MANAGING THE MARKET PLACE: THE CONSORTIUM APPROACH

David Ball and Susan Wright

Paper presented at the the National Group on Consortium Purchasing for Academic Libraries conference 'Managing the Market Place', UMIST, Manchester, June 1997

The funding context of higher education is examined, together with some of the constraints and imperatives to which it gives rise. The history, constitution and operation of the Southern Universities Purchasing Consortium's Libraries Project Group are discussed. The paper closes with a discussion of possible future roles for purchasing consortia.

The Higher Education context

We shall first illustrate briefly the funding context within which libraries in higher education institutions (HEIs) operate. The illustrative statistics cover the academic years 1983/84-1993/94, and are taken from the LISU Annual Library Statistics 1995. There are unfortunately two sets of statistics, one for 'old' universities, one for 'new', compiled for historical reasons on rather different bases. Despite these differences some trends common across the whole sector do emerge.

Historical statistics

Taking first the LISU table 'Summary Statistics of Old University Libraries - Great Britain' (Fig.1), the most striking factor is the rise over the period in student numbers from 326,000 to 523,000. This rise is accompanied by a (smaller) rise in the number of academic and academically related staff, from 55,000 to 73,000. Since the number of full-time equivalent professional library staff shows a slight fall, from 1398 to 1359, these must be chiefly teaching and research staff.

Taken together, these figures show a rise in the user population of 56%. The ratio of users (students and staff) to each member of professional staff shows an even higher rise, from 262 to 420, that is 60%.

Absolute expenditure shows some significant rises, particularly for periodicals, from £13.9m to £35.5m. However, if adjusted to take account of inflation and the rise in student numbers, the figures paint a very different picture. Total real library expenditure per capita shows a fall of 20% from £331 to £264 (1993 prices converted using the GDP deflator). The fall in real spend per capita is however much greater for books and periodicals. The real spend on books per capita (at 1993 prices, converted using the
LISU academic book price index) falls from £64.60 to £35.65, that is by 45%. The real spend on serials per capita (at 1993 prices converted using Blackwell’s Periodicals Price Index) falls from £103.38 to £59.59, that is by 42%.

The table ‘Summary Statistics of the Average New University Library’ (Fig. 2) portrays a similar situation. For the average new university library, the user population has risen from 9012 to 17026, that is by 88%. The number served by each member of professional library staff has risen from 369 to 604, that is by 64%.

Using the same deflators as for ‘old universities’, absolute expenditure has declined by 10% from £148.40 to £134.03; the real book spend by 32% from £31.80 to £24.75; the real periodicals spend by 53% from £37.80 to £18.40 (all figures per capita).

Over the past eleven years, both parts of the higher education sector have therefore experienced:

a) large increases in student numbers;
b) increases approaching two thirds in users per member of staff;
c) decreases approaching 50% in real spend per capita on books and serials.

Future trends

While the future should not show a similar increase in student numbers, which government policy will hold fairly constant, pressure on library budgets will continue.

Real funding per full-time equivalent student will decline, as universities absorb pay rises. There are few signs that inflation in book and periodical prices will decline to the level of RPI inflation. The value of the student grant will decline, as students are expected to contribute more to their own maintenance, or even to fees, either through loans, earnings or savings; there is no incentive to spend part of a shrinking grant on books.

New technology is welcome, and offers opportunities for new services and alternative methods of delivery. But only in relatively few places does the digital form offer a direct replacement for the hard copy; even then it puts increased pressure on capital budgets. Innovation also necessitates additional staff training and user education.

Teaching methods have changed and the trend to resource-based, that is library-intensive, learning will continue. The proportion of non-traditional students (eg part-timers, distance learners) will continue to increase: indeed it has been argued that, since 80% of ‘full-time’ students have part-time jobs, the full-time student is in fact a rarity. Such students require more support and longer opening hours.

Imperatives

This analysis of the financial and cultural context in which higher education libraries operate exposes a number of management imperatives:

Target staff resources

It is a cliché to see staff as the most valuable resource of an organisation. Nevertheless, in the modern library we gain most from customer care, or front-of-house operations, from liaison with our academic staff and from technical innovation. The background operations, for instance of acquiring and processing books and serials, are necessary to our efficient functioning, but not the highest priority for a scarce and valuable resource.

Gain value for money

In this competitive market place, with suppliers chasing library purses that are shrinking in real terms, the customer can demand the lowest prices combined with a high-quality service. However, just like manufacturing industry, we also require stable long-term relationships with suppliers, whom increasingly we regard as partners in our operations.

