

# GLOBAL JOURNAL

OF HUMAN SOCIAL SCIENCES: G

## Linguistics & Education



Development of Sinology

Cameroonian Secondary Schools

Highlights

Revised Janis Scale Application

Psychometric Evaluation of Job

Discovering Thoughts, Inventing Future

Volume 16    ISSUE 6    VERSION 1.0



GLOBAL JOURNAL OF HUMAN-SOCIAL SCIENCE: G  
LINGUISTICS & EDUCATION

---



GLOBAL JOURNAL OF HUMAN-SOCIAL SCIENCE: G  
LINGUISTICS & EDUCATION

---

VOLUME 16 ISSUE 6 (VER. 1.0)

OPEN ASSOCIATION OF RESEARCH SOCIETY

© Global Journal of Human Social Sciences. 2016.

All rights reserved.

This is a special issue published in version 1.0 of "Global Journal of Human Social Sciences." By Global Journals Inc.

All articles are open access articles distributed under "Global Journal of Human Social Sciences"

Reading License, which permits restricted use. Entire contents are copyright by of "Global Journal of Human Social Sciences" unless otherwise noted on specific articles.

No part of this publication may be reproduced or transmitted in any form or by any means, electronic or mechanical, including photocopy, recording, or any information storage and retrieval system, without written permission.

The opinions and statements made in this book are those of the authors concerned. Ultraculture has not verified and neither confirms nor denies any of the foregoing and no warranty or fitness is implied.

Engage with the contents herein at your own risk.

The use of this journal, and the terms and conditions for our providing information, is governed by our Disclaimer, Terms and Conditions and Privacy Policy given on our website <http://globaljournals.us/terms-and-condition/menu-id-1463/>

By referring / using / reading / any type of association / referencing this journal, this signifies and you acknowledge that you have read them and that you accept and will be bound by the terms thereof.

All information, journals, this journal, activities undertaken, materials, services and our website, terms and conditions, privacy policy, and this journal is subject to change anytime without any prior notice.

**Incorporation No.:** 0423089  
**License No.:** 42125/022010/1186  
**Registration No.:** 430374  
**Import-Export Code:** 1109007027  
**Employer Identification Number (EIN):**  
**USA Tax ID:** 98-0673427

## Global Journals Inc.

(A Delaware USA Incorporation with "Good Standing"; **Reg. Number: 0423089**)

*Sponsors: Open Association of Research Society  
Open Scientific Standards*

### *Publisher's Headquarters office*

**Global Journals® Headquarters**  
945th Concord Streets,  
Framingham Massachusetts Pin: 01701,  
United States of America

*USA Toll Free: +001-888-839-7392*

*USA Toll Free Fax: +001-888-839-7392*

### *Offset Typesetting*

**Global Journals Incorporated**  
2nd, Lansdowne, Lansdowne Rd., Croydon-Surrey,  
Pin: CR9 2ER, United Kingdom

### *Packaging & Continental Dispatching*

**Global Journals**  
E-3130 Sudama Nagar, Near Gopur Square,  
Indore, M.P., Pin:452009, India

### *Find a correspondence nodal officer near you*

To find nodal officer of your country, please email us at *local@globaljournals.org*

### *eContacts*

**Press Inquiries:** *press@globaljournals.org*  
**Investor Inquiries:** *investors@globaljournals.org*  
**Technical Support:** *technology@globaljournals.org*  
**Media & Releases:** *media@globaljournals.org*

### *Pricing (Including by Air Parcel Charges):*

*For Authors:*

22 USD (B/W) & 50 USD (Color)

*Yearly Subscription (Personal & Institutional):*

200 USD (B/W) & 250 USD (Color)

INTEGRATED EDITORIAL BOARD  
(COMPUTER SCIENCE, ENGINEERING, MEDICAL, MANAGEMENT, NATURAL  
SCIENCE, SOCIAL SCIENCE)

**John A. Hamilton, "Drew" Jr.,**  
Ph.D., Professor, Management  
Computer Science and Software  
Engineering  
Director, Information Assurance  
Laboratory  
Auburn University

**Dr. Henry Hexmoor**  
IEEE senior member since 2004  
Ph.D. Computer Science, University at  
Buffalo  
Department of Computer Science  
Southern Illinois University at Carbondale

**Dr. Osman Balci, Professor**  
Department of Computer Science  
Virginia Tech, Virginia University  
Ph.D. and M. S. Syracuse University,  
Syracuse, New York  
M. S. and B. S. Bogazici University,  
Istanbul, Turkey

**Yogita Bajpai**  
M.Sc. (Computer Science), FICCT  
U.S.A.Email:  
yogita@computerresearch.org

**Dr. T. David A. Forbes**  
Associate Professor and Range  
Nutritionist  
Ph.D. Edinburgh University - Animal  
Nutrition  
M. S. Aberdeen University - Animal  
Nutrition  
B. A. University of Dublin- Zoology

**Dr. Wenying Feng**  
Professor, Department of Computing &  
Information Systems  
Department of Mathematics  
Trent University, Peterborough,  
ON Canada K9J 7B8

**Dr. Thomas Wischgoll**  
Computer Science and Engineering,  
Wright State University, Dayton, Ohio  
B.S., M.S., Ph.D.  
(University of Kaiserslautern)

**Dr. Abdurrahman Arslanyilmaz**  
Computer Science & Information Systems  
Department  
Youngstown State University  
Ph.D., Texas A&M University  
University of Missouri, Columbia  
Gazi University, Turkey

**Dr. Xiaohong He**  
Professor of International Business  
University of Quinnipiac  
BS, Jilin Institute of Technology; MA, MS,  
PhD,. (University of Texas-Dallas)

**Burcin Becerik-Gerber**  
University of Southern California  
Ph.D. in Civil Engineering  
DDes from Harvard University  
M. S. from University of California, Berkeley  
& Istanbul University

**Dr. Bart Lambrecht**

Director of Research in Accounting and Finance  
Professor of Finance  
Lancaster University Management School  
BA (Antwerp); MPhil, MA, PhD  
(Cambridge)

**Dr. Carlos García Pont**

Associate Professor of Marketing  
IESE Business School, University of Navarra  
Doctor of Philosophy (Management),  
Massachusetts Institute of Technology (MIT)  
Master in Business Administration, IESE,  
University of Navarra  
Degree in Industrial Engineering,  
Universitat Politècnica de Catalunya

**Dr. Fotini Labropulu**

Mathematics - Luther College  
University of Regina  
Ph.D., M.Sc. in Mathematics  
B.A. (Honors) in Mathematics  
University of Windsor

**Dr. Lynn Lim**

Reader in Business and Marketing  
Roehampton University, London  
BCom, PGDip, MBA (Distinction), PhD,  
FHEA

**Dr. Mihaly Mezei**

ASSOCIATE PROFESSOR  
Department of Structural and Chemical  
Biology, Mount Sinai School of Medical  
Center  
Ph.D., Eötvös Loránd University  
Postdoctoral Training,  
New York University

**Dr. Söhnke M. Bartram**

Department of Accounting and Finance  
Lancaster University Management School  
Ph.D. (WHU Koblenz)  
MBA/BBA (University of Saarbrücken)

**Dr. Miguel Angel Ariño**

Professor of Decision Sciences  
IESE Business School  
Barcelona, Spain (Universidad de Navarra)  
CEIBS (China Europe International Business School).  
Beijing, Shanghai and Shenzhen  
Ph.D. in Mathematics  
University of Barcelona  
BA in Mathematics (Licenciatura)  
University of Barcelona

**Philip G. Moscoso**

Technology and Operations Management  
IESE Business School, University of Navarra  
Ph.D in Industrial Engineering and  
Management, ETH Zurich  
M.Sc. in Chemical Engineering, ETH Zurich

**Dr. Sanjay Dixit, M.D.**

Director, EP Laboratories, Philadelphia VA  
Medical Center  
Cardiovascular Medicine - Cardiac  
Arrhythmia  
Univ of Penn School of Medicine

**Dr. Han-Xiang Deng**

MD., Ph.D  
Associate Professor and Research  
Department Division of Neuromuscular  
Medicine  
Department of Neurology and Clinical  
Neuroscience Northwestern University  
Feinberg School of Medicine

**Dr. Pina C. Sanelli**

Associate Professor of Public Health  
Weill Cornell Medical College  
Associate Attending Radiologist  
NewYork-Presbyterian Hospital  
MRI, MRA, CT, and CTA  
Neuroradiology and Diagnostic  
Radiology  
M.D., State University of New York at  
Buffalo, School of Medicine and  
Biomedical Sciences

**Dr. Roberto Sanchez**

Associate Professor  
Department of Structural and Chemical  
Biology  
Mount Sinai School of Medicine  
Ph.D., The Rockefeller University

**Dr. Wen-Yih Sun**

Professor of Earth and Atmospheric  
Sciences Purdue University Director  
National Center for Typhoon and  
Flooding Research, Taiwan  
University Chair Professor  
Department of Atmospheric Sciences,  
National Central University, Chung-Li,  
Taiwan University Chair Professor  
Institute of Environmental Engineering,  
National Chiao Tung University, Hsin-  
chu, Taiwan. Ph.D., MS The University of  
Chicago, Geophysical Sciences  
BS National Taiwan University,  
Atmospheric Sciences  
Associate Professor of Radiology

**Dr. Michael R. Rudnick**

M.D., FACP  
Associate Professor of Medicine  
Chief, Renal Electrolyte and  
Hypertension Division (PMC)  
Penn Medicine, University of  
Pennsylvania  
Presbyterian Medical Center,  
Philadelphia  
Nephrology and Internal Medicine  
Certified by the American Board of  
Internal Medicine

**Dr. Bassey Benjamin Esu**

B.Sc. Marketing; MBA Marketing; Ph.D  
Marketing  
Lecturer, Department of Marketing,  
University of Calabar  
Tourism Consultant, Cross River State  
Tourism Development Department  
Co-ordinator , Sustainable Tourism  
Initiative, Calabar, Nigeria

**Dr. Aziz M. Barbar, Ph.D.**

IEEE Senior Member  
Chairperson, Department of Computer  
Science  
AUST - American University of Science &  
Technology  
Alfred Naccash Avenue – Ashrafieh

## PRESIDENT EDITOR (HON.)

---

### **Dr. George Perry, (Neuroscientist)**

Dean and Professor, College of Sciences

Denham Harman Research Award (American Aging Association)

ISI Highly Cited Researcher, Iberoamerican Molecular Biology Organization

AAAS Fellow, Correspondent Member of Spanish Royal Academy of Sciences

University of Texas at San Antonio

Postdoctoral Fellow (Department of Cell Biology)

Baylor College of Medicine

Houston, Texas, United States

## CHIEF AUTHOR (HON.)

---

### **Dr. R.K. Dixit**

M.Sc., Ph.D., FICCT

Chief Author, India

Email: [authorind@computerresearch.org](mailto:authorind@computerresearch.org)

## DEAN & EDITOR-IN-CHIEF (HON.)

---

### **Vivek Dubey(HON.)**

MS (Industrial Engineering),

MS (Mechanical Engineering)

University of Wisconsin, FICCT

Editor-in-Chief, USA

[editorusa@computerresearch.org](mailto:editorusa@computerresearch.org)

### **Sangita Dixit**

M.Sc., FICCT

Dean & Chancellor (Asia Pacific)

[deanind@computerresearch.org](mailto:deanind@computerresearch.org)

### **Suyash Dixit**

(B.E., Computer Science Engineering), FICCTT

President, Web Administration and

Development , CEO at IOSRD

COO at GAOR & OSS

### **Er. Suyog Dixit**

(M. Tech), BE (HONS. in CSE), FICCT

SAP Certified Consultant

CEO at IOSRD, GAOR & OSS

Technical Dean, Global Journals Inc. (US)

Website: [www.suyogdixit.com](http://www.suyogdixit.com)

Email: [suyog@suyogdixit.com](mailto:suyog@suyogdixit.com)

### **Pritesh Rajvaidya**

(MS) Computer Science Department

California State University

BE (Computer Science), FICCT

Technical Dean, USA

Email: [pritesh@computerresearch.org](mailto:pritesh@computerresearch.org)

### **Luis Galárraga**

J!Research Project Leader

Saarbrücken, Germany



## CONTENTS OF THE ISSUE

---

- i. Copyright Notice
- ii. Editorial Board Members
- iii. Chief Author and Dean
- iv. Contents of the Issue
  
1. Participation of Higher Secondary School Teachers in School Administration. *1-26*
2. ICT and English Language Teaching and Learning in Cameroonian Secondary Schools. *27- 34*
3. On Studying Teachers' Self Esteem based on Revised Janis Scale Application. *35 -42*
4. Psychometric Evaluation of Job Satisfaction Scale in Uganda's Teacher Population Sample. *43-50*
5. Investigating the Most and the Least used Vocabulary Learning Strategies among Saudi Undergraduate Learners. *51-56*
  
- v. Fellows
- vi. Auxiliary Memberships
- vii. Process of Submission of Research Paper
- viii. Preferred Author Guidelines
- ix. Index



GLOBAL JOURNAL OF HUMAN-SOCIAL SCIENCE: G  
LINGUISTICS & EDUCATION  
Volume 16 Issue 6 Version 1.0 Year 2016  
Type: Double Blind Peer Reviewed International Research Journal  
Publisher: Global Journals Inc. (USA)  
Online ISSN: 2249-460X & Print ISSN: 0975-587X

## Participation of Higher Secondary School Teachers in School Administration

By Priya Mondal

*University of Gourbanga*

**Abstract-** Teacher play a important role in school both academically and by participating in school administration for ensuring quality education for student. The efficiency of the school system can be ensured not by providing only a magnificent building to it, but by organizing and administering it on ideal lines in every way. A good building is just one small factor. There is the human element in the form of pupils, teachers and administrators without which the body of a school is incomplete and even inconceivable. Although the structure of a school is also raised by bricks and mortar but the more important things about school are the ideas, aims and the spirit behind its structure. Organization of a school is much more than a mere structure. Its administration is also not to be on the same pattern as the administration of a factory or a department The teacher's job is a challenge for even the most capable. Its duties and function are unlimited in number. The present investigation was undertaken to study the *Participation of Higher Secondary School Teachers in School Administration*'. The researcher selected 100 teachers from 12 higher secondary schools of Jalpaiguri district.

**Keywords:** *participation, administration, planning, organization, co-ordination, educational administration, school administration, secondary school teacher, community relationship.*

**GJHSS-G Classification :** FOR Code: 330305p



Strictly as per the compliance and regulations of:



© 2016. Priya Mondal. This is a research/review paper, distributed under the terms of the Creative Commons Attribution-Noncommercial 3.0 Unported License (<http://creativecommons.org/licenses/by-nc/3.0/>), permitting all non-commercial use, distribution, and reproduction in any medium, provided the original work is properly cited.

# Participation of Higher Secondary School Teachers in School Administration

Priya Mondal

**Abstract-** Teacher play a important role in school both academically and by participating in school administration for ensuring quality education for student. The efficiency of the school system can be ensured not by providing only a magnificent building to it, but by organizing and administering it on ideal lines in every way. A good building is just one small factor. There is the human element in the form of pupils, teachers and administrators without which the body of a school is incomplete and even inconceivable. Although the structure of a school is also raised by bricks and mortar but the more important things about school are the ideas, aims and the spirit behind its structure. Organization of a school is much more than a mere structure. Its administration is also not to be on the same pattern as the administration of a factory or a department The teacher's job is a challenge for even the most capable. Its duties and function are unlimited in number. The present investigation was undertaken to study the *Participation of Higher Secondary School Teachers in School Administration*. The researcher selected 100 teachers from 12 higher secondary schools of Jalpaiguri district. These teachers had been categorized as male and female, more experienced and less experienced, Govt. and Private management. A standardized tool (TPSAS) of Taj (1985) was used to assess the teacher's participation in school administration of higher secondary school of Jalpaiguri district in relation to differential level of gender, school management and teaching experience. It consists of 27 items in which 5 items are related to planning, 6 items are related to organizing, 7 items are related to communicating, 5 items are related to controlling and 4 items are related to evaluating. To know the participation of secondary school teacher in school administration data were collected and mean, SD were worked out, 't' test was applied to find out significant difference and ANOVA was applied to Study the significance difference between subsamples of gender, management and experience. This paper seeks to set the stage for the exploration of female leadership in educational Systems.

- The female teachers should be motivated to handle any sort of pressure and workload.
- Teachers with less experience should not be kept for administration work.
- The government schools should be able to cater to needs and demands of the teacher.

**Keywords:** participation, administration, planning, organization, co-ordination, educational administration, school administration, secondary school teacher, community relationship.

**Author:** Assistant Professor, Balurghat B.Ed College, University of Gourbanga. e-mail: kalidashroy@gmail.com

## I. INTRODUCTION

School is one of the most important institutions in any society. It is set up by the society with a large number of objectives which are of a very important nature. It has to play a crucial role in the building up of the society which builds it. The function of developing the future citizens is entrusted to the schools. As a future citizen, the child enjoys certain rights. The society is under obligation to fulfill those rights. Organizing efficient and good schools for its children is one of the primary responsibilities of a society or state.

The efficiency of the school system can be ensured not by providing only a magnificent building to it, but by organizing and administering it on ideal lines in every way. A good building is just one small factor. There is the human element in the form of pupils, teachers and administrators without which the body of a school is incomplete and even inconceivable. Although the structure of a school is also raised by bricks and mortar but the more important things about school are the ideas, aims and the spirit behind its structure. Organization of a school is much more than a mere structure. Its administration is also not to be on the same pattern as the administration of a factory or a department.

### a) *Meaning of administration*

According to *Theo Haimann*, (2009) "Administration means overall determination of policies, setting of major objectives, the identification of general purposes and laying down of broad programmes and projects". It refers to the activities of higher level. It lays down basic principles of the enterprise.

#### i. *Concept of Educational Administration*

Administration is a process of getting thing done. It is the moving force to set and keep an institution or a department in motion. To a large extent it is the agency that runs the whole show. It keeps the whole machinery well-oiled to achieve optimum results. It solves problems arising in the execution of activities and more efficient administration, possesses foresight into the problem and may check them before they arise. The entire relevant responsibilities lie with the administration. If something goes wrong it is to be held responsible. In the case of achievements, it has every right to be the major claimant of the credit. Poor

functioning of an institution or a department is a sign of poor administration. Smooth functioning is one of the signs of good administration.

There are five clearly defined aspects of administration which throw more light on it, viz.; planning, organization, direction, coordination and evaluation.

ii. *Educational Administration and School Administration*

- Educational administration is a more comprehensive term. School administration is only a part of it but at the same time it has its own distinct status and a sphere of functioning.
- Educational administration has its primary focus on education. Whereas school administration has its attention primarily on the school. It is more concerned with the institution, its goals, policies and execution of these policies.
- Educational administration is concerned with educational policies, educational planning, direction, coordination and supervision of educational programmes. School administration is concerned only with institutional policies, their direction and control.
- Educational administration is more dynamic in nature than school administration. The former has to face problems of wider nature, variety and implications whereas the latter is concerned with the problems of a localized nature.

iii. *Need of School Administration*

Every administration exists primarily for the purpose of getting things done. The educational institutions are established for the important purpose of educating the children. This important function necessitates ideal provisions of related type and their most efficient management. A modern school system must be administered competently if we expect good results. Complexity of the school system further necessitates a competent administration for ensuring coordination and smooth functioning. On the human side, a healthy cooperation is to be ensured between pupils, teachers, parents, administrators, rulers, writers, social workers, reformers and any other well wishers of the society. On the material side, the maximum benefit is to be drawn from the combined resources of funds, buildings, groups, equipments, and other relevant articles. On the curricular side, maximum assimilation is to be obtained from the collective impact of ideas, courses of study, methods, games and all the allied activities.

Harmonious and integrated development of the children demands a balance between different provisions, opportunities and programmes. Educational administrator will ensure harmony in the functioning of his institution to ensure harmonious development. He

will also produce an integration of all his resources and efforts to achieve integrated development of the children.

Educational administration is concerned both with human element and material resources. It demands an ideal coordination between these two. There cannot be haphazard approach to it. The administration of educational institutions is to set the pace for all types of administrative wings in the society. Education is a goal-oriented activity. It has to produce results and has to satisfy the demands and aspirations of the society. Educational administration has to present an example of efficiency, harmony and economy. The school is one of the important social institutions and as such it is an ideal administrative machinery. There are scores of parents, scores of students, lakhs of teachers, thousands of administrators. Thousands of other serving personnel, a large number of examining bodies, a large number of departments, a large number of policy making agencies, a large number of employers and a large number of suppliers, who have to join their heads and hands to achieve the aims and objectives of education. Only efficient administrative machinery can ensure their cooperation and combined effort. Without this, there is bound to be chaos and confusion in this vast, complicated and many sided human enterprise.

Educational administration is the functional aspect of education. Educational philosophy sets the goals, educational psychology explains the principles of teaching and learning, but administration carries out the schemes, programmes and practices in the schools. It takes care of the process of implementation and execution. It is a must for any sound system of education.

iv. *Aims and objectives of school administration*

School administration is to fulfill various aims and objectives. The most important will be to realize faithfully the goals which are laid down by the community for education.

These aims and objectives can be described as follows:

- To define functions of the school
- To coordinate the school activities.
- To eliminate wastage
- To simplify complexities
- To introduce experimentation

v. *Principles of school administration*

In every administration and more so in school administration, the responsibilities have to be carried out according to certain principles. Administration devoid of principles cannot carry much conviction with the concerned individuals. The discussion of these principles is given below:

- Consistency with the philosophy of education.

- Democratic approach
- Optimum contribution by all
- Respect for individualities.
- Due importance to different programmes.
- Optimistic outlook.
- All round development of the students.
- Professional growth of the teachers.
- School community relationship

vi. *Changing roles and responsibilities of teachers*

Milton Ramario (2010) says, "Effective teaching has to be fluid and adaptive to current culture. The effective teacher understands what skills and knowledge are to be learnt by the pupils. This actually requires the art and science of teaching.

- To integrate art and science of teaching:- The science of teaching requires content knowledge, organization of knowledge, management skills and detailed planning where as the art of teaching requires the basic skills of making interaction with students, parents as well as connecting the curriculum to the world of the present day in a relevant manner. The teacher of 21<sup>st</sup> century is required to maintain cordial, friendly and favorable intentional relationships with students, parents and colleagues for the sake of the success of tomorrow. Success of students is the ultimate goal of education.
- To make a difference: - The teacher is to make a difference. Effective, role appropriate ways for teachers to make a difference for students are:
  - Developing cordial relation and putting positive influences.
  - Close and caring connecting.
  - Healthy social-emotional climate.
  - Development of professional success.
- Development of teacher effectiveness: - Teaching profession is the present era must bear the responsibilities for the competence of its members, which can be achieved through training. Therefore the following definitions are to be realized:

Teacher competency- Any single knowledge, skill or professional value position which a teacher may be said either to possess or not to possess and the possession of which is believed to be relevant to the successful practice of teaching.

- Teacher's abilities in crucial contributors to students learning: - Any competency is assessable. What a teacher does know or believes. In competency we change the teacher not the pupil.
- Teachers need to be able to effective in enabling a diverse group of students:- as the demands on teachers are increasing, teachers are needed to

provide useful information to students, effective in enabling in a diverse group of students to learn more complex material. They are expected to prepare virtually all students for higher order thinking and performance skills, once reserved for only a few.

- Changing role of the teacher to meet issues and challenges of future:- The changing roles and responsibilities of the teacher also demand how to help societies to meet the issues and challenges of future, which comprise decentralization of decision making, autonomy, pedagogical reform from teacher-centered education to learner autonomy and independence, openness to international cultures, global information exchange and development of global education, stressing citizenship, environmental concerns, peace, human rights and international understanding.

The new professional profile of the teachers should include the changing characteristics for raising their social status.

- Promoting values and attitudes leading to the development of community,
- Displaying expertise, knowledge and skills in teaching,
- Guiding learners for self actualization,
- Becoming scientifically, technologically literate,
- Participating for upliftment of teaching profession,
- Being a friend, philosopher and guide to students,
- Developing awareness in children about modern trends and approaches to education.

vii. *Importance of teachers' participation in school administration*

It is generally assumed that motivation influences people's attitude and performance at work. Teacher motivation is directly linked to the instructors' desire to take part in the pedagogical process and interest in sharing their knowledge with the students. It determines their involvement or non-involvement in the teaching activities. Teachers put educational philosophy and objective into the knowledge they transfer to their students. Teachers are the most important factor in a generation's education process, so it is important that they perform to the best of their abilities in the educational activity. Each country's authorities must pay attention to the factors that affect teachers' performance which has a direct effect on students' performance.

Teachers' motivation is influenced by a myriad of factors, including compensation, success in the classroom, their dedication to the profession, the training they receive and the prospect of promotion and career advancement. Compensation influences teacher education, but in many cases it is not the most or the only important factor. Teachers may be compensated

through salaries, bonuses, training programs or special assistance such as shelter and transport support. If teachers are not paid, or if they are not paid on a regular basis, their motivation will be affected and they might start teaching irregularly or leave their jobs. A good teacher compensation system will increase motivation, decrease absenteeism and at the same time create a stabilized and reliable teaching system in the country.

Teachers' motivation is influenced by their working conditions too. An appropriate environment in which the teacher feels safe and healthy and has access to supportive resources and facilities will help teachers participate more in the process of teaching, management and administration. Moreover, teacher motivation is influenced by the number of hours the instructor has to work every week, the number of students in the classroom and at the same time by parents' involvement and support. When teachers are motivated and love their teaching profession they will motivate their students to learn.

Individuals are motivated by money, power or praise. As teachers can't motivate students by offering money or power, they should focus on praise. Some students are self-motivated and their actions are a result of their desire to face challenges. Teachers can praise, promote and encourage this personal trait by showing students their efforts are worthwhile and that they will benefit from them.

Although there is no formula to increase students' self-motivation, there is however a few things teachers can do. Frequent positive feedback on students' work will support their beliefs that they can do well. All students, even low performers, must receive praise individually, but teachers should praise the class as a whole to encourage it and build team unity. However, too much praise will make students become dependent on it and develop no personal initiative. Praise may become only a pleasure for the students instead of a means of motivating them.

Teachers can increase students' self-motivation by helping them find personal meaning in the materials they are being presented with, by creating an open and positive atmosphere in the classroom and by making them feel that they are valued and important members of the learning community.

Students are motivated when the learning material satisfies their own needs or reasons for enrolling in the course. Learning how to perform a task or activity is rewarding and will motivate students more than grades do. Another means of motivating students is by making them active participants in learning. Students learn more effectively by doing, writing, creating and solving. Passivity decreases students' motivation and interest. Students should be encouraged to express their ideas, ask questions and suggest approaches to a problem.

Teachers' expectations have a powerful effect on students' performance. Research has shown that if the teacher acts as though he expects the students to be hardworking and motivated, there are more likely to be so. However, teachers should set realistic goals for their students and assign appropriate tasks. If teachers' standards are too high, there are chances students will feel frustrated they can't meet the expectations and thus become less motivated to learn. Teachers' enthusiasm has a strong impact on students' motivation. Bored and apathetic teachers will transfer their mood to their students who will become less interested in the topic or less motivated to learn.

Another means of increasing students' motivation is to emphasize learning rather than receiving good grades. Teachers should stress the personal satisfaction which results from accomplishing a task and its use in everyday life rather than focusing on complicated grading systems.

#### b) *Review of related literature*

The number of related studies have been reviewed and presented systematically in the following paragraphs. The investigator has thoroughly gone through number of references. It includes Survey of Educational Research, Indian Educational Abstract, Dissertation Abstract and journals through internet and published and unpublished theses and dissertation. The studies conducted in India and Abroad have been categorized and written separately. Reviews have been presented year wise in an ascending order.

##### i. *Studies conducted in India*

*Verma (1989)* found that as far as the leadership behavior of principals as perceived by teachers is concerned, the principal have been rated high on all dimensions as well as leadership as a whole. Further, no significant relationship exists between the leadership behavior of principals with teaching experience and administrative experiences.

*Das (1990)* studied a secondary school principals' administrative behavior and found positive relationship between head's administrative behavior and teacher attitude towards work.

*Mehrotra and Neelima (2002)* found principals of govt. and private schools manifest different leadership styles, the majority of the govt. school principals had low initiation- high consideration style, while majority of private school principals had a unique high initiation high consideration pattern.

*Dinesh (2010)* found aided schools head leadership behavior better than the govt. school head leadership behavior and unaided schools head leadership behavior was better than the govt. schools head leadership behavior.

*Tamang, (2011)* conducted study on the teacher's participation in school administration at the secondary level of education and found that there did

not exist any significance difference in teacher's participation in school administration in relation to experience variation.

ii. *Studies conducted in Abroad*

*Reitzug (1994)* done the work on a case a study of empowering principal behavior and found the school principal is a pivotal figure in participative management.

*Rice and Schneider (1994)* worked on a decade of teacher empowerment and found evidence of a positive relationship between the presence of site-based management initiatives and teacher perceptions of their level of involvement in decision-making in the building.

*Smylie (1994)* conducted the study redesigning teachers work and found initiatives grounded in collective and professional orientations toward teachers work and change are more likely to be associated with classroom improvement than initiatives based on individualistic, hierarchical, and bureaucratic orientations.

*Marks and Louis (1997)* conducted the study does teacher empowerment affect the classroom? The implication of teacher empowerment for instructional practice and student academic performance and found the instructional outcomes of teacher empowerment, used the content dimension of teachers' participation, which they divided into four areas: school operation and management; students school experiences; teachers work life; and classroom instruction.

*Rinehart and Short (1998)* studied teacher empowerment and principal leadership and defined primarily, empowerment has been defined as a process whereby school participants develop the competence to take charge of their own growth and resolve their own problems.

*Rinehart, Short and Eckley (1998)* worked on teacher empowerment and principal leadership and found the relationship between principals and their teachers is a critical factor in determining teachers' perceptions of their empowerment, which in turn enhances their participation in decision making.

*Leithwood and Jantzi (1999)* conducted the study principal and leadership effects and found the effects of teacher participation leadership on student engagement and found no significant relationship. They suggested that the lack of conclusive evidence could be due to the lack of strong quantitative research on the subject and that many educational strategies, when first undergoing rigorous study do not reveal significant findings.

*Blasé and Blasé (1999)* worked on shared governance principals and found the principals sharing their governing roles with teacher in which teachers participate, in various ways and to varying extents, in making decisions in schools that were traditionally made by the principal.

*Blasé and Blasé (2000)* studied principals perspectives on shared governance leadership and found shared governance encompasses other governance or leadership roles that are distinct from decision making including peer supervision or evaluation, action research and school data analysis and leadership in such areas as staff development and personal hiring.

*Barth (2001)* conducted study on teacher leader and found teacher participation is necessary to professionalize and democratize teaching. Furthermore, a democratic school environment is believed to encourage children to participate in and sustain our country system of government.

*Somech and Drach (2001)* conducted study on influence strategies of principals and found participative management and decision making have been in existence since early in the twentieth century, when business and management theorists began to experiment with giving workers some control over their working environments.

*Riesgraf (2002)* conducted study on effects of school-based management practices on decision making for special education and found the decentralization of formal decision-making authority from the district to the building level often including parents, community members, and school staff along with principals and teachers in the decision-making process. Participative decision-making is a more general term that refers to the sharing of decision authority among stakeholders in a given context. It does appear that there is some relationship between SBM and teacher participation in school decision-making.

*Somech (2002)* conducted a study on explicating the complexity of participative management and found teacher participation actually has positive outcomes, and it has been suggested that the lack of a shared understanding among scholars of what teacher participation actually looks like is perhaps the reason for the lack of definite evidence of its effects.

*Crowther, Kaagan, Ferguson and Hann (2002)* conducted study on developing teacher leader and describes in detail an image of teacher leadership as full participation by teachers in developing a shared vision, planning and implementing instructional improvements working with the community and participating in professional development in job-embedded, collegial ways in addition to participation in decision making.

*Morris and Wilson (2004)* note that management involves working with people, thus relations and reconciling these with results. Managing people therefore involves providing leadership, motivating people to achieve stated goals, decision making and managing conflict. The school head as a manager has to manage the organization, through team building,

matching curriculum to need, managing quality and standard, and managing resources and the environment, and the change process within the organization.

c) *Major findings of the reviews*

The major findings from the above reviews are:

- There is relationship between head's administrative behavior and teacher attitude towards work.
- Teachers of girls' school are significantly more responsible professionally than teachers of boys' school.
- In organization function of school administrative teachers play an important role.
- School principal has a pivotal figure in participative management.

d) *Rationale of the study*

The quality of a nation depends upon the quality of its citizens and the quality of citizens depends upon the quality of education. It is said that education is the only device to eradicate disparity, child labor, illiteracy and to bring democratic value like fraternity, equality, justice etc. Teachers are the backbone behind progress and prosperity of a nation. School's administration cannot run smoothly and cannot achieve marvelous performance from students without active participation of teachers. After thorough reviews of theoretical and empirical literature the areas in which the teachers should participate in school administration are Planning, Organizing, Communicating, Controlling, and Evaluation, and then only teacher can help implementation of the developmental programme of the society. In the school, headmaster is considered as a skilled administrator, on whose ability, skill, personality and professional competence will largely depend on the tone and efficiency of the school. He should be a good leader to be able to inspire teachers who work under his direction. In a democracy, he cannot drive them. He should follow democratic leadership which is aimed at increasing the effectiveness and improvement of staff and school because assumption is that administrator is the high school headmaster. In larger school, many of the duties of the administration will be performed of the assistant headmasters and other members of the school staff. Bhagabaji (1984) observed that teachers in charge of games and sports whole heartedly participated or supported the co-curricular activities programme.

In the light of above discussions, it is evident that teacher participation in school administration is gaining importance and also essential for school quality and academic goal achievement.

In the light the following research questions can be asked:-

- Do the higher secondary school teachers participate in school administration?

- Is it satisfactory at the higher secondary level?
- Do the higher secondary school teachers differ in the level of their participation in school administration with regard to their gender, school management and teaching experience variation?

Answers to the above questions provide a backdrop for conducting the present research.

e) *Statement of the problem*

The problem is stated as "*Participation of Higher Secondary School Teachers in School Administration*".

f) *Objectives of the study*

- To study the level of participation of higher secondary school teachers in school administration and to categorize them in different levels of their participation in school administration.
- To find out significant differences if any in the participation of higher secondary school teachers in school administration in relation to gender, school management and teaching experience variation both totally and component wise.
- To find out the main and interaction effect of gender, school management and teaching experience on the levels of participation of higher secondary school teachers in school administration.

g) *Formulation of hypotheses*

The following hypotheses were raised for the study:-

$HO_1$ : There is no significant difference in the degree of participation of higher secondary teachers in school administration.

$HO_2$ : There is no significant difference in the participation of higher secondary school teachers in school administration due to gender, school management and teaching experience variation.

$HO_3$ : There is no significant difference in the participation of higher secondary school teachers in planning aspect in relation to gender, school management and teaching experience variation.

$HO_4$ : There is no significant difference in the participation of higher secondary school teachers in organizing aspect in relation to gender, school management and teaching experience variation.

