Concept Clearance—Reissue of Short Courses on Innovative Methodologies and Approaches in the Behavioral and Social Sciences R25 program

The OBSSR Strategic Plan identifies training the next generation of behavioral and social science (BSS) researchers as a critical foundational process, particularly in areas of cutting-edge methodologies, designs, and measures.

OBSSR has recognized the need for training future generations of BSS researchers, particularly in scientific domains that may not be widely available to most scientists. OBSSR first issued *Short Courses on Innovative Methodologies in the Behavioral and Social Sciences* R25 program (RFA-OD-13-009) in 2013, then again in 2019 as *Short Courses on Innovative Methodologies and Approaches in the Behavioral and Social Sciences* (R25; RFA-OD-19-012). OBSSR plans on reissuing the RFA every two years to keep the pool of short courses as current and timely as possible.

The first RFA was issued in 2013; there were 48 applications, and 8 awards were made. Given the unique nature of each of the programs, it is difficult to summarize the success of these programs. All receive high ratings in their evaluations, and all programs have shown agility in tailoring their courses based on suggestions made by students and instructors. All actively recruit underrepresented populations both as instructors and participants. Following are examples of progress from the first cohort of short courses:

- One program focusing on causal analysis has taught an average of 90 students a year, with 53 unique faculty. There is extensive collaboration among students and instructors, resulting in publications and grant applications. While the primary course is taught in-person, videos of the classes are available online.
- Another program has taught 19 courses related to epidemiology and population health. There are online options, and continued interactions among students and staff is facilitated post-course. In 2017 alone the course had participants from 29 different countries.
- A course on dynamic systems modeling developed a semester-long course that the instructors then packaged so that it could be taught elsewhere. They have also developed an online community for continued contact post course.
- A year-long Community-Based Participatory Research (CBPR) course begins with a week-long intensive in-person course that is followed by monthly activities (e.g. mentor meetings, interactive online forums) and an e-community for continued co-learning and career development. This course enrolls pairs of academicians and community partners; in the first three years of the program they enrolled 12 teams (73 individuals).
- The Mixed Methods course has an intensive summer course followed by a year of mentoring. There is pairing of scholars and mentors that work closely together throughout the course. This program features a much-used website that receives approximately 60 hits per day. The program has also resulted in quite a few publications and conference presentations.

- A course on power calculations in multilevel and longitudinal studies has the unique approach of taking the course to interested institutions rather than having the students come to them. This is a three-day course that is also offered entirely online, with an accompanying course book developed by the investigators. Within the first three years, scientists from more than 100 specialties had attended the course.
- A mobile health (mHealth) course integrates team science principles into its program that reaches 175-213 participants per year. This course is also available in an online forum that in three years logged 66,560 page views from more than 14,000 users from 140 countries.

The RFA was reissued in in 2019. There were 27 applications, and 10 awards were made. Progress is limited at this time, since awards were only made in the fall of 2019. The first courses would only have been held this past summer; additionally, the programs needed to pivot to deal with COVID pandemic conditions. Most chose to convert to an online forum, but a few decided to postpone until 2021.

This program is well-received by the broader NIH IC community and has been able to fund educational opportunities that might not otherwise be supported (e.g. an intensive course on mixed methods). Possible educational topics include, but are not limited to: neuroimaging methods related to BSS; approaches to make better use of big data; open science paradigms for BSS; computational approaches for multilevel data; approaches for translating basic BSS into the development and testing of prevention and intervention programs.