

Supplementary Material

Table S1 Number and percentages of the distress symptoms for Internal Workload

	Anxiety		Depression		Sleep problems	
	N	%	N	%	N	%
Not bothered	1502	87.6	1545	90.1	1290	75.2
A little bothered	170	9.9	128	7.5	292	17.0
Quite bothered	28	1.6	26	1.5	88	5.1
Very bothered	6	.3	7	.4	36	2.1
Missing	9	.5	9	.5	6	.3

	Psychological Fatigue		Physical Fatigue	
	N	%	N	%
Daily	47	2.7	100	5.8
Sometimes per-week	172	10.0	251	14.6
Once a week	126	7.3	203	11.8
Sometimes per-month	330	19.2	308	18.0
Never/almost never	1030	60.1	843	49.2
Missing			10	.6

Table S2 Number and percentages of the distress symptoms for External Workload

	Anxiety		Depression		Sleep problems	
	N	%	N	%	N	%
Not bothered	1560	88.6	1610	91.5	1343	76.3
A little bothered	169	9.6	124	7.0	294	16.7
Quite bothered	26	1.5	19	1.1	91	5.2
Very bothered	4	.2	6	.3	31	1.8
Missing	1	.1	1	.1	1	.1

	Psychological Fatigue		Physical Fatigue	
	N	%	N	%
Daily	37	2.1	89	5.1
Sometimes per-week	166	9.4	242	13.8
Once a week	132	7.5	213	12.1
Sometimes per-month	321	18.2	325	18.5
Never/almost never	1104	62.7	889	50.5
Missing			2	.1

The following two tables report the results of additional analysis. Here we report the average of the measures of internal and external workload at T1 and T2 on physical and psychological wellbeing.

Table S3 Crude and adjusted odds ratios (95% confidence intervals) of internal workload group (low, medium, high) (averaged over 2013 – 2016) on physical and psychological wellbeing (n=2989)

	Anxiety	Depression	Psychological fatigue	Physical fatigue	Sleep problems
Crude					
OR (95%					
CI)					
Low	1	1	1	1	1
Medium	1.36 (1.00 – 1.75)	1.06 (.77–1.45)	2.43 (1.86 – 3.16)	1.76 (1.43 – 2.16)	1.08 (.74 – 1.57)
High	1.47 (1.11– 1.94)	1.26 (.93–1.71)	4.56 (3.54 – 5.88)	3.22 (2.62 – 3.96)	1.66 (1.18 – 2.35)
Adjusted					
OR (95%					
CI)					
Low	1	1	1	1	1
Medium	1.30 (.96 – 1.75)	1.05 (.75 – 1.47)	2.14 (1.62 – 2.84)	1.84 (1.47 – 2.30)	1.12 (.76 – 1.66)
High	1.42 (1.04 – 1.94)	1.12 (.80– 1.57)	3.80 (2.87– 5.02)	3.78 (2.95 – 4.70)	1.57 (1.07 – 2.31)

adjusted for age, gender, education level, job autonomy and occupational position

	Anxiety	Depression	Psychological fatigue	Physical fatigue	Sleep problems
Low	1	1	1	1	1
Medium	1.12 (.81 – 1.56)	.99 (.70 – 1.39)	1.85 (1.37 – 2.50)	1.53 (1.21 – 1.95)	1.07 (.69 – 1.67)
High	1.14 (.82 – 1.59)	.91 (.64 – 1.30)	3.04 (2.28 – 4.09)	2.83 (2.19 – 3.65)	1.06 (.69 – 1.63)

adjusted for age, gender, education level, job autonomy, occupational position and distress symptoms reported at 2013

Table S4 Crude and adjusted odds ratios (95% confidence intervals) of external workload group (low, medium, high) (averaged 2013 – 2016) on physical and psychological wellbeing (n=3186)

	Anxiety	Depression	Psychologica l fatigue	Physical fatigue	Sleep problems
Crude					
	OR (95%				
	CI)				
Low	1	1	1	1	1
Medium	1.06 (.82 – 1.38)	1.08 (.80 – 1.45)	1.40 (1.11 – 1.76)	1.07 (.88 – 1.30)	.86 (.60 – 1.22)
High	.89 (.68 – 1.16)	.94 (.70 – 1.28)	1.58 (1.28 – 1.98)	1.01 (.84 – 1.23)	1.07 (.77 – 1.49)
Adjusted					
	OR (95%				
	CI)				
Low	1	1	1	1	1

Medium	1.00 (.76 – 1.33)	1.14 (.83 – 1.56)	1.39 (1.07 – 1.79)	1.24 (1.01 – 1.53)	.96 (.66 – 1.39)
High	.98 (.72 – 1.33)	1.09 (.77 – 1.56)	1.59 (1.20 – 2.04)	1.32 (1.05 – 1.65)	1.27 (.86 – 1.88)

adjusted for age, gender, education level, job autonomy and occupational position

	Anxiety	Depression	Psychological fatigue	Physical fatigue	Sleep problems
Low	1	1	1	1	1
Medium	1.04 (.74 – 1.35)	1.10 (.79 – 1.51)	1.27 (.97 – 1.67)	1.16 (.92 – 1.46)	1.05 (.69 – 1.56)
High	.95 (.68 – 1.32)	1.03 (.72 – 1.48)	1.41 (1.06 – 1.88)	1.16 (.90 – 1.49)	1.38 (.89 – 2.13)

adjusted for age, gender, education level, job autonomy, occupational position and distress symptoms reported at 2013