

Personality Traits of Romanian Sports Managers: Preliminary Findings

Radu Predoiu¹, *ORCID: 0000-0001-8618-8435*

Szabolcs Simon², *ORCID: 0009-0005-8144-3376*

Gabriela Szabo³, *ORCID: 0009-0009-8240-0609*

Alexandru Ilie⁴, *ORCID: 0009-0005-1309-3060*

Ionut Patenteu⁵, *ORCID: 0009-0001-9684-5467*

Răzvan Marian Bucătaru⁶, *ORCID: 0009-0006-1524-9425*

Affiliation: ¹ National University of Physical Education and Sport,
Faculty of Physical Education and Sport, Romania

² Hyperion University, Faculty of Legal Sciences – Law, Romania

³ “George Emil Palade” University of Medicine, Pharmacy, Science and
Technology, Advanced Medical and Pharmaceutical Research Center, Romania

⁴ RestartiX Center, Romania

⁵ University of Medicine and Pharmacy “Carol Davila”,
Faculty of Medicine, Romania

⁶ “Dunărea de jos” University of Galați, Faculty of Physical Education and
Sport, Romania

E-mail: ionut.patenteu@drd.umfcd.ro

Abstract

Personality traits analysis represents an essential tool for training and even selecting effective managers in sports organizations. The purpose of the research was to investigate the Big-Five personality characteristics of Romanian sports managers. A total of forty-five experienced (ESM) and future managers of sports organizations (FMSO), aged between 21 and 60 years old, took part in the study. The Mini-IPIP questionnaire was used to measure Extraversion, Agreeableness, Conscientiousness, Neuroticism, and Imagination/Intellect. Using the t-test for independent samples, the differences between the two groups of sports managers (ESM and FMSO) were verified. Even if no statistically significant differences were found ($p > 0.05$), subtle differences in term of Big-Five personality traits were observed: ESM tend to be slightly more extroverted and agreeable, while FMSO registered slightly higher results for intellect/ imagination dimension and on conscientiousness. Next, data analysis (Mann-Whitney test) revealed significant differences in the level of conscientiousness between: Romanian experienced managers (men) and women ESM ($p = 0.035$), and between experienced sports managers over 40 years of age and ESM between 25 and 40 years ($p = 0.020$). Men sports

managers reported a higher level of self-discipline and are more goal oriented (the influence of cultural factors and social expectations associated with gender were discussed), while considering neuroticism and intellect/imagination sub-scales the differences were almost non-existent, based on ESM' gender. Also, higher scores for conscientiousness were observed in older sports managers, while no significant differences were found according to managers' marital status and family situation (with or without children).

Keywords: Big-Five model, personality features, sports managers, sports organizations

Introduction

In recent decades, sport has become not only a recreational activity, but also a global industry with a significant impact on the economy, society, and culture. In the context of the rapid evolution of the sports industry and the increasingly complex demands faced by managers in this field, investigating the personality features of sports managers is particularly important. Sports managers must adjust their leadership style according to the situations inside the organization, according to the individual needs of employees, knowing that leadership involves not only control but also the ability to inspire others (Scott, 2014). Beyond technical knowledge or business strategies, the personality of those who lead sports organizations has a decisive influence on the organizational climate, adaptability, and motivation of employees. Personality traits are "an important determinant of long-term success in sport" (Allen et al., 2013), influencing communication and the well-being experienced by employees of sports organizations.

Understanding the distinct personality traits that characterize successful sports managers is crucial, given their multifaceted responsibilities in strategic decision-making and daily operational oversight (Güneş & Kılıç, 2024). This profession demands a blend of holistic and detailed attention, requiring adaptability to emergent situations, the capacity for rapid consequential analysis, and the ability to work in an interdisciplinary team (Nørgaard & Sørensen, 2019). Such roles necessitate a particular psychological profile, often attracting and retaining individuals who exhibit specific behavioral patterns and dispositions (Farstad & Arnulf, 2024). For instance, considering the brain dominance of experienced sports managers, it seems that they "use more the lower right quadrant of the brain, being socially oriented individuals, empathetic, expressive and sensitive to others" (Predoiu et al., 2023). In terms of coping strategies, experienced sports managers "accept more easily situations they cannot change and control" and need less compassion and emotional external support in difficult situations at the workplace (Predoiu et al., 2024). Macra-Oşorhean et al. (2011) reported lower values for verbal aggression and irritability in the case of Romanian sports managers, but higher results for guilt and social desirability when managers of sports organizations were compared with their counterparts from other E.U. countries. Following a systematic review of the literature regarding the profile of sports managers, Santos et al. (2022) highlighted competencies such as: integrity, leadership, innovative thinking, specific knowledge, authority's delegation and resource allocation. Not least, sports managers demonstrate a high level of emotional intelligence. They know how to recognize and manage

