

Workplace relationships in Europe: An analysis by occupation and employment status

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Abstract

Purpose: This article analyses the extent to which two objective attributes of work – employment status, and occupation – influence workplace relationships in Europe. Employing a quantitative approach, we explore how far the segmentation of the labour market is reflected in the non-material dimensions of working life, seeing the nature of work and the stabilisation of employment as resources that help explain broader dynamics of job quality.

Design/methodology: Based on three indicators of the 6th edition of the European Working Conditions Survey – 2015 (support from colleagues; support from managers; and the quality of relationships), we performed two-way ANOVA to test both the primary effects of the variables ‘employment status’ and ‘occupation’ on support and quality of workplace relationships, and their interaction effect. Additionally, we carried out a descriptive analysis of the mean scores of each of the dependent variables in the various groups of the independent variables. The survey’s sample consists of 43,850 workers from 35 European countries, randomly selected by strata of the active population in each country.

Findings: The results show that workers with more stable jobs, and those who occupy positions at the top of the ISCO-08 classification, enjoy more support and better interpersonal relationships, thus suggesting the need to extend labour market segmentation discussions to the relational spheres of work.

Research limitations/implications: The statistical indicators used need a more robust operationalisation, able to provide greater empirical validity. Other independent variables, such as the perceptions of job security or the country of work should be considered in future analysis to control for institutional and policy specificities.

Originality/value: Research on workplace relationships tends to emphasise the effects that such relationships have on both organisations and individuals, usually based on case studies and individual narratives of relationships formed in stable work contexts. In this article, we shift the focus from the effects of workplace relationships, to the ways in which they vary in accordance with the nature of work and the objective employment conditions.

Keywords: Workplace relationships, Support from colleagues, Support from managers, Occupation, Employment status

Jel Codes: C12, J24, J81, M50, O15, O52

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1. Introduction

There is a broad consensus that establishing good relationships at work can have a positive effect on both organisational performance and individual well-being (Colbert, Bono & Purvanova, 2016; Morrison & Nola, 2009; Morrison & Cooper-Thomas, 2017; Sias & Shin, 2019). Going beyond the study of causal relations, the empirical developments over the years have made it possible to widen the discussion to encompass the processes of forming and maintaining such interpersonal relationships in the workplace, considering them central to an understanding of contemporary work dynamics (Morrison & Cooper-Thomas, 2017; Riordan & Griffeth, 1995; Sias & Cahill, 1998; Sias, Health, Perry, Silva & Fix, 2004; Sias, Petersen, Gallagher & Kopaneva, 2012; Sias & Shin, 2019).

Two major trends have been taking root in the predominant literature on workplace relationships. One is the generalised use of case studies and individual narratives, in what Fritz (2014) and Rumens (2017) have called the qualitative, post positivist, turn in workplace relationships studies. This has, to some extent, relegated quantitative analysis to a secondary position in the field.

The fact that extensive data on workplace relationships are not easily available has limited the development of comparative and over time analyses of relational dynamics at work. Possible difficulties with the measurement and validation of relational-type indicators have contributed to a certain neglect of this dimension in larger-scale surveys.

Be this as it may, various extensive surveys, such as the European Working Conditions Survey (EWCS) and the European Social Survey (ESS), have been working on this dimension, mainly by asking subjects to provide a subjective individual assessment of the quality of their interpersonal relations. EWCS (2015) data show that most European workers possess a good interpersonal support network at work, receiving helpful support from colleagues (75.5% said that this was the case always or most of the time) and managers (64.7% said that this was the case always or most of the time), and generally getting on well with co-workers (91.1% strongly agreed or tended to agree with the sentence “I generally get on well with my work colleagues”). As with other subjective indicators, it is possible that assessments of the quality of personal relationships and support networks at work may be somewhat impermeable to external socioeconomic factors and not vary much over time, but the lack of longitudinal data makes this type of analysis impossible.

To some extent, this generalised tendency for good relationships to be established at work and their possible stability over time is part of the reason why researchers have preferred not to analyse these indicators in more depth, namely in terms of the ways in which social support and the quality of interpersonal relationships vary in accordance with the nature of the work and the objective conditions in which it is done, or with other indicators of a structural kind.

The second trend is the generalised analysis of relationships formed in work contexts that possess some degree of stability (Pedersen & Lewis, 2012). It is understandable that studies about work focus on concrete workplaces, where the relational dynamics are either already established, or in a phase in which they are forming or dissolving. Relationships at work are thus often presented as resulting from organisational logics, interactional circumstances, or certain personality traits. However, considering the mobility, fluidity and dissolution of boundaries between work and non-work, which characterise many employment relationships in contemporaneity, it is also necessary to look at interpersonal relationships as being external to specific organisational contexts and personal circumstances, promoting an approach that considers the relational dimension of work to be a wider phenomenon that occurs in, results from, and generates broader social dynamics.

In the present article we seek to fill in some of these analytical gaps, examining the extent to which two objective attributes of work – employment status, and occupation – bring about variations in the relational dimension of work. To this end, we use three EWCS indicators: support from colleagues; support from managers; and the quality of relationships with colleagues (EWCS, 2015). Primarily employing a quantitative approach that considers all the European workers who responded to the survey, we explore how far the segmentation of the labour market is also reflected in the non-material dimensions of working life, seeing the nature of work and the stabilisation of legal employment statuses as resources that help explain broader dynamics of well-being and quality of work.

The article begins with a review of the existing literature on workplace relationships, and presentation of our key research hypotheses. The following section sets out the methods and data used, describing the survey, the variables, the statistical procedures and the characteristics of the sample. In sections four and five, we present and then discuss our results, identify the limitations of the study and offer some thoughts about possible future research. Finally, we present the main conclusions.

2. Workplace relationships

The effects that relational dynamics have on daily working life and on the ways in which organisations function are well documented in the literature. A predominant area of research has focused on the instrumental role that social relationships at work can take on. Some aspects of day-to-day working life, such as sharing information, performing tasks (Colbert, Bono & Burvanova, 2016; Morrison & Nolan, 2009), disclosing errors (Mao & Hsieh, 2017), among others, can be facilitated by the existence of workplace friendships.

Similarly, it has also been noted that interpersonal relationships at work take on an expressive function, namely of a socio-emotional nature, influencing perceptions of organisational support (Hayton, Carnabucci & Eisenberger, 2012) or interactive justice (Chen, Mao, Hsieh, Liu & Yen, 2013), but also contributing to personal growth and individual flourishing (Colbert, Bono & Burvanova, 2016). Having good relationships with co-workers and managers influences levels of satisfaction and commitment, for example, reducing intentions to change job or organisation (Lewis, Doorne-Huiskes, Redai & Barroso, 2011; Ahmad & Yekta, 2010; Pedersen & Lewis, 2012). The relational dimension of work also helps improve people's daily experience with work, giving it meaning and contributing to individual well-being (Ducharme & Martin, 2000; Hodson, 1997; Hulbert, 1991; Morin, 2001; Schaufeli & Baker, 2004).

Apart from looking at its effects, another important body of contributions to an understanding of working relationships can be found in the literature on friendship. The concept of friendship has been less thoroughly explored in the literature than the notion of social support, which is also associated with the idea that having friends at work does not always mean working in a friendly context – an attribute that can in fact be more important for both workers and enterprises (Morrison & Nolan, 2009).

According to Morrison and Nolan (2009), social support can be drawn from various sources and does not presuppose as much intimacy and closeness as friendship relationships. However, as these authors themselves conclude, this distinction ends up existing more on the academic and analytical plane than in the narratives given by workers, who tend to treat social support and friendship at work as synonymous.

In any case, studies on friendship have made relevant contributions to understanding personal relationships at work, namely by analysing the processes whereby friendships at work are formed, maintained, and dissolved (Morrison & Cooper-Thomas, 2017; Riordan & Griffeth, 1995; Sias & Cahill, 1998; Sias et al., 2004; Sias et al., 2012; Sias & Shin, 2019), and by theorising workplace friendships as a set of practices and as social, rather than just organisational, relationships (Rumens, 2017).

This line of research has also suggested a number of angles that are of interest to a broader and more integrated approach to interpersonal relationships at work. The idea that friendships are formed within a framework of voluntariness has been debated, above all in the sphere of work, in which there is a range of key structural determinants, which promote and condition the relationships that are established (Adams & Blieszner, 1994;

Grey & Sturdy, 2007). Along the same lines, there have also been developments which are leading towards a greater integration of the factors that explain friendships, concretely expanding the psychological and individual dispositional explanations to include the analysis of the cultural and structural contexts in which friendships occur and unfold (Adams & Blieszner, 1994).

The contributions made by the various approaches to social capital are also relevant. Applying the social capital concept to the world of work has resulted in a considerable number of studies that see it as a privileged instrument with which to both gain access to and retain certain jobs, and progress within a career or organisation (Chan & Goldthorpe, 2004; De Graff & Flap, 1988; Lin, Ensel & Vaughan, 1981; Lin, 2000).

The concept of social capital is also often treated as though it were the same as social ties. Notwithstanding the criticisms of this undifferentiated treatment (Fishman, 2009; Grey & Sturdy, 2007), which are due above all to the conceptual imprecisions of the concept itself, studies on social capital have made it possible to add to the knowledge about the relational dimension of work, specifically in terms of how it is formed and the consequences it has (Bandiera, Barankay & Rasul, 2008).

Whatever the analytical angle or thematic focus that studies may adopt, it would seem to be useful for contemporary scholarship to problematize the relational dimension of work within the overall framework of today's labour dynamics.

In contemporary societies, the dissolution of boundaries between work and non-work (Olson-Buchanan & Boswell, 2006) is lending a prominent role to the relationships that people establish at work. The processes of work intensification, the centrality which the work sphere is taking on in life, and the long periods of time which are often spent working mean that the workplace is increasingly being recognised as a privileged location in which to develop close and supportive interpersonal relationships (Pedersen & Lewis, 2012). The relationships that are formed at work can thus contribute to personal fulfilment and social integration in a broader sense, inasmuch as co-workers can often frequent relationship circles that are not restricted to the working sphere.

In current labour markets, the increasing insecurity of employment relationships has given rise to new questions in studies on the relational dimension of work. Research has shown that in more difficult periods, having friends at work or being able to count on the support of colleagues and managers can make daily activities easier to do (Morrison & Nolan, 2009). Similarly, there is also empirical evidence which suggests that more trying contexts – particularly those associated with job insecurity – can lead to hostile behaviour between co-workers (Feather & Rauter, 2004; Hodson, Roscigno & Lopez, 2006; Probst, 2009) and lower levels of organizational commitment (Cruz, López-Gusman & Cañizares, 2014).

In addition, mobility between jobs and between periods of employment and unemployment, together with the growth of hiring formats that are not permanent or are based on flexible or irregular working hours, can make it harder to form bonds and can also lead to a certain disinvestment in interpersonal relationships by both workers and managers, and the organisation in which they work.

Some authors attribute a significant part of the responsibility for any increased fragility in interpersonal relationships to the fluidity of legal employment relationships (Feather & Rauter, 2004; Probst, 2009). As Pedersen and Lewis (2012) say, if friendships are context-dependent and if there is a tendency for them to form through work, then it is important to know what happens when people change job, are fired or retire.

The labour market segmentation theories underline the existence of unequal and contrasting segments within the overall market (Berger & Piore, 1980; Doeringer & Piore, 1971; Gordon, Edwards & Reich, 1982). Various statistical indicators with the potential to gauge the quality of working life support these theses, according to which the “good” jobs tend to accumulate favourable characteristics, in contrast to the “bad” ones, which combine a range of adverse conditions (see, for instance, Kalleberg (2011)). One essential element of this differentiation is the legal employment bond, which lies at the roots of the insider/outsider dichotomy.

However, there are indications that this differentiation is also produced by the nature of the occupation in question. The specificities of certain countries notwithstanding, managers, professionals and technicians tend to

enjoy better working conditions than other occupations. This is true of both the material dimensions of work, such as pay or exposure to physical risks, and aspects linked to personal development or lifelong learning, as well as the content of the work itself, which is perceived as more complex and varied, useful, and satisfying (Barroso, 2013; Eurofound, 2017).

There have been few studies on the impacts that occupational differentiation has on the relational dimensions of work. Some authors do address working relationships in specific occupational groups – examples include nurses (Brunetto et al., 2013; Tran, Nguyen, Dang & Ton, 2018; Trincherro, Farr-Wharton & Brunetto, 2019), school teachers (Lam & Lau, 2012; Yavuzkurt & Kiral, 2020), academic professionals (Moulin, 2020; Potgieter, Coetzee & Ferreira, 2018), or bank workers (Bader, Hashim & Zaharin, 2013). However, occupation as a variable that explains or influences work relationships is rarely problematized.

Chun-Te Lin's (2010) study on the Chinese and Taiwanese reality is an exception. She showed that managers, and professionals who perform managerial functions, tend to enjoy better friendships at work than subordinate workers. Other relevant contributions can be found in the literature on emotions at work which, albeit still very focused on service occupations, has made it possible to confirm that both the expression and experience of negative emotions at work tend to become more intense as one moves down the occupational ladder (Lively, 2000; Sloan, 2004). In their analysis of bullying at work, Hodson et al. (2006), and Roscigno, Hodson and Lopez (2009) identify low-status service occupations as being particularly vulnerable to abuses of authority and bad workplace relationships. Based on this evidence, one can not only posit the hypothesis that labour market segmentation also extends to the relational dimension of working life, but also say that more studies on this question are needed.

In the present article we seek to contribute to the development of knowledge about workplace relationships in contemporary societies, by means of an analysis that considers how they vary in accordance with employment status and occupation. As such, we propose to test the following hypotheses:

Hypothesis 1.

Colleagues' support varies according to employment status, occupation and the combined effect of employment status and occupation. Concretely, precarious forms of employment and occupations at the bottom of the ISCO-08 classification are associated with less support from colleagues.

Hypothesis 2.

Managers' support varies according to employment status, occupation and the combined effect of employment status and occupation. More specifically, precarious forms of employment and occupations at the bottom of the ISCO-08 classification are associated with less support from managers.

Hypothesis 3.

The quality of interpersonal relationships varies according to employment status, occupation and the combined effect of employment status and occupation. More concretely, precarious forms of employment and occupations at the bottom of the ISCO-08 classification are associated with weaker workplace relationships.

