A Crystalized Exposition On The Skills-Required And Motivational Tendencies Of Close-In Fielders: A Case Study Of Indian Cricket

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ABSTRACT

The research aims to investigate the skills (physical and physiological, technical, and mental aspects) required for close-in fielders, along with motivational inclinations considered in Indian cricket. The researchers introduced a self-administered three-part questionnaire after checking the internal consistency and validity using Cronbach's α and Kaiser-Meyer-Olkin (KMO). Next, the data were reviewed and coded using R Studio and Microsoft Excel. Finally, the selected hypotheses were tested using the Bayesian hypotheses testing approach. Inarguably, players, ex-players, and three components of cricket coaches (batting, bowling, fielding, and conditioning) accepted that physical, physiological, technical, and mental dexterities are essential to close-in fielders. In addition, the game's close-in fielders and all specialization coaches exclaimed that those multiple motivational factors led to taking the riskiest close-in fielding positions. However, the research covers the southern states of India. In addition, it never considers the skills required for the wicketkeepers, even though they are nearer to the batsman. Another limitation of the study is that it does not assess tactical abilities because it is applicable only at the captain's discretion in consultation with the bowler. The research is pioneering from this cricketing nation, complete with a broad spectrum of cricketers and coaches.

Keywords: Cricket; Close-in fielders; Physical and Physiological skills; Technical and mental skills; Kaiser-Meyer-Olkin (KMO) and Bayesian hypothesis testing approach.

INTRODUCTION

Cricket is not just a game to watch; its significance is no less than any team sporting event in any part of the globe. The contest in cricket fosters team spirit, and discipline helps build character and brings out leadership qualities. Cricket is played between two teams, a common phenomenon in the developed and developing world. Cricket is a bat and ball team sport that is popular worldwide (Bartlett, 2003). Significantly, cricket is the religion mainly in Southeast Asian

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countries and leads to severe public tensions and is considered communal and religious tensions. The game of cricket is a good specimen of the division of work, which is the first principle of management, according to Henry Fayol. Cricket is a vital sport enjoyed and followed by masses of people around the world and is the most popular team game in British colonial countries such as England, Australia, New Zealand, India, Pakistan, Sri Lanka, Bangladesh, and South Africa. The game has a vibrant history and has played a prominent role in shaping different nations' identities and fostering a sense of national pride. The game's prominence highlights that it is a powerful tool for building unity and camaraderie among teams, players, and fans. The world of cricket brings together the public from different backgrounds, cultures, and religions, fostering a sense of inclusivity and mutual respect. Playing this game requires physical fitness, mental focus, and strategic thinking. It teaches life skills such as perseverance, determination, and the significance of working together toward a common goal. In addition to the above benefits to individuals, the cricket game is also a significant contributor to the economy. At the same time, it offers multiple benefits to players, coaches, teams, boards, administrators, broadcasters, and related industries, such as sports merchandise and tourism. The game creates millions of job opportunities for people in game management, facilities, etc. Internationally, three formats of cricket are played at the elite level: Test, ODI, and Twenty 20, and the duration and intensity of the formats vary significantly (Petersen et al., 2010), in which all eleven players have to bat and field, while only some players bowl and one person keeps wickets. Whenever a team is planning to win the match, irrespective of the format, an excellent all-around performance is required, including batting, bowling, and fielding. Despite the adage that 'catches win matches,' there has been little research into fielding and wicket-keeping in cricket compared to other game areas (Bartlett, 2003). In practice, players will take specialized training in batting and bowling. In contrast, no such kind of opportunity has been available until recently, and the same degree of attention is not always afforded. The same is also the case in cricket research. Dismissing a batsman can be achieved differently, some specific to fielders. Hence, catching and throwing are vital skills to retake the upper hand over rivals, for which standard skill requirements are speed and accuracy (Freeston et al., 2007). With the enhancing trend of popularity, particularly in the shorter formats of cricket, the role of fielders drastically increased, which demands optimizing the actions and dexterities required to successfully field can have an essential influence on the game. Based on the above discussion on the significance of fielding and wicket-keeping, the researchers, with their professional backdrop of the game and academics, initiated this research to investigate the skill set explicitly required the close-in fielders, excluding wicketkeepers and also to study the behavioral and motivational tendencies of Indian cricketers. For Indians specifically, cricket is life; everything else is just a game. Cricket – the iconic game began in the late 16th century in South-East

