

Crafting for autonomy, competence, and relatedness: A self-determination theory model of need crafting at work

Anja H. Olafsen  | Baptiste P. C. Marescaux | Miika Kujanpää

School of Business, University of South-Eastern Norway, Hønefoss, Norway

Correspondence

Anja H. Olafsen, School of Business, University of South-Eastern Norway, Postboks 164 Sentrum, Hønefoss 3502, Norway.

Email: anja.olafsen@usn.no

Funding information

This research was supported by a grant from the Research Council of Norway (Grant Number 301316).

Abstract

With the purpose of extending job crafting theory, the current article outlines a comprehensive conceptual model of work-related need crafting grounded in self-determination theory—the Self-Determination Theory Model of Need Crafting at Work. Specifically, by taking as our basis the three basic psychological needs for autonomy, competence, and relatedness, we introduce the concept of work-related need crafting and outline its underlying cognitive and behavioral components. We also theorize how cognitive and behavioral forms of need crafting are related and how cognitive and behavioral need crafting foster well-being and optimal functioning by enhancing need satisfaction and reducing need frustration. Finally, we outline a reciprocal relation between need crafting practices and the experience of basic psychological needs, and thereby depict how need crafting and basic psychological needs develop over time. In sum, the Self-determination Theory Model of Need Crafting at Work provides a theory-based framework relevant for covering a wide breadth of different need crafting practices that have the potential to significantly advance future research on job crafting for the benefit of both employees and organizations.

This is an open access article under the terms of the [Creative Commons Attribution-NonCommercial-NoDerivs](https://creativecommons.org/licenses/by-nc-nd/4.0/) License, which permits use and distribution in any medium, provided the original work is properly cited, the use is non-commercial and no modifications or adaptations are made.

© 2024 The Author(s). *Applied Psychology* published by John Wiley & Sons Ltd on behalf of International Association of Applied Psychology.

KEYWORDS

basic psychological needs, job crafting, need crafting, self-determination theory

INTRODUCTION

Job crafting has become a “hot” topic in the literature over the past 20 years. In the midst of the knowledge society, employees are increasingly in charge of their own work experiences, and employers also expect employees to be proactive and make adjustments in relation to their work and the tasks they are to complete. In essence, job crafting is referred to as proactive behaviors and cognitions that employees engage in with the aim of aligning their jobs with their own preferences, motives, and passions (Wrzesniewski & Dutton, 2001). A rapidly growing body of research has shown that job crafting is related to a wide variety of positive outcomes for employee well-being (e.g., work engagement, job satisfaction, meaningfulness, and positive affect) and performance (e.g., self-rated and other-rated performance) (Rudolph et al., 2017; Zhang & Parker, 2019). Moreover, studies have suggested that job crafting may constitute a protective factor against the negative effects of job strain, such as burnout (Demerouti, 2015; Tims et al., 2013).

The evolution of job crafting research started with the original role-based conceptualization by Wrzesniewski and Dutton (2001) and continued with its adaptation to resource-based perspectives (Tims & Bakker, 2010) drawing from the Job Demands-Resources (JD-R) model (Bakker et al., 2023). More recently, new conceptual developments in distinguishing crafting practices (Bruning & Campion, 2018) have led to further evolution of both the role-based (e.g., Bindl et al., 2019) and the resource-based (e.g., Zhang & Parker, 2019) perspectives of crafting. However, most of this research has focused on the effects of proactive changes in external factors of work such as crafting for job demands and resources, while individuals' own benefits (e.g., motives and needs) as the foci of crafting behaviors and cognitions have so far been left to the periphery. In this article, alongside an emerging literature of need crafting at the work-nonwork interface and in the educational domain (de Bloom et al., 2020; Laporte et al., 2021), we develop a third strand drawing on psychological needs (i.e., psychological nutrients essential for adjustment, integrity, and growth) as key foci of crafting, extending prior crafting research: a conceptualization of job crafting based on Self-Determination Theory (SDT; Deci & Ryan, 2000; Ryan & Deci, 2017).

By introducing the concept “work-related need crafting” and a conceptual model depicting how its cognitive (i.e., changing how the job is perceived) and behavioral (i.e., changing how the job is conducted) forms are related and, further, how they play into a motivational process predicting employee well-being and work functioning, we contribute to the literature on job crafting in four important ways. First, existing research on job crafting drawing on prevailing conceptualizations tends to overlook the full range of strategies that employees may use (Demerouti et al., 2019) and that has been indicated in qualitative studies (see, for instance, Lazazzara et al., 2020). Adopting a needs-based approach to crafting at work does not restrict crafting behaviors and cognitions to a narrow set defined by external demands and resources. For instance, shaping non-instrumental relationships that can foster relatedness, emphasizing personally important tasks that can increase the sense of autonomy, and practices such as mentally expanding one's potential capabilities to foster the experience of competence, has been

altogether left out of prior crafting conceptualizations, despite such strategies being widespread in qualitative crafting research (Lazazzara et al., 2020). Due to the broad and universal nature of basic psychological needs (Vansteenkiste et al., 2023), we can readily map a broad spectrum of these crafting practices into our needs-based framework. This is in line with recent calls for a clearer understanding of the diversity of forms crafting can take (Zhang et al., 2023).

Second, our model depicts cognitive crafting at work as a key antecedent to behavioral crafting, an interrelation that has not been explicated in existing models. In particular, in contrast to a majority of job crafting research, which has generally focused on behavioral change (e.g., Bakker et al., 2012; Tims et al., 2022), we propose that cognitive need crafting acts as a key antecedent for behavioral need crafting, highlighting the importance of cognitive processes for the initiation of behavioral crafting practices. Furthermore, we also describe how cognitive need crafting may be, in turn, affected by behavioral need crafting through the concrete impact the latter has on basic psychological needs. Third, by drawing on the basic SDT model in the workplace (Deci et al., 2017), the Self-determination Theory Model of Need Crafting at Work provides a theory-based account for how the crafting process at work relates to well-being and optimal employee functioning and how this process unfolds over time. With this, we extend recent work in the literature on the reciprocal dynamics associated with crafting (e.g., Clinton et al., 2024; Zhang et al., 2023) and the relationship between crafting and basic psychological needs (e.g., Bakker & Van Woerkom, 2017). Specifically, satisfaction (i.e., the experience of fulfillment) and frustration (i.e., the experience of undermining) of the basic psychological needs are proposed to represent the key intermediating mechanisms that translate the effects of crafting practices on employee outcomes. Moreover, need satisfaction and frustration are proposed to predict further engagement in crafting practices, depicting a reciprocal process between work-related need crafting and basic needs where an increase in need satisfaction and a decrease in frustration broadens the perspective regarding crafting opportunities and provides additional energy to build on existing crafting efforts. Fourth, in addition to contributing to the literature on job crafting, the creation of the concept of work-related need crafting serves as a theoretical extension of SDT, in particular the basic SDT model in the workplace (Deci et al., 2017), accounting for an individual level source of need satisfaction and frustration. With this, need crafting broadens the scope of factors that are associated with motivational processes within the realm of work.

Job crafting: takeaways from role-based, resource-based and approach-avoidance models

Research on job crafting started with role-based models. In their seminal conceptualization, Wrzesniewski and Dutton (2001) defined job crafting as “the physical and cognitive changes individuals make in the task or relational boundaries of their work” (p. 179). They posited that employees use three types of crafting strategies to change their work role identity and enhance the meaning of their work: task, relational, and cognitive crafting. Task crafting entails altering the type, number, or scope of the tasks (e.g., spending more time on fulfilling tasks). Relational crafting refers to changing with whom one interacts or the nature of one’s interactions in the workplace (e.g., making an effort to get to know people well at work). Cognitive crafting refers to altering how one views one’s job—in terms of both how the job functions and what impact the job has (e.g., seeing one’s job as a meaningful contribution to society).

A decade after job crafting was coined by Wrzesniewski and Dutton (2001), Tims and Bakker (2010) introduced a resource-based view of crafting, integrating it within an existing theoretical model of employee health, the job demands-resources (JD-R) model. Herein, job demands are seen as characteristics of one's work that require sustained physical, emotional, or mental effort, while job resources are job characteristics assumed to stimulate personal growth and development, reduce job demands, or are functional in achieving work goals (Bakker & Demerouti, 2017). Within this strand of crafting models, job crafting is described as the changes that employees make to balance their job demands and job resources with their personal abilities and needs (Tims & Bakker, 2010) to feel engaged in their work and to avoid exhaustion. These models are organized around what overall categories of work characteristics are being impacted by crafting (demands, resources) and how they are being impacted (increasing, reducing, and optimizing). Empirically, these models look at employees' increasing resources, increasing challenging demands, reducing hindering demands (Petrou et al., 2012), and optimizing hindering demands (Demerouti & Peeters, 2018). Accordingly, research using resource-based models has primarily focused on behavioral crafting processes.

More recently, a new taxonomy has emerged in the literature (Bruning & Campion, 2018), distinguishing between crafting processes that expand engagement toward desirable work outcomes (approach crafting) and crafting processes that reduce engagement to prevent negative work outcomes (avoidance crafting). This taxonomy has led to the creation of new integrative models that combine the approach-avoidance dichotomy with resource-based crafting (Zhang & Parker, 2019) and with role-based crafting (Bindl et al., 2019).

Looking at the key takeaways from the main strands of crafting, it can be argued that role-based models (Bindl et al., 2019; Wrzesniewski & Dutton, 2001) are organized around what concrete aspects of work are being crafted (i.e., tasks, relations, skills, and personal perspectives), thus distinguishing between the different forms of crafting. However, these models do not provide a substantial theoretical basis for the motivational underpinnings of crafting strategies, making it unclear which set of potential needs, motives, or passions would explain how and why a specific aspect of a job (e.g., tasks) is crafted. Moreover, they rely on a limited view of the cognitive processes underlying cognitive crafting, focusing mainly on meaningfulness through emphasizing importance of tasks and roles.

