



## NIH AIDS Reagent Program

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### DATA SHEET

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**Reagent:** ☒ rVV/ST

**Catalog Number:** 771

**Lot Number:**

**Provided:** 1 vial cell-free virus,  $1 \times 10^9$  pfu/ml at 72 hours.

**Cloning Vector:** Vaccinia virus, strain IHDJ. Infects a wide range of mammalian cells.

**Description:** This recombinant vaccinia vector expresses the *env* gene of HIV-2<sub>ST</sub>. The 2797 bp *Ava*I-*Eco*O109 fragment excised from plasmid pJSP4-27/H6, encompassing 91 extra nucleotides 5' to the *env* AUG, was ligated into the *Sma*I site of the vaccinia virus recombination vector.<sup>1</sup> The *env* gene is under control of the vaccinia p7.5 early/late promoter, and is co-expressed with the *lacZ* gene under control of the p11 vaccinia promoter.<sup>3</sup>

**Special Characteristics:** The *env* fragment was inserted into recombination plasmid pSC11 (provided by Dr. Bernard Moss, NIAID), followed by subsequent homologous recombination into the TK gene of vaccinia.<sup>1</sup> HIV-2/ST is a non-cytopathic, non-fusogenic strain of HIV-2<sup>2</sup> initially provided by Dr. Beatrice Hahn. rVV/ST expresses high levels of HIV-2 envelope protein that is processed and transported to the cell surface.

**Recommended Storage:** -70degreeC.

**Contributor:** Dr. Mark J. Mulligan, Departments of Medicine and Microbiology, University of Alabama, Birmingham, AL.

**References:** 1. Mulligan MJ, Kumar P, Hui H, Owens R, Ritter D, Hahn B. The *env* protein of an infectious noncytopathic HIV-2 is deficient in syncytium formation. *AIDS Res Hum Retroviruses* **6**:707-720, 1990. 2. Kong LI, Lee S-W, Kappes JC, Parkin JS, Decker D, Hoxie JA, Hahn BH, Shaw GM. West African HIV-2-related human retrovirus with attenuated cytopathicity. *Science* **10**:1525-1529, 1988. 3. Mulligan MJ, Ritter D, Chaikin M, Yamshchikov GV, Kumar P, Hahn BH, Sweet R, Compans RW. Human immunodeficiency virus type 2 envelope glycoprotein: differential CD4 interactions of soluble gp120 versus the assembled envelope complex. *Virology* **187**:222-244, 1993. 4. Mulligan MJ

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ALL RECIPIENTS OF THIS MATERIAL MUST COMPLY WITH ALL APPLICABLE BIOLOGICAL, CHEMICAL, AND/OR RADIOCHEMICAL SAFETY STANDARDS INCLUDING SPECIAL PRACTICES, EQUIPMENT, FACILITIES, AND REGULATIONS. NOT FOR USE IN HUMANS.

the assembled envelope complex. *virology* **187**:233-241, 1992. T. Mulligan MJ, Yamshchikov GV, Ritter GD, Gao F, Jim MJ, Nail CD, Spies CP, Hahn BH, Compans RW. Cytoplasmic domain truncation enhances fusion activity by the exterior glycoprotein complex of human immunodeficiency virus type 2 in selected cell types. *J Virol* **66**:3971-3975, 1992.

**NOTE:**

Acknowledgment for publications should read "The following reagent was obtained through the NIH AIDS Reagent Program, Division of AIDS, NIAID, NIH: rVV/ST from Dr. Mark J. Mulligan." Also include the references cited above in any publications.

**The US Government has submitted a patent application on the parent plasmid pSC11.**

**Scientists at for-profit institutions or who intend commercial use of this reagent must contact Dr. Sally Hu at the NIH Office of Technology Transfer, Email: [hus@mail.nih.gov](mailto:hus@mail.nih.gov), Phone: 301-435-5606, before the reagent can be released. Please specify the name and a description of the intended use of the reagent.**

**Last Updated:**

June 24, 2013

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