

**THE VIEWS OF THE PROPERTY INDUSTRY ON THE CURRICULUM OF THE  
UNDERGRADUATE PROPERTY STUDIES DEGREE IN THE SCHOOL OF  
CONSTRUCTION ECONOMICS AND MANAGEMENT AT THE UNIVERSITY OF  
THE WITWATERSRAND**

**Graeme Michael Jay**

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## **ABSTRACT**

Employers are an important group of stakeholders in the education that is provided to the graduates that they will eventually employ. As a result, any revision of the curriculum of the undergraduate property studies degree offered by CEM at Wits should take the views of the property industry into account.

The research undertaken for this research study was completed in two parts. An initial study of senior management of large property companies operating in the property industry in South Africa was undertaken. The second part of the research surveyed past students who had completed their studies in the School of Construction Economics and Management and who graduated from the University of the Witwatersrand.

This research study investigates what knowledge and skills are required by the property industry in South Africa of graduates who have completed their degree in property studies.

The results of this research study clearly indicate that there are certain areas that graduates require more knowledge of and that graduates lack practical skills when entering the work environment. The responses received from respondents in both sample groups indicated that there is too much focus on construction subjects in the current curriculum. An increased focus in the areas of property finance, property investment and asset management is required. Graduates require the degree programme to be suitable for the purposes of the academic requirements to becoming a registered valuer. Respondents in both samples were of the view that the property industry should introduce an internship programme to integrate knowledge learned at university with the practical skills required in the work environment.

It is suggested that the property studies curriculum should focus more on finance, valuations and economics and less on the quantity surveying and construction type courses, which the current curriculum contains. The inclusion of these suggestions in the curriculum will allow the degree to move closer towards the curriculum required by the property industry in a property studies degree programme.

## **DECLARATION**

I declare that this research report is my own unaided work. It has been submitted for the Degree of Master of Science in Building in the University of the Witwatersrand, Johannesburg. It has not been submitted before for any degree or examination in any other University.

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**Signature of Candidate**

\_\_\_\_\_ **Day of** \_\_\_\_\_ **(year)** \_\_\_\_\_

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## **LIST OF ACRONYMS**

AfRES – African Real Estate Society

AMP – Accredited Mortgage Professional

ASAQS – Association of South African Quantity Surveyors

BA – Bachelor of Arts degree

BAcc – Bachelor of Accounting degree

BArch – Bachelor of Architecture degree

BBusSc – Bachelor of Business Science degree

BCom – Bachelor of Commerce degree

BEconSc – Bachelor of Economic Science degree

BSc – Bachelor of Science degree

CBE – Council for the Built Environment

CA (SA) – Chartered Accountant (South Africa)

CEO – Chief Executive Officer

CEM – School of Construction Economics and Management at the University of the Witwatersrand

CFA – Chartered Financial Analyst

CHE – Council for Higher Education

CIO – Chief Investment Officer

COO – Chief Operating Officer

EAAB – Estate Agency Affairs Board

FASSA – Fellow of the Actuarial Society of South Africa

FIA – Fellow of the Institute of Actuaries

LLB – Bachelor of Laws degree

MBA – Master of Business Administration degree

MBChB – Bachelor of Medicine, Bachelor of Surgery/Chirurgery degree

MD – Managing Director

MEcon – Master of Economics degree

MPhil – Master of Philosophy degree

RICS – Royal Institute of Chartered Surveyors

SACPVP – SA Council for the Property Valuers Profession

SACQSP – SA Council for Quantity Surveying Professionals

SAIV – South African Institute of Valuers

SAPOA – South African Property Owners Association

UCT – University of Cape Town

UP – University of Pretoria

UWC – University of the Western Cape

WITS – University of the Witwatersrand

## **LIST OF APPENDICES**

Appendix A – Survey of selected degrees offered by twenty two universities  
accredited by the CHE

Appendix B – Proposed New Curriculum

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Appendix D – Research Questionnaire – Graduate

# CHAPTER 1: INTRODUCTION

## *1.1 Introduction and background*

The business environment is ever-changing, not only globally, but also in a developing country like South Africa. The growth in property or real estate as an asset and investment class now dictates that the individuals employed in this arena are professional in their approach and have suitable academic qualifications (Wells and Williams, 1993; Briffett, 1994; Baxter, 2007). In order to keep up with the changes in the environment and the demands made by industry, it is necessary for academic programmes geared towards preparing property professionals to be reviewed and amended in order to remain relevant and to provide for the property industry of the future (Wells and Williams, 1993; Baxter, 2007; Manning and Epley, 2006). Employers want their new staff “to be able to hit the ground running” (Galuppo and Worzala, 2004: 25) and Weeks and Finch (2003:257) sound the following warning perhaps ominously, “clearly, if real estate is to survive and thrive long-term as a legitimate area of business school study, a strong curriculum that is recognized as enhancing students’ ability to compete and succeed in the marketplace is a necessity.”

Property academics, as opposed to their academic colleagues who work in other academic disciplines, also have the challenge of determining what the real estate or property body of knowledge consists of (Black and Rabianski, 2003; Epley, 1996; Baxter, 2007). Baxter (2007) emphasises that as the property body of knowledge is not entirely defined and the fact that property programmes tend to be quite specialised, the ongoing development and support of these programmes within the University environment is often not as great as with other academic programmes.

The influence that the schools or departments where property programmes are housed is also to be noted. In American universities, property programmes generally find themselves in a finance or business school environment. In fact, many writers have indicated that the best place to house a property programme is within a business school (Black and Rabianski, 2003; Epley, 1996; Weeks and Finch, 2003).

In the UK, property programmes have traditionally found themselves being housed in the area of construction and surveying (Roulac, 2002; Chikafalimani and Cloete, 2007) and as Boyd (2005) and Newell and Acheampong (2002) point out, the housing of property programmes in schools that are not finance and economics based, is in fact suitable.

The school or department where a property programme is housed is therefore perhaps not as important as the curriculum that is offered by that programme, although the curriculum offered may be biased in a particular direction as a result of its home. Mabokela (1997: 68) in providing commentary on race relations and higher education in post-apartheid South Africa notes that the "...curriculum at both historically White and Black universities is heavily Euro-centric."

Ekong and Cloete (1997) comments likewise and Morrow (2003) goes further by indicating that the 'Eurocentric curriculum' of South African universities needs to be eradicated and that there needs to be a recognition that we are in Africa "...with its own alternative forms of knowledge" (Morrow, 2003: 7).

Given the euro-centric influences on our universities in South Africa, it is understandable that the property studies degree offered by the University of the Witwatersrand is housed in the School of Construction Economics and Management; the primary focus of the school being quantity surveying and construction management.

Regardless of the academic home of a property programme, Baxter (2007) does emphasise the point made by Black and Rabianski (2003) that education in the field of real estate as well as its application in the work environment has become truly universal around the world. This would not negate the influence that the school where the degree is housed has on the particular direction of the degree, such as being more finance focussed or construction focussed. Furthermore, regardless of what the global real estate body of knowledge is considered to be, there are also domestic and specific geographical area influences on property programmes (Baxter, 2007).

As previously indicated, employers play an important role in providing input into the development of curriculum over time (Wells and Williams, 1993; Manning, 2002; Baxter, 2007) and it is therefore necessary to interact with the future employers of graduates in order to determine whether or not the curriculum that is currently being offered does indeed reflect the skills and knowledge requirements of the particular industry. Manning (2002: 28) is of the opinion that "...prospective employers obviously possess valuable knowledge that can assist faculty to select more useful and relevant course content." The school or department where the academic programme is housed should not affect the input provided by employers.

The current curriculum of the property studies programme at Wits contains general real estate or property courses, such as valuations, property economics and property marketing and management. However, given the home (CEM) of the property studies programme at Wits, the curriculum of the programme also has a strong bias towards construction and quantity surveying subject matter. Weeks and Finch (2003) observe that the department where the real estate programme is accommodated, "...seems to drive curriculum requirements" (Weeks and Finch, 2003: 267).

When the property studies programme was first introduced into the school (CEM) in 2001, although all relevant university procedures were followed relating to the introduction of a new qualification, there was little or no consultation with the industry and potential employers at the time.

It has therefore become necessary to re-visit the curriculum offered by the property studies degree programme and interact with both employers and graduates.

## ***1.2 The School of Construction Economics and Management (CEM) at the University of the Witwatersrand (Wits)***

The work of Ralph Tyler in the late 1940s arguably laid the platform for the future development of curriculum models in the second half of the twentieth century (Hewitt, 2006; Doll, 1992; Carl, 2002).

An important aspect of the Tyler model is the evaluation of the curriculum to determine whether or not the objectives of the curriculum have been attained (Doll, 1992).

All academic schools at the University are required to review their degree programmes on a regular basis and this presented an opportunity for a thorough analysis and evaluation of the current property studies programme offered by CEM at Wits.

CEM at Wits currently offers the following undergraduate degree programmes, viz:

- Quantity Surveying (Undergraduate);
- Construction Management (Undergraduate); and
- Property Studies (Undergraduate).

CEM's undergraduate programmes are currently four year Bachelor degrees (South African equivalent of an Honours degree) and the School is in the process of making these three year Bachelor degrees followed by a one year Honours degree to enable a student to exit after three years with a Bachelors degree. Only those students wishing to, or judged capable by the School of doing so would then proceed on to the one year Honours degree. Given that the property studies degree was initially introduced with little or no industry consultation, this review process also presented the opportunity to consult with employers and graduates. The undergraduate property studies degree offered by CEM at Wits was identified as a case study and the curriculum of the degree as the unit of analysis.

### ***1.3 Research question***

The curriculum of any degree programme must remain relevant and requires updating over time to reflect the changing needs of both students as well as employers. The property industry in South Africa has developed over the past twenty years and graduates with knowledge in areas such as property investment, property finance, property management and asset management are being demanded by the corporate real estate sector.

The property industry ultimately employs the graduates who choose property as a path of study and career and it is therefore necessary to ensure that any changes to be made to the property studies curriculum include the requirements of the property industry.

Hence this prompted the **research question**:

***How should the curriculum of the undergraduate property studies degree programme offered by CEM at Wits be developed/changed in order to remain relevant and meet the needs of the property industry in South Africa?***

This in turn led to the following **sub-questions**:

- *What is the definition of curriculum?*
- *What is the process to be followed to create a revised curriculum for the property studies programme in CEM at Wits?*
- *Is there consensus regarding the real estate body of knowledge?*
- *Is the current property studies curriculum offered by CEM at Wits relevant and meeting the needs of the property industry in South Africa?*
- *What are the knowledge requirements that the property industry requires of property studies graduates?*

#### ***1.4 Aim of this research study***

The aim of this research study is to determine what skills and knowledge the property industry requires of graduates of undergraduate property studies degree programmes and hence how the requirements of industry will influence the curriculum development of such programmes. A further aim is to determine what skills and knowledge graduates of property studies programmes believe that future graduates of such programmes should have and also how these views will influence the curriculum development of the property studies curriculum of CEM at Wits. This research study also aims to identify what knowledge areas constitute the real estate body of knowledge and whether or not consensus exists regarding the body of knowledge.



### **1.5 Objectives**

The primary objective of this study is to determine the view of the property industry as to whether the current curriculum of the undergraduate property studies degree in CEM at Wits addresses the knowledge requirements of the property industry. The secondary objectives of this study are:

- To define the concept of curriculum;
- To explore and examine the process to be followed in developing and re-developing a curriculum;
- To determine whether consensus exists regarding the real estate body of knowledge;
- To examine the current curriculum of the property studies degree offered by CEM at Wits; and
- To determine the extent to which the needs of the property industry are being met by the current curriculum of the property studies degree offered by CEM at Wits.

### **1.6 Research proposition**

The proposition of such a research study would then be:

The view of the property industry is that the curriculum of the undergraduate property studies degree in the CEM at Wits does not currently address the knowledge requirements of the property industry.

### **1.7 Limitations**

The first group of graduates of the property studies degree at Wits completed their degree in 2005. The graduates surveyed for the purposes of this research study graduated between 2005 and 2009. As people change their contact details over time, it was also not possible to contact all the graduates who form part of the sample group.

The property industry in South Africa is diverse and includes, inter alia, occupations in corporate property owning entities, valuation companies, asset and facility managers, property finance, property broking. It is not possible to survey the whole industry due to its diverse nature. However, SAPOA is considered to be the most representative property body in South Africa.

According to SAPOA's website,

“SAPOA, or the South African Property Owners Association, is the representative body and official voice of the commercial and industrial property industry in South Africa.

SAPOA was established in 1966 by the leading and large property investment organisations to bring together all role players in the commercial property field and to create a powerful platform for property investors. Today our members control about 90% of all commercial and industrial property in South Africa, with a combined portfolio in excess of R150 billion ([www.sapoa.org.za](http://www.sapoa.org.za)).”

The membership of SAPOA was therefore considered to be representative of the property industry in South Africa and due to the fact that the members of SAPOA are so dominant in the industry, most property studies graduates would tend to commence their working careers working for a SAPOA member, especially as many of the SAPOA members have graduate trainee programmes and provide bursaries to fund university studies.

The dearth of relevant South African literature available on the topic, unlike the literature emanating out of the US, the UK, Europe, Australia and New Zealand was also a limitation.

A further limitation is that any suggestions with regard to the curriculum development of the property studies curriculum of CEM at Wits does not take into account the underlying philosophy of CEM and hence the influence that this may have on curriculum development, specifically with regards to the framework or content of that curriculum.

### ***1.8 Assumptions***

The researcher's involvement in CEM, private training business and the property industry provides him with the depth of knowledge and background to enhance the outcome of the research study, with reliable and suitable suggestions based on the research findings. It is acknowledged that this may introduce an inherent level of bias. Questionnaires to be utilised to collect primary data were designed in such a manner to ensure that any bias was minimised or avoided. The researcher was also mindful of this potential bias when analysing the data.

### ***1.9 Methodology***

This study is primarily qualitative using a case study approach. The undergraduate property studies degree offered by CEM at Wits was identified as the case study and the curriculum of the degree as the unit of analysis. As the primary objective of this research study was to determine whether the current curriculum of the undergraduate property studies degree in CEM at Wits addresses the knowledge requirements of the property industry, it was decided that the best method to collect primary data to meet these objectives was through a survey of two populations, namely employers and graduates using two similar questionnaires.

Data was analysed using ordinal measurement. Qualitative inferences were drawn from the analysis of the data to test the strength of support for the research proposition.

The significance of this study is that it provides input and an overview with regard to curriculum design and development of the undergraduate property studies degree with respect to Wits specifically and more generally, the other universities in South Africa that offer the same or similar degree.

### **1.10 Structure**

The researcher initially conducted a worldwide literature review using web based academic search engines.

This provided an extensive and comprehensive background to the research topic. In addition, a vast variety of local and international journals, textbooks, industry websites, electronic journals, current affairs and academic articles were consulted in order to provide a greater understanding of the subject. Chapter 2 provides a thorough analysis of existing published material, relative to this research study.

Chapter 3 presents a discussion on research methodology as well as the research design and the actions taken to conduct this research study. Questionnaires were distributed to the two different target groups identified for the purposes of this research study. Two similar empirical studies were conducted to suit two different target groups at two separate times. These studies set out to gather information from industry players and recent graduates who had exposure to industry needs. The findings are presented in Chapter 4 of this research study.

Chapter 5 presents the conclusions to the research study as well as the argument for the development and implementation of a new curriculum for the undergraduate property studies degree at Wits.

## **CHAPTER 2: LITERATURE REVIEW**

### ***2.1 Introduction and overview***

This chapter presents a review of literature regarding the definition of curriculum and the models that have been developed to assist with the process of curriculum development. Literature relating to curriculum development of property degree programmes generally and also the research that has been undertaken into the skills and knowledge required of professionals working in the property industry is also reviewed.

### ***2.2 Definition of curriculum***

Lawton (1975) indicates that a narrow definition of curriculum relates to what is formally scheduled to be taught in the classroom. Therefore, the easiest way to learn about any curriculum would be to determine what the lecturer or instructor is teaching in the lecture room or to read through the course outline applicable to that course. However, Lawton (1975) also suggests that 'extra-curricular activities' or activities that occur outside of the lecture room should also form part of the curriculum. Doll (1992) agrees with this sentiment.

The views of Kelly (1989) are perhaps more insightful when he points out that the word curriculum often has numerous connotations. Kelly (1989: 10) states, "To begin with, it will be helpful if we distinguish the use of the word to denote the content of a particular subject or area of study from the use of it to refer to the total programme of an educational institution".

The view taken in this research study accords with those of Kelly's (1989) when he talks of the curriculum being, "...the overall rationale for the educational programme of an institution..." and that the development of the curriculum will, "...be of relevance to the problems of developments within individual subject areas" (Kelly, 1989: 11).

Therefore, in this research study, the curriculum of the property studies degree of CEM at Wits will refer to the structure of the degree, being in the words of Kelly (1989: 10), “the total programme.”

### **2.3 Approaches to curriculum development**

Numerous models relating to curriculum development have been developed over the last 60 years. A thorough analysis of all the models is beyond the scope of this research study; however an overview does provide some useful insights into the various approaches that one can follow. An overview of the various approaches summarised from Carl (2002: 55 to 62) is presented in Table 2.1.

**Table 2.1 Approaches to curriculum development**

<b>Approach</b>	<b>Description</b>
The academic approach	This approach suggests that curriculum development should be done in a logical and systematic manner. It has academic rationality and is theoretically logical. The Tyler rationale, being perhaps the most famous of these approaches has four steps, namely, identification of goals and objectives, the educational experiences likely to attain these goals and objectives, organisation of the educational experiences and finally evaluation.
The experiential approach	This approach suggests that the teachers and their students play an important role in making co-operative curriculum decisions. This approach is far more learner centric and subjective than the academic approach and was originally proposed by Dewey in 1897.
The technological approach	This approach is also an analytical approach. Curriculum planning is to be approached and its effectiveness maximised using scientific or engineering principles that would be applied in industry. Scientific curriculum development was first proposed by Franklin Bobbit in 1918. The logical process to achieve the end result is also important in the technological approach and in this respect is similar to the Tyler rationale.
The pragmatic approach	This approach to curriculum development says that the process of curriculum development is not logical or systematic, but rather is the result of a more complex process that is grounded in involvement and interaction. Advocates of this approach propose that curriculum development is reactive and happens in a fragmented fashion. Principles drawn from the academic, experiential and technological approaches are utilised in this approach. There will be much discussion and negotiation between interested parties before consensus on the curriculum is achieved. One of the proponents of this approach is Decker Walker who, in 1971, referred to this as a naturalistic model.

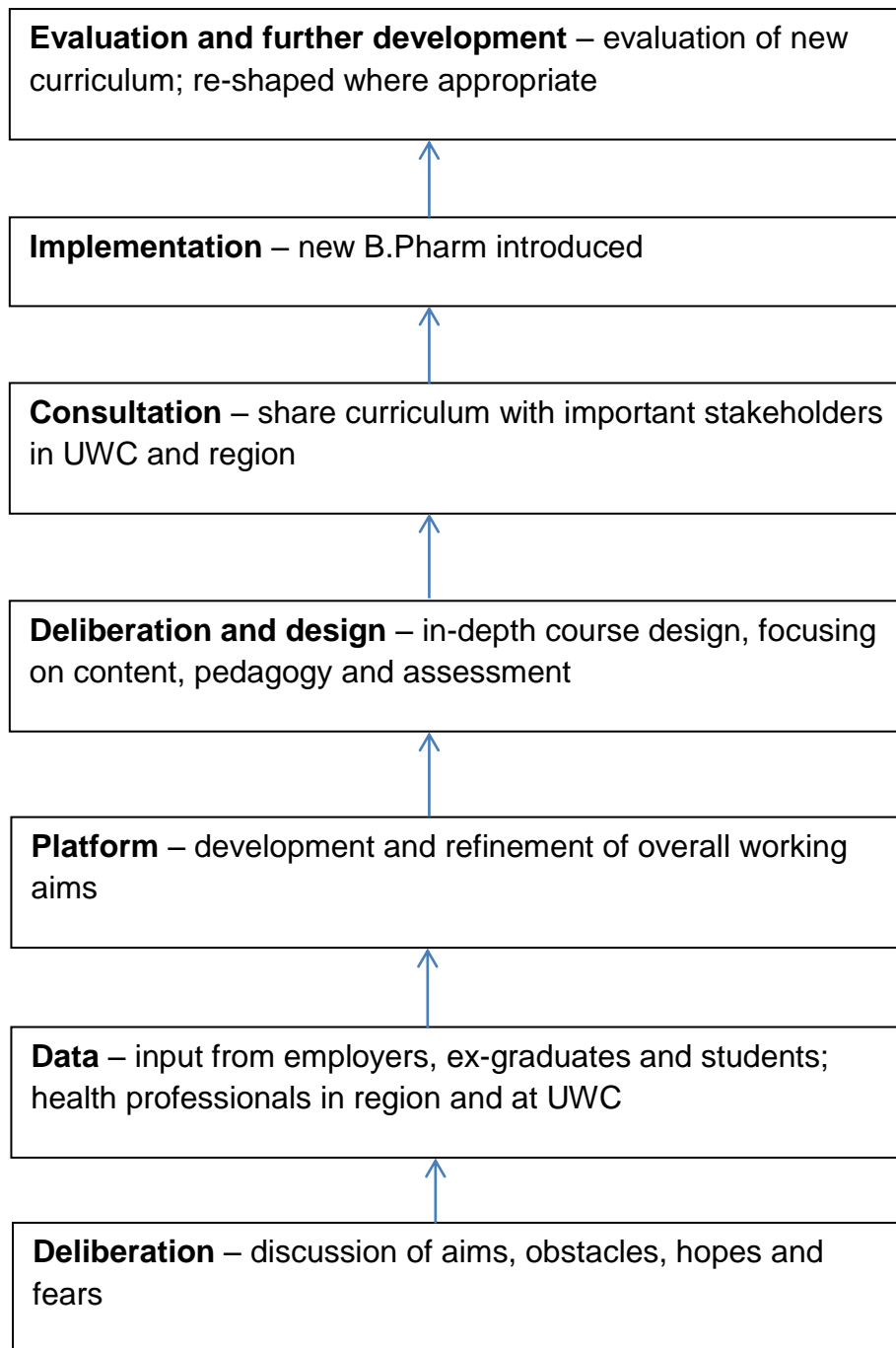
**(Source: Carl (2002))**

Walker's model follows a "...three-step sequence of developing a platform, a process of deliberation (which includes a sub-stage of data collection), and of design..." (Butler and Ensor, 1994: 77). Hewitt (2006) mentions that the 'deliberation process' when applying Walker's model is important and that Walker's model is based upon research that was undertaken by Walker. Hewitt (2006: 142) goes on to state, "Models that emerge based upon research or as extractions from the research experience are important for a discipline and for practice." Therefore, the use of Walker's model would be acceptable given that its development is grounded in research undertaken by Walker.

Butler and Ensor (1994), in discussing the process of curriculum development and review that was followed by the School of Pharmacy at the University of the Western Cape (UWC) articulate that Walker's naturalistic model is to be applied as follows:

1. Platform stage – at this stage people's opinions and insights are communicated openly between all those participating in the curriculum development process. One of the objectives of the platform stage is to identify the areas of agreement and disagreement between all those participating in the process.
2. Deliberation stage – during this stage, the areas of disagreement identified in the platform stage are re-visited and workable solutions are identified that all participants are satisfied with.
3. Design stage – this stage encompasses the process that will be used to complete the development of the curriculum.

At UWC, the model that was used to complete the process of curriculum development (design stage) is highlighted in Figure 2.1.



**Figure 2.1 Descriptive model of curriculum development in UWC's School of Pharmacy**

**(Source: Butler and Ensor (1994: 93))**

Butler and Ensor (1994) emphasise the point, that Walker's naturalistic model is not applied in a step-by-step fashion and the steps followed do not necessarily lead on from each other. A derivation of Walker's naturalistic model was also applied in the curriculum development process that was undertaken by CEM at Wits. This will be discussed further in detail in Chapter 5.



## ***2.4 Multidisciplinary and interdisciplinary field of Property Studies or Real Estate***

Although universities in the US have provided instruction for courses in the field of real estate for the last century, "...the academic field of real estate has had a difficult time finding a clear niche within the academy" (Weeks and Finch, 2003: 257). One of the difficulties in being able to define property studies or real estate as a distinct academic discipline lies in the fact "...that real estate is a complex asset and the real estate industry is a multidisciplinary field" (Galuppo and Worzala, 2004: 25). Galuppo and Worzala (2004) further emphasize this point when they point out the multifaceted components of real estate studies include, "...real estate law, real estate finance, real estate appraisal, real estate equity investments, urban land economics, real estate development, secondary mortgage markets and real estate asset management" (ibid: 25) and that students need to study several of these courses to fully appreciate and understand the field of real estate.

The argument therefore being advanced by Galuppo and Worzala (2004) is that the professional field of real estate is extremely varied where people can choose to work in areas such as property management, asset management, property finance and property development and that the education of professionals in the real estate industry requires "...an emphasis on the important multidisciplinary aspects of real estate" (ibid: 25). This means that the academic education of a property professional needs to be varied and encompass the 'multidisciplinary' aspects of real estate.

Baxter (2007) also notes that due to the fact that the business environment is continuously evolving and changing, the significant increase in the size of the property sector generally and the large scale and intricate property developments that have occurred around the world, that property valuers are required to possess a 'different skill-set' than may have been required previously. Baxter (2007) comments that students who qualify as valuers may do so in order to obtain a professional registration and title, but then diversify into other areas in real estate, such as "...consultancy, property finance, portfolio management, or agency" (ibid: 445).

This would therefore imply, that the views of Baxter (2007) concur with those of Galuppo and Worzala (2004) in that the education of real estate professionals needs to prepare them for the multidisciplinary field of real estate.

Interestingly, Baxter's (2007) article provides commentary about the real estate environment in Australia, whereas Galuppo and Worzala (2004) concerns the United States, yet their research indicates similar findings and experience in different parts of the world.

Chikafalimani and Cloete (2007: 7), in their discussion of the South African environment also confirm "...that real estate is a complex asset and multidisciplinary in nature" and that "Production of competent graduates who will meet industrial requirements can only be achieved by exposing students to a several range of issues and concepts in the curriculum." Black and Rabianski (2003) and Mooya (2007) have similar views.

The multifaceted components of real estate studies noted by Galuppo and Worzala (2004) would imply that the field of real estate is also varied and multifaceted. Therefore, real estate professionals may work in diverse areas ranging from property management to asset management to property development to property finance. However, according to Chikafalimani and Cloete (2007), real estate professionals also need to have knowledge of finance as well as the influence that 'social, cultural, legal and political' issues have on real estate. Black, Carn, Diaz III and Rabianski (1996: 183) note that the "...real property discipline is both multidisciplinary and interdisciplinary." Black et al. (1996) argue that the real property discipline is multidisciplinary because the real estate professional requires complete comprehension of a 'combination of disciplines' and it is interdisciplinary because the real estate professional needs to be able to connect principles and ideas from other well established academic schools of thought that need to be applied in the area of real property.

An example of the multidisciplinary nature of the real estate environment advanced by Black et al. (1996: 183) is that "Commercial site selection, for example, involves at a minimum some knowledge of civil engineering, landscape architecture, architecture, economics, finance, accounting, marketing, law and psychology."

An example of the interdisciplinary nature of the real estate environment advanced by Black et al. (1996: 183) is that "...discounted cash flow analysis is the result of an interdisciplinary melding of accounting, finance and economics."

Therefore, if property studies or real estate as an academic discipline is to prepare students adequately for the real estate environment, the curriculum should contain a combination of disciplines (multidisciplinary), identify how the various disciplines interlink and relate to each other (interdisciplinary) and encompasses a broad spectrum of knowledge areas (Black and Rabianski, 2003; Mooya, 2007). Given this, the researcher is not proposing any specific definition of real estate or property studies. The terms real estate and property studies will be used interchangeably in this research study. These terms likely reflect the geographic origin of the degree programme, but will equally be used to denote a similar academic discipline in this research study.

## ***2.5 Survey of RICS accredited degree programmes***

The contribution that an accreditation body such as RICS has made regarding the development of the real estate curriculum worldwide has been noted by authors such as Schulte (2003) and Mooya (2007). RICS is active in South Africa and has accredited various degrees offered by universities in South Africa. Given the influence that RICS has in the UK as well as the Commonwealth countries, it would be of value to gain an understanding of the focus of the qualifications accredited by RICS. According to the Royal Institute of Chartered Surveyors (RICS) website, of the universities globally that offer RICS accredited degree programmes, there are:

- Eighty eight universities offering an undergraduate degree in Quantity Surveying and Construction;
- Twenty five universities offering an undergraduate degree in Building Surveying;
- Nineteen universities offering an undergraduate degree in Environmental Planning and Management;
- Six universities offering an undergraduate degree in Facilities Management;

- Seventy universities worldwide offering an undergraduate degree in Commercial Property Practice; and
- Seventy universities offering an undergraduate degree in Residential Property Practice.

([www.rics.org](http://www.rics.org))

Closer inspection reveals that the degrees in Commercial Property Practice and Residential Property Practice are identical. Although, there are at least 70 broadly classified Commercial Property Practice or Residential Property Practice degree programmes to choose from worldwide, these degrees, selected on a random basis, vary from:

- BSc Hons Business in Property offered by the School of the Built and Natural Environment at the University of the West of England at Bristol; to
- Bachelor of Business Management (Real Estate and Development) offered by the Business School at the University of Queensland; to
- BA Hons Business of Real Estate offered by the Department of the Built Environment at Oxford Brookes University; to
- Bachelor Engineering (Real Estate Management) offered by the Faculty of Construction Management and Real Estate at Chongqing University; to
- BSc Hons International Real Estate offered by the Faculty of Development and Society at Sheffield Hallam University; to
- BSc Hons Investment and Finance in Property offered by the School of Real Estate and Planning at the University of Reading; to
- BA Hons Tripos Land Economy offered by the Department of Land Economy at the University of Cambridge; to
- LLB Law and Property Valuation offered by the City Law School at City University London; to
- Bachelor of Property offered by the Department of Property at the University of Auckland; to
- Bachelor of Applied Science Property offered by the School of Property, Construction and Project Management at RMIT University; to

- BSc Hons Property Agency and Marketing offered by the School of Real Estate and Land Management at the Royal Agricultural College; to
- Bachelor of Property and Real Estate offered by the School of Architecture and Building at Deakin University; to
- BSc Hons Property Development offered by the School of Civil Engineering and Surveying at the University of Portsmouth; to
- BSc Hons Property Development and Valuation offered by the School of Engineering and the Built Environment at Edinburgh Napier University; to
- BSc Hons Property Economics (Valuation Surveying) offered by the Department of Surveying and Building Technology at the Dublin Institute of Technology; to
- BSc Hons Property Management offered by the Faculty of Construction and Land Use at the Hong Kong Polytechnic University; to
- BSc Hons Property Management and Investment offered by the School of the Built Environment at the University of Salford; to
- BSc Hons Property Management and Valuation offered by the School of the Built and Natural Environment at the Glasgow Caledonian University.

([www.rics.org](http://www.rics.org))

One can see that the names of the degrees vary greatly which may perhaps be reflective of differences in philosophy or local conditions. Table 2.2 compares all of these randomly selected degrees in terms of the type of degree that is offered, the school or department where the degree is housed and the location of the university.

