

Abbasi, Muhammad Nauman; Sarwat, Nosheen

Article

Factors inducing career choice: Comparative study of five leading professions in Pakistan

Pakistan Journal of Commerce and Social Sciences (PJCSS)

Provided in Cooperation with:

Johar Education Society, Pakistan (JESPK)

Suggested Citation: Abbasi, Muhammad Nauman; Sarwat, Nosheen (2014) : Factors inducing career choice: Comparative study of five leading professions in Pakistan, Pakistan Journal of Commerce and Social Sciences (PJCSS), ISSN 2309-8619, Johar Education Society, Pakistan (JESPK), Lahore, Vol. 8, Iss. 3, pp. 830-845

This Version is available at:

<https://hdl.handle.net/10419/188172>

Standard-Nutzungsbedingungen:

Die Dokumente auf EconStor dürfen zu eigenen wissenschaftlichen Zwecken und zum Privatgebrauch gespeichert und kopiert werden.

Sie dürfen die Dokumente nicht für öffentliche oder kommerzielle Zwecke vervielfältigen, öffentlich ausstellen, öffentlich zugänglich machen, vertreiben oder anderweitig nutzen.

Sofern die Verfasser die Dokumente unter Open-Content-Lizenzen (insbesondere CC-Lizenzen) zur Verfügung gestellt haben sollten, gelten abweichend von diesen Nutzungsbedingungen die in der dort genannten Lizenz gewährten Nutzungsrechte.

Terms of use:

Documents in EconStor may be saved and copied for your personal and scholarly purposes.

You are not to copy documents for public or commercial purposes, to exhibit the documents publicly, to make them publicly available on the internet, or to distribute or otherwise use the documents in public.

If the documents have been made available under an Open Content Licence (especially Creative Commons Licences), you may exercise further usage rights as specified in the indicated licence.



<https://creativecommons.org/licenses/by-nc/4.0/>

Factors Inducing Career Choice: Comparative Study of Five Leading Professions in Pakistan

Muhammad Nauman Abbasi
Institute of Management Sciences, Bahauddin Zakariya University, Multan, Pakistan
Email: abbasimna@bzu.edu.pk

Nosheen Sarwat
Institute of Management Sciences, Bahauddin Zakariya University, Multan, Pakistan
Email: nosheensarwat@bzu.edu.pk

Abstract

This study aimed to identify major factors which induce Pakistani graduates while making their career choice. The current research investigated whether career choice factors vary across gender and among leading professions like management, agriculture, engineering, medical and pharmacy. Grounded from literature, a specially designed survey instrument was prepared and pilot tested for data collection. The final questionnaire pertained 24 items and was administered across a valuable sample of 370 students representing various disciplines from 8 different universities. Using principal component analysis, the items were grouped into five factors and were labeled as growth opportunities, occupational charm, self-esteem, societal inspiration and work related factors. The results significantly varied especially for medical, management and pharmacy professions and differed from previous investigations, illuminating the contextual importance of career choice factors. In terms of gender, females seemed more socially inspired as compared to their male counterparts while making a career choice.

Key Words: career choice, higher education, leading professions, Pakistan.

1. Introduction

Education sets career direction. Perhaps, all over the world and especially in Asian societies, learners from kindergartens to universities have remained under one interrogation i.e. what would you like to be? Interestingly, most of the answers given are embedded under societal, environmental and cultural biasness typical of their parental back ground. It means factors influencing career choice will vary from culture to culture and society to society. Usually students want to pursue their higher education in professions having high job opportunities. Since last few years, professions like business, medical, agriculture, engineering, pharmacy etc. have gain fabulous attention by graduates due to high market acceptability, attractive financial packages and status quo associated with these professions. Keeping in view the high demand of these professions, higher education institutions are offering disciplines like Business Administration, Medical, B-Pharmacy, Engineering, Agriculture etc. These disciplines not only fulfill knowledge curiosity of the learners rather also provide them opportunities to be specialized which resultantly help them in their career progression.

Numerous studies have been conducted aiming to explore career choices and to identify related perspectives. In this regard, researchers have investigated factors influencing career choice of the students, role of higher educational institution in career development, role and influence of family, parents and teachers on career choice, gender difference in career choice, impact of culture & values on career choice, career success etc. Researchers have also explored factors influencing career choice decisions of the graduates with reference to demanding occupations like, medical, accounting, engineering, computer sciences, information technology, agriculture, MBA. Majorly, the focus of these studies remained on exploring factors influencing career choice of the students, possible gender differences and impact of culture on student career choice'. Nevertheless, these studies are contextual and were conducted within specific socio-cultural environment. Hence, it is argued that the outcomes of these studies cannot be generalized.

