R.I.G.H.T. Leadership:

Scale Development and Validation of a Psychologically Healthy Leadership Model

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Abstract

The R.I.G.H.T. leadership model prescribes five specific behaviors for leaders in organizations to create psychologically healthy workplaces. The aim of this paper was to develop and validate a scale to measure the R.I.G.H.T. leadership behaviours. Collecting data from three samples across two studies (N=108, N=233, N=420), we examined the factor structure and tested the validity of the R.I.G.H.T. Leadership Scale. We found support for the five-factor structure of R.I.G.H.T. leadership. Moreover, we observed a positive association between R.I.G.H.T. leadership and mental health mediated by psychological safety at work. The scale developed in this study can be used in future research involving leadership and mental health.

Keywords: psychosocial factors, psychological health, psychologically health workplaces, leadership, transformational leadership

Employee mental health has become a prominent topic in organizations in the last decade (Dimoff & Kelloway, 2013). Wellness movements have built awareness on the importance psychologically healthy workplaces for organizational productivity and sustainability. Researchers have also responded to this need by developing evidence-based interventions such as Mental Health Awareness Training (MHAT; Dimoff et al., 2016) and Co-worker Mental Health Awareness Training (CHAT; Oakie et al., 2018). These programs resulted in positive changes in the mental healt and well-being of employees within organizations.

Both research and practice in occupational health acknowledge the role of leaders in creating healthy workplaces (Nielsen et al., 2016). Leaders have a unique role in this area because they have the authority and capacity to influence employee health and well-being outcomes directly (e.g., through positive interactions) and indirectly (e.g., through work design; Piccolo et al., 2010). Moreover, leaders not only have an influence over job-related well-being (e.g., job satisfaction; Thibault et al., 2019), but also general health (e.g., chronic pain; Gulseren et al., 2020).

Recognizing the importance of positive leadership in occupational health, researchers have been debating whether health-specific leadership models are needed in this area (Rudolph et al., 2019). Some scholars contend that leadership models that are specific to the health domain are more promising than general leadership models both theoretically and practically because they are potentially more congruent with health outcomes (Schneider et al., 2011). Empirical findings provide support for the incremental validity of healthy leadership above and beyond established general leadership models such as transformational leadership (Boehm et al., 2016).

Following the camp that endorses the development of healthy leadership models, Kelloway et al. (2017) proposed the R.I.G.H.T. model of leadership which aims to create

psychologically healthy workplaces. The R.I.G.H.T. model draws on transformational leadership theory and the American Psychological Association's (APA) Psychologically Healthy Workplaces Model and it prescribes five specific behaviours to organizational leaders. These are (1) **r**ecognition, (2) **i**nvolvement, (3) supporting **g**rowth and development, (4) emphasizing **h**ealth and safety, and (5) fostering **t**eamwork. The R.I.G.H.T. model is a new, behaviourally-focused, practical, and promising model in the area of workplace mental health. The R.I.G.H.T. leadership model differs from existing healthy leadership constructs by its behavioural approach and , more importantly, practical focus. However, there is a need for empirical studies to ensure the effectiveness of this model. As the first step in empirical testing, the current study aims to develop and validate a scale to measure R.I.G.H.T. leadership behaviours.

The Five Practices of the R.I.G.H.T. Model of Leadership

Leaders have a critical role in designing healthy organizational processes and discussing health. Indeed, healthy leadership behaviours are more demanding than designing organizational practices as they require daily practice and consistency. Transformational leadership, which is known as a successful general leadership model in enhancing employee health and well-being, guides the R.I.G.H.T. model of leadership (Kelloway et al., 2017). The theory of transformational leadership builds on the assumption that employees have potential and leaders are responsible for turning this potential into performance through effective and ethical interactions (Bass, 1995). These behaviours are simply (1) inspiring employees (i.e., inspirational motivation), (2) attending their individual needs (i.e., individualized consideration), (3) encouraging employees to use their potential (i.e., intellectual stimulation), and (4) serving as an ethical role model (i.e., idealized influence; Bass, 1995). Based on the theory of transformational

leadership, the R.I.G.H.T. leadership model is also based on the assumption that employees are valuable and leaders should honour this.

Besides the transformational leadership model, the R.I.G.H.T. model of leadership also mimics APA's Psychologically Healthy Workplaces Model (Grawitch & Ballard, 2016). The APA's model involves five organizational practices (i.e., involvement, work-life balance, health and safety, employee growth and development, and employee recognition; Grawitch et al., 2006). These practices are conveyed through communication and, in return, increased employee well-being and organizational functioning are expected (Grawitch et al., 2006). Evidence supports the effectiveness of this model in terms of employee health and well-being (for a review, please see Grawitch & Ballard, 2016). As can be seen, APA's psychologically healthy wokplaces model emphasizes the relational aspect of occupationl health instead of organizational processes (Grawitch & Ballard, 2016).

