

HOW TO MEASURE COMPASSIONATE LEADERSHIP EFFECTIVENESS

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Abstract

Compassionate leadership has emerged as a strategical issue in promoting well-being, and retention within healthcare organizations (Trzeciak & Mazzaelli, 2019; West et al., 2017; Paakkanen et al., 2021). Despite its growing relevance, the measurement of compassionate leadership effectiveness remains a complex and relatively unexplored area. This study aims to identify the key indicators and variables that can be used to assess the effectiveness of compassionate leadership. To achieve this objective, a comprehensive review of existing measurement tools and frameworks related to compassionate leadership has been conducted. We referred to the two prominent models by West et al. (2017), developed in UK (King's Fund), and Schuck et al. (2019), developed in USA. We examined how these models operationalize compassionate leadership and which dimensions are most frequently assessed. Beyond the review of most recent research on this topic, we explored which organizational and individual indicators are most likely to be influenced by compassionate leadership. Our findings suggest that Psychological Well-being and Burnout are key mediators in the relationship between Compassionate Leadership and two critical outcomes: Job Satisfaction and Intention to Leave. Compassionate leadership directly affects Compassion at Work (Lilius et al., 2008), as a climate dimension measured on team level. And it indirectly enhances Job Satisfaction and reduces Turnover Intentions by positively affecting employee's well-being. We also consider the potential role played by Supportive Learning Environment (Garvin et al., 2008) as moderator between well-being and intention to leave. For each selected indicator, we identified a set of validated measurement tools and conducted a pre-test with a sample of Italian healthcare professionals. The aim was to assess the reliability of these instruments using Cronbach's Alpha. The results confirmed the internal consistency of the selected scales, supporting their use in future empirical studies on compassionate leadership effectiveness. This study contributes to the ongoing discourse on leadership in healthcare by offering a structured approach to measuring compassionate leadership effectiveness. It highlights the importance of integrating compassion into leadership assessment tools and encourages further empirical research to validate the proposed indicators. Ultimately, understanding how to measure compassionate leadership can support the development of more humane and effective healthcare organizations.

Keywords: *Compassionate leadership, compassion at work, job satisfaction, healthcare organization, research design.*

1. Introduction

Interest in person-centred leadership has grown, reflecting the central role of compassion in healthcare. In a system under increasing pressure, compassionate leadership has become a strategic priority (Trzeciak et al., 2017). For this reason, the Veneto Region adopted this model and launched the CompAct project to strengthen the healthcare system by promoting leadership practices that support caregivers.

2. State of the art

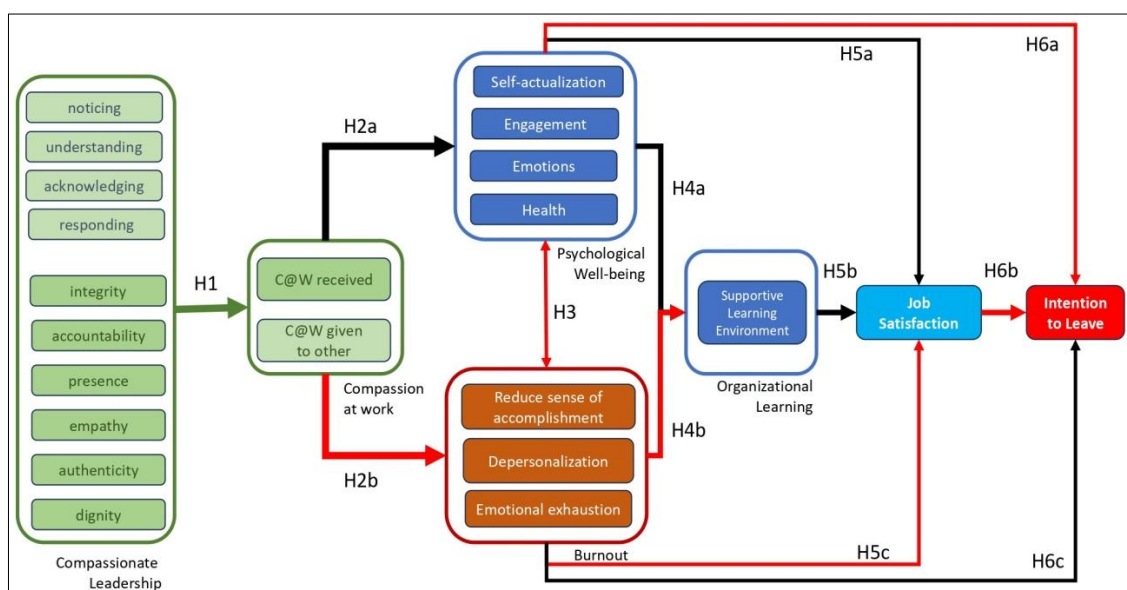
As defined by Goetz et al. (2010) and Dutton et al. (2014), compassion is characterised by a profound awareness of one's own and others' suffering, coupled with a dedication to alleviating and preventing it. From this perspective, compassionate leadership can be defined as “a leadership model that