In Pakistan, since the devolution of University Grant Commission (UGC) to Higher Education Commission of Pakistan (HEC), higher education has been revolutionized. Today, 124 universities representing both public (68; 55%) as well as private (56; 45%) sector are offering wide range of disciplines. However, observing the youth proportionate i.e. 55.53 (33.9%) of 163.76 million population, current (higher education) facilities seem insufficient to fulfill the future requirements' of the youth. Additionally, with overall unemployment rate at 2.7% in 2008-09, the age specific unemployment rate is the highest among youth cohorts embedded in the age range 10-24 years (9.3% for 10-14 year old; 9.5% for 15-19 years; 7.3% for 20-24 years). These facts highlight the significance of career choice among Pakistani youth.

Keeping in view the scarcity of research on career choice in context of Pakistan, questions like, do upcoming graduates will get admission in disciplines of their choice? Students have the liberty to choose career of their choice or their choice is under influence? What are the factors affecting the career choice of the students? Accordingly, this paper aims to determine the factors influencing career choice' of Pakistani students in light of their opted (professions) disciplines at universities. Additionally, this paper seeks to explore differences amongst factors influencing career choice of Pakistani students' pursuing any one of the five major professions, i.e. management, agriculture, engineering, pharmacy or medicine.

2. Literature Review

Career is the sequential set of experiences and attitudes related to work that an individual has over the span of his/her work life. Career is exploring sequence of a person's gained experience of work over time. While, the choice is separating or selecting one preferred out of many available things or options. Hence selection of career is one of many important decisions in life which facilitate accomplishment of one's future goals. Since last few years, career choice due to its significance has gained fabulous attention from academicians and researchers. In fact, researchers have explored internal (attitude, aptitude, personal interests, education, family background, etc) as well as external factors

(market acceptability, job opportunities, salary structure, career progression, etc) and their influence on career selection (Felton, et al., 1994; Paolillo & Estes, 1992). In these studies, number of personal, societal, cultural and environmental factors has been observed with reference to their influence on career choice.

In previous studies, numerous factors have been identified including salary, work autonomy, parental support, academic achievements, gender, prestige, status quo, physical or intellectual efforts, job security and their influence on student's career choice. Among previous studies, three dimensional framework of Carpenter and Foster (1977) and Beyon et al. (1998) considered being the most seminal work. Their framework include three influencing factors, which are intrinsic (personal interest in the job, personally satisfying work), extrinsic (availability of the jobs, high salary structures) and interpersonal (influence of parents, peer group, teacher etc) (Beyon, Kelleen, & Kishor, 1998; Carpenter & Foster, 1977). Similarly, career choice model by Meece et al. (1982) provides substantial ground to explore factors influencing career choice of the graduates. Their model included; academic choice, academic performance and academic persistence as key academic achievement behaviors (Meece et al., 1982).

In recent years, efforts have been made to probe the impact of different relations (i.e. parents, siblings, peer group, guardians, teachers, friends, etc) on career selection. In previous studies, various relationship perspectives have been explored in context of career choice. For example, authors have identified the impact of parental occupation on their children's career preferences (Stone & Wang, 1990). Similarly, authors have identified the inspirational impact of parental education on their children career choice (Jones & Larke, 2001; Monica & Kate, 2005). In this regard, Jones & Larke (2001) found that parents with high level of education can better influence career decisions of their children. Likewise, Monica and Kate (2005) found influence of parental education and their personal career as strong motivators to their children in career selection. In similar tune, numbers of researchers have confirmed strong influence of parents, guardians, teachers and friends on career choice (Dick & Rallis, 1991; Esters & Bowen, 2005; Fisher & Griggs, 1995; Fouad et al., 2008; Lent & Brown, 1996; Mutekwe, et al., 2011).

Rosen et al. (1982), in comparative study among various professions, observed high parental influence, peer influence and job satisfaction on medical profession as compared to other professions such as attorney, engineer and accountants. Lent and Brown (1996) have observed that parental influences are powerful contextual determinants that mediate the relationship between interests and goals, between goals and actions, and between actions and accomplishments. Likewise, Ferreira et al. (2006) observed that parental impact is among the various factors influencing vocational behavior of teenagers. Esters and Bowen (2005) have empirically verified that parents, guardians and friends are the most influencing individuals on career choice. Fouad et al. (2008) substantiate the findings that parents served as role model and hence influence the career decisions of their kids. The study conducted by Mutekwe et al. (2011) revealed that in addition to many other factors, career choices and aspirations strongly influenced by parental expectations. Agarwala (2008) observed 'father' as the most significant individual

influencing the career choice of Indian management students. Moreover, his study also exposed the importance of (culture) collectivism and its impact on career selection. Conversely, Eddy et al., (2008) were unable to identify influence of people (family and non-family) as be predictor of career decisions. In a study conducted by Suan, Mat & Im (2012) respondents denied the impact of family members on their career choice.