**Table 2.2 Comparison of randomly selected degrees accredited by RICS**

<u>University</u>	<u>Degree</u>				<u>School/Department</u>				<u>Location of University</u>
	<u>BSc</u>	<u>Business</u>	<u>Property/ Real Estate</u>	<u>Other</u>	<u>Built Environment</u>	<u>Business or Commerce</u>	<u>Property/ Real Estate</u>	<u>Other</u>	
University of the West of England at Bristol	X				X				United Kingdom
Oxford Brookes University				X	X				United Kingdom
Sheffield Hallam University	X				X				United Kingdom
University of Reading	X						X		United Kingdom
University of Cambridge				X				X	United Kingdom
City University London				X				X	United Kingdom
University of Portsmouth	X							X	United Kingdom
Edinburgh Napier University	X				X				United Kingdom
Dublin Institute of Technology	X							X	United Kingdom
University of Salford	X				X				United Kingdom
Glasgow Caledonian University	X				X				United Kingdom
University of Queensland		X				X			Australia

Deakin University			X		X				Australia
RMIT University			X				X		Australia
University of Auckland			X				X		New Zealand
Hong Kong Polytechnic University	X				X				Hong Kong
Chongqing University				X	X				China

**(Source: [www.rics.org](http://www.rics.org))**

One notes from Table 2.2, that only 3 of the degrees (17% of the sample) are called a Bachelor of Property (University of Auckland), Bachelor of Applied Science Property (RMIT University) or a Bachelor of Property and Real Estate (Deakin University) with 9 of the 18 degrees (50% of the sample) being a Bachelor of Science and only 1 degree (6% of the sample) being a Bachelor of Business Management. Nine of the 18 degrees (50% of the sample) are housed in a School or Department of the Built Environment and only 3 of the 18 degrees (17% of the sample) are housed in a School of Real Estate and Planning (University of Reading), School of Property, Construction and Project Management (RMIT University) or Department of Property (University of Auckland). It is important to note that due to the limited sample size, no statistical significance is implied with the percentages of the sample identified in analysis of Table 2.2.

Twelve of the 18 degrees of the sample are offered by universities located in the UK, with 8 of these 12 universities offering their degrees as a Bachelor of Science and 6 of the 12 universities house their degrees in a School or Department of the Built Environment, Construction or Surveying.

Another matter of interest is the focus of the various degrees surveyed, as indicated in the name of the degree:

- Two of the 18 degrees appear to focus on the Business of Property or Real Estate;

- Three of the 18 degrees focus on Real Estate Development;
- Three of the 18 degrees focus on Property and Real Estate;
- One of the 18 degrees focus on Property or Real Estate Management;
- Two of the 18 degrees focus on Property or Real Estate Management together with Property Investment or Property Valuation;
- One of the 18 degrees focus on Property Agency and Marketing;
- One of the 18 degrees focus on International Real Estate;
- One of the 18 degrees focus on Investment and Finance in Property;
- Two of the 18 degrees focus on Property Economics or Land Economy; and
- Two of the 18 degrees focus on Law or Business Management together with Property Valuation.

It is assumed that the title of the degree accurately reflects the curriculum of the degree. The diversity of terminology used in naming the degree as well as the apparent divergent focus of these degrees raises the question as to whether or not a discernable body of real estate knowledge exists. This question will be dealt with in this chapter.

## ***2.6 The academic disciplines of construction and property studies***

One must also bear in mind the need to distinguish the field of property studies or real estate from the various construction and related disciplines. Students can, for example, choose to follow a career path in quantity surveying, construction management, town/urban planning and civil engineering and there are specialised degrees that can be obtained in these fields. Wits, for example, offers the following four year degrees in the academic disciplines mentioned above:

- BSc in Quantity Surveying Studies BSc (Hons)
- BSc in Construction Management Studies BSc (Hons)
- BSc in Urban and Regional Planning (Hons)
- BSc (Eng) in Civil and Environmental Engineering

([www.wits.ac.za](http://www.wits.ac.za))



Indeed there are numerous universities and institutions of higher learning in South Africa that also offer these specialised degrees or qualifications. Appendix A presents a web based survey of the 22 universities or higher education institutions accredited by the CHE and their respective qualifications that they offer in the academic disciplines of quantity surveying, construction management, town/urban planning and civil engineering.

An analysis of the survey contained in Appendix A reveals the following:

- Five of the institutions or 22.7% offer a BTech: Quantity Surveying, 1 institution or 4.5% offers a ND: Building (Extended Programme – QS), 4 institutions or 18.2% offer a Bachelor of Science in Quantity Surveying, 5 institutions or 22.7% offer a BSc Honours in Quantity Surveying and 10 of the institutions or 45.5% of the institutions do not offer any studies in Quantity Surveying;
- Seven of the institutions or 31.8% offer a ND: Building, 5 of the institutions or 22.7% offer a BTech: Construction Management, 4 of the institutions or 18.1% offer a Bachelor's or BSc in Construction Management, 5 of the institutions offer a BSc Honours in Construction Management and 10 of the institutions or 45.5% of the institutions do not offer any studies in Construction Management;
- Seven of the institutions or 31.8% offer a ND: Engineering: Civil, 7 of the institutions or 31.8% offer a BTech: Engineering: Civil, 5 of the institutions or 22.7% offer a Bachelor's or Honours degree in Civil Engineering and 9 of the institutions or 40.9% of the institutions do not offer any studies in Civil Engineering; and
- Two of the institutions or 9.1% offer a ND: Town and Regional Planning, 2 of the institutions or 9.1% offer a BTech: Town and Regional Planning, 5 of the institutions or 22.7% offer a Bachelor's or Honours degree in Town and Regional or Urban Planning and 14 of the institutions or 63.6% of the institutions do not offer any studies in Town and Regional or Urban Planning.

A point to highlight is that only Wits and UCT offer a BSc Honours in Property Studies and UP offers a BSc in Real Estate compared to the numerous institutions accredited by the CHE offering students the opportunity to study quantity surveying, construction management, civil engineering and town/urban planning. The University of KwaZulu-Natal offers a BSc Property Development. According to the University of KwaZulu-Natal's Undergraduate Prospectus 2011,

“The Bachelor of Science in Quantity Surveying and the Bachelor of Science in Construction Management are no longer available to new entrants. These programmes have been replaced by the Bachelor of Science in Property Development (BScPropDev) (3 years full-time). Graduates from this programme may choose to follow either the BScPropDev Honours degree in Construction Management or in Quantity Surveying (1 year full-time) after completion of the Bachelor of Property Development degree.” (ibid: 74)

Notwithstanding the information contained within the prospectus, the University of KwaZulu-Natal has not accepted any first year registrations in the 2011 academic year into their property programme and this programme is in the process of being wound down.

The University of the Free State offers a BSc in Land and Property Development Management which focuses on land administration and construction management.

Table 2.3 presents a comparison of the curriculum of the property studies degree offered by Wits and UCT and the real estate degree offered by UP.

**Table 2.3 Comparison of property studies degrees offered by Wits, UCT and UP**

	<b>WITS BSc Property Studies (Honours)</b>	<b>UCT Bachelor of Science in Property Studies</b>	<b>UP BSc of Science Real Estate</b>
<i>First year of study</i>	<ul style="list-style-type: none"> <li>• Applied Mathematics (BQ)</li> <li>• Construction Planning and Design 1</li> <li>• Theory and Practice of Quantity Surveying 1</li> <li>• Mathematics (BQT)</li> <li>• Planning for Property Developers (half-course)</li> </ul>	<ul style="list-style-type: none"> <li>• Property Studies I A</li> <li>• Property Studies I B</li> <li>• Property Information Systems</li> <li>• Property Investment Mathematics I</li> <li>• Building Technology I T</li> <li>• Management &amp; Enterprise</li> <li>• Microeconomics</li> <li>• Macroeconomics</li> <li>• Statistics</li> <li>• Statistics 1001</li> </ul>	<p><b>First Semester</b></p> <ul style="list-style-type: none"> <li>• Building drawings 111</li> <li>• Building science 110</li> <li>• Computer literacy 111</li> <li>• Academic literacy 110</li> <li>• Building services 112</li> <li>• Quantities 101</li> <li>• Site analysis and assessment 110</li> <li>• Statistics 110</li> <li>• Pre-calculus 133</li> </ul> <p><b>Second Semester</b></p> <ul style="list-style-type: none"> <li>• Industrial and organisational psychology 181</li> <li>• Building organisation 121</li> <li>• Building drawings 121</li> <li>• Building science 120</li> <li>• Information literacy 121</li> <li>• Academic literacy 120</li> <li>• Building services 122</li> <li>• Quantities 101</li> <li>• History of the environment 122</li> <li>• Introduction to research 151</li> <li>• Statistics 161</li> </ul>
<i>Second year of study</i>	<ul style="list-style-type: none"> <li>• Business Accounting</li> <li>• Construction Planning and Design II</li> <li>• Theory and Practice of Quantity Surveying II</li> <li>• Building Science I</li> <li>• Civil Engineering in Relation to Planning</li> <li>• Economics 1</li> <li>• Commercial Law</li> </ul>	<ul style="list-style-type: none"> <li>• Financial Accounting I</li> <li>• Business Finance</li> <li>• Business Law I</li> <li>• Property Studies II A</li> <li>• Real Property Law I</li> <li>• Measurement</li> <li>• Property Investments Mathematics II</li> <li>• Property Studies II B</li> </ul> <p><b>Elective Core Courses</b></p> <ul style="list-style-type: none"> <li>• Marketing I</li> <li>• People Management</li> <li>• Labour Law</li> <li>• Microeconomics II</li> <li>• Macroeconomics II</li> <li>• Business Statistics</li> </ul>	<p><b>First Semester</b></p> <ul style="list-style-type: none"> <li>• Building science 210</li> <li>• Economics 110</li> <li>• Financial accounting 111</li> <li>• Building services 212</li> <li>• Cartography 110</li> <li>• Quantities 200</li> </ul> <p><b>Second Semester</b></p> <ul style="list-style-type: none"> <li>• Building science 220</li> <li>• Economics 120</li> <li>• Financial accounting 121</li> <li>• Building services 222</li> <li>• Quantities 200</li> <li>• Informatics 181</li> <li>• History of the environment 224</li> <li>• Civil engineering services 220</li> <li>• Theory of strategic and integrated development planning 220</li> </ul>

	<b>WITS BSc Property Studies (Honours)</b>	<b>UCT Bachelor of Science in Property Studies</b>	<b>UP BSc of Science Real Estate</b>
<b>Third year of study</b>	<ul style="list-style-type: none"> <li>Industrial Organisation and Management</li> <li>Construction Technology (half course)</li> <li>Theory and Practice of Quantity Surveying III</li> <li>Research Report (half course)</li> <li>Property Valuation</li> <li>Property Economics</li> <li>Commercial Law</li> </ul>	<ul style="list-style-type: none"> <li>Business Law II</li> <li>Professional Communication Studies</li> <li>Property Studies III A</li> <li>Property Studies III B</li> <li>Property and Contract Law</li> <li>Cost Engineering I</li> <li>Property Studies III C</li> </ul> <p><b>Elective Core Courses</b></p> <ul style="list-style-type: none"> <li>Business Accounting</li> <li>Management Accounting I</li> <li>Marketing I</li> <li>Company Law</li> <li>Labour Law</li> <li>Globalisation &amp; the Built Environment</li> <li>Microeconomics II</li> <li>Macroeconomics II</li> <li>Business Statistics</li> <li>Research &amp; Survey Statistics</li> </ul> <p><b>Post Graduate Honours Degree</b></p> <p>“The curriculum of the BSc(Hons) in Property Studies programme equips graduates to: apply advanced methods of valuation and value special properties; manage property and buildings; plan, control and report costs associated with property management; know and apply legislation and case law relevant to the valuation of fixed property; define a research problem, undertake empirical research, analyse data and report research findings; and apply skills in an elective area of speciality in statistics, management, economics or law.”</p>	<p><b>First Semester</b></p> <ul style="list-style-type: none"> <li>Business law 310</li> <li>Building science 310</li> <li>Building services 312</li> <li>Institutional and legal structures for planning 310</li> <li>Community-based project 201</li> <li>Construction information technology and communication 311</li> </ul> <p><b>Second Semester</b></p> <ul style="list-style-type: none"> <li>Housing 320</li> <li>Settlement establishment and housing delivery 220</li> <li>Building science 320</li> <li>Introduction to property law 320</li> <li>Building services 322</li> <li>Urban land development economics 261</li> <li>Community-based project 201</li> </ul>
<b>Fourth year of study</b>	<ul style="list-style-type: none"> <li>Discourse</li> <li>Commercial Procedures including Relevant Legislation</li> <li>Introduction to Construction Project Management</li> <li>Estimating and Analysis of Prices (half course)</li> <li>Property Finance and Investment</li> </ul>	<ul style="list-style-type: none"> <li>Advanced Property Studies A</li> <li>Advanced Property Studies B</li> <li>Applied Property Law</li> <li>Housing Development &amp; Management I T</li> <li>Research Report</li> <li>Advanced Property Studies C</li> </ul>	NONE

	<ul style="list-style-type: none"> <li>• Cost Evaluation and Control</li> <li>• Property Marketing and Management</li> </ul>	<p><b>Elective Courses</b></p> <ul style="list-style-type: none"> <li>• Business Accounting Management Accounting I</li> <li>• Marketing I</li> <li>• Company Law</li> <li>• Labour Law</li> <li>• Construction Costing</li> <li>• Construction Management I T</li> <li>• Globalisation &amp; the Built Environment</li> <li>• Microeconomics II</li> <li>• Macroeconomics II</li> <li>• Business Statistics</li> <li>• Research and Survey Statistics</li> <li>• Approved elective</li> </ul>	
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**(Source: [www.wits.ac.za](http://www.wits.ac.za), [www.uct.ac.za](http://www.uct.ac.za), [www.up.ac.za](http://www.up.ac.za))**

As previously mentioned, the prospective student has a wide choice of university or higher education institution in South Africa should they wish to study Quantity Surveying, Construction Management, Town/Urban Planning and Civil Engineering. However, the only universities in South Africa that offer property studies as distinct academic disciplines are Wits, the University of Cape Town (UCT) and the University of Pretoria (UP) and furthermore, the property studies degrees at Wits, UCT and UP are all housed in a School or Department of Construction Economics and Management.

An analysis of the curriculum offered by Wits, UCT and UP reveals a focus in the areas of construction management and quantity surveying for the degrees offered by Wits and UP, which is to be expected given the academic school or department where the programme is housed. Although the degree offered by UCT is housed in a similar academic school, it has very little focus in the areas of construction management and quantity surveying and offers more courses in the areas of real estate and property studies as students have to complete Property Studies IA and IB in the first year of study, Property Studies IIA and IIB in the second year of study, Property Studies IIIA, IIIB and IIIC in the third year of study and Advanced Property Studies A, B and C in the fourth year of study.

## ***2.7 The body of knowledge of real estate or property education internationally***

According to Schulte (2003) the evolution of Property Studies has differed between different countries. Weeks and Finch (2003: 257) state that, "Real estate coursework has been variously characterized as vocational, a branch of economics, a branch of finance, or an independent academic field." One of the on-going debates with the academic environment is what constitutes the common body of real estate knowledge and what should be taught in a real estate programme (Wells and Williams, 1993; Weeks and Finch, 2003; Black and Rabianski, 2003; Galuppo and Worzala, 2004; Baxter, 2007)

The manner in which property studies or real estate programmes have evolved makes for an interesting study. Weeks and Finch (2003) citing Nourse (1995) in discussing the origins of real estate as an academic discipline, note that universities in the US have been providing courses in real estate classes for the last century. However, although this is the case, a unified body of knowledge that has achieved consensus amongst academics does not seem to have emerged.

The academic department or school where the real estate or property studies programme is housed appears to have had an influence. Various commentators note that the finance and investment focus of many of the real estate degrees in the US is as a result of the degree being accommodated in a business school or business or finance department within the university (Wells and Williams, 1993; Weeks and Finch, 2003; Black and Rabianski, 2003; Galuppo and Worzala, 2004; Baxter, 2007). Programmes in the United Kingdom, Australia and New Zealand are more likely to find their home in the built environment where the emphasis is more on the physical surroundings rather than finance or business, whereas programmes in parts of Europe tend to concentrate on engineering and construction (Black and Rabianski, 2003).

The following compelling and important points are summarised from Black et al. (1996):

- Real estate as an academic discipline owes its existence to the academics who have researched and studied the activities and functions of a particular target group of people; namely those people who create and add to the built environment that exists around us;
- The requirements of this target group of people necessitates that real estate academics over time will proceed to create knowledge that will assist the target group in advancing their endeavours and activities as opposed to merely considering or defining these activities;
- Consensus regarding the body of knowledge is not required for an area of study to be considered an academic discipline. The absence of an accepted body of knowledge has not precluded certain disciplines from being accepted as an academic discipline;
- A body of knowledge that has achieved consensus will ensure that the creation of new knowledge occurs at faster pace and in a more streamlined manner than would be the case if an accepted body of knowledge did not exist. The drawback of a concentrated body of knowledge is that the research output will tend to be as focussed and this will eventually lead to the discipline become relevant to fewer and fewer individuals over time. As real estate or property does not have a body of knowledge that has achieved consensus, there is no possibility at the moment of the field becoming irrelevant to fewer and fewer people, although this possibility always exists;
- The requirements of real estate professionals will influence the ongoing study of real estate or property. Any academic discipline that does not meet the needs of its target group will be unable to maintain the backing that the target group has previously provided;
- The target group may not always be aware of its own requirements. A function of the academic discipline is to develop a way in which the requirements of the target group are evaluated on an ongoing basis and then to assist the target group to develop further. This will ensure that an academic discipline continues to be pertinent and sustainable;

- If the academic discipline of real estate or property is able to assist its target group with its ongoing requirements, this will ensure its on-going success and place within the 'multidisciplinary and interdisciplinary' web where it finds itself positioned; and
- An academic discipline will comply with its obligations towards the professionals that it interacts with by creating and distributing information that improves and develops its target group.

Thus, a complete body of knowledge that has achieved consensus amongst the academic community that researches and utilises that body of knowledge is not required before an academic discipline can establish its integrity in both the academic as well as the professional world. Black and Rabianski (2003) agree that the inability to reach agreement regarding the definition and margins of an academic area like real estate or property are, may cause one to decide that real estate is in fact not a clearly defined academic discipline. Black and Rabianski (2003: 34) go further and state, "Real estate is not defined by paradigms, but by activities (consuming, lending, governing, etc.)." This means that real estate or property is not defined by 'paradigms' as other academic disciplines might be, but rather by the activities that occur in the field. These activities might be buying and selling property, developing property, financing property and so on. Therefore, one of the ways to try and identify what constitutes the real estate body of knowledge would be, "...by surveying the participants in the various activity nodes of real estate" (ibid: 34). Black et al. (1996) highlight the fact that the requirements and desires of employers may impact upon the curriculum for a real estate or property degree. The curriculum can then be designed to educate students who will become graduates "...needed at the highest managerial and technical levels" (ibid).

### ***2.8 The body of real estate or property education knowledge in South Africa***

Property Studies as a distinct academic discipline is relatively new to South African tertiary education institutions. Cloete (2002) draws attention to the fact that before 2000 in South Africa, an undergraduate degree in property studies or real estate did not exist.



Formal instruction in real estate has been available to students in the US from the 1890s (Galuppo and Worzala, 2004). However, it was only in the 1970s and 1980s that real estate educators entered into significant discussion regarding the real estate body of knowledge and the position that real estate as a distinct academic discipline now finds itself in. It is therefore likely that the curriculum development of such degrees, both internationally and in South Africa, may not have reached its full potential as yet.

Given that the instruction of real estate and its application in the work environment has become global and that real estate academics no longer view real estate in a national context only (Black and Rabianski, 2003; Baxter, 2007), the curriculum of property studies degrees at universities in South Africa appears to require further and on-going development. This is especially the case when one looks at the curriculum of similar degrees offered internationally (Wells and Williams, 1993; Weeks and Finch, 2003; Galuppo and Worzala, 2004 and Baxter, 2007) as well as the requirements of the property industry in South Africa (Chikafalimani and Cloete, 2007). According to Chikafalimani and Cloete (2007), citing Roulac (2002) and Schulte and Schulte-Daxbroek (2003), globalisation has impacted upon the evolution of the curriculum of real estate degrees largely due to the fact that many real estate organisations are conducting their business all over the world. As a result, the curriculum of real estate degrees needs to reflect this reality. This can be accomplished by universities having student exchange programmes (Schulte, 2002) and including content with an international focus in the curriculum of the degree (Schulte and Schulte-Daxbroek, 2003; Chikafalimani and Cloete, 2007).

It is also important for a university to benchmark its programmes against similar programmes of other universities to ensure that the academic programmes that it offers are comparable and demanded by both students and industry alike (Chikafalimani and Cloete, 2007; Galuppo and Worzala, 2004).

The South African market and general economy has developed rapidly over the past 15 years, since the abolishment of apartheid. It is essential that the progress of curriculum development in the field of property studies in South Africa keeps pace with these changes (Chikafalimani and Cloete, 2007).

Viruly (2007) suggests the body of knowledge that exists in property studies in South Africa has developed from land economics and urban economics. Viruly (2007) continues that land economics and urban economics are connected to academic disciplines in the built environment, including town planning, construction management, quantity surveying and architecture.

The housing of property studies in construction management or quantity surveying schools at South African universities reflects this development (Viruly, 2007).

Viruly (2007) agrees with many other commentators that property programmes in the US have been strongly influenced by finance, while programmes in the UK are inclined towards land economics and construction.

Viruly (2007) researched a sample of 35 articles, which were presented at the AfRES 2003 and 2004 conferences in Nairobi and Kampala respectively. Viruly (2007) sought to identify the research focus of his sample. Table 2.4 presents the results of Viruly's (2007) research.

**Table 2.3 Sample of the research focus of 35 articles presented at the 2003 and 2004 AfRES conferences**

Research Focus AfRES (Sample of 35 Articles)		
Topic	Frequency	Ranking
Appraisal/Valuation	12	1
Professional Development	12	1
Government Impact	10	2
Land Regulation	7	3
The Economy	6	4
Lease Analysis/Property Management	5	5
Taxation	5	5
Banking	5	5
Ethics	4	6
Investment Benchmark	3	7
Market Information	2	8
Property Market Analysis	2	8

**(Source: Viruly (2007))**

Appraisal is a prominent area of research focus in Viruly's (2007) sample and government impact, land issues and economics also feature prominently, perhaps reflecting the Eurocentric influence on real estate programmes in Africa. Topics in finance and investment are not at all prominent.

It has already been noted that many real estate programmes in the US have a finance and investment focus as a result of the degree being accommodated in a business school or business or finance department (Wells and Williams, 1993; Weeks and Finch, 2003; Black and Rabianski, 2003; Galuppo and Worzala, 2004; Baxter, 2007).

Programmes in the United Kingdom, Australia and New Zealand tend to be accommodated in the built environment where the focus is more on the physical environment rather than finance or business. Programmes in parts of Europe tend to concentrate on construction and engineering (Black and Rabianski, 2003).

Likewise the point has also been made in Chapter 1 of this research study that universities in South Africa have significant euro-centric influences (Mabokela, 1997; Ekong and Cloete, 1997; Morrow, 2003). Therefore, it is understandable that the property studies degree offered by the University of the Witwatersrand is housed in the School of Construction Economics and Management; the primary focus of the school being quantity surveying and construction management. Certain degrees in CEM are also accredited by RICS or the Royal Institution of Chartered Surveyors ([www.rics.org](http://www.rics.org)) and would therefore also be influenced by the requirements of this organisation.

When discussing property studies, it is perhaps more important to understand and analyse the curriculum offered, rather than trying to determine if property studies has a body of knowledge distinct from real estate, real property or property. It would appear that many of the property or real estate degree programmes worldwide are moving towards a similar core curriculum, regardless of the naming convention used for the degree (Baxter, 2007).

As Cloete (2002) notes, before 2000 in South Africa, an undergraduate degree in property studies or real estate did not even exist. A student could choose to study one of the construction disciplines, such as quantity surveying or construction management at various universities in South Africa or valuations which was offered by certain other institutions of higher learning in South Africa, such as Technikons.

Given the Eurocentric influences that have impacted upon South African universities, one can understand the emergence of property studies from within the construction disciplines. Property studies are offered at three universities in South Africa and all of these programmes are housed in schools of construction management and quantity surveying. It is suggested that the recognition of property studies by the management hierarchy of universities and greater consensus amongst academics regarding the body of knowledge will allow property studies to take its place as a fully-fledged academic discipline.

The universities in South Africa must play a role in further defining the real estate body of knowledge. In his RICS (Royal Institution of Chartered Surveyors) research paper, Mooya (2007: 9), points out that, "South Africa is a giant in Africa in terms of its economy and supporting technical and professional infrastructure." However, "... the contribution of South Africa to the growth of 'mainstream' property knowledge in Africa does not reflect this dominance" (ibid: 9). Mooya (2007), citing Newell, Acheampong and Du Plessis (2002), states that this is emphasised by the fact that very few property related research papers have been published in international journals by South African academics in post-apartheid period.

Whilst property studies or real estate as an academic discipline is new to South African universities (Cloete, 2002; Mooya, 2007), various universities in commonwealth countries have offered education in property for some length of time (Mooya, 2007). Examples provided by Mooya (2007) include degree programmes in Land Economy at the University of Science and Technology in Ghana and the Copperbelt University in Zambia and Land Economics at the University of Nairobi in Kenya. Comparable degree programmes have also been offered in Nigeria for a lengthy period already (ibid). Mooya (2007) indicates that the reason for these degree programmes being available in Zambia, Kenya and Nigeria is due to the influence that Britain has had on these countries, whilst, "...decades of political and cultural isolation may partly explain why it has taken so long for South Africa to have university programmes in property" (ibid: 14).

According to Statistics South Africa (2010) the value of buildings completed, being additions to existing stock, in 1991 reported to municipalities as at 2005 prices was R19.9 billion and the value of buildings completed, also being additions to existing stock, reported to municipalities in 2009 was R40.4 billion. This growth in the property industry in South Africa over the last two decades may very well be one of the reasons for the emergence of university level property education as more real estate professionals such as property managers, asset managers, property analysts and financiers are required by the property industry. The impact that urbanisation has had on the use of land has also impacted upon the development of the real estate curriculum as new modalities of real investment decisions have developed and caused new themes to be added to the real estate curriculum (Chikafalimani and Cloete, 2007).

Therefore, the historical background of a suppressed society unable to interact with the global community has impacted upon the late development of property studies as an academic discipline in South Africa (Mooya, 2007). The Eurocentric influences on the curriculum of higher education institutions (Mabokela, 1997; Morrow, 2003) have been one of the driving forces behind the housing of property studies in Schools of Construction or the Built Environment. The absence of focus of courses or components of courses in investment finance and markets in the property studies curriculum in South Africa also illustrates the influence of the school where these programmes are housed (Mooya, 2007).

According to Mooya (2007: 15), "This is significant in the context of our argument. It is argued here that the theoretical foundation of property education is to be found in economics and the cognate disciplines. The lack of emphasis in these topical areas weakens the theoretical foundation of South African property programmes, with implications for the type of research that can be done."

Interestingly, Schulte (2003) is of the opinion that the focus of investment and finance in property education and research will decrease over time due to the increase in the research output and participation in international conferences by non-American academics.

This will mean that real estate will be viewed more broadly and not just from a finance perspective and the real estate curriculum will have a more equitable emphasis on finance and various other real estate courses which will in turn lead to the universities creating graduates who will become capable 'real estate professionals' (Chikafalimani and Cloete, 2007).

Mooya (2007) suggests that the future of property education in South Africa will either be driven by the current construction management or quantity surveying schools where the property studies programmes are housed or by the creation of new property programmes from scratch. The former approach is similar to the approach outlined by Baxter (2007) followed at the RMIT University in Australia in the creation of a new degree in valuation.

Mooya (2007) suggests that the development of new programmes will allow these programmes to meet the very particular requirements of a country like South Africa that displays the characteristics of both a developed and developing country. Chikafalimani and Cloete (2007: 4) also make the point that the, "...new real estate educational needs in the democratic South Africa" need to be recognised by real estate academics and included in the real estate curriculum. The development of new curriculum may enhance this process. Mooya (2007) concludes that the development of a new curriculum will require "advocacy and leadership" (Mooya, 2007: 25) and that given that he does not see where this 'leadership' will emanate from that "Perhaps the RICS can play this role" (ibid: 25). This suggestion may however fly in the face of the calls by certain commentators for the Africanisation of the curriculum of higher education institutions (Morrow, 2003; Ekong and Cloete, 1997; Mabokela, 1997).

## ***2.9 The curriculum of a real estate or property degree***

A summary of various studies that have been undertaken since 1993 into the curriculum of real estate programmes follows. The data is presented according to the findings of each author/s.

*Wells and Williams (1993)*

Wells and Williams (1993) surveyed 1 000 real estate brokers who were randomly selected by the computer of the Indiana Real Estate Commission. A response rate of 17.8% was received. Although only real estate brokers were surveyed, the principal rationale of the questionnaire that was despatched as part of their research, according to Wells and Williams (1993), was to obtain suggestions for the curriculum for future real estate students wishing to work as 'real estate professionals' and not just as a real estate broker.

Wells and Williams (1993: 237) note that, "Most real estate careers are classified as professional" and that many careers in real estate oblige individuals to have university education and therefore the university curriculum must be designed to ensure that students will be able to work in the various professions in the real estate field when they graduate.

Wells and Williams (1993) also studied the prospectus from 76 American Assembly of Collegiate School of Business (AACSB) accredited universities and they found that 69 or 90.1% of the accredited universities provided some level of instruction in real estate. Their research indicated that some universities in the United States accredited by the AACSB, being an organisation, "...committed to the advancement of education for business administration and management" (ibid: 238) had undergraduate business degrees with a major in finance and a specific focus in real estate and some had degrees with a distinct major in real estate. Weeks and Finch (2003: 261) state that a major "...is a defined body of courses designated as such by the particular school's online catalog" and "A concentration is a group of courses that constitute an area of speciality within another major." According to Wells and Williams (1993: 238), any university wishing "...to attain or to retain its AACSB accreditation must provide business students with a well-defined business curriculum..." Wells and Williams (1993) also indicated that most bachelor's degrees in business require students to study other courses in addition to business or economics related subjects.

The results of the research undertaken by Wells and Williams (1993) suggest that individuals graduating with a business degree with a major in real estate should have knowledge in the areas of real estate, finance, business law, accounting, marketing, management and economics.

*Black, Carn, Diaz III and Rabianski (1996)*

Black, Carn, Diaz III and Rabianski (1996) did not undertake any new research. Their work was rather to suggest that an all-inclusive curriculum for a real property degree should be viewed as a four-angled approach designed to cover all the various pertinent subject areas.