Recognition

The first practice of the R.I.G.H.T. leadership model is recognizing employees. Recognition refers to appreciating a person or a job well-done using various reinforcement methods such as praise or a reward (Brun & Dugas, 2008). This is consistent with the inspirational motivation dimension of transformational leadership. Brun and Dugas (2008) identify three ways leaders could recognize their employees. These are (1) personal recognition (i.e., recognizing the potential of workers), (2) process recognition (i.e., recognizing the efforts of workers), and (3) product recognition (i.e., recognizing the outputs produced by workers). Besides the formal recognition initiatives such as pay for performance or employee of the month (Long & Shields, 2010), leaders can also show their appreciation through simple daily acts such as praising performance or verbally celebrating an achievement. Montani et al. (2017) observed

that employees who were frequently recognized by their managers perceived their jobs to be more meaningful and showed higher involvement at work. Similarly, Merino and Privado (2015) found that employees who received recognition from their supervisors and peers reported higher levels of well-being, which was mediated by psychological functioning.

Involvement

Akin to the individual consideration dimension of transformational leadership, the R.I.G.H.T. leadership model encourages leaders to involve employees in organizational decisions, especially if the decisions concern them. Grawitch et al. (2009) define involvement practices as a spectrum ranging from employee surveys (i.e., low involvement) to self-managed work teams (i.e., high involvement). The majority of the studies that test the outcomes of employee involvement focus on innovation and performance (e.g., Andries & Czarnitzki, 2014; Yang & Konrad, 2011). In addition, a limited number of studies show that when employees are given a voice, they report higher levels of positive organizational attitudes and general well-being. For example, Carmeli et al. (2010) found that employees under inclusive leaders (e.g., leaders who are open to hearing new ideas or who seek feedback from employees) felt psychologically safe to share their opinions, which increased involvement in creative work in return. Similarly, in a multi-level study, Wallace et al. (2016) found a positive correlation between employee involvement climate and employee thriving at work. Lastly, Boxall and Macky (2014) observed that involvement practices such as giving autonomy to employees and inviting them in decision-making were positively associated with job satisfaction and work-life balance, but not with reduced levels of stress or fatigue.

Growth and Development

The intellectual stimulation dimension of transformational leadership relates to leader behaviours that support employees' growth and development (Bass, 1995). Similarly, the R.I.G.H.T. leadership model invites leaders to provide developmental opportunities for their employees. These opportunities can be in many forms, such as providing resources for self-development or assigning new and challenging responsibilities. The relationship between learning opportunities and positive organizational attitudes is not new in the field of organizational psychology. Skill acquisition and knowledge expansion are related to increased levels of desirable organizational attitudes such as job satisfaction and organizational commitment (Browne, 2000; Grawitch et al., 2007). Growth and development opportunities are also positively linked to well-being (D'Antonio, 2018; Grawitch et al., 2007).

Health and Safety

The individualized consideration dimension of transformational leadership is concerned with employees' health and safety (Bass, 1995). Similarly, health and safety also is an important element of R.I.G.H.T. leadership. Leaders can communicate the importance of health and safety both verbally (e.g., talking about self-care or mental health) and non-verbally (e.g., prioritizing health and safety over financial gains in organizational decisions). The work-life balance practice in APA's Psychologically Healthy Workplaces Model is also covered in the health and safety dimension of R.I.G.H.T. leadership. There are many examples of the association between health and safety behaviours of leaders and positive health and safety outcomes in the literature (e.g., Dimoff et al., 2016; Franke et al., 2014; Mullen & Kelloway, 2009). Similar to the other dimensions of R.I.G.H.T. leadership, health and safety behaviours are positively associated with job-related well-being and general health (for a review, please see Rudolph et al., 2019).

Teamwork

The last practice of R.I.G.H.T. leadership is fostering teamwork. Teamwork is not traditionally recognized as an element of healthy workplaces. Ironically, many employees work in a team. Moreover, relationships and interactions between leaders and employees usually take place in team settings as well as on an individual level (Schermuly & Meyer, 2016). Teams have a particularly important role in creating a psychologically safe environment (Edmondson & Mogelof, 2006). For example, Paulin and Griffin (2016) found that Australian employees who worked in a civil team environment reported higher levels of well-being. Similarly, in a Finnish study, Sinokki et al. (2009) observed that employees working in a poor team climate reported higher levels of depressive symptoms. Because leaders have a significant amount of control over their teams and team environment, through fostering positive teamwork, they can contribute to both employee job-related affect and general mental health. Considering all five R.I.G.H.T. leadership dimensions, we hypothesized that:

> **H1:** *The R.I.G.H.T. leadership scale will have five dimensions: (1) recognition, (2) involvement, (3) growth and development, (4) health and safety, and (5) teamwork.*

As can be seen above, previous research showed positive associations between individual dimensions of R.I.G.H.T. leadership and occupational health in different research settings. Leaders can enhance their employees' mental health both directly and indirectly. Direct links between leader behaviours and employee health outcomes are usually driven by daily interactions (Breevaart et al., 2014). For example, when employees perceive that their efforts are appreciated (i.e., recognition), they could feel more confident in their abilities to cope with problems. Therefore, we hypothesized that:

