

Teacher education in Singapore: What motivates students to choose teaching as a career?

GOH Kim Chuan & Lourdusamy ATPUTHASAMY

National Institute of Education

Nanyang Technological University

Singapore

Paper to be presented at the International Educational Research Conference, University of Notre Dame, Fremantle, Western Australia, 2-6 December 2001.

ABSTRACT

The Singapore government is acutely aware that the future of Singapore very much depends on her human resource. However much Singapore has achieved in the area of education thus far, particularly through its school system, the need for teachers in sufficient quantity and quality remains a perennial problem. A small population base, wide employment opportunities in the private sector in a booming economy, the lack of man-power in many areas all contribute to making teaching as one of the job options for school leavers not necessarily a preferred one. Of late, the Ministry of Education has been aggressively taking steps to elevate the status of teaching through many measures. It is worth finding out what now attracts entrants into the teaching profession.

This paper discusses the motives of new entrants to the National Institute of Education's initial teacher training programmes. A survey was carried out to find out the motives of students as to why they choose to become teachers. The results of this study are compared with those from similar studies carried out locally and in other countries. The implications of the findings to attract young people to the teaching profession are discussed.

Introduction

Problems of recruitment, attrition and retirement of those in service make for persistent teacher shortage in many developed and developing countries. The consequences of this perennial shortfall in teacher supply to meet demands in terms of the impact on school going children, the quality of their learning and the ultimate impact on the nation's economic development are not difficult to imagine. That the teacher is the cornerstone of educational development and the crucial role he or she plays in determining quality, effectiveness and relevance of education has been recognised as a prerequisite to achieving poverty eradication, sustainable human development, and equity (Maclean, 1999). However, these will remain a dream if the issue of persistent teacher shortage is not solved. The problem of teacher shortage is not confined to the concern for numbers, it also concerns quality as well. While the education system of any country must ensure that enough teachers enter the

teaching profession, it must also strive to entice the most capable and appropriate people into the occupation and to make efforts to ensure that these stay in the profession through career-long professional development.

To encourage the young to enter the teaching profession, many countries have adopted different strategies to make teaching attractive. In a situation where the image of the teaching profession is in the doldrums and the morale of teachers rapidly declining, measures taken to redress the situation include the raising of the status of teaching. In Britain, where the image of the teaching profession is getting a bashing from the public, the government's recruitment measures recommended better rewards for teaching, including two pay ranges. This recommendation that took effect in September 2000 recognised that high-performing teachers can go beyond the first range to higher salaries. There was also to be a fast track scheme for earlier advancement of exceptional teachers and promising trainees. In addition, heads of schools who have performed well in tough jobs can look forward to higher salaries under what is termed improved leadership scheme. The essence of all these measures was to 'restore teaching to the status it deserves and to make it an attractive career choice' (Moran, et al., 2001). While monetary rewards may be an expression of recognition of good teachers as professionals, a point noted as important in retaining good science teachers in the United States, many who leave the profession seldom relate their decision to leave with money. Many who leave almost always indicated a lack of control over how the school is run (Knapp, 1998).

While the above may be relevant in teacher recruitment it is what motivates a young person to go into teaching that is really significant. Any mismatch between the motives for going into teaching and measures perceived to be attractive to teaching may result in those who enter into teaching leaving sooner than anticipated. Recruitment agencies must take cognisance of what motivates young job-seekers to enter teaching and what makes them stay or leave because this understanding is essential in any efforts to maintain a stable teaching force, especially in a competing job market of vibrant economies (Soh, 1998)

Many studies have been conducted in different countries to discover what motivates people to go into teaching. In general the motives can be divided into three categories - extrinsic (matters such as remuneration and other benefits), intrinsic (the enjoyment of teaching and the school environment) and altruistic (making a difference to young lives). Studies carried out in the past have shown that not all these three factors affected the motivation of an individual, that each factor carried a different emphasis and that there were gender differences (Moran, et al. 2001).

A study comparing the third and fourth year students who were studying Elementary Education at the Pennsylvania State University and at the University of Cyprus in 1995 showed some similarities in motives but some differences as well. The factor 'intrinsic motives' was the strongest among students from the Pennsylvania State University than those from Cyprus. The factor that strongly motivated students from Cyprus to enter the same major was extrinsic i.e. the 'variety of benefits' they would enjoy after graduation plus the job security that teaching affords in that country. These differences did not negate the fact that both intrinsic and extrinsic factors did influence their choice but to varying degrees (Papanastasiou & Papanastasiou, 1997). Despite the attractive extrinsic benefits in Cyprus the authors lamented the lack of the most qualified individuals and those who love the profession who entered the major.

