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Monitoring Aggression in Adolescents: Yoga As A Panacea

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Abstract

An Anova of the order of 2x2x(2) with repeated measure was employed in the present research to gauge the effect of yogic exercises if any between the control group and the experimental group in the two genders from pre to post test on different types of aggression. This investigation used a complete package of multiple counselling techniques to normalize aggression. The sample consisted of 100 school students (50 males, 50 females) from Shimla district of H.P. between the ages of 14 to 17 years. the main findings are: 1) The main effects of group, gender and treatment have turned out to be significant at .05 and .01 levels; 2) the interaction effects of treatment x group and treatment x gender have also yielded significant F ratios thereby revealing the significant impact of interventions in monitoring the aggression.

Index terms—

1 Introduction

ffensive behaviour or aggression among children and adolescents is a significant clinical and social problem. The significance derived from findings that antisocial behaviour (particularly aggressive acts) are relatively prevalent among community samples, serve as the basis for one-third to one-half of clinical referrals among children, are relatively stable over the course of development, often portend major dysfunction in adulthood (e.g., criminal behaviour, alcoholism, antisocial personality), and are likely to be transmitted to one's offspring's **??**Kazdin, in Press;Loeber 1985;Robins, 1981;Rutter & Giller, 1983).

Adolescent aggression is an important focus for educators and parents owing to its relative stability over time and consistent link to a variety of negative outcomes later in adolescence, including delinquency, substance use, conduct problems, poor adjustment, and academic difficulties (poor grades, suspension, expulsion, and dropping out of school). In addition, verbal and physical aggression often is the first signs, as well as later defining symptoms, of several childhood psychiatric disorders. These include Oppositional Defiant Disorder and Conduct Disorder, both of which have prevalence rates ranging from 6 to 10% in the general population and even higher among males, according to the American Psychiatric Association.

Aggression is defined as "a sequence of behaviour, the goal response of which is the injury to the person toward whom it is directed" (Dollard et al., 1939).

Although the term aggression refers to a wide spectrum of behaviours, in the psychological literature, it is defined as any behaviour intended to harm another individual who is motivated to avoid being harmed (e.g. Baron & Richardson, 1994;Coie & Dodge, 2000).

Aggressive behaviours can vary from problems with emotional regulation to severe and manipulative behaviours. There are various characteristics of aggression, which can include behaviours such as starting rumours; excluding others; arguing; bullying, both verbally (name-calling) and physically (pushing); threatening; striking back in anger; use of strong-arm tactics (to get something they want); and engaging in physical fights. Notably, aggressive behaviours do not always involve physical contact with another person. Verbal aggression in elementary school years, such as starting rumors, excluding others, and arguing, can be part of a developmental trajectory leading to adolescent delinquency and Conduct Disorder.

Adolescents with a childhood onset of aggression, rather than an adolescent onset, are more likely to display the most persistent, severe, and violent antisocial behaviour. Indeed, childhood aggression is often viewed as

an indication of a broader syndrome, frequently involving oppositional and defiant behaviour toward adults and covert rule-breaking behaviours. These behaviours could lead to more serious and recurrent violations in adolescence, such as stealing, vandalism, assault, and substance abuse. The development of adolescent aggressive behaviour is often considered to be the result of a set of family and personal factors, with the child's aggressive behaviour representing a substantial part of that developmental pattern. For example, children with difficult temperaments and early behavioural problems are at greater risk for later adolescent aggression and conduct problems. This developmental course is also set within the child's social environment. For example, poor parenting practices, such as poor parental monitoring and supervision and high rates of harsh and inconsistent discipline, have been shown to contribute to children's aggressive behaviour.

In early to middle childhood, children who show high levels of oppositional behaviour and aggression may experience negative reactions from teachers and peers. This may also lead to problematic ways of processing social information, such as relying on aggressive solutions in problem solving when presented Year with social conflicts, expecting that aggressive solutions will work, and having difficulties interpreting social information accurately (such as attributing neutral behaviours by others as hostile). Aggressive children are at risk for many academic problems and, as their academic progress and social bond to school weakens (owing to problematic exchanges with teachers and peers), they become more vulnerable to influences from deviant peer groups.

By adolescence, this developmental course results in a heightened risk of substance use, delinquent acts, and school failure. Likewise, certain environmental risk factors can play a role in moving an adolescent along this developmental pathway. For example, family dysfunction may be sufficient to initiate the sequence of escalating aggressive behaviour. Living in poor, crimeridden neighbourhoods also adds to the environmental risk factors leading to seriously aggressive, problematic behaviour.

For young children to outgrow their aggressive ways, they need positive, consistent, nurturing discipline. They need to learn positive problem-solving techniques. Parents and teachers need to place children in environments that offer a setting and support for learning positive social behaviour rather than aggressive, hostile, antisocial acts. Social behaviour is behaviour directed towards society, or taking place between, members of the same species. Positive social behaviour means conforming to the social norms or expectations which do not include problem behaviour.

Therefore, besides knowing the etiological factors or the risk factors that foster aggression, it is also important to know and understand the protective factors that are associated with less aggression. Several treatments have been implemented to alter antisocial behaviours including diverse forms of individual and group therapy, residential treatment, pharmacotherapy, and a variety of community based treatments (Kazdin, 1985).

As the medical treatment has many side effects. Medicines make the individual more addicted to it and their effect is not long lasting. There are more chances of relapse if one stops taking the medicine and is totally dependent on it, therefore, application of school based intervention programmes and social-cognitive group intervention programmes in the treatment of aggression has recently received wider attention. Stirtzinger et al. (2001) examined the effects of a school based multi model intervention project to assist aggressive students at-risk for school dropout and delinquency. It is maintained that school climate, peer pairing, teacher education and whole class interventions are main clinical strategies which seek to attain a multiple reinforcement model for increased social inclusion, healthy behaviour and social interaction in the at-risk student group. In one more study on reducing children's aggressive and oppositional behaviours in the schools, Muris et al. (2005) examined the effects of a social-cognitive group intervention program for children with oppositional and aggressive behaviours. Forty-two children aged between 9 and 12 years who clearly displayed behaviour problems at school were treated with this program.

