GLOBALISATION-INDUCED BRAIN-DRAIN AFFECTING ACADEMIC FACULTY'S PROFESSIONALISM AT THE HIGHER LEVEL

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Abstract

This paper assesses the effects of globalisation in terms of brain-drain on the professionalism of the teachers of higher education institutions in Pakistan. The research is based on a survey method. The target group consisted of 11,092 faculty members of HEC-recognised universities located in Islamabad. By using a convenience sampling technique, 198 faculty members were selected as sample. To measure the intention to migrate Planning and Preparation for Opportunities Assessment scale was used. Professionalism Assessment scale was used to assess teachers' professionalism. The data revealed that the intention to migrate was having a significant effect on the professionalism of the teachers. Female faculty members were found to be significantly more inclined to migrate and better in their professionalism as compared to male faculty members. The faculty members between the ages of 46 and 55 were significantly better in professionalism. Teachers who had completed their PhD were more inclined toward migration in search of opportunities. The faculty having over 15 years of experience was also found to be significantly more inclined to migrate. They were also better in professionalism as compared to the other respondents. The paper recommends that teachers need to the incentivised by the government

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Regional Studies, 37:3, Autumn 2019, pp.59-81.

to make them resist the temptation to migrate, such as high salary, participation in departmental decisions, appreciation certificates, job security, etc.

***Key Words**: brain-drain, professionalism, classroom environment management, instruction and assessment strategy, professional attitude*

Introduction

With rapid changes in information technology, communication is becoming increasingly easier. Every new development across the globe is shared by people living in different parts of the world due to fast means of communication. This is only one aspect of what is referred to as globalisation. Globalisation refers to the inter-relationship and inter-linkage between countries and people living far away from each other but connected and aware of the happenings around the globe. This is the reason that the world is referred to as a global village.

With the development of new ways of communication and transportation, fields like trade, travelling, and tourism expanded. As people nowadays have the facilities to travel, communicate, and interact with areas far away from them more easily and swiftly, the significance of space between countries and people has diminished. New ways of living in the world have enabled people to interact with others living at distances of miles to share ideas, culture, trade, communication, information, entertainment, earning, investment, and migration. It has also improved people's lifestyles.

With better and more efficient communication infrastructure, it has become easier to communicate and travel. The print and electronic media have made it possible for us to see news from all parts of the world by just having a television at our home by reading a newspaper every morning, by clicking a search engine via our internet system, or by having a look at our smartphones. Rapid advancement in technology has brought people together. With the rising awareness and swift means of transportation, new horizons for skilled people to find opportunities to acquire education, jobs, better living conditions, social security, and a desirable lifestyle have opened up. This has given birth to the concept of migration towards the developed countries to

improve the standard of life. People living in developing and under-developed countries are more likely to move to other parts of the world where they can earn better and give better education and life to their children. In these efforts, the skilled and intelligent minds leave their country and serve other countries, while their own country needs them for its economic development. This is referred to as brain-drain.

Brain-drain is one of the most common and sensitive issues faced by the majority of developing and under-developed countries. Lifestyles and living standards are changing with the effects of globalisation. With the wave of globalisation, the world has transformed into a global village. Nowadays, it has become much easier to move and migrate to any country in search of better facilities and job opportunities. That is the major cause of brain-drain from the developing countries to the developed ones.

Pakistan is also facing brain-drain. The government invests through the system of education in each child of the country. Depending upon the ability of the children, they move on through the stages of education. Some leave their education at primary level, some leave it at the secondary level, and some leave at the graduation level. However, there are a few who reach higher levels of education. It means that those who reach higher levels have spent more years in the educational institutions and the government has spent more money on their development. That is why we look at them as the future of the country. Moreover, only a few reach MPhil and PhD level. These are the finest products of the education system. This, for them, should be the time to serve the nation. Unfortunately, after this, the majority of the professionals from all fields of education move or try to move towards the developed countries in search of a good salary and job facilities. At the same time, their own country's government has to hire professionals for its own country from other countries who in return take heavy salaries and this income is indirectly transferred to their countries. Like all other professions, the teaching profession is also facing the same situation. Already, in Pakistan, teachers are still fighting for a better status. When a highly qualified teacher does not get any suitable or desirable job, he or she moves in search of better opportunities. Tertiary level education

is the most important step of education and thus we need more skilled and competent faculty at this stage to handle the future of the nation. In this situation, brain-drain is a real challenge for the administrative authorities and the government.

