

# **Journal of Occupational Rehabilitation**

## **Occupational Factors and Labor Market Outcomes Among Individuals with Sickness Absence due to Common Mental Disorders: A Population-Wide Cohort Study**

Gerda Stutaite<sup>1</sup>, Ellenor Mittendorfer-Rutz<sup>1</sup>, Magnus Helgesson<sup>1,2</sup>, Kristin Farrants<sup>1</sup>, Katalin Gémes<sup>1</sup>

<sup>1</sup>Division of Insurance Medicine, Department of Clinical Neuroscience, Karolinska Institutet, SE-171 77 Stockholm, Sweden.

<sup>2</sup>Department of Public Health and Caring Sciences, Uppsala University, Box 564, 751 22, Uppsala, Sweden.

Corresponding author:

Gerda Stutaite

Division of Insurance Medicine

Department of Clinical Neuroscience

Karolinska Institutet

SE-171 77 Stockholm

Sweden

Email: gerda.stutaite@ki.se

Phone: +46 73-946 02 30

## Supplementary Information

**Table 1. Baseline Characteristics of Individuals Included in the Unemployment (UE) Analysis (n = 78,900 (99.0%)) and Those Excluded due to Emigration or Death (n = 773 (1.0%)).**

Characteristic	n Included %	n Excluded %
<b>Sex:</b>		
Female	56,488 (71.6)	418 (54.1)
Male	22,412 (28.4)	355 (45.9)
<b>Age:</b>		
25-29	9,369 (11.9)	112 (14.5)
30-34	12,390 (15.7)	121 (15.6)
35-39	15,276 (19.4)	108 (14.0)
40-44	15,187 (19.2)	132 (17.1)
45-49	13,778 (17.5)	158 (20.4)
50-55	12,900 (16.3)	142 (18.4)
<b>Country of birth:</b>		
Sweden	68,597 (86.9)	528 (68.3)
Other Nordic	1,696 (2.2)	78 (10.1)
Other European	4,020 (5.1)	81 (10.5)
Rest of the World	4,587 (5.8)	86 (11.1)
<b>Education level:</b>		
Elementary (< 10 years)	6,591 (8.3)	99 (12.8)
High school (10-12 years)	36,266 (46.0)	320 (41.4)
University or college (> 12 years)	36,043 (45.7)	354 (45.8)
<b>Family composition:</b>		
Living without a partner and without children	25,654 (32.5)	357 (46.2)
Living without a partner and with children	9,017 (11.4)	69 (8.9)
Living with a partner and without children	9,881 (12.5)	101 (13.1)
Living with a partner and with children	34,348 (43.6)	246 (31.8)
<b>Type of living area:</b>		
City	31,183 (39.5)	358 (46.3)
Town or suburban area	33,187 (42.1)	304 (39.3)
Rural area	14,530 (18.4)	111 (14.4)
<b>Occupational sector:</b>		
Private	45,469 (57.6)	514 (66.5)
Public	33,431 (42.4)	259 (33.5)
<b>Occupational branch:</b>		
Production, industrial, and resource-based	10,838 (13.7)	127 (16.4)
Trade, transport, and storage	12,316 (15.6)	122 (15.8)
Information, financial, and business services	14,282 (18.1)	177 (22.9)
Hospitality and personal services	3,597 (4.6)	42 (5.4)
Education and public administration	17,820 (22.6)	132 (17.1)
Health and social services	20,047 (25.4)	173 (22.4)
<b>Job demands (SweJEM):</b>		
Low	11,914 (15.1)	145 (18.8)
Medium	37,164 (47.1)	314 (40.6)

