SUMMARY

EDITORIAL

Diversity at a crossroads: How diversity research can contribute to the fight for social justice

SMARANDA BOROŞ

Vlerick Business School, Brussels, Belgium

Four decades ago, the conservative president of the world's biggest economy changed the face of diversity research in organisations. The president in question is Ronald Reagan, who promoted a political ideology of "colour blindness, the dismantling of race-conscious affirmative action in employment, deregulation, and minimal government intervention in social issues" (Nkomo et al., 2019) and advanced a discourse that positioned group-based solutions to discrimination and workplace exclusion emanating from the Civil Rights Act of 1964 as antithetic to individual rights, individual freedoms, and individual agency. He cemented this ideological discourse through the prediction of the Hudson Institute's 1987 report Workforce 2000: Work and Workers for the Twenty-First Century, which claimed that racial and ethnic minorities and women would, by the turn of the millennium, constitute the majority of the net new entrants into the U.S. labour force without any further action in antidiscrimination and equal rights practices. This ideological, political context triggered the shift in HR practitioners' and researchers' discourse, from an initial antidiscrimination and equality perspective to 'the business case for diversity'. A plethora of research (from fundamental to practitioner and policy reports) tried to prove how diversity improves the bottom line of businesses, by mirroring the customers make-up and better adapting products to their needs (i.e., the access-and-legitimacy paradigm, Thomas & Ely, 1996); by drawing from a diverse pool of employees, which would solve demographic issues such as the aging of the population (European Commission, 2006); by capitalizing on the human capital of these diverse employees and thereby driving innovation (McKinsey & Company, 2020).

Four decades later however, meta-analytical findings show a much more complex picture of the dynamics that diversity brings in organisations than these linear claims. Systematic evidence at both team (van Knippenberg, De Dreu & Homan, 2004) and organisational levels (Mor-Barak et al., 2016) link diversity to both beneficial and detrimental outcomes. On the one hand, diversity can boost creativity in work teams (Curşeu et al., 2016; Homan et al., 2015), but it can also increase interpersonal conflicts (De Wit, Greer & Jehn, 2012), mistrust and animosity (Holmes et al., 2020; Mor-Barak et al 2016). Interventions that increase people's emotional awareness (Boroş, 2020; Boroş & Vîrgă, 2020) and contribute to creating more inclusive climates are the sine qua non mediator of diversity success (Holmes et al 2020; Mor-Barak et al 2016). However, this inclusion is not easily achieved in organisational interventions alone.

Correspondence concerning this article should be addressed to Smaranda Boroș, Vlerick Business School, Brussels, Belgium, E-mail: smaranda.boros@vlerick.com

Organisations are open systems that exist in historical, social and cultural contexts. Unfortunately, diversity research doesn't always recognize that and instead paints an incomplete picture of situated diversity in the workplace (Nkomo et al., 2019).

In their editorial for the special issue on diversity theorizing in Academy of Management Review (2019), Stella Nkomo and her collaborators talk about the limitations of diversity research in the past decades, both in content (the what) and in methodological approaches (the how). Reviewing decades of mainstream diversity research, the authors point to the predilection of the field to ontologically position diversity as any attribute along which a person is different, allowing for the move from what was termed as 'surface' diversity (e.g., socio-demographics) to 'deep-level' diversity (Harrison et al., 1998). While this line of research was crucial for team-level research and advancing the knowledge concerning team dynamics (Phillips & Loyd, 2006), it also allowed to eschew the issue of dominance of certain groups in society (e.g., the issue of 'white privilege', for instance – McIntosh, 1988) and further the research on power dynamics and diversity in organisations (a notable gap that research at group level started tackling more systematically only recently – Greer et al., 2017). The great majority of studies also used – for the sake of simplicity of design and analyses – single categories of diversity; this is one of the big gaps recently addressed at the group level by faultlines research (Homan et al., 2007). One immediately notices from these last couple of sentences (and in line with Nkomo et al.'s 2019 observations) that the most notable advancements in the field of diversity come from group-level studies (i.e., the micro-level of theorizing), mainly pursued in a positivistic approach, with elegant (often experimental), clear-cut designs. While such designs bring significant contributions to the advancement of knowledge, any HR practitioner is aware of the much messier reality of diversity in organisations and the need to actively bring issues of power, privilege, history and the larger context (e.g., of the industry or the

larger society) into the equation. It doesn't come then as a big surprise to see that, all these decades later, meta-analyses on the effectiveness of diversity trainings paint a rather gloomy picture. In their meta-analysis of 40 years of diversity trainings, Katerina Bezrukova and collaborators (2016) show that while cognitive learning persists after such trainings, affective/attitudinal and behavioural changes do not (with the impact being often reduced to two weeks post-training). The authors bring evidence that the most impactful and lasting interventions are trainings integrated in larger organisational interventions (Bezrukova et al., 2016). However, these are few and far between, not only on account of organisational costs, but also because the research here is lagging behind: The most noticeable gap in the 'how' of diversity theorizing in management sciences is the missing links between the micro-meso-macro levels of theorizing; specifically, "although societal systems of domination (i.e., racism, sexism, patriarchy, heteronormativity, and classism) are particularly relevant to understanding diversity in the workplace, the macro social-historical-political context has been largely neglected within management studies and diversity theorizing" (Nkomo et al., 2019: 502).

This is an especially troubling finding as it can be used as an argument against diversity trainings instead of thinking further how to better integrate diversity management interventions in the life of an organisation and the larger fabric of society. Why does it matter, you will ask, since diversity and inclusion interventions seem to be quite fashionable and currently on the agenda of many organisations? Because four decades later after the start of our story, another president of the (still) world's biggest economy, in the midst of a powerful social movement wanting to reveal and end the lingering systemic racial inequalities in the country, pulls federal funding for diversity awareness trainings, on account of them being 'divisive, anti-American propaganda'. One can only stop and wonder what implications this new policy orientation will have for the

field of diversity, given the implications of the last political intervention in diversity research (i.e., systematic evidence revealing that most research that tackles the macro-level of theorizing predominantly uses a resource-based view of the firm and competitive advantages brought on by diversity, and largely misses input from sociology, political theory, feminist studies and critical theory – Nkomo et al., 2019) and the fact that so much of this research remains to date very US and Western-centric. To the point, the top outlets for publishing management research are US or UK-based: of 13 journals ranked in Financial Times – so-called A* journals – only one is non-Anglo-Saxon (i.e., US or UK-based), and that one is based in The Netherlands.

The critique of the lack of cultural and historical-political context of mainstream diversity research, where context is often equated with task environment, diversity climate, or group culture, has been long and often raised by critical management research (Zanoni et al., 2010). This line of research strives to fill in these gaps. However, upon analysing the bulk of research published in this stream, one notices the high frequency of positioning research in Western philosophical and theoretical frames: a favourite in terms of framing being Marxism, with Foucault (from a philosophical standpoint) and Lacan (psychoanalysis) also richly informing critical management research. But how valid are these frames in non-Western settings, in fundamentally different systems of thought? Researchers from the Global South decry this positioning and the Western-centrism of diversity theories, be they mainstream or critical management (Holvino, 2010). The missing voices of the Global South and of local perspectives, culturally and historically situated, has been repeatedly raised in the leading journals (e.g., George et al., 2016) – and yet the same journals keep publishing research that fits into the existing paradigmatic, theoretical and methodological expectations (Boroş et al., 2020; Bosch et al., 2015).

This is where local journals of management science are needed to step up and make a stronger, original contribution to the *general state of diversity research*. Where, instead of replicating mainstream theories and studies, journals such as Human Resource Psychology can promote research that is:

- *Situated culturally and historically*: The easiest point to make here is about understanding the communist heritage in Eastern Europe and its current impact on organisational dynamics (e.g., Curşeu & Boroş, 2011), both within Eastern European systems, as well as in cross-cultural collaborations in multinationals. But beyond that, how do older systems of beliefs and cultural practices (such as, for example, beliefs in and the relation with the afterlife and the sacred dimension – Curşeu & Pop-Curşeu, 2011) shape current social interactions in the workplace; how do they shape goal-setting, organisational commitment and work-life balance? We need more in-depth input from local systems of thought (Konadu et al., 2021), we need the cultural and historical context in which studies are conducted to be part of the conversation and the theoretical modelling, not just a footnote in research context.

- *Taking into account power relations between minorities and majorities in the workplace, and that tells both stories and their interdependencies*. In the past, diversity research often approached employees who are a minority in the workplace as targets to be managed, rather than as agentic actors (Dye & Golnaraghi, 2017). However, ultimately it is the (minority) employee's decision to act or not upon diversity initiatives the organisation sets out (Cha & Roberts, 2019). This agentic potential gained a lot of traction in recent years, with new models bringing together the perspective of the minority as agent and the organisation as enabler (Van Laer & Janssens, 2017, Zanoni & Janssens, 2007). More research is

needed that continues this agentic approach, in conjunction with better insights as to why majority members themselves can act as allies and supporters (allyship insights having gained much prominence in journals such as HBR in 2020 – Creary, 2020; Melaku et al., 2020).

- *Intersectional*: So far, an extensive body of diversity theorizing has focused mainly on single categories of difference in isolation from others (Nkomo et al., 2019) -i.e., gender or age or race or ethnicity. Although a number of scholars have proposed the adoption of multiple demographic characteristics and intersectional lenses (e.g., Cha & Roberts, 2019; Holvino, 2010; Liu et al., 2019; Ramarajan, 2014), this is reflected less in empirical studies in mainstream diversity research (intersectionality remaining mainly the staple of critical management - Nkomo et al., 2019). Single categories of diversity, pointing to one feature of being different, i.e. a woman, omit the opportunities to draw on identity resources coming from the simultaneity of multiple identities, hence taking into account intersectional phenomena (Cha & Roberts, 2019). This is all the more limiting as there is research showing that women could "neutralize the disadvantageous lower status that is associated with being a women by foregrounding her other identities to construct a powerful and successful professional identity" (Janssens et al., 2006: 140). Future theory building should therefore position identities as fluid and intersectional (Holvino, 2010; Liu et al., 2019). This theoretical stance is reflected in a call for more idiographic research which gives voice to the "hidden stories at the intersections of race, ethnicity, gender, class, nation" (Holvino, 2010: 248) in the workplace. This finally leads us to the last two characteristics of new diversity research:

- *Combines qualitative and quantitative approaches more actively and bridges the divide* between the two. Since most researchers specialize in one or the other, this is also a call for more diverse collaborations in authorship, and true co-creation of research questions and design that span fundamental to applied, insight and internal validity to ecological validity questions. Variety in research methods would also continue the contribution of different systems of thought and knowing (Konadu et al., 2021): some cultures capitalize less on verbal expression, and instead complement it or even rely more on different sources of knowing, such as insight, and different means of expression from embodiment to music and visual artifacts (Baggini, 2018; Curşeu & Pop-Curşeu, 2011). How can we capture this in research in organisations and broaden the data sources and methods we use, in order to make room for new insights and new means of giving voice to respondents?

- *Actively reaches out to a diversity of respondents*, thereby addressing the lack of data on difficult to reach participants (Mehra et al., 1998). In doing so, research becomes a megaphone for the unheard voices, those who, in diversity interventions (be they organisational or related to international development) suffer the consequences of solutions that are put forward often without them being asked. This means a more tenuous data collection process; reaching out to less educated respondents, and finding ways to ask the questions differently than a standard questionnaire or even typical interview (DeSmet & Boroş, 2020). Without our research methods broadening (and learning from

disciplines such as ethnography and anthropology), the very issue of representation, central to diversity research, is at stake.

The covid-19 pandemic revealed to an unprecedented extent the existent inequalities in societies and between nations. There are calls from the heads of the main global monetary funds (Worldbank, IMF) to actively work on addressing raising world poverty. The fight for social justice – between and within societies needs more impactful support from diversity research: frames to better understand and create awareness of social and organisational dynamics; pathways to reconciliation and reparation; ways forward for collaboration that is mindful of difference and learns to build bridges that respect these differences and give them a voice in the global conversation. At organisational level, a recent paper on 'COVID-19 and the Workplace: Implications, Issues, and Insights for Future Research and Action' (Kniffin et al., 2020) written by some of the biggest names in OB research, singles out understanding the various experiences of different categories of employees (i.e., diversity in the workplace) as a core driver in modelling the new ways of working. Diversity research has now a real chance to make a social impact in the crafting of 'the great reset' (WEF, 2020) both at organisational and societal level. But this cannot happen if we all continue to pursue the old, well-established tracks of research, just to publish the same things in the same journals, and if journals keep launching the same calls for papers and accepting the same type of work. This is why, now more than ever, diversity researchers and HR practitioners need to actively choose the path they want to carve forward. This is the time of revolution. This is the time for diversity researchers and practitioners to lead the way in the fight for social justice and make the difference we all dreamed of when we first embarked on a journey in this field.

References

Baggini, J. (2018). *How the world thinks: a global history of philosophy*. Granta Books.

Bezrukova, K., Spell, C. S., Perry, J. L., & Jehn, K. A. (2016). A meta-analytical integration of over 40 years of research on diversity training evaluation. *Psychological Bulletin*, 142(11), 1227-1274.

Boroş, S. (2020). Controversy without conflict: How group emotional awareness and regulation can prevent conflict escalation. *Group Decision and Negotiation*, 29, 251–269.

Boroş, S., & Vîrgă, D. (2020). Too much love will kill you: the development and function of group emotional awareness. *Team Performance Management: An International Journal*, 71-90.

Boroş, S., Bosch, A., & Shymko, Y. (2020). North meets South: A call for inclusive global research. *Global Focus. The EFMD Business Magazine*, 14(2), 86-89.

Bosch, A., Nkomo, S., Carrim, N., Haq, R., Ali, F. & Sayed, J. (2015). Practices of organising and managing diversity in emerging countries: Comparisons between India, Pakistan and South Africa. Regine Bendl, Inge Bleijenbergh, Elina Henttonen, and Albert J. Mills (Eds). *The Oxford Handbook of Diversity in Organizations*. Oxford University Press.

Cha, S. E. & Roberts, L. M. (2019). Leveraging Minority Identities at Work: An Individual-Level Framework of the Identity Mobilization Process, *Organization Science*, 30(4), 735-760

Creary, S. (2020). How to be a better ally to your black colleagues. *Harvard Business Review*, 2-5.

Curşeu, P. L., & Boroş, S. (2011). Gender stereotypes in management: A comparative study of communist and postcommunist Romania. *International Journal of Psychology*, 46(4), 299-309.

Curşeu, P. L., & Pop-Curşeu, I. (2011). Alive after death: An exploratory cultural artifact analysis of the Merry Cemetery of Săpânţa. *Journal of Community & Applied Social Psychology*, 21(5), 371-387.

Curşeu, P. L., Pluut, H., Boroş, S., & Meslec, N. (2015). The magic of collective emotional intelligence in learning groups: No guys needed for the spell!. *British Journal of Psychology*, 106(2), 217-234.

De Smet, S. & Boroş, S. (2020). Revisiting women empowerment through a cultural lens An in-depth analysis of empowerment methodologies in horticulture in rural Ethiopia. *Frontiers in Psychology*, Special issue: African Cultural Models in Psychology.

De Wit, F. R. C., Greer, L. L., & Jehn, K. A. (2012). A meta-analysis of the relationship between diversity, conflict and team performance. *Journal of Applied Psychology*, 92(2), 360-390.

Dye, K., Golnaraghi, G. (2017). Organizational benefits through diversity management: Theoretical perspectives on the business case. Bendl R, Bleijenbergh I, Henttonen E, Mills AJ, eds. The *Oxford Handbook of Diversity in Organizations* (Oxford University Press, Oxford, UK), 255–280.

European Commission. 2006. *The demographic future of Europe - From challenge to opportunity.* Communication of 12 October 2006 [COM (2006)

571]. Available at https://op.europa.eu/en/publication-detail/-/publication/eec46e9d-b108-489e-9d65-b0e216428094/language-en

George, G., Corbishley, C., Khayesi, J.N.O., Haas, M.R., & Tihany, L. (2016). Bringing Africa in: Promising directions for management research. *Academy of Management Journal*. 59(2), 377-393.

Harrison, D. A., Price, K. H., & Bell, M. P. (1998). Beyond relational demography: Time and the effects of surface-and deep-level diversity on work group cohesion. *Academy of management journal*, 41(1), 96-107.

Holmes IV, O., Jiang, K., Avery, D. R., McKay, P. F., Oh, I. S., & Tillman, C. J. (2020). A Meta-Analysis Integrating 25 Years of Diversity Climate Research. *Journal of Management*. Online first at: https://journals.sagepub.com/doi/pdf/10.1177/0149206320934547?casa_token=qIAXqjiwZkUAAAAA:6_RcnncBbbjlcDtvKb3TaM9hgVdSMrFij57sCfrnUIsGD5OWbtKVGHILtXHflR7oteHkEVEkLF4

Holvino, E. 2010. Intersections: The simultanity of race, gender and class in organization studies. *Gender, Work & Organization*, 17, 248–277.

Homan, A. C., Buengeler, C., Eckhoff, R. A., van Ginkel, W. P., & Voelpel, S. C. (2015). The interplay of diversity training and diversity beliefs on team creativity in nationality diverse teams. *Journal of Applied Psychology*, 100(5), 1456-1467.

Homan, A. C., Van Knippenberg, D., Van Kleef, G. A., & De Dreu, C. K. (2007). Bridging faultlines by valuing diversity: diversity beliefs, information elaboration, and performance in diverse work groups. *Journal of applied psychology*, 92(5), 1189-1199.

Janssens, M., Cappellen, T., Zanoni, P. (2006). Successful female expatriates as agents: Positioning oneself through gender, hierarchy, and culture. *Journal of World Business*, 41(2), 133-148.

Kniffin, K.M.; Narayanan, J.; Anseel, F.; Antonakis, J.; Ashford, S.; Bakker, A.B.; Bamberger, P.; Bapuji, H.; Bhave, D.P.; Choi, V.K. (2020). COVID-19 and the Workplace: Implications, Issues, and Insights for Future Research and Action. *American Psychologist*. In press.

Konadu, O.A., Bosch, A. & Boroş, S. (2021). *An Ubuntu approach to understanding women's identity in Africa. Ubuntu Dialogues*. Academic Seminar Series organised by Stellenbosch University Museum and the African Studies Center at Michigan State University.

Liu, X., Park, J., Hymer C. & Thatcher, S. M. B. (2019). Multidimensionality: A Cross-Disciplinary Review and Integration. *Journal of Management*, 45(1), 197-230.

Mehra, A., Kilduff, M., & Brass, D. J. (1998). At the margins: A distinctiveness approach to the social identity and social networks of underrepresented groups. *Academy of Management Journal*, 41(4), 441-452.

McIntosh, P. (1988). *White Privilege and Male Privilege: A Personal Account of Coming to See Correspondences Through Work in Women's Studies*. Wellesley: Center for Research on Women.

McKinsey & Company (2020). *Diversity wins: How inclusion matters*. Available at: https://www.mckinsey.com/featured-insights/diversity-and-inclusion/diversity-wins-how-inclusion-matters

Melaku, T.M., Beeman, A.; Smith, D.G. & Johnson, W.B. (2020). Be a better ally. *Harvard Business Review*, 98(6), 135-139.

Mor Barak, M. E., Lizano, E. L., Kim, A., Duan, L., Rhee, M. K., Hsiao, H. Y., & Brimhall, K. C. (2016). The promise of diversity management for climate of inclusion: A state-of-the-art review and meta-analysis. *Human Service Organizations: Management, Leadership & Governance*, 40(4), 305-333.

Nkomo, S. M., Bell, M. P., Roberts, L. M., Joshi, A., & Thatcher, S. M. (2019). Diversity at a critical juncture: New theories for a complex phenomenon. *Academy of Management Review*, 44(3), 498-517.

Phillips, K. W., & Loyd, D. L. (2006). When surface and deep-level diversity collide: The effects on dissenting group members. *Organizational Behavior and Human Hecision Processes*, 99(2), 143-160.

Ramarajan, L. (2014). Past, Present and Future Research on Multiple Identities: Toward an Intrapersonal Network Approach, *Academy of Management Annals*, 8(1), 589-659

Thomas, D. A., & Ely, R. (1996). Making differences matter: A new paradigm for managing diversity. *Harvard Business Review*, 1-12.

Van Knippenberg, D., De Dreu, C. K., & Homan, A. C. (2004). Work group diversity and group performance: An integrative model and research agenda. *Journal of Applied Psychology*, 89(6), 1008.

Van Laer K., Janssens M. (2017). Agency of ethnic minority employees: Struggles around identity, career and social change. *Organization*, 24(2), 198-217.

Zanoni P., Janssens M. (2007), Minority Employees Engaging with (Diversity) Management: An Analysis of Control, Agency, and Micro-Emancipation*. *Journal of Management Studies*, 44(8), 1371-1397.

Zanoni, P., Janssens, M., Benschop, Y., & Nkomo, S. M. (2010). Guest editorial: Unpacking diversity, grasping inequality: Rethinking difference through critical perspectives. *Organization*, 17, 9–29.

RESEARCH ARTICLE

Work-family enrichment of dual-earner couples: a longitudinal study on the effects of personal resources

ALINA MATEI
West University of Timişoara, Timişoara, Romania

DELIA VÎRGĂ
West University of Timişoara, Timişoara, Romania

Abstract

The current study investigated the dyadic longitudinal interaction between psychological capital as a personal resource and work-family enrichment. Work-family enrichment is a positive transfer by both men and women from the home domain's job experience. The study involved 129 couples with a broad age range measured at two measurement occasions spaced three months apart. The design was built on the Work-Home Resources and Spillover-Crossover models. The analyses applied in this study were based on Actor–Partner Interdependence Models and extended Common Fate Models. Psychological capital is a predictor of the interpersonal (between partners) and intrapersonal (within the self) level for WFE in the models conducted on dyadic data. Furthermore, shared work-family enrichment predicted shared psychological capital from both partners. Thus, personal resources predicted work-family enrichment three months later. Theoretical and practical implications are discussed.

Keywords

Work-family enrichment, psychological capital, longitudinal, couples, crossover

Work-family research that receives the most considerable attention has previously focused on the negative spillover from the work domain to the family domain (e.g., work-family conflict; see review by Eby, Casper, Lockwood, Bordeaux, & Brinley, 2005), mainly ignoring the positive connections. In line with the positive psychology movement, researchers have recently explored the positive spillover between work and family (e.g., work-family enrichment; see review by Steiner & Krings, 2017). The synergies appear in literature under various labels (Greenhaus & Powell, 2006), including enrichment, enhancement, and facilitation.

Work-family enrichment (WFE) is defined as the extent to which experiences in one role improve the quality of life in another role (Greenhaus & Powell, 2006, p. 73). Thus, WFE represents how family roles benefit through developmental resources and positive affect derived from work involvement. The present study, using the Work-Home Resources Model (W-HR; ten Brummelhuis & Bakker, 2012), adds value to the literature by investigating the antecedents of WFE. W-HR aims to illuminate how resources are related to work-family facilitation (on a system level) and identify its primary antecedents, such as PsyCap, consequences, and moderators. The

---

Correspondence regarding this article should be addressed to Delia Virga, Ph.D., Full Professor, West University of Timisoara, Department of Psychology, Bv. Vasile Parvan, no. 4, Timisoara, 300223, Romania, Phone: +40 722 620 205, Email: delia.virga@e-uvt.ro

W-HR Model proposes that critical resources are conditional factors that prevent and attenuate the negative impact of the work on the home domain (ten Brummelhuis & Bakker, 2012).

Personal resources refer to "aspects of the self that are generally linked to resiliency and refer to individuals' sense of their ability to control and impact upon their environment successfully" (Xanthopoulou, Bakker, Demerouti, & Schaufeli, 2009, p. 123). Psychological capital (PsyCap) is a personal resource concerning the degree to which people believe they can influence their jobs (Luthans, Youssef, & Avolio, 2007). PsyCap represents a synergistic combination of four positive capacities: self-efficacy, hope, optimism, and resilience (Luthans, 2002) and enhances the capability of individuals in tackling problems and fit the demands in stressful circumstances. Resources are linked to each other, and people with a substantial reservoir of resources are likely to further enrich their resources (e.g., resources caravans; Hobföll, 2011). Therefore, individuals who already have possessed reserves of PsyCap are capable of substituting resources used in dealing with demands in stressful situations. They are thus less likely to suffer from stress symptoms.

This study adopted the Spillover - Crossover model (SCM; Bakker & Demerouti, 2013), which theorizes that individuals who experience job demands and resources will first spill over to their work domain and then cross over to their partners. The transmission of positive experiences has traditionally been referred to as a crossover and provides interesting insights for the spouses (Bakker, Westman, van Emmerik, Etzion, & Chen, 2009). Crossover represents a level of analysis of WFE research in that it allows for an understanding of how experiences are transmitted on the inter-individual level (Lapierre et al., 2018).

Based on the work-family literature, we propose an explanation of the underlying process of work-family spillover and crossover effects, namely that psychological capital may transmit resources from the work domain to the family domain and lead to interference.

In our research, we moved several steps beyond existing research by examining the dyadic longitudinal interplay between PsyCap and both individual and shared aspects of WFE within couples over three months. Specifically, using the developmental environment of stable intimate relationships, we addressed associations of longitudinal intra-personal and inter-personal effects in the personal resources and work-family interface. The use of dyadic longitudinal analysis designs, including PsyCap and the WFE of both partners, has the advantage that ecologically valid indicators of the individual's environment can be studied.

To more precisely capture the idea of the situation, we applied the Actor-Partner Interdependence Model (APIM; Kenny et al., 2008), but also conducted analyses based on an extended Common Fate Model (CFM; Ledermann & Kenny, 2012). The APIM is well-suited to test theoretical relationships among variables at the individual level. The actor effects quantify intra-individual influences, and the partner effects quantify the inter-individual forces within dyads. However, a dyad level analysis model (i.e., CFM) can assess the relationships' impact, not the individuals. In the opinion of Ledermann and Kenny (2012), the CFM "implies that two dyad members are similar to one another on a given variable due to the influence of a shared or dyadic latent variable" (p. 141).

This study's first contribution concerns the expansion of inter-role balancing by examining the longitudinal crossover impact of work on personal life. The W-HR Model authors encourage longitudinal studies and propose that it would be useful to test the hypothesis that gains in more structural personal resources influence work and home outcomes in the long run. The second contribution of the study is that it considers the relationships between WFE and PsyCap, with WFE as predictors at the intra-individual level and WFE and its predictors at the inter-individual level.

Our proposed study contributes to the literature in several ways. First, it surpasses the individual level-analyses that dominated this research (Beham, 2008) by including a crossover effect between one partner's PsyCap and the WFE of the other partner. Thus, it

offers practical implications for organizations seeking to help employees by implementing PsyCap interventions to stimulate WFE (Lupșa, Vîrgă, Maricuțoiu, & Rusu, 2020). Second, it heeds the call of Casper et al. (2007) and Kossek et al. (2011), who advocate for more WFE research in European cultures.

Work-Family Enrichment and Psychological Capital

A systematic review of Crain and Hammer (2013) has shown that WFE is positively associated with personal resources. Moreover, recent studies have shown that WFE is positively associated with PsyCap (Mishra, Bhatnagar, Gupta, & Wadsworth, 2019). PsyCap refers to "an individual's positive psychological state of development, "characterized by: "(1) having confidence (efficacy) to take on and put in the necessary effort to succeed at challenging tasks; (2) making a positive attribution (optimism) about succeeding now and in the future; (3) persevering toward goals and, when necessary, redirecting paths to goals (hope) in order to succeed, and (4) when beset by problems and adversity, sustaining and bouncing back and even beyond (resilience) to attain success" (Luthans et al., 2007, p. 3).

These findings can also be explained by the W-HR Model (Ten Brummelhuis & Bakker, 2012), which provides an informative view of what occurs when the work and home domains enrich each other. WFE reflects the process whereby resources in one area replenish or add to one's resource supply. The W-HR Model also explains how conditional factors, such as personal resources, may influence the occurrence of WFE. Furthermore, the model examines how WFE develops over time. The personal resources developed in each domain subsequently facilitate performance in the other area. For example, emotional support from one spouse (a contextual resource) may lead to a positive mood and enhanced self-efficacy. Those personal resources may, in turn, be used at work, leading to a vigorous and resilient work attitude or even enhance work performance (Greenhaus & Powell, 2006). This process view extends previous work-family research

that employed concepts referencing the relationship between work and family itself, interference, and spillover (Demerouti et al., 2017).

Previous research demonstrates that an individual with high PsyCap faces the demands that arise from the two domains of work and family and will cognitively appraise the task of combining work and non-work domains roles as a challenge (van Steenbergen, Ellemers, Haslam, & Urlings, 2008). The individual will then think positively about the demanding situation by positive revaluating. This individual will, in turn, feel capable of drawing valuable work and family resources and having mastery of both work and non-work demands, and thus perceives more WFE (Bell, Rajendran, & Theiler, 2012).

The resource of PsyCap can help employees preserve their perception of enrichment between work and family, and they are less vulnerable to future resource loss due to demand. The essential resources included in the W-HR Model help us understand which individuals are more or less prone to experience WFE. Individuals who have an extensive poll of personal resources (e.g., self-efficacy, optimism, or hope) are prone to experience WFE because those resources facilitate efficiently and optimize the usage of other resources (e.g., tasks, job) (Xanthopoulou, Bakker, Demerouti, & Schaufeli, 2009).

Theoretically, an employee with higher levels of PsyCap should feel more capable of managing or coping with the conflict due to higher perceived work and family psychological resources. In turn, employees who report high PsyCap should perceive more work-family resources and be better prepared to provide critical psychological resources: confidence to effectively handle a family emergency, optimism to view the situation as a more temporary setback, hope to manage the conflict in different ways to achieve resolution eventually, and the resiliency to bounce back and reduce negative work interference (Morganson, Litano, & O'Neill, 2014).

Work-life enrichment has implications for employee attitudes, behaviors, well-being, and organizational effectiveness (Eby et al., 2005).

The organizations introduce interventions to help employees manage the competing demands of work and family domains. Some of these interventions are: redesigning jobs to provide employees more autonomy and variety, providing benefits and policies such as work remotely, and developing a family-friendly organizational culture (Baral & Bhargava, 2011). More critical, PsyCap interventions can be used to stimulate WFE. A specific training model is a PsyCap Intervention (PCI) developed by Luthans, Avey, Avolio, Norman, and Combs (2006). The training proposes to increase each dimension comprising PsyCap. PCI can develop resources by identifying a goal, choosing measurable success points, approaching goal accomplishment, and identifying sub-goals to stay motivated (Luthans et al., 2006). By proactively implementing PCI in the workplace, employees will be better able to foster enrichment and be resilient in the face of conflict situations when they arise.

The recent meta-analytic review of the antecedents of WFE has provided support for the positive impact of PsyCap on the work-family interface (Lapierre et al., 2018). For example, findings show that individuals with more available resources can better manage and cope with various stressors and demands (e.g., Crawford, LePine, & Rich, 2010). Researchers have proposed the importance of psychological resources in managing competing work and family role demands in the existing work-family literature (Morganson et al., 2014). For example, related research has linked core-self evaluations (a meta-construct, including self-efficacy and self-esteem) with heightened WFE (Baral et al., 2011).

Taken together, previous studies and resource theories, especially the Work-Home Resources and the Spillover-Crossover Models, lead us to formulate the following hypotheses:

Intra-individual hypothesis 1: PsyCap at Time 1 will be positively related to employees' work-family enrichment at Time 2.

The above hypothesis is a typical sample of the classical causality hypothesis, which seems to be the consensus in the present theorization of WFE. That is, personal

resources cause positive WFE. Empirical studies limiting the nature of cross-sectional design, conduce to supply the process model with a content model, decline dynamic loops into a linear flow from resources to strains (Lu, 2011).

Similarly, Lu (2006) purports that human energy consumption is inseparably related to human energy production. Even while people are spending energy, they are also transforming more of it for later use. In other words, managing multiple roles may create energy and enhance the availability of resources. This study proposes that in addition to the path of resources leading to WFE, the opposite paths may operate. That is, enrich performance in one or two roles may generate further resources to enable later positive interactions between work and family domains, thus completing a positive feedback loop. This is the opposite of the "loss spiral" observed in the negative work-family process using a longitudinal research design (Demerouti, Bakker, & Voydanoff, 2010).