In addition to explore the impact of interpersonal relations on career choice, authors have also examined the impact of intrinsic and extrinsic factors on the career decision of the graduates (Allen & Katz, 1995; Bai, 1998; Kim & Cha, 2000; Rosen, 1982). The outcomes of these studies suggested that both monetary and non-monetary rewards remained strong influencers' in career selection. Rosen (1982) discovered that competitive earning potential among various professions significantly influence career decision of the graduates. Similarly, the study of Allen and Katz (1995) exposed that technical workers prefer management positions because they believe that these positions are mostly associated with high power, prestige, salary and status. Bai (1998) has explored that prevailing market economy influence the choice of university graduates. He observed that graduates in search of jobs normally prioritized personal-interest in shape of money and power as compared to societal interests.

The findings of Kim and Cha (2000) revealed that employee satisfaction is subject to expected rewards which resultantly has great impact on their career selection and progression. Likewise, the outcomes from the study of Manuel and Hughes (2006) substantiated the findings of several other researchers. They exposed personal fulfillment, working with young people, working conditions, lifestyle, and professional status as the key career influencers. Moreover, Boz and Boz (2008) found that intrinsic career values, salary, social status, social influences, working with children/adolescents, and making social contribution are among the most significant factors that motivate Turkish graduates to join teaching as profession. Conversely, Eiland et al. (2010) in a comparative study of students and faculty perspectives regarding career opportunities in pharmacy academia found that salary was not significant factor for students in selection of any other profession compared to pharmacy academia as career.

Interestingly, majority of the research in the field of career selection, development and progression remained contextual and mostly were conducted with reference to leading professions i.e. medical (Hauer, et al., 2008; Kassebaum & Szenas, 1994; Sanfey, et al., 2006), engineering (Ling, Mat, & Lin, 2012; Wilkinson, 1996), computer science/information technology (Nielsen, et al., 1998; Papastergiou, 2008), agriculture (Esters & Bowen, 2005), pharmacy (Eiland et al., 2010; Keshishian, 2010), management (Agarwala, 2008; Chank-Keung & Jing, 2010; Eddy, et al., 2008), teaching (Eren & Vefa, 2010), etc. For example, Agarwala (2008) has explored various factors influencing career choice of management students in India. Based on the opinion of 93 management students in India, he found that management skills, competencies and abilities are among the most significant factors for management profession. Another valuable study exploring the factors influencing career choice in management profession is of Eddy et al. (2008).

Based on the opinion of US MBA students, they explored the role of values, family and non-family influence on career choice in management. Similarly, Chak-Keung and Jing (2010) have observed the parental influence on management students in China. They found “perceived parental support of the H&T industry”, “perceived parental career concerns about welfare and prestige” and “perceived parental barriers to career choice” are the key predictors for students intend to adopt hotel and tourism (management) as their career choice.

Among others, medical profession is also in spotlights since last many decades. Various authors have explored factors influencing graduates to adopt medical as their career. Earlier, Kassebaum and Szenas (1994) determined the motives behind the selection of different specialties in medical profession. They identified prestige, personality, time and flexibility, lifestyle as key determinants influencing the choice of medical students to adopt any specialty as their career. Later on, Sanfey et al. (2006) have observed similar factors like, prestige, lifestyle, income and balanced lives as key motivators influencing career choice of the surgeons in USA. Additionally, their study exposed gender and generation both as important influencers in medical profession. In similar tune, Rehman et al. (2011) elucidated the specialty preferences of Pakistani medical students. Recently, Hauer et al. (2012) in their studies determined medical students’ career decision regarding internal medicine. Their study explored internal medicine practice environment and internists’ lifestyle as key factors influencing young doctors to pursue internal medicine as profession.

Like, medical and management professions, some other professions like, pharmacy, engineering, agriculture and information technology have also been prioritized by youth and accordingly investigated in context of career choice. For example, Nielsen et al. (1998) presented contextual model and explained how different cultural factors affect and shape the student’s perception regarding IT as career. Eiland et al. (2010) conduct comparative study and explored student and faculty perspective regarding career opportunities in pharmacy academia. They have observed significant differences between student and faculty views regarding pharmacy academia as career. In a case study conducted in Malaysian manufacturing context, Suan et al. (2012) determine drivers influencing graduates to adopt engineering as profession.