> **H2:** *R.I.G.H.T. Leadership and mental health will be positively associated.*

A potential mechanism through which R.I.G.H.T. leadership behaviours lead to mental health can be through heightened psychological safety. Psychological safety refers to the opportunity to take risks without being judged or punished by the team members (Edmondson, 1999). As previous research also suggested (e.g., Carmeli et al., 2010; Edmondson & Mogelof, 2006) when leaders invite employees to share their opinions, are thankful for their employees' efforts, or create a positive team environment, employees perceive their work environment as a safe place. They can voice their opinions without feeling hesitant or fear of being judged or ridiculed. This can, in turn, contribute to their well-being. Therefore, we hypothesized that:

> **H4:** *Psychological safety will mediate the relationship between R.I.G.H.T. leadership and mental health.*

Overview of Other Healthy Leadership Models

The term "healthy leadership" refers to health-specific leadership models. The goal of these healthy leadership models is to improve physical, psychological, and social health in organizations (Rudolph et al., 2019). Researchers have developed many different healthy leadership models over the last two decades. Some of these include health-promoting leadership (Eriksson, 2011), health-oriented leadership (Franke & Felfe, 2011) health-focused leadership (Boehm & Baumgaertner, 2016), health-specific leadership (Gurt et al., 2011), individual leadership for health promotion (Anderson et al., 2005), and salutogenic leadership (Eberz & Antoni, 2018; for a review, please see Rudolph et al., 2019). The primary argument in developing these models is to establish strong associations with leadership and health outcomes through domain congruence between the predictor and outcomes. Although not all of these models received equally high levels of empirical attention, several of them (i.e., salutogenic leadership; Eberz & Antoni, 2016; health-oriented leadership; Franke et al., 2014; health- and

development-promoting leadership; Vincent, 2011) provided incremental validity in predicting

some health outcomes such as general health status, irritation, health complaints, and sense of

coherence above and beyond transformational leadership (Eberz & Antoni, 2016; Franke et al.,

2014; Vincent, 2011).

Among the 13 healthy leadership constructs, two of them received a great deal of

attention by researchers: the health-promoting leadership model (Eriksson, 2011) and the health-

oriented leadership model (Franke & Felfe, 2014). Health-promoting leadership involves

showing leadership behaviours that create a healthy workplace culture and having values that

promote employee health and well-being (Eriksson, 2011). Jiménez et al. (2017) developed a

scale to measure health-promoting leadership. The scale assesses health-promoting leadership

through seven dimensions (i.e., health awareness, low workload, control, reward, community,

fairness, and values). Despite its popularity, the model received two major criticisms. First, the

leader behaviours proposed in the model are vague to the point that they could be almost any

behaviour. The second criticism involves construct contamination or construct labelling.

Behaviours and attributes are intertwined in the model and in the measure, although the theory

refers to them as "behaviours" (Rudolph et al., 2019).

The other popular health leadership construct is health-oriented leadership developed by

Franke and Felfe (2011). This model has two components: self-care and staff-care. Self-care

involves leaders' management of their own health whereas the staff-care component pertains to

expressing health-related values, creating health awareness, and exhibiting healthy behaviours.

The arguments raised to criticize the health-promoting leadership model also apply to the health-

oriented leadership. For example, values, awareness, and behaviours that make up the construct

comprise more than just leadership behaviours. Moreover, there could be several complications

measuring this model (i.e., self-care and staff-care) as they refer to a dyadic relationship instead of leader behaviours (Rudolph et al., 2019).

The R.I.G.H.T. leadership model is different from the constructs that are briefly reviewed above and it offers several strengths. First and foremost, R.I.G.H.T. leadership prescribes specific leader behaviours. These behaviours are neither vague nor confounded with attitudes and values. Second, the R.I.G.H.T. leadership model is based on a psychologically healthy workplace model and it focuses on psychological health. The narrow boundaries of R.I.G.H.T. leadership means that the relationship between leadership and health outcomes are likely stronger due to increased domain congruence. Last, R.I.G.H.T. leadership is a pragmatic model that offers easy implementation in practice.

The current research

We present two studies exploring the nature and consequences of R.I.G.H.T. leadership. In Study 1, we present the initial development of a scale to assess R.I.G.H.T. leadership. In Study 2, we test the relationships between R.I.G.H.T. leadership and hypothesized outcomes (see Figure 1).

--- Figure 1 about here ---

Study 1

The focus of this study was on the development of a scale to measure R.I.G.H.T. leadership as described by Kelloway et al. (2017).

Method

Participants

Sample 1 participants were 108 employees of a long-term care facility. Participants reported an average age of 44.78 years (*SD* = 12.74 years) and had been employed for an average

of 9.97 years ($SD = 7.97$ years). The vast majority (97%) of respondents were female, reflecting

the workforce composition.

Sample 2 participants were 233 employees of a long-term care facility. Participants

reported an average age of 47.72 years ($SD = 13.06$ years). Approximately 88% of respondents

were female (N=205). At the request of the employer, no further demographic information was

collected.