This study assesses the intentions of the teachers serving at higher-level educational institutional in Islamabad and the effect of their intention to move in search of a better job on their professionalism.

Understanding the Phenomenon of Brain-Drain

The humans of today have much more and better facilities than the past and this betterment is moving on and on. This is all possible due to the interconnections between the countries. Now all the parts of the world are so interconnected that invention, research, and discovery in any part of the world are shared with other people within seconds and thus all can get quick and easy benefit from these developments.[1]

Technology is one of the major factors that have influenced globalisation. With the discoveries and technological innovations, the people of today have the fastest means of communication and interaction with the world. These technologies have also helped to provide the fastest means of production that are not only faster but also cheaper. Thus, it has ensured the provision of quick and cheaper goods for people all around the world. Technological development has also provided a stable environment for industries and consumers. Now the consumers have more and more options available to satisfy their demands. Globalisation has not only benefitted the governments but also individuals by providing them opportunities to earn and explore options all around the world. It has provided them with a chance to raise their standard of living and secure the future of their countries.[2]

Pakistan, being a developing country, has also been influenced by globalisation. The trend of globalisation has provided Pakistan with a chance to present and preserve the cultural handicrafts in the markets of the world and get a profitable income for the economic stability of the country. For example, the sports goods that are made in the city of Sialkot are famous all over the world for their quality. Handmade dresses and embroidery are known

all over the world about Pakistan. Agricultural products like fruits are also produced in Pakistan that are exported to different parts of the world.

Everything in the world has two sides depending upon its use or misuse. One side of this wave of globalisation has benefited the countries in such a way that industrial development and technology developed by the engineers and scientist can be shared easily by the developing countries.[3] It is a blessing of sharing of knowledge, especially when the poor and under-developed countries do not have the resources to generate their research processes.[4] In this context, research in the health sector has also benefited many people. Above all, people have better and easy access to educational facilities.[5] In the same way, now there are more opportunities to move to other countries and earn better.[6]

At the same time, such blessings of mobility become a concern for a state when its skilled manpower starts moving in search of better earning and living facilities to the developed countries and leave their own country.[7] Travelling facilities have created many problems as well that are getting serious day-by-day. With the ease of travelling from one country to another, many infectious diseases spread all over the world.[8] It has also created income disparity, alongside environmental degradation. Drugs and human smuggling have become more serious with the advent of globalisation. For this study, it has resulted in a brain-drain from developing countries to the developed ones.[9]

Brain-drain is a term used to refer to the trend of going to the developed countries, which have better education, health, earning, and living conditions. It is more popular among people in developing countries.[10] It negatively affects the economy of the countries that are already facing a shortage of skilled manpower and invest their money on the education of its people to overcome it. They expect that the skilled and trained graduates will at the end of their education serve that country and will support it in its development. But, unfortunately, what happens is that when these people are well trained they travel to developed countries in search of better living and earning opportunities and their own country remains at the same point;

dependant on the aid of other countries not only for money but also for human resource.[11] As an example, it can be observed that in Pakistan most of the doctors and engineers are not ready to work in the rural areas. Instead, when they get an opportunity to go abroad and establish their career, they are willing to do so. Such a situation produces a space in the country that has to be plugged to fulfil the needs of the local people. Then, the government has to call trained people from other countries and pay them heavily. That is another burden on the economy of the country while its workforce serves other nations.[12]

Like all other fields, the wave of globalisation has also affected the education system all over the world. With the expansion of knowledge, breaking the boundaries of space and time, economic resources to acquire knowledge, knowledge at the doorstep with information and communication technology, the world has turned into a single-language state. More awareness related to global and social issues and sharing of research and ideas at the international level at an economical cost are examples of this fact.

Learning has become a lifelong process without any restriction of age. E-learning, e-content, virtual learning programmes, use of virtual teams, constructivist approach to learning, effects of the advancement of technology, brain-based learning programmes, international organisations to facilitate learning, digital libraries, e-search engines, e-conferencing, and availability of readymade material that makes the learners dependant on ICT has opened a new world for the academics.[13] It also attracts educators, students, and professionals to the developed countries in search of better education and job opportunities.

Globalisation has not only changed the systems and structures of developed countries but has also changed the policies and systems of developing countries. To adjust to and live with this change, the coming generation must be equipped with the latest technology and made aware of the global changes. Its major responsibility lies on the shoulders of the system of education and training. Since businesses have changed their strategies and policies, the construct of knowledge has also changed with the emergence of

new researches and technologies. It all calls for a dynamic system to educate and train people for the demands of the future.

