

**Supplementary material** to the article "Subjective perceptions of workload and stress of emergency service personnel depending on work-related behavior and experience patterns" by Beatrice Thielmann, Heiko Schumann, Julia Botscharow and Irina Böckelmann (2022) in *Notfall+Rettungsmedizin*. Article and supplementary material are available at [www.springermedizin.de](http://www.springermedizin.de). Please enter the article title in the search there.

## 2a. Most frequent physical stress factors and their evaluation

| stress factor               | "How often or how strongly does this characteristic or factor apply to your work?" |  |  |  |  | $p_{\chi}^2$<br>Pearson | "Does this make you feel physically or mentally stressed or strained?" |                        |                        |                        |                        | $p_{\chi}^2$<br>Pearson |
|-----------------------------|--|--|--|--|--|-------------------------|--|------------------------|------------------------|------------------------|------------------------|-------------------------|
|                             |  | A  | B  | G  | S  |                         |  | A                      | B                      | G                      | S                      |                         |
| inappropriate posture       | never<br>rarely<br>moderately<br>often   | 0(0,0%)<br>6(15,0%)<br>17(42,5%)<br>17(42,5%)  | 0(0,0%)<br>6(22,2%)<br>13(20,6%)<br>28(44,4%)<br>21(33,3%) | 1(1,6%)<br>18(24,0%)<br>31(41,3%)<br>26(34,7%)   | 0(0,0%)<br>18(24,0%)<br>31(41,3%)<br>26(34,7%) | 0,492                   | no<br>yes  | 8(20,0%)<br>32(80,0%)  | 4(14,8%)<br>23(85,2%)  | 17(27,0%)<br>46(73,0%) | 26(34,7%)<br>41(65,3%) | 0,255                   |
| lifting heavy loads         | never<br>rarely<br>moderately<br>often   | 0(0,00%)<br>7(17,5%)<br>20(50,0%)<br>13(32,5%) | 0(0,0%)<br>5(18,5%)<br>14(22,2%)<br>13(48,1%)<br>9(33,3%)  | 1(1,6%)<br>15(20,0%)<br>34(54,0%)<br>14(22,2%)   | 0(0,0%)<br>15(20,0%)<br>37(49,3%)<br>23(30,7%) | 0,959                   | no<br>yes  | 9(22,5%)<br>31(77,5%)  | 4(14,8%)<br>23(85,2%)  | 21(33,3%)<br>42(66,7%) | 24(32,0%)<br>51(68,0%) | 0,241                   |
| carrying heavy loads        | never<br>rarely<br>moderately<br>often   | 0(0,0%)<br>6(15,0%)<br>19(47,5%)<br>15(37,5%)  | 0(0,0%)<br>6(22,2%)<br>12(19,0%)<br>14(51,9%)<br>7(25,9%)  | 2(3,2%)<br>12(17,3%)<br>31(49,2%)<br>18(28,6%)   | 1(1,3%)<br>13(17,3%)<br>39(52,0%)<br>22(29,3%) | 0,949                   | no<br>yes  | 8(20,0%)<br>32(80,0%)  | 4(14,8%)<br>23(85,2%)  | 21(33,3%)<br>42(66,7%) | 26(34,7%)<br>49(65,3%) | 0,047                   |
| physical work               | never<br>rarely<br>moderately<br>often   | 1(2,5%)<br>25(62,5%)<br>14(35,0%)              | 4(14,8%)<br>11(40,7%)<br>12(44,4%)                         | 4(6,3%)<br>47(74,6%)<br>12(19,0%)                | 12(16,0%)<br>47(62,5%)<br>16(21,3%)            | 0,027                   | no<br>yes  | 9(22,5%)<br>31(77,5%)  | 5(18,5%)<br>22(81,5%)  | 23(36,5%)<br>40(63,5%) | 34(45,3%)<br>41(54,7%) | 0,044                   |
| holding heavy loads         | never<br>rarely<br>moderately<br>often   | 1(2,5%)<br>9(22,5%)<br>17(42,5%)<br>13(32,5%)  | 0(0,0%)<br>8(29,6%)<br>12(44,4%)<br>14(22,2%)              | 3(4,8%)<br>18(28,6%)<br>28(44,4%)<br>14(22,2%)   | 3(4,0%)<br>23(30,7%)<br>36(48,0%)<br>13(17,3%) | 0,923                   | no<br>yes  | 10(25,0%)<br>30(75,0%) | 8(29,6%)<br>19(70,4%)  | 26(41,3%)<br>37(58,7%) | 37(49,3%)<br>38(50,7%) | 0,075                   |
