



NIH AIDS Reagent Program

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DATA SHEET

Reagent: HIV-1 YU2 Infectious Molecular Clone

Catalog Number: 1350

Lot Number: 040591

Release Category: C

Provided: 1 vial transformed JM109 bacteria.

Cloning Vector: pTZ19R (United States Biochemical).

Cloning Site: *SphI-SalI*.

GenBank: M93258

Description: *SalI-EcoRI* (5') and *EcoRI-SphI* (3') fragments were ligated and cloned into the *SphI-SalI* site of pTZ19R to produce the full length, nonpermuted clone pYU2.

Special Characteristics: This is the first full length proviral HIV-1 clone derived directly from uncultured material. pYU2 is a replication competent, infectious molecular clone. Virus derived from this clone productively infects primary lymphocytes, primary monocytes and macrophages, and Molt-4 clone 8 cells, but does not replicate in Sup-T1 or CEMx174 cells. Growth of the bacteria at 30°C is less likely to cause deletions than growth at higher temperatures. Source of Pro Virus: Proviral DNA was cloned directly from human brain tissue without extensive cell culture from a patient who died of AIDS dementia complex. Ampicillin resistant.

Recommended Storage: -70°C.

Contributor: Dr. Beatrice Hahn and Dr. George M. Shaw.

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.

References:

Li Y, Hui H, Burgess CJ, Price RW, Sharp PM, Hahn BH, Shaw GM. Complete nucleotide sequence, genome organization, and biological properties of human immunodeficiency virus type 1 in vivo: evidence for limited defectiveness and complementation. *J Virol* **66**:6587-6600, 1992. Li Y, Kappes JC, Conway JA. Price RW, Shaw GM, Hahn BH. Molecular characterization of human immunodeficiency virus type 1 cloned directly from uncultured human brain tissue: identification of replication-competent and -defective viral genomes. *J Virol* **65**:3973-3985, 1991.

NOTE:

Acknowledgment for publications should read "The following reagent was obtained through the NIH AIDS Reagent Program, Division of AIDS, NIAID, NIH: pYU-2 from Dr. Beatrice Hahn and Dr. George Shaw." Also include the references cited above in any publications.

Last Updated:

July 11, 2018

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