

INSIGHTS INTO LEADERSHIP AND PERSONALITY

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ABSTRACT

This paper's main objective is to verify some correlations between specific dimensions of personality and leadership, seen as a facet of personality. The research involved administering an online questionnaire in December 2019, which collected information on leadership, self-confidence, emotional instability, unpretentiousness, comprehension, and honesty-humility. The study was conducted on a group of 269 participants. Nonprobability sampling was used, based on the availability criterion. Results supported most of the hypotheses. Thus, people with a higher level of self-confidence have a higher level of leadership; also, people with a higher level of emotional instability have a lower level of leadership, and, respectively, people with a higher level of comprehension have a higher level of leadership. Scores obtained for the leadership scale show that men have a higher level than women, and managers score higher than people who do not have a management role. The hypothesis that unpretentiousness and the level of leadership are inversely correlated remains controversial since, on the one hand, unpretentiousness brings a plus in exercising influence over others, but, on the other hand, contrasts with the desire for affirmation of those who lead.

KEYWORDS: *leadership, personality, self-confidence, gender differences, managers.*

1. INTRODUCTION

Leadership is the process of influencing others to facilitate the achievement of important goals of a particular company/organization/group. In other words, leadership means influence, referring to the power of convincing people to work towards a common goal, relevant for the well-being of the group they belong to (Hogan, Curphy & Hogan, 1994; Radu-Gherase, 2009). Many authors have addressed the relationship between personality traits and leadership styles. They often concluded that specific characteristics, such as extraversion, conscientiousness, agreeableness, openness, honesty, emotional stability, and self-confidence are essential to leaders, for most leadership styles (de Vries, 2008; Kirkpatrick & Locke, 1991; Oc et al., 2015; Derue et al., 2011), except for the cases of transactional leader or passive leader. Other studies have indicated relatively weak correlations between well-known models (Big Five Theory, HEXACO Model, etc.) and leadership styles (Bono & Judge, 2004; Lim & Ployhart, 2004). De Hoogh, Den Hartog, and Koopman (2005) also emphasize the importance of dynamic contexts. A dynamic work environment acts as an important moderator between the charismatic leadership style and perceived effectiveness. De Vries (2012) considers that most studies have shown weak relationships between personality and leadership styles, but this is rather due to a disagreement between the way the leader is perceived and how his subordinates perceive him. Thus, the author obtained strong correlations between honesty-humility and ethical leadership, between extraversion and charismatic leadership, between agreeableness and supportive leadership, and, respectively, between conscientiousness and task-oriented leadership (de Vries, 2012).

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Beyond leadership styles, many studies have looked at the relationship between personality and leadership, as shown in a 2002 study (meta-analysis) (Judge et al., 2002). According to this meta-analysis, the correlations made by other authors between the dimensions of the Big Five model and leadership are -0.28 (emotional instability), 0.31 (extraversion), 0.24 (openness to experience), 0.08 (agreeableness), and 0.38 (conscientiousness). In addition, a multiple correlation coefficient of 0.48 was obtained between the five-factor model and leadership, which thus brought an additional justification to the traits perspective in the leadership approach.

Many studies have focused more on the link between personality and performance in a managerial position (Benson & Campbell, 2007; Hurtz & Donovan, 2000; Tett & Jackson, 1991), with different results. Communication frequency can also be a generator of leadership performance (Kacmar et al., 2003). Some authors (McCormick, 2001; McCormick, Tanguma & López-Forment, 2002) have shown that self-efficacy is a predictor of leadership performance in separating leaders from non-leaders. The authors' results also led to the validation of gender differences in leadership, based on the idea that women have a lower self-efficacy level than men (McCormick et al., 2002). The same happens with self-confidence, a trait attributed mainly to men. On the other hand, Canary and Hause (1993) consider that the differences between men and women are not exactly real, but rather due to the use of masculine scales, traditionally used to measure masculinity. Although they correctly predict leadership, the use of such scales serves to perpetuate the gender stereotypes they measure (Canary and Hause, 1993). Likewise, the research undertaken by Kolb (1999) did not indicate substantial differences between the behaviors of male leaders and those of female leaders, but there were differences in perceptions of these behaviors. Gender differences in leadership are a challenging topic of research (Radu, Deaconu & Frăsineanu, 2017; Radu & Năstase, 2011).

This paper's main objective is to verify a series of correlations between specific dimensions of personality and leadership, seen not as a result (the others follow the leader), but as a facet of the personality.

