

**Teacher educators' perspectives on
Pedagogical Content Knowledge for
secondary school Economics teaching**

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DECLARATION

I, the undersigned, hereby declare that the work contained in this dissertation is my own original work and that I have not previously in its entirety or in part submitted it at any university for a degree.

A handwritten signature in black ink, appearing to read 'Kruger', is centered on the page. The signature is written in a cursive style with a large initial 'K'.

Signature

Date: November 2017

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*This dissertation is dedicated to my loving parents Johannes and Petro Benadé whose love
and support knows no bounds*

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ABSTRACT

Learners do not perform well in the Economics examination in the annual National Senior Certificate examinations, which explains the decline in the number of learners who opt to do Economics as a school subject. One way of countering this, would be Economics teachers who are able to raise the level of learner performance. This challenges institutions involved in teacher education to develop high-calibre Economics teachers. Teacher educators, responsible for curriculum design and implementation of subject-specific methodology courses in subjects like Economics, are central to this enterprise, but little is known about these individuals and the rationale behind their selection of curriculum content.

This study explores the nature of the content included in Economics methodology modules, and teacher educators' reasons for including it. In the process, insight is provided into the profiles and perspectives of teacher educators as curriculum makers and shapers of future Economics teachers.

A qualitative methodology was employed for this study, situated in an idealist interpretive paradigm. Purposive sampling was used to select the participants, five teacher educators at research-intensive South African universities, who taught an Economics methodology module in the Post Graduate Certificate of Education programme. The data collection instrument was semi-structured interviews with teacher educators. Module outlines were also collected and analysed to determine the content prescribed for prospective Economics teachers.

An interpretivist phenomenological analysis (IPA) of the interviews helped to reveal the Economics teaching experiences of teacher educators. It seems that they are diverse, experienced individuals, convinced of their responsibility to model ideal teaching to their students. The three main themes that emerged from a synchronous analysis of the curriculum documents by means of qualitative content analysis are: the nature of the Economics methodology modules; the nature of delivery; and the theoretical influences that guided teacher educators in the compilation and teaching of the modules.

The results indicated that that South African school policy drives the selection of content for Economics methodology modules, and that a large portion of the modules focused on developing the general pedagogic competencies of prospective Economics teachers. The nature of delivery suggested an interactive, collaborative approach to the teaching of the

module. It seems that constructivism and socio-constructivism are the major theories that underpin the design and teaching of the modules.

The teacher educators in the study seem to be aware of the demands of teaching Economics in diverse South African school contexts, and are therefore committed to preparing prospective Economics teachers for these challenges. However, Economics teacher education does not seem to have a clear theoretical framework. This suggests that teacher educators need support and continuous professional development to help them redesign Economics methodology modules.

Keywords: Economics education, pedagogical content knowledge, pedagogy, PGCE, teacher education, teacher educators

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CHAPTER 1

BACKGROUND, PROBLEM STATEMENT AND MOTIVATION FOR THE STUDY

1.1 INTRODUCTION AND BACKGROUND

The literature on the state of education in South Africa presents strong evidence that education in South Africa is in crisis (Spaull, 2013:10; Commey, 2014:22; Rusznyak, 2014). One example is that recent figures show that only 48% of learners in public schools who begin grade 1 actually complete grade 12, and only 30.6% of the latter achieve the level of pass rate, termed a bachelor's pass, required for access to university (Rusznyak, 2014). These results reflect the poor quality of education in South Africa. The pass rate of full-time South African matriculants who wrote the National Senior Certificate (NSC) Examination in 2016 was 72.5%, an increase of 1.8% on the 2015 pass rate (DBE, 2017:50).

A particular reason for concern is that the number of learners who wrote the Economics examination paper declined by 9 734 from 165 642 in 2015 to 155 908 in 2016 (DBE 2017:50), a mere 25.5% of all learners who wrote the NSC examination. The number of learners enrolled for Economics, as well as the learners who pass the subject (in this instance at 40% and above), has been consistently low for the past five years. Those who pass Economics by obtaining 30% or more has decreased by 2.9%, and those who pass Economics by obtaining 40% and above decreased by 2.7% between 2015 and 2016 (DBE, 2017:52). This is part of the overall decline in the quality of learners' performance (DBE, 2017:55).

The percentage of learners who enrol for NSC Economics at the start of the year, but do not write the final NSC Economics Examination, has increased sharply in the last year, indicating that there is an urgent problem that needs to be addressed. Given the importance of Economic education in developing learners' critical awareness and making them aware of how to be responsible consumers, producers and citizens (OFSTED, 2008:19), it is vital for prospective Economics teachers to have effective teacher education.

A serious problem in education in South Africa is that schools seem unable to help the country's youth develop the necessary mindset and intellectual skills to build a modern state (Taylor, 2006:2; Spaull, 2013:7). Many years ago, Morrow (2007:7) pointed to the

deterioration in the quality of schooling since 1994 and Taylor (2006:3) found that 80% of schools in South Africa were essentially dysfunctional. Little has changed in the past decade, with unsuccessful curriculum reforms leaving the majority of South African schools unable to provide effective schooling, which has direct implications for the right to basic education (Letseka, 2014:4865).

South African learners have not fared well in international tests of competencies in reading and mathematics (Murtin, 2013:8). Attempts to understand the reasons for low learner performance have led to increased interest in the relationship between teacher characteristics, pedagogical practices, content knowledge and poor academic development (Taylor & Vinjevoold, 1999; Carnoy *et al.*, 2012; Taylor & Taylor, 2013). A common finding across these studies is that large numbers of South African teachers lack a fundamental understanding of subject content and the competence to teach it (Spaull, 2013:25).

The quality of a country's teachers is regarded by many as the single most important element of a quality education system (Spaull, 2013:24; Holborn, 2013:27) since teachers are viewed as the education system's principal resource (Wayne & Youngs, 2003:89). The critical role of teachers in the quality of education is not only evident in developing countries (O'Sullivan, 2010:377), but also in developed countries (Harris & Sass, 2011:798). In the United States of America (USA), for instance, there is concern about the inadequate training of some student teachers who are then required to teach the most vulnerable learners with numerous learning needs (Darling-Hammond, 2006:301).

The issue of inadequate preparation of teachers is an international phenomenon, as the United Nations Educational, Scientific and Cultural Organization (UNESCO) documents point out (Sayed & Ahmed, 2015:336). Ideally, teachers should be individuals who are "...qualified, professionally trained, motivated, and well supported" (UNESCO, 2014:3, as quoted by Sayed & Ahmed, 2015:336). Teacher education is the process whereby prospective teachers are prepared and equipped with the necessary knowledge and skills in order to teach effectively (Taylor, 2014:10). Given the influence teacher knowledge has on learner performance, teacher education has a crucial role to play in educational improvement (Kleickmann *et al.*, 2013:90). In an address to teachers and learners at a high-performing school in South Africa, the Deputy President, Cyril Ramaphosa, argued that teachers have a central role to play in overcoming the poor quality of education in the country (City Press, 2014).

Some blame the teacher education system, which should be delivering quality teachers to South African schools, for the poor quality of teachers (Taylor, 2014:6). A recent move that may address this is that HEIs are required to redesign the teacher education curriculum in order to prepare student teachers for challenges faced in the 21st century and beyond (Van Wyk, 2014:753). Teacher education programmes should prepare teachers who are highly effective and willing to explore new and different approaches to teaching to adapt to the ever-changing school environment (Maistry & Parker, 2010:389).

The Norms and Standards for Educators (NSE, 2000) originally set out the roles and responsibilities of teachers in South African schools, but failed to adequately describe the tasks and responsibilities of South African teachers in the different challenging contexts they are expected to teach (Morrow, 2007:4). The Minimum Requirements for Teacher Education Qualifications (MRTEQ) has replaced the NSE and is now the ruling policy for teacher education programmes in South Africa. The MRTEQ explicitly stipulates that it should not be taken as a representation of a curriculum for teacher education programmes (MRTEQ, 2015:9). The consequence of this is that the exact content of teacher education programmes remains unspecified.

1.2 MOTIVATION FOR THE STUDY

The MRTEQ policy (2015:26) sets out the qualifications and programmes for initial teacher education, of which the Postgraduate Certificate in Education (PGCE) is one. The PGCE is a one-year 'capping' qualification that follows an undergraduate degree or an approved diploma, with the purpose of developing focused knowledge and skills as teachers (MRTEQ, 2015:26). This 'capping' qualification is found in many countries across the world, including Norway the UK, USA, New Zealand, Australia, Malaysia, Ireland, Canada, Sweden, The Netherlands, Singapore and Hong Kong (Smith, 2011:338).

I have chosen to focus specifically on the PGCE, since this qualification focuses primarily on the acquisition of skills for teaching (pedagogical and practical learning), taking subject content knowledge as a given (MRTEQ 2015:28). In the Bachelor of Education (BEd) programme (a four year teaching qualification) the knowledge mix is a combination of subject knowledge, disciplinary learning (foundations of education) and practical experience (MRTEQ, 2015:20) and at least 50% of the credits across the four years are assigned to developing the teaching specialisation phase and subject (MRTEQ, 2015:22). In the PGCE, students usually have one methodology module per school subject. This helped to limit the study and ensure consistent and reliable comparisons across universities that were involved.

PGCE programmes have to cover a broad spectrum of topics and include the study of education and its foundations, disciplinary subject matter, pedagogical learning, practical learning, school-based work integrated learning (WIL), and situational learning (MRTEQ, 2015:29). However, the Policy only provides a broad framework of topics to be included in a PGCE programme and there is the possibility that while the initial teacher education (ITE) curricula may be policy-compliant, they may also be fragmented, providing incoherent learning programmes to prospective teachers, if knowledge development is presented in stand-alone modules (Rusznyak, 2015:10). The exact content to be included in the modules of the programme is open to individual interpretation. Since lecturers (teacher educators) at the different universities are usually responsible for the development and implementation of curricula, the PGCE programmes offered at different South African universities are not the same (Le Grange, 2006:190; Slabbert-Redpath, 2014:4; Nomlomo & Sosibo, 2016:205).

The Joint Education Trust (JET) Education Services recently undertook a study of the ITE programmes offered at Higher Education Institutions (HEIs) in South Africa. This Initial Teacher Education Research Project (ITERP) aims at determining whether HEIs are producing teachers who can respond to the challenges posed by schools (Taylor, 2014:6). The JET study focused on English, Mathematics and WIL.

This study, which addresses the need to focus on the Economics curricula, explores the perspectives of teacher educators, one of the key variables in teacher education. Teacher educators are those individuals charged with preparing teachers (Koster, 2002:7; Abell, 2008:1405; Maistry, 2011:122 & Livingston, 2014:218). In this study teacher educators refers specifically to university lecturers that teach Economics methodology to PGCE students who are prospective secondary school Economic teachers.

Economics is the study of how individuals, businesses, governments and other organisations within our society choose to use scarce resources to satisfy their numerous needs and wants in a manner that is efficient, equitable and sustainable (CAPS, 2011:9). The subject is rooted in problem-solving. Against the backdrop of recent Economic crises and global recessions, Economics education to prepare learners as future global citizens to make effective decisions is of the utmost importance (Hermanowicz *et al.*, 1985:9; Joshi & Marri, 2006:199; Van Wyk, 2014:754). It also has a role to play in equitable society. Poverty, unemployment, unequal distribution of income and poor Economic growth still prevail in the majority of developing countries in the world, including South Africa. Traditional ways of thinking are unable to solve these problems and therefore new approaches to Economic

education, as well as the education of Economic teachers is needed (Clark *et al.*, 2009:1; Maistry, 2011:122; Schnick-Vollmer *et al.*, 2015:24).

This study will look into the explicit and implicit aspects of the PGCE programme for student teachers specialising in secondary school Economics teaching. Explicit refers to the curriculum content and learning outcomes, but implicit refers to the delivery of the module as well as the perspectives of teacher educators (Grossman, 2005:426).

1.3 OVERVIEW OF SCHOLARLY LITERATURE

Learning to teach is a complex and enduring process (Spalding *et al.*, 2011:3) and HEIs are primarily responsible for preparing qualified and competent teachers through their teacher education programmes (Cochran-Smith, 2003:5). Various studies (Metzler & Woessmann, 2012:487; Sadler *et al.*, 2013:1036; Fritsch *et al.*, 2015:3) indicate that learner gains are related to their teacher's knowledge level and that teacher quality is a key determinant of learner performance (OECD, 2005:2; Metzler & Woessmann, 2012:486; Shepherd, 2013:2; Valletta *et al.*, 2014:696).

Teacher characteristics that have a positive impact on learner achievement in high school Economics classes include courses in Economics, additional content training in Economics as well as years of experience in teaching Economics (Valletta *et al.*, 2014:697). This indicates that targeted training and content knowledge aid in successfully conveying specialised subject matter to learners (Watts, 2006:8). Teacher education is a crucial element in developing prospective teachers' knowledge, and is even considered more important than a teacher's experience (Fritsch *et al.*, 2015:5). Economic pedagogues are in agreement on the vital importance of preparing prospective teachers of Economics to teach effectively (Salemi & Walstad, 2010; Milkman & McCoy, 2014; Sheridan *et al.*, 2014).

Shulman (1986:5) argues that anyone who plans to teach a subject to children must first demonstrate adequate knowledge of that specific subject as a precondition to teaching. In his research, he differentiates between the different knowledge areas of a teacher, viz. what teachers know and what only teachers can do, and he identified subject specific pedagogical knowledge as the 'missing paradigm' (Shulman, 1986:6). He introduced the term pedagogical content knowledge (PCK).

PCK is regarded as the specialised knowledge of a teacher which distinguishes the content specialist from the pedagogue (Shulman, 1987:8; Cochran *et al.*, 1991:4; Abell, 2008:1414;

Ball *et al.*, 2008:392). Currently, content knowledge (CK), pedagogical knowledge (PK) and PCK are considered to be the main categories of teachers' professional knowledge (Baumert *et al.*, 2010). It is important to note that the dynamic nature of PCK allows a teacher to develop it over time, supported by teacher preparation programmes and teaching experience (Abell, 2008:1407).

Teacher educators are key to the successful preparation of future teachers (Mayer *et al.*, 2011:248) since there is a strong relationship between the quality of teacher educators and quality teacher education. For that reason, teacher educators ought to be experts in knowledge generation, dissemination and practice in the discipline of teaching (Loughran, 2011:290). However, teaching about teaching is inevitably problematic because teaching comprises a complex array of skills, attitudes, actions and meanings (Loughran, 1997:8).

Although there has been increasing interest in research on the identities of teacher educators, an understanding of who teacher educators are and how their identities are shaped throughout their teaching careers remains elusive (Livingston, 2014:218). It is generally agreed that the way in which teacher educators think, as well as their attitudes and beliefs have a direct influence on their teaching (Ward, 2013:431). However, as yet the research on the attitudes and beliefs of teacher educators, especially teacher educators of Economics, is insufficient (Mayer *et al.*, 2011:247). My study aims to contribute to closing that gap and to stimulate Economics teacher educators' continuous professional development, by initiating dialogue and self-reflection on their teaching (Timmerman, 2009:226; Livingston, 2014:228).

1.4 THEORETICAL FRAMEWORK

The theoretical framework of my study (Merriam, 2009:66) pays particular attention to the curriculum, as stipulated by Dillon (2009), asking the questions of curriculum and looking for answers in the content of PGCE for Economics curricula. The scope of this study will be limited to the elements of the PGCE Economics pedagogy curriculum, with the aim of answering the questions posed by Dillon, namely "What are the things that compose it?" (Dillon, 2009:344).

The elements of curriculum encompass the basic things that must be included in a curriculum and for the purposes of this study, the following elements will be investigated (Dillon, 2009:346):

(a) Subject matter – What?

What is the nature and content of the subject-matter included in the curricula?

In order to determine what knowledge is considered as having the most worth, the nature and content of the subject-matter will be included.

(b) Milieu – Where and when?

In what context is teaching of student teachers taking place? The context will include 'who', not only where and when.

(c) Aim – Why? To what end?

What do curriculum developers (teacher educators) aim to achieve?

The goals and objectives of the curriculum and the underlying philosophy reflect the profile of the ideal Economics teacher as intended by the curriculum. This question relates to the last question concerned with the nature of curriculum, namely 'Result – What comes of it? Who learns what?' (Dillon, 2009:346). This study does not measure the actual outcomes of the curricula, but focuses instead on the intended outcomes.

These questions guided the methodology of this study in the deductive analysis of the elements of the PGCE Economics methodology curricula (What is taught?). The conceptualisation of the ideal Economics teacher is suggested by the aims of the curriculum (What should that result in?), and by what teacher educators regard as important for Economics student teachers to know and do (What is believed necessary to include in order to produce that result?).

1.5 RESEARCH QUESTIONS

The primary research question that guided this study was:

What are teacher educators' perspectives on the PCK required for secondary school Economics teaching?

The four secondary research questions that helped me to answer the primary question were:

1. What are the profiles of Economics teacher educators and how do they perceive the typical profile of a prospective Economics teacher?
2. How is curriculum content selected for Economics methodology modules?
3. What is the nature of Economics methodology curricula in selected South African universities?
4. What theoretical influences underlie the Economics methodology curricula in selected South African universities?

1.6 AIM OF THE STUDY

The aim of this study was to determine the nature of the content included in Economics methodology modules, and identify the motives that guided teacher educators to include this content. Through this process, insight was gained into the perspectives of Economics teacher educators as curriculum makers and shapers of future teachers.

I was also interested in understanding the theoretical conceptions of curriculum and the theories of teaching and learning which guided teacher educators during the construction of the curricula. As a young academic and Economics teacher educator, I was keen to learn from my peers in order to enrich my teaching and inform my perspectives on teaching Economics.

1.7 RESEARCH DESIGN AND METHODOLOGY

A qualitative research design was used. Qualitative research is characterised by a focus on meaning and understanding. I employed a phenomenological approach embedded in an idealist interpretive paradigm in order to understand how individuals interpret and attribute meaning to their experiences (Best & Kahn, 2006:246; Schnelker, 2006:45; Merriam, 2009:5). The traditional methods of data collection for qualitative research include interviews, observation and documents (Best & Kahn, 2006:247).

It is important to distinguish between the terms curriculum analysis and curriculum evaluation. The analysis of the Economics methodology curricula in this study focused on the planned (written) curriculum. Curriculum evaluation looks at all the aspects that comprise curriculum, including the enacted curriculum and the results of the curriculum. The key steps for curriculum evaluation according to Hall (2014:343) are benchmarking, evidencing, knowing and applying. Since the purpose of this study was not to make a value judgement on the curriculum being taught to prospective Economics teachers, the term curriculum analysis was used rather than curriculum evaluation.

1.7.1 Sampling strategy

In qualitative research there are a number of sampling strategies that can be employed to identify participants. Since the purpose of my study was to gain an in-depth understanding of

a certain phenomenon, individuals were purposefully selected to participate in the study (Cohen *et al.*, 2011:156; Creswell, 2014:227; Merriam & Tisdell, 2016:97).

My study was situated in the higher education environment and the sample for my study was traditional, research-intensive South African universities (Lategan, 2009:62) that offer Economics education in the PGCE curriculum. After studying the yearbooks of all the research-intensive universities (11 in total), five universities were selected based on the PGCE for secondary school Economics programmes being offered, also taking account of the accessibility of the curriculum content of these universities.

1.7.1.1 Selection of teacher educators

The teacher educators responsible for teaching¹ Economics PGCE student teachers were identified via the relevant university's website or by contacting the respective subject chairs or programme leaders. A total of five teacher educators were included in the sample. These individuals met the criterion of having experience in teaching Economics teacher education, and were therefore able to provide a particular perspective on Economics education (Smith *et al.*, 2009:49).

1.7.1.2 Document selection

I wanted to study the content of the PGCE Economics methodology curricula of the five selected universities which were available in the form of documents or what Graham-Jolly (2013:232) terms the 'planned curriculum' or 'explicit curriculum'. In this study, I refer to these documents as the Economics methodology module. Acknowledging the fact that the term 'curriculum' has an array of different and sometimes even incoherent meanings (Dillon, 2009:344; Adamson & Morris, 2014:310), the narrow conceptualisation of curriculum was used for the purposes of this study.

1.7.2 Methods of data generation and collection

I held semi-structured interviews with teacher educators via Skype, and gathered documents which specified the content of PGCE Economics methodology curricula.

¹ I acknowledge the possibility that the writers of the curriculum documents are not necessarily the same individuals as those responsible for presenting the module. However, the presenters of the module ought to be familiar with the content of the curriculum documents.

1.7.2.1 Semi-structured interviews

Interviewing or holding conversations to obtain certain information can be viewed as one of the most common means of data collection in qualitative studies (Merriam, 2009:86). The interview is a flexible tool for data collection, enabling multisensory channels to be used: verbal, non-verbal, spoken and heard (Cohen *et al.*, 2011:409). Interviewing via Skype was best suited for my research since participants were geographically far apart. Participants were interviewed on a one-to-one basis and asked open-ended questions as the research entailed past events and participants' reflections on their experiences (Merriam, 2009:88; Creswell, 2014:240).

The interviews were semi-structured in that the list of topics were not dealt with in a specific order or in a standardised manner (Phellas *et al.*, 2012:183). The form of data collection was a good fit for the proposed data analysis. Semi-structured one-on-one interviews is the technique most widely used by interpretive phenomenological analysis (IPA) researchers because it is seen as the best way to elicit lived experiences (Griffin & May, 2012:450).

I wanted to play an active role in the data collection process, true to the nature of qualitative research (Merriam, 2009:15). I hoped this research project would encourage dialogue between teacher educators in the country and thus help to enhance the image of Economics as a secondary school subject. I also hoped that providing teacher educators with an opportunity to reflect on their practice would enhance teacher education.

1.7.2.2 Documents

Documents formed part of the data, since documents not only contain valuable information, but are written with different purposes in mind (Prior, 2012:427). The content of these documents provided an insight into the specific skills or content teacher educators expect prospective secondary school Economics teachers to acquire (Sheridan *et al.*, 2014:841). Although studies that emphasise the versatile role of documentation in social sciences are rare (Prior, 2012:427), documents are considered to be a ready-made source of data easily accessible to the imaginative and resourceful investigator (Merriam, 2009:139). Creswell (2014:245) supports this view, stating that documents provide valuable information that help researchers understand central phenomena in qualitative studies.

1.7.3 Methods of data analysis

“Qualitative analysis involves interpreting interviews, observations and documents to find substantively meaningful patterns and themes” (Patton, 2015:5). The two sets of data, namely the interviews and the documents were analysed using different techniques to facilitate triangulation of the results and to increase the validity and trustworthiness of the study. IPA was used to analyse data generated by the interviews and qualitative content analysis was used to analyse the curriculum documents.

1.7.3.1 Interpretive phenomenological analysis (IPA)

IPA is an inductive method of interpreting people’s accounts of their own experiences (Griffin & May, 2012:447). IPA stems from the philosophy of phenomenology (attempt to understand lived experiences) and the theory of interpretation. IPA was used in an inductive manner to analyse the transcribed interviews conducted with teacher educators, since I wanted to interpret the meaning participants assign to their experiences and construct a profile of Economics teacher educators.

1.7.3.2 Content analysis

Content analysis is the process of summarising and reporting written data – the main content of data and their meanings (Cohen *et al.*, 2011:563). Although content analysis was primarily quantitative in the past, qualitative content analysis now uses it to discover themes and recurring patterns of meaning in the content of interviews and documents (Merriam, 2009:205). Qualitative content analysis is concerned with the explanation of a specific phenomenon at a particular time or its development over a period of time, and it adds knowledge to a field of inquiry (Best & Kahn, 2006:257).

Curriculum scope is an essential factor that should be studied when analysing curricula (Aesaert *et al.*, 2013:133), and therefore the analysis of the documents will focus on the content, scope or outline of the curriculum as stipulated in the study guide or other available documents. The process of document analysis followed a deductive approach. This was informed by Dillon’s questions of curriculum (cf. 1.4) and the secondary research questions (cf. 1.5).

1.8 VALIDITY AND TRUSTWORTHINESS

The validity and trustworthiness of a qualitative study is measured by the degree to which the researcher and participants share mutual meanings of interpretations and concepts (Maree & Van der Westhuizen, 2013:38; Nieuwenhuis, 2013:113). In qualitative research, validity is enhanced by the data collection and analysis techniques and various methods (McMillan & Schumacher, 2014:354). I used two of these strategies, namely multiple methods that permit triangulation and participant review.

Triangulation is the use of two or more methods of data collection to ensure validity and credibility from an interpretive-constructivist perspective (Cohen *et al.*, 2011:195; Creswell, 2014:283; Merriam & Tisdell, 2016:244). Triangulation of the data was effected by employing multiple sources of data collection, namely curriculum documents and semi-structured interviews.

The authenticity of the documents was ensured by verifying the author, place and date of writing the material under study (Merriam, 2009:151). In order to increase the trustworthiness of the interviews, the transcripts were sent to the interviewees for review and respondent validation (Cohen *et al.*, 2011:202; Nieuwenhuis, 2013:113; Merriam & Tisdell, 2016:246).

1.9 ETHICAL CONSIDERATIONS

Permission to use the content of the curricula, present in the curriculum documents was obtained by means of the Promotion of Access to Information Act (2 of 2000). These documents were collected in a pass-word protected electronic format and stored electronically. For each university I had to use a specified process to obtain the necessary permission and documentation. Anonymity was ensured by renaming the universities Northern, Southern, Eastern, Western and Central University.

Ethical clearance was gained from the ethics committee of the NWU to conduct interviews with participants (Ethics Code: NWU-00204-16-A2; see Addendum A). Interviews were conducted on Skype to minimise costs and accelerate the data generation process. The Skype interviews were voice recorded and transcribed by the researcher. The informed consent of each interviewee was obtained before commencement of the interviews accompanied by a comprehensive explanation of the nature of the research conducted and an assurance that his/her identity would not be revealed (Bhatt, 2015:221).

1.10 CONCLUSION

This chapter elaborated on the background and context of the study and the rationale for the study. An overview of the research questions, research design and ethical considerations were provided, setting the scene for the planned execution of the research.

The next chapter provides an in-depth review of the existing scholarly literature on teacher education, PCK and Economics teaching. Chapter 3 describes the research design and specifically the research methodology, paradigm, sampling method, data collection and data analysis. Detailed information is also given on the ethical aspects related to the study. Chapter 4 provides a presentation of the data in three parts, relating it to the research questions. The final chapter presents the findings of the study, the implications of the findings as well as recommendations for future research.

CHAPTER 2

OVERVIEW OF SCHOLARLY LITERATURE

2.1 INTRODUCTION

The purpose of a literature review is to enhance the collective understanding of scholars by summarising the past and current state of research on a certain topic and to provide the foundation for contributing to the existing knowledge base (Boote & Beile, 2005:3; Merriam, 2009:72; Creswell, 2014:96). After identification of the strengths and weaknesses of existing literature, gaps emerge that point to the necessity for further research on a particular topic (Creswell, 2009:25; Maree & Van der Westhuizen, 2013:26).

I followed the steps for conducting a literature review suggested by Creswell (2014:97). First, the key terms were identified. These were 'teacher education', 'teacher educators', 'PGCE', 'methodology', 'pedagogy', 'PCK', 'teaching', 'Economics teaching' and 'Economics education'. Second, I identified the relevant literature by visiting the library for books, searching the academic journals on the university's website and consulting the reference list of articles on relevant and related topics. Websites that focus on Economic education, such as the Council for Economic Education (CEE), provided helpful guidance on the nature of research in the field, as well as additional areas of research to explore. Third, I undertook an in-depth study of the literature I had identified as seemingly relevant to evaluate the extent to which the information in it was actually relevant to my study, either in terms of the research questions posed, the theoretical framework, the methodology employed or the results of the study.

