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Work Matters: Work Personal Projects and the Idiosyncratic Linkages Between Traits, Eudaimonic and Hedonic Well-being

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Abstract A holistic understanding of relationships between personality and well-being requires knowing the linkages between several levels of personality analysis and different wellbeing varieties, namely hedonic and eudaimonic measures. We explore the moderator effect of work personal projects, a personality variable linked to personal action, on the relations between proactive conscientiousness facets, personality traits, and subjective and psychological well-being. In two cross-sectional studies, a battery of self-report questionnaires was used to assess personality traits, personal projects, subjective and psychological well-being in 398 teachers of primary and high schools. Findings show that work personal projects moderate the relations between competence and deliberation, but not achievement striving, and the three psychological well-being dimensions. However, work personal projects do not have a moderator influence on the relationship between these traits and subjective well-being components. Therefore, work personal projects seem to provide specific and distinct linkages on the relationships between personality trait and these two kinds of well-being. Additionally, findings support the importance of work in adult lives, considered by diverse authors.

Keywords Teachers' work personal projects · Personality, subjective well-being · Psychological well-being

1 Introduction

In the well-being field, two major concepts have consolidated theoretical frameworks and generated a substantial amount of research: subjective well-being (SWB, Diener 1984) and

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psychological well-being (PWB, Ryff 1989). Research has suggested that variables linked to the personality realm are significantly related to SWB and, across time, several literature reviews and meta-analysis have reported these findings (DeNeve and Cooper 1998; Diener et al. 2003; Lucas 2008; Lucas and Diener 2008; Ozer and Benet-Martínez 2006; Steel et al. 2008). Regarding PWB, despite less abundant, findings indicate the existence of a consistent relationship between these well-being constructs and personality (Burns and Machin 2010; Grant et al. 2009; Keyes et al. 2002; Schmute and Ryff 1997; Siegler and Brummett 2000; Wood et al. 2009).

Nevertheless, the simultaneous study of the relationships between the personality variables and these two well-being constructs may help clarify their similarities and differences, promoting the development of both personality and well-being fields.

Furthermore, personal projects' features, personality variables linked to personal action, have consistently been related to SWB, but their linkages to PWB have been less explored. Little (2011b) considers that personal projects can help distinguish different varieties of well-being and their causes, correlates and consequences. Furthermore, work is a powerful theme in adulthood, so work personal projects may have a relevant role in the elucidation of the idiosyncratic linkages between personality levels and hedonic and eudaimonic well-being measures.

The purpose of the present study was to investigate, at a narrow level, the moderator influence of teachers' work personal projects in SWB and PWB. Specifically, we aim at exploring both the relationship between competence, deliberation and achievement facets (proactive conscientiousness facets) and the SWB components (satisfaction with life, positive affect, and negative affect), and the relationship between the same facets and three PWB dimensions that we consider particularly relevant in teachers' work (positive relations with others, purpose of life and environmental mastery). We predict that teachers' work activity may be so strong that its mere presence or absence has an impact on well-being.

Thus, having or not having personal projects may elicit distinct moderator influences on the effects of the three conscientiousness facets both on SWB components and PWB dimensions.

2 Literature Review

2.1 Individual Differences in Emotional and Social Life at Broad and Narrow Levels:

The Five Personality Domains and Their Facets

The five factor model (FFM) emerges as one the most well-established personality models related to the study of traits level (Costa and McCrae 1992, 1994; Goldberg 1990; McCrae and John 1992; John and Srivastava 1999), being supported both by the lexical (Goldberg 1992, 1993) and the psychometric tradition (Costa and McCrae 1992). The two traditions share the idea that the most important individual differences in personality can be organized in five ample domains that summarize more specific personality traits (Soto and John 2009). Nonetheless, some differences between these two backgrounds, namely in FFM measurement, in the designation of each of the five personality domains and in the inclusion of specific traits contribute to maintain two autonomous research fields.

Costa and McCrae (whose model we adopted) define the FFM as a hierarchical organization of personality traits in five basic dimensions: Extraversion, Agreeableness, Conscientiousness, Neuroticism, and Openness to Experience (Costa and McCrae 1992; McCrae and Costa 2008a, b). Each five personality factors is conceptualized as the broader

and higher level of the model, including, at a narrow level, the facets that supposedly measure a discrete trait (Costa and McCrae 1992). Both personality domains and facets refer to consistencies within a person and differences between different persons in social and emotional life and are considered as internal and bipolar dispositions, genetically formatted, relatively stable over time and across situations (McAdams 2009). McCrae and Costa (2008a, p. 285) consider “that an analysis that incorporates NEO-PI-R facets and their combinations can lead to detailed information that goes far beyond the five factors”. Several other authors have equally suggested that the prediction of many variables could be improved by using facets instead of global personality dimensions (Ekehammar and Akrami 2007; Paunonen and Ashton 2001; Paunonen et al. 2003). In the well-being field, Albuquerque et al. (2012b, e) showed that facets have a differential impact both in SWB components as PWB dimensions.

Conscientiousness refers to individual differences in organization and achievement (McCrae and Costa 2003). Previous research has shown that the conscientiousness domain has a considerable impact on work domain, namely in job performance (Barrick and Mount 1991). McCrae and Costa (2008b) clarify that the conscientious individuals are usually more productive because they are punctual, hard-working and systematic.