Measures and Procedures

The authors of the current study initially generated 50 items (10 per dimension) to assess

the dimensions of Recognition, Involvement, Growth and development, Health and safety, and

Teamwork. Participants in the Sample 1 completed the 50-item measure as part of larger survey.

Participants in Sample 2 completed a shorter 15-item measure (a reduced number of items based

on exploratory principal components analyses of the original 50 items, see results below). Items

were in Likert-format, with anchors ranging from 1 (*Never*) to 7 (*Always*). Higher scores

reflected higher levels of R.I.G.H.T. leadership behaviors.

In both cases, paper surveys were distributed at the facility to all employees and returned

through a survey collection box. Each individual who completed a survey received a lottery

ticket from their executive director as a token of appreciation. The study was approved by the

Research Ethics Board of the second, and third authors' university (file number 20-097) and

participants provided a written consent prior to answering the survey.

Results

We began by conducting a series of exploratory principal components analyses using the

data from Sample 1. Each dimension (i.e., 10 items) was analysed separately. In the initial

analysis a one-factor solution was extracted for each dimension accounting for the majority of

item variance (Recognition= 84.96%; Involvement = 75.64%; Growth and Development =

80.20%; Health and Safety = 76.53%; Teamwork = 76.76%). To shorten the scale, we then

identified the three items that loaded on each factor and subjected them to another round of

exploratory principal components analyses. Again, the five dimensions explained substantial

amounts of item variance (Recognition= 94.69%; Involvement = 91.74%; Growth and

Development = 87.89%; Health and Safety = 94.42%; Teamwork = 91.51%). Each of the

dimensions demonstrated satisfactory internal consistency (see Table 1). As shown in Table 1 the

scales were strongly inter-correlated, the magnitude of the intercorrelations did not suggest

redundancy.

<div align="center">--- Table 1 about here ---</div>

Using Sample 2 data, we estimated a series of exploratory structural equation models

(ESEM; Asparouhov & Muthén, 2009) to assess the factor structure of the 15-item instrument.

ESEM combines features of both exploratory and confirmatory factor analysis with researchers

specifying the number of factors but allowing items to load on any of the estimated factors. Like

confirmatory factor analysis, ESEM uses maximum likelihood estimation and results in

parameter estimates and goodness of fit indices (Asparouhov & Muthén, 2009; Marsh et al.,

2009).

The one-factor (χ^2 ($N = 233$, 90) = 1335.87, $p < .01$; CFI = .75; TLI = .70; RMSEA =

.24), two-factor (χ^2 ($N = 233$, 76) = 928.32, $p < .01$; CFI = .83; TLI = .76; RMSEA = .22), and

three-factor (χ^2 ($N = 233$, 63) = 498.55, $p < .01$; CFI = .91; TLI = .85; RMSEA = .17) models all

provided poor fits to the data. Although the four-factor model provided a marginal fit (χ^2 ($N =$

233, 51) = 255.71, $p < .01$; CFI = .96; TLI = .91; RMSEA = .13), the five-factor model provided

a substantially better and acceptable fit to the data (χ^2 ($N = 233, 40) = 66.53$, $p < .01$; CFI = 1.00; TLI = .99; RMSEA = .05). Again, as shown in Table 1, the five dimensions were strongly correlated with each other – although not to a level that suggests redundancy and each dimension demonstrated satisfactory internal consistency.

Study 2

Method

Participants

Four hundred and twenty participants (68.1% female) were recruited on a voluntary basis through Qualtrics, an online survey system using the Qualtrics panel service. Participants were recruited and compensated by Qualtrics. It was required that each participant be 18 years of age or older, fluent in English, and currently employed. The average age was 40.68 years ($SD = 11.85$ years) and had been employed by their current organization for an average of 9.11 years ($SD = 8.34$ years).

The study was approved by the Research Ethics Board of the second, and third authors' university (file number 18-201). Participants provided consent prior to answering the survey by agreeing on the consent form located at the front page of the survey.

Measures and Procedure

Participants completed the online questionnaire using Qualtrics. The questionnaire included the 15-item R.I.G.H.T. measure developed in Study 1. In addition, the questionnaire also consisted of six-items from the psychological safety scale (anchors ranging from 1 for *strongly disagree* to 7 for *strongly agree* developed by Edmondson (1999), and the 12-item General Health Questionnaire (GHQ; Banks et al., 1980). Negatively worded items in the psychological safety scale and GHQ were reverse coded. Higher scores indicated higher levels of

R.I.G.H.T. leadership behaviors, psychological safety, and positive mental health in the final

version of the dataset.

Results

We began with a confirmatory factor analysis contrasting the fit of a unidimensional

model with the hypothesized five-factor model of R.I.G.H.T. leadership. As expected the

unidimensional model provided a poor fit to the data (χ^2 ($N = 420$, 90) = 2005.48, $p < .001$; CFI

= .74, TLI = .70; RMSEA = .23) with the five-factor model providing a better, and acceptable, fit

to the data (χ^2 ($N = 420$, 80) =2005.48, $p < .001$; CFI = .98, TLI = .98; RMSEA = .06, $\Delta\chi^2$ ($N =$

420, 10) = 1795.03, $p < .001$). Standardized parameter estimates for the five-factor model are

presented in Table 2. Again, the factors are substantially intercorrelated but not to the extent that

they would indicate redundancy. Table 3 presents the correlations between the five R.I.G.H.T.

leadership factors as well as their Cronbach's alphas.

