Preclinical evaluation of a vaccine against herpes viruses

August 4 2016

Oral and genital herpes are caused by the herpes simplex virus type 1 (HSV-1) and the herpes simplex virus type 2 (HSV-2), which both cause lifelong infection. HSV-2 infection is associated with increased risk for HIV infection. HSV2-infected women pose a risk of transmitting this dangerous infection to newborn babies; therefore, avoiding herpes infection during pregnancy is very important.

In this issue of *JCI Insight*, researchers from the Albert Einstein College of Medicine report a promising vaccine strategy for immunizing against both HSV-1 and HSV-2 infections.

Led by Betsy Herold and William Jacobs Jr., the researchers expanded upon previous work from their group indicating that a vaccine made from an engineered HSV-2 virus that lacks expression of glycoprotein D could protect against infection with a single strain of HSV-2 in mice.

The current report shows that vaccination protects mice from multiple clinical isolates of HSV-1 and HSV-2 infection.

Mice rapidly cleared virus after infection and did not develop long-term latent infections. These studies provide exciting preclinical support for a new vaccine strategy to prevent infection by herpes viruses.

**More information:** Christopher D. Petro et al, HSV-2 ΔgD elicits FcγR-effector antibodies that protect against clinical isolates, *JCI Insight* (2016). [DOI: 10.1172/jci.insight.88529]
Provided by JCI Journals

Citation: Preclinical evaluation of a vaccine against herpes viruses (2016, August 4) retrieved 21 August 2023 from https://medicalxpress.com/news/2016-08-preclinical-vaccine-herpes-viruses.html

This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.