As the above discussion has shown, globalisation has affected every aspect of our lives. It has changed the concept of living among the people of today. Now the distance between different parts of the world has lost its meaning. Every 15 seconds a new website is launched, every 15 minutes a new technology is invented, and every 15 days a new product is introduced in the world. Due to globalisation, all these things are equally shared by the people living in different parts of the world. All these changes have changed our thinking, lifestyles, facilities that we use, ways of communication, travelling, business and trading, and, of course, all these changes ultimately affect the education that we require to meet the needs of the modern day and age. As globalisation is putting more and more demands on us to live and compete with the changing world, the education system that was in use a few years back is no longer able to fulfil the needs of today and tomorrow. For the changing world, we need a more focused and dynamic system of education and training of our people so that they should be able to contribute to the progress of the world and their own country. Learning has become a lifelong process without any restriction of age. Furthermore, the following new trends have emerged in the field of learning:

1. E-learning
2. E-content
3. Virtual learning programmes
4. Cooperative learning programmes
5. Use of virtual teams
6. A constructivist approach to learning
7. Advancement of technology
8. Brain-based learning programmes
9. International organisations to facilitate learning
10. Digital libraries
11. E-search engines
12. E-conferencing

13. The enhanced role of media in highlighting and expanding learning opportunities
14. Availability of readymade material making the learners dependant on ICT
15. Increase in the quantity of available material and decreased in quality
16. The confusion created for learners due to extensive material availability creates confusion for the learners
17. Extensive use of ICT blocking the creativity of the students

Methodology

Research Design

This research is based on a survey method. The researchers visited the respondents and analysed the responses to a survey questionnaire.

Population

Research population consisted of 11,092 faculty members serving in the 17 HEC recognised universities of Islamabad. The HEC database revealed that in Islamabad 13 universities were working under the public sector and only 4 universities were from the private sector. 9,421 faculty members were serving in the public sector universities and 1,671 faculty members were serving in the private sector universities.

Sample

By using a convenience sampling technique, 220 faculty members were selected as a sample. The respondents were contacted personally and asked to give responses to the research. However, 22 questionnaires were rejected due to missing information. Finally, 198 respondents were finalised as the sample of the research.

Data Collection

To measure the intention to migrate, Planning and Preparation for Opportunities Assessment scale was used. It was based on 10 items. Professionalism Assessment Scale was used to assess professionalism and it

was based on further three major areas (classroom environment management, instruction and assessment strategy, and professional attitude). In total, it was having 36 items. Both scales were developed by the researchers and were found reliable (See Table No. 1).

Data Analysis

The data collected by the researchers was analysed with the help of SPSS. For analysis reliability, item-total correlation, inter-section correlation, regression analysis, t-test, and ANOVA were used.

Table 1

Cronbach's Alpha Reliability Analysis (n=198)

Scale	Items	Cronbach's Alpha Reliability
Planning and Preparation for Opportunities Assessment Scale	10	0.81
Professionalism Assessment Scale	36	0.95

Table 1 shows that both the scales used by the researchers were reliable and can be used for further research as well. The reliability of the Planning and Preparation for Opportunities Assessment Scale was 0.81. The reliability of the Professionalism Assessment Scale was 0.95.

Table 2a

Item Total Correlation of Planning and Preparation for Opportunities Assessment Scale (n=198)

Item	Correlations	Item	Correlations
PP1	0.66	PP6	0.60
PP2	0.61	PP7	0.74
PP3	0.67	PP8	0.59
PP4	0.39	PP9	0.66
PP5	0.58	PP10	0.68

Table 2b

Item Total Correlation of Professionalism Assessment Scale (n=198)

Item	Correlations	Item	Correlations
C1	0.52	I8	0.55
C2	0.53	I9	0.63
C3	0.66	I10	0.73
C4	0.59	I11	0.71
C5	0.64	P1	0.72
C6	0.65	P2	0.62
C7	0.62	P3	0.64
C8	0.58	P4	0.68
C9	0.46	P5	0.56
C10	0.71	P6	0.84
C11	0.63	P7	0.73
I1	0.77	P8	0.73
I2	0.66	P9	0.80
I3	0.47	P10	0.63
I4	0.53	P11	0.64
I5	0.74	P12	0.51
I6	0.77	P13	0.41
I7	0.77	P14	0.69

Tables 2a and 2b show the item-total correlation of the Planning and Preparation for Opportunities Assessment Scale and the Professionalism Assessment Scale. Table 2a shows that the highest correlation was of PP7 (0.74). Table 2b shows that the highest correlation was of P6 (0.84). All the items were significantly correlated with each other.