Exploit new communications technology

Much ink has been expended on the importance of new technologies for the delivery of teaching. At a more mundane level, we should not underestimate the potential of electronic communication with our users (eg electronic capture of inter-library loan requests or book suggestions) and our suppliers (eg EDI, uploading check-in data from serials agents). Real efficiency gains are possible, by shaking
time, paper and duplication out of the acquisitions process.

**Precipitate the electronic publishing revolution**

We are still waiting for the full benefits of the electronic publishing revolution. Our users know what is possible. Frustratingly we are not yet in a position to deliver it to them, largely because the electronic corpus does not yet exist.

**Enter strategic partnerships**

Individual libraries alone cannot achieve academic value for money, exploit new communications effectively, and precipitate the electronic publishing revolution. Indeed, *pace* eLib, the higher education sector probably cannot in isolation create and exploit new technologies. It is only through co-operation and partnership, both with other elements of the higher education sector and with suppliers and producers, that libraries can hope to radically alter the market place.

**The Southern Universities Purchasing Consortium**

**Background**

One outstanding example of co-operation within the HE sector is the Southern Universities Purchasing Consortium (SUPC). Founded in 1974, it is a mature and flourishing organisation, open to institutions in receipt of HEFCE funding. At the time of writing there are 29 full members, and 4 associate members. Despite the size it is very focused; only HEIs, chiefly universities, are members.

One important characteristic is that parent institutions, not libraries, are members. There is generally commitment to the SUPC at the highest level within these institutions; other bodies, such as funding agencies and auditors, are aware of its activities. There is therefore institutional and sectoral expectation that full use will be made of SUPC-negotiated agreements.

The SUPC is generally regarded as one of the more successful consortia. This success arises partly from its size: on published statistics, the members have a combined spending power approaching £1bn. It also derives from the level of activity, seeded by a full-time professional Regional Purchasing Co-ordinator and two Assistants, aided by increasing numbers of purchasing professionals in individual HEIs.

**Aims and objectives**

Of the aims and objectives of the SUPC, we would highlight the following:

a) 'the negotiation of special discounts on a group basis';

b) 'to secure the advantages of group purchasing';

c) 'raising the purchasing profile at all levels';

d) 'seeking and developing strategic alliances'.

Using the muscle offered by group purchasing is fairly obvious. However it must be borne in mind that the SUPC is a combination formed by very different, completely autonomous HEIs. There is little scope or indeed infrastructure for centralised purchasing and distribution.

One of the most important aspects of SUPC activity is raising the level of purchasing professionalism. This is achieved partly by example, partly by involving other professions through the project-group structure, but also by education and training.

As we noted earlier the formation of strategic alliances with other consortia and public organisations is an important means of managing the purchasing environment.

**Obligations**

Membership of a consortium of course brings obligations as well as benefits. Members are expected to keep confidential information such as the terms of SUPC agreements, and also to abide by the ethical code of the Institute of Purchasing and Supply.

But the most important obligation is active participation in consortium agreements. If members do not use the agreements a consortium will fail. Libraries in particular have in the past had fairly comfortable relationships with suppliers. This was due in part no doubt to the existence of the Net Book Agreement (NBA), which created an
The Libraries Project Group

The SUPC’s activities are structured in a number of Commodity Areas: Building and Site Services; Catering; Computing; Furniture and Related Equipment; Printing, Stationery and Office Equipment; Professional Services; Scientific Equipment and Laboratory Supplies. Each Commodity Area is then further structured into a number of Project Groups. Practically all areas of HE1 activity are covered. This breadth of scope demonstrates the importance of the partnership between purchasing professionals and professionals working in individual commodity areas.

Even within one project group, such as Libraries, the number of members gives rise to a wide variation in the requirements of any agreement. The SUPC will therefore typically negotiate with one or more suppliers a framework agreement, which will satisfy the majority of expressed needs of members. Individual libraries are then able, within the overall framework, to customise the agreement to their individual needs. Such agreements therefore have both universal and bilateral characteristics.

The SUPC has major agreements in place both for serials and for monographs and standing orders. The latter agreement is the more complex, and demonstrates the potential of consortium purchasing for securing substantial discounts.