2. LEADERSHIP AND PERSONALITY. SOME ASPECTS THAT DEFINE THE LEADER

Trust is the foundation of leadership. Leaders are the ones having self-confidence and the ones generating confidence in others.

Self-confidence, seen as the perceived probability of success in accomplishing a task (McClelland, 1985), is undoubtedly an essential aspect of leadership. Kipnis and Lane (1962) showed in an experiment that people who did not have confidence in their leadership skills were much less willing to have face-to-face discussions with subordinates and instead tended to send their subordinates to the top manager or remember to rely on using administrative rules to solve problems rather than discussing them. On the other hand, although many studies aim at self-confidence as an attribute of effective leadership, many of them focus on showing confidence rather than on being confident as an intrapersonal quality, the effect being visible in people who follow the leader (De Cremer & van Knippenberg, 2004; Shamir, House & Arthur, 1993; Conger & Kanungo, 1987). In fact, displaying a higher level of self-confidence is an important feature to consider since the managers' selection process (Sosik & Megerian, 1999).

Emotional stability is expected to be one of the fundamental traits of successful leadership. Self-confidence helps leaders stay calm, and there is often a sign of equality between self-confidence and emotional stability (Kirkpatrick & Locke, 1991), although there are many different scales of measurement in the literature.

McCrae and Costa obtained a model that measures five personality factors (neuroticism, extraversion, openness, agreeableness, and conscientiousness), each factor having six measurement scales (McCrae & Costa, 1985). The model was developed, over time, according to the lexicon

method, which was both criticized and validated by other authors (Ashton & Lee, 2005). Thus, people characterized by neuroticism, seen as emotional instability, are vulnerable, worried, self-compassionate, and have unjustified mood swings. The opposite of these states is in the form of emotional stability, which assumes that people do not have unjustified sadness, feel good about themselves, and no longer worry about things that have already happened, aspects should resonate with leadership performance.

The sixteen scales of the 16 PF questionnaire are associated with the five factors and the eleven scales of the Tellegen's Multidimensional Personality Questionnaire (MPQ), with the three independent personality factors: positive emotionality, negative emotionality and constraint. Thus MPQ offers a unique assessment of personality from an affective, interpersonal and behavioral point of view, organized around broad factors corresponding to temperament dimensions (Patrick & Kramer, 2017). One of the scales of Tellegen's Multidimensional Personality Questionnaire measures emotional instability as a reaction to stress, self-observed through changes in mood, the manifestation of stress, worry and panic, doubt and sadness, which leads to diminished results obtained by managers and leaders.

Li, Chun, Ashkanasy, and Ahlstrom (2012) demonstrate that the emergence of leadership is determined, at least in part, by an interaction between individual group members' emotional stability and members' perceptions of group conflict. Both the emotional stability of the leader and the one of the subordinates influence the performance, the two being in a permanent interaction (Tee, Ashkanasy & Paulsen, 2013). Clarke (2010) suggests that emotional stability is even more important in project management due to the nature of this form of work organization, in which communication, teamwork, attention, and conflict management are crucial for project success.

Another interesting personality trait to approach in connection with leadership is unpretentiousness, seen as the absence of the need to constantly impress others by seeming more important, more talented, or more cultured than in reality. Walters and Diab (2016) showed that the relationship between unpretentious leadership and employee engagement was mediated by psychological security. By shaping learning ability, leaders can create an environment in which followers can act fearlessly and become fully involved in their work. Thus, unpretentiousness can be seen as a feature with an extraordinary potential to increase influence. However, this relationship between unpretentiousness and leadership is controversial, as being a center of influence for others also means standing out from the crowd.

Another feature of intentional personal development seems to be closely correlated with the tendency to lead others to achieve goals (Austin et al., 2000; Hay, 2010), especially in the case of transformational leadership.

Porter and Schumann (2017) talk about intellectual humility and openness to the opposite view. These are not possible without greater general intellectual humility, interest in general culture, more reading, and so on. However, intellectual humility presupposes more than that, by recognizing the limits of one's own knowledge and generously appreciating others' intellectual strengths so that disagreements become constructive. Results indicated a positive correlation between intellectual humility and openness to the opposing view (Porter & Schumann, 2017).

Therefore, we believe that another aspect that could define the leader is honesty-humility. Ashton, Lee and Son (2000) initially suggested honesty as a name for this dimension, but later concluded that this name would not capture well enough the scope of content covered by this factor and came to be called honesty-humility (Lee & Ashton, 2004).

