Current Directions in Psychological Science

An Evidence-Based Model of Work Engagement

Arnold B. Bakker Current Directions in Psychological Science 2011 20: 265 DOI: 10.1177/0963721411414534

The online version of this article can be found at: http://cdp.sagepub.com/content/20/4/265

Published by: SAGE

http://www.sagepublications.com

On behalf of:

ODS ASSOCIATION FOR PSYCHOLOGICAL SCIENCE

Association for Psychological Science

Additional services and information for Current Directions in Psychological Science can be found at:

Email Alerts: http://cdp.sagepub.com/cgi/alerts

Subscriptions: http://cdp.sagepub.com/subscriptions

Reprints: http://www.sagepub.com/journalsReprints.nav

Permissions: http://www.sagepub.com/journalsPermissions.nav

>> Version of Record - Aug 8, 2011

What is This?



An Evidence-Based Model of Work Engagement

Current Directions in Psychological Science 20(4) 265–269 © The Author(s) 2011 Reprints and permission: sagepub.com/journalsPermissions.nav DOI: 10.1177/096372141141534 http://cdps.sagepub.com



Arnold B. Bakker

¹Erasmus University Rotterdam

Abstract

Employees who are engaged in their work are fully connected with their work roles. They are bursting with energy, dedicated to their work, and immersed in their work activities. This article presents an overview of the concept of work engagement. I discuss the antecedents and consequences of engagement. The review shows that job and personal resources are the main predictors of engagement. These resources gain their salience in the context of high job demands. Engaged workers are more open to new information, more productive, and more willing to go the extra mile. Moreover, engaged workers proactively change their work environment in order to stay engaged. The findings of previous studies are integrated in an overall model that can be used to develop work engagement and advance job performance in today's workplace.

Keywords

employee engagement, JD-R model, job crafting, job performance, work engagement

Do you remember the last time you were really fascinated by a speaker who was explaining something very energetically and passionately? Do you recall the occasion you had a connecting flight and airport service officers were doing their utmost to help you get to the right gate in time? The persons you met during these occasions were engaged in their work—they put their selves in their work by doing it the best way they could

In this article, I discuss the phenomenon of work engagement and its antecedents and consequences. Additionally, I outline how engaged employees stay engaged—how they take initiative and create changes in how their work is performed. The literature review is summarized in an overall evidence-based model of work engagement illustrating that engaged workers are proactive job crafters who mobilize their own job challenges and job resources.

Work Engagement

Kahn (1990) was one of the first to theorize about work engagement. He described engaged employees as being fully physically, cognitively, and emotionally connected with their work roles. Engagement refers to focused energy that is directed toward organizational goals (Macey, Schneider, Barbera, & Young, 2009). Engaged employees are more likely to work harder through increased levels of discretionary effort than are those who are disengaged.

There are several definitions of *engagement* (see Albrecht, 2010; Bakker & Leiter, 2010), but Schaufeli and Bakker

(2004) proposed what is arguably the most often used definition of work engagement: an active, positive work-related state that is characterized by vigor, dedication, and absorption. Vigor refers to high levels of energy and mental resilience while working, whereas dedication refers to being strongly involved in one's work and experiencing a sense of significance, enthusiasm, and challenge. Absorption is characterized by being fully concentrated and happily engrossed in work, such that time passes quickly.

Work engagement is different from job satisfaction in that it combines high work pleasure (dedication) with high activation (vigor, absorption); job satisfaction is typically a more passive form of employee well-being. Work engagement is different from work-related flow in that it refers to a longer performance episode; flow typically refers to a peak experience that may last only 1 hour or even less. Finally, work engagement is different from motivation, in that it also refers to cognition (absorption) and affect (vigor)—in addition to motivation (dedication). Not surprisingly then, work engagement is a better predictor of job performance than are many earlier constructs.

Most studies to date have looked at differences between individuals regarding work engagement using the validated

Corresponding Author:

Arnold B. Bakker, Erasmus University Rotterdam, Institute of Psychology, Department of Work and Organizational Psychology, Woudestein, T12-47, P.O. Box 1738, 3000 DR Rotterdam, The Netherlands E-mail: bakker@fsw.eur.nl; see also www.arnoldbakker.com

266 Bakker

Utrecht Work Engagement Scale and the possible reasons for these differences—for example, working conditions and personal resources (Schaufeli & Bakker, 2004; Xanthopoulou, Bakker, Demerouti & Schaufeli, 2009a). However, recent studies have shown that engagement may also fluctuate within persons from day to day. Depending on what happens during the day, employees show higher or lower levels of engagement in their work activities.