| pulling/pushing heavy loads | never<br>rarely<br>moderately<br>often   | 0(0,0%)<br>11(27,5%)<br>17(42,5%)<br>12 30,0%) | 0(0,0%)<br>9(33,3%)<br>10(37,0%)<br>8(29,6%)               | 5(7,9%)<br>20(31,7%)<br>26(41,3%)<br>12(19,0%)   | 4(5,3%)<br>23(30,7%)<br>34(45,3%)<br>14(18,7%) | 0,576                   | no<br>yes  | 11(27,5%)<br>29(72,5%) | 7(25,9%)<br>20(74,1%)  | 30(47,6%)<br>33(52,4%) | 41(54,7%)<br>34(45,3%) | 0,008                   |
| forced posture              | never<br>rarely<br>moderately<br>often   | 1(2,5%)<br>21(52,5%)<br>14(35,0%)<br>4(10,0%)  | 1(3,7%)<br>13(48,1%)<br>12(44,4%)<br>1(3,7%)               | 10(15,9%)<br>26(41,3%)<br>17(27,0%)<br>10(15,9%) | 6(8,0%)<br>38(50,7%)<br>27(36,0%)<br>4(5,3%)   | 0,169                   | no<br>yes  | 17(42,5%)<br>23(57,5%) | 11(40,7%)<br>16(59,3%) | 38(60,3%)<br>25(39,7%) | 47(62,7%)<br>28(37,7%) | 0,115                   |
| lack of exercise            | never<br>rarely<br>moderately  | 2(5,0%)<br>18(45,0%)<br>17(42,5%)              | 0(0,0%)<br>7(25,9%)<br>17(63,0%)                           | 6(9,5%)<br>30(47,6%)<br>16(25,4%)                | 8(10,7%)<br>37(49,3%)<br>21(28,0%)             | 0,043                   | no<br>yes  | 21(52,5%)<br>19(47,5%) | 10(37,0%)<br>17(63,0%) | 38(60,3%)<br>25(39,7%) | 54(72,0%)<br>21(28,0%) | 0,010                   |

|                            |                   |           |           |           |           |  |  |            |           |           |           |           |
|----------------------------|-------------------|-----------|-----------|-----------|-----------|--|--|------------|-----------|-----------|-----------|-----------|
|                            | <i>often</i>      | 3(7,5%)   | 3(11,1%)  | 11(17,5%) | 9(12,0%)  |  |  |            |           |           |           |           |
| overhead work              | <i>never</i>      | 2(5,0%)   | 3(11,1%)  | 18(28,6%) | 15(20,0%) |  |  | <i>no</i>  | 21(52,5%) | 15(55,6%) | 54(85,7%) | 60(80,0%) |
|                            | <i>rarely</i>     | 31(77,5%) | 14(51,9%) | 33(52,4%) | 50(66,7%) |  |  | <i>yes</i> | 19(47,5%) | 12(44,4%) | 9(14,3%)  | 15(20,0%) |
|                            | <i>moderately</i> | 4(10,0%)  | 10(37,0%) | 11(17,5%) | 9(12,0%)  |  |  |            |           |           |           |           |
|                            | <i>often</i>      | 3(7,5%)   | 0(0,0%)   | 1(1,6%)   | 1(1,3%)   |  |  |            |           |           |           |           |
| standing                   | <i>never</i>      | 0(0,0%)   | 0(0,0%)   | 2(3,2%)   | 1(1,3%)   |  |  | <i>no</i>  | 26(65,0%) | 18(66,7%) | 49(77,8%) | 66(88,0%) |
|                            | <i>rarely</i>     | 8(20,0%)  | 11(40,7%) | 15(23,8%) | 18(24,0%) |  |  | <i>yes</i> | 14(35,0%) | 9(33,3%)  | 14(22,2%) | 9(12,0%)  |
|                            | <i>moderately</i> | 22(55,0%) | 8(29,6%)  | 35(55,6%) | 45(60,0%) |  |  |            |           |           |           |           |
|                            | <i>often</i>      | 10(25,0%) | 8(29,6%)  | 11(17,5%) | 11(14,7%) |  |  |            |           |           |           |           |
| sitting                    | <i>never</i>      | 0(0,0%)   | 0(0,0%)   | 1(1,6%)   | 3(4,0%)   |  |  | <i>no</i>  | 29(72,5%) | 20(74,1%) | 51(81,0%) | 66(88,0%) |
|                            | <i>rarely</i>     | 11(27,5%) | 8(29,6%)  | 12(19,0%) | 16(21,3%) |  |  | <i>yes</i> | 11(27,5%) | 7(25,9%)  | 12(19,0%) | 9(12,0%)  |
