



Spring 3-24-2017

Economics Students Top Leaderboard in Forecasting Game

University Communications
Illinois Wesleyan University

Follow this and additional works at: <https://digitalcommons.iwu.edu/news>

Recommended Citation

Communications, University, "Economics Students Top Leaderboard in Forecasting Game" (2017). *News and Events*. 3005.
<https://digitalcommons.iwu.edu/news/3005>

This Article is protected by copyright and/or related rights. It has been brought to you by Digital Commons @ IWU with permission from the rights-holder(s). You are free to use this material in any way that is permitted by the copyright and related rights legislation that applies to your use. For other uses you need to obtain permission from the rights-holder(s) directly, unless additional rights are indicated by a Creative Commons license in the record and/ or on the work itself. This material has been accepted for inclusion by faculty at Illinois Wesleyan University. For more information, please contact digitalcommons@iwu.edu.

©Copyright is owned by the author of this document.

Economics Students Top Leaderboard in Forecasting Game

March 24, 2017

BLOOMINGTON, Ill.— As an [economics](#) major, Chris Collins '18 was already attentive to media reports about the U.S. economy. But since he's started playing – and winning – a forecasting game on four key economic indicators, he's glued to his news feed each month when unemployment rate and job creation figures are announced.

Collins and his classmates in the economics course "Time Series Analysis" are playing FREDcast, a forecasting game from the Federal Reserve Bank of St. Louis, one of 12 regional banks in the Federal Reserve system. In the online interactive game, players make forecasts for four economic indicators: the consumer price index tracking cost of living changes; monthly change in payroll employment, or job creation; the monthly unemployment rate; and the quarterly growth rate in gross domestic product (GDP).

Collins and two classmates, Ling Zheng '19 and John Collins '17 (no relation to Chris), are among the top 10 "All Time" players in the leaderboard of student performance. Points are awarded based on how close a player comes to the actual number released by federal agencies, with scores calibrated on a monthly basis.

The ability to compare player scores, both within a class, and globally offers an instructor using FREDcast a valuable element of audience for the game, according to course instructor Diego Mendez-Carbajo, professor of economics.

The bragging rights of winning in what might be called a fantasy league competition is nice, of course, but the real value comes from the effort needed to produce the forecasts, not in the accuracy of the forecasts themselves, said Mendez-Carbajo.

Time series forecasting is the use of a model to predict future values based on previously observed values. Instructors using FREDcast say students are initially enamored by the competition, but soon realize it's more important to understand how and why the statistics change from month to month.

Chris Collins agreed. "I never turn down a competition, so that helps bring some extra motivation in playing the game," said Collins, who's a member of the Titan football team. "But I'm interested both in doing well and mastering the economic forecasting of these statistics."

He noted his favorite aspect of economics is taking the field's theoretical ideas and applying them to real-world scenarios where actual results can be measured. Collins' favorite aspect mirrors national studies; Mendez-Carbajo said research in economics education indicates students' report that the media attention given to indicators such as unemployment rates makes the macroeconomic concept "worth learning."

Mendez-Carbajo called the Federal Reserve Bank in St. Louis "a powerhouse in economic education" with many related lines of learning. In fall 2016 Mendez-Carbajo spent his sabbatical on-site at the bank after he submitted a successful proposal for new online lessons. During his sabbatical he created lesson content and served as the subject matter expert in working with a team of instructional and web developers on a series of online, open-access, teaching and learning resources named FRED (Federal Reserve Economic Data) Interactive lessons.

FRED Interactive lessons are self-paced courses where high school and college students are introduced to basic economic concepts, receive instruction on how to manipulate and visualize data through the FRED website, and test themselves on their analytical skills. The lessons are the newest addition to a suite of free online courses and videos that are part of the ECON Lowdown website, which has more than one million registered high school and college students across the country.

"The FRED website is the portal of the largest U.S. aggregator of economic statistics, facilitating free access to almost 400,000 series," said Mendez-Carbajo. An average of 325,000 people visit the site each month, he said.

Working on-site at the Federal Reserve aligned with Mendez-Carbajo's professional interests in helping economics instructors incorporate real data into their lessons, thereby increasing mathematical literacy skills.

He said he's inspired by American statistician Edward Tufte, a pioneer in the field of data visualization, who said data graphics are instruments for reasoning about quantitative information.

"If an image is worth a thousand words when my students build and read graphs, they are reasoning like professional social scientists," said Mendez-Carbajo.



Students in the course 'Time Series Analysis' (far left) John Nolan '18 and Chris Collins '18 review their economic forecasts with Professor of Economics Diego Mendez-Carbajo (right)