After I had evaluated the literature, I coded each source and grouped the codes into categories. This chapter is the fifth and final step in the literature review process, namely writing up the findings to provide an overview of the existing literature, the strengths and weaknesses of studies and to identify gaps. The purpose of this is to provide a rationale and theoretical basis for my study. The rest of the review provides an outline of the main categories that were identified through coding of the literature, namely teacher education (2.2), teacher educators (2.3), PCK (2.4) and Economics education (2.5). The theoretical framework that guided this study is discussed in section 2.6 followed by a conclusion of the

chapter (2.7). Furthermore, each of these categories has subcategories that enhanced the process of building a theoretical foundation for my study.

2.2 TEACHER EDUCATION

The first sub-section of the review of literature which focus on teacher education, reports on studies related to the nature and importance of teacher education (2.2.1). This includes the principles proposed by scholars for the design of teacher education programmes, as well as the relationship between teacher education and teacher performance. The next sub-section elaborates on suggested content for teacher education programmes (2.2.2), followed by literature on teacher education in the South African context (2.2.3). This sub-section concludes with a critical view of teacher education (2.2.4).

2.2.1 The nature and importance of teacher education

Local and international scholars concur on the importance of teacher education in preparing effective teachers (Darling-Hammond, 2000:166; Sayed, 2002:389; Wayne & Youngs, 2003:89; Mayer *et al.*, 2011:248; Kleickmann *et al.*, 2013:90; Taylor, 2014:6; Van Wyk, 2014:753; Rusznyak, 2015:10; Nomlomo & Sosibo, 2016:205). However, there is still some debate on the exact nature and content of these programmes (Boyd *et al.*, 2009).

Alluding to the discord related to the content of teacher education programmes, a summary will be provided of the nature of selected teacher education programmes and proposals for teacher education programmes by educational researchers. The initial pedagogy of teacher education constructed by Korthagen *et al.* (2006) aimed at being both empirically based and practically oriented. The fundamental principles they propose for teacher education programmes and practices acknowledge the complex process of learning about teaching and its conflicting and competing demands (*ibid.*, 1025). This process requires a shift in focus from the curriculum to the student teacher (*ibid.*, 1029) and an acknowledgement that learning about teaching is enhanced through student teacher research (*ibid.*, 1030). Teacher educators need to model learning and teaching approaches in their own practice as an effective means of enabling student teachers to learn about teaching (*ibid.*, 1036).

In the light of further research on teacher education programmes, Korthagen (2010a) refined these principles and suggested a three-level model of learning to teach to address the theory-practice divide characterised by teacher education. This three-level model focused on developing student teachers' awareness of *gestalt* (unconscious action on experiences; a teacher's perception of the here-and-now situation); and after reflection, the development of

schema to apply to teaching practice (ibid., 104). In the third level *theory* is introduced when student teachers require a deeper comprehension of the logical ordering of relations in a schema.

In this model, Korthagen (2010a:103) suggests a 'realistic approach' to teacher education, where the focus is on student teachers' process of learning to teach in real contexts and the practical problems they experience. The three-level model of learning needs to be considered (gestalt, schema, and theory) along with two kinds of integrated theory: theory of practice and theory of several subject disciplines (Korthagen, 2010b:414). Consequently, Korthagen (ibid., 419) suggests an integrated teacher education programme without distinction between modules such as subject matter methods and general education. The rationale for this is the view that teacher learning is grounded in *gestalts* formed from experiences. These are not fragmented as the structure of teacher education programmes suggests.

The *New South Wales Quality Teaching model* sees attributes of teacher effectiveness as Intellectual Quality (the production of deep understanding of important concepts, skills and ideas by requiring learners to engage in higher-order thinking), Quality Learning Environment (supportive classroom structures to promote learner outcomes and developing positive relations between teachers and learners and among learners) and Significance (linking classroom learning to learner's life world and the broader context) as key determinants of quality teaching (Lumadi & Acquah, 2014:2853).

In Norway, policy in 2000-2001 teacher education was structured around five areas of competence (Smith, 2011:340): subject matter competence; teaching competence; social competence; competence to change and develop and competence of professional ethics. In 2008-2009, teacher education policy in Norway changed and the focus shifted to the importance of a teacher's role in advancing learners' learning. The main foci have become: improved quality of teacher education; better quality recruits to the teaching profession; closer follow-up of novice teachers; and more relevant research and development for schools and teacher education.

It seems that policy across the world is vague and that the efficacy of these guidelines is under-researched. There are not as yet models of teachers' competencies for specific domains or instruments to measure these competencies (Fritsch *et al.*, 2015:3).

Wayne and Youngs (2003:95) identified four distinct categories of teacher characteristics which have been found to influence learner achievement reflected in the teachers' college ratings, test scores, course taking, degrees and certification status. Other studies found that teacher education that focuses on the practical aspects of teaching leads to gains in learner achievement in the first year of teaching, but in the second year, content learning seems to have a greater effect on learner performance (Boyd *et al.*, 2009:434).

However, test scores are never perfect indicators of what learners know or of what teachers have taught, since a variety of factors influence learner performance such as learner characteristics, teacher characteristics and classroom variables (Boyd *et al.*, 2009:420). Therefore studies that relate the quality of teachers to learners' achievement alone are not always accurate reflections of teacher effectiveness. Maistry and Parker (2010:379) stress that not only disciplinary knowledge and knowledge about teaching, but also a teacher's belief in his/her efficacy, and ability to influence learning through his/her teaching is necessary for an teacher to succeed. Valletta *et al.*, (2014: 704) found that learner characteristics, including high school grade point averages (GPAs), viewed as a key factor in college admissions in the USA, peer GPAs and self-reported attitudes toward Economics have a greater statistically significant effect on post-test scores, than teacher quality alone.

2.2.2 Content to be included in teacher education programmes

In an interview with Lee S. Shulman, a pioneer of research on teacher knowledge, Berry *et al.* (2008:1276) reports that a teacher needs a thorough understanding and a real affection for a subject to teach it well. Lumadi and Acquah (2014:2853) agree, arguing that teacher education must ensure that teachers are equipped with the necessary skills to successfully implement the school curriculum. Teacher education should include knowledge of both subject content and pedagogy (Grossman, 2005:425), and reflect the practices of the profession (Boyd *et al.*, 2009: 419). With reference to teaching science, Abell (2008:1414) emphasises that learning to teach involves developing a set of complex and contextualised knowledge that can be applied to specific problems in practice.

Korthagen *et al.* (2006:1029) suggest that student teachers need to play a central role in the process of teacher education. Teacher educators need to take account of the pre-existing ideas they have on the role of teaching and schooling (Fenwick & Cooper, 2013:107). Therefore, student teachers should be provided with opportunities to engage with experiences of teaching, and supported in the process of construction and deconstruction of the experience of teaching practice, to enhance the link between practical experiences and

theory. He urges that the message that should be embedded in this experience is that “telling is not teaching and listening is not learning”, if teaching experiences are to have real meaning for practice (Korthagen *et al.*, 2006:1029).

One way of deconstructing student teachers’ beliefs about teaching is through the use of reflective journals on their past educational experiences or apprenticeships of experience, and opportunities to share their experiences with their peers towards the construction of a personal pedagogy (Knapp, 2012:325). It is also important to expose student teachers to various contexts, as context can affect learning (Fenwick & Cooper, 2013:107), and student teachers need to learn that these contextual constraints can be overcome by having high expectations of all learners and by creating supportive learning environments (*ibid.*, 106).

Student teachers should also be made aware of the need for assessment, its purposes and its ability to inform teachers’ practice in relation to learner progress (Westrick & Morris, 2016: 165). However, James (2006) emphasises the dangers of reducing teacher education to disparate technical competencies, instead of aligning student teachers’ learning, their teaching and assessment practices with their understanding of learners, learning and subject knowledge.

2.2.3 Teacher Education in South Africa

Consistently low performance by learners in South African schools over the last decade has led to an increased interest in understanding the possible role of teacher characteristics, pedagogical practices and content knowledge, and how they may figure within these patterns of poor academic development (Taylor & Vinjevold, 1999; Carnoy *et al.*, 2012; Taylor & Taylor, 2013). A common finding across these studies is that large numbers of South African teachers lack fundamental understandings of subject content (Nomlomo & Sosibo, 2016:200).

The field of teacher education in South Africa has undergone significant changes since 1994 (Sayed, 2002) and in 2002 the provision of teacher education was moved entirely into the higher education sector. Qualifying teachers are now required to hold a bachelor’s degree and/or professional qualification (Rusznyak, 2015:9). The most common of these are a BED and a PGCE.

The knowledge mix required by PGCE programmes, as prescribed by MRTEQ (2015:26), include the following: disciplinary learning (foundations of education as well as specific

subject matter relevant to an academic discipline); pedagogical learning (general pedagogical knowledge and specifically the principles and methods of teaching, knowledge of learners and learning, the curriculum and instructional and assessment strategies, as well as specialised pedagogical content knowledge for a specific discipline); practical learning (learning from practice by using case studies, video recordings and lesson observations before practical learning of teaching during WIL); fundamental learning (related to the context of teacher education in South Africa, such as the importance of a second official language, information and communication technology (ICT) skills, and academic literacies; and situational learning (knowledge of various learning situations, context and environments in which education takes place, including policy, political and organisational context, which constitute learning in and about context).

The roles of teachers are also specified and require teachers to be specialists in a phase, subject discipline and practice, fill the role of mediator of learning, interpreter and designer of learning programmes and materials, administrator and manager, scholar, researcher, lifelong learner, assessor, and community member, and play a citizenship and pastoral role (MRTEQ, 2015:58).

Cognisant of the requirements for prospective teachers, Rusznyak (2015) argues that ITE curriculum designers should create conceptually coherent and contextually responsible curricula, since a lack of coherence could result in fragmented teacher education curricula. Steyn *et al.* (2016:28) propose formal and material elements of teacher education as the complex array of knowledge, and the development of teaching skills required by prospective teachers, cannot be reduced to a checklist of competencies (*ibid.*, 30). The formal elements of knowledge of practice are to be included in university-based coursework and craft knowledge learnt from apprenticeships in schools, their peers and teacher educators. The material elements are the contextual conditions under which practices of learning to teach takes place. The challenges of the South African education system demand teacher education programmes that prepare prospective teachers to be responsive to contextual factors (Maistry, 2001:171; Rusznyak, 2015:15).

As the majority of student teachers in South African universities emanate from dysfunctional schools with poor teaching practices, there is a dire need to address their misconceptions of schooling (Rusznyak, 2015:20). If conceptual foundations are not provided by subject and pedagogic knowledge, student teachers tend to regress to mechanical and superficial ways of lesson presentation and resource use (*ibid.*, 20). She suggests that teacher education programmes should focus on developing reflective practice, which can enhance personal

practical knowledge and general pedagogical knowledge to help student teachers deal with the demands of classroom life, as well as situational knowledge to help student teachers resist the constraints of current practices and develop effective teaching practices (ibid., 16).

2.2.4 Criticism of teacher education

Teacher education programmes have been criticised in many research studies for their disappointing impact on teacher behaviour and teacher learning (Korthagen *et al.*, 2006:1021; Lunenberg *et al.*, 2007; Korthagen, 2010a:98; Borg, 2004:275). Loughran (2011:279) identifies one of the major problems with teacher education as the simplistic views of teaching and learning they encourage such as 'teaching as telling' and 'learning as listening'. At the same time, they do not give due attention to the importance and value of comprehensive teacher preparation (Hammerness *et al.*, 2005:359).

Teacher education in South Africa has also been publicly criticised as not meeting prospective teachers' practical teaching needs (Spalding *et al.*, 2011:3). This resonates with Morrow's (2007:14) call to developers of teacher education programmes to take account of the contextual constraints within which teachers are expected to teach (Nomlomo & Sosibo, 2016:204).

Korthagen (2010a) concurs that the field of teacher education lacks a theory of teacher learning which can support the transition from narrow conceptualisations of teaching to enabling pedagogies for teaching. Individuals responsible for developing teacher education programmes need to know how teachers learn to teach; mere observation of teaching is not sufficient to support the process of learning to teach (Westrick & Morris, 2016: 158).

The preconceptions of teaching held by student teachers regarding teaching, could be explained by the 'apprenticeship of observation' a term coined by Lortie in 1975 (Borg, 2004:274). While they were at school, they spent approximately twelve years observing how teaching is done. As a result they have the misconception that teaching is simple; they are quite unaware of the complex processes that underlie teaching (Borg, 2004:274; Westrick & Morris, 2016:156). Consequently, this limits the degree to which teacher education programmes are able to influence student teachers' beliefs and practices and they tend to teach in the way they were taught (Mewborn & Tyminski, 2006:30). However, as Mewborn and Tyminski (2006:32) warn, it is important not to generalise. They found that student teachers draw on pleasant and unpleasant teaching experiences and observations when they construct the type of teacher they wish to be. The apprenticeship of observation can be

used in productive ways in teacher education as an aid to supporting student teachers to construct their teacher identities (Furlong, 2013:78).

Teacher education programmes need to take account of the perceptions and beliefs of student teachers, as well as the attitudes they have developed during their learning experiences (Fenwick & Cooper, 2013:99). After analysing nine articles pertaining to teaching and teacher education, Ben-Peretz (2011:8) came to the conclusion that teacher education programmes need to go even further than this. The preparation of future teachers cannot be limited to developing their competencies in a specific subject, but must include attention to societal issues. Van Wyk (2014:753) calls for a change in teacher practices to create conditions which will promote critical engagement and Spalding *et al.*, (2011:3) urges policy makers to take account of the fact that learning to teach is a complex, life-long process.

The under preparedness of teachers for diverse and urban environments led to the development of scripted curricula in American schools to help teachers know what to teach, when to teach it and how to teach (Milner, 2013:163). Remillard and Reinke (2012) suggest that descriptive texts that speak *to* a teacher and not *through* a teacher can provide support to inexperienced teachers or teachers who are teaching in an unfamiliar discipline. However, scripted curricula hold the risk that teachers fail to take account of their learners' abilities or needs because they focus on the content which will be tested or examined during the year. This could lead to missed opportunities to develop learners' skills and creativity, and disadvantage diverse learners with unique needs, since learners' backgrounds and individual learning needs are not taken into consideration (Milner, 2013:168; Timberlake *et al.*, 2017:49).

2.3 TEACHER EDUCATORS

The first sub-section of the review of the literature on teacher educators explores studies related to the persona of teacher educators (2.3.1), followed by the role of teacher educators in teacher education (2.3.2) and criticism of the practices of teacher educators (2.3.3). Perspectives of teacher educators follow (2.3.4) and the section concludes with a review of the literature on teacher educators in South Africa (2.3.5).

2.3.1 Who are teacher educators?

As the focus has shifted to the quality of the teacher that affects learner achievement, increased emphasis has been directed towards the quality of teacher education (Taylor, 2014) and therefore it is timely to study those individuals responsible for the training of teachers, known as teacher educators (Mayer *et al.*, 2011:250).

Shulman (2005:59) reminds teacher educators that the way they teach will shape how teachers behave. *Signature pedagogies* is the term Shulman (2005:52) gives to the characteristic form of teaching and learning in the preparation of a specific profession, including teacher education. Goodwin *et al.* (2014:284) contend that there is a strong relationship between quality teacher education and the quality of teacher educators, albeit that what teacher educators need to know and be able to do is as yet not clearly defined.

In an attempt to determine who teacher educators are, Tillema (2007:278) summarised the role of the teacher educator, namely that of mentor, role model of preferred ways of teaching, reflective or critical friend, and monitor of the professional standards of teaching quality. It seems that teacher educators initially face serious doubts about their ability to translate their professional insights into practice and perform their wider roles as teacher educators (Tillema, 2007:278; Izadenia, 2014:426).

The difficult tasks of being a teacher educator include the lack of formal preparation for their profession, heavy time pressure, and little support from their environment. The expectations and assessments of teacher educators' performance often relate strongly to curriculum development or research output, and are not always directly related to their teacher education practice. This can make it difficult for teacher educators to assess the influence of their own teaching behaviour on the learning of student teachers (Lunenberg *et al.*, 2007:588).

2.3.2 The role of teacher educators in teacher education

Teacher educators have special knowledge of teaching about teaching, which enables them to influence student teachers' learning about teaching (Loughran, 1997:4). Therefore teacher educators have the responsibility to reveal what lies behind the performance of teachers by making the 'pedagogical reasoning visible' (Loughran, 2014:277). Since teacher educators play a critical part in the professional identity formation of student teachers they should have

a strong sense of their roles and professional self and engage in a critical examination of their own practices (Furlong, 2013:80).

In teacher education settings, the teacher educator is an example of a teacher (Lunenberg *et al.*, 2007:588), and will therefore have a strong impact on student teachers' views of teaching. Teacher educators have the responsibility for modelling ideal teaching, as one of the principles of learning about teaching, and at the heart of this principle is that student teachers need to see into their teacher educators' thinking about teaching so that they can access the ideas and feelings that inform teaching and learn about teaching in meaningful ways (Korthagen *et al.*, 2006:1036).

A clear distinction should be drawn between implicit modelling and explicit modelling (Lunenberg *et al.*, 2007:590). Implicit modelling refers to teacher educators who live the maxim that you must 'teach as you preach' or 'walk your talk'. However, this may not be effective, as student teachers' attention is not drawn to the practice of modelling, and they are not directly challenged to question their own preconceptions about teaching (*ibid.*, 590). Explicit modelling of teaching is preferred in which teacher educators make their teaching choices and the reasons for them explicit. This makes it possible for student teachers to be involved in the teaching process. It can facilitate the transfer of the teacher educators' practice to their own practices (*ibid.*, 598).

2.3.3 Criticism of the practices of teacher educators

There has been some criticism of the practices of teacher educators. Cochran-Smith (2003:6) views the lack of attention to a curriculum for the continuous development of teacher educators as an international problem (Goodwin *et al.*, 2014:299). Smith (2011:324) emphasises that while the role of teacher educators is multi-faceted and complex, there is not a clear definition of it and what it requires.

The modelling of teaching has been criticised by scholars on the grounds that it can reinforce traditional teaching practices, thus encouraging student teachers to teach as they were taught, not as they are taught to teach (Blume, 1971:412; Lunenberg *et al.*, 2007:587). A study of the teacher role models used by teacher educators by Timmerman (2009:233) found that teacher educators were influenced by teacher role models from their primary and secondary school years, but none of them could recall a specific teacher role model from teacher education that impacted their teaching or their view of teaching.

2.3.4 The perspectives of teacher educators

Lanier and Little (1984) initiated research that focused on teacher educators, their activities and duties as well as their thinking (Livingston, 2014:218). In an attempt to answer the question 'Why teach teachers as you do?' Loughran and Russel (1997) made use of narratives from teacher educators to gain insight into the nature of their teaching practice and the theories and guiding principles that formed the foundation of their practice. Timmerman (2009) conducted a study to determine the life histories of teacher educators and how it has shaped their professional identities as well as the role of teacher models on their own modelling.

Similar studies have been conducted in recent years, including a study conducted in Hong Kong by Katyal and Fai (2010) where eight teacher educators presenting a postgraduate diploma in education course were interviewed to determine their beliefs on teaching. The results indicated that local and Western tutors held different perceptions pertaining to their role as teacher educators, the content and process of knowledge acquisition of their students and their perceptions about their students as learners (Katyal & Fai, 2010:321). Mayer (2011:254) found that the knowledge and experience that teacher educators view as important is dependent on their own career histories.

Other related studies on the nature of teacher educators' work and their perspectives on teaching and learning have been conducted internationally, including the USA (Daniel & Peercy, 2014), UK (Childs, 2013), the Netherlands (Tillema, 2007), Australia (Loughran, 2011; Mayer *et al.*, 2011), Norway (Smith, 2011), China (Yuan, 2015) and Hong Kong (Katyal & Fai, 2010). Some studies were related to specific subjects: Mathematics (Zazkis & Zazkis, 2011), English, (Childs, 2013) and Physical Education (Chróinin *et al.*, 2013).

2.3.5 Research on teacher educators in South Africa

There is little literature on teacher educators at South African HEIs, however, some useful work has been done on the potential for teacher educators' influence in curriculum development coupled with severe challenges to identity in complex environments (Kruss, 2009:157; Braund, 2015:313). Maodzwa-Taruvunga and Divala (2014:1962) report on the experiences of black women teacher educators in South African universities and the unique challenges faced in the construction of their identity. Jita and Mokhele (2013:139) reported on the value of communities of practices to aid in the shifting of the identities of teacher educators from teachers to researchers. Mukeredzi (2015:136) reports on her self-reflection

as a teacher educator during practical teaching, and found that reflective questions on her practice facilitated her professional development as a teacher educator, mentor and researcher.

2.4 PEDAGOGICAL CONTENT KNOWLEDGE (PCK)

The first sub-section of the review of literature on PCK will provide a background on the conceptualisation of PCK (2.4.1), followed by a report on studies related to the relationship between content knowledge and pedagogical content knowledge (2.4.2), a critique on PCK (2.4.3) and a synopsis of research on PCK in different subjects (2.4.4).

2.4.1 The origin of PCK

Shulman (1986:6) compared the board examination for school teachers in 1985 to the one in 1875 and found a stark contrast between the focus on subject content knowledge in the past and the (then) current focus on assessing a teacher's capacity to teach (Shulman, 1986:6). These results led him and his colleagues to launch a research programme titled *Knowledge Growth in Teaching* that focused on teacher knowledge, its nature and sources and on how teachers acquire new knowledge (Shulman, 1987:8).

The categories of a teacher's knowledge base consisted of subject content knowledge; general pedagogical knowledge (principles and strategies of classroom management); curriculum knowledge (grasp of the materials and programmes that serve as the tools of the trade for teachers); pedagogical content knowledge (that special amalgam of content and pedagogy that is uniquely the province of teachers, their own special form of professional understanding); knowledge of learners and their characteristics; knowledge of educational context (ranging from the workings of the group or classroom, the governance and financing of school districts to the character of communities and cultures); and knowledge of educational ends, purposes and values and their philosophical and historical grounds.

Among those categories, PCK was of special interest because it specified the distinctive bodies of knowledge needed for teaching. PCK represents the blending of content and pedagogy into an understanding of how particular topics, problems, or issues in a specific subject are organised, represented and adapted to the diverse interests and abilities of learners, and effectively presented for instruction. PCK is the category most likely to distinguish the understanding of the content specialist from that of the pedagogue (Shulman,

1987:8). Siding with Aristotle, Shulman (1986:14) concludes that the ultimate test of understanding is reflected in an individual's ability to transform their knowledge into teaching.

Shulman did not intend to compile a mere list of what a teacher should know, but wanted to provide a conceptual coordination to focus the attention on the nature and types of knowledge needed to teach a subject (Ball *et al.*, 2008:392). Shulman's presidential address in 1986 and the related article in *Harvard Education Review* in 1987 have been cited more than 12 000 times in refereed journals, in 125 different journals in various professions (Ball *et al.*, 2008:392). The majority of research on PCK focuses on science and mathematics education and one third of the articles citing PCK make general claims about teacher knowledge and teacher education, but studies focusing on a specific content area are lacking (Ball *et al.*, 2008:394). A few of these studies will subsequently be discussed.

Grossman (1990:8), one of Shulman's students, focused her attention on English and urged teachers to make disciplinary topics more accessible to learners by drawing on both subject matter knowledge and knowledge of learners. In 1991 Cochran and others compiled a *Tentative Model for Teacher Preparation* focusing on the PCK required by teachers. PCK is sketched as a type of knowledge that is unique to teachers (Cochran *et al.*, 1991:4), and entails the manner in which teachers incorporate their pedagogical knowledge with their subject matter knowledge, taking into consideration the school context and the learners. This model includes various other knowledge domains required by a teacher, including knowledge of subject matter; knowledge of pedagogy; knowledge of learners, their motivation and backgrounds and knowledge of the environmental context, which includes the school climate, parental concerns and the social context of the community (Cochran *et al.*, 1991:11).

Various studies on PCK have attempted to refine various domains of knowledge required by a teacher (Rahman & Schaife, 2006; Bouchard, 2008). Mansor *et al.* (2010:1836) explain that the component of teachers' PCK that contribute to learners' conceptual understanding includes content knowledge, pedagogical knowledge, knowledge about learners and knowledge of the context. Only when teachers had both subject matter knowledge (SMK) as well as knowledge of learner misconceptions was learner performance significantly higher (Sadler *et al.*, 2013:1038). Clotfelter *et al.* (2007:28) found similar results: teacher test scores on tests entailing material on curriculum (SMK), instruction and assessment (PCK) correlated positively and statistically significantly with the performance of learners.

Researchers unanimously agree that PCK is necessary for teachers to fulfil their teaching responsibilities (Bouchard, 2008; Ben-Peretz, 2011:8). PCK is, however, not set in stone. Its dynamic nature allows a teacher to develop PCK over time supported by teacher preparation programmes and teaching experience (Abell, 2008:1407). Teacher education programmes can thus provide the opportunity for student teachers to develop their PCK using practices such as reflection and the sharing of experiences with their peers (Nilsson, 2008:1284).

2.4.2 The relationship between content knowledge and pedagogical content knowledge

Shulman (1986:9) defined content knowledge (CK) as the amount and organisation of knowledge about a subject in a teacher's mind, and expects a teacher to have subject matter content understanding at least equal to that of the mere subject matter major (Shulman, 1986:9). Cochran *et al.* (1991:4) agrees that both PCK and CK are crucial to good teaching and learner understanding. Ball *et al.* (2008:390) concur that content understanding is a special kind of technical knowledge that is key to the profession of teaching. Various studies emphasise the relationship between CK and PCK as predictors of instructional quality and learner progress (Joshi & Marri, 2006:200; Abell, 2008:1407; Baumert *et al.*, 2010:166; Fritsch *et al.*, 2015:11), while deficits in CK are detrimental to the development of PCK (Baumert *et al.*, 2010:167). Intellectual quality (CK and PCK) accounts more for learners' rating scores of teacher effectiveness than other factors such as learning environment and significance (Lumadi & Acquah, 2014:2861).

At one extreme, certain higher education pedagogues, such as Colander (2004:63), hold the view that content, and not delivery, determines whether one is a good teacher or not. Hermanowicz *et al.* (1985:10) agrees that the effectiveness of Economics instruction and the enhancement of learners' learning are directly related to the teacher's command of the subject. However, an understanding of content matters for teaching, but what constitutes understanding of content is only loosely defined (Ball *et al.*, 2008:389).

Valletta *et al.* (2014:708) provides a counterargument and cautions that content expertise may have a detrimental effect on a teacher's ability to impart knowledge at a suitable level for the high school curriculum. Even though the learners of teachers with more Economics modules in college obtained higher scores in multiple-choice tests, learners of teachers with advanced degrees in education scored better essay type questions. This suggests that CK alone adds less value to teaching a specialised subject than PCK (Valletta *et al.*, 2014:696) and may be explained by the criticism that the subject content knowledge prescribed in

certain university courses is sometimes too abstract for teachers to teach to school learners, and therefore may hinder student teachers' understanding of the subject taught at school (Nilsson, 2008:1290). These studies suggest that teacher education must be balanced between CK and PCK and continuously linked to practice (Boyd *et al.*, 2009:11).

2.4.3 Critique of PCK

PCK is, however, not accepted by all pedagogues as the only determinant of a quality teacher as some suggest that it fails to describe the ideal method of classroom teaching (Berry *et al.*, 2008:1272). Ball *et al.* (2008:389) is of the opinion that PCK is underspecified and the term lacks definition and empirical foundation. More research is needed on PCK as the transformation of subject matter knowledge, focusing on different subjects as well as different topics within a subject (Abell, 2008:1410).

2.4.4 Research on PCK in different subjects

Research in the field of PCK has been conducted in various school subjects, including Accounting (Fritsch *et al.*, 2015; Schnick-Vollmer *et al.*, 2015), Mathematics (Ball *et al.*, 2008; Blömeke *et al.*, 2013; Blömeke & Kaiser, 2014), Physics (Riese & Reinhold, 2010), Biology (Jüttner & Neuhaus, 2013), Science (Berry *et al.*, 2008; Abell, 2008), English (Grossman, 1990), Business and Economics (Kuhn *et al.*, 2014), Physical education (Ward, 2013) and History (Keirn & Luhr, 2012).

