**Supplemental Information**

**Supplemental Table 1**

**Generalized linear models examining the relationship between caregiving-related awakenings and workplace outcomes (N=258).**

|  |  |  |
| --- | --- | --- |
|  |  | **Presenteeism**  |
|  |  | **Unadjusted** | **Adjusted** |
|  |  | *OR* | *p-value* | *Lower* | *Upper* | *OR* | *p-value* | *Lower* | *Upper* |
| **Caregiving-related awakenings** |  |  |  |
|  | Never, rarely |  |  |  |  |  |  |  |  |
|  | Some nights | 1.03 | 0.332 | 0.97 | 1.10 | 1.01 | 0.603 | 0.94 | 1.09 |
|  | Most nights, every | **1.25** | **0.000** | **1.15** | **1.36** | **1.27** | **0.000** | **1.16** | **1.40** |
|  |  |  |  |  |  |  |  |  |  |
|  |  | **Absenteeism** |
|  |  |  |  |
|  |  | *OR* | *p-value* | *Lower* | *Upper* | *OR* | *p-value* | *Lower* | *Upper* |
| **Caregiving-related awakenings**  |  |  |  |  |  |  |  |
|  | Never, rarely |  |  |  |  |  |  |  |  |
|  | Some nights | 1.01 | 0.364 | 0.98 | 1.05 | 1.00 | 0.798 | 0.97 | 1.04 |
|  | Most nights, every | **1.15** | **0.000** | **1.10** | **1.20** | **1.10** | **0.000** | **1.06** | **1.15** |
|  |  | **Total Productivity Impairment** |
|  |  |  |  |
|  |  | *OR* | *p-value* | *Lower* | *Upper* | *OR* | *p-value* | *Lower* | *Upper* |
| **Caregiving-related awakenings** |  |  |  |  |  |  |  |
|  | Never, rarely |  |  |  |  |  |  |  |  |
|  | Some nights | 1.05 | 0.252 | 0.96 | 1.13 | 1.02 | 0.607 | 0.94 | 1.2 |
|  | Most nights, every | **1.43** | **0.000** | **1.29** | **1.59** | **1.41** | **0.000** | **1.25** | **1.58** |
|  |  |  |  |  |  |  |  |  |  |

*Notes*.

Bold indicates statistical significance at the p<.05 level.

Adjusted models included education, gender, relationship status, and self-reported health.

**Supplemental Table 2**

**Generalized linear models examining the relationship between nighttime awakenings and workplace outcomes (N=258).**

|  |  |  |
| --- | --- | --- |
|  |  | **Presenteeism** |
|  |  | **Unadjusted** | **Adjusted** |
|  |  | *OR* | *p-**value* | *Lower* | *Upper* | *OR* | *p-**value* | *Lower* | *Upper* |
| **Nighttime awakenings** |
|  | Never, rarely |  |  |  |  |  |  |  |  |
|  | Some nights | **1.02** | **0.484** | **0.99** | **1.07** | 1.02 | 0.519 | 0.96 | 1.08 |
|  | Most nights, every | 1.03 | 0.446 | 0.96 | 1.10 | 1.07 | 0.088 | 1.01 | 1.11 |
|  |  | **Absenteeism**  |
|  |  |  |  |
|  |  | *OR* | *p-**value* | *Lower* | *Upper* | *OR* | *p-**value* | *Lower* | *Upper* |
| **Nighttime awakenings** |
|  | Never, rarely |  |  |  |  |  |  |  |  |
|  | Some nights | 0.99 | 0.670 | 0.96 | 1.02 | 1.00 | 0.823 | 0.97 | 1.02 |
|  | Most nights, every | 1.03 | 0.054 | 0.99 | 1.03 | **1.05** | **0.005** | **1.01** | **1.08** |
|  |  | **Total Productivity Impairment**  |
|  |  | **Unadjusted** | **Adjusted** |
|  |  | *OR* | *p-**value* | *Lower* | *Upper* | *OR* | *p-**value* | *Lower* | *Upper* |
| **Nighttime awakenings** |
|  | Never, rarely |  |  |  |  |  |  |  |  |
|  | Some nights | 1.01 | 0.715 | 0.94 | 1.08 | 1.02 | 0.3661 | 0.94 | 1.10 |
|  | Most nights, every | 1.06 | 0.169 | 0.97 | 1.16 | **1.12** | **0.018** | **1.02** | **1.24** |
|  |  |  |  |  |  |  |  |  |  |

*Notes*.

