The Self Rated Job Performance Scale
Studio delle proprietà psicometriche in lavoratori italiani

Annamaria Di Fabio[1] e Andrea Svicher[2]

Sommario

La Self-Rated Job Performance Scale (SRJPS) è un questionario che misura la job performance autovalutata. Il Presente studio è volto ad analizzare le proprietà psicometriche della Self-Rated Job Performance Scale (SRJPS) – Versione Italiana in 101 lavoratori italiani. La Horn's Parallel Analysis e l'analisi fattoriale esplorativa sono state condotte per testare la dimensionalità della scala. L'alfa di Cronbach e stata valutata per investigare l'affidabilità mentre la validità concorrente è stata investigata con la Utrecht Work Engagement Scale (UWES-9) e la Job Satisfaction Scale (JSS). I risultati hanno mostrato che una soluzione a un fattore si adattava adeguatamente ai dati, così come una correlazione positiva e statisticamente significativa tra SRJPS e UWES-9 e tra SRJPS e JSS hanno fornito l'evidenza di una buona validità convergente. Pertanto la versione italiana della Self-Rated Job Performance Scale ha mostrato risultati soddisfacenti per il suo utilizzo anche in Italia sul piano della ricerca e dell'intervento.

Parole chiave

Self-Rated Job Performance Scale, Job Performance, Contesto italiano, Lavoratori.

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The Self Rated Job Performance Scale

Study on its Psychometric Properties in Italian Workers

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Abstract

The Self-Rated Job Performance Scale (SRJPS) is a six-item self-rated questionnaire measuring job performance. The present research sought to analyse the psychometric properties of the Self-Rated Job Performance Scale (SRJPS) – Italian version in 101 Italian workers. Horn's parallel analysis and exploratory factor analysis were run to test the dimensionality of the scale. Cronbach's alpha was assessed to test reliability, whereas convergent validity was investigated with the Utrecht Work Engagement Scale (UWES-9) and the Job Satisfaction Scale (JSS). Results showed that a one-factor solution fit the data adequately. Furthermore, Cronbach's alpha coefficient of reliability was found to be good, in addition, a positive and statistically significant correlation between SRJPS and UWES-9, and between SRJPS and JSS provide evidence of good convergent validity. Thus, the Italian version of the Self-Rated Job Performance Scale shows good results for its use in Italy in research and intervention.

Keywords

Self-Rated Job Performance Scale, Job performance, Italian context, Workers, Psychometric properties.

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Introduction

In the field of work and organizational psychology, job performance is an essential aspect (Martocchio, 2015). According to Motowidlo (2003), job performance is the overall expected behaviour in relation to the organization's goals that an individual can carry out over a specific time. In this light, performance is a behavioural characteristic, since it is composed of several distinct behaviours that occur throughout a defined time frame. Moreover, the behavioural patterns referring to performance represent the expected value for the organization. Therefore, the construct of performance is a variable that discriminates between behavioural patterns performed by different workers and behavioural patterns performed by the same worker at different times. The difference is made on the likelihood that these sets of behaviours will either contribute to or subtract from organizational effectiveness (Campbell & Wiernik, 2015; Koopmans et al., 2014, Motowidlo, 2003). Therefore, performance only entails behaviours that have the potential to influence the achievement of organizational goals (Andrade et al., 2020).

Recent literature offers several models of job performance, such as Campbell's (2012) Multifactor Model, which includes eight factors. The *job-specific task proficiency* factor is how effectively a worker can accomplish essential technical job tasks that differentiate working activities. The *non-job-specific task proficiency* factor describes whether employees can accomplish activities that most occupations in an organization demand. The *written and oral communications* factor encompasses the proficiency of workers in writing or speaking to a group. The *demonstrating effort* factor deals with the extent to which workers are committed and how persistently and intensely they put efforts into assigned tasks. The *maintaining personal discipline* factor encompasses how much workers avoid alcohol addiction, absenteeism, and rule violation. The *facilitating team and peer performance* factor regards the degree of assistance, growth, and support individuals can provide towards the effectiveness of their workgroup. The *supervision* factor includes how effective workers are in exerting influence on subordinates. The *management and administration* factor refers to how successfully workers execute the required managerial tasks (Campbell, 2012). Subsequently, Koopmans et al. (2014) expand Campbell's concept including an additional dimension, namely, counterproductive work behaviour, indicating practices that are detrimental to the success of the organization.

