

Motivational Factors Affecting Amotivation among Faculty Members of Public Sector Universities in Islamabad

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Abstract

The study was designed to address motivational factors (intrinsic motivation, integrated regulation, identified regulation, introjected regulation and external regulation) derived from the work of Deci and Ryan (1985). The Self Determinant Theory (SDT) and Organismic Integration Theory (OIT) were the central focus of research inquiry. The major objectives of the study were to draw a comparison of motivational factors on the basis of gender and age and to assess the impact of motivational factors on “amotivation.” The population of research consisted of faculty members (of all the departments and levels available) of the public sector universities in Islamabad. Sample was drawn through convenient sampling technique. The number of respondents who contributed in the process of data collection was 67. A questionnaire was used as a research tool and the reliability of the scale was found to be .78. The collected data was tabulated and analyzed through the Statistical Package for Social Sciences version 21. The results revealed that there was no significant difference between male and female respondents related to intrinsic motivation, integrated regulation, introjected regulation, external regulation and amotivation. It was also revealed that there was statistically no significant difference between respondents of 20-30 years age and of above 30 years with reference to independent and dependant variables. It was also revealed that independent variables describe 20 percent variance in dependant variable. It was recommended that external motivators such as rewards, certifications, awards, acknowledgement letters, specific positions, special duties, bonuses, etc. may be provided after a fixed interval to keep faculty members active and motivated towards their profession.

Keywords: *Self Determinant Theory, Organismic Integration Theory*

Introduction

Education at higher level plays the most important role in any educational system. It is the final stage which produces skilled manpower in a country. As such the faculty serving in the universities holds a central position in the whole system and furthers the process of developing and

building a nation for tomorrow. Faculty members make the whole educational system run. Quality of work of the faculty members affects the quality of product. Their level of commitment and motivation is reflected in the education, learning and growth of their students. Motivation is a drive that initiates dedication, hard work and progress. In order to develop a strong nation we need strongly committed and highly motivated teachers at all levels of education. Although human beings are complex in nature and behavior, it is proved by various theories that humans are motivated due to certain factors. Different psychologists have presented their theories in this regard. According to Maslow, human beings are driven by their needs (1943). Alderfer's Existence, Relatedness, Growth (ERG) Theory presented in 1969 also supports the idea given by Maslow. McClelland (1961) presented his ideas in the form of Achievement Need Theory in the same direction. Another name in this regard is of Skinner whose Reinforcement Theory supports the point that the human beings are motivated by external rewards as well. It can be observed that the well reputed organizations all over the world pay special attention to motivate their employees by various means such as reward, certification, increase in salary, recreational trips, awards, facilities, etc. Thus humans can be attracted towards an activity by the use of internal as well as external reinforcements. The use of motivational techniques depends upon nature, level and need of the subjects. People belonging from different social strata and cultures are driven by different nature and types of motivational techniques. Motivation is also affected by the responsibilities people have in life and by their age. It is usually observed that young people are more enthusiastic and motivated to achieve their targets in life. These targets play a role of the motivator in their life.

Teachers being the builder of a nation are considered important variable of teaching learning process. Thus maintaining motivation of teachers is a major responsibility of the management of educational institutions. External and internal motivation of teachers directly affects the quality of instruction that they provide. The external motivators such as salary, policies, leadership, supervision and work environment lead to the employee's job satisfaction and it is a universal fact that satisfied employees/ teachers can concentrate on their work responsibilities in an effective manner. On the other hand, internal motivational factors such as sense of achievement, recognition within the organization, participation in the organizational activities, nature of work and the chances of personal growth also positively affect motivation of employees. In return, the motivated employees/teachers can provide better performance, team work, respect to the co workers, better communication, delivery of instruction, innovative and creative outputs and reduced rate of turnover.

Research by psychologists on Self-Determinant Theory indicates that motivation results in higher quality learning, competence, ability to take initiative and develop and implement solutions to problems. When the human basic needs are satisfied they are more intrinsically motivated and actively engaged in their learning process (Deci & Ryan, 1985a, 2000; Reeve, Deci, & Ryan, 2004; Ryan & Deci, 2000, 2002; Vansteenkiste et al., 2010).