promotes and sustains compassion at work” (Cervai & Blasutig, 2025, p. 104), a relational resource that can foster a culture of competent and sensitive responses to pain (Kanov et al., 2004; Lilius et al., 2011; Dutton et al., 2014) and fosters a sense of collective responsibility among workers (Buonomo et al., 2022a). The literature on compassionate leadership identifies two main theoretical models. One model describes compassionate leadership as a process of four interconnected stages: attention, understanding, empathy, and helping (West, 2021). The other model identifies six core themes: integrity, accountability, presence, empathy, authenticity, and dignity (Shuck et al., 2019). Although the two models differ, both view compassionate leadership as the ability to recognise, interpret, and respond to others’ suffering in a competent and humane way. In this perspective, compassion functions as an organisational climate variable (Lilius et al., 2008), shaping how employees perceive relationships and support at work and reflected in outcomes such as psychological well-being, lower burnout, organisational learning, job satisfaction, and reduced intention to leave.

Empirical evidence confirms the conceptual links between compassionate leadership and important organisational outcomes. Psychological well-being, which is sensitive to the quality of relationships with leaders, is positively associated with compassionate leadership ($r = 0.34$; Shuck et al., 2019). In contrast, burnout exhibits an inverse relationship: higher levels are associated with a lower perception of compassionate leadership ($r = -0.36$; Wang et al., 2024) and a significant decline in psychological well-being ($\beta = -0.531$, $p < 0.001$; Buonomo et al., 2022b). Compassion at work helps mitigate the effects of burnout by partially mediating the relationship with well-being ($\beta = -0.089$, $p < 0.001$; Buonomo et al., 2022b). Organisational learning also seems to benefit from compassionate environments, as indicated by the robust correlation between compassion and collective learning ability ($r = 0.652$; Guinot et al., 2020). Job satisfaction shows positive associations with perceived compassion, with correlations ranging from moderate ($r = 0.26$; Basu, 2024) to very high ($r = 0.79$; Elínborgardóttir, 2024). Finally, the intention to leave, particularly critical in healthcare settings (Jimenez-Caceres et al., 2025), is negatively associated with compassionate leadership ($r = -0.37$; Shuck et al., 2019), highlighting its potential protective role in employee’s retention.

Drawing on recent evidence and conceptual models developed by West et al. (2017) and Shuck et al. (2019), the CompAct project will empirically test a series of interconnected hypotheses that describe the influence of compassionate leadership on individual and organisational outcomes. The framework supposes that compassionate leadership, which is measured through the two models by Shuck and West, fosters a climate of compassion at work (H1), which is understood as a team-level variable (Lilius et al., 2008). This climate of compassion, both received and expressed, is expected to enhance psychological well-being (H2a) and to reduce burnout (H2b). Well-being and burnout are assumed to be inversely associated (H3) and to jointly influence the quality of the organisational learning environment (H4a–H4b), which contributes to job satisfaction (H5b). Job satisfaction is then hypothesised to reduce the intention to leave the organisation (H6b).

Figure 1. The research hypotheses in CompAct project.



3. Aims and objectives

Situated within the wider CompAct project, the objective of this paper is to verify the intercultural adaptation of the questionnaires chosen to measure the variables of the longitudinal study (Figure 1). Most of the tools have not yet been validated in Italian, so it was necessary to translate them and to assess their internal reliability before beginning data collection.

4. Preliminary quantitative research project: pre-test

The following section presents the pre-test phase, describing in detail the instruments used, the composition of the sample, the procedure for data collection and the results.

