

Perceptions of Primary School Teaching by First Year Education Students

Myung-sook AUH
University of New England

ABSTRACT

The purpose of the study was to investigate first-year Education students' perceptions of selected aspects of primary school teaching. This information can be useful for teacher educators to understand where the first-year Education students stand in terms of their views on primary education, and to provide appropriate support system if their perceptions change over the four year program. Participants were 99 first-year Education students in Bachelor of Education in Primary Education at a regional university in NSW, Australia. Data were collected using the Primary Teaching Questionnaire (PTQ), devised by the investigator, and were analyzed using statistical analysis and coding methods. Results showed that their perceptions about primary school teaching were positive, and in some cases, idealistic. They wanted to make an impact on children's life and make a difference as future leaders. They listed personal qualities appropriate for primary school teachers, such as a caring mind, enthusiasm, humour, passion for teaching, patience, flexible, engaging, open-minded, and rated themselves highly for these qualities. They think creativity is important in order to motivate children and to develop creative potential in children. Many students think they will be happy staying in primary teacher positions for many years to come.

INTRODUCTION

Background

Student teachers' attitudes and beliefs

Student teachers' attitudes and beliefs are important because they affect the way that they learn to teach (Feiman-Nemser, 2001, Richardson, 1996). Teacher attitudes can be a valid indicator of the future effectiveness of a teacher (Richardson, 1996). Teacher beliefs are also important from constructivist perspectives. Student teachers come to a teacher education program with their own beliefs about teaching and learning, and their beliefs influence the way that they study in teacher education programs (e.g., Brookhart & Freeman, 1992, Calderhead & Robson, 1991, Richardson, 1996). And these beliefs come from their life experiences, school experiences, and their subject and pedagogical knowledge (Richardson, 1996).

Studies of student teachers' attitudes and beliefs found that student teachers are optimistic, highly confident, and humanistic (Richardson, 1996), and these results are consistent across time, nations, and methodology (Richardson, 1996). Key findings of studies in this topic, as

reviewed by Richardson (1996), are as follows: 1) Student teachers want to become teachers with intension of helping children and engaging in public service (Book & Freeman, 1986; Pigge & Marso, 1988); 2) Extrinsic rewards, such as salary, are considerably less important in their wanting to be teachers (Mitchell, Ortiz, & Mitchell, 1987); 3) Their experiences of other cultures are limited (Causey & Thomas, 2000; Gay, 2002; Zimpher & Ashburn, 1992); 4) Student teachers can be “unrealistically optimistic” (Weinstein, 1988, 1989); 5) Primary student teachers have great interest in children; 6) Primary female teachers exhibit more positive attitudes towards students than secondary male teachers (Khan & Weiss, 1973); 7) Traditional student teachers, who came to university straight from high schools, are less likely to understand complexities of teaching than mature age student teachers (Kile, 1993); 8) The strongest factor that influence how and what student teachers learned in their teacher education program was their *perspectives* on teaching and learning (Ross, Johnson, & Smith, 1991); 9) Student teachers have different learning orientations, i.e., internal orientation (reflection) and external orientation (just tell me what I should do), and student teachers with external orientation dropped out after 1 year in teacher education programs (Korthagen, 1988); 10) Student teachers who are career changers and mature age students bring business values to their teacher education study, and more individualistic than group-oriented (Crow, Levine, and Nager, 1990); 11) Student teachers’ perceptions of the self as superior students can interfere their communications with their supervising teachers during school practicum (Clift, Meng, & Eggerding, 1994). These finding suggest that student teachers’ perceptions of teaching and learning are directly related to their success in teacher education programs.

Student teachers’ perceptions of specific subjects

A number of studies of student teachers’ perceptions focused on specific subject areas; for example, mathematics (e.g., MacNab & Payne, 2003; Roberts, Cretchley, & Harman, 1998), information technology (e.g., Santhanam & Leach, 2000), special education (Avramidis, Bayliss, & Burden, 2000), music (Auh, 2003; 2004, 2006), visual arts (Welch, 1995), and physical education (e.g., Morgan & Bourke, 2005).

