"A Study Of Academic Achievement Of Secondary School Students In Relation To Metacognition, Emotional Intelligence And Family Environment"

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Abstract:

The main aim of this study relationship of Academic achievement with metacognition, emotional intelligence, and family environment of secondary school students in Jorhat district. The researcher sample constituted of 300 students in studying in class XI both boys and girls belonging to govt. and private school of urban and rural area in Jorhat district were randomly selected. Researcher use descriptive survey method to find out the correlation between the internal objectives. The tool used Open ended questionnaire. Metacognitive awareness inventory prepares and standardized by Sindhu PG (2011). It consists of thirty items following 5point scale. Emotional intelligence quotient tool devised by Dr. Reuven Baron. Family environment scale by Bhatia and Chadha (1993).

Keyword: Metacognition, Emotional Intelligence, Family Environment, Academic achievement.

Introduction :

Education is the process of developing the capacities and potentials of the individual as to be prepare that individual to be successful in a specific society. Education is a continuous and life long process and it is the capacity to feel the pleasure and pain at the right moment.

Today the world is becoming more and more competitive. Quality of performance is the main goal of life. In this time educational researcher find out that many factors are affecting the academic achievement of student. In this study find out that metacognition, emotional intelligence and family environment are how to affect academic achievement of secondary school students.

Metacognition :

Metacognition is referred to as 'thinking about thinking', 'knowing about knowing'. Metacognition is a regulatory system that helps a person understand and control his or her own cognitive performance.

Learning is majorly a cognitive process involving acquisition, accommodation, and assimilation of new learning experiences. The awareness of one's processes of learning during a new learning task is termed as meta cognition.

It was first coined by John Flavell in 1979. Meta means beyond and cognition means thinking. Thuse thinking beyond or cognition about cognition process is known as meta cognition.

Flavell (1976) defines it as "one's knowledge concerning one's own cognitive process or anything related to them".

A metacognitive approach helps the students to learn how to take control of their own learning by setting their learning goals and monitoring their progress.

Emotional Intelligence :

Emotional intelligence is also called EI or EQ, it is described as an ability, capacity or skill to perceive, assess and manage the emotions of one's self, of others and of groups. It means how we can control our emotions.
Emotional intelligence is a set of skills that underlie accurate expressions, appraisal and regulation of emotions. It is the feeling or affective side of intelligence.

The concept was first introduced by Peter Salovey and John Mayer who defined emotional intelligence as "the ability to monitor one's own and other emotions, to discriminate among them, and to use the information to guide one's thinking and actions".

In simple terms, emotional intelligence refers to the ability of an individual to process emotional information efficiently and accurately.

Family Environment :

The family Status, monthly income, parent education level, size, number of family member, structure of the family, relationship with children and other hospitality all these are influencing on secondary school student emotional intelligence and on academic achievements.

The healthy family environment strongly builds on emotional security, adjustment and metacognition, these are interrelated to each other influencing on academic achievement.

Academic Achievement

Academic achievement considered as an important factor in the educational life of students. It encourages the students to hard work and learn more competitively.

Academic achievement represents performance outcomes that indicate the extent to which a person has accomplished specific goals that were the focus of activities in instructional environments, specifically in collage, school, university.

Review of Literature :

Arti Bakhshi, Karuna Gupta, Dharvindar Singh (2016), studied that Emotional intelligence to academic achievement of secondary school students and they concluded that there are no significant gender differences in emotional intelligence. It is also concluded that there is significant positive relationship between emotional intelligence and academic achievement of secondary school students.

M, Kumar (2020), observed that emotional intelligence is the key factor of achievement and progress in the personal, educational and social life of an individual. And he concluded that by learning to use the emotional part of student brains as well as the rational, students not only expand their range of choices when it comes to responding to a new event, they will also factor emotional memory into their decision making.

Sajna Jaleel, P. Premachandran (2016), studied that Metacognition is one of the key factors of academic achievement in secondary school students. He concluded that activities that encourage a reflective and strategic stance towards learning should be embedded in the regular activities of a classroom. Such reflective activities are an add – on, which takes away from the ongoing reflection, evaluation and revision and being strategic about work.