Thus it is very important to understand employees as human beings and their needs and desires. Only in this way, the management of different educational organizations can motivate their employees in a productive way to get maximum output from their abilities. The motivated work force can lead any organization into the right direction. Therefore, it is the foremost responsibility of the management to encourage and develop its workforce in order to get the desired results. Keeping in view the importance of this area, the present research was designed to assess motivational factors and to determine the differences among various motivational aspects/areas on the basis of gender and age of the faculty members hired by the universities.

Theoretical Framework

In 1970's a new theory Self Determinant Theory (SDT) emerged. It was a macro level theory that defines how human behavior is initialized with motives. This theory was only a key focus in social psychology. However, Deci and Ryan (1985) developed Organismic Integration Theory (OIT), as a sub-theory of SDT, to explain different ways in which extrinsically motivated behavior is regulated. They proposed further four divisions of external motivation regulation. These four divisions were integrated regulation, identified regulation, introjected regulation and external regulation. According to Deci and Ryan (2000), SDT focuses on the degree to which an individual's behavior is self-motivated and self-determined.

According to this theory, a person takes start from a neutral point that is referred to as amotivation. The stage of amotivation is a path to extrinsic motivation leading to intrinsic motivational stage. When a person enters into a situation, s/he needs external motivator to get started with the environment. These external motivational factors are further divided into four divisions as mentioned above. These four divisions lead to a stage where the person is intrinsically motivated towards the activity. Deci and Ryan (2000) have presented their views about the theory as:

Self Determinant Theory (SDT) is a theory of motivation that uses traditional empirical methods to build its theory and to inform its classroom applications. The theory, which

has been 40 years in the making, assumes that all students, no matter their age, gender, socioeconomic status, nationality, or cultural background, possess inherent growth tendencies (e.g., intrinsic motivation, curiosity, psychological needs) that provide a motivational foundation for their high-quality classroom engagement and positive school functioning.

The theory acknowledges that people sometimes lack self-motivation, display disaffection, and act irresponsibly.

To resolve this seeming paradox of possessing inner motivational resources on the one hand and displaying disaffection on the other, SDT research identifies the classroom conditions that support and vitalize students' inner motivational resources versus those that neglect, undermine, and thwart them. (Deci & Ryan, 1985a)

SDT focuses on the degree to which an individual's behavior is self-motivated and self-determined. It identifies three innate needs that, if satisfied, allow optimal function and growth. These include the following: competence, relatedness, and autonomy. These three psychological needs motivate the self to initiate specific behavior and mental nutrients that are essential for psychological health and well-being. When these needs are satisfied, there are positive consequences, such as well-being and growth, leading people to be motivated, productive and happy. When they are thwarted, people's motivation, productivity and happiness plummet.

There are three essential elements of the theory:

1. Humans are inherently proactive with their potential and in mastering their inner forces (such as drive and emotions).
2. Humans have an inherent tendency towards growth, development and integrated functioning.
3. Optimal development and actions are inherent in humans but they do not happen automatically.

Motivation has been a central topic of researches. It has been discussed from various angles but Self Determinant Theory is still not used in many educational researches. Thus, the researcher selected the motivational factors (intrinsic motivation, integrated regulation, identified regulation, introjected regulation and external regulation) presented by Deci and Ryan (1985) to assess the effect of motivational factors on amotivation of the employees hired by the universities of Islamabad. The idea put forth by Deci and Ryan is presented in the following figure.

