Vol. No.08, Issue No. 10, October 2020 www.ijates.com



IMPACT OF QUALITY OF LIFE ON SELF-ESTEEM: A REVIEW ON SECONDARY SCHOOLTEACHERS IN NIGERIA

Dawi Dala Mangari¹, Mohammed Musa Gwoma², Hauwa Musa Aliyu³

ABSTRACT

Quality of life is increasingly becoming significant factor in achieving goals of any organization. Quality of life consists of work environment, organizational commitment, rewards and incentives and recognition among others. While self-esteem on the other hand refers to a subjective evaluation /assessment of his or her own worth. It also implies how one thinks about self. The objectives of the reviewareto relate the findings of different scholars on the impact of self-esteem and quality of life on secondary school teachers in Nigeria. Analysis of the views and findings revealed that there is significant impact of quality of life on the self-esteem of teachers. Similar studies study conducted on quality of life as a predictor of self-esteem of primary school teachers conducted in Borno State indicated strong positive correlation between quality of life and self-esteem where it was concluded that available literature revealed that quality of life has significant impact on self-esteem of teachers.

Key words: Quality of Life, Self Esteem, Secondary School Teachers.

1.INTRODUCTION

Teacher is one of the key stakeholders in the education sector. He is the engine room and nerve center of any academic activity. Without the teacher, education at whatever level is not feasible. It is therefore imperative to create the enabling and conducive environment for him to contribute his/her role in the nation building. Therefore, this research intends examined the impact of quality of life on of secondary school teachers in Nigeria. Teachers' best performance on their jobs can positively impact on the lives of students with the multiplier effects on the wellbeing of the entire society. It is against this background that this review work analyzed the connection between self-esteem and quality of life. Individual potentials like qualification, welfare, and factors like job satisfaction, work atmosphere, occupation pressure, and standards are essential characteristics of the teacher which influence his work and success. The fact remains that teachers are the backbone of development in every society and without teachers,

¹Department of Political Science Education, Kashim Ibrahim College of Education, Maiduguri. (Nigeria)

²Department of General Studies Education, Kashim Ibrahim College of Education, Maiduguri. (Nigeria)

³Department of Educational Psychology, Kashim Ibrahim College of Education, Maiduguri (Nigeria)

Vol. No.08, Issue No. 10, October 2020

www.ijates.com



no educational plan can succeed no matter how articulated. It is only when the teachers are contented and fulfilled with their effort, they can put in their best foot forward in achieving maximum productivity. In the light of achieving this noble objective, basic essential conditions which guarantee the enabling environment for them to operate with ease and put in their best efforts must be put in place.

Consequently, keeping in view the above discussion, the review carefully focuses on the connection between selfesteem and quality of life of secondary school teachers in Nigeria.

2.SELF-ESTEEM

The term self-esteem originated from Greek to describe admiration for one's disposition. The self-aspect of self-esteem is related our ethics, beliefs, and qualities. One aspect of self-esteem defines the ethics and value which a personattaches to himself.

Self-esteem is a term used to defineperson'soverally aluation and appraisal of his individual worth. It comprisesprinciples, feelings, personality, and sadness. It is a sense of egotism in someone's mind. The term selfesteem is relevant to the ethics, principles, and attributes a person choose himself. Self-worthdescribes the significance and worth which anindividual attach to himself. It enables one to have the right attitude to be successful at work. Its replacements are self-interest, trust in one's self, confidence, self-assurance and self-respect. Like other people, students also want to know who they are, what they want, what they want to achieve in life and what their existence really means in this world. Prodigious self-worth offers individual a decent feeling about one self, whereas, low self-esteem changes one's idea of himself. One must see insidewith the view to discover what he gains. Though, self-esteem is advancedoncehousehold talk, provides, and devote time with another. School activitiesmake students to progress self-concept which will eventually impact on their self-confidence. The status of self-confidence could be seen on its effects on the life and preferences of persons, a person could consider himself respected and has reason to live, self-esteem has severe consequences on emotions, desire, values, goals and ideas. It enables one also to take and make adjustment to new challenges, it provides one with a clear vision of his strength and weaknesses, allows one to act individually and accepts responsibility to one's actions, desires and goals. It also impacts one's behavior, self-image, attitude, perceptions and thoughts. Finally, it exposes practically the difference between success and failure.