The conscientiousness domain integrates facets such as: (a) competence—sense of capacity to deal with life, belief in self-efficacy; (b) order—being neat, tidy and well organized; (c) dutifulness—strict adherence to ethical principles, scrupulous fulfill of moral obligations; (d) achievement striving—high aspirations, capacity to work hard to achieve goals, diligence, and sense of direction in life; (e) self-discipline—self-motivation and ability to begin and carry out the tasks despite boredom or distractions; (f) deliberation—tendency to think carefully before acting or speaking, cautiousness (Costa and McCrae 1992; McCrae and Costa 2003). Authors consider that conscientiousness facets constitute two groups of different traits—proactive traits (such as competence, achievement striving and deliberation) and inhibitive traits (such as order, dutifulness and self-discipline; McCrae and Costa 1987).

2.2 Work Personal Projects: One of the Most Frequent Pursuits in Middle Adulthood

Work is a central theme in adulthood. Freud (1930) considers that the communal life of human beings is grounded in the compulsion to work and the power of love. The importance of work in development of personality is also a crucial aspect in Erikson’s developmental theory (Erikson 1963). Thus, our work personal projects may be an important aspect related to the quality of lives in middle adulthood.

Personal projects are extended sets of personally salient actions in contexts that range from the daily affairs to the self-defining passions of life time (Little and Chambers 2004). These variables allow the study of personality at the goals and motives level. Theoretically, personal projects are anchored on the social ecological framework of human development (Little 1987, 2007, 2008, 2011a). On par with current concerns (Klinger 1977), personal strivings (Emmons 1986) and life tasks (Cantor and Kihlstrom 1987), personal projects (Little 1983) integrate personal action constructs (PAC), which are linked to intentional action in context (Little 2006). Little (1996, 2000) argues that personal projects link internal motivational tendencies and external ecological hindrances and difficulties.

People appraise their pursuits in several cognitive and affective dimensions. The most recent theoretical framework suggests that cognitive dimensions are organized into three factors—meaning, manageability and community—while the affective dimensions are translated into two affective factors—positive and negative affect (Little and Chambers 2004; Little and Gee 2007). Despite the emergence of the factors being conditioned by the

presence of specific appraisal dimensions and their inclusion being flexible, principal components analyses with standard version seems to support a similar structure (Albuquerque et al. 2012d; Little et al. 2006).

Our daily pursuits may be classified into broad categories according to the principal focus of their content: interpersonal, academic, work, intrapersonal, recreational/leisure, health and maintenance (Little and Gee 2007). Some personal projects can contribute to the achievement of other pursuits, promoting each other, or, conversely, they may hinder and preclude their reciprocal development (Little 2011a; Little and Gee 2007). Work personal projects are one of the most frequent categories encountered in the adult population (Albuquerque 2006; Little 2011a). Findings of a longitudinal study (Salmela-Aro et al. 2007) showed that work personal projects increased with the emergence of adulthood. Grant et al. (2007) consider that work pursuits are a link between individuals and their groups and organizations, providing information related to cognitions, affect, and behaviors that influence the work context; conversely, projects are influenced by the context as well. Work personal projects have been studied as independent, mediator and outcome variables (Grant et al. 2007). For instance, work pursuits' features were shown to predict job satisfaction (Harris et al. 2003) and job performance (Probst et al. 1998). Goodline (2000) reported that project commitment positively mediated the relationship between competence and work satisfaction. Salmela-Aro et al. (2004), in a longitudinal study, showed that psychotherapy interventions may have an impact on work personal projects. Other findings indicate that work projects and non-work projects may be in conflict (Karoly and Ruehlman 1996).

Several aspects linked to work have emerged as predictors of well-being measures (Robertson and Cooper 2011). Little (2011a) considers that human well-being is associated with the sustainable pursuit of core projects, and that those links are subtle and complex. Thus, the social ecological model proposes that personal projects' features have a direct effect on well-being and interact with traits and contextual factors in the production of well-being (Little 2008). Importantly, previous studies have shown that personal projects factors are linked to SWB (Albuquerque 2006, Albuquerque et al. 2012c, d; Christiansen et al. 1999; McGregor and Little 1998; Pychyl and Little 1998; Salmela-Aro and Nurmi 1997; Wallenius 1999). On the other hand, meaning and efficacy of personal projects seem to have distinct relationships with hedonic and eudaimonic well-being measures (McGregor and Little 1998).

2.3 Subjective Well-being: Judging Life Positively and Feeling Good

SWB is one of the most well-known concepts in psychological research. People react and respond in a different way to the same circumstances and the judgment of their life conditions is filtered through individual and distinctive expectations and values, as well as by past and singular experiences (Diener et al. 1999). Therefore, there is a subjective element of well-being that is not captured by social indicators (Diener and Suh 1997). In two seminal and influential articles, SWB is considered to be a multidimensional construct that involves a cognitive component, related to how we evaluate our life satisfaction (life satisfaction), and an affective component, concerning our positive or negative emotional reactions (positive and negative affect, respectively; Diener 1984; Diener et al. 1999). Research has supported this premise: the tripartite structure has been empirically confirmed by several studies that showed some degree of empirical independence between the three components (Albuquerque et al. 2012a; Arthaud-Day et al. 2005; Lucas et al. 1996). Therefore, the SWB reflects the experience of a high level of positive affect, a low level of negative affect and a high degree of satisfaction with one's life (Deci and Ryan 2008; Diener 2000; Diener et al. 2005).

The field of SWB has grown steadily in recent decades, stimulating extensive research related to: (a) structure and measurement, predictive variables; (b) cross cultural differences; (c) physiological mechanisms; (d) adaptation process across time to events; (e) consequences to physical and mental health; (f) and development of strategies for improvement (Diener et al. 1999; Eid and Larsen 2008; Kahneman et al. 1999).