Intra-individual hypothesis 2: WFE at Time 1 will be positively related to the employees' PsyCap at Time 2.

Crossover between partners

This study adopted the Spillover - Crossover model (SCM) proposed by Bakker and Demerouti (2013), which theorizes that individuals experience job demands and resources will first spill over to their family domain cross over to their partners. The SCM combines the spillover and crossover literature and proposes that personal-related strain first spills over to the work domain and then crosses over to the partner through social interaction (Bakker & Demerouti, 2013).

Using SCM (Bakker & Demerouti, 2013) to differentiate the partner effects from the individual level effects, the term crossover has been introduced. The crossover process occurs when a psychological strain experienced by one person affects the stress of another person. This process may be either direct or indirect (Westman, 2001).

In the present study, we focus on WFE regarding direct partner crossover effects from a longitudinal perspective. The only synthetically review of positive and negative

crossover between partners (Steiner & Krings, 2017) yielded 21 studies that examined positive crossover, that is, the crossover of resources or positive experiences the WFE. Only a few studies applied a longitudinal research design (Bakker et al., 2013; Hammer et al., 2005; Rodríguez-Muñoz, Sanz-Vergel, Demerouti, & Bakker, 2014; Sanz-Vergel & Rodríguez-Muñoz, 2013; Yang, Zhang, Kwan, & Chen, 2015). The results of the studies mainly highlight indirect crossover based on spillover processes and marital interactions. More specifically, the results show that incumbents' positive experiences at work cross over to their spouses' well-being or family functioning through experiences of WFE (Steiner & Krings, 2017). The reviewed studies provide strong evidence for positive crossover in couples, with some longitudinal studies showing positive crossover effect seven for one year (e.g., Bakker et al., 2013; Hammer et al., 2005). Only two studies found no evidence for a positive crossover (Malach Pines et al., 2011; van der Zee et al., 2005). For example, van der Zee and colleagues (2005) found that only incumbents' work-family conflict but not enrichment crossed over to influence the spouses' subjective well-being. The specific sample might explain this finding, that is, expatriate couples. Besides WFE, an incumbent's work-related resources and positive experiences at work cross over and positively influence their spouse's well-being or family functioning.

The majority of findings on the effects of personal resources on WFE refer to intrapersonal associations. Both cross-sectional and longitudinal results indicate that self-efficacy is positively related to WFE, and PsyCap predicts a positive interface between work and family (Kwok, Cheng, & Wong, 2015; Mishra, Bhatnagar, & Gupta, 2013). Also, as part of PsyCap, optimism is a cognitive construct (expectations about the future), which is also related to motivation (Carver & Scheier, 2014). Optimists expect positive and desirable events in the future, whereas pessimists always have negative thoughts and are confident that undesirable events will occur (Luthans et al., 2007).

Several studies have found that personality characteristics are related to work-family experiences (Ahmad & Ngah, 2011; Baral & Bhargava, 2011). The results of a recent study lead by Burhanudin, Tjahjono, and Hartono (2020) show that optimism is positively related to WFE.

Positive resources or experiences gained from the workplace or family are likely to accrue and create positive spirals of resources, thus enabling individuals who have resources to gain further resources (Mauno, Kinnunen, & Ruokolainen, 2007). Like co-workers and supervisors support generating resources in the workplace, having an optimistic view, or a high level of self-efficacy can enrich work outcomes (ten Brummelhuis, van der Lippe, & Kluwer, 2010). Gross, Richards, and John (2006) found evidence for a relationship-specific interpretation bias suggesting that individuals with a high level of WFE tend to evaluate their life and relationship more positively. Interpersonal associations are studied less often, and existing results have been inconsistent. However, several studies have reported significant positive interpersonal associations between an individual's PsyCap and his or her intimate partner's WFE (e.g., ten Brummelhuis et al., 2010).

Thus, it remains unclear whether the interplay between PsyCap and WFE is intra- or interpersonal and whether the longitudinal associations are unidirectional or reciprocal. Therefore, we formulate the following hypothesis:

Inter-individual hypothesis 3: One partner's PsyCap at Time 1 is positively correlated to the other partner's WFE at Time 2.

APIM and Common Fate Model

The present study includes two analytic methods capable of handling interdependence and continues to support Ledermann and 'Kenny's (2012) call for more dyadic research to apply the common fate model (CFM) in connection with the actor–partner interdependence model (APIM). As the CFM extracts the shared portion of a between-dyad

variable, it can be used to model an environmental climate or atmosphere defined by both members of the dyad's perceptions.

The 'APIM's assumption includes four primary paths of interest: two actor paths and two partners (Cook & Kenny, 2005), while CFM allows for the measurement to occur at the level of the dyad versus at the individual level. The shared variable measures are modeled as a latent variable with two indicators, one from each dyad member.

This study included one common fate variable consist of two manifest variables as indicators: female responses and male responses regarding shared WFE and shared PsyCap.

We expected that primarily, the individual part of WFE and shared WFE would be affected by PsyCap and shared PsyCap. In turn, we assumed that shared PsyCap would influence shared WFE.

Inter-individual hypothesis 4: Shared PsyCap at Time 1 is positively associated with shared WFE at Time 2.

Methods

Participants

For the longitudinal study, we used a sample of 129 Romanian dual-earner couples. The selection of the participants was conducted voluntarily through a public research announcement disseminated through social media. After obtaining the informed consent to initiate an investigation, a self-administered questionnaire was filled out online of the couple. The answers of the respondents were anonymous and confidential. Participants completed the survey in approximately 15 min. The total sample at T1 consisted of 281 adults (age: M = 35, SD = 12.47, 51% women). The time lag between the two measurement occasions was 3months. For this study, selected all heterosexual couples with complete data for both partners. The final study sample consisted of 129 cohabiting or married couples (N = 258 individuals). The following sample description refers to the final sample. The participants ranged in age from

18 to 60 years (M = 35.91, SD = 11.62). The participants' average age is 36 years (Mwomen= 35 years; Mmen = 37 years), 60.47% of the couples were married, and 54.26% had children. The children's average age is 17 years, and most live with their parents (63%). The purpose of this study is to have only double-earner dyadic, so all the participants are employees at different companies, from public institution and non-governmental organization as well, with 18.27 averages of work years, and 71.7% of them working for five or more years.

There was a broad range of educational attainment. Of all participants, 46% reported having a BA degree, 9% had primary education, and 45% completed a university degree or higher.

Measures

Work-Family Enrichment was assessed with the five items scale from the SWING questionnaire (Geurts et al., 2005) with answers rated on a scale from 0 (never) to 3 (always). Example items for WFE are "You fulfill your domestic obligations better because of the things you have learned on your job?", "You are better able to keep appointments at home because your job requires this as well?" and "You manage your time at home more efficiently as a result of the way you do your job?". In the present study, the Cronbach's alpha coefficients of WFE for women were .78 and men were .75.

PsyCap was measured with the 24-item Psychological Capital Questionnaire (Luthans et al., 2007). The PsyCap Questionnaire has previously been validated psychometrically in Romania (Lupșa & Vîrgă, 2018). The questionnaire consists of four subscales, each with six items: self-efficacy ("I feel confident in representing my work area in meetings with the organization management"), hope ("Nowadays, I try to achieve my goals with great energy"), resilience ("At work, if necessary, I am able to stand "at my own risk"), and optimism ("In my work, I always look on the positive side of things"). The questionnaire answer rated a scale from 1 (total disagree) to 6 (totally agree). Cronbach's alpha values of the overall PsyCap scale for

each member of the couple were adequate (α = .92 for women and α = .94 for men).

Data Analysis

The panel data was analyzed based on the structural equation modeling (SEM) framework (Team, 2015), using the *lavaan* (Rosseel, 2012) packages in R (R Core Team, 2018). The model fit was assessed using 5000 bootstrap samples with 95% confidence intervals (Taasoobshirazi & Wang, 2016). Three absolute fits indices were used: Chi-square statistic, root mean square error of approximation (RMSEA), and standardized root mean square residual (SRMR) and two relative fit indices: comparative fit index (CFI) and the Tucker-Lewis index (TLI). The standards for the fit indices were the following: RMSEA < .08; SRMR< .08; TLI and CFI > .90 (Hu & Bentler, 1999).

Actor–Partner Interdependence Model

To account for the non-independence of dyadic data and to pursue our goal of examining bidirectional intra- and interpersonal associations between PsyCap and WFE, we applied two types of dyadic longitudinal cross-lagged models. The first type of model refers to an Actor–Partner Interdependence Model (APIM; Kenny, 2008), representing the most common model for analyzing dyadic data. It included the latent variable PsyCap and latent WFE for women and men at both measurement occasions.

Using APIM, intrapersonal stability coefficients for PsyCap, WFE, and the intrapersonal effects across constructs and the interpersonal effects within the same and across constructs could be analyzed for the intimate partners. As it was of interest in the current study, the model could be applied to analyze both intra- and interpersonal effects of PsyCap on the individual part of WFE and vice versa (see Figure 1).

Extended CFM

The Common Fate Model (CFM; Ledermann & Kenny, 2012) is rarely used in the dyadic data analysis literature. As a significant distinction from the classic APIM, the CFM explicitly enables variables to be modeled as shared external/contextual factors or common relational variables. Thus, these variables are assumed to be based on both dyad members' perceptions and, subsequently, affect both dyad members (Ledermann & Kenny, 2012). WFE represents a typical common relational variable. Therefore, we implemented the CFM in our second set of analyses in which we applied it to model the WFC of both intimate partners as work-family climate (see Figure 2). Hence, the work-family climate was conceptualized as the shared environmental context of the two intimate partners involving WFE aspects that were perceived and reported by both members.

In contrast to individual WFE and PsyCap, the latent shared WFE and shared PsyCap is less biased by interpretation biases concerning individuals' self-perceptions (Finn et al., 2013). The model also enabled us to analyze the effects of both women's and men's shared PsyCap on work-family climate and vice versa. As Kenny et al. (2008) recommended, we will report the unstandardized regression coefficients to ensure the coefficients' comparability between the two dyad members, thus across women and men.

Results

Preliminary Analysis

Table 1 presents the descriptive statistics, the correlation matrix, and the reliabilities for all the observed variables. All the Cronbach's coefficients indicate acceptable reliability, and all the correlations are statistically significant. Results revealed that participants reported high levels of PsyCap (means range from 4.39 - men to 4.46 - women) and high levels of WFE (Means range from 6.29 - men to 7.33 - women).

Table 1. *Mean standard deviation and Cronbach's coefficients.*

| | M | SD | Time 1 | | | | Time 2 | | | |
			1	2	3	4	5	6	7	8
Time 1										
1. PsyCap♀	4.46	.73	(.92)							
2. WFE♀	6.46	3.25	.28**	(.75)						
3. PsyCap♂	4.39	.78	.27**	.20*	(.94)					
4. WFE ♂	6.29	3.62	.26**	.46**	.26**	(.78)				
Time 2										
5. PsyCap♀	4.45	.74	.70**	.21*	.22**	.17	(.92)			
6. WFE ♀	7.33	3.56	.26**	.39**	.25**	.31**	.32**	(.75)		
7. PsyCap♂	4.39	.76	.34**	.23*	.44**	.25*	.35**	.27**	(.94)	
8. WFE ♂	7.07	4.09	.37**	.24*	.24**	.26**	.32**	.36**	.36**	(.78)

Notes: $N = 258$, 129 dyads (129 male and 129 female). **$p<0.01$, *$p<0.05$. PyCap = Psychological Capital, WFE = work-family enrichment;♀= women;♂ = men.Cronbach's α coefficients are displayed on the main diagonal.

Temporal stability

Before the model testing, the means, SD, and bivariate correlations (including auto-correlations) were computed for WFE and PsyCap (Table 1). As can be seen from the tables, all variables had significant auto-correlations of at least .26. The highest average auto-correlation was for PsyCap of female (.70), followed by PsyCap of male (.44), WFE of female (.39), and finally, WFE of male (.26). This means that WFE and PsyCap for males and females are relatively stable experiences.

Measurement and alternative models

We conducted a confirmatory factor analysis (CFA) before testing hypotheses 1, 2, and 3. According to Demerouti et al. (2004) procedure for analyzing cross-lagged data, four competing models were fitted to each set's data using a cross-lagged SEM. First of all, a model with temporal stabilities and without cross-lagged structural paths was described. The temporal stabilities (*stability model*) were drawing as correlations between the two constructs for each possible pair of measurement waves. This model estimates, therefore, the total stability coefficient between waves one and two. Second, this stability model was compared with the *causality model*. The causality model is identical to the stability model but also includes cross-lagged structural paths and crossover relationships from T1 PsyCap to T2 WFE, as well as T1 PsyCap to partner T2 WFE. The *reverse causality model* is identical to the stability model and includes cross-lagged structural paths from T1 WFE to T2 PsyCap. Additionally, this model consists of a crossover relationship from T1 WFE to partner T2 PsyCap. *The reciprocal model* includes reciprocal relationships between PsyCap and WFE, including all paths of the causality model and reversed causality model and full crossover relationship between partners.

The analysis suggested that the causality model had an acceptable fit. The model fits the APIM ($\chi2$= 263.97, RMSEA = .07, CFI = .98, TLI = .91, SRMR = .05) were good, comparisons with alternative models (e.g., stability model, reverse causality model and reciprocal model), as Table 2 shows.

Table 2. *Alternative models*

CFA	χ2	df	RMSEA	CFI	TLI	SRMR	Δχ2(Δdf)
Reciprocal model	263.97	28	.07	.96	.90	.07	0(0)
Revers causality model	263.97	28	.08	.96	.84	.06	0(0)
Causality model	263.97	28	.07	.98	91	.05	-
Stability model	263.97	28	.07	.92	.82	.07	0(0)
CFM	55.24	6	.07	.97	.93	.07	-

Notes: $N = 258$, 129 dyads (129 male and 129 female). PsyCap = psychological capital, WFE = work-family enrichment, *CFA* = confirmatory factor analyses, *RMSEA* = root mean square error of approximation, *CFI* = comparative fit index, *TLI* = Tucker Lewis index, *SRMS* = standardized root mean square residual, χ2= Chi-square

Statistical Analysis

Our data support intra-individual hypotheses 1 and 2. Employee PsyCap at T1 was positively related to her or his WFE at T2 ($\beta = .51$, $p < 0.01$ for female and $\beta = .74$, $p < 0.01$ for male), in support for hypothesis 1. Moreover, employee WFE at T1 was positively related to her/his PsyCap at T2 ($\beta = .12$, $p < 0.05$ for female and $\beta = .13$, $p < 0.05$ for male). This data support hypothesis 2.
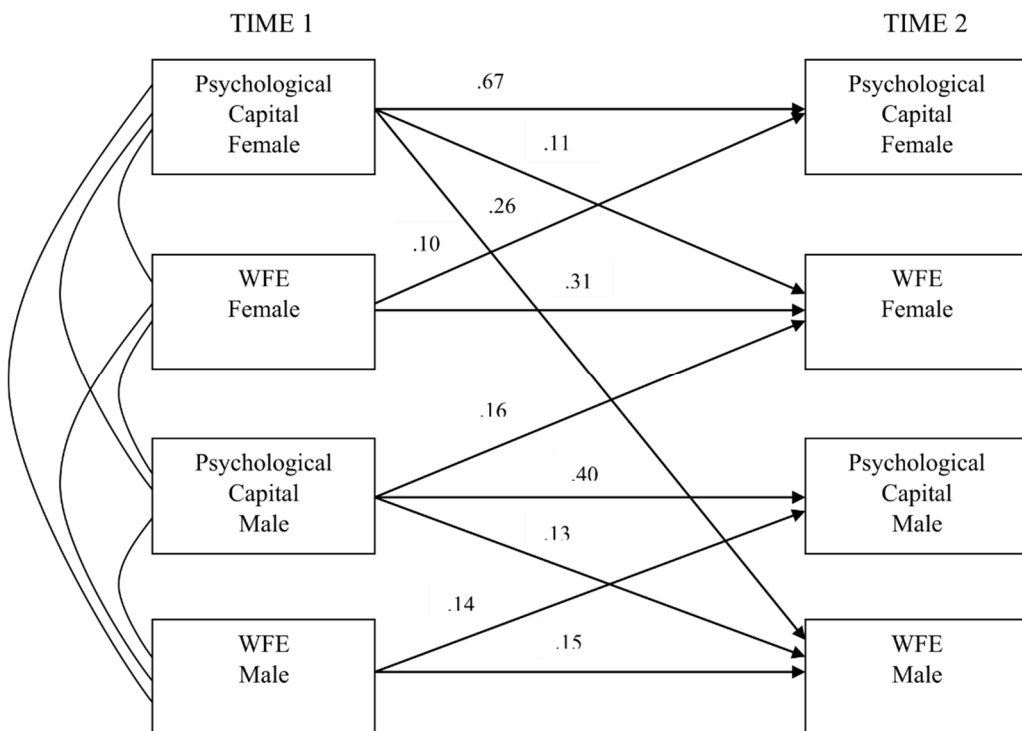

Figure 1. Standardized coefficients of the APIM tested in the study

APIM analyses

Regarding crossover effects, in support for hypothesis 3, female PsyCap at T1 was positively related to her spouse WFE at T2 (β = .40, p < 0.01), and male PsyCap was positively associated with his spouse WFE at T2 (β = .72, p < 0.01). Consider the intrapersonal associations between personal resources and WFE. We found a significant positive association between PsyCap at T1 and WFE at T2. Moreover, WFE at T1 and PsyCap at T2 were significantly related. The analyses on interpersonal associations between PsyCap and WFE reveal strong associations. Thus, the partner's PsyCap at T1 was a predictor of the spouse's T2 WFE, but WFE at T1 did not predict the partner's PsyCap at T2 (Table 3, Figure 1).

In sum, our analyses revealed that individuals high on PsyCap at T1 reported high WFE at T2. In contrast, individuals' PsyCap at T1 appeared to be predictive of higher WFE in the intimate partner at T2. Furthermore, WFE at T1 can also be predictive of higher PsyCap in the intimate partner at T1 (Table 3, Figure 1).

Table 3. *Associations between PsyCap, work-family enrichment, and work-family climate*

Model	Predictor	Effect	Correlation	b	SE	95% CI
APIM	PsyCap	Intrapersonal	PsyCap♀ T1 ->WFE ♀ T2	.11	0.41	[.17, .53]
	PsyCap	Intrapersonal	PsyCap ♂ T1 -> WFE ♂ T2	.13	0.44	[.18, .60]
	WFE	Intrapersonal	WFE ♀ T1 -> PsyCap ♀ T2	.10	0.15	[.15, .23]
	WFE	Intrapersonal	WFE ♂ T1 -> PsyCap ♂ T2	.14	0.17	[.17, .22]
	PsyCap	Interpersonal	PsyCap ♂ T1 -> WFE ♀ T2	.16	0.37	[.37, .39]
	PsyCap	Interpersonal	PsyCap ♀ T1 -> WFE♂ T2	.26	0.46	[.29, .78]
CFM	Shared PsyCap		Shared PsyCap T1 ->shared WFE T2	.24*	0.91	[.18, .32]

Notes: N = 258, 129 dyads (129 male and 129 female). **p<0.01, *p<0.05. PyCap = Psychological Capital, WFE = work-family enrichment; shared = shared WFE; ♀= women; ♂ = men, T1 = first measurement occasion; T2 = second measurement occasion (time interval: 3 months).

Extended Common Fate Model analyses

For testing hypothesis 4, we constructed a common fate structural equation model with shared PsyCap predicting shared WFE (see Figure 2). The findings of the CFM analyses complemented and accentuated the results reported from the preliminary analyses as follows. This model fit the data well: χ^2 = 55.24, df = 6, root mean square error of approximation (RMSEA) = .07; comparative fit index (CFI) = .97; Tucker–Lewis Index (TLI) = .93; and standardized root mean square residual (SRMR) = .07.

Lastly, the results supported hypothesis 4. More specified, shared PsyCap was positively related to a shared dimension of 'partners' WFE (β = .24, p< 0.05)

Our analyses did provide evidence of a link between shared PsyCap at T1 and shared WFE at T2 (Table 3, Figure 2). In summary, WFE is conceptualized as a dyadic shared WFE variable positively related to both partners' PsyCap partners in the couple.
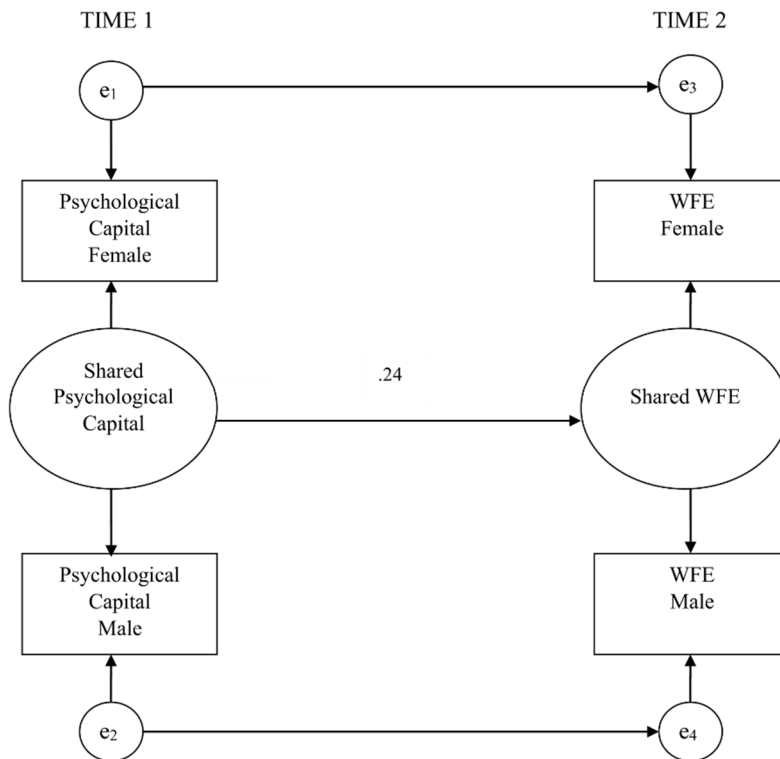
Figure 2. Unstandardized coefficients from Common Fate Model

Discussion

The current study investigated the bidirectional relation interplay between PsyCap and WFE in intimate couples, with WFE as one potential outcome at the intra-individual and inter-individual context. In a longitudinal dyadic dataset of heterosexual couples from Romanian, the main findings emerged.

First, in line with previous studies (Demerouti et al., 2017), our analyses revealed a positive intra-personal association between PsyCap and WFE (e.g., an employee who scored high on PsyCap at T1 reported high WFE at T2). Moreover, the analyses revealed a bidirectional interplay, and a high employee score on WFE at T1 reported a high score of PsyCap at T2. Second, our results demonstrated a positive inter-personal link between PsyCap and WFE (e.g., employee high PsyCap at T1 predicted her or his partner higher WFE at T2). Focusing on the dyadic level of shared WFE, shared PsyCap was

associated with shared WFE, suggesting that a positive shared PsyCap at T1 was predictive of higher shared WFE three months later.

Following W-HR Model (ten Brummelhuis & Bakker, 2012), our findings provide further evidence of a positive intra-personal association between PsyCap and WFE, suggesting that PsyCap is a psychological resource in the relationship context. Moreover, the inter-personal association's presence contrasts with previous studies (e.g., McNall, Nicklin, & Masuda, 2010).

Similarly, the empirical support for the second hypothesis augment the proposition of the W-HR Model (ten Brummelhuis & Bakker, 2012) provides that positive answers enhance the employees' personal resources. Handling control over various work and home requirements reduce the conflict between work and family demands (Aamir et al., 2016). It also generates positive emotions among employees, which aids in developing personal resources (Demerouti et al., 2017). WFE

allows control over work and home pressures, resulting in more positive experiences. These experiences act as reservoirs for further courses of action and keep employees positive, optimistic, and hopeful, even in challenging situations (Gupta & Shaheen, 2017). These findings provide empirical evidence about WFE as one of the essential purposes of positivity that develops and enriches employees' personal psychological resources. Owing to the positive work-related outcomes of PsyCap, Avey (2014) explored the antecedents of PsyCap and suggested that analyzing the predictors of PsyCap will help in designing strategies to develop the PsyCap level of the employees. Exercise control keeps employees hopeful, optimistic about their success, and resilient to work challenges, positively influencing the employees' PsyCap level. The present study with dyadic data goes one step further and suggests how the WFE keeps employees engaged in their work and enhances their psychological resources.

Most importantly, in agreement with SCM (Bakker & Demerouti, 2013), the current study's longitudinal design enabled control for the stability of all constructs involved. Whereas prior research was primarily conducted on employees only, the current sample consisted of couples from a more comprehensive age range. Two aspects of the core construct of PsyCap might provide some explanation of how enrichment may occur. As proposed by McNall et al. (2010), optimistic individuals perceive their relationships as more positive. Second, self-efficacy serves as a personal resource that generates positive outcomes (e.g., WFE), helping individuals build and maintain harmonious relationships in the workplace and family domain (Ho, Chen, Cheung, Liu, & Worthington, 2013). Thus, it might be the case that this positive bias primarily affects the inner world of the individual (self-perception of WFE) more than the outer world of the individual (shared WFE), resulting in intrapersonal associations only.

Theoretical and practical implications

The results of this study have several implications. Our findings confirmed that both

PsyCap and WFE play an essential role in intimate relationships. Using longitudinal dyadic cross-lagged models, we demonstrated that the pattern of associations between PsyCap with WFE is alike for the two dimensions. Consistent with the W-HR Model (ten Brummelhuis & Bakker, 2012), WFE was an outcome of PsyCap at intra-individual and inter-individual level, and also was a predictor of PsyCap at the intra-individual level. The findings emphasize that intimate relationships represent an environment that contributes to developing useful personal resources such as PsyCap.

Despite the limitations above, this study does have specific theoretical and practical implications in Spillover-Crossover Model (Bakker & Demerouti, 2013). From a theoretical perspective, this study heeds Beham (2008) calls, who advocates for a closer examination of how one partner's personal resources affect the other partner. The results demonstrate an association between the PsyCap of one partner and the WFE of the spouse in time. Thus, these results close the existing gap in the interplay between personal resources and work-family enrichment.

Furthermore, the study emphasizes the Common Fate Model's theoretical and methodological relevance (CFM; Ledermann & Kenny, 2012). The CFM offers a supplementary perspective from which to analyze environmental effects in dyadic relationships. However, under the condition that the intra- and inter-personal associations are equal between the two dyad members, thus, between women and men in our study, the main results are expected to be similar between the two model types. Consequently, the primary analyses showed that shared WFE modeled as a common factor provides consistent and differential results concerning associations with shared PsyCap in contrast with the studies on individual WFE.

From a practical perspective, our results provide HR specialists with a series of instruments to help individuals with their work. Specifically, investing in interventions aimed at enhancing ones' psychological capital is bound to have a positive impact on their WFE, as well as that of their partners. Several interventions model are presented by

Lupșa and her colleagues (2020). In this meta-analytical review, an example is PCI (PsyCap Intervention; Luthans et al., 2014), mindfulness, or interventions for self-development had an impact on PsyCap (Lupșa, Vîrgă, Maricuțoiu, & Rusu, 2020). Furthermore, teaching employees how to control their emotional responses can enhance the benefits of a PsyCap intervention, improving the occurrence of WFE. Denny and Ochsner (2014) have already validated such an intervention by teaching individuals to reinterpret or distance themselves from the negative stimuli over 12 days. Thus, organizations should make strategic efforts to develop people through organizational interventions and consider their family integral parts and facilitators of individual and organizational performance.

Limitations

Despite its strengths, the current study has several limitations. First, as the interplay between personal resources and WFE was studied at two measurement occasions covering three months, it was impossible to conclude long-term processes that may drive such associations between the constructs. Second, more measurement occasions across more extended periods are needed. Third, the WFE is a broad construct, and it contains many more aspects beyond social inclusion. Thus, future studies might be interesting to look at associations between PsyCap and the meta-perception of WFE (i.e., employee perception of spouse WFE). This measure would contain both a subjective perception and a form of interpersonal perception of WFE.

Conclusions

This longitudinal study aims to provide evidence that the pattern of dyadic longitudinal associations between PsyCap, as a personal resource and WFE. This study adds to the literature by simultaneously consider both spillover and crossover effects over time among dual-earner couples. Adopting two types of dyadic longitudinal cross-lagged models that we can control for the constructs'

stability, we demonstrated that high PsyCap predicted WFE within individuals and between intimate partners.

Finally, the individually WFE of both intimate partners promoted higher PsyCap of the spouse across time. Moreover, we applied the Common Fate Mode concerning shared WFE and implemented it in the context of shared personal resources to study the interplay between shared PsyCap and shared WFE. Our findings suggest that future research should extend this study by applying longitudinal dyadic designs that can consider both individuals' roles and shared aspects of WFE and individual and shared aspects of PsyCap.

References

Ahmad, A., & Ngah, N. (2011). Impact of dispositional factors and work-family conflict on job satisfaction among single mother employees. *American Journal of Applied Sciences*, *8*, 1107-1115.

Aamir, A., Hamid, A.B.A., Haider, M. and Akhtar, C.S. (2016), Work-life balance, job satisfaction, and nurse retention: moderating role of work volition *International Journal of Business Excellence, 10*, 488-501.

Avey, J. B. (2014). The left side of psychological capital: New evidence on the antecedents of PsyCap. *Journal of Leadership & Organizational Studies*, *21*, 141-149.

Bakker, A. B., & Schaufeli, W. B. (2008). Positive organizational behavior: Engaged employees in flourishing organizations. *Journal of Organizational Behavior*, *29*, 147–154.

Bakker, A. B., Shimazu, A., Demerouti, E., Shimada, K., &Kawakami, N. (2013). Work engagement versus workaholism: A test of the spillover-crossover model. *Journal of Managerial Psychology,29*, 63–80

Bakker, A. B., Westman, M., van Emmerik, I. H., Etzion, D., & Chen, S. (2009). The crossover of positive experiences from business travelers to their spouses. *Journal of Managerial Psychology, 24*, 269-284.

Baral, R., & Bhargava, S. (2011). Predictors of work-family enrichment: Moderating effect of core self-evaluations. *Journal of Indian Business Research, 3*, 220–243.

Beham, B. (2008). Satisfaction with work-family balance among German office workers. *Journal of Management Psychology, 25*, 669-689.

Bell, A. S., Rajendran, D., & Theiler, S. (2012). Job Stress, Wellbeing, Work-Life Balance, and Work-Life Conflict Among Australian Academics. *E-Journal of Applied Psychology*, *8*, 25-37.

Brough, P., O'Driscoll, M., Kalliath, T., Cooper, C. L., &Poelmans, S. (2009). *Workplace psychological health: Current research and practice*. Cheltenham, UK: Edward Elgar.

Burhanudin, B., Tjahjono, H., & Hartono, A. (2020). Work-family enrichment as a mediator effect of supervisor support, self-esteem, and optimism on job satisfaction. *Management Science Letters*, *10*, 2269-2280.

Carlson, D., Ferguson, M., Kacmar, M., Grzywacz, J., & Whitten, D. (2011). Pay it forward: The positive crossover effects of supervisor work-family enrichment. *Journal of Management, 37*, 770-789.

Carlson, D., Grzywacz, J., & Zivnuska, S. (2009). Is work-family-balance more than conflict and enrichment? *Human Relations*, *62*, 1459-1486.

Carlson, D. S., Kacmar, M., Wayne, J., & Grzywacz, J. G. (2006). Measuring the positive side of the work-family interface: Development and validation of a work-family enrichment scale. *Journal of Vocational Behavior*, *68*, 131-164.

Carver, C. S., & Scheier, M. F. (2014). Dispositional optimism. *Trends in Cognitive Sciences*, *18*, 293-299.

Casper, W. J., Eby, L. T., Bordeaux, C., Lockwood, A., & Lambert, D. (2007). A review of research methods in IO/OB work-family research. *Journal of Applied Psychology, 92*, 28–43.

Cook, W. L., & Kenny, D. A. (2005). The actor–partner interdependence model: A model of bidirectional effects in developmental studies. *International Journal of Behavioral Development*, *29*, 101-109.