Toftoy and Jabbour (2004) drew attention to the fact that the business environment is overcrowded with arrogance, pretentiousness, and desire for attention, and that humility is one of the "lost" traits of success. Nielsen, Marrone, and Slay (2010) emphasize the special role of humility in charismatic leadership, thereby preventing excessive self-concentration and considering others' opinions.

The model of the six factors (HEXACO) takes into account six dimensions of personality: honesty-humility, emotionality, extraversion, agreeableness, conscientiousness, and openness to experience. Honesty-humility is defined by traits such as sincerity and justice, as opposed to vanity and greed

(Ashton & Lee, 2008). In fact, the biggest difference between the Big Five and the HEXACO model is the addition of the honesty-humility factor, represented by the facets of sincerity, fairness, greed avoidance, and modesty (Anglim & O'Connor, 2018).

Honest individuals generally tend to make fairer allocations and act more cooperatively (Hilbig & Zettler, 2009), which increases their chances of success in interacting with others. Although very similar, honesty-humility does not entirely overlap with the agreeableness of the five-factor model. Thus, an experimental study (two different games) demonstrated active cooperation in the case of honesty-humility (but not in the case of agreeableness), in contrast to reactive cooperation in the case of agreeableness (but not in the case of honesty-humility). Active cooperation involved the equitable sharing of a sum of money by the decision-maker, and reactive cooperation involved the reaction to an incorrect sharing by someone else (Hilbig, Zettler, Leist, & Heydasch, 2013).

On the other hand, it is expected that people with a low score on the honesty-humility scale will not be perceived as leaders due to the tendency towards immoral actions (Ogunfowora & Bourdage, 2014). Of course, this finding would no longer be valid if we talk about self-assessment of the level of honesty and humility, in which case, often, less modest people are those who self-appreciate more in everything, including in terms of leadership skills.

Another interesting distinction between honesty-humility, on the one hand, and agreeableness, on the other hand, is that of creativity. Thus, Silvia, Kaufman, Reiter-Palmon, and Wigert (2011) showed that there is no correlation between agreeableness and creativity, but that honesty-humility is inversely correlated to creativity, according to previous studies that indicated a higher level of creativity in pretentious, less modest people (Feist, 1993).

An interesting experimental study on honesty-humility is that of Hilbig, Thielmann, Wühlrl, and Zettler (2015). The authors showed that the desire to establish the fairness shown by high-score individuals on the honesty-humility scale could be observed as goodwill and reluctance to take advantage of others' inferiority, but not as a general preference for equality. Participants made the necessary corrections when they won unfairly at the expense of others, but did not make them when they were in the opposite situation, which confirmed the difficulty of reactive cooperation when others do them an injustice.

Given all the above, a particular positioning towards a low level of honesty-humility has advantages and disadvantages, and it is not easy to establish which idea has a more substantial impact on leadership performance, each study emphasizing one of the two directions. In fact, trait theories in the leadership approach have often been criticized, even if we talk about traits in which the relationship seems less complex, as in the case of self-confidence.

3. RESEARCH METHODOLOGY

3.1 Research Hypotheses

This research aims to identify correlations between a series of personality traits and leadership, as well as leadership differences depending on gender and position in the organization. In this sense, we formulated the following hypotheses:

- Hypothesis 1. People with a higher level of self-confidence have a higher level of leadership.
- Hypothesis 2. People with a higher level of emotional instability have a lower level of leadership.
- Hypothesis 3. Upretentiousness and the level of leadership are inversely correlated.
- Hypothesis 4. People with a higher level of comprehension have a higher level of leadership.

- Hypothesis 5. Men have a higher level of leadership than women.
- Hypothesis 6. Managers have a higher level of leadership than people who do not have a management role.

3.2 Participants

The study was conducted on a group of 269 participants. Nonprobability sampling was used, based on the availability criterion.

The gender ratio is approximately 1:1, as 139 (51.67%) of the respondents are female, and 130 (48.33%) are male.

Participants are between 15 and 69 years old, with an average age of 28.112 (the standard deviation is 10.906).

Table 1 shows the distribution of participants by taking into account their status in the labor market.

Table 1. Distribution of respondents - status in the labor market

	Labor market status	Counts	% of Total
1	Employee - Manager	37	13.755
2	Employee - Non-manager	99	36.803
3	Entrepreneur	22	8.178
4	Student	97	36.059
5	Without any job	14	5.204
6	<i>Total</i>	<i>269</i>	<i>100.000</i>

3.3 Instruments

The research was based on the use of six scales. These instruments were taken in the Romanian language from Research Central (<http://www.researchcentral.ro/index.php?action=listateste>), with the corresponding statements (items), and the scoring method.

