

# Comparing Work Engagement in People-Changing and People-Processing Service Providers: A Mediation Model With Red Tape, Autonomy, Dimensions of PSM, and Performance

Public Personnel Management

2018, Vol. 47(3) 287–313

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DOI: 10.1177/0091026018770225

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## Abstract

Due to the increasing demanding work environment, public managers need their employees to be proactive and dedicated and feel energetic in their work to reach high performance—that is, public organizations need engaged workers. However, there is a dearth of research examining work engagement in the public sector context in general and in different institutional contexts (e.g., education vis-à-vis central government) in particular. The goal of this study is to examine the relationship between antecedents and outcomes of work engagement in the public sector in general and the within-public sector differences including institutional contexts in particular. Based on the analysis of a large data set, it can be concluded that public servants have different personalities and work in different institutional contexts, and these differences influence their work engagement. The importance of work engagement research in public administration is further confirmed because it leads to higher performance and job satisfaction across sectors.

## Keywords

work engagement, people-processing service providers, people-changing service providers, performance, public service motivation

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## Introduction

Work engagement—defined as “[. . .] a positive, fulfilling, work-related state of mind that is characterized by vigor, dedication, and absorption” (Schaufeli, Salanova, González-Romá, & Bakker, 2002)—gained increasing attention in public organizations across the world (e.g., Cotton, 2012; Jansen, Brink, & van den Kolk, 2010; Kernaghan, 2011; Lavigna, 2013). In contrast to passive attitudes such as organizational commitment and job satisfaction that connote calmness and contentness, work engagement connotes proactivity and energy (Tummers, Steijn, Nevicka, & Heerema, 2016). Because it is increasingly expected of public servants to perform better with fewer resources supplemented with an increasing negative image among citizens, public organizations need engaged public servants instead of merely satisfied (passive) employees (Lavigna, 2013; Liu, Yang, & Yu, 2015).

Despite the attention for work engagement in practice, there is a dearth of research examining work engagement in the public sector context (Kernaghan, 2011; Tummers et al., 2016; Vigoda-Gadot, Eldor, & Schohat, 2013). Without specific attention to context, Bakker and Hakanen (2014) show, for example, that the work engagement of public dentists is significantly lower than the work engagement of private dentists. Also, the within-sector differences including the institutional contexts and inherent work tasks receive little attention (Bakker, Demerouti, & Sanz-Vergel, 2014; Bickerton, Miner, Dowson, & Griffen, 2015; Gorgievski, Moriano, & Bakker, 2014). Nonetheless, the few researchers conducting research in that area showed interesting findings. Hakanen, Bakker and Schaufeli (2006) argue that individual differences of teachers relative to other public occupations might influence work engagement. Borst and Lako (2017) show that the pride of public teachers as an important indicator of work engagement is much higher than the pride of public servants in classic public sectors such as local and central government.

The goal of this study is, therefore, to examine the relationship between antecedents and outcomes of work engagement in the public sector in general and the within-public sector differences including varying institutional contexts and inherent work tasks in particular.

The analysis of the antecedents of work engagement is based on the Job Demands–Resources (JD-R) model (Bakker & Demerouti, 2008). Throughout the last decade, the effects of many antecedents and outcomes of work engagement have been studied applying this model (for an overview, see Schaufeli Schaufeli & Taris, 2014, pp. 64–65). I extend this JD-R model of work engagement by examining specific defining elements of the public sector context that might influence the work engagement of public servants—public service motivation (PSM), autonomy, and red tape (Lavigna, 2013). Scholars have argued that, for example, PSM has a positive relationship with the work engagement of public servants (Bakker, 2015; Jin & McDonald, 2016; Vigoda-Gadot et al., 2013). However, it has also been shown that some dimensions of PSM do not have such an effect on the attitudes and well-being of public servants (e.g., Homberg, McCarthy, & Tabvuma, 2015; Taylor, 2007). The effects of the dimensions of PSM as well as the effects of autonomy and red tape on work engagement might

depend on the various institutional contexts within the public sector (Kjeldsen, 2014; van Loon, 2015).

Besides the focus on antecedents, scholars in public administration argue that work engagement is expected to be positively related to job satisfaction, good service provision, and quality of service (Vigoda-Gadot et al., 2013). Work engagement is therefore potentially an answer to the main challenge in the public sector today, namely, performance enhancement (Vigoda-Gadot et al., 2013). The effects of work engagement on job performance and job satisfaction of public servants will be tested below. As work engagement is often analyzed as a mediating variable between job demands and job resources that affects work engagement, which in turn affects outcomes (Schaufeli, 2015), I analyze the role of work engagement within the relationship between the public sector specific factors (PSM, red tape, autonomy), on one hand, and the performance and satisfaction of public servants, on the other hand.

In a nutshell, my study tries to answer the following questions: Under which contextual conditions is work engagement associated with red tape, PSM, and autonomy? What are the effects of work engagement on job satisfaction and job performance? To what extent is work engagement a mediator between these job resources and job outcomes? Do these relationships differ between public servants within different institutional contexts and what are the influential aspects of these contexts?

The outline of the article is as follows. In section “Theory”, the theoretical framework is built including four hypotheses. Section “Methods” describes the data, involving 23,688 public servants from all public organizations, as well as the methods used. Section “Results” then presents the results, followed by the section “Discussion” in which the results are discussed. I concluded with the section “Conclusion” in which conclusions are drawn.

## Theory

### *Work Engagement: What Is It and How Does Its Nomological Network Look Like?*

The concept of work engagement recently gained increasing attention in public organizations across the world, including the United States, United Kingdom, and Canada (e.g., Cotton, 2012; Kernaghan, 2011; Lavigna, 2013). Although managers in these public organizations are interested in stimulating work engagement, they often have an unclear picture of what work engagement entails (Cotton, 2012). One of the contributors to this confusion is the fact that the concept of work engagement was initially developed through organizational practice rather than through academic research. Public organizations often use, for example, the Gallup Q12 questionnaire to measure the work engagement of their employees (Cotton, 2012; Lavigna, 2013). These questions are aimed at measuring the antecedents of work engagement instead of work engagement itself (Bakker & Leiter, 2010). Other contributors to the confusion are organizational leaders, who define engagement by the

characteristics of engaged employees, as opposed to defining the construct itself (Byrne, Hayes, & Holcombe, 2017).

In contrast, scholars within the realm of positive psychology most often define work engagement as an active energetic state of mind that is characterized by vigor, dedication, and absorption (Schaufeli et al., 2002). Vigor is defined as having high levels of energy and mental resilience while working; dedication is defined as feeling a sense of significance, meaningfulness, enthusiasm, pride, and inspiration toward one's work, and absorption is defined as being fully engrossed in one's work (Schaufeli et al., 2002). It is expected that employees with high work engagement invest their entire self into their work (Christian, Garza, & Slaughter, 2011). In contrast to the conceptualizations of practitioners, this scientific conceptualization actually does define and operationalize the construct itself. Using this conceptualization, I can therefore also deduce several implications for practitioners.