|                            | <i>moderately</i> | 21(52,5%) | 16(59,3%) | 36(57,1%) | 45(60,0%) |  |  |            |           |           |           |           |
|                            | <i>often</i>      | 8(20,0%)  | 3(11,1%)  | 14(22,2%) | 11(14,7%) |  |  |            |           |           |           |           |
| hand dexterity             | <i>never</i>      | 0(0,0%)   | 0(0,0%)   | 1(1,6%)   | 2(2,7%)   |  |  | <i>no</i>  | 28(70,0%) | 21(77,8%) | 51(81,0%) | 67(89,3%) |
|                            | <i>rarely</i>     | 10(25,0%) | 10(37,0%) | 9(14,3%)  | 10(13,3%) |  |  | <i>yes</i> | 12(30,0%) | 6(22,2%)  | 12(19,0%) | 8(10,7%)  |
|                            | <i>moderately</i> | 16(40,0%) | 12(44,4%) | 17(42,9%) | 41(54,7%) |  |  |            |           |           |           |           |
|                            | <i>often</i>      | 12(35,0%) | 5(18,5%)  | 26(41,3%) | 22(29,3%) |  |  |            |           |           |           |           |
| vibrations,<br>oscillation | <i>never</i>      | 3(7,5%)   | 2(7,4%)   | 21(33,3%) | 14(18,7%) |  |  | <i>no</i>  | 33(82,5%) | 21(77,8%) | 53(84,1%) | 69(92,0%) |
|                            | <i>rarely</i>     | 24(60,0%) | 15(55,6%) | 23(36,5%) | 41(54,7%) |  |  | <i>yes</i> | 7(17,5%)  | 6(22,2%)  | 10(15,9%) | 6(8,0%)   |
|                            | <i>moderately</i> | 12(30,0%) | 6(22,2%)  | 15(23,8%) | 13(17,3%) |  |  |            |           |           |           |           |
|                            | <i>often</i>      | 1(2,5%)   | 4(14,8%)  | 4(6,3%)   | 7(9,3%)   |  |  |            |           |           |           |           |
| walking                    | <i>never</i>      | 0(0,0%)   | 1(3,7%)   | 2(3,2%)   | 2(2,7%)   |  |  | <i>no</i>  | 34(85,0%) | 24(88,9%) | 56(88,9%) | 69(92,0%) |
|                            | <i>rarely</i>     | 16(40,0%) | 9(33,3%)  | 6(9,5%)   | 14(18,7%) |  |  | <i>yes</i> | 6(15,0%)  | 3(11,1%)  | 7(11,1%)  | 5(6,7%)   |
|                            | <i>moderately</i> | 11(27,5%) | 12(44,4%) | 40(63,5%) | 40(53,3%) |  |  |            |           |           |           |           |
|                            | <i>often</i>      | 13(32,5%) | 5(18,5%)  | 15(23,8%) | 19(25,3%) |  |  |            |           |           |           |           |

## 2b: Most frequent organizational and psychological stress factors and their evaluation

| stress factor                               | "How often or how strongly does this characteristic or factor apply to your work?" |  |   |  |  | $p_{\chi^2}$<br>Pearson | "Does this make you feel physically or mentally stressed or strained?" |                        |                        |                        |                        | $p_{\chi^2}$<br>Pearson |
|---|--|--|---|--|--|-------------------------|--|------------------------|------------------------|------------------------|------------------------|-------------------------|
|   |  | A  | B   | G  | S  |                         |  | A                      | B                      | G                      | S                      |                         |
| shift work                                  | never<br>rarely<br>moderately<br>often   | 0(0,0%)<br>0(0,0%)<br>6(15,0%)<br>34(85,0%)    | 0(0,0%)<br>0(0,0%)<br>9(33,3%)<br>18(66,7%)   | 2(3,2%)<br>6(9,5%)<br>8(12,7%)<br>47(74,6%)      | 3(4,0%)<br>1(1,3%)<br>14(18,7%)<br>57(76,0%)     | 0,049                   | no<br>yes  | 10(25,0%)<br>30(75,0%) | 6(22,2%)<br>21(77,8%)  | 28(44,4%)<br>35(55,6%) | 37(49,3%)<br>38(50,7%) | 0,029                   |