First-year primary student teachers showed more positive perceptions about mathematics than final-year primary student teachers in Scotland, although the latter was more confident in teaching mathematics than the former was (MacNab & Payne, 2003). A study of primary student teachers’ changes in attitudes towards mathematics through a course exploring mathematical ideas and experiences, not a curriculum unit, found an unexpected result that their perceptions of the usefulness of mathematics dropped significantly at the end of the course (Roberts, Cretchley, & Harman, 1998). Student teachers held positive attitudes towards special education in general. However, when they actually experienced children with emotional and physical difficulties, student teachers experienced stress and their positive views dropped (Avramidis, Bayliss, & Burden, 2000). Welch (1995) found that when primary pre-service teachers valued visual arts, they also displayed high levels of teaching efficacy in visual arts; and that pre-service teachers’ perceptions about the value of visual arts education decreased in their final year. The above studies suggest that perceptions of primary student teachers in their beginning years tend to be optimistic and sometimes over-confident, but their optimistic perceptions change to become more realistic in their final years.

A significant difference was found in perceptions of IT between males and females among university students (Santhanam & Leach, 2000), which was consistent with student teachers’ perceptions of music IT found in Auh (in press). That is, male students said they grew up using computers at home, thus they have basic computer skills; therefore they are confident that they will have no problem in teaching music IT.

Primary student teachers' perceptions about their abilities in teaching music have been investigated by several researchers (e.g., Auh, 2003, 2004, 2006, in press; Russell-Bowie, 2005). As Richardson (1996) pointed out, their lack of confidence in teaching music comes from their life experiences, school experiences, and their lack of music teaching skills and strategies. For example, many primary student teachers mentioned that as a child they were told not to sing at home or in schools because they sounded funny or awful. Many of them did not have quality music classes in primary schools, as the National Review of School Music Education found out (Australian Government DEST, 2005). Such negative experiences about music construct their perceptions of music and music teaching, i.e., fear of music and reluctance to lean to teach music.

A study of perceptions of primary pre-service and in-service teachers regarding their confidence in teaching physical education showed that they were only moderately confident in teaching physical education, and that they thought that their teacher education for physical education was not effective in preparing them to teach physical education in schools (Morgan & Bourke, 2005). Discrepancy between teacher education courses at university and school practicum has been noted in several teacher education studies (see Rideout & Feldman, 2002).

Student teachers' perceptions of primary school teaching

A few studies investigated student teachers' perceptions of various aspects of primary school teaching. A study of preservice teachers' beliefs about effective teachers found 7 emerging themes for characteristics of effective teachers (Minor, Onwuegbuzie, Witcher, & James, 2002): 1) student-centered, 2) effective classroom and behaviour manager, 3) competent instructor, 4) ethical, 5) enthusiastic about teaching, 6) knowledgeable about subject, and 7) professional. Developing specific graduate attributes of student teachers was examined for different year levels at university (Nicolettou, 1997). The specific graduate attributes were developing professional knowledge through reflection, leadership role, and team work. In the first year, student teachers were more emotionally involved in their work, which in many cases led to remorse and disappointment and thus lack of confidence. However, in the fourth year, student teachers showed *matter-of-fact* approaches to work. This finding relates to the previous findings with first-year versus final-year students that student teachers become *realistic* and *down-to-earth* in their final years.

Prompted from recent findings that teachers reported emotional exhaustion and stress and even burnout in their first years of school teaching (Brouwers & Tomic, 2000; Burke, Greenglass, & Schwarzer, 1996; Cunningham, 1983; Farber, 2000; Van Horn, Schaufeli, & Enzmann, 1999), predictors of emotional exhaustion of final-year student teachers were investigated (Turner, Jones, Davies, and Ramsey, 2004). Factors examined were self-efficacy, attribution style, their expectations of workforce, their commitment to the profession, and their perceived level of preparedness for teaching.

However, few studies investigated key questions related to primary school teaching, such as whether primary student teachers like children, why they want to become primary teachers, what personal qualities they think are appropriate for primary teachers and whether they have the personal qualities, how they view creativity in relation to primary teaching, and their future plan in primary teaching career. Also, few studies examine *what reasons* primary student teachers provide for their perceptions about primary school teaching, and *which are more frequently mentioned reasons* for their perceptions. This study intends to examine selected key questions about primary school teaching, to ask primary student teachers about their reasons for the way that they perceive, and to provide lists of reasons in rank orders. This study is a pilot study attempting to uncover first-year Education students' attitudes towards primary school teaching.