Although practitioners and academicians are different in conceptualizing engagement, they are similar in aiming to identify antecedents and outcomes (i.e., the nomological network) of such engagement (Macey & Schneider, 2008). Together with the development of the construct work engagement, the most often used model to study its antecedents and outcomes is the JD-R model. According to the JD-R model, all working environments or job characteristics can be modeled using two different categories, namely, job demands and job resources. Job demands are factors that cost energy to deal with and are therefore negatively associated with work engagement (Bakker & Demerouti, 2007). Job resources refer to those physical, psychological, social, or organizational aspects of the job that (a) reduce job demands and the associated physiological and psychological costs, (b) are functional in achieving work goals, and (c) stimulate personal growth, learning, and development and are accordingly positively associated with work engagement (Bakker & Demerouti, 2007). Recently, also personal resources are distinguished in the JD-R theory, which are defined as the psychological characteristics or aspects of the self that are generally associated with resilience and refer to the ability to control and affect one's environment successfully (Xanthopoulou, Bakker, Demerouti, & Schaufeli, 2007). Accordingly, personal resources are expected to be positively related to work engagement (Xanthopoulou et al., 2007).

Kahn (1990) proposed that these resources influence work engagement which, in turn, drives individual attitudes, behavior, and performance. In other words, work engagement is believed to mediate the relationships between the JD-R model and employee outcomes. These employee outcomes are categorized in the JD-R model as attitudinal, behavioral, and performance outcomes (Albrecht, Bakker, Gruman, Macey, & Saks, 2015).

### *Institutionalizing the JD-R Model of Work Engagement*

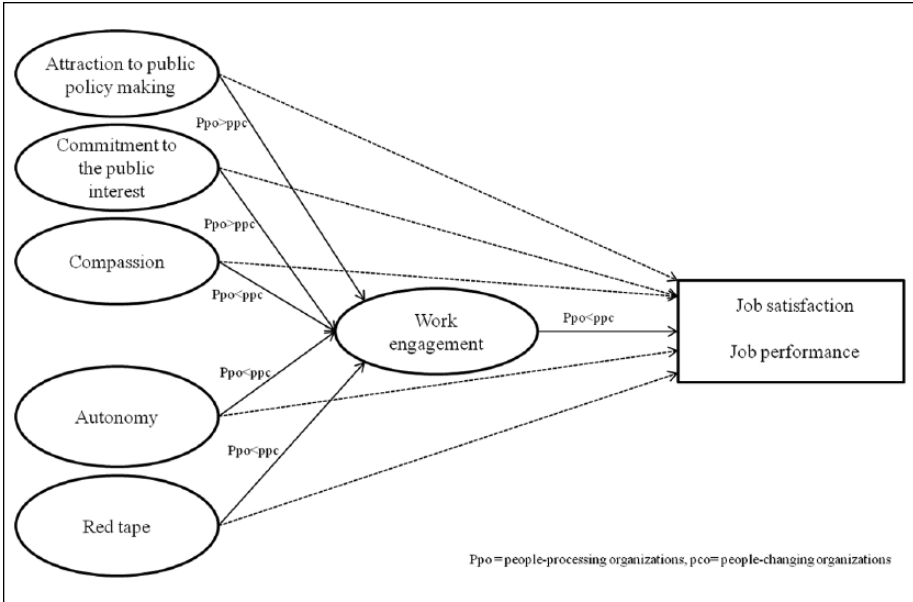
Although the biggest advantages of the JD-R model of work engagement are its all-inclusiveness (Bakker & Demerouti, 2014), one of its biggest critiques is that the influence of institutional differences between organizations on the relationships within

the JD-R model is understudied (Bakker, Demerouti, & Sanz-Vergel, 2014; Bickerton et al., 2015; Gorgievski et al., 2014). According to several scholars within public administration, the specific public institutional context might, for example, play an important role in work engagement research (Akingbola & Van den Berg, 2016; Bailey, Madden, Alfes, & Fletcher, 2017; Noesgaard & Hansen, 2017). There are specific defining elements within a public institutional context which influences the work engagement of public employees (Lavigna, 2013; Noesgaard & Hansen, 2017). The most important typical factors mentioned by public administration scholars that might influence work engagement are the bureaucratic structures, especially the perceived red tape, the (dimensions of) PSM of public employees to work in the public sector (i.e., the attraction to public policy making [APP], compassion [COM], and commitment to the public interest [CPI]), and the professionalism and necessary discretionary space that public employees often experience (Lavigna, 2013; Noesgaard & Hansen, 2017).

Due to the all-inclusiveness of the JD-R model, it might be possible to frame also these defining elements as job demands, job resources, or personal resources. I will bring in these defining elements (red tape and autonomy, APP, CPI, and COM) of the public institutional context to extend the existing knowledge of the JD-R model of work engagement. With the integration of these defining elements, I respond to a recent call for more integration of public administration research and work engagement research.

However, the same scholars that argue to take specific defining elements of the public institutional context into account when applying the JD-R model of work engagement also argue that it may well be possible that work engagement and its antecedents and outcomes might differ between organizations within this institutional context (Akingbola & Van den Berg, 2016; Bailey et al., 2017; Noesgaard & Hansen, 2017). One should therefore take into account the diversity in organizations within the group specified as public as well.

The stream of research within public administration that is aimed on pinpointing these institutional differences between various public organizations is the dimensional publicness approach (Bozeman & Bretschneider, 1994). According to the followers of this approach, it is rather naïve to think that the public sector is a homogeneous institutional context without differences between organizations (Rainey, 2003; van Loon, 2015). An institutional context exists of regulative, normative, and cultural-cognitive elements that constrain the behavior and attitudes of individuals through determining, respectively, the rules of the game, the values deemed important, and the way of doing things, also known as institutional logics (Scott, 2001). The public institutional context is often demarcated merely based on the regulative elements and scholars inherently merely look at the influence of the regulative institutional logic on the behavior and attitudes of public employees. However, recent scholars started to extend this research by taking into account normative elements (i.e., the institutional logic that looks at the values deemed important) to study the observed differences in behavior and attitudes between public employees across public organizations (Kjeldsen, 2014; van Loon, Leisink, & Vandenabeele, 2013).



**Figure 1.** Conceptual model.

According to these scholars, a taxonomy exists of two opposing normative institutional logics within the public context—people-changing logic versus people-processing logic. The behavior and attitudes of public employees in a public organization with either a people-changing logic or a people-processing logic are determined by the amount of contact with clients and the service provided to these clients. The public organizations with mainly a people-processing logic are the police, central, regional, and local government and the judicial sector. These public employees deal with all kinds of users and only change the status or location of a user by applying the relevant legal framework. Only limited contact is taking place and the users mostly remain unidentified (Kjeldsen, 2014; van Loon et al., 2013). In contract public organizations with mainly a people-changing logic are public educational organizations and public health care organizations. More intense and longer enduring contacts with an identifiable user group are demanded from people-changing organizations because they aim to bring about changes in the user (van Loon et al., 2013).

Below it is argued how these contrasting institutional logics influence the relationships between the defining elements in the public context (i.e., red tape, autonomy, and the dimensions of PSM as parts of the JD-R model) and work engagement as well as the influence of these logics on the relationships between work engagement and its employee outcomes (i.e., performance and job satisfaction). The related conceptual model is presented in Figure 1.