| deadline pressure                           | never<br>rarely<br>moderately<br>often   | 1(2,5%)<br>16(40,0%)<br>13(32,5%)<br>10(25,0%) | 1(3,7%)<br>17(63,0%)<br>7(25,9%)<br>2(7,4%)   | 11(17,5%)<br>20(31,7%)<br>20(31,7%)<br>12(19,0%) | 10(13,3%)<br>28(37,3%)<br>22(29,3%)<br>15(20,0%) | 0,127                   | no<br>yes  | 21(52,5%)<br>19(47,5%) | 21(77,8%)<br>6(22,2%)  | 46(73,0%)<br>17(27,0%) | 58(77,3%)<br>17(22,7%) | 0,065                   |
| work on weekends                            | never<br>rarely<br>moderately<br>often   | 1(2,5%)<br>11(27,5%)<br>28(70,0%)              | 2(7,4%)<br>13(48,1%)<br>12(44,4%)             | 5(7,9%)<br>27(42,9%)<br>31(49,2%)                | 9(12,0%)<br>35(46,7%)<br>31(41,3%)               | 0,042                   | no<br>yes  | 9(22,5%)<br>31(77,5%)  | 4(14,8%)<br>23(85,2%)  | 29(46,0%)<br>34(54,0%) | 41(54,7%)<br>34(45,3%) | 0,001                   |
| overtime                                    | never<br>rarely<br>moderately<br>often   | 0(0,0%)<br>8(20,0%)<br>15(37,5%)<br>17(42,5%)  | 0(0,0%)<br>8(29,6%)<br>12(44,4%)<br>7(25,9%)  | 2(3,2%)<br>24(38,1%)<br>28(44,4%)<br>9(14,3%)    | 0(0,0%)<br>30(40,0%)<br>30(40,0%)<br>15(20,0%)   | 0,109                   | no<br>yes  | 8(20,0%)<br>32(80,0%)  | 7(25,9%)<br>20(74,1%)  | 31(49,2%)<br>32(50,8%) | 41(54,7%)<br>34(45,3%) | 0,002                   |
| trouble with superiors                      | never<br>rarely<br>moderately<br>often   | 7(17,5%)<br>19(47,5%)<br>9(22,5%)<br>5(12,5%)  | 0(0,0%)<br>10(37,0%)<br>13(48,1%)<br>4(14,8%) | 20(31,7%)<br>32(50,8%)<br>10(15,9%)<br>1(1,6%)   | 7(9,3%)<br>58(77,3%)<br>8(10,7%)<br>1(1,6%)      | <0,001                  | no<br>yes  | 12(30,0%)<br>28(70,0%) | 4(14,8%)<br>23(85,2%)  | 36(57,1%)<br>27(42,9%) | 53(70,7%)<br>22(29,3%) | <0,001                  |
| trouble with colleagues                     | never<br>rarely<br>moderately<br>often   | 5(12,5%)<br>20(50,0%)<br>11(27,5%)<br>4(10,0%) | 0(0,0%)<br>16(59,3%)<br>10(37,0%)<br>1(3,7%)  | 15(23,8%)<br>37(58,7%)<br>10(15,9%)<br>1(1,6%)   | 7(9,3%)<br>59(78,7%)<br>7(9,3%)<br>2(2,7%)       | 0,001                   | no<br>yes  | 12(30,0%)<br>28(70,0%) | 6(22,2%)<br>21(77,8%)  | 38(60,3%)<br>25(39,7%) | 54(72,0%)<br>21(28,0%) | <0,001                  |
| time pressure                               | never<br>rarely<br>moderately<br>often   | 1(2,5%)<br>9(22,5%)<br>15(37,5%)<br>15(37,5%)  | 0(0,0%)<br>9(33,3%)<br>12(44,4%)<br>6(22,2%)  | 0(0,0%)<br>14(22,2%)<br>29(46,0%)<br>20(31,7%)   | 1(1,3%)<br>14(18,7%)<br>34(45,3%)<br>26(34,7%)   | 0,777                   | no<br>yes  | 17(42,5%)<br>23(57,5%) | 16(59,3%)<br>11(40,7%) | 37(58,7%)<br>26(41,3%) | 46(61,3%)<br>29(38,7%) | 0,241                   |
| responsibility for safety, health of others | never<br>rarely<br>moderately<br>often   | 3(7,5%)<br>13(32,5%)<br>24(60,0%)              | 7(25,9%)<br>12(44,4%)<br>8(29,6%)             | 6(9,5%)<br>15(23,8%)<br>42(66,7%)                | 7(9,3%)<br>28(37,3%)<br>40(53,3%)                | 0,047                   | no<br>yes  | 15(10,9%)<br>25(62,5%) | 11(40,7%)<br>16(59,3%) | 45(71,4%)<br>18(28,6%) | 54(72,0%)<br>21(20,0%) | <0,001                  |