Crawford, E. R., LePine, J. A., & Rich, B. L. (2010). Linking job demands and resources to employee engagement and burnout: A theoretical extension and meta-analytic test. *Journal of Applied Psychology*, *95*, 834-848.

Demerouti, E., Bakker, A. B., & Bulters, A. J. (2004). The loss spiral of work pressure, work-home interference and exhaustion: Reciprocal relations in a three-wave study. *Journal of Vocational Behavior*, *64*, 131-149.

Demerouti, E., Bakker, A. B., & Voydanoff, P. (2010). Does home life interfere with or facilitate performance? *European Journal of Work and Organizational Psychology*, *19*, 128–149.

Demerouti, E., Van den Heuvel, M., Xanthopoulou, D., Dubbelt, L., & Gordon, H. J. (2017). Job resources as contributors to well-being. In M. C. Peeters, J. De Jonge, & T. W. Taris (Eds.). *An Introduction to Contemporary Work Psychology* (pp. 269-283). John Wiley & Sons.

Denny, B. T., & Ochsner, K. N. (2014). Behavioral effects of longitudinal training in cognitive reappraisal. *Emotion*, *14*, 425-433.

Eby, L. T., Casper, W. J., Lockwood, A., Bordeaux, C, & Brinley, A. (2005). Work and family research in IO/OB: Content analysis and review of the literature (1980-2002). *Journal of Vocational Behavior, 66*, 124-197.

Ferguson, M. (2012). You cannot leave it at the office: Spillover and crossover of co-worker incivility. *Journal of Organizational Behavior*, *33*, 571–588.

Ferguson, M., Carlson, D., & Kacmar, K. M. (2015). Flexing work boundaries: The spillover and crossover of workplace support. *Personnel Psychology*, *68*, 1–34.

Ferguson, M., Carlson, D., Zivnuska, S., & Whitten, D. (2010). Is it better to receive than to give? Empathy in the conflict-distress relationship. *Journal of Occupational Health Psychology*, *15*, 304–315.

Ferguson, M., Carlson, D., Zivnuska, S., & Whitten, D. (2012). Support at work and home: The path to satisfaction through balance. *Journal of Vocational Behavior*, *80*, 299–307.

Finn, C., Mitte, K., & Neyer, F. J. (2013). The relationship-specific interpretation bias mediates the link between neuroticism and satisfaction in couples. *European Journal of Personality*, *27*, 200–212.

Gareis, K., Barnett, R., Ertel, K., & Berkman, L. (2009). Work-family enrichment and conflict: Additive effects, buffering, or balance. *Journal of Marriage and Family*, *71*, 697 – 707

Geurts, S. A., Taris, T. W., Kompier, M. A., Dikkers, J. S., Van Hooff, M. L., & Kinnunen, U. M. (2005). Work-home interaction from work psychological perspective: Development and validation of a new questionnaire, the SWING. *Work & Stress*, *19*, 319-339.

Greenhaus, J. H., & Allen, T. D. (2011). Work-family balance: A review and extension of the literature. In J. C. Quick & L. E. Tetrick (Eds.), *Handbook of occupational health psychology,* (pp.165-183). Washington, DC, US: American Psychological Association.

Greenhaus, J. H., & Powell, G. N. (2006). When work and family are allies: A theory of work-family enrichment. *Academy of Management Review*, *31*, 72-92.

Greenhaus, J. H., Ziegert, J. C., & Allen, T. D. (2012). When family-supportive supervision matters: Relations between multiple sources of support and work-family balance. *Journal of Vocational Behavior*, *80*, 266-275.

Gross, J. J., Richards, J. M., & John, O. P. (2006). Emotion regulation in everyday life. *Emotion Regulation in Couples and Families: Pathways to Dysfunction and Health*, *26*, 13-35.

Grzywacz, J. G., & Marks, N. F. (2000). Reconceptualizing the work-family interface: An ecological perspective on the correlates of positive and negative spillover between work and family. *Journal of Occupational Health Psychology*, *5*, 111-126.

Gupta, M., Shaheen, M., & Reddy, P. K. (2017). Impact of psychological capital on organizational citizenship behavior. *Journal of Management Development, 36,* 973-983..

Hammer, L. B., Cullen, J. C., Neal, M. B., Sinclair, R. R., & Shafiro, M. V. (2005). The longitudinal effects of work-family conflict and positive spillover on depressive symptoms among dual-earner couples. *Journal of Occupational Health Psychology*, *10*, 138–154.

Haq, I., Azeem, M. U., Raja, U., & Sharif, I. (2018). Combined Effects of Perceived Threat of Terrorism, PsyCap, Negative Affectivity on Job Outcomes. In G. Antic (Ed). *Academy of Management Proceedings* (13863-13917). NY: Academy of Management.

Ho, M. Y., Chen, X., Cheung, F. M., Liu, H., & Worthington, E. L. Jr. (2013). A dyadic model of the work-family interface: A study of dual-earner couples in China. *Journal of Occupational Health Psychology*, *18*, 53–63.

Hobfŏll, S. E. (2011). Conservation of resources caravans in engaged settings. *Journal of Occupational and Organizational Psychology, 84*, 116–122.

Hu, L.T.; Bentler, P.M. (1999) Cut-off criteria for fit indexes in covariance structure analysis: Conventional criteria versus new alternatives. *Structural Equation Modeling: a Multidisciplinary Journal, 6,* 1–55.

Kenny, D. A. (2008). Reflections on mediation. *Organizational Research Methods*, *11*, 353-358.

Kwok, S. Y., Cheng, L., & Wong, D. F. (2015). Family emotional support, positive psychological capital, and job satisfaction among Chinese white-collar workers. *Journal of Happiness Studies*, *16*, 561-582.

Kinnunen, U., Feldt, T., Mauno, S., & Rantanen, J. (2010). Interface between work and family: A longitudinal individual and crossover perspective. *Journal of Occupational and Organizational Psychology*, *83*, 119-137.

Kossek, E. E., Baltes, B. B., & Matthews, R. A. (2011). How work-family research can finally have an impact in organizations. *Industrial and Organizational Psychology*, *4*, 352-369.

Lapierre, L. M., Li, Y., Kwan, H. K., Greenhaus, J. H., DiRenzo, M. S., & Shao, P. (2018). A meta-analysis of the antecedents of work-family enrichment. *Journal of Organizational Behavior*, *39*, 385-401.

Larson, M. D., Norman, S. M., Hughes, L. W., & Avey, J. B. (2013). Psychological capital: A new lens for understanding employee fit and attitudes. *International Journal of Leadership Studies*, *8*, 28-43.

Ledermann, T., & Kenny, D. A. (2012). The Common Fate Model for dyadic data: Variations of a theoretically important but underutilized model. *Journal of Family Psychology*, *26*, 140–148.

Liang, H.-L. (2015). Are you tired? Spillover and crossover effects of emotional exhaustion on the family domain. *Asian Journal of Social Psychology*, *18*, 22–32.

Liu, H., & Cheung, F. M. (2015). Testing crossover effects in an actor-partner interdependence model among Chinese dual-earner couples. *International Journal of Psychology*, *50*, 106–114.

Lu, L. (2011). A Chinese longitudinal study on work/family enrichment. *Career Development International, 16,* 385-400

Lupșa, D., & Vîrgă, D. (2018). Psychological Capital Questionnaire (PCQ): Analysis of the Romanian adaptation and validation. *Psihologia Resurselor Umane*, 16, 27-39.

Lupșa, D., Vîrga, D., Maricuțoiu, L. P., & Rusu, A. (2020). Increasing psychological capital: A pre-registered meta-analysis of controlled interventions. *Applied Psychology*, *69*, 1506-1556.

Luthans, F., Youssef, C. M., & Avolio, B. J. (2007). Psychological capital: Investing and Developing positive organizational behavior. *Positive Organizational Behavior*, *1*, 9-24.

Luthans, F., Avey, J. B., Avolio, B. J., Norman, S. M., & Combs, G. M. (2006). Psychological capital development: Toward a micro-intervention. *Journal of Organizational Behavior, 27,* 387–393.

Malach Pines, A., Neal, M. B., Hammer, L. B., & Icekson, T. (2011). Job burnout and couple burnout in dual-earner couples in the sandwiched generation. *Social Psychology Quarterly*, *74*, 361–386.

Mauno, S., Kinnunen, U., & Ruokolainen, M. (2007). Job demands and resources as antecedents of work engagement: A longitudinal study. *Journal of Vocational Behavior,70*, 149 - 171.

McNall, L., Nicklin, J., & Masuda, A. (2010). A meta-analytic review of the consequences associated with work-family enrichment. *Journal of Business and Psychology*, *25*, 381-396.

McNatt, D. B., & Judge, T. A. (2008). Self-efficacy intervention, job attitudes, and turnover: A field experiment with employees in role transition. *Human Relations*, *61*, 783-810.

Mishra, P., Bhatnagar, J., & Gupta, R. (2013). Role of psychological capital in the relationship between work-to-family enrichment, family-to-work enrichment and innovative work behaviour, *Indian Institute of Management*, *12*, 1-13.

Mishra, P., Bhatnagar, J., Gupta, R., & Wadsworth, S. M. (2019). How work-family enrichment influence innovative work behavior: Role of psychological capital and supervisory support. *Journal of Management & Organization*, *25*, 58-80.

Morganson, V. J., Litano, M. L., & O'Neill, S. K. (2014). Promoting work-family balance through positive psychology: A practical review of the literature. *The Psychologist-Manager Journal*, *17*, 221.

Muurlink, O., Peetz, D., & Murray, G. (2014). Work-related influences on marital satisfaction amongst shift workers and their partners: A large, matched-pairs study. *Community, Work & Family*, *17*, 288–307.

Parent-Rocheleau, X., Bentein, K., & Simard, G. (2020). Positive together? The effects of leader-follower (dis) similarity in psychological capital. *Journal of Business Research*, *110*, 435-444.

Pedersen, D. E., & Minnotte, K. L. (2012). Dual-earner husbands and wives: Marital satisfaction and the workplace culture of each spouse. *Journal of Family and Economic Issues, 33*, 272–282.

R Core Team. (2018). R: A language and environment for statistical computing. Vienna, Austria: R Foundation for Statistical Computing.

Rosseel, Y. (2012). lavaan: An R Package for Structural Equation Modeling. *Journal of Statistical Software*, *48*, 1–36.

Rodríguez-Muñoz, A., Sanz-Vergel, A. I., Demerouti, E., & Bakker,A. B. (2014). Engaged at work and happy at home: A spillovercrossovermodel. *Journal of Happiness Studies*, *15*, 271–283.

Sanz-Vergel, I., & Rodríguez-Muñoz, A. (2013). The spillover and crossover of daily work enjoyment and well-being: A diary study among working couples. *Journal of Work and Organizational Psychology*, *29*, 179–185.

Siu, O. L., Lu, J. F., Brough, P., Lu, C. Q., Bakker, A. B., Kalliath, T., ... & Sit, C. (2010). Role resources and work-family enrichment: The role of work engagement. *Journal of Vocational Behavior*, *77*, 470-480.

Steiner, R. S., & Krings, F. (2017). How Was Your Day, Darling?. *European Psychologist*, *21*, 296–315

Taasoobshirazi, G., & Wang, S. (2016). The performance of the SRMR, RMSEA, CFI, and TLI: An examination of sample size, path size, and degrees of freedom. *Journal of Applied Quantitative Methods*, *11*, 31-40.

Team, R. (2015). RStudio: integrated development for R. *RStudio, Inc., Boston, MA URL http://www.rstudio.com*, *42*, 14-21.

Ten Brummelhuis, L. L., & Bakker, A. B. (2012). A resource perspective on the work-home interface: The work-home resources model. *American Psychologist*, *67*, 545–556.

van der Zee, K. I., Ali, A. J., & Salomé, E. (2005). Role interference and subjective well-being among expatriate families. *European Journal of Work and Organizational Psychology*, *14*, 239–262.

van Steenbergen, E. F., Ellemers, N., Haslam, S. A., & Urlings, F. (2008). There is nothing either good or bad, but thinking makes it so: Informational support and cognitive appraisal of the work-family interface. *Journal of Occupational and Organizational Psychology*, *81*, 349-367.

Westman, M. (2001). Stress and strain crossover. *Human Relations*, *54*, 717–751.

Xanthopoulou, D., Bakker, A. B., Demerouti, E., & Schaufeli, W. B. (2009). Work engagement and financial returns: A diary study on the role of job and personal resources. *Journal of Occupational and Organizational Psychology*, *82*, 183-200.

Yang, Z., Zhang, H., Kwan, H. K., & Chen, S. (2015). Crossover effects of servant leadership and job social support on employee spouses: The mediating role of employee organization-based self-esteem. Advance online publication. *Journal of Business Ethics, 147*, 595-604.

RESEARCH ARTICLE

The Path from Leader-Member Exchange to Citizenship: An Empirical Test of Self-Determination as a Linchpin

ANATA-FLAVIA IONESCU
University of Bucharest, Bucharest, Romania

DRAGOȘ ILIESCU
University of Bucharest, Bucharest, Romania

Abstract

In response to calls to uncover the mechanisms whereby leadership influences subordinate outcomes, the present study proposes and tests a path from leader-member exchange (LMX) to subordinate organizational citizenship behaviors (OCBs) through work motivation as conceptualized by self-determination theory (SDT). We conducted a survey study on a Romanian sample of 338 subordinates nested under 59 leaders from a large variety of organizational contexts. Our findings at the within-group level offer limited support for the incremental validity of autonomous motivation and amotivation, but suggest controlled motivation—and, through it, LMX—has a negative incremental contribution to both OCB targeted at co-workers and OCB targeted at the organization. None of the paths was supported at group level. Results thus suggest that leaders should be wary of the consequences of high LMX—despite its established overall positive influence on OCB, LMX may also undermine OCB to the extent to which it enhances controlled motivation.

Keywords

Work motivation is, at least in theory, a key explanation for the impact of leadership on follower performance, susceptible of addressing decade-old calls to uncover the underlying mechanisms of this impact (e.g., Yukl, 2010). However, the scarcity of empirical tests limits our current knowledge of the role of motivation in linking leadership to subordinate performance-related outcomes. This is especially true for leadership perspectives such as leader-member exchange (LMX).

Rooted in social exchange, LMX theory states that supervisors establish relationships of different qualities with each of their direct reports (Graen & Uhl-Bien, 1995). Low-quality relationships are limited to the employment contract, whereas high-quality relationships are characterized by the exchange of a great variety of tangible and non-tangible resources (Liden, Sparrowe, & Wayne, 1997). Empirical research has demonstrated that LMX is salient for a plethora of important subordinate outcomes such as task performance, citizenship behaviors, job satisfaction, turnover intentions, organizational justice perceptions, innovative behaviors, affective climate, affective and normative organizational commitment, satisfaction with supervision, and even satisfaction with pay (Dulebohn, Bommer, Liden, Brouer, & Ferris, 2012;

Correspondence concerning this article should be addressed to Anata-Flavia Ionescu, Faculty of Psychology and Educational Sciences, Department of Psychology, University of Bucharest. Email: anataflavia.ionescu@drd.unibuc.ro

Gerstner & Day, 1997). However, more research is needed to ground and test the underlying mechanisms linking LMX to many of these consequences.

The present study focuses on explaining the effect of LMX on organizational citizenship behaviors (OCBs). A positive association between LMX and OCBs is firmly established (Carter, Armenakis, Feild, & Mossholder, 2012; Dulebohn et al., 2012; Ilies, Nahrgang, & Morgeson, 2007; Martin, Guillaume, Thomas, Lee, & Epitropaki, 2016; Wang, Law, Hackett, Wang, & Chen, 2005), but relatively few studies have aimed to elucidate how LMX actually stimulates citizenship. For example, despite encouraging results reported by Liden, Wayne, and Sparrowe (2000), motivational mediating mechanisms have been rarely studied ever since (Martin et al., 2016).

Furthermore, though self-determination sometimes was alluded to in the few LMX studies addressing motivation (such as in the Liden et al. [2000] paper), even fewer studies appealed to the integrative self-determination framework to explain the influence of LMX, which may have yielded misleading results. Martin et al. (2016) reported that empirical research of the LMX-motivation relationship employed heterogeneous operationalizations of motivation, the majority of studies focusing on intrinsic motivation. Due to conceptual overlaps with other forms of motivation that whose effects were not accounted for, confounding variables are a major concern in these studies. We argue that a comprehensive view of both the LMX-OCB relationship and the role of motivation in it warrants testing other forms of motivation, such as controlled motivation.

Our paper addresses the aforementioned limitations by testing unique effects of self-determination based types of motivation as potential explanations of the LMX-OCB association. Self-determination theory (SDT; Deci & Ryan, 2000; Gagné & Deci, 2005) depicts a simplex model in which motivation internalization lies on a continuum from amotivation (i.e., the complete lack of motivation) to autonomous motivation (i.e., adopting goals as part of the person's identity or even finding intrinsic pleasure in pursuing those goals) through the extrinsic controlled motivation (i.e., pursuing goals as a consequence of an external pressure). SDT-based concepts are becoming increasingly popular as explanations of the influence of leadership styles on subordinate outcomes (e.g., Eyal & Roth, 2011; Kovjanic, Schuh, Jonas, Van Quaquebeke, & Van Dick, 2012). Other leadership perspectives, such as LMX, may thus benefit from the integration with the SDT framework. We contend that SDT would allow a deeper understanding of the mediating effects of motivation through the analysis of unique contributions of the different SDT-based internalization categories. Given conceptual overlaps, unique effects are of primary interest. For example, controlled and autonomous motivation can both be opposed to amotivation in that they indicate the presence of determination. Yet, unlike autonomous motivation, controlled motivation has been often found to display negative effects on subordinate outcomes (Gagné & Deci, 2005). A closer look into the incremental contributions of SDT concepts could further suggest specific motivation-targeted interventions for boosting citizenship.

Explaining the Impact of LMX on Citizenship via Motivation

LMX as an Antecedent of Self-Determination

By and large, motivation is expected to be one of the key mechanisms linking leadership behaviors and attitudes to subordinate performance (Gottfredson & Aguinis, 2017; Ng, 2017).

Intuitively, LMX should appeal to self-determination by satisfying the three basic psychological needs associated with the degree of goal internalization: autonomy, competence, and relatedness. First, LMX can easily be qualified as an autonomy-supportive behaviour, showing a notable conceptual overlap with leader autonomy support as defined by Slemp, Kern, Patrick, and Ryan (2018). Slemp et al. describe leader autonomy support as leader behaviors which encourage choice and agentic behaviour on the part of subordinates—similar to early conceptualizations of LMX as negotiating latitude (Gerstner & Day, 1997; Liden & Maslyn, 1998). Second, LMX is based

on mutual professional respect and delegation by the leader, increased responsibility, trust in the subordinate, etc. (Graen & Uhl-Bien, 1995), which can be expected to fulfil the subordinate's competence need. Finally, the relatedness need should also be expected to be satisfied, as high LMX encompasses affect and loyalty.

Hints that SDT-based concepts may be placed on the path to influence of LMX have also been provided by several empirical studies. For example, the quality of an employee's relationship with his or her supervisor, as well as the quality of the relationships with subordinates, were shown to enhance autonomous motivation and feelings of self-efficacy (Trépanier, Fernet, & Austin, 2012). Ng (2017) meta-analytically confirmed paths from LMX to subordinate performance-related outcomes via job self-efficacy.

Besides nurturing autonomous motivation, however, we argue that LMX could also be expected to enhance controlled motivation. LMX theory posits that provisions by one party trigger a growing feeling of obligation to reciprocate on the part of the recipient (Graen & Uhl-Bien, 1995). This felt obligation may act as an external social pressure. Similarly, inasmuch supervisor provisions contingent upon the subordinate's contribution to the exchange consist of tangible resources, they may act as an external material pressure.

The Role of Internalization in Explaining OCBs

We further argue that, in turn, a certain level of motivation internalization may be useful—and to a certain extent necessary—for a subordinate to display OCBs. What we know from LMX theory is that a good relationship with the leader may stimulate quite a few means of reciprocation on the part of the subordinate, and OCB is only one of them. So, what is the route from LMX to OCB? Based on the scarce available studies, Martin et al. (2016) meta-analytically derived a positive indirect effect of LMX on citizenship performance via motivation.

We specifically propose that the same SDT concepts we assumed to be consequences of LMX should be referred to in order to refine the answer to this research question.

As SDT theory builds on the axiomatic premise that behavior needs to be energized by motivation in order to be enacted (Deci & Ryan, 2000; Gagné & Deci, 2005), we also expect that any antecedent of OCBs (in our case, LMX) is bound to affect motivation beforehand. Extant empirical research also furnishes premises in this respect. First, in their meta-analysis, Van den Broeck, Ferris, Chang and Rosen (2016) found basic need satisfaction to enhance OCBs. Similarly, intrapersonal and interpersonal need fulfilment, as correlates of job autonomy and support, were also shown to be conducive of citizenship behaviors (Ilies, Lanaj, Pluut, & Goh, 2018). Second, levels of internalization stipulated by SDT were found to correlate with subordinate performance-related outcomes (Gagné et al., 2015). Furthermore, SDT-based motivation concepts have occasionally been tested—and confirmed—as mediators for LMX in influencing various subordinate outcomes. For example, in one of the few empirical studies that addressed this issue, LMX was shown to partially influence subordinate subjective vitality, job satisfaction, and affective organizational commitment through autonomous motivation (Graves & Luciano, 2013).

Results from the abovementioned studies hint at a positive relationship with OCBs for autonomous motivation. Furthermore, autonomous motivation was directly shown to display strong consistently positive relationships with outcomes such as work role performance, job effort, and affective commitment (Gagné et al., 2015). We thus hypothesize:

Hypothesis 1. utonomous motivation mediates the positive relationship between LMX and subordinate (a) OCB targeted at individuals and (b) OCB targeted at the organization.

The sign of controlled motivation as a predictor of OCBs is less obvious. Controlled motivation was found to be detrimental to citizenship behaviors (e.g., Wright, George, Farnsworth, & McMahan, 1993), possibly through its theorized undermining effect on intrinsic motivation (Gagné & Deci, 2005). Nevertheless, Gagné and Deci (2005) acknowledged that controlled motivation may

also enhance OCB, possibly as an impression management tactic. In a later study, Gagné et al. (2015) unexpectedly found a strong positive effect of controlled motivation on job (extra) effort. Yet, we argue that controlled motivation may covary with autonomous motivation as they are both indicators of the presence of motivation in the first place. As such, especially for behaviors that exceed the employment contract, any positive influence of controlled motivation may in fact be due to the variance shared with autonomous forms of motivation. This would mean that controlling for autonomous motivation is required when testing the impact of controlled motivation on subordinate OCBs. Accordingly, we propose:

Hypothesis 2. When controlling for the other two SDT-based types of motivation (autonomous motivation and amotivation), LMX has a negative indirect effect on subordinate (a) OCB targeted at individuals and (b) OCB targeted at the organization through controlled motivation.

As for amotivation, the scarce empirical findings suggest its impact on performance-related and attitudinal outcomes is consistently negative (Gagné et al., 2015). We therefore posit:

Hypothesis 3. Amotivation mediates the positive relationships between LMX and subordinate (a) OCB targeted at individuals and (b) OCB targeted at the organization.

Please note that full support for these hypotheses would mean significant effects both at the within-group and between-group levels.

Method

Participants and Procedure

Nineteen trained undergraduates who volunteered to take part in our study were asked to recruit working people having at least two direct reports in their supervision. The contacted supervisors were asked to invite all their direct reports in the study, and were assured that participation was voluntary and anonymous for them and their reports, and feedback on individual results was available upon request. Undergraduates then disbursed sealed envelopes containing paper-pencil surveys and collected the surveys once

completed. In order to ensure anonymity, each participant was assigned an alphanumeric code, imprinted on the participant's envelope, which allowed matching supervisor and subordinate surveys.

Sixty-five supervisors and 497 of their subordinates initially agreed to participate. Fifty-nine of the supervisors (response rate of 90.77%) and 352 of their subordinates (70.83% response rate) returned completed surveys. There were no cases of subordinate surveys without matched supervisor data. Removing surveys with missing data or control variables yielded a final sample of 59 managers and 338 of their direct reports. The sample comprised participants from various organizational contexts, including educational and health, information technology, retail, agriculture, energy, etc. Of the organizations, 22.03% were public and 77.97% were private. The number of direct subordinates per supervisor was on average 5.73 (ranging from 2 to 13), for an average within-group response rate of 63.63%.

The subordinates included in the final sample were 59.76% female, with an average age of 36.61 ($SD = 9.60$), an average job tenure of 8.34 years, an average organization tenure of 7.95 years, and an average dyad tenure with their respective supervisors of 4.31 years. In terms of education, the majority (76.27%) of them held a bachelor's or a master's degree, while 8.47% were college graduates, 5.08% held a high school diploma, another 5.08% had completed post-secondary education, and only 3.39% held a doctoral degree.

Measures

All the instruments were translated into Romanian following a guided forward translation procedure (Iliescu, 2017).

The subordinate survey included the following assessments:

LMX. We used the LMX-MDM scale (Liden & Maslyn, 1998), assessing each dimension of the four-dimensional model (affect, loyalty, contribution, and professional respect) by three items. Sample items include "My supervisor is the kind of person one would like to have as a friend," and "I do work

for my supervisor that goes beyond what is specified in my job description." Responses were collected on a five-point Likert scale (1 = *strongly disagree*, 5 = *strongly agree*).

Work motivation. We measured motivation using the 19-item Multidimensional Work Motivation Scale (MWMS; Gagné et al., 2015), which includes subscales for six SDT-based motivation types: amotivation, three types of controlled motivation (extrinsic regulation—social, extrinsic regulation—material, and introjected regulation), and two types of autonomous motivation (identified regulation and intrinsic motivation). Scale instructions ask respondents to rate the extent to which each item represents a reason why they put or would put efforts into their current jobs on a 5-point Likert scale. Sample items include, "I don't know why I'm doing this job, it's pointless work" (amotivation), "To avoid being criticized by others (e.g., supervisor, colleagues, family, clients…)" (extrinsic regulation—social), "Because others will reward me financially only if I put enough effort in my job (e.g., employer, supervisor …)" (extrinsic regulation—material), "Because I have to prove to myself that I can" (introjected regulation), "Because I personally consider it important to put efforts in this job" (identified regulation), and "Because what I do in my work is exciting" (intrinsic motivation).

For the leader-rated variables in this study, we used the following measures:

Subordinate OCBs. This variable was measured using the two seven-item subscales of Williams and Anderson's (1991) job performance scale that measure organizational citizenship behavior targeting individuals (OCBI) and targeting the organization (OCBO), respectively. Sample items include, "Helps others who have heavy workloads" (OCBI), and "Gives advance notice when unable to come to work" (OCBO). Responses were collected on a 5-point Likert scale.

Control variables. We initially included control variables whose relevance to LMX has been confirmed (Bernerth & Aguinis, 2016): subordinate and leader sex and age, subordinate and leader job tenure, dyad tenure, leader-member gender difference, and group size, as some authors suggested it may be deleterious to individual LMX and increase LMX differentiation (Henderson, Liden, Glibkowski, & Chaudhry, 2009). Controls displaying non-significant correlations with the outcomes in the model were excluded.

Analytical Strategy

We preliminarily checked whether or not our data warrants multilevel modelling by calculating intraclass correlation coefficients (ICCs; Bliese, 2000). We found ICC(1) values to range from .35 for OCBO to .65 for LMX, indicating high group-level variability for our variables and the suitability of hierarchical linear modeling.

For our analyses, we used multilevel structural equation modeling (MSEM; Muthén & Asparouhov, 2008; Preacher, Zhang, & Zyphur, 2011) with Bayesian estimation in Mplus 7 (Muthén & Muthén, 1998-2012). Simulation studies suggest that Bayesian estimation can be more reliable than maximum likelihood in estimating mediation (Muthén, 2010).

Results

Descriptive statistics, internal consistency reliabilities, and correlations among study variables are presented in Table 1.

To test the hypothesized model, all three categories of motivation (autonomous motivation, controlled motivation, and amotivation) were entered simultaneously as mediators for the LMX-OCBI and LMX-OCBO associations. Controls variables relevant for the mediators and for the outcomes were introduced in the mediation model as exogenous covariates. The one-tailed *p* values represent the relative frequency in the posterior distribution of effects of the effects of opposite sign (Muthén, 2010). Credibility intervals (CIs) are constructed around each estimate using Markov chain Monte Carlo algorithms for parameter posterior distribution approximation. Effects are considered significant if the CI does not include zero.

Table 1. *Means, Standard Deviations, and Correlations among Variables*

Variable	M	SD	1	2	3	4	5	9	10	11	12	13
					Individual-level variables							
1. Subordinate gender	.60	.49										
2. Subordinate age	36.61	9.60	.00									
3. Subordinate job tenure	7.95	7.64	.06	.74***								
4. Dyad tenure	4.31	4.21	-.08	.42***	.5***							
5. LMX	3.61	.68	.24***	.08	.14*	.05	(.90)					
9. OCBI	3.44	.78	.10	.04	.09	-.01	.34***	(.79)				
1. OCBO	3.99	.70	.25***	.09	.10	.02	.29***	.53***	(.77)			
11. Autonomous motivation	3.57	.93	.20***	.07	.11*	-.06	.60***	.39***	.34***	(.90)		
12. Controlled motivation	3.11	.68	.01	-.03	.03	.00	.04	.00	-.14*	.25***	(.75)	
13. Amotivation	1.73	.82	-.23***	-.17**	-.20***	-.13*	-.45***	-.09	-.33***	-.39***	.12*	(.77)
					Group-level variables							
1. Leader gender	.61	.49										
2. Leader age	43.31	8.06	.1									
3. Leader job tenure	8.34	6.67	-.19	.48***								
4. Group size	11.81	9.34	-.11	.34**	.34**							

Note: For individual level variables, $N = 338$. For group level variables, $N = 59$. LMX = leader-member exchange; OCBI = organizational citizenship behavior targeted at individuals; OCBO = organizational citizenship behavior targeted at the organization.

* $p < .05$, ** $p < .01$, *** $p < .001$. Cronbach's alphas are reported on the diagonal
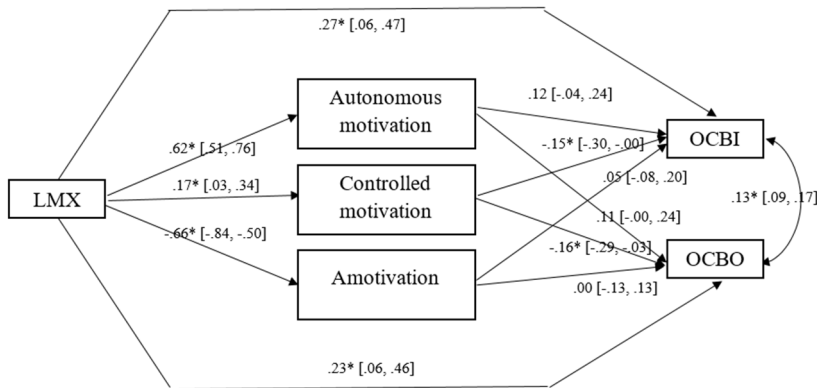
Figure 1. Results for the hypothesized mediation model.

Note: only within-group coefficients are represented. Credibility intervals are reported in brackets. Asterisks mark coefficients significant at $p > .05$

Figure 1 summarizes within-level results for the mediation models we tested from LMX to subordinate OCBs via subordinate work motivation. As shown in the figure, the direct effects of LMX on both forms of OCB remained significant in the presence of the mediators, indicating at most partial mediation.

Hypothesis 1, which posited that the effects of LMX on OCBs are mediated by autonomous motivation, was not supported. LMX had a significant positive effect on autonomous motivation, but, in turn, in the presence of the other types of motivation (controlled motivation and amotivation), autonomous motivation displayed a non-significant effect on both types of OCB.