*Red tape as a job demand.* Bureaucratic burdens and red tape are defined as the rules, regulations, and procedures that remain in force and entail a compliance burden, but do not advance the legitimate purposes the rules were intended to serve (Bozeman, 2000, p. 12). Public management research has a rich tradition that focuses on red tape (Bozeman & Feeney, 2011; Brewer & Walker, 2010; DeHart-Davis & Pandey, 2005). Scholars conclude that when public servants encounter rules, regulations, or procedures that seem pointless yet burdensome, they become alienated of their work, less creative, and less productive (DeHart-Davis & Pandey, 2005). Red tape can be framed as a hindrance job stressor being judged as job demands or work circumstances that involve excessive or undesirable constraints that inhibit an individual's work engagement (Crawford, LePine, & Rich, 2010; Quratulain & Kahn, 2015).

Although red tape is an obstacle for all employees, it is likely to be less detrimental for the work engagement of public servants within people-processing organizations because they are more socialized within these bureaucratic processes as they apply the relevant legal framework to deal with users themselves (Kjeldsen, 2014). People-processing service providers, such as many functions within municipalities or the police, put the focus on regulating services and applying legal frameworks. Although their job entails an objective classification for which they need clear rules, they are far more used to dealing with rules and regulations (which is automatically accompanied with red tape) than public servants within people-changing organizations including nurses and teachers. Nurses and teachers are expected to have lasting personal contacts and interactions with users to change these users. These public servants in people-changing organizations are not trained (socialized) to deal with legal frameworks and inherently red tape. They especially experience that the time spend on filling out paperwork is lost as it cannot be spend on their main task (educating and healing clients). It is therefore probably far more detrimental to the work engagement of employees in people-changing organizations than to the work engagement of employees in people-processing organizations. This results in the following hypotheses:

**Hypothesis 1a:** Perceived red tape has a significant negative impact on the work engagement of public servants in general.

**Hypothesis 1b:** Perceived red tape has a higher significant negative impact on the work engagement of public servants in people-changing organizations than on the work engagement of public servants in people-processing organizations.

*Autonomy as a job resource.* Autonomy refers to the discretionary powers and freedom with respect to work goals, setting priorities, shaping task elements, and determining the order and tempo in which tasks are executed (Runhaar, Konermann, & Sanders, 2013). The relationships between job autonomy, on one hand, and outcomes such as satisfaction and commitment, on the other hand, have been extensively studied within public administration (Tummers et al., 2016). However, whether job autonomy is related to the work engagement of public servants has not received any attention. Job autonomy fulfills one of the basic human needs, and it can therefore be expected to positively affect work engagement (Bakker & Demerouti, 2008). Indeed, Tummers

et al. (2016) study vitality (conceptually similar to the vigor dimension of work engagement) and show that perceived job autonomy has a positive impact on the vitality of public servants because autonomy gives them energy in making them act upon their deep values, goals, and interests. In addition, Jansen et al. (2010) studied the pride (an important indicator of work engagement) of public servants and also show that public servants are more proud when they experience professionalism and discretion (Jansen et al., 2010).

As argued above, it is expected that this relationship is stronger for public servants within people-changing organizations than for public servants within people-processing organizations. As Hasenfeld (1972) shows, people-processing organizations have four tasks: client assessment of the existence of the condition that legitimates an action, clients evaluation to determine the appropriate action alternatives, making a choice among the alternatives, and carrying out the chosen alternative. These tasks are highly standardized reducing the necessity of job autonomy for public servants in people-processing organizations.

In contrast, public servants within people-changing organizations have intense and enduring contact with users making their work more nonroutine. This type of service requires a focus on being responsive toward the user (van Loon, 2015) and this responsiveness requires additional discretionary space in comparison with public servants in people-processing organizations who have a more routine and structured job in which they apply a structured legal framework upon users with which they have merely one-off contacts. Furthermore, public servants in people-changing organizations, for instance, teachers, have a strong intrinsic calling to help students often beyond what is asked (Hakanen et al., 2006; van Loon, Vandenabeele, & Leisink, 2015). They will profit most from autonomy. This results in the following hypotheses:

**Hypothesis 2a:** Perceived autonomy has a significant positive impact on the work engagement of public servants in general.

**Hypothesis 2b:** Perceived autonomy has a higher significant positive impact on the work engagement of public servants in people-changing organizations than on the work engagement of public servants in people-processing organizations.

*Dimensions of PSM as personal resources.* Although Bakker (2015) expects that PSM as a personal resource of public servants has a positive effect on the work engagement of public servants, many studies show that the strength of the links between PSM and, for example, affective commitment, motivation, and job satisfaction vary considerably depending on the dimensions of PSM being examined (Homberg et al., 2015; Taylor, 2007). Perry and Wise (1990) stated that an individual's PSM can be attributed to a mixture of rational, normative, and affective motives. Although PSM is seldom identified with rational motives, the APP dimension can be considered to be rational in nature (Taylor, 2007). The attraction of public servants to public policy making is partly inspired by the needs for power and self-esteem (Wise, 2000). The CPI and the desire to pursue the common good are normative motives for public servants to work in the public sector. The desire and willingness to help others including the altruism



and feelings of COM toward others are the affective motives of public servants to work in the public sector.

Within the conceptualization of work engagement, meaningfulness and significance of the job are central themes. The desire to undertake work of social worth (normative motives) and the willingness to help others (affective motives) are strong engaging properties for public servants, at least stronger than the external self-serving needs including rational motives (APP; Bright, 2013; Taylor, 2007). Although this could be valid for the public sector as a whole, the effects of the various motives on work engagement might vary based on the personality of public servants and their inherent choice for a certain public organization. It is in other words expected that the nature of an organization is a good proxy for the size of the effects of a certain motive on work engagement.

Within people-changing organizations, identification with the users is likely to be a part of the organization's character and work values (van Loon et al., 2013). This identification will lead to a greater amount of sympathy. Public servants within these organizations are especially driven by affective motives (van Loon et al., 2013). In contrast, public servants within people-processing organizations are mostly focused on fair and neutral processing without building relationships with users. They are driven predominantly by instrumental motives (APP) as they want to be part of a bigger whole and also normative motives (CPI) because ethical behavior is a central value (van Loon et al., 2013). It is therefore more likely that affective motivates (COM) have a stronger effect on the work engagement of public servants in people-changing organizations than on public servants in people-processing organizations. At the same time, it is expected that instrumental motives and normative motives have a stronger effect on the work engagement of public servants in people-processing organizations than on public servants in people-changing organizations. This results in the following hypotheses:

**Hypothesis 3a:** The individual dimensions of PSM, including APP, COM, and CPI, have a positive significant effect on the work engagement of public servants, but the APP dimension has a significantly lower effect than the COM and CPI dimensions.

**Hypothesis 3b:** Affective motives have a stronger significant effect on the work engagement of public servants in people-changing organization than on the work engagement of public servants in people-processing organizations, whereas instrumental motives and normative motives have a stronger significant effect on the work engagement of public servants in people-processing organizations than on public servants in people-changing organizations.

*Outcomes of work engagement: Job satisfaction and job performance.* Work engagement is believed to mediate the relationships between job demands and resources, on one hand, and job satisfaction and job performance, on the other (Kahn, 1990; Schaufeli, 2015). Within the public administration literature, hedonic indicators such as job satisfaction received a lot of attention (e.g., Wang, Zheng, Hu, & Zheng, 2014; Yang & Wang, 2013; Cantarelli, Belardinelli, & Belle, 2016). Conceptually, job satisfaction is

an attitude often defined as a positive (or negative) evaluative judgment one makes about one's job or job situation (Weiss, 2002).

