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# Personality Traits And Post Traumatic Growth Following De-Selection. A Correlational Study Of Elite Cricketers Of Pakistan

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#### Abstract

The aim of the study was to examine at the relationship among elite cricketers' personality traits and their psychological development after being deselected in a sample of Pakistani top cricketers. The study employed a positivistic approach to investigate the issue, and thirty-five (35) outstanding cricketers were conveniently and purposefully and selected for the sample. The ten-item personality inventory (TIPI), and the post-traumatic growth inventory (PTGI) were the tools used to conduct a survey. The association between the TIPI and the PTGI ( $r = -0.410^*$ , p = 0.007) was found to be low negative and statistically significant (p < 0.05). The correlation across variables in question was 59.3 percent. Personality variables accounted for 24% of the heterogeneity in posttraumatic growth. It is concluded that personality traits have significant effect on post traumatic growth and the effect changes as personality traits as base line data before making any psychological intervention to elite cricketers when experiencing de-selection or any sports related trauma.

*Key words*: *Elite cricketers, Personality trait, ten item personality inventory (TIPI), Post traumatic Growth (PTGI), Deselection.* 

## Introduction

Participation in sports offers benefit, physical, emotional and intellectual abilities. Athlete is someone that competes in a sport or activity requiring skill, competence, endurance, and athletic abilities. Athletes are those who actively compete in structured events alongside their area of expertise, usually individually or as a team. They must be physically fit, skillful, competent and trained. Athletes of different sports elapse through divergent stages and phases that often define the trajectory of their professional careers and de-selection is one of them (Neely et al., (2016). De-selection is defined as being removed from an athletic competition squad depending on the choices of the coach. It can also be described as the dismissal of a competitor from a competing sports team depending on the choices of the coach (Taylor & Ogilvie, 1994). There are mainly two distinct types of transformations .Intentional and conventional athletic career transformations are those which are expected and at the athlete's disposal, advancement to higher ranks, an independent decision to give up work/study commitments, and a decrease in their love of sports are all situations of intentional athletic retirement, whilst forced and uncustomary transformation, on the other hand, do not occur predicted and come in form of trauma, deselection, advancing age beyond competition. (Alfermann & Stambulova, 2007; Barcza-Renner, 2020; Blakelock et al., 2016; Kaul, 2017; Stokowski et al., 2019

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In this study, de-selection means the temporary/permanent termination of a cricketer whether it is voluntary or involuntary from the cricket team due to bad performance, disciplinary issues, injury or retirement etcD because deselection not only defines the trajectory of athlete's career but also have consequences that could harm the athletes psychosocially. As it has stated it effects psychosocially, every person has its personal trait that reacts in response to stimulus, situation and circumstances.

It looks odd that de-selection is traumatic considering that the research implies that tragic events encompass catastrophes or, in athletics, both physical and sexual assault. However, the extent of trauma attached to a particular event is determined by factors such as personal evaluation, allocation of responsibility, and belief in the relevance linked with the incident, and the experience must be "traumatic enough" to influence a person's perception of self in order to stimulate growth. According to the literature, psychological discomfort such as deeper despair, frustration, shame, and a lessened perception of self, correlate with deselection. De-selection seemed "distressing enough" to foster positive development since it forced participants to reassess their identities, their abilities, and the significance of sport in their personal lives. The research findings shown and confirm the broken premises concept, with individuals potentially ceased considering their athletic world as in kind. They disclosed de-selection as "catastrophic," "devastating," and "the end of the world" and challenged their athletics abilities, identity, and preconceptions concerning their competitive environment ("Who am I? What am I?"). As a consequence, if trauma indicators are induced by a breaking of perspectives, de-selection seems to have destroyed participants' perspectives to some degree. Post traumatic growth were reported in natural disasters (Cieslak et al., 2009; Karanci & Acarturk, 2005), disasters (Nishi et al., 2010; Shakespeare-Finch & Armstrong, 2010), and the passing away of a family member (Davis et al., 2007; Taku et al., 2008b) are all examples of stressful life experiences