their emotions, remain motivated in the face of challenges, and use their emotional energy constructively to achieve organizational goals (Predoiu et al., 2021).

Through the Big Five theory, McCrae and Costa offer a structural approach, according to which personality consists of stable and measurable traits that can be observed in various behavioral contexts (McCrae & Costa, 1997). The Big Five model identifies five fundamental dimensions of personality: openness to experience, conscientiousness, extraversion, agreeableness, and emotional stability/neuroticism – abbreviated as OCEAN (McCrae & Costa, 2008). Conscientiousness is strongly associated with planning, responsibility, and goal achievement (Xu & Hao, 2025), essential aspects (in the case of sports managers), for example for budgeting and long-term strategic management. Furthermore, people with a higher level of conscientiousness can weigh the pros and cons more effectively in a specific scenario (El Othman et al., 2020). Emotional stability (low neuroticism) is critical for resilience and effective decision-making under stress (Devin, 2017), while openness to experience, “signified by adaptability and curiosity” (Shuai et al., 2023) could facilitate sports managers’ creativity and adaptation to new technologies and strategies. Openness to experience is associated with intelligence, divergent thinking, and broad-mindedness (Dan et al., 2021). Finally, extraversion (characterized by sociability) and agreeableness – marked by cooperativeness and kindness (Kang et al., 2025) can support networking, public representation and conflict resolution within the organizations, through empathy and cooperation. Agreeable individuals create a more pleasant organizational climate, contributing to a higher level of job satisfaction (Aydogmus et al., 2015).

We mention a gap in the literature regarding the Big Five OCEAN personality traits of Romanian sports managers. The very few existing studies focused on personality traits of future (not experienced) sports managers, the values for the Big Five personality traits being at the level of the population mean (Mitrache et al., 2023). It is worth mentioning that the “sanguine” and “phlegmatic” temperamental types (more emotionally stable) dominate in the case of Romanian future sports managers, while aggression, depressive symptoms, irritability, but also sociability is higher in the case of male future sports managers, compared to females (Stănescu et al., 2016).

Materials and Methods

Scope

The aim of the study is to investigate the Big-Five personality traits of Romanian managers within sports organizations.

Hypotheses

H1: There are significant differences between experienced sports managers and future managers of sports organizations in terms of Big Five personality dimensions.

H2: Investigation of personality traits reveals significant differences between experienced sports managers based on gender and age.

H3: There are significant differences between experienced managers in terms of personality traits depending on marital status (married or unmarried) and family situation (with or without children).

Participants

The study involved 45 sports managers and future managers, aged between 21 and 60 years old, distributed as follows:

- 25 experienced sports managers (ESM), 15 males and 10 females, aged between 25 and 60 years;
- 20 future managers of sports organizations (FMSO), 11 males and 9 females, aged between 21 and 30 years old, students in the program – “Management and Marketing in Sports Structures, Activities and Events”, within National University of Physical Education and Sports, Bucharest.

The inclusion criterion for managers of sports organizations, in the present study, was a minimum of two years in a management position. However, we mention that only three sports managers have two years of experience, the other managers of sports organizations having between 4 and 21 years of experience ($M_{\text{experience}} = 7.76$ years, in the entire sample). The management positions of the participants (within state and private Romanian sports organizations) are: sports manager, sports club president, deputy director and sports club executive director.

Measures

To assess the Big Five factors of personality, the Mini-IPIP questionnaire was used (Donnellan et al., 2006). The Mini-IPIP was translated (for the current study) through retroversion, a procedure used in previous research (Rawat et al., 2023; Piotrowski et al., 2021). The questionnaire measures: Extraversion, Agreeableness, Conscientiousness, Neuroticism, and Imagination/Intellect.