Hypothesis 2a, positing an indirect effect of LMX on OCBI through controlled motivation, was also not supported. Within groups, both the paths from the independent variable to the mediator and from the mediator to the outcome were significant (for the relationship between LMX and controlled motivation, $\gamma = .17$, $p < .05$, 95% CI = [.03, .34], and for the path from controlled motivation to OCBI, $\gamma = -.16$, $p < .05$, 95% CI = [-.30, -.00]), and the probability of an indirect effect of opposite sign (as indicated by the p-value) was only 2.9% (thus smaller than 5%). Still, the 95% CI = [-.06, .00] for the indirect effect included zero, so mediation was rejected. Offering partial support for Hypothesis 2b, however, our results confirmed a significant negative indirect effect of LMX on OCBO via controlled motivation at within-group level (-.02, $p < .05$, 95% CI = [-.06, -.00]) after accounting for the contributions of autonomous motivation and amotivation.

For reasons similar to the case of Hypothesis 1 (non-significant path from mediator to outcomes), our results also failed to support Hypothesis 3, with the indirect effect of LMX on both OCBs via amotivation being non-significant. Indirect effects and their CIs for both levels are presented in Table 2.

Table 2. *Motivation as a Mediator for the Effects of LMX on OCBs*

Dependent Variable: Mediator	Within level		Between level	
	Direct effect	Indirect effect	Direct effect	Indirect effect
OCBI:	.27 [.06, .47], .006		.05 [-1.67, 4.47], .430	
Autonomous motivation		.07 [-.02, .15], .092		.05 [-.10, .32], .225
Controlled motivation		-.02 [-.06, .00], .029		-.00 [-4.52, 1.60], .455
Amotivation		-.04 [-.13, .05], .199		.04 [-.11, .27], .255
OCBO:	.23 [.06, .46], .004		-.06 [-1.75, 2.99], .408	
Autonomous motivation		.07 [-.00, .16], .026		.03 [-.08, .25], .263
Controlled motivation		-.02 [-.06, -.00], .013		.00 [-3.04, 1.70], .497
Amotivation		-.00 [-.09, .10], .218		-.09 [-.34, .05], .096

Notes. $N = 338$ at the within level and 59 at the between level. Values are reported as unstandardized estimate [95% CI], one-tailed p-value.

Discussion

Our study tested SDT categories of motivation as mediators for the effect of LMX on subordinate OCBs. Partial mediation occurred for the association between LMX and OCBO, via controlled motivation. Neither autonomous motivation nor amotivation were found to mediate the effect of LMX on any of the two investigated types of OCB. Per contra, it was the two forms of motivation that lost their significance in the presence of LMX, while LMX preserved its significant positive direct effect in the presence of all motivation types, leaving room for the exploration of additional mediation mechanisms. While none of the categories of motivation incrementally contributed to OCBI, autonomous motivation and amotivation annihilated each other's effects in predicting OCBO. These effects held only at the within level.

The significant direct effects of LMX corroborate findings such as Gottfredson and Aguinis's (2017), suggesting that LMX affects performance-related above and beyond concurrent explanatory mechanisms. On the other hand, our results support the negative effect of controlled motivation on OCB, replicating the results reported in Wright et al. (1993), and challenging the more recent findings by Gagne et al. (2015).

Moreover, the negative indirect effects of LMX on OCBO through controlled motivation highlight the possibility for an antecedent with an established total effect of a certain directionality to act differently via different underlying mechanism. In our case, as more types of motivation may constitute

concurrent explanations for the influence of LMX on citizenship, some of which may have opposite effects, this implies that more research is needed to elucidate the conditions under which one mechanism may be triggered to a larger extent than the others—and possibly to the detriment of the others.

Theoretical Implications

We distinguish three major theoretical contributions of the present study. First, relevant to the literature investigating the role of motivation in stimulating citizenship, our results suggest that the distinctive component of controlled motivation, the variance shared with neither autonomous motivation nor amotivation, i.e., the perceived external pressure to pursue work goals, was the only one displaying incremental validity in predicting OCBs, above and beyond the other two types of motivation that practically annulled each other. A closer look at the unique contributions of the three types of motivation may also lead to a slight reinterpretation of the role of amotivation, at least for OCB as an outcome. In light of our findings, because autonomous motivation and amotivation cancel out, amotivation seems to have an effect opposite to the one of autonomous motivation, rather than express the lack of controlled motivation or of motivation in general.

The second important contribution we identify concerns the sign of the confirmed indirect effect. This case illustrated a pattern that may potentially be discovered in other mediation models—in which an overall positive relationship may hide negative indirect effects or vice-versa. While the overall association between LMX and OCBs remained positive, controlled motivation displayed a significant negative contribution to the relationship.

Last but not least, our results challenge findings regarding the level of analysis at which LMX operates. For example, Markham, Yammarino, Murry, and Palanski (2010) reported dyad-level effects of LMX on subordinate performance-related outcomes (or between dyads, i.e., significant effects both within and between groups). Effect sizes in the Markham et al. (2010) study were even greater

at group level. Yet, our results failed to find any significant between-group effect, instead supporting the dyads-within-groups level stipulated by earlier theorizing (Graen & Uhl-Bien, 1995).

Practical Implications

Supervisors should keep in mind that at least part of their influence on subordinate citizenship behaviors and is due to work motivation. LMX related positively to both autonomous and controlled motivation. Thus, while it could be expected to be beneficial to many subordinate outcomes through autonomous motivation, a high quality exchange relationship with the leader may also have a negative impact on, e.g., subordinates' interest in the welfare of the organization to the extent to which it enhances controlled motivation. More specifically, leaders should be wary of controlled motivation which does not overlap with either autonomous motivation or the lack of amotivation, that is, of the external pressure component of controlled motivation. For a leader who seeks to enhance organization-targeted citizenship among his or her direct reports, constantly performing regulatory actions (supervise, direct, correct, etc.) may be deleterious to the desired outcome.

Limitations and Directions for Further Research

The present study has a number of limitations. First, the cross-sectional design used in our study does not allow causal inferences. Second, the level 2 sample size (number of clusters) may not have been large enough to detect weak inter-group effects. Third, our results on a Romanian sample may not be highly generalizable to other cultures. Last but not least, employing only the subordinate perspective of LMX may have offered an incomplete picture of the relationship quality.

We strongly recommend that further research consider longitudinal, or at least cross-lagged designs separating measurement of LMX, motivation variables, and citizenship behaviors in time. Besides allowing causal inferences, such designs are susceptible of revealing different short-term and long-term

effects of LMX and motivation on citizenship. For example, it is conceivable that controlled motivation may become more and more internalized and generate positive effects after a generous time lag. Additionally, assessment of LMX should ideally involve collecting both perspectives—the leader's and the members'.

References

Bernerth, J. B., & Aguinis, H. (2016). A critical review and best-practice recommendations for control variable usage. *Personnel Psychology*, 69, 229-283. doi: 10.1111/peps.12103

Bliese, P. D. (2000). Within-group agreement, non-independence, and reliability: Implications for data aggregation and analyses. In K. J. Klein & S. W. J. Kozlowski (Eds.), *Multilevel theory, research, and methods in organizations: Foundations, extensions, and new directions* (pp. 349–381). San Francisco, CA: Jossey-Bass.

Carter, M. Z., Armenakis, A. A., Feild, H. S., & Mossholder, K. W. (2013). Transformational leadership, relationship quality, and employee performance during continuous incremental organizational change. *Journal of Organizational Behavior, 34*, 942-958. doi: 10.1002/job.1824

Deci, E. L., & Ryan, R. M. (2000). The "what" and "why" of goal pursuits: Human needs and the self-determination of behaviour. *Psychological Inquiry, 11*, 227–268. doi: 10.1207/S15327965PLI1104_01

Dulebohn, J. H., Bommer, W. H., Liden, R. C., Brouer, R. L., & Ferris, G. R. (2012). A meta-analysis of antecedents and consequences of leader-member exchange: Integrating the past with an eye toward the future. *Journal of Management, 38*, 1715-1759. doi: 10.1177/0149206311415280

Eyal, O., & Roth, G. (2011). Principals' leadership and teachers' motivation: Self-determination theory analysis. *Journal of Educational Administration, 49*, 256-275. doi: 10.1108/09578231111129055

Gagné, M., & Deci, E. L. (2005). Self-determination theory and work motivation. *Journal of Organizational Behavior, 26*, 331-362. doi: 10.1002/job.322

Gagné, M., Forest, J., Vansteenkiste, M., Crevier-Braud, L., Van den Broeck, A., Aspeli, A. K., …. & Westbye, C. 2015. The Multidimensional Work Motivation Scale: Validation evidence in seven languages and nine countries. *European Journal of Work and Organizational Psychology, 24*, 178-196. doi: 10.1080/1359432X.2013.877892

Gerstner, C. R., & Day, D. V. (1997). Meta-analytic review of leader–member exchange theory: Correlates and construct issues. *Journal of Applied Psychology*, 82, 827-844.

Gottfredson, R. K., & Aguinis, H. (2017). Leadership behaviors and follower performance: Deductive and inductive examination of theoretical rationales and underlying mechanisms. *Journal of Organizational Behavior, 38*(4), 558-591. doi: 10.1002/job.2152

Graen, G. B., & Uhl-Bien, M. (1995). Relationship-based approach to leadership: Development of leader-member exchange (LMX) theory of leadership over 25 years: Applying a multi-level multi-domain perspective. *Leadership Quarterly, 6*, 219-247.

Graves, L. M., & Luciano, M. M. (2013). Self-determination at work: Understanding the role of leader-member exchange. *Motivation and Emotion, 37*, 518-536. doi: 10.1007/s11031-012-9336-z

Henderson, D. J., Liden, R. C., Glibkowski, B. C., & Chaudhry, A. (2009). LMX differentiation: A multilevel review and examination of its antecedents and outcomes. *Leadership Quarterly*, 20, 517-534. doi: 10.1016/j.leaqua.2009.04.003

Ilies, R., Lanaj, K., Pluut, H., & Goh, Z. (2018). Intrapersonal and interpersonal need fulfillment at work: Differential antecedents and incremental validity in explaining job satisfaction and citizenship behavior. *Journal of Vocational Behavior, 108*, 151-164. doi: 10.1016/j.jvb.2018.07.005

Ilies, R., Nahrgang, J. D., & Morgeson, F. P. (2007). Leader-member exchange and citizenship behaviors: A meta-analysis. *Journal of Applied Psychology, 92*, 269-277. doi: 10.1037/0021-9010.92.1.269

Iliescu, D. (2017). *Adapting Tests in Linguistic and Cultural Situations*. Cambridge: Cambridge University Press.

Kovjanic, S., Schuh, S. C., Jonas, K., Van Quaquebeke, N. V., & Van Dick, R. (2012). How do transformational leaders foster positive employee outcomes? A self-determination-based analysis of employees' needs as mediating links. *Journal of Organizational Behavior, 33*, 1031-1052. doi: 10.1002/job.1771

Liden, R. C., & Maslyn, J. M. (1998). Multidimensionality of leader-member exchange: An empirical assessment through scale development. *Journal of Management, 24*, 43-72. doi: 10.1016/S0149-2063(99)80053-1

Liden, R. C., Sparrowe, R. T., & Wayne, S. J. (1997). Leader-member exchange theory: The past and potential for the future. *Research in Personnel and Human Resources Management, 15*, 47-120.

Liden, R. C., Wayne, S. J., & Sparrowe, R. T. (2000). An examination of the mediating role of psychological empowerment on the relations between the job, interpersonal relationships, and work outcomes. *Journal of Applied Psychology, 85*, 407-416. doi: 10.1037/0021-9010.85.3.407

Markham, S. E., Yammarino, F. J., Murry, W. D., & Palanski, M. E. (2010). Leader–member exchange, shared values, and performance: Agreement and levels of analysis do matter. *Leadership Quarterly, 21*, 469-480. doi: 10.1016/j.leaqua.2010.03.010

Martin, R., Guillaume, Y., Thomas, G., Lee, A., & Epitropaki, O. (2016). Leader–member exchange (LMX) and performance: A meta-analytic review. *Personnel Psychology, 69*, 67-121. doi: 10.1111/peps.12100

Muthén, B. (2010). *Bayesian analysis in Mplus: A brief introduction*. Unpublished manuscript. Retrieved from www.statmodel.com, accessed on February 26th, 2017.

Muthén, B. O., & Asparouhov, T. (2008). Growth mixture modeling: Analysis with non-Gaussian random

effects. In G. Fitzmaurice, M. Davidian, G. Verbeke, & G. Molenberghs (Eds.), *Longitudinal data analysis*, 143–165. Boca Raton, FL: Chapman & Hall/CRC.

Muthén, L. K., & Muthén, B. O. (1998-2012). *Mplus User's Guide* (7th ed.). Los Angeles, CA: Muthén & Muthén.

Ng, T. W. (2017). Transformational leadership and performance outcomes: Analyses of multiple mediation pathways. *Leadership Quarterly*, *28*(3), 385-417. doi: 10.1016/j.leaqua.2016.11.008

Preacher, K. J., Zhang, Z., & Zyphur, M. J. (2011). Alternative methods for assessing mediation in multilevel data: The advantages of multilevel SEM. *Structural Equation Modeling*, 18, 161-182. doi: 10.1080/10705511.2011.557329

Slemp, G. R., Kern, M. L., Patrick, K. J., & Ryan, R. M. (2018). Leader autonomy support in the workplace: A meta-analytic review. *Motivation and Emotion, 42*, 706-724. doi: 10.1007/s11031-018-9698-y

Trépanier, S.-G., Fernet, C., & Austin, S. (2012). Social and motivational antecedents of perceptions of transformational leadership: A self-determination theory perspective. *Canadian Journal of Behavioural Science, 44*, 272-277. doi: 10.1037/a0028699

Van den Broeck, A., Ferris, D. L., Chang, C. H., & Rosen, C. C. (2016). A review of self-determination theory's basic psychological needs at work. *Journal of Management, 42*, 1195-1229. doi: 10.1177/0149206316632058

Wang, H., Law, K. S., Hackett, R. D., Wang, D., & Chen, Z. X. (2005). Leader-member exchange as a mediator of the relationship between transformational leadership and followers' performance and organizational citizenship behavior. *Academy of Management Journal, 48,* 420-432. doi: 10.5465/amj.2005.17407908

Williams, L. J., & Anderson, S. E. (1991). Job satisfaction and organizational commitment as predictors of organizational citizenship and in-role behaviors. *Journal of Management*, *17*, 601–617. doi: 10.1177/014920639101700305

Wright, P. M., George, J. M., Farnsworth, S. R., & McMahan, G. C. (1993). Productivity and extra-role behavior: The effects of goals and incentives on spontaneous helping. *Journal of Applied Psychology, 78*, 374–381. doi: 10.1037/0021-9010.78.3.374

Yukl, G. A. 2010. *Leadership in organizations* (7th ed.). Upper Saddle River, NJ: Prentice Hall.

RESEARCH ARTICLE

Fulfilled Expectations about Leaders Predict Engagement through LMX

ANDREEA A. PETRUȘ
University of Bucharest, Bucharest, Romania

Abstract

Drawing on the bandwidth-fidelity principle (Cronbach & Glaser, 1957), this paper challenges the use of broad Implicit Leadership Theories (ILTs) domains in predicting organizational outcomes (i.e., prototypic ILTs and anti-prototypic ILTs) and provides preliminary arguments for examining ILTs narrow traits (e.g., sensitivity, intelligence) effects on LMX and consequently on work engagement. Specifically, using polynomial regression and response surface methodology, I examined the effects of followers' ideal-actual ILTs congruence on LMX. Additionally, using the block variable approach, I tested the mediation effects of LMX on the relationship between ideal-actual ILTs congruence and work engagement, on a sample of 68 employees. The results showed that followers' fulfilled expectations about sensitivity and tyranny had linear effects on LMX, indicating the generalized benefits for leaders to be high on sensitivity and low on tyranny to enhance followers' LMX. Intelligence, dedication, dynamism, and masculinity had non-linear effects, revealing that fulfilling followers' expectations are the best option for leaders to develop high-quality relationships with their followers. The mediation hypothesis received partly support, suggesting that additional mechanisms can explain the relationship between followers' ideal-actual ILTs congruence and work engagement.

Keywords

The human mind is hardwired to make sense of the world. To cope with the complexities of our lives, we rely on simplifying cognitive mechanisms, such as conceptual categories or mental models to map and navigate the world (Fiske & Taylor, 1991). Implicit Leadership Theories (ILTs) are an example of such mental models that incorporate desired attributes of leaders in professional settings (Eden & Leviatan, 1975; Lord, Foti, & de Vader, 1984; Lord & Maher, 1991). Their practical utility stems from their role during leader-follower interactions when they are used by their holders as benchmarks to predict and interpret leaders' behaviors and attitudes and to respond in an adaptive manner (Lord & Maher, 1991).

ILTs have been proven to have considerable significance in predicting employees' organizational attitudes and their performance (e.g., Ayman & Chemers, 1983; Biermeier-Hanson & Coyle, 2019; Epitropaki & Martin, 2005; Junker, Schyns, van Dick, & Scheurer, 2011; Khorakian & Sharifirad, 2018; Riggs & Porter, 2016). Building upon initial theoretical assumptions, most of the research conducted on ILTs has focused on how ILTs impact various organizational outcomes through the relationship between leaders and followers (leader-member exchange, LMX; Junker & van Dick, 2014). Specifically, when leaders live up to their followers' expectations, there is a high likelihood for followers to have

---

Correspondence for this article should be addressed to Andreea A. Petruș, Psychology Department, Faculty of Psychology and Educational Studies, University of Bucharest, Panduri Street, 90, Bucharest, Romania, E-mail: andreea.petrus@drd.unibuc.ro

positive affective reactions towards their leaders and to develop high-quality relationships with them, whereas when leaders fall short of their followers' expectations, followers tend to develop negative affective responses and low-quality relationship with their leaders (Lord & Maher, 1991). Consequently, followers behave in a manner aligned with their feelings and the perceived quality of the dyadic relationship which eventually will lead to different outcomes, such as counterproductive work behaviors (CWB) in case of low LMX (Biermeier-Hanson & Coyle, 2019) or organizational commitment in case of high LMX (Epitropaki & Martin, 2005).

Many authors have tried to determine the content of ILTs. The best empirically tested and most extensively used factor structure is the one developed by Offerman, Kennedy, and Wirtz (1994) and revised by Epitropaki and Martin (2004). It consists of 21 attributes of leaders, grouped into 4 prototypic or positive factors (Sensitivity, Intelligence, Dedication, and Dynamism) and 2 anti-prototypic or negative factors (Tyranny and Masculinity). Lately, a growing body of research has tested the impact of the congruence between followers' preferences regarding ILTs traits of ideal leaders and the recognition of those ILTs traits in their actual leaders on various outcomes, such as perceived leadership, work attitudes, turnover intentions, performance or development (e.g., Rahn, Jawahar, Scrimpshire, & Stone, 2016; Riggs & Porter, 2017; Rupprecht, Kueny, Shoss, & Metzger, 2016; Wang & Peng, 2016). With the exception of the study conducted by Rupprecht and her colleagues (2016), which focused on the impact of a single ILTs trait, namely Sensitivity, on CWB, all the other empirical studies tested the impact of the broad dimensions of ILTs traits, either prototypical or anti-prototypical, on organizational outcomes. The two broad ILTs dimensions comprise subsets of related (i.e., highly correlated), yet distinct traits. While their combined effects have proven to have predictive utility, their criterion validity can be maximized when they work separately. Some positive ILTs traits, like Sensitivity, might be more important for affective loaded outcomes, such as job attitudes, whereas others, such as

Intelligence, might be more important for performance outcomes. The concept of bandwidth fidelity (Cronbach & Gleser, 1957; Salgado, 2017) indicates that there should be compatibility between the nature and breadth of the predictor and those of the outcome variable. In the domain of personality literature, using narrow personality measures (i.e., facets) instead of broad dimensions, not only that narrow criteria could be better predicted, but narrow personality measures explained supplementary variance of broad outcomes over broad dimensions (Ashton, 1998; Jenkins & Griffith, 2004; Tett & Burnett, 2003). Despite the theoretical provision of the bandwidth fidelity framework, no research has empirically tested it for narrow ILTs traits. Given the heterogeneous content of ILTs, it might have practical relevance to explore their effects individually, not on a global level. Therefore, the main purpose of this study was to address this gap and explore whether the congruence between employees' narrow ILTs traits and recognition of those traits in their actual leaders had different associations with LMX, which in turn, had different implications for engagement.

This study contributes to the social-cognitive perspective of leadership literature by examining how congruence between each ILTs trait and recognition of that trait in leaders impact LMX and engagement in a nuanced manner, by using polynomial regression analysis and graphing the three-dimensional response surface generated for the combination of two predictor variables, namely ideal ILTs trait and recognition of that trait in leaders, and follower-rated LMX. Additionally, this study challenges the conventional expectations that all positive ILTs traits always have a positive impact on LMX, by showing that even inherently good attributes might have negative consequences on LMX when they are above holders' preference. Furthermore, except for the study conducted by Epitropaki and Martin (2005), no empirical research has addressed the relationship between anti-prototypical ILTs traits and LMX or other outcome variables.

Theoretical background and hypotheses

Implicit Leadership Theories: a brief overview

ILTs are focal concepts of the leadership categorization theory (Eden & Leviatan, 1975; Lord, Foti, & de Vader, 1984). The central assumption of this theory is that people form and hold in their long-term memory mental models of leaders which they use as benchmarks to automatically judge organizational actors and make spontaneous decisions if they are (ideal) leaders or not. ILTs are structured in memory from early childhood, during socialization with authority figures, such as parents and teachers (Keller, 1999; Keller, 2003) and restructured continuously in an adaptive manner to integrate new experiences with leaders (Shondrick & Lord, 2010). According to Lord and Maher (1991), ILTs are encoded in a hierarchical structure that includes attributes for various types of leaders in different contexts. As such, ILTs contain three different levels of abstraction: a superordinate level, where the most abstract attributions that differentiate leaders from non-leaders are held (e.g., domineering versus compliant), a basic level, where representations contain information about leaders in specific contexts (e.g., business leaders versus political leaders) and a subordinate level, where more situational and exclusive attributes about leaders are encoded (e.g., top-level versus middle-level business leaders). During interactions with others in professional settings, people use their hierarchically structured ILTs attributes to compare the target person with a category of leaders. Once the match is produced, ILTs holder labels the other person according to the category and assigns him or her all the other attributes of that specific category, irrespective if they are characteristics or not of the target person. Despite the ILTs structure developed by Offerman, Kennedy, and Wirtz (1994) and revised by Epitropaki and Martin (2004) was the most frequently used in business settings, according to the systematic review conducted by Junker and van Dick (2014), researchers have conceptualized it differently, either as a set of attributes of ideal leaders (i.e., exceptionally positive leaders) or as a set of attributes of prototypic leaders (i.e., average leaders). The study conducted by Van Quaquebeke, Graf and Eckloff (2014) showed that the two conceptualizations had considerable overlap, but only the ideal one was predictive for affective commitment towards the leader, respect for the leader, satisfaction with leadership, LMX and intention to leave. Therefore, for the purpose of this study, the ideal conceptualization of ILTs was used.

Even though prior studies have investigated ideal-actual ILTs congruence at a higher level of aggregation, by linking the cumulative effect of either positive ILTs congruence or negative ILTs congruence on LMX, of practical relevance is the congruence at the level of narrow ILTs traits. One thing supporting this view is the fact that people endorse different ILTs traits in specific contexts. For example, in educational settings, leaders' capacities to build positive relationships with the students and teachers and their ability to develop an effective curriculum are key drivers to academic achievement (Hallinger, 2001; Robinson, Lloyd, & Rowe, 2008). These two aspects can translate into sensitivity and intelligence, two positive traits that add to the positive ILTs aggregate score. On the other hand, sensitivity can fall behind in other types of settings, such as the military one, where dominance takes precedence (Rueb, Erskine, & Foti, 2008). Thus, investigating the consequences of each ILTs trait may be more informative both from a theoretical and practical point of view.

Ideal-actual ILTs congruence

When ILTs were used in applied settings to determine their impact on various organizational outcomes, researchers measured them either directly, by asking participants about the degree to which their leaders possess specific ILTs traits (e.g., Khorakian & Sharifirad, 2019) or indirectly, by measuring two sets of ILTs traits, one representing participants' expectations from ideal leaders and a parallel one, assessing recognition of those ILTs traits in their actual

leaders (e.g., Biermeier-Hanson & Coyle, 2019). In the second case, researchers computed a congruence score, underpinning the ideal-actual match, which they used to predict various outcomes. In most of the studies, congruence scores were computed as difference scores, either absolute or squared difference, but Edwards (2002) encouraged the use of polynomial regression instead. The most important advantage of the polynomial regression is its potential to extract more practical information, such as the differential impact of the direction of the congruence (i.e., ideal > actual or ideal > actual) or of the degree of congruence (i.e., congruence at high levels or congruence at low levels). Based on Edwards' recommendations and given that recent studies have started to utilize polynomial regression, for this study, I measured two sets of scores (i.e., preferences for ideal leaders' ILTs and recognition of those ILTs in actual leaders) and use them to deploy regression analysis with response surface.

Ideal-actual ILTs congruence and LMX

LMX represents another significant leadership framework that emphasizes the dyadic relationship between leaders and followers (Gerstner & Day, 1997; Graen & Uhl-Bien, 1995). Drawing on the principles of social exchange theory (Blau, 1964), the core assumption of LMX stipulates that leaders and followers alike develop mutual relationships that differ in quality, depending on the bidirectional exchanges between partners. High-quality relationships are characterized by mutual trust, respect, and exchanges that go beyond regular job requirements, whereas low-quality relationships are based on reciprocal exchanges that are limited to formal job requirements (Graen & Uhl-Bien, 1995).

Previous studies have proven the impact of ideal-actual ILTs congruence on LMX (e.g., Epitropaki & Martin 2005; Rupprecht, Kueny, & Shoss, 2016). As mentioned previously, ILTs have an important role in guiding employees' perceptions and making attributions about their leaders, both perceptions and attribution modulating the dynamic of the leader-follower relationship. When followers' positive

perceptions of actual leaders' behaviors match their expectations, an automatic recognition process is generated (Lord & Maher, 1991). This process predisposes followers to make positive initial impressions about their leaders, which, in turn, color subsequent perceptions, following a perception-behavior sequence: initial positive judgments bias followers to behave in a desirable way during interactions with leaders. These behaviors attract positive reactions from leaders, which sequentially reinforce the initial positive perceptions. Thus, leaders are perceived to be trustful and relationships are perceived as highly qualitative. Moreover, followers' desirable behaviors and attitudes stimulate equivalent behaviors and attitudes from leaders, such as providing additional attention, support, and resources. It is a mutual influence process that feeds back to the followers' perception of a high-quality LMX with leaders (Lord & Maher, 1991). Edward and Cable (2009) tested a conceptual theoretical model with 4 explanatory mechanisms that linked value congruence (i.e., employees' perceptions that the organization shares their values) to organizational outcomes. The mechanisms were: enhanced communication, predictability, interpersonal attraction, and trust. The same underlying mechanisms can explain the link between ILTs congruence and LMX, given that both the leader and the organization are contextual elements and operate in a similar fashion in the relationship with the employees. Another explanatory mechanism linking positive ILTs congruence to LMX is the Pygmalion effect (Rosenthal, 1993). Whiteley, Sy and Johnson (2012) proved that fulfilled positive expectations about the dyadic partner give rise to a "naturally occurring Pygmalion effect" (p. 822), a self-fulfilling prophecy which creates a propensity for the holders of the expectations to make other positive inferences about the dyadic partner, which eventually impacts LMX positively following the above-mentioned perception-behavior sequence. In addition to test whether fulfilled positive expectations predict high LMX, results of previous studies suggest that the level at which fulfillment is achieved matters too (e.g., Rupprecht et al., 2016). Having a high need satisfied brings more benefits than having a moderate or even low one. In the first case a

significant positive affective reaction can be triggered, whereas, in the second, the affective effects might be negligible. Because there is no specific information in the literature on how each ILTs trait relates to LMX, but relying on the results of previous research that revealed a positive association between the cumulative effect of all positive ILTs traits and LMX, I hypothesized the following:

Hypothesis 1: Followers' intra-personal congruence at higher levels of positive ILTs traits will be associated with higher ratings of follower-rated LMX, as compared at lower levels of positive ILTs traits. This hypothesis was tested separately for each positive ILTs trait, as follows: H1a – Sensitivity, H1b – Intelligence, H1c – Dedication and H1d – Dynamism. (*Fulfilled positive expectations hypothesis*)

When positive expectations are not fulfilled, low-quality LMX is developed, in which dyadic exchanges are within the limits of formal roles. Based on the needs-supplies fit theoretical assumption formulated by Edwards, Caplan and Harrison (1998) who asserted that both under and oversupply can be detrimental, it was expected that there was an optimum level of positive ILTs traits manifested by leaders for LMX to be maximized. Getting even more from leaders than what they expected, might have been tricky for followers because receiving more of a kind impede other job-related needs to be satisfied (Edwards et al, 1998). Another explanation was offered by Harris and Kacmar's study (2006) which revealed, contrary to the obvious intuition, that having a high LMX with their leaders led to a higher level of stress for followers, because of the high obligations felt by followers to reciprocate for the advantages obtained from their leaders. Nevertheless, not receiving enough when the requirement for a specific ILTs trait is high can be more damaging than getting more of a good thing because the underlying unfulfilled need is felt more intense and urgent. The idea is captured in the loss aversion concept introduced by Kahneman and Tversky (1979). They stated that the suffering of losing is felt extremely

powerful so that people take risks to avoid it. Given all this, I proposed the following hypothesis:

Hypothesis 2: When the direction of the followers' intra-personal incongruence is such that the scores of the followers' ideal positive ILTs traits (i.e., preferences) are below the scores of actual positive ILTs traits of their leaders (i.e., recognition), the level of follower-rated LMX will be lower, as compared to the situation when ideal positive ILTs traits are above the scores of actual positive ILTs traits of the leaders. This hypothesis was tested separately for each positive ILTs trait, as follows: H2a – Sensitivity, H2b – Intelligence, H2c – Dedication and H2d – Dynamism. (*Direction of unfulfilled positive expectations hypothesis*)

Regarding the negative ILTs traits, to the best of my knowledge, only one previous empirical study investigated the relationship between ideal-actual congruence and LMX and it revealed no significant association between them (Epitropaki & Martin, 2005). Nevertheless, the mentioned study used absolute difference scores to approximate the congruence and therefore the results might have been hampered by the methodological problems associated with difference scores (Edwards & Parry, 1993). Moreover, the authors used the broad negative dimension which encompasses two ILTs traits, specifically Tyranny and Masculinity. In case the ideal-actual congruence scores for the two traits had different associations with LMX, their aggregation might end up canceling each other out. While ideal-actual congruence for positive ILTs promotes better LMX, it is expected that, on the flip side, ideal-actual congruence for negative ILTs to hinder LMX. Leung and Sy (2018) found that when negative Implicit Followership Theories (i.e., attributes of ideal followers) were fulfilled at a group level, Golem effect, a dark self-fulfilling process, was triggered, having negative effects on performance. Therefore, the following hypotheses were proposed, paralleling the hypothesis suggested for the positive ILTs, but making the necessary logical changes for the dark side of ILTs traits:

Hypothesis 3: Followers' intra-personal congruence at lower levels of negative ILTs traits will be associated with higher ratings of follower-rated LMX, as compared at higher levels of negative ILTs traits. This hypothesis was tested separately for each negative ILTs trait, as follows: H4e – Tyranny and H4f – Masculinity. (*Fulfilled negative expectations hypothesis*)

Hypothesis 4: When the direction of the followers' intra-personal incongruence is such that the scores of the followers' ideal negative ILTs (i.e., preferences) are above the scores of actual negative ILTs of their leaders (i.e., recognition), the level of follower-rated LMX will be higher, as compared to the situation when ideal negative ILTs traits are below the scores of actual negative ILTs traits of the leaders. This hypothesis was tested separately for each negative ILTs trait, as follows: H5e – Tyranny and H6f – Masculinity (*Direction of unfulfilled negative expectations hypothesis*)

LMX as a mediator between ILTs congruence and engagement

Work engagement is a positive affective and highly motivational state that can be experienced by employees who perceive that their job resources are plentiful for handling their demands (Bakker & Demerouti, 2014). High-quality LMX with leaders has been proven to lead to the perception of a resourceful work environment because it comes with enriched jobs, empowerment, and social support for followers (Breevaart, Bakker, Demerouti, & van den Heuvel, 2015). Huel and his colleagues (2017) found a meta-analytical moderate association between LMX and engagement. Epitropaki and Martin (2004) showed that LMX mediated the relationship between ILTs congruence and well-being. Additionally, consistent with leader categorization theory (Lord & Maher, 1991) that asserts that once a person is labeled as a good leader many direct and indirect effects on organizational outcomes are triggered and also the abundance of prior research that supports that the effect of fulfilled expectations about leaders impacts various outcomes through LMX (Junker and van Dick, 2014), it is further expected to find

an indirect effect of ideal-actual ILTs congruence on engagement through LMX. By contrast, followers perceiving low-quality LMX with their leaders can feel deprived of some resources such as leaders' support and are more strongly constrained to formal job tasks, so that they may not be as motivated and engaged as their colleagues in high-quality relationships with leaders. Consequently:

Hypothesis 5: Followers' intra-personal congruence between ideal and actual ILTs has an indirect effect on engagement through LMX. This hypothesis was tested separately for each positive ILTs trait, as follows: H5a – Sensitivity, H5b – Intelligence, H5c – Dedication, H5d – Dynamism, H5e – Tyranny and H5f - Masculinity.