Literature synthesis revealed that each profession has its own economic value and market acceptability. In general, researchers have hypothesized that factors influencing career choice vary from profession to profession. The findings of these studies empirically verified that differences exist among factors influencing graduates to adopt any profession as career. Unfortunately, little efforts have been made to identify and compare differences amongst factors influencing students pursuing any one of the leading professions, except the seminal work produced by Paolillo and Estes (1982). They have empirically analyzed how different career choice factors affect the perception of accountants, attorneys, engineers and physicians. Their study reveals distinctive differences and motivating factors among the four different professions.

Interestingly, the focus of many of the above stated studies remained on exploring factors influencing career choice of the students, possible gender differences and impact of culture on student career choice. Nonetheless, these studies are contextual and were conducted within specific socio-cultural and economic environments. It justifies the need to conduct study comparing the differences amongst factors influencing students pursuing various leading professions. Accordingly, this study has explored differences amongst factors influencing Pakistani students' pursuing any one among the five major professions including management, agriculture, engineering, pharmacy or medical.

3. Research Methodology

3.1 Research Aims

This study was initiated with three main objectives; first, identify major factors influencing career choice of Pakistani students. Second, identify gender differences amongst students with regard to the afore-mentioned issues. Third, identify differences amongst factors influencing Pakistani students pursuing any one of the five major professions, i.e. Management/Administration, Agriculture, Engineering, Pharmacy and Medical as their career choice.

Table 1: Sample Size and Gender Wise Classification

Discipline	Institution	Male (%)	Female (%)	Total
Management Sciences	Lahore University of Management Sciences (LUMS), Lahore.	12 (50)	12 (50)	24
	Institute of Management Sciences (IMS), Bahauddin Zakariya University, Multan.	19 (63.33)	11 (36.66)	30
	National University of Computer & Emerging Sciences (FAST), Lahore	14 (56)	11(44)	25
	Bahria University, Islamabad.	16 (64)	09 (36)	25
				104
Agriculture	Agriculture University (AUF), Faisalabad.	10 (50)	10 (50)	20
	University College of Agriculture (UCA), Bahauddin Zakariya University, Multan.	12 (48)	13 (52)	25
				45
Medical	Nishter Medical College (NMC), Multan.	11 (45.83)	13 (54.16)	24
	Quaid-e-Azam Medical College (QMC), Bahawalpur.	18 (66.66)	09 (33.33)	27
	King Edward Medical University (KEMU), Lahore	10 (41.66)	14 (58.33)	24
				75
Pharmacy	Department of Pharmacy (DPBZU), Bahauddin Zakariya University, Multan	12 (48)	13(52)	25
	Department of Pharmacy (DPIUB), The Islamia University of Bahawalpur, Bahawalpur.	14 (53.84)	12 (46.15)	26
				51
Engineering	University of Engineering & Technology (UET), Lahore.	15 (62.5)	09 (37.5)	24
	National University of Sciences & Technology (NUST), Lahore.	16 (76.19)	05 (23.81)	21
	Bahria University, Islamabad.	22 (88)	03 (12)	25
	National University of Computer & Emerging Sciences (FAST), Lahore	21 (84)	04 (16)	25
				95
Total		222 (60)	148 (40)	370

3.2 Participants

To attain the aims of this study, eleven well reputed & specialized educational institutions in each discipline were selected for data collection. These institutions are; Lahore University of Management Sciences (LUMS), Bahauddin Zakariya University (BZU), National University of Computer & Emerging Sciences (FAST), National University of Sciences & Technology (NUST), Bahria University (BU), Agriculture University (AUF), Nishter Medical College (NMC), Quaid-e-Azam medical College (QMC), King Edward Medical University (KEMU), University of Engineering & Technology (UET), The Islamia University of Bahawalpur (IUB). Students already enrolled in these disciplines were chosen as respondents. Out of 370 respondents, 220 (60%) were male, while, 148 (40%) were females. Table – 1 summarized percentage of respondents classified as per major disciplines.

3.3 Scale Development & Pilot Study

General survey guided by structured questionnaire through convenience sampling was administered across a valuable sample of 374 students. Based on extensive literature review, a well-structured questionnaire was developed pertaining 24 independent variables influencing career choices. The content of the questionnaire was based on variables (items) mostly grounded in literature (Agarwala, 2008; Dick & Rallis, 1991; Hauer, et al., 2008; Mutekwe, et al., 2011; Rehman, et al., 2011; Suzanne, 1996). However, modifications were made to attain the objectives and to precisely measure the construct of this study. Before data collection, the instrument was pilot tested from 30 university students. During pilot study, it was ensured that characteristics of the pilot sample remained in line with the population of this study. Reliability of the instrument was checked through Cronbach's alpha. High value i.e. 0.82 confirmed the reliability of the instrument.