Within the scholarly literature, a distinction is made between "hedonic indicators" and "eudaimonic indicators" of well-being (Diener, Scollon, & Lucas, 2009). Hedonic indicators refer to happiness, pleasure, and enjoyment (Diener et al., 2009; Ryan & Deci, 2001; Tummors et al., 2016). Eudaimonic indicators refer to purpose, meaningfulness, and psychological well-being (Diener et al., 2009; McGregor & Little, 1998; Ryan & Deci, 2001). Job satisfaction is a typical hedonic indicator as it is limited to enjoyment of the job (i.e., hedonism) and does not take into account the significance or meaningfulness of the job (i.e., eudaimonism). Job satisfaction differs from work engagement as work engagement connotes activation (enthusiasm, alertness, excitement, elation), whereas satisfaction connotes satiation (contentment, calmness, serenity, relaxation; Schaufeli, 2013).

Studies show that employees who experience high levels of components of eudaimonic well-being (e.g., work engagement) are physically healthier, experience more satisfaction of their psychological needs, and also experience hedonic well-being (e.g., satisfaction) compared with employees with low eudaimonic well-being (Barret-Cheetham, Williams, & Bednall, 2016; Ryff, 1989). Work engagement is therefore defined as a more encompassing and deeper construct than job satisfaction because it connotes the investment of an employees' entire self (psychically, cognitively and emotionally) to its work, whereas satisfaction only focuses on a *state* of feeling well. This reasoning would explain why several scholars define satisfaction as an outcome of work engagement (Albrecht et al., 2015).

Similarly, several scholars expect that work engagement might be very important to reach good service provision, the improvement of client satisfaction, and quality of service within the public sector (Akingbola & Van den Berg, 2016; Vigoda-Gadot et al., 2013). However, other studies also show that job demands and job resources have direct effects on job satisfaction and job performance (see, for example, Cantarelli et al., 2016; Hsieh, 2016). It is therefore expected that work engagement not fully, but partially mediates the relationships between the JD-R model and the job outcomes (i.e., job satisfaction and job performance). For example, autonomy is a basic psychological need which leads to satisfaction and higher performance through feelings of vitality and significance which are factors reflected in work engagement (Albrecht et al., 2015; Ryan & Deci, 2000). An important part of the effect of autonomy on job satisfaction and performance is, in other words, explained by work engagement.

Work engagement is expected to be a stronger partial mediator between job resources and job outcomes in the people-changing organizations than in people-processing organizations. Independent of the offered job resources and job demands, these public servants' performance and satisfaction is mostly determined by the perceived meaningfulness and significance (reflected in work engagement). A large portion of the effects of job resources and job demands on job outcomes will therefore be accounted for by work engagement. In contrast, public servants in people-processing organizations are expected to have a roughly lower initial commitment than people-changing organizations. The indirect effect of job resources and job demands on

outcomes through work engagement will therefore be less strong in people-processing organizations. The following hypothesis can be stated:

**Hypothesis 4a:** Work engagement partially mediates the effects of red tape, autonomy, and the dimensions of PSM on job satisfaction and job performance.

**Hypothesis 4b:** Work engagement is a stronger partial mediator in case of public servants in people-changing organizations than in case of public servants in people-processing organizations.

## Method

### *Data Collection*

Every other year, the Dutch Ministry of the Interior and Kingdom Relations carries out a personnel monitor (POMO) involving a representative sample of the employees within the public sector. This representative sample is randomly extracted from the so-called data warehouse APS which consists of all public servants in the Dutch public sector. This article utilizes the data collected in 2014 as the government decided to include multiple items on work engagement in 2014. In total, 87,536 questionnaires were digitally sent to public servants employed in the organizations which are defined as “public” according to the legal institutional criteria. These public servants received log-in codes on June 14, 2013. On July 3, the respondents received a reminder and on Monday, July 21, the data collection closed. In total, 24,334 public servants responded to the questionnaire implying a response percentage of 28%.

Two groups of organizations were constructed: educational organizations and hospitals were identified as people-changing services, and municipalities, provinces, water boards, central government, the legal authorities, judicial sector, military, and police as people-processing services (cf. Kjeldsen, 2014; van Loon, 2015). After listwise deletion of respondents with missing values on one or more of the research variables, the data of 13,513 public servants in people-processing services and 10,175 public servants in people-changing services could be used. See Table 1 for the demographics.

### *Measures*

The items used were formulated as 5-point Likert-type scales ranging from *completely agree* (5) to *completely disagree* (1).

*Work engagement* was measured using six items out of the validated nine-item short version of the Utrecht Work Engagement Scale (Schaufeli et al., 2002). Work engagement is a higher order construct composed of three dimensions, that is, vigor, dedication, and absorption. Because the three dimensions of engagement are highly correlated (i.e., intersubscale correlations over .50), it is a common approach to combine the subscales into an aggregate measure of work engagement (e.g., Halbesleben, Harvey, & Bolino, 2009). A high score indicates that an employee is highly engaged in his or her work.

**Table 1.** Sample Statistics.

|   | People-processing organizations |      | People-changing organizations |      | Total    |      |
|---|---------------------------------|------|-------------------------------|------|----------|------|
|   | <i>n</i>                        | %    | <i>n</i>                      | %    | <i>n</i> | %    |
| Gender  |                                 |      |                               |      |          |      |
| Male  | 8,908                           | 65.9 | 4,055                         | 39.9 | 12,963   | 54.7 |
| Female  | 4,605                           | 34.1 | 6,120                         | 60.1 | 10,725   | 45.3 |
| Age (years)                                       |                                 |      |                               |      |          |      |
| 15-24   | 130                             | 1.0  | 112                           | 1.1  | 242      | 1.0  |
| 25-34   | 1,498                           | 11.1 | 1,544                         | 15.2 | 3,042    | 12.8 |
| 35-44   | 2,757                           | 20.4 | 1,875                         | 18.4 | 4,632    | 19.6 |
| 45-54   | 4,839                           | 35.8 | 2,970                         | 29.2 | 7,809    | 33.0 |
| ≥55   | 4,289                           | 31.7 | 3,674                         | 36.1 | 7,963    | 33.6 |
| Education   |                                 |      |                               |      |          |      |
| Primary education                                 | 56                              | .4   | 32                            | .3   | 88       | .4   |
| Prevocational secondary education                 | 2,167                           | 16.0 | 609                           | 6.0  | 2,776    | 11.7 |
| Senior general secondary/pre-university education | 1,087                           | 8.0  | 344                           | 3.4  | 1,431    | 6.0  |
| Secondary vocational education                    | 3,343                           | 24.7 | 1,038                         | 10.2 | 4,381    | 18.5 |
| Higher professional education                     | 3,693                           | 27.3 | 5,454                         | 53.6 | 9,147    | 38.6 |
| University education                              | 2,692                           | 19.9 | 1,849                         | 18.2 | 4,541    | 19.2 |
| Academic education (PhD)                          | 475                             | 3.5  | 849                           | 8.3  | 1,324    | 5.6  |
| Tenure (years)                                    |                                 |      |                               |      |          |      |
| ≤1  | 381                             | 2.8  | 580                           | 5.7  | 961      | 4.1  |
| 2-10  | 4,230                           | 31.3 | 3,987                         | 39.2 | 8,217    | 34.7 |
| 11-20   | 3,796                           | 28.1 | 2,946                         | 29.0 | 6,742    | 28.4 |
| 21-30   | 2,450                           | 18.1 | 1,588                         | 15.6 | 4,038    | 17.0 |
| 31-40   | 2,364                           | 17.5 | 1,020                         | 10.0 | 3,384    | 14.3 |
| 41-50   | 292                             | 2.2  | 54                            | .5   | 346      | 1.5  |

The items of (*the dimensions of*) PSM were derived from the validated PSM scale of Vandenberghe (2008) and previously applied by van Loon, Kjeldsen, Bøgh Andersen, Vandenberghe, and Leisink (2016). This scale is developed by Vandenberghe (2008) to make it compatible within contexts such as the Dutch public sector. APP, COM, and CPI, respectively, exist of two, four, and three items.

