

European Journal of Educational Sciences (EJES)

2014 / December

Publisher:

**European Scientific Institute,
ESI**

Reviewed by the "European Journal of Educational Sciences" editorial board 2014

December 2014 edition vol. 1, no. 4

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ISSN 1857- 6036

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POSSIBLE CAUSES OF PREMARITAL SEX AMONG YOUTHS AS PERCEIVED BY LECTURERS OF UNIVERSITY OF ILORIN, NIGERIA

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Abstract

The age of first sex has significantly reduced generally in the modern society, particularly Nigeria. Youths often dare the consequences of premarital sex to fulfil sexual desire which in most cases have dire effects on their health, education and social lives. This study investigated possible causes of premarital sex among youths as perceived by lecturers of University of Ilorin, Nigeria. The descriptive survey method was used for the study while a total of 160 respondents were purposively selected. The t-test statistical analysis was used to test the stated null hypotheses at 0.05 level of significance. The measure of central tendency statistics was adopted to determine answers to the research questions. The results revealed that, personal reason was the most perceived reason for premarital sex among youths while inadequate knowledge of reproductive health was perceived as the most important specific factor. Respondents were similar in their perception based on gender and academic ranks. It was recommended that counsellors and health educators should endeavour to provide adequate information to youths on reproductive health and appropriate relationship with friends.

Keywords: Premarital Sex, Health, Social, Youth, Perception

Introduction

Premarital sex is the involvement in sexual intercourse by persons who have not engaged in marital vow or culturally recognized as having been enrolled in marriage institution. Although marriage rites take different forms depending on cultural permissiveness, nevertheless the major thrust is the acceptance by the society. In most cases, premarital sex is not always a problem to individuals who are sexually matured since they may view it as a natural response to a natural stimulus. However, premarital sex is morally unacceptable in almost every human society that regards marriage as the legitimate requirement for sexual permissiveness, and especially among youths who are considered vulnerable to health – related problems.

Both Christianity and Islam (the major religions in Nigeria) vehemently oppose premarital sex and thus prescribed specific punishment for culprits. Sometimes, premarital sex is rebranded as fornication because of its implication. In Islam, the Holy Quran chapter 24 verse 2 prescribed that a man or woman caught in the act of fornication (sex before marriage, that is, premarital sex) should be flogged with a hundred stripes in the public and that no one should have compassion for the victim. In addition, Quran chapter 17 verse 32 says: “*Nor come nigh to it (premarital sex) for it is a shameful (deed) and an evil...*” These Quran verses point to the fact that Islam opposes premarital sex.

In Christianity, the Holy Bible states that: “... *the marriage bed should be kept pure, for God will judge... all the sexually immoral*” (Heb.13:4). In this context, keeping the marriage bed holy suggests abstinence from sex before marriage while sexually immoral refers to any unacceptable sexual acts particularly premarital sex. Thus, it is also clear that Christian faithfuls are prohibited from engaging in sex before marriage (premarital sex).

The traditional practice which made premarital sex abominable paved way with the advent of civilization across the globe. In particular, the emergence of the so-called “sex liberation” in the Western world in 1960s and 1970s significantly legitimized the acceptance of sexual behaviours, including premarital sex, outside marriage (Abraham & Kumar, 1999). The modern society thus appears to be more permissive in many ways because premarital sex has become an ‘ordinary’ activity that permeates the adolescent group in particular and the entire human existence. According to Arumala (2005), the prevalence of premarital sex among adolescents is evidenced in the magnitude of unwanted (teenage) pregnancies, abortions, high rate of Sexually Transmitted Diseases (STDs) and death resorting from sexual activities among youths age group 13 to 21 years old. Scott (2006) corroborates this when he stated that, throughout the world; most young people have had sex before they reach 19 years of age (the adolescence and

pre-marriage age) without engaging in marital vow. He went further to identify some other ones who engage in so-called “sexually alternatives” such as fondling their sex organs (masturbation).

Gelana (2009) stated that in Ethiopia, 60% of pregnancies which emanated from premarital sex are unwanted or unintended and thus endanger the life of the expectant youth who become mothers by accident. In a study of Kenya’s population, Kiragu and Zabin (1993) reported that a lot of Kenyan youth engage in premarital sex and the behaviour is on the increase. The proportion of young people who are sexually experienced by age 15 and 18 years old in Nigeria in 2008 showed significant variations between male and female. Where 5.7% male of age 15 have had sex the female population was 15.7%. At age 18, the statistics showed that 25.6% of males have had sex but the females’ proportion was 49.3%, which is remarkably higher than their male counterparts (Adeyemi, 2013). The reasons for the variation could be numerous ranging from biological (maturation), social, cultural to psychological.

Many factors account for premarital sex, youthful age itself is a stage of human life that is characterized by accelerated development in different parts of the body. In particular, the unprecedented growth and development of sex organs and the attendant heightened emotion as correlate are enough significant factors that may predispose youth to premarital sex. Different studies identified different factors that may dispose young persons to premarital sex. In Thailand and Philippines, family structure was associated with premarital sex; youths living with single parent have higher rate of premarital sexual activities than those living with both parents (Stewart, Sebastiani & Lopez, 2001). In Turkey, Mechet (2006) identified mother’s education, age, ethnicity and employment status as the most important predictors of attitudes of young women toward premarital sex. One may deduce from the two studies mentioned that home background is a common factor that dispose youths to premarital sex.

In support of this, Durojaiye (1972) did observe that in Africa homes, parents are not fully equipped to answer questions on sexual matters adequately; even those who attempt to pass on faulty information to their children. Thus, insufficient sex education from home throws youths into confusion which often results to personal search and in the process become prey to adults who could take advantage and defile the innocent young females especially. Other factors associated with premarital sex include influence of media, peer pressure, insatiable lust for money, cultural influence, sexual harassment, curiosity, poor school discipline, location of school, religious teachings and literacy (Kiragu & Zabin, 1993; Abraham & Kumar, 1999; Ajiboye, 2006; Adegoke, 2013).

There are numerous sexual behaviours that can make the youth susceptible to practicing premarital sex. A category of such behaviour is autoeroticism in which an adolescent attempts to gratify his/her sexual urge by carrying out the activities by self and on self. Among such acts are sexual fantasy (a mental exercise involving imagining, mapping, desiring and navigating, in abstract, into sexual pleasure), masturbation (the manual stimulation of one's own genital for sexual pleasure), and erotic dreams (an unconscious state especially during sleep when one experiences sensual feeling). Other sexual behaviours that could dispose adolescent to premarital sex include pornographic viewing, kissing and touching (frotteurism).

There is no doubt the fact that premarital sex has dire effect on youths. Barker and Rich (1992) identified teenage pregnancy as a major consequence of premarital sex. No wonder, Gyepi-Garbrah (2005) inferred that premarital sex is one of the reproductive health problems witnessed among youth as a result of daily increase of teenage pregnancy with its attendant consequences. Hutterth and Hayes (1997) reported that young girls between ages 14 and 20 in Dakar sold sex with seven or eight clients per night and 40% did not know anything about condoms. This suggests double tragedies for the girls because they may incur unwanted pregnancy and get infected with STDs. These two dire consequences could become a springboard for other challenges such as school drop out, poor health conditions, and permanent deformity, which may resort from sexual activities. Other consequences are stigmatization, isolation, self-guilt, poor self-concept, negative self-image, teenage motherhood, single – parenting to mention a few.

Statement of the Problem

It is seemingly apparent that many Nigerian researchers and observers are of the opinion that the traditional values are changing rapidly and for the worse (Ezeh, 2001 and Arumala, 2005). An area in which the decline of traditional value is loud and obvious is the issue of sexuality. It appears the society has accepted premarital sex as a legitimate practice since emphasis has shifted from virginity till marriage. Yet, the consequences of premarital sex among youths are still pronounced in the society. Previous studies (Kiragu & Zabin, 1993; Douglas & Richard, 1994; and Arumala, 2005) have focused much on strategies for reducing risky behaviour and perception of parents on prevalence of premarital sex among youths. The present study deemed it fit to investigate perception of University lecturers on possible causes of premarital sex among youths. Thus, the study was limited to University of Ilorin, Kwara State, Nigeria.

Research Questions

- (i) What particular category of factors predicts premarital sex among youths?
- (ii) What specific factors significantly predict premarital sex among youths?

Research Hypotheses

- (i) There is no significant difference in the perception of lecturers on possible causes of premarital sex among youths based on gender.
- (ii) There is no significant difference in the perception of lecturers on possible causes of premarital sex among youths based on rank.

Methodology

The descriptive survey method was adopted to find out the perception of lecturers on possible causes of premarital sex among in-school adolescents. The population for the study comprised all lecturers (academic staff) of the University of Ilorin. However, a sample of 160 respondents was used for the study. The non-probability sampling procedures (the purposive and the stratified sampling techniques) were adopted to select the respondents across the variables of gender and rank. A self-developed questionnaire was used to collect the data. The research instrument used for the study has two sections (A and B). Section A contains items on demographic characteristics while section B sought the perception of respondents on possible causes of premarital sex among in-school adolescents. Having subjected the instrument to the test re-test method reliability a correlation co-efficient of 0.71 was obtained. The questionnaires were administered to the respondent after which the data collected were analyzed using the descriptive statistics and t-test statistics. The 0.05 alpha level of significance was adopted.

Results

The results are discussed below.

Socio-demographic Data

Table 1: Distribution of Respondents by Gender and Rank

Variable	Frequency	Percentage
Gender		
Male	107	66.87
Female	53	33.13
Total	160	100.0
Rank		
Lecturer I and below	126	78.75
Senior Lecturer and Above	34	21.25
Total	160	100.0

The results in table 1 revealed that there were more males (66.97%) respondents than females (33.13%). Lecturers between Graduate Assistant and Lecturer I rank constitute (78.75%) of the respondents while the remaining (21.25%) were those between senior lecturer and professor.

Table 2 presents the rank order of possible causes of premarital sex among youths in the perception of the respondents.

Table 2: Rank order of responses to the items on possible causes of premarital sex among youths

Categories of Predictors	Means Scores	Rank
Personal reasons	13.09	1 st
Peer group influence	11.43	2 nd
Family – related	11.04	3 rd
Psychological factors	9.14	4 th

The results in table 2 revealed that among the categories of causes of premarital sex, personal reasons ranked first while peer group influence ranked second. Family-related and psychological factors were ranked third and fourth respectively. This is an indication that the respondents perceived personal reasons as the major factor for premarital sex among in school adolescents. This finding might not be unconnected with the fact that youths could engage in premarital sex as a result of curiosity, which was earlier mentioned by Kiragu and Zabin (1993).

Table 3: Rank order of items on causes of premarital sex

Items	Mean	Rank
Inadequate knowledge of reproductive health	2.71	1 st
pressure from friends	2.67	2 nd
Curiosity	2.56	3 rd
Desire for physical pleasure	2.41	4 th
Imitation of friends sexual behaviour	2.38	5 th
Lack of self – control	2.27	6 th
Response to emotional breakdown	2.25	7 th
Poor home training	2.24	8 th
Loneliness	2.22	9 th
Desire to always satisfy friends	2.20	10 th
Response to sexually urge	2.19	11 th
Participation in risky sexual behaviour of peers	2.17	12 th
Socio-economic status of parents	2.16	13 th
Autocratic parenting style	2.15	14 th
Non-challant attitude of parents	2.13	15 th
Insatiable desire for money	2.12	16 th
Parent – child communication pattern	2.10	17 th
Desire to express affection	2.08	18 th
Desire to satisfy emotional feeling	2.06	19 th
Need to respond to sexual urge	2.05	20 th

On the specific items on the questionnaire, inadequate knowledge of reproductive health, pressure from friends' and curiosity ranked first, second and third respectively. Thus, these three items were the significantly perceived specific factors predicting premarital sex among youths. This is in agreement with the assertion of Wight, Williamson and Henderson (2006) that lack of satisfactory information on sexuality was grossly responsible for teenage pregnancy in Zimbabwe

Hypothesis One: *There is no significant difference in the perception of lecturers on causes of premarital sex among youths based on gender.*

Table 4: The t-test showing the perception of male and female respondents

Gender	N	Mean	Standard Deviation	Df	Calculated t-value	Critical t-value
Male	107	53.68	3.41	158	1.87	1.96
Female	53	51.42	3.73			

The result in table 4 shows that the calculated t-value of 1.87 is less than the critical value of 1.96 an indication that the calculated value falls within the acceptance region and as a result the stated null hypothesis was accepted. There is therefore no significant difference in the perception of lecturers on the causes of premarital sex among in school adolescents based on gender.

Hypothesis Two: *There is no significant difference in the perception of lecturers on causes of premarital sex among in school adolescents based rank.*

Table 5: The t-test showing the perception of rank respondents

Rank	N	Mean	Standard Deviation	Df	Calculated t-value	Critical t-value
Lecturer I and Below	126	62.74	2.88	158	1.55	1.96
Senior lecturer and Above	34	61.51	3.64			

The result in table 5 shows that the calculated t-value of 1.55 is less than the critical value of 1.96 an indication that the calculated value falls within the acceptance region and as a result the stated null hypothesis was accepted. There is therefore no significant difference in the perception of lecturers on the causes of premarital sex among in school adolescents based on academic ranks.

Discussion of Findings

It is evident from this study that personal reasons are perceived to be the major factors determinants of premarital sex among youths and youths

lack adequate knowledge of reproductive health. This may suggest that, there is inadequate emphasis on sex education in schools and homes. Wight, Williamson and Henderson (2006) inferred that lack of satisfactory information on sexuality was grossly responsible for teenage pregnancy in Zimbabwe. Equally, pressure from friends and curiosity were specific factors that ranked significantly high by the respondents. Sambisa *et al* (2008) stated that advice from friends was responsible for adolescents' involvement in unprotected sex in Zimbabwe while Kiragu and Zabin (1993) blamed premarital sex on personal adventure and exploration of youths as a result of poor information on reproductive health.

The study indicated that there were no significant differences in the perception of respondents based on gender and academic ranks. Thus, lecturers irrespective of their gender and academic ranks perceived factors predicting premarital sex among youths in the same way. This is in agreement with the assertion of Ajiboye (2006) that gender does not always differentiate people's perception and attitude.

Recommendations

- Counsellors should constantly be in contact with the youths to educate them on sexuality and how best to manage their sexual feelings without necessarily engaging in premarital sex. Counsellors should help to enlighten adolescents on healthy peer friendship to discourage bad influence.
- Health educators should rise to the challenge of organizing enlightenment activities in schools in order to provide adequate reproductive health information to students and parents.
- Also, parents should endeavour to provide the necessary materials for their children in order to discourage commercial (premarital) sex among in-school adolescents. Parents should ensure that useful pieces of information on sexuality are provided for adolescents at home in order to guide against being influenced by destructive information from friends and media.

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EVALUATION BY THE CURRICULUM GRADUATES AND EMPLOYERS. CASE: ENGINEER WORKS AND SERVICES UNIVERSITY CENTER OF SOUTH COAST - UNIVERSITY OF GUADALAJARA

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Abstract

This work is part of the experience of tracking graduates and curriculum evaluation, derived from an international accreditation process conducted by the European agency AQU Catalunya University Center South Coast (South Coast CU) at the University of Guadalajara. Because of this, we conducted a Follow-up Study, which included generic skills (PROFLEX, 2010) of graduates demanded from the labor market, complemented by the Study of Employers who evaluated the same competency. In this study, generic skills in graduates of Career Engineer Works and Services are analyzed, contrasting perceptions of graduates and employers. The methodology is described and a method for the comparative analysis is proposed, the results and their implications for curriculum design career competencies are discussed.

Keywords: Graduates, Employers, Skills, Curriculum Evaluation

Introduction

The opinion of employers is increasingly a priority for Higher Educational Institutions (HEI) with respect to aspects of graduate training demanded by firms (López F., & Montañes G., 2003). Education-employment relationship is determined by social and political structures in certain geographical areas, where the local and international market becomes one of the most important indicators that guide the demands on higher education. Thus Diaz Barriga (2000) notes that "the proper functioning of the education system is reflected in the timely preparation of its graduates, according to the requirements of each position in the labor market."