3. Methods and data

In the present article we use 2015 data from the sixth edition of the European Working Conditions Survey (EWCS), which has been applied at 5-yearly intervals since 1991 to workers in various European countries by the European Foundation for the Improvement of Living and Working Conditions (Eurofound). In all, 43,850 workers from 35 European countries (EU28, Norway, Switzerland, Turkey, Macedonia, Albania, Montenegro, and Kosovo) were interviewed. The sample was randomly selected by strata of the active population. The survey method was face-to-face application at the respondents' household addresses.

Variables

The questionnaire includes questions designed to socio-demographically and occupationally characterise the respondents, along with specific questions about work, including on aspects such as health and safety conditions, pay, work organisation, working hours, conciliation with personal life, vocational training, employment relationships, satisfaction, and others. In the present article, we focus on five variables: employment status; occupation; support from colleagues; support from managers; and quality of workplace relationships.

Employment status

The employment relationship corresponds to the legal bond established between employer and worker. In the case of the questionnaire, this relationship was measured using the five options available to respondents to the question: “What type of contract do you have in your main paid job?”: 1) an unlimited-duration contract; 2) a limited-duration contract; 3) a temporary employment agency contract; 4) an apprenticeship or other training contract; 5) no contract; 6) other.

Occupation

Occupation was measured using the nine major groups in the international ISCO-08 classification: 1. Managers; 2. Professionals; 3. Technicians and associate professionals; 4. Clerical support workers; 5. Services and sales workers; 6. Skilled agricultural, forestry and fishery workers; 7. Craft and related trades workers; 8. Plant and machine operators and assemblers; 9. Elementary occupations; 0. Armed Forces.

Support from colleagues

The variable ‘support from colleagues’ was measured through the request: “For each of the following statements, please select the response which best describes your work situation: Your colleagues help and support you”. Five options were offered in terms of frequency, from 1-always to 5-never. The scale was then inverted in order to make the results easier to interpret: 1-never to 5-always.

Support from managers

The variable ‘support from colleagues’ was measured through the request: “For each of the following statements, please select the response which best describes your work situation: Your manager helps and supports you”. Five options were offered in terms of frequency, from 1-always to 5-never. The scale was then again inverted in order to make the results easier to interpret: 1-never to 5-always.

Quality of workplace relationships

This variable refers to the quality of human interactions in relation to peers in the workplace, and in the present study they were measured by means of the responses to the following question: “To what extent do you agree or disagree with the following statement about your job: I generally get on well with my work colleagues?”. The five choices form a scale from 1-strongly agree to 5-strongly disagree. The scale was then again inverted in order to make the results easier to interpret: 1-strongly disagree to 5-strongly agree.

Sample characteristics

Inasmuch as the sample is a representative one, its characteristics reflect the major trends in the distribution of the active population of Europe (Table 1). The survey sample presents a balanced distribution by gender. The largest segment of the participants had completed education up to the secondary level, followed by those who had a higher education diploma, and by those who had completed their basic education but gone no further.

The most common occupations were services and sales workers (ISCO-5), professionals (ISCO-2), craft and related trades workers (ISCO-7), technicians and associate professionals (ISCO-3), elementary occupations (ISCO-9), and clerical support workers represented (ISCO-4). The least represented groups were plant and machine operators and assemblers (ISCO-8), managers (ISCO-1), skilled agricultural, forestry and fishery workers (ISCO-6), and armed forces workers (ISCO-0).

In terms of employment status, the great majority of the participants had a permanent contract. Around 20% of the respondents in the sample had a non-permanent type of contract.

		N	%
Sex	Male	21603	49.3
	Female	22238	50.7
Education	Early childhood education	235	0.5
	Primary education	1986	4.5
	Lower secondary education	5743	13.1
	Upper secondary education	18193	41.5
	Post-secondary non-tertiary education	3062	7.0
	Short-cycle tertiary education	4122	9.4
	Bachelor's or equivalent	5832	13.3
	Master's or equivalent	4136	9.4
	Doctorate or equivalent	387	0.9
Occupation	Armed forces occupations	159	0.4
	Managers	2727	6.2
	Professionals	7958	18.1
	Technicians and associate professionals	4919	11.2
	Clerical support workers	3868	8.8
	Services and sales workers	9559	21.8
	Skilled agricultural, forestry and fishery workers	2143	4.9
	Craft and related trades workers	5059	11.5
	Plant and machine operators, and assemblers	2935	6.7
	Elementary occupations	4359	9.9
Employment status	Contract of unlimited duration	27514	62.7
	Contract of limited duration	4155	9.5
	A temporary employment agency contract	508	1.2
	An apprenticeship or other training scheme	274	0.6
	No contract	3290	7.5
	Other	373	0.9

Table 1. Sample distribution by sex, education, occupation and employment status (Eurofound, EWCS, 2015)

Procedures

In order to test the above hypotheses, we conducted an analysis at the European level, considering all the EWCS data and using design weight 1, a sampling weight that adjusts to different selection probabilities in order to guarantee an accurate representativeness of the population (Eurofound, n.d.). Given the reduced number of cases in armed forces' occupations and in apprenticeships or other training contract, and considering the heterogeneity of these two categories regarding their skills levels, we decided to remove them from the analysis.

After an initial descriptive analysis of the studied variables, we performed two-way ANOVA in order to test both the primary effects of the variables 'employment status' and 'occupation' on support and quality of workplace relationships, and the interaction effect of the two independent variables. The identification and comparison of mean differences between groups were conducted using Bonferroni adjustment, which controls well for type I errors, although it is considered to be more conservative than other adjustments. Additionally, we carried out a descriptive analysis of the mean scores of each of the dependent variables in the various groups of the two independent variables. We considered a significance level of 0,05. Data was processed using IBM SPSS Statistics, version 28.0.

4. Findings

A first descriptive analysis of mean distributions highlights a tendency for support from colleagues and managers and the quality of personal relationships to decline as employment status gets more precarious (Figure 1).

Contracts of unlimited duration are associated with both the highest level of support from co-workers and managers and the best relationships with colleagues. At the other end of the scale, with less support and worse interpersonal relationships, are the work situations that are the most precarious from the contractual point of view – i.e. the absence of any contract, and undefined contractual situations in general. After permanent workers, workers with fixed-term contracts were the group that enjoyed the best relational working conditions. They were followed by temporary employment agency staff, and finally, people with no contract, and other types of contracts.

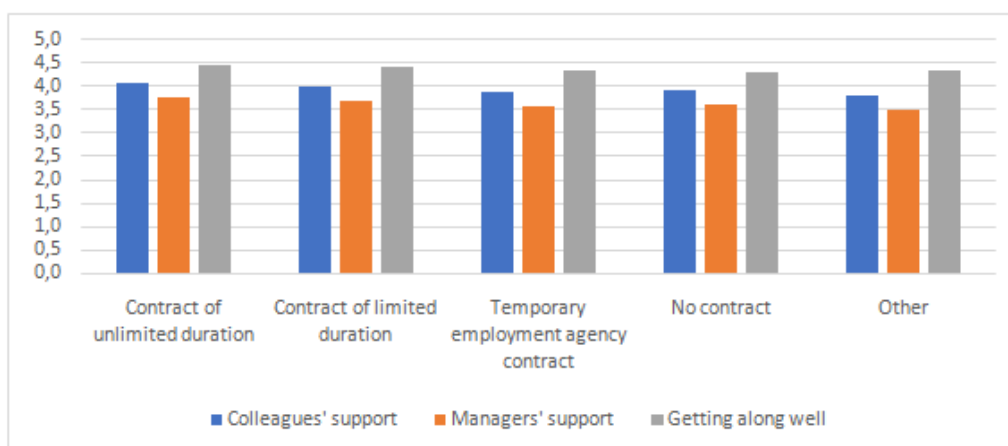


Figure 1. Quality of workplace relationships and social support by employment status. Mean scores. 1-never/strongly disagree; 5-always/strongly agree (Eurofound, EWCS, 2015)

The same pattern was found regarding occupation. The descriptive mean distribution analysis revealed a tendency for both support from co-workers and managers and the quality of personal relationships to decrease as we moved down the list of occupational groups (Figure 2).

The first major groups on the list - managers, professionals and technicians and associate professionals, which are those whose occupations associated with the highest skills level, are those which enjoyed more support and higher-quality personal relationships. The occupations at the bottom of the classification, on the other hand, are those which recorded less support and worse interpersonal relationships, with skilled agricultural workers and elementary occupations presenting the lowest values.

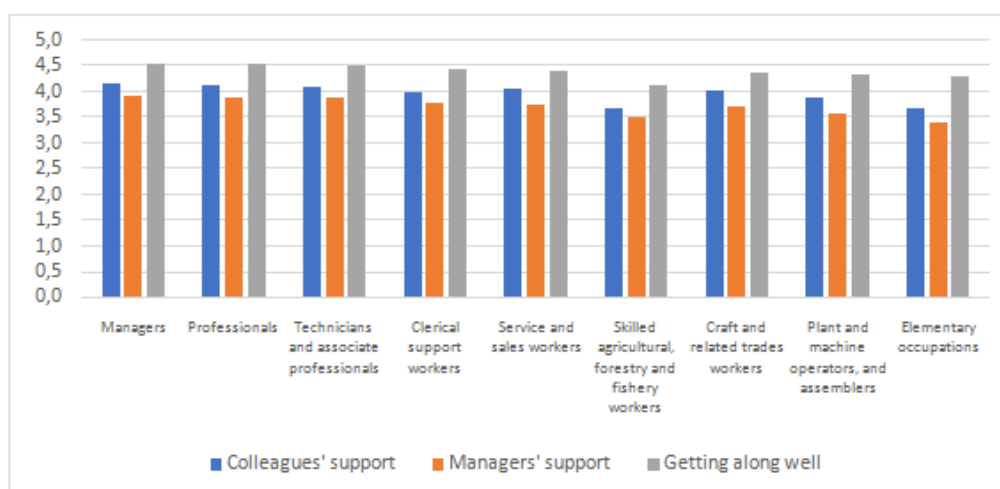


Figure 2. Quality of workplace relationships and social support by occupation Mean scores. 1-never/strongly disagree; 5-always/strongly agree (Eurofound, EWCS, 2015)

The effects of employment status and occupation on colleagues' support

When testing for differences in the mean distribution of colleagues' support, we have found significant main effects of the employment status ($F(4)=5.083$, $p=0.000$), and occupation ($F(8)=22.166$, $p=0.000$) (Table 2).

Regarding the main effect of employment status (Appendix A), significant differences were found between workers with unlimited duration work contracts and those with temporary employment agency contracts, with the former receiving more support from colleagues than the latter ($p<0.05$).

Concerning the main effect of occupation (Appendix B), workers in elementary occupations showed significant lower levels of support from colleagues than all other occupational groups, with the exception of skilled agricultural, forestry and fishery workers ($p<0.05$). The latter, in its turn, showed significant lower levels of support than professionals, technicians and associate professionals, services and sales workers, and craft and related trades workers ($p<0.05$). On the other hand, technicians and associate professionals presented significant higher levels of support from colleagues than all other occupational groups, with the exception of managers and crafted and related trades workers ($p<0.05$).

There was also a significant interaction between employment status and occupation on the support provided for by colleagues ($F(32)=4.156$, $p=0.000$) (Table 2). The descriptive analysis (Table 3) shows that technicians and associate professionals with a temporary employment agency contract reported the highest levels of support from colleagues ($M=4.37$, $SD=0.75$). Managers with a temporary agency contract, on the other hand, presented the lowest scores in this respect ($M=2.96$, $SD=1.51$). The difference between permanent and non-permanent employment situations made itself more clearly felt among elementary occupations, and services and sales workers. In these cases, workers with some type of non-permanent employment status did not receive as much support from colleagues as their counterparts with unlimited-duration contracts.

The comparison of the mean differences (Appendix C) showed that in elementary occupations, significant differences were found between workers with unlimited or limited work contracts, and all other modalities of employment ($p<0.05$).

In other groups, such as craft and related trades workers, skilled agricultural, forestry and fishery workers, and services and sales workers, those without contract show lower levels of support when compared to workers with contracts with unlimited duration ($p<0.05$).

In the higher skilled occupations (ISCO 01-03), non-permanent employment relations do not prevent the reporting of higher levels of support from colleagues, although, in the professionals' group, having other type of contract shows significant lower levels of support than all other employment situations ($p<0.05$).

Source of variation	Type III SS	df	MS	F	p
Corrected model	812.705 ^a	44	18.471	17.473	<.001
Intercept	28898.114	1	28898.114	27337.843	.000
Occupation	187.445	8	23.431	22.166	<.001
Employment	21.493	4	5.373	5.083	<.001
Occupation*Employment	140.590	32	4.393	4.156	<.001
Error	37272.417	35260	1.057		
Total	613631.000	35305			
Corrected total	38085.122	35304			

R Squared = .021 (Adjusted R Squared = .020)

Table 2. Analysis of variance of colleagues' support according to employment status and occupation (Eurofound, EWCS, 2015)

	Permanent	Non-permanent			
	Contract of unlimited duration	Contract of limited duration	Temporary employment agency contract	No contract	Other
Managers	4.18	4.08	2.96	4.15	4.31
Professionals	4.15	4.06	4.22	4.04	3.48
Technicians and associate professionals	4.12	4.22	4.37	4.29	4.26
Clerical support workers	3.99	3.90	3.97	4.13	3.98
Services and sales workers	4.13	4.03	4.01	3.93	3.72
Skilled agricultural forestry and fishery workers	4.01	4.09	3.05	3.73	3.03
Craft and related trades workers	4.10	4.16	4.07	4.09	4.20
Plant and machine operators and assemblers	3.89	3.86	3.86	4.12	3.98
Elementary occupations	3.81	3.75	3.44	3.45	3.40

Table 3. Support from colleagues by employment status and occupation. Mean scores. 1-never/strongly disagree; 5-always/strongly agree (Eurofound, EWCS, 2015)

The effects of employment status and occupation on managers' support

When testing for differences in the mean distribution of managers' support, we have found a significant effect of occupation ($F(8)=20.134$, $p=0.000$), but no significant main effect of employment status (Table 4).

