Relationship between combat video games addiction and aggressive behaviour among youth

Nunna Amulya

(17PHD013)

Thesis submitted to

Avinashilingam Institute for Home Science and Higher Education for Women,

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In Partial Fulfillment of the Requirements for the Degree of Master of Science in Human Development

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Signature of the Guide **Signature of Head of the Department**

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“Gratitude is not only greatest of virtues,

But the parent of all the others”

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I. INTRODUCTION

Youth is the time of life when one is young, and often means the time between childhood and adulthood. It is also defined as "the appearance, freshness, vigour, spirit, etc., characteristic of one who is young". The United Nations defines youth as persons between the ages of 15 and 24. Youth is best understood as a period of transition from the dependence of childhood to adulthood's independence.

Adolescence and young adulthood are a difficult period in one's life and youth struggle during the transition from childhood to adulthood (Darling.N.2005). Physical and emotional changes occur at a rapid pace and the need for acceptance gains importance in their life. Hormones take over, emotions run high and every teen has to learn to cope with the new change. They are also learning to get along with others and discovering their own. Learning to adapt these changes can create anger sometimes even aggression in some teenagers and young adults (Schafer, 2013).

Aggression is a form of behaviour characterized by physical or verbal attack. It may be directed outward against others or inward against the self, leading to self-destructive or suicidal actions. Kakar (1974) defines aggression as an attempt by an individual or group to inflict physical injury on another individual or group without the consideration of whether their attempt was intentional or whether it was successful. Berkowitz (1993) defined aggression as any form of behaviour that is intended to injure someone physically or psychologically. The dictionary meaning of aggression is hostile or violent behaviour or attitudes. It is a disorganized emotional response. Adolescence and young adult are considered as the most important transition period of life, as they face an intense turmoil because of the cognitive, biological and social changes taking place in this period. This is also the period of psychological transition from a child who has to live in a family to an adult who has to live in a society. Furthermore, adolescence is a period of heightened risk with high rates of conduct disorders and antisocial behaviour. In adolescence stage any of the interruption in desires and activities, constant fault finding, teasing, lecturing and making

unfavourable comparisons with other children will lead to aggression (Veeraraghvan 2006)

Aggression doesn't develop overnight, and is largely homebred. Experts describe aggression to a combination of factors- increasing exposure to violence through the media and the internet, lack of parental supervision, persistence tension and use of foul language at home, lack of communication between the child and parents, faulty parenting, performance pressure at school, growing substance abuse, increasing intake of junk food and sedentary life style (Broota,2008). During the formative years, that are two to 10 years of age, a child is very inquisitive. They want to use every new world they come across, want to imitate their role model and want to feel big. At this age, if parents are not there to answer their queries, chances of their falling prey to behavioural problems are high.

Parenting style also plays a great role in development of aggressive behaviour in adolescents. Parenting style is defined as the manner in which parents treat, communicate, discipline, monitor and support their children (Slicker and Thornberry 2003). When parents are warm, protective and supportive, children are unlikely to be over aroused and are better able to respond to parental efforts to focus their attention and guide their behaviour. This view is consistent with Vygotsky's (1978) view that cognitive skills are socially constructed through interactions with supportive and responsive adults. Parenting styles may also be linked to children's regulation and externalizing behaviour problems because of its effects on the quality of the parent-child relationship. Parental warmth & acceptance, positive expressivity and protection have been linked to a secure attachment (Contreras et al., 2000) and this security is believed to foster regulated behaviour, because child has greater psychological resources for dealing with negative emotions and events. In addition, children with more secure attachment are likely to be better at understanding others" emotions (Laible and Thompson 2002), all of which could result in greater emotional control of behaviour and lower levels of aggressive behaviour.

Violence in the family is another contributing factor in stimulation of aggressive behaviour in children. Family violence has existed in both Indian and Western families

(Bhatti and Beig 1985., Straus and Gelles 1986). Family violence can be defined as an act/ action performed by a family member to get the desired conformity from the other member/s and when it carries a negative emotional component. A loving home produces child who pass on these benefits to other person but if there is violence, tension and insecurity, home become a breeding ground for dangerous and destructive behaviour (Tondon 1988). Lessons children learn at home about violence are not lost to them but are extended to other social roles as well. A child who is punished severely for being aggressive at home tends to be more aggressive outside the home (Sharma et al., 2008). Extreme or inconsistent punishment encourages aggressive behaviour as much as any lack of discipline. Parental corporal punishment is associated with aggressive behaviour of children (Gershoff, 2002). Singh (2008) reported a link between family violence and aggressive behaviour of adolescents. Though a healthy and stable family is the most important social institution that can control the psychological or social factor which contribute to the violent behaviour among students.

Violence in entertainment media is also considered by many to be a major contributor to aggressive and violent behaviour in real life (Donnerstein and Smith 1997, Huesmann et al., 1997, Anderson and Bushman 2002, Sparks and Sparks 2002). As we have seen that the media industry is showcasing every violent story in the society. This is having a negative impact on children's Behaviour. They are not only learning new ways of anti-social behaviour but also have become aggressive not only in schools but also at home with their friends and relatives. The contribution of media cannot be look down upon because media has played a significant role in development of children. The trend of media in the past few years has actually played a reversal role in childhood development. Children are considered as the future leaders and service providers of a nation as they have the potential to learn new things and come up with innovative ideas. But when these young minds are exposed to violence, hatred, religious disparities, exposure to violent video games and access to the internet which comprises of millions evidence of aggression and violence they might eventually get more inspired in negative outcomes and might come up with evil

ideas for their benefits. This constant exposure to aggression not only hampers thinking and learning process but the personality development also.

Continuous exposure to violence, murder, torture in films dulls the human nature to abhor violence (Sinha 1994). Identification with television personalities especially for boys identification with a character substantially increases the likelihood that the character's aggressive behaviour will be modelled (Huesmann and Eron 1986). National Association for Education of Young Children, NAEYC (1990) quoted that children who are frequent viewers of media violence learn that aggression is a successful and acceptable way to achieve goals and solve problems, they are less likely to benefit from creative imaginative play as the natural means to express feelings, overcome anger and gain self-control. Behaviours like aggression can be learned by watching and imitating the behaviour of others. A considerable amount of evidence suggests that watching violence on television increases the likelihood of short-term aggression in children (Aronson et al., 2005). On TV, children likely to listen only those program that are exciting and entertaining. It is very sad that children see more movies that are made for adults. Watching all the violence develops anxiety, fright and tension among children. The image presented on TV and movies influence the attitude of children. Exposure to violence by daily viewing of violent television scenes resulted in increased antisocial behaviour. It is contended that new films and television shows that portray hostility, aggression and assault, may further raise the incidence of aggressive acts committed by those who are exposed to such extensions.

Family, the seat of social learning has been considered as an institution where children learn the process of socialization (Hurlock 1972). But school and peer group are also a major contributor of behaviour development of adolescents. A school is an institution providing education for young people up to the age of about 19 years. It is in this school setting where learners learn new behaviours. Social learning theories suggest that aggressive behaviour is learned and maintained through environmental experiences. Adolescents who are exposed to antisocial environment learn to participate in antisocial behaviour. Antisocial behaviour is not only related to family but also to school and society. The school exposes children to new behaviours which were

not acquired at home during the adolescent's childhood. Some of these behaviours may be positive or negative, depending on the school environment. Learning involves the modification of perception and behaviour, which also means that behavioural modifications occur in meeting, changed conditions so that obstacles are overcome. Teachers and peers play a dominant role in shaping these behaviours either positively or negatively. Every teacher is responsible directly to God for the welfare of each child placed in his care, so if he looks on silently while a child needing assistance is led to destruction as an adult, he is co-responsible and will have to answer for his actions before God (Nemangwele 1998).

Social learning theories suggest that aggressive behaviour is learned and maintained through environmental experiences. Adolescents who are exposed to antisocial environment learn to participate in antisocial behaviour. It is confirmed that the extent to which children are exposed to a number of different family risk factors cause children's aggressive behaviour. Children's aggression is viewed as a reaction to frustration in an attempt to reduce aversive stimuli. Antisocial behaviour is not only related to family, but also to school and society. The school and society expose children to new behaviours which were not acquired at home during the adolescent's childhood. Some of these behaviours may be positive or negative, depending on the environment. It has been highlighted that teachers' harsh discipline can contribute to aggressive behaviour. Adolescents television access to and use of media technology (e.g. Television and Internet etc.) are on the rise, and this explosion of technology brings with its potential benefits and risks.

Effect of Combat videogames

A combat game is a genre of video game in which a gamer battles against another character controlled by another gamer or the game's artificial intelligence. These games are a form of action game in which two on-screen characters engage in one-on-one combat. Fighting games frequently feature unarmed fighting, such as boxing or martial arts, but can also include fighting with weapons like swords or

guns. Players are given options to control the on-screen characters and engage in close combat with opponents.

Since the early 80's, the video games became an essential part of the entertainment industry that captured many people, mostly children and youth. According to Lee and LaRose "the video game has become one of the most popular and pervasive forms of entertainment". The community meets a new hobby ambiguously: despite the fact that the computers bring a lot of benefits to society, people began to realize that they have a negative impact on children, especially youth.

Nowadays, the problem of the negative effects of video games on young people's health and development is particularly relevant. Many parents cannot find time for their children because of the daily activities, fatigue, and other routine problems, and thus have a positive attitude to the video games, allowing children to play different video games on the computer.

Every year the ranks of gamers are increasing exponentially. More and more children are spent seated at a desk in front of a computer, playing their favourite computer games. The younger people or teenagers are addicted to the computer games, the less they pay attention to their families and friends.

Some researchers have found that the growing popularity of virtual entertainment contributes to a sharp drop in the quality of relationships and frequency of communication with parents and peers. Teenagers spend their free time not on the important social contacts, but on the computer hobbies, due to which the credibility of the family decreases and the children turn in on themselves.

Many parents began to notice that children, who played the video games, more often used the words: "I was killed," "I killed," etc. Many mothers begin to notice this fact after the kids played the "shooter game" on the computer. This is a proven fact that the main theme and purpose of the video games are to kill somebody or do other different aggressive actions. The computer industry is developing very rapidly, the video games are becoming more and more realistic, a murder of any game is done

realistically, dead people are falling, etc. The developers work on the physics of human behaviour, a virtual man walks, shoots, falls and dies like a real man.

All these actions only negatively affect young people's behaviour. Moreover, the violent video games can provoke young people to suicide. The player imagines himself the hero of his favourite games, and starts to grow into this role, confusing the real and virtual worlds. As a result, it leads to irreversible consequences for a gamer.

As a result, the combat games have negative impacts on young people's health and behaviour. The computer games that include murders, violence can lead to the mental disorders, poor health, sleep, loss of awareness of objective reality, etc. Over time they will be fascinated by different combat video games, becomes irritated, is removed from his/her peers and society as a whole. A young person who is addicted to the combat video games, has different problems, such as sleep problems, insomnia, worsening health status, declining eyesight, negative attitudes, rough behaviour towards others. They become irritable and always exhausted. He or she will try to produce the aggressive behaviour in real world also.

In addition, they lose a "contact with reality. "In instance, for them, the "virtual" world became an alternative to the "real" one and thus they lost any relationship with the community, the combat video game became the "drug" for them. In general, it should be noted that the combat games have more negative aspects than positive ones. Thus, in connection with these consequences, a lot of psychologists recommend for parents to limit access to the computer for their children or completely block that access.

Furthermore, a prolonged sit at the computer adversely affects a visual acuity. Myopia is being developed because of a constant stress of visual organs. In addition, there is a harmful radiation.

The video games which promote violence and brutality have a negative impact on health, especially on mental and emotional states. A computer game can provoke an attack of motiveless aggression, if the young people has some mental diseases.