Perhaps, because there was no guarantee of teaching jobs upon training in the United States that extrinsic factors did not come out as an important factor in motivating people to go into teaching. On the contrary, while a wide range of factors influenced their decision, it was the altruistic reasons that were dominant (Hayes, 1990). This feature was noted by a

much earlier study of a large sample of 1980 high school sophomores and seniors where those aspiring to teach were less concerned with financial rewards than those who chose other professions (Robertson, et al. 1983). A similar conclusion was reached in a study of minority students on their interest in teaching. The results of that study revealed that the most important factors ranked 1,2 and 3 were 'knowledge and skill in the subject one would teach', 'desire to work with children' and 'interest in the subject you would teach' respectively. Issues like 'expected salary of a teacher', 'availability of jobs in Nevada', and 'prestige and recognition associated with teaching profession' were ranked 10, 11, and 12 respectively (Summerhill, et al. 1998). The same can be said of those who became kindergarten teachers in Greece (Doliopoulou, 1995) where the love of working with children was dominant. In Britain, a vast majority of Postgraduate Certificate in Education (PGCE) students had positive and professionally sound rather than negative and questionable reasons for wanting to teach (Reid and Caudwell, 1997). In fact, the two most popular reasons, seen as important or very important by 96 per cent of 453 PGCE students were altruistic and intrinsic i.e. 'enjoying working with children' and 'feeling that teaching would bring high job satisfaction'. In contrast, extrinsic reasons such as job security, salary, holidays, etc were regarded as very important and important by less than 50 per cent, and as very important by 15 per cent or less.

In Brunei Darussalam where there has been teacher shortage and where there is still reliance on teachers recruited from abroad, the teaching profession provides job security, good remuneration and fringe benefits and teacher training incentives. These realities were very much the main factors that influenced young adults to go into teaching (Yong, 1994). The motives for teacher trainees to choose teaching were first extrinsic, second intrinsic, and third altruistic (Yong, 1995).

Several studies on the same theme have been conducted in Singapore in the past. The earliest was conducted by Lau (1968) and the most popular motives for choosing to teach were mainly altruistic and intrinsic - 'service to society', 'further education', 'develop the young', 'teaching suits temperament and ability', and 'teaching is an interesting job'. Soh (1981) found that the factors have not changed in his study some 15 years later. Popular motives to teaching include 'teaching being a challenging job', 'develop the young', 'fondness for children', 'realization of potential', and 'further education'. He commented that firmness in the decision to teach among the respondents was associated with the intrinsic nature of teaching, self-actualization, and altruism. The same author (Soh, 1989) later carried out a survey of female teacher-trainees and concluded that, "it is not simplicity but complexity that prevails. In other words, the choice of becoming a teacher is determined mainly by a host of motives related to the nature of teaching, opportunity for self-actualization, and altruism as well as 'practical' considerations. Moreover, 'fondness of children' stands out distinctly as a factor of motivation for choosing to teach. In a general sense, these findings concur with those of earlier studies, both local and overseas."

In his latest study of 180 secondary school teachers in service, Soh (1998) applying factor analysis found that out of eight factors of motives for teaching, two (self-actualisation and service conditions) were the most prominent ones. This implies that the choice to become a teacher is the result of an interaction between the individual's expectation, on the one hand, and service conditions offered, on the other.

This paper is based on a study with similar objectives as the previous ones. But unlike Soh's latest investigation in particular, which targeted serving teachers, this study was much more extensive and involved teacher trainees who have just started their initial teacher training at the National Institute of Education (NIE). These trainees belonged to three different programmes, namely the Post-Graduate Diploma of Education (1 year), Diploma in

Education (2 years) and the Bachelor of Arts/Bachelor of Science with Diploma of Education (4 years). These candidates were all training for primary teaching.