At the University Center of South Coast the continuous improvement at curricular proposals is important to ensure the relevance of their careers with the regional and national labor market, as it carries out information about monitoring graduates and employers review to let you know the congruence between the skills that form in its educational programs and requirements of the productive sector. This work was taken as an example to study Engineering Works and Services in the University Center of South Coast.

Methodology

Follow-up studies of graduates emerged to analyze the relationship between educational spending and economic growth; and the links between education investment and the benefits of individuals. Many universities have incomplete studies of graduates. There are two projects funded by the European Commission who conducted general surveys in Europe: CHEERS (1998), funded by the Fourth Framework Programme of the EU; and REFLEX (2004), supported by the Sixth Framework Programme of the EU, which achieved international recognition (PROFLEX, 2010). Derived from this experience, the ALFA project with the name PROFLEX (2010), who conducted a survey of graduates in Latin American universities based on the European experience that was performed.

According PROFLEX, proper monitoring of university graduates induces managers to consider the following questions: Do we know the strengths and areas of improvement in the training of our graduates?. Do we know if their skills are what the market requires?. Finally, we know the work history of our graduates? (PROFLEX, 2010).

In 1998 the National Association of Universities and Institutions of Higher Education (NAUIHE) published the document Core Scheme for Graduates Studies, informing that graduate follow-up is a key strategy in improving the HEI, it also generates information to support the processes of evaluation and updating plans and programs of study and the design of the new educational offer (NAUIHE, 1998).

From an educational perspective, employers' opinion surveys are a tool to gather information on the productive sector skills required by graduates to join the workplace efficient manner; based on that you can make decisions on the design of strategies for teaching and learning, new curricula or restructure existing curricula.

In studies of the labor market for professionals the relationship between the labor market and the HEI is analyzed, since they act as intermediaries, or catalysts for the needs of buyers and sellers, and employment opportunities at a professional level (Navarro, 1998). With this studies, the University Center of South Coast hopes to contribute an

improvement the relevance of their curriculum, and build better conditions for the employment of its graduates, providing them with job skills, knowledge, abilities, skills, values and other tools allowing a positive impact on their professional field.

To conduct this study universe graduates and employers in the Engineering Works and Services were taken. As a reference the collection of information was taken as a reference database for the Coordination of the race (CUCSUR, 2010), which met the same requirements of validity and reliability in composition for purposes of the study (Malhotra, 2007). The sampling technique used was not random due to the features presented by the sample and the type of convenience (Gutiérrez, 2005).

Regarding the design of the questionnaire the one established by the PROFLEX project (2010), was taken as a reference, which uses more than 150 questions, with a structure consisting of nine sections covering aspects; the training, transition of work, competence and satisfaction, among others. Concerning the requirement of reliability of the instrument the Cronbach's Alpha test was applied, resulting in a value of 0.740, which confirmed the degree of relevance of the items included. Likert was used as the scale of measurement where a value or address and the interviewed indicates if the respondent agrees or disagree with the statement - (McMillan, JH & Schumacher, S., 2005: 240).

Since the application of the questionnaire was performed in most cases by telephone, it was considered that respondents may have difficulty remembering the list of issues, or have limitations in answering the questionnaire. So they chose to handle items in closed form,-one which the subject chooses between predetermined answers - (McMillan, JH & Schumacher, S., 2005: 135).

With respect to the concept of competence, Hartog (1992) defines them as aptitudes? Abilities and skills of graduates in higher education that increases their productivity from a multidimensional perspective. The multidimensional nature as a novel element in the current concept of competence stand out. The questionnaire asks PROFLEX graduates reflections on the skills they have and they need for their jobs and the contribution of universities to learning from them. For this study, the questionnaire for employers was designed based on the PROFLEX. To analyze the results the opinion surveys of graduates (GR) and employers (EM) only the two highest levels of capacity on the relevant competence were used; "alot" and "to a large extent". Both together were referred to as "High level".

Descriptive statistics were used in analyzing the data and methodologies as the categorization of the skills were implemented, and the weighting of the views of GR and EM. In these weighting methods,

experiences from Gómez G., and Z. Mendoza Castañeda P. (2010) were used with some modifications. This is how it was defined that the value of weighting of the RG is 30% (RGw= 0.30) and the value of weighting of the EM is 70% (EMw = 0.70%). The methodology is summarized in Table 1 according to present suggestions by the results obtained in the analysis of the views of GR and EM, the weighting GRW and EMW, the Weighted Average (WA) in the percentage of opinion and the maximum time in years to perform the review, modification and curriculum changes (TIMAX).

Table 1. RG and EM scenarios opinion, weighting GRW and EMW, and suggestions for a draft revision, modification and curriculum transformation.

Competence of the corresponding category	WA percentage of opinion GR y EM GRW=0.30; EM=0.70	Suggestions	TIMAX
Competition 1,2, .. n	90-100	Refine details and be aware of disciplinary and environmental changes	3
	80-89	Perform surface and moderate changes: review and define the competencies according to GR and EM	2
	70-79	Perform moderate to profound changes: Emphasize the elements and relevance of skills according to GR and EM	1
	60-69	Making major changes: extension and depth competency	0.75
	50-59	Contents very strong changes: Restructuring the curriculum and competencies	0.75
Category 1, 2, .. n	<50	Start a curricular transformation considering the "non grata" antecedent	0.5

The suggestion of what? and the time to do them, will depend on the weighted average for the relevant competition.

Results

The relevance of the educational program of the University Center of South Coast is based on the curriculum content thereof. One challenge is the ongoing evaluation of the impact of academic processes in society. This is important for developing strategies that lead to feedback of the educational programs curriculum that we already have and identify new training needs, in order to respond in a positive and innovative way to social needs; ie, providing better training to meet the open economy imposed by national and international competition, both professional services and like goods and services.

The analysis proposed by poll is according to the six categories in which the capabilities of graduates are grouped according to the work required at the graduate level and profile cluster level. Subsequent to this, is the analysis of specific skills.

Knowledge, analytical thinking, reasoning and tools

This category refers to the capabilities of: mathematical logical reasoning; analytical thinking; to master knowledge of their areas or other areas; to acquire new knowledge quickly and use tools. These capabilities allow the individual to work with some intellectual criteria such as clarity, accuracy, precision, relevance, depth, breadth, logic, important significance and impartiality?

Capacity logical mathematical reasoning

40% of GR have mentioned that they count with a high level relative to the competence; and 50% said that the company where they work requires a high level in this competence? That is, the GR perceived themselves with less mathematical logical reasoning, than what they believe the businesses require.

Moreover 10% of the EM mentioned that GR working in their organizations have high-level logical mathematical reasoning (Table 10).

Ability of analytical thinking

20% of GR indicated that critical thinking ability is high; and regarding the companies in which 50% work said that they require high-level professionals who have this ability. That is, the GR perceived themselves with less analytical thinking, that what they believes that businesses require. Turning to the views of EM, 50% of them felt that their institutions require professionals with this high level of competence, as well as the same percentage of EM mentioned that GR working in their organizations have a high level. That is, both the EM and GR perceive that the EG have this capability in high level (Table 2).

Ability to master knowledge of your area

In this competence both the EG and EM revealed that they account a high level therefore? Agree with the review of performance of the GR that 50% is what the businesses require; and in the same way 50% of the EM believe that their institution need professionals with this high level of competence and they also coincide with the percentage of MS, who feel that graduates working in their companies have this competence in the required level (Table 2).

Ability to master knowledge of other areas

40% of GR mentioned that they have less of this competence than what companies require; and 50% of EM believe that their institution demand professionals with this high level of competence and 40% of them mentioned that professionals working in their companies have this ability as is required (Table 2).

Ability to acquire new knowledge

In analyzing this competence, we see how 50% of EG mentioned that they have this high ability feature; and the same percentage said that this required level of competence in the company is high relative to the ability to acquire new knowledge. Moreover 70% of EM felt that their organizations require professionals with a high level of this competence and only 50% of EM mentioned that GR working in their organizations have a high level (Table 2).

Ability to use tools

With respect to this competence 30% of GR indicated that their ability to use tools is high; regarding working companies 50% said that they require professionals who have a high level (Table 2), so graduates are perceived with less level that is required by the labor market.

Table 2. Review of graduates (GR) and employers (EM) on high (A lot or a great deal) of the skills required in the workplace and their weighted average (WA SRW), the skills of the graduate profile and weighted average (WA SGR) and total weighted Average (WA TOTAL) in the category of knowledge, analytical thinking, reasoning and tools.

competition	Level required at work			Level having the graduate profile			WA TOTAL
	Percent who think that the required level at work is high		WA SRW	Percent who think that the graduate level is high profile		WA SGR	
	GR	EM		GR	EM		
Logical mathematical reasoning ability.	50	0	15	40	10	19	17
Analytical thinking ability	50	50	50	20	50	41	46
Ability to master knowledge of your area	50	50	50	50	50	50	50
Ability to master knowledge of other areas	50	50	50	40	40	40	45
Ability to rapidly acquire new knowledge.	50	70	64	50	50	50	57
Ability to use tools.	50	50	50	30	30	30	40
Average	50	45	47	38	38	38	42

The results of this table indicate that graduates have career preparation skills in this category of medium to high. It is observed that the competence that mostly contributes to this result is the ability to rapidly acquire new knowledge with 57%.

Innovation

The economic development of an organization, a country or a society depends on its ability to leverage opportunities presented by exploiting their current resource endowment and adding or developing new resources and / or ideas to materialize value-generating projects (new-applications) as they can take advantage of future opportunities; because with the globalization of markets huge a problems and many task to solve these also emerge. Importantly, these resources and / or ideas become innovations when they are used to meet a specific need and valued by the labor market.

Ability to identify new opportunities

In this competition, 50% of GR have revealed that they have a high level and the same percentage said that this capacity is required at high level in they have companies where they work. Meanwhile 50% of EM say this capability is required heavily in their businesses and 10% of these mention that GR features with high capacity to detect new opportunities, ie entrepreneurs perceive only some of their personal graduate degrees with high level in competence and therefore this means that the missing of this review, mentions that their hired and graduates of any profession-career staff do not have this competence in high level as required by them (Table 3).

Ability to find new ideas and solutions

In this capacity we can observe that 40% of GR indicated that they use high level and 50% say that this capacity is required at high level in the companies where they work, so the opinion of GR with respect to this competence is to the extent that the labor market high level demands this capability, GR perceived to have this competence in a low level than required by the companies where they work. With regards to the opinion of EM, 50% say that this competence is required at high level and 40% indicated that professionals working in their organizations have this capability at a low level; (Table 3).

Table 3. Review of graduates (GR) and employers (EM) on high level (much or largely) the skills required in the workplace and their weighted average (WA SRW), the skills of the graduate profile and weighted average (WA SGR) and total weighted Average (WA TOTAL) in the Innovation category.

Competition	Level required at work			Level having the graduate profile			WA TOTAL
	Percent who think that the required level at work is high		WA SRW	Percent who think that the graduate level is high profile		WA SGR	
	GR	EM		GR	EM		
Ability to identify new opportunities.	50	50	50	50	10	22	36
Ability to find new ideas and solutions.	50	50	50	40	40	40	45
Average	50	50	50	45	25	31	41

Recall that the changes and innovations in modern society requires higher educational responses to the new needs emerging in the professional context, hoping to get the GR increased efficiency and productivity in the labor market.

Communication

Communication occurs when two or more people interact, in which interaction express feelings, ideas, questions and so on. It is a daily activity for all people. Communication in personal relationships is important, as well as in organizations. In the workplace, a person interacts with peers, superiors, clients, etc. Similarly, he/she receives data, gives or receives instructions and coordinates work teams. All these tasks and relationships are part of good communication in organizations leading to better results within them.

Ability to communicate in a second language

In a globalized world it is important to manage a second language. However in the case of Engineering Works and Services, that power did not obtain a high level assessment, but the views were evaluated as low at an intermediate level. So a red alert according to this review arised because the GR are perceived whit less capability in this competence to compete in the globalized workplaces. Meanwhile, whit respect to the opinion of the EM the same situation happens, they do not have a high level competence instead the reviews were assessed as low intermediate (Table 4) level e.

Ability to draft documents

10% of GR have mentioned that they have a high relative whit respect to this competence; and 50% said that this required level of competence in the company where they work is high. That is, GR perceive themselves whit less competence to write, than what they believe businesses require. Moreover, 20% of EM felt that their organizations require professionals with a high level of competence and only 10% of EM mentioned that the GR that work in their organizations have a high level in writing documents (Table 4).

Ability to be understood

In this competition 40% of GR revealed that they have a high level competence, while 50% thought that they lack this in the institutions where they work. 50% of the EM believe that their institution requires professionals with a high level competence and only 40% of them mentioned that professionals working in their companies have this ability at a high level (Table 4).

Ability to present publicly products, ideas or reports

As for the opinion of the GR there was not a high level of competence found and whit respect to companies where they work, only 50% said that this ability is required at a high level. With regard to the opinion of the EM, in the same way they feel that professionals do not have this capability at a high level, but 50% indicated that they require this competence at work in a high level (Table 4).

Table 4. Opinion of graduates (RG) and employers (EM) on high level (much or largely) the skills required in the workplace and their weighted average (WA SRW), the skills of the graduate profile and weighted average (WA SGR) and total weighted Average (WA TOTAL) in the category of Communication.

Competition	Level required at work			Level having the graduate profile			WA TOTAL
	Percent who think that the required level at work is high		WA SRW	Percent who think that the graduate level is high profile		WA SGR	
	GR	EM		GR	EM		
Ability to communicate in a second language.	0	0	0	0	0	0	0
Ability to draft documents.	50	20	29	10	10	10	20
Ability to be understood.	50	50	50	40	40	40	45
Ability to present publicly products, ideas or reports.	50	50	50	0	0	0	25
Average	38	30	32	13	13	13	22

It is important to learn to understand each other and to function appropriately in social and organizational situations; since this act to establish contact with another individual allows us to transmit information that ultimately granted us improvement in personal relationships.

Coordination

This is a common responsibility for people with management level, as their goal is to direct staff so that all employees work together harmoniously to achieve business goals in the most efficient manner possible.

Ability to work under pressure

The opinion of the GR and EM regarding this competence shows the following; 50% of the GR believe they have a high level of competence and with respect to their companies 50% mentioned that this capacity is required at a high level. Similarly, 50% of EM believe that the level required in the work of this competition is high and 50% of EM say that professionals working in their companies have this capability in great measurement (Table 5).

Ability to coordinate activities

In this competition the GR perceived the same capacity as required by the company where they work; since 50% of these indicated that the level they have with respect to this competence is so high, it was mentioned that this competence is largely required in their organizations where they work. With regard to the opinion of EM, 50% of them said that this competence is required at high level and in the same percentage have professionals who manifest this power greatly.

Ability to use time effectively

In this competence on how the GR is perceived in terms of their level and what the company where they work asks level is greater than the perception of EM. That is 56% of GR are considered high level in the ability to use time effectively and 44% say that their companies require this high level competence. With regard to the opinion of MS, 50% indicated they require this high level of competence in their organizations, but there was no classification as to professionals with this high level competence (Table 5).

Table 5. Review of graduates (GR) and employers (EM) on high level (much or largely) the skills required in the workplace and their weighted average (WA SRW), the skills of the graduate profile and weighted average (WA SGR) and total weighted Average (WA TOTAL) in the category of Coordination.

Competition	Level required at work			Level having the graduate profile			WA TOTAL
	Percent who think that the required level at work is high		WA SRW	Percent who think that the graduate level is high profile		WA SGR	
	GR	EM		GR	EM		
Ability to work under pressure	50	50	50	50	50	50	50
Ability to coordinate activities.	50	50	50	50	50	50	50
Ability to use time effectively.	44	50	48	56	0	17	33
Average	48	50	49	52	33	39	44

Coordination within an organization will always have inter-personal nature, since the concept is linked to the optimization of the allocation of resources and the achievement of the objectives of the company.