The scale has 20 items, with 4 items for each personality dimension. For each factor, the sum of the responses to the corresponding items is calculated. At the same time, we mention 11 items with reverse scoring. Ways of answering: a 5-point scale, from 1 = “Very inaccurate” to 5 = “Very accurate” (3 = “Neither accurate nor inaccurate”). Items example: “Talk to a lot of different people at parties” (Extraversion), “Sympathize with others’ feelings” (Agreeableness), “Make a mess of things” (Conscientiousness), “Have frequent mood swings” (Neuroticism), and “Have a vivid imagination” (Imagination/Intellect). McDonald’s omega reliability coefficient (ω) was calculated for the present study, for each personality factor, obtaining the following results: $\omega = 0.72$ (Extraversion), $\omega = 0.78$ (Agreeableness), $\omega = 0.70$ (Conscientiousness), $\omega = 0.71$ (Neuroticism), while $\omega = 0.73$ (Imagination/Intellect), emphasizing an acceptable reliability (internal consistency).

Procedure

The study was conducted between November 2024 and April 2025. The Mini-IPIP questionnaire for this research was administered online using Google Forms. All ethical principles were respected: written informed consent was obtained, participants were free to

withdraw from the study at any time, and the data collected was treated with confidentiality, guaranteeing the anonymity of the respondents. The convenience sampling technique (as a recruitment technique, in the case of future sports managers) and, also, the snowball sampling technique (in the case of experienced sports managers) were used.

Statistical Analysis

Analyses were conducted using Jamovi (The Jamovi Project, 2025, Version 2.7). To verify whether there are significant differences between the two groups of sports managers (with and without experience), the independent t-test was used (the significance threshold was set at 0.05). The normality condition was tested using the Shapiro-Wilk test, while p-values higher than 0.05 for the Levene test showed homogeneity of variances (Martin & Bridgmon, 2012). Cohen's d (effect size) interpretation is: 0.8 large effect, 0.5 medium and 0.2 small effect (Hahs-Vaughn & Lomax, 2019). Also, using the Mann-Whitney (U) test (with small samples – Beatty, 2018) the differences between experienced sports managers, based on gender, age, marital status and family situation (with or without children) were tested. The effect size (r) was interpreted as follows: 0.5 large effect, 0.3 medium and 0.1 small effect (Predoiu, 2020).

Results

First, the presence of excessive/extreme values was investigated, an important aspect taking into consideration the absence of a social desirability scale. Following data analysis (box plots), four excessive values were eliminated from further processing, specifically in the case of the factors: conscientiousness (one value, from ESM group), neuroticism (two values, one from ESM group, and one from FMSO group), and intellect/imagination (one value, from ESM group).

Using the t-test for independent samples, the differences between the two groups of managers (ESM and FMSO) were verified, in terms of the Big-Five personality factors. The normality of the distributions was confirmed using the Shapiro-Wilk test ($p > 0.05$, Table 1) and, also, the condition of homogeneity of variances was (generally) met (Levene's test, Table 1).

Table 1

Shapiro-Wilk (normality) and Levene's test for homogeneity of variances

| Personality traits | $p_{\text{Shapiro-Wilk}}$ | p_{Levene} |
|-----------------------|---------------------------|---------------------|
| Extraversion | 0.291 | 0.012 |
| Agreeableness | 0.173 | 0.389 |
| Conscientiousness | 0.246 | 0.228 |
| Neuroticism | 0.456 | 0.799 |
| Imagination/Intellect | 0.144 | 0.908 |

Table 2

Results of the t-test for independent samples – personality factors

| Personality traits | t | df | p | Effect size | |
|-----------------------|--------|------|-------|-------------|--------|
| Extraversion | 0.868 | 43.0 | 0.390 | Cohen's d | 0.260 |
| Agreeableness | 1.308 | 43.0 | 0.198 | Cohen's d | 0.392 |
| Conscientiousness | -0.977 | 42.0 | 0.334 | Cohen's d | -0.296 |
| Neuroticism | -0.552 | 41.0 | 0.584 | Cohen's d | -0.170 |
| Imagination/Intellect | -1.288 | 42.0 | 0.205 | Cohen's d | -0.390 |

Since the alpha threshold is greater than 0.05 (Table 2), there are no statistically significant differences between the two groups of sports managers. However, the descriptive analysis highlights subtle differences that may be relevant in practice (Table 3). Specifically, ESM tend to be slightly more extroverted and agreeable, suggesting a greater orientation towards effective cooperation. On the other hand, FMSO scored slightly higher on the intellect/imagination dimension and on conscientiousness indicating a predisposition towards creative thinking and openness to new ideas.

