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EFFECT OF e-CONTENT ASSISTIVE AND IMAGERY SPECIFIC TRAINING WITH TRADITIONAL TRAINING ON SELECTEDSKILL PERFORMANCE VARIABLES OF INTERCOLLEGIATE CRICKET PACE BOWLERS

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Abstract:

The purpose of the study was to determine the effect of e-content assistive and imagery specific training with traditional training on selected skill performance variables of intercollegiate cricket pace bowlers. To achieve the purpose, twelve intercollegiate cricket pace bowlers were randomly selected from the Maruthi College of Physical Education and Ramakrishna Mission Vivekananda University, Periyanaickenpalayam, Coimbatore. The age of the subjects ranged from 18 to 25 years. The selected subjects were considered as only one group. The following criterion variables were selected for the study namely, bowling speed, bowling accuracy and bowling ability. The training period was for twelve weeks except on Saturdays and Sundays in every week. Data were collected from each subject before and after the twelve weeks ofe-content assistive and imagery specific training with traditional training. The collected data were statistically analyzed by using 't' ratio. It was found that there is significant improvement in bowling speed, bowling accuracy and bowling ability due to the treatment ofe-content assistive and imagery specific training with traditional training.

Key Words: e-Content Assistive Training, Imagery Specific Training, Traditional Training&Skill Performance

Introduction:

Sport consists of a physical and mental competitive activity that is carried out either with a recreational purpose, for competition, for self-enjoyment, to attain excellence, for the development of a skill, or for some combination of these. Sport is a physical activity, side by side competition, self-motivation and a scoring system. The difference of purpose is what characterizes sport, combined with the notion of individual (or team) skill or prowess (David Arnaheim, 1987).

The development of modern cricket's popularity received its biggest boost in 1971 because of a fluke. Instead of a normal cricket match, which can last for three or four days, a rainout in Melbourne of the start of a big match led to the One-Day International Match. The ODI lured 46,000 fans and more ODIs were scheduled. ODI matches feature more scoring, which appeals to fans, as do the limited duration of the contests. Now ODI matches are the standard for the World Cup of Cricket, which began in 1975 and is contested at four-year intervals**(**Harte, Chris, 1993).

An educational technology pioneer advocated that the "e" of e-learning should be interpreted to mean "exciting, energetic, enthusiastic, emotional, extended, excellent, and educational" in addition to "electronic"[Bernard Luskin,2002].

"Traditional (conventional) exercise programmes are commonly thought to involve exercises that isolate specific muscles in order to increase strength more effectively" [McGill., et al. (2009)].

Imagery conducted for sport performance is referred to as sport imagery, but can be used interchangeably with the broader term mental imagery (Taylor & Wilson, 2005). Several other terms including mental practice, mental rehearsal and visualization have also been used to refer to various components of mental imagery in sport (Morris, Spittle and Watt's, 2005; Taylor & Wilson, 2005; Weinberg & Gould, 2007).

"Sports training is a planned and controlled process in which, for achieving a goal, changes in complex sports motor performance, ability to act and behavior are made through measures of content, methods and organization"[Martin, 1979].

Fast bowling, is sometimes known as pace bowling, in the sport of cricket. Practitioners are usually known as fast bowlers, fast men, pace bowlers, quick's, or pace men, although sometimes the label refers to the specific fast bowling technique the bowler prefers, such as swing bowler or seam bowler. The aim of fast bowling is to bowl the hard cricket ball at high speed and to induce it to bounce off the pitch in an erratic fashion or move sideways through the air, factors which make it difficult for the batsman to hit the ball cleanly.A typical fast delivery has a speed in the range of 137–153 km/h (85–95 mph).

Hypothesis:

It was hypothesized that there would be a significant difference between the pretest and posttest due to e-content assistive and imagery specific training with traditional trainingon selectedskill performance variables of intercollegiate cricket pace bowlers.