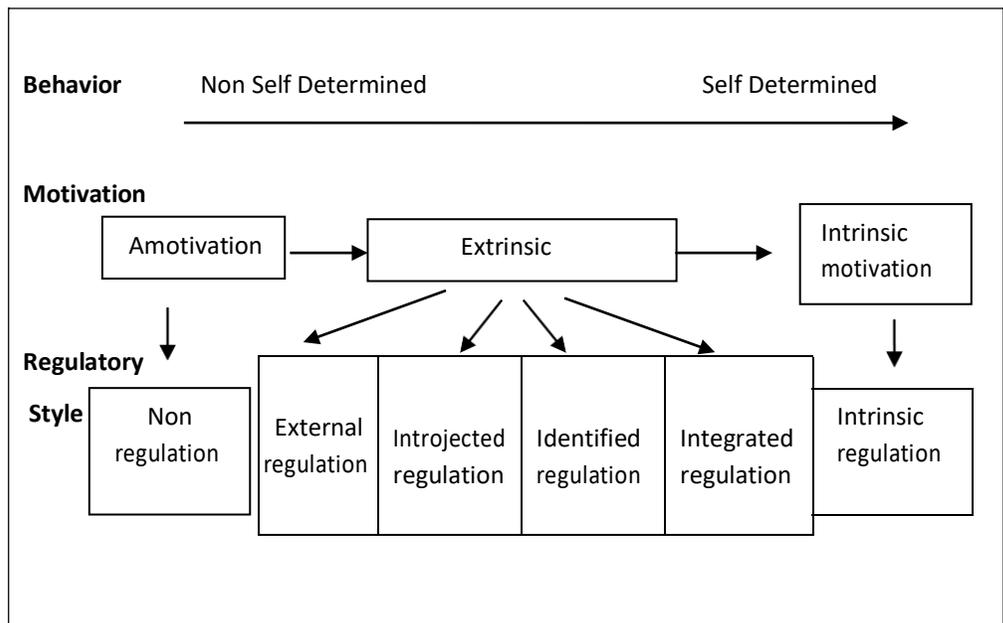


Figure 1: Motivational Factors Presented By Deci and Ryan

Literature Review

The concept of motivation has been a burning topic of research in organizational behavior for a long time. Its importance remain the same in all periods of time (Drafke & Kossen, 2002; Dweck & Sorich, 1999; Herzberg, 1966; Nelson, 2003). Starting from the carrot and stick theories moving to the need based motivational theories up to the performance based motivational concepts; all have proved valuable depending upon the nature of subject and time. In 1970's, a new concept in the area of motivation was developed. It was named as Self Determinant Theory. Many researches were done on the theory and the focus of these researches was intrinsic and extrinsic motivation. The findings of these researches revealed that the intrinsic motivation plays a dominant role in the development of behavior of an individual. However, this theory was not commonly accepted by the field until in the mid 1980s SDT was formally introduced and accepted as a sound empirical theory (Lepper, Greene, & Nisbett, 1973). Research applying SDT to different areas in social psychology has increased considerably since 2000s. Key studies that led to emergence of SDT included research on intrinsic motivation.

Deci, & Ryan, (1991) later extended on the early work differentiating between intrinsic and extrinsic motivation and proposed

three main intrinsic needs involved in self-determination. According to Deci and Ryan (2002):

The three psychological needs motivate the self to initiate behavior and specify nutrients that are essential for psychological health and well-being of an individual. These needs are said to be universal, innate and psychological and include the need for competence, autonomy, and psychological relatedness.

The role of external motivation was elaborated by Deci and Ryan (1985). According to them, "extrinsic motivation comes from external sources." While extending and developing the same work in the same direction Deci and Ryan (1985) developed Organismic Integration Theory (OIT), as a sub-theory of SDT, to clarify the diverse ways in which extrinsically forced behavior is regulated. In this regard they suggested four further ways of external motivation that are integrated regulation, identified regulation, introjected regulation and external regulation. OIT was developed keeping in view the different forms of extrinsic motivation and the environmental context in which it is developed. OIT describes four different types of extrinsic motivations. These types are operationalized for the purpose of current research as follows:

Integrated Regulation: It is the most autonomous kind of extrinsic motivation occurring when regulations are fully assimilated with self. So they are included in a person's self evaluation and beliefs on personal needs. Because of this, integrated motivations share qualities with intrinsic motivation but are still classified as extrinsic because the goals that are trying to be achieved are for reasons extrinsic to the self, rather than the inherent enjoyment or interest in the task (Deci & Ryan, 1995).

Identified Regulation: It "is a more autonomy driven form of extrinsic motivation. It involves consciously valuing a goal or regulation so that said action is accepted as personally important" (Deci & Ryan, 1995).

Introjected Regulation: According to Deci and Ryan (1995), introjected regulation "describes taking on regulations to behavior but not fully accepting said regulations as your own." Deci and Ryan (1995) claim "such behavior normally represents regulation by contingent self-esteem, citing ego involvement as a classic form of introjections. This is the kind of behavior where people feel motivated to demonstrate ability to maintain self-worth." While this is internally driven, Deci and Ryan (1995) state that "introjected behavior is on an externally perceived locus of control because they aren't perceived as part of self" (Deci & Ryan, 1995). It refers to doing something in order to maintain self-esteem, pride, avoid guilt, or

anxiety, for example, going to school in order to make one's parents proud. Introjected behaviors are not fully accepted as part of oneself.

