Task Variety and Counterproductive Work Behavior

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Abstract

Purpose: This study examined the relationship between task variety and counterproductive work behavior (CWB) and the relationship between change in task variety and change in CWB. CWB is proposed as being a behavior that serves as an outlet by which employees can express displeasure and acts as a substitute for a lack of interest when task variety is low.

***Design/methodology/approach*:** This study analyzed survey data that was collected at two points in time (T1 and T2) from 515 employees with different occupations working in Switzerland.

Findings: Task variety at T1 negatively related to organizational CWB (CWB-O) at T1 and interpersonal CWB (CWB-I) at T2. Task variety at T1 was also related to a change in CWB-O and a change in CWB-I. However, change in task variety showed a non-significant relationship to change in CWB-O and change in CWB-I.

Research limitations/implications: Results indicated that employees tend to respond with CWB when task variety is permanently low and that CWB may even increase over time. Further studies that examine the dynamics between task variety and CWB are therefore recommended.

Practical implications: Findings inform the practice on the potentially harmful effects of unstimulating work designs and therefore have implications for how to better prevent CWB.

***Originality/value*:** The two-wave data collection allowed for differentiation between the effect of the baseline level of task variety at T1 on CWB at T2 and the effect of a change in task variety on a change in CWB.

Keywords: counterproductive work behavior; job characteristics; resources; deviance

Task Variety and Counterproductive Work Behavior

Introduction

Today's organizations use standardization, automatization and technology to gain efficiency in production. The way in which work is organized has implications, which can often be lower levels of task variety (Loukidou *et al.*, 2009). According to the job design literature (Demerouti *et al.*, 2001; Humphrey *et al*., 2007), low levels of task variety reflect a lack of work stimulation. The influence of job design on employees' attitudes and well-being has been studied widely. It is also the case that employees may not want to simply accept unsatisfactory job design. Thus, research has also increasingly recognized the need to explore employees' behavioral reactions when coping with unsatisfactory and unstimulating job designs (e.g. Oldham and Hackman, 2010; Wrzesniewski and Dutton, 2001). Some of these behaviors may have dysfunctional implications for organizations (Balducci *et al.*, 2011; Spector and Fox, 2010)

We combine research on job design and counterproductive work behavior (CWB) to link task variety to CWB. CWB is harmful behavior that is targeted at the organization (e.g., arriving late for work) or co-workers (e.g., cursing a co-worker) (Spector *et al.*, 2006). We propose that CWB may serve employees as a way of expressing their displeasure with low task variety and increasing stimulation when task variety is low or reduced. Thus, we investigate the relationship between perceived task variety and CWB, as well as between perceived change in task variety and change in CWB (see Figure 1). Although the degree of CWB can differ, it occurs in almost all organizations (Coyne and Bartram, 2000). Annual costs resulting from CWB are estimated to be billions of dollars (Vardi and Weitz, 2003).

[Figure 1]

This study adds to the sparse literature on behavioral reactions to task variety, which is an important element of a motivating job design (Demerouti *et al.*, 2001; Humphrey *et al.*,

2007). In their meta-analysis, Humphrey *et al.* (2007) did not find a single study investigating behavioral reactions to task variety. Additionally, our study aims at furthering the understanding of the dynamics between task variety and CWB by using a two-wave design. Little is known on how CWB evolves over time (Meier and Spector, 2013; Shoss *et al.*, 2016). Furthermore, to draw more generalizable conclusions, a sample of employees with various occupations working in Switzerland was examined. In particular, the knowledge on potential outcomes of modification in task variety is limited to the findings of a few case studies exploring task enlargement (i.e., a planned increase in task variety as a managerial intervention) among blue-collar workers (e.g., Campion and McClelland, 1993; Parker, 1998). Yet, given today's fast-paced working environment, change in task variety can affect employees in any occupation.

