

Data_management_wave8_Dec2019 - Printed on 23/06/2020 15:19:32

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1 *****
2 * University of Oxford
3 * ELSA
4 * December 2019
5 *****
6
7 *Data: wave_8_elsa_data_eul_v2.dta
8
9 *Variables needed for health comparison from Wave 8
10 *Identifier
11 * idauniq Variable label = Unique individual serial number
12 * idahhw8 Variable label = Analytical wave-specific individual
13 * perid Variable label = Person ID
14 * samptyp Variable label = Sampling status
15 * w8xwgt Variable label = Wave 8 cross-sectional weight
16 * w8indout Variable label = Individual outcome code
17
18 *Demography
19 * Derived variables are denoted with "(D)" at the beginning of the variable label:
20 * indager Variable label = (D) Definitive age variable collapsed at 90+: priority diag,
dhage
21 * indsex Variable label = (D) Definitive sex variable: priority disex, dhsex
22 * fqethnmr Variable label = (D) Ethnicity recoded into white and non-white (consolidated)
23 * wpdes Variable label = Best description of current situation (retired)
24 * dimarr Variable label = (D) Respondent current legal marital status - combined
marriage/civil partnership
25 * estwt Variable label = (D) Weight: final measured or estimated weight (kg)
26
27 *Health-related variables
28 *--Heart problems
29 *Angina
30 * hedawan Variable label = Diagnosed angina fed forward
31 * hedacan Variable label = Whether confirms angina diagnosis
32 * hediman Variable label = Cardiovascular disease: angina diagnosis newly reported
(merged)
33 *Heart attack
34 * hedawmi Variable label = Diagnosed heart attack fed forward
35 * hedacmi Variable label = Whether confirms heart attack diagnosis
36 * hedimmi Variable label = Cardiovascular disease: heart attack diagnosis newly
reported (merged)
37 *Congestive heart failure
38 * hedawhf Variable label = Diagnosed congestive heart failure fed forward
39 * hedachf Variable label = Whether confirms congestive heart failure diagnosis
40 * hedimhf Variable label = Cardiovascular disease: congestive heart failure diagnosis
newly reported (merged)
41 *Heart murmur
42 * hedawhm Variable label = Diagnosed heart murmur fed forward
43 * hedachm Variable label = Whether confirms heart murmur diagnosis
44 * hedimhm Variable label = Cardiovascular disease: heart murmur diagnosis newly
reported (merged)
45 *Abnormal heart rhythm
46 * hedawar Variable label = Diagnosed abnormal heart rhythm fed forward
47 * hedacar Variable label = Whether confirms abnormal heart rhythm diagnosis
48 * hedimar Variable label = Cardiovascular disease: abnormal heart rhythm diagnosis
newly reported (merged)
49 *Other heart disease
50 * hedaw95 Variable label = Diagnosed other heart disease fed forward
51 * hedac95 Variable label = Whether confirms other heart disease diagnosis
52
53 *--Diabetes
54 *Diabetes or high blood sugar
55 * hedawdi Variable label = Diagnosed diabetes or high blood sugar fed forward
56 * hedacdi Variable label = Whether confirms diabetes or high blood sugar diagnosis
57 * hedimdi Variable label = Cardiovascular disease: diabetes or high blood sugar
diagnosis newly reported (merged)
58 *--High blood pressure
59 *High blood pressure
60 * hedawbp Variable label = Diagnosed high blood pressure fed forward
61 * hedacbp Variable label = Whether confirms high blood pressure diagnosis
62 * hedimbp Variable label = Cardiovascular disease: high blood pressure diagnosis newly
reported (merged)
63 *--Stroke
64 *Stroke
65 * hedawst Variable label = Diagnosed stroke fed forward
66 * hedacst Variable label = Whether confirms stroke diagnosis

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67 * hedimst Variable label = Cardiovascular disease: stroke diagnosis newly reported
(merged)