3.3.1 Leadership Scale

This scale can be found as scale 199 (Research Central). It is in the domain of Personality [IPIP] and in the subdomain of The 44 Lower-Level HPI Scales [HICs]. It includes six items (the last two being reversed) that measure the attitude towards leadership (seen primarily as an intention to lead others).

The internal consistency coefficient α Cronbach of the Leadership scale is 0.849, and no item was eliminated.

3.3.2 Self-Confidence

This scale can be found as scale 197 (Research Central). Like the previous scale, it is included in the Personality domain [IPIP] and in the subdomain The 44 Lower-Level HPI Scales [HICs]. It contains six items (out of which the last three are reversed) that measure an individual's level of certainty about their own abilities, abilities, and judgments.

The internal consistency coefficient α Cronbach of the Self-confidence scale is 0.811, and no item was removed.

3.3.3 Emotional Instability

This scale can be found as scale 266 (Research Central). It falls into the domain of Personality [IPIP] and Tellegen's Multidimensional Personality Questionnaire [MPQ]. It includes ten items (out of which the last five are reversed) that measure the degree of experience of rapid mood swings.

The internal consistency coefficient α Cronbach of the Emotional Instability scale is 0.842, and no item was eliminated.

3.3.4 Unpretentiousness

This scale can be found as scale 305 (Research Central). It is part of the Personality domain [IPIP] and the sub-domain Six Factor Personality Questionnaire [6FPQ] Higher-level 6FPQ Constructs. It includes nine items (items 3-9 are reversed) that measure the lack of need to be the center of attention.

The internal consistency coefficient α Cronbach of the Unpretentiousness scale is 0.763, and no item was eliminated.

3.3.5 Comprehension

This scale can be found as scale 308 (Research Central). It is part of the Personality domain [IPIP] and the sub-domain Six Factor Personality Questionnaire [6FPQ] Higher-level 6FPQ Constructs. It includes ten items (out of which the last three are reversed) that measure interest in reading and general culture.

The internal consistency coefficient α Cronbach of the Comprehension scale is 0.816, and no item was removed.

3.3.6 Honesty-Humility

This scale can be found as scale 314 (Research Central). It is part of the Personality domain [IPIP] and the subdomain Six Factor Personality Questionnaire [6FPQ] HEXACO Personality Inventory. It includes ten items (out of which the last five are reversed).

The internal consistency coefficient α Cronbach of the Honesty - Modesty scale is 0.790, and no item was eliminated.

3.4 Design and Procedure

The design of the research is non-experimental, transversal, exploratory. The study involved administering an online questionnaire (Google Forms) in December 2019, which involved collecting answers to the six scales presented and some questions about socio-demographic data. We distributed the link by email, and the data were collected within three weeks.

Participants were not financially motivated to answer the questionnaire. Participation was voluntary, with no time limit, ensuring the confidentiality of data and responses.

In the introduction of the questionnaire, information was provided on the study's purpose and the average duration of completion. The introduction also mentioned that participants could request a summary of the research report, and some of them used this option.

The questions in the questionnaire were asked in the same order for all respondents. All items were mandatory. Partial completion of the questionnaire was not allowed.

4. RESULTS

4.1 Descriptives

The data are normally distributed only for two of the six variables analyzed (Unpretentiousness and Comprehension); in the case of the other four, the data do not follow the normal distribution:

- Leadership, Self-Confidence, and Emotional Instability – skewness and kurtosis are acceptable (within the range [-0.7; +0.7]), but the Shapiro-Wilk test does not validate normal distribution;
- Honesty-Humility – all the data show that the distribution is not normal; most people perceive themselves as very honest (see Figure 1 and Table 2).

As a result, non-parametric methods are generally used to test the hypotheses.

