



Personalized Medicine: Redefining Cancer Treatment

Predict the effect of Genetic Variants to enable Personalized Medicine

\$15,000 · 1,386 teams · a month ago

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Overview

Description

A lot has been said during the past several years about how precision medicine and, more concretely, how genetic testing is going to disrupt the way diseases like cancer are treated.

Evaluation

But this is only partially happening due to the huge amount of manual work still required. Memorial Sloan Kettering Cancer Center (MSKCC) launched this competition, accepted by the [NIPS 2017 Competition Track](#), because we need your help to take personalized medicine to its full potential.

Prizes

Timeline

CLASSIFYING CLINICALLY ACTIONABLE GENETIC MUTATIONS

NIPS 2017 COMPETITION

Once sequenced, a cancer tumor can have thousands of genetic mutations. But the challenge is distinguishing the mutations that contribute to tumor growth (drivers) from the neutral mutations (passengers).

Currently this interpretation of genetic mutations is being done manually. This is a very time-consuming task where a clinical pathologist has to manually review and classify every single genetic mutation based on evidence from text-based clinical literature.

For this competition MSKCC is making available an expert-annotated knowledge base where world-class researchers and oncologists have manually annotated thousands of mutations.

We need your help to develop a Machine Learning algorithm that, using this knowledge base as a baseline, automatically classifies genetic variations.

Kaggle is excited to partner with research groups to push forward the frontier of machine learning. Research competitions make use of Kaggle's platform and experience, but are largely organized by the research group's data science team. Any questions or concerns regarding the competition data, quality, or topic will be addressed by them.

Leaderboard



- 1 ilmirashaim
- 2 Waterpls
- 3 Yang 3
- 4 FourteenthTokyo
- 5 Bcottman
- 6 varstation
- 7 NCTU_GoldX5
- 8 DaXian

Kernels



- [Personalised Medicine - EDA with t...](#)
200 votes · a month ago
- [Redefining Treatment \[0.57456\]](#)
117 votes · 4 months ago
- [Brief insight on Genetic variations](#)
95 votes · 4 months ago
- [Basic NLP: Bag of Words, TF-IDF, ...](#)
52 votes · 2 months ago
- [Simple Exploration Notebook-Pers...](#)
38 votes · 4 months ago

137 discussion topics



- [Thank You](#)
16 replies · 5 days ago
- [Will the first's method be published?](#)
0 replies · 6 days ago
- [Comparison data based on manual...](#)
2 replies · 9 days ago
- [What is your approach and what is ...](#)
15 replies · 9 days ago
- [How absurd the result is ! ! ! so u...](#)
16 replies · 16 days ago

Launch

4 months ago

Close

a month ago

a month ago

Rules Acceptance

Deadline

1,386

Teams

447

Competitors

Points

This competition did not award standard ranking points

Tiers

This competition did not count towards tiers

Tags

multiclass classification

text

human genetics

health sciences

multiclassloss

small