68 *--Arthritis
69 *Arthritis
70 * hedbwar Variable label = Chronic: diagnosed arthritis fed forward
71 * hedbdar Variable label = Whether confirms arthritis diagnosis
72 * hedibar Variable label = Chronic: arthritis diagnosis newly reported
73 *--Osteoporosis
74 *Osteoporosis
75 * hedbwos Variable label = Chronic: diagnosed osteoporosis fed forward
76 * hedbdos Variable label = Whether confirms osteoporosis diagnosis
77 * hedibos Variable label = Chronic: osteoporosis diagnosis newly reported
78 *--Dementia
79 *Dementia
80 * hedbwde Variable label = Chronic: diagnosed dementia fed forward
81 * hedbdde Variable label = Whether confirms dementia diagnosis
82 * hedibde Variable label = Chronic: dementia diagnosis newly reported
83 *--Chronic lung disease
84 *Chronic lung disease
85 * hedbwlu Variable label = Chronic: diagnosed lung disease fed forward
86 * hedbdlu Variable label = Whether confirms lung disease diagnosis
87 * hediblu Variable label = Chronic: lung disease diagnosis newly reported
88 *Asthma
89 * hedbwas Variable label = Chronic: diagnosed asthma fed forward
90 * hedbdas Variable label = Whether confirms asthma diagnosis
91 * hedibas Variable label = Chronic: asthma diagnosis newly reported
92
93 *****
94
95 *Data: wave_8_elsa_data_eul_v2.dta ((IFS derived databaset))
96
97 *Variables needed for health comparison from Wave 8
98 *Identifier
99 * idauniq Variable label = Unique individual serial number
100 * idahhw8 Variable label = Analytical wave-specific individual
101 * w8xwgt Variable label = Wave 8 cross-sectional weight
102
103 *Demography
104 * ageg5 Variable label = age band - 5 year bands (8 way split)
105 * sex Variable label = sex: copy of indsex/dhsex
106 * elsa Variable label = Sampling status
107 * inst Variable label = whether in an institution
108 * nonwhite Variable label = ethnic origin (white/non-white)
109 * marstat Variable label = marital status - couple combined with dimar
110 * smoker Variable label = whether current smoker
111 * smokerstat Variable label = smoker status (past or present)
112
113
114 *****
115 version 15.1
116 clear all
117
118 cd "\Data" /* Change working directory */
119
120 *---REVIEWERS COMMENTS.
121
122 use "wave_8_elsa_data_eul_v2.dta", clear
123 tab indsex
124 /* 8445 */
125
126 keep idauniq idahhw8 perid samptyp w8xwgt indager indsex fqethnmr wpdes dimarr estwt
hedawan hedacan hediman hedawmi hedacmi hedimmi ///
127 hedawhf hedachf hedimhf hedawhm hedachm hedimhm hedawar hedacar hedimar hedaw95
hedac95 hedia95 hedawdi hedacdi hedimdi ///
128 hedawbp hedacbp hedimbp hedawst hedacst hedimst hedbwar hedbdar hedibar hedbwos
hedbdos hedibos ///
129 hedbwde hedbdde hedibde hedbwlu hedbdlu hediblu hedbwas hedbdas hedibas
130
131
132 merge 1:1 idauniq idahhw8 using "wave_8_elsa_ifs_dvs_eul_v1.dta", keepusing(wgt ageg5 sex
elsa inst nonwhite smoker smokerstat)
133 tab _merge
134 drop _merge
135 save "ELSA Comparison.dta",replace
136

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```
137 tab indsex
138 /* 8445 */
139
140 *-----
141 *---EXCLUSION CRITERIA
142 *- 1. Noncore members (elsa=0 or samptyp=)
143 *- 2. Younger than 65 (age<65)
144 *- 3. Living in an institution (inst=1)
145
146 *N=8,445
147
148 *-CORE MEMBERS
149 tab1 elsa samptyp, m
150 tab samptyp elsa
151 *N=7,223
152
153 *-AGE
154 tab ageg5, m
155 *N=5,478
156
157
158 *-LIVING IN A INSTITUTION
159 tab inst, m
160 *N=58
161 *N=8,387
162
163 gen exclusion=1 if inst==1
164 replace exclusion=2 if ageg5<4
165 replace exclusion=3 if elsa==0
166 label var exclusion "Exclusion criteria"
167 label define exclusion 1 "Living in a institution" 2"Aged<65" 3"NoCore Members", replace
168 label values exclusion exclusion
169 tab exclusion, m
170
171
172 keep if exclusion==.