These four angles or components are: “...(1) the market environment; (2) the financial environment; (3) the legal and public policy environment; and (4) the physical and development environment” (Black et al, 1996: 187). Any particular subject that students take must contain at least one or two of the four components, but that subject could also connect with the other components. The broad knowledge areas, according to Black et al. (1996) that would be included in courses that cover each environment are summarised as follows:

- Market environment – market analysis and valuation;
- Financial environment – mechanics of finance, including the time value of money, types of mortgage instruments and the analysis of debt and equity investments;
- Legal and public policy environment – regulatory aspects of government involvement in real estate operations, role of public institutions in the operation of real estate markets and the decision processes of public entities; and
- Physical and development environment – land resources, site development, design, engineering, management, developmental processes and environmental impact.



Black et al. (1996) believe that a university can choose any of three ways to deliver a real property degree or at the very least, individual subjects. The first possibility is to add one or two service courses dealing with real estate analysis, finance and law to an existing business degree. This would provide students with an overview of real estate analysis from a management and business perspective. The advantage of this approach is that only one academic member of staff would be required to present the real estate courses.

The second possibility is to have between four and six real estate specific courses which would become "...a major area of concentration for BBA and/ or MBA students" (ibid: 189). Knowledge areas that would be included in such courses are investment analysis, mortgage finance, property law, public policy, market analysis and asset management.

These courses would be designed to provide students with a more detailed knowledge of real estate and would highlight that real estate is an area of management, rather than a distinct area of knowledge separate from management. Four academic members of staff would be required to present these real estate courses, which could include two full time members of staff and several qualified part-time members of staff.

The third possibility is to develop a full and complete degree. Graduates of such a degree programme will have the knowledge to be able to take managerial decisions relating to real estate. This will also allow students to work as a real estate professional in numerous areas of the real estate sector.

Courses will include those identified in the second possibility above as well as courses in asset valuation, property management, international real estate investment, mortgage banking, investment management, market research and law. Additional courses in other fields such as architecture, civil engineering, planning and construction management could also be offered. Eight to ten full-time academic staff members who are specialists in their field would be necessary to present all of these. In addition, several part-time members of staff who also have practical experience in real estate may also be required.

Black et al. (1996) believe that the third possibility as discussed would be the best option for the professionals already working in the area of real estate and that having such a curriculum would "...delimit boundaries that define the breadth of real property studies" (ibid: 190).

*Rabianski and Black (1999)*

The contrast of the different influences on property education in developed as opposed to developing countries is discussed by Viruly (2007). Viruly (2007) refers to the study undertaken by Rabianski and Black (1999). Rabianski and Black (1999) believe that 'real estate education' and practice has really become global in nature. Academic conferences that are held in various parts of the world and that attract delegates from all over the world as well as academics visiting other universities around the world is evidence that Rabianski and Black (1999) provide as support for their assertions, certainly in the academic environment.

The objective of the study undertaken by Rabianski and Black (1999) was to gain an international perspective relating to the global body of real estate knowledge as opposed to studying the real estate curriculum offered by various universities. Rabianski and Black (1999) conducted a two-step Delphi study. A population of 376 people was identified from the membership of the American Real Estate and Urban Economics Association (AREUEA) and the American Real Estate Society (ARES). This population excluded people from the US and Canada. The first questionnaire that was despatched was a series of open ended questions requesting participants to the survey to "...list the twenty-four real estate topics they considered most important for real estate education and professional practice in the real estate industry" (ibid: 15). A response rate of 16% was achieved. A second questionnaire was designed which contained a list of the 24 topics most frequently identified by the responses obtained with the first questionnaire.

In the second questionnaire, respondents were asked to measure the importance of each of the 24 topics. The second questionnaire was despatched to all of the 376 potential participants who had received the first questionnaire even if the recipient had not participated in the first part of the study. A response rate of 13% to the second questionnaire was achieved (Rabianski and Black, 1999).

Rabianski and Black (1999) were able to cluster the people who responded to the second questionnaire into three geographic regions, namely, the UK, continental Europe and the Pacific Rim. This was done in order "...to determine if differences of opinion exist among these three geographic regions" in the responses obtained (ibid: 18). A summary of the ranking of topics is presented in Table 2.5. Rabianski and Black (1999) concluded that there did appear to be differences between the continental European countries and the two other regions (the UK and the Pacific Rim countries) in the ranking of topics.

**Table 2.4 Responses from geographic regions: rankings**

<u>Topic</u>	<u>Rank (UK)</u>	<u>Rank (other European countries)</u>	<u>Rank (Pacific Rim)</u>
Discounted cash flow analysis	1	15	1
Yield calculation and forecasting	2	7	2
Risk and return analysis	3	6	3
Appraisal methodology and techniques	4	5	10
Property market cycles and forecasting	5	3	8
Macroeconomic cycles and forecasting	6	8	16
Commercial property location requirements	7	24	22
Property market modelling–demand and supply analysis–housing, retail, office, etc.	8	3	8
Portfolio analysis, diversification and Management	9	21	21
Commercial property location theory	10	23	23
Financial market cycles and forecasting	11	12	18
Benchmarking	12	17	27
Options and option pricing	13	31	26
Globalization / internationalization	14	27	25
Government policy impact on real estate	15	2	4
Lease analysis	16	4	19
Globalization / internationalization	17	36	34
Urban development and growth analysis	18	9	15
Corporate real estate strategic planning	19	20	28
Land use theory	20	13	11
Behavioural analysis	21	19	31
Securitization	22	26	14
Land use regulation	23	10	9
Land contamination and brownfields	24	33	30
Analysis of site characteristics	25	18	17
Environmental legislation and planning	26	22	29
Property rights	27	11	13
Property taxation issues	28	14	5

<u>Topic</u>	<u>Rank (UK)</u>	<u>Rank (other European countries)</u>	<u>Rank (Pacific Rim)</u>
Inflation theory and analysis	29	29	24
Negotiation strategies and techniques	30	34	36
Contracts and other legal documents	31	30	32
Ethics	32	25	7
Secondary mortgage market	33	35	33
Income taxation issues	34	28	20
Mergers, acquisitions, divestitures	35	32	35
Housing affordability /housing prices	36	16	12

**(Source: Rabianski and Black (1999: 26 - 27))**

The three topics that received the highest ranking from respondents in the UK and the Pacific Rim countries are identical, namely, discounted cash flow analysis, yield calculation and forecasting and risk and return analysis. All three of these topics have a finance and investment focus, whereas the three topics ranked the highest from respondents in continental Europe were property market cycles and forecasting, property market modelling and government policy impact on real estate, being topics that focus on economics and government policy. Appraisal methodology and techniques was ranked 4<sup>th</sup> by respondents in the UK, 5<sup>th</sup> by respondents in continental Europe and 10<sup>th</sup> by respondents in Pacific Rim countries.

*Weeks and Finch (2003)*

A study undertaken by Weeks and Finch (2003) investigated the curriculum requirements of the real estate degrees offered by AACSB accredited 'colleges of business administration in the United States'. The focus of their study was to categorise the coursework required of 'real estate concentrations' and 'real estate majors' of universities or colleges forming part of the study. Forty universities or colleges offering a real estate major and twenty seven universities or colleges offering a concentration in real estate were surveyed, being all the universities or colleges offering real estate as part of their curriculum.

Weeks and Finch (2003) note with interest that one of the difficulties that the discipline of real estate has had to cope with is the fact that employers and academics have made divergent recommendations for the future curriculum development of real estate degrees. The very real problem that may arise as a result is that universities will recommend a more theoretical education based approach whilst employers may prefer a more practical training based approach. Weeks and Finch (2003: 258) highlight this tension when they state that, "...the characteristic often cited to differentiate vocational education from an academic field is active scholarly research, and this influence has led academic real estate toward finance and land economics as research studies adapt the theories and paradigms of these fields." Weeks and Finch (2003: 258) point out that although "...the linkage of real estate provides a framework for research theory and paradigms, it contributes little towards a standardized real estate curriculum." This further highlights the fact that a common body of knowledge does not as yet exist.

Weeks and Finch (2003: 259) citing research conducted by Epley (1996) comment that the "...common elements in most real estate curriculums include courses in real estate principles, finance, law and valuation." Weeks and Finch (2003) state that although the work undertaken by Black et al. (1996) is, "...a blueprint for real estate curriculum development" (Weeks and Finch, 2003: 259) that the current available literature points to the absence of agreement regarding the 'needed skills, courses and structure' for degrees that require students to study real estate as a major or degrees that have a real estate focus (being a finance major with real estate). This could however be more of a challenge for employers who employ graduates as opposed to the academics responsible for designing the real estate curriculum (Weeks and Finch, 2003). As previously mentioned Weeks and Finch (2003) define a major as a particular set of subjects identified by a particular university as a major and a 'concentration' or focus in real estate as a set of subjects that students can study within a major.

Weeks and Finch (2003) also refer to the fact that the results of the survey conducted by Black et al. (1996) highlighted that there is no consensus on what constitutes the real estate body of knowledge. The results of the research conducted by Weeks and Finch (2003) reveal the following:

- The real estate curriculum of those universities offering a focus as opposed to a major in real estate was not standardised. The most common course, Real Estate principles, was offered by 18 of the 23 schools that expect the course to be part of a real estate 'concentration' or focus. Real Estate Finance is the next most common course offered and expected by those universities offering a real estate focus.
- There did appear to be standardisation in the real estate curriculum for those universities offering a real estate major. The subjects that students would be required to study as part of a real estate major include Real Estate Principles, Real Estate Finance, Real Estate Property Appraisal and Valuation, Real Estate Law and Real Estate Investments. All universities also required electives to be taken by students. Electives varied from university to university. There was only one university that had an internship as a compulsory element of the curriculum.

Weeks and Finch (2003) indicate that Carn and Rabianski (1986) identified that the following courses should constitute a real estate curriculum: Real Estate Principles, Investment Analysis, Real Estate Finance, Market Analysis, Appraisal and Policy and Law. The conclusion drawn by Weeks and Finch (2003) is that most universities or colleges that offer real estate majors require their students to complete the courses identified by Carn and Rabianski (1986) whereas those universities or colleges that offer a real estate focus do not necessarily have the same requirements.

This absence of a standardised real estate curriculum is explained as follows by Weeks and Finch (2003). Firstly, those universities that offer a focus in real estate often do not have lecturers who are sufficiently knowledgeable or specialised to lecture a course in real estate law and real estate market analysis. Therefore, these specialised courses are not offered as a result. Secondly, the school where the real estate programme is accommodated impacts upon the curriculum offered in a real estate focus. As an example, the emphasis on finance reflects this reality.

*Galuppo and Worzala (2004)*

Galuppo and Worzala (2004) discuss the procedure that the academic staff at the Burnham-Moores Center for Real Estate at the University of San Diego followed in the conceptualisation and design of a master's degree in real estate. Galuppo and Worzala (2004: 25) note that their research highlighted the fact "...that real estate is a complex asset and the real estate industry is a multidisciplinary field" the study of which would, according to Galuppo and Worzala (2004), include real estate law, real estate finance, real estate appraisal, real estate equity investments, urban land economics, real estate development, secondary mortgage markets and real estate asset management. Galuppo and Worzala (2004) emphasize that real estate professionals require skills that focus on the 'multidisciplinary' nature of real estate above and beyond what is usually taught and learned in a typical business degree.

Although the focus of Galuppo and Worzala's (2004) work is at the graduate level, they do however make some important points which are applicable to both undergraduate and graduate level real estate education. These are:

- The debate around the real estate body of knowledge only become prominent in the 1970s and 1980s;
- The conclusions reached by Wells and Williams (1993) illustrated that there were significant differences between the general real estate curriculum being offered by American universities and colleges and the needs of the real estate industry;
- The development of the real estate curriculum is affected by the absence of consensus amongst academics regarding the real estate body of knowledge as well as the accessibility and inclinations of academics to instruct various real estate courses as opposed to the needs of the real estate industry that employs the real estate graduate;
- A real estate programme cannot be grounded in theory only. Real estate education requires a combination of theory and practice to allow students to gain knowledge and experience of the applications of theory and concepts; and
- The 'multidisciplinary' nature of real estate studies necessitates the design of a curriculum that contains more than two or three courses in real estate.



### *Epley (2004)*

Epley (2004) surveyed a specific pre-selected, non-random sample of corporate real estate executives working in a selection of occupational areas and firm specialities. Epley (2004) only surveyed those people who were able to provide input on the subject areas and the relevant knowledge required to be able to make various types of real estate decisions. Potential respondents to the survey were pre-selected based upon their level of seniority in their respective organisations. A diverse range of organisations was identified and all respondents held the Certified Commercial and Investment Member (CCIM) designation. The diverse range of organisations selected for the study was done in order "... to avoid a concentration of responses that reflect the needs of only one industry, and to cover a wide-ranging set of properties requiring a diverse set of decision-making skills" (ibid: 48).

Epley (2004: 45) proposed that the basic question to be addressed in his study was, "What do you need to know in the current assignment to be successful?" The conclusions drawn by Epley (2004: 65) were that corporate real estate executives value three important concepts, namely, "...real estate market interpretation, general tools of analysis as opposed to specific tools and relationships with other personnel and the public." Table 2.6 presents the important areas of each concept identified by Epley's (2004) research.

**Table 2.5 Important concepts valued by real estate executives**

<b>Important areas of real estate markets</b>	<b>Use of general tools of analysis as opposed to specific tools</b>	<b>Relationships with other personnel and the public</b>
Conduct a location analysis	Conduct a site analysis	Identification of the client and goals
Identify phases of the real estate cycle	Conduct a location analysis	Determination of the needs of space users
Conduct a site analysis	Calculate investment value	Use of people skills
Recognize the impact of demographics	Calculate investment performance	
Use market data to set rents	Describe types of leases	
Access and interpret market data	Develop strategies for managing risk	
Use market feasibility, appraisal and highest and best use	Evaluate investment performance measures	
	Use net present value	

**(Source: Epley (2004))**

Epley (2004) also identified lease analysis and lease interpretation as important concepts.

It is interesting to note all the topics identified by Epley (2004) as this also provides an indication as to the various skills and not only knowledge required by corporate real estate executives.

#### *Manning and Epley (2006)*

Manning and Epley sent 512 lecturers, whom received correspondence from the American Real Estate Society (ARES) or the American Real Estate and Urban Economics Association (AREUEA) and whom the researchers thought may be teaching a college or university real estate course, a survey. The purpose of the survey was to determine all of the real estate courses being instructed in the United States (US) as well as their content and the resources being used by the lecturer. The universities or colleges surveyed included those that only provided undergraduate real estate degrees as well as those that provided post graduate real estate degrees as well.

Manning and Epley (2006) citing Gibler, Black and Moon (2002) suggest that real estate professionals need to develop general management skills and knowledge in addition to having technical real estate and financial skills.

The conclusions drawn by Manning and Epley (2006) focus mainly on whether or not real estate academics teach the skills and competences that are important to real estate executives. Manning and Epley (2006) indicate that the university academics who teach real estate in the US are able to teach the technical real estate skills and knowledge required by real estate professionals in undergraduate degree programmes, but do not seem to teach general business skills and knowledge required in graduate degree programmes.

Manning and Epley (2006) do however logically conclude that management and business skills and knowledge would be taught in other management courses and not in real estate courses.

*Baxter (2007)*

Baxter (2007) uses the experience of redeveloping the valuation degree at RMIT University in Australia as a case study to review property and valuation university education in Australia.

Baxter (2007) notes that in Australia over the last 20 years, property degree programmes have changed their focus from valuations to more of a general property oriented curriculum. Property finance and investment has overtaken property valuation as the area of emphasis within many real estate programmes. This has led to the development of comprehensively educated real estate graduates capable of working in numerous areas with the property profession. Such developments have also had the effect of reducing the focus on valuations as a significant area of university education.

Baxter (2007) also makes the point that the various professional bodies that real estate professionals belong to and the universities have often not entered into any meaningful bi-lateral discussion regarding research issues. As a result, the bulk of the research generated by the various real estate academics in Australia is due to the, "...individual academics' interest, academic background and teaching preference rather than larger industry-driven projects" (ibid: 446). This means that research being undertaken by real estate academics may be of academic value, but does not add any value to the professional world. Baxter (2007) agrees with the views of Parker (2000) that universities are the creators of knowledge and "...provide thought leadership..." (Baxter, 2007: 446) and all stakeholders will profit as a result. However, argues Baxter (2007), due to the fairly recent introduction and growth of valuation and property studies as an academic discipline and the lack of consensus regarding the body of knowledge, university administrators are not easily persuaded that additional resources are required to further advance real estate and valuation as an academic discipline. Thus, academics spend most of their time teaching and have little or no time left for research and developing 'thought leadership'.

Baxter (2007) also acknowledges that the academic home of the real estate discipline will also affect the focus of the degree programme offered and that worldwide, real estate programmes find themselves in the environment of a business school, a construction or built environment school, a real estate school or an agriculture or land based school.

Interestingly, Baxter (2007) notes that in the UK, Australia as well as other countries, dedicated valuation degree programmes have been offered by universities, whereas in the US, valuation education has been undertaken by the professional organizations and the universities have provided more general real estate education. Baxter (2007) also points out that the University of Melbourne intends to offer generalist undergraduate programmes with specialist post graduate programmes.

The School of Property, Construction and Project Management at RMIT University was established in 2002/2003. This school offers four different degrees in Property, Valuation, Construction Management and Project Management. The first year of study is the same for all four degrees and there are other shared courses that students in all four degree programmes have to complete in the second, third and fourth years of study. The rationale with this structure, according to Baxter (2007: 455), is that all students will "...understand property, its construction and basic design, materials and the role of all of the professionals that the School now caters to."

Baxter (2007: 455) states that "...the real estate process, with its triangulation of space consumer, space producer and public infrastructure/community groups around the project site and its improvements", assisted with the structuring of the degrees. The relationships between the four degree programmes were also acknowledged and the degrees structured in such a way to give students exposure to as many knowledge areas as possible. An extract from the RMIT University 2010 Student Resource Guide (2010) is presented in Table 2.7 highlights all four degrees.

Baxter (2007) indicates that the research conducted by Weeks and Finch (2003) is the point of reference when designing any new curriculum. Notwithstanding Baxter's (2007) viewpoint, the research of Weeks and Finch (2003) was not used in the restructuring of the degrees in the School of Property, Construction and Project Management at RMIT University. Baxter (2007) does however conclude that the new real estate curriculum at RMIT University does compare favourably with the recommendations of Weeks and Finch (2003). The final assessment of the new curriculum will be when graduates of the new curriculum leave university to seek work (Baxter, 2007).

**Table 2.6 Undergraduate degrees offered by the School of Property, Construction and Project Management at RMIT University**

	<b>Bachelor of Applied Science (Property)</b>	<b>Bachelor of Applied Science (Valuation)</b>	<b>Bachelor of Applied Science (Project Management)</b>	<b>Bachelor of Applied Science (Construction Management)</b>
<b>1st Year Semester 1</b>	<ol style="list-style-type: none"> <li>1. Introduction to Buildings</li> <li>2. Valuations and Property</li> <li>3. Project Management Concepts</li> <li>4. Professional Communications</li> </ol>	<ol style="list-style-type: none"> <li>1. Introduction to Buildings</li> <li>2. Valuations and Property</li> <li>3. Project Management Concepts</li> <li>4. Professional Communications</li> </ol>	<ol style="list-style-type: none"> <li>1. Introduction to Buildings</li> <li>2. Valuations and Property</li> <li>3. Project Management Concepts</li> <li>4. Professional Communications</li> </ol>	<ol style="list-style-type: none"> <li>1. Introduction to Buildings</li> <li>2. Valuations and Property</li> <li>3. Project Management Concepts</li> <li>4. Professional Communications</li> </ol>
<b>Semester 2</b>	<ol style="list-style-type: none"> <li>1. Introduction to Construction Processes</li> <li>2. Property and Capital Markets</li> <li>3. Techniques for Projects</li> <li>4. Managing for Sustainability</li> </ol>	<ol style="list-style-type: none"> <li>1. Introduction to Construction Processes</li> <li>2. Property and Capital Markets</li> <li>3. Techniques for Projects</li> <li>4. Managing for Sustainability</li> </ol>	<ol style="list-style-type: none"> <li>1. Introduction to Construction Processes</li> <li>2. Property and Capital Markets</li> <li>3. Techniques for Projects</li> <li>4. Managing for Sustainability</li> </ol>	<ol style="list-style-type: none"> <li>1. Introduction to Construction Processes</li> <li>2. Property and Capital Markets</li> <li>3. Techniques for Projects</li> <li>4. Managing for Sustainability</li> </ol>
<b>2nd Year Semester 1</b>	<ol style="list-style-type: none"> <li>1. Financial Reporting</li> <li>2. Urban Economics</li> <li>3. Property Data Analysis</li> <li>4. Property Law</li> </ol>	<ol style="list-style-type: none"> <li>1. Financial Reporting</li> <li>2. Urban Economics</li> <li>3. Property Data Analysis</li> <li>4. Property Law</li> </ol>	<ol style="list-style-type: none"> <li>1. Financial Reporting</li> <li>2. Measurement and Estimating</li> <li>3. Property Data Analysis</li> <li>4. Project Management Fundamentals</li> </ol>	<ol style="list-style-type: none"> <li>1. Financial Reporting</li> <li>2. Measurement and Estimating</li> <li>3. Project Management Fundamentals</li> <li>4. Construction Technology (Commercial)</li> </ol>
<b>Semester 2</b>	<ol style="list-style-type: none"> <li>1. Investment Evaluation</li> <li>2. Advanced Property Law</li> <li>3. Business Forecasting</li> <li>4. Student Elective</li> </ol>	<ol style="list-style-type: none"> <li>1. Investment Evaluation</li> <li>2. Advanced Property Law</li> <li>3. Business Forecasting</li> <li>4. Statutory Valuation</li> </ol>	<ol style="list-style-type: none"> <li>1. Investment Evaluation</li> <li>2. Risk Management</li> <li>3. Construction Management</li> <li>4. Student Elective</li> </ol>	<ol style="list-style-type: none"> <li>1. Investment Evaluation</li> <li>2. Advanced Measurement &amp; Estimating</li> <li>3. Advanced Construction Technology (Commercial)</li> <li>4. Construction Management</li> </ol>
<b>3rd Year Semester 1</b>	<ol style="list-style-type: none"> <li>1. Human Relations and OH&amp;S</li> <li>2. Property Investment</li> <li>3. Property Development</li> <li>4. Project Management Fundamentals</li> </ol>	<ol style="list-style-type: none"> <li>1. Human Relations and OH&amp;S</li> <li>2. Property Investment</li> <li>3. Property Development</li> <li>4. Urban Valuation</li> </ol>	<ol style="list-style-type: none"> <li>1. Human Relations and OH&amp;S</li> <li>2. Property Law</li> <li>3. Property Development</li> <li>4. Project Administration</li> </ol>	<ol style="list-style-type: none"> <li>1. Human Relations and OH&amp;S</li> <li>2. Property Law</li> <li>3. Property Development</li> <li>4. Cost Planning and Tendering</li> </ol>

<b>Semester 2</b>	1. Research & Sustainability 2. Student Elective 3. Feasibility Studies 4. Property Funding & Portfolio Management	1. Research & Sustainability 2. Student Elective 3. Feasibility Studies 4. Rural Valuation	1. Research & Sustainability 2. Leadership/Teams 3. Feasibility Studies 4. Quality Management	1. Research & Sustainability 2. Building Services 3. Structures 4. Advanced Cost Planning
<b>4th Year Semester 1</b>	1. Student Elective 2. Property Work Integrated Learning 3. Property Work Experience in Industry 1 4. Asset Management	1. Student Elective 2. Property Work Integrated Learning 3. Property Work Experience in Industry 1 4. Advanced Valuation	1. Industrial Relations & Dispute Resolution 2. Property Planning and Reporting 3. Advanced Project Management 4. Asset Management	1. Industrial Relations & Dispute Resolution 2. Project Administration 3. Law and Urban Development 4. Advanced Construction Management 5. Industrial Experience
<b>Semester 2</b>	1. Research Project 2. Student Elective 3. Current Issues 4. Property Work Experience in Industry 2	1. Research Project 2. Student Elective 3. Current Issues 4. Property Work Experience in Industry 2	1. Research Project 2. Student Elective 3. Current Issues 4. Student Elective	1. Research Project 2. Student Elective 3. Student Elective 4. Student Elective

**(Source: RMIT University, Student Resources Guide (2010))**

*Hefferan and Ross (2010)*

The research conducted by Hefferan and Ross (2010) did not focus on curriculum issues, but rather on what factors are currently impacting upon property education and research in Australia. It is interesting to note that many of the challenges identified by Hefferan and Ross (2010) are similar to those facing real estate academics in South Africa and hence the inclusion of this research in the review of literature.

Hefferan and Ross (2010) note that the property sector needs a variety of property professionals and that the education of property professionals through the provision of university level education is fairly new in Australian universities. The education of property professionals in Australia has transformed only in the last forty years from technical education to university level education. However, it does appear that although it is a requirement for valuers to be statutorily registered, there is also an increased focus for valuers as well as other property professionals to be registered with a relevant professional body in order to be able to work in specific area of real estate (ibid).

The challenges facing property education in Australia, summarised from Hefferan and Ross (2010) are:

- Government funding for property research is lacking;

- Apart from those people working in the specific professional area, the acknowledgement of property as a profession is generally found to be wanting it;
- It is problematic to conduct research in the area of property due to the wide range of disciplines that property covers, including all the construction and engineering disciplines;
- Potential academic staff do not have PhD level qualifications as many are drawn from industry and current academic staff, in most instances, do not have the necessary industry experience. As most property schools are housed in business or engineering faculties, post graduate university qualifications are required for academic staff which most suitable candidates that would be drawn from industry do not have;
- Remuneration, compared to what is paid in industry, is poor and this makes it very challenging to attract real estate professionals to the academic environment;
- There are few full time academic members of staff instructing and researching in the area of property in Australia, "...and there are only seven available property chairs in Australia as at 2010" (Hefferan and Ross, 2010: 374);
- Due to the small number of academic staff, property schools cannot become viable academic schools on their own and therefore have become housed in business faculties, engineering and built environment faculties and sometimes even architecture or natural sciences faculties;
- Property schools are often not acknowledged within the university itself and therefore lack strategic influence within the university structures;
- Academics are primarily focussed on lecturing and teaching and as a result are restricted in terms of undertaking any decent research or becoming acquainted with the property industry;
- It is difficult to attract young academic talent to universities due to a lack of young academics with higher level degrees and lower salaries paid by universities;
- The Australian Research Council which provides government funding for research activities has a relationship with only three property academics in the whole country; and

- Research that is undertaken by consultancies is often not shared with the whole industry and the academic community as this research is a competitive advantage for the consultancy that has undertaken the research.

Hefferan and Ross (2010) also note the value of incorporating university education with practical work experience and that this will enable the graduate to become proficient and skilled practically and not just have theoretical knowledge. However, Hefferan and Ross (2010) also point out that only 50% of students enrolled in undergraduate property degree programmes have of late completed high school. Therefore a very high percentage of registered students are working either part-time or full-time in the property sector already. This reality will encourage lectures in future to be presented after hours with online support. Hefferan and Ross (2010) further point out that given pending regulatory changes that will impact upon Australian universities, undergraduate property education may very well only be offered by the more technical type universities.

Hefferan and Ross (2010) also note the contributions of both RICS and the Australian Property Institute (API) in the development of university level property education in Australia. These professional bodies can continue to contribute to the ongoing growth of undergraduate and post graduate degree programmes as well as short and specialised courses for the working property professionals.

### ***2.10 Role of the university as knowledge creator and knowledge disseminator***

Cloete (2002) does propose that many property education programmes are aligned to industry needs in South Africa. Many of these programmes are short courses and vocational in nature and not formal university degree programmes. This has its merits, but one must not forget the purpose of a university education, being the learning and transfer of knowledge (Etzkowitz et al., 2000; Sutz, 2005; Ramkissoo, 2008).



In 1852 John Henry Newman wrote and published a book entitled, "The idea of a university defined and illustrated". Newman (1852) prefaces his work by stating that a university is an institution of instruction and complete understanding and the dissemination and ongoing development of knowledge is the purpose of a university. Newman (1852) states further that the reason for attending university should not be to enable employment but rather to create a routine for a lifetime of learning.

Ramkissoon (2008: 1) states that the rate at which technologies are evolving, means that the amount of knowledge that we have "...doubles every 5 years compared to every 50 years in the nineteenth century." Ramkissoon (2008) says that knowledge is the totality of what we are aware of whereas information is 'raw data' as well as the process by which it becomes 'raw data' or, "... a shaping or packaging to make it manageable, transmissible and consumable" (ibid: 1). Ramkissoon (2008) says that knowledge is the internalising of information and that the ability to be able to transform information into knowledge requires skills. Sutz (2005) agrees when she says that learning at tertiary level in particular is not only about gathering knowledge in a structured manner, but also equipping students with the skills to be able to develop solutions to problems.

Etzkowitz, Webster, Gebhardt and Terra (2000: 314), in reference to universities, propose that "...publication of research and production of graduates are held to be the most appropriate roles for an institution dedicated to the public good." Therefore, part of a university's role is to prepare graduates for a future career. A formalised education such as a degree opens doors to jobs, greater opportunities and in most instances improved remuneration. According to Etzkowitz et al. (2000) a university is also a knowledge producing and disseminating institution and that as knowledge becomes an increasingly important part of 'innovation', the university will play an ever increasing role in 'industrial innovation'. The 'entrepreneurial university' has developed of late and has become "...a cost effective and creative inventor and transfer agent of both knowledge and technology (ibid: 314).

Ramkissoon (2008) agrees when he states that the origins of a university such as MIT can be traced to the executive meeting rooms of companies in the US and 'entrepreneurial' universities have developed in countries like South Korea.

Universities can play an important role in the economic development of a country. An example provided by Etzkowitz et al. (2000), is that of students at the University of Sao Paulo in Brazil and the University of Aveiro in Portugal who assist in the dissemination of information and know-how to domestic companies. The university's research activities therefore lead to the production of knowledge which can then be disseminated to industry (Etzkowitz et al., 2000; Ramkissoon, 2008).

Universities are the storehouses of knowledge and are well placed within society to firstly produce knowledge and secondly, to then distribute that knowledge (Etzkowitz et al., 2000; Sutz, 2005; Ramkissoon, 2008). Economies that are 'knowledge driven', depend on universities to produce knowledge and share that knowledge with industry (Ramkissoon, 2008).

In 1999 Etzkowitz and Leydesdorff referred to the 'triple-helix' association that should exist between universities, industry and government (Etzkowitz et al., 2000; Ramkissoon, 2008). According to Etzkowitz et al. (2000), the work that is now undertaken by universities in the process of 'industrial innovation' was previously undertaken by government and industry. This is due to the fact that the universities create and distribute the knowledge that is required to enable the role players in the economy to create and develop new products and services. Ramkissoon (2008) says that the increasing bond between the three elements of the 'helix' has occurred because of the decrease in funding providing by government to universities for research. Ramkissoon (2008) and Sutz (2005) both indicate that the paradigm created by the 'triple-helix' relationship of universities, government and industry is largely due to the fact that universities are increasingly being encouraged to work closely with government and industry and provide the ability of the university to create and generate new knowledge and subsequently be paid for this. In this way the university becomes entrepreneurial and this funding will allow universities to expand laboratories, hire new staff and increase the remuneration of all university staff (Ramkissoon, 2008; Sutz 2005). The disadvantage of this 'triple-helix' paradigm says Ramkissoon (2008) is that universities will focus on the national objective of keeping the economy competitive rather than the universal benefit of creating knowledge and adding to the existing body of knowledge.