A recent study conducted by Fritsch *et al.* (2015:13) focused on Accounting teachers and the PCK required to teach quality Accounting lessons. The aspects of PCK that were highlighted include knowledge of learners' way of thinking and learner misconceptions; knowledge of tasks as an instructional tool and knowledge of multiple representations and explanations.

Research on PCK for Economics is emerging, as a study by Ayers (2017:2) sought to differentiate between the different types of knowledge utilised by a teacher to teach Economics at a secondary school. Three types of knowledge, namely horizontal content knowledge (the connection of curriculum knowledge with learners' prior knowledge and across current subjects and in previous grades, *ibid.*, 6); specialized content knowledge (the development of critically minded, reflective citizens, *ibid.*, 14) with frequent practical applications of Economic reasoning, *ibid.*, 15); knowledge of content and teaching (the employment of active learning instructional practices, *ibid.*, 15) and knowledge of content and learners (emphasising learner relevance and scaffolding, *ibid.*, 16).

2.5 ECONOMICS EDUCATION

The first sub-section of the review of literature on Economics provides a historical overview of the development of Economics education (2.5.1), followed by suggestions for the preparation of Economics teachers (2.5.2). A synopsis of teaching strategies for Economics teaching is provided in the next section (2.5.3) and this section concludes with an overview of the perspectives on the teaching of Economics (2.5.4).

2.5.1 Historical development of Economics education

The Joint Council on Economic Education was established in 1949 to improve the quality and increase the quantity of Economic education in the USA's schools, from kindergarten through grade twelve (Hermanowicz *et al.*, 1985:5). The Joint Council's primary goal is to train teachers how to teach Economics more effectively.

In 1985, the *Basic Recommendations for Economic Education for Future Elementary and Secondary Teachers*, based on the necessity for all prospective teachers to be given Economics education, were submitted to the Joint Council on Economic Education. This report did not distinguish between teachers of Economics and teachers of subjects other than Economics, but emphasised the fact that regardless of what subjects or grade levels a teacher is expected to teach, without a background in Economics, a prospective teacher would not be able to advance the academic understanding and achievement of their learners (Hermanowicz *et al.*, 1985:10).

Generalisations made with regard to the current state of Economic education in the USA argue that the *Voluntary National Content Standards in Economics* influences the content taught in Economics, teachers remain poorly prepared to teach basic Economics and, children, as well as adolescents, are able to learn basic Economics (Clark *et al.*, 2009:2). In recent years financial literacy has been given greater attention as part of Economic literacy and Economic education (Clark *et al.*, 2009:1; Van Wyk, 2014:754).

Economic education enjoys importance on an international level. The USA, Australia, England, Japan and Korea have established national organisations and academic journals in the field (Watts & Walstad, 2010:410). These four nations face similar challenges with regard to Economic education in secondary schools. Economics is usually an elective course and therefore not given as much emphasis in the school curriculum compared to subjects such

as Mathematics and adding to these dilemmas, teachers are often not adequately prepared to teach Economics (Watts & Walstad, 2010:411). Australia boasts the most academic journals focusing on Economic education, both in terms of depth and breadth. In England and Korea, there is more involvement by teachers and a greater focus on secondary school Economic education (Watts & Walstad, 2010:412).

There seems to be little research on Economics teaching in South Africa, especially in disadvantaged schools. Student teachers with disadvantaged backgrounds are almost certain to return to their communities when they graduate as teachers (Maistry, 2001:160). According to Van Wyk (2014:754), Economic education in South Africa should focus on the scholarship of teaching and learning Economics as a subject with the purpose of preparing responsible citizens who are able to make effective decisions and contribute to our nation's economy. Economics education in South Africa is vital to enhance the quality of teaching and learning of the subject (Van Wyk, 2014:758).

2.5.2 The preparation of Economics teachers

A teacher is unable to teach what he/she does not know (Spaull, 2013; Taylor, 2014) and therefore programmes to help to prepare Economics teachers have been developed. These programmes primarily focus on Economics education at tertiary level for post-graduate students (Salemi, 2003; Clark *et al.*, 2009; Sheridan *et al.*, 2014; Milkman & McCoy, 2014). These take the teacher's subject content knowledge as a given, and focus on the pedagogical aspects of teaching Economics. The content included in these preparation programmes provide an insight into what prospective Economics teachers need to be able to do to teach the subject effectively. Clark *et al.* (2009:1) reports on research done on the teaching of pre-college Economics since the 1970s, and found that the typical topics dealt with curriculum, materials, demographics and effectiveness of teaching techniques, focusing on teacher preparation and subsequent student learning to ensure improved understanding of Economics.

Additional examples of programmes for the preparation of Economics teaching include a *Model Teacher Training Programme* specifically aimed at novice teachers of Economics (Salemi, 2003) and a *Primer for New Teachers of Economics* (Sheridan *et al.*, 2014) with various tips and techniques for inexperienced teachers of pre-college Economics. Milkman and McCoy (2014) evaluated nine universities' programmes aimed at preparing graduate

students to teach Economics as an associate instructor². A study of these programmes revealed the most important content to be included in preparing individuals to teach Economics. More attention is given to this in the following sections.

Institution specific teaching policies and regulations regarding teaching (Milkman & McCoy, 2014:25) are necessary to guide instructors, as well as stipulate unacceptable behaviour (Salemi, 2003:455) to help the instructor develop his/her own teaching philosophy (Sheridan *et al.*, 2014:841). Prospective Economics instructors should be given the opportunity to present micro teaching lessons (Salemi, 2003:455) or warm ups (Milkman & McCoy, 2014:25) to give them some practice in classroom teaching.

Learning theory provides information on the background of students and their learning preferences and this information guides the instructor in selecting the most appropriate media for teaching (Salemi, 2003:455). Active learning strategies, where the students are actively involved in the lesson and the instructor engages the students in constructing the content, is a valuable aid to improving the teaching and learning of Economics (Watts, 1998; Walstad & Saunders, 1998; Salemi, 2003; Salemi, 2003:455).

Assessment is a crucial part of the learning process and therefore instruction on assessment strategies should be included in teacher preparation programmes (Salemi, 2003:455; Milkman & McCoy, 2014:25; Van Wyk, 2014:754). Lecturing is the teaching strategy most frequently employed by Economics lecturers (Watts & Becker, 2008:285) and therefore aspiring instructors should be informed about the strengths and weaknesses of lecture (Salemi, 2003:455), as well as an overview of effective lecturing techniques (Milkman & McCoy, 2014:25), ensuring that relevance is always clear (Sheridan, 2014:846).

Economics instructors should be able to design a course (Salemi, 2003:455) by using learning objectives (Milkman & McCoy, 2014:25) and employ the content to be taught in such a way so as to ensure optimal student learning (Van Wyk, 2014:754). Economics instructors ought to be visited by their mentors (Salemi, 2003:455; Milkman & McCoy, 2014:25), where after feedback on their teaching should guide and empower them to continuously develop and improve their teaching practices (Sheridan *et al.*, 2014:848). Finally, information regarding classroom management is especially useful for novice

² The term 'instructor' is used when referring to graduate students who are expected to teach Economics at universities. Since these individuals are not pursuing a degree in teaching, but in Economics, the term 'instructor' is used rather than 'student teacher'.

instructors to ensure a smooth-sailing teaching and learning journey (Sheridan *et al.*, 2014:842).

2.5.3 Teaching strategies for Economics

A 2005 survey revealed that the most popular form of instruction in US higher education is class discussion, with infrequent use of cooperative and active learning techniques (Watts & Becker, 2008:283). Compared to other lecturers, economists prefer to lecture or to use what is commonly termed 'chalk and talk' (Watts & Becker, 2008:285). However, active and interactive learning help students to learn Economics more deeply, and the use of technology, such as clickers, are useful means of encouraging active learning (Sheridan *et al.*, 2014:845). There seems to be agreement that new Economics teachers should be directed towards a variety of lecturing strategies and teaching methods for Economics (Van Wyk, 2014:754; Milkman & McCoy, 2014:21).

Siminica and Traistaru (2013:4) views self-directed learning (SDL) in Economic education as the foundation of lifelong learning. The utilisation of SDL in Economic education tasks the student with taking responsibility for his/her own learning needs and engagement in the dynamic process of SDL necessitating problem-solving (Siminica & Traistaru, 2013:9). Tang (2011:36) suggests a Piagetian-Bloomsian approach to teaching Economic concepts at undergraduate level. This approach is rooted in the Piaget's and Bloom's theories with a realist-constructivist view whereby students are actively engaged in the teaching and learning process in order to develop their analytical and creative skills (Tang, 2011:37).

In terms of secondary school Economics teaching, Finkelstein and Hanson (2010:4) reported statistically significant improvements in learners' learning after a problem-based approach to Economics instruction in high schools was implemented. The South African school curriculum that is set out in the Curriculum and Assessment Policy Statement (CAPS) emphasises a problem-based approach to teaching and the use of active and critical teaching methods (CAPS, 2011:4). This is in line with Maistry (2011:126) who identified the signature pedagogy of Economics as problem solving, which accords with the nature of the discipline.

After surveying 1 201 secondary school Economics and social studies teachers, Clark *et al.* (2009:9) found that Economics teachers used a different pedagogy from their social studies colleagues, which indicates that Economics teachers have a signature pedagogy (Shulman, 2005:52) for teaching Economics. Economics teachers favour small group work rather than

whole group instruction and there is widespread agreement on definitions and principles as a result of the *Voluntary Content Standards for Economics* (Clark *et al.*, 2009:10).

Woldab (2013:202) suggests a constructivist approach to teaching Economics, where learners' autonomy and high level thinking is encouraged. Inquiry-based activities in a collaborative learning environment can lead to better results in examinations (Yamarik, 2007:275), as learning from other learners and discussing work with group members enhances learning.

Active methods (such as simulations, games, class discussions, jigsaws) of teaching Economics and constructivism as the learning theory are the preferred approaches to teaching Economics in high school social studies classes in the USA (Joshi & Marri, 2006:199). Watts (2005:5) contends that instructional materials, as well as increased teaching time, have a positive influence on the learning of Economics, while Clark *et al.* (2009:1) specify that young people should be taught by knowledgeable teachers using well developed curriculum materials to ensure optimal learning of Economics.

The *Journal of Economic Education* is a useful tool for teachers of Economics, even though the focus is primarily on college or post-secondary Economics teaching. The Journal has specific categories, which focuses on research in Economic education, Economic instruction, content and online teaching aids. Other resources for Economic educators³ include books compiled by leading pedagogues in the field of Economics.

Examples of such books include resources for interactive methods for teaching Economics by Salemi and Walstad (2010) titled, *Teaching Innovations in Economics*, which provide practical examples for the application of interactive instructional methods in college and post-secondary Economics teaching. In *Teaching Economics* Becker *et al.* (2006) provide alternatives to the prevailing method of 'chalk and talk'. These include teaching methods used by teachers of Economics, especially at college and university level such as cooperative learning, classroom experiments and distance learning strategies. In 2010, Simon W. Bowmaker put together essays from teachers of Economics resulting in a comprehensive volume aptly titled *The Heart of Teaching Economics* in which Economics teachers' memoirs provides insight into what motivates teachers of Economics and drives their passion for the subject.

³ Secondary school teachers of Economics and Economics lecturers.

Various researchers emphasise the contribution technology can make to the methodology of Economics education. Moryl (2014:284) suggests the use of podcasts to teach Economics, as it can broaden the reach and appeal of Economics courses. Swan and Hofer (2011:90) encourages the use of podcasting in Economics to disseminate the curriculum to enhance pedagogical efficiency, supplement course material, enhance the clarity of direct instruction, and assess the degree to which content has been understood. They found that podcasting allowed teachers to engage and motivate their learners in the study of Economics (*ibid.*, 90). Memes make use of crowdsourcing to gather Economic concepts which are then infused with humour and made available for use to teachers, students and the general public (Engel *et al.*, 2014:75).

Al-Bahrani and Patel (2015:56) suggests the incorporation of Twitter, Instagram and Facebook in Economics lectures at universities and colleges, as they believe that social media can provide a new way of sharing ideas with students. The benefits of using social media include direct communication with lecturers, improved learning experiences through posting relevant Economics articles and videos, increased collaboration between students, and more active student participation in the learning process as well as more enjoyable learning (Al-Bahrani & Patel, 2015:65). Bista (2015:97) found that participants who used Twitter reported positive experiences as they were able to engage in class discussions, projects, course announcements, thus encouraging active collaboration and participation in the learning process.

Blogs and Wikis are alternative forms of ICT that can help to enhance the teaching of Economics (Cameron, 2012). There are various apps, such as study aids, calculators, data, events, feedback, quizzes and simulations, which can capture and sustain students' interest during the teaching of Economics: students have fun engaging in Economic apps, and therefore their learning and retention increases (Cohran *et al.*, 2015:231).

2.5.4 Perspectives on the teaching of Economics

Research is lacking on the view of Economics teachers regarding the curriculum they are expected to teach, their teaching strategies as well as their opinions on public issues (Clark *et al.*, 2009:3). PCK is a combination of internal constructs and external expressions compiled by what a teacher knows and does, as well as the reasons for a teacher's actions, and therefore the complexity of PCK cannot be ignored (Rahman & Scaife, 2006:83).

Maistry (2011:123) embarked on a *Critical Economics Education project* in an effort to emancipate student teachers, who are under the false impression that they lack the capacity or potential to contribute to change in society. With specific reference to the global Economic crisis in 2009, Maistry (2011:122) deems the current business education disciplines as insufficient to address current socio-Economic issues. He therefore encourages teacher educators to acknowledge their role as active participants in the use of the curriculum as a vehicle for social transformation (Maistry, 2011:119).

Colander (2004:65) contends that a good teacher 'indoctrinates a learner' since they are 'empty' vessels to be filled. Van Wyk (2014:754) strongly contests this view stating that teachers are not tasked with indoctrinating learners, but with providing knowledge foundations which encourage learner opinions and decision making skills.

Focusing on Economics teaching in South Africa, Van Wyk (2010) conducted a study to determine the factors that influence Economics teachers' choice of didactic principles for Economics teaching. He found that learner centeredness, assessment, problem-solving, (crucial thinking and creativity, differentiation, individuality and activity), and classroom management practice were the main aspects that influenced South African Economics teachers' teaching (Van Wyk, 2010:116).

2.6 THEORETICAL FRAMEWORK

The theoretical framework of my study (Merriam, 2009:66) focuses on the curriculum. It poses the questions of curriculum stipulated by Dillon (2009) and looks for answers in the content of PGCE for Economics curricula.

Following an in-depth analysis of studies conducted by curriculum theorists, Dillon (2009:343) proposes three orders of questions relating to the nature, elements and practice of curriculum in order to formulate an answer to the great questions of 'curriculum'. All the questions of curriculum are located within education (ibid., 348). The scope of this study is limited to the elements of the PGCE Economics pedagogy curriculum. It is aimed at answering the main question posed by Dillon: "What are the things that compose it?" (ibid., 344).

The elements of curriculum encompass the basic things that must be included in a curriculum. For the purposes of this study, the following elements were investigated (ibid., 346):

(a) Subject matter – What?

What is the nature and content of the subject-matter included in the curricula?

In order to determine what knowledge is considered as having the most worth, the nature and content of the subject matter were analysed.

(b) Aim – Why? To what end?

What is the purpose of the curriculum? What do curriculum developers (teacher educators) hope this curriculum will achieve?

In order to determine what teacher educators aimed to achieve, the intended module outcomes of each curriculum document were analysed.

(c) Activity – How?

What means, methods and actions are required by the student and the teacher?

In order to determine the nature of the actions of the teacher educator, the focus was on elements in the curriculum documents related to the delivery of the module, as well as teacher educators' reflections on their teaching of the module.

These questions guided the methodology of this study. The nature of the PGCE Economics methodology module was analysed (What is taught?) together with the conceptualisation of the profile of the ideal Economics teacher sketched by the module outcomes (What should that result in?), and the espoused delivery of the module (What teaching methods are employed?).

The second question of Ornstein's fifteen basic curriculum questions (1987, as quoted by Dillon, 2009:354), namely "What philosophies and theories are we communicating, intentionally or not, in our curriculum?" were posed to determine the underlying theoretical influences that guided teacher educators when compiling and teaching of the Economics methodology modules.

2.7 CONCLUSION

It appears that various studies have been conducted to determine the causes of and recommend possible solutions for the parlous state of education in South Africa. Studies regarding teacher education reveal not only the importance of adequately prepared teachers, but highlight the necessity of having competent teacher educators who can help student teachers develop professional identities.

The value of PCK for teacher education was illuminated and disassembling it provided a valuable starting point for an exposition of the knowledge and skills required by prospective

teachers. However, current research on PCK lacks subject-specific direction. It also offers too much scope for subjective interpretation by teacher educators and developers of teacher education programmes. The importance of Economic education and the urgent need for effective preparation of future Economics teachers highlights the need for this area to be researched in South Africa.

The next section will elaborate on the research design and methodology that was employed for this study.

CHAPTER 3

RESEARCH DESIGN

3.1 INTRODUCTION

The literature review in the previous chapter emphasised the importance of teacher education and the role of teacher educators. It seems that various factors influence the teaching practice of and curricula selected by teacher educators. This chapter will focus on the research methodology and methods employed to respond to the research questions.

The primary research question sought to determine teacher educators' perspectives on the PCK required for secondary school Economics teaching. The secondary research questions supplement the primary question by looking at the profiles of Economics teacher educators, the approaches used for the selection of content for Economics methodology modules, and the nature and delivery of these modules. They also explore the theoretical influences that underlie PCK for Economics teaching.

The primary aim of this study was to elicit the perspectives of teacher educators responsible for preparing future secondary school Economics teachers. This was achieved by determining the content included in Economics methodology curricula and the teacher educators' rationale for including these aspects. The unification of content and guiding motives provide details of the theoretical influences which inform Economics methodology teaching at South African universities.

The qualitative research design (3.2) employed is discussed in the subsequent section, followed by the research methodology (3.3) and research paradigm (3.4). The rationale and criteria used to select research participants are discussed in section 3.5, followed by the process of data generation (3.6), the semi-structured interviews (3.6.1) and the curriculum documents (3.6.2). The methods employed to elicit the data is discussed in section 3.7. Interpretive phenomenological analysis was used to analyse the interviews (3.7.1) and qualitative content analysis for the curriculum documents (3.7.2). The sections that follow provide details regarding issues of validity and trustworthiness (3.8), as well as my role as researcher (3.9). The chapter concludes with ethical considerations of the study (3.10) as well as a conclusion of the chapter (3.11).

3.2 RESEARCH DESIGN

The research design is the plan that gives direction to the study and sets out how the responses to the research questions will be obtained (Patton, 2015:244). The research design is guided by philosophical assumptions and specifies the participant selection, as well as methods of data collection and analysis (Nieuwenhuis, 2007:70; Punch, 2009:112). The key features characteristic of the qualitative research (McMillan & Scumacher, 2014:345) in this study are direct data collection, since I personally conducted the interviews, and a combination of inductive and deductive analysis (Patton, 2015:11; Kelly, 2012:101), exploring the significance attributed to participants' perspectives, and acknowledging the complexity of understanding (McMillan & Schumacher, 2014:348).

Figure 3.1 provides a graphic representation of the research design employed in this study. In the following paragraphs, the key elements of the research design are explained: the methodology, the paradigm, participant selection, data generation and data elicitation.

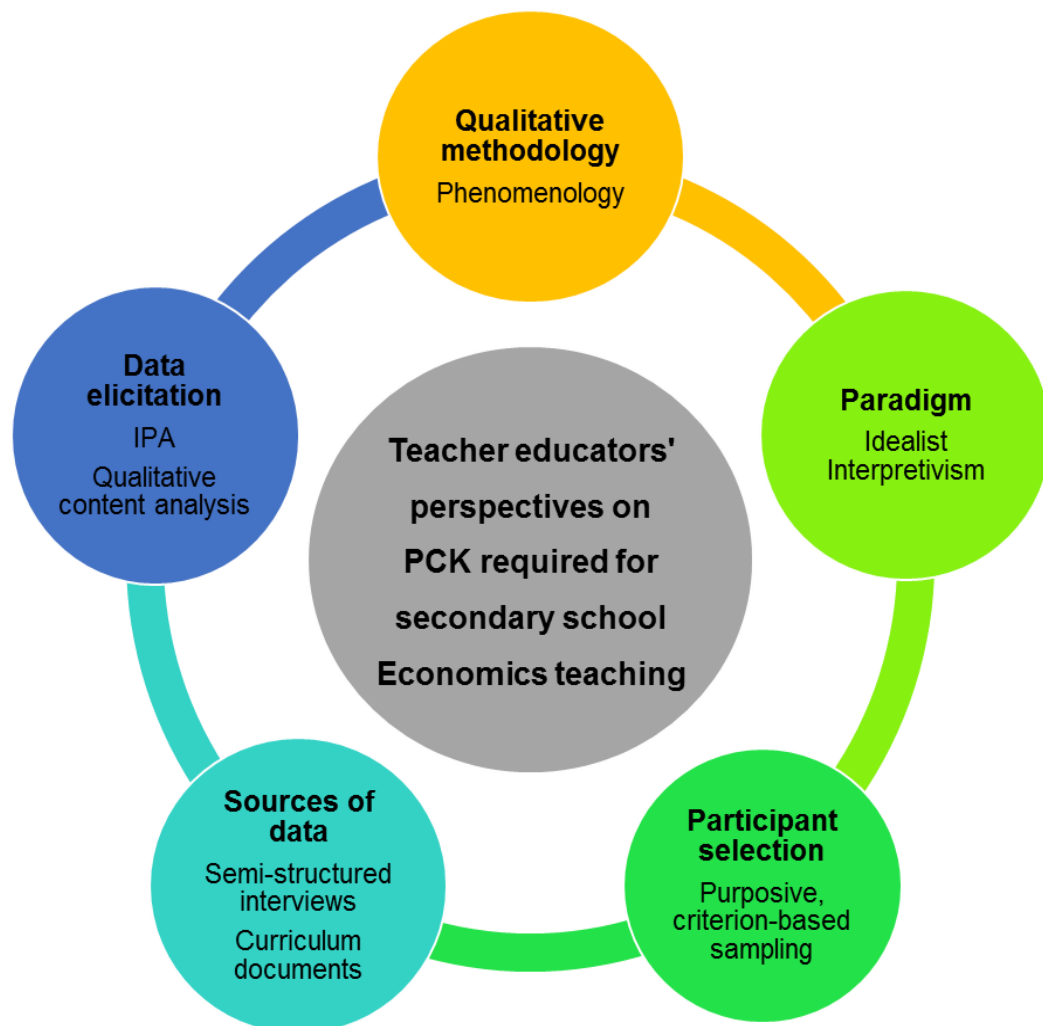


Figure 3.1 Research design

3.3 QUALITATIVE RESEARCH METHODOLOGY: PHENOMENOLOGY

Qualitative research sets out to collect rich descriptive data with regard to a certain phenomenon, with the intention of developing an understanding of what is being studied (Nieuwenhuis, 2007:50). The qualitative approach seeks to elicit the meaning that people attach to everyday life, as well as identifying the participant's beliefs and values that underlie the phenomena. It is therefore concerned with describing and understanding, rather than explaining or predicting human behaviour (Fouché & Delpont, 2013:65).

Phenomenology was chosen as a methodology, since it is concerned with the study and understanding of experiences from the perspectives of individuals (Pringle *et al.*, 2011:8). According to Van Manen, (1990:9), “[p]henomenological research is the explication of phenomena as they present themselves to consciousness.” The purpose of this study was not to objectively generalise findings, but rather inquire into the life-worlds of individuals and interpret the experiences that have influenced their view of Economics education and the requirements that prospective Economics teachers should meet, whilst acknowledging subjectivity and personal knowledge construction.

The word ‘phenomenology’ is derived from Greek, meaning ‘to bring to the light’, and as a research approach it allows the researcher to go beyond the superficial to look at individuals’ life experiences and understand the meanings ascribed to these experiences (Pringle *et al.*, 2011:8; Smith, 2013). The history and development of phenomenology show that it is dynamic. This made it the ideal approach for my study. I discovered the importance of valuing each participant’s response equally, without regard to whether their interpretation of his/her experience was correct or not.

The purpose of a phenomenological study is to describe and interpret the lived experiences of participants regarding a particular event in order to understand the meanings that participants ascribe to that event (Lavery, 2003:4; Groenewald, 2004:5; McMillan & Schumacher, 2014:372). Since the research participants’ ‘reality’ is not accessible to the researcher, the researcher focuses on the dialogue solicited by means of loosely structured interviews (Van der Mescht, 2004:15). There is a close relationship between the phenomenological methodology and the interpretivist paradigm, since epistemologically, phenomenological approaches are situated in a paradigm of personal knowledge and subjectivity, and emphasise the importance of personal perspective and interpretation (Smith, 2013).

3.4 RESEARCH PARADIGM: IDEALIST INTERPRETIVISM

This study was situated in an idealist interpretive paradigm which focuses on descriptions of individuals and unique realities, whilst viewing reality as a mental construct, which cannot exist independently of participants' perceptions and their experiences of reality (Schnelker, 2006:45). In education, the interpretive paradigm allows researchers to construct understandings of the life-world experiences of teachers and students (Taylor & Medina, 2013), with the intension of analysing and explaining phenomena (Adamson & Morris, 2014:319). Interpretivist methods rely on naturalistic methods of inquiry such as interviewing and analysis of existing texts (Cohen & Crabtree, 2006). The characteristics of the idealist interpretive paradigm according to meta-theoretical assumptions that I applied in my study are provided in Table 3.1.

Table 3.1 Characteristics of the interpretive paradigm

Meta-theoretical assumptions	Idealist interpretivism
Ontology	Teacher educators and their life-worlds and experiences are inseparable (Weber, 2004:5). Individuals' knowledge, values and experiences are respected as unique, meaningful and worthy of exploration (Byrne, 2012:209). Reality is a mental construct and cannot exist independent of participants' experiences of reality (Schnelker, 2006:45).
Epistemology	Knowledge is subjectively constructed by the lived experiences of teacher educators (Cohen & Crabtree, 2006). Data is contained in the perspectives of people. Knowledge construction is intersubjective (Taylor & Medina, 2013): the researcher uses her own subjective experiences to develop an empathetic understanding of the feelings and perceptions that influence participants' sense-making (Schelker, 2006:45).
Research objective	Research objective is to determine perspectives of teaching as influenced by experiences of teaching. Research is concerned with people's lived experiences and how they reflect on these. Research is a process of meaning-making and

	constructing knowledge.
Methodological approach	Hermeneutics and phenomenology – inquiring into lived experiences (Weber, 2004:4). Naturalistic, ethnographic and interactive methods of data collection, such as interviewing are employed (Cohen & Crabtree, 2006; Schnelker, 2006:45).

3.5 PARTICIPANT SELECTION

The sources of information used by qualitative researchers include individuals, groups, documents, reports and sites, but regardless the form of the data, purposeful sampling is used, since the purpose is to select information-rich cases for analysis (Patton, 2002:242; McMillan & Schumacher, 2014:348). Therefore, in order to understand teacher educators' perspectives on Economics education, I purposefully selected the participants for this study (Cohen *et al.*, 2011:156; Maree & Pietersen, 2013:178; Creswell, 2014:227 Patton, 2015:283; Merriam & Tisdell, 2016:97).

My study was situated in the higher education environment and the sample for my study was traditional government funded South African universities (Lategan, 2009:62) that offer Economics in the PGCE curriculum. After studying the yearbooks of all the traditional government funded South African universities (11 in total), five universities were selected based on the PGCE for secondary school Economics programmes being offered. Issues of accessibility of the curriculum content also played a role in participant selection. My supervisors provided guidance in this regard.

The first source of data was semi-structured interviews with the teacher educators at the selected universities and the second source was the content of the Economics methodology modules.