Bold indicates statistical significance at the p<.05 level.

Adjusted models included education, gender, relationship status, and self-reported health.

**Supplemental Table 3**

**Generalized linear models examining the relationship between both sleep difficulties (caregiving-related awakenings or nighttime awakenings) and total productivity impairment (N=258).**

|  |  |  |
| --- | --- | --- |
|  |  | **Presenteeism** |
|  |  | **Unadjusted** | **Adjusted** |
|  |  | *OR* | *p-value* | *Lower* | *Upper* | *OR* | *p-value* | *Lower* | *Upper* |
| **Caregiving-related awakenings** |  |  |  |  |
|  | Never, rarely |  |  |  |  |  |  |  |  |
|  | Some nights | 1.03 | 0.333 | 0.97 | 1.09 | 1.01 | 0.640 | 0.95 | 1.09 |
|  | Most nights, every | **1.26** | **0.000** | **1.15** | **1.37** | **1.27** | **0.000** | **1.15** | **1.40** |
| **Nighttime awakenings** |  |  |  |  |
|  | Never, rarely |  |  |  |  |  |  |  |  |
|  | Some nights | 1.00 | 0.743 | 0.96 | 1.06 | 1.01 | 0.727 | 0.95 | 1.07 |
|  | Most nights, every | 0.98 | 0.608 | 0.92 | 1.05 | 1.02 | 0.595 | 0.94 | 1.11 |
|  |  | **Absenteeism** |
|  |  |  |  |
|  |  | *OR* | *p-value* | *Lower* | *Upper* | *OR* | *p-value* | *Lower* | *Upper* |
| **Caregiving-related awakenings** |
|  | Never, rarely |  |  |  |  |  |  |  |  |
|  | Some nights | 1.01 | 0.347 | 0.98 | 1.05 | 1.00 | 0.865 | 0.97 | 1.04 |
|  | Most nights, every | **1.15** | **0.000** | **1.10** | **1.20** | **1.09** | **0.000** | **1.04** | **1.14** |
| **Nighttime awakenings** |
|  | Never, rarely |  |  |  |  |  |  |  |  |
|  | Some nights | 0.98 | 0.374 | 0.96 | 1.01 | 0.99 | 0.629 | 0.97 | 1.02 |
|  | Most nights, every | 1.00 | 0.611 | 0.97 | 1.04 | 1.04 | 0.060 | 0.99 | 1.07 |
|  |  | **Total Productivity Impairment**  |
|  |  |  |  |
|  |  | *OR* | *p-value* | *Lower* | *Upper* | *OR* | *p-value* | *Lower* | *Upper* |
| **Caregiving-related awakenings** |
|  | Never, rarely |  |  |  |  |  |  |  |  |
|  | Some nights | 1.05 | 0.248 | 0.97 | 1.13 | 1.02 | 0.659 | 0.93 | 1.11 |
|  | Most nights, every | **1.44** | **0.000** | **1.29** | **1.61** | **1.38** | **0.000** | **1.23** | **1.56** |
| **Nighttime awakenings** |
|  | Never, rarely |  |  |  |  |  |  |  |  |
|  | Some nights | 0.99 | 0.913 | 0.93 | 1.06 | 1.00 | 0.914 | 0.93 | 1.08 |
|  | Most nights, every | 0.99 | 0.846 | 0.91 | 1.08 | 1.06 | 0.266 | 0.96 | 1.17 |
|  |  |  |  |  |  |  |  |  |  |

*Notes*.

Bold indicates statistical significance at the p<.05 level.

Adjusted models included education, gender, relationship status, and self-reported health.