Regarding the effect of occupation (Appendix D), workers in elementary occupations and skilled agricultural, forestry and fishery workers show significant lower levels of support from managers than all other occupational groups ($p<0.05$). Differences were also found between technicians and associate professionals and services and sales workers, with the former presenting higher levels of support than the latter ($p<0.05$).

There was also a significant interaction between employment status and occupation on the support provided for by managers ($F(32)=3.635$, $p=0.000$) (Table 4). The mean distribution (Table 5) shows that managers with a temporary contract reported the highest levels of support from their own managers ($M=4.49$, $SD=1.05$); while at the far end of the scale were the skilled agricultural, forestry and fishery workers with temporary contracts ($M=2.46$, $SD=0.96$). The difference between permanent and non-permanent workers was less patent in the various occupational groups. It was only among skilled agricultural, forestry and fishery workers that the average levels of support enjoyed by people with permanent contracts were higher than those received by their counterparts without such contracts. This difference is also present in elementary occupations, where the average levels of support from managers were significant lower for workers with a temporary employment agency contract, no contract, and other situations, compared to those with unlimited or limited work contracts ($p<0.05$) (Appendix E). Other significant differences were found in the occupational group of technicians and associate professionals (Appendix E), where those with no contract present lower levels of managers' support than those in all other employment situations ($p<0.05$).

Source of variation	Type III SS	df	MS	F	<i>p</i>
Corrected model	1085.735 ^a	44	24.676	17.669	.000
Intercept	24273.304	1	24273.304	17381.266	.000
Occupation	224.937	8	28.117	20.134	.000
Employment	10.114	4	2.529	1.811	.124
Occupation*Employment	162.449	32	5.077	3.635	.000
Error	50206.328	35951	1.397		
Total	556871.000	35996			
Corrected total	51292.063	35995			

Table 4. Analysis of variance of managers' support according to employment status and occupation (Eurofound, EWCS, 2015)

	Permanent	Non-permanent			
	Contract of unlimited duration	Contract of limited duration	Temporary employment agency contract	No contract	Other
Managers	3.94	3.93	4.49	3.69	4.21
Professionals	3.90	3.84	4.13	3.85	3.24
Technicians and associate professionals	3.87	3.82	3.43	4.14	4.29
Clerical support workers	3.78	3.81	3.88	4.01	3.73
Services and sales workers	3.78	3.68	3.60	3.84	3.39
Skilled agricultural, forestry and fishery workers	3.67	3.40	2.46	3.36	2.58
Craft and related trades workers	3.71	3.76	3.85	3.65	3.93
Plant and machine operators, and assemblers	3.55	3.47	3.74	3.73	4.00
Elementary occupations	3.46	3.47	3.04	3.21	3.24

Table 5. Support from managers by employment status and occupation. Mean scores. 1-never/strongly disagree; 5-always/strongly agree (Eurofound, EWCS, 2015)

The effects of employment status and occupation in the quality of interpersonal relationships

When testing for differences in the mean distribution of the quality of interpersonal relationships, we have found significant main effects of occupation ($F(8)=7.827$, $p=0.000$) and employment status ($F(4)=4.164$, $p=0.002$) (Table 6).

As regards the main effect of employment status (Appendix F), significant differences were found between workers with unlimited contracts and workers without any type of contract ($p<0.05$).

Concerning the main effect of occupation (Appendix G), technicians and associate professionals show significant higher levels of managers' support than all other occupational groups, with the exception of managers and professionals ($p<0.05$). Professionals and technicians, in its turn, present significant higher levels of support than service and sales workers and elementary occupations ($p<0.05$).

There was also a significant interaction between employment status and occupation regarding the quality of interpersonal relationships ($F(32)=2.137$, $p=0.000$) (Table 6). The descriptive analysis (Table 7) shows that the occupational group that presents the highest average value for 'getting along well' is that of technicians and associate professionals with a temporary employment agency contract ($M=4.67$, $SD=0.57$), while managers with a temporary contract present the lowest scores ($M=3.51$, $SD=1.05$). The only occupational group in which there is a clear differentiation between permanent and non-permanent workers is services and sales workers. In this group, the quality of interpersonal relationships of permanent workers is higher than those of the non-permanent workers. In other groups, such as elementary occupations; skilled agricultural, forestry and fishery workers; and clerical support workers, workers with a temporary employment agency contract, no contract, or other forms of contract did not get on with their co-workers as well as those who possessed an unlimited-duration contract. However, the difference in relation to the holders of limited-duration contracts is not notable. At the top of the occupational hierarchy, the length of the contractual arrangement did not bring about differences in the quality of personal relationships. In fact, managers, professionals and technicians with some type of non-permanent contracts present higher levels of quality of interpersonal relationships than those with permanent employment, although without major difference.

In elementary occupations, mean differences in the quality of workplace relationships were significant between workers with unlimited or limited duration contracts, and those with a temporary contract or without any type of contract ($p<0.05$), with the former reporting better workplace relationships than the later (Appendix H). In services and sales workers, the same pattern was found. Differences were significant between workers with unlimited or limited duration contracts, and those without any type of contract ($p<0.05$), with the later

presenting worse workplace relationships than the former (Appendix H). For managers, differences were significant between those with unlimited duration contracts and those with temporary employment agency situations ($p < 0.05$), with the former presenting better workplace relationships than the later (Appendix H).

Source of variation	Type III SS	df	MS	F	<i>p</i>
Corrected model	280.259 ^a	44	6.370	11.718	.000
Intercept	36729.246	1	36729.246	67572.046	.000
Occupation	34.035	8	4.254	7.827	.000
Employment	9.055	4	2.264	4.164	.002
Occupation*Employment	37.167	32	1.161	2.137	.000
Error	19479.445	35837	.544		
Total	727300.000	35882			
Corrected total	19759.704	35881			

Table 6. Analysis of variance of managers' support according to employment status and occupation (Eurofound, EWCS, 2015)

	Permanent	Non-permanent			
	Contract of unlimited duration	Contract of limited duration	Temporary employment agency contract	No contract	Other
Managers	4.58	4.41	3.51	4.59	4.65
Professionals	4.54	4.53	4.55	4.42	4.54
Technicians and associate professionals	4.53	4.57	4.67	4.49	4.58
Clerical support workers	4.43	4.45	4.29	4.40	4.31
Services and sales workers	4.44	4.39	4.25	4.28	4.35
Skilled agricultural, forestry and fishery workers	4.43	4.61	4.36	4.30	3.85
Craft and related trades workers	4.41	4.37	4.52	4.30	4.32
Plant and machine operators, and assemblers	4.35	4.35	4.41	4.43	3.91
Elementary occupations	4.34	4.36	4.16	4.20	4.31

Table 7. Quality of workplace relationships by employment status and occupation. Mean scores. 1-never/strongly disagree; 5-always/strongly agree (Eurofound, EWCS, 2015)

In summary, the results confirmed the isolated effect of occupation in the three indicators, of employment status in support from colleagues and quality of relationships, and the combined effects of occupation and employment status in the three indicators.

If we consider the main effects of employment status, permanent employees excel as having better workplace relationships when compared to all other workers, and higher levels of support from colleagues when compared to temporary employment agency workers.

If we consider the main effects of occupation, elementary occupations and skilled agricultural, forestry and fishery workers stand out with lower levels of support from colleagues and managers, than all other occupational groups. Elementary occupations also present worse workplace relationships when compared to the occupational groups at the top of the classification (ISCO 1-3). In fact, managers, professionals, and technicians and associate professionals significantly have better workplace relationships than the other occupations. Concrete differences were also found between services and sales workers, and technicians and associate professionals, regarding managers' support, and between services and sales workers, and managers and professionals, regarding the quality of workplace relationships.

Generally, these results show that the weakest workplace relationships, in which there is less support from co-workers and lower levels of mutual understanding, occurred in work situations where employment relations were more fragile. Similarly, they also demonstrate that both the support from colleagues and managers and the quality of interpersonal relationships are stronger in higher-skilled occupations.

However, the combined effects of employment and occupation bring more complexity to the analysis, showing that the negative effect that non-permanent forms of employment have on workplace relationships is more significant among elementary occupations, skilled agricultural, forestry and fishery workers, and to some degree services and sales workers, than in other occupational groups. At the top of the occupational classification, workplace relationships tend to be impermeable to non-permanent forms of employment. Technicians and associate professionals with temporary employment agency contracts present the highest levels of support from colleagues and quality of workplace relationships. Managers with temporary employment agency contracts present the lowest levels of support from colleagues and quality of workplace relationships, but the highest levels of support from their own managers.

5. Discussion

Our results can be discussed in the light of the labour market segmentation theories, according to which jobs tend to accumulate favourable or unfavourable conditions, forming blocks that are polarised in relation to and distinguished from one another. This segmentation extends to non-material working conditions, namely relational dynamics, which are not just associated with individual, personality and organisational characteristics, but are also dependent on the immediate context in relational terms and as regards general working conditions. In this debate, the literature has been emphasising the specific role played by employment relationships. The precarity and time-limited nature of certain forms of contractual bond are seen as obstacles to the formation of stable relationships, precluding on the one hand the creation of the conditions needed to develop sociabilities in the workplace and between co-workers, and fostering on the other a disinvestment in interpersonal relationships, which it is assumed will not last for long, both by the individuals themselves and by managers and organisations. The groups which are institutionally less integrated into the labour market, due above all to the fragility of their employment status, but also to a range of variables that influence job security, are also those which are less socially integrated into work contexts. The results of our analysis are thus in keeping with those of earlier research, such as the work of Feather and Rauter (2004), Probst (2009), Hodson et al. (2006), Roscigno et al., 2009, and Cruz et al. (2014), particularly regarding the support from colleagues and the quality of workplace relationships, updating, however, the existing evidence with new quantitative data on workplace relationships in Europe.

Another line of thought for debate could be to look at the intrinsic characteristics of each occupational group and the specific characteristics of the ways in which they do their work. On the one hand, the nature of the tasks involved may imply different types of collaboration and interpersonal relationships; on the other, the qualification-based differentiation of occupations may also presuppose inequalities in the capacity to obtain and mobilise the so-called ‘transversal competencies’ – namely social skills – which include the ability to work effectively in teams, adapt to different contexts, resolve conflicts, communicate and self-motivate, among many others, and which can be key elements in the configuration of the relational dimension of work. The results of our analysis thus corroborate evidence presented in earlier studies, such as that by Chun-Te (2010), though extending the debate to working contexts that are not country or organization specific.

As in the case of the legal employment bond, what the data do clearly show is that the occupational inequalities in the labour market go beyond the material dimensions of work, such as physical conditions and pay, insinuating themselves into the non-material dimensions of the working life as well.

Labour market segmentation theories allow us to discuss the combined effect that employment status and occupation have on the relational dimension of work. We know that albeit employment instability is tending to be a generalised phenomenon, it affects occupations that are unqualified and at the base of the occupational classification in particular ways. Our data confirm that this intersection exists. The effect of the contractual bond

in workplace relationships is particularly felt in elementary occupations and skilled agricultural, forestry and fishery workers. On the other hand, the nature of the work developed by the higher-skilled occupations (ISCO 1-3) protect these workers from the negative effects of precariousness in workplace relationships. This finding is particularly innovative because it allows the dialogue between social capital literature, labour market segmentation theories, and workplace relationships and friendship literature. In addition, it challenges labour market scholars not to dissociate objective working conditions from the relational dimensions of work when studying inequalities and segmentation.

Our results do present some limitations, above all because they do not allow a more robust statistical analysis. The indicators for support and the quality of relationships at work also need more robust operationalisations that possess greater empirical validity and cover longer periods of time. What is more, other independent variables can and should be considered in addition to the major occupational group, including the perceptions of job insecurity beyond the contractual bond, profession and specific job's characteristics. We have developed an extensive analysis that could allow a discussion of workplace variations in Europe, but the country of work should also be considered in future analysis to control for institutional and policy specificities. Having said that, our data do underline the role which employment status and occupation play in ensuring that people enjoy good workplace relationships. They also open the way to the development of more structural approaches to the study of the relational dimension of work, which should be extensive and ideally cover a substantial period of time. Our analysis does more than just study the impact of workplace relationships on organisational performance and individual well-being; it also contributes to an understanding of the effects that objective working conditions can have on both the capacity to establish those relationships and their quality, contradicting a certain endogeneity that currently exists within this topic (Adam & Blieszner, 1994) by considering different occupational groups and workers with a range of legal employment relationships.

The results provide an integrative framework for the understanding of workplace relationships to those practitioners who aim to promote organizational commitment and performance through the improvement of working conditions, and give a new analytical angle to both academics and policy makers interested in labour market structures and workplace dynamics.

6. Conclusion

In the present article we have been able to confirm that the relational dimension of work, measured using indicators for support from colleagues, support from managers and the quality of workplace relationships, is sensitive to employment status and occupation. We conclude that as the precariousness of the employment relationship increases, both support from colleagues and the quality of relationships decrease. Similarly, support from colleagues and managers and the quality of relationships is greater in occupations at the top of the occupational classification. Employment status and occupation combined significantly affect support from colleagues, managers and the quality of relationships, with elementary occupations and skilled agricultural, forestry and fishery workers, being more exposed to the effects of the employment status.

We argue that these results should be interpreted in the light of the labour market segmentation theories, and propose an integrated vision of the dynamics that are established in work contexts, considering their structural and institutional ramifications. We propose that it is not only the effects that workplace relationships have on organisations and individuals that should be analysed, but also the extent to which structural conditioning factors, such as the legal employment bond or the person's occupation, can determine the nature and quality of the support that is received and the relationships that are established.

The complexity of the analysis of the dynamics involved in support and friendship at work, and their importance to individual and social well-being, means that our initial hypotheses need to be deepened, and that they will be more or less viable depending on the extent to which it is possible to overcome the analytical and empirical limitations which the study of this topic still faces, namely in terms of the availability and nature of the data used, and the lack of more robust indicators.