4.1. Measures

The study includes instruments selected for their alignment with the research objectives and the healthcare context. Where validated Italian versions were unavailable, the questionnaires were adapted using standard procedures (Beaton et al., 2000) and, where necessary, several items were developed specifically for this study.

To measure Compassionate Leadership, two instruments have been selected. The first one, Compassion at Work – Leadership Behaviors Inventory (CAW-LBI; Pansini, Buonomo, & Benevene, in press) is available in Italian and Spanish. The 9 original items assess “noticing”, “acknowledging”, and “responding” dimensions, while 3 additional items have been enhanced to deepen the “understanding” dimension. The final questionnaire includes 12 items rated on a 5-point Likert scale. The second one, Compassionate Leadership Behaviors Inventory (CLBI; Shuck et al., 2019), originally available only in English, was adapted into Italian through a cross-cultural adaptation process (Beaton et al., 2000). The questionnaire consists of 24 items, organized into 6 dimensions — integrity, accountability, presence, empathy, authenticity, and dignity — and rated on a 5-point Likert scale.

Compassion at work was graded using the Compassion at Work Scale (C@W; Lilius et al., 2008). The original English version includes 3 items measuring received compassion. For the CompAct project, the scale was translated and adapted to the Italian context and extended with 3 additional items relating to compassion given to others, defined as the availability to provide emotional and practical support to colleagues in difficulty. All items were rated on a 5-point Likert scale.

For measuring well-being, the PERMA-Profilier has been selected (Butler & Kern, 2016). 14 items from the Italian validated version (Giangrasso, 2021) were included to cover engagement, negative emotions, accomplishment, perceived health, loneliness and general happiness. All items were rated on a 1–10 Likert scale.

To assess burnout, the Italian validated Maslach Burnout Inventory – MBI (Sirigatti & Stefanile, 1993) is available, it includes 22 items on a 7-point frequency scale.

The Supportive Learning Environment subscale (SLEs) of the Learning Organization Survey (LOS-27; Singer et al., 2012) has been chosen to measure the Organizational learning dimension. The scale has been developed from the model by Garvin et al. (2008) and later refined by Bostwick et al. (2025) for the healthcare context. The subscale consists of 7 items, rated on a 7-point Likert scale, and was adapted to the Italian context.

To monitor job satisfaction (JS) and intention to leave (ITL), we decided to maintain the items included in the organizational climate assessment periodically managed at National Level (Belle et al., 2023). Job satisfaction is measured through 2 items rated on a 5-point Likert scale, complemented by a single-item assessing overall perceived satisfaction on a continuous scale from 0 (minimum) to 100 (maximum) (Cortese & Quaglino, 2006). Intention to leave is measured using 5 items rated on a 5-point Likert scale.

4.2. Sample

The sample (N = 50) consisted of healthcare professionals working in the Veneto Region who completed the main set of questionnaires in July 2025. They could choose between an online format and a paper-based format (11 opted for the online format and 39 for the paper-based format).

Regarding the SLEs sub-scale, the sample (N = 57) had a different composition and timing: physicians and nurses were specifically selected for their ability to provide more accurate assessments of organisational learning dynamics, data were collected two months later after the first survey due to organizational reasons.

4.3. Analysis and results

To assess the internal reliability of the questionnaires described in Section 4.1, the collected data were initially organised in Microsoft Excel ® and then cleaned. Missing values were coded as 'NA', enabling R (version 4.5.2) to automatically exclude them from the Cronbach's α calculation (Cronbach, 1951). In addition to the reliability indexes, the confidence intervals associated with each α value were estimated. Both Cronbach's α and the corresponding confidence intervals are shown in table 1.

Table 1. Estimation of Cronbach's alpha with a confidence interval.

Measures	Cronbach's alpha	Confidence interval	Measures	Cronbach's alpha	Confidence interval
CAW – LBI	0.96	0.93 - 0.98	SLEs	0.89	0.84 - 0.93
CLBI	0.97	0.95 - 0.98	MBI	0.82	0.68 - 0.91
C@W	0.83	0.72 - 0.91	JS	0.87	0.79 - 0.94
PERMA	0.85	0.76 - 0.92	ITL	0.92	0.87 - 0.96

Moreover, about the Compassion at Work scale (C@W; Lilius et al., 2008), internal reliability was also estimated by separating the component of compassion received from that of compassion given to others. The Cronbach's α for compassion received was 0.68 (confidence interval: 0.38–0.86), whereas the α for compassion enacted toward others was 0.75 (confidence interval: 0.61–0.91).

