doi: 10.15503/rg2018.6

AN EXPLORARTORY STUDY ON THE LEVEL OF GENERAL KNOWLEDGE OF SECONDARY SCHOOL STUDENTS

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ABSTRACT

Education plays an important role in any person's life. All over the world, a large part of the resources have been dedicated by the government to give good quality education to its people. Education tries to develop innate potentialities of an individual in a harmonious manner. The ultimate aim of education is harmonious development of all the powers of the human being i.e. physical, social, intellectual, aesthetic and spiritual. The Indian government working towards the achievement of the goal of universalisation of education simultaneously strives for achievement of quality education for all. In the present paper an attempt has been made to test the general knowledge of secondary school students which can be considered as an indicator of the quality of education being provided in both government and non government schools. This paper strives to find out the present level of general knowledge of government and non-government secondary school students and compare the level of general knowledge of government and non government secondary school students. In the study it was found out that the level of general knowledge of secondary school students was average. When the test results were compared it showed that the students of non government school performed better than the government school students on the general knowledge test. Hence it can be said that the quality of non government schools was better than the government school but if we see overall performance of all the secondary school students the performance was just average on the general knowledge scale showing there is definitely scope for improvement in the quality of education being imparted.

Keywords: Secondary schools, General knowledge, Government schools, Non-Government schools, Secondary education, Intelligence, Domains of Knowledge

INTRODUCTION

Liberty cannot be preserved without the general knowledge among the people

- John Adams

EDUCATION

Education is an on-going and a life-long process. It continues from cradle to grave. Education plays a significant role in an individual's life. It is the process of development of child or any individual attempting to do so. Education tries to develop innate potentialities of an individual in a harmonious manner. The ultimate aim of education is harmonious development of all the powers of the human being i.e. physical, social, intellectual, aesthetic and spiritual.

Education has the dual function of transferring to the new generation the heritage of the past with its collected wisdom in the history of human race and preparing it for the present and the future that the emerging needs of society and individuals holds before us.

ETYMOLOGICAL MEANING OF EDUCATION

The term education has been derived from two Latin words 'Educare' and 'Educatum'. The term educare means to train or mould. It also means to bring up or to lead out or to draw out, propulsion from inward to outward. The term educatum denotes the act of teaching. These terms mainly indicate development of the latent faculties of the child.

EDUCATION IN INDIA

Education in the developing India is passing through a very critical phase. Rapid growth of population, various social changes, need for rapid economic growth, boom in the knowledge field and advancement in the technological field as well as other factors pose a challenge for the educational development of our country.

Education and the constitution of India

The constitution of India – the charter of India's freedom is a unique blueprint of democracy.

Education in the concurrent list – Till 1976 education was a state subject but with the 42nd amendment to the constitution it was put on the concurrent list. The central government is expected to play a significant role in the field of education.

Education structure in India

Pre –Primary: It consists of children of 3-5 years of age studying in nursery, kindergarten and upper kindergarten.

Primary: Includes the age group of children 6-11 years studying in classes from first to fifth

Middle: Consists of children studying in from sixth to eight.

Secondary: Includes students studying in classes ninth and tenth.

Higher secondary: Includes students studying in eleventh and twelfth classes.

Undergraduate: Here a child goes through higher education which he completes in college. The course structure and duration may vary according to the fields chosen by the respective students.

Post graduate: After completing graduation a student may opt for post graduation to further add to his qualification.

Equality of educational opportunity

Equality of opportunity has become one of the most debated and talked about element in educational field and policy. Writers like A.H. Hasley opine that the role of education must largely be to maintain a society of equals.

Equality in education Vs education for equality

The statement equality in education and education for equality has some significance while dealing with the problem of equality of educational opportunity. *Equality in education* is concerned with equality in schooling, equality of income, status and the like. Inequalities in education is caused due to difference in quality of teaching, educational resources, right curriculum etc. equality in education involves quality of teaching, expenditure on children education, library use and other educational resources, examination and selection criteria , school timings and cultural provisions in schools.

Education for equality refers to leveling. Leveling qualities enable the people to follow the principle that benefits and burdens must be distributed on relevant and equal ground. The need are equality of opportunity, greater equality in educational resources devoted to children, greater use of the educational systems to promote the equalities, more equality in the quality of educational received etc .

