

EDITORIAL

Organizational diagnosis and analysis of psychosocial risk factors: A changing paradigm

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In recent years, in an effort to optimize organizational performance, an increasing emphasis has been placed on the assessment and management of organizational factors which determine yield and employee satisfaction. The psychological dimensions that arise in the interaction between, on one hand, the employees' need for autonomy and achievement, and the normative pressures imposed by the organization, on the other hand, are taken into consideration.

Based on the analysis of the latest developments in organizational psychology, in the following, the recent concerns of the scientific community in I-O have been brought in the foreground. Concerns needed to identify organizational factors that contribute to the employee performance and wellbeing (factors of the organizational climate) are described, or of factors that, through their negative effects, can affect the employee's performance and wellbeing (psychosocial risk factors). Finally, some considerations were made on possible future developments in I-O psychological research and practice.

1. Paradigms in human resource management in organizations

With time, industrial-organizational psychology has evolved from the focus on the individual employee to a focus on the collective as a whole, from the normativity

imposed to the employee, to the concern for an individual's wellbeing. Two main attitudes, "philosophies", or perspectives exist about the understanding and approach to human resource management within the organization.

The first perspective starts from the (explicit or implicit) assumption that the employee is the main person responsible for achieving professional performance (individual and collective). As such, management (HR departments) should focus on implementing procedures that ensure standardization, control and predictability of behavior of employees (*recruitment and selection of staff, professional integration and adaptation, training of technical skills, assessing individual performance*, etc.). This approach is supported by academic disciplines such as Human Resource Management, Labor Psychology / Psychology of personnel, and it focuses on training, monitoring and control. It requires employees to comply with the procedures and standards set, otherwise they risk being penalized or removed from the organization. Although this approach is predominantly directive, organizational control on psychological dimensions that are supposedly underlying the performance (aptitudes, competencies and personality of the employee) is quite low. The explanations are as follows: these dimensions vary within the human population and are difficult to be reunited within a collective (through the

processes of recruitment and selection); they are relatively stable and resistant to change (depending on the genetic predispositions – *aptitudes*, and conditioning from the earliest years of life – *skills, traits*); finally, the psychological dimensions themselves do not guarantee performance, their actualization, manifestation depends on the specific context of work and the perceptions that employees have on the equity of the effort-reward ratio. Moreover, empirical studies and meta-analyses confirm that the abilities (especially cognitive) have a predictive power for performance around .50 (Schmidt & Hunter, 1998), while the personality traits have a low predictive power for performance: the observed correlates with the performances at values between .12 and .64 with a median of .27 - .13 and the operational correlations are between .13 and .70, with a median of .37 (Iliescu, 2011).

In the same vein we note that industrial-organizational psychology (I-O) was set up more like a psychotechnic science; since the dawn of applied psychology, psychologists have constructed tests to assess the individual aptitudes and intelligence (Binet & Simon, 1905) and had proposed measurement of the individual abilities to see if they meet the requirements (physical and mental) of a profession (Constantin, 2016).

The second attitude or philosophy for human resource management (partly associated with Theory "Y" on employee motivation, McGregor, 1960) assumes that employees have the need to excel and achieve the performance at work, and the organizational management must create the conditions needed, being the responsible factor for individual and collective performance. If the employees do not give the desired yield, then they must identify which part of the involvement-motivation system of the employees or which of the organizational procedures are not properly calibrated. In this perspective, there is a shift in emphasis and responsibility from the employee to the organization, from the need for standardization of procedures and employee's control, to the need of involvement and empowerment of the employee to take part in the organizational development. Thus, the orientation has shifted gradually from the

previous predominantly psychotechnic, centered on the analysis of individual characteristics which might underlie professional performance (aptitudes, skills, competencies, traits), to the analysis of some psychological dimensions that arise in the interaction between employees and the organization (e.g., organizational citizenship behavior, counterproductive work behaviors, etc.), or to the analysis of certain organizational variables that might be associated with the professional performance or satisfaction (e.g., organizational climate, organizational culture, etc.). As we will see below, in recent decades the industrial-organizational (I-O) psychology has placed a strong emphasis on analysis and management of organizational factors that can be stable predictors of long-term performance; these factors are more manageable by the organizational management, compared to the individual ones.

2. Professional satisfaction, well-being and ... profit!

In recent years more and more emphasis has been put on "professional satisfaction", "wellbeing" and even "employee's happiness", especially in peak industries where valuable employees are hardly kept. They have already created positions of "Chief Happiness Officer" whose task is precisely to ensure that employees feel satisfied, and, if possible, happy at the work place (Kovensky, 2014).