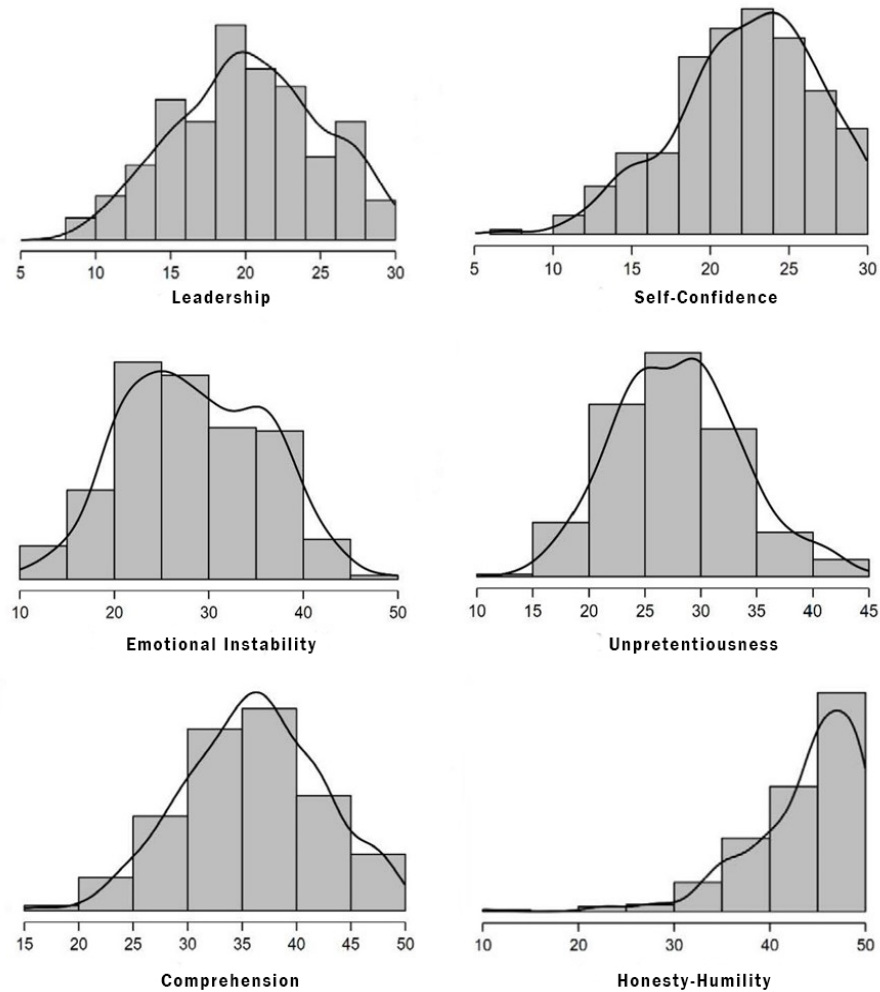


Figure 1. Distribution of participants' scores on the six scales (269 participants)

Table 2. Descriptives for the six variables and the whole group of participants (269)

		Leadership	Self-Confidence	Emotional Instability	Unpretentiousness	Comprehension	Honesty-Humility
1	N	269	269	269	269	269	269
2	Mean	20.338	22.431	28.576	28.059	36.071	43.736
3	Standard deviation	4.778	4.468	7.361	5.668	6.287	5.907
4	Skewness	-0.042	-0.461	0.079	0.282	-0.116	-1.689
5	Std. error skewness	0.149	0.149	0.149	0.149	0.149	0.149
6	Kurtosis	-0.621	-0.081	-0.626	-0.071	-0.222	4.557
7	Std. error kurtosis	0.296	0.296	0.296	0.296	0.296	0.296
8	Shapiro-Wilk	0.985	0.974	0.987	0.990	0.992	0.857
9	Shapiro-Wilk p	0.005	<.001	0.013	0.060	0.168	<.001
10	Minimum	9.000	7.000	10.000	14.000	16.000	10.000
11	Maximum	30.000	30.000	49.000	45.000	50.000	50.000

4.2 Hypothesis Testing

4.2.1 Hypothesis 1

People with a higher level of self-confidence have a higher level of leadership.

The hypothesis is confirmed; the correlation is statistically significant, $p < 0.001$, and the Spearman Rho correlation coefficient = 0.405 (positive), indicating an average effect size.

People with more self-confidence, who know their qualities, and have a good opinion of themselves, want more than others to be leaders, having more confidence in their own leadership skills.

4.2.2 Hypothesis 2

People with a higher level of emotional instability have a lower level of leadership.

The hypothesis is confirmed; the correlation is statistically significant, $p < 0.001$, and Spearman Rho = - 0.237 (negative), indicating a fairly small effect size.

People who are more emotionally stable (thus, with a lower level of emotional instability), who do not worry about anything and feel comfortable with themselves, are more willing to lead others.

4.2.3 Hypothesis 3

Unpretentiousness and the level of leadership are inversely correlated.