Another point to note is that Soh's study was conducted at the height of the economic crisis East Asia and Singapore were experiencing and teachers in service felt secure that the crisis did not affect them as it did the private sector workers, many of whom were retrenched. This present study was conducted in 2000 when Singapore's economy was booming again. During this period the Ministry of Education also introduced several incentives to make teaching attractive such as salary revision and better career prospects. The purpose of this study was to understand the motives of student teachers in choosing to come to NIE for initial teacher training and, by extension of that logic, choosing teaching as a career, and whether this choice reflected those improved conditions.

Data Collection

The sample of this study consisted of 680 students enrolled in the Diploma in Education, BSc/BA Education and the Postgraduate Diploma in Education (primary) programme. Of these student teachers, 57.3% were Diploma in Education students (Total of Dip Ed General = 578), 84.5% BSc/BA Education students (Total = 220) and 65.0 % PGDE students (Total = 250). In terms of gender, 82.9% are females and 17.1% males. Their ages cover a wide range from 18 – 47 with a mean of 23.

Though the survey instrument was distributed to all students in the three programmes we received 64.9 % return, hence this sample comprises student teachers who were willing to return the completed questionnaire. The sample is quite good considering the large total size and would reasonably represent the entire group of trainees.

Instrument

Student teachers were asked to complete a questionnaire, which is made up of 22 statement of motives for choosing teaching as a career, a few questions related to their background information and two open ended questions related to their expectations. The statements were presented with a five-point scale of agreement vary from 5 (*strongly agree*) through 1 (*strongly disagree*).

Results

Most popular motives

First, descriptive statistics were employed to find out the most popular motives of student teachers for choosing to become teachers. Table 1 sets out the percentages of responses for the five response categories as well as the means, standard deviations and the rank order based on the mean scores of the items. As can be seen from the table the five most influential motives (having a mean of 4.00 and above on a 5-point scale) are: *Love working with children*, *Love teaching*, *Influence young lives for good*, *Teaching is intellectually stimulating* and *Teaching is a noble profession*. These mainly reflect fondness for children and the nature of the teaching profession. These are all basically intrinsic motives.

The next important group of motives (having means above 3.00 and below 3.99) are: *Secure job, Inspired by a model teacher, Inborn talent for teaching, High status profession, Employed immediately after graduation and Many fringe benefits*. This group of 6 motives is related to service conditions and some elements related to internal and external influences.

Of lesser importance (having mean scores above 2.00 and below 2.99) are a group of nine motives: *Others value teachers, Long vacation, Friends' encouragement, Attractive training pay, Attractive training pay, Good prospect, High salaries, Easy promotion, and Parent/sibling teacher*. This is a mix bag of motives mainly related to service conditions and social influences.

At the lowest end of influence with respect to the 22 motives presented to the student teachers are two motives (having mean scores less than 2.00): *No other choice, and Relatively easy job*. It is interesting to note that these student teachers did enter the profession with clear motives and not as a desperate choice. They also seem to realise that it is not an easy job but one that requires their dedication and effort.

Factor Analysis

Factor analysis was carried out to examine the structure underlying the motive items and to reduce the variables to several scales or factors so that the motives of student teachers may be better understood. Different student teachers might have entered the teaching profession for a host of different reasons or motives. It would be interesting to find out some of the aspects that attracted them to teaching. This is accomplished using the principal-components analysis. The number of cases in the present study (n = 680) satisfies the minimum criterion about sample size, that is "at least five times as many observation as there are variables to be analyzed (Hair et al. 1995, p. 373).

Table 1

Motives for teaching: percentage, means, standard deviation and rank order

Motives for teaching	A%	B%	C%	D%	E%	Mean	SD	Rk
13 Love working with chldn.	0.0	0.9	11.9	47.6	39.6	4.26	.70	1
1 Love teaching	0.0	0.1	11.6	59.3	28.3	4.17	.62	2
2 Influence young lives	0.1	0.1	11.9	58.2	29.6	4.17	.64	3
14 Intellectually stimulating	0.6	0.9	14.4	58.4	25.7	4.08	.70	4