Some concern about the limitations associated with SWB measures, namely the lack of theoretical underpinnings and the negligence of aspects related to positive psychological development described in conceptions of life-span development, led to the emergence of a new well-being construct, the PWB (Ryff 1989, 1995).

2.4 Psychological Well-being: Positive Psychological Functioning and Mental Health

PWB arose from the intersection of the aristotelic concept of eudaimonia and several theoretical psychological perspectives (Ryff 1989, 1995; Ryff and Singer 2008). So, PWB integrated contributions of the life-span development theory (Büller 1935; Erikson 1959; Neugarten 1973), maturity (Allport 1961), self-actualization (Maslow 1968), individuation (Jung 1933), full functioning (Rogers 1961) and positive mental health (Jahoda 1958). Ryff was able to articulate both these theoretical frameworks and the eudaimonic philosophic concept in a coherent approach about human well-being. Therefore, the PWB area aims at prompting research about positive psychological functioning and at generating a theory-based empirical approach to what it means to be mentally healthy (Ryff and Singer 2005, 2006, 2008).

PWB is described as a multidimensional construct that includes six dimensions—autonomy, environmental mastery, personal growth, purpose in life, positive relationships with others, self-acceptance—which correspond to six challenges that individuals experience across their lives (Ryff 1989). Self-acceptance (SA) defines the people's attempt to feel good about themselves despite being conscious of their own limitations; positive relationships with others (PRO) is related to the effort of development and maintenance of warm and trusting interpersonal relationships; environmental mastery (EM) refers to the pursuit to shape the environment so as to meet personal needs and desires; autonomy (AU) defines the attempt to sustain individuality within a larger social context; purpose in life (PL) is linked to the seeking of a sense of self-determination and personal authority in order to find meaning in one's efforts and challenges; and personal growth (PG) is linked to the search of making the most of one's talents and capacities (Keyes et al. 2002; Ryff 1989; Schmute and Ryff 1997). Although research has produced ambiguous findings concerning PWB dimensions (Abbott et al. 2006; Springer and Hauser 2006) several studies have supported the proposed structure (Albuquerque et al. 2012; Ryff and Singer 2006).

Research in the PWB field during the past two decades may be organized around five major categories: factorial validation, psychological correlates and cross-time dynamics, assessment of socio-demographical correlates, biological correlates, and intervention efforts to promote positive functioning (Ryff and Singer 2006, 2008).

3 Methods

3.1 Participants and Procedure

The study integrates 398 teachers that were recruited from primary and high schools in Viseu district (Portugal). They were randomly selected by clusters corresponding to the 19 schools or school cluster they worked in. Mean age was 41.09 (SD = 7.71), 72.1 % were

females ($n = 287$) and 27.90 % males ($n = 111$). The majority of subjects were married, (75.60 %, $n = 301$) and 78.95 % were graduated ($n = 314$). The mean of years in teaching experience was 16.85 ($SD = 8.00$). Sociodemographic characteristics of this teachers' sample were analyzed in comparison to the characteristics of the Portuguese teachers' population (Gabinete de Estatística e Planeamento da Educação, 2010) and we found that our sample had similar sociodemographic characteristics.

After obtaining permission for the data collection by the school boards, we distributed 1,000 research protocols to participants with the collaboration of the school staff. Each protocol included a battery of self-report questionnaires related to personality, well-being and socio-demographic and professional data, as well as script information about the research goals and filling instructions. In line with ethical requirements, it was emphasized that participants' cooperation was voluntary and their answers were confidential and only used for the purpose of this study. 675 research protocols were returned, and 277 of these were not used since they had missing data that precluded their use. According to the teachers' feedback to the researcher and to their school boards, this response rate was related to the length of the questionnaires pack and, also, to a general lack of motivation to integrate the study due to recent changes in the legal definition of the career progress of teachers in Portugal.

3.2 Measures

3.2.1 *Personality Traits*

The three conscientiousness facets (competence, deliberation and achievement) were measured with a self-report version of the NEO Personality Inventory—Revised (NEO PI-R), developed by Costa and McCrae (1992) and validated to the Portuguese population by Lima (1997). Each facet was assessed by a set of 8 items and a confirmatory factor analysis showed that these facets have factorial validity (Albuquerque et al. 2012e).

3.2.2 *Personal Projects*

Personal projects were assessed through the *Personal Projects Analysis—PPA* (Little 1983; Lima 2002). PPA incorporates four modules for personal projects analysis: elicitation, appraisal, hierarchy, and impact. This study uses only the first module. In the personal project elicitation module, the respondents were encouraged to generate their planned or ongoing projects without constraint “To start, please take 10–15 min and type in the following cells as many personal projects and activities you can that you are currently engaged in or considering—remember these need not be formal projects or even important ones—we would prefer that you gave us more of the everyday kinds of activities or concerns that characterize your life at present”.

The projects elicited were categorized by content. Two independent persons, a teacher and a psychologist, previously trained in the PPA methodology, reviewed the categorization, in an attempt to provide more objectivity in this process. Then, the number of projects in a given category could be used as indexes. The present study focused specifically on work personal projects elicited by teachers. These projects were integrated in a comprehensive category that ranges from trivial tasks (e.g. Buying colour paper) to more molar projects (e.g. Implicating the parents in school life) and from individual projects (e.g. Correcting my students home work) to projects linked to school groups and school organization (e.g. Collaborating in the accomplishment of an educational project). We also

integrated in this category the academic and training courses related to teachers' work (e.g. Finishing my master thesis in "Evaluation of teachers"; Doing my training report on "The learning of children with cognitive disabilities"). In our study, we dichotomized the category work personal projects in two variables: 'to have' or 'not to have' work personal projects.