Methodology:

The purpose of the study was to find out the effects ofe-content assistive and imagery specific training with traditional training on selected skill performance variables of intercollegiate cricket pace bowlers. To achieve the purpose of the study, twelve intercollegiate cricket pace bowlers were selected as subjects from the Maruthi College of Physical Education and Ramakrishna Mission Vivekananda University, Periyanaickenpalayam, Coimbatore, Tamil Nadu by applying random sampling method. The age of the subjects ranged from eighteen to twenty five years. The selected subjects were considered as one group. The following criterion variables were selected for the study namely, bowling speed, bowling accuracy and bowling ability. The training period was for twelve weeks except on Saturdays and Sundays of every week.

Criterion Measures:

The selected tests were measured by the following units of testing the hypothesis.

Skill Performance Variables:

- Doppler's radar gun test was used to find out bowling speed.
- Bowling accuracy test was used to find out bowling accuracy.
- Subjective rating test was used to find out bowling ability.

Training Programme:

The e-content assistiveand imagery specific training with traditional training was given to the subjects. The training period was for twelve weeks except on Saturdays and Sundays of every week. The following exercises were given to the subjects namely,Video based learning, Experts views, Image based learning, Imagery method, Hip rotation, Angle rotation, Slight jump, Alternate toe touch, Skipping, Calf stretch, Modified hurdler stretch, Butterfly stretch, Straddle stretch, Side quad stretch, High Knees, High Skipping, Skipping Kicks, Upper back side stretch, Wrist flexion stretch, Rotating wrist stretch, Elbow out rotator stretch, Standing Toe-up Achilles stretch, Five-

Cone running, Cock accuracy throws, Cock distance throw, Diagonal stepping, Diagonal leaps, Shadow Play, Court coverage, Long rallies, Ball collection, "M" formation runs, Medicine Ball Tosses, Overhead Toss, Forward Toss, Side Toss, Triceps Toss. Pre and post-test were conducted prior to and after the intervention.

Statistical Technique:

Correlated dependent't' ratios was calculated to find out the significant difference between the mean of pre and post-tests of the group.

Results and Discussion: e-Content Assistive and Imagery Specific Training with Traditional Training Group on Bowling Speed

The data obtained on bowling speed as a result of e-content assistive and imagery specific training with traditional trainingwere analyzed using the 't' ratio and are presented in table -I.

Table I: Table Showing Mean Difference Standard Deviation and 't' Value of e-Content Assistive and Imagery Specific Training With Traditional Training Group On Bowling Speed

Group	Mean	MD	SD	Std. Error of the mean	DF	Correlation	't'	Table value
Pre test	104.09	5.69	2.87	0.83	11	0.91	6.86*	2.20
Post-test	109.78							

* Significant at 0.05 level of confidence

To find out the significant difference between the pre- test and post- test on the bowling speed of the e-content assistive and imagery specific training with traditional traininggroup,'t' ratio is employed and the level of significance was set at 0.05. Thee-content assistive and imagery specific training with traditional training groups pre- test value is 104.09 and post- test value is 109.78. The mean difference value is 5.69and theobtained 't' ratio is 6.86 and is higher than the table value of 2.20. It shows that thee-content assistive and imagery specific training with traditional traininggroup had significant improvement on the bowling speed. Pre- test and post- test results of e-content assistive and imagery specific training with traditional training group on bowling speed are presented in figure 1.

