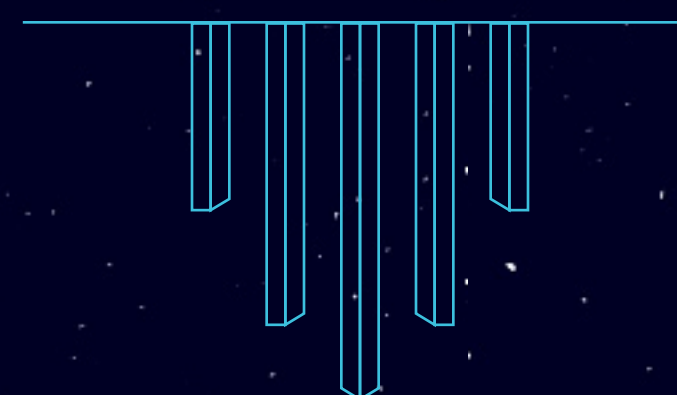




EXOPLANETS

Hunting for Exoplanets in Deep Space



GLOSSARY

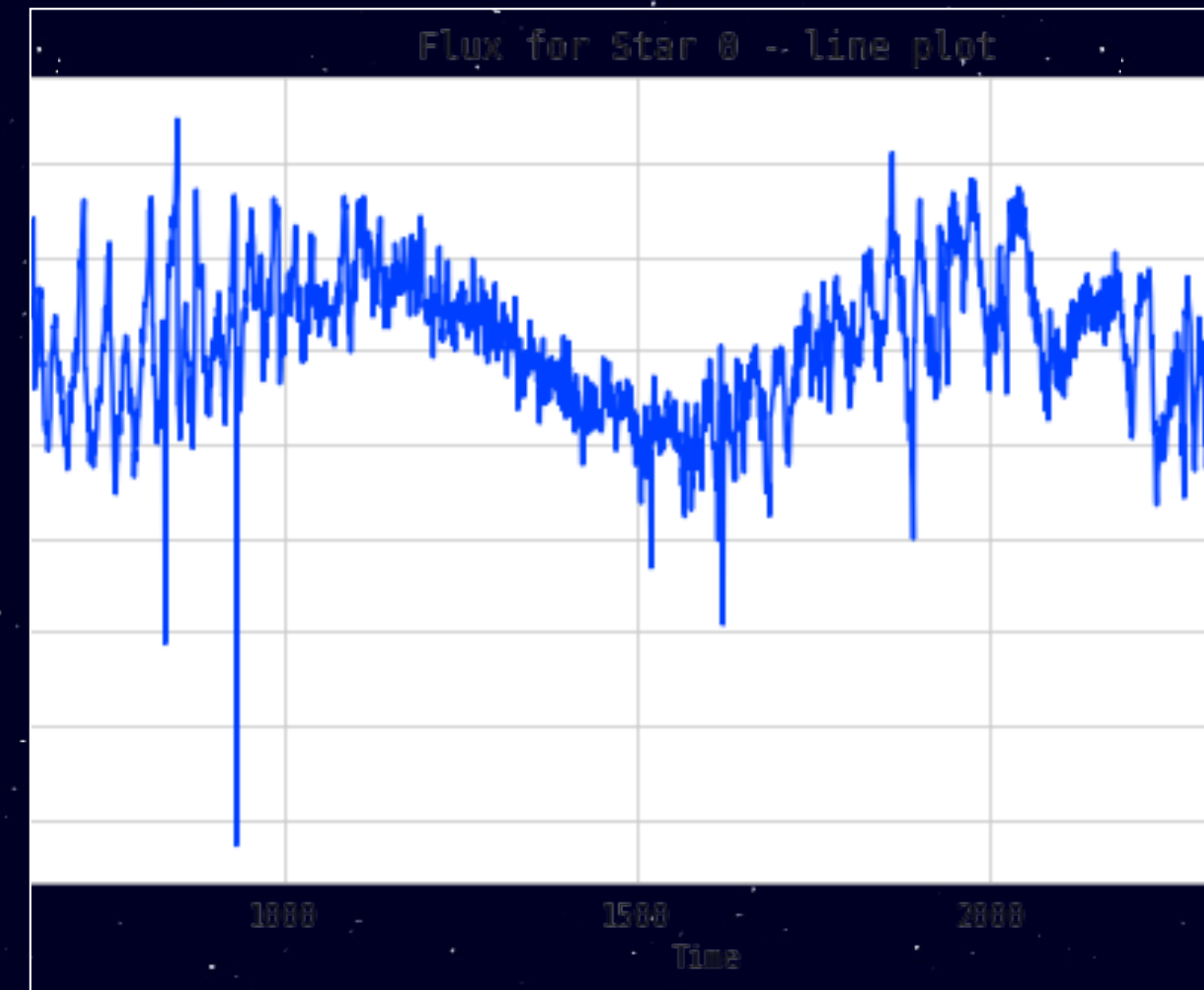
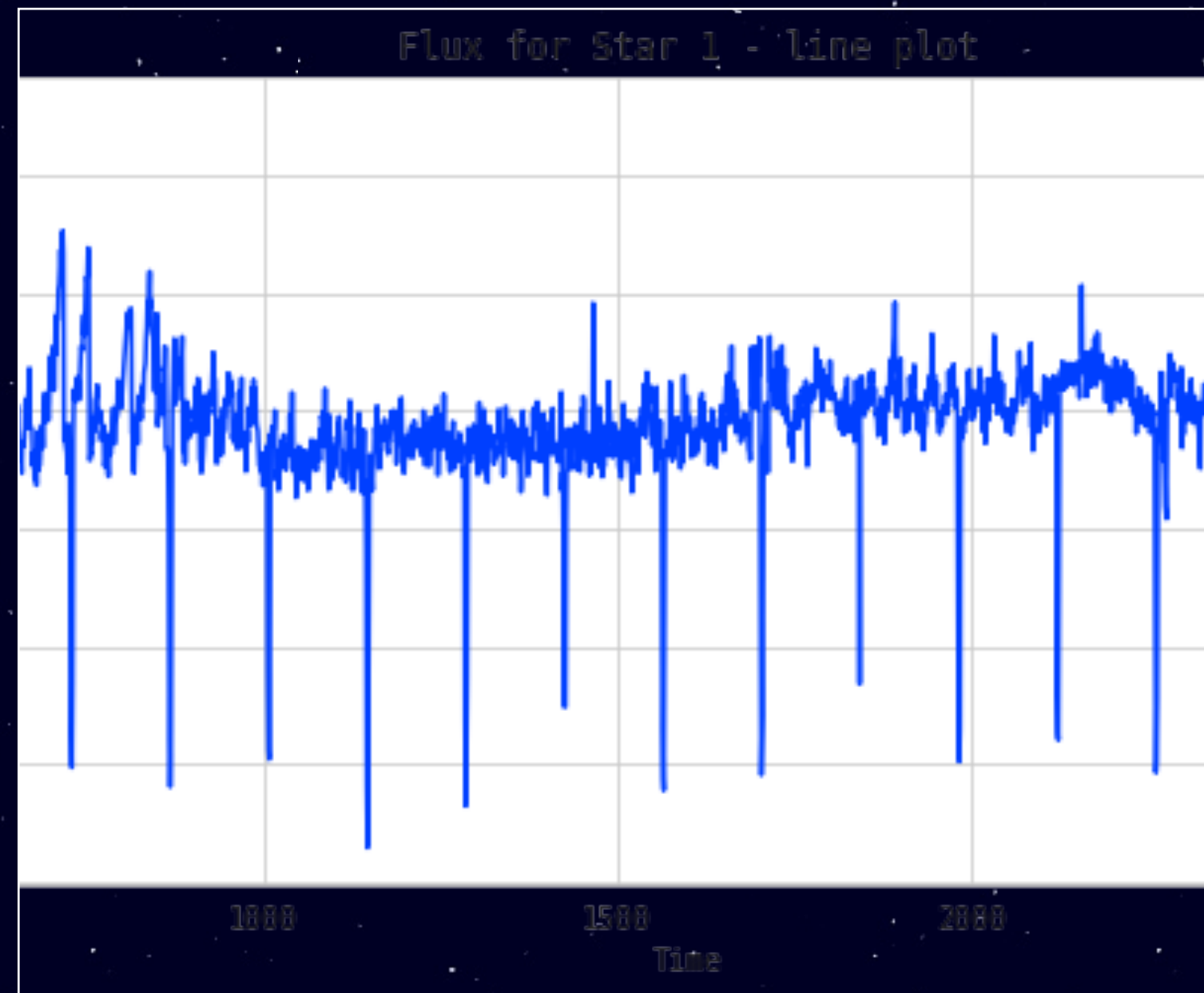
- EXOPLANET: planets outside of our solar system
- FLUX: variation or change in light values of stars



DATASET

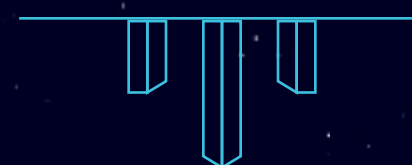
- The training data including 3,197 flux observations for 5,087 stars.
- The test data included 570 stars for testing the model.
- All data comes from the Kepler space telescope (NASA)