Table 3

Inter-Section Correlation of Professionalism Assessment Scale (n=198)

	Classroom Environment Management	Instruction and assessment strategy	Professional Attitude	Professionalism Assessment Scale
Classroom Environment Management	1	0.762**	0.726**	0.885**
Instruction and assessment strategy	0.762**	1	0.841**	0.938**
Professional Attitude	0.726**	0.841**	1	0.942**
Professionalism Assessment Scale	0.885**	0.938**	0.942**	1

Table 3 shows the inter-section correlation between the sub-scales of the Professionalism Assessment Scale. The table reveals that all the sub-scales were statistically significantly correlated with each other. The highest correlation was found between Professional Attitude and the Professionalism Assessment Scale (.942**)

Table 4

Effect of Planning and Preparation for Opportunities (Brain-drain) on Professionalism of the teachers (n=198)

Independent Variable	Dependent Variable	B (Coefficients)	t	Sig.	R Square
Planning and Preparation for Opportunities Assessment	Professionalism	2.00	9.80	0.00	0.32
	Classroom Environment Management	0.68	10.91	0.00	0.37
	Instruction and assessment strategy	0.58	8.30	0.00	0.26
	Professional Attitude	0.72	7.92	0.00	0.23

*p <0.05, **p <0.01

Independent Variable: Planning and Preparation for Opportunities Assessment (IV)

Dependent Variable: Professionalism (DV)

a. Classroom Environment Management
b. Instruction and assessment strategy
c. Professional Attitude

Table No. 4 shows that intention to migrate was having 32 per cent statistically significant effect on the 'professionalism' of the teachers. Thus, the hypothesis that there is no statistically significant effect of globalisation in terms of brain-drain on the professionalism of the teachers is rejected ($p < 0.01$).

a. Classroom environment management was having a 37 per cent significant effect on the 'professionalism' of the teachers.
b. Instruction and assessment strategy was having 26 per cent significant effect on the 'professionalism' of the teachers.
c. Professional Attitude was having 23 per cent significant effect on the professionalism of the teachers.

In this way, hypothesis 1a, 1b, and 1c are also rejected ($p < 0.01$).

Table 5a

Gender-wise Difference in Planning and Preparation for Opportunities (n=198)

Variable		N	Mean	t value	df	Sig
Planning and Preparation for Opportunities Assessment	Male	66	39.64	3.59	196	0.00
	Female	132	42.24			

*p <0.05, **p <0.01

Table 5a shows that the t value (3.59) was statistically significant (**p <0.01). It shows that there was a significant difference between male and female respondents with reference to planning and preparation for opportunities. The females were found more focused on planning and preparation for opportunities.

Table 5b

Gender-wise difference in Professionalism (n=198)

Variable		N	Mean	t value	df	Sig
Professionalism Assessment Scal	Male	66	149.59	3.35	196	0.00
	Feale	132	158.11			

*p <0.05, **p <0.01

Table No. 5b shows that the t value (3.35) was statistically significant (**p <0.01). It shows that there was a significant difference between male and female respondents with reference to professionalism. The females were found more focused on the profession in comparison to males. In this way, the hypothesis that there is no statistically significant difference in the intention to migrate and professionalism of the teachers based on gender is rejected.

Table 6a

Age-wise difference in Planning and Preparation for Opportunities (n=198)

Variable	Age	N	Mean	F	df	Sig
Planning and Preparation for Opportunities Assessment	25-35	128	41.13	0.95	194	0.41
	36-45	53	41.34			
	46-55	13	43.23			
	55+	4	43.50			
	Total	198	41.37			

*p <0.05, **p <0.01

Table No. 6a shows that the F value (0.95) was not statistically significant. It shows that there was no significant difference with reference to Planning and Preparation for Opportunities Assessment on the basis of the age difference. Thus, there is no statistically significant difference in the intention to migrate based on age.

Table 6b

Age wise difference in Professionalism (n=198)

Variable	Age	N	Mean	F	Df	Sig
Professionalism Assessment Scale	25-35	128	152.84	2.62	194	0.05
	36-45	53	159.08			
	46-55	13	162.85			
	55+	4	158.00			
	Total	198	155.27			

*p <0.05, **p <0.01

Table 6b shows that the F value (2.62) was statistically significant (*p <0.05). It shows that there was a statistically significant difference with reference to professionalism on the basis of the age difference. The respondents of age 46-55 were found better in comparison to the other age groups. Thus, there is no statistically significant difference in professionalism based on age.