$HO_5$ : There is no significant difference in the participation of higher secondary school teachers in communicating aspect in relation to gender, school management and teaching experience variation.

$HO_6$ : There is no significant difference in the participation of higher secondary school teachers controlling aspect in relation to gender, school management and teaching experience variation.

$HO_7$ : There is no significant difference in the participation of higher secondary school teachers in evaluation aspect in relation to gender, school management and teaching experience variation.



$H_{0g}$ : There is no interaction effect gender, management and experience together on the participation of higher secondary school teachers in school administration.

#### h) Operational definitions of the terms

*Participation* refers to the involvement, as in some action or attempt.

*School administration* refers to a process that includes the combined operation of a large number of persons whereby the whole fabric of education in the school is maintained in good working conditions.

*Higher Secondary School Teachers* means a Higher Secondary School Teacher of an aided school ranging from class XI to XII.

#### i) Scope and delimitation of the study

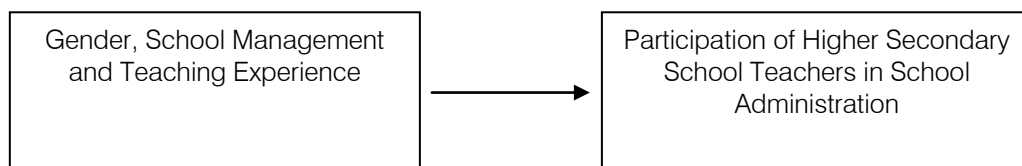
The scope of the study is to ascertain the level of participation of higher secondary school teachers in school administration in relation to their gender, school management and teaching experience variation. Other variables like – age, social economic status, locale, intelligence etc. was not taken into consideration due to time constraint.

The study was delimited to 100 higher secondary school teachers teaching in classes XI and XII of higher secondary schools of siliguri in jalpaiguri district of west Bengal.

## II. METHODOLOGY AND PROCEDURE

In this chapter attempts have been made to highlight on the methodology adopted for conducting the study. So this section presents a brief outline of the design adopted, the sample selected, description of the tool used for the study, techniques of data analysis and procedure.

- *Conceptual framework*



#### b) Sample

A sample of 100 teachers had been selected from 12 higher secondary schools of Jalpaiguri district. These teachers had been categorized as male and female, more experienced and less experienced, Govt. and Private management. These teachers had been selected according to simple random sampling method. The detailed description had been presented in table 1 below.

#### a) Design

The purpose of the study is to find out the participation of higher secondary school teachers in school administration. The study design is descriptive method i.e., normative survey method. Here in the study participation of higher secondary school teachers has been studied in relation to gender, school management and experience. Therefore, it is an ex-post-facto study. The other methods like historical, correlation or experimental study design were not adopted on the following grounds.

Application of historical method had not been adopted in the context of the nature of research. The historical method of research was ideally suited for a study that keeps conditions in the context of forces and factors that operated in the past. This needs primary and secondary data, as well as internal and external evidences. But the present research work was not a development study since it aimed at investigating the factors influencing the dependent variables under the present conditions.

Application of experiment method of research was not thought to be suitable because of its objectives. Experimental method would be a choice in a research study that analyze the effects of predictors on the criterion or experimental designation despite designs were more specific in that they direct attention to particular aspects or dimensions of the research target. The heuristic value to descriptive studies must be considered a major contribution as well consistent with at least one of the objectives of research designs outlined by Selltitz et al (1959, p-50), descriptive studies can reveal potential relationships elaborative investigation later. Here the design was descriptive survey design.

Table 1 : Selection of the sample

SI.No	Schools	Male	Female	Management	Above 10yrs	Below 10yrs	Total
1	Krishnamaya memorial nepali high school	05	03	Govt.	02	06	08
2	Dr Rajendra Prasad girls high school	00	04	Do	02	02	04
3	Nilinalini vidya mandir	03	07	Do	05	05	10
4	Siliguri girls high school	00	10	Do	08	02	10
5	K.V. Bengdubi	04	02	Do	03	03	06
6	K.V. Sevoke road	01	03	Do	02	02	04
7	K.V. Sukna	04	04	Do	04	04	08
8	K.V. Airforce bagdogra	02	04	Do	02	04	06
9	Isabella school	02	05	Private	01	06	07
10	Nirmala convent	06	02	Do	03	05	08
11	Mahbert high school	12	04	Do	08	08	16
12	Don Bosco school	11	2	Do	08	05	13
<b>Total</b>							100

Sample drawn from the above mentioned schools have been stratified under gender, management and experience only and has been presented in table 2.

Table 2 : Description of the sample according to gender, management and experience wise

Variation	Sub – Sample	No. of Teacher
Gender	Male	50
	Female	50
Management	Govt.	56
	Private	44
Experience	Above 10yrs	48
	Below 10yrs	52
Total		100

The stratifications of the sample along the above lines has been made basing upon the research findings of Garg(1983), Hushdil(1985), Verma(1989), Riesgraf (2002) and Morris and Wilson (2004).

First of all samples of 50 male and 50 female were selected on simple random basis from the schools of Jalpaiguri district. Then, they were categorized under management and experience.

### c) Tool Used

Teacher's participation in school administration scale (TPSAS) of Taj (1985) was used to assess the teacher's participation in school administration of higher secondary school of Jalpaiguri district in relation to differential level of gender, school management and teaching experience.

It consists of 27 items in which 5 items are related to planning, 6 items are related to organizing, 7 items are related to communicating, 5 items are

related to controlling and 4 items are related to evaluating.

#### i. Area of Scale

The five areas adequately cover the teachers' participation in school administration and also possess the adequate conceptual framework and content validity.

- *Planning* – Planning is a function, which is fundamental in school administration in which the teacher's should participate. These areas includes items on participation of teachers' in laying out in advance, what to be done, how this is to be done, and who shall be responsible to particular activity in addition to preparing school time table and the school calendar for the academic year.
- *Organizing* – Organizing function is the means or process by which the activities can be co-ordinate to achieve the stated goals of schools. In this area items on procuring and arranging activities and materials systematically both in curricular and extra – curricular area are included.
- *Communicating* – Communication is one of the most important facilitators' teacher effectiveness, without which, facts, ideas and experience cannot be exchanged. The items in this pertain to, how teacher exchange his ideas between himself and his colleagues, head of the school, students and parents.
- *Controlling* – Controlling is the heart of effective school administration. It consists in verifying with the plan adopted. The items covered in this area, all the participation of teachers in taking decisions regarding selection of innovative methods of

teachings, budgets for curricular and extra – curricular activities etc.

- *Evaluation* – It is the core of the school administration, without evaluation, no objective can know to be realized. The items covered in this area,

covers informing progress of students to their parents, judging the suitability and adequacy of physical facilities, instructional materials and evaluating the health status of pupils in school etc. by the teachers.

*Table 3* : Total number of final scale items

Sl. No.	Areas	Serial No. of Items in the Final Scale	Total No. of Items in Each Area
1	Planning	4, 6, 7, 18, 20	5
2	Organizing	1, 2, 5, 11, 15, 27	6
3	Communicating	12, 13, 14, 21, 22, 23, 24	7
4	Controlling	8, 9, 16, 17, 26	5
5	Evaluating	3, 10, 19, 25	4
		Total	27

The responses are recorded against each item under the five point scale always, frequently, occasionally, rarely and never and they have cells ( ) against each response. In this rating scale there were no negative item, all scale items were positive and they were scored equally. The scale continuum has been provide five points on the principle of equal appearing interval pattern and arbitrary weights for each scale point was assigned as follows: the always '5' point, frequently scored '4', occasionally scored '3' and rarely scored '2', never was scored as '1'. Here rater has to rate on samples of teachers from school those who had solved a questionnaire. Teachers were rated on the basis of five components planning, organizing, communicating, controlling and evaluating weights for each components was assigned as 1 for very low, 2 for low, 3 for average, 4 for high and 5 for very high and arbitrary weights for each scale point was assigned as follows: The 'Always' 5 point, 'Frequently' scored 4, 'Occasionally' scored 3 and 'Rarely' scored 2, 'Never' scored as 1. Reliability and Validity of the test is 0.69 and 0.68 respectively.

#### d) *Techniques of Data Collection*

Techniques of analysis for the present investigation includes collection of data, scoring, interpretation of scores in relation to the objectives stated and hypotheses formulated. Questionnaire technique was adopted for collection of data. Scoring was made manually.

For interpretation of scores in teacher's participation in school administration both descriptive and inferential statistics is used. Descriptive statistic have been made use to determine the respondents' standing in the predicting situations whereas, inferential statistics have been used to find out intra-variables effects.

#### e) *Procedure*

In the present investigation the teachers of 12 higher secondary schools have been selected as the

sample. The sample consists of teachers' gender, management and experience.

After planning about sample, the investigator planned about the tools to be used. Taj (1985) scale has been adopted as a tool to find out the teachers' participation in the sample.

The investigator has also planned out the procedure of treating the data. For systematic analysis and interpretation of data the investigator has planned to find out the mean and variance from the raw scores of each group and sub-groups. A brief summary has been given at the end by suggesting recommendation emerging out of the study. The scope for further research in the area has also been presented.

### III. ORGANIZATION OF DATA

In this chapter attempts have been made to present the data in an organized form for verification of the hypotheses and interpretation of the result emerging out of the findings. Thus this chapter was discussed under two heads, administration and scoring and organization of data. Under administration and scoring, the principle of administration of scales, scoring and preparation of data sheet are covered. Under organization of data, all the variable wise subjected for descriptive measures through mean, median, and standard deviation. The details of the procedure were described as per the following.

#### a) *Administration of the scale*

For administration of scale a sample of 100 teachers from 12 higher secondary schools were selected through simple random sampling basis. Certain principles were followed while administering the questionnaire, which were given below:

- The investigator firstly sought permission for the administration of the same from the head of the institute.
- The investigator established rapport with teachers and made clear that neither it is meant for

examining them nor for utilizing the same for any other purpose rather than research.

- Teachers were given proper instructions and clarifications for responding of the items of the scale.
- Before recess the test was administered to make respondents free from mental fatigue.
- They were told to write their responses on the square (□) provided on questionnaire itself.
- There was no fixed time for the test, even though they were requested to complete the same in 50 minutes.

b) *Scoring the of scale*

TPSAS scale was scored as per the manual. As per the variable wise, component wise, question wise and in totality, the data sheet was prepared. The

responses of teachers were scored according to the manual. In this rating scale there were no negative items, all scale items were positive and they were scored equally. The positive items were scored numerically 5, 4, 3, 2, 1 respectively for Always, Frequently, Occasionally, Rarely, Never.

c) *Study of score distribution of Teachers participation in school administration*

The scores were prepared on a data sheet on the ascending order and found out highest and lowest scores. In case of male it ranged from 50 to 135 and from 51 to 109 in case of females. In case of total sample it ranged from 50 to 135.

The distribution of scores of the entire sample along with the sub-samples has been presented in the table 4.

**Table 4 :** Frequency distribution of scores on TPSAS of the total sample and sub-sample of Gender, School management and Teaching experience

C-I	Male	Female	Govt.	Private	Below 10 years	Above 10 Years	Total
130-139	1	0	0	1	0	1	1
120-129	1	0	0	1	0	1	1
110-119	2	0	1	1	1	1	2
100-109	4	2	2	4	3	3	6
90-99	11	9	9	11	12	8	20
80-89	16	21	24	13	16	21	37
70-79	12	14	16	10	17	9	26
60-69	2	2	2	2	2	2	4
50-59	1	2	2	1	1	2	3
Total	50	50	56	44	52	48	100

From the above table it is quite clear that for all the sub samples and total sample, the class interval 80-89 is considered as the modal class interval and shows the tapering trend gradually towards the upper and lower end. It is also observed in case of all the sub samples. Such a distribution gives an impression of scores falling into a normal distribution.

Thus the frequencies and smoothed frequencies have been plotted into a frequency polygon curve with the smoothed frequency polygon super imposed on it. These graphs have been drawn for the total sample, male and female together, govt. and private together, below and above 10yrs experience together. The figures have been displayed in pages as figure i. In order to calculate the percentage of cases for total distribution, a smoothed ogive has also been drawn which has been presented in figure ii, iii, iv, v.

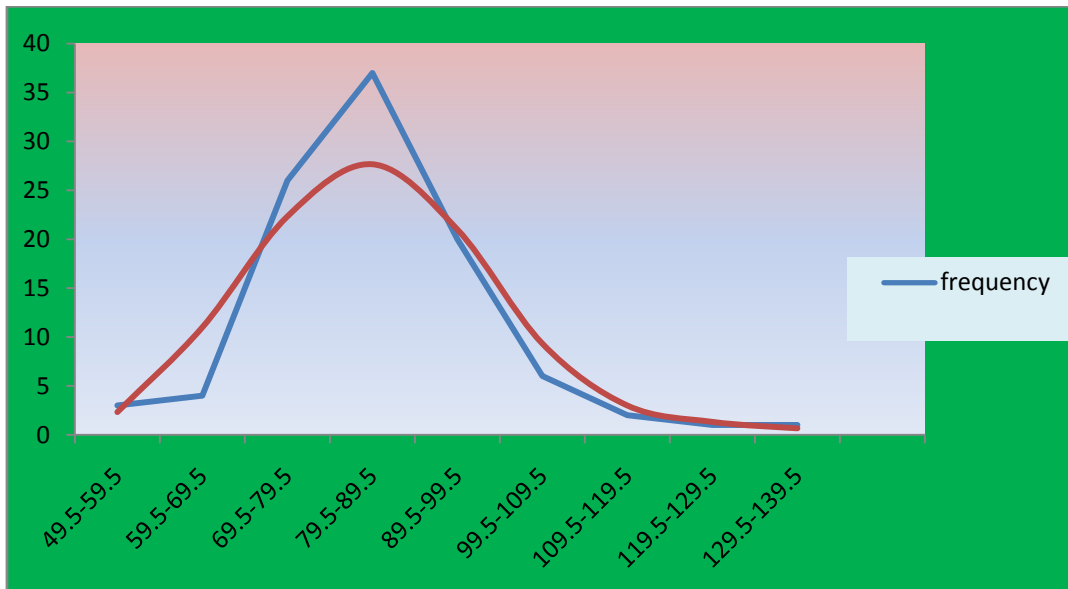


Figure (i) : Frequency polygon of the scores on teachers' participation on school administration with smoothed frequency curve superimposed

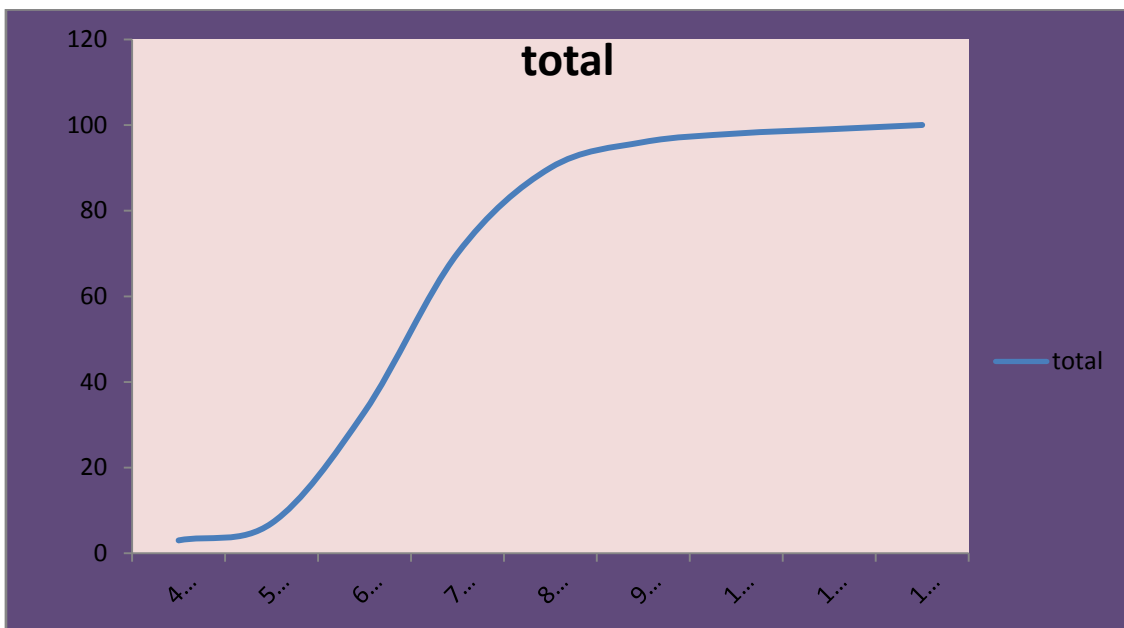


Figure (ii) : Ogive showing total sample on teachers' participation in school administration at the higher secondary level of education

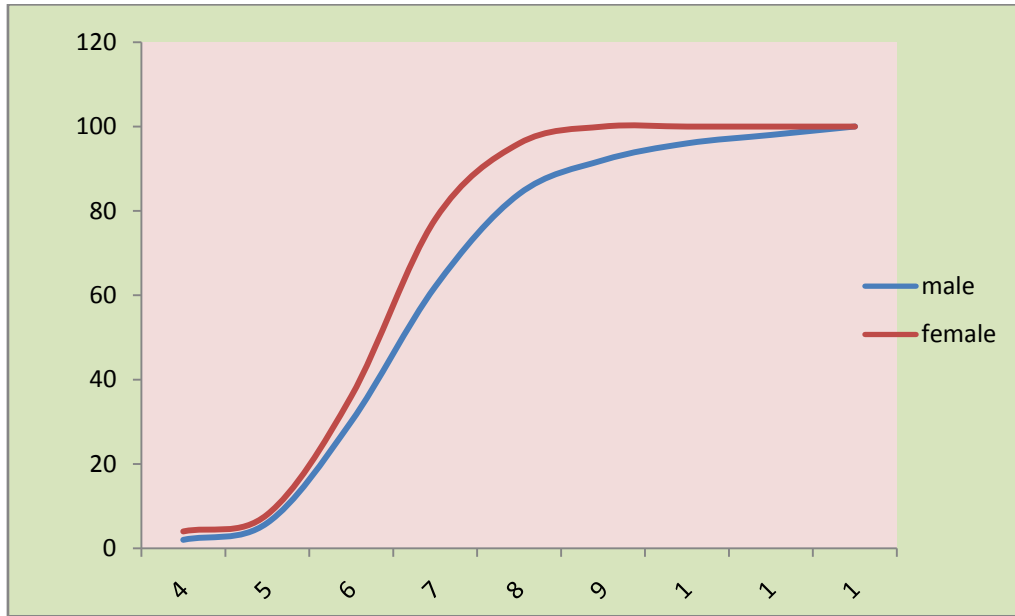


Figure (iii) : Ogive showing male, female sample on teachers' participation in school administration at the higher secondary level of education

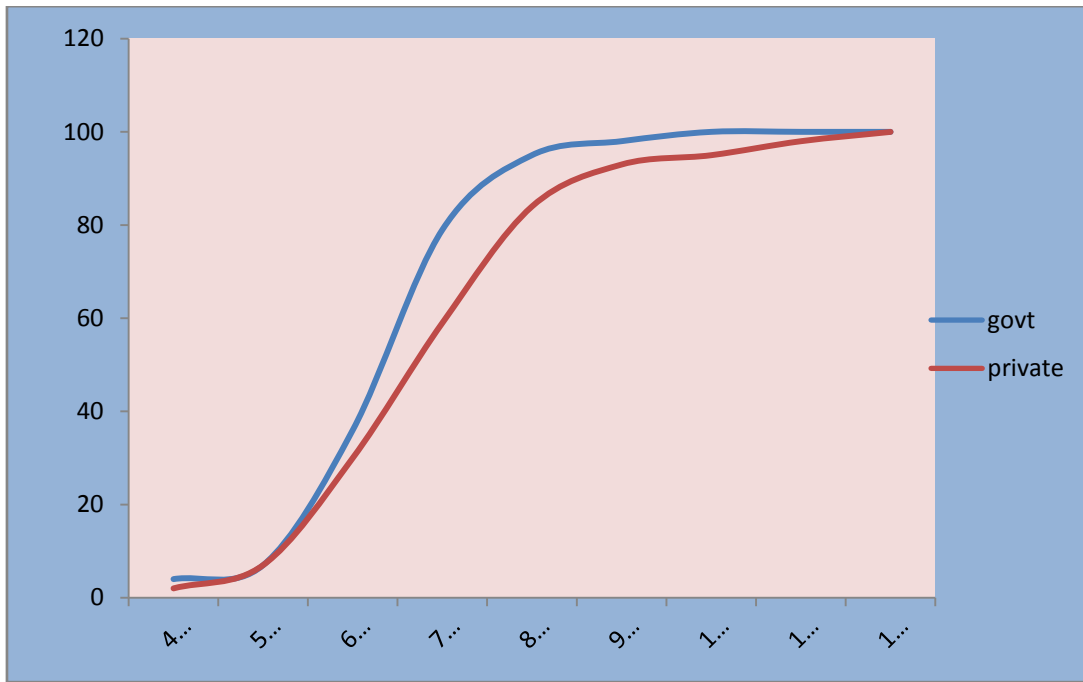


Figure (iv) : Ogive showing govt. and private sample on teachers' participation in school administration at the higher secondary level of education

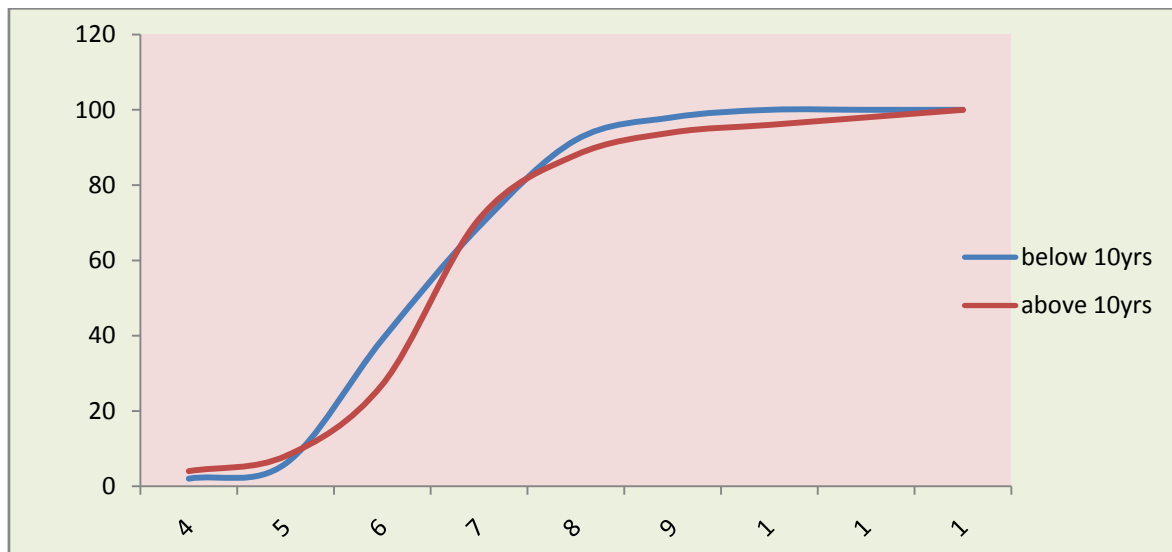


Figure (v) : Ogive showing below and above 10yrs experience on teachers' participation in school administration at the higher secondary level of education

d) Descriptive measure on Teacher's Participation in School Administration Scale (TPSAS)

For studying the score distribution a score frequency table is prepared from the data sheet and on

the descriptive measure like the mean, median, mode and standard deviation of the total sample as well as all sub samples were calculated. The results are shown in the following table and in figure iv.

Table 5 : Descriptive measures on the scores of TPSAS for the total and all the sub samples

Variation	Group	No. of teachers	Mean	median	Mode	SD
Gender	Male	50	87.5	85.75	82.25	14.87
	Female	50	82.3	82.83	83.89	10.45
Management	Govt.	56	82.71	82.83	83.07	10.87
	Private	44	87.68	86.42	83.9	15.04
Teaching experience	Above10years	48	85.96	84.74	82.33	14.7
	Below10 years	52	83.90	83.25	81.95	11.3
Total		100	84.9	84.1	82.5	13.1

On perusal of the above table it was observed that there existed slight differences in the mean scores of males (87.5), females (82.3), govt. (82.71), private (87.68), above 10yrs experience (85.96) and below 10yrs experience (88.90). The median of males, females, govt., private, above 10yrs and below 10yrs were 85.75, 82.83, 82.83, 86.42, 84.74 and 83.25 respectively. The mode of males, females, govt., private, above 10yrs and below 10yrs were 82.25, 83.89, 83.07, 83.9, 82.33 and 81.95 respectively.

The standard deviation of the total sample is 13.1. The  $P_{90}$ ,  $P_{75}$ ,  $P_{25}$  and  $P_{10}$  for the total sample were found to be 99.5, 92, 76.42 and 70.65 respectively. The semi inter quartile range of the distribution is 7.79. The sum of the median and semi inter quartile range was found to be 91.89 and the difference between the two was 76.31. The third and the first quartile of the distribution were 92 and 76.42. If the sum and difference between the median and semi inter quartile range

becomes same with the third quartile and the first quartile, respectively, they give evidence towards normality in distribution of scores. As in the present case they were almost same, it may be inferred that the distribution is approximately a normal distribution.

Mean and Standard Deviation of the distribution are 84.10 and 13.10 respectively. The scores when plotted into a smoothed frequency distribution curve revealed that 79% of cases lie within  $\pm 1SD$ , 91% of cases lie within  $\pm 2SD$  and 100% of cases lie within  $\pm 3SD$  as against 68.26%, 95.44% and 99.77% in case of normal distribution.

Again to claim approximate normality of the data, the skewness and kurtosis of the scores were calculated and found to be 0.18 and 0.27 as against 0 and 0.263 respectively in case of a normal curve. Hence the distribution is positively skewed and platykurtic. The scores obtained by teachers on TPSAS deviates slightly from normality.

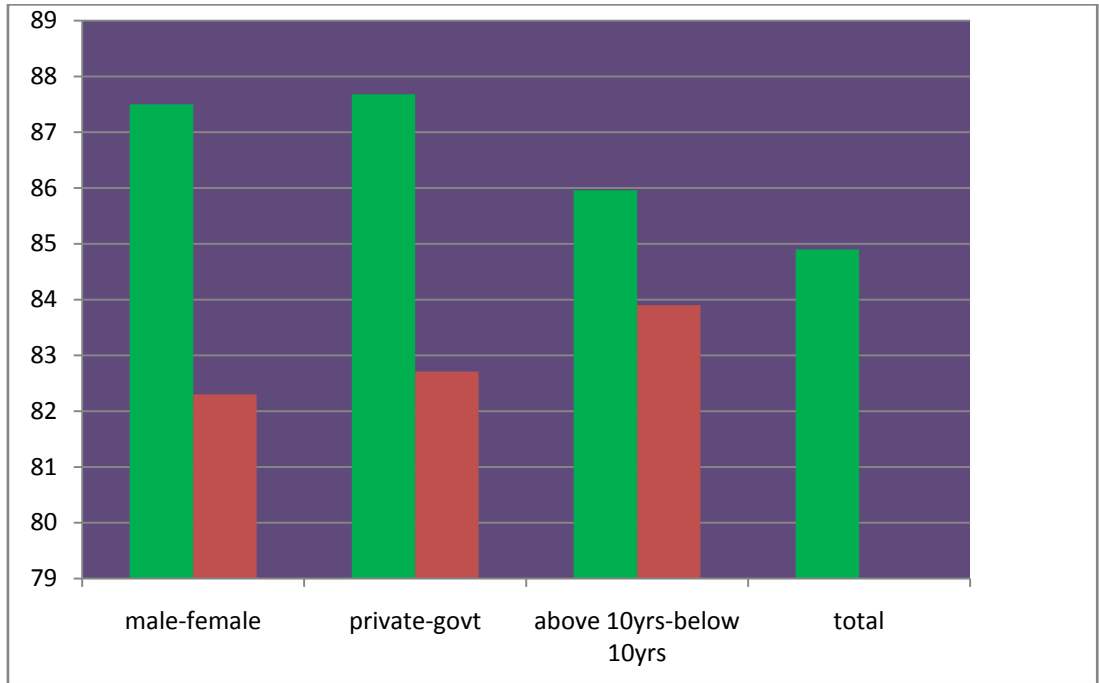


Figure (vi) : Bar diagram showing the mean scores of males, females, private, govt., above 10yrs, below 10yrs and total sample

e) Component wise descriptive measures on TPSAS

The calculated mean, standard deviation of sub samples based on component wise were grouped together and presented in the table below.

Table 6 : Mean and Standard deviation of the components of TPSAS

Group	N	Planning		Organizing		Communicating		Controlling		Evaluating	
		M	S.D	M	S.D	M	S.D	M	S.D	M	S.D
Male	50	16.48	4.56	19.58	3.50	23.76	4.87	14.88	4.19	13.84	2.87
Female	50	14.92	3.53	18.50	3.08	23.16	3.39	13.2	3.28	12.74	2.32
Govt.	56	14.89	3.47	18.88	3.14	23.16	3.41	13.4 3	3.30	12.82	2.65
Private	44	16.73	4.69	19.25	3.57	23.84	5.00	14.86	4.32	13.89	2.58
Above 10yrs	48	15.75	4.39	19.17	3.78	23.54	4.15	14.33	4.21	13.19	2.83
Below 10yrs	52	15.65	3.94	18.92	2.89	23.38	4.12	13.81	3.47	13.38	2.51
Total	100	15.70	4.26	19.04	3.23	23.46	4.13	14.06	4.12	13.29	2.46

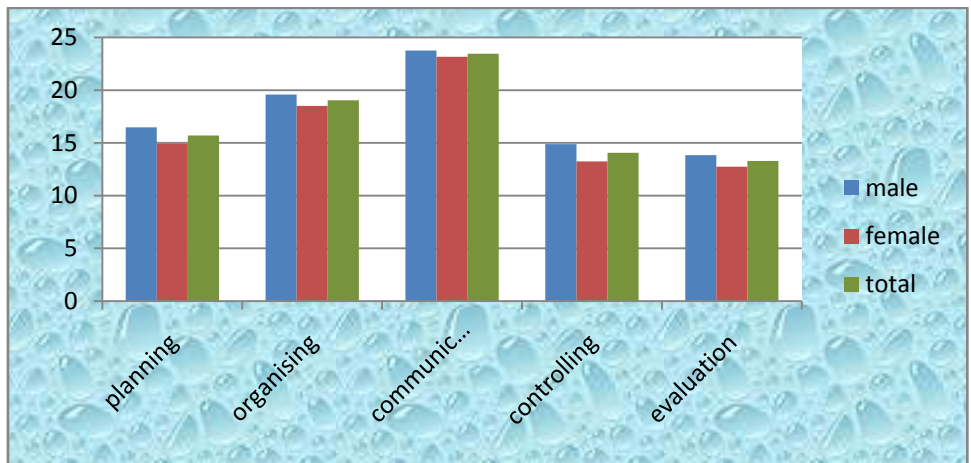


Figure (vii) : Bar graph showing the component wise mean score of male, female and total sample according to differential levels of the participations of teachers in school administration



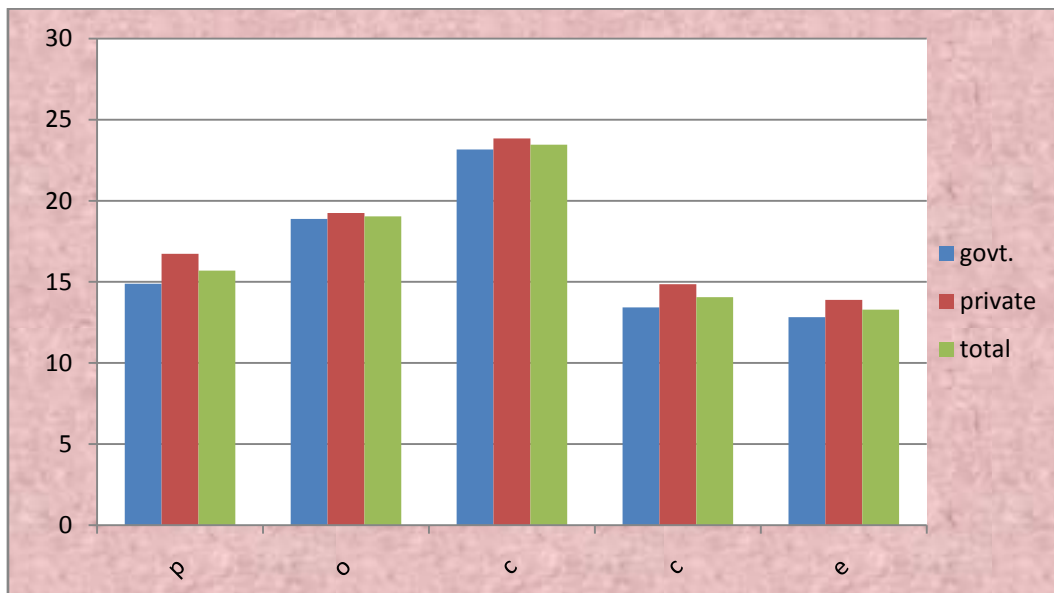


Figure (viii) : Bar graph showing the component wise mean score of govt., private and total sample according to differential levels of the participations of teachers in school administration

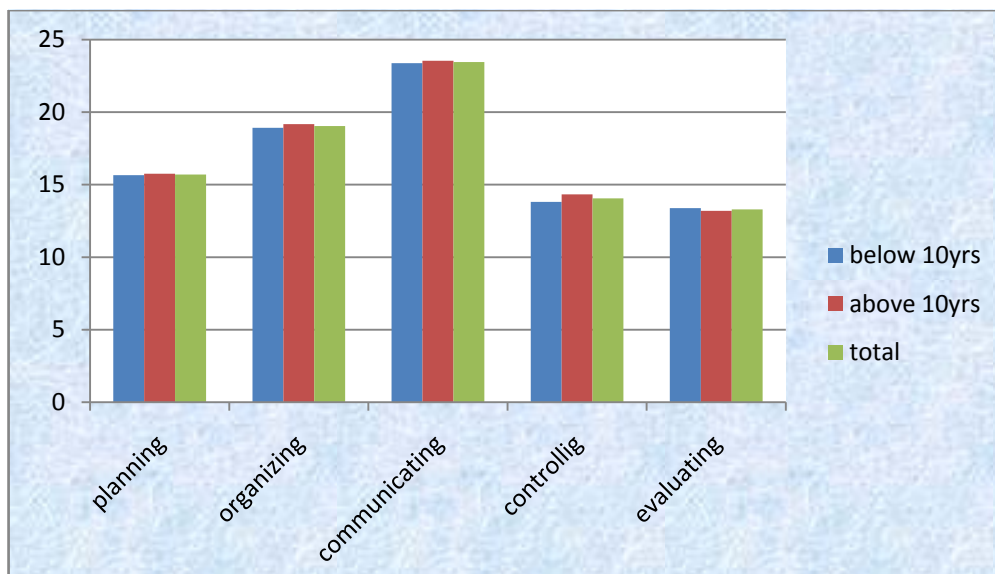


Figure (ix) : Bar graph showing the component wise mean score of below, above 10yrs experience and total sample according to differential levels of the participations of teachers in school administration

f) *Categorization of the total number of teachers in sample as per the level of their participation*

It has been earlier mentioned that one of the objectives of the study is to find out teachers participation in different level of school administration. For this scores on school administration were considered and six levels were decided as teachers with extremely high participation, high, above average, below average, low and extremely low participation. For determining the teachers with different degrees of participation, the cutoff point was decided as  $\pm 2\sigma$  and above,  $1\sigma$  to  $2\sigma$ ,  $M \pm 1\sigma$ ,  $-1\sigma$  to  $-2\sigma$ ,  $-2\sigma$  and below for extremely high, high, average, low and extremely low

participation respectively. The percentage of the sample in different degrees were calculated and presented in table below.