*Job Autonomy* was measured with four items adapted from Hackman and Oldham (1980). A high score indicates that an employee perceived autonomy in his or her job.

*Red tape* was measured with a validated six-item scale applied before by Vermeeren and van Geest (2012). A high score indicates that an employee perceives a high level of red tape.

*Performance* was measured with a three-item scale recently validated by van Loon et al. (2016). The items refer to the appreciation of the employee in the organization as a proxy of his or her performance. A high score indicates that an employee perceives that he or she performs well.

*Job satisfaction* was measured with one item: "Considering everything, how satisfied are you with your job?" Although a single item measure precludes analyses of reliability, it is a frequently applied measure to analyze job satisfaction in public administration studies (Cantarelli et al., 2016; Scarpello & Campbell, 1983).

Table 2 shows the items, factor loadings, and the reliability (composite reliability and Cronbach's alpha) and validity (average variance extracted) of the measures.

Next to these measures, I control for several other factors. I dummy coded *gender* (0 = male; female). *Age* was categorized into five cohorts (1 = 15-24 years; 2 = 25-34 years; 3 = 35-44 years; 4 = 45-54 years; 5 = 55 years and older). *Tenure* was included as a continuous variable, expressed as the number of years employees have worked for the organization. I also included *education* which was subdivided into seven categories, reflecting the Dutch educational system (1 = primary education; 2 = prevocational secondary education; 3 = senior general secondary education and pre-university education; 4 = secondary vocational education; 5 = higher professional education; 6 = university education; 7 = academic education). Age and education were treated as continuous variables in line with Vermeeren, Kuipers, and Steijn (2014).

## Data Analysis

My four hypotheses were tested using structural equation modeling performed in Mplus version 7.4 (Muthén, Muthén, & Asparouhov, 2016). A two-step approach was adopted. First, the measurement model was examined, followed by the analysis of the structural model (Davis & Stazyk, 2017). As the measurement model included categorical variables of which many had skewed distributions (floor and ceiling effects), I applied the weighted least squares means and variance adjusted (WLSMV) estimation method. The WLSMV estimation method does not assume normally distributed variables and provides the best option for modeling categorical data (Brown, 2006). After the development of the measurement model, all the created factors for the structural model are automatically corrected for skewness and made continuous.

To test the measurement model, several fit measures were analyzed. In large samples (as in this research), the chi-square test almost always leads to the rejection of the model, because the difference between the sample covariances and implied population covariances will lead to a higher chi-square value if the sample size increases (Hu & Bentler, 1999). As a result, a number of alternative fit measures have been developed from which I use one of every "family" (Hu & Bentler, 1999). The comparative fit index (CFI), Tucker-Lewis index (TLI), and root mean square of approximation (RMSEA) are used to assess whether the model fits the data. The measures of CFI and TLI indicate good fit

**Table 2.** Operationalization and Data Quality.

| Measures  | Ppo  | Pco  |
|---|------|------|
|   | FL   | FL   |
| <b>Work engagement</b> (ppo $\alpha = .90$ , AVE = .73, CR = .94; pco $\alpha = .90$ , AVE = .74, CR = .95)               |      |      |
| UWES1 I am proud on the work that I do  | .859 | .862 |
| UWES2 My job inspires me  | .907 | .911 |
| UWES3 I am enthusiastic about my job  | .923 | .918 |
| UWES4 I feel happy when I am working intensely  | .756 | .808 |
| UWES5 When I get up in the morning, I feel like going to work   | .830 | .828 |
| UWES6 At my work, I feel bursting with energy   | .844 | .828 |
| <b>Attraction to public policy</b> (ppo $\alpha = .73$ , AVE = .65, CR = .79; pco $\alpha = .70$ , AVE = .67, CR = .80)   |      |      |
| PSM0 Politics is a dirty word. (R)  | .769 | .648 |
| PSM1 I have little interest in politics. (R)  | .847 | .963 |
| <b>Commitment to public interest</b> (ppo $\alpha = .77$ , AVE = .54, CR = .82; pco $\alpha = .76$ , AVE = .53, CR = .82) |      |      |
| PSM2 I unselfishly contribute to my community.  | .548 | .630 |
| PSM3 Providing meaningful public service is very important to me.   | .827 | .775 |
| PSM4 I find it more important to contribute to the public good than having personal success.                              | .660 | .663 |
| PSM5 The general interest is a key driver in my daily life.   | .849 | .828 |
| <b>Compassion</b> (ppo $\alpha = .65$ , AVE = .50, CR = .74; pco $\alpha = .64$ , AVE = .50, CR = .74)                    |      |      |
| PSM6 It is difficult for me to contain my feelings when I see people in distress.   | .704 | .732 |
| PSM7 I think the welfare of fellow citizens is very important.  | .858 | .789 |
| PSM8 If we do not show more solidarity, our society will fall apart.  | .509 | .573 |
| <b>Autonomy</b> (ppo $\alpha = .84$ , AVE = .66, CR = .88; pco $\alpha = .87$ , AVE = .71, CR = .91)                      |      |      |
| AUTO1 I can decide on my own when I do my job   | .850 | .868 |
| AUTO2 I can decide on my own how I do my job  | .779 | .741 |
| AUTO3 I can decide on my own where I do my job  | .854 | .901 |
| AUTO4 I can decide on my own with whom I do my job  | .755 | .850 |
| <b>Red tape</b> (ppo $\alpha = .83$ , AVE = .50, CR = .86; pco $\alpha = .86$ , AVE = .58, CR = .89)                      |      |      |
| Red1 Filling out forms and systems cost me a lot of time  | .697 | .773 |
| Red2 It takes me a long time to comply with all the rules and obligations within my organization                          | .621 | .668 |
| Red3 Some rules or guidelines that I encounter in my work contradict with each other                                      | .674 | .705 |
| Red4 Guidelines and regulations are more important in my organization than my experience or intuition.                    | .843 | .827 |
| Red5 Rules and procedures in my organization make it difficult to do my job well.   | .743 | .817 |

(continued)

**Table 2. (continued)**

| Measures  | Ppo  | Pco  |
|---|------|------|
|   | FL   | FL   |
| Red6 Requirements of supervisory bodies and inspections make it difficult for me to do my job well.     | .663 | .777 |
| <b>Performance</b> (ppo $\alpha = .62$ , AVE = .52, CR = .75; pco $\alpha = .69$ , AVE = .56, CR = .79) |      |      |
| Perf1 Compared with people who do the same work as I do, I am highly appreciated by my organization.    | .418 | .569 |
| Perf2 In my work, colleagues ask me for advice if things get complicated.                               | .848 | .860 |
| Perf3 In my work, I am given the more difficult jobs.   | .824 | .785 |

Note. ppo = people-processing organizations; pco = people-changing organizations; FL = factor loading; AVE: average variance extracted; CR = composite reliability; PSM = public service motivation; UWES = Utrecht Work Engagement Scale.

with a threshold above .90 and excellent fit above .95. RMSEA indicates fit below .10 and excellent fit below .08 (Byrne, 2012; Hu & Bentler, 1999; Kline, 2010).