The Serials Agreement

From its inception over 20 years ago SUPC had an informal arrangement with a subscription agent. This arrangement offered a retrospective rebate based on total SUPC spend, together with settlement discounts for advance payment of invoices. Journal prices were based on the agent’s list price; in many instances this price is higher than the publisher’s list price as it includes a handling charge. About 80% of SUPC members’ serials requirements were purchased through this arrangement.

In March 1995 SUPC recognised the need to tender formally this arrangement. The tendering process was carried out in accordance with the European Purchasing Directives. Potential suppliers were visited to assess their service capabilities. Financial assessments were also undertaken; these were of particular importance because of the practice of paying for serials in advance.

The tender was based on: discount, or handling charge, on the publisher’s list price; settlement discounts for advance payment of invoices; and retrospective discounts based on total consortium expenditure. This pricing structure allowed us easily to compare the bids on a like-for-like basis, especially as we did not have precise lists of journals purchased on which to base the evaluation. We also asked for prices for consolidation services. Consolidation services are particularly advantageous for North American journals. Members could decide on the consolidation services required and payment profile to suit their individual requirements.

Within our evaluation we took into account the cost of transfer of subscriptions. The contract was awarded to two agents and members were free to choose whichever agent they wished. The exercise realised savings, releasing additional funds for our members’ diminishing budgets. In percentage terms these savings were relatively small: agents themselves operate on small margins.

The Monographs and Standing Orders Agreement

Potentially 33 libraries could participate in the agreement. This number would obviously be attractive to suppliers, representing a significant slice of the academic market. It therefore gave the negotiators a good bargaining position.

But the number also posed problems of diversity. Member libraries buy all kinds of materials, including grey literature and standing orders, on the widest range of subjects, from all possible markets (UK, EU, US, etc.). They also have very diverse requirements for servicing, invoicing etc.

Before inviting suppliers to tender, a survey of the membership was undertaken to...
determine the likely spend, existing suppliers, and requirements for servicing.

The tender process itself aimed essentially for transparency of pricing, to eliminate the cross-subsidy of a wide range of servicing that operated under the NBA. Suppliers were therefore invited to tender:

- on the basis of discount from the publisher’s list price;
- for one or more of four markets: UK, Rest of Europe, North America, Rest of the World;
- quoting itemised individual servicing costs.

Prices were required for: covering paperbacks; strengthening books; jacketing hardbacks; ownership stamping; affixing barcodes, bookplates, security tags, date and spine labels; and for supplying cataloguing. Members would therefore be able to pick and mix on the basis of true servicing costs within an overall headline discount.

The suppliers who elected to tender were subject to routine financial checks. Those who could supply members' needs were then visited by representatives of the working group. These visits typically lasted several hours and were crucial to the selection process: they enabled the working group to get a real feel for the company, and particularly for its systems and quality procedures.

Those suppliers clearing all the hurdles were finally invited to meet the working group to provide a final clarification of their bids. The purpose of these meetings was to ensure that suppliers understood the basis on which the group was working, namely the transparency of pricing mentioned above, and were structuring their bids appropriately.

Following this stage a final evaluation of the bids was undertaken, and a recommendation put to a meeting of the Libraries Project Group. The outcome was that one supplier was accepted for the UK market, and a second for all the other three markets. Discounts of course varied from market to market, but were by any measure substantial.

---

**Benefits of consortium membership**

We identify four major benefits arising from consortium membership; the second is probably the most significant in the long term.

Firstly and most obviously, there are financial savings. Discount rates vary from the headline-grabbing percentage on UK monographs to much smaller rates on serials. In many universities' budgets however, small percentages on serials are significant in terms of actual money saved.

Secondly, we believe that the SUPC, and the other consortia active in the library sector, have radically affected the marketplace. Suppliers now realise that libraries will band together and, more importantly, will demonstrate their commitment to such associations by moving their business to recommended suppliers. Libraries now also require real transparency of pricing: it is their only means of taking informed decisions on the disposition of scarce resources.

Thirdly, librarians themselves are becoming much more aware of the procurement process, of market dynamics and of the power of group purchasing. Nearly all our staff are to a greater or lesser extent involved in the purchasing process. We all send messages, conscious or unconscious to our suppliers. It is the duty of those of us most closely involved to ensure that this awareness is increased.

Finally, consortia have increased the level of co-operation and partnership between libraries; they have brought into being new partnerships between libraries and purchasing professionals; and they are opening the door to new possibilities of partnership with other strategic players and with the suppliers themselves.