**Supplemental Table 4**

**Generalized linear models examining the relationship between both sleep difficulties (caregiving-related awakenings or nighttime awakenings) and total productivity impairment by work type (N=258).**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
|  |  |  | **Day Workers** |  | **Non-Day Workers** |
|  |  |  | (n=195) |  | (n=64) |
|   |   | **Presenteeism** |
|  |  | *N* | *OR* | *p-value* | *Lower* | *Upper* | *N* | *OR* | *p-value* | *Lower* | *Upper* |
| **Caregiving-related sleep disturbance** |  |  |  |  |  |  |  |  |  |  |
|  | Never, rarely | 153 |  |  |  |  | 50 |  |  |  |  |
|  | Some nights | 30 | 0.99 | 0.759 | 0.92 | 1.06 | 7 | 1.11 | 0.272 | 0.92 | 1.33 |
|  | Most nights, every | **13** | **1.20** | **0.000** | **1.08** | **1.33** | **6** | **1.53** | **0.001** | **1.18** | **1.98** |
| **Nighttime awakenings** |  |  |  |  |  |  |  |  |  |  |
|  | Never, rarely | 119 |  |  |  |  | 37 |  |  |  |  |
|  | Some nights | 53 | 1.00 | 0.916 | 0.95 | 1.06 | 15 | 1.01 | 0.866 | 0.99 | 1.16 |
|  | Most nights, every | 23 | 0.98 | 0.674 | 0.91 | 1.07 | 12 | 1.01 | 0.905 | 0.82 | 1.23 |
|   |   | **Absenteeism** |
|  |  | *N* | *OR* | *p-value* | *Lower* | *Upper* | *N* | *OR* | *p-value* | *Lower* | *Upper* |
| **Caregiving-related sleep disturbance** |  |  |  |  |  |  |  |  |  |  |
|  | Never, rarely | 153 |  |  |  |  | 50 |  |  |  |  |
|  | Some nights | 30 | 1.01 | 0.315 | 0.99 | 1.03 | 7 | 0.95 | 0.479 | 0.85 | 1.08 |
|  | Most nights, every | **13** | **1.03** | **0.014** | **1.01** | **1.06** | **6** | **1.27** | **0.004** | **1.08** | **1.50** |
| **Nighttime awakenings** |  |  |  |  |  |  |  |  |  |  |
|  | Never, rarely | 119 |  |  |  |  | 37 |  |  |  |  |
|  | Some nights | 53 | 1.00 | 0.837 | 0.98 | 1.02 | 15 | 0.96 | 0.324 | 0.88 | 1.04 |
|  | Most nights, every | 23 | 1.02 | 0.161 | 0.99 | 1.04 | 12 | 0.99 | 0.899 | 0.87 | 1.13 |
|   |   | **Total Productivity Impairment** |
|  |  | *N* | *OR* | *p-value* | *Lower* | *Upper* | *N* | *OR* | *p-value* | *Lower* | *Upper* |
| **Caregiving-related sleep disturbance** |  |  |  |  |  |  |  |  |  |  |
|  | Never, rarely | 153 |  |  |  |  | 50 |  |  |  |  |
|  | Some nights | 30 | 0.99 | 0.972 | 0.92 | 1.09 | 7 | 1.06 | 0.608 | 0.83 | 1.35 |
|  | Most nights, every | **13** | **1.24** | **0.000** | **1.10** | **1.40** | **6** | **1.95** | **0.000** | **1.41** | **2.71** |
| **Nighttime awakenings** |  |  |  |  |  |  |  |  |  |  |
|  | Never, rarely | 119 |  |  |  |  | 37 |  |  |  |  |
|  | Some nights | 53 | 1.00 | 0.889 | 0.94 | 1.08 | 15 | 0.97 | 0.716 | 0.81 | 1.15 |
|   | Most nights, every | 23 | 0.99 | 0.967 | 0.90 | 1.10 | 12 | 1.00 | 0.976 | 0.77 | 1.29 |
| *Notes*. Bold indicates statistical significance at the p<.05 level.All models adjust for education, gender, relationship status, and self-reported health. |