

# THE LANCET

## Supplementary appendix

This appendix formed part of the original submission and has been peer reviewed. We post it as supplied by the authors.

Supplement to: Banerjee A, Pasea L, Harris S, et al. Estimating excess 1-year mortality associated with the COVID-19 pandemic according to underlying conditions and age: a population-based cohort study. *Lancet* 2020; published online May 12. [http://dx.doi.org/10.1016/S0140-6736\(20\)30854-0](http://dx.doi.org/10.1016/S0140-6736(20)30854-0).

**Suppl Table 1. High-risk mortality groups for COVID-19 infection in 3,862,012 individuals by age and gender.**

	<b>Men Age ≤70 years N=1696728</b>	<b>Men Age&gt;70 years N=207349</b>	<b>Women Age≤70 years N=1634552</b>	<b>Women Age&gt;70 years N=323383</b>
<b>Demographics</b>				
Age (years), mean (SD)	43.5 (11.66)	78.1 (6.11)	43.5 (11.91)	80.2 (7.03)
IMD quintile				
1 (Least deprived)	384993 (22.7)	45735 (22.1)	382183 (23.4)	69913 (21.6)
2	368204 (21.7)	47890 (23.1)	362914 (22.2)	74205 (22.9)
3	353908 (20.9)	45247 (21.8)	344154 (21.1)	71130 (22)
4	317818 (18.7)	37921 (18.3)	298922 (18.3)	59482 (18.4)
5 (Most deprived)	270037 (15.9)	30326 (14.6)	244771 (15)	48276 (14.9)
Practice region				
East Midlands	54965 (3.2)	6669 (3.2)	51993 (3.2)	9924 (3.1)
East Of England	196981 (11.6)	23810 (11.5)	188834 (11.6)	36366 (11.2)
London	297576 (17.5)	27188 (13.1)	289471 (17.7)	43033 (13.3)
North East	33062 (1.9)	4134 (2)	31491 (1.9)	6241 (1.9)
North West	230831 (13.6)	26459 (12.8)	217496 (13.3)	42577 (13.2)
South Central	218027 (12.8)	26705 (12.9)	210615 (12.9)	42158 (13)
South East Coast	213015 (12.6)	28402 (13.7)	208722 (12.8)	43896 (13.6)
South West	203035 (12)	31265 (15.1)	197035 (12.1)	47706 (14.8)
West Midlands	183652 (10.8)	23857 (11.5)	173924 (10.6)	37433 (11.6)
Yorkshire & The Humber	65584 (3.9)	8860 (4.3)	64971 (4)	14049 (4.3)
<b>Risk factors recommended for social isolation</b>				
CVD	45650 (2.7)	38158 (18.4)	29668 (1.8)	45593 (14.1)
Diabetes (any type)	42901 (2.5)	17928 (8.6)	29791 (1.8)	21048 (6.5)
Chronic kidney disease	8202 (0.5)	15036 (7.3)	10136 (0.6)	26023 (8)
COPD	8990 (0.5)	9763 (4.7)	7475 (0.5)	8778 (2.7)
BMI>40*	8241 (1.9)	443 (0.7)	21042 (3.7)	1447 (1.6)
Corticosteroid rx	28935 (1.7)	12215 (5.9)	43894 (2.7)	20934 (6.5)
N risk factors				
0	1574734 (92.8)	138916 (67)	1512639 (92.5)	229571 (71)
1	104205 (6.1)	48663 (23.5)	104972 (6.4)	69704 (21.6)
2	15049 (0.9)	15217 (7.3)	14230 (0.9)	19082 (5.9)
≥3	2740 (0.2)	4553 (2.2)	2711 (0.2)	5026 (1.6)
<b>Other risk factors</b>				
Hypertension	134650 (7.9)	66955 (32.3)	113473 (6.9)	101135 (31.3)
ACE inhibitor rx	73513 (4.3)	38847 (18.7)	50299 (3.1)	52263 (16.2)
NSAID rx	204502 (12.1)	40412 (19.5)	262563 (16.1)	71611 (22.1)

\*BMI data available for 425782, 65549, 567034 and 89631 patients in the respective categories

**Suppl Table 2: High-risk mortality groups for COVID-19 infection in 3,862,012 individuals by underlying cardiovascular disease, diabetes, chronic kidney disease and chronic obstructive pulmonary disease.**