In addition to the above-mentioned information, it is possible to add that the common features of computer game addiction are a huge number of psychological and physical symptoms that are closely linked: psychological symptoms: well-being or euphoria at the computer, increase in the amount of time spent at the computer, neglecting family and friends, feelings of emptiness, depression, anger, problems with work or school. Physical symptoms: carpal tunnel syndrome (the nerve trunks in the hands, associated with prolonged muscle tension), dry eyes, headaches according to the type of migraine, back pain, irregular meals, skipping meals, neglecting personal hygiene, sleep disturbances, changes in sleep patterns.

The main causes of video game addiction among adolescents and young adults:

- The lack of communication and warm emotional relationships between parents and children within family. When parents (or other close relatives) do not pay a proper attention to their children needed for a daily expression of a sincere participation in a child's life.
- The absence of serious hobbies, interests, attachments, not related to the computer.
- The inability to establish a desired contact with others, the lack of friends. Let's suppose that a child (teenager) is too shy and could not overcome his shyness. Or the presence of a visible physical disability, the external ugliness repels peers from communicating with him.
- The total bad lack of any child. This reason is similar to the previous one. For example, a child has bad grades at school, or has bad relations with parents. If this situation does not suit any child, he may well fall into computer game addiction, where he is a protagonist, he is on top of success, he is a winner, ruler, and the first destroyer (or creator).

Rationale of the study:

Young people started to become independent, they will spend their pent-up energy in the way of enjoying and exploring their independence which will make them to produce the aggressive behaviour sometimes. Nowadays youth are

more exposed to the video games that are violent in nature, which make them to behave aggressive. They want to be superior resulting unpleasant feelings or activities which will lead to aggression in terms of physical and verbal behaviour with an intention to harm other individuals. Display of aggressive behaviour now become a crucial concern and deserves a careful attention because young people may lose their right path and may detract themselves from mental and physical effectiveness.

The objectives of this study are:

Primary Objective(s):

- To find out the aggression level of the youth relating to their combat videogame addiction level.

Secondary Objective(s):

a) To assess the difference in aggression level based on age
b) To examine the gender differences in aggression level
c) To assess the influence of demographic variables like area of living, family income, Family type, parent's education, parent's occupation on the aggression level of youth.
d) To assess the difference in combat video game addiction level.
e) To examine the gender differences in combat video game addiction level.
f) To assess the influence of demographic variables like area of living, family income, Family type, parent's education, parent's occupation on the aggression level of youth.
g) To corelate the level of Aggression and addiction of combat video games.

Hypothesis:

The hypothesis proposed for the current research were as follows

- There is no significant difference in aggression level with reference to age.
- There is no significant difference in aggression level with reference to gender.
- There is no significant difference in aggression level with reference to area of living.
- There is no significant difference in addiction of combat videogames with reference to age.
- There is no significant difference in addiction of combat videogames with reference to gender.
- There is no significant difference in addiction of combat videogames with reference to area of living.
- There is no significant relation between aggression and addiction to combat videogames.

II. REVIEW OF LITERATURE

Review of literature is very important aspect of the research as it provides deep understanding of the variables being studied and also helps in proper planning of and executing the research. 'Review of related literature' consists of two words: Review and Literature. The term 'review' means to organize the knowledge of the specific area of research, to evolve an edifice of knowledge, to show that the proposed study would be an addition to this field. And the term 'literature' refers to the knowledge of a particular area of investigation of any discipline which includes theoretical, practical and its research studies. Human beings are such animals who can take advantage of the knowledge and findings of the previous generations as well as from the surroundings. Whatever has been done earlier may prove to be beneficial to the coming generations or the present generation. After having described the theoretical framework it will be desirable to review the empirical studies which have been conducted in India as well as abroad and have tried to identify the factors contributing to aggression, their relationship with self-esteem and family environment and discovering important variables. The purpose of this chapter is to review the available researches conducted in the past which are related to the topic being studied in the present research.

A literature pertaining to the research entitled, "Relationship between combat video games addiction and aggressive behaviour among youth" was classified and presented under subsequent headings.

A. Concept of youth
B. Definition of aggressive behaviour
C. Factors leading to aggressive behaviour
D. Impact of combat video game addiction
E. Effect of combat video games on aggression

A. Concept of youth

The United Nations defines youth as persons between the ages of 15 and 24.It is the time of life when one is young, and often means the time between childhood and adulthood. It is also defined as "the appearance, freshness, vigour, spirit, etc., characteristic of one who is young".

According to psychologists, youth may be viewed as a young person in transition between the behaviours, typical of children and the behaviour typical of adults; between a period of rapid development as an individual and a period in which the individual learns to make the adjustments to the needs of self, others and the community. It is the period in which the person moves out of the home circle and becomes physically and mentally independent **(Anderson et al., 2007).**

According to sociological interpretation of the word youth; it is a transitional period between childhood and adulthood. During childhood, the individual is completely dependent upon parents or other adults of the family for food, clothing, shelter and emotional support necessary for his survival and growth. During late adolescence, he is relatively self-sufficient and independent. Able to provide for most of his own needs and ready to establish himself away from the parental home **(Chauhan, 2007)**.

Stanley et al. (2006) define youth in terms of psychological changes occurring in adolescents. He begins this period from twelve or thirteen years of age and ends when full adult status is attained by twenty-two or twenty-five years of age. It is a period of storm and stress.

Youth is a distinctive stage in personality development precipitated by the significant changes in the biosocial status of the child **(Asubel, 2008)**. Youth is a critical period of human development manifested at the biological, psychological and social skills of interaction of variable on set and duration, but marking the end of childhood and setting the foundation for maturity **(Fisenberg, 2006)**. During youth the individual wants to be independent. Gradually he starts to control his desires according to the standards set by the society **(Stanley Hall, 2006)**.

B. Definition of aggressive behaviour

Aggression can be defined as ant behaviour that causes painful experience to another person **(Gendreau and Archer, 2005)** or as actions that are destructive to one's self, other people or belongings **(Connor et al., 2006)**.

Aggression is a dynamic and varied phenomenon due to the complexity of human behaviour **(Lewis, 2005)**. Human aggression can be defined as any behaviour directed towards another individual that is carried out with intent to cause harm. In addition, the aggressor must believe and expect that the behaviour will harm the victim, and the victim is motivated to avoid the aggressive act. Thus, aggression is not seen as an accidental event **(Geen, 2001)**.

Aggression has been defined from different aspects, such as being a result of a drive aiming to destroy life (psychoanalytical theories), as a learned reaction to frustrating events (psychological theories) **(Shaver and Mikulincer, 2011)**, as a behaviour based on biological functioning (Biological origins of aggression) **(Liu and Wuerker, 2005)** or as a shared drive to advance different functions (ethological theory) **(Lewis, 2005)**.

Aggressive behaviour can be examined on the basis of its consequences to others and self. Harm to other people or damage to property commonly reveal that an aggressive act has taken place. Harm may include physical harm, such as physical injuries in assault situations **(Viitasara, 2004)** or psychological harm, like emotional distress **(Inoue et al., 2006).**

Wood et al., (2002) found that "approximately half of the variance in sociometric and teacher ratings of peer rejection was accounted for by aggression and social withdrawal for boys and girls". Violent and bullying behaviours are specific types of aggressive behaviour that result in similar outcomes or functions of aggressive behaviour. These functions include power and control, affiliation, escape, gaining attention and self-gratification.

Social learning theory considers aggression primarily as a learned form of social behaviour adopted either as results of experience or by observing others, performed when rewarded, and maintained through positive reinforcement. Thus,

aggressive behaviour is acquired in the same manner as other forms of social behaviour. Persons perpetrate in assaults against others because they adopt aggressive responses due to past experience, or they receive or anticipate various forms of reward for carrying out such actions, or they are directly provoked to aggression by specific social or environmental conditions **(Bandura, 2001)**.

C. Factors leading to aggressive behaviour

Erin E Centeio et.al (2015) conducted a study on youth to find out their aggression levels. They found that there were significant associations between with age and aggression. Specifically, older students reported more aggression than younger students.

Khan et al. (2014) found that one third of school children had aggressive behaviour directly related to family size and family environment. Mostly nuclear families have aggression in children. The aggressive behaviour was more significant in single parents like widow /separated or divorced particularly among males.

Erin L. Romanchych (2014) studied that there was a significant gender difference in maternal-report of children's aggression, with significantly higher mean physical aggression scores for boys, as compared to girls.

Miklos Balazs Halmos (2012) conducted a study on youth. He found that age was not significantly correlated with the aggression level and Gender was correlated in that males reported higher aggression than females.

Nicole Danielle Waddell (2012) concluded that there was no relationshipfound between the amounts of affection the parents gave the respondent as a child or if they were beaten by their parents and the respondent having a tendency to hit others.

Boxer et al. (2009) have conducted a survey study entitled "The role of violent media preference in cumulative developmental risk for violence and general

aggression". In this study, they analyzed data on 820 youth, including 390 juvenile delinquents and 430 high school students, to examine the relation of violent media use to involvement in violence and general aggression. Using criterion scores developed through cross-informant modelling of data from self, parent/guardian, and teacher/staff reports, they observed that childhood and adolescent violent media preferences contributed significantly to the prediction of violence and general aggression from cumulative risk totals. Findings represent a new and important direction for research on the role of violent media use in the broader matrix of risk factors for youth violence.

Rupali sen Deka (2004) found that there is a significance difference in aggression among male and female adolescents, the male adolescents are more aggressive than female and there is no significant difference in aggression among adolescents from urban and rural area.

Khatri and Kupersmidt (2003) collected data from 229 fourth-, sixth-, eighth- and tenth-graders in a small semi-rural north western town in India. Gender differences were observed in that males were more likely to be aggressors than females.

Anderson (1997) has conducted two experimental studies entitled "Effects of violent movies and trait irritability on hostile feelings and aggressive thoughts". Experiment 1 explored the effects of viewing violent movie clips on affect and cognition. Participants who viewed a violent movie clip later reported higher levels of state hostility than did those who viewed a nonviolent clip. Experiment 2 added trait hostility to the design as a potentially important individual difference variable. The state hostility results of Experiment 1 were replicated. In addition, the relative accessibility of aggressive thoughts was increased by the violent clip, but only for low irritable participants. Discussion focused on the relevance to aggressive behaviour .design as a potentially important individual difference variable.

Paik and Comstock (1994) have conducted a Meta analytic study entitled ". The Effects of Television Violence on Antisocial Behavior: A Meta-Analysis". A metanalysis is performed on studies pertaining to the effect of television violence on

aggressive behaviour. Partitioning by research design, viewer attributes, treatment and exposure variables, and type of antisocial behaviour, allows one to interpret computed effect sizes for each of the variables in the partitions. They find a positive and significant correlation between television violence and aggressive behaviour, albeit to varying degrees depending on the particular research question. The effect of television violence on the antisocial behaviour of boys and girls is found to be marginally equal in surveys. A host of tests are performed to solidify these, and further results. Substantive interpretation is provided as well.

Arunima (1988) found that Male children were more aggressive than female children and the size of the family was also found to be conducive in making the children aggressive.

Fenigstein (1979) has conducted two experimental studies entitled “Does aggression cause a preference for viewing media violence?” The present research experimentally tested the hypotheses that physical aggression and fantasy aggression would lead to a preference for viewing violence. In Experiment 1, undergraduate men and women were induced to express aggressive, nonaggressive, or no fantasies and were then given an opportunity to select film clips for viewing. The films chosen by men contained more violence than those chosen by women. In addition, aggressive fantasies in males, compared to nonaggressive fantasies, increased the preference for viewing violence. Experiment 2, using only males, replicated the results of the first study and also found that men who were given an opportunity to aggress physically, compared to those who had no such opportunity, were more likely to choose to view films containing violent content. These results provide an additional perspective on the relationship between the observation of violence and the expression of aggression by suggesting that the causal effects are bidirectional: Just as the viewing of violence may increase aggression, so, too, aggressive behaviour may increase the preference for viewing violence.