Negotiator

A good negotiator must have the ability to understand and carry the other party in the most convenient way for both, managing interpersonal relationships in the right way and more conducive. Definitely preparing well before a negotiation is a must, as in be sure of what you are going to negotiate and never lose focus.

Ability to negotiate effectively

As for the GR they do not have this high level of competence with respect to the organization where they work, 50% mentioned that they are required a high level in this capacity. That is, the GR are still contemplating less capacity that businesses require. On the other hand, the views of EM differs slightly; since 50% indicated that this competence is largely required in their companies and in the same way as the GR, there is no classification whit respect to high EM graduates who have this ability (Table 6).

Ability to work in team

This competence has equality from GR in their profile and in terms of what is required of him. 50% of GR indicated that they count in great measurement with the ability to work in teams and the same percentage.

Mentioned that the company where they operate professionally, require this high level competence. Similarly, in the perception of EM it is observed that this depends largely on the ability to work in teams projecting a 50% likewise 50% say they have working in their company professionals with this ability at a high level (Table 6).

Willingness to question their own or others ideas

In this competence, the view of EM state there is no consistency as to what is required in their company and in terms of the profile that has the GR employee in their organization. 50% say they require this capability in their company and 30% mentioned, they have professionals with this capability in great measurement. Regarding the GR, they still perceive less capacity than required by enterprises.

Table 6. Opinion graduates (GR) and employers (EM) on high (A lot or a great deal) of the competencies required in the workplace and their weighted average (WA SRW), the skills of the graduate profile and weighted average (WA SGR) and total weighted Average (WA TOTAL) in the category of the Negotiator.

Competition	Level required at work			Level having the graduate profile			WA TOTAL
	Percent who think that the required level at work is high		WA SRW	Percent who think that the graduate level is high profile		WA SGR	
	GR	EM		GR	EM		
Ability to negotiate effectively.	50	50	50	0	0	0	25
Ability to work in team.	50	50	50	50	50	50	50
Willingness to question their own or others ideas.	50	50	50	30	30	30	40
Average	50	50	50	27	27	27	38

Finally, it is important to note that while there are people with an innate gift for negotiation, these skills can also be learned by attending training courses and practice.

Leadership

Leadership is a process of interaction between people in which one leads, through personal influence and power, energies, potentials and activities of a group to achieve a common goal to transform both the company and the people who work in it. The leader does not impose its ideas, but convenes and engages others to offer better decisions, obtaining

with it a wide range of alternatives, however, in risky situations, he is the decision maker.

Ability to mobilize the capacities of others

In this competence 30% of GR revealed to have less of this competence than what companies require; and 50% of EM believe that their institution requires professionals with a high level of this competence and only 30% of them mentioned that professionals working in their companies have this ability (Table 7).

Ability to assert his authority

As for this competence, EM insists his company requires a high level of 50% and the same percentage said that professionals that is responsible have this capability at a high level. As a matter for the opinion of GR in the case of this competence, both in the opinion of GR as in the level required, it is manifested by the same percentage to meet at a high level. Obtaining a weighted average in this competence of 50% (Table 7).

Table 7. Opinion graduates (GR) and employers (EM) on high (A lot or a great deal) of the competencies required in the workplace and their weighted average (WA SRW), the skills of the graduate profile and weighted average (PP PEG) and total weighted Average (WA TOTAL) in the category of Leadership.

Competition	Level required at work			Level having the graduate profile			WA TOTAL
	Percent who think that the required level at work is high		WA SRW	Percent who think that the graduate level is high profile		WA SGR	
	GR	EM		GR	EM		
Ability to mobilize the capacities of others.	50	50	50	30	30	30	40
Ability to assert his authority.	50	50	50	50	50	50	50
Average	50	50	50	40	40	40	45

The competent leader is one who has the ability to effectively coordinate and organize their work teams, providing an adequate working environment, guiding and directing others to motivate them and urge them on to reach goals and objectives. Likewise he transcends and gives the example through compliance, ethics and commitment.

Specific skills

Following is an analysis of specific competences by the Engineering Works and Services educational program. The weighted average was 37%,

most of which the graduate profile in both the GR and EM review was less than that required in the workplace. The competence with the highest score was the competence for the cooperative and collaborative work with 50% overall weighted. As the largest contributor to the low result was the troubleshooting of the field of competence (Table 8).

Table 8 Opinion graduates (GR) and employers (EM) on high level (much or largely) the skills required in the workplace and their weighted average (WA SRW), the skills of the graduate profile and weighted average (WA SER) and total weighted Average (WA TOTAL) on specific skills.

Competition	Level required at work			Level having the graduate profile			WA TOTAL
	Percent who think that the required level at work is high		WA SRW	Percent who think that the graduate level is high profile		WA SGR	
	GR	EM		GR	EM		
For cooperative and collaborative work	50	50	50	50	50	50	50
Assess the technical, social and economic feasibility of the project based on ethical criteria of sustainability	40	50	47	30	30	30	39
Troubleshooting purview Effective design of projects in the area of professional competence	40	50	47	0	0	0	24
	50	50	50	30	30	30	40
Use of TIC'S	50	50	50	30	30	30	40
Provide leadership with responsibility for their professional area	50	50	50	20	20	20	35
Managing resources in organizations	50	50	50	50	20	29	40
Average	43	50	48	27	27	27	37

The state of competence and suggestions in a curriculum review

Understanding that competencies are the skills and abilities acquired in the academic development of GR and that will allow you to participate in the professional field meeting the demands or requirements of a particular

situation; is important to note the different views that show both the GR and EM about what they offer and demand in the labor market.

Knowledge, analytical thinking, reasoning and tools.

In this category it can be seen how two skills: ability to master knowledge of your area, and ability to acquire new knowledge quickly, require more attention in a period not exceeding nine months. The remaining four races require more attention in a period not exceeding six months. What the TIMAX suggests to get an overall average in this category of 42% is a curricular reform that is implemented considering the antecedent non grata and urgent attention over a period of 6-9 months. (Table 9).

Table 9: Suggestions for a draft revision, modification or curricular and maximum time in years (TIMAX) to accomplish it in the category of knowledge, analytical thinking, reasoning and tools.

Competition	WA TOTAL	Advice	TIMAX
Logical mathematical reasoning ability.	17	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years
Analytical thinking ability.	46	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years
Ability to master knowledge of your area	50	Urgent attention. Poor. Contents very strong changes: Restructuring the curriculum and competencies.	0.75 years
Ability to master knowledge of other areas.	45	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years
Ability to rapidly acquire new knowledge.	57	Urgent attention. Poor. Contents very strong changes: Restructuring the curriculum and competencies.	0.75 years
Ability to use tools.	40	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years

Innovation

This category consists of two skills that the labor market requires future professionals, as they will face a variety of demands in which they have to give solutions. The suggestion offered by TIMAX with the results of the total average of 41% found in this category, that you should make a curriculum change in a period not exceeding six months (Table 10).

Table 10: Suggestions for a draft revision, modification or curricular and maximum time in years (TIMAX) to realize it in the category of Innovation.

Competition	WA TOTAL	Advice	TIMAX
Ability to identify new opportunities.	36	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years
Ability to find new ideas and solutions.	45	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years

Communication

This category is composed of four competences that when emphasized each of them we find a strong alert in the ability to communicate in a second language by obtaining a total weighted average of 0% therefore TIMAX qualifies this competition as non grata and suggests starting a curriculum change in a time not exceeding six months. The same applies to other tasks, which also suggests strong changes in a time not exceeding six months. The average in this category is 22% indicating that reaction response to the improved skills that constitute this category must be in a short time (Table 11).

Table 11 Suggestions for a draft revision, modification or curricular and maximum time in years (TIMAX) to realize it in the category of Communication.

Competition	WA TOTAL	Advice	TIMAX
Ability to communicate in a second language.	0	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years
Ability to draft documents.	20	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years
Ability to be understood.	45	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years
Ability to present publicly products, ideas or reports.	25	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years

Coordination

In this category usually TIMAX suggests a history with urgent attentions in two unpleasant contexts, demanding curricular and skills needed in a time of 6-9 months. (Table 12).

Table 12 Suggestions for a draft revision, modification or curricular and maximum time in years (TIMAX) to realize it in the category of Coordination.

Competition	WA TOTAL	Advice	TIMAX
Ability to work under pressure	50	Urgent attention. Poor. Contents very strong changes: Restructuring the curriculum and competencies.	0.75 years
Ability to coordinate activities.	50	Urgent attention. Poor. Contents very strong changes: Restructuring the curriculum and competencies.	0.75 years
Ability to use time effectively.	33	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years

Negotiator

The skills found in this category are very important in GR due to acquiring these skills they will be better prepared to compete in today's global workplace; because people who have demonstrated this skill will be able to establish relationships and create an atmosphere of trust obtaining better results in the professional field. By getting an overall average of 38% in this category TIMAX suggests that changes should be carried out in a time of 6-9 months. (Table 13).

Table 13: Suggestions for a draft revision, modification or curricular and maximum time in years (TIMAX) to realize it in the category of The Negotiator.

Competition	WA TOTAL	Advice	TIMAX
Ability to negotiate effectively.	25	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years
Ability to work in team.	50	Urgent attention. Poor. Contents very strong changes: Restructuring the curriculum and competencies.	0.75 years
Willingness to question their own or others ideas.	40	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years

Leadership

This category includes two competences which are the ability to mobilize the capacities of others that received a total weighted average of 40%, and the ability to assert their authority with a 50%, according to

TIMAX there should have more attention and begin a transformation curricular considering the antecedent "urgent Care" and "Non pleasing" in a maximum period of 6-9 months. (Table 14).

Table 14 Suggestions for a draft revision, modification or curricular and maximum time in years (TIMAX) to realize it in the category of Leadership.

Competition	WA TOTAL	Advice	TIMAX
Ability to mobilize the capacities of others.	40	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years
Ability to assert his authority.	50	Urgent attention. Poor. Contents very strong changes: Restructuring the curriculum and competencies.	0.75 years

Specific skills

Table 15 presents the results of the specific competences studied, a total weighted average of 37% was obtained, indicating that all competencies, and according to TIMAX, should have more attention and should initiate curriculum changes considering the antecedent "urgent Care" and "Non pleasure" of this competence in a period of 6-9 months.

Table 15 Suggestions for a draft revision, modification or curricular and maximum time in years (TIMAX) to realize it on specific skills.

Competition	WA TOTAL	Advice	TIMAX
For cooperative and collaborative work	50	Urgent attention. Poor. Contents very strong changes: Restructuring the curriculum and competencies.	0.75 years
Assess the technical, social and economic feasibility of the project based on ethical criteria of sustainability	39	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years
Troubleshooting purview	24	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years
Effective design of projects in the area of professional competence	40	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years
Use of TIC'S	40	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years
Provide leadership with responsibility for their professional area	35	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years
Managing resources in organizations	40	Very poor. Don't accept new revenue. Start a curricular transformation considering the "non grata" antecedent.	0.5 years

Conclusions

The study of graduates and employers is very important, as field research allows us to find out the current situation and the professional performance of its graduates, their personal needs and requirements of professionals in the workplace; well as evaluating the curricular relevance of educational programs and possible adjustments. This information is extremely useful in guiding the training of new professionals and designing academic programs that strengthen and promote continuous improvement strategies in academia, permitting with this to understand and meet the labor demand. Therefore the follow-up study of graduates and employers becomes a key strategy for self-knowledge and improvement of HEI.

Both the competency analysis model and TIMAX model are endless successive approximation processes seeking quality and improvement in academic, only that comparing the two models you find that the competency analysis covers the generic skills with a 35% of jurisdiction in red, interpreting that all these require immediate review. While TIMAX counting with a more difficult grade when calculating the weighted average of the opinions of the GRW and flush immediately marks the priority that must be addressed by the competition degree of difficulty; i.e., the first model marks the same equivalence of care (red) to the powers which are determined by TIMAX that allows different attention span of 6 months. The same applies to the specific, 71% scored red, resulting in immediate need of revision; therefore TIMAX points out his attention on a period not exceeding six months.

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PERCEPTIONS OF ONLINE VERSUS FACE-TO-FACE LEARNING OF EDUCATIONAL LEADERSHIP GRADUATE STUDENTS

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Abstract

A descriptive study was conducted using a researcher-created survey of students (N=10) enrolled in online M.Ed. courses in Educational Leadership during the fall of 2012. The purpose of this study was to determine student perceptions of learning in an online setting versus a traditional setting. Key findings of the study indicate that because of ease of use, convenience, and flexibility online courses do not detract from learning vis-à-vis courses delivered under a traditional format. For program development, future researchers could continue our exploration of ease of use, convenience, and flexibility in educational leadership courses.

Keywords: Traditional face to face instruction, online learning, leadership, educational leadership

Introduction

Perceptions of Online Versus Face-To-Face Learning of Educational Leadership Graduate Students

In 2012, more than 6.7 million students in the United States were enrolled in at least one online course (Sloan, 2013). Yet, studies continue to demonstrate that university professors question whether or not online learning environments expose students to complex learning tasks. They ponder, also, whether such students are intrinsically motivated in online environments and if adequate student interactions take place and represent true performance-based learning experiences (Kester, Kirschner, & Cobalan, 2006).

Researchers continue to wonder if today's online environments provide enough carefully guided interactive student postings, threaded

discussions and other selected online interactive modalities (Woo & Reeves, 2007). Ward, Peters, and Shelley (2010) point out that their findings confirm those of others (e.g., Woo & Reeves, 2007) who contend that professors must continue to query whether online environments positively impact university student learning. In fact, Ward et al. (2010) found the success of the online learning environment is mixed.

Chen and Shaw (2006) examined meaningfulness of the interactive processes in face-to-face, hybrid and online environments. Over time, they reported no differences between the instruction given face-to-face versus online. Ritter, et al. (2010) examined the perceptions of graduate students enrolled in educational leadership programs that were either face-to-face, online, or hybrid. Using an emailed survey to measure participant's sense of community, connectedness, and learning, students were asked to respond to twenty items using a five point Likert scale, ranging from *strongly disagree* to *strongly agree* (Ritter et al. 2010). They used the Classroom Community Scales by Rovai (2002) to collect data from 126 participants. Findings indicated that university graduate students noted having developed a greater sense of community in face-to-face environments and hybrid environments over strictly online situations. However, there was no statistical difference in the perceptions of learning in either the face-to-face, online, or hybrid courses.

Sherman, Crum and Beaty (2010) explored many aspects of student's perceptions of their online course in educational leadership. By sending out a survey link to students in the educational leadership department at two universities, students' experiences with the online courses and perceptions of their effectiveness were rated using a five-point Likert scale, also ranging from *strongly disagree* to *strongly agree*. The responding students reflected positively on their experience in their online courses and indicated plans to take future online courses. In addition, the majority of students felt that their online courses allowed them to make connections between theory and practice, demonstrate their knowledge and practice, and prepare them to serve as leaders. However, they also indicated that they would prefer hybrid courses that combined online and face-to-face interactions versus just online courses or face-to-face classes. Overall, the research of Sherman, Crum, and Beaty (2010) noted that after more than a decade of research examining online versus face-to-face-versus hybrid learning environments (particularly in regards to successful learning platforms for graduate students in educational leadership), many questions are still unanswered. This study examines the perceptions of students on the comparative effectiveness of online and face-to-face learning environments in meeting specified learning goals in a university setting and will take steps toward answering one of those unanswered questions.

Method

Participants in this study (N=10) were students in an online Master's degree program in Educational Leadership. The purpose of the study was to determine student perceptions of the effectiveness of online courses versus traditional courses.

The methodological approach for this study was survey research of a convenience sample of students (N=10) following Mertler and Charles' (2011) approach to describing the characteristics of a sample at a given point in time (p.233). This approach was appropriate because the researchers were interested in only the perceptions of the respondents during one semester of study toward either online courses or f2f courses.