By contrast, resource-based models connect crafting with a well-established model of occupational health antecedents, articulating how employees can increase or decrease specific aspects of their work to support their health and well-being (see also Bruning & Campion, 2018). Yet neither pioneering nor more recent models of resource-based crafting distinguish forms of crafting within the broad and rather abstract categories of demands and resources, thus overlooking how distinct crafting processes (tasks, relations, skills, and personal perspectives) may be sustained over time (Zhang et al., 2023). Moreover, this categorization focuses on resources and demands that have an objective instrumental value for work effectiveness, at the expense of other job aspects that may be just as necessary for thriving at work. For instance, prior resource-based crafting research has emphasized asking for support and feedback from colleagues and supervisors (e.g., Tims et al., 2012), which focuses solely on the instrumental side of work relationships (Petrou et al., 2012; Tims & Bakker, 2010). However, there has been a growing interest in the literature regarding how workplace relationships can be valuable without being instrumental (Bannya et al., 2023). Indeed, qualitative studies have shown that employees engage in crafting to nurture affective workplace relationships based on mutual liking rather than instrumental value (Lazazzara et al., 2020), highlighting the need to incorporate this potentially key aspect of crafting for relatedness in crafting models. Finally, key

behavioral crafting practices for autonomy, such as emphasizing tasks that are personally important or aligned with one's personal values (Berg et al., 2010), have thus far not been integrated with resource-based models of crafting.

Lastly, the approach-avoidance view on crafting is organized around how the same concrete aspect of work can be crafted from two distinct perspectives: to increase its positive effects or to reduce its negative consequences. Yet the avoidance side of this dichotomy is defined and interpreted differently across the literature, sometimes being considered as “crafting by doing less” and therefore conducive to negative outcomes (Lichtenthaler & Fischbach, 2019), sometimes being considered as “crafting by focusing on what is good” (Bindl et al., 2019) and therefore conducive to positive outcomes, thus questioning the purpose and level of proactivity involved in avoidance crafting.

We argue that centering crafting around basic psychological needs addresses these limitations and provides a stronger theoretical basis for employees' crafting practices than modulating external demands and resources, while encompassing both behaviors and cognitions neglected in prior research. Accordingly, we argue in line with role-based models, that crafting should be organized alongside the diversity of concrete experiences of employees rather than all-encompassing collections of work characteristics, but, at the same time, alongside the resource-based models, we posit that crafting should address both positive work experiences and negative work experiences at the behavioral level. This approach affords the potential to encompass crafting strategies for addressing all three basic needs that have been shown to be imperative for thriving at work, not just the need for competence, which tends to be the more emphasized one in existing crafting models (e.g., crafting for learning, feedback, and skills use). Our model focuses on the approach side of crafting, as we consider that this side is more likely to encompass all the proactive change processes that will positively impact basic psychological needs. Beyond existing models and strands of research, we also introduce the importance of theorizing the interplay between the cognitive and the behavioral facets of crafting, which has thus far just been hinted at (Wrzesniewski & Dutton, 2001; Zhang & Parker, 2019) and only more recently empirically explored (Costantini, 2022).

SDT and the potential of need-driven crafting models

SDT is a macro-theory of human motivation across life domains that has received increasing attention in the organizational literature over the past 15 years. One of its main tenets revolves around the existence of three basic psychological needs conceived as innate, essential, and universal (Deci & Ryan, 2000): the needs for autonomy, competence, and relatedness. The need for autonomy designates the desire for individuals to choose actions and make decisions following their own volition. The need for competence designates the desire for individuals to have a sense of mastery in the processes or tasks they enact and the chance to develop one's abilities. Finally, the need for relatedness designates the desire of individuals to feel part of a community and have a sense of connection to those surrounding them. These three needs cover the essential experiences conducive for optimal human functioning (Vansteenkiste et al., 2020), making satisfaction of them in the workplace of utmost importance for employees' psychosocial adjustment and well-being. Indeed, research has shown that employees report more positively in relation to their work attitudes, productive work behavior, and work-related and general well-being when their needs are satisfied at work (for a meta-analysis, see, e.g., Van den Broeck et al., 2016). Whereas psychological need satisfaction is growth-conducive, the frustration of the

same needs creates negative consequences for employees, including ill-being, negative attitudes, and counterproductive behaviors (for a review, see Deci et al., 2017; Forest et al., 2023; Olafsen & Deci, 2020).

Most research on need satisfaction and frustration to date has focused on the role of social-contextual influences for employees' functioning, with less focus given to individual-level factors and processes (Olafsen & Deci, 2020). Yet employees are not just passive recipients of contextual need support. Particularly, in today's knowledge society, they can also proactively steer their own work, thereby contributing to their own need satisfaction and potentially uplifting their own functioning. According to SDT, humans are indeed "proactive organisms that have the inclination to shape and optimize their own life conditions" (Vansteenkiste & Ryan, 2013, p. 264). The idea that people have a natural inclination to seek and create work environments that contribute to their own need satisfaction and growth is thus fully consistent with SDT's organismic-dialectical perspective (Ryan & Deci, 2002) and recently also supported in some emerging studies. In 2014, Slemp and Vella-Brodrick conducted the first exploration of job crafting with relation to SDT, retaining the original structure and definition of job crafting from Wrzesniewski and Dutton (2001) and expanding on the motivational factors behind crafting processes. To that end, they aligned the original antecedents of job crafting (i.e., need for control, need for positive self-image, and need to connect with others) with basic psychological needs (i.e., need for autonomy, need for competence, and need for relatedness). Subsequent studies have shown similar results, demonstrating how job crafting relates to increased need satisfaction and decreased need frustration (Bakker & Oerlemans, 2019; Toyama et al., 2022). Further, while these studies suggest that job crafting can be an initiator of basic psychological need satisfaction, other studies examine job crafting as a consequence of motivational orientation (Berdicchia et al., 2021; Wu et al., 2022), suggesting a reciprocal process. With SDT's assumption that individuals inherently possess an active organismic nature driving them to seek need satisfaction, growth, optimal functioning, and wellness, job crafting emerges as a natural way for people to achieve these aspirations in the context of work. That is, job crafting allows individuals to tailor their job roles, tasks, and interactions, enabling them to align their work with their needs, growth, and wellness ambitions. At the same time, SDT underscores the importance of an optimal motivational process that is inherently conducive to proactive behaviors, including job crafting. Therefore, work contexts that nurture employees' basic psychological needs and foster autonomous work motivation amplify employees' inherent active nature, thus facilitating more crafting behaviors. This highlights a synergistic relation: while job crafting is an individual strategy to enhance need satisfaction within the workplace, the extent and effectiveness of these crafting efforts are significantly influenced by the motivational quality of the work environment.

With basic psychological needs being both central antecedents and outcomes of job crafting, the reasoning turns to how crafting can be understood as a motivational process directly involving basic psychological needs. This need-driven conceptualization of crafting was first examined by de Bloom et al. (2020), with a crafting model that emphasized individuals' psychological needs as key factors forming the content and foci of crafting efforts across different life domains and role identities. Drawing on the tenets of SDT, we further develop this need-driven approach to crafting to propose a novel concept, work-related need crafting, as behaviors and cognitions focused on enhancing need satisfaction and reducing need frustration at work, and by developing a conceptual model of how work-related need crafting constitutes a reciprocal motivational process.

AN INTEGRATED FRAMEWORK OF WORK-RELATED NEED CRAFTING

Congruent with SDT's assumption of the inherent proactivity of humans to shape themselves and their environment to better satisfy basic psychological needs (Vansteenkiste & Ryan, 2013), one could argue that employees who craft to shape their demands and resources are indeed ultimately engaging in these crafting practices in order to satisfy their basic psychological needs as an intrinsic, underlying goal (see also Holman et al., 2024 on need satisfaction as a potential key goal of demands- and resource-based job crafting). That is, crafting one's various job characteristics to optimize one's work is a strategy that aims to self-fulfill one's basic psychological needs for autonomy, competence, and relatedness and could hence be organized as such. As such, we propose that the most proximal outcome of work-related need crafting is enhanced need satisfaction and diminished need frustration, while external job demands and resources are more distal outcomes of need crafting. In other words, through need crafting, individuals shape themselves as well as their work environments.

An emerging strand of research has started to focus on proactive self-management of need-based experiences among adolescents (Laporte et al., 2021), in non-work contexts (e.g., Kujanpää et al., 2022), and recently in the work domain (Tušl et al., 2024), demonstrating positive effects for psychological need satisfaction, health, and well-being across life domains. According to Laporte et al. (2021, p. 68), need crafting entails both "awareness of one's personal sources of psychological need satisfaction and a tendency to act upon this awareness," thus including both a cognitive and behavioral element. Moreover, de Bloom et al. (2020) proposed needs-based crafting as proactive and self-initiated changes across different role identities (e.g., parent and volunteer) targeted at individual needs (e.g., crafting for autonomy, for detachment, and for relaxation).

The model we propose next aligns with prior studies in conceptualizing crafting around basic psychological needs and the implications it has on further need experiences. However, we argue that for cognitions or behaviors to be labeled as need crafting, they need to be proactive, intentional, and self-initiated (de Bloom et al., 2020). As such, in contrast to the work by Laporte et al. (2021) and Laporte, Soenens, et al. (2022), we conceptualize cognitive and behavioral need crafting efforts at work more broadly than crafting centered purely on a mental state of awareness and a behavioral tendency to act. Moreover, in contrast to de Bloom et al. (2020) and Tušl et al. (2024), we differentiate between cognitive and behavioral need crafting as two unique forms of crafting. In addition, and importantly, we further differentiate behavioral need crafting in terms of resource- and demand-based need crafting to bring this concept to the work context in a way that integrates the extensive prior literature on behavioral job crafting. This makes the concept more uniquely tailored and applicable to crafting at work specifically than prior conceptualizations of need crafting, as it applies to certain boundaries specific to this domain. Moreover, we exclude facets of crafting related to detachment and relaxation from our conceptualization of work-related need crafting, as these experiences may be complicated to craft for within the work-domain as well as not meeting the criteria for being a basic need within SDT.

We define work-related need crafting as the cognitive or behavioral processes, initiated by an employee, aimed at increasing the satisfaction and reducing the frustration of their basic psychological needs for autonomy, competence, and relatedness, through modifying the content and context of their job. This definition entails two distinct forms of need crafting: behavioral need crafting and cognitive need crafting. Additionally, behavioral need crafting can be

distinguished into two sub-forms: need resources crafting and need demands crafting. While we posit that there is an interaction between cognitive and behavioral forms of need crafting and that they can predict each other over time, we nevertheless assume that they both remain part of the unitary construct of work-related need crafting, in line with previous conceptualizations (Wrzesniewski & Dutton, 2001) and empirical investigation (Costantini, 2022). In the following, we will first present and define the two main forms of need crafting—cognitive need crafting and behavioral need crafting—before moving on to describing the process model of work-related need crafting.

