

APPENDIX A. Sleep Quality Index Variables

(1) How much sleep do you get (hours): How much sleep do you get (hours)? The range is 1-11 and is truncated at 12 or more. Response of “I don’t know” or “refused” were considered missing: **sld010h**

(2) How long to fall asleep (min.), 0-50, 60 or more=60: **sld020m**

(3) How often do you snore?, 4-point likert scale: 0=never, 1=Rarely (1-2 nights/week), 2=Occasionally (3-4 nights/week), 3=Frequently (5 or more nights/week): **slq030**

(4) How often do you snort/stop breathing? 4-point likert scale: 0=never, 1=Rarely (1-2 nights/week), 2=Occasionally (3-4 nights/week), 3=Frequently (5 or more nights/week): **slq040**

(5) How often do you have trouble falling asleep? 5-point likert scale: 0=Never, 1=Rarely (1 time a month), 2=Sometimes (2-4 times a month), 3=Often (5-15 times a month), 4=Almost always (16-30 times a month) : **slq080**

(6) How often do you wake up during the night? 5-point likert scale: 0=Never, 1=Rarely (1 time a month), 2=Sometimes (2-4 times a month), 3=Often (5-15 times a month), 4=Almost always (16-30 times a month) : **slq090**

(7) How often do you wake up too early in the morning? 5-point likert scale: 0=Never, 1=Rarely (1 time a month), 2=Sometimes (2-4 times a month), 3=Often (5-15 times a month), 4=Almost always (16-30 times a month) : **slq100**

(8) How often do you feel unrested during the day? 5-point likert scale: 0=Never, 1=Rarely (1 time a month), 2=Sometimes (2-4 times a month), 3=Often (5-15 times a month), 4=Almost always (16-30 times a month) : **slq110**

(9) How often do you feel overly sleepy during the day? 5-point likert scale: 0=Never, 1=Rarely (1 time a month), 2=Sometimes (2-4 times a month), 3=Often (5-15 times a month), 4=Almost always (16-30 times a month) : **slq120**

(10) How often did you not get enough sleep? 5-point likert scale: 0=Never, 1=Rarely (1 time a month), 2=Sometimes (2-4 times a month), 3=Often (5-15 times a month), 4=Almost always (16-30 times a month) : **slq130**

(11) How often do you take pills to help you sleep? 5-point likert scale: 0=Never, 1=Rarely (1 time a month), 2=Sometimes (2-4 times a month), 3=Often (5-15 times a month), 4=Almost always (16-30 times a month) : **slq140**

(12) How often do you have leg jerks while sleeping? 5-point likert scale: 0=Never, 1=Rarely (1 time a month), 2=Sometimes (2-4 times a month), 3=Often (5-15 times a month), 4=Almost always (16-30 times a month) : **slq150**

(13) How often do you have leg cramps while sleeping? 5-point likert scale: 0=Never, 1=Rarely (1 time a month), 2=Sometimes (2-4 times a month), 3=Often (5-15 times a month), 4=Almost always (16-30 times a month) : **slq160**

(14) Do you have difficulty concentrating when tired? 5-point likert scale: 1=Don't do this activity for other reasons, 2=no difficulty, 3=Yes, a little difficulty, 4=Yes, moderate difficulty, 5=yes, extreme difficulty: **slq170**

(15) Do you have difficulty remembering when tired? 5-point likert scale: 1=Don't do this activity for other reasons, 2=no difficulty, 3=Yes, a little difficulty, 4=Yes, moderate difficulty, 5=yes, extreme difficulty: **slq180**

(16) Do you have difficulty eating when tired? 5-point likert scale: 1=Don't do this activity for other reasons, 2=no difficulty, 3=Yes, a little difficulty, 4=Yes, moderate difficulty, 5=yes, extreme difficulty: **slq190**

(17) Do you have difficulty with a hobby when tired? 5-point likert scale: 1=Don't do this activity for other reasons, 2=no difficulty, 3=Yes, a little difficulty, 4=Yes, moderate difficulty, 5=yes, extreme difficulty: **slq200**

(18) Do you have difficulty getting things done when tired? 5-point likert scale: 1=Don't do this activity for other reasons, 2=no difficulty, 3=Yes, a little difficulty, 4=Yes, moderate difficulty, 5=yes, extreme difficulty: **slq210**

(19) Do you have difficulty with finances when tired? 5-point likert scale: 1=Don't do this activity for other reasons, 2=no difficulty, 3=Yes, a little difficulty, 4=Yes, moderate difficulty, 5=yes, extreme difficulty: **slq220**

(20) Do you have difficulty with work when tired? 5-point likert scale: 1=Don't do this activity for other reasons, 2=no difficulty, 3=Yes, a little difficulty, 4=Yes, moderate difficulty, 5=yes, extreme difficulty: **slq230**

(21) Do you have difficulty using the phone when tired? 5-point likert scale: 1=Don't do this activity for other reasons, 2=no difficulty, 3=Yes, a little difficulty, 4=Yes, moderate difficulty, 5=yes, extreme difficulty: **slq240**

APPENDIX B. Reduced factor analysis and factor loading plot

Reduced and rotated factor analysis results with 2-factor extraction:

factor loadings/uniqueeness

	Factor 1	Factor 2	Uniqueness
	Sleepiness and sleep disturbance	Poor sleep-related daytime dysfunction	
sld020m	0.46	-0.04	0.76
slq080	0.72	0.04	0.48
slq090	0.76	0.05	0.43
slq100	0.69	0.06	0.51
slq110	0.73	0.23	0.42
slq120	0.66	0.27	0.49
slq130	0.74	0.20	0.42
slq170	0.38	0.60	0.50
slq180	0.34	0.54	0.59
slq190	0.14	0.43	0.79
slq200	0.15	0.54	0.69
slq210	0.12	0.58	0.65
slq220	0.07	0.56	0.68
slq230	-0.05	0.44	0.80
slq240	0.14	0.53	0.70

Bolded factor loadings are >0.40 and considered significant. Factors are labelled based on highest loadings on measured items.

Factor loading plot