Hapkiewicz and Stone (1974) have conducted an experimental study entitled “The Effect of Realistic versus Imaginary Aggressive Models of Children's Interpersonal Play”. One hundred eighty elementary school children were randomly

assigned to same sex pairs and randomly assigned to one of three treatment groups: real-life aggressive film, aggressive cartoon, or nonaggressive film. Results reveal that boys who viewed the realistic aggressive film were significantly more aggressive in play than boys who viewed the other films.

D. Impact of combat video game addiction

Desai et al. (2010) have conducted a survey study entitled “Video-gaming among high school students: Health correlates, gender differences, and problematic gaming”. This study anonymously surveyed 4028 adolescents about gaming and reported problems with gaming and other health behaviours. A total of 51.2percent of the sample reported gaming (76.3percent of boys and 29.2percent of girls).Result have shown no negative health correlates of gaming in boys and lower odds of smoking regularly; however, girls who reported gaming were less likely to report depression and more likely to report getting into serious fights and carrying a weapon to school. Among gamers, 4.9percent reported problematic gaming, defined as reporting trying to cut back, experiencing an irresistible urge to play, and experiencing a growing tension that could only be relieved by playing. Boys were more likely to report these problems(5.8percent) than girls (3.0percent). Correlates of problematic gaming included regular cigarette smoking, drug use, depression, and serious fights. Results suggest that gaming is largely normative in boys and not associated with many health factors. In girls, however, gaming seems to be associated with more externalizing behaviours and fewer internalizing symptoms.

Skoric et al. (2009) have conducted a survey study entitled “Children and Video Games: Addiction, Engagement, and Scholastic Achievement”. The aim of this study was to assess the relationship between video gaming habits and elementary school students' academic performance. Three hundred thirty-three children ages 8 to 12 years from two primary schools in Singapore were selected to participate in this study. A survey utilizing Danforth's Engagement-Addiction (II) scale and questions from DSM-IV was used to collect information from the schoolchildren, while their grades were obtained directly from their teachers. The findings indicate that addiction

tendencies are consistently negatively related to scholastic performance, while no such relationship is found for either time spent playing games or for video game engagement. The implications of these findings are discussed.

Olson et al. (2009) have conducted a survey study entitled “M-rated video games and aggressive or problem behaviour among young adolescents”. This research examined the potential relationship between adolescent problem behaviours and amount of time spent with violent electronic games. Survey data were collected from 1,254 7th and 8th grade students in two states. A “dose” of exposure to Mature-rated games was calculated using Entertainment Software Rating Board ratings of titles children reported playing “a lot in the past six months,” and average days per week of video game play. M-rated game dose predicted greater risk for bullying ($p < .01$) and physical fights ($p < .001$), but not for delinquent behaviours or being a victim of bullies. When analyzed separately, these associations became weaker for boys and stronger for girls.

Sheese and Graziano (2005) have conducted an experimental study entitled “Research reports: deciding to defect the effects of video-game violence on cooperative behaviour”. This experiment examined the effect of video-game violence on cooperative decision making. Participants (N= 48) were randomly assigned to play either a violent or a nonviolent version of the video game Doom in dyads. Following the videogame task, participants were separated and given an opportunity to choose to cooperate with their partner for mutual gain, withdraw from the interaction, or exploit their partner for their own benefit. Participants in the violent condition were significantly more likely to choose to exploit their partners than participants in the nonviolent condition. These findings suggest that playing violent video games may undermine prosocial motivation and promote exploitive behaviour in social interactions.

Griffiths et al. (2004) have conducted a survey study entitled “Online computer gaming: a comparison of adolescent and adult gamers”. Therefore, an online questionnaire survey was used to examine various factors of online computer game players (n = 540) who played the most popular online game Everquest. Results

showed that in relation to favourite aspects of game play, the biggest difference between the groups was that significantly more adolescents than adults claimed their favourite aspect of playing was violence. Results also showed that in general, the younger the player, the longer they spent each week playing.

Griffiths et al. (2004) have conducted an online survey entitled “Demographic Factors and Playing Variables in Online Computer Gaming”. An online questionnaire survey was used to examine basic demographic factors of online computer game players who played the popular combat online game Everquest (i.e., gender, age, marital status, nationality, education level, occupation). The survey also examined playing frequency (i.e., amount of time spent playing the game a week), playing history (i.e., how long they had been playing the game, who they played the game with, whether they had ever gender swapped their game character), the favourite and least favourite aspects of playing the game, and what they sacrifice (if anything) to play the game. Results showed that 81percent of game players were male, and that the mean age of players was 27.9 years of age. For many players, the social aspects of the game were the most important factor in playing. A small minority of players appear to play excessively (over 80 h a week), and results suggest that a small minority sacrifice important activities in order to play (e.g., sleep, time with family and/or partner, work, or schooling).

Funk et al. (2003) have conducted a survey study entitled “Playing violent video games, desensitization, and moral evaluation in children”. Children between the ages of 5 and 12 answered questionnaires about their experiences with and preferences for video games and about their attitudes toward violence. Next, one group of children played a nonviolent video game, and one group played a violent video game. All children responded to short stories about everyday occurrences, and their responses were coded for empathy and aggression. Although playing the violent versus nonviolent video game before responding did not seem to affect children's empathy, those who had long-term experience with video games were less empathetic than those who did not have much experience with video games before the study.

Funk (1993) has conducted a survey study entitled “Re-evaluating the impact of video games”. A survey assessing frequency and location of play and game preference was completed by 357 seventh- and eighth-grade students. Results showed that Approximately half of preferred games were from one of two categories of violent games, while 2percent of preferred games were educational.

E. Effect of combat video games on aggression

Lemmens et al. (2011) have conducted a survey study entitled “The effects of pathological gaming on aggressive behaviour”. Studies have shown that pathological involvement with computer or video games is related to excessive gaming binges and aggressive behaviour. Furthermore, higher levels of pathological gaming, regardless of violent content, predicted an increase in physical aggression among boys. That this effect only applies to boys does not diminish its importance, because adolescent boys are generally the heaviest players of violent games and most susceptible to pathological involvement.

Assocham's social development foundation (2011) have conducted a survey study entitled “too much gaming makes kids obese, aggressive, violent: survey” .in a survey more than 2,000 teenagers and 1,000 parents’ were conducted in the major cities of Delhi-Ncr, Mumbai, Chandigarh, Lucknow, Ahmedabad, Patna, Kolkata, Chennai, Bengaluru and Jaipur. The sample included almost an equal number of males and females in the age group of 8-18 years. Result has shown over 82percent playing video games around 14-16 hours a week. In about 7percent qualified as being pathological video games, those playing more than 20 hours a week. About 84percent (ages 8 to 18) of children said that they play violence games when they're alone than with their parents. 76percent prefer to play action game. 45percent of gamers who shows signs similar to addiction are also more likely to have a video game system in their bedroom. A total of 1200 teens (76percent) played video games. Most of these (800 [80percent]) are boys and 400 (20percent) are girls. Male gamers spend an average of 50 minutes playing on the weekdays and two-three hours

playing on the weekends. The survey also disclosed that more than 90percent of kids between 8-14 years old are getting online to game, Facebook as one of their favourite websites. The social networking games are probably a big part of their gaming habits.

Allahverdipour et al. (2010) have conducted a survey study entitled “Correlates of video games playing among adolescents in an Islamic country”. The cross-sectional study was performed with a random sample of 444 adolescents recruited from eight middle schools. A self-administered, anonymous questionnaire covered socio demographics, video gaming behaviours, mental health status, self-reported aggressive behaviours, and perceived side effects of video game playing. Overall, participants spent an average of 6.3 hours per week playing video games. Moreover, 47percent of participants reported that they had played one or more intensely violent games. Participants' self-reported aggressive behaviours were associated with length of gaming. Boys, but not girls, who reported playing video games excessively showed more aggressive behaviours. Result have shown a curvilinear relationship between video game playing and mental health outcomes, with "moderate" gamers faring best and "excessive" gamers showing mild increases in problematic behaviours. Interestingly, "non-gamers" clearly show the worst outcomes.

Moller and Krahe (2009) have conducted an experimental study entitled “Exposure to violent video games and aggression in German adolescents: a longitudinal analysis”. In this study the relationship between exposure to violent electronic games and aggressive cognitions and behaviour was examined in a longitudinal method. A total of 295 German adolescents completed the measures of violent video game usage, endorsement of aggressive norms, hostile attribution bias, and physical as well as indirect/relational aggression cross-sectionally, and a subsample of N=143 was measured again 30 months later. Cross-sectional results showed Exposure to violent games at T1 influenced physical (but not indirect/relational) aggression at T2 via an increase of aggressive norms and hostile attribution bias. The findings are discussed in relation to social-cognitive explanations of long-term effects of media violence on aggression.

Polman et al. (2008) have conducted an experimental study entitled "experimental study of the differential effects of playing versus watching violent video games on children's aggressive behaviour". This experimental study was aimed at investigating the differential effects of actively playing vs. passively watching the same violent video game on subsequent aggressive behaviour. Fifty-seven children aged 10-13 either played a violent video game (active violent condition), watched the same violent video game (passive violent condition), or played a non-violent video game (active nonviolent condition). Aggression was measured through peer nominations of real-life aggressive incidents during a free play session at school. After the active participation of actually playing the violent video game, boys behaved more aggressively than did the boys in the passive game condition. For girls, game condition was not related to aggression. These findings indicate that, specifically for boys, playing a violent video game should lead to more aggression than watching television violence.

Gentile and Gentile (2008) have conducted a survey study entitled "Violent Video Games as Exemplary Teachers". Samples were 430 elementary school children (mean age 10 years), 607 young adolescents (mean age 14 years), and 1,441 older adolescents (mean age 19 years). Participants were surveyed about their video game habits and their aggressive cognitions and behaviours. They found students who play multiple violent video games should be more likely to learn aggressive cognitions and behaviours than those who play fewer and students who play violent video games more frequently across time should be more likely to learn aggressive cognitions and behaviours than those who play the same types of games for equivalent amounts of time but less frequently.

Giumetti and Markey (2007) have conducted an experimental study entitled "Violent video games and anger as predictors of aggression". A total of 167 undergraduate students (79 females, 88 males) first completed a measure of anger and were then randomly assigned to play either a non-violent or violent game. After the video game play period, participants completed ambiguous story storms in order to assess aggression. consistent with predictions of the GAM; anger significantly

moderated the effect of video game violence on aggression. Specifically, participants who were angry were more affected by violent video games those participants who were not angry.

Guo et al. (2007) have conducted a survey study entitled “Review of the effect of violent video games on children and adolescents”. According to result the take a conclusion that Exposure to violent video games increases aggressive behaviour, emotional & physiological arousal, and decreases helping behaviour. A positive intervention from parents can decrease negative effects of violent video games.

Konijn et al. (2007) have conducted an experimental study entitled “I wish I were a warrior: The role of wishful identification in the effects of violent video games on aggression in adolescent boys”. This study tested the hypothesis that violent video games are especially likely to increase aggression when players identify with violent game characters. Dutch adolescent boys with low education ability (N=112) were randomly assigned to play a realistic or fantasy violent or nonviolent video game. As expected, the most aggressive participants were those who played a violent game and wished they were like a violent character in the game. These results show that identifying with violent video game characters makes players more aggressive. Players were especially likely to identify with violent characters in realistic games and with games they felt immersed in.