Sutz (2005) agrees and says that closer working relationships between universities and industry can create certain difficulties. An example of this would be the inability to publish research findings because the research has been funded by industry that does not want the research distributed in the public domain. Another conundrum for the university is to what extent the research conducted by the university should be influenced and driven by a profit motive.

The sale of the knowledge created by universities as a commodity is what Suddaby and Greenwood (2001: 934) would refer to as “knowledge commodification.” Jordaan (2004) in citing Toohey (1999) comments that the disadvantage of viewing the university as an important participant in the economy and encouraging the sale of knowledge as a commodity is that scholarly autonomy will be substituted in favour of the objectives and goals of those politicians in control of government.

Universities in developing countries are also being encouraged to forge the triple helix relationship between universities, government and industry (Sutz, 2005; Ramkissoon, 2008). Sutz (2005) says that in order to enhance the production and transfer of knowledge in developing countries, universities in those countries should transform themselves into what she refers to as “developmental universities” (ibid: 56). Sutz (2005) stresses that for the work of ‘developmental universities’ to be of any value; certain circumstances need to be present. These circumstances are summarised from Sutz (2005) as follows:

- High level research and teaching activities need to be improved. More researchers will be required and the prospects for these researchers as well as interested students to undertake research work in their own country will also need to be improved;
- Domestic requirements must form part of the research agenda. This will allow for local solutions to be developed to local problems and that there is a demand for this research locally;
- Research that is undertaken relating to local needs must be rewarded irrespective whether the work is globally relevant or accepted globally; and
- Academic staff and students who are dedicated to recognising and resolving local questions must be funded and provided with backing from the university.

Government and industry need to partake in supporting this initiative. This can be achieved by encouraging increased collaboration between universities and industry in the areas of consulting and research for which academic staff members may be remunerated and establishing special agencies that can liaise between the university and industry (Sutz, 2005; Ramkissoon, 2008). Sutz (2005) emphasises the point that in developing countries, universities also have to cope with declining funding for research, insufficient remuneration for staff and the historical divide that exists between universities and industry. However the ability of academics to have one foot in the academic world and one foot in the consulting world also allow for what Suddaby and Greenwood (2001) refer to as the 'legitimation' of knowledge. Original thoughts and concepts that are shared with organisations, presented at conferences or communicated through consulting work allow for and enhance the acceptance of these ideas (ibid).

### ***2.11 Real estate or property studies as a profession***

Universities are the storehouses of knowledge and are well placed within society to create and disseminate knowledge (Etzkowitz et al., 2000; Sutz, 2005; Ramkissoon, 2008). Jordaan (2004) highlights that academic education is the preserve of the university, whereas vocational training is traditionally undertaken by other institutions of higher education, such as the Technikons.

The creation of knowledge and the dissemination of this knowledge is important for the members of any profession. Ferguson and Ramsay (2010: 24) define an occupation "...as the principle activity one engages in to earn money...", whereas "...a profession is an occupation requiring specialized skill or knowledge." Gilmore and Williams (2003: 2 - 3) suggest that professionalism can be defined as converting "...one order of scarce resources (i.e. special knowledge and skills) into another – that of social and economic rewards." Root, Hancock and Chapman (1995) agree that the key driver for any professional is to generate revenue.

Evetts (2005: 2) makes the interesting point that "The concept of 'profession' is not as often used outside of the Anglo-American literature..."

Evetts (2005) also notes that the term 'professionalism' is often utilised for promotional purposes to appeal to potential clients and that one can distinguish 'occupational professionalism' from 'organizational professionalism'. 'Occupational professionalism' refers to the duty of good faith and trust that exists between the professional and their employers and clients, requires the professional to complete prolonged periods of both formal education and work related training, has very solid professional character and is governed by "...codes of professional ethics..." which are enforced by "...professional institutes and associations" (ibid: 9). 'Organizational professionalism' on the other hand allows management in organisations to exercise their influence over the working environment. It encompasses uniform rules and processes in the work environment as well as defined lines of reporting and 'decision-making' (ibid).

'Occupational professionalism' would refer to most of the classic professions, such as medicine and law, whereas 'organizational professionalism' relates to a type of individual discipline where control over people by management is unnecessary and the professional is self-driven and committed (ibid). Evetts (2005: 13) emphasises the point that the ideas of "...trust, competence and professionalism..." that characterise occupational professionalism have become applicable to 'organizational professionalism'.

Various commentators have commented on the characteristics of a profession (Rice and Duncan, 2006; Wallace, Van Fleet and Downs, 2010). Rice and Duncan (2006: 1) suggest that a profession has five characteristics:

- "A profession must be full-time.
- Schools and curricula must be aimed specifically at teaching the basic ideas of the profession, and there must be a defined common body of knowledge.
- A profession must have a national professional association.
- A profession must have a certification programme.
- A profession must have a code of ethics."

Ferguson and Ramsay (2010) further state that that if a person wants to be known as a professional, they must function in an area that is considered to be a profession.

Doctors, attorneys and accountants work in professions that have been recognised as such for many years. The question that then arises is whether or not real estate or property is a recognised profession?

Ferguson and Ramsay (2010) identify the fact that professions do begin at some point and become established over a period of time and that professionals develop their skills and knowledge by completing a formal education process. Warschauer (2002) agrees that education is vital for any profession and that the professionals as well as the universities should be working together over time to develop the education that is provided to students.

According to Ferguson and Ramsay (2010), the profession itself must take responsibility for identifying and describing the body of knowledge for that profession.

Wallace, Van Fleet and Downs (2010), citing Squires (2001) refer to the definition of a 'professional discipline', as opposed to a profession. A 'professional discipline' is viewed with regard to:

- 1) "its impact on society
- 2) decisions and actions based on analysis of uncertain circumstances, and
- 3) the use of techniques and rules to guide action."

Wallace, Van Fleet and Downs (2010: 1)

Dean (1995) and Williams (1998) advocate that professions that are well developed have certain characteristics which include, a focussed body of knowledge and a formal education programme that is based upon the body of knowledge. This is confirmed by Wallace, Van Fleet and Downs (2010) when they state that one of the features of a profession is the creation of an organised body of knowledge that is supported by research.

Ferguson and Ramsay (2010) indicate that the process by which an occupation becomes accepted as a profession is called 'professionalization'. A summary of Ferguson and Ramsay (2010) reveals that this will occur when widely accepted professional qualifications have been established, barriers to enter the industry exist allowing people to distinguish between qualified and unqualified individuals, professional associations are established to create a community environment for members of the association and a professional code of ethics is established and enforced.

It is suggested that real estate or property studies may not be a discernable profession as yet. However, a certain level of 'organizational professionalism', as proposed by Evetts (2005) may be present within the property industry. Although an academic discipline of real estate or property studies may exist, it is debatable if real estate is viewed as a profession. As Ferguson and Ramsay (2010) note for a person to be able to refer to themselves a professional, they must work in a known profession. The recent introduction of undergraduate property studies degrees in South Africa (Cloete, 2002) may signal the beginning of a real estate or property studies profession. A further difficulty according to Warschauer (2002) is that concentrated and directed education is vital for any profession to exist. It has been established earlier in this research study that there appears to be a core of courses around which real estate degrees are built (Wells and Williams, 1993; Carn and Rabianski, 1986; Weeks and Finch, 2003; Galuppo and Worzala, 2004; Baxter, 2007). It has also been established in this research study that there are numerous naming conventions for degrees in real estate and property studies as well as various topics that are emphasised within these degrees, such as property finance and investment, property management, asset management and property valuations. It is therefore perhaps better to refer to real estate or property studies as a professional discipline (Wallace, Van Fleet and Downs, 2010; Squires, 2001) at least until consensus has been achieved regarding the real estate or property studies body of knowledge and this body of knowledge is supported by research (Wallace, Van Fleet and Downs, 2010).

## ***2.12 Aligning the study of real estate to the needs of the industry***

Marshall (2008) citing a report commissioned by the European Commission proposes that higher education is perhaps not entirely preparing students to be successful in the workplace and that due to constant changes in the business environment that graduates need to be able to adapt to that change. This illustrates to some degree that there may be discontinuity between the needs of industry and the education that is provided by universities. Marshall (2008) does however note that graduates in general in European countries tend to acquit themselves well in the work environment.

Marshall (2008) also comments that the European Commission study indicated that students should be encouraged to obtain work experience that is pertinent to their field of study and academic recognition should be given to students who obtain such pertinent work experience and that university programmes also need to ensure that graduates enter the work place with 'professional skills'. Manning and Roulac (2001), Manning, Weinstein and Seal (2007) and Ferguson and Ramsay (2010) agree that internships and apprenticeships for students might prepare students better for their future work. Hefferan and Ross (2010: 377) also note that the importance of combining university studies with practical work programmes "...in the development of the whole professional – not simply someone with technical competence."

It is also important to continually assess university degree programmes (Callanan and McCarthy, 2003; Manning, 2002). Education involves the transmission of knowledge in the lecture room, but this on its own will not necessarily be sufficient to ready students for the work environment (Callanan and McCarthy, 2003; Manning, 2002). As soon as graduates find themselves in the work environment, additional skills may be required over and above those learned at university. It must be borne in mind that universities create and disseminate knowledge (Etzkowitz et al., 2000; Sutz, 2005; Ramkisson, 2008) and do not necessarily teach skills. As Jordaan (2004) has pointed out, academic education is the preserve of the university, whereas vocational training is traditionally undertaken by other institutions of higher education, such as the Technikons.



The value of work experience gained whilst still a student, perhaps via an internship or apprenticeship may therefore be invaluable in addressing this skills gap experienced by graduates (Manning and Roulac, 2001; Manning, Weinstein and Seal, 2007; Ferguson and Ramsay, 2010).

Callanan and McCarthy (2003) state that it is important to obtain the opinions of both students and industry on an ongoing basis to determine if students are being taught to meet industry needs and if graduates are to be ready to perform at an appropriate level when they enter the work environment. Callanan and McCarthy (2003) also agree with Marshall (2008), that graduates need to be flexible and pliable in a work environment that is constantly evolving.

In the survey conducted by Callanan and McCarthy (2003), one of the issues raised was the inability of graduates to apply the knowledge and theory that was learnt at university in the work environment and another was the insufficient amount of work place experience in the degree. The future solutions to these problems identified by Callanan and McCarthy (2003) which was viewed favourably and accepted by students and employers is summarised as follows:

- A practical work place experience course is to be added to the curriculum. Students will obtain academic credit if they submit two reports regarding aspects of their experience of working in an approved property business for at least 450 hours over a 12-month period;
- To increase the practical content in second and third year level courses mainly through the use of case studies; and
- A “buddy” visit programme, where final year students are grouped together and visit property companies.

Many real estate degree programmes do require students to learn technical and financial skills, such as the ability to calculate net present value (NPV) and internal rate of return (IRR) for an investment in property or being able to complete a feasibility study for a proposed new property development. Whilst there may be some concentration in real estate degrees offered in the US on aligning skills to entry and intermediate level jobs in real estate, this may not be the case for the skills required for a more senior or executive role (Manning and Epley, 2006).

Strategy, negotiating skills and even subjects like international finance and economics are examples proposed by Manning and Epley (2006) that may be required by senior personnel in property organisations, which do not necessarily form part of the current real estate curriculum. Manning and Epley (2006) believe that although the university education of junior and middle level managers in real estate in the US is being catered for adequately, this is not the case for senior managers whose education needs to be more focussed on the overall business strategy of a company. The approach adopted at RMIT outlined by Baxter (2007) may provide a solution to the problem identified by Manning and Epley (2006). The curriculum of the undergraduate real estate degree at RMIT is designed to expose students to most of the real estate knowledge areas, whereas the curriculum of the post graduate degree in real estate allows students to specialise in certain areas. Indeed, the development of the Masters of Business Administration (MBA) degree has fulfilled this role in business schools around the world allowing students with a variety of undergraduate degrees to specialise in the various business disciplines.

### ***2.13 Influencing factors in curriculum development***

The historical factors particular to South Africa's past that have impacted on the development of property studies in South Africa have already been highlighted. These factors include:

- South Africa's political history – the advent of apartheid, subsequent isolation as a result and then transition to a democratic dispensation.
- The nature of the South African property market – opportunities in the property market that are potentially similar to those that present in developed countries, yet South Africa is largely considered to still be an emerging economy.
- The fact that Property Studies programmes have been traditionally housed in quantity surveying and construction schools at the various universities.
- The increase in size of both the non-residential and residential property markets by all interested participants in the economy (Stats SA, 2010).

(Chikafalimani and Cloete, 2007; Mooya, 2007).

Hakfoort, Berkhout and Manshanden (2003) also point out that real estate programmes will differ as a result of the focus on real estate that is proposed by the government of a country. In the post-apartheid era in South Africa for example, transformation charters, such as the 'property and construction charters', have been promulgated by government in an effort to rectify the inequities of the apartheid era (Chikafalimani and Cloete, 2007).

Chikafalimani and Cloete (2007) have recognised that there are several factors that will impact upon the curriculum development of postgraduate real estate qualifications in South Africa. Chikafalimani and Cloete (2007) state that these factors can assist real estate academics in improving the real estate curriculum in the future. The factors that influence curriculum development recognised by Chikafalimani and Cloete (2007) have been summarised below.

- **Accreditation bodies:** in general, a real estate accreditation body would standardise and apply rules with respect to real estate professionals, such as the registration of professional members, enforcement of a code of ethics and the ongoing development of its members. Authors such as Schulte (2003) and Mooya (2007) have identified the contribution that an accreditation body such as RICS has made regarding the development of the real estate curriculum worldwide.
- **Employers:** employers will employ the students who graduate with real estate qualifications. Employers assess the capabilities and proficiencies of graduates and they are therefore well placed to make recommendations with regard to modifications required in the real estate curriculum. Employers also have practical knowledge and understanding of real estate as a profession which further adds to their ability to make recommendations with regard to the real estate knowledge and skills which need to be included and emphasised in the real estate curriculum (Black et al., 1996; Galuppo and Worzala, 2004).
- **Environmental concerns:** in South Africa, regulations are being employed by local authorities that 'environmental impact assessment reports' must be submitted with any applications for property developments that are being proposed. The focus on environmental sustainability issues will influence the development of the real estate curriculum.

- **Finance:** in the past, real estate has generally been seen as a 'financial asset'. The failure and collapse of major financial institutions globally both in the past and during the recent global financial crisis has currently has led to the introduction of a firm focus on real estate finance in the real estate curriculum. However, Schulte (2003) believes that the increase in non-American real estate academics and researchers and their participation in international real estate conferences will reduce the focus of finance and investment in both education and research.
- **Globalisation:** as part of a global market, local markets cannot operate in isolation. The increase in global real estate transactions means that real estate education must be able to provide the knowledge required for these transactions. Exposure to international real estate transactions and exchange programmes that students participate in allows for the exchange of knowledge globally and will influence the development of the real estate curriculum and future research (Schulte and Schulte-Daxbroek, 2003).
- **Government and political factors:** the government creates the legal environment within which property transactions occur. Subsequent to the election of the first democratic government in South Africa, black people who were previously not allowed to own property in South Africa are now allowed to do so. In addition, the introduction of 'property and construction charters' whose purpose is to rectify the inequities of the apartheid era, means that the real estate curriculum in South Africa must be developed to include these very specific South African nuances.
- **Information technology advances:** rapid changes in technology have influenced the development of the real estate curriculum as students are required to be proficient with a computer. The work of the valuer has been impacted quite significantly by technology.  
Most of the financial institutions will be able to conduct valuations using a desktop approach and will require decreasing intervention by the valuer. This means that there will be increasing pressure on valuers to conduct valuations electronically and to also increase the number of valuations to be completed in a shorter period of time.

- **Land and urban form changes:** physical structures are developed on land and therefore the development of new real estate will be affected by the availability of land as well as the various land uses that are allowed in terms of the law. Issues around 'urban land use and form' will therefore influence the development of the real estate curriculum as well.
- **Local communities and professionals:** graduates of a university will often be employed by real estate organisations and professionals located around or within close proximity to the university. This means that graduates will interact with the local community. The local community and local real estate professionals are able to influence the development of the real estate curriculum as they are also the beneficiaries of university education that offers a relevant curriculum.
- **Real estate educators:** real estate educators should be closely involved with the planning, implementation and evaluation of the curriculum of real estate degrees (Galuppo and Worzala, 2004). Real estate educators must understand the changing requirements of the real estate industry requirements and to then develop the real estate curriculum accordingly. Real estate educators interact with students and can use course assessments to identify what the expectations of students are and how this influences the development of the real estate curriculum (Manning, 2002; Callanan and McCarthy, 2003).
- **Social and cultural factors:** the social and religious beliefs of a community as well as cultural factors may affect the development of real estate as well real estate decision making. The impact that these factors have on the real estate curriculum should be included by real estate educators.
- **Students:** course assessments completed by students can be very valuable in identifying the expectations and experiences of students who have attended a real estate course. Apart from the expectations that students have, students will also research and determine the qualifications and skills that they require to be able to competent when they are employed (Manning, 2002; Callanan and McCarthy, 2003). Due to the lack of work place experience that students have, real estate educators may not give credence to the recommendations made by students regarding specific course content (Manning, 2002). Despite this, Chikafalimani and Cloete (2007) still believe students can provide positive input regarding the development of the property studies curriculum.

The factors identified by Chikafalimani and Cloete (2007) are not ranked in any particular order and each factor may not be equally as influential in its impact on the development of the real estate curriculum. Whilst an all-inclusive approach should be adopted when reviewing and revising a curriculum, Chikafalimani and Cloete (2007) do advise that industry requirements are key. The objectives of creating graduates who are competent and who meet the requirement of the industry can only be achieved by ensuring that students are exposed to a range of issues in the curriculum (Manning 2002; Callanan and McCarthy, 2003; Chikafalimani and Cloete 2007).

#### ***2.14 Industry accreditation, certification and membership bodies***

As already mentioned, Chikafalimani and Cloete (2007) identified industry accreditation bodies as being influential in the development of the real estate curriculum. A real estate accreditation body would standardise and apply rules with respect to real estate professionals, such as the registration of professional members, enforcement of a code of ethics and the ongoing development of its members (Chikafalimani and Cloete 2007). Schulte (2003) and Mooya (2007) have identified the contribution that an accreditation body such as RICS has made on the development of the real estate curriculum worldwide. Baxter (2007) feels that the interactions between the universities and professional bodies in Australia could have been more significant and that the professional bodies have often had their “own political agendas and their own continuing professional development programs” (ibid: 446).

In South Africa, a professional body that represents real estate professionals does not exist. A summary of selected accreditation, certification and voluntary membership bodies that exist in South Africa follows:

### 2.14.1 Council for the Built Environment (CBE)

According to the CBE's website:

“The Council for the Built Environment (CBE) is a statutory body established in terms of the Council for the Built Environment Act, 2000 (Act No. 43 of 2000) (CBE Act).

The CBE Act was introduced in order to address certain shortcomings in the built environment and to enable a climate for ongoing transformation and development of the professions to take place. In terms of the CBE Act the Council is, amongst others, responsible for transforming the professions, acting as a conduit between Government and the built environment professions, fostering growth of the professions, and contributing to the creation of a dynamic built environment.”

The CBE represents the following councils and interests:

- Engineering Council of South Africa
- SA Council for the Architectural Profession
- SA Council for the Quantity Surveying Profession
- SA Council for the Property Valuers Profession
- SA Council for the Landscape Architectural Profession
- SA Council for the Project and Construction Management Professions
- Government
- Public

The role of the CBE is to:

“**Champion** sound governance of the professions, appropriate standards of health, safety and environmental protection, standards of training and ongoing human resource development in the built environment, in order to protect the interests of the public and to maintain a sustainable built environment and natural environment.

**Serve as a forum** where the built environment professions, through their respective Councils can interact with regard to matters of mutual interest, to the benefit of the built environment.

**Serve as facilitator** in order to encourage participation by the built environment professions in integrated development in the context of national goals of government.

**Act as sentinel** to ensure the uniform application of norms and guidelines set by the Councils for the Professions throughout the built environment.”

([www.cbe.org.za](http://www.cbe.org.za))

#### **2.14.2 SACPVP – SA Council for the Property Valuers Profession**

A summary of the Council’s website reveals that the Council’s main statutory functions are:

- to register professionals (valuers);
- to consult with the Council on Higher Education regarding matters relevant to education in property valuation;
- to conduct accreditation visits to any educational institution offering property valuation education;
- to accredit education institutions and their property valuation education programmes;
- to consult with the South African Qualifications Authority (SAQA) to determine standards of competency for the purpose of registration;
- to establish a standards generating body (SGB);
- to prescribe or recognize any examination or qualification for the purposes of the Act
- to determine conditions relating to the nature and extent of continuing education and training;
- to allow registered persons to gain professional status in other countries;
- to recognize voluntary associations;
- to engender a code of conduct for registered persons;
- to investigate complaints.

([www.sacpvp.co.za](http://www.sacpvp.co.za))



### **2.14.3 SACQSP – SA Council for Quantity Surveying Professionals**

A summary from the Council's website reveals that the purpose of this body is to: direct, assist and promote a high standard of proficiency and responsibility in the quantity surveying profession, undertake accreditation visits to institutions of higher education, increase awareness of the range of services offered and prescribe and enforce a Code of Conduct and Codes of Practice. The organisation's mission is also to ensure the profession engenders development of South Africa.

([www.sacqsp.org.za](http://www.sacqsp.org.za))

### **2.14.4 The EAAB – The Estate Agents Affairs Board of South Africa.**

The Estate Agency Affairs Board is a statutory body created by Act 112 of 1976. Estate agents are required to be registered with the EAAB and obtain a fidelity fund certificate to be able to practice legally in South Africa.

According to the EAAB's website:

"The Estate Agency Affairs Board (EAAB) was established in 1977 in terms of the Estate Agency Affairs Act 112 of 1976 ('the Act'), with the mandate to regulate and control certain activities of estate agents in the public interest.

The EAAB regulates the estate agency profession through ensuring that all persons carrying out the activities of an estate agent as a service to the public are registered with the EAAB. A Fidelity Fund Certificate, which is to be renewed each year is issued as evidence of such registration and confirmation that such person is legally entitled to carry out the activities of an estate agent.

The primary statutory mandate of the EAAB is to:

- a) regulate, maintain and promote the standard of conduct of estate agents having due regard to the public interest;
- b) issue fidelity fund certificates to qualifying applicants;
- c) prescribe the standard of training and practical experience of estate agents;

- d) investigate complaints against estate agents and institute disciplinary proceedings against offending estate agents where required; and
- e) manage and control the Estate Agents Fidelity Fund.”

([www.eaab.org.za](http://www.eaab.org.za))

#### **2.14.5 SAPOA – The South African Property Owners Association.**

SAPOA is a voluntary membership body representing industry interests. SAPOA is representative of major property owners in South Africa. According to SAPOA’s website:

“SAPOA, or the South African Property Owners Association, is the representative body and official voice of the commercial and industrial property industry in South Africa.

SAPOA was established in 1966 by the leading and large property investment organisations to bring together all role players in the commercial property field and to create a powerful platform for property investors. Today our members control about 90% of all commercial and industrial property in South Africa, with a combined portfolio in excess of R150 billion.

We are held in very high esteem by the relevant sectors of government and are therefore consulted on all matters pertaining to the property industry. SAPOA also enjoys representation on key South African bodies, which are key to the country’s property development.”

([www.sapoa.org.za](http://www.sapoa.org.za))

#### **2.14.6 AfRES – The African Real Estate Society**

This body seeks to promote networking, research and education among property professionals across Africa. It is affiliated to the International Real Estate Society (IRES) and other similar bodies internationally.

According to the AfRES website:

“The African Real Estate Society (AfRES) is a continent-wide organisation that seeks to promote networking, research and education among property professionals across Africa. It is affiliated to the International Real Estate Society (IRES), along with sister societies in North America (ARES), Asia (AsRES), Europe (ERES), the Pacific Rim (PRRES) and Latin America (LaRES).”

([www.afresnet.net](http://www.afresnet.net))

There are various statutory bodies that have been created for specific professions, such as the South African Council for the Property Valuers Profession (SACPVP) and the South African Council for Quantity Surveying Professionals (SACQSP). There are also voluntary membership bodies which normally create a forum for members to meet and exchange ideas and these bodies will often represent the interests of members when dealing with government or the statutory bodies who are tasked with the registration of members and the regulation of the profession. Examples of these voluntary membership bodies include the South African Institute of Valuers (SAIV) which creates networking opportunities for members and the Association of South African Quantity Surveyors (ASAQS). Individuals who work in the areas of, for example, asset management, real estate development, property and facilities management and real estate financing do not have a statutory body to which they must belong and that also acts as an accreditation body of education programmes. A voluntary membership body does also not exist to which they can belong and that represents their interests as a profession.

The establishment of a South African real estate accreditation body will facilitate the professionalization of the real estate industry. A real estate accreditation body would standardise and apply rules with respect to real estate professionals, such as the registration of professional members, develop and enforce of a code of ethics and provide for the ongoing development of its members (Chikafalimani and Cloete, 2007). Currently, such a body does not exist.

## **2.15 Concluding literary remarks**

As suggested by the literature, there appears to be a lack of consensus as to what constitutes the real estate body of knowledge (Wells and Williams, 1993; Weeks and Finch, 2003; Black and Rabianski, 2003; Galuppo and Worzala, 2004; Baxter, 2007). A cohesive body of knowledge that has achieved consensus amongst real estate academia has not emerged. Black et al. (1996) do emphasise that consensus regarding the body of knowledge is not required for an area of study to be considered an academic discipline

An academic discipline that is unable to meet the needs of its target group will be unable to maintain the backing that the target group has previously provided. The academic discipline of property must continue to create and distribute information that develops its target group (Black et al., 1996).

The literature does identify certain core courses that should form the foundation of an undergraduate property degree. Black et al. (1996) indicate that a property course should cover certain environments. The broad knowledge areas, according to Black et al. (1996) that would be included in courses that cover each environment are summarised as follows:

- Market environment – market analysis and valuation;
- Financial environment – mechanics of finance, including the time value of money, types of mortgage instruments and the analysis of debt and equity investments;
- Legal and public policy environment – regulatory aspects of government involvement in real estate operations, role of public institutions in the operation of real estate markets and the decision processes of public entities; and
- Physical and development environment – land resources, site development, design, engineering, management, developmental processes and environmental impact.

Weeks and Finch (2003) state that universities or colleges in the US that offer real estate as a major contain courses in 'Real Estate Principles, Real Estate Finance, Real Estate Property Appraisal and Valuation, Real Estate Law and Real Estate Investments'.

This range of real estate courses demonstrates the fact the real estate is a 'multidisciplinary' field and that students need to be exposed to all of these subject areas as well as 'Urban Land Economics, Real Estate Development, Secondary Mortgage Markets and Real Estate Asset Management' (Galuppo and Worzala, 2004). In addition to real estate courses, various commentators state that real estate professionals also need to develop general management skills and knowledge (Galuppo and Worzala, 2004; Manning and Epley, 2006; Hefferan and Ross, 2010).

The faculty or school where a property programme is housed will also impact upon the focus of the degree. Programmes in the US have a finance and investment focus and tend to be housed in a business school or a business of finance faculty or department (Wells and Williams, 1993; Weeks and Finch, 2003; Black and Rabianski, 2003; Galuppo and Worzala, 2004; Baxter, 2007), whereas programmes in the United Kingdom tend to be housed in the area of the built environment and programmes in other parts of Europe focus on construction, technology and engineering (Black and Rabianski, 2003). In South Africa, property studies programmes are housed in the built environment and have a strong construction bias which reflects the euro-centric influences on our universities in South Africa.

Property studies is a new academic discipline in South Africa, with an undergraduate degree in property studies only being introduced in 2000 (Cloete, 2002). The curriculum of the property studies degrees offered by Wits, UCT and UP will require revision over time as these degrees look to find their own identity. The approach adopted by RMIT in Melbourne is worthy of consideration. The curriculum of the undergraduate real estate degree at RMIT is designed to expose students to most of the real estate knowledge areas, whereas the curriculum of the post graduate degree in real estate allows students to specialise in certain areas (Baxter, 2007).

The scarcity of lecturing resources and the relatively small size and lack of influence that property studies schools have (Hefferan and Ross, 2010), may also encourage the approach outlined by Baxter (2007) and adopted at RMIT in Melbourne, namely, that the construction management, quantity surveying and property studies degrees would have many courses in first, second and third year common or exactly the same and specialisations only in the fourth year.

The literature does reveal that stakeholders such as employers and graduates are important to consult with regarding the development of the curriculum (Callanan and McCarthy, 2003; Manning and Epley, 2006) and that the needs of the property industry can be useful input for the development of the curriculum of a real estate or property degree (Black et al., 1996).

One of the questions that arise is whether or not real estate or property studies is considered to be a profession. The definition of a profession in the literature (Rice and Duncan, 2006; Wallace, Van Fleet and Downs, 2010) would seem to indicate that real estate is not a profession. The body of knowledge is not defined, a national professional association does not exist and there is no applicable code of ethics. However, according to Evetts (2005) the ideas of 'trust, competence and professionalism' that characterise 'occupational professionalism' have become applicable to 'organizational professionalism'. In addition, most of the literature refers to real estate as a profession (Wells and Williams, 1993; Weeks and Finch, 2003; Black and Rabianski, 2003; Galuppo and Worzala, 2004; Baxter, 2007). It may be perhaps more correct to refer to real estate or property studies as a 'professional discipline' (Wallace, Van Fleet and Downs, 2010; Squires, 2001) at least until consensus has been achieved regarding the real estate or property studies body of knowledge and this body of knowledge is supported by research (Wallace, Van Fleet and Downs, 2010)

The establishment of a real estate accreditation body representing the needs of professionals employed in the areas of property management, asset management, real estate financing and so on may assist with the process of professionalization of real estate.

A Real Estate accreditation body would standardise and apply rules with respect to real estate professionals, such as the registration of professional members, enforcement of a code of ethics and the ongoing development of its members (Chikafalimani and Cloete 2007). Schulte (2003), Mooya (2007) and Hefferan and Ross (2010) have all indicated the positive role and influence that an accreditation body such as RICS has had on the development of the real estate curriculum worldwide and perhaps RICS may be in a position to play a role as an accreditation body insofar as the professionalization of real estate or property studies in South Africa is concerned.

## CHAPTER 3: RESEARCH METHODOLOGY

### 3.1 Introduction

This chapter outlines the methodology used to collect data as well as the approach that was adopted in this research study.

Leedy and Ormrod (2005: 2) define research as "...a systematic process of collecting, analysing and interpreting information (data) in order to increase our understanding of the phenomenon about which we are interested or concerned."

Taylor, Sinha and Ghoshal (2006) suggest that there are three aspects or 'dimensions' of research methodology. These 'dimensions' are presented in Table 3.1.

**Table 3.1 The three dimensions of research methodology**

Research strategies	Case studies Surveys Action research Experimental design
Research methods	Interviews Questionnaires Observation Documentary analysis
Data types	Qualitative Semi-quantitative Quantitative

**(Source: Taylor, Sinha and Ghoshal (2006))**



Taylor, Sinha and Ghoshal (2006) emphasise the point that the research methodology that is utilised needs to be suitable to be able to meet the demands of the study that are central to the research that is being undertaken.

