SANTA CRUZ BIOTECHNOLOGY, INC.

HepC NS4b (2H1): sc-52416

SANTA CRUZ BIOTECHNOLOGY

The Power to Question

BACKGROUND

Hepatitis C virus (HCV), the major causative agent of chronic and sporadic non-A, non-B hepatitis worldwide, and GBV-C or hepatitis G virus (HGV), which is closely related to HCV, are members of the hepacivirus genus of the flavi-viridae family. Nonstructural (NS) proteins of HCV play major roles in viral replication and the pathogenesis of liver diseases. HCV non-structural proteins, including NS5a, form a large multiprotein replication complex, which directs the replication of the HCV genome. The NS5a nonstructural protein of HCV has been shown to inhibit the cellular interferon (IFN)-induced protein kinase R (PKR). The nonstructural protein 5b (NS5b) of HCV is an RNA-dependent RNA polymerase (RdRp) which plays an essential role in viral RNA replication. The NS3 protein of hepatitis C virus (HCV) contains protease and RNA helicase activities, both of which are likely to be essential for HCV propagation. The HGV NS3 protease is responsible for the cleavage of the HGV polyprotein at four different locations. The small proteins NS2a, NS2b, NS4a and NS4b are hydrophobic, suggesting a possible membrane-related function.

REFERENCES

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2. Pawlotsky, J.M. and Germanidis, G. 1999. The non-structural 5a protein of hepatitis C virus. J. Viral. Hepat. 5: 343-356.
3. Garcia, F., Jr., Garcia, F., Bernal, M.C., Piedrola, G. and Maroto, M.C. 2000. Genomic variability of hepatitis G virus/GBV-C at the NS3 region: clinical implications. Microbios 401: 17-25.
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7. Lee, Y.J., Kang, H., Rho, S.H., Eom, S.H. and Park, W.J. 2001. Assessment of substrate specificity of hepatitis G virus NS3 protease by a genetic method. Biochem. Biophys. Res. Commun. 1: 171-175.

SOURCE

Hep C NS4b (2H1) is a mouse monoclonal antibody raised against recombinant Hep C NS4b.

PRODUCT

Each vial contains 200 µg IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

APPLICATIONS

Hep C NS4b (2H1) is recommended for detection of an epitope corresponding to amino acids 1710-1730 of NS4 region of Hep C origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunofluorescence (starting dilution 1:50, dilution range 1:50-1:500) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

Molecular Weight of Hep C NS4: 27 kDa.

SELECT PRODUCT CITATIONS

1. Jeong, S., Lee, Y.S., Kim, K., Yoon, J.S., Kim., S., Ha, J., Kang, I. and Choe, W. 2021. 2-O-methylhonokiol suppresses HCV replication via TRAF6-mediated NF-κB activation. Int. J. Mol. Sci. 22: 6499.

STORAGE

Store at 4° C, **DO NOT FREEZE**. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

RESEARCH USE

For research use only, not for use in diagnostic procedures.

PROTOCOLS

See our web site at www.scbt.com for detailed protocols and support products.