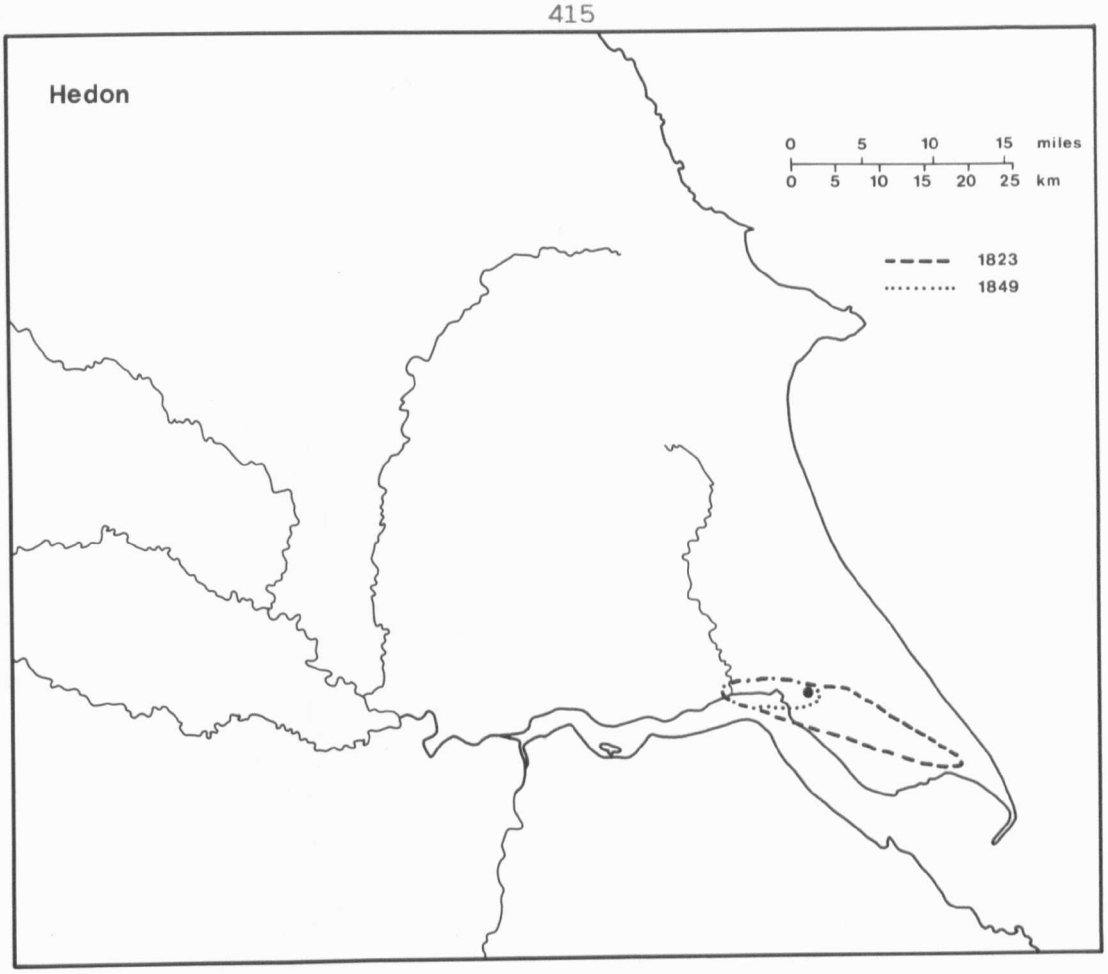


Fig.7.1 The Market Areas of Howden, Hedon and Patrington, 1823-1849



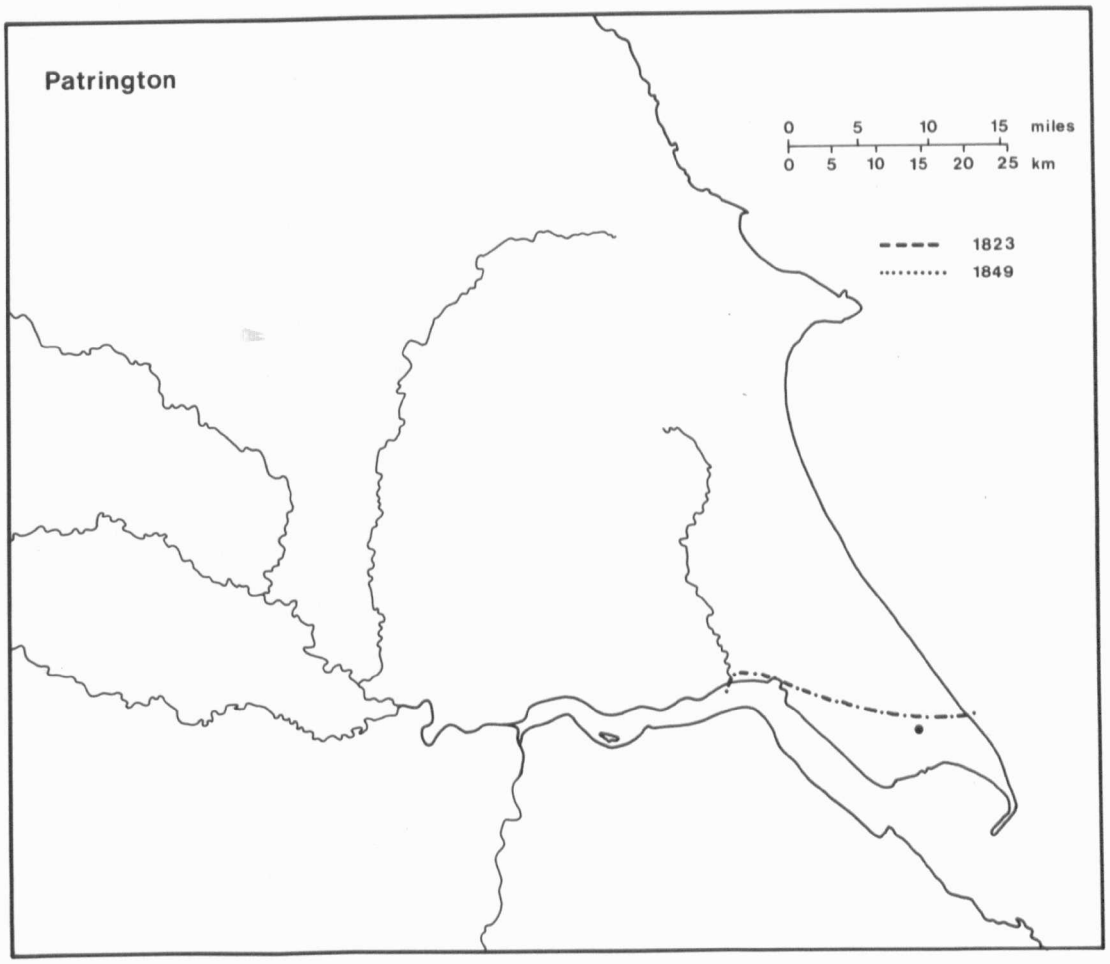


Fig.7.1 (Continued)

Hull-Preston-Hedon Road was even less. The later direct turnpike road from Hedon to Hull received slightly higher toll incomes - £793 in 1849[31] - but this was largely trade moving away from the town towards Hull rather than trade from Hull to Hedon[32]. Data relating to land carriage reveals a similar picture, the nodality of most stable towns being ill-developed even by the mid-nineteenth century. Howden had the most advantageous geographical location due to it's juxtaposition with the West Riding. Consequently it was served by a larger number of carriers and was connected to more places than many other stable towns. As figure 7.1 shows, Howden's market area was more extensive than either Hedon or Patrington's, the latter were connected to only six and one places respectively in 1823. While the nodal importance of Patrington increased slightly in the ensuing quarter century, that of Hedon declined so that by 1850 the town had contacts with Hull and Patrington only (see chapter 4). The trading contacts of both Holderness towns were affected by their geographical location which limited their hinterland and confined trade principally to South Holderness. Poor communications and lack of market specialisation offered little incentive to traders to travel long distances when superior services were more readily available elsewhere.

Trade flows, via their respective navigations, were also considerably less than those associated with expanding or dynamic towns. They probably did no more than render them able to maintain a stable position within the regional settlement system. Howden, whose nearest water communication was at Howden Dike two miles south of the town, never proved able to participate in inter-regional water-borne trade. In the late eighteenth century goods were shipped from Howden Dike to London and Hull, but no mention is made of that trade after that date and it appears that the port of Selby, and later Goole, drew off all the trade[33].

Hedon and Patrington fared rather better, but incomes and the volume of trade involved were of a low magnitude. Towns enjoying good water communications, and consequently good trading links, underwent a different economic experience to those settlements indirectly served (Howden), or whose communications were persistently beset by navigational difficulties (Hedon and Patrington).

As can be seen from table 5.2, incomes received from Hedon and Patrington Havens were fairly small. The best income achieved on the former was £455 in 1840, but on the latter it was a mere £68. It is often difficult to estimate the number of ships and the type of goods plying the navigations for few records survive of their arrival and departure. At the small haven of Hedon, trading principally with London and the West Riding, vessels appear to have arrived at the rate of only ten a month at the close of the eighteenth century[34]. Shipping flows to the haven were in particular affected by problems of maintenance and silting, for vessels which entered the haven scarcely had time to load or unload before the tide had turned and left them stranded[35]. Patrington haven seems to have attracted a slightly higher volume of shipping, although total tonnages involved were not necessarily greater. On average twenty boats a month entered the haven carrying 70 tons apiece[36].

Compared to their regional counterparts, total tonnages of agricultural produce annually shipped from both Hedon and Patrington were small. Much of the grain that passed through Patrington's corn market was shipped to Wakefield and other towns of the West Riding. Sir George Head in his Home Manufacturing Tour of 1836 remarked that ten lighters, having delivered coal to Patrington, were waiting to export grain from the cornfactors' magazines at the haven to that district[37]. While his account would suggest that the grain trade might have been considerable,

other sources state that only about 5,000 quarters were annually involved, with 3,000 chaldrons of lime being imported[38]. Nevertheless, these navigational links were of particular importance to both towns for the imports of coal, lime, porter and building stone, among other products[39], ensured that the towns continued to function as central places. Just as externality was a major force behind the development of locational advantage and the selectivity of growth in dynamic and expanding centres, an absence of external forces in stable towns acted strongly to restrict their growth experience.

(c) Externality

Stable towns were characterised by an almost total lack of external interest in schemes related to them: most developments were instigated within and by the communities. As a result these towns were frequently denied important sources of capital and external contacts that might have stimulated urban growth. Of the fourteen subscribers to the Hedon Haven Improvement scheme of 1773, 57% of that number, or eight, were resident, a higher percentage than on any of the navigational schemes instigated in other East Riding towns[40]. Likewise in the supply of capital town residents contributed a slightly higher percentage - 37.5% - than in other towns. More significant, however, is the low level of numerical support attracted to the venture, for the number of subscribers was considerably less than to similar ventures in other country towns (table 5.4)[41]. When support for the venture began to wane in the face of serious technical difficulties, numbers were insufficient to provide either the capital or the motivation to construct a lock which might have provided a permanent answer to the haven's problems[42]. Furthermore, as figure 5.2 demonstrates, most of the subscribers lived within a twelve-mile radius of the town, denying the navigation the importance of wider intra- and inter-regional links which might

have provided a stimulus to town trade. A similar situation prevailed at Patrington, for all the trustees of the haven were local men, either town residents or persons with landed interests in the immediate locality[43].

Within these stable towns there is also evidence to suggest that external interest and influences were lacking. Although almost one-fifth of Patrington landowners at enclosure were non-resident, most of these were small landowners and the average holding per owner was 19.8 acres, considerably less than in other local towns. Patrington's land was divided among a large body of landowners, and in numerical terms the balance of interest was tipped well towards the smaller proprietor (table 7.3). More than two-thirds of all landowners held less than three acres and four-fifths less than ten; but the percentage of parish land held by these groups comprised little more than five per cent of the total while the five largest owners possessed almost two-thirds of all land. Although parish land was dominated by manorial lords and the gentry, town land was diffusely owned. As figure 7.2 shows, Patrington was owned by a group of 68 landowners, and although a number of wealthier proprietors, such as Henry Etherington and Jeremiah Joy, held at least two plots of town land, few had consolidated their property, and ownership was highly fragmented. There is thus evidence to suggest that, as early as the mid-eighteenth century, large landowners were of relatively minor influence in town affairs.

Unfortunately little tithe apportionment data exists for Patrington, but evidence from Howden and Hedon would suggest that in stable towns lesser proprietors increased their share of urban property and land over the 'century' between 1750 and 1850. At the time of the tithe apportionment the average extent of holdings in Howden was just sixteen acres and in Hedon three[44]. Furthermore, these lesser proprietors held a significant

Fig.7.2 Property Ownership in Patrington, c.1768

Table 7.3 Landownership in Hedon, Howden and Patrington

Acres Held		Patrington 1768	Howden 1844	Hedon 1849
		%		
1000 +	Land	-	-	-
	Landowners	-	-	-
500 - 999	Land	49.8	-	-
	Landowners	1.3	-	-
100 - 499	Land	14.0	22.3	-
	Landowners	1.9	1.8	-
50 - 99	Land	20.0	30.0	27.5
	Landowners	6.4	6.3	1.1
10 - 49	Land	11.1	35.1	34.0
	Landowners	9.6	25.2	4.3
3 - 9	Land	3.1	9.6	22.6
	Landowners	13.4	25.2	11.9
Under 3	Land	2.0	3.0	15.8
	Landowners	67.4	31.4	82.6
Total No of Landowners		156	111	92
Average acreage per owner		19.8	16.2	3.0
No of Acres listed in Award		2,935	1,803	279
Listed Acreage as % of all Parish Land		92.0	64.0	100
Acreage of Parish		3,180	2,820	280

Source: B.I.H.R. CD 10 AL
H.C.R.O. PR 1067, DDCK 32/33, RDB AK 98/8

proportion of land in each town (table 7.3). While this pattern would be expected in the small borough town of Hedon with its limited areal extent, the data for Howden indicates the emerging importance of smaller landowners in the property owning structure of town and parish. While 53% of titheable land was held by just nine landowners, an almost equal amount was held by proprietors whose total holding was less than 50 acres. This contrasts sharply with the experince of the dynamic town of Great Driffield where large landowners retained and even increased their share of urban property ownership.

Further evidence of the reduction of landed interest in these stable towns is provided by the Land Tax returns. Over the period 1782 to 1832 the number of landowners in Howden increased from 144 to 152 and in Patrington from 55 to 79. In both these towns the percentage of lower tax paying groups expanded. Landowners taxed at less than 10/- increased from 61% to 69% of all taxpayers in Howden, and from 47% to 60% in Patrington. In Hedon, where the number of landowners remained unchanged at 82, this group comprised approximately 70% of taxpayers throughout this fifty year period[45]. In both Howden and Patrington there was a corresponding reduction in the importance of the higher tax-paying groups (Appendix VII (a)). Those taxed at over £5 in Howden, for example, fell from 6.3% to 3.9% of all landowners in the period 1782 to 1832, and those taxed at between 10/- and £1 from 16.8% to 9.9%.

This shift in the balance of landownership towards the lesser proprietor was arguably of some significance in the growth experience of stable towns. The basis of authority in most country towns rested on several factors; inherited position, wealth, education, professional and economic status, but perhaps most important of all, landownership. The structure of landownership exerted a powerful and direct influence on all

aspects of social, economic and political life, for an 'estate' or property qualification was often regarded as the passport to the right of community involvement. By the second quarter of the nineteenth century there is evidence to suggest that there had been a decline in the importance of larger landowners in stable towns. Consequently authority, and the burden of responsibility for town affairs, became delegated to lesser proprietors of lowlier means who came to own the majority of town land and who formed a more substantial part of urban society. This had repercussions within these towns for the changing landownership structure denied them access to potential sources of external capital and ensured that any developments would have to be instigated within and by the towns themselves.

Certainly, with one exception[46], no external interests became involved in developing the economic or social potential of these places. In Howden the capital sum of £2,000 required to light the town with gas was raised entirely among principal inhabitants in £10 shares, and nowhere is there any evidence to suggest other than purely local influences at work[47]. Here, therefore, is an important differentiating factor between levels of externality associated with the different town types. In dynamic centres externality was present on both a regional and local scale and in expanding centres on a regional scale: in stable centres external forces were virtually absent. This absence of externality, along with poorly developed nodality and locational disadvantages, had clear structural and spatial manifestations.

2. Demographic Structure

The demographic experience of stable towns stands in contrast to that of expanding and dynamic centres. Over the course of the period 1700 to 1850 these towns increased their population only between two and three fold. They experienced small but negative

changes in their rank position, and each saw a reduction in their share of regional urban population concentration.

The eighteenth century was a time of limited growth for all three towns. Hedon, for example, made a net gain of only 57 persons during this period while Howden added 221 (table 7.4). The principal reason for slow growth was the high rate of mortality that held population in check for the first three-quarters of the century. In the period 1720 - 1780 burial rates were constantly above thirty per thousand population, and in the 1720's and 1730's peaked at 62 per 1,000 in Hedon and 54 per 1,000 in Patrington (table 7.5 and figure 7.3); considerably higher rates than were experienced in the dynamic and expanding towns of the region. While in the same period, viz 1720 to 1780, baptismal rates also rose, it was not nearly as much as to offset heavy mortality occasioned by epidemic disease. Indeed the prevalence of epidemics must be seen as one of the principal causes of population decline in these towns. The remarks of medical practitioners in places adjacent to the Riding substantiate the view that disease was widespread and that the poor in particular were the chief sufferers[48]. A considerable excess of deaths over births characterised the period. When annual totals of baptisms and burials are calculated as nine year moving averages the trends become especially clear (figures 7.4, 7.5 and 7.6). The years between 1715 and 1735 were ones of heavy mortality for all three towns, with Howden also suffering sharply in the years 1740-43 and 1749-55.

The first eighteenth century epidemic to affect the East Riding was typhus which appeared in 1718 and continued into the warm summer of 1719, reaching its peak in July and August of that year. No sooner was this epidemic over than the towns were visited by smallpox, autumnal dysentry and diarrhoea, and between 1727 and 1735 general fevers and epidemics affected many

Table 7.4 Population Estimates for Howden, Hedon and Patrington, c1700-1851

Date	Parish Register Analysis						Census		
	Howden		Hedon		Patrington		Howden	Hedon	Patrington
1700	931		526		535				
1720	909		515		485				
1740	774	Herring	391	Herring	423	Herring			
		1,534		450		450			
1760	791	1,551	328	393	509	536			
1780	769	1,529	318	383	620	647			
1800	850	1,570	431	496	728	755			
1801	-		-		-		1,152	592	894
1811	-		-		-		1,812	780	1,016
1820	1,305	2,045	703	768	1,203	1,230	-	-	-
1821	-		-		-		2,080	902	1,244
1831	-		-		-		2,130	1,080	1,298
1840	1,883	2,623	956	1,021	1,705	1,732	-	-	-
1841	-		-		-		2,332	998	1,402
1851	1,990	2,630	981	1,046	2,048	2,075	2,491	1,027	1,827

Note: Figures underlined refer to continuing calculations made by parish register analysis using Archbishop Herring's Visitation Returns of 1743 as a starting total.