As the following quotation demonstrates there are some sceptics who do not share our estimation of the benefits arising from consortium membership:

The trend to Consortium buying means that there is a significant and powerful market trend in operation. Instead of the library making the decision on the selection of agency, based on personal contacts, cosy relationships and service provision, the men in grey suits become involved within the universities, and financial
considerations come more to the fore. There is a power struggle emerging between those who are aware primarily of the bottom line, and in particular to achieve cost savings and financial efficiencies [sic], and those who look at a broader picture whereby service has a greater role in helping the library sustain its overall activities. The increasing financial squeezes being felt by universities in the UK - some on the verge of bankruptcy - would imply that the ultimate power is increasingly in the hands of the financial administrators and no longer just the library.²

There are two particular myths here that we wish to dispel.

The first concerns 'men in grey suits'. It should be clear from our exposition of the two tenders that librarians themselves evaluate, recommend and implement SUPC agreements. Value for money is one essential criterion in such decision-making. Paying attention to it should not be denigrated: we are custodians of public money and accountable for it. However, value for money is only one criterion amongst several.

The second myth equates low cost with poor service. However, the dynamic of the library market is that major suppliers want market share, and will give high discounts to achieve it. At the same time, consortia of the size of SUPC have such a strong position, through the contract-review process, vis-à-vis suppliers, that they can ensure that quality of service starts high and improves. Indeed, quality of service is an essential criterion for judging potential suppliers.

It is particularly depressing that this quotation is part of an opinion-forming report published by the library and information community itself.

The future role of purchasing consortia

Obviously all active consortia have a full agenda: they have current agreements to manage, expiring agreements that will generate a new round of tendering, and new areas for tender.

But in addition to these bread-and-butter operations, there are three areas of activity in which we foresee consortia playing a significant role.

The contracting library

Let us take as an example the typical large university library of the mid-1970s. As a library it was pretty much self-contained and self-sufficient, with the obvious exception of inter-library loans. All cataloguing and classification was done by library staff; loans housekeeping was completely manual (slips and ledgers); there were probably no connections to online databases. There was a bindery on the premises, although, a straw in the wind, it could well be run by an outside company.

Over the last 20 years however, the walls of such large libraries have generally contracted.

They buy in catalogue records. Books may come ready-processed from the supplier. Investments in library housekeeping systems have largely replaced the manual donkey-work of filing. Serials may be bought as part of a consolidated service, arriving shelf-ready twice a week; each such parcel may even contain check-in information on a disk for automatic uploading to the library housekeeping system, with no data-entry by library staff.

More and more traditional mundane library work is therefore taking place outside the library's walls, in suppliers' warehouses or in the software developed by systems suppliers.

The electronic revolution has accelerated this process. It is routine now for the academic end-user to connect to external online databases, which replace the bibliographies traditionally held in house. In future the electronic availability of full-text source documents will replace holdings, Just-in-Case, with delivery, Just-in-Time.

The future will see more and more partnerships and co-operation, between libraries and their suppliers. Contracting, in the legal sense of the word, will therefore become more and more significant, and consortia will play a major role.

Electronic information

The eLib and Telematics projects are starting to reveal their technological potential. There is also the Pilot Site Licence Initiative (PSLI): now in its second year, a full-scale successor service will, we hope, emerge in 1999. We can foresee HE consortia banding together with the major
Managing the market place: the consortium approach

Regional libraries

We can foresee within the next four years cross-sectoral regional library systems coming into being. One major unifying element would be a common library housekeeping system, providing a union catalogue, and a shared database of borrowers with varying permissions in different constituent libraries. Economies of scale would be achieved through common central acquisitions services and facilities management.

Purchasing consortia obviously have a major role to play here too: what is abundantly clear is that co-operation and partnership are key to these future developments.

Envoi

Judging by changes seen in the last twenty years, only an optimist or a fool would try to predict the future. What does seem certain is that libraries will continue to contract, in both senses of the word.

Most weight-loss is healthy; consortia can be our dieticians.