High	29,822 (37.8)	314 (40.6)
<b>Job control (SweJEM):</b>		
Low	26,379 (33.4)	277 (35.8)
Medium	30,352 (38.5)	269 (34.8)
High	22,169 (28.1)	227 (29.4)
<b>Job strain (SweJEM):</b>		
Active jobs (high demands/high control)	12,165 (15.4)	137 (17.7)
Intermediate strain	57,041 (72.3)	500 (64.7)
Passive jobs (low demands/low control)	6,290 (8.0)	81 (10.5)
High-strain jobs (high demands/low control)	3,221 (4.1)	52 (6.7)
<b>Any unemployment days:</b>		
Yes	5,924 (7.5)	76 (9.8)
No	72,976 (92.5)	697 (90.2)
<b>SA history:</b>		
0 days (no SA history)	67,101 (85.0)	649 (84.0)
0 days < SA history ≤ 30 days	4,848 (6.1)	30 (3.9)
30 days < SA history ≤ 90 days	4,120 (5.2)	63 (8.2)
90 days < SA history ≤ 180 days	1,761 (2.2)	20 (2.6)
180 days < SA history	1,070 (1.4)	11 (1.4)
<b>Index SA diagnosis:</b>		
Depressive disorders (F32-F33)	29,476 (37.4)	361 (46.7)
Anxiety disorders and OCD (F40-F41 and F42)	9,828 (12.5)	109 (14.1)
Stress-induced disorders (F43)	39,596 (50.2)	303 (39.2)
<b>Index SA grade:</b>		
Full-time (100%)	71,157 (90.2)	713 (92.2)
Part-time (0%, 25%, or 75%)	7,743 (9.8)	60 (7.8)
<b>Net index SA days:</b>		
30 days < SA days ≤ 90 days	40,419 (51.2)	387 (50.1)
90 days < SA days ≤ 180 days	17,425 (22.1)	176 (22.8)
180 days < SA days	21,056 (26.7)	210 (27.2)
<b>Mental comorbidities:</b>		
Yes	5,524 (7.0)	117 (15.1)
No	73,376 (93.0)	656 (84.9)
<b>Somatic comorbidities:</b>		
Yes	34,122 (43.2)	316 (40.9)
No	44,778 (56.8)	457 (59.1)
<b>Medications:</b>		
Antidepressants (ATC: N06A):		
No dispensations	61,071 (77.4)	489 (63.3)
One dispensation	9,804 (12.4)	116 (15.0)
Two or more dispensations	8,025 (10.2)	168 (21.7)
Other psychotropic medications:		
No dispensations	62,688 (79.5)	501 (64.8)
One or more dispensations	16,212 (20.5)	272 (35.2)

a. Abbreviations (in alphabetical order): ADHD = Attention Deficit Hyperactivity Disorder, ATC = Anatomical Therapeutic Chemical, CMDs = Common Mental Disorders, OCD = Obsessive Compulsive Disorder, SA = Sickness Absence, SweJEM = The Swedish Job Exposure Matrix.

b. Measurement timepoints: Age, education level, family composition, type of living area, occupation, and occupational sector and branch were assessed on December 31 of the year before the index SA began. UE days were measured for the entire year preceding the start of the index SA spell. SA/DP history was assessed in the two-year period prior to the exclusion window, which began one year before the index SA. Mental and somatic comorbidities were assessed within two years of the start of the index SA spell, and medication use was assessed six months before and three months after the index SA spell started.

c. Missing information was classified as the lowest education level – “elementary education (<10 years).”

d. Low-strain jobs are not included due to small observation counts.

e. Intermediate job strain: low demands/medium control, medium demands/low control, medium demands/medium control, medium demands/high control, high demands/medium control.

f. All diagnostic codes refer to the 10th version of the International Classification of Diseases (ICD-10) codes.

g. Other psychotropic medications: anxiolytics (ATC: N05B), hypnotics and sedatives (ATC: N05C), psychostimulants, ADHD agents, and nootropics (ATC: N06B), psycholeptics and psychoanaleptics in combination (ATC: N06C).