3.5.1 Selection of teacher educators

The criteria used to select the participants of my study was that they were required to teach, or have teaching experience, in the Economics methodology module for PGCE students at the selected university. A total of five participants who met these criteria were selected as participants. These teacher educators, who were responsible for preparing future secondary

school Economics teachers, were the experts on the phenomenon being studied, namely Economics education (Bailey, 2014:169; Smith *et al.*, 2009:49).

3.5.2 Selection of curriculum documents

Curriculum, in this study, will focus on the narrow curriculum perspective, and more specifically the 'explicit' or 'planned' curriculum (Graham-Jolly, 2013:232). It is essential for the scope of the curriculum to be included when analysing curricula (Aesaert *et al.*, 2013:133), and therefore the analysis of the documents focused on the content, scope or outline of the curriculum as stipulated in the study guide or other available documents. Curriculum here was thus reduced to a policy artefact, a written document (in the form of a single module), expected to be implemented and taught to student teachers (Du Preez & Simmonds, 2014:11).

3.6 PROCESS OF DATA GENERATION

According to Patton (2015:14), qualitative findings are based on three kinds of data, namely in-depth open-ended interviews, direct observations and written communications. In my study, I worked with two of the three kinds of data, namely interviews and documents. I gathered documents in the form of curriculum content for PGCE Economics methodology curricula and conducted interviews via Skype with teacher educators tasked with preparing prospective secondary school Economics teachers.

3.6.1 Semi-structured in-depth interviews

Similar studies that set out to discover the perceptions of teacher educators chose interviewing to collect the data in the majority of studies and data was interpreted qualitatively with an interpretivist paradigm (Tillema, 2007; Katyal & Fai, 2010; Mayer *et al.*, 2011; Daniel & Peercy, 2014).

The continuous professional development of teacher educators can be achieved through collaboration between colleagues (Livingston, 2014:219). As a young Economics teacher educator, I was keen to learning from my more experienced peers in order to enrich my own teaching and shape my perspectives of Economics teaching. The process of reflecting on experiences of teaching Economics could improve my teaching practice as a teacher educator (Luttenberg & Bergen, 2008:543; Livingston, 2014:224; Körkkö *et al.*, 2016:199).

3.6.1.1 Interviews in social research

Interviewing, which entails a conversation with a purpose of obtaining certain information, can be viewed as one of the most common means of data collection in qualitative studies (Merriam, 2009:86). The interview is a flexible tool for data collection, enabling multisensory channels to be used: verbal, non-verbal, spoken and heard (Cohen *et al.*, 2011:409).

3.6.1.2 Conducting semi-structured in-depth interviews

Semi-structured in-depth interviews are the most frequent form of data collection for studies employing IPA (Clarke, 2009:38) as it is seen as the best way by which the lived experience of individuals can be communicated (Griffin & May, 2012:450). Since reality is constructed by individual, diverse mental constructs, the interview questions have to be open-ended, with a list of topics to be discussed (See Addendum D for an example of the interview schedule). In the case of this study, the semi-structure interview encouraged relaxed dialogue between the research participant and me, and enabled me to become attuned to subtle differences in the participant's position and to respond to the experiences on which the participant reflected (Merriam, 2009:90; Cohen *et al.*, 2011:412).

A pilot interview was conducted a week before commencing with the interviews. This was conducted with someone not included in the official sample. Breakwell (2006:240) emphasises the importance and value of a pilot interview as it helps to ensure that the participants understand what is required of them and that the focus remains on the main research issue. After the pilot interview was conducted, I reflected on the participant's response and amended the interview schedule in the following ways:

- Since the consequent questions elaborated on this concept, I provided a brief introduction to Pedagogical Content Knowledge to ensure that all participants were familiar with the term. I also provided the participants with the background to the study and set the scene for the rest of the interview.
- The order of questions was adapted. This meant that the participants were asked about their teaching philosophy only after they had provided information on their background and qualifications, and how their background and teaching and experience had shaped their current teaching.
- I included a more direct question on how the participant's experiences had influenced their current teaching and asked them to explain which experiences have had the most influence, giving reasons. My intention was to encourage teacher educators to reflect on their experiences.

- I removed a question related to the current state of schooling in South Africa, since it was not relevant in this study. The question regarding the state of Economics education in South African schools meant that the participants remained focused on the main issue.

It became clear that the teacher educators were diverse individuals. Some had never been interviewed as part of a research project before. One teacher educator agreed to participate in the study, on condition that the interview questions were provided beforehand. This teacher educator therefore had the opportunity to study and think through his responses. His answers provided more depth than the other teacher educators, who did not have the questions beforehand. The teacher educators without the questions were more spontaneous in their responses.

One interviewer requested that the interview be conducted in his home language, namely Afrikaans. I did not make use of a professional translator, as Afrikaans is my home language. I first transcribed the interview in Afrikaans and then translated the transcription into English myself. Considering the interpretive nature of translation, I focused on the meaning the participant ascribed to his experiences (Al-Amer *et al.*, 2016:155). Since this process can be viewed as multilingual research, but not multicultural research, cultural issues associated with translation were limited (Im *et al.*, 2016:146).

3.6.1.3 Reflection on interviews via Skype

Skype provides video chat and voice call services via the internet. Initially I was very excited about using Skype, but I soon realised that this method of conducting interviews presented some difficulties. Connection problems occurred frequently, and it delayed the time the interview started. Almost all participants experienced problems with the audio or visual aspects of Skype, which meant we were either not able to see or to hear each other. However, the nature of the data was not affected by the lost audio. After the interviews, I realised that transcribing the interviews was challenging, since the quality of the sound was inconsistent.

Another problem was that not all research participants had the Skype software installed on their computers or were familiar with using Skype. In order to overcome this challenge, a telephonic interview was held with one participant, and a face-to-face interview with another. During the struggle to get Skype started, I sensed that this process contributed to participants feeling uncomfortable before the interview commenced. It made me very aware

of the importance of making a participant feel comfortable and at ease before an interview if candid and sincere answers are expected.

Reflecting on all the interviews conducted, I once again realised that no two teacher educators were the same. Some participants gave short and to the point answers, while others used the opportunity to elaborate and share personal experiences (Cohen *et al.*, 2011:409). It seemed that participants with more research experience gave concise answers, whereas participants with more secondary school teaching experience enjoyed elaborating on their histories and experiences.

3.6.2 Curriculum documents

3.6.2.1 Documents in social research

Documents are ready-made sources of data easily accessible to the imaginative and resourceful investigator (Merriam, 2009:139), although few studies have been conducted in which the versatile role of documentation was fully utilised (Prior, 2012:427). Bowen (2009:28) emphasises the versatility of documents in a qualitative approach, by stating that “documents are a useful source of data that can be used in conjunction with other methods”. In a study conducted by Daniel and Peercy (2014:102), observation of teacher educators as well as course materials was used generate data during an investigation of teacher educators’ perspectives of teaching student teachers.

3.6.2.2 Curriculum documents of Economics methodology modules

The content of the curriculum documents provided insight into the specific skills or content teacher educators expect prospective secondary school Economics teachers to master (Sheridan *et al.*, 2014:841). Documents can be viewed as realities in themselves which are socially constructed in some way (Gidley, 2012:271), and therefore the curriculum related documents are likely to carry rich information and relate to the theoretical and philosophical orientation of the writer, in most cases the lecturer responsible for teaching the module. In order to determine the philosophical underpinnings of the PGCE Economics methodology curricula, the ‘archaeological’ approach was used to explore how the document came into being (Prior, 2012:428).

I found that in some instances the teacher educators were not the original constructors of the curriculum documents. In these instances, I attempted to find out how they interpreted these pre-scripted curriculum documents and to what extent these documents resonated or were in conflict with their own thinking about Economics teaching.

3.7 METHODS OF DATA ELICITATION

Qualitative data analysis is primarily an inductive process of organising data into categories and identifying patterns and relationships among the categories (McMillan & Schumacher, 2014:395). The two sets of data, namely the documents and the interviews were analysed using different techniques to facilitate the triangulation of results and to increase the validity and reliability of the study. IPA was used for an inductive analysis of the interviews, and qualitative content analysis for a deductive analysis of the curriculum documents.

3.7.1 Interpretive Phenomenological Analysis (IPA)

IPA aims to explore and understand the meaning of an experience from the participant's point of view (Clarke, 2009:37; Smith & Osborn, 2007). It emanates from the philosophy of phenomenology (attempt to understand lived experiences) and the theory of interpretation. While phenomenology uncovers meanings, hermeneutics interprets the meaning (Pringle *et al.*, 2011:21). Since phenomenology is the methodology employed during this study situated in an interpretive paradigm, IPA as a technique for data analysis was well suited to helping me achieve my research aim.

The first process of data analysis through IPA is immersion in and close scrutiny of the material, followed by description, interpretation and finally work across cases to enhance transparency and increase coherence to reveal meanings from the original text (Griffin & May, 2012:450). The approach adopts both emic (insider) and etic (interpretative, outsider) positions, where the insider position enables the researcher to understand the participants' story and experiences and the outsider position allows the researcher to interpret and make sense of the data by allowing her own interpretations and ideas to submerge but ensuring that verbatim quotes are used to ground interpretations in participants' actual experience (Clarke, 2009:39).

Since teacher educators selected for this study have experience in teaching Economics in teacher education programmes and therefore teaching methodology has shaped their opinions and perspectives regarding the competencies that are required by future teachers, I

had to enter the teacher educators' lifeworld and make meaning of their experiences regarding the phenomena of teaching Economics (Griffin & May, 2012:448).

The process of data analysis through IPA is related to the six steps of content analysis (discussed in the following section). However, there is one area of variation. Whereas content analysis suggests the objective coding and categorisation of data in order to build themes, IPA suggests a subjective immersion in the data to allow themes to emerge. The researcher has to play an active role in IPA when trying to understand participants' stories and experiences as an insider, and then interpreting the data as an outsider, whilst acknowledging and valuing the researcher's own interpretations and ideas. This personal involvement of the researcher in IPA, provided the ideal opportunity for myself, a young teacher educator, to learn from my more experienced peers.

3.7.2 Qualitative content analysis

The history of content analysis can be traced to the Second World War and the first book on content analysis was written by Bernard Berelson in 1952 and focused on content analysis in communication research (Prasad, 2008:2). The foundations of content analysis in the human sciences can be traced back to hermeneutics (Mayring, 2014:7), which is related to the methodology and paradigm of this study (ibid., 6). Content analysis has been primarily quantitative in the past, but qualitative content analysis seeks to discover themes and recurring patterns of meaning in the content of interviews and documents (Merriam, 2009:205).

I used a combination of the six steps suggested by Creswell (2014:261) and McMillan and Schumacher (2014:397) for content analysis as a guide, with adaptation of the second and third step. The theoretical framework provided by Dillon's questions of curriculum (cf. 2.6), in conjunction with the research questions of this study, informed the general deductive analysis of the curriculum documents. The six steps were also not applied in a linear sequence, but iteratively, because of the complex nature of making sense of the data:

1. Collection and organisation of the curriculum documents
2. Explorative reading of the curriculum documents and searching for key words related to Dillon's questions of curriculum
3. Infusion of key words from the curriculum documents and the comments of the participants to build themes related to the research questions
4. Representation and reporting of the qualitative findings

5. Interpretation of the findings in relation to the research questions
6. Validation of the accuracy of the findings by referring to the literature.

3.8 VALIDITY AND TRUSTWORTHINESS

Validity of qualitative designs is the degree to which the interpretations have mutual meanings between the participants and the researcher (McMillan & Schumacher, 2014:354). To ensure validity of my study, I compiled a pattern of questions for the interviews to ensure internal consistency, and the interviews were audio-taped to make transcription possible and to ensure validity and exclude personal bias from the interviews (Breakwell, 2006:247). Triangulation of the data was achieved by employing multiple sources of data collection, namely curriculum documents and semi-structured interviews (Merriam & Tisdell, 2016:244; Creswell, 2014:283; Cohen *et al.*, 2011:195).

Some of the suggestions made by Lincoln and Guba (1985) to develop trustworthiness in qualitative research were implemented as well. The interview transcripts were saved to ensure an audit trail that would enhance the credibility of the study (Cope, 2014:90). The interview transcripts were also sent to participants as a means of 'member checking' or 'respondent validation' (Merriam & Tisdell, 2016:246). The participants were given the opportunity to provide feedback on the interview transcripts and to judge the accuracy of the account (Creswell & Poth, 2018:261). This process aided in limiting interviewer bias and ruling out the possibility of misinterpretation of participants' responses (Cohen *et al.*, 2011:185). To ensure confirmability, rich quotes from the participants that depict each emerging theme are provided in the data analysis chapter (Cope, 2014:89).

The comparison of the content analysed in the curriculum documents as well as analysis of the interviews via IPA, not only facilitated triangulation of the data, but also aided in addressing the final research question, namely the theoretical underpinnings of Economic educators regarding PCK for Economics teaching.

3.9 MY ROLE AS RESEARCHER

In qualitative research and especially a phenomenological study, the researcher plays an active role in the research process. IPA recognises the central role of the researcher in making sense of the personal experiences of research participants (Pringle *et al.*, 2011:20). Therefore, my experiences and perceptions were not ignored, but valued. This is evident in my conception of participants' recollection of their experiences and how they have shaped

their perspectives. My teaching background as a PGCE student and young teacher, as well as subsequent years in academia focusing on Economics and management sciences for education, provided a unique lens through which to view the participants' responses and enabled me to relate to their stories.

3.10 ETHICAL CONSIDERATIONS

As suggested by the Ethics committee, the deans of the various faculties of education of each university were contacted and permission was requested to contact the relevant teacher educator to conduct an interview (see Addendum B for an example of the permission letter). After each dean gave permission, I contacted the teacher educators in that faculty and invited them to participate in the study. Before the interviews were conducted, participants were required to complete an informed consent form (See example of informed consent in Addendum C) in which an explanation of the nature of the research was provided, as well as assurance of confidentiality and anonymity (McMillan & Schumacher, 2014:363).

Ethical clearance was granted by the Ethics Committee of the Faculty of Education Sciences, of the North West University, Potchefstroom Campus on 21 April 2016. The ethics number is NWU-00204-16-S2 (Addendum A). The curriculum documents for the Economics methodology module for PGCE students were regarded as property of the university, and therefore I used the guidelines set out on each university's website in terms of the Promotion of Access to Information Act (2 of 2000) to obtain permission to use the content of the curricula in the curriculum documents. This process required me to submit a formal request to the Campus Registrar of each university for permission.

The Campus Registrars, or their proxies, provided me with the documents in electronic format, mostly scanned in from a study guide or module outline. I password protected and saved these documents. Since the communication was primarily via e-mail, and replies were delayed at times, the collection of the documents was not a linear process. It took three months to complete. Anonymity was ensured by using pseudonyms for the teacher educators, as well as the universities.

3.11 CONCLUSION

This chapter provided the background on the methodological aspects of the study, particularly the research design, methodology and paradigm guiding the inquiry. Issues

regarding participant selection, data generation and analysis methods and the role that I played during the study were explained in detail. Ethical considerations as well as quality issues relating to validity and trustworthiness of the study were discussed.

The next chapter provides an explanation of the application of the methodological aspect of the study in particular how I went about collecting and analysing the data. The IPA of the interviews held with teacher educators is used to shed light on how teacher educators' experiences have shaped their perspectives regarding Economics teaching. The curriculum documents are analysed using content analysis and the themes that emerged provide insight into the nature of Economics methodology curricula in South African universities.

CHAPTER 4

PRESENTATION OF THE DATA

4.1 INTRODUCTION

In the previous chapter the qualitative research design of this study was outlined. This chapter analyses and interprets the data. The description of the profiles of the teacher educators is based on the inductive analysis of the interviews using IPA. The theoretical framework provided by Dillon (cf. 2.6), as well as the research questions of this study (cf. 1.5), led to the emergence of preliminary themes related to the curriculum documents. These were merged with the comments of teacher educators to form three main themes and a number of related sub-themes.

The presentation of the data is done in four parts. Part A provides a profile of each teacher educator (4.2) through a phenomenological lens. Part B focuses on the first theme, namely the nature of the Economics methodology curricula (4.3) and the related sub-themes. The next part, Part C, elaborates on the nature of delivery of the modules (4.4), and part D explores the theoretical influences that seem to inform the practice of teacher educators (4.5). The chapter concludes with a synopsis of the results (4.6).

PART A

4.2 PROFILES OF ECONOMICS TEACHER EDUCATORS

The teacher educators were required to answer questions regarding their background, qualifications and teaching experience. These responses were used to sketch the profiles. This biographical information on the five teacher educators was used to describe the personality traits of these individuals and how they view their role as Economics teacher educators. In other words, it is used to describe the teacher or to answer the 'Who?' question (Dillon, 2009:345).

Pseudonyms were used for each teacher educator and each university in the interests of anonymity. The first letter of the teacher educator's name is matched with the first letter of the university.

4.2.1 Emily from the Eastern University

Emily's first qualification was a Higher Diploma in Education (HDE) in Commerce followed by a BTech degree. She completed her Master's degree part-time and enrolled for her PhD in 2015. She started her career as an Accounting and Economics teacher at a secondary school. For the past 13 years, she has taught at Further Education and Training (FET) colleges and Universities. Since she started teaching at an FET college, her appointments have varied between part-time and full-time positions and at present she is employed on a contract basis. She believes her teaching experience in a variety of different education contexts has influenced her current teaching.

Emily is passionate about Accounting Education and has made it the topic of her PhD. Since there are not many PGCE students who have Economics as a main subject, she has combined the three commerce modules, Economics, Business Studies and Accounting, into one module, namely the Methods of Commerce module. This draws approximately 20 students. Although Emily is not currently teaching the module, because she has been relieved of her teaching responsibilities so she can complete her PhD, she revealed that she finds the module tiring. She has been teaching the Methods of Commerce since 2011.

Emily considers Economics to be a very important subject which relates to everyday activities and it is part of preparing learners for life. She is concerned about the declining

number of schools that offer Economics. The explanation for the drop in numbers seems to be that the subject is seen as difficult. In Emily's opinion, the ideal Economics teacher keeps up to date with current national and international Economic events, and incorporates these in his/her teaching. Furthermore, an Economics teacher needs additional critical thinking skills in addition to the prescribed seven roles of a teacher. She believes that the main role of an Economics teacher is to encourage learners to start their own businesses in order to contribute to the Economy.

4.2.2 Nicole from the Northern University

Nicole's first qualification was a teacher's diploma in Commerce followed by a further certificate in Accounting. Her MCom focused on web-course management, and her PhD in Sustainable Development and Business Education. Nicole's teaching career began in 1986 as an Accounting teacher. She then taught Economics and Business Studies for 14 years, eight of these years as the head of department (Accounting). After a short time in the private sector, she has filled a number of positions in Higher Education since 1999.

Nicole values her teaching experience because it made her feel confident that she has appropriate knowledge and the ability to deal with different situations in class. Her experience taught her to read widely and integrate various disciplines. Nicole sees herself as a lifelong learner, since she completed a BA and BA Honours in Psychology part-time. Nicole's PhD and current research focuses on sustainable development and business education, and it greatly influences her teaching philosophy.

Nicole had been teaching at the Northern University for nine years and is the only permanent academic staff member responsible for Economics, Accounting and Business Studies in the PGCE programme. Nicole enjoys teaching the PGCE students, since they have solid content knowledge, although she is worried that the number of Economics students has declined over the years. At the time of the research she was not teaching Economics to PGCE students, but was using part-time academic staff as substitutes.

Nicole feels that the unique terminology used in Economics distinguishes the subject from other EMS (Economic and Management Sciences) subjects, and she accentuates the significance of an Economics teacher's attitude towards the subject. She feels that the ideal Economics teacher should be up to date with topical events, due to the dynamic nature of

the subject. Furthermore, she contends that Economics teachers should have an inquiring mind and read widely in order to make their teaching interesting.

4.2.3 William from the Western University

William completed a BEd Honours, an MTech and a PhD which focused on curriculum studies and specifically the integration of Technology in Education. William has been in the education sector for the past 16 years. He spent 10 years teaching Accounting, Economics and Business Studies, although his qualifications focused on the last two subjects mentioned. During his time as a teacher, he also trained fellow teachers in the implementation of the interim curriculum in 2005. William has been at the Western University for the past five years teaching EMS and commerce subjects.

As a former student activist, William is familiar with Apartheid Education and his teaching philosophy encourages change in education. William feels fortunate to have students from diverse backgrounds with good content knowledge and he uses the curriculum as a means of challenging them. William emphasises the importance of Economics as a subject, and feels that the parlous state of the country's economy is the result of poor Economics education.

William believes that teachers have to have sound and extensive Economics content knowledge as well as the ability to relate current Economics events to the content they teach. They also need to have critical knowledge gained from the business world, access to the internet and other current information sources, and have the competence to use technology effectively in their teaching.

4.2.4 Sam from the Southern University

Sam completed his BCom degree in 1980, focusing on Economics, Business Studies and Accounting followed by a Higher Education Diploma in 1981. He has over 32 years of teaching experience, 20 years at secondary school level and 12 years at tertiary level. During this time, he has filled various management positions at secondary schools and at the university.

Sam's methods of teaching changed when he entered the higher education sector. He abandoned the traditional teacher centred approach he had followed as a school teacher and adopted a learner centred approach instead. Sam has been teaching the methods of

Economics module for eight years and he believes that it is essential to set an example for, and to establish good rapport with his students.

Sam feels that Economics is a very important subject for learners, since it can help to improve their Economic well-being. However, he has noticed that the difficulty of the subject dissuades distinction-driven students from enrolling for the subject. Sam considers that the ideal Economics teacher needs to have Economics subject knowledge, as well as knowledge of departmental policies and prescriptions. He feels that an Economics teacher needs the patience to explain difficult concepts, and must be able to fill the various roles prescribed by the NSE.

4.2.5 Carla from the Central University

Carla is a foreign national who has been appointed on a contract basis. She completed her BEd and MEd in her home country and she is currently doing a PhD on higher education methodology. Carla taught Accounting, Business Management and Economics at a secondary school in her home country for five years. She has taught the method of Economics at the Central University for the past three years. Carla values the experience she gained from teaching this module, since it has guided her to adapt and improve her teaching.

Carla's teaching philosophy is learner centred. She believes that the ideal teacher should know how to make it possible for learners to understand what he/she teaches, and also be concerned to understand his/her learners and their developmental needs. Carla feels that Economics is a very important subject, since it helps learners to be self-reliant and become aware of their role in society. Although Carla is not an Economics subject specialist, she regards subject content knowledge as essential for future teachers. She suggests that aspects of Economics content should be included in methodology curricula, since she has found that her students require support in this regard.

4.2.6 Synopsis of teacher educators

Based on the discussion above, one can conclude that teacher educators at South African universities are diverse individuals, with varying backgrounds, qualifications and teaching experience. They all view Economics as a school subject as of utmost importance and are concerned about the declining number of learners who enrol for the subject. Research is regarded as vital by the majority of teacher educators and their research interests have

consequently influenced their perspectives on the nature and purpose of the curriculum. Furthermore, they view subject content knowledge as essential for a prospective Economics teacher, as well as the ability to integrate current events into their teaching.

PART B

4.3 THEME 1: NATURE OF THE CURRICULUM

I chose to start my analysis of the Economics methodology curricula of the five universities by carefully establishing what the intention of each programme was. A feature of each module was the explicit foregrounding of learning outcomes. This approach to curriculum suggests that the module designers identified and selected what they believe to be a useful set of knowledge and skills required by prospective Economics teachers.

The construction of module outlines in various degrees of detail is usually mandatory for most higher education institutions. This tradition has its roots in the way universities understand curriculum (either as highly defined or loosely designed). There has been a trend towards more tightly designed curricula with specific topics to be covered on specific dates and pre-determined outcomes and assessments in the last decade – a swing back towards uniformity and conformity.

The module outcomes driving the curricula suggest a rather prescriptive approach to curriculum where each institution has a predetermined knowledge and skills set that they believe students should acquire or what may be described as a structured, rigid approach to curriculum planning. There appears to be little or no room to explore what students may want to learn or to establish what students already know. There also does not seem to be any provision made to respond to specific student needs or any flexibility to respond to spontaneous occurrences or events in the local or international education context. This is consistent with the comments of teacher educators during the interviews. These comments reflected what the teacher educators expected student teachers to learn or master. There was no mention of students' learning needs or and the role and potential input students could provide in the teaching and learning process.

Three of the five curricula provided module outcomes only. The other two curricula contained additional learning or study unit outcomes that elaborate on the module outcomes stated in the introductory section of the curriculum document. To ensure uniform comparisons, the module outcomes analysed are those mentioned in the introductory section of the course, and not the additional outcomes for each study unit.

After the module outcomes and topics had been analysed, the data were coded and similar codes were grouped together in terms of the frequency of recurrence to determine what

insights they provided into the nature of the curriculum. A similar approach was followed with the topics outlined in the curriculum documents, or included in the planning for the course. Finally, the comments of the teacher educators during the interviews were analysed to find associations between them and the emerging themes from the topics and module outcomes.

The five sub-themes which contained evidence of the recurring topics related to the nature of the curriculum were PGCE curriculum driven by SA school curriculum (4.3.1); developing pedagogic competencies (4.3.2); teaching strategies for Economics (4.3.3); reflective practice (4.3.4); and context-sensitive teaching (4.3.5). In order to distinguish between the prevalence of the topics that formed the themes, the source of the topics from either *interviews*, *module outcomes* or *module topics* were colour coded, and the page number of the interview or number of the module outcome or topic indicated.

4.3.1 Sub-theme 1.1: PGCE curriculum driven by SA school policy

The first sub-theme relates to departmental policy documents, with reference to the National Curriculum Statement (NCS) in general and the CAPS for Economics specifically. There seems to be a variation in the way the CAPS is approached by teacher educators, ranging from strict adherence to departmental prescriptions to the teaching and assessment of Economics to a critique of the prescriptive nature of the CAPS.

Two of the teacher educators view knowledge of the CAPS as essential for an Economics teacher so it drives the content of the Economics methodology curricula.

The content of [the Economics methodology module]⁴ is primarily based on the most important aspects as prescribed in the Curriculum and Assessment policy statement for Economics, as prescribed in 2011. (Sam, p.4)

Even the first year when I was teaching that, I was like man, what are we really teaching here, everything is there in the CAPS. (Carla, p.7)

It is important to be aware that taking account of the background and experience of these teacher educators enriches the analysis of their comments.

⁴ The participant mentioned the module codes of the Economics methodology module. To ensure the anonymity of the participant, the module codes have been removed and replaced with a description of the module to which he is referring.

Sam had the most secondary school teaching experience of all the teacher educators. It is possible that the roles he filled as manager and administrator at secondary schools could all have influenced his strict adherence to prescribed departmental regulations. His comment relates to the first module outcome in the curriculum document of the Southern University, which states:

...have a wide-ranging and systematic basis of knowledge of the National Curriculum Statement and other related departmental policy documents for grades 10-12, and be able to apply it.

As a foreign national, Carla does not have experience teaching in South African secondary schools, and it could explain her reliance on the prescribed curriculum document to guide her teaching of Economics methodology.

Actually everything is there in the CAPS. (Carla, p.6)

Contrary to Sam and Carla's view, Nicole sees the CAPS as only a guide for Economics teachers, and feels that prospective teachers should avoid over-reliance on prescribed resources.

Sometimes we're so, we're so fixated on the curriculum, we're so fixated on the textbook, and the textbook is limited, the curriculum is limited. So you need to, you need to read wider than that. Those are just tools, just tools that gives you some sort of guidance, it doesn't give you all the guidance. (Nicole, p.8)

Nicole has been involved in Higher Education for the past 18 years, more than all the other teacher educators, and she sees herself as a life-long learner (p.3). Her view of the CAPS and other prescribed policy documents as a mere tool relates to her background. She values her experience as it has taught her to *read widely*, whilst she also requires prospective Economics teachers to be *well-read*.

So it's you as an Economics lecturer that needs to go beyond those first set of tools that we have. (Nicole, p.8)

This view relates to the second module outcome in the curriculum document of the Northern University:

Critically analyse the Economics curriculum as documented in the National Curriculum Statement.