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References

- Adams, R.G., & Blieszner, R. (1994). An integrative conceptual framework for friendship research. *Journal of Social and Personal Relationships*, 11, 164-184. <https://doi.org/10.1177/0265407594112001>
- Ahmad, Z.A., & Yekta, Z.A. (2010). Relationship between perceived organizational support, leadership behavior, and job satisfaction: An empirical study in Iran. *Intangible Capital*, 6(2), 162-184. <https://doi.org/10.3926/ic.2010.v6n2.p162-184>
- Bader, H.A.M., Hashim, I.H.M., & Zaharim, N.M. (2013). Workplace friendships among bank employees in Eastern Libya. *Digest of Middle East Studies*, 22(1), 94-116. <https://doi.org/10.1111/dome.12020>
- Bandiera, O., Barankay, I., & Rasul, I. (2008). Social capital in the workplace: evidence on its formation and consequences. *Labour Economics*, 15(4), 724-748. <https://doi.org/10.1016/j.labeco.2007.07.006>
- Barroso, M. (2013). *Qualidade de vida e de trabalho em contextos organizacionais no norte e no sul da Europa*. (Doctoral thesis, Iscte-University Institute of Lisbon, Lisbon, Portugal). Available at: <https://repositorio.iscte-iul.pt/handle/10071/7444>
- Berger, S., & Piore, M.J. (1980). *Dualism and discontinuity in industrial societies*. Cambridge: Cambridge University Press.
- Brunetto, Y., Xerry, M., Schriberg, A., Farr-Wharton, R., Schacklock, K., Newman, S., & et al. (2013). The impact of workplace relationships on engagement, well-being, commitment and turnover for nurses in Australia and the USA. *Journal of Advanced Nursing*, 69(12), 2786-2799. <https://doi.org/10.1111/jan.12165>
- Chan, T.W., & Goldthorpe, J.H. (2004). Is there a status order in contemporary British society? Evidence from the Occupational Structure of Friendship. *European Sociological Review*, 20(5), 383-401. <https://doi.org/10.1093/esr/jch033>
- Chen, C-Y, Mao, H-Y, Hsieh, A-T, Liu, L-L, & Yen, C-H. (2013). The relationship among interactive justice, leader-member exchange, and workplace friendship. *The Social Science Journal*, 50, 89-95. <https://doi.org/10.1016/j.soscij.2012.09.009>
- Chun-Te, L. (2010). Relationship between job position, job attributes and workplace friendship: Taiwan and China. *Journal of Technology Management in China*, 5(1), 55-68. <https://doi.org/10.1108/17468771011032796>
- Colbert, A.E., Bono, J.E., & Purvanova, R.K. (2016). Flourishing via workplace relationships: Moving beyond instrumental support. *Academy of Management Journal*, 59(4), 1199-1223. <https://doi.org/10.5465/amj.2014.0506>
- Cruz, F.G.F, López-Gusman, T., & Cañizares, S.M.S. (2014). Satisfacción laboral y compromiso organizativo en los recursos humanos de la hostelería de Córdoba (España): Influencia de la tipología contractual y la jornada de trabajo. *Intangible Capital*, 10(1), 189-221. <https://doi.org/10.3926/ic.489>
- De Graff, N.D., & Flap, H.D. (1988). With a little help from my friends. *Social Forces*, 67, 452-472. <https://doi.org/10.2307/2579190>
- Doeringer, P.B., & Piore, M.J. (1971). *Internal Labour Markets and Manpower Analysis*. New York: D.C. Heath and Company.
- Ducharme, L.J., & Martin, J.K. (2000). Unrewarding work, co-worker support and job satisfaction. A test of the buffering hypothesis. *Work and Occupations*, 27(2), 223-243. <https://doi.org/10.1177/0730888400027002005>

- Eurofound (2017). *Sixth European Working Conditions Survey – Overview report (2017 update)*. Luxembourg: Publications Office of the European Union.
- Eurofound (n.d.). *European Working Conditions Survey. Technical report*. Retrieved from: https://www.eurofound.europa.eu/sites/default/files/ef_survey/field_ef_documents/6th_ewcs_-_technical_report.pdf
- EWCS. Eurofound (2015). *Sixth European Working Conditions Survey. Database*. Retrieved from: <https://beta.ukdataservice.ac.uk/datacatalogue/series/series?id=200014>
- Feather, N., & Rauter, K. (2004). Organizational citizenship behaviours in relation to job status, job insecurity, organizational commitment and identification, job satisfaction and work values. *Journal of Occupational and Organizational psychology*, 77, 81-94. <https://doi.org/10.1348/096317904322915928>
- Fishman, R.M. (2009). On the costs of conceptualizing social ties as social capital. In: Bartkus V.O. & Davis J.H., *Social Capital. Reaching out, reaching in*. Cheltenham: Edward Elgar.
- Fritz, J.H. (2014). Researching workplace relationships: What can we learn from qualitative organizational studies?. *Journal of Social and Personal Relationships*, 31, 460-466. <https://doi.org/10.1177/0265407514522888>
- Gordon, D.M., Edwards, R., & Reich, M. (1982). *Segmented work, divided workers: the historical transformation of labor in the United States*. Cambridge: Cambridge University Press.
- Grey, C., & Sturdy, A. (2007). Friendship and organizational analysis. Toward a research agenda. *Journal of Management Inquiry*, 16(2), 157-172. <https://doi.org/10.1177/1056492606295500>
- Hayton, J., Carnabuci, G., & Eisenberger, R. (2012). With a little help from my colleagues: A social embeddedness approach to perceived organizational support. *Journal of Organizational Behaviour*, 33, 235-249. <https://doi.org/10.1002/job.755>
- Hodson, R. (1997). Group relations at work. Solidarity, conflict and relations with management. *Work and Occupations*, 24(4), 426-452. <https://doi.org/10.1177/0730888497024004003>
- Hodson, R., Roscigno, V.J., & Lopez, S.H. (2006). Chaos and the abuse of power. Workplace bullying in organizational and interactional context. *Work and Occupations*, 33(4), 382-416. <https://doi.org/10.1177/0730888406292885>
- Hulbert, J.S. (1991). Social networks, social circles and job satisfaction. *Work and Occupations*, 18(4), 415-430. <https://doi.org/10.1177/0730888491018004003>
- Kalleberg, A. (2011). *Good jobs, bad jobs. The rise of polarized and precarious employment systems in the United States, 1970s to 2000s*. New York: Russel Sage Foundation.
- Lam, M.W., & Lau, D.C. (2012). Feeling lonely at work: investigating the consequences of unsatisfactory workplace relationships. *The International Journal of Human Resource Management*, 23(20), 4265-4282. <https://doi.org/10.1080/09585192.2012.665070>
- Lewis, S., Doorne-Huiskes, A., Redai, D., & Barroso, M. (2011). Healthy Organizations. In Bäck-Wiklund, M., van der Lippe, T., den Dulk, L. & Doorne-Huiskes, A. *Quality of life and work in Europe. Theory, practice and policy* (165-185). London: Palgrave Macmillan. https://doi.org/10.1057/9780230299443_10
- Lin, N. (2000). Inequality in social capital. *Contemporary Sociology*, 29(6), 785-795. <https://doi.org/10.2307/2654086>
- Lin, N., Ensel, W.M., & Vaughan, J.C. (1981). Social resources and the strength of ties: structural factors in occupational status attainment. *Social Networks*, 8, 365-385. <https://doi.org/10.2307/2095260>
- Lively, K.J. (2000). Reciprocal emotion management. Working together to maintain stratification in private law firms. *Work and Occupations*, 27(1), 32-63. <https://doi.org/10.1177/0730888400027001003>
- Mao, H-Y., & Hsieh, A-T. (2017). Friendship at work and error disclosure. *Business Research Quarterly*, 20, 213-225. <https://doi.org/10.1016/j.brq.2017.07.002>
- Morin, E. (2001). Os sentidos do trabalho. *RAE, Revista de Administração de Empresas*, 41(3), 8-19. <https://doi.org/10.12660/gvexec.v1n1.2002.34764>

- Morrison, R., & Nolan, T. (2009). I get by with a little help from my friends...at work. *Kotuitui: New Zealand Journal of Social Sciences Online*, 4(1), 41-54. <https://doi.org/10.1080/1177083X.2009.9522443>
- Morrison, R.L., & Cooper-Thomas, H.D. (2017). Friendship among Coworkers. In M. Hojjat & A. Moyer (Eds.). *The Psychology of Friendship*. New York: Oxford University Press. <https://doi.org/10.1093/acprof:oso/9780190222024.003.0008>
- Moulin, T.C. (2020). Mental Health in Academia: The Role of Workplace Relationships. *Frontiers in Psychology*, 11, 562457. <https://doi.org/10.3389/fpsyg.2020.562457>
- Olson-Buchanan, J., & Boswell, W.R. (2006). Blurring boundaries: Correlates of integration and segmentation between work and nonwork. *Journal of Vocational Behaviour*, 68, 432-445. <https://doi.org/10.1016/j.jvb.2005.10.006>
- Pedersen, V.B., & Lewis, S. (2012). Flexible friends? Flexible working time arrangements, blurred work-life boundaries and friendship. *Work, Employment and Society*, 26(3), 464-480. <https://doi.org/10.1177/0950017012438571>
- Potgieter, I.L., Coetzee, M., & Ferreira, N. (2018). The role of career concerns and workplace friendship in the job embeddedness–retention practices satisfaction link. *SA Journal of Industrial Psychology/SA Tydskrif vir Bedryfsielkunde*, 44(0), a1519. <https://doi.org/10.4102/sajip.v44i0.1519>
- Probst, T.M. (2009). Job insecurity, unemployment and organizational well-being. Oxymoron or possibility?. In: Cartwright S & Cooper CL, *The Oxford Handbook of Organizational Well-being*. Oxford: Oxford University Press. <https://doi.org/10.1093/oxfordhb/9780199211913.003.0016>
- Riordan, C.M., & Griffeth, R.W. (1995). The opportunity for friendship in the workplace: An underexplored construct. *Journal of Business and Psychology*, 10(2), 141-154. <https://doi.org/10.1007/BF02249575>
- Roscigno, V., Hodson, R., & Lopez, S. (2009). Workplace incivilities: The role of interest conflicts, social closure and organizational chaos. *Work, Employment and Society*, 23, 747-773. <https://doi.org/10.1177/0950017009344875>
- Rumens, R. (2017). Researching workplace friendships: Drawing insights from the sociology of friendship. *Journal of Social and Personal Relationships*, 34(8), 1149-1167. <https://doi.org/10.1177/0265407516670276>
- Schaufeli, W.B., & Bakker, A.B. (2004). Job demands, job resources, and their relationship with burnout and engagement: A multi-sample study. *Journal of Organizational Behavior*, 25, 293-315. <https://doi.org/10.1002/job.248>
- Sias, P.M., & Cahill, D.J. (1998). From coworkers to friends: The development of peer friendships in the workplace. *Western Journal of Communication*, 62, 273-299. <https://doi.org/10.1080/10570319809374611>
- Sias, P.M., Health, R.G., Perry, T., Silva, D., & Fix, B. (2004). Narratives of workplace friendship deterioration. *Journal of Social and Personal Relationships*, 21(3), 321-340. <https://doi.org/10.1177/0265407504042835>
- Sias, P.M., Pedersen, H., Gallagher, E.B., & Kopaneva, I. (2012). Workplace friendship in the electronically connected organization. *Human Communication Research*, 38, 253-279. <https://doi.org/10.1111/j.1468-2958.2012.01428.x>
- Sias, P.M., & Shin, Y. (2019). Workplace Relationships. In: Nicotera, A.M. (ed.), *Origins and Traditions of Organizational Communication. A comprehensive introduction to the field*. New York: Routledge. <https://doi.org/10.4324/9780203703625-13>
- Sloan, M.M. (2004). The effects of occupational characteristics in the experience and expression of anger in the workplace. *Work and Occupations*, 31(1), 38-72. <https://doi.org/10.1177/0730888403260734>
- Tran, K.T., Nguyen, P.V., Dang, T.T.U., & Ton, T.N.B. (2018). The Impacts of the High-Quality Workplace Relationships on Job Performance: A Perspective on Staff Nurses in Vietnam. *Behavioral Sciences*, 8, 109. <https://doi.org/10.3390/bs8120109>

Trinchero, E., Farr-Wharton, B., & Bruneto, Y. (2019). Workplace Relationships, Psychological Capital, Accreditation and Safety Culture: A new Framework of Analysis within Healthcare Organizations. *Public Organizations Review*, 19, 139-152. <https://doi.org/10.1007/s11115-017-0390-6>

Yavuzkurt, T., & Kiral, E. (2020). The Relationship Between Workplace Friendship and Job Satisfaction in Educational Organizations. *International Journal of Progressive Education*, 16 (5), 404-425. <https://doi.org/10.29329/ijpe.2020.277.25>

APPENDICES

Appendix A. Main effect of employment status on colleagues' support

Estimated marginal means

Dependent variable: colleagues support

Employment status	M	SD	95% Confidence Interval	
			Lower bound	Upper bound
Unlimited	4.034	.010	4.014	4.054
Limited	3.994	.023	3.949	4.039
Temporary	3.751	.086	3.582	3.919
No contract	3.979	.026	3.928	4.031
Other	3.856	.073	3.712	3.999

Pairwise comparisons

Dependent variable: colleagues support

(I) Employment status	(J) Employment status	Mean difference (I-J)	SD	p	95% Confidence Interval Difference	
					Lowerbound	Upperbound
Unlimited	Limited	.040	.025	1.000	-.031	.111
	Temporary	.283*	.086	.011	.041	.526
	No contract	.055	.028	.516	-.024	.133
	Other	.179	.074	.158	-.029	.386
Limited	Unlimited	-.040	.025	1.000	-.111	.031
	Temporary	.243	.089	.062	-.006	.493
	No contract	.015	.035	1.000	-.083	.113
	Other	.138	.077	.715	-.077	.354
Temporary	Unlimited	-.283*	.086	.011	-.526	-.041
	Limited	-.243	.089	.062	-.493	.006
	No contract	-.229	.090	.109	-.481	.023
	Other	-.105	.113	1.000	-.422	.212
No contract	Unlimited	-.055	.028	.516	-.133	.024
	Limited	-.015	.035	1.000	-.113	.083
	Temporary	.229	.090	.109	-.023	.481
	Other	.124	.078	1.000	-.095	.342
Other	Unlimited	-.179	.074	.158	-.386	.029
	Limited	-.138	.077	.715	-.354	.077
	Temporary	.105	.113	1.000	-.212	.422
	No contract	-.124	.078	1.000	-.342	.095