11 Noble profession	1.5	1.8	16.0	54.3	26.5	4.02	.79	5
7 Secure job	3.4	6.2	29.6	47.8	13.1	3.61	.91	6
4 Inspired by teacher	4.4	8.4	35.8	37.9	15.4	3.52	1.00	7
20 Inborn talent	1.6	9.0	50.0	33.5	5.9	3.33	.79	8
15 High status profession	4.3	11.2	44.7	32.1	7.8	3.28	.92	9
17 Immediate employment	6.2	12.5	36.3	37.1	7.9	3.28	.99	10
19 Many fringe benefits	5.4	17.6	48.1	27.4	1.5	3.02	.85	11
21 Others value teachers	8.1	19.7	43.8	24.4	4.0	2.96	.96	12
16 Long vacation	10.0	23.4	34.6	27.8	4.3	2.93	1.04	13
12 Friends' encouragement	11.3	22.4	37.8	24.9	3.7	2.87	1.03	14
9 Attractive training pay	8.4	23.7	42.9	23.5	1.5	2.86	.92	15
18 Attractive training pay	9.9	29.3	40.1	17.8	2.9	2.75	.96	16
6 Good prospect	9.3	24.7	50.6	14.9	0.6	2.73	.85	17
5 High salaries	16.8	27.9	43.8	10.7	0.7	2.51	.92	18
22 Easy promotion	15.7	34.9	45.7	3.4	0.3	2.38	.80	19
3 Parent/sibling teacher	36.0	26.8	21.6	9.4	6.2	2.23	1.21	20
10 No other choice	41.3	31.8	21.3	3.7	1.9	1.93	.97	21
8 Relatively easy job	36.6	40.4	19.3	3.5	0.1	1.90	.84	22

A = strongly disagree; B = disagree; C = neutral; D = agree; E = strongly agree

N = 680

The principal-components analysis was conducted with maximum iterations for convergence set at 25. The initial factor solution was rotated under the VARIMAX rotation, which converged after 12 iterations. The first five factors that have eigenvalues greater than unity were examined further (Kim and Muller, 1994). They accounted for only 52.0% of the total variance.

Table 2 gives the rotated factor loadings of absolute value greater than 0.3 only. This criterion is the conventional rule of thumb used to decide factor loadings that are worth interpreting (Kline, 1994).

On the basis of the principal-components analysis results attempts were made to construct meaningful student teachers' motive scales for further analyses. The simplest method is to assign each item to the factor on which it is loaded most highly. This method was used for the first three factors with minor adjustment for two items, which were assigned to the

Table 2

Motives for teaching: Factor structure (Varimax rotated factor loadings)

Motives for teaching	Factor1	Factor2	Factor3	Factor4	Factor5
22 Easy promotion	.736				
6 Good prospect	.713			.348	
18 Many job possibilities	.646				
19 Many fringe benefits	.628		.348		
5 High salaries	.614			.398	
8 Relatively easy job	.598				
21 Others value teachers	.575				
16 Long vacation	.520		.343		
9 Attractive training pay	.492		.383	.329	
15 High status profession	.444	.360	.342		
1 Love teaching		.737			
13 Love working with chld.		.685			
14 Intellectually stimulating		.619			
2 Influence young lives		.575			
11 Noble profession		.512	.537		

20 Inborn talent		.483			.335
7 Secure job	.380		.584		
17 Immediate employment	.339		.579		
10 No other choice			.454		
4 Inspired by teacher				.727	
3 Parent/sibling teacher					.783
12 Friends' encouragement				.382	.546
Eigenvalues	5.18	2.82	1.24	1.14	1.05
% total variance explained	22.6	12.9	5.6	5.2	4.8

Note: Those in bold italics are used to define scales.

scale that is more conceptually meaningful than indicated by the factor loadings. These items are marked with an asterisk (*) in Table 3 below. This strategy left only one item in factor 4 and 2 items in factor 5. A reanalysis was done limiting the number of factors to 4. The single item in factor 4 merged with the two items in factor 5 to form the new factor 4 consisting of items, 3, 4 and 12 with factor loadings of **.655**, **.564** and **.681** respectively.

The first factor which is statistically the most important and which explains 22.6% of the variance is a factor of **Service conditions (SC)**. Here, student teachers who select teaching as a career seem to have considered the service conditions of the teaching profession such as promotion prospects, salary, vacation and fringe benefits. The second in importance is an **Altruistic (AL)** factor, which explains 12.9% of the variance. This deals with a perception of possession of innate quality for teaching. The next two factors **Teaching Profession (TP)** and **Social Influence (SI)** are minor in influence. The Cronbach's alphas of these four scales were determined. They are given in Table 4.