Table 3

Descriptive statistics – personality traits

| Sports managers | | Extraversion | Agreeableness | Conscientiousness | Neuroticism | Imagination/Intellect |
|-----------------|------|--------------|---------------|-------------------|-------------|-----------------------|
| N | ESM | 25 | 25 | 24 | 24 | 24 |
| | FMSO | 20 | 20 | 20 | 19 | 20 |
| Mean | ESM | 13.3 | 15.4 | 15.7 | 10.6 | 15.0 |
| | FMSO | 12.8 | 14.6 | 16.4 | 10.9 | 15.6 |
| Median | ESM | 13 | 15 | 16.0 | 11.0 | 15 |
| | FMSO | 13.0 | 14.5 | 17.0 | 11 | 15 |
| SD | ESM | 1.41 | 2.04 | 2.78 | 2.04 | 1.65 |
| | FMSO | 2.21 | 2.52 | 2.06 | 2.27 | 1.64 |

Notes: ESM: Experienced sports managers, FMSO: Future managers of sports organizations

Next, using the Mann-Whitney (U) test, the differences between experienced managers were investigated according to gender and age (ESM between 25–40 years, and ESM over 40 years of age), in relation to the five major personality factors.

Table 4

U test – differences based on gender and age

| Personality traits | U – gender | p | r | U – age | p | r |
|---------------------------|------------|-------|-------|---------|-------|--------|
| Extraversion | 56.5 | 0.308 | 0.246 | 62.0 | 0.389 | -0.205 |
| Agreeableness | 68.0 | 0.716 | 0.093 | 68.0 | 0.602 | -0.128 |
| Conscientiousness | 34.0 | 0.035 | 0.514 | 31.5 | 0.020 | -0.559 |
| Neuroticism | 68.0 | 0.929 | 0.028 | 57.0 | 0.409 | -0.202 |
| Imagination/ Intellect | 64.0 | 0.742 | 0.085 | 66.0 | 0.767 | 0.076 |

The result obtained ($p=0.035$, Table 4) indicates a statistically significant difference between men ($M=16.7$, $SD=2.40$) and women ($M=14.2$, $SD=2.70$) in terms of conscientiousness, with an effect size of $r=0.51$, reflecting a strong effect (a strong difference between male sports managers and female managers in terms of conscientiousness). It seems that Romanian experienced sports managers (men) reported a stronger tendency towards self-discipline and goal orientation, compared to experienced women sports managers. In terms of neuroticism and intellect/imagination, the differences based on gender are almost non-existent. Also, a significant (and strong) difference in the level of conscientiousness ($p=0.020$, $r=0.55$ – Table 4) was found between ESM over 40 years of age ($M=17.0$, $SD=2.14$) and ESM between 25 and 40 years ($M=14.5$, $SD=2.82$).

Not least, using the U test, the differences between experienced sports managers were verified according to marital status (married or unmarried), and family situation (with or without children), in relation to the Big-Five personality traits.

Table 5

Mann-Whitney test – differences based on marital status and family situation

| Personality traits | U marital status | p | r | U family situation | p | r |
|---------------------------|------------------|-------|-------|--------------------|-------|-------|
| Extraversion | 65.5 | 0.505 | -0.16 | 72.0 | 0.801 | -0.06 |
| Agreeableness | 66.5 | 0.546 | -0.14 | 59.5 | 0.347 | -0.22 |
| Conscientiousness | 61.0 | 0.539 | -0.15 | 50.5 | 0.229 | -0.29 |
| Neuroticism | 70.5 | 0.953 | -0.02 | 63.0 | 0.637 | -0.11 |
| Imagination/ Intellect | 63.0 | 0.615 | -0.12 | 67.0 | 0.812 | -0.06 |

