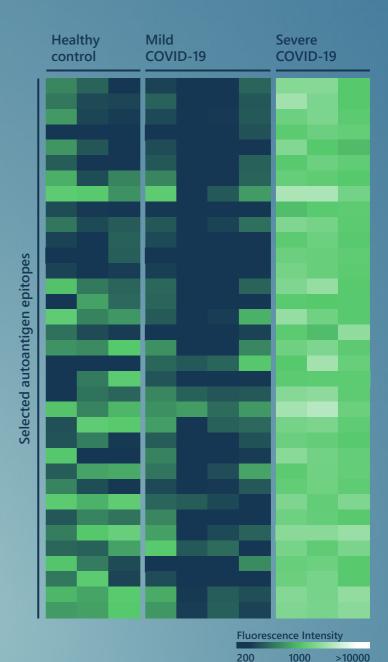
Autoantibodies in SARS-CoV-2

A look at IgA responses of COVID-19 patient sera to known human autoantigens.

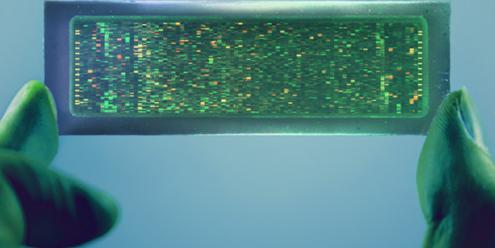
Identify and monitor autoantibodies in COVID-19 patient sera with the new PEPperCHIP® Autoimmune Human Epitope Microarray.

The chip contains 3,723 human B-cell autoimmune disease associated epitopes, including peptide variants with citrulline and acetyllysine.

Fig. 1. IgA fluorescence intensity heat maps showing IgA reponses in healthy, mild, and severe COVID-19 patient sera against selected human autoantigen peptides in the PEPperCHIP® Autoimmune Human Epitope Microarray.



To learn more about the new PEPperCHIP® Autoimmune Human Epitope Microarray, email us at info@pepperprint.com.







PEPperCHIP® Autoimmune Human Epitope Microarray

Product: PEPperCHIP® Peptide Microarray

Organism: Homo sapiens

Epitope related diseases: Autoimmune diseases of the:

· urogenital tract

• blood (e.g. antiphospholipid syndrome)

• cardiovascular system

• central nervous system (e.g. multiple sclerosis)

endocrine system (e.g. diabetes mellitus)

· eyes, nose and throat

• musculoskeletal system (e.g. rheumatoid arthritis)

· peripheral nervous system

skin and connective tissue (e.g. vitiligo)

• systemic autoimmune disease (e.g. systemic lupus erythematosus)

For more information, please visit the Immune Epitope Database

(http://www.iedb.org/).

Microarray Content: 3,723 human B-cell epitopes associated with autoimmune diseases from the

Immune Epitope Database (http://www.iedb.org/) including 534 citrullinated

peptide variants and 29 peptide variants with acetyllysine.

More information on the epitope content is available in the Excel file: "Peptide

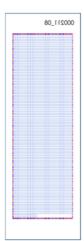
Map Autoimmune Human Epitope Microarray.xlsx".

Epitope / Peptide Lengths: 4 - 50 aa / 4 to 17 aa depending on the epitope length; longer epitopes were

translated into overlapping 17 aa peptides

Number of Peptides/Spots: 5,315 / 10,630 (peptides in duplicate)

Microarray Layout:



Each PEPperCHIP® Peptide Microarray is marked with microarray ID on the backside of the glass slide. The glass slide is accurately placed in an incubation tray with the microarray surface up if the microarray ID appears in the top right corner in a mirror view manner.

The PEPperCHIP® Autoimmune Human Epitope Microarray contains a single peptide array and is compatible with a 3/1-well PEPperCHIP® Incubation Tray.

Each PEPperCHIP® Autoimmune Human Epitope Microarray further contains additional HA, polio and c-Myc control peptides (78, 76 and 76 spots each control).

Microarray Layout Files: Excel: Peptide Map Autoimmune Human Epitope Microarray.xlsx

Mapix: Autoimmune Human Epitope Microarray.gal