Appendix B. Main effect of occupation (ISCO08) on colleagues' support

Estimated marginal means

Dependent variable: colleagues support

ISCO08	M	SD	95% Confidence Interval	
			Lowerbound	Upperbound
1.00	3.961	.118	3.729	4.193
2.00	3.991	.045	3.902	4.080
3.00	4.241	.057	4.130	4.353
4.00	3.979	.049	3.882	4.076
5.00	3.976	.031	3.916	4.037
6.00	3.583	.118	3.351	3.814
7.00	4.098	.049	4.002	4.194
8.00	3.932	.073	3.789	4.075
9.00	3.544	.035	3.476	3.612

Pairwise comparisons

Dependent variable: colleagues support

(I) ISCO08	(J) ISCO08	Mean difference (I-J)	SD	p	95% Confidence Interval Difference	
					Lowerbound	Upperbound
1.00	2.00	-.030	.127	1.000	-.435	.376
	3.00	-.280	.131	1.000	-.700	.140
	4.00	-.018	.128	1.000	-.428	.392
	5.00	-.015	.122	1.000	-.406	.376
	6.00	.378	.167	.852	-.156	.913
	7.00	-.137	.128	1.000	-.547	.273
	8.00	.029	.139	1.000	-.415	.474
	9.00	.417*	.123	.026	.022	.811
2.00	1.00	.030	.127	1.000	-.376	.435
	3.00	-.250*	.073	.021	-.483	-.018
	4.00	.012	.067	1.000	-.203	.226
	5.00	.014	.055	1.000	-.161	.190
	6.00	.408*	.127	.045	.003	.813
	7.00	-.107	.067	1.000	-.321	.106
	8.00	.059	.086	1.000	-.216	.333
	9.00	.446*	.057	.000	.264	.629
3.00	1.00	.280	.131	1.000	-.140	.700
	2.00	.250*	.073	.021	.018	.483
	4.00	.262*	.075	.018	.021	.503
	5.00	.265*	.065	.002	.058	.472
	6.00	.659*	.131	.000	.239	1.078
	7.00	.143	.075	1.000	-.097	.383
	8.00	.309*	.092	.030	.014	.605
	9.00	.697*	.067	.000	.484	.910

4.00	1.00	.018	.128	1.000	-.392	.428
	2.00	-.012	.067	1.000	-.226	.203
	3.00	-.262*	.075	.018	-.503	-.021
	5.00	.003	.058	1.000	-.183	.189
	6.00	.396	.128	.071	-.013	.806
	7.00	-.119	.070	1.000	-.342	.103
	8.00	.047	.088	1.000	-.234	.328
	9.00	.435*	.060	.000	.242	.627
5.00	1.00	.015	.122	1.000	-.376	.406
	2.00	-.014	.055	1.000	-.190	.161
	3.00	-.265*	.065	.002	-.472	-.058
	4.00	-.003	.058	1.000	-.189	.183
	6.00	.394*	.122	.046	.003	.784
	7.00	-.122	.058	1.000	-.307	.063
	8.00	.044	.079	1.000	-.209	.297
	9.00	.432*	.046	.000	.283	.580
6.00	1.00	-.378	.167	.852	-.913	.156
	2.00	-.408*	.127	.045	-.813	-.003
	3.00	-.659*	.131	.000	-1.078	-.239
	4.00	-.396	.128	.071	-.806	.013
	5.00	-.394*	.122	.046	-.784	-.003
	7.00	-.516*	.128	.002	-.925	-.107
	8.00	-.349	.139	.427	-.793	.095
	9.00	.038	.123	1.000	-.356	.432
7.00	1.00	.137	.128	1.000	-.273	.547
	2.00	.107	.067	1.000	-.106	.321
	3.00	-.143	.075	1.000	-.383	.097
	4.00	.119	.070	1.000	-.103	.342
	5.00	.122	.058	1.000	-.063	.307
	6.00	.516*	.128	.002	.107	.925
	8.00	.166	.088	1.000	-.115	.447
	9.00	.554*	.060	.000	.362	.746
8.00	1.00	-.029	.139	1.000	-.474	.415
	2.00	-.059	.086	1.000	-.333	.216
	3.00	-.309*	.092	.030	-.605	-.014
	4.00	-.047	.088	1.000	-.328	.234
	5.00	-.044	.079	1.000	-.297	.209
	6.00	.349	.139	.427	-.095	.793
	7.00	-.166	.088	1.000	-.447	.115
	9.00	.387*	.081	.000	.129	.646
9.00	1.00	-.417*	.123	.026	-.811	-.022
	2.00	-.446*	.057	.000	-.629	-.264
	3.00	-.697*	.067	.000	-.910	-.484

	4.00	-.435*	.060	.000	-.627	-.242
	5.00	-.432*	.046	.000	-.580	-.283
	6.00	-.038	.123	1.000	-.432	.356
	7.00	-.554*	.060	.000	-.746	-.362
	8.00	-.387*	.081	.000	-.646	-.129

Appendix C. Interaction effects of employment status and occupation on colleagues' support

Estimated marginal means

Dependent variable: colleagues support

Employment status	ISCO08	M	SD	95% Confidence Interval	
				Lowerbound	Upperbound
Unlimited	1.00	4.177	.026	4.126	4.228
	2.00	4.138	.013	4.112	4.164
	3.00	4.111	.017	4.078	4.143
	4.00	3.972	.018	3.936	4.009
	5.00	4.121	.014	4.094	4.148
	6.00	4.000	.073	3.856	4.144
	7.00	4.103	.018	4.067	4.139
	8.00	3.881	.022	3.839	3.924
	9.00	3.803	.022	3.759	3.847
Limited	1.00	4.061	.103	3.858	4.263
	2.00	4.057	.037	3.985	4.129
	3.00	4.216	.050	4.118	4.314
	4.00	3.901	.052	3.799	4.004
	5.00	4.034	.032	3.972	4.096
	6.00	4.000	.131	3.744	4.256
	7.00	4.116	.049	4.020	4.212
	8.00	3.848	.061	3.728	3.968
	9.00	3.714	.043	3.630	3.799
Temporary	1.00	3.000	.514	1.992	4.008
	2.00	4.184	.147	3.896	4.472
	3.00	4.371	.174	4.031	4.712
	4.00	3.980	.144	3.698	4.263
	5.00	4.034	.094	3.849	4.218
	6.00	3.000	.460	2.099	3.901
	7.00	4.029	.125	3.785	4.274
	8.00	3.800	.128	3.550	4.050
	9.00	3.358	.094	3.174	3.542
No contract	1.00	4.123	.128	3.873	4.373
	2.00	4.040	.062	3.919	4.161
	3.00	4.309	.075	4.162	4.455
	4.00	4.124	.088	3.952	4.296
	5.00	3.939	.035	3.870	4.008
	6.00	3.613	.098	3.421	3.804
	7.00	4.094	.053	3.990	4.199
	8.00	4.130	.081	3.972	4.289
	9.00	3.443	.043	3.358	3.528
Other	1.00	4.444	.242	3.969	4.919
	2.00	3.535	.157	3.228	3.842

	3.00	4.200	.206	3.797	4.603
	4.00	3.917	.171	3.581	4.253
	5.00	3.753	.112	3.534	3.972
	6.00	3.300	.325	2.663	3.937
	7.00	4.148	.198	3.760	4.536
	8.00	4.000	.325	3.363	4.637
	9.00	3.403	.131	3.147	3.659

Pairwise comparisons

Dependent variable: colleagues support

ISCO08	(I) Employment status	(J) Employment status	Meandifference (I-J)	SD	p	95% Confidence Interval Difference	
						Lowerbound	Upperbound
1.00	Unlimited	Limited	.116	.107	1.000	-.183	.415
		Temporary	1.177	.515	.222	-.268	2.622
		No contract	.054	.130	1.000	-.311	.419
		Other	-.267	.244	1.000	-.952	.417
	Limited	Unlimited	-.116	.107	1.000	-.415	.183
		Temporary	1.061	.524	.431	-.411	2.533
		No contract	-.062	.164	1.000	-.523	.398
		Other	-.384	.263	1.000	-1.123	.356
	Temporary	Unlimited	-1.177	.515	.222	-2.622	.268
		Limited	-1.061	.524	.431	-2.533	.411
		No contract	-1.123	.530	.340	-2.610	.364
		Other	-1.444	.568	.110	-3.040	.151
	No contract	Unlimited	-.054	.130	1.000	-.419	.311
		Limited	.062	.164	1.000	-.398	.523
		Temporary	1.123	.530	.340	-.364	2.610
		Other	-.321	.274	1.000	-1.090	.447
Other	Limited	.267	.244	1.000	-.417	.952	
	Unlimited	.384	.263	1.000	-.356	1.123	
	Temporary	1.444	.568	.110	-.151	3.040	
	No contract	.321	.274	1.000	-.447	1.090	
2.00	Unlimited	Limited	.080	.039	.396	-.029	.190
		Temporary	-.046	.147	1.000	-.460	.368
		No contract	.098	.063	1.000	-.079	.276
		Other	.603*	.157	.001	.161	1.045
	Limited	Unlimited	-.080	.039	.396	-.190	.029
		Temporary	-.126	.151	1.000	-.551	.299
		No contract	.018	.072	1.000	-.184	.220
		Other	.523*	.161	.012	.071	.975
	Temporary	Unlimited	.046	.147	1.000	-.368	.460
		Limited	.126	.151	1.000	-.299	.551
		No contract	.144	.159	1.000	-.303	.591
		Other	.649*	.215	.025	.046	1.252
	No contract	Unlimited	-.098	.063	1.000	-.276	.079
		Limited	-.018	.072	1.000	-.220	.184
		Temporary	-.144	.159	1.000	-.591	.303
		Other	.505*	.169	.027	.032	.978
Other	unlimited	-.603*	.157	.001	-1.045	-.161	
	Limited	-.523*	.161	.012	-.975	-.071	
	Temporary	-.649*	.215	.025	-1.252	-.046	
	No contract	-.505*	.169	.027	-.978	-.032	

3.00	Unlimited	Limited	-.105	.053	.462	-.253	.043
		Temporary	-.261	.175	1.000	-.751	.229
		No contract	-.198	.077	.099	-.414	.018
		Other	-.089	.206	1.000	-.669	.490
	Limited	Unlimited	.105	.053	.462	-.043	.253
		Temporary	-.156	.181	1.000	-.663	.352
		No contract	-.093	.090	1.000	-.346	.160
		Other	.016	.212	1.000	-.578	.610
	Temporary	Unlimited	.261	.175	1.000	-.229	.751
		Limited	.156	.181	1.000	-.352	.663
		No contract	.063	.189	1.000	-.468	.594
		Other	.171	.269	1.000	-.584	.927
	No contract	Unlimited	.198	.077	.099	-.018	.414
		Limited	.093	.090	1.000	-.160	.346
		Temporary	-.063	.189	1.000	-.594	.468
		Other	.109	.219	1.000	-.506	.723
	Other	Unlimited	.089	.206	1.000	-.490	.669
		Limited	-.016	.212	1.000	-.610	.578
		Temporary	-.171	.269	1.000	-.927	.584
		No contract	-.109	.219	1.000	-.723	.506
4.00	Unlimited	Limited	.071	.056	1.000	-.085	.227
		Temporary	-.008	.145	1.000	-.415	.400
		No contract	-.152	.090	.912	-.404	.100
		Other	.056	.172	1.000	-.428	.540
	Limited	Unlimited	-.071	.056	1.000	-.227	.085
		Temporary	-.079	.153	1.000	-.509	.351
		No contract	-.223	.102	.294	-.510	.064
		Other	-.015	.179	1.000	-.518	.488
	Temporary	Unlimited	.008	.145	1.000	-.400	.415
		Limited	.079	.153	1.000	-.351	.509
		No contract	-.144	.169	1.000	-.617	.330
		Other	.064	.224	1.000	-.565	.692
	No contract	Unlimited	.152	.090	.912	-.100	.404
		Limited	.223	.102	.294	-.064	.510
		Temporary	.144	.169	1.000	-.330	.617
		Other	.207	.193	1.000	-.333	.748
	Other	Unlimited	-.056	.172	1.000	-.540	.428
		Limited	.015	.179	1.000	-.488	.518
		Temporary	-.064	.224	1.000	-.692	.565
		No contract	-.207	.193	1.000	-.748	.333
5.00	Unlimited	Limited	.087	.035	.118	-.010	.184
		Temporary	.088	.095	1.000	-.180	.355
		No contract	.182*	.038	.000	.076	.288
		Other	.368*	.112	.010	.053	.684
	Limited	Unlimited	-.087	.035	.118	-.184	.010
		Temporary	.001	.099	1.000	-.279	.280
		No contract	.095	.047	.445	-.038	.228
		Other	.281	.116	.153	-.044	.607
	Temporary	Unlimited	-.088	.095	1.000	-.355	.180
		Limited	-.001	.099	1.000	-.280	.279
		No contract	.095	.101	1.000	-.188	.377
		Other	.281	.146	.546	-.129	.691
	No contract	Unlimited	-.182*	.038	.000	-.288	-.076
		Limited	-.095	.047	.445	-.228	.038
		Temporary	-.095	.101	1.000	-.377	.188