Method

Participants and procedure

Participants were recruited through snowball sampling. The sample included 68 working adults who were willing to participate voluntarily in the study. Their ages ranged from 22 to 55 years old ($M = 35.04$, $SD = 7.78$). Male respondents accounted for 27% of the sample. About their educational level, 8.8% graduated high school, 42.6% had undergraduate studies, 36.8% graduate studies and 11.8% had postgraduate education. In terms of tenure, 8.8% had between one and three years of work experience, 14.7% between three to five, 25% between 6 to 10, 35.3% between 10 to 20 and 16.2% more than 20 years of experience. Regarding their leadership experience, 60.2%, 20.6% had less than three years of leadership experience, 7.4% between three and five, 4.4% between 5 to 10 and 7.4% more than 10 years of leadership experience.

Measures

Ideal ILTs traits were measured with the scale developed by Offermann, Kennedy, and Wirtz (1994) and revised by Epitropaki and Martin (2004). On a 9-point scale, participants were asked to rate to what degree each item included in the scale was characteristic for an ideal leader. The scale consists of 21 items that load onto four prototypic factors, namely

Sensitivity (three items, e.g., understanding; α = .72), Intelligence (four items, e.g., knowledgeable; α = .79), Dedication (three items, e.g., hard-working; α = .82) and Dynamism (three items, e.g., energetic; α = .79) and two anti-prototypic factors, namely Tyranny (six items, e.g., domineering; α = .82) and Masculinity (two items, e.g., masculine; α = .92).

Actual ILTs traits were measured with the same scale developed by Offermann, Kennedy, and Wirtz (1994) and revised by Epitropaki and Martin (2004). This time, on a 9-point scale, participants were asked to rate to what degree each item was characteristic for their actual leader. The Cronbach alpha coefficients were the following: Sensitivity (α = .87), Intelligence (α = .97), Dedication (α = .98), Dynamism (α = .89), Tyranny (α = .76) and Masculinity (α = .94).

LMX was measured with the 7 items leader-member exchange scale developed by Graen and Uhl-Bien (1995). On a 5-point scale, participants were asked to rate the quality of their relationship with the leader. Sample items include: "How well does your manager understand your job problems and needs?" and "I know where I stand with my manager."

Work engagement was measured with the 9 items scale included in the Job Demands-Resources Questionnaire developed by Baker (2014). Participants were asked to rate how characteristic each of the affirmations was characteristic for them. Each item was rated on a 7-point scale, with response ranging from never to always. Sample items include: "At my work, I feel bursting with energy" and "I am proud of the work that I do".

Analytical strategy

Polynomial regression analysis with surface modeling (Edwards & Parry, 1993) was used to test the hypotheses. Most of the research addressing ILTs congruence has used the difference scores (e.g., Coyle & Foti, 2014; Epitropaki & Martin, 2005). This methodological approach was criticized for having numerous disadvantages such as the fact that it reduces a three-dimensional relationship to a two-dimensional one and that

meaningful congruence hypotheses cannot be tested with difference scores (Edwards, 2002; Edwards, 2007). Polynomial regression is a more robust and informative analytical tool because it allows not only to test the extent the which congruence between two variables is related to an outcome, but also how the direction of the (in)congruence (i.e., Ideal ILTs trait > Actual ILTs trait or Ideal ILTs trait < Actual ILTs trait) and the level of congruence (i.e., when both ideal ILTs trait and actual ILTs trait are high or both are low) are related to the outcome (Rupprecht, Reynolds Kueny, and Shoss, 2016; Shanock, Baran, Gentry, Pattison, and Heggestad, 2010). As an example, for predicting LMX from the congruence between ideal Sensitivity and actual Sensitivity recognized in leaders, one of the positive ILTs traits, the regression equation was the following:

$$LMX = b_0 + b_1*Sensitivity\_I + b_2*Sensitivity\_A + b_{11}*Sensitivity\_I*Sensitivity\_A + b_{22}*Sensitivity\_I^2 + b_{12}*Sensitivity\_A^2 + e,$$

where b is the regression coefficient for each variable, I stands for the ideal Sensitivity (i.e., preference), and A stands for actual Sensitivity (i.e., recognition of Sensitivity in actual leader).

Prior to testing the models, scores for ideal and actual ILTs were centered to their midpoints, by subtracting 5 from each score, because both ideal ILTs and actual ILTs were measured on a 9-point Likert scale. This procedure was recommended because it reduces multicollinearity and facilitates the interpretation of the results (Aiken & West, 1991; Edwards & Parry, 1993). Thus, the coefficients for ideal ILTs traits and actual ILTs traits represent the slope of the surface at the center of the X-Y plane, namely the plane defined by the ideal ILTs traits and actual ILTs traits. For each trait, I computed three new variables necessary for the quadratic equation, namely: the square of the centered ideal ILTs trait, the square of the centered actual ILTs trait and the product between the centered ideal ILTs trait and centered actual ILTs trait. In total, 6 quadratic regressions were run for

all ILTs traits. Based on the coefficients from the quadratic equation, the response surface pattern was determined for each combination of variables. Subsequently, I deployed polynomial regressions in SPSS for each of the ILTs traits, regressing LMX on the centered predictor variables, the squares of their centered values and the product of their centered values.

Using polynomial regression coefficients, I computed slopes and curvatures along the line of congruence and line of incongruence for each equation, using the Excel spreadsheet built by Shanock and her colleagues (2010). These parameters provided information about the shape of the surface, whether it was convex, concave or a saddle-shaped surface, which gave information about the overall relationship between variables. The line of congruence represents the line of the perfect fit, where the ideal ILTs trait score is equal to the actual ILTs trait score (e.g., Sensitivity_I = Sensitivity_A). The slope along the line of congruence gives indications on how the congruence predicts the level of outcome (i.e., the height of the outcome), whereas the curvature reveals if the relationship between the congruence and the outcome is linear or nonlinear. The line of incongruence is perpendicular to the line of congruence and reflects the perfect misfit, where ideal ILTs trait score equals minus actual ILTs trait score (e.g., Sensitivity_I = -Sensitivity_A). The slope along the line of incongruence shows whether the direction of the misfit (i.e., Senzitivity_I > Sensitivity_A or vice versa) produces an effect on the level of outcome. A significant curvature along the line of incongruence indicates how the direction of the misfit affects the outcome. A negative curvature means that the outcome is more sharply reduced as the misfit between the ideal and actual ILTs trait increases.

Consequently, I used the same polynomial regression coefficients to plot the three-dimensional response surfaces for each set of three variables, namely ideal ILTs trait, actual ILTs trait depicted in the horizontal plane and LMX depicted on the vertical axis. For that purpose, I used Origin Pro 2020 software.

For testing the mediation hypotheses, I used Edwards and Cable's (2009) block variable method. First, for each ILTs trait, I computed a block variable, a weighted linear composite consisting of the joint effects of the five quadratic terms (e.g., for Sensitivity: Sensitivity _I, Sensitivity _A, Sensitivity _I_squared, Sensitivity _I X Sensitivity _A, Sensitivity _A_squared), in which the weights were the standardized regression coefficients in the polynomial regression. Then I used Hayes' PROCESS macro for SPSS (2018) to assess the indirect effect for each block variable to Engagement via LMX.

Results

Table 1 presents the means, standard deviations, internal consistencies, and correlations between study variables. Additionally, the table includes correlations with several control variables (i.e., demographics) to have a more comprehensive understanding of the data, but they were not included in the subsequent analysis because there was no theoretical argument to do so. Using Gignac and Szodorai (2016) criteria for assessing the magnitude of the correlations, ILTs traits had moderate to large correlations with LMX and engagement, which was according to the expectations.

Table 2 presents both the first-order models with ideal ILTs traits and actual ILTs traits as predictors and the second-order models which additionally includes second-order components, as specified in the quadratic equation above. As can be seen in the table, second-order models showed increased effects sizes compared to the first ones, indicating that exploring not only ideal ILTs traits and actual ILTs traits, but their simultaneous effect on LMX had practical value.

Based on the response surface results presented in Table 2 and graphs depicted in Figure 1, I examined how (in)congruence between ideal positive ILTs traits and actual positive ILTs traits, their degrees and their directions related to LMX.

Table 1. *Descriptive statistics, correlations between variables and reliabilities*

Variable	M	SD	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18
Followers' Demographics																				
1. Age	35.04	7.78																		
2. Gender			.11																	
3. Work tenure	4.35	1.18	.88**	.10																
4. Length of the relationship	4.52	1.28	.47**	.20	.57**															
Followers' Ideal ILTs																				
5. Sensitivity_FI	7.70	0.87	.17	.12	.18	.15	(.72)													
6. Intelligence_FI	8.57	0.50	.11	.26*	.02	.13	.34**	(.79)												
7. Dedication_FI	8.49	0.61	.04	.15	-.01	.26*	.20	.48**	(.82)											
8. Dynamism_FI	7.92	0.87	.14	.11	.03	.02	.27*	.54**	.40**	(.79)										
9. Tyranny_FI	4.54	1.64	-.18	-.25*	-.15	.02	-.08	.09	.04	.19	(.82)									
10. Masculinity_FI	3.86	2.62	-.19	-.29*	-.26*	-.30*	.10	.06	-.03	.04	.36**	(.92)								
Followers' Actual ILTs																				
11. Sensitivity_FA	7.60	1.19	-.06	.20	-.05	-.17	.33**	.17	.03	.12	-.08	-.03	(.87)							
12. Intelligence_FA	8.38	0.90	.05	.16	.04	.01	.12	.21	.08	.08	.15	-.01	.52**	(.97)						
13. Dedication_FA	7.87	1.50	-.04	.11	.02	-.06	.23	.17	.14	.13	.01	-.16	.57**	.58**	(.98)					
14. Dynamism_FA	7.58	1.29	-.17	.09	-.21	-.23	-.01	.17	.09	.23	.23	-.06	.58**	.48**	.69**	(.89)				
15. Tyranny_FA	5.31	1.81	-.14	-.08	-.17	.06	-.17	-.01	-.04	.1	.56**	.37**	-.32**	-.09	-.22	.09	(.76)			
16. Masculinity_FA	3.79	3.08	-.24*	-.19	-.17	-.17	-.05	.06	-.14	-.14	.18	.50**	-.16	-.09	-.15	-.15	.23	(.94)		
Mediating variable																				
17. LMX	3.93	0.53	.01	.17	.05	-.06	.09	.01	-.06	-.16	-.22	-.24*	.64**	.44**	.34*	.27	-.37*	.02	(.85)	
Outcome variables																				
18. Engagement	3.96	1.02	.06	.27*	.03	.06	-.02	.15	.32**	.01	-.02	.08	.31**	.45**	.32**	.32**	-.09	-.08	.42**	(.92)

Note. ** $p < .01$; * $p < .05$. Reliability estimates (Alpha Cronbach) are reported in parenthesis along the diagonal. ILTs traits marked with I are ideal, and ILTs traits marked with A are perceptions regarding the traits of the actual leaders.

Table 2. *Polynomial Regression Results predicting LMX from the Congruence Between Followers' Ideal ILTs Traits and Recognition of ILTs Traits in Their Leaders*

Followers' intra-personal congruence (ideal versus actual) N = 68	First Order Model	Polynomial Model
Sensitivity		
Intercept	2.15**	3.90**
Sensitivity_FI	-.07	-.04
Sensitivity_FA	.31**	.31**
Sensitivity_FI²		.01
Sensitivity_FI * Sensitivity_FA		.03
Sensitivity_FA²		.01
R²	.43**	.44**
Congruence (Sensitivity_FI = Sensitivity_FA)		
Slope		.27**
Curvature		.05
Incongruence (Sensitivity_FI – Sensitivity_FA)		
Slope		-.35*
Curvature		-.01
Intelligence		
Intercept	3.93*	3.84**
Intelligence_FI	-.09	-.11
Intelligence_FA	.27**	.41*
Intelligence_FI²		.03
Intelligence_FI * Intelligence_FA		.18
Intelligence_FA²		.08
R²	.20*	.23*
Congruence (Intelligence_FI = Intelligence_FA)		
Slope		.30
Curvature		.29
Incongruence (Intelligence_FI = - Intelligence_FA)		
Slope		-.52*
Curvature		-.07

Inter-personal congruence (followers' ideal versus leaders' ideal) N = 34	First Order Model	Polynomial Model
Dedication		
Intercept	3.93**	3.89**
Dedication_FI	-.09	-.14
Dedication_FA	.13*	.20*
Dedication_FI²		-.07
Dedication_FI * Dedication_FA		.11
Dedication_FA²		.03
R²	.14*	.20*
Congruence (Dedication_FI = Dedication_FA)		
Slope		.06
Curvature		.07
Incongruence (Dedication_FI - Sensitivity FA)		
Slope		-.34
Curvature		-.15
Dynamism		
Intercept	3.93**	3.76**
Dynamism_FI	-.15*	-.02
Dynamism_FA	.18**	.18*
Dynamism_FI²		.16*
Dynamism_FI * Dynamism_FA		.05
Dynamism_FA²		.01
R²	.21*	.37**
Congruence (Dynamism_FI = Dynamism_FA)		
Slope		.18**
Curvature		.22**
Incongruence (Dynamism_FI - Dynamism_FA)		
Slope		-.22
Curvature		.12

Table 2. *(continued)*

Followers' intra-personal congruence (ideal versus actual) $N = 68$	First Order Model	Polynomial Model	Inter-personal congruence (followers' ideal versus leaders' ideal) $N = 34$	First Order Model	Polynomial Model
Tyranny					
Intercept	3.93**	3.92**			
Tyranny_FI	.01	.02			
Tyranny_FA	-.15*	-.16*			
Tyranny_FI²		.01			
Tyranny_FI * Tyranny_FA		-.02			
Tyranny_FA²		.01			
R²	.20*	.20*			
Congruence (Tyranny_FI = Tyranny_FA)					
Slope		-.14*			
Curvature		0			
Incongruence (Tyranny_FI = - Tyranny_FA)					
Slope		-.18*			
Curvature		.01			
Masculinity					
Intercept	3.94**	3.86**			
Masculinity_FI	-.04	-.01			
Masculinity_FA	-.02	-.08*			
Masculinity_FI²		-.02			
Masculinity_FI * Tyranny_FA		.03*			
Masculinity_FA²		.01			
R²	.07	.24*			
Congruence (Masculinity_FI = Masculinity_FA)					
Slope		-.09*			
Curvature		.02			
Incongruence (Masculinity_FI = - Masculinity_FA)					
Slope		.07			
Curvature		-.04			

Note. $N = 68$. ** $p < .01$; * $p < .05$. Unstandardized regression coefficients are reported. Slope along the line of congruence: $b_1 + b_2$. Curvature along the line of congruence: $b_3 + b_4 + b_5$. Slope along the line of incongruence: $b_1 - b_2$. Curvature along the line of incongruence: $b_3 - b_4 + b_5$.

For *Sensitivity*, the surface analysis revealed a significant positive slope along the line of congruence (.27**). This indicates that when ideal Sensitivity and actual Sensitivity were congruent, LMX increased as both increased. In Figure 1a, the highest level of LMX was reached at the right corner of the graph, where both ideal Sensitivity and actual Sensitivity were high. The curvature along the line of congruence was insignificant (.05), which meant that the relationship between variables was linear. These results were in support of H1a. The slope along the line of incongruence was negative and significant (-.35*), which meant that LMX was lower when the incongruence was such that the level of ideal Sensitivity was above the level of actual Sensitivity. Indeed, the graph depicted in Figure 1 shows that LMX decreased toward the front corner of the graph, as ideal Sensitivity increased, and actual Sensitivity decreased.

The curvature along the line of incongruence was negative and insignificant (-.01), which indicated a linear relationship. Thus, H2a was supported. For *Intelligence*, the surface analysis showed an insignificant positive slope (.30) and an insignificant positive curvature (.29) along the line of congruence. Thus, H1b did not receive support. Nevertheless, the values of the parameters were moderate, which meant that in the case of a higher power, it could have been significant. Indeed, as seen in the response surface graph presented in Figure 1, the relationship between the three variables generated a convex surface. In the case the results would have been significant, they could have been interpreted as following: LMX was higher when ideal and actual Intelligence were congruent at lower levels and at higher levels (right and left corner of the figure) and that LMX was lower when the two predictors were congruent at middle levels. With respect to the line of incongruence, the results revealed a significant negative slope. This meant that LMX was lower when the incongruence was such that actual Intelligence was below ideal Intelligence, compared to when actual Intelligence was above ideal Intelligence. Thus, there was support for H2b. The curvature along the line of incongruence

was negative but insignificant, indicating a linear relationship between variables along the line of incongruence. Regarding *Dedication*, the response surface analysis revealed an insignificant positive slope (.06) and an insignificant positive curvature (.07) along the line of congruence. Thus, H1c did not receive support. Nevertheless, visual inspection of the graph depicted in Figure 1 indicated a convex response surface and therefore a tendency for LMX to increase as the congruence between ideal and actual Dedication increased. Additionally, the results showed an insignificant negative slope (-.34) and an insignificant negative curvature (-.15) along the line of incongruence. Therefore, H2c was not supported. However, the magnitude of the slope along the line of incongruence was moderate. Corroborating this information with the negative value reached for the curvature along the line of incongruence, meant that the relationship between variables had a concave shape along the line of incongruence. If statistical significance would have been achieved, we could have interpreted as following: LMX decreased more sharply as the level of incongruence between ideal Dedication and actual Dedication increased and reached its minimum level when ideal Dedication was above actual Dedication. Indeed, the same conclusion can be drawn by visually inspecting the 3D graph in Figure 1, where the lowest level for LMX is achieved in the front corner of the graph, where ideal Dedication is high and actual Dedication is low. For *Dynamism*, the results showed a significant positive slope (.18**) and a significant positive curvature (.22**) along the line of congruence. These results indicate that LMX increased in a non-linear manner, when both ideal Dynamism and actual Dynamism were congruent either at higher levels or at lower levels, but not at average levels. Thus, H1d was not supported since the relationship was not linear. Visual inspection of the graph depicted in Figure 1 reveals higher levels of LMX in the left corner, where both ideal Dynamism and actual Dynamism were at their minimum. The slope along the line of incongruence was negative and insignificant (-.22) and the curvature was positive and insignificant (.12), which meant

that H2d was not supported. However, the rather moderate value of slope and the visual information revealed in Figure 1 indicated a tendency for LMX to decrease as the incongruence increased, reaching a minimum when ideal Dynamism was low and actual Dynamism was high. In the case of *Tyranny*, the response surface results showed a negative significant slope (-.14*) and a null curvature along the line of congruence. These indicated a linear relationship between the variables in the sense that LMX decreased as both ideal and actual Tyranny increased simultaneously. In Figure 1, the lowest level of LMX along the line of congruence is observed in the right corner, where both ideal and actual Tyranny reached their maximum levels. Thus, H3e was supported. The slope along the line of incongruence was negative and significant (-.18*), revealing that LMX was lower when the direction of the incongruence was such that ideal Tyranny was below actual Tyranny. The same conclusion is revealed by inspecting the graph depicted in Figure 1, where the minimum value for LMX along the line of incongruence was achieved in the back corner of the graph where ideal Tyranny was above actual Tyranny. The curvature along the line

of incongruence was positive and insignificant (.01), revealing a linear relationship between variables. Thus, H4e received support. Regarding *Masculinity*, the response surface analysis showed a significant negative slope along the line of congruence (-.09*) and an insignificant positive curvature (.02). These results revealed that LMX was higher when both ideal and actual Masculinity were higher. Thus, H2f did not receive support. Visual inspection of the graph in Figure 1 revealed rather a saddle-shaped response surface, indicating a non-linear relationship between the variables. That indicated a tendency for LMX to increase when ideal and actual Masculinity tended to increase or decrease simultaneously. The slope along the line of incongruence was positive but insignificant (.07) and the curvature along the line of incongruence was negative but insignificant (-.04). Therefore, H4f was not supported. Nevertheless, the graph depicted in Figure 1 revealed a concave surface along the line of incongruence, indicating a tendency for LMX to decrease as the incongruence between ideal and actual Masculinity increased. Table 3 presents the summary of the results.

Table 3. *Congruence and Incongruence Hypotheses testing*

Trait / Hypothesis	Sensitivity (a)	Intelligence (b)	Dedication (c)	Dynamism (d)	Tyranny (e)	Masculinity (f)
Congruence (H1, H3)	✓ LMX increased in a linear way as both ideal and actual Sensitivity increased. (H1a)	X LMX showed a tendency to increase in a non-linear way (convex surface along the line of congruence), such that it was higher when both ideal and actual Intelligence were either high or low. (H1b)	X LMX showed a tendency to increase in a non-linear way (convex surface along the line of congruence), such that it was higher when both ideal and actual Dedication were either high or low. (H1c)	X LMX showed a tendency to increase in a non-linear way (convex surface along the line of congruence), such that it was higher when both ideal and actual Dynamism were either high or low. (H1d)	✓ LMX decreased in a linear way as both ideal and actual Tyranny increased. (H3e)	X LMX showed a tendency to increase in a non-linear way (saddle-shaped surface along the line of congruence), such that it was higher as both ideal and actual Masculinity were either high or low. (H3f)
Incongruence (H2, H4)	✓ LMX decreased in a linear way as the incongruence increased and it reached its minimum when ideal Sensitivity was high and actual Sensitivity was low. (H2a)	✓ LMX decreased in a linear way as the incongruence increased and it reached its minimum when ideal Intelligence was high and actual Intelligence was low. (H2b)	X LMX showed a tendency to decrease in a non-linear way as the incongruence increased (concave shape along the line of incongruence), reaching its minimum when ideal Dedication was maximum and actual Dedication was minimum. (H2c)	X LMX showed a tendency to decrease in a linear way as the incongruence increased, reaching a minimum when ideal Dynamism was low and actual Dynamism was high. (H2d)	✓ LMX decreased in a linear way as the incongruence increased and reached its minimum when ideal Tyranny was high and actual Tyranny was low. (H4e)	X LMX showed a tendency to decrease in a non-linear way (concave shape along the line of incongruence), indicating a tendency for LMX to decrease as the incongruence between ideal and actual Masculinity increased. (H4f)

Note: $N = 68$

✓   Hypothesis received support (statistical significance was reached)

X   Hypothesis did not received support (statistical significance was not reached), but the tendency was revealed in the graphical representation of the response surface

The results generated for 10,000 bootstrapped samples, by the mediation analysis deployed in SPSS, are presented in Table 4. The only mediation hypothesis which received support was H5a, revealing that the effect of Sensitivity block variable is transferred to engagement partly through LMX (.30* for the indirect effect, .09 for the direct effect and .39** for the total effect) . Intelligence, Dedication, Tyranny and Masculinity block variables had indirect effects on engagement, but their total effects were insignificant, whereas Dynamism had only a direct effect on engagement.

Table 4. *Direct, Indirect and Total Effects of ILTs traits Congruence on Engagement through LMX*

ILTs trait	Coefficient	*SE*	95% CI
Sensitivity block			
Indirect effect	.30*	.11	(.04, .49)
Direct effect	.09	.19	(-.27, .45)
Total effect	.39**	.15	(.10, .68)
Intelligence block			
Indirect effect	.04*	.17	(-.22, .42)
Direct effect	-.06	.25	(-.55, .43)
Total effect	-.03	.27	(-.56, .51)
Dedication block			
Indirect effect	.83*	.30	(.23, 1.40)
Direct effect	-.07	.54	(-1.15, 1.02)
Total effect	.75	.52	(-.29, 1.80)
Dynamism block			
Indirect effect	.19	.11	(-.01, .42)
Direct effect	.36*	.18	(.02, .71)
Total effect	.55**	.14	(.27, .83)
Tyranny block			
Indirect effect	.29**	.09	(.13, .50)
Direct effect	-.16	.17	(-.50, .18)
Total effect	.13	.17	(-.21,.46)
Masculinity block			
Indirect effect	.10***	.04	(.04, .19)
Direct effect	-.12*	.05	(-.22, -.02)
Total effect	-.02	.05	(-.12, .08)

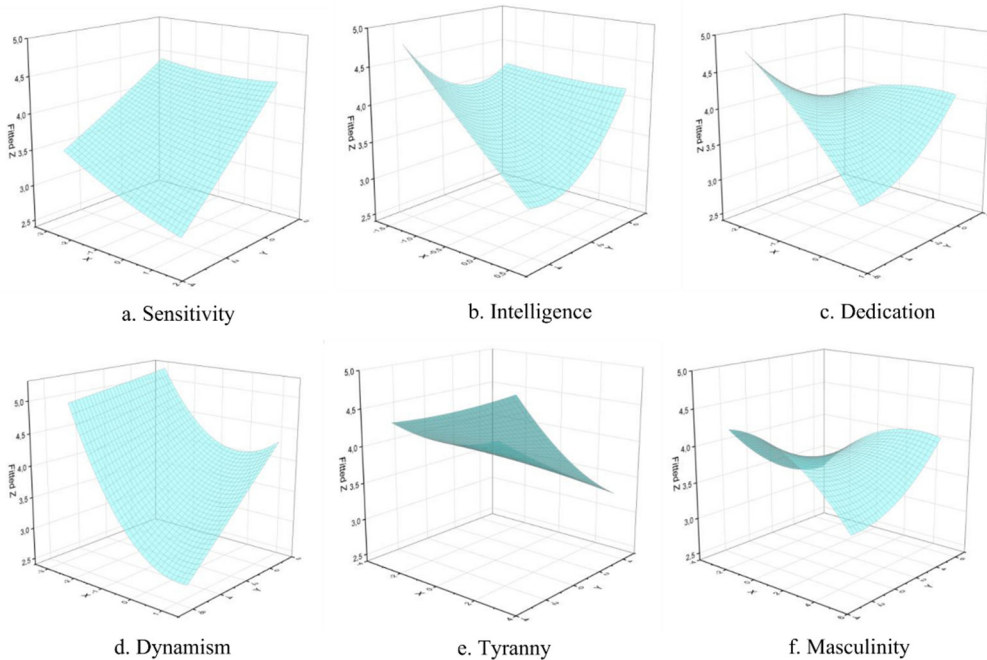*Note.* * $p < .05$. ** $p < .01$. *** $p < .001$.

Figure 1. Response Surfaces for the Relationships between Ideal and Actual ILTs Traits and LMX

Discussions

In this study, guided by the bandwidth-fidelity principle, I investigated the relationships between each set of ideal-actual ILTs traits and LMX and subsequently, their indirect effect on work engagement. I used polynomial regression with response surface for testing the relationship between ideal-actual congruence and LMX and block variable approach for testing the mediation hypotheses. The results revealed that among the four positive ILTs traits, only sensitivity seems to be inherently good, as both congruence and incongruence hypotheses were supported. This means that even when the perceived sensitivity of leaders is above the expected level, followers perceive higher LMX than when the perceived sensitivity is below expectations. The results are in line with Rupprecht's and her colleagues' findings on the relationship between ideal-actual sensitivity incongruence and CWB (2016) and meta-analytical correlations found by Judge, Piccolo and Ilies (2004) which revealed that consideration for followers (e.g., concern and

respect) were stronger related to leadership outcomes than the organizational capacities of the leaders to structure the work of their followers. Regarding the other three positive ILTs traits, namely intelligence, dedication and dynamism, the results indicate that meeting followers' expectations, especially when they are extremely high or low, is the best way for leaders to develop a high-quality LMX with their followers. Despite the three ILTs traits being considered intrinsically positive, current results show that when followers' expectations are low and their perceptions are that leaders manifest those traits at higher levels, the perceived quality of their relationship is affected. This is in line with the needs-supply fit concept (Edwards et al.,1998) that explains that on the one hand, receiving too much of a kind inhibits other resources to be obtained and on the other, it creates a liability for the dyadic partner to reciprocate. Nevertheless, results indicate also that it is safer when the unfulfilled expectations are achieved at lower levels of expectations (i.e., when ideal < actual) than when they are achieved at higher levels (i.e.,

when ideal > actual). Concerning negative ILTs traits, current results indicate that tyranny of leaders should be low, irrespective of the level of followers' expectations. Even when followers' expectations are not fulfilled, it is better when the direction is such that expectations are above the actual tyranny of the leader. Regarding masculinity, present results indicate that for having a positive impact on LMX, followers' expectations must be met, irrespective of the level of expectations. In other words, if followers prefer masculine leaders, manifested masculinity enhances LMX, but so does when followers prefer low level of masculinity and leaders are perceived low on masculinity. Considering simultaneously currents findings related to Tyranny and Masculinity that indicate effects on LMX and the results obtained by Epitropaki and Martin (2004), that revealed no effect of the composite score of negative ILTs traits on wellbeing, a possible explanation of different results is that when the effects of Tyranny and Masculinity on LMX are combined, as they were in the mentioned study, they could generate a destructive interference so that the cumulative effects of the two was less than either one of them taken individually.

Additionally, I found that ideal-actual sensitivity congruence had an indirect effect on work engagement, in line with the results obtained by Rupprecht and her colleagues (2016) and those found by Epitropaki and Martin (2005). Ideal-actual intelligence congruence had no effect on engagement, neither direct or indirect, revealing that, as expected, it might have predictive validity for other types of outcomes, such as performance. Dedication had only an indirect effect on engagement through LMX, but the total effect was insignificant, suggesting that other mechanisms inhibit the effect transmitted through LMX. Dynamism had a direct effect on engagement, but not an indirect one, again revealing that the impact on engagement is transferred through another mediating variable than LMX. Both tyranny and masculinity had indirect effects on engagement via LMX, but their total effects were insignificant suggesting that other mediating variables masked the effects transmitted through LMX.

To sum up, mediation results indicate that LMX has a mediating effect only for the relationship between ideal-actual sensitivity congruence and work engagement. The remaining ILTs traits can impact other outcomes than engagement, as I was speculating above that ideal-actual intelligence congruence can have a positive effect on job performance, or their indirect effects via LMX are inhibited by other explanatory mechanisms.

Although not all the hypotheses were supported, current results provide empirical arguments for exploring ILTs traits at the level of narrow traits, instead of broad dimensions.

Future studies should address additional outcomes, but also additional mediating mechanisms linking ideal-actual ILTs congruence to those outcomes. Identifying which ILTs trait may predict each outcome and whether some ILTs traits are more important than others within some specific populations or in specific settings, can help achieve a greater understanding of the impact of fulfilled expectations about leaders in work settings.

There are several limitations in this study. First, the results of this study should be interpreted carefully due to the small sample size. A larger sample would allow more relationships to be significant and higher confidence for the findings. Second, this study is cross-sectional in nature and the data was collected from a single source. Despite the design asks for self-assessment, longitudinal or experimental studies can be conducted in the future or address other variables that might be rated by other sources. Nevertheless, although the common method variance (CMV) may be concerning, Conway and Lance (2010) explained that most of the time CMV is just a perpetuated misconception and that same-source correlations might be closer to true scores than different-source correlations.

This study adds to the literature on ILTs in two important ways. First, it draws on the bandwidth-fidelity principle and revealed that addressing ILTs at the level of narrow traits provides additional theoretical and practical insights. Second, by using polynomial regression with response surface

methodology, it showed nuanced effects of ideal-actual (in)congruence on LMX and engagement. Third, the current study adds to the Occupational Health Psychology (OHP) literature, by showing how the leaders' behaviors can affect the followers' OHP related outcomes.