England. It is the world's second most popular spectator sport after football. In 1932, under the captaincy of Mr. C. K. Naidu, the Indian cricket team played its first match against England (Yourself Team, 2023). Cricket is not only the passion of the Indian subcontinent people; it is their life and attitude. It has, therefore, come to corner the lion's share of the public attention and financial and infrastructural support, while other games, to varying degrees, languish for want of support following (Ray, 2008). Cricket can be a perplexing sport to novices with a host of cricket terms - and with 13 players plus two umpires usually on the field at any given time, it is not remarkable that people strive to get to hold who does what. Moreover, each player has a specific role, from the cricket captain to the wicketkeeper, bowler, and fielder. Due to the conventional nature of cricket, coaches generally rely on experience and circumstantial evidence when coaching. It is widely believed that batting and bowling are innate talents that players instinctively acquire (or not), whereas fielding is a series of skills that can be taught and improved (Woolmer et al. 2008).

This part of the research highlights the review of the pertinent associated literature to determine what is known and what requires further investigation. Keep this point in mind, and the researchers reviewed the literature concerning the physical, physiological, mental, technical, and mental skills necessary to field in general and close-in fielding positions. Cricket in India has undeniably become the de facto national game. Whenever an excellent and outstanding all-round performance is required in all forms of cricket, it is imperative in the game's shorter forms. Success has a thousand fathers; defeat is an orphan. The most suitable adage to the game of cricket is the success or failure of the Indian cricket team in particular or any other team in the world that lost World Cup tournaments only because of fielding mistakes. The sort of attention that cricket receives in India is showcased by headlines such as 'The Dream of a Billion Comes True,' which a leading Bengali daily carried on the opening page after the Indian cricket team completed a Test series victory over the eternal bête noire Pakistan (Anandabazaar Patrika, 2004). Cricket was brought to India by the Britishers in the early 1700s, and then, in the early 1900s, some Indians played for the English cricket team. In India, cricket is considered a religion rather than a team game. In 1932, the Indian team made a debut, and since then, it has risen dramatically and continued to dominate the Indian sporting scenario. Cricket was an ordinary game till 1983; after India's triumph in the 1983 Prudential World Cup, the game flows in the blood of all Indians irrespective of their caste, creed, state, or religion. The Indian National Cricket Team, also called "Team India," are the "Men in Blue" and are fondly liked by billions of people throughout the globe, which the Board of Control controls for Cricket in India (BCCI). Currently, Team India is ranked world number one in both the shorter formats of the game Twenty 20 (T20) and one-day internationals (ODI) and world number two in the test match format (Kendix, 2023). Cricket is termed an obsession by

the Indians. Ashis Nandy frequently said that cricket is an Indian game accidentally discovered by the English and compared with a rainbow, which has many colors and factors, including political identity, geo-economic politics, and corporate business. Ramachandra Guha acknowledged that cricket keeps the institutions together in India, along with the civil services, the Indian army, and the railways. The most famous sporting channel, ESPN, reiterated that 80 percent of the Indian betting market comes from cricket out of its $60 billion, the same also mentioned by the Federation of Indian Chamber of Commerce and Industry (FICCI) (EduBirdie, 2023). There is an elite bond between cricket and Indians that has the power to topple anything, such as race, gender, ethnicity, and religion, which may hurt the integrity and unity of the nation. The controversies and the ups and downs of the willow game have been the subject of discussion by cricket chroniclers and lovers of the game in times gone by. The study by researchers Singh et al. (2021) examined the level of motivation among players and the nature and role of cooperation from academic institutions such as colleges or universities. The same study identified the loopholes in the absence of trainers and the commensurate infrastructure that seems to be the bane in developing top cricketers in educational institutions.