173 *N=5,065
174
175 ***CLEANING AND TRANSFORMING VARIABLES
176
177 *ID
178 rename idauniq id
179 gen psu=id
180
181 *-AGE INTO 5 YEAR BANDS
182 tab ageg5, m
183
184 gen w8age4g=ageg5
185 recode w8age4g 4=1 5=2 6=3 7=4 8=4
186 label var w8age4g "Age into 4 groups"
187 label define w8age4g 1 "65-69" 2 "70-74" 3"75-79" 4"80 or more", replace
188 label values w8age4g w8age4g
189 tab w8age4g, m
190
191 tab w8age4g ageg5, m
192 drop ageg5
193
194 *-SEX
195 tab indsex
196
197 rename indsex w8sex
198
199 *1=male; 2=female
200 label var w8sex "Sex"
201
202 label define w8sex 1 "Male" 2 "Female", replace
203 label values w8sex w8sex
204 tab w8sex
205
206 *-ETHNICITY
207 tab fqethnmr nonwhite, m
208
209 rename fqethnmr w8white
210 recode w8white 1=1 2=0
211
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```
212 *--MARITAL STATUS
213 tab dimarr, m
214 gen w8marstat=0
215 replace w8marstat=1 if dimarr==2 | dimarr==3
216 replace w8marstat=. if dimarr==8
217 label var w8marstat "Current legal marital status - Married/civil partnership yes/no"
218 label define w8marstat 0"Other" 1"Married/civil", replace
219 label values w8marstat w8marstat
220 tab w8marstat
221
222 *--WORK STATUS
223 tab wpdes, m
224
225 gen w8retired=0
226 replace w8retired=1 if wpdes==1
227 label define w8retired 0"Other" 1"Retired", replace
228 label values w8retired w8retired
229 label var w8retired "Best description of current situation - Retired yes/no"
230 tab w8retired
231
232 *--WEIGHT
233 replace estwt=. if estwt<38 /***** CUT-OFF USED IN OPAL study *****/
234
235 rename estwt w8weightKg
236
237 *--SMOKE
238 tab smokerstat smoker
239 tab smokerstat, m
240
241 gen w8smokerstat=.
242 replace w8smokerstat=1 if smokerstat==0
243 replace w8smokerstat=2 if smokerstat==1 | smokerstat==2 | smokerstat==3
244 replace w8smokerstat=3 if smokerstat==4
245 lab define w8smokerstat 1"Never smoker" 2"Ex-smoker" 3"Current smoker", replace
246 label values w8smokerstat w8smokerstat
247 label variable w8smokerstat "Cigarette smoking status"
248
249 tab w8smokerstat, m
250
251 *--HEALTH-RELATED FACTORS
252
253 *Angina: `hedawan`, `hedacan`, `hediman`
254 *Heart attach: `hedawmi`, `hedacmi`, `hedimmi`
255 *Congestion heart failure: `hedawhf`, `hedachf`, `hedimhf`
256 *Heart murmur: `hedawhm`, `hedachm`, `hedimhm`
257 *Abnormal heart rhythm: `hedawar`, `hedacar`, `hedimar`
258 *Other: `hedaw95`, `hedac95`, `hedia95`
259
260 *--ANGINA
261 tab1 hedawan hedacan hediman
262 gen w8angina=0
263 replace w8angina=1 if (hedawan==2 & hedacan==1) | hediman==1
264 replace w8angina=. if hediman<0 & w8angina!=1
265
266 *--HEART ATTACK
267 tab1 hedawmi hedacmi hedimmi
268 gen w8heartattack=0 if hedawmi==1
269 replace w8heartattack=1 if (hedawmi==3 & hedacmi==1) | hedimmi==1
270 replace w8heartattack=. if hedimmi<0 & w8heartattack!=1
271
272 *--CONGESTION HEART FAILURE
273 tab1 hedawhf hedachf hedimhf
274 gen w8heartfailure=0
275 replace w8heartfailure=1 if (hedawhf==4 & hedachf==1) | hedimhf==1
276 replace w8heartfailure=. if hedimhf<0 & w8heartfailure!=1
277
278 *--HEART MURMUR
279 tab1 hedawhm hedachm hedimhm
280 gen w8heartmurmur=0
281 replace w8heartmurmur=1 if (hedawhm==5 & hedachm==1) | hedimhm==1
282 replace w8heartmurmur=. if hedimhm<0 & w8heartmurmur!=1
283
284 *--ABNORMAL HEART RHYTHM
285 tab1 hedawar hedacar hedimar
286 gen w8heartrhythm=0
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287 replace w8heartrhythm=1 if (hedawar==6 & hedacar==1) | hedimar==1
288 replace w8heartrhythm=. if hedimar<0 & w8heartrhythm!=1
289
290 *-OTHER
291 tab1 hedaw95 hedac95 hedia95
292 gen w8otherheartproblem=0
293 replace w8otherheartproblem=1 if (hedaw95==95 & hedac95==1) | hedia95==1
294 replace w8otherheartproblem=. if hedia95<0 & w8otherheartproblem!=1
295
296 *-HEART PROBLEMS
297 gen w8hearttroubles=0
298 replace w8hearttroubles=1 if w8angina==1 | w8heartattack==1 | w8heartfailure==1 |
w8heartmurmur==1 | w8heartrhythm==1 | w8otherheartproblem==1
299 replace w8hearttroubles=. if w8angina==. & w8heartattack==. & w8heartfailure==. &
w8heartmurmur==. & w8heartrhythm==. & w8otherheartproblem==.