Table 7 : Categorization of total number of teachers as per the level of participation in school administration

Degree of participation	sigma limit	Score range	No. of teachers	% of teachers
Extremely high participation	+2σ and above	112 and above	5	5
High participation	1σ to 2σ	99 – 111	7	7
Average participation	M ±1σ	72 – 98	79	79
Low participation	-1σ to -2σ	59 – 71	5	5
Extremely low participation	-2σ and below	below 46	4	4

The table shows that 12% of total sample were regarded to have high level of participation and 79% having average participation and 9% are having low participation level as against 16%, 68% and 16%

respectively. The categorization was not according to the normal curve owing to sampling error. The bar graph diagram showing the categorization of sample of teacher's participation has been shown in figure x.

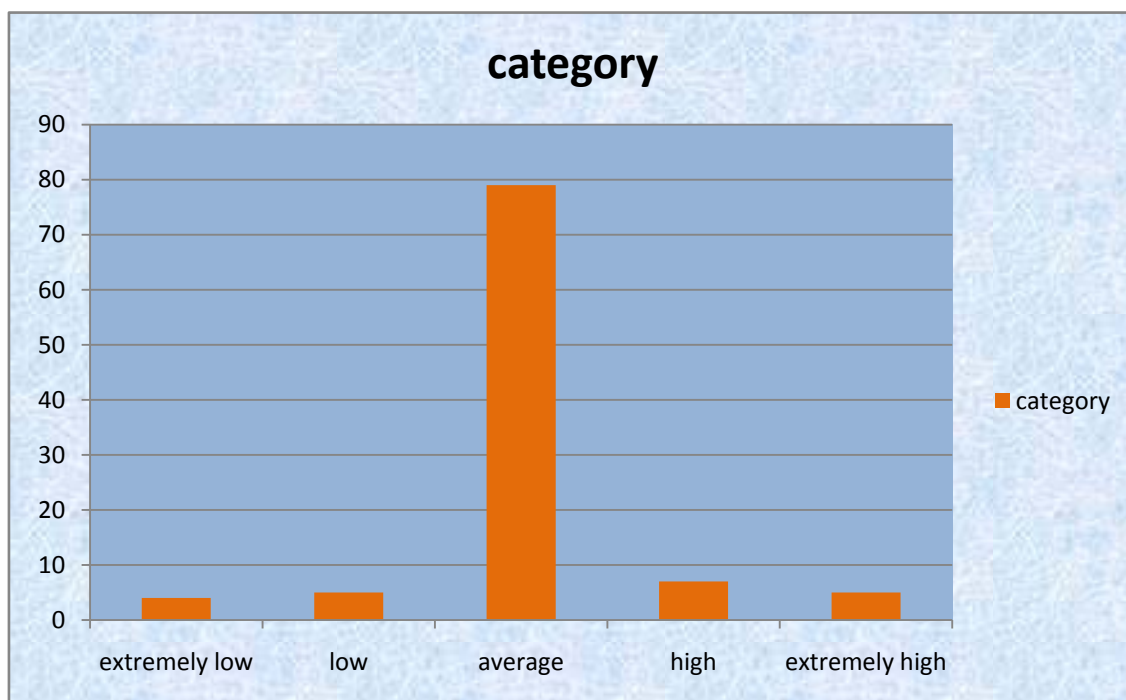


Figure x : Bar graph showing the categorization of sample according to differential levels of the participations of teachers in school administration

#### IV. ANALYSIS AND INTERPRETATION

In the first chapter, it has been attempted to delineate the problem content and the problem focus from a theoretical stand point. It also focuses on the rationale of the study, sources of ideas through review of related literature and the statement of the problem along with its objectives, hypotheses, scope and limitations. An attempt has been made in the second chapter for describing the design and procedures adopted for the study. The third chapter focused on the collection of data and results emerging there from. A sincere attempt has been made in this chapter to analyze the results in terms of the objectives stated and hypotheses formulated.

##### a) Assessment of the categorization of sample

One of the objectives of the study was to categorize the higher secondary school teachers in different levels of their participation in school administration. Therefore, the null hypothesis was formulated as "there is no significant difference in the degree of participation of higher secondary school teachers in school administration". In order to test the significance of difference  $\chi^2$  test was applied. First, all the samples were categorized under the 5 levels. The frequencies were observed as 5, 7, 79, 5, 4 respectively. Then, the  $\chi^2$  test of normality was applied and the result has been presented in table 8.

Table 8 : Chi-square test of normality on teacher's participation

fo	fe	fo-fe	(fo-fe) <sup>2</sup>	$\frac{(fo - fe)^2}{fe}$
5	20	-15	225	11.25
7	20	-13	169	8.45
79	20	59	3481	174.05
5	20	-15	225	11.25
4	20	-16	256	12.80
N= 100				$\chi^2 = 217.80$

Critical value of ' $\chi^2$ ' with df (4) at 0.01 = 13.277 and at 0.05 = 9.488

The Chi-square value was found to be 217.80 on the present study which was more than the critical value at 0.05 and 0.01 levels. The Chi-square was highly significant and consequently the null hypothesis was rejected. Hence, it can be concluded that there is significant difference in the degree of participation of higher secondary school teachers in school administration.

b) *Sub-Sample wise differential analysis on teachers' participation*

The present sub-sample analysis has been attempted to meet the objective of testing the null hypothesis ( $H_0$ ) stated earlier and presented in this report in earlier chapter. In case of each sub-sample, first the null hypotheses have been set up according to the requirements of the problem. The level of significance for the test has been selected and the data and data are subjected to the test of significance. On the basis of 't' value for corresponding degrees of

freedom. The calculated value of 't' was compared where a decision rule was framed. If the calculated value of 't' is larger than the table value of 't' the null hypothesis was rejected and the alternate hypothesis was accepted. If the calculated value of 't' is less than the table value of 't' the null hypothesis was accepted and interpretation of result was made accordingly.

i. *Gender wise differential analysis on teacher's participation*

Gender is also found to be an important co-variable of administration by a number of researchers. In the sample 50% of the teachers were female and rest was male. Their scores on participation in school administration were calculated for determining the significance of difference between the mean of male teachers and female teachers. The 't' test was adopted and the value of 't' ratio was calculated and presented in table 9.

Table-9 : Summary of test of significance of difference between the mean score due to gender variation

Sub-sample	N	Mean	SD	SE <sub>D</sub>	't'	Remark
Male	50	87.5	14.87	2.57	2.02	$p < 0.05$
Female	50	82.3	10.45			

Critical value of 't' with df (98) at 0.01 = 2.63 and at 0.05 = 1.98

From the above table it was revealed that the 't' ratio was significant at 0.05 level of significance. The 't' ratio being 2.02 is more than the table value of 't' which is 1.98 at 0.05 level of significance at 98 degrees of freedom. Therefore, null hypothesis  $H_{01}$  that there does not exist significant difference between the teachers participation in school administration in relation to gender variation was rejected. From the means of the male and female teachers, it was quite evident that the male teachers had more participation in school administration than the female teachers. It is due to the fact that the male teachers are more accountable, committed and has less burden and they have less work load as compared to female teachers. Owing to these factors, the findings in the present case can be considered as final.

ii. *Management wise differential analysis on teachers' participation*

One of the objectives of the study was to be found out if there exists any difference in type of school

of the teacher's participation in school administration, therefore the null hypothesis that state. There does not exist significant difference in the participation of higher secondary school teachers in school administration due to management.

In order to find out difference if any in the scores of participation of teachers of private and government schools, the test of significance of difference between the means of two sub sample was calculated and tested for significance.

In the sample there were 56% of the teachers working in government managed schools and 44% were in the private school. The 't' ratio was calculated and presented in table 10.

Table-10 : Summary of test of significance of difference between the mean score due to management variation

Sub-sample	N	Mean	SD	S <sub>ED</sub>	't'	Remark
Govt.	56	82.71	10.87	2.69	1.84	NS
Private	44	87.68	15.04			

Critical value of 't' with df 98 at 0.01 = 2.63 and at 0.05 = 1.98

The above table reveals that the 't' ratio was not significant even at 0.05 level of significance. The 't' ratio being 1.84 is less than the table value of 't' which is 1.98 at 0.05 level of significance at 98 degrees of freedom. Therefore, null hypothesis H<sub>0</sub> that there does not exist significant difference between the teachers participation in school administration in relation to management variation could not be rejected. Hence, the 't' ratio could not be significant with slight deviation of 0.14. From the means of the govt. and private teachers, it was quite evident that the private school teachers had more participation in school administration than the govt. school teachers. It is due to the fact that the private school teachers are more accountable, committed and has the pressure from the management to participate

actively in different aspects of school administration. Owing to these factors, the findings in the present case can be considered as final. The finding was in conformity with the earlier studies reported by Dinesh (2010).

iii. *Teaching Experience wise differential analysis on teachers' participation*

Teaching experience also has a significant role to play in effective teaching and learning process. A teacher with some years of experience in teaching would be able to deliver better to the students. It is because experienced teachers through their experience are more organized, conscious and can also handle the situation with more ease.

Table-11 : Summary of test of significance of difference between the mean score due to teaching experience variation

sub-sample	n	mean	sd	se <sub>d</sub>	't'	remark
below 10yrs	52	83.90	11.30	2.64	0.78	ns
above 10yrs	48	85.96	14.70			

Critical value of 't' with df 98 at 0.01 = 2.63 and at 0.05 = 1.98

The above table revealed that the 't' ratio was not significant even at 0.05 level of significance. The 't' ratio being 0.78 is less than the table value of 't' which is 1.98 at 0.05 level of significance at 98 degrees of freedom. Therefore, null hypothesis H<sub>0</sub> that there does not exist significant difference between the teachers participation in school administration in relation to teachers experience variation could not be rejected. Hence, the 't' ratio could not be significant with deviation of 1.20. From the means it was revealed that above 10yrs experience teachers had more participation in school administration than the below 10yrs experience teachers. It is due to the fact that the above 10yrs experience has more experience in teaching-learning field and they follow systematic way as compare to below 10yrs experience teachers.

i. *Differential analysis on teacher's participation on planning aspect due to gender, management and experience variation*

One of the objectives was to ascertain the percentage of teacher taking part in planning of administration system in relation to gender, management and experience. Therefore the null hypotheses in planning that there does not exist any significant difference in teacher's participation in school administration in relation to gender, management and experience variation were formulated. In order to find out difference if any in the scores on teacher participation in school administration, the test of significance of difference between the two sub samples were calculated and tested for significant. The result has been presented below:

c) *Component wise differential analysis on the subsamples of TPSAS*

An attempt has been made by the investigator to highlight the component-wise differences of teacher's participation in school administration in relation to all sub-samples. For this 't' ratio was calculated and presented in table.

**Table-12 :** Summary of test of significance of difference between subsamples on planning aspect

Variation	Subsample	N	M	SD	SE <sub>D</sub>	df	T	Remarks
Gender	Male	50	16.48	4.56	0.82	98	1.90	NS
	Female	50	14.92	3.53				
Management	Govt.	56	14.89	3.47	0.85	98	2.16	p<0.05
	Private	44	16.73	4.69				
Experience	Below 10yrs	52	15.65	3.94	0.84	98	0.12	NS
	Above 10yrs	48	15.75	4.39				

Critical value of 't' with df 98 at 0.01 = 2.63 and at 0.05 = 1.98

It was observed from the above table that in gender variation mean and standard deviation of male and female teachers was found to be 16.48, 14.92, 4.56, 3.53 respectively & the 't' ratio was found to be 1.90. In case of management variation mean and standard deviation of govt. and private teachers was found to be 14.89, 16.73, 3.47, 4.69 respectively & the 't' ratio was found to be 2.16. In case of experience variation mean and standard deviation of below 10yrs and above 10yrs teachers was found to be 15.65, 15.75, 3.94, 4.39 respectively & the 't' ratio was found to be 0.12.

"t" value of gender and experience variation was found to be less than the table value 1.98 at 0.05 level in 98 degree of freedom, which is not significant. Hence, the formulated hypotheses HO<sub>3</sub> that there does not exist significant difference in the higher secondary school teachers participation in planning aspect in relation to gender and teachers experience variation was accepted and "t" value of management variation was found to be more than the table value 1.98 at 0.05 level in 98 degree of freedom, which is significant. Hence, the formulated hypotheses HO<sub>3</sub> that there does not exist significant difference in the higher secondary school

teacher's participation in planning aspect in relation to management variation were rejected. From the mean scores in different contrasting subsamples, it was found that male, private and more experience teachers had more participation in planning aspect.

ii. *Differential analysis on teacher's participation on organizing aspect due to gender, management and experience variation*

One of the objectives was to ascertain the percentage of teacher taking part in organizing of administration system in relation to gender, management and experience. Therefore the null hypotheses in organizing that there does not exist any significant difference in teacher's participation in school administration in relation to gender, management and experience variation were formulated. In order to find out difference if any in the scores on teacher participation in school administration, the test of significance of difference between the two sub samples were calculated and tested for significant. The result has been presented below:

**Table-13 :** Summary of test of significance of difference between subsamples on organizing aspect

Variation	Subsample	N	M	SD	SE <sub>D</sub>	df	T	Remarks
Gender	Male	50	19.58	3.50	0.66	98	1.64	NS
	Female	50	18.50	3.08				
Management	Govt.	56	18.88	3.14	0.69	98	0.54	NS
	Private	44	19.25	3.57				
Experience	Below 10yrs	52	18.92	2.89	0.68	98	0.37	NS
	Above 10yrs	48	19.17	3.78				

Critical value of 't' with df 98 at 0.01 = 2.63 and at 0.05 = 1.98

It was observed from the above table that in gender variation mean and standard deviation of male and female teachers was found to be 19.58, 18.50, 3.50, 3.08 respectively & the 't' ratio was found to be 1.64. In case of management variation mean and standard deviation of govt. and private teachers was found to be 18.88, 19.25, 3.14, 3.57 respectively & the 't' ratio was found to be 0.54. In case of experience variation mean and standard deviation of below 10yrs and above 10yrs

teachers was found to be 18.92, 19.17, 2.89, 3.78 respectively & the 't' ratio was found to be 0.37.

"t" value of all the variation was found to be less than the table value 1.98 at 0.05 level in 98 degree of freedom, which is not significant. Hence, the formulated hypotheses HO<sub>4</sub> that there does not exist significant difference in the higher secondary school teachers' participation in organizing aspect in relation to gender, management and teachers experience variation was

rejected. From the mean scores in different contrasting subsamples, it was found that male, private and more experience teachers had more participation in organizing aspect.

iii. *Differential analysis on teacher's participation on communicating aspect due to gender, management and experience variation*

One of the objectives was to ascertain the percentage of teacher taking part in communicating of administration system in relation to gender,

management and experience. Therefore the null hypotheses in communicating that there does not exist any significant difference in teacher's participation in school administration in relation to gender, management and experience variation were formulated. In order to find out difference if any in the scores on teacher participation in school administration, the test of significance of difference between the two sub samples were calculated and tested for significant. The result has been presented below:

**Table-14 :** Summary of test of significance of difference between subsamples on communicating aspect

Variation	Subsample	N	M	SD	SE <sub>D</sub>	df	t	Remarks
Gender	Male	50	23.76	4.87	0.84	98	0.71	NS
	Female	50	23.16	3.39				
Management	Govt.	56	23.16	3.41	0.88	98	0.77	NS
	Private	44	23.84	5				
Experience	Below 10yrs	52	23.38	4.12	0.83	98	0.19	NS
	Above 10yrs	48	23.54	4.15				

Critical value of 't' with df 98 at 0.01 = 2.63 and at 0.05 = 1.98

It was observed from the above table that in gender variation mean and standard deviation of male and female teachers was found to be 23.76, 23.16, 4.87, 3.39 respectively & the 't' ratio was found to be 0.71. In case of management variation mean and standard deviation of govt. and private teachers was found to be 23.16, 23.84, 3.41, 5 respectively & the 't' ratio was found to be 0.77. In case of experience variation mean and standard deviation of below 10yrs and above 10yrs teachers was found to be 23.38, 23.54, 4.12, 4.15 respectively & the 't' ratio was found to be 0.19.

"t" value of all the variation was found to be less than the table value 1.98 at 0.05 level in 98 degree of freedom, which is not significant. Hence, the formulated hypotheses  $H_{05}$  that there does not exist significant difference in the higher secondary school teachers' participation in communicating aspect in relation to gender, management and teachers experience variation was rejected. From the mean scores in different contrasting subsamples, it was found that male, private

and more experience teachers had more participation in communicating aspect.

iv. *Differential analysis on teacher's participation on controlling aspect due to gender, management and experience variation*

One of the objectives was to ascertain the percentage of teacher taking part in controlling of administration system in relation to gender, management and experience. Therefore the null hypotheses in controlling that there does not exist any significant difference in teacher's participation in school administration in relation to gender, management and experience variation were formulated. In order to find out difference if any in the scores on teacher participation in school administration, the test of significance of difference between the two sub samples were calculated and tested for significant. The result has been presented below:

**Table-15 :** Summary of test of significance of difference between subsamples on controlling aspect

Variation	Subsample	N	M	SD	S <sub>ED</sub>	df	t	Remarks
Gender	Male	50	14.88	4.19	0.75	98	2.19	$p < 0.05$
	Female	50	13.24	3.28				
Management	Govt.	56	13.43	3.30	0.78	98	1.83	NS
	Private	44	14.86	4.32				
Experience	Below 10yrs	52	13.81	3.47	0.77	98	0.68	NS
	Above 10yrs	48	14.33	4.21				

Critical value of 't' with df 98 at 0.01 = 2.63 and at 0.05 = 1.98

It was observed from the above table that in gender variation mean and standard deviation of male and female teachers was found to be 14.88, 13.24, 4.19, 3.28 respectively & the 't' ratio was found to be 2.19. In case of management variation mean and standard deviation of govt. and private teachers was found to be 13.43, 14.86, 3.30, 4.32 respectively & the 't' ratio was found to be 1.83. In case of experience variation mean and standard deviation of below 10yrs and above 10yrs teachers was found to be 13.81, 14.33, 3.47, 4.21 respectively & the 't' ratio was found to be 0.68.

"t" value of management and experience variation was found to be less than the table value 1.98 at 0.05 level in 98 degree of freedom, which is not significant. Hence, the formulated hypotheses  $H_{06}$  that there does not exist significant difference in the higher secondary school teachers participation in controlling aspect in relation to management and teachers experience variation was accepted and "t" value of gender variation was found to be more than the table value 1.98 at 0.05 level in 98 degree of freedom, which is significant. Hence, the formulated hypotheses  $H_{06}$  that there does not exist significant difference in the

higher secondary school teacher's participation in planning aspect in relation to gender variation were rejected. From the mean scores in different contrasting subsamples, it was found that male, private and more experience teachers had more participation in controlling aspect.

v. *Differential analysis on teacher's participation on evaluating aspect due to gender, management and experience variation*

One of the objectives was to ascertain the percentage of teacher taking part in evaluation of administration system in relation to gender, management and experience. Therefore the null hypotheses in evaluation that there does not exist any significant difference in teacher's participation in school administration in relation to gender, management and experience variation were formulated. In order to find out difference if any in the scores on teacher participation in school administration, the test of significance of difference between the two sub samples were calculated and tested for significant. The result has been presented below:

*Table-16* : Summary of test of significance of difference between subsamples on evaluating aspect

Variation	Subsample	N	M	SD	SE <sub>p</sub>	df	t	Remarks
Gender	Male	50	13.84	2.87	0.52	98	2.12	$p < 0.05$
	Female	50	12.74	2.32				
Management	Govt.	56	12.82	2.65	0.53	98	2.02	$p < 0.05$
	Private	44	13.89	2.58				
Experience	Below 10yrs	52	13.38	2.51	0.54	98	0.35	NS
	Above 10yrs	48	13.19	2.83				

Critical value of 't' with df 98 at 0.01 = 2.63 and at 0.05 = 1.98

It was observed from the above table that in gender variation mean and standard deviation of male and female teachers was found to be 13.84, 12.74, 2.87, 2.32 respectively & the 't' ratio was found to be 2.12. In case of management variation mean and standard deviation of govt. and private teachers was found to be 12.82, 13.89, 2.65, 2.58 respectively & the 't' ratio was found to be 2.02. In case of experience variation mean and standard deviation of below 10yrs and above 10yrs teachers was found to be 13.38, 13.19, 2.51, 2.83 respectively & the 't' ratio was found to be 0.35.

"t" value of gender and management variation was found to be more than the table value 1.98 at 0.05 level in 98 degree of freedom, which is significant. Hence, the formulated hypotheses  $H_{07}$  that there does not exist significant difference in the higher secondary school teachers participation in evaluation aspect in relation to gender and management variation was rejected and "t" value of experience variation was found to be less than the table value 1.98 at 0.05 level in 98 degree of freedom, which is not significant. Hence, the formulated hypotheses  $H_{07}$  that there does not exist

significant difference in the higher secondary school teacher's participation in evaluation aspect in relation to experience variation could not be rejected. From the mean scores in different contrasting subsamples, it was found that male, private and more experience teachers had more participation in evaluating aspect.

d) *Study of significance of difference between subsamples of gender, management and experience through ANOVA on teacher's participation in school administration*

The main objective of the study was to assess the main effect of gender, management and experience on teacher's participation in school administration. In this context the null hypothesis formulated was that, "There is no interaction effect of gender, management and experience together on the participation of higher secondary school teachers in school administration". Therefore an ANOVA was applied to test the result. For this purpose the 3 groups (gender, management and experience) were categorized under 8 subgroups like male, govt. and below 10yrs experience teachers; male, govt. and above 10yrs experience teachers; male,

private and below 10yrs experience teachers; male, private and above 10yrs experience teachers; female, govt. and below 10yrs experience teachers; female,

private and below 10yrs teachers; female, private and above 10yrs teachers; female, govt. and above 10yrs teachers. The result was presented in the table 17.

*Table-17* : Test of significance of difference between subsamples through ANOVA on participation of teachers in school administration

Sources of variance	Sum of squares	df	Mean square variance	f	Remark
Between groups	1779	7	254.14	0.133	NS
Within groups	175564	92	1908.30		
Total	177343	99	1791.34		

'F' ratio for (92, 7) df at 0.05 = 2.04

From the above table it was observed that the f ratio was 0.133 which was quite less than the table value of f ratio for (92, 7) df at 0.05 = 2.04 therefore the null hypothesis that there is no interaction effect of gender, management and experience together on the participation of higher secondary school teachers in school administration could not be rejected. Hence it can be concluded that the teacher's belonging to different groups on gender, management and experience did not differ significantly with respect to their level of participation in school administration. The result could be quite clear from the analysis of the results obtained through 't' ratios.

## V. SUMMARY AND RECOMMENDATION

### a) The Summary

A teacher does not confine himself to the programme mere giving of information he goes for beyond it. He links his teaching with the ultimate values of life. He must be conscious of the inadequacies of the present social, economic, religious and moral environment and strive to create in his pupil a desire to leave the world a better place than he found it. The teaching professions demands deep understanding, reasoning power, power of discrimination, originality, imagination, memory, alertness, tactfulness, resourcefulness and foresight. Only a person possessing above average intelligence can face successfully the problem arising in the job. It is desirable for a teacher to possess an intellectual bent of mind, and his pursuits and engagements must be intellectual in nature rather than recreational and materialistic.

The teacher's job is a challenge for even the most capable. Its duties and function are unlimited in number. Major areas of teachers' participation in school administration are:

- Planning: An unplanned administration will not very far. Only a planned approach can achieve desired results. A haphazard approach will block the channel and process of administration. The rules of administration, which make it smooth and systematic, are also a part of this planning. When administration is to act as the agency to solve

problems, it must first give thought to them and plan the steps to be taken for solving any one of them.

- Organization: It is the fundamental task in every administration. Organization is the machine for getting things done. It is chiefly concerned with provisions, arrangements and manpower which enable the administration to carry out its obligations. With the organization of materials we raise a structure for the school.
- Direction: Direction represents leadership, which has a key role to play in administration. This is the authority which directs work and gets things done. It is held by a person who is responsible for making decisions, issuing them in the form of orders or directions and getting them implemented.
- Co-ordination: In administration, there is always the involvement of a number of things and persons. It is the domain of coordination which produces in all of them a sort of oneness, single-mindedness and collective effort. It serves as a lubricant in the administrative machinery for its smooth functioning.
- Evaluation: He has to carry out frequent evaluation of the progress of the students also. This is a part of his teaching duties and it helps immensely in his process of teaching. It gives an opportunity to discover the students' deficiencies, difficulties and possibilities. Teaching can proceed in the light of achievements from individual to individual. Bhagabji (1984) observed that teachers in charge of games and sports whole heartedly participated or supported the co-curricular activities to the programme.

### i. Rationale of the Study

The quality of a nation depends upon the quality of its citizens and the quality of citizens depends upon the quality of education. It is said that education is the only device to eradicate disparity, child labor, illiteracy and to bring democratic value like fraternity, equality, justice etc. Teachers are the backbone behind progress and prosperity of a nation. School's administration cannot run smoothly and cannot achieve marvelous performance from students without active participation



of teachers. After thorough reviews of theoretical and empirical literature the areas in which the teachers should participate in school administration are Planning, Organizing, Communicating, Controlling, and Evaluation, and then only teacher can help implementation of the developmental programme of the society. In the school, headmaster is considered as a skilled administrator, on whose ability, skill, personality and professional competence will largely depend on the tone and efficiency of the school. He should be a good leader to be able to inspire teachers who work under his direction. In a democracy, he cannot drive them. He should follow democratic leadership which is aimed at increasing the effectiveness and improvement of staff and school because assumption is that administrator is the high school headmaster. In larger school, many of the duties of the administration will be performed of the assistant headmasters and other members of the school staff. Bhagabaji (1984) observed that teachers in charge of games and sports whole heartedly participated or supported the co-curricular activities programme.

In the light of above discussions, it is evident that teacher participation in school administration is gaining importance and also essential for school quality and academic goal achievement.

In the light the following research questions can be asked:-

- Do the higher secondary school teachers participate in school administration?
- Is it satisfactory at the higher secondary level?
- Do the higher secondary school teachers differ in the level of their participation in school administration with regard to their gender, school management and teaching experience variation?

Answers to the above questions provide a backdrop for conducting the present research.

#### ii. Statement of the problem

The problem is stated as “Participation of Higher Secondary School Teachers in School Administration”.

#### iii. Objectives of the study

The study was conducted with the following objectives.

- To study the level of participation of higher secondary school teachers in school administration and to categories them in different levels of their participation in school administration.
- To find out significant differences if any in the participation of higher secondary school teachers in school administration in relation to gender, school management and teaching experience variation both totally and component wise.
- To find out the main and interaction effect of gender, school management and teaching

experience on the levels of participation of higher secondary school teachers in school administration.

#### iv. Formulation of hypotheses

The following hypotheses were formulated for the study.

$HO_1$ : There is no significant difference in the degree of participation of higher secondary teachers in school administration.

$HO_2$ : There is no significant difference in the participation of higher secondary school teachers in school administration due to gender, school management and teaching experience variation.

$HO_3$ : There is no significant difference in the participation of higher secondary school teachers in planning aspect in relation to gender, school management and teaching experience variation.

$HO_4$ : There is no significant difference in the participation of higher secondary school teachers in organizing aspect in relation to gender, school management and teaching experience variation.

$HO_5$ : There is no significant difference in the participation of higher secondary school teachers in communicating aspect in relation to gender, school management and teaching experience variation.

$HO_6$ : There is no significant difference in the participation of higher secondary school teachers controlling aspect in relation to gender, school management and teaching experience variation.

$HO_7$ : There is no significant difference in the participation of higher secondary school teachers in evaluation aspect in relation to gender, school management and teaching experience variation.

$HO_8$ : There is no interaction effect gender, management and experience together on the participation of higher secondary school teachers in school administration.

#### v. Scope and delimitation of the study

The scope of the study is to ascertain the level of participation of higher secondary school teachers in school administration in relation to their gender, school management and teaching experience variation. Other variables like – age, social economic status, locale, intelligence etc. was not taken into consideration due to time constraint.

The study was delimited to 100 higher secondary school teachers teaching in classes XI and XII of higher secondary schools of siliguri in jalpaiguri district of west Bengal.

#### vi. Method of the Study

The study design is descriptive method i.e., normative survey method. Here in the study participation of higher secondary school teachers has been studied in relation to gender, school management and experience. Therefore, it is an ex-post-facto study.

vii. *Sample*

A sample of 100 teachers had been selected from 12 higher secondary schools of Jalpaiguri district. These teachers had been categorized as male and female, more experienced and less experienced, Govt. and Private management.

viii. *Tools used*

To assess the level of participation of Higher Secondary School Teachers in School Administration, Teacher's Participation in School Administration Scale (TPSAS) of Taj (1985) will be used in the study. The scale consists of 27 items comprising of 5 areas like – planning, organizing, communicating, controlling and evaluation. The responses will be recorded against each item under the five point scale i.e. always, frequently, occasionally, rarely and never. The always point given 5 credits and never will be scored as 1 credit and three middle points frequently, occasionally and rarely will be scored as 4,3,2 respectively. The test retest reliability of a scale is 0.76.

ix. *Techniques for data analysis*

For collection of data, questionnaire technique was used. For the interpretation of scores, both descriptive and inferential statistics would be adopted in relation to objectives stated and hypotheses formulated. Descriptive statistics will be used for ascertaining the participation of higher secondary school teachers in school administration with respect of gender, management and teaching experience variation.

In inferential statistics test of significance 't'- ratio was used for computation of scores based on gender, management and teaching experience.  $\chi^2$  was also used.

b) *The major findings of the study*

The major findings of the study are presented briefly in the following lines:

- The skewness and kurtosis of scores were found to be 0.18 and 0.27 as against 0 and 0.263 respectively in case of a normal curve. Hence the distribution is positively skewed and platykurtic. The scores obtained by teachers on TPSAS deviated slightly from normality.
- There existed significance difference in the participation of higher secondary school teachers in school administration in relation to gender variation.
- There existed no significant difference in the participation of higher secondary school teachers in school administration in relation to school management and teaching experience variation.
- In planning aspect there existed no significant difference in teacher's participation in relation to gender and experience variation but there existed significance difference in relation to management variation.

- In organizing aspect there existed no significant difference in teacher's participation in relation to gender, management and teaching experience variation.
- In communicating aspect there existed no significance difference in teacher's participation in relation to gender, management and teaching experience variation.
- In controlling aspect there existed significance difference in teacher's participation in relation to gender variation but there existed no significant difference in relation to management and teaching experience variation.
- In evaluation aspect there existed significance difference in teacher's participation in relation to gender and management variation but there existed significant difference in relation to experience variation.

## VI. RECOMMENDATION

The challenges faced by today's school administrators are increasing in frequency, complexity and intensity and require school leaders to have both theoretical understandings of school based problems and practical approaches to addressing them. Adequate funding should be provided, in order to provide for the day to day administrative running of the school. There should be more of parental involvement in secondary school administration; after all it's their child that attends this secondary school so it should also be their concerns. The Parents-Teacher Association (PTA) should be formed in order to coordinate this affair. Recruitment of competent hands to handle the administrative affairs of the secondary schools is necessary. Here only season administrators should be employed based on merit and their track records in secondary school administration. There should be constant teacher's training in the secondary school system in order to enhance the capacity of the teachers and inculcate in them new ideas in the teaching industry. A detail short or medium term plan should be designed, developed and implemented for secondary schools. At least let our administrators have a guide or directive on the road to follow and how they can be able to meet the set deadlines. Administrative issues with teachers and other staff members can run the gamut from complaints about teacher evaluations to program changes to lack of supplies. Administrators address pedagogical difficulties and work with staff to solve problems that hinder learning. It is challenging to create an orderly and task-oriented atmosphere in which all stakeholders are considered. As far as differences between male and female in leadership positions were concerned, two contradictory views appear in the literature. While some researchers found no substantial

evidence for gender differences in educational leadership this paper seeks to set the stage for the exploration of female leadership in educational Systems.

- The female teachers should be motivated to handle any sort of pressure and workload.
- Teachers with less experience should not be kept for administration work.
- The government schools should be able to cater to needs and demands of the teacher.

#### a) Scope for further Research

The present study has selected 100 samples and it was delimited to Jalpaiguri district because of limited duration. The study was not able to cover everything about the teacher participation in school administration as the duration is delimited.

- The study can be conducted again in same area taking more samples.
- Some other variables by including more district or states taking teachers from various types of schools such as, male and female, coeducation, locale such as rural and urban, tribal, types of curriculum such as ICSE and CBSE so as to present clear picture of the studies than it will be more beneficial for the higher secondary school education in that way we can find out shortcomings of education system, as quality education is the need of an hour.
- There is a scope for further research that can be conducted with samples drawn at different levels of education like primary and secondary.