The reasons that underlie this concern for the wellbeing of employees are diverse and related to the technological and social evolutions in recent decades, to the plateau effect which affects the factors involved in fostering the performance, to the normative pressures of the trade unions, civil society and ... to calculations and financial reasons!

In the last decades it has been scientifically proven in rigorous studies that the contentment and satisfaction of the employee has a direct impact on performance; job satisfaction is more strongly linked to performance, especially when organizational behavior (like OCB and CWB) is included as part of the performance. In this regard, studies in *organizational citizenship behaviors* (OCB) and *counterproductive work behavior* (CWB)

have provided empirical, solid arguments to support the idea that these variables can be considered as extended indicators of organizational performance (Ion, 2014). Moreover, the OCB and CWB indicators seem to be more stable than objectively measured performance (*task performance*) both for simple roles (.81 vs. .61) and complex ones (.72 vs. .50) (Sturman, Cheramie, & Cashen, 2006). In recent meta-analytical studies, the average correlation between job satisfaction and individual performance is .30, higher for more complex jobs (Borman, Ilgen, & Klimoski, 2003). Professional satisfaction was associated with labor productivity (Halki & Bousinakis, 2010) and quality of work (de Menezes & Wood, 2015). In addition, generally job satisfaction correlates negatively with absenteeism, drug-use, resignation or early retirement (Carr, Schmidt & Ford, 2003; Judge, Parker, Colbert, Heller, & Ilies & 2006).

Organizational research is considered to have organizational variables which may be seen as antecedents of the CWB and OCB, variables related to in a higher measure with climate or organizational culture that can affect the final performance: *Organizational Satisfaction* (Organ & Ryan, 1995), *Organizational Commitment* (Riketta, 2002), *Organizational Fairness*, *Organizational Justice* (Colquitt, Conlon, Wesson, Porter & Ng, 2001), *Perceived Organizational Support* (Liu, 2009); *Task and Role Ambiguity* (Eatough, Chang, Miloslavic, & Johnson, 2011) etc. (apud Ion, 2014). In other words, it has been passed from analysis of individual factors that may be predictors of the individual and organizational performance, to the analysis of certain variables that appear in the interaction between employee and organization (OCB or CWB) or depending on procedures, policies and organizational practices (factors of organizational climate and culture).

On the other hand, in addition to the positive effect of the state of satisfaction on performance and implicitly on the profit of companies, European and international studies have shown that significant financial losses occur when the wellbeing of employees is ignored, and the factors associated with work-related stress affects physical and

psychological health status of employees. In the empirical research and in the organizational intervention of recent years the concerns about organizational climate analysis and employee satisfaction have increased, focusing on the impact they may have had on performance. One of the relevant current topics of research and intervention is related to the *psychosocial risk factors*.

3. The analysis of psychosocial risk factors in organizations

Firstly, during the last decades the rate of workplace accidents stagnated to an average of 3.83 (calculated per 100,000 employees) in the interval 2002–2010 (Manuele, 2013). On the other hand, the psychological pressures exerted on employees have been intensified and psychological factors have become the primary risk factor at work. Only in 2002, at the EU level, the estimated costs of work-related stress was over 20 billion euros; the *Sainsbury Center for Mental Health* estimated in 2007 as costs per organization, about 1,220 Euro/employee, because of dysfunctional effects of stress, anxiety and depression associated with psychosocial risk factors (Hassardet al., 2014). In this context, there is a legislative framework at the European level to encourage interventions towards reducing the incidence and effects of psychosocial risk factors and are allocating significant resources for the assessment and management of psychosocial risks at work. (<https://osha.europa.eu/en/themes/psychosocial-risks-and-stress>).

According to the *European Agency for Safety and Health at Work* (EU-OSHA, 2017) psychosocial risks are associated with "various aspects of the design, organization and management of labor, of the social and environmental context of labor, which can have negative effects on the staff, at a psychological, physical and social level." The psychosocial risk factors can also refer to "all those facets of the design and management of labor and the organizational and social context that can cause psychological or physical harm" (Cox & Griffiths, 2005), and are often associated with experiences of stress at work (Leka, Jain, & World Health Organization, 2010). Summing up, we can say that

psychosocial risk factors refer to any type of pressure exerted on the employee, which causes intense mental stress, frequent or prolonged, associated with the emergence of some dysfunctional symptoms, either cognitive or psychosomatic.