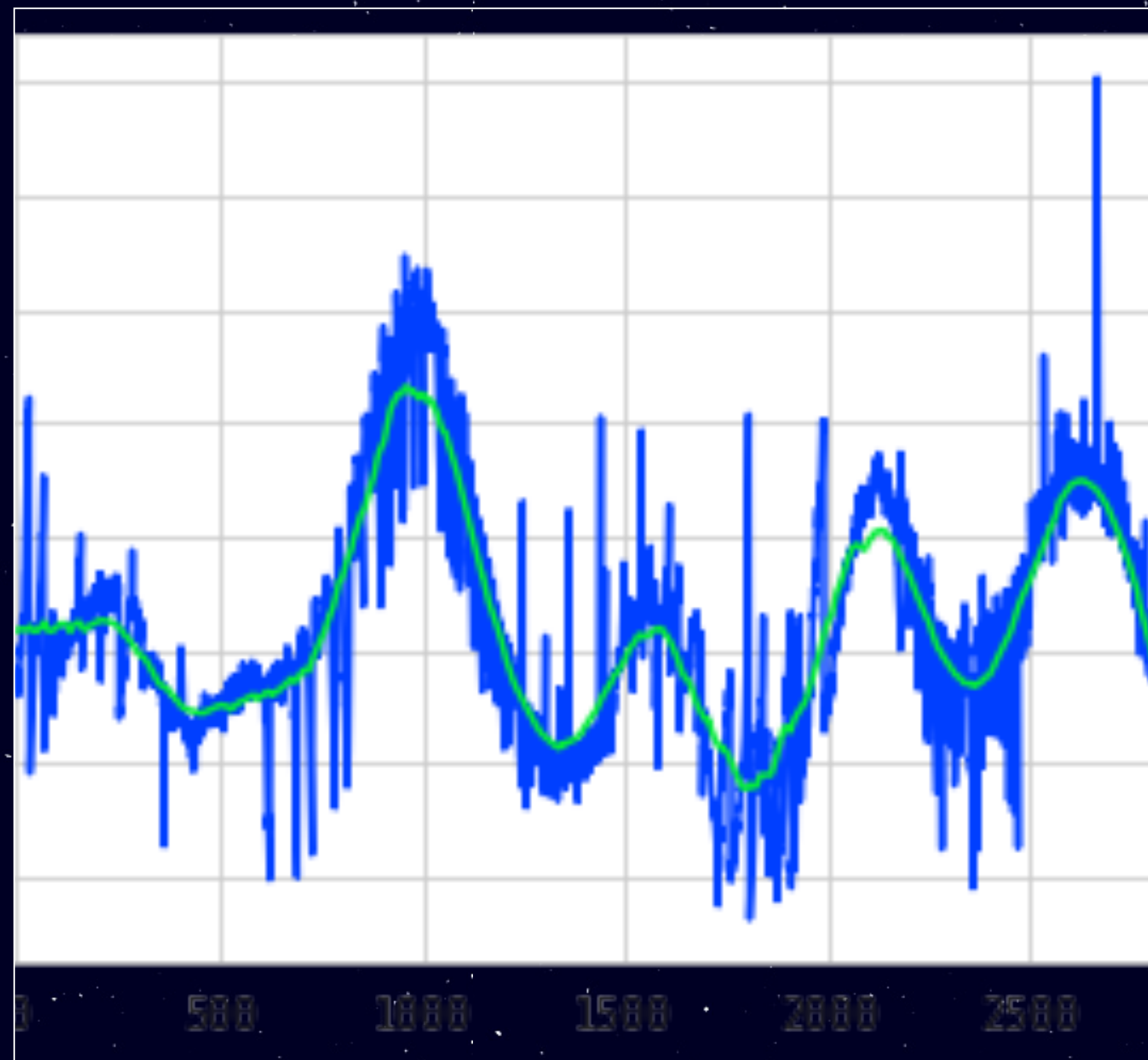




OBJECTIVE

Looking for “dips” (periodicity) in the light flux of stars (right image shows “dips”)