The study was designed to answer the following three main research questions:

1. Which mode of course delivery, online or traditional, do students perceive better helps them to meet their specified learning outcome goals?
2. Which instructional method, online or traditional, do students perceive presents more challenges in meeting their specified learning outcome goals?
3. How can the online learning environment be improved to better support students in meeting their specified learning outcome goals?

The Survey

The survey instrument was comprised of 13 open-ended items. The questionnaire was developed by the faculty teaching the online courses, and items were reviewed by two research professors. An advised consent agreement was provided in the questionnaire explaining the voluntary nature of the study, and each respondent was provided with the option to withdraw from the survey at any time. .

The questions in the survey fall within four general topic headings: reasons for enrolling in an online class, enabling conditions between online and f2f classes, platform challenges issues and learning outcomes perceptions. Conclusions from the question responses are reported below.

Data from the surveys were gathered from early November, 2012 through early December, 2012. Questionnaires were sent to 24 students with 10 responding, for a 42% response rate. Follow-up questions soliciting the reasons for the lack of responses from the remaining students were sent to all the 14 students who did not respond. Again, none of the 14 students responded to the follow-up questions. This research study is not a population-based study; therefore, the results cannot be deemed as generalizable to a population of graduate students taking online courses. Any

interpretations and conclusions from this study are only applicable to the 10 students who responded. The researchers' conclusions are based upon the assumption that all respondents' answers were truthful.

Method of Analysis

The responses given for each question in the survey were assessed by the researchers and grouped by themes and issues emerging from the respondents' answers based on the descriptors used in the narrative responses. Most of the questions were answered by all 10 of the respondents; although several questions were answered by only nine of the respondents. For follow-up questions to which students had indicated affirmative responses in previous parent questions 'Not Applicable' responses were grouped as agreement responses.

Results

The tables below show a summary of the dimensional analysis of the responses; grouped by emerging themes and issues.

Table 1 indicates the percentage of responses aligned to the corresponding response themes indicated.

Table 1: Reasons for Taking Online Classes

Survey Domain	Response Themes	Percentage
Reasons	Convenience	70%
	More reflection on learning	10%
	Required class and availability	10%
	Preferred Professor	10%
Degree to Which Reasons Were Satisfied	All Reasons Were Satisfied	100%

A majority (70%) of respondents indicated 'Convenience' as the reason for taking online class. 'More Reflection on Learning'; 'Required Class and Availability'; and 'Preferred Professor' were each 10%.

The responses on enabling conditions for online course are summarized in Table 2.

Table 2: On-line Course Enabling Conditions

Survey Domain	Response Themes	Percentage
Enabling Conditions	Convenience	30%
	Flexibility	30%
	Engaging Discussion Session	30%
	Self-directedness and Time Management	10%

'Convenience', 'Flexibility', and 'Engaging Discussion Sessions' were the reasons cited by 90% of respondents. Ten percent cited 'Self-directedness and Time Management' as the enabling condition for taking an online course.

Table 3 depicts the perceived enablers in f2f classes when compared with online classes.

Table 3: Perceived Enablers in Face-to-Face Classes Compared to Online Classes

Survey Domain	Response Themes	Percentage
Perceived Face-to-face Enabling Conditions	No perceived difference	40%
	More opportunity for 'Teachable Moments'	20%
	More opportunity for face-to-face interactive participation	30%
	Required attendance and presence	10%

Forty percent of respondents perceived no difference between face-to-face and online methods of delivery. Thirty percent felt that face-to-face provides more opportunity for direct physical interaction between learners, while 20% responded that face-to-face provides more opportunity for 'teachable moments'. A summary of the challenges faced by learners in the online learning environment is shown in Table 4.

Table 4: Challenges in the Online Learning Environment

Survey Domain	Response Themes	Percentage
Challenges in Online Environment	None	70%
	Navigational Challenges	30%
Challenges overcame	All challenges were overcame	100%

Seventy percent of the respondents indicated that they did not face any challenges. Only 30% indicated they faced Navigational Challenges. The relative advantage of online vs. f2f in enhancing leadership knowledge and skills are summarized in Table 5.

Table 5: Online Delivery vs. Face-to-Face in Enhancing Leadership Knowledge and Skills

Survey Domain	Response Themes	Percentage
Knowledge and Skills	More Self-directedness and time management skills	50%
	More focused on closer analysis of content topics	20%
	No difference	30%

On questions relating to the relative advantage of online delivery vs. f2f in enhancing leadership knowledge and skills, 50% of respondents indicated that online delivery is more advantageous in promoting self-directedness and time management. Twenty percent indicated that online delivery improved their abilities to be more focused and with closer analysis of content topics compared to f2f. Thirty percent indicated that there is no difference between the two delivery platforms in terms of relative advantage in leadership knowledge and skills acquisition.

Table 6 is a summary of the responses to the questions relating to what would have been different had the mode of delivery been a face-to-face instead of online.

Table 6: What Would Have Been Different if Delivery Was Face-to-Face

Survey Domain	Response Themes	Percentage
What Would Have Been Different	Not as Self-directed	30%
	More interaction with professor	20%
	Less time dedicated to learning activities	10%
	No difference	40%

On the question regarding what would have been different if the mode of delivery was f2f instead of online, 30% responded that they would not have been more self-directed in a face-to-face setting compared to online. Twenty percent indicated that online provided more opportunity for learning while 40% responded that there would have been no difference.

Discussions and Conclusions

The following patterns have emerged from the results of this study.

- Majority of the respondents (70%) take online courses because of convenience. Convenience includes considerations such as timemanagement, flexibility, and fitness within other personal obligations.
- Compared to face-to-face, three factors were cited as relative advantages for online learning. The enablers are convenience, flexibility, and engagement in discussion sessions. All of the students in the graduate program were adults. This finding is in line with how adults learn. Adult learning posits that adults learn at a self-directed pace and in environments where they can freely exchange knowledge and learning experiences (Knowles, 1980). The online environment seemed to provide these opportunities.
- Compared to online, it is worthy of note that 20 % of respondents indicated that face-to-face platforms provide opportunities for occasional ‘Teachable Moments.’ Teachable Moments occur when a teaching and learning process spontaneously brings out assumed misconceptions and/or begins to extend the learning and knowledge process beyond pre-determined boundaries. Although teachable moments can also occur through discussion sessions in online environments, the online instructor has to be more intuitive and to elicit these moments in online discussion sessions.
- Contrary to common perception, 70% of respondents stated that they did not face any insurmountable challenges using the online learning platform. This is an important finding that can help to puncture the notion that online learning environments are fraught with challenges,

especially navigational challenges. These issues may have been mitigated because the quality of the course layout and student-focused considerations which went into planning the online courses during the course development process. All courses in the program were assessed and approved through a third party quality review.

- Self-directedness, time management, and closer analysis of content were the knowledge and skills takeaways from online delivery by a majority of the respondents. This again ties into the way adults learn and process information.
- Also, worthy of note is that only 20% of respondents felt that face-to-face would provide more interaction with the professor than would an online delivery mode and that face-to-face is less self-directed when compared to online delivery platforms (30%). Forty percent felt that nothing would have been different in either delivery platform. This is an indication that if conditions are equal, graduate students in educational leadership may prefer an online course delivery mode to face-to-face.

In conclusion, the considerations that make online classes preferable to face-to-face classes for graduate students in Educational Leadership include, but are not limited to: ease of use, convenience, flexibility, self-directedness, time-management, and engaging discussion sessions. The considerations that make face-to-face preferable include minimal self-directedness and opportunity for more direct and physical interaction with the professor.

Limitations and Expectations for Follow-up Study

This study was focused on online courses in a specific educational leadership preparation program. Although the results of this study may inform others delivering, designing, or managing online programs, they are not necessarily generalizable to other contexts. There is a need to expand this research to other courses in other programs to improve the generalizability of the findings and the conclusions.

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THE ATTITUDES OF BIOLOGY TEACHERS AND STUDENTS TOWARD THE CONSERVATION OF NATURAL RESOURCES IN EKITI STATE, NIGERIA

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Abstract

The study investigated the attitudes of Biology teachers and students toward conservation of natural resources in Ekiti State. The participants for this study were 50 Biology teachers and 100 Biology students. The selection was based on purposive sampling technique which involved 10 secondary schools. Data collected from teachers' and students on conservation of Natural Resources Questionnaire were analyzed using frequency counts, percentage, mean, standard deviation and t-test.

The findings indicated that both teachers and students had a good knowledge of natural resources conservation concepts. The attitudes of both teachers and students point more to positive than negative. On a general note, the teachers had higher mean scores than the students indicating that teachers tended to have more favourable attitudes than the students toward natural resources conservation. It is recommended therefore, that the Federal and State environmental protection agencies should continue to make schools their principal focus in their bids to create, promote and sustain public awareness of the importance of natural resources conservation to mankind.

Keywords: Attitude, Conservation, Natural resource

Introduction

Earth is the only place in the universe known to sustain life through its life support system and essential ecological process. The maintenance of such processes and system is a necessity for all societies, regardless of their stage of development. In the beginning man was endowed with natural

environmental resources which include wildlife, clean water, air, soil, forest and everything else which was placed in the care of man by God. Our natural environments as created by God are orderly, stable, pure and supportive of flora and fauna in an interdependent manner (Egu, 1993).

Tropical forest alone form the most diverse and complex ecosystem on earth. A virtual power house of evolution, a natural supermarket, a rich reservoir of biodiversity, containing 40% of all living species. The forest provides us with food, water, medicine, shelter and new types of energy sources. They form an essential part of the complex web of life on and around our planet. These natures given resource in our natural environments are so dispensable to the daily lives and needs of people on earth that one could hardly think of survival without them. There is empirically based evidence to show that human beings are destroying the natural resources at a rate detrimental to their continues survival on the planet. The situation is further aggravated in recent time by growth of human population and its various needs as wells as scientific and technological advancement degradation.

Our forests are being ravaged every year by agricultural expansion, dispossession of large expanse of land for urbanization, industrialization, indiscriminate bush burning, uncontrolled logging and over exploitation of fuel wood. Nest (1991) reported that Nigeria's land, water, atmosphere, vegetation, wildlife, population and culture have been and are still being degraded. The Nigeria natural resource is ill and beset with problems, visible signs of environmental problems such as flooding, soil erosion, gully erosion, coastal and marine erosion, deforestation, surface and ground water pollution, oil spillage, gas flaring, industrial pollution, loss of biodiversity, water hyacinths invasion, indiscriminate waste disposal etc. These problems can be attributed to various factors; prominent among such factors are low level of awareness about the consequences of our actions on the natural resources, our poverty level, consumption pattern and the adoption of non-sustainable mode of development (Fafunwa, 1991).

Conservation of natural resources is the most important challenge of the present century. Nothing affects the quality of our lives quite like the welfare and state of the nature and no future can be quite so bleak as one in which the living resources such as plants and wildlife, which are essential for human survival and development are not attended to. There must be a change of attitude and reversal of current trend by government, organizations and individuals to revive our natural resources from depletion.

Research Questions

The following research questions were raised to guide and direct the study.

- i. What is the level of teachers' knowledge of natural resources conservation?
- ii. What is the attitude of teachers towards their natural resources conservation?
- iii. What is the level of students' knowledge of natural resources conservation?
- iv. What is the attitude of students towards their natural resources conservation?
- v. Is there any significance between the attitudes of teachers and students toward their natural resources conservation?

Methodology

Research Design

The research design used in this study is descriptive research method of survey type.

The population consisted of teachers and students in the secondary schools in Ekiti State, Nigeria.

Sample and Sampling Techniques

The sample for this study was 100 students and 50 teachers drawn from 10 secondary schools in Ekiti State. Ten senior secondary schools II (SSS II) students and five teachers were selected from each school to participate in the study. The selection was based on purposive sampling techniques.

Research Instrument

Two sets of questionnaire were adopted for the study – the first set was designed for teachers while the second set was designed for the students. The questionnaire were subjected to face and construct validation. The test-retest of reliability of the teachers' questionnaire yielded a correlation coefficient of 0.58 while that of the students' questionnaire yielded a correlation coefficient of 0.62 these are found significant at 0.05 levels.

The questionnaires were personally administered by the researcher in all the schools.

Data Analysis

Data collected were analysed by using descriptive and inferential statistics. Frequency count and percentage were used for research questions 1 and 3. Mean and standard deviation were used for research questions 2 and 4 while t-test was used for question 5.

Results and Discussion

The results are presented in appropriate tables in sequence according to the research questions.

Research Question One

What is the level of teachers' knowledge of natural resources conservation?

Table 1: Teachers' knowledge of Natural Resources Conservation.

No of items	Items Description	Right option	%
1.	Forest as reservoir of biodiversity.	47	94
2.	Importance of plants and animals.	6	12
3.	Environmental awareness.	33	66
4.	Shifting cultivation	47	94
5.	Environmental education through conservation clubs.	27	54
6.	Habitat destruction	40	80
7.	Depletion of forest resources.	20	40
8.	Refuse disposal.	43	86
9.	Environmental education sustainable development.	37	74
10.	Timber exploitation.	23	46
11.	Desertification.	30	60
12.	Indiscriminate bush burning.	17	34

Table 1, above revealed that a greater proportion of the teachers showed more favourable environmental knowledge as represented in their response to eight out of twelve items used to measure natural resources conservation. These items are 1, 3, 4, 5,6,8,9 and 11. A relatively low proportion of the teachers made responses to four out of twelve items which are 2, 7, 10 and 12. The result therefore indicated that the teachers used in the study have a good knowledge of natural resources conservation.

Research Question Two

What is the attitude of teachers towards their natural resources conservation?

Table 2: Mean and Standard Deviation of Teachers' attitude towards natural resources conservation.

No of items	Items Description	Mean	SD
1.	Keeping of flowers.	3.67	0.59
2.	Pet keeping.	3.20	0.98
3.	Tree planting programme	2.73	1.18
4.	Environmental protection	3.60	0.88
5.	Clean environment	3.73	0.77
6.	Management of solid waste	3.27	0.77
7.	Effective dissemination of environmental information	3.73	0.57
8.	Over exploitation	3.8	0.75
9.	Soil erosion	3.8	0.54
10.	Insects as pollinations	3.53	1.02
11.	Deforestation	3.07	0.99
12.	Conservation of natural resources	2.47	0.80
	Over all	3.38	0.85

Table 2 above showed that the mean attitude of teachers towards natural resource conservation for the 12 items used in the study range from 2.47 to 3.80 with an over all attitude of 3.38.

The result indicated that the overall attitude of teachers to natural resources conservation tends to be positive than negative. Their mean scores on individual item also indicated that their attitude to each item constitutes the natural resources environmental scale is also positive. The teachers tend to have more favourable attitudes with respect to items 1, 2, 3, 5, 6, 7, 8, 9, 10 and 11 while they tend to exhibit the least favourable attitudes with items 4 and 12.

The table also showed that the standard deviation value ranges from 0.58-1.18. The low standard deviation – values also indicated that the individual scores of the teachers on each item tend to cluster around the mean. This further point to the fact that the teachers used in the study are more favourably disposed to natural resources conservation.

Research Question Three

What is the level of student's knowledge of natural resources conservation?

Table 3: Students knowledge of natural resources conservation.

No of items	Items Description	Mean	SD
1.	Forest as reservoir of biodiversity.	80	80
2.	Importance of plants and animals.	66	66
3.	Environmental awareness.	94	94
4.	Shifting cultivation.	52	52
5.	Environmental education through conservation clubs.	98	98
6.	Habitat destruction.	70	70
7.	Depletion of forest resource.	98	98
8.	Refuse disposal.	24	24
9.	Environmental education sustainable development.	62	62
10.	Timber exploitation.	46	46
11.	Desertification.	56	56
12.	Indiscriminate bush burning.	84	84

Table 3: showed that a greater percentage of students demonstrated a good knowledge of natural resources conservation with respect to ten items – 1, 2, 3, 4, 5, 6, 7, 9, 11 and 12 while a small percentage of the students exhibited poor knowledge of natural resources conservation with respect to two items (items 8 and 10). The result therefore showed that students have good knowledge of natural resources conservation.