Table 7.5 Annual Average Baptism, Burial, Marriage and Natural Increase Rates in Howden, Hedon and Patrington, 1701-1850

Rates per 1,000 Population

	Baptism			Burial			Marriage			Natural Increase		
	How	Hed	Pat	How	Hed	Pat	How	Hed	Pat	How	Hed	Pat
1701-1720	25.8	40.5	28.6	27.0	41.7	33.8	7.6	11.8	8.2	-1.2	-1.7	-5.2
1721-1740	33.7	46.0	47.3	42.5	61.9	54.6	10.8	11.2	9.7	-8.8	-15.9	-7.3
1741-1760	33.6	37.6	45.6	32.6	47.2	37.1	15.5	10.0	7.8	1.0	-9.6	8.5
1761-1780	35.6	50.7	48.2	37.0	52.3	39.3	27.7	12.9	11.7	-1.4	-1.6	8.9
1781-1800	38.4	32.7	35.0	35.7	23.1	29.0	24.0	8.0	7.0	2.7	9.6	6.0
1801-1820	28.7	29.7	35.2	17.3	14.6	15.9	16.5	5.1	5.5	11.4	15.1	19.3
1821-1840	30.6	28.5	32.8	18.3	15.8	14.9	15.2	6.4	5.8	12.3	12.7	17.9
1841-1850	27.8	23.4	32.1	23.9	21.2	15.0	NA	5.5	5.2	3.9	2.2	17.1

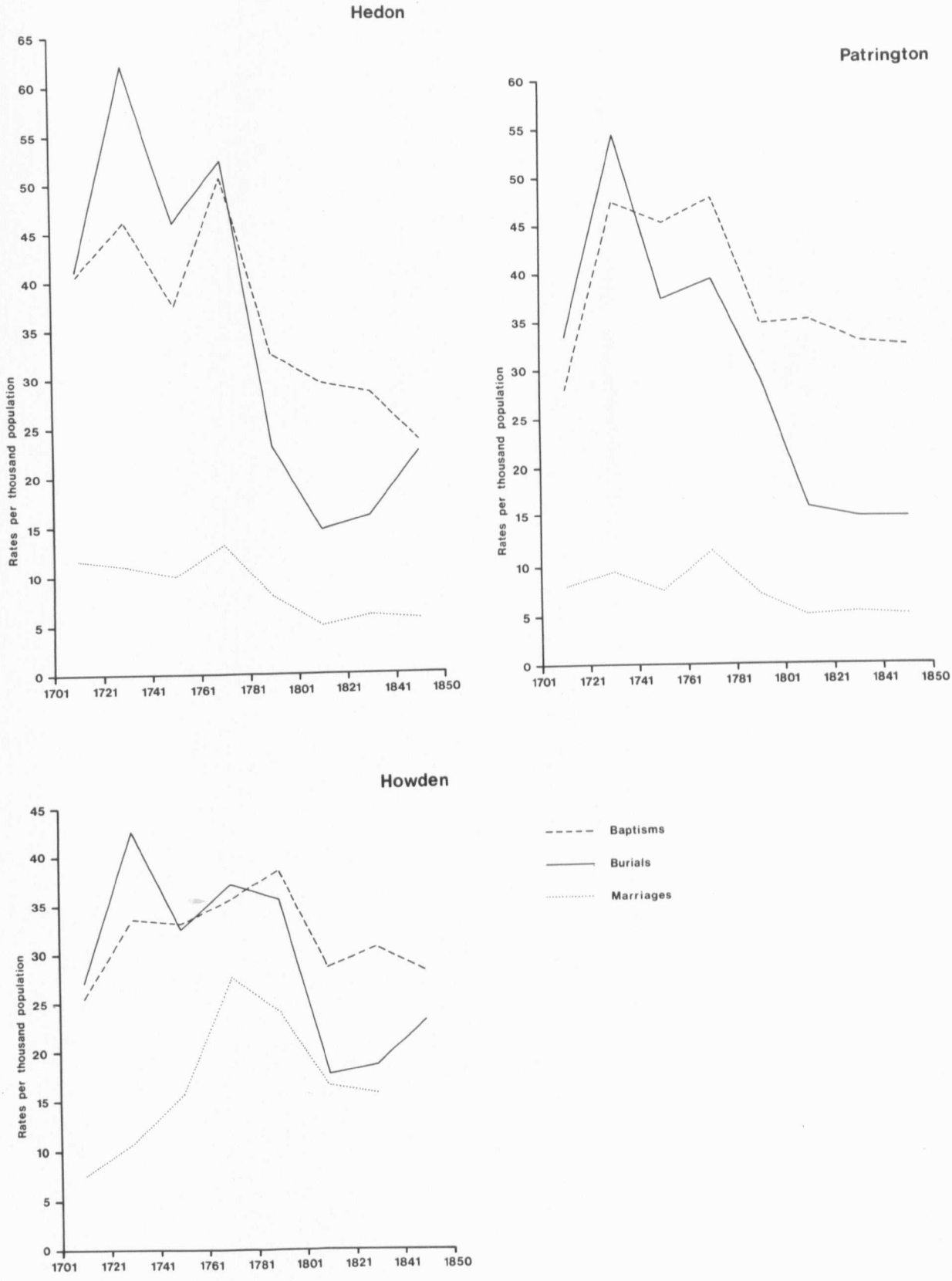


Fig.7.3 Average Annual Baptisms, Burial and Marriage Rates in Howden, Hedon and Patrington, 1701-1851

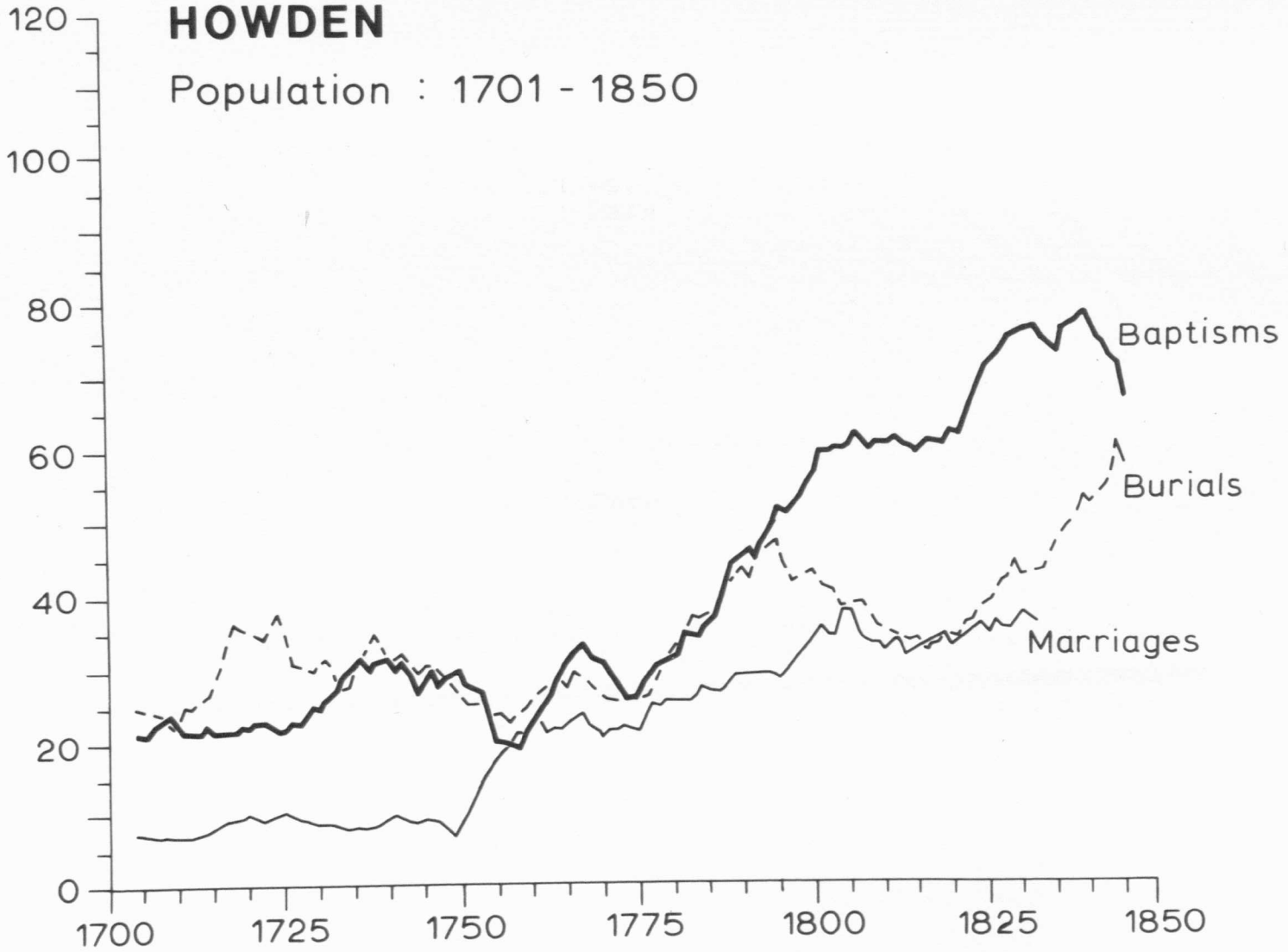


Fig.7.4 Population Change in Howden 1701-1851 : Nine Year Moving Average

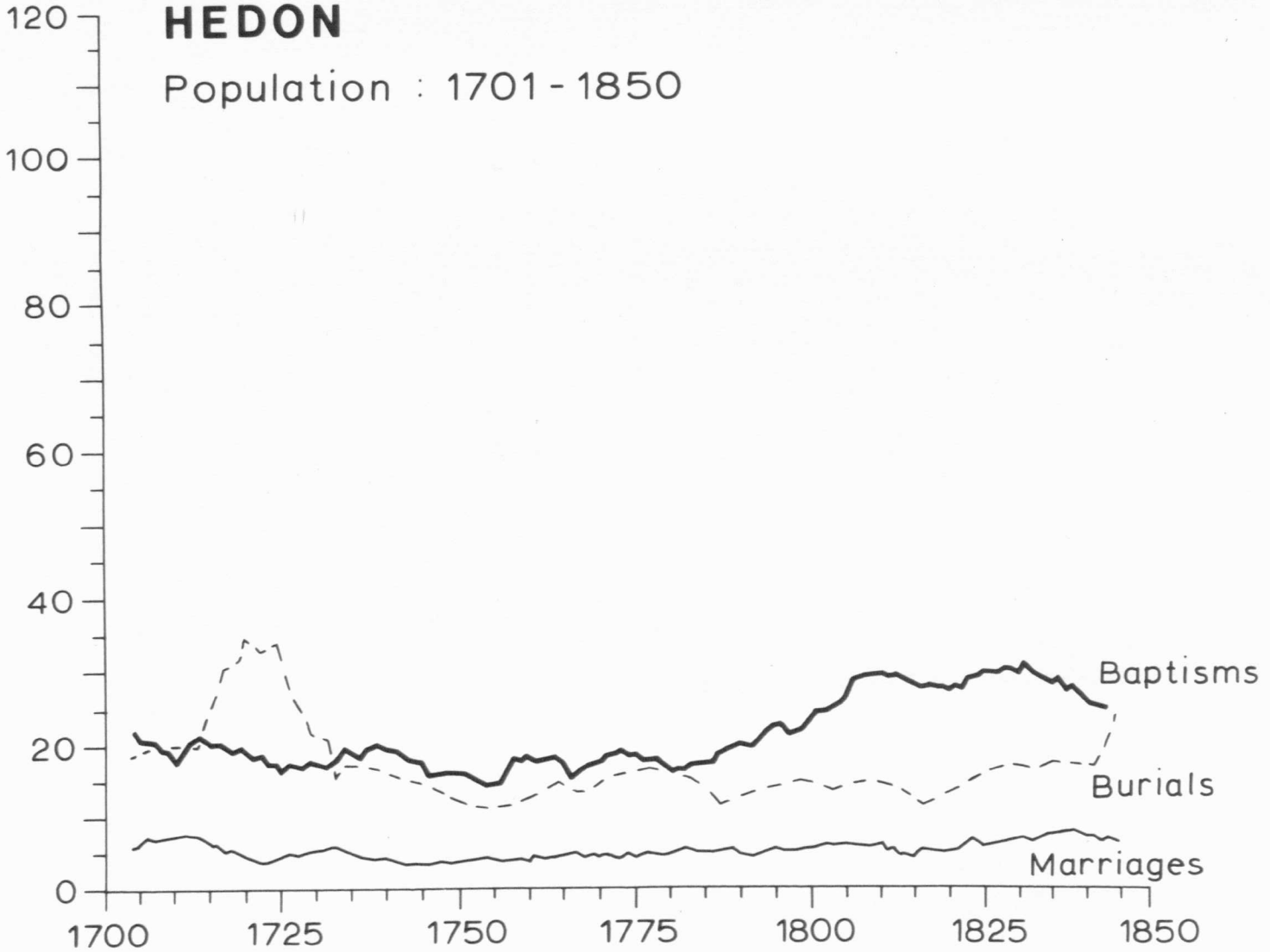


Fig.7.5 Population Change in Hedon 1701-1851 : Nine Year Moving Average

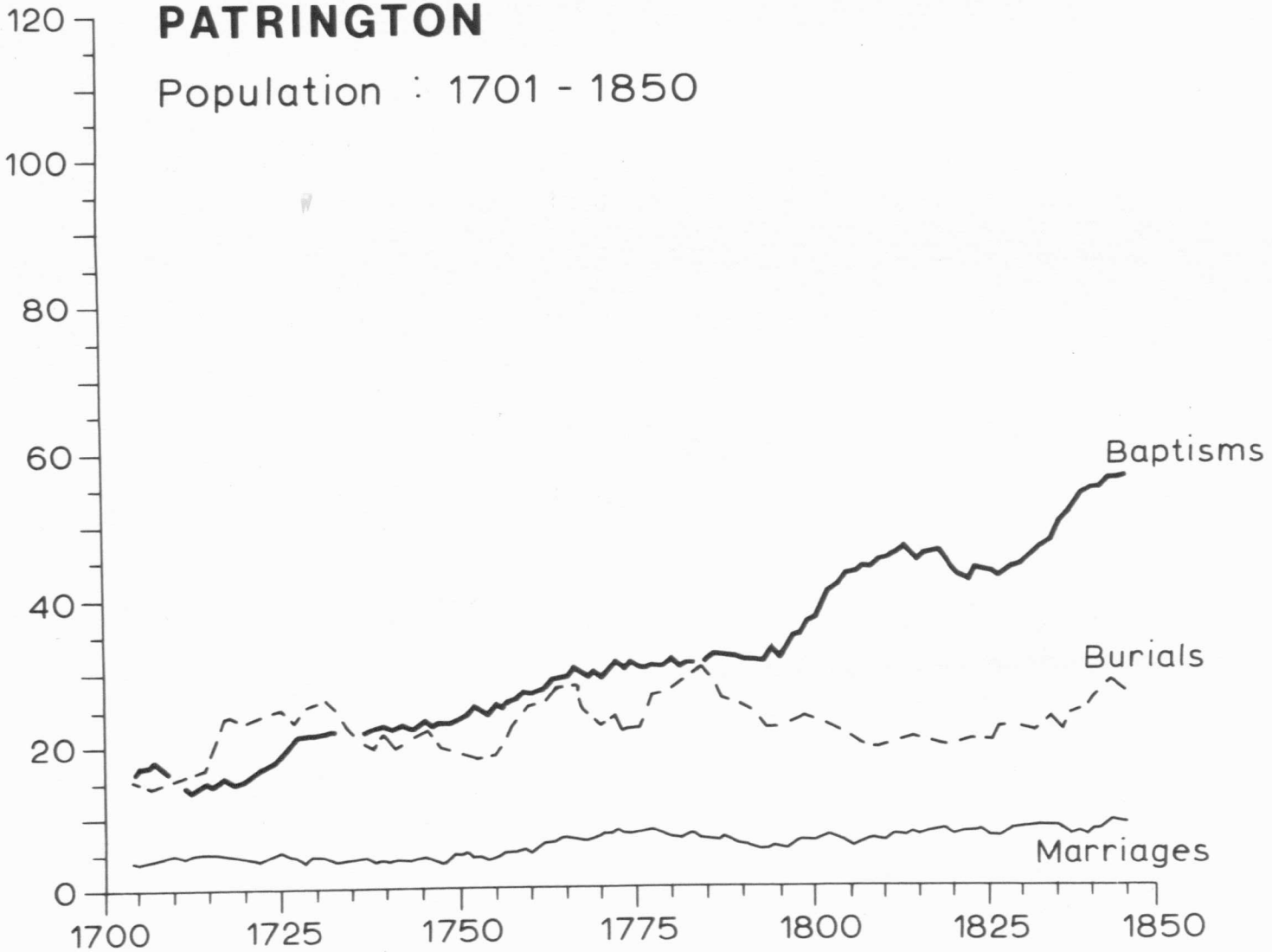


Fig.7.6 Population Change in Patrington 1701-1851 : Nine Year Moving Average

communities. Often coinciding with these epidemics were bad weather and harvest failures. Although in general the period between 1700 and 1750 was one of abundant harvests and low prices, three bad harvests in the years of dearth of 1718, 1728 and 1741 brought widespread distress and undoubtedly helped to occasion further losses of life[49].

Whereas demographic expansion became marked in dynamic and expanding towns from the middle of the eighteenth century, the demographic fortunes of most stable towns took an upward turn only after 1780. From the latter date negative rates of natural increase were replaced by positive ones, which from the turn of the century reached levels comparable to, and occasionally in excess of, those in expanding and dynamic towns. Indeed the town of Patrington experienced rates of natural increase considerably higher than those found in the region, more than trebling between 1780 and 1820. This is not to suggest, however, that these towns were completely free of mortality checks by the last quarter of the eighteenth century. Smallpox struck Hedon in 1783 and 1789, and Howden in 1792, 1800 and 1803, the latter place also being affected by outbreaks of measles and whooping cough in 1797 and 1810[50]; but generally birth rates were high enough to offset the effects of these sporadic epidemics. High rates of growth continued until the 1840's in Hedon and Howden and until 1850 in Patrington, the population of each town doubling in the period 1801 - 1851; but population growth might have been of far greater magnitude if outmigration had not come to play so significant a role in the demographic fortunes of these places.

While for most of the eighteenth century outmigration characterised the region of eastern Yorkshire[51], there is little evidence to suggest that this was other than a purely rural trend. Analysing urban growth over the eighteenth century as a whole, and in particular the severe population losses of the period up to

1760, natural increase was insufficient to account for all the recorded population increase, Towns grew in varying degrees by inmigration, but it is evident that stable centres were most affected by the mortality crises of the first half of the century and relied more heavily on inmigration to sustain their growth. As table 7.6 shows, Howden, Hedon and Patrington probably each added in excess of 150 persons to their population by inmigration in the eighteenth century.

The high occupational commitment to agriculture among East Riding inhabitants led to a considerable amount of migration. Seasonal migration of labour, annual hirings of farm servants and migrant craftsmen all contributed to a remarkably mobile population. Many permanent migrants came from the North and West Ridings and in particular from the neighbourhoods of Knaresborough, Richmond and the northern Dales, generally in order to pursue some form of non-agricultural employment. It appears that this migration was possibly due to a decline in flax working and hand knitting in these districts[52]. Migrational movement was further stimulated by agricultural improvement together with other improvements such as the cutting of canals, new drainage schemes, and the provision of new employment opportunities, such as the sacking factory at Howden. These and other developments enabled the region to both retain its own increment and attract migrants. The returns of the Registrar General suggest that the East Riding, which in 1801 had a slightly higher degree of demographic urbanisation than the West Riding, at times relied more heavily on inmigration than its industrial neighbour[53].

Inmigration and the acceleration in the population growth of stable towns continued into the first decades of the nineteenth century. Howden's population increased by more than 57% between 1801 and 1811 and that of Hedon by 32%, while in the following decade Patrington's rose by over 22%. From the 1820's, however,

Table 7.6 Migration to Howden, Hedon and Patrington, 1700-1851

(a) Howden

	Population	Difference	Baptisms - Burials	Inferred Migration	% of Natural Increase Lost
1700	931				
1801	1,152	221	- 101	+ 322	-
1811	1,812	660	214	+ 446	-
1821	2,080	268	261	+ 7	-
1831	2,130	50	314	- 264	84.0
1841	2,332	202	264	- 62	23.5
1851	2,491	129	107	+ 22	-

(b) Hedon

1700	526				
1801	592	66	- 95	+ 161	-
1811	780	188	118	+ 70	-
1821	902	122	154	- 32	20.7
1831	1,080	178	142	36	-
1841	998	- 82	111	- 192	173.0
1851	1,027	29	25	+ 4	-

(c) Patrington

1700	535				
1801	894	359	193	+ 166	-
1811	1,016	122	222	- 100	45.0
1821	1,244	228	253	- 25	9.8
1831	1,298	54	245	- 191	78.0
1841	1,402	104	257	- 153	59.5
1851	1,827	425	343	+ 82	-

growth rates considerably slackened as inmigration began to give way to a reverse trend. Over the first half of the nineteenth century Hedon and Howden each lost one-fifth of their natural increase through the forces of outmigration and Patrington almost one-third. In certain decades, as table 7.6 shows, losses were of a far greater magnitude. Patrington and Howden lost 78% and 84% of their natural increase respectively in the 1820's, and Hedon 173% in the following decade. It was only after 1840 that these stable towns once more became focal points for inmigration. While agricultural depression and a shift in urban economic growth encouraged movement from these towns to their larger counterparts in the period 1810 to 1840, from the latter date widening trade networks and the introduction of new rurally based industries necessitated the presence of a larger workforce in these communities. A flax factory at Patrington, a tannery at Howden and the mechanisation of milling industries all offered new employment[54], resulting in some resurgence of the demographic fortunes of these towns.

The forces of migration must, therefore, be seen as a major factor operating to restrict the growth of stable towns in the first half of the nineteenth century. Their inability to maintain a position as focal inmigratory points is surely attributable to their locational disadvantages and ill developed nodality which acted strongly as deterrents to growth in the period after 1750. Inmigration, to a large extent, depended on the favourable presence of these factors, but, as the data relating to marriage distances shows, stable towns proved unable to extend their early eighteenth century sphere of influence.