Data analysis revealed no significant differences between married and unmarried ESM and, also, between experienced sports managers who have children and those without children, in terms of the five major personality factors ($p>0.05$, Table 5). However, some slightly differences were observed: ESM who have children tend to exhibit higher levels of

conscientiousness ($M = 16.3$, $SD = 2.50$) and agreeableness ($M = 15.8$, $SD = 1.97$), compared to ESM without children ($M = 14.9$, $SD = 3.02$ – conscientiousness, respectively $M = 15.0$, $SD = 2.14$ – agreeableness). Also, married sports managers registered slightly higher levels of conscientiousness ($M = 16.0$, $SD = 2.34$) and agreeableness ($M = 15.7$, $SD = 2.02$), compared to unmarried ESM ($M = 15.3$, $SD = 3.23$ – conscientiousness, $M = 15.2$, $SD = 2.12$ – agreeableness).

Discussion

The personality of sports managers represents a combination of psychological traits, interpersonal styles, and leadership behaviors that influence how they manage people, organizations, and high-pressure situations in the sporting context. With all the changes and challenges in the field of sport, such as digitisation, audience diversification and globalisation, there is a constant demand for the development of managers who not only understand the technical aspects of sport, but also the psychological and social dimensions of sports management.

In the first stage of the present study, experienced sports managers were compared with future managers in terms of personality characteristics (the Big Five model). Data analysis revealed differences which, although not statistically significant, may be of practical importance in the context of human resource selection and training, in the field of sport. More exactly, experienced managers scored slightly higher on extraversion and agreeableness, indicating a slightly higher level of sociability and cooperation in interpersonal relationships. Interestingly, in terms of conscientiousness, future sports managers obtained slightly higher values. This result may reflect an increased desire of FMSO to demonstrate efficiency, organization and responsibility (essential characteristics in the professional training stage), or can be interpreted in terms of increased motivation for performance and professional validation. At the same time, FMSO scored slightly higher on the intellect/imagination dimension, indicating a predisposition towards creative thinking and openness to new ideas. However, in the absence of statistically significant differences between ESM and FMSO, we mention that Romanian future managers in the field of sport are well suited to the specifics of the job, combining personal responsibility with a proactive attitude and openness to innovation, manifesting (at least with regard to the five major factors of personality) the necessary characteristics for a successful career in sport management.

Next, the personality traits of experienced sports managers were investigated according to gender, age, marital status and family situation (with or without children). The Big Five model application to experienced sports managers, particularly concerning the above mentioned variables, represents an area requiring investigation. Therefore, the current study aimed to bridge this gap by examining how the Big Five personality traits manifest differently between male and female sports managers, according to managers' age, marital status or family situation – recognizing that these traits can significantly impact leadership efficacy and organizational performance. A significant difference in the level of conscientiousness was found between Romanian experienced managers (men) and women ESM, in favor of men, which are more goal oriented and show a higher

self-reported discipline. This difference may be influenced by contextual and cultural factors, professional roles, or social expectations associated with gender. It seems that male managers are more frequently described as adopting autocratic approaches that prioritize authority and task completion (Burton et al., 2009). This pattern is not, however, universal, but is shaped by organizational culture and contextual expectations. Considering neuroticism and intellect/imagination, the differences are almost non-existent based on ESM' gender. A good emotional self-control (low neuroticism) not only supports effective decision-making, but also contributes to the sustainability of a successful career in sports management (Allen & Laborde, 2014), regardless of gender. Interestingly, investigating sports managers from Transylvania (Romania), Zamora and Lupu (2010) found that female sport managers manifest a higher level of somatic and psychic anxiety, and a lower level of monotony avoidance (compared to men).

Also, a significant difference in the level of conscientiousness was found between ESM over 40 years of age, and ESM between 25 and 40 years (in favor of older sports managers). Specialized literature (Roberts et al., 2006; Soto et al., 2011) discussed about the changes in personality characteristics across the life course (distinct age trends in each broad Big Five domain), older people being more rule-oriented and having a greater maturity, self-discipline and adjustment, which in the sport management field support, for example, operations, governance, and budgeting. Regarding conscientiousness, "people in leadership careers traditionally display [...] higher conscientiousness" (Farstad & Arnulf, 2024), this trait being a robust predictor of job performance (Barrick & Mount, 1991).