The hypothesis is not confirmed; for the whole group of participants, although the correlation appears to be statistically significant and the sign of the Spearman Rho correlation coefficient is negative, the correlation is weak anyway (see Table 3). We could say that it is not necessarily a rule, but that people with leadership aspirations are rather pretentious, concerned with making a good impression and meaning something special in the eyes of others.

On the other hand, the literature has shown that successful leaders (those who truly lead and influence, not those who have leadership aspirations) are less demanding. Therefore, we considered it necessary to test this hypothesis for a small group, including from the sample containing only those who hold management positions, more precisely 59, composed of 37 employees with management position and 22 entrepreneurs. This time, the correlation is not statistically significant (and the Pearson correlation coefficient was used, since, strictly on the sample of managers, the data are normally distributed for all variables except Honesty-humility, as presented in Table 13).

Table 3. Correlation Leadership – Unpretentiousness

		Correlation coefficient	p-value
1	All participants (269)	Spearman's rho = - 0.180	0.003
2	Only managers (59)	Pearson's r = - 0.069	0.602

4.2.4 Hypothesis 4

People with a higher level of comprehension have a higher level of leadership.

The hypothesis is confirmed; the correlation is statistically significant, $p < 0.001$, and the correlation coefficient Spearman Rho = 0.289 (positive), indicating a rather small effect size.

In principle, people who are more willing to broaden their knowledge and who work on their personal development are more inclined to lead others to achieve their goals.

4.2.5 Hypothesis 5

Men have a higher level of leadership than women.

Table 4. Leadership – Gender differences

		Mann-Whitney U	p-value	Biserial correlation
1	Leadership	6579.500	<.001	-0.272

The effect's size is given by the biserial correlation coefficient, which is relatively small (see Table 4). The test is statistically significant and indicates that women's leadership level is lower than that of men, as shown in Table 5.

Table 5. Descriptives – Leadership by gender

		Group	N	Mean	Standard deviation	Standard error
1	Leadership	Female	139	19.252	4.763	0.404
2	Leadership	Male	130	21.500	4.531	0.397

It is debatable to what extent this difference relates to real leadership skills, with the questionnaire assessing only respondents' perceptions, and the Leadership scale following leadership aspirations and not leadership performance.

4.2.6. Hypothesis 6

Managers have a higher level of leadership than people who do not have a management role.

In order to test this hypothesis, we selected a group of 118 participants in the field of work (since there are 59 managers – employees or entrepreneurs, we randomly selected an equal group of 59 employees without management positions, from the all 99 who responded to the questionnaire).

Descriptives are presented in Table 6 and indicate normal distributions for the variables Leadership, Unpretentiousness, and Comprehension (unlike descriptives for the total number of participants, we can see that this time the variable Leadership follows a normal distribution).

Table 6. Descriptives for the six variables – the small group of 118 participants

		Leadership	Self-Confidence	Emotional Instability	Unpretentiousness	Comprehension	Honesty-Humility
1	N	118	118	118	118	118	118
2	Mean	20.780	22.636	27.364	28.475	36.610	44.568
3	Standard deviation	4.820	4.148	6.611	5.283	5.984	5.213
4	Skewness	-0.051	-0.377	0.034	-0.028	-0.170	-1.218
5	Std. error skewness	0.223	0.223	0.223	0.223	0.223	0.223
6	Kurtosis	-0.537	-0.268	-0.782	-0.075	-0.357	1.060
7	Std. error kurtosis	0.442	0.442	0.442	0.442	0.442	0.442
8	Shapiro-Wilk	0.981	0.975	0.977	0.989	0.983	0.873
9	Shapiro-Wilk p	0.100	0.027	0.041	0.456	0.154	<.001
10	Minimum	9.000	12.000	11.000	16.000	20.000	27.000
11	Maximum	30.000	30.000	41.000	41.000	48.000	50.000

The hypothesis is statistically confirmed by the t-Student test: $t(116) = 2.376$; $p = 0.019$, with an effect size (Cohen) of 0.437.

Thus, on average, participants who currently hold a management position have a higher level of leadership than those employed without a management position (see Table 7), indicating the existence of actions to influence others.

Table 7. Descriptives – Leadership – managers versus non-Managers

		Group	N	Mean	Standard deviation	Standard error
1	Leadership	Manager	59	21.814	5036	0656
2	Leadership	Non Manager	59	19.746	4397	0572

4.3 Other Results

4.3.1 Findings regarding the whole group of participants

In Table 8, we present all the correlations highlighted by our analysis.