In the first half of the eighteenth century approximately one-quarter of all marriage partners were extraparochial, a higher level than in many other towns of the region (table 7.7). Most partners, however, came from the immediate locality. The mobility

Table 7.7 Marriage Distances of Howden, Hedon and Patrington, 1701-1840

	1701-1760						1761-1790						1791-1840					
	Howden		Hedon		Pat		Howden		Hedon		Pat		Howden		Hedon		Pat	
	No	%	No	%	No	%	No	%	No	%	No	%	No	%	No	%	No	%
No of Marriages	555		154		162		220		127		214		866		271		359	
No and % of Extraparochial Marriages (EM)	157	28.0	38	24.6	36	22.2	51	23.2	28	22.0	47	22.0	198	22.8	80	29.5	79	22.0
No and % of EM Partners from West Riding	33	21.0	1	2.6	2	5.5	16	31.4	1	3.5	2	4.3	58	29.3	3	3.7	2	2.5
No and % of EM Partners from North Riding	4	2.5	-	-	-	-	-	-	-	-	-	-	2	1.0	3	3.7	1	1.3
No and % of EM Partners from Lincolnshire	2	1.3	-	-	1	2.7	3	5.9	-	-	1	2.1	8	4.0	5	6.2	1	1.3
No and % of EM Partners from other British Counties	3	1.9	1	2.6	-	-	1	1.9	-	-	-	-	5	2.5	4	5.0	-	-
No and % of EM Partners from other East Riding Towns	5	3.2	8	21.0	6	16.6	5	9.8	7	25.0	4	8.5	10	5.0	11	13.7	5	6.3
No of places with which contact was made	61		21		18		27		12		23		58		38		30	

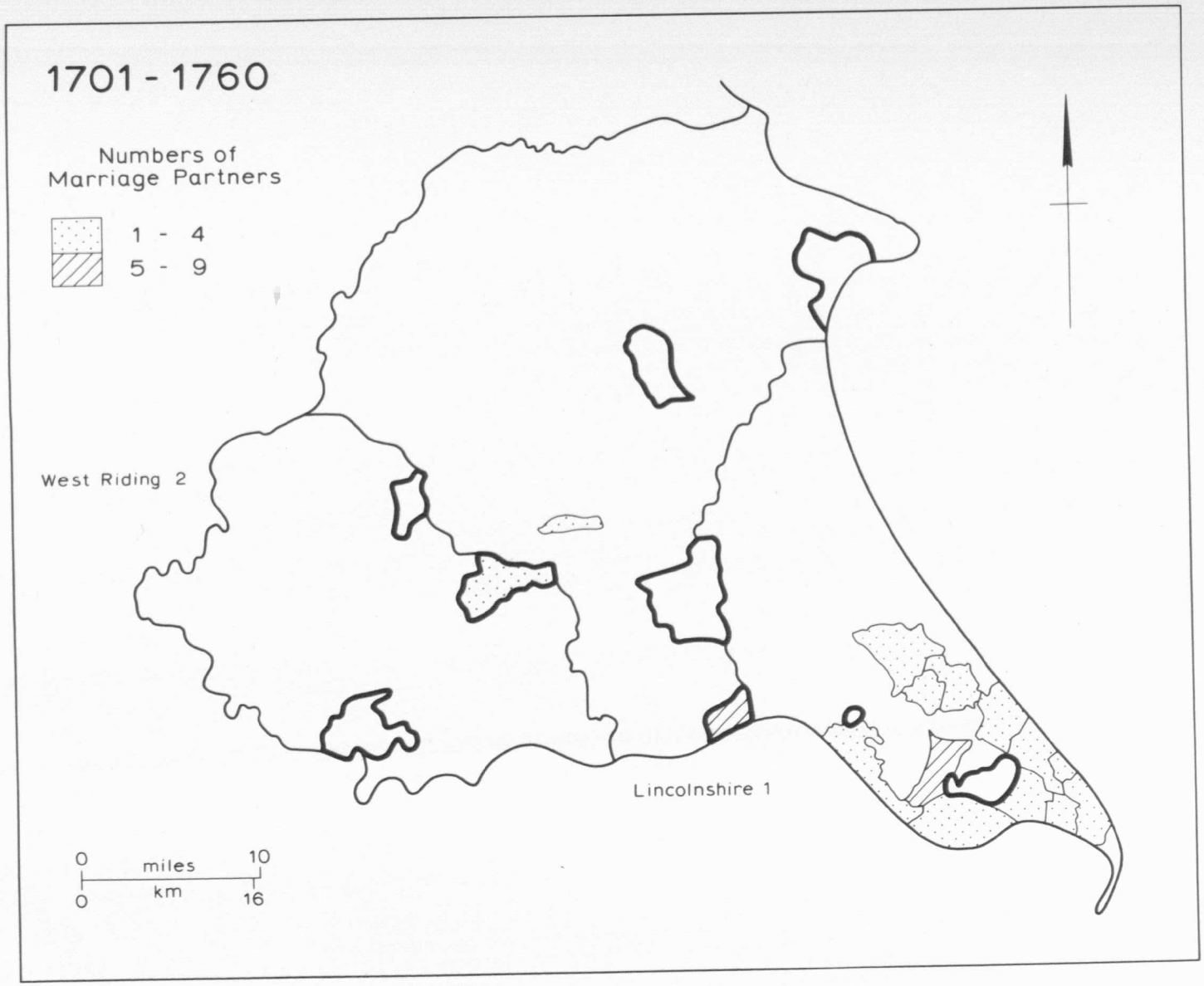


Fig.7.7 Marriage Distances of Patrington, 1701-1761

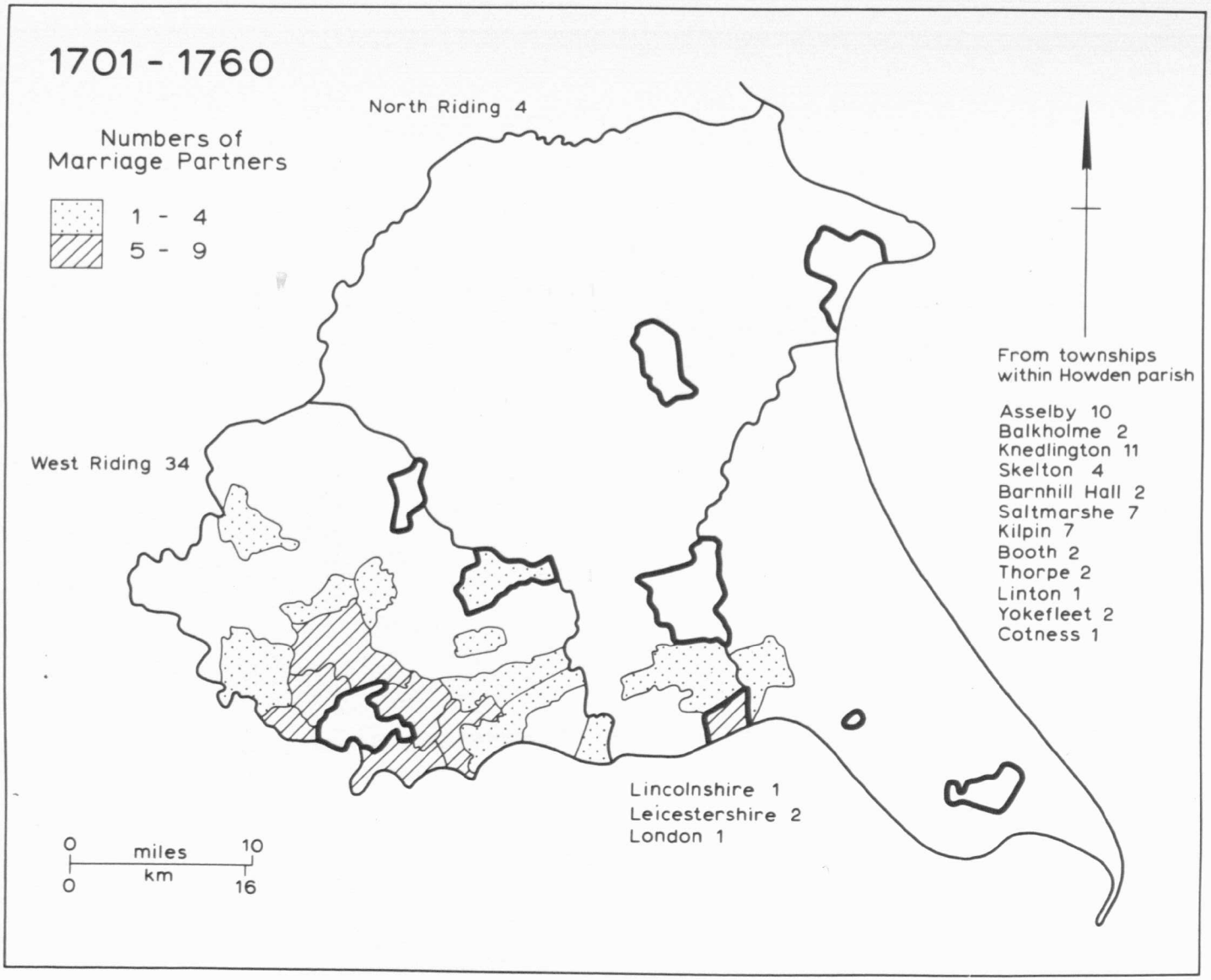


Fig.7.8 Marriage Distances of Howden, 1701-1760

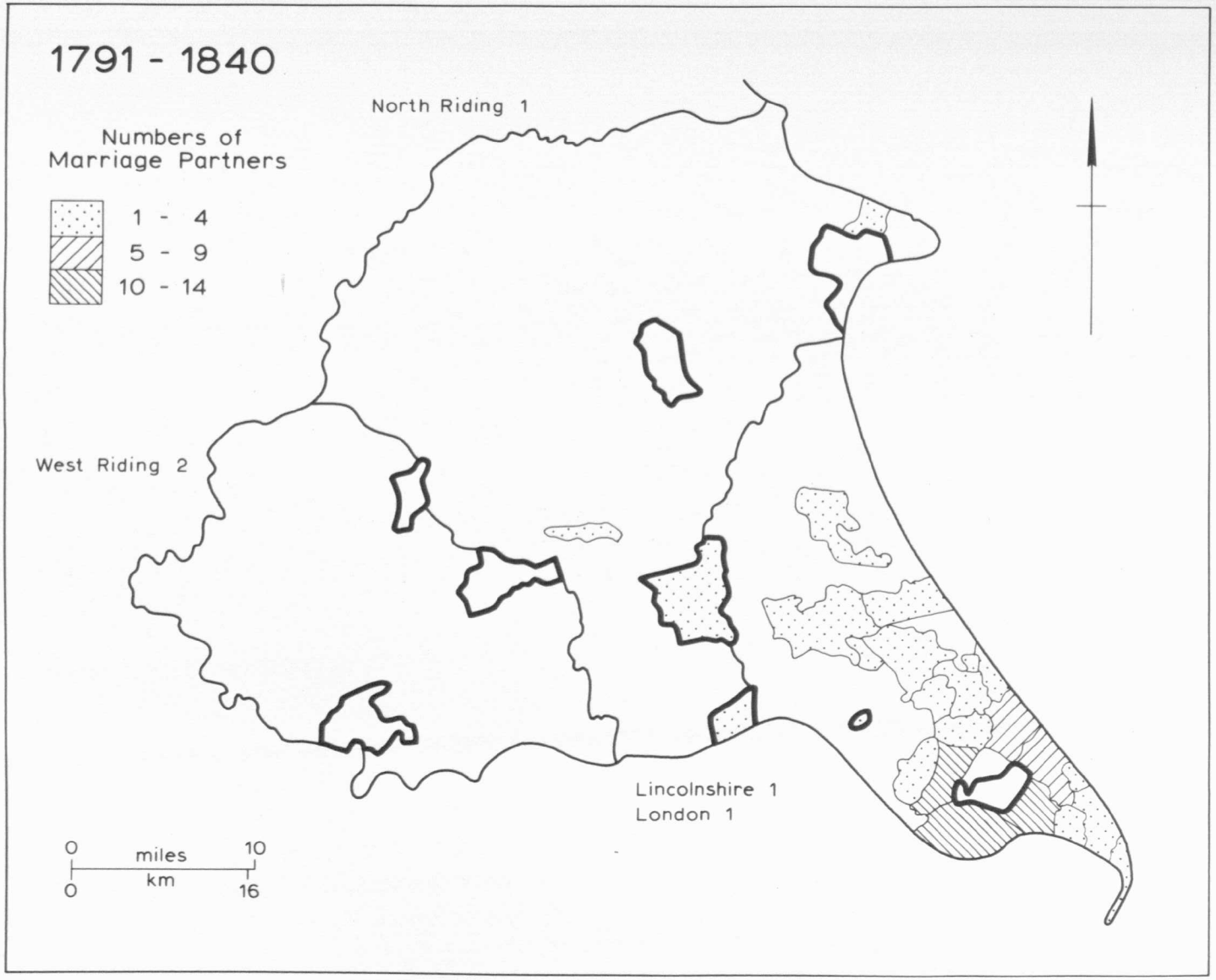


Fig.7.9 Marriage Distances of Patrington, 1791-1840

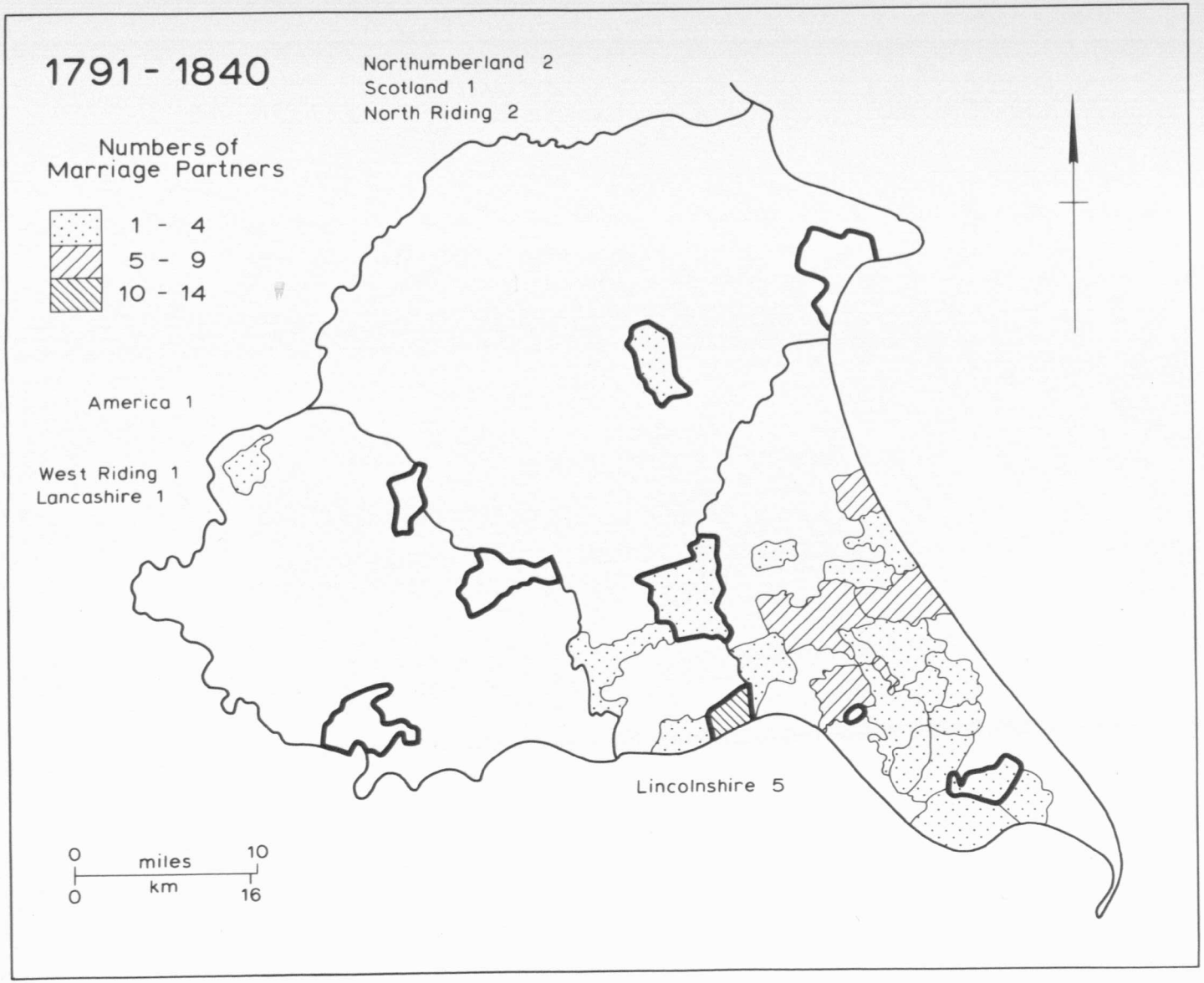


Fig.7.10 Marriage Distances of Hedon, 1791-1840

of most Patrington residents, for example, appears to have been limited primarily to South Holderness and the town had little contact with other parts of the East Riding (figure 7.7). A similar situation, determined largely by reasonable travelling distances on foot, is observable in Howden. As figure 7.8 demonstrates, the largest proportion of extraparochial partners here were drawn from outlying townships within Howden parish and from neighbouring places. The geographical situation of the town clearly influenced Howden's contact with neighbouring regions, for over one in every five extraparochial partners was found in the nearmost parts of the West Riding (table 7.7). The ensuing eighty years saw no widespread divergence from these early eighteenth century patterns. While the number of places with which contact was made showed some increase in Hedon and Patrington, it declined slightly in Howden and indeed remained below the levels associated with dynamic and expanding centres.

By the first quarter of the nineteenth century the spatial range over which partners were drawn had been subject to very little extension. Howden retained its links with the West Riding, with 30% of all extraparochial partners being found in that area, but within East Yorkshire its range of contact was confined largely to Howdenshire. The mobility of Patrington residents still remained restricted to Holderness and, as figure 7.9 demonstrates, only a handful of partners were found elsewhere in the East Riding and only five outside the administrative county. Hedon's influence too was confined principally to Holderness, although the town had - perhaps through shipping conducted via the haven and its proximity to Hull - established contact with a greater number of places outside the East Riding (figure 7.10).

The restriction of the nodal influence of these settlements to primarily local areas is reflective of their lack of interaction and integration within the region and hence their

stability within the urban system. Carter suggests that

> "When the system of settlements is integrated, then emphasis is directed outwards towards the region. This redirection of emphasis is brought about by the interaction between places, lubricated or made possible by the particular transportation media..... It is not suggested that outward extension of the town is directly related to the outward direction of interest but that redirection of interest certainly brings new forces to bear on the settlement"[55].

Clearly these stable towns were not integrated fully within the region due to locational and nodal disadvantage; this might therefore be seen as an explanation of the high levels of outmigration from the towns and hence restrictions placed on their population growth. Likewise, in economic terms, interest was focused primarily upon the local area giving stable towns a less developed economy and low level economic experience.

3. Economic Structure

Economically the stable towns of eastern Yorkshire fall into two distinct types. On the one hand were towns with a historic legacy, often attributable to their borough status, and on the other organic market towns[56]. The East Riding towns of Hedon and Howden fall into the former category and the town of Patrington into the latter. Hedon was a planted town of the Middle Ages created by the excision of 300 acres from the Count of Aumale's manor of Preston in Holderness, while Howden was the focus of the Bishop of Durham's extensive liberty of Howdenshire[57]. Both towns possessed economies in which legal and administrative functions existed side by side with commerce, and in which agricultural employment played a relatively minor role. Conversely, Patrington was an organic market town whose economy was very closely tied to the land, and a settlement in which agricultural employment dominated. Yet despite these differences, each of these stable centres failed to develop their economy to the same extent as either dynamic or expanding centres in the course of the

eighteenth and nineteenth centuries and in this respect had a common growth experience.

As in the faster growing towns of the region, the percentage of the active population employed directly in agriculture was also subject to some decline during the eighteenth and first half of the nineteenth century. It fell from over one-quarter to one-sixth of all parish register entries in Patrington in the period 1710-1840, but in 1851 still comprised 24% of the town workforce (table 7.8). Here there was also rather less diversification in agricultural activity and even by the mid-nineteenth century ancillary agricultural activities such as nursery and seedsmen and market gardeners constituted a very small percentage of all agricultural workers. By contrast in both Hedon and Howden, where agricultural employment averaged between 5% and 10%, these occupations were of greater significance. In the period 1801-20, 66% of all agricultural workers recorded in the parish registers of Howden were engaged in ancillary agricultural occupations and 47% in Hedon[58]. The continuing high level of agricultural activity in Patrington was of significance for it acted as a barrier to the full economic development of the town. In towns where strong agricultural ties were retained well into the nineteenth century, the capital and enterprise required if the economy was to be industrialised in any measure was seldom forthcoming and available finance was channelled largely into agriculture.

The low level of agricultural commitment in both Hedon and Howden might suggest that here there existed the opportunity to acquire more specialised functions particularly in the tertiary economic sector. Although, by regional standards, retail and professional services were well developed in both towns in the early eighteenth century, the following 100 years witnessed a stagnation of position with neither town acquiring many additional

Table 7.8 Occupational Structure of Howden, Hedon and Patrington

(a) Parish Register Analysis

	1710-1740			1741-1770			1771-1800			1801-1820			1821-1840		
	How	Hed	Pat	How	Hed	Pat	How	Hed	Pat	How	Hed	Pat	How	Hed	Pat
Agriculture	NA	4.6	28.2	9.6	3.4	23.4	10.2	7.1	17.7	12.1	8.5	14.9	3.8	5.9	14.9
Building	NA	11.0	14.8	6.4	14.3	10.1	10.3	18.8	6.3	9.5	13.5	15.3	9.8	15.8	10.2
Retail Service	NA	15.3	11.5	24.2	23.8	19.4	18.8	20.0	10.8	18.0	12.6	9.6	18.3	17.6	15.6
All Manufacturing	NA	46.4	27.8	20.8	33.0	30.5	37.2	34.6	41.9	47.4	41.8	44.4	50.3	31.8	44.8
(a) Textiles	NA	2.4	2.8	1.6	4.8	3.1	2.2	4.6	4.3	6.0	2.8	2.4	3.4	-	-
(b) Clothing	NA	4.5	7.6	4.8	3.3	9.1	7.8	5.1	8.2	9.0	4.4	7.0	10.4	4.9	3.5
(c) Leatherworking	NA	33.1	9.1	9.6	12.4	8.2	12.1	13.9	15.3	16.7	22.0	15.1	20.1	16.6	17.8
(d) Ropemaking	NA	-	-	-	-	0.3	0.8	0.3	-	1.4	1.4	0.6	0.9	-	
(e) Milling/Brewing	NA	0.5	2.3	-	5.4	2.5	2.6	1.9	3.3	4.1	5.9	6.7	2.2	3.5	6.7
(f) Woodworking	NA	2.7	1.9	4.8	0.4	4.0	4.0	0.5	3.6	3.8	0.5	4.5	1.6	0.2	6.7
(g) Metalworking	NA	2.5	2.8	-	5.4	4.8	6.0	7.7	5.1	3.1	3.4	5.9	3.6	3.5	5.4
(h) Other	NA	0.7	1.3	-	1.3	0.5	1.7	0.6	2.1	3.3	1.4	2.8	5.4	2.2	-
Professions	NA	18.8	7.2	16.1	14.9	5.2	12.2	12.6	5.5	12.3	14.0	3.6	10.2	12.4	4.7
Maritime/Transport	NA	1.0	5.8	6.4	3.4	3.9	6.1	2.3	12.9	5.9	2.0	8.1	1.4	7.9	3.8
Miscellaneous	NA	2.9	4.7	16.1	4.4	1.3	3.8	2.0	2.3	5.3	2.8	4.1	4.4	3.9	5.4
Labouring as % of all Occupations	NA	19.4	31.6	16.2	22.7	31.8	32.3	26.2	31.1	32.3	27.7	40.1	35.4	22.2	44.2

Source: H.C.R.O. PR: B.I.H.R. PRT.