Cognitive need crafting

The SDT perspective on human tendency toward proactively shaping and optimizing one's conditions (Vansteenkiste & Ryan, 2013) can be exemplified through proactive cognitions, as it has been shown that employees strive to build coherence between their work situation and work motivation at a cognitive level (Hewett, 2022). Cognitive need crafting at work entails *the ensemble of cognitive changes enacted by an individual in the way they perceive, mentally organize, and reimagine the content and context of their work in order to enhance satisfaction and reduce frustration of the basic psychological needs for autonomy, competence, and relatedness*. Cognitive need crafting relies on the mental representations that employees form of their job, representations of what they think their job should be, and what they think their job could be. These representations are underpinned by subjective theories of need satisfaction, also called need-based schemas (Janssen et al., 2021), which orient the employee toward specific elements of their work content and context that they think are likely to satisfy their needs. Thus, these schemas affect where they place their attention, what kind of information they prioritize in their processing of their work environment, and the kind of outcomes they anticipate that their behavior will produce. For instance, employees could form an autonomy-based schema on how much they should take the lead in collaborative work, or a competence-based schema of being effective in tackling specific tasks, or again a relatedness-based schema of having a positive informal relationship with their supervisor (Janssen et al., 2021). Need-based schemas are either confirmed when needs are satisfied as expected or disconfirmed when the level of satisfaction, or frustration, does not match expectations. Thus, cognitive need crafting entails the intentional creation and modification of those need-based schemas.

Some existing need-based schemas are likely to clash with the physical and social reality of the job (Janssen et al., 2021), thus creating situations of need frustration. For instance, the employee, having formed a competence-based schema of being effective in tackling their work tasks, and thus forming expectations of how those work tasks should be carried out, can become frustrated if they realize that those tasks are more demanding than they expected. This subverted expectation reveals a discrepancy between the individual's need-based schema and their work reality. Resolving this discrepancy between the schema and the work reality can be achieved in one of two ways: modifying the job or modifying the schema (Melo et al., 2021). In relation to our model, modifying the job entails behavioral need crafting, whereas modifying the schema entails cognitive need crafting. Modifying the schema can be done through different forms of reframing (Hewett, 2022; Unsworth et al., 2004). Individuals can shift their attention, for instance focusing their mind on the aspects of work that are more satisfying (Batova, 2018); they can reevaluate their tasks and relationships, trying to perceive difficulties as positive (e.g., Vuori et al., 2012); and finally, they may also reevaluate the outcomes of their role,

focusing on the long-term consequences of their work (e.g., Singh & Singh, 2016) or their impact on the broader society (e.g., Wrzesniewski & Dutton, 2001). From a need crafting point of view, autonomy crafting may thus entail envisioning the significance of the job beyond daily work duties, competence crafting may entail reframing challenges as learning opportunities, and relatedness crafting may entail envisioning how colleagues experience their job (see Table 1).

It is also possible that employees would form novel representations of their job that are not limited by their current definition of their role (Janssen et al., 2016) and thereby satisfy their needs in new ways. Individuals can therefore form need-based schemas that are based on personal callings (Berg et al., 2010) and thus expand their need crafting beyond their existing work identity (de Bloom et al., 2020). As an example, an individual with a specific calling that is not fulfilled by their role may form new autonomy-based schemas about the type of work responsibilities that would match their calling. This explorative side of cognitive crafting may also be driven by the individual's curiosity as the formation of new need-based schemas enables them to seek new experiences in their role and gain new information (Kashdan et al., 2020). For instance, an individual may be driven by their curiosity to form new relatedness-based schemas of novel forms of interactions they could have with their colleagues (Randel et al., 2023). These novel need-based schemas are likely to be more uncertain and ambiguous compared to existing schemas, as they are less rooted in the established definition of one's work role.

TABLE 1 Examples of cognitive and behavioral crafting efforts for each basic psychological need.

| Basic psychological need | Cognitive need crafting | Behavioral need crafting | |
|--------------------------|--|---|---|
| | | Need resources crafting | Need demands crafting |
| Autonomy | Envisioning significance of job beyond daily work duties | Rearranging work to gain control over one's own schedule | Voicing one's opinion when facing ethically challenging policies at work |
| | Rethinking job roles toward personally valued outcomes | Seeking out possibilities for participating in assignments that one finds interesting | Trying out new methods to maintain interest while doing assignments experienced as boring |
| Competence | Reframing obstacles as learning opportunities | Asking for feedback on one's performance | Simplifying complex work tasks |
| | Focusing attention on accomplishments at work | Learning new skills to master | Carving out more time to perform better in high-pressure assignments |
| Relatedness | Reflecting on strategies for building supportive relationships | Finding moments to connect with colleagues | Reaching out when feeling isolated |
| | Envisioning colleagues' work experiences | Becoming involved in new social groups at work | Seeking emotional support when feeling distressed |

Behavioral need crafting

Beyond cognitive need crafting, and again aligning with the SDT view of individuals as proactive organisms, employees can also engage in proactive behaviors at work to effectively and autonomously meet individual and organizational goals (Strauss & Parker, 2014). More specifically, *behavioral need crafting at work* can be defined as *the proactive and self-initiated behaviors enacted by an individual to change the content and context of their work in order to enhance the satisfaction and decrease the frustration of the basic psychological needs for autonomy, competence, and relatedness* (see also de Bloom et al., 2020; Laporte et al., 2021). This broad conceptualization of work-related need crafting can more readily incorporate a diverse range of behaviors focused on crafting for autonomy, competence, and relatedness than prior models. For instance, crafting for autonomy, a concept that is mostly absent in prior behavioral job crafting measures, is based on the idea of work autonomy not only as having control over one's work tasks, but more generally as a sense of volition and personal freedom at work (Van den Broeck, Vansteenkiste, & De Witte, 2008). Our conceptualization of crafting for autonomy includes a broad set of proactive and self-initiated behaviors with the goal of enhancing one's sense of autonomy, for example, rearranging one's work schedule, putting emphasis on personally interesting tasks, or trying out new work methods to keep boredom at bay (see Table 1). Similarly, crafting for competence concerns not only developing one's capabilities in relation to one's current work tasks (Bruning & Campion, 2018; Tims et al., 2012) but can also include lowering or increasing the difficulty of tasks that are not optimally challenging (Deci & Ryan, 2000) or learning in an unrelated field in order to gain a sense of mastery. Finally, crafting for relatedness not only includes the idea of shaping one's work to increase the social support that one receives (Petrou et al., 2012; Tims et al., 2012) but can also include, in a wider sense, efforts at increasing one's sense of belongingness by showing interest in and caring for others (Baumeister & Leary, 1995). Each need crafting dimension can incorporate crafting practices focused on shaping a wide variety of demands and resources (e.g., crafting for autonomy subsumes crafting focused on shaping job control, task enjoyment, decision latitude, task significance, task variety, role clarity and conflict, value [in]congruence, and voice, to name a few). As such, more parsimonious yet still comprehensive measures for behavioral crafting may be developed using the SDT Model of Need Crafting at Work.

Integrating the concept of need crafting with prior crafting research focusing on resources and demands (Tims & Bakker, 2010), we divide behavioral need crafting into two broad sub-categories: *need resources crafting* and *need demands crafting*. Need resource crafting entails proactive behaviors focused on enhancing need satisfaction through the creation of new personal, job, and social resources, or by shaping and rechanneling existing resources. Need resources crafting has potential for role expansion, wherein employees' personal and work roles and identities become enriched through need crafting efforts such as proactively expanding one's job content to take on more personally valued tasks or by broadening one's social roles at work (Bruning & Campion, 2018). Moreover, need resources crafting aligns with frameworks used in many SDT-based interventions, which involve enhancing and mobilizing personal resources to pursue need-satisfying goals (e.g., Laporte, van den Bogaard, et al., 2022; Sheldon et al., 2010). Need demands crafting, on the other hand, refers to proactive behaviors targeted at enhancing need satisfaction and decreasing need frustration by shaping personal, job, and social demands. Employees can adjust their demands through need crafting by decreasing demands that bring about need frustration or by optimizing their demands to be more conducive to need satisfaction (Bakker & Oerlemans, 2019; Zhang & Parker, 2022). As such, need demands crafting is a

proactive, bottom-up approach that employees may utilize to create a less need-thwarting and more need-supportive context for themselves at work. Need demands crafting can be a strategy for role reduction, wherein employees reduce effort expenditure and pressures associated with the job and create more space for roles and activities they value most (Bruning & Campion, 2018).

A PROCESS MODEL OF NEED CRAFTING AT WORK FROM AN SDT PERSPECTIVE

Having proposed and defined the concepts of behavioral and cognitive need crafting at work, we now turn to how these concepts are related and, further, how they constitute a reciprocal process in fostering well-being and optimal work functioning through basic psychological needs and external work characteristics as displayed in Figure 1. We argue that cognitive crafting for basic psychological needs precedes behavioral crafting of the very same needs and that increased need crafting enhances need satisfaction and reduces need frustration at work (Laporte et al., 2021; Laporte, Soenens, et al., 2022). We also propose that behavioral need crafting can increase job resources and decrease job demands. In line with past research, the model further posits a relation from job demands and resources to basic psychological need satisfaction (Olafsen & Frølund, 2018; Van den Broeck, Vansteenkiste, de Witte, & Lens, 2008), and that need satisfaction is, positively, and need frustration is, negatively, linked to employee functioning (e.g., Niemiec et al., 2022; Olafsen et al., 2017; Van den Broeck, Vansteenkiste, de Witte, & Lens, 2008). Finally, we propose a feedback loop, with changes in need satisfaction and frustration acting as drivers of further engagement in cognitive and behavioral need crafting practices at work.

