

ARTIFICIAL INTELLIGENCE FOR DEVELOPMENT AFRICA (AI4D-AFRICA) NETWORK

AI4D Predict the Global Spread of COVID-19 Challenge

Challenge for data scientists to build an epidemiological model to accurately predict the spread of coronavirus (COVID-19) around the world as it develops. 2,500 USD (€ 2,300)

On 11 March 2020, the World Health Organization (WHO) officially classified COVID-19 as a pandemic. At the time, the number of confirmed cases were over 130,000 across 114 countries around the world, with the number of deaths caused by the disease over 5,000.

COVID-19 is the acronym of "coronavirus disease 2019" and is the disease caused by a new strain of coronavirus which first appeared in late 2019. According to the WHO, viral diseases like COVID-19 continue to emerge and represent a serious public health risk worldwide. In recent years we have seen the emergence of epidemics such as the severe acute respiratory syndrome coronavirus (SARS-CoV) in 2002 and H1N1 influenza in 2009.

Accurately modelling the spread of these viral diseases is critical for policymakers and health workers to take appropriate actions to contain and mitigate the impact of these disease.

This challenge asks data scientists on Zindi to accurately predict the spread of COVID-19 around the world over the next few months. Solutions will be evaluated against future data.

The effects of COVID-19 have yet to emerge as the situation is evolving rapidly. With this challenge we hope to contribute to the global body of knowledge which will help stem the impact of pandemics such as this one as well as those in the future.

This challenge is sponsored by the Artificial Intelligence for Development Africa(AI4D-Africa) Network.

About AI4D-Africa; Artificial Intelligence for Development-Africa Network: (ai4d.ai)

AI4D-Africa is a network of excellence in AI in sub-Saharan Africa. It is aimed at strengthening and developing community, scientific and technological excellence in a range of AI-related areas. It is composed of African Artificial Intelligence researchers, practitioners and policy makers.

Rules

If your solution places 1st, 2nd, or 3rd in the final ranking, you will be required to submit your winning solution code to us for verification and you thereby agree to assign all worldwide rights of copyright in and to such winning solution to Zindi.

Your solution must not infringe the rights of any third party and you must be legally entitled to assign ownership of all rights of copyright in and to the winning solution code to Zindi. Zindi will share the winning solutions on GitHub as a public good.

Individual competitors are now able to form teams on this competition. You must accept the rules associated with teaming.

Multiple accounts per user are not allowed. Collaboration across individuals not in the same team is not allowed. And collaboration across different teams that is not allowed.

Code must not be shared privately. Any code that is shared, must be made available to all competition participants through the platform.

The solution must use publicly-available, open-source packages only.

Maximum 10 solutions submitted per day. Your highest-scoring solution will be the one by which you are judged.

Note that there is a Public Leaderboard which will be updated every Thursday at approximately 15:00 GMT with the most recent seven days of actual data. In other words, Public Leaderboard scores will be recalculated every seven days. While the competition is open, the Public Leaderboard will rank the submitted solutions by the accuracy score they achieve on only the most recent seven days. Once submissions are closed and no longer accepted, the most recent Public Leaderboard will remain visible until the final close of the competition. Upon the final close of the competition, the Private Leaderboard will be revealed which gives an accuracy score on only the data from the time submissions closed until the time the competition closed. This will be the final ranking for the competition.

If two solutions earn identical scores on the leaderboard, the tie breaker will be the date and time in which the submission was made (the earlier solution will win).

Refer to the FAQs and Terms of Use for additional rules that may apply to this competition.

You acknowledge and agree that Zindi may, without any obligation to do so, remove or disqualify an individual, team, or account if Zindi believes that such individual, team, or account is in violation of these Rules.

If you are in the top 20 at the time the leaderboard closes, we will email you to request your code. On receipt of email, you will have 48 hours to respond and submit your code following the submission guidelines detailed below.

Reproducibility

If your submitted code does not reproduce your score on the leaderboard, we reserve the right to adjust your rank to the score generated by the code you submitted.

