

EHMT1 (N-16): sc-68165

BACKGROUND

EHMT1 (also known as euchromatic histone-lysine N-methyltransferase 1) is a widely expressed histone methyltransferase. EHMT1 belongs to the histone-lysine methyltransferase family and contains eight ANK repeats, one pre-SET domain and one SET domain. It acts to methylate Lys 9 of Histone H3, which represents a specific tag for epigenetic transcriptional repression by recruiting HP1 proteins to methylated histones. During G₀ phase, EHMT1 is found as part of the E2F6.com-1 complex and probably contributes to silencing of Myc- and E2F-responsive genes, suggesting a role in G₀/G₁ transition in the cell cycle. EHMT1 defects are the cause of chromosome 9q subtelomeric deletion syndrome. Common indicators of this syndrome are severe mental retardation, hypotonia, brachy(micro)cephaly, epileptic seizures, synophrys, prognathism, macroglossia and conotruncal heart defects.

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RESEARCH USE

For research use only, not for use in diagnostic procedures.

CHROMOSOMAL LOCATION

Genetic locus: EHMT1 (human) mapping to 9q34.3; Ehmt1 (mouse) mapping to 2 A3.

SOURCE

EHMT1 (N-16) is an affinity purified goat polyclonal antibody raised against a peptide mapping at the N-terminus of EHMT1 of human origin.

PRODUCT

Each vial contains 200 µg IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-68165 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

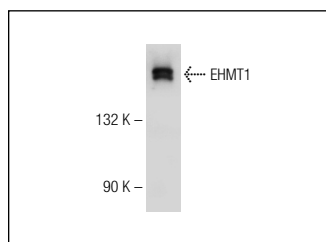
EHMT1 (N-16) is recommended for detection of EHMT1 of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 µg per 100-500 µg of total protein (1 ml of cell lysate)], immunofluorescence (starting dilution 1:50, dilution range 1:50-1:500) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

Suitable for use as control antibody for EHMT1 siRNA (h): sc-62261, EHMT1 siRNA (m): sc-62262, EHMT1 shRNA Plasmid (h): sc-62261-SH, EHMT1 shRNA Plasmid (m): sc-62262-SH, EHMT1 shRNA (h) Lentiviral Particles: sc-62261-V and EHMT1 shRNA (m) Lentiviral Particles: sc-62262-V.

Molecular Weight of EHMT1: 138 kDa.

Positive Controls: K-562 whole cell lysate: sc-2203.

DATA



EHMT1 (N-16): sc-68165. Western blot analysis of EHMT1 expression in K-562 nuclear extract.

STORAGE

Store at 4° C, ****DO NOT FREEZE****. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

PROTOCOLS

See our web site at www.scbt.com or our catalog for detailed protocols and support products.