Table S1. Quality assessment checklist for prevalence studies (adapted from Hoy et al. [24])

| Name of author(s): <br> Year of publicaton: <br> Study title: |  |  |  |
| :---: | :---: | :---: | :---: |
| Risk of bias items | Risk of bias levels | Poin | red |
| 1. Was the study's target population a close representation of the national population in relation to relevant variablel, e.g. age, sex, occupation? | Yes (LOW RISK): The study`s target population was a alos representation of the national population. & 0 & 0 \\ \hline & No (HIGH RISK): The study`s target population was clearly NOT representative of the national population. | 1 | 1 |
|  | Yes (LOW RISK): The sampling frame was a true or close representation of the target population. | 0 | 0 |
|  | No (HIGH RISK): The sampling frame was NOT a true or close representation of the target population. | 1 | 1 |
| 3. Was some form of random selection used to select the sample, OR, was a census undertaken? | Yes (LOW RISK): A census was undertaken, OR, some form of random slection was used to select the sample (e.g. simple random sampling, stratified random sampling, cluster sampling, systematic sampling). | 0 | 0 |
|  | No (HIGH RISK): A census was NOT undertaken, AND some form of random slection was NOT used to select the sample. | 1 | 1 |
| 4. Was the likelihood of non-response bias minimal? | Yes (LOW RISK): The response rate for the study was $\geq 75 \%$, OR, an analysis was performed that showed no significant difference in relevant demographic characteristics between responders and nonresponders. | 0 | 0 |
|  | No (HIGH RISK): The response rate was <75\%, and if any analysis comparing responders and non-responders was done, it showed a significant difference in relevant demographic characteristics between responders and non-responders. | 1 | 1 |
| 5. Were data collected directly from the subjects (as opposed to a proxy)? | Yes (LOW RISK): All data were collected directly from the subjects. | 0 | 0 |
|  | No (HIGH RISK): In some instances, data were collected from a proxy. |  |  |
|  |  | 1 | 1 |
| 6. Was an acceptable case definition used in the study? | Yes (LOW RISK): An acceptable case definition was used. | 0 | 0 |
|  | No (HIGH RISK): An acceptable case definition was NOT used. | 1 | 1 |
| 7. Was the study instrument that measured the parameter of interest (e.g. prevalence of low back pain) shown to have reliability and validity (if necessary)? | Yes (LOW RISK): The study instrument had been shown to have reliability and validity (if this was necessary), e.g. test-re- test, piloting, validation in a previous study, etc. | 0 | 0 |
|  | No (HIGH RISK): The study instrument had NOT been shown to have reliability or validity (if this was necessary). | 1 | 1 |
| 8. Was the same mode of data collection used for all subjects? | Yes (LOW RISK): The same mode of data collection was used for all subjects. | 0 | 0 |
|  | No (HIGH RISK): The same mode of data collection was NOT used for all subjects. | 1 | 1 |
| 9. Were the numerator(s) and denominator(s) for the parameter of interest appropriate? | Yes (LOW RISK): The paper presented appropriate numerator(s) AND denominator(s) for the parameter of interest (e.g. the prevalence of low back pain). | 0 | -- |
|  | No (HIGH RISK): The paper did present numerator(s) AND denominator(s) for the parameter of interest but one or more of these were inappropriate. | 1 | -- |
| 10. Summary on the overall risk of study bias | LOW RISK | 0-3 | 0-2 |
|  | MODERATE RISK | 4-6 | 3-5 |
|  | HIGH RISK | 7-9 | 6-8 |

