Human Respiratory Syncytial Virus, A2001/2-20

Catalog No. NR-28525

For research use only. Not for human use.

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Manufacturer:
BEI Resources

Product Description:

Virus Classification: Paramyxoviridae, Pneumovirinae, Pneumovirus, Human respiratory syncytial virus
Species: Human respiratory syncytial virus
Strain: A2001/2-20
Original Source: Human respiratory syncytial virus (RSV), A2001/2-20 was isolated from a nasal wash from an infant with RSV bronchiolitis in Nashville, Tennessee on February 20, 2001. 1

Comments: A2001/2-20 is one of six clinical RSV isolates that recently were shown to induce variable disease severity, lung interleukin-13 (IL-13) levels, and gob-5 levels in BALB/cJ mice. 2 IL-13 is a cytokine linked to mucus production and gob-5 is a calcium-activated chloride channel family member implicated in airway inflammation. 3,4 Compared to mock infection, RSV A2001/2-20 infection led to relatively high levels of gob-5 and significantly elevated levels of IL-13 in lung tissue. This isolate also induced a bimodal weight loss pattern in infected mice, with peaks at day 2 and day 6 post-infection. RSV A2001/2-20 infection caused the most severe disease of any isolate tested, and was characterized by airway hyperresponsiveness and mucin expression, perivascular edema, epithelial desquamation, bronchiolitis, and increased breathing effort. 5

Material Provided:
Each vial contains approximately 1 mL of cell lysate and supernatant from HEp-2 cells (ATCC® CCL-23™) infected with human respiratory syncytial virus, A2001/2-20.

Note: If homogeneity is required for your intended use, please purify prior to initiating work.

Packaging/Storage:
NR-28525 was packaged aseptically in screw-capped plastic cryovials. The product is provided frozen and should be stored at -60°C or colder immediately upon arrival. For long-term storage, the vapor phase of a liquid nitrogen freezer is recommended. Freeze-thaw cycles should be avoided.

Growth Conditions:

Host: HEp-2 cells (ATCC® CCL-23™)
Growth Medium: Eagle’s Minimum Essential Medium supplemented with 2% fetal bovine serum
Infection: Cells should be 60% to 80% confluent
Incubation: 3 to 7 days at 37°C and 5% CO2
Cytopathic Effect: Rounding and sloughing

Citation:
Acknowledgment for publications should read “The following reagent was obtained through BEI Resources, NIAID, NIH: Human Respiratory Syncytial Virus, A2001/2-20, NR-28525.”

Biosafety Level: 2

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References:

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