As a research domain "in the search for identity", there is no full agreement among analysts in this field; there is no theoretical model (empirical validated), a standard list containing the psychosocial risk factors, or recognized evaluation methodology. Starting from the analysis of relevant studies (Clarke & Cooper, 2004; Tabanelli et al., 2008; Leka, Jain, & World Health Organization, 2010; Manuele, 2013; Zaharia, 2015) and European practices promoted in recent years (Eurofound, 2014; EU-OSHA, 2017), we propose a strategy for identifying the psychosocial risk factors at the organizational level, illustrated below on a case study. In this approach, we proposed a research design aiming to consider whether and in what circumstances factors of organizational climate (expression of procedures, practices and organizational policies) are associated with a high incidence of psychosomatic individual symptoms (mean obtained within a group).

A number of 863 employees of a university (accounting for over 50% of the institution's staff) filled out two questionnaires (ECO System, Constantin, 2008 and The Copenhagen Psychosocial, Kristensen, 1997) under conditions of anonymity and confidentiality.

Utilizing the path analysis (AMOS) and regression analysis (hierarchical stepwise regression) our first conclusion was that, in the analyzed institution, the most important predictors of incidence of psychosomatic type symptoms, as potential psychosocial risk factors were: *overload at work, organizational (in-)justice, professional (non-)satisfaction and leadership / managerial style of direct superiors* (this latter having a positive effect by moderating the dysfunctional effects of the first three factors). These results differ in various collective or professional category, accordingly with the particular professional pressures and working conditions. (Constantin, 2017, in press).

The obtained data also suggest that the incidence of psychosomatic symptoms is the effect of practices within group and the way of application of organizational procedures and policies and not to hierarchical status or seniority. In other words, the psychosocial risk factors may be specific to each collective or category of employees, according to the characteristics of that group and the pressures (similar) to which their members are subjected. Where the incidence of individual psychosomatic symptoms exceeds a critical threshold, procedures for the management of psychosocial risk factors at the workplace should be implemented.

A regular assessment of organizational psychological health is useful and beneficial, considering that it gives access to both employee's wellbeing indicators and organizational practices and policies and allows for potential intervention when the situation is problematic.

Moreover, in parallel with the evaluation of the incidence of psychosomatic symptoms, it would be useful to record the indicators of well-being or individual happiness. In this way, both psychological risk factors — organizational pressures that may affect (negatively) physical and psychological health of employees, and resources — organizational contexts which may act as protective factors, generators of psychological comfort and wellbeing — be identified.

4. Possible developments of I/O psychology

In previous pages I made reference to only some of the relevant research topics in recent decades for I/O psychology, especially on the organizational behavior analysis component. As previously argued, recent developments in this field reveal a switch of the research interest from mainly individual variables to the collective ones (Schein, 2015). The employee is no longer considered the major source of the organization's performance, the performance responsibility being assigned to the organization itself. In other words, the I/O psychology studies have moved from a predominantly psychotechnic orientation, focused on evaluating relationships among individual inputs (aptitudes, competencies,

traits, etc.) and outputs (performance, satisfaction, burnout, etc.), to one focused on the analysis of behavior and organizational processes, of what happens in current professional interactions, in the organizational "black box".

Another reason for this is that the analysis of the relationships between individual characteristics and performance of employees has somehow reached its limits, as long as empirical data already frequently reconfirm identified relationships between the two categories of variables. There are already several meta-analyses confirming and reconfirming that the cognitive dimensions have a greater predictive power, around .55 (Hunter & Schmidt, 1998), while personality traits have a lower predictive power, between .10 and .65, with a median around .25 (Barrick & Mount, 1991; Tett, Jackson, & Rothstein, 1991; Tett, Jackson, Rothstein, & Reddon, 1994; Judge & Bono, 2001; Judge, Heller, & Mount, 2002; Viswesvaran, Schmidt, & Ones, 2005; Richardson, Abraham, & Bond, 2012; Poropat, 2009).

Analysis of interaction and group/organization phenomena has become larger and larger, to the detriment of analysis focused on the individual (Schein, 2015). The studies in dynamic of group/team interaction, employee motivation, organizational leadership, impact of the organizational climate, feeling of belonging or organizational (in-)justice are examples of important themes of past decades (Porter & Schneider, 2014; Schein, 2015). To these an increasing number of studies has been added related to the wellbeing or happiness of the employee at work and to the finding out the factors that could affect the psychological comfort of the employee ("psychological risk factors"). This shift from staff assessment to organization assessment, from the individual predictors of performance to the collective/organizational ones may have beneficial effects on organizational health. She moves the pressure from employee to management and encourages the implementation of procedures designed to protect the employee and to provide psychological comfort necessary for quality work.