300
301 *-DIABETES
302 tab1 hedawdi hedacdi hedimdi
303 gen w8diabetes=0
304 replace w8diabetes=1 if (hedawdi==7 & hedacdi==1) | hedimdi==1
305 replace w8diabetes=. if hedimdi<0 & w8diabetes!=1
306
307 *-HIGH BLOOD PRESSURE
308 tab1 hedawbp hedacbp hedimbp
309 gen w8hbp=0
310 replace w8hbp=1 if (hedawbp==1 & hedacbp==1) | hedimbp==1
311 replace w8hbp=. if hedimbp<0 & w8hbp!=1
312
313 *-STROKE
314 tab1 hedawst hedacst hedimst
315 gen w8stroke=0
316 replace w8stroke=1 if (hedawst==8 & hedacst==1) | hedimst==1
317 replace w8stroke=. if hedimst<0 & w8stroke!=1
318 tab w8stroke
319
320 *-ARTHRITIS
321 tab1 hedbwar hedbdar hedibar
322 gen w8arthritis=0
323 replace w8arthritis=1 if (hedbwar==3 & hedbdar==1) | hedibar==1
324 replace w8arthritis=. if hedibar<0 & w8arthritis!=1
325
326 *-DEMENTIA
327 tab1 hedbwde hedbdde hedibde
328 gen w8dementia=0
329 replace w8dementia=1 if (hedbwde==9 & hedbdde==1) | hedibde==1
330 replace w8dementia=. if hedibde<0 & w8dementia!=1
331
332 *-OSTEOPOROSIS
333 tab1 hedbwos hedbdos hedibos
334 gen w8osp=0
335 replace w8osp=1 if (hedbwos==4 & hedbdos==1) | hedibos==1
336 replace w8osp=. if hedibos<0 & w8osp!=1
337
338 *-CHRONIC LUNG DISEASE
339 tab1 hedbwlu hedbdlu hediblu
340 gen w8lungdisease=0
341 replace w8lungdisease=1 if (hedbwlu==1 & hedbdlu==1) | hediblu==1
342 replace w8lungdisease=. if hediblu<0 & w8lungdisease!=1
343
344 *-ASTHMA
345 tab1 hedbwas hedbdas hedibas
346
347 gen w8asthma=0
348 replace w8asthma=1 if (hedbwas==1 & hedbdas==1) | hedibas==1
349 replace w8asthma=. if hedibas<0 & w8asthma!=1
350
351 *-CHRONIC LUNG DISEASE + ASTHMA
352 gen w8cld=0
353 replace w8cld=1 if w8lungdisease==1 | w8asthma==1
354 replace w8cld=. if w8lungdisease==. & w8asthma==.
355
356 /***** ANALYSIS WITH WEIGHTED DATA *****/
357
358 svyset, clear
359 svyset [pweight=w8xwgt], psu(psu)

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```
360
361
362  /***** FEMALE *****/
363
364  unab xvars: w8white w8marstat w8retired w8smokerstat w8hearttroubles w8diabetes w8hbp
w8stroke w8arthritis w8dementia w8osp w8cld
365  foreach x of local xvars {
366  svy:tab `x' w8age4g if w8sex==2, col per ci
367  }
368
369  *---Weight (Kg)
370  forvalues i = 1/4 {
371  svy:mean w8weightKg if w8sex==2 & w8age4g==`i'
372  }
373
374  *---Unweighted N
375  tab w8age4g if w8sex==2
376
377
378  /***** MALE *****/
379  unab xvars: w8white w8marstat w8retired w8smokerstat w8hearttroubles w8diabetes w8hbp
w8stroke w8arthritis w8dementia w8osp w8cld
380  foreach x of local xvars {
381  svy:tab `x' w8age4g if w8sex==1, col per ci
382  }
383
384  *---Weight (Kg)
385  forvalues i = 1/4 {
386  svy:mean w8weightKg if w8sex==1 & w8age4g==`i'
387  }
388
389  *---Unweighted N
390  tab w8age4g if w8sex==1
391
392
```