### REFERENCES RÉFÉRENCES REFERENCIAS

1. *Bacharach, Bamberger, Conley, Bauer. (1990). The dimensionality of decision participation in educational organization: The value of a multi-domain evaluative approach. Educational Administrative Quarterly, 26(2), 121.*
2. *Barth, R.S. (2000). Teacher leader. Phi Delta Kappan, 82(6), 443-449.*
3. *Blasé, J., Blasé, J. (1999). Shared governance principals: The inner experience. NASSP Bulletin, 83(606), 81-90.*
4. *Blasé, J., Blasé, J. (2000). Principals' perspectives on shared governance leadership. Journal of school leadership, 10(1), 9-39.*
5. *Bhagabaji (1984). Educational Administrative in India, New Delhi.*
6. *Crowther, F, Kaagan, S.S., Ferguson, M., \$ Hann, L. (2002). Developing teacher leader: How teacher leadership enhances school success. Thousands oaks, CA: Car win pres, Inc.*
7. *Dinesh, S (2010). Principal leadership for outstanding educational outcomes. Journal of Educational Administration.*
8. *Ganapathy (1981). Educatoinal Administrative, In M.B.Buch, New Delhi.*
9. *Garg, N. K. (1983). A study of teachers professional responsibility in relation to administrative styles and organizational climate of secondary level. Unpublished Dissertation Ph.D Education. Pg-936.*
10. *Hushdil (1985). A study of principals leadership behavior in on suburban school district, DAI 49(11).*
11. *Khusdil, N. (1985). An investigation into the mutual role expectation and actual role perception of the principals and teacher of senior secondary schools of Delhi. Unpublished Ph.D Dissertation in Edu. JMI, P.g. 1086.*
12. *Leithwood, K., \$ Jantzi, D. (2000). Principal and teacher leadership effects: A replication. School leadership and Management, 20(4), 415-434.*
13. *Marks, H.M., \$ Louis, K.S. (1997). Does teacher empowerment affect the classroom? The implication of teacher empowerment for instructional practice and student academic performance. Educational Evaluation and policy Analysis, 19(3), 245-275.*
14. *Mohrman, S. A., Lawler, E.E., \$ Mohrman, A.M. (1992). Applying employee involvement in schools. Educational Evaluation and Policy Analysis 14(4), 347-360.*
15. *Naik. D.G. (1982). An inquiry into the relationship between leadership behavior of secondary school headmaster and teacher morale. In M.B.Buch Edition Third survey of Educational Research.*
16. *Rajeevalochana (1981). Study of Administrative behavior of high school principals in central Gujarat, 111 survey of research in education, In M.B. Buch, New Delhi, NCERT, 1987.*
17. *Reitzug, U.C. (1994). A case study of empowering principal behavior. American Educational Research Journal, 31(2), 283-307.*
18. *Rice, E.M., \$ Schneider, G.T. (1994). A decade of teacher empowerment: An empirical analysis of teacher involvement in decision making, 1980-1991. Journal of educational administration, 32(1), 43-58.*
19. *Riesgraf, K.M. (2002). Effects of school-based management practices on decision making for special education: Unpublished Doctoral Dissertation, University of Minnesota, Minneapolis.*
20. *Rinehart J.S., Short, P.M., Short, R.J., \$ Eckley, M. (1998). Teacher empowerment and principal leadership: Understanding the influence process. Educational administration quarterly, 34 (supplement), 630-649.*
21. *Smylie, M.A. (1994). Redesigning teachers work: connections to the classroom. Review of Research in Education, 20, 129-177.*
22. *Somech, A. (2002). Explicating the complexity of participative management: An investigation of multiple dimension. Educational Administrative Quarterly, 38(3)/341-371.*

23. Somech, A & Drach-Zahavy, A. (2001). Influence strategies of principals: ordinary times compared with times of change. *Journal of school leadership*, 11(1), 25-47.
24. Tamang, M. (2011). *Teacher's Participation on school administration at the secondary level of Education*. Unpublished M.Ed Dissertation, Sikkim University, Sikkim.
25. Verma, MB (1989). *Leadership Behaviour of college principals as perceived by their respective teachers with some correlates of leadership behavior*. Cited from Shabir Bhat's Unpublished PhD. Dissertation (Education), p.55.





GLOBAL JOURNAL OF HUMAN-SOCIAL SCIENCE: G  
LINGUISTICS & EDUCATION  
Volume 16 Issue 6 Version 1.0 Year 2016  
Type: Double Blind Peer Reviewed International Research Journal  
Publisher: Global Journals Inc. (USA)  
Online ISSN: 2249-460X & Print ISSN: 0975-587X

## ICT and English Language Teaching and Learning in Cameroonian Secondary Schools

By Dr. Njwe Eyovi Nee Amah Ntongieh

*The University of Bamenda*

**Abstract-** This work investigates ICTs and its crucial role in ameliorating knowledge acquisition in general and enhancing English Language mastering in particular. There is an assessment of the level of applicability of the level of ICT tools in facilitating English language teaching/learning amongst final year students in Anglophone secondary schools in Cameroon. It further emphasises the use of ICTs and heightens awareness of the crucial role ICTs play in ameliorating learning in general and language in particular. Findings in this study reveal that ICTs are not employed in our school system to enhance language learning. The work concludes by recommending the implementation and use of ICT tools in the fostering of English language teaching/learning.

**Keywords:** *ICT, english language, teaching/learning, assessment, proficiency.*

**GJHSS-G Classification :** *FOR Code: 420101*



*Strictly as per the compliance and regulations of:*



© 2016. Dr. Njwe Eyovi Nee Amah Ntongieh. This is a research/review paper, distributed under the terms of the Creative Commons Attribution-Noncommercial 3.0 Unported License (<http://creativecommons.org/licenses/by-nc/3.0/>), permitting all non-commercial use, distribution, and reproduction in any medium, provided the original work is properly cited.

# ICT and English Language Teaching and Learning in Cameroonian Secondary Schools

Dr. Njwe Eyovi Nee Amah Ntongieh

**Abstract-** This work investigates ICTs and its crucial role in ameliorating knowledge acquisition in general and enhancing English Language mastering in particular. There is an assessment of the level of applicability of the level of ICT tools in facilitating English language teaching/learning amongst final year students in Anglophone secondary schools in Cameroon. It further emphasises the use of ICTs and heightens awareness of the crucial role ICTs play in ameliorating learning in general and language in particular. Findings in this study reveal that ICTs are not employed in our school system to enhance language learning. The work concludes by recommending the implementation and use of ICT tools in the fostering of English language teaching/learning.

**Keywords:** *ICT, english language, teaching/learning, assessment, proficiency.*

## I. INTRODUCTION

The role of ICT (Information Communication Technology) in the 21<sup>st</sup> Century educational set up cannot be overemphasized. Its relevance in the teaching/learning process in general is crucial and its application in the teaching and learning of English is imperative. This is essentially associated with the acquisition and proficiency of the language at different levels and for different purposes.

English language has assumed a hegemonic role in the global village world as it is spoken in all the continents. A mastery of the language guarantees communication openings to every part of the globe. It is one of the official languages of Cameroon and constitutes the medium of instruction in the Anglophone subsystem of education. Therefore it is of great necessity to address problems linked to the mastery of English Language at various levels.

The multilingual nature of Cameroon with the need for everyone to function in at least two or three languages whereby English constitutes a second language to Anglophones; the pivotal role of the language as a medium of instruction and the gross lack of mastery of the language, contribute to learning problems associated with low proficiency in this medium of instruction.

These problems have increased over the years and have resulted to the cumulative deficiencies evident in our educational system. In a bid to curb and correct this situation, there is a dire need to foster and

ameliorate the teaching and learning of English language. To this effect, various methods have been sought and implemented with different degrees of successes. From this backdrop therefore, with the advent of the ICT, there is every reason to investigate its use in the teaching of English language in our secondary schools.

Hartoyo (2010) opines, and strongly too, that the integration of ICT in the field of language learning is inevitable. He further states that, the ICT and language learning are two aspects which support each other like two sides of a coin.

This is also the stand point of many experts and educational practitioners who strongly advocate for the integration of ICT in language learning. They inform that, the integration of ICT will improve efficiency and effectiveness of learning and enhance the quality of understanding and mastery of the language.

### a) *What is Ict?*

Simply put, ICT include any product which will store, retrieve, manipulate, transmit or receive information electronically in a digital form. These include personal computers, digital television, email, robots, etc.

### b) *Advantages of Ict in Language Learning*

According to Herington ICT has several advantages ranging from facilitating exposure to authentic language to providing access to wider sources of informational varieties of language. It also creates opportunities for people to communicate world-wide and allows for a learner-centred approach in the teaching, learning business. It enhances development of learners' autonomy and creates avenue for people to get information and communicate with each other in a wider range. On a more specific note, in the English language classroom ICT address key outcomes of the syllables, and allows students to become competent users as well as consumers in English.

From research, it is suggested that incorporating ICT into the English curriculum can improve writing and reading skills, develop speaking and listening skills and support collaboration, creativity, independent learning and reflection (Becta, 2003a, Becta, 2003b, VTC, 2003-cited in Becta 2005).

Furthermore, as an interactive and collaborative medium, ICT gives students the opportunity to easily share responses, composures and publications as well as the avenue to explore the language of texts more

creatively and to develop as efficient and fluent speakers, great writers and focused readers for an ever widening range of purposes and audiences.

Summarily, ICT can enable students to:

- Access information and respond to a widening range of texts.
- Organise and present information in a variety of forms
- Broaden the range of audiences for their work.
- Compose a widening range of texts for a broad range of purposes.
- Compose for real audiences
- Support in the choice of genre for audience and purpose.
- Identify key characteristics and features of texts.
- Develop understanding of language and critical literacy (Becta, 2006, ICT in curriculum.)

Specifically, dealing with ICT and the teaching and learning of English in Information Communication Technology Assisted Language Learning (ICTALL) which includes computers, the internet and electronic delivery systems such as radios, televisions, and projectors, among others, as is widely used in today's educational field, teaching and learning no longer depend exclusively on printed materials. Multiple resources are abundant on the Internet, and knowledge can be acquired through video clips, audio sounds, and visual presentation just to name a few. Current research has indicated that ICTALL insist in transforming a teaching environment into a learner centred one (Castro Sanchez and Alleman, 2011) since learners are actively involved in the learning processes in ICT classrooms, they are authorized by the teacher to make decisions, plans and so forth (Lu, Hou and Huang 2010). ICTALL therefore provides both learners and instructors with more educational affordances and possibilities.

From the foregoing, it is evident that the range and coverage of ICT is broad or wide, and very relevant in knowledge acquisition in general and specifically for our English language proficiency quest.

### c) *Theoretical Framework*

The theoretical frame work of this study is based on some learning theories which have been integrated and applied to information and Communication Technology Assisted Language Learning. These include; the behaviourist, the cognitive and the constructivist theories. Each of these theories will be explained in turn and associated to ICT assisted language learning.

In the Behaviourist theory, a central premise of behaviourism as popularized by both the Russian and American psychologists, Ivan Pavlov and B.F. Skinner respectively is the notion of learning by conditioning.

The idea is that, it is possible to explain human behaviour in terms of responses to stimuli and that is dependent on the nature of the stimulus, varying kinds of human responses can be provoked.

If a behaviour is positive, it is rewarded hence it will recur and be reinforced. On the other hand, if a behaviour is not positive, it is punished or not rewarded. Hence, it is discarded. Behaviourist theory thus came to explain learning in terms of operant conditioning. It is believed that language is acquired through principles of conditioning, including association, imitation and reinforcement. Thus language acquisition is viewed as a cognitive behaviour. Therefore, children learn words by associating sounds with objects, actions, and events. They also learn words and syntax by imitating others. Adults enable children to learn words and syntax by reinforcing correct speech. The use of ICTs fit into this theory in that the computer and other ICT tools provide avenue for imitation repetition which enhances acquisition and proficiency.

In other words, repeated drills can be carried out on the computer whereby the machine does not get bored or tired with presenting the same material over and over again.

A computer can present such material on an individualised basis, allowing students to proceed at their own pace and freeing up class time for other activities (Warchauer 1996).

As far as cognitive theory is concerned, as stated by Piaget, Cognitive development results from the interactions that children have with their physical and social environments. As a child explores his world, eventually they begin to discover that they hold a perspective of the world uniquely of their own. Cognitivist focuses on the inner mental activities involving the mental processes such as thinking, memory, knowing, and problem-solving needed to be explored.

Piaget saw cognitive development as essentially a process of maturation, within which genetics and experience interact. The developing mind is viewed as constantly seeking equilibration, i.e. a balance between what is known and what is currently being experienced. This accomplished by the complimentary processes of assimilation and accommodation. Put simply, assimilation is the process by which incoming information is changed or modified in our minds so that we can fit it in with what we already know. Accommodation, on the other hand, is the process by which we modify what we already know to take into account new information. Working in conjunction, these two processes contribute to what Piaget terms the central process of cognitive adaptation.

In ICTALL terms, the theories of cognitive psychologists can be seen to inform software following the "revelatory" paradigm of discovery-based and problem-solving oriented learning and stimulation. The

most notable proponent of using the potential of new technologies to help learners “construct new understandings through their exploratory activity” (Crook 1994, p. 16).

Theories of cognitive thinking allow us to understand the impact of applications and tools which help us process information, engage them in abstract thinking, allow them to make the knowledge and help them to build classificatory systems. Generic software such as word processors, databases, spreadsheets, falls into this category. There is some consensus that these applications are liberating and empower the user to engage in cognitive and creative thinking.

Cognitivist learning can be acquired through listening, watching, touching, reading and then processing and remembering the information. Therefore, there is various range of software which can be used for this learning theory.

With regards to the Constructivist theory, constructivism refers to the epistemological consideration focusing exclusively on the meaning-making activity of the individual mind. It is a theory to guide understanding of how students acquire critical questioning skills. It can become a guiding theoretical foundation and provide a theory of cognitive growth and learning that can be applied to several learning goals. In constructivist learning environment, the role of the teacher shifts from being a source of knowledge to facilitating learning.

Constructivism or Constructivist learning is based on students’ active participation in problem-

solving and critical thinking regarding a learning activity which they find relevant and engaging. They are “constructing” their own knowledge by testing ideas and approaches based on their prior knowledge and experience, applying these to a new situation, and integrating the new knowledge gained with pre-existing intellectual constructs.

The term refers to the idea that learners construct knowledge for themselves. Each learner individually (and socially) constructs meaning as he or she learns. In ICT usage, the web is where constructivist learning can take place. It provides access to rich source of information, encourages meaningful interactions with contents and brings people together to challenge support or respond to each other.

The essence of this study is to carry out an assessment of the level of applicability and effectiveness of the use of ICTALL in the teaching/learning of English language in our secondary schools. It also emphasizes and heightens awareness of the relevance of ICTs in the fostering of English language proficiency and consequently, knowledge acquisition in general. The research population for this study comprised 1000 form five students and forty English language teachers drawn from ten Secondary schools, five each from the North West and South West Regions which constitute the Anglophone regions of Cameroon. The details of the population and schools for this study are presented on table 1 below.

	School	No of Students	No of English Form 5 English teachers
1.	GHS Tiko	350	4
2.	GBHS Limbe	370	4
3.	BGS Molyko (Buea)	480	5
4.	GBHS Buea (Bokwango)	250	3
5.	CCAS Kumba	312	5
6.	GBHS Bamenda	503	4
7.	GBHS Down Town	370	5
8.	GBHS Santa	300	4
9.	GBHS Ndop	228	3
10.	GBHS Mbengwi	302	3
	<b>TOTAL</b>	<b>3465/1000</b>	<b>40 ALL</b>

From 3,465 Form five students in ten schools used for this study, 1000 (200 students each from the different schools) were selected, representing 28.8% using the simple random sampling technique and given questionnaires to fill which was later analysed and used for this study. Also, forty questionnaires were given to forty form five teachers of all the schools under study which were also filled and analysed in this study. Form five students were selected because they were in the final class of the Ordinary Level and were set for GCE Ordinary Level examinations in English language which have experienced a decline in performance for a while.

The schools selected here were also equipped with multimedia centre facilities which could be exploited for English language teaching/learning purposes. It is important to note here that, apart from GBHS Mbengwi’s multimedia centre which was established by MTN Cameroon, the other centres had been established by the government. There were interviews with the Heads or Principals of these institutions as well as observations in these schools. Two Regional Inspectors from the North West and South West for English were interviewed as well as two of the technical inspectors charged with the responsibility of running of the multimedia centres.



d) *Students' Questionnaires*

The students' questionnaires were to find out

- If they use the Cyber Space to search and use information
- If their teachers used computer/internet in teaching English Language.
- If the use of the internet improves on their performance
- Whether or not they enjoy being taught using the internet
- Whether ICTs make lessons enjoyable and more comprehensible

e) *Teachers' Questionnaires*

A total of 40 Questionnaires were administered to 40 teachers and all were collected. The teachers' questionnaire was to find out:

- What aspects of English language the students enjoyed most
- Whether they use ICT in teaching English language
- Whether they encouraged students to make research using ICT
- The aspects of English language that could best be taught using ICT
- The difficulties faced in teaching English language using ICTs

II. RESULTS AND DISCUSSIONS

Students' interest in English language and strategies used by teachers in teaching

Table 2 : Students' interest in English language

Interest level	No of Students	% per level
High	677	67.7%
Moderate	301	30.1%
Low	22	2.2%
<b>Total</b>	<b>1000</b>	<b>100%</b>

From the above table, it is evident that most students have a very high interest level in English language. This is exemplified by 677 students out of 1000 representing 67.7% indicating a high interest level; 301 students out of 1000 representing 30.1% indicating a moderate level and just 22 students out of 1000 representing 2.2% indicating a low level of interest in English language. This can be explained by the fact that English language is one of the most determining factors or criteria for admission into the University and other High institutions of learning. The Anglophone Universities of Buea and Bamenda do not admit any Anglophone student without a pass mark in English language GCE O'level examination.

Since the students are very interested in English language, there is every need for the teachers to consider the integration of ICTs in the teaching of

English. This will go a long way to enhance their performance in the subject.

*Strategies used by teachers in teaching English*

When asked the different strategies used in teaching English language to the learners, the most recurrent strategies stated by the teachers included the following: relating subject matter of lesson to real life situations, relating the lesson to performance outcomes, constant use of teaching aids and dramatizing. Other strategies also included language games, exposes, dialogue, interaction, repetition and the use of text books, journals and charts. It is obvious from this presentation that no teacher cited the use of ICTs as a strategy for teaching English language. To confirm the fact that teachers did not generally employ ICTs in teaching English the next question requested the extent of the use of ICTALL by Teachers and Students in the teaching and learning of English language.

Therefore, questions were asked to teachers to understand whether or not they use ICTALL in teaching English Language, while on the part of the students, they were asked if their teachers use computers or other ICT tool when teaching them. Apart from two teachers from GBHS Mbengwi, no other teacher cited the use of ICT tool in teaching English language.

On the part of the students, we have the following response represented on table 3 below.

Table 3 : Students' response to teachers' use of ICTs in teaching English language

School	No of students with positive response (YES)	No of students with negative response (NO)
GHS Tiko	2	348
GBHS Limbe	3	367
BGS Molyko	5	475
GBHS Buea	1	249
CCAS Kumba	2	310
GBHS Bamenda	5	498
GBHS Down Town	3	367
GBHS Atiela	1	299
GBHS Ndop	2	226
GBHS Mbengwi	9	293
<b>TOTAL</b>	<b>33</b>	<b>967</b>

From table 3 above, 967 students representing 96.7% of the total number of students indicated that no teacher used ICTs to teach English language. However, 33 students representing 3.3% (with 13 from schools in the South West region and 20 from schools in the North West Region) affirmed the use of ICTs in the teaching of English by teachers.

This was controversial with the teachers' responses because only two teachers from GBHS Mbengwi indicated the use of ICTs for teaching English language. As a result of this controversy, some

interviews were conducted amongst students to clarify this point.

It was discovered that some teachers actually used dictionaries on their smart phones to handle various vocabulary items like spelling, pronunciation of words and grammatical aspects like tenses. In fact, it was also revealed that students were asked by teachers to “Google” up various texts for comprehension exercises and other grammatical analysis. The teachers who used this method didn't report because as far as

they were concerned, they saw this as some kind of passive activity and they didn't probably consider the keyboard on the phone as ICT gadget. The student on their part took this very seriously and for them, it was quite exciting. To follow up on this, the next question was on the frequency of the teachers' use of ICTs to teach. The response reported here are those of the students because, apart from two teachers of GBHS Mbengwi, the other teachers indicated that they did not use ICTs to teach.

Table 4 : Frequency of teachers using ICTs to teach

School	Always	Sometimes	Never
GHS Tiko	0	2	348
GBHS Limbe	0	3	367
BGS Molyko (Buea)	0	5	475
GBHS Buea	0	1	249
CCAS Kumba	0	2	310
GBHS Bamenda	0	5	498
GBHS Down Town	0	3	367
GBHS Atiela	0	1	299
GBHS Ndop	0	2	226
GBHS Mbengwi	2	7	293
<b>TOTAL</b>	<b>2</b>	<b>31</b>	<b>967</b>

From table 4 above, it is realized as indicated that only two teachers from GBHS Mbengwi were consistent with the employment of ICT gadgets to teach English Language. 31 teachers sometimes employed Computers and 967 never employed computers or any other ICT tool.

Further investigation revealed that the MTN Cameroon (A telecommunication network company) donated a computer laboratory with twenty Personal Computers to GBHS Mbengwi. This got everyone excited and keen to learn to maximize the use of the computers. Moreover, during a competition organized to assess ICTs Operators from the different schools in the North West Region this year in Bamenda by MTN Cameroon, the best Operator came from GBHS Mbengwi. This to an extent, explains the application of computers by teachers of this institution.

The next set of questions investigated the use of Cyber Space by students in general and the work they undertook in the internet.

Table 5 : The use of Cyber Space by students

Use of Cyber Space	Population Number	Percentage of Total Population
Always	350	35%
Sometimes	556	55.6%
Never	94	9.4%
<b>Total</b>	<b>1000</b>	<b>100%</b>

From table 5 above it is evident that many students are exposed to the internet and actually use it. 350 students representing 35% of the total population investigated, use the internet always. 556 students

representing 55.6% of the total population use it sometimes and 94 students representing 9.4% never use Cyber Space.

This is indicative of the fact that if ICTs were formally introduced for teaching in general and English Language in particular, a majority of the students will embrace it with relative ease.

The next question was to find out the kind of work students engage in when they use Cyber Space. The activities will be presented and given values in numbers to facilitate presentation on the table.

Different types of Activities and No. Values

Navigate Yahoo Messenger = 1

Face Book =2

Do school assignments and other research findings =3

Table 6 : Types of work student engage in when they use Cyber Space

Different types of Activities	Population	Percentage
1 only	83	8.3%
2 only	206	20.6%
3 only	10	1%
1+2	400	40%
1+2+3	200	20%
2+3	05	0.5%
1+3	02	0.2%

From table 6 above, a total population of 400 students representing 40% use cyber space to navigate Yahoo Messenger and Face book while 206 students

representing 20.6% use cyber space to do only face book and 83 students representing 8.3% use the internet to navigate Yahoo messenger. This shows that up to 68.9% of the total population use cyber space for activities other than class assignment. There are just about 12% of the students who use cyber space who actually engage in class assignment and research. This situation, calls for reorientation such that more students should be counselled and helped to actually use Cyber Space for class assignments and research which will be much more beneficial for their progress.

The next question looked at the use of other technologies for research apart from Computers.

Table 7

Other Technology	No of Students	Percentage of Total Population
Phone	254	25.4%
Phone + Television	241	24.1%
Phone + Radio	220	22%
Television + Radio	163	16.3%
Television + Phone + Radio	122	12.2%
<b>TOTAL</b>	<b>1000</b>	<b>100%</b>

It is obvious from table 7 that various gadgets are used for research. Interviews indicated that many students enjoy using various gadgets for studies.

The next question dealt with difficulties faced by teachers and students when using ICTs gadget in the teaching and learning of English Language. When asked the difficulties, teachers and students faced in using ICTSLL in the teaching and learning process of English language, the teachers gave the following responses: low levels of computer literacy by teachers, slow connectivity, constant power failure, lack of trained ICT teachers, unavailability of computers, lack of electricity in classes, limited computers to so many students, difficulties in usage by physically challenged and lack of gadgets.

The difficulties faced by the students included; low level of computer literacy, problems with downloading documents, not knowing important websites, slow typing speed etc. These difficulties are very obvious since students are not even taught using ICTALL. If they were taught using these new technologies, obviously this will improve on their technology skills but nevertheless, I think if they were well trained on how to effectively use ICTALL, these problems will be solved. In any case, the students indicated that they also faced problems when using the internet for research. These problems ranged from detailed information not given on some topics, difficulty with access to the computer room, difficulty with reading on computer/phone screens, distractions from some

websites, difficulty in downloading documents, internet packages are expensive, lack of computer skills, slow internet speed, to slow typing speed.

#### a) Analysis of Participant Observation and Interviews

Marshall and Rossman define observation as "the systematic description of events, behaviours, and artefacts in the social setting chosen for study." Observation enables the researcher to describe existing situations using the five senses, providing a "written photograph" of the situation under study. It connects the researcher to the most basic of human experiences, discovering through immersion and participation the how and why of human behaviour in a particular context. An observation guide was used to help or guide in assessing the use of ITCs in the teaching and learning process of English language in the different schools investigated. From what was observed, little or no attention was generally paid on the use of ICTs in the teaching and learning process. English language is not generally taught using ICTs tools. The traditional methods are highly used which brings about passive participation of students and the teacher assume the position of sole owner of knowledge.

Interviews conducted with various stakeholders generally point to the fact that ICTs were not utilised in teaching English language. The pedagogic inspectors indicated that ICT gadgets were very expensive to acquire and moreover, there was no time allocated in the time table to adequately use the method and the skim of work did not permit teachers to employ the ICTs. They further explained that the large classrooms and the limited gadgets did not envisage the use of ICTs. The technical inspectors complained that some of the gadgets were bad due to lack of maintenance. They complained that no motivation was provided to those who managed the centres and there were no replacements of damaged gadgets. On the other hand, students generally indicated that they would enjoy learning English language with the integration of ICTs. A good number of them indicated that, it would be quite exciting and they also believed that it would facilitate their understanding and proficiency in the different skills of listening, speaking, reading and writing of English language.

### III. RECOMMENDATIONS

Throughout this study, we have been able to understand the vital place of English language acquisition. This is a pointer to the fact that enormous pedagogical benefits could accrue with the reinforcement of strategies that enhance the acquisition of English language skills. Thus, the following recommendations have therefore been made to the following groups of people.

a) *To The Government*

- The government should train and retain teachers on how to use ICT devices so as to facilitate access to a variety of teaching/learning techniques.
- The government should put in place English language laboratories and library centres with ICT devices in schools as well as ensure that they contain fast network and fast connectivity.
- The government should also ensure that there should be electricity in all classes because sometimes a teacher might want to use a computer but will not find electricity in the class.
- The government should construct and equip ICT centres in all schools even those in remote areas so as to give students all over the country an equal opportunity to use ICTs. It should ensure that, these centres have enough computers for the students and even teachers. That is, one student per computer.

b) *To Curriculum Designers*

- The curriculum designers should implement Information and Communication Technology as a compulsory school subject at all levels of education, especially at the nursery and primary levels where the foundation of knowledge begins and needs to be solid.

c) *To Educational Authorities*

- Educational authorities should organise refresh course and pedagogic seminars on the importance of Information and Communication Technology in the teaching and learning process of English language. These seminars should be organised to effectively demonstrate how ICTs could be managed and adapted to suit our local realities.
- Educational authorities should also include in school time tables periods for training students on how to use ICTs. Show them important websites where they can carry out their school research and educate them on the importance of ICT in learning not only English language but other school subjects. Thus they should make the use and mastery of ICT tools compulsory to each and every students as well as teachers.
- Educational authorities should encourage text book writers to upload their books on the internet. This will go a long way to encourage and motivate students to be visiting the cyber space.

d) *To Teachers*

- Teachers should diversify teaching and include ICT tools in their teaching aids. This will go a long way to reduce their work load transmitting and communicating knowledge. Teachers are facilitators

and should therefore, organise a healthy teaching and learning environment. They should attend pedagogic seminars so as to improve on their teaching skills.

e) *To Learners*

- It is high time learners embrace the offer of this new technology, "the cyber space" as the learner through this or through connected computers if they have, will assume more responsibility over their learning process otherwise known as the constructivist approach where the model is student-centred with end results also being positive.

f) *To Parents*

- Parents should endeavour to provide their children with money to meet up with the demands of the cyber space education. This is because the cyber space has a lot to offer. They should also consider the need to provide computers for their children, they as well as endeavour to provide them with connectivity so that they can carry out their research without any major problems. From time to time they should also check whether these children are using educational websites.

#### IV. CONCLUSION

This study has proven that, Information and Communication Technology Assisted Language Learning (ICTALL) can positively influence students' performance if being used effectively by; teachers in the teaching/learning process of English language. The findings thus imply that, Information and Communication Technology Assisted Learning has come to be a solution to academic problems and therefore needs to be fully implemented as far as the teaching and learning of English language is concerned. We believe that if the educational system has a goal to better prepare its citizens for future challenges, it will have to favour an in depth, daily and regular integration of Information and Communication Technology Assisted Language Learning which will be very profitable not only to teachers and students of English language, but to the society as a whole as these students are the leaders of tomorrow and need to be trained using the best technologies available. Thus Information and Communication Technology Assisted Language Learning which has new, inviting, promising and diversified possibilities are indispensable in the teaching/learning process, it is a valuable tool to enhance teaching and learning.

#### REFERENCES RÉFÉRENCES REFERENCIAS

1. Becta (2005). Benefits and features of ICT in English. ICT in the Curriculum. [http://curriculum.becta.org.uk/docserver.php/?docid=657\(11/4/2006\)](http://curriculum.becta.org.uk/docserver.php/?docid=657(11/4/2006))

2. Becta (2006). ICT in the Curriculum. <http://curriculum.becta.org.uk/docserver.php?temid=255> (11/4/2006).
3. Becta (2006). IT and English activities and ideas. ICT in the Curriculum <http://curriculum.becta.org.uk/docserver.php?tdocid=622> (11/4/2006).
4. Becta (2006). What the Research says about using ICT in English. ICT in the Curriculum. (11/4/2006) <http://curriculum.becta.org.uk/docserver.php?docid=668>.
5. Broughton G. et al. (1980). Teaching English as a Foreign Language. London and New York: Routledge. 1980. Print.
6. Castro S. J.J. and Aleman E.C. (2011). Teachers' opinion survey on the use of ICT tools to support attendance-based teaching. Journal Computers and Education. Vol. 56, pp. 911-915.
7. Chin P. (2004). Using C and IT to Support Teaching. London and New York: Routledge 2004. Print.
8. Clyde W. and Delohery A. (2005). Using Technology in Teaching. New Haven and London: Yale University Press, 2005. Print.
9. Crook C. (1994). Computers and the collaborative experience of learning. London: Routledge.
10. Hartoyou A. (2010). ICTs in Language learning Universities Sumatera Utrara.
11. Lu Z., Hou L. and Huang X. (2010). A research on a student-centered teaching model in an ICT based English audio-video speaking class. International Journal of Education and Development using Information and Communication Technology, vol. 6, pp.101-123.
12. Warschauer M. (1996). 'Computer assisted language learning, an introduction.' In Fotos S.(ed) Multimedia language teaching. Tokoyo: Logos International, pp.3-20.



GLOBAL JOURNAL OF HUMAN-SOCIAL SCIENCE: G  
LINGUISTICS & EDUCATION  
Volume 16 Issue 6 Version 1.0 Year 2016  
Type: Double Blind Peer Reviewed International Research Journal  
Publisher: Global Journals Inc. (USA)  
Online ISSN: 2249-460X & Print ISSN: 0975-587X

## On Studying Teachers' Self Esteem based on Revised Janis Scale Application

By Baghli Asmaa

*Djilali Liabes University*

**Abstract-** Self-esteem is one of the most pertinent notions that has enjoyed a long period of interest. Researches findings on self-esteem posit that a healthy level of self-esteem usually results in positive outcomes and reflects on behaviours, performances and even personal handwriting. Thus, the current paper highlights the eminence of self-esteem for foreign/second language teachers. It also aims at, not only measuring, but examining the connection between sundry self-esteem' elements. First, in order to demonstrate the significance of self-esteem' implication in teaching, a general definition to the teaching process is necessary. Second, we will essay to explain the main methodology and the primary tools selected. Finally, on the data analysis and interpretation, we will endeavour to suggest some techniques that can upsurge self-esteem.

**Keywords:** *self-esteem – competence – worthiness – teaching – acceptance – personality - impact.*

**GJHSS-G Classification :** *FOR Code: 330399*



*Strictly as per the compliance and regulations of:*



© 2016. Baghli Asmaa. This is a research/review paper, distributed under the terms of the Creative Commons Attribution-Noncommercial 3.0 Unported License (<http://creativecommons.org/licenses/by-nc/3.0/>), permitting all non-commercial use, distribution, and reproduction in any medium, provided the original work is properly cited.

# On Studying Teachers' Self Esteem based on Revised Janis Scale Application

Baghli Asmaa

**Abstract-** Self-esteem is one of the most pertinent notions that has enjoyed a long period of interest. Researches findings on self-esteem posit that a healthy level of self-esteem usually results in positive outcomes and reflects on behaviours, performances and even personal handwriting. Thus, the current paper highlights the eminence of self-esteem for foreign/second language teachers. It also aims at, not only measuring, but examining the connection between sundry self-esteem' elements. First, in order to demonstrate the significance of self-esteem' implication in teaching, a general definition to the teaching process is necessary. Second, we will essay to explain the main methodology and the primary tools selected. Finally, on the data analysis and interpretation, we will endeavour to suggest some techniques that can upsurge self-esteem.

**Keywords:** self-esteem – competence – worthiness – teaching – acceptance – personality - impact.

## I. INTRODUCTION

Self-esteem has a long and rich history, and has been investigated for more than a century. The notion of “self-esteem” attracted a number of scholars from several disciplines, as being one of the most influential variables that is basically related to wellbeing's lives. Yet, the concept of self-esteem witnessed a wide conflict in terms of conceptualization and operationalization<sup>1</sup>, and its main definition and usage have been critical. Still, most researchers admit its vital role in creating a strong personality and improving outcome.

### a) Definition of Effective Teaching

Teachers are frequently regarded as the role models and motivators for students. The quality of their teaching has a great influence on students' learning. The profession is an ever-surprising mix of sheer hard work and ecstatic successes. In teaching, it is necessary to well grasp the meaning of ecstatic success; when teachers feel satisfied about their teaching performances and the knowledge provided, as well as the skills learnt and developed, they are more likely to communicate their satisfaction to their learners. Indeed, professional knowledge and intellectual practices are two essence factors in an honest and sincere teacher who enjoys noticing his/her students' development.

*Author:* Djilali Liabes University. e-mail: pen\_friends26@yahoo.fr

<sup>1</sup> *Operationalization:* Operationalizing is defined as to put something into working order.

Teachers enter the field of education in the hope of changing something in the world. They have that desire to make constant efforts to breathe new life into this profession. They are, often, aware that any word uttered by them or any action taken can leave a lasting impression on their students' minds. They have the power to cross young and impressionable minds, and this can prove their effectiveness.

In fact, Teacher effectiveness has been widely questioned resulting in a plethora of definitions. Clark (1993, p. 10) wrote that: “*Obviously, the definition involves someone who can increase student knowledge, but it goes beyond this in defining an effective teacher.*” Vogt (1984), in his turn, related effective teaching to the ability to provide instructions to students of different abilities, at the meantime, incorporate instructional objectives and assess the effective learning mode of the students. Collins (1990), while working with the Teacher Assessment Project established five criteria for effective teachers: their commitment to students and learning, mastery of the subject matter, their responsibility for managing students, they often reflect on their own practice, and they are a member of the learning community.

In addition, Swank et al (1989) viewed, “effective” as the decrease in the negative unproductive practices such as negative feedback and low-level questions, at the same time, the increase of academic questions. Million (1987) also believed that effectiveness is based on the lesson and teaching method. Papanastasiou (1999) stated: “*that no single teacher attribute or characteristic is adequate to define an effective teacher*”.

Researchers as Sanders (1999), Horn (1997) et al demonstrated that teachers' effectiveness can be gauged, and may be critical to student success. Both Sanders' (1999) and Wenglinsky's (2000) work asserted that teacher effectiveness is what contributes to student success. This means that teachers' effectiveness is related to the extent to which students have accomplished their objectives.