A cross over design was used in which one group of children first received treatment and then assigned to a waiting period, whereas, the other group of children first waited and subsequently received treatment. Results demonstrate that the social cognitive intervention yielded a significant reduction of behaviour problems and an increase of social-cognitive skills as compared to the waiting list control condition. Further, a follow-up assessment of the children who were initially treated indicates that the intervention effects were retained over a three month period. Finally, some support was found for the theoretical underpinnings of the social-cognitive skills were to some extent associated with a larger reduction of behaviour problems. Interventions that seek to increase protective factors and reduce risk factors can significantly reduce aggressive behaviour in children and teens.

Techniques like yoga, relaxation and interpersonal counseling also seems to be highly influential in reducing aggression (Rana, 2007).Yoga is the word derived from the Sanskrit root "Yuj" which means to join, attach and yoke, to direct and concentrate one's attention on, to use and apply. It also means union or communion. It is the true union of our will with the will of God. Yoga is regarded as a science as well as a method that allows man to live a harmonious life with spiritual progress through the control of mind and body.

Krishna Rao (1995) discusses the significance of yoga to the well being of mankind. The core of yoga practice lies in concentration, yogic meditation and absorption. Reports showed that yogic practices are probably the most important and effective self-help tools available to humanity. Substantial reduction in depression, anxiety, psychotism, paranoid ideation, hostility, somatism, obsession, and inter-sensitivity has been found on account of living a yogic lifestyle (Bhushan, 1998).

Physical and perceptual benefits were investigated with twenty-six healthy adults, 20-58 years of age, using two different styles of yoga, Hatha and Astanga. The participants were divided into the two different yoga classes

for six weeks. The significant improvement of ? twenty-percent reduction in selfperceived stress for participants in Astanga yoga and no significant reduction in self-perceived stress for Hatha participants shows there are differences in perceptual benefits of yoga. Perceptual benefits were assessed using Perceived Stress Scale, and short form 20 health survey was used for data collection. This study is significant to the area of yoga research because it Global Journal of Human Social Science Volume XII Issue X" V Version I(D D D D) A Year 2012

focused on testing the benefits of certain styles of yoga (Cowen, & Adams, 2005). A similar study was done by Wheeler and Wilkin (2007) with 79 college students, ages 18-24, to determine if Yoga Asana influenced perceived stress and anger level over a ten-20 week period. The results of the study suggest that Yoga Asana was associated with positive pre to post-class changes on perceived stress and anger.

The present research was designed to study the effect of intervention programme on aggression. It is basically concerned with intervention technique which is used in psychotherapy to disrupt ongoing maladaptive behavior patterns. In the present study an attempt was made to reduce/manage the high aggressive behavior with the help of yoga, relaxation, and interpersonal counselling. In the intervention programme, yogic techniques, relaxation technique coupled with interpersonal counselling were administered. The hypothesis of the present investigation is, "intervention programme will be effective in monitoring aggression." The 1 month intervention was given to only high aggressive students, while the other high aggressive group remained as control.

2 II.

3 Design

In order to study the effect of intervention programme on aggression among students, a 2x2x (2) Repeated Measure ANOVA was computed. The first two levels were control and experimental groups; second factor i.e. gender and the last factor was a Repeated Measure in the form of pre and post test on aggression. The intervention was administered in the post test condition. The pre test scores served as attention control.

4 III.

5 Sample

A total of 100 students (100 males and 100 females) from various schools of Shimla (H.P). participated in the present research work. The age ranged between 14-17 years. Out of 200 students, 100 subjects were high on aggression (50males, 50 females). From these 100 subjects, 50 students (25 males and 25 females) were randomly selected for the intervention. The other 50 remained as the control group. Aggression was measured with "Direct and Indirect Aggression Scales," (DIAS) developed by Bjorkqvist, Lagerspetz, and Osterman (1992). The instrument consists of three subscales: physical, verbal, and indirect aggression. Indirect aggression was conceptualized as attempts to cause psychological harm to the target person by social manipulation, pretending that the attack was not aggressive at all. Few changes were introduced in the scale. The original scale consisted of 24 specific acts of aggression. These were reduced to 23 acts and changes were made in the language. It was made easier so that all the students/subjects can easily understand what was asked. Total items included in the three subscales were as follows; physical aggression (7 items), verbal aggression (5 items) and indirect aggression **??**11 items). In this scale, each pupil of a class is asked to assess, on a 5-point scale, the extent to which each other pupil in the class is exhibiting any of 23 specific acts of aggression when in conflict with or angry with his/her peers.

The instrument may be applied in both peer and self-estimations. In the present investigation, same sex peer-estimated data was used i.e., females' ratings of females and males' ratings of males. The subscales of DIAS had high levels of internal consistency, ranging from .80 to .94 in the different subgroups of the study. The test retest reliability is .85 and criterion validity of this scale is .88. First, the pairs were made for peer rating. Then they were given the questionnaires. Following instructions were given to the subjects: "Please read each and every item in the questionnaire carefully, and rate your peer under the options you feel relevant for him/her. It was made clear to the subjects that there were no right or wrong answers and there is no particular time limit but don't waste much time on any single item." Scoring of the responses was done carefully. First, scoring for each subscale was done on 5-point scale and then the scores on all the 3 subscales were combined, to get the total score on aggression scale.

V.

6 Intervention Programme

The intervention programme included yogic exercises including relaxation techniques and interpersonal counselling. Duration for the training was six months which involved daily practice schedule. A two day workshop was conducted thrice for this purpose. Besides this, subjects were contacted individually for interpersonal counselling from time to time. The session of interpersonal counselling was of two months as each student from the experimental group was given counseling. Subjects were given individual counseling so that they could share their feelings and problems openly and freely. After a week's gap of this two months session, a two day workshop was conducted. Since, the main emphasis of the present study was on yogic therapy including

relaxation and meditation, an attempt was made to extract those therapeutically significant ingredients from Patanjali's eight fold yoga system, which could be effectively applied to the treatment of aggression. Therefore, yogic techniques were demonstrated to help subjects correctly practice them. It helps in vacating the mind from all worries, tensions, negative emotions and thoughts letting the mind relax.

