

THE LANCET

Global Health

Supplementary appendix

This appendix formed part of the original submission. We post it as supplied by the authors.

Supplement to: Jalali MS, DiGennaro C, Sridhar D. Transparency assessment of COVID-19 models. *Lancet Glob Health* 2020; published online Oct 27. [http://dx.doi.org/10.1016/S2214-109X\(20\)30447-2](http://dx.doi.org/10.1016/S2214-109X(20)30447-2).

Percent of COVID-19 models (n=29) which satisfy transparency assessment criteria

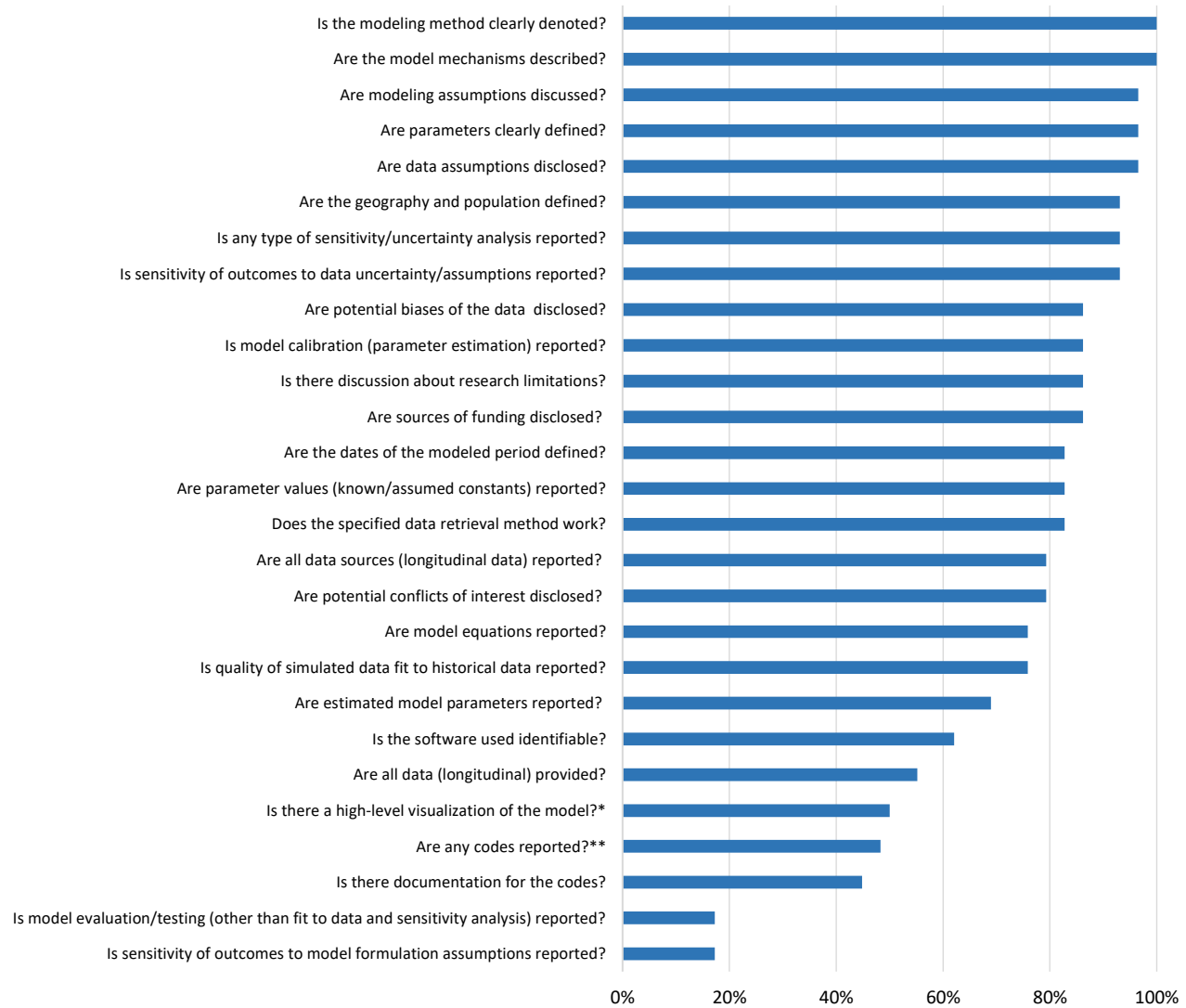


Fig. S1. Percent of COVID-19 models (n=29) which satisfy transparency assessment criteria

*Five regression models are exempt from this criterion, as there is no visualization that communicates model structure. **codes used for a generalized model are not sufficient; we were able to successfully retrieve the codes of each model that provided a retrieval method.