The reaction can be different of same stimulus and situation to different individuals. This statement is endorsed by the examples of athletes who experienced de-selection phenomena in early phase of their professional career but that were immensely benefitted by becoming more mentally tough and more skilled as an outcome but on the other hands there are also some athletes who left the sports while experiencing de-selection in early phase of their professional and sports career. Pakistan is a developing nation and as developing nation it also has short comings in dealings with athletes and their overall development and progression. Cricket is one of the sports which is highly lucrative and attractive in youth. It is stated, it has short comings in managing and developing cricket talent. It is also evident in elite cricketers who represented Pakistan at world stage the statistics are very ordinary when it comes to development of elite players. There are 27 % of elite cricketers who were considered to be successful in the career while the remaining remain 73% were drained out of the system prematurely, which in mathematically term is high drainage rate of talent in any sports.

In relation to above if traumatic events caused post traumatic growth as an aftermath, does it implies to the sporting events. As discussed in literature de-selection caused clinical level of distress in athletes and they questioned their social and athletic identity after experiencing deselection. Cann et al., (2010) believed that positive outcome can arise from a traumatic experience exists for many years. Findings from studies indicate that distress and growth can co-exist (Cann et al., 2010). There are number of question that arises, first how do the athletes experience psychological growth after deselection? What is the role of personality traits, as trauma is described as subjective experience than how individual personality dispositions deal with trauma? The study has significance, first it will help examine the nature

of relationship between personality traits (The Big Five) and post traumatic growth following deselection secondly, what attributes or characteristics (e.g., reluctant trait responses personality characteristics) are more inclined to cause to psychological suffering after deselection?

## Material and method

The study adopted the quantitative research design and used convenience and purposeful sampling strategy to conduct a survey to collect the data. Adapted Questionnaires of Ten-Item Personality Inventory (TIPI) (Gosling et al.,2003) measured the dimensions of the Five Factors Model (FFM) extroversion, agreeableness, conscientiousness, emotional stability, and openness to experience using ten items (two for each aspect). Posttraumatic Growth Inventory (PTGI) (Tedeschi & Calhoun, 1996) comprising factors, relating to others, spiritual change, new opportunities, appreciation of life and personal strength were used to collect the data. Both of these scales were measured on 6 point Likert scale ranging options from strongly disagree to strongly agree.

# Sample Size

The investigation examined thirty-five (35) elite cricketers who played for Pakistan's men's team at international competition in each of the three or a minimum of one format, namely tests, one-day internationals, and T20s, during the preceding twenty years and were subsequently de-selected. The author used the purposively convenience sample technique and contacted (80) eighty male cricketers who encountered de-selection while playing the Pakistan national team in tests, one-day internationals (ODIs), and Twenty20. Forty-five (45) respondents hesitated to provide a response. The survey forms were distributed to the selected cricketers after they were accepted to take part in the study

## **Data Analysis**

The investigation was intended to determine if top cricketers' personality traits had a substantial impact on their post-traumatic growth after deselection. The presumption was evaluated with a threshold of significance of (p < 0.05). Descriptive statistics were utilized to examine the variables in question, that comprise data on the average and the standard deviation. In addition, the degree of normality of the data is assessed by the Shapiro-Wilk test. To broaden the study's findings to the population, the scholar used correlation and multiple regression modelling strategies.