**Table 2. Distribution of Exposure and Covariate Categories Across the Three Outcome Categories for Unemployment (UE) Days (n total = 78,900).**

Total UE Days During Follow-Up	None (0) n = 60,673	0 < UE Days ≤ 180 n = 11,045	> 180 UE Days n = 7,182	Overall n = 78,900
<b>Main exposures</b>				
<b>Job strain (SweJEM):</b>				
Intermediate	44,301 (73.2%)	7,956 (72.2%)	4,784 (66.8%)	57,041 (72.5%)
Active jobs (high demands/high control)	9,824 (16.2%)	1,394 (12.6%)	947 (13.2%)	12,165 (15.5%)
Passive jobs (low demands/low control)	4,182 (6.9%)	1,080 (9.8%)	1,028 (14.4%)	6,290 (8.0%)
High-strain jobs (high demands/low control)	2,228 (3.7%)	591 (5.4%)	402 (5.6%)	3,221 (4.1%)
<b>Job demands (SweJEM):</b>				
Low	8,356 (13.8%)	1,947 (17.6%)	1,611 (22.4%)	11,914 (15.1%)
Medium	28,073 (46.3%)	5,607 (50.8%)	3,484 (48.5%)	37,164 (47.1%)
High	24,244 (40.0%)	3,491 (31.6%)	2,087 (29.1%)	29,822 (37.8%)
<b>Job control (SweJEM):</b>				
Low	18,784 (31.0%)	4,445 (40.2%)	3,150 (43.9%)	26,379 (33.4%)
Medium	24,050 (39.6%)	4,044 (36.6%)	2,258 (31.4%)	30,352 (38.5%)
High	17,839 (29.4%)	2,556 (23.1%)	1,774 (24.7%)	22,169 (28.1%)
<b>Occupational sector</b>				
Private	31,872 (52.5%)	7,927 (71.8%)	5,670 (78.9%)	45,469 (57.6%)
Public	28,801 (47.5%)	3,118 (28.2%)	1,512 (21.1%)	33,431 (42.4%)
<b>Occupational branch</b>				
Production, industrial, and resource-based	7,923 (13.1%)	1,642 (14.9%)	1,273 (17.7%)	10,838 (13.7%)
Trade, transport, and storage	8,474 (14.0%)	2,249 (20.4%)	1,593 (22.2%)	12,316 (15.6%)
Information, financial, and business services	1,0191 (16.8%)	2,322 (21.0%)	1,769 (24.6%)	14,282 (18.1%)
Hospitality and personal services	2,370 (3.9%)	721 (6.5%)	506 (7.0%)	3,597 (4.6%)
Education and public administration	15,088 (24.9%)	1,842 (16.7%)	890 (12.4%)	17,820 (22.6%)
Health and social services	16,627 (27.4%)	2,269 (20.5%)	1,151 (16.0%)	20,047 (25.4%)
<b>Other covariates</b>				
<b>Sex:</b>				
Female	44,671 (73.6%)	7,551 (68.4%)	4,266 (59.4%)	56,488 (71.6%)
Male	16,002 (26.4%)	3,494 (31.6%)	2,916 (40.6%)	22,412 (28.4%)
<b>Age:</b>				