--- Table 2 about here ---

--- Table 3 about here ---

The hypothesized model (see Figure 1) was estimated as a latent variable model. We used

the five dimensions of R.I.G.H.T. leadership to represent the construct. Psychological safety was

indicated by three, two-item parcels. Finally, GHQ was constructed by three, four-item parcels

which were used as indicators for the mental health variable. The model (see Figure 1) provided

an acceptable fit to the data (χ^2($N = 420$, 41) = 174.673, $p < .001$; CFI = .96; TLI = .95; RMSEA

= .09). We also attempted to model a factor to account for the existance of common method

variance (i.e., a factor on which all indicators loaded that was orthogonal to the substantive

factors) but this resulted in a matrix that was not positive definite and an acceptable solution

could not be obtained.

Standardized parameters are presented in Figure 2. As shown, psychological safety (β = .79, $p < .001$) was positively associated with R.I.G.H.T. leadership and mental health was positively associated with psychological safety (β = .54, $p < .001$) . However, R.I.G.H.T. leadership was not directly related to mental health (β = .00, $p > .05$) . We estimated the hypothesized indirect effect using bias-corrected confidence intervals based on a bootstrap of 5000 samples. Our results suggested a significant indirect effect of R.I.G.H.T. leadership on mental health through psychological safety (β = .42, $p < .001$).

--- Figure 2 about here ---

General Discussion

The purpose of this paper was to create and validate a measure of transformational leadership that was in line with the APA's psychologically workplace model. In Study 1, we created a 15-item (three items measuring Recognition, three items measuring Involvement, three items measuring supporting Growth and development, three items measuring emphasizing Health and safety, and three items measuring fostering Teamwork) measure. In the full 15-item version of the R.I.G.H.T. leadership scale, the five-factor structure was supported and provided the best fit to the data. All five factors were positively correlated but not so correlated as to show construct redundancy. These relationships were shown in both Sample 1 and Sample 2 of Study 1. Study 2 also supported the five-factor model of the R.I.G.H.T. leadership scale. The factor structure of the scale supports the five-dimensional model of the R.I.G.H.T. model of leadership as introduced by Kelloway et al. (2017).

In addition to the confirmatory factor analysis, Study 2 also validated the R.I.G.H.T. leadership scale by examining the relationship between R.I.G.H.T. leadership (15-item version), psychological safety, and mental health. R.I.G.H.T. leadership positively predicted psychological

safety but did not directly predict mental health. As expected, R.I.G.H.T. leadership's relationship with mental health was mediated by psychological safety.

These findings support the role and importance of leadership on employee health and well-being; and therefore, aligned with the existing studies on this topic (Gulseren et al., 2019; Thibault et al., 2019). However, previous research argues that leaders can have both indirect and direct effect on employees (Gulseren et al., 2019; Thibault et al., 2019). Our results show that R.I.G.H.T leaders exert an indirect effect only on employees' mental health. Leaders with R.I.G.H.T. behaviors show their influence through regulating the work environment (Ortega et al., 2014). The results of this study show that in the presence of this mechanism, the effect of R.I.G.H.T. leadership is transmitted through a change in the social environment (i.e., psychological safety).

Limitations and future research

While this paper used multiple samples, all data are cross-sectional self-report thereby limiting causal inference. The use of mono-source data also increases the possibility of the findings being contaminated by common method variance (CMV). CMV can inflate relationships artificially. However, this concern is somewhat mitigated as CMV would enhance the likelihood of support for a unidimensional, rather than multidimensional, factor solution (Harman, 1976). The results support a multifactor solution, suggesting that CMV was not a major factor in these results. That said, future research should incorporate both longitudinal research designs and the use of non-self-report measures. For instance, research could examine the relationship between subordinate-rated R.I.G.H.T. leadership and leader-rated employee behaviour (e.g., absenteeism, performance, civility).

While the current paper developed and assessed the reliability and validity of the

R.I.G.H.T. leadership scale, further development of the scale is both encouraged and warranted.

We developed a five-factor 15-item scale. The relationships between these two versions of the

R.I.G.H.T. leadership measure and other key organizational variables and health outcomes

should be compared to ensure both measures have similar relationships with these important

variables. Additionally, future research should examine the individual relationships between key

variables and each of the five R.I.G.H.T. leadership factors.

Theoretical and practical implications

The theoretical implications of this paper extends R.I.G.H.T. model of leadership and

was the first attempt in measuring R.I.G.H.T. leadership behaviours and the R.I.G.H.T. model of

leadership. Using the scale developed in this study, researchers can quantify the R.I.G.H.T.

leadership behaviours enacted by leaders and establish R.I.G.H.T. leadership's relationships with

other organizational constructs.