### b) Definition of Self-Esteem

Self-esteem has a long and rich history, and has been investigated for more than a century. It is a potent means for self-construction that exists within each individual. It is more than a sense of self-worth. Numerous definitions exist and the most recent studies have made the concept the buzzword of the century.

Thus, self-esteem refers to people's confidence in their own abilities that would enable them to cope with any unpredictable situation and challenges. It means their inner right to feel happy, worthy, deserving and living every moment with enjoyments.

The notion of "self-esteem" attracted a number of scholars from several disciplines, as being one of the most influential variables that is basically related to wellbeing's lives. It, indeed, affects people in every single part of their lives, their motivation, functional behaviour and satisfaction. Yet, the concept of self-esteem witnessed a wide conflict in terms of conceptualization and operationalization<sup>2</sup>, and its main definition and usage have been critical.

Baumeister et al (2003) believed that there is no link between the two: self-esteem and academic achievement. This lack of consistency and consensus means that mental health practitioners and educators may be making their own assumptions about self-esteem's nature, relying on common sense. Still, self-esteem is a construct and it is not seen but believed to exist via its artifacts.

Going back 30 years ago, Wells and Marwell (1978) had provided four approaches through which self-esteem could be clear up. These approaches are: object/attitudinal approach- the relational approach- psychological responses approach and the personality function approach<sup>3</sup>.

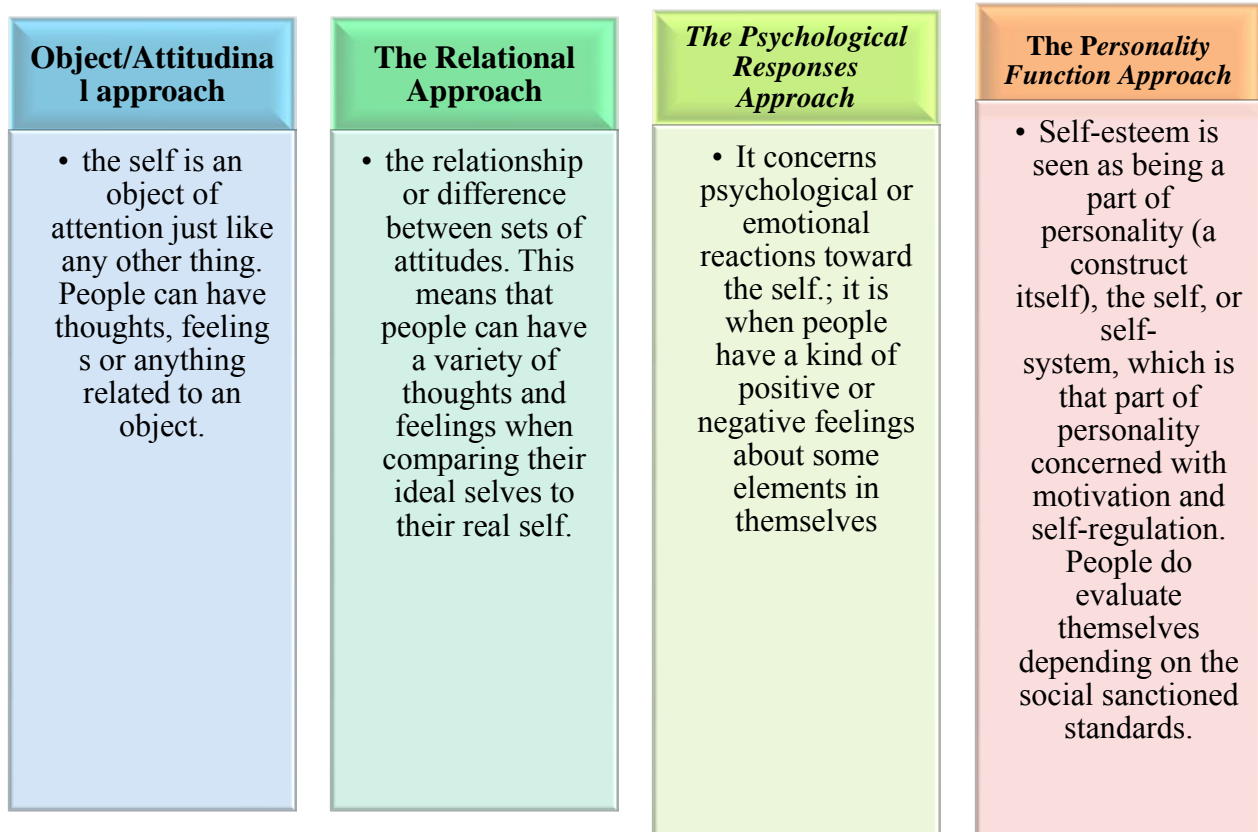


Figure 2.1 : Marwell's Approaches to Self-Esteem(1978)

So, one of the several self-esteem studies' upshots is the diversity in its definitions. Even though, Wells and Marwell<sup>4</sup> assumed that self-esteem can be categorized into two primary aspects: evaluation and its emotional experience or affect.

<sup>2</sup> Operationalization: Operationalizing is defined as to put something into working order.

<sup>3</sup> Cited In: MARY H. GUINDON (2010) "Self-Esteem across the Lifespan: Issues and Interventions". Routledge, Francis and Taylor Group, New York, London.

<sup>4</sup> Cited In: MARY H. GUINDON (2010) "Self-Esteem across the Lifespan: Issues and Interventions". Routledge, Francis and Taylor Group, New York, London.



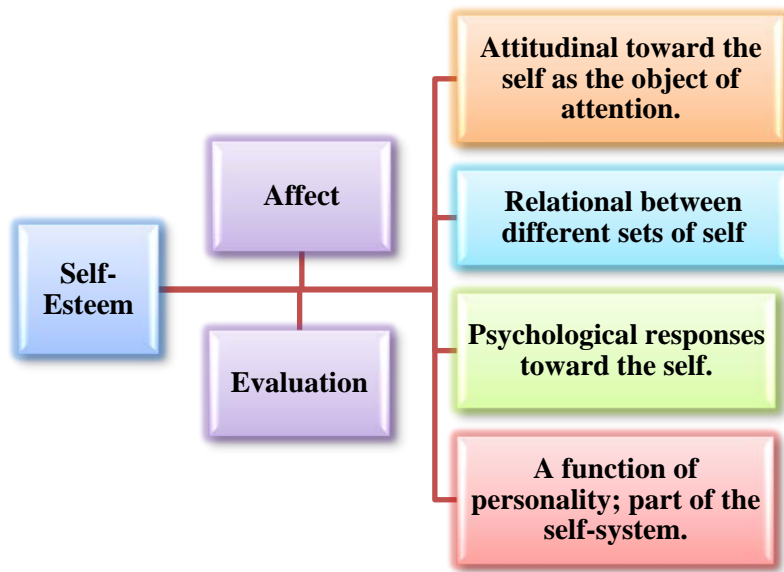


Figure 2.2 : Wells and Marwell's Different Interpretations of Self-Esteem

There are other accepted definitions that have been afforded, as for Smelser (1989); he seeks to identify it as “almost universally accepted components of the concept.”<sup>5</sup> He began by presenting three of them.

*“There is first, a cognitive element; self-esteem means characterizing some parts of the self in descriptive terms: power, confidence, and agency. It means asking what kind of person one is. Second, there is an affective element, a valence or degree of positiveness or negativeness attached to those facets identified; we call this high or low self-esteem. Third, and related to the second, there is an evaluative element, an attribution of some level of worthiness according to some ideally held standard.”*

Smelser (1989, p. 10)

Some definitions portrayed self-esteem as a stable personality trait whereas others describe it as the responsive to situational and contextual influences, the fact that makes it fluctuates. Today's interpretations to the concept is seen as: “trait versus state” (Leary & Downs, 1995) or “stable versus unstable” (Greenier, Kernis & Waschull, 1995), or “global versus situational” self-esteem (Harter, 1999).

## II. SELF-ESTEEM AND LANGUAGE TEACHING

Researches on self-esteem have shown the extent to which it can control teachers' confidence and

strengthen their personality. Valazza (2011)<sup>6</sup> believes that teacher personal development and self-confidence are closely related. The more teaching ability is developed, the better teacher's confidence will be. This confidence in personal teaching will lead to further readiness for moving forwards to the next level. Then, Underhill (1986) (as cited in Head, K. and P. Taylor (1997)<sup>7</sup>) defined teacher development as “the process of becoming the best kind of teacher that I personally can be.” Then, Rossner<sup>8</sup> (1992, 4) advocated that:

*“Teacher development is not just to do with language or even teaching: it's also about language development, counseling skills, assertiveness training, confidence-building (my italics), computing, meditation, cultural broadening – almost anything, in fact”*

Rossner (1992)<sup>9</sup>

So, both definitions emphasize on the teacher personality, their personal development and sense of self-confidence.

## III. RESEARCH POPULATION AND METHODOLOGY

Since the aim is to measure and examine teachers' self-esteem, the main method undertaken is the quantitative methods. It embraces one tool, which is

<sup>6</sup> Cited In: Gerardo Valazza (2011) “Professional development: teacher development and confidence”. Available at: <http://www.one-stopenglish.com/support/methodology/professional-development/-professional-development-teacher-development-and-confidence/-146473.article>.

<sup>7</sup> HEAD, K. AND P. TAYLOR (1997). “Readings in Teacher Development”. Oxford: Heinemann.

<sup>8</sup> ROSSNER, R (1992): “Where there's a will – facilitating teacher development” in Teacher Development Newsletter 18: 4 – 5.

<sup>9</sup> Cited in: the previously mentioned reference Gerardo Valazza (2011).

<sup>5</sup> Taken from: CHRISTOPHER, J. M. (2006) “Self-Esteem Research, Theory, and Practice”. Springer Publishing Company, New York.

revised and adapted Janis Field Test of Personality. This latter was distributed to 22 teachers of the English language at the DjilaliLiabes University, Sidi Bel Abbes.

a) *Difficulties in Revised Janis Scale Application*

Self-esteem is definitely not a new notion. Indeed, it has been widely researched by scholars like: Roseburg, Coppersmith, Janis and may other researchers. Those researchers have used variety of tools in their inquiries. Some of these tools are questionnaires (or self-esteem tests) and observation. Although these tools were of a great benefit for the current study, some problems arose in their application. That is to say, the main problem encountered in the utilization of the previous listed tools is the inappropriateness of some questionnaire's questions. Revised Janis and Field Scale, for instance, was designed for a particular kind of population that differs from the present research population in terms of culture and beliefs. Thus, during the JFS distribution process, some questions seemed ambiguous to teachers. The researcher was obliged to ignore a number of question, and select the ones that fit for teachers' culture.

b) *Revised Janis and Field Scale*

The aim behind the Revised Janis and Field Scale is to evaluate teachers' professional self-esteem.

This evaluation would make it possible to figure out which of the following three categories does each teacher's professional self-esteem belong to: high, average or low. The test anonymity and privacy were highly respected so that to make teachers feel at ease while answering.

Henceforth, the test embraces 15 questions, each of which aims at discovering a specific point related to self-esteem. To put it clear, the test exhibits: teachers' self-acceptance – teachers' sense of inadequacy and worthiness – teachers' self-efficacy – teachers' self-evaluation – teachers' self-consciousness, and body image. Then, the Likert scale was used for the general scale calculation. Thus, the test can be divided into six parts.

c) *Revised Janis and Field Scale Analysis and Interpretation*

The general results of the Revised Janis and Field Scale reported that amid 22 teachers, 44% of teachers possess a high self-esteem ( $3 \leq 3$  up to  $3.7 \leq 4$  on the Likert Scale). Whilst 50% of them have a medium level of self-esteem ( $2 \leq 2.2$  up to  $2.9 \leq 3$  on the Likert Scale). The remaining 6% of teachers have a low self-esteem ( $1 \leq 1.4 \leq 2$  on the Likert Scale).

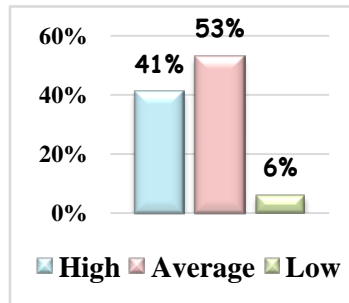


Figure 3.1 : Teachers' Professional Self-Esteem at the DjilaliLiabes University, The English Department, Sidi Bel Abbes

i. *Part One: Teachers' Self-Acceptance*

Questions (1/7/9/10/11) aim at discovering teachers' sense of self-acceptance.

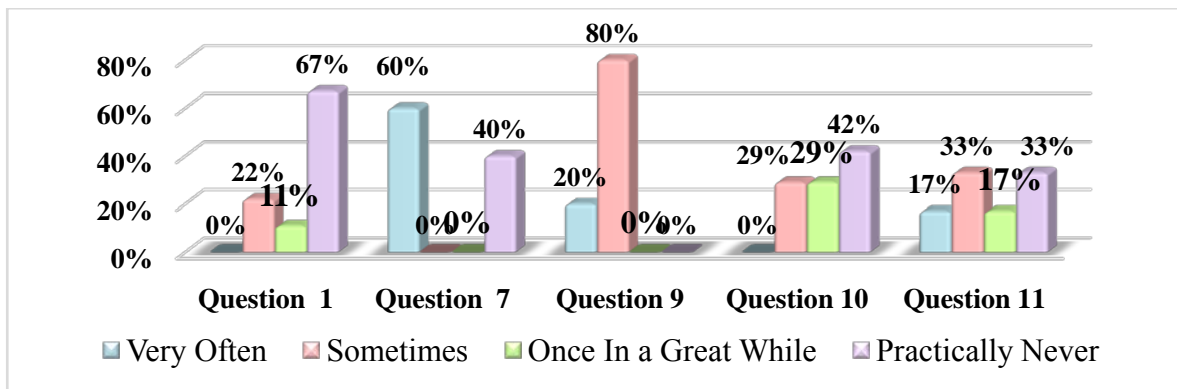


Figure 3.1 : Teachers' Self-Acceptance

The figure above demonstrates the results of teachers' sense of self-acceptance via discussing questions (1/7/9/10/11). Question n° 1 and 7 are two sides of the same coin, i.e. they aim at showing teachers self-view. As can be noticed, 22% of teachers have sometimes the feeling of being inferior while 11% have the same feeling once in a great while, but no one 0% experience that feeling very often. The remaining 67% practically never feel substandard. This category demonstrates teachers' great self-confidence and acceptance. In the same line, 60% of teachers are very often sure that people will respect them one day contrary to 40% of them who practically never have the feeling that one day they will be respected. Their choice justifies their previous answer, i.e. they never feel substandard as they do not care of people respect; for them, it is enough to be self-respected. Whilst 0% of teachers do have this feeling very often or once in a great while.

More to the point, as seen in the question n° 9, 80% of teachers sometimes worry about their abilities to convince their colleagues, they feel concerned with others' disagreement. For this kind of teachers, convincing interlocutors is one way to feel able. At the meantime, only 20% have that feeling. These teachers, in fact, belong to the same categories of the previous

#### d) Teachers' Sense of Self- Worthiness and Inferiority

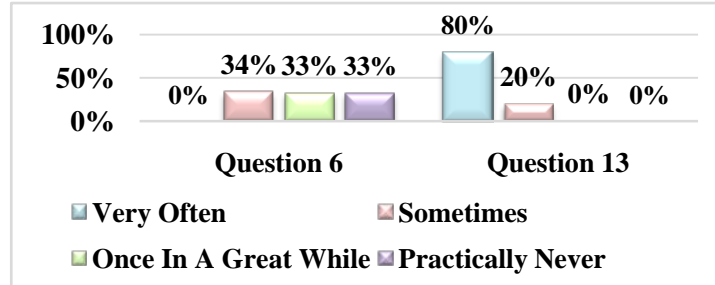


Figure 3.2: Teachers' Sense of Self- Worthiness and Inferiority

Questions 6 and 13 are interrelated. That is to say, if teachers do not feel worthless about their capacities to solve problems in a specific situation, it is because they have confidence in their abilities and vice versa. Hence, the graph above shows that 34% of teachers feel sometimes useless in case they can do nothing about a situation, while 33% of them have that feeling once in a great while, and others 33% practically never have that feeling. Still, none of them 0% do not experience that feeling. Similarly, 80% of teachers are very confident about their abilities, whilst 20% of them are slightly confident about their capacities. Actually, these questions are compatible with question n° 1. In other words, teachers who are very confident (80%) about themselves do not experience a sense of inferiority (67%). Whereas those who doubt about their skills and capacities to solve problems (20% / 34%)

questions (1/7). To put it clear, these tutors seem to depend and look for people appreciation and respect. If people respect them and agree with their ideas, they would feel more self-accepted and confident. It can be said that their self-acceptance is related to others' view and perception.

In addition, questions n° 10 and 11 are allied. This means, if teachers feel themselves worthless, they are more likely to worry whether others like and enjoy their acquaintance. Thus, 42% of teachers practically never feel discouraged or worthless, while 29% experience that feeling once in a great while, and others 29% sometimes. Yet, one of them feel worthless very often. Similarly, in question n° 11, 33% of teachers practically never worry about people's acquaintance, and other tutors 33% feel concerned sometimes whether other people like to be with them. The remaining teachers 17% worry very often whilst 17% only once in a great while about people's acquaintance.

Therefore, thing that can be assumed from the histogram above is that teachers who answered mostly with practically never have a high self-esteem. Those whose answers were mainly sometimes have a low self-esteem, while teachers who answered with either very often or once in a great while have an average self-esteem.

have more often than not a feeling of being inferior (22%).



i. Teachers' Self-Efficacy

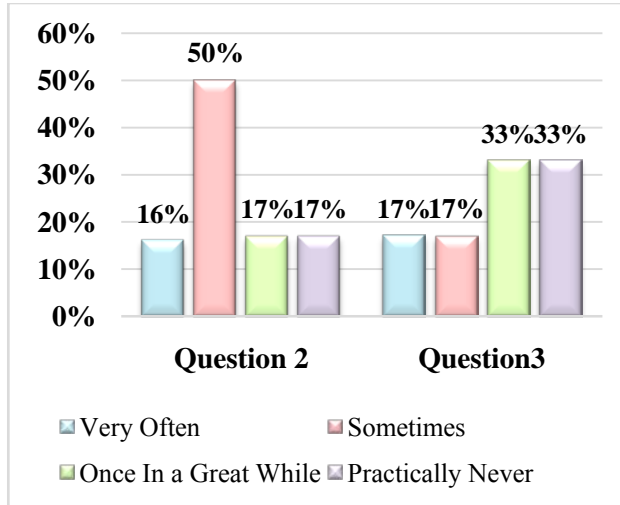


Figure 3.3 : Teachers' Self-Efficacy

Both questions 2 and 3 are well matched. This means that, if people doubt about their general capacities and skills, they are more likely to lose their conversational abilities. Indeed, the graph above demonstrates that 50% of teachers have sometimes trouble thinking of the right thing to talk about, while 16% face this situation very often. Whereas 17% of tutors have that feeling only once in a great while, whilst 17% practically never feel that way. Likewise, question n°3 categorized teachers into two groups: the first group have some difficulties to select the right thing to talk about either very often 17% or sometimes 17%, contrary to the second group of teachers who have that feeling once in a great while 33% or practically never 33%.

As a matter of fact, teachers who think that there is something they cannot do well are more likely to experience some difficulties to select the appropriate topic for the right situation. That is to say, if teachers doubt about their general skills, they tend to lose their conversational abilities. Their uncertainty would lead them to feel anxious in a conversational situation, afraid to express themselves, share their ideas and provide opinions. The fact that would lead them either to avoid communication, be isolated, or keep silent. Such teachers are believed to belong to the low-self-esteem teachers' category.

ii. Teachers' Body Image

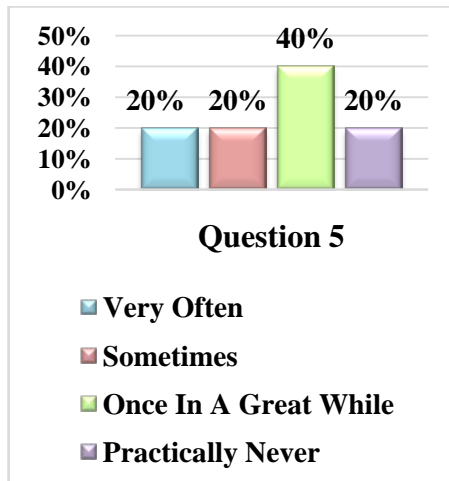


Figure 3.4 : Teachers' Body Image

Question n° 05 tackles teachers' body image. Hence, the results as can be depicted from the graph above reveals that 20% of teachers sometimes feel others see they are physically appealing, meanwhile 20% of tutors very often feel they are physically

attractive. Seemingly, these two categories of teachers tend to consider people's view while evaluating oneself. That is to say, their physical attractiveness depends on people's opinion.

Contrary to 40% of instructors who do not have that feeling on a regular basis, i.e. they think about others' views on their physical appearance only once in a great while, whereas 20% of them practically never have such feeling. The last two categories show teachers' confident about their physical appearance. It

is worth mentioning that the two last group of teachers, apparently, do not take physical appearance or people's regard to their physical look into account. As they have that feeling only once in a great while or even practically never, they simply trust themselves.

iii. Teachers' Self Evaluation

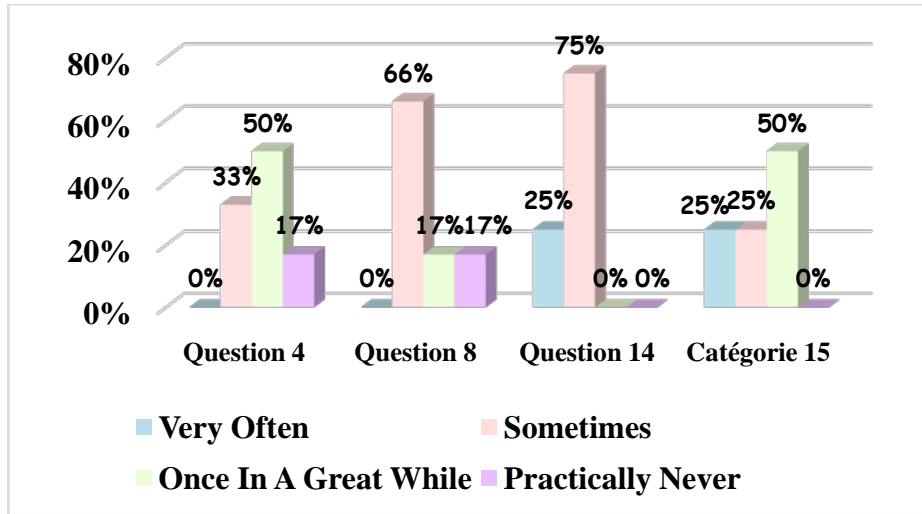


Figure 3.5 : Teachers' Self-Evaluation

Questions n° 4, 8 and 15 are widely linked to question n° 14. To put it clear, if teachers depend on others (students, colleagues) views, critics, or unfavourable opinion, this is going to determine their self-evaluation, i.e. they see themselves either a failure or success in their job. Therefore, the graph above displays that 50% of teachers worry only once in a great while about what others think they are, while 33% sometimes worry about it. The same two categories of teachers (50% and 33%) share the same feeling about colleagues' views and criticism in question n° 8. That is to say, 66% of tutors sometimes worry about colleagues' criticism, whilst 17% of teacher feel concerned once in a great while about it. In contrast, 17% of them practically never worry about people's regard, and none of them 0% experiences that feeling very often. By the same token, 17% of teachers practically never worry or fear colleagues' disapproval. Still 0% of instructors care very often about colleagues' critics.

In the same way, 50% of teachers feel concerned once in a great while about people unfavourable opinion. These teachers are the same who worry about peoples' view and criticism. Nevertheless, other tutors care about peoples' negative attitudes either sometimes 25% or very often 25%. Still, no one of them practically never cares about what others view or think.

Correspondingly, 75% of teachers worry sometimes about whether people regard them as a success or a failure in their job. As can be noticed in the graph, these teachers' depend heavily on others' opinions and critics as a means to evaluate themselves.

That is to say, their personal evaluation is not an inner sense of self-confidence but the outcome of what others think and view. While 25% of them worry very often. Though such teachers do not take into account people's opinions and critics, they still worry about whether they are regarded as a success or a failure. This fact clearly exhibits their luck or unbalanced self-confidence. Still, no teacher cares once in a while 0% or practically never 0% of what others regard him: success or failure.



## iv. Teachers' Self-Consciousness

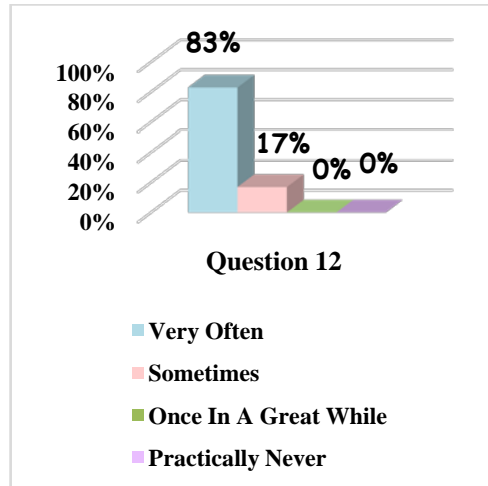


Figure 3.6 : Teachers' Self-Consciousness

Question n° 12 is aims at discovering the extent to which teachers are self-conscious. Thus, 83% of teachers claim that they are very often self-conscious, while 17% of them assumed only sometimes. But, no teacher does feel conscious only once in a great while 0% or practically never 0%. This fact ensures that self-consciousness is commonly present amid teachers.

#### IV. SUGGESTIONS AND RECOMMENDATIONS

The following are some proposals that might help improving self-esteem. It can be one basic way to develop positive classroom teachers' behaviours and performances.

- *Believe One Self*: being self-confident about one's capacities, knowledge, social skills ...etc.).
- *Self-Awareness*: according to lock 2013, Self-awareness is what makes a strong personality. It is central for self-development. *Body Language*: Developing body language can result in a both positive teachers' classroom behaviours and students' perception to teachers and attitudes to learning.
- *Learner Centeredness Approach*: Learners' centeredness approach highlights learners' goals and puts them at priority. It focuses on two main components: students' ability to decide about the way they prefer to go about their own learning process, and, teachers as facilitators and guiders.
- *Reflective Teaching*: The reflective practice is about questioning one's own teaching practices as to improve the quality of both teaching and learning processes.

#### V. CONCLUSION

This study is attempt towards amplifying the eminence of teachers' self-esteem. As confessed by teachers' participant and proved by scholars, self-esteem is an integral component in teaching. It can help to develop teachers' personality, better the teaching performances and improve the learning process. Thus, its improvement can be beneficial for teachers and learners alike.

#### REFERENCES RÉFÉRENCES REFERENCIAS

1. CHRISTOPHER, J. M. (2006) *"Self-Esteem Research, Theory, and Practice"*. Springer Publishing Company, New York.
2. MARY H. GUINDON (2010) *"Self-Esteem across the Lifespan: Issues and Interventions"*. Routledge, Francis and Taylor Group, New York, London.
3. [4] SMELSER, N. J. (1989). *"Self-Esteem and Social Problems: An Introduction. In A. M. Mecca, N. J. Smelser & J. Vasconcellos (Eds.)"* The social importance of self-esteem (pp. 1–23). Berkeley: University of California Press.
4. [5][8]Gerardo Valazza (2011) "Professional development: teacher development and confidence". Available at:<http://www.onestopenglish.com/support/methodology/professional-development/professional-development-teacher-development-and-confidence/146473.article>
5. [6]HEAD, K. AND P. TAYLOR (1997). *"Readings in Teacher Development"*. Oxford: Heinemann.
6. [7]ROSSNER, R (1992): *"Where there's a will – facilitating teacher development"* in Teacher Development Newsletter 18: 4 – 5.



GLOBAL JOURNAL OF HUMAN-SOCIAL SCIENCE: G  
LINGUISTICS & EDUCATION  
Volume 16 Issue 6 Version 1.0 Year 2016  
Type: Double Blind Peer Reviewed International Research Journal  
Publisher: Global Journals Inc. (USA)  
Online ISSN: 2249-460X & Print ISSN: 0975-587X

## Psychometric Evaluation of Job Satisfaction Scale in Uganda's Teacher Population Sample

By Musenze Ibrahim Abaasi

*Makerere University Business School*

**Abstract-** Despite several studies in the field of job satisfaction, troublesome areas are still evident. There is still controversy as to whether specific sample may be assessed using instruments which were largely developed based on a dissimilar type of sample other than the one under study. With focus on the problematic area, we derived the purpose for our study. The purpose of the present study is to examine Job Satisfaction Survey's (JSS) relevance for estimation of job satisfaction in teacher population in Uganda. Confirmatory Factor Analysis, using structural equation modelling technique was used to assess the model fit in 208 primary school teachers in Uganda. Results of the Confirmatory Factor Analysis of the teachers' sample did not support the existence of the original 9 facet model by (Spector, 1985), suggesting that some of the JSS's sub scales do not reflect teachers' job satisfaction within the context of Uganda. The best model in the present study was determined to be a four factor solution model, including promotion, supervision, fringe benefits and nature of work.

**Keywords:** *job satisfaction, psychometric evaluation, teachers.*

**GJHSS-G Classification :** *FOR Code: 130313p*



*Strictly as per the compliance and regulations of:*



# Psychometric Evaluation of Job Satisfaction Scale in Uganda's Teacher Population Sample

Musenze Ibrahim Abaasi

**Abstract-** Despite several studies in the field of job satisfaction, troublesome areas are still evident. There is still controversy as to whether specific sample may be assessed using instruments which were largely developed based on a dissimilar type of sample other than the one under study. With focus on the problematic area, we derived the purpose for our study. The purpose of the present study is to examine Job Satisfaction Survey's (JSS) relevance for estimation of job satisfaction in teacher population in Uganda. Confirmatory Factor Analysis, using structural equation modelling technique was used to assess the model fit in 208 primary school teachers in Uganda. Results of the Confirmatory Factor Analysis of the teachers' sample did not support the existence of the original 9 facet model by (Spector, 1985), suggesting that some of the JSS's sub scales do not reflect teachers' job satisfaction within the context of Uganda. The best model in the present study was determined to be a four factor solution model, including promotion, supervision, fringe benefits and nature of work. In view of study's originality/value; the current wave of changes in the education sector in Uganda demand validated scales that can address job context specific requirements to follow-up variations in the satisfaction levels of primary school teachers, an area least addressed in literature in Uganda, which this study has fulfilled.

**Keywords:** job satisfaction, psychometric evaluation, teachers.

## I. INTRODUCTION

The Job satisfaction Instrument (JSI) (Spector, 1985) is one of the most widely used instruments used to measure Job satisfaction. It a 36 multi-dimensional instrument developed by Spector in 1985 to measure job satisfaction. This kind of measurement considers job satisfaction from human service employee. Overall, the Job satisfaction survey or instrument present evidence for scale reliability and construct validity. The scale reveals a nine (9) factor solution of: Pay, Promotion, Supervision, Fringe Benefits, Contingent Rewards, Operating Procedures, Coworkers, Nature of Work, and Communication. It allows adequate assessment of level of job satisfaction among workers in organizations.

The psychometric properties for the Job satisfaction Instrument (JSI) are strong and have been well-established (Mahamoud, 2012; Astrauskaitė, Vaitkevičius & Perminas, 2011). In addition, the Job satisfaction scale has strong test-retest reliability,

long term reliability, and validity (Spector, 1985; 1997). The JSS uses 36 items with a 6-point scale (—strongly agree to —strongly disagree) to assess nine facets (Pay, Promotion, Supervision, Fringe Benefits, Contingent Rewards, Operating Procedures, Coworkers, Nature of Work, and Communication). Internal consistency reliabilities reported by Spector (1985) for the facets range from .60 (Coworkers) to .82 (Supervision), with a value of .91 for the total score and 18-month test-retest Coefficients, in range of .37 to .71. A multi trait-multi method matrix analysis using JSS and Job Descriptive Index facet scales supported their construct validity (Spector, 1985). Poor job satisfaction has been significantly associated with a host of negative organizational outcomes, including reduced productivity (Appelbaum & Kamal, 2000); delivery of inferior quality work (Tietjen & Myers, 1998); low firm's competitiveness and profitability (Garrido, Perez, & Anton, 2005; Aronson, Laurenceau, Sieveking, & Bellet, 2005).

The bulk of studies on the measurement properties of the modified self- Job Satisfaction Scale (JSS) were conducted in the USA, Europe and Asia (for a review, see Mahmoud ,2012; Byrne, 2010; Al-Khalil & Mahmoud, 2012); thus it was considered important that local validation of the measure precedes its use in a Ugandan setting. The study therefore seeks to establish whether the modified version of the Job satisfaction Scale (JSS) can offer a reliable and valid measure of Job satisfaction on a Ugandan sample. By extension, the primary objective of this study was to test the reliability and construct and/or factorial validity/the factor structure of the Job satisfaction Scale(JSS) on a Ugandan sample of primary school teachers. To the researchers' knowledge, the Job satisfaction Scale (JSS) has been used locally in a few published studies (Musenze, Mayende & Mohamadi, 2014), but the psychometric properties were not reported.

Further, as earlier pointed out; the Job Satisfaction Scale (JSS) was originally developed by Spector in 1985 and has since been used or applied to all organizations. Despite the popularity of the measure, there continues to be disagreement as to whether Spector's original nine-factor model of pay, promotion, supervision, fringe benefits, contingent rewards (performance based rewards), operating procedures, co-workers, nature of work and communication represents the most valid structure. Other authors

**Author:** PhD, Lecturer, Makerere University Business School, Kampala, Uganda. e-mail: ibramusenze@yahoo.com



(Astrauskaitė & Vaitkevičius, 2011) have supported a three-factor model of promotion, supervision and nature of work. The difficulty in determining the most psychometrically sound factor structure of the Job Satisfaction Scale (JSS) is further exacerbated by the fact that the Job Satisfaction Scale (JSS) development was based on the samples from community health centers, state psychiatric hospitals, state social service departments, nursing homes (Spector, 1985).

The instrument was used in various studies within different organizational sectors in different cultures (Giri & Kumar, 2010; Watson, Thompson & Meade, 2007). This level of diversity complicates the situation as to the appropriate structure and setting. While the Job Satisfaction Survey is one of the most frequently used job satisfaction instruments (Liu, et al., 2004; Watson et al., 2007; Yelboga, 2009), we hypothesize that some of the Job Satisfaction Survey's facets do not correspond teachers' job satisfaction dimensions adequately. The generated purpose of the present study is to examine Job Satisfaction Survey's relevance for estimation of job satisfaction model of teacher population in primary sector in Uganda.