Table 7a

Qualification wise difference in Planning and Preparation for Opportunities (n=198)

Variable	Qualification	N	Mean	F	df	Sig
Planning and Preparation for Opportunities Assessment	Masters	57	42.02	4.33	193	0.00
	M.Phil	82	40.51			
	Ph.D	49	42.88			
	Post-doctorate	1	31.00			
	Any other	9	38.11			
	Total	198	41.37			

*p <0.05, **p <0.01

Table 7a shows that the F value (4.33) was statistically significant (**p <0.01). It shows that there was a statistically significant difference with reference to planning and preparation for opportunities assessment on the basis of academic qualification. The respondents who had done PhD were found better in comparison to the other respondents.

Table 7b

Qualification wise difference in Professionalism (n=198)

Variable	Qualification	N	Mean	F	Df	Sig
Professionalism Assessment Scale	Masters	57	153.35	0.69	193	0.59
	M.Phil	82	154.55			
	Ph.D	49	158.65			
	Post-doctorate	1	160.00			
	Any other	9	155.11			
	Total	198	155.27			

*p <0.05, **p <0.01

Table 7b shows that the F value (0.69) was not statistically significant. It shows that there was statistically no significant difference concerning Professionalism based on Academic Qualification.

Table 8a

Experience-wise difference in Planning and Preparation for Opportunities (n=198)

Variable	Experience	N	Mean	F	df	Sig
Planning and Preparation for Opportunities Assessment	1-5 years	61	40.21	2.66	194	0.04
	6-10 years	70	41.19			
	11-15 years	63	42.59			
	15+ years	4	43.25			
	Total	198	41.37			

*p <0.05, **p <0.01

Table 8a shows that the F value (2.66) was statistically significant (*p <0.05). It shows that there was a statistically significant difference with reference to planning and preparation for opportunities assessment on the basis of experience. The respondents who had 15 years and more teaching experience were found better in comparison to the other respondents.

Table 8b

Experience wise difference in Professionalism (n=198)

Variable	Experience	N	Mean	F	df	Sig
Professionalism Assessment Scale	1-5 years	61	147.57	6.82	194	0.00
	6-10 years	70	157.20			
	11-15 years	63	160.00			
	15+ years	4	164.50			
	Total	198	155.27			

*p <0.05, **p <0.01

Table 8b shows that the F value (6.82) was statistically significant (**p <0.01). It shows that there was statistically no significant difference regarding professionalism based on teaching experience. The respondents who had 15 years and more teaching experience were found better in comparison to the other respondents.

The hypothesis that there is no statistically significant difference in intention to migrate and professionalism of the teachers on the basis of job experience is rejected (*p <0.05).

Analytical Outcome

Countries invest in education of their citizens with the vision to develop skilled manpower to progress.[14] This is a long-term investment that gives results after a long time.[15] A child who is enrolled in the education system spends several years in that education system and during these years the government spends money on the education system to facilitate the learning process of the child. However, with the latest development in technology and media, the world is interconnected and every minute is openly shared by people all over the world. Travelling has got much easier for people in terms of time and resources, so people easily move from developing countries to the developed ones in search of facilities, jobs, and education.[16] In this situation, the developing countries spend money on the education of the

children but when the students complete their education they move to the other countries. In doing so, all the investment goes in vain. Keeping in view this critical issue, the research was planned in the context of Pakistan. The researchers were interested in assessing the effects of the intention to migrate on the professionalism of the teachers. Like all other professions, teaching is also a very important field to be discussed. Brain-drain is a danger for the teaching profession like other professions. Skilled teachers are equally important to other professionals. A country needs skilled teachers just like it needs other skilled manpower. So when the skilled teacher migrates the country loses its investment.

The first objective of the research was to assess the effect of brain-drain as a product of globalisation on the professionalism of the teachers. It was found that the intention to migrate was having 32 per cent statistically significant effect on the professionalism of the teachers.

The second objective of the research was to find out the difference in the intention to migrate and professionalism of the teachers based on gender. It was found that females were significantly more inclined to migrate and better in their professionalism as compared to males.

The third major objective of the study was to find out the difference in intention to migrate and professionalism of the teachers based on age. The faculty members between the ages of 46 and 55 were significantly better in professionalism.