Kadriu, Kelpi, Kalyva^[1] surveyed self-esteem in the framework of self-image and consumption pattern. The survey included 198 youngsters age between 15 and 18 years old. The result showed the connection between variables and self-esteem was negatively associated with self- image and consumption syndrome conducts.

It is believed that individuals with high self-esteem have assurance in their abilities because the can stand on their own without relying on others in the conduct of their daily activities. Persons with great self-esteem are found to be very good in communication and listening skills, and that give them the privilege of good understanding. Individuals with high self-esteem are usually focused and goal oriented. They set targets for themselves and desirous to succeed. Finally, people with high self-esteem are capable of taking good care of themselves physically, socially,

Vol. No.08, Issue No. 10, October 2020

www.ijates.com

ISSN 2348 - 7550

psychologically and emotionally.

Ulrich Orth^[2] carried out research on self-esteem development from young adulthood to old age in which the result showed that variations in socio-economic position and physical well-being contribute to the fall in self-esteem that happens in old age.

Erole^[3] analyzed the evolution of self-esteem in adolescents and young adults. Statistical analysis showed that self-esteem rises through youthful age and persist to rise gradually in early maturity age. The result of the study further suggested that normative rise regarding mastery to a great extent brings about normative rise in self-esteem.

Ayodele^[4] researched on the relationship between self-esteem and performance in mathematics together with effects of gender on self-concept. The result of the investigation discovered that self-concept averagely relates to performance in mathematics and that gender has no effect on self-concept towards mathematics.

Singh^[5] conducted a study on relationship between self-esteem and family environment and found out that the effects of socio-economic status on self-esteem significant. Suggesting that there exist a positive and significant relationship between self-esteem of students and family environment, further suggesting that family relationship affect the self-esteem of students.

Branden^[6] defines self-esteem as the understanding of being capable to handle with the elementary tasks in life and brings about of happiness. According to Branden, self-esteem is the totality of self-confidence and self-respect. It happens as a result of incidental ruling that every individual has in his or her capacity to face life experiments, realize and resolve difficulties, their ability to attain contentment and be accorded self-respect. Self-esteem is the total sum of self-confidence and self-respect. It exists as a result of tacit verdict that every person does on one side and the ability to confront difficulties in order to achieve happiness. This twin sided method provides equal explanation that will be able to deal with the restrictions of describing self-esteem basically with respect to worth. Branden's account of self-esteem includes the basic elements; self-esteem as an essential social requirement, self-esteem as an involuntary and unavoidable result of the totality of person's preferences in applying senses, and experience as a portion of or background to all individual views, feelings and actions.

Marshal, et al.^[7] discovered that wrongdoers are often saddled with little esteem accompanied by feeling of humiliation as a consequence of which they discover it challenging to adjust in the society they happen to find themselves in.

Rosenberg^[8] gave the definition of self-esteem as "individual's judgment of his or her self-worth".

According to Tomaka and Blascovich^[9], self-esteem includes "cognitive and behavioral aspects as well as evaluative and affective ones".

According to Rosenberg^[8], self-esteem is a vital feature of well-developed in the life of a person's self-worth and how well one feels about self.

Mann et al. [10], recognized self-esteem as part of one's knowledge and beliefs about his personal endowment and how effective one perceives one's self have both internal and external control over worldly affairs.

Bolger and Patterson[11]

Vol. No.08, Issue No. 10, October 2020

www.ijates.com

ISSN 2348 - 7550

Deci&Ryan^[13] opined that teacher's self-esteem is internally motivated and that one's worth is not determined by external factors; and therefore, it is relatively stable.

Elliot and colleagues^[14] in their study on sex offenders discovered that children that have low self-esteem and lacking in confidence are often victims of sexual abuse, while children that have confidence and high self-esteem are probably to seek protective measures and support in a situation where they feel threatened and unsafe.

Leary and colleagues^[15]discovered that people who are subjected to experimental condition that is self-compassion friendly were found to have fewer negative tendencies and are capable of taking responsibility for their actions. It was further asserted that if the principle of compassion is inculcated into a child right at the formative age, it will lead to a child becoming more empathetic towards others and tendency to commit offences against anybody will be less. It is therefore not surprising that people with high self-compassion; which impliedly means self-compassion promotes self-esteem.

