Developing Country Studies
ISSN 2224-607X (Paper) ISSN 2225-0565 (Online)
Vol.4, No.15, 2014
www.iiste.org

Defective Selection and Application of Valuation Data as the Cause of Valuation Inconsistency in Metropolitan Lagos, Nigeria

AYEDUN, Caleb Abiodun DURODOLA, Olufemi Daniel
AJIBOLA, Mayowa Olusola OLOKE, Olayinka Clement
Department of Estate Management, College of Science & Technology, Covenant University
Ota; Ogun State, Nigeria

Abstract
There has been increasing criticisms of the ability of Nigerian valuers to undertake investment valuations in a reliable and consistent manner. The earlier studies have focused mainly on the range of disparity between either the sale prices and valuation figures or between the valuation figures of two or more valuers. This study however sought to examine the roles of training and exposure to valuation inputs/data often employed in investment valuation by the professional valuers plays in the disparity/variance of the valuation figures produced by the valuers in cases where two or more valuers may have cause to carry out the valuation of the same property(ies) at about the same time/period.

To achieve the aim of the study, the researchers employed quasi-experimental method whereby forty five estate surveyors and valuers with varying number of years in practice were sampled by requesting them to carry out valuation of twelve residential properties recently sold within Lagos Metropolis, the study area. The results of their valuations showed wide disparity/variance in the valuation outcomes between and amongst the valuers. These wide variance/disparity is traceable largely to lack of uniformity in the choice of valuation inputs employed by the valuers for valuation assignments and which has direct link to the training received by the respondent valers. The study concluded that there is the need by the Estate Surveyors and Valuers Registration Board of Nigeria (ESVARBON) and the Nigerian Institution of Estate Surveyors and Valuers (NIESV) to take up the responsibility of ensuring that for any Estate Surveyor and Valuer to qualify to carry out valuation assignment(s) such Estate Surveyor and Valuer must have undergone sufficient training and acquire relevant exposure to the art and science of valuation which will afford them opportunity of how to employ relevant valuation data and inputs with a view to curtailing the problem of disparity in valuations amongst the valuers.
Keywords: Exposure, Lagos Metropolis, Valuation accuracy, Valuation inputs, Training, Nigeria

Introduction

In the absence of continuously traded, deep and secutitised markets, investment property valuations perform a vital function in the property market by acting as a surrogate for transaction prices. As with asset prices in the equity and bond markets, property valuations are central to the inter-related processes of performance measurement, acquisition and disposal decisions. However, it has been a subject of intense debate amongst professionals and academicians as to the ability of professional valuers in carrying out their valuation assignments in a reliable manner.

In his foreword to the first edition of the Guidance Notes on Property Valuation, Udo-Akagha (1985) argued that "there can be no reason why two or more valuers, valuing the same interest in a property for the same purpose and at the same time should not arrive at the same or insignificantly different results if they make use of the same data and follow the same valuation approach. But very often this is not usually the case and in some of these unfortunate cases, the profession is thrown into considerable embarrassment".

In the same vein, in 1998, in an editorial on page 2 on "property valuation and the credibility problems" in The Estate Surveyor and Valuer, the professional Journal of the Nigerian Institution of Estate Surveyors and Valuers stated *inter alia* that

> "the valuation process has been the focus of recent debate and controversy both within and outside the profession as cases of two or more valuers giving different capital values with wide margins of variation for the same property abound".

Comments of this nature have led many to ask whether estate surveyors and valuers are interpreters or creators of values. From the above statements, it is evident that the twin problems of inaccuracy and inconsistency (variance) in the valuation practice exist in Nigeria. Even in developed countries such as Britain, Australia, Canada and USA, Parker (1993), Baum et al (2000), the valuers' estimates, methods and processes have been increasingly criticized for over the past thirty years as clients seek advice in increasingly sophisticated investment markets (Baum and Macgregor, 1992).

In the same vein, there has also been a focus on the seeming inability of valuation estimates to accurately represent/interpret market prices or serve as a security for bank loans. Bretten and Wyatt (2002) observed that valuers do not operate with perfect market knowledge while valuers in many instances follow clients' instructions, analyze available information, make judgments and respond to different pressures from

stakeholders when preparing a valuation in a market atmosphere of heterogeneity.
It is against the foregoing background that attempt has been made in this paper to examine the ways and means through which the valuers select the data and inputs often adopted in their valuation exercises as a way of ascertaining possible cause(s) of variation/disparity in the valuation estimates emanating from the valuers when two or more of them have reason(s) to carry out the valuation of the same property at about the same time.

Review of Relevant Literature

It is noteworthy that whilst a hundred percent valuation accuracy in market price prediction is an "aim" (Millington, 1985), it should neither be expected nor necessarily sought to be fully achieved in any valuation assignment. However, in a situation whereby the disparity between valuation figures emanating from one valuer and another becomes too wide calls for concern. Millington in the study carried out in UK argues that expectation of absolute accuracy (or a zero per cent margin of error), is "foolish" and akin to an aspiration to predict the winner of the Grand National, which if achieved, would remove risk, and the prospect of gains and losses from property investment. The fundamental characteristics of properly as an asset class, the imperfect nature of the properly market, the lack of a central register of sales, the individual character of buildings and confidentiality of information are all cited reasons which can preclude accuracy (see, for example, Mainly for Students (1985) and Millington, 1985). Millington (1985) observes that the condition of full information of prices, homogeneity of product, ease of mobility of participant and product and competition between numerous active participants should exist for a perfectly competitive market but are absent for the property market. Such imperfection, he argues is compounded by other factors which also influence supply or demand for investment property, including the cost and availability of credit, tax charges on investment framework within which the author contends "great" and "regular accuracy" are "impossible". The various opportunities for rounding up numbers or figures during the valuation process, was cited as one of the major reasons why total valuation accuracy cannot be achieved by Millington (1979) while noting that: "Where a series of figures are all "rounded off" there is always the possibility of cumulative errors being unacceptably large". Perhaps, however, the most entrenched support for valuation inaccuracy comes from the reliance on the valuation process upon the comparable evidence, which is generally in limited supply.
Acceptance of Millington's arguments does not however preclude the establishment of an appropriate margin of error acceptable to all stakeholders – valuers, courts, the valuers' clients, professional institutions etc. At the moment there appears to be no universal consensus as to what the acceptable level of inaccuracy should be. What level of inaccuracy that can be recommended as acceptable to all valuation stakeholders? There is as yet no clear guidance on this from the professional bodies. For example, at no point even within the RICS's Valuation Standards Manual (the "Red Book"), or any of the RICS's professional guidelines is there any definition of what constitute the minimum level of accuracy that should be achieved by valuers working within the scope of the manual definition (Harvard, 2001). There is similarly no guidance in this regard from Nigeria's Guidance Notes on Property Valuation (1985) even though the Guidance notes recognize that "practice problems do arise where differences of opinion of two valuers on the same property are so wide that the values could not be relied upon".
One may therefore turn to valuation accuracy studies and legal cases for some insight. Hager and Lord (1985) whose work in UK was among the studies that provoked much of the later works on valuation accuracy envisaged a range of ±5% either side of the 'correct' value; Baum and Crosby (1988) cited "margins of error" of ±5% to ±15%. In Nigeria, Ogunba and Ajayi (1998) employed a margin of error of ±5% taken after Hager and Lord (1985)'s study while Ogunba (2003) employed a margin of error of ±10 per cent. In Australia, Parker (1988) carried out a property valuation estimate accuracy study in which ±5% to ±10% margin of error, a mode of ±5% and arithmetic mean ±6.04% were adopted. Bretten and Wyatt (2002) conducted a study amongst the valuation stakeholders on the acceptable margin of error for mortgage loan security. The result showed that 36% of the respondents favoured a +/-5% margin of error as permissible, 40% considered a +/-10% variance while 24% of the valuers considered a +/-15% variance as an acceptable margin of error. The authors quoted one of the investors as saying that the size of bracket would depend on the nature of individual valuation and that a single percentage range cannot satisfy all cases. All papers cited above fail to establish a consensus, though a compromise margin of ±10 per cent seems to be up-and-coming. Whilst valuation inaccuracy appears to be generally expected, there are however considerable differences as to what should constitute the acceptable extent or range of such inaccuracy. While Hager and Lord (1985) anticipated a range of "about ±5%", Glover (1985) quote Michael Mallinson (then chief surveyor at the prudential) as citing a figure of ±10% was the outer limit of an acceptable margin of difference (this view or stand was equally supported by Mainly for Students 1985). Baum and Crosby (1988) suggested that "it is even common to quote an acceptable margin of error of up to ±15% in valuations".
The courts in the UK have more or less constituted themselves into one of the major stakeholders on the subject matter of acceptable margin of error between the sale price of properties and the valuation figures recommended by the valuers. The courts have always adopted the "margin of error" principle as a means of establishing