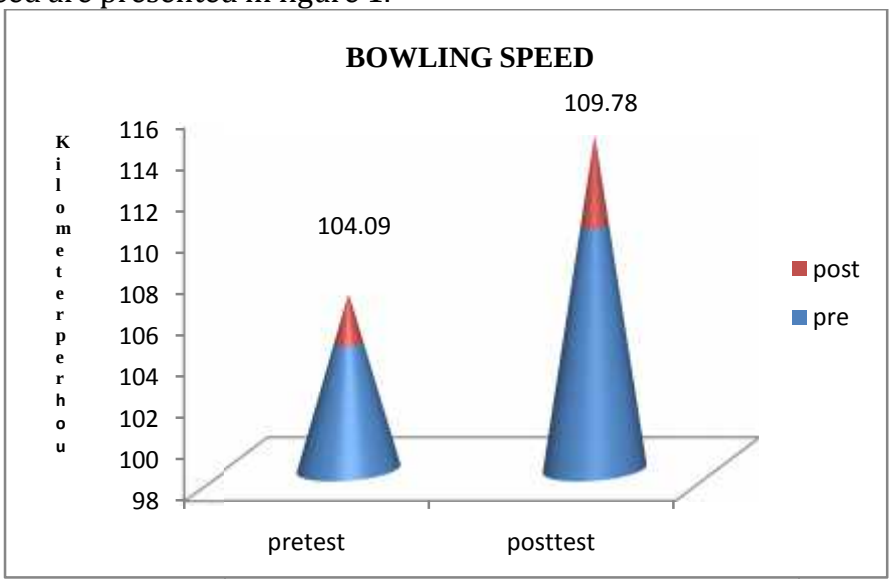

Figure 1: Figure Showing Mean Values of e-Content Assistive and Imagery Specific Training with Traditional Training on Bowling Speed e-Content Assistive and Imagery Specific Training with Traditional Training on Bowling Accuracy

The data obtained on bowling accuracy as a result of the e-content assistive and imagery specific training with traditional training were analyzed using the 't' ratioand are presented in table – II.

Table II: Table Showing Mean Difference Standard Deviation and 't' Value of e-Content Assistive And Imagery Specific Training With Traditional Training Group on Bowling Accuracy

Group	Mean	MD	SD	Std. Error of the mean	DF	Correlation	't'	Table value
Pre test	142.08	11.75	7.62	2.20	11	0.65	5.34*	2.20
Post-test	153.83							

* Significant at 0.05 level of confidence

To find out the significant difference between pre-test and post- test on bowling accuracyof e-content assistive and imagery specific training with traditional traininggroup,'t' ratio is employed and the level of significance was set at 0.05. The e-content assistive and imagery specific training with traditional traininggroups pre- test value is 142.08and post- test value is 153.83. The mean difference value is 11.75and the obtained 't' ratio is 5.34and is greater than the table value of 2.20. It shows that the e-content assistive and imagery specific training with traditional training group showed a significant improvement on bowling accuracy.

Pre- test and post- test results of e-content assistive and imagery specific training with traditional training group on bowling accuracy are presented in figure 2.

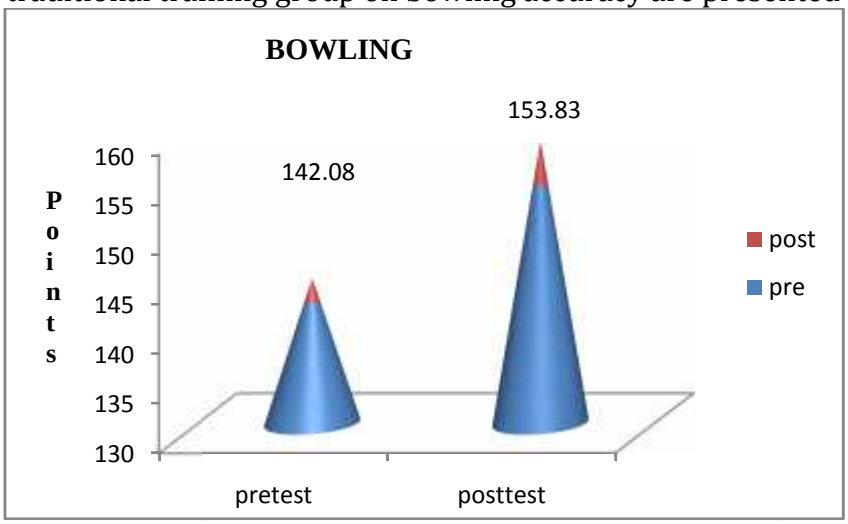

Figure 2: Figure Showing Mean Values of e-Content Assistive and Imagery Specific Training with Traditional Training Groupon Bowling Accuracy e-Content Assistive and Imagery Specific Training with Traditional Training onBowling Ability

The data obtained on bowling ability as a result of thee-content assistive and imagery specific training with traditional traininggroup were analyzed using the 't' ratio and are presented in table III.

