Keynote Lectures

K4 - Better Research and Better Uptake: Lessons from the Pandemic

Prof Paul GLASZIOU
Director, Institute for Evidence-Based Healthcare
Faculty of Health Sciences & Medicine, Bond University, Australia

Paul is Professor of Evidence-Based Practice at Bond University and the Director of the Institute for Evidence Based Healthcare. He was the Director of the Centre for Evidence-Based Medicine in Oxford from 2003-2010. His key interests include identifying and removing the barriers to using high quality research in everyday clinical practice. He is a leader within the Reward Alliance, investigating research waste and promoting better prioritisation, design, conduct, regulation, management and reporting of health research. Other interests include overdiagnosis and overtreatment, general practice, uptake of evidence for non-drug interventions, and automation of systematic review processes.

Jeremy Farrar, Director of Wellcome and Chair of the World Health Organization R&D Blueprint Scientific Advisory Group, has said "It's critical that the global research effort is rapid, robust and is conducted at scale and co-ordinated across multiple countries." The record setting speed of development and testing of vaccines was built on the work of CEPI - Coalition for Epidemic Preparedness Innovations, and has begun to halt the pandemic, though slowed by vaccine hesitancy.

Similarly, the rapid clear answers to treatment questions have saved hundreds of thousands of lives during the course of the COVID-19 pandemic. In previous pandemics, large-scale randomized trials were generally not set up in time. Many of the >2,000 planned drug studies examining COVID-19 treatments (www.covid-trials.org), most have delivered little or no directly useful information. However, there are some important exceptions, with trials such as RECOVERY, REMAP-CAPS and SOLIDARITY setting new standards and showing that a combination of old-fashioned randomization, established clinical-trials networks and imaginative use of modern information technology can provide many rapid and reliable therapeutic answers. The speed of the RECOVERY trial was record-breaking: the period from protocol to first patient recruitment was nine days, with the 176 UK hospitals recruiting >12,000 hospitalized patients (15% UK COVID-19 cases), and it provided clear answers within a few months on the effectiveness of dexamethasone and the ineffectiveness of hydroxychloroquine and lopinavir–ritonavir.

While the pandemic has seen remarkable trials for vaccines and drug treatments, much less has been done to evaluate the effects of Public Health and Social Measures (also known as non-pharmaceutical' interventions - NPIs - or Behavioural, Environmental, Social and Systems Interventions – BESSIs. Only a handful of trials have been registered and few completed in time to influence practice and policy. Important lessons can be learned from examining both the successes and failures of research during this pandemic, both in research and in its implementation.