		Other	.186	.117	1.000	-.142	.514
	Other	Unlimited	-.368*	.112	.010	-.684	-.053
		Limited	-.281	.116	.153	-.607	.044
		Temporary	-.281	.146	.546	-.691	.129
		No contract	-.186	.117	1.000	-.514	.142
6.00	Unlimited	Limited	-3.331E-16	.150	1.000	-.421	.421
		Temporary	1.000	.466	.317	-.307	2.307
		No contract	.387*	.122	.015	.045	.730
		Other	.700	.333	.357	-.236	1.636
	Limited	Unlimited	3.331E-16	.150	1.000	-.421	.421
		Temporary	1.000	.478	.364	-.342	2.342
		No contract	.387	.163	.175	-.070	.845
		Other	.700	.350	.457	-.284	1.684
	Temporary	Unlimited	-1.000	.466	.317	-2.307	.307
		Limited	-1.000	.478	.364	-2.342	.342
		No contract	-.613	.470	1.000	-1.932	.707
		Other	-.300	.563	1.000	-1.881	1.281
	No contract	Unlimited	-.387*	.122	.015	-.730	-.045
		Limited	-.387	.163	.175	-.845	.070
		Temporary	.613	.470	1.000	-.707	1.932
		Other	.313	.339	1.000	-.640	1.266
	Other	Unlimited	-.700	.333	.357	-1.636	.236
		Limited	-.700	.350	.457	-1.684	.284
		Temporary	.300	.563	1.000	-1.281	1.881
		No contract	-.313	.339	1.000	-1.266	.640
7.00	Unlimited	Limited	-.012	.052	1.000	-.159	.135
		Temporary	.074	.126	1.000	-.280	.428
		No contract	.009	.056	1.000	-.149	.168
		Other	-.045	.199	1.000	-.603	.513
	Limited	Unlimited	.012	.052	1.000	-.135	.159
		Temporary	.086	.134	1.000	-.290	.462
		No contract	.021	.072	1.000	-.182	.225
		Other	-.033	.204	1.000	-.605	.540
	Temporary	Unlimited	-.074	.126	1.000	-.428	.280
		Limited	-.086	.134	1.000	-.462	.290
		No contract	-.065	.136	1.000	-.446	.316
		Other	-.119	.234	1.000	-.775	.538
	No contract	Unlimited	-.009	.056	1.000	-.168	.149
		Limited	-.021	.072	1.000	-.225	.182
		Temporary	.065	.136	1.000	-.316	.446
		Other	-.054	.205	1.000	-.629	.521
	Other	Unlimited	.045	.199	1.000	-.513	.603
		Limited	.033	.204	1.000	-.540	.605
		Temporary	.119	.234	1.000	-.538	.775
		No contract	.054	.205	1.000	-.521	.629
8.00	Unlimited	Limited	.034	.065	1.000	-.148	.216
		Temporary	.081	.129	1.000	-.282	.445
		No contract	-.249*	.084	.030	-.484	-.013
		Other	-.119	.326	1.000	-1.033	.796
	Limited	Unlimited	-.034	.065	1.000	-.216	.148
		Temporary	.048	.141	1.000	-.350	.445
		No contract	-.283	.102	.053	-.568	.002
		Other	-.152	.331	1.000	-1.081	.776
	Temporary	Unlimited	-.081	.129	1.000	-.445	.282
		Limited	-.048	.141	1.000	-.445	.350

		No contract	-.330	.151	.287	-.755	.094
		Other	-.200	.349	1.000	-1.180	.780
	No contract	Unlimited	.249*	.084	.030	.013	.484
		Limited	.283	.102	.053	-.002	.568
		Temporary	.330	.151	.287	-.094	.755
		Other	.130	.335	1.000	-.810	1.071
	Other	Unlimited	.119	.326	1.000	-.796	1.033
		Limited	.152	.331	1.000	-.776	1.081
		Temporary	.200	.349	1.000	-.780	1.180
		No contract	-.130	.335	1.000	-1.071	.810
9.00	Unlimited	Limited	.089	.049	.685	-.048	.225
		Temporary	.444*	.096	.000	.174	.715
		No contract	.360*	.049	.000	.223	.496
		Other	.400*	.132	.026	.028	.771
	Limited	Unlimited	-.089	.049	.685	-.225	.048
		Temporary	.356*	.103	.006	.066	.646
		No contract	.271*	.061	.000	.099	.443
		Other	.311	.138	.237	-.075	.697
	Temporary	Unlimited	-.444*	.096	.000	-.715	-.174
		Limited	-.356*	.103	.006	-.646	-.066
		No contract	-.085	.103	1.000	-.375	.205
		Other	-.045	.161	1.000	-.496	.407
	No contract	Unlimited	-.360*	.049	.000	-.496	-.223
		Limited	-.271*	.061	.000	-.443	-.099
		Temporary	.085	.103	1.000	-.205	.375
		Other	.040	.138	1.000	-.346	.426
	Other	Unlimited	-.400*	.132	.026	-.771	-.028
		Limited	-.311	.138	.237	-.697	.075
		Temporary	.045	.161	1.000	-.407	.496
		No contract	-.040	.138	1.000	-.426	.346

Appendix D. Main effect of employment status on managers' support

Estimated marginal means

Dependent variable: managers' support

ISCO08	M	SD	95% Confidence Interval	
			Lowerbound	Upperbound
1.00	4.060	.137	3.792	4.328
2.00	3.808	.051	3.708	3.908
3.00	3.940	.066	3.812	4.069
4.00	3.842	.056	3.732	3.952
5.00	3.662	.035	3.594	3.731
6.00	3.071	.145	2.787	3.354
7.00	3.745	.056	3.636	3.854
8.00	3.714	.087	3.543	3.885
9.00	3.282	.038	3.206	3.357

Pairwise comparisons

Dependent variable: managers' support

(I) ISCO08	(J) ISCO08	Meandifference (I-J)	SD	p	95% Confidence Interval Difference	
					Lowerbound	Upperbound
1.00	2.00	.253	.146	1.000	-.214	.719
	3.00	.120	.152	1.000	-.365	.605
	4.00	.219	.148	1.000	-.254	.691
	5.00	.398	.141	.173	-.053	.849
	6.00	.989*	.199	.000	.353	1.626
	7.00	.315	.148	1.000	-.157	.787
	8.00	.346	.162	1.000	-.173	.865
	9.00	.779*	.142	.000	.324	1.233
2.00	1.00	-.253	.146	1.000	-.719	.214
	3.00	-.133	.083	1.000	-.399	.133
	4.00	-.034	.076	1.000	-.277	.209
	5.00	.145	.062	.670	-.052	.343
	6.00	.737*	.153	.000	.247	1.227
	7.00	.062	.075	1.000	-.179	.304
	8.00	.094	.101	1.000	-.230	.417
	9.00	.526*	.064	.000	.322	.730
3.00	1.00	-.120	.152	1.000	-.605	.365
	2.00	.133	.083	1.000	-.133	.399
	4.00	.099	.086	1.000	-.178	.375
	5.00	.278*	.074	.007	.040	.516
	6.00	.870*	.159	.000	.362	1.377
	7.00	.195	.086	.842	-.080	.470
	8.00	.226	.109	1.000	-.123	.576
	9.00	.659*	.076	.000	.415	.902
4.00	1.00	-.219	.148	1.000	-.691	.254
	2.00	.034	.076	1.000	-.209	.277
	3.00	-.099	.086	1.000	-.375	.178
	5.00	.179	.066	.241	-.032	.391
	6.00	.771*	.155	.000	.275	1.267
	7.00	.096	.079	1.000	-.156	.349
	8.00	.128	.104	1.000	-.205	.460
	9.00	.560*	.068	.000	.342	.778
5.00	1.00	-.398	.141	.173	-.849	.053
	2.00	-.145	.062	.670	-.343	.052
	3.00	-.278*	.074	.007	-.516	-.040
	4.00	-.179	.066	.241	-.391	.032
	6.00	.591*	.149	.003	.116	1.067
	7.00	-.083	.066	1.000	-.293	.127
	8.00	-.052	.094	1.000	-.353	.249

	9.00	.381*	.052	.000	.214	.547
6.00	1.00	-.989*	.199	.000	-1.626	-.353
	2.00	-.737*	.153	.000	-1.227	-.247
	3.00	-.870*	.159	.000	-1.377	-.362
	4.00	-.771*	.155	.000	-1.267	-.275
	5.00	-.591*	.149	.003	-1.067	-.116
	7.00	-.675*	.155	.000	-1.170	-.179
	8.00	-.643*	.169	.005	-1.184	-.103
	9.00	-.211	.150	1.000	-.689	.267
7.00	1.00	-.315	.148	1.000	-.787	.157
	2.00	-.062	.075	1.000	-.304	.179
	3.00	-.195	.086	.842	-.470	.080
	4.00	-.096	.079	1.000	-.349	.156
	5.00	.083	.066	1.000	-.127	.293
	6.00	.675*	.155	.000	.179	1.170
	8.00	.031	.104	1.000	-.300	.363
	9.00	.464*	.068	.000	.248	.680
8.00	1.00	-.346	.162	1.000	-.865	.173
	2.00	-.094	.101	1.000	-.417	.230
	3.00	-.226	.109	1.000	-.576	.123
	4.00	-.128	.104	1.000	-.460	.205
	5.00	.052	.094	1.000	-.249	.353
	6.00	.643*	.169	.005	.103	1.184
	7.00	-.031	.104	1.000	-.363	.300
	9.00	.432*	.096	.000	.127	.738
9.00	1.00	-.779*	.142	.000	-1.233	-.324
	2.00	-.526*	.064	.000	-.730	-.322
	3.00	-.659*	.076	.000	-.902	-.415
	4.00	-.560*	.068	.000	-.778	-.342
	5.00	-.381*	.052	.000	-.547	-.214
	6.00	.211	.150	1.000	-.267	.689
	7.00	-.464*	.068	.000	-.680	-.248
	8.00	-.432*	.096	.000	-.738	-.127

Appendix E. Interaction effects of employment status and occupation on managers' support

Estimated marginal means

Dependent variable: managers' support

Employment status	ISCO08	M	SD	95% Confidence Interval	
				Lowerbound	Upperbound
Unlimited	1.00	3.945	.031	3.885	4.005
	2.00	3.897	.015	3.867	3.927
	3.00	3.862	.019	3.825	3.899
	4.00	3.771	.021	3.730	3.812
	5.00	3.779	.016	3.749	3.810
	6.00	3.663	.083	3.500	3.826
	7.00	3.703	.021	3.662	3.745
	8.00	3.551	.025	3.502	3.599
	9.00	3.447	.025	3.398	3.495
Limited	1.00	3.911	.125	3.667	4.155
	2.00	3.855	.042	3.772	3.938
	3.00	3.829	.058	3.717	3.942
	4.00	3.797	.060	3.679	3.915
	5.00	3.666	.036	3.596	3.736
	6.00	3.339	.150	3.045	3.633
	7.00	3.725	.056	3.615	3.835
	8.00	3.444	.070	3.308	3.581
	9.00	3.431	.048	3.337	3.525
Temporary	1.00	4.500	.591	3.342	5.658
	2.00	4.115	.164	3.794	4.437
	3.00	3.500	.203	3.103	3.897
	4.00	3.902	.165	3.578	4.226
	5.00	3.628	.107	3.418	3.839
	6.00	2.400	.528	1.364	3.436
	7.00	3.710	.142	3.431	3.989
	8.00	3.730	.149	3.438	4.022
	9.00	3.054	.104	2.851	3.257
No contract	1.00	3.667	.157	3.360	3.973
	2.00	3.859	.071	3.720	3.998
	3.00	4.191	.085	4.024	4.357
	4.00	3.988	.093	3.805	4.170
	5.00	3.846	.038	3.771	3.922
	6.00	3.237	.120	3.002	3.472
	7.00	3.660	.060	3.542	3.777
	8.00	3.733	.092	3.553	3.914
	9.00	3.219	.046	3.129	3.310
Other	1.00	4.278	.279	3.732	4.824
	2.00	3.311	.176	2.966	3.656
	3.00	4.320	.236	3.857	4.783
	4.00	3.750	.197	3.364	4.136
	5.00	3.391	.127	3.142	3.639
	6.00	2.714	.447	1.839	3.590
	7.00	3.929	.223	3.491	4.366
	8.00	4.111	.394	3.339	4.883
	9.00	3.258	.145	2.972	3.543

Pairwise comparisons

Dependentvariable: managers' support

ISCO08	(I) Employment status	(J) Employment status	Meandifference (I-J)	SD	p	95% Confidence Interval Difference	
						Lowerbound	Upperbound
1.00	Unlimited	Limited	.034	.128	1.000	-.326	.394
		Temporary	-.555	.592	1.000	-2.216	1.106
		No contract	.279	.159	.806	-.169	.726
		Other	-.332	.280	1.000	-1.119	.454
	Limited	Unlimited	-.034	.128	1.000	-.394	.326
		Temporary	-.589	.604	1.000	-2.284	1.106
		No contract	.244	.200	1.000	-.317	.806
		Other	-.367	.305	1.000	-1.223	.490
	Temporary	Unlimited	.555	.592	1.000	-1.106	2.216
		Limited	.589	.604	1.000	-1.106	2.284
		No contract	.833	.611	1.000	-.883	2.549
		Other	.222	.653	1.000	-1.612	2.056
	No contract	Unlimited	-.279	.159	.806	-.726	.169
		Limited	-.244	.200	1.000	-.806	.317
		Temporary	-.833	.611	1.000	-2.549	.883
		Other	-.611	.320	.558	-1.508	.286
Other	Limited	.332	.280	1.000	-.454	1.119	
	Unlimited	.367	.305	1.000	-.490	1.223	
	Temporary	-.222	.653	1.000	-2.056	1.612	
	No contract	.611	.320	.558	-.286	1.508	
2.00	Unlimited	Limited	.042	.045	1.000	-.084	.168
		Temporary	-.218	.165	1.000	-.680	.244
		No contract	.038	.073	1.000	-.166	.242
		Other	.586*	.177	.009	.090	1.082
	Limited	Unlimited	-.042	.045	1.000	-.168	.084
		Temporary	-.260	.169	1.000	-.735	.215
		No contract	-.004	.083	1.000	-.236	.228
		Other	.544*	.181	.027	.036	1.053
	Temporary	Unlimited	.218	.165	1.000	-.244	.680
		Limited	.260	.169	1.000	-.215	.735
		No contract	.256	.179	1.000	-.245	.758
		Other	.804*	.241	.008	.129	1.480
	No contract	Unlimited	-.038	.073	1.000	-.242	.166
		Limited	.004	.083	1.000	-.228	.236
		Temporary	-.256	.179	1.000	-.758	.245
		Other	.548*	.190	.039	.015	1.081
Other	Unlimited	-.586*	.177	.009	-1.082	-.090	
	Limited	-.544*	.181	.027	-1.053	-.036	
	Temporary	-.804*	.241	.008	-1.480	-.129	
	No contract	-.548*	.190	.039	-1.081	-.015	
3.00	Unlimited	Limited	.033	.061	1.000	-.137	.203
		Temporary	.362	.204	.754	-.209	.933
		No contract	-.329*	.087	.002	-.573	-.085
		Other	-.458	.237	.534	-1.124	.208
	Limited	Unlimited	-.033	.061	1.000	-.203	.137
		Temporary	.329	.211	1.000	-.262	.921
		No contract	-.361*	.103	.004	-.649	-.074
		Other	-.491	.243	.437	-1.173	.192

