

Supplementary 1 – Operational details of the proportional weighting method

As the survey oversampled older adults and females, weighting factors were adopted to compensate for this bias. Proportional weight was computed from a crosstab of age by gender to adjust for multiple population characteristics. Proportional weighting was adopted to adjust the weight for each case so that the weighted sample distribution aligned with the general population for age and gender. Cases in oversampled groups received a proportional weight <1 while proportional weight >1 was assigned to cases in under-sampled group. Cases received a proportional weight of 1 if that group was represented in the sample with the same proportion as in the general population. Proportional weighting inflated under-sampled cases, and deflated the over-sampled ones. This weight variable was then used in all analyses of the data. Data were weighted prior to performing any analysis including t-test, chi-square test, logistic regression, and path analysis.

Supplementary 2 – Table. Original and weighted demographic and socioeconomic characteristics

| | Original % | Weighted % * |
|---------------------------------------|-------------|--------------|
| Age (year) | | |
| 18-30 | 67 (8.9%) | 133 (17.7%) |
| 31-40 | 73 (9.7%) | 136 (18.1%) |
| 41-50 | 135 (18.0%) | 133 (17.7%) |
| 51-60 | 135 (18.0%) | 144 (19.1%) |
| 61-70 | 153 (20.3%) | 113 (15.0%) |
| 71-80 | 111 (14.8%) | 54 (7.1%) |
| 81 or above | 78 (10.4%) | 40 (5.3%) |
| Sex | | |
| Male | 274 (36.4%) | 336 (44.7%) |
| Female | 478 (63.6%) | 416 (55.3%) |
| Marital status | | |
| Never married | 112 (14.9%) | 188 (25.0%) |
| Married / Cohabit | 534 (71.0%) | 493 (65.6%) |
| Separated / Divorced / Widowed | 106 (14.1%) | 71 (9.4%) |
| Number of people within the household | | |
| 1 | 81 (10.8%) | 60 (8.0%) |
| 2 | 192 (25.5%) | 156 (20.7%) |
| 3 | 89 (11.8%) | 94 (12.4%) |
| 4 | 177 (23.5%) | 198 (26.4%) |
| 5 | 144 (19.1%) | 165 (21.9%) |
| 6 or above | 69 (9.2%) | 79 (10.6%) |
| Education level | | |
| Primary or below | 255 (34.2%) | 167 (22.4%) |
| Secondary | 352 (47.2%) | 351 (47.1%) |
| Tertiary or above | 138 (18.5%) | 228 (30.6%) |
| Social security | | |
| Yes | 265 (35.2%) | 157 (20.8%) |
| No | 487 (64.8%) | 595 (79.2%) |
| Place of birth | | |
| Hong Kong | 375 (49.9%) | 426 (56.7%) |
| Others | 376 (50.1%) | 325 (43.3%) |
| Income-poverty | | |
| Non-income-poor | 409 (62.3%) | 489 (73.7%) |
| Income-poor | 247 (37.7%) | 174 (26.3%) |
| Deprivation | | |
| Non-deprived | 570 (75.8%) | 592 (78.7%) |
| Deprived | 182 (24.2%) | 160 (21.3%) |

* Weighted according to the census data in terms of age and sex (mid 2019 HK population)

Supplementary 3 – Table. Association of demographic, socioeconomic characteristics, and current economic activity status by HRQOL and negative COVID-19-related issues