25-29	6,655 (11.0%)	1,713 (15.5%)	1,001 (13.9%)	9,369 (11.9%)
30-34	9,388 (15.5%)	1,826 (16.5%)	1,176 (16.4%)	12,390 (15.7%)
35-39	11,842 (19.5%)	2,109 (19.1%)	1,325 (18.4%)	15,276 (19.4%)
40-44	11,847 (19.5%)	2,024 (18.3%)	1,316 (18.3%)	15,187 (19.2%)
45-49	10,690 (17.6%)	1,797 (16.3%)	1,291 (18.0%)	13,778 (17.5%)
50-55	10,251 (16.9%)	1,576 (14.3%)	1,073 (14.9%)	12,900 (16.3%)
<b>Country of birth:</b>				
Sweden	53,438 (88.1%)	9,415 (85.2%)	5,744 (80.0%)	68,597 (86.9%)
Outside Sweden	7,235 (11.9%)	1,630 (14.8%)	1,438 (20.0%)	10,303 (13.1%)
<b>Education level:</b>				
Elementary (<10 years)	4,394 (7.2%)	1,243 (11.3%)	954 (13.3%)	6,591 (8.4%)
High school (10-12 years)	26,822 (44.2%)	5,609 (50.8%)	3,835 (53.4%)	36,266 (46.0%)
University or college (>12 years)	29,457 (48.6%)	4,193 (38.0%)	2,393 (33.3%)	36,043 (45.7%)
<b>Type of living area:</b>				
City	23,659 (39.0%)	4,408 (39.9%)	3,116 (43.4%)	31,183 (39.5%)
Suburban or town	25,842 (42.6%)	4,527 (41.0%)	2,818 (39.2%)	33,187 (42.1%)
Rural	11,172 (18.4%)	2,110 (19.1%)	1,248 (17.4%)	14,530 (18.4%)
<b>Mental comorbidities:</b>				
None	57,052 (94.0%)	9,897 (89.6%)	6,427 (89.5%)	73,376 (93.0%)
Other CMDs and burnout	2,471 (4.1%)	711 (6.4%)	477 (6.6%)	3,659 (4.6%)
Other mental comorbidities	1,150 (1.9%)	437 (4.0%)	278 (3.9%)	1,865 (2.4%)
<b>Somatic comorbidities:</b>				
None	34,520 (56.9%)	6,223 (56.3%)	4,035 (56.2%)	44,778 (56.8%)
One or more	26,153 (43.1%)	4,822 (43.7%)	3,147 (43.8%)	34,122 (43.2%)
<b>SA history:</b>				
No	51,886 (85.5%)	9,158 (82.9%)	6,057 (84.3%)	67,101 (85.0%)
Yes	8,787 (14.5%)	1,887 (17.1%)	1,125 (15.7%)	11,799 (15.0%)
<b>DP history:</b>				
No	60,434 (99.6%)	10,957 (99.2%)	7,144 (99.5%)	78,535 (99.5%)
Yes	239 (0.4%)	88 (0.8%)	38 (0.5%)	365 (0.5%)
<b>Index SA diagnosis:</b>				
Depressive disorders (F32-F33)	21,770 (35.9%)	4,651 (42.1%)	3,055 (42.5%)	29,476 (37.4%)
Anxiety disorders and OCD (F40-F41 and F42)	7,228 (11.9%)	1,564 (14.2%)	1,036 (14.4%)	9,828 (12.5%)
Stress-induced disorders (F43)	31,675 (52.2%)	4,830 (43.7%)	3,091 (43.0%)	39,596 (50.2%)