External Regulation: It is the least autonomous and is performed because of external demand or possible reward. "Such actions can be seen to have an externally perceived locus of control" (De Charms, 1968). It refers to when we take some action in order to satisfy an external demand or to receive some reward, for example, getting more education so that one can get paid more money.

Since the entire focus of research is on motivation, it is extremely necessary to bring to light what motivation and amotivation mean.

Motivation: Motivation refers to a state that develops an action and/or a force that initiates a behavior. It is a very common subject of research especially in the field of organizational behavior. However, "amotivation" is a new term introduced in almost the same context by Deci and Ryan (1985) as a constituent of their theory.

Amotivation: Amotivation is referred to as the inability to participate in some activity. "It refers to lack of motivation resulting from realizing that there is no point" (Dörnyei, 2001). Amotivation was introduced by Deci and Ryan (1985) as a component of their Self Determinant Theory and they define it as "the relative absence of motivation that is not caused by a lack of initial interest but rather by the individual's experiencing feelings of incompetence and helplessness when faced with the activity." Further Pelletier et al. (1999) said that "personal beliefs, helplessness, strategy, capacity, and effort, lead to greater amotivation, while self-determination has an inverse relationship with amotivation."

Research Objectives

1. To assess the difference among motivational factors on the basis of gender.
2. To assess the difference among motivational factors on the basis of age variation.
3. To assess the difference among motivational factors on the basis of departments.
4. To assess the effect of motivational factors on amotivation.

Research Hypotheses

1. There is no difference among motivational factors on the basis of gender.

2. There is no difference among motivational factors on the basis of age variation.
3. There is no difference among motivational factors on the basis of departments.
4. There is no effect of motivational factors on amotivation.

Research Variables

Independent Variables:

- 1) Integrated Regulation
- 2) Identified Regulation
- 3) Introjected Regulation
- 4) External Regulation
- 5) Intrinsic Motivation

Dependant Variable:

- 1) amotivation

Methodology

The study was based on a survey method. The study adopted quantitative method of inquiry. The population of research consisted of all the faculty members of the public sector universities in Islamabad. The records available at Higher Education Commission (HEC) data base revealed that there are 13 public sector universities in Islamabad and 9,421 faculty members working in these public sector universities of Islamabad. To draw a sample, the researcher selected convenient sampling technique. 75 faculty members were selected from different universities (See Appendix I) in order to collect data. A questionnaire termed as "Self-Determination Index" was used in order to collect responses from the respondents. The questionnaire was adopted from the work of Tremblay, Blanchard, Taylor, Pelletier and Villeneuve (2009) titled as "Work Extrinsic and Intrinsic Motivation Scale: Its Value for Organizational Psychology Research." The actual questionnaire consisted of the same research variables that are addressed in the present study. Thus the same questionnaire was selected to be used as the research instrument. The questionnaire consisted of 18 items in total divided into five sub sections: intrinsic motivation (Item # 4, 8, 15); integrated regulation (Item # 5,10,18); identified regulation (Item # 1, 7, 14); introjected regulation (Item # 6, 11, 13); external regulation (Item # 2, 9, 16) and amotivation (Item # 3, 12, 17). Previous researches have shown that the self-determination index displays high levels of reliability and validity (Fortier, Vallerand, & Guay,

1995; Green-Demers, Pelletier, & Me´nard, 1997; Pelletier, Dion, Slovinc-D’Angelo, & Reid, 2004). The internal consistency (Cronbach’s alpha coefficient) of the scale was .84.

Initially, 75 questionnaires were distributed among the faculty members of different departments. 67 questionnaires were returned with complete information. The SPSS version 21 was used for the purpose of analysis. During the process of analysis, Cronbach's Alpha reliability, correlation, t-test, ANOVA, regression and frequencies were used. In this way the results were drawn and the recommendation were made.

Results

Although the questionnaire was adopted from the work of Tremblay, Blanchard, Taylor, Pelletier and Villeneuve (2009) and it was a recognized questionnaire, the researcher calculated the reliability of the instrument on the basis of the data collected from the universities of Islamabad. Keeping in view the cultural differences of each country, city and area there was a need to reassess the reliability of the instrument in the cultural background on the current research area.

Table 1: Reliability Statistics

N of Items	Cronbach's Alpha
18	.78

The reliability of the scale was found .78. It explains that the instrument was well constructed and can be used in future with a fair amount of confidence.