Lemmens et al. (2006) have conducted a survey study entitled “The appeal of violent video games to lower educated aggressive adolescent boys from two countries. The objective of this study was to test the effect of individual differences on appeal and use of video games. Participants were 299 adolescent boys from lower and higher secondary schools in the Netherlands and Belgium. Boys that scored higher in trait aggressiveness and lower in empathy were especially attracted to violent games and spent more time playing video games than did boys lower in trait aggressiveness. Lower educated boys showed more appreciation for both violent and nonviolent games and spent more time playing them than did higher educated boys. The present study showed that aggressive and less empathic boys were most

attracted to violent games. The fact that heavy users of violent games show less empathy and higher aggressiveness suggests the possibility of desensitization.

Bartholow et al. (2005) have conducted an experimental study entitled "Correlates and Consequences of Exposure to Video Game Violence: Hostile Personality, Empathy, and Aggressive Behavior". This correlational study shows that video game violence exposure (VVE) is positively correlated with self-reports of aggressive behaviour and that this relation is robust to controlling for multiple aspects of personality. A lab experiment showed that individuals low in VVE behave more aggressively after playing a violent video game than after a nonviolent game but that those high in VVE display relatively high levels of aggression regardless of game content. Mediational analyses show that trait hostility, empathy, and hostile perceptions partially account for the VVE effect on aggression. These findings suggest that repeated exposure to video game violence increases aggressive behaviour in part via changes in cognitive and personality factors associated with desensitization.

Carnagey and Anderson (2005) have conducted an experimental study entitled "The effects of reward and punishment in violent video games on aggressive affect, cognition, and behaviour". Three experiments examined the effects of rewarding and punishing violent actions in video games on later aggression-related variables. Participants played one of three versions of the same race-car video game: (a) a version in which all violence was rewarded, (b) a version in which all violence was punished, and (c) a nonviolent version. Participants were then measured for aggressive affect (Experiment 1), aggressive cognition (Experiment 2), and aggressive behaviour (Experiment 3). Rewarding violent game actions increased hostile emotion, aggressive thinking, and aggressive behaviour. Punishing violent actions increased hostile emotion, but did not increase aggressive thinking or aggressive behaviour. Results suggest that games that reward violent actions can increase aggressive behaviour by increasing aggressive thinking.

Uhlmann and Swanson (2004) have conducted an experimental study entitled "Exposure to violent video games increases automatic aggressiveness". The

effects of exposure to violent video games on automatic associations with the self were investigated in a sample of 121 students. Playing the violent video games led participants to associate themselves with aggressive traits and actions on the implicit association test. Results suggest that playing violent video games can led to the automatic learning of aggressive self-view.

Gentile et al. (2004) have conducted a survey study entitled “The effects of violent video game habits on adolescent hostility, aggressive behaviours, and school performance”. The first goal of this study was to document the video games habits of adolescents and the level of parental monitoring of adolescent video game use. The second goal was to examine associations among violent video game exposure, hostility, arguments with teachers, school grades, and physical fights. In addition, path analyses were conducted to test mediational pathways from video game habits to outcomes. Six hundred and seven 8th- and 9th-grade students from four schools participated. Adolescents who expose themselves to greater amounts of video game violence were more hostile, reported getting into arguments with teachers more frequently, were more likely to be involved in physical fights, and performed more poorly in school.

Deselms and Altman (2003) have conducted an experimental study entitled “Immediate and Prolonged Effects of Videogame Violence”. This study examined the relationship between playing violent videogames and sensitivity to aggressive acts. In 2 experiments, college students were randomly assigned to play violent or less violent videogames. They then read a series of criminal vignettes and assigned prison sentences to violent criminals. In the second experiment, participants returned 1 hr later and completed a second series of vignettes. A significant interaction between gender and videogame was found in both experiments. Men who played the violent game gave more lenient sentences to criminals than did those who played the less violent game. In the second experiment, women, unlike men, assigned harsher sentences after playing the violent game. The effects were found to persist for at least 1 hour.

Bartholow and Anderson (2002) have conducted an experimental study entitled “Effects of violent video games on aggressive behaviour: Potential sex differences”. Evidence of the effects of playing violent video games on subsequent aggression has been mixed. This study examined how playing a violent video game affected levels of aggression displayed in a laboratory. Forty-three undergraduate students (22 men, 21 women) were randomly assigned to play either a violent (‘Mortal Kombat’) or nonviolent (‘PGA Tournament Golf’) video game for 10 minutes. Then they competed with a confederate in a reaction time task that allowed for provocation and retaliation. Punishment levels set by participants for their opponents served as the measure of aggression. The results confirmed our hypothesis that playing the violent game would result in more aggression than playing the nonviolent game. In addition, a Game x Sex interaction showed that this effect was larger for men than for women. Findings are discussed in light of potential differences in aggressive style between men and women.

Anderson and Bushman (2001) have conducted a meta-analytic study entitled “Effects of Violent Video Games on Aggressive Behaviour, Aggressive Cognition, Aggressive Affect, Physiological Arousal, and Pro social Behaviour” to investigate whether playing violent video games will increase aggressive behaviour. A meta-analytic review of the video game research literature reveals that violent video games increase aggressive behaviour in children and young adults. Experimental and non-experimental studies with males and females in laboratory and field settings support this conclusion. Analyses also reveal that exposure to violent video games increases physiological arousal and aggression-related thoughts and feelings. Playing violent video games also decreases pro social behaviour.

Lynch et al. (2001) have conducted a survey study entitled “effects of violent video game habits on adolescent aggressive attitudes and behaviours”. The study included 607 pupils with an average age of 14. Participants were given three questionnaires: a computer-game habits survey, a hostile attribution survey and a hostility survey. The study ascertained that the boys played more than the girls and

preferred more violent content. It also showed that the participants reported an increased interest in violent content in computer games. In addition, the study measured other media use and ascertained that there was an overall correlation between the use of computer media and hostility to the outside world. The study also found that students who played more than others for several years, or who bought computer games, had more often been involved in physical fights. Finally, it was ascertained that those who played or preferred computer games with violent content had a more hostile perception of their surroundings than others.

Anderson and Dill (2000) have conducted two different experimental studies entitled “Video Games and Aggressive Thoughts, Feelings, and Behavior in the Laboratory and in Life”. They used different methods to illustrate the question of aggression and violent computer games. Study 1 had 227 participants, all psychology students, with a clear preponderance of women and an average age of 19. They took part to gain course credits and were given the choice of participating in the study or writing an essay for a corresponding number of credits. The participants completed questionnaires about aggressive behaviour, crime and their grades. Use of computer games was quantified by participants describing their favourite games, how long they played them and how long they generally played computer games. Overall, Study 1 concluded that use of lifelike, violent computer games was closely correlated with aggressive behaviour and crime. The correlation was especially strong for men and individuals with aggressive personalities. Academic performance was also adversely affected by general playing time. Study 2, had 210 participants, all psychology students with the same motivation to take part as those in the first study. The aim was to look at the correlation between violent computer games and aggressive thoughts, emotions, behaviour and perceptions, by exposing the participants to two different games: Myst and Wolfenstein 3D. The strength of a sound that participants emitted towards their opponents was also measured. The study found that violent games underpin aggressive thoughts and that men are most aggressive. Those who played Wolfenstein 3D emitted a significantly longer sound after losing than did those who played the non-violent game, Myst. According to the study, this supports the

conclusion that players of violent computer games exhibit more violent behaviour in the real world.

Irwin and Gross (1995) have conducted an experimental study entitled "Cognitive Tempo, Violent Video Games, and Aggressive Behaviour in Young Boys". In a factorial design, impulsive and reflective children played video games with aggressive or nonaggressive themes. Interpersonal aggression and aggression toward inanimate objects were assessed in a free-play setting and interpersonal aggression was assessed during a frustrating situation. Results indicated that subjects who played the video game with aggressive content exhibited significantly more object aggression during free-play and more interpersonal aggression during the frustrating situation than youngsters who played nonaggressive video games.

III. METHODOLOGY

Research is careful investigation or inquiry especially a search for new fact in any branch of knowledge and is important part of any scientific study. The main aim of the research is to find out the truth hidden. Methodology is the systematic, theoretical analysis of the methods applied to a field of study. It comprises the theoretical analysis of the body of methods and principles associated with a branch of knowledge.

The methodology adopted for **"Relationship between combat video games addiction and aggressive behaviour among youth "**, consisted of following steps:

A. Selection of the Area

B. Selection of the Sample

C. Selection of the Tools

D. Administration of the scale

E. Conduct of the Study

F. Statically analysis and interpretation

A. SELECTION OF THE AREA

Aggressive behaviour increases significantly during mid-adolescence, peaks in late adolescence, and decreases rapidly beginning in early adulthood (Farrington, 2007). Transient aggressive behaviour occurs during adolescence and only a minority (about 10%) of a population does not engage in delinquent behaviour at all during adolescence (Piquero et al., 2005).

The study has focused on the aggressive behaviour among youth in the age group of 15 to 24 years, the aggression level and its relation to playing combat video games.

Students of “Government college of Technology “of Coimbatore district were selected to conduct the present study.

B. SELECTION OF THE SAMPLE:

The term sampling means the selection of a part of group or an entirely with the sole aim of collecting complete information is used to determine the feature of the entire population, is known as a Sampling.

A finite part of a population or a subset of a set of sampling units, selected by some process usually by deliberate selection with the object of investigating the Properties of the parent population or set is called a sample.

The sample was selected randomly and sampling method where a statistical population of the subset has equal probability of being chosen. All the students have an equal and independent chance of being selected.

For the conduct of the current study 120 youth were selected from the age group of 15-24 years.

Ethical clearance

As a matter of the ethics the youth population was informed about the research through a simple written consent form. The sample was thus allowed to make a voluntary choice to participate in the study. The application form explaining the design and the protocols used in the research study was also subjected to Institutional Human Ethical Committees (IHEC) and was approved for the same with the approval number- AUW /IHEC/HD-18-19/XPD/15.

C. SELECTION OF TOOLS

Investigator selected questionnaire as a tool for her study. 'Questionnaire' is a research instrument consisting of a list of questions that a number of people are asked so that information can be collected about something. Most often this method of data collection is used to gain statistical data that can serve as the basis for scientific research.

1. Demographic information questionnaire: a questionnaire was constructed to elicit adequate information on general and personal profile of the selected young girls and boys with special reference to their age. education, area of origin, etc.

2. Aggression scale questionnaire: The tool used for conducting the study was the standardized tool. "Aggression scale" developed by Dr.R.L. Bharadwaj was used to conduct this study. This questionnaire tells about the aggression level of the young people.

3. Addiction of combat video games:

This is a self-made questionnaire which tells about young people's addiction of combat video games. The questionnaire was developed by referring related materials such as books, journals, internet, and consultation with experts and distributed to the experts and addition were made and thus finalized.

D. ADMINISTRATION OF THE SCALE:

Simple and clear instructions are printed for the examinee on the cover page of the test booklet. Although the test can be virtually self -administering. it is always important to establish good 'rapport' with the examinees, whether tested individually or in groups.

Further it is good to reinforce the instructions by orally reiterating that the examiner will, in the long run be doing themselves most good by being frank and honest in describing themselves.

Detailed instruction:

- Please read carefully as every statement is related to your expressed behaviour.
- Please answer each and everything with utmost honesty
- There are five alternatives before each and every statement. Please tick which ever alternative resembles your behaviour.
- All information given by you shall remain confidential.