Data analysis revealed no significant differences between married and unmarried ESM and, also, between experienced sports managers who have children and those without children, in terms of the Big Five personality traits. However, some interesting findings are still worth discussing: ESM who have children tend to exhibit slightly higher levels of conscientiousness and agreeableness (compared to ESM without children), while married experienced managers registered, also, the same tendencies (slightly higher scores for conscientiousness and agreeableness). These small differences may reflect the personal stability and social support associated with long-term relationships, and the subtle influence of parental responsibilities on personal and professional functioning.

Limitation of the study

The limitations of the research mainly concern the relatively small number of experienced managers investigated. Further studies are needed to supplement the present data, on larger groups and in different contexts – including other countries, being known that "cultures with an earlier onset of adult-role responsibilities are marked by earlier personality maturation" (Bleidorn et al., 2013). Also, the reliance on a self-reported tool may affect the accuracy of the responses, the limits of explicit/declarative measures being known (Predoiu et al., 2022). In this context, future studies using the implicit (nonconscious/automatic) self-concept of personality can be, also, used (see Schmukle et al., 2008).

Not least, the necessity for sports organizations to consider a comprehensive psychological profile (beyond the Big Five) when selecting and developing managers,

suppose including traits like those within the Dark Triad which may, also, exert considerable influence on leadership outcomes.

Conclusions

Subtle differences in term of Big-Five personality traits were emphasized between experienced and future sports managers (not statistically significant). FMSO registered slightly higher values on the intellect/imagination and conscientiousness sub-scales, indicating a predisposition towards openness to new ideas, creative thinking and self-discipline, while ESM obtained slightly higher results for extraversion and agreeableness. Considering neuroticism, the differences are almost non-existent. Therefore, we can state that Romanian future sports managers have the appropriate characteristics for a successful career in sport management – at least in terms of Big Five personality characteristics.

Based on gender, experienced sports managers (men) reported a stronger tendency towards self-discipline and goal orientation, compared to experienced women sports managers, while in terms of neuroticism and intellect/imagination the differences are almost non-existent. Also, significantly higher results for conscientiousness were observed in older sports managers (between 40–60 years old), regardless of gender, while insignificant Big-Five personality traits-related differences were found according to managers' marital status (married or unmarried) and family situation (with or without children).

Funding. *This study did not receive any external funding.*

Informed Consent Statement. *The participants provided their written informed consent to take part in this study.*

Conflict of interest. *Authors declare no conflict of interest.*

References

1. Allen, M. S., & Laborde, S. (2014). The role of personality in sport and physical activity. *Current Directions in Psychological Science*, 23(6), 460–465. <https://doi.org/10.1177/0963721414550705>
2. Allen, M. S., Greenlees, I., & Jones, M. (2013). Personality in sport: A comprehensive review. *International Review of Sport and Exercise Psychology*, 6(1), 184–208. <https://doi.org/10.1080/1750984X.2013.769614>
3. Aydogmus, C., Ergeneli, A., & Camgoz, S. M. (2015). The role of psychological empowerment on the relationship between personality and job satisfaction. *Research in Transportation Business & Management*, 2, 251–276. <https://doi.org/10.17261/Pressacademia.2015312979>
4. Barrick, M. R., & Mount, M. K. (1991). The Big Five personality dimensions and job performance: A meta-analysis. *Personnel Psychology*, 44(1), 1–26. <https://doi.org/10.1111/j.1744-6570.1991.tb00688.x>
5. Beatty, W. (2018). *Decision Support Using Nonparametric Statistics*. Cham: Springer International Publishing.