Only one teacher educator criticised the constraint CAPS imposes on a teacher's freedom as curriculum maker.

[T]eacher autonomy is no more there. Because of your CAPS document... (William, p.4).

William's role as student activist and his involvement in the compilation of the first school curriculum of a democratic South Africa seems to have influenced his view on the role of a teacher to *influence and change the curriculum*. Contrary to his remark, the second module outcome of the Western University adheres to prescribed education policy on planning for teaching:

Design and present lesson plans that are in line with the annual teaching plan per grade.

This clarifies his explanation that he has *adopted* the modules he is expected to teach (William, p. 5), but is in the process of changing the curriculum.

I think we've got the kind of product we think might work. The ones which speak to the, well you know, your issues of the curriculum. (William, p. 6)

The PGCE curricula at universities appear to be heavily influenced by the content of the CAPS curriculum for Economics. As a result, teacher educators, try to ensure that the student teachers cope with the school curriculum, by following the prescriptions of the CAPS curriculum. Combining the comments of the teacher educators with the content of the Economics methodology modules (module outcomes and topics), it seems that the PGCE programmes have a direct and practical intention, whilst being very parochial as the focus is on the local South African curriculum. This might have direct benefit for local students who intend teaching in South Africa, but it might not be appropriate for international students or adequately equip local students who might want to teach abroad.

The extracts above suggest that the teacher educators' views and use of the CAPS curriculum for Economics vary. On the one hand, Sam seems to rely heavily on the prescribed policy regulations, which relates to Carla's view of the CAPS curriculum as all-encompassing. Emily's view of the CAPS curriculum seems to move away from strict adherence of policy prescriptions towards the integration of the principles of the CAPS curriculum, whilst relating policy requirements to assessment. The criticism made by William regarding the prescriptive nature of the CAPS curriculum suggests a move away from strict

adherence to policy prescriptions, while Nicole cautions against over-reliance of the CAPS curriculum. She views the prescribed policy as a mere tool in the preparation of prospective teachers.

The next sub-theme is as prevalent in interview data and curriculum documents as the first sub-theme and relates to teacher education in general.

4.3.2 Sub-theme 1.2: Developing general pedagogic competencies

Learning how to teach features in all the Economics methodology curricula. This includes a range of aspects such as lesson planning (4.3.2.1); the integration of theories of teaching and learning with practical teaching (4.3.2.2 and 4.3.2.3); novel approaches to teaching with the development and use of teaching and learning resources (4.3.2.4) and finally assessment (4.3.2.5) and general classroom practices (4.3.2.6). This can be summarised as skills for teaching, or learning *how to teach* (Carla, p.4; Emily, p.11; Sam, p.5), also known as general pedagogical knowledge (PK).

Not all curricula refer to the teaching of Economics as a subject specifically and therefore, the focus will fall on general pedagogic competencies in this sub-theme. The next sub-theme will focus on teaching strategies specifically for Economics. The distinction is made between teaching methods or focusing on how to teach and teaching strategies as various ways and means by which a specific subject or topic can be taught.

4.3.2.1 An emphasis on planning

Only three of the five teacher educators mentioned the importance of developing lesson plans in their interviews, and two curriculum documents contain module outcomes related to planning. Nonetheless, all of the curriculum documents contain topics that deal with planning. The nature of planning ranges from ensuring that prescribed policy requirements are met, to the in-depth analysis of planning, and finally the possible downfalls of rigid adherence to a plan.

Prescribed education policy is integrated in planning for teaching. The second module outcome of the Western University refers to the Teaching Plans stipulated in the CAPS document for Economics:

Design and present lesson plans that are in line with the annual teaching plan per grade.

The fourth topic of the Northern University also relates lesson planning to prescribed policy documents:

National Curriculum Statement (NCS) and Curriculum Assessment Policy Statement (CAPS) in the FET-band: Learning Programme Design & Lesson Plans.

The second topic of the Western University's curriculum document, 'Year Planning, Homework and Assessment', deals with planning in depth:

Planning to teach Economics:

2.1 The importance of planning

2.2 What are aims and objectives? Why are they important in the lesson planning process?

2.3 What are the aims of the South African education framework?

The emphasis on planning and the creation of lesson plans could suggest strict adherence to a particular sequence in which to teach, as determined by departmental policy documents. Again, reference to prescribed teaching plans suggests that rigid adherence to CAPS drives how teachers are trained. The focus on planning could be justified as the programme is targeted at inexperienced student teachers. However, while the planning process could aid in visualising and preparing teaching, it could place more pressure and responsibility on the teacher as the driver and director of the teaching process. This suggests a teacher-directed teaching strategy without input from learners as they have no part in deciding what or how to learn.

An over-emphasis on planning may lead to a situation where inexperienced student teachers' lessons may seem unnatural and forced. They focus more on meeting what they perceive to be the teacher educators' demands than on their teaching and students' learning.

*Otherwise, you just want to satisfy me because I'm coming to supervise you and you just set goals and you convince yourself that you have achieved the goals.
(Carla, p.11)*

4.3.2.2 Casual reference to theories of learning

Theories of teaching and learning are mentioned by two teacher educators, and included in three module outcomes and three topics. Specific theories of teaching and learning are not mentioned, but reference is only made to theories in general.

Sam's mention of theories relates to general pedagogical practices, and the theory of learning is applicable to Economics teaching.

Students in this module, the content thereof, entails an informed and critical comprehension of the principles and theories with regards to classroom management, creative teachers and active learning in the Economics class. (Sam, p.4)

There is not uniformity in the selection of theories: one curriculum focuses on theories of teaching and learning, and another curriculum focuses solely on theories of learning. The first two module outcomes of the Central University are informed by theories of teaching and learning:

Evaluate theories of teaching and learning in the context of Economics teaching. (1)
Apply theories of teaching and learning to basic lesson planning for teaching of Economics. (2)

The following remark provides evidence of an emphasis on learning theories:

Economics teachers must have knowledge of how learners learn... knowledge of the phases of development of learners so that they can formulate realistic expectations. (Sam, p.6)

This relates to the module outcomes and topics of the Northern University which also focuses on knowledge of how learners learn and how it might influence the teaching of Economics. The first module outcome of the Northern University states:

Develop an understanding of how learners learn and understand the implications for teaching Economics in the FET band.

The topic of the Northern University that relates to theories of learning:

Theories of learning and their implications for Economics teaching. (3)

The inclusion of theories of teaching and learning seems to be an attempt to link the practical aspects of teaching to the theory of teaching and learning. This could help students to be aware of the reasons for the choices they make in lesson planning and the selection of teaching methods. The emphasis on theories of learning or '*knowledge of how learners learn*' (Sam, p.6), suggests that learners and their needs have implications for teaching.

4.3.2.3 Developing practical teaching skills

In the interests of providing insights into the ontological nature of teaching, elements of practical teaching or micro-teaching are evident in all of the curricula and were mentioned by most of the teacher educators in their interviews. The requirements student teachers have to meet with regard to practical teaching ranges from the demonstration of knowledge and skills of Economics teaching to the use and critique of various teaching approaches. This indicates that student teachers have to 'show' in some way that they are able to teach Economics in a simulated context.

Four teacher educators mentioned the importance of practical teaching in their interviews.

Because the more practice you get, look, you can do so much content. People can tell you this is what you must do, this is what you must do, this is what you must do, this is what you must do. But until you go and do it yourself, you will never master it. (Emily, p.26)

Three module outcomes mention the required knowledge and skills related to practical teaching:

Demonstrate knowledge and skills for Economics classroom teaching/practice. (Central: 5)

Demonstrate thorough knowledge of various approaches, methods and media they can use to facilitate teaching and learning in an Economics classroom. (Western: B1)

Use and critique a range of teaching methods in the planning and teaching of Economics. (Northern: 3)

Two modules contain topics that relate to practical teaching or **micro-teaching** (Eastern: 1; Northern: 5) and the development of teaching skills, and three modules relate practical

teaching to specific Economics topics or topics included in grades 10–12. This focus on subject-specific and topic-specific teaching is discussed in the next sub-theme.

The focus on developing practical teaching skills relates to ‘how’ to teach, but there is a suggestion that student teachers should use novel approaches to teaching Economics, retaining learners’ interest by using creative teaching strategies and innovative teaching resources.

4.3.2.4 Teaching resources as a necessary complement to teacher oratory skills

The emphasis the teacher educators place on various teaching resources varies from a focus on the use of technology and the development of ICT skills to more traditional forms of teaching resources. However, all module outcomes and module topics refer to the use of teaching resources or learning materials.

Module outcomes refer to teaching and learning materials in general and vary from the development and design of teaching resources or learning materials (Eastern) to the use of a variety of teaching resources (Northern) that are appropriate for the teaching of Economics (Central), and the facilitation of teaching and learning in an Economics classroom (Western).

Some teacher educators focus on the importance of technology and the integration of technology for teaching:

Uhm, I've mentioned the one that is, people are talking about TPCK, I'm sure you are aware of that people are talking about technological pedagogical content knowledge that's also other knowledges which are very important. So an ideal teacher should have that. For the teacher to be able to impart knowledge correctly to students. (William, p.11)

Then, teachers must also master basic technological skills for example audio-visual presentations, assessment and reporting. (Sam, p.6)

Uhm, and to, to, uhm, to make, I think technology can play a big role, to get that excitement also going. (Nicole, p.9)

So you bring in technology, you bring in social media, you bring in some of the topical stuff that is happening, and uhm, and you can make it quite interesting if you are on top of your game. (Nicole, p.8)

This focus on technology relates to the topics of the modules which focus on technology use for teaching:

Teaching & Learning Aids and/or The use of e-Technology. (Eastern: 7)

Using technology to teach Market efficiency in Grade 12. (Northern: 17)

In contrast to the focus on technology, one teacher educator is critical of an over-reliance on technology as a teaching resource, and relates the use of resources to the teaching context:

I also just quickly go through how to design a poster, very old-fashioned....So we need to not only concentrate on technology as a resource, but the old, back to the past, years ago paper, you know, and whatever it is that they need. (Emily, p.11)

This resonates with the topics included by Central University and Western University that refer to using a variety of media to aid in the teaching of Economics, and not solely to the use of technology in teaching. The assortment of teaching resources is linked to novel ways of teaching, as well as the nature of Economics as a discipline in that teacher educators refer to the subject as requiring '*everyday research*' (William, p.6) and the resultant need for up-to-date media:

Using the newspaper and other media in Economics teaching and learning. (Central: 9)

Teaching methods and teaching learning media. (Western: B3)

Although there is a variation in the types of resources that they advocate, they all agree on the importance of using a variety of teaching resources to aid in the teaching and learning of Economics. The PGCE Economics curriculum is based on the assumption that potential learners learn via multiple media, and suggest that verbal inputs may not be enough to ensure effective teaching. Therefore other forms of stimuli are also required to provide scaffolding and make learning meaningful. Economics teachers are expected to use their initiative in selecting and using resources to sustain learners' interest in and enthusiasm for the subject.

The next section focuses on assessment and specifically the knowledge and skills related to assessment required by prospective Economics teachers. The form of assessment used by teacher educators in their Economics methodology curricula is dealt with in the theme relating to the nature of delivery in section 4.4.

4.3.2.5 Developing assessment skills as strategic competence

The majority of curricula contain module outcomes related to assessment. There are basic requirements to develop assessment strategies, as well as emphasis on the different types and forms of assessment. This points to the importance of assessment ascribed by teacher educators in the teaching and learning process. The extent to which assessment is included in the curricula varies from adherence to policy requirements, to the in-depth analysis of assessment, and finally to critique of assessment.

Two teacher educators mentioned the importance of assessment in the interviews when commenting on prescribed policy and Bloom's Taxonomy:

...knowledge of the departmental prescriptions and policy with regards to the purpose, principles and assessment. (Sam, p.6)

And uhm, I also look at all the other things to do with assessment. Like Bloom's taxonomy, and those kinds of things. We obviously concentrate a lot on Bloom's taxonomy because the CAPS curricu...document states all those different types of questions for the different sections of the paper which relates to Bloom's Taxonomy. (Emily, p.12)

Sam's comment relates to the breadth of assessment contained in the topics of the Southern and Western Universities which include the definition of assessment, the elements of assessment (reliability, validity and transparency), continuous assessment, the distinction between formative and summative assessment, the methods, forms and instruments of assessment, the recording of assessment and reports, CAPS and assessment, and the drafting and moderation of a question paper and memorandum for Economics.

The analysis of the topics of the Southern and Western University reveals a degree of tension. Certain topics require student teachers to have a sophisticated understanding of the theories underpinning assessment (topic 5.1 of the Southern University and 3.1 and 3.2 of the Western University), as well as the various methods and techniques for assessment (5.3–5.5 of the Southern University and 3.6 of the Western University), which contrasts with the strict adherence to policy prescriptions and the use of Bloom's Taxonomy as it is included in the CAPS (3.8 of the Western University).

The modules outcomes seem to relate to the application of assessment skills:

List and explain different types and forms of assessment and implement these in specific lessons. (Western: A4)

Develop assessment strategies. (Eastern: 8)

Although 'various types and forms of assessment' suggests the inclusion of formative and summative assessment, the specific mention of setting up a test or examination paper and memorandum in the topics in three of the modules implies that the emphasis is on summative assessment:

Setting up a Test & Memorandum (Eastern: 10)

5.8 The drafting of a question paper for Economics

5.9 The drafting of a memorandum for Economics (Southern: 5)

Setting class tests and developing marking memos (Central: 7).

These comments, topics and module outcomes suggest a technical approach to assessment and a focus on the development of assessment skills, such as the setting of tests or examination papers, as required by education policy. Only one module outcome and one topic suggest that there might be a more complex view of assessment in that they require student teachers to evaluate their impact on Economics teaching:

Understand issues and debates in assessment and their peculiar implications for Economics teaching and learning. (Northern: 5)

Analysis of matric papers. (Central: 6)

The variation in the topics and module outcomes suggest that assessment is dealt with in great breadth in some instances, such as the Southern and Western Universities. The Northern and Central Universities seem to address assessment in some depth, requiring student teachers to engage with concerns related to assessment. The implication of the variation in breadth and depth could be that student teachers are taught to develop and apply assessment, without due regard to the impact particular types of assessment could have on their teaching and their students' learning.

4.3.2.6 Classroom management and dealing with disruptive behaviour

The final aspect related to general pedagogic competencies in curriculum documents speak to general classroom practices, administrative aspects of teaching, classroom organisation and management, and maintaining discipline in the class.

The curriculum of the Southern University appears to place a great deal of importance on general pedagogic skills, applicable in an Economics classroom.

Students in this module, the content thereof, entails an informed and critical comprehension of the principles and theories with regards to classroom management... (Sam, p. 4)

The last module outcome of the Eastern University relates to the teacher's role as an administrator in that it requires the preparation of a Subject management file that adheres strictly to policy prescriptions:

Prepare an Educator's/Subject Management file for Accounting, Business Studies and/or Economics before you go out on Teaching Practice. (Minimum suggested content: CAPS document, Annual Teaching Plan, Assessment Plan; personal timetable of the grades you will be teaching).

This may relate to the roles of a teacher stipulated in policy documents:

I propose Economics teachers who are qualified, competent, dedicated and compassionate. Such teachers are able to fulfil the various roles stipulated in the Norms and Standards for Educators. According to this, teachers are viewed as facilitators of learning, interpreters and designers of learning programmes and learning materials, leaders, administrators, managers, subject specialists, researchers, lifelong learners, community members, citizens and counsellors, assessors and experts of subjects. (Sam, p. 7)

The development of general management skills for teachers, such as administrative, organisational and management skills, may equip a prospective teacher to teach any subject and perform duties required by teachers, other than teaching. It may seem repetitive to students, as other teaching modules usually deal with these topics.

Two teacher educators mentioned the importance of learner discipline as a means of dealing with disruptive behaviour, and two modules contain topics on learner discipline in an Economics classroom, but no module outcomes are related to learner discipline. Aspects of learner discipline are evident in the comments made by two of the teacher educators:

Economics teachers must have knowledge of disciplinary strategies and they must have knowledge of specific context in which there is taught. (Sam, p.6)

Topic in Northern University that deals with discipline:

Learner Discipline (WCED) and Active Learning in the Economic Class. (Northern: 16)

Aspects of learner discipline in the topics of the Southern University:

Study unit 8: Discipline

8.1 Behaviour that disrupts the class

8.2 The importance of good relationships in the application of discipline and for the creation of a pleasant atmosphere in class

8.3 The disciplinary plan

8.4 Addendum 8.1: Alternatives for corporal punishment. (Southern: 8)

The PGCE Economics curriculum of the Southern University is the only one that contains topics which deal with learner discipline in depth. Taking into account Sam's extensive secondary school teaching experience, the emphasis on learner discipline could relate to the difficult classroom contexts that South African teachers, and by implication Economics teacher, face. South African learners come to schools with a range of social problems which manifest themselves in inappropriate behaviour.

The implication however, of the focus on learner discipline, is that time spent on this topic could have been used to teach the methods of Economics teaching. There could be a possible overlap between what is included in the PGCE Economics curriculum and other general education studies modules which are likely to include topics on learner discipline and classroom management.

The second sub-theme dealt with developing general pedagogic competencies, and from the aspects discussed in the sections above, it seems that a large portion of the PGCE Economics curriculum deals with general teaching skills. Neither the Southern University nor

the Western University mention topic-specific Economics teaching strategies. They seem to focus more on adherence to policy prescriptions, lesson planning, lesson presentation and assessment.

The PGCE Economics curricula of the Eastern and Central universities contain indications of various methods of Economics teaching with a focus on teaching Economics topics that are included in the CAPS curriculum for grades 10–12. The Northern University is the only university that mentions specific Economics topics and relates specific teaching strategies to these topics. The next sub-theme elaborates on specific teaching strategies for Economics teaching.

4.3.3 Sub-theme 1.3: Teaching strategies for Economics

In some Economics methodology curricula, there seems to be a shift from general pedagogic competencies to specific competencies for a teacher of Economics, related to the unique nature of the subject. This sub-theme focuses on teaching strategies specifically for Economics, starting with how the teacher educators perceive the subject and the suggestions they make on how to teach the subject.

In the interviews, teacher educators seem to view Economics as a unique and dynamic subject:

Well, this is a very very specialised subject. So there's a, there's a literacy, it's based on a specific literacy of concepts that you won't find in a different subject. So you need to know what is the distinct, what is the discerning concepts that is very very peculiar to your subject. (Nicole, p.7)

where you bring in the lively thing in other words the commerce curriculum needs everyday research, because commerce is changing on a daily basis. (William, p.6)

So the knowledge of Economics, you use it on an everyday basis. (Carla, p.10)

Well, you need to be uhm, well-read, uhm, you need to know what's happening around you, uhm, you need to be, have, an enquiring attribute. (Nicole, p.7)

So I, I say Economics is actually what you are living every day. (Emily, p.21)

This relates to topics regarding the unique nature of Economics:

The nature of Economics as a discipline (neutrality, social justice, ideology).
(Central: 1)

The significance of Economics in the curriculum. (Northern: a)

Introduction to the subject Economics and initial approaches to teaching Economics.
(Western: B1)

All of these teacher educators view subject content knowledge as essential for an Economics teacher, which could be related to the nature of the subject:

We cannot overlook the content knowledge. That's absolutely important. Because if teachers do not have the content knowledge, that is going to be a problem for them to explain certain things. (William, p.9)

So the content is very very important in fact for you to be able to, whatever methodology you learn and you don't have the content, you are not really really going to make any impact on the learners. You understand? (Carla, p.8)

Uhm, it should entail that you as a teacher should be on top of your game. You need to know your content very well. (Nicole, p.6)

During the interviews, teacher educators provide specific Economics-related examples when asked to elaborate on the knowledge and skills required of a prospective Economics teacher. These references enhance the importance of content knowledge for Economics teaching, and what teacher educators consider to be key topics in Economics. Examples include the index of shares and the value of the rand (William); unemployment, functions of government Economic choice and JSE (Emily); production possibility curve, demand and supply, macro-, market- and micro-environment (Nicole); price index, scarcity, Economic growth, poverty, unemployment (Sam).

With regard to how to teach Economics, these teacher educators view pedagogy as the bridge between content knowledge and teaching:

So to have all the knowledge here, and to have it here in your head means absolutely nothing if you can't bring it across and if you can't share it. So we look at the way that you share it and the way that you can share that in the simplest and easiest way. (Nicole, p.6)

Since Economics is viewed as a unique subject, with an emphasis on the importance of content knowledge, the focus will now shift to the specific teaching strategies for Economics topics, as proposed by the Economics methodology curricula.

From the interviews, teacher educators concur that teaching Economics differs from the teaching of other subjects:

...methods of teaching a commerce subject, are totally different, are specialized. They need a kind of particular thinking. (William, p.6)

So maybe it is just to give an example, so say for a particular topic in commerce you wouldn't use any other method which you know, would not even fit for that. You look at the content itself and then you say, which ways or techniques would I use to be able to share this content. You look at the content itself and then you say, which ways or techniques would I use to be able to share this content. (William, p.8)

So every topic is a different topic and when they, after their micro-teaching little lesson, after their presentation, if there is a different way that I think will be better to present the lesson, then I will show them. Yes, or I just say to them, or you can do it like this or like that or like this, you know, your way is not good or your way is good, and here is other possible ways of actually covering this topic. (Emily, p.12)

Module outcomes also relate to teaching methods and approaches specifically for Economics teaching:

Evaluate theories of teaching and learning in the context of Economics teaching. (Central: 1)

Use and critique a range of teaching methods in the planning and teaching of Economics. (Northern: 3)

Demonstrate thorough knowledge of various approaches, methods and media they can use to facilitate teaching and learning in an Economics classroom. (Western: B1)

The use of different teaching strategies for different topics is linked to the teacher educators' perspectives of Economics as a unique subject that requires an Economics teacher to have comprehensive content knowledge and to employ novel ways of teaching. Topics range from general teaching techniques or strategies (Eastern University: 6), as well as teacher and learner-directed methods (Western University: 3). Only the Northern University relates

specific Economics topics to a specific teaching strategy, where curricula from the Eastern and Central University refer to the teaching of grade 10–12 Economics topics, using a variety of teaching strategies. The table below provides a breakdown of the different teaching strategies for each of the different Economics topics as employed by the various Universities.

Table 4.1: Teaching strategies for topics in Economics

Teaching strategy	University that uses this strategy / included in topics	Teaching strategy related to Economics content (stipulated in topics)
General teaching techniques/ strategies	Eastern (6) Central (5)	Not Applicable
Active learning	Southern (6)	Not Applicable
Teacher-directed and learner-directed methods	Western (3)	Not Applicable
Problem-solving	Central (10) Northern (15)	Demand and supply
Case studies	Central (11) Northern (11) Northern (15)	Africa Growth Economic growth and job creation
Direct instruction	Northern (7)	Globalisation
Role-play/debates	Northern (8)	Nationalisation in the South African context
Whole-class discussion	Northern (9)	Economic crisis of 2008 and Problem of System Debt
Small group work	Northern (10)	Stages of Economic development
Learner research	Northern (12)	New Growth Path
Co-operative learning	Northern (13)	Redress since 1994 and Poverty
Textbook method	Northern (17)	Monetary Policy Development

From the table above, it seems that most teaching strategies focus on the learner as central to teaching (active learning, problem-solving, case studies, role-play and debates, whole-class discussion, small group work, learner research and co-operative learning). These student-led activities relate to the approach intended and the use of resources in the previous sub-theme. It suggests that, even though Economics teachers are required to be subject specialists equipped with a variety of teaching strategies, the focus of teaching seems to be on the learner and the aim of teaching is to engage learners actively in the teaching process, suggesting that learners should be partners in teaching, which in turn will

aid in the development of independent and critical thinking skills and optimal learning and development of Economics learners.

4.3.4 Sub-theme 1.4: Reflective practice

Three of the teacher educators mentioned reflection as a strategy to improve teaching and for the development of the ideal teacher, whilst the majority of module outcomes contain evidence of reflection or reflective practice.

Reflection as it relates to teaching:

...make them to be able to say let us reflect. When you do the reflection you are saying: how did I start my lesson? (William, p.8)

...they are reflecting they have to think about why did these students get a low mark and then the next day they have to do something else. (Emily, p.13)

Reflection as it relates to the ideal teacher:

I really really really enjoyed teaching them because we would like reflect, make them to look at what can make them better, what can make you an ideal teacher? (Carla, p.12)

This suggests that the PGCE for Economics curricula intends to develop the skills of future teachers who are able to reflect on their own teaching and analyse their own shortcomings taking account of the need to develop improved methods for teaching. The need for contemplation on teaching and the ideal teacher relates to the requirement of an Economics teacher to constantly '*develop as professionals*' (Western, p.12) and be '*on top of their game*' (Northern, p.6).

Mention of reflection or reflective practice in module outcomes relates to the improving of teaching and learning, whilst engaging with peers:

Develop a reflective practice towards teaching and learning by engaging in activities that will broaden and deepen students' insight and understanding into the field of Accounting, Business Studies and/or Economics education. (Eastern: 9)

Develop a critical and reflective approach to planning and teaching Economics. (Northern: 4)

Engage in reflective practice in collaboration with their peers. (Western: B4)

Demonstrate skills of reflection and self-critique as it relates to Economics teaching.
(Central: 6)

The prescriptive CAPS appear to be at odds with reflective practice, as reflection is constrained by prescription. The need for reflection reflected in the curriculum documents suggests a level of autonomy of a teacher as taking responsibility for his/her own teaching and engaging in reflection as a means of improving teaching and learning.

4.3.5 Sub-theme 1.5: Context-sensitive teaching

The importance of context for teaching is evident in all the interviews. This reference to context has two layers. The first layer focuses specifically on the South African context, the impact of the environment in which there is taught, the limited resources in some schools, as well as the diverse students who are underprepared for the subject. The second layer of context refers to the teaching of Economics as a subject, which is unique and requires differentiated teaching strategies. The second layer of context was dealt with in sub-theme 1.3: Teaching strategies for Economics (cf. 4.3.3).

It seems that the teaching environment (context) influences the methodology, or the ideal way in which to teach, whilst the context is influenced by available teaching resources. Learners also influence the context. Only when you know your learners will you be able to adequately teach for optimal learning, with relate to sub-theme 1.2: Learning theories (cf. 4.3.2.2).

So uhm, you cannot teach without knowing what the context is. So context is as important as how you teach it. (Nicole, p.6)

they must have knowledge of specific context in which there is taught (Sam, p.6)

So if you do not have the context or understanding of people that you teach, you will never be able to do that. (William, p.7)

Because methodology to me depends on the context, the environment in which we work in. So it will be determined to say, even if you can have many know about the but the environment in which you find yourself which will be made by even the sources you have. (William, p.9)

But at some schools they need to design a poster, because not all schools they have these data-projectors and laptops and stuff like that for teachers. Some of the

schools don't even have boards, never mind whiteboards, they don't even have the green boards. (Emily, p.11)

The context seems to refer to the learning environment, which is also influenced by the resources that are available. These in turn influence the teaching methodology. One of the teacher educators mentioned how language can influence context:

And like I told one of the student teachers who was just speaking Zulu all through, I said you see now I can't understand what you are saying, and even those learners, you are not helping them, because they are going to write these exams in English. (related to need for language skills) (Carla, p.10)

Only two of the curricula contain module outcomes related to context, although one curriculum has two outcomes that speak to context related to teaching, which indicates its importance to the composer of the curriculum.

Develop insights into and solutions to the challenge of teaching Economics in diverse contexts. (Northern: 6)

Demonstrate context specific and context responsive teaching practices. (Central: 7)

The first outcome suggests that prospective Economics teachers might be required to teach Economics in diverse contexts, and therefore it is necessary to prepare them for this arduous task. Student teachers seem to be required to develop an understanding of the nature of the challenge and different factors that may have an influence on the challenge, whilst developing solutions to the problem of teaching in diverse contexts.