Supplementary Table S1: Transparency Assessment of 29 COVID-19 models

Transparency Assessment Criteria	COVID-19 Model																													
	1	2*	3	4	5*	6*	7	8*	9*	10*	11	12*	13*	14*	15	16	17	18	19	20*	21	22	23	24	25*	26*	27	28*	29*	
Are the geography and population defined?	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green
Are the dates of the modeled period defined?	Green	Green	Green	Red	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green
Is the modeling method clearly denoted?	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green
Are the model mechanisms described?	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green
Is there a high-level visualization of the model?***	Red	Red	Green	Green	Red	Gray	Green	Gray	Green	Green	Green	Red	Gray	Red	Red	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green
Are model equations reported?	Green	Green	Green	Green	Red	Green	Red	Red	Green	Green	Green	Green	Green	Red	Red	Green	Red	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green
Are modeling assumptions discussed?	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Red	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green
Are parameter values (known/assumed constants) reported?	Green	Green	Green	Green	Green	Green	Green	Green	Yellow	Yellow	Green	Green	Red	Yellow	Green	Green	Green	Green	Red	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green
Are all data sources (longitudinal data) reported?	Yellow	Green	Green	Green	Red	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Red	Yellow	Green	Green	Green	Green	Green	Green	Yellow	Yellow	Green	Green	Green	Green	Green
Are all data (longitudinal) provided?	Yellow	Green	Green	Green	Red	Yellow	Green	Red	Green	Red	Green	Red	Green	Green	Green	Red	Green	Green	Red	Red	Yellow	Green	Green	Yellow	Red	Green	Green	Green	Green	Green
Does the specified data retrieval method work?	Green	Green	Green	Green	Red	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Red	Green	Green	Green	Red	Yellow	Green	Green	Green	Green	Yellow	Green	Green	Green	Green
Are parameters clearly defined?	Green	Green	Green	Green	Green	Green	Green	Red	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green
Are data assumptions disclosed?	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Red	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green
Are potential biases of the data disclosed?	Green	Green	Green	Green	Red	Green	Green	Green	Green	Red	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Red	Green	Green	Green	Green	Green	Green
Are any codes reported?***	Red	Red	Green	Green	Red	Red	Red	Red	Green	Red	Green	Green	Green	Green	Green	Green	Green	Green	Red	Green	Green	Red	Red	Red	Red	Red	Red	Red	Red	Red
Is there documentation for the codes?	Red	Red	Green	Green	Red	Red	Red	Red	Green	Red	Green	Green	Green	Red	Green	Green	Green	Green	Red	Green	Green	Red	Red	Red	Red	Red	Red	Red	Red	Red
Is the software used identifiable?	Red	Red	Green	Green	Red	Red	Red	Red	Green	Red	Green	Green	Green	Green	Green	Green	Green	Green	Red	Green	Green	Red	Red	Red	Red	Red	Red	Red	Red	Red
Is model calibration (parameter estimation) reported?	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Red	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green
Are estimated model parameters reported?	Red	Green	Green	Green	Red	Red	Green	Red	Green	Green	Green	Green	Red	Red	Green	Red	Green	Green	Green	Green	Green	Green	Red	Green	Green	Green	Green	Green	Green	Red
Is quality of simulated data fit to historical data reported?	Red	Green	Green	Green	Red	Green	Green	Green	Green	Red	Green	Green	Green	Green	Green	Red	Red	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green
Is model evaluation/testing (other than fit to data and sensitivity analysis) reported?	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red
Is any type of sensitivity/uncertainty analysis reported?	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Red	Red	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green
Is sensitivity of outcomes to data uncertainty/assumptions reported?	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Red	Red	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green
Is sensitivity of outcomes to model formulation assumptions reported?	Red	Red	Green	Red	Red	Green	Red	Red	Red	Red	Green	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red	Red
Is there discussion about research limitations?	Green	Green	Green	Green	Green	Green	Green	Green	Red	Green	Green	Red	Green	Green	Green	Green	Green	Green	Green	Red	Green	Green	Green	Green	Green	Green	Red	Green	Green	Green
Are sources of funding disclosed?	Green	Green	Green	Green	Green	Green	Green	Red	Red	Green	Green	Green	Green	Red	Green	Green	Green	Green	Green	Green	Green	Green	Red	Green	Green	Green	Green	Green	Green	Green
Are potential conflicts of interest disclosed?	Green	Green	Red	Red	Red	Green	Green	Red	Red	Green	Green	Green	Green	Red	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green	Green

*preprint; **n=24, there was no expectation of this for purely statistical models; ***we were also able to retrieve all codes using the specified method. green=yes; red=no; yellow=partially; gray=exempt (only applicable for the assessment of high-level model visualization)

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