Principle and mechanics of scoring:

Before starting the scoring, procedure answer sheet should be checked that the subject has answered all the questions on the answer sheet. The scoring of aggression scale is very easy and of quantitative nature. The scale can be scored easily with reference to the scores obtained for each item separately. Each item has five alternative answers and subject has only to put a right mark at any one out of the five alternatives. Scoring of these five alternatives follow a system of 5,4,3,2 and 1 from upper to lower end. The addition of all the scores obtained on each item would be the total of aggression score of the subject.

Scores:

70 and above	Very high or saturated
60 – 69	High
40 – 59	Average
30 – 39	Low
5 – 29	Very low

The scoring of addiction of combat video games questionnaire is also very easy and of quantitative nature. This is a five-point scale consists of 15 questions and scoring will be 5, 4, 3, 2, and 1.

Scores:

15 – 35	Low
36 – 55	Moderate
56 – 75	High

E. CONDUCT OF THE STUDY

The study was conducted in phases with the prime objective of assessing aggression levels of selected youth. The phases of study are: -

Phase 1 – Rapport establishment:

Rapport with subject is an important venture of the study. So, to get along with the sample to ensure full cooperation to carry out the study. Subsequent to establishing rapport with the student, they were oriented about the study.

Phase 2 – Collection of data:

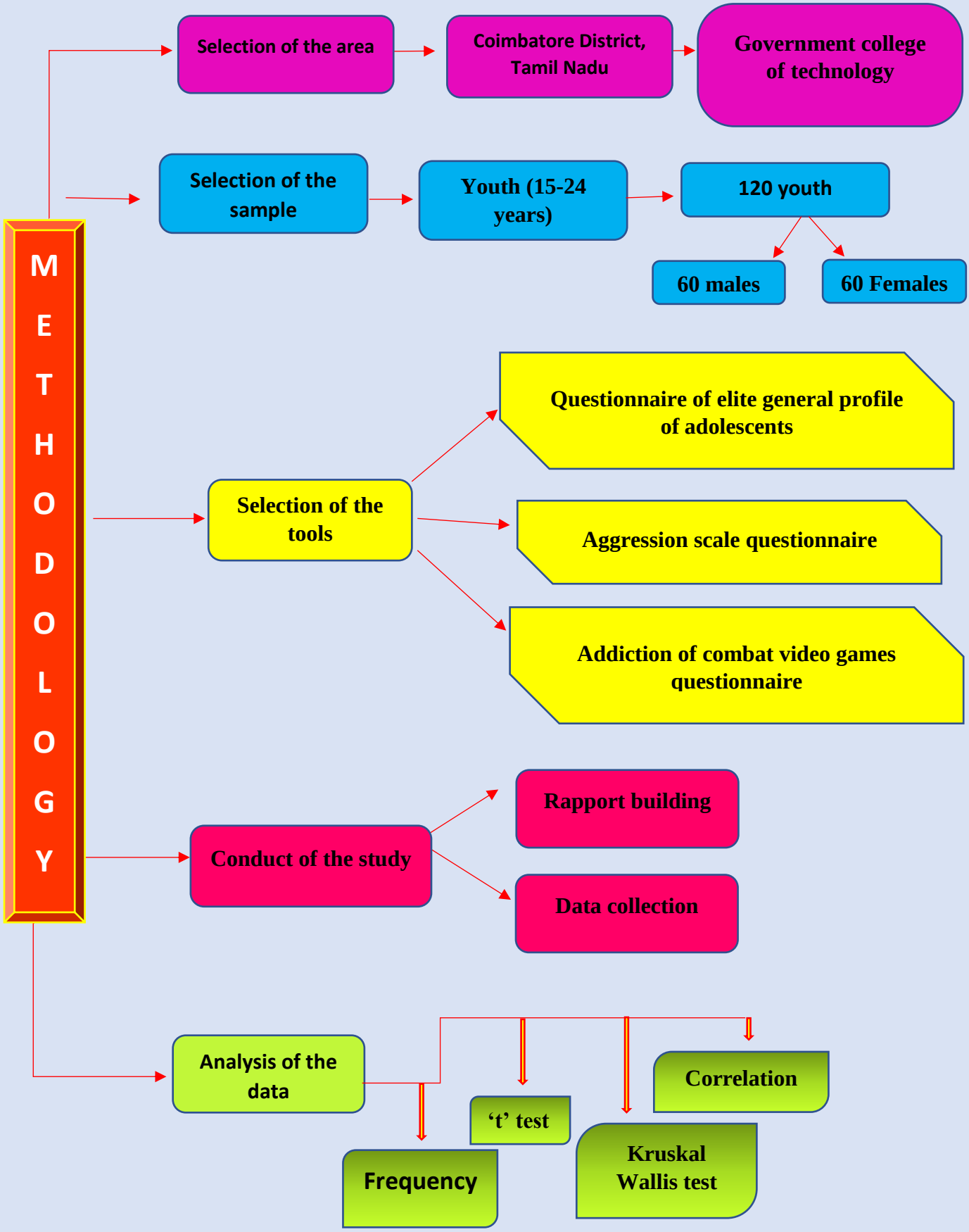
The investigation collected from respondents which included their personal profile through the self-constructed interview schedule. Aggression scale questionnaire was administered to the identified respondents. They were able to fill it up in 15 minutes. However, the investigator clarified their doubts in filling up tools.

F. STATISTICAL ANALYSIS AND INTERPRETATION:

According to Jain (2000) the purpose of table is to simplify the presentation of data for feasible comparison. After collection the data, the consolidations are to be taken up.

The data thus collected were checked for its ambiguity and were consolidated and tabulated. After the transcription of data is over, they were summarized and arranged in compact form for further analysis.

METHODOLOGY AT A GLANCE



IV.RESULTS AND DISCUSSION

The results obtained on analysis of data of the present study on "**Relationship between combat videogames addiction and aggressive behaviour among youth"** are presented as below.

The study examined the level of aggressive behaviour of youth related to their combat video games addiction. The data collected through the random sampling from the **Government College of Technology, Coimbatore** were entered, consolidated, tabulated and analyzed statistically using SPSS software for windows and discussed under the following headings.

A. General profile of the selected respondents
B. Aggressive behaviour among Youth
C. Combat video games addiction among Youth
D. Interrelationship between aggressive behaviour and addiction of combat video games among youth

A. General profile of the selected respondents

Collecting and analysing the background information of the selected respondents is an important task in every research. General information of the respondents comprises their age, gender and area of residence which is categorised and findings were discussed under the following subhead.

i) Background information of the selected respondents

The background information of the selected paves the base of any effective study. Following table represents the background information of the respondents including age, gender, living area and family type.

Table 1.

Background information of the selected respondents

S.NO	Variables	Categories	N	%
1	Age	15-19 years	60	50
		20-24 years	60	50
		Total	120	100
2	Gender	Male	60	50
		Female	60	50
		Total	120	100
3	Living Area	Urban	69	57.6
		Rural	26	21.6
		Semi Urban	25	20.8
		Total	120	100
4	Family type	Nuclear	105	87.5
		Joint	15	12.5
		Total	120	100

Table no.1 shows the background information of the selected respondents. As can be seen from the above data the age compositions of the selected respondents were distributed as 15-19 years youth and 20-24 years youth. They are equally represented in the selected sample.

Glancing to the given data for gender male and female were equally represented in the selected sample. That is 50% in each category.

Tracing the area of living more than half of the respondent's 57.5 percent were residing in urban area, 21.6 percent in rural area and 20.8 percent each were found from semi urban area.

Glancing at the given data for family types it's found that majority of the respondents i.e. 87.5 percent were from the nuclear family whereas 12.5 percent were belonged to the joint family.

B. Aggressive behaviour among Youth

Aggressive behaviour increases significantly during mid-adolescence, peaks in late adolescence and decreases rapidly beginning in early adulthood.

i) Aggressive behaviour among youth
ii) Association of age and gender on aggressive behaviour
iii) Association of living area and aggressive behaviour

i) Aggressive behaviour among youth

The table figure below represents the level of aggressive behaviour among youth.

Table no-2

Aggressive behaviour among youth

S.NO	Variable	Particular	N	%
1.	Aggression scale scores	Very low	0	0
		Low	0	0
		Average	6	5.0
		High	21	17.5
		Very high	93	77.5
	Total		120	100.0

Table no.2 shows the aggressive behaviour among youth. In total 120 members 6 members representing 5% of the samples are in average score. This indicates that they have average level of aggression. 21 members representing 17.5% of the samples are in High score. This indicates that they have High level of aggression. 93 members representing 77.5% of the samples are in very high score. This indicates that they have very high level of aggression.

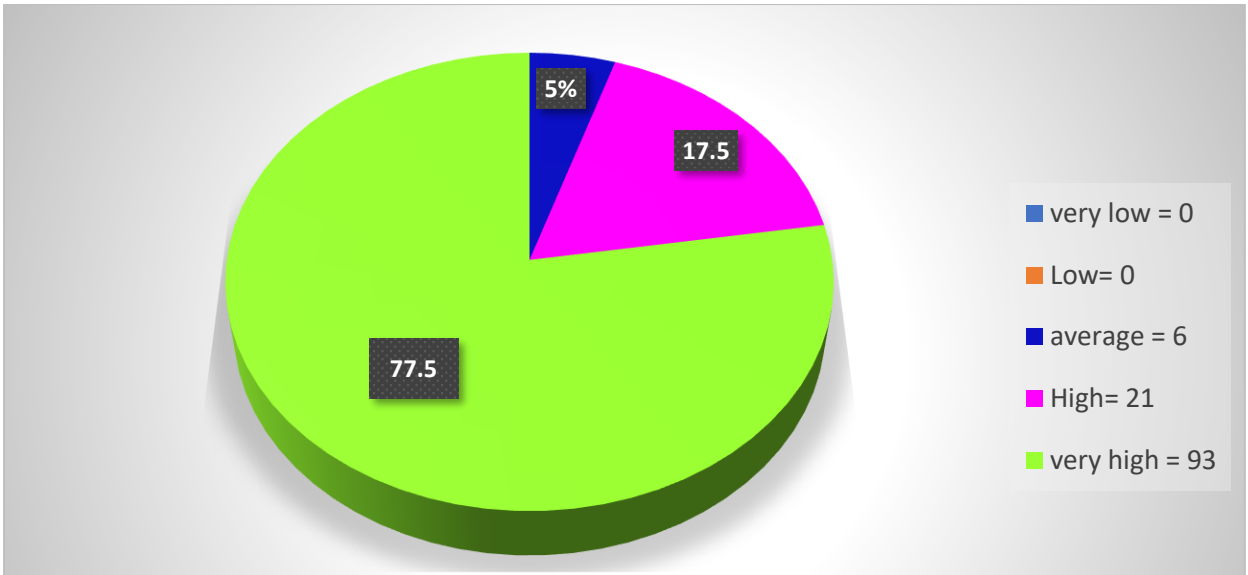


Figure-1
Aggressive behavior among youth

ii) Association of age and gender on aggressive behaviour

This table below represents the age and gender influence on aggressive behaviour.

Table no-3

Association of age and gender on aggressive behaviour

S.NO	Variable	Age	N	Mean	SD	df	t Value	Sig. Value
1.	Age	15-19	60	83.22	14.743	118	4.035	.000**
		20-24	60	73.77	10.572			
2.	Gender	Male	60	81.48	15.545	118	2.455	.016**
		Female	60	75.50	10.710			

**. Significant at 1% level *. Significant at 5% level NS: Not Significant

The mean score of the 15-19- and 20-24-years youth at is 83.22 and 73.77 respectively, which shows that 15-19 years have higher aggression level than 20-24

years youth. The ‘t’ value shows that age have significance influence on the aggressive behaviour.

The mean score of the males and females at is 81.48 and 75.50 respectively, which shows that males have higher aggression level than females. The ‘t’ value shows that gender have significance influence on the aggressive behaviour.