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Instructions: "Breath deeply, slowly and imagine that each inhalation fills your mind, purifies it from all negative thoughts and emotions, worries and tensions. All that is good in the universe around you is entering inside your body and that you are getting filled up with divine powers. Thoughts which you want to get rid of your mind (especially related to aggression, poor concentration, and academic achievement) go out through exhalation and those desired by you are brought-in with inhalation.

8 b) Kapalbhati:

It is an excellent preparation for concentration and meditation, as it calms the mind. 'Kapal' means skull and 'Bhati' means purification, so, it is a purification and cleansing of the inside skull. Hence, kapalbhati refers to that exercise which makes the skull and brain luminous and lustrous. This technique should easily be done for five minutes.

Instructions: Sit either in any of the asanas, viz. padmasana, sidhasana, vajrasana, or any other meditative posture whichever you find convenient. Breathe in and out normally and forcefully, so as to influence the organs of the abdominal area. This technique should easily be done for five minutes. While doing this technique think that while exhaling you are throwing all the diseases out of your body. Individuals with mental aberrations like anger, greed, self-ego, attachment etc. should develop a feeling of throwing out all the negative and injurious elements along with the air exhaled. In the beginning do kapalbhati for three minutes and gradually increase it to five minutes. Initially, if you feel tired in between, take rest for a while and resume after practice of about two months, you will be able to perform this pranayama for five minutes at a stretch without any fatigue. In the beginning, you may feel a little pain in the back or abdomen. But this will disappear after some practice. So do not give up. c) Anulom-viloma Pranayama:

This pranayama quitens the mind and helps in improving concentration.

Instructions: After sitting in the suitable posture, close the right side nostril with the right hand thumb. Prana breathed in through left nostril represents energy of the moon, which symbolizes peace, and has a cooling effect. Right nostril imparts heating effect on the body. Hence for purification of nadis, beginning of this pranayama has to be made by the left nostril. Inhale slowly through the left nostril till the lungs are filled. Then close the left nostril with the second and third fingers (Madhyama and Anamika). Open the right nostril and exhale through it. Repeat this exercise slowly in the beginning, and with practice, increase the speed. When you are able to practice this exercise for a long time, inhale with as much rhythm as is possible for you, then exhale also rhythmically. This practice of inhalation and exhalation alternatively through the right and left nostril, as indicated above should be done for three minutes.

If you feel tired, rest for sometime and resume. Regular practice will enable you to do this pranayama for ten minutes. After some practice, this pranayama(D D D D) A Year 2012

should be done for five to ten minutes daily, depending upon one's capacity. However, in summer season it should be done for duration starting from three minutes and up to a maximum of five minutes. If you practice this Pranayama for five minutes regularly on a daily basis, the coiled energy called kundalini shakti lying in the muladhar chakra begins to awaken. This is known as kundalini jagran. While doing this pranayama, mentally repeat the martra "OM" so the mind becomes fit for meditation.

While performing this pranayama there develops a feeling in mind that the whole body is being enlightened by a divine light. Imagine that the supreme power is showering divine energy and divine knowledge, that the supreme power is filling you with divine power and virtues. Try to get the initiation of the divine energy by yourself anulom-viloma pranayama done with this kind of feeling gives better results and benefits to the individual in all the spheres viz. physically mentally and spiritually. A divine power light will appear from the muladhara-chakra on its own and there will be kundalini jagran, you will feel the kick/rise within yourself and you will be blessed with the initiation of the divine energy in yourself. Regular practice of this pranayama also has the capacity to replace negative thinking by positive approach to life. It increases enthusiasm and spirit, the person becomes fearless and feels blissful. This pranayama should be done with the thought that individual consciousness merges with the divine cosmic consciousness. Mind should be full of the thought that divine bliss is descending, that deep divine wisdom fills the entire being. Exercising this pranayama with such thought will endow one with divine light and one will be able to meditate effortlessly. With the practice of this pranayama the mind becomes steady. It is beneficial in conditions like mental tension, agitation, high blood pressure, heart disease etc. It is also useful for meditation. "Concentrate your mind on the respiration and meditate on the sacred mantra "OM" with every act of breathing in and breathing out mentally go on repeating the mantra "OM". The speed of respiration should be so slow and subtle that you yourself also may not be aware of its sound, even if a piece of cotton is placed in front of the nostril. It should not move by the effect of the air exhaled out. Slowly practice and make the duration of one inhalation and exhalation to one minute. Likewise, try to visualize the breath

inside the body. Initially the breath can be felt only in the nostrils but gradually it will be felt deep inside. In this way, visualizing the breath and continuous chanting of "OM" will lead to dhyana automatically. Your mind will develop a feeling of concentration and your body will be filled with the feeling of "OM". The Gayatri Mantra from the Vedas can also be chanted meaningfully along with pranayama. Also, if this is practiced at bedtime, one will get peaceful sleep without any perverted dreams etc. It was developed by Jacobson (1938) and is a widely used procedure today. It causes deep muscular relaxation in muscle groups, tensed under stressful conditions. In progressive muscular relaxation, first you deliberately tense the muscles, and then you let go, and turn your attention to how the muscles relax as the tension flows away. The aim is to work systematically through the body and it is usual to start with the hands, workup to the shoulders, then back to the feet and up to the shoulders again, leaning the face and neck to last.

Instructions: Here is an order in which the subjects were instructed to do the following: Bottom : Clench your buttocks together (7-10 sec).

9 Relax (15 sec).

Stomach : Hold your stomach muscles in tight (7-10 sec). Relax (15 sec).

Chest : Breath in, hold your breath, and tighten all your chest muscles (7-10 sec). Relax (15 sec). Shoulders : Breath in, hold your breath and raise your shoulders as if to touch your ears (7-10 sec). Relax (15 sec).

Neck : Stretch your head up, as if your chin could touch the ceiling (7-10 sec). Relax (15 sec). Bend your head forward until your chin reaches your chest (7-10 sec). Relax (15 sec).

Mouth and Jaw : Press your lips together and clench your teeth (7-10 sec). Relax (15 sec).