In this framework, other models have explored the purpose of analysing job performance with an emphasis on the self-perception of individual behaviour (Andrade et al., 2020). Accordingly, Sonnentag and Frese (2002) developed a model that differentiates between *task-oriented performance* work activities (fitting with the technical core of the organization) and *context-oriented performance* (non-technical work activities that are rooted in the social, organizational and

psychological environment). Some other scholars, in particular Sora-Miana and colleagues (2011), and Peiró and colleagues (2020), have reinforced the field of study on work-related performance, starting from Abramis 's (1994) model, which is a widely used model specifically advanced for evaluating an individual's self-rated job performance. Abramis (1994) defined job performance as the workers' ability to successfully accomplish their tasks as well as their capability of making a positive contribution to the work environment. He identified three dimensions, namely, *technical performance*, *social performance*, and *attendance* (Abramis, 1994). *Technical performance* is the capacity of a worker to manage tasks, make correct decisions, and execute tasks without errors. *Social performance* is the capacity of a worker to work well with others, reach agreements, and refrain from conflict. *Attendance* is the absence of tardiness and absenteeism (Abramis, 1994). In particular Peiró et al. (2020), according to this model, starting from the Spanish adaptation of the scale developed by Abramis (1994) by Sora et al. (2011) as a nine-item self-report scale, developed a shorter version of the scale, comprising six items that measure workers' job performance considering six tasks: decision-making, performing without making mistakes, goal attainment, effort, taking initiatives, and taking responsibility.

From a contemporary perspective that considers the continuous erosion of resources in the working scenario (Blustein et al., 2019), researchers are called upon to apply evidence-based approaches to guarantee a cost-effective accordance (Whiston et al., 2017). Using questionnaires in a short form in working environments could encourage an approach capable of decreasing research and intervention costs without losing reliability. However, to the best of our knowledge, the Self-rated Job Performance Scale is not yet validated for Italian contexts. For these reasons, our study is aimed at evaluating the psychometric proprieties of the Self-rated Job Performance Scale - Italian Version in Italian workers.

Methods

Participants and Procedure

The Job Performance Scale – Italian Version was translated from English into Italian using the back-translation procedure. Participants of the current study were 101 Workers (Mage = 45.3, DS = 13.4; male = 48.5%, female = 51.5%) from Tuscany in Central Italy. Participants took part in the research voluntarily. They also provided written and informed consent in accordance with Italian privacy legislation (Law Decree DL196/2003) and the EU General Data Protection Regulation (EU 2016/679). We balanced the order of the administration to counteract the effect of the presentation order.

Instruments

The *Self-Rated Job Performance Scale* (SRJPS) – Italian Version (Di Fabio & Svicher) is a six-item self-rated tool based on Peiró et al. (2020), using a five-point Likert scale ranging from (1 = *very badly* - 5 = *very well*). The psychometric properties of this questionnaire were evaluated in the current study.

The *Utrecht Work Engagement Scale* (UWES-9) (Schaufeli et al., 2006) – Italian Version (Balducci et al., 2010) is a nine-item self-report scale measuring work engagement. The Likert scale of the instrument is rated using seven points (from 0 = *never* to 6 = *always*). In the present research, the reliability was α = 0.96.

The *Job Satisfaction Scale* (JSS) (Judge et al., 1998). – Italian Version (Di Fabio, 2018) is a five-item scale to evaluate job satisfaction using a Likert scale with seven points (1 = *Strongly disagree* – 7 = *strongly agree*). In the present research, reliability was α = 0.78.

Data Analysis

The Job Performance Scale's factor structure was investigated via exploratory factor analysis with principal axis factoring. The Kaiser–Meyer–Olkin test (KMO) and Bartlett's test of sphericity were performed (Bartlett, 1950; Kaiser & Rice, 1974). Factor structure was judged adequate with a KMO greater than 0.80 (Kaiser & Rice, 1974) and a statistically significant Bartlett's test of sphericity (Bartlett, 1950). We performed Horn's parallel analysis (Horn, 1965) to establish the factors' number to extract. Factor loadings were evaluated as follows: greater than 0.30 acceptable and greater than 0.50 good (Osborne et al., 2008). Reliability of the Job Performance Scale was evaluated using the Cronbach's alpha coefficient. A Cronbach alpha > 0.70 was judged acceptable (Nunnally & Bernstein, 1994). Pearson correlations were run to examine convergent validity with the UWES-9 and JSS. Significance levels were set at $p < 0.05$ (two-tailed). All the analyses were implemented via the R *Psych* 2.2.5 Package.

Results

We observed an adequate value (i.e., 0.89) obtained at the Kaiser–Meyer–Olkin test of sampling adequacy as well as a statistically significant Bartlett's test of sphericity ($p \leq 0.001$). Thus, the EFA was carried out. In order to evaluate the number factors to investigate, Horn's parallel analysis was performed. Figure 1 displays Horn's parallel analysis, revealing that a one factor should be extracted.