### **3.2 Research strategies**

The research strategies presented in Table 3.1 include case studies, surveys, action research and experimental design. The application of each of these is briefly described as follows:

- Case studies – often used in management research and can be used to compare different organisations to one another. According to Creswell (2009: 13), “Case studies are a strategy of inquiry in which the researcher explores in depth a program, event, activity, process, or one or more individuals”;
- Surveys – surveys can be utilised to access many people and enable the researcher to survey a number of variables or issues. One of the reasons for conducting surveys is to be able use the results obtained from a sample to make generalisations about the population (Creswell, 2009);
- Action research – often suitable for research in a working environment where the researcher is also an employee. This is suitable when the research is problem focussed or change oriented; and
- Experimental research – often used as a research strategy in the physical sciences where environmental conditions and variables that can affect the outcome of the research can be controlled (Creswell, 2009; Thomas, 2003).

### **3.3 Research methods**

There are various options in terms of determining what type of research method to use for a particular study. This can include surveys, research in the field, the analysis of content and observation (Taylor, Sinha and Ghoshal, 2006; Leedy and Ormrod, 2005).

The most suitable research method is selected to ensure that the study can be measured and the researcher is able to ultimately reach a conclusion with results from the study that are reliable and valid (Taylor, Sinha and Ghoshal, 2006; Cresswell, 2009). The research methods outlined by Taylor, Sinha and Ghoshal (2006) include interviews, questionnaires, observation and documentary analysis. The application of each of these is briefly described as follows:

- Interviews – this method allows for the researcher to communicate directly with respondents and can be undertaken in person with the interviewee or telephonically (Leedy and Ormrod, 2005; Cresswell, 2003). Response rates with interviews are greater than with a questionnaire, but may be more costly to administer (Rabianski and Black, 1999);
- Questionnaires – a questionnaire is designed to collect specific information from the respondents using questions that have been pre-determined by the researcher (Leedy and Ormrod, 2005; Cresswell, 2009);
- Observation – the purpose of observation is to gather data in a typical day-to-day setting allowing the researcher to observe typical behaviour (Bogdan and Biklen, 2003); and
- Documentary analysis – analysing the content of documents allows the researcher to reach certain conclusions which can then be validated by the researcher utilising alternative methods to collect data (Stremler, 2001).

### ***3.4 Qualitative versus quantitative research***

Research needs to be carefully planned and the researcher must approach the research task at hand with a clear idea of the objectives of the research as well as the process that will be followed in order to achieve these objectives. Leedy and Ormrod (2005: 3) clearly state “Therefore, in addition to identifying the specific goal of your research, you must also identify how you propose to reach your goal.”

In a quantitative approach, the researcher may wish to determine what effect a change in one variable will have on other variables. This approach is often used to test a theory (Creswell, 2009).

The researcher will design an instrument that is used to collect the data and the analysis of the data usually provides statistical results that the researcher can rely on with a certain level of confidence (Thomas, 2003; Creswell, 2009). Quantitative research measures quantities and is empirical by its very nature. As Thomas (2003: 1) says, “Quantitative methods ... focus attention on measurement and amounts ... of the characteristics displayed by the people and events that the researcher studies.” The research questions and objectives as well as the hypothesis of the research study will be ‘tested against reality’ (Du Plooy, 1996).

According to Creswell (2009) a qualitative approach is one where the researcher seeks to comprehend the significance that people impute to a particular issue. “Data analysis involves collecting open-ended data, based on asking general questions and developing an analysis from the information supplied by participants” (Cresswell, 2009: 184). Thomas (2003) indicates that the use of a qualitative approach means that the researcher will not measure quantities. Thus, qualitative research does not try to measure a particular amount or quantity, but rather tries to explore issues in a complete and universal manner.

Cresswell (2003) states that there is also a mixed approach. A mixed approach is an approach which integrates aspects of the quantitative and qualitative approaches (Creswell, 2003). In applying the mixed approach, the researcher will collect data as would be the case with a quantitative approach, but will also use elements of the qualitative approach “...so that the overall strength of a study is greater than either qualitative or quantitative research (ibid: 4). The researcher will ultimately have a record of both quantitative and qualitative data (ibid).

Thomas (2003) does emphasise the point that not all researchers agree when defining quantitative and qualitative approaches. “And definitions become even more confusing when authors differ markedly in what they intend by the term method. Some writers, when speaking of method, focus on one facet of research activity while other focus on quite a different facet” (ibid: 2).

### **3.5 Approach adopted in this research study**

According to the classification provided by Taylor, Sinha and Ghoshal (2006), the research methods and data types used in this research study were decided upon as follows:

- A thorough and detailed literature review was undertaken and is presented in Chapter 2. Information was gathered from various sources including academic textbooks, academic journals, various articles and the internet. This included a review and comparison of the existing curriculum outlines of the undergraduate property studies degrees of Wits, UCT and UP.
- The literature review was necessary in order to gain an in depth understanding of what research has previously been undertaken by other researchers and writers. The literature review also informed the questions that were posed to potential respondents of the survey that was undertaken.
- The undergraduate property studies degree offered by CEM at Wits was identified as a case study and the curriculum of the degree as the unit of analysis. As part of the research study was to determine the link between employers and the development of the curriculum, a case study approach was decided upon. Yin (2009) states that a case-study reflects a real life situation. A criticism of the case study approach is whether or not you can generalise from your case study. Yin (2009: 15) states as follows, "...the case study, like the experiment, does not represent a "sample," and in doing a case study, your goal will be to expand and generalize theories (analytical generalization) and not to enumerate frequencies (statistical generalization)." It would therefore seem acceptable to use a case study to generalize. Yin (2009:39) in fact makes the point that the researcher, "...should try to aim toward analytical generalization in doing case studies, ...".
- As the primary objectives of this research study were to find out from senior managers in the property industry and as well as recent graduates what skills and knowledge graduates of a property studies programme require, it was decided that the best method to meet these objectives was through the use of questionnaires.

- Responses to the questionnaires were designed to allow respondents to provide their own opinion and the research study was therefore primarily qualitative in nature. However, respondents were provided with a scale of 1 to 5 to respond to certain questions and this aspect of the questionnaire was quantitative in nature.
- A list of chief executive officers (CEOs) and senior managers of corporate members of SAPOA was drawn up from the attendees of the 2008 SAPOA Convention. The contact details of these people were confirmed telephonically. This also enabled confirmation that the person was still employed at that organisation in a senior management capacity. This ensured that the questionnaires that were received were completed by people within an organisation who were in the position to understand and know what skills and knowledge are required of property studies graduates. The approach of contacting senior personnel who would be in a position to understand and express an opinion regarding the skills and knowledge required of real estate graduates was similar to that followed by, inter alia, Manning and Epley (2006) and Callanan and McCarthy (2003). The questionnaire was emailed to all potential respondents. A follow up telephone call was made to ensure that the questionnaire had been received and a further telephone call was made as a reminder to complete and return the questionnaire.
- A list of graduates who had recently (between 2005 and 2009) completed their degrees in property studies at Wits was drawn up with assistance from the CEM. Individuals on this list were contacted and asked to complete a similar questionnaire that was emailed to them. The questionnaire was only emailed to all potential respondents who had been working in the property industry for at least one year. A follow up telephone call was made to ensure that the questionnaire had been received and a further telephone call was made as a reminder to complete and return the questionnaire.
- Responses from the two groups were compared in an attempt to determine if a trend emerged between the data collected from the two sample groups. Qualitative inferences were drawn from the analysis of the data to test the strength of support for the research proposition.

- The data gathered from the surveys, current curriculums of the universities in South Africa offering an undergraduate property studies degree programme and literature review was compared to support any assumptions and conclusions.

The significance of this study is that it provides input and an overview with regard to curriculum design and development of the undergraduate property studies degree with respect to Wits specifically and more generally, the other universities in South Africa that offer the same or similar degree.

The research conducted, surveyed and targeted two distinct sample groups.

Firstly, senior management working in the property industry in South Africa, and secondly, graduates who had completed an undergraduate property studies degree programme in the School of Construction Economics and Management, had graduated from the University of the Witwatersrand and now were also working in the property industry for at least a year and had therefore had exposure to the property industry. From the literature review it had emerged that to identify if the curriculum of a university property programme is aligned to industry needs, the best people to survey are experienced industry members who are employers of graduates.

The decision to include graduates of the School of Construction Economics and Management was taken in order to ensure that an holistic view was obtained from a group of interested stakeholders as well as to increase the sample size for generalisation purposes. This survey therefore reflects the opinions of individuals who are experienced in real estate, as well as graduates who have recent and first-hand knowledge of the existing curriculum as well as a different perspective from senior management due to their lack of working experience of the skills and knowledge required of graduates.

The skills and knowledge highlighted by the survey are considered to be relevant and the survey which included both samples (senior management and graduates) is regarded as a comprehensive research study.

As highlighted in Chapter 1, the researcher's involvement in CEM, private training business and industry provides him with the depth of knowledge and background to enhance the outcome of the research study, with reliable and suitable suggestions based on the research findings. It is acknowledged that this may introduce an inherent level of bias. Questionnaires to be utilised to collect primary data were designed in such a manner to ensure that any bias was minimised or avoided. The researcher was also mindful of this potential bias when analysing the data. Given the researcher's position with CEM, access to graduates and employers was obtained with relative ease. This allowed for data rich collection, through the use of questionnaires, with respect to the curriculum of undergraduate property studies offered by CEM. Other methodologies would not have allowed for the same richness of data.

### **3.6 Research Design**

In this research study, a survey was duplicated to two different target audiences, with slight variations to suit the different groups. When conducting the survey the researcher attempted to collect information from a population who described their opinions, attitudes, beliefs and experience regarding the research topic.

A very similar questionnaire was given to each of the two different target audiences. The respondents in each sample group therefore had to respond to largely the same set of questions. The survey followed a 'deductive approach', which Neuman (1997: 231) states "...begins with a theoretical or applied research problem and ends with empirical measurement and data analysis." Neuman (1997) also indicates that research conducted in such a way allows for generalisations to be made that are applicable to an entire population. Likewise, Creswell (2009: 146) states that the purpose of 'survey research' "...is to generalize from a sample to a population so that inferences can be made about some characteristic, attitude, or behavior of this population."

As mentioned, the research design in this survey was centred around two similar questionnaires distributed to two different target groups; this being the main source for the collection of data. This information was then compared with the current curriculum offered by CEM at Wits, in order to suggest curriculum development for the future.

The qualitative methodology used herein includes an email survey questionnaire sent to two different target groups. The questionnaire consisted of structured questions as presented in Appendix C for Sample 1, being the employer sample and Appendix D for Sample 2, being the graduate sample. A variety of closed and open-ended questions were posed in order to obtain the relevant information required to complete the research study.

Data obtained included the answers to the questionnaire, which was then analysed and interpreted against the current curriculum offered by CEM at Wits and was used to support the research conclusions. The survey questionnaire was used as the measuring instrument for data collection.

### ***3.7 Measuring Instrument and Data Collection***

The research conducted consisted of two parts:

The first part was to gather information regarding the curriculum of the undergraduate property studies degrees offered by Wits, UCT and UP. This information is detailed in Chapter 2.

The second part involved gathering information via a survey questionnaire, providing information from the target audiences – exploring their beliefs, opinions, attitudes, knowledge and experience. In this primary data, all respondents in each group were asked the same set of questions, with slight variations, in order to ensure that the questionnaire was appropriate for that group. The core questions were however the same. Refer to Appendix C and D for the two questionnaires.



### **3.8 The Research Samples**

#### **Sample 1**

As indicated above, a list of chief executive officers (CEOs) and senior managers of corporate members of SAPOA was drawn up from the attendees of the 2008 SAPOA Convention. A variety of different types of property companies were identified and the respondents from the sample group represent the following fields: Property Management; Institutional Property Owners, Listed Property Sector Companies, Public Sector Property Institutions, Asset Management, Property Management/Broking, Property Brokers and Property Developers and Investment Banks. Quantity surveying, legal and engineering firms were excluded as well as any organisation that would require a potential graduate employee to have studied in a specialised area.

As a result, 58 organisations were defined as the sample of a total population of 198 organisations that were represented at the 2008 SAPOA Convention. This was a purposive sample as the sample contained organisations and individuals who were specifically targeted for the purposes of the research to be conducted.

Any potential bias was eliminated by surveying everyone in the sample and this is also ethically acceptable. There were 15 willing participants who responded to the survey, giving a response rate of 26%.

As all organisations, both larger and smaller, who would be potential employers of graduates of a property studies programme were included in the sample, any additional bias that may have resulted from only surveying organisations of a particular size, were also eliminated.

It was endeavoured to limit sample bias, but to still to obtain a cross section of the senior South African property industry decision-makers to complete the questionnaire.

## **Sample 2**

This sample was limited to students who had completed their studies between 2005 and 2009 and who therefore had between one and five years working experience in the property industry. A total of 45 students have graduated from the undergraduate property studies programme during this time (2005 to 2009). This was also a purposive sample as the sample contained individuals who were specifically targeted for the purposes of the research to be conducted, namely, graduates of the School of Construction Economics and Management at the University of the Witwatersrand.

Only past students who had been exposed to the South African real estate market were considered for the sample. Different students had varying experiences in terms of their exposure, i.e. to different aspects across the real estate industry spectrum

The researcher was not concerned with random, stratified, clustered or systematic sampling for selecting respondents, as the total population as defined in both samples were given the opportunity to be part of the survey. Any potential bias was eliminated by surveying everyone in the sample and this is also ethically acceptable. There were 18 willing participants who responded to the survey out of a total of 38 people who were surveyed, giving a response rate of 47%.

### ***3.9 Data Collection and Distribution Methods: Research Questionnaire***

Two very similar questionnaires, with subtle differences, were designed in order to direct more suitable questions to the appropriate target audience. The similarities of the two questionnaires were critical to evaluate the overall context of the research study. The first questionnaire was designed to address the target audience identified as Sample 1 above, i.e. experienced and senior industry members. The second questionnaire which was based entirely on the first one, with a few modifications, was designed to address the target audience in Sample 2 above, i.e. past university students who were now employed in the property industry.

Questions 2 to 4 of the questionnaire were designed to survey the knowledge areas required of a property studies graduate. Questions 5 to 8 were designed to survey the opinions of respondents with regard to an internship programme. Question 9 was designed to survey the positions held by graduates after being employed for amounts of time, varying from 1 to 5 years. Questions 10 and 13 were designed to identify in which areas of the property industry skills shortages exist.

Questions 11 and 12 were designed to assess the qualifications of the senior management of the organisations where the respondents were employed and the preferred qualifications that potential new graduate employees should possess.

Questions 14 and 15 were designed to allow respondents to provide their own opinions with regard to suggestions for improving property studies programmes in the future as well as the weightings that should be given to various subject areas in a property studies degree programme.

The questionnaire was designed to take respondents a maximum of 20 minutes to complete, so as not to dissuade people from responding.

While the questionnaire provides essentially qualitative data gathered from the population sample, the limited numbers also provided the opportunity for some qualitative interpretation and assessment.

By including a few open ended questions on certain aspects of the research study, insights and attitudes from this group, into the skills required by graduates to operate in the property industry, were also gauged.

The questions asked predominantly required respondents to rank answers according to a scale provided; which scale was explained to the respondent. Respondents were required to rank or rate the answers to indicate a priority level, for example, subject or knowledge areas that may be more or less relevant than other areas. This allowed the researcher to gather larger quantities of more relevant information, while still making the questionnaire relatively easy and quick for the respondent to administer him or herself. The questionnaire was emailed with a covering letter to the relevant sample group and followed up and motivated with a phone call to encourage responses.

It was considered that there are problems associated with email questionnaires; however it was believed to be the most suitable research instrument to use in this instance, as the respondents are professionals who are used to conducting business and communicating via email. In order to ensure a satisfactory response rate was received, the respondents were contacted telephonically prior to despatch of the questionnaire and a follow up telephone call was made or email reminder sent within two weeks to respondents to complete the questionnaire. Some questions were quite detailed and required a certain amount of thought, and this was therefore another reason why a self-administered questionnaire was viewed as suitable.

A further advantage was that this method was inexpensive and manageable and allowed for the standardisation of responses which could not be influenced by the interviewer's bias. The disadvantage was that questions could not be clarified to the respondent; however when reviewing the responses it appears that all questions were understood and answered.

The Wits Code of Ethics for Research on Human Subjects was strictly adhered to, specifically:

- The aims of the investigation were communicated to informants;
- Informants had the right to remain anonymous;
- Questions asked were not insulting or embarrassing;
- There was no exploitation of informants for personal gain; and
- The privacy and wishes of informants was respected at all times.

([www.wits.ac.za](http://www.wits.ac.za))

Once the data had been gathered, the researcher needed to create a summarised version of the responses. In order to address the purpose of the research study and answer the research question, the data was prepared in two documents, one being for Sample 1 and the other for Sample 2. Answers were grouped and tabulated into a workable and analytical format. For each question all respondents' answers were grouped together, either in a table with numerical values (percentages) or written out as quotes.

### **3.10 Conclusion**

This chapter defined the research methodology used in this research project and explains how the data collected was analysed.

This research study investigated what industry members and past students exposed to industry believe graduates entering the property industry should be proficient in, i.e. what knowledge areas should be included in the curriculum of real estate studies, and what relevance these subjects have in the working environment.

Analysis of the research conducted provides an opportunity to propose changes to the curriculum of the undergraduate property studies degree offered by CEM at Wits.

Gathering of data for this research study was based upon the principles outlined in this chapter relating to qualitative research. The advantage of qualitative research is that it provided sufficient detailed information. Some questions were easier to interpret because of this, while others were more difficult.

As the topics of the curriculum are vast, it was more of a challenge to assign the topics that had a “moderate” level of relevance.

This research study applied questionnaires. Questionnaires were developed for each of the two sample groups as certain questions were required to be posed to each sample group in a slightly different manner.

The questions and survey were designed to achieve an objective, which it is believed they did. Although only 15 out of 58 responses (26%) were received from Sample 1 and 18 out of 38 responses (47%) were received from Sample 2, it was believed that the response rate was sufficient to validate the research and regarded as being reliable.

Closed questions made it easier for respondents to respond and the researcher to compare and tabulate. Open ended questions did however provide insight into opinions, beliefs and knowledge without the respondent being prompted.

## **CHAPTER 4: DATA ANALYSIS**

### ***4.1 Introduction***

From the sample surveyed, respondents represented a good cross-section of the property industry in South Africa and included the following areas of the industry: Property Traders and Property Development, Investment Banks, Property Management and Broking, Listed Property Sector, Asset Management and alumni students of the School of Construction Economics and Management who completed their studies between the years 2005 and 2009. All respondents completed all questions.

According to Creswell (2009), it is important to be aware of threats to external validity of the data. Creswell (2009: 162) states that, "External validity threats arise when experimenters draw incorrect inferences from the sample data to other persons, other settings, and past or future situations". The two main threats identified by the researcher, were as Creswell (2009) puts it, 'selection' and 'diffusion of treatment'. The threat of 'selection' means that respondents to the study may have particular traits that would incline them to act or respond in a particular manner. As one of the sample groups for this study was CEOs and senior managers of corporate members of SAPOA, the possibility of the threat of 'selection' was identified. As potential respondents of Sample group 1 were representative of all sectors of the property industry, it is believed that the threat of 'selection' was minimised.

The threat of 'diffusion of treatment' means that respondents to the study in two different groups may converse and this could affect the responses of each group. This threat was minimised by collecting primary data from each group separately.

### ***4.2 Responses***

As indicated earlier the responses were tabulated and summarised into two documents, i.e. one for each sample group. Refer to Appendix C and D for copies of the research questionnaires.

**Question 1:**

Both past students and industry professionals were asked to indicate which sector of the property industry they represented.

Responses from both groups indicated a cross-section of industry representatives – where at least one respondent was representative from each of the following sectors:

- Property Management
- Asset Management
- Institutional Property Owner
- Listed Property Company
- Property Management/Broking
- Public Sector Institution
- Property Institution
- Property Development

This indicates that the sample was representative of the industry, expressing the views of industry members across the board. However, most of the respondents are employed in the area of Property and Asset Management, Listed Property Companies or Institutional Property Owners. This could of course create some bias with regard to the knowledge areas viewed as being important for graduates wishing to be employed in these areas. It is however likely that most property studies graduates would be employed in these areas.

**NOTE:** Respondents were asked to use the following scale when answering the questions in the questionnaire:

**Table 4.1 Ranking scale utilised in questionnaire**

<u>Knowledge required</u>	<u>Rank</u>	<u>Meaning</u>
No knowledge required	1	The graduate does not require any knowledge in this subject area to be competent in the work environment.
Minimum (below average) knowledge required	2	The graduate requires a minimum or below average level of knowledge in this subject area and should still be able to execute work related tasks adequately. It is however not essential or necessary for the graduate to have knowledge in this area.
Moderate (average) knowledge required	3	The graduate requires a moderate or average level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have some knowledge in this area.
Good (above average) knowledge required	4	The graduate must have a good or above average level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have an above average level of knowledge in this subject area.
Excellent (complete) knowledge required	5	The graduate must have an excellent or complete level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have an excellent or complete level of knowledge in this subject area.

**Question 2:**

Respondents were asked the following question:

*“What level of knowledge does a real estate graduate need to have of each of the following subject areas?”*

It is important to note that a list of subject areas was created from existing courses offered in CEM. Respondents were allowed to add their own additional subject areas in question 3.



The responses to **question 2** from the respondents in **Sample 1** are presented in Table 4.2.

**Table 4.2 Sample 1 - analysis of responses to question 2 of the questionnaire**

Subject area	No knowledge Required	Minimum level of knowledge required	Moderate level of knowledge Required	Good level of knowledge required	Excellent level of knowledge Required
Property Development	-	20%	53%	20%	7%
Property Investment	-	13%	27%	33%	27%
Property law	-	13%	53%	33%	-
Property Economics	-	7%	33%	47%	13%
Property Valuation	-	20%	60%	13%	7%
Property Finance	-	13%	20%	47%	20%
Property Portfolio Management	-	-	40%	40%	20%
Basic statistics	7%	73%	-	7%	13%
Advanced Statistics	23%	69%	8%	-	-
Property Environment	-	20%	40%	27%	13%
Property Planning	-	40%	40%	20%	-
Property Marketing	7%	40%	13%	33%	7%
Finance & Cost Management	-	7%	21%	50%	21%
Introduction to Construction Project Management	7%	40%	33%	13%	7%
Project Management in Developing Areas	27%	53%	7%	7%	7%
Environmental Management	-	47%	13%	33%	7%
Commercial & Industrial Law	-	13%	60%	27%	-
Accounting	-	27%	40%	27%	7%
Urban Land Economics	13%	47%	27%	13%	-
Introduction to Facilities Management	-	33.3%	33.3%	33.3%	-
Advanced Facilities Management	-	40%	40%	20%	-

An analysis of the responses of respondents in **Sample 1** reveals:

A sizeable proportion of the respondents in **Sample 1** indicated that graduates need to have a moderate level of knowledge for workplace relevance/readiness in the following subject areas:

- Property Development
- Property Investment
- Property Law
- Property Economics
- Property Valuation
- Property Finance
- Property Portfolio Management
- Property Environment
- Property Planning
- Finance and Cost Management
- Introduction to Construction Project Management
- Commercial and Industrial Law
- Accounting
- Urban Land Economics
- Introduction to Facilities Management
- Advanced Facilities Management

A sizeable proportion of the respondents in **Sample 1** indicated that graduates need to have a good level of knowledge for workplace relevance/readiness in the following subject areas:

- Property Development
- Property Investment
- Property Law
- Property Economics
- Property Finance
- Property Portfolio Management
- Property Environment

- Property Planning
- Property Marketing
- Finance and Cost Management
- Environmental Management
- Commercial and Industrial Law
- Accounting
- Introduction to Facilities Management
- Advanced Facilities Management

A sizeable proportion of the respondents in **Sample 1** indicated that graduates need to have an excellent level of knowledge for workplace relevance/readiness in the following subject areas:

- Property Investment
- Property Finance
- Property Portfolio Management
- Finance and Cost Management

The responses of respondents suggest that there are numerous subject areas that should form part of the property studies curriculum, either as a topic or a stand-alone subject. The subject areas which graduates require an excellent level of knowledge, as indicated by the respondents, all have a finance and investment focus.

All respondents who indicated that graduates require an excellent knowledge of Property Investment, Property Finance, Property Portfolio Management and Finance and Cost Management are representatives of the asset management sector of the property industry. It is therefore logical that these subject areas were identified as the subject areas of which graduates require an excellent level of knowledge.

A sizeable proportion of the respondents in **Sample 1** indicated that graduates need to have no knowledge or a minimum level of knowledge for workplace relevance/readiness in the following subject areas:

- Property Development
- Property Valuation
- Basic Statistics

- Advanced Statistics
- Property Environment
- Property Planning
- Property Marketing
- Introduction to Construction Project Management
- Project Management in Developing Areas
- Environmental Management
- Accounting
- Urban Land Economics
- Introduction to Facilities Management
- Advanced Facilities Management

However, only Basic Statistics, Advanced Statistics, Project Management in Developing Areas and Urban Land Economics were ranked by a majority of respondents as subject areas that graduates require no knowledge or a minimum level of knowledge.

The responses to **question 2** from the respondents in **Sample 2** are presented in Table 4.3.

**Table 4.3 Sample 2 - analysis of responses to question 2 of the questionnaire**

Subject	No knowledge Required	Minimum level of knowledge required	Moderate level of knowledge required	Good level of knowledge required	Excellent level of knowledge required
Property Development	-	11%	44%	17%	28%
Property Investment	-	17%	17%	39%	28%
Property Law	-	6%	44%	39%	11%
Property Economics	-	-	17%	44%	39%
Property Valuation	-	17%	39%	44%	-
Property Finance	-	6%	44%	39%	11%

<b>Property Portfolio Management</b>	-	28%	28%	44%	-
<b>Basic Statistics</b>	11%	89%	-	-	-
<b>Advanced Statistics</b>	28%	72%	-	-	-
<b>Property Environment</b>	-	11%	33%	56%	-
<b>Property Planning</b>	-	44%	17%	39%	-
<b>Property Marketing</b>	11%	11%	72%	6%	-
<b>Finance &amp; Cost Management</b>	-	-	56%	39%	6%
<b>Introduction to Construction Project Management</b>	17%	56%	28%	-	-
<b>Project Management in Developing Areas</b>	17%	67%	17%	-	-
<b>Environmental Management</b>	-	66%	28%	6%	-
<b>Commercial &amp; Industrial Law</b>	-	33%	50%	17%	-
<b>Accounting</b>	-	61%	11%	28%	-
<b>Urban Land Economics</b>	-	72%	28%	-	-
<b>Introduction to Facilities Management</b>	17%	50%	28%	6%	-
<b>Advanced Facilities Management</b>	17%	39%	39%	6%	-

An analysis of the responses of respondents in **Sample 2** reveals:

A sizeable proportion of the respondents in **Sample 2** indicated that graduates need to have a moderate level of knowledge for workplace relevance/readiness in the following subject areas:

- Property Development
- Property Law
- Property Valuation
- Property Finance
- Property Portfolio Management
- Property Environment
- Property Marketing
- Finance and Cost Management
- Introduction to Construction Project Management
- Environmental Management
- Commercial and Industrial Law
- Accounting
- Urban Land Economics
- Introduction to Facilities Management
- Advanced Facilities Management

A sizeable proportion of the respondents in **Sample 2** indicated that graduates need to have a good level of knowledge for workplace relevance/readiness in the following subject areas:

- Property Investment
- Property Law
- Property Economics
- Property Valuation
- Property Finance
- Property Portfolio Management
- Property Environment
- Property Planning

- Finance and Cost Management
- Accounting

A sizeable proportion of the respondents in **Sample 2** indicated that graduates need to have an excellent level of knowledge for workplace relevance/readiness in the following subject areas:

- Property Development
- Property Investment
- Property Economics

The responses of respondents in **Sample 2** also suggest that there are numerous subject areas that should form part of the property studies curriculum, either as a topic or a stand-alone subject. It is to be noted that 13% of respondents in **Sample 1** as opposed to 39% of respondents in **Sample 2** indicated that graduates require an excellent level of knowledge of Property Economics. In addition, 60% and 20% of respondents in **Sample 1** respectively indicated that graduates require a moderate level or minimum level of knowledge of Property Valuation, whereas 39% and 44% of respondents in **Sample 2** respectively indicated that graduates require a moderate level or good level of knowledge of Property Valuation.

Insofar as Property Marketing is concerned, 72% of respondents in **Sample 2** indicated that graduates require a moderate level of knowledge, whereas 13% and 40% of respondents in **Sample 1** respectively indicated that graduates a moderate level and minimum level of knowledge. It would appear that the respondents in **Sample 2** believe that graduates need a lower level of knowledge in the subject areas of Property Economics and Property Valuation and a higher level of knowledge in the area of Property Marketing, as opposed to the respondents in **Sample 1**. Twenty eight percent of respondents (28%) from **Sample 2** also indicated that graduates require an excellent level of knowledge in the subject area of Property Development, whereas only 7% of respondents in **Sample 1** had the same perspective.

A sizeable proportion of respondents in **Sample 1** indicated that graduates require an excellent level of knowledge in the subject areas of Property Portfolio Management and Finance and Cost Management, whereas 0% and 6% respectively of respondents in **Sample 2** indicated that graduates require an excellent level of knowledge in these two subject areas. As has already been mentioned, this may very well be as a result of the sectors that the respondents in **Sample 1** work in and new and fairly new graduates may not be required to have a greater level of knowledge in portfolio management and finance and cost management until later on in their careers.

A sizeable proportion of the respondents in **Sample 2** indicated that graduates need to have no knowledge or a minimum level of knowledge for workplace relevance/readiness in the following subject areas:

- Property Portfolio Management
- Basic Statistics
- Advanced Statistics
- Property Planning
- Introduction to Construction Project Management
- Project Management in Developing Areas
- Environmental Management
- Commercial Law
- Accounting
- Urban Land Economics
- Introduction to Facilities Management
- Advanced Facilities Management

Basic Statistics, Advanced Statistics, Introduction to Construction Project Management, Project Management in Developing Areas, Accounting, Urban Land Economics, Introduction to Facilities Management and Advanced Facilities Management were ranked by the majority of respondents as subject areas that graduates require no knowledge of or a minimum level of knowledge. This is in stark contrast to the responses from the respondents in **Sample 1**.



Basic Statistics, Advanced Statistics, Project Management in Developing Areas and Urban Land Economics were ranked by a majority of respondents in both **Sample 1** and **Sample 2** as subject areas that graduates require no knowledge of or a minimum level of knowledge. Accounting, Introduction to Facilities Management and Advanced Facilities Management were ranked by a sizeable proportion of the respondents in **Sample 1** as good level of knowledge required by graduates, whereas a sizeable proportion of the respondents in **Sample 2** rated these subjects as either no knowledge or minimum level of knowledge required by graduates.

**Question 3:**

Respondents were asked to list any additional subjects that they believed a graduate entering their organisation as a real estate professional required knowledge of and should be included in an undergraduate property studies degree.