In order to be able to test the hypothesized relationships and compare the results between the people-changing and people-processing organizations, measurement invariance needs to be present. Using Mplus v7.4, the full measurement model was tested and comparisons were made between the three levels of invariance. Configural invariance tests whether the constructs in this study have the same factor structure across groups and, in this multigroup model, all loadings and variances are allowed to differ. In testing for metric invariance, all the factor loadings are constrained, and for scalar invariance, factor loadings and intercepts are constrained to be equal.

Normally, by comparing the configural model with the metric model, and the scalar model with the metric model, the change in chi-square and fit measures (RMSEA, TLI, and CFI) is checked. However, just as with the absolute chi-square test, the chi-square difference statistic is sensitive to sample size and almost always (as in this case) lead to the rejection of the measurement invariance assumption (Chen, 2007). I will therefore focus on the fit statistics. For testing invariance in large samples, a change of  $\geq -.010$  in CFI, supplemented by a change of  $\geq .015$  in RMSEA in the more constrained model would indicate noninvariance (Chen, 2007).

Applied to the data, the fit measures of the comparison between the configural (TLI = .955, CFI = .961, RMSEA = .063) and metric model (TLI = .956, CFI = .961, RMSEA = .062) even increase which indicates metric invariance ( $\Delta$ TLI = +.001,  $\Delta$ CFI = +.000, and  $\Delta$ RMSEA = -.001). When comparing the metric (TLI = .956, CFI = .961, RMSEA = .062) and the scalar models (TLI = .955, CFI = .955, RMSEA = .063), the fit measures decrease within acceptable margins ( $\Delta$ TLI = -.001,  $\Delta$ CFI = -.006, and  $\Delta$ RMSEA = +.001). In other words, scalar invariance and inherently

measurement invariance are present. It is therefore allowed to compare the people-processing and people-changing organizations.

## Results

### *Measurement Model*

The measurement models of people-processing organizations and people-changing organizations show good fit (TLI = .959, CFI = .964, RMSEA = .059, and TLI = .950, CFI = .956, RMSEA = .067, respectively). A Harman's single-factor test, in which all items are loaded onto one dimension, was performed to test for common method bias within each group. These models had significantly worse fits (people-processing: TLI = .511, CFI = .546, RMSEA = .197; people-changing: TLI = .484, CFI = .520, RMSEA = .198) than the measurement models, indicating that common method bias is unlikely to influence the results (Podsakoff & Organ, 1986).

### *Descriptive Statistics*

Correlations between the variables for both types of organizations are presented in Table 3, whereas the descriptive statistics of the variables for these types are presented in Table 4.

There are significant differences between the groups. Public servants in people-changing organizations have a significantly higher work engagement than public servants in people-processing organizations ( $M = 4.08$  and  $M = 3.93$ , respectively,  $p = .000$ ). In addition, public servants in people-changing organizations also have significant higher COM and perceive significant more red tape in their work than people-processing organizations ( $M = 3.87$  and  $M = 3.30$  vs.  $M = 3.77$  and  $M = 3.13$ , respectively,  $p = .000$ ). In contrast, public servants in people-processing organizations have a significant higher CPI and perceive significantly more autonomy in their job than public servants in people-changing organizations ( $M = 3.51$  and  $M = 3.10$  vs.  $M = 3.44$  and  $M = 2.70$ , respectively,  $p = .000$ ).

### *Structural Model*

To test our hypotheses, I conducted a structural model (as shown in Table 5).

First, I tested my hypotheses that red tape has a negative effect on the work engagement of public servants in both types of organizations, but that the negative effect is higher for public servants in people-changing organizations than for public servants in people-processing organizations. Although the average perceived red tape by public servants is significantly higher within people-changing organizations than that perceived by public servants in people-processing organizations, Table 5 shows that its negative effect on the work engagement of public servants in people-changing organizations is significantly lower than on the work engagement of public servants within



**Table 3.** Correlations.

|                                  | 1       | 2       | 3       | 4       | 5       | 6       | 7       | 8      | 11      | 12      | 13      | 14      |
|----------------------------------|---------|---------|---------|---------|---------|---------|---------|--------|---------|---------|---------|---------|
| 1. Gender (male-female)          | —       | -.13*** | -.12*** | -.09*** | .03***  | -.11*** | -.06*** | .02*** | -.17*** | -.01    | -.07*** | -.01    |
| 2. Age                           | -.13*** | —       | -.18*** | .57***  | -.01    | .13***  | .06***  | .08*** | -.03*** | .08***  | -.02    | -.02*   |
| 3. Educational level             | .05***  | -.15*** | —       | -.11*** | .07***  | .14***  | .10***  | .03**  | .12***  | .10***  | .13***  | -.03**  |
| 4. Tenure                        | -.21*** | .57***  | -.29*** | —       | -.01    | .06***  | .01     | .04*** | -.08*** | .12***  | -.01    | -.01    |
| 5. Work engagement               | -.03*** | .01     | .04***  | -.02*   | —       | .11***  | .30***  | .32*** | .12***  | -.01    | .42***  | .44***  |
| 6. Attraction to public policy   | -.01    | .05***  | .24***  | -.04*** | .23***  | —       | .26***  | .26*** | .04***  | .01     | .14     | .01     |
| 7. Commitment to public interest | -.04*** | .05***  | .16***  | -.01    | .38***  | .40***  | —       | .74*** | .07***  | .10***  | .23***  | .06***  |
| 8. Compassion                    | .03**   | .10***  | .05***  | .03***  | .31***  | .31***  | .71***  | —      | -.01    | .12***  | .21***  | .05***  |
| 11. Autonomy                     | -.05*** | .06***  | .24***  | .00     | .28***  | .14***  | .14***  | .08*** | —       | -.32*** | .23***  | .20***  |
| 12. Red tape                     | -.13*** | -.00    | -.06*** | .09***  | -.13*** | -.14*** | .00     | .01    | -.22*** | —       | .04***  | -.28*** |
| 13. Performance                  | -.08*** | -.01    | .16***  | -.01    | .40***  | .19***  | .27***  | .19*** | .26***  | .05***  | —       | .20***  |
| 14. Job satisfaction             | .01     | .04***  | .00     | .02*    | .48***  | .13***  | .12***  | .08*** | .24***  | -.26*** | .17***  | —       |

Note. People-processing organization below the diagonal, and people-changing organizations above the diagonal. \* $p \leq .05$ . \*\* $p \leq .01$ . \*\*\* $p \leq .001$ .