Table 7.8 Occupational Structure of Howden, Hedon and Patrington

(b) Directories.

%

	1791			1823			1851		
	How	Hed	Pat	How	Hed	Pat	How	Hed	Pat
Agriculture	7.4	NA	2.1	3.2	5.8	16.5	5.3	4.6	10.9
Building	6.8	NA	8.7	3.2	12.5	8.2	4.3	7.7	6.7
Retail/Service	29.2	NA	30.4	28.6	25.8	18.3	28.1	26.9	23.7
All Manufacturing	34.0	NA	34.4	44.3	25.0	30.1	30.9	27.5	32.0
(a) Textiles	-	NA	2.1	1.8	-	-	0.7	-	1.2
(b) Clothing	14.3	NA	4.3	12.2	6.6	8.2	9.8	6.9	10.9
(c) Leatherworking	3.4	NA	10.8	8.9	11.6	11.9	8.3	7.7	9.7
(d) Ropemaking	-	NA	-	0.9	-	-	0.5	0.7	-
(e) Milling/Brewing	2.7	NA	2.1	5.1	1.6	3.6	2.0	3.0	2.4
(f) Woodworking	7.4	NA	6.5	5.6	0.8	2.7	3.3	2.3	2.4
(g) Metalworking	3.4	NA	6.5	7.5	3.3	2.7	3.5	4.6	3.6
(h) Other	2.7	NA	2.1	2.3	1.6	0.9	2.8	2.3	1.8
Professions	17.0	-	13.0	18.3	25.0	14.6	25.8	28.4	19.5
Maritime/Transport	-	-	-	-	-	-	1.0	2.3	1.2
Miscellaneous	-	-	-	0.5	1.7	4.8	4.6	2.6	6.0

Source: U.B.D. 1791. B.Y. 1823. F.W.E.R. 1851.

Table 7.8 Occupational Structure of Howden, Hedon and Patrington

(c) Census, 1851.

%

Occupational Group	Heads of Households			All Employed Persons		
	How	Hed*	Pat[x]	How	Hed*	Pat[x]
Agriculture	19.0	13.1	32.9	15.2	11.4	24.7
Building	5.7	7.9	8.3	6.4	6.7	10.4
Retail/Service	14.5	10.9	10.6	9.5	7.0	4.8
All Manufacturing	28.8	20.2	16.6	27.7	20.7	25.9
(a) Textiles	1.1	-	1.8	0.9	-	9.0
(b) Clothing	7.0	3.9	3.3	9.0	8.1	8.0
(c) Leatherworking	12.0	7.5	4.7	11.4	6.1	3.9
(d) Ropemaking	0.2	0.8	-	0.2	0.9	-
(e) Milling/Brewing	2.8	2.6	2.1	1.6	1.8	2.0
(f) Wood working	2.3	1.3	1.8	1.6	0.9	1.2
(g) Metal working	1.9	2.6	2.1	1.7	2.0	1.5
(h) Other	1.3	1.3	0.9	11.4	0.9	0.3
Professions	11.2	16.6	6.5	9.5	16.9	6.3
Maritime/Transport	2.4	7.0	9.8	21.0	4.4	6.0
Domestic Service	2.7	2.2	0.3	10.1	19.4	12.2
Miscellaneous	8.4	9.2	4.7	7.6	10.3	6.0
General Labouring	2.1	3.5	1.8	2.0	3.8	3.5
Unspecified	4.9	9.2	8.3	-	-	-

* Includes figures for Havenside.

x Includes figures for Enholmes Farm and Havenside.

functions that would have enhanced their regional centrality. The analysis of the economic dimension to change in chapter three demonstrated that the regional position of stable towns remained essentially unchanged but, as Rowley also found in his study of the middle-order towns of Wales, this is not to say that they did not occupy a significant position in the central place hierarchy nor that they failed to enjoy some functional expansion at this time[59]. Howden averaged a rank position of seven in respect of tertiary activity and Hedon fifteen; but each saw a reduction in their contribution to regional centrality largely because they failed to build upon an early position of strength.

Shopkeepers, spirit merchants, grocers, attorneys, physicians and surgeons, and bank agents were already characteristic of both towns in the first half of the eighteenth century; by the turn of the same century brandy, corn and seed merchants, tea dealers, stationers and booksellers, and solicitors had been added to their number[60]. From the latter date, however, few new functions were acquired by either town over and above the rate needed to maintain their relative standing. Indeed Howden became of demonstrably less importance as a professional service centre within the region and the retail trade at Hedon also suffered some demise. At a time when more favourably located towns were fast developing their service sector, it was necessary that both Hedon and Howden offer services superior to those of most other centres. Their failure to do this resulted in no positive alteration in their regional position.

Patrington, on the other hand, whose service provision was ill developed in the eighteenth century[61], witnessed a more marked development of this sector from the turn of the century. While the number of basic fixed retail outlets such as grocers and drapers increased, it was the wholesale trade that showed the greatest change with a variety of specialised merchants appearing

for the first time[62]. As the retail trade of Hedon declined in the face of growing competition from Hull, there is evidence to suggest that by the second quarter of the nineteenth century Patrington was appropriating Hedon's role as the principal service centre for South Holderness. As table 7.8 shows, the percentage of Patrington's workforce engaged in retail trades and professional activities rose, and at the same time resident gentry and professional persons, which declined in number in Hedon, showed a corresponding increase in Patrington[63]. Nevertheless, Patrington's role as a service centre remained essentially local, for specialised services such as fire and life insurance offices, land agents, confectioners and chemists were never acquired by the town[64].

Manufacturing in each of these three stable towns was also subject to relatively little development in the course of the eighteenth and nineteenth centuries; it accounted for approximately one-third of economic activity in Hedon and Patrington, and up to one-half in Howden (table 7.8). The organisation of manufacturing and craft industry remained on a fairly restricted scale with relatively few tradesmen or craftsmen employing labour; just six in Patrington and five in Hedon (table 5.12)[65]. The exception to this general trend is found in Howden where thirty manufacturing craftsmen employed labour, sixteen of them in the leather trade. As table 7.8 demonstrates, the leather industry came to dominate manufacturing in Howden rising from 9.6% to 20.1% of all economic activity in the period 1741 - 1840. Although the leather industry was of importance in other East Yorkshire country towns - for example, Hedon, Beverley and Pocklington - it accounted for a higher proportion of all employment in Howden and was organised on a scale far larger than in any of its regional counterparts, save Beverley[66].

By 1851 a full range of leatherworking crafts were found in

Howden: viz, cordwainers, tanners, curriers, fellmongers and furriers and the industry was clearly of importance to town economy. Two extensive tanyards sited on the western edge of the town in Pinfold Street and Marsh End provided the focus of the town's leather industry, with 40% of all leather workers residing in that area. The largest enterprise was run by a tanner and currier who employed twenty-six men, while another currier and shoemaker employed twelve men. These larger units were supported by several producer/retailers: shoemakers, saddlers and glovers, often employing less than six men[67]. Leather-working apart, no other industry was of particular importance in Howden and certainly there were no attempts to industrialise this economic sector. In certain respects the over-reliance of Howden on the leather trade must be regarded as detrimental to the economic expansion of the town for it restricted diversity in manufacturing, diversity that was important if that town was to emerge as a burgeoning central place within the region. This was true also of the 'stable' textile towns in the northwest of the region.

Surprisingly, one of the only really large-scale industrial units to be built in any of the country towns was a flax factory established at Patrington in 1846; surprising in the fact that there had been little tradition of flax cultivation or flax dressing in the town or neighbourhood[68] and in view of the generally low-key nature of town economy. In 1846 the Marshalls of Leeds purchased Enholmes Farm on the outskirts of the town and established a flax factory. James Marshall and his brother Arthur developed the works before 1851, erecting new buildings, making roads, introducing steam engines and building workers' cottages[69]. In 1856 James purchased the farm from his brother William hoping to process 1,250 tons of undressed Baltic flax a year by chemical means. Flax prices, however, fell sharply and James and Arthur

jointly agreed to dispose of their enterprise at Patrington[70]. Why a flax factory was built in the town remains something of an enigma, although the town was conveniently situated for the import of Baltic flax through Hull and possibly through the town's own haven. The factory had a considerable effect on town and neighbourhood and in Caird's view "converted the quiet of a retired rural centre into a scene of bustling industry"[71]. The works for the retting and scutching of flax were extensive. By 1851 Arthur Marshall was processing an annual crop of 300 acres and 9% of the total workforce of the parish of Patrington, or upwards of 100 people, were employed at the factory with another 46 labourers being engaged at Enholmes Farm in flax cultivation. It was attested that the factory and extensive improvements made at Enholmes Farm helped to push the rate of farm wages in the parish to 12%-15% above those in the surrounding district[72]. The factory, however, came too late, was too short lived and was too isolated to significantly alter the economic fortunes of the town.

This factory apart, manufacturing trades and crafts in Patrington and in Hedon altered little over the course of the study period. Although more specialised crafts were added to the clothing and wood and metal working trades, for example, in the shape of bonnet makers, cabinet makers, and gunsmiths, diversification was essentially limited. Likewise in other economic sectors such as building trades and crafts, the more specialised services of architects, painters and masons were either absent or present on a very limited scale[73]. Howden, with its larger population and more significant professional element, was perhaps rather more developed in this respect; but, in contrast to the numbers engaged in specialised manufacturing crafts in dynamic and expanding centres, it is evident that these crafts were of local importance only. The limited expansion of stable centres in demographic and economic terms became reflected

in the social and spatial structure of these communities.

4. Social Structure

Over the course of the eighteenth and first half of the nineteenth century, social transition was not especially marked in any of these three stable towns. The Hearth Tax returns of the last quarter of the seventeenth century suggest that corporate or borough towns were of higher social status than many of their organic counterparts, having already developed extremes of social structure. In Hedon and Howden, for example, 35% of taxable households contained between three and five hearths and 5% more than six hearths. A significant professional element and social elite were already well established with nine titled inhabitants residing in Hedon and eleven in Howden[74]. By contrast, only 18% of taxable households in Patrington had between three and five hearths and just 2% over six. Certainly at the start of the eighteenth century Hedon and Howden were very much 'urban' places, while Patrington had little in terms of social structure to distinguish that settlement from many larger villages. In the ensuing century and a half each of these stable centres experienced little significant alteration to their 'pre-industrial' social structure. The number of gentry in two of their number increased - from nine to twenty-six between 1791 and 1850 in Howden, and from one to thirteen in Patrington - while in Hedon they declined from eighteen to twelve in the period 1823 to 1850[75]. Considering the number of titled inhabitants already resident in Hedon and Howden as early as 1675, it is evident that growth of a social elite was much less marked than in dynamic and expanding centres. The increase in Patrington was thirteen fold, but even so this number was insufficient to elevate the social standing of the town. The result of the greater stability in the social structure of these places was that social provision and urban

Table 7.9 Social Structure of Howden, Hedon and Patrington, 1851

Class	Howden (% Household Heads)	Hedon (% Household Heads)	Patrington (% Household Heads)
I	4.0	6.6	2.8
II	21.2	14.5	14.3
III	38.7	40.3	29.6
IV	21.5	23.7	41.1
V	9.3	8.7	5.9
Unclassified	5.1	6.1	6.2

Source: Census Enumerators' Returns, 1851.

improvements in Howden and Hedon never became fully developed, while in Patrington they were never really established on a noteworthy scale.

At the close of the eighteenth century Hedon and Howden were among the most socially important country towns. Ranking the nineteen country towns for which data is available in respect of social and cultural provision, they achieved ranks of five and six respectively, but sixty years later these ranks had fallen to eight and ten (appendix IV)[76]. Assembly rooms, theatres and societies seldom appeared in any of the stable towns of the region for none of these places had nodal importance outside the local area. Clearly within a predominantly rural area there was room for only a handful of settlements to be of more than purely local social importance. Their most important social functions became relegated to local educational provision - Howden had six schools in 1840, Hedon four and Patrington three -[75] and it was their numerous inns and alehouses that provided the focus of most social activity. Howden, whose population was 1,500 persons less than the dynamic town of Great Driffield could boast six more inns than that town in 1851, and even the very small town of Hedon had ten such institutions[77]. Certainly no contemporary accounts mention the social importance of these places, and it must be adduced that few residents spent their leisure time in any organised institution or form of entertainment before the middle of the nineteenth century. It was only from the latter date that social provision on a basis comparable to that found in the larger centres of the region appeared[78].

The lack of social provision is perhaps surprising in the light of their social structure. In 1851 more than one-quarter of Howden households were of social classes I and II and one-fifth of Hedon's; in the more agriculturally dominated Patrington this figure was only one-sixth (table 7.9). Both Howden and Hedon had,

at just over 30%, lower percentages of households in groups IV and V than the dynamic and expanding towns of which study has been made. In Patrington, on the other hand, with its large number of agricultural labourers, almost one-half of all households comprised the two lowest social groups. Social problems would appear to have posed greater difficulties for Patrington than either Howden or Hedon. Patrington workhouse accommodated 100 inmates, and the number of illegitimate births in the town in the 1840's was 141 out of a total of 645[79]. Only 11.5% of households in Patrington employed domestic servants in contrast to 21.5% and 23% in Howden and Hedon respectively[80]. The social structure of Patrington is largely reflective of the town's role as a local agricultural service centre in which agricultural employment remained of particular significance. In Hedon and Howden social structure must to a large extent be seen as a legacy of the towns' earlier administrative and legal importance within the region, but nevertheless a structure that, through the lack of progression, failed to give either centre enhanced social standing in terms of social function and provision in the period after 1700. The social structure of each of these towns became most clearly manifest in spatial structure.

5. Spatial Structure

(a) Morphology

The demographic experience of most stable towns exerted little pressure upon urban form and consequently in 1850 these country towns retained a good deal of their medieval plan. As in the expanding towns of the region, the direction of growth was predominantly inward and there was little, if any, extension of the early-eighteenth-century physical area. While the long winding streets of Howden, the grid iron pattern of streets in Hedon, and the linear form of Patrington were subject to some

infill, the creation of small lanes and alleys behind the main street frontages and the replacement of garden plots by courts and yards were far less characteristic processes in stable centres, for population pressure was insufficient to warrant infill to this degree.

The Land Tax returns and the official census returns each suggest that expansion occurred on a circumscribed scale. In Hedon and Patrington the number of taxable properties recorded in the former returns increased from 65 to 82 and from 58 to 98 respectively in the period 1782-1832, while in Howden the number listed fell from 224 to 187. Explanation for the apparent reduction in Howden rests with the compilation of the returns; after the turn of the century individual properties held by one owner were not separately listed, but were recorded simply as a single gross taxable sum[81]. The percentage increase in new dwellings recorded in the decennial census between 1801 and 1841, was 58% in Howden and Hedon, and 84% in Patrington (in contrast to 101% in Driffield and 130% in Market Weighton)[82]. While occupance rates in all three towns remained low - at around 5:1 in the first half of the nineteenth century - evidence from the Land Tax indicates that an increasing proportion of households were forced to share dwellings. After 1800 it became common for properties to be tenanted by more than one person and in Patrington, Hedon and Howden such property accounted for approximately one-quarter of all entries in the Land Tax[83]. The root cause of this problem lay in the fluctuation in land prices in the period of the Napoleonic wars; owner-occupiers found it more profitable to rent out their houses and land. Thus at a time when the level of owner-occupation steadily decreased in these towns, the proportion of properties tenanted by more than one individual rose. The census returns also indicate that a higher proportion of households in each of these three stable towns

shared dwellings[84], than in their expanding and dynamic counterparts.

Land was provided for development in stable centres in a manner similar to that operating in expanding towns. Few larger land and property owners were involved in the building process, and, as already demonstrated, it was small land and property owners who came to dominate ownership in all three towns. As figures 7.11 and 7.12 demonstrate for Hedon and Patrington, it was plots within the central area that were subdivided to provide new building space, plots which were largely purchased by men of lesser means. Correlating the number of landowners with the number who paid under 4/- tax over the period 1782-1832 gives a Pearson's r of 0.98 for Patrington with an associated probability of 0.01, and 0.90 for Hedon and Howden with an associated probability of 0.05. Average decennial turnover of land and property was lower in Hedon and Howden than in Pocklington and Driffield, 37% compared with 44%, perhaps not unexpectedly for the physical development of the former was less marked. In Patrington, where there was a greater percentage increase in the total number of dwellings, decennial turnover was of the same order as in the expanding and dynamic centres previously analysed[85].

The outward extension of the urban area and the creation of successive fringe belts was not characteristic of stable centres; most expansion was related to inward lying or intra-mural areas[86]. The general absence of externality in stable towns gave rise to little development of fringe areas, although the haven basins at Patrington and Hedon did give rise to some extra-mural growth[87]. In Howden, where transport linkages with the surrounding countryside were limited in the period before the railway, extra-mural development was largely absent. The resulting urban structure of these places is of some interest and gave rise to