3.2.3 Subjective Well-being

SWB was assessed by two self-report measures: *Satisfaction with Life Scale* (SWLS) and *Positive and Negative Affect Schedule* (PANAS).

The SWLS (Diener et al. 1985) appraises the cognitive component of SWB. The version used in the present study was validated to the Portuguese population by Simões (1992). The scale includes 5 items and the Portuguese version is measured on a rating scale from 1 (strongly disagree) to 5 (strongly agree). The PANAS (Watson et al. 1988; Portuguese version by Simões 1993) integrates two subscales, Positive Affect (PA) and Negative Affect (NA) that assess the affective component of SWB and are measured on a rating scale from 1 (very slightly or not at all) to 5 (extremely). A three component model with 5 items in SWLS, 9 items in PA of PANAS and 9 items in NA of PANAS emerged in a confirmatory factor analysis that tested SWB structure (Albuquerque et al. 2012a).

3.2.4 Psychological Well-being

PWB was measured by the Scales of Psychological Well-Being (SPWB) (Ryff 1989; Ryff and Essex 1992; Portuguese version: Novo et al. 1997). The self-report questionnaires used in the present study integrate 84 items that evaluate six dimensions of PWB (14 for each dimension): self-acceptance (SA), positive relationships with others (PRO), environmental mastery (EM), autonomy (AUT), purpose in life (PL) and personal growth (PG). Only the EM, PL and PRO scales were used in this study because these are the most relevant dimensions in teachers work. A Likert scale ranging from 1 (completely disagree) to 6 (completely agree) was used to answer.

4 Results

4.1 Statistical Analysis

Data analyses were conducted using PASW (PASW, Predictive Analytics Software, version 20, SPSS Inc., Chicago, IL, USA).

In their seminal article, Baron and Kenny (1986) considered that a moderator is a qualitative or quantitative variable that influences the direction and/or strength of the relationship between a predictor and a criterion variable. In order to analyse the moderator effect of work personal projects on the relationship between proactive conscientiousness facets and SWB components, we conducted several multiple hierarchical regression analyses considering the interaction between continuous predictors (competence, achievement striving and deliberation) and a categorical predictor (to have or not to have work personal projects) (Baron and Kenny 1986; Cohen et al. 2003). In this procedure, in an attempt to reduce the error associated with multicollinearity, we used a standardized procedure, centering the values of the continuous predictor variables, and then obtaining

the interaction product by multiplying the two variables (continuous and categorical) (Aiken and West 1991). Finally, in order to better understand the relation between the facets and the well-being measures when we have the two conditions of work personal projects (to have or not to have work personal projects), we plotted graphics considering three levels of traits (low, medium and high) and the two conditions of the categorical variable.

4.2 Descriptive Statistics

The means and standard deviations for personality and well-being measures are presented in Table 1 and are close to those found in preceding studies (Lima 1997; Novo et al. 1997; Simões 1992, 1993). The majority of participants ($n = 340$, 85.4 %) elicited work personal projects, with 14.6 % ($n = 58$) participants not eliciting such personal projects. Cronbach' alpha revealed values that range from .61 for competence facet to .86 for negative affect, which are considered to be acceptable and good values (DeVellis 2003). Pearson product-moment correlations were conducted to explore the degree of association between variables. Results showed that all variables, with the exception of the correlation between achievement striving and negative affect, are associated at a statistical level of $p < .010$.

Negative affect is inversely correlated with other variables, while all the remaining variables are positively associated with each other. Overall, all correlations are low or moderate, with the exception of the correlations between PWB measures, which are slightly higher. These findings are common in PWB measures (Springer and Hauser 2006).

Then, six hierarchical regression analyses were conducted to control the effects of socio-demographic variables age, education and gender on the three SWB components and the three PWB dimensions. Concerning to PWB dimensions, gender inversely predicts the dimension environmental mastery. Regarding SWB components, age positively predicts the SWLS component.

5 Study 1: The Moderator Effect of Work Personal Projects on the Relationship Between Conscientiousness Facets and PWB Dimensions

5.1 Competence, Work Personal Projects and PWB Dimensions

Three hierarchical regression analyses were conducted to explore the moderator effect of work personal projects on the relationship between competence and positive relations with others, purpose in life and environmental mastery. The three steps of the model are shown in Table 2. In the first step, the competence facet was entered as a predictor and in the second step work personal projects was further incorporated as a predictor variable. Whereas in the first step the predictor (competence) produced a statistically significant model, the entry of the second predictor (to have or not to have work personal projects) does not produce a significant model. In the third step, the interaction terms were entered and produced three statistically significant models. The interaction terms were entered and produced a R^2 of .13 [$F_{(1, 394)} = 4.13$; $p < .043$] for positive relations with others, a R^2 of .29 [$F_{(1, 394)} = 4.25$; $p < .040$] for purpose in life and a R^2 of .23 [$F_{(1, 394)} = 5.15$; $p < .024$] for environmental mastery. Thus, there was a significant interaction between competence and work personal projects on predicting these three dimensions of PWB.