Hence the state hypothesis “There is no significant difference in aggression level with reference to age” and “There is no significant difference in aggression level with reference to gender” are here by rejected.

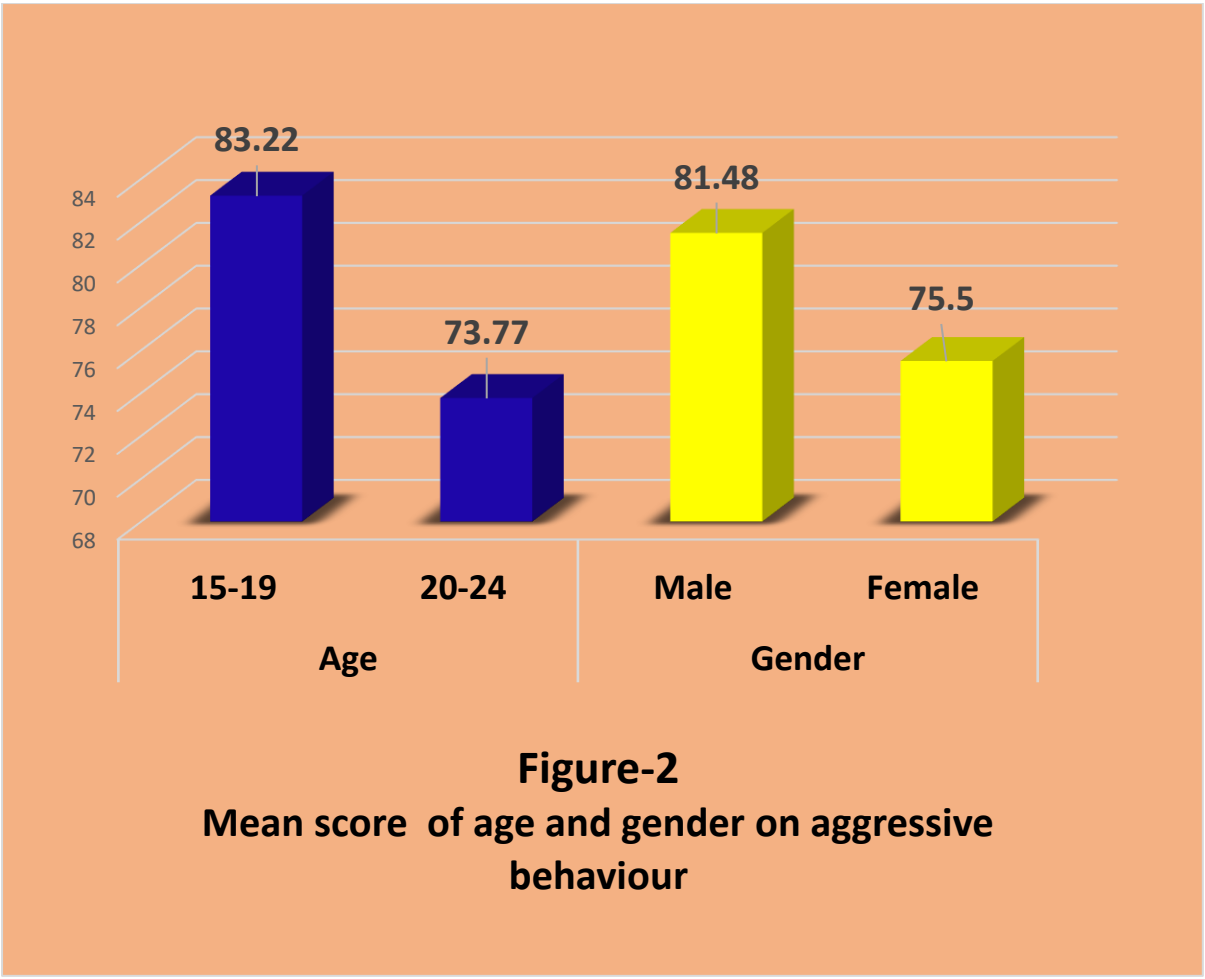


Figure-2
Mean score of age and gender on aggressive behaviour

This study is supported by

Erin L. Romanchych (2014) studied that there was a significant gender difference in maternal-report of children's aggression, with significantly higher mean physical aggression scores for boys, as compared to girls.

Miklos Balazs Halmos (2012) conducted a study on youth. He found that age was not significantly correlated with the aggression level and Gender was correlated in that males reported higher aggression than females.

Khatri and Kupersmidt (2003) collected data from 229 fourth-, sixth-, eighth-, and tenth-graders in a small semi-rural north western town in India. Gender differences were observed in that males were more likely to be aggressors than females.

Arunima (1988) found that Male children were more aggressive than female children and the size of the family was also found to be conducive in making the children aggressive.

iii) Association of living area and aggressive behaviour

This table shows the area of living influence on aggressive behaviour of youth,

Table no-4

Association of living area and aggressive behaviour

S.NO	Living area	N	Mean rank	df	Chi square	Sig. Value
1.	Urban	69	59.92	2	.203	.903^{NS}
2.	Rural	26	59.38			
3.	Semi-urban	25	63.26			

**. Significant at 1% level *. Significant at 5% level NS: Not Significant

Glancing at the above table $p < 0.5$ revealed that there is no significant difference between aggressive behaviours with reference to their living area. However, looking into the given mean values of respondent's aggression scores between urban (mean= 59.92), rural (mean= 59.38) and semi urban (mean= 63.26). It reveals that semi urban respondents have slightly higher level of aggression than rural and urban respondents. There is some difference in mean scores but it is not statistically significant.

Hence the state hypothesis "There is no significant difference in aggression level with reference to area of living" is here by accepted.

This study is supported by

Rupali sen Deka (2004) found that there is no significant difference in aggression among adolescents from urban and rural area.

C. Combat video games addiction among Youth

Nowadays the youth are getting more addicted towards violent video games. These types of games can increase the aggressiveness of the youth.

i) Addiction of combat video games

ii) Association of age and gender on combat video game addiction scores

iii) Association of living area and combat video game addiction scores

i) Addiction of combat video games

Following table and figure represents the level of combat video games addiction.

Table no-5

Addiction of combat video games

S.NO	Variable	Particular	N	%
1.	Video game addiction scores	Low	49	40.8
		Moderate	60	50.0
		High	11	9.2
		Total	120	100.0

Table no.5 shows the addiction of combat video games. In total 120 members 49 members representing 40.8% of the samples are in low score. This indicates that they have low level of addiction towards combat video games. 60 members representing 50.0% of the samples are in moderate score. This indicates that they have moderate level of addiction towards combat video games. 11 members representing 9.2% of the samples are in high score. This indicates that they have high level of attitude towards combat video games.

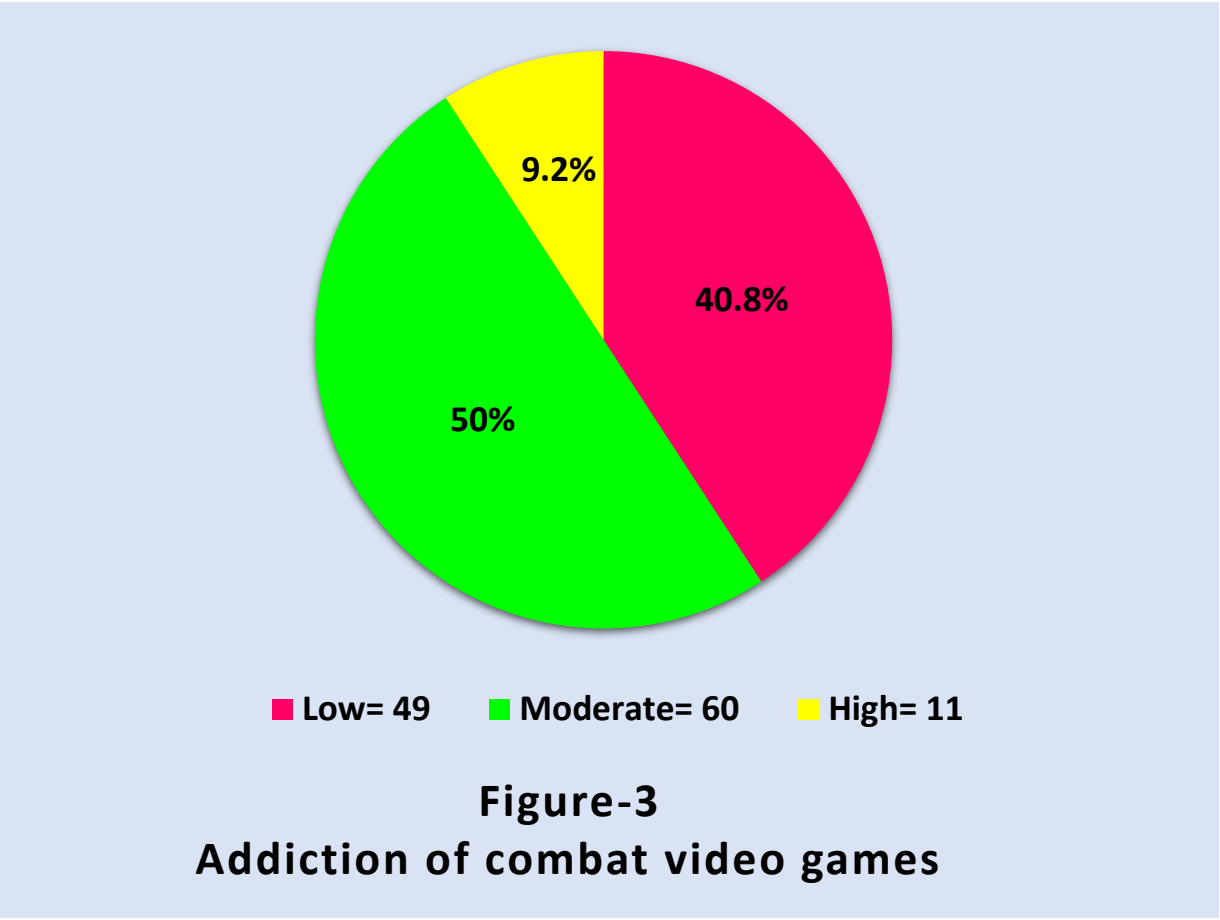


Figure-3
Addiction of combat video games

This study is supported by

Funk (1993) has conducted a survey study entitled “Re-evaluating the impact of video games”. A survey assessing frequency and location of play and game preference was completed by 357 seventh- and eighth-grade students. Results showed that Approximately half of preferred games were from one of two categories of violent games, while 2percent of preferred games were educational.

ii) Association of age and gender on combat video game addiction scores

This table below represents the age and gender influence on addiction towards combat video games.

Table no-6

Association of age and gender on combat video game addiction scores

S.NO	Variable	Age	N	Mean	SD	df	t Value	Sig. Value
1.	Age	15-19	60	41.78	10.877	118	3.256	.001**
		20-24	60	34.38	13.841			
2.	Gender	Male	60	39.83	14.179	118	1.489	.139^{NS}
		Female	60	36.33	11.421			

**. Significant at 1% level *. Significant at 5% level NS: Not Significant

The table no.6 shows the association of age and gender on video game addiction scores, the mean score of the adolescents and youth is 41.78 and 34.38 respectively, which shows that adolescence have higher attitude towards combat video games than young adults. The 't' value shows that age have significance influence on the attitude towards combat video games. It is significant at 1% level.

The mean score of the males is 39.83 and females is 36.33, which shows that males have higher aggression level than females. Even though there is a difference in the mean scores of the males and females, it is not statistically significant.

Hence the hypothesis "There is no significant difference in addiction of combat videogames with reference to age and "There is no significant difference in addiction of combat videogames with reference to gender" partially accepted. As age influences the combat videogame addiction and gender does not influence the combat video game addiction.

