

**COMPARATIVE STUDY ON SKILL RELATED PHYSICAL FITNESS
AND CARDIOVASCULAR ENDURANCE OF HILL AND PLAIN
AREAS FOOTBALL PLAYERS**

**BY
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**SUBMITTED TO
VIDYASAGAR UNIVERSITY**



**DEPARTMENT OF PHYSICAL EDUCATION
MUGBERIA GANGADAR MAHAVIDYALAYA
FOR THE DEGREE OF MASTER OF PHYSICAL EDUCATION
BHUPATINAGAR, PURBA MEDINAPUR
WEST BENGAL, PIN -721425**

AUGUST-2023

DEDICATED
TO
MY LOVELY PARENTS (AAMA, AAPA, BARA)
TEACHERS
&
FRIENDS

APPROVEDBY

Mimu seikh.

Signature of the Supervisor
(Dr. MIMU SEIKH)

DEPARTMENT OF PHYSICAL EDUCATION
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Dr. Mimu Seikh

Assistant Professor (SACT)

Ref.No: MGM/2021-2023

Date: 16.08.2023

This is to certify that that Mr. Puspa Raj Tamang is a regular student of Mugberia Gangadhar Mahavidyalaya under Vidyasagar University, in the season of 2021-2023. For the Master of Physical Education, semester-IV, carried out his research study under my supervision and guidance in lieu of the requirements for the master of Physical Education degree with his thesis entitled “COMPARATIVE STUDY ON SKILL RELATED PHYSICAL FITNESS AND CARDIOVASCULAR ENDURANCE OF HILL AND PLAIN AREAS FOOTBALL PLAYERS” the material and data composed from students in this study are genuine and were collected by him.

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Place– Mugberia

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This is to certify that Mr./Miss.

Roll ^{PG/VUEGS32/PEDIVS} Number 21028 a PG / UG student of

SEM IV Department of PHYSICAL EDUCATION has

successfully completed a dissertation / ~~project~~ entitled COMPARATIVE STUDY

ON SKILL RELETED PHYSICAL FITNESS AND CARDIOVASCULAR

ENDURANCE OF HILL AND PLAIN AREAS FOOTBALL PLAYERS

for the paper MPCC-403 in the year 2023

Signature of HOD

Signature of Principal

Date : 16.08.2023

Principal
Mugberia Gangadhar Mahavidyalaya

DECLARATION

I do here by declare that the research work entitled “COMPARATIVE STUDY ON SKILL RELATED PHYSICAL FITNESS AND CARDIOVASCULARE NDURANCE OF HILL AND PLAIN AREAS FOOTBALL PLAYERS” is an original piece of work done by me under the supervision and guidance of Dr. Mimu Seikh, Assistant Professor (SACT), Mugberia Gangadhar Mahavidyalaya. I have specified, by means of reference, the sources of information.

Date: 16.08.2023

Puspa Raj Tamang

M.P.Ed Schoalr

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The investigator wishes to express his heartiest thanks to all the Associate Professor and Assistant Professor, Mugberia Gangadhar Mahavidyalaya, for their help and support for the successful completion of the study.

The scholar expresses his obeisance to his parents without the guidance and inspiration of whom the researcher could never be able to reach to his present position. Finally, the researcher expresses his deep indebtedness to her friends for taking the pains while providing continuous co-operation, inspiration and encouragement throughout the course of study.

The scholar expresses his sincere appreciation and thanks to all institutes, club, academy and their teachers, coaches those are providing help for my study. The investigator sincerely appreciates the courageous attitude of the performance who was the subject of the study.

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SUMMARY, CONCLUSION AND RECOMMENDATION

SUMMARY

The purpose of this study was to compare the skill-related physical fitness and cardiovascular endurance of football players from hill area (Kalimpong Hill) and plain area (MGM, Purba Medinipur). The study involved 30 players from each region.

To achieve the objective, the researchers utilized the SAI skill test, which included three batteries of tests: a 30m run with the ball, shooting accuracy, and ball juggling. Additionally, the BEEP test, involving a 20m continuous shuttle run with beeps, was used to assess cardiovascular endurance in both groups of player.

Data analysis was conducted using the Microsoft Excel data package (2010 version) and online calculation tool (<https://www.graphpad.com>). Descriptive statistics were calculated for all the experimental data. To determine the significant differences if any between the two groups independent t-test was used. Significant level was set at $p < 0.05$.

CONCLUSION

Within the limitation of the study it was concluded that,

- 1) Findings of the study show that, significant difference was found on SAI skill test and cardiovascular endurance between the Hill and Plain areas football players.
- 2) Further the study reveal that Hill areas players displayed better performance in two components of SAI skill test namely shooting accuracy and ball juggling whereas the Plain area players done better in 30m run with ball.
- 3) The study also indicates that Hill areas football players had a significantly higher cardiovascular endurance compared to their counterparts from the plains.

Overall, the results indicate that football players from the hill area exhibited superior performance in both skill-related fitness and cardiovascular endurance tests compared to players from the plain area.

RECOMMENDATION

From the results of the study the following recommendations are drawn.

1. The study may be used by the physical education teacher, coaches to understand the skill related fitness and cardiovascular endurance of hill's and plain's football players.
2. The study may be helpful in preparing training schedule for hill's and plain's football players.
3. Similar study may be conducted on other variables like physical fitness and psychological variable like anxiety.
4. The result of the study may be helpful for the coach and physical education teacher while making a combined team from hill and plain.
5. Similar study can be done on female football players.

APPENDIX-IV

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To
The Head of the Institution,
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Bhupatinagar Purba Medinipur
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Sub.: Permission for Collection of Data/Conducting Research Project

Sir/Madam,

Mr./Ms. Papoo Raj Tamang, Roll No. 28 one of our P. G. Students of SEM - IV has undertaken a Research Project entitled, "Comparative Study on Cardiovascular Endurance and skill Test of child and teen football player".

I would request you to extend your necessary cooperation so that he/she can complete the research project successfully.

He/She will meet you in this regard for your necessary queries if any.

Thanking you.

Yours sincerely,


(Dr. D. Ray)
Head of the Department

APPENDIX-V



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TO WHOM IT MAY CONCERN

This is to certify that Mr. Puspa Raj Tamang, Kalimpong is a P.G. a student in Physical Education of Mugberia Gangadhar Mahavidyalaya, West Bengal has come to our club for collecting data on "A comparative study on skills related fitness and cardiovascular endurance of football players of the hilly and plain region" from our player for the dissertation.

I expect his success in life.

Thank you.



Sincerely,

NADONG FOOTBALL CLUB, KALIMPONG

Puspa Raj Tamang
27/7/23