| | HRQOL | | | | Negative COVID-19-related issues | | | | | | | | |
|----------------------------------|----------|----------------|----------------|----------------|----------------------------------|----------------|----------------|------------------------------------|---|----------------|---|-----------------|----------------|
| | SF-12 | | p ^a | | Worry of COVID-19 | | | Change of economic activity status | | | Current face mask reserves in the household | | |
| | PCS | p ^a | MCS | p ^a | Neutral / Not worried | Worried | p ^b | No | Unemployed / Insufficient working hours / Uncertain working hours | p ^b | 1 month or more | 3 weeks or less | p ^b |
| Age (year) | | <0.001 | | <0.001 | | | 0.766 | | | <0.001 | | | <0.001 |
| 18-30 | 54.3±4.3 | | 60.4±8.4 | | 54 (16.9%) | 79 (18.2%) | | 110 (17.9%) | 23 (17.6%) | | 127 (20.3%) | 2 (2.9%) | |
| 31-40 | 53.2±5.7 | | 58.6±10.1 | | 50 (15.7%) | 86 (19.9%) | | 110 (17.9%) | 25 (19.1%) | | 123 (19.6%) | 9 (13.2%) | |
| 41-50 | 54.8±5.5 | | 57.6±9.0 | | 59 (18.5%) | 74 (17.1%) | | 90 (14.7%) | 39 (29.8%) | | 110 (17.5%) | 13 (19.1%) | |
| 51-60 | 52.6±7.5 | | 57.1±9.3 | | 67 (21.0%) | 77 (17.8%) | | 111 (18.1%) | 31 (23.7%) | | 124 (19.8%) | 12 (17.6%) | |
| 61-70 | 50.6±9.9 | | 55.4±7.5 | | 50 (15.7%) | 63 (14.5%) | | 99 (16.2%) | 12 (9.2%) | | 85 (13.6%) | 15 (22.1%) | |
| 71-80 | 51.4±7.5 | | 53.7±7.1 | | 22 (6.9%) | 31 (7.2%) | | 53 (8.6%) | 1 (0.8%) | | 37 (5.9%) | 11 (16.2%) | |
| 81 or above | 45.7±9.7 | | 54.0±7.7 | | 17 (5.3%) | 23 (5.3%) | | 40 (6.5%) | 0 (0%) | | 21 (3.3%) | 6 (8.8%) | |
| Sex | | 0.001 | | 0.062 | | | 0.001 | | | 0.143 | | | 0.376 |
| Male | 51.7±6.9 | | 58.1±9.0 | | 164 (51.4%) | 172 (39.7%) | | 265 (43.4%) | 66 (50.4%) | | 283 (45.1%) | 35 (50.7%) | |
| Female | 53.4±7.5 | | 56.8±8.9 | | 155 (48.6%) | 261 (60.3%) | | 346 (56.6%) | 65 (49.6%) | | 344 (54.9%) | 34 (49.3%) | |
| Marital status | | <0.001 | | <0.001 | | | 0.434 | | | 0.953 | | | 0.002 |
| Never married | 53.7±5.2 | | 60.6±8.0 | | 81 (25.4%) | 107 (24.7%) | | 156 (25.5%) | 32 (24.2%) | | 171 (27.3%) | 8 (11.4%) | |
| Married / Cohabit | 52.7±7.5 | | 56.9±8.9 | | 213 (66.8%) | 280 (64.7%) | | 398 (65.0%) | 87 (65.9%) | | 406 (64.8%) | 50 (71.4%) | |
| Separated / Divorced / Widowed | 49.4±9.4 | | 52.6±9.1 | | 25 (7.8%) | 46 (10.6%) | | 58 (9.5%) | 13 (9.8%) | | 50 (8.0%) | 12 (17.1%) | |
| Education level | | <0.001 | | <0.001 | | | 0.164 | | | 0.005 | | | 0.003 |
| Primary or below | 50.1±8.7 | | 54.3±8.2 | | 61 (19.4%) | 106 (24.6%) | | 146 (24.1%) | 18 (14.0%) | | 123 (19.7%) | 21 (30.9%) | |
| Secondary | 52.9±7.5 | | 57.6±8.3 | | 159 (50.5%) | 192 (44.5%) | | 267 (44.1%) | 76 (58.9%) | | 289 (46.3%) | 37 (54.4%) | |
| Tertiary or above | 54.1±5.2 | | 59.3±10.0 | | 95 (30.2%) | 133 (30.9%) | | 193 (31.8%) | 35 (27.1%) | | 212 (34.0%) | 10 (14.7%) | |
| Income-poverty | | <0.001 | | <0.001 | | | 0.820 | | | 0.747 | | | <0.001 |
| Non-income-poor | 53.5±6.4 | | 58.2±9.0 | | 210 (74.2%) | 279 (73.4%) | | 394 (73.8%) | 91 (75.2%) | | 440 (78.0%) | 35 (57.4%) | |
| Income-poor | 49.6±9.3 | | 54.8±9.0 | | 73 (25.8%) | 101 (26.6%) | | 140 (26.2%) | 30 (24.8%) | | 124 (22.0%) | 26 (42.6%) | |
| Current economic activity status | | <0.001 | | <0.001 | | | 0.336 | | | <0.001 | | | 0.003 |
| Full time employee | 53.3±6.3 | | 59.1±8.7 | | 139 (43.4%) | 187 (43.2%) | | 268 (43.9%) | 58 (43.9%) | | 296 (47.1%) | 19 (27.5%) | |
| Part time employee | 53.2±6.9 | | 57.2±9.9 | | 19 (5.9%) | 35 (8.1%) | | 24 (3.9%) | 30 (22.7%) | | 45 (7.2%) | 4 (5.8%) | |
| Self employed | 52.7±8.4 | | 56.5±9.9 | | 15 (4.7%) | 17 (3.9%) | | 17 (2.8%) | 15 (11.4%) | | 26 (4.1%) | 6 (8.7%) | |

| | | | | | | | | |
|---|-----------|-----------|----------------|----------------|----------------|----------------|----------------|---------------|
| Unemployed | 52.3±6.7 | 54.6±11.7 | 17 (5.3%) | 28 (6.5%) | 6 (1.0%) | 29 (22.0%) | 35 (5.6%) | 1 (1.4%) |
| Retired | 49.8±9.0 | 54.9±7.8 | 70 (21.9%) | 71 (16.4%) | 140 (23.0%) | 0 (0%) | 101 (16.1%) | 20 (29.0%) |
| Student / Homemaker / Permanently sick or disabled | 53.7±7.0 | 57.2±8.4 | 60 (18.8%) | 95 (21.9%) | 155 (25.4%) | 0 (0%) | 125 (19.9%) | 19 (27.5%) |
| Categories of family members | | | | | | | | |
| 17 to 64 years old, with chronic illnesses or disabilities | 0.006 | 0.015 | | | 0.123 | | 0.800 | 0.428 |
| 0 | 52.9±6.8 | 57.6±8.7 | 310 (97.2%) | 411 (94.9%) | 586 (95.9%) | 125 (95.4%) | 604 (96.2%) | 65 (94.2%) |
| 1 - 2 | 46.0±13.1 | 51.7±12.7 | 9 (2.8%) | 22 (5.1%) | 25 (4.1%) | 6 (4.6%) | 24 (3.8%) | 4 (5.8%) |

^a Two samples t test or one-way ANOVA for HRQOL; ^b Chi Square test for negative COVID-19-related issues