## II. LITERATURE REVIEW

### a) *Teachers and Job Satisfaction*

Teachers were often found to have different operating circumstances and experience higher levels of work related stress in relation to usual and typical organizations' employees (Klassen et al., 2010). Unlike typical traditional organizations' employees, teachers have multiple responsibilities. They are required to educate students, ensure their safety and healthy atmosphere, communicate and jointly work together with parents, specialists and administrators, and knowledge, administer documents, organize school trips and complete a range of other tasks like co- curricular activities provided by the government and school administration (Comber & Nixon, 2009). Quite often, teachers register numerous challenges in dealing and interacting with problematic students of various ages, and social background. Such level of interaction, demand sufficient communication, problem solving, interpersonal and conflict managing skills.

Confronted with such challenges, teachers' work requires emotional and intellectual resources which may result into burnout, depression or other physical and psychological health related issues (Chang, 2009). It is evident that teachers vary from typical traditional employees in a variety of ways. Accordingly, tools that usually measure such job satisfaction dimensions as appreciation, communication, coworkers, fringe benefits, job conditions, nature of work, organization itself, organizations' policies and procedures, pay, personal growth, promotion opportunities, recognition,

security, supervision may not constantly match with teachers' job satisfaction facets (Spector, 1997).

Literature is consistently in agreement that supervision, co- workers, work itself, promotion and recognition are more important facets of teachers' satisfaction with work (Sharma & Jyoti, 2009; Tillman & Tillman, 2008). However, there are also some other aspects that significantly contribute to teachers' satisfaction that should not be ignored in respect to understanding teachers' job satisfaction phenomenon. "Relationships with students are largely contributing to teachers job satisfaction" – as pointed out by Ramatulasamma and Bhaskara Rao (2003, p.71). Other scholars emphasize such dimensions of job satisfaction as: students' personality and behavior, classroom control, accessibility to the resources, relations with students, colleagues and supervisors (Sharma and Jyoti, 2009). Despite the arguments of various researchers, teachers' job satisfaction is still evaluated using general instruments developed and based on other specific samples (Blood et al., 2002; Castillo, Conklin & Cano, 1999; Tillman et al., 2008; Wong, 2010).

### b) *The Present Study*

Prior results in the research field of job satisfaction unmasked a number of knotty areas. First of all, the bulk of studies on the measurement properties of the modified self- Job Satisfaction Scale (JSS) were conducted in the USA, Europe and Asia (Mahmoud, 2012; Byrne, 2010; Al-Khalil & Mahmoud, 2012); thus necessitating local validation of the modified Job satisfaction scale on a Ugandan sample. Secondly, specific samples, such as teachers are often assessed using scales that may not constantly replicate properties of a particular sample. Based on this, I do contend or hypothesize that although the general job satisfaction instruments or instruments which were primarily developed for specific industry sector do not always mirror other specific sample's characteristics, there were no studies conducted to explain this issue until now. In this article, I examine the relevance of Paul Spector's Job Satisfaction Survey's (JSS), for estimation of job satisfaction of the Ugandan primary teacher population sample.

Thirdly, the JSS was developed based on the samples from community health centers, state psychiatric hospitals, state social service departments, nursing homes (Spector, 1985). However, soon after, the instrument was used in a series of studies within diverse organizational sectors in different cultures (Giri & Kumar, 2010; Watson, Thompson & Meade, 2007). Job Satisfaction Survey is one of the most regularly used job satisfaction instruments (Giri et al., 2010; Liu, et al., 2004; Watson et al., 2007; Yelboga, 2009). Yet, we hypothesize that some of the Job Satisfaction Survey's facets do not correspond teachers' job satisfaction dimensions adequately. Lastly, despite the popularity of

the measure, there continues to be disagreement as to whether Spector's original nine-factor model of pay, promotion, supervision, fringe benefits, contingent rewards (performance based rewards), operating procedures, co-workers, nature of work and communication represents the most valid structure since other researchers like (Astrauskaitė & Vaitkevičius, 2011) have supported a three-factor model of promotion, supervision and nature of work.

The generated purpose of the present study is to examine Job Satisfaction Survey's relevance for estimation of job satisfaction of teacher population in Uganda. To examine the data and to create a model that robustly fits our Ugandan teachers' sample, we rely on confirmatory factor analysis (CFA) which is one of the techniques of structural equation modeling. The goals of the present study are a) to assess JSS prime model's adequacy to the primary school teachers' sample and b) to determine JSS's facet model that best fits our primary school teachers' sample. Findings, limitations and recommendations are discussed further in the article.

### III. METHODS

#### a) Design, population and sample

This study employs a cross sectional survey design. A total sample of 247 primary school teachers was generated using Yamane's (Yamane, 1967) sample size determination approach from a total population of 650. In order to ensure that each participant had equal chance in the study, 247 teachers were selected from a total population of six hundred and fifty (650) primary school teachers, using simple random sampling technique. Two hundred and eight (208) questionnaires were retrieved from the field indicating a response rate of 84%. The unit of analysis was the individual primary school teachers. In terms of gender, the male respondents constituted 66% and the female respondents were 34%. Out of 208 respondents, 130 had grade three certificates; 70 diplomas, 08 had degrees. More than half of the respondents were above 25 years of age.

Confirmatory factor analysis technique (as with almost all other multivariate statistical techniques) requires data without missing values (Tabachnick & Fidell, 2007). Based on this, missing value analysis was done and the missing values were replaced using linear interpolation method, consistent with recommendations by (Dodge, 2006). This method was used because of its capability to preserve the entire data structure (Dodge, 2006), a major limitation with other replacement methods such as series mean. After replacement, the final data set consisted of 208 respondents.

#### b) Measuring Job Satisfaction

The respondents were requested to complete the Job Satisfaction Survey (JSS) developed by Paul

Spector (Spector, 1985). The scale offers adequate reliability, validity and normative data measurements (internal consistency reliability and total norms of JSS are presented in Table 1). Also, JSS is available for researchers free of charge for use provided it is not for commercial purposes (Spector, 1997). The JSS assesses 9 facets including pay, promotion, supervision, fringe benefits, contingent rewards, operating conditions, coworkers, nature of work and communication. Each of the sub scales consists of four items. The overall job satisfaction score is computed by summing all 36 items. Therefore, the Job Satisfaction Scale is a 36 multi-dimensional instrument. Examination of the dimensions' internal consistency revealed that Cronbach alpha coefficient ( $\alpha$ ) for each dimension of the survey ranged from .45 to .74 (which implies that internal consistency of some JSS scales was probably unsatisfactory in this setting; as at least 0.7 and above is acceptable (Nunnally, 1978). More detailed information on the internal consistency reliability of JSS scales in our study is provided in Table 1. The data were analyzed using statistical package SPSS 20.0 and AMOS 19.0 for CFA.

#### c) Statistical modelling

To evaluate Spector's JSS Scale, I relied on Structural equation modelling (SEM), specifically Confirmatory factor Analysis (CFA). SEM is an all-inclusive statistical approach used to ascertain whether relations exist among observed and latent variables (Hoyle, 1995; Kline, 2011). Accordingly, to evaluate the psychometric properties of Spector's JSS scale, the present study uses SEM with AMOS. We used the estimation procedure in AMOS 19 (Arbuckle, 2009) to determine Job satisfaction factor solution model in a teacher sample of primary schools in Uganda. The Chi-square test which is an absolute test of model fit demands that the model is rejected if the p-value is  $< 0.05$ ; Root mean square error of approximation (RMSEA) should be  $< 0.06$  and Tucker-Lewis Index (TLI) values of 0.95 or higher (Hu and Bentler, 1999). Others like Kim (2007) recommend goodness of fit (GFI)  $> 0.90$ , adjusted goodness of fit index (AGFI)  $> 0.85$ , TLI  $> 0.95$ , CFI  $> 0.90$  and RMSEA  $< 0.08$  as satisfactory goodness-of-fit indices. We hence followed these guidelines in evaluating the JSS scale based on Ugandan primary teacher sample.

### IV. RESULTS

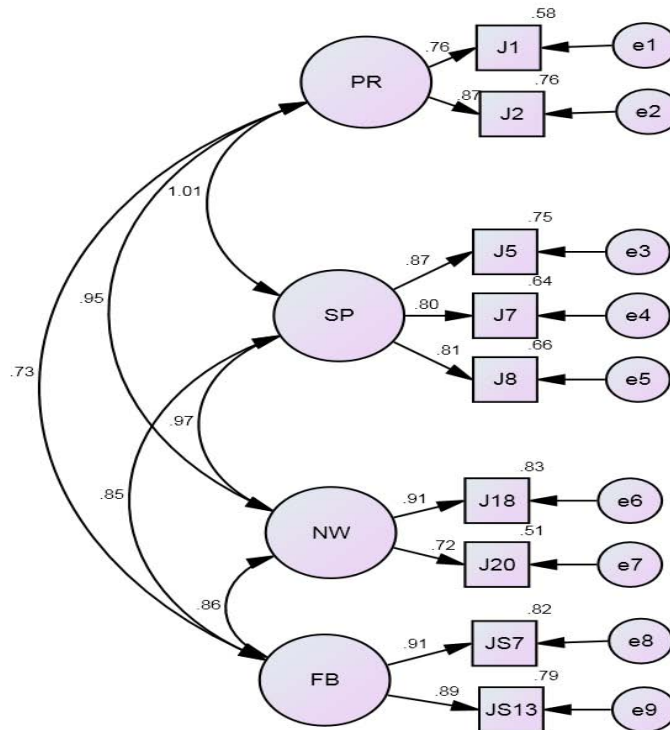
The data of 208 respondents did adequately satisfy the prerequisite of multivariate normality (multivariate kurtosis = 0.91; critical ratio = 18.0); therefore I proceeded with further analysis using structural equation modeling, mainly to estimate models' precise fit. SEM requires that the assumption of multivariate normality is satisfied (Kline, 2010).

As the purpose of the analysis was to explore the facets' model, the overall index score of job satisfaction (as a factor) was not integrated. The original model comprised of 9 dimensions as first order factors matching to the JSS scales. In order to ensure that every indicator loads only on one factor, I only relied on standard CFA models. This technique assisted eliminate correlations between measurement errors. The results of CFA indicated that the primary nine facet model did not adequately fit the data well ( $p > .05$ ;  $GFI = .655$ ;  $AGFI = .586$ ;  $NFI = .721$ ;  $TLI = .698$ ;  $CFI = .762$ ). Accordingly, through model trimming, CFA was also used to establish the other model which adequately fits the Ugandan Teacher sample best. This process generated a four factor solution model of: promotion, supervision and nature of work and pay. The model with standardized estimates is presented in Figure 1. CFA showed adequate fit of the model to the data ( $p = .13$ ). Goodness of fit indices also confirmed adequateness of the model (Table 3).

From the above analysis, it can be deduced that there is a momentous and significant association between JSS factor solution of observed variables (promotion, supervision, nature of work and fringe benefits) and their underlying latent variables in Ugandan primary school teacher's sample as can be detected from Figure 1 and Table 3. The JSS model put forward in this study showed an  $NFI$  of 0.948, which indicates strong convergent validity (Mark and Sockel, 2001). Further, as can be seen in Figure 1 – representing the present study's factor structure –

items present satisfactory factor loadings that vary between .37 and .90, and thus indicating the model's convergent validity (Kline, 2011). These observed factor loadings show support of a relationship between Job satisfaction scale and its relevant and respective confirmed facets of promotion, supervision, nature of work and fringe benefits. More evidence is provided by the  $RMSEA = 0.59$  which is further supported by baseline comparison fit indices: the  $TLI$  result of 0.90 and  $CFI = .952$ . In addition,  $GFI$  of 0.91 surpasses the suggested minimum of 0.9 which demonstrates acceptable fit of the data. Accordingly, Job Satisfaction four factor structure is confirmed for the sample of primary school teachers in Uganda.

Results in Table 1, indicate that the observed factor loadings of all the items are statistically significant ( $p < 0.01$ ) that is at 1 percent. According to Bollen (1989) and Koufteros (1999), item reliability is assessed through examining multiple regressions ( $R^2$ ) and should be well above 0.5, a prerequisite that this study fulfilled. This showed consistence of items in measuring a construct (Kline, 2010; Lu et al., 2007) and the construct reliability of (0.795; 0.834, 0.801 and 0.825) for promotion; supervision, nature of work and fringe benefits respectively were above 0.7 indicating adequate construct reliability (Kim, 2007; Nunually, 1978). Discriminant validity is assessed using average variance extracted (AVE) which should be above 0.5 (Fornell and Larcker, 1981). In this study, it is 0.704 which signifies adequate convergent validity.



$NFI$  .948;  $TLI$  .904;  $CFI$  .952;  $GFI$  .912;  $AGF$  .901;  $RMSEA$  .597;  $p = .13$   
 Note: PR – promotion; SP – Supervision; NW – Nature of work ; FB – Fringe benefits

Table 1 : Path coefficients for Job satisfaction in Uganda.

Path	Unstandardized path coefficient	Critical Ratio(CR)	Standardized Path coefficient	R2	AVE	P- value
J1 <--- PR	1.000		.763	.788	.704	
J2 <--- PR	1.330	13.055	.872	.824		.001
J5 <--- SP	1.000		.867	.515		
J7 <--- SP	1.156	14.537	.801	.828		.001
J8 <--- SP	.934	14.938	.814	.663		.001
J18 <--- NW	1.000		.901	.642		
J20 <--- NW	.731	12.458	.717	.751		.001
Js7 <--- FB	1.000		.908	.760		
JS13<---FB	.831	16.820	.888	.583		.001

Table 2 : Job Satisfaction among primary school teachers in Uganda

Job satisfaction dimension	Job satisfaction Items	Analysis code
Promotion (PR)	1.I am satisfied with my chances for promotion.	J1
	2.Employees who do well on the job stand a fair chance of being promoted.	J2
Supervision (SP)	1. I like my supervisor.	J5
	2. My supervisor is not interested in the feelings of subordinates.	J7
	3. My supervisor is quite competent in doing his/her job.	J8
Nature of Work(NW)	1. My job is enjoyable.	J18
	2. I like doing the things I do at work.	J20
Fringe benefits	1. The benefit package we have is equitable.	JS7
	2. There are benefits we do not have which we should have.	JS13

Table 3 : Fit Indices for Confirmed Job satisfaction Model in Uganda

Confirmed Job satisfaction Scale	NFI	TLI	CFI	GFI	AGFI	RMSEA
	.948.	904	.952	912	.901	.597

## V. DISCUSSION

The purpose of the present study was to examine Job Satisfaction Survey's (JSS) relevance for estimation of job satisfaction in Uganda teacher population. Results of the standard Confirmatory Factor Analysis of the teachers' sample did not support the existence of 9 facets factor model, suggesting that some of the JSS's sub scales do not reflect primary teachers' job satisfaction within the context of Uganda. In this study, a case has been made for developing a teacher job satisfaction scale that is grounded in specific job context and job content of Ugandan teachers. The resulting indigenous scale based on a large sample of primary school teachers drawn at random from teachers in Uganda represents a departure from the majority of imported and general scales that are frequently used in the domain of organisational psychology. It also represents a

rigorously derived tool for measuring job satisfaction in one predominantly teacher (primary) occupational cluster. The 9-item job satisfaction scale has demonstrated an acceptable level of internal consistence (reliability). The scale revealed a four factor structure that consisted of supervision, fringe benefits, promotion and nature of work. The following results suggest that some of the JSS's domains do not adequately measure teachers' job satisfaction sufficiently in the population of Ugandan primary school teachers.

There is a diversity of possible explanations for the unsatisfactory fit of the primary model compared with the original instrument development (JSS). First, according to Mueller & McCloskey (1990), the original JSS Instrument was developed more than 28 years ago based on small samples from community health centers, state psychiatric hospitals, and state social service departments besides nursing homes (Spector,

1985). The current study data were collected in 2016. With passage of time, work conditions and employment, agreements have changed. For example, nurses' pay and benefits have increased and improved consistent with governments' desire to retain health staff. In Uganda, the government has introduced funds for specifically doctors who accept to work at health centre IVs. Pay for primary school teachers has equally been enhanced consistent with government policy to improve the quality of education and make the sector more appealing. This may explain the relatively inferior reliabilities for the JSS scale when used with primary school teachers.

Another possible explanation for the poor fit relates to conceptual inconsistencies. The apparent lack of consensus on the job satisfaction concept and its dimensions among researchers, practitioners and research participants is still evident in literature. As Linda Evans hints, Research in this field is subject to an additional threat to construct validity, arising out of the vagueness of the concept of job satisfaction" (Evans, 1998, p.6). Without a universal consensus on what constitutes job satisfaction and its separate indicators are, misinterpretations may easily occur. Such misunderstandings may lead to unreliable and invalid results, as this case is.

The best model in the present study was determined to be a four factor solution model, including promotion, supervision nature of work and fringe benefits. The four indicators are among the most frequently investigated job satisfaction dimensions (Spector, 1997). Also, in the recent studies promotion, supervision and nature of work were proved to be of high importance in understanding teachers' job satisfaction (Sharma et al., 2009; Tillman et al., 2008; Rosser, 2005). Based on prior studies, we deduce that the four facets in our confirmed model represent significant and essential dimensions of teachers' job satisfaction and may be used in further research among teachers. Further, consistent with extant literature regarding a positive association between job satisfaction and organization commitment, the present scale linked significantly in the positive direction with Mowday et.al. (1982) organization commitment measure. The scale's predictive soundness was robust in the face of a relatively long period of over 13 months. Of the confirmed 7 job satisfaction sub scales, those relating to relationship with supervisors were major in predicting the likely hood of quitting. The contribution of the remaining factors to quitting decision was marginal. Based on this, it appeared that the decision to quit or stay on job is determined by worker's relationship with supervisors, which this study affirms. Further, the current results contribute to the growing body of literature on job satisfaction evaluation by employing the JSS in the Ugandan context. These findings suggest similarities in

cultural understandings among Uganda and Lithuanian employees (Astrauskaitė, Vaitkevičius & Perminas, 2011). Another contribution of this study relates to the data from a large sample size, which significantly supports the psychometric evaluation of the JSS.

The present study for measuring job satisfaction among primary school teachers in Uganda and the normative data reported herein, can serve a diversity of practical applications. The scale can for instance be used to assist with the evaluation of quality of teacher's work life and similar other agendas by evaluating changes in the satisfaction levels of various job areas prior and after the implementation program or plan. In the specific domain of teacher management, it is fascinating to note that pay, contingency rewards, coworkers and operating procedures was the area of least job satisfaction. Along with the current teachers' scheme of service and teacher sector restructuring, government of Uganda has introduced measures to improve on motivational levels of teachers. Some of these measures include the policy shift for headship of both primary and secondary schools aimed at collapsing the current school grading system; that is grade I, II, III and IV so that payment is not contingent on the grade of the school under his/her leadership but rather on academic qualification along with accompanying instrument. Communication within the sector has also been streamlined and operational procedures such as strict observance of teaching time tables given due consideration. Most teachers in public schools are now managed by general administrators who are unlikely to be teachers themselves. The effect of the new management environment on teachers' job satisfaction can be gauged on national level against the present normative data.

This study is not without limitations; first, the current finding is the limited selection of work contexts included in the study. The study was limited to primary education sector. Consistent with Strong et al.'s (1999) work context catalog or taxonomy, job contexts in some organizations may vary thereby defeating the goal of enhancing the generalizability and practical utility. Future research, regarding job satisfaction across work contexts should consider a diversity of work contexts that vary from one another to differing extents. Secondly, the study results are derived through confirmatory factor analysis (CFA). Recent study by Hopwood and Donnellan (2010) focusing on personality inventories' internal structure assessment using CFA technique, demonstrated that CFA may not always be a suitable method for personality inventories' model estimation. From their study, it is evident that not any of the sound or well-known personality attribute inventories demonstrated adequate model fit. While JSS is not a personality trait inventory, it is based on subjective employees' feelings towards their job. Consequently,

using only CFA is not satisfactory for the final conclusions regarding the test. Based on this argument, while Hopwood and Donnellan do not assert that CFA is generally unsuitable method; they suggest that researchers should employ multiple factor analytic methods that is (CFA as well as EFA) that this study was devoid of. This is not however to imply that the emergent JSS model is absolutely inadequate to the teacher sample studied.

## VI. CONCLUSION

In view of the satisfactory fit indices of reliability and validity of the scale, a new version of the Job Satisfaction Scale can be judged as reliable and valid for measuring job satisfaction within the context of primary school teachers in Uganda. The findings of this study suggest the need for scholars to focus and develop specific work context job satisfaction measures since the working environment differ from job to job. The following results suggest that some of the JSS subscales defectively explain teachers' job satisfaction facets.

Besides the desire for strong validity and reliability properties, require that research tools ought to be as concise as possible to lessen respondents' burden and research costs in respect to data collection, data exploration and analyses (Tourangeau&McGilton, 2004). In any survey, including fewer measures of study variables is normally positively related to superior statistical power. If teacher job satisfaction can be effectively measured using 9 items collapsing into four subscales as established in this study rather than nine subscales as developed by Spector 1985, analytical models that rely on these subscales are likely to have more statistical power. In the Ugandan setting and in other fields with similar support for service delivery, it is sensible to consider use this four factor scale for more credible results. However, I do recommend further redesigning, testing and retesting of the JSS instrument in order to minimize probable causes of error associated with sampling adequacy of items. This has the potential to increase instruments' internal consistence, hence increased efficacy, effectiveness and trustworthiness of the JSS as a legitimate and consistent measure of teacher Job.

## REFERENCES RÉFÉRENCES REFERENCIAS

1. Arbuckle, J. (2009). Amos 18 User's Guide. Chicago, IL: Amos Development Corporation.
2. Appelbaum, S., & Kamal, R. (2000). An Analysis of the Utilization and Effectiveness of Non-Financial Incentives in Small Business. *Journal of Management Development*, 19 (9), 733–63.
3. Aronson, K., Laurenceau, J., Sieveking, N., & Bellet,W. (2005). Job Satisfaction as a function of Job Level. *Admin. Policy Mental Health*, 32, 285-291.
4. Astrauskaitė, M., and Vaitkevičius, R. (2011) Job Satisfaction Survey: A Confirmatory Factor Analysis based on Secondary School Teachers' Sample. *International Journal of Business and Management* Vol. 6, No. 5, pp 41-50.
5. Astrauskaitė, M., Vaitkevičius, R., & Perminas, A. (2011). Job Satisfaction Survey: A Confirmatory Factor Analysis Based on Secondary School Teachers' Sample. *International Journal of Business & Management*, 6(5), 41-50.
6. Blood, G.W., Ridenour, J.S., Thomas, E.A., Qualls, C.D., & Hammer, C.Sch. (2002). Predicting job satisfaction among speech-language pathologists working in public schools. *Language, Speech, and Hearing Services in Schools*, 33, 282-290.
7. Byrne, B.M., & Van De Vijver, F.J.R. (2010). Testing for measurement and structural equivalence in large-scale cross-cultural studies: Addressing the issue of nonequivalence. *International Journal of Testing*, 10, 107-132.
8. Castillo, J.X., Conklin, E.A., & Cano, J. (1999). Job satisfaction of Ohio agricultural education teachers. *Journal of Agricultural Education*, 40 (2), 19-27.
9. Comber, B., & Nixon, H. (2009). Teachers' work and pedagogy in an area of accountability. *Discourse: Studies in the Cultural Politics of Education*, 30(3), 333-345.
10. De Nobile, J.J., & McCormick, J. (2005). Job satisfaction and occupational stress in catholic primary schools. A paper presented at the Annual Conference of the Australian Association for Research in Education, Sydney, November 27th–December 1<sup>st</sup>, 2005.
11. Dodge, Y. (2006). *The Oxford dictionary of statistical terms*. New York: Oxford University Press.
12. Evans, L. (1998). *Teacher morale, job satisfaction and motivation*. Great Britain: Paul Chapman Publishing Ltd.
13. Fornell, C., Larcker, D.F. (1981). Evaluating structural equation models with unobservable Variables and measurement error. *Journal of Marketing Research* 18 (1), pp. 39-50.
14. Garrido, M. J., Perez, P., & Anton, C. (2005). Determinants of Sales Manager Job Satisfaction: An Analysis of Spanish Industrial Firms. *International Journal of Human Resource Management*, 16 (10), 1934–54.
15. Giri, V.N., & Kumar, B.P. (2010). Assessing the impact of organizational communication on job satisfaction and job performance. *Psychological Studies*, 55(2), 137-143.
16. Hopwood, Ch.J., & Donnellan, M.B. (2010). How should the internal structure of personality inventories be evaluated? *Personality and Social Psychology Review*, 14 (3), 332-346.

16. Hoyle, R. H. (1995). The structural equation modeling approach: Basic concepts and fundamental issues. In *Structural equation modeling: Concepts, issues, and applications*, R. H. Hoyle (editor). Thousand Oaks, CA: Sage Publications, Inc., pp. 1-15.
17. Hu, L., & Bentler, P.M. (1999). Cutoff criteria for fit indexes in covariance structure analysis: Conventional criteria versus new alternatives. *Structural Equation Modeling*, 6, 1 – 55.
18. Kim, K. (2007). *Structural equation Modeling*. Seoul: Hannarae.
19. Klassen, R.M., Usher, E.L., & Bong, M. (2010). Teachers' collective efficacy, job satisfaction, and job stress in cross-cultural context. *The Journal of Experimental Education*, 78, 464-486.
20. Kline, R.B. (2011). *Principles and practice of structural equation modeling*, 3<sup>rd</sup> ed. New York: The Guilford Press.
21. Liu, C., Borg, I., & Spector, P.E. (2004). Measurement equivalence of the German job satisfaction survey used in a multinational organization: Implications of Schwartz's culture model. *Journal of Applied Psychology*, 89(6), 1070-1082.
22. Mahmoud, A. B. (2012). The influence of gender and job description on job satisfaction: An empirical study within public hospitals in Damascus. *Damascus University Journal of Economics & Law Sciences*.
23. Mark, B., & Sockel, H. (2001). A Confirmatory Factor Analysis of IS Employee Motivation and Retention. *Information Management*, 38, 265-276.
24. Nunnally, J. C. (1978). *Psychometric theory* (2<sup>nd</sup> ed.). New York: McGraw Hill.
25. Ramatulasamma, K., & Bhaskara Rao, D. (2003). *Job Satisfaction of Teachers Educators*. India: Discovery Publishing House.
26. Rosser, V.J. (2005). Measuring the change in faculty perceptions over time: An examination of their worklife and satisfaction. *Research in Higher Education*. 46(1), 81-107.
27. Sharma, R.D., & Jyoti, J. (2009). Job satisfaction of university teachers: An empirical study. *Journal of Services Research*, 9(2).
28. Spector, P. (1997). *Job satisfaction: Application, assessment, causes, and consequences*. Thousand Oaks, CA: Sage.
29. Spector, P. E. (1985). Measurement of human service staff satisfaction: development of the Job Satisfaction Survey. *American Journal of Community Psychology*, 13(6), 693-713.
30. Strong, M. H., Jeanneret, P. R., McPhail, S. M., Blakley, B. R., & D'Egidio, E. L. (1999). Work context: Taxonomy and measurement of work environment. In N. G. Peterson, M.D. Mumford, W. C. Borman, P. R. Jeanneret & E. A. Fleishman (Eds.), *An occupational information system for the 21<sup>st</sup> century*. (pp.127-146). Washington, D.C.: American Psychological Association.
31. Tabachnick, B.G., & Fidell, L.S. (2007). *Using Multivariate Statistics*. United States of America: Pearson Education.
32. Tietjen, M., & Myers, R. (1998). Motivation and Job Satisfaction. *Management Decision*, 36 (4), 226–31.
33. Chang, M.L. (2009). An appraisal perspective of teacher burnout: Examining the emotional work of teachers. *Educational Psychology Review*, 21, 193-218.
34. Tillman, W.R., & Tillman, C.J. (2008). And you thought it was the apple: A study of job satisfaction among teachers. *Academy of Educational Leadership Journal*. 12(3), 1-18.
35. Watson, A.M., Thompson, L.F., & Meade, A.W. (2007). Measurement invariance of the job satisfaction survey across work contexts. Paper presented at the 22nd Annual Meeting of the Society for Industrial and Organizational Psychology, New York.
36. Wong, Y.H.P. (2010). Kindergarten teachers' perceived school culture and well-being: A comparison of non-profit-making and profit-making kindergartens. *Early Child Development and Care*, 180(3), 271-278.
37. Yamane, T. (1967). *Statistics, an Introductory Analysis* (2<sup>nd</sup> ed.). New York: Harper and Row.
38. Yelboga, A. (2009). Validity and reliability of the Turkish version of the job satisfaction survey (JSS). *World Applied Sciences Journal*, 6(8), 1066-1072.



GLOBAL JOURNAL OF HUMAN-SOCIAL SCIENCE: G  
LINGUISTICS & EDUCATION  
Volume 16 Issue 6 Version 1.0 Year 2016  
Type: Double Blind Peer Reviewed International Research Journal  
Publisher: Global Journals Inc. (USA)  
Online ISSN: 2249-460X & Print ISSN: 0975-587X

## Investigating the Most and the Least used Vocabulary Learning Strategies among Saudi Undergraduate Learners

By N. Alyami

*University of Central Lancashire, United Kingdom*

**Abstract-** This paper investigates the most and the least frequently used vocabulary learning strategies (VLSs) among Saudi undergraduate learners, in Najran University, Saudi Arabia. It forms part of a larger study investigating the different uses of VLSs and how they are perceived by Saudi learners studying a range of different majors. The sample consisted of 158 male and female students, who were asked to report their uses of the seventy-five VLSs (which were divided into 12 dimensions) using a five-point Likert scale in which 1 represents “never”, 2 represents “rarely”, 3 represents “sometimes”, 4 represents “often”, and 5 represents “always”. A questionnaire was used for the purpose of collecting the data, which were subsequently computed and analysed using descriptive statistics. This involved calculating the overall means of all dimensions and ranking them in order, as well as giving the mean values for the most and least used VLSs in order. The results indicated that, in certain situations, learners tend to focus more on the meaning of words in L1 than in L2.

**Keywords:** *language learning strategies, vocabulary learning strategies (VLSs), L1, L2.*

**GJHSS-G Classification :** *FOR Code: 200401*



*Strictly as per the compliance and regulations of:*



© 2016. N. Alyami. This is a research/review paper, distributed under the terms of the Creative Commons Attribution-Noncommercial 3.0 Unported License (<http://creativecommons.org/licenses/by-nc/3.0/>), permitting all non-commercial use, distribution, and reproduction in any medium, provided the original work is properly cited.



# Investigating the Most and the Least used Vocabulary Learning Strategies among Saudi Undergraduate Learners

Naji Awadh Alyami

**Abstract-** This paper investigates the most and the least frequently used vocabulary learning strategies (VLSs) among Saudi undergraduate learners, in Najran University, Saudi Arabia. It forms part of a larger study investigating the different uses of VLSs and how they are perceived by Saudi learners studying a range of different majors. The sample consisted of 158 male and female students, who were asked to report their uses of the seventy-five VLSs (which were divided into 12 dimensions) using a five-point Likert scale in which 1 represents “never”, 2 represents “rarely”, 3 represents “sometimes”, 4 represents “often”, and 5 represents “always”. A questionnaire was used for the purpose of collecting the data, which were subsequently computed and analysed using descriptive statistics. This involved calculating the overall means of all dimensions and ranking them in order, as well as giving the mean values for the most and least used VLSs in order. The results indicated that, in certain situations, learners tend to focus more on the meaning of words in L1 than in L2. This is the case, for example, when students use a dictionary to look up the meaning of a new word, when they ask teachers or classmates about the L1 equivalent of an English word, and when they are writing down new L2 words with their L1 translations. The least frequently used strategies were those that require higher order thinking skills, such as “organizing words by meaning group”. Moreover, the most frequently used dimension was “reasons for note taking strategies”, while the least frequently used dimension was “ways of organizing notes taken”.

**Keywords:** language learning strategies, vocabulary learning strategies (VLSs), L1, L2.

## I. INTRODUCTION

Teachers of languages and linguistics claim that vocabulary is one of the most important aspects of language learning; some even believe that vocabulary is more important than grammar. Wilkins (1972:111) notes that “without grammar very little can be conveyed, without vocabulary nothing can be conveyed”. Cook (1991:37) also states that “grammar provides the overall patterns, vocabulary the material to put in the patterns”. Furthermore, Luo (1992, cited in Lessard-Clouston 1996:27) asserts that “vocabulary - words, phrases, idioms, etc. is at the heart of all language usage in the skill areas of listening, speaking, reading, and writing, as well as culture.” These statements all support the vital role played by

*Author:* School of Literature, Language and International Studies, University of Central Lancashire, UK.

*e-mails:* nanalyami@uclacn.ac.uk, naji-alyami@hotmail.com

vocabulary, in both first and second language acquisition, in achieving comprehensible communication. Learners need to build up their vocabulary and expand their repertoires. They are more likely to carry a dictionary with them than a grammatical reference book, and they admit that their main problem is not knowing enough words (Krashen, 1989:440).

In recent years, there has been a greater focus on vocabulary, and on VLSs (VLSs) in particular. Hulstijn (1993) suggests that teachers should not only teach learners certain words, but should also provide them with strategies for expanding their vocabulary knowledge.

As noted earlier, this paper is part of a larger study investigating the different uses of VLSs and how they are perceived by Saudi learners studying a range of different majors. However, it also attempts to determine which VLSs, and which dimensions, are most and least frequently used by Saudi learners.

## II. LITERATURE REVIEW

### a) Vocabulary Knowledge

Miller (1996:5) as cited in (Qian, 2002:21) states that, in order to produce a comprehensible output, learners need to know the following key aspects about a word: “its sound, its own spelling, its own meaning, its own role, its own use, its own history”. Nation (2001:27) has summarized what is involved in knowing a word. As can be seen in table 1 below, knowing every aspect of a word might be somewhat tedious for L2 learners.

*Table 1 :* What is involved in knowing a word (Nation, 2001:27) (Note: R = receptive knowledge, P = productive knowledge)

Form	Spoken	R P	What does the word sound like? How is the word pronounced?
	Written	R P	What does the word look like? How is the word written or spelled?
Word parts		R P	What parts are recognizable in this word? What word parts are needed to express this meaning?
	Meaning	R P	What meaning does this word form signal? What word form can be used to express this meaning?
Concepts and referents		R P	What is included in the concept? What items can the concept refer to?
	Associations	R P	What other words does this make us think of? What other words could we use instead of this one?
Use	Grammatical functions	R P	In what patterns does this word occur? In what patterns must we use this word?
	Collocations	R P	What words or types of words occur with this one? What words or types of words must we use with this one?
Constraints on use		R P	Where, when, and how often would we expect to meet this word? Where, when, and how often can we use this word?

It is obvious that learners should know many aspects about a word. Nation (2001:23) pointed out “there are many things to know about any particular word and there are many degrees of knowing...words are not isolated units of language, but fit into many interlocking systems and levels” (ibid:23). However, they do not need to know all of the aspects. Thus, table 2 summarizes those aspects which I believe to be the most important.