There are several practical implications of this study, as well. By showing that sensitivity of leaders is beneficial whenever is high and that tyranny of leaders should be low for a high quality LMX to pe perceived by followers, I provided valuable information for those in charge with selection and development programs for leaders. Additionally, by revealing non-linear relationships between the ideal-actual congruence for the other ILTs traits, the current study shifts the focus on the idea of matching leaders and followers based on their expectations in order to provide benefits both for followers and for organizations. Finally, training programs might be conducted in organizations aimed to adjust followers' mental models about effective leaders in a way that they are more adapted to organizational settings and less influenced by followers' personal histories.

The results of the current paper pave the way for future studies that address the unique effects of each ideal-actual ILTs trait congruence on other organizational outcomes. Additionally, the CMV limitation calls for future studies with dyadic design, which, on one hand, have the advantage of the multisource and, on the other, can tap into the dyadic effect of intra-personal and inter-personal ILTs and IFTs congruence on work outcomes.

In conclusion, this study expands the existing knowledge on ILTs and their impact on organizational outcomes by showing that to predict specific outcomes narrow ILTs traits should be considered and that, counter-intuitively, some positive ILTs can be detrimental when they are too high and other negative ILTs traits are not always harmful.

References

Aiken, L. S., & West, S. G. (1991). *Multiple regression: Testing and interpreting interactions*. Newbury Park, CA: Sage.

Ashton, M. C. (1998). Personality and job performance: the importance of narrow traits. *Journal of Organizational Psychology*, *19*(3), 289-303. https://doi.org/10.1002/(SICI)1099-1379(199805)19:3<289::AID-JOB841>3.0.CO;2-C

Ayman, R., & Chemers, M. M. (1983). Relationship of supervisory behavior ratings to work group effectiveness and subordinate satisfaction among Iranian managers. *Journal of Applied Psychology, 68*(2), 338–341. https://doi.org/10.1037/0021-9010.68.2.338

Bakker, A.B. (2014). The Job Demands–Resources Questionnaire. Rotterdam: Erasmus University.

Bakker, A. B., & Demerouti, E. (2014). Job Demands-Resources theory. In C. Cooper & P. Chen (Eds.), *Wellbeing: A complete reference guide*. John Wiley & Sons Ltd.

Bakker, A. B., & Demerouti, E. (2017). Job demands–resources theory: Taking stock and looking forward. *Journal of Occupational Health Psychology*, *22*(3), 273-285. https://doi.org/10.1037/ocp0000056

Biermeier-Hanson, B., & Coyle, P. (2019). Investigating leader role congruity and counterproductive work behavior. *The Journal of Psychology*, *153*(8), 820-842. https://doi.org/10.1080/00223980.2019.1627274

Blau, P. M. (1964). *Exchange and power in social life*. NY: John Wiley & Sons.

Breevaart, K., Bakker, A.B., Demerouti, E., & Van den Heuvel, M. (2015). Leader-member exchange, work engagement, and job performance. *Journal of Managerial Psychology*, *30*, 754-770. https://doi.org/10.1108/jmp-03-2013-0088

Conway, J. M., & Lance, C. E. (2010). What reviewers should expect from authors regarding common method bias in organizational research. *Journal of Business and Psychology*, *25*, 325–334. http://dx.doi.org/10.1007/s10869-010-9181-6

Coyle, P. T., & Foti, R. (2015). If You're not with me, you're . . .? examining prototypes and cooperation in Leader–Follower relationships. *Journal of Leadership & Organizational Studies*, *22*(2), 161-174. https://doi.org/10.1177/1548051814550830

Cronbach, L. J., & Gleser, G. C. (1957). *Psychological tests and personnel decisions*. University of Illinois Press.

Gerstner, C. R., & Day, D. V. (1997). Meta-analytic review of leader-member exchange theory: Correlates and construct issues. *Journal of Applied Psychology*, *82*(6), 827-844. https://doi.org/10.1037/0021-9010.82.6.827

Gignac, G. E., & Szodorai, E. T. (2016). Effect size guidelines for individual differences researchers. *Personality and Individual Differences, 102,* 74-78. https://doi.org/10.1016/j.paid.2016.06.069

Graen, G. B., & Uhl-Bien, M. (1995). Relationship-based approach to leadership: Development of leader-member exchange (LMX) theory of leadership over 25 years: Applying a multi-level multi-domain perspective. *The Leadership Quarterly*, *6*(2), 219-247. https://doi.org/10.1016/1048-9843(95)90036-5

Huell, F., Vincent-Höper, S., Bürkner, P. C., Gregersen, S., Holling, H. & Nienhaus, A. (2017). Leader-Member Exchange and Employee Well-Being: A Meta-Analysis. *Academy of Management Journal*. https://doi.org/10.5465/ambpp.2016.13537abstract

Eden, D., & Leviatan, U. (1975). Implicit leadership theory as a determinant of the factor structure underlying supervisory behavior scales. *Journal of Applied Psychology*, 60(6), 736−741. https://doi.org/10.1037/0021-9010.60.6.736

Edwards, J. R. (2002). Alternatives to difference scores: Polynomial regression analysis and response surface methodology. In F. Drasgow & N. W. Schmitt (Eds.), *Advances in measurement and data analysis* (pp. 350-400). San Francisco: Jossey-Bass.

Edwards, J. R., & Cable, D. M. (2009). The value of value congruence. *Journal of Applied Psychology*, 94(3), 654-677. https://doi.org/10.1037/a0014891

Edwards, J. R., Caplan, R. D., & Harrison, R. V. (1998). Person environment fit theory: Conceptual foundations, empirical evidence, and directions for future research. In C. L. Cooper (Ed.), *Theories of organizational stress* (pp. 28–67). New York, NY: Oxford University Press.

Edwards, J. R., & Parry, M. E. (1993). On the use of polynomial regression equations as an alternative to difference scores in organizational research. *Academy of Management Journal,* 36(6), 1577–1613. https://doi.org/10.5465/256822

Epitropaki, O., & Martin, R. (2004). Implicit leadership theories in applied settings: Factor structure, generalizability, and stability over time. *Journal of Applied Psychology*, 89(2), 293-310. https://doi.org/10.1037/0021-9010.89.2.293

Epitropaki, O., & Martin, R. (2005). From ideal to real: A longitudinal study of the role of implicit leadership theories on leader-member exchanges and employee outcomes. *Journal of Applied Psychology*, 90(4), 659-676. https://doi.org/10.1037/0021-9010.90.4.659

Fiske, S. T., & Taylor, S. E. (1984). *Social cognition*. Massachusetts: Addison-Wesley Publishing Company.

Hallinger, P. (2011). Leadership for learning: Lessons from 40 years of empirical research. *Journal of Educational Administration*, 49(2), 125-142. https://doi.org/10.1108/09578231111116699

Harris, K. J., & Kacmar, K. M. (2006). Too much of a good thing: The curvilinear effect of leader-member exchange on stress. *The Journal of Social Psychology*, 146, 65–84. http://dx.doi.org/10.3200/SOCP.146.1.65-84

Jenkins, M., & Griffith, R. (2004). Using personality constructs to predict performance: Narrow or broad bandwidth. *Journal of Business and Psychology*, 19(2), 255-269. . https://doi.org/10.1007/s10869-004-0551-9

Judge, T. A., Piccolo, R. F., & Ilies, R. (2004). The Forgotten Ones? The Validity of Consideration and Initiating Structure in Leadership Research. *Journal of Applied Psychology,* 89(1), 36–51. https://doi.org/10.1037/0021-9010.89.1.36

Junker, N. M., Schyns, B., van Dick, R., & Scheurer, S. (2011). Die Bedeutung der Führungskräfte-Kategorisierung für Commitment, Arbeitszufriedenheit und Wohl- befinden unter Berücksichtigung der Geschlechterrollentheorie. *Zeitschrift für Arbeits- und Organisationspsychologie*, 55(4), 171-179. https://doi.org/10.1026/0932-4089/a000055

Junker, N. M., & van Dick, R. (2014). Implicit theories in organizational settings: A systematic review and research agenda of implicit leadership and followership theories. *The Leadership Quarterly*, 25(6), 1154-1173. https://doi.org/10.1016/j.leaqua.2014.09.002

Kahneman, D., & Tversky, A. (1979). Prospect Theory: An Analysis of Decision under Risk. *Econometrica*, 47(2), 263-291. http://www.jstor.org/stable/1914185?origin=JSTOR-pdf

Keller, T. (1999). Images of the familiar: Individual differences and implicit leadership theories. *The Leadership Quarterly*, 10(4), 589-607. https://doi.org/10.1016/S1048-9843(99)00033-8

Keller, T. (2003). Parental images as a guide to leadership sensemaking: An attachment perspective on implicit leadership theories. *The Leadership Quarterly*, 14(2), 141-160. https://doi.org/10.1016/S1048-9843(03)00007-9

Khorakian, A., & Sharifirad, M.S. (2019). Integrating Implicit Leadership Theories, Leader-Member Exchange, Self-Efficacy, and Attachment Theory to Predict Job Performance. *Psychological Reports*, 122(3), 1117-1144. https://doi.org/10.1177/0033294118773400

Leung, A., & Sy, T. (2018). I am as incompetent as the prototypical group member: An investigation of naturally occurring golem effects in work groups. *Frontiers in Psychology*, 9, 1581. https://doi.org/10.3389/fpsyg.2018.01581

Lord, R. G., Foti, R. J., & De Vader, C. L. (1984). A test of leadership categorization theory: Internal structure, information processing, and leadership perceptions. *Organizational Behavior and Human Performance*, 34, 343−378. https://doi.org/10.1016/0030-5073(84)90043-6

Lord, R. G., & Maher, K. J. (1991). *Leadership and information processing: Linking perceptions and performance*. Boston: Routledge.

Offermann, L. R., Kennedy, J. K., & Wirtz, P. W. (1994). Implicit leadership theories: Content, structure, and generalizability. *The Leadership Quarterly*, 5(1), 43-58. https://doi.org/10.1016/1048-9843(94)90005-1

Quaquebeke, N. V., Graf, M. M., & Eckloff, T. (2014). What do leaders have to live up to? contrasting the effects of central tendency versus ideal-based leader prototypes in leader categorization processes. Leadership, 10(2), 191-217. https://doi.org/10.1177/1742715013476081

Rahn, D. L., Jawahar, I., Scrimpshire, A. J., & Stone, T. (2016). Are leaders defined by followers? role of follower's ILT and the mediating influence of LMX on follower outcomes. *Journal of Organizational Effectiveness: People and Performance*, 3(1), 43-69. https://doi.org/10.1108/JOEPP-04-2015-0016

Riggs, B. S., & Porter, C. O. L. H. (2017). Are there advantages to seeing leadership the same? A test of the mediating effects of LMX on the relationship between ILT congruence and employees' development. *The Leadership Quarterly*, 28(2), 285-299. https://doi.org/10.1016/j.leaqua.2016.10.009

Robinson, V. M. J., Lloyd, C. A., & Rowe, K. J. (2008). The Impact of Leadership on Student Outcomes: An Analysis of the Differential Effects of Leadership Types. *Educational Administration Quarterly*, 44(5), 635–674. https://doi.org/10.1177/0013161X08321509

Rosenthal, R. (1993). Interpersonal expectations: Some antecedents and some consequences. In P. D. Blanck (Ed.), *Interpersonal expectations: Theory, research, and applications. Studies in emotion and social interaction* (pp. 3–24). New York, NY, US: Cambridge University Press.

Rueb, J. D., Erskine, H. J., & Foti, R. J. (2008). Intelligence, dominance, masculinity, and self-monitoring: Predicting leadership emergence in a military setting. *Military Psychology*, *20*(4), 237–252. https://doi.org/10.1080/08995600802345139

Rupprecht, E. A., Kueny, C. R., Shoss, M. K., & Metzger, A. J. (2016). Getting what you want: How fit between desired and received leader sensitivity influences emotion and counterproductive work behavior. *Journal of Occupational Health Psychology*, *21*(4), 443-454. https://doi.org/10.1037/a0040074

Salgado, J. F. (2017). Bandwidth-Fidelity Dilemma. In V. Zeigler-Hill, & T. K. Shackelford (Eds.). *Encyclopedia of Personality and Individual Differences*. Springer. https://doi.org/10.1007/978-3-319-28099-8_1280-1

Shanock, L. R., Baran, B. E., Gentry, W. A., Pattison, S. C., & Heggestad, E. D. (2010). Polynomial regression with response surface analysis: A powerful approach for examining moderation and overcoming limitations of difference scores. *Journal of Business and Psychology*, *25*(4), 543-554. https://doi.org/10.1007/s10869-010-9183-4

Shondrick, S. J., Dinh, J. E., & Lord, R. G. (2010). Developments in implicit leadership theory and cognitive science: Applications to improving measurement and understanding alternatives to hierarchical leadership. *The Leadership Quarterly*, *21*(6), 959-978. https://doi.org/10.1016/j.leaqua.2010.10.004

Tett, R. P., & Burnett, D. D. (2003). A personality trait-based interactionist model of job performance. *Journal of Applied Psychology*, *88*(3), 500-517. https://doi.org/10.1037/0021-9010.8

Wang, X., & Peng, J. (2016). The effect of implicit-explicit followership congruence on benevolent leadership: Evidence from Chinese family firms. *Frontiers in Psychology, 7*, 812-812. doi:10.3389/fpsyg.2016.00812

Whiteley, P., Sy, T., & Johnson, S. K. (2012). Leaders' conceptions of followers: Implications for naturally occurring pygmalion effects. *The Leadership Quarterly, 23*(5), 822-834. doi:10.1016/j.leaqua.2012.03.006

RESEARCH ARTICLE

Workplace Bullying and Turnover Intention. The Role of Protective versus Vulnerable Personality Factors

ANDREEA BUTUCESCU*
Interdisciplinary School of Doctoral Studies, University of Bucharest, Romania
Department of Psychology, University of Bucharest, Romania

MIRUNA MUTU*
Department of Psychology, University of Bucharest, Romania

DRAGOȘ ILIESCU
Department of Psychology, University of Bucharest, Romania

Abstract

This study investigates the vulnerability/protection effects of the Big Five personality traits (extraversion, openness, agreeability, conscientiousness, neuroticism) on the relationship between bullying and turnover intention. Specifically, based on the assumption of Vulnerability-Stress Model we propose that bullying will predict turnover intention and that this relationship will increase or decrease in accordance with one's level of certain personality traits. We collected a convenience sample of 460 employees. Results of the moderation analysis suggests that bullied employees, as an attempt to coping are more inclined to turnover intentions, as preceded suggested by literature. Furthermore, out of all 5 factors, solely extraversion and agreeableness acts like a protective factor.

Keywords

Vulnerability Stress Model, bullying, turnover intentions, Extraversion, Agreeableness

There are numerous conceptualizations of bullying at work, but they all refer to the same phenomenon, namely: one or more employees in an organization experiencing direct or indirect systematic aggression, involving repeated incidents or a pattern of negative behaviors, over a longer period of time (at least one incident per week, over a period of six months) where the targeted victim cannot easily escape from the given situation (Leymann, 1996; Nielsen & Einarsen, 2018). The concept of bullying emerged quite recently, but is already a well-researched topic. The International Labour Office (ILO, 1996) has shown that violence at the workplace is extensive around the globe, with

France, Argentina, Romania, Canada and England reporting the highest rates of harassment in organizations. Prevalence rates have been estimated meta-analytically at about 15% of global employees (Nielsen et al., 2010).

The research interest in bullying is driven not only by its high prevalence, but also by its effects. The most direct effects of bullying are felt by the employees who are experiencing the aggression (e.g., effects on adequate communication, social interactions, personal reputation, professional situation, physical health; Leymann, 1996). The consequences of bullying are also in the organization itself: bullying fosters harmful phenomena in organizational contexts, such as increased absenteeism (Devonish, 2013), turnover (Coetzee & van Dyk, 2017), decreased productivity and organizational performance (Yildrim, 2009; Elçi, Erdilek, Alpkan & Şenerd, 2014).

Workplace Bullying and Turnover Intention

Workplace bullying is associated, especially at higher rates, with turnover intentions (Coetzee & van Dyk, 2018; Hoel & Copper, 2000). Turnover intention is distinct from, and precedes, actual turnover. Turnover intention refers to a subjective appraisal of the employee, regarding the likelihood of leaving the organization in the near future (Cho, 2009). Studying turnover intentions has a number of benefits; most importantly, at the moment when an employee is beginning to consider leaving the organization, there may still be time for corrective measures. We therefore focus in the present study on turnover intentions.

Turnover intention is influenced by a variety of factors (person-organization-fit/person-job-fit; Hassan, Akram, & Naz, 2012; lack of career opportunities; Chen, Chang, & Yeh, 2004; hard working conditions; Cottini, Kato, & Westergaard-Nielsen, 2011 etc.) but is mainly related to the interpersonal aspects of the job, for instance, the relationship between employees and their direct manager or coworkers. Acts of incivility, such as misunderstandings, teasing and conflicts can lead to bullying, increasing

the risk of turnover intention (Glambek, Matthiesen, Hetland, & Einarsen, 2014; Rahim, & Cosby, 2016). The underlying mechanism is based on resignation as an instance of positive coping: leaving the organization eliminates the negative factor in one's personal and professional life (Hogh et al., 2011; Zapf & Gross, 2001), and in fact the literature on bullying interventions at work shows that, as a last resort, resigning may be convenient for individuals (Zapf & Gross, 2011). Following the results of previous studies and based on the mechanism described above, we first hypothesize that:

Hypothesis 1: Bullying is a predictor for turnover intention.

The Role of Personality Traits

The innovative contribution we bring to the literature is the investigation of the moderating effects of broad personality traits, that may increase or decrease the effects of bullying on turnover intention. Individual differences are acknowledged in their capacity to explain workplace behaviors, such as performance, counterproductive behaviors and civic behaviors etc. Turnover specifically has been related to personality traits in the past, but the relationships found were not significant (Zimmerman, 2008). In their meta-analysis, Barrick and Mount (1991) found fairly weak evidence for personality factors as predictors for turnover intention, reporting effect sizes between .20 for emotional stability and .12 for conscientiousness. These small effects suggest that, if personality traits are related in any way to turnover, the relationship may be based on an intervening and not on a direct effect; in fact one of the mandatory conditions of a valid moderation consists of the dependent variable having only a weak or insignificant relationship with the moderator variable. We therefore consider that personality traits could act as moderators in the relationship between workplace bullying and turnover intention.

In order to expand and test this hypothesis we have used Five-Factor Model of personality, which is arguably the most robust model of personality – or at the very least the most used in contemporary personality research (Caspi, Roberts, & Shiner, 2007).

The five broad traits of neuroticism, extraversion, openness to experience, agreeableness and conscientiousness have to date not been considered as moderators in the relationship between workplace bullying and turnover intention in the past, but have been investigated predictors both of turnover intentions, and of bullying, e.g. by focusing on the portrait of those individuals who are likely to become perpetrators (Van Geel, Goemans, Toprak, & Vedder, 2017), or victims (Glaso, Matthiesen, Nielsen, & Einersen, 2007) of bullying.

One of the theoretical frames that offer credibility to our hypothesis that personality traits may act as moderators in this relationship is the Vulnerability-Stress Model (McKeever & Huff, 2003). The Vulnerability-Stress Model proposes that individual characteristics may act as vulnerability and risk factors, but also as protective factors, in one's response to harmful environmental events (stressors). In this regard, personality traits are seen as broad vulnerability or protective factors (Iliescu, Macsinga, Sulea, Fischmann, Elst & De Witte, 2017). In this context, we consider that each of the five personality traits could attenuate, or as an amplifier of the relationship between workplace bullying and turnover intention. We will outline in the next sections the most likely explanatory mechanisms for these effects.

Neuroticism as a moderator. Individuals with a higher level of neuroticism typically tend to have unfavorable opinions about themselves and, generally, about the world (Watson & Clark, 1984). Simultaneously, they are prone to feel negative emotions, such as dissatisfaction, anxiety, anger (Hogh, Mikkelsen, & Hansen, 2010). Establishing this tendency, from a mental health point of view, neuroticism is often seen as a factor that could determine one to behave in a more vulnerable manner (Iliescu et. al, 2017). At the same time, when confronted with workplace bullying, high neuroticism may determine the victim to take firm or extreme action in order to withdraw from the situation. Individuals high on neuroticism could therefore be more responsive and prone to self-defense, while

individuals low on neuroticism may be less likely to choose to extract themselves from the situation, by quitting their jobs. We therefore propose that:

Hypothesis 2a: Neuroticism will act as a protective factor for the individual, by strengthening the relationship between workplace bullying and turnover intention.

Extraversion as a moderator. People higher on extraversion are prone to have more contacts within and outside the organization, and more varied professional alternatives (Zimmerman, 2018). Research has shown that extraverts socialize more intensively inside the organization and adapt more easily to the organizational culture (McCrae, & Costa, 1997), being therefore perceived as less susceptible to turnover intentions (Maertz, & Campion, 2004; Zimmerman, 2008). Nonetheless, when confronted with bullying, their social skills may be less effective; given their demand for positive social interactions exiting the organization may allow extraverts more prospects to develop positive relationships. We therefore propose that:

Hypothesis 2b: Extraversion will act as a protective factor for the individual, by strengthening the relationship between workplace bullying and turnover intention.

Openness to experience as a moderator. Maertz and Griffeth (2004) advocate that people high on openness to experience may be more eager to experience new jobs and explore new perspectives, and therefore would be more prone to leave the current organization, irrespective of how they perceive their work (Zimmerman, 2008). Out of all the five personality traits discussed here, openness to experience is the one that is most frequently related turnover, even in favorable conditions. Individuals high on openess will likely only be more eager to leave when confronted with adverse conditions, while more conventional individuals (low on openness) may have difficulties leaving their familiar environment, even if this context is appalling. We therefore propose that:

Hypothesis 2c: Openness will act as a protective factor for the individual by strengthening the relationship between workplace bullying and turnover intention.

Agreeableness as a moderator. Individual wellbeing is affected by workplace conflicts (Dijkstra, Dierendonck, Evers, & De Dreu, 2005), which suggests that people who are high on agreeableness will more easily leave the organization when consistently exposed to interpersonal harassment. Previous studies (Priyadarshini, 2017) have shown that agreeableness has a significant and positive association with avoidant coping in conflict situation ($\beta = 0.17$, $p < .05$), and leaving the organization may be a probable route through which individuals high on agreeableness may avoid the conflict and the aggressor in order to protect themselves. Low agreeableness is characterized by toughness, persistence and aggressiveness and with a strong preference for using a confronting coping style; previous research has shown that participants low on agreeableness are more likely to rate power tactics as their preferred method of managing conflict (Grazziano, Jensen-Campbell, & Hair, 1996). In this case, individuals low on agreeableness may rather engage directly with the bully, leading to an escalation of the conflict but not to voluntary turnover. We therefore propose that:

Hypothesis 2d: Agreeableness will act as a protective factor for the individual by strengthening the relationship between workplace bullying and turnover intention.

Conscientiousness as a moderator. Employees who are high on conscientiousness are generally less likely to resign their job, and we consider this to be the case also in the specific context of bullying. Watson, Clark, and Harkness (1994) have highlighted the fact that people high on conscientiousness are less inclined to act impulsively or spontaneously and may therefore take a longer time before considering leaving the organization when confronted with workplace difficulties, such as bullying. An additional explanation for the persistence of individuals who are high on conscientiousness is their preference for their task-oriented coping styles; they may be more inclined to focus more on the job than on personal relationships when confronted with adversity. We therefore propose that:

Hypothesis 2e: Conscientiousness will attenuate the relationship between workplace bullying and turnover intention.

Method

Sample and Procedure

The data used in this study was collected using three online platforms. Adult age and a minimum of six month of job experience with the same organization were the only criteria of inclusion. We collected a convenience sample of 460 employees (67% female). The age of the participants varies from 18 to 57 years ($M = 32.1$, $SD = 10.3$), 57.4% have graduate studies, 18.3% have post-graduate studies and 24.3% have high school studies. A significant part (75.5%) work in private institutions and the rest in public institutions.

Measures

Workplace bullying. The NAQ-R scale (Einarsen, Ståle, Höel, Helge, & Notelaers, 2009) was used for measuring workplace bullying. This questionnaire contains 22 items related to different workplace behaviors and is divided into 3 dimensions: person-related bullying (e.g., "Having your opinions ignored"), workplace-related bullying (e.g., "Someone withholding information which affects your performance") and physically intimidating bullying (e.g., "Being shouted at or being the target of spontaneous anger"). The Cronbach Alpha coefficient for this scale is .90.

Turnover Intention. The Turnover Intention Scale (Bentein, Vandenberghe, Vandenberg & Stinglhamber, 2005) consists of 2 items, that measure the desire to leave the organization in prospect ("I often think about giving up the organization for which I currently work", "I intend to look for a job with another employer next year"). The items are rated on a five-point Likert scale (1 = strong disagreement, 5 = strong agreement). The Cronbach Alpha coefficient for this scale is .86.

Personality Traits. The Big Five Inventory-2 Short Form Scale (BFI-2; Soto & John, 2017) was used to measure the five personality traits. It contains 30 items rated on a five-point Likert scale (1 = strong disagreement, 5 = strong agreement). Each factor consists of 6 items: Extraversion ("Is dominant, acts as a leader", "Is full of energy); Agreeableness ("Is compassionate, has a soft

heart", "Assumes the best about people"), Conscientiousness ("Is reliable, can always be counted on", "Keeps things neat and tidy"), Negative Emotionality ("Worries a lot", "Tends to feel depressed, blue"), Open-Mindedness ("Is fascinated about art, music, or literature", "Is original, comes up with new ideas"). The Cronbach Alpha coefficients are .77, .75, .78, .84 and .77 for Extraversion, Agreeableness, Conscientiousness, Negative Emotionality, and Open-Mindedness respectively.

Analytic Approach

A moderation analysis using the PROCESS macro in SPSS (Hayes, 2012), Model 1, with 5000 bootstrapped samples following the recommendations of Preacher and Hayes (2008) was performed to test the moderation effect. We chose to test the moderation hypotheses based on the significance of the interaction term and in case of significant moderators, we further analyzed the effect modification test of the difference between the simple slopes.

Results

Table 1 presents the descriptive statistics and the correlations between the study's variables.

Table 1. *Descriptive statistics and correlations for the variables in study*

Variables	M	SD	1	2	3	4	5	6
Workplace bullying	36.02	13.51	-	-	-	-	-	
Turnover Intention	5.49	2.77	.44**	-	-	-	-	
Extraversion	19.94	5.56	-.04	-.09*	-	-	-	
Agreeableness	18.92	3.28	-.09*	-.10*	.22**	-	-	
Conscientiousness	19.51	3.40	-.14**	-.06	.17**	.25*	-	
Negative Emotionality	13.17	3.79	.16**	.16**	-.20**	-.23**	-42*	
Open Mindedness	18.55	3.31	-.01	.05	.09*	.06	.11**	-

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

To test the assumption that bullying predicts turnover intention (H1), the collected data was analyzed using a hierarchical linear regression. Multicollinearity tests have shown that the level of multicollinearity between variables was low (Tolerance = 1.00; VIF = 1.00). The data met the assumption of independent errors (Durbin-Warson Value= 1.89). It also met the assumption of non-zero variance (Bullying Scores, Variance= 182.76; Turnover Intention Scores, Variance= 7.70). Results indicated that bulling predicts turnover intention ($\Delta R^2 = .20$, $F(1,473) = 117.12$, $p < .00$).

Before computed the moderation analysis for testing H2-H6, following the recommendations of Aiken & West, 1991, variables were mean-centered before being entered in the analysis. To rule out alternative explanations (Carlson & Wu, 2012), gender (0 = male, 1 = female) and age (in years) were included as control variables. In this particular case, gender is positively associated with negative emotionality (r = .18, $p < .01$; females have a higher tendency experiencing negative emotionality) and age relates positively with conscientiousness (r = .15, $p < .01$; older people tend to have higher conscientiousness scores), negatively with negative emotionality (r = -.10, $p < .01$; younger people have a higher tendency experiencing negative emotionality) and negatively with open mindedness (r = -.14, $p < .01$; younger people have higher scores at open mindedness). To demonstrate the unique relationship between model's variables, it is important to parse out the variance between these controls and our predictor variable.

As can be seen in Table 2, we found an effect of bullying and extraversion in

predicting turnover intention, $\beta = .007$, $\Delta R^2 = .05$, $p < .001$. The predictive value for the whole model regarding the explained variance of turnover intention is 26 %, while the increment of the interaction is 5%. To illustrate the bullying X extraversion interaction for turnover interaction, we computed the effect modification test (Hayes, 2012, 2017) in order to investigate slope differences at different levels of the moderator (low, average and high), as presented in Table 3. The relationship between bullying and turnover intention is amplified as the level of extraversion is higher [$b = .14$, $t(470) = 11.87$, $p < 0.001$]. Similarly, at low levels of extraversion, the relationship between bullying and turnover intention was also relevant [$b = .06$, $t(470) = 6.15$, $p < 0.001$].

Table 2. *Summary of the regression results for the moderating effect of bullying and Big Five personality factors on turnover intention*

	Moderator (M)				
	E	A	C	N	O
Age	-.03	-.03*	-.03*	-.03	-.03*
Gender	-.13	-.07	-.11	-.21	-.10
IV	.10***	.10***	.09***	.09***	.09***
M	-.04	-.05	.01	.07	.03
IV x M	.007***	.011***	-.001	.000	-.002
R^2	.26***	.25***	.20***	.21***	.20***
ΔR^2	.05***	.03***	.00	.002	.001

Note. Table contains unstandardized betas. IV = Bullying, DV = Turnover intention, E= Extraversion, A= Agreeableness, C= Conscientiousness, N= Negative Emotionality, O= Open Mindedness. 95CI = 95% Confidence Interval at Step 3, * $p < .05$, ** $p < .01$, *** $p < .001$.

Gender was coded: 0 = male; 1 = female.

Table 3. *Conditional effect of bullying on turnover intention at values of the significative moderators (Extraversion, Agreeableness)*

Moderator	E				A			
	Values	Effect	SE	T	Values	Effect	SE	t
Low	-5.56	.06***	.01	6.15	-3.62	.06***	.01	5.13
Average	.00	.10***	.00	11.89	.00	.10**	.00	11.38
High	5.56	.14***	.02	11.87	3.62	.13***	.02	10.98

Note. E= Extraversion, A= Agreeableness. Values for moderators are the mean and plus/minus one SD from mean, * $p < .05$, ** $p < .01$, *** $p < .001$.

For agreeableness, was found a similar pattern. The moderating effect of agreeableness on the relationship between bullying and turnover intention is $\beta = .010$, $\Delta R^2 = .03$, $p < .001$. Agreeableness as moderator brought up to 3 % in explaining the variability of turnover intention. As Table 3 shows, the relationship between bullying and turnover intentions is stronger as levels of agreeableness is higher [$b = .13$, $t(470) = 10.98$, $p < 0.001$].

Results revealed that the interaction among bullying, and negative emotionality did not account for a significant proportion of the variance in turnover intention, $\beta = .000$, $\Delta R^2 = .002$, $p > .05$. In the case of conscientiousness, the interaction term with bullying also did not account for a significant portion of the

variance for turnover intention: β = -.001, ΔR^2 = .00, p >.05. Finally, the interaction among bullying, and open mindedness also did not account for a significant proportion of the variance in intention to appeal, β = -.002, ΔR^2 = .001, p >.05.

Discussion

The objective of this study was to establish the way personality traits influence one's desire to depart from the organization, due to bullying. This perspective has not yet been studied in the literature, previous studies referring to personality only as an antecedent of bullying, and as an antecedent of turnover intention. Based on the assumption of Vulnerability-Stress Model, personality traits could act as a protector or could enhance one's vulnerability due to stress (i.e., bullying in this context). In this paper, the role of vulnerability vs. protective has been related to the turnover intention criteria. To be precise, vulnerability refers to the employee's incapacity to remain stuck in the current position (i.e., being bullied), whereas protective outlines one's determination to bring about change. We learn from previous studies that, due to perpetual bullying, by that time, the affected employee is trying to unsuccessfully cope with the situation. Moreover, specialists conclude that leaving the organization may be the foremost alternative.