Eyes: Close them tightly (7-10 sec). Relax (15 sec). Forehead and Scalp : Raise your eyebrows as if they could disappear (7-10 sec). Relax (15 sec).

Face : Screw all the muscles up together (7-10 sec).

Relax (15 sec).

10 VI.

11 Instructions

Following instructions were given to the students before the training/intervention session: Select a clean, ventilated and peaceful place for doing yogic techniques and relaxation.

Sit either in any of the asanas, viz. padmasana, sidhasana or vajrasana which ever you find convenient. The sheet or cloth (cotton or wool etc.) on which you sit must be a non-conductor of electricity.

Breathe only through the nose, because by doing so the air which you take in is filtered. During day time even make it a habit to respire only through nose and not through mouth.

Yogic techniques especially pranayama should be performed four or five hours after taking food. In the morning it should be done after finishing daily routine acts like cleansing mouth, emptying of bowels etc. In the beginning it should be done for five or ten minutes. Gradually the time may be increased up to about ½ or 1 hour. Maintain a specific number of repetitions and do not change Keep your mind calm and composed. However, yoga and relaxation techniques can also calm down the disturbed mind and keep one peaceful.

If you feel fatigued in the course of doing yogic techniques, take rest for sometime and then begin deep breathing, which will remove the fatigue.

Avoid food containing irritating spices. Eat plain and simple, non-spicy food. Use of cow's milk, ghee (clarified butter), fruits and green vegetables can be said to be an ideal food.

Few techniques in it (Pranayama) does not mean just breathing in, keeping the breathed air in and exhaling it. It also means establishing control on the entire breathing process, and maintaining mental equilibrium, and concentration of mind.

Be careful that while doing these yogic techniques, none of your organs such as mouth, eyes, nose, etc. feels any strain and it should be done gradually without any undue stress or strain. All the organs of the body should be kept in normal condition.

While doing them (especially pranayama) sit in an erect posture. Keep your spine and neck straight. This is essential for reaping the full benefit of these techniques. The F-ratio for the main effect of gender under error (A) is 64.25**, $p < .01$. Grand mean of males' physical aggression is 20.85 and that of females' is 14.75 which reveal that there is significant difference in the physical aggression of males and females (Table 1).

12 VII.

13 Results

14 a) Physical Aggression

The main effect of treatment under error (B) represents significant treatment effect, F-ratio being 27.78** $p < .01$ (Table 2).

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Year With regard to the two factor interaction i.e. treatment x group, F-ratio is 61.47** which is significant at .01 level. Pre and post means for the experimental groups are 10.70 vs. 5.76, while pre and post means for control group are 10.49 vs. 10.70 (Table 3). The interaction effect clearly depicts that there is a perceptible crossover in the physical aggression of the control vs. experimental group (Fig. **??**).The F-ratio for the treatment x gender is 6.20* which is also significant at .05 level. The means of males and females under pre treatment condition are 12.80 vs. 9.55 while under post treatment condition it is reduced to 8.05 vs. 5.20 (Table 3). It is evident from Table 5 that the main effect of group under error (A) is 5.31*, $p < .05$ showing the significant differences in the means of control and experimental group. Means for control group is 18.00 and for experimental group it is 14.32.

Regarding the main effect of gender under error (A) F-ratio is 6.69*, $p < .05$ which represents the significant gender differences. Overall means of males and females are 18.15 vs. 15.34 (Table 4). It is visible from the means table that the overall verbal aggression of females is significantly lower than the males. Under error (B), the main effect of treatment is significant at .01 level, F-ratio being 10.88**. It reflects the significant effect of treatment.

The two factor interaction i.e. treatment x group is also significant at .01 level, F-ratio being 65.66** (Table 5).

16 Year c) Indirect Aggression

As far as indirect aggression is concerned, the main effect of group under error (A) is significant at .01 level, F-ratio being 18.05** showing the significant differences between the groups (Table 8). Means for control and experimental group are 38.14 vs. 30.15 (Table7).

The F-ratio for the main effect of gender under error (A) is 3.55* which is significant at .05 level. Overall means of males' in indirect aggression are 38.03 and that of females is 34.07, indicating that the level of indirect aggression among males is significantly higher than females (Table 7). For the main effect of treatment under error (B), the F-ratio is 5.70*, $p < .05$ showing significant treatment effect (Table 8). The two factor interaction of treatment x group is significant at .01 level, F-ratio being 18.08**. In the Mean contingency (Table 9) the experimental groups' mean for pre intervention is 19.05 and post intervention it is 11.10. Pre and post means for control group are 19.09 and 19.05. The interaction table and figure shows a perceptible crossover in the indirect aggression of experimental and control group (Fig. 4 & Table 9)

17 Discussion

Aggressive behaviour can readily be observed in social interactions of children with peers, parents and authority. Either the child has not learnt the better ways of responding to environmental forces or his needs for aggression are so strong that he cannot behave otherwise. The control of aggressive behaviour is very important so that the child can learn to check his rage, discriminate between appropriate and inappropriate situations to behave aggressively and in other words, to modulate/vary his aggressive response to match the degree of provocation to which he may be subjected. Aggression is not unmanageable. With the help of various techniques one can overcome aggression. Just a zeal, enthusiasm and determination to manage it should be there within the individual. Therefore, the emphasis should be on the need for more sensitive measures of at-risk children's psychological and academic changes. Keeping in mind all the facts and problems related to aggressive behaviour an intervention programme was introduced in the present investigation.

In the second section of the study, a 2x2x (2) Repeated Measure Analysis of Variance was employed. High aggressive subjects were divided into two groups i.e. Control group (n = 50) and Experimental group (5 = 50), 25 males and 25 females in each group. Both the groups were assessed on the variables of aggression, before and after the intervention. In the pre test condition, the control and experimental groups were roughly equal on aggression.

It is evident from Table 2, 5 & 8 that the F-ratios for the main effect of groups under error (A) for physical aggression is 22.84**, $p < .01$; for verbal aggression 5.31*, $p < .05$ and regarding indirect aggression, the Fratio is 18.05**, $p < .01$. It clearly shows the significant differences in the means of control and experimental group. The difference in the groups seems to be the result of intervention programme.