SECONDARY EDUCATION

Secondary education is the backbone of a country's entire educational program. After independence the need for a revaluation of secondary education was felt and hence a commission was appointed in 1952 which submitted its findings in form of a report. This commission was known as the Mudaliar commission after its chairman Dr. A. Lakshmanswami Mudaliar. The report found that many defects exists in the present set up of secondary education in India. The main problem which was recognized was the inability of secondary education to fulfill the goals of education and its inability to transform a person into responsible self sufficient citizen of India. Thus the quality of secondary education being provided was seriously questioned as the

people were unable to secure jobs after the completion of their secondary education. Many reports have been published which questions the quality of education being provided by the schools both government and private. There are many parameters which can be used to check the quality of education and one of them is the level of general knowledge which a student posses.

Intelligence

It is recognized by all teachers and academicians that one of the most important single variable which affects schooling is the quality of behavior called intelligence. The term intelligence is vague and is open to many interpretations depending upon the psychologist who try to understand or define it. Various psychologists have defined and classified intelligence according to their understanding. All the definitions of intelligence have been systematized by Vernon and freeman.

Vernon has classified all definitions of intelligence under 3 broad categories such as:

- Biological approach
- Psychological approach
- Operational approach

Freeman though has also classified all the definitions of intelligence but his approach was different from Vernon. He classified intelligence as:

- Adjustment or adaptation ability
- Ability to carry on abstract thinking
- Ability to learn

E.L. Thorndike had classified intelligence into 3 categories such as :

- Concrete intelligence
- Abstract intelligence
- Social intelligence

Misconceptions about intelligence

Intelligence is not knowledge though acquisition of knowledge depends, to a great extent on intelligence and vice versa

Intelligence is not the same as knowledge. There stands a difference between them. Before going into the difference let us first study what knowledge or general knowledge for the purpose of this study is.

GENERAL KNOWLEDGE

General knowledge is the knowledge of many different things or events as opposed to detailed knowledge about one particular subject.

1. AS A TERM

The term 'General Knowledge' has been subjected to various interpretations. The meaning of general knowledge differs with the person trying to define it. In its broader sense the term general knowledge can mean anything and everything. It encompasses all the different elements of a person's life. Sometimes general knowledge is also equated with general awareness.

2. AS A SCHOOL SUBJECT

We are living in a fast growing world consisting of advanced technologies and new innovations coming out every day. So it is important to know something about everything than knowing everything about something. And general knowledge as a school subject aims to do exactly so. As a school subject general knowledge comprises of important information on different fields and areas like wonders of the world, history, geography, different religions, sports, current affairs, books , scientist and their discoveries, animal kingdom, plant world, abbreviation, policies of our government ,scientific facts etc. As it is evident general knowledge thus combines information and facts from all other discipline of the curriculum. It is thus like a binding agent which adds up all the important information of different subjects of the curriculum and presents it in a organized form.

DOMAINS OF KNOWLEDGE

Researchers have identified 20 domains or aspects of knowledge that can form general knowledge namely:

- Art
- Biology
- Film
- Fashion
- General science
- Games
- Cookery
- Classical music

- History
- History of science
- Music
- Politics
- Popular music
- Sports
- Television
- Discovery and exploration
- Finance
- Literature
- Medicine
- Geography

Difference between general intelligence and general knowledge

Many people while discussing about general knowledge equate it with intelligence. Though there lies a relationship between general knowledge and general intelligence they are not be considered the same.

General intelligence is the ability to think about different ideas, and solve different problems. General intelligence means reasoning. It is the existence of a general intelligence that affects ones performance on mental ability measure. General intelligence is the ability to think about ideas, analyze situations, and solve problems. It is the aptitude level of a person including areas like reasoning, maths etc. General knowledge on the other hand is ones understanding of the world, of the facts, of the ideas, events etc around one. It normally covers all the areas related to the society at large.