Table 8. Correlation coefficients between the analyzed variables – 269 participants

		Correlation coefficient	p-value
1	Leadership – Self-Confidence	0.405***	< .001
2	Leadership – Emotional Instability	-0.237***	< .001
3	Leadership – Unpretentiousness	-0.180**	0003
4	Leadership – Comprehension	0.289***	< .001
5	Leadership – Honesty-Humility	-0.081	0.184
6	Self-Confidence – Emotional Instability	-0.517***	< .001
7	Self-Confidence – Unpretentiousness	0.191**	0.002
8	Self-Confidence – Comprehension	0.282***	< .001
9	Self-Confidence – Honesty-Humility	0.168**	0.006
10	Emotional Instability – Unpretentiousness	-0.326***	< .001
11	Emotional Instability – Comprehension	-0.259***	< .001
12	Emotional Instability – Honesty-Humility	-0.176**	0.004
13	<i>Unpretentiousness – Comprehension</i>	<i>-0.062</i>	<i>0.313</i>
14	Unpretentiousness – Honesty-Humility	0.243***	< .001
15	Comprehension – Honesty-Humility	0.213***	< .001

* $p < .05$, ** $p < .01$, *** $p < .001$; in the case of data written in italics, Pearson correlation coefficient was used; for all the other cases, we presented the Spearman correlation coefficients.

Thus, a slightly stronger correlation can be noticed between self-confidence and emotional instability (the higher the self-confidence, the lower the emotional instability). Contrary to our expectations, it is interesting that the relationship between unpretentiousness and honesty-humility is relatively low, even if the two features seem to have several convergent aspects (especially in terms of implications for the leadership approach).

A significant difference can be observed between female and male participants in terms of unpretentiousness. Our results show that men are less pretentious (have a higher level of unpretentiousness) than women (see Tables 9 and 10).

Table 9. Gender differences – Unpretentiousness and Comprehension

		t-Student	df	p-value	Cohen's d
1	Unpretentiousness	-2.976	267.000	0.003	-0.363
2	Comprehension	-1.829	267.000	0.069	-0.223

Table 10. Descriptives – Unpretentiousness by gender

		Group	N	Mean	Standard deviation	Standard error
1	Unpretentiousness	Female	139	27.079	5.762	0.489
2	Unpretentiousness	Male	130	29.108	5.392	0.473

Table 11. Gender differences – Self-Confidence, Emotional Instability, and Honesty-Humility

		Mann-Whitney U	p-value	Biserial correlation
1	Self-Confidence	6939.000	< .001	-0.232
2	Emotional Instability	12790.000	< .001	0.416
3	Honesty-Humility	9045.000	0.988	0.001

A significant difference can be observed between female and male participants in terms of emotional instability (with an average effect size), in the sense that women tend to be more emotionally unstable than men (see Table 11), so as the literature suggests.

In Table 12, we presented the descriptives (for the two genders) for both self-confidence and the other variable where a statistically significant difference is observed (self-confidence); even if in the case of self-confidence, the effect size is relatively small, it is also in agreement with the results of previous studies.

Table 12. Descriptives – Gender in the case of the variable Unpretentiousness

		Group	N	Mean	Standard deviation	Standard error
1	Self-Confidence	Female	139	21.496	4.808	0.408
2	Self-Confidence	Male	130	23.431	3.846	0.337
3	Emotional Instability	Female	139	31.094	7.350	0.623
4	Emotional Instability	Male	130	25.885	6.374	0.559

4.3.2 Other results – Managers (59 participants)

This time, all variables, except for Honesty-Humility, follow a normal distribution (see Table 13).

Table 13. Descriptives for the six variables – the small group of 59 managers

		Leadership	Self-Confidence	Emotional Instability	Unpretentiousness	Comprehension	Honesty-Humility
1	N	59	59	59	59	59	59
2	Mean	21.814	23.627	25.356	29.390	37.424	45.390
3	Standard deviation	5.036	3.921	6.327	5.715	6.237	4.749
4	Skewness	-0.245	-0.472	0.269	-0.420	-0.357	-1.488
5	Std. error skewness	0.311	0.311	0.311	0.311	0.311	0.311
6	Kurtosis	-0.632	-0.066	-0.404	-0.189	-0.019	2.415
7	Std. error kurtosis	0.613	0.613	0.613	0.613	0.613	0.613
8	Shapiro-Wilk	0.967	0.964	0.975	0.971	0.975	0.849
9	Shapiro-Wilk p	0.105	0.074	0.253	0.178	0.277	< .001
10	Minimum	10.000	14.000	11.000	16.000	20.000	28.000

11	Maximum	30.000	30.000	39.000	41.000	48.000	50.000
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Tables 14 and 15 show the correlations between the variables, strictly for this group of participants (managers).