Purpose

The purpose of the study was to investigate first-year Education students' perceptions of selected aspects of primary school teaching.

The following research questions were raised in this study:

1. Do first-year Education students like children?
2. Do first-year Education students value primary education? If so, why?
3. Why do first-year Education students want to become primary school teachers?
4. What personal qualities do first-year Education students think are important to be a primary teacher? And do they have these personal qualities?
5. Do first-year Education students think creativity is important? If so, why?
6. How do first-year Education students rate their teaching skills?
7. Do first-year Education students think that they will be happy being a primary school teacher for many teachers to come?

Importance of this study

First, this study informs first-year primary student teachers' perceptions regarding selected key questions in primary school teaching, some of which few studies investigated; e.g., personal qualities appropriate for primary school teachers, why creativity is important, and their future plan in primary teacher career. Especially unique in this study is asking them to describe their reasons for their perceptions. The reasons for their perceptions were analyzed and listed in rank order in the Results. Second, this paper points out in the review of literature that student teachers in their beginning years tend to be unrealistically optimistic, but they become down-to-earth and use matter-of-fact approaches to work in their final (fourth) year at university. Thus, although some researchers were alarmed by significant decreases in positive perceptions of primary student teachers (e.g., MacNab & Payne, 2003; Roberts, Cretchley, & Harman, 1998), they should be reminded that first-year student teachers' perceptions were unrealistic in the first place. Third, this study is a pilot study exploring first-year primary student teachers' perceptions on key questions related to primary school teaching, which will be extended in future studies with fourth-year primary student teachers and in-service teachers, and also examining geographical differences between teachers in rural areas and those in metropolitan areas.

METHOD

Participants

Participants of this study were 99 first-year university students (N = 99) enrolled in Bachelor of Education in Primary Education at a university in New South Wales, Australia. The students were recruited from a pedagogy course comprising 127 students in total that the investigator was teaching. Participants consisted of 19 males and 80 females. The university is located in a regional area of New South Wales, and thus many of the students come from regional and rural areas, while a few come from metropolitan areas.

Instrument

Primary Teaching Questionnaire (PTQ) was devised by the investigator based on a review of literature in relevant research areas. The PTQ consisted of 20 questions. The PTQ used 10 point rating scales ranging from 1 (not at all) to 10 (very much so), and open-ended questions to ask

students about their reasons for the way that they think. For example, if the Mean score is 5.5 points for a question asking how important they think primary education is, this suggests that they think primary education is moderately important. The PTQ asked about selected aspects of primary school teaching, which are as follows:

Selected Aspects of Primary School Teaching

- 1) Liking of children
- 2) Value of primary education
- 3) Why they want to become a primary school teacher
- 4) Personal qualities appropriate for primary school teachers
- 5) Creativity
- 6) Teaching Skills: Confidence in giving clear instructions
Discipline strategies
Teamwork
- 7) Future plan: Long term plan to be a school teacher
Leadership ambition

Procedure

The PTQ was administered in semester 2 during the first-year students' pedagogy workshop classes taught by the investigator. There were 5 pedagogy workshop classes, and each workshop had 25 students in average. Participation in this study was voluntary. It took 25 minutes to administer.

Analysis of Data

The quantitative data were analyzed using statistical analysis, such as descriptive statistics. The qualitative data were analyzed using rank orders and coding methods suggested in Miles and Huberman (1994).

RESULTS

Research Question 1

Do first-year Education students like children? Most student teachers said they like children; $M = 9.42$, $SD = .99$, $N = 99$, minimum = 5, Maximum = 10.

Research Question 2

Do first-year Education students value primary education? If so, why? Most of the students said primary education is very important; $M = 9.90$, $SD = .36$, minimum = 8, Maximum = 10.

When they were asked why primary education is important, the majority of the students (71%) said primary education 'builds foundations for life' (see Table 1). Other reasons were: Build social skills and intellectual skills; Children are the future leaders; and Education is the key to success in life.

Table 1. Rank orders of the reasons for the value of primary education by Education students

Importance of Primary Education	Ranking	Percentage	Frequency
Build foundations for life	1	71%	70
Build social skills and intellectual skills	2	11%	11
Children are the future leaders	3	8%	8
Education is the key to success in life	4	7%	7
Make a difference in a child's life	5	2%	2

Research Question 3

Why do first-year Education students want to become a primary school teacher? The students' most frequently mentioned reason for wanting to become a primary school teacher was 'Enjoy teaching children' (see Table 2). Other main reasons were: Rewarding job; Significant role in the development of children; and To make a difference for children's life. A few students mentioned good extrinsic rewards for being a primary school teacher, such as school holidays and overseas travelling opportunities for teachers.