General intelligence includes areas like :	**General knowledge includes areas like**
Verbal intelligence	History

Mathematical logic	Art
Musical skills	Discovery and exploration
Visual spatial	General science
Bodily kinesthetic	Geography
Non verbal intelligence	Literature
Concrete reasoning	Sports
Verbal linguistic	Literature
Existential	Fashion, Film and Television
Abstract reasoning	Medicine
Naturistic	Politics

NEED AND SIGNIFICANCE OF THE STUDY

Researchers have found that people high in general knowledge tend to be highly open to new experiences. High level of general knowledge contributes to personal enrichment, and a better understanding of the world (and the universe!) as a whole. The more you know about specific things, the more you can connect the individual, separate facts to other facts. This leads to understanding.

In such a time and age where cut throat competition is the order of the day the level of general knowledge which a child posses becomes a very important factor in deciding the success or failure of a child.

Also what needs to be remembered is that quality of education plays a very important role in determining the bright future of the country. Education provided should be such which not only helps the child to achieve good marks but helps in developing the level of general awareness and knowledge of a child. A child should be familiar with what is going on in their country, what is happening on the international scale, what policies have been introduced by the government for their development, if policies adopted by government are good or bad, what is the general history of other countries, what is going on in the world of sports, music , dance, art etc.

Knowledge of all these things enables a child to understand things more easily and in relation to each other. He/she is able to see things more clearly and in a bigger perspective. Hence the need was strongly felt to test the level of general knowledge which a student posses to see whether the present system of education was capable of providing the child with the level of general knowledge required by them or changes have to be made in order to ensure that level of general knowledge of a student increases and is according to their age.

Competitive exams are the order of the day. Wherever one may go and in any field the selection in any job or institution depends upon clearing these competitive exams. General knowledge plays a very important role in the competitive exams. A major section of these exams is devoted to check the general knowledge possessed by an individual. Hence the importance of level of general knowledge becomes even more important in the modern day world. Thus the need for conducting a study in this area was strongly felt.

Need was also felt to see if there was any difference in the level of general knowledge possessed by the students of government and non government schools which would indicate the difference in the quality of education provided by these two different types of schools.

STATEMENT OF THE PROBLEM

An exploratory study on the level of general knowledge of secondary school students .

RESEARCH QUESTIONS

1. What is the level of general knowledge among secondary school students of government and non government schools?
2. Is there any difference between the level of general knowledge among secondary school students of government and non government school?

OBJECTIVES OF THE STUDY

The objectives of the present study are:

1. To assess the level of general knowledge of secondary school students of government and non government schools.

2. To compare the level of general knowledge of students of government and non government schools.

HYPOTHESIS

The present study proposes to test the following hypothesis

1. There is no significant difference between the level of general knowledge of secondary school students of government and non government schools.

OPERATIONAL DEFINITIONS

General Knowledge :

General knowledge has been defined in differential psychology as "culturally valued knowledge communicated by a range of non-specialist media" and encompassing a wide subject range

Secondary schools: By secondary schools I mean the schools comprising the classes of 9^{th} standard only.

Government schools: Government schools are those schools which are run and supported financially entirely by the government.

Non Government Schools: Non government schools are those schools which are run and supported financially by bodies or organization other than the government

DELIMITATIONS

1. The study is based on the data collected from the government and non government schools of Delhi only.
2. The study is limited to the students of 9^{th} standard only.
3. The study test students general knowledge in only 6 domains of general knowledge out of 20 domains.

PLAN AND PROCEDURE OF THE STUDY

METHOD OF STUDY

The study is exploratory in nature. Exploratory research is a type of research conducted for a problem that has not been clearly defined. As the name suggest it intends to merely explore the problem and does not intends to offer final and conclusive solutions to the problem in hand. Although the results of qualitative research can give some indication as to the "why", "how" and "when" something occurs, it cannot tell us "how often" or "how many"

POPULATION OF THE STUDY

For the purpose of my study the secondary schools students of government and non government schools of "South Delhi" were taken as the total population.

SAMPLE OF THE STUDY

The sample of the study consists of secondary school students and in that too only the students studying in 9^{th} standard has been taken for the study. The students comprise of both government and non government schools.

60 students were taken from 2 government schools divided equally into 30 students from each government school. Similarly 60 students were taken from 2 non government schools again divided equally into 30 students from each non government school. So in total the sample consisted of 120 students studying in 9^{th} standard.