a. Abbreviations (in alphabetical order): CMDs = Common Mental Disorders, DP = Disability Pension, OCD = Obsessive Compulsive Disorder, SA = Sickness Absence, SweJEM = The Swedish Job Exposure Matrix.

b. Measurement timepoints: Age, education level, type of living area, and occupational sector and branch were assessed on December 31 of the year before the index SA began. SA/DP history was assessed in the two-year period prior to the exclusion window, which began one year before the index SA. Mental and somatic comorbidities were assessed within two years of the start of the index SA spell.

c. Intermediate job strain/low demands/medium control, medium demands/low control, medium demands/medium control, medium demands/high control, high demands/medium control.

d. Production, industrial, and resource-based branch: agriculture, forestry, fishing, manufacturing, extraction, energy supply, environmental services, and construction.

e. All diagnostic codes refer to the 10th version of the International Classification of Diseases (ICD-10) codes.

**Table 3. Distribution of Exposure and Covariate Categories Across the Four Outcome Categories for Sickness Absence (SA) and Disability Pension (DP) Days (n total = 78,967).**

Total SA/DP Days During Follow-Up	30 < Days ≤ 90 n = 26,635	90 < Days ≤ 180 n = 19,335	180 < Days ≤ 365 n = 16,388	> 365 Days n = 16,609	Overall n = 78,967
<b>Main exposures</b>					
<b>Job strain:</b>					
Intermediate	19,016 (71.6%)	13,994 (72.5%)	11,941 (73.1%)	12,134 (73.2%)	57,085 (72.5%)
Active jobs (high demands/high control)	4,373 (16.5%)	3,090 (16.0%)	2,610 (16.0%)	2,100 (12.7%)	12,173 (15.5%)
Passive jobs (low demands/low control)	2,124 (8.0%)	1,434 (7.4%)	1,170 (7.2%)	1,572 (9.5%)	6,300 (8.0%)
High-strain jobs (high demands/low control)	1,059 (4.0%)	774 (4.0%)	623 (3.8%)	769 (4.6%)	3,225 (4.1%)
<b>Job demands:</b>					
Low	3,984 (15.0%)	2,799 (14.5%)	2,294 (14.0%)	2,860 (17.2%)	11,937 (15.1%)
Medium	12,402 (46.6%)	9,022 (46.7%)	7,699 (47.0%)	8,068 (48.6%)	37,191 (47.1%)
High	10,249 (38.5%)	7,514 (38.9%)	6,395 (39.0%)	5,681 (34.2%)	29,839 (37.8%)
<b>Job control:</b>					
Low	8,466 (31.8%)	6,167 (31.9%)	5,265 (32.1%)	6,513 (39.2%)	26,411 (33.4%)
Medium	10,113 (38.0%)	7,509 (38.8%)	6,441 (39.3%)	6,312 (38.0%)	30,375 (38.5%)
High	8,056 (30.2%)	5,659 (29.3%)	4,682 (28.6%)	3,784 (22.8%)	22,181 (28.1%)
<b>Occupational sector</b>					
Private	15,913 (59.7%)	11,147 (57.7%)	8,985 (54.8%)	9,465 (57.0%)	45,510 (57.6%)
Public	10,722 (40.3%)	8,188 (42.3%)	7,403 (45.2%)	7,144 (43.0%)	33,457 (42.4%)
<b>Occupational branch</b>					
Production, industrial, and resource-based	3,928 (14.7%)	2,751 (14.2%)	2,108 (12.9%)	2,069 (12.5%)	10,856 (13.7%)
Trade, transport, and storage	4,236 (15.9%)	3,017 (15.6%)	2,424 (14.8%)	2,645 (15.9%)	12,322 (15.6%)
Information, financial, and business services	5,091 (19.1%)	3,448 (17.8%)	2,885 (17.6%)	2,867 (17.3%)	14,291 (18.1%)