Research Question Four

What is the attitude of students towards their natural resources conservation?

Table 4: Students attitudes toward natural resources conservation?

No of items	Items Description	Mean	SD
1.	Keeping of flowers.	3.42	0.90
2.	Pets keeping.	3.18	0.96
3.	Tree planting programme	2.72	1.06
4.	Environmental protection	3.30	0.85
5.	Clean environment	3.04	0.96
6.	Management of solid waste	2.68	0.17
7.	Effective dissemination of environmental information	2.94	0.95
8.	Over exploitation	3.04	1.21
9.	Soil erosion	3.34	0.92
10.	Insects as pollinations	2.80	0.94
11.	Deforestation	3.00	0.98
12.	Conservation of natural resources	2.96	1.20
	Over all	3.00	1.01

Table 4: showed that the mean of students attitude towards natural resources conservation for the items descriptions range from 2.46 to 3.42.

The overall mean score is 3.00. The students' attitude could therefore be regarded as positive since the overall mean attitude points more to positive than negative.

Research Question Five

Is there any significant difference between the attitude of teachers and students toward natural resources conservation?

Table 5: t-test summary of mean comparison between teachers and students in their attitudes toward natural resources conservation.

Item No.	Group	N	X	S.D	df	t cal	t tab
1.	Teachers	50	3.67	0.59	43	1.04	2.01
	Students	100	3.42	0.90			
2.	Teachers	50	3.20	0.98	43	0.06	2.01
	Students	100	3.18	0.96			
3.	Teachers	50	3.60	0.88	43	0.96	2.01
	Students	100	3.30	0.85			
4.	Teachers	50	2.73	1.18	43	0.03	2.01
	Students	100	2.72	1.06			
5.	Teachers	50	3.73	0.77	43	1.60	2.01
	Students	100	3.04	0.96			
6.	Teachers	50	3.27	1.12	43	1.69	2.01
	Students	100	2.68	1.17			
7.	Teachers	50	3.73	0.57	43	1.69	2.01
	Students	100	2.94	0.95			
8.	Teachers	50	3.80	0.75	43	2.42	2.01
	Students	100	3.40	1.21			
9.	Teachers	50	3.80	0.54	43	1.71	2.01
	Students	100	3.34	0.92			
10.	Teachers	50	3.53	1.02	43	2.48	2.01
	Students	100	2.80	0.94			
11.	Teachers	50	3.07	0.99	43	0.24	2.01
	Students	100	3.00	0.98			
12.	Teachers	50	3.47	0.80	43	0.04	2.01
	Students	100	2.46	1.20			
Overall	Teachers	50	3.38	0.85	43	1.37	2.01
	Students	100	3.00	1.01			

Table 5 presented t-test comparison of teachers and students attitude to natural resources conservation for each item and for the overall scales. The results showed that on the overall, there is statistically significant difference between students and teachers in their attitudes towards natural resources conservation at 0.05 probability test.

The result showed that statistical significant difference exist between the items with respect to four items (items 5, 7, 8 and 10) at 0.05 probability level. In both cases, teachers had higher mean scores than the students

indicating that teachers tended to have more favourable natural resource conservation

Discussion

Teachers have a high level knowledge of their environment due to the awareness created by the government. The government gave their orientation and stressed the points raised in the National Council of Education of Nigeria 2004 that Nigerian should adopt a national conservation education strategy to vigorously pursue and promote teachers knowledge of natural resources conservation.

Student's knowledge of environment conservation was low because they were not informed about the danger of not taking care of their natural resources. According to the National Policy on Education 1981 (revised 2004) which stated the important roles of primary and secondary education to other level is that environmental teaching and learning would be given adequate emphasis within the overall framework of the national conservation education strategy which is lacking behind in our curriculum today.

In this finding, teachers have the higher mean scores in their attitudes toward environmental conservation than students. This is in line with Gbadamosi and Adebakin, (1996) and Olagunju (1999) that teachers' attitudes toward environmental conservation must be favourable enough to carry students along. Teachers are role model to the students and they are easily mimicked, therefore they must be careful about what they teach and their attitudes in the class.

Conclusion and Recommendations

The findings is very encouraging and points to the fact that Biology teachers are putting their best to ensure that students maximize what they learn, despite government inadequate attention and commitment to teachers welfare.

Based on the findings, the following are recommended:-

- i. The federal and state ministries of education should regularly organize workshops, seminars and conferences on environmental awareness to update teachers' knowledge of natural resources issues.
- ii. Biology and environmental education teachers should be encouraged to embark on field trips and excursions to make the teaching and learning of environmental education concepts more practical and meaningful to students.
- iii. Environmental Protections Agencies should make schools their principal focus in their bid to create, promote and sustain public awareness of the importance of natural resources to mankind.

- iv. Environmental education like shifting cultivation, indiscriminate bush burning, over exploitation to forest resources and their grave consequences to mankind should be given adequate emphasis in the school curricula.

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SOCIAL REPRESENTATIONS OF DISABILITY BY TEACHERS AND PARENTS: ANALYSIS OF THE CONTENT OF THEIR NARRATIONS

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Abstract

AIM: understand the social representations of disability in the school context

METODOLOGY: purpose-built questionnaire with open answers, consisting of 10 questions, was used.

RESULTS:

- the operators interviewed undoubtedly framed the disabled student in a non-medicalization perspective, albeit with qualitative differences;
- all teachers and all parents have de facto provided representative modalities that are often collusive between themselves;
- only the families of students with disabilities can provide significant information on therapeutic opportunities or previous educational experiences that may give relevant results in terms of both behaviour and profit.

Keywords: Handicap; social representations of disability; students with disabilities

Introduction

“Social representations are the mechanisms through which a community builds a system of values, ideas and behaviours around a social fact, whereby this system puts that fact into an already existing context, making it real for everybody” (Palmonari et al, 2002, p. 39). They affect people’s behaviour, the social images that group or individual has of a particular social phenomenon. It is, therefore, interesting to investigate the social representations of disability and how they can be of hindrance or

support to the inclusion (Pattanaik, 2010). Among others, the emotional and sexual dimensions of the disabled are symptomatic of the representational stereotypes of the social context, which do not identify them as normal developmental milestones and indicators of adulthood (Bozuffi, 2006).

It is possible to make a few observations also in the school context. The objective evaluation of judgment on the capabilities, of request of performance, of comparison and rivalry with classmates, but above all the effort of adaptation and socialization skills, in a still little habitual context, does not generally favour the school adjustment of children with disabilities. This makes the task of the companions more difficult and especially harder for the teacher to help them integrate. These difficulties are partially exacerbated by the degree of awareness that the child has of his/her diversity and the role of the family, which is often not fully integrated in the process of inclusion of the child at school. Sometimes, because of this, the disabled show at school their discomfort with psycho-emotional blocks or psycho-motor restlessness or with an aggressive behaviour, especially when anxiety or fear are evident in themselves. Therefore, all these problems have a negative impact on the process of socialization and school inclusion of the disabled person (Savarese, 2009).

Literature also tells us that, in classes where disabled students are added, their typically developing classmates rarely – if ever – spontaneously interact with them and choose them as playing and study partners (Note, Soresi, 2007). It is interesting to understand, therefore, how reference adults read and represent all of the above dynamics. Federici and collaborators, through focus groups with main and support teachers, parents, health workers and educators, have conducted qualitative text and manual-based analyses, also with the help of the software called Atlas.ti. They have focused on representational models of disability identified in literature, such as social, medical and bio-psycho-social, concluding that the social model is widespread in all homogeneous groups by position, except for the group of support teachers. However, only the parents of the disabled and their teachers seem to strongly assert their commitment to a social model. In fact, the parents of non-disabled range between the social model and the medical model, while support teachers show an oscillation among all three models of disability. Finally, the bio-psycho-social model does not prevail in any group (Federici et al., 2006).

In literature, there are few studies using the methodology of qualitative analysis of text analysis, aimed at the investigation of the representations of the different actors involved in the processes of school inclusion, but we have found no study that compares teachers and parents' narrative content in such perspective.

Objective and hypothesis of research

The aim of this study was to examine the social representations of disability by teachers and parents of children with and without disabilities, to explore the ways in which the inclusion of the disabled student is realised within the school context, by highlighting also the relational dynamics that drive the different individuals (main teachers, support teachers, parents with and without disabled children), sharing the same context of inclusion.

The assumption is that main teachers, support teachers, parents with disabled children and those with typically developing children can sometimes produce representative modalities, which collide with each other and create the emergence of cultural repertoires that make living together more or less complex and diverse organizationally.

Methodology

The research was conducted on a sample (cluster sampling) from Salerno and its province, consisting of:

Group of teachers: 149 main teachers, 139 support teachers of various levels, equal number of males and females aged between 30 and 60.

Group of parents: 167, including 40 parents of disabled students, equal number of males and females aged between 30 and 50.

A purpose-built questionnaire with open answers, consisting of 10 questions, was used.

The questionnaire was given to participants at the schools to which they belong, after a meeting with the researchers, which presented the research and clarified any doubt about the interpretation of the questions. The completion occurred at the homes of the respondents.

The completion time was about two hours.

Regarding the procedures of data analysis, a textual analysis was conducted with the help of the T-LAB software (Lancia, 2005). We chose this testing procedure, often used in psychological research for some years, to minimize our intervention on respondents, also because the material to be analysed had long phases of collection and physiological delays, with the risk of having to keep under control many intervening variables. Being aware that this type of analysis presents the disadvantage that the researcher can be too active in the interpretation of the data, we have developed a research plan that would use a software, the aforementioned T-LAB, which also takes into account the semantics of the analysed corpus.

The variables examined were:

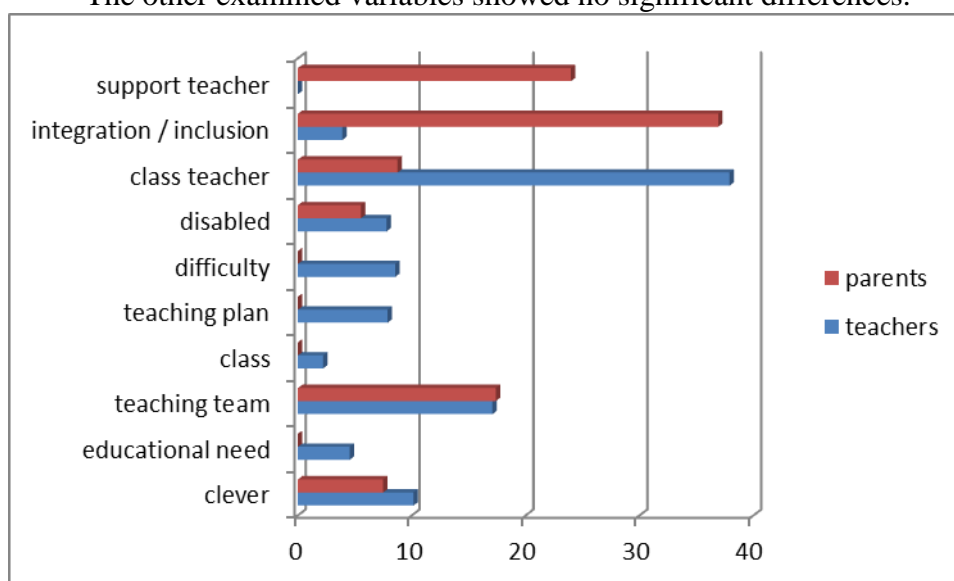
- Gender and age for the entire sample;
- For the group of teachers: if support or main teachers, length of service and level of the school they belong to;

- For the group of parents: whether with or without disabled children, occupation and level of education.

Discussion of main results

By means of a T test for independent samples, significant differences in the comparison between the responses of main teachers and support teachers were not shown, as well as between the responses of parents with disabled children and those without children with disabilities. However, significant ($p > .05$) were the responses in the groups teachers (all, main and support) and parents (all, with and without children with disabilities), and we present the resulting data.

The other examined variables showed no significant differences.



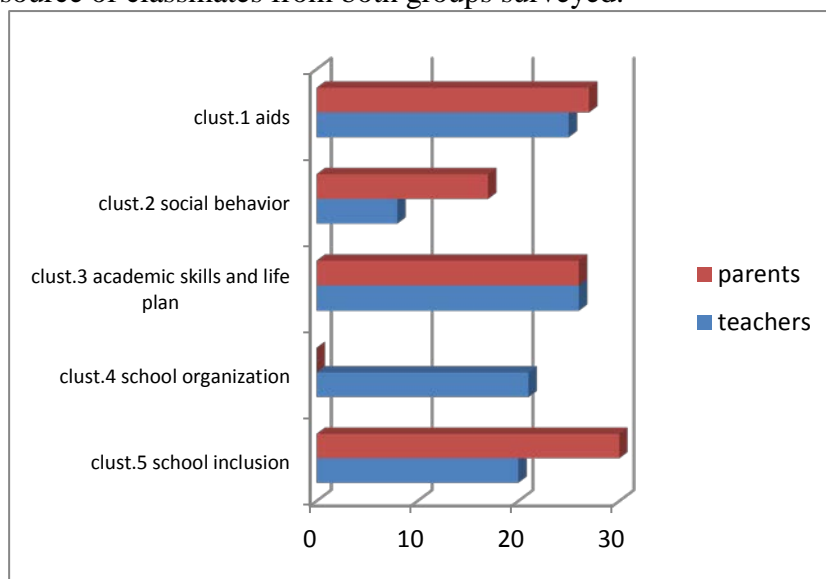
Graph 1: Associations of words at the re-occurrence of the terms “student” and “disability” (data in %)

During the associations of words (Graph. 1), the teachers intended disability as a special educational need, also common to other students. Therefore, they consider students with disabilities as belonging to the class and as individuals for whom to prepare individualised and flexible programs, which should facilitate the inclusion process. They believe that all teachers should work together in order to commonly define “shared objectives” (i.e. processed and actualised together targets, not just imposed), possible routes, criteria for monitoring and evaluation of both the targets and the methods to achieve them (Savarese, 2009). They think, therefore, of the fundamental role of the teaching team for the integration and inclusion in schools, in synergy with the valorisation of the role of classmates. They do, however,

never refer to the importance of the cooperation of the families in these paths.

As for the parents, however, it should be noted that they do not think of particular struggles/difficulties, when it comes to students with disabilities; they have as a reference, in the first place, the support teacher and, only in a second moment, main teachers. In fact, in most cases, the parents, while giving the school institution the difficult task of inclusion / integration, consider the support teacher as the only one capable of really taking charge of the disabled student and of the objectives the student will achieve through the personalization of education. Although the need for a debate and a dialogue between parents and teachers is obvious, the analysis of our data leads to assert, however, that parents consider the school still resistant to realize the full involvement of the family of the student with a disability.

A very interesting aspect, in our view, is the absence of reference to the resource of classmates from both groups surveyed.



Graph 2: Cluster analysis (data in %)

We then identified five clusters (Graph 2), which show how the problems of social inclusion and education of the students with disabilities are mostly felt by the group of parents, because of the barriers still in existence in architectural, mental and social terms. In fact, among the most significant lemmas appear "school", "accessible", "type", "handicap", "report/relationship" and "to favour".

Teachers, however, point out especially the inclusion of disability issues, highlighting in particular the complexity of the school system, which

has to deal in parallel with individualized activities, involvement of all pupils, special educational needs and co-existence of the whole class group. In fact, among the most significant lemmas appear “group”, “activity”, “class”, “to favour”, “school”, “to involve”, “inclusion”, “to integrate” and “class group.”

