***Analyzing NAEP/TIMSS Data with Direct Estimation in R, Theory and Practice***

4/21/2022

8:00 to 4:30 pm PT

Westin San Diego Gaslamp: La Jolla

**Instructors**: Emmanuel Sikali, Ting Zhang, Michael Lee, Paul Bailey, and Sinan Yavuz

8:00-8:30 Introductions of participants and instructors - Emmanuel

8:30-9:30 Overview of NAEP and TIMSS - Emmanuel

9:30-9:40 10 mins break

9:40-10:25 Plausible values and direct estimation - Ting

10:25-10:35 10 mins break

10:35-10:55 Introduction to R and the packages EdSurvey and Dire - Michael

10:55-11:25 Data process and manipulation - Michael

11:25-11:35 10 mins break

11:35-12:00 Descriptive statistics (e.g., summary2, edsurveyTable) - Michael

12:00-1:00 Lunch Break

1:00-2:00 Direct estimation using EdSurvey (NAEP primer as example data) – Paul

* lm.sdf
* mml.sdf
* draw Plausible Values (PVs)

2:00-2:10 10 mins break

2:10-3:30 Direct Estimation with augmenting external data and draw PVs – Sinan and Paul

* getting an external data – ACS as example data
* linking an external data
* direct estimation on linked data
* draw PVs

3:30-4:00 Other topics – Emmanuel

- How to obtain a Restricted Data License

- How to obtain funding for your NCES Research

- Closing information and evaluations

4:00-4:30 Hands-on practice and Q&A