Table 4.4 presents a summary of the broad subject areas identified by the respondents in **Sample 1** as well as the percentage of respondents who indicated each subject area.

**Table 4.4 Sample 1 - analysis of responses to question 3 of the questionnaire**

<u>Subject area</u>	<u>Percentage of respondents who identified each subject area</u>
Equity valuation methodologies	33%
Fixed income security valuation methodologies	33%
Negotiation skills	33%
Architectural design	33%
Urban planning	33%
Listed property sector	33%
Optimising property portfolios	27%
Dealing with land claims	27%
Strategic management principles	27%
General marketing principles	20%

Further analysis of the responses received from the respondents in **Sample 1** is of great interest. Subject areas identified by respondents appear to broadly fall into the area of investment as well as management. Other subject areas identified also include architectural design and urban planning as well as softer skills such as negotiation skills.

The responses provided appear to be very specific to the part of the industry that the particular respondent is employed in, for example, equity valuation methodologies was a subject area identified by respondents employed in the area of asset management. Table 4.5 presents further detail in this regard.

**Table 4.5 Sample 1 – additional analysis of responses to question 3 of the questionnaire**

<u>Subject area</u>	<u>Sector of the property industry where respondent is employed</u>
Equity valuation methodologies	Asset management
Fixed income security valuation methodologies	Asset management
Optimising property portfolios	Property management/broking
Dealing with land claims	Property management/broking
Strategic management principles	Property management/broking
General marketing principles	Property management/broking
Negotiation skills	Property development and financial institution
Architectural design	Property development and financial institution
Urban planning	Property development and financial institution
Listed property sector	Property development, financial institution and property management/broking

Respondents in **Sample 2** were asked to list any additional subjects, which are not currently offered in the undergraduate property studies degree in CEM at Wits, that they believed a graduate entering the property profession as a real estate professional required knowledge of and should be included in the undergraduate property studies degree.

Table 4.6 presents a summary of the broad subject areas identified by the respondents in **Sample 2** as well as the percentage of respondents who indicated each subject area.

**Table 4.6 Sample 2 - analysis of responses to question 3 of the questionnaire**

<u>Subject area</u>	<u>Sector of the property industry where respondent is employed</u>
Advanced feasibility studies	33%
Shopping centre management	28%
Risk management	28%
Asset management	28%
Housing/land use policy	17%
Entrepreneurship	17%
Operations management	17%
Human resources management	17%
Rural land economics	11%

It is interesting to note that the responses received from the respondents in **Sample 2** could not be clustered according to the sector of the property industry where the particular respondents were employed, unlike with **Sample 1**.

It would appear that working experience impacts upon the subject areas that respondents feel should be included in the curriculum, such as shopping centre management, risk management and asset management. Although commerce related subjects such as accounting are already included in the property studies curriculum, it appears that graduates identify the importance of having knowledge in the areas of entrepreneurship, operations management and human resources management in the working environment.

Twenty eight percent of respondents also indicated that they would like the property studies degree to include sufficient coverage in the area of property valuation to allow graduates to become a registered valuer.

**Question 4:**

Respondents were asked the following question:

*“What subject areas do you think graduates entering the real estate industry have POOR or insufficient knowledge of? What subject areas do you think graduates entering the real estate industry have GOOD knowledge of?”*

**NOTE:** “Poor knowledge” is defined as being insufficient to be competent in a relevant or related work area. “Good knowledge” is defined as having sufficient knowledge to be competent in a relevant or related work area.

In terms of the subject areas that graduates were viewed to have a good knowledge of by the respondents in **Sample 1**, the dominant areas, as presented in Table 4.7, include: Property Valuation, Property Environment and Commercial and Industrial Law. Subject areas that graduates entering the real estate industry had particularly poor knowledge of, also presented in Table 4.7 include: Property Development, Property Investment, Property Economics, Property Finance, Statistics and Property Planning.

**Table 4.7 Sample 1 – Poor versus good knowledge of subject areas graduates entering the property industry have**

<b>Subject Knowledge</b>	<b>Good</b>	<b>Poor</b>
Property Development	33%	<b>67%</b>
Property Investment	20%	<b>80%</b>
Property Law	60%	40%
Property Economics	33%	<b>67%</b>
Property Valuation	<b>67%</b>	33%
Property Finance	33%	<b>67%</b>
Property Portfolio Management	40%	60%
Basic Statistics	50%	50%
Advanced Statistics	33%	<b>67%</b>
Property Environment	<b>67%</b>	33%
Property Planning	33%	<b>67%</b>
Property Marketing	50%	50%
Financial and Cost Management	50%	50%
Introduction to Construction Project Management	60%	40%
Environmental Management	40%	60%
Commercial and Industrial Law	<b>67%</b>	33%
Accounting	60%	40%
Urban and Land Economics	60%	40%
Introduction to Facilities Management	60%	40%
Advanced Facilities Management	40%	60%
Project Management In Developing Areas	40%	60%

The analysis of the responses to question 2 of the respondents in **Sample 1** indicated that graduates need to have a good or excellent level of knowledge for workplace relevance/readiness in some the following subject areas:

- Property Development
- Property Investment
- Property Economics
- Property Finance
- Property Planning

These are the knowledge areas indicated in the table above where graduates have poor knowledge according to the respondents in **Sample 1**.

In terms of the subject areas that graduates were viewed to have a good knowledge of by the respondents in **Sample 2**, the dominant areas, as indicated in Table 4.8, include: Property Development, Property Investment, Property Law, Property Economics, Property Finance, Property Environment, Finance and Cost Management and Commercial and Industrial Law. Subject areas, according to the respondents in **Sample 2**, graduates entering the real estate industry had particularly poor knowledge of, also presented in Table 4.8 include: Property Portfolio Management, Basic Statistics, Introduction to Construction Project Management, Project Management in Developing Areas, Introduction to Facilities Management and Advanced Facilities Management.

**Table 4.8 Sample 2 – Poor versus good knowledge of subject areas graduates entering the property industry have**

<b>Subject Knowledge</b>	<b>Good</b>	<b>Poor</b>
Property Development	83%	17%
Property Investment	72%	28%
Property Law	83%	17%
Property Economics	89%	11%
Property Valuation	56%	44%
Property Finance	67%	33%
Property Portfolio Management	33%	67%
Basic Statistics	17%	83%
Advanced Statistics	11%	89%
Property Environment	83%	17%
Property Planning	44%	56%
Property Marketing	44%	56%
Finance & Cost Management	83%	17%
Introduction to Construction Project Management	11%	89%
Environmental Management	44%	56%
Commercial and Industrial Law	83%	17%
Accounting	56%	44%
Urban Land Economics	44%	56%
Introduction to Facilities Management	33%	67%
Advanced Facilities Management	17%	83%
Project Management In Developing Areas	17%	83%

The respondents in **Sample 2** were of the opinion that graduates entering the property industry have good knowledge, inter alia, in the areas of:

- Property Development
- Property Investment
- Property Economics
- Property Finance

This is in stark contrast to the responses obtained from the respondents in **Sample 1**, where these respondents were of the opinion that graduates had poor knowledge in these areas. This may be due to the fact that respondents in **Sample 2** are biased towards their own level of knowledge or perhaps having a more intimate understanding of the content of the undergraduate property studies degree, believe that they have good knowledge in these areas.

Both groups did however agree that the subject areas that graduates were viewed to have a good knowledge of include:

- Property Law
- Property Valuation
- Property Environment
- Commercial and Industrial Law.

**Question 5 and 6:**

Respondents were asked the following questions:

*“Do you think graduates should complete an internship programme as part of their studies prior to entering the property industry in order to gain practical skills? The internship would be 6 to 12 months and would focus on integrating knowledge learned at university with the practical skills required in the industry.”*

And

*“Do you think an internship programme should be in a specialised area or field of the property industry or should it cover as many areas of the property industry as possible?”*

Respondents in both samples all answered in the affirmative that the property industry should introduce an internship programme to integrate knowledge learned at university with the practical skills required in the work environment. Fifty percent of the respondents in both **Sample 1** and **2** were of the view that such an internship should be in a specialised field.

**Question 7 & 8:**

Respondents were asked to list the advantages and disadvantages of an internship programme.

The advantages and disadvantages, as indicated by the respondents in each sample, of such an internship programme are presented in Table 4.9:

**Table 4.9 Sample 1 and 2 – The advantages and disadvantages of introducing an internship for undergraduate property students**

Advantages	Disadvantages
<p><b>Sample 1:</b></p> <ul style="list-style-type: none"> <li>• “Young people can enter into the industry with knowledge once they graduate.”</li> <li>• “Learners will have great opportunity to learn from people with expertise in the field and will get practical exposure.”</li> <li>• “Confidence for graduates.”</li> <li>• “Familiarisation of the students with the work environment.”</li> <li>• “Better prepared when entering the job market.”</li> <li>• “Enhance knowledge base and practical skill.”</li> <li>• “Currently it is difficult to obtain practical experience as property remains a specialised field.”</li> </ul> <p><b>Sample 2:</b></p> <ul style="list-style-type: none"> <li>• “Marrying the theoretical and practical concepts are always beneficial to graduates”</li> <li>• “Will give students a broader knowledge base.”</li> <li>• “A better idea of the industry, puzzle all the pieces together.”</li> <li>• “Being on the job straight after the academic work would have made things much clearer.”</li> <li>• “Mentorship would be ideal.”</li> <li>• “Expose graduates to the people in the industry.”</li> <li>• “The graduate cannot learn in varsity, getting to know the buildings and players in the industry.”</li> <li>• “Gain insight into the property spectrum.”</li> <li>• “Adds practicality to the theory.”</li> </ul>	<p><b>Sample 1:</b></p> <ul style="list-style-type: none"> <li>• “Reluctant to participate for nominal reward.”</li> <li>• “None.”</li> <li>• “May be difficult to find willing organisations where people are prepared to add real value to the learning experience.”</li> <li>• “May have to start in their last year of studies. 6-12 months might be too short to be meaningful.”</li> <li>• “Skilled workers might not or be willing to give their time.”</li> <li>• “Difficulties in structuring.”</li> </ul> <p><b>Sample 2:</b></p> <ul style="list-style-type: none"> <li>• “One needs to undertake refresher courses all the time, which sometimes are useless because you have dealt with half the things in the course, resulting in limited or no interest at all.”</li> <li>• “Degree of contribution graduates can make is low.”</li> <li>• “May create too many generalists and not enough specialists.”</li> <li>• “Difficult to expose graduates to broad range of functions in the property profession over that period and therefore may not be of any value.”</li> </ul>



The major advantage, based upon the responses received from both sample groups, would seem to be that an internship programme will allow students to integrate the theoretical concepts learned at university with the practical skills required in the work environment.

The major disadvantage, based upon the responses received from both sample groups, would seem to be that an internship programme may be difficult to implement if organisations are not willing to implement such a programme and if people within those organisations are not willing to act as mentors to students. In addition, graduates may not be able to make a significant contribution to justify the internship programme.

**Question 9:**

Respondents were asked to list what areas and positions property studies graduates work in and fill after 1, 2, 3, 4 and 5 years of employment.

Graduates who entered the property industry and employed by respondents in the last five years, now fill the positions presented in Table 4.10.

**Table 4.10 Consolidated list of Sample 1 and 2 – graduates employed from 2005 – 2010 in their designated positions**

	Area/Field	Designation
<b>After 1 year</b>	<ul style="list-style-type: none"> <li>• Asset Management</li> <li>• Property traders and developers</li> <li>• Listed properties</li> <li>• Construction Management</li> <li>• Public Administration</li> </ul>	<ul style="list-style-type: none"> <li>• Assistant asset manager</li> <li>• Property trader</li> <li>• Property analyst</li> <li>• Foreman</li> <li>• Shareholder</li> <li>• Lease Manager</li> </ul>
<b>After 2 years</b>	<ul style="list-style-type: none"> <li>• Accounting</li> <li>• Commercial property</li> <li>• Property valuations</li> <li>• Listed properties</li> <li>• Construction Management</li> <li>• Marketing</li> <li>• Public Administration</li> </ul>	<ul style="list-style-type: none"> <li>• Chief Financial Officer</li> <li>• Property manager</li> <li>• Administrator Valuations</li> <li>• Property analyst</li> <li>• Retail Portfolio Manager</li> <li>• Project Manager</li> </ul>

<b>After 3 years</b>	<ul style="list-style-type: none"> <li>• Asset manager</li> <li>• Retail property</li> <li>• Direct commercial properties</li> <li>• Construction Management</li> <li>• Marketing</li> <li>• Public Administration</li> </ul>	<ul style="list-style-type: none"> <li>• Senior asset manager</li> <li>• Centre manager</li> <li>• Fund manager</li> <li>• Broker</li> <li>• Team Leader</li> <li>• Project Manager</li> <li>• Property inspector</li> </ul>
<b>After 4 years</b>	<ul style="list-style-type: none"> <li>• Commercial and industrial property</li> <li>• Property management</li> <li>• Construction Management</li> <li>• Marketing</li> <li>• Public Administration</li> </ul>	<ul style="list-style-type: none"> <li>• Property manager</li> <li>• Supervisor</li> <li>• Development Manager</li> <li>• Director</li> <li>• Shareholder</li> <li>• Principle</li> </ul>
<b>After 5 years</b>	<ul style="list-style-type: none"> <li>• Asset management</li> <li>• Property management</li> <li>• Property planning</li> <li>• Construction Management</li> <li>• Marketing</li> <li>• Public Administration</li> <li>• Developer</li> <li>• Real Estate Agent</li> </ul>	<ul style="list-style-type: none"> <li>• Fund Manager</li> <li>• Head of Property operations</li> <li>• Town planner</li> <li>• Development Manager</li> <li>• Quantity Surveyor</li> <li>• Business Owner</li> <li>• Head of Housing Department (Government)</li> <li>• Local Government Politicians and Officials</li> <li>• Chief Architect</li> </ul>

As one may expect, the more experience the graduate has, the more senior the position and function the graduate now performs. One also notices the wide spectrum of areas that graduates work in, including asset management, property management, construction management, listed property sector, valuations, marketing, development, broking and public administration.

**Question 10:**

Respondents were asked the following question:

*“In your opinion, in what areas of the property industry does skills shortages exist? Please list.”*

Table 4.11 presents a summary of the responses to this question from respondents in **Sample 1**.

**Table 4.11 Sample 1 – The areas of skills shortages identified by respondents**

Area of skill shortage	Percentage of respondents who believe that skills shortage exist in this area
Property development skills	73%
Property finance	73%
Property administration	73%
Integrated general management skills	73%
Accounting for the property environment	73%
Project management	60%
Asset management	60%
Property management	60%
Property financing and deal structuring	60%
Property investments specialists (equity)	60%
Skills/knowledge in the property industry in Africa	60%
Using property investment tools, such as discounted cash flow analysis	60%
Town planning	60%
Environmental issues	60%
People skills	60%
Legal skills	47%

The responses to this question from the respondents in **Sample 1** are somewhat consistent with the responses from this sample group to question 4. Seventy three percent of respondents indicated that skills shortages in the property industry exist in the area of property development and property finance. In question 4, a large percentage of respondents of **Sample 1** had indicated that graduates had poor or insufficient knowledge in the areas of property development (67%) and property finance (67%).

Also of interest, is that 73% of respondents indicated that there is a shortage of skills in property administration and integrated general management skills.

Sixty percent of respondents indicated skills shortages in the investment areas as well, including asset management and property investment. This is also consistent with the responses received from this sample to question 2. A lack of people skills was indicated by 60% of **Sample 1**.

Table 4.12 presents a summary of the responses to this question from respondents in **Sample 2**.

**Table 4.12 Sample 2 – The areas of skills shortages identified by respondents**

Area of skill shortage	Percentage of respondents who believe that skills shortage exist in this area
Property development skills	72%
Property finance	72%
Property management and building management	72%
Project management and structuring	56%
Commercial leasing	56%
Building contracts	56%
Analysing the general property market	56%
Property law	56%
Communication skills (written and verbal)	56%
Design of new developments	22%

Responses from **Sample 2** indicate that a high percentage of respondents (72%) are of the opinion that there are skills shortages in the areas of property development, property finance and property management. This is consistent with responses received from the respondents in **Sample 1**. However, a large percentage of respondents in **Sample 2** were also of the opinion that graduates have good knowledge of property development (83%) and property finance (67%). Communication skills were also indicated as an area where there is a shortage of skill by 56% of respondents. This may be more a skill that respondents feel they personally lack rather than a skill generally lacking in the industry.

**Question 11:**

Respondents were asked a general question about the qualifications that the directors of their organisation hold.

*“What qualifications do the directors of your organisation have? List the position/designation of the director (not the name) and his/her qualification.”*

Table 4.13 presents a summary of responses to question 11.

**Table 4.13 Qualifications held by directors of industry organisations surveyed**

<b>Director position/Designation</b>	<b>Qualifications</b>
CEO	MBChB, MBA, CFA, MBA
CIO	BBusSc, CA (SA), CFA
Head of institutional Business	BEconSc, FASSA, FIA
COO	BBusSc, CA (SA), CFA, AMP
Senior Portfolio Manager	BCom, CA (SA), CFA
Executive Management	LLB
MD	BA LLB, CA
Financial Director	BAcc
Executive Manager	BA and MPHIL
General Directors	CA, LLB, BSc, BCom, Bsc Building Science (Honours), MBA, B.Arch, B.Sc (Eng) M.Econ, CFA

As indicated in Table 4.13, the qualifications of management vary quite significantly, from finance, accounting and general commerce qualifications to business science and legal qualifications, with a significant number of postgraduate qualifications. There is no specific qualification required to be a senior manager or director of a property organisation. One must also bear in mind that property studies is a new academic discipline in South Africa and therefore would not have been available as a course of study for most of the senior management or directors of property organisations in this country when they embarked on their chosen course of study.

**Question 12:**

Respondents were surveyed regarding the qualifications that are preferred for graduates and what positions would be suitable for these graduates to fill with such qualification.

Table 4.14 presents a summary of the responses to question 12.

**Table 4.14 Sample 1 and Sample 2 consolidated - positions in relation to degrees held**

Degree	Position
<b>BSc (Property Studies)</b>	<ul style="list-style-type: none"> <li>• General property management</li> <li>• Property portfolio manager</li> <li>• Property trader and developer</li> <li>• Property finance</li> <li>• Broker</li> </ul>
<b>B.Com</b>	<ul style="list-style-type: none"> <li>• Property manager</li> <li>• Property trader and developer</li> <li>• Property finance</li> <li>• Accounting</li> <li>• Asset management.</li> </ul>
<b>BSc (Quantity Surveying)</b>	<ul style="list-style-type: none"> <li>• Property manager</li> <li>• Property trader and developer</li> <li>• Developer and asset management</li> </ul>
<b>BSc (Construction Management)</b>	<ul style="list-style-type: none"> <li>• Construction manager</li> <li>• Project manager</li> <li>• Development</li> </ul>
<b>BSc (Engineering)</b>	<ul style="list-style-type: none"> <li>• Technical position, like maintenance</li> </ul>
<b>Post Graduate Diploma (Property Development and Management) or MSc (Building) or MSc (Property Development)</b>	<ul style="list-style-type: none"> <li>• Senior property manager up to director level</li> <li>• Head of property operations, agency and land use</li> <li>• Senior project manager</li> <li>• Senior asset manager</li> <li>• Property finance specialist</li> <li>• Property broker</li> </ul>
<b>CFA MBA</b>	<ul style="list-style-type: none"> <li>• Property finance specialist</li> <li>• Senior property analyst</li> </ul>

It would appear from the responses received from both sample groups, that a BSc in Property Studies is a suitable qualification to hold to be able to work in the areas of general property management, property portfolio management, property trading and developing, property finance and property broking. However, a postgraduate property qualification seems to be required in order to be able to progress within the organisation.

**Question 13:**

The respondents in **Sample 1** only were asked if, in their own opinion, the skills (as opposed to knowledge) base required by the property industry has changed over the last 10 years. Seventy three percent of respondents agreed that it had, with some of the general comments received presented in Figure 4.1.

- “Basic skills still remain.”
- “Yes, more broad outlook from engineering to property economics.”
- “Shortage due to a large extent of emigration.”
- “Finding it hard to find suitable skilled employees.”
- “People have not kept up to date with changes in the industry, such as green building issues, and need to continuously upgrade themselves”
- “Multi- skilling is required ranging from facilities management to utilities management to project management.”
- “Good all-rounders and surviving but newcomers have impressive degrees but little practical and technical knowledge.”
- “Yes, the industry is definitely more professional, more sophisticated”
- “More technical skills are required in the areas of property funding, environmental issues, the capital markets and understanding the industries in which tenants operate.”
- “Skill base is declining.”
- “Former white companies have failed to hold onto black talent and becoming lily white again with traditional white males in top positions”

**Figure 4.1 Changing skills base**

The overall impression that these comments make is that the skills base in the property industry has changed over the last ten years. People have not necessarily kept up to date with technology, such as green building issues and a range of skills is required. This means that generalists as opposed to specialists are necessary, but having said that, very particular skills in the areas of property finance and capital markets do also seem to be needed, particularly by those respondents working in the area of asset management. The lack of practical skills of graduates also seems to be an issue as does the apparent lack of transformation within some organisations.

**Question 14:**

Respondents were asked to make suggestions to improve undergraduate property studies education in South Africa.

Responses received from both samples are presented in Table 4.15.

**Table 4.15 Improvements suggested for future property studies programmes**

Sample 1	Sample 2
<ul style="list-style-type: none"> <li>• “More practical training.”</li> <li>• “More property finance and investment side.”</li> <li>• “Town planning also seems thin.”</li> <li>• “General practical would add a lot of value.”</li> <li>• “A more practical approach.”</li> <li>• “Internship.”</li> <li>• “Commercial property finance and corporate finance from a property environment, as skills can be expanded on for graduates.”</li> <li>• “Theoretical knowledge is good but theory without practical knowledge creates problems in workplace.”</li> <li>• “Have access to real situations.”</li> <li>• “Needs to be sufficient practical exposure.”</li> <li>• “A bridging course.”</li> </ul>	<ul style="list-style-type: none"> <li>• “More practical application.”</li> <li>• “More specialisation.”</li> <li>• “Practical skills training incorporated into BSc programme.”</li> <li>• “Do more subjects to finish all qualifications i.e. Valuation.”</li> <li>• “Leave with practical skill.”</li> <li>• “Elevate the post graduate diploma to a MBA level.”</li> <li>• “Offer more practical training.”</li> <li>• “Actively advise students on different career paths available in property industry.”</li> <li>• “Include compulsory 6 months internship programme with pre-determined companies.”</li> <li>• “Create culture awareness whereby students keep up to date with industry news, formal/informal engagement with students during lectures.”</li> <li>• “Focus on project management and project/development finance (structuring).”</li> <li>• “Practical skills programme.”</li> <li>• “Property courses too focused on construction and building.”</li> </ul>



The point that is being made very clearly here is that graduates lack practical skills when entering the work environment. There also seems to be too great a focus on construction subjects and graduates would appreciate the degree programme being suitable for the purposes of the academic requirements to becoming a registered valuer. An increased focus on property finance and property investment is also required, but once again these comments were made by those respondents working in the area of asset management. What is extremely interesting to note, is that no comments were received recommending a complete amendment or overhaul of undergraduate property studies education.

**Question 15:**

Respondents were asked, in their opinion, what level of knowledge graduates require of the various areas of focus within the property studies degree excluding specific property subjects.

*“In your opinion, what level of knowledge do graduates require of the following broad knowledge areas?”*

- *Law*
- *Finance*
- *Statistics*
- *Economics*
- *Accounting*
- *Other (please stipulate)*

**NOTE:** *This question specifically excludes property specific subject areas. Please use the same scale as indicated in question 1.*

Table 4.16 presents the responses received from the respondents in **Sample 1**.

**Table 4.16 Sample 1 - Relevance of various broad subject areas in a property studies degree**

Subject	No knowledge required	Minimum level of knowledge required	Moderate level of knowledge required	Good level of knowledge required	Excellent level of knowledge required
Law	-	7%	33%	47%	13%
Finance	-	-	13%	47%	40%
Statistics	-	60%	33%	-	7%
Economics	-	-	13%	67%	20%
Accounting	-	7%	27%	59%	7%
Other:					
• Environmental issues	-	-	-	100%	-
• Management principles	-	-	-		100%

An analysis of the responses received from the respondents in **Sample 1** reveals that 33% of respondents and 47% of respondents were of the opinion that graduates require a moderate level of knowledge and good level of knowledge respectively of law. Law is therefore an important broad subject area that requires focus in the property studies degree.

Forty seven percent and 40% of respondents were of the opinion that graduates require a good level of knowledge and an excellent level of knowledge respectively of finance, although this result is influenced by the respondents working in the area of asset management. Finance is therefore an important broad subject area that requires focus in the property studies degree.

Sixty percent and 33% of respondents were of the opinion that graduates require a minimum level of knowledge and a moderate level of knowledge respectively of statistics. Statistics does therefore appear not to be an important broad subject area that requires focus in the property studies degree.

Sixty seven percent and 20% of respondents were of the opinion that graduates require a good level of knowledge and an excellent level of knowledge respectively of economics. Economics is therefore an important broad subject area that requires focus in the property studies degree.

Twenty seven percent and 59% of respondents were of the opinion that graduates require a moderate level of knowledge and a good level of knowledge respectively of accounting. Accounting is therefore an important broad subject area that requires focus in the property studies degree.

Interestingly, environmental issues and management principles were also highlighted as being important areas of focus to be included in the property studies degree.

Table 4.17 presents the responses received from the respondents in **Sample 2**.

**Table 4.17 Sample 2 - Relevance of various broad subject areas in a property studies degree**

Subject	No knowledge required	Minimum level of knowledge required	Moderate level of knowledge required	Good level of knowledge required	Excellent level of knowledge required
Law	-	-	17%	44%	39%
Finance	-	-	11%	39%	50%
Statistics	-	39%	55%	6%	-
Economics	-	-	-	39%	61%
Accounting	-	28%	39%	28%	5%

An analysis of the responses received from the respondents in **Sample 2** reveals that 44% of respondents and 39% of respondents were of the opinion that graduates require a good level of knowledge and an excellent level of knowledge respectively of law. Law is therefore an important broad subject area that requires focus in the property studies degree.

Thirty nine percent and 50% of respondents were of the opinion that graduates require a good level of knowledge and an excellent level of knowledge respectively of finance. Although a similar result was received from **Sample 1**, it is important to note that a very small percentage of respondents in **Sample 2** work in the area of asset management. This would seem to indicate that regardless of the area in which a graduate is employed, finance is therefore an important broad subject area that requires focus in the property studies degree.

Thirty nine percent and 55% percent of respondents were of the opinion that graduates require a minimum level of knowledge and a moderate level of knowledge respectively of statistics.

Statistics does therefore appear not to be an important broad subject area that requires focus in the property studies degree according to respondents.

Thirty six percent and 64% percent of respondents were of the opinion that graduates require a good level of knowledge and an excellent level of knowledge respectively of economics. Economics is therefore an important broad subject area that requires focus in the property studies degree.

Thirty nine percent and 28% percent of respondents were of the opinion that graduates require a moderate level of knowledge and a good level of knowledge respectively of accounting. Twenty eight percent of respondents were also of the opinion that graduates require a minimum level of knowledge of accounting. Based upon the overall responses from this sample group, accounting is an important broad subject area that requires focus in the property studies degree.

**Sample 2** did not identify any other broad subject areas requiring focus in the property studies degree.

### ***4.3 Conclusion***

The two different sample groups that were surveyed displayed certain similarities and certain differences with their responses.

The responses to question 2 from **Sample 1** suggested that there are numerous subject areas that should form part of the property studies curriculum, either as a topic or a stand-alone subject. The subject areas which graduates require an excellent level of knowledge, as indicated by the respondents, all have a finance and investment focus. However, all respondents in **Sample 1** who indicated that graduates require an excellent knowledge of Property Investment, Property Finance, Property Portfolio Management and Finance and Cost Management are representatives of the asset management sector of the property industry. It is therefore logical that these subject areas were identified as the subject areas of which graduates require an excellent level of knowledge.

The responses of respondents in **Sample 2** also suggest that there are numerous subject areas that should form part of the property studies curriculum, either as a topic or a stand-alone subject. It is to be noted that 13% of respondents in **Sample 1** as opposed to 39% of respondents in **Sample 2** indicated that graduates require an excellent level of knowledge of Property Economics. In addition, 60% and 20% of respondents in **Sample 1** respectively indicated that graduates require a moderate level or minimum level of knowledge of Property Valuation, whereas 39% and 44% of respondents in **Sample 2** respectively indicated that graduates require a moderate level or good level of knowledge of Property Valuation. Insofar as Property Marketing is concerned, 72% of respondents in **Sample 2** indicated that graduates require a moderate level of knowledge, whereas 13% and 40% of respondents in **Sample 1** respectively indicated that graduates a moderate level and minimum level of knowledge. It would appear that the respondents in **Sample 2** believe that graduates need a lower level of knowledge in the subject areas of Property Economics and Property Valuation and a higher level of knowledge in the area of Property Marketing, as opposed to the respondents in **Sample 1**. Twenty eight percent of respondents (28%) from **Sample 2** also indicated that graduates require an excellent level of knowledge in the subject area of Property Development, whereas only 7% of respondents in **Sample 1** had the same perspective.

A sizeable proportion of respondents in **Sample 1** indicated that graduates require an excellent level of knowledge in the subject areas of Property Portfolio Management and Finance and Cost Management, whereas 0% and 6% respectively of respondents in **Sample 2** indicated that graduates require an excellent level of knowledge in these two subject areas. As has already been mentioned, this may very well be as a result of the sectors that the respondents in **Sample 1** work in and new and fairly new graduates may not be required to have a greater level of knowledge in portfolio management and finance and cost management until later on in their careers.

Basic Statistics, Advanced Statistics, Introduction to Construction Project Management, Project Management in Developing Areas, Accounting, Urban Land Economics, Introduction to Facilities Management and Advanced Facilities Management were ranked by a majority of respondents in **Sample 2** as subject areas that graduates require no knowledge of or a minimum level of knowledge. This is in stark contrast to the responses from the respondents in **Sample 1**. Basic Statistics, Advanced Statistics, Project Management in Developing Areas and Urban Land Economics were ranked by a majority of respondents in both **Sample 1** and **Sample 2** as subject areas that graduates require no knowledge of or a minimum level of knowledge. Accounting, Introduction to Facilities Management and Advanced Facilities Management were ranked by a sizeable proportion of the respondents in **Sample 1** as good level of knowledge required by graduates, whereas a sizeable proportion of the respondents in **Sample 2** rated these subjects as either no knowledge or minimum level of knowledge required by graduates.

Additional subject areas that the respondents in **Sample 1** indicated that graduates require knowledge of were in the areas of investment as well as management. In addition, knowledge in the areas of architectural design and urban planning as well as softer skills such as negotiation skills was also identified by the respondents in **Sample 1**. Once again, the responses provided by the respondents in **Sample 1** appeared to be very specific to the part of the industry that the particular respondent is employed in, for example, equity valuation methodologies was a subject area identified by respondents employed in the area of asset management.