Table 2 : Author’s views about word knowledge

<b>A- Knowing the collocation of the words</b>
<b>B- Knowing the different aspects of meanings associated with the words.</b>
<b>C- Knowing the formality (register) of the words</b>
<b>D- Knowing all the grammatical rules of the words</b>
<b>E- Knowing the pronunciation of the words</b>

b) *Language Learning Strategies (LLSs)*

It is better to address LLSs before addressing VLSs, as the former may shed light on the latter. As noted by Segler (2001), the majority of LLSs taxonomies are VLSs, and can therefore be used to learn L2 vocabulary. Thus, “combining the results from general learning strategies research with those from more vocabulary-specific studies allows us to derive a number of tentative general conclusions about vocabulary learning strategies” (Schmitt, 1997:200).

A number of definitions for LLSs have been proposed, as there is no overall agreement on what constitutes a LLS (O’Malley, Chamot, Stewner-Manzanares, Kupper, & Russo, 1985). This is because researchers define LLS based on their own research interests and foci. Oxford (1990:1) provides the following definition: “[L]earning strategies are tools for active, self-directed involvement, which is essential for developing communicative competence. Appropriate language learning strategies result in improved proficiency and greater self-confidence.”

Cook (2001:127) stresses that LLS are choices made by learners of a second language that affect the learning process. According to Chamot (1987:71), “learning strategies are techniques, approaches, or deliberate actions that students take in order to facilitate the learning and recall of both linguistic and content area information.”

Although researchers have argued about the definition of LLSs, Nation (2001:217) suggests that LLSs should meet the following criteria: they should involve choice, i.e. there should be several strategies to choose from; they should be complex, i.e. there should be several steps to learn; they should require knowledge and practising them should be beneficial to learners;

and they should increase the efficiency of vocabulary learning and vocabulary use.

Since there are several definitions of LLSs, there are also a number of different taxonomies. A well-known taxonomy of LLSs was proposed by Oxford (1990:14-15), who believes that her classification is more detailed and comprehensive than other LLS taxonomies. Other researchers agree with Oxford’s claims and consider that her taxonomy is the most suitable way of classifying LLSs (Ellis, 1994; Schmitt, 1997). Figure 1 shows Oxford’s classification of LLSs.

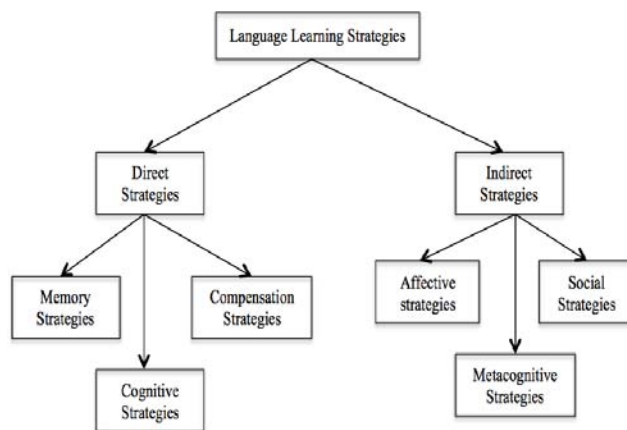


Fig. 1 : Oxford’s Classification of language learning strategies

c) *Vocabulary Learning Strategies (VLSs)*

During the last two decades, researchers, teachers, and authors have paid more attention to LLS, particularly in the field of second language acquisition (SLA). As a result, there has been a greater focus on VLSs; this is because they are part of LLSs. This is addressed by Nation (2001:217), who states that “vocabulary learning strategies are a part of language learning strategies which, in turn, are a part of general learning strategies”. It is now clear that VLSs are related to LLS and that, consequently, the definitions and classifications of VLSs will be similar to those of LLSs. VLSs can be defined as: “[K]nowledge about the mechanism (processes, strategies) used in order to learn vocabulary as well as steps or actions taken by students (a) to find out the meaning of unknown words, (b) to retain them in long-term memory, (c) to recall them at will, and (d) to use them in oral or written mode.” (Catalán 2003: 56)

Moreover, VLSs can be taught in the classroom and learners can be taught how to use them effectively. Successful training in VLSs can help learners to build up their repertoire and can also improve their vocabulary retention. Training of this nature would help L2 learners to be more confident in learning new vocabulary outside the classroom.

Since there are strong similarities, and no major distinctions, between LLSs and VLSs, it stands to reason

that researchers would base their VLS taxonomies on the existing LLS taxonomies. For example, Schmitt (1997) developed his taxonomy of VLSs on the basis of Oxford's taxonomy of LLSs (1990), stating that, "Of the more established systems, the one developed by Oxford (op. cit.), seemed best able to capture and organize the wide variety of: identified" (op.cit:205).

Schmitt's (1997) classification divided VLSs into two main categories: discovery strategies, and consolidation strategies. The former deals with strategies that can be used to find out "initial information about a new word", whereas the latter comprises strategies that can be used by learners to retain the new words once taught or encountered. Figure 2 shows Schmitt's (1990) classification of VLSs (adapted from Tassana-ngam, 2004:85).

Strategies for the discovery of a new word's meaning	Strategies for consolidating a word once it has been encountered
DET Analyse part of speech	MEM Use 'scapes' for gradable adjectives
DET Analyse affixes and roots	MEM Peg Method
DET Check for L1 cognate	MEM Last Method
DET Analyse any available pictures or gestures	MEM Group words together to study them
DET Guess from textual context	MEM Group words together within a storyline
DET Bilingual dictionary	MEM Use new words in sentences
DET Monolingual dictionary	MEM Group words together within a storyline
DET Word lists	MEM Study the spelling of a word
DET Flash cards	MEM Study the sound of a word
SOC Ask teacher for an L1 translation	MEM See new word aloud when studying
SOC Ask teacher for paraphrase or synonyms of new word	MEM Underline initial letter of the word
SOC Ask teacher for sentence including the new word	MEM Underline initial letter of the word
SOC Ask classmates for meaning	MEM Categorization
SOC Discover new meaning through group work activity	MEM Use keyword method
	MEM Affixes and roots (remembering)
	MEM Part of speech (remembering)
	MEM Paraphrase the word's meaning
	MEM Use cognates in study
	MEM Learn the words of an idiom together
	MEM Use physical action when learning a word
	MEM Use semantic feature grids
	MEM Use English-language media (songs, movies, newsreels etc)
	MEM Testing oneself with word lists
	MEM Use spaced word practice
	MEM Skip or pass new word
	MEM Continue to study word over time
	MEM Study and practice meaning in a group
	SOC Teacher checks students' flash cards for word lists for accuracy
	SOC Interact with native speakers

Strategies for consolidating a word once it has been encountered
COG Verbal repetition
COG Written repetition
COG Word lists
COG Flash cards
COG Take notes (in class)
COG Use vocabulary section in your textbook
COG Listen to tape of word lists
COG Put English labels on physical objects
COG Keep a vocabulary notebook
MEM Study word with a pictorial representation of its meaning
MEM Image word's meaning
MEM Connect word to a personal experience
MEM Associate the word with its coordinates
MEM Connect the word to its synonyms and antonyms
MEM Use semantic maps

KEY Abbreviations:
SOC Social strategies: Use interaction with other people to improve language learning
MEM Memory strategies: Relate new material to existing knowledge
COG Cognitive strategies: Manipulate or transform the target language
MET Metacognitive strategies: A conscious overview of the learning process and making decisions about planning, monitoring, or evaluating the best ways to study.
DET Determination strategies: Discover a new word's meaning without recourse to another person's expertise.

Fig. 2 : Schmitt's (1990) classification of VLSs

### III. METHODOLOGY

#### a) Research Questions

This study attempts to answer the following initial research questions:

- What are the most and the least frequently used VLSs among Saudi undergraduate students?
- What are the most and the least used frequently used dimensions among Saudi undergraduate students.

#### b) Participants

A total of 158 male and female participants from different disciplines were chosen from Najran University in Saudi Arabia. The subjects were fairly homogenous, as they were all between 20 and 22 years old and were all in their second year of study. In addition, all of the participants had studied English for seven years at secondary school level, and none of them had previously lived in, or visited, an English speaking country.

#### c) Instruments

There are many ways of collecting data on VLSs, and the choice of method will depend on a number of factors, such as the research questions, the reliability and validity of the instruments, and time constraints (Cohen, 1998). Hatch and Farhady (1982, cited in Larsen-Freeman & Long, 1991:10) state that "research is a systematic approach to finding answers to questions". Thus, "individual researchers have a freedom of choice. They are 'free' to choose the methods, techniques, and procedures of research that best meet their needs and purposes" (Creswell, 2003:12). With regard to this paper, the chosen instrument of data collection was the questionnaire. We have adopted Marin's (2005) questionnaire, and we have added some items from McCrostie's (2007) questionnaires, all of which were largely based on the items previously proposed and analysed by Schmitt (1997). Responses to each item of the questionnaire were measured using a type of Likert scale; the possible answers were (1) ever, (2) seldom, (3) sometimes, (4) often, and (5) always. On the subject of reliability, Oppenheim (1992:69) says, "Reliability refers to consistency; obtaining the same results again". According to Mueller (1986), the Cronbach's alpha coefficient of reliable results should be .80 or higher. As can be seen in table 3, the Cronbach's alpha for our 75 items was .84, thus indicating that the results of the study were reliable and valid.

Table 3 : The Reliability Coefficient of the VLSQ

Cronbach's alpha	Number of items
.84	75

#### d) Data Collection and Analysis

The questionnaire was distributed to participants after completion of a consent form. To compensate for the Hawthorne effect (i.e. the observer effect), participants were asked to report their actual usage of the various VLSs, not what they thought would please the researcher. The questionnaire took between 25 and 30 minutes to complete.

Once the data had been collected, the SPSS (version 21) statistical software was used to analyse the quantitative data. Seventy-five strategies, which comprise the dependent variables, were entered in 75 columns. The SPSS software was then used to analyse the VLSQ replies of each informant. Data analysis methods such as means and standard deviations were used. For example, the mean frequency for each VLS item (75 items) was calculated in order to identify the overall patterns of strategies across 12 dimensions, without taking any variables into consideration. The mean results for the 75 strategies were then averaged in order to produce scores for each of the 12 dimensions

in the study. The aim of this was to identify the dimensions, which were the most and the least frequently used by our participants, regardless of any variables, when using VLSs.

#### IV. RESULTS AND DISCUSSION

##### a) Frequency of VLS use across all dimensions

This section deals with the overall strategy employed by Saudi undergraduate learners. As can be seen in table 4, the most frequently used strategy among learners, with a mean score of 4.58, was “checking the Arabic meaning of new words by using a dictionary”, and the second most frequently used strategy related to the type of dictionary used – using a mobile phone had a mean score of 4.42. The third most commonly used strategy, with a mean score of 4.33, was “asking a teacher or friends about its equivalent Arabic meaning”.

Looking at the four dimensions (i.e. VLSD4, VLSD3, VLSD2 and VLSD5), it seems that it is obvious that learners will use L1. This is because learners’ native language plays an important role in their comprehension of the target language. Using L1 makes the learning process much easier for them. Moreover, checking the meaning by using L1 is probably preferable to the learners because many English words change their meaning according to the context in which they are used. For example, the word “play” has a different meaning when used in the phrase “play music” than in “I saw a play in a theatre”. Therefore, the use of L1 was second most dominant strategy, after strategies that are related VLSD8, which deals with reasons for noting vocabulary.

Table 4 : The ten most frequently used VLSs

Rank	VLSs	N	Dimensions	Mean	SD
1	I look up the unknown word by using a dictionary and check its Arabic meaning.	158	VLSD4	4.5823	0.84624
2	I use a smartphone dictionary application to check the meaning of unknown words.	155	VLSD3	4.4258	0.99315
3	I ask teachers and friends about its Arabic equivalent.	158	VLSD2	4.3354	1.00071
4	I select a word for note taking if I see that the word is useful to me.	158	VLSD8	4.3228	0.84664
5	I select a word for note taking if I see that the word is important in that it is needed when speaking or writing.	158	VLSD8	4.2278	0.99616
6	I select a word for note taking if I see that the word is unknown and thus new to me.	158	VLSD8	4.1709	1.16309
7	I select a word for note taking if I see that the word is important in that it recurs frequently in the text where I encountered it.	158	VLSD8	4.0380	0.96358
8	I use an electronic dictionary such as Atlas to check the meaning of unknown words.	158	VLSD3	3.9241	1.24432
9	I select a word for note taking if I see that the word is important in that the teacher said so.	158	VLSD8	3.8354	1.11081
10	I write down the English word with its Arabic translation.	158	VLSD5	3.8227	1.13721

Note: VLSD3 = Types of dictionary used; VLSD4 = Information taken from dictionaries; VLSD5 = Types of information noted VLSD6 = Locations of vocabulary note taking strategy and VLSD7 = Ways of organizing words noted.

Among Saudi undergraduate learners, the least frequently used strategy, with a mean score of 1.56, was keeping notes on wall charts (see table 5). Interestingly, all dimensions, except VLSD3 and VLSD4, were related to vocabulary note-taking strategies, suggesting that the majority of the least frequently used strategies were those relating to taking notes. Of those less frequently used strategies, four (i.e. “organizing the word by their grammar category”, “organizing the words in alphabetical order”, “organize the words into families with the same stem” and “organize the words by their meaning group”) were from VLSD7 (“ways of organizing words noted”).

It is understandable why the mean score for keeping notes on cards was so low (1.5): notes on cards are easily lost and are hard to keep tidy. Moreover, making notes on cards is not practical, as it requires learners to write notes on both sides of the card; this is time consuming and is not very effective. Therefore, learners disregard this type of strategy. With regard to ways of organizing notes, learners knew that organizing words would require a significant amount of effort and a high level of mental process. For example, “organizing words by their meaning groups”, which received a mean score of 1.8 (close to “never” in our Likert scale), requires a certain degree of mental manipulation. In fact, all of the least frequently employed strategies from VLSD7 require a high level of mental manipulation. Another example is the strategy of “organizing words in alphabetical order”. Once again, this involves the use of higher-level mental processes.

Table 5 : The ten least frequently used VLSs

Rank	VLSs	N	Dimensions	Mean	SD
75	Keep notes on wall charts, posters or small pieces of paper that I stick somewhere at home.	158	VLSD6	1.5127	0.93575
74	Keep notes on cards.	158	VLSD6	1.5633	0.82503
73	Write down a note about the source I got it from.	157	VLSD5	1.5987	0.93274
72	Organize the words by their grammatical category	158	VLSD7	1.6899	0.97027
71	Organize the words in alphabetical order.	158	VLSD7	1.7025	1.00006
70	I organize words in families with the same stem.	158	VLSD7	1.7848	1.00535
69	In a paper English-English dictionary.	158	VLSD3	1.7975	1.11023
68	Looking for examples.	158	VLSD4	1.8671	1.08319
67	Organize the words by their meaning groups.	158	VLSD7	1.8924	1.03188
66	Write English word down with the other related words of the same family.	158	VLSD5	1.9367	1.17122

Note: VLSD3 = Types of dictionary used; VLSD4 = Information taken from dictionaries; VLSD5 = Types of information noted VLSD6 = Locations of vocabulary note taking strategy and VLSD7 = Ways of organizing words noted.

##### b) Frequency of VLS use by dimensions

Table 6 shows which dimensions are most and least frequently used by our informants. Interestingly,

this table reflects our earlier findings on the most and least frequently used VLSs across dimensions (see table 4 and table 5), that is, “reasons for vocabulary note taking” (i.e. VNSD8) (mean 3.73). As found earlier, four strategies relating to (VLS7) were among the ten least frequently used VLSs. Therefore, we can say that, amongst our participants, the least frequently used dimension was “ways of organizing words noted” (i.e. VLS7), with a mean score of 2.22.

Participants demonstrated a high level of interest in word-selection criteria; this could be attributed to the fact that the informants focused more on note-taking than on any other category. Their non-use of ways of organizing words when taking notes was probably caused by the abundance of different ways available – this leads note-takers to neglect many of them. Moreover, it could be because such strategies require higher order mental processes

**Table 6 :** The most and least frequently used dimensions

Rank	VLSs	N	Mean	SD
1	VLSD8 Reasons for vocabulary note-taking	158	3.7346	0.54823
2	VLSD9 Methods of repetition	158	3.4620	0.82503
3	VLSD12 Practicing/consolidation strategies	158	3.1440	0.79773
4	VLSD3 Type of dictionary used	158	3.1389	0.64538
5	VLSD2 Asking strategies	158	2.9852	0.52381
6	VLSD10 Information used when repeating new words	158	2.9541	0.75547
7	VLSD1 Guessing strategies	158	2.8080	0.53971
8	VLSD4 Information taken from dictionaries	158	2.7434	0.56560
9	VLSD11 Association strategies	158	2.7061	0.76248
10	VLSD6 Locations of vocabulary NTS	158	2.5298	0.55605
11	VLSD5 Types of word and non-word information noted	158	2.3510	0.49747
12	VLSD7 Ways of organizing words noted	158	2.2233	0.50151

## V. CONCLUSION

The purpose of this paper was to investigate the VLSs that are the most and least frequently used by Saudi undergraduate learners. The study was conducted on one hundred and fifty-eight Saudi university students in Saudi Arabia. Data analysis, including mean frequency, was applied in order to determine the overall use of VLSs across dimensions and by dimensions.

The findings for the first research question (what are the most and the least frequently used VLSs among Saudi undergraduate students?) reveals that Saudi learners prefer to use their native language (Arabic) when they encounter new words, suggesting that using L1 is a dominant choice. These strategies were “checking the Arabic meaning of new words by using a dictionary” and “asking a teacher or friends about its equivalent Arabic meaning”. Note-taking strategies, on the other hand, were the least frequently used,

particularly VLS7 “ways of organizing words noted”. This suggests that learners are unlikely to favour strategies that require the use of higher-level cognitive processes.

The findings for the second research question (what are the most and the least frequently used dimensions among Saudi undergraduate students?) indicate that learners prefer to note down a lot of new words, but they do not tend to organize them according to their grammatical function, in alphabetical orders, or according to their meaning.

Learners should be given more encouragement to use L2 rather than L1. For example, it would be better if they checked the English meaning of new L2 words, rather than checking what they mean in Arabic. This strategy would build their repertoire, since the English definition in the dictionary would give them more detailed information about the target word.

## REFERENCES RÉFÉRENCES REFERENCIAS

- Catalán, R. M. J. (2003). Sex Differences in L2 Vocabulary Learning Strategies. *International Journal of Applied Linguistics*, 13(1), 54–77. doi:10.1111/1473-4192.00037
- Chamot, A. U. (1987). The learning strategies of ESL students. In A. Wenden & J. Rubin (Eds.), *Learner strategies in language learning* (pp. 71–83). New York: Prentice Hall International.
- Cohen, A. D. (1998). Strategies in learning and using a second language. *Applied Linguistics and Language Study*, 3–23.
- Cook, V. (1991). *Second Language Learning and Language Teaching*. London; New York: Edward Arnold.
- Cook, V. (2001). *Second language learning and language teaching*. London; New York: Arnold; Oxford University Press.
- Creswell, J. W. (2003). *Research design: Qualitative and quantitative approaches*. Thousand Oaks, Calif.: Sage.
- Ellis, N. C. (1994). *Implicit and explicit learning of languages*. Academic Press.
- Hulstijn, J. H. (1993). When Do Foreign-Language Readers Look Up the Meaning of Unfamiliar Words? The Influence of Task and Learner Variables. *The Modern Language Journal*, 77(2), 139–147.
- Larsen-Freeman, D., & Long, M. (1991). *An Introduction to Qualitative Research Interviewing*. London.: Sage publications.
- Lessard-Clouston, M. (1996). Vocabulary and the ESL/EFL Curriculum. *TESOL Report*, 29(2), 21–33.
- Marin, A. (2005). Extraversion and the use of vocabulary learning strategies among university EFL students in Mexico. University of Essex, UK., UK.
- McCrostie, J. (2007). Examining Learner Vocabulary Notebooks. *ELT Journal*, 61(3), 246–255. Retrieved



- from <http://search.ebscohost.com/login.aspx?direct=true&db=mzh&AN=2007651393&site=ehost-live>
13. Mueller, D. J. (1986). *Measuring social attitudes: A handbook for researchers and practitioners*. Teachers College Press New York.
  14. Nation, I. S. P. (2001). *Learning vocabulary in another language*. Ernst Klett Sprachen.
  15. O'Malley, M., Chamot, U., Stewner-Manzanares, G., Kupper, L., & Russo, R. (1985). *Learning Strategies Used by Beginning and Intermediate ESL Students*. *Language Learning*, 35(1), 21–46. doi:10.1111/j.-1467-1770.1985.tb01013.x
  16. Oppenheim, A. (1992). *Questionnaire design and attitude measurement*. New York. London: Printer Publisher.
  17. Qian, D. D. (2002). Investigating the relationship between vocabulary knowledge and academic reading performance: An assessment perspective. *Language Learning*, 52(3), 513–536.
  18. Schmitt, N. (1997). *Vocabulary learning strategies*. In N. Schmitt & M. McCarthy (Eds.), *Vocabulary: Description, acquisition and pedagogy*. Cambridge: Cambridge University Press.
  19. Segler, T. M. (2001). PhD Research proposal: Second language vocabulary acquisition and learning strategies in CALL environments. Retrieved July 15, 2014, from <http://homepages.inf.ed.ac.uk/-s9808690/newprop.pdf>.
  20. Tassana-ngam, I. (2004). *The Effect of Vocabulary Learning Strategies Training on Thai University Students' Word Retention in the Second Language Classroom*. University of Essex.
  21. Thornbury, S. (2002). *How to teach vocabulary*. Harlow: Longman.
  22. Wilkins, D. A. (1972). *Linguistics in language teaching*. Cambridge Univ Press.

# GLOBAL JOURNALS INC. (US) GUIDELINES HANDBOOK 2016

---

[WWW.GLOBALJOURNALS.ORG](http://WWW.GLOBALJOURNALS.ORG)

# FELLOWS

## FELLOW OF ASSOCIATION OF RESEARCH SOCIETY IN HUMAN SCIENCE (FARSHS)

Global Journals Incorporate (USA) is accredited by Open Association of Research Society (OARS), U.S.A and in turn, awards “FARSHS” title to individuals. The 'FARSHS' title is accorded to a selected professional after the approval of the Editor-in-Chief/Editorial Board Members/Dean.



- The “FARSHS” is a dignified title which is accorded to a person’s name viz. Dr. John E. Hall, Ph.D., FARSS or William Walldroff, M.S., FARSHS.

FARSHS accrediting is an honor. It authenticates your research activities. After recognition as FARSHS, you can add 'FARSHS' title with your name as you use this recognition as additional suffix to your status. This will definitely enhance and add more value and reputation to your name. You may use it on your professional Counseling Materials such as CV, Resume, and Visiting Card etc.

*The following benefits can be availed by you only for next three years from the date of certification:*



FARSHS designated members are entitled to avail a 40% discount while publishing their research papers (of a single author) with Global Journals Incorporation (USA), if the same is accepted by Editorial Board/Peer Reviewers. If you are a main author or co-author in case of multiple authors, you will be entitled to avail discount of 10%.

Once FARSHS title is accorded, the Fellow is authorized to organize symposium/seminar/conference on behalf of Global Journal Incorporation (USA). The Fellow can also participate in conference/seminar/symposium organized by another institution as representative of Global Journal. In both the cases, it is mandatory for him to discuss with us and obtain our consent.



You may join as member of the Editorial Board of Global Journals Incorporation (USA) after successful completion of three years as Fellow and as Peer Reviewer. In addition, it is also desirable that you should organize seminar/symposium/conference at least once.

We shall provide you intimation regarding launching of e-version of journal of your stream time to time. This may be utilized in your library for the enrichment of knowledge of your students as well as it can also be helpful for the concerned faculty members.

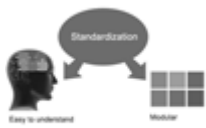






The FARSHS can go through standards of OARS. You can also play vital role if you have any suggestions so that proper amendment can take place to improve the same for the benefit of entire research community.

As FARSHS, you will be given a renowned, secure and free professional email address with 100 GB of space e.g. [johnhall@globaljournals.org](mailto:johnhall@globaljournals.org). This will include Webmail, Spam Assassin, Email Forwarders, Auto-Responders, Email Delivery Route tracing, etc.



The FARSHS will be eligible for a free application of standardization of their researches. Standardization of research will be subject to acceptability within stipulated norms as the next step after publishing in a journal. We shall depute a team of specialized research professionals who will render their services for elevating your researches to next higher level, which is worldwide open standardization.

The FARSHS member can apply for grading and certification of standards of the educational and Institutional Degrees to Open Association of Research, Society U.S.A. Once you are designated as FARSHS, you may send us a scanned copy of all of your credentials. OARS will verify, grade and certify them. This will be based on your academic records, quality of research papers published by you, and some more criteria. After certification of all your credentials by OARS, they will be published on your Fellow Profile link on website <https://associationofresearch.org> which will be helpful to upgrade the dignity.



The FARSHS members can avail the benefits of free research podcasting in Global Research Radio with their research documents. After publishing the work, (including published elsewhere worldwide with proper authorization) you can upload your research paper with your recorded voice or you can utilize chargeable services of our professional RJs to record your paper in their voice on request.

The FARSHS member also entitled to get the benefits of free research podcasting of their research documents through video clips. We can also streamline your conference videos and display your slides/ online slides and online research video clips at reasonable charges, on request.





The FARSHS is eligible to earn from sales proceeds of his/her researches/reference/review Books or literature, while publishing with Global Journals. The FARSHS can decide whether he/she would like to publish his/her research in a closed manner. In this case, whenever readers purchase that individual research paper for reading, maximum 60% of its profit earned as royalty by Global Journals, will be credited to his/her bank account. The entire entitled amount will be credited to his/her bank account exceeding limit of minimum fixed balance. There is no minimum time limit for collection. The FARSS member can decide its price and we can help in making the right decision.

The FARSHS member is eligible to join as a paid peer reviewer at Global Journals Incorporation (USA) and can get remuneration of 15% of author fees, taken from the author of a respective paper. After reviewing 5 or more papers you can request to transfer the amount to your bank account.



## MEMBER OF ASSOCIATION OF RESEARCH SOCIETY IN HUMAN SCIENCE (MARSHS)

The ' MARSHS ' title is accorded to a selected professional after the approval of the Editor-in-Chief / Editorial Board Members/Dean.

The “MARSHS” is a dignified ornament which is accorded to a person’s name viz. Dr John E. Hall, Ph.D., MARSHS or William Walldroff, M.S., MARSHS.



MARSHS accrediting is an honor. It authenticates your research activities. After becoming MARSHS, you can add 'MARSHS' title with your name as you use this recognition as additional suffix to your status. This will definitely enhance and add more value and repute to your name. You may use it on your professional Counseling Materials such as CV, Resume, Visiting Card and Name Plate etc.

*The following benefits can be availed by you only for next three years from the date of certification.*



MARSHS designated members are entitled to avail a 25% discount while publishing their research papers (of a single author) in Global Journals Inc., if the same is accepted by our Editorial Board and Peer Reviewers. If you are a main author or co-author of a group of authors, you will get discount of 10%.

As MARSHS, you will be given a renowned, secure and free professional email address with 30 GB of space e.g. [johnhall@globaljournals.org](mailto:johnhall@globaljournals.org). This will include Webmail, Spam Assassin, Email Forwarders, Auto-Responders, Email Delivery Route tracing, etc.





We shall provide you intimation regarding launching of e-version of journal of your stream time to time. This may be utilized in your library for the enrichment of knowledge of your students as well as it can also be helpful for the concerned faculty members.

The MARSHS member can apply for approval, grading and certification of standards of their educational and Institutional Degrees to Open Association of Research, Society U.S.A.



Once you are designated as MARSHS, you may send us a scanned copy of all of your credentials. OARS will verify, grade and certify them. This will be based on your academic records, quality of research papers published by you, and some more criteria.

It is mandatory to read all terms and conditions carefully.



# AUXILIARY MEMBERSHIPS

## Institutional Fellow of Open Association of Research Society (USA) - OARS (USA)

Global Journals Incorporation (USA) is accredited by Open Association of Research Society, U.S.A (OARS) and in turn, affiliates research institutions as “Institutional Fellow of Open Association of Research Society” (IFOARS).



The “FARSC” is a dignified title which is accorded to a person’s name viz. Dr. John E. Hall, Ph.D., FARSC or William Walldroff, M.S., FARSC.

The IFOARS institution is entitled to form a Board comprised of one Chairperson and three to five board members preferably from different streams. The Board will be recognized as “Institutional Board of Open Association of Research Society”-(IBOARS).

*The Institute will be entitled to following benefits:*



The IBOARS can initially review research papers of their institute and recommend them to publish with respective journal of Global Journals. It can also review the papers of other institutions after obtaining our consent. The second review will be done by peer reviewer of Global Journals Incorporation (USA) The Board is at liberty to appoint a peer reviewer with the approval of chairperson after consulting us.

The author fees of such paper may be waived off up to 40%.

The Global Journals Incorporation (USA) at its discretion can also refer double blind peer reviewed paper at their end to the board for the verification and to get recommendation for final stage of acceptance of publication.



The IBOARS can organize symposium/seminar/conference in their country on behalf of Global Journals Incorporation (USA)-OARS (USA). The terms and conditions can be discussed separately.

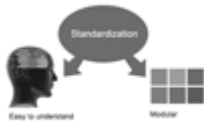
The Board can also play vital role by exploring and giving valuable suggestions regarding the Standards of “Open Association of Research Society, U.S.A (OARS)” so that proper amendment can take place for the benefit of entire research community. We shall provide details of particular standard only on receipt of request from the Board.



The board members can also join us as Individual Fellow with 40% discount on total fees applicable to Individual Fellow. They will be entitled to avail all the benefits as declared. Please visit Individual Fellow-sub menu of GlobalJournals.org to have more relevant details.



We shall provide you intimation regarding launching of e-version of journal of your stream time to time. This may be utilized in your library for the enrichment of knowledge of your students as well as it can also be helpful for the concerned faculty members.



After nomination of your institution as “Institutional Fellow” and constantly functioning successfully for one year, we can consider giving recognition to your institute to function as Regional/Zonal office on our behalf. The board can also take up the additional allied activities for betterment after our consultation.

**The following entitlements are applicable to individual Fellows:**

Open Association of Research Society, U.S.A (OARS) By-laws states that an individual Fellow may use the designations as applicable, or the corresponding initials. The Credentials of individual Fellow and Associate designations signify that the individual has gained knowledge of the fundamental concepts. One is magnanimous and proficient in an expertise course covering the professional code of conduct, and follows recognized standards of practice.



Open Association of Research Society (US)/ Global Journals Incorporation (USA), as described in Corporate Statements, are educational, research publishing and professional membership organizations. Achieving our individual Fellow or Associate status is based mainly on meeting stated educational research requirements.

Disbursement of 40% Royalty earned through Global Journals : Researcher = 50%, Peer Reviewer = 37.50%, Institution = 12.50% E.g. Out of 40%, the 20% benefit should be passed on to researcher, 15 % benefit towards remuneration should be given to a reviewer and remaining 5% is to be retained by the institution.



We shall provide print version of 12 issues of any three journals [as per your requirement] out of our 38 journals worth \$ 2376 USD.

**Other:**

**The individual Fellow and Associate designations accredited by Open Association of Research Society (US) credentials signify guarantees following achievements:**

- The professional accredited with Fellow honor, is entitled to various benefits viz. name, fame, honor, regular flow of income, secured bright future, social status etc.



- In addition to above, if one is single author, then entitled to 40% discount on publishing research paper and can get 10% discount if one is co-author or main author among group of authors.
- The Fellow can organize symposium/seminar/conference on behalf of Global Journals Incorporation (USA) and he/she can also attend the same organized by other institutes on behalf of Global Journals.
- The Fellow can become member of Editorial Board Member after completing 3yrs.
- The Fellow can earn 60% of sales proceeds from the sale of reference/review books/literature/publishing of research paper.
- Fellow can also join as paid peer reviewer and earn 15% remuneration of author charges and can also get an opportunity to join as member of the Editorial Board of Global Journals Incorporation (USA)
- • This individual has learned the basic methods of applying those concepts and techniques to common challenging situations. This individual has further demonstrated an in-depth understanding of the application of suitable techniques to a particular area of research practice.

**Note :**

//

- In future, if the board feels the necessity to change any board member, the same can be done with the consent of the chairperson along with anyone board member without our approval.
- In case, the chairperson needs to be replaced then consent of 2/3rd board members are required and they are also required to jointly pass the resolution copy of which should be sent to us. In such case, it will be compulsory to obtain our approval before replacement.
- In case of “Difference of Opinion [if any]” among the Board members, our decision will be final and binding to everyone.

//



## PROCESS OF SUBMISSION OF RESEARCH PAPER

---

The Area or field of specialization may or may not be of any category as mentioned in 'Scope of Journal' menu of the GlobalJournals.org website. There are 37 Research Journal categorized with Six parental Journals GJCST, GJMR, GJRE, GJMBR, GJSFR, GJHSS. For Authors should prefer the mentioned categories. There are three widely used systems UDC, DDC and LCC. The details are available as 'Knowledge Abstract' at Home page. The major advantage of this coding is that, the research work will be exposed to and shared with all over the world as we are being abstracted and indexed worldwide.

The paper should be in proper format. The format can be downloaded from first page of 'Author Guideline' Menu. The Author is expected to follow the general rules as mentioned in this menu. The paper should be written in MS-Word Format (\*.DOC,\*.DOCX).

The Author can submit the paper either online or offline. The authors should prefer online submission.Online Submission: There are three ways to submit your paper:

**(A) (I) First, register yourself using top right corner of Home page then Login. If you are already registered, then login using your username and password.**

**(II) Choose corresponding Journal.**

**(III) Click 'Submit Manuscript'. Fill required information and Upload the paper.**

**(B) If you are using Internet Explorer, then Direct Submission through Homepage is also available.**

**(C) If these two are not convenient, and then email the paper directly to dean@globaljournals.org.**

Offline Submission: Author can send the typed form of paper by Post. However, online submission should be preferred.



# PREFERRED AUTHOR GUIDELINES

## MANUSCRIPT STYLE INSTRUCTION (Must be strictly followed)

Page Size: 8.27" X 11"

- Left Margin: 0.65
- Right Margin: 0.65
- Top Margin: 0.75
- Bottom Margin: 0.75
- Font type of all text should be Swis 721 Lt BT.
- Paper Title should be of Font Size 24 with one Column section.
- Author Name in Font Size of 11 with one column as of Title.
- Abstract Font size of 9 Bold, "Abstract" word in Italic Bold.
- Main Text: Font size 10 with justified two columns section
- Two Column with Equal Column with of 3.38 and Gaping of .2
- First Character must be three lines Drop capped.
- Paragraph before Spacing of 1 pt and After of 0 pt.
- Line Spacing of 1 pt
- Large Images must be in One Column
- Numbering of First Main Headings (Heading 1) must be in Roman Letters, Capital Letter, and Font Size of 10.
- Numbering of Second Main Headings (Heading 2) must be in Alphabets, Italic, and Font Size of 10.

**You can use your own standard format also.**

### Author Guidelines:

1. General,
2. Ethical Guidelines,
3. Submission of Manuscripts,
4. Manuscript's Category,
5. Structure and Format of Manuscript,
6. After Acceptance.