The questionnaire also included some general information like, name of the institution, department, program, gender and semester/year. Each student was personally requested to participate in the study. After oral consent, each student was briefed about the nature of the study and was requested to fill questionnaire on 4 – point Likert scale, with anchors ranging from 1= strongly agree, 2= agree, 3= disagree and 4= strongly disagree. Alpha reliability of the scale with the actual sample also remained within the acceptable standards i.e. (Cronbach's alpha = 0.702). Principal components analysis with varimax rotation was used to determine the underlying latent clusters within the 24 items regarding factors' influencing the career choice of the students. Factors having Eigen values greater than 1 were retained.

3.4 Data Analysis

Data were coded and analyzed using the Statistical Package for the Social Sciences (SPSS version 17.0). Data were analyzed through descriptive statistics including frequencies, percentages, means and standard deviations. An independent sample *t-test* was conducted to determine significant differences between gender and the career-choice

factors. ANOVA and Post- Hoc (Tukey) tests were performed to identify the differences among career choice factors of students belonging to the five different professions.

4. Results

Applying principal component analysis, five factors consisting of 16 items explaining 60.26% of the cumulative variance emerged. The authors reviewed the factors derived for interpretability and labeled the underlying constructs as, growth opportunities, occupational charm, self-esteem, societal inspiration, and work related factors. Table 2 depicts these factors. 'Growth opportunities' comprised of 3 variables i.e. opportunities for further (higher) studies, opportunities for further (on/off job) trainings, and opportunities to go aboard (international exposure). The second factor, 'occupational charm' also comprises of three variables i.e. job security, fringe benefits, and starting salary. Similarly, third factor, 'self-esteem' consist of 3 variables i.e. life style, prestige (status quo), and respect. Fourth factor was labeled as 'societal inspiration' and it comprised of 4 variables i.e. parents influence, friends influence, siblings influence, and school teacher influence. Finally, 'work related factors' included 3 variables which were, work autonomy, work load, and flexi-timings.

Table 2: Five Factor Career Choice Rotated Component Matrix

	Component				
	1	2	3	4	5
1. Opportunity/Further Studies				.797	
2. Opportunity/ Further Training				.776	
3. Opportunity/Go abroad				.525	
4. Secure Job			.705		
5. Fringe Benefits			.709		
6. Starting Salary			.764		
7. Life Style					.527
8. Prestige					.756
9. Respect					.766
10. Parents Influence	.785				
11. Friends influence	.865				
12. Siblings Influence	.634				
13. School teacher Influence	.727				
14. Autonomy Of Work		.730			
15. Work Load		.840			
16. Flexible Work Timings		.755			

After exploratory factor analysis (EFA), we tested the five factors model whereby each item loaded on its respective factor. The results of the confirmatory factor analysis yielded a good fit for the five factor model ($X^2 = 177.42$, $df = 94$, $CFI = .91$, $GFI = .94$, $IFI = .91$, $PNFI = .65$, $PCFI = .71$, $RMSEA = .05$). Finally averages were taken of all items separately for each factor.

The means, standard deviations and correlations between variables have been presented in table 3. As noted in table 3, the five dimensions of career choice are weakly to moderately correlated with each other ($r = -0.01$ to 0.73). Further, each dimension of the career choice has an acceptable level of internal consistency (i.e., all Cronbach alpha exceed 0.70). Independent sample *t-tests* were conducted to check differences among gender while selection of career among various professions. Only along the dimension of

Factors Inducing Career Choice

'societal inspiration' results varied significantly ($F = 186.29, p < .001$) for gender differences.

Table 3: Means, Standard Deviations, Correlations and Reliabilities

		M	SD	1	2	3	4	5	6	7	8
1	Department	2.86	1.46	(NA)							
2	Gender	1.41	0.49	0.03	(NA)						
3	Age	1.17	0.40	-0.11*	0.03	(NA)					
4	Self-esteem	3.06	0.62	0.29**	0.05	0.05	(0.72)				
5	Work Associated Factors	2.71	0.71	0.02	-0.09	-0.05	0.12*	(0.71)			
6	Social Inspiration 2.30		0.55	-0.01	0.73**	0.02	-0.01	-0.09	(0.75)		
7	Occupational Charm 2.98		0.61	0.08	0.06	-0.06	0.17**	0.14**	0.08	(0.70)	
8	Growth Opportunities	3.18	0.59	0.06	0.03	0.04	0.16**	0.17**	0.03	0.27**	(0.73)

N=374; alpha reliabilities in parenthesis; ** $p > .01$ (2-tailed) level * $p > .05$ (2-tailed); (Coding) Department (1= Management Sciences, 2= Agriculture, 3= Engineering, 4= Pharmacy, 5= medical) Gender 1= Male, 2= Female) Age (1=18-22yrs, 2=23-28 yrs, 3= 29-32 yrs, 4= >33).