Variable	Mean	Std. Deviation
Ten item Personality inventory	4.190	0.389
Extroversion	4.000	0.943
Agreeableness	4.814	0.692
Conscientiousness	3.464	0.684
Emotional Stability	4.214	0.662
Openness to Experience	4.457	0.671
Post Traumatic Growth Inventory	4.001	0.496
Relating to Others	3.552	1.013
New Possibilities	4.652	0.679

**Table 1** Descriptive Summary of variables and sub variables (n=35)

Personal Strength	4.295	0.565	
Spiritual Change	3.614	0.940	
Appreciation of Life	3.942	0.944	

Table 1 provides a description of each factor drawn from the sample data. Elite cricketers had an overall average  $\pm$  SD of 4.19  $\pm$  0.38 on the Ten Item Personality Inventory (TIPI), with a mean  $\pm$  SD of 4.00  $\pm$  0.94 for extroverted This indicates the athletes are extroverted and partly agree with extrovert attributes with lesser variation among average scores. Elite cricketers had an average and a standard deviation score of (4.81 $\pm$ 0.69) for agreeableness, indicating a high level of agreement with small fluctuation. Elite cricketers demonstrate conscientiousness (3.46  $\pm$  0.68), indicating cautious and attentive execution of their respective duties. Standard deviation indicates less variance. Elite cricketers have stable emotions, as demonstrated by a descriptive assessment of (4.21  $\pm$  0.66). The average score for openness to experience is (4.45  $\pm$  0.67), demonstrating that top cricketers are keen to put forth effort independently, as seen by the low variability in data among mean scores. Elite cricketers agree with post-traumatic growth after de-selection encounters, as indicated by their average as well as standard deviation value of (4.001 $\pm$ 0.496).

**Table 2** Normality of data (n=35)

Variables	Shapiro-V	Wilk
	Statistic	Sig.
Ten item Personality Inventory	0.980	0.748
Post traumatic Growth Inventory	0.977	0.671

Table 2 displays the outputs of the Shapiro-Wilk Test, which demonstrate that every one of the variables being tested have a normal distribution since the significance level for each variable exceeds 0.05.

# **Table 3** Reliability of Scales (n=35)

Scale	Item	Cronbach Alphas
Ten item personality inventory	20	0.39
Post traumatic growth inventory	20	0.60

Table 3 illustrated the Cronbach alpha score for the TIPI and PTGI that was 0.39 and 60 respectively, making it lower than 0.70. consequently, the items utilized for evaluating all variables may not be as trustworthy because of their small sample size.

**Table :4** Correlation analysis Personality traits and Post traumatic growth

Correlations Matrix

Serial of variables (											
Scales)	1	2	3	4	5	6	7	8	9	10	11 12
1.Extroversion	1.0										
	00										

2.Agreeableness	.253	1.0 00									
	.07 1	00									
3.Conscientiousness	- .24 7	.12 1	1.0 00								
	.07 6	.24 4									
4.Emotional stability	.11 4	.18 3	- .13 7	1.0 00							
	.25 8	.14 6	.21 7								
5.Openness to experience	.47 8**	.16 3	- .16 1	- .04 1	1.00 0						
	.00 2	.17 5	.17 8	.40 9							
6.Ten item personality	.64 4**	.67 7**	.16 9	.43 8**	.530* *	1.000					
inventory	.00 0	.00 0	.16 6	.00 4	.001						
7.Post traumatic growth inventory	- .12	- .52 1**	- .04	- .27	.077	- .410**	1.000				
	6 .23 6	1 .00 1	5 .39 9	8 .05 3	.330	.007					
8.Relating to others	- .27 1	- .44 7**	.03 7	- .05 4	- .131	387*	.609**	1.0 00			
	.05 8	.00 4	.41 7	.37 9	.226	.011	.000				
9.New possibilities	.17 0	- .24 5	- .45 8**	- .15 7	.368*	135	.404**	- .00 7	1.00 0		
	.16 5	.07 8	.00 3	.18 5	.015	.219	.008	.48 3			
10.Personal strength	.05 5	.23 3	.22 7	- .11 4	- .042	.053	.297*	.09 9	- .128	1.0 00	
	.37 7	.08 9	.09 5	.25 8	.404	.381	.041	.28 5	.231		
11.Spiritual change	- .08 7	- .44 2**	- .00 8	- .13 1	.018	235	.605**	.18 6	.053	- .01 9	1.0 0
	, .30 9	.00 4	.48 1	.22 7	.459	.087	.000	.14 2	.381	.45 7	

12.Appreciation of life	- .01 9	- .37 0*	- .05 5	- .31 8*	.132	279	.740**	.24 1	.500* *	.09 4	.26 3	1.00 0
							.000					

\*\*. Correlation is significant at the 0.01 level (1-tailed).