whether a valuer has been negligent in his duty or not. The "margin of error" or "bracket" is a theoretical bracket placed at equal distances either side of valuation deemed by the court to be "correct". The "correct" valuation figure as well as the size of the bracket is provided by expert witnesses called to assist the court with unbiased opinions on the valuation that defendants should have reasonably reached with plaintiff at the relevant date (Crosby, 2000). Norris and Joyce (1994) noted that the "acceptable margin of error" or "bracket" was first used in UK courts in the case of Singer and Fried Larder V John D.Wood & Co (1977) 243 EG 212 (a case concerning a rural residential development), in which the judge held that there can be a "permissible margin of error of 10% either side of the 'correct figure', extended to 15% in "exceptional circumstances". Norris and Joyce (1994) further noted that in the case of Trade Credits Limited V Baillieu Knight Frank (NSW) Limited (1985) Aust. Torts Reports 80-757, Court Decision No. 18, (a case concerning a rodeo property), expert evidence indicated a margin of "up to 15%". Similarly, in Private & Trust Co. Limited V S (UK) Limited (1983) EG 112 (a case concerning the redevelopment of an office property), the Judge Rice J accepted a "permissible margin of error of 15% on either side of (a) bracket of value". One of the judicial cases that did not arrive at a definite conclusion was one which focused on the valuation of an investment property involving Banque Bruxelles Lambert SA V Eagle Star Insurance Company Limited and others (1994) 31EG 68 and (1994) 32 EG 89, where the valuation of three substantial office properties produced differences from market price in the range of between 39% and 74%. Whilst the Judge, Phillips J expressed an opinion that such differences were unacceptable, he did not however express an opinion as to the extent of acceptable margin of error, though he did note that the plaintiff, Banque Bruxelles Lambert assumed that "valuations will be within ±10% of true market values"

From the foregoing discussions, one can assume that UK literature accepts that the lack of hundred per cent accuracy as a fundamental feature of valuation principles and practice, with ±5% to ±15% maximum levels of variance appearing to be generally accepted within the qualitative commentaries, and 10% to15% generally accepted within court precedent. Thus, whilst the literature indicates inaccuracy of between 5% and 15% or between 10% and 15% as noted above, it does not consider its acceptability to the user. It appears that an aggrieved user (client) of valuation estimate may not likely succeed in a claim of incompetence if the level of inaccuracy is +/-15% of the market sale figure. From the study of literature so far, the position of the user of valuation estimates has not been the subject of much research.

In Nigeria, Ogunba (1997) undertook an empirical step at addressing the question of accuracy and variance in investment valuations in Nigeria using Lagos metropolis as the study area. In the absence of a database of property valuations and sales, he resorted to the approach of requesting thirty Lagos based practicing estate surveying and valuation firms to carry out valuations of two residential properties earlier sold located at Victoria Island and Ikoyi respectively. The valuation estimates subsequently arrived at by the valuers was subjected to a number of statistical tests such as range, inter-quartile range, mean deviation and regression/correlation analysis. The result of the statistical tests showed that valuations were not a good proxy for market prices, for three reasons. First, the average variance between valuations and prices was far in excess of his adopted margin of error of +/-5%; the intercept in the regression equation was statistically distinguishable from zero and the slope statistically distinguishable from 1; and third, the range and inter-quartile ranges were unacceptably wide. The results of the study must be interpreted with caution because only two (2) properties were considered (as in the Hager and Lord, 1985 study) and the sample of valuers (thirty firms) was small. In addition, the properties were never inspected nor were the valuers paid for their services.

Aluko (2000) carried out an accuracy study on a larger scale with a focus on mortgage valuations and subsequent sale prices of foreclosed mortgage properties. In his study, Bank records of mortgage valuations conducted by fifty nine (59) estate firms in Lagos metropolis were examined. The sale prices of the properties were compared with their earlier valuation estimates and analyzed by means of regression/ANOVA. He came to a conclusion that valuations in Nigeria are a good proxy for price and that despite the anecdotal evidence to the contrary the mortgage valuers are doing a very good job of price prediction. However, even though the study sample size is larger than that in Ogunba & Ajayi (op. cit.) study, and even though the study overcame the problem of valuers not inspecting properties and not being paid, the sample size of fifty nine estate firms was still small relative to earlier UK studies for drawing generalizeable conclusions. In addition, the sale prices of collaterized property adopted for cross-checking the result of the prior valuations were likely to be forced sale values which do not meet the definition of open market value in terms of time on the market. Finally, the study did not consider the time lags between the dates when the properties were valued and the dates such properties were eventually sold.

Ogunba (2003) expanded the coverage area of accuracy studies to a consideration of property valuation estimates and sale prices in the six states of south-western Nigeria. The approach adopted in the study was similar to the one adopted in his earlier work. A total of 171 estate surveying and valuation firms which constituted 75% of the sample frame of estate surveying and valuation firms in Southwestern Nigeria were employed for the study. Statistical tests such as range, inter-quartile range, mean deviation, regression analysis, and analysis of variance employed by the author confirmed his earlier work that valuation estimates were not good proxy for sale prices

and also that valuation estimates of one firm were not good proxy of other firms. The study also extended to an examination of the causes of valuation inaccuracy under topics such as the conduct of valuations, and the educational and practice structure of the valuation industry. Though the study improved on earlier studies in terms of sample size, scope of study area and number of properties valued, it is still open to the earlier criticism of sample properties not being inspected by the valuers prior to their valuation and neither were the valuers paid for their services.