Regression coefficients analysis (Table 2) showed that competence is a statistically significant and independent predictor in all steps of the model, whereas work personal

Table 1 Means (M) and standard deviations (SD), correlations and Cronbach alphas for the continuous variables under study ($N = 398$)

	M	SD	Correlations								
			1	2	3	4	5	6	7	8	9
1 Competence	21.78	3.18	–								
2 Achievement striving	20.81	3.90	.52**	–							
3 Deliberation	18.76	4.16	.37**	.34**	–						
4 Life satisfaction	17.08	4.41	.29**	.25**	.21**	–					
5 Positive affect	32.24	4.18	.38**	.46**	.17**	.36**	–				
6 Negative affect	19.86	6.26	–.35**	–.10	–.32**	–.42**	–.35**	–			
7 Environmental mastery	59.71	8.66	.46**	.37**	.35**	.56**	.42**	–.55**	–		
8 Purpose in life	66.18	9.02	.53**	.50**	.36**	.54**	.44**	–.44**	.73**	–	
9 Positive relations with others	64.62	9.81	.35**	.24**	.16**	.34**	.35**	–.45**	.60**	.58**	–
Cronbach alpha			.61	.68	.70	.84	.79	.86	.82	.84	.85

** $p < .010$

Table 2 Model summary of the three steps hierarchical multiple regression using competence, achievement striving and deliberation (conscientiousness facets) to predict the positive relations with others, purpose in life and environmental mastery (PWB dimensions) having work personal projects as moderator ($N = 398$)

	Positive relations w. others		Purpose in life		Environmental mastery	
	ΔR^2	β	ΔR^2	β	ΔR^2	β
Step 1	.12***		.28***		.21***	
Competence		.35***		.53***		.46***
Step 2	.00		.00		.01	
Competence		.35***		.53***		.46***
Work PP		.05		.05		.07
Step 3	.01*		.01*		.01*	
Competence		.60***		.76***		.73***
Work PP		.04		.05		.06
Competence \times work PP		-.27*		-.25*		-.29*
Total R^2	.13***		.29***		.23***	
Step 1	.06***		.25***		.13***	
Achievement striving		.24***		.50***		.37***
Step 2	.00		.00		.00	
Achievement striving		.23***		.50***		.37***
Work PP		.05		.04		.07
Step 3	.00		.00		.00	
Achievement striving		.39**		.61***		.48***
Work PP		.04		.04		.06
Achievement striving \times work PP		-.17		-.12		-.13
Total R^2	.06		.26		.14	
Step 1	.03**		.13***		.12***	
Deliberation		.16**		.36***		.35***
Step 2	.00		.01		.01	
Deliberation		.16**		.36***		.35***
Work PP		.06		.08		.09
Step 3	.01*		.01*		.01*	
Deliberation		.38**		.60***		.60***
Work PP		.06		.08		.09*
Deliberation \times work PP		-.24*		-.26*		-.28*
Total R^2	.04**		.15***		.14***	

PP personal projects

* $p < .050$, ** $p < .010$, *** $p < .001$

projects are not. The interaction between these two variables points out to the existence of a moderator effect of work personal projects on the relationship between competence and positive relations with others ($\beta = -.27$; $t = -2.031$; $p = .043$), on the relationship between competence and purpose in life ($\beta = -.25$; $t = -2.062$; $p = .040$), and on the relationship between competence and environmental mastery ($\beta = -.29$; $t = -2.269$; $p = .024$).

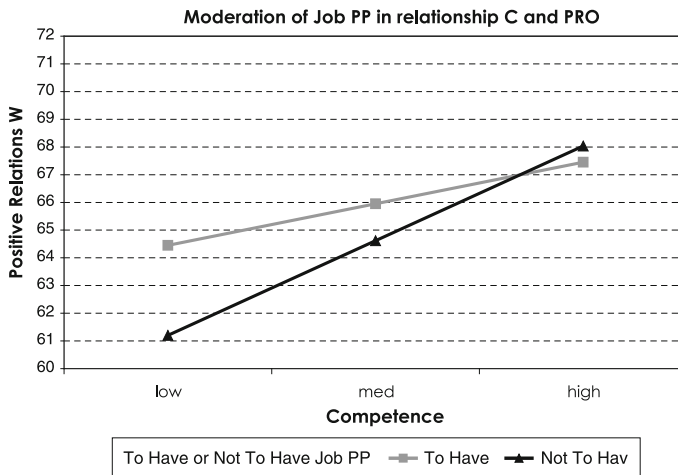


Fig. 1 Graphic for the relation between competence and positive relation with others with two conditions of work personal projects

5.2 Achievement Striving, Work Personal Projects and PWB Dimensions

The moderator effect of work personal projects on the relationship between deliberation and positive relations with others, purpose in life and environmental mastery was also explored (Table 2). Only the three first models are significant. In the first step, deliberation was entered as a predictor and on the second step job personal projects was added. When the interaction terms were entered, in the third step, they produced a R^2 of .06 [$F_{(1, 394)} = 1.44$; $p < .231$] for positive relations with others, a R^2 of .26 [$F_{(1, 394)} = 1.01$; $p < .315$] for purpose in life and a R^2 of .14 [$F_{(1, 394)} = .98$; $p < .322$] for environmental mastery. Therefore, there was no significant interaction between achievement striving and work personal projects on predicting these three PWB dimensions. Regression coefficients analysis (Table 2) showed that achievement striving is an independent and statistically significant predictor in all three steps. The non-significant interaction between achievement striving and work personal projects suggests the inexistence of a moderator effect of work personal projects on the relation between achievement striving and the three PWB dimensions.

