
* CR_MDS_FrailtyIndex_short.

* Construction of a Frailty Index short.

* Last updated: 13 August 2015.

* Protocol of Searle et al. 2008 "A standard procedure for creating a frailty index" BMC Geriatrics.

Psych sub-scale

IF (T0_PW_NERV = 6) FI_nerv=0.

IF (T0_PW_NERV = 5) FI_nerv=0.2.

IF (T0_PW_NERV = 4) FI_nerv=0.4.

IF (T0_PW_NERV = 3) FI_nerv=0.6.

IF (T0_PW_NERV = 2) FI_nerv=0.8.

IF (T0_PW_NERV = 1) FI_nerv=1.

EXECUTE.

IF (T0_PW_BLUE = 6) FI_blue=0.

IF (T0_PW_BLUE = 5) FI_blue=0.2.

IF (T0_PW_BLUE = 4) FI_blue=0.4.

IF (T0_PW_BLUE = 3) FI_blue=0.6.

IF (T0_PW_BLUE = 2) FI_blue=0.8.

IF (T0_PW_BLUE = 1) FI_blue=1.

EXECUTE.

IF (T0_PW_DOWN = 6) FI_down=0.

IF (T0_PW_DOWN = 5) FI_down=0.2.

IF (T0_PW_DOWN = 4) FI_down=0.4.

IF (T0_PW_DOWN = 3) FI_down=0.6.

IF (T0_PW_DOWN = 2) FI_down=0.8.

IF (T0_PW_DOWN = 1) FI_down=1.

EXECUTE.

IF (T0_PW_CALM = 6) FI_calm=1.

IF (T0_PW_CALM = 5) FI_calm=0.8.

IF (T0_PW_CALM = 4) FI_calm=0.6.

IF (T0_PW_CALM = 3) FI_calm=0.4.

IF (T0_PW_CALM = 2) FI_calm=0.2.

IF (T0_PW_CALM = 1) FI_calm=0.

EXECUTE.

IF (T0_PW_HAPPY = 6) FI_happy=1.

IF (T0_PW_HAPPY = 5) FI_happy=0.8.

IF (T0_PW_HAPPY = 4) FI_happy=0.6.

IF (T0_PW_HAPPY = 3) FI_happy=0.4.

IF (T0_PW_HAPPY = 2) FI_happy=0.2.

IF (T0_PW_HAPPY = 1) FI_happy=0.

EXECUTE.

****EQ-5D+C****

IF (T0_EQ5MO = 1) FI_EQ_mob=0.

IF (T0_EQ5MO = 2) FI_EQ_mob=0.5.

IF (T0_EQ5MO = 3) FI_EQ_mob=1.

EXECUTE.

IF (T0_EQ5SC = 1) FI_EQ_selfcare=0.

IF (T0_EQ5SC = 2) FI_EQ_selfcare=0.5.

IF (T0_EQ5SC = 3) FI_EQ_selfcare=1.

EXECUTE.

IF (T0_EQ5ACT= 1) FI_EQ_act=0.

IF (T0_EQ5ACT = 2) FI_EQ_act=0.5.

IF (T0_EQ5ACT = 3) FI_EQ_act=1.

EXECUTE.

IF (T0_EQ5PAIN= 1) FI_EQ_pain=0.

IF (T0_EQ5PAIN = 2) FI_EQ_pain=0.5.

IF (T0_EQ5PAIN = 3) FI_EQ_pain=1.

EXECUTE.

IF (T0_EQ5ANX= 1) FI_EQ_mood=0.

IF (T0_EQ5ANX = 2) FI_EQ_mood=0.5.

IF (T0_EQ5ANX = 3) FI_EQ_mood=1.

EXECUTE.

IF (T0_EQ5C= 1) FI_EQ_cog=0.

IF (T0_EQ5C = 2) FI_EQ_cog=0.5.

IF (T0_EQ5C = 3) FI_EQ_cog=1.

EXECUTE.

Social functioning and self-reported health

IF (T0_SOCFUNC = 5) FI_SocFunc=0.

IF (T0_SOCFUNC = 4) FI_SocFunc=0.25.

IF (T0_SOCFUNC = 3) FI_SocFunc=0.50.

IF (T0_SOCFUNC = 2) FI_SocFunc=0.75.

IF (T0_SOCFUNC = 1) FI_SocFunc=1.

EXECUTE.

IF (T0_HEALTH1 = 5) FI_Health1=1.

IF (T0_HEALTH1 = 4) FI_Health1=0.75.

IF (T0_HEALTH1 = 3) FI_Health1=0.50.

IF (T0_HEALTH1 = 2) FI_Health1=0.25.

IF (T0_HEALTH1 = 1) FI_Health1=0.

EXECUTE.

IF (T0_HEALTH2 = 5) FI_Health2=1.

IF (T0_HEALTH2 = 4) FI_Health2=0.75.

IF (T0_HEALTH2 = 3) FI_Health2=0.50.

IF (T0_HEALTH2 = 2) FI_Health2=0.25.

IF (T0_HEALTH2 = 1) FI_Health2=0.

EXECUTE.

*Above constructed variables same as long FI variables.

***COMPUTE FRAILITY INDEX.

Short frailty index.

```
COMPUTE FI_short_missing_number=NMISS(TO_KATZ_BRUSH,  
    TO_KATZ_WALK, TO_KATZ_TEL, TO_KATZ_TRAVEL, TO_KATZ_SHOP ,  
    TO_KATZ_FEED, TO_KATZ_HH, TO_KATZ_MED, TO_KATZ_FIN, FI_nerv, FI_blue, FI_down, FI_calm,  
    FI_happy,  
    FI_EQ_mob, FI_EQ_selfcare, FI_EQ_act, FI_EQ_pain, FI_EQ_mood, FI_EQ_cog, FI_SocFunc,  
    FI_Health1, FI_Health2).  
EXECUTE.
```

```
COMPUTE Frailty_short_total = sum(TO_KATZ_BRUSH,  
    TO_KATZ_WALK, TO_KATZ_TEL, TO_KATZ_TRAVEL, TO_KATZ_SHOP ,  
    TO_KATZ_FEED, TO_KATZ_HH, TO_KATZ_MED, TO_KATZ_FIN, FI_nerv, FI_blue, FI_down, FI_calm,  
    FI_happy,  
    FI_EQ_mob, FI_EQ_selfcare, FI_EQ_act, FI_EQ_pain, FI_EQ_mood, FI_EQ_cog, FI_SocFunc,  
    FI_Health1, FI_Health2).  
EXECUTE.
```

Establish a minimum number of permissible missing deficits.

***NOTE! Previous research has identified improved predicative validity with inclusion of 30 deficits (see Searle et al. 2008 above).

Adjustment of base for missing data.

```
IF (FI_short_missing_number <= 3) FI_short_corrected=  
    Frailty_short_total/(23-FI_short_missing_number).  
EXECUTE.
```