Ogunba and Iroham (2009) addressed the recurrent problem of identifying the accuracy/consistency benchmark (a maximum acceptable margin of error), beyond which valuations should be considered negligent. This has been a problem with the use of standard deviations in accuracy research. Their work aimed at discovering such a margin of error perceptually in the Nigerian context (for stable market conditions) from the view points of both valuers and their clients. The research method involved the distribution of questionnaires to 195 estate surveyors and valuers in Lagos metropolis, and all the 25 commercial banks in the country. The perceptual responses demonstrated that the benchmark for valuation variance in Nigeria could range between ±11.1% (as suggested by valuers) and ±13.16% (as suggested by their mortgage valuation clients). It was noted that the appropriate implementation of such a margin of consistency in unstable market conditions must be cautious and flexible, taking into consideration the availability of data.

The above Nigerian literature points to the inconclusive and even contradictory nature of accuracy/variation research. The problem is exuberated by methodological problems. The earlier studies are plagued with problems of valuers not inspecting properties, valuers not being paid, values suspected of being forced sale values and values suspected of being influenced by lagging, Moreover in the use of standard deviations, the Ogunba study employed a margin of error of 5% while his later study employed 10%. These earlier studies may have been too stringent as the Ogunba and Iroham (2009) study suggests a margin of up to ±13.16% is acceptable to clients.

It is noteworthy that all studies above have failed to take into consideration what may have led to inaccuracy of valuations by failing to consider the methods and mode often adopted by the valuers in the selection of their valuation data and inputs, hence this study is out to gleaned on how the valuers select the inputs and data for their valuation exercise.

3. Setting of The Study

Lagos State covers an area of about 3,577 square kilometres, representing 0.4% of Nigeria's territorial landmass according to Esubiyi (1994). The State shares boundary in the North with Ogun State, West with the Republic of Benin, and stretches for over 180 kilometers North of the Guinea Coast of the Atlantic Ocean. Politically, Lagos State according to Ogunba (1997) had expanded as a result of rural-urban drift and had become a metropolis enclosing settlements such as Mushin, Oshodi, Ikeja, Agege, Shomolu and Bariga. The 2006 National census put the population of the State at 9,013,534.

Lagos Metropolis has been chosen as the study area because it is the most important commercial city in Nigeria thus providing a sufficiently vibrant economic base and valuation activity which the researcher hopes to provide a vigorous and robust study base. Lagos metropolis, apart from being Nigeria's former capital, is the largest metropolitan city in Africa. The metropolis is located within the coastal frontage of Lagos State and is bounded in the West, by the Republic of Benin, in the East by Ondo State and Atlantic Ocean in the South and in the North by Ogun State. The metropolis covers an approximate land area of 2,350 square kilometers spreading over four main islands of Lagos, Iddo, Ikoyi and Victoria islands. In the economic scene, Lagos metropolis has grown from a small farming and fishing settlement to become an important centre of commerce, finance and maritime in Nigeria, housing the headquarters of several banks, industries and commercial enterprises.

The research study population comprise of estate surveyors and valuers practising in Lagos Metropolis which constitute over fifty (50) percent of estate surveyors and valuers according to the directory of the Nigerian Institution of Estate Surveyors and Valuers (2013). All the respondent estate surveyors and valuers are registered with Estate Surveyors and Valuation Registration Board of Nigeria which is the only body legally empowered to register and regulate estate surveying and valuation practices in the country. The study adopted five nuclei in the stratification of Lagos Metropolis. This is borne out of the fact that the study population is found aggregating in these economic nuclei where there is the expectation of very active property market necessitating request for valuation assignments. The study adopted an exploratory cross-sectional survey research devoid of control; involving one-time observation of independent and non-manipulated variables. Structured questionnaires were administered to 137 practising estate surveyors and valuers in the study area out of which 82 (60%) were retrieved. Data analysis was carried out with the aid of descriptive statistics.

Fig 1: Map of Metropolitan Lagos

Source: Lagos State Ministry of Information

The Research Method

The research study population comprise of the estate surveying and valuation firms with its headquarters located within Metropolitan Lagos which accounted for over fifty (50) percent of such firms in Nigeria according to the directory of the Nigerian Institution of Estate Surveyors and Valuers (2013), All the respondent estate surveyors and valuers are registered with Estate Surveyors and Valuation Registration Board of Nigeria which is the only body that can register and regulate estate surveying and valuation practices in the country. The study adopted five nuclei in the stratification of Lagos Metropolis. This is borne out of the fact that the study population is found to aggregating about these economic nuclei where there is the expectation of very active property market necessitating request for valuation assignments. The study adopted an exploratory cross-sectional survey research devoid of control; involving one-time observation of independent and non-manipulated variables. Structured questionnaires were administered to 137 practising estate surveyors and valuers in the study area out of which 82 (60%) were retrieved. Data analysis was carried out with the aid of descriptive statistics.

Analysis and Discussion

Causes of Inaccuracy/Inconsistency in the Conduct of Valuation

Table 1: Assessment of the Accuracy of Sampled Properties by Means of Several Tests

Properties	Sale Prices (000,000)	Results of the Statistical Tests				
		No. of Valuers	Range (000,000)	Inter-quartile Range (000,000)	Mean Deviation (000,000)	Std Deviation (000,000)
A	B	C	D	E	F	G
Property 1	200	45	550	80	98.9 (49.5%)	115.20 (57.6%)
Property 2	20	45	91	9.75	14.04 (70.2%)	18.40 (92%)
Property 3	18	45	170	8.5	17.80 (98.8%)	25.90 (144%)
Property 4	35	45	77	9.5	12.71 (36.3%)	13.80 (39.4%)
Property 5	26	45	108	12	22.04 (84.7%)	19.426 (74.7%)
Property 6	20	45	66	7	9.08 (45.4%)	12.20 (61%)
Property 7	65	45	78	14.5	29.17 (44.9%)	20.61 (31.7%)
Property 8	55	45	82	15.5	27.17 (49.4%)	20.51 (37.3%)
Property 9	180	45	690	58.50	75.48 (41.9%)	111.25 (61.8%)
Property 10	2.5	45	8.80	0.5	0.87 (34.8%)	1.40 (56%)
Property 11	3	45	11.50	1.15	1.71 (57%)	2.30 (76.7%)
Property 12	52	45	117.50	24.5	24.12 (46.4%)	29.64 (57%)

Source: Author's Field Survey and Analysis, 2008.

The above result of the analysis contained in Table 1 above showed very wide ranges of values for the sampled properties (690m) in the case of property 9. Even where one cuts off the extreme values (the over valued and under valued half of valuations), the range of valuations is still extremely high for example, up to 58.5 million in the case of property 9.