Table 2. Rank orders of the reasons for wanting to become a primary school teacher by Education students

Reasons for wanting to become a primary school teacher	Ranking	Percentage	Frequency
Enjoy teaching children	1	42%	50
Rewarding job	2	21%	25
Significant role in the development of children	3	15%	18
To make a difference for children's life	4	14%	17
Pass on love for learning to children	5	4%	5
I will make a good teacher	6	3%	3
Good extrinsic rewards	7	2%	2

Research Question 4

What personal qualities are appropriate for primary school teachers? And do first-year Education students have these qualities? When students were asked what personal qualities are appropriate for primary school teachers, they had a very clear idea about these personal qualities. The five personal qualities that they mentioned most frequently were: Enthusiastic, Caring, Flexible, Humor, and Patience (see Table 3). The other personal qualities were Organized, Smart, People skills, Creative, and Reliable.

Table 3. Rank orders of personal qualities appropriate for primary school teachers mentioned by Education students

Personal qualities appropriate for primary school teachers	Ranking	Frequency
Enthusiastic	1	47
Caring	2	41
Flexible	3	36
Humor	4	31
Patience	5	26
Organized	6	24
Smart	7	15
People skills	8	14
Creative	9	7
Reliable	10	6

Note: Percentages are not presented in Table 3, because each student mentioned several personal qualities, thus percentages are meaningless here.

The student teachers also mentioned other personal qualities, which could be grouped under the 10 categories of the qualities as follows:

Enthusiastic:	Passion for teaching, determination, positive attitudes, encouraging
Caring:	Compassionate, empathetic, liking children
Flexible:	Open-minded, not-biased, willing to learn new things, fair, honest, easy-going, approachable, friendly.
Humor:	Fun, exciting
Patience	
Organized	
Smart:	Knowledgeable, good role model, resourceful
People skills:	Good communication skills, good listener
Creative:	Engaging
Reliable:	Responsible, common sense, leadership

When the students were asked how well they are equipped with the personal qualities that they think are appropriate for primary school teachers, their responses were extremely positive; $M = 9.12$, $SD = .87$, minimum = 7, Maximum = 10.

Research Question 5

Do first-year Education students think creativity is important? If so, why? Yes, they did; $M = 9.57$, $SD = .80$, minimum = 6, Maximum = 10.

When they were asked why creativity is important, they mentioned the following four reasons:

Self-expressions:	For children to communicate their feelings nonverbally
To motivate children:	To prevent boredom
	Keep children interested

Give a variety of ways to learn
 To meet different individual needs
 Creativity = fun
 Encourage independent thinking: To develop identity/ individualism
 To develop creative potentials in children: To develop imagination
 To encourage to be original

The four reasons were considered important in similar weightings, as shown in Table 4.

Table 4. Rank orders of the reasons for why creativity is important, mentioned by Education students

Why creativity is important	Ranking	Percentage	Frequency
Self-expression	1	33%	34
To motivate children into learning	2	25%	26
Encourage independent thinking	3	22%	23
To develop creative potentials in children	4	20%	21

Research Question 6

How do first-year Education students rate their teaching skills? Three questions were asked regarding teaching skills: 1) Giving clear instructions, 2) Discipline strategies, and 3) Teamwork. They rated their teaching skills moderately highly:

Giving clear instructions: $M = 7.60$, $SD = 1.40$, minimum = 2, Maximum = 10
 Discipline strategies: $M = 7.08$, $SD = 2.16$, minimum = 1, Maximum = 10
 Teamwork: $M = 8.94$, $SD = 1.11$, minimum = 5, Maximum = 10

Research Question 7

Do first-year Education students consider primary school teaching as their long term career? Two questions were asked in relation to this research question: 1) Will they be happy to teach as a primary school teacher for many years to come? 2) Are they going to pursue leadership positions, such as school principals, in the future?