Hospitality and personal services	1,193 (4.5%)	817 (4.2%)	679 (4.1%)	909 (5.5%)	3,598 (4.6%)
Education and public administration	5,855 (22.0%)	4,503 (23.3%)	3,899 (23.8%)	3,573 (21.5%)	17,830 (22.6%)
Health and social services	6,332 (23.8%)	4,799 (24.8%)	4,393 (26.8%)	4,546 (27.4%)	20,070 (25.4%)
<b>Other covariates</b>					
<b>Sex:</b>					
Female	18,175 (68.2%)	13,846 (71.6%)	12,283 (75.0%)	12,217 (73.6%)	56,521 (71.6%)
Male	8,460 (31.8%)	5,489 (28.4%)	4,105 (25.0%)	4,392 (26.4%)	22,446 (28.4%)
<b>Age:</b>					
25-29	3,442 (12.9%)	2,436 (12.6%)	1,804 (11.0%)	1,692 (10.2%)	9,374 (11.9%)
30-34	4,344 (16.3%)	3,127 (16.2%)	2,533 (15.5%)	2,392 (14.4%)	12,396 (15.7%)
35-39	5,226 (19.6%)	3,782 (19.6%)	3,148 (19.2%)	3,127 (18.8%)	15,283 (19.4%)
40-44	4,969 (18.7%)	3,706 (19.2%)	3,245 (19.8%)	3,275 (19.7%)	15,195 (19.2%)
45-49	4,498 (16.9%)	3,239 (16.8%)	2,906 (17.7%)	3,158 (19.0%)	13,801 (17.5%)
50-55	4,156 (15.6%)	3,045 (15.7%)	2,752 (16.8%)	2,965 (17.9%)	12,918 (16.4%)
<b>Country of birth:</b>					
Sweden	23,231 (87.2%)	16,979 (87.8%)	14,325 (87.4%)	14,116 (85.0%)	68,651 (86.9%)
Outside Sweden	3,404 (12.8%)	2,356 (12.2%)	2,063 (12.6%)	2,493 (15.0%)	10,316 (13.1%)
<b>Education level</b>					
Elementary (<10 years)	2,066 (7.8%)	1,442 (7.5%)	1,267 (7.7%)	1,828 (11.0%)	6,603 (8.4%)
High school (10-12 years)	11,945 (44.8%)	8,732 (45.2%)	7,475 (45.6%)	8,150 (49.1%)	36,302 (46.0%)
University or college (>12 years)	12,624 (47.4%)	9,161 (47.4%)	7,646 (46.7%)	6,631 (39.9%)	36,062 (45.7%)
<b>Type of living area:</b>					
City	10,910 (41.0%)	7,817 (40.4%)	6,294 (38.4%)	6,186 (37.2%)	31,207 (39.5%)
Suburban or town	11,052 (41.5%)	7,929 (41.0%)	7,048 (43.0%)	7,185 (43.3%)	33,214 (42.1%)
Rural	4,673 (17.5%)	3,589 (18.6%)	3,046 (18.6%)	3,238 (19.5%)	14,546 (18.4%)
<b>Mental comorbidities:</b>					
None	25,254 (94.8%)	18,219 (94.2%)	15,224 (92.9%)	14,728 (88.7%)	73,425 (93.0%)
Other CMDs and burnout	934 (3.5%)	748 (3.9%)	762 (4.6%)	1,222 (7.4%)	3,666 (4.6%)
Other mental comorbidities	447 (1.7%)	368 (1.9%)	402 (2.5%)	659 (4.0%)	1,876 (2.4%)
<b>Somatic comorbidities:</b>					
None	16,129 (60.6%)	11,052 (57.2%)	8,869 (54.1%)	8,767 (52.8%)	44,817 (56.8%)
One or more	10,506 (39.4%)	8,283 (42.8%)	7,519 (45.9%)	7,842 (47.2%)	34,150 (43.2%)
<b>SA history:</b>					
No	23,745 (89.1%)	16,626 (86.0%)	13,640 (83.2%)	13,139 (79.1%)	67,150 (85.0%)
Yes	2,890 (10.9%)	2,709 (14.0%)	2,748 (16.8%)	3,470 (20.9%)	11,817 (15.0%)
<b>DP history:</b>					
No	26,574 (99.8%)	19,286 (99.7%)	16,317 (99.6%)	16,425 (98.9%)	78,602 (99.5%)
Yes	61 (0.2%)	49 (0.3%)	71 (0.4%)	184 (1.1%)	365 (0.5%)
<b>Index SA diagnosis:</b>					
Depressive disorders (F32-F33)	8,668 (32.5%)	7,253 (37.5%)	6,323 (38.6%)	7,270 (43.8%)	29,514 (37.4%)
Anxiety disorders and OCD (F40-F41 and F42)	3,250 (12.2%)	2,296 (11.9%)	2,001 (12.2%)	2,288 (13.8%)	9,835 (12.5%)
Stress-induced disorders (F43)	14,717 (55.3%)	9,786 (50.6%)	8,064 (49.2%)	7,051 (42.5%)	39,618 (50.2%)