The standard and mean deviations also show a high level of inaccuracy. None of the mean values fell within thirty per cent of the selling prices. The mean deviation from market price for all the sampled properties came to ±32.44%. This represents a very high degree of inaccuracy relative to the 5% adopted by Hager and Lord and by Ogunba 1997 and relative to the 10 per cent adopted by Ogunba (2003). The mean deviation from market price for all the privatized properties (see Table appendix) was even worse: ±38.62%. This means that valuers in the study area are not in any way interpreting market prices with any appreciable degree of accuracy, even where they inspect the properties and are paid. The study also sought to ascertain the number of valuers who were able to conduct valuations within different ranges of error. The results are documented in Table 2 below.

Table 2: Cumulative Margins of Error among 45 Valuers in Lagos

Margin of error (%)	**Properties**												Total (540)	**%**
	Property 1	Property 2	Property 3	Property 4	Property 5	Property 6	Property 7	Property 8	Property 9	Property 10	Property 11	Property 12		
	Number of valuations within the margin of error													
0*	2	1	2	2	2	4	-	1	1	5	4	-	24	4.4
±5	4	1	7	2	1	1	1	-	1	1	-	2	45	8.3
±10	2	3	6	3	2	4	-	3	7	2	5	-	82	15.2
±15	2	3	8	4	-	-	2	1	4	3	-	3	112	20.7
±20	1	1	5	1	-	1	2	3	3	8	7	2	146	27.0
±25	2	4	5	2	1	6	5	2	2	--	1	4	180	33.3
±30	3	2	4	4	-	1	4	3	1	4	-	2	208	38.5
±35	2	2	4	5	3	1	2	1	3	1	2	2	237	44.0
±40	2	-	1	1	1	2	2	5	6	3	1	3	264	49.0
±45	4	-	1	4	-	-	1	2	1	-	-	2	279	51.7
±50	4	3	-	3	3	4	4	1	-	1	3	4	309	57.2
Outside ±50	17	25	2	14	32	21	22	23	16	17	22	21	540	100

* Where Valuation Estimates Equal Sale Prices of Properties.

Source: Author's Field Survey and Analysis, 2008.

Table 2 above indicated that only 4.4% of the valuation estimates tallied with the sale prices of the properties while 8.3% of the valuation fell within ±5% margin of error. Table 5.29 above also shows that 15.2% of the valuations fell within the study target margin of error of ±10%. Taking the ±10% variance as the norm, 15.2% success recorded in this study is a far cry from 90% achieved by Baum et al (2001) in 2000 and also 59% in 1983.

Table 3 below further revealed the performances of the respondent participant valuers by showing the differences (disparity) between the valuation estimates and the sale (transaction) prices of each of the properties. The figures contained in the table are the differences between the valuation figures and the sale prices which were arrived at after deducting the valuation figures from the sale prices (i.e. sale (transaction price – valuation estimates) of each of the valuers for each of the twelve properties.

Table 3: Analysis of Valuation Variances in terms of Range of Values Amongst the Forty Five (45) Valuers Involved in the Valuation of Twelve Properties

S/N	Valuers	Properties											
		Property 1	Property 2	Property 3	Property 4	Property 5	Property 6	Property 7	Property 8	Property 9	Property 10	Property 11	Property 12
		Differences between Sale Prices and Valuation Estimates of the 12 Properties Valued by the 45 Valuers in millions of Naira											
1	1	15m	35	-75	2	8	10	12	-22	-58	-20	-25	60
2	2	-225	-15	6	-8	-46	-25	-62	-105	67	-20	-17	71
3	3	-80	-75	-83	-15	-85	-40	3	-31	-67	32	17	86
4	4	-3	55	-8	12	54	55	-28	7	36	28	0	69
5	5	25	-400	-900	-65	-362	-275	-31	-64	61	-300	-367	13
6	6	32	-110	-94	-27	0	-50	-54	-18	-11	0	-67	42
7	7	28	-100	-178	-20	-38	0	-23	-27	-36	28	-83	73
8	8	3	-50	-144	-30	-8	-25	-17	-36	-14	52	-33	65
9	9	43	-25	-39	-35	-131	-30	-29	-9	0	-12	10	13
10	10	-3	0	-150	-11	-73	10	-46	-82	36	-100	-20	81
11	11	-50	25	-189	-15	23	25	-69	-109	-22	-40	-8	71
12	12	-28	10	-44	-10	-92	35	-26	-38	-39	-60	-117	-17
13	13	8	-150	-67	2	-73	0	-48	-55	-69	-20	-67	52
14	14	0	-35	0	0	-112	-5	-85	9	-39	-8	-7	69
15	15	-13	5	-178	-5	-35	-75	-54	-18	34	-140	-40	71
16	16	-75	-30	-150	-12	-112	-60	-42	-118	44	-4	-150	4
17	17	-83	20	-3	-17	-150	-50	-77	0	-8	0	-107	12
18	18	-153	50	-44	-12	-85	-25	-108	-13	-17	-80	10	46
19	19	-125	30	14	-21	-100	-60	-92	-18	-75	-20	0	-48
20	20	-118	-75	44	-1	-138	-75	-57	-36	-94	-20	-50	67
21	21	-90	-60	22	5	-162	-50	-54	-45	-317	-48	-83	4
22	22	-43	-13	-94	-10	-177	-100	-88	-67	-67	0	-167	-25
23	23	-93	-150	-81	0	-150	-40	-23	-85	-6	28	-77	69
24	24	-100	-65	-25	-7	-81	-25	-46	-82	-57	20	-50	81
25	25	-43	-100	-178	-21	-46	0	-66	-49	-25	12	-17	85
26	26	-58	-25	-83	-27	-265	-110	-72	-56	-19	0	17	-25
27	27	-65	-70	-122	-8	-77	-225	-92	-73	52	-20	-67	38
28	28	-38	-200	-39	-18	-92	-60	-38	-89	-9	-100	0	38
29	29	8	-110	-89	-25	-131	-75	-62	-100	-53	-60	-20	71
30	30	-105	-175	-233	-28	-69	-100	-108	-55	-67	-28	8	17
31	31	-35	-300	-133	-15	-104	-10	-92	-36	-78	-12	0	-38
32	32	-100	10	-206	-20	0	-25	-71	-82	31	-40	17	-35
33	33	-63	-25	-344	-10	-35	-50	-54	-55	-28	0	-33	62
34	34	-28	-13	0	-5	-85	-65	-57	-84	-83	-20	-50	-83
35	35	-83	-135	-39	-1	4	10	-48	-64	-4	-60	-150	-46
36	36	-60	-50	-25	10	-100	0	-23	-109	31	-8	-233	-140
36	36	0	-75	-161	5	-142	-70	-26	-122	-39	-40	-117	-121
38	38	45	8	-67	-11	-173	20	-15	-91	-72	-60	-67	-25
39	39	-18	-63	-69	-12.5	-48	-62.5	-19	-23	-7	-500	-417	-24
40	40	50	-125	-139	-25	-96	-125	-38	-45	-14	-1000	-833	-48
41	41	-25	-80	-89	-16	-62	-80	-25	-29	-9	-640	-533	-31
42	42	38	-110	-122	-22	-85	-110	-34	-40	-12	-880	-733	-42
43	43	-48	-75	-83	-15	-58	-75	-23	-27	-8	-600	-500	-29
44	44	-4	-150	-133	-3	-150	-65	-85	-91	-17	-1200	-1000	-58
45	45	-50	-250	-94	-17	-35	-130	-108	-55	8	600	500	29

The figures with negative (-) signs are the figures/differences by which the valuation estimates exceeded the sale

prices while the figures without any negative/positive signs are those figures from the valuation estimates which were lower than the sale prices. On the other hand, the zero (0) figures indicate that both the valuation figures and sale prices were equal to each other hence such valuation estimates were regarded to be 100% accurate.