\*. Correlation is significant at the 0.05 level (1-tailed).

Table 4 shows the association of personality trait extroversion with different dimensions of post traumatic growth. The association of extroversion was found to be, relating to others (r = -0.271, p = .058), to be low, negative association and statistically significant (p = .05), spiritual change (r = -.087 p=.309) to be very low, negative association value and statistically insignificant (p > .05) and low positive association value of new possibilities (r = 0.170, p = 0.165), personal strength (r = 0.055, p = .377) and appreciation of life (r = -.019, p = .457) statistically insignificant with (p > .05) hence it can stated that extroversion showed significant relationship only with relating to others dimension of post traumatic growth and rest of the dimension showed any significant relationship with other dimension of post traumatic growth.

The association of personality trait, agreeableness and different dimensions of post traumatic growth was found to be, relating to others ( $r = -0.447^{**}$ , p = .004), spiritual change ( $r = -0.442^{**}$ , p = .004) and appreciation of life ( $r = -0.370^{*}$ , p = .014) low negative association value and statistically significant, apart from new possibilities (r = -0.245 p = .078) which is very low negative association value and statistically insignificant value. Agreeableness and personal strength (r = 0.233, p = .089) is found to be very low positive association value and statistically insignificant value of relationship. hence we it can be stated that cricketers with agreeableness trait tends to have negative and significant relationship with relating to others, spiritual change and appreciation of life dimensions of growth and the other aspects of growth namely new possibilities and personal strength did not signify any relationship with agreeableness trait.

Personality trait, conscientiousness relationship with different dimensions of post traumatic growth personal Strength (r =.227, p=.095), relating to others (r =.037, p=.417) was found to very low / very low positive association with statistically insignificant value of relationship (p >.05), and spiritual change (r = - 0.008 p=.481) was found to be markedly low negative and negligible association with statistically insignificant value of relationship (p >0.05) and rest of the dimensions like new possibilities (r= -.458\*\*p=.003) found to be moderate negative association value and statistically significant value of relationship as (p < 0.05), similarly appreciation of Life (r = 0-.055, p=.378) is also found to be very low negative association with statistically insignificant value (p >0.05) hence it can be stated that the cricketers having conscientiousness trait remained confident and optimistic, they also take care of individuals in their relationship in social networks and exhibit slight increased religious believes on the other hand they are reluctant to explore other opportunities in life and not found to be satisfied with life.

Personality trait, emotional stability relationship with different dimensions of post traumatic growth, relating to others (r = -0.054 p=.379), new possibilities (r = -0.157 p=.185), personal Strength (r = -0.114, p=.258), spiritual Change (r = -0.131 p=.227) was found to markedly low negative association with statistically insignificant value of relationship (p >.05) and on the other hand appreciation of Life (r = -0.318\*, p=.033) was found to be very low negative association value and statistically significant relationship value of (p < 0.05). Hence

it can be stated the cricketers who are emotionally stable remained negative in relationship with all aspects and dimensions of post traumatic growth apart from appreciation of life

The relationship of personality trait openness to experience with different dimensions of post traumatic growth like new possibilities (r = 0.368\*, p = .015) was found to be low positive association and statistically significant relationship value (p <.05) ,appreciation of Life ( r=.132, p=.225) with very low positive association value and spiritual Change (r = .018, p=.459 ) was found to be markedly low, negligible positive association value and statistically insignificant (p > .05) and on the other hand other dimensions relating to others (r = -0.131, p=.226), was found to be very low negative association value and personal Strength (r=-.042, p=.404) to be the markedly low, negligible negative association value and statistically insignificant (p > .05). it can be stated openness to experience relationship with new possibilities found to be significantly positive but rest of the dimension did not signify the relationship at any conventional level.