Hypothesis Development

Task variety is the extent to which employees are able to perform a wide range of tasks and refers to the use of different skills and variety in their job content (Morgeson and Humphrey, 2006). An example of a job with low task variety is the job of a data entry clerk, which requires data being input and corrected all day. An example of a job with high task variety is the job of a product manager; this job includes the whole product management circle, such as developing a marketing strategy, implementing marketing measures, conducting market analyses and pricing. According to the job demand-resource (JD-R) model, high task variety is a job resource (Bakker and Demerouti 2007; Demerouti *et al.*, 2001). Job resources are aspects of work that help employees achieve personal goals, satisfy personal needs, stimulate personal growth and cope with job demands that require effort to deal with (e.g., time pressure). High levels of job resources are associated with positive motivational outcomes, such as work engagement (Bakker and Demerouti 2007; Demerouti *et al.*, 2001). In contrast, "lacking resources preclude dealing effectively with high job demands and foster mental withdrawal or

disengagement" (Schaufeli and Bakker, 2004, p. 296).

Similarly, high task variety has the functional value of making work-related goals achievable and contributing to personal growth and thus qualifies as a job resource. Task variety offers valuable opportunities to use different skills and fosters an experience of meaningfulness and motivation (Hackman and Oldham, 1976; Humphrey *et al.,* 2007). Van den Broeck *et al.* (2015) showed that skill utilization is important for individual well-being; Van Ruysseveldt *et al.* (2011) found that task variety promoted on-the-job learning opportunities and Smith *et al*. (2009) demonstrated that individuals started to vary their tasks in order to remain interested and therefore meet performance demands. In contrast to high task variety, low task variety means a lack of opportunity to use valued skills (Loukidou *et al.,* 2009; Zaniboni *et al.,* 2013). Low task variety may require additional effort to maintain attention and performance and is likely to result in a lack of stimulation and motivation, displeasure and even more negative affective states, such as frustration or anger.

Balducci *et al*. (2011) proposed that CWB is a behavioral reaction to negative affective states caused by poor work design. The authors found support for their propositions. Similarly, Spector and Fox (2005) argued that CWB is an attempt to overcome negative affective reactions to poor working conditions. CWB in this sense serves as a way of behaving which restores a sense of justice and control. More recent literature also posits that employees may engage in CWB in order to find additional stimulation and escape non-stimulating work (Spector and Fox, 2010; Skowronski, 2012). Thus, CWB qualifies as a coping behavior; employees anticipate that they will feel better if they engage in it (Shoss *et al.,* 2016).

CWB refers to a variety of dysfunctional behavior. A distinction can be made between organizational CWB (CWB-O), which threatens organizations, and interpersonal CWB (CWB-I), which threatens individuals in the organization (Spector *et al*., 2006). Examples of CWB-O include excessive private web-serving, taking longer breaks than necessary, or call-

ing in sick (Bennett and Robinson 2000; Spector *et al.,* 2006). Examples of CWB-I include gossiping about co-workers, holding information back, or cursing at co-workers (Bennett and Robinson 2000; Spector *et al*., 2006). Evidence indicates that employees tend to direct CWB against the source of their displeasure (Fox *et al.* 2001). As the employer is responsible for job design, perceptions of task variety might be more strongly associated with CWB-O than with CWB-I. However, low task variety may also provoke CWB-I. This is in line with the work-environment hypothesis developed and supported by researchers on bullying (e.g., Baillien *et al*., 2011; Einarsen *et al.,* 1994). The hypothesis states that negative affective states caused by unsatisfactory work conditions may become manifest in workplace aggression, including CWB-I. In sum, we hypothesize:

Hypothesis 1a: The relationship between task variety and CWB-O is negative.

Hypothesis 1b: The relationship between task variety and CWB-I is negative.

In contrast to the baseline level of task variety, which relates to the range of different job tasks, an increase in task variety means that new tasks are added to a job in such a way that the repetitiveness of the work is reduced (Zaniboni *et al.,* 2013). In contrast, a decrease in task variety can be understood as the loss of a valued job aspect and opportunities for making full use of skills. A decrease in task variety is consequently associated with an increase in perceived repetitiveness (Loukidou *et al*., 2009). We therefore argue that a loss of task variety is, in a similar way to low task variety, a negative work-related experience to which employees may react with negative affective states. In addition, employees may feel the need to find a substitute for a lack of work stimulation so this can go hand-in-hand with lower task variety (Spector and Fox, 2010).