A cursory look at the figures in the table showed that the differences in the valuation figures and sale prices are very significant and alarming which is an indication that the valuation estimates emanating from the professional estate surveyors and valuers in Nigeria are very far from being accurate and as such cannot be relied upon for sale measurement. A situation by which the differences between valuation and sale price is going as high as more ±50% cannot be described as ideal and would therefore need an urgent attention.

In an effort to further ascertain the level of accuracy of valuers that undertook the valuation of the 12 properties, the results of their valuation efforts were further subjected to other statistical tests by examining the range of valuation inputs adopted by each of the valuers for the valuation of the 12 properties in an efforts to establish the possible sources of disparity/variance of the valuation figures arrived at by the valuers. The result of the exercise are as presented below:

Review of Examination of Possible Causes of Valuation Inaccuracy/Variance

The valuation inputs used for arriving at the capital values estimates by the valuers are the subject of the analyses contained in the subsequent tables and discussions.

Discussions on how the various inputs noted above were adopted for the valuations of the sampled 12 properties follows.

Capitalization Rates Applied by Respondents

For the purpose of determining whether capitalization rates applied could be one of the causes of inaccuracy/inconsistency of valuation estimates produced by the valuers in respect of the 12 sampled properties, the capitalization rates adopted by the valuers for their individual valuation estimates were analysed. The summary of the rates are the subject of Table 4 below:

Table 4: Capitalization Rates Adopted in the Valuation of Sampled Properties by 45 Valuers

Yield Rate (%)	Properties												Mean Freq.	Ranking
	1	2	3	4	5	6	7	8	9	10	11	12		
	%	%	%	%	%	%	%	%	%	%	%	%		
2.5	2	2	0	4	0	2	2	4	0	4	0	2	1.8	12th
3.0	4	11	4	0	6	8	4	6	2	8	4	6	5.25	8th
3.5	7	8	11	8	11	6	4	4	8	6	4	4	6.75	5th
4.0	8	4	13	8	6	11	8	13	6	6	11	8	8.50	4th
4.5	11	11	15	13	17	13	15	13	13	11	13	11	13.00	3rd
5.0	31	28	20	33	24	20	28	22	24	31	22	20	25.25	1st
5.5	13	15	13	17	20	20	17	15	17	15	17	22	16.75	2nd
6.0	4	6	8	4	4	6	4	6	6	8	6	8	5.83	7th
6.5	8	4	6	2	4	6	4	4	8	2	6	4	4.83	9th
7.0	2	4	2	4	2	4	2	4	4	2	4	4	2.58	10th
7.5	4	2	2	0	2	0	2	0	2	0	4	2	1.70	13th
8.0 & Above	2	0	2	2	0	0	2	4	4	2	4	4	2.20	11th

Source: Author's Field Survey and Analysis, 2008.

A cursory look at the Table 4 above clearly showed that there was no uniformity amongst the valuers concerning rates of capitalization adopted by the valuers. Looking at the rates adopted for individual properties showed great disparities amongst the valuers. It is disturbing that valuers adopted varying rates of capitalization for the same property valued at the same time and for the same purpose. Adoption of varying rates for the same property value for the same purpose will definitely produce varying results. This development can be one of the major reasons accounting for the problem of inaccuracy and inconsistency in valuation estimates amongst valuers in Nigeria. Generally speaking, as noted earlier, the use of different capitalization rates is bound to produce different results hence inconsistencies in valuation estimates.

Gross Income (Rent) Applied by Respondents

For the purpose of determining how uniformly respondents estimate rental value inputs into their valuations, the gross rent estimates that respondents adopted in arriving at capital value estimates for the 12 sampled properties were analyzed. The summaries of rental estimates are the result of Table 5 below:

Table 5: Gross Rental Incomes Adopted For the Valuation of the 12 Sampled Properties by the 45 Respondent Valuers

Range of Rents (000)	Properties											
	Property 1	Property 2	Property 3	Property 4	Property 5	Property 6	Property 7	Property 8	Property 9	Property 10	Property 11	Property 12
	(%)	(%)	(%)	(%)	(%)	(%)	(%)	(%)	(%)	(%)	(%)	(%)
100-200	-	-	17	-	-	-	-	-	-	44	46	-
201-300	-	-	40	-	4	-	-	-	-	17	33	-
301-400	-	2	33	8	13	4	-	-	-	13	4	-
401-500	-	4	6	15	15	13		-	-	8	4	-
501-600	-	40	2	33	28	24	4	6	8	8	2	2
601-700	-	42	-	22	31	26	8	15	11	4	4	4
701-800	-	6	-	11	4	13	6	4	6	2	-	15
801-900	-	2	-	8	2	8	15	17	4	-	-	22
901-1,000	-	2	-	-	-	6	26	28	6	-	-	26
Above 1,000	98	-	-	-	-	2	39	26	59	-	-	28

Source: Author's Field Survey and Analysis, 2008.

The analyses of the gross rental income adopted by the forty (45) respondent valuation firms as summarized in the Table 5 above showed that the valuers are not interpreting the rental markets uniformly. In all the twelve properties sampled, the analysis revealed wide disparities amongst the valuers in the choice of rental income adopted for the valuation estimates. The inability to correctly interpret the rental markets must be one of the reasons for the inaccurate and inconsistency in capital valuation estimates as revealed above. This is not unexpected when viewed along with various methods the valuers gave in Table 5 for determining rental values for investment valuation purposes which indicated lack of uniformity of approach which also provides some explanation of the marked disparity of capital value estimates from market price on the one hand and inconsistency in valuation estimates arrived at amongst the valuers on the other hand.

Rate of Outgoings Adopted for the valuations

In attempt to determine empirically how uniformly or otherwise in how valuers in Lagos estimate outgoings in their valuations, the rate of outgoings the respondents used in arriving at net rents for the 12 sampled properties were analyzed and the result of the analysis are outlined in Table 6 below:

Table 6: Outgoings Adopted For the Valuation of the 12 Sampled Properties by the 45 Respondent Valuers

Out-goings (%)	Properties												Mean Freq.	Ranking
	1 (%)	**2** (%)	**3** (%)	**4** (%)	**5** (%)	**6** (%)	**7** (%)	**8** (%)	**9** (%)	**10** (%)	**11** (%)	**12** (%)		
4-5	7	11	4	7	2	11	9	2	6	9	13	4	7.08	6th
6-7	7		9	33	24	9	8	20	33	24	8	11	17.33	1st
8-9	22	9	17	20	7	22	24	9	22	22	20	6	16.70	2nd
10-11	11	16	20	16	10	31	20	22	16	8	13	8	16.00	3rd
12-13	7	4	11	4	13	2	7	11	13	13	16	13	9.50	4th
14-15	9	11	4	7	4	4	8	7	2	4	11	22	7.75	5th
16-17	4	2	8	4	4	-	6	4	4	7	2	11	4.70	7th
18-19	7	4	2	4	2	-	4	4	-	2	2	2	2.75	8th
20 and above	7	0	2	4	-	-	2	-	2	-	4	2	2.00	9th

Source: Author's Field Survey and Analysis, 2008.