6. Bleidorn, W., Klimstra, T. A., Denissen, J. J., Rentfrow, P. J., Potter, J., & Gosling, S. D. (2013). Personality maturation around the world: A cross-cultural examination of social-investment theory. *Psychological science*, 24(12), 2530–2540. <https://doi.org/10.1177/0956797613498396>
7. Burton, L. J., Barr, C. A., Fink, J. S., & Bruening, J. E. (2009). “Think athletic director, think masculine?”: Examination of the gender typing of managerial subroles within athletic administration positions. *Sex Roles: A Journal of Research*, 61(5–6), 416–426. <https://doi.org/10.1007/s11199-009-9632-6>
8. Dan, Y., Ahmed, A. A. A., Chupradit, S., Chupradit, P. W., Nassani, A. A., & Haffar, M. (2021). The Nexus Between the Big Five Personality Traits Model of the Digital Economy and Blockchain Technology Influencing Organization Psychology. *Frontiers in Psychology*, 12: 780527. <https://doi.org/10.3389/fpsyg.2021.780527>
9. Devin, H. F. (2017). Investigating the relationship between Big Five personality traits and cultural intelligence on football coaches. *Human and Social Studies*, 6(3), 116–131. <https://doi.org/10.1515/hssr-2017-0027>
10. Donnellan, M. B., Oswald, F. L., Baird, B. M., & Lucas, R. E. (2006). The Mini-IPIP Scales: Tiny-yet-effective measures of the Big Five Factors of Personality. *Psychological Assessment*, 18(2), 192–203. <https://doi.org/10.1037/1040-3590.18.2.192>
11. El Othman, R., El Othman, R., Hallit, R., Obeid, S., & Hallit, S. (2020). Personality traits, emotional intelligence and decision-making styles in Lebanese universities medical students. *BMC Psychology*, 8: 46. <https://doi.org/10.1186/S40359-020-00406-4>
12. Farstad, C. W., & Arnulf, J. K. (2024). Individual characteristics in arts management careers: investigating the highly sensitive person scale on motivation to lead. *Frontiers in Psychology*, 15: 1392412. <https://doi.org/10.3389/fpsyg.2024.1392412>
13. Güneş, E., & Kılıç, H. O. (2024). Examining the Leadership Styles and Effects of Sport Managers. *Eurasian Journal of Sport Sciences and Education*, 6(2), 333–349. <https://doi.org/10.47778/ejsse.1502165>
14. Hahs-Vaughn, D., & Lomax, R. G. (2019). *An Introduction to Statistical Concepts*. Abingdon: Taylor & Francis.
15. Kang, C., Allen, J., & Watkins, J. (2025). A hierarchical analysis of perceived team personality traits in sport. *Frontiers in Sports and Active Living*, 7: 1502988. <https://doi.org/10.3389/fspor.2025.1502988>
16. Macra-Oșorhean, M., Lupu, I., Bogdan, T., & Lazăr, L. (2011). Psychological profile of Romanian sports managers in an international comparative perspective. *Studia Universitatis Babes-Bolyai, Educatio Artis Gymnasticae*, 56(4), 19–30.
17. Martin, W. E., & Bridgmon, K. D. (2012). *Quantitative and Statistical Research Methods. From Hypothesis to Results*. Hoboken: Wiley.
18. McCrae, R. R., & Costa, P. T., Jr. (1997). Personality trait structure as a human universal. *American Psychologist*, 52(5), 509–516. <https://doi.org/10.1037//0003-066x.52.5.509>
19. McCrae, R. R., & Costa, P. T., Jr. (2008). The five-factor theory of personality. In O. P. John, R. W. Robins, & L. A. Pervin (Eds.), *Handbook of personality: Theory and research* (3rd ed., pp. 159–181). New York: The Guilford Press.
20. Mitrache, G., Mihăiță, E., Cernăianu, S., Vasiliu, A. M., & Tudor, D. L. (2023). The relationship between BIG-FIVE personality factors, thinking style and self-efficacy among sports management students. *Discobolul – Physical Education, Sport & Kinetotherapy Journal*, 62(4), 305–316. <https://doi.org/10.35189/dpeskj.2023.62.4.3>
21. Nørgaard, M., & Sørensen, J. P. (2019). *Kompetencebehovet i Sport Management branchen i Danmark* [Competence requirements in the sports management industry in Denmark]. <https://tinyurl.com/sp-managers>
22. Piotrowski, A., Makarowski, R., Predoiu, R., Predoiu, A., & Boe, O. (2021). Resilience and subjectively experienced stress among paramedics prior to and during the COVID-19 pandemic. *Frontiers in Psychology*, 12, 664540. <https://doi.org/10.3389/fpsyg.2021.664540>

