

Product Name	: AMD-070
Synonyms	: AMD-11070
Cat No.	: M15031
CAS Number	: 558447-26-0
Molecular Formula	: C ₂₁ H ₂₇ N ₅
Formula Weight	: 349.47
Chemical Name	: 1,4-Butanediamine, N1-(1H-benzimidazol-2-ylmethyl)-N1-[(8S)-5,6,7,8-tetrahydro-8-quinolinyl]-
Description	A potent and selective antagonist of CXCR4 with IC₅₀ of 13 nM in a CXCR4 125I-SDF inhibition binding assay; displays no significant activity (IC₅₀>10 uM) for a series of other closely GPCRs (CCR1, CCR2b, CCR4, CCR5, CXCR1, and CXCR2); inhibits the replication of T-tropic HIV-1 (NL4.3 strain) in MT-4 cells and PBMCs with IC₅₀ of 2 nM and 26 nM, respectively, with noncytotoxic to cells (>23 uM); exhibits good PK profiles and excellent oral bioavailability; also inhibits CXCR4/SDF-1-mediated events in ALL cancer cells and transplant models.HIV Infection Phase 3 Clinical
Pathway	: GPCR/G Protein
Target	: Chemokine Receptor
Receptor	: Chemokine Receptor
Solubility	: 10 mM in DMSO
SMILES	: C1CC(C2=C(C1)C=CC=N2)N(CCCCN)CC3=NC4=CC=CC=C4N3
Storage	: (-20°C)
Stability	: ≥ 2 years
Reference	:

1. Skerlj RT, et al. J Med Chem. 2010 Apr 22;53(8):3376-88.| 2. Stone ND, et al. Antimicrob Agents Chemother. 2007 Jul;51(7):2351-8.| 3. Parameswaran R, et al. Leukemia. 2011 Aug;25(8):1314-23.