The next module outcomes related to context suggests that Economics teaching creates a unique context in itself and that specific teaching and learning theories are applicable to the unique context of Economics teaching (cf. 4.3.3). This module outcomes suggests that student teachers should develop a sensitivity towards the diverse contexts in which they might be required to teach. At the same time, they need to equip themselves with the necessary teaching strategies to be able to adapt their teaching for specific context, whilst being continuously aware of the dynamic context and the variety of factors that might have an influence on the context. This module outcome seems to pull the theories of learning (knowing your learners) and the teaching strategies for Economics together.

In summary, the policy-driven nature of the Economics methodology curricula seems different from the rest of the content of the curricula, which relate to one another. It seems that student teachers are expected to comply with prescribed policy in terms of what and when to teach and how and when to assess. Although prospective Economics teachers need to be equipped with general pedagogical skills, comprehension of teaching and learning theories and their integration with teaching and learning suggests an approach to Economics teaching with due cognisance to learners and their learning needs. Using a variety of teaching resources and teaching methods for different Economics topics and different grades, whilst constantly reflecting on the ideal teaching for successful learning will help student teachers develop a sensitivity and responsiveness to context.

The next theme relates to the nature of delivery of the Economics methodology curricula, as indicated in the interviews with the teacher educators, as well as suggestions of delivery in the curriculum documents.

PART C

4.4 THEME 2: NATURE OF DELIVERY

To aid in answering the research question related to the nature of the Economics methodology curricula⁵ in selected South African universities, the nature of delivery could provide some insight into how the planned curriculum is enacted in lecture rooms. The nature of delivery is addressed in the second question of curriculum posed by Dillon (2009:349), which relates to the elements of curriculum, more specifically the 'How' of the curriculum:

(2f) Activity – How?

This question of means, methods, and actions urgently divides into student action and teacher action, with educational primacy given to the student. (It is by the actions of this agent that the intended learning may occur; and because the student's actions are forcibly determined by the actions of the teacher, teacher actions must first be designed in light of the student action to follow.) However, in addition it is a question of complementary action—that is to say, interaction (Dillon, 2009:346).

Elements of delivery could explain the classroom practices employed by teacher educators, more specifically the strategies they employ to prepare future Economics teachers, as well as the interaction between the teacher educators and Economics student teachers.

Given the scope of the current study (a mini-dissertation), as researcher (and full time university lecturer) I decided to exclude direct observation as it was not practicable nor logistically possible. Even though I recognise the benefit of obtaining first hand data, in this instance I have settled for what the participants told me about their pedagogy. In the light of this, I have analysed what they say about their teaching with circumspection.

The subsequent sections focus on teacher educators' reflections of how they teach and specifically their view of teaching time as a constraining factor (4.4.1), the educational approaches they chose to use during their teaching (4.4.2) as well as their intention of modelling how to teach (4.4.3), followed by the resources the teacher educators use during their lessons (4.4.4); their view and expectations of their students and how they respond to student expectations (4.4.5) and finally the assessment practices employed by the teacher educators in the course of the module (4.4.6).

⁵ Henceforth referred to as 'the module'.

4.4.1 Sub-theme 2.1: Teaching time as constraining factor

The duration of the Economics methodology modules at the various universities vary from one semester (approximately 11 weeks) to one year (approximately 20 weeks⁶) with one to two lectures of an hour or more per week. The majority of teacher educators felt that this is not enough time to prepare student teachers and teach them how to teach:

Because they have a very short space of time to do their methodological training. So when you compare to the BEd students and you look at them, they need lots of support, they need a lot of support. So these are the students that we are trying with the mentor programmes to support them, but I don't think we are doing enough. (William, p.6)

William's comment emphasises the mismatch between what needs to be covered and the time available to effect this. William is of the opinion that the official time allocated for the module on the university's timetable does not provide enough opportunity to effectively prepare prospective teachers, and therefore necessitates additional '*support*' for PGCE students. He seems to have no faith in the institution's ability to address this need satisfactorily ('*I don't think we are doing enough*') as it raises questions of finding time, human and other resources.

...how do I actually cover the school content in my method of Economics classroom uhm, I don't have time to actually take every topic and show them how to teach that topic. (Emily, p.11)

Emily's reference to the school content, and the importance of teaching prospective teachers how to teach Economics at school level, relates to the reliance on the prescribed CAPS for Economics, as stated in the previous theme (cf. 4.3.1). It seems that the emphasis falls on developing skills for teaching Economics topics included in the school curriculum, rather than focusing on teaching the principles of Economics teaching which can be applied to any Economics topics, which would make the teaching of each topic superfluous.

The misgivings of teacher educators raises the question about wide breadth and limited depth in which certain topics in the module is dealt with, considering that time is such a

⁶ For the modules presented over the course of a year, it seems that one quarter (approximately 9 weeks) is utilised for teaching practice at secondary schools and students are therefore not attending lectures during that time.

constraining factor. Moreover, meeting all the intended module outcomes in the given time frame necessitates the structured delivery of the module according to a specified and rigid module plan. The next section deals with the educational approaches employed by teacher educators during their teaching.

4.4.2 Sub-theme 2.2: Educational approaches employed during teaching

Insight into the educational approaches employed by teacher educators during their teaching were gained from their utterances during the interviews. These approaches suggest the intended course of teaching followed by teacher educators, and possibly how they perceive ideal teaching. The majority of teacher educators emphasise the importance of student participation during lectures.

Where my approach would be more to say learner engagement. (William, p.5)

It's a very interactive, constructivist way of teaching. So it takes on a very active learning, you know, approach with the Economics part. (Nicole, p.4)

I am of the opinion that students must be involved with a course and participate actively in class discussions. I try to do away with the formal, traditional method of teaching and to focus on active participation. (Sam, p.3)

It seems that these teacher educators regard their students as active participants in the teaching process. This notion is supported by the stipulation in the curriculum documents that students prepare for contact sessions in order to participate in class discussions. Class attendance is compulsory at the Northern, Western and Central Universities, where the Eastern University require students to attend at least 80% of the lectures and the Southern University encourages students to attend lectures. The focus on class attendance and participation suggests that teacher educators believe that learning to teach Economics should happen in a communal space. The compulsory attendance suggests that teacher educators believe that their student teachers might not benefit fully from the module if they are not physically present.

Student participation during teaching is further emphasised by the importance attached to discussions during class and how working with other students might aid in the personal and professional development of prospective teachers:

Now the third year, I'm really really really having a nice time with them, because if you ask me a question, which, I will put it up for discussion and everybody brings his

own... before we go for the day, I give them the next topic, they have it, so I remind them that okay, go read about this, this is our next topic, so that when we come, I will not be teaching you, we going to discuss it. (Carla, p.4)

Carla seems to value deliberative engagement with and between students, since she uses the students' own contextual challenges and questions as sources for teaching. She appears to be responsive to students and their peculiar challenges. Furthermore, Carla does not believe that she should be the sole source of answers to students' challenges. She therefore creates opportunities for purposeful engagement and collegial interaction.

There's a lot of discussions happening in class. Sometimes heated as well, because not all of us have the same views. Uhm, so yes, it's very discussion based. And interactive. (Nicole, p.5)

Nicole seems to understand teaching as a contested space as she is very open to debate and contestation, and in the process she hopes that her student teachers might learn that contestation is a necessary part of learning. She welcomes and encourages robust debate and is comfortable with making space for divergent views.

And make it interesting for them. Because if it becomes too theoretical, the students may lose interest, and they want to, they want to, we make use of a lot of, a lot of eh, discussions. (Nicole, p.5)

This focus on stimulating students' interest suggests that Nicole believes that it is her responsibility to create lessons that are appealing for students, and she understands the consequences if they are not. This points to good modelling of ideal teaching. Moreover, she seems to value the importance of linking theory to practice and believes that this relationship can be effective through discussion. The emphasis in the extract on the '*they want to*' supports the notion that students are viewed as central to the teaching process; she appears to be in tune with the learning styles and preferences of her students. The repetition of '*discussions*' suggests that Nicole emphasises the importance of interactive discussion.

Thereby my students learn to identify problems by means of critical and creative thinking to solve, to effectively argue and work together as members of a group and so learn how to speak in front of other people. Group discussions teach students to also respect the points of view of others. (Sam, p.3)

Sam's comment suggests that he teaches problem identification and diagnosis and fosters argumentative skills development in a communal space. He encourages public discussion as part of the preparation of student teachers to be teachers, and emphasises the importance of encouraging empathy, patience and understanding so that a range of views can be expressed on an issue.

The comments of teacher educators related to the nature of delivery suggest that they all support an interactive, discussion-based, collaborative and student-focused approach to teaching where student's insights and contributions are valued. This may be explained by teacher educators' view of their students as '*older*' (Emily, p.17) since they have already completed their first degrees, and are therefore '*empowered*' (William, p.6) to contribute to the teaching process. The focus does not seem to be on the teacher educator as driver of the teaching and learning process, but rather as the mediator of learning. It suggests that student teachers are encouraged to take responsibility for their own learning, reflect on their experiences and learn from others during the module.

The expectation that student teachers will act autonomously is somewhat at odds with the next sub-theme, which relates to teacher educators taking it upon themselves to model to student teachers how to act and teach in an ideal way.

4.4.3 Sub-theme 2.3: Modelling how to teach

The majority of teacher educators view themselves as experienced teachers, and therefore capable of exemplifying what they believe are effective ways of teaching. Teacher educators have taken it upon themselves to show students how an ideal teacher should not only teach, but also act and respond in a teaching context. They view this as necessary, since the exposure student teachers have gained from previous experiences are, according to teacher educators, not the way a teacher should ideally teach:

And then they say but, but Miss, this lecturer teaches like this, and this lecturer does that, and then I say but ... they're not school teachers. They are lecturers, and so don't copy your lecturers because you think this is the way that you are supposed to go and teach in a school. (Emily, p.8)

Emily seems to alert her students to undesirable practices and to encourage them to be different. This suggests that the ideal type of teaching at a secondary school is different from

the type of teaching at universities. Merely telling student teachers how to teach is deemed insufficient and therefore teacher educators regard it as essential to show them.

...so what I try to do is, I now try to uhm, mimic, you know, the way a teacher is supposed to teach in a school setup, so that they can see that example, at least you know, then take that to the school. So I try to make it very practical. (Emily, p.8)

Emily's mimicking is a deliberate attempt to construct the reality of a school classroom context in the hope that it would serve as an exemplar of teaching techniques that student teachers might attempt. She believes that observation of good practice is more likely to be effective than simply learning theory about good practice, and moreover she believes that she should be the demonstrator of 'good practice'.

I make use of modelling to, for example to model, questioning, group work... (Sam, p.5)

In most cases, for us to be able to share that pedagogical content knowledge, one way of doing that is to preach, or to practice what you preach. (William, p.8)

Like Emily, Sam and William believe that advocacy for particular types of teaching is not sufficient in a teacher training programme, but that such advocacy should necessarily be accompanied by concrete, observable examples. The assumption is that showing particular methods in action is a signal to the students that the teacher educator believes in the value of such methods. Modelling is not limited to teaching, but is extended to personality traits and characteristics required by a teacher.

Good values, personal example and teaching is synonymous for me. Especially the first two mentioned aspects are non-negotiable. I try to continuously emphasise professionalism, good manners, punctuality, neatness, integrity, commitment, tolerance, loyalty and respects towards learners and students of all cultures and beliefs and then live it out through personal example. (Sam, p.3)

Sam sees these characteristics as basic requirements and in effect he teaches more than just the subject content of the PGCE Economics curriculum. This indicates that he believes the other crucial elements of a teacher's make up must also be demonstrated by good example.

Through personal example, consistent application of discipline and tips that I acquired in this regard in practice, I try to prepare my students as such for practice. (Sam, p.4)

Furthermore, Sam sees himself as central to the teaching encounter as he immerses himself and identifies himself as a key element of the PGCE Economics curriculum. Good teaching is not just a once a week issue – it must happen every day and become a natural part of a teacher’s way of life. Sam signals where this knowledge and skills have come from as justification for his practice – from his experience – which implies that PGCE should be taught by people who have actually had school teaching experience.

The inclination to model the ideal teaching and behaviour of a teacher could be explained by Nicole’s view of the effect of a teacher’s actions on his/her learners.

And if you’re inquisitive, your learners will become, your students will become inquisitive and that hopefully will have a ripple effect to the classroom. (Nicole, p.7)

Teacher educators have the power to project particular favourable dispositions which might be learnt by their students – and this they believe has the potential to filter through to the school classroom if students are allowed to observe particular teaching and learning behaviours.

The nature of delivery seems to be closely related to how teacher educators view themselves, the nature of teaching and the roles and responsibilities of teachers. Aiming at being the embodiment of ideal teaching and the ideal teacher suggests that teacher educators view themselves as pedagogues and the teaching profession as a vocation.

The next sub-theme relates to the teaching and learning aids used by teacher educators in the course of their teaching as it could aid in sketching a picture of how teaching takes place in lecture rooms.

4.4.4 Sub-theme 2.4: Resources employed by teacher educators

The resources included in the curriculum documents as well as those referred to by teacher educators in their remarks during the interviews helped to throw light on the nature of delivery of the module. Curriculum documents contain information on a variety of prescribed

and suggested resources such as electronic journals and articles, websites and textbooks that student teachers should utilise.

The Western and Southern University include an additional *Reader*, compiled from various sources, in their curriculum documents. The other universities require students to search for the listed readings independently. The variety of resources relates to the view of Economics as a discipline and the concomitant need to keep up-to-date with the latest news and events (William, p. 6) as well as the importance of using a variety of resources for Economics teaching (cf. 4.3.2.4).

Sometimes we're so, we're so fixated on the curriculum, we're so fixated on the textbook, and the textbook is limited, the curriculum is limited. So you need to, you need to read wider than that. Those are just tools, just tools that gives you some sort of guidance, it doesn't give you all the guidance. So it's you as an Economics lecturer that needs to go beyond those first set of tools that we have. (Nicole, p.8)

Nicole acknowledges that in general, teachers tend to rely solely on prescribed textbooks and the school curriculum to inform their teaching. She is critical of over-reliance on these prescribed materials. She feels that prescribed materials may limit a teacher's teaching and so makes a point of signalling to student teachers that there are sources of worthwhile knowledge for learners other than textbooks or the curriculum. Therefore, Nicole views it as essential that a variety of alternative resources be consulted by Economics teachers and teacher educators.

Nicole's reference to '*read wider*', and being '*well-read*' (Nicole, p.7) suggests that she places the onus on the pedagogue (prospective Economics teachers and Economics lecturers) to do research and seek additional information that will add value to the teaching of Economics. This indicates that she views knowledge (epistemology) as dynamic and 'out there' to be discovered. However, she does not disregard the value of prescribed materials, but is of the opinion that they are only aids that have to be scrutinized for their value in guiding teaching.

In keeping with the remarks made by the teacher educators on their responsibility to model or show student teachers ideal teaching methods, as well as teacher characteristics (cf. 4.4.3), they include the use of teaching aids in their modelling activities.

So it's you as an Economics lecturer that needs to go beyond those first set of tools that we have. So you bring in technology, you bring in social media, you bring in

some of the topical stuff that is happening, and uhm, and you can make it quite interesting if you are on top of your game. (Nicole, p.8)

It stands to look at uhm, at integrating ICTs in the teaching, using your social media in the teaching, using your blogs and all those aspects. (William, p.6)

Nicole and William agree on the use of technology as an aid in teaching. Nicole encourages teacher educators to caution against over-reliance on prescribed materials, which she views as *'tools'* and suggests that modern sources of information and communication be incorporated during lectures. Nicole and William's reference to social media signals that they are in tune with their students (cf. 4.4.2) and their learning needs. This indicates a move away from traditional resources such as textbooks and prescribed policy documents, towards socially constructed sources of information, which could provide diverse perspectives on a given topic. Nicole's reference to *'topical stuff that is happening'* suggests the dynamic nature of the subject (as elaborated on in sub-theme 4.1.3) and the subsequent need for ongoing research from a variety of resources. The reference to *'social media'*, *'ICT'* and *'blogs'* relates to Nicole's and William's reference to the value of the internet as a resource for teaching.

Access to wireless connectivities so that they can access the internet. (Nicole, p.9)

The second one is exposure to, or access to the net, the internet. (William, p.11)

Nicole emphasises the role of the teacher educator in exemplifying ideal teaching that integrates technology:

Uhm, and to, to, uhm, to make, I think technology can play a big role, to get that excitement also going. But then it means that the lecturer must be just as uhm, you know, technology savvy in order to do that. So, uhm, and you will see it feeds off. If you as a lecturer you know, bring new things, have e-learning and you have a blended learning approach, you will see it feeds off your students and your students will then transfer it back into the schools. So it's important what we do. (Nicole, p.9)

Nicole's utterance suggests that teacher educators are required to be up-to-date with technological advances and their applications to teaching. Thence, the justification is not only the need to ensure 'exciting' lessons that will stimulate the learners' interest, but also the belief that if the teacher educator enables student teachers to appreciate the value of

technology for teaching, they will use it in their classrooms when they are Economics teachers.

Although the emphasis seems to fall on the use and integration of technological resources, other resources that can be used for teaching are not excluded:

And uhm, an Economics teacher who does not, I'm not sure whether you are subscribed to any financial magazine, but any teacher who does not subscribe to that needs to be worried. Because you need that information. Financial knowledge, what is happening. (William, p.11)

Even though William seems to be a proponent of the integration of ICT (cf. 4.4.4), he refers to a more traditional sources of information, namely magazines, and specifically financial magazines as a means of obtaining valuable information for Economics teaching. William, like Nicole, lays the responsibility on the Economics teacher or Economics teacher educator for acquiring this information.

The use of resources by teacher educators during their teaching relate to the first theme (cf. 4.3.2.4) which dealt with the nature of the curriculum and specifically on the variety of resources teacher educators require and expect student teachers to use during their teaching. Teacher educators are now modelling the use of resources and view technology as a tool to stimulate students' interest whilst supporting the notion that a variety of sources of information should be incorporated in Economics teaching and learning. Teacher educators seem to be aware of their students' needs and learning preferences. The next section will deal with how they view their students and respond to their students' expectations.

4.4.5 Sub-theme 2.5: Responding to student expectations

The previous sub-themes emphasised the student-focused nature of teaching employed by teacher educators. Consequently, there is a need to illuminate how teacher educators view their students, as they seem to have a pronounced impact on their teaching. Teacher educators' utterances suggest that their perspectives on their students range from a degree of disappointment due to students' inabilities to a high regard for their students and their competencies.

Carla expected her PGCE students to possess certain graduate-attributes which would enable them to function at an intellectual level suited for post-graduate studies.

Well, at first I was expecting so much of them given that they are done with their first degrees, so I was really really expecting that this people will be operating at a higher level. (Carla, p.3)

Unfortunately, Carla's expectations were not met. Carla's subject speciality is not in Economics and she expected her teaching of the PGCE Economics curriculum to focus on methodological training of Economics teachers, and not the content of Economics (Carla, p.4). She found that her students did not have sufficient Economics content knowledge for methodological training.

Some of them were really not, they were expecting the content from me... After the first experience the second year I had to announce to them from the beginning, that look, I am not teaching you content, so if you come with the expectation of learning content, I am not teaching you content. But it is not my responsibility to teach you the content. You have to go, if you have left Economics for a long time you go back, do your research, and help yourself. (Carla, p.4)

There was a tension between Carla's expectations of her students and her students' expectations of her as a lecturer. She only resolved this once she had directly addressed the issue by clearly stating the mutual expectations and responsibilities.

Carla's comment on her students' content knowledge does not accord with Nicole and William's view of their students. They seem to have high regard for their students' prior knowledge.

But what is nice with teaching the PGCE's is that you have them already coming to class with that content knowledge. So the pedagogy becomes easier, because you sort of feed off from their own knowledge base. Which makes it so much interesting. (Nicole, p.4)

Well I, you know we've got these students who are so wonderful. They are empowered in terms of content knowledge, however the problem that we have it's methodology. (William, p.6)

Nicole values her students' content knowledge as enabling pedagogical training, and supporting teaching and learning in the module. Although William praises his students' content knowledge, he seems to view content knowledge and methodological skills as separate knowledge domains. Nonetheless, their references to content knowledge suggest that this knowledge domain is a prerequisite for methodological training.

Carla, Nicole and William's comments show that teacher educators' views of their students vary, and that this seems to have a direct influence on their teaching styles. Nicole and William emphasise interactive, discussion-based teaching, which is dependent on students' competencies, including their subject content knowledge.

Sam's view of himself and his relationship with his students includes his role as a mentor on a personal and professional level.

I successfully succeed in convincing my students that their humanity and needs are my priority. In this regard I follow, among others, an open-door policy. I do not believe in consulting hours and I encourage my students continuously to come and see me any time during office hours about academic or personal problems. They know that they can trust me and I experience that they highly appreciate my advice. I have always made a point of knowing each student in my class' name. Furthermore I try to, during any contact session, verbally go about with each person that is present that day. In this way I convince them that each individual is important to me. (Sam, p.4)

Sam's utterance suggests that he is confident about the influence he has on his students; he views his students as requiring guidance on and support with regard to academic and personal issues. He feels an obligation to build rapport with his students and to build a relationship based on trust. This suggests that he adopts a paternal role. This could be linked to his view that he needs to model ideal teacher traits to his students so they can develop these traits (cf. 4.4.3).

I have a passion for young people and I believe unconditionally in the contribution and necessity of well-motivated, well-trained teachers that can fulfil the role of educators, and specifically substitute parents in the current and future South Africa. (Sam, p.3)

Sam's experience as a secondary school teacher could have exposed him to divergent teaching contexts which required of him to act as a '*substitute parent*'. Based on that experience, he reckons that the same might be expected of his students.

The high expectations these teacher educators have of their students' ability to be contributors and influencers of teaching is reflected in the way they (teacher educators) address their students' needs and concerns in their teaching and assessment practices.

That's when I would realise my students would want us to use a methodology, which is more, you know kind of like I say pedagogy but it is ways of sharing content, of passing content to students for them to understand. (William, p.7)

William seems to be sensitive to his students' learning needs and views them as partners in the teaching process. He is therefore willing to adapt his methodology to suit his students' needs. In this way, he is modelling pedagogic skills required by an Economics teacher.

I used to say they must teach a grade 10, 11 and 12 uhm lesson, but then later on I discovered three is, it's too much. Because by the time they must do the grade 12 presentation, that's in the fourth term, they already have gone out on teaching practice. In the third term and they come back to university the fourth term they are so sick and tired of presenting [laughs] that they don't want to do another presentation. So I've taken that grade 12 presentation away. (Emily, p.9)

Emily seems to be responsive to her students' opinion. In this case, their comments led her to reflect on her assessments practices and to reduce the number of presentations. This suggests that Emily's assessment strategy is adaptable and focuses not only on reaching the intended module outcomes, but engaging students in the process.

Although William seems willing to adapt his teaching style to model ideal teaching, he only does so if he truly believes his students would benefit from it.

So once you come across those students, you realise that some of them were used to a particular method and then for example if you are saying whatever you are teaching, you need to from time to time say to them this is for the exam. This is important. But my approach is not like that. I want them to understand, so I won't say this is for the exam. So they would find me very difficult to say you bring in a lot of application. And that's what I enjoy. (William, p.7)

William's comment relates to Emily's reference to students who have become accustomed to certain teaching approaches (cf. 4.4.3), and it points to his students' expectations of him as a lecturer. Even though William acknowledges that his teaching approach is unlike the approach his students seem to be accustomed to, he continues to use it because he believes in the value of focusing on application rather than mere transfer of knowledge in examinations.

Although teacher educators' perspectives of their students differ, it appears that they have good relationships with their students, and are responsive to their students' learning needs. They seem to value their student's responses and inputs and view them as co-constructors of the teaching and learning process. The final sub-theme provides suggestions on how teacher educators measure the effectiveness of their teaching and students' attainment of intended module outcomes through assessment practices.

4.4.6 Sub-theme 2.6: Assessment practices employed by teacher educators

Assessment can be viewed as a means of measuring the success of an instructional opportunity aimed at attaining predetermined outcomes. Assessment in this instance is used to measure learning ascribable to teaching to gain an insight into the nature of delivery. The following discussion of assessment practices focuses on comments made by teacher educators related to assessment, and then on aspects of assessment included or prescribed in curriculum documents.

Elements of assessment found in the comments of these teacher educators suggest that they seem to view assessment as an integral part of the teaching and learning process.

Okay, uhm, the content is uhm, okay first let me start off with how I assess them, because the content is actually linked to their assessments. Okay, uhm, actually the assessment is linked to the content but if I start with the assessment first, I think it will be better just for you to get a quick, just to get a quick picture in your head. (Nicole, p.9)

Nicole seems to view assessment as an integral part of the module, as she uses the results of assessment to guide her teaching and selection of content for the module. The value attached to assessment could suggest that her teaching is focused on preparing students for what will be assessed so aspects of teaching or learning that are not linked to assessments are deemed trivial. This suggests a rather narrow approach to teaching. The implication is

that, since students are rarely consulted on the compilation of assessments, it is not possible to address students' learning needs or adapt assessments to support students' maturation as teachers.

These teacher educators use a number of different types, forms, methods and instruments of assessment in the course of the module. Diagnostic assessment is used to determine students' prior knowledge before commencing with teaching.

Now, I have to like the first time I meet them this time around I let them know where are they coming from, I interact with them, I try to know their background about Economics. (Carla, p.4)

Carla has realised that she cannot assume what her students know and are capable of doing (cf. 4.4.5) and she therefore actively engages with her students to determine their prior knowledge of Economics. She realises that her students' knowledge deficits may require her to adapt her teaching to suit her students' needs and provide adequate support for them to reach the intended module outcomes.

The collaborative nature of teaching and the importance attached to students' learning from one other is supported by peer assessment strategies.

I also use peer assessment to assess the success of a teaching opportunity. (Sam, p.6)

Sam's assessment practices support his teaching style (cf. 4.4.2) as he values interaction between students and requires student teachers to form an opinion of good teaching and be able to discern between good and bad teaching.

Information pertaining to assessment as outlined in curriculum documents provide details on what is needed to complete the module successfully and the variety of assessment opportunities and their respective contribution to the final module mark required to pass the module. Assessments in PGCE Economics curricula take the form of assignments, lesson presentations, portfolios, tests and examinations. The student teachers are not only individually assessed, but also, in some instances, in groups (Eastern University), or in pairs (Northern University).

The assessment instruments employed vary. Three of the five Universities (Southern, Northern and Western) have opted for a combination of tests and assignments, whereas the Eastern and Central University do not seem to use formal tests, but set assignments instead. All the Universities except the Northern University have a final examination at the end of the year as a summative assessment, which contributes between 40 and 50% of the final module mark. Overall, assessment seems to be continuous in nature and focuses on topics such as lesson planning and lesson presentation; the development and analysis of assessment instruments such as tests, memoranda and examination papers; a teacher's administrative skills and the ideal Economics teacher.

All the curriculum documents contain some form of assessment on lesson planning and most of them include lesson presentation. The lesson presentations are in some instances assessed by the teacher educator (Western and Eastern), and in other instances by peers (Northern and Southern). Peer assessment is congruent with the collaborative nature of teaching and the facilitator role of teacher educators.

The development of lesson plans seems to vary in depth from a narrow focus on technical requirements to deep reflection on and the analysis of the teaching process. The development of lesson plans at the Eastern, Western and Southern Universities seems to aim at developing practical teaching skills, as the enactment of these lesson plans is required.

Assignments from two Universities require student teachers to set a test and a memorandum (Eastern and Southern), and the Southern University requires the compilation of a Record examination and memorandum as part of a more comprehensive portfolio. The Central University requires an in-depth analysis of examination papers.

In conclusion, the delivery of the Economics methodology curricula leans towards interactive, discussion-based teaching, in which students are viewed as collaborators in the teaching process and have to take responsibility for their own learning, while being given the opportunity to develop their unique identity as a teacher. Assessments seem to support the measurement of attainment of the module outcomes, as well as developing the practical competencies of prospective Economics teachers.