Drivers of Work Engagement Job resources

Previous studies have consistently shown that job resources such as social support from colleagues, performance feedback, skill variety, autonomy, and learning opportunities are positively associated with work engagement (Albrecht, 2010; Bakker & Demerouti, 2008). *Job resources* refer to those physical, social, or organizational aspects of the job that may (a) reduce job demands and the associated physiological and psychological costs; (b) be functional in achieving work goals; or (c) stimulate personal growth, learning, and development (Schaufeli & Bakker, 2004). Hence, resources are not only necessary to deal with (high) job demands—they also are important in their own right.

Job resources are assumed to play either an intrinsic motivational role because they foster employees' growth, learning, and development or an extrinsic motivational role because they are instrumental in achieving work goals. In the former case, job resources fulfill basic human needs, such as the needs for autonomy, relatedness, and competence (Deci & Ryan, 1985). For instance, proper feedback fosters learning, thereby increasing job competence, whereas decision latitude and social support satisfy the need for autonomy and the need to belong, respectively.

Job resources may also play an *extrinsic* motivational role, because resourceful work environments foster the willingness to dedicate one's efforts to the work task. In such environments, it is likely that the task will be completed successfully and that the goal will be attained. For instance, supportive colleagues and performance feedback increase the likelihood of being successful in achieving one's work goals. In either case, be it through the satisfaction of basic needs or through the achievement of work goals, the outcome is positive, and engagement is likely to occur (Schaufeli & Bakker, 2004).

Consistent with these notions about the motivational role of job resources, several studies have shown a positive relationship between job resources and work engagement. For example, in their 3-year panel study among 2,555 Finnish dentists, Hakanen, Perhoniemi, and Toppinen-Tanner (2008) found that job resources, such as the opportunity to be creative (craftsmanship) and positive feedback about the direct results of work, predicted work engagement—which, in turn, predicted personal initiative and innovativeness. In a similar vein, in their study among managers and executives of a Dutch

telecom company, Schaufeli, Bakker, and Van Rhenen (2009) found that changes in job resources predicted engagement over a period of 1 year. Specifically, results showed that increases in social support, autonomy, opportunities to learn, and performance feedback were positive predictors of future work engagement and (reduced) registered sickness absenteeism.

It is important to note that job resources become salient and gain their motivational potential when employees are confronted with high job demands (e.g., quantitative, emotional, and cognitive demands). Hakanen, Bakker, and Demerouti (2005) tested this hypothesized interaction between job demands and job resources in a sample of Finnish dentists employed in the public sector. It was hypothesized and found that job resources (e.g., variability in the required professional skills, peer contacts) were most beneficial in maintaining work engagement under conditions of high job demands (e.g., workload, unfavorable physical environment). Similar findings have been reported by Bakker, Hakanen, Demerouti, and Xanthopoulou (2007). In their study of Finnish teachers working in elementary, secondary, and vocational schools, they found that job resources particularly influenced work engagement when teachers were confronted with high levels of pupil misconduct. Particularly supervisor support, innovativeness, appreciation, and organizational climate were important job resources for teachers that helped them cope with demanding interactions with students.

Personal resources

Personal resources are positive self-evaluations that are linked to resiliency and refer to individuals' sense of their ability to successfully control and have an impact on their environment (Hobfoll, Johnson, Ennis, & Jackson, 2003). It has been convincingly shown that such positive self-evaluations predict goal setting, motivation, performance, job and life satisfaction, and other desirable outcomes (for a review, see Judge, Van Vianen, & De Pater, 2004). The reason for this is that the higher an individual's personal resources, the more positive the person's self-regard and the more goal self-concordance is expected to be experienced. Individuals with goal self-concordance are intrinsically motivated to pursue their goals, and as a result, they trigger higher performance and satisfaction.

Several authors have investigated the relationships between personal resources and work engagement. For example, it has been shown that self-esteem, self-efficacy, locus of control, and the abilities to perceive and regulate emotions are positive predictors of work engagement (for an overview, see Albrecht, 2010). In their longitudinal survey and diary studies, Xanthopoulou, Bakker, Demerouti, and Schaufeli (2009a, 2009b) examined the role of three personal resources (self-efficacy, organizational-based self-esteem, and optimism) in predicting work engagement. Results showed that engaged employees are highly self-efficacious; they believe they are able to meet the demands they face in a broad array of contexts. In addition,



engaged workers have the tendency to believe that they will generally experience good outcomes in life (optimistic) and believe they can satisfy their needs by participating in roles within the organization (self-esteem).