Marulasiddappa N. T (2022), observed that family environment, emotional intelligence is broadly influence in academic achievement of secondary school student life.   And he also concluded that there is significant different in academic achievement of boys and girls of secondary school.

Surinder Kaur & Mrs. Rajbir Kaur (2016), studied metacognition in relation to academic achievement in secondary school students and they concluded that there is no significant difference in metacognition of boys and girls of secondary school students.

Objectives :

1. To study the level of Metacognition, Emotional Intelligence, Family Environment and Academic Achievement of secondary school students.

2. To study the level of Metacognition, Emotional Intelligence, Family Environment and Academic Achievement of government and private secondary school students.

3. To study the level of Metacognition, Emotional Intelligence, Family Environment and Academic Achievement of Rural and urban secondary school students.

4. To find out whether there is any significant difference between metacognition, emotional intelligence, family environment and academic achievement of male and female secondary school students.

5. To find out difference between metacognition, emotional intelligence, academic achievement of the nuclear and joint family of secondary school students.

6. To find out difference between metacognition, emotional intelligence, academic achievement of family monthly income of secondary school students.

7. To study relationship of Academic achievement with metacognition, emotional intelligence, and family environment of secondary school students.

Hypothesis :

1. There is no significant difference between Metacognition, Emotional intelligence, family environment with academic achievement of secondary school students.

2. There is no significant difference between level of metacognition, emotional intelligence, family environment and academic achievement of government and private secondary school students.

3. There is no significant difference between level of metacognition, emotional intelligence, family environment and academic achievement of rural and urban secondary school students.

4. There is no significant difference between mean score metacognition, emotional intelligence, family environment and academic achievement of male and female secondary school students.

5. There is no significant difference between metacognition, emotional intelligence, and academic achievement of nuclear and joint family of secondary school students.

6. There is no significant difference between metacognition, emotional intelligence, academic achievement of family monthly income of secondary school students.

7. There is no relation between metacognition, emotional intelligence, family environment with academic achievement of secondary school students.

8. There is no significant difference between metacognition, emotional intelligence and academic achievement of parent education level of secondary school students.

Methodology :

The present study is descriptive survey study that needs to prepare a layout of the method of following steps in taking a proper sample, collecting data, applying the suitable technique to arrive at desired results and verification of the hypothesis.

Sample

The investigator selected 300 sample from secondary school students in Jorhat district based on stratified random sampling.

Tools

1. Open ended questionnaire.

2. Metacognitive awareness inventory prepares and standardized by Sindhu PG (2011). It consists of thirty items following 5point scale.

3. Emotional intelligence quotient tool devised by Dr. Reuven Baron.

4. Family environment scale by Bhatia and Chadha (1993).

Study design

Mean, S.D., t-test, ANOVA statistical technique were used for data analysis.

Analysis of data on the basis of objective

Objective -1: To study the level of Metacognition, Emotional Intelligence, Family Environment and Academic Achievement of secondary school students.

Objective 4: To find out whether there is any significant difference between metacognition, emotional intelligence, family environment and academic achievement of male and female secondary school students.

Table-1.0

SL No	Variable	Gender	N	Mean	S. D.	t-value
1	Metacognition	Male	300	111	49.63	2.49
		Female	300	80	35.77	
2	Emotional Intelligence	Male	300	101	45,17	2.54
		Female	300	96	42,93	
3	Family Environment	Male	300	66	29,51	1.87
		Female	300	79	35.32	
4	Academic Achievement	Male	300	160	71.55	3.65
		Female	300	120	53.66	

Note: *   denoted significant at 1% level 1.96

- denoted significant at 5% level 2.58

HYPOTHESIS 1

HYPOTHESIS 1 was formulated that no significant difference between Metacognition, Emotional intelligence, family environment with academic achievement of secondary school students. The calculated t-value of metacognition 2.49, emotional intelligence 2.54 greater than table value at 1% level so it is rejected that 1% level and accept 5% level, family environment calculated t value 1.87 accept 1% level and academic achievement t-value 3.65 its greater than 1% and 5% level so it is rejected the null hypothesis at 1% and 5% level.