In addition to these recent changes, we must take into account other signs of some developments in progress, which can decisively have an impact on the future of the industrial-organizational psychology.

For example, an area of research that might change this view, which could attack the psychometric position, is related to the genetic studies focused on the analysis of the relationship among the human genome/candidate genes and psychological characteristics of the individual. Already the studies on candidate genes and genome-wide association studies (GWAS) are increasingly numerous, because realization costs have decreased. The empirical results indicate an association between certain candidate genes and individual psychological characteristics, such as the five factors of personality (Terracciano et al., 2010; De Moor et al., 2012), individual reactions to stress (Miu, 2012), sensation seeking (Derringer et al., 2010), social anxiety (Miu, Vulturar, Kish, Ungureanu, & Gross, 2013), etc.

Another area rapidly evolving is that of information technologies, which bring about major changes in the collection and interpretation of large volumes of complex data. Data collected by entities like *Google* or *Facebook* and the way they can be used, make us wonder if in the near future the psychological evaluation based on self-report (given its vulnerabilities) will still be considered a valid procedure for assessment and prediction of behavior. The answers provided by one person at a time, in a self-assessment questionnaire, in a context with high stakes (at hiring, for example) can be easily distorted by the tendency to make a good impression. On the other hand, it is possible to assess and accurately predict the behaviors, preferences and future options of a person with the help of a database like *Google* or *Facebook*, based on their long history (in years) of lookups, options or decisions in terms of utility or preference. Kosinski and collaborators showed, in 2013, on a sample of 58,466 volunteer participants, that he was able to predict *Openness* (one of the five factors of the Big Five model) relying exclusively on the analysis of choices that people make on *Facebook*, with the same accuracy as test-retest studies which use personality

inventories (Kosinski, Stillwell, & Graepel, 2013). Also based on previous activity on Facebook it was possible to quite accurately identify sexual orientation, ethnicity, political and religious beliefs, intelligence, happiness, addictions, age, gender etc. (Kosinski et al., 2013).

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Progress in human genome analysis and the capacity to collect and analyze a huge quantity of individual and organizational information, in conjunction with recent concerns surrounding the study of wellbeing of the employee in work context, can open new lines of research and new insights on individual psychological assessment and prediction of future behaviors. We have to cope with these changes and, if possible, to anticipate them by defining (individual or collective / associative) some strategies for professional development.

The psychologists familiar with the language and rigors of research could provide the community, especially to practicing psychologists, on specialized platforms, syntheses of the latest results and insights in empirical research with organizational relevance. Also in such a framework one can call for involvement in the implementation of research programs and validation of new intervention procedures. Practicing psychologists, who are less familiar with scientific research algorithms, would be interested in participating in projects aimed at testing in organizational reality of valuable intervention programs which occur as outcomes of some recent empirical research. Thus, the need for information and professional development of practicing psychologists may be associated with the need which psychologists-researchers have for empirical validation of some assumptions or valuable intervention programs on extended populations and in real and various organizational contexts.

Such collaboration would entail creating partnerships among research centers/ universities, large companies and practicing psychologists, the latter being represented by bodies/ associations, such as the Association of Organizational Industrial Psychology (APIO). APIO could create the regulatory framework and provide the necessary support (a web platform) for mediation between: a)

organizational questions or issues (raised by practitioners or companies/ institutions); b) research or intervention projects meant to scientifically model these questions / issues (proposed by research centers / universities) and practical expertise and the context for implementing these projects (practicing psychologists).

In this way three major psychological needs of the community could be met: a) the need of professional solutions, scientifically verified and with checked impact (customers); b) the need for accurate data, collected on large samples and in distinct units (researchers); c) the need for appropriate methodology, involvement and professional development (practitioner psychologists). More, by creating such partnerships, people might pass from implementing the reactive strategies (e.g. *solving problems related to staff fluctuation*), to the design of some proactive strategies, of interest to the entire professional community (e.g. *anticipation of cognitive, motivational and attitudinal changes in new generations / future employees*).

Such a project will not be easy, but by creating the framework and routine of such interactions/collaborations, it will be easier to anticipate upcoming changes and to adapt ourselves quickly, so the I/O psychology in Romania could say that this is synchronized with that one practiced at the European and world level.

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