A glance at the figures in the above Table 6 indicated that estate surveyors and valuers within the study area (Lagos Metropolis) are not displaying uniformity in the choice of outgoings being adopted for their valuation assignments. This is not unexpected in view variations in the manner valuers determine the deduction for outgoings as shown in the analysis on Table 6 which indicated adoption of array of approaches to determination of outgoings. Some rely on Landlord's records while others rely on rules of thumb. Still others rely on the valuer's assessment of the age/intensity of use of the property. The ideal position is that valuers should determine outgoings from past expenditure on the subject property and others of a comparable nature. The adoption of different rate for outgoings for investment valuation purposes is bound to produce inconsistency as well as inaccuracy in valuation estimates by valuers.

Conclusion and Recommendation

It was discover through this study from the outcome of simulated valuation exercise that there was lack of uniformity in the way and manner estate surveyors and valuers in Lagos metropolis interpret property market information and apply such information to their valuation assignments. This was evidenced from the wide disparities in the rates of yields (capitalisation rates), gross rental incomes and outgoings adopted in for the simulated valuation assignments. These disparities was what largely accounted for variances or disparities in the valuation estimates amongst and between the valuers in the metropolis and which in effect was responsible for valuation estimates of one firm not serving as good proxy for the valuation estimates of contemporaneous (other) firms in the metropolis.

This ugly trend if not quickly stem, could pose a serious threat to the credibility and integrity of valuers and even damage the public image of the estate surveying and valuation profession in the country. This could also result to the profession being regarded as obsolete and encourage the incursion of other professionals into this core area of the profession of Estate Management in the country to further compounded the woes of the profession as manifested by the quacks who had almost take over the agency aspect of the profession.

To stem this ugly tide, it behoves on the Nigerian Institution of Estate Surveyors and Valuers and Estate Surveyors and Valuers Registration Board of Nigeria, the two bodies responsible the regulation of the profession in the country to ensure that the variance/disparity in valuation is minimised in the country to make it mandatory for all estate surveyors and valuers to submit relevant valuation data (sales figures, rental va;lues, outgoings, yield rates, etc) on all transactions with respect to property sales and lettings compulsorily for the purpose of building and regularly updating a data bank . each state Chapters of the Nigerian Institution of Estate Surveyors and Valuers should be mandated to establish such a property data bank and review periodically to make such data continuously relevant. Such information so collated could serve as a reference point for comparison between states and among states for Nigerians who may wish to invest in any state within the country. Such property databank would assist researchers in producing property market indices for performance measurement and accuracy test especially in the application of the investment method of valuation.

References

Abrams, J.B. (2004) "Accuracy of Your Valuation" Unpublished Article Available Online At www.abramsvaluation.com/pdf/ch10.pdf

Adair, A., Berry, J. and McGreal, S. (1996) "Valuation of Residential Property: Analysis of Participant Behaviour" Journal of Property Valuation and Investment, Vol. 14 No.1.

Adegoke, O.J. (2006) "A Study of Valuer Heuristic Behaviour and Valuation Reliability in Lagos Metropolis" Unpublished M.Sc. Thesis Submitted to the Department of Estate Management, Obafemi Awolowo University, Ile-Ife.

Adegoke, O.J. (2008) "Behaviour of Valuers when Valuing Properties in Localities where they Lack substantial Prior experience" Real Estate and Best Economics journal Vol. 1 No. 1 pp30-45

Ajayi, C.A. (1990) "An Analysis of Default Factors in Residential Mortgages of the Federal Mortgage Bank of Nigeria and Oyo State Property Development Corporation" Unpublished PhD Thesis, Obafemi Awolowo University, Ile-Ife.

Ajayi, C.A. (2006) "Towards New Directions for Property Paradigm" A Paper Presented at the International Conference Organized by the College of Science and Technology; Covenant University; Ota; on the theme: The Built Environment: Innovation Policy and Sustainable Development; Pp.126-129.

Ajayi, C. A. (2003) "The Income Approach to Valuation: The Preference of the Investor" Being the text of an invited paper presented at the Continuing Professional Development Workshop organized by the Lagos State Branch of the Nigerian Institution of Estate Surveyors and Valuers on the 3rd of December 2003. Pp.1-24.

Allan G.J. (2000), The Blackwell Dictionary of Sociology: A user's Guide to Sociological Language 2nd Edition; Blackwell Publishing, 350, Main Street, Malden; USA.

Aluko, B.T. (1998) "Property Valuation: Are Estate Surveyors and Valuers Interpreters or Creators of Value?" Journal of the Nigerian Estate Surveyors and Valuers. Pp. 9-15.

Aluko, B.T. (2000) "A Study of Appropriateness of Mortgage Valuation for Institutional Lending in Nigeria" Unpublished PhD thesis submitted to the Department of Estate Management, Obafemi Awolowo University, Ile-Ife.

Aluko B.T. (2004) "Market Data for Better Valuation/Pricing: The Holy Grail of the Valuation Profession'' Estate Surveyors and Valuers, Vol. 27, No.1, March, pp. 54-63.

Amidu, A. (2006) A Study of Client Influence on Residential Property Valuations in Lagos Metropolis" An M.Sc.Thesis Submitted to the Department of Estate Management, Faculty of Environmental Design and Management, Obafemi Awolowo University, Ile-Ife, Nigeria.

Association of Housing Corporation in Nigeria, (2006) Directory of the Top Shakers and Movers in Nigeria Housing/Building Industry An Official Publication of the Association of Housing Corporation in Nigeria**.**

Bain, J.S; (1968): Industrial Organization John Wiley and Sons Inc, N.Y. 2nd Edition**.**

Baum, A. and Crosby, N. (1988) Property Investment Appraisal Routlege, London.

Baum, A., Crosby, N., Gallimore, P., Gray, A. and McAllister, P. (2000); "The Influence of Values and Valuations on the Workings of Commercial Ivestment Market" , London, IPF/RICS Research Founation/ Jones Landsalle.

Bretten, J. and Wyatt, P. (2002): "Variance in Property Valuations for Commercial Lending" Vol. 4 No. 9, RICS Foundation May 2002 Electronic Reference PS0409 (WWW.rics- foundation.org).

Brown, G. (1985) "Property Investment and Performance Measurement: A Reply", Journal of Valuation, Vol. 4, pp 33-44.

Brown, G. (1991) Property Investment and The Capital Markets, E & FN Spon, London.

Brown, G. (1992) "Valuation Accuracy: Developing the Economic Issues" Journal of Property Research, 9:199-207.

Brown, G. and Matysiak, G. (2000) Real Estate Investment: A Capital Market Approach. FT Prentice-Hall, 708 pp.