	Temporary	Unlimited	-.362	.204	.754	-.933	.209	
		Limited	-.329	.211	1.000	-.921	.262	
		No contract	-.691*	.220	.017	-1.307	-.074	
		Other	-.820	.311	.084	-1.694	.054	
	No contract	Unlimited	.329*	.087	.002	.085	.573	
		Limited	.361*	.103	.004	.074	.649	
		Temporary	.691*	.220	.017	.074	1.307	
		Other	-.129	.251	1.000	-.834	.576	
	Other	Unlimited	.458	.237	.534	-.208	1.124	
		Limited	.491	.243	.437	-.192	1.173	
		Temporary	.820	.311	.084	-.054	1.694	
		No contract	.129	.251	1.000	-.576	.834	
	4.00	Unlimited	Limited	-.026	.064	1.000	-.205	.153
			Temporary	-.131	.167	1.000	-.599	.338
			No contract	-.216	.095	.235	-.484	.052
			Other	.021	.198	1.000	-.535	.577
Limited		Unlimited	.026	.064	1.000	-.153	.205	
		Temporary	-.105	.176	1.000	-.599	.390	
		No contract	-.190	.111	.864	-.502	.121	
		Other	.047	.206	1.000	-.531	.626	
Temporary		Unlimited	.131	.167	1.000	-.338	.599	
		Limited	.105	.176	1.000	-.390	.599	
		No contract	-.086	.190	1.000	-.619	.447	
		Other	.152	.257	1.000	-.570	.874	
No contract		Unlimited	.216	.095	.235	-.052	.484	
		Limited	.190	.111	.864	-.121	.502	
		Temporary	.086	.190	1.000	-.447	.619	
		Other	.238	.218	1.000	-.374	.849	
Other	Unlimited	-.021	.198	1.000	-.577	.535		
	Limited	-.047	.206	1.000	-.626	.531		
	Temporary	-.152	.257	1.000	-.874	.570		
	No contract	-.238	.218	1.000	-.849	.374		
5.00	Unlimited	Limited	.113*	.039	.037	.004	.223	
		Temporary	.151	.109	1.000	-.154	.456	
		No contract	-.067	.041	1.000	-.183	.049	
		Other	.389*	.128	.023	.030	.747	
	Limited	Unlimited	-.113*	.039	.037	-.223	-.004	
		Temporary	.038	.113	1.000	-.280	.356	
		No contract	-.180*	.052	.006	-.328	-.033	
		Other	.275	.132	.365	-.094	.645	
	Temporary	Unlimited	-.151	.109	1.000	-.456	.154	
		Limited	-.038	.113	1.000	-.356	.280	
		No contract	-.218	.114	.556	-.539	.102	
		Other	.237	.166	1.000	-.229	.704	
	No contract	Unlimited	.067	.041	1.000	-.049	.183	
		Limited	.180*	.052	.006	.033	.328	
		Temporary	.218	.114	.556	-.102	.539	
		Other	.456*	.132	.006	.084	.827	
Other	Unlimited	-.389*	.128	.023	-.747	-.030		
	Limited	-.275	.132	.365	-.645	.094		
	Temporary	-.237	.166	1.000	-.704	.229		
	No contract	-.456*	.132	.006	-.827	-.084		
6.00	Unlimited	Limited	.325	.172	.585	-.157	.806	
		Temporary	1.263	.535	.182	-.238	2.765	

		No contract	.426*	.146	.035	.016	.836	
		Other	.949	.454	.367	-.326	2.224	
	Limited	Unlimited	-.325	.172	.585	-.806	.157	
		Temporary	.939	.549	.875	-.604	2.481	
	Temporary	No contract	.102	.192	1.000	-.438	.641	
		Other	.624	.471	1.000	-.698	1.947	
		Unlimited	-1.263	.535	.182	-2.765	.238	
		Limited	-.939	.549	.875	-2.481	.604	
	No contract	No contract	-.837	.542	1.000	-2.358	.684	
		Other	-.314	.692	1.000	-2.257	1.628	
		Unlimited	-.426*	.146	.035	-.836	-.016	
		Limited	-.102	.192	1.000	-.641	.438	
	Other	Temporary	.837	.542	1.000	-.684	2.358	
		Other	.523	.462	1.000	-.775	1.821	
		Unlimited	-.949	.454	.367	-2.224	.326	
		Limited	-.624	.471	1.000	-1.947	.698	
	7.00	Unlimited	Temporary	.314	.692	1.000	-1.628	2.257
			No contract	-.523	.462	1.000	-1.821	.775
			Limited	-.021	.060	1.000	-.189	.147
			Temporary	-.007	.144	1.000	-.410	.397
Limited	No contract	.044	.064	1.000	-.135	.222		
	Other	-.225	.224	1.000	-.855	.405		
	Unlimited	.021	.060	1.000	-.147	.189		
	Temporary	.014	.153	1.000	-.415	.444		
Temporary	No contract	.065	.082	1.000	-.166	.295		
	Other	-.204	.230	1.000	-.850	.442		
	Unlimited	.007	.144	1.000	-.397	.410		
	Limited	-.014	.153	1.000	-.444	.415		
No contract	No contract	.050	.154	1.000	-.383	.484		
	Other	-.218	.265	1.000	-.962	.525		
	Unlimited	-.044	.064	1.000	-.222	.135		
	Limited	-.065	.082	1.000	-.295	.166		
Other	Temporary	-.050	.154	1.000	-.484	.383		
	Other	-.269	.231	1.000	-.918	.380		
	Unlimited	.225	.224	1.000	-.405	.855		
	Limited	.204	.230	1.000	-.442	.850		
8.00	Unlimited	Temporary	.218	.265	1.000	-.525	.962	
		No contract	.269	.231	1.000	-.380	.918	
		Limited	.106	.074	1.000	-.101	.314	
		Temporary	-.179	.151	1.000	-.603	.244	
Limited	No contract	-.183	.095	.554	-.450	.085		
	Other	-.560	.395	1.000	-1.668	.548		
	Unlimited	-.106	.074	1.000	-.314	.101		
	Temporary	-.286	.164	.822	-.747	.176		
Temporary	No contract	-.289	.115	.123	-.613	.035		
	Other	-.667	.400	.956	-1.790	.456		
	Unlimited	.179	.151	1.000	-.244	.603		
	Limited	.286	.164	.822	-.176	.747		
No contract	No contract	-.003	.175	1.000	-.494	.488		
	Other	-.381	.421	1.000	-1.563	.801		
	Unlimited	.183	.095	.554	-.085	.450		
	Limited	.289	.115	.123	-.035	.613		
Other	Temporary	.003	.175	1.000	-.488	.494		
	Other	-.378	.405	1.000	-1.513	.758		
	Unlimited	Unlimited	.560	.395	1.000	-.548	1.668	
		Limited	.667	.400	.956	-.456	1.790	

		Temporary	.381	.421	1.000	-.801	1.563
		No contract	.378	.405	1.000	-.758	1.513
9.00	Unlimited	Limited	.016	.054	1.000	-.135	.168
		Temporary	.393*	.107	.002	.094	.692
		No contract	.228*	.052	.000	.080	.375
		Other	.189	.148	1.000	-.225	.603
	Limited	Unlimited	-.016	.054	1.000	-.168	.135
		Temporary	.377*	.114	.010	.056	.697
		No contract	.211*	.067	.015	.024	.399
		Other	.173	.153	1.000	-.257	.603
	Temporary	Unlimited	-.393*	.107	.002	-.692	-.094
		Limited	-.377*	.114	.010	-.697	-.056
		No contract	-.165	.114	1.000	-.484	.153
		Other	-.204	.179	1.000	-.705	.298
	No contract	Unlimited	-.228*	.052	.000	-.375	-.080
		Limited	-.211*	.067	.015	-.399	-.024
		Temporary	.165	.114	1.000	-.153	.484
		Other	-.038	.153	1.000	-.467	.390
Other	Unlimited	-.189	.148	1.000	-.603	.225	
	Limited	-.173	.153	1.000	-.603	.257	
	Temporary	.204	.179	1.000	-.298	.705	
	No contract	.038	.153	1.000	-.390	.467	

Appendix F. Main effect of employment status on the quality of interpersonal relationships

Estimated marginal means

Dependent variable: quality of interpersonal relationships

Employment status	M	SD	95% Confidence Interval	
			Lowerbound	Upperbound
Unlimited	4.446	.007	4.432	4.460
Limited	4.440	.016	4.407	4.472
Temporary	4.282	.062	4.161	4.402
No contract	4.389	.019	4.353	4.426
Other	4.361	.051	4.260	4.461

Pairwise comparisons

Dependent variable: quality of interpersonal relationships

(I) Employment status	(J) Employment status	Meandifference (I-J)	SD	p	95% Confidence Interval Difference	
					Lowerbound	Upperbound
Unlimited	Limited	.006	.018	1.000	-.044	.057
	Temporary	.164	.062	.081	-.010	.338
	No contract	.057*	.020	.046	.001	.113
	Other	.085	.052	1.000	-.061	.231
Limited	Unlimited	-.006	.018	1.000	-.057	.044
	Temporary	.158	.064	.132	-.021	.337
	No contract	.051	.025	.426	-.019	.120
	Other	.079	.054	1.000	-.073	.231
Temporary	Unlimited	-.164	.062	.081	-.338	.010
	Limited	-.158	.064	.132	-.337	.021
	No contract	-.107	.064	.948	-.288	.073

	Other	-.079	.080	1.000	-.304	.146
No contract	Unlimited	-.057*	.020	.046	-.113	-.001
	Limited	-.051	.025	.426	-.120	.019
	Temporary	.107	.064	.948	-.073	.288
	Other	.029	.055	1.000	-.125	.182
Other	Unlimited	-.085	.052	1.000	-.231	.061
	Limited	-.079	.054	1.000	-.231	.073
	Temporary	.079	.080	1.000	-.146	.304
	No contract	-.029	.055	1.000	-.182	.125

Appendix G. Main effect of occupation (ISCO08) on the quality of interpersonal relationships

Estimated marginal means

Dependent variable: quality of interpersonal relationships

ISCO08	M	SD	95% Confidence Interval	
			Lowerbound	Upperbound
1.00	4.356	.085	4.190	4.523
2.00	4.504	.032	4.442	4.567
3.00	4.565	.040	4.486	4.644
4.00	4.366	.036	4.296	4.437
5.00	4.345	.022	4.302	4.388
6.00	4.345	.083	4.183	4.507
7.00	4.385	.035	4.317	4.454
8.00	4.325	.052	4.223	4.427
9.00	4.259	.025	4.210	4.309

Pairwise comparisons

Dependent variable: quality of interpersonal relationships

(I) ISCO08	(J) ISCO08	Meandifference (I-J)	SD	p	95% Confidence Interval Difference	
					Lowerbound	Upperbound
1.00	2.00	-.148	.091	1.000	-.438	.142
	3.00	-.208	.094	.960	-.509	.092
	4.00	-.010	.092	1.000	-.305	.285
	5.00	.011	.088	1.000	-.269	.292
	6.00	.012	.118	1.000	-.367	.390
	7.00	-.029	.092	1.000	-.322	.265
	8.00	.032	.100	1.000	-.287	.350
2.00	9.00	.097	.089	1.000	-.186	.381
	1.00	.148	.091	1.000	-.142	.438
	3.00	-.060	.051	1.000	-.225	.104
	4.00	.138	.048	.147	-.016	.292
	5.00	.159*	.039	.002	.035	.284
	6.00	.160	.089	1.000	-.124	.443
	7.00	.119	.047	.428	-.032	.271

	8.00	.179	.061	.121	-.016	.375
	9.00	.245*	.041	.000	.115	.376
3.00	1.00	.208	.094	.960	-.092	.509
	2.00	.060	.051	1.000	-.104	.225
	4.00	.198*	.054	.009	.026	.371
	5.00	.220*	.046	.000	.073	.367
	6.00	.220	.092	.601	-.074	.514
	7.00	.180*	.053	.027	.009	.350
	8.00	.240*	.066	.010	.029	.451
	9.00	.306*	.048	.000	.154	.458
	4.00	1.00	.010	.092	1.000	-.285
2.00		-.138	.048	.147	-.292	.016
3.00		-.198*	.054	.009	-.371	-.026
5.00		.021	.042	1.000	-.114	.156
6.00		.022	.090	1.000	-.266	.310
7.00		-.019	.050	1.000	-.179	.141
8.00		.041	.063	1.000	-.161	.244
9.00		.107	.044	.523	-.033	.248
5.00		1.00	-.011	.088	1.000	-.292
	2.00	-.159*	.039	.002	-.284	-.035
	3.00	-.220*	.046	.000	-.367	-.073
	4.00	-.021	.042	1.000	-.156	.114
	6.00	.000	.086	1.000	-.273	.274
	7.00	-.040	.041	1.000	-.172	.092
	8.00	.020	.057	1.000	-.161	.201
	9.00	.086	.034	.369	-.021	.193
	6.00	1.00	-.012	.118	1.000	-.390
2.00		-.160	.089	1.000	-.443	.124
3.00		-.220	.092	.601	-.514	.074
4.00		-.022	.090	1.000	-.310	.266
5.00		.000	.086	1.000	-.274	.273
7.00		-.040	.090	1.000	-.327	.246
8.00		.020	.098	1.000	-.293	.332
9.00		.086	.086	1.000	-.190	.362
7.00		1.00	.029	.092	1.000	-.265
	2.00	-.119	.047	.428	-.271	.032
	3.00	-.180*	.053	.027	-.350	-.009
	4.00	.019	.050	1.000	-.141	.179
	5.00	.040	.041	1.000	-.092	.172
	6.00	.040	.090	1.000	-.246	.327
	8.00	.060	.063	1.000	-.140	.261
	9.00	.126	.043	.123	-.012	.264
	8.00	1.00	-.032	.100	1.000	-.350
2.00		-.179	.061	.121	-.375	.016