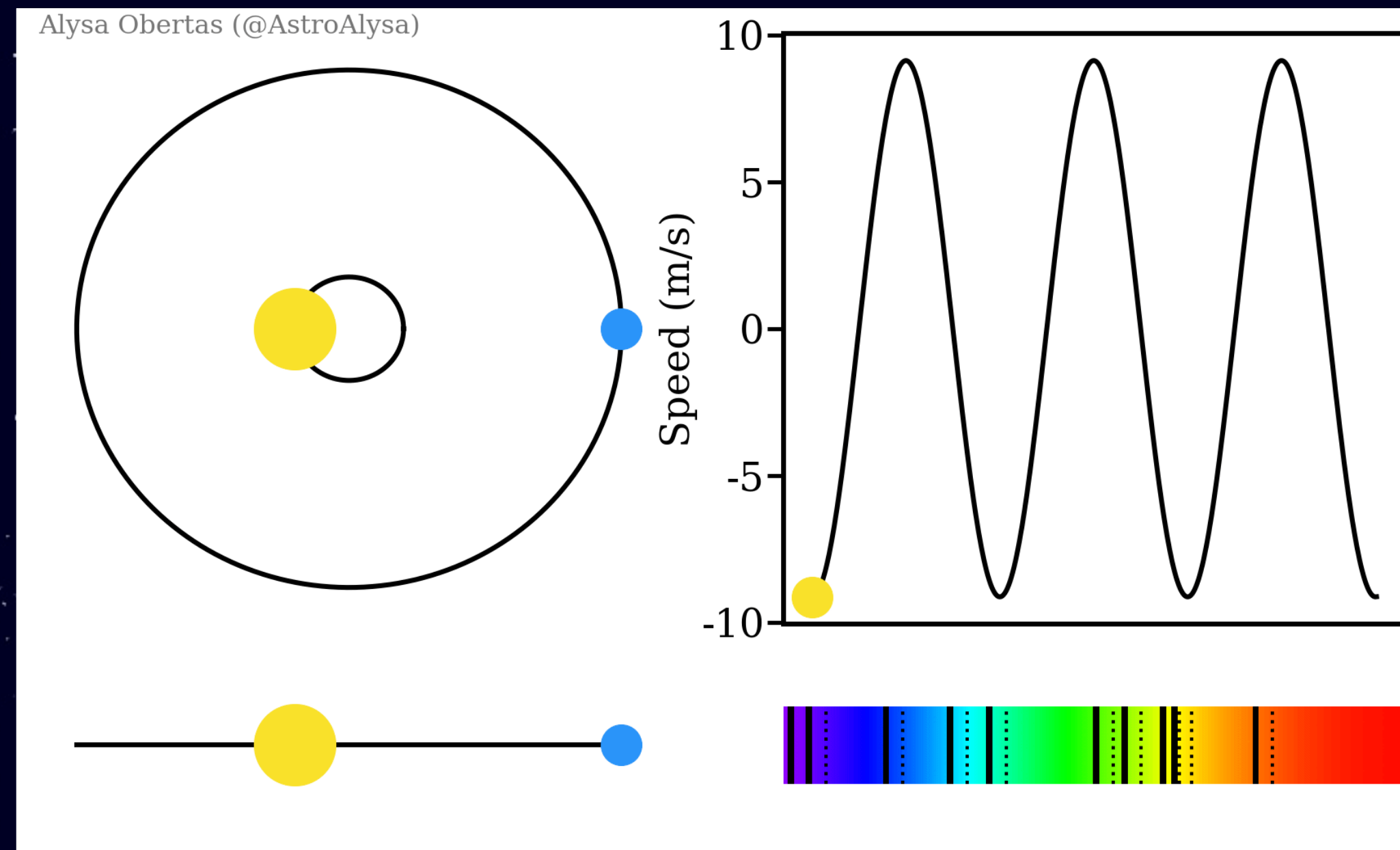




5 PLANETS

- Using two different machine learning models, 5 planets were identified successfully and matched the data confirmed by NASA / Kepler as exoplanets.

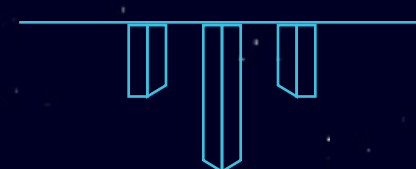


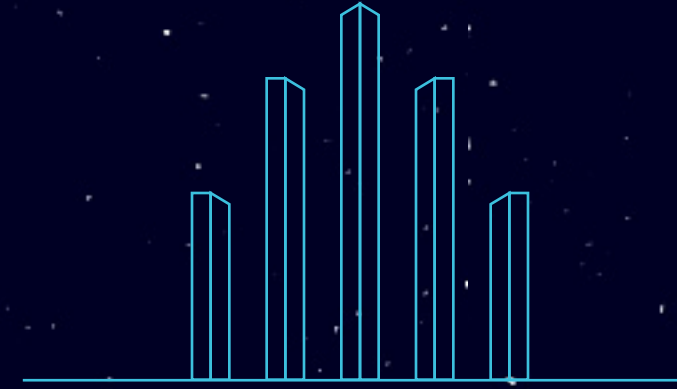


FUTURE WORK

There are many other ways of identifying exoplanets.

There is much more to explore, including pulsars and black holes!





THANK YOU