Using the same theoretical principles as those above, a loss in task variety may predict an increase in CWB. We hypothesize:

Hypothesis 2a: The relationship between change in task variety and change in CWB-O

is negative.

Hypothesis 2b: The relationship between change in task variety and change in CWB-I is negative.

Method

Procedure and Sample

The data used was from a research project that surveys employees in Switzerland on a regular basis. The first data wave was collected in the autumn of 2012, and the second in the autumn of 2013. A total of 1,479 employees received a request inviting them to participate in the online-survey; 600 responders completed both the first and second survey (response rate = 41%). The survey was conducted in German and French. To ensure a high response rate, coupons valued at 15 Swiss Francs were offered for every survey completed. As a result of CWB-O and CWB-I being target-specific, we excluded 46 respondents who had changed employer between T1 and T2, and 24 who had transferred internally (i.e., they had different coworkers). We also excluded 15 respondents who reported an absence of longer than three months (e.g., maternity or unpaid leave).

The total sample consisted of 515 respondents. Average age was 40.46 years (*SD* = 10.11) and the average job tenure 12.29 years (*SD* = 9.80). A total of 61% of the sample was male; 27% worked part time and 77% completed the survey in German. Additionally, 35% held a bachelor's degree or higher; 27% described themselves as administrative professionals; 24% health, cultural or educational professionals; 18% technical professionals; 11% manual or production workers; 10% trade or transport professionals; 4% tourism and service professionals and 4% construction workers.

Measures

CWB. CWB-O was measured at T1 and T2 using Bennett and Robinson's (2000) 12-item scale (e.g., "Intentionally worked slower than you could have worked"). CWB-I was

measured at T1 and T2 by using the 7-item scale also developed by Bennett and Robinson (2000, e.g., "Made fun of a co-worker at work"). For both scales, respondents indicated on a 7-point scale (1 = *never*, 7 = *daily*) how often they had conducted CWB during the last year. Cronbach's alpha of the CWB-O scale was .81 at T1 and .80 at T2. Cronbach's alpha of the CWB-I scale was .83 at T1 and .82 at T2. Bennett and Robinson (2000) originally developed the scales to measure workplace deviance: a very similar construct to CWB. Their scales have also been widely used to assess CWB because the scales fully overlap with other established CWB measurements (Spector and Zhou, 2014).

Change in CWB. Change scores of CWB-I and CWB-O were obtained by subtracting T1 values from T2 values. Positive values reflect an increase in CWB and negative values a decrease. We also obtained standardized residuals by regressing the scores of CWB-O and CWB-I in T2 onto the scores in T1. Modeling change by using standardized residuals has the advantage of non-inflating errors (Cronbach and Furby, 1970; Demerouti *et al.*, 2012; Edwards and Parry, 1993). We found no differences in results when using either standard residuals or simple change scores. Therefore, the results obtained with simple change scores were reported.

Task Variety. Task variety at T1 and T2 was measured by using three items developed by Morgeson and Humphrey (2006) (e.g., "My job involves doing a number of different things"). Responders indicated to what extent they agreed on a 5-point Likert scale (1 = *not at all*, 5 = *completely*). Cronbach's alphas were both .88 (T1 and T2).

Change in Task Variety. We calculated change scores in task variety by subtracting the values of task variety at T1 from the values of task variety at T2. Positive values reflect an increase in task variety and negative values a decrease. We also checked whether results differed when standardized residuals were used instead of simple change scores. Results obtained with simple change scores were reported because this was not the case.