# **Regression Analysis of Personality Traits and Post traumatic growth Inventory**

Model one is about the impact of various components of personality traits on post traumatic growth of elite cricketers.

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.593a	0.352	0.240	0.43277
a Predictors: (	Constant) Openn	ess to experience Emotic	nal stability. Conscientiousness. Ag	reachlaness Extraversion

 Table 5 Model Summary of Personality traits and Posttraumatic Growth

Constant), Openness to experience, Emotional stability, Conscientiousness, Agreeableness, Extraversion

Table 5 reveals that the value of R is 0.593, suggesting that the relationship among the variables in question is 59.3 percent. The R square is 0.352, demonstrating the model's explanatory strength. The value of Adjusted R square indicates a 24% variability in posttraumatic growth because of unique personality traits.

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	2.948	5	0.590	3.148	.022b
	Residual	5.432	29	0.187		
	Total	8.380	34			

Table 6 ANOVA of Personality traits and Posttraumatic growth

a. Dependent Variable: Post traumatic Growth Inventory

b. Predictors: (Constant), Openness to experience, Emotional stability, Conscientiousness, Agreeableness, Extraversion

Table 6 depicts the model's predictive reliability based on by the F statistic values. The model's F(5,29) = 3.148, p<0.05, and R2 = 0.352 indicate a good fit at the 5% level of significance.

		Unstandardized Coefficients B	Standard Coefficie		t	Sig.
Model			Std. Error	Beta		
1	(Constant)	5.815	0.924		6.296	0.000

Extraversion	0.000	0.94	-0.001	-0.004	0.997
Agreeableness	-0.390	0.118	-0.544	-3.305	0.003
Conscientiousness	-0.039	0.114	-0.054	-0.342	0.735
Emotional					
stability	0.103	0.118	-0.138	-0.876	0.388
Openness to					
experience	0.145	0.130	0.196	1.115	0.274

a. Dependent Variable: Post traumatic Growth Inventory

Table 7 reports the impact of various personality traits on post traumatic growth. Agreeableness has significant negative influence on post traumatic growth at 5% level of significance. The remaining personality traits had little or no impact on post-traumatic growth at any conventional degree of relevance.

# Results

The associations among the Ten Item Personality Inventory and the Post-Traumatic Growth Inventory (r= -.410\*. p=.01) was assessed to have with a slight negative association and of statistical significance (p <.05.). As an outcome of these information, the assumption is not rejected, and it has the potential to infer that personality traits have an essential impact on the post-traumatic growth of great cricketers. The dependent variable posttraumatic growth was regressed on predicting variable personality traits to test the hypothesis. H<sub>0</sub>. personality traits significantly predicted post traumatic growth F (1-29) =3.148, p > 0.001 which indicates that TIPI can play a significant role in shaping PTGI, p= 0.000 = P < 0.001. These results clearly indicated the effect of TIPI, more over the R<sup>2</sup> = 0.352 depicts that the model explain 24 % of variance in PTGI.