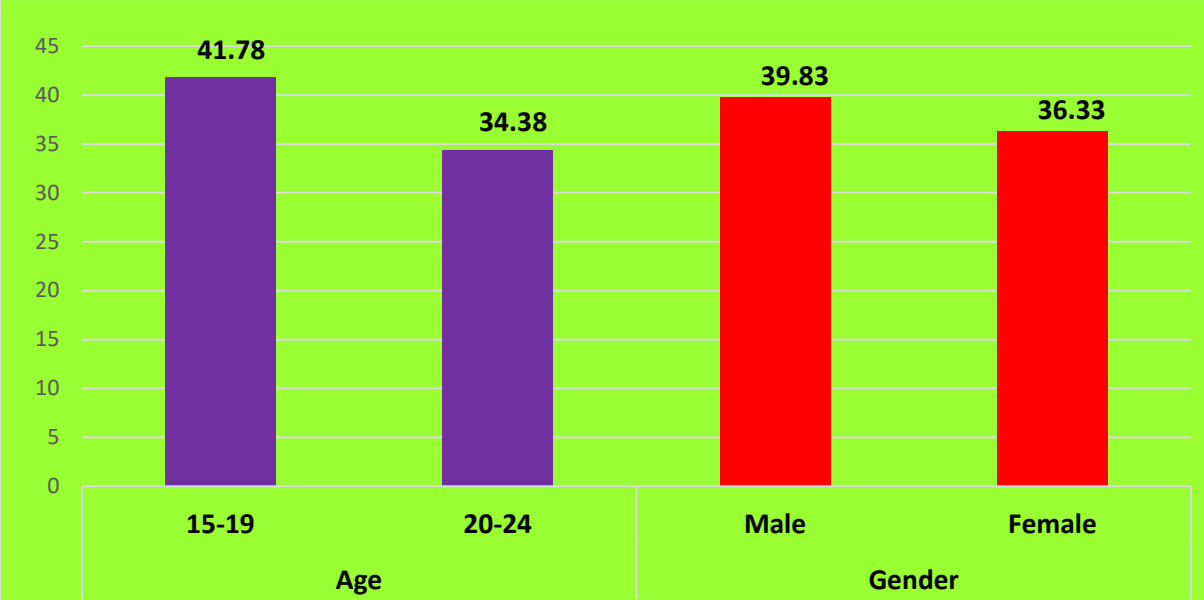


Figure-4
Association of age and gender on combat video game addiction scores

These results of study are supported by

Griffiths et al. (2004) have conducted a survey study entitled “Online computer gaming: a comparison of adolescent and adult gamers”. Therefore, an online questionnaire survey was used to examine various factors of online computer game players (n = 540) who played the most popular online game Everquest. Results showed that In relation to favourite aspects of game play, the biggest difference between the groups was that significantly more adolescents than adults claimed their favourite aspect of playing was violence. Results also showed that in general, the younger the player, the longer they spent each week playing.

Olson et al. (2007) have conducted a survey study entitled “Factors Correlated with Violent Video Game Use by Adolescent Boys and Girls”. Aim of this study was compare the video and computer game play patterns of young adolescent boys and girls, including factors correlated with playing violent games. Of 1126 children who listed frequently played game titles, almost half (48.8percent) played at least one violent (mature-rated) game regularly (67.9percent of boys and 29.2percent of girls).

Playing M-rated games is positively correlated ($p < .001$) with being male, frequent game play, playing with strangers over the Internet, having a game system and computer in one's bedroom, and using games to manage anger. They conclude that most young adolescent boys and many girls routinely play M-rated games.

iii) Association of living area and combat video game addiction scores

This table shows the area of living influence on addiction towards combat video games.

Table no-7

Association of living area and combat video game addiction scores

S.NO	Living area	N	Mean rank	df	Chi square	Sig. Value
1.	Urban	69	65.00	2	3.251	.197 NS
2.	Rural	26	50.94			
3.	Semi-urban	25	58.02			

**. Significant at 1% level *. Significant at 5% level NS: Not Significant

Glancing at the above table $p < 0.5$ revealed that there is no significant difference between attitudes towards combat video games with reference to their living area. However, looking into the given mean values of respondent's attitude towards combat video games scores between urban (mean= 65.00), rural (mean= 50.94) and semi urban (mean= 58.02). It reveals that urban respondents have higher level of attitude towards combat video games than rural and semi urban respondents. There is some difference in mean scores but it is not statistically significant.

Hence the state hypothesis "There is no significant difference in addiction of combat videogames with reference to area of living" is here by accepted.

D. Interrelationship between aggressive behaviour and addiction of combat video games among youth

The investigator attempted to find out the relationship between combat video games addiction and aggressive behaviour among youth.

Table no-8

Correlation between aggressive behaviour and addiction of combat video games

Variable	Correlation	aggression scale score	Video game score
aggression raw score	Pearson Correlation	1	.387**
	Sig. (2-tailed)		.000
	N	120	120
Combat videogame addiction raw score	Pearson Correlation	.387**	1
	Sig. (2-tailed)	.000	
	N	120	120

**. Correlation is significant at the 0.01 level (2-tailed).

The correlation coefficient value .000 revealed that there is a significant positive relationship at 1% level between aggressive behaviour and attitude towards combat video games. It shows that these two are positively correlated. It means that more the level of aggressive behaviour more the attitude towards combat video games, like wise more the attitude towards combat video games the level of aggressive behaviour will be more.

Hence the hypothesis “There is no significant relation between aggression and addiction to combat videogames” is here by rejected.

The result of this study is supported by

Uhlmann and Swanson (2004) have conducted an experimental study entitled “Exposure to violent video games increases automatic aggressiveness”. The effects

of exposure to violent video games on automatic associations with the self were investigated in a sample of 121 students. Playing the violent video games led participants to associate themselves with aggressive traits and actions on the implicit association test. Results suggest that playing violent video games can led to the automatic learning of aggressive self-view.

Giumetti and Markey (2007) have conducted an experimental study entitled “Violent video games and anger as predictors of aggression”. A total of 167 undergraduate students (79 females, 88 males) first completed a measure of anger and were then randomly assigned to play either a non-violent or violent game. After the video game play period, participants completed ambiguous story storms in order to assess aggression. consistent with predictions of the GAM; anger significantly moderated the effect of video game violence on aggression. Specifically, participants who were angry were more affected by violent video games those participants who were not angry.

Guo et al. (2007) have conducted a survey study entitled “Review of the effect of violent video games on children and adolescents”. According to result the take a conclusion that Exposure to violent video games increases aggressive behaviour, emotional & physiological arousal, and decreases helping behaviour. A positive intervention from parents can decrease negative effects of violent video games.

Anderson and Bushman (2001) have conducted a meta-analytic study entitled “Effects of Violent Video Games on Aggressive Behaviour, Aggressive Cognition, Aggressive Affect, Physiological Arousal, and Pro social Behaviour” to investigate whether playing violent video games will increase aggressive behaviour. A meta-analytic review of the video game research literature reveals that violent video games increase aggressive behaviour in children and young adults. Experimental and non-experimental studies with males and females in laboratory and field settings support this conclusion. Analyses also reveal that exposure to violent video games increases physiological arousal and aggression-related thoughts and feelings. Playing violent video games also decreases pro social behaviour.

Lynch et al. (2001) have conducted a survey study entitled “effects of violent video game habits on adolescent aggressive attitudes and behaviours”. The study included 607 pupils with an average age of 14. Participants were given three questionnaires: a computer-game habits survey, a hostile attribution survey and a hostility survey. The study ascertained that the boys played more than the girls and preferred more violent content. It also showed that the participants reported an increased interest in violent content in computer games. In addition, the study measured other media use and ascertained that there was an overall correlation between the use of computer media and hostility to the outside world. The study also found that students who played more than others for several years, or who bought computer games, had more often been involved in physical fights. Finally, it was ascertained that those who played or preferred computer games with violent content had a more hostile perception of their surroundings than others.

V Summary and conclusion

Aggression is overt, often harmful, social interaction with the intention of inflicting damage or other unpleasantness upon another individual. It may occur either in retaliation or without provocation. In humans, frustration due to blocked goals can cause aggression. Aggression can take a variety of forms, which may be expressed physically, or communicated verbally or non-verbally. Behaviourists have regarded aggression as a learned or conditioned response to frustration maintained through reinforcement. Social learning theorists thought it to be all behaviour learned in a social context through observation, imitation and reinforcement.

A combat game is a genre of video game in which a gamer battles against another character controlled by another gamer or the game's artificial intelligence. These games are a form of action game in which two on-screen characters engage in one-on-one combat.

A young person who is addicted to the combat video games, has different problems, such as sleep problems, insomnia, worsening health status, declining eyesight, negative attitudes, rough behaviour towards others. They become irritable and always exhausted. He or she will try to produce the aggressive behaviour in real world also. The video games which promote violence and brutality have a negative impact on health, especially on mental and emotional states. A computer game can provoke an attack of motiveless aggression, if the young people has some mental diseases.

It is a matter of serious concern for the progress of the society as a whole because youth represents the energy of the present and hope of the future. They have to play an important role in the development of our society. In the present-day youth are facing many challenges with regarding to their aggressive behaviour and therefore it is necessary to understand their aggression level and their addiction towards combat video games.

The study was undertaken in the “Government college of Technology “Coimbatore district. Data was collected from a total sample of 120 where 60 respondents were males and 60 were females. The data was collected from the respondents using interview questionnaire to elicit general information, “Aggression scale” developed by Dr.R.L. Bharadwaj and self-made questionnaire which tells about young people’s attitude towards combat video game. The collected data was then consolidated, statistically analysed and interpreted using t-test and Kruskal-Wallis test and correlation.

The key findings of the present study were:

A. GENERAL PROFILE OF THE RESPONDENTS

- With reference to age selected respondents were distributed as 15-19 years youth and 20-24 years youth. They are equally represented in the selected sample.
- With reference to gender male and female were equally represented in the selected sample, representing 50% each.
- more than half of the respondent’s i.e.57.5 percent were resided in urban area, 21.6 percent in rural area and 20.8 percent each were found sited in semi urban area.
- The majority of the selected respondents i.e. 87.5% were from nuclear family and 12.5% were belonged to joint family

B. AGGRESSIVE BEHAVIOUR AMONG YOUTH

- In total 120 members more than half of the samples are having very high level of aggression (93 members). 21 members are having high level and the remaining 6 members are having average level of aggression.

C. ASSOCIATION OF AGE AND GENDER ON AGGRESSIVE BEHAVIOUR

- The selected respondents were distributed equally as 15-19 years youth and 20-24 years youth. 15-19 years samples are having more aggressive behaviour when compared to 20-24 years indicating age have significant influence on aggressive behaviour of youth. It is significant at 1% level.
- Males are more aggressive than females. It shows that gender has significant influence on youth's aggressive behaviour. It is significant at 1% level.

D. ASSOCIATION OF LIVING AREA AND AGGRESSIVE BEHAVIOUR

- The results revealed that there is no significant difference between aggressive behaviours with reference to their living area.
- Looking into the given mean values of respondent's aggression scores between urban, rural and semi urban. It reveals that semi urban respondents have higher level of aggression than rural and urban respondents. There is some difference in mean scores but it is not statistically significant.

E. ADDICTION OF COMBAT VIDEO GAMES

- In total 120 members half of the samples are having moderate level of addiction of combat video games (60 members). 49 members are having high level and the remaining 11 members are having average level of addiction of combat video games.

