

Bitesize Bio Webinar

# **Development of Ultrasensitive Immunoassays for SARS-CoV-2 Antibody Detection**

Date: Tuesday, February 23, 2021 Time: 11am EST / 5pm CET

## In this webinar, you will learn about:

- The importance of assay sensitivity in COVID-19 serology research
- The benefits of Single Molecule Counting (SMC<sup>™</sup>) ultrasensitive immunoassay technology
- The development of SMC<sup>™</sup> SARS-CoV-2 kits

Immunoassay-based serology techniques play key roles in many SARS-CoV-2 research programs due to their ability to identify and characterize the immune response of individuals already infected by the virus through analysis of biomarkers such as immunoglobulins (Ig). However, the limited sensitivity and resolution offered by traditional assay platforms and their serology assays can leave unanswered crucial research questions. We harnessed the power of the Single Molecule Counting (SMC<sup>™</sup>) ultrasensitive immunoassay platform for the development of SARS-CoV-2 specific antibody assays, which can be used to resolve subtle differences in humoral immunity among individuals and detect antibody response earlier after infection. These assays may also be used to thoroughly profile immune responses after vaccine challenge.

This webinar describes the process by which these new kits were developed by the Custom Assay & Sample Testing (CAST) team at MilliporeSigma, and details key data from the assay development and verification work, including signal linearity, sensitivity and specificity determination, assay precision, and cross-reactivity.

#### For Research Use Only. Not For Use In Diagnostic Procedures.

#### To register, visit:

https://bitesizebio.com/webinar/immunoassays-for-sars-cov-2antibodies/

### **About the Speaker**



**Rosemary Sweetwood** Manager, CAST Sample Testing MilliporeSigma

Rosemary has worked with SMC<sup>™</sup> technology for over seven years in diagnostic development, assay development, and custom manufacturing, as well as managing clinical sample testing projects for our SMC<sup>™</sup> Sample Testing customers. With almost two decades of research experience working in government research labs, Academia, and Biotech/Pharma, Rosemary has publications spanning neurology, virology, and immunology. She has also worked in early phase vaccine research with several vaccines that have gone into clinical trials, and biomarker assay development has been a critical function throughout Rosemary's career.