3.ANALYSIS OF REVIEWS AND CONCLUDING REMARKS

The analysis of the reviews made on self-esteem, indicated the general consensus among different authors that self-esteem plays prominent role in developing individual's self-worth and how well he/she feels about self thereby leading to greater confidence and making of a great personality. In the same manner, the study conducted on the self-esteem of primary school teachers with respect to gender in Borno State Nigeria indicated that self-esteem enhances the personality of individual teachers thereby creating hope and confidence in them which eventually raise the level of their satisfaction and performance on the job.

4.QUALITY OF LIFE

Quality of life could be clarified as the totality of connection between workers and operational atmosphere that include suitable and reasonable reward, harmless and strong working condition, opportunities to utilize and advance human capabilities, chances for occupational advancement, social relationship within the workforce, balancing of working condition, compensation and acknowledgment. The expression ''quality of life'' is used to mean a wide variety of working condition and the connected ambitions and prospects of workers. Therefore, quality of life has become an important part of attention nowadays. Considering the essentials of quality of life to human beings generally, it important to acknowledge that decent quality enhances individual's way of life. It is therefore a requirement that a healthy working environment guarantees proper job performance of a worker. It is only when a worker is healthy that he can perform his job dutifully. Against the backdrop of this that providing an enabling and healthy environment is a pre requisite for qualitative way of life. Quality of life does not only restrict its meaning to the physical or psychological wellbeing of an individual alone, but it also covers the totality of factors that guarantees the survival of individual. This of course include the personal wellness of an individual, security, social relationship, self-esteem and the environment. In organizations like the school environment, the quality of life of teachers have significant impact on their job performance, their relationship with the school authorities, within

Vol. No.08, Issue No. 10, October 2020

www.ijates.com

themselves and also with their students. A healthy school environment will surely create the impetus for the overall achievement of educational goals of any society. Hence, the significance of quality of life in relation to the environment under which an individual is made to function, the welfare and condition which one is subjected to and availability of the basic facilities and infrastructure necessary for a healthy and decent life will facilitate accelerated development in every society.

Chelate^[16]viewed quality of life as 'strength of relationships between workers and entire working condition with human aspect and financial considerations".

Baba and Jamal^[17], indicated that quality work life like job contentment, job participation, conflicting work functions, job pressure and desire to leave work by employees determines their quality of life.

Savin et al. [18] summarized that adolescents' self-esteem vary from nearly eighth level Researches have shown that self-esteem seems moderately steady. Several researches have also shown that during adolescent stages and early childhood, self-esteem stabilizes and even rises at a point.

Dhal^[19] conclude that the youths learning in a government schools exhibit optimal stage of self-esteem, limited isolation and a safe affiliation style. Sharma^[20] discovered that connection between self-esteem and household regulation of adolescents is important and helpful.

Self-esteem is a mixture of appraisal of individual capability and assessment of elementary value as an individual.

Chhabra^[21]posited there is no collaborative effect of sex on job satisfaction and work-related pressure of school tutors. While Gowri^[22] explored that amount of approach towards education had a substantial influence on job satisfaction in relation to factor visible facilities and self-esteem.

Salim et al. [23] further argued that, job satisfaction improves structural obligation, organizational nationality behavior, and worker welfare. Tutors who are contented with their jobs regularly have high amount of specialized capability and instructional talents, and feel protected about classroom control. Chang, Ferris, Johnson Rose &Tan^[24], stressed that central self-assessment is a generalized word which comprises self-worth, self-efficacy, selfregulation, and emotional control for job satisfaction, when a worker is unhappy and has disappointment at work, then, he or she thinks about his or her job. Akomolafe&Ogunmakin^[25]a study in Nigeria, stressed that effects of lack of job satisfaction are truancy from school, abandoning the work, hostile behavior towards coworkers and students, early resignation from the teaching career, and emotional isolation from work.

Lau et al. [26] quantified quality of work life as a conducive working environment that links and aided fulfilment by providing workers incentives, safety, and professional growth prospects.

Beaudoin &Edgar^[27] were of the view that quality of life is connected to the personal wellbeing and attitude of workers, but also connected to the spirits of workers in relation to their jobs. Saklani^[28] scientifically appraised the significance of numerous potentials of work life features relating to workers and the extent of their presence in organizations. The findings of the research show that besides financial considerations, workers in India place high importance to aspects that affect self-esteem and self-actualization needs greater.

