CODECHECK certificate 2020-011

https://doi.org/10.5281/zenodo.FIXME

Item	Value
Title	Estimating the effects of non-pharmaceutical interventions on COVID-19 in Europe
Authors	Seth Flaxman, Imperial College COVID-19 Response Team, Samir Bhatt ⬤
Reference	Nature, in press http://dx.doi.org/10.1038/s41586-020-2405-7
Codechecker	Stephen J. Eglen ⬤
Date of check	2020-06-13 14:00:00
Summary	XYZ TO COMPLETE XYZ R code project.
Repository	https://github.com/codecheckers/covid19model

Table 1: CODECHECK summary

Summary

This code was (not) straightforward to codecheck. [. . . ADD MORE INTERESTING FINDINGS HERE..]

Output	Comment	Size (b)
nature/figures/France-three-pannel-base-nature-724064.png	manuscript Figure 1 (France)	172065
nature/figures/Italy-three-pannel-base-nature-724064.png	manuscript Figure 1 (Italy)	174822
nature/figures/Spain-three-pannel-base-nature-724064.png	manuscript Figure 1 (Spain)	174135
nature/figures/United Kingdom-three-pannel-base-nature-724064.png	manuscript Figure 1 (UK)	180837
nature/figures/covars-alpha-reductionbase-nature-724064.png	manuscript Figure 2	95718
nature/results/per-cases-model-base-nature-724064.csv	Table 1 (Total population infected by country)	413
nature/figures/Belgium-three-pannel-base-nature-724064.png	manuscript Extended Data Fig 1. (Belgium)	173988
nature/figures/Germany-three-pannel-base-nature-724064.png	manuscript Extended Data Fig 1. (Germany)	178400
nature/figures/Sweden-three-pannel-base-nature-724064.png	manuscript Extended Data Fig 1. (Sweden)	168702
nature/figures/Switzerland-three-pannel-base-nature-724064.png	manuscript Extended Data Fig 1. (Switzerland)	180800
nature/figures/Austria-three-pannel-base-nature-724064.png	manuscript Extended Data Fig 1. (Austria)	175032
nature/figures/Norway-three-pannel-base-nature-724064.png	manuscript Extended Data Fig 1. (Norway)	179007
nature/figures/Denmark-three-pannel-base-nature-724064.png	manuscript Extended Data Fig 1. (Denmark)	176012
nature/results/deaths-model-base-nature-724064.csv	manuscript Extended Table 2 (column 3; model)	485
nature/results/deaths-null-base-nature-724064.csv	manuscript Extended Table 2 (column 3; null)	542
nature/results/deaths-averted-base-nature-724064.csv	manuscript Extended Table 2 (column 3; averted)	546

Table 2: Summary of output files generated

CODECHECKER notes

The GitHub repo . . . Code was written in . . . I went through the following steps . . . One hard problem was . . .

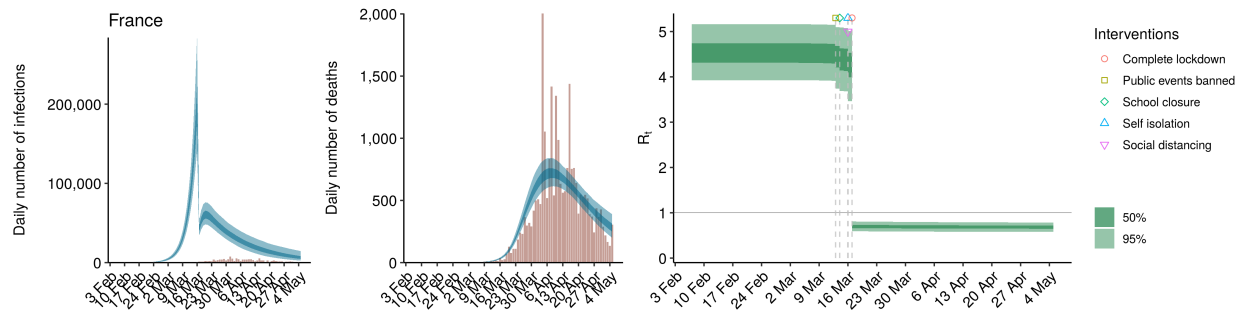This took . . . minutes to complete on {a large workstation, my laptop}.
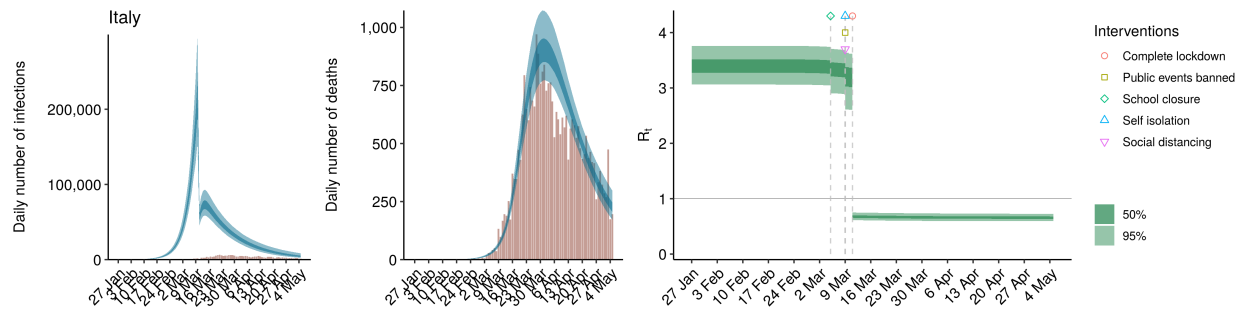
Figure C1: manuscript Figure 1 (France)