Most students said that they will be happy to be teaching as a primary school teacher for many years to come; $M = 9.08$, $SD = 1.49$, minimum = 1, Maximum = 10. Most students showed interest leadership positions in the future; $M = 7.90$, $SD = 1.92$, minimum = 2, Maximum = 10.

DISCUSSION

Summary of the current findings

The results showed that first-year primary student teachers' perceptions regarding key questions in primary school teaching were optimistic and positive, as Richardson (1996) pointed out. All of them said they like children. They think primary education is important, because primary

education builds basic foundations for life. They entered the primary teacher education program, because they enjoy teaching children. Other reasons for why they want to become a primary teacher were that primary teacher is a rewarding job; primary teacher plays a significant role in the development of children; and they want to make a difference in children's life. They responded that they have the personal qualities appropriate for primary school teachers, citing that they were enthusiastic, caring, flexible, humorous, patient, organized, smart, had people skills, were creative, and/or reliable. They said that creativity is important, because creativity allows nonverbal self-expressions, motivates children into learning, encourages independent thinking, and develops creative potentials in children. Their perceptions about their teaching skills, such as giving clear instructions, discipline strategies, and teamwork showed positive views and showed high levels of confidence in teaching skills, although their actual competence levels remains to be seen. Most of them said they will be happy to be teaching as a primary school teacher for many years to come, and still many students mentioned that they are interested in leadership roles in the future, such as a school principal.

Comparisons with previous studies

These optimistic and positive perceptions are promising for the first-year primary teachers, because, when facing difficulties in learning to teach, they are likely to say, "I will give it a go", as several of them said in Auh's (in press) study. Some of the findings of this study were consistent with previous findings. For example, first, student teachers' reasons for wanting to become primary teachers were in order to help children and to engage in public service, which was consistent with Book & Freeman (1986) and Pigge and Marso (1988). Second, extrinsic rewards were not an important reason (mentioned only by two student teachers) for their wanting to become teachers, which was consistent with (Mitchell, Ortiz, & Mitchell, 1987). Third, the student teachers' self-assessment of the personal qualities appropriate for primary teachers were 9 points on average out of 10 points, meaning that they believe they have high levels of the qualities. When I, the investigator, recall teaching the student teachers for six weeks for a Creative Arts unit, their self-assessment appears quite generous and unrealistically optimistic, which is consistent with Weinstein (1988, 1989). Fourth, the student teachers showed great interest in children and working with children, which is consistent with (Book & Freeman, 1986). Finally, both the current study and Minor et al. (2002) found that enthusiasm and knowledgeable (smart) are important personal qualities of teachers.

Teacher burnout and EdASP

How can teacher educators help student teachers to avoid teacher burnout in their first years of teaching? Emotional exhaustion of beginning teachers has been reported in previous studies (e.g., Turner et al., 2004). Teacher burnout is an occupation health issue and also a health issue relating to emotional and physical well-being. Consequences of teacher burnout included heart symptoms and depressive mood (Burke et al, 1996). Emotional exhaustion of teachers is likely to affect negatively on their teaching performances, and thus teachers' perceived self-efficacy in classroom management will likely decrease (Brouwers & Tomic, 2000). One such help for beginning teachers in their first years of teaching career was offered by a group of teacher educators at University of New England (UNE) through their research project, EdASP (Education Alumni Support Project: <http://fehps.une.edu.au/Education/>), utilizing e-mail communications. The beginning teachers, who are graduates of the UNE and were teaching in primary or secondary schools, reported their frustrations in working as relief, casual, or support teachers, and lack of discipline strategies in dealing with students with behaviour problems; and that the beginning teachers said the professional support through the EdASP provided great help for them throughout a year. The EdASP utilized internet communications through its website, thus suggests an implication of ICT in professional development of beginning teachers.

Also, there are different types of teacher burnout, i.e., wearout (giving up in confronting stress), classic burnout (working increasing hard in the face of stress), and underchallenged (tired of monotonous and unstimulating work conditions) (Faber, 200). Thus, student teachers should learn strategies for dealing with teacher burnout during their teaching program in order to maintain their optimistic views of primary school teaching.

Implications

Implications for teaching. First, ICT, especially websites and e-mails, can be utilized in providing support for pre-service teachers' school practicum and for in-service teachers' professional development. Second, strategies for dealing with teacher burnout should be communicated to pre-service teachers.