One-way analysis of variance revealed that among all the career choice dimensions, the outcomes for self-esteem ($F = 10.39, p < .001$), occupational charm ($F = 6.62, p < .001$)

and growth opportunities ($F = 4.50, p < .01$) varied significantly. Further the results of the Post-hoc tukey tests revealed that among the five major professions the medical profession significantly varied ($p < .05$) from other professions on 'self-esteem' factor. Significant differences were observed for the management students ($p < .05$) and pharmacy profession ($p < .01$) along the dimensions of 'occupational charm' and the management students also attached great significance ($p < .05$) to the 'growth opportunities' in comparison to other professions.

5. Discussion

The results of this study depict that Pakistani graduates give due consideration to factors like, growth opportunities, occupational charm, societal inspiration, self-esteem and few work related factors, while opting any one of the profession among medical, management, agriculture, engineering, and pharmacy as career. The outcome of mean analysis revealed that Pakistani students give valuable consideration to growth opportunities ($m=3.18, sd=0.59$), occupational charm ($m=2.98, sd=0.61$), societal inspiration ($m=2.30, sd=0.55$), self-esteem ($m=3.06, sd=0.62$) and work related factors ($m=2.71, sd=0.71$) while evaluating different professions to select any one of them as their career. Among the factors, societal inspiration seems highly influential as compared to other factors. The result empirically suggest that Pakistani students are under great influence of their parents, siblings, friends, teachers, etc. and they give due consideration to their inter-personal & social relations in the selection of any profession as career. Interestingly, growth opportunities seem weaker factor as compared to other factors that reflect lack of understanding of Pakistani students towards their career progression and future planning. Instead, Pakistani students prefer to attain *job* irrespective of any other preferences due to today's tight economic conditions. Later, they keep eye on monetary and non-monetary benefits associated with any job (profession) as compared to devise long-term career strategy and to foresee future progression. These outcomes draw interesting theoretical and practical implications. The second objective of the study was accomplished but gender differences were limited in their applicability to the social influence only. In countries like Pakistan which are high on the masculinity and collectivist dimension as it pertains to their national culture (Hofstede, 1980), it can be understood that the females are more prone to social influences and take inspiration from their parents, friends, family, and teachers while deciding for their career as compared to male counterparts.

The results of our study revealed that there were significant differences among career choice of students belonging to five major professions specifically in terms of self-esteem, growth opportunities and occupational charm. However, contrary to previous studies that have highlighted a number of career choice factors for different professions, our study is more comprehensive in its context as it juxtaposes five major professions and their choice factors. The results of our studies as compared to previous researches also remained unique which further illuminates the contextual importance of the present study.

For instance, among the students opting for management and pharmacy as their career choice financial factors and opportunities for growth were the most significant factors as compared to other researches where the career choice of respondents associated to these professions has been for management: management competencies and skills (Agarwala, 2008); family and non-family influence (Eddy et al., 2008) and parental influence (Chak-Keung & Jing, 2010). Similarly for pharmacy, Eiland et al. (2010) study proved that salary was not a decisive career choice factor as compared to the financial benefits associated with specific occupation, as has been identified in our study for the students of pharmacy while contemplating for the pharmacy profession. So it becomes apparent from these results that the career choice of students pertaining to different professions is culturally induced, further stressing the need for such a study to be conducted. The only profession where the results of the current study were somewhat similar to previous researches was medical. Akin to the kernel thought in these investigations (Kassebaum and Szenas, 1994; Sanfey et al., 2006; Rehman et al., 2011 and Hauer et al., 2012) on career choice of medical students, self-esteem was considered as the most rudimentary factor in the respondent's desire for the medical profession as compared to clinical mentors which turned out to be a decisive factor in career choice of medical students in UK (Yap, Rosen, Sinclair & Pearce, 2012).

6. Implications

In the last couple of decades in Pakistan, the medical and management professions have been the most preferred career options for the graduating students. Specifically keeping in view the current crisis which doctors have faced Pakistan is an alarming situation for policy makers belonging to these professions. The results of our study have highlighted the importance of the 'self-esteem' dimension of career choice comprising of factors like prestige, life style and respect as the most significant factor for medical students while opting for this profession. While contemplating for various benefits given to the medical professionals, the findings of the current research can be valuable source of information guiding these policy makers as to what factors students keep in mind while they decide to associate with these professions.