Raj Adhikar and Kumar Gautan^[29]was of the view that quality of work life results to higher incentive, loyalty, and

Vol. No.08, Issue No. 10, October 2020

www.ijates.com

ISSN 2348 - 7550

room for changes among the staff. All these issues were vital in effectiveness of establishments and quality of work which in turn decrease the tendency of absenteeism, movement of staff out of the organization and enhance their job satisfaction.

Chitra and Mahalakshimi^[30], listed ten variables that assess quality of work. They include; backing from organizations, connection with colleagues, self-competence, effect of job, relevance of job, and confidence on organizational transformation, independence, availability of capital, and time regulator. Furthermore, the findings indicated that each of these variables is a prominent forecaster of job satisfaction.

Lau^[31] conducted research on quality of work life and performance to give an examination of two prominent essentials of the facility income series and discovered that there is a connection between growth and quality of life. The findings rated performance in relation to progress and success in 500 organizations.

The findings indicated that organizations with good quality of work life enjoyed higher growth rate than those who don't have.

David Lewis et al.^[32] conducted a research on external and internal elements that affect quality of work life. The variables used external features like salary and other tangible things and internal features like skills. The study revealed that supervisory style and commitment contribute positively in determine quality of life. The result further suggested that male employees are more satisfied on the job than the female employees.

Linda K. Johnsrud^[33] conducted a study on quality of work life of members of faculty in the University of Hawaii. The findings revealed that salary was the major issue in determining quality of work life of the staff and that there is a significant relationship between quality of work life and workers satisfaction.

Normal and Daud^[34], in their investigation conducted on quality of work life and organizational commitment among workers in Malaysian companies. The result showed that employee participation has positive correlation with affective, alternative, and cost commitment which tend to improve sense of commitment among employees.

B. Alireza et al.^[35] carried out a research on the connection between quality of life and demographic features of Information Technology and affiliation of staff. The dimensions used include fair reward, harmless and healthy environment, progress and safety, social significance, life duration, social incorporation, age, gender, and working experience. The result indicated that there no significant relationship between quality of work life and gender, but substantial connection between Information Technology (IT) staff and quality of work life and income.

Aloys N.K.^[36] Analyzed factors that influenced working atmosphere and quality of life among petrol station attendants in Kitali town, Kenya. His findings revealed that there is a positive correlation between quality of work life and work environment. The further indicated there is no significant connection between knowledge, occupation, progress and expansion. It is also discovered that relationship between colleagues and supervisors greatly influenced the work environment

.

Vol. No.08, Issue No. 10, October 2020 www.ijates.com



5. ANALYSIS OF REVIEWS AND CONCLUDING REMARKS:

From the views and findings of the studies conducted as per the reviews made, it was discovered that the better the quality of life, the higher the self-esteem. Thereby meaning that improvement on the welfare and working condition of teachers will certainly enhance their self-esteem and further boost their morale and confidence in carrying out their assignment. These findings from the reviews are also in conformity with the result obtained in a similar study conducted among primary school teachers in Borno State.

6. STUDIES ON SELF-ESTEEMAND QUALITY OF LIFE AMONG SECONDARY SCHOOL **TEACHERS IN NIGERA**

Various studies have be conducted on quality of life and self-esteem of school teachers in Nigeria. SesanOlatundeMabekoie^[37] in the study "psychological well-being among Nigerian teachers" found out that selfesteem and social support are important determinants of psychological well-being of teachers.

Opavemi and Akinbode^[38] in the study "The Influence of self-esteem on job involvement among Secondary school Teachers in Lagos State" revealed that self-esteem had a significant impact on teacher's job involvement.

Dawi and Vijay^[39] in study conducted on "relationship Between Quality of Life and Self-esteem of Primary School Teachers in Borno State" discovered that there is strong positive correlation between quality of life and self-esteem and that quality of life greatly influenced the self-esteem of teachers.

In a similar conducted, Dawi and Gwoma [40] "Relationship between Job Satisfaction and Self-Esteem of Primary School Teachers". It was discovered that job satisfaction of school teachers is significantly influenced by the level of self-esteem and confidence teachers have while carrying out their duties.