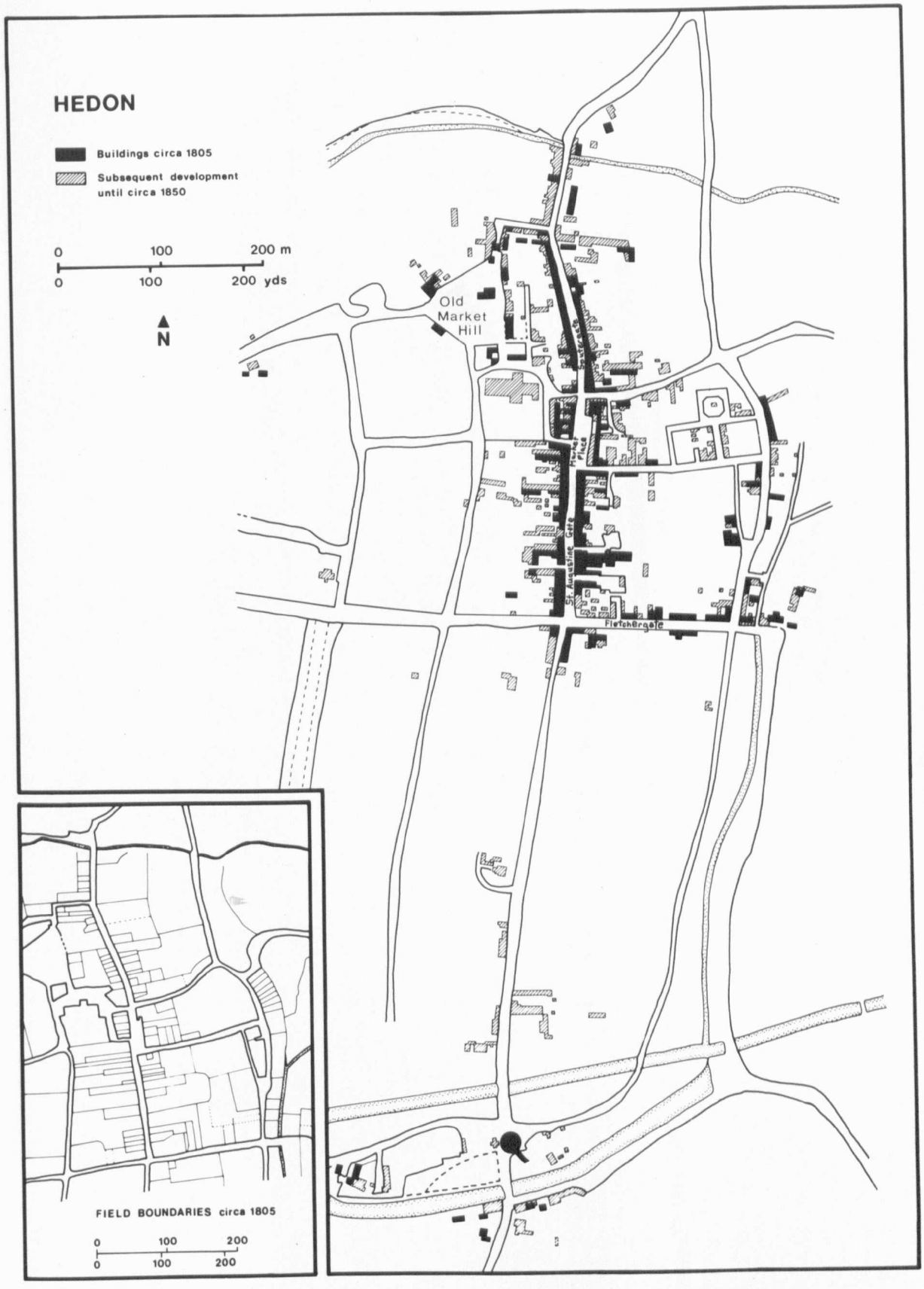


Fig.7.11 Extension of the Built Area in Hedon, c.1805-1850

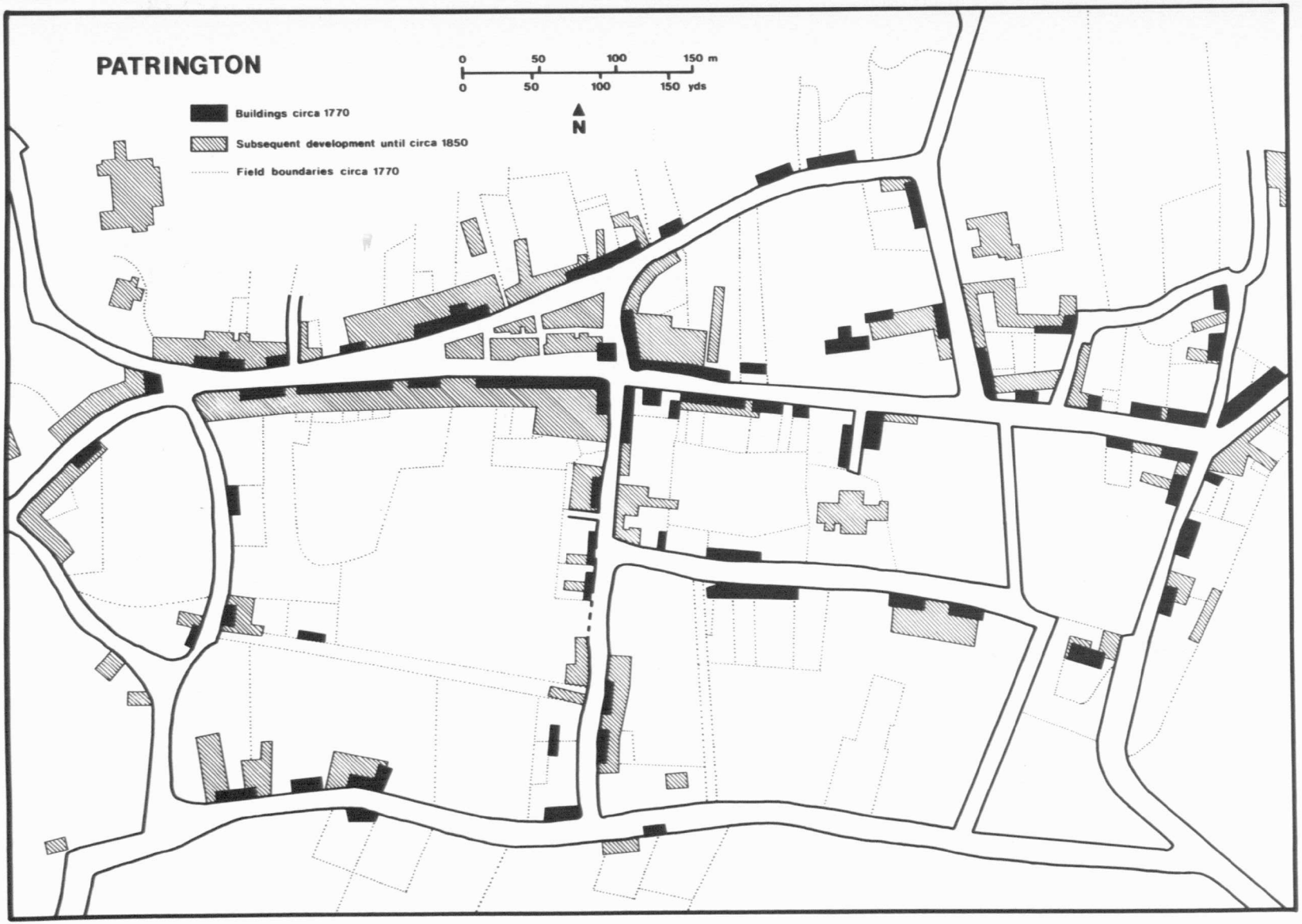


Fig.7.12 Extension of the Built Area in Patrington, c.1770-1850

socio-spatial patterns somewhat distinctive of stable country towns. Information on housing rental values as recorded in the poor rate assessment books for Howden indicates something of the developing structure of that town in the period 1781 to 1831[88].

During the last quarter of the eighteenth century more than two-thirds of the houses in Howden had a yearly rental value of under £5, almost one-quarter a value of between £6 and £20, and only one-tenth a rental value in excess of the latter amount[89]. At this date, the long main streets of the town were associated with a considerable intermix of housing types, although the loosely compacted structure did give rise to certain groupings. Most of the poorer housing was located in Bridgegate and Hailgate, while Bridgegate and the Market Place also contained several low to middle value properties. Parts of the Market Place were also devoted to predominantly good quality housing while Flatgate was occupied almost exclusively by 'high value' houses (table 7.10 and figure 7.13).

Over the period 1780 to 1830 most of the new urban population was housed in dwellings of inferior stock. During this time the number of houses valued at between £1 and £5 increased from 108 to 224, while the number of houses with an annual rental value of £20 or more only increased by sixteen. Development in the town was most marked in the first quarter of the nineteenth century. In the preceding quarter century it would appear that just eight new dwellings were added to the existing housing stock, although there is evidence to suggest that several of the poorest properties may have been demolished and replaced by better quality houses (tables 7.10 and 7.11). The demographic crisis that affected Howden in the first seventy years of the eighteenth century clearly kept housing demand at a very low level.

From 1800 a large number of new dwellings were erected in the town with two areas, St. John's Street and Applegate, and Pinfold

Table 7.10 Location Quotients of Rental Values in Howden, 1781-1831

Street	Annual Rental: Under £1			£1 - £5			£6 - £10			£11 - £20			£20 - £50			£50 - £100		
	(a)	(b)	(c)	(a)	(b)	(c)	(a)	(b)	(c)	(a)	(b)	(c)	(a)	(b)	(c)	(a)	(b)	(c)
Market Place	0.3	-	0.4	0.7	0.9	0.7	2.0	1.1	2.2	2.0	2.2	1.8	1.0	-	1.7	0.9	1.0	1.4
Church Yard	-	-	0.7	1.1	1.4	0.9	1.2	1.6	0.5	2.3	-	2.1	1.0	-	-	-	-	2.0
St. Johns Street and Applegate	1.4	2.9	0.9	0.9	0.7	1.2	0.4	1.5	0.6	1.5	-	0.5	0.6	0.8	0.5	1.8	2.8	0.7
Pinfold Street and Corn Market Hill	2.5	-	0.7	0.7	1.4	1.2	-	-	0.7	o	1.1	0.5	2.1	-	1.0	-	4.2	0.7
Bridgegate	0.8	0.4	1.8	1.1	0.8	0.7	1.5	1.5	1.2	0.4	0.7	1.1	1.0	2.5	1.0	-	0.8	1.5
Hailgate	1.6	2.1	1.1	1.1	1.3	1.1	0.4	0.4	0.5	0.4	0.9	0.9	0.4	0.8	1.1	0.5	0.4	0.4
Flatgate	1.2	-	-	0.3	1.5	1.3	-	0.6	0.7	1.6	0.7	0.4	3.0	-	-	8.4	2.8	1.4
Total No of Dwellings	43	17	35	105	108	224	28	43	44	22	35	33	17	16	15	6	9	23
Rental Groups as percentage of all Housing	19.4	7.5	9.4	47.5	47.4	59.9	12.7	18.8	11.8	10.0	15.4	8.8	7.6	7.0	4.0	2.8	3.9	6.1

(a) 1781. (b) 1801. (c) 1831.

Table 7.11 Housing Development in Howden, 1781-1831

Street	1781		1801		1831	
	No	%	No	%	No	%
Market Place	39	17.6	48	21.0	58	15.5
Church Yard	13	5.9	13	5.7	16	4.3
St. Johns Street and Applegate	20	9.0	18	7.9	45	12.0
Pinfold Street and Corn Market Hill	6	2.8	6	2.6	47	12.6
Bridgegate	64	28.9	64	28.0	75	20.0
Hailgate	66	29.9	70	30.7	109	29.1
Flatgate	13	5.9	9	3.9	24	6.4
Total all Areas	221		228		374	

Table 7.12 Housing Types in Howden, c1831

Street	Houses		Houses & Land		Shops		Houses & Shops		Farms		Houses & Garden		Business Premises		Industrial Premises		Warehouses		Land	
	%	L.Q	%	L.Q	%	L.Q	%	L.Q	%	L.Q	%	L.Q	%	L.Q	%	L.Q	%	L.Q	%	L.Q
Market Place	7.6	0.5	11.5	0.7	71.4	4.6	95.2	6.1	33.3	2.1	-	-	33.3	2.1	33.3	2.1	33.3	2.1	-	-
Church Yard	4.2	1.0	6.5	1.5	-	-	-	-	-	-	33.3	7.7	-	-	-	-	-	-	-	-
St. Johns Street and Applegate	15.0	1.3	3.3	0.3	-	-	4.8	0.4	-	-	66.7	5.5	33.3	2.7	-	-	-	-	-	-
Pinfold Street and Corn Market Hill	13.4	1.1	9.8	0.7	-	-	-	-	33.3	2.6	-	-	-	-	33.3	2.6	-	-	-	-
Bridgegate	22.2	1.1	19.7	0.9	14.3	0.7	-	-	16.7	0.8	-	-	33.3	1.6	-	-	-	-	33.3	1.6
Flatgate	6.1		11.4		-		-		16.7	2.6	-		-		-		-		-	
Hailgate	31.5	1.1	37.7		14.3	0.5	-		-		-		-		33.3	1.1	-		66.7	2.3
TOTAL NO.	261		61		7		21		6		3		3		3		1		3	
HOUSE TYPE AS % OF ALL PROPERTY	69.8		16.3		1.9		5.6		1.6		0.8		0.8		0.8		0.3		0.8	

L.Q. = Location Quotient. Source: Tables 7.10, 7.11, 7.12, H.C.R.O. PR 847.

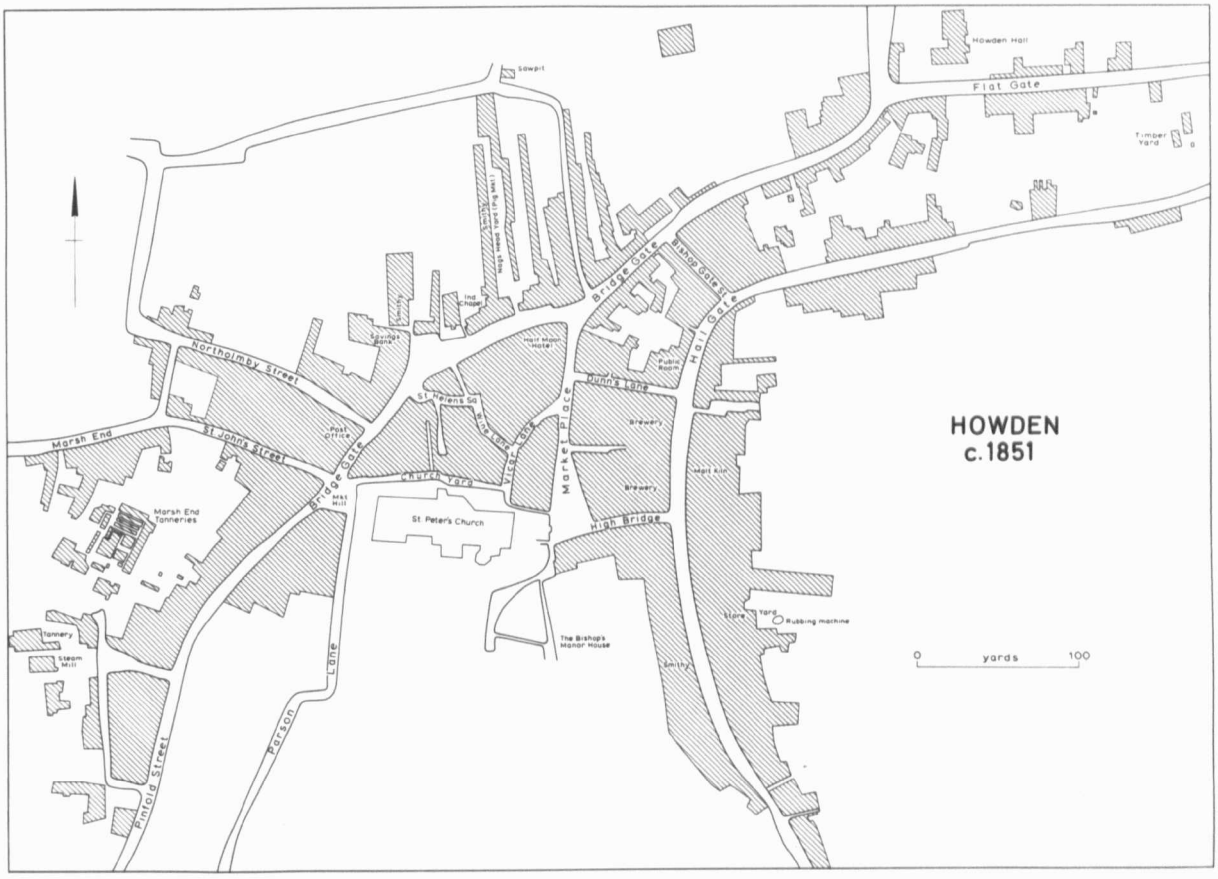


Fig.7.13 Howden, c.1850

Street and Corn Market Hill, adding considerably to their percentage share of all housing (table 7.11). The predominantly low rental value of properties built in these areas is reflective of their economic function. In the early nineteenth century two large tanneries were built in that part of the town and many of the new properties were undoubtedly terraced rows of workers cottages. Other areas of the town also experienced increase in their dwelling stock; but in streets such as Bridgegate, Church Lane and the Market Place (the medieval core of Howden) there was rather less room for expansion.

Location quotients can be usefully employed to indicate something of the changing status of the town's streets. In the period up to 1800 Flatgate was clearly the most fashionable residential area of Howden, having a location quotient of 8.4 for houses with an annual rental value of £50 or more in 1780 and 2.8 in 1801 (table 7.10). From the latter date, however, there would appear to have been some erosion of the high-status value of this street as other areas, notably Bridgegate and the Market Place, increased their share of high value properties. Hailgate, St. John's Street, Applegate, and Pinfold Street remained the poorest areas of the town consistently registering location quotients of 1.0 and over for houses valued at £5 or less, and generally being less well represented by high value property. Not surprisingly, the Market Place was over represented by 'middle valued' property with an annual rental of between £6 and £20, evidencing the central and commercial importance of this area. Over the period 1781 to 1830 the picture presented by this data suggests that spatial differentiation, in terms of property values, did exist; but it would seem that an increasing polarisation of urban space, whereby different parts of the built area emerged as high or low status, did not occur. Rather the available evidence would suggest that, over time, the structure of the community

became more balanced with a considerable intermix of housing characterising most streets.

Analysing housing by type, rather than value, presents a similar picture. Better quality houses, ie, dwellings with attached gardens or land, were fairly evenly dispersed, although they did show a tendency for over representation in the Church Yard and Flatgate, while only St. John's Street and Applegate could be considered to have more than their expected share of poorer dwellings. It is only with respect to commercial property that really discernible patterns emerge. Nearly all retail activity was centralised; of the twenty eight assessed shops[90], only three were located outside the Market Place. Business and industrial premises were perhaps more widely scattered, but Flatgate and Church Yard, both areas of better quality housing, are noticeable by the absence of any commercial or manufacturing activity (table 7.12).

Over the period 1781 to 1831 Howden, as a predominantly stable centre, displayed a remarkable degree of structural and morphological continuity. While, as table 7.11 demonstrates, the process of infill, so characteristic of dynamic and expanding centres, was present within the town, it occurred on a limited scale. Intra-mural development took place principally to the southeast and southwest of the central core, associated with the building of workers cottages in Pinfold Street, and St. John's Street and Hailgate. Whereas structural development in towns experiencing more rapid regional growth led to the creation of residentially distinct areas and to considerable improvement of the urban fabric[89], in stable centres, such as Howden, Hedon and Patrington, the pattern and process of morphological change was far less distinct. Indeed it could be argued that in the more 'historic' of their number, limited eighteenth and nineteenth century development to some extent obscured earlier patterns of

spatial differentiation.

In the early eighteenth century Defoe remarked that Hedon was a "pleasant town ... handsome well built"[91], and some of its buildings were then fairly grand. The market cross erected in 1733, an octagonal brick building with a cupola, was built by William Poultney one of the town's M.P.'s, while another, Mr Henry Guy, erected the Town Hall in 1693[92]. The failure of the town to expand its regional role in the ensuing century appears to have arrested any further attempts to improve the character of the built environment, for a government report of 1835 described the town as having "few or no good houses"[93]. In the same report Patrington was accounted to be "low and indifferently built" and a contemporary described Howden as "containing nothing remarkable except its collegiate church"[94]. Certainly in the period before 1850, the stable growth experience of these centres had clear spatial manifestations.

(b) Socio-economic Structure

Town morphology had an important determining influence on socio-economic differentiation. A clear distinction is apparent between structurally compact towns where there was little parallelism between physical and social distance, and more loosely composed centres where there was opportunity for such a parallelism to develop[95]. Two additional factors can be added to this equation; first the character of that form - whether linear, gridiron or composite - had a bearing upon the disposition of land uses and social areas; and second, the nature of the growth experience.

Of the three stable towns under consideration, each had a distinct morphology[96]; yet their common growth experience gave rise to similarity in the nature, if not the disposition, of spatial differentiation. Furthermore, they were each loosely compacted and thus possessed the facility to develop functionally

and socially distinct areas; but their limited expansion and restricted regional role led to fairly weak patterns of spatial organisation. It has already been demonstrated that in Howden, whose early regional importance had - as in the county town of Beverley[97] - led to a degree of residential segregation, the period of most rapid population growth after 1780 gave rise to no really clear cut differentiation within the urban area. Hedon, whose regional role also diminished in the period after 1700, underwent a similar experience; the census enumerators' returns of 1851 suggest that only Fletchergate to the south of the town had retained its social and functional distinctiveness, being comprised almost entirely of professional households. In the agriculturally dominated Patrington, which had possessed little to accord it urban status in periods preceding the eighteenth century, eighteenth and early nineteenth century growth led to the development of socio-economic patterns at only the weakest level.

Analysing the census enumerators' returns for this latter type of stable country town at the mid-nineteenth century demonstrates clearly the limited effect that a stable growth experience had on urban spatial structure. The most evident patterns of socio-economic differentiation occurred not within the built area but in the two parochial foci of extramural growth of Enholmes Farm (the location of Marshall's Flax factory) and Patrington Haven. Almost 9% of Patrington residents were born outside the administrative county of Yorkshire and over half this number resided at Enholmes and the Havenside, being employed either as agricultural labourers, or flax dressers at Marshall's factory. Socially both these areas were dominated by low status households of social groups IV and V, and by a general absence of middle and upper class groups (table 7.13). Within the urban area there was a considerable intermix of social and functional groups. While the

Table 7.13 Location Quotients of Social and Economic Groups in Patrington, 1851. (Heads of Households)

	Social Class					Economic Activity				
Street/Area	I	II	III	IV	V	Ag	Buil	Ret	Prof	Man
1. Humber Lane, Ings Lane, Westgate	2.3	1.0	0.7	1.1	0.3	1.4	1.3	0.2	1.4	0.9
2. North Side	-	1.6	1.1	0.9	-	1.0	1.8	0.3	0.4	1.8
3. Welwick Road	3.6	2.8	0.7	0.7	6.8	1.2	-	1.0	1.3	1.2
4. High Street	1.5	0.3	2.0	0.6	-	0.6	1.5	2.5	0.6	1.8
5. Market Place Pump Row	-	1.0	1.2	0.8	1.2	0.9	0.2	2.2	0.8	1.1
6. Greenshaw Lane	3.4	1.3	0.7	1.1	-	0.7	2.3	0.9	2.6	0.4
7. Vicar Lane	-	1.8	1.1	0.8	-	0.6	3.2	-	1.7	0.8
8. White Crop	-	0.5	0.8	1.0	1.7	1.7	0.9	0.4	-	0.5
9. Havenside	-	0.1	1.0	1.2	2.1	0.8	0.2	1.3	0.2	0.4
10. Enholmes/ Factory Cottages	2.2	-	0.8	1.6	-	0.9	0.7	-	0.8	2.6

See also Appendix VII (b) for a breakdown of the location of economic and social groups in Hedon, Howden and Patrington.