As far as interaction effect i.e., treatment x group is concerned, F-ratios for physical aggression is 61.47**, $p < .01$; 65.66**., $p < .01$ for verbal aggression and for indirect aggression, the interaction effect of treatment x group is 18.08**, $p < .01$ (see **??**able 2, **??** & 8).

It is perceptible from the results that the experimental group has been significantly benefited from the intervention programme due to which their aggression has reduced to a significant level in all the three types of aggression. Whereas, for the interaction effect between treatment x gender, the F-ratio has been turned out to be significant 6.20*p<.05 only for physical aggression which shows that the inter-differences between genders are significant at both the ends that is, at the pre-test and post test session owing to treatment and the females have been benefitted more because of their serious disposition and articulation **??** Sharma &Malhotra,2007). Thus, our hypothesis that "intervention programme will be effective in managing aggression" stands confirmed.

For the intervention programme, following techniques were used in the training phase: a) Yogic Techniques

In the present study, deep breathing, kapalbhati, anulom-vilom, bhramari, oral "OM" chanting, meditation and shavasana were taken as yogic techniques in the intervention programme.

18 b) Relaxation Technique (Jacobsons)

A relaxation technique developed by Jacobson was also administered to the experimental group.

19 c) Interpersonal Counselling

Interpersonal counselling was given to the high aggressive subjects of experimental group so that they can express their feelings and problems openly and frankly. Thus, after establishing rapport, subjects were asked to perform the above mentioned techniques regularly. Beside this, they were provided with some tips for encouraging positive behaviour. During the intervention programme the subjects were visited individually and regularly to monitor their practice. Attempt was made to help such students with the help of yogic techniques, relaxation and interpersonal counselling. Interventions that seek to increase protective factors and reduce risk factors can significantly decrease aggressive behavior in children and teens.

Here the main question is how the practices of yoga, relaxation and interpersonal counselling to reform the aggressive children can be utilized? The parent, and the challenges of life cannot be replaced but the child can be taught these techniques and resolve their personal conflicts. The results of the present investigation support this viewpoint. At the end of the intervention programme, changes in aggressive behaviour between pre test and post test were analyzed. It was detected that the experimental group improved significantly in terms of aggression i.e. it was reduced to a significant level.

Pranayama helps in the more oxygen absorption and better carbon dioxide removal by getting most of the energy from air. Cleansing of the respiratory system is the basic task of Pranayama. Pranayama is a Sanskrit word meaning "restraint of the prana or breath". The word is composed of two Sanskrit words, Pr?na, life force, or vital energy, particularly, the breath, and "?y?ma", to suspend or restrain. It is often translated as control of the life force (prana) (Sivananda, 1971). Prana or the life energy contains all the powers of the world. It is the biggest medicine. Pranayama purifies the life energy. Generally, the main reason for any mental or Year any physical problem is the negative thinking and deficiency of oxygen.

Pranayama only works as a solution for all such problems. Aggression is also among such problems and pranayama can help in managing it. Medicine can control diseases for a limited time but the actual cure can be done only with pranayama. Oxygen is that life energy, which is vital for the life. Its deficiency can be fatal. Life is the game of breathes and the life remains balanced with the balance of breathes. A person who understands this synchronization of breathes leads to healthy and disease free life. And the main purpose behind the present research was to help the students managing their aggressive behaviour through these techniques of pranayama.

While doing kapalbhati pranayama the subject is asked to think that while exhaling you are throwing all the diseases out of your body. Individuals with mental aberrations like anger, greed, self-ego attachment, aggression etc. should develop a feeling of throwing out all the negative and injurious elements along with the air exhaled. In this way the feeling of getting rid of diseases while exhaling imparts a special benefit to the individual.

Regular practice of anulom vilom has the capacity of cleansing all innumerable nadis, which makes the body healthy lustrous and strong. Alternate nostril breathing, balances nadis and nervous system, and teaches the person how to induce calmness within him. Negative thinking is replaced by positive approach to life. It increases enthusiasm and the spirit, the sadhak becomes fearless and feels blissful. In short, this pranayama has the effect of cleansing the body and the mind and cures almost all the diseases from which the individuals has been suffering. If this pranayama is practiced for 250 to 500 times a day. Kundalini shakti turns its face upward and begin to rise above through the susumna nadi. It means that the phenomenon known as kundalini jagran begins.

Exercising bhramari pranayama with the thought that your individual consciousness merges with the divine cosmic consciousness, endows you with divine light and helps in meditating effortlessly. With the practice of this pranayama the mind becomes steady. It is beneficial in conditions like mental tension, agitation, etc. The very nature of chanting 'OM' ensures deep breathing and relaxation. Active chanting leaves one's body and mind vibrant. Mind develops a feeling of concentration and peacefulness.

Children are as good as or better able than adults to learn relaxation therapies (Hiebert et al., 1989;Zaichkowsky & Zaichkowsky, 1984). Children seem more enthusiastic about such procedures than adults. Relaxation therapy can also be a positive addition to improving psychosomatic disorders (Richter, 1984) and hyperactive children's impulsivity, disruptive behaviour, academic performance and self-concept (Omizo & Williams, 1982). Ahmad et al. (1988) has also reported that meditators show overall better adjustment and personality organization than non-meditators. Yoga is claimed to endow perfect physical, mental and social well being of an individual. A different set of studies by Muskatel et al. (1984) and Hafner (1982) show that meditation practice can be effective in reducing hostile behaviours. Similarly, relaxation therapy, such as progressive muscular relaxation (PMR) and meditation seems to be equally effective as cognitive therapy in reducing symptoms of hostility (Deffenbacher, et al., 1990).

On a subjective level, regular practice of yoga promotes strength, endurance and flexibility and cultivates a sense of calmness and well being. Yoga students normally report an improved sense of energy to lead life fully with enjoyment (Mehta et al., 1995), which is the opposite of fight/flight stress response. In this regard, Collins

(1998) suggested that regular practice of yoga leads to overall physical and psychological well being. The very aim of yoga is the harmonic integration of the body, mind and spirit in search of perfect health, self awareness and spiritual attainment.