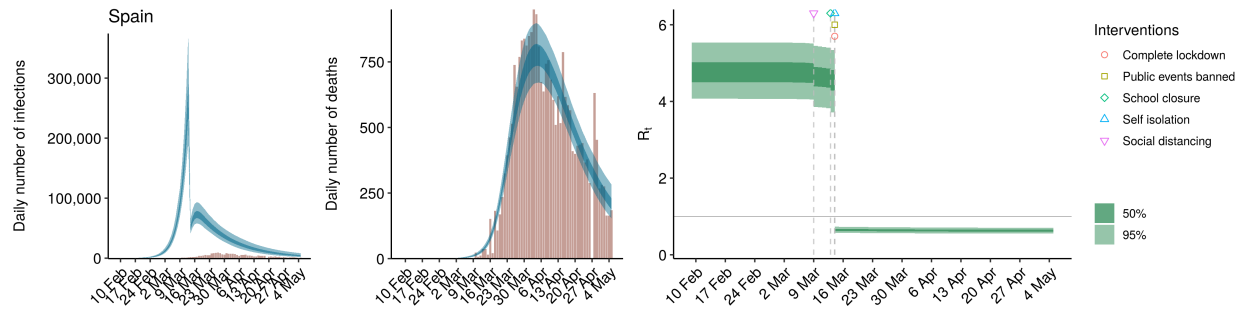**Figure C2: manuscript Figure 1 (Italy)**

Figure C3: manuscript Figure 1 (Spain)