Engagement-Performance Link

There are at least four reasons why engaged workers perform better than nonengaged workers. First, engaged employees often experience positive emotions, including gratitude, joy, and enthusiasm. These positive emotions seem to broaden people's thought—action repertoire, implying that they constantly work on their personal resources (Fredrickson, 2001). Second, engaged workers experience better health. This means that they can focus and dedicate all their skills and energy resources to their work. Third, as will be illustrated later, engaged employees create their own job and personal resources. Finally, engaged workers transfer their engagement to others in their immediate environment (Bakker & Xanthopoulou, 2009). Since in most organizations performance is the result of collaborative effort, the engagement of one person may transfer to others and indirectly improve team performance.

To date, several studies have shown that work engagement is positively related to job performance (e.g., in-role performance, that is, officially required outcomes and behaviors that directly serve the goals of the organization; creativity; organizational citizenship behavior). For example, Bakker, Demerouti, and Verbeke (2004) showed that engaged employees received higher ratings from their colleagues on in-role and extra-role performance (discretionary behaviors on the part of an employee that are believed to directly promote the effective functioning of an organization, without necessarily directly influencing a person's target productivity), indicating that engaged employees perform well and are willing to go the extra mile. Further, in their study of employees working in Spanish restaurants and hotels, Salanova, Agut, and Peiró (2005) showed that employee ratings of organizational resources, engagement, and service climate were positively related to customer ratings of employee performance and customer loyalty.

In their recent study of Greek employees working in fast-food restaurants, Xanthopoulou, Bakker, Demerouti, and Schaufeli (2009b) expanded this research and made a compelling case for the predictive value of work engagement for performance on a daily basis. Participants were asked to fill in a survey and a diary booklet for 5 consecutive days. Consistent with hypotheses, results showed that employees were more engaged on days that were characterized by many job resources. Daily job resources like supervisor coaching and team atmosphere contributed to employees' personal resources (day levels of optimism, self-efficacy, and self-esteem), which, in turn, contributed to daily engagement. Importantly, this study clearly showed that engaged employees perform better on a daily basis. The higher employees' levels of daily engagement, the higher their objective financial returns.

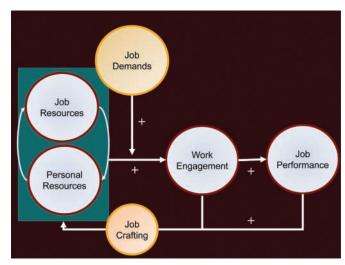


Fig. 1. The model of work engagement (based on Bakker & Demerouti, 2008). Job and personal resources independently or together predict work engagement and have a particularly positive impact on engagement when job demands are high; engagement, in turn, positively affects job performance. Importantly, the feedback loop in the model shows how employees who are engaged and perform well are able to create their own resources (job crafting), which then foster engagement over time and create a positive gain spiral.

Overall Model of Work Engagement

The evidence regarding the antecedents and consequences of work engagement can be organized in an overall model of work engagement (Bakker & Demerouti, 2008; see Fig. 1). According to this model, job resources such as social support from colleagues and supervisors, performance feedback, skill variety, and autonomy start a motivational process that leads to more work engagement and consequently to higher performance. In addition, the model postulates that job resources become more salient and gain their motivational potential when employees are confronted with high job demands (e.g., workload, emotional demands, and mental demands). Further, Xanthopoulou and her colleagues (2009a, 2009b) have shown that job and personal resources are mutually related and that personal resources can be independent predictors of work engagement. Thus, employees who score high on optimism, self-efficacy, resilience, and self-esteem are well able to mobilize their job resources and generally are more engaged in their work.

The model of work engagement is graphically depicted in Figure 1. As can be seen, I assume that job resources and personal resources independently or in combination predict work engagement. Further, job and personal resources particularly have a positive impact on engagement when job demands are high. Work engagement, in turn, has a positive impact on job performance. Importantly, the feedback loop in the model shows how employees who are engaged and perform well are able to create their own resources, which then foster engagement over time and create a positive gain spiral.