Table 4

Student teachers' motive scales with Cronbach's alphas

Scale	Item	No. of items	Chronbach's alpha
Service condition	5, 6, 8, 9, 16, 17*, 18, 19, 21, 22	10	.8434
Altruism	1, 2, 13, 14, 20	5	.6792

Teaching profession	7, 10, 11, 15*	4	.4479
Social influence	3, 4, 12	3	.3645
Whole scale	1 – 22	22	.8114

The alpha value of SC scale shows that this scale has strong internal consistency while AL scale shows moderate internal consistency, whereas the other two scales have low internal consistency.

Motivating factors and programme type

The academic backgrounds of students who enter the teaching career through the different programmes are different and their prospects in the profession are also different. The Bachelor of Arts/Science with Dip Ed have the necessary A-level or polytechnic diploma qualifications to enter the degree programme, but those who do not make it to this programme will be considered for the Diploma in Education programme. The PGDE programme takes in trainees who are graduates with degree from local or overseas universities. In this connection, it is reasonable to assume that their expectations will also be different. This is borne out by the result of this study (Table 5).

Service conditions

There is a significant difference between the three groups ($p < .001$) with respect to this factor. The degree students seem to be attracted more to teaching by service conditions than the diploma and PGDE students and the diploma group more than the PGDE group. The post-hoc Scheffe test reveals that the mean score differences of the three groups are significantly different.

Altruistic motives

Diploma students who will mainly be teaching the younger children in the primary schools have greater attraction to teaching for altruistic reasons than the degree and PGDE students. The post-hoc Scheffe test shows that the mean score of the diploma group is significantly different from the mean scores of the degree and PGDE groups.

Teaching Profession

The F-value obtained by the one-way analysis of variance indicates that there is a significant difference ($p < .001$) in the perception of the teaching profession by the three groups of student teachers. The post-hoc Scheffe test reveals that the mean score of the PGDE group is statistically different from the mean scores of the degree and diploma groups. The PGDE students as a group have a lower attraction to teaching on the count of nobility, public status and security of the profession.

Social Influence

No difference is observed with respect to this factor between the three groups ($p > .05$)

Table 5

Motivating factors and Programme type

Motive factor	Diploma (n = 331) Mean (SD)	Degree (n = 186) Mean (SD)	PGDE (n = 163) Mean (SD)	F-value
Service Condition	28.28 (5.94)	30.29 (4.78)	24.40 (5.67)	49.73***
Altruistic motive	20.49 (2.13)	19.45 (2.20)	19.64 (2.42)	15.99***
Teaching Profession	13.11 (2.20)	13.52 (1.74)	11.54 (2.11)	45.28***
Social Influence	8.67 (2.27)	8.79 (1.90)	8.31 (2.17)	2.42

***p < .001

Motivating factors and gender

It is not only a common perception that teaching is a career more suited to females than males but it is also reflected by the greater number of female than male candidates who apply to enter the teaching profession. In the Singapore context the female to male teacher ratio is approximately 72:28. It is therefore interesting to find out whether female and male student teachers are motivated differently.

T-test analyses were performed to examine the difference in the mean scores of male and female students. The mean scores, standard deviations and the t-values are shown in Table 6. No significant difference is observed between the groups with respect to all the motivating factors. This suggests that both male and female trainees are attracted to teaching as a career for the same reasons.

Motivating Factors and work experience

The student teachers' work experiences were classified into the three categories, 'no work experience' (NWE), 'work experience related to teaching' (TWE) and 'work experience not related to teaching' (NTWE). Those with 'work experience related to teaching' would have greater insight of what is involved in teaching than those with 'no teaching experience.' It would be interesting to find out whether they are differently motivated to enter the teaching profession. One-way analyses of variance were performed to answer this question. Table 7 displays the group means, standard deviations and the F-values.

Table 6

Motivating factors and gender

Motive Factors	Male (n = 559) Mean (SD)	Female (n = 115) Mean (SD)	t-value 2-tailed sig.
Service Condition	28.75 (6.31)	27.74 (5.86)	1.57, p> .05
Altruistic motive	20.49 (2.13)	19.45 (2.20)	1.01, p> .05
Teaching Profession	13.11 (2.20)	13.52 (1.74)	1.61, p> .05
Social Influence	8.67 (2.27)	8.79 (1.90)	2.37, p> .05

The analyses indicate that there is significant group difference with respect to altruistic factor. The post-hoc Scheffe test reveals that there is no difference between the 'no experience' group and 'teaching experience group', and between the 'teaching experience' group and the 'non-teaching experience' group. However, a significant difference exists between the 'no working experience' group and the 'non-teaching work experience' group. The 'non-teaching work experience' group is more altruistically motivated to select teaching as a career than the group with 'no work experience.' The reason may be the negative experiences that they may have encountered in their previous working experience that attracted them to teaching.