5. Conclusion and limits

The analyses indicate good internal reliability across all scales. While ITL, CAW-LBI and CLBI show excellent α values, C@W, PERMA, LOS, MBI and JS still report solid coefficients. Therefore, the pre-test confirmed the robustness of the instruments selected for the CompAct project, providing a reliable methodological basis for future Italian validation and the large-scale administration planned for 2026.

This work contributes to broader research on compassionate leadership, highlighting its potential as a model that can integrate well-being and performance within the healthcare context. The main limitations concern the healthcare-exclusive sample and the preliminary nature of the analyses, which require further testing on larger samples, longitudinal studies and cross-sector comparisons.

Despite these limitations, the findings support the use of the instruments and reinforce the view of compassionate leadership as a strategic lever for organisational sustainability.

References

- Basu, S. (2024). Impact of compassionate leadership on the job satisfaction level of the employees: A case study of Norbuling Rigter College. *Educational Administration: Theory and Practice*, 30(4), 8854-8858.
- Beaton, D. E., Bombardier, C., Guillemin, F., & Ferraz, M. B. (2000). Guidelines for the process of cross-cultural adaptation of self-report measures. *Spine*, 25(24), 3186-3191.
- Belle, N., Cantarelli, P., Pirrotta, L., Scopis, L., Mazzi, C., & D'Orio, G. (2023). *Indagine di clima organizzativo: Sistema sociosanitario regionale del Veneto – 2023*. [Organizational Climate Survey: Regional Social and Healthcare System of Veneto – 2023]. Pisa: Tipografia Editrice Pisana snc.
- Bostwick, A., Ades, A., Rodriguez-Paras, C., Dombroski, M., Lim, C., Ordoñez Paredes, M., Heimall, L., Soorikian, L., Handley, S. C., & Herrick, H. M. (2025). A survey of team culture and learning organization in the resuscitation of neonates with congenital anomalies: A single center experience. *Resuscitation Plus*, 22, 100877.
- Buonomo, I., Pansini, M., Cervai, S., & Benevene, P. (2022a). Compassionate work environments and their role in teachers' life satisfaction: The contribution of perceived collective school performance and burnout. *International Journal of Environmental Research and Public Health*, 19(21), 14206.
- Buonomo, I., Santoro, P. E., Benevene, P., Borrelli, I., Angelini, G., Fiorilli, C., Gualano, M. R., & Moscato, U. (2022b). Buffering the effects of burnout on healthcare professionals' health — The mediating role of compassionate relationships at work in the COVID era. *International Journal of Environmental Research and Public Health*, 19(15), 8966.
- Butler, J., & Kern, M. L. (2016). The PERMA-Profil: A brief multidimensional measure of flourishing. *International Journal of Wellbeing*, 6(3), 1-48.