Control Variables. As a result of the fact that satisfaction with different job aspects other than task variety (e.g., payment) might influence CWB (Hershcovis *et al.,* 2007), we assessed overall job satisfaction at T1 as a proxy for the overall assessment of all job aspects. Job satisfaction was measured with one item (using a 10-point scale 1 = completely dissatisfied, 10 = completely satisfied; Wanous *et al.,* 1997). In accordance with the literature (Douglas and Martinko, 2001; Gonzalez-Mulé *et al.,* 2013; Zaniboni *et al.,* 2013), we measured gender (1 = *male,* 0 = *female*), age (in years), job tenure (in years), part time work (1 = *part time,* 0 = *full time*) and education (1 = *bachelor level or above,* 0 = *other*) at T1. To consider regional and cultural differences in Switzerland, we coded the language in which the surveys were completed (1 = *German,* 0 = *French*). We also collected data on organizational events (i.e., restructuring, lay-offs and promotion) and the occupational sector. Following the recommendations of Becker (2005), we only controlled for these variables in the model that showed sustainable effects: gender, language, age, education and job satisfaction.

Results

Table 1 presents the descriptive statistics of the variables included in the model. To estimate the relationship between task variety and CWB, we used task variety measured at T1 as a predictor and CWB-O and CWB-I measured at T2 as outcomes. To estimate the relationship between change in task variety and change in CWB, we controlled for the baseline level of CWB (i.e. CWB-O and CWB-I at T1) and for the baseline level of task variety at T1. OLS regressions were estimated on a step-by-step basis. The results are reported in Table 2. Missings were deleted list-wise because there was no indication as to whether they were non-random ($\chi 2(1.836) = 1813.78$, $p = .639$) and results did not change when the full information maximum likelihood method was used to replace missing data. Additionally VIF values (> 2.00) indicated that multicollinearity was not an issue.

[Table 1]

Consistent with Hypothesis 1a, task variety showed a significant negative relationship with CWB-O (b = -.22, p < .001, ΔR^2 = .04, p < .001). Data also supported Hypothesis 1b in predicting that task variety was significantly negatively related to CWB-I (b = -.20, p < .001, ΔR^2 = .03, p < .001). However, we found no support for Hypothesis 2a, which stated that change in task variety and change in CWB-O were negatively related (b = -.07, p > .05; ΔR^2 = .00, p > .05). Also, Hypothesis 2b was not supported as we found a non-significant relationship between change in task variety and change in CWB-I (b = .03, p > .05, ΔR^2 = .00, p > .05). Importantly, the relationship between the baseline level of task variety and change in CWB-O (b = -.12, p < .01, ΔR^2 = .01, p < .01) and change in CWB-I (b = -.13, p < .01, ΔR^2 = .01, p < .01) was negative and significant.

[Table 2]

Supplementary Analysis

Results suggest that task variety is a predictor of CWB-O and CWB-I, as well as of any change in CWB-O and CWB-I. To explore further contexts in which low high task variety is more prevalent and therefore high CWB-O and CWB-I are potentially of higher concern, supplementary t-tests were conducted. Responders with lower levels of education reported significant lower task variety than respondents holding a bachelor degree or above (4.46 vs. 4.61, t(487) = 2.50, p < .05). French speaking responders also indicated lower levels of task variety than German-speaking responders (4.40 vs. 4.55, t(510) = 2.01, p < .05). Interestingly, no significant differences between responders working in different occupational sectors were found. Similarly, we also found no significant differences in task variety with regard to other measured control variables.

Discussion

In this paper, we investigated how the baseline level of perceived task variety and change in perceived task variety were related to CWB and changes in CWB, respectively.

Data supported a negative relationship between task variety at T1 and CWB-O at T2 and CWB-I at T2. This implies that a low level of task variety might have unintended harmful consequences for organizations. Specifically, we found further support for literature that suggests that CWB is a coping behavior that employees exhibit in order to deal with unsatisfactory work conditions (e.g., Shoss *et al*., 2016; Spector and Fox, 2005). Yet, CWB may serve employees as both as an outlet whereby they can express displeasure and as a behavior in which they indulge when perceived task variety is low to make up for a lack of interesting work. Consequently, we recommend further research to investigate the effect of negative psychological experiences and the need for enhancing stimulation as variables that potentially mediate the relationship between low task variety and high CWB. It would also be worthwhile examining buffers in such mediation models. For instance, perception of job importance may influence the extent to which low task variety is tolerated (Barbalet, 1999).