Implications for research. The current study was a pilot study for future research exploring attitudes and beliefs of pre-service and in-service teachers in their learning to teach. A longitudinal study of comparing the perceptions of the first-year primary student teachers with their perceptions when they become fourth-year at university will be an interesting project to see how their perceptions change over the four years. Also, various factors were identified as influencing their perceptions in the review of literature in this study; for example, gender, age, internal/external learning orientations, self-images (superior or wanting to learn).

REFERENCES

- Auh, M. (in press). A model for primary music pedagogy course to build student teachers' confidence in teaching music. *Proceedings of the 2006 National Conference of the Australian Association for Research in Education*, Adelaide, 27-30 November, 2006.
- Auh, M. (2006). Changes of student teachers' confidence in teaching secondary music. *Proceedings of the 27th World Conference of the International Society for Music Education*, 17-21 July 2006, Kuala Lumpur, Malaysia.
- Auh, M. (2004). Changes in perceptions of confidence in teaching music by pre-service students. *Bulletin of the Council for Research in Music Education*, 161/162, 11-18.
- Auh, M. (2003). Pre-service students' self-perceptions of confidence in teaching music and their relations to liking music and musical experiences. *Proceedings of the Fourteenth Australian Society for Music Education National conference*, July 4 – 8, 2003, Darwin, Australia.
- Avramidis, E., & Bayliss, P., & Burden, R. (2000). Student teachers' attitudes towards the inclusion of children with special educational needs in the ordinary school. *Teaching and Teacher Education*, 16(3), 277-293.
- Book, C., & Freeman, D. (1986). Differences in entry characteristics of elementary and secondary teacher candidates. *Journal of Teacher Education*, 37(2), 47-51.
- Brookhart, S., & Freeman, D. (1992). Characteristics of entering teacher candidates. *Review of Educational Research*, 62, 37-60.

- Brouwers, A., & Tomic, W. (2000). A longitudinal study of teacher burnout and perceived self-efficacy in classroom management. *Teaching and Teacher Education, 16*, 239-253.
- Burke, R. J., Greenglass, E. R., & Schwarzer, R. (1996). Predicting teacher burnout over time: Effects of work stress, social support, and self-doubts on burnout and its consequences. *Anxiety, Stress, and Coping: An International Journal, 9*(3), 261-275.
- Calderhead, J., & Robson, M. (1991). Images of teaching: Student teachers' early conceptions of classroom practice. *Teaching and Teacher Education, 7*, 1-8.
- Causey, V. E., Thomas, C. D., & Armento, B. J. (2000). Cultural diversity is basically a foreign term to me: the challenges of diversity for preservice teacher education. *Teaching and Teacher Education, 16*(1), 33-45.
- Clift, R., Meng, L., & Eggerding, S. (1994). Mixed messages in learning to teach English. *Teaching and Teacher Education, 19*(3), 265-279.
- Crow, G., Levine, L., & Nager, N. (1990). No more business as usual: Career changers who become teachers. *American journal of Education, 98*(3), 197-223.
- Cunningham, W. G. (1983). Teacher burnout – Solutions for the 1980s: A review of the literature. *The Urban Review, 15*(1), 37-51.
- Farber, B. A. (2000). Treatment of strategies for different types of teacher burnout. *Journal of Clinical Psychology, 56*(5), 675-689.
- Feiman-Nemser, S. (2001). From preparation to practice: Designing a continuum to strengthen and sustain teaching. *The Teachers College Record, 103*, 1013-1055.
- Gay, G. (2002). Preparing for culturally responsive teaching. *Journal of Teacher Education, 53*(2), 106-116.
- Khan, S., & Weiss, J. (1973). The teaching of affective responses. In R. M. W. Travers (Ed.), *Second handbook of research on teaching* (pp. 759-804). Chicago: Rand McNally.
- Kile, R. (1993). *Preconceptions of elementary and secondary preservice teachers*. Unpublished doctoral dissertation, University of Arizona, Tucson.
- Korthagen, F. A. J. (1988). The influence of learning orientations on the development of reflective teaching. In J. Calderhead (Ed.), *Teachers' professional learning* (pp. 35-50). Philadelphia: Falmer.
- MacNab, D. S., & Payne, F. (2003). Beliefs, attitudes and practices in mathematics teaching: Perceptions of Scottish Primary School Student Teachers. *Journal of Education for Teaching, 29*(1), 55-68.
- Maxwell, T. W., Smith, H. J., Baxter, D., Boyd, J., Harrington, I., Hopwood, L., Jenkins, K., Sargeant, J., & Tamatea, L. (2006). Migrating to the classroom: Online support for the 2005 beginning teacher alumni of UNE: Final report for the Higher Education Innovation Program of the *Education Alumni Support Project (EdASP)*. Retrieved on 31/5/06 from <http://fehps.une.edu.au/Education/>

