Econometrics 673: Economic Analytics Fall 2022 Term Project Assignment

## **COVID Effects on Public School Education Performance**

It has been widely reported that public school closures and the move to virtual teaching modes during the COVID pandemic had a significant impact on public school student performance. Your term project assignment is to explore any COVID pandemic effects on student performance as evidenced by the outcomes on the State of Texas Assessments of Academic Readiness (STAAR®) program. Specifically, you are tasked with analyzing the outcomes on the 8<sup>th</sup> grade STAAR exams for the 2018-2019 academic year versus the 2020-2021 academic year – no exams were administered during the 2019-2020 academic year due to the pandemic.

## The Assignment

Each student will be assigned to a 5-person team. The teams are tasked with analyzing and summarizing data to present evidence of the extent of any COVID impact on 8<sup>th</sup> grade student performance. As described below, I am providing several data sets for your Team's analysis. We will discuss these data in some detail in class. You are encouraged to collect other data that you think is helpful. As described below, the STAAR outcomes data is at the individual campus (e.g., the specific school) level. Each Team will also be asked to prepare an evaluation of another Team's analysis.

You will be given access to the following data/information:

cfy19e8.sas7bdat and	Campus level STAAR outcomes data for the 2018-
cfy21e8.sas7bdat	2019 and 2020-2021 academic years, respectively, in
	SAS database format
fy19_varlist_g08.xls and	Variable lists and descriptions for the STAAR
fy21_varlist_g08.xls	outcomes data for the 2018-2019 and 2020-2021
	academic years, respectively, in Excel format
Campus Analyze_2018-19.xlsx and	Campus categories on a Rural-Urban scale for the
Campus Analyze_2020-21.xlsx	2018-2019 and 2020-2021 academic years,
	respectively, in Excel format. Includes 'Overview'
	and 'Data Dictionary' tabs.
"Enrollment	Campus level enrollment reports by gender and
Report_Statewide_Campuses_Gender_Ethnicity_2018-	ethnicity for the 2018-2019 and 2020-2021 academic
2019.csv"	years, respectively, in CSV format.
and	
"Enrollment	
Report_Statewide_Campuses_Gender_Ethnicity_2020-	
2021.csv"	
TEA Student Enrollment Data Notes.docx	Some information on the TEA Enrollment data
District Directory.csv	Information on School Districts and Schools
	including whether the school is a "Charter," in CSV
	format.

## The Rules

You may employ *any* statistical analysis, hypothesis testing and/or data summaries that your team feels support your assigned role. This analysis should be reduced to a written report that clearly states all of the Team's opinions, the data analysis that supports those opinions and any summary exhibits (e.g. tables or graphs). The target audience for both your Team report and presentation is a group of education policy makers. You should assume that while this group of policy makers may be highly educated, they are NOT economic/statistics/econometrics specialists. You should provide any technical detail for your analyses in an appendix. Your report (including the appendix) should provide enough detail of your methods and data sources

that your analysis could be replicated. If there is disagreement among the team as to the relevant analyses or evidence that should be presented, the report may include a set of 'minority' opinions. You must identify in your reports those team members who support each opinion put forward by the team. As noted above, each Team will also be evaluating the Report of another Team. Thus, when you submit your initial team report in Canvas on **Tuesday, November 29<sup>th</sup>** you must email a copy to your assigned evaluation Team. Cross-Team Evaluation reports are due in Canvas by **Friday, December 2<sup>nd</sup>**. Cross-Team evaluation reports may be short and simply point out what are thought to be either conceptual or technical flaws but must include the basis for any alleged flaw. With-in team peer evaluations will be done through an anonymous on-line system that are due on **Wednesday, December 7<sup>th</sup>** – instructions to follow.

## **Team Presentations**

Each team is required to make a 15-20 minute Zoom presentation of your findings on one of the class presentation days during the week of **December 5**<sup>th</sup> – exact dates and times to be determined.

We will discuss data definitions and analysis strategies in class.