5.3 Deliberation, Work Personal Projects and PWB Dimensions

Table 2 presents the hierarchical regression analyses that explore the moderator effect of work personal projects on the relationship between deliberation and positive relations with others, purpose in life and environmental mastery. Only the first and the third steps are statistically significant. In the first step, deliberation was entered as a predictor and on the second step work personal projects was added. When the interaction terms were entered, in the third step, they produced a R^2 of .04 [$F_{(1, 394)} = 3.85$; $p < .050$] on positive relations with others, a R^2 of .15 [$F_{(1, 394)} = 5.01$; $p < .026$] on purpose in life and a R^2 of .14 [$F_{(1, 394)} = 5.87$; $p < .016$] on environmental mastery. Therefore, there was a significant interaction between deliberation and work personal projects on predicting these three PWB dimensions. From the regression coefficients analysis (Table 2), we can see that

deliberation is an independent and statistically significant predictor in all three steps. The interaction between deliberation and job personal projects suggests the existence of a moderator effect of job personal projects on the relationship between deliberation and positive relations with others ($\beta = -.24$; $t = -1.963$; $p = .050$), on the relationship between deliberation and purpose in life ($\beta = -.26$; $t = -2.239$; $p = .026$), and on the relationship between deliberation and environmental mastery ($\beta = -.28$; $t = -2.424$; $p = .016$).

The graphic in Fig. 1 illustrates the relationship between competence and positive relation with others with the two conditions of work personal projects.

We can observe that to have work personal projects increases positive relations with others in individuals with low levels of competence. However, individuals that have high levels of competence are slightly benefited in positive relations with others if they do not have work personal projects.

To enhance the understanding of the relationship between competence and purpose in life when there are different conditions of work personal projects another graphic was plotted. This second case showed a similar pattern to Fig. 1. To have work personal projects makes a difference in the purpose in life of individuals with low levels of competence, but individuals with high level of competence reveal a bit higher purpose in life if they do not have work personal projects.

Finally, a graphic was also plotted to enhance the understanding of the relation between competence and environmental mastery, when there are two different conditions of work personal projects. The same pattern of outcomes (as the one shown in Fig. 1) was found: to have work personal projects makes a difference on environmental mastery in individuals with low levels of competence, but individuals with high levels of competence are benefited if they don't have work personal projects.

In order to improve the understanding of the relationship between deliberation and the PWB dimensions when there are two different conditions of work personal projects, three graphics were plotted (Figs. 2, 3, 4).

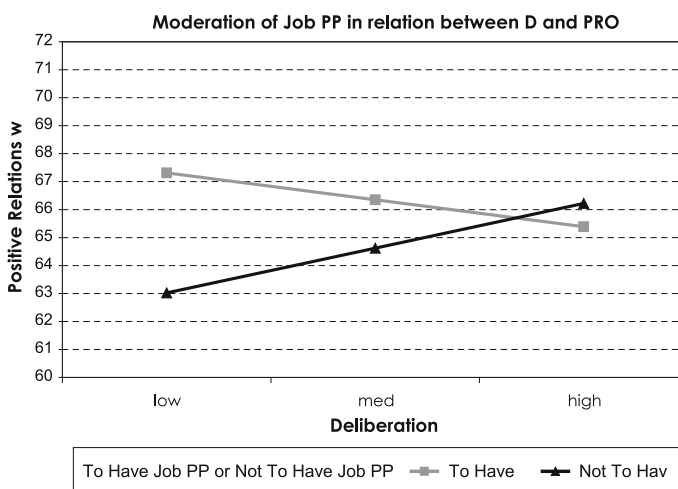


Fig. 2 Graphic for the relation between deliberation and positive relations with others with two conditions of work personal projects

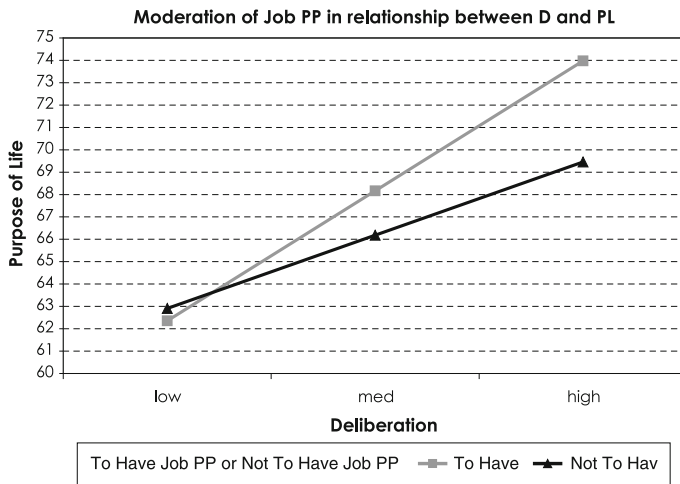


Fig. 3 Graphic for the relation between deliberation and purpose in life with two conditions of work personal projects

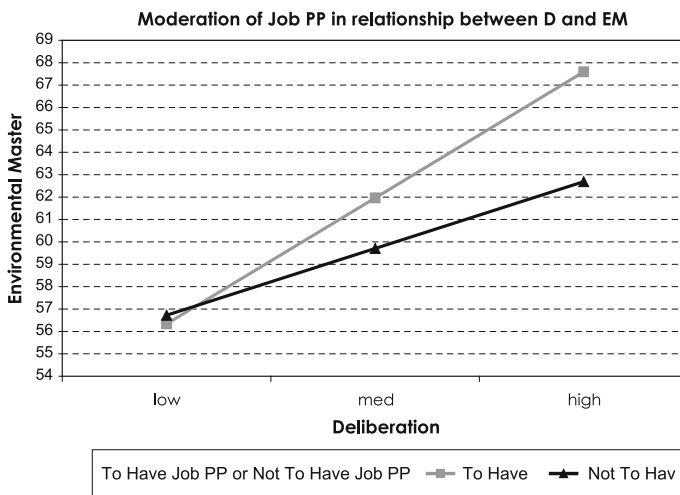


Fig. 4 Graphic for the relation between deliberation and environmental mastery with two conditions of job personal projects

Positive relations with others are benefitted if individuals with low levels of deliberation have work personal projects (Fig. 2). However, not having work personal projects slightly increases the level of positive relations with others on individuals with high levels of deliberation.