There are many studies that explore the effectiveness of transformational leadership

interventions. A transformational leadership intervention could be created based on the

R.I.G.H.T. model of leadership. Future studies should examine the impact of such an

intervention using the R.I.G.H.T. leadership scale. Furthermore, the effectiveness of typical

transformational leadership interventions could be compared to the effectiveness of an

intervention using the R.I.G.H.T. model of leadership.

Conclusion

Although APA's Psychologically Healthy Workplaces Model has been around for a long

time, it is generally used as a heuristic model in practice instead of a research tool. Combining

transformational leadership theory with APA's model, R.I.G.H.T. leadership suggested a

leadership model that is theoretically driven and practically promising. Despite its potential,

making conclusions about the outcomes of R.I.G.H.T. leadership was impossible due to the lack

of a measure. In the current study, we developed the R.I.G.H.T. leadership scale and provided

the first empirical findings using the scores obtained from that measure. Using the R.I.G.H.T.

leadership scale, researchers can examine the relationship between R.I.G.H.T. leadership and

other organizational variables.

References

Anderson, D., Plotnikoff, R. C., Raine, K., & Barrett, L. (2005). Development of measures of individual leadership for health promotion. *Leadership in Health Services, 18*, 1-12.

Andries, P., & Czarnitzki, D. (2014). Small firm innovation performance and employee involvement. *Small Business Economics*, *43*(1), 21-38.

Asparouhov, T., & Muthén, B. (2009). Exploratory structural equation modeling. Structural *Equation Modeling, 16*, 397-438.

Banks, M. H., Clegg, C. W., Jackson, P. R., Kemp, N. J., Stafford, E. M., & Wall, T. D. (1980). The use of the General Health Questionnaire as an indicator of mental health in occupational studies. *Journal of Occupational Psychology, 53*(3), 187-194.

Bass, B. M. (1995). Theory of transformational leadership redux. *Leadership Quarterly, 6,* 463-478.

Boehm, S. A., & Baumgaertner, M. K. (2016). Gesünder führen. *Harvard Business Manager, 38*(2), 6-9.

Boehm, S. A., Baumgärtner, M. K., & Kreissner, L. M. (2016). The relationship between leadership and health: A comparison of general and health-focused leadership approaches. In *Healthy at Work* (pp. 87-102). Springer, Cham.

Boxall, P., & Macky, K. (2014). High-involvement work processes, work intensification and employee well-being. *Work, Employment and Society*, *28*(6), 963-984.

Breevaart, K., Bakker, A., Hetland, J., Demerouti, E., Olsen, O. K., & Espevik, R. (2014). Daily transactional and transformational leadership and daily employee engagement. *Journal of Occupational and Organizational Psychology*, *87*(1), 138-157.

Browne, J. H. (2000). Benchmarking HRM practices in healthy work organizations. *American Business Review, 18*(2), 55-61.

Brun, J. P., & Dugas, N. (2008). An analysis of employee recognition: Perspectives on human resources practices. *The International Journal of Human Resource Management*, *19*(4), 716-730.

Carmeli, A., Reiter-Palmon, R., & Ziv, E. (2010). Inclusive leadership and employee involvement in creative tasks in the workplace: The mediating role of psychological safety. *Creativity Research Journal*, *22*(3), 250-260.

D'Antonio, A. C. (2018). Coaching psychology and positive psychology in work and organizational psychology. *The Psychologist-Manager Journal, 21*(2), 130-150.

Dimoff, J. K., & Kelloway, E. K. (2013). Bridging the gap: Workplace mental health research in Canada. *Canadian Psychology/Psychologie canadienne, 54*(4), 203-212.

Dimoff, J. K., Kelloway, E. K., & Burnstein, M. D. (2016). Mental health awareness training (MHAT): The development and evaluation of an intervention for workplace leaders. *International Journal of Stress Management, 23*(2), 167-189.

Eberz, S., & Antoni, C. H. (2016). The Systemic Salutogenic Interaction Modell (SSIM) - A holistic approach for explanation and development of health-promoting interactions between leaders and employees. Gruppe. Interaktion. Organisation. *Zeitschrift für Angewandte Organisationspsychologie, 47*(3), 265-273.

Edmondson, A. (1999). Psychological safety and learning behavior in work teams. *Administrative Science Quarterly*, *44*(2), 350-383.

Edmondson, A. C., & Mogelof, J. P. (2006). Explaining psychological safety in innovation teams: organizational culture, team dynamics, or personality?. In *Creativity and innovation in organizational teams* (pp. 129-156). Psychology Press.

Eriksson, A. (2011). Health-promoting leadership: A study of the concept and critical conditions for implementation and evaluation. (Unpublished doctoral dissertation). Nordic School of Public Health NHV, Göteborg, Sweden.

Franke, F., & Felfe, J. (2011). Diagnose gesundheitsförderlicher führung - Das instrument "health-oriented leadership". In B. Badura, A. Ducki, H. Schröder, J. Klose, & K. Macco (Eds.), *Fehlzeiten-Report* (pp. 3-13). Heidelberg: Springer.