The results were partly confirmed. As expected, the first hypothesis was confirmed. Specifically, bullied employees, as an attempt to coping are more inclined to turnover intentions, as preceded suggested by literature. Moreover, when we examine the extent to which this relationship is influenced by personality factors, present results show that exclusively two traits have a small contribution, namely extraversion and agreeableness. Notably about these results is that, although the mentioned factors evidently capture other aspects of human behavior, out of all 5 factors, solely extraversion and agreeableness consist, at their core, of aspects as social interactions/interpersonal relationships. Furthermore, both traits could be located within the interpersonal circumplex (Trapnell &Wiggins, 1990), which is defined

by two orthogonal axes labeled as dominance-agency and nurturance-communion. Whereas extraversion reflects a mixture of dominance and nurturance, agreeableness dwells primarily on nurturance (Tov, Nai, & Lee, 2014). In addition, it is comprehensible that both extroverted and highly agreeable individuals need positive relationships, however this specific aspect is threatened by bullying situations. As follows, they might come to think about changing the social context, by resigning from the workplace.

Extraversion is neither in this study (r = -.04) nor in previous studies related to the proclivity of bullying, on the contrary, not only by having better social skills (Festa, McNamara Barry, Sherman, & Grover, 2012), but also by possessing the tendency to generally experience pleasant affects (Wilt & Revelle, 2009), extraverts aim to evoke more positive reactions from others than introverts (Eaton & Funder, 2003). Nonetheless, according to the present results, extraverts who are experiencing acts of bullying are put in contexts that does not allow them to benefit from interpersonal exchanges, so they tend to resign, or at least to have turnover intentions. Moreover, extraverts are described as interested in having high social impact (Tobin, Graziano, Vannman, & Tassinary, 2000) and being victims in bulling situations, social impact is certainly inefficient or negative. In short, from this perspective, extroverts do not have the opportunity nor the audience to express themselves, meaning they cannot dominate the interactions. Hereby, extraversion acts like a protective factor.

Similar to extravert individuals, high agreeableness is negatively related to bullying (r= -.09*), meaning that they usually are not target of the bullying behavior, *au contraire*. This may be explained by their nature: people who score high on the agreeableness scale have been described as likable, pleasant, and responsive to the needs of others (Graziano & Tobin, 2009) and primarily concerned with maintaining positive relationships with the rest. Present results indicate that it is very unlikely for agreeable people to respond to social conflict in any other way than withdrawing from the respective circumstance. Thus, their agreeableness acts

rather as a protective factor by not exposing themselves as the target of aggression anymore, by leaving or thinking about leaving the organization. In the current study, the other personality factors did not reveal that they would make any contribution in explaining turnover intention in bullying situations.

Theoretical and Practical Implications

In a recent exhaustive review of workplace bullying, Nielsen & Einarsen (2018) conclude that scientific studies in the field of workplace bullying have resulted in addressing an important social problem, rather than as the result of purely academic and theoretical interest, theories guiding workplace bullying research are therefore relatively few and far between. In order to move the field forward, it is necessary to further integrate established theories for adjacent research. Thus, main theoretical contribution of our research concerns the usability of a theoretical framework, Vulnerability-Stress Model, in the literature dedicated to bullying. The model provides an explanatory framework for which certain personality traits could not only contribute to the relationship between bullying and turnover, but also can provide a practical benchmark. Among the most important practical contribution of this study is the watch out signal that can be drawn related to a possible risk category of personnel. If someone refers to the previous results in the literature, we know that both agreeableness and extraversion are negatively correlated with bullying - meaning that they are not predisposed to be victims in such a context, which can be reassuring for organizational management. Also, if we look at the previous results between personality and turnover intention, ones with high agreeableness scores are rather loyal to the organization, and extraverts are rather attached to their interpersonal relationships, a conclusion which again, could lead to the thought that, from a managerial perspective, there should be no concerns from the standpoint of turnover. This study adds to the literature targeting on the context in which of the two categories could be considered a risk of leaving, i.e., when they are bullied.

Limits and Future Direction

Although our results might be explained by using theoretical arguments (e.g., the lack of social impact in the context of bullying of extraverts and respectively the inability to nourish the need for positive relationships as part of bullying of the agreeable employees), it would still be an advance to empirically test the present model, by placing out theoretical arguments as mediators.

All studies that are considering intentions, rather than behaviors, are considered limited from this point of view. Although it is important to study the intention, as we have argued, primarily because, at that moment, organizational management still has time to interfere, meta-analyses have reported correlations between turnover intentions and actual turnover, in the range of 0.35–0.38 (Griffeth, Hom, & Gaertner, 2000; Jiang, Liu, McKay, Lee, & Mitchell, 2012), meaning that it is possible that the effects of personality, as it happens real turnover, may be larger, smaller, or have other significance, accordingly further studies should also take into account the turnover behavior. However, we are compelled to mention that even in the event of personality factors acting differently in the context of turnover behavior versus turnover intention, present contribution would not be invalidated. Just thinking about leaving the workplace is itself an anxiogenic experience, which should be addressed by the upper management.

References

Andersson, L. M., & Pearson, C. M. (1999). Tit for Tat? The Spiraling Effect of Incivility in the Workplace. *Academy of Management Review*, *24,* 452–471. DOI:10.5465/amr.1999.2202131

Barrick, M. R., & Mount, M. K. (1991). The Big Five Personality dimensions and job performance: A meta-analysis. *Personnel Psychology, 44,* 1–26. DOI:10.1111/j.1744-6570.1991.tb00688.x

Bentein, K., Vandenberghe, C., Vandenberg, R., & Stinglhamber, F. (2005). The Role of Change in the Relationship Between Commitment and Turnover: A Latent Growth Modeling Approach. *Journal of Applied Psychology, 90,* 468–482. DOI:10.1037/0021-9010.90.3.468

Chen, T., Chang, P., & Yeh, C. (2004). A study of career needs, career development programs, job satisfaction and the turnover intentions of R&D personnel.

Career Development International, 9, 424–437. DOI:10.1108/13620430410544364

Cho, S., Johanson, M. M., & Guchait, P. (2009). Employees intent to leave: A comparison of determinants of intent to leave versus intent to stay. *International Journal of Hospitality Management, 28,* 374–381. DOI:10.1016/j.ijhm.2008.10.007

Coetzee, M., & van Dyk, J. (2017). Workplace Bullying and Turnover Intention: Exploring Work Engagement as a Potential Mediator. *Psychological Reports, 121,* 375–392. DOI:10.1177/003329411 7725073

Cottini, E., Kato, T., & Westergaard-Nielsen, N. (2011). Adverse workplace conditions, high-involvement work practices and labor turnover: Evidence from Danish linked employer–employee data. *Labour Economics, 18,* 872–880. DOI:10.1016/j.labeco. 2011.07.003

Devonish, D. (2013). Job demands, health, and absenteeism: does bullying make things worse? *Employee Relations, 36,* 165–181. DOI:10.1108/er-01-2013-0011

Dijkstra, M. T. M., van Dierendonck, D., Evers, A., & De Dreu, C. K. W. (2005). Conflict and well-being at work: the moderating role of personality. *Journal of Managerial Psychology, 20,* 87–104. DOI:10.1108/02683940510579740

Eaton, L. G., & Funder, D. C. (2003). The creation and consequences of the social world: an interactional analysis of extraversion. *European Journal of Personality, 17,* 375–395. DOI:10.1002/per.477

Einarsen, S., Hoel, H., & Notelaers, G. (2009). Measuring exposure to bullying and harassment at work: Validity, factor structure and psychometric properties of the Negative Acts Questionnaire-Revised. *Work & Stress, 23,* 24–44. DOI:10.1080/0267837090 2815673

Elçi, M., Erdilek, M. K., Alpkan, L., & Şener, İ. (2014). The Mediating Role of Mobbing on the Relationship between Organizational Silence and Turnover Intention. *Procedia - Social and Behavioral Sciences, 150,* 455–464. DOI:10.1016/j.sbspro.2014.09.053

Festa, C. C., Barry, C. M., Sherman, M. F., & Grover, R. L. (2012). Quality of College Students' Same-Sex Friendships as a Function of Personality and Interpersonal Competence. *Psychological Reports, 110,* 283–296. DOI: 10.2466/04.09.10.21.pr0. 110.1.283-296

Glambek, M., Matthiesen, S. B., Hetland, J., & Einarsen, S. (2014). Workplace bullying as an antecedent to job insecurity and intention to leave: a 6-month prospective study. *Human Resource Management Journal, 24,* 255–268. DOI:10.1111/1748-8583.12035

Glasø, L., Matthiesen, S. B., Nielsen, M. B., & Einarsen, S. (2007). Do targets of workplace bullying portray a general victim personality profile? *Scandinavian Journal of Psychology, 48,* 313–319. DOI:10.1111/j.1467-9450.2007.00554.x

Graziano, W. G., & Tobin, R. M. (2009). Agreeableness. In M. R. Leary & R. H. Hoyle (Eds.), *Handbook of Individual Differences in Social Behavior*, 46-61. New York, NY, US: The Guilford Press.

Griffeth, R. W., Hom, P. W., & Gaertner, S. (2000). A Meta-Analysis of Antecedents and Correlates of Employee Turnover: Update, Moderator Tests, and Research Implications for the Next Millennium. *Journal of Management, 26,* 463-488. DOI:10.1177/014920630002600305

Hassan, M., Akram, A., & Naz, S. (2012). The Relationship between Person Organization Fit, Person-Job-Fit and Turnover Intention in Banking Sector of Pakistan: The Mediating Role of Psychological Climate. *International Journal of Human Resource Studies, 2,* 172. DOI:10.5296/ijhrs.v2i3.2286

Hayes, A. F. (2012). PROCESS: A versatile computational tool for observed variable mediation, moderation, and conditional process modeling [White paper]. Retrieved from *http://www.afhayes.com/ public/process2012.pdf*

Hoel, H., & Cooper, C. L. (2000). Destructive Conflict & Bullying at Work. Manchester: Manchester School of Management, University of Manchester, Institute of Science and Technology.

Høgh, A., Mikkelsen, E. G., & Hansen, A˚. M. (2011). Individual consequences of workplace bullying/mobbing. In S. Einarsen, H. Hoel, D. Zapf, & C. L. Cooper (Eds.)*, Bullying and Harassment in the Workplace. Developments in Theory, Research, and Practice (2nd ed., pp. 107128).* Boca Raton, FL: CRC Press.

Iliescu, D., Macsinga, I., Sulea, C., Fischmann, G., Vander Elst, T., & De Witte, H. (2017). The five-factor traits as moderators between job insecurity and health. *Career Development International, 22,* 399–418. DOI:10.1108/cdi-08-2016-0146

Jiang, K., Liu, D., McKay, P. F., Lee, T. W., & Mitchell, T. R. (2012). When and how is job embeddedness predictive of turnover? A meta-analytic investigation. *Journal of Applied Psychology, 97,* 1077–1096. DOI:10.1037/a0028610

Keashly, L. & Jagatic, K. (2000). By any other name: American perspectives on workplace bullying. In S. Einarsen, H. Hoel, D. Zapf & C. Cooper (Eds), *Bullying and Emotional Abuse in the Workplace: International Perspectives in Research and Practice.* London: Taylor & Francis, 2003.

Kline, R. B. (2010). Principles and practice of structural equation modeling (3rd ed.). New York, NY: Guilford.

Leymann, H. (1996) The content and development of mobbing at work. *European Journal of Work and Organizational Psychology*, *5,* 165–184. DOI:10.1080/13594329608414853

Maertz, C., & Campion, M. A. (2004). Profiles in Quitting: Integrating Process and Content Turnover Theory. *Academy of Management Journal, 47,* 566 - 582. DOI:10.5465/20159602

McCrae, R. R., & Costa, P. T. (1997). Personality trait structure as a human universal. *American Psychologist, 52,* 509–516. DOI:10.1037/0003-066x.52.5.509

McKeever, V. M., & Huff, M. E. (2003). A diathesis-stress model of posttraumatic stress disorder: Ecological, biological, and residual stress pathways. *Review of General Psychology, 7,* 237–250. DOI:10.1037/1089-2680.7.3.237

Namie, G. (2003). Workplace bullying: Escalated incivility. *Ivey Business Journal Online*. https://iveybusinessjournal.com/

Nielsen, M. B., & Einarsen, S. V. (2018). What we know, what we do not know, and what we should and could have known about workplace bullying: An overview of the literature and agenda for future research. *Aggression and Violent Behavior, 42,* 71-83. DOI:10.1016/j.avb.2018.06.007

Nielsen, M. B., Matthiesen, S. B., & Einarsen, S. (2010). The impact of methodological moderators on prevalence rates of workplace bullying. A meta-analysis. *Journal of Occupational and Organizational Psychology*, 955–979. DOI:10.1348/096317909x481256

Preacher, K. J., & Hayes, A. F. (2008). Asymptotic and resampling strategies for assessing and comparing indirect effects in multiple mediator models. *Behavior Research Methods, 40*, 879–891. DOI:10.3758/brm.40.3.879

Quine, L. (2001). Workplace Bullying in Nurses. *Journal of Health Psychology, 6,* 73–84. DOI:10.1177/135910530100600106

Rahim, A., & Cosby, D. M. (2016). A model of workplace incivility, job burnout, turnover intentions, and job performance. *Journal of Management Development, 35,* 1255–1265. DOI:10.1108/jmd-09-2015-0138

Roberts, B. W., Kuncel, N. R., Shiner, R., Caspi, A., & Goldberg, L. R. (2007). The Power of Personality: The Comparative Validity of Personality Traits, Socioeconomic Status, and Cognitive Ability for Predicting Important Life Outcomes. *Perspectives on Psychological Science, 2,* 313–345. DOI:10.1111/j.1745-6916.2007.00047.x

Rosseel, Y. (2012). lavaan: An R package for structural equation modeling. *Journal of Statistical Software*, *48,* 1-36.

Soto, C. J., & John, O. P. (2017). The next Big Five Inventory (BFI-2): Developing and assessing a hierarchical model with 15 facets to enhance bandwidth, fidelity, and predictive power. *Journal of Personality and Social Psychology, 113,* 117–143. DOI:10.1037/pspp0000096

Tobin, R. M., Graziano, W. G., Vanman, E. J., & Tassinary, L. G. (2000). Personality, emotional experience, and efforts to control emotions. *Journal of Personality and Social Psychology*, *79,* 656 – 669. DOI:10.1207/s15327752jpa8403.

Tov, W., Lee, H.W., & Nai, Z. L. S. (2014). Relationship satisfaction of extroverts and agreeable people: How do they get there? *Research Collection School of Social Sciences*. Paper 1667. https://ink.library.smu.edu.sg/soss_research/1667

Trapnell, P. D., & Wiggins, J. S. (1990). Extension of the Interpersonal Adjective Scales to include the Big Five dimensions of personality. *Journal of Personality and Social Psychology, 59,* 781–790. DOI:10.1037/0022-3514.59.4.781

Van Geel, M., Goemans, A., Toprak, F., & Vedder, P. (2017). Which personality traits are related to traditional bullying and cyberbullying? A study with the Big Five, Dark Triad and sadism. *Personality and Individual Differences*, *106,* 231–235. DOI:10.1016/j.paid.2016.10.063

Watson, D., & Clark, L. A. (1984). Negative affectivity: The disposition to experience aversive emotional states. *Psychological Bulletin, 96,* 465–490. DOI:10.1037/0033-2909.96.3.465

Watson, D., Clark. L.A., Harkness, A.R. (1994). Structures of personality and their relevance to psychopathology. *Journal of Abnormal Psychology*, *103,* 18–31

Wilt, J., Revelle, W. (2009). Extraversion. In: Leary, M., Hoyle, R., editors. *Handbook of Individual Differences in Social Behaviour*. London, UK: The Guilford Press, 27–45

Yildirim, D. (2009). Bullying among nurses and its effects. *International Nursing Review, 56,* 504–511. DOI:10.1111/j.1466-7657.2009.00745.x

Zapf, D., & Gross, C. (2001). Conflict escalation and coping with workplace bullying: A replication and extension. *European Journal of Work and Organizational Psychology, 10,* 497–522. DOI:10.1080/13594320143000834

Zimmerman, R. D. (2008). Understanding the impact of personality traits on individuals' turnover decisions: A meta-analytic path model. *Personnel Psychology, 61,* 309–348. DOI:10.1111/j.1744-6570.2008.00115.x

Priyadarshini, S. (2017). Effect of Personality on Conflict Resolution Styles. IRA-*International Journal of Management & Social Sciences, 7*, 196-207. DOI:http://dx.doi.org/10.21013/jmss.v7.n2.p9

RESEARCH ARTICLE

Equal, but so much different: Examining socio-demographic differences of the employees in relation to organizational commitment, burnout and intention to leave

LAVINIA ȚÂNCULESCU-POPA
Hyperion University, Faculty of Psychology and Educational Sciences Department of Psychology
The National University of Political Studies and Public Administration, Communication and Public Relations Department

Abstract

The current study was conducted among employees in various industries and sectors (N = 412) in Romania and examined how four socio-demographic groups differ with regards to three main organizational outcomes: organizational commitment, burnout and intention to leave. Multivariate analysis of variance showed that statistically significant differences exist between socio-demographic groups based on hierarchical level, sector of the employer, generation and perceived income level. Additionally, significant differences were shown at the dependent variables levels for certain socio-demographic groups. One of the most expected set of results relate to the differences between generations in terms of all variables included in the study. Like the other findings, but most of it, in a complete form, this highlight could help organizations in their endevour to bridge the generational gap and propose a tailored organizational employee value proposition to their prospective targets.

Keywords

Introduction

As much as we like to be otherwise, people are contributing differently and, therefore, treated and rewarded differently, in spite of all the political correctness rules so much enforced these days in the organizational world. Authors have talked widely about this different contribution and reward ever since the Social Exchange Frame of theories was thoroughly critically analyzed by Richard M. Emerson in his 1976 seminal review. Emerson points out an important addition that George Homans, one of the main contributors to the creation of this frame of theories, completed his set of three basic propositions to explain human behavior with two more. Those two propositions explain the concept of *value* as "the degree of reward" and are defined as *The Value Proposition* and *The Rationality Proposition* (Homans, 1974). Homan's Value Proposition states that "The more valuable to a person is the result of his action, the more likely he is to perform the action." (p. 25).

We can link this statement with the difference in the current level of total rewards packages (especially the performance base pay part) an employee in a management position receives in comparison with an employee from the same field, who does not

---

Correspondence addressed to: Lavinia Țânculescu, lavinia.tanculescu@thewings.ro

hold a management position, as well as the total rewards packages a civil servant receives in comparison with a peer from a private sector organization.

The current study seeks to investigate differences in a matrix comprised of four socio-demographic groups of employees and three organizational outcomes, namely burnout, organizational commitment and intention to leave. Burnout was considered both at the global factor and its facets' level. The organizational commitment is most meaningfully assessed using three separate facets, not as a single global factor, since the three facets of the construct are conceptually different (Allen & Meyer, 1996), including the subscales of the continuance commitment facet, namely the one indicating the high sacrifices required when leaving the organization and the availability of limited alternatives (Meyer, Allen & Smith, 1993). Intention to leave is measured and reported as a three items, single factor.

The four investigated socio-demographic categories are: hierarchical level of the employee (manager or non-manager), sector of the employer (private or public sector), age generation of the employee (Baby-Boomers, X-Generation or Y-Generation/Millennials) and the level of reported income. For the purpose of the current study, we take into consideration the financial expected results of an employee's actions, acknowledging that there are also other kinds of achievement motivators (Schuler, Thornton, Frintrup, Mueller-Hanson, 2004) and antecedents of the commitment at work (Jeong & Oh, 2017; Suman & Srivastava, 2012; Cohen, 1992). Practical potential implications outlined in this study are intended to have both an individual impact, on the employees themselves and also helps the organizations through their human capital professionals to better tailor their Employee Value Proposition and, in this way, to secure talent and save costs.

Differences between employees and their impact on the organizational outcomes

There is a full body of literature talking about the difference between employees and ways in which those contributes to the performance of the organization and the shareholders' value creation and the actual gap between various employees in public and private sector, in management and non-management position, in any of the generation studied or amount of pay perceived.

To give just an example of such differences between employees working in public vs. employees working in private sector, in OECD countries, performance pay (namely performance bonus depending on the degree to which performance goals are achieved) is only a small part (up to 10%) of the civil servant's total pay (OECD, 1997).

Czech Republic case seem to be unique, since performance bonuses can be up to 100% of the salary for jobs in grades 9-12 and 40% for job grades 1-8. Average performance bonuses are about 25% of take-home pay and vary by each public institution (OECD, 2005).

However, when asked whether they knew of any employee in their organizations who had been rewarded for good performance in the preceding year, public officials taking part in a World Bank survey run in sixteen countries reported not knowing any rewards for good performance (Mukherjee & Gokcekus, 2001).

Comparing to the public sector, the private sector performance-related pay is ranging from the lowest 18% of salary in leisure and hospitality sector to 57% in information systems and to an even higher level of 67% of salary in financial activities sector (Gittleman & Pierce, 2013). One of the most significant finding is that the sector (private- versus public-sector organizations) has a moderating effect upon the pay satisfaction and the organizational commitment relationship (Cohen & Gattiker, 1994).

In a meta-analysis studying the link between organizational commitment and turnover, when age served as the career stage indicator, results showed that younger employees who report high levels of commitment may have a sharp decline shortly after a survey, causing a low organizational commitment-turnover relationship, while in the older employees case, even if reporting low levels of organizational commitment but may not leave their organization because, says the author: "of structural bonds, few

employment alternatives, and a desire for stability" (Cohen, 1993).

Another study show that there is a difference in the levels of organizational commitment between Gen X and Gen Y, namely that Gen X have higher normative commitment and affective commitment comparing with Y Gen-ers, that have higher levels of continuance commitment comparing with X-Gen-ers. (Patalano, 2008)

Also, rewards (actual and perceived) may be considered as important determinants of organizational commitment (Oliver, 1990; Cohen & Gattiker, 1994), while other studies show a weak relationship between pay and the level of income and organizational commitment and suggested that income and pay satisfaction may operate differently across various structural settings (Cohen & Lowenberg, 1990; Mathieu & Zajac, 1990).

In a meta-analysis studying the antecedents, the correlations and, most importantly, the consequences of the three types of engagement in organizations, it was argued that affective organizational commitment has the strongest and most desirable correlations with outcomes at the individual level (e.g., stress or personal-work life conflict) and at the organizational level (e.g., performance, participation, organizational citizenship behaviour), followed by normative commitment. The continuance commitment did not correlate or negatively correlate with the results at the individual or organizational level. Therefore, employees with a high degree of emotional commitment want to get involved in the work activity due to the fact that they are attached, feel identified or share values with the organization (Meyer, Stanley, Herscovitch & Topolnytsky, 2002). It was, therefore, highlighted the importance the managers have in creating organizational commitment more than the non-managers (Clugston, Howell & Dorfman, 2000), mainly due to higher status and autonomy that managers perceive as well as the income – organizational commitment relationship that was argued to be stronger for managers than for non-managers (Cohen & Gattiker, 1994). Still, a study conducted by Yousef (2016) showed that employees were highly satisfied with supervision and co-

workers and had low satisfaction with pay and promotion facets of the job.

Therefore, we may conclude that pay could constitute an incentive only in some situations and just for some categories of the employees (Cohen & Gattiker, 1994). Other elements are valued more in the organization and contribute to them deciding to stay and deliver performant results for the organization. For instance, subjective value congruence correlates with employees' attitudes such as identification with the organization, job satisfaction, and the intention to stay in the organization. (Edwards & Cable, 2009).

On the other hand, studies had shown various negative health (e.g. depression) and organizational (e.g. absenteeism, intention to leave, performance, and quality of services) outcomes (for a review see Schaufeli and Enzmann, 1998). Montgomery, Peeters, Schaufeli & Den Ouden (2003) discuss the importance of social support and the relation between burnout and work-home interference. They oncluded that social support from one's supervisor can have a positive effect on a manager's level of cynicism (decreasing) via positive interference. Also, comparing1056 private sector and 557 public sector employees, Bogg and Cooper (1995) found that civil servants had the worse mental and physical health.

Even if the current literature speaks vastly about individual differences and how those can contribute to the organizational performance, there is no study that brings together three of the most important organizational outcomes and studies them in relation with the four socio-demographic characteristics we propose in the current study.

Study objectives and research questions

Objectives

The study aims to determine whether burnout and its facets, organizational commitment facets and intention to leave, considered as dependent variables differ in case of four socio-demographic groups: hierarchical level, form of property of the organization the person works in, generation and perceived level of income, as independent variables.

<table>
<tr><td>

Research questions

Even if for certain relationships between the socio-demographic characteristics and the three main criterion variables there already exists literature (for instance for the relationship between two out of three generations considered in this study and the facets of organizational commitment or the hierarchical level and the level of burnout and its facets), this is not the case for all the possible combinations resulted from the presented 4 socio-demographic characteristics per 3 organizational outcomes matrix. Therefore, stating the hypotheses as directional would be inadequate, since not all the hypotheses can be grounded in previous work done. Consequently, we formulated the following research questions:

Research question 1: Is there a variance in the studied organizational outcomes (namely the facets of the organizational commitment, burnout and its facets and intention to leave) due a combined effect of the four independent variables?

Research question 2: Is there a variance in the studied organizational outcomes (namely the facets of the organizational commitment, burnout and its facets and intention to leave) due to hierarchical level?

Research question 3: Is there a variance in the studied organizational outcomes (namely the facets of the organizational commitment, burnout and its facets and intention to leave) due to form of property of the institution in which the employee works (sector of the employer)?

Research question 4: Is there a variance in the studied organizational outcomes (namely the facets of the organizational commitment, burnout and its facets and intention to leave) due the age (generation) of the employees?

Research question 5: Is there a variance in the studied organizational outcomes (namely the facets of the organizational commitment, burnout and its facets and intention to leave) due the level of income reported by the employees?

</td><td>

Methodology

Participants

The study sample was formed of 412 Romanian employees (M_{age} = 39.14, SD = 10.32), 54,6% women. From them, 141 respondents (34,2%) are managers. 153 respondents (37,1%) work in public institutions. From the age (generation) point of view, we classified the respondents in three categories: Baby – Boomers: people born between 1944 and 1964, from which, our sample gathered 60 respondents (14,6%), Generation-X: people born between 1965 and 1979, from which, our sample gathered 187 respondents (45,4%) and Generation-Y/Millennials, people born between 1980 and 1994, from which, our sample gathered 165 respondents (40,0%). The self-reported level of income was classified in three groups: Low income level: 125 employees (30,3%) reported that they don't consider they earn enough and they face financial difficulties; Medium income level: 230 employees (55,8%) that consider that they earn enough to manage daily life without difficulties and a third category, High income level: 57 respondents (15,8%) that consider that they earn more than enough and are able to make savings. The respondents have completed an online survey, using a virtual testing platform. The recruitment of the participants and their inclusion were made on a voluntary, snowball basis, with confidentiality assurance. The data were collected between April and June 2019.

Measures

Organizational commitment (OC) was measured by the homonym Questionnaire (Meyer & Allen, 1997). Internal reliability coefficients ranged from α =.89 for the sub-scale of Affective Commitment (AC) (6 items), to α = .88 for Normative Commitment (NC) (6 items) and α = .81 for Continuance Commitment (CC) (8 items). The CC has two subscales: CC-HHS (High Sacrifices Scale – 4 items) with α = .71 and CC-LAS (Lack of Alternatives Scale – 4 items) with α = .72. A 7-point scale was used with 1=Strongly Disagree and 7=Strongly Agree.

Burnout was measured by Maslach Burnout Inventory (MBI, Schaufeli, Leiter,

</td></tr>
</table>

Maslach & Jackson, 1996). Alpha Cronbach calculated on our sample (N=412) ranged from α = .89 for the sub-scale of Exhaustion (5 items), to α = .84 for the sub-scale of Cynicism (for 4 out of the 5 items; item 4: "I just want to do my job and not be bothered." was removed from the analysis, due to decreasing the reliability of the sub-scale) and α = .81 for the 6-items subscale of Professional Inefficacy. Answers ranged from (1) "never" to (7) "every day".

The intention to leave (ITL), was assessed by using the three-item scale of Mobley, Horner & Hollingsworth (1978). ITL items were ranked on a 5-point Likert scale ranging from (1) Strongly disagree to (5) strongly agree, for which the Alpha Cronbach coefficient calculated on our sample (N=412) was α = .86.

Data analysis

The design of this study was cross-sectional. The statistical analysis was carried out in SPSS. Multivariate analysis of variance (MANOVA) was used to determine the significance of differences between the organizational outcomes (organizational commitment, burnout and intention to leave) of different socio-demographic groups. MANOVA is the equivalent statistical method of analysis of variance (ANOVA) methods, used to cover cases where there is more than one dependent variable and where the dependent variables cannot simply be combined. Also, this method is used to identify whether changes in the independent variables, in our case, the socio-demographic

characteristics, have a significant effect on the dependent variables, in our case, organizational commitment, burnout and intention to leave. The assumptions for the multivariate analysis of variance were met. We observed both Pillai–Bartlett trace, the sum of the proportion of explained variance on the discriminant functions, similar to R^2 (Field, 2018, p.842) and Wilk's Lambda. We choose to report the later, being the product of the unexplained variance on each of the variates (Field, 2018, p.843), to test the likelihood of the data under the assumption of equal population mean vectors for all groups. We used one-way analysis of variance when an effect was significant in MANOVA, to discover which dependent variables had been affected. ANOVA reflects the expression of the hypothesis tests of interests in terms of variance estimates (Muller & Fetterman, 2002). A Bonferroni-type adjustment was made to address the Type 1 error, uneven groups (Popa, 2010, p.218).

Results

Correlation Analysis

The best use of MANOVA is also seen when, apart from meeting the assumptions for the multivariate analysis of variance there is, also, a substantial correlation between the dependent variables (Kerlinger & Lee, 2000). The results presented in Table 1 show that apart from the Organizational Continuance Commitment, especially the Lack of Alternatives facet, the dependent variables correlate between themselves.

Table 1. *Means, Standard Deviations and Intercorrelations of the study variables*

	Variables	M	SD	1	2	3	4	5	6	7	8	9	10
1	AC	5.17	1.39	-									
2	NC	4.67	1.45	.72**	-								
3	CC	4.47	1.16	.27**	.34**	-							
4	HHS	4.59	1.32	.35**	.40**	.89**	-						
5	LAS	4.34	1.29	.13**	.20**	.89**	.58**	-					
6	BURN	2.15	0.88	-.61**	-.45**	-.06	-.11*	.01	-				
7	EXH	2.51	1.21	-.48**	-.35**	-.06	-.09	-.02	.83**	-			
8	CYN	1.95	1.14	-.59**	-.44**	-.05	-.12*	.04	.90**	.66**	-		
9	PI	1.99	0.91	-.41**	-.27**	-.02	-.05	.01	.67**	.25**	.48**	-	
10	ITL	2.18	1.05	-.71**	-.63**	-.17**	-.25**	-.05	.54**	.47**	.56**	.24**	-

Note. N = 412, AC = Affective Commitment; NC = Normative Commitment; CC = Continuance Commitment; HHS-High Sacrifices Scale; LAS: Lack of alternatives Scale; BURN = Burnout (Global Factor); EXH = Exhaustion; CYN = Cynicism; PI = Professional Inefficacy: ITL = Intention to Leave; *p < .05. **p < .01.

MANOVA

The results of the MANOVA analyses are provided in Table 2.

There was a difference between managers and non-managers when considered jointly the variables organizational commitment (with its facets), burnout (with its facets) and intention to leave, Wilk's Λ =.881, $F(8, 403) = 6.83$, $p < .001$, partial $\eta^2 = .12$. Also, for the same jointly considered variables, there was a significant diference between employees

working in public and private sectors, Wilk's Λ =.945, $F(8,403) = 2.94$, $p =.003$ and partial $\eta^2 = .05$, people from the three studied generations: Wilk's Λ =.830, $F(16, 804) = 4.92$, $p < .001$, partial $\eta^2 = .09$ and with the three level of reported income: Wilk's Λ =.885, $F(8,403) = 3.16$, $p < .001$, partial $\eta^2 = .09$. We are going to consider in interpreting the effect size, Cohen's guideliness (1988), where $\eta^2 = .01$ indicates a small, $\eta^2 = .06$ a medium and $\eta^2 = .14$ a large effect size.