F. ASSOCIATION OF AGE AND GENDER ON COMBAT VIDEO GAME ADDICTION SCORES

- The selected respondents were distributed equally as 15-19 years youth and 20-24 years youth. 15-19 years samples are having more addiction of combat video games when compared to 20-24 years indicating age have significant influence on addiction of combat video games behaviour of youth. It is significant at 1% level.
- Males are having more addiction of combat video games than females. Even there is a difference in the mean scores of the males and females it is statistically not significant.

G. ASSOCIATION OF LIVING AREA AND COMBAT VIDEO GAME ADDICTION SCORES

- The results revealed that there is no significant difference between addiction of combat video games with reference to their living area.
- Looking into the given mean values of respondent's addiction of combat video games scores between urban, rural and semi urban. It reveals that urban respondents have higher level of addiction of combat video games than rural and semi urban respondents. There is some difference in mean scores but it is not statistically significant.

H. CORRELATION BETWEEN AGGRESSIVE BEHAVIOUR AND ADDICTION OF COMBAT VIDEO GAMES

- The correlation coefficient value revealed that there is a significant positive relationship at 1% level between aggressive behaviour and attitude towards combat video games.
- It shows that these two are positively correlated. It means that more the level of aggressive behaviour more the addiction towards combat video

games, like wise more the addiction towards combat video games the level of aggressive behaviour will be more.

LIMITATION OF THE STUDY

- Due to limitation of sample size, the findings of the current study would not be able to generalize to the population
- The samples are selected from only one institute for the study so, that couldn't refer the population sample as because there will be variation among the samples from different places.

RECOMMENDATION FOR FURTHER STUDY

- Further study can be given an intervention programme to the youth who are having very high aggressive behaviour and high addiction of combat video games.
- The study can be done on other variables like, race, ordinal position, father and mother occupation, father and mother education and parenting style.

CONCLUSION

The present study clearly concludes that there is a positive relationship between aggressive behaviour and addiction towards combat video games, and addiction of combat video games can increase the level of aggressive behaviour of the youth. The study has identified that there is significant difference, of the selected variables on the aggressive behaviour and addiction of combat video games among youth.

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INSTITUTIONAL HUMAN ETHICS COMMITTEE

Avinashilingam

Institute for Home Science and Higher Education for Women

Deemed to be University Under category 'A' By MHRD, (Estd. u/s 3 of UGC Act 1956)

Re Accredited with 'A' Grade By NAAC, Recognised by UGC Under Section 12 B

Coimbatore - 641043, Tamil Nadu, India

24 January 2019

To
Ms. Nunna Amulya
Department of Human Development
Avinashilingam Institute for Home Science and
Higher Education for Women
Coimbatore – 641 043

Dear Nunna Amulya,

Ref: Your proposal No. IHEC/18-19/HD/15 entitled "A Study on Aggressive Behaviour among Youth" submitted for approval to the IHEC on 30.09.18.

The Institutional Human Ethics Committee of our University hereby grants approval to your research proposal No. IHEC/18-19/HD/15 entitled "A Study on Aggressive Behaviour among Youth" submitted by you. The Approval number for the same is AUW/ IHEC/HD-18-19/XPD/15.

We wish you all the best in your research endeavours.

Regards,

S. Uma Mageshwari

Dr.S.Uma Mageshwari
Member Secretary

Institutional Human Ethics Committee

Background Information (BGI)

Please fill in the following entries:

1. Name:
2. Age:
3. Date of birth:
4. Class:
5. Religion:

Hindu ☐ Muslim ☐ Christian ☐

6. Family type:

Nuclear ☐ Joint ☐

7. Father's education:

Illiterate ☐ Primary ☐ Matriculation ☐

Graduate ☐ Postgraduate ☐

8. Mother's education:

Illiterate ☐ Primary ☐ Matriculation ☐

Graduate ☐ Postgraduate ☐

9. Father's occupation:

Government ☐ Private ☐ Unemployed ☐

10. Mother's occupation:

Government ☐ Private ☐ Unemployed ☐

11. Area of residence:

Urban ☐ Sub urban ☐ Rural ☐

Dr. Rajeev Lochan Bhardwaj

Reader, Department of Psychology
D.S. College, Aligarh

AG Scale

Please give information about yourself :

Gender	Age	Caste	Religion	Education
Rural/Urban	Occupation	Monthly Income	Married/Unmarried	

Instruction :

1. Please read carefully as every statement is related to your expressed behaviour.
2. Please answer each and everything with utmost honesty.
3. There are five alternatives before each and every statement. Please tick (√) which ever alternative resembles your behaviour.
4. All information given by you shall remain confidential.

---

1. Whether your friends or relative.... in meeting you.
   - ( ) avoid in excess
   - ( ) avoid much
   - ( ) avoid generally
   - ( ) generally do not avoid
   - ( ) never avoid

2. I take ..... in debating with others even without need.
   - ( ) excessive pleasure
   - ( ) much pleasure
   - ( ) pleasure normally
   - ( ) no pleasure
   - ( ) not the least pleasure

3. To hear and read the story of revolutionary heroes, I.....
   - ( ) like very much.
   - ( ) like much.
   - ( ) like normally.
   - ( ) like less
   - ( ) like the least.

4. To obey the rules of the society, I.....
   - ( ) do not consider necessary always.
   - ( ) do not consider necessary.
   - ( ) consider necessary off and on.
   - ( ) consider necessary.
   - ( ) consider necessary always.

5. To drive fast or to sit in the fast driven car without much need of the occasion, I.....
   - ( ) like very much.
   - ( ) like much.
   - ( ) like normally.
   - ( ) like less.
   - ( ) like the least.

---

6. To retort the other's provoking answer, I.....
( ) like very much.
( ) like much.
( ) like normally.
( ) like less.
( ) like the least.

7. To return a blow in lieu of slap, I.....
( ) consider very much appropriate.
( ) consider much appropriate.
( ) consider appropriate normally.
( ) consider less appropriate.
( ) consider least appropriate.

8. In the event of a work against my wishes, I.....
( ) lose my temper in excess.
( ) lose my temper very often.
( ) lose my temper occasionally.
( ) do not lose my temper normally.
( ) never lose my temper.

9. Actions of violence in the programmes of TV, I....
( ) like very much.
( ) like much.
( ) like normally.
( ) like less.
( ) do not like at all.

10. During the sleep the dreams of strife and violence, I.....
( ) have in excess.
( ) have very often.
( ) have occasionally.
( ) do not have generally.
( ) do not have at all.

11. How to improve the present social system around us ? This point .....
( ) is the most important for me.
( ) is important for me.
( ) is important normally for me.
( ) is less important for me.
( ) is not at all important for me.

12. In order to achieve my goal (right or wrong), I.....
( ) remain always eager.
( ) remain eager.
( ) occasionally remain eager.
( ) hardly remain eager.
( ) never remain eager.

13. To have a meeting with the battle warriors and horrible fighters, I.....
( ) like very much.
( ) like much.
( ) like normally.
( ) like less.
( ) do not like at all.

14. For the selfish interests of others, I.....
( ) become a tool always.
( ) become a tool generally.
( ) become a tool occasionally.
( ) do not become a tool normally.
( ) never become a tool.

15. Finding that my things are not properly placed, I....
( ) become angry in excess.
( ) become much angry.
( ) become angry occasionally.
( ) do not become angry normally.
( ) do not become angry at all.

16. To break or to throw away the inanimate objects, I.....
( ) like very much.
( ) like much.
( ) like generally.
( ) do not like generally.
( ) do not like at all.

17. To hunt the animals and birds without much cause, I.....
( ) like very much.
( ) like much.
( ) like normally.
( ) like less.
( ) do not like at all.

18. In teasing and torturing others, I.....
( ) find delight in excess.
( ) find delight.
( ) find delight normally.
( ) do not find much delight.
( ) find no delight at all.

19. While being confronted with partiality, I.....
( ) become very much angry.
( ) become angry.
( ) become angry normally.
( ) do not become angry generally.
( ) do not become angry at all.

20. How the opponent should be tortured ? This thought, is.....
( ) always present in my mind.
( ) generally present in my mind.
( ) occasionally present in my mind.
( ) not present in my mind normally.
( ) never present in my mind.

21. To obey the elders, I.....
( ) do not like at all.
( ) generally do not like.
( ) occasionally do not like.
( ) like normally.
( ) like always.

22. To hear others in loud tone, I.....
( ) do not like at all.
( ) do not like normally.
( ) tolerate some times.
( ) tolerate very often.
( ) tolerate always.

23. To tell the faults of elders while they are at faults, I.....
( ) consider very much necessary.
( ) consider necessary.
( ) consider necessary normally.
( ) consider less necessary.
( ) do not consider necessary at all.

24. While failing to take revenge with the opponent, I.....
( ) shout and murmur for a long time.
( ) shout and murmur for quite some time.
( ) shout and murmur normally.
( ) shout and murmur a little.
( ) hardly shout and murmur.

25. In the interest of the nation, even the deeds going against public interest, I.....
( ) accept very easily.
( ) accept easily.
( ) accept normally.
( ) hardly accept.
( ) do not accept at all.

26. If a small event of tussel appears on the road, I.....
( ) begin to irritate in excess.
( ) begin to irritate.
( ) begin to irritate normally.
( ) hardly irritate.
( ) never irritate.

27. If I get angry on others, I ..... for my own loss.
( ) never care
( ) do not care normally
( ) do not care occasionally
( ) care less
( ) least care

28. In the unnecessary disputes of the society, I.....
( ) participate very often.
( ) participate often.
( ) participate occasionally.
( ) hardly participate.
( ) do not participate at all.

Thank you !

Addiction of combat videogames

Instruction: For each of the following statements, tick the number of 5 – point scale (1 = Strongly agree, 5 = strongly disagree. There are no right and wrong answers, so don't spend lot of time on any one item. Put a √ mark in the appropriate box which depicts your answer the best. Be sure not to omit any items.

Item	Strongly agree	Agree	Moderate	Disagree	Strongly Disagree
1. My main entertainment is playing video games					
2. I play video games in daily basis					
3. Mostly I prefer to play video games which has little or no violence					
4. Fantasy violence is my favourite genre of video game					
5. I like video games which has crude Humour					
6. I prefer to play combat video games					
7. War stimulation is one of my most played video games					
8. I like action games which is usually bloody and gore					
9. I like video games which involves Weapons					
10. I like video games which involves fighting opponents to reach goal.					
11. I am very good at playing combat video games.					
12. I often get into arguments or fights during or after playing aggressive video games.					
13. I feel irritated or angry when someone disturbed me while playing video game.					
14. I feel irritated and angry when I lose the game					
15. I often use inappropriate language while playing a violent video game.					

Avinashilingam
Institute for Home Science and Higher Education for Women
Deemed to be University Under category 'A' By MHRD, (Estd. u/s 3 of UGC Act 1956)
Re Accredited with 'A' Grade By NAAC, Recognised by UGC Under Section 12 B
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அரசினர் பொறியியற் கல்லூரி
11 SEP 2018
கோயமுத்தூர் - 641013

Permitted.
P. Th 11/9/18

Date : 10/9/18

To,
The Principal,
Government College of Technology,
Coimbatore.

Sir/Madam

Sub: Permission for data collection from the students of your esteemed institution– reg.

As a part of curriculum for II M.Sc. Human Development, the students have to submit a dissertation thesis. Ms. Nunna Amulya is working on the topic "A study on aggressive behaviour among youth".
In this connection, she has to collect data from the students of your esteemed institution. Hence, with due regards, kindly permit her to collect data and conduct her research work.

I would also like to mention that the data collection work will be carried out according to the schedule given by you without causing any inconvenience to your classes.

Thanking you

Arockia Maraichelvi
Yours faithfully

Human Development Dept.
Avinashilingam Institute for Home Science
and Higher Education for Women
Coimbatore - 641 043