

PEPperCHIP® Yellow Fever Virus Proteome Microarray

Product: PEPperCHIP® Peptide Microarray

Organism: Yellow fever virus

Strains: 17D vaccine

Ghana/Asibi/1927

Microarray Content: Genome polyproteins are cleaved into the following 14 chains:

- 1. Capsid protein C (Core protein)
- 2. prM
- 3. Peptide pr
- 4. Small envelope protein M (Matrix protein)
- 5. Envelope protein E
- Non-structural protein 1
- 7. Non-structural protein 2A
- 8. Non-structural protein 2A-alpha
- 9. Serine protease subunit NS2B (Flavivirin protease NS2B regulatory subunit, Non-structural protein 2B)
- 10. Serine protease NS3 (Flavivirin protease NS3 catalytic subunit, Nonstructural protein 3)
- 11. Non-structural protein 4A
- 12. Peptide 2k
- 13. Non-structural protein 4B
- 14. RNA-directed RNA polymerase NS5 (Non-structural protein 5)

Protein	Uniprot Entry	Protein Length
Genome polyprotein	P03314	3,411 aa
(strain 17D vaccine)		
Genome polyprotein	Q6DV88	3,411 aa
(strain Ghana/Asibi/1927)		

Sequence Compilation:

The protein sequences were elongated by neutral GSGSGSG linkers to avoid truncated peptides. The elongated protein sequences were translated into 15 aa peptides printed in duplicate with a maximum peptide-peptide overlap of 14 aa for full epitope coverage. Redundant peptides were deleted.

peptide length/overlap: 15 aa / 14 aa

number of peptides/spots: 3,834 / 7,668



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.

PEPperCHIP® Yellow Fever Virus Proteome Microarray contains a single peptide array each chip and is compatible with a 3/1-well PEPperCHIP® Incubation Tray.

Each PEPperCHIP® Yellow Fever Virus Proteome Microarray further contains HA, Polio and c-Myc control peptides (28, 32, 24 spots each control).

Microarray Layout Files: Excel: Peptide_Map_Yellow_Fever_Virus_Proteome_Microarray.xlsx

MAPIX / GenePix® Pro: Yellow_Fever_Virus_Proteome_Microarray.gal