| performance pressure                        | never<br>rarely<br>moderately<br>often   | 1(2,5%)<br>7(17,5%)<br>19(47,5%)<br>13(32,5%)  | 0(0,0%)<br>10(37,0%)<br>16(59,3%)<br>1(3,7%)  | 5(7,9%)<br>22(34,9%)<br>30(47,6%)<br>6(9,5%)     | 9(12,0%)<br>26(34,7%)<br>30(40,0%)<br>10(13,3%)  | 0,012                   | no<br>yes  | 14(35,0%)<br>26(65,0%) | 15(55,6%)<br>12(44,4%) | 46(73,0%)<br>17(27,0%) | 59(78,7%)<br>16(21,3%) | <0,001                  |

|   |  |  |  |  |  |              |           |                        |                        |                        |                        |              |
|---|--|--|--|--|--|--------------|-----------|------------------------|------------------------|------------------------|------------------------|--------------|
| control by superiors                      | never<br>rarely<br>moderately<br>often | 2(5,0%)<br>19(47,5%)<br>16(40,0%)<br>3(7,5%)   | 0(0,0%)<br>13(48,1%)<br>12(44,4%)<br>2(7,4%) | 13(20,6%)<br>32(50,8%)<br>16(25,4%)<br>2(3,2%)   | 5(6,7%)<br>46(61,3%)<br>19(25,3%)<br>5(6,7%)   | <b>0,030</b> | no<br>yes | 19(47,5%)<br>21(52,5%) | 11(40,7%)<br>16(59,3%) | 47(74,6%)<br>16(22,4%) | 62(82,7%)<br>13(17,3%) | <0,001       |
| concentration                             | never<br>rarely<br>moderately<br>often | 0(0,0%)<br>10(25,0%)<br>12(30,0%)<br>18(45,0%) | 0(0,0%)<br>8(29,6%)<br>12(44,4%)<br>7(25,9%) | 0(0,0%)<br>7(11,1%)<br>19(30,2%)<br>37(58,7%)    | 2(2,7%)<br>16(8,0%)<br>42(56,0%)<br>25(33,3%)  | <b>0,005</b> | no<br>yes | 24(60,0%)<br>16(40,0%) | 18(66,7%)<br>9(33,3%)  | 45(71,4%)<br>18(28,6%) | 56(74,7%)<br>19(25,3%) | 0,551        |
| independent decision making               | never<br>rarely<br>moderately<br>often | 5(12,5%)<br>18(45,0%)<br>17(42,5%)             | 7(25,9%)<br>15(55,6%)<br>5(18,5%)            | 2(3,2%)<br>25(39,7%)<br>36(57,1%)                | 9(12,0%)<br>32(42,7%)<br>34(45,3%)             | <b>0,024</b> | no<br>yes | 21(52,5%)<br>19(47,5%) | 16(59,3%)<br>11(40,7%) | 45(71,4%)<br>18(28,6%) | 64(85,3%)<br>11(14,7%) | <b>0,003</b> |
| contemplating                             | never<br>rarely<br>moderately<br>often | 0(0,0%)<br>5(12,5%)<br>13(32,5%)<br>22(55,0%)  | 0(0,0%)<br>6(22,2%)<br>13(48,1%)<br>8(29,6%) | 0(0,0%)<br>1(1,6%)<br>21(33,3%)<br>41(65,1%)     | 1(1,3%)<br>2(2,7%)<br>41(54,7%)<br>31(41,3%)   | <0,001       | no<br>yes | 21(52,5%)<br>19(47,5%) | 20(74,1%)<br>7(25,9%)  | 43(68,3%)<br>20(31,7%) | 63(84,0%)<br>12(16,0%) | <b>0,007</b> |
| interruptions by superiors                | never<br>rarely<br>moderately<br>often | 1(2,5%)<br>22(55,0%)<br>16(40,0%)<br>1(2,5%)   | 1(3,7%)<br>18(66,7%)<br>7(25,9%)<br>1(3,7%)  | 12(19,0%)<br>42(66,7%)<br>9(14,3%)<br>0(0,0%)    | 12(16,0%)<br>47(62,7%)<br>14(18,7%)<br>2(2,7%) | 0,083        | no<br>yes | 20(50,0%)<br>20(50,0%) | 14(51,9%)<br>13(48,1%) | 51(81,0%)<br>12(19,0%) | 68(90,7%)<br>7(9,3%)   | <0,001       |
| independent distribution of labor         | never<br>rarely<br>moderately<br>often | 0(0,0%)<br>13(32,5%)<br>14(35,0%)<br>13(32,5%) | 0(0,0%)<br>13(48,1%)<br>8(29,6%)<br>6(22,2%) | 1(1,6%)<br>5(7,9%)<br>27(42,9%)<br>30(47,6%)     | 4(5,3%)<br>19(25,3%)<br>19(25,3%)<br>33(44,0%) | <b>0,003</b> | no<br>yes | 27(67,5%)<br>13(32,5%) | 21(77,8%)<br>6(22,2%)  | 49(77,8%)<br>14(22,2%) | 69(92,0%)<br>6(8,0%)   | <b>0,021</b> |
| interruptions from colleagues             | never<br>rarely<br>moderately<br>often | 2(5,0%)<br>24(60,0%)<br>12(30,0%)<br>2(5,0%)   | 2(7,4%)<br>20(74,1%)<br>5(18,5%)<br>0(0,0%)  | 8(12,7%)<br>44(69,8%)<br>11(17,5%)<br>0(0,0%)    | 6(8,0%)<br>50(66,7%)<br>19(25,3%)<br>0(0,0%)   | 0,159        | no<br>yes | 33(82,5%)<br>7(17,5%)  | 24(88,9%)<br>3(11,1%)  | 54(85,7%)<br>9(14,3%)  | 69(92,0%)<br>6(8,0%)   | 0,487        |