- Miles, M. B., & Huberman, A. M. (1994). *Qualitative data analysis, 2nd ed.* London: Sage Publications Ltd.
- Minor, L. C., Onwuegbuzie, A. J., Witcher, A. E., & James, T. L. (2002). Preservice teachers' educational beliefs and their perceptions of characteristics of effective teachers. *The Journal of Educational Research, 96*(2), 116-127.
- Mitchell, D., Ortiz, F., & Mitchell, T. (1987). *Work orientation and job performance: The cultural basis of teaching rewards and incentives.* Albany: State University of New York Press.
- Morgan, P., & Bourke, S. (2005). An investigation of pre-service and primary school teachers' perspectives of PE teaching confidence and PE teacher education. *ACHPER Healthy Lifestyles Journal, 52*(1), 7 – 13.
- Pigge, F., & Marso, R. (1988). *Cognitive, affective, and personal characteristics associated with motives for entering teacher training.* Paper presented at the annual meeting of the American Education Research Association, New Orleans. (ERIC Document Reproduction Service No. ED 293 799)
- Richardson, V. (1996). The role of attitudes and beliefs in learning to teach. In J. Sikula (Ed.), *Handbook of research in teacher education* (pp. 102-119). New York: Macmillan Library Reference USA.
- Rideout, R., & Feldman, A. (2002). Research in music student teaching. In R. Colwell & C. Richardson (Eds.), *The new handbook of research on music teaching and learning* (pp. 874-886). New York: Oxford University Press.
- Roberts, C., Cretchley, P., & Harman, C. (1998). Measuring attitudes towards mathematics in early childhood and primary teacher education. Proceedings of the Twenty First Annual Conference of the Mathematics Education Research Group of Australasia Incorporated, 'Teaching Mathematics in New Times', 5-8 July, 1998, Gold Coast, Australia. *Mathematics Education Research Group of Australia, 2*, 476-483.
- Ross, D., Johnson, M., & Smith, W. (1991). *Developing a professional teacher at the University of Florida.* Paper presented at the annual meeting of the American Educational Research Association, Chicago.
- Russell-Bowie, D., & Dowson, M. (2005). Effects of background and sex on confidence in teaching the creative arts: Tests of specific hypotheses. *Proceedings of the 2005 National Conference of the Australian Association for Research in Education* (Paper code: RUS05351), Sydney, November 2005. Retrieved on 31/5/06 from <http://www.aare.edu.au/05pap/alpha.htm#R>
- Santhanam, E., & Leach, C. (2000). University students' perceptions of information technology. *Proceedings of the 9th Annual Teaching learning Forum, 'Flexible futures in tertiary teaching,* 2–4 February, 2000, Curtin University of Technology, Perth, WA. Retrieved on 26/5/06 from: <http://lsn.curtin.edu.au/tlf/tlf2000/santhanam1.html>
- Van Horn, J. E., Schaufeli, W. B., Enzmann, D. (1999). Teacher burnout and lack of reciprocity,. *Journal of Applied Social Psychology, 29*(1), 91-108.

- Weinstein, C. (1988). Preservice teachers' expectations about the first year of teaching. *Teaching and Teacher Education*, 4(1), 31-41.
- Weinstein, C. (1989). Teacher education students' preconceptions of teaching. *Journal of Teacher Education*, 40(2), 53-60.
- Welch, A. (1995). The self-efficacy of primary teachers in art education. *Proceedings of the 1995 National Conference of the Australian Association for Research in Education*, November 1995, Hobart, Tasmania. Retrieved on 31/5/06 from <http://www.aare.edu.au/95pap/welca95076.txt>
- Zimpher, N., & Ashburn, E. (1992). Countering parochialism in teacher candidates. In M. Dilworth (Ed.), *Diversity in teacher education: New expectations* (pp. 40-62). San Francisco: Jossey-Bass.