7.ANALYSIS OF REVIEWS AND CONCLUDING REMARKS:

Views of researchers that conducted study on self-esteem and quality of life of school teachers in different parts of the Nigeria indicate positive relationship between quality of life and self-esteem. The findings also revealed that conditions under which teachers carry out their duties greatly influence their quality of life thereby impacting either positively or negatively on their self-esteem. However, general conclusion drawn suggested that the better the quality of life, the higher the self-esteem.

8.CONCLUSION

The results obtained from the reviews on quality of life and self-esteem indicate that quality of life and selfesteem are positively correlated to each other, and quality of life has significant impact on self -esteem. Results obtained from the reviews suggest that the better the quality of life of teachers, the greater their self-esteem, which further suggest that more commitment and greater performance.

The implications of the findings from the reviews indicate that if the quality of life of teachers is poor, it will certainly lead to weak self-esteem thereby resulting in to lack of confidence and commitment to their job.Against

Vol. No.08, Issue No. 10, October 2020

www.ijates.com

this background, it incumbent upon all the stakeholders in the education industry to ensure that necessary conditions like welfare, condition of service, and working environment are appropriately provided to guarantee job satisfaction and greater self-esteem of teachers are put in place.

REFERENCE

- [1] Kadriu, M. Kelpi and E. Kalyvan (2014) Eating Disorder behaviors I Kosovo school based population: Potential risk factors. Procedia. Social and Behavioral Sciences 114 pp382-387
- [2] Orth, U., Trzesniewski, K. H. and Robins, R. W. (2010), "Self-esteem development from young Adulthood to old age: A cohort-sequential Longitudinal study", Journal of personality And Social Psychology, 98, pp.645-658
- [3] Erol, R. Y. and Ulrich, O. (2011), "Self-Esteem Development from Age 14 -30 Years: A Longitudinal Study", Journal of Personality and Social Psychology, vol. 101, No. 3, pp607-619.
- [4] Ayodele, O. J. (2011), "Self-concept and Performance of Secondary School Students in Mathematics", Journal of Educational and Developmental Psychology, vol.1 No.1, pp176-183.
- [5] Singh, D. (1958), Job satisfaction in office and manual workers. Indian journal of Social Work, 9, 39-45
- Branden, N. (1969). The Psychology of Self-Esteem: A new concept of man's psychological nature. Los [6] Angeles: Nash Publishing Corporation
- [7] Marshal, W. L. Marshal, L. E., Seran G. A. & O Brien, M. D. Self-esteems, shame, cognitive distortations and empathy in sexual offenders: their integration and treatment implications. Psychology, crime and Law, 15, 217-234
- [8] Rosenberg, M. (1965). Society and adolescent self-image. Princeton N.J.: Princeton University Press.
- [9] Blascovich, J., &Tomaka, J. (1991). Measures of self-esteem. Measure of personality and psychological attitudes, 115-160
- [10] Mann, M. Hosman, C.M.H., Schaalma, H. P., & de Vries, N. K. (2004). Self- esteem in broad Spectrum approach for mental health promotion. Health Education Research Theory & practice, 19, 357-372.
- Bolger K. E., & Patterson c. j. (2001). Pathway from Child Maltreatment to internalizing problems; [11] Perception of control as mediators and moderators. Development and Psycho- pathology, 13, 913-940.
- Neff K. (2003). Self-compassion: An alternative conceptualization of a healthy, attitude [12] Towards oneself. Self and Identity, 2, 85-101
- [13] Deci, E. L. & Ryan, R. M. (1995). Human autonomy: The basis for true self esteem. In M. H. Kernis(Ed), Efficacy, agency, and self-esteem pp. (pp. 31-49). New York: Plenum
- [14] Elliot, M., K., &Kilcoyne, J. (1995). Child Sexual Abuse Prevention: what offenders tell. Child Abuse and Neglect, 19, 579-594
- Leary, M. R., Tate, E. B., Adams, C. E., Batts Allen, A., & Hancock, J. (2007) Self Compassion and [15]