Table 7

Motivating factors and work experience

Motive factor	NWE (n = 116) Mean (SD)	TWE (n = 198) Mean (SD)	NTWE (n = 367) Mean (SD)	F-value
Service Condition	28.76 (6.87)	28.10 (5.62)	27.54 (5.83)	1.88
Altruistic motive	19.47 (2.50)	19.83 (2.14)	20.26 (2.42)	6.10**
Teaching Profession	12.97 (1.94)	12.88 (2.14)	12.78 (2.29)	0.37
Social Influence	8.66 (2.01)	8.74 (1.99)	8.54 (2.29)	0.58

** $p < .001$

Motivating factors and age

The age of the student teachers ranged from 18 to 47 years. They were divided into three age groups to examine the influence of age on the motivating factors in the selection of teaching as a career. Group 1 consists of students aged 18 to 20 years, Group 2 - students aged 21 to 24, and Group 3 - students aged 25 and above. Table 8 displays the mean scores, standard deviations of the groups and the F-values generated by the one-way analysis of variances.

The results indicate that there are significant differences between age groups in the degree of influence of the different motivating factors.

Service conditions

There is a significant difference between the three groups ($p < .001$) with respect to this factor. The Group 1 students seem to be attracted more to teaching by service conditions than the Group 2 and Group 3 students and the Group 2 more than Group 3. The post-hoc Scheffe test reveals that the mean score differences of the three groups are statistically different. The Group 3 students who are the older students are most probably the second career students who have selected teaching not so much for service condition but for other reasons.

Altruistic motives

The post-hoc Scheffe test shows that there is no significant difference between the mean scores of Group 1 and Group 2, and between Group 2 and Group 3. A statistical significant difference exists between Group 1 and Group 3. The older students have more altruistic motive for choosing to be a teacher than the younger ones. As they are mostly second career entrees, this may be an indication of their delusion with working life in the private sector.

Teaching Profession

The F-value obtained by the one-way analysis of variance indicates that there is a significant difference ($p < .001$) in the perception of the teaching profession by the three groups of student teachers. The post-hoc Scheffe test reveals that the mean score of the Group 1 is significantly different from the mean scores of Group 2 and Group 3, and the mean score of Group 2 is significantly different from Group 3. Group 3 students have a lower attraction to teaching on the count of nobility, public status and security of the profession compared to Group 1 and Group 2.

Social Influence

The F-value obtained by the one-way analysis of variance suggests that there is a significant difference ($p < .01$) between the groups with respect to this factor. The post-hoc Scheffe test shows that a significant difference exists between Group 1 and Group 2. The younger entrees to teaching are more influenced by teachers, friends and family to choose teaching as a career than the 21-24 age group.

Discussion

At the individual item level the most popular motives for selecting teaching as a career are altruistic in nature: *love for teaching and working with children, ability to influence lives for good and the intellectually stimulating and noble nature of teaching*. These motives mainly reflect the fondness for children by the entrees to the teaching profession as well as their appreciation for the stimulating and noble nature of teaching. These motives mirror a romantic altruistic view of teaching. This result is in line with the findings of Lau (1968) and Soh (1981,1998). It is also similar to the results obtained by

Table 8

Motivating factors and age

Motive factor	Group 1 (n = 174) Mean (SD)	Group 2 (n = 291) Mean (SD)	Group 3 (n = 194) Mean (SD)	F-value
Service Condition	30.15 (4.86)	27.84 (6.00)	26.32 (6.14)	20.44***
Altruistic motive	19.55 (2.19)	20.04 (2.23)	20.35 (2.29)	5.91**
Teaching Profession	13.51 (1.83)	12.85 (2.25)	12.29 (2.32)	14.48***
Social Influence	9.00 (2.01)	8.36 (2.17)	8.66 (2.34)	5.03**

p<.01, *p<.001

Ried & Caudwell (1997) in Britain, Doliopoulou (1995) in Greece and Hayes (1990) in the United States. So it appears that the most popular motives for selecting teaching as a career have not changed over the last 32 years in Singapore. It also appears that the love for children and working with children to be the prime motive for joining the teaching profession not only in Singapore but elsewhere. It is also very interesting to note that even during an economically bad time very few Singaporeans select teaching as a career out of desperation. Many realise the seriousness and societal value of education. *No other choice* and *relatively easy job* were the lowest ranked motives.