There has been much research in different parts of the world on the subject of cricket batting, and bowling skills, particularly physical and physiological demands (Christie, 2012); Christie et al. 2008; Taliep et al. 2010) and visual information cues and decision making (Croft et al. 2010; Muller et al. 2009). However, while there have been plentiful time-motion analysis studies of cricket fielding (Petersen et al. 2010; Petersen et al. 2009a, 2011), fielding research needs to include the breadth and depth of other game areas. In practice, players will undergo specialized batting and bowling training, although fielding and wicket-keeping are always only sometimes afforded the same degree of attention; this is also the case in cricket research. Although India's Men in Blue already has a reputation for being an excellent fielding side, there is a lack of pragmatic evidence to inform their training practices. At the same time, the team's fielding standards are not up to the mark compared to those of developed nations like Australia, England, and New Zealand. For instance, as part of their high-performance plan, New Zealand Cricket recommends core playing skills (Pamment et al. 2013) at different levels of competition.

Nevertheless, the core playing skills document provides test standards for the physical performance obligations and commendations for skill levels, yet there are no means to calculate this skill. The main goal of any cricketing nation is to improve world rankings in all three formats, for which an all-around performance commitment is imperative in batting, bowling, fielding, and wicket-keeping. After identifying this lack of empirical research into fielding and wicket-keeping in cricket, the researchers originated the study to know the exact skill set required to close in fielders from the current and yesteryear players, coaches, and other experts related to the

game for further understanding and improving the performance of fielders. In this respect, the principal question that guided this research is, "What are the diverse skills required, especially for close-in fielders in all formats of cricket?" In response to this question, a fielding and wicket-keeping performance profile was developed to inform strength and conditioning practice and coach education content. Thus, this research aims to enhance the knowledge base on Indian cricket and the skills required, especially for close-in fielders, through surveys and provide recommendations regarding methods to improve fielding quality and implications for training and programming. Finally, the findings will be presented in peer-reviewed journals to popularize the research outcome and to stretch the scope for further research. A widely accepted fact is that to excel in any sport, a player must possess many physical, technical, and psychological strengths or skills to cope with the performance demands, particularly at elite or international competitions. Consequently, to improve the team's performance, it is imperative to understand the sport's requisite physical, physiological, psychological, and technical skill requirements. As discussed in the article, fielding and wicket-keeping have not received the same attention in training and conditioning camps and scientific research such as bowling and batting. Fielding performance has been divided into several components, which will be systematically reviewed below, mostly related to the physical, physiological, mental, technical, and tactical skills. All these aspects or skills are essentially required of cricket players at all levels to take the upper hand in the game. However, the research aims to employ a survey method to know the exact skill set explicitly required for the close-in fielders by focusing on physical, physiological, technical, mental, and tactical aspects of performance.

Physical aspects of performance have been examined concerning injury incidence and prevention, particularly for fast bowling and throwing. However, a slight investigation into the physical aspects of fielding has taken place. Therefore, physical elements such as anthropometry, strength, speed, and aerobic and anaerobic fitness will be considered. Many researchers have explored the anthropometric profile of first-class cricketers (Bourdon et al. 2000; Johnstone & Ford, 2010; Portus et al. 2013; Stretch, 1987, 1991) mainly by comparing groups of players, such as batsmen, bowlers, or all-rounders. The measures administered were mass and stature measurement and the sum of seven skin folds (biceps, triceps, subscapular, supra-iliac, abdominal, thigh, and medial calf). Portus et al. (2013) have comprehensively studied the qualities of Australian players. Indigenous variations in prominence given Indigenous variations in prominence, these conclusions may not be validated to be validated globally. The anthropometry for specific fielding positions has yet to be investigated. Anthropometry will provide the perfect fielding position for a player. With modern cricket's hectic schedule, players can be expected to tour up to eleven months a year; physical fitness is essential. The only research (Fletcher, 1955)