Franke, F., Felfe, J., & Pundt, A. (2014). The impact of health-oriented leadership on follower health: Development and test of a new instrument measuring health-promoting leadership. *German Journal of Human Resource Management*, *28*(1-2), 139-161.

Grawitch, M. J., & Ballard, D. W. (Eds.). (2016). The psychologically healthy workplace: Building a win-win environment for organizations and employees. American Psychological Association.

Grawitch, M. J., Gottschalk, M., & Munz, D. C. (2006). The path to a healthy workplace: A critical review linking healthy workplace practices, employee well-being, and organizational improvements. *Consulting Psychology Journal: Practice and Research, 58*(3), 129-147.

Grawitch, M. J., Ledford, G. E., Jr., Ballard, D. W., & Barber, L. K. (2009). Leading the healthy workforce: The integral role of employee involvement. *Consulting Psychology Journal: Practice and Research, 61*(2), 122-135.

Grawitch, M. J., Trares, S., & Kohler, J. M. (2007). Healthy workplace practices and employee outcomes. *International Journal of Stress Management, 14*(3), 275-293.

Gulseren, D., Thibault, T., & Kelloway, E. K. (2019). The role and importance of leadership in creating psychologically healthy workplaces. In Ronald Burke & Astrid Richardsen (Eds*.), Creating psychologically healthy workplaces* (197-214*).* Edward Elgar: UK.

Gurt, J., Schwennen, C., & Elke, G. (2011). Health-specific leadership: Is there an association between leader consideration for the health of employees and their strain and wellbeing? *Work & Stress, 25*(2), 108-127.

Harman, H. H. (1976). Modern Factor Analysis, 3rd ed. Chicago, IL: Univ. Chicago Press.

Jiménez, P., Winkler, B., & Dunkl, A. (2017). Creating a healthy working environment with leadership: The concept of health-promoting leadership. *The International Journal of Human Resource Management, 28*(17), 2430-2448.

Kelloway, E. K., Penney, S. A., & Dimoff, J. K. (2017). Leading the psychologically healthy workplace the R.I.G.H.T. way. In E. K. Kelloway, K. Nielsen, & J. Dimoff (Eds.), *Leading to occupational health and safety: How leadership behaviours impact organizational safety and well-being* (p. 113-127). Chichester, West Sussex, UK: John Wiley & Sons.

Long, R. J., & Shields, J. L. (2010). From pay to praise? Non-cash employee recognition in Canadian and Australian firms. *The International Journal of Human Resource Management, 21*(8), 1145-1172.

Marsh, H. W., Muthén, B., Asparouhov, T., Lüdtke, O., Robitzsch, A., Morin, A. J. S., & Trautwein, U. (2009). Exploratory structural equation modeling, integrating CFA and

EFA: Application to students' evaluations of university teaching. *Structural Equation*

   Modeling, 16, 439-476.

Merino, M. D., & Privado, J. (2015). Does employee recognition affect positive psychological

   functioning and well-being? *Spanish Journal of Psychology,* 18, E64.

   https://doi.org/10.1017/sjp.2015.67

Montani, F., Boudrias, J.-S., & Pigeon, M. (2017). Employee recognition, meaningfulness and

   behavioral involvement: Test of a moderated mediation model. *The International Journal*

   of Human Resource Management, 1-29. https://doi.org/10.1080/09585192.2017.1288153

Mullen, J. E., & Kelloway, E. K. (2009). Safety leadership: A longitudinal study of the effects of

   transformational leadership on safety outcomes. *Journal of Occupational and*

   Organizational Psychology, *82*(2), 253-272.

Nielsen, K., Kelloway, E. K., & Taris, T. W. (2016). Leading well: Leadership and employee

   safety and wellbeing. *Work & Stress*, *30*(4), 395-396.

Oakie, T., Smith, N. A., Dimoff, J. K., & Kelloway, E. K. (2018). Coworker health awareness

   training: An evaluation. *Journal of Applied Biobehavioural Research*, *23*(4), e12148.

   https://doi.org/10.1111/jabr.12148

Ortega, A., Van den Bossche, P., Sánchez-Manzanares, M., Rico, R., & Gil, F. (2014). The

   influence of change-oriented leadership and psychological safety on team learning in

   healthcare teams. *Journal of Business and Psychology*, *29*(2), 311-321.

Paulin, D., & Griffin, B. (2016). The relationships between incivility, team climate for incivility

   and job-related employee well-being: A multilevel analysis. *Work & Stress*, *30*(2), 132-

   151.

Piccolo, R. F., Greenbaum, R., Hartog, D. N. D., & Folger, R. (2010). The relationship between ethical leadership and core job characteristics. *Journal of Organizational Behavior*, *31*(2-3), 259-278.

Rudolph, C. W., Murphy, L. D., & Zacher, H. (2019). A systematic review and critique of research on "healthy leadership". *The Leadership Quarterly*, 101335.