a. Abbreviations (in alphabetical order): CMDs = Common Mental Disorders, DP = Disability Pension, OCD = Obsessive Compulsive Disorder, SA = Sickness Absence, SweJEM = The Swedish Job Exposure Matrix.

b. Measurement timepoints: Age, education level, type of living area, and occupational sector and branch were assessed on December 31 of the year before the index SA began. The SA and DP history was assessed within two years of the index SA start, that is, one year before the exclusion period started. Mental and somatic comorbidities were assessed within two years of the start of the index SA spell.

c. Intermediate job strain: low demands/medium control, medium demands/low control, medium demands/medium control, medium demands/high control, high demands/medium control.

d. Production, industrial, and resource-based branch: agriculture, forestry, fishing, manufacturing, extraction, energy supply, environmental services, and construction.

e. All diagnostic codes refer to the 10th version of the International Classification of Diseases (ICD-10) codes.

**Table 4. Multinomial Logistic Regression Results for Job Strain and Unemployment (UE) Days with the Individuals with Low-Strain Jobs (n = 183 (0.23%)) (total n = 78,900).** Model 1 was adjusted for sex and age, Model 2 was additionally adjusted for education, country of birth, and type of living area, and Model 3 was further adjusted for index SA diagnosis, SA/DP history, and mental and somatic comorbidities. Reference category: 0 UE days during the follow-up period.

Occupational Characteristic	Outcome Category	Crude OR (95% CI)	Model 1 OR (95% CI)	Model 2 OR (95% CI)	Model 3 OR (95% CI)
<b>Job strain:</b>					
Intermediate	0 < UE Days ≤ 180	1.00 (ref)	1.00 (ref)	1.00 (ref)	1.00 (ref)
	> 180 UE Days	1.00 (ref)	1.00 (ref)	1.00 (ref)	1.00 (ref)
Low-strain jobs (low demands/high control)	0 < UE Days ≤ 180	0.97 (0.63-1.49)	0.93 (0.60-1.44)	0.98 (0.63-1.52)	0.98 (0.63-1.51)
	> 180 UE Days	1.41 (0.89-2.23)	1.27 (0.80-2.02)	1.41 (0.89-2.24)	1.42 (0.89-2.26)
Active jobs (high demands/high control)	0 < UE Days ≤ 180	0.79 (0.74-0.84)	0.79 (0.74-0.84)	0.88 (0.83-0.94)	0.91 (0.85-0.97)
	> 180 UE Days	0.89 (0.83-0.96)	0.84 (0.78-0.90)	0.98 (0.91-1.06)	1.01 (0.93-1.09)
Passive jobs (low demands/low control)	0 < UE Days ≤ 180	1.44 (1.34-1.54)	1.31 (1.22-1.41)	1.14 (1.06-1.23)	1.11 (1.03-1.20)
	> 180 UE Days	2.28 (2.11-2.45)	1.83 (1.70-1.98)	1.50 (1.39-1.62)	1.48 (1.36-1.60)
High-strain jobs (high demands/low control)	0 < UE Days ≤ 180	1.48 (1.34-1.62)	1.37 (1.25-1.51)	1.28 (1.17-1.41)	1.27 (1.15-1.39)
	> 180 UE Days	1.67 (1.50-1.87)	1.38 (1.23-1.54)	1.22 (1.09-1.37)	1.21 (1.08-1.36)

a. Intermediate job strain: low demands/medium control, medium demands/low control, medium demands/medium control, medium demands/high control, high demands/medium control.

**Table 5. Multinomial Logistic Regression Results for Job Strain and Sickness Absence and Disability Pension (SA/DP) Days with the Individuals with Low-Strain Jobs (n = 184 (0.24%) (n total = 78,967).** Model 1 was adjusted for sex and age, Model 2 was additionally adjusted for education, country of birth, and type of living area, and Model 3 was further adjusted for index SA diagnosis, SA/DP history, and mental and somatic comorbidities. Reference category: 30 < SA/DP Days ≤ 90 during the follow-up period.