that precisely explored the calorific energy demand of cricketers examined multi-day cricket in 1955. Its authenticity in demonstrating the challenges of modern-day players would look debatable. Contemporary research has revealed that cricketers primarily have faith in an aerobic energy supply and that the rates of energy expenditure in cricket are reasonably low, with the exclusion of fast bowlers throughout a bowling spell (Fletcher, 1955; Johnstone & Ford, 2010). In assumption, aerobic fitness is essentially required for all cricket players to play up to six hours a day, with a fraction of the anaerobic energy demand. So far, cricketers' strength, power, and speed studies have been equivocal and give the impression of lacking rational or face legitimacy. Every cricket player needs strength and power to deliver the best in every field, like batting, bowling, and fielding. For fielding, players need strength, energy, and speed, which is more demanding when they play international cricket. The researchers identified a lack of knowledge and research concerning the physical attributes of fielding performance; there may be merit in consulting research in sports with relative movements, for instance, tennis (Salonikidis & Zafeiridis, 2008) and football (Burgess et al. 2006; Spratford et al. 2009). The most prevalent approach to quantifying the physiological demands of cricket is time-motion analyses using Global Positioning System (GPS) units (McDonald et al., 2013). There are few studies of cricket's physiological demands or top-class cricketers' specific physiological, biochemical, or anthropometric attributes (Noakes & Durandt, 2000). However, some time-motion analyses have been undertaken in recent years to investigate the different physiological requirements between the game's three formats. Petersen et al. (2009) administered GPS units and time-motion analysis to quantify positional movement patterns in T20 cricket.

In technical skills, high repetition of explosive, powerful, lateral movement is required for close-in fielders and wicketkeepers to effectively take catches and deliveries from bowlers. Therefore, the necessary movements to take sharp catches with great speed should be proficient and require as little physical effort as possible. Shilbury (1990) explored the occurrence of fielding aptitudes for twenty-five defined positions and the fielding patterns of individual players of an 'A' grade cricket team playing first-class multi-day cricket. The gathered data was divided into four skill categories: fielded ball, fielded ball and throw, fielded the ball and underarm return, and catches and attempted catches. Regardless of the format, the fielding positions in the game of cricket demand different technical cues like pre-movement, movement, catch, throw, speed, agility, and quick reflections. Most importantly, sharp reflexes are most required, particularly close-in fielders, because the batters frequently come out from the popping crease. Modern-day professional cricket imperatively demands inordinate physical skill and mental aptitude, including the ability to concentrate intensely for very long periods, for which a high level of physical fitness cannot fully compensate (Noakes & Durandt, 2000). Every field fielder

must concentrate on every ball of the innings, regardless of their position and format.

MATERIALS & METHODS

The research plans to garner the opinions of diverse mental dexterities viz., concentration, patience, aggression and attacking faith on the bowler, and any other options from different respondents uniquely required for close-in fielders, along with these, anticipation, cue scanning, reactive ability, decision making, routines, leadership also essentials needed to all fielders irrespective of their field positions. The significance of mental factors on sports performance has been recognized in cricket research (Weissensteiner et al., 2009; Weissensteiner et al., 2012) and is documented in the New Zealand Cricket (NZC) Core Playing Skills document. The principal mental skills acknowledged by New Zealand Cricket were routines, decision-making, performance flags, concentration, coachability, and adaptability; recommendations around performance preparation, performance focus, reviewing performance, and world-class performance were also made (MacDonald, 2015). Additional mental aspects of fielding have been investigated (Hopwood et al., 2011; Scott et al., 2000), although most studies have focused on batting (Croft et al., 2010; Land & McCleod, 2000; Muller et al., 2009).