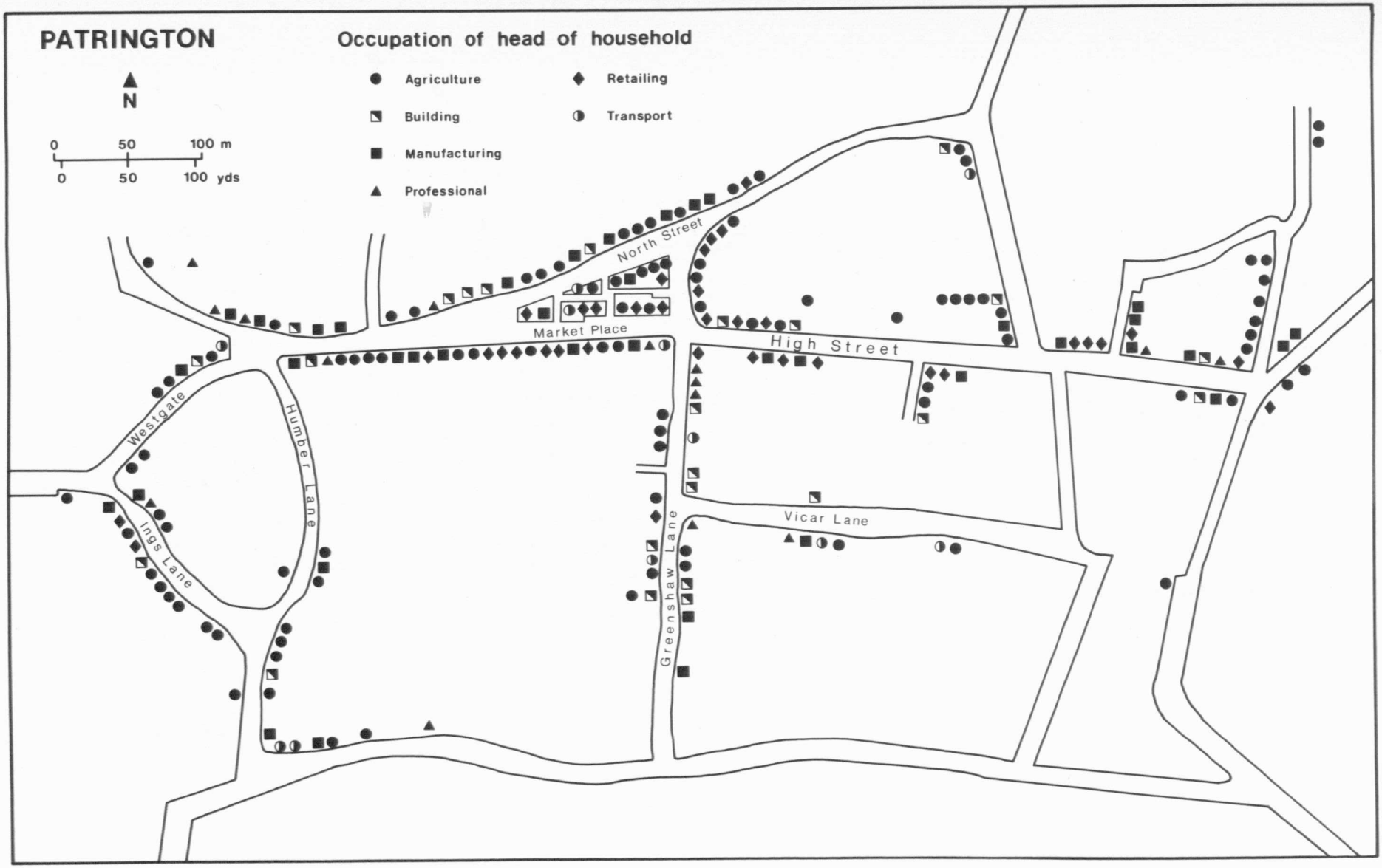


Fig.7.14 Location of Households Engaged in Selected Economic Activities in Patrington, 1851

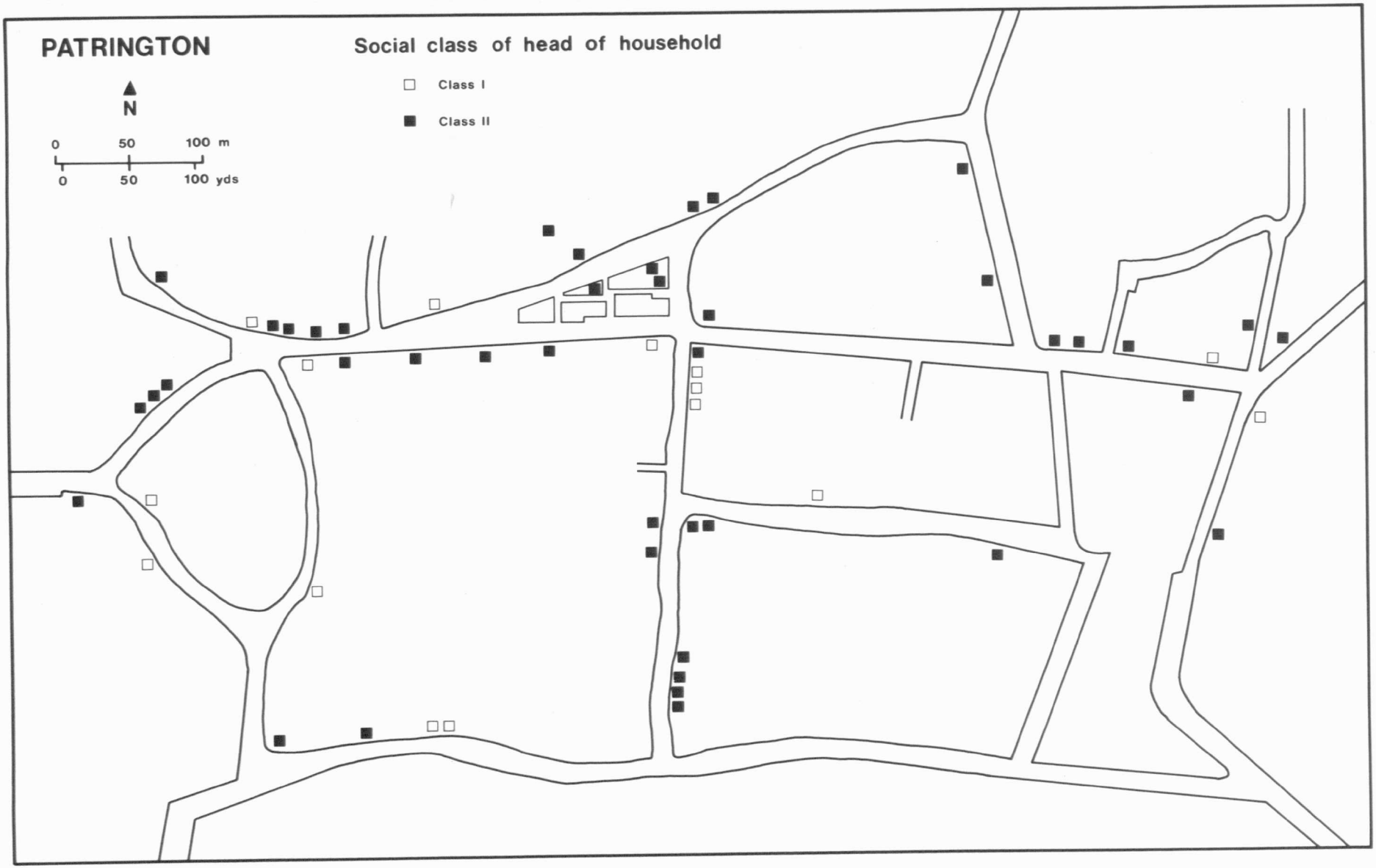


Fig.7.15 Location of Class I and II Households in Patrington, 1851

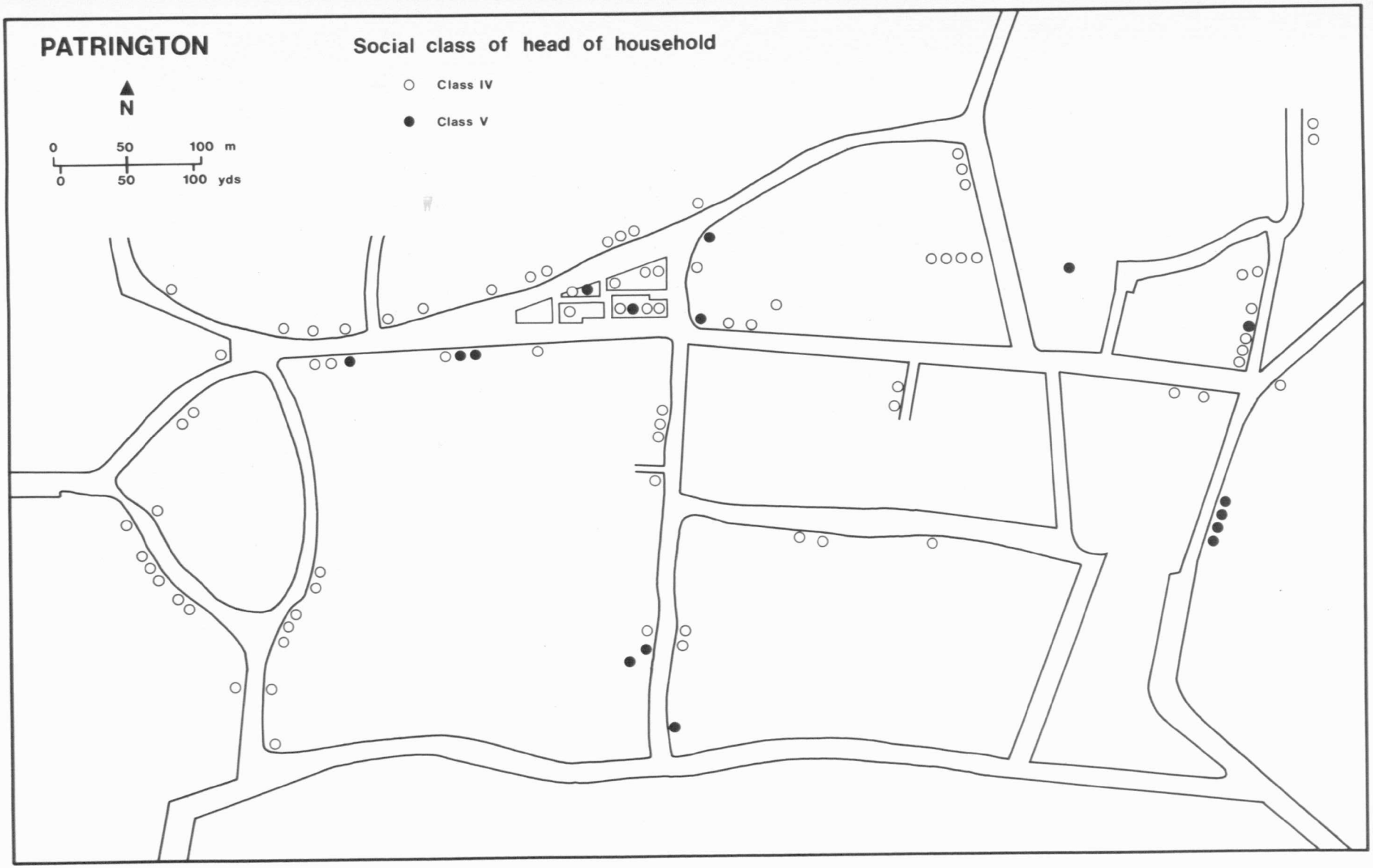


Fig. 7.16 Location of Class IV and V Households in Patrington, 1851

calculation of location quotients for the different town areas does point to certain concentrations, for example, professional activity in Greenshaw Lane and Vicar Lane and retailing in the High Street and the Market Place, the mapping of individual households demonstrates the diffuseness of economic and social location within the various streets (table 7.13 and figures 7.14, 15, 16).

Economically one of the most characteristic features of Patrington was the dispersal of agricultural activity throughout the town. Whereas dynamic and expanding centres had seen a removal of most agriculturally based households from the central area, in Patrington only the small area of the Market Place and Pump Row could be considered to have shed its direct contacts with agriculture in any measure. Clearly the more limited functional development of the town exerted less pressure on traditional uses of the central area. Other economic activities were fairly widely dispersed and although retailing occupied the majority of households in the High Street and the Market Place, spatially this group was not as concentrated as in expanding towns such as Pocklington and Market Weighton. The maximum number of functionally similar households to locate in juxtaposition, other than for agricultural activity, was just three (figure 7.14).

Social intermix was also marked. Class I and class II households did show some leaning towards the urban margins (figure 7.15), locating in Greenshaw Lane and at the western end of Northside, but this pattern had still to be fully developed, perhaps not surprisingly in view of the relatively small number of high status households in total urban structure[98]. The lower social groups were perhaps even more widely dispersed (figure 7.16). Only the southern side of the Market Place and the High Street were noticeable by their absence of households of classes IV and V. No areas of Patrington emerge as dominated by a

particular economic or social group and functional and residential nuclei were present in only the weakest of forms.

It might be argued, therefore, that a stable growth experience resulted in a distinctive spatial structure in which there was only limited differentiation between social and economic groups within the urban area. This pattern can be seen as the result of two operative processes. In stable towns which had possessed previous legal, administrative or political importance, their growth experience in the period after 1700 weakened any earlier spatial dichotomy and gave rise to a more equitable disposition of landuses and social areas. In organic stable towns, whose pre-eighteenth century role as a market centre for the local area had given rise to a largely undifferentiated spatial structure, limited growth in the eighteenth and first half of the nineteenth century restricted any need for major spatial reorganisation and led to little alteration of existing patterns.

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51. In the period 1701-1750 Deane and Cole estimate that over 3,500 people, or 60% of natural increase, left the administrative county of the East Riding, and between 1750 and 1780 a further 45% of regional natural increase was lost at an annual rate of 3·9 per 1,000 population. DEANE, P. and COLE, W. British Economic Growth 1688-1959. Cambridge, 1964, pp.109, 115.

52. LEATHAM, I. A General View of the Agriculture of the East Riding. London, 1794, p.31; pers comm.

53. DEANE and COLE, op.cit., p.122.

54. Census of Population; PRIVY COUNCIL, Seventh Report of the Medical Officer of the Privy Council. London, 1864, p.291.

55. CARTER, H. 'Urban Systems and Town Morphology', in BOWEN, E.G. ed Geography at Aberystwyth. Cardiff, 1968, p.223.

56. Howden was never officially granted corporate status but on occasions it was styled a borough; ALLISON, K.J. East Riding of Yorkshire Landscape. London, 1976, p.227.

57. For an account of Hedon see BERESFORD, M.W. History on the Ground. London, 1957, chapters 5 and 6; BERESFORD, M.W. New Towns of the Middle Ages. London, 1967, pp.510-511; and for Howden CLARKE T. History of Howden. Howden, 1851.

58. These and subsequent figures are calculated from the analysis of all occupations recorded in the baptism and burial registers of each town. H.C.R.O. PR; B.I.H.R. PRT.

59. See ROWLEY, G. The Middle Order Towns of Wales. (Unpublished Ph.D. thesis, University College of Wales. Aberystwyth, 1967).

60. H.C.R.O. PR; B.I.H.R. PRT; B.B.D. 1784, U.B.D. 1791.

61. In the parish registers for this town in the period 1710-1740, mention is made of grocers, butchers and innkeepers only, H.C.R.O. PR.

62. These were undoubtedly associated with the resurgence of trade at the haven. Both parish registers and directories make mention of corn and coal merchants, flour dealers and lime merchants.

63. Solicitors, physicians and surgeons and vets began to make an appearance in Patrington.

64. In contrast other local towns had at least two or more fire and life insurance offices and one or more land agents by 1850.

65. Census Enumerators' Returns, 1851.

66. Leather working had been a principal trade in Beverley since the Middle Ages. In the early nineteenth century several large tanning establishments, among them Hodgkinson's, operated from the town.

67. Census Enumerators' Returns, 1851.

68. The only flaxworkers are listed in the parish registers at the turn of the eighteenth century, H.C.R.O. PR 1804.

69. Brotherton Library Manuscripts, Leeds, 200/15/23.

70. RIMMER, W.G. Marshalls of Leeds, Flaxspinners 1788-1886. Cambridge, 1960, pp.260-61.

71. CAIRD, op.cit., p.307.

72. ibid; Census Enumerators' Returns, 1851.

73. B.U.D. 1791; B.Y. 1823; F.W.E.R. 1851.

74. See Chapter 1, Tables 1.5 and 1.6.

75. B.U.D. 1791; B.Y. 1823; F.W.E.R. 1851.

76. The change in the social rank of these towns is given in Appendix IV; see also note 44, chapter 4.

77. W.E.R. 1840; F.W.E.R. 1851.

78. A mechanics institute was established in Hedon in 1845 and card assemblies were accounted to be held in that town, but no formal assembly rooms or social rooms appeared until after 1850. Later directories for the region such as Kelly's directory for 1872 and Bulmers' directory of 1892 attest their appearance by the last quarter of the century.

79. Census Enumerators' Returns 1851; H.C.R.O. Pr 1402.

80. Census Enumerators' Returns 1851.

81. H.C.R.O. LTA, QDE.

82. Census of Population 1801-1841.

83. H.C.R.O. LTA, Q.D.E. NOBLE, M. 'Land Tax Returns and Urban Development'; The Local Historian, vol.15, No.2, 1982, p.90.

84. Only seventeen households out of a total of 558 lived in shared dwellings in Great Driffield in 1831, and just one and four respectively in Pocklington and Market Weighton. At the same date twenty three households in Hedon, seventeen in Howden and fifteen in Patrington shared houses.

85. NOBLE, 'Land Tax' op.cit., p.89.

86. The concept of extra-mural development is discussed in CONZEN, M.R.G. 'Alnwick: a Study in Town Plan Analysis', T.I.B.G. No.27, 1960, pp.1-22; WHITEHAND, J.W.R. 'The Changing Nature of the Urban Fringe: a Time Perspective', in JOHNSON, J.H. ed Suburban Growth: Geographical Processes on the Edge of the Western City. London, 1974, pp.31-52; CARTER, H. and WHEATLEY, S. 'Fixation Lines and Fringe Belts, Land uses and social areas: Nineteenth Century Change in the Small Town', T.I.B.G. New Ser, vol.4, No.2, pp.214-238; WHITEHAND, J.W.R. 'The Urban Landscape: Historical Development and Management. (I.B.G. Special Publication, No.13). London, 1981.

87. This is in contrast to dynamic country towns and larger industrial towns such as Leeds. See for example the case of Aberystwyth in CARTER and WHEATLEY, op.cit., and Leeds in CHAPMAN, S.D. The History of Working Class Housing. Newton Abbott, 1971, chapter 4.

88. This and subsequent information is drawn from H.C.R.O. PR 847.

89. In Great Driffield whose social status was more akin to that of an industrial town in 1818, 65% of houses still had a rental value of £5 or less.

90. Unfortunately the earlier returns do not specify property types.

91. DEFOE, D. A Tour Through England and Wales, 2 vols, (Everyman). London, 1906, p.245.

92. PARK, G. The History of the Ancient Borough of Hedon. Hull, 1895, p.205.

93. B.P.P. 1833, XIII 344, Report From the Select Committee Appointed to Inquire into the State of the Municipal Corporations of England and Wales.

94. ibid.; B.Y. 1823.

95. CARTER and WHEATLEY, op.cit., p.237.

96. Hedon's plan was gridiron, Howden's consisted of long winding streets and Patrington consisted largely of one long street.

97. At the taking of the hearth tax returns there was a clear north-south dichotomy in Beverley, between North Bar Within and Without in the north and the cramped Beckside areas in the south.

98. They comprised less than one-sixth of all households.

CONCLUSION

The forces shaping Britain in the course of the eighteenth and nineteenth centuries led to both continuity and change. Between 1700 and 1850 three transitions affected the country as a whole; a demographic transition from slow population growth to rapid rates of natural increase and a major redistribution of the population; a social transition from rural to urban living; and third, an economic and technological transition from a slowly changing agricultural way of life to a mechanised society[1]. Each of these transitions had a profound effect upon the urban system. Through the medium of differential and selective urban growth, changes within these dimensions brought a new degree of complexity to the existing urban hierarchy associated with a widening out of relative sizes, an alteration in the economic and social standing of many centres within local, regional and national settlement systems, and new levels of structural diversity within towns. The result was that small towns, which had for centuries been the basis of most urban living, became displaced from their position of prominence, as larger urban communities with populations of 10,000 or more grew rapidly in importance[2]. Despite the growth of larger towns and cities at the expense of their smaller counterparts, it was demonstrated at the outset of this thesis that, until the turn of the nineteenth century, small towns remained an important element in the urban structure of England and Wales, accounting for as much as 50% of all urban living. The 'strength' of small towns within the urban system, however, is not proportionately represented in the considerable body of academic literature directed towards analysing towns and urban growth in this critical transitional period of the eighteenth and nineteenth centuries. Accordingly knowledge of the forces of change operating upon and within towns at the lower end of the size hierarchy is relatively

underdeveloped, especially in those predominantly rural areas of the country which were effectively bypassed by the more direct effects of the Industrial Revolution[3]. This thesis has attempted to go some way towards bridging this gap by focusing attention upon the country towns of eastern Yorkshire.

At the start of the eighteenth century the regional urban system of eastern Yorkshire comprised three orders of settlement: by the close of the same century they numbered five, and by the middle of the nineteenth there were seven. This increasing level of complexity was established among a static body of towns, for the region saw no actual urban genesis during the course of the study period[4]. Instead the trend was for a process of rationalisation among the very smallest of their number. Not unexpectedly, the dominant role of the highest order settlements, the regional capitals of York and Hull, remained unchanged and unchallenged and it was among the middle and lower order centres - the country towns of the region - that additional orders of settlement were created. The principal emphasis in this thesis has therefore been to analyse the nature of the growth experience and the operation of, and the results of, the process of selective urban growth among country towns.

The study towns were placed in a comparative context for two principal reasons; first, it enables a certain level of generalisation to be attained, and second, it has facilitated a basis for comparison with studies of larger centres. Within this comparative context the thesis has sought to establish some methodologies for analysing development and change among the lower levels of the urban system in the period 1700-1850. The constraints of the available data sources, however, restrict the type of analysis which can be undertaken, particularly in the century before the taking of the first national census and before local trade directories become widely available. These can be

identified as the different number of towns for which data is available at any of the study dates, and variations, both temporal and spatial, in the comprehensiveness of coverage. Nevertheless, through the use of Parish Registers, Hearth Tax returns and Visitation returns, together with a variety of nineteenth century sources, it is possible to gain considerable insight into economic and demographic change in the urban system of eastern Yorkshire.

The analysis of a range of economic and demographic variables indicated that during the period 1700-1850 the regional structure of urban settlement was subject to considerable fluctuation and change, with distinct spatial variations emerging in both the timing and pattern of growth. The towns of the northwest part of the region, for example, enjoyed good rates of growth in the first half of the eighteenth century, but subsequently saw little further expansion of their fortunes due to their peripheral and generally disadvantaged location and the competition from other more favourably located centres. Indeed it can be observed that towns situated in peripheral, and frequently disadvantaged, geographical locations commonly retained the most stable positions in the regional urban hierarchy, only proving able to improve their relative role if they gained direct access to a viable navigational link of some kind. Towns in the central portion of the region, comprising a large part of the administrative county of the East Riding, were perhaps subject to the most fluctuating fortunes and it was this area which, furthermore, witnessed the greatest rationalisation in number. Accompanying these spatial variations was a growing complexity in regional urban structure involving considerable alterations in status levels and a movement towards entropy. Changes were greatest in the seventy-five years between 1750 and 1825; in the second quarter of the nineteenth century there was a consolidation of earlier emergent

patterns as a degree of equilibrium was attained.

