

Product datasheet for TR516243

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Nrcam Mouse shRNA Plasmid (Locus ID 319504)

Product data:

Product Type: shRNA Plasmids

Product Name: Nrcam Mouse shRNA Plasmid (Locus ID 319504)

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Synonyms: Bravo; C030017F07Rik; C130076O07Rik; mKIAA0343

Vector: pRS (TR20003)

E. coli Selection: Ampicillin

Mammalian Cell Puromycin

Selection:

Format: Retroviral plasmids

Components: Nrcam - Mouse, 4 unique 29mer shRNA constructs in retroviral untagged vector(Gene ID =

319504). 5µg purified plasmid DNA per construct

29-mer scrambled shRNA cassette in pRS Vector, TR30012, included for free.

RefSeq: NM 001146031, NM 176930, NM 176930.1, NM 176930.2, NM 176930.3, NM 176930.4,

NM 001146031.1, BC055053, BC060532, BC156235, BC157007

UniProt ID: Q810U4

Summary: Cell adhesion protein that is required for normal responses to cell-cell contacts in brain and

in the peripheral nervous system. Plays a role in neurite outgrowth in response to contactin binding (PubMed:11564762). Plays a role in mediating cell-cell contacts between Schwann cells and axons (PubMed:20188654). Plays a role in the formation and maintenance of the nodes of Ranvier on myelinated axons. Nodes of Ranvier contain clustered sodium channels that are crucial for the saltatory propagation of action potentials along myelinated axons. During development, nodes of Ranvier are formed by the fusion of two heminodes. Required for normal clustering of sodium channels at heminodes; not required for the formation of mature nodes with normal sodium channel clusters (PubMed:14602817, PubMed:20188654). Required, together with GLDN, for maintaining NFASC and sodium channel clusters at mature

nodes of Ranvier (PubMed:24719088).[UniProtKB/Swiss-Prot Function]

shRNA Design: These shRNA constructs were designed against multiple splice variants at this gene locus. To

be certain that your variant of interest is targeted, please contact <u>techsupport@origene.com</u>. If you need a special