| interruptions due to machine malfunctions | never<br>rarely<br>moderately<br>often | 7(17,5%)<br>28(70,0%)<br>5(12,5%)<br>0(0,0%)   | 6(22,2%)<br>20(74,1%)<br>1(3,7%)<br>0(0,0%)  | 22(34,9%)<br>35(55,6%)<br>6(9,5%)<br>0(0,0%)     | 32(42,7%)<br>39(52,0%)<br>3(4,0%)<br>1(1,3%)   | 0,124        | no<br>yes | 34(85,0%)<br>6(15,0%)  | 24(88,9%)<br>3(11,1%)  | 54(85,7%)<br>9(14,3%)  | 71(94,7%)<br>4(5,3%)   | 0,159        |
| monotonous work                           | never<br>rarely<br>moderately<br>often | 3(7,5%)<br>24(60,0%)<br>11(27,5%)<br>2(5,0%)   | 2(7,4%)<br>16(59,3%)<br>8(29,6%)<br>1(3,7%)  | 13(20,6%)<br>34(54,0%)<br>11(17,5%)<br>5(7,9%)   | 14(18,7%)<br>42(56,0%)<br>17(22,7%)<br>2(2,7%) | 0,375        | no<br>yes | 31(77,5%)<br>9(22,5%)  | 23(85,2%)<br>4(14,8%)  | 52(82,5%)<br>11(17,5%) | 65(86,7%)<br>10(13,3%) | 0,771        |
| clock-bound work                          | never<br>rarely<br>moderately<br>often | 6(15,0%)<br>18(45,0%)<br>14(35,0%)<br>2(5,0%)  | 6(22,2%)<br>15(55,6%)<br>4(14,8%)<br>2(7,4%) | 12(19,0%)<br>18(28,6%)<br>18(28,6%)<br>15(23,8%) | 24(32,0%)<br>28(37,3%)<br>17(22,7%)<br>6(8,0%) | <b>0,003</b> | no<br>yes | 37(92,5%)<br>3(7,5%)   | 24(88,9%)<br>3(11,1%)  | 55(87,3%)<br>8(12,7%)  | 68(90,7%)<br>7(9,3%)   | 0,838        |
| precise observation                       | never<br>rarely<br>moderately          | 0(0,0%)<br>13(32,5%)<br>18(45,0%)              | 1(3,7%)<br>9(33,3%)<br>10(37,0%)             | 2(3,2%)<br>20(26,7%)<br>27(42,9%)                | 2(2,7%)<br>33(44,0%)                           | 0,439        | no<br>yes | 27(67,5%)<br>13(32,5%) | 20(74,1%)<br>7(25,9%)  | 52(82,5%)<br>11(17,5%) | 61(81,3%)<br>14(18,7%) | 0,216        |

|                                       |                   |           |           |           |           |              |                         |           |           |           |           |              |
|---------------------------------------|-------------------|-----------|-----------|-----------|-----------|--------------|-------------------------|-----------|-----------|-----------|-----------|--------------|
|                                       | <i>often</i>      | 9(22,5%)  | 7(25,9%)  | 24(38,1%) | 20(26,7%) |              |                         |           |           |           |           |              |
| dependence on colleagues' speed       | <i>never</i>      | 0(0,0%)   | 1(3,7%)   | 9(14,3%)  | 4(5,3%)   | 0,254        | <i>no</i><br><i>yes</i> | 27(67,5%) | 23(85,2%) | 50(79,4%) | 68(90,7%) | <b>0,025</b> |
|                                       | <i>rarely</i>     | 16(40,0%) | 14(51,9%) | 21(33,3%) | 34(45,3%) |              |                         | 13(32,5%) | 4(14,8%)  | 13(20,6%) | 7(9,3%)   |              |
|                                       | <i>moderately</i> | 19(47,5%) | 9(33,3%)  | 27(42,9%) | 30(40,0%) |              |                         |           |           |           |           |              |
|                                       | <i>often</i>      | 5(12,5%)  | 3(11,1%)  | 6(9,5%)   | 7(9,3%)   |              |                         |           |           |           |           |              |
| dependence on machines' speed         | <i>never</i>      | 16(40,0%) | 11(40,7%) | 35(55,6%) | 43(57,3%) | 0,117        | <i>no</i><br><i>yes</i> | 39(97,5%) | 26(96,3%) | 58(92,1%) | 73(97,3%) | 0,597        |