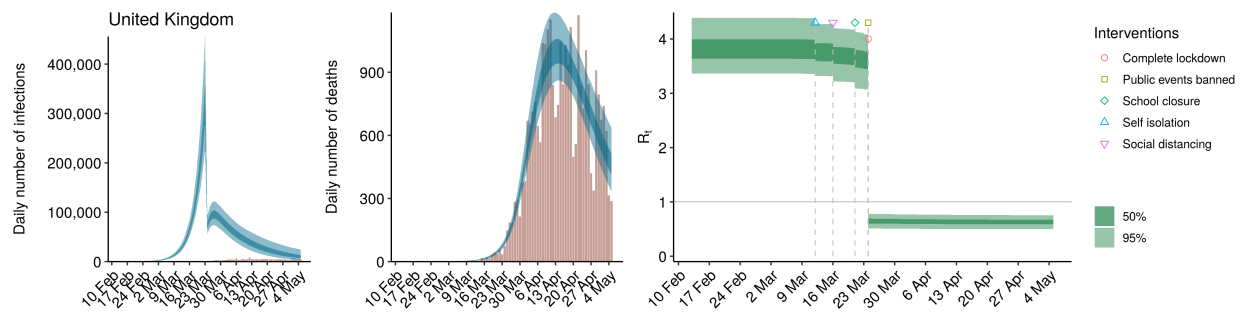**Figure C4: manuscript Figure 1 (UK)**
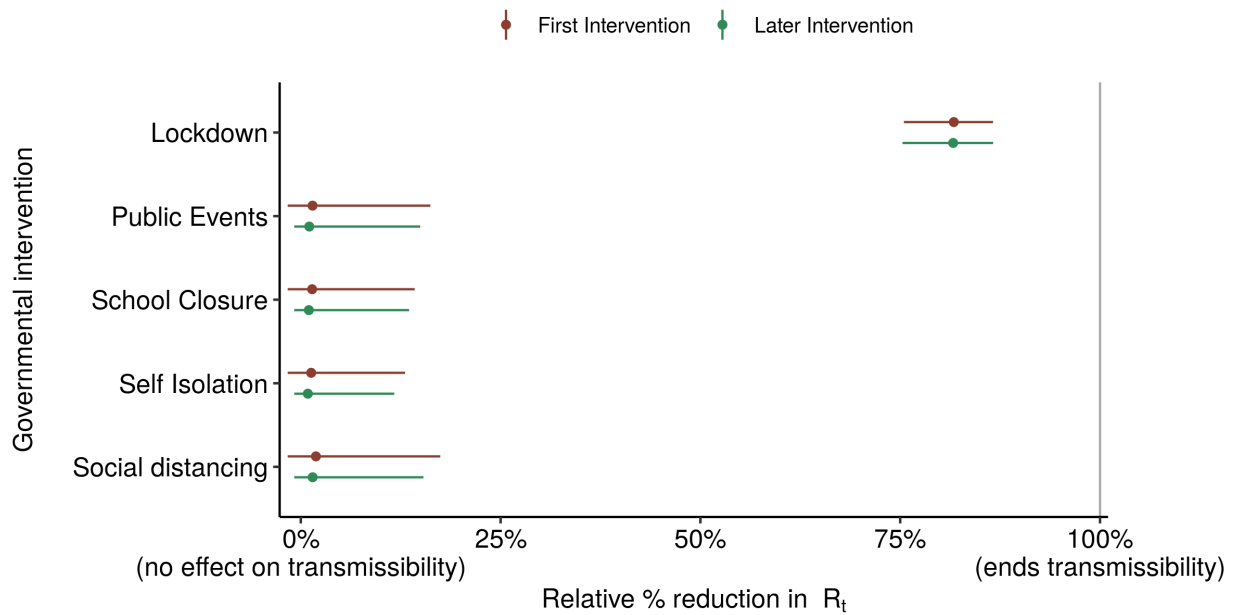
Figure C5: manuscript Figure 2

Country	Percent_Infected
Austria	0.76 [0.59 - 0.98]
Belgium	8 [6.1 - 11]
Denmark	1 [0.79 - 1.3]
France	3.4 [2.7 - 4.4]
Germany	0.85 [0.67 - 1.1]
Italy	4.6 [3.7 - 5.7]
Norway	0.46 [0.35 - 0.62]
Spain	5.6 [4.4 - 7]
Sweden	3.8 [2.8 - 5.2]
Switzerland	1.9 [1.5 - 2.4]
United_Kingdom	5.1 [3.9 - 6.5]

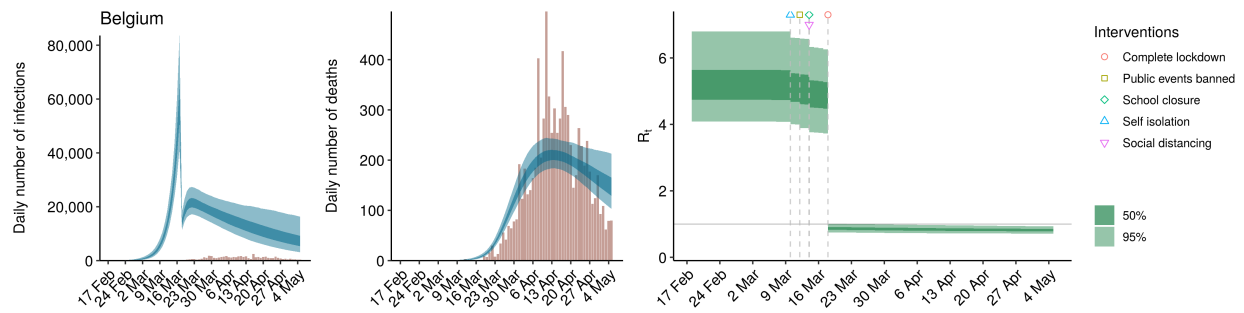**Table C1: Table 1 (Total population infected by country)**