Yoga and meditation can contribute positively to various cognitive processes including perception and in turn, on subjective well-being, quality of life and criminal propensity (Khurana & Dhar, 2000). A study by Ghosh (2003) revealed that recitation of "OM" usually gives rise to sensations, feelings and experience of positive nature improves the cognitive functioning such as attention, concentration, perception etc. In the same way individual-oriented intervention seems to be more effective than group-oriented programme. George et al. (1998) administered cognitive behavioural intervention to a single patient. The fact that the intervention was focused on a single individual implies greater motivational force of the intervention.

In the present study, yogic exercises were administered, where each individual from high aggressive group (experimental group) was contacted individually. In such situations, intensive individualfocused attention and consequent motivational force was much more. Therefore, subjects from experimental group benefited more as compared to the control group.

20 IX.

21 Limitations

The present study was an attempt to investigate the effect of intervention programme on aggression. As no research work is without any limitations, therefore, we turn now to discuss some limitations of the present study. First, separate effect of intervention techniques should have been observed rather than the combined effect in order to determine the individual/separate contribution of these techniques (Yoga, relaxation and interpersonal counselling). Therefore, the future researches should take note of this. Another concern is that the samples used were from Himachal Pradesh (INDIA), limiting our ability to generalize the findings. Nonetheless, the present findings are highly significant, hence, can be generalized and can act as a guide for further research in the field of human aggression. The fact that the participants were taken from a particular area of India and moreover in India sex differences appear to be greater in aggression in comparison with those in the west. Therefore, the results were scored according to gender. Moreover, the differences in cultural norms and status between the sexes cannot be ignored. During interpersonal counselling subjects were told about the benefits of yoga, demerits of aggressive behaviour and were provided with few tips with the help of which they can manage their aggressive behaviour and increase their concentration level and academic achievement. Their personal or familial problems were also discussed, which they feel was responsible in aggravating their aggressive behaviour. With the help of interpersonal counselling it is easy to instil a higher selfconcept and an attitude of inner discipline, as here we deal with the subjects individually and the subjects also feel free in sharing their personal problems. Another possible study might include a larger number of participants. Another possibility might include more different schools with similar demographics that might show different results. Future research could also include different age groups of children. There is minimal research on yoga with younger children. Younger children may show aggression differently and may not have developed coping skills for aggression. Older children, such as middle school students, may also perceive aggression differently. Comparing the effectiveness of yoga for a broad age range of children would be an interesting study.

22 X.

23 Conclusion

In dealing with aggressive adolescents, one must remember that they are generally not receptive, cooperative or obedient, and a person attempting to teach them yoga practices may become easily frustrated when confronted by a negative, resentful child. Yoga cannot be forced on anyone; it is up to the counsellor to devise ways of introducing these techniques so that they appeal to the child. If an adolescent can experience even a brief period of mental relaxation, he/she will gain some insight into his own behaviour. In such cases interpersonal counselling plays a very important role and the results of the study confirm this viewpoint. Hence, a complete package of yogic techniques, relaxation technique and interpersonal counselling procedures are highly efficacious in managing aggression as the failure of one technique can be taken by the other. These techniques help in alleviating aggression and bring out better concentration level, academic achievement and the best in the individual.

In a nutshell, it can be said that yoga alone offers a relaxed outlook in life. A rested mind and a rested body are the best kind of health insurance. It is from the rested mind that the entire beneficial cycle stats. In psychoanalytical language yoga helps us to conquer the neurotic personality of our times and makes the mind peaceful and happy. Chanting of OM stimulates the brain cells resulting in their reactivation and ultimately leading to better concentration (Ghosh, S.K. 2003). It is rightly said -"If you wish to change the society, first change yourself and through yoga man can find his zest for life". Yoga bestows on man healthier and happier life. Yogasanas give suppleness to the spine tree of our life by calming the tired nerves, relaxing the muscles, revitalizing the organs and nervous system thereby increasing the power of concentration and ultimately leading to achievement in any sphere.

Figure 1: O

460 [1]

Figure 2:

Figure 3: VolumeYear

Figure 4:

Figure 5:

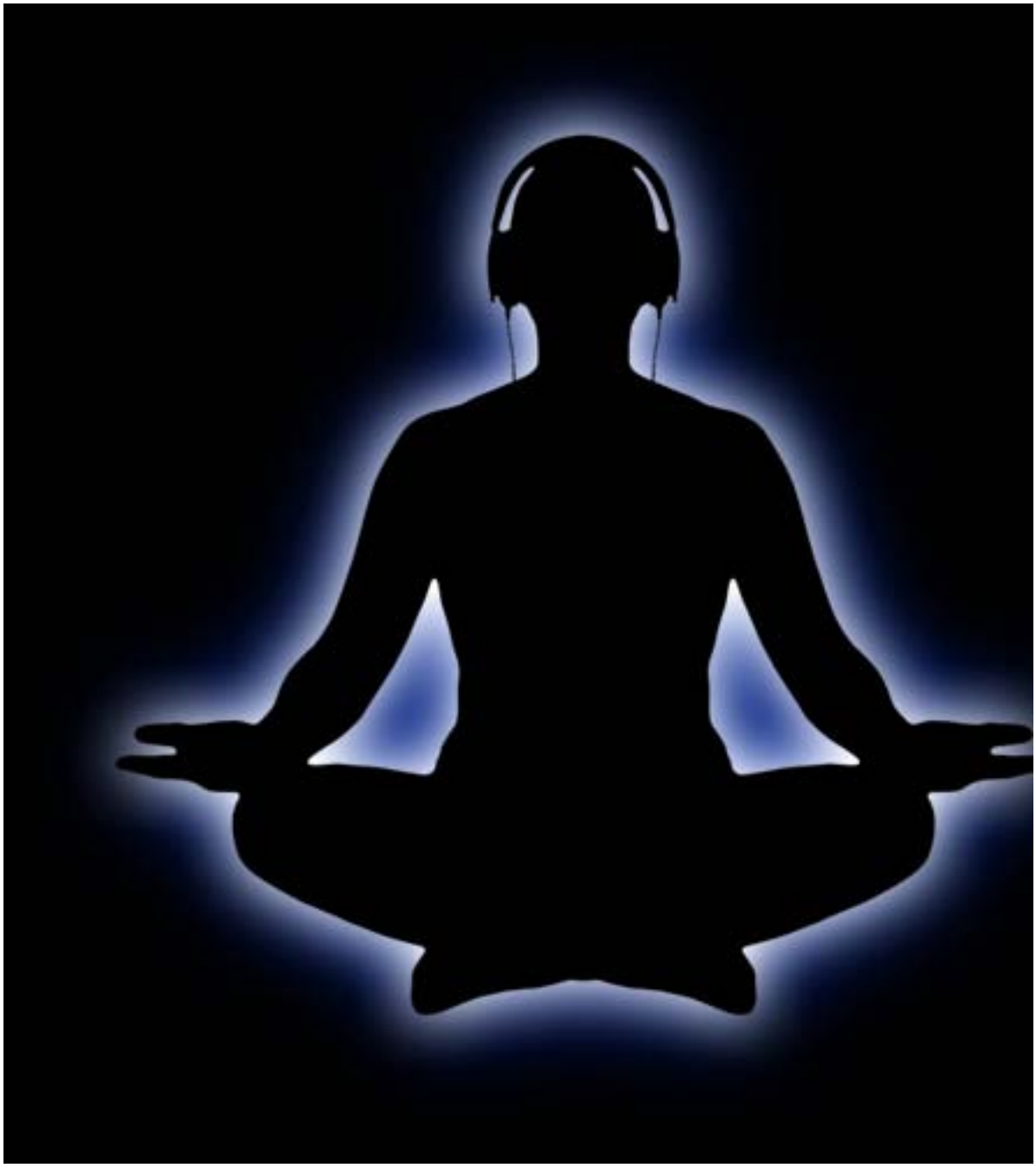

Figure 6:

Figure 7:

2

Figure 8: Table 2

1

Figure 9: Table 1

1

Variable	Males	Females	Control	Experimental	Pre treatment	Post treatment
Physical Aggression	20.85	14.75	21.19	16.46	21.19	16.46

Figure 10: Table 1 :

2

Source of Variance	Sum of Squares	df	MSV	F-ratio
	Error A Between Groups			
Group	339.45	1	339.45	22.84**
Gender	954.88	1	954.88	64.25**
Group x Gender	16.20	1	16.20	1.09
Error (A)	1427.46	1	1427.46	
		96		
	Error B within Groups			
Treatment	129.50	1	229.50	27.78**
Treatment x Group	507.75	1	507.75	61.47**
Treatment x Gender	51.53	1	51.53	6.20*
Treatment x Gender x Group	5.00	1	5.00	.61
Error (B)	729.71	96	8.26	
Total	4224.48	199		
p < .05; ** p <.01				

Figure 11: Table 2 :

3

	Means of Treatment x Group		Means of Treatment x Gender	
Treatment	Control	Experimental	Males	Females
Pre	10.49	12.80	12.80	9.55
Post	10.70	5.76	8.05	5.20

Figure 12: Table 3 :

4

Variable	Males	Females	Control	Experimental	Pre treatment	Post treatment
Verbal Aggression	18.15	15.34	18.00	14.32	18.00	14.32

Figure 13: Table 4 :

5

Source of Variance	Sum of Squares	df	MSV	F-ratio
	Error A Between Groups			
Group	127.81	1	127.81	5.31*
Gender	161.11	1	161.11	6.69*
Group x Gender	34.20	1	34.20	1.42
Error (A)	2309.07	96	24.05	
	Error B Within Groups			
Treatment	66.05	1	66.05	10.88**
Treatment x Group	398.61	1	398.61	65.66**
Treatment x Gender	4.61	1	4.61	.75
Treatment x Gender x Group	.70	1	.70	.12
Error (B)	582.92	96	6.07	
Total	3685. 08	199		

Through contingency table the pre and post means can be compared i.e. pre and post means of experimental group are 8.95 vs. 5.37, while that of control group are 9.05 vs. 8.95 (Table 6).

Figure 14: Table 5 :

6

		Means of Treatment x Group	
	Treatment	Control	Experimental
	Pre	9.05	8.95
	Post	8.95	5.37

Figure 4 : Interaction Effects of Experimental Group and Control Group in Verbal Aggression

	Interaction Effect of Treatment X Group	
10	8.95	
8	9.05	8.95
6	Means of Control Group	5.37
4		
0 2	Means of Experimental Group	
	Pre	Post

[Note: A 2 42]

Figure 15: Table 6 :

7

Variable	Males	Females	Control	Experimental	Pre treatment	Post treatment
Indirect Aggression	38.03		34.07	38.14 30.15	38.14	30.15

Figure 16: Table 7 :

8

Source of Variance	Sum of Squares	df	MSV	F-ratio
	Error A Between Groups			
Group	1508.15	1	1508.15	18.05**
Gender	296.51	1	296.51	3.55*
Group x Gender	15.88	1	15.88	.19
Error (A)	8016.97	96	83.51	
	Error B within Groups			
Treatment	512.72	1	512.72	5.70*
Treatment x Group	1625.12	1	1625.12	18.08**
Treatment x Gender	44.54	1	44.54	.49
Treatment x Gender x Group	29.25	1	29.25	.32
Error (B)	8625.60	96	89.95	
Total	20674.74	199		

$p < .05$; ** $p < .01$

Figure 17: Table 8 :

9

	Means of Treatment x Group	
Treatment	Control	Experimental
Pre	19.09	19.05
Post	19.05	11.10

Figure 18: Table 9 :

[East West Psychology National Award Lecture on] , *East West Psychology National Award Lecture on* 4.

[Homewood] , I L Homewood . Dorsey Press.

[Canadian Journal of School Psychology] , *Canadian Journal of School Psychology* 17 (1) p. .

[Deffenbacher et al. ()] 'A combination of cognitive, relaxation, and behavioural coping skills in the reduction of general anger'. J L Deffenbacher , K Mcnamara , R S Stark , P M Sabadell . *Journal of College Student Development* 1990. 31 p. .