Sampling procedure

List was prepared of schools in South Delhi and 8 schools consisting of 4 government and 4 non government were approached to give permission to collect the data. Out of the total 8 schools that were approached 2 government schools and 2 non government schools agreed to participate in the study and collect the desired data from the students.

The procedure of drawing out sample is given below:

- South Delhi was chosen as the area where sampling will take place.
- The government and non government schools of south Delhi were recognized and identified
- In total 8 schools of south Delhi were chosen and approached consisting of 4 government and 4 were non government schools.

- Out of the 8, 4 schools agreed to participate in the study consisting of 2 government and 2 non government schools.
- Only the 9^{th} standard students were taken for the study
- In total there were 120 students out of which 60 were government school students and 60 were non government school students.

For the purpose of the study and achievement of first two objectives, the sample has been draw using the following procedure:

Firstly, convenience sampling was used using which the location for drawing out sample was decided as South Delhi.

Next, the population was divided into two parts of government and non government secondary school students.

Finally, the samples for the study were chosen using the random sampling method wherein 60 government and 60 non government secondary school students were chosen randomly

List of sampled schools in South Delhi

S.No	SCHOOL	TYPE	LOCATION
1	Sarvodaya Kanya Vidyalaya(SKV),	Government school	Tughlakabad Village, New Delhi – 110044
2	GovernmentBoys Senior Seconadary Schools,	Government school	DDA Flats Kalkaji, New Delhi -110019
3	Kalka Public School	Non government school	Alaknanda, New Delhi 110019
4	Jagriti Public School	Non government school	F-2/152 Ratiya Marg ,Sangam Vihar, New Delhi - 110080

DESCRIPTION OF THE TOOL

Due to the non availability of any standardized tool which exactly meets the requirement of the present study, the investigator used a self constructed achievement test which tests the general knowledge of the students.

The test was objective in nature consisting of 30 questions in total which were of multiple choice questions answers.

The whole test was divided into 6 domains of general knowledge. Although in total there are 20 domains of general knowledge for the purpose of this research only 6 domains were taken to test the general knowledge of the students.

The questions asked were based on these domains only. The help of general knowledge books of 6^{th} to 8^{th} standard along with internet facility were taken to select the questions.

The 6 domains of general knowledge are as follows:

- History
- Geography
- Indian constitution
- Indian constitution
- General science
- Famous books, personalities and sports

Face validity

In the study, the face validity of the tool has been established by the researcher. A draft of the tool was prepared and given to various faculty members of the institute. The teachers examined the tool and made some valuable suggestions. Keeping these suggestions in mind, the researcher prepared a final draft of the tool and hence the tool was prepared and face validity established.

Administration of the Test

The test was administered by the researcher in each of the government and non government school. The students were made to sit in a classroom with their one regular school; teacher present in the room. At a time 30 students took the test. The time duration for the test was 35 minutes.

Analysis of Data

For the present study the researcher has used qualitative data analysis techniques.

Statistical techniques used for analysis of data

Statistical techniques are statistical tools which help in the analysis of the quantitative data. Statistical analysis can be defined as the theory of practice of analysis data with statistical tools.

For the present study the researcher has used the following statistical methods for calucaltion of mean and standard Deviation

Mean –

Mean = $\sum X/N$

Where M = Mean

$\sum$ = Summation of

X = Scores in a distribution

N = Number of scores

Standard Deviation –The formula for computation of standard deviation is:

$$\sigma = \sqrt{\sum(X - X^2)/N}$$

Where, σ = Standard Deviation

$\sum$ = Summation of

X = Scores in a distribution

N = Number of scores

t-test – A t- test is used to compare the mean scores obtained by two group on a single variable.

Formula for calculating t-test

$$T = M_1 - M_2 / \sqrt{S_1^2/N_1 + S_2^2/N_2}$$

Level of significance – The level of significance is a variable associated to most statistical tests, which indicates the probability of obtaining the same results by chance alone. The rejection or acceptance of a null hypothesis is based on some level of significance (alpha level) as a criterion.

For the present study the level of significance has been taken at (.05).