**Table 4.** Descriptive Statistics.

|                                 | Work engagement        |     | Attraction to public policy |     | Commitment to public interest |     | Compassion             |     | Autonomy              |     | Red tape               |     | Job satisfaction   |     | Performance           |     |
|---------------------------------|------------------------|-----|-----------------------------|-----|-------------------------------|-----|------------------------|-----|-----------------------|-----|------------------------|-----|--------------------|-----|-----------------------|-----|
|                                 | M                      | SD  | M                           | SD  | M                             | SD  | M                      | SD  | M                     | SD  | M                      | SD  | M                  | SD  | M                     | SD  |
| People-processing organizations | 3.93                   | .63 | 3.62                        | .87 | 3.51                          | .64 | 3.77                   | .58 | 3.1                   | .87 | 3.13                   | .72 | 4.03               | .86 | 3.61                  | .66 |
| People-changing organizations   | 4.08                   | .63 | 3.63                        | .84 | 3.44                          | .62 | 3.87                   | .55 | 2.7                   | .94 | 3.30                   | .81 | 4.04               | .85 | 3.64                  | .69 |
| Independent sample t test       | -18.504 <sup>***</sup> |     | -.483 <sup>ns</sup>         |     | 7.758 <sup>***</sup>          |     | -13.766 <sup>***</sup> |     | 37.557 <sup>***</sup> |     | -17.670 <sup>***</sup> |     | .240 <sup>ns</sup> |     | -3.824 <sup>***</sup> |     |

<sup>\*\*\*</sup> $p \leq .001$ .

**Table 5.** Structural Equation Model.

|                                  | Model I<br>Work engagement      |             |             | Model I<br>Job satisfaction |             |            | Model I<br>Job performance    |             |             |
|----------------------------------|---------------------------------|-------------|-------------|-----------------------------|-------------|------------|-------------------------------|-------------|-------------|
|                                  | $\beta$ ppo                     | $\beta$ pco | $Z_{diff}$  | $\beta$ ppo                 | $\beta$ pco | $Z_{diff}$ | $\beta$ ppo                   | $\beta$ pco | $Z_{diff}$  |
| Gender                           | -.07**                          | .10**       | <b>6.04</b> | .07**                       | -.09**      | 5.91       | -.13**                        | -.14**      | <b>.32</b>  |
| Tenure                           | -.01**                          | .00         | <b>1.41</b> | .00                         | .00         | .71        | .01**                         | .00         | <b>1.41</b> |
| Age                              | .02                             | .01         | <b>.49</b>  | .04**                       | -.03**      | 4.64       | -.04**                        | -.03**      | <b>.74</b>  |
| Education                        | .01                             | .06**       | <b>4.30</b> | .01                         | -.06**      | 6.38       | .13**                         | .09**       | <b>2.81</b> |
| Autonomy                         | .22**                           | .12**       | <b>6.22</b> | .10**                       | .10**       | 1.35       | .11**                         | .16**       | <b>2.94</b> |
| Red tape                         | -.07**                          | -.01        | <b>3.29</b> | -.22**                      | -.29**      | 4.98       | .10**                         | .07**       | <b>1.47</b> |
| Attraction to<br>public policy   | .11**                           | .03*        | <b>3.96</b> | .03*                        | .00         | 1.41       | .08**                         | .09**       | <b>.65</b>  |
| Commitment to<br>public interest | .22**                           | .10**       | <b>4.94</b> | -.03                        | .00         | .96        | .06**                         | .07**       | <b>.57</b>  |
| Compassion                       | .10**                           | .20**       | <b>3.98</b> | -.06**                      | -.06**      | .04        | -.01                          | -.01        | <b>.33</b>  |
| Work<br>engagement               | NA                              | NA          | NA          | .54**                       | .53**       | .22        | .29**                         | .32**       | <b>1.47</b> |
| $R^2$                            | .19                             | .10         | —           | .40                         | .40         | —          | .18                           | .19         | —           |
|                                  | People processing organizations |             |             |                             |             |            | People changing organizations |             |             |
| TLI                              |                                 | .944        |             |                             |             |            | .945                          |             |             |
| CFI                              |                                 | .952        |             |                             |             |            | .952                          |             |             |
| RMSEA                            |                                 | .057        |             |                             |             |            | .061                          |             |             |

Note.  $Z_{diff}$  is calculated with the formula:  $Z = (b_1 - b_2) / (\sqrt{SEb_1^2 + SEb_2^2})$ . If  $Z_{diff}$  is equal to or higher than 1.96, the difference is significant. TLI = Tucker–Lewis index; CFI = comparative fit index; RMSEA = root mean square error approximation; ppo = people-processing organizations; pco = people-changing organizations.

\* $p \leq .05$ . \*\* $p \leq .01$ .

people-processing organizations ( $\beta = -.02$  and  $\beta = -.10$ , respectively,  $p \leq .000$ ). Hypothesis 1a is in other words accepted and Hypothesis 1b needs to be rejected.

Second, I tested Hypotheses 2a and 2b which stated that perceived autonomy has a significant positive impact on the work engagement of public servants in general and the positive effect is larger for public servants in people-changing organizations than for public servants in people-processing organizations. The results in Table 5 show that autonomy has a positive effect on the work engagement of public servants in both types of organizations, but the assumed difference is exactly reversed. The effect on work engagement is significantly higher in case of public servants in people-processing organizations than in case of public servants in people-changing organizations ( $\beta = .24$  and  $\beta = .11$ , respectively,  $p \leq .000$ ). Hence, Hypothesis 2a is accepted and Hypothesis 2b needs to be rejected.

Third, Table 2 shows that the CPI and COM dimension have a much higher effect on work engagement than the APP dimension. The APP dimension is even nonsignificant in case of public servants in people-changing organizations. The effects of the APP and

**Table 6.** Mediation Model.

|                                     |                       | Job<br>satisfaction<br>ppo | Job<br>satisfaction<br>pco | Z <sub>diff</sub> | Performance<br>ppo | Performance<br>pco | Z <sub>diff</sub> |
|-------------------------------------|-----------------------|----------------------------|----------------------------|-------------------|--------------------|--------------------|-------------------|
| Autonomy                            | Total                 | .22**                      | .16**                      |                   | .18**              | .20**              |                   |
|                                     | Direct                | .10**                      | .10**                      |                   | .11**              | .16**              |                   |
|                                     | Indirect <sup>a</sup> | .12**                      | .06**                      | <b>5.97</b>       | .06**              | .04**              | <b>4.60</b>       |
| Red tape                            | Total                 | -.25**                     | -.30**                     |                   | .08**              | .08**              |                   |
|                                     | Direct                | -.22**                     | -.29**                     |                   | .10**              | .07**              |                   |
|                                     | Indirect <sup>a</sup> | -.04**                     | -.01                       | <b>3.25</b>       | -.02**             | -.01               | <b>3.20</b>       |
| Attraction to<br>public policy      | Total                 | .08**                      | .02                        |                   | .11**              | .10**              |                   |
|                                     | Direct                | .03**                      | .00                        |                   | .08**              | .09**              |                   |
|                                     | Indirect <sup>a</sup> | .06**                      | .02*                       | <b>4.23</b>       | .03**              | .01*               | <b>3.54</b>       |
| Commitment<br>to public<br>interest | Total                 | .09**                      | .05**                      |                   | .12**              | .11**              |                   |
|                                     | Direct                | -.03                       | .00                        |                   | .06**              | .08**              |                   |
|                                     | Indirect <sup>a</sup> | .12**                      | .05**                      | <b>4.76</b>       | .06**              | .03**              | <b>4.10</b>       |
| Compassion                          | Total                 | -.01                       | .05*                       |                   | .02                | .05*               |                   |
|                                     | Direct                | -.06**                     | -.06**                     |                   | -.01               | -.01               |                   |
|                                     | Indirect <sup>a</sup> | .05**                      | .11**                      | <b>3.80</b>       | .03*               | .06**              | <b>4.07</b>       |

Note. Z<sub>diff</sub> is calculated with the formula:  $Z = (b_1 - b_2) / (\sqrt{SEb_1^2 + SEb_2^2})$ . If Z<sub>diff</sub> is equal to or higher than 1.96, the difference is significant. ppo = people-processing organizations; pco = people-changing organizations.

