Human SAMHD1 Knockdown Cell Line (WB-Validated)

Catalog #: C62473

Aliases

SAMHD1; SAM And HD Domain Containing Deoxynucleoside Triphosphate Triphosphohydrolase 1; MOP-5; Monocyte Protein 5; SBBI88; HDDC1; Deoxynucleoside Triphosphate Triphosphohydrolase SAMHD1; SAM Domain And HD Domain-Containing Protein 1; Dendritic Cell-Derived IFNG-Induced Protein; SAM Domain And HD Domain 1; HSAMHD1; DNTPase; Mg11; AGS5; DCIP; Aicardi-Goutieres Syndrome 5; HD Domain Containing 1; EC 3.1.5.-; CHBL2; MOP5

Background

Gene Name: SAMHD1
NCBI Gene Entry: 25939

Storage

Store at liquid nitrogen for 1 year.

Kit Components

1. Human SAMHD1 Knockdown Cell Line (Wb-Validated)
2. Wild-type cell line

Parental Cell Line

Human cell line supplied by the client

Validation Methods

RT-qPCR, Western blotting (WB)

Shipping

Shipped on Dry Ice.

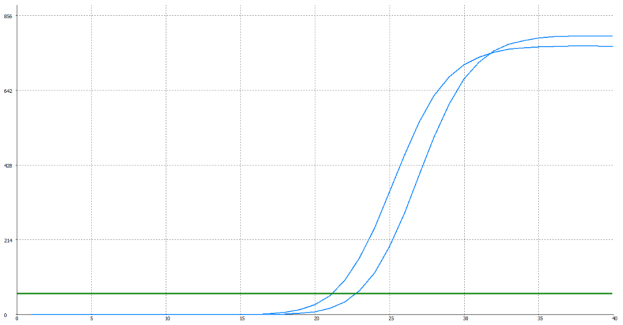
Instructions For Use

This knockdown cell line should be paired with wild-type cell line for use.

Note: This product is for research use only.

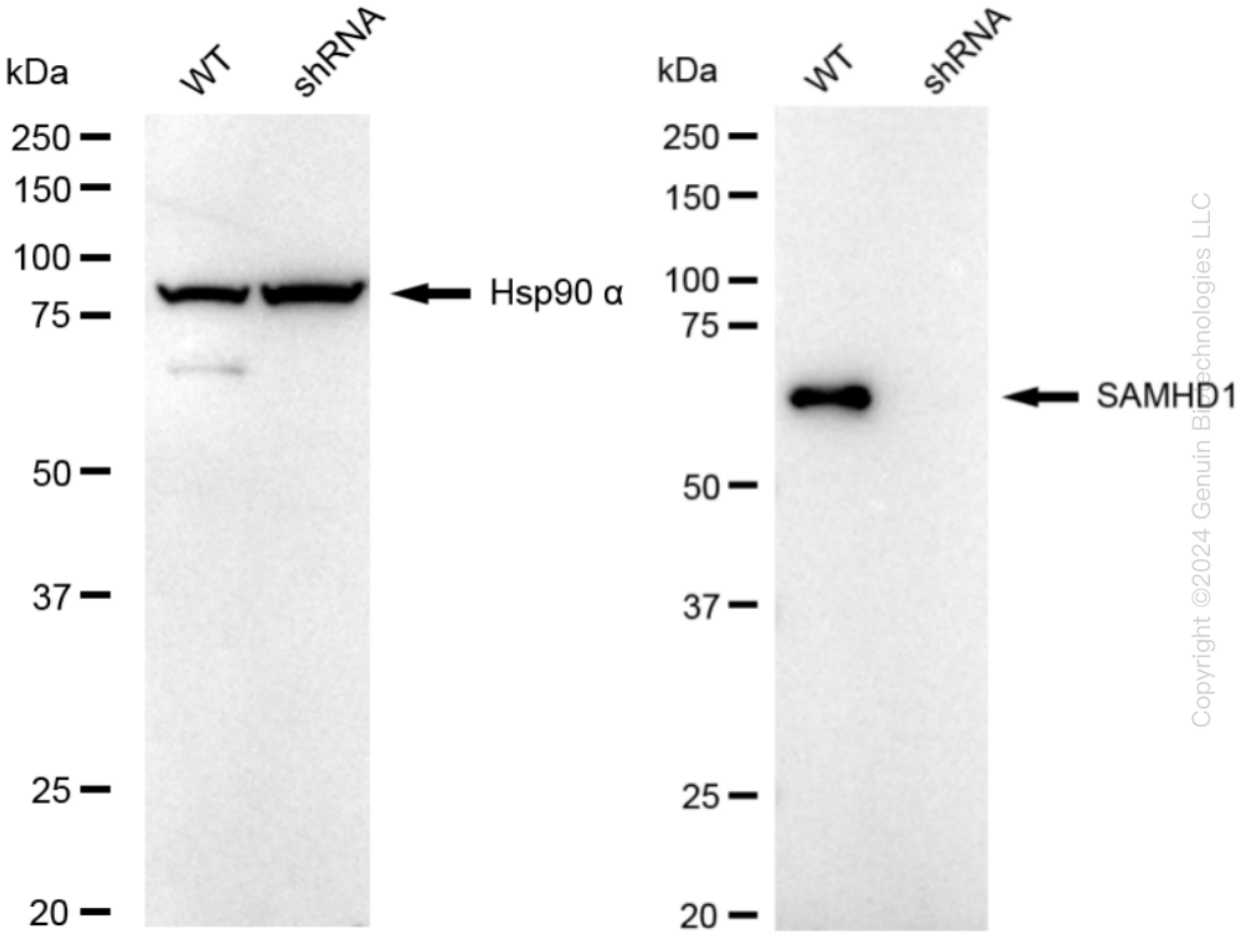
Validation Data

Human SAMHD1 Knockdown Cell Line (WB-Validated)



Genotype	Ct Value
Wild-Type	21.00
Knock-Down	22.64
ΔCt (Ct_{KD}-Ct_{WT})	1.64
% mRNA Reduction	⬇ 68%

RT-qPCR analysis. HeLa cells were infected with SAMHD1-specific shRNA lentiviral particles, total RNA was extracted from wild-type and knockdown cells, RT-qPCR was performed using gene-specific primers. ΔCt (CtKD-CtWT) was used to calculate mRNA reduction (%) between wild-type and knockdown cells using the following formula: (1-1/2ΔCt) x 100%.



Western blotting analysis. SAMHD1 protein expression in wild-type (WT) and shRNA knockdown (KD) HeLa cells was detected using Western blotting. Hsp90 α served as a loading control. The blots were incubated with primary antibodies against SAMHD1 and Hsp90 α, respectively, followed by incubating with HRP-conjugated goat anti-rabbit secondary antibody. Images were developed using FeQ™ ECL Substrate Kit.