PART D

4.5 THEME 3: THEORETICAL INFLUENCES

After analysing the nature of curriculum (cf. 4.3) and the nature of delivery (cf. 4.4), I sought to discover which theories had influenced these teacher educators' teaching and their perspectives on the preparation of Economics teachers. Insight into the guiding theories helped to answer the final research question that seeks to determine the theoretical influences that underlie the PGCE module for Economics teaching. This cast light on the perspectives of teacher educators on the PCK required for secondary school Economics teaching.

During the interviews, teacher educators were requested to elaborate on their teaching philosophy, which were, in some instances, related to popular teaching or learning theories. Emily and Sam's teaching philosophies allude to socio-constructivism.

Okay. I basically use eh, constructivism. (Emily, p.8)

...there was a shift in my personal teaching approach in favour of the social constructivist approach to teaching and learning as a foundation for cooperative, learner-centred teaching and learning. (Sam, p.2)

After Emily's comment on her teaching philosophy, she reflected on a teaching experience and emphasised the importance of interactive lectures, where students' experiences are recognised (Emily, p.8), and Sam emphasised the importance of providing *practice-oriented examples* for his students, as well as requiring his students to work in groups (Sam, p.3). The elaboration of the teaching approaches employed suggests a narrow conceptual soundness of their comprehension of socio-constructivism.

William related his teaching philosophy to the critical theory.

So my philosophy is I am actually speaking for change in education... (William, p.3)

So I would say my philosophy has been influenced by many theories especially the critical theory. (William, p.5)

Throughout the interview, William seems to use vocabulary that could be related to elements of critical theory, such as *speaking for change* (p. 3), *teacher autonomy* (p. 3), *student activist* (p. 4), *agents of change* (p. 5), *empowered* (p. 6). However, when reflecting on his

teaching, he emphasises that his approach focuses on student engagement (p. 5), and the integration of ICT in teaching (p. 6). This suggests a narrow understanding of critical theory.

Nicole's teaching philosophy seems to be closely related to her field of research, as she named it 'business in society philosophy'.

Uhm, I have a, a teaching philosophy that, uh, goes beyond just looking at the triple bottom line, so I call it the business in society philosophy. (Nicole, p.3)

Carla explained that she 'borrowed' from various philosophies and shifted from conservative, progressive and radical theories, depending on the context and the topic under study.

I have, I, I tend to borrow from all of, all of the progressive, radical, I borrow whatever suits what I'm doing, I borrow from there. (Carla, p.5)

From the comments above, it seems that these teacher educators were willing to 'name-drop' grand theories, without much explanation of what the theories actually mean. Bearing the teaching philosophies in mind, the collective evaluation of these teacher educators' comments and the curriculum documents could provide indications of whether the theory explicitly mentioned by these five teacher educators were enacted during their delivery of the module.

In order to simplify the analysis, the theories underpinning the teaching and curriculum construction of teacher educators were placed into broad categories termed Conservative, Progressive and Radical Theories (Gwele, 2005). My aim was not simply to engage in a technical exercise of trying to locate theories in a particular box, but to try to get a sense of what had influenced them.

Theories related to Essentialism and Behaviourism fell under the Conservative category (4.5.1), whereas Pragmatism, Experimentalism, Constructivism and Social Constructivism fell under the Progressive category (4.5.2) and Reconstructionism and Critical curriculum theory leaned towards the Radical category (4.5.3). Finally, the combined profile of the ideal Economics teacher sketched by these teacher educators was analysed for indications of Pedagogical Content Knowledge (4.5.4) and a synopsis of the theoretical influences (4.5.5). Throughout the discussion, reference is made to elements of the first two themes and related sub-themes, as support for the selection of theory.

4.5.1 Conservative

In the first theme, the most striking element was the reliance on prescribed departmental policy documents, and especially the CAPS document to inform the PGCE curriculum (cf. 4.3.1). It is assumed that these departmental policy documents are compiled by education officials in authoritative positions, who are regarded as experts in the field. Therefore, these teacher educators could see these documents and the prescriptions in them as valid and reliable. The strict adherence to the CAPS and other policy documents required by school teachers in South African public schools seems to be reinforced by these teacher educators who transfer them to student teachers.

Moreover, teacher educators seem to require prospective teachers to be knowledgeable in fields other than education policy and their subject speciality (cf. 4.3.3), including knowledge and skills in Mathematics (William, p.10), as well as general skills such as reading and language skills (Carla, p.10), communication, interpersonal, presentation and technological skills (Sam, p.6). Furthermore, importance seems to be attached to the development and demonstration of various pedagogical skills, and especially practical teaching skills such as lesson planning and lesson presentation (cf. 4.3.2). Furthermore, it seems that these teacher educators view themselves as experts in the field and as such are required to model ideal teaching and ideal behaviour (cf. 4.4.3). Assessment of the acquisition of knowledge and skills is also emphasised. This is because student teachers are required to be knowledgeable and skilled in various methods, forms and types of assessment (cf. 4.3.2.5).

The teacher educators seem to rely on the expertise of those in authority in deciding what learners are required to learn, and what teachers are required to teach, as reflected in their adherence to prescribed education policy. This view together with the worthwhile knowledge required by prospective teachers, the modelling of teaching by the expert teacher (teacher educator) seems to reflect the perceived role of learners and teachers in society, suggests elements of Essentialism.

The teacher educators seem to hold an authoritarian view of curriculum construction, since they decide what is taught, when it will be taught and how it will be taught. This is reflected in the task of compiling the year plan of the module, which requires them to identify, select and organise what is to be learned, how and when it is to be learned, without any taking account of student input (cf. 4.4.1).

The presumed authoritarian position held by teacher educators, is reflected in the elements of classroom management and discipline mentioned in the comments of two of the teacher educators (Emily, p. 25 and Sam, p. 3, 4) and included in the curriculum document of the Southern University (Topics 2, 3 and 8), (cf. 4.3.2.6). This indicates that prospective Economics teachers will be required to exercise control over a classroom and effectively over learners. This may be described as a strict, regimental approach to teaching, where the role of the teacher is viewed as one of controller and dictator of learning. The teacher seems to be strong and powerful and the child is weak. Here elements of Behaviourist theories seem evident. When considering teacher educators' earlier remarks (cf. 4.5), there seems to be a tension between their espousal of constructivism and their pre-occupation with authority and control.

Furthermore, teacher educators sketch the profile of the ideal teacher as one with a wide array of characteristics and skills required for the various roles a prospective teacher needs to fill.

Just like the Economics teacher, all educators should deliver a core contribution to the transformation of education in South Africa. As in the National Curriculum statement for Grades 7–12 of 2003, I propose Economics teachers who are qualified, competent, dedicated and compassionate. Such teachers are able to fulfil the various roles stipulated in the Norms and Standards for Educators. According to this, teachers are viewed as facilitators of learning, interpreters and designers of learning programmes and learning materials, leaders, administrators, managers, subject specialists, researchers, lifelong learners, community members, citizens and counsellors, assessors and experts of subjects. (Sam, p.7)

It also reflects the perspective that education is a noble calling.

But what I, this is now my own uhm, belief, uhm, is that a teacher is not somebody that you can just take off the street and train. A teacher is somebody that comes, that enrolls for a teaching qualification because he is called to do it. It is not just a job for you. It's a divine calling I believe. (Emily, p.27)

Sam's idealist portrayal of the teacher possessing a multitude of characteristics and skills, as well as Emily's perspective of teaching as a noble calling, seems to reflect an emotional response towards teachers and the teaching profession. This suggests that their views have been influenced by elements of idealism and romanticism.

4.5.2 Progressive

Considering the nature of the curriculum (cf. 4.3), the teacher educators seem to include content that they believe would develop the skills required by prospective teachers in practice. The assessments that student teachers are required to complete in the course of the module suggest a focus on developing the administrative skills of teachers (Eastern University, Module Outcome 14; and Southern University, Topic 2). Moreover, teacher educators regularly refer to the experience they have gained as teachers, and how they propose to teach prospective teachers practical teaching skills, as the utterances below seems to focus on practical tips for teachers to implement in schools.

Uhm, and so what I try to do is, I now try to uhm, mimic, you know, the way a teacher is supposed to teach in a school setup, so that they can see that example, at least you know, then take that to the school. So I try to make it very practical. (Emily, p.8)

Through personal example, consistent application of discipline and tips that I acquired in this regard in practice, I try to prepare my students as such for practice. (Sam, p.4)

Student teachers are required to have practice in how to teach. The opportunities they have to do micro teaching (cf. 4.3.2.3), and the suggestion that more opportunities be created for them to teach in diverse contexts (William, p.12) support the notion of learning by doing. The contribution their experiences make to teaching and learning is reflected in the remark below:

I believe that you must include the lived curriculum. You must include the students' and even your lived experiences in that whole, in the education and learning processes. (Emily, p.9)

The focus on developing practical teaching skills, as well as valuing learners' life experiences suggests elements of Experiential learning, which can be closely linked to Constructivism. Students are viewed as partners and co-constructors of knowledge, as well as active participants in the learning process (cf. 4.4.2). The focus on the teacher as a facilitator of knowledge and student teachers being responsible for their own learning and learning through reflection are included in the following module outcomes and topics. Collectively they suggest a Constructivist approach to teaching:

Demonstrate thorough knowledge of various approaches, methods and media they can use to facilitate teaching and learning in an Economics classroom; (Western University: 2.1)

Demonstrate skills of reflection and self-critique as it relates to Economics teaching (Central University: 6)

Action Research (Eastern University: 6)

Self-regulated learning (Western University: 2.3)

Elements of social constructivism are also evident, where cooperation and collaboration between students in class discussions is encouraged, based on the view that knowledge is socially constructed.

Engage in reflective practice in collaboration with their peers. (Western University: 2.4)

Let's talk about the topic of cooperative learning. If you want to teach them to understand cooperative learning, do it with them. And then you can reflect on what we have done and in that process they will be able to tell you, you will be able to pick up that if we are talking about interdependence or learning from other people, especially if you've got a rich environment where you have a diversity of students. They will be able to say to you but I'm learning about other people's culture, whilst I'm learning the content also. So, that's one way of doing that. (William, p.8)

The assessments that student teachers are required to complete also contain elements of cooperative learning. This is evident in the group and peer assessment that is indicated (cf. 4.4.2, 4.4.6). It seems that the provision of the necessary resources helps student teachers to discover information and acquire knowledge. Importance is attached to the use of a variety of resources (cf. 4.3.2.4), which emphasises the Social Constructivist notion that knowledge is communally based.

4.5.3 Radical

Most of the teacher educators made little or no reference to radical theories of curriculum. However, one teacher educator's comments suggest a critical approach towards teaching and learning.

So I would say my philosophy has been influenced by many theories especially the critical theory. It has been influenced from that perspective, so I really want to see that

happen, where we become agents of change, when we change how we do things for the better. Not just change, but change for the better. (William, p.5)

William's emphasis on the need for change is explained by his role as a student activist (William, p.4) who contributed to post-apartheid curricula. His remark is supported by the module outcome of the Western University:

The aforementioned should be achieved through applying creative ways in which students challenge common Economics and business practices that perpetuate oppression. (Western University: 2.3)

William seems to view general Economic and business practices as a source of oppression, and calls for the need for change, and especially the abolition of the oppression which characterises the discipline he teaches (Economics and business). He seems to view education and teachers as agents of change. This relates to the second topic of the Central University, where there seems to be a conflict between the nature of teaching and the nature of Economics as a discipline.

Social justice and Economics teaching

The nature of Economics as a discipline (neutrality, social justice, ideology). (Central University: 2.1)

Key words in certain of the module outcomes of the Eastern University could suggest an element of radical theory. However, the comments of the teacher educator responsible for the compilation of this document are not congruent with the content of the module outcomes:

Develop a conceptual understanding of definitions, values and human rights issues. (Eastern University: 3)

Interpret, develop and design learning materials within the context of transformation in the curriculum and the education system. (Eastern University: 4)

Play a leading role in the development and empowerment of learners and communities in understanding issues in Accounting, Business Studies and/or Economics education which affect their lives. (Eastern University: 11)

The dissonance between the content of the curricula and the comments of the teacher educator who compiled the curricula (Emily) could suggest an attempt by the teacher

educator to include elements of critical theory, in light of the need for transformation and the empowerment of teachers to lead the process. Since the elements of critical theory are not reflected in Emily's remarks, she may not be experienced in enacting the principles of critical theory.

4.5.4 Rudimentary conceptualisations of PCK

Even though none of the curriculum documents explicitly names PCK as an element required by prospective Economics teachers, the majority of teacher educators seem to be familiar with the term. However, the elements related to PCK which emerged from the data (comments as well as curriculum documents), suggest a basic understanding of PCK for Economics teaching. An exposition of the elements will subsequently be provided:

The emphasis on subject content knowledge for Economics teaching (cf. 4.3.3) as a prerequisite for effective teaching; the prominence of general teaching skills and developing pedagogic competencies (cf. 4.3.2), the inclusion of specific teaching strategies for specific Economics topics (cf. 4.3.3); the centrality of, and reliance on South African school policy (cf. 4.3.1) and the desirability of knowing learners and taking their various contexts into account (cf. 4.3.5) jointly relate to elements of PCK proposed by Shulman (1986). However, it seems that overall, PCK is implied, but not specifically addressed in Economics methodology curricula. This suggests that there are only elementary conceptions of PCK and its possible applications to Economics teacher education.

4.5.5 Synopsis of theoretical influences

In conclusion, it seems that none of the teacher educators seems to be locked into one theory. Many of them seem to be drawing on different theories. However, there is also some tension in that they contradict each other and at times, contradict themselves. The results suggest that teacher educators' experience in teaching in certain educational sectors has had an influence on the theories that underlie their teaching. In the discussion that follows, reference is made to teacher educators' teaching philosophies and how they relate to the theories underpinning their teaching and curriculum documents, as well as their teaching experience.

It seems that Emily's approach is situated in the social constructivist theory, as she values students' active engagement in teaching and emphasises the importance of learning by doing. However, there seem to be elements of the conservative theory. Where the module

outcomes tend to focus on the CAPS, she has included elements of discipline in her teaching and she deems it necessary to model ideal teaching as the teaching expert.

Even though Sam indicated that his teaching is situated in a social constructivist theory, the module outcomes and topics of the Southern University suggest otherwise. The focus on the CAPS, classroom management and discipline leans towards a conservative approach, which could explain his desire to play a paternal role (Sam, p.3). Sam, who had the most secondary school experience of all the teacher educators, may perceive the traditional role of a teacher as a mentor and substitute-parent. These perceptions suggest a leaning towards the conservative theories.

William's comments suggest that his approach is radical, more specifically that it is situated in critical theory, as he focuses on empowerment, teacher autonomy and change in education. His experience as a student activist involved in developing the post-apartheid curriculum has greatly influenced his perspective on teaching and the role of teachers. However, as he is required to reflect on his teaching approach, and with the incorporation of the curriculum documents, it seems that there are elements of progressive and conservative theories involved.

Even though Nicole's philosophy focused on the role of businesses in society, her comments suggest that her teaching is influenced by progressive theories, specifically social constructivism. She mentions classroom discussions, interaction with and between learners. Furthermore, the focus of her teaching seems to be directed towards students and what they find interesting and stimulating. Nicole has had more tertiary teaching experience than any of the other teacher educators, and her comments and curriculum documents do not show any clear traces of conservative theories.

Finally, Carla tends to shift between conservative and progressive theories. Her reliance on the CAPS document to guide her teaching is offset by the importance she attaches to students' self-directed learning and their contributions during class discussions.

Overall, it seems that there are multiple theoretical influences and different points in each of the curricula and different topics, and teacher educators mainly tend to shift between conservative and progressive theories. The reliance on progressive theories such as constructivism and social constructivism is in line with current research on teacher education and the preparation of 21st century learners who are self-directed, cooperative learners.

4.6 CONCLUSION

In this chapter, the elicitation of the data provided some insight into the profiles of the teacher educators and how their Economics teaching experiences have influenced the ways in which they view ideal Economics teachers. The nature of the Economics methodology modules, their espoused approach to teaching it, and the major theories of teaching and learning that guided these teacher educators in the construction of the modules were discussed. In the next chapter the findings of the study are discussed, as well as recommendations for possible future research.

CHAPTER 5

FINDINGS, RECOMMENDATIONS AND CONCLUSION

5.1 INTRODUCTION

In the previous chapter, the results of the data analysis were categorised into three main themes and related sub-themes, which cast light on the nature of Economics methodology curricula at traditional South African universities, their mode of delivery, as well as the theoretical assumptions that inform the curricula. This chapter provides an overview of the study (5.2), which refers specifically to each of the preceding chapters and discusses the findings of the study (5.3), with reference to the results from the data analysis as well as supporting literature. Thereafter, the implications of the findings (5.4) are discussed with recommendations and suggestions for future research (5.5). The limitations of the study are outlined in section 5.6, followed by reflections on the study (5.7) and the conclusion of the chapter (5.8).

In this study I set out to explore teacher educators' perspectives on PCK for secondary school Economics teaching. The main research question was:

What are teacher educators' perspectives on the PCK required for secondary school Economics teaching?

Four secondary research questions supplemented the main research question:

1. What are the profiles of Economics teacher educators and how do these teacher educators perceive the typical profile of a prospective Economics teacher?
2. How is curriculum content selected for Economics methodology modules?
3. What is the nature of Economics methodology curricula in selected South African universities?
4. What theoretical influences underlie the Economics methodology curricula in selected South African universities?

5.2 OVERVIEW OF THE STUDY

Chapter 1 set the scene for the study by providing an overview of the SA educational landscape, the problem statement and the rationale for researching the topic. A brief discussion of scholarly literature and with the theoretical perspectives influencing the study

followed. These informed the conceptual framework that guided this study. The research questions as well as the research design and methodology employed for this study were also briefly introduced.

Chapter 2 provided a review of existing scholarly literature on teacher education and teacher educators in local and international contexts, as well as their important role in improving the preparation of future teachers. The background of pedagogical content knowledge was sketched, as well as research that evolved from pedagogical content knowledge of various subjects. An overview of the literature on Economics education, its nature and relevance and teaching strategies for Economics were provided. It became evident that there is a dearth of research on Economics teacher educators in South African universities and that there is a need to expand the research on PCK for Economics in South African contexts.

Chapter 3 focused on the research design and methodology employed in this study. Qualitative research methodology situated in an idealist interpretivist paradigm framed the process of data generation and analysis. The chapter discussed the validity and trustworthiness of the study, my role as researcher, and finally the ethical aspects concerning the study. On reflecting on the research methodology, I realised that the chosen methodology provided depth to the process of data analysis, and the interviews provided rich responses and loaded meanings.

Chapter 4 discussed the themes that emerged from the data analysis. Insight was provided into who teacher educators are and the guiding motives that aided in the construction of the Economics methodology modules. The nature of the modules was revealed as well as the nature of the intended delivery of the modules. Finally, the theories underlying the Economics methodology curriculum and the practice of teacher educators emerged.

5.3 DISCUSSION OF THE FINDINGS

The findings of the study are related to the research questions and the extent to which the findings addressed the stated research questions is discussed.

5.3.1 The profiles of Economics teacher educators at five traditional South African universities

The teacher educators at South African universities have varying backgrounds, qualifications and teaching experience, which influence their teaching and their expectations of future teachers. Three of the teacher educators were female and two were male. Two teacher educators had completed their PhDs at the time of the study, two others were engaged in PhD research, and the other teacher educator did not specify the nature of his current research.

Teacher educators' experience in secondary and tertiary, or higher education environments varies, but the majority have had more teaching experience in secondary schools than in tertiary environments. The career histories of these teacher educators corresponds with the general course of professional development of teacher educators at South African universities (Maodzwa-Taruvunga & Divala, 2014:1965). Most of them qualify as teachers and teach in schools before entering academia. Once they enter academia, they obtain further qualifications in education such as master's and doctoral degrees.

The majority of teacher educators indicated that they had held management and leadership positions in their current and previous occupations, including serving as heads of department, subject heads and or programme leaders. This suggests that their selection as teacher educators was based on teaching and leadership strengths, and not necessarily on their research experience (Braund, 2015:321; Jita & Mokele, 2013:127).

The experiences of teacher educators seem to have had a strong impact on their view of education, the curriculum, the nature and purpose of teachers and also teacher education. The teacher educator who has had the most secondary school teaching experience and leadership roles has an authoritarian view of a teacher towards students. This may be related to the fact that teachers view discipline in many South African schools as a serious problem (Venter & Van Niekerk, 2011:245; Teise, 2015:51). Therefore, while he espouses socio-constructivism as his teaching philosophy, he is very aware of the constraining factors in the South African school context.

Only two of the five teacher educators said that Economics was their area of specialisation, the three other participants indicated that business or accounting were their areas of specialisation. This could be explained by the fact that many teacher educators are part-time contract staff who are often appointed quite late in the year. Another possible reason for this

phenomenon could be that the remuneration of contract staff is unattractive for appropriately qualified individuals.

This poses the question of whether all Economics teacher educators are suitably qualified to teach the subject methodology, if their practices are influenced by the principles of disciplines other than Economics. However, there seems to be a tendency for teacher educators to be required to teach in fields outside their area of specialisation (Hoadley, 2009:35). Nonetheless, the majority of teacher educators seem to be confident of their abilities. They view themselves as accomplished individuals who can set a personal and professional example for their students by modelling ideal teaching and the behaviour of an ideal teacher (cf. 4.4.3).

The Economics teacher educators who participated in this study seem to view the ideal Economics teacher as someone who should have exceptional Economics subject content knowledge (Shulman, 1986:5; Ball *et al.*, 2008:390; Colander, 2004:63). It is assumed that graduates who enter the PGCE have the requisite content knowledge (cf. 4.3.3), and therefore the curricula does not contain make provision for student teachers to improve their subject content knowledge (cf. 4.4.5). Time constraints also do not allow for the teaching of content (cf. 4.4.1). The ideal Economics teacher should be critical and make connections between Economic theory and practice, whilst developing critical thinking skills (cf. 4.3.3). It seems that teacher educators have high expectations of prospective Economics teachers. However, the students they encounter may not see teaching as their first career choice. They may have chosen teaching because they are unable to find jobs in the corporate sector. Motivating such individuals may prove quite challenging for teacher educators who might have idealistic expectations of their student teachers.

5.3.2 Selection of curriculum content for Economics methodology modules

The selection of curriculum content seems to be guided by policy prescriptions and especially the MRTEQ and the CAPS for Economics. The modules reflect breadth of general principles required for prospective teachers as stipulated by the MRTEQ (cf. 2.2.3), but in most instances lack depth with regard to the principles of teaching Economics. Moreover, it seems that teacher educators' teaching experience strongly influences their teaching of student teachers (cf. 4.2). There is an absence of a theoretical framework for the inclusion of content in the Economics methodology curricula (Korthagen, 2010b:408).

This lack of a theoretical framework could be ascribed to the limited research done by teacher educators on their own practice (cf. 5.3.1). Mukeredzi (2015:143) and Kruss (2009:3) propose self-study and critical reflection for teacher educators to promote their professional development. Jita and Mokele (2013:127) suggest communities of practice in HEIs in South Africa, which could help to stimulate interest in and emphasise the need for research by teacher educators. A curriculum based on research is likely to have more theoretical depth.

5.3.3 The nature of Economics methodology curricula in South African universities

The Economics methodology curricula in South African universities seem to be driven by South African school policy, more specifically the CAPS document, as all the curricula contain content on the CAPS for Economics (cf. 4.3.1). This is in line with scholars' belief that student teachers need to be prepared for practices of the profession (Shulman, 1987; Boyd *et al.*, 2009; Lumadi & Acquah, 2014:2853). However, the CAPS document is quite prescriptive as to what these practices of the profession should be. Korthagen *et al.* (2006:1029) suggests that teacher education should shift from a focus on the curriculum to increased focus on the learner, or in this instance, the student teacher, as learning to teach is a bottom-up process (Korthagen, 2010a:98).

The focus on the South African school policy is questionable, as not all students enrolled for the PGCE programme at these universities will teach in South African schools that follow the CAPS. Local and international students who attend South African universities may teach abroad or in private schools that follow a different curricula. Furthermore, the fluidity of the CAPS would necessitate the need for frequent training to meet any changes to it.

A great portion of Economics methodology curricula focus on the development of general pedagogic competencies, formulated by teacher educators as the 'how' of teaching (cf. 4.3.2). Even though the development of teaching skills is a requirement of the PGCE programme (MRTEQ, 2015:8), the breadth of content on lesson planning, lesson presentation, assessment and classroom management in a subject methodology module is questionable, since general teaching modules tend to deal with these aspects. The inclusion of these aspects could be explained by a lack of overall programme coherence, where individual teacher educators work in insular departments without the collegial consultation necessary for a more integrated approach to the PGCE programme. Insularity could result in the repetition of information in the PGCE programme.

The focus on the CAPS and MRTEQ when constructing Economics methodology modules reflects a “bureaucratic compliance” characteristic of teacher education programmes compiled by teacher educators at South African universities (Kruss, 2009:157). The influence of the strict adherence to prescribed policy may impede the development of new, authentic knowledge, especially subject specific knowledge pedagogical knowledge, and constrain academic autonomy in teacher education.

The emphasis on developing skills of lesson planning in accordance with the CAPS prescriptions is comparable to the scripted curriculum provided to teachers in American schools. These scripted curricula have been criticised by scholars (Remillard & Reinke, 2012; Milner, 2013; Timberlake *et al.*, 2017). Korthagen (2010b) and Rusznyak (2015) cautions against the over-emphasis on general teaching tips and tricks in teacher education, as the multitude of techniques, concepts and skills without a clear overarching framework, may be confusing for student teachers, especially in the light of the other modules in the PGCE curriculum. The focus is on preparing student teachers for the everyday demands of classroom life (cf. 4.3.2.6). This has been criticised for its lack of intellectual content: only contingent concepts and strategies are taught which act as immediate coping strategies, but are not theoretically informed (Rusznyak, 2015:18).

Superficial reference to theories of teaching and learning (cf. 4.3.2.2) could deepen the theory-practice divide which characterises traditional teacher education. As universities are viewed as responsible for providing student teachers with an appropriate theoretical foundation, and schools are tasked with providing practical teaching experience, the responsibility falls on the student teacher to enact these theories in practice. This is related to the technical-rationality model (Korthagen, 2010b:408). The theory-practice division could be reinforced if students are not provided with the opportunity to reflect on the application and implications of their teaching and learners’ learning, while teacher educators are required to provide support on how theory informs practice and how practice talks back to theory.

The requirement of developing various teaching resources (cf. 4.3.2.4) is in line with the suggestion made by Clark *et al.* (2009:1) that a variety of curriculum materials and resources can support optimal learning of Economics by young people. Al-Bahrani and Patel suggest the incorporation of Twitter, Instagram and Facebook in Economics classrooms (2015:56), in line with participants’ suggestions on using social media to promote the teaching and learning of Economics. Further ways in which technology could be used in Economics

classrooms, not included in teacher educators' responses, are podcasts, blogs and wikis and apps for Economics (Moryl, 2014; Cameron, 2012; Cochran *et al.*, 2015).

James (2006) emphasises the importance of teaching prospective teachers about effective assessment practices, but states that these practices are usually not based on sound theories of learning. Although the development of assessment strategies is required by MRTEQ (2015:10), the emphasis seems to be on general principles, methods and types of assessment (cf. 4.3.2.5) which are generic. The failure to link the discipline of Economics and specific assessment strategies is not conducive for the development of PCK for Economics.

It seems that the link between general pedagogic knowledge and specific subject content knowledge is weak. PCK as a knowledge base for Economics teaching is not explicitly mentioned in any of the modules, and only one module has linked specific teaching strategies and particular Economics topics (cf. 4.3.3). Some modules include content on teaching methods in general or sections that deal with the teaching of Economics topics in grades 10 to 12. It seems that the focus is on developing general teaching skills, without taking account of the unique nature of Economics as a discipline and the particular PCK-based teaching skills required to teach the subject effectively.