The temporal analysis of the demographic and economic dimensions to change pointed to a variety of growth experiences affecting the region's country towns; furthermore, it was evident that the nature of the growth experience in a large measure determined any changes in the relative and absolute contribution made by individual centres to the functioning of the regional urban system. Chapter 4 thus proposes a typology which might profitably provide a framework for further investigation of the growth and development of country towns. The preceding analysis highlighted the individualistic nature of small towns and their growth: clearly there were many types of country towns and in this respect any generalization must be an oversimplification of reality. Nevertheless common growth experiences provided a unifying dimension, overriding diffuseness of size, character and type. Through a synthesis of the previously analysed variables, four town types - viz dynamic, expanding, stable and declining - were identified, and the characteristics of each type discussed. While analysis of the urban system at this aggregate level pointed to some of the determinants of differential and selective urban growth, only in-depth investigation of individual centres could comprehensively elucidate the process and pattern of change.

The case studies of the second part of the thesis focused primarily on middle and lower order country towns for the fortunes and growth experience of the larger of their number, namely county towns and emerging ports and resorts, are already well documented and understood. It is among the mass of country towns - the market centres of any region - that the forces shaping selectivity and growth remain to be elucidated. The case studies of six East Riding towns suggested that different forces were operative both upon and within the individual growth types, leading to distinct structural and spatial manifestations. Four main forces acted to

determine the growth experience of country towns; these can be identified as location, nodality, externality and competition. Locational advantages, a highly developed nodality and good external linkages became the major stimuli to the growth of dynamic centres. Expanding centres, although also developing their locational advantages and nodal position during the course of the study period, faced competition from dynamic towns whose generally superior location provided competitive barriers to the development of externality in these places. For stable towns, locational disadvantages gave rise to a poorly developed nodal position, and a general absence of externality and must be seen, therefore, as the major deterrent to growth. The case studies thus confirmed the findings of the aggregate analysis which suggested that location and competition were two major determinants of differential growth, but additionally they pointed to the importance of external interests and linkages in growth experience.

Distinct structural features were also associated with each town type. Dynamic centres were generally little affected by the demographic crises of the early eighteenth century and thus emerged into the latter part in a stronger position than many of their regional counterparts. Furthermore they became regional focal inmigratory points of considerable significance in the period after 1750. Many stable centres, on the other hand, suffered quite sharply from population crises during the fifty years between 1710 and 1760, delaying any significant upturn in their demographic fortunes until the last quarter of that century; furthermore they each generally lost a significant proportion of their natural increase through outmigration. Expanding towns enjoyed a midway position; they too became migrational focal points of some importance during the study period, but due to a less developed location and more limited economic transformation

they proved unable to continually sustain this role in the period between 1750 and 1850.

In economic terms, the structural experience of each town type also differed, although here there was perhaps greater diversity due to historical antecedents and population size. It is evident, however, that widening and diversification of economic structure was most marked among dynamic centres, and it was these places which came to mirror most closely the effects that the Industrial Revolution had on their larger counterparts. In these centres larger scale employment units appeared as trade and industry emerged on a noteworthy scale. Although such units were also found in the other town types, in stable towns, for example, there was generally an overreliance on a single manufacturing craft, denying the centre the degree of diversity required if its relative position within the regional urban system was to be increased in any measure. Widening and diversification of economic structure was of some importance for it created a new commercial and professional elite, spearheading changes in the provisioning of town society. A new urban culture became most notable in dynamic towns, less so in expanding towns, while in stable centres earlier social provisioning and importance dissipated in the face of the reduced standing of these places in the regional settlement system. Accordingly these towns witnessed the introduction of few new social amenities in the period before 1850. Exceptions to this general trend can be noted for the resorts and the county town of Beverley. While the proximity of the latter to Hull held its economic standing in check, Beverley's status as a county town led to an enhancement of its social position within the region.

The forces behind growth, and structural variations in development and growth, had clear spatial manifestations. Within dynamic centres a new structural diversity emerged characterised

by specific functional concentrations and socially and morphologically distinct residential areas. In many respects it can be argued that a dynamic growth experience enabled centres to mirror in miniature patterns and processes of change found in much larger towns and cities. In expanding towns more tempered growth led to the creation of less distinct spatial patterns; here the essential distinction lay not between town streets or areas, but between small pockets of functionally or socially similar nuclei within streets and streetblocks. Furthermore, the compactness of urban form occasioned by more limited growth restricted the opportunity for the emergence of differentiated space. Spatial differentiation at only the weakest level characterised stable towns, particularly the organic of their number. Even in those towns with corporate status, where segregated space had been of some significance in the pre-industrial era, stability of growth in the period after 1700 tended to weaken earlier spatial dichotomies. Furthermore, the small size of many of these towns also restricted diversity. As Royle argued in his study of Leicestershire towns, there were recognisable size thresholds below which it was difficult for spatial differentiation to develop[5].

Through the analysis and monitoring of the effect of a range of variables on the country towns of eastern Yorkshire, this thesis has attempted to indicate the effects of more than a century of change. In this respect this study has been wide ranging and the case studies, in particular, have covered a variety of themes. It is hoped that some of these themes will offer openings for future research, underlying the whole question of the contribution made by country towns to the functioning of the urban system. Many of the difficulties which this thesis has experienced in the use of diffuse, time-consuming, sources would not be encountered in more specific investigation of detached

themes: for example, the study of a single element of urban structure, a rigorous programme of research into demographic change, or further insights into the role of externality. Each of these would contribute to the total field, though by themselves their interest can only be of a secular nature.

It has only been possible to pursue this thesis within one area. There is a need to study other regional urban systems in order to reinforce this preliminary picture of change among and within small towns. Fields of enquiry indeed could be extended to regional concentrations of small industrial communities, for example, West Yorkshire, the Black Country and eastern Lancashire where conclusions would be particularly illuminating. These areas would serve as admirable fields for raising and answering the question of the role that one dominant manufacturing trade could have on growth experience. The extension of the study of country towns beyond the eighteenth and early nineteenth centuries would identify more forward and backward linkages. In particular, the examination of the role played by country towns in the late nineteenth century, a period in which they were increasingly affected by the railway, would highlight processes that led to their decline, before their selective regeneration in the twentieth century. Lastly further in-depth study of economic and social interaction between rural towns and major regional centres would further elucidate knowledge of the contribution made by country towns to the operation of urban systems. Within a historical context, the extent to which smaller communities operated in isolation, the financial linkages between large and small settlements and functional relationships between towns are all aspects worthy of further enquiry.

NOTES AND REFERENCES

1. LAWTON, R. 'Population and Society 1730-1900', in DODGSHON, R.A. and BUTLIN, R.A. eds An Historical Geography of England and Wales. London, 1978, p.313.

2. LAW, C.M. 'The Growth of Urban Population in England and Wales 1801-1911', T.I.B.G., No.41, 1967, pp.125-43; ROBSON, B.T. Urban Growth: an Approach. London, 1973.

3. Industrialising regions have perhaps received rather more attention, although the relationships of many of these settlements in a systems context remains to be elucidated, eg. JONES, P.N. Colliery Settlement in the South Wales Coalfield. (University of Hull, Occasional Papers in Geography No.14). Hull, 1969; CHALKLIN, C.W. The Provincial Towns of Georgian England. London, 1974. SMELSER, N.J. Social Change in the Industrial Revolution, an Application of Theory to the Lancashire Cotton Industry. London, 1959.

4. The only new town to enter the system was the canal port town of Goole, which achieved recognisable urban status only in the period after 1840.

5. ROYLE, S.A. Aspects of Social Geography of Leicestershire Towns, 1837-1871. (Unpublished Ph.D Thesis, University of Leicester, 1976).

Appendix I

Market Centres of Eastern Yorkshire circa. 1400 - 1700

PLACE	KNOWN EXISTENCE c.1300	c.1500 - 1600	c.1700
Selby	x	x	x
Kilham	x	x	x
Whitgift	x		
Brough	x		
Pocklington	x	x	x
Ravenserodd	x		
Warter	x		
Heslerton	x		
Hovingham	x	x	
Scampston	x		
Great Driffield	x	x	x
Burton Agnes	x		
Lund	x		
Thwing	x		
Stonegrave	x		
Adlingfleet	x		
Leven	x		
Hedon	x	x	x
Skipsea	x		
Hull	x	x	x
Thornton-le-Dale	x		
Newton-upon-Ouse	x		
Brandesburton	x		
Pickering	x	x	x
Easingwold	x		x
Tollerton	x		
South Cave	x		
Hemingborough	x		
North Duffield	x		
Carnaby	x		
Faxfleet	x		
Holme-on-Spalding-Moor	x		
Osgodby	x		
Sledmere	x		
Sinnington	x		

Coxwold	x		
Lowthorpe	x		
Wansford	x		
Swinefleet	x		
Patrington	x		x
Hutton Cranswick	x		
Market Weighton	x	x	x
Cottingham	x		
York	x	x	x
Topcliffe	x		
Withernsea	x		
Stainforth	x		
North Newbald	x		
Riccall	x		
Hornsea	x		x
Kirkburn	x		
Sherriff-Hutton	x		
Leconfield	x		
Bridlington	x	x	x
Beverley	x	x	x
Helmsley		x	x
Kirkby Moorside		x	x
Malton		x	x
Scarborough		x	x
Seamer		x	x
Snaith		x	x
Thirsk		x	x
Hunmanby			x
North Frodingham			x
Thorne			x
Howden		x	x

Appendix II (a)

Social Structure of Eastern Yorkshire

Area/Wapentake		No. of Hearths 1	2	3	4	5	6	7	8	9	10	11	12	Over 12	Total Charg	Not Charg	Total House holds
East Riding	No	7,927	2,294	908	498	270	174	113	57	41	34	21	15	48	12,400	3,669	16,069
	%	63.9	18.5	7.3	4	2	1	1	0.4	0.3	0.2	0.1	0.1	0.3		22.8	
York	No	297	447	277	215	120	98	69	45	34	35	16	10	24	1,687	434	2,121
	%	17.6	26.5	16.4	12.7	7.1	5.8	4.1	2.7	2	2.1	0.9	0.6	1.4		20.5	
Birdforth	No	1,006	297	98	37	20	12	5	1	3	1	3	2	6	1,491	460	1,951
	%	67.5	19.9	6.6	2.5	1.3	0.8	0.3	0.1	0.2	0.1	0.2	0.1	0.4		23.6	
Bulmer	No	1,674	296	82	50	26	25	14	5	8	10	4	2	8	2,204	549	2,753
	%	76	13.4	3.7	2.3	1.2	1.1	0.6	0.2	0.4	0.4	0.2	0.1	0.4		19.9	
Ryedale	No	1,197	241	90	54	24	12	9	4	4	-	2	-	6	1,643	643	2,286
	%	72.8	14.7	5.5	3.3	1.5	0.7	0.5	0.2	0.2	-	0.1	-	0.4		28.1	
Pickering	No	1,457	215	41	25	13	8	4	4	5	3	-	1	3	1,779	505	2,284
	%	82	12.1	2.3	1.4	0.7	0.4	0.2	0.2	0.3	0.2		0.1	0.2		22.1	
Whitby Strand (Scarborough, Falgrave & Hackness)	No	242	106	56	38	18	6	5	1	2	1	2	1	1	479	213	692
	%	50.5	22.1	11.7	7.9	3.7	1.2	1.0	0.2	0.4	0.2	0.4	0.2	0.2		30.8	
Osgoldcross lower	No	658	252	88	51	28	10	3	1	6	1	1	-	5	1,104	164	1,268
	%	59.6	22.8	8.0	4.6	2.5	0.9	0.3	0.1	0.5	0.1	0.1	-	0.4		12.9	
Barkstone Ash lower	No	605	316	137	96	43	11	14	10	2	2	2	-	9	1,247	120	1,367
	%	48.5	25.3	11	7.7	3.4	0.9	1.1	0.8	0.2	0.2	0.2	-	0.7		8.8	
Strafforth & Tickhill Sth (Thorne, Hatfield, Stainforth, Fishlake, Sykehouse)	No	288	189	63	40	6	9	6	1	3	3	1	1	2	612	106	718
	%	47.0	30.9	10.3	6.5	1.0	1.5	1.0	0.2	0.5	0.5	0.2	0.2	0.3		14.7	
Eastern Yorkshire	No	15,351	4,653	1,840	1,104	568	365	242	129	108	90	52	32	112	24,646	6,863	31,509
	%	62.3	18.9	7.5	4.5	2.3	1.5	1.0	0.5	0.4	0.4	0.2	0.1	0.5		21.8	

Appendix II (b)

Social Structure of Yorkshire

		No. of Hearths															Total House holds
		1	2	3	4	5	6	7	8	9	10	11	12	Over 12	Total Charg	Not Charg	
East Riding	No	7,927	2,294	908	498	270	174	113	57	41	34	21	15	48	12,400	3,669	16,069
	%	64	18.5	7	4	2	1	1	0.4	0.3	0.2	0.1	0.1	0.3		23	
York City	No	297	447	277	215	120	98	69	45	34	35	16	10	24	1,687	434	2,121
	%	17.6	26.5	16.4	12.7	7.1	5.8	4.1	2.7	2	2.1	0.9	0.6	1.4		20	
North Riding	No	12,827	3,077	1,028	549	277	174	85	40	45	34	24	20	65	18,245	5,825	24,070
	%	70	17	6	3	1.5	1	0.5	0.2	0.2	0.2	0.1	0.1	0.3		24	
West Riding	No	18,783	8,709	3,510	1,858	871	468	269	218	116	84	59	39	153	35,137	3,732	38,869
	%	53.5	24.8	10	5.3	2.5	1.3	0.8	0.6	0.3	0.2	0.2	0.1	0.4		9.6	
Eastern Yorkshire	No	15,351	4,653	1,840	1,104	568	365	242	129	108	90	52	32	112	24,646	6,863	31,509
	%	62.3	18.9	7.5	4.5	2.3	1.5	1.0	0.5	0.4	0.4	0.2	0.1	0.5		21.8	

Source: (Appendix II (a) and II (b)) PURDY J. Hearth Tax Returns for Yorkshire (unpublished M.Phil. Thesis, University of Leeds, 1975).

APPENDIX III (a)

Availability of Occupational Information in Parish Registers of Eastern Yorkshire Towns

Town	Date			
	1720-25	1750-55	1780-85	1810-15
Beverley	X	X	X	X (St John 1812-15)
Bridlington	X	X	-	X (1813-15)
Easingwold	-	X	X	X
Hedon	X	X	X	X
Great Driffield	-	-	X	X
Helmsley	-	-	X	X
Hornsea	-	X (patchy)	X (1783-85)	X (1813-15)
Howden	-	-	X	X
Hunmanby	-	-	-	X
Kilham	-	X	X	X
Kirkby Moorside	-	-	X (1783-85)	X (1811-15)
Malton	X	X	X	X
Market Weighton	X	X	X	X (1813-15)
Patrington	X	X	X	X (1813-15)
North Frodingham	-	-	-	X (1813-15)
Pickering	-	-	-	X (1813-15)
Pocklington	-	-	-	X (patchy)
Scarborough	-	-	-	X (1813-15)
Snaith	-	-	X (1783-85)	X (1812-15)
South Cave	-	-	-	X (1811-15)
Selby	-	X (patchy)	X	X
Thirsk	X	X	X	X
Thorne	X (1723-4 missing)	X	X(1781-85)	X (1813-15)

Methodology

Each occupational entry in the baptism registers was counted for each six year period for the twenty three country towns and the numerical totals obtained were converted to percentages. For the case studies of the second part of the thesis, each occupational entry in the baptismal and burial registers for each of the six towns was recorded in the period 1710-1840, and a similar procedure was adopted. As baptisms tend to over-inflate numbers and burials to under-inflate them, the mean percentage from both registers was calculated to provide a balanced view of town economy.

Labourers were the main problem in both analyses for they could account for as much as 40% of all entries. The exact nature of their employment, however, is not known and therefore labourers were expressed in the analysis as a percentage of the total workforce only; they were excluded from the detailed analysis of the strength of individual occupational groups. This procedure made parish register and directory material more directly comparable. Furthermore, evidence from the 1851 census enumerators' returns indicated that the number of general labourers was small, and that labourers, agricultural workers apart, were divided fairly evenly among the various town trades and industries.

APPENDIX III (b)

Number of Entries and Percentage Coverage of Directories

Town	1791		1823		1849	
	No	%	No	%	No	%
Beverley	245	4.5	559	8.3	872	9.8
Bridlington	193	6.2	548	12.8	592	10.1
Easingwold	127	5.0	231	12.0	205	9.2
Great Driffield	92	6.5	307	13.3	254	6.4
Hedon	37	6.25	113	12.5	118	11.5
Helmsley	26	1.8	92	6.0	159	10.7
Hornsea	NA	-	78	9.9	133	14.1
Howden	133	11.5	219	10.5	322	12.9
Hunmanby	69	9.1	99	9.7	73	5.6
Kilham	81	13.8	85	8.7	69	5.5
Kirkby Moorside	72	5.2	121	6.5	233	12.7
North Frodinham	NA	-	51	8.9	NA	-
Market Weighton	158	13.3	177	6	207	10.3
Malton/Norton	NA	-	344	6.6	602	9.8
Patrington	45	5.0	105	8.4	115	6.3
Pickering	42	2.1	275	10.0	291	9.4
Pocklington	126	12.0	244	12.4	311	12.2
Selby	45	1.6	302	7.4	519	9.7
South Cave	NA	-	74	8.4	69	7.4
Thirsk	93	4.4	355	14.0	383	12.8
Thorne	27	1.0	168	4.8	260	7.5
Snaith	68	9.8	98	11.7	125	14.9
Scarborough	207	3.2	874	10.7	1428	11.7
MEAN % Coverage =		6.6		9.5		9.6

* 1801 Population used.

% = Percentage of Town Population represented in directory.

APPENDIX III (c)

Functions Used in Measuring Urban Status

1. Retailing

(a) Retail

Butcher
Baker
Bookseller/Stationer
Chemist/Druggist
Confectioner
Fruiterer
Fishmonger
Pawnbroker
Ironmonger/Hardward
Toy Dealer
Grocer
Tea Dealer
Draper
Clothing Trades (ie. Hosier, Haberdasher, Mercer, Clothes Broker, Hatter)
Glass/China/Earthenware
Inns/Hotels/Taverns
Shopkeepers/Provision Dealers
Hairdresser/Perfumer
Furniture Broker
Jeweller
Music/Musical Instrument Dealer
Newsagent
Eating Houses
Temperance Coffee House/Hotel
Coffee Dealer
Cutlery Dealer
Tobacconist
Law Stationer

(b) Wholesale

Butter/Bacon/Ham/Cheese Factor
Spirit/Wine/Porter/Brandy Merchant

Coal Merchant
Corn Merchant
Lime Merchant
Flour Merchant
Timber/Raff Merchant
Oil/Bone/Seed Merchant
Horse/Cattle Dealer
Salt Merchant
Game Dealer

2. Professional

Physician
Surgeon
Apothecary
Schoolmaster
Exciseman/Customs
Attorney
Surveyor
Coroner
Bank
Savings Bank
Fire and Life Insurance Officers
Auctioneer/Appraiser
Vet
Land Agent
Transport/Shipping Agent
Commission Agent
House Agent (Building Society)
Accountant
Registrar
Professor and Teacher
High Constable/Chief Constable/Sherriffs Officer
Relieving Officer
Dentist
Tax Collector/Inland Revenue Officer
Brokers (Shipping and Insurance/Stocks and Shares)
Newspaper Editor
Architect
Treasurer/Cashier

Appendix IV

Social Scores and Rank of Eastern Yorkshire Towns, 1791 - 1849

Town	Date 1791			1823			1849		
	S	%	R	S	%	R	S	%	R
Scarborough	76	14.4	1	178	12.6	2	364	15.7	1
Pickering	69	13.0	2	66	4.7	8	80	3.4	10.5
Thirsk	67	12.7	3	24	1.7	14.5	63	2.7	1.2
Beverley	59	11.1	4	337	23.8	1	335	14.4	2
Howden	48	9.0	5	51	3.6	9	101	4.3	8
Hedon	31	6.4	6	124	8.7	4	80	3.4	10.5
Malton	29	5.5	7.5	89	6.3	6	247	10.6	3
Market Weighton	29	5.5	7.5	40	2.8	11	52	2.2	14
Kilham	27	5.1	9.5	0	0.0	21.5	18	0.8	20
Selby	27	5.1	9.5	19	1.3	16	150	6.5	6
Pocklington	17	3.2	11	67	4.7	7	115	4.9	7
Bridlington	10	1.9	14	122	8.6	5	163	7.0	5
Easingwold	10	1.9	14	44	3.1	10	50	2.1	15
Great Driffield	10	1.9	14	133	9.4	3	226	9.7	4
Helmsley	10	1.9	14	35	2.5	13	41	1.8	16
Patrington	10	1.9	14	17	1.2	17	24	1.0	19
Hornsea	0	-	19.5	37	2.6	12	25	1.1	18
Kirkby Moorside	0	-	19.5	24	1.7	14.5	54	2.3	13
Snaith	0	-	19.5	3	0.2	19	40	1.7	17
South Cave	0	-	19.5	3	0.2	19	5	0.2	21.5
Thorne	0	-	19.5	3	0.2	19	83	3.6	9
Hunmanby	0	-	19.5	51	3.6	9	5	0.2	21.5

S = Score

% = Percentage contribution to Total Social Score (all country towns)

R = Rank

APPENDIX V (a)

Great Driffield - Number and % of Taxpayers in each Taxation Class, 1782-1832.