Table III: Table Showing Mean Difference Standard Deviation and 't' Value of e-Content Assistive and Imagery Specific Training with Traditional Training Group on Bowling Ability

Group	Mean	MD	SD	Std. Error of the mean	DF	Correlation	't'	Table value
Pre test	6.08	2.21	0.66	0.19	11	0.08	11.67*	2.20
Post-test	8.29							

* Significant at 0.05 level of confidence

To find out the significant difference between pre- test and post- test on bowling ability of e-content assistive and imagery specific training with traditional traininggroup, 't' ratio is employed and the level of significance was set at 0.05. The e-content assistive and imagery specific training with traditional training groups pre- test value is 6.08and post- test value is 8.29. The mean difference value is 2.21 and the obtained 't' ratio is 11.67 and is greater than the table value of 2.20. It shows that the e-content assistive and imagery specific training with traditional traininggroup showed significant improvement on bowling ability.

Pre-test and post- test results of e-content assistive and imagery specific training with traditional traininggroup on bowling ability are presented in figure 3.

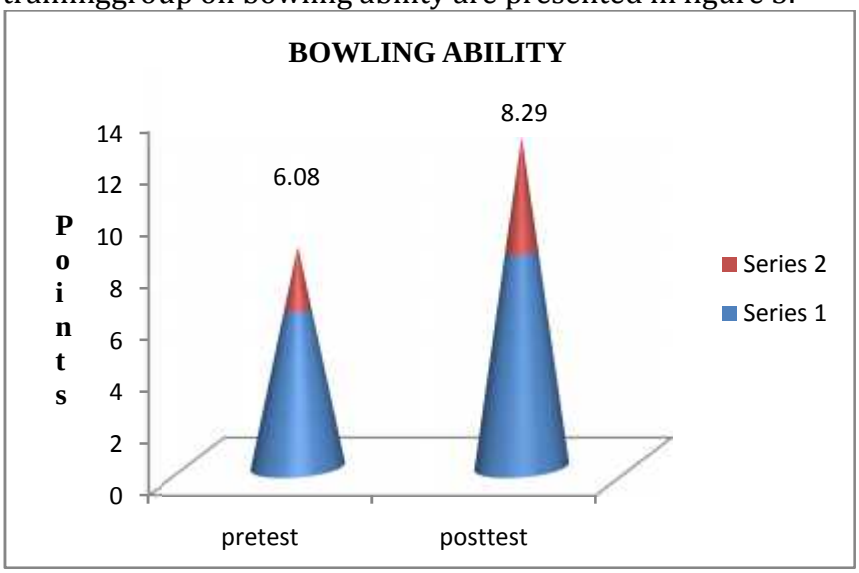

Figure 3: Figure Showing Mean Values of e-Content Assistive and Imagery Specific Training with Traditional Training Group on Bowling Ability

Discussion on Findings:

The prime intention of the researcher was to analyze the e-content assistive and imagery specific training with traditional training on the selected skill performance variables of inter-collegiate cricket pace bowlers. The results of the study indicated that the e-content assistive and imagery specific training with traditional training had significantly influenced skill performance variables namely, bowling speed, bowling accuracy and bowling ability. Thus, it stands proved that the selected training means had influenced the criterion variables.

The results of the present study indicated that the e-content assistive and imagery specific training with traditional training impacted significantly the progress of the subjects as far as the bowling speed, bowling accuracy and bowling ability of the cricket pace bowlers was concerned.

Therefore, cricket pace bowlers ought to possess the bowling speed, bowling accuracy and bowling ability for ability to bowl balls at high speed, thereby making it difficult for the batsmen or even get cleanly bowled to hit the ball; for bowling precisely at the right spot; make it difficult for the batsmen to hit the ball and to take wickets; for their overall performance as bowlers in any situation. The systematic and scientific imparting of these training regimens was advantageous in improving the bowling speed, bowling accuracy and bowling ability of the players.The results of the study have also been supported by the following authors Marshall & Ferdinands (2003), Portus ., et al (2004), David ., et al (2009), Phillips ., et al (2012), Bartlett ., et al (1996), Elliott ., et

al (2005),whose studies brought about similar results as far as improvement on bowling speed, bowling accuracy and bowling abilitywent.

Conclusions:

It was concluded that the selected skill performance variables namely, bowling speed, bowling accuracy and bowling ability significantly improve due to the e-content assistive and imagery specific training with traditional training.

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