Interestingly, the baseline level of task variety was negatively associated with change in CWB-O and change in CWB-I. This finding supports Shoss *et al.* (2016) who proposed that CWB may be a learned coping behavior that employees tend to demonstrate when more problem-focused coping tactics aimed at dealing with an unsatisfactory situation are perceived to be less effective. The behavior is learned because the authors found that the frequency with which CWB was used in the past predicted the extent to which individuals perceived CWB as being a successful coping tactic. In order to explore more functional coping tactics than CWB, we encourage further research into the examination of different coping tactics used by employees experiencing low task variety. A starting point could be to study CWB and job crafting jointly. Demerouti *et al.* (2015) found that seeking challenges, a job crafting behavior used to create more challenging jobs, such as asking for more responsibilities, was positively associated with CWB. Both behaviors could possibly have the same underlying cause, namely a need for more work stimulation.

Contrary to our predictions, the relationships found between change in task variety and change in CWB-O and change in task variety and change in CWB-I were non-significant. However, a low baseline level of task variety was significantly related to CWB-O and CWB-I, as well as change in CWB-O and CWB-I. Thus, it seems reasonable to assume that when changes in task variety are permanent to an extent that task variety falls below a certain threshold, changes in task variety that lead to low task variety may provoke CWB in the long term. Such a threshold effect would be in line with the strain accumulation model (Zapf *et al.*, 1996). According to this model, strong reactions of individuals can only be observed when a certain breaking point is achieved at which individuals perceive their work situation as uncontrollable and unchangeable by their own problem-focused efforts. Consequently, investigating longitudinal dynamics as well as a potential threshold effect would be fruitful avenues for further research. It would also be interesting to examine to what extent supportive implementation practices of task redesign as well as other factors (e.g., personal resources such as self-efficacy) influence employees' reactions to a change in task variety.

Our supplementary analysis suggests that low task variety, and thus higher levels of CWB are more prevalent among employees with lower levels of education. Yet we found no significant differences among respondents working in different occupational sections. These findings possibly reflect the fact that automatization and standardization are increasingly used in all occupational sectors, including service and knowledge work (Davis, 2010). Employees with higher education may be less affected by these developments. One possible explanation for the finding that French-speaking respondents indicated lower levels of task variety could be that the French-speaking part of Switzerland has a slightly tighter labor market than the German-speaking part (Schweizer Bundesamt für Statistik, 2017). Employees in the French-speaking part may therefore have fewer options to change jobs when they perceive low task variety. Supporting Davis (2010), our results suggest that the way work is designed by organ-

izations is not unrelated to micro-economic and societal factors. Consequently, research could further investigate how factors such as the local unemployment rate or technology use in industries are interrelated with job design as well as with the way employees respond to poor work design.

Limitations and Strengths

Firstly, the effect sizes reported were small, yet usual for CWB research (e.g., Penney and Spector, 2005; Spector and Zhou, 2014). Nevertheless findings can be of practical relevance as infrequent incidents of CWB can have serious negative implications. For example, 26% of respondents admitted to have made at least once a racist or sexist remark (i.e., values greater than 1 for the respective item) within the last year. Such behavior can cause costly legal investigations and damage an organization's reputation. In addition, CWB may be under-reported. Observed means and standard deviations were very low, but comparable with reported values in the field (e.g., Demerouti *et al.,* 2015; Meier and Spector, 2013). However, measuring CWB with self-reports appears to be reasonable. Berry *et al.* (2012) demonstrated that self-rates reported engaging in CWB more often than other rates (e.g., supervisors or co-workers). Halevy *et al.* (2014) found that self-reports of cheating behavior correlated with actual cheating behavior.

Secondly, in accordance with the original scale (Bennett and Robinson, 2000), respondents were asked to recall their CWB during the time span of one year. As less current events of CWB may be less salient to respondents, they may not be recalled correctly. Thus, short-lived effects may remain undetected. We found, however, significant effects despite the time lag of one year. Furthermore, our two-wave design lowered the possibility of a common method bias (Podsakoff *et al.,* 2003). Also, results of the Harman's single-factor suggested that common method variance was not a serious problem for our data.