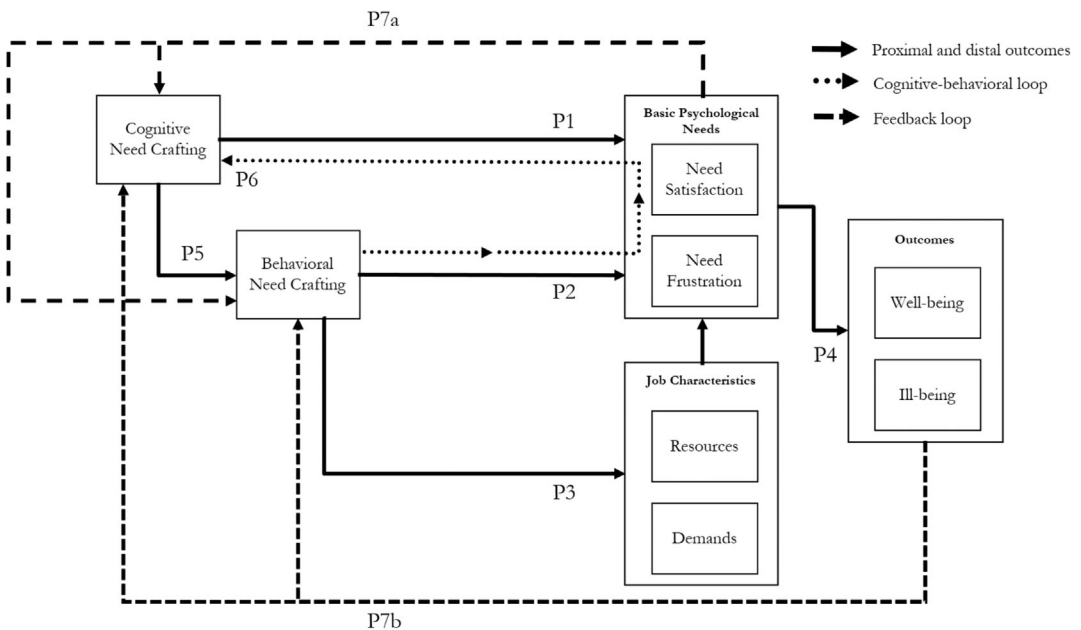


FIGURE 1 The self-determination theory model of need crafting at work.

The impact of work-related need crafting on basic psychological needs

There is evidence that cognitive forms of job crafting increase need satisfaction (Slemp & Vella-Brodrick, 2014). By actively reshaping their perceptions of the job through cognitive need crafting, individuals can enhance their work experience leading to increased need satisfaction and reduced frustration at work. For instance, individuals can modify their need-based schemas to enhance their awareness of opportunities leading to the satisfaction of specific needs in their direct environment (Radel et al., 2011). Thus, enhancing awareness of opportunities for need satisfaction may involve choosing to focus more on work aspects that reflect personal values, thus increasing autonomy satisfaction, putting more attention on what is learned when tackling specific tasks, thus increasing competence satisfaction, or being more sensitive to how colleagues contribute to good relations in the work group, thus increasing relatedness satisfaction. Another instance of schema modification is reframing the meaning (Berg et al., 2010) and impact (Hewett, 2022) of work situations. Employees can reframe unwanted work situations by considering how they can gain access to new options, thereby increasing autonomy; how they enable them to develop their skills, thereby increasing competence; and how they contribute to the good functioning of the group, thereby increasing relatedness. Reframing has been shown to increase autonomous work motivation (Berkovich & Eyal, 2017), a form of motivation centrally underpinned by basic psychological need satisfaction (Olafsen et al., 2018, 2021). As such, it is likely that reframing is also conducive to enhanced need satisfaction. Creation of new need-based schemas is also likely to lead to need satisfaction. Luyckx et al. (2009) demonstrated that individuals engaging in cognitive exploration of potential future self-related plans increase their need satisfaction over time. Such cognitive exploration could be likened with the redefining aspects of cognitive need crafting, which would entail the formation of new need-based schemas as part of the new definition of one's job (Janssen et al., 2016). We can thus postulate that different forms of cognitive need crafting, by reshaping or creating need-based work schemas, are likely to directly impact the basic psychological needs.

Proposition 1. *Cognitive need crafting at work results in increased need satisfaction and decreased need frustration.*

Following previous research on job crafting in relation to basic psychological needs (Bakker & Oerlemans, 2019; Slemp & Vella-Brodrick, 2014; Toyama et al., 2022), job crafting serves to fulfill such needs of employees and, as we propose, reduce the experience of need frustration. Behavioral need crafting aligns even closer with SDT than prior conceptualizations, constituting employees' proactive efforts focused on enhancing the satisfaction and diminishing the frustration of the needs for autonomy, competence, and relatedness at work. Thus, through need crafting, employees can make bottom-up changes in their work that are conducive to a more optimized situation for their own psychological needs. For instance, crafting for competence could result through creation of new skills, knowledge, and capabilities. Importantly, such changes may not always involve changes in external job demands and resources, as need crafting can also involve shaping skills and capabilities that are not directly related to the task characteristics of one's job. As another example, crafting for relatedness could result in relatedness satisfaction through showing mutual care and support for colleagues, even if the content of such interactions would not be work-related. As a proactive, individual-level strategy, behavioral need crafting constitutes a source of need satisfaction and reduced need frustration at work that supplements contextual enhancers of need satisfaction identified in the literature

(e.g., need support, personal, job, and social resources) (Van den Broeck et al., 2016). Adapting the matching perspective proposed by de Bloom et al. (2020), crafting focused on a specific need can be expected to produce the highest positive effect for that needs' satisfaction (e.g., autonomy crafting primarily enhances autonomy need satisfaction).

Proposition 2. *Behavioral need crafting at work results in increased need satisfaction and decreased need frustration.*

The impact of work-related need crafting on job demands and resources

Following the model proposed by Wrzesniewski and Dutton (2001), engaging in job crafting practices will change the characteristics (design) of the job. Coupling this with the JD-R framework (Bakker & Demerouti, 2017), we propose that engaging in behavioral need crafting will have an impact on external job demands and resources. More specifically, behavioral need crafting is expected to lead to an increase in job resources and to a decrease in job demands. Studies based on the JD-R model have shown that employees can increase their job resources (e.g., task variety, development opportunities, and social support) through job crafting, while the effects of crafting for job demands are less clear (Harju et al., 2021; Holman et al., 2024; Tims et al., 2013). Similarly, through behavioral need crafting, employees proactively shape their job contexts to be better aligned with their psychological needs, with potential for enhancing job resources. That is, although behavioral need crafting centers on behaviors focused on psychological need satisfaction and frustration, such crafting behaviors can also influence the individual's external work context. For instance, crafting efforts focused on enhancing autonomy need satisfaction may also help the individual to enhance their job control, decision latitude, and task variety, as they shape their job characteristics in a way that allows for a better integration with personal interests and values. Similarly, crafting focused on competence could help employees to build ability-related job resources such as skill utilization and developmental opportunities, and relatedness crafting could provide employees with more supervisor and coworker support and feedback (in addition to boosting relatedness experiences). Thus, behavioral need crafting at work has the potential to positively shape and increase an individual's job resources, in addition to providing them with enhanced need satisfaction.

Need crafting efforts may also have an impact on job demands. For instance, autonomy crafting could help employees to change task boundaries and voice opinions, which support the individuals' role clarity and decrease external pressures posed by the job (see also Weinstein & Ryan, 2011). Crafting for competence could help to manage heavy cognitive demands and workload in a self-initiated way, as the individual actively reorganizes their job to tackle such demands and reduce overload. Crafting focused on relatedness could help employees navigate emotional demands and situations with interpersonal conflict by managing interactions with coworkers, leaders, and clients and limiting social involvement when a mutual relationship is very difficult to achieve.

Proposition 3. *Behavioral need crafting at work results in an increase in job resources and decrease in job demands.*

The impact of work-related need crafting on well-being and ill-being

With increased need satisfaction and decreased need frustration through the paths in Propositions 2–4, we can further expect positive effects for employees' optimal functioning, in terms of enhanced well-being and diminished ill-being, as need-based experiences have been shown to be a vital antecedent of a wide range of well-/ill-being indicators in numerous studies within SDT (e.g., Olafsen et al., 2021, 2017; Van den Broeck et al., 2016). Thus, our model highlights work-related need crafting as a bottom-up, self-initiated way through which individuals can bring about changes in their well-being and ill-being, with psychological needs as the key variable that translates employees' crafting efforts into well-being and ill-being outcomes. The paths from crafting to needs directly and indirectly (i.e., through job demands and resources) provide a holistic framework for describing crafting processes, well within the realm of SDT's postulate of individuals being "proactive organisms" that shape both themselves and their environments in order to function optimally (Vansteenkiste & Ryan, 2013). Thus, our model delineates that cognitive and behavioral need crafting at work leads to enhanced well-being and diminished ill-being, partially through changes in job demands and resources, and that need satisfaction and frustration are key factors that transmit these effects to outcomes.

Proposition 4. *Need crafting at work results in increased well-being and decreased ill-being through a process involving changes in psychological need satisfaction and frustration.*

The interplay between cognitive and behavioral crafting

Melo et al. (2021) posited that behavioral crafting efforts likely stem from cognitive processes as an individual is more intent on initiating effective changes in the content and context of their job if they have first elaborated those changes mentally. Mäkikangas and Schaufeli (2021) supported this, as they showed that employees who engaged most in cognitive crafting were also the ones who engaged in high levels of behavioral crafting. There has also recently been direct evidence for cognitive crafting predicting behavioral crafting over time (Costantini, 2022; Zhang et al., 2023). Adding to these prior conceptualizations and findings, we posit that cognitive need crafting, by aiming to resolve the discrepancy between need-based schemas and the work reality of the individual, can lead to changes in that work reality through behavioral need crafting. For instance, the reframing of an existing competence-based schema, where an individual focuses their mind on the tasks that they find most satisfying, is likely to lead to behavioral need crafting in terms of actively increasing the time and energy spent on those tasks. As another example, reframing a relatedness-based schema to see interaction with colleagues in terms of potential for mutual care rather than as purely instrumental is likely to lead the individual to seek such interactions by behaviorally crafting for relatedness. Likewise, the formation of new need-based schemas, driven by employee curiosity, is likely to lead to explorative need crafting behaviors of seeking new experiences and information (Kashdan et al., 2020), finding opportunities with the potential to satisfy needs in new ways. We thus argue that individuals engaging in cognitive need crafting at work, by either reshaping existing need-based schemas or creating new ones, will also be more likely to engage in behavioral need crafting.

Proposition 5. *Cognitive need crafting at work results in increased behavioral need crafting.*

As cognitive crafting affects behavioral crafting, the reciprocal relationship has also been evidenced (Costantini, 2022; Zhang et al., 2023). If cognitive crafting can be elicited by a discrepancy between work reality and work representations, then changes to the employee's work reality through their own behavioral crafting are also likely to further create such a discrepancy by opening the potential for further positive change. For instance, an employee proactively taking on an assignment they find highly interesting may increase their autonomy satisfaction, leading them to reframe and broaden their perspective of what their job can offer in terms of interesting projects. Behavioral crafting can thus not only bring a resolution to the discrepancy between need-based schemas and work reality by its impact on need satisfaction, but this successful impact also opens new opportunities. Indeed, by demonstrating the employee's capacity to change their work reality positively, behavioral crafting also bolsters the employee to reconsider their job and envision what new concrete changes they could bring to their work, which is akin to cognitive crafting. In that regard, we would argue that behavioral crafting, by having an impact on basic psychological need satisfaction and frustration, changes both the reality of employees' work and their sense of what they can craft, leading them to change their need-based schemas accordingly through cognitive need crafting.