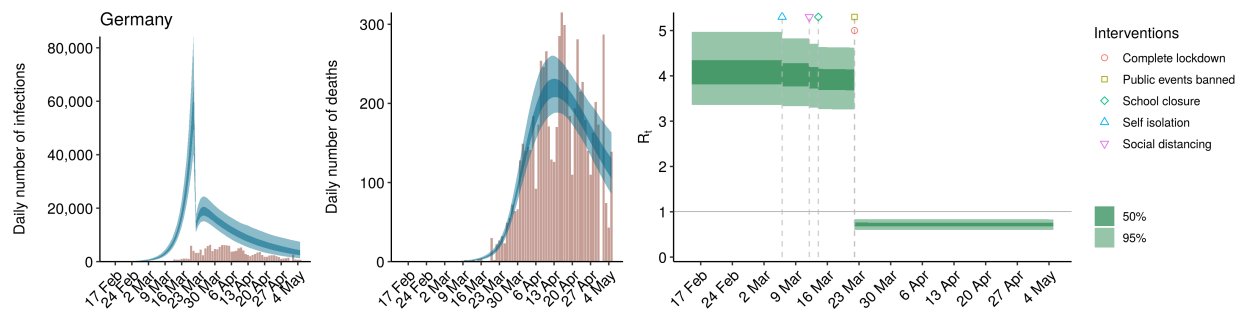**Figure C6: manuscript Extended Data Fig 1. (Belgium)**
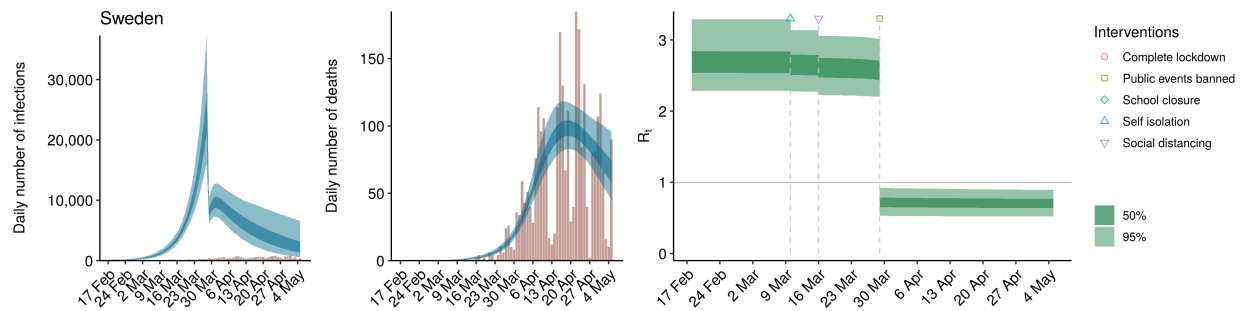

Figure C7: manuscript Extended Data Fig 1. (Germany)

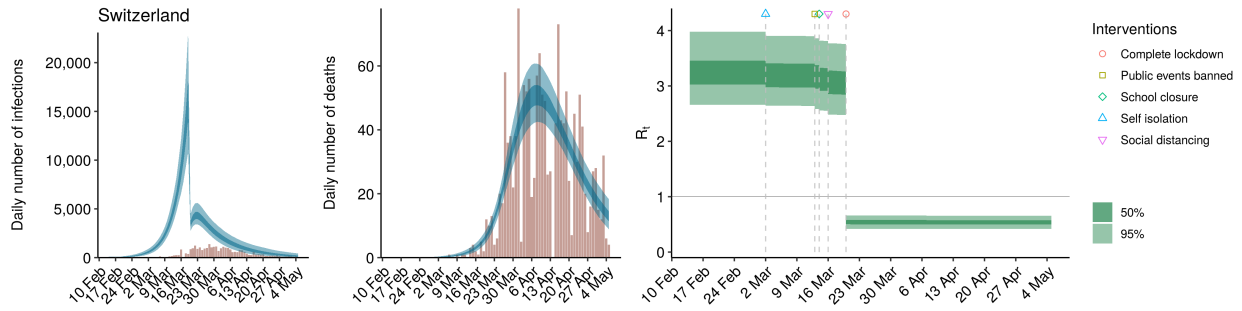**Figure C8: manuscript Extended Data Fig 1. (Sweden)**