Figure 1

Parallel Analysis Scree Plots
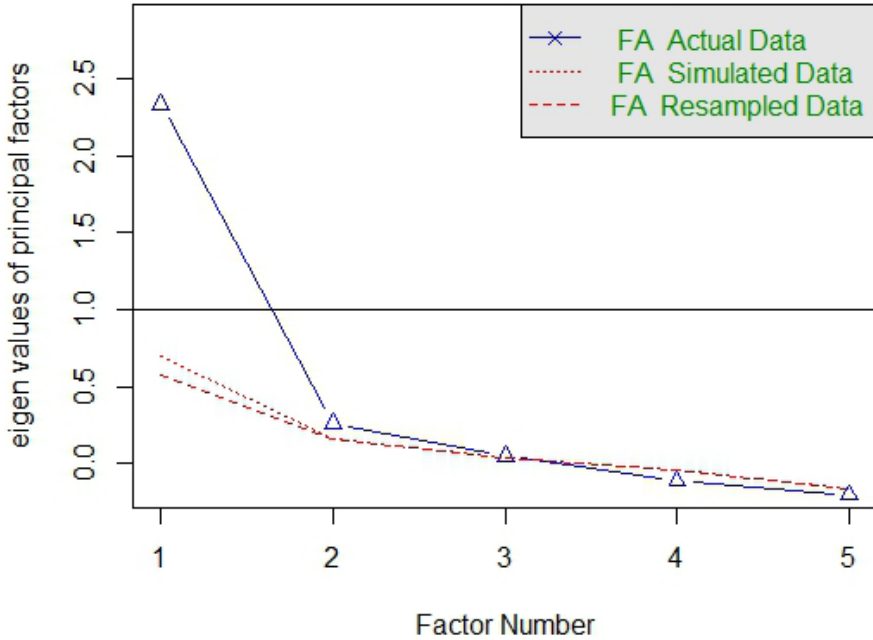
Job Performance Scale: Horn's parallel analysis (n = 101).

Table 1 displays the findings obtained with exploratory factor analysis (EFA) for the SRJPS. Results showed that a one-factor solution explained 47.7% of the variance also indicating a first eigenvalue of 2.84. Furthermore, table 1 displays that the one-factor solution had good factor loadings ranging between 0.60 (item 3) and 0.73 (item 4). Analysis of reliability indicated that the scale has a satisfactory reliability, revealing a Cronbach's alpha of 0.84.

Table 1

Self-rated Job Performance Scale: Exploratory factor analysis (principal axis factoring) (n = 101)

		Item					
		1	2	3	4	5	6
Factor	l	0.720	0.715	0.599	0.732	0.710	0.645

λ = factor loadings.

Lastly, table 2 illustrates Pearson correlations between the Job Performance Scale and the Utrecht Work Engagement Scale, as well as the correlation between the Job Performance Scale and the Job Satisfaction Scale. Results showed statistically significant and positive correlations of the Job Performance Scale with the Utrecht Work Engagement Scale and statistically significant and positive correlations of the Job Performance Scale with the Job satisfaction scale (Table 2).

Table 2

Correlations between the Self-rated Job Performance Scale, the Utrecht Work Engagement Scale, and the Job Satisfaction Scale (n = 101)

	1		2		3
1. SRJPS	—				
2. JSS	0.234	**	—		
3. UWES-9	0.387	***	0.415	***	—

Note. * p < .05, ** p < .01, *** p < .001. SRJPS: Self-Rated Job Performance Scale; JSS: Job Satisfaction Scale; UWES-9: Utrecht Work Engagement Scale.

Discussion

To the best of our knowledge, the current research firstly examined the psychometric properties of the Self-rated Job Performance Scale (SRJPS) in Italian workers. Exploratory factor analysis indicated that that a unidimensional solution fits the data well, highlighting a one-factor solution as suggested by Sora et al. (2011) and Peiró et al. (2020). Furthermore, the reliability of the SRJPS was found to be satisfactory, in line with Sora et al. (2011) and Peiró et al. (2020). Additional evidence of the scale's validity was highlighted by the statistically significant and positive correlation of the SRJPS with both the Utrecht Work Engagement Scale and the Job Satisfaction Scale, indicating good convergent validity.

This study has limitations and strengths. The principal limitation is inherent to the fact that the current research was conducted on workers enrolled in Central Italy. Thus, results could not be expanded to all Italian workers. To this end, additional studies enrolling workers from broader regions of Italy are recommended. Moreover, future research could apply confirmatory factor analysis as well as an item response theory model to further advance knowledge on the psychometric properties of this instrument. Another promising approach could be to explore the relationship between the SRJPS and relevant positive psychological resources, for example, emotional intelligence, resilience, humour, hope, and other positive-related variables (Di Fabio & Saklofske, 2021), which are vital in sustaining the flourishing of workers according to the positive healthy organiza-

tion perspective (Di Fabio, 2017a; Di Fabio & Peiró, 2018; Di Fabio et al., 2020). Despite the previous limits, the SRJPS showed good psychometric properties in assessing job performance in Italian workers, thus adding a short and easy-to-administer scale for research and practice in Italian working contexts, fully satisfying the requirements of accountability principles (i.e., limiting the costs of the research intervention while maintaining reliability).

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