To better understand how the two conditions of work personal projects differentially impact on the relationship between deliberation and purpose in life, another graphic was plotted (Fig. 3).

The graphic shows that to have or not to have work personal projects makes a positive difference in the level of purpose in life in individuals with high levels of deliberation, but makes little difference on individuals with low levels of deliberation.

In Fig. 4, the graphic shows how the two conditions of work personal projects impact on the relationship between deliberation and environmental mastery (Fig. 4). To have work personal projects enhances the level of environmental mastery when individuals show high levels of deliberation.

6 Study 2: The Moderator Effect of Work Personal Projects on the Relationship Between Conscientiousness Facets and SWB

6.1 Competence, Work Personal Projects and SWB Components

The first three hierarchical regression analyses explored the moderator effect of work personal projects on the relationship between competence and positive affect, negative affect and life satisfaction (Table 3). In the first step, the competence facet was entered as a predictor and in the second step work personal projects was further incorporated as a predictor variable. Whereas in the first step the predictor (competence) produced a statistically significant model, the entry of the second predictor (to have or not to have work personal projects) did not produce a significant model. In the third step, the interaction terms were entered and did not produce a statistically significant model. When the interaction terms were entered they produced a R^2 of .15 [$F_{(1, 394)} = 1.18$; $p < .279$] for positive affect, a R^2 of .12 [$F_{(1, 394)} = .00$; $p < .969$] for negative affect and a R^2 of .09 [$F_{(1, 394)} = .11$; $p < .738$] for life satisfaction. Therefore, there was no significant interaction of competence and work personal projects on predicting these three SWB components. Regression coefficients analysis confirmed that competence was a statistically significant and independent predictor in all steps model, whereas work personal projects was not (Table 3).

6.2 Achievement Striving, Work Personal Projects and SWB Components

The following three hierarchical regression analyses explored the moderator effect of work personal projects on the relationship between achievement striving and the three SWB components (Table 3). Only when positive affect and life satisfaction were the outcomes was the first step statistically significant. In the first phase, achievement striving was entered as a predictor and on the second work personal projects was added. When the interaction terms were entered, in the third step, they produced non significant models: R^2 of .21 [$F_{(1, 394)} = 1.05$; $p < .306$] on positive affect, a R^2 of .01 [$F_{(1, 394)} = .38$; $p < .538$] on negative affect and a R^2 of .06 [$F_{(1, 394)} = .07$; $p < .790$] on life satisfaction. The interaction between achievement striving and work personal projects suggests that there was no moderator effect of work personal projects on the relationship between achievement striving and SWB components (Table 3).

6.3 Deliberation, Work Personal Projects and SWB Components

Finally, three other hierarchical regression analyses were conducted to explore the moderator effect of work personal projects on the relationship between deliberation and SWB

Table 3 Model summary of the three steps hierarchical multiple regression using competence, achievement striving and deliberation (conscientiousness facets) to predict the positive affect, negative affect and life satisfaction (SWB components) having work personal projects as moderator ($N = 398$)

	Positive relations w. others		Purpose in life		Environmental mastery	
	ΔR^2	β	ΔR^2	β	ΔR^2	β
Step 1	.14***		.12***		.09***	
Competence		.38***		-.35***		.29***
Step 2	.00		.00		.00	
Competence		.37***		-.35***		.29***
Work PP		.06		.04		-.01
Step 3	.00		.00		.00	
Competence		.24***		-.36***		.25***
Work PP		.06		.04		-.01
Competence \times work PP		.15		.01		.05
Total R^2	.15***		.12***		.09***	
Step 1	.21***		.01		.06***	
Achievement striving		.46***		-.10		.25***
Step 2	.00		.00		.00	
Achievement striving		.45***		-.10		.25***
Work PP		.04		.03		-.02
Step 3	.00		.00		.00	
Achievement striving		.58***		-.18		.21***
Work PP		.04		.03		-.02
Achiv. striv. \times work PP		-.13		.09		.04
Total R^2	.21**		.01		.06	
Step 1	.03**		.10***		.04***	
Deliberation		.17**		-.32***		.22***
Step 2	.01		.00		.00	
Deliberation		.17**		-.32***		.22***
Work PP		.07		.03		.00
Step 3	.01		.00		.00	
Deliberation		.35*		-.36**		.22*
Work PP		.07		.03		.00
Deliberation \times work PP		-.20		.04		-.01
Total R^2	.20**		.32***		.22***	

PP personal projects

* $p < .050$, ** $p < .010$, *** $p < .001$

components (Table 3). In the first step, deliberation was entered as a predictor and on the second step work personal projects was added. Only the first step was statistically significant. Besides, when the interaction terms were entered in the third step they produced a R^2 of .20 [$F_{(1, 394)} = 2.72$; $p < .100$] on positive affect, a R^2 of .32 [$F_{(1, 394)} = .13$; $p < .716$] on negative affect and a R^2 of .22 [$F_{(1, 394)} = .00$; $p < .951$] on life satisfaction. The regression coefficients analysis showed that deliberation is an independent and statistically significant predictor in all three steps (Table 3). The interaction between

deliberation and work personal projects showed that there was no moderator effect of work personal projects on the relationship between deliberation and the three SWB components.