Occupational Characteristic	Outcome Category	Crude OR (95% CI)	Model 1 OR (95% CI)	Model 2 OR (95% CI)	Model 3 OR (95% CI)
<b>Job strain:</b>					
Intermediate	90 < SA/DP Days ≤ 180	1.00 (ref)	1.00 (ref)	1.00 (ref)	1.00 (ref)
	180 < SA/DP Days ≤ 365	1.00 (ref)	1.00 (ref)	1.00 (ref)	1.00 (ref)
	> 365 SA/DP Days	1.00 (ref)	1.00 (ref)	1.00 (ref)	1.00 (ref)
Low-strain jobs (low demands/high control)	90 < SA/DP Days ≤ 180	0.93 (0.63-1.37)	0.95 (0.65-1.41)	0.96 (0.65-1.41)	0.97 (0.66-1.44)
	180 < SA/DP Days ≤ 365	1.11 (0.76-1.64)	1.18 (0.80-1.74)	1.19 (0.81-1.76)	1.22 (0.82-1.79)
	> 365 SA/DP Days	0.85 (0.56-1.28)	0.89 (0.59-1.36)	0.93 (0.61-1.41)	0.93 (0.61-1.43)
Active jobs (high demands/high control)	90 < SA/DP Days ≤ 180	0.96 (0.91-1.01)	0.98 (0.93-1.03)	0.98 (0.93-1.04)	1.00 (0.95-1.06)
	180 < SA/DP Days ≤ 365	0.95 (0.90-1.00)	0.98 (0.93-1.03)	1.01 (0.95-1.06)	1.04 (0.98-1.10)
	> 365 SA/DP Days	0.75 (0.71-0.80)	0.76 (0.72-0.81)	0.85 (0.80-0.90)	0.90 (0.85-0.96)
Passive jobs (low demands/low control)	90 < SA/DP Days ≤ 180	0.92 (0.86-0.98)	0.98 (0.91-1.05)	0.98 (0.91-1.05)	0.96 (0.89-1.04)
	180 < SA/DP Days ≤ 365	0.88 (0.81-0.95)	1.00 (0.93-1.08)	0.98 (0.90-1.05)	0.95 (0.88-1.03)
	> 365 SA/DP Days	1.16 (1.08-1.24)	1.31 (1.22-1.41)	1.14 (1.06-1.23)	1.09 (1.01-1.17)
High-strain jobs (high demands/low control)	90 < SA/DP Days ≤ 180	0.99 (0.90-1.09)	1.05 (0.95-1.16)	1.05 (0.95-1.16)	1.04 (0.94-1.15)
	180 < SA/DP Days ≤ 365	0.94 (0.85-1.04)	1.05 (0.95-1.17)	1.04 (0.94-1.16)	1.02 (0.92-1.13)
	> 365 SA/DP Days	1.14 (1.03-1.25)	1.26 (1.15-1.39)	1.20 (1.08-1.32)	1.15 (1.04-1.27)

a. Intermediate job strain: low demands/medium control, medium demands/low control, medium demands/medium control, medium demands/high control, high demands/medium control.

**Fig 1 Study Timeline.** Visual representation for a hypothetical individual with an index sickness absence (SA) spell starting in 2012. Individuals with index SA spells in 2011 or 2013 would follow the same timeline, shifted one year earlier or later

Abbreviations (in alphabetical order): DP = Disability Pension, SA = Sickness Absence

Severe psychiatric or neurological disorders refer to specialized outpatient or inpatient care for psychosis spectrum disorders (ICD-10: F20-29), bipolar disorder (ICD-10: F30-F31), early-onset neurodegenerative disorders (ICD-10: F00-F03, G30-G32), anorexia nervosa (ICD-10: F50.0), and intellectual disabilities (ICD-10: F70-F79)

Mental and somatic comorbidities and psychotropic medications are listed in Table 1 in the main manuscript