23. Predoiu, A. (2020). *Metodologia cercetării științifice. Aplicații practice și elemente de statistică neparametrică* [Scientific research methodology. Practical applications and elements of nonparametric statistics]. București: Discobolul.
24. Predoiu, A., Cristea, C. I., Predoiu, R., Roco, M., Cosma, G., Dănoiu, R., & Mihăilă, C. V. (2023). Brain dominance in sports managers – a preliminary study. *Journal of Sport and Kinetic Movement*, 41(1), 11–18. <https://doi.org/10.52846/jskm/41.2023.1.2>
25. Predoiu, R., Bitan, R., Predoiu, A., Nijloveanu, D., Gheorghe, G., & Szabo, G. (2024). Sports managers' coping strategies and overall life satisfaction. *Journal of Sport & Kinetic Movement*, 44, 46–55. <https://doi.org/10.52846/jskm/44.2024.1.5>
26. Predoiu, R., Dumitru, E. Ș., Predoiu, A., Gheorghiță, N., & Tudorancea, Ș. D. (2021). Temperament and emotional intelligence in the case of sports managers. *Discobolul – Physical Education, Sport & Kinetotherapy Journal*, 60(2), 170–181. <https://doi.org/10.35189/dpeskj.2021.60.2.9>
27. Predoiu, R., Makarowski, R., Görner, K., Predoiu, A., Boe, O., Ciolacu, M. V., ... & Piotrowski, A. (2022). Aggression in martial arts coaches and sports performance with the COVID-19 pandemic in the background – A dual processing analysis. *Archives of Budo*, 18, 23–36.
28. Rawat, S., Deshpande, A. P., Predoiu, R., Piotrowski, A., Malinauskas, R., Predoiu, A., ... & de Gennaro, D. (2023). The personality and resilience of competitive athletes as BMW drivers – Data from India, Latvia, Lithuania, Poland, Romania, Slovakia, and Spain. *Healthcare*, 11: 811. <https://doi.org/10.3390/healthcare11060811>
29. Roberts, B. W., Walton, K. E., & Viechtbauer, W. (2006). Patterns of mean-level change in personality traits across the life course: A meta-analysis of longitudinal studies. *Psychological Bulletin*, 132(1), 1–25. <https://doi.org/10.1037/0033-2909.132.1.1>
30. Santos, J. M., Batista, P., & Carvalho, M. J. (2022). Framing sport managers' profile: A systematic review of the literature between 2000 and 2019. *SPORT TK-Revista EuroAmericana de Ciencias del Deporte*, 11: 24. <https://doi.org/10.6018/sportk.479841>
31. Schmukle, S. C., Back, M. D., & Egloff, B. (2008). Validity of the five-factor model for the implicit self-concept of personality. *European Journal of Psychological Assessment*, 24(4), 263–272. <https://doi.org/10.1027/1015-5759.24.4.263>
32. Scott, D. (2014). *Contemporary Leadership in Sport Organizations*. Champaign: Human Kinetics.
33. Shuai, Y., Wang, S., Liu, X., Kueh, Y. C., & Kuan, G. (2023). The influence of the five-factor model of personality on performance in competitive sports: a review. *Frontiers in Psychology*, 14: 1284378. <https://doi.org/10.3389/fpsyg.2023.1284378>
34. Soto, C. J., John, O. P., Gosling, S. D., & Potter, J. (2011). Age differences in personality traits from 10 to 65: Big Five domains and facets in a large cross-sectional sample. *Journal of Personality and Social Psychology*, 100(2), 330–348. <https://doi.org/10.1037/a0021717>
35. Stănescu, M., Vasile, L., & Stănescu, R. (2016). Study about the psychological profile of the future sport managers. *European Proceedings of Social and Behavioural Sciences*, 15, 935–942. <https://doi.org/10.15405/EPBSBS.2016.09.116>
36. The Jamovi Project (2025) *Jamovi. (Version 2.7) [Computer software]*. Available online at: <https://www.jamovi.org> (Accessed September 12, 2025).
37. Zamora, E., & Lupu, I. (2010). Psychological differences in sports managers from Transylvania, Romania. An empirical study of gender differences. *Studia Universitatis Babes-Bolyai, Educatio Artis Gymnasticae*, 55(4), 65–74.
38. Xu, J., & Hao, F. (2025). The role of personality traits in athlete selection: A systematic review. *Acta Psychologica*, 260: 105478. <https://doi.org/10.1016/j.actpsy.2025.105478>