The questionnaire was divided into five further sections that were intrinsic motivation (Item # 4, 8, 15); integrated regulation (Item # 5, 10, 18); identified regulation (Item # 1, 7, 14); introjected regulation (Item # 6, 11, 13); external regulation (Item # 2, 9, 16) and amotivation (Item # 3, 12, 17). On the basis of the collected data, the researcher attempted to measure the degree of inter relationship between the sub sections of the questionnaire. This was the reason that the inter section correlation was calculated.

Table 2: Inter Section Correlation

	Intrinsic Motivation	Integrated Regulation	Identified Regulation	Introjected Regulation	External Regulation	Amotivation	Total
Intrinsic Motivation	1						
Integrated Regulation	.499**	1					
Identified Regulation	.472**	.391**	1				
Introjected Regulation	.364**	.543**	.498**	1			
External Regulation	.250*	.350**	.390**	.255*	1		
Amotivation	.100	.115	.068	.319**	.308*	1	
Total	.604**	.658**	.664**	.740**	.676**	.583**	1

**Correlation is significant at the 0.01 level (2-tailed).

* Correlation is significant at the 0.05 level (2-tailed).

The correlation between all the sub scales was statistically significant. The highest correlation was found between intrinsic motivation and integrated regulation (.499**) which shows that intrinsic motivation and integrated regulation were more strongly interconnected than any other section.

Data collected regarding demographics of gender, age, and departments is tabulated below.

Table 3: Demographics (Gender)

	Frequency	Percent	Cumulative Percent
Male	32	47.8	47.8
Female	35	52.2	100.0
Total	67	100.0	

Table 4: Demographics (Age)

	Frequency	Percent	Cumulative Percent
20-30	43	64.2	64.2
31+	24	35.8	100.0
Total	67	100.0	

Table 5: Demographics (Departments)

	Frequency	Percent	Cumulative Percent
Social Sciences	22	32.8	32.8
Languages	22	32.8	65.7
Management Sciences	23	34.3	100.0
Total	67	100.0	

The demographic data revealed that 47.8 % of the respondents were male and 52.2 % of the respondents were female. This shows that almost an equal ratio of male and female respondents was selected so that the responses may not be gender biased. On the other hand, (64.2 %) of the respondents were of 20 to 30 years of age which shows that majority of the respondents were of more than 30 years of age. This was quite appropriate sample for the current research. Besides, 32.8 % of the respondents were from Social sciences, 32.8% of the respondents were from Languages and 34.3 % of the respondents were from management Sciences. This was also an equal ratio to remove the chance of any kind of biasness on the basis of departments and subjects.

Gender Wise Comparison

Table 6 shows that there was no significant difference between male and female respondents related to intrinsic motivation, integrated regulation, introjected regulation, external regulation and amotivation. However, there was a significant difference between male and female respondents related to identified regulation. This shows that male and female respondents both were facing the same conditions and level of motivation so there was no gender based difference found to be considered in provision of motivational factors. This concluded that male and female respondents both can be treated by the same strategy in future.

Table 6: Gender Wise Comparison (t-test)

	Gender	N	Mean	Std. Deviation	T	df	Sig.
Intrinsic Motivation	Male	32	12.59	1.500	1.265	65	.210
	Female	35	12.14	1.417			
Integrated Regulation	Male	32	11.81	1.874	-.666	65	.508
	Female	35	12.14	2.158			
Identified Regulation	Male	32	12.47	1.164	2.553	65	.013
	Female	35	11.40	2.089			
Introjected Regulation	Male	32	11.44	1.777	1.271	65	.208
	Female	35	10.80	2.273			
External Regulation	Male	32	11.97	2.403	1.161	65	.250
	Female	35	11.29	2.408			
Amotivation	Male	32	10.59	2.626	-.423	65	.674
	Female	35	10.86	2.475			

* $P < 0.05$

** $P < 0.01$

Age Wise Comparison

Table 7 reveals that there was statistically no significant difference between respondents of 20-30 years of age and of above 30 years with reference to intrinsic motivation, integrated regulation, identified regulation, introjected regulation, external regulation and amotivation. It was also concluded from the results obtained from the data that no difference in the motivational variables was found on the basis of age difference. The respondents under 30 years of age and the respondents above 30 years of age both had same motivational needs and level.