ANALYSIS OF DATA AND INTERPRETATIONS OF RESULTS

OBJECTIVE 1: To assess the level of general knowledge of secondary school students of government and non government schools

Table 1.1 showing the distribution of government school students into low, medium and high achiever on the basis of marks obtained by them in the general knowledge test

Marks range	Number of students
0 – 10	12
10 -20	45
20 – 30	3

Performance of government school students in GK test

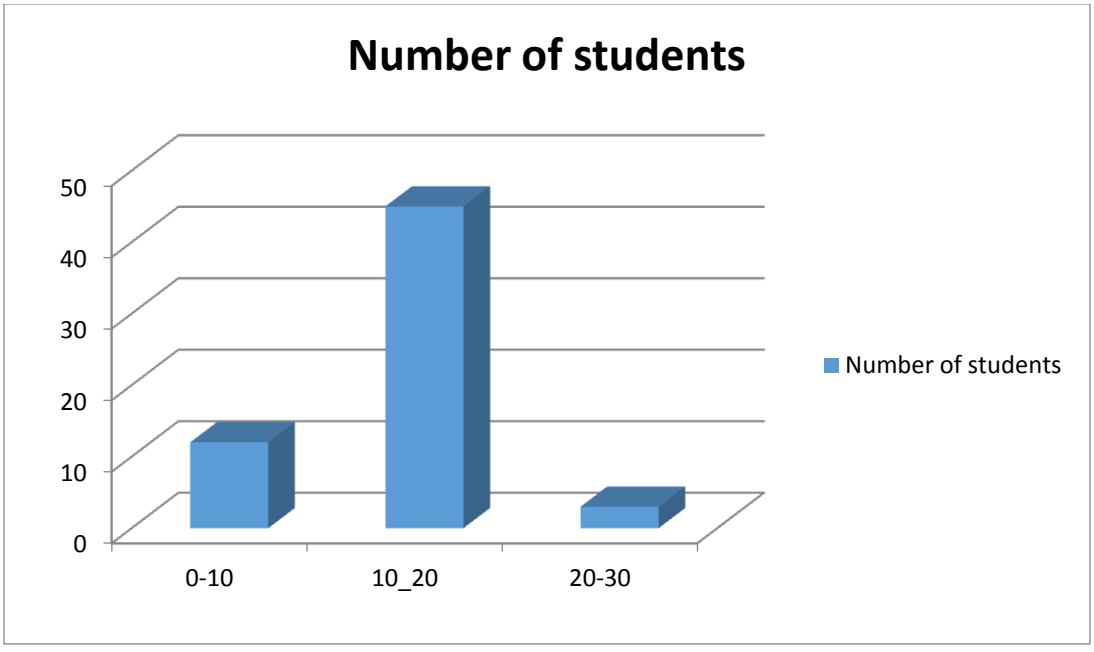


Figure 1.1 indicates the distribution of students into the low, middle and high marks achievers in the general knowledge. As per the figure

12 students in the government school got marks between 0-10 on the general knowledge test.

45 students got marks between 10 -20 on the general knowledge test

And 3 students got marks between 20-30 on the general knowledge test

Table 1.2 showing the distribution of non government school students into low, medium and high achiever on the basis of marks obtained by them in the general knowledge test