Hypothesis 4 was formulated that no significant difference between mean score metacognition, emotional intelligence, family environment and academic achievement of male and female secondary school **students. It shows that different mean score so above null hypothesis was rejected and alternative hypothesis accepted.**

Objective 2: To study the level of Metacognition, Emotional Intelligence, Family Environment and Academic Achievement of government and private secondary school students.

Table 1.1

SL NO	Variable	Gender	N	Mean	SD	t-value
1	Academic Achievement	Govt.	300	113	50.53	2.82
		Privat	300	106	47.40	
2	Metacognition	Govt.	300	77	34.43	1.88
		Private	300	69	30.85	
3	Emotional Intelligence	Govt.	300	80	35.77	1.97
		Private	300	73	32.64	
4	Family Environment	Govt.	300	56	25.04	1.60
		Private	300	68	30.41	

Hypothesis 2 state that no significant difference between level of metacognition, emotional intelligence, family environment and academic achievement of government and private secondary school students. The calculated t-value academic achievement 2.82 greater than table value at 1% and 5% level so its rejected and metacognition 1.88, family environment 1.60 accepted at 1% level and emotional intelligence 1.97 rejected 5% level and accepted at 1% level.

Objective 3: To study the level of Metacognition, Emotional Intelligence, Family Environment and Academic Achievement of Rural and urban secondary school students.

Table-1.2

SL No	Variable	Gender	N	Mean	S. D.	t-value
1	Metacognition	Urban	300	99	44.27	2.32
		Rural	300	80	35.77	
2	Emotional Intelligence	Urban	300	75	33.54	1.97
		Rural	300	78	34.88	
3	Family Environment	Urban	300	66	29.51	1.72
		Rural	300	69	30.17	
4	Academic Achievement	Urban	300	140	62.60	3.36
		Rural	300	120	53.66	

Hypothesis 3 state that no significant difference between level of metacognition, emotional intelligence, family environment and academic achievement of rural and urban secondary school students. The calculated t-value metacognition 2.32, emotional intelligence 1.97 rejected 1% level and accepted at 5% level, family environment 1.72 accepted at 1% level and academic achievement rejected at 1% and 5% both levels.

Objective 5: To find out difference between metacognition, emotional intelligence, academic achievement of the nuclear and joint family of secondary school students.

Table-1.3

SL No	Variable	Gender	N	Mean	S. D.	t-value
1	Metacognition	Nuclear	300	88	39.35	2.14
		Joint	300	78	34.88	
2	Emotional Intelligence	Nuclear	300	75	33.54	1.97
		Joint	300	78	34.88	
3	Family Environment	Nuclear	300	66	29.51	1.72
		Joint	300	69	30.17	
4	Academic Achievement	Nuclear	300	125	55.90	3.16
		Joint	300	120	53.66	

Hypothesis 5 state that no significant difference between metacognition, emotional intelligence, and academic achievement of nuclear and joint family of secondary school **students. The t-value calculated metacognition and emotional intelligence accepted at 5% level and rejected at 1% level, family environment accepted both level and academic achievement rejected both levels.**

Hypothesis 7 state that no relation between metacognition, emotional intelligence, family environment with academic achievement of secondary school students. This study observed that metacognition, emotional intelligence and family environment are interrelated to academic achievement. Mostly family environment having broad impact to academic achievement in secondary school students. A healthy and clean family environment helped to the students in achieved their goal.

Findings / Conclusion:

1. There is significant difference between Metacognition, Emotional intelligence, family environment with academic achievement of secondary school students.

2. There is significant difference between level of metacognition, emotional intelligence, family environment and academic achievement of government and private secondary school students.

3. There is significant difference between level of metacognition, emotional intelligence, family environment and academic achievement of rural and urban secondary school students.

4. There is significant difference between mean score metacognition, emotional intelligence, family environment and academic achievement of male and female secondary school `students.`

5. There is significant difference between metacognition, emotional intelligence, and academic achievement of nuclear and joint family of secondary school `students.`

6. There is significant difference between metacognition, emotional intelligence, academic achievement of family monthly income of secondary school students.

7. There is relation between metacognition, emotional intelligence, family environment with academic achievement of secondary school students.

8. There is significant difference between metacognition, emotional intelligence and academic achievement of parent education level of secondary school students.

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