Table 14. Pearson's r correlation coefficients (five variables, 59 participants – managers)

			Leadership	Self-Confidence	Emotional Instability	Unpretentiousness	Comprehension
1	Leadership	r	-				
2	Leadership	p value	-				
3	Self-Confidence	r	0.592***	-			
4	Self-Confidence	p value	< .001	-			
5	Emotional Instability	r	-0.315*	-0.453***	-		
6	Emotional Instability	p value	0.015	< .001	-		
7	Unpretentiousness	r	-0.069	0.178	-0.466***	-	
8	Unpretentiousness	p value	0.602	0.177	< .001	-	
9	Comprehension	r	0.202	0.356***	-0.189	0.075	-
10	Comprehension	p value	0.125	0.006	0.151	0.574	-

* $p < .05$, ** $p < .01$, *** $p < .001$

Table 15. Spearman's Rho correlation coefficients (Honesty-Humility – correlation to the other five variables, 59 participants – managers)

			Leadership	Self-Confidence	Emotional Instability	Unpretentiousness	Comprehension
1	Honesty-Humility	Rho	-0.149	0.049	-0.047	0.249	0.313*
2	Honesty-Humility	p value	0.261	0.710	0.721	0.057	0.016

* $p < .05$, ** $p < .01$, *** $p < .001$

Interestingly, the relationships verified in the hypotheses have slightly higher correlation coefficients when the participants considered for the analysis are exclusively those holding management positions (except for the case of Comprehension).

Honesty-Humility is correlated only with Comprehension (see Table 15).

5. DISCUSSION AND CONCLUSIONS

Following the studied literature, most hypotheses are verified. Thus, people with a higher level of self-confidence have a higher level of leadership; also, people with a higher level of emotional instability have a lower level of leadership, and, respectively, people with a higher level of comprehension have a higher level of leadership. Scores obtained for the leadership scale show that men have a higher level than women, and managers score higher than people who do not have a management role. The hypothesis that unpretentiousness and the level of leadership are inversely correlated was not statistically confirmed. However, this is a controversial hypothesis since, on the one hand, unpretentiousness brings a plus in exercising influence over others, but, on the other hand, it contrasts with the desire for affirmation of those who lead.

Through this analysis, other correlations could be highlighted, such as, for example, the negative relationship between emotional instability and self-confidence.

It should be noted that all hypotheses were tested considering leadership as an aspiration (by using the Leadership scale) and not leadership as a position in the organization. Participants' self-

assessment cannot be confused with the actual level of leadership performance, but it reflects their attitude towards leadership. A future direction of research aims to design an experimental design, through which some variables (and especially leadership and honesty-humility) can be observed as actions/sets of behaviors. An alternative may be the further use of questionnaires but applied with identifying those in leadership positions in order to distinguish between how the leader is perceived and how his subordinates perceive him.

A rather significant limitation of this research is the sampling method used (nonprobability), based on availability and volunteering criteria. Representativeness cannot be achieved or estimated, and the results cannot be generalized to the whole population.

Also, since the data were distributed mostly non-parametrically (sometimes obviously from skewness and kurtosis, other times only by the Shapiro-Wilk test), non-parametric tests were mainly used that diminished the statistical power.

Although we could observe a significant gender difference in the entire sample, there is no significant difference between women and men in terms of the Leadership variable if the analyzed group is restricted to people holding management positions. Still, this finding requires further research, as the respondent managers were a total of 59, out of which only 18 female, which is why we did not present these data (irrelevant). We intend to continue the study from this point of view, as some studies suggest that the differences are only in perception and not in behavior, and the scales used are often too masculine.

As further processing of our data obtained from the questionnaire, we could use a coefficient of optimism, given by how the participants evaluate their material situation in the past and present and how they anticipate the one in the future (data obtained, but not studied yet). We could also check if there are differences between participants explained by the environment in which they spent the most time up to 18 years (again, data obtained, but not studied yet).

Finally, a future direction of research involves using a more comprehensive tool in assessing leadership to separate leadership styles and pursue the identification of relationships between personality traits and leadership styles.

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