The respondents in **Sample 2** were asked to list any additional subjects, which are not currently offered in the undergraduate property studies degree in CEM at Wits, that they believed a graduate entering the property profession as a real estate professional required knowledge of and should be included in the undergraduate property studies degree.

It is interesting to note that the responses received from the respondents in **Sample 2** could not be clustered according to the sector of the property industry where the particular respondents were employed, unlike with **Sample 1**.

However, it would appear that working experience impacts upon the subject areas that respondents feel should be included in the curriculum, such as shopping centre management, risk management and asset management.

Although commerce related subjects such as accounting are already included in the property studies curriculum, it appears that graduates identify the importance of having knowledge in the areas of entrepreneurship, operations management and human resources management in the working environment.

Twenty eight percent of respondents also indicated that they would like the property studies degree to include sufficient coverage in the area of property valuation to allow graduates to become a registered valuer.

The respondents in **Sample 1** noted that graduates have a good knowledge of subjects such as Property Law, Property Valuation, Property Environment, Commercial and Industrial Law and poor knowledge of Property Development, Property Investment, Property Economics, Property Finance, Property Portfolio Management, Statistics and Property Planning.

The respondents in **Sample 2** were of the opinion that graduates have good knowledge of the subject areas of Property Development, Property Investment, Property Law, Property Economics, Property Finance, Property Environment, Finance and Cost Management and Commercial and Industrial Law and poor knowledge of the subject areas of Property Portfolio Management, Basic Statistics, Introduction to Construction Project Management, Project Management in Developing Areas, Introduction to Facilities Management and Advanced Facilities Management.

The respondents in **Sample 2** were of the opinion that graduates entering the property industry have good knowledge, inter alia, in the areas of:

- Property Development
- Property Investment
- Property Economics
- Property Finance

This is in stark contrast to the responses obtained from the respondents in **Sample 1**, where these respondents were of the opinion that graduates had poor knowledge in these areas.

This may be due to the fact that respondents in **Sample 2** are biased towards their own level of knowledge or perhaps having a more intimate understanding of the content of the undergraduate property studies degree, believe that they have good knowledge in these areas.

Both groups did however agree that the subject areas that graduates were viewed to have a good knowledge of include:

- Property Law
- Property Valuation
- Property Environment
- Commercial and Industrial Law.

Respondents in both samples were of the view that the property industry should introduce an internship programme to integrate knowledge learned at university with the practical skills required in the work environment. Fifty percent of the respondents in both **Sample 1** and **2** were of the view that such an internship should be in a specialised field.

The major advantage, based upon the responses received from both sample groups, would seem to be that an internship programme will allow students to integrate the theoretical concepts learned at university with the practical skills required in the work environment.

The major disadvantage, based upon the responses received from both sample groups, would seem to be that an internship programme may be difficult to implement if organisations are not willing to implement such a programme and if people within those organisations are not willing to act as mentors to students. In addition, graduates may not be able to make a significant contribution to justify the internship programme.



Respondents in both sample groups indicated that the more experience a graduate has, the more senior the position and function the graduate now performs. Graduates do appear to work in a wide range of areas, including asset management, property management, construction management, listed property sector, valuations, marketing, development, broking and public administration.

The respondents in **Sample 1** indicated that skills shortages in the property industry exist in the area of property development and property finance as well as in property administration and integrated general management skills. Respondents in **Sample 1** indicated skills shortages in the investment areas as well, including asset management and property investment.

Respondents in **Sample 2** indicated that skills shortages exist in the areas of property development, property finance and property management. This is consistent with responses received from the respondents in **Sample 1**. Communication skills were also indicated as an area where there is a shortage of skill by respondents in **Sample 2**.

Responses from respondents in both sample groups indicated that a BSc in Property Studies is a suitable qualification to hold to be able to work in the areas of general property management, property portfolio management, property trading and developing, property finance and property broking. However, a postgraduate property qualification seems to be required in order to be able to progress within the organisation.

The skills base in the property industry appears to have changed has changed over the last ten years. It would seem that people have not kept up to date with technology, such as green building issues and a range of new skills is required. A possible future solution means that generalists as opposed to specialists are necessary, but having said that, very particular skills in the areas of property finance and capital markets do also seem to be needed, particularly by those respondents working in the area of asset management. The lack of practical skills of graduates also seems to be an issue as does the apparent lack of transformation within some organisations.

Respondents in both sample groups indicated that graduates lack practical skills when entering the work environment. There also seems to be too great a focus on construction subjects and graduates would appreciate the degree programme being suitable for the purposes of the academic requirements to becoming a registered valuer.

An increased focus on property finance and property investment is also required, but once again these comments were made by those respondents working in the area of asset management. What is extremely interesting to note, is that no comments were received recommending a complete amendment or overhaul of undergraduate property studies education.

An analysis of the responses received from the respondents in **Sample 1** reveals that 33% of respondents and 47% of respondents were of the opinion that graduates require a moderate level of knowledge and good level of knowledge respectively of law as a broad subject area. Law is therefore an important broad subject area that requires focus in the property studies degree.

Forty seven percent and 40% of respondents were of the opinion that graduates require a good level of knowledge and an excellent level of knowledge respectively of the broad subject area of finance, although this result is influenced by the respondents working in the area of asset management. Finance is therefore an important broad subject area that requires focus in the property studies degree.

Sixty percent and 33% of respondents were of the opinion that graduates require a minimum level of knowledge and a moderate level of knowledge respectively of the broad subject area of statistics. Statistics does therefore appear not to be an important broad subject area that requires focus in the property studies degree.

Sixty seven percent and 20% of respondents were of the opinion that graduates require a good level of knowledge and an excellent level of knowledge respectively of the broad subject area of economics. Economics is therefore an important broad subject area that requires focus in the property studies degree.

Twenty seven percent and 59% of respondents were of the opinion that graduates require a moderate level of knowledge and a good level of knowledge respectively of the broad subject area of accounting. Accounting is therefore an important broad subject area that requires focus in the property studies degree.

Environmental issues and management principles were also identified as being important knowledge areas to be included in the property studies degree.

An analysis of the responses received from the respondents in **Sample 2** reveals that 44% of respondents and 39% of respondents were of the opinion that graduates require a good level of knowledge and an excellent level of knowledge respectively of the broad subject area of law. Law is therefore an important broad subject area that requires focus in the property studies degree.

Thirty nine percent and 50% of respondents were of the opinion that graduates require a good level of knowledge and an excellent level of knowledge respectively of the broad subject area of finance. Although a similar result was received from **Sample 1**, it is important to note that a very small percentage of respondents in **Sample 2** work in the area of asset management. This would seem to indicate that regardless of the area in which a graduate is employed, finance is therefore an important broad subject area that requires focus in the property studies degree.

Thirty nine percent and 55% of respondents were of the opinion that graduates require a minimum level of knowledge and a moderate level of knowledge respectively of the broad subject area of statistics.

Statistics does therefore appear not to be an important broad subject area that requires focus in the property studies degree according to respondents.

Thirty six percent and 64% of respondents were of the opinion that graduates require a good level of knowledge and an excellent level of knowledge respectively of the broad subject area of economics. Economics is therefore an important broad subject area that requires focus in the property studies degree.

Thirty nine percent and 28% of respondents were of the opinion that graduates require a moderate level of knowledge and a good level of knowledge respectively of the broad subject area of accounting. Twenty eight percent of respondents were also of the opinion that graduates require a minimum level of knowledge of accounting. Based upon the overall responses from this sample group, accounting is an important broad subject area that requires focus in the property studies degree.

**Sample 2** did not identify any other broad subject areas requiring focus in the property studies degree.

Overall, it would appear that the responses of both sample groups tend to suggest that the broad subject areas that should comprise the core of an undergraduate property degree accords with the views of Black et al. (1996). The responses of both groups overall also tends to suggest that the undergraduate property degree requires a finance and investment focus, similar to views advanced by Weeks and Finch (2003). In addition to real estate courses, various commentators state that real estate professionals also need to develop general management skills and knowledge (Galuppo and Worzala, 2004; Manning and Epley, 2006; Hefferan and Ross, 2010). The responses of the respondents in **Sample 1** suggest that this sample group agrees that graduates do need management skills and knowledge.

## **CHAPTER 5: CONCLUSIONS**

This chapter presents an overview of the research that was undertaken as well as the research findings, recommendations, evaluation of the research approach, problems experienced undertaking the research study and possibilities for further research.

### ***5.1 Overview of research***

The undergraduate property studies degree offered by CEM at Wits was identified as the case study to test the perceptions of both an employer group as well as a graduate group as to whether or not the current curriculum of the undergraduate property studies degree offered by CEM at Wits meets the knowledge requirements of the property industry.

A thorough and detailed literature review was undertaken. Information was gathered from various sources including academic textbooks, academic journals, various articles and the internet. This included a review and comparison of the existing curriculum outlines of the undergraduate property studies degrees of Wits, UCT and UP. The literature review was necessary in order to gain an in depth understanding of the research previously undertaken. The literature review also informed the questions that were posed to potential respondents of the survey that was undertaken.

This study is primarily qualitative using a case study approach. The undergraduate property studies degree offered by CEM at Wits was identified as the case study and the curriculum of the degree as the unit of analysis. As part of the research study was to determine the link between employers and the development of the curriculum, a case study approach was decided upon.

As the primary objectives of this research study were to find out from senior managers in the property industry and as well as recent graduates what skills and knowledge graduates of a property studies programme require, it was decided that the best method to meet these objectives was through the use of questionnaires.

The questionnaire was emailed to all potential respondents. A follow up telephone call was made to ensure that the questionnaire had been received and a further telephone call was made as a reminder to complete and return the questionnaire. Responses from the two groups were compared in an attempt to determine if a trend emerged between the data collected from the two sample groups.

The data gathered from the surveys, current curriculums of the universities in South Africa offering an undergraduate property studies degree programme and literature review was compared to support any assumptions and conclusions. Qualitative inferences were drawn from the analysis of the data to test the strength of support for the research proposition.

## **5.2 Research findings**

The research findings are presented with regard to the objectives of the research study. The objectives of this research study were as follows:

- To define the concept of curriculum;
- To explore and examine the process to be followed in developing and re-developing a curriculum;
- To determine whether consensus exists regarding the real estate body of knowledge;
- To examine the current curriculum of the property studies degree offered by CEM at Wits; and
- To determine the extent to which the needs of the property industry are being met by the current curriculum of the property studies degree offered by CEM at Wits.

*Objective one: To define the concept of curriculum*

This research study met this objective. The purpose of this objective was to define the concept of curriculum. In terms of the literature that was reviewed, the concept of curriculum was defined. Based upon the literature, the view adopted in this research study was that the curriculum refers to the structure of the degree or, according to Kelly (1989), 'the total programme'.

The 'total programme' would encompass the courses that students would be required to complete as well as any extra curricula activities that would be required. Any work place experience that students would undertake would form part of the curriculum.

*Objective two: To explore the process to be followed in developing and re-developing a curriculum*

This research study met this objective. The purpose of this objective was to explore the process to be followed in developing and re-developing a curriculum. The various approaches outlined in the literature were discussed and reviewed. Carl (2002) provides a useful overview of these approaches, namely; the academic approach, the experiential approach, the technological approach and the pragmatic approach. The naturalistic model of Decker Walker, being a model that accords with the pragmatic approach, was identified as being the most suitable approach for the purpose of curriculum development. This process requires the involvement and interaction of all who are party to the development of the curriculum and principles from the other three approaches are utilised in this approach. Discussion and negotiation between all those involved in the curriculum development process is required before consensus on the curriculum is achieved. This is the approach that was adopted by CEM and is discussed in more detail within the following objective.

The curriculum development models identified and debated in this research study can also be utilised when re-developing a curriculum. The application of Walker's naturalistic model advanced by Butler and Ensor (1994) was utilised by CEM. According to Butler and Ensor (1994), Walker's model is applied as follows:

- Platform stage – at this stage people's opinions and insights are communicated openly between all those participating in the curriculum development process. One of the objectives of the platform stage is to identify the areas of agreement and disagreement between all those participating in the process.
- Deliberation stage – during this stage, the areas of disagreement identified in the platform stage are re-visited and workable solutions are identified that all participants are satisfied with.

- Design stage – this stage encompasses the process that will be used to complete the development of the curriculum.

*Objective three: To determine whether consensus exists regarding the real estate body of knowledge*

This research study met this objective. The purpose of this objective was to determine whether consensus exists regarding the real estate body of knowledge.

As suggested by the literature, there appears to be a lack of consensus as to what constitutes the real estate body of knowledge (Wells and Williams, 1993; Weeks and Finch, 2003; Black and Rabianski, 2003; Galuppo and Worzala, 2004; Baxter, 2007). A cohesive body of knowledge that has achieved consensus amongst real estate academia has not emerged. Black et al. (1996) do emphasise that consensus regarding the body of knowledge is not required for an area of study to be considered an academic discipline

The literature does identify certain core courses that should form the foundation of an undergraduate property degree. Black et al. (1996) indicate that a property course should cover certain environments. The broad knowledge areas, according to Black et al. (1996) that would be included in courses that cover each environment are summarised as follows:

- Market environment – market analysis and valuation;
- Financial environment – mechanics of finance, including the time value of money, types of mortgage instruments and the analysis of debt and equity investments;
- Legal and public policy environment – regulatory aspects of government involvement in real estate operations, role of public institutions in the operation of real estate markets and the decision processes of public entities; and
- Physical and development environment – land resources, site development, design, engineering, management, developmental processes and environmental impact.



Weeks and Finch (2003) state that universities or colleges in the US that offer real estate as a major contain courses in 'Real Estate Principles, Real Estate Finance, Real Estate Property Appraisal and Valuation, Real Estate Law and Real Estate Investments'.

This range of real estate courses demonstrates the fact the real estate is a 'multidisciplinary' field and that students need to be exposed to all of these subject areas as well as 'Urban Land Economics, Real Estate Development, Secondary Mortgage Markets and Real Estate Asset Management' (Galuppo and Worzala, 2004). In addition to real estate courses, various commentators state that real estate professionals also need to develop general management skills and knowledge (Galuppo and Worzala, 2004; Manning and Epley, 2006; Hefferan and Ross, 2010).

The faculty or school where a property programme is housed will also impact upon the focus of the degree. Programmes in the US have a finance and investment focus and tend to be housed in a business school or a business of finance faculty or department (Wells and Williams, 1993; Weeks and Finch, 2003; Black and Rabianski, 2003; Galuppo and Worzala, 2004; Baxter, 2007), whereas programmes in the United Kingdom tend to be housed in the area of the built environment and programmes in other parts of Europe focus on construction, technology and engineering (Black and Rabianski, 2003). In South Africa, property studies programmes are housed in the built environment and have a strong construction bias which reflects the Eurocentric influences on our universities in South Africa.

Property studies is a new academic discipline in South Africa, with an undergraduate degree in property studies only being introduced in 2000 (Cloete, 2002). The curriculum of the property studies degrees offered by Wits, UCT and UP will require revision over time as these degrees look to find their own identity.

*Objective four: To examine the current curriculum of the property studies degree offered by CEM at Wits*

This research study met this objective. The purpose of this objective was to examine the current curriculum of the property studies degree offered by CEM at Wits. The property studies degree at Wits is a BSc degree and therefore must comply with the requirements of such a degree regarding the weighting of each subject type that is offered in the degree. In other words, a certain minimum number of subjects classified as science subjects must be offered in a BSc degree. As a result, any amendments to the property studies degree must occur within these boundaries.

*Application of Walker's naturalistic model in CEM*

CEM conducted an initial workshop (platform stage) with academic staff at the commencement of the process to re-develop the curriculum for all the undergraduate degrees offered by CEM; namely, quantity surveying, construction management and property studies. The purpose of this initial meeting was to share information and allow participants to provide their views and opinions. Areas of agreement and disagreement were identified. Numerous meetings were held after the initial workshop where problem areas were re-visited and solutions were identified until all participants were satisfied (deliberation stage). The survey of the graduate and employer groups allowed for the collection of data and assisted with the process to finalise the development of the suggested curriculum (design stage).

*Objective five: To determine the extent to which the needs of the property industry are being met by the current curriculum of the property studies degree offered by CEM at Wits*

This research study met this objective. The purpose of this objective was to determine the extent to which the needs of the property industry are being met by the current curriculum of the property studies degree offered by CEM at Wits. The literature reviewed demonstrated that in order to keep up with the changes in the environment and the demands made by industry, it is necessary for academic programmes geared towards preparing property professionals to be reviewed and amended in order to remain relevant and to provide for the property industry of the future (Wells and Williams, 1993; Baxter, 2007; Manning and Epley, 2006).

The literature reviewed has also demonstrated that a major challenge for property academics is to determine what the real estate or property body of knowledge consists of (Black and Rabianski, 2003; Epley, 1996; Baxter, 2007).

Employers play an important role in providing input into the development of curriculum over time (Wells and Williams, 1993; Manning, 2002; Baxter, 2007). It is therefore necessary to interact with the future employers of graduates in order to determine whether or not the curriculum that is currently being offered does indeed reflect the skills and knowledge requirements of the particular industry.

The current curriculum of the property studies programme at Wits does contain general real estate or property courses, such as valuations, property economics and property marketing and management. However, given the home (CEM) of the property studies programme at Wits, the curriculum of the programme does also have a strong bias towards construction and quantity surveying subject matter.

Although none of the respondents in either of the two sample groups recommended a complete amendment or overhaul of undergraduate property studies education, it was clear that there are certain areas that graduates require more knowledge of and that graduates lack practical skills when entering the work environment. The responses received from respondents in both sample groups indicated that there is too much focus on construction subjects in the current curriculum. It was noted that an increased focus in the areas of property finance, property investment, asset management and property portfolio management is required. Graduates would appreciate the degree programme being suitable for the purposes of the academic requirements to becoming a registered valuer.

It is also apparent that graduates require knowledge in the area of general management. Softer skills, such as negotiation skills were also identified as a skill, as opposed to a knowledge area, that graduates require exposure to.

Subjects such as statistics appear to have little importance according to respondents, however, it was felt that statistics is important to include in the curriculum to allow students to understand issues around research methodology.

Respondents in both samples were of the view that the property industry should introduce an internship programme to integrate knowledge learned at university with the practical skills required in the work environment.

The major advantage, based upon the responses received from both sample groups, would seem to be that an internship programme will allow students to integrate the theoretical concepts learned at university with the practical skills required in the work environment.

The major disadvantage, based upon the responses received from both sample groups, would seem to be that an internship programme may be difficult to implement if organisations are not willing to implement such a programme and if people within those organisations are not willing to act as mentors to students. In addition, graduates may not be able to make a significant contribution to justify the internship programme.

Results of this suggest that the current undergraduate property studies degree does not meet the needs of the property industry and the curriculum requires revision to allow the inclusion of additional knowledge areas.

#### *Proposition of the research study*

The proposition of such a research study would then be:

The view of the property industry is that the curriculum of the undergraduate property studies degree in the CEM at Wits does not currently address the knowledge requirements of the property industry.

This research study has clearly demonstrated that the current curriculum of the property studies degree does not in fact address the knowledge requirements of the property industry and therefore accords with the research proposition.

### **5.3 Benefits of findings**

The major benefit of the findings of this research study is that the opinions and perceptions of employers and graduates were utilised to suggest amendments to the curriculum of the undergraduate property studies degree.

Therefore, the amendments suggested to the curriculum of the undergraduate property studies degree was based not only on the opinions and perceptions of the academic staff involved in the programme, but also those of the employer and graduate groups who participated in this research study. A further benefit is that this research study has possibly provided the basis for future curriculum development, not only at Wits, but also at other universities in South Africa that offer the undergraduate property studies degree. This research study has also provided a platform for dialogue not only within CEM, but also with potential employers who employ the graduates produced by CEM at Wits.

### **5.4 Recommendations**

The current curriculum of the undergraduate property studies degree at Wits is not meeting the needs of the property industry in South Africa. Based upon the results of this study, it is proposed that the property studies curriculum be amended as follows (only significant changes are indicated):

#### First year of study

In the first year of study, Applied Mathematics is dropped from the curriculum, but Mathematics is retained. Although one of the findings of the research study was that Statistics was indicated as a subject that graduates do not require knowledge of, CEM was of the opinion that students do require some exposure to Statistics as this would assist with research methodology in the final year of study. Professional Practice I is added to allow students to gain practical work experience. Economics I is moved from the second year of study to the first year of study. A course in Environmental Science is added to provide students with exposure to environmental issues.

### Second year of study

In the second year of study, a new course entitled An Introduction to Property Development and Finance is added. This course will give students exposure to the property development and finance environment as was suggested by the research study. Property Valuation I is moved from the third year of study to the second year of study. This course will however focus on residential property valuations. Professional Practice II is added to the curriculum to allow students to gain additional practical work experience. Economics II is also added to improve students' knowledge of economics. Introduction to Land Management and Environmental Planning is added to the curriculum to give students exposure to these issues. Civil Engineering in Relation to Planning is dropped from the curriculum.

### Third year of study

In the third year of study, Property Valuation II is added. This is a new course that will focus on income producing property valuations. Law on Property Valuation is also added as a new course. These new courses will allow students to improve their knowledge in the valuations area and may allow CEM to have the property studies degree accredited as a suitable academic qualification which would allow students to register as a valuer. Property Marketing and Management is moved from the fourth year of study to the third year of study. A course in Construction Law is also added to the curriculum to provide students with exposure to legal issues in construction.

### Fourth year of study

In the fourth year of study, a course in Facilities Management is added to expose students to this knowledge area. Corporate Property Finance is a new course that is also added and will focus primarily on corporate and property finance issues. Property Valuation III is also a new course that is added. This course will focus on the valuation of special properties. Construction Law II is added to the curriculum which will build on concepts learned in Construction Law I and will also include topics relating to Property Law. Professional Practice III is also added to the curriculum and will ensure that students gain on-going practical work experience. Property Finance and Investment is retained as this course focuses on the important areas of property finance and investment as identified in this research study.

A summary of the most significant proposed changes to the curriculum reveals:

1. An increased focus on economics with the inclusion of Economics II in the second year of study;
2. The introduction of a new course in property development and finance, namely, An Introduction to Property Development and Finance in second year and Corporate Property Finance in fourth year. These courses will complement the existing Property Finance and Investment course;
3. Re-organisation of the valuations courses and the addition of two further courses in valuations. The new curriculum now offers students Valuations I, II and III (second, third and fourth year of study) and covers the full spectrum of valuation topics, including residential, income producing, special property and statutory valuations;
4. The introduction of Law on Property Valuations as well as Construction Law I and II. These courses will focus on legal issues relating to property valuations, construction as well as property law; and
5. The introduction of practical work place experience with the inclusion of Professional Practice I, II and III. It is envisaged that these courses would give students exposure to the workplace. This is not the same as an internship programme, but does move closer to providing students with practical work experience before they enter the work environment. It may take some time until a complete internship programme can be introduced as suggested by Callanan and McCarthy (2003). Employers will need to fully commit to such a programme before it can be implemented by any university.

It is suggested that certain elective subjects may also be introduced into the curriculum in future. These subjects could include general management, negotiation skills, property portfolio management and asset management. The question to be debated is whether or not these subjects or skills should be included in the curriculum at all, either as a core or as an elective subject.

It may be possible to incorporate management and negotiation skills as part of a future internship programme where students would have to complete a research assignment for which they would receive academic credit.

The core subjects in the area of quantity surveying and construction of the property studies degree are common to all three degrees offered by CEM; namely, quantity surveying, construction management and property studies. This is similar to the approach outlined by Baxter (2007) at RMIT in Melbourne, Australia.

The proposed new curriculum focuses more on finance, valuations and economics and less on the quantity surveying and construction type courses, which the current curriculum contains. The inclusion of the additional courses reflects the results of the research undertaken.

The curriculum that is proposed as a result of this research study that was undertaken will allow students to be exposed to the knowledge areas that the property industry has highlighted as being important in a property studies degree programme.

It has been demonstrated in this research study that there are certain subject areas that should be removed from the curriculum and other subject areas that need to be included in the curriculum. These suggestions are summarised in Appendix B.

### ***5.5 Evaluation of the research approach undertaken***

The research study was able to meet all of its objectives. The literature review was detailed and thorough and canvassed all the relevant literature. Notwithstanding the fact that the research study is viewed as a worthy study, it was identified that it would have been possible to improve the research study as follows:

- The sample size of the employer group could have been larger. Only those people who attended the 2008 SAPOA Convention were considered as members of the sample group. The graduate group could not have been expanded as this group consisted of all graduates who graduated between 2005 and 2009. However, although all graduates were considered for the survey, only 45 people have graduated with a BSc degree in Property Studies from Wits.



Although this represents the total population of graduates, it is a small number of graduates and a larger sample size over time may yield different results.

- It may have been beneficial to survey the graduates of the property studies degree programmes from UCT and UP. This would have allowed a comparison between the graduates of the three different universities to see if any differences in opinion exist between these graduates.
- It may also have been beneficial to the research study to identify which employers have employed a graduate from Wits and to determine if this would have yielded any different research findings.

### ***5.6 Problems experienced undertaking the research study***

The problems experienced during the course of research study include:

- The total population of potential employers of property studies graduates in South Africa is small. In addition, there is no central database of employers in the real estate environment so it is impossible to compile a complete list of potential employers.
- The membership of SAPOA represents a large percentage of the corporate real industry in South Africa. Many of the smaller employers such as developers, construction companies and property management companies may not be members of SAPOA and it is therefore difficult to identify these employers. Likewise, the membership of SAPOA may have particular bias due to the size of the organisations that are SAPOA members.
- There is a dearth of relevant South African literature related to the research study. The majority of the relevant literature emanates out of the United States, Europe, Australia and New Zealand. There may be particular bias due to the geographic location of the academics conducting the study as well as the participants of the study.

### **5.7 Possibilities for further research**

This research study has provided the following research opportunities:

- One of the limitations of this study was the relative small sample size of the graduate group. A research study that includes graduates of property studies degree programmes from Wits, UCT and UP may provide useful insight regarding the opinions and experiences of these graduates from different universities. This would increase the size of the sample and would allow for a detailed statistical analysis of results, as opposed to qualitative analysis.
- A research study that compares the needs and requirements of larger and smaller employer companies in terms of the knowledge and skills required of graduates that are employed may ensure greater reliability and validity of research results. In addition, such a study would allow one to determine if the knowledge and skills requirements of employers of differing sizes would impact upon the development of the curriculum. The sample size would also be increased and would allow for a detailed statistical analysis of results, as opposed to qualitative analysis.
- An international research study that compares the opinions and perceptions of employers and graduates in different parts of the world. This would also allow the researcher to determine how this may impact upon future curriculum development.

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**APPENDIX A - Survey of selected degrees offered by twenty two universities accredited by the CHE**

Note: This list may not be comprehensive and reflects only programmes visible on the individual institution's website.

University	Website reference	Quantity Surveying	Construction Management	Civil Engineering	Town/Urban Planning	Property Studies
<b>Cape Peninsula University of Technology</b>	<a href="http://www.cput.ac.za/">http://www.cput.ac.za/</a>	BTech: Quantity Surveying	National Diploma: Building  BTech: Construction Management	National Diploma: Engineering: Civil  BTech: Engineering: Civil	NONE	NONE
<b>Central University of Technology</b>  (former Technikon Free State and Vista University's Welkom campus)	<a href="http://cut.ac.za/">http://cut.ac.za/</a>	B. Tech: Quantity Surveying	N. Dip: Building  B. Tech: Construction Management	N. Dip. / B.Tech: Civil Engineering  M. Tech.: Civil Engineering  D. Tech.: Civil Engineering	NONE	NONE
<b>Durban University of Technology</b>	<a href="http://dut.ac.za/">http://dut.ac.za/</a>	B TECH (Quantity Surveying)  M TECH (Quantity Surveying)	ND : (Building)  B TECH (Construction Management)  M TECH (Construction Management)	National Diploma: Engineering : Civil  Bachelor of Technology : Engineering : Civil	National Diploma: Town & Regional Planning  Bachelor of Technology: Town & Regional Planning	NONE
<b>Nelson Mandela Metropolitan University</b>	<a href="http://www.nmmu.ac.za/">http://www.nmmu.ac.za/</a>	BTech (Quantity Surveying)  Mtech Quantity Surveying  BSc (Construction Economics) is followed by the BSc Honours Quantity Surveying	NDip Building (Extended Curriculum – 4 years)  NDip Building – 3 years  BTech Construction Management  MTech Construction Management  BSc Construction Economics  BSc Honours Construction  Postgraduate Diploma in the Built Environment	NDip Civil Engineering  BTech Civil  Engineering  Disciplines: Environmental Engineering  Urban Engineering		

<b>North West University</b>	<a href="http://www.nwu.ac.za/">http://www.nwu.ac.za/</a>	NONE	NONE	NONE	NONE	NONE
<b>Rhodes University</b>	<a href="http://www.ru.ac.za/">http://www.ru.ac.za/</a>	NONE	NONE	NONE	NONE	NONE
<b>Stellenbosch University</b>	<a href="http://www.sun.ac.za/">http://www.sun.ac.za/</a>	NONE	NONE	BEng (Civil)*	NONE	NONE
<b>Tshwane University of Technology</b>	<a href="http://www.tut.ac.za/">http://www.tut.ac.za/</a>	Bachelor's Degree: Quantity Surveying	National Diploma: Building  Bachelor's Degree: Construction Management	B Tech: Civil	NONE	NONE
<b>University of Cape Town</b>	<a href="http://www.uct.ac.za/">http://www.uct.ac.za/</a>	BSc in Quantity Surveying (Honours)	BSc Construction Studies (Honours)	Bachelor of Science (Eng) in Civil Engineering	NONE	Bachelor of Science in Property Studies (Honours)  Postgraduate Diploma in Property Studies
<b>University of Fort Hare</b>	<a href="http://www.ufh.ac.za/">http://www.ufh.ac.za/</a>	NONE	NONE	NONE	NONE	NONE
<b>University of Johannesburg</b>	<a href="http://www.uj.ac.za/">http://www.uj.ac.za/</a>	BTech: Quantity Surveying	Extended Programme for NDip: Building  BTech: Construction Management	NDip: Building NDip: Engineering: Civil  BTech: Engineering: Civil  BIng: Civil Engineering  Extended Programme BIng: Civil Engineering Science	NDip: Town and Regional Planning BTech: Town and Regional Planning	NONE
<b>University of Kwazulu Natal</b>	<a href="http://www.ukzn.ac.za/Homepage.aspx">http://www.ukzn.ac.za/Homepage.aspx</a>	BSc Property Development Honours – Quantity Surveying	BSc Property Development Honours – Construction Management	BSc Engineering	NONE	BSc Property Development
<b>University of Limpopo</b>	<a href="http://www.ul.ac.za/">http://www.ul.ac.za/</a>	NONE	NONE	NONE	NONE	NONE
<b>University of Pretoria</b>	<a href="http://web.up.ac.za/">http://web.up.ac.za/</a>	BSc QS	BSc Construction Management	BEng (Civil)	B&TRP (Town & regional planning)	BSc Real Estate
<b>University of South Africa</b>	<a href="http://www.unisa.ac.za/">http://www.unisa.ac.za/</a>	NONE	NONE	National Diploma (Engineering (Civil) (NDECI)	NONE	NONE

<b>University of the Free State</b>	<a href="http://www.ufs.ac.za/">http://www.ufs.ac.za/</a>	Bachelor of Science Learning area (Quantity Surveying) (Residential) Bachelor of Science Honores Learning area Quantity Surveying (Residential)	Bachelor of Science Learning area (Construction Management) (Residential) Diploma in Construction Science and Building Surveying (Diploma C.S.B.S.) Bachelor of Science Honores Learning area Construction Management (Residential)	NONE	Baccalaureus in Spatial Planning Honores.	Bachelor of Science (Land and Property Development Management) (Residential) Baccalaureus in Land and Property Development Management
<b>University of the Western Cape</b>	<a href="http://www.uwc.ac.za/">http://www.uwc.ac.za/</a>	NONE	NONE	NONE	NONE	NONE
<b>University of the Witwatersrand</b>	<a href="http://web.wits.ac.za/">http://web.wits.ac.za/</a>	BSc in Quantity Surveying Studies BSc Honours in Quantity Surveying Studies	BSc in Construction Management Studies BSc Honours in Construction Management	Bachelor of Science in Civil and Environmental Engineering	Bachelor of Science in Urban and Regional Planning Honours follows	BSc in Property Studies
<b>University of Venda</b>	<a href="http://www.univen.ac.za/">http://www.univen.ac.za/</a>	NONE	NONE	NONE	Bachelor of Urban and Regional Planning Degree Hons. Planning	NONE
<b>Vaal University of Technology</b>	<a href="http://www.vut.ac.za/new/">http://www.vut.ac.za/new/</a>	NONE	NONE	NONE	NONE	NONE
<b>Walter Sisulu University</b>	<a href="http://www.wsu.ac.za/">http://www.wsu.ac.za/</a>	ND: Building (Extended Programme - QS)	ND: Building (Extended Programme)	National Diploma: Engineering: Civil B Tech: Engineering: Civil	NONE	NONE
<b>University of Zululand</b>	<a href="http://www.uzulu.ac.za/">http://www.uzulu.ac.za/</a>	NONE	NONE	NONE	B.A. Environmental Planning and Development B.Consumer Science (Extension and Rural Development),	NONE

**(Source: [www.cput.ac.za](http://www.cput.ac.za), [www.cut.ac.za](http://www.cut.ac.za), [www.dut.ac.za](http://www.dut.ac.za), [www.nmmu.ac.za](http://www.nmmu.ac.za), [www.nwu.ac.za](http://www.nwu.ac.za), [www.ru.ac.za](http://www.ru.ac.za), [www.sun.ac.za](http://www.sun.ac.za), [www.tut.ac.za](http://www.tut.ac.za), [www.uct.ac.za](http://www.uct.ac.za), [www.ufh.ac.za](http://www.ufh.ac.za), [www.uj.ac.za](http://www.uj.ac.za), [www.ukzn.ac.za](http://www.ukzn.ac.za), [www.ul.ac.za](http://www.ul.ac.za), [web.up.ac.za](http://web.up.ac.za), [www.unisa.ac.za](http://www.unisa.ac.za), [www.ufs.ac.za](http://www.ufs.ac.za), [www.uwc.ac.za](http://www.uwc.ac.za), [www.wits.ac.za](http://www.wits.ac.za), [www.univen.ac.za](http://www.univen.ac.za), [www.vut.ac.za](http://www.vut.ac.za), [www.wsu.ac.za](http://www.wsu.ac.za), [www.uzulu.ac.za](http://www.uzulu.ac.za))**

## APPENDIX B – Proposed New Curriculum

<u>OLD CURRICULUM</u>	<u>NEW CURRICULUM</u>	<u>SUBJECT AREA CLASSIFICATION</u>	<u>COMMENT ON THE NEW CURRICULUM</u>
<u>FIRST YEAR</u>			
Applied Mathematics	Mathematics	Science	Applied Mathematics is dropped from the curriculum.
Planning for Property Developers	Construction Technology I	Technology	Construction Planning and Design I split into two new courses.
Construction Planning and Design I	Construction Drawing	Technology	Construction Planning and Design I split into two new courses.
Theory and Practice of QS I	Measurement I	Economics	Theory and Practice of QS I renamed.
Mathematics	Economics I	Economics	Course moved from second year currently to first year.
	Professional Practice I	Management	New course added to allow students to gain practical work experience.
	Statistics	Science	New course added to give students exposure to statistics.
	Planning for Property Developers	Management	Existing course retained.
	Environmental Science	Science	New course added to give students exposure to environmental issues.
	Construction Materials	Science	New course added to give students exposure to construction materials.