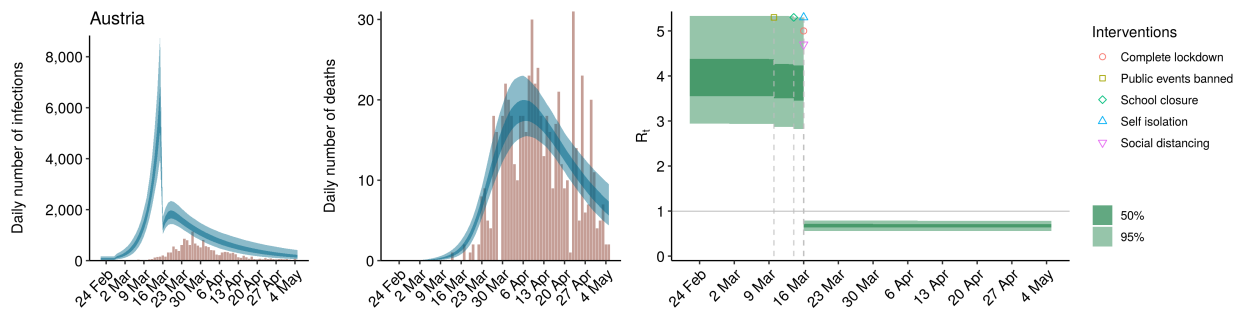**Figure C9: manuscript Extended Data Fig 1. (Switzerland)**

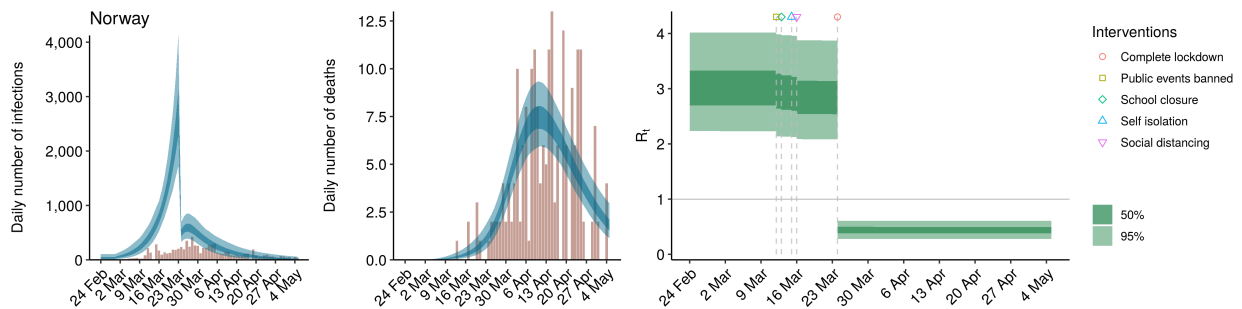**Figure C10: manuscript Extended Data Fig 1. (Austria)**

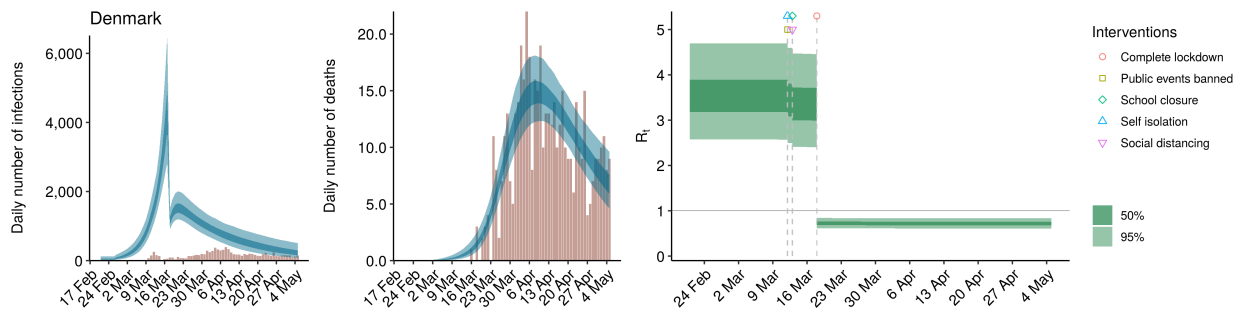**Figure C11: manuscript Extended Data Fig 1. (Norway)**

Figure C12: manuscript Extended Data Fig 1. (Denmark)

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Extended data table 1 was made by merging several data files, each column coming from a different CSV.