Similarly management professionals also need to keep in mind that along with financial benefits, organizations that provide their potential recruits with opportunities for growth in the form of on the job and/or off the job training will be the most preferred employers. Finally the factors which have been identified in general in this study can also help organizations in reducing the stress which may be caused due to the person-environment mismatch, a proposition of the person-environment (P-E) theory of stress (Caplan, 1983), because when these graduates opt for a particular career they have certain expectations related to it, which if not fulfilled can be a great source of stress as the person starts feeling that he/she is a mismatch in that environment.

Future trajectories on the same line of thought building on the propositions of the person-environment (P-E) theory of stress (Caplan, 1983) can focus on longitudinal studies evaluating the after and before comparisons when a student from a certain discipline contends for a particular career and then finally becomes a part of that specific

profession. Further, authors have distinguished between the factors affecting career choices of medical students in high and low-income countries (Puertas, Arósquipa, & Gutiérrez, 2013), the instrument in this study was developed in Pakistan, which is a low-income country, so this instrument can also be administered in different cultural settings in countries with high-income so as to test for any cultural differences.

REFERENCES

- Agarwala, T. (2008). Factors influencing career choice of management students in India. *Career Development International, 13*(4), 362-376.
- Allen, T. J., & Katz, R. (1995). The project-oriented engineer: A dilemma for human resource management. *R&D Management, 25*(2), 129-140.
- Bai, L. (1998). Monetary rewards versus the national ideological agenda: Career choice among Chinese university students. *Journal of Moral Education, 27*(4), 525-541.
- Beyon, J., Kelleen, T., & Kishor, N. (1998). Do visible minority students of Chinese and South Asian ancestry want teaching as a career? Perceptions of some secondary school students in Vancouver, BC. *Canadian Ethnic Studies, 30*(2), 38-60.
- Boz, Y. & Boz, N. (2008). Prospective Chemistry, Mathematics teachers' reason for choosing teaching as a profession, *Education Journal 16*(1), 137-144.
- Caplan, R. D. (1983). Person-environment fit: Past, present, and future. In C. L. Cooper (Ed.), *Stress research* (pp. 35-78). New York: Wiley.
- Carpenter, P., & Foster, B. (1977). The career decisions of students teachers. *Educational Research and Perspectives, 4*(1), 23-33.
- Chank-Keung, S. W., & Jing, G. L. (2010). Will parental influences affect career choice? *International Journal of Hospitality Management, 22*(1), 82-102.
- Dick, P. T., & Rallis, F. S. (1991). Factors and influences on high school students' career choices. *Journal for Research in Mathematics Education, 22*(04), 281-292.
- Eddy, S. W. N., Burke, R. J., & Fiksenbaum, L. (2008). Career choice in management: findings from US MBA students. *Career Development International, 13*(4), 346-361.
- Eiland, L. S., Flowers, S. K., Andurkar, S. V., O' Brocta, R., Prabhu, S., & Medon, P. J. (2010). A comparative study of student and faculty perspectives regarding career opportunities in pharmacy academia. *Currents in Pharmacy Teaching & Learning, 2*(1), 39-51.
- Eren, A., & Vefa, K. T. (2010). Factors influencing teaching choice, professional plans about teaching, and future time perspective: a mediational analysis. *Teaching and Teacher Education, 26*(7), 1416-1428.