# Discussion

The findings suggested that the relationship of total Ten item personality inventory (TIPI) and total post traumatic growth inventory (PTGI) ( $r = -0.410^*$ , p = 0.01) was found to be statistically significant in low negative association. Hence it can be stated that the personality traits are inversely proportional to post traumatic growth. Tedeschi and Calhoun (1996) said that personality characteristics are thought to be essential for figuring out one's reactions to traumatic situations, and our observations confirmed this perspective by demonstrating that extraversion, agreeableness, conscientiousness, emotional stability, and openness to experience are predictive of total PTG furthermore elite cricketers with high extraversion trait may express their thoughts and feelings more openly and frequently with others. As a result, the intensity of traumatic experiences may become less severe, which helps them in shaping up the coping strategies including cognitive restructuring, emotional and social support seeking (Connor-Smith & Flachsbart, 2007). Thus, extraversion trait may enable cricketers to deal with the traumatic effect of deselection by employing more effective coping mechanisms, which will ultimately promote growth across almost all domains. However, extraversion appears to have a dampening impact on PTG when the traumatic effect is low. High in extraversion trait may not feel the need to apply their coping mechanisms in incidents with low trauma intensity, which prevents them making much progress since they don't feel compelled to participate in solving issues or seek out help from others support. Personality trait, agreeableness is showed association with relating to others, spiritual change and appreciation of life apart from new possibilities and personal strength. This finding are in line with Ayse Karanci., et al 2012) proposing that agreeableness facilitates. Apart from personal strength, PTG forces the individual to face the devastating event and find assistance from others in order to move forward with its repercussions. Credibility, compassion, obedience, and tender-mindedness are all components of agreeableness (McCrae & John, 1992). It coincides with a high degree perceived and actual social assistance (Bowling et al., 2005).

Elite cricketers, high on conscientiousness characteristic is associated with an absence of interest in various pursuits or options in life. These outcomes are consistent with (McCrae & John, 1992), who claimed that conscientiousness demands a high degree of self-control, dedication, control over impulses, achievement direction, and discipline, and that this trait is linked to solving issues and mental restructuring ways of coping (Connor-Smith & Flachsbart, 2007). Consequently, it is logical that conscientiousness may assist the understanding of the traumatic event and immediately available mechanisms of coping. However, those that are weak on this trait seem to require an extensive traumatic effect in order manage with the incident, and hence express PTG only when they suffer considerable distress. hence it can be stated that the cricketers having high on conscientiousness trait remains confident, focused, persistent and achievement orientated.

Tedeschi & Calhoun, (2004) noted, Cognitive handling is a prerequisite for PTG., and it may be considered that those who demonstrate openness have a greater tendency to feel prepared to mentally grasp the traumatic incident. and its significance, resulting with greater growth in PTGI. On the basis of these findings it can be concluded that cricketers high on openness may show growth on PTGI. These findings are in line with (Costa & McCrae, 1985) proposing Openness means being receptive in discovering new situation, circumstances, and concepts. People with a high level of openness are inclined to be explorers, innovative, and enthusiastic about in discovering new things. On the other hand, it may have suppressing effect on relating to others and personal strength.

Cricketers with high emotional stability remain cool in dealing with of high-stress situations, which helps them absorb the distressing incident and develop coping skills. Connor-Smith and Flachsbart (2007) found that a low degree of emotional stability linked wishful pondering, abandonment, and coping that focused on emotions. All of these tactics lead to the reality that people who lack emotional stability can engage in strategies of avoidance, which might impede their understanding of events that are necessary for growth. These results appear somewhat consistent with (Ayse Karanci., et al 2012), who additionally argued that the emotional stability characteristic have a detrimental influence on spirituality and interpersonal growth, but our findings extend this adverse impact to other aspects of growth.

# Conclusion

Personality traits have a significant impact on the post-traumatic growth of elite cricketers after deselection One of the major findings of this research is the clearly showed notion that deselected players have different response to PTGI and it depends on their personality dispositions. Instructors, professionals, and therapists may utilize personality traits as initial information when providing psychological therapies to deselected athletes. The research effort will assist athletes who suffer from mental health issues as a result of de-selection. Recognizing the positive connections among substitute creation, the development of life skills, and transitional attractiveness following sports career expulsion, preventive interventions might include practitioners encouraging these types of growth and competencies.

## Limitations of the Study

A variety of strengths and weaknesses may be noted when drawing conclusions from the findings. The study's limitations include a small, highly homogeneous sample size and the

inability to generalize findings to any other sport or group. The findings apply exclusively to top male cricketers, and the growth mechanism may alter if the study was carried out with a different demographic and players from various socioeconomic backgrounds. The study's shortcomings include subjects' genetic predisposition and introspective recollection. Memory bias and social attraction are both likely to influence reactions.

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