Thirdly, there might be the possibility of a ceiling effect (i.e., those respondents who

pointed to a maximal value on the measurement scale in T1 were not able subsequently to signify an increase in task variety in T2). An extremely high level of task variety – probably better reflected by constructs such as role overload – could be a source of strain rather than a job resource. However, research has found little evidence for u-shaped relationships between work characteristics and employees' reactions (LePine *et al.,* 2005). Note that the squared term of task variety T1 showed no significant effect when included in our models.

Apart from these potential limitations, the negative relationship found between task variety and CWB was robust. We checked whether results also held when task variety at T1 was used to predict CWB-O and CWB-I at T1, and task variety at T2 was used to predict CWB-O and CWB-I at T2. We found similar effects when estimating these cross-sectional models. Yet, because of our two-wave design, we are able to draw stronger conclusions about causality compared to those looking at cross-sectional designs, which dominate the field (Meier and Spector, 2013). We also have no indication of reverse causality. An additional cross-lagged analysis revealed that task variety at T1 related significantly to CWB-O at T2, but CWB-O at T1 did not significantly relate to task variety at T2. Similarly, task variety at T1 showed a significant relationship with CWB-I at T2, but CWB-I at T1 did not with task variety at T2.

Practical Implications

Our findings suggest that when task variety is low CWB appears to be a higher potential risk for organizations than when task variety is high. Consequently, those in an organization that hold jobs which unify a number of different tasks seem to be less likely to show CWB. Yet, our results suggest that employees with a lower level of education and in the economically slightly weaker French-speaking region of Switzerland have less access to jobs with high task variety. Providing these employees with more task variety should therefore be a key priority for organizations.

High levels of task variety seem – to a certain extent – to be a useful measure when

tackling and attempting to decrease instances of CWB. Although change in task variety was not related to a change in CWB, the baseline level of task variety was related to higher CWB. Therefore, changes in a work organization that decrease or raise the level of task variety sustainably might still increase or reduce CWB in the long run. In line with previous research on job enrichment interventions (Parker, 1998), we expect the effects of an increase in task variety to be most favorable when employees report having the information they require, as well as the opportunity to obtain the skills needed to complete the new work tasks. Organizations with limited opportunities to increase task variety might profit from measures such as controls, in order to prevent and detect CWB more easily. An alternative would be to integrate gamification elements (e.g., team competitions) into daily tasks at work in order to make that work more enjoyable, therefore counteracting low task variety (Cardado *et al.* 2017; Dale, 2014). Our findings also raise questions about the need for preventive measures in order to prevent CWB when task variety is decreased. CWB does not appear to increase immediately when task variety is decreased. However, lower levels of task variety seem to enforce CWB over time. Management should therefore not disregard potential negative long-term effects when considering standardizing processes, implementing the use of higher technology (Loukidou *et al*., 2009), or restructuring work in other ways that lower task variety sustainably.

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Table 1.
Means, Standard Deviations and Correlations

Variables	*M*	*SD*	1	2	3	4	5	6	7	8	9	10	11	12	13
1 Male (T1)	0.61	0.49													
2 German (T1)	0.77	0.42	.03												
3 Higher Education (T1)	0.35	0.48	.14**	-.14**											
4 Age (T1)	44.46	10.11	.15***	.00	-.05										
5 Job Satisfaction (T1)	7.76	1.60	-.01	.07	.07	.01									
6 Task Variety (T1)	4.51	0.70	.01	.09*	.10*	.04	.36***								
7 Task Variety (T2)	4.53	0.66	.00	.04	.09*	.08	.26***	.66**							
8 Change in Task Variety (T2-T1)	0.01	0.56	-.01	-.07	-.01	.04	-.14**	-.46***	.37***						
9 CWB-O (T1)	1.62	0.55	.11*	-.12*	.04	-.14**	-.13**	-.20***	-.19***	.03					
10 CWB-O (T2)	1.52	0.52	.10*	-.11*	-.01	-.18***	-.15***	-.26***	-.25***	.02	.69***				
11 Change in CWB-O (T2-T1)	-0.09	0.42	-.04	.02	-.06	-.02	-.01	-.03	-.04	-.02	-.48***	.31***			
12 CWB-I (T1)	1.57	0.67	.21***	.02	-.03	-.02	-.12**	-.16***	-.15**	.02	.56***	.42***	-.24***		
13 CWB-I (T2)	1.45	0.59	.19***	.05	-.11*	-.08	-.08	-.21***	-.15***	.08	.44***	.58***	.11*	.55***	
14 Change in CWB-I (T2-T1)	-0.11	0.60	-.04	.01	-.05	-.05	.05	-.02	.02	.06	-.23***	.11*	.38***	-.57***	.38***