7 Discussion

Almost 20 years ago, Pavot et al. (1995) suggested that SWB would to be an ideal arena to clarify the interplay between personality levels. We have sought to extend this idea and explore how two personality levels interact in the production of two kinds of well-being in teachers. At a narrow level, we studied the moderator influence of work personal projects on the effect of traits on SWB and PWB of teachers. Our hypothesis that having or not having work personal projects would differently moderate the effect of competence, achievement striving and deliberation (proactive conscientiousness facets) on SWB components (hedonic measures) and on PWB dimensions (eudaimonic measures) seems to be partially supported by the results. Our findings show that work personal projects do indeed reveal a moderating effect on the relationship between competence and deliberation traits and positive relations with others (PRO), purpose in life (PL) and environmental mastery (EM). However, work personal projects do not moderate the relationship between competence and deliberation traits and positive affect (PA), negative affect (NA) and life satisfaction (LS). Furthermore, both the relationship between achievement striving and SWB components, as between achievement striving and PWB dimensions are not moderated by the conditions of having or not having work personal projects.

Additionally, work personal projects seem to moderate the relationship between the two proactive conscientiousness facets and the three PWB dimensions with relative specificity.

Having work personal projects is beneficial to positive relations, purpose in life and environmental mastery in individuals with diminished competence. Consequently having work personal projects may benefit teachers with low sense of efficiency, self-confidence and resourcefulness (competence trait), helping them in the development and maintenance of warm and trusting interpersonal relationships (PRO), in the shaping of the environment so as to meet personal needs and desires (EM), and in the improvement of the sense of self-determination and personal authority to find meaning in their lives (PL).

Conversely, teachers with heightened competence are slightly benefited in these three PWB dimensions, if they do not have work personal projects. Then, it seems that having work personal action may be a way to increase our sense of competence, increasing our PWB.

The relationship between the deliberation trait and the three PWB measures is also moderated by having or not having work personal projects. So, and unlike what happened with the competence trait, to have work personal projects improves the sense of capacity to find meaning in life (PL) and the shaping of the environment according to needs and desires (EM) in individuals with an increased tendency to be meticulous, cautious and focused (deliberation). Nonetheless, having or not having personal work projects does not make a difference in teachers with diminished levels of deliberation. In contrast, in teachers with a reduced deliberation, the development and maintenance of positive interpersonal relationships (PRO) is improved if they have work personal projects, but teachers with an increased deliberation seem to benefit slightly if they do not have work personal projects. Possibly, in teachers less focused on their tasks, less cautious and meticulous, having work personal projects is a way to interact with others and to develop and maintain warm and trusting interpersonal relationships.

The presence or absence of work personal projects does not moderate the relationship between achievement striving and the SWB components or the PWB dimensions. Accordingly, to possess high aspirations, capacity to work hard to achieve goals, diligence, and sense of direction in life (achievement striving trait), predict two of the SWB components (positive affect and life satisfaction) and the three PWB dimensions (positive relations with others, environmental mastery and purpose in life). Nevertheless, having or not having work pursuits does not significantly modify the strength and/or direction of the relationships.

Regarding the SWB components, to having or not having work personal projects does not seem to influence the relationship between competence and deliberation and the SWB components. Therefore, teachers' positive or negative emotional reactions (positive and negative affect) are influenced by the deliberation and competence traits, but their work personal projects do not change the strength and/or the direction of this relationship. Similarly, teachers' judgements about their lives as a whole (life satisfaction) is influenced by competence and deliberation, but teachers' work personal projects do not moderate this relationship.

Several implications can be drawn from the present study. Findings seem to reinforce the idea argued by several authors that SWB and PWB are different and independent concepts of well-being (Deci and Ryan 2008; Keyes et al. 2002; Lent 2004; Little 2011b; Ryan and Deci 2001). Therefore, eudaimonic well-being measures are more permeable to the effect of work activity, which moderates the effect of two proactive conscientiousness traits (competence and deliberation) on three PWB dimensions. In contrast, the influence of those two traits on hedonic well-being measures does not seem to be affected by the conditions of having or not having work personal projects. Moreover, the current study seems to confirm Little's (2011b) suggestion that personal projects may elucidate the idiosyncrasies of different well-being varieties and contribute to know the subtle linkages between personality and well-being. Besides, a holistic understanding of the relationships between personality and well-being should consider the personality as a whole since the several personality levels interact in the production of well-being (Little 1996, 2008; Little 2011b). Personal action in context differently moderates the traits influence, and alters the strength and the direction of their impact on three dimensions of PWB, but not on the SWB components. So, the quest to understand the structure, functioning and coherence of personality and its relationship with well-being needs information about all levels (Little 2006, 2008; McAdams 1995, 1996). Importantly, and in line with several authors (Erikson 1963; Freud 1930; Robertson and Cooper 2011), this study also highlights the importance of work in adult lives. The mere fact that teachers include or not personal projects linked to work when they elicited their personal projects may differently moderate the impact of traits on well-being. Additionally, these findings support previous research showing that analysis at a narrow level can have an important role in a more refined understanding of personality and well-being linkages (Albuquerque et al. 2012b, e). As Costa and McCrae (2008) consider, facets are specific and give detailed information beyond the factor. This study revealed that the three proactive conscientiousness facets, being a subset of the six facets from this personality domain, interact differently with work personal projects in the production of PWB and SWB, suggesting that the specificity of these facets may be more subtle.

7.1 Limitations and Future Research

The present study has a cross-sectional design. Therefore, it does not capture the effects of the interaction between traits and work personal projects on well-being measures across time. Longitudinal studies could help overcome this limitation.

Our sample includes solely teachers and we know that an overrepresentation of particular groups is an obstacle to the generalization of results. Therefore, future studies comprising heterogeneous and representative samples should be conducted, seeking to replicate the current findings.

Future research could also encompass other personality and well-being variables, providing a more extensive picture related to the linkages between these two psychology fields.

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