<table>
<thead>
<tr>
<th>Table 3.36</th>
<th>SUMMARY STATISTICS OF OLD UNIVERSITY LIBRARIES - GREAT BRITAIN</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Number of universities</strong></td>
<td>45</td>
</tr>
<tr>
<td><strong>Students</strong></td>
<td>328</td>
</tr>
<tr>
<td><strong>Staff of University</strong></td>
<td>55</td>
</tr>
<tr>
<td><strong>Student : Staff ratio</strong></td>
<td>5.9</td>
</tr>
<tr>
<td><strong>Professional Librarians (FTE)</strong></td>
<td>1,398</td>
</tr>
<tr>
<td><strong>Students : Staff per Professional Librarian</strong></td>
<td>262</td>
</tr>
<tr>
<td><strong>University Total Expenditure</strong></td>
<td>1,976</td>
</tr>
<tr>
<td><strong>Library Expenditure</strong></td>
<td>15</td>
</tr>
<tr>
<td><strong>Proportion</strong></td>
<td>3.79</td>
</tr>
<tr>
<td><strong>Library Expenditure per Student (FTE)</strong></td>
<td>246</td>
</tr>
<tr>
<td><strong>Library Expenditure per capita</strong></td>
<td>196</td>
</tr>
<tr>
<td><strong>Real Library Expenditure per capita</strong></td>
<td>331</td>
</tr>
<tr>
<td><strong>Book Spend</strong></td>
<td>12.5</td>
</tr>
<tr>
<td><strong>Book Spend per capita</strong></td>
<td>32.69</td>
</tr>
<tr>
<td><strong>Real Book Spend per capita</strong></td>
<td>84.60</td>
</tr>
<tr>
<td><strong>Periodicals Spend</strong></td>
<td>13.9</td>
</tr>
<tr>
<td><strong>Periodicals Spend per capita</strong></td>
<td>36.45</td>
</tr>
<tr>
<td><strong>Real Periodicals Spend per capita</strong></td>
<td>103.38</td>
</tr>
<tr>
<td><strong>Proportion of Library Expenditure</strong></td>
<td></td>
</tr>
<tr>
<td><strong>Wages &amp; Salaries</strong></td>
<td>54.7</td>
</tr>
<tr>
<td><strong>Books</strong></td>
<td>16.6</td>
</tr>
<tr>
<td><strong>Periodicals</strong></td>
<td>18.6</td>
</tr>
<tr>
<td><strong>Binding</strong></td>
<td>4.0</td>
</tr>
<tr>
<td><strong>Other</strong></td>
<td>6.0</td>
</tr>
</tbody>
</table>

(1) University of Wales counted as one university
(2) Academic and Academic Related only
(3) Includes Full Time and Part Time Students and Staff (Academic & Academic Related)
(4) Converted using GDP Deflator
(5) Converted using the LSI Academic Book Price Index for previous calendar year incorporating exchange rate adjustment
(6) Converted using the BCA's Periodicals Price Index for subsequent calendar year incorporating exchange rate adjustment