Hypotheses selected

H1: Physical and physiological skills are most crucial for close-in fielders in any format of cricket.

H2: Technical skills are indispensable only to the close fielders.

H3: Concentration and patience are close-in fielders' most effective mental dexterities.

H4: All close-in fielders, irrespective of the game's format, should need and develop physical, technical and mental dexterities.

H5: Recognition, contribution to the win, and the team's need are crucial motivational factors widely considered by cricket players to stand in close-in, dangerous positions.

Researchers originated this research with a core objective of knowing the diverse skill set required, particularly for the close-in fielders in cricket who are exposed to injuries and sometimes life threats. The researchers believed that exploratory analysis is the only way to garner the opinions of cricket players and other stakeholders, particularly ex-players and coaches of all game specializations. The researchers circulated 500 questionnaires to collect the views of targeted respondents, and only 471 were received by the last date fixed in March 2023; they identified 39 questionnaires as different kinds of mistakes that were deleted for the analysis. The researchers involved in a detailed literature review on the various dexterities essential to particularly close-in fielders, excluding wicketkeepers, a self-administered three-part questionnaire designed and circulated among current players, ex-players, and coaches. The first part of the questionnaire highlighted information about the demographic profile of respondents, whereas the second offered information about the comprehensive list of skills required. The last part of the questionnaire

aims to gather information on the most critical skills required and motivational factors influencing the close-in fielders. The researchers conducted a convenience and stratified random sampling to collect the opinions of four hundred thirty-two (432) respondents, mainly from the southern parts of India. The collected data

Table 1: Respondents' Demographic Profile (N=432)

S. No.	Demographic Variable	Player N = 351	Ex-Player N = 66	Game Coach N = 11	Strength Coach N = 4
1	**Age**				
	a) 10 - 19	027	00	00	00
	b) 20 - 29	179	03	00	00
	c) 30 - 39	101	07	01	00
	d) 40 - 49	024	22	03	01
	e) 50 - 59	016	14	05	02
	f) 60 - 69	004	09	02	01
	g) 70 - 79	000	11	00	00
2	**Cricket Experience**				
	a) 00 - 10	187	08	03	01
	b) 11 - 19	123	24	05	02
	c) 20 - 29	021	28	02	01
	d) 30 - 39	012	02	01	00
	e) 40 - 50	008	04	00	00
	f) 51 - 60	000	00	00	00
3	**State**				
	a) Andhra	289	42	09	03
	b) Telangana	045	20	02	01
	c) Tamil Nādu	008	02	00	00
	d) Karnataka	004	01	00	00
	e) Kerala	001	01	00	00
	f) Other States	004	00	00	00
4	**Cricket Formats**				
	a) T20	289	13	07	02
	b) One-Day	058	41	03	01
	c) Multi-day/Test	004	12	01	01
5	**Specialist In: (Players Only)**				
	a) Bowler	068	11	05	01
	b) Batman	073	10	04	01
	c) All-rounder	197	39	00	01
	d) Wicketkeeper	013	06	02	01

Source: Research findings (N=432)

was carefully summarized, coded, and controlled by Software R Studio and Microsoft Excel. Before introducing the questionnaire for data collection, the researchers checked the instrument's reliability and validity using Cronbach's Alpha and Kaiser-Meyer-Olkin (KMO) to get more concrete and authentic results by comparing the two reliability and validity tests available for categorical variables. The selected five hypotheses were tested by applying the Bayesian hypotheses testing approach.

Table 1 shows demographic variables such as their respondents' nature, age, experience, geographical location, and the cricket formats they were involved in. It also collects information about the players' specialization in cricket.