	3.00	-.240*	.066	.010	-.451	-.029
	4.00	-.041	.063	1.000	-.244	.161
	5.00	-.020	.057	1.000	-.201	.161
	6.00	-.020	.098	1.000	-.332	.293
	7.00	-.060	.063	1.000	-.261	.140
	9.00	.066	.058	1.000	-.119	.251
9.00	1.00	-.097	.089	1.000	-.381	.186
	2.00	-.245*	.041	.000	-.376	-.115
	3.00	-.306*	.048	.000	-.458	-.154
	4.00	-.107	.044	.523	-.248	.033
	5.00	-.086	.034	.369	-.193	.021
	6.00	-.086	.086	1.000	-.362	.190
	7.00	-.126	.043	.123	-.264	.012
	8.00	-.066	.058	1.000	-.251	.119

Appendix H. Interaction effects of employment status and occupation on the quality of interpersonal relationships

Estimated marginal means

Dependent variable: quality of interpersonal relationships

Employment status	ISCO08	M	SD	95% Confidence Interval	
				Lowerbound	Upperbound
Unlimited	1.00	4.574	.018	4.538	4.610
	2.00	4.529	.010	4.510	4.547
	3.00	4.520	.012	4.497	4.544
	4.00	4.427	.013	4.401	4.453
	5.00	4.435	.010	4.416	4.455
	6.00	4.438	.052	4.337	4.540
	7.00	4.416	.013	4.391	4.442
	8.00	4.345	.015	4.315	4.375
	9.00	4.328	.016	4.297	4.359
Limited	1.00	4.386	.073	4.242	4.530
	2.00	4.533	.026	4.482	4.584
	3.00	4.577	.036	4.507	4.647
	4.00	4.435	.037	4.363	4.508
	5.00	4.390	.023	4.346	4.435
	6.00	4.581	.094	4.397	4.764
	7.00	4.365	.035	4.296	4.433
	8.00	4.348	.043	4.263	4.433
	9.00	4.341	.031	4.281	4.402
Temporary	1.00	3.500	.369	2.777	4.223
	2.00	4.528	.101	4.330	4.727
	3.00	4.629	.125	4.384	4.873
	4.00	4.240	.104	4.036	4.444
	5.00	4.266	.066	4.136	4.396
	6.00	4.400	.330	3.754	5.046
	7.00	4.500	.091	4.322	4.678
	8.00	4.385	.091	4.205	4.564

	9.00	4.089	.066	3.959	4.218
No contract	1.00	4.600	.091	4.421	4.779
	2.00	4.420	.044	4.334	4.506
	3.00	4.520	.053	4.417	4.624
	4.00	4.406	.062	4.285	4.526
	5.00	4.272	.025	4.223	4.321
	6.00	4.305	.072	4.164	4.446
	7.00	4.324	.038	4.249	4.398
	8.00	4.447	.057	4.336	4.558
	9.00	4.210	.031	4.149	4.270
Other	1.00	4.722	.174	4.382	5.063
	2.00	4.512	.112	4.291	4.732
	3.00	4.577	.145	4.294	4.860
	4.00	4.324	.126	4.076	4.571
	5.00	4.361	.081	4.203	4.520
	6.00	4.000	.213	3.583	4.417
	7.00	4.321	.139	4.048	4.595
	8.00	4.100	.233	3.643	4.557
	9.00	4.328	.097	4.138	4.517

Pairwise comparisons

Dependent variable: quality of interpersonal relationships

ISCO08	(I) Employment status	(J) Employment status	Meandifference (I-J)	SD	p	95% Confidence Interval Difference	
						Lowerbound	Upperbound
1.00	Unlimited	Limited	.188	.076	.130	-.024	.400
		Temporary	1.074*	.369	.036	.038	2.110
		No contract	-.026	.093	1.000	-.288	.236
		Other	-.148	.175	1.000	-.639	.342
	Limited	Unlimited	-.188	.076	.130	-.400	.024
		Temporary	.886	.376	.184	-.169	1.941
		No contract	-.214	.117	.681	-.543	.115
		Other	-.336	.189	.748	-.866	.193
	Temporary	Unlimited	-1.074*	.369	.036	-2.110	-.038
		Limited	-.886	.376	.184	-1.941	.169
		No contract	-1.100*	.380	.038	-2.166	-.034
		Other	-1.222*	.408	.027	-2.366	-.078
	No contract	Unlimited	.026	.093	1.000	-.236	.288
		Limited	.214	.117	.681	-.115	.543
		Temporary	1.100*	.380	.038	.034	2.166
		Other	-.122	.196	1.000	-.673	.429
Other	Limited	.148	.175	1.000	-.342	.639	
	Unlimited	.336	.189	.748	-.193	.866	
	Temporary	1.222*	.408	.027	.078	2.366	
	No contract	.122	.196	1.000	-.429	.673	
2.00	Unlimited	Limited	-.004	.028	1.000	-.083	.074
		Temporary	.000	.102	1.000	-.285	.286
		No contract	.109	.045	.156	-.017	.235
		Other	.017	.113	1.000	-.300	.334
	Limited	Unlimited	.004	.028	1.000	-.074	.083
		Temporary	.005	.105	1.000	-.289	.299
		No contract	.113	.051	.267	-.030	.257
		Other	.022	.115	1.000	-.302	.346
	Temporary	Unlimited	.000	.102	1.000	-.286	.285

		Limited		-.005	.105	1.000	-.299	.289
		No contract		.108	.110	1.000	-.202	.418
		Other		.017	.151	1.000	-.408	.441
	No contract	Unlimited		-.109	.045	.156	-.235	.017
		Limited		-.113	.051	.267	-.257	.030
		Temporary		-.108	.110	1.000	-.418	.202
		Other		-.092	.121	1.000	-.431	.247
	Other	unlimited		-.017	.113	1.000	-.334	.300
		Limited		-.022	.115	1.000	-.346	.302
		Temporary		-.017	.151	1.000	-.441	.408
		No contract		.092	.121	1.000	-.247	.431
3.00	Unlimited	Limited		-.057	.038	1.000	-.163	.049
		Temporary		-.108	.125	1.000	-.459	.243
		No contract		8.364E-5	.054	1.000	-.151	.152
		Other		-.056	.145	1.000	-.464	.351
	Limited	Unlimited		.057	.038	1.000	-.049	.163
		Temporary		-.051	.130	1.000	-.415	.313
		No contract		.057	.064	1.000	-.122	.236
		Other		.001	.149	1.000	-.418	.419
	Temporary	Unlimited		.108	.125	1.000	-.243	.459
		Limited		.051	.130	1.000	-.313	.415
		No contract		.108	.135	1.000	-.272	.488
		Other		.052	.191	1.000	-.484	.587
	No contract	Unlimited		-8.364E-5	.054	1.000	-.152	.151
		Limited		-.057	.064	1.000	-.236	.122
		Temporary		-.108	.135	1.000	-.488	.272
		Other		-.057	.154	1.000	-.488	.375
	Other	Unlimited		.056	.145	1.000	-.351	.464
		Limited		-.001	.149	1.000	-.419	.418
		Temporary		-.052	.191	1.000	-.587	.484
		No contract		.057	.154	1.000	-.375	.488
4.00	Unlimited	Limited		-.008	.039	1.000	-.119	.102
		Temporary		.187	.105	.751	-.108	.482
		No contract		.021	.063	1.000	-.155	.198
		Other		.104	.127	1.000	-.253	.460
	Limited	Unlimited		.008	.039	1.000	-.102	.119
		Temporary		.195	.111	.774	-.115	.506
		No contract		.030	.072	1.000	-.172	.232
		Other		.112	.132	1.000	-.258	.482
	Temporary	Unlimited		-.187	.105	.751	-.482	.108
		Limited		-.195	.111	.774	-.506	.115
		No contract		-.166	.121	1.000	-.506	.174
		Other		-.084	.164	1.000	-.544	.377
	No contract	Unlimited		-.021	.063	1.000	-.198	.155
		Limited		-.030	.072	1.000	-.232	.172
		Temporary		.166	.121	1.000	-.174	.506
		Other		.082	.141	1.000	-.313	.477
	Other	Unlimited		-.104	.127	1.000	-.460	.253
		Limited		-.112	.132	1.000	-.482	.258
		Temporary		.084	.164	1.000	-.377	.544
		No contract		-.082	.141	1.000	-.477	.313
5.00	Unlimited	Limited		.045	.025	.674	-.024	.114
		Temporary		.169	.067	.114	-.019	.357
		No contract		.163*	.027	.000	.088	.239
		Other		.074	.082	1.000	-.155	.303
	Limited	Unlimited		-.045	.025	.674	-.114	.024

		Temporary	.124	.070	.755	-.072	.321	
		No contract	.118*	.034	.005	.024	.213	
		Other	.029	.084	1.000	-.207	.265	
	Temporary	Unlimited	-.169	.067	.114	-.357	.019	
		Limited	-.124	.070	.755	-.321	.072	
		No contract	-.006	.071	1.000	-.205	.193	
	No contract	Other	-.095	.105	1.000	-.389	.198	
		Unlimited	-.163*	.027	.000	-.239	-.088	
		Limited	-.118*	.034	.005	-.213	-.024	
	Other	Temporary	.006	.071	1.000	-.193	.205	
		Other	-.089	.085	1.000	-.327	.149	
		Unlimited	-.074	.082	1.000	-.303	.155	
		Unlimited	Limited	-.029	.084	1.000	-.265	.207
			Temporary	.095	.105	1.000	-.198	.389
			No contract	.089	.085	1.000	-.149	.327
6.00	Unlimited	Limited	-.142	.107	1.000	-.443	.158	
		Temporary	.038	.334	1.000	-.898	.975	
		No contract	.134	.089	1.000	-.115	.382	
		Other	.438	.219	.453	-.176	1.053	
	Limited	Unlimited	.142	.107	1.000	-.158	.443	
		Temporary	.181	.343	1.000	-.782	1.143	
		No contract	.276	.118	.195	-.056	.607	
		Other	.581	.233	.125	-.072	1.233	
	Temporary	Unlimited	-.038	.334	1.000	-.975	.898	
		Limited	-.181	.343	1.000	-1.143	.782	
		No contract	.095	.337	1.000	-.852	1.043	
		Other	.400	.392	1.000	-.702	1.502	
	No contract	Unlimited	-.134	.089	1.000	-.382	.115	
		Limited	-.276	.118	.195	-.607	.056	
		Temporary	-.095	.337	1.000	-1.043	.852	
		Other	.305	.225	1.000	-.326	.935	
	Other	Unlimited	-.438	.219	.453	-1.053	.176	
		Limited	-.581	.233	.125	-1.233	.072	
		Temporary	-.400	.392	1.000	-1.502	.702	
		No contract	-.305	.225	1.000	-.935	.326	
	7.00	Unlimited	Limited	.051	.037	1.000	-.054	.156
			Temporary	-.084	.092	1.000	-.341	.174
			No contract	.093	.040	.211	-.020	.205
			Other	.095	.140	1.000	-.298	.488
Limited		Unlimited	-.051	.037	1.000	-.156	.054	
		Temporary	-.135	.097	1.000	-.408	.138	
		No contract	.041	.052	1.000	-.104	.186	
		Other	.043	.144	1.000	-.360	.447	
Temporary		Unlimited	.084	.092	1.000	-.174	.341	
		Limited	.135	.097	1.000	-.138	.408	
		No contract	.176	.098	.730	-.100	.453	
		Other	.179	.166	1.000	-.288	.645	
No contract		Unlimited	-.093	.040	.211	-.205	.020	
		Limited	-.041	.052	1.000	-.186	.104	
		Temporary	-.176	.098	.730	-.453	.100	
		Other	.002	.144	1.000	-.403	.408	
Other		Unlimited	-.095	.140	1.000	-.488	.298	
		Limited	-.043	.144	1.000	-.447	.360	
		Temporary	-.179	.166	1.000	-.645	.288	
		No contract	-.002	.144	1.000	-.408	.403	

8.00	Unlimited	Limited	-0.003	.046	1.000	-0.132	.125
		Temporary	-.040	.093	1.000	-.300	.220
		No contract	-.102	.059	.810	-.267	.062
		Other	.245	.234	1.000	-.411	.901
	Limited	Unlimited	.003	.046	1.000	-.125	.132
		Temporary	-.036	.101	1.000	-.320	.248
		No contract	-.099	.071	1.000	-.299	.101
		Other	.248	.237	1.000	-.417	.914
	Temporary	Unlimited	.040	.093	1.000	-.220	.300
		Limited	.036	.101	1.000	-.248	.320
		No contract	-.062	.108	1.000	-.364	.239
		Other	.285	.250	1.000	-.418	.988
	No contract	Unlimited	.102	.059	.810	-.062	.267
		Limited	.099	.071	1.000	-.101	.299
		Temporary	.062	.108	1.000	-.239	.364
		Other	.347	.240	1.000	-.326	1.021
	Other	Unlimited	-.245	.234	1.000	-.901	.411
		Limited	-.248	.237	1.000	-.914	.417
		Temporary	-.285	.250	1.000	-.988	.418
		No contract	-.347	.240	1.000	-1.021	.326
9.00	Unlimited	Limited	-.013	.035	1.000	-.110	.084
		Temporary	.239*	.068	.004	.048	.430
		No contract	.119*	.035	.007	.021	.216
		Other	.001	.098	1.000	-.275	.276
	Limited	Unlimited	.013	.035	1.000	-.084	.110
		Temporary	.253*	.073	.005	.048	.458
		No contract	.132*	.044	.025	.009	.254
		Other	.014	.102	1.000	-.271	.299
	Temporary	Unlimited	-.239*	.068	.004	-.430	-.048
		Limited	-.253*	.073	.005	-.458	-.048
		No contract	-.121	.073	.984	-.326	.084
		Other	-.239	.117	.417	-.568	.090
	No contract	Unlimited	-.119*	.035	.007	-.216	-.021
		Limited	-.132*	.044	.025	-.254	-.009
		Temporary	.121	.073	.984	-.084	.326
		Other	-.118	.102	1.000	-.403	.167
	Other	Unlimited	-.001	.098	1.000	-.276	.275
		Limited	-.014	.102	1.000	-.299	.271
		Temporary	.239	.117	.417	-.090	.568
		No contract	.118	.102	1.000	-.167	.403

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