|                                       | <i>rarely</i>     | 20(50,0%) | 15(55,6%) | 22(34,9%) | 27(36,0%) |              |                         | 1(2,5%)   | 1(3,7%)   | 5(7,9%)   | 2(2,7%)   |              |
|                                       | <i>moderately</i> | 4(10,0%)  | 1(3,7%)   | 4(6,3%)   | 4(5,3%)   |              |                         | 1(1,3%)   |           |           |           |              |
|                                       | <i>often</i>      | 0(0,0%)   | 0(0,0%)   | 2(3,2%)   |           |              |                         |           |           |           |           |              |
| give instructions                     | <i>never</i>      | 0(0,0%)   | 2(7,4%)   | 1(1,6%)   | 4(5,3%)   | <b>0,014</b> | <i>no</i><br><i>yes</i> | 30(75,0%) | 21(77,8%) | 48(76,2%) | 69(92,0%) | <b>0,029</b> |
|                                       | <i>rarely</i>     | 16(40,0%) | 13(48,1%) | 13(20,6%) | 22(29,3%) |              |                         | 10(25,0%) | 6(22,2%)  | 15(23,8%) | 6(8,0%)   |              |
|                                       | <i>moderately</i> | 17(42,5%) | 12(44,4%) | 34(54,0%) | 41(54,7%) |              |                         |           |           |           |           |              |
|                                       | <i>often</i>      | 7(17,5%)  | 0(0,0%)   | 15(23,8%) | 8(10,7%)  |              |                         |           |           |           |           |              |
| responsibility for machines, material | <i>never</i>      | 0(0,0%)   | 0(0,0%)   | 5(7,9%)   | 4(5,3%)   | <0,001       | <i>no</i><br><i>yes</i> | 28(70,0%) | 23(85,2%) | 51(81,0%) | 66(88,0%) | 0,138        |
|                                       | <i>rarely</i>     | 9(22,5%)  | 13(48,1%) | 4(6,3%)   | 9(12,0%)  |              |                         | 12(30,0%) | 4(14,8%)  | 12(19,0%) | 9(12,0%)  |              |
|                                       | <i>moderately</i> | 18(45,0%) | 8(29,6%)  | 28(44,4%) | 35(46,7%) |              |                         |           |           |           |           |              |
|                                       | <i>often</i>      | 13(32,5%) | 6(22,2%)  | 26(41,3%) | 27(36,0%) |              |                         |           |           |           |           |              |

## 2c. Most frequent stress factors originating from work environment and their evaluation

| stress factor       | "How often or how strongly does this characteristic or factor apply to your work?" |  |   |  |  | $p_{\chi}^2$<br>Pearson | "Does this make you feel physically or mentally stressed or strained?" |                        |                        |                        |                        | $p_{\chi}^2$<br>Pearson |
|---------------------|--|--|---|--|--|-------------------------|--|------------------------|------------------------|------------------------|------------------------|-------------------------|
|                     |  | A  | B   | G  | S  |                         |  | A                      | B                      | G                      | S                      |                         |
| warmth/heat         | never<br>rarely<br>moderately<br>often   | 0(0,0%)<br>16(40,0%)<br>14(35,0%)<br>10(25,0%) | 0(0,0%)<br>6(22,2%)<br>15(55,6%)<br>6(22,2%)  | 3(4,8%)<br>23(36,5%)<br>30(47,6%)<br>7(11,1%)  | 2(2,7%)<br>27(36,0%)<br>34(45,3%)<br>12(16,0%) | 0,538                   | no<br>yes  | 16(40,0%)<br>24(60,0%) | 14(51,9%)<br>13(48,1%) | 40(63,5%)<br>23(36,5%) | 50(66,7%)<br>25(33,3%) | 0,065                   |