Note. N = 515. CWB-O = organizational counterproductive work behavior, CWB-I = interpersonal counterproductive work behavior. Male, German, and higher education are dummy coded variables. $^{*}p < .05$, $^{**}p < .01$, $^{***}p < .001$.

Table 2.
Regressions Predicting Organizational and Interpersonal Counterproductive Work Behavior

Variables and Steps	CWB-O (T2)	Change in CWB-O (T2-T1)	CWB-I (T2)	Change in CWB-I (T2-T1)
ΔR^2 *Step 1*	*.08****	*.25****	*.07****	*.34****
Male (T1)	.13**	.05	.22***	.10**
German (T1)	-.11*	-.05	.03	.01
Higher Education (T1)	-.04	-.06	-.14**	-.10*
Age (T1)	-.19***	-.10*	-.12**	-.08*
Job Satisfaction (T1)	-.14**	-.06	-.07	-.01
CWB-O (T1)		-.51***		
CWB-I (T1)				-.60***
ΔR^2 *Step 2*	*.04****	*.01***	*.03****	*.01***
Task Variety (T1)	-.22***	-.12**	-.20***	-.13**
ΔR^2 *Step 3*		*.00*		*.00*
Change in Task Variety (T2-T1)		-.07		.03
R2adj.	*.11*	*.25*	*.09*	*.35*
N	*484*	*458*	*501*	*492*

Note. Standardized coefficients are reported only for the variable added in each step of the relevant model CWB-O = organizational counterproductive work behavior, CWB-I = interpersonal counterproductive work behavior. Male, German, and higher education are dummy coded. $^{*}p < .05$, $^{**}p < .01$, $^{***}p < .001$.

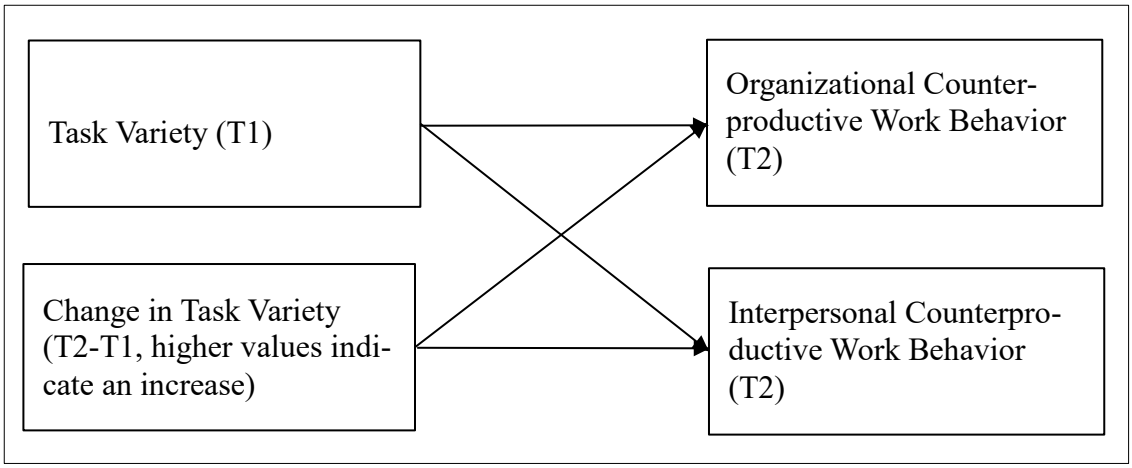

Figure 1. Research model