Schermuly, C. C., & Meyer, B. (2016). Good relationships at work: The effects of Leader-Member Exchange and Team-Member Exchange on psychological empowerment, emotional exhaustion, and depression. *Journal of Organizational Behavior*, *37*(5), 673-691.

Schneider, B., Ehrhart, M. G., & Macey, W. H. (2011). Perspectives on organizational climate and culture. In S. Zedeck (Ed.), *APA handbooks in psychology. APA handbook of industrial and organizational psychology, Vol. 1. Building and developing the organization* (p. 373-414). American Psychological Association.

Sinokki, M., Hinkka, K., Ahola, K., Koskinen, S., Klaukka, T., Kivimäki, M., ... & Virtanen, M. (2009). The association between team climate at work and mental health in the Finnish Health 2000 Study. *Occupational and Environmental Medicine*, *66*(8), 523-528.

Thibault, T., Biricik Gulseren, D., & Kelloway, E. K. (2019). The benefits of transformational leadership and transformational leadership training on health and safety outcomes. In Ronald Burke & Astrid Richardsen (Eds.), *Increasing occupational health and safety in workplaces: Research and practice* (pp. 334-348). Edward Elgar: UK.

Vincent, S. (2011). Health and development-promoting leadership: an analysis instrument. In B. Badura, A. Ducki, H. Schröder, J. Klose, & K. Macco (Eds.), *Fehlzeiten-Report* (pp. 49-60). Heidelberg: Springer.

Wallace, J. C., Butts, M. M., Johnson, P. D., Stevens, F. G., & Smith, M. B. (2016). A multilevel

model of employee innovation: Understanding the effects of regulatory focus, thriving,

and employee involvement climate. *Journal of Management*, *42*(4), 982-1004.

Yang, Y., & Konrad, A. M. (2011). Diversity and organizational innovation: The role of

employee involvement. *Journal of Organizational Behavior*, *32*(8), 1062-1083.

Figure 1. Hypothesized model depicting the relationship between R.I.G.H.T. leadership,
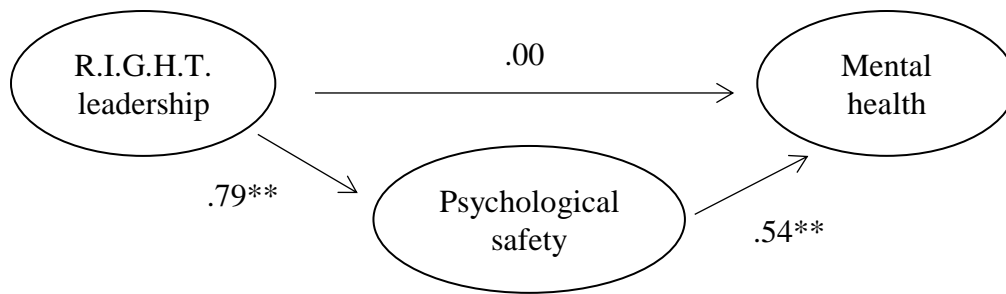
psychological safety, and mental health

Figure 2. Standardized parameters for the relationship between R.I.G.H.T. leadership,

psychological safety, and mental health (** *p* < .001)

Table 1

Descriptive statistics and correlations

	M	*SD*	1	2	3	4	5	*M*	*SD*	α
Recognition	3.94	1.73		.75	.73	.70	.65	4.24	1.78	.95
Involvement	4.27	1.55	.80		.76	.65	.57	4.27	1.92	.95
Growth and Development	3.98	1.76	.81	.84		.69	.61	4.42	1.78	.94
Heath and Safety	4.34	1.71	.77	.73	.78		.65	4.87	1.61	.95
Teamwork	4.65	1.64	.81	.78	.78	.76				.91
α			.97	.96	.93	.97	.95			

Note: Data from Sample 1 (*N*=108) below the diagonal; Data from Sample 2 (*N*=233) above the diagonal. All correlations *p* < .01.

Table 2

Study 2: Standardized parameters for the five factor model

Item	F1	F2	F3	F4	F5
Notices when I do good work	.89				
Thanks me for the work I do	.94				
Tells me when I've done a good job	.88				
Asks for my input when making decisions		.94			
Gives me a say in decisions		.94			
Asks for suggestions		.92			
Identifies opportunities to apply my skills			.87		
Supports my growth and development			.95		
Promotes my growth and developmental opportunities			.96		
Openly discusses the importance of health and safety				.94	
Shares information about health and safety resources				.93	
Addresses health and safety issues in the workplace				.92	
Is concerned about my team members' well-being					.87
Encourages my team members to collaborate with one another					.89
Clearly defines each team members' roles and responsibilities					.86

Note: All parameters p < .001

Table 3

Study 2 correlations between the R.I.G.H.T. leadership factors

	F1	F2	F3	F4	F5
F1	(.93)				
F2	.72	(.95)			
F3	.80	.74	(.95)		
F4	.61	.62	.71	(.95)	
F5	.74	.65	.82	.67	(.91)

Notes. All parameters $p < .001$. Interfactor correlations are the disattenuated estimates.

Alphas on the diagonal