Reliability and validity tests

The researchers tested the reliability and validity of the questionnaire by employing both Cronbach α and Kaiser-Meyer-Olkin (KMO) tests by using the test sample of 50 (fifty) South Indian cricket players, ex-players, and coaches of all specializations of the game. The two selected tests were most suitable for testing the reliability and validity of the categorical variables. The researchers administered these two tests to get more concrete and authentic results. Based on the positive effects of these tests, the researchers collected the opinions of the remaining respondents. The Cronbach α is the most widely applicable measure of internal consistency reliability. The reliability coefficient (α) can range from 0-1, with 0 representing an unreliable questionnaire that is not reliable and 1 representing a reliable one. A reliability coefficient (α) of 0.73 or higher is considered acceptable reliability in R Studio. Below, Table 2 depicts the values of the reliability and validity tests of both Cronbach α and KMO. The KMO test is implemented to determine if the data is ready for analysis using R Studio, and the result of the KMO test for the overall model consisting of all the variables in the instruments is 0.69. The KMO test measures how well your data is suited for factor analysis. It measures the sampling adequacy of each variable in the model and the complete model (Potluri et al., 2022).

Hypotheses testing

Finally, the gathered data is prepared to test and determine the driven hypotheses using the Bayesian hypotheses testing approach. The Bayesian hypotheses testing approach recognizes that there is always some uncertainty about the probability of getting each outcome in every hypothesis considered. The analysis is implemented using R Studio software and R Programming Language. Full Bayesian Evidence Test (FBET) analyzes each interval hypothesis against the traditional alternative. For this purpose,

Table 2: Reliability and Validity of the Questionnaire

Number of Variables	Cronbach's Alpha	Kaiser-Meyer-Olkin (KMO)
15	0.73	0.69

Source: Research findings (N=50)

the Bayesian Evidence value includes the e-value of the Full Bayesian Statistical Test (FBST) as a particular limiting case. FBST package in R language provides access to a range of functions for computing and visualizing the FBST and the e-value for testing a sharp hypothesis. To compute the Bayesian statistical testing values, it is vital to implement the Posterior Markov Chain Monte Carlo (MCMC) sampling. MCMC algorithm is used to implement the sampling from a data distribution. While the Full Bayesian Significance Test (FBST) employs the e-value to quantify the evidence against a precise hypothesis, the assumption of a correct point-null hypothesis is unrealistic in various contexts. Frequently, for instance, in biomedical research or cognitive sciences, the premise of an interval hypothesis is more appropriate. The Full Bayesian Evidence Test (FBET) generalizes the Pereira-Stern-theory, which underpins the FBST and allows for testing interval hypotheses. More comprehensive theoretical details can be found in Kelter (2022).

RESULTS

The results and discussion part of this research article highlighted the research context and presented the selected hypotheses with suitable discussion by showing the results in a tabular form.

Research Context and Testing of Hypotheses

The unique research blends physical education discipline with players' and coaches' behavioral and motivational tendencies. As a result, the study is the first to know the skill set required, particularly for the close-in fielders, excluding wicketkeepers. Table 3 illustrates applying the Bayesian hypotheses testing approach with test results. The Bayesian value from the development of this statistical test will decide whether to accept or reject the stated premises.

In analyzing the complete results of the research concerning hypothesis 1, physical and physiological skills are the most crucial for close-in fielders in any format of the game because the Bayesian uncertainty value in favor of the null hypothesis is about 86.37 percent, which means along with these two crucial technical and mental dexterities also plays a dominant role in the fielding skills of close-in fielders. Related to hypothesis 2, a Bayesian e-value in favor of the null hypothesis is 0.756841 as against the value of 0.216578 in favor of the alternative view, which means technical skills like pre-movement, movement, expertise in taking catches and throwing the ball with quick reflexes with an incredible speed and agility are indispensable only to the close-in fielders.