- Cervai, S., & Blasutig, G. (2025). La leadership nel Terzo Settore. [Leadership in Third Sector] In A. Crismani (Ed.), *Il Terzo Settore come organizzazione della solidarietà* [The Third Sector as the organizational infrastructure of solidarity] (pp. 91-108). Pisa: Pacini Editore.
- Cortese, C. G., & Quaglino, G. P. (2006). The measurement of job satisfaction in organizations: A comparison between a facet scale and a single-item measure. *TPM – Testing, Psychometrics, Methodology in Applied Psychology*, 13(4), 305-316.
- Cronbach, L. J. (1951). Coefficient alpha and the internal structure of tests. *Psychometrika*, 16(3), 297-334.
- Dutton, J. E., Workman, K. M., & Hardin, A. E. (2014). Compassion at work. *Annual Review of Organizational Psychology and Organizational Behavior*, 1(1), 277-304.
- Elínborgardóttir, H. V. (2024). *Compassion in the work environment: Examining the link between compassion and thriving at work via job satisfaction* (Bachelor's thesis, Akureyri University Repository). Retrieved from <https://skemman.is/bitstream/1946/47900/1/Compassion%20in%20the%20Work%20Environment.pdf>
- Garvin, D. A., Edmondson, A. C., & Gino, F. (2008). Is yours a learning organization? *Harvard Business Review*, 86(3), 109-116.
- Giangrasso, B. (2021). Psychometric properties of the PERMA-Profilier as hedonic and eudaimonic well-being measure in an Italian context. *Current Psychology*, 40, 1884-1896.
- Goetz, J. L., Keltner, D., & Simon-Thomas, E. (2010). Compassion: An evolutionary analysis and empirical review. *Psychological Bulletin*, 136(3), 351-374.
- Guinot, J., Miralles, S., Rodríguez-Sánchez, A. M., & Chiva, R. (2020). Do compassionate firms outperform? The role of organizational learning. *Employee Relations*, 42(3), 717-734.
- Jimenez-Caceres, A., Agusti-Boada, A., Caro-Benito, C., & Monistrol, O. (2025). Relationship between different leadership styles of nursing managers and nurses' turnover intention in hospitals: An integrative review. *BMC Nursing*, 24, 939.
- Kanov, J., Maitlis, S., Worline, M. C., Dutton, J. E., Frost, P. J., & Lilius, J. M. (2004). Compassion in organizational life. *American Behavioral Scientist*, 47(6), 808-827.
- Lilius, J. M., Worline, M. C., Maitlis, S., Kanov, J., Dutton, J. E., & Frost, P. (2008). The contours and consequences of compassion at work. *Journal of Organizational Behavior*, 29(2), 193-218.
- Lilius, J. M., Kanov, J. M., Dutton, J. E., Worline, M. C., & Maitlis, S. (2011). Compassion revealed: What we know about compassion at work (and where we need to know more). In K. S. Cameron & G. M. Spreitzer (Eds.), *The Oxford handbook of positive organizational scholarship* (pp. 273-287). Oxford: Oxford University Press.
- Paakkanen, M., Martela, F., Hakanen, J., Uusitalo, L., & Pessi, A. (2021). Awakening compassion in managers: A new emotional skills intervention to improve managerial compassion. *Journal of Business and Psychology*, 36(6), 1095-1108.
- Pansini, M., Buonomo, I., & Benevene, P. (in press). Compassionate leadership: Development and cross-cultural validation of Compassion at Work – Leadership Behaviors Inventory (CAW-LBI). *The Spanish Journal of Psychology*.
- Shuck, B., Alagaraja, M., Immekus, J., Cumberland, D., & Honeycutt-Elliott, M. (2019). Does compassion matter in leadership? A two-stage sequential equal status mixed method exploratory study of compassionate leader behavior and connections to performance in human resource development. *Human Resource Development Quarterly*, 30(4), 537-564.
- Singer, S. J., Moore, S. C., Meterko, M., & Williams, S. (2012). Development of a short-form Learning Organization Survey: The LOS-27. *Medical Care Research and Review*, 69(4), 432-459.
- Sirigatti, S., & Stefanile, C. (1993). Adattamento e taratura per l'Italia [Adaptation and calibration for Italy]. In C. Maslach & S. Jackson (Eds.), *MBI Maslach Burnout Inventory Manuale* (pp. 33-42). Firenze: Organizzazioni Speciali.
- Trzeciak, S., Roberts, B. W., & Mazzairelli, A. J. (2017). Compassionomics: Hypothesis and experimental approach. *Medical Hypotheses*, 107, 92-97.
- Trzeciak, S., & Mazzairelli, A. (2019). *Compassionomics: The revolutionary scientific evidence that caring makes a difference*. Pensacola, FL: Studer Group.
- Wang, W., Creese, J., Karanika-Murray, M., Harris, K., McCarthy, M., Leng, C., & King, C. (2024). Can compassionate leadership of hospital senior leaders help to retain trainee doctors? *BMJ Leader*. Retrieved November 18, 2025, from <https://doi.org/10.1136/leader-2024-001010>
- West, M., Eckert, R., Collins, B., & Chowla, R. (2017). *Caring to change: How compassionate leadership can stimulate innovation in health care*. London: The King's Fund.
- West, M. A. (2021). *Compassionate leadership: Sustaining wisdom, humanity and presence in health and social care*. London: Swirling Leaf Press.