CHAPTER-V

SUMMARY, GENERAL CONCLUSION AND RECOMMENDATIONS
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RECOMMENDATIONS

5.1 SUMMARY

The purpose of the study was to find the relationship of physiological, coordinative and psychomotor variables to the performance of male volleyball players. One hundred interuniversity male volleyball players were selected. The subjects were explained about the objectives of the study. The data was obtained from Himachal University Shimla, Punjabi University, Patiala, Panjab University, Chandigarh, G.N.D.U, Amritsar, Kurukshetra University, Kurukshetra and Punjab Agriculture University, Ludhiana. On the basis of available literature in Coordinative ability, Exercise Physiology, Body Composition and Psychomotor Variables the following variables were selected for the study:

I. Coordinative ability
   a) Differentiation Ability
   b) Orientation Ability
   c) Balance ability
   d) Rhythm Ability
   e) Reaction Ability

II. Psychomotor variables
   a) Speed
   b) Agility
c) Speed of Movement  
d) Response Time

**III. Physiological variables**

a. Vital Capacity  
i. FVC (Forced Expiratory Vital Capacity)  
b. VO\textsubscript{2} max (Maximum Oxygen Consumption)  
c. Body Mass Index (BMI)

The purpose of study was further extended to find out the relationship or to compare the physiological, coordinative and psychomotor variables to the performance of volleyball players. With regard to this purpose of the study statistical techniques of rank order, partial co-relation and multiple co-relations was applied to find out relationship. Level of significance was fixed at 0.05.

The results showed that there were significant relationship of Coordinative Abilities i.e. Differentiation Ability, Orientation Ability, Balance, Rhythm and Reaction Ability to the performance of volleyball players.

For Psychomotor variables analysis it was found that there were significant relationship for Speed, Agility, Response Time and Speed of Movement to the performance of volleyball players.

The study revealed that the selected Physiological Variables that is Vital Capacity (Forced Vital Capacity, Peak Expiratory Flow and Peak Inspiratory Flow) Body Mass
Index and VO₂ max. have significant relationship to the performance of volleyball players.

5.2 STATEMENT OF THE PROBLEM

Keeping in view the importance of coordinative, psychomotor and physiological variable to the performance of male interuniversity volley ball players. The investigator has undertaken the problem for investigation stated as under

The purpose of the study is to determine the relationship of selected coordinative, psychomotor and physiological abilities to the performance in volleyball.

5.3 OBJECTIVES

1. To study the relationship of coordinative ability to the performance in volley ball.
2. To study the relationship of psychomotor ability to the performance in volley ball.
3. To study the relationship of physiological ability to the performance in volley ball.
4. To find out the partial relationship of volley ball performance between two of the three variables.
5. To find out the multiple co-relation between volley ball performance and composite score of all the three variables.

5.4 HYPOTHESES

Following hypothesis were formulated for the present study
1. There would be no significant relationship of selected Coordinative abilities to the performance in volleyball.

2. There would be no significant relationship of selected Psychomotor abilities to the performance in volleyball.

3. There would be no significant relationship of selected Physiological abilities to the performance in volleyball.

4. There would be no significant partial relationship of volleyball performance between the two of the three variables.

5. There would be no significant multiple co-relation between volleyball performance and composite score of all the three variables.

5.5 DELIMITATIONS

1. This study is delimited to Interuniversity Volleyball Male players only who had represented their university team in Inter University North Zone tournament.

2. The study is delimited to 100 male volleyball players only of Himachal University Shimla, Punjabi University, Patiala, Panjab University, Chandigarh, G.N.D.U, Amritsar, Kurukshetra University, Kurukshetra and Punjab Agriculture University, Ludhiana.

3. The study is delimited to the following Coordinative Ability:-
   a) Orientation ability
   b) Differentiation ability
   c) Reaction ability
4. The study will be delimited to following Psychomotor Ability:-
   a) Speed
   b) Agility
   c) Speed of movement
   d) Response Time

5. The study will be delimited to following physiological variables:-
   a) BMI
   b) VO2 Max
   c) Vital Capacity

5.6 LIMITATION

Variation in performance due to motivational factors which affect the study will be considered as limitation of study.

5.7 SELECTION OF SUBJECTS

For the purpose of the study 100 Volley ball players were selected as subjects (100 Inter university male Volley ball players of Himachal University Shimla, Punjabi University, Patiala, Panjab University, Chandigarh, G.N.D.U, Amritsar, Kurukshetra University, Kurukshetra and Punjab Agriculture University, Ludhiana). The subjects were thoroughly acquainted with the testing procedure as well as the purpose and significance of the study. A thorough orientation of requirements during the testing
procedures and performance test were made for successful completion of study. They were requested by the scholar to cooperate and to participate with utmost sincerity. Everything regarding the tests was made clear and finally requested to participate whole heartedly in the present study.

5.8 CONCLUSION

On the basis of result obtained from the study, following conclusion were drawn:

1. There was significant relationship between selected coordinative abilities to the performance of volley ball players, independently or as a whole.

2. There was significant relationship between selected psychomotor abilities to the performance of volley ball players, independently or as a whole.

3. There was no significant relationship between selected physiological abilities to the performance of volley ball players, independently or as a whole.

4. This study also indicated that development of different selected coordinative abilities, Psychomotor abilities and Physiological abilities may be considered as an essential factor to achieve the best performance by Volley ball players.

5. Further it can also be concluded that minimum level of the coordinative abilities, Psychomotor abilities and Physiological abilities might not be enough for the performance of Volleyball Players.
5.9 RECOMMENDATIONS

Based on the conclusions drawn in this study the following recommendations have been made:

1. Similar Studies can also be conducted on female volleyball players.

2. The study may be undertaken with large number of variables.

3. Similar study may be undertaken to analyze the other game players and athletes.

4. Similar study may be conducted by using more sophisticated equipment’s of different level.

5. This study can be conducted on International teams.