Proposition 6. *Behavioral need crafting at work results in increased cognitive need crafting through increased satisfaction and reduced frustration of basic psychological needs.*

The feedback loop between basic needs and work-related need crafting

Besides the potential positive effects for well-being and ill-being, sustained use of need crafting practices is also likely to create positive feedback loops, where enhanced need satisfaction helps employees to become more energized, making further need crafting practices easier to implement (see also Quinn et al., 2012). Complementarily, instances of enhanced need frustration are also likely to create a dynamic of need restoration (Dalgas et al., 2024) with employees engaging in crafting as an attempt to resolve their frustration.

Existing models of well-being and flow argue that proactive work behaviors (Cangiano & Parker, 2015), work cognitions, and job crafting (Bakker & Van Woerkom, 2017) lead to an increase in basic need satisfaction, which, in turn, indirectly leads to further engagement in those proactive processes. These models refer to the broaden-and-build theory of positive affect (Fredrickson, 2001), which posits that experiencing positive emotions leads individuals to broaden their thought-action repertoire and build their personal resources. At the empirical level, Clinton et al. (2024) have shown that there is a positive and sustaining reciprocal relationship over time between job crafting and self-concordant goal attainment, with self-concordant goal pursuit and attainment being underpinned by satisfaction of basic psychological needs (Sheldon & Houser-Marko, 2001). Likewise, Zhang et al. (2023) have shown that there is a positive and sustaining feedback loop across multiple time points between job crafting and passion, with passion being underpinned by satisfaction of basic psychological needs (Vallerand, 2015). As Zhang et al. (2023) argue that there is an affective component and a motivational component to the interplay between passion and crafting, we propose that there is a positive feedback loop

between need crafting and basic psychological needs (motivational component) and a positive feedback loop between well-being and need crafting (affective component). We argue that the feedback loop between crafting and needs is direct. More specifically, as need crafting is primarily geared toward addressing needs, and needs are also motivational antecedents for crafting, basic need satisfaction and frustration are both proximal outcomes and proximal drivers of work-related need crafting. We also posit that the feedback loop between crafting and well-being is indirect, through the mediation of the satisfaction and frustration of basic psychological needs, such that improvements in well-being have an additional positive effect on further crafting efforts on top of basic psychological needs. Furthermore, we advance that cognitive need crafting corresponds to “broaden” and behavioral need crafting to “build” of the broaden-and-build theory.

On the cognitive side, studies have shown that need satisfaction generally predicts enhanced awareness of the environment (Olafsen, 2017) and the formation of innovative ideas (Messmann et al., 2022). Regarding specific needs, autonomy satisfaction has been shown to increase curiosity (Schutte & Malouff, 2019), which is itself a predictor of job crafting (Kashdan et al., 2020). Moreover, relatedness satisfaction has been shown to increase anticipation of further satisfaction from new social encounters (Moller et al., 2010). Taken together, need satisfaction enhances curiosity and attention, creates further anticipation of satisfaction, and bolsters idea production and predicts crafting efforts, all elements that are considered to be part of the broaden effect (attention, creativity, and social cognition) (Conway et al., 2012). Need satisfaction thus not only brings direct confirmation to existing need-based schemas, but through the enhanced anticipation and curiosity it fosters, it also pushes for the broadening of these existing schemas and the creation of new ones, which is akin to cognitive crafting. We can thus posit that higher need satisfaction and lower need frustration gained through need crafting practices is conducive to the use of more cognitive need crafting practices in the future.

On the behavioral side, Grant and Ashford (2008) have proposed that autonomy and experienced efficacy (a mental state close to competence) are key situational enhancers of proactive work behavior. Indeed, increases in need satisfaction and decreases in need frustration can enable employees to keep or even increase their motivation for modifying the content and context of their job and thus build further their own resources. Support for the potential stimulating effect of need satisfaction has been found longitudinally for proactive work behavior in general (Chen et al., 2021) and also cross-sectionally in a recent study on job crafting (Wu et al., 2022). To summarize, we posit that a higher need satisfaction and lower need frustration through need crafting practices, together with well-being, energize further engagement in behavioral need crafting, creating a feedback loop.

Proposition 7. *Sustained use of need crafting practices at work creates a positive feedback loop over time, where (a) enhanced need satisfaction and diminished need frustration result in increased use of cognitive and behavioral need crafting practices over time and (b) enhanced well-being resulting in further increased use of both forms of crafting.*

CONCEPTUAL ADVANCES AND FUTURE DIRECTIONS

While the literature on job crafting continues to receive empirical and theoretical attention and recent efforts have provided advancements in reconciling the two dominant frameworks,

certain questions remain. In the Self-determination Theory Model of Need Crafting at Work, we have outlined how job crafting can be conceptualized as crafting for the basic psychological needs for autonomy, competence, and relatedness and how both cognitive and behavioral forms of these types of crafting should be accounted for in a reciprocal motivational process leading to employee well-being and optimal work functioning. Cognitive need crafting involves developing and altering work expectations (i.e., need-based schemas). Behavioral need crafting encompasses two dimensions: need demands crafting and need resources crafting. This approach to job crafting aligns with previous job crafting research while adhering to the SDT view of employees as proactive agents who actively shape their own need experiences in their surrounding environments. In the following, we highlight the theoretical contributions of the Self-determination Theory Model of Need Crafting and the avenues for future research it provides.

Behavioral and cognitive need crafting as two forms of job crafting

The concept of work-related need crafting can be seen as an expansion of previous job crafting frameworks. Indeed, our conceptualization integrates and expands existing approaches by encompassing both cognitive and behavioral forms of crafting and theorizing how these forms are interrelated. Yet, by basing crafting strategies on three universal basic psychological needs, our model offers a new type or structure of crafting with broader categories encompassing a wide range of various crafting practices more relevant for a broader spectrum of occupations and jobs. The proposed structure has obvious links to the conceptualization of Wrzesniewski and Dutton (2001), who argued for individuals crafting their job to maintain control over their work, to create a positive self-image for themselves in their work, and to connect with others in the workplace, aligning closely with the three SDT needs for autonomy, competence, and relatedness, respectively. However, structuring job crafting around the basic psychological needs allows for a clear framework for not only describing the motivational force but also the content of the crafting efforts themselves.

The concept of behavioral need crafting is linked to previous conceptualizations of job crafting that have focused on crafting as a proactive behavioral strategy (e.g., Tims et al., 2012; Tims & Bakker, 2010) but, again, organizes behavioral need crafting practices around the basic psychological needs within SDT. The concept of behavioral need crafting brings theoretical clarity to SDT-based research on behavioral change, which has examined a wide variety of behaviors related to experiences of need satisfaction without fully theorizing their content and related processes (Knittle et al., 2020). Behavioral need crafting, according to the Self-determination Theory Model of Need Crafting at Work, also has similarities to the “action” component of need crafting as developed by Laporte et al. (2021). However, the model highlights that behavioral need crafting is not only a general “action-oriented approach” (Laporte et al., 2021, p. 69), but more specifically a self-initiated and proactive shaping of the self and the environment (e.g., demands and resources) in order to satisfy psychological needs.

The concept of cognitive need crafting integrates two main research strands, namely, literature on the cognitive underpinnings of job crafting (e.g., meaning and identity, demands and resources, and sensemaking; Melo et al., 2021; Wrzesniewski & Dutton, 2001; Zhang & Parker, 2019), and SDT-based studies on cognitive processes related to work and motivation, such as the conceptualization of need-based schemas (Janssen et al., 2021) and motivational internalization processes (Hewett, 2022). Cognitive need crafting is distinct from existing concepts of cognitive crafting (e.g., Melo et al., 2021; Zhang & Parker, 2019) in that it focuses on

the schemas organizing the subjective experience of need satisfaction or need frustration at work rather than on the shifts in perception of work characteristics identified as resources or demands, therefore aligning well with studies on the role of intrinsic goal-oriented processes behind expressions of proactivity (Wu & Parker, 2013). It is also distinct from prior conceptualizations of crafting for need-based experiences in that, unlike the concept of need crafting by Laporte et al. (2021), work-related cognitive crafting entails self-initiated need-centered cognitive change processes rather than states of need awareness as a complement to behavioral efforts. Moreover, our conceptualization of cognitive need crafting refines the work of Kujanpää et al. (2022) and Tušl et al. (2024), who do not delineate specific cognitive change processes related to needs-based crafting and do not distinguish cognitive crafting from behavioral crafting.

With the conceptualization of work-related need crafting, a next and important step is to look at the operationalization of this concept and its underlying forms and dimensions. In doing so, it will be important to capture both the bottom-up, self-initiated nature of need crafting at work, and its focus on efforts made in order to satisfy basic psychological needs. Further, because we argue that the concept of work-related need crafting can possibly cover a large breadth of crafting efforts, scale items should refer to needs in a broad manner, capturing several of the aspects related to each need for best coverage. Moreover, it seems important to examine the incremental predictive power of an operationalization of work-related need crafting over existing scales, given that individual perceptions and behaviors focused on psychological needs may be more flexibly crafted over time than work characteristics as well as encompassing a wider breadth of possible crafting strategies employees engage in. Moreover, as suggested by others (e.g., Zhang & Parker, 2019), we find it important that efforts to develop measurement scales for work-related need crafting, follow the definitions of the constructs and their underlying forms and dimensions, such that the items capture the proactivity that crafting constitutes (i.e., I actively seek [...], I reorganize [...], and I modify [...]). As we expect cognitive crafting, behavioral resources crafting, and behavioral demands crafting to each entail distinct processes with distinct aims, they should be represented as distinct dimensions of the work-related need crafting construct (see Table 1).

