

Triangle Economics of Education Workshop: Abstracts

Wednesday, May 14, 2025

SMALL DISTANCES THAT MATTER: EFFECTS OF LOCAL COMMUNITY COLLEGE OPENINGS ON ENROLLMENT AND DEGREE COMPLETION

Presenter: Lois Miller (University of South Carolina)

Many students attend colleges close to their homes. How important is the proximity of colleges in students' enrollment choices? In this paper, I explore this question using administrative data on the universe of public high school students in Texas matched to all within-state college enrollment at public two-year and four-year colleges. I use an event study analysis around the openings of community colleges to estimate the causal effect of the availability of a two-year college within 20 minutes driving time of students' high schools. I find that local students do enroll in the new community colleges, but this enrollment response is primarily substitution away from other colleges rather than the effect of enrollments from new students who otherwise would not have enrolled in any college. I also find evidence that students who gain access to a more proximate community college have an increased likelihood of completing a two-year associate's degree with no difference in their four-year bachelor's degree completion rates.

WORKFORCE ALIGNMENT AND THE UNC SYSTEM

Presenter: Canyon Bosler (University of North Carolina System Office)

The University of North Carolina System Board of Governors has charged the System Office with establishing an ongoing reporting system to evaluate "alignment between the University System's academic portfolio and emerging workforce and societal needs" and identify "new and expandable degree and credential programs that would be beneficial to the state." This flash talk will present a brief overview of our novel approach to estimating supply and demand at the program level (e.g. Bachelor's in Economics) and preliminary results highlighting key deviations from the methods traditionally used in higher education policy contexts. We are seeking both broad conceptual or empirical feedback on the current trajectory and specific proposals in two areas: 1) accounting for the impact of interstate mobility and non-UNC institutions on supply, and 2) refining the estimates for programs at the graduate level or associated with barriers to entry (e.g. formal licensure or credential requirements).

IMPACTS OF GUN VIOLENCE ON COLLEGE CAMPUSES

Presenter: Cecilia Rodriguez Ingold (University of North Carolina at Chapel Hill)

This paper examines the effects of gun violence on college campuses on three sets of institution-level outcomes: those that involve prospective students (applications, admission, enrollment), those that characterize current students (retention, completion), and those that reflect the support of broader university-affiliated communities (donations to the universities). I merge data from IPEDS for

university outcomes, the Gun Violence Archive for the identification of gun violence incidents on campuses, and fundraising data from the Voluntary Support for Education (VSE) survey to perform differences-in-differences analyses to identify the effect of gun violence on these outcomes.

Preliminary results indicate no statistically significant effects of gun violence on applications, admissions, enrollment, test scores of the incoming cohort, donations, retention, or completions. However, there is a notable shift in the composition of the incoming student cohorts. In the year following a gun violence incident, the share of in-state students enrolled in the university decreases by almost 4 percentage points, and the share of international students drops by approximately one percentage point. These reductions are offset by a 5-percentage-point increase in out-of-state enrollment, nearly half of which comes from students within the broader region. This compositional shift persists in the second year after the incident, albeit smaller in magnitude.

MAJOR DIFFERENCES IN INCOME CONTINGENT STUDENT LOAN REPAYMENT

Presenter: Andrew Simon (University of Virginia)

The cost of financing student loan programs for governments importantly depends on student repayment behavior. Students who do not repay their loans or take a relatively long time to do so receive an implicit higher subsidy to finance their education. This implies that student loans impact the social value and cost of each field of study will vary considerably as graduates of different fields have different earnings potentials underlying repayment behavior. We use administrative tax data from Australia to study how student loan accumulation and repayment varies across fields of study. We document that high earnings fields, especially Engineering, repay a larger share of their loans more quickly, despite accumulating larger balances. Education also has high repayment rates, but its low tuition leads students to accumulate modest balances. Creative Arts majors have the lowest repayment rates with more than 20% of students in this field not making a single payment 15 years after initial loan receipt. These repayment rates alter the total subsidy to finance different types of human capital.

HIGH SCHOOL TEACHERS AND COLLEGE-RELEVANT SKILL PRODUCTION: EVIDENCE FROM ACT SCORE VALUE ADDED

Presenter: Hema Shah (Duke University)

The transition from high school to college is crucial for children's later life outcomes, yet little is known about the impacts of teachers on children's skill development during the final years of high school. I provide the first estimates of teacher value added on college admissions test scores, using administrative data from North Carolina to estimate the impacts of high school teachers on students' ACT performance. I then estimate the impacts of ACT score value added on college enrollment, college choice, and college performance. Assignment to math and English teachers with high ACT score value added increases on-time 4-year college enrollment, decreases 2-year college enrollment, and increases enrollment in selective colleges conditional on 4-year college enrollment. Assignment to math and English teachers with high ACT score value added increases freshman college GPA and credits, decreases freshman dropout, and increases 5-year college completion, conditional on 4-year college enrollment. My results suggest that high school teachers have significant scope to influence the accumulation of college-relevant cognitive skills.

THE UNINTENDED COST OF DISTANCE LEARNING: AN ANALYSIS OF CHILD MALTREATMENT

Presenter: Sungmee Kim (Duke University)
Co-Author: Jeongsoo Suh (Duke University)

Education personnel play a crucial role in identifying and reporting child maltreatment. However, school closures amid COVID-19 pandemic disrupted this vital reporting system. I causally investigate how remote learning influenced trends in child maltreatment reports and risks, leveraging county-level variations in remote learning instructional weeks in the United States during the 2020-21 school year. Utilizing maltreatment report and maltreatment-related fatality data from the National Child Abuse and Neglect Data System (NCANDS) and mortality data from the National Vital Statistics System (NVSS), I find that counties with higher exposure to remote instruction experienced fewer screened-in allegations of school-aged children, but a higher substantiated allegations and an increase in maltreatment-related child fatalities. The reduction in allegations was primarily driven by those reported by education personnel, and the impacts varied significantly based on characteristics such as the child's race/ethnicity and the type of maltreatment. These results highlight an unintended cost of distance learning: remote instruction impaired the detection of child maltreatment, leading to fewer reports but more severe cases that could have lasting impacts on children. They also urge prompt policy interventions to safeguard children who remain undetected and to repair the reporting gaps caused by educator-child disconnection.

LEARNING ABOUT RESILIENCE FROM TIME-VARYING TREATMENT EFFECTS: ACADEMIC OUTCOMES, MENTAL HEALTH AND RESILIENCE OF COLLEGE STUDENTS DURING THE COVID-19 PANDEMIC

Presenter: Jane Cooley Fruehwirth (University of North Carolina at Chapel Hill)
Co-Authors: Samuel Barker, Valentin Verdier, & Krista M. Perreira (University of North Carolina at Chapel Hill)

Resilience is the ability to adapt and bounce back in times of adversity. Increasingly, colleges invest in programs to build resilience. However, it remains an open question whether students can grow in resilience when faced with adversity and to what extent administrators should protect students from adversity. We estimate individual-specific, time-varying academic treatment effect profiles from the pandemic using administrative data. Treatment effects reveal resilience through their persistence over time. We find that students who used flexible grading policies to overcome pandemic adversity were less resilient after the flexible grading policies were removed, based on recovery profiles of treatment effects. We then link to unique survey data on socioemotional skills and mental health symptoms to determine which skills are associated with greater resilience, i.e., less persistent treatment effects. Finally, we determine whether student perceptions of their resilience grow when they successfully overcome adversity.