Table 7: Age Wise Comparison (t-test)

	Age	N	Mean	Std. Deviation	T	df	Sig.
Intrinsic Motivation	20-30	43	12.49	1.470	.974	65	.334
	31+	24	12.12	1.454			
Integrated Regulation	20-30	43	12.23	2.136	1.352	65	.181
	31+	24	11.54	1.744			
Identified Regulation	20-30	43	11.93	1.907	.121	65	.904
	31+	24	11.88	1.569			
Introjected Regulation	20-30	43	11.26	2.083	.802	65	.425
	31+	24	10.83	2.036			
External Regulation	20-30	43	11.77	2.553	.704	65	.484
	31+	24	11.33	2.160			
Amotivation	20-30	43	10.93	2.364	.859	65	.394
	31+	24	10.38	2.826			

* $P < 0.05$

** $P < 0.01$

Department Wise Comparison

Table 8 shows that three departments were considered for data collection. These departments included Social Sciences, Languages, and Management Sciences. The results show that there was no statistically significant difference between various departments related to intrinsic motivation, integrated regulation, introjected regulation, external regulation and amotivation. Only variable related to identified regulation was found having statistically significant difference level in the selected departments. In this regard, the mean score of the Management Sciences Department was (12.39) higher in comparison to the other departments.

Table 8: Department Wise Comparison (ANOVA)

Variables	Departments	N	Mean	Df	F	Sig.
Intrinsic Motivation	Social Sciences	22	12.41	64	.848	.433
	Languages	22	12.05			
	Management Sciences	23	12.61			
Integrated Regulation	Social Sciences	22	11.91	64	.152	.859
	Languages	22	11.86			
	Management Sciences	23	12.17			
Identified Regulation	Social Sciences	22	12.18	64	3.401	.039
	Languages	22	11.14			
	Management Sciences	23	12.39			
Introjected Regulation	Social Sciences	22	11.23	64	.098	.907
	Languages	22	11.14			
	Management Sciences	23	10.96			
External Regulation	Social Sciences	22	11.23	64	1.466	.239
	Languages	22	11.27			
	Management Sciences	23	12.30			
Amotivation	Social Sciences	22	11.14	64	.890	.416
	Languages	22	10.91			
	Management Sciences	23	10.17			

Effectiveness of Motivational Factors to Develop “Amotivation”

In order to determine effectiveness of motivational factors, independent and dependents variables were considered. The following table is presented to determine the effectiveness.

The coefficient ($\beta = .336$) of extrinsic regulation was statistically significant at 0.01 level. It indicates that extrinsic regulation was statistically significantly related to amotivation.

Discussion

The present study was designed basically to assess the impact of motivational factors on amotivation. Amotivation refers to a state in which individuals cannot perceive a relationship between their behavior and that behavior's subsequent outcome. Theoretically, there are three broad classes that involve and help define motivation: intrinsic motivation, extrinsic motivation and amotivation. Intrinsic motivation is defined as: "the inherent tendency to seek out novelty and challenges, to extend and exercise one's capacities, to explore, and to learn" (Deci & Ryan, 2000).

While on the other hand extrinsic motivation involves "undertaking an activity that results in a separable outcome, an activity that may not be inherently enjoyable or interesting" (Deci & Ryan, 2000). The concept of amotivation, however, completely differs from intrinsic and extrinsic motivation, "being a complete absence of both intrinsic and extrinsic types of motivation" (Pelletier, 2002). While overall the term motivation can be defined as the catalyst that initiates, helps and maintains behaviors that are goal focused.

The study also aimed to draw a comparison between male and female respondents and to draw a comparison on the basis of their age difference. The researcher focused on intrinsic motivation, integrated regulation, identified regulation, introjected regulation and external regulation as motivational factors. Hypothesis 1 of the research "There is no difference among motivational factors on the basis of gender" was proved. The data approved the hypothesis as far as intrinsic motivation, integrated regulation, introjected regulation and external regulation are concerned. However, there was a difference between male and female respondents with respect to identified regulation.

Hypothesis 2 that "There is no difference among motivational factors on the basis of age variation" was also found true. The results showed that statement of the hypothesis was proved and no difference was found in independent as well as dependant variables.

Hypothesis 3 that "There is no difference among motivational factors on the basis of departments" was proved by the data. There was no statically significant difference found in the motivational factors.

Hypothesis 4 that "There is no effect of motivational factors on amotivation" was rejected. The results explain that there is 20 percent variance on dependant variable due to the independent variable.

Introjected regulation and extrinsic regulation were found significant factors in affecting amotivation at 0.01 level of significance.