It should be noted that the relationships in Figure 1 do not refer only to differences between persons but also to

268 Bakker

differences within persons over time. That is, on days when an individual employee is exposed to more job resources (like support from colleagues, feedback from the supervisor, and interesting contacts with customers), (s)he should experience higher levels of state work engagement and consequently perform better. Such days should also evoke more behaviors known as job-crafting (see below), which then result in higher levels of job and personal resources (e.g., optimism, self-efficacy) on these specific days.

Engagement and job crafting

Remember the examples with which I started this article—the energetic and passionate speaker and the service officers who were helping you get your connecting flight. These engaged employees showed active, positive, and even proactive behavior. Indeed, engaged employees are not passive actors in work environments but instead actively change their work environment if needed. Employees may actively change the content or design of their jobs by choosing tasks, negotiating different job content, and assigning meaning to their tasks or jobs. This process of employees shaping their jobs has been referred to as job crafting (Wrzesniewski & Dutton, 2001). As a consequence of job crafting, employees may be able to increase their personjob fit and to experience enhanced meaning in their work.

Tims, Bakker, and Derks (in press) argue that job crafting is a specific form of proactive behavior in which employees initiate changes in their levels of job demands and job resources. Job crafting enables employees to fit their jobs to their personal knowledge, skills, and abilities on the one hand and to their preferences and needs on the other. Consistent with this view, Tims and her colleagues found that engagement had a positive relationship with colleague ratings of job crafting. Engaged employees were most likely to increase their job resources—for example, by asking for feedback from their supervisor and mobilizing their social network. Additionally, engaged employees were most likely to increase their own job demands in order to create a more challenging work environment. For example, they were most likely to start new projects.

Current issues in engagement

Although research on work engagement is flourishing, there are still many lessons to be learned about engagement. For example, not all researchers agree on the definition and measurement of engagement. Although most authors use the three-dimensional model of Schaufeli and Bakker (2004)—including vigor, dedication, and absorption—some authors have argued that the definition should include a behavioral dimension (Macey et al., 2009). In addition, not much is known about how leaders influence their followers' engagement and the mechanisms that explain this influence. Do leaders set the stage for follower engagement by offering the right mix between job demands and resources? Do effective leaders

fulfill their followers' basic needs for competence, autonomy, and relatedness? Future research should try to answer these questions by conducting multilevel studies of leaders and their followers. Furthermore, it is conceivable that more engagement is not always better. Employees cannot always be engaged; they need moments of absence and opportunities for recovery. It is plausible that—even on a single working day fluctuating levels of work engagement are better than constant, elevated levels of engagement. Future studies should not only investigate work engagement over longer periods of time with traditional surveys, but also investigate engagement over shorter periods like weeks and days. Finally, recent studies suggest that the concept of engagement may be relevant for other domains than work as well, including education and sport. It seems important to more fully examine whether the engagement model holds in other life domains. Bakker, Albrecht, and Leiter (2011) offer a more elaborate research agenda for engagement.

Conclusion

Engaged employees are physically, cognitively, and emotionally connected with their work roles. They feel full of energy, are dedicated to reach their work-related goals, and are often fully immersed in their work. Work engagement is predicted by job resources and personal resources and leads to higher job performance. Thus, work engagement is an important indicator of occupational well-being for both employees and organizations. Human resource managers can do several things to facilitate work engagement among their employees. An important starting point for any active policy is the baseline measurement of engagement and its drivers among all employees, for example by using the work engagement model presented in this article. On the basis of this assessment, it can be determined whether individual employees, teams, job positions, or departments score low, average, or high on work engagement and its antecedents, and thereby we may learn where to most usefully focus interventions. Generally, interventions aimed at harnessing the positive power of work engagement should focus on individuals and teams and the organization at large.

Recommended Reading

Bakker, A.B., Albrecht, S., & Leiter, M.P. (2011). Key questions regarding work engagement. *European Journal of Work and Organizational Psychology*, 20, 4–28. Discusses key questions regarding work engagement in more detail than the current article. Bakker, A.B., & Demerouti, E. (2009). The crossover of work engagement between working couples: A closer look at the role of empathy. *Journal of Managerial Psychology*, 24, 220–236. An illustrative study among couples showing that work engagement may be contagious.

Bakker, A.B., & Leiter, M.P. (Eds.). (2010). (See References). A thorough, far-reaching theoretical analysis of work engagement.