The importance of developing student teachers' ability to reflect (cf. 4.3.4) is emphasised by Nilsson (2008:1293) and Korthagen (2010a:104) as a means of developing schemata from *gestalt* (cf. 2.2.1) and enhancing the transformation of student teachers' knowledge domains to develop their PCK. These reflective practices, which can also help teachers to formulate their professional identities and teaching competences, acknowledge student teachers' educational experiences and construct personalised practical knowledge through personal experiences (Mukeredzi, 2015:142; Rusznyak, 2015:18).

The emphasis on context-sensitive teacher education (cf. 4.3.5) is in line with the need to prepare prospective teachers to teach in the diverse contexts of South African schools (Nomlomo & Sosibo, 2016:204). It seems that teacher educators are aware of the internal and external contextual factors (Steyn *et al.*, 2016:32). This supports the notion that there should be contextually-driven coherence in teacher education programmes in South Africa (Rusznyak, 2015).

5.3.4 The nature of delivery of Economics methodology curricula in SA universities

Teacher educators agree that the time allocated for the Economics methodology curricula for PGCE students is insufficient to prepare an Economics teacher effectively (cf. 4.4.1). The great portion of time allocated to teaching general pedagogic principles in the Economics methodology modules could further exhaust the limited time to teach principles of Economics teaching. However, the criticism that the inadequate time is allotted to it in the PGCE programme as a whole is reflected in student teachers' views as well (Nomlomo & Sosibo, 2016:211).

Since this study focused on the espoused curriculum (Kruss, 2009:3), only that which teacher educators claimed to teach could be included in the data that was analysed for indications of the delivery of the module. The nature of teaching approaches that teacher educators said they employ during their teaching (cf. 4.4.2) is related to the recommended Economics teaching strategies (cf. 4.3.3), as well as to general teaching strategies of Economics such as active learning, simulations, class discussions, small group work and guest speakers (Joshi & Marri, 2006:199; Becker *et al.*, 2006; Clark *et al.*, 2009:10; Salemi & Walstad, 2010; Tang, 2011:37).

The emphasis on modelling ideal teaching to student teachers (cf. 4.4.3) relates to the notion that pre-service teacher education should not only allow students to hear and read about teaching, but experience ideal teaching (Korthagen *et al.*, 2006:1036; Lunenberg *et al.*, 2007:589; Tilema, 2007:278). The focus on modelling ideal teaching behaviour, relates to the apprenticeship of observation (Lortie, 1975), but seems to strengthen the observational nature of learning to teach. Westrick and Morris (2016:157) suggest that teacher education pedagogy should aim at disrupting the apprenticeship of observation to enable preservice teachers to develop a more comprehensive understanding of the complexities of teaching and thus overcome some of the challenges of learning to teach.

Furthermore, the effectiveness of this intended modelling is questionable, since teacher educators fail to link their practices to theory (Lunenberg *et al.*, 2007:597). The use of modelling to enhance student teachers' learning about teaching, can only be effective if teacher educators explicitly discuss the value of modelling and link it to relevant education theories. Moreover, the opportunity should be created for student teachers to question and reflect on the teaching of teacher educators in order to develop a framework of teaching that they can use to inform their teaching practice. This is not generally included in teacher

education programmes, as teacher educators view themselves as experts and find the prospect of vulnerability difficult (ibid., 598).

The resources that teacher educators say that they use during their teaching (cf. 4.4.4) accords with the resources they suggest prospective Economics teachers employ during their teaching (cf. 4.3.2.4). At first glance, it appears that the assessment practices employed by teacher educators (cf. 4.4.6) are linked to the assessment practices taught to student teachers (cf. 4.3.2.5). However, teacher educators give precedence to assessment of learning (in the form of tests and an end-of-year examination), over assessment for learning. This may be because a year mark needs to be compiled that reflects student teachers' mastery of the module. It seems therefore that teachers educators' attempts at modelling good assessment practices may be constrained and that their assessment practices (where the teacher educator is responsible for assessment) is not congruent with their beliefs of teaching and learning (cf. 4.4.2); an observation supported by Postareff *et al.* (2012:87).

5.3.5 Theoretical influences that underlie Economics methodology modules

The constructivist nature of teaching (cf. 4.5.5) is in accordance with the suggested constructivist approach to Economics teaching of Woldab (2013) and Joshi and Marri (2006:199). However, there is continuous tension between the theoretical influence teacher educators intend to enact and the theory reflected in the curriculum documents. This suggests a narrow conceptualisation of these theories, and supports the notion that teacher educators' guidance of student teachers may be based on a superficial understanding of theory.

The weak theoretical foundation of most teacher educators seems to be related to the challenges faced by teacher educators in South Africa who struggle to balance teaching, research and community engagement at HEIs (Jita & Mokhele, 2013:139).

5.4 IMPLICATIONS OF THE FINDINGS

The findings discussed in the previous section have implications for the continuous professional development of teacher educators. They also have implications for the development of the PGCE programme, specifically the design of Economics methodology curricula. This study may also be valuable for writers of textbooks of Economics teaching. These implications are categorised into implications for practice, policy and theory.

5.4.1 Implications for practice

The diverse perspectives and theories that inform the teaching practice of teacher educators could result in diverse teacher education programmes for Economics student teachers across the country. This could result in diverse Economics teachers with divergent views on Economics and the teaching thereof.

There is a need for ongoing support for teacher educators to enable them to create their professional identities. Continuous professional development, especially in terms of support to do research, seems imperative.

5.4.2 Implications for policy

There is a need for a reconceptualisation of teacher education programmes, and collaboration between colleagues responsible for programme development to ensure coherence between different modules included in these programmes.

5.4.3 Implications for possible theory

There is a need for a theoretical framework to guide the preparation of prospective Economics teachers, based on the process and principles of learning to teach. There is also a need for a theoretical framework for teacher educators to guide their practice, a pedagogy of teacher education (Loughran, 2014:274), specifically designed for Economics teaching in the South African context.

5.5 RECOMMENDATIONS AND ISSUES FOR FURTHER RESEARCH

There seems to be a need for the continuous professional development of teacher educators to help them create a theoretical framework to guide their practice. Furthermore, I recommend increased dialogue and collaboration between colleagues from different universities to share their experiences and best practices in the interests of producing ideal Economics teachers.

Reconceptualisation of the curricula of teacher education programmes, especially the PGCE programme, is required to ensure coherence between the modules and avoid replication of information. Since CAPS is fluid, the reliance on prescribed school policy on guiding teacher education programmes should be reconsidered. I recommend that the Economics

methodology modules be guided by principles of Economics teaching, rather than Economics topics.

Since the content knowledge of some graduates entering the PGCE programme may be inadequate, I recommend that pre-entry assessments focus on the subject matter content prospective student teachers will need in the PGCE programme. The results of this assessment can serve to identify gaps in subject content knowledge. Additional courses in Economics or assignments designed to fill the gaps could be devised for student teachers who lack a firm foundation for pedagogical content knowledge.

Further research needs to be done on the professional identities of Economics teacher educators, as well as the construction of the professional identities of student teachers of Economics. Observations of the teaching of Economics teacher educators could provide insights into their teaching philosophies. The declining number of learners who choose Economics as a subject, as well as the declining number of schools offering Economics requires research to identify the underlying reasons for this and possible means of resolving it. There is also a need to follow-up on Economics student teachers and the value they attached to their experiences of teacher education and the possible challenges they face in the school environment.

The formidable task of preparing lesson plans is daunting to inexperienced preservice teachers and therefore I suggest that a data bank of lessons on various Economics principles be compiled. This data bank should not be prescriptive, but rather viewed as a resource from which Economics teachers can utilise and adapt lessons to suit their local contexts. This will help to develop novice teachers' teaching skills and Economics PCK. Furthermore, research is needed on specific teaching strategies for specific Economics principles, which can be incorporated in Economics teacher education. A booklet with a summary of the major Economics misconceptions held by learners and how to address them can be compiled, or a short course for Economics teachers can be provided with the focus on developing PCK for Economics.

5.6 LIMITATIONS OF THE STUDY

The nature of a dissertation means that it has inevitable limitations. One of these is that financial constraints made it impossible to visit the universities that were included in the study. An opportunity to observe teacher educators' lectures could have provided valuable data for this study. It was also not possible to hold a second set of interviews once the

analysis of the curriculum documents had been completed. Had this been possible, the emerging themes could have been enriched. A third limitation is that the study does not include an analysis of the actual assessments, such as the test and examination papers that teacher educators used. These have provided an insight into teacher educators' perspectives on assessment.

Furthermore, only five traditional, research-intensive universities in South Africa were included in this study. The inclusion of more universities, including universities of technology or higher education institutions beyond the borders of the country could have added value to the study. Finally, interviews were conducted only with teacher educators. Interviewing student teachers and their experiences on learning to become Economics teachers could provide useful insights into the teacher education of prospective Economics teachers.

5.7 SELF-REFLECTION ON THE STUDY

I have only recently become an Economics teacher educator. The research process afforded an opportunity to reflect on my teaching. This helped me gain some insight into my teaching and encouraged me to question my own assumptions and perspectives and how these guide my practice. Most teacher educators experience the process of transitioning from being a teacher to being a teacher educator as challenging.

During the research process I realised that methods of data collection need to have enough flexibility to suit the preferences of participants and help to make them willing to share their experiences and provide genuine responses. I originally planned to conduct the interviews via Skype, but some participants requested that the interview be conducted telephonically or in person. Some wanted to be interviewed in their home language. This meant that the questions had to be translated.

Some of the challenges that I experienced were the gatekeepers (Faculty of Education deans) that I had to consult to gain permission to contact teacher educators, as well as the legislation that regulated access to university documents and the associated administrative procedures of the PAIA.

5.8 CONCLUSION

This chapter concludes the research study which set out to determine the nature of the content included in Economics methodology modules, as well as the motives that guide the

choices teacher educators made. The findings on the profile of teacher educators resonated with the literature on the identities and roles of teacher educators. The elements required by the MRTEQ, and related literature, for teacher education programmes, were included in the Economics methodology module.

Although teacher educators agree that PCK should be included in teacher education programmes for Economics student teachers, the analysis of the documents suggests that they include only superficial teaching strategies. Therefore, there is a need for a clear theoretical framework, informed by PCK for Economics teaching, to guide the design and implementation of the Economics methodology modules.

It seems that teacher educators require continuous (personal and professional) support to help them construct their professional identities as academics. There is a need for encouragement and incentives to pursue research in the field of Economics education, so that teacher educators can view themselves not only as subject specialists, but as Economic pedagogues. I hope this will help them to construct or expand a theoretical foundation for Economics teacher education. Only then can the poor performance of secondary school Economics learners be addressed, and the potential of the subject for developing critical thinking and decision-making skills of learners be realised.

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ADDENDUM A

ETHICS CERTIFICATE



NORTH-WEST UNIVERSITY
YUNIBESITHI YA BOKONE-BOPHIRIMA
NOORDWES-UNIVERSITEIT

Private Bag X6001, Potchefstroom,
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Institutional Research Ethics Regulatory Committee

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Email: Ethics@nwu.ac.za

2016-09-12

ETHICS APPROVAL CERTIFICATE OF STUDY

Based on approval by the **Ethics Committee of the Faculty of Education Sciences (ESREC)** after being reviewed at the meeting held on **25/08/2016**, the North-West University Institutional Research Ethics Regulatory Committee (NWU-IRERC) hereby **approves** your study as indicated below. This implies that the NWU-IRERC grants its permission that, provided the special conditions specified below are met and pending any other authorisation that may be necessary, the study may be initiated, using the ethics number below.

Study title: Teacher educators' perspectives on pedagogical content knowledge for secondary school economics teaching.																												
Project Head/Supervisor:	Prof P du Preez																											
Project Team:	Prof S Maistry, D Kruger																											
Ethics number:	<table border="1"><tr><td>N</td><td>W</td><td>U</td><td>-</td><td>0</td><td>0</td><td>2</td><td>0</td><td>4</td><td>-</td><td>1</td><td>6</td><td>-</td><td>A</td><td>2</td></tr><tr><td colspan="3">Institution</td><td colspan="4">Study Number</td><td colspan="2">Year</td><td colspan="3">Status</td></tr></table> <small>Status: S = Submission; R = Re-Submission; P = Provisional Authorisation; A = Authorisation</small>	N	W	U	-	0	0	2	0	4	-	1	6	-	A	2	Institution			Study Number				Year		Status		
N	W	U	-	0	0	2	0	4	-	1	6	-	A	2														
Institution			Study Number				Year		Status																			
Application Type:	N/A																											
Commencement date:	2016-08-25																											
Expiry date:	2018-12-24																											
Risk:	<table border="1"><tr><td>N/A</td></tr></table>	N/A																										
N/A																												

Special conditions of the approval (if applicable):

- Translation of the informed consent document to the languages applicable to the study participants should be submitted to the ESREC (if applicable).
- Any research at governmental or private institutions, permission must still be obtained from relevant authorities and provided to the ESREC. Ethics approval is required BEFORE approval can be obtained from these authorities.

General conditions:

While this ethics approval is subject to all declarations, undertakings and agreements incorporated and signed in the application form, please note the following:

- The study leader (principle investigator) must report in the prescribed format to the NWU-IRERC via ESREC:
 - annually (or as otherwise requested) on the progress of the study, and upon completion of the project
 - without any delay in case of any adverse event (or any matter that interrupts sound ethical principles) during the course of the project.
 - Annually a number of projects may be randomly selected for an external audit.
- The approval applies strictly to the proposal as stipulated in the application form. Would any changes to the proposal be deemed necessary during the course of the study, the study leader must apply for approval of these changes at the ESREC. Would there be deviation from the study proposal without the necessary approval of such changes, the ethics approval is immediately and automatically forfeited.
- The date of approval indicates the first date that the project may be started. Would the project have to continue after the expiry date, a new application must be made to the NWU-IRERC via ESREC and new approval received before or on the expiry date.
- In the interest of ethical responsibility the NWU-IRERC and ESREC retains the right to:
 - request access to any information or data at any time during the course or after completion of the study;
 - to ask further questions, seek additional information, require further modification or monitor the conduct of your research or the informed consent process.
 - withdraw or postpone approval if:
 - any unethical principles or practices of the project are revealed or suspected,
 - it becomes apparent that any relevant information was withheld from the ESREC or that information has been false or misrepresented,
 - the required annual report and reporting of adverse events was not done timely and accurately,
 - new institutional rules, national legislation or international conventions deem it necessary.
- ESREC can be contacted for further information or any report templates via Ema.Conradie@nwu.ac.za or 018 299 4656

The IRERC would like to remain at your service as scientist and researcher, and wishes you well with your project. Please do not hesitate to contact the IRERC or ESREC for any further enquiries or requests for assistance.

Yours sincerely

Prof LA Du Plessis
Digitally signed by
Prof LA Du Plessis
Date: 2016.09.13
09:11:29 +02'00'

Prof Linda du Plessis

Chair NWU Institutional Research Ethics Regulatory Committee (IRERC)

ADDENDUM B

EXAMPLE OF LETTER REQUESTING PERMISSION FOR INTERVIEWS WITH PARTICIPANTS

[Particulars of the Dean]

[Address]

[Name of University]

[Name of Campus]

REQUEST FOR PERMISSION TO CONDUCT AN INTERVIEW WITH A LECTURER

Dear Prof. [details of Dean]

I am a full-time lecturer of Economics and Business Studies for Education at the North-West University, Potchefstroom Campus. I am pursuing my MEd this year under the study supervision of Prof. Petro du Preez and Prof. Suriamurthee Maistry. My study will include the traditional universities in South Africa, with specific focus on the general principles taught to PGCE students in the **Economics methodology** module.

Title of MEd: Teacher educators' perspectives on pedagogical content knowledge for secondary school Economics teaching

Ethical clearance: NWU-00204-16-S2

I hereby request permission that [name of participant], lecturer for the Economics methodology module for PGCE students [module code] participate in the above-mentioned research project.

[Name of participant]'s participation will not provide any potential risks or discomfort or have any financial implications. Participation in the research project will only have minimal time implications and only require his/her consent to participate in an interview that will be conducted via *Skype* during July or August 2016, at a suitable time chosen by [name of participant].

I will only contact [name of participant] once your permission has been granted.

(Please sign the space provided below.)

If you have any questions or queries in this regard, please do not hesitate to contact me or one of my supervisors.

Kind regards

Mrs. Danél Kruger

	Mrs. Danél Kruger	Prof. Petro du Preez (NWU)	Prof. Suriamurthee Maistry (UKZN)
Role	MEd student	Supervisor	Supervisor
E-mail address	Danel.Kruger@nwu.ac.za	Petro.duPreez@nwu.ac.za	Maistrys@ukzn.ac.za
Contact number	083 392 7961	018 299 4737	031 260 3457

Signature (Dean): _____ **Date:** _____

LETTER TO RESEARCH PARTICIPANTS

Dear [name of participant]

I am a full-time lecturer of Economics and Business Studies for Education at the North-West University, Potchefstroom Campus. I am pursuing my MEd this year under the study supervision of Prof. Petro du Preez and Prof. Suriamurthee Maistry. My study will include the traditional universities in South Africa, with specific focus on the general principles taught to PGCE students in the **Economics methodology** module.

Title of MEd: Teacher educators' perspectives on pedagogical content knowledge for secondary school Economics teaching

Ethical clearance: NWU-00204-16-S2

As the lecturer for the Economics Methodology module for PGCE students [module code] and an expert on the phenomenon being studied, I have carefully selected you to participate in this study. Your inputs will be highly valued in understanding and shaping thinking on the issue. One of the objectives of this study is to develop rich insights to advance Economics education pedagogy in the South African context. Therefore, I will share the findings upon completion of the study.

Your participation will involve an interview conducted with you via *Skype*. Since the interview will be conducted via *Skype*, it will have no cost implications for you and will only result in a minimal sacrifice of your time. After conducting the interview, it will be transcribed and I will send it back to you for your approval as a true reflection of your response.

If you agree to participate in the study, I would greatly appreciate that you do the following:

- 1) Please complete the attached informed consent form and return it to me as soon as possible.
- 2) Please indicate a convenient date and time during which the interview can take place (between 5 July and 5 August 2016 during office hours).
- 3) If available, please provide me with your *Skype* details. Note: If *Skype* details are not available, please provide me with a contact number so that we can make alternative arrangements.

If you have any further queries, please do not hesitate to contact me or one of my supervisors.

Kind regards
Mrs. Danél Kruger

	Mrs. Danél Kruger	Prof. Petro du Preez (NWU)	Prof. Suriamurthee Maistry (UKZN)
Role	MEd student	Supervisor	Supervisor
E-mail address	Danel.Kruger@nwu.ac.za	Petro.duPreez@nwu.ac.za	Maistrys@ukzn.ac.za
Contact number	083 392 7961	018 299 4737	031 260 3457

ADDENDUM C

EXAMPLE OF INFORMED CONSENT OF RESEARCH PARTICIPANT

NORTH WEST UNIVERSITY CONSENT TO PARTICIPATE IN RESEARCH

Teacher educators' perspectives on pedagogical content knowledge for secondary school Economics teaching

You are requested to participate in a research study conducted by Danél Kruger, from the Faculty of Education Sciences, North West University. The research results of this study will be made public in the form of a MEd thesis, scientific articles and book chapters. You were purposefully selected as a participant in this study because you are responsible for teaching the Economics methodology module at your institution, which is a traditional South African university.

1. PURPOSE OF THE STUDY

The study will aim to address the following question: *What are teacher educators' perspectives on the PCK required for secondary school Economics teaching?*

The main objectives of the research to be undertaken, among others, are:

- To determine the nature of the content included in Economics pedagogy modules.
- To determine what motives guided pedagogues for including this content.
- To gain insight into the perspectives of Economics pedagogues as curriculum makers and shapers of future educators.

2. PROCEDURES

If you volunteer to participate in this study, I would ask you to:

- provide me with a suitable date to conduct the interview via Skype;
- participate in a semi-structured interview on said date;
- confirm that the transcription is a true reflection of the interview, after I have transcribed the interview.

3. POTENTIAL RISKS AND DISCOMFORTS

The study to be undertaken will not provide any potential risks to the participant.

4. POTENTIAL BENEFITS TO SUBJECTS AND/OR TO SOCIETY

As a teacher educator, you will be given the opportunity to reflect on your teaching practice during the interview. The research output may also be used to improve the preparation of future educators.

5. PAYMENT FOR PARTICIPATION

No payment will be given for participation in this study.

6. CONFIDENTIALITY

Any information that is obtained in connection with this study and that can be identified with you will remain confidential and will be disclosed only with your permission or as required by law. Information will not be released to any other party for any reason.

The questionnaire data, audio taped data and transcribed data can at any stage during the research process be reviewed by the participant. Tapes will be destroyed as soon as it has been transcribed by the researcher.

In the dissertation the names of participant's names will, for example, be referred to as: university A/B and teacher educator C/D.

7. PARTICIPATION AND WITHDRAWAL

You can choose whether to be in this study or not. If you volunteer to be in this study, you may withdraw at any time without consequences of any kind. You may also refuse to answer any questions you don't want to answer and still remain in the study. The researcher may withdraw you from this research if circumstances arise which warrant doing so.

8. IDENTIFICATION OF RESEARCHERS

If you have any questions or concerns about the research, please feel free to contact any one of the promoters of the study, Professor Petro du Preez at 018 299 4737 or Professor Suriamurthee Maistry at 031 260 3457.

9. RIGHTS OF RESEARCH SUBJECTS

You may withdraw your consent at any time and discontinue participation without penalty. You are not waiving any legal claims, rights or remedies because of your participation in this research study. If you have questions regarding your rights as a research subject, please ask the researcher or promoters of the study.

SIGNATURES OF PARTICIPANT AND RESEARCHER

The information above was described to me by Danél Kruger in English and I am in command of this language. I was given the opportunity to ask questions and these questions were answered to my satisfaction.

I hereby consent voluntarily to participate in this study. I have been given a copy of this form.

_____ *Name of Participant*

_____ *Signature of Participant*

Danél Kruger _____ *Name of Researcher*

 _____ *Signature of Researcher*

_____ / _____ /2016 _____ *Date*

ADDENDUM D

INTERVIEW SCHEDULE

Explain beforehand what PCK is.

My study focuses on a specific aspect of teacher knowledge, namely pedagogical content knowledge. Pedagogical content knowledge is a combination of pedagogical knowledge (how to teach) and content knowledge (what to teach).

It is a teacher's knowledge and skills of how to teach a specific subject in such a way that learners understand.

BACKGROUND

1. Please tell me more about yourself
 - 1.1 Qualifications
 - 1.2 Work experience
 - 1.3 Teaching background
 - 1.4 Current area of research.

CURRENT TEACHING

2. The literature suggests that a teacher educators' background and teaching experience influences his/her teaching.
 - 2.1 Do you agree?
 - 2.2 And how does it apply to you?

FOLLOW UP:

What factors have impacted your current teaching (in higher education) the most?

- Qualification / Teaching experience / work experience / Research

3. What is your teaching philosophy?
 - 3.1 In your opinion, what *theory* underpins your teaching philosophy?
4. Please tell me more about the Economics methodology module you are teaching.

4.1 How long have you been teaching this module?

4.2 Please tell me more about your students (in the Economics methodology module).

[Needs and capabilities of students / PGCE different from BEd?]

5. Please explain how you have selected the content of the module.

PEDAGOGY AND PCK

6. Please explain the term 'pedagogy' in your own words.

7. Are you familiar with the term pedagogical content knowledge (PCK)?

7.1 Please explain this term in your own words.

8. Do you think it is necessary to teach students about PCK?

9. In your opinion, **what** should pedagogical content knowledge (PCK) for Economics teaching entail?

9.1 **How** do you teach PCK in your class?

9.2 **Why?** (Please provide reasons for your answer)

10. What **knowledge** do you regard as essential for an Economics teacher?

10.1 Why?

11. What **skills** do you regard as essential for an Economics teacher?

11.1 Why?

ECONOMICS TEACHING

12. Do you think Economics education is important in South African schools?

12.1 Why?

13. What is your opinion regarding current Economics teaching in secondary schools in South Africa?

14. To summarise, what do you think is the **profile** of the **ideal** Economics teacher?

15. How best do you think can a university prepare a student teacher for South African schools?

ADDENDUM E

FRAMEWORK FOR MODULE CONTENT ANALYSIS

1. General information of the document

- 1.1 Date of compilation of the document.
- 1.2 Details of the author (name, surname, qualification).
- 1.3 Aims and objectives of the document.

2. Elements of Pedagogical Content Knowledge (PCK)

2.1 *Subject content knowledge*

- 2.1.1 What subject specific content is included in the curriculum document?

2.2 *Pedagogical knowledge*

- 2.2.1 Is pedagogical knowledge explicitly stated or implied?
- 2.2.2 Is the role of the teacher stated?
- 2.2.3 What is the nature and importance of lesson planning in the curriculum document?
- 2.2.4 Is classroom management techniques addressed?
- 2.2.5 Is the use of technology in the classroom included?
- 2.2.6 Are there guidelines regarding information management, for example the recording and reporting of marks?
- 2.2.7 Is the importance of different teaching strategies for different learners emphasised?
- 2.2.8 Are there guidelines on how to support learners with special needs in the curriculum document?
- 2.2.9 Are elements of practical teaching, and the importance thereof, included in the curriculum document?

2.3 *Pedagogical content knowledge*

- 2.3.1 Is the signature pedagogy of Economics stated?
- 2.3.2 Is the importance of Economics as a subject stated?
- 2.3.3 Are there topic specific teaching skills included?
- 2.3.4 Are there guidelines on how to select appropriate content from different sources and textbooks?

2.4 *Assessment*

- 2.4.1 Is formal and informal assessment distinguished from each other?
- 2.4.2 Is the nature and importance of informal assessment addressed with examples?
- 2.4.3 Is the nature and importance of formal assessment addressed with examples?
- 2.4.4 Are there guidelines regarding the planning of formal and informal assessments?

- 2.4.5 Are the different methods of assessment, such as educator, peer and group assessment addressed?
- 2.4.6 Are the different forms of assessment, such as tests and examination papers addressed?
- 2.4.7 Are there guidelines on how to develop different forms of assessment and assessment instruments such as rubrics and memoranda?

2.5 Knowledge of context

- 2.5.1 Is the knowledge of the social context of learners and the impact thereof on teaching addressed?
- 2.5.2 Is there information regarding legislation relating to school and teaching matters included?

2.6 Knowledge of curriculum

- 2.6.1 Are the following policy documents addressed?
- Curriculum and Assessment Policy Statement (CAPS) for Economics;
 - National policy pertaining to the programme and promotion requirements of the National Curriculum Statement Grades R-12;
 - National Protocol for Assessment Grades R-12.
- 2.6.2 Is there information regarding School Based Assessment (SBA) and the calculation of learners' marks?

3. Teaching-learning methodologies

- 3.1 Elaborate on the nature of self-directed learning in the curriculum.
- 3.2 Elaborate on the nature of cooperative learning in the curriculum.
- 3.3 Elaborate on the nature of active learning in the curriculum.
- 3.4 Elaborate on the nature of blended learning in the curriculum.

4. Philosophies underpinning the content

- 4.1 Are subject-specific philosophies such as capitalism, socialism and communism explicitly stated or implied?
- 4.2 Are teacher-specific philosophies such as social constructivism and critical theory explicitly stated or implied?

5. General impression of the curriculum

- 5.1 Provide comments regarding the pace of the curriculum document.
- 5.2 Is there a logical order of progression of topics in the curriculum document?

ADDENDUM F

LANGUAGE EDITOR DECLARATION

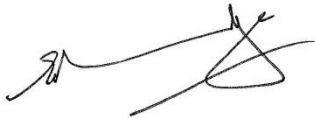
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TO WHOM IT MAY CONCERN

This is to attest that I have edited the language of the dissertation:
**Teacher educators' perspectives on Pedagogical Content Knowledge for
secondary school Economics teaching
by Danél Kruger**

To be submitted for the degree of
Magister Educationis in Curriculum Studies
at the Potchefstroom Campus of the North-West University



(Dr) Elaine Ridge BA UED (Natal) DEd (Stell)
Freelance Editor and Translator

18 November 2017

ADDENDUM G

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