Factor analysis produced four factors of motives for teaching namely, service conditions, altruistic, teaching profession and social influence that may be fitted into the three categories suggested by Moran et al. (2001): intrinsic, extrinsic and altruistic. Service conditions and social influences are basically extrinsic motives. The two most predominant factors influencing the choice of teaching as a career among Singaporeans are Service Conditions and Altruistic motives which explained 35.5% of the total variance. Thus, job seekers who seek to actualize their altruistic motive for teaching may be attracted to teaching if the service conditions are made more attractive and if they are made aware of them. Of late, the Ministry of Education, Singapore has been aggressively taking steps to elevate the status of teaching and career prospects through many measures: salary revisions, promotional opportunities, training and development opportunities, improving school buildings and infrastructure, and overall massive injection of funds. This would likely help to attract more

job seekers to the teaching profession. But caution should be exercised in recruitment to ensure that service conditions are not the only motive that attracts job seekers to the teaching profession especially in times of economic downturn. Candidates must also have an innate love for teaching and a passion for working with children. Working with children and teenagers requires a lot of patience and dedication to the development of the young

At the factor level there are some differences between students in the different teacher education programmes, between student teachers with different work experiences and between different age groups of student teachers. Service conditions have attracted more the student teachers in the degree programme, followed by the students in the diploma and the PGDE programmes. The Diploma students have higher altruistic motives than the degree and the PGDE students. The PGDE students are relatively oriented less positively towards the teaching profession than the degree students. One reason could be that the degree programme prepares graduate teachers for the primary schools and their training is over four years. Trainees would have accepted the fact that they will be teaching primary levels when they graduate. But the PGDE students might not have accepted this fact early but might have opted for teaching due to the tight job market. These degree students may also perceive the working conditions and environment in primary schools more positively than the PGDE students who, until recently, might not have thought that they would be primary school teachers.

Though females are more attracted to teaching than males there is no difference in the degree of influence of the different factors examined. May be other considerations such as family life, caring for own children are involved in their selection of teaching as a career but these are not reflected in the factors examined.

Those who enter the teaching career with non-teaching work experience are more altruistically oriented towards teaching than those with no working experience. It appears that non-teaching work experience induces a greater appreciation for teaching. Perhaps, these people have a romantic view of teaching having had no experience in actual classrooms and face its demands.

With respect to the age groups of the entrants, the younger student teachers are more attracted to teaching than the older student teachers by the service condition, characteristic of the teaching profession and as a result of social influence. However, the older student teachers seem to choose teaching more for altruistic reasons than the younger ones. As the older ones would have had more work experience they seem to be attracted to teaching as a result of higher ideals.

What does all this imply for the recruitment of teachers and retention of teachers? It is clear that one of the factors that motivates Singaporeans to choose teaching as a career is the favourable service conditions which not only includes good salary but also other benefits like promotion prospects and long vacation. With respect to this factor the government has done a lot and is continuing to devise schemes to make the teaching profession an attractive one for those who have the passion for teaching. For example, new openings are created to provide better career prospects for teachers who wish to remain in the classroom and raise the overall quality of education. Teachers who excel in the classroom can aim for new higher-level posts: senior teachers and master teachers. These super teachers who are experts in their subjects as well as have strong teaching skills can expect to earn as much as a school administrator, e.g. vice-principal S\$6200 - S\$8000 per month (The Straits Times, Sept. 27, 2001). What has to be done is to publicize more widely the benefits of the teaching service scheme so that young people who have the desire to teach are attracted to apply.