Testing of Hypotheses

DISCUSSION

Related to the mental dexterities required for the close-in fielders, in the chosen hypothesis 3, all the respondents outrightly accepted concentration and patience as crucial skills for the close-in fielders compared to aggression or attacking and faith in the bowler. Consequently, the Bayesian e-value has a higher value (0.913574) in favor of the null hypothesis, so the alternative view has the slightest chance of uncertainty with a value of 0.174223. Associated with hypothesis 4, the e-value (69.74%) in

Table 3: Results of Bayesian Hypotheses Testing

Hypotheses S. No	Null & Alternative Hypothesis (H0 & H1)	Proportionality Test Result	Interpretation
1	**H0:** Physical and physiological skills are not the most crucial for close-in fielders in any format of cricket. **H1:** Concentration and patience are close-in fielders' most effective mental dexterities.	Bayesian e-value in favor of H0:0.863127 Bayesian e-value against H0:0	As the evidence against 0 is already 0, the only uncertainty illustrated is that the evidence favoring H0 is about 86.31%. Thus, it is still being determined whether the null hypothesis holds, so physical and physiological skills are crucial for close-in fielders in any cricket format.
2	**H0:** Technical skills are indispensable not only to the close fielders. **H1:** Technical skills are indispensable only just to the close fielders.	Bayesian e-value in favor of H0: 0.756841 Bayesian e-value against H0: 0.216578	The null hypothesis is considered the least likely to happen since the uncertainty favoring H0 is more than the one for H1. Thus, H1 has less e-value, which means it has a 21.65% chance of uncertainty, so the null hypothesis (H0) is rejected. Thus, technical skills are indispensable only just to the close fielders.
3	**H0:** Concentration and patience are not close- in fielders' most effective mental dexterities **H1:** Concentration and patience are close-in fielders' most effective mental dexterities.	Bayesian e-value in favor of H0:0.913574 Bayesian e-value against H0:0.174223	Bayesian e-value has a higher value in favor of the null hypothesis, so the alternative hypothesis has the least chance of uncertainty. So, concentration and patience are the most significant mental dexterities required for close-in fielders
4	**H0:** All close-in fielders, irrespective of the game's format, should not need and develop physical, technical, and mental dexterities. **H1:** All close-in fielders, irrespective of the game's format, should need and develop physical, technical, and mental dexterities.	Bayesian e-value in favor of H0:0.697452 Bayesian e-value against H0:0.413547	The E-value in favor of H0 has a higher value than the one against H1. This also illustrates that the null hypothesis has a higher chance of uncertainty (69.74%) than the alternative hypothesis. So, all close-in fielders, irrespective of the game's format, should need and develop physical, technical, and mental dexterities.

Table 3: Results of Bayesian Hypotheses Testing

Hypotheses S. No	Null & Alternative Hypothesis (H0 & H1)	Proportionality Test Result	Interpretation
5	**H0:** Recognition, contribution to the win, and the team's needs are not just the crucial motivational factors.	Bayesian e-value in favor of H0:0.158765 Bayesian e-value against H0:0.915135	In this case, the Bayesian e-value against the null hypothesis is significantly higher than the e-value in favor of the null hypothesis. Thus, there is a likely high chance of uncertainty on the alternative hypothesis side. Thus, recognition, contribution to the win, and the team's needs are not just crucial motivational factors.
	H1: Recognition, contribution to the win, and the team's need are crucial motivational factors.		

favor of the null hypothesis is higher than the one against the same. Accordingly, all fielders must develop physical, physiological, technical, and mental skills irrespective of their field placements. Finally, connected with the last hypothesis, motivational factors like recognition, contribution to the win, and the team's needs are not just crucial because it is not always possible to take this risky position with only these factors. In addition to these, the overall skills have the player, the captain's confidence in the specific fielder or player, to put pressure on and challenge the batsman also plays a significant or dominant role as a vital motivational factor in taking this life risk field position in cricket. In this situation, the Bayesian e-value (0.915135) against the null hypothesis is significantly higher than the e-value (0.158765) in favor of the null hypothesis. Thus, there is a likely high chance of uncertainty on the alternative hypothesis side.