	No CVD N=3702943	CVD N=159069	No DM N=3750344	DM N=111668	No CKD N=3802615	CKD N=59397	No COPD N=3827006	COPD N=35006
<b>Demographics</b>								
Age (years), mean (SD)	47.5 (16.2)	68.9 (15.1)	48.0 (16.5)	62.5 (15.8)	48.0 (16.4)	74.5 (13.9)	48.2 (16.6)	70.0 (12.0)
Women	1882674 (50.8)	75261 (47.3)	1907096 (50.9)	50839 (45.5)	1921776 (50.5)	36159 (60.9)	1941682 (50.7)	16253 (46.4)
IMD quintile								
1 (Least deprived)	852344 (23)	30480 (19.2)	863864 (23)	18960 (17)	870934 (22.9)	11890 (20)	878254 (22.9)	4570 (13.1)
2	818130 (22.1)	35083 (22.1)	830392 (22.1)	22821 (20.4)	839787 (22.1)	13426 (22.6)	847030 (22.1)	6183 (17.7)
3	780150 (21.1)	34289 (21.6)	790522 (21.1)	23917 (21.4)	801513 (21.1)	12926 (21.8)	807186 (21.1)	7253 (20.7)
4	683280 (18.5)	30863 (19.4)	690516 (18.4)	23627 (21.2)	702791 (18.5)	11352 (19.1)	706051 (18.4)	8092 (23.1)
5 (Most deprived)	565213 (15.3)	28197 (17.7)	571159 (15.2)	22251 (19.9)	583638 (15.3)	9772 (16.5)	584546 (15.3)	8864 (25.3)
Practice region								
East Midlands	117034 (3.2)	6517 (4.1)	120284 (3.2)	3267 (2.9)	122424 (3.2)	1127 (1.9)	122539 (3.2)	1012 (2.9)
East Of England	428720 (11.6)	17271 (10.9)	434154 (11.6)	11837 (10.6)	440118 (11.6)	5873 (9.9)	442772 (11.6)	3219 (9.2)
London	638219 (17.2)	19049 (12)	635511 (16.9)	21757 (19.5)	645274 (17)	11994 (20.2)	652256 (17)	5012 (14.3)
North East	70863 (1.9)	4065 (2.6)	73103 (1.9)	1825 (1.6)	74157 (2)	771 (1.3)	73814 (1.9)	1114 (3.2)
North West	491655 (13.3)	25708 (16.2)	502994 (13.4)	14369 (12.9)	509907 (13.4)	7456 (12.6)	510965 (13.4)	6398 (18.3)
South Central	478376 (12.9)	19129 (12)	483848 (12.9)	13657 (12.2)	490230 (12.9)	7275 (12.2)	493624 (12.9)	3881 (11.1)
South East Coast	475437 (12.8)	18598 (11.7)	478353 (12.8)	15682 (14)	486524 (12.8)	7511 (12.6)	489787 (12.8)	4248 (12.1)
South West	455024 (12.3)	24017 (15.1)	464293 (12.4)	14748 (13.2)	470063 (12.4)	8978 (15.1)	474405 (12.4)	4636 (13.2)
West Midlands	401024 (10.8)	17842 (11.2)	407566 (10.9)	11300 (10.1)	412622 (10.9)	6244 (10.5)	414886 (10.8)	3980 (11.4)
Yorkshire & The Humber	146591 (4)	6873 (4.3)	150238 (4)	3226 (2.9)	151296 (4)	2168 (3.7)	151958 (4)	1506 (4.3)
<b>Risk factors recommended for social isolation</b>								
CVD	0 (0)	159069 (100)	139671 (3.7)	19398 (17.4)	142439 (3.7)	16630 (28)	149642 (3.9)	9427 (26.9)
Diabetes (any type)	92270 (2.5)	19398 (12.2)	0 (0)	111668 (100)	98536 (2.6)	13132 (22.1)	107908 (2.8)	3760 (10.7)
Chronic kidney disease	42767 (1.2)	16630 (10.5)	46265 (1.2)	13132 (11.8)	0 (0)	59397 (100)	56039 (1.5)	3358 (9.6)
COPD	25579 (0.7)	9427 (5.9)	31246 (0.8)	3760 (3.4)	31648 (0.8)	3358 (5.7)	0 (0)	35006 (100)
BMI>40*	28849 (2.7)	2324 (2.9)	25456 (2.4)	5717 (6.9)	30006 (2.7)	1167 (3.4)	30583 (2.7)	590 (3.3)
Corticosteroid rx	93768 (2.5)	12210 (7.7)	99573 (2.7)	6405 (5.7)	100144 (2.6)	5834 (9.8)	91539 (2.4)	14439 (41.2)
<b>N risk factors</b>								
0	3455860 (93.3)	0 (0)	3455860 (92.1)	0 (0)	3455860 (90.9)	0 (0)	3455860 (90.3)	0 (0)
1	214287 (5.8)	113257 (71.2)	252996 (6.7)	74548 (66.8)	297877 (7.8)	29667 (49.9)	314831 (8.2)	12713 (36.3)
2	29714 (0.8)	33864 (21.3)	35760 (1)	27818 (24.9)	42380 (1.1)	21198 (35.7)	48624 (1.3)	14954 (42.7)
≥3	3082 (0.1)	11948 (7.5)	5728 (0.2)	9302 (8.3)	6498 (0.2)	8532 (14.4)	7691 (0.2)	7339 (21)
<b>Other risk factors</b>								
Hypertension	332751 (9)	83462 (52.5)	355583 (9.5)	60630 (54.3)	378532 (10)	37681 (63.4)	402966 (10.5)	13247 (37.8)
ACE inhibitor rx	162700 (4.4)	52222 (32.8)	172910 (4.6)	42012 (37.6)	191583 (5)	23339 (39.3)	207045 (5.4)	7877 (22.5)
NSAID rx	542395 (14.6)	36693 (23.1)	553123 (14.7)	25965 (23.3)	565096 (14.9)	13992 (23.6)	571656 (14.9)	7432 (21.2)

\*BMI data available for 1067854 patients with no CVD, 80142 patients with CVD, 1064775 with no DM, 83221 with DM, 1113396 with no CKD, 34600 with CKD, 1130189 with no COPD and 17807 with COPD

*COPD: Chronic obstructive pulmonary disease, CKD: Chronic kidney disease, CVD: cardiovascular disease, DM: diabetes mellitus*