TAX	DATE										
	1782	1792		1802		1812		1822		1832	
		No	%	No	%	No	%	No	%	No	%
Under 4/-	NA	24	29.2	54	48.2	54	47.8	41	38.3	44	40.7
4/- - 10/-	NA	30	36.6	34	30.3	32	28.3	36	33.6	35	32.4
10/- - £1	NA	12	14.6	7	6.3	9	8.0	9	8.4	8	7.4
£1 - £5	NA	11	13.4	14	12.5	16	14.1	18	16.8	18	16.6
£5 - £10	NA	2	2.5	-	-	-	-	2	1.9	2	1.9
£10 - £20	NA	1	1.2	1	0.9	-	-	-	-	-	-
Over £20	NA	2	2.5	2	1.8	2	1.8	1	1.0	1	1.0

Source: H.C.R.O. LTA/QDE

APPENDIX V (b)

VARIABLE	DESCRIPTION
1.	Percentage of the total population resident in each town area.
2.	Percentage of the total number of town-born inhabitants resident in each town area.
3.	Percentage of the total number of East Yorkshire-born inhabitants resident in each town area.
4.	Percentage of the total number of other Yorkshire-born inhabitants resident in each town area.
5.	Percentage of the total number of inhabitants born in other English counties resident in each town area.
6.	Percentage of the total number of Irish-born inhabitants resident in each town area.
7.	Percentage of the total number of household heads in socio-economic group I resident in each town area.
8.	Percentage of the total number of household heads in socio-economic group II resident in each town area.
9.	Percentage of the total number of household heads in socio-economic group III resident in each town area.
10.	Percentage of the total number of household heads in socio-economic group IV resident in each town area.
11.	Percentage of the total number of household heads in socio-economic group V resident in each town area.
12.	Percentage of the total number of household heads occupied in agricultural activities resident in each town area.
13.	Percentage of the total number of household heads occupied in building trades resident in each town area.
14.	Percentage of the total number of household heads occupied in retail trades resident in each town area.
15.	Percentage of the total number of household heads occupied in manufacturing activity resident in each town area.
16.	Percentage of the total number of household heads occupied in professional service resident in each town area.

APPENDIX V (b)

Location of Demographic, Social and Economic Groups - Great Driffield 1851.

	Variables															
TOWN/STREET/AREA	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
								%								
Beverley Lane, George Street, Union Street, Prospect Row, Pinfold Place	5.0	5.7	4.1	9.0	1.9	-	2.5	1.0	2.8	10.5	8.3	6.3	11.8	0.9	6.8	6.3
Beverley Road	1.0	0.7	1.1	1.9	0.6	-	-	0.5	1.5	0.5	-	1.4	1.7	0.9	0.4	-
New Road	5.3	4.5	5.5	4.8	14.2	-	25.6	5.5	7.2	4.1	-	2.8	1.7	11.0	4.8	20.0
Brewery Lane, Promise Square, Church Lane	4.1	4.3	4.0	3.8	3.2	-	7.7	4.5	4.0	7.6	5.8	9.8	3.4	0.9	5.3	2.1
North End	3.7	4.0	3.0	2.6	1.9	40.0	-	1.5	4.4	2.3	7.5	3.5	5.0	3.6	2.5	-
Bridge Street	2.9	2.5	2.4	2.9	3.9	31.4	15.4	7.1	6.3	5.2	1.6	2.1	-	1.8	2.5	5.3
Mill Street, Kings Mill, Mill Cottages	2.6	2.8	2.9	1.3	1.3	-	2.5	4.5	4.7	2.3	-	3.5	1.7	5.5	4.4	5.3
Westgate, Dossers Place	11.2	13.1	10.7	9.7	8.4	-	2.5	4.5	11.6	5.8	28.3	4.2	5.1	8.3	11.5	9.5
Washington Street	4.1	4.6	4.0	3.2	3.2	2.8	2.5	0.5	4.3	7.6	1.6	7.7	5.1	2.7	3.8	2.1
Eastgate	10.8	11.0	11.3	9.7	6.5	-	12.9	9.6	9.4	18.1	14.2	18.8	16.9	3.8	6.8	10.6
Middle Street	25.5	23.5	26.3	28.7	26.6	17.1	25.6	45.2	24.4	7.0	9.2	6.3	28.8	47.3	28.2	35.8
Canal Head	2.9	1.7	2.3	1.8	9.3	-	2.8	2.5	1.6	1.7	-	2.8	1.8	3.8	1.7	1.0

APPENDIX V (b) Continued)

TOWN/STREET/AREA	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
								%								
St. John's Street, Dye House Garth Lane	1.9	2.3	1.5	1.6	3.9	2.8	-	0.5	1.4	2.9	4.2	2.8	1.7	-	0.8	-
East Cottages, Wansford Road	2.5	1.1	3.5	3.8	0.6	5.9	-	0.5	2.8	1.1	-	1.4	-	-	3.0	-
Bandmakers Lane, Chapel Lane, Doctors Lane, Brook Row, Providence Place	10.2	12.6	8.5	9.0	7.8	-	-	2.0	1.6	16.9	15.0	12.5	11.8	13.8	14.5	1.0
Market Place	1.6	1.5	1.4	2.9	3.9	-	-	2.5	0.6	0.5	-	0.7	1.8	3.8	1.3	-
Rest of Parish	5.2	4.1	7.4	3.5	2.8	-	-	7.6	1.2	5.3	4.3	13.4	1.7	0.9	1.7	1.0

For key to Variables see Appendix V (b)

APPENDIX VI (a)

Market Weighton - Number and % of Taxpayers in each Taxation Class, 1782-1832.

TAX	DATE											
	1782		1792		1802		1812		1822		1832	
	No	%	No	%	No	%	No	%	No	%	No	%
Under 4/-	-	-	5	5.3	15	12.7	15	13.6	14	13.3	34	26.7
4/- - 10/-	54	57.2	56	58.3	62	52.5	57	51.8	57	54.3	44	34.6
10/- - £1	18	18.9	19	19.8	22	18.6	17	15.4	11	10.4	28	22.0
£1 - £5	20	20.8	14	14.6	16	13.5	18	16.5	20	19.0	19	14.9
£5 - £10	-	-	-	-	1	0.9	1	0.9	1	1.0	-	-
£10 - £20	1	1.0	1	1.0	1	0.9	1	0.9	1	1.0	1	0.9
Over £20	2	2.1	1	1.0	1	0.9	1	0.9	1	1.0	1	0.9

Source: H.C.R.O. LTA/QDE

APPENDIX VI (a)

Pocklington - Number and % of Taxpayers in each Taxation Class, 1782-1832.

TAX	DATE											
	No	%	No	%	No	%	No	%	No	%	No	%
Under 4/-	43	35.5	45	35.4	60	38.2	58	37.9	70	44.8	51	33.3
4/- - 10/-	39	32.2	38	29.9	53	33.7	51	33.3	45	28.8	63	41.2
10/- - £1	20	16.5	26	20.5	22	14.0	18	11.8	15	9.6	17	11.0
£1 - £5	16	13.2	15	11.8	19	12.1	25	16.3	25	16.1	19	12.4
£5 - £10	2	1.7	1	0.8	2	1.3	-	-	-	-	1	0.7
£10 - £20	-	-	1	0.8	-	-	-	-	-	-	1	0.7
Over £20	1	0.9	1	0.8	1	0.7	1	0.7	1	0.7	1	0.7

Source: H.C.R.O. LTA/QDE

APPENDIX VI (b)

Location of Demographic, Social and Economic Groups - Market Weighton 1851.

	Variables															
TOWN/STREET/AREA	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
	%															
Southgate	22.5	24.6	22.3	16.9	16.8	9.6	42.1	28.7	20.2	28.0	14.2	29.3	30.0	13.3	26.3	34.7
Hungate	9.8	8.8	11.5	8.7	7.9	-	10.5	13.7	3.3	10.9	31.4	12.5	-	3.7	6.5	13.0
East End of Market Place	11.3	10.4	10.0	12.2	23.8	12.9	15.7	5.5	16.9	5.5	2.7	6.8	20.0	20.7	10.5	10.8
West End of Market Place	15.6	15.4	15.9	25.7	13.9	3.2	15.7	12.3	27.3	5.6	22.8	5.0	20.0	35.8	25.0	15.2
St. Helen's Square Arch, Church Lane	4.4	4.2	4.5	5.8	-	6.6	10.5	4.1	4.0	6.8	17.1	6.8	5.0	5.6	3.9	4.3
Northgate, Linegate	28.1	27.5	27.0	27.9	33.6	64.6	5.3	20.5	27.0	36.4	12.8	28.1	20.0	20.9	27.5	19.5
Holme Road	5.1	7.0	4.2	1.4	3.0	-	-	4.3	1.3	6.8	5.7	6.2	5.0	-	0.3	2.5
Rest of Parish	3.2	1.9	4.6	1.4	1.0	3.3	-	10.9	-	-	3.3	5.3	-	-	-	-

For key to Variables see Appendix V (b)

APPENDIX VI (b)

Location of Demographic, Social and Economic Groups - Pocklington 1851.

TOWN/STREET/AREA	Variables 1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
	%															
Great George Street, York Terrace	11.5	10.9	13.5	12.2	19.2	2.0	19.4	14.6	13.6	11.2	12.7	10.9	24.4	7.9	10.8	24.6
New Pavement, Tute Hill	4.5	5.1	2.8	3.6	14.3	6.0	2.7	5.3	6.1	3.7	1.8	4.1	2.4	6.5	4.8	-
Chapmangate, Smithy Hill	17.9	18.4	16.8	18.3	20.4	4.0	33.6	10.6	13.6	24.3	32.7	22.6	9.8	11.8	16.5	24.6
New Street, Deans Lane, Peter Lane, Peter Square	6.0	6.6	6.1	5.3	2.0	-	-	-	8.7	5.6	-	4.1	9.8	9.2	8.6	-
Regent Street, South Parade	5.4	4.8	5.9	8.5	5.1	-	13.8	5.3	8.7	4.3	1.8	3.4	9.7	5.3	7.7	13.8
Market Place	11.7	12.9	10.9	11.1	10.2	10.0	5.8	16.0	19.3	2.5	1.8	0.6	12.2	31.6	18.7	4.6
Swine Market, Church Lane, Brass Castle Hill	11.8	11.7	13.3	9.8	8.1	2.0	2.7	12.0	14.0	10.6	14.8	10.2	9.7	14.4	16.5	6.7
Union Street	6.0	5.4	6.2	7.3	9.2	4.0	5.5	1.3	5.7	7.5	3.6	6.1	7.3	5.3	3.6	6.7
London Street	8.6	8.6	6.5	5.5	9.2	56.0	5.5	2.6	1.7	18.1	10.9	19.2	-	1.5	2.8	4.6
Finkle Street, Grape Lane	3.8	4.3	3.4	3.6	6.1	-	-	2.6	3.9	4.8	10.9	4.8	12.2	2.6	4.3	1.8
Canal Head, West Green	5.8	4.4	5.8	11.8	5.2	-	8.3	16.4	3.2	3.7	9.0	4.1	2.5	3.9	5.0	12.6
Rest of Parish	7.0	6.9	8.8	3.0	1.0	16.0	2.7	13.3	1.5	3.7	-	9.5	-	-	0.7	-

For key to Variables see Appendix V (b)

APPENDIX VII (a)

Hedon - Number and % of Taxpayers in each Taxation Class, 1782-1832.

TAX	DATE											
	1782		1792		1802		1812		1822		1832	
	No	%	No	%	No	%	No	%	No	%	No	%
Under 4/-	-	-	32	41.0	31	41.3	28	39.4	24	36.3	25	40.3
4/- - 10/-	44	70.9	30	38.5	27	36.0	26	36.6	22	33.3	19	30.6
10/- - £1	8	12.9	10	12.8	10	13.3	10	14.0	10	15.2	7	11.3
£1 - £5	9	14.5	5	6.4	6	8.1	6	8.5	9	13.7	10	16.2
£5 - £10	1	1.7	1	1.3	1	1.3	1	1.5	1	1.5	1	1.6
£10 - £20	-	-	-	-	-	-	-	-	-	-	-	-
Over £20	-	-	-	-	-	-	-	-	-	-	-	-

Source: H.C.R. 'LTA/QDE

APPENDIX VII (a)

Howden - Number and % of Taxpayers in each Taxation Class, 1782-1832.

TAX	DATE											
	1782		1792		1802		1812		1822		1832	
	No	%	No	%	No	%	No	%	No	%	No	%
Under 4/-	30	20.8	41	28.3	51	32.1	44	29.1	40	28.3	43	28.3
4/- - 10/-	60	41.6	51	35.2	55	34.6	57	37.7	54	38.3	62	40.8
10/- - £1	24	16.8	25	17.2	27	16.9	17	11.2	15	10.6	15	9.9
£1 - £5	18	14.5	21	14.5	18	11.5	25	16.5	24	17.0	26	17.1
£5 - £10	7	4.9	5	3.4	4	2.8	5	3.3	6	4.3	2	1.3
£10 - £20	1	0.7	1	0.7	2	1.4	2	1.5	1	0.8	3	1.9
Over £20	1	0.7	1	0.7	1	0.7	1	0.7	1	0.7	1	0.7

Source: H.C.R.O. LTA/QDE

APPENDIX VII (a)

Patrington - Number and % of Taxpayers in each Taxation Class, 1782-1832.

TAX	DATE											
	1782		1792		1802		1812		1822		1832	
	No	%	No	%	No	%	No	%	No	%	No	%
Under 4/-	4	7.3	-	-	28	34.1	25	34.2	33	41.7	32	40.5
4/- - 10/-	22	40.0	17	34.0	21	25.6	15	20.5	13	16.4	16	20.3
10/- - £1	10	18.2	11	22.0	13	15.8	17	23.3	19	24.0	13	16.5
£1 - £5	14	25.5	18	36.0	18	21.8	11	15.0	12	15.3	13	16.5
£5 - £10	3	5.4	2	4.0	2	2.4	2	2.8	-	-	2	2.5
£10 - £20	1	1.8	1	2.0	-	-	2	2.8	1	1.3	2	2.5
Over £20	1	1.8	1	2.0	1	1.2	1	1.4	1	1.3	1	1.2

Source: H.C.R.O. LTA/QDE

APPENDIX VII (b)

Location of Demographic, Social and Economic Groups - Howden 1851.

TOWN/STREET/AREA	Variables 1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
	%															
Pinfold Street, Tan Yard	10.5	11.6	8.9	7.7	15.3	18.3	14.3	5.4	13.8	16.8	14.3	19.0	6.7	6.5	12.5	11.8
Marsh End, St. John's Street, Applegate, Wright's Place	15.7	18.4	13.3	13.3	11.9	10.2	9.5	9.0	15.7	26.5	10.2	21.0	10.0	6.5	16.5	11.8
Bridgegate, Wood Lane	14.3	16.0	14.7	12.4	7.7	4.0	23.8	20.7	13.3	8.8	6.1	10.0	16.7	28.9	10.6	18.6
Flatgate	9.5	8.3	12.6	9.8	4.3	8.2	9.6	7.2	11.4	11.6	8.2	18.0	6.7	6.5	9.9	6.6
Market Place, Highbridge	9.8	8.4	9.1	13.6	18.8	-	19.0	17.1	10.8	2.6	2.0	2.0	6.7	25.0	12.6	6.6
Church Yard, Vicar Lane, Corn Market Hill	7.3	5.9	7.2	9.3	4.3	10.2	-	10.8	8.5	4.4	10.3	3.0	3.3	5.3	11.3	7.4
Hailgate, Bishopgate	27.5	28.8	25.6	27.0	34.3	30.6	23.8	26.2	25.6	28.5	46.9	23.0	40.0	19.8	26.6	35.5
Rest of Parish	5.4	2.6	8.6	6.9	3.4	18.5	-	3.6	0.9	0.8	2.0	4.0	-	1.5	-	1.7

For key to Variables see Appendix V (b)

APPENDIX VII (b)

Location of Demographic, Social and Economic Groups - Hedon 1851.

TOWN/STREET/AREA	Variables															
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
	%															
Soutergate	21.5	25.1	17.9	13.4	23.8	15.5	26.0	21.2	21.7	18.5	25.0	23.3	27.7	12.0	21.8	21.0
Market Place	12.7	12.0	9.9	19.4	16.6	15.5	21.0	9.1	15.2	11.0	10.0	26.7	16.6	25.0	15.2	13.1
George Street, Kings Place Holyrood	8.1	6.3	11.2	8.9	9.5	6.8	6.6	9.1	10.8	7.4	10.0	-	11.2	8.0	13.0	10.5
Magdalen Gate, Magdalen Row	4.0	5.5	3.5	1.6	-	4.4	-	6.0	4.3	7.4	5.0	-	-	-	2.2	2.6
St. Augustine's Gate	20.6	18.6	20.2	11.9	26.2	53.3	-	9.1	23.9	16.6	10.0	16.7	3.5	20.0	34.8	7.9
Fletchergate	7.7	5.9	12.8	-	7.1	2.2	13.3	18.2	1.2	1.8	-	6.7	-	-	-	18.4
Baxtergate, Bird Row, Burgess Row, Grape Lane, Stone Yard	10.2	10.5	11.2	14.9	7.1	2.3	6.6	9.1	9.8	24.0	15.0	23.3	22.3	8.0	4.3	5.2
Market Hill, Ivy Hill, Swing Lane, Church Side	5.4	5.2	3.8	16.4	7.3	-	13.3	12.2	2.3	3.9	15.0	3.3	5.5	3.0	4.3	13.3
Sheriff Highway	5.0	5.3	3.2	13.5	2.4	-	6.6	6.0	5.4	3.8	10.0	-	-	8.0	2.2	5.4
Havenside	4.8	5.6	6.3	-	-	-	6.6	-	5.4	5.6	-	-	11.2	16.0	2.2	2.6

For key to Variables see Appendix V (b)

APPENDIX VII (b)

Location of Demographic, Social and Economic Groups - Patrington 1851.

	Variables															
TOWN/STREET/AREA	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
	%															
Humber Lane, Ings Lane, Westgate	12.5	14.1	13.1	13.0	7.9	-	30.0	13.7	9.5	15.1	4.7	18.5	17.2	2.7	11.8	19.2
North Side	9.0	10.3	8.8	5.2	3.9	5.0	-	15.6	10.4	8.2	-	10.0	17.2	2.7	16.9	3.8
Welwick Road	3.1	2.8	4.2	2.6	1.3	-	10.0	7.8	1.9	2.0	19.0	3.3	-	2.7	3.3	3.8
High Street	6.1	6.1	6.3	9.1	6.6	-	10.0	1.9	13.4	4.1	-	4.2	10.3	16.6	11.8	3.8
Market Place, Pump Row	16.7	18.3	18.2	6.5	15.8	8.3	-	19.6	22.8	16.4	23.8	16.8	3.4	41.6	22.0	15.4
Greenshaw Lane	9.6	10.0	9.3	10.4	5.3	-	30.0	11.8	6.6	9.6	-	6.7	20.7	8.3	3.3	23.2
Vicar Lane	3.4	2.8	2.8	3.9	18.4	-	-	7.8	4.8	3.4	-	2.5	13.8	-	3.5	7.7
White Crop	6.0	6.1	7.3	5.2	6.6	-	-	4.0	5.7	8.8	14.3	12.6	6.9	2.7	3.5	-
Havenside	19.5	19.8	14.2	23.4	17.1	48.3	-	2.0	17.3	21.2	38.2	14.3	3.4	22.2	6.7	3.8
Enholmes, Factory Cottages	6.1	3.3	5.0	11.7	11.8	35.0	10.0	-	3.8	7.5	-	4.2	3.4	-	11.9	3.8
Rest of Parish	8.0	6.4	10.8	9.0	5.2	3.4	10.0	15.8	3.8	3.7	-	6.9	3.4	-	5.0	15.5

For key to Variables see Appendix V (b)

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(A) PRIMARY SOURCES

(i) Unpublished

Humberside County Record Office, Beverley - H.C.R.O.

AP	Acts of Parliament
CSR	Commissioner of Sewers
DDBC	Beverley Corporation
DDBD	Miss L. Bird
DDCK	Messrs. Watson, Carrick and Sons, Hull
DDGR	Grimston of Grimston Garth
DDHE	Hedon Corporation Records
DDIV	Iveson, West and Wilkinson
DDMW	Mr. B. Allison
DDPK	Mr. P.F. Bilton, Hull
DDPY	Messrs. Powell and Young, Pocklington
DDTR	Taylor, Broomer and Company
DDX	Miscellaneous collections
DP	Documents purchased
DPX	Deposited Plans
LTA	Land Tax Returns
MR	Methodist Records
PR	Parish Registers, Churchwardens Accounts, Vestry Minutes, Tithe Awards
QDE/QDJ/QDT	Quarter Sessions
RDB	Enclosure Awards
TTBF/TTBM/TTYK	Turnpike Trust Records

Hull University Archives - H.U.A.

DDCV	Messrs. Crust, Todd and Mills, Beverley
DDJ	Dunnington-Jefferson of Thicket Priory
DDEV	Maxwell Constable of Everingham
DDLA	Langdale of Holme on Spalding Moor
DDLO	Londesborough settled estates
DDSY	Sykes of Sledmere
DDWA	Pennington of Warter

Borthwick Institute of Historical Research, York - B.I.H.R.

CD/CCD	Tithe Plans
CC Pr	Enclosure Plans
DMH	Dissenting Meeting House Registers
PR	Parish Registers
PRT	Parish Register Transcripts
TA	Tithe Awards

North Yorkshire County Record Office, Northallerton - N.Y.C.R.O.

PR	Parish Registers
PRT	Parish Register Transcripts

Public Record Office - P.R.O.

RAIL	Canal/Railway Records

British Museum - B.M.

BS. Add Mss	Additional Manuscripts

Brotherton Library, Leeds

Brotherton Library Manuscripts

York City Record Office and Hull City Record Office

Apprentice Indentures

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