Conclusion

Our study objective was to understand the social representations of disability in the school context. All the operators interviewed undoubtedly framed the disabled student in a non-medicalization perspective, albeit with qualitative differences, depending on the role played, whether as a teacher or parent. Our hypothesis was only partially verified. In fact, in contrast to what we were expecting, main and support teachers, as well as parents with and without children with disabilities, all provided similar representations; however, all teachers and all parents have de facto provided representative modalities that are often collusive between themselves. This, of course, makes the organizational coexistence complex and it often penalizes or delays inclusion paths for students with disabilities. It becomes clear how scarce is the centrality of the report between school and family in the integration process. Yet, for the growth and social maturity of the disabled student, even teachers need the information and directions that only the family can offer. In fact, only the families of students with disabilities can provide significant information on therapeutic opportunities or previous educational experiences that may give relevant results in terms of both behaviour and profit. The school could be the best environment to achieve this path, which should represent the primary goal of a real inclusion process, a process that requires the synergy between teachers and parents in a social network of shared responsibilities, in a continuous exchange of information and advice and with a consistent transition of leadership depending on the type of problem to be addressed (Stainback, Stainback, 1993; Dionne and Rousseau, 2006).

We seem to be able to conclude that our data suggest the need to network: in line with recent international literature (Whittaker, Garbarino, 1983; Bigby, 2003; Chenoweth, McAuliffe, 2005), school inclusion is a process that implies the need for integrated team work and social network, having as objective the guarantee of an educational offer which is functional to the full development of the individual potentials (Zanobini, Usai, 2005). Making a school tailored to the learning needs of each student implies, especially for students with disabilities, an indispensable synergy with families and the environment outside school, to allow the individualisation of the actual schooling, directing the Individualised Education Plan to a dimension of life plan (Cuoco, 2009; 2012).

From the methodological point of view and operational, it is necessary to move from the logic of individual support to the network of supports (Cuoco, Savarese, 2010), formed both by the school operators and the external resources.

From these considerations, it is also clear that the isolated intervention becomes less than satisfactory for the disabled pupils' life plan and, of course for actions that relate to the school inclusion, too.

While building relationships among main teachers, support teachers and families can be tiring, and at times quite difficult, it is clear that only by organizing the school life in all its components, according to the model of the network of supports and, in our opinion, also of resources, a school that values differences, responding to the educational needs of each student, can be realised (Ianes, 2000). Within the social network, we must not forget also the disabled individual's classmates, an undoubtedly valuable resource (Vianello et al., 1999; Savarese, 2009). In fact, studies conducted with adolescent students who experienced a school environment with the presence of classmates with moderate or severe mental delays, have allowed us to demonstrate that prolonged contact with comrades who have special needs brings benefits both on the cognitive, affective-emotional and social aspects. In particular, we have highlighted six different types of benefits that the surveyed students have taken from their relationship with "special" peers (Savarese and Iannaccone, 2010):

1. Improvement of the concept of self;
2. Greater interpersonal understanding;
3. Lesser fear of differences;
4. Greater tolerance;
5. Development of personal principles;
6. Experience of genuine acceptance.

A thorny issue, and apparently still unresolved, concerns then the consideration of the teacher support, by the public opinion, as the only deputy to educate / teach the student with disabilities (Scruggs, Mastropieri, 2005). This belief, in truth, has also been reported by some (few) of our interviewed teacher with greater seniority. Yet, in all ministerial documents, from 1975 onwards, the support teachers have been considered a "support to the class", whose ability is to network their communication skills with those of other teachers to coordinate different levels of educational planning, including the personalised education plan for the disabled student (Ianes, 2000; Ianes 2006). Furthermore, the Ministerial Directive of 27/12/2012 highlighted the strategies to achieve the right to learn for pupils with difficulties, providing greater scope for intervention not only for pupils with Specific Learning Disorders (SLD), implemented by Law no. 170/2010, but also the entire area of Special Educational Needs (SEN) (Ministerial Circular

no. 8/2013), such as specific developmental disorders, linguistic, social and cultural disadvantages. It extends, therefore, to all students in need the right to personalised learning, referring to the principles of the Law 52/2003. In this perspective, the majority of pupils is to be considered with special educational needs, no longer only the disabled. Then the prejudice of teacher being “special”, the support, as “special” is his pupil, the disabled, should disappear. In the light of recent legislation, instead, the majority of students are seen as “special” and, if a teacher is forced to operate by himself, the institutional design of the SEN not only has less chance of success, but also is likely to fail miserably. The Law regarding SEN is also innovative in this respect, since it no longer refers to a specialist teacher, but to a team of specialised teachers, meaning, in this regard, both the main teachers and the support, in a synergic work. The Law also wishes to witness a real involvement of the Teachers Board and School Committees to achieve the adoption of an internal school policy for the inclusion, which takes a real transversality and centrality of the complex of the educational offer. The real policy (Various Authors, 2006; Giombattista, 2009), in this sense, can only be achieved if the families of students with SEN will be considered active parties to contribute to the development of adequate and timely educational services and whether the school will use in case of real need, even outside consultants (Ministerial Circular no. 8/2013). Thus, the aforementioned network of supports requires mutual support between institutions and communities, and the interpretation of differences as a resource and not as problems to be solved.

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JOB SATISFACTION STATUS OF PUBLIC PRIMARY SCHOOL TEACHERS: A CASE OF PAKISTAN ADMINISTRATIVE KASHMIR

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Abstract

This survey study was conducted to investigate the job satisfaction of Govt. primary school teachers in Pakistan administrative Kashmir. We applied Lester, P. E. (1987) teacher's job satisfaction questionnaire (TJSQ) with nine factors, supervision, colleague, working condition, pay, responsibility, working itself, advancement, security and recognition to assess the level of job satisfaction of primary school teachers. The sample consists of 150 government primary teachers from all over the Azad Jammu & Kashmir. We applied descriptive statistics to analyze the data through IBM SPSS 21. The results show that primary teacher are satisfied by four factors (out of nine) of a job i.e. supervision, pay, responsibility, and advancement. Whereas for other five factor they responded moderate. The study recommends certain measures for the entire satisfaction of primary school teacher for better performance.

Keywords: Job Satisfaction, Primary School Teachers, Azad Jammu & Kashmir

Introduction

Job satisfaction has been one of the most popular interests' among the researchers and practitioners from last few decades (Milda Astrauskaitė, 2011; Rajendran, R , 2013). Study of job satisfaction has a long history, since 1919, job satisfaction has been broadly studied and discussed in the areas of organizational management & behavior, industrial organization, social psychology, organizational personnel and human resource

management, and (Cranny, C. J., Smith, P. C., & Stone, E. F. 1992). The education system has also been changed into an organization. In the field of education, study of the job satisfaction of teachers has become a major focus of attention for researchers to make it a dynamic and competent (M. Asgha Ali, 2011). People are at different in the amount to which they account job satisfaction, and the specifics for these differences lies in the nature of the jobs which different employees offer. Therefore, teacher job satisfaction refers to a teacher's relation to his or her teaching function and is a role of the perceived relationship between what one desires from teaching and what one perceives it is offering to a teacher, (Zembylas and Papanastasiou, 2004).

Primary education is fundamental stage of further education and job satisfaction of primary teachers is extremely important among all others categories of teachers because of importance of primary education which is basic stage of the pyramid of education system in the world. This necessitates the need to study and address the issue of primary school teachers' job satisfaction. A great level of research has been conducted in the developed countries to measure the job satisfaction of schools teachers (Linda Evans, 1997; Dmitri Van Maele and, Mieke Van Houtte, 2012; Ietje Veldman et al., 20013; Robert W. Lent et al., 2011, Robert M. Klassen, 2009). In developing countries such as in Pakistan few cases have been traced related to teacher's job satisfaction (M. Asghar Ali, 2011; Nadim, 2012; Ghazi, S. R, 2012; Farah Deeba, 2013, M. Jamal Shah, 2012: Azhar M., 2011, Farida Shaikh, et al., 2012). However, there is a lack of studies that have investigated primary teachers' job satisfaction worldwide in general and in Pakistan or Pakistan administrative Kashmir. Especially AJ&K until now I did not find any study related to area of job satisfaction so this is the first study of its kind in Azad Jammu & Kashmir which is geopolitically very important part . This study attempts to explore the level of job satisfaction and dissatisfaction among Primary teachers and will provide evidence for those who directly involve in AJ&K education system to analyze the current policies whether or not moving the institutions right direction toward achieving the national educational goals.

Job satisfaction and dissatisfaction

Commonly, job satisfaction is an effective response of employee's situation at work (E. C. Papanastasiou and M. Zembylas, 2005). Job satisfaction is an attitude, which results from balance, and abstract of several particular likes and dislikes practiced in connection with the job. This approach manifests itself in the assessment of job and employing organization. This evaluation may rest mostly upon one's success or failure in the attainment of individual objectives and upon the perceived contributions of the job and employing organization to these ends

(Mahmood, Nudrat, & Asdaque, 2011). In terms of definitions, generally there is no agreed upon description of teacher job satisfaction or of what constitutes teacher satisfaction although there might be some international trends such as, the perception that teachers are most satisfied by matters intrinsic to the role of teaching: student attainment, helping students, positive interaction with students and others, self growth and so on (Berg, 2002; Dinham & Scott, 2002).

Newsroom, (1986) defined job satisfaction, as “It is a set of favorable or unfavorable feelings with which employees view their work.”

Brayfield & Rothe (1951) refers job satisfaction as the individual’s attitude (feeling) toward his work. According to Hugh (1983), job satisfaction will be defined as “the amount of overall positive affect (of feeling) that individuals have towards their jobs”.

Spector, (1956) defined job satisfaction as “how people feel about their jobs and different aspects of their jobs.”

Employers and employees both desire a more encouraging environment because of common interest, such as better performance and job satisfaction. Employers want better performance whereas employees feel that the climate is favorable when they are doing something useful that provides a sense of individual worth. They often want challenging work that is intrinsically satisfying. They want responsibility and the opportunity to succeed, to be listened to, treated and valued as individuals. They desire that the organizations should truly be concerned about their need and problem (Davis, 1985).

Research on teacher’s job satisfaction

Teachers are arguably the most imperative group of professionals for all nations’ future. Therefore, it is worrying to find that a lot of today’s teachers are dissatisfied with their jobs. Concerning to study of Beer & Beer (1992) who investigated the depression among Los Angeles teachers by applying depression scale the mean depression score of a sample of 75 teachers was 15.6. The CES-D score equal to 16 or greater is considered significant. According to Schonfeld, (1989) this level of depression score associated with risk of depression.

Teacher job satisfaction has remained as a large number of studies in many countries. Perhaps from last two decades, many studies have been conducted to identify sources of teacher satisfaction and dissatisfaction at elementary and secondary school level teachers.

Teacher’s job satisfaction or dissatisfaction depends on a many factors ranging from where he teaches to the sense of self-fulfillment they may receive from doing teaching. Generally, job satisfaction involves a description of those factors that a teacher perceives to either promote

positive feelings about job, or negative feelings about job (Ghazi, S. R, 2012). Imposed and centralized system accountability, lack of professional sovereignty, persistently obligatory changes, regular media criticism, lack of resources, and average salaries are major sources of low teacher satisfaction in many developed countries around the world (Dinham, S. and Scott, C. 2002; van den Berg, 2002).

Perpetual factors such as Student achievement, helping, student's positive relationships with colleagues and self growth have been associated with teacher job satisfaction, whereas further factors such as professed low status and pay, lack of professional independence and deprofessionalisation have been associated to teacher dissatisfaction, (Zembylas, M., & Papanastasiou, E. ,2004).

Demographic factors and personal characteristics also associated with the job satisfaction. gender, age, qualification, years of teaching experience, subject, location, , responsibility, and activity are the such factors that influence on the teachers job satisfaction,(Aliakbari, 2013; Bishay,1996; Shujie Liu , Anthony J. Onwuegbuzie, 2012).

Satisfaction and dissatisfaction are also deeply correlated with performance of teachers. The satisfied teachers are known to show higher level work performance in teaching profession (Mbah, 2012; Alimi Baba Gana, 2011).Whereas dissatisfaction reduced aptitude to meet students' needs, major incidences of psychosomatic disorders leading to increase the trend of absenteeism, and high levels of claims for stress-related disability (Farber, 1991; Troman, 2000). Significantly, teacher dissatisfaction results to be a major motivation in teachers leaving the job in many countries (Woods et al.1997).

Job Satisfaction of Primary Teachers: Case of Pakistan Administrative Kashmir

Azad Jammu & Kashmir remote area under Pakistan administration having area of 5134 square miles with 4.09 million population which came into existence as a result of civil war in 1947.(Malik 2002, Ajk govt). Pakistan administrative territory has educational administrative structure similar to Pakistan structure which was introduced by British government in subcontinent having the characteristics of too much centralization and authoritarianism with a series of reforms transformed gradually after independence brought through legislation without much thinking about the 'system', 'individual', and 'the organizational values' (Ghazi, S. R, 2012).

In Azad Jammu & Kashmir educational fact and figure are better than other provinces of Pakistan but the primary schools have a poor infrastructure with lake of facilities. Although major portion of the budget (28%) of the territory is being spend on education but still it is not sufficient

to have good facilities for the teaching. Presently the educational data of AJK is that 4202 government primary school are established with 9589 available primary teachers and 41% are without buildings 87 % without electricity, 73% are without availability of drinking water and 82% are without boundary walls (Pakistan Education Statistics, 2011). But according to the AJ& K Planning and development department, which indicates different number of primary teachers, 8069 male and 6903 female total 14972 primary teachers employed in Azad Kashmir primary education department,(AJ&K Planning and Development, 2014). This necessitates the need to investigate the teacher's job satisfaction in AJ&K who working under the worse condition and poor infrastructure.

The researcher have an experience to work as a teacher both in public and private schools near about ten years and seen sometime conflicts rise between AJ&K teacher union and Ministry of education. Usually in social media, sometime the government and common people; they criticize the public teacher's carelessness, laziness, purposeful lethargy, and lack of devotion, enthusiasm to work and absenteeism. On other hand the AJ&K teacher's organization were disagreed by existing pay structure, benefits and working conditions do not satisfy their basic needs as much. But AJK governments and ministry of education have argued that the current economic realities in the state cannot prolong the demand in increasing of salaries, benefits, and urgently improvements in working conditions. Particularly they argue that teachers' demands are beyond the government resource.

The current situations demand to measure the job satisfaction, dissatisfaction of primary teachers in AJ&K because teacher performance is closely related to job satisfaction and a better performance of a teacher can only be expected if they are satisfied with their jobs, (R. Rajendran 2013; Alima Baba Gana, 2013).

Significance of study

The previous research indicates that satisfaction is highly correlated to performance of employees. More satisfied employees perform better and on other hand dissatisfied employees are more likely to resort to incapacitate and reflexive aggression resulted in not only turn down in organization performance but it creates negative attitude among employees and affect health too. Morally dissatisfaction creates negative attitude among employees affected in personal and social life and the stress that results from it, in fact increases one's susceptibility to mental diseases consequences in heart attacks. Satisfied employees build a satisfied society with psychologically healthy people hold positive attitudes toward life in general.

In education sector primary education is fundamental stage provide a pillar for further high education so for it is very important that primary teachers should be satisfied with respect to all aspects of job satisfaction for sound education because health of primary schools depend upon the job satisfaction of primary teachers and it has been a significant concern to researchers and educationists in recent years. The current study is very scar in Pakistan and in AJ&K I did not find any published research related to this area which is geographically very important territory.

Objectives

The current study intends to attain the following objectives:

- To explore the job satisfaction of primary school teachers in AJ&K.
- To identify the deficiencies in this area and to provide the information to educational planners, administrators and policy makers for improvement of working situations in the schools and further studies to explore the problem in more depth.

Research Methodology

The population of this study mainly based on all primary teachers of Pakistan administrative Kashmir. A sample of total 150 teachers was selected randomly from three divisions Mirpur, Poonch and Muzafarabad.