Table 2. *Multivariate tests for the four demographic groups*

Variable	Value	F	df	Error df	p	Partial Eta Squared
Hierarchical Level	.881	6.83ᵃ	8.00	403.00	<.001	.12
Sector of the Employer	.945	2.94ᵃ	8.00	403.00	.003	.05
Generation	.830	4.92ᵃ	16.00	804.00	<.001	.09
Level of reported income	.885	3.16ᵃ	8.00	403.00	<.001	.09

ᵃExact statistic

These results support positively answering to *Research Question 1*. Still, various levels of effect sizes can be observed in terms of differences related to the jointly observed organizational outcomes, from small to medium in the case of sector of the employer to medium, for generation and level of

reported income, to medium high in case of hierarchical level contribution.

A separate ANOVA was conducted for each dependent variable (see Tables 3, 4, 5 and 7), with each ANOVA evaluated at an alpha level of .025.

Table 3. *ANOVA – Test of Between-Subject Effects for Hierarchical Level*

Variable	Mean Square	F	df	Df Error	p	Partial Eta Squared
AC	49.09	27.06	1	410	<.001	.06
NC	45.01	22.41	1	410	<.001	.05
CC	.03	.02	1	410	.876	.00
HHS	2.09	1.20	1	410	.274	.00
LAS	3.27	1.98	1	410	.160	.00
BURN	4.06	5.28	1	410	.022	.01
EXH	.49	.33	1	410	.563	.00
CYN	2.44	1.87	1	410	.172	.00
PI	14.29	17.93	1	410	<.001	.04
ITL	11.97	11.05	1	410	.001	.03

Note: AC = Affective Commitment; NC = Normative Commitment; CC = Continuance Commitment; HHS- High Sacrifices Scale; LAS: Lack of alternatives Scale; BURN = Burnout (Global Factor); EXH = Exhaustion; CYN = Cynicism; PI = Professional Inefficacy: ITL = Intention to Leave.

From Table 3 we see that there was a difference between managers and non-managers on total level of Burnout, with non-managers (M=2.22) scoring higher than managers (M=2.01), but with a low partial η^2 = .01. The differences are related to the Professional Inefficacy area of the Burnout construct, where the difference between non-managers (M=2.13) and managers (M=1.73) is higher than in the global Burnout factor, with a partial η^2 = .04. Also, there is a significant difference between employees at different hierarchical level on Affective Commitment, managers (M=5.65) scoring higher than non-managers (M=4.93) with a medium effect size η^2 = .06 and on Normative Commitment, also managers (M=5.13) scoring higher than non-managers (M=4.43), with a partial η^2 = .05. Finally, in the Intention

to leave area, non-managers have a higher mean (M=2.30) than managers (M=1.94), the effect size being between small and medium with a partial η^2 = .03. All estimated marginal means were generated by SPSS.

These results partially answer to *Research Question 2*. The hierarchical level accounts for differences between managers and non-managers, with medium effect sizes in the case of Affective and Normative Commitment, with small to medium effect sizes in the case of Professional Inefficacy and Intention to Leave and with a small effect size in the case of the global factor of Burnout. No differences were found in case of the Exhaustion, Cynicism or Continuance Commitment (with its sub-facets) between managers and non-managers.

Table 4. *ANOVA – Test of Between-Subject Effects for Sector of the Employer*

Variable	Mean Square	F	df	Df Error	p	Partial Eta Squared
AC	.32	.42	1	410	.519	.00
NC	.42	.29	1	410	.591	.00
CC	.42	.32	1	410	.571	.00
HHS	.17	.20	1	410	.653	.00
LAS	8.81	4.61	1	410	.032	.01
BURN	28.00	13.66	1	410	<.001	.03
EXH	2.16	1.62	1	410	.204	.00
CYN	1.33	.76	1	410	.383	.00
PI	3.20	1.94	1	410	.165	.00
ITL	.32	.42	1	410	.519	.00

Note: AC = Affective Commitment; NC = Normative Commitment; CC = Continuance Commitment; HHS- High Sacrifices Scale; LAS: Lack of alternatives Scale; BURN = Burnout (Global Factor); EXH = Exhaustion; CYN = Cynicism; PI = Professional Inefficacy: ITL = Intention to Leave

There was a difference between employees working in public and in the private sectors only on the total level of Burnout, with employees working in public sector (M=2.19) scoring higher than employees working in private sector (M=2.13), but with a rather small to medium effect size of η^2 = .03, p<.001. In the Continuance Commitment's dimension of perceived Lack of Alternatives, the employees from public sector (M=4.45) find difficult to leave the current job due to perceived lack of alternatives in the job market than employees working in private sector

(M=4.27), the effect size is rather small η^2 = .01, p.=.032. The other investigated differences between the public and private sector's employees were found not be significant, according to the data included in Table 4. Considering these data, the *Research Question 3* is partially answered.

Table 5 presents that for all the studied dependent variables, there are differences between generations. Data support answering *Research Question 4*, namely there are differences between all the organizational outcomes studied due to the the generation.

Rather larger effect sizes are obtained in the case of Affective Commitment and Burnout (as a global factor), $\eta^2 = .10$ and medium to large effect sizes are seen in the case of Exhaustion ($\eta^2 = .08$) and Normative Commitment ($\eta^2 = .07$). Medium effect sizes are seen in the case of Cynicism and Professional Innefficacy ($\eta^2 = .06$). Last, small to medium effect sizes where seen related to Continuance Commitment ($\eta^2 = .04$) and its facets, as well as to the Intention to Leave ($\eta^2 = .03$).

Table 5. *ANOVA – Test of Between-Subject Effects for Generation*

Variable	Mean Square	F	df	Df Error	p	Partial Eta Squared
AC	39.49	22.62	2	409	<.001	.10
NC	29.19	14.74	2	409	<.001	.07
CC	9.98	7.70	2	409	.001	.04
HHS	11.39	6.74	2	409	.001	.03
LAS	8.66	5.34	2	409	.005	.03
BURN	15.62	22.22	2	409	<.001	.10
EXH	22.51	16.63	2	409	<.001	.08
CYN	15.49	12.52	2	409	<.001	.06
PI	10.67	13.65	2	409	<.001	.06
ITL	7.81	7.25	2	409	.001	.03

Note: AC = Affective Commitment; NC = Normative Commitment; CC = Continuance Commitment; HHS- High Sacrifices Scale; LAS: Lack of alternatives Scale; BURN = Burnout (Global Factor); EXH = Exhaustion; CYN = Cynicism; IP = Professional Inefficacy: ITL = Intention to Leave

To ilustrate these differences, we included in Table 6, the means and standard deviations for all three generations reported for each of the dependent variables.

Table 6. *Descriptive Statistics for the Dependent Variables in relation to the Generations*

DEPENDENT VARIABLE	1944-1964 BABY_BOOMERS (N=60)		1965-1979 X_GEN (N=186)		1980-1994 Y_GEN (N=165)		Total	
	M	SD	M	SD	M	SD	M	SD
AC	5.95[a]	1.01	5.34[b]	1.34	4.70[c]	1.39	5.17	1.39
NC	5.41[a]	1.22	4.77[b]	1.48	4.29[c]	1.38	4.67	1.45
CC	4.84[a]	1.04	4.56[b]	1.15	4.22[c]	1.16	4.47	1.16
HHS	4.99[a]	1.24	4.70[b]	1.26	4.33[c]	1.36	4.59	1.32
LAS	4.69[a]	1.15	4.43[b]	1.35	4.11[c]	1.23	4.34	1.29
BURN	1.75[c]	.71	1.99[b]	.74	2.47[a]	.97	2.15	.88
EXH	2.01[c]	.97	2.33[b]	1.13	2.89[a]	1.27	2.51	1.21
CYN	1.50[c]	.77	1.82[b]	1.02	2.25[a]	1.30	1.95	1.14
PI	1.76[c]	.84	1.82[b]	.77	2.27[a]	1.01	1.99	.91
ITL	1.86[a]	.92	2.09[b]	1.07	2.40[a]	1.04	2.18	1.05

Note: AC = Affective Commitment; NC = Normative Commitment; CC = Continuance Commitment; HHS- High Sacrifices Scale; LAS: Lack of alternatives Scale; BURN = Burnout (Global Factor); EXH = Exhaustion; CYN = Cynicism; PI = Professional Inefficacy: ITL = Intention to Leave; a-the highest score, b – the medium score, c – the lower score for the variable.

Both the effect sizes and the calculated means show a rather sensible attitude the younger generation display. In terms of Burnout Y-Gen-ers report the higher score comparing with the older generation (Baby-Boomers) and the difference is valid when discussing about all the burnout facets, namely Exhaustion, Cynicism and Professional Inefficacy.

Also, an important finding is that results show medium to large effect size differences in terms of Affective and Normative Commitment, the older generation being the highest committed employees rather than the younger generation. One may say that this could be due to the lack of perceived alternatives or high sacrifices the old generation may need to do in order to find alternative employment opportunities. Effect size wise, this represents rather a small posibility since the Continuance Commitment partial eta-square and its' facets', were rather small in intensity $\eta^2 = .03-.04$.

As presented in Table 7, there were reported differences between employees in the three categories of perceived level of income but not in the case of all studied dependent variables. This fact support partially answering *Research Question 5*, namely, differences were obtained in the Intention to Leave and the Organizational Commitment areas (except for the Affective Commitment), with rather smaller effect sizes ($\eta^2 = .02-.04$) . No differences between the employees in the three categories of perceived level of income with regards to Burnout or any of its facets were found.

Table 7. *ANOVA – Test of Between-Subject Effects for Perceived Level of Income*

Variable	Mean Square	F	df	Df Error	p	Partial Eta Squared
AC	4.29	2.24	2	409	.108	.01
NC	8.71	4.18	2	409	.016	.02
CC	9.72	7.49	2	409	.001	.04
HHS	13.61	8.10	2	409	<.001	.04
LAS	8.54	5.27	2	409	.006	.03
BURN	.75	.97	2	409	.382	.00
EXH	.79	.54	2	409	.582	.00
CYN	1.98	1.52	2	409	.220	.01
PI	.21	.26	2	409	.774	.00
ITL	5.69	5.23	2	409	.006	.02

Note: AC = Affective Commitment; NC = Normative Commitment; CC = Continuance Commitment; HHS- High Sacrifices Scale; LAS: Lack of alternatives Scale; BURN = Burnout (Global Factor); EXH = Exhaustion; CYN = Cynicism; PI = Professional Inefficacy: ITL = Intention to Leave

The differences between the three categories of perceived income level are presented, in terms of means and standard deviations, in the Table 8. As can be seen, it is not the generation but rather the perceived level of income that explains diferences in terms of normative and continuance commitment and its facets. For instance, people reported the low income level perceived that their costs related to leaving the company would be higher in terms of sacrifices and risks of not finding alternative employement solutions, followed by people with high income level. The most balanced from this point of view would be people with medium income level. Still, interestingly enough, people with low income level are reporting the higher intention to leave.

Table 8. *Means and standard deviations for the Dependent Variables found to have significant differences in relation to the three studied levels of perceived level of income*

DEPENDENT VARIABLE	High Income Level (N=57)		Medium Income Level (N=230)		Low Income Level (N=125)		Total (N=412)	
	M	SD	M	SD	M	SD	M	SD
NC	5.04[a]	1.44	4.72[b]	1.39	4.40[c]	1.53	4.67	1.45
CC	4.35[b]	1.14	4.32[c]	1.15	4.79[a]	1.12	4.47	1.16
HHS	4.65[b]	1.29	4.38[c]	1.30	4.96[a]	1.29	4.59	1.32
LAS	4.05[c]	1.30	4.25[b]	1.33	4.63[a]	1.15	4.34	1.29
ITL	1.96[c]	1.08	2.10[b]	.99	2.42[a]	1.11	2.18	1.05

Note: NC = Normative Commitment; CC = Continuance Commitment; HHS- High Sacrifices Scale; LAS: Lack of alternatives Scale; ITL = Intention to Leave; a-the highest score, b – the medium score, c – the lower score for the indicated variable.

Discussions and conclusions

We focused on the study of three of the main studied organizational results, namely organizational commitment, burnout and intention to leave and how are they manifesting in various groups of employees. One of the most important reason for which we crossed-examined the three selected organizational outcomes and the four demographic characteristics is due to the fact that an important amount of costs are associated with the lack of organizational commitment, higher levels of burnout or intention to leave (Schaufeli & Salanova, 2014; Loi, Hang-yue & Foley, 2006; Guchait & Cho, 2010). Also, it is important to note the increasing interest of the organizations to tailor their approach to various groups of professionals, if not even to have dedicated initiatives at the individual level.

We found that, when considering the entire sample, professional inefficacy is highly negatively correlated with the affective commitment and mildly connected with normative commitment while not at all connected with the continuance commitment and its facets.

When discussing about the various considered groups, the significant difference between managers and non-managers on total level of Burnout, particularily, in the Professional Inefficacy area as well as in the affective commitment and normative commitment. We also found that non-

managers have a higher intention to leave than managers.

We believe that the results of the current study bring a foundation for the organizations to tailor better human capital policies in relation with the various groups of professionals.

Also, the results gives to the human capital practitioners some important insights such as the ones related to the level of perceived burnout which are found to be higher in non-management rather than in managers, somehow counterintuitive considering the amount of increased responsibilities management has comparing to the non-management. However, it is well possible that an associated perceived lack of job resources (such as autonomy) could lead the non-managers to perceiving that they do not deliver at a good-enough level and their professional efficacy is greatly diminished.

Recruiters are also informed by the current study results that is more difficult to find suitable professionals from the public sector interested in new opportunities on the market since those individuals perceive that, in fact, there are not so many real opportunities for them to experience a change in their career. Maybe among the only reasonable competitive advance the private sector companies could bring to a public sector employee in order to attract them would be the perceived level of Burnout, since the public sector professionals perceive that they are more stressed than their peers in the private sector.

Another important point on the HR agenda is an optimal right-sizing of the total rewards packages such as the companies to ensure proper attraction and retention of talent and prevent, in this way, talent loss, secure institutional memory and save to the costs associated with the loss of investment in human capital, additional recruitment and training as well as negative effects on productivity (Țânculescu, 2015; Weisberg & Kirschenbaum, 1991).

An even more important finding supporting the dedicated approach that companies need to take for various groups of employees and in various situations can be identified regarding the age of the participants, meaning that for all the studied dependent variables, there are differences between generations. One of the most important challenge companies are facing at the moment is to bridge the generational gap. This study brings light in the elements the young generation perceive as most disturbing for them comparing older generation and how those behaviors can be transformed from difficulties to opportunities to develop new practices and policies adapted to meet both young and senior professionals' needs.

For instance, we found that the organizational commitment is declining as the age decreased, namely the most committed employees are the Baby Boomers and not only from the continuous commitment point of view. They may not be perceiving as many opportunities on the market as the younger generation, but they are also the most affective and normative committed to the company. Counter-intuitively and rather counter-naturally, the most burned-out are the employees from the youngest generation and also, they are the ones expressing the higher intention to leave. Also the younger generation obtain the higher level of professional inefficacy comparing with the other two considered generations.

Last but not least, money are not all, at least not all the times. As poor or as wealthy as you perceived yourself to be, if you want to be affectively committed to the organization, you are. And, unfortunately, irrespective of the perceived level of income, burnout and its facets can affect both poor and rich.

Differences between organizational outcomes when analyzing the three groups from the perceived income point of view occur when considering the normative and continuance commitment as well as the intention to leave. To illustrate with an example, as much as the lack of alternatives on the market are perceived by employees with perceived low income, the higher is their intention to leave. That means that the fact that the fear of not finding a job outside of the company is lower than their intention to leave the company, most probably to find a better paid job.

The limitations of the study include the fact that the results were obtained solely through self-report questionnaires, which increase the possibility of contamination of the reported relationships through common method variance. Another limitation of this study could be seen in the transversal design that impair us to draw causal inferences. Also, even if the study had a medium size large sample (N=412), the sub-sets of samples were, at times uneven, like in the situation of the group of people reporting higher level of income or in the situation of the Baby-Boomers participating in the study.

As future research, one possible important study paths would focus on the differences considering other demographic characteristics such as tenure or working experience, for the companies to be able to derive much more adapted solutions to increase achievement motivation and reduce employees' attrition as well as enriched, redesigned positions as a result of applying more adapted, tailored approaches for the employees.

References

Allen, N.J. & Meyer, J.P. (1996) Affective, Continuance, and Normative Commitment to the Organization: An Examination of Construct Validity. *Journal of Vocational Behaviour, 49*, 252–276

Bogg, J. & Cooper, C. (1995). Job Satisfaction, Mental Health, and Occupational Stress among Senior Civil Servants. *Human Relations, 48*, 327-341.

Clugston, M., Howell, J. P. & Dorfman, P. W. (2000). Does cultural socialization predict multiple bases and foci of commitment? *Journal of Management, 26*, 5–30.

Cohen, A. (1993). Organizational Commitment and Turnover: A Meta-Analysis. *The Academy of Management Journal, 36(5),* 1140-1157, DOI: 10.2307/256650

Cohen, A., & Gattiker, U. (1994). Rewards and Organizational Commitment across Structural Characteristics: A Meta-Analysis. *Journal of Business and Psychology, 9*(2), 137-157.

Cohen, A., & Lowenberg, G. (1990) A reexamination of the side-bet theory as applied to organizational commitment: A meta-analysis. *Human Relations, 43*, 1015-1050.

Cohen, J. (1988). *Statistical power analysis for the behavioral sciences (2nd ed.)* (Hillsdale, NJ: Erlbaum)

Edwards, J. & Cable, D. (2009). The Value of Value Congruence. *The Journal of applied psychology*, *94*. 654-677. DOI: 10.1037/a0014891.

Emerson, R.M. (1976). The Social Exchange *Theory. Annual Review of Sociology 2*(1), 335-362, DOI: 10.1146/annurev.so.02.080176.002003.

Field, A. (2018). *Discovering Statistics Using IBM SPSS Statistics* (5th Ed.). London, UK: Sage Publications, 736-775.

Gittleman M, Pierce B.(2013) How Prevalent is Performance-Related Pay in the United States? Current Incidence and Recent Trends. *National Institute Economic Review 226*(1): R4-R16. DOI:10.1177/002795011322600102

Guchait, P., & Cho, S. (2010). The impact of human resource management practices on intention to leave of employees in the service industry in India: the mediating role of organizational commitment. *The International Journal of Human Resource Management, 21*(8), 1228–1247

Homans, G. (1974). *Social Behavior*, revised Ed., New York: Harcourt-Brace, 25-44.

Jeong, M. & Oh, H. (2017). Business-to-business social exchange relationship beyond trust and commitment. *International Journal of Hospitality Management 65*, 115-124. DOI: 10.1016/j.ijhm.2017.06.004.

Kerlinger, F. N. & Lee, H. B. (2000). *Foundations of behavioral research* (4th Ed) Fort Worth, TX: Harcourt College Publishers.

Loi, R., Hang-yue, N. & Foley, S. (2006). 'Linking Employees' Justice Perceptions to Organizational Commitment and Intention to Leave: The Mediating Role of Perceived Organizational Support, *Journal of Occupational and Organizational Psychology, 79*, 101–120.

Mathieu, J. E., & Zajac, D. M. (1990). A review and meta-analysis of the antecedents, correlates and consequences of organizational commitment. *Psychological Bulletin, 108*: 171-194.

Meyer, J. P., & Allen, N. J. (1997). *Commitment in the workplace*. Thousand Oaks, CA: Sage.

Meyer, J. P., Allen, N. J., & Smith, C. A. (1993). Commitment to organizations and occupations: Extension and test of a three component conceptualization. *Journal of Applied Psychology, 78(4)*, 38-551.

Meyer, J. P., Stanley, D. J., Herscovitch, L. & Topolnytsky, L. (2002). Affective, continuance and normative commitment to the organization: A meta-analysis of antecedents, correlates, and consequences. *Journal of Vocational Behavior, 61*, 20–52.

Montgomery, A.J., Peeters, M.C.W., Schaufeli, W.B. & Den Ouden, M. D. (2003). Work-Home Interference among Newspaper Managers: Its Relationship with Burnout and Engagement. *Anxiety, Stress & Coping, 16*, 195-211, DOI: 10.1080/1061580021000030535

Muller, K.E. & Fetterman, B.A. (2002). *Regression and ANOVA: An integrated approach using SAS® Software.* Cary, NC: SAS Institute Inc & John Wiley & Sons Inc.

Mukherjee, R. & Gokcekus, O. (2001) *Living with Political Patronage: Civil Service Reform Options When Patronage Cannot be Eliminated.* Draft PREM Note, The World Bank.

Patalano, C (2008). *A study of the relationship between generational group identification and organizational commitment: Generation X vs. Generation Y*. Nova Southeastern University, ProQuest Dissertations Publishing, 2008. 3301306.

Popa, M. (2010). *Statistici multivariate aplicate în psihologie* [*Multivariate Statistics Applied in Psychology*Multivariate Statistics Applied in Psychology]. Iasi, Polirom, 207-264.

Schaufeli, W.B. & Enzmann, D. (1998). *The Burnout Companion to Study and Research: A Critical Analysis*. Taylor & Francis, London.

Schaufeli, W.B. & Salanova, M. (2014). Burnout, boredom and engagement at the workplace. In Peeters, M., de Jonge J., & Taris, T. (eds.), *People at work: An Introduction to Contemporary Work Psychology*. Chichester, Wiley-Blackwell, 293 – 320.

Schuler, H., Thornton, G.C., Frintrup, A., Mueller-Hanson, R. (2004). *Achievement Motivation Inventory. Manual.* Oxford: Hogrefe & Huber Publisher.

Suman, S., & Srivastava, A. K. (2012). Antecedents of Organisational Commitment across Hierarchical Levels. *Psychology and Developing Societies, 24*(1), 61–83. DOI: 10.1177/097133361102400103.

Ţânculescu, L. (2015) *Impactul factorilor de personalitate înţeleşi în cheia teoriei celor cinci mari factori de personalitate asupra angajamentului organizaţional. PhD Thesis (unpublished).* UBB, Cluj-Napoca.

Weisberg, J.& Kirschenbaum, A. (1991). Employee Turnover Intentions: Implications from a National Sample. *International Journal of Human Resource Management, 2*(3), 359–375.

Yousef, D. A. (2016). Organizational Commitment, Job Satisfaction and Attitudes toward Organizational Change: A Study in the Local Government. *International Journal of Public Administration*, *40(1),* 77-88 DOI: 10.1080/01900692.2015.1072217

***OECD.(1997) *Trends in public sector pay in OECD countries*. Paris: OECD-Publishing

***OECD (2005) *Performance-related pay policies for government employees*, Paris: OECD-Publishing

PUBLISHING STANDARDS

Psychology of Human Resources – guide for authors

THE EDITORS

This document represents the "Guide for Authors". It covers the format and language to be used for manuscripts submitted to Human Resources Psychology. Also, this document can be found on the webpage of the Romanian Association of Industrial and Organizational Psychology (www.apio.ro).

This "Guide for Authors" follows the 6th APA Publication Manual.

Manuscript Submission and Format

All manuscripts for the journal Human Resources Psychology should be submitted to the following e-mail address: revista@apio.ro.

To edit the manuscript please use Times New Roman 12-point type, 1.5 line spacing and the A4 page setting. Each page will be numbered in the upper right corner. The top and side margins should be left of at least one inch or 2.54 cm. A full example of a manuscript can be found in the 6th APA Publication Manual.

Publications

Accepted papers are copy-edited and retyped. Authors have to review edits and proofread their work. The editor of Human Resources Psychology will contact the corresponding author after the editor assigns your work to an issue.

If your work is accepted, please keep the editor informed of changes in your contact information and of long absences.

Front Page

The first page of the manuscript should include the following information:

1. Title

The title should be a concise statement of the main topic and should identify the variables or theoretical issues under investigation and the relationship between them. It should be typed in sentence case, centered between left and right margins, and positioned in the upper half of the page.

2. Author name(s) and institutional affiliation(s)

Author name(s) will be presented in the following form: first name, middle initial(s), and last name.

Institutional affiliation should reflect the institution/location where the author(s) were when the research was conducted. When an author has no institutional affiliation, the city and state of residence below the author´s name should be specified. The institutional affiliation should be centered under the author's name, on the next line.

3. Author´s note

This section should include the following:
- First paragraph should include the departmental affiliations at the time of the study for all authors as follows: name of the author as it appears in the byline, comma, department name, comma, university name, semicolon, next

author name, and so on, and end with a period.

- Second paragraph should include any changes in author affiliation subsequent to the time of the study as follows: [author´s name] is now at [affiliation].
- Third paragraph should include acknowledgments (only for grants or other financial support, any special agreements concerning authorship, thanks for personal assistance) and special circumstances (disclose them before the acknowledgements in this paragraph).
- Fourth paragraph should include information about the person to contact in terms of mailing address and e-mail.

Place the author note on the title page, below the title, byline, and affiliation. Center the label *Author Note.* Start each paragraph of the note with an indent, and type separate paragraphs for the authors' names and current affiliations, changes in affiliations, acknowledgments, and special circumstances, if any, along with the person to contact. The author note is not numbered or cited in the text.

Abstract Page

The abstract as well as the title of the work go on page 2. The abstract should be no longer than 150 words. The label *Abstract* should appear in sentence case, centered, at the top of the page. Type the abstract itself as a single paragraph without paragraph indentation. Place a running head (short title).

The abstract will be written in English. It is necessary to include 3-5 key words after each abstract, in all these three languages.

Main body text pages

In preparing your manuscript, begin the introduction on page 3. Type the title of the manuscript in sentence case centered at the top of the page, and then type the text. The remaining sections of the article follow each other without a break; do not start a new page when a new heading occurs.

This section should include the following:

- Introduction of the problem. This section will present the specific problem under the study and describe the research strategy. There is no need to label this section as Introduction.
- Explore importance of the problem. This section states why the problem deserves new research. State explicitly this problem according to the type of the study (empirical study, literature review and meta-analysis, methodological paper and case study).
- Describe relevant scholarship by discussing the relevant related literature and demonstrating the logical continuity between previous and present work.
- State each tested hypothesis clearly and provide a theoretical argument for how it was derived from theory or is logically connected to previous data and argumentation.

Method

This section describes in detail how the study was conducted, including conceptual and operational definitions of the variables used in the study. Authors should include the following:

- Sample description, by describing the main characteristics with particular emphasis on characteristics that may have bearing on the interpretation of results.
- Sampling procedure by describing the procedures for selecting participants in terms of sampling method, the percentage of the sample approached that participated, the number of participants who selected themselves into the sample.
- Sample size, power and precision.
- Measures and covariates by describing the methods used to collect data and to enhance the quality of the measurements.
- Research design.
- Experimental manipulations or procedures.
- Task description.

Results

This section summarizes the collected data and the analysis performed on the data to test the proposed hypotheses. Report the data analysis in sufficient detail to justify your conclusions. For more information please consult the 6th APA Publication Manual.

Discussion

This section evaluates and interprets the implications of the results, especially with respect to original hypotheses. Examine, interpret, and qualify the results and draw inferences and conclusions from them. Emphasize any theoretical or practical consequences of the results.

Also, the limits of the study and possible future studies can be considered in this section.

References

References are your entries in the *alphabetical list at the end* of your article or research note. This list should include all the works you have cited throughout the manuscript. The references should be formatted as follows:

1. Periodicals (selective examples)

Author, A.A, Author, B. B., & Author, C. C. (year). Title of article. *Title* of *Periodical, xx,* pp-pp. doi: xx.xxxxxxxxxx

Author, A. A., Author, B. B., Author, C. C., Author, D. D., Author, E. E., Author, F.F., … Author, Y.Y. (year). Title of article. *Title* of *Periodical, xx,* pp-pp. doi: xx.xxxxxxxxxx

Author, A.A, Author, B. B., & Author, C. C. (year). Title of article. *Title* of *Periodical, xx,* pp-pp.

Author, A.A., & Author, B.B. (in press). Title of article. *Title of Periodical.* Retrieved from http://cogprints.org/5780/1/ECSRAP.F07.pdf

2. Books

Author, A. A. (year). *Title of work.* Location: Publisher.

Author, A. A. (year). *Title of work.* Retrieved from http://www.xxxxxxx

Author, A. A. (year). *Title of work.* doi: xxxxx

Editor, A. A. (Ed.) (year). *Title of work.* Location: Publisher.

3. For chapters in a book or entry in a reference book (selective example)

Author, A.A., & Author, B.B. (year). Title of chapter or entry. In A. Editor, B. Editor, & C. Editor (Eds.), *Title of book* (pp. xxx-xxx). Location: Publisher.

Author, A.A, &Author, B.B. (year). Title of chapter or entry. In A. Editor & B. Editor (Eds.), *Title of book* (pp. xxx-xxx). Retrieved from http://www.xxxxxxx

Author, A.A., & Author, B.B. (year). Title of chapter or entry. In A. Editor, B. Editor, & C. Editor (Eds.), *Title of book* (pp. xxx-xxx). Location: Publisher. doi: xxxxxxxx

4. Meeting and symposia (selective examples)

Contributor, A.A., Contributor, B.B., Contributor, C.C., & Contributor, D.D. (Year, Month). Title of contribution. In E.E. Chairperson (Chair), *Title of symposium.* Symposium conducted at the meeting of Organization Name, Location.

Presenter, A.A. (Year, Month). *Title of paper or poster.* Paper or poster session presented at the meeting of Organization Name, Location.

5. Unpublished works (selective examples)

Author, A.A. (Year). Title of manuscript. Unpublished manuscript [or "Manuscript submitted for publication," or "Manuscript in preparation"].

For a detailed description of the procedure related to the citation of other types of work than those listed above, consult the 6th APA Publication Manual.

Footnotes

Footnotes are used to provide additional content or to acknowledge copyright permission status.

Appendices

The appendices of the manuscript (labeled APPENDIX A, APPENDIX B etc.) contain materials that supplements article content such as lengthy methodological procedures, calculations of measures, scales etc.

Tables and Figures

The author should number all tables and figures with Arabic numerals in the order in which they are first mentioned in the text, regardless of whether a more detailed discussion of the table or figure occurs later in the paper. The author should label them as Table 1, Table 2, and so on or Figure 1, Figure 2, and so on. List all tables first followed by figures. Place tables and figures after appendices at the end of the manuscript, and indicate the position of each in the text as follows:

Insert Table 1 about here

Each table or figure needs an introductory sentence in your text. The format agreed is the standard (canonical) one. Each table should report one type of analysis (which is identified in the title), and each vertical column and horizontal row should contain only one type of data.

Citation

It is important to put in the Reference section every work you have cited throughout the manuscript. The author can cite in-text as follows:

1. One author

Name and year: It has been found that X is associated with Y (Author, year)

Year only: Author (year) has found that

2. Two authors

When a work has two authors, the author should cite both names every time the reference occurs in the text.

When a work has three, four, or five authors, you should cite all authors the first time the reference occurs but in the subsequent citations, include only the surname of the first author followed by et al.,

(not Italicized and with a period after al.) and the year.

3. Two or more cited works

The author should order citations *alphabetically*. Designate two or more works by one author (or by an identical group of authors) published in the same year by adding "a," "b," and so forth, after the year.

4. Works with no identified author or with an Anonymus author

When a work has no identified author, the author should cite in text the first few words of the reference list entry (usually the title) and the year. Use double quotation marks around the title of an article, a chapter, or a web page and italicize the title of a periodical, a book, a brochure, or a report:

on organizational commitment ("Study Report", 2011)

the book *Motivational Outcomes* (2011)

5. Page numbers in citations

To cite a specific part of a source, the author should indicate the page, chapter, figure, table, or equation at the appropriate point in text. Always give page numbers for quotations.

(Johnny, 2011, p. 13)

6. Secondary sources

When the original work is out of print, unavailable through usual sources, the author should give the secondary source in the reference list and in the text you should name the original work and give a citation for the secondary source

Minnie's report (as cited in Smith, 2011).

Thank you for paying attention to the conventions outlined in this guide – it will help the work of everyone involved in the publication of this journal.