- Esters, T. L., & Bowen, E. B. (2005). Factors influencing career choices of urban agricultural education students. *Journal of Agricultural Education*, 46(02), 24-35.
- Felton, S., Buhr, N., & Northey, M. (1994). Factors influencing the business student's choice of a career in chartered accountancy. *Issues in Accounting Educations*, 13(1), 131-141.
- Ferreira, I., van der Horst, K., Wendel-Vos, W., Kremers, S., van Lenthe, F.J. and Brug, J. (2006). Environmental correlates of physical activity in youth-a review and update. *Obesity Reviews* 8(2), 129-154.
- Fisher, T. A., & Griggs, M. B. (1995). Factors that influence the career development of African-American and Latino youth. *The Journal of Vocational Research*, 20(2), 57-74.
- Fouad, N. A., Kantamneni, N., Smothers, M. K., Chen, Y. L., Fitzpatrick, M., & Terry, S. (2008). Asian American career development: A qualitative analysis. *Journal of Vocational Behavior*, 72(1), 43-59.
- Hauer, E. K., Durning, J. S., Kernan, N. W., Fagan, J. M., Mintz, M., O'Sullivan, S. P., Schwartz, D. M. (2008). Factors associated with medical students' career choices regarding internal medicine. *Journal of American Medical Association*, 300(10), 1154-1164.
- Hofstede, G. (1980). Culture and Organizations. *International Studies of Management & Organization*, 10(4), 15-41.
- Jones, W. A., & Larke, A. (2001). Factors influencing career choice of African ethnic minorities in agriculture. *NACTA Journal*, 47(3), 11-17.
- Kassebaum, G. D., & Szenas, L. P. (1994). Factors influencing the specialty choices of 1993 medical school graduates. *Academic Medicine*, 69(2), 164-170.
- Keshishian, F. (2010). Factors influencing pharmacy students' choice of major and its relationship to anticipatory socialization. *American Journal of Pharmaceutical Education*, 74(4), 1-6.
- Kim, Y., & Cha, J. (2000). Career orientations of R&D professionals in Korea. *R&D Management*, 30(2), 121-138.
- Lent, R. W., & Brown, S. D. (1996). Social cognitive approach to career development: An overview. *Career Development Quarterly*, 44(4), 310-321.
- Ling, S. C., Mat, N., & Lin, I. T. (2012). What drives the career choice among engineers? A case in Malaysian manufacturing plant. *International Journal of Research Studies in Management*, 01(02), 15-24.
- Manuel, J. & Hughes, J. (2006). It has always been my dream': exploring pre-service teachers' motivations for choosing to teach. *Teacher Development*, 10(1), 5-24.
- Meece, J. L., Parsons, J. E., Kaczala, C. M., Goff, S. B., & Futterman, R. (1982). Sex differences in math achievements : Towards a model of academic choice. *Psychological Bulletin*, 91, 324-348.

- Monica, A., & Kate, M. K. (2005). Early determinants of women in the IT workforce: A model of girl's career choices. *Information Technology & People, 18*(3), 230-259.
- Mutekwe, E., Modiba, M., & Maphosa, C. (2011). Factors affecting female students' career choices and aspirations: A Zimbabwean example. *Journal of Social Sciences, 29*(2), 133-141.
- Nielsen, S. H., von Hellens, L. A., Greenhill, A., & Pringle, R. (1998). Conceptualizing the influence of cultural and gender factors on students' perceptions of IT studies and careers *CPR 98 Boston MA USA*.
- Paolillo, G. P. J., & Estes, W. R. (1992). An empirical analysis of career choice factor among accountants, attorneys, engineers, and physicians. *The Accounting Review, LVII*(04), 785-793.
- Papastergiou, M. (2008). Are computer science and information technology still masculine fields? High school students' perceptions and career choices. *Computer & Educaion, 51*(2), 594-608.
- Puertas, E. B., Arósquipa, C., & Gutiérrez, D. (2013). Factors that influence a career choice in primary care among medical students from high-, middle-, and low-income countries: a systematic review. *Revista Panamericana de Salud Pública, 34*(5), 351-358.
- Rehman, A., Rehman, T., Ateeb, M. S., Yasmin, H., Asif, A., & Kafil, H. (2011). Pakistani medical students' speciality preference and the influencing factors. *Journal of Pakistan Medical Association, 61*(7), 713-718.
- Rosen, L. S. (1982). An empirical analysis of carrer choice factor among accountants, attorneys, engineers, and physicians. *The Accounting Review, LVII*(4), 785-793.
- Sanfey, H. A., Saalwachter-Schulman, A. R., Nyhof-Young, J. M., Eidelson, B., & Mann, B. D. (2006). Influences on Medical Students Career Choice. *Arch-Surg, 141*, 1086-1094.
- Stone, J. R., & Wang, Y. (1990). The influence of participation in vocational education on expressed career choice in a related occupation. *Journal of Voctaional Research, 15*(1), 41-54.
- Suan, C. L., Mat, N. & Im, T. L. (2012). What drives the career choice among engineers? A cse in Malaysian manufacturing plant. *International Journal of research Studies in Management, 1*(2), 15-24.
- Suzanne, W. (1996). The factors affecting the career choice of male and female civil engineering students in the UK. *Career Development International, 1*(5), 45-50.
- Wilkinson, S. (1996). The factors affecting the career choice of male and female engineering students in the UK. *Career Development International, 1*(5), 45-50.
- Yap, C., Rosen, S., Sinclair, A. M., & Pearce, I. (2012). What undergraduate factors influence medical students when making their choice of post graduate career? *British Journal of Medical and Surgical Urology, 5*(1), 11-15.