[Wheeler and Wilkin ()] 'A study of the impact of yoga Asana on perceived stress, heart rate, and breathing rate'. A Wheeler , L Wilkin . *International Journal of Yoga Therapy* 2007. 17 p. .

[Coie and Dodge ()] 'Aggression and Antisocial Behaviour'. J D Coie , K A Dodge . *Handbook of Child Psychology: Social, Emotional, and Personality Development*, W Damon (series Ed, N Eisenberg (ed.) (New York) 2000. Wiley. 3 p. .

[Omizo and Williams ()] 'Biofeed backinduced relaxation training as an alternative for the elementary school learning disabled child'. M M Omizo , R E Williams . *Biofeedback and Self Regulation* 1982. 7 p. .

[Muskatel et al. ()] 'Effect of meditation training on aspects of coronary-prone behaviour'. N Muskatel , R L Woolfolk , P Carrington , P M Lehrer , B S Mccann . *Perceptual and Motor Skills* 1984. 58 p. .

[Khurana and Dhar ()] *Effect of vipassana meditation on quality of life, subjective well-being, and criminal propensity among inmates of tihar jail, Delhi, Final Report Submitted to Vipassana Research Institute*, A Khurana , P L Dhar . 2000. (Research Paper on Tihar Jail Inmates)

[Ghosh ()] 'Effects of physical exercises, yogic practices and their combined training on selected physiological variables among high school males'. S K Ghosh . *Yoga Mimamsa* 2003. 35 (182) p. .

[Robins ()] 'Epidemiological approaches to natural history research: Antisocial disorders in children'. L N Robins . *Journal of the American Academy of Child Psychiatry* 1981. 20 p. .

[Dollard et al. ()] *Frustration and Aggression*, J Dollard , L W Doob , N E Miller , O H Mowrer , R R Sears . 1939. New Haven, CT: Yale University Press.

[Baron and Richardson ()] *Human Aggression*, R A Baron , D Richardson . 1994. New York: Plenum Press.

[Rutter and Giller ()] *Juvenile delinquency trends and perspectives*, M Rutter , H Giller . 1983. New York: Penguin Books.

[George et al. ()] 'Modification of the Type A behaviour pattern in coronary heart disease: A cognitive-behavioural programme'. I M George , P S D V Prasadarao , V Kumaraiah , S T Yavagal . *NIMHANS Journal* 1998. p. .

[Stirtzinger et al. ()] *Multimodal School-Based Intervention for at Risk, Aggressive, Latency-Age Youth*, R Stirtzinger , L Campbell , A Green , C Desouza . 2001.

[Loeber ()] 'Patterns and development of antisocial child behaviour'. R Loeber . *Annals of Child Development*, G J Whilehurst (ed.) (New York) 1985. JAI Press. p. .

[Sharma and Malhotra ()] *Personality and social norms*, A Sharma , D Malhotra . 2007. New Delhi: Concept Publications.

[Ahmad et al. ()] 'Personality study of individuals regularly practicing transcendental meditation technique'. S Ahmad , H Ahmjad , S S Sumboo . *Journal of Personality and Clinical Studies* 1988. 4 (1) p. .

[Cowen and Adams (2005)] 'Physical and perceptual benefits of yoga asana practice: Results of a pilot study'. V Cowen , T Adams . www.intl.elsevierhealth.com/journals/jmbt *Journal of Bodywork and Movement Therapies* 2005. January 25, 2009. 9 p. .

[Jacobson ()] *Progressive Relaxation*, E Jacobson . 1938. Chicago: University of Chicago Press.

[Hafner ()] 'Psychological treatment of essential hypertension: A controlled comparison of meditation and meditation plus biofeedback'. R J Hafner . *Biofeedback and Self-Regulation* 1982. 7 (3) p. .

[Muris et al. ()] 'Reducing Children's Aggressive and Oppositional Behaviours in the Schools: Preliminary Results on the Effectiveness of a Social-Cognitive Group Intervention Program'. P Muris , C Meesters , M Vincken , B A Eijkelen . *Child and Family Behaviour Therapy* 2005. 27 (1) p. .

[References Références Referencias] *References Références Referencias*,

[Sivananda ()] 'Regulation of breath or the control of Prana'. S Sivananda . *The Science of Pranayama. Divine Life Society. Available online as: The Science of Pranayama by Sri Swami Sivananda*, 1971.

[Rana ()] *Relationship of personality and family environment with aggression and the effect of intervention programme on aggression. (unpublished) PhD thesis*, M Rana . 2007. India. Department of Psychology. Himachal Pradesh University

[Hiebert et al. ()] 'School based relaxation: Attempting primary prevention'. B Hiebert , B Kirrby , A Jaknovorian . *Canadian Journal of Counselling* 1989. 23 p. .

[Bjorkqvist et al. ()] *The direct and indirect aggression scales*, K Bjorkqvist , K M J Lagerspetz , K Osterman . 1992.

[Zaichkowsky and Zaichkowsky ()] 'The effects of a school based relaxation training program on 4 th grade children'. L B Zaichkowsky , L D Zaichkowsky . *Journal of Clinical Child Psychology* 1984. 13 p. .

[Richter ()] 'The efficacy of relaxation training with children'. N C Richter . *Journal of Abnormal Child* 1984. 12 p. .

[Kazdin ()] *Treatment of antissocial behaviour in children and adolescents*, A E Kazdin . 1985.

[Mehta et al. ()] *Yoga the iyenkar way*, S Mehta , M Mehta , S Mehta . 1995. New York: Alfred A. Knoff Company.

[Collins ()] 'Yoga: intuition, preventive medicine and treatment'. J Collins . *Journal of Obstetrics, Gynaecology and Neonatal Nursing* 1998. 27 (5) p. .

[Rao ()] 'Yoga: Its scientific and applied aspects'. Krishna Rao , PV . *Journal of Indian Psychology* 1995. 13 (2) p. .

[Bhushan ()] *Yogic lifestyle and psychological well-being*, L I Bhushan . 1998. (Paper Presented as S.P)