| improper lighting   | never<br>rarely<br>moderately<br>often   | 1(2,5%)<br>18(45,0%)<br>14(35,0%)<br>7(17,5%)  | 0(0,0%)<br>8(29,6%)<br>16(59,3%)<br>3(11,1%)  | 5(7,9%)<br>18(28,6%)<br>30(47,6%)<br>10(15,9%) | 4(5,3%)<br>27(36,0%)<br>32(42,7%)<br>12(16,0%) | 0,476                   | no<br>yes  | 17(42,5%)<br>23(57,5%) | 17(63,0%)<br>10(37,0%) | 38(60,3%)<br>25(39,7%) | 51(68,0%)<br>24(32,0%) | 0,125                   |
| risk of accidents   | never<br>rarely<br>moderately<br>often   | 0(0,0%)<br>11(27,5%)<br>14(35,0%)<br>15(37,5%) | 0(0,0%)<br>10(37,0%)<br>8(29,6%)<br>9(33,3%)  | 2(3,2%)<br>16(25,4%)<br>24(38,1%)<br>21(33,3%) | 2(2,7%)<br>15(20,0%)<br>35(46,7%)<br>23(30,7%) | 0,768                   | no<br>yes  | 22(55,0%)<br>18(45,0%) | 16(59,3%)<br>11(40,7%) | 39(61,9%)<br>24(38,1%) | 49(65,3%)<br>26(34,7%) | 0,770                   |
| wetness, humidity   | never<br>rarely<br>moderately<br>often   | 0(0,0%)<br>19(47,5%)<br>14(35,0%)<br>7(17,5%)  | 0(0,0%)<br>11(40,7%)<br>10(37,0%)<br>6(22,2%) | 6(9,5%)<br>24(38,1%)<br>29(46,0%)<br>4(6,3%)   | 3(4,0%)<br>40(53,3%)<br>23(30,7%)<br>9(12,0%)  | 0,088                   | no<br>yes  | 19(47,5%)<br>21(52,5%) | 14(51,9%)<br>13(48,1%) | 44(69,8%)<br>19(30,2%) | 56(74,7%)<br>19(25,3%) | 0,025                   |
| odors, steam        | never<br>rarely<br>moderately<br>often   | 0(0,0%)<br>17(42,5%)<br>12(30,0%)<br>11(27,5%) | 0(0,0%)<br>13(48,1%)<br>8(29,6%)<br>6(22,2%)  | 3(4,8%)<br>21(33,3%)<br>25(39,7%)<br>14(22,2%) | 5(6,7%)<br>30(40,0%)<br>31(41,3%)<br>9(12,0%)  | 0,439                   | no<br>yes  | 18(45,0%)<br>22(55,0%) | 16(59,3%)<br>11(40,7%) | 42(66,7%)<br>21(33,3%) | 54(72,0%)<br>21(28,0%) | 0,005                   |
| noise               | never<br>rarely<br>moderately<br>often   | 0(0,0%)<br>18(45,0%)<br>16(40,0%)<br>6(15,0%)  | 0(0,0%)<br>12(44,4%)<br>9(33,3%)<br>6(22,2%)  | 5(7,9%)<br>24(38,1%)<br>21(33,3%)<br>13(20,6%) | 3(4,0%)<br>31(41,3%)<br>31(41,3%)<br>10(13,3%) | 0,387                   | no<br>yes  | 22(55,0%)<br>18(45,0%) | 16(59,3%)<br>11(40,7%) | 41(66,1%)<br>21(33,9%) | 53(70,7%)<br>22(29,3%) | 0,154                   |
| draft               | never<br>rarely<br>moderately<br>often   | 1(2,5%)<br>23(57,5%)<br>11(27,5%)<br>5(12,5%)  | 0(0,0%)<br>12(44,4%)<br>13(48,1%)<br>2(7,4%)  | 8(12,7%)<br>30(74,6%)<br>21(33,3%)<br>4(6,3%)  | 8(10,7%)<br>37(49,3%)<br>24(32,0%)<br>6(8,0%)  | 0,496                   | no<br>yes  | 24(60,0%)<br>16(40,0%) | 17(63,0%)<br>10(37,0%) | 47(74,6%)<br>16(25,4%) | 60(80,0%)<br>15(20,0%) | 0,154                   |
| chemical substances | never<br>rarely<br>moderately<br>often   | 1(2,5%)<br>15(37,5%)<br>16(40,0%)<br>8(20,0%)  | 0(0,0%)<br>19(70,4%)<br>3(11,1%)<br>5(18,5%)  | 8(12,7%)<br>38(60,3%)<br>13(20,6%)<br>4(6,3%)  | 7(9,3%)<br>44(58,7%)<br>18(24,0%)<br>6(8,0%)   | 0,001                   | no<br>yes  | 22(55,0%)<br>18(45,0%) | 16(59,3%)<br>11(40,7%) | 49(77,8%)<br>14(22,2%) | 59(78,7%)<br>16(21,3%) | 0,015                   |
| dust, dirt          | never<br>rarely<br>moderately<br>often   | 2(5,0%)<br>17(42,5%)<br>14(35,0%)<br>7(17,5%)  | 0(0,0%)<br>16(59,3%)<br>7(25,9%)<br>4(14,8%)  | 8(12,7%)<br>25(39,7%)<br>23(36,5%)<br>7(11,1%) | 7(9,3%)<br>41(54,7%)<br>21(28,0%)<br>6(8,0%)   | 0,395                   | no<br>yes  | 22(55,0%)<br>18(45,0%) | 16(59,3%)<br>11(40,7%) | 51(81,0%)<br>12(19,0%) | 60(80,0%)<br>15(20,0%) | 0,003                   |