Survey technique was applied to collect data through Lester, P. E. (1987), Development and factor analysis of the Teacher Job Satisfaction Questionnaire (TJSQ) with nine factors, Recognition, Security, Work itself, Responsibility, Working Condition, Advancement, Colleagues, Pay, and Supervision. This questionnaire is comprised of 66 items with five point likert scale format assessing nine facets of job satisfaction. Participants were asked to respond by scoring 1 to 5, by representing whether they agree or disagree with each item on the scale. The overall job satisfaction score is computed by summing all 66 items. 50% items were written in positive form and 50% items in negative form to minimize the response bias. Reverse scoring was necessary for items written in negative form which had been changed five into one and four into two.

We used descriptive statistics with help of software IBM SPSS 21 to analyze the data.

To measure the level of job satisfaction we applied Best's criteria (1977) that classified the level of job satisfaction into five categories which as follows:

$$\frac{\text{High score} - \text{Lower score}}{\text{Number of levels}}$$

$$\frac{5 - 1}{5}$$

$$= 0.80$$

Table A The scale for understanding the means of level of satisfaction

Mean score	Level of satisfaction
1.00- 1.80	Very unsatisfied
1.81- 2.60	Unsatisfied
2.61- 3.40	Moderate
3.41- 4.20	Satisfied
4.21- 5.00	Very satisfied

Findings

Table 1 Supervision factor

N	Number of items	Max. Expected Score	Gained score on all items	Mean Score	Standard Deviation	Remarks
150	14	70	48.12	3.4371	.27490	Satisfied

The supervision factor consists of 14 items, related to Head master and assistant education officer's help, assistance, praise, relation with primary teacher and supervisory role. The expected score on these subscale items was 70 whereas gained score on these items is 48.12. The means score and standard deviation of supervisory factor is 3.4371 and .27490 respectively. It is clear from that result that satisfaction toward the supervision factor is almost satisfied.

Table 2 Colleague factor

N	Number of items	Max. Expected Score	Gained score on all items	Mean Score	Standard Deviation	Remarks
150	10	50	36.75	3.24	.25508	Moderate

The colleague factor consists of the 10 items. The respondents were asked questions related to their relation with colleagues/ co workers. The mean score on colleague factor is 3.24 whereas standard deviation is .25508 which indicates that teacher's satisfaction toward this factor is moderate.

Table 3 Working condition factor

N	Number of items	Max. Expected Score	Gained score on all items	Mean Score	Standard Deviation	Remarks
150	7	35	22.05	3.1495	.69824	Moderate

Working condition factor is combination of 7 items related to school physical condition, working condition and administrative policies. The mean score and standard deviation on working condition factor is 3.1495 and .69824 respectively. The mean score value indicates the teachers satisfaction toward school working condition is moderate.

Table 4 Pay factor

N	Number of items	Max. Expected Score	Gained score on all items	Mean Score	Standard Deviation	Remarks
150	7	35	22.33	3.74	.33115	satisfied

Pay factor also consists of 7 items in which respondent were asked question related to their income and expenses, pay according to ability and pay comparison with similar jobs in other schools and provinces. The mean score on pay factor is 3.74 and standard deviation .33115. The mean score value indicates that teachers satisfaction toward pay is satisfied.

Table 5 Responsibility factor

N	Number of items	Max. Expected Score	Gained score on all items	Mean Score	Standard Deviation	Remarks
150	8	40	31.73	3.9666	.33931	satisfied

Responsibility factor combines 8 items related to get along with students, awareness of school policies and teaching responsibility. The mean score this factor is 3.9666 and standard deviation .33931 which revealed that teacher satisfaction for responsibility factor is satisfied.

Table 6 working itself factor

N	Number of items	Max. Expected Score	Gained score on all items	Mean Score	Standard Deviation	Remarks
150	9	45	30.64	3.4044	.65522	Moderate

Working itself subscale consist of nine items related to teachers interest to work, routine work, creativity, opportunity for variety of skills and freedom for own decision making. The mean score value for this subscale is 3.4044 with standard deviation .65522 which is evident that teacher's satisfaction for this factor is moderate.

Table 7 Advancement factor

N	Number of items	Max. Expected Score	Gained score on all items	Mean Score	Standard Deviation	Remarks
150	5	25	18.11	3.6227	.49865	satisfied

In table 7 advancement factor was measured. This facet of job satisfaction consists of 5 items related to teacher's opportunities for promotion. The mean score for this facet is 3.6227 with standard deviation .49865 which indicates that satisfaction for advancement factor is satisfied.

Table 8 Security factor

N	Number of items	Max. Expected Score	Gained score on all items	Mean Score	Standard Deviation	Remarks
150	3	15	10.21	3.4000	.52519	Moderate

In the security factor the respondents were asked for response for three items related to security of job. The mean score for this subscale is 3.4022 with standard deviation .52519. The mean value indicates that teachers level of satisfaction for this factor is moderate.

Table 9 Recognition factor

N	Number of items	Max. Expected Score	Gained score on all items	Mean Score	Standard Deviation	Remarks
150	3	15	9.50000	3.1667	0.7594	Moderate

The recognition factor consists of three items which explain the recognition of primary teachers in term of receiving recognition as good and successful teacher. The mean value for this factor is 3.1667 with standard deviation 0.7594 which indicates that teacher's satisfaction for this factor is moderate.

Table 10 Overall job satisfaction on all factors

	N	Minimum	Maximum	Sum	Mean	Std. Deviation
Valid N	9	3.15	3.97	31.13	3.4588	.27370
	9					Satisfied

In table 10 overall job satisfactions for 9 factors were measured by summing and calculating the mean scores on all items. The overall job satisfaction for all factors is satisfied.

Graphical presentation of job satisfaction

Figure 1

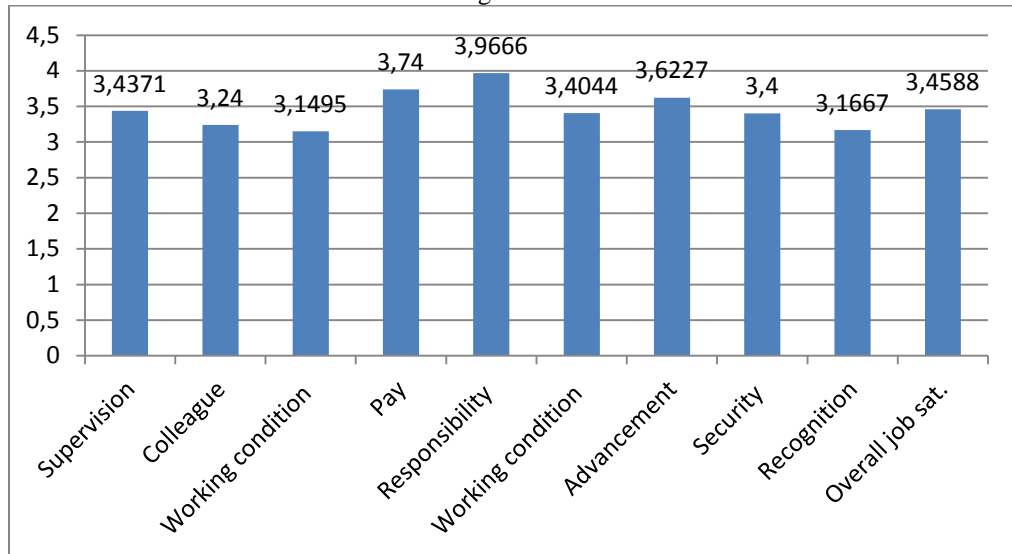


Figure 1 illustrates the levels of job satisfaction of respondent with nine factors including overall job satisfaction. The factors of job satisfaction are listed on the X axis and mean scores on the scale are indicated on the Y axis.

Discussion

The purpose of this study was to explore the level of job satisfaction of government primary teacher at Azad Jammu & Kashmir. In education, the researcher have usually adapted the concept theories and measure from other discipline although teaching is a distinctive there is a discrepancy in profession, value system and job features. In education context job satisfaction demand to investigate the nature of educational work setting and distinctiveness of teacher themselves to measure the job satisfaction specifically according to education setting. In the current study we applied Lester Paul Teacher job satisfaction Questionnaire (TJSQ) with nine factors, Recognition, Security, Work itself, Responsibility, Working Condition, Advancement, Colleagues, pay, and Supervision.

Supervision factor consists of fourteen items which deals with the two aspects, supervisory behavior and interpersonal relationship with teachers such as, “My immediate supervisor gives me assistance when I need help”, “My immediate supervisor provides assistance for improving, instruction,” “My immediate supervisor offers suggestions to improve my teaching” are describing the supervisors behavior whereas “My immediate supervisor turns one teacher against another”, and “My immediate supervisor makes me feel uncomfortable” explain the interpersonal relation. In this study teacher’s satisfaction for supervisory factor is satisfactory.

Colleague factor consist of ten items which refer to group outcomes and goal interdependence. Items used in factor explain the social aspect of teaching, teaching work groups and social aspect of schools setting. The teachers group work helpful to achieve the common goals. The mutual understanding similarity of attitudes builds the good personnel relationship among the fellow teacher and increases all aspect of social interaction. In our present study the teacher's satisfaction for this factor is moderate. The political interference in schools, the teacher's affiliation with political parties and with teachers associations are the major factor among the teacher which creates non cooperative environment in schools.

The working condition factor contains seven items about teaching situation with context of environmental characteristics such as physical conditions, working environment, school organization and administrative policies. Current research indicates that in AJ&K, primary teacher are moderate for working condition factor. With context to physical condition, M. Shabbir et al., (2014) investigated the poor physical infrastructure in AJ&K primary school. According to Pakistan education statistics, (2001-12), 175, (41%) primary school out of 4286 was without buildings, and other facilities like availability electricity, existing furniture, school boundary wall, drinking water latrine were very poor.

Pay factor also contains nine items which explain teaching profession with economic point of view. These items reflect the teacher's attitudes toward wages, teaching income, compensation and survival with teaching income. In our study teacher are satisfied by their pay. After 2002 there was seem to be considerable increase in wages of all employment in AJK. The govt. of AJ&K introduced the time scale to encourage the school teachers in 2008 which brought a substantial change in wages of schools teachers. But the teachers have less than nine years of service could not benefit by this scheme.

Responsibility factor contains eight items which explain the three components of these factors such as accountability of teacher's own work, student's teacher relations, and contribution in school policies. Responsibility factor, thus, is the need to be accountable for one's own work, to help ones students learn, and chance to play a part in activities relating policy and decision making. The current research refers to teacher satisfied for responsibility factor.

Working itself factor contains nine items related to teacher's daily task, creativeness and independency. The factor of work itself, subsequently, is the teaching job or the tasks related to job. It involves the freedom to use school innovative material, and to utilize skills, abilities to design work as well as experiment. Unfortunately in AJK education infrastructure is poor. Although the teacher are satisfied for this factor but they rarely get chance to

take part in creative activities because of poor infrastructure and lack of inventive material in public sectors schools.

Advancement factor consists of items related to opportunities of promotion in present teaching position. Advancement or promotion refers to change in current status or position such as primary teacher to junior and then senior. Promotion may be equated in with larger wages and authority. In the current research primary teacher are satisfied with this factor. As mentioned above the time scale is beneficial for upgrading of scale staying in the same status, the teachers who have been remained same status at least nine years get the benefit of better scale without promotion.

Security factor consist of three items related to stability and instability within school organization. This factor refers to tenure, layoff, pension retirement and dismissal. The current research investigated that primary teacher's satisfaction for this factor is moderate.

Recognition factor deals social position, some act of notice, admire, blame, and criticism such as "No one tell me that I am a good teacher", I receive full recognition for my successful teaching. Recognition involves the interest, admiration, status, and regard of supervisors, coworker students and parents. In AJ&K the primary teacher's satisfaction for this factor is moderate. The primary is the lower rank job in education sector and the teacher get low recognition from the society.

Overall the teacher is slightly satisfied by their jobs. In AJ&K most of graduates give priority to get job in public sector. There are not prominent jobs for young graduates in private sector. There are no big private industries except of small business and entrepreneurships. So by seeming the unemployment and comparing their jobs with others sector jobs, the primary teachers in AJ&K look like to be satisfied.

Conclusion

The Government primary school teachers at Pakistan administrative Kashmir were generally satisfied with four factors of Lester A Paul job satisfaction out of nine factors. The teachers were satisfied with supervision, pay responsibility and advancement factors whereas for other five factors of job satisfaction such as recognition, security, working condition, working itself and colleague, they responded moderate. None of any factor mean value fall in categories of unsatisfied or very satisfied. Overall, the responses indicated that the respondents in this study were satisfied with their job of primary teacher.

Limitations

Following few limitations of this study which are highlighted as below:-

- This study is limited to the government primary institutions in Pakistan administrative Kashmir only.
- Sampling technique was applied in this study which has inherent disadvantage of representativeness.
- The results were limited to the data collected by questionnaire method.
- This study does not contain data by, interviews, group, and panel discussion which can be supported to get more solid results.

Recommendation for further study

Following suggestions are recommended to make the study broad.

- The demographic considerations and personal characteristics may be taken into account in analysis.
- This study is only limited to primary schools, it may be carried out in higher educational institutions, other than primary schools.
- Such kind of studies may be conducted for private institutions.
- A comparative study of job satisfaction of public and private Teachers may be conducted.

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INTEGRATED STUDENT GROUP PRESENTATION IN TEACHING DEVELOPMENTAL MATHEMATICS COURSES

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Abstract

The purpose of this study is to examine whether there is a difference in students' understanding of the core concepts in Pre-calculus after integrating student group presentations into teaching versus the teacher-led traditional classroom setting. The results of the analysis indicated that student group presentations do increase student retention and success rate, the number of students obtaining an A, and the final exam average. The model of integrating group presentation in teaching developmental mathematics courses should be adapted.

Keywords: Pre-calculus, group presentation, student retention rate, student success rate, core concepts

Introduction

Employers are in high demand of graduates with excellent communication skills. Therefore, a student's in-class presentation becomes an important element in training students to deliver information of their learning (Alshare, 2004). **Hempel etl did a study in** didactical ultrasound courses and found out that only a limited amount of information can be processed at a time and 12% of knowledge can be retained after 2 weeks. Presentations of short duration can increase the retained knowledge rate. Therefore, classroom-based presentations in teaching should be adapted (Hempel, 2014).

Fan and YEO (Fan, 2007) in Singapore integrated oral presentations into mathematics teaching and learning. Their study showed that both teachers and students initially encountered difficulties and challenges in applying this new teaching strategy in the classrooms. However, both teachers and students believe that using oral presentations in class can be effective in teaching and learning after gaining experiences. They concluded from the results that it is meaningful to integrate oral presentations into

teaching and learning given necessary guidance and training for both students and instructors.

One can only learn when one can teach. When students talk about mathematics, it is usually not easy to understand what they really mean. Even if their reasoning is correct, it may not appear to be sound when they try to convert their thoughts into words. So it is very important to re-voice their learning through in-class presentation. Re-voicing can help students to understand math content or core concepts and increase students' critical thinking (Chapin, 2003).

Pre-calculus is a unified course with the same content as College Algebra and Trigonometry. It is one of the prerequisites for Calculus I which is required by most of Science, Technology, Engineering and Mathematics (STEM) majors. In the first half of this course, college algebra is the main focus and the core concepts include graphing algebraic, logarithmic, and exponential functions, and solving the algebraic, logarithm, and exponential equations (and inequalities). The second half of this course will mainly cover the basic trigonometry properties which include graphing and evaluating trigonometric functions, solving trigonometric equations, and solving three variable linear system with matrix. When students have learned trigonometry during the second of half of the semester, they tend to forget the algebra (from the beginning). Furthermore, students in Pre-Calculus had great difficulty in understanding the core concepts of this course, specifically the definition of a function, trigonometric functions, and algebraic expressions of fractions. Lacking this basic knowledge, students encountered difficulties in solving quadratic equations and linear inequalities, and graphing trigonometric and rational functions. Furthermore, they are also confused when learning inverse functions, exponential functions, and trigonometric formulas, which are core topics in this course.

The main purpose of this study is to get students to become interested in the world of mathematics and other related STEM courses. Group presentation will provide students an opportunity to think logically and creatively when solving mathematics problems. A mathematically-based problem solving approach to life will likely increase the probability that these students choose STEM careers. The main objectives of this project are to help students to be prepared for upper level mathematics courses that their majors might require and to increase their presentation skills and critical thinking.