Country	model	null	averted
Austria	620 [530 - 730]	66,000 [41,000 - 87,000]	65,000 [40,000 - 86,000]
Belgium	7,300 [6,400 - 8,400]	120,000 [95,000 - 140,000]	110,000 [87,000 - 130,000]
Denmark	500 [420 - 590]	34,000 [16,000 - 49,000]	34,000 [15,000 - 49,000]
France	23,000 [20,000 - 27,000]	710,000 [580,000 - 850,000]	690,000 [560,000 - 820,000]
Germany	6,900 [6,000 - 7,900]	570,000 [370,000 - 780,000]	560,000 [360,000 - 770,000]
Italy	31,000 [28,000 - 36,000]	660,000 [550,000 - 780,000]	630,000 [520,000 - 750,000]
Norway	210 [170 - 250]	12,000 [3,300 - 25,000]	12,000 [3,100 - 25,000]
Spain	25,000 [22,000 - 28,000]	480,000 [380,000 - 560,000]	450,000 [360,000 - 540,000]
Sweden	2,900 [2,400 - 3,300]	28,000 [15,000 - 48,000]	25,000 [13,000 - 45,000]
Switzerland	1,500 [1,300 - 1,700]	54,000 [35,000 - 73,000]	52,000 [33,000 - 72,000]
United_Kingdom	29,000 [26,000 - 34,000]	5e+05 [4e+05 - 610,000]	470,000 [370,000 - 580,000]
All	130,000 [120,000 - 140,000]	3,200,000 [2,900,000 - 3,700,000]	3,100,000 [2,700,000 - 3,500,000]

Table C2: manuscript Extended Table 2 (column 3; model)

About this document

This document was created using R Markdown using the `codecheck` R package. `make codecheck.pdf` will regenerate the report file.

```r
sessionInfo()
```

```
## R version 4.0.0 (2020-04-24)
## Platform: x86_64-pc-linux-gnu (64-bit)
## Running under: Manjaro Linux
##
## Matrix products: default
## BLAS:   /usr/lib/libopenblasp-r0.3.9.so
## LAPACK: /usr/lib/liblapack.so.3.9.0
##
## locale:
##  [1] LC_CTYPE=en_GB.UTF-8       LC_NUMERIC=C
##  [3] LC_TIME=en_GB.UTF-8        LC_COLLATE=en_GB.UTF-8
##  [5] LC_MONETARY=en_GB.UTF-8    LC_MESSAGES=en_GB.UTF-8
##  [7] LC_PAPER=en_GB.UTF-8       LC_NAME=C
##  [9] LC_ADDRESS=C               LC_TELEPHONE=C
## [11] LC_MEASUREMENT=en_GB.UTF-8 LC_IDENTIFICATION=C
##
## attached base packages:
## [1] stats     graphics  grDevices utils     datasets
## [6] methods   base
##
## other attached packages:
##  [1] codecheck_0.0.0.9005 readr_1.3.1
##  [3] tibble_3.0.1         rprojroot_1.3-2
##  [5] jsonlite_1.6.1       knitr_1.28
##  [7] rmarkdown_2.1.10     parsedate_1.2.0
##  [9] assertthat_0.2.1     R.cache_0.14.0
## [11] gh_1.1.0             stringr_1.4.0
## [13] yaml_2.2.1           xtable_1.8-4
## [15] zen4R_0.3-1          devtools_2.3.0
## [17] usethis_1.6.1
##
## loaded via a namespace (and not attached):
##  [1] tinytex_0.23     xfun_0.14          remotes_2.1.1
##  [4] vctrs_0.3.0      testthat_2.3.2     htmltools_0.4.0
##  [7] rlang_0.4.6      pkgbuild_1.0.7     R.oo_1.23.0
## [10] pillar_1.4.4     glue_1.4.1         withr_2.2.0
## [13] R.utils_2.9.2    sessioninfo_1.1.1  lifecycle_0.2.0
## [16] rvest_0.3.5      R.methodsS3_1.8.0  memoise_1.1.0
## [19] evaluate_0.14    callr_3.4.3        ps_1.3.2
## [22] fansi_0.4.1      highr_0.8          Rcpp_1.0.4.6
## [25] backports_1.1.6  desc_1.2.0         pkgload_1.0.2
## [28] fs_1.4.1         hms_0.5.3          digest_0.6.25
## [31] stringi_1.4.6    processx_3.4.2     cli_2.0.2
## [34] tools_4.0.0      magrittr_1.5       crayon_1.3.4
## [37] pkgconfig_2.0.3  ellipsis_0.3.1     xml2_1.3.2
## [40] prettyunits_1.1.1 httr_1.4.1        rstudioapi_0.11
## [43] R6_2.4.1         compiler_4.0.0
```