### 1. GENERAL

Before submitting your research paper, one is advised to go through the details as mentioned in following heads. It will be beneficial, while peer reviewer justify your paper for publication.

### Scope

The Global Journals Inc. (US) welcome the submission of original paper, review paper, survey article relevant to the all the streams of Philosophy and knowledge. The Global Journals Inc. (US) is parental platform for Global Journal of Computer Science and Technology, Researches in Engineering, Medical Research, Science Frontier Research, Human Social Science, Management, and Business organization. The choice of specific field can be done otherwise as following in Abstracting and Indexing Page on this Website. As the all Global



Journals Inc. (US) are being abstracted and indexed (in process) by most of the reputed organizations. Topics of only narrow interest will not be accepted unless they have wider potential or consequences.

## 2. ETHICAL GUIDELINES

Authors should follow the ethical guidelines as mentioned below for publication of research paper and research activities.

Papers are accepted on strict understanding that the material in whole or in part has not been, nor is being, considered for publication elsewhere. If the paper once accepted by Global Journals Inc. (US) and Editorial Board, will become the copyright of the Global Journals Inc. (US).

**Authorship: The authors and coauthors should have active contribution to conception design, analysis and interpretation of findings. They should critically review the contents and drafting of the paper. All should approve the final version of the paper before submission**

The Global Journals Inc. (US) follows the definition of authorship set up by the Global Academy of Research and Development. According to the Global Academy of R&D authorship, criteria must be based on:

- 1) Substantial contributions to conception and acquisition of data, analysis and interpretation of the findings.
- 2) Drafting the paper and revising it critically regarding important academic content.
- 3) Final approval of the version of the paper to be published.

All authors should have been credited according to their appropriate contribution in research activity and preparing paper. Contributors who do not match the criteria as authors may be mentioned under Acknowledgement.

Acknowledgements: Contributors to the research other than authors credited should be mentioned under acknowledgement. The specifications of the source of funding for the research if appropriate can be included. Suppliers of resources may be mentioned along with address.

**Appeal of Decision: The Editorial Board's decision on publication of the paper is final and cannot be appealed elsewhere.**

**Permissions: It is the author's responsibility to have prior permission if all or parts of earlier published illustrations are used in this paper.**

Please mention proper reference and appropriate acknowledgements wherever expected.

If all or parts of previously published illustrations are used, permission must be taken from the copyright holder concerned. It is the author's responsibility to take these in writing.

Approval for reproduction/modification of any information (including figures and tables) published elsewhere must be obtained by the authors/copyright holders before submission of the manuscript. Contributors (Authors) are responsible for any copyright fee involved.

## 3. SUBMISSION OF MANUSCRIPTS

Manuscripts should be uploaded via this online submission page. The online submission is most efficient method for submission of papers, as it enables rapid distribution of manuscripts and consequently speeds up the review procedure. It also enables authors to know the status of their own manuscripts by emailing us. Complete instructions for submitting a paper is available below.

Manuscript submission is a systematic procedure and little preparation is required beyond having all parts of your manuscript in a given format and a computer with an Internet connection and a Web browser. Full help and instructions are provided on-screen. As an author, you will be prompted for login and manuscript details as Field of Paper and then to upload your manuscript file(s) according to the instructions.



To avoid postal delays, all transaction is preferred by e-mail. A finished manuscript submission is confirmed by e-mail immediately and your paper enters the editorial process with no postal delays. When a conclusion is made about the publication of your paper by our Editorial Board, revisions can be submitted online with the same procedure, with an occasion to view and respond to all comments.

Complete support for both authors and co-author is provided.

#### 4. MANUSCRIPT'S CATEGORY

Based on potential and nature, the manuscript can be categorized under the following heads:

Original research paper: Such papers are reports of high-level significant original research work.

Review papers: These are concise, significant but helpful and decisive topics for young researchers.

Research articles: These are handled with small investigation and applications

Research letters: The letters are small and concise comments on previously published matters.

#### 5. STRUCTURE AND FORMAT OF MANUSCRIPT

The recommended size of original research paper is less than seven thousand words, review papers fewer than seven thousands words also. Preparation of research paper or how to write research paper, are major hurdle, while writing manuscript. The research articles and research letters should be fewer than three thousand words, the structure original research paper; sometime review paper should be as follows:

**Papers:** These are reports of significant research (typically less than 7000 words equivalent, including tables, figures, references), and comprise:

- (a) Title should be relevant and commensurate with the theme of the paper.
- (b) A brief Summary, "Abstract" (less than 150 words) containing the major results and conclusions.
- (c) Up to ten keywords, that precisely identifies the paper's subject, purpose, and focus.
- (d) An Introduction, giving necessary background excluding subheadings; objectives must be clearly declared.
- (e) Resources and techniques with sufficient complete experimental details (wherever possible by reference) to permit repetition; sources of information must be given and numerical methods must be specified by reference, unless non-standard.
- (f) Results should be presented concisely, by well-designed tables and/or figures; the same data may not be used in both; suitable statistical data should be given. All data must be obtained with attention to numerical detail in the planning stage. As reproduced design has been recognized to be important to experiments for a considerable time, the Editor has decided that any paper that appears not to have adequate numerical treatments of the data will be returned un-refereed;
- (g) Discussion should cover the implications and consequences, not just recapitulating the results; conclusions should be summarizing.
- (h) Brief Acknowledgements.
- (i) References in the proper form.

Authors should very cautiously consider the preparation of papers to ensure that they communicate efficiently. Papers are much more likely to be accepted, if they are cautiously designed and laid out, contain few or no errors, are summarizing, and be conventional to the approach and instructions. They will in addition, be published with much less delays than those that require much technical and editorial correction.



The Editorial Board reserves the right to make literary corrections and to make suggestions to improve brevity.

It is vital, that authors take care in submitting a manuscript that is written in simple language and adheres to published guidelines.

## Format

*Language: The language of publication is UK English. Authors, for whom English is a second language, must have their manuscript efficiently edited by an English-speaking person before submission to make sure that, the English is of high excellence. It is preferable, that manuscripts should be professionally edited.*

Standard Usage, Abbreviations, and Units: Spelling and hyphenation should be conventional to The Concise Oxford English Dictionary. Statistics and measurements should at all times be given in figures, e.g. 16 min, except for when the number begins a sentence. When the number does not refer to a unit of measurement it should be spelt in full unless, it is 160 or greater.

Abbreviations supposed to be used carefully. The abbreviated name or expression is supposed to be cited in full at first usage, followed by the conventional abbreviation in parentheses.

Metric SI units are supposed to generally be used excluding where they conflict with current practice or are confusing. For illustration, 1.4 l rather than  $1.4 \times 10^{-3} \text{ m}^3$ , or 4 mm somewhat than  $4 \times 10^{-3} \text{ m}$ . Chemical formula and solutions must identify the form used, e.g. anhydrous or hydrated, and the concentration must be in clearly defined units. Common species names should be followed by underlines at the first mention. For following use the generic name should be constricted to a single letter, if it is clear.

## Structure

All manuscripts submitted to Global Journals Inc. (US), ought to include:

Title: The title page must carry an instructive title that reflects the content, a running title (less than 45 characters together with spaces), names of the authors and co-authors, and the place(s) wherever the work was carried out. The full postal address in addition with the e-mail address of related author must be given. Up to eleven keywords or very brief phrases have to be given to help data retrieval, mining and indexing.

*Abstract, used in Original Papers and Reviews:*

### Optimizing Abstract for Search Engines

Many researchers searching for information online will use search engines such as Google, Yahoo or similar. By optimizing your paper for search engines, you will amplify the chance of someone finding it. This in turn will make it more likely to be viewed and/or cited in a further work. Global Journals Inc. (US) have compiled these guidelines to facilitate you to maximize the web-friendliness of the most public part of your paper.

### Key Words

A major linchpin in research work for the writing research paper is the keyword search, which one will employ to find both library and Internet resources.

One must be persistent and creative in using keywords. An effective keyword search requires a strategy and planning a list of possible keywords and phrases to try.

Search engines for most searches, use Boolean searching, which is somewhat different from Internet searches. The Boolean search uses "operators," words (and, or, not, and near) that enable you to expand or narrow your affords. Tips for research paper while preparing research paper are very helpful guideline of research paper.

Choice of key words is first tool of tips to write research paper. Research paper writing is an art. A few tips for deciding as strategically as possible about keyword search:



- One should start brainstorming lists of possible keywords before even begin searching. Think about the most important concepts related to research work. Ask, "What words would a source have to include to be truly valuable in research paper?" Then consider synonyms for the important words.
- It may take the discovery of only one relevant paper to let steer in the right keyword direction because in most databases, the keywords under which a research paper is abstracted are listed with the paper.
- One should avoid outdated words.

Keywords are the key that opens a door to research work sources. Keyword searching is an art in which researcher's skills are bound to improve with experience and time.

Numerical Methods: Numerical methods used should be clear and, where appropriate, supported by references.

*Acknowledgements: Please make these as concise as possible.*

#### References

References follow the Harvard scheme of referencing. References in the text should cite the authors' names followed by the time of their publication, unless there are three or more authors when simply the first author's name is quoted followed by et al. unpublished work has to only be cited where necessary, and only in the text. Copies of references in press in other journals have to be supplied with submitted typescripts. It is necessary that all citations and references be carefully checked before submission, as mistakes or omissions will cause delays.

References to information on the World Wide Web can be given, but only if the information is available without charge to readers on an official site. Wikipedia and Similar websites are not allowed where anyone can change the information. Authors will be asked to make available electronic copies of the cited information for inclusion on the Global Journals Inc. (US) homepage at the judgment of the Editorial Board.

The Editorial Board and Global Journals Inc. (US) recommend that, citation of online-published papers and other material should be done via a DOI (digital object identifier). If an author cites anything, which does not have a DOI, they run the risk of the cited material not being noticeable.

The Editorial Board and Global Journals Inc. (US) recommend the use of a tool such as Reference Manager for reference management and formatting.

#### Tables, Figures and Figure Legends

*Tables: Tables should be few in number, cautiously designed, uncrowned, and include only essential data. Each must have an Arabic number, e.g. Table 4, a self-explanatory caption and be on a separate sheet. Vertical lines should not be used.*

*Figures: Figures are supposed to be submitted as separate files. Always take in a citation in the text for each figure using Arabic numbers, e.g. Fig. 4. Artwork must be submitted online in electronic form by e-mailing them.*

#### Preparation of Electronic Figures for Publication

Even though low quality images are sufficient for review purposes, print publication requires high quality images to prevent the final product being blurred or fuzzy. Submit (or e-mail) EPS (line art) or TIFF (halftone/photographs) files only. MS PowerPoint and Word Graphics are unsuitable for printed pictures. Do not use pixel-oriented software. Scans (TIFF only) should have a resolution of at least 350 dpi (halftone) or 700 to 1100 dpi (line drawings) in relation to the imitation size. Please give the data for figures in black and white or submit a Color Work Agreement Form. EPS files must be saved with fonts embedded (and with a TIFF preview, if possible).

For scanned images, the scanning resolution (at final image size) ought to be as follows to ensure good reproduction: line art: >650 dpi; halftones (including gel photographs) : >350 dpi; figures containing both halftone and line images: >650 dpi.



Color Charges: It is the rule of the Global Journals Inc. (US) for authors to pay the full cost for the reproduction of their color artwork. Hence, please note that, if there is color artwork in your manuscript when it is accepted for publication, we would require you to complete and return a color work agreement form before your paper can be published.

*Figure Legends: Self-explanatory legends of all figures should be incorporated separately under the heading 'Legends to Figures'. In the full-text online edition of the journal, figure legends may possibly be truncated in abbreviated links to the full screen version. Therefore, the first 100 characters of any legend should notify the reader, about the key aspects of the figure.*

## **6. AFTER ACCEPTANCE**

Upon approval of a paper for publication, the manuscript will be forwarded to the dean, who is responsible for the publication of the Global Journals Inc. (US).

### **6.1 Proof Corrections**

The corresponding author will receive an e-mail alert containing a link to a website or will be attached. A working e-mail address must therefore be provided for the related author.

Acrobat Reader will be required in order to read this file. This software can be downloaded

(Free of charge) from the following website:

[www.adobe.com/products/acrobat/readstep2.html](http://www.adobe.com/products/acrobat/readstep2.html). This will facilitate the file to be opened, read on screen, and printed out in order for any corrections to be added. Further instructions will be sent with the proof.

Proofs must be returned to the dean at [dean@globaljournals.org](mailto:dean@globaljournals.org) within three days of receipt.

As changes to proofs are costly, we inquire that you only correct typesetting errors. All illustrations are retained by the publisher. Please note that the authors are responsible for all statements made in their work, including changes made by the copy editor.

### **6.2 Early View of Global Journals Inc. (US) (Publication Prior to Print)**

The Global Journals Inc. (US) are enclosed by our publishing's Early View service. Early View articles are complete full-text articles sent in advance of their publication. Early View articles are absolute and final. They have been completely reviewed, revised and edited for publication, and the authors' final corrections have been incorporated. Because they are in final form, no changes can be made after sending them. The nature of Early View articles means that they do not yet have volume, issue or page numbers, so Early View articles cannot be cited in the conventional way.

### **6.3 Author Services**

Online production tracking is available for your article through Author Services. Author Services enables authors to track their article - once it has been accepted - through the production process to publication online and in print. Authors can check the status of their articles online and choose to receive automated e-mails at key stages of production. The authors will receive an e-mail with a unique link that enables them to register and have their article automatically added to the system. Please ensure that a complete e-mail address is provided when submitting the manuscript.

### **6.4 Author Material Archive Policy**

Please note that if not specifically requested, publisher will dispose off hardcopy & electronic information submitted, after the two months of publication. If you require the return of any information submitted, please inform the Editorial Board or dean as soon as possible.

### **6.5 Offprint and Extra Copies**

A PDF offprint of the online-published article will be provided free of charge to the related author, and may be distributed according to the Publisher's terms and conditions. Additional paper offprint may be ordered by emailing us at: [editor@globaljournals.org](mailto:editor@globaljournals.org) .



Before start writing a good quality Computer Science Research Paper, let us first understand what is Computer Science Research Paper? So, Computer Science Research Paper is the paper which is written by professionals or scientists who are associated to Computer Science and Information Technology, or doing research study in these areas. If you are novel to this field then you can consult about this field from your supervisor or guide.

#### TECHNIQUES FOR WRITING A GOOD QUALITY RESEARCH PAPER:

**1. Choosing the topic:** In most cases, the topic is searched by the interest of author but it can be also suggested by the guides. You can have several topics and then you can judge that in which topic or subject you are finding yourself most comfortable. This can be done by asking several questions to yourself, like Will I be able to carry our search in this area? Will I find all necessary recourses to accomplish the search? Will I be able to find all information in this field area? If the answer of these types of questions will be "Yes" then you can choose that topic. In most of the cases, you may have to conduct the surveys and have to visit several places because this field is related to Computer Science and Information Technology. Also, you may have to do a lot of work to find all rise and falls regarding the various data of that subject. Sometimes, detailed information plays a vital role, instead of short information.

**2. Evaluators are human:** First thing to remember that evaluators are also human being. They are not only meant for rejecting a paper. They are here to evaluate your paper. So, present your Best.

**3. Think Like Evaluators:** If you are in a confusion or getting demotivated that your paper will be accepted by evaluators or not, then think and try to evaluate your paper like an Evaluator. Try to understand that what an evaluator wants in your research paper and automatically you will have your answer.

**4. Make blueprints of paper:** The outline is the plan or framework that will help you to arrange your thoughts. It will make your paper logical. But remember that all points of your outline must be related to the topic you have chosen.

**5. Ask your Guides:** If you are having any difficulty in your research, then do not hesitate to share your difficulty to your guide (if you have any). They will surely help you out and resolve your doubts. If you can't clarify what exactly you require for your work then ask the supervisor to help you with the alternative. He might also provide you the list of essential readings.

**6. Use of computer is recommended:** As you are doing research in the field of Computer Science, then this point is quite obvious.

**7. Use right software:** Always use good quality software packages. If you are not capable to judge good software then you can lose quality of your paper unknowingly. There are various software programs available to help you, which you can get through Internet.

**8. Use the Internet for help:** An excellent start for your paper can be by using the Google. It is an excellent search engine, where you can have your doubts resolved. You may also read some answers for the frequent question how to write my research paper or find model research paper. From the internet library you can download books. If you have all required books make important reading selecting and analyzing the specified information. Then put together research paper sketch out.

**9. Use and get big pictures:** Always use encyclopedias, Wikipedia to get pictures so that you can go into the depth.

**10. Bookmarks are useful:** When you read any book or magazine, you generally use bookmarks, right! It is a good habit, which helps to not to lose your continuity. You should always use bookmarks while searching on Internet also, which will make your search easier.

**11. Revise what you wrote:** When you write anything, always read it, summarize it and then finalize it.



**12. Make all efforts:** Make all efforts to mention what you are going to write in your paper. That means always have a good start. Try to mention everything in introduction, that what is the need of a particular research paper. Polish your work by good skill of writing and always give an evaluator, what he wants.

**13. Have backups:** When you are going to do any important thing like making research paper, you should always have backup copies of it either in your computer or in paper. This will help you to not to lose any of your important.

**14. Produce good diagrams of your own:** Always try to include good charts or diagrams in your paper to improve quality. Using several and unnecessary diagrams will degrade the quality of your paper by creating "hotchpotch." So always, try to make and include those diagrams, which are made by your own to improve readability and understandability of your paper.

**15. Use of direct quotes:** When you do research relevant to literature, history or current affairs then use of quotes become essential but if study is relevant to science then use of quotes is not preferable.

**16. Use proper verb tense:** Use proper verb tenses in your paper. Use past tense, to present those events that happened. Use present tense to indicate events that are going on. Use future tense to indicate future happening events. Use of improper and wrong tenses will confuse the evaluator. Avoid the sentences that are incomplete.

**17. Never use online paper:** If you are getting any paper on Internet, then never use it as your research paper because it might be possible that evaluator has already seen it or maybe it is outdated version.

**18. Pick a good study spot:** To do your research studies always try to pick a spot, which is quiet. Every spot is not for studies. Spot that suits you choose it and proceed further.

**19. Know what you know:** Always try to know, what you know by making objectives. Else, you will be confused and cannot achieve your target.

**20. Use good quality grammar:** Always use a good quality grammar and use words that will throw positive impact on evaluator. Use of good quality grammar does not mean to use tough words, that for each word the evaluator has to go through dictionary. Do not start sentence with a conjunction. Do not fragment sentences. Eliminate one-word sentences. Ignore passive voice. Do not ever use a big word when a diminutive one would suffice. Verbs have to be in agreement with their subjects. Prepositions are not expressions to finish sentences with. It is incorrect to ever divide an infinitive. Avoid clichés like the disease. Also, always shun irritating alliteration. Use language that is simple and straight forward. put together a neat summary.

**21. Arrangement of information:** Each section of the main body should start with an opening sentence and there should be a changeover at the end of the section. Give only valid and powerful arguments to your topic. You may also maintain your arguments with records.

**22. Never start in last minute:** Always start at right time and give enough time to research work. Leaving everything to the last minute will degrade your paper and spoil your work.

**23. Multitasking in research is not good:** Doing several things at the same time proves bad habit in case of research activity. Research is an area, where everything has a particular time slot. Divide your research work in parts and do particular part in particular time slot.

**24. Never copy others' work:** Never copy others' work and give it your name because if evaluator has seen it anywhere you will be in trouble.

**25. Take proper rest and food:** No matter how many hours you spend for your research activity, if you are not taking care of your health then all your efforts will be in vain. For a quality research, study is must, and this can be done by taking proper rest and food.

**26. Go for seminars:** Attend seminars if the topic is relevant to your research area. Utilize all your resources.



**27. Refresh your mind after intervals:** Try to give rest to your mind by listening to soft music or by sleeping in intervals. This will also improve your memory.

**28. Make colleagues:** Always try to make colleagues. No matter how sharper or intelligent you are, if you make colleagues you can have several ideas, which will be helpful for your research.

**29. Think technically:** Always think technically. If anything happens, then search its reasons, its benefits, and demerits.

**30. Think and then print:** When you will go to print your paper, notice that tables are not be split, headings are not detached from their descriptions, and page sequence is maintained.

**31. Adding unnecessary information:** Do not add unnecessary information, like, I have used MS Excel to draw graph. Do not add irrelevant and inappropriate material. These all will create superfluous. Foreign terminology and phrases are not apropos. One should NEVER take a broad view. Analogy in script is like feathers on a snake. Not at all use a large word when a very small one would be sufficient. Use words properly, regardless of how others use them. Remove quotations. Puns are for kids, not grunt readers. Amplification is a billion times of inferior quality than sarcasm.

**32. Never oversimplify everything:** To add material in your research paper, never go for oversimplification. This will definitely irritate the evaluator. Be more or less specific. Also too, by no means, ever use rhythmic redundancies. Contractions aren't essential and shouldn't be there used. Comparisons are as terrible as clichés. Give up ampersands and abbreviations, and so on. Remove commas, that are, not necessary. Parenthetical words however should be together with this in commas. Understatement is all the time the complete best way to put onward earth-shaking thoughts. Give a detailed literary review.

**33. Report concluded results:** Use concluded results. From raw data, filter the results and then conclude your studies based on measurements and observations taken. Significant figures and appropriate number of decimal places should be used. Parenthetical remarks are prohibitive. Proofread carefully at final stage. In the end give outline to your arguments. Spot out perspectives of further study of this subject. Justify your conclusion by at the bottom of them with sufficient justifications and examples.

**34. After conclusion:** Once you have concluded your research, the next most important step is to present your findings. Presentation is extremely important as it is the definite medium through which your research is going to be in print to the rest of the crowd. Care should be taken to categorize your thoughts well and present them in a logical and neat manner. A good quality research paper format is essential because it serves to highlight your research paper and bring to light all necessary aspects in your research.

## INFORMAL GUIDELINES OF RESEARCH PAPER WRITING

### Key points to remember:

- Submit all work in its final form.
- Write your paper in the form, which is presented in the guidelines using the template.
- Please note the criterion for grading the final paper by peer-reviewers.

### Final Points:

A purpose of organizing a research paper is to let people to interpret your effort selectively. The journal requires the following sections, submitted in the order listed, each section to start on a new page.

The introduction will be compiled from reference matter and will reflect the design processes or outline of basis that direct you to make study. As you will carry out the process of study, the method and process section will be constructed as like that. The result segment will show related statistics in nearly sequential order and will direct the reviewers next to the similar intellectual paths throughout the data that you took to carry out your study. The discussion section will provide understanding of the data and projections as to the implication of the results. The use of good quality references all through the paper will give the effort trustworthiness by representing an alertness of prior workings.





Writing a research paper is not an easy job no matter how trouble-free the actual research or concept. Practice, excellent preparation, and controlled record keeping are the only means to make straightforward the progression.

**General style:**

Specific editorial column necessities for compliance of a manuscript will always take over from directions in these general guidelines.

To make a paper clear

- Adhere to recommended page limits

Mistakes to evade

- Insertion a title at the foot of a page with the subsequent text on the next page
- Separating a table/chart or figure - impound each figure/table to a single page
- Submitting a manuscript with pages out of sequence

In every sections of your document

- Use standard writing style including articles ("a", "the," etc.)
- Keep on paying attention on the research topic of the paper
- Use paragraphs to split each significant point (excluding for the abstract)
- Align the primary line of each section
- Present your points in sound order
- Use present tense to report well accepted
- Use past tense to describe specific results
- Shun familiar wording, don't address the reviewer directly, and don't use slang, slang language, or superlatives
- Shun use of extra pictures - include only those figures essential to presenting results

**Title Page:**

Choose a revealing title. It should be short. It should not have non-standard acronyms or abbreviations. It should not exceed two printed lines. It should include the name(s) and address (es) of all authors.



## Abstract:

The summary should be two hundred words or less. It should briefly and clearly explain the key findings reported in the manuscript-- must have precise statistics. It should not have abnormal acronyms or abbreviations. It should be logical in itself. Shun citing references at this point.

An abstract is a brief distinct paragraph summary of finished work or work in development. In a minute or less a reviewer can be taught the foundation behind the study, common approach to the problem, relevant results, and significant conclusions or new questions.

Write your summary when your paper is completed because how can you write the summary of anything which is not yet written? Wealth of terminology is very essential in abstract. Yet, use comprehensive sentences and do not let go readability for brevity. You can maintain it succinct by phrasing sentences so that they provide more than lone rationale. The author can at this moment go straight to shortening the outcome. Sum up the study, with the subsequent elements in any summary. Try to maintain the initial two items to no more than one ruling each.

- Reason of the study - theory, overall issue, purpose
- Fundamental goal
- To the point depiction of the research
- Consequences, including definite statistics - if the consequences are quantitative in nature, account quantitative data; results of any numerical analysis should be reported
- Significant conclusions or questions that track from the research(es)

## Approach:

- Single section, and succinct
- As an outline of job done, it is always written in past tense
- A conceptual should situate on its own, and not submit to any other part of the paper such as a form or table
- Center on shortening results - bound background information to a verdict or two, if completely necessary
- What you account in an abstract must be regular with what you reported in the manuscript
- Exact spelling, clearness of sentences and phrases, and appropriate reporting of quantities (proper units, important statistics) are just as significant in an abstract as they are anywhere else

## Introduction:

The **Introduction** should "introduce" the manuscript. The reviewer should be presented with sufficient background information to be capable to comprehend and calculate the purpose of your study without having to submit to other works. The basis for the study should be offered. Give most important references but shun difficult to make a comprehensive appraisal of the topic. In the introduction, describe the problem visibly. If the problem is not acknowledged in a logical, reasonable way, the reviewer will have no attention in your result. Speak in common terms about techniques used to explain the problem, if needed, but do not present any particulars about the protocols here. Following approach can create a valuable beginning:

- Explain the value (significance) of the study
- Shield the model - why did you employ this particular system or method? What is its compensation? You strength remark on its appropriateness from a abstract point of vision as well as point out sensible reasons for using it.
- Present a justification. Status your particular theory (es) or aim(s), and describe the logic that led you to choose them.
- Very for a short time explain the tentative propose and how it skilled the declared objectives.

## Approach:

- Use past tense except for when referring to recognized facts. After all, the manuscript will be submitted after the entire job is done.
- Sort out your thoughts; manufacture one key point with every section. If you make the four points listed above, you will need a least of four paragraphs.



- Present surroundings information only as desirable in order hold up a situation. The reviewer does not desire to read the whole thing you know about a topic.
- Shape the theory/purpose specifically - do not take a broad view.
- As always, give awareness to spelling, simplicity and correctness of sentences and phrases.

#### **Procedures (Methods and Materials):**

This part is supposed to be the easiest to carve if you have good skills. A sound written Procedures segment allows a capable scientist to replacement your results. Present precise information about your supplies. The suppliers and clarity of reagents can be helpful bits of information. Present methods in sequential order but linked methodologies can be grouped as a segment. Be concise when relating the protocols. Attempt for the least amount of information that would permit another capable scientist to spare your outcome but be cautious that vital information is integrated. The use of subheadings is suggested and ought to be synchronized with the results section. When a technique is used that has been well described in another object, mention the specific item describing a way but draw the basic principle while stating the situation. The purpose is to text all particular resources and broad procedures, so that another person may use some or all of the methods in one more study or referee the scientific value of your work. It is not to be a step by step report of the whole thing you did, nor is a methods section a set of orders.

#### **Materials:**

- Explain materials individually only if the study is so complex that it saves liberty this way.
- Embrace particular materials, and any tools or provisions that are not frequently found in laboratories.
- Do not take in frequently found.
- If use of a definite type of tools.
- Materials may be reported in a part section or else they may be recognized along with your measures.

#### **Methods:**

- Report the method (not particulars of each process that engaged the same methodology)
- Describe the method entirely
- To be succinct, present methods under headings dedicated to specific dealings or groups of measures
- Simplify - details how procedures were completed not how they were exclusively performed on a particular day.
- If well known procedures were used, account the procedure by name, possibly with reference, and that's all.

#### **Approach:**

- It is embarrassed or not possible to use vigorous voice when documenting methods with no using first person, which would focus the reviewer's interest on the researcher rather than the job. As a result when script up the methods most authors use third person passive voice.
- Use standard style in this and in every other part of the paper - avoid familiar lists, and use full sentences.

#### **What to keep away from**

- Resources and methods are not a set of information.
- Skip all descriptive information and surroundings - save it for the argument.
- Leave out information that is immaterial to a third party.

#### **Results:**

The principle of a results segment is to present and demonstrate your conclusion. Create this part a entirely objective details of the outcome, and save all understanding for the discussion.

The page length of this segment is set by the sum and types of data to be reported. Carry on to be to the point, by means of statistics and tables, if suitable, to present consequences most efficiently. You must obviously differentiate material that would usually be incorporated in a study editorial from any unprocessed data or additional appendix matter that would not be available. In fact, such matter should not be submitted at all except requested by the instructor.



## Content

- Sum up your conclusion in text and demonstrate them, if suitable, with figures and tables.
- In manuscript, explain each of your consequences, point the reader to remarks that are most appropriate.
- Present a background, such as by describing the question that was addressed by creation an exacting study.
- Explain results of control experiments and comprise remarks that are not accessible in a prescribed figure or table, if appropriate.
- Examine your data, then prepare the analyzed (transformed) data in the form of a figure (graph), table, or in manuscript form.

### What to stay away from

- Do not discuss or infer your outcome, report surroundings information, or try to explain anything.
- Not at all, take in raw data or intermediate calculations in a research manuscript.
- Do not present the similar data more than once.
- Manuscript should complement any figures or tables, not duplicate the identical information.
- Never confuse figures with tables - there is a difference.

### Approach

- As forever, use past tense when you submit to your results, and put the whole thing in a reasonable order.
- Put figures and tables, appropriately numbered, in order at the end of the report
- If you desire, you may place your figures and tables properly within the text of your results part.

### Figures and tables

- If you put figures and tables at the end of the details, make certain that they are visibly distinguished from any attach appendix materials, such as raw facts
- Despite of position, each figure must be numbered one after the other and complete with subtitle
- In spite of position, each table must be titled, numbered one after the other and complete with heading
- All figure and table must be adequately complete that it could situate on its own, divide from text

### Discussion:

The Discussion is expected the trickiest segment to write and describe. A lot of papers submitted for journal are discarded based on problems with the Discussion. There is no head of state for how long a argument should be. Position your understanding of the outcome visibly to lead the reviewer through your conclusions, and then finish the paper with a summing up of the implication of the study. The purpose here is to offer an understanding of your results and hold up for all of your conclusions, using facts from your research and generally accepted information, if suitable. The implication of result should be visibly described. Infer your data in the conversation in suitable depth. This means that when you clarify an observable fact you must explain mechanisms that may account for the observation. If your results vary from your prospect, make clear why that may have happened. If your results agree, then explain the theory that the proof supported. It is never suitable to just state that the data approved with prospect, and let it drop at that.

- Make a decision if each premise is supported, discarded, or if you cannot make a conclusion with assurance. Do not just dismiss a study or part of a study as "uncertain."
- Research papers are not acknowledged if the work is imperfect. Draw what conclusions you can based upon the results that you have, and take care of the study as a finished work
- You may propose future guidelines, such as how the experiment might be personalized to accomplish a new idea.
- Give details all of your remarks as much as possible, focus on mechanisms.
- Make a decision if the tentative design sufficiently addressed the theory, and whether or not it was correctly restricted.
- Try to present substitute explanations if sensible alternatives be present.
- One research will not counter an overall question, so maintain the large picture in mind, where do you go next? The best studies unlock new avenues of study. What questions remain?
- Recommendations for detailed papers will offer supplementary suggestions.

### Approach:

- When you refer to information, differentiate data generated by your own studies from available information
- Submit to work done by specific persons (including you) in past tense.
- Submit to generally acknowledged facts and main beliefs in present tense.



## THE ADMINISTRATION RULES

Please carefully note down following rules and regulation before submitting your Research Paper to Global Journals Inc. (US):

**Segment Draft and Final Research Paper:** You have to strictly follow the template of research paper. If it is not done your paper may get rejected.

- The **major constraint** is that you must independently make all content, tables, graphs, and facts that are offered in the paper. You must write each part of the paper wholly on your own. The Peer-reviewers need to identify your own perceptives of the concepts in your own terms. NEVER extract straight from any foundation, and never rephrase someone else's analysis.
- Do not give permission to anyone else to "PROOFREAD" your manuscript.
- **Methods to avoid Plagiarism is applied by us on every paper, if found guilty, you will be blacklisted by all of our collaborated research groups, your institution will be informed for this and strict legal actions will be taken immediately.)**
- To guard yourself and others from possible illegal use please do not permit anyone right to use to your paper and files.

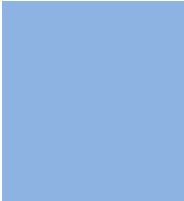


CRITERION FOR GRADING A RESEARCH PAPER (COMPILATION)  
BY GLOBAL JOURNALS INC. (US)

Please note that following table is only a Grading of "Paper Compilation" and not on "Performed/Stated Research" whose grading solely depends on Individual Assigned Peer Reviewer and Editorial Board Member. These can be available only on request and after decision of Paper. This report will be the property of Global Journals Inc. (US).

Topics	Grades		
	A-B	C-D	E-F
<i>Abstract</i>	Clear and concise with appropriate content, Correct format. 200 words or below	Unclear summary and no specific data, Incorrect form  Above 200 words	No specific data with ambiguous information  Above 250 words
<i>Introduction</i>	Containing all background details with clear goal and appropriate details, flow specification, no grammar and spelling mistake, well organized sentence and paragraph, reference cited	Unclear and confusing data, appropriate format, grammar and spelling errors with unorganized matter	Out of place depth and content, hazy format
<i>Methods and Procedures</i>	Clear and to the point with well arranged paragraph, precision and accuracy of facts and figures, well organized subheads	Difficult to comprehend with embarrassed text, too much explanation but completed	Incorrect and unorganized structure with hazy meaning
<i>Result</i>	Well organized, Clear and specific, Correct units with precision, correct data, well structuring of paragraph, no grammar and spelling mistake	Complete and embarrassed text, difficult to comprehend	Irregular format with wrong facts and figures
<i>Discussion</i>	Well organized, meaningful specification, sound conclusion, logical and concise explanation, highly structured paragraph reference cited	Wordy, unclear conclusion, spurious	Conclusion is not cited, unorganized, difficult to comprehend
<i>References</i>	Complete and correct format, well organized	Beside the point, Incomplete	Wrong format and structuring





# INDEX

---

---

## **A**

Alchemy · 35

---

## **D**

Divinatory · 30

---

## **E**

Eminence · 59, 68

---

## **H**

Haphazard · 2, 22

---

## **I**

Inferential · 9, 24



save our planet



# Global Journal of Human Social Science

Visit us on the Web at [www.GlobalJournals.org](http://www.GlobalJournals.org) | [www.SocialScienceResearch.org](http://www.SocialScienceResearch.org)  
or email us at [helpdesk@globaljournals.org](mailto:helpdesk@globaljournals.org)



ISSN 975587

© Global Journals