The interrelation between cognitive and behavioral crafting

While previous frameworks have acknowledged the concept of cognitive crafting, as pointed out by Zhang and Parker (2019), research to date has not been specific when it comes to its relation with other forms of crafting. Former conceptual works, for instance, the job crafting models by Wrzesniewski and Dutton (2001) and Zhang and Parker (2019), have hinted at the potential influence of cognitive crafting on behavioral crafting, without theorizing it fully, though there has been subsequent empirical inquiry into that relation (Costantini, 2022). Likewise, the conceptualization of need crafting by Laporte et al. (2021) assumes that awareness of the level of need satisfaction is a prerequisite for engaging in need crafting behaviors, describing a path from experiences to behavioral crafting yet omits the necessary cognitive elaboration in-between that would effectively connect the two parts. The Self-determination Theory Model of Need Crafting at Work proposes that cognitive need crafting and behavioral need crafting constitute a reciprocal process where reshaping existing or creating new need-based schemas (i.e., cognitive need crafting) is likely to lead to engagement in related tasks at the behavioral level (i.e., behavioral need crafting), which, in turn, by changing the reality of work in terms of

the need satisfaction and frustration, is likely to lead to further changes in need-based schemas that integrate this new reality, as shown in Figure 1. Future empirical research can examine this proposition in determining the temporal interrelation between the two forms of work-related need crafting.

Need crafting as a reciprocal process model of motivation

The process outlined in the Self-determination Theory Model of Need Crafting at Work in Figure 1 showcases how cognitive and behavioral need crafting brings about need satisfaction (and reduced need frustration) that, in turn, contributes to optimal employee motivation and well-being and protects against ill-being. In addition, as a motivational process supported by need satisfaction is likely to facilitate more proactive behaviors (e.g., Huang et al., 2022; Wu et al., 2022), we also propose a reciprocal process whereby increased need satisfaction (and reduced need frustration) contributes to more need crafting, with increased well-being having an additional positive effect on crafting on top of need satisfaction. Future studies could examine the interplay between need crafting at work, need satisfaction and frustration, and well-being over time; for instance, it would be interesting to explore how need crafting can be used for need restoration (Dalgas et al., 2024) in situations where need frustration strongly impacts ill-being. Likewise, it would be interesting to explore how long it takes for need crafting practices to create an effect on well-being. It would also be useful to examine how work-related need crafting may influence reciprocal relationships between external job demands and resources and psychological need states over time.

Work-related need crafting as an extension of SDT

In addition to the specific contributions to the job crafting literature, our conceptual model also advances SDT as it applies to the study of organizational psychology. Indeed, work-related need crafting is a theoretical extension of SDT, with previous research mainly focusing on how the social-contextual environment either supports or hinders the human tendency of psychological growth, functioning, and well-being by supporting or thwarting the three basic human psychological needs at work (Deci et al., 2017; Forest et al., 2023; Olafsen & Deci, 2020). As such, although the idea that people have a natural inclination to seek and create work environments that contribute to their own need satisfaction and growth is consistent with SDT's organismic-dialectical perspective (Ryan & Deci, 2002), this idea has so far not been well-integrated into the theory. By engaging in need crafting at work, rather than being solely dependent on supportive work environments to get their basic psychological needs met, employees can contribute actively to their own optimal functioning and well-being by crafting their experiences of need satisfaction.

Further, while the idea of need crafting was recently introduced by Laporte et al. (2021) in the educational domain, this conceptualization did not fully take previous conceptualizations and prior empirical research on crafting into account. In the Self-determination Theory Model of Need Crafting at Work, we outline how the basic psychological needs can be used to encompass previous forms of crafting, expanding them into broader categories, and clearly distinguishing cognitive and behavioral need crafting. Consequently, introducing the concept of work-related need crafting opens an avenue of future research on how crafting for each basic

psychological need, accounting for both cognitive and behavioral processes, can bring about positive motivational processes particularly in the work domain. With the large literature of SDT in the organizational domain showing the importance of a supporting external environment for the basic psychological needs, future studies might also take into consideration the interaction of individual and external factors in predicting motivational processes unfolding at work. Indeed, it seems likely that need-supportive work environments are conducive to a motivational process stimulating more need crafting (Slemp et al., 2015; Wu et al., 2022) or, as suggested by Laporte et al. (2021), that need crafting can serve as a buffer against the detrimental effects of need-thwarting contexts. Finally, with regard to the emerging stream of research on the tripartite approach to basic psychological needs states (e.g., Huyghebaert-Zouaghi et al., 2021), future research might attempt to integrate the concept of need unfulfillment and evaluate the role of cognitive and behavioral need crafting in alleviate unfulfilling experiences.

PRACTICAL IMPLICATIONS

While theoretical in nature, our model also has several implications for practice. First, the concept of work-related need crafting is informative for crafting interventions, which can benefit from the decisively bottom-up focus of crafting for psychological needs, complementing earlier approaches that mostly focus on shaping external demands and resources, some even adding organizationally defined objectives to the intervention agenda (Oprea et al., 2019). As perceptions of the same objective work environment may differ between employees, emphasizing employees' subjective experience of their job by focusing on individual needs as the basis of crafting interventions may produce higher compliance toward the intervention, as well as better results especially for motivational outcomes (e.g., work engagement and autonomous work motivation). Moreover, need crafting can be a readily applicable framework for employees to consider how they may self-initiate changes to optimize their work functioning based on basic psychological needs. Work-related need crafting is applicable to a wide range of work and life situations, even for flexible, emerging jobs that may not have a clearly definable array of demands and resources (Janssen et al., 2016). Finally, the idea of work-related need crafting has the potential to complement previous SDT interventions in the workplace by offering a bottom-up approach to enhancing employees' need satisfaction, autonomous motivation, and in turn well-being and optimal work-functioning.

CONCLUSION

Based on SDT, we develop a novel conceptualization and model of work-related need crafting focusing on the basic psychological needs for autonomy, competence, and relatedness. First, we define cognitive and behavioral need crafting as two main forms of work-related crafting, each addressing autonomy, competence, and relatedness. Second, through seven propositions, we showcase how cognitive and behavioral need crafting are related and propose a reciprocal process of how these forms of need crafting bring about enhanced employee well-being and diminished ill-being through increasing need satisfaction and decreasing need frustration. The Self-determination Theory Model of Need Crafting at Work has implications for future studies on crafting at work by broadening the scope of crafting practices and explaining the underlying processes of how crafting for autonomy, competence, and relatedness brings about positive

consequences for employees, stimulating even further crafting efforts. In addition, it has implications for future SDT-based studies by emphasizing a new individual-level construct to consider when examining motivational processes at work. This provides a novel addition to the SDT model of motivation at work that acknowledges humans' proactive nature in pursuing growth and full functioning. Moreover, this extension of the framework aligns with the emphasis on employees' proactive behaviors in today's knowledge society.

CONFLICT OF INTEREST STATEMENT

The authors have no conflict of interest to declare.

DATA AVAILABILITY STATEMENT

Data sharing is not applicable to this article, as no datasets were generated or analyzed during the current study.

ETHICS STATEMENT

No ethical approval is required.

ORCID

Anja H. Olafsen  <https://orcid.org/0000-0002-8600-5747>

REFERENCES

- 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>
- Bakker, A. B., Demerouti, E., & Sanz-Vergel, A. (2023). Job demands–resources theory: Ten years later. *Annual Review of Organizational Psychology and Organizational Behavior, 10*, 25–53. <https://doi.org/10.1146/annurev-orgpsych-120920-053933>
- Bakker, A. B., & Oerlemans, W. G. (2019). Daily job crafting and momentary work engagement: A self-determination and self-regulation perspective. *Journal of Vocational Behavior, 112*, 417–430. <https://doi.org/10.1016/j.jvb.2018.12.005>
- Bakker, A. B., Tims, M., & Derks, D. (2012). Proactive personality and job performance: The role of job crafting and work engagement. *Human Relations, 65*(10), 1359–1378. <https://doi.org/10.1177/0018726712453471>
- Bakker, A. B., & van Woerkom, M. (2017). Flow at work: A self-determination perspective. *Occupational Health Science, 1*, 47–65. <https://doi.org/10.1007/s41542-017-0003-3>
- Bannya, A. R., Bainbridge, H. T., & Chan-Serafin, S. (2023). HR practices and work relationships: A 20 year review of relational HRM research. *Human Resource Management, 62*(4), 391–412. <https://doi.org/10.1002/hrm.22151>
- Batova, T. (2018). Work motivation in the rhetoric of component content management. *Journal of Business and Technical Communication, 32*(3), 308–346. <https://doi.org/10.1177/1050651918762030>
- Baumeister, R. F., & Leary, M. R. (1995). The need to belong: Desire for interpersonal attachments as a fundamental human motivation. *Psychological Bulletin, 117*(3), 497–529. <https://doi.org/10.1037/0033-2909.117.3.497>
- Berdicchia, D., Bracci, E., & Masino, G. (2021). Performance management systems promote job crafting: The role of employees' motivation. *Personnel Review, 51*(3), 861–875. <https://doi.org/10.1108/PR-05-2020-0361>
- Berg, J. M., Grant, A. M., & Johnson, V. (2010). When callings are calling: Crafting work and leisure in pursuit of unanswered occupational callings. *Organization Science, 21*(5), 973–994. <https://doi.org/10.1287/orsc.1090.0497>
- Berkovich, I., & Eyal, O. (2017). Emotional reframing as a mediator of the relationships between transformational school leadership and teachers' motivation and commitment. *Journal of Educational Administration, 55*(5), 450–468. <https://doi.org/10.1108/JEA-07-2016-0072>