Cole, R; Guilkey, D and Miles, M (1986) "Toward an Assessment of the Reliability of Commercial Appraisals", Appraisal Journal, July, pp. 442-432.

Crosy, N. (2000*)"*Future Directions and Challenges for Valuation Research and Practice",Keynote Address Presented at Pacifc im Real state Society's 6th Annual Conference,Sydney, Australia**.**

Crosby, N; Devaney, S; Key, T. and Matysiak, G. (2003) "Valuation Accuracy Reconciling Timing of the Valuation and Sale" European Real Estate Society*,* Helsinki-Finland

Crosby, N; Lavers, A. and Murdoch, J. (1998) "Property Valuation variation and the Margin of Error" Journal of Property Research, UK Vol. 15 No. 4 pp 305-330

Crosby, N; Lavers, A. and Murdoch, J (1999) "Performance of Expert Witnesses in Valuation Disputes" Paper Presented at the Cutting Edge 1999 Property research Conference of the Royal Institution of Chartered Surveyors, University of Cambridge, September

Crosby, N; French, N. and Ward, C. (1993) "Valuation Accuracy: A Self Fulfilling Prophesy" The City Edge pp 1-11

Cullen, I. (1994) "The Accuracy of Valuation Re-Visited", A Paper Presented at RICS Cutting Edge Research Conference, London

Descombe, M. (2003) The Good Research Guide for Small Scale Social Research Projects. (Second Edition), Open University Press. Maidenhead, Philadelphia

Diaz, J.III (1990a) "How Appraisers Do Their Work: A Test of the Appraisal Process and the Development of A Descriptive Model" Journal of Real Estate Research, Vol. 5 No.1.

Diaz, J.III (1990b) "The Process of Selecting Comparable Sales" The Appraisal Journal 58:4, pp. 33-40

Diaz, J. III (1997) "An Investigation into the Impact of previous Expert Value Estimates on Appraisal Judgement" Journal of Real Estate Research, Vol.13 No. 1.

Diaz, J. III and Wolverton, M.I.; (1998) "A Longitudinal Examination of the Appraisal Smoothing Hypothesis" Real Estate Economics, Vol. 26, No.2; pp.349-358.

Esubiyi, A.O. (1994) "Obsolescence and Property Values: A Case Study of Lagos." Unpublished B.Sc Dissertation Submitted to the Department of Estate Management, Obafemi Awolowo University, Ile-Ife.

Evans, A.W. (1989) "House Prices and Land Prices in the South East" A Review House Builders Federation; London

Fletcher, S. and Diskin, B.A. (1994) "Agency Relationships In Appraising for Institutional Asset Managers" The Appraisal Journal, Vol. 62 No.1.pp.103-12

Fraser, R.R. and Worzala, E.M (1994): An insight into the idea of Professor James A

French, N. (2007) "Valuation Uncertainty: Common Standards and Methods" 13th Pacific-Rim Real Estate Society Conference Fremantle, Western Australia, 21 to 24 January, 2007.

Gallimore, P. and Wolverton, M. (1997) "Price Knowledge Induced Bias: A Cross-Cultural Comparison" Journal of Property Valuation and Investment, Vol. 15 (3), 261-273.

Gallimore, P.(1994) "Aspects of Information Processing in Valuation Judgement and Choice" Journal of Property Research, Vol.11, pp.97-110.

Gallimore, P. (1996) "Confirmation Bias in the Valuation Process: A Test for Corroborating Evidence" Journal of Property Research; V0l. 13(4), 261-274.

Geltner, D. (1993) "Estimating Market Values fro Appraisal Value Without Assuming an Efficient Market" Journal of Real Estate Research, Vol.8 No.3, Summer, pp.325-345.

Glover, T. (1985) "Cutting Out the Educated Guesswork" Accountancy Vol. 69, No. 1098

Graaskamp, J.A.(1988) US 100th Congress, Transcription of Testimony in Support of HR 3675, With Reference to the Real Estate Reform Act of 1987, Committee of Governing Operations, 25th February.

Hager, DP and Lord, DJ (1985) The Property Market, Property Valuations And Performance Measurement, Institute Of Actuaries, London.

Havard, T.M., (1999) "Valuer Behaviour and the Causes of Excessive Variance in Commercial Property Valuation, PhD thesis Submitted to UMIST; Manchester

Havard, T.M. (2001) "An Experimental Evaluation of the Effect of Data Presentation on Heuristics Bias in Commercial Valuation" Journal of Property Research, Vol.18, No. 1, pp.51-68.

Hendrickson, H. and Espahbodi, R. (1991) "Second Opinion, Opinion Shopping and Independence" The CPA Journal, Vol. 61 No.3, pp.26-29

Herd, G. and Lizieri, C. (1994) "Valuing and Appraising New Lease Forms: The Case Of Break Clauses In Office Markets", RICS 1994 Cutting Edge Conference, City University Business School, London, September.

Hutchison, N; Macgregor, B and Nanthakumaran, N. (1995) "Variations In The Capital Valuations Of UK Commercial Property: Do Valuers Get It Right"?. RICS 1995 Cutting Edge Conference, Aberdeen, September.

Igboko, N.P.(1992) A Research Project on Valuation Methods in Nigeria With Special Reference to Years Purchase (Y.P.) A Research Report Carried out for and on behalf of the Nigeria Institution of Estate Surveyors and Valuers. Pp.1-43.

IPD/DJ (1988) The Variance In Valuations, Drivers Jonas, London.

IPD/DJ (1990) The Variance In Valuations 1990 Update, Drivers Jonas, London.

IPD/DJ (2004) The Variance In Valuations 2004 Update, Drivers Jonas, London.

Iroham, O.C. (2007) "Influence of Valuers and Valuatiob in the Workings of Commercial Property Investment in Lagos Metropolis" An M.Sc. Thesis Submitted to Covenant University, Ota, Ogun State.

IVSC (2002), International Valuation Standards 2001, London International Valuation Standards Committee.

Kahneman, D and Tversky, A. (1972) "Subjective Probability: A Judgement of Representativeness", Cognitive Psychology pp.430-545.

Kinnard, W.N., Lenk, M.M. and Worzala, E.M (1997) "Client Pressure in the Commercial Appraisal Industry: How Prevalent is it?" Journal of Property Valuation and Investment, Vol. 15 (3), 233-244.

Kohli, A. (1989) "Determinants of Influence in Organizational Buying: A Contingency Approach", Journal of Marketing, Vol.53 No.3, pp.50-65.

Levy, D. and Schuck, E. (1999) "The Influence of Clients on Valuations" Journal of Investment & Finance, Vol.17 No.4

Lizieri, C. and Venmore-Rowland, P. (1991) "Valuation Accuracy: A Contribution To The Debate" Journal of Property Research.

Lizieri, C. and Venmore-Rowland, P. (1993) "Valuations, Prices and The Market: A Rejoinder" Journal of Property Research.

Mallison, M. and French, N. (2000) "Uncertainty in Property Valuation: The Nature and Relevance of Uncertainty and how it Might be Measured and Reported" Journal of Property Investment and Finance, 18: 1.

