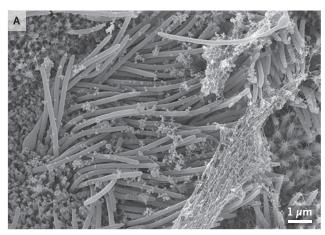
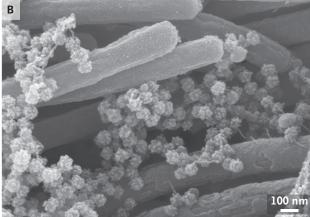
IMAGES IN CLINICAL MEDICINE

Chana A. Sacks, M.D., Editor

SARS-CoV-2 Infection of Airway Cells





N A LABORATORY SETTING, SEVERE ACUTE RESPIRATORY SYNDROME COROnavirus 2 (SARS-CoV-2) was inoculated into human bronchial epithelial cells. This inoculation, which was performed in a biosafety level 3 facility, had a multiplicity of infection (indicating the ratio of virus particles to targeted airway cells) of 3:1. These cells were then examined 96 hours after infection with the use of scanning electron microscopy. An en face image (Panel A) shows an infected ciliated cell with strands of mucus attached to the cilia tips. At higher magnification, an image (Panel B) shows the structure and density of SARS-CoV-2 virions produced by human airway epithelial cells. Virus production was approximately 3×10^6 plaque-forming units per culture, a finding that is consistent with a high number of virions produced and released per cell.

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