Figure 1
### Table 4.10 Summary Statistics of the Average New University Library

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>New University Total Expenditure (Crn)</td>
<td>183</td>
<td>176</td>
<td>191</td>
<td>198</td>
<td>219</td>
<td>n/a</td>
<td>34.2</td>
<td>47.6</td>
<td>55.9</td>
<td>60.6</td>
<td>60.6</td>
</tr>
<tr>
<td>Library Expenditure (000's)</td>
<td>91</td>
<td>850</td>
<td>894</td>
<td>951</td>
<td>1,010</td>
<td>1,181</td>
<td>1,264</td>
<td>1,442</td>
<td>1,705</td>
<td>1,963</td>
<td>2,282</td>
</tr>
<tr>
<td>Library Spend as a % of Total Spend (%)</td>
<td>4.3</td>
<td>4.6</td>
<td>4.7</td>
<td>4.8</td>
<td>4.6</td>
<td>2.7</td>
<td>3.6</td>
<td>3.5</td>
<td>3.9</td>
<td>3.9</td>
<td>3.9</td>
</tr>
<tr>
<td>People to be Served</td>
<td>9,012</td>
<td>9,009</td>
<td>9,338</td>
<td>9,608</td>
<td>9,807</td>
<td>10,299</td>
<td>11,106</td>
<td>11,958</td>
<td>13,697</td>
<td>15,426</td>
<td>17,050</td>
</tr>
<tr>
<td>Library Spend per Person (£'s current)</td>
<td>87.77</td>
<td>94.35</td>
<td>95.74</td>
<td>98.98</td>
<td>102.15</td>
<td>114.68</td>
<td>113.81</td>
<td>120.59</td>
<td>124.48</td>
<td>127.27</td>
<td>134.03</td>
</tr>
<tr>
<td>Real Library Spend per Person (1993 £'s)</td>
<td>148.40</td>
<td>151.89</td>
<td>148.03</td>
<td>146.67</td>
<td>143.72</td>
<td>151.18</td>
<td>140.29</td>
<td>137.56</td>
<td>133.58</td>
<td>131.39</td>
<td>134.03</td>
</tr>
<tr>
<td>Book Spend (000's)</td>
<td>145</td>
<td>141</td>
<td>153</td>
<td>11</td>
<td>158</td>
<td>184</td>
<td>192</td>
<td>226</td>
<td>266</td>
<td>306</td>
<td>421</td>
</tr>
<tr>
<td>Book Spend per Person (£'s current)</td>
<td>16.09</td>
<td>15.65</td>
<td>16.58</td>
<td>12</td>
<td>16.79</td>
<td>17.87</td>
<td>17.79</td>
<td>18.50</td>
<td>19.42</td>
<td>19.61</td>
<td>24.75</td>
</tr>
<tr>
<td>Periodicals Spend (000's)</td>
<td>121</td>
<td>131</td>
<td>134</td>
<td>144</td>
<td>147</td>
<td>164</td>
<td>180</td>
<td>197</td>
<td>236</td>
<td>256</td>
<td>313</td>
</tr>
<tr>
<td>Bookstock (000's)</td>
<td>294</td>
<td>305</td>
<td>318</td>
<td>317</td>
<td>325</td>
<td>343</td>
<td>354</td>
<td>362</td>
<td>350¹¹</td>
<td>356</td>
<td>467</td>
</tr>
<tr>
<td>Bookstock per Person</td>
<td>13.6</td>
<td>13.5</td>
<td>13.6</td>
<td>13.4</td>
<td>13.5</td>
<td>13.6</td>
<td>13.6</td>
<td>13.6</td>
<td>13.6</td>
<td>13.6</td>
<td>17.4</td>
</tr>
<tr>
<td>Issues (000's)</td>
<td>257</td>
<td>264</td>
<td>286</td>
<td>296</td>
<td>306</td>
<td>324</td>
<td>351</td>
<td>402</td>
<td>481</td>
<td>530</td>
<td>614</td>
</tr>
<tr>
<td>Issues per Person</td>
<td>13.5</td>
<td>13.2</td>
<td>13.8</td>
<td>13.6</td>
<td>13.8</td>
<td>14.0</td>
<td>14.5</td>
<td>16.0</td>
<td>17.8</td>
<td>20.1</td>
<td>24.1</td>
</tr>
<tr>
<td>Professional Library Staff</td>
<td>708</td>
<td>705</td>
<td>687</td>
<td>676</td>
<td>690</td>
<td>684</td>
<td>705</td>
<td>754</td>
<td>777</td>
<td>817</td>
<td>874</td>
</tr>
<tr>
<td>Professional Library Staff per Person</td>
<td>39.6</td>
<td>38.5</td>
<td>37.8</td>
<td>36.1</td>
<td>37.9</td>
<td>38.2</td>
<td>40.3</td>
<td>41.1</td>
<td>42.1</td>
<td>43.1</td>
<td>46.1</td>
</tr>
<tr>
<td>Library Served per Total Library Staff</td>
<td>183</td>
<td>164</td>
<td>171</td>
<td>173</td>
<td>179</td>
<td>185</td>
<td>193</td>
<td>212</td>
<td>204</td>
<td>218</td>
<td>218</td>
</tr>
<tr>
<td>Library Served per Professional Library Staff</td>
<td>369</td>
<td>371</td>
<td>406</td>
<td>412</td>
<td>415</td>
<td>450</td>
<td>471</td>
<td>492</td>
<td>527</td>
<td>576</td>
<td>604</td>
</tr>
<tr>
<td>Annual Visits (000's)</td>
<td>727</td>
<td>758</td>
<td>780</td>
<td>816</td>
<td>845</td>
<td>845</td>
<td>984</td>
<td>1000</td>
<td>1000</td>
<td>1000</td>
<td>1000</td>
</tr>
<tr>
<td>Average Visits by each Person per annum</td>
<td>70.6</td>
<td>66.9</td>
<td>66.2</td>
<td>65.9</td>
<td>66.4</td>
<td>66.6</td>
<td>66.4</td>
<td>66.4</td>
<td>66.4</td>
<td>66.4</td>
<td>66.4</td>
</tr>
</tbody>
</table>

Data for all years refer only to 29 New Universities in England

¹¹ includes abnormal low returns by three institutions

---

**Figure 2**

**References**