Two main reasons why teachers leave the service are job stress and the lure of better monetary prospects in the private sector in time of economic upturn. The Ministry of Education has now come up with another incentive to reward those who stay in the teaching profession long. Called the 'Connection Plan', it aims to encourage teachers to make teaching their long-term career. Under the plan, the Ministry of Education will put aside S\$2000 to S\$4800 every year for each teacher. The teacher may then draw out part of the money at different points – every three to five years – during his career. Larger payments will be made during the 15th year and nearer retirement. Those who resign will forfeit the rest of the accumulated sum. It is estimated that a teacher who stays a full 40-year career could receive a total payout of S\$90,000 to S\$120,000 (The Straits Times, Oct. 6, 2001)

There is also plan to relieve teachers from some of the administrative tasks so that they can concentrate on the things they do best, teach. Administrative officers have been employed to do some of the administrative duties in which teachers were involved formally. There is also plan to put in place a scheme by which teaching assistants can be recruited to help teachers in the classroom.

All in all, it can be seen that the Ministry of Education in Singapore is doing its utmost to make the teaching profession an attractive one for those who select teaching as their long-term career. The efforts on the part of the Ministry have borne some fruits. The teaching force has expanded over the past four years to fill up most vacancies across the island, even as the number of schools increased.

Acknowledgement

Appreciation is expressed here to A/P Soh Kay Cheng for assistance in the initial analysis of the survey data.

References

- Doliopoulou, E. 1995, The motives for the selection of the teaching profession by future kindergarten teachers and the factors which form their later opinion of their profession, *International Journal of Early Childhood*, 27, 1, 28-33.
- Hair, J. F., Anderson, R. E., Tatham, R. L., & Black, W. C. (1995). *Multivariate data analysis with readings* (4th Ed.). Englewood Cliffs, N.J: Prentice Hall.
- Hayes, S. 1990, Students' reasons for entering the educational profession, Research Report, Oklahoma: North-western Oklahoma State University, 35 pp.
- Kim, J. & Muller, C. W. (1994). *Factor analysis: statistical methods and practical issues*. SAGE Publication.
- Kline, P. (1994). *An easy guide to factor analysis*. London: Routledge
- Knapp, H. (1998) Attracting and retaining high-quality professionals in science education, *Phi Delta Kappan*, 79, 7.

Lau, W.H. 1968, Why teach? A study of motives for teaching as a career, Singapore Teachers' Training College. Unpublished paper, Institute of Education, Singapore.

Maclean, R. 1999, Developments in teacher education in Asia and the Pacific: Issues and prospects towards the Twenty-first century, *Asia-Pacific Journal of Teacher education and Development*, 2,1, 87-94.

Moran, A., Kilpatrick, R., Abbot, L., Dallat, J., and McClune, B., 2001, Training to teach: motivating factors and implications for recruitment, *Evaluation and Research in Education*, 15, 1, 17-32.

Papanastasiou, C., and Papanastasiou, E., 1997, Factors that influence students to become teachers, *Educational Research and Evaluation*, 3, 4, 305-316.

Reid, I. and J. Caudwell, 1997. Why did secondary PGCE students choose teaching as a career? *Research in Education*, 58, 46-58.

Robertson, S.D., Keith, T.A., & Page, E.B. (1983). Now who aspires to teach?

Educational Researcher, 12,6, 13-20.

Summerhill, A., Matranga, M., Peltier, G. and Hill, G. (1998) High school seniors' perception of a teaching career, *Journal of Teacher Education*, 49, 1, 228-232.

Soh, K.C. 1981, Student profiles and motives for teaching of full-time students in the institute of education (preliminary report). Occasional paper No. 7, Singapore: Institute of Education.

Soh, K.C. 1989, Motives for Teaching of Female Certificate in Education Students. Institute of Education: Research Papers ERU/9/89, 1989.

Soh, K. C. (1998). Who has come to teach and why? A cross sectional comparison of four 'generations' of teaching in Singapore. *Journal of applied Research in Education*, 2, 1, 19-34.

The Straits Times (2001). Super teachers may earn as much as VPs. September, 27. pp. H12.

The Straits Times (2001). Teachers to receive long-service reward. October, 6. pp H13.

Yong, C. S. (1994) Factors that determine the attractiveness of the teaching profession in Brunei Darussalam as perceived by teacher trainees. *Journal of Education and Teaching*, 20, 1, 113-126.

Yong, C.S. (1995) Teacher trainee's motives entering into a teaching career in Brunei Darussalam, *Teaching and Teacher Education*, 11, 3, 275-280.