The fourth objective of the research was to find out the difference in intention to migrate and professionalism of the teachers based on academic qualification. It was found that the faculty members who had done their PhDs were more interested in migrating in search of opportunities.

The fifth objective was to find out the difference in the intention to migrate and professionalism of the teachers on the basis of job experience. While based on experience the faculty having over 15 years of experience was having significantly higher intent to migrate, they were also better in professionalism as compared to other respondents.

Recommendations

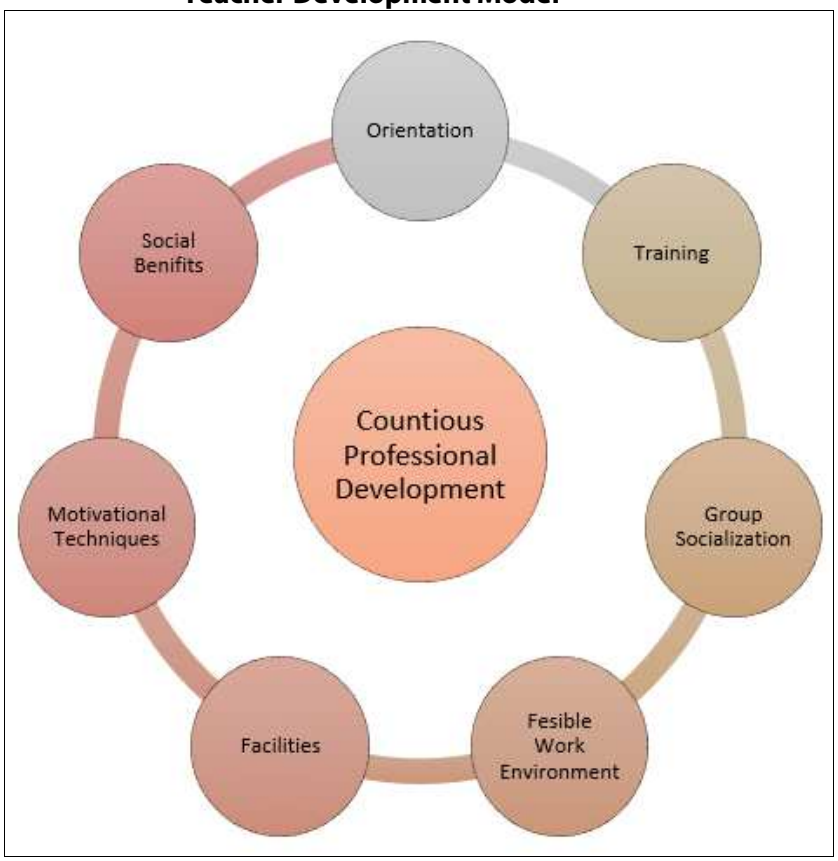
1. Teaching professionals need greater attention from the government to make the profession attractive to the teachers.
2. The status of the teacher in our society needs attention. The government may launch awareness programmes in collaboration with the media related to the teaching profession and its benefits to attract talented people to join this profession by choice.
3. Special facilities like revised pay structure have to be given to teachers to make this profession acceptable by people like other income-generating professions. It would make the teachers more satisfied with their salary and pay full attention to their duties.
4. Medical facilities, housing, and social security have to be provided for a comfortable life within the country, so that teachers may not look for opportunities in search of these facilities outside the country.
5. The teaching profession needs to be given security from political interference and the selection process needs to be fair, so that the young generation may not be disappointed by the system.
6. Teacher training programmes also need to be revised, according to the international standards, so that teachers as professionals may upgrade the quality of education.
7. Special awards related to teaching may be announced at all stages of education frequently. It would help to motivate the teachers.
8. Motivational techniques need to be applied for the motivation of employees and to attract new professionals to this field such as the following:
    a. High salary
    b. Participation in departmental disciplinary decisions
    c. Issuance of participatory certificates
    d. Issuance of appreciation certificates
    e. Job security
    f. Health benefits
    g. Trust in employee's potential

h. Delegation of authority
i. Challenging tasks to perform
j. Constructive feedback from seniors

9. The following is the model to improve teaching as a profession to attract graduates towards this profession within the country. The model explains the activities needed as a major milestone in teaching as a profession. Thus, it is recommended to the management of the educational institutions to implement this plan of action to improve the situation.
    a. Orientation
    b. Training
    c. Group socialisation
    d. Feasible work environment
    e. Facilities
    f. Motivational techniques
    g. Social benefits

Figure 1

Teacher Development Model



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