Vol. No.08, Issue No. 10, October 2020

www.ijates.com

ISSN 2348 - 7550

- Reactions to unpleasant self-relevant events. The implications of Treating oneself kindly. Journal of personality and social psychology, 92, 887-904
- [16] Chelte, A.F., (1983). Organisational Commitment, job satisfaction and quality of work life. *Journal of Occupational Behaviour*, 5, 197-212.
- [17] Baba, & Jamal, M. (1991). Reutilization of job context and job content as related employee's quality of working life: a study of psychiatric nurses. *Journal of Organizational behaviour*, 379-386.
- [18] Savin, W. (1983). Situational and trans-situational determinants of self-feelings. *Journal of personality and social psychology*, (44), 824-833
- [19] Dhal., A., Bhatia S.Sharma, & Gupta, P., V. (2007). Adolescent self-esteem. *Attachment and Loneliness*. (http://www.J icam.org/0303/adolselfesteem.pdf).
- [20] Sharma, R. (2010). Study of adjustment of adolescents in relation to their self-esteem. M.Ed Dissertation, Amritsar: Guru Nanak Dev University.
- [21] Chabbra, N., (2010). Study of occupational stress in relation to job satisfaction of private school teachers. Unpublished M.Ed Thesis. Amritsar: Guru Nanak Dev University.
- [22] Gowari. P.A., &Marriamal,K. (2011). Study of college teachers' attitudes towards teaching and job [satisfaction. *Journal of Community Guidance and Research*. Vol: 28, 99-106
- [23] Salim, S.S., Nasir, R., Arip, M.A., & Mustafa, M.B. (2012). The role of Emotional Intelligence on job satisfaction among school teachers. *The social sciences*, 7(3), 125-129.
- [24] Chang, M.L., Ferris, D.L., Johnson, R.E., Rosen, C. C., & Tan. J. A. (2012). Core self-evaluations, a review and evolution of the literature. *Journal of Management*, 38(1), 81-128.
- [25] Akomolafe, J.M., Ogunmakin, A.O., &Fasooto, G.M. (2014). Job satisfaction among Secondary School Teachers: Emotional Intelligence, emotional stress and self-sufficiency as predictors. *Journal of Education and Social Research*, 3(2), 335-349.
- [26] Lau, R. S. M. &Brue, E. M. (1998). A win-win paradigm for Quality of Work Life and Business performance. Human Resource Development, Quarterly, vol.9 No.3, Pp.211-226
- [27] Beaudoin, L.E., &Hassies. (2003). the importance to nurses' quality of work life. *Nursing Economics*, 21, 106-113.
- [28] Saklani, D.R., (2004). Quality of life in the Indian context: An empirical Investigation. *Decision*. 31(2) July-Dec., 101-135.
- [29] Raj, A.D., & Kumar, K.D. (2010) Labor Legislation for improving Quality of Work Life. *International Journal of Law and Management*, 52(1), 40-53.
- [30] Chitra, D. &Mahalakshimi, V. (2012). A study of Employees perception on Quality of work life and job satisfaction in manufacturing organization. An Empirical study.
- [31] Lau, R. S. M. &Brue, E. M. (1998). A win-win paradigm for Quality of Work Life and Business performance. Human Resource Development, Quarterly, vol.9 No.3, Pp.211-226

Vol. No.08, Issue No. 10, October 2020

www.ijates.com

ISSN 2348 - 7550

- [32] David Lewis et al., (2001), Extrinsic and Intrinsic Determinants of quality of work life, Leadership in Health Services, MCB University Press, 14(2).
- [33] Linda, K. Johnsrud, (2006) studied on quality of Faculty Work Life; University of Hawaii.
- [34] Normala, Daud (2010). "Investigating the Relationship between Quality of Work Life and organizational commitment amongst employees in Malaysian firms" Faculty of Business Management, University of Technology, MARA, International Journal of Business and Management, 5(10).
- [35] AlirezaBolhari et al., (2011), The Relationship between Quality of Work Life and Demographic characteristics of Information Technology Staff, International Conference on Computer Communication Management, vol. 5 IACSIT Press, Singapore
- [36] Aloys, N.K., (2013), Working Environmental Factors that Affect Quality of Work Life among Attendants in Petrol Stations in Kitali Town, Kenya, International Journal of Academic Research in Business & Social Sciences, 3(5).
- [37] Sesan O.M.et al, (2013), Journal of Research in Counselling Psychology, vol.9, No. 1, 48-57
- [38] Opayemi and Akimbode. www.ResearchGate.net, vol.19, no.2 pp 131-142
- [39] Dawi and Vijay Purakala Journal. ISSN 0971-2143, vol.31, issue 25, May, 2020.
- [40] Dawi and Gwoma, International Journal of Advanced Research in Science and Engineering, vol 09, issue No. 08, August, 2020.