Recommendations

1. It is recommended that at the time of appointment and selection of employees as teaching faculty, some kind of aptitude test may be taken to assess the level of motivation. Motivation towards this profession plays a vital role in the performance of employees. Thus the devoted and motivated teachers may be selected for and promoted in this profession.
2. External motivators such as rewards, certifications, awards, acknowledgement letters, specific positions, special duties, bonuses, etc. may be provided after a fixed interval of time to keep them active and motivated towards their profession.
3. Moral development and ethical value system may be considered priority of the teacher education programs to stimulate introjected regulation. The teaching profession is the most sensitive profession. Teachers are the builders of a nation. There is a special need to develop strong moral value system among them to motivate them towards their responsibilities.
4. Teacher training programs may include projects related to the social services to develop enjoyment in such activities. In this way, they will gradually learn and get motivated towards amotivational activities.

Significance of the Study

The field of education is the most important field in any society and education is the instrument to develop any nation. The time and money that we invest in education today will bring the prosperity and development for the future generations. Teachers being the central figure in the system of education become the focus of latest researches. Thus keeping in view the importance of the field, the present research is designed to assess the motivational factors that are prevailing in the system of education in Pakistan. The findings of the research will be helpful in developing teachers as the major work force in the educational organizations. It would help the educational managers as well to develop a sense of dedication and sincerity among the employees in order to get better output. It may also be helpful for policy developers to include such policies that may be useful in developing and enhancing the level of motivation among teachers.

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Appendix I

List of Total Population

List of Public Sector Universities

S. No	University/DAI Name	Male	Female	Total
1	Air University, Islamabad	465	140	605
2	Allama Iqbal Open University, Islamabad	448	280	728
3	Bahria University, Islamabad	592	285	877
4	COMSATS Institute of Information Technology, Islamabad	1680	522	2202
5	Federal Urdu University of Arts, Sciences & Technology, Islamabad	564	226	790
6	Institute of Space Technology, Islamabad	115	20	135
7	International Islamic University, Islamabad	540	656	1196
8	National Defense University, Islamabad	78	11	89
9	National University of Modern Languages, Islamabad	365	381	746
10	National University of Sciences & Technology, Rawalpindi	985	240	1225
11	Pakistan Institute of Development Economics, Islamabad	89	34	123
12	Pakistan Institute of Engineering & Applied Sciences, Islamabad	199	23	222
13	Quaid-i-Azam University, Islamabad	355	128	483
	Total	6,475	2,946	9,421

Source: Higher Education Commission Data Base, Statistical Division (2009-2014)

Appendix II

Self-Determination Index

Name _____ Designation _____

Organization _____ Gender _____

Qualification _____ Age _____

Department _____

Using the scale below, please indicate to what extent each of the following items corresponds to the reasons why you are presently involved in your work. There is no right or wrong answer.

Strongly Agree	Agree	Undecided	Disagree	Strongly Disagree
5	4	3	2	1

Sr. No	Statements	Strongly Agree	Agree	Undecided	Disagree	Strongly Disagree
1	Because this is the type of work I chose to do to attain a certain lifestyle.	5	4	3	2	1
2	For the income it provides me.	5	4	3	2	1
3	I ask myself this question, I don't seem to be able to manage the important tasks related to this work.	5	4	3	2	1
4	Because I derive much pleasure from learning new things.	5	4	3	2	1
5	Because it has become a fundamental part of who I am.	5	4	3	2	1

6	Because I want to succeed at this job, if not I would be very ashamed of myself.	5	4	3	2	1
7	Because I chose this type of work to attain my career goals.	5	4	3	2	1
8	For the satisfaction I experience from taking on interesting challenges	5	4	3	2	1
9	Because it allows me to earn money.	5	4	3	2	1
10	Because it is part of the way in which I have chosen to live my life.	5	4	3	2	1
11	Because I want to be very good at this work, otherwise I would be very disappointed.	5	4	3	2	1
12	I don't know why, we are provided with unrealistic working conditions.	5	4	3	2	1
13	Because I want to be a "winner" in life.	5	4	3	2	1
14	Because it is the type of work I have chosen to attain certain important objectives.	5	4	3	2	1
15	For the satisfaction I experience when I am successful at doing difficult tasks.	5	4	3	2	1
16	Because this type of work provides me with security	5	4	3	2	1
17	I don't know, too much is expected of us.	5	4	3	2	1
18	Because this job is a part of my life.	5	4	3	2	1