Kahn, W.A. (1990). Psychological conditions of personal engagement and disengagement at work. Academy of Management Journal, 33,





Work Engagement 269

692–724. A historical classic—one of the first papers to raise attention about employee engagement.

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. A representative study that illustrates original research about daily work engagement.

Declaration of Conflicting Interests

The authors declared no potential conflicts of interest with respect to the research, authorship, and/or publication of this article.

References

- Albrecht, S.L. (Ed.). (2010). *Handbook of employee engagement: Perspectives, issues, research and practice.* Glos, England: Edward Elgar.
- Bakker, A.B., Albrecht, S., & Leiter, M.P. (2011). Key questions regarding work engagement. European Journal of Work and Organizational Psychology, 20, 4–28.
- Bakker, A.B., & Demerouti, E. (2008). Towards a model of work engagement. Career Development International, 13, 209–223.
- Bakker, A.B., Demerouti, E., & Verbeke, W. (2004). Using the Job Demands—Resources model to predict burnout and performance. *Human Resource Management*, 43, 83–104.
- Bakker, A.B., Hakanen, J.J., Demerouti, E., & Xanthopoulou, D. (2007). Job resources boost work engagement, particularly when job demands are high. *Journal of Educational Psychology*, 99, 274–284.
- Bakker, A.B., & Leiter, M.P. (Eds.). (2010). Work engagement: A handbook of essential theory and research. New York, NY: Psychology Press.
- Bakker, A.B., & Xanthopoulou, D. (2009). The crossover of daily work engagement: Test of an actor–partner interdependence model. *Journal of Applied Psychology*, 94, 1562–1571.
- Deci, W.L., & Ryan, R.M. (1985). *Intrinsic motivation and self-determination in human behavior*. New York, NY: Plenum.
- Fredrickson, B.L. (2001). The role of positive emotions in positive psychology: The broaden-and-build theory of positive emotions. *American Psychologist*, *56*, 218–226.
- Hakanen, J.J., Bakker, A.B., & Demerouti, E. (2005). How dentists cope with their job demands and stay engaged: The moderating role of job resources. *European Journal of Oral Sciences*, 113, 479–487.

- Hakanen, J.J., Perhoniemi, L., & Toppinen-Tanner, S. (2008). Positive gain spirals at work: From job resources to work engagement, personal initiative and work–unit innovativeness. *Journal of Vocational Behavior*, 73, 78–91.
- Hobfoll, S.E., Johnson, R.J., Ennis, N., & Jackson, A.P. (2003). Resource loss, resource gain, and emotional outcomes among inner city women. *Journal of Personality and Social Psychology*, 84, 632–643.
- Judge, T.A., Van Vianen, A.E.M., & De Pater, I. (2004). Emotional stability, core self-evaluations, and job outcomes: A review of the evidence and an agenda for future research. *Human Performance*, 17, 325–346.
- Kahn, W.A. (1990). Psychological conditions of personal engagement and disengagement at work. Academy of Management Journal, 33, 692–724.
- Macey, W.H., Schneider, B., Barbera, K., & Young, S.A. (2009).
 Employee engagement: Tools for analysis, practice, and competitive advantage. London, England: Blackwell.
- Salanova, M., Agut, S., & Peiró, J.M. (2005). Linking organizational resources and work engagement to employee performance and customer loyalty: The mediation of service climate. Journal of Applied Psychology, 90, 1217–1227.
- Schaufeli, W.B., & Bakker, A.B. (2004). Job demands, job resources and their relationship with burnout and engagement: A multisample study. *Journal of Organizational Behavior*, 25, 293–315.
- Schaufeli, W.B., Bakker, A.B., & Van Rhenen, W. (2009). How changes in job demands and resources predict burnout, work engagement, and sickness absenteeism. *Journal of Organizational Behavior*, 30, 893–917.
- Tims, M., Bakker, A.B., & Derks, D. (in press). Development of the job crafting scale. *Journal of Vocational Behavior*.
- Wrzesniewski, A., & Dutton, J.E. (2001). Crafting a job: Revisioning employees as active crafters of their work. Academy of Management Review, 26, 179–201.
- Xanthopoulou, D., Bakker, A.B., Demerouti, E., & Schaufeli, W.B. (2009a). Reciprocal relationships between job resources, personal resources, and work engagement. *Journal of Vocational Behavior*, 74, 235–44.
- Xanthopoulou, D., Bakker, A.B., Demerouti, E., & Schaufeli, W.B. (2009b). 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.