<b><u>OLD CURRICULUM</u></b>	<b><u>NEW CURRICULUM</u></b>	<b><u>SUBJECT AREA CLASSIFICATION</u></b>	<b><u>COMMENT ON THE NEW CURRICULUM</u></b>
<b><u>SECOND YEAR</u></b>			
Business Accounting	Business Accounting	Economics	Existing course retained.
Construction Planning and Design II	Construction Technology II	Technology	Construction Planning and Design II split into two new courses.
Theory and Practice of QS II	Measurement II	Economics	Theory and Practice of QS II renamed.
Building Science	An Introduction to Property Development and Finance	Economics	New course added to give students exposure to the Property Development and Finance environment.
Civil engineering in Relation to Planning	Intro to Land Mngt and Environmental Planning	Management	New course added to give students exposure to Land Management and Environmental issues. Civil Engineering course is dropped.
Economics I	Property Valuation 1 - Valuation principles and residential valuations	Economics	Existing course moved from third year currently, but content to focus specifically on residential valuations.
Commercial Law I	Commercial Law I	Law	Existing course retained.
	Professional Practice II	Management	New course added to allow students to gain practical work experience.
	Engineering Surveying	Technology	New course added to allow students to gain exposure to the principles of surveying.
	Building Science 1	Science	New course added to allow students to gain exposure to the principles of building science.
	Economics II	Economics	New course added to give students an improved knowledge of Economics.



<u>OLD CURRICULUM</u>	<u>NEW CURRICULUM</u>	<u>SUBJECT AREA CLASSIFICATION</u>	<u>COMMENT ON THE NEW CURRICULUM</u>
<b><u>THIRD YEAR</u></b>			
Industrial Organisation and Management	Management Principles in Construction	Management	Existing course renamed.
Construction Technology	Community Project	Management	New course added to allow students to gain exposure to community work and community issues.
Theory and Practice of QS III	Housing Theory Law and Practice	Management	New course added to allow students to gain exposure to legal issues in the housing environment.
Research Report	Research Methodology	Management	Existing course renamed.
Property Valuation	Property Valuation II - Income producing and special property valuations	Economics	New course added focussing on income producing property valuations.
Property Economics	Property Economics	Economics	Existing course retained.
Business Enterprise Law	Law on Property Valuation	Law	New course added to allow students to gain exposure to Property Valuation Law.
Mercantile Law	Property marketing and management	Management	Existing course moved from fourth year.
	Construction Law	Law	New course added to allow students to gain exposure to legal issues in construction.
	Estimating and analysis of prices	Economics	Existing course moved from fourth year.

<u>OLD CURRICULUM</u>	<u>NEW CURRICULUM</u>	<u>SUBJECT AREA CLASSIFICATION</u>	<u>COMMENT ON THE NEW CURRICULUM</u>
<b><u>FOURTH YEAR</u></b>			
Discourse	Treatise	Management	Existing course renamed.
Commercial Procedures	Construction Law II	Law	New course added to allow students to build on their knowledge gained in the Construction Law II course. Commercial Procedures dropped.
Introduction to Construction Project Management	Facilities management	Management	New course added to allow students to gain exposure to facilities management issues.
Estimating and Analysis of Prices	Corporate Property Finance	Economics	New course added to allow students to gain knowledge of corporate finance issues. Estimating course is dropped.
Property Finance and Investment	Property Finance and Investment	Economics	Existing course retained.
Cost evaluation and control	Cost evaluation and control	Economics	Existing course retained.
Property Marketing and Management	Property Valuation III	Economics	New course added to allow students to build on their knowledge gained in Property Valuation I and II. This course will focus on special valuations.
	Professional Practice III	Management	New course added to allow students to gain practical work experience. Builds on Professional Practice I and II.
	Simulated project	Management	New course added which will allow students to complete an integrated, multi-disciplinary project.

## APPENDIX C – Research Questionnaire - Industry

### Research Questionnaire – Sample 1 – Industry Members

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#### **Purpose:**

The purpose of this research questionnaire is to survey senior management of large companies operating in the property industry in South Africa. The focus of the study is to investigate what knowledge and competence is required by the property industry in South Africa, of students who have completed their studies.

#### **Topic:**

***THE INFLUENCE OF THE PROPERTY INDUSTRY ON CURRICULUM DEVELOPMENT OF THE UNDERGRADUATE PROPERTY STUDIES DEGREE IN THE SCHOOL OF CONSTRUCTION ECONOMICS AND MANAGEMENT AT THE UNIVERSITY OF THE WITWATERSRAND***

#### **Instructions:**

- Please complete the entire questionnaire, i.e. all 15 questions.
- As an industry professional your opinion is relevant to this research project.
- Please read each question carefully and answer how you feel about the relevance of topics covered in academic real estate programmes in South Africa.
- Question formats vary, so please read the instruction for each individual question.
- The questionnaire should take approximately 20-25 minutes of your time to complete.

**Your input in this research project would be most valuable to industry needs –  
thanking you in advance for your participation!**

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**Section 1: Tuition**

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**Questions:**

**1. Which sector of the property industry do you represent?**

**Instruction:** Tick the appropriate answer in the space provided below:

Property Management	<input type="checkbox"/>	Asset Management	<input type="checkbox"/>
Institutional property owner	<input type="checkbox"/>	Property Management/ Broking	<input type="checkbox"/>
Listed Property Sector Company	<input type="checkbox"/>	Public Sector Institution	
Property Institution	<input type="checkbox"/>	Other: _____	<input type="checkbox"/>

**2. What level of knowledge does a real estate graduate need to have of each of the following subject areas?**

**Instruction:** Assign the appropriate ranking in the designated box next to each subject, as per the ranking scale indicated below:

Knowledge required	Rank	Meaning
No knowledge required	1	The graduate does not require any knowledge in this subject area to be competent in the work environment.
Minimum (below average) knowledge required	2	The graduate requires a minimum or below average level of knowledge in this subject area and should still be able to execute work related tasks adequately. It is however not essential or necessary for the graduate to have knowledge in this area.
Moderate (average) knowledge required	3	The graduate requires a moderate or average level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have some knowledge in this area.

Good (above average) knowledge required	4	The graduate must have a good or above average level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have an above average level of knowledge in this subject area.
Excellent (complete) knowledge required	5	The graduate must have an excellent or complete level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have an excellent or complete level of knowledge in this subject area.

**For Example:** A person entering the advertising industry would require excellent knowledge of **MARKETING** (5) but minimum knowledge of **FINANCE** (2).

- **Property Development**   
Principles of property development.
- **Property Investment**   
Principles of property investments, optimal property portfolio formulation, listed property sector and property development feasibility studies.
- **Property Law**   
Law relating to land & building: security, immovable property & arbitration and Company Law: companies close corporations & partnerships.
- **Property Economics**   
How property markets work, property investors, markets & management, types of property investments and construction techniques.
- **Property Valuation**   
Principles & application of property valuation, law relating to rating, expropriation and property valuation.
- **Property Finance**   
Application to property finance techniques, mathematics of finance, property investment decision-making and types of financial instruments.
- **Property Portfolio Management**   
Property as an investment class and the economic cycle, introduction to portfolio management, legal & tenant issues, case studies and outsourcing.

- **Basic Statistics**   
Data presentation, descriptive statistics and applied mathematics.
- **Advanced Statistics**   
Design of questionnaire, presenting results and statistical methods.
- **Property Environment**   
The general property environment, property taxation, entities used to own property, professionals in the property industry.
- **Property Planning**   
Town and regional planning theory, urban renewal and design & municipal requirements.
- **Property Marketing**   
Principles of marketing, pricing theory & practice, research, real estate agency and functions of a property manager.
- **Finance and Cost Management**   
Financial analysis techniques relating to property evaluation, such as NPV/IRR, accounting issues relating to property, property taxation, feasibility studies.
- **Introduction to Construction Project Management**   
Principles of project management, project management techniques and project management body of knowledge.
- **Project Management in Developing areas**   
Problems relating to the management of projects in developing areas.
- **Environmental Management**   
Relevant legislation, developing within the constraints imposed by environmental issues, impact assessments, green buildings.
- **Commercial and Industrial Law**   
General principles of contract, building contracts, industrial legislation.
- **Accounting**   
General principles of financial accounting, financial statement analysis, budgeting.
- **Urban Land Economics**   
Urban economics & problems, urban hierarchy, rent & urbanization process. Location theory.

- **Introduction to Facilities Management**

Principles, management of building services & maintenance and value management.

- **Advanced Facilities Management**

Space planning, outsourcing, service level agreements, benchmarking and post occupancy evaluations.

**3. Are there any additional subjects a graduate entering your organisation as a real estate professional requires, that are not mentioned in question 2 above? i.e. List any additional subject you think should be included in an undergraduate property studies degree.**

**List and Rank the subjects you think should be included in a degree to prepare graduates entering the real estate industry.**

**Instruction:** List the relevant subjects you think need to be added to the list in question 1 above, then rank each subject on a scale of 1-5 based on their relevance. Assign the appropriate ranking in the designated box next to each subject, as per the ranking scale indicated below:

Knowledge required	Rank	Meaning
No knowledge required	1	The graduate does not require any knowledge in this subject area to be competent in the work environment.
Minimum (below average) knowledge required	2	The graduate requires a minimum or below average level of knowledge in this subject area and should still be able to execute work related tasks adequately. It is however not essential or necessary for the graduate to have knowledge in this area.
Moderate (average) knowledge required	3	The graduate requires a moderate or average level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have some knowledge in this area.

Good (above average) knowledge required	4	The graduate must have a good or above average level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have an above average level of knowledge in this subject area.
Excellent (complete) knowledge required	5	The graduate must have an excellent or complete level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have an excellent or complete level of knowledge in this subject area.

**For Example:** A person entering the advertising industry would require excellent knowledge of **MARKETING (5)** but minimum knowledge of **FINANCE (2)**.

- \_\_\_\_\_
- \_\_\_\_\_
- \_\_\_\_\_
- \_\_\_\_\_
- \_\_\_\_\_
- \_\_\_\_\_
- \_\_\_\_\_



**4. What subject areas do you think graduates entering the real estate industry have POOR or insufficient knowledge of?  
What subjects do you think graduates entering the real estate industry have GOOD knowledge of?**

**Instruction:** You may refer to the descriptions provided in question 2 above for clarity.

Tick the appropriate box in the table below:

**NOTE:** “Poor Knowledge” is defined as being insufficient to be competent in a relevant or related work area. “Good Knowledge” is defined as having sufficient knowledge to be competent in a relevant or related work area.

<b>Knowledge of Graduates entering the real estate industry</b>	<b>POOR</b>	<b>GOOD</b>
• Property Development		
• Property Investment		
• Property Law		
• Property Economics		
• Property Valuation		
• Property Finance		
• Property Portfolio Management		
• Basic Statistics		
• Advanced Statistics		
• Property Environment		
• Property Planning		
• Property and Construction Marketing		
• Financial and Cost Management		
• Introduction to Construction Project Management		
• Project Management in Developing areas		
• Environmental Management		
• Commercial and Industrial Law		
• Accounting		

• Urban Land Economics		
• Introduction to Facilities Management		
• Advanced Facilities Management		

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**Section 2: Practical Skills**

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**5. Do you think graduates should complete an internship programme as part of their studies prior to entering the property industry in order to gain practical skills? The internship would be 6-12 months and would focus on integrating knowledge learned at university with the practical skills required in the industry.**

**Instruction:** Tick only one of the answers below by marking the appropriate box.

**Yes**

**No**

**6. Do you think an internship programme should be in a specialised area or field of the property industry or should it cover as many areas of the property industry as possible?**

**Instruction:** Tick only one of the answers below by marking the appropriate box.

**Specialised Field**

**Cross Section of all Fields**

**7. Explain briefly what YOU think the disadvantages of such a programme are?**

<p>.....</p> <p>.....</p> <p>.....</p> <p>.....</p> <p>.....</p>
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**8. Explain briefly what YOU think the advantages of such a programme are?**

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**Section 3: Manager's Perspective**

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**9. With regard to the graduates that your organisation has employed in the last 5 years, what positions are they currently employed in?**

**Instruction:** Please advise areas or fields and designations.

	<b><i>Area/Field</i></b>	<b><i>Designation</i></b>
<b><i>After 1 year</i></b>		
<b><i>After 2 years</i></b>		
<b><i>After 3 years</i></b>		
<b><i>After 4 years</i></b>		
<b><i>After 5 years</i></b>		

**10. In your opinion, in what area/s of the property industry does skills shortage exist? Please list.**

**Instruction:** List the areas of skills shortage in the table below.

<b>Areas of Skill Shortage:</b>	
<b>1.</b>	<b>2.</b>
<b>3.</b>	<b>4.</b>
<b>5.</b>	<b>6.</b>
<b>7.</b>	<b>8.</b>
<b>9.</b>	<b>10.</b>

**11. What qualifications do the directors of your organisation have? List the position/designation of the director (not the name) and his/her qualification.**

<b>Director Position/Designation</b>	<b>Qualification/s</b>
1.	
2.	
3.	
4.	
5.	
6.	
7.	
8.	
9.	
10.	

**12. What qualifications do you prefer graduates entering your organisation to hold and what positions would be suitable for these graduates to fill with such qualification?**

**Instruction:** You may tick more than one box from the options presented below:

Degree	<input type="checkbox"/>	Positions
Bsc (Property Studies)	<input type="checkbox"/>	
B.Com	<input type="checkbox"/>	
BSc (Quantity Surveying)	<input type="checkbox"/>	
BSc (Construction Management)	<input type="checkbox"/>	
BSc (Engineering)	<input type="checkbox"/>	
Post Graduate Diploma (Property Development and Management) or MSc (Building) or MSc (Property Development)	<input type="checkbox"/>	
Other:	<input type="checkbox"/>	

**13. Has the skills base (as opposed to knowledge) required in the property industry changed over the last 10 years? Briefly explain how and why this is so in your opinion.**

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**14. What advice would you offer for the improvement of undergraduate property studies education in South Africa?**

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**15. In your opinion, what level of knowledge do graduates require of the following broad knowledge areas?**

**Instruction:** Rank each subject according to their level of relevance in a property study curriculum. Assign the appropriate ranking in the designated box next to each subject, as per the ranking scale indicated below:

Knowledge required	Rank	Meaning
No knowledge required	1	The graduate does not require any knowledge in this subject area to be competent in the work environment.
Minimum (below average) knowledge required	2	The graduate requires a minimum or below average level of knowledge in this subject area and should still be able to execute work related tasks adequately. It is however not essential or necessary for the graduate to have knowledge in this area.
Moderate (average) knowledge required	3	The graduate requires a moderate or average level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have some knowledge in this area.
Good (above average) knowledge required	4	The graduate must have a good or above average level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have an above average level of knowledge in this subject area.

Excellent (complete) knowledge required	5	The graduate must have an excellent or complete level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have an excellent or complete level of knowledge in this subject area.
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**For Example:** For a person doing an advertising course, MARKETING (5) is absolutely imperative, while FINANCE (2) may have minimal relevance.

Subject	Ranking
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Law	<input type="text"/>
Finance	<input type="text"/>
Statistics	<input type="text"/>
Economics	<input type="text"/>
Accounting	<input type="text"/>
Other	<input type="text"/>
Other	<input type="text"/>

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Thank you once again for taking time to complete this questionnaire.

## APPENDIX D – Research Questionnaire – Graduate

### Research Questionnaire – Sample 2 – Graduates

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#### **Purpose:**

The purpose of this research questionnaire is to survey graduates of the property studies degree programme at Wits who are working in the property industry in South Africa. The focus of the study is to investigate what knowledge and competence is required by the property industry in South Africa, of students who have completed their studies.

#### **Topic:**

***THE INFLUENCE OF THE PROPERTY INDUSTRY ON CURRICULUM DEVELOPMENT OF THE UNDERGRADUATE PROPERTY STUDIES DEGREE IN THE SCHOOL OF CONSTRUCTION ECONOMICS AND MANAGEMENT AT THE UNIVERSITY OF THE WITWATERSRAND***

#### **Instructions:**

- Please complete the entire questionnaire, i.e. all 15 questions.
- As an industry professional your opinion is relevant to this research project.
- Please read each question carefully and answer how you feel about the relevance of topics covered in academic real estate programmes in South Africa.
- Question formats vary, so please read the instruction for each individual question.
- The questionnaire should take approximately 20-25 minutes of your time to complete.

**Your input in this research project would be most valuable to industry needs –  
thanking you in advance for your participation!**

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**Section 1: Tuition**

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**Questions:**

**1. Which sector of the property industry do you currently represent?**

**Instruction:** Tick the appropriate answer in the space provided below:

<b>Property Management</b>	<input type="checkbox"/>	<b>Asset Management</b>	<input type="checkbox"/>
<b>Institutional property owner</b>	<input type="checkbox"/>	<b>Property Management/ Broking</b>	<input type="checkbox"/>
<b>Listed Property Sector Company</b>	<input type="checkbox"/>	<b>Public Sector Institution</b>	
<b>Property Institution</b>	<input type="checkbox"/>	<b>Other: _____</b>	<input type="checkbox"/>

**2. What level of knowledge does a real estate graduate need to have of each of the following subject areas?**

**Instruction:** Assign the appropriate ranking in the designated box next to each subject, as per the ranking scale indicated below:

Knowledge required	Rank	Meaning
No knowledge required	1	The graduate does not require any knowledge in this subject area to be competent in the work environment.
Minimum (below average) knowledge required	2	The graduate requires a minimum or below average level of knowledge in this subject area and should still be able to execute work related tasks adequately. It is however not essential or necessary for the graduate to have knowledge in this area.
Moderate (average) knowledge required	3	The graduate requires a moderate or average level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have some knowledge in this area.

Good (above average) knowledge required	4	The graduate must have a good or above average level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have an above average level of knowledge in this subject area.
Excellent (complete) knowledge required	5	The graduate must have an excellent or complete level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have an excellent or complete level of knowledge in this subject area.

**For Example:** A person entering the advertising industry would require excellent knowledge of MARKETING (5) but minimum knowledge of FINANCE (2).

- **Property Development**   
Principles of property development.
- **Property Investment**   
Principles of property investments, optimal property portfolio formulation, listed property sector and property development feasibility studies.
- **Property Law**   
Law relating to land & building: security, immovable property & arbitration and Company Law: companies close corporations & partnerships.
- **Property Economics**   
How property markets work, property investors, markets & management, types of property investments and construction techniques.
- **Property Valuation**   
Principles & application of property valuation, law relating to rating, expropriation and property valuation.
- **Property Finance**   
Application to property finance techniques, mathematics of finance, property investment decision-making and types of financial instruments.
- **Property Portfolio Management**   
Property as an investment class and the economic cycle, introduction to portfolio management, legal & tenant issues, case studies and outsourcing.
- **Basic Statistics**   
Data presentation, descriptive statistics and applied mathematics.

- **Advanced Statistics**   
 Design of questionnaire, presenting results and statistical methods.
- **Property Environment**   
 The general property environment, property taxation, entities used to own property, professionals in the property industry.
- **Property Planning**   
 Town and regional planning theory, urban renewal and design & municipal requirements.
- **Property Marketing**   
 Principles of marketing, pricing theory & practice, research, real estate agency and functions of a property manager.
- **Finance and Cost Management**   
 Financial analysis techniques relating to property evaluation, such as NPV/IRR, accounting issues relating to property, property taxation, feasibility studies.
- **Introduction to Construction Project Management**   
 Principles of project management, project management techniques and project management body of knowledge.
- **Project Management in Developing areas**   
 Problems relating to the management of projects in developing areas.
- **Environmental Management**   
 Relevant legislation, developing within the constraints imposed by environmental issues, impact assessments, green buildings.
- **Commercial and Industrial Law**   
 General principles of contract, building contracts, industrial legislation.
- **Accounting**   
 General principles of financial accounting, financial statement analysis, budgeting.
- **Urban Land Economics**   
 Urban economics & problems, urban hierarchy, rent & urbanization process. Location theory.
- **Introduction to Facilities Management**   
 Principles, management of building services & maintenance and value management.

- **Advanced Facilities Management**

Space planning, outsourcing, service level agreements, benchmarking and post occupancy evaluations.

**3. Are there any additional subjects a graduate entering your organisation as a real estate professional requires, that are not mentioned in question 2 above? i.e. List any additional subject you think should be included in an undergraduate property studies degree.**

**List and Rank the subjects you think should be included in a degree to prepare graduates entering the real estate industry.**

**Instruction:** List the relevant subjects you think need to be added to the list in question 1 above, and then rank each subject on a scale of 1-5 based on their relevance. Assign the appropriate ranking in the designated box next to each subject, as per the ranking scale indicated below:

Knowledge required	Rank	Meaning
No knowledge required	1	The graduate does not require any knowledge in this subject area to be competent in the work environment.
Minimum (below average) knowledge required	2	The graduate requires a minimum or below average level of knowledge in this subject area and should still be able to execute work related tasks adequately. It is however not essential or necessary for the graduate to have knowledge in this area.
Moderate (average) knowledge required	3	The graduate requires a moderate or average level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have some knowledge in this area.
Good (above average) knowledge required	4	The graduate must have a good or above average level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have an above average level of knowledge in this subject area.

Excellent (complete) knowledge required	5	The graduate must have an excellent or complete level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have an excellent or complete level of knowledge in this subject area.
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**For Example:** A person entering the advertising industry would require excellent knowledge of **MARKETING (5)** but minimum knowledge of **FINANCE (2)**.

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**4. What subject areas do you think graduates entering the real estate industry have POOR or insufficient knowledge of?**  
**What subjects do you think graduates entering the real estate industry have GOOD knowledge of?**

**Instruction:** You may refer to the descriptions provided in question 2 above for clarity.

Tick the appropriate box in the table below:

**NOTE:** “Poor Knowledge” is defined as being insufficient to be competent in a relevant or related work area. “Good Knowledge” is defined as having sufficient knowledge to be competent in a relevant or related work area.



<b>Knowledge of Graduates entering the real estate industry</b>	<b>POOR</b>	<b>GOOD</b>
• Property Development		
• Property Investment		
• Property Law		
• Property Economics		
• Property Valuation		
• Property Finance		
• Property Portfolio Management		
• Basic Statistics		
• Advanced Statistics		
• Property Environment		
• Property Planning		
• Property and Construction Marketing		
• Financial and Cost Management		
• Introduction to Construction Project Management		
• Project Management in Developing areas		
• Environmental Management		
• Commercial and Industrial Law		
• Accounting		
• Urban Land Economics		
• Introduction to Facilities Management		
• Advanced Facilities Management		

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**Section 2: Practical Skills**

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**5. Do you think graduates should complete an internship programme as part of their studies prior to entering the property industry in order to gain practical skills? The internship would be 6-12 months and would focus on integrating knowledge learned at university with the practical skills required in the industry.**

**Instruction:** Tick only one of the answers below by marking the appropriate box.

**Yes**

**No**

**6. Do you think an internship programme should be in a specialised area or field of the property industry or should it cover as many areas of the property industry as possible?**

**Instruction:** Tick only one of the answers below by marking the appropriate box.

**Specialised Field**

**Cross Section of all Fields**

**7. Explain briefly what YOU think the disadvantages of such a programme are?**

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**8. Explain briefly what YOU think the advantages of such a programme are?**

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**Section 3: Manager's Perspective**

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**9. With regard to the graduates that your organisation has employed in the last 5 years (including yourself), what positions are they currently employed in?**

**Instruction:** Please advise areas or fields and designations.

	<b><i>Area/Field</i></b>	<b><i>Designation</i></b>
<b><i>After 1 year</i></b>		
<b><i>After 2 years</i></b>		
<b><i>After 3 years</i></b>		
<b><i>After 4 years</i></b>		
<b><i>After 5 years</i></b>		

**10. In your opinion, in what area/s of the property industry does skills shortage exist? Please list.**

**Instruction:** List the areas of skills shortage in the table below.

<b>Areas of Skill Shortage:</b>	
<b>1.</b>	<b>2.</b>
<b>3.</b>	<b>4.</b>
<b>5.</b>	<b>6.</b>
<b>7.</b>	<b>8.</b>
<b>9.</b>	<b>10.</b>

**11. What qualifications do the directors of your organisation have? List the position/designation of the director (not the name) and his/her qualification.**

<b><i>Director Position/Designation</i></b>	<b><i>Qualification/s</i></b>
<b>1.</b>	
<b>2.</b>	
<b>3.</b>	
<b>4.</b>	
<b>5.</b>	
<b>6.</b>	
<b>7.</b>	
<b>8.</b>	
<b>9.</b>	
<b>10.</b>	

**12. What qualifications do your employers prefer graduates entering your organisation to hold and what positions do you think would be suitable for these graduates to fill with such qualification?**

**Instruction:** You may tick more than one box from the options presented below:

Degree	Positions
Bsc (Property Studies) <input type="checkbox"/>	_____
B.Com <input type="checkbox"/>	_____
BSc (Quantity Surveying) <input type="checkbox"/>	_____
BSc (Construction Management) <input type="checkbox"/>	_____
BSc (Engineering) <input type="checkbox"/>	_____
Post Graduate Diploma (Property Development and Management) or MSc (Building) or MSc (Property Development) <input type="checkbox"/>	_____
Other: <input type="checkbox"/>	_____

**13. Has the skills base (as opposed to knowledge) required in the property industry changed over the last 10 years? Briefly explain how and why this is so in your opinion.**

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You are not required to answer this question.

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**14. Taking into account your academic studies, what advice would you offer for the improvement of undergraduate property studies education in South Africa?**

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**15. In your opinion, what level of knowledge do graduates require of the following broad knowledge areas?**

**Instruction:** Rank each subject according to their level of relevance in a property study curriculum. Assign the appropriate ranking in the designated box next to each subject, as per the ranking scale indicated below:

Knowledge required	Rank	Meaning
No knowledge required	1	The graduate does not require any knowledge in this subject area to be competent in the work environment.
Minimum (below average) knowledge required	2	The graduate requires a minimum or below average level of knowledge in this subject area and should still be able to execute work related tasks adequately. It is however not essential or necessary for the graduate to have knowledge in this area.
Moderate (average) knowledge required	3	The graduate requires a moderate or average level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have some knowledge in this area.
Good (above average) knowledge required	4	The graduate must have a good or above average level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have an above average level of knowledge in this subject area.



Excellent (complete) knowledge required	5	The graduate must have an excellent or complete level of knowledge in this subject area to be competent in the work environment. It is essential or necessary for the graduate to have an excellent or complete level of knowledge in this subject area.
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**For Example:** For a person doing an advertising course, MARKETING (5) is absolutely imperative, while FINANCE (2) may have minimal relevance.

Subject	Ranking
Law	<input type="text"/>
Finance	<input type="text"/>
Statistics	<input type="text"/>
Economics	<input type="text"/>
Accounting	<input type="text"/>
Other	<input type="text"/>
Other	<input type="text"/>

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Thank you once again for taking time to complete this questionnaire.