<sup>a</sup>Mediated by work engagement.

\* $p \leq .05$ . \*\* $p \leq .01$ .

CPI dimensions on the work engagement of public servants in people-processing organizations are also significantly higher than these effects on the work engagement of public servants in people-changing organizations ( $\beta = .09$  and  $\beta = .46$  vis-à-vis  $\beta = .02$  and  $\beta = .18$ , respectively,  $p \leq .000$ ). The COM dimension has a significantly higher impact on the work engagement of public servants in people-changing organizations than on the work engagement of public servants in people-processing organizations ( $\beta = .29$  and  $\beta = .11$ ,  $p \leq .000$ ). These results confirm the relationships as stated by Hypotheses 3a and 3b.

Fourth, I tested the expectations (reflected in Hypotheses 4a and 4b) that in general work engagement is a mediator between the above-mentioned factors and job satisfaction and performance, and that work engagement is a stronger mediator in case of public servants in people-changing organizations than in case of public servants in people-processing organizations. To test these possible mediating effects, I employed a bootstrapping method (as shown in Table 6) with 1,000 resamples and confidence intervals set at .95.

Table 6 shows that work engagement is in all instances a partial mediator for public servants in people-processing and people-changing organizations. Hypothesis 4a is therefore accepted. In addition, work engagement is only a stronger partial mediator for public servants in people-changing organizations in case of the relationships between COM and both outcomes. Hence, Hypothesis 4b is rejected.

## Discussion

Due to the increasing demanding work engagement, public managers need their employees to be proactive and dedicated and feel energetic in their work to reach high performance—that is, public organizations need engaged workers. Most studies are merely focused on the commitment and job satisfaction of public servants, which are passive attitudes that do not lead to the attainment of the full potential by these public servants. Studying work engagement as a new concept in public administration has in other words become relevant. The goal of this study was to examine the relationship between antecedents and outcomes of work engagement in the public sector in general and the within public sector differences including institutional contexts and inherent work tasks in particular. After all, assuming that the attitudes and behaviors of public servants are all the same across all different public organizations is naive.

Based on the results presented above, it can be concluded that public servants have different personalities and work in different institutional contexts, which influences their work engagement. Public servants in organizations with a people-changing service orientation (including education and health care) become especially engaged due to their compassionate personality and possibility to contribute to society. Public servants in organizations with a people-processing service orientation (including, for example, the local government and the police) become especially engaged due to their APP and CPI.

In conflict with my expectations, red tape has a negative effect on all public servants, but employees in people-processing organizations experience more detrimental effects on their work engagement due to red tape than their colleagues in people-changing organizations. In addition, the effect of autonomy on the work engagement of public servants is positive, but the effect is much smaller in case of health care personnel and teachers than in case of people-processing public servants. Possibly because public servants in people-changing organizations are more socialized in the contexts of relatively high red tape and relatively low autonomy and knew what they were getting into. Another explanation might be that teachers and health care personnel see their work as a real calling and are relatively less interested in all the provided job resources (Hakanen et al., 2006).

The argument that especially public servants in people-changing organizations see their work as a real calling might also explain the results that public servants in people-changing organizations have a significantly higher work engagement than their people-processing counterparts. In any case, work engagement is in both types of organizations an important mediator between personality and job factors, on one hand, and job performance and job satisfaction, on the other hand.

## *Contributions for Practice*

My research is timely given the growing pressures in, for example, the U.S. congress to increase employee engagement (Byrne et al., 2017). This study shows that public

personnel managers should be aware in what kind of environment they work before they introduce resources to increase work engagement. The effects of job resources and job demands on the work engagement of public servants vary depending on the environment.

First, public personnel managers in public hospitals and schools need to realize that their personnel becomes especially engaged by their intrinsic motivation and COM for others (affective motivates). This personnel has an intrinsic calling and is much less influenced by all sorts of external job resources. In contrast, public managers within the police, defense, and also central and local government need to realize that their personnel becomes engaged by the possibility to contribute to the public interest and to develop public policies (normative motives and rational motives). In other words, public managers should take into account the specific motives of their personnel in choosing their steering mechanisms.

Second, in contrast to schools and hospitals, public personnel managers within the police, defense, central government, and local government can increase the work engagement of their personnel by decreasing red tape and increasing the possibility to work autonomously. Although the experienced red tape is high within schools and hospitals, the detrimental effect on the work engagement and inherent performance is negligible.

Third, work engagement is a very important stimulator of performance and job satisfaction of personnel in every context. The importance of stimulating the work engagement of public servants by their managers (Byrne et al., 2017; Cotton, 2012; Kernaghan, 2011; Lavigna, 2013) is therefore confirmed by this study.

### *Limitations and Future Research Directions*

I end this article by discussing some limitations. First, I used cross-sectional data. As such, assumptions are merely based on theoretical arguments about the likely direction of causality, moving from resources and demands through work engagement to performance and satisfaction. Future studies could employ longitudinal or experimental designs that could test the actual causality of these relationships. Second, because the questions on all the factors were asked in the same survey, the data could be subject to common source bias (CSB). To limit possible bias, several actions were taken including asking reversed questions, providing full anonymity in completing the survey, and separating all the factors in the survey. Additional tests were also conducted including the Harman's one-factor test for both groups which is still an important test to identify issues with CSB (George & Pandey, 2017). Furthermore, interaction effects are a core element of this paper which cannot be the product of CSB (George & Pandey, 2017). Third, a distinction between public organizations based on normative institutional logics has shown to be relevant in explaining differences in work engagement. However, other distinctions may also be relevant. Cultural-cognitive institutional elements might, for example, matter or the differences between street-level bureaucrats and personnel behind the scenes. More research on how differences between public organizations influence the relationship between work engagement and its antecedents and outcomes is necessary to gain insight into the context dependency of work engagement.

## Conclusion

In conclusion, my empirical results emphasize the importance of work engagement research in public administration because it leads to higher performance and job satisfaction. My research findings especially highlight the importance of taking into account the personality of public servants and also the need to relate institutional theory with work engagement. This research therefore shows that work engagement is a very important addition for scholars and practitioners in public administration, but there is more to discover.

## Declaration of Conflicting Interests

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

## Funding

The author(s) received no financial support for the research, authorship, and/or publication of this article.

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