Marks range	**Number of students**
0 – 10	**4**
10 – 20	**54**
20 – 30	**2**

Performance of non government school students in Gk test

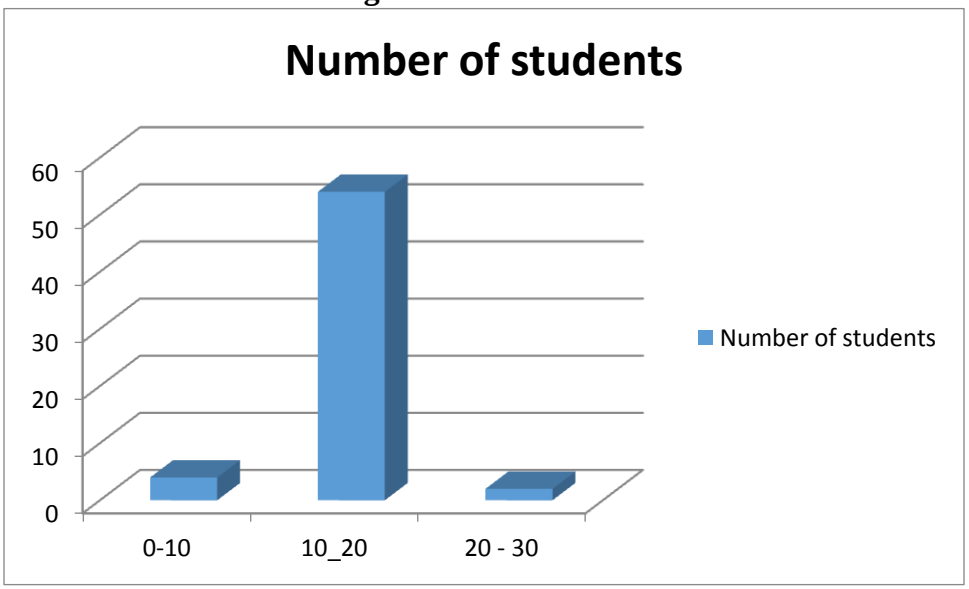


Figure 1.2. shows the distribution of non government schools students into low, medium and high achiever in the general knowledge. As per the figure

4 students got marks between 0 – 10 on the general knowledge test indicating low achievers

54 students got marks between 10 – 20 on the general knowledge test indicating medium or average achievers

2 students got marks between 20 – 30 on the general knowledge test indicating high achievers

Interpretations

The figures clearly shows that majority of the secondary school students have scored average or appear into the medium achiever category in general knowledge .

Out of 120 students including both of government and non government schools 102 students have scored on an average in the general knowledge test indicating that the level of general knowledge is average among the secondary schools students of both government and non government schools.

The low achievers were 16 in total who scored marks between 0 – 10 whereas the high achievers were just 2 who scored between 20 – 30

Objective 2: To find out if there is any difference in the level of general knowledge of secondary school students of government and non government schools.

HYPOTHESES 1: There is no significant difference between the level of general knowledge of secondary school students government and non government schools

Table 1.3 showing mean, standard deviation and t value

variable	Compared groups	N	Mean	S.D.	df	t-value

General knowledge score	**Government school students**	**60**	**12.1**	**2.77**	**118**	**4.30**
	Non government school students	**60**	**14.38**	**3.15**		

Comparison of government and non government school students GK scores

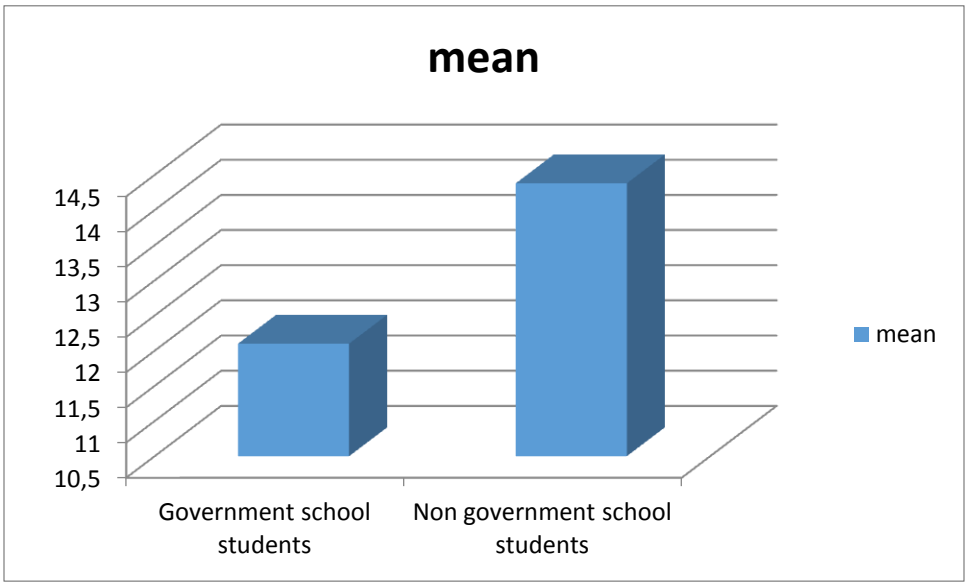


Figure 1.3 showing mean score of the marks in general knowledge test of secondary school students of government and non government school students in comparison

Table 1.3 shows that the mean score of government school students is 12.1 and that of non government school students is 14.38. The SD of the scores of government schools students is 2.77 whereas the SD of the scores of non government school students is 3.15.