The developed world extensively researches all sports and game disciplines, including cricket. However, mainly related to cricket's skill demands, in-depth research like authors Shilbury (1990) attempted to quantify the skill demands only four fielding activities: fielded ball, fielded the ball and underarm throw, fielded the ball and overarm throw, and catches and attempted catches. Based on these research results, Cricket Australia assessed, reviewed, and introduced necessary modifications to the existing training sessions to improve the performance of all players, particularly fielders, and wicketkeepers, concerning the physical and technical components of the game. Like Shilbury's research, the current study also confidently provides first-hand information about the dexterities required for close-in fielders. The current standards and practices will be reviewed based on the literature review, and results of the studies, improvements, and novel skills assessments will be proposed. The Board of Control for Cricket in India (BCCI) could review the existing standards of all players' fielding standards in all game formats from the bottom to the apex level. Based on this, there will be an opportunity to develop fielding standards from scratch

after clearly identifying the skill set required. At the same time, the BCCI can guide all the state cricket associations while fixing the training programs with the support of the National Cricket Academy (NCA), Bangalore. All kinds of cricket training wings of the game have to design training curricula to enhance the physical, physiological, technical, and mental skills of all players in general and close-in fielders in particular. Even the strength/conditioning coaches have a prospect to design their physical training programs based on the results of this research and the expectations of the remaining specialist coaches. The study provides first-hand information even to the academia of the physical education departments of universities and colleges to design their curricula based on the present trend of the shorter formats of cricket. Finally, the research proffers an excellent guide in research design, survey method, reliability and validity testing of the questionnaire, application of the Bayesian hypothesis testing approach, and a comprehensive guide to young researchers in physical education who have plans to conduct research.

CONCLUSIONS

There is a need for more scientific research information from the southern part of India, mainly related to the performance demands of cricket fielding. Whatever the diverse skills required for the close-in fielders of the game discussed in the article, like physical, physiological, technical, and mental, were never researched from the point of view of players and coaches predominantly from the southern states of the cricketing nation. Pertinent literature related to the dexterities required, chiefly close-in fielding, is unavailable. However, conventional wisdom on several aspects of the game does not need to be supported by exploratory research. After clear-cut identification of the significance of fielding components to win matches, principally in the game's shorter formats, the lack of research in this area is perplexing and needs to be clarified. The knowledge available in the sports or physical education discipline is very modicum. The field could be complemented by obtaining the opinions and insights of coaches and players and by conducting detailed surveys, videos, and theoretical investigations. The research outcome proffers comprehensive background information about the skills required chiefly associated with the close-in fielding positions based on the opinions of players, ex-players, and coaches. This research evidence also outlines the strategic framework of fielding-specific valuations, which should make developing more intensive training, conditioning, and coaching protocols possible. This changing sphere of coaching protocols should proliferate the fielding performance and contribute to the goal of winning matches. Based on the different skill set requirements between diverse fielding positions, the appraisals and preparation should be individualized, considering these differences. The logical continuation of this research would be to undertake solid reliability studies for the novel testing procedures introduced based on specific skill-specific significance. There would be a binding obligation to encourage the physical education

departments of the country's academic institutions to intensify their research based on different sports and games disciplines. In contrast, the federal and state government sports bodies and discipline associations should encourage research to measure players' performance, sports physiology tools, video and global positioning systems, and ergonomics tests by administering the latest technology methods like artificial intelligence and robotics.

Concerning the study's limitations, the research collected only the opinions of players, ex-players, coaches, and conditioning coaches and excluded the administrators from the southern states of India. However, it never considers the skill set required for the wicketkeepers, even though they are nearer to the batsman and most prominent position. Another limitation of the study is that it does not consider tactical skills because it is applicable only because of the captain's discretion in consultation with the bowler. Nevertheless, there is a possibility and mammoth scope to take up systematic research covering all components of cricket related to the game's three formats that would benefit different stakeholders of the discipline. Simultaneously, it is promising to study the significance of wicket-keeping and the skills required for it based on the requirements of the game's three formats.

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