Martin, M. M.(1997): "The Ethics of Desire" The Appraisal Journal, 65(3) pp.227-231.

Matysiak, G. & Wang, P. (1995) "Commercial Property Market Prices and Valuations: Analyzing the Correspondence" Journal of Property Research.

McAllister, P. (1995) "Valuation Accuracy : A Contribution to the Debate" Journal of Property Research Vol. 12 (3) pp.181-202.

Miller, T.(1992) "Do We Need to Consider the Individual Auditor When Discussing Auditor Independence?" Accounting Auditing and Accountability Journal, Vol.5 No.2 pp.74-84.

Millington, A.F. (1979) An Introduction To Property Valuation, The Estate Gazette Limited, London

Millington A.P. (1985) "Accuracy and the Role of the Valuer" Estate Gazette, 9th November, Vol.276, pp 603

Mokrane, M. (2002) "Valuations: Standards, Accuracy and Consistency" IPD European Property Strategies Conference, May, 2002 pp.20

Newell, A. and Simon, H. (1972) Human Problem Solving, New Jersey; Prentice Hall.

Newell, G. & Kishore, R. (1998) The Accuracy of Commercial Property Valuations. School of Land Economy, University of West Sydney. Newell, G. & Kishore, R. (1998) The Accuracy of Commercial Property Valuations. School of Land Economy, University of West Sydney.

NIESV (2002) The Directory of the Estate Surveyors and Valuers; The Official Publication of the Nigerian Estate Surveyors and Valuers.

Norris, K and Joyce, L. (1994) Valuers Liability, AIVLE, Deakin.

Nwana, O.C. Introduction to Educational research for Students-Teachers Hienemann Educational Books, (Nig.) Ltd., Ibadan (1981)

Ogunba, O.A. (1997) "A Study of Valuation and Pricing Methods in the Residential Property Market In Lagos Metropolis'' An Unpublished M.SC. Dissertation Submitted to the Department of Estate Management, Obafemi Awolowo University, Ile Ife.

Ogunba O.A. and Ajayi, C.A. (1998) "An Assessment of the Accuracy of Valuations in the Residential Property Market of Lagos" A Journal of the Nigerian Institution of Estate Surveyors and Valuers; Vol.21, No.2: Pg.19-23

Ogunba, O.A. (2002) "Predevelopment Appraisal and Risk Adjustment Techniques for Property Investment in South Western Nigeria" An Unpublished PhD Thesis Submitted to the Department of Estate Management, Obafemi Awolowo University, Ile Ife.

Ogunba, O.A. (2004) "Implementation Hurdles in the Search for Rationality in Investment Valuation in Nigeria" Journal of Property Research and Construction (1) 14-28.

Ogunba, O.A and Ojo, O. (2007) "Resolving Reliability, Consistency and Rationality Problems of Professionally Prepared Valuations in Nigerian Practice", Journal of The Nigerian Institution of Estate Surveyors and Valuers; Vol. 30, pp. 39-48.

Ojo, O. (2004) "Reliability, Consistency and Rationality of Professionally Prepared Valuations: Suggestions for Resolving the Problems in Nigeria Practice" A Paper presented a the 2004/2005 CPD Training Workshop on Asset Valuation Organized by The Nigerian Institution of Estate Surveyors ad Valuers and holding in Lagos, Kaduna and Enugu.

Okoror, S. (1995) ''Mortgage Financing Mechanism as a Strategy for the Operation of Staff Housing Loan Scheme in Obafemi Awolowo University" An Unpublished M.SC. Dissertation Submitted to the Department of Estate Management, Obafemi Awolowo University, Ile Ife.

Oladimeji E.O. (1995) ''An Analysis of the Pattern of Residential Property Location in Lagos Metropolis'' An Unpublished M.SC Dissertation Submitted to the Department of Estate Management, Obafemi Awolowo University, Ile Ife.

Olaleye, A. (2005) "A Study of Real Estate Portfolio Diversification Strategies in the Nigerian Property Market" A PhD Dissertation Submitted to the Department of Estate Management, Faculty of Environmental Design and Management, Obafemi Awolowo University, Ile-Ife, Nigeria.

Oloyede, S.A. (2005) "A Study of the Performance of Mortgage Financing Institutions in Southwestern

Nigeria" A PhD Dissertation Submitted to the Department of Estate Management, Faculty of Environmental Design and Management, Obafemi Awolowo University, Ile-Ife, Nigeria.

Osuala, E.C. (1987) Introduction to Research Methodolgy, Africana- Feb. Pub. Ltd; Onitsha.

Otte, J. (2006) "Sample Size Considerations" FAO Corporate Document Repository

Parker, R.R.P. (1998) "Valuation Accuracy-An Australia Perspective" 4th Pacific Real Estate Society Conference, Perth, 19-21 January 1998.

Parker, D.R; (1993) "Aspects of a Depressed Property Market; Some Issues facing Valuers" The Valuer and Land Economist; February Vol. 1; Pp. 183-197

Paserwark, W.R. and Wilkerson, J.E. (1989) "Introducing the Power of Quintruplets: Client Power and Auditor Independence". Woman Cpa, Vol. 17 N0. 3 & 4 pp 13-17

Peterson, G.E; Kingsley, G.T. and Telgarsky, J.P. (1990) Urban Economics and National Development; Office of Housing and Urban Programs, U.S. Agency for International Development, Washington, D.C

Poneman, L.A. (1992 "Ethical Reasoning and Selection-Socialization in Accounting" Accounting Organisation and Society, Vol. 17 No.3, 4, pp.239-258

Ratcliff, R (1979) Readings on Appraisal and Bits Foundation Economics, Landmark Research, Madison

Reid, I. (1985) "A Response To Hager And Lord" Estates Gazette, 274:19-21.

RICS (1996): RICS Appraisal and Valuation Manual. Royal Institution of Chartered Surveyors, London

Roberts, J. and Roberts, E. (1991) "The Myth about Appraisals" The Appraisal Journal, Vol. 59 (2), 212-220.

27. Roulac (1985)

RICS (1998): Royal Institution of Chartered Surveyors Appraisal and Valuation Manual.

Rushmore, S. (1993) "Ethics In Hotel Appraising" The Appraisal Journal, 61(3), pp 357-363

Smolen, G.E. and Hambleton, D.C.(1997) "Is the Real Estate Appraisal's Role Too Much to Expect" Appraisal Journal, Vol. 65 No. 1.

Soludo, C.C., (2006) "The Outcome of the Banking Sector Recapitalization and the Way Forward for the Undercapitalized Banks in Nigeria" Central Bank of Nigeria Conference of 16th January.

.Tversky, A. and Kahnerman, D. (1994) "Judgement under Uncertainty: Heuristics and Biases" Science.Vol. 185, pp. 1124-1131.

the Discipline of Property", Cutting Edge Conference, RICS, London

Udo-Akagha, S. (1985) "Guidance Note on Property Valuation" Foreword to the Nigerian Institution of Estate Surveyor and Valuers 1st Edition

Waldy, B. (1997) "Valuation Accuracy" 64th FIG Permanent committee Meeting and International Symposium, Singapore, May