The degree of freedom(df) is 118. The t test value calculated using the above said value of mean and SD is 4.30

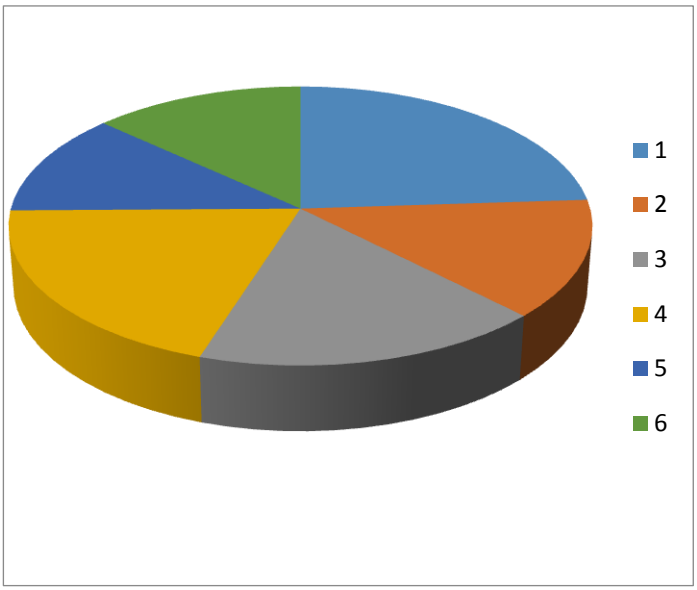
The t test value at 0.05 is 1.9803. so since the calculated value i.e. 4.30 is higher than the table value hence it means that the null hypothesis "there is no significant difference between the level of general knowledge of secondary school students of government and non government school" is rejected.

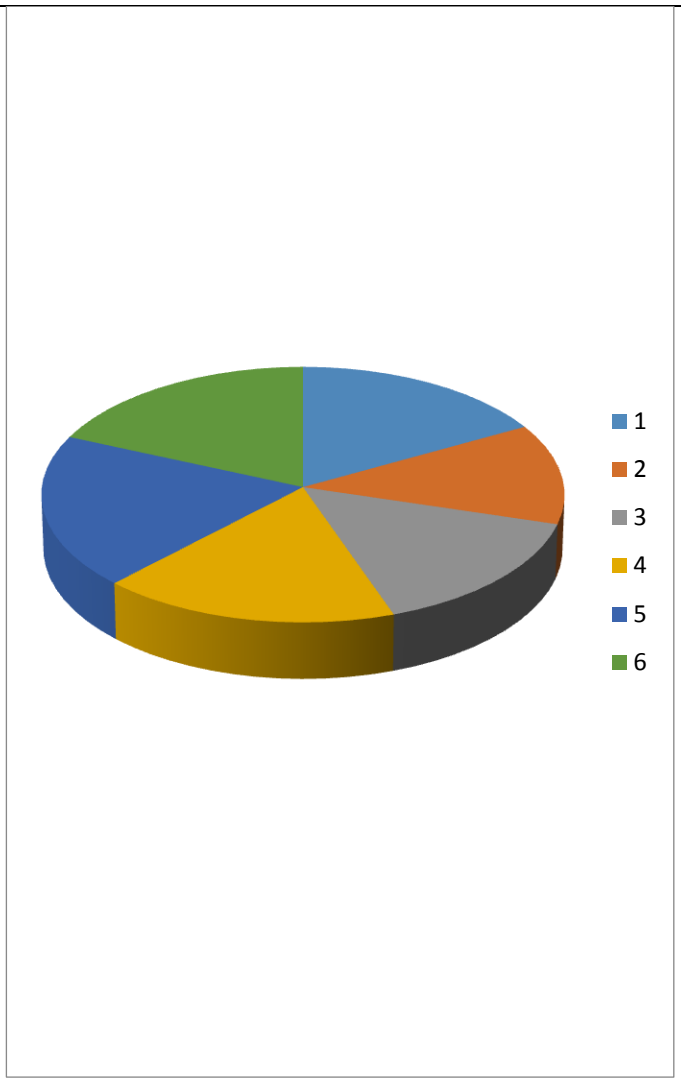
It means that there is significant difference between the level of general knowledge of government and non government secondary school students.

