INO80D siRNA (m): sc-140642



The Power to Question

BACKGROUND

The INO80 complex contributes to a wide variety of chromatin-dependent nuclear transactions, including transcription, DNA repair and DNA replication. Evolutionarily conserved from yeast to human, theINO80 complex belongs to a subfamily of the ATP-dependent chromatin remodelers and is characterized by a split ATPase domain in the core ATPase subunit. ATP-dependent chromatin remodeling complexes contain ATPases of the Swi/Snf superfamily and alter DNA accessibility of chromatin in an ATP-dependent manner. INO80D (INO80 complex subunit D), is an 878 amino acid protein that is a component of the chromatin-remodeling INO80 complex.

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CHROMOSOMAL LOCATION

Genetic locus: Ino80d (mouse) mapping to 1 C2.

RESEARCH USE

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

PRODUCT

INO80D siRNA (m) is a target-specific 19-25 nt siRNA designed to knock down gene expression. Each vial contains 3.3 nmol of lyophilized siRNA, sufficient for a 10 μ M solution once resuspended using protocol below. Suitable for 50-100 transfections. Also see INO80D shRNA Plasmid (m): sc-140642-SH and INO80D shRNA (m) Lentiviral Particles: sc-140642-V as alternate gene silencing products.

STORAGE AND RESUSPENSION

Store lyophilized siRNA duplex at -20° C with desiccant. Stable for at least one year from the date of shipment. Once resuspended, store at -20° C, avoid contact with RNAses and repeated freeze thaw cycles.

Resuspend lyophilized siRNA duplex in 330 μ l of the RNAse-free water provided. Resuspension of the siRNA duplex in 330 μ l of RNAse-free water makes a 10 μ M solution in a 10 μ M Tris-HCl, pH 8.0, 20 mM NaCl, 1 mM EDTA buffered solution.

APPLICATIONS

 $\ensuremath{\mathsf{INO80D}}$ siRNA (m) is recommended for the inhibition of INO80D expression in mouse cells.

SUPPORT REAGENTS

For optimal siRNA transfection efficiency, Santa Cruz Biotechnology's siRNA Transfection Reagent: sc-29528 (0.3 ml), siRNA Transfection Medium: sc-36868 (20 ml) and siRNA Dilution Buffer: sc-29527 (1.5 ml) are recommended. Control siRNAs or Fluorescein Conjugated Control siRNAs are available as 10 µM in 66 µl. Each contain a scrambled sequence that will not lead to the specific degradation of any known cellular mRNA. Fluorescein Conjugated Control siRNAs include: sc-36869, sc-44239, sc-44240 and sc-44241. Control siRNAs include: sc-37007, sc-44230, sc-44231, sc-44232, sc-44233, sc-44234, sc-44235, sc-44236, sc-44237 and sc-44238.

RT-PCR REAGENTS

Semi-quantitative RT-PCR may be performed to monitor INO80D gene expression knockdown using RT-PCR Primer: INO80D (m)-PR: sc-140642-PR (20 μ l). Annealing temperature for the primers should be 55-60° C and the extension temperature should be 68-72° C.

PROTOCOLS

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

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