If your code does not run you will be dropped from the top 10. Please make sure your code runs before submitting your solution.

Always set the seed. Rerunning your model should always place you at the same position on the leaderboard. When running your solution, if randomness shifts you down the leaderboard we reserve the right to adjust your rank to the closest score that your submission reproduces.

We expect full documentation. This includes:

- All data used
- Output data and where they are stored
- Explanation of features used
- Your solution must include the original data provided by Zindi and validated external data (no processed data)
- All editing of data must be done in a notebook (i.e. not manually in Excel)

Data standards:

Your submitted code must run on the original train, test, and other datasets provided.

If external data is allowed it must not exceed 1 GB. External data must be freely and publicly available, including pre-trained models with standard libraries. If external data is allowed, any data used should be shared on the discussion forum.

Packages:

You must use the most recent versions of packages. Custom packages in your submission notebook will not be accepted.

You may only use tools available to everyone i.e. no paid services or free trials that require a credit card.

Consequences of breaking any rules of the competition or submission guidelines:

First offence: No prizes or points for 6 months. If you are caught cheating all individuals involved in cheating will be disqualified from the challenge(s) you were caught in and you will be disqualified from winning any competitions or Zindi points for the next six months.

Second offence: Banned from the platform. If you are caught for a second time your Zindi account will be disabled and you will be disqualified from winning any competitions or Zindi points using any other account.

Monitoring of submissions

We will review the top 20 solutions of every competition when the competition ends.

We reserve the right to request code from any user at any time during a challenge. You will have 24 hours to submit your code following the rules for code review (see above).

If you do not submit your code within 24 hours you will be disqualified from winning any competitions or Zindi points for the next six months. If you fall under suspicion again and your code is requested and you fail to submit your code within 24 hours, your Zindi account will be disabled and you will be disqualified from winning any competitions or Zindi points.

Further updates and rulings of note:

Multiple accounts per user, collaboration or membership across multiple teams are not allowed.

Code may not be shared privately. Any code that is shared, must be made available to all competition participants through the platform.

Solutions must use publicly-available, open-source packages only, and all packages must be the most updated versions.

Solutions must not infringe the rights of any third party and you must be legally entitled to assign ownership of all rights of copyright in and to the winning solution code to Zindi.

You will be disqualified if you do not respond within the timeframe given in the request for code.

We reserve the right to update these rules at any time.

Timeline

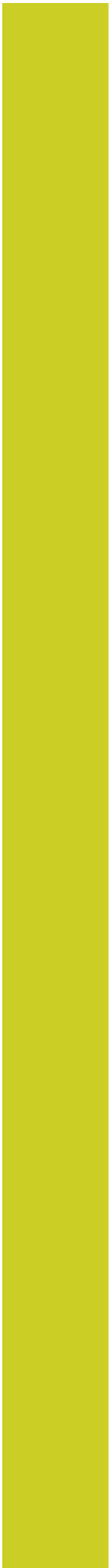
Submissions will be accepted onto the leaderboard only until 19 April 2020.

Final submissions must be received by 11:59 PM GMT.

Competition closes and the final private leaderboard will be revealed on 8 June 2020.

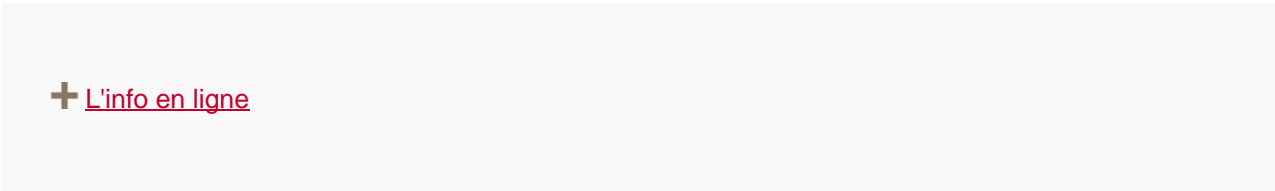
We reserve the right to update the contest timeline if necessary.







13 mars 2020
19 avril 2020



+ [L'info en ligne](#)