Table S2. Basic characteristics of cross-sectional studies with low and moderate quality comparing chronic physical disorders among self-employed individuals (s-empl) with that of employees (empl)

| Author, publication date | Country/ region of study | Sample size, Female | Age [Mean(SD) or range] | Source population | Occupational groups | Disease outcomes: assessment tools |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| EUROPE |  |  |  |  |  |  |
| Atherton 2007 | Great Britain | $\begin{gathered} 8,952, \\ \text { n.r. } \end{gathered}$ | 45 y | Perinatal mortality register | s-empl (without personnel) vs s-empl (with personnel) vs empl (managerials/professionals) | 1. Blood pressure: three readings <br> 2. Pain: <br> American College of Rheumatology criteria |
| $\begin{gathered} \hline \text { Nikiforow } \\ 1978 \end{gathered}$ | Finland | $\begin{gathered} 3,067 \\ 38.7 \% \end{gathered}$ | $\begin{aligned} & 79.5 \text { y (rural), } \\ & 74.0 \text { y (urban) } \end{aligned}$ | Every inhabitant of Oulu and Yli-li | s-empl vs empl | Absence because of headache: <br> New questionnaire developed for the study |
| $\begin{gathered} \text { Rossignol } \\ 2005 \end{gathered}$ | Canada | $\begin{aligned} & 2,834, \\ & 45.1 \% \end{aligned}$ | 61.8 y (9.3) | Network of primary care all across France in cooperation with physicians | s-empl vs. empl | Osteoarthritis: <br> a) Lequesne questionnaire, <br> b) Dreiser questionnaire |



Table S3. Results of cross-sectional studies with low and moderate quality comparing chronic physical disorders between self-employed individuals (s-empl) with that of employees (empl)

| Author, Publication date | Results |
| :---: | :---: |
| Heart diseases and stroke |  |
| $\begin{aligned} & \text { Min } \\ & 2019 \end{aligned}$ | Stroke s-empl (small employer) vs s-empl (middle to large employer) vs empl [\%]: 0.58 vs. 0.37 vs. 0.14 * <br> Myocardial infarction s-empl(small employer) vs s-empl(middle to large employer) vs empl [\%]: 0.61 vs. 0.62 vs. 0.22 * <br> Angina s-empl (small employer) vs s-empl (middle to large employer) vs empl [\%]: 0.80 vs. 0.75 vs. 0.26 * |
| Non-musculoskeletal disease |  |
| $\begin{aligned} & \text { Min } \\ & 2019 \end{aligned}$ | Hypertension s-empl (small employer) vs s-empl (middle to large employer) vs empl [\%] 11.76 vs. 11.79 vs. 6.70 * <br> Diabetes s-empl (small employer) vs s-empl (middle to large employer) vs empl [\%]: 5.29 vs. 5.11 vs. 2.24 * <br> Dyslipidemia s-empl (small employer) vs s-empl (middle to large employer) vs empl <br> [\%]: 3.79 vs. 5.07 vs. 2.83 * |
| Atherton $2007$ | Chronic widespread pain s-empl vs empl (managerial/professional, ref.) [\%, OR(95\%CI)]: <br> male: 16.3 vs $8.1 ; 2.19$ (1.64, 2.92); female: 16.5 vs 9.4; 1.90 (1.31, 2.76) |
| Lewin-Epstein 1991 | HDL s-empl vs empl [\%, effect of employment status] (\%): $17.6(5.2)$ vs 20.0(7.0), $b=-2.09$ * |
| $\begin{aligned} & \text { Nikiforow } \\ & 1978 \end{aligned}$ | Headache (absence from work) s-empl vs empl [\%]: all: 22 vs 12 ; rural: 23 vs 11 ; urban: 17 vs 13 |
| Musculoskeletal diseases |  |
| Fischer $2012$ | Pain intensity s-empl vs empl [Mean(SD)]: <br> after 1 h solo interpreting: $5.4(2.1)$ vs $5.4(2.4)$ <br> after 1day team interpreting: 5.6(2.4) vs $5.5(2.3)$ <br> at time filling out the survey: $3.4(2.3)$ vs $3.7(2.4)$ |
| Rossignol 2005 | Osteoarthritis s-empl vs empl (construction, mechanics, clothing and food sector) [RR(CI95\%)]: <br> Male: $2.9(2.6-3.3)$ vs $1.9(1.7-2.2)$, female: $5.0(3.9-6.3)$ vs $3.2(2.5-4.1)$ |

* $p \leq 0.05$, vs = versus, $O R=$ odds ratio, $C l=$ confidence interval, $S D=$ standard deviation, $R R=$ rate ratio