Design

Rationale: This project is conducted at an open enrollment (historically black) university in the Midwest of the United States. The student body at this institution is extremely diverse, which includes a large

proportion of underrepresented minorities, non-traditional students, and academically unprepared students. The investigator of this project noticed that most students who struggled in Pre-calculus had difficulties in understanding the core concepts and would be unlikely to participate in the class discussion. After the pilot study in academic year 2010-2011 and one on one discussion with these students, the investigator found out that students felt embarrassed to participate in the discussion without knowing the basic concepts. In addition, students would get lost easily when they watched the online tutorial videos or reviewed the notes by themselves. These factors were significant obstacles for them to participate in the class activities. In order to spur students' interest in mathematics and build a solid background to pass Pre-calculus, the investigator implemented student group presentation to help students understand the core concepts.

Design: A pilot study was conducted during the academic year 2010-2011. Students showed great interest in group presentations in Pre-Calculus. The study will use a quasi-experimental non-equivalent control group design. The Experimental group will use the applied teaching method-student group presentation while the Baseline group will apply the traditional teacher directed classroom setting. The group differences will serve as the independent variables in the study. Dependent variable measures will focus on the quantity and quality of skills and knowledge. The Baseline group consists of the data such as the retention rate and grade distribution collected from the academic year 2011-2012. The Experimental group will be the data collected from the academic year 2012-2013. By comparing the data collected from these two groups, students from Experimental group are expected to show an increase in retention rate and passing rate.

Participants: Participants of this project included approximately 75 bstudents enrolled in Pre-calculus at a (historically black) university in the Midwest of United States. The institution is an open-enrollment institution with a large portion of underrepresented, nontraditional, and unprepared students.

Student Resources: Two online resources were available for student viewing and used as supplementary materials for their presentations. One is videos of my own presentations on core concepts and applications of mathematics in real life. I introduced an expanded emphasis on applications to promote an appreciation for mathematics in STEM majors. For instance, one example I used in this course is traveling waves (physics): If we snap photographs of the string at several instants, it appears that the waves in the string "travel" to the right. The velocity of the wave is the rate at which it moves to the right. If the wave has the velocity v , the graph of the shifted wave at time t is $y(x, t) = A \sin k(x - v t)$, which is a sine function. The graph of sine function is a very important technique in Pre-calculus. Another

example is pH scale and hydrogen ion concentration (chemistry): Chemists defined a convenient expression of pH and hydrogen ion concentration as

$$\text{pH} = -\log [\text{H}^+],$$

where $[\text{H}^+]$ is the concentration of hydrogen ions measured in moles per liter. It is clear for students to use a calculator to find the corresponding pH given the hydrogen ion concentration. But how could students find corresponding $[\text{H}^+]$ given pH? This is an application of solving logarithmic functions. Students can solve the logarithmic functions by rewriting the equation in the form of exponential function: $[\text{H}^+] = 10^{-\text{pH}}$ and they can find solutions by substituting the numbers into the formulas.

The second resource is shared online videos from Louisiana State University. With permission of Louisiana State University Math Coordinator Mrs. Phobe Rouse, I shared on-line lecture videos (<https://www.math.lsu.edu/courses/videos>) to support student preparation for their group presentations in this course. In these online videos, examples of solving questions were a main focus.

Guideline of Group Presentation: Students were randomly divided in groups and each group was in charge of one algebra core concept and one trigonometry core concept. During student presentations, students are strongly encouraged to ask questions and participate in the discussions. At the end of each presentation, the instructor points out the strength and areas of improvement so that students can gain immediate feedback. The presentation score is counted as 10% of their course grade. The guidelines of presentations:

1. Each presentation should include three parts: Introduction, Applications and a brief Summary.
 - i) Introduction: The introduction is mainly about student understanding of the core concepts for the assigned topics. Students are encouraged to present in both a conceptual and graphical view.
 - ii) Applications: Then students need to find real-life applications or examples in their disciplines. These examples could not be the examples directly from our textbook or my class notes. Students are also required to write up some questions for their classmates to practice for their final exams.
 - iii) Summary: The summary included a brief review of the core concept and the key ideas in applying these concepts to solve problems.
2. Each student in the group has to present part of their assigned topics. Each presentation consists of 15-16 minutes of lecturing, followed by a 4-5 minute question-and-answer period. Presenters should prepare

several questions to involve the whole class. The questions were intended to include all levels from straightforward to challenging.

3. After each presentation, a quiz is given to the rest of the class except for the presenters. The average score of the quiz will be added to the presentation score of that group. The final exam will include questions to check their understandings of these core concepts and formulas.

Results

The data attached below was collected from the Pre-calculus classes from Fall 2010 to Spring 2013. In Fall 2012, 21 students were enrolled in this course (note: three students never showed up to the class and were dropped accordingly). For the remaining 18 students, 16 students received a letter grade and two students withdrew as the semester progressed. Among the students who received letter grades, eight of them scored A's, three B's, three C's, and two failed the course. The retention rate of 2012-2013 was $16/18 = 88.89\%$ and the passing rate was $14/16 = 87.5\%$.

In the academic year 2011-2012, 27 students were enrolled in this course at the start of the semester. Due to financial and academic reasons eight students left the class in the middle of the semester. 18 students stayed and received a letter grade and one student decided to audit the course. Among the students who obtained a final course grade, six students scored A's, two B's, seven C's, and three failed the course. The retention rate of 2011-2012 was $19/27 = 70.37\%$ and the passing rate was $15/18 = 83.33\%$.

For the academic year of 2010-2011, there were 28 students who originally registered the course, and 9 of them withdrew the course in the middle of this semester. The final grade distribution of this course: seven scored A's, four B's, six C's, one D, and one student failed the course. Hence, the retention rate of 2010-2011 was $19/28 = 67.86\%$ and the passing rate was $17/19 = 89.47\%$.

FIGURE 1: Grade Distribution of Academic Year 2010-2011, 2011-2012 and 2012-2013.

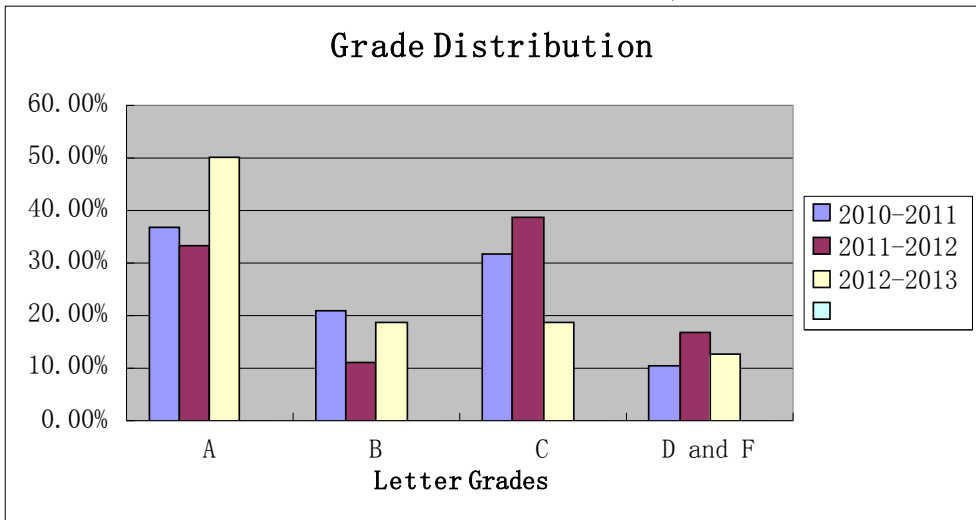


FIGURE 2: Retention Rate and Passing Rate of Academic Year 2010-2011, 2011-2012 and 2012-2013.

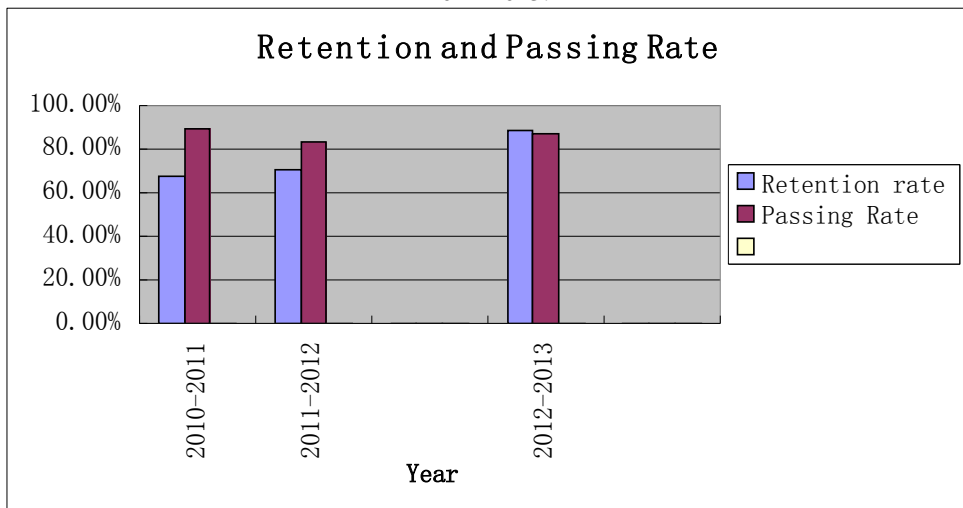


FIGURE 3: Final Exam Grade vs. Group

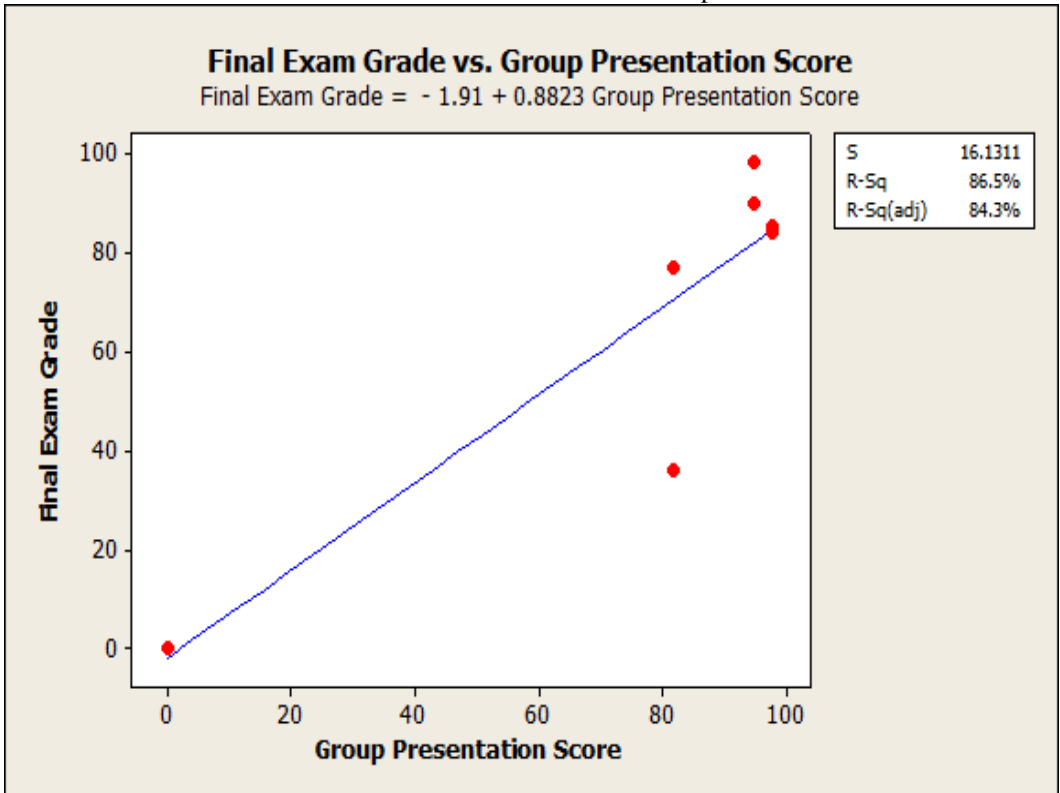
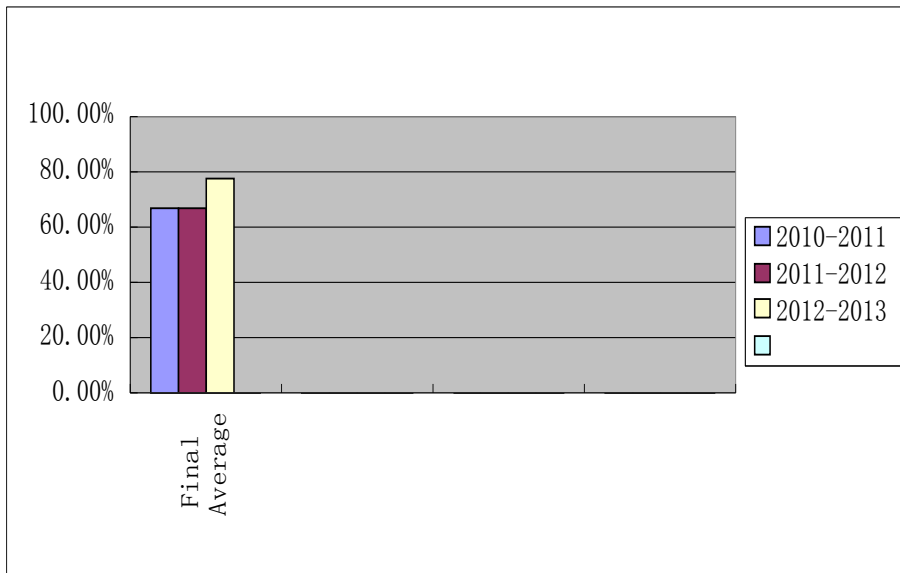


FIGURE 4: Average of final examPresentation Score in 2011-2012 and 2012-2013.



Assessment of Data

Comparing the results from the collected data in Figure 1 and 2, the student retention rate was increased by 18.5% for the academic year 2012-2013 than year 2011-2012. The student passing rate remained relatively stable. It has a 6% decrease from academic year 2010-2011 to 2011-2012, while it has a 4% increase from year 2011-2012 to year 2012-2013. Comparing the grade distribution of academic year 2011-2012 and year 2012-2013, it shows a 16.6% increase on A's. It has a small increase in B's and a huge decrease in C's. The newly developed teaching strategy did show great improvement in retaining students and the rate of students obtaining an A average.

(2012-2013) 18 students took the pretest and eight students failed. The passing rate of the pretest was $10/18 = 55.56\%$. 16 students took the post-test and only one student failed the post-test. The passing rate of post-test was $15/16 = 93.75\%$. Figure 3 (Final Exam vs. Group Presentation Score) contains a percentage of variance equal to 86.5%, with R-Sq (adj) at 84.3%. The higher correlation between Final Exam Grade vs. Group Presentation Scores indicates that student group presentation does a positive effect on student final exam grade. In figure 4, the average of final exam had an 10% increase in year 2012-2013 compared with year 2011-2012.

Data Analysis: The rate of students who obtained A's showed a 16.5% increase. It showed that student learning improved when working together on presentations. Through group presentations, students understood core concepts and how to apply these concepts to solve real life problems. The final exam average increased 10%. This indicated that group presentation did spur students to review course materials and core concepts.

Conclusion

The strongest positive outcomes of this project were the quality of student presentations, the increase in student retention rate, and the increase in the number of students who obtained A's in the academic year 2012-2013. Student presentations were counted 10% of their course grade. During their presentations, students were actively engaged in learning the materials instead of (passively) listening to the lectures. By making quizzes for their classmates, students were inspired to think critically about the course content. By tracking student progress in high level math courses, it showed that it is much easier for students to understand the materials in high level math courses after they fully understood the core concepts in Pre-calculus. Thus it follows that the model of integrating group presentation into teaching and learning core concepts in mathematics should be adapted.

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