The non government secondary school students have a higher level of general knowledge as compared to government secondary school students.

PIE CHART SHOWING DOMAIN WISE COMPARISON OF SCORES OF GENERAL KNOWLEDGE OF GOVERNMENT AND NON GOVERNMENT SECONDARY SCHOOL STUDENTS

GOVERNMENT SCHOOL STUDENTS	NON GOVERNMENT SCHOOL STUDENTS





The domains of general knowledge are as follows

1. History

2. Geography

3. Indian Constitution

4. Indian Economy

5. General Science

6. Famous Books, Personalities and Sports

TABLE 1.4 showing domain wise comparison of scores of general knowledge of government and non government school students

S.NO.	DOMAINS	GOVERNMENT SCHOOL STUDENTS	NON GOVERNMENT SCHOOL STUDENTS
1	**HISTORY**	**174**	**146**
2	**GEOGRAPHY**	**99**	**110**
3	**INDIAN CONSTITUTION**	**126**	**130**
4	**INDIAN ECONOMY**	**144**	**151**
5	**GENERAL SCIENCE**	**87**	**168**
6	**FAMOUS BOOKS, PERSONALITIES AND SPORTS**	**96**	**159**

The table clearly shows that while the government school students score more in history domain than the non government school student, in all the other domains the non government school students score more than the government school students.

The government school students have scored the highest in history domain while the non government school students have scored the highest in general science domain.

On the other hand the government school students have scored the lowest in general science and the non government school students have scored the lowest in geography

CONCLUSION

As a result of analysis and interpretation of the data, the investigator has been able to obtain some of the findings and conclusions which are presented as below:

- Looking at the general knowledge scores of both government and non government school students it can be concluded that the level of general knowledge of secondary school is just average with a mean score of 13.24. The mean score of 13.24 indicates that the level of general knowledge of secondary school students of both government and non government school students is average.

- There exists a significant difference between the level of general knowledge of government and non government school students. The mean score of government school students in general knowledge is 12.1 whereas the mean score of non government school students is 14.38.The non government school students have a high level of general knowledge as compared to non government school students.

- The government school students scored the highest in History domain of general knowledge with the total of 174 marks whereas they scored the lowest in general science domain of general knowledge with the total of 87 marks.

- The non government school students scored the highest in general science domain of general knowledge with a total of 168 marks whereas they scored the least in geography domain of general knowledge with only 110 marks.

SUGGESTIONS

On the basis of the study conducted various suggestions can be made like:

- Similar studies can be conducted to validate the present findings on students of different grade.
- Similar studies can be conducted in other states of Delhi or even in other areas of Delhi and the result can be seen.
- Apart from the five major domains, general knowledge can also be tested on other major domains and results can be checked.
- School curriculum can be studied and seen if it has any effect on the raising the level of general knowledge of secondary school students.
- Comparative study of the level of general knowledge of Delhi based secondary school students with secondary school students of other states can be undertaken.
- The present study deals only with government and non government schools. It may be replicated on the students of aided schools.
- The study deals with only 4 schools. It may be done in more schools also.

Suggestions for the teachers

- The teachers should treat general knowledge as important as regular main stream subjects and give full focus to it.
- The subject of general knowledge should be taught in a more innovative way which would make it more interesting.
- Since the nature of the subject is such that it includes knowledge from all walks of life it can be made more interesting if it is taught keeping the real life experiences of the child in mind.
- The teacher should encourage the students to cultivate habit of reading newspapers, magazines, journals etc and watch daily news to improve their level of general knowledge.

Suggestions for the parents

- Good reading habits should be inculcated by the parents in their children from an early age to ensure that their child develop a good base from an early age.
- The parents should encourage more news watching at home than mindless programs so that the children start to have an idea about what is going on in the world around.
- Good general knowledge books and magazines can be bought by parents and they should encouraged their child to read them.
- Various games can be made from general knowledge questions and parents should try and ensure they play these kinds of games with their children.

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