



## NIH AIDS Reagent Program

20301 Century Boulevard  
Building 6, Suite 200  
Germantown, MD 20874  
USA

Phone: 240 686 4740  
Fax: 301 515 4015  
aidsreagent.org

### DATA SHEET

<b>Reagent:</b>	Emtricitabine
<b>Catalog Number:</b>	10071
<b>Lot Number:</b>	NB16-106-3
<b>Release Category:</b>	A
<b>Provided:</b>	20 mg
<b>Chemical Name:</b>	4-amino-5-fluoro-1-[(2R,5S)-2-(hydroxymethyl)-1,3-oxathiolan-5-yl]-2(1H)-pyrimidinone
<b>Empirical Formula:</b>	C <sub>8</sub> H <sub>10</sub> FN <sub>3</sub> O <sub>3</sub> S
<b>Molecular Weight:</b>	247.2
<b>CAS Num:</b>	143491-57-0
<b>Solubility:</b>	Solubility in water is about 112 mg/ml at 25°C.
<b>Mechanical Action:</b>	Emtricitabine, a nucleoside analogue of cytidine, is phosphorylated by cellular enzymes to form emtricitabine 5'-triphosphate. Emtricitabine 5'-triphosphate inhibits the activity of HIV-1 reverse transcriptase by competing with the natural substrate deoxycytidine 5'-triphosphate and by being incorporated into nascent viral DNA which results in chain termination.
<b>Special Characteristics:</b>	<a href="#">Click here for the SDS</a> Alternate name: (-)FTC

---

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.

**Recommended Storage:** Room Temperature. Can be stored at -20°C upon reconstitution.

**Contributor:** NIAID, DAIDS

**NOTE:** Acknowledgment for publications should read "The following reagent was obtained through the NIH AIDS Reagent Program, Division of AIDS, NIAID, NIH: Emtricitabine from NIAID, DAIDS (cat# 10071)."

**Last Updated** November 25, 2019

---

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.