- Bindl, U. K., Unsworth, K. L., Gibson, C. B., & Stride, C. B. (2019). Job crafting revisited: Implications of an extended framework for active changes at work. *Journal of Applied Psychology, 104*(5), 605–628. <https://doi.org/10.1037/apl0000362>
- de Bloom, J., Vaziri, H., Tay, L., & Kujanpää, M. (2020). An identity-based integrative needs model of crafting: Crafting within and across life domains. *Journal of Applied Psychology, 105*(12), 1423–1446. <https://doi.org/10.1037/apl0000495>
- Bruning, P. F., & Campion, M. A. (2018). A role–resource approach–avoidance model of job crafting: A multi-method integration and extension of job crafting theory. *Academy of Management Journal, 61*(2), 499–522. <https://doi.org/10.5465/amj.2015.0604>
- Cangiano, F., & Parker, S. K. (2015). Proactivity for mental health and well-being. In *The Wiley Blackwell handbook of the psychology of occupational safety and workplace health* (pp. 228–250). Wiley.
- Chen, H., Liang, Q., Feng, C., & Zhang, Y. (2021). Why and when do employees become more proactive under humble leaders? The roles of psychological need satisfaction and Chinese traditionality. *Journal of Organizational Change Management, 34*(5), 1076–1095. <https://doi.org/10.1108/JOCM-12-2020-0366>
- Clinton, M. E., Bindl, U. K., Frasca, K. J., & Martinescu, E. (2024). Once a job crafter, always a job crafter? Investigating job crafting in organizations as a reciprocal self-concordant process across time. *Human Relations, 00187267241228997*. <https://doi.org/10.1177/00187267241228997>
- Conway, A. M., Tugade, M. M., Catalani, L. I., & Fredrickson, B. L. (2012). The broaden-and-build theory of positive emotions: Form, function, and mechanisms. In I. Boniwell, S. A. David, & A. C. Ayers (Eds.), *The Oxford handbook of happiness* (pp. 17–34). Oxford Academic.
- Costantini, A. (2022). Rethinking work: How approach and avoidance features of cognitive crafting are linked with job crafting behaviors and work engagement. *Journal of Management & Organization, 1*–21. <https://doi.org/10.1017/jmo.2022.79>
- Dalgas, B. W., Ntoumanis, N., Elmoose-Østerlund, K., & Bredahl, T. V. G. (2024). Exploring the process of restoring psychological needs after incidences of frustration and need unfulfillment. *Frontiers in Psychology, 15*, 1413963. <https://doi.org/10.3389/fpsyg.2024.1413963>
- Deci, E. L., Olafsen, A. H., & Ryan, R. M. (2017). Self-determination theory in work organizations: State of the science. *Annual Review of Organizational Psychology and Organizational Behavior, 4*(1), 19–43. <https://doi.org/10.1146/annurev-orgpsych-032516-113108>
- Deci, E. L., & Ryan, R. M. (2000). The “what” and “why” of goal pursuits: Human needs and the self-determination of behavior. *Psychological Inquiry, 11*(4), 227–268. https://doi.org/10.1207/s15327965pli1104_01
- Demerouti, E. (2015). Strategies used by individuals to prevent burnout. *European Journal of Clinical Investigation, 45*(10), 1106–1112. <https://doi.org/10.1111/eci.12494>
- Demerouti, E., & Peeters, M. C. W. (2018). Transmission of reduction-oriented crafting among colleagues: A diary study on the moderating role of working conditions. *Journal of Occupational and Organizational Psychology, 91*(2), 209–234. <https://doi.org/10.1111/joop.12196>
- Demerouti, E., Peeters, M. C., & van den Heuvel, M. (2019). Job crafting interventions: do they work and why? In *Positive psychological intervention design and protocols for multi-cultural contexts* (pp. 103–125). Springer. https://doi.org/10.1007/978-3-030-20020-6_5
- Forest, J., Gradito Dubord, M.-A., Olafsen, A. H., & Carpentier, J. (2023). Shaping tomorrow's workplace by integrating self-determination theory: A literature review and recommendations. In R. M. Ryan (Ed.), *The Oxford handbook of self-determination theory*. Oxford University Press. <https://doi.org/10.1093/oxfordhb/9780197600047.013.45>
- Fredrickson, B. L. (2001). The role of positive emotions in positive psychology: The broaden-and-build theory of positive emotions. *American Psychologist, 56*(3), 218–226. <https://doi.org/10.1037/0003-066X.56.3.218>
- Grant, A. M., & Ashford, S. J. (2008). The dynamics of proactivity at work. *Research in Organizational Behavior, 28*, 3–34. <https://doi.org/10.1016/j.riob.2008.04.002>
- Harju, L. K., Kaltiainen, J., & Hakanen, J. J. (2021). The double-edged sword of job crafting: The effects of job crafting on changes in job demands and employee well-being. *Human Resource Management, 60*(6), 953–968. <https://doi.org/10.1002/hrm.22054>
- Hewett, R. (2022). Dissonance, reflection and reframing: Unpacking the black box of motivation internalization. *Journal of Management Studies, 60*(2), 285–312. <https://doi.org/10.1111/joms.12878>

- Holman, D., Escaffi-Schwarz, M., Vasquez, C. A., Irmer, J. P., & Zapf, D. (2024). Does job crafting affect employee outcomes via job characteristics? A meta-analytic test of a key job crafting mechanism. *Journal of Occupational and Organizational Psychology*, 97(1), 47–73. <https://doi.org/10.1111/joop.12450>
- Huang, X., Sun, M., & Wang, D. (2022). Work harder and smarter: The critical role of teachers' job crafting in promoting teaching for creativity. *Teaching and Teacher Education*, 116, 103758. <https://doi.org/10.1016/j.tate.2022.103758>
- Huyghebaert-Zouaghi, T., Ntoumanis, N., Berjot, S., & Gillet, N. (2021). Advancing the conceptualization and measurement of psychological need states: A 3 × 3 model based on self-determination theory. *Journal of Career Assessment*, 29(3), 396–421. <https://doi.org/10.1177/1069072720978792>
- Janssen, S., van Vuuren, M., & de Jong, M. D. (2021). Sensemaking in supervisor-doctoral student relationships: Revealing schemas on the fulfillment of basic psychological needs. *Studies in Higher Education*, 46(12), 2738–2750. <https://doi.org/10.1080/03075079.2020.1804850>
- Janssen, M., Wallenburg, I., & de Bont, A. (2016). Carving out a place for new health care occupations: An ethnographic study into job crafting. In *Boundaryless hospital* (pp. 119–141). Springer. https://doi.org/10.1007/978-3-662-49012-9_7
- Kashdan, T. B., Goodman, F. R., Disabato, D. J., McKnight, P. E., Kelso, K., & Naughton, C. (2020). Curiosity has comprehensive benefits in the workplace: Developing and validating a multidimensional workplace curiosity scale in United States and German employees. *Personality and Individual Differences*, 155, 109717. <https://doi.org/10.1016/j.paid.2019.109717>
- Knittle, K., Heino, M., Marques, M. M., Stenius, M., Beattie, M., Ehbrecht, F., Hagger, M. S., Hardeman, W., & Hankonen, N. (2020). The compendium of self-enactable techniques to change and self-manage motivation and behaviour v. 1.0. *Nature Human Behaviour*, 4(2), 215–223. <https://doi.org/10.1038/s41562-019-0798-9>
- Kujanpää, M., Syrek, C., Tay, L., Kinnunen, U., Mäkikangas, A., Shimazu, A., Wiese, C. W., Brauchli, R., Bauer, G. F., & Kerksieck, P. (2022). Needs-based off-job crafting across different life domains and contexts: Testing a novel conceptual and measurement approach. *Frontiers in Psychology*, 13, 959296. <https://doi.org/10.3389/fpsyg.2022.959296>
- Laporte, N., Soenens, B., Brenning, K., & Vansteenkiste, M. (2021). Adolescents as active managers of their own psychological needs: The role of psychological need crafting in adolescents' mental health. *Journal of Adolescence*, 88, 67–83. <https://doi.org/10.1016/j.adolescence.2021.02.004>
- Laporte, N., Soenens, B., Flamant, N., Vansteenkiste, M., Mabbe, E., & Brenning, K. (2022). The role of daily need crafting in daily fluctuations in adolescents' need-based and affective experiences. *Motivation and Emotion*, 46(2), 137–149. <https://doi.org/10.1007/s11031-021-09921-2>
- Laporte, N., van den Bogaard, D., Brenning, K., Soenens, B., & Vansteenkiste, M. (2022). Testing an online program to foster need crafting during the COVID-19 pandemic. *Current Psychology*, 43(9), 8557–8574. <https://doi.org/10.1007/s12144-022-03012-2>
- Lazazzara, A., Tims, M., & de Gennaro, D. (2020). The process of reinventing a job: A meta-synthesis of qualitative job crafting research. *Journal of Vocational Behavior*, 116, 103267. <https://doi.org/10.1016/j.jvb.2019.101001>
- Lichtenthaler, P. W., & Fischbach, A. (2019). A meta-analysis on promotion-and prevention-focused job crafting. *European Journal of Work and Organizational Psychology*, 28(1), 30–50. <https://doi.org/10.1080/1359432X.2018.1527767>
- Luyckx, K., Vansteenkiste, M., Goossens, L., & Duriez, B. (2009). Basic need satisfaction and identity formation: Bridging self-determination theory and process-oriented identity research. *Journal of Counseling Psychology*, 56(2), 276–288. <https://doi.org/10.1037/a0015349>
- Mäkikangas, A., & Schaufeli, W. (2021). A person-centered investigation of two dominant job crafting theoretical frameworks and their work-related implications. *Journal of Vocational Behavior*, 131, 103658. <https://doi.org/10.1016/j.jvb.2021.103658>
- Melo, N., Dourado, D., & Andrade, J. (2021). Reclaiming cognitive crafting: An integrative model of behavioral and cognitive practices in job crafting. *International Journal of Organizational Analysis*, 29(5), 1302–1320. <https://doi.org/10.1108/IJOA-04-2020-2130>
- Messmann, G., Evers, A., & Kreijns, K. (2022). The role of basic psychological needs satisfaction in the relationship between transformational leadership and innovative work behavior. *Human Resource Development Quarterly*, 33(1), 29–45. <https://doi.org/10.1002/hrdq.21451>

- Moller, A. C., Deci, E. L., & Elliot, A. J. (2010). Person-level relatedness and the incremental value of relating. *Personality and Social Psychology Bulletin*, 36(6), 754–767. <https://doi.org/10.1177/0146167210371622>
- Niemiec, C. P., Olafsen, A. H., Halvari, H., & Williams, G. C. (2022). Losing sleep over work: A self-determination theory view on need frustration, sleep disturbance, and mental ill health. *Stress and Health*, 38(4), 790–803. <https://doi.org/10.1002/smi.3134>
- Olafsen, A. H. (2017). The implications of need-satisfying work climates on state mindfulness in a longitudinal analysis of work outcomes. *Motivation and Emotion*, 41(1), 22–37. <https://doi.org/10.1007/s11031-016-9592-4>
- Olafsen, A. H., & Deci, E. L. (2020). *Self-determination theory and its relation to organizations*. Oxford Research Encyclopedia of Psychology. <https://doi.org/10.1093/acrefore/9780190236557.013.112>
- Olafsen, A. H., Deci, E. L., & Halvari, H. (2018). Basic psychological needs and work motivation: A longitudinal test of directionality. *Motivation and Emotion*, 42(2), 178–189. <https://doi.org/10.1007/s11031-017-9646-2>
- Olafsen, A. H., & Frølund, C. W. (2018). Challenge accepted! Distinguishing between challenge- and hindrance demands. *Journal of Managerial Psychology*, 33(4/5), 345–357. <https://doi.org/10.1108/JMP-04-2017-0143>
- Olafsen, A. H., Halvari, H., & Frølund, C. W. (2021). The basic psychological need satisfaction and need frustration at work scale: A validation study. *Frontiers in Psychology*, 12, 697306. <https://doi.org/10.3389/fpsyg.2021.697306>
- Olafsen, A. H., Niemiec, C. P., Halvari, H., Deci, E. L., & Williams, G. C. (2017). On the dark side of work: A longitudinal analysis using self-determination theory. *European Journal of Work and Organizational Psychology*, 26(2), 275–285. <https://doi.org/10.1080/1359432X.2016.1257611>
- Oprea, B. T., Barzin, L., Virgă, D., Iliescu, D., & Rusu, A. (2019). Effectiveness of job crafting interventions: A meta-analysis and utility analysis. *European Journal of Work and Organizational Psychology*, 28(6), 723–741. <https://doi.org/10.1080/1359432X.2019.1646728>
- Petrou, P., Demerouti, E., Peeters, M. C., Schaufeli, W. B., & Hetland, J. (2012). Crafting a job on a daily basis: Contextual correlates and the link to work engagement. *Journal of Organizational Behavior*, 33(8), 1120–1141. <https://doi.org/10.1002/job.1783>
- Quinn, R. W., Spreitzer, G. M., & Lam, C. F. (2012). Building a sustainable model of human energy in organizations: Exploring the critical role of resources. *Academy of Management Annals*, 6(1), 337–396. <https://doi.org/10.5465/19416520.2012.676762>
- Radel, R., Pelletier, L. G., Sarrazin, P., & Milyavskaya, M. (2011). Restoration process of the need for autonomy: The early alarm stage. *Journal of Personality and Social Psychology*, 101(5), 919–934. <https://doi.org/10.1037/a0025196>
- Randel, A. E., Galvin, B. M., & Alves, T. D. C. (2023). Job crafting to ensure a balance between focus and connection. *Applied Psychology*, 73(1), 296–322.
- Rudolph, C. W., Katz, I. M., Lavigne, K. N., & Zacher, H. (2017). Job crafting: A meta-analysis of relationships with individual differences, job characteristics, and work outcomes. *Journal of Vocational Behavior*, 102, 112–138. <https://doi.org/10.1016/j.jvb.2017.05.008>
- Ryan, R. M., & Deci, E. L. (2002). Overview of self-determination theory: An organismic-dialectical perspective. In E. L. Deci & R. M. Ryan (Eds.), *Handbook of self-determination research* (pp. 3–33). University of Rochester Press.
- Ryan, R. M., & Deci, E. L. (2017). *Self-determination theory: Autonomy and basic psychological needs in human motivation, social development, and wellness*. Guilford Publications.
- Schutte, N. S., & Malouff, J. M. (2019). Increasing curiosity through autonomy of choice. *Motivation and Emotion*, 43(4), 563–570. <https://doi.org/10.1007/s11031-019-09758-w>
- Sheldon, K. M., Abad, N., Ferguson, Y., Gunz, A., Houser-Marko, L., Nichols, C. P., & Lyubomirsky, S. (2010). Persistent pursuit of need-satisfying goals leads to increased happiness: A 6-month experimental longitudinal study. *Motivation and Emotion*, 34(1), 39–48. <https://doi.org/10.1007/s11031-009-9153-1>
- Sheldon, K. M., & Houser-Marko, L. (2001). Self-concordance, goal attainment, and the pursuit of happiness: Can there be an upward spiral? *Journal of Personality and Social Psychology*, 80(1), 152–165. <https://doi.org/10.1037/0022-3514.80.1.152>
- Singh, V. L., & Singh, M. (2016). Techniques of job crafting: An exploratory study on management consultants. *South Asian Journal of Management*, 23(2), 25.
- Slemp, G. R., Kern, M. L., & Vella-Brodrick, D. A. (2015). Workplace well-being: The role of job crafting and autonomy support. *Psychology of Well-Being*, 5(1), 7. <https://doi.org/10.1186/s13612-015-0034-y>

- Slemp, G. R., & Vella-Brodrick, D. A. (2014). Optimising employee mental health: The relationship between intrinsic need satisfaction, job crafting, and employee well-being. *Journal of Happiness Studies*, 15(4), 957–977. <https://doi.org/10.1007/s10902-013-9458-3>
- Strauss, K., & Parker, S. K. (2014). Effective and sustained proactivity in the workplace: A self-determination theory perspective. In M. Gagné (Ed.), *The Oxford handbook of work engagement, motivation, and self-determination theory* (pp. 50–71). Oxford University Press.
- Tims, M., & Bakker, A. B. (2010). Job crafting: Towards a new model of individual job redesign. *SA Journal of Industrial Psychology*, 36(2), 1–9. <https://doi.org/10.4102/sajip.v36i2.841>
- Tims, M., Bakker, A. B., & Derks, D. (2012). Development and validation of the job crafting scale. *Journal of Vocational Behavior*, 80(1), 173–186. <https://doi.org/10.1016/j.jvb.2011.05.009>
- Tims, M., Bakker, A. B., & Derks, D. (2013). The impact of job crafting on job demands, job resources, and well-being. *Journal of Occupational Health Psychology*, 18(2), 230–240. <https://doi.org/10.1037/a0032141>
- Tims, M., Twemlow, M., & Fong, C. Y. M. (2022). A state-of-the-art overview of job-crafting research: Current trends and future research directions. *Career Development International*, 27(1), 54–78. <https://doi.org/10.1108/CDI-08-2021-0216>
- Toyama, H., Upadyaya, K., & Salmela-Aro, K. (2022). Job crafting and well-being among school principals: The role of basic psychological need satisfaction and frustration. *European Management Journal*, 40(5), 809–818. <https://doi.org/10.1016/j.emj.2021.10.003>
- Tušl, M., Bauer, G. F., Kujanpää, M., Toyama, H., Shimazu, A., & de Bloom, J. (2024). Needs-based job crafting: Validation of a new scale based on psychological needs. *Journal of Occupational Health Psychology*, 29(2), 57–71. <https://doi.org/10.1037/ocp0000372>
- Unsworth, K., Mason, C., Jones, R., & Stream, Q. (2004). A use for rose-coloured glasses? Cognitive reframing, job crafting & positive psychology at work. In *18th annual Australian New Zealand academy of management conference*. University of Otago.
- Vallerand, R. J. (2015). *The psychology of passion: A dualistic model*. Oxford University Press. <https://doi.org/10.1093/acprof:oso/9780199777600.001.0001>
- 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 Accounting Research*, 42(5), 1195–1229. <https://doi.org/10.1177/01492063166632058>
- Van den Broeck, A., Vansteenkiste, M., & de Witte, H. (2008). Self-determination theory: A theoretical and empirical overview in occupational health psychology. In J. Houdmont & S. Leka (Eds.), *Occupational health psychology: European perspectives on research, education, and practice* (pp. 63–88). Nottingham University Press.
- Van den Broeck, A., Vansteenkiste, M., de Witte, H., & Lens, W. (2008). Explaining the relationships between job characteristics, burnout, and engagement: The role of basic psychological need satisfaction. *Work and Stress*, 22(3), 277–294. <https://doi.org/10.1080/02678370802393672>
- Vansteenkiste, M., & Ryan, R. M. (2013). On psychological growth and vulnerability: Basic psychological need satisfaction and need frustration as a unifying principle. *Journal of Psychotherapy Integration*, 23(3), 263–280. <https://doi.org/10.1037/a0032359>
- Vansteenkiste, M., Ryan, R. M., & Soenens, B. (2020). Basic psychological need theory: Advancements, critical themes, and future directions. *Motivation and Emotion*, 44(1), 1–31. <https://doi.org/10.1007/s11031-019-09818-1>
- Vansteenkiste, M., Soenens, B., & Ryan, R. M. (2023). Basic psychological needs theory: A conceptual and empirical review of key criteria. In R. M. Ryan (Ed.), *The Oxford handbook of self-determination theory*. Oxford University Press. <https://doi.org/10.1093/oxfordhb/9780197600047.013.5>
- Vuori, T., San, E., & Kira, M. (2012). Meaningfulness-making at work. *Qualitative Research in Organizations and Management: An International Journal*, 7(2), 231–248. <https://doi.org/10.1108/17465641211253110>
- Weinstein, N., & Ryan, R. M. (2011). A self-determination theory approach to understanding stress incursion and responses. *Stress and Health*, 27(1), 4–17. <https://doi.org/10.1002/smi.1368>
- Wrzesniewski, A., & Dutton, J. E. (2001). Crafting a job: Revisioning employees as active crafters of their work. *Academy of Management Review*, 26(2), 179–201. <https://doi.org/10.2307/259118>
- Wu, C. H., & Parker, S. K. (2013). Thinking and acting in anticipation: A review of research on proactive behavior. *Advances in Psychological Science*, 21(4), 679–700. <https://doi.org/10.3724/SP.J.1042.2013.00679>

- Wu, G., Zhang, L., Liu, X., & Liang, Y. (2022). How school principals' motivating style stimulates teachers' job crafting: A self-determination theory approach. *Current Psychology*, 42(24), 20833–20848. <https://doi.org/10.1007/s12144-022-03147-2>
- Zhang, F., & Parker, S. K. (2019). Reorienting job crafting research: A hierarchical structure of job crafting concepts and integrative review. *Journal of Organizational Behavior*, 40(2), 126–146. <https://doi.org/10.1002/job.2332>
- Zhang, F., & Parker, S. K. (2022). Reducing demands or optimizing demands? Effects of cognitive appraisal and autonomy on job crafting to change one's work demands. *European Journal of Work and Organizational Psychology*, 31(5), 641–654. <https://doi.org/10.1080/1359432X.2022.2032665>
- Zhang, X., Yu, K., Li, W.-D., & Zacher, H. (2023). Sustainability of passion for work? Change-related reciprocal relationships between passion and job crafting. *Journal of Management*, 01492063231207343. <https://doi.org/10.1177/01492063231207343>

How to cite this article: Olafsen, A. H., Marescaux, B. P. C., & Kujanpää, M. (2024). Crafting for autonomy, competence, and relatedness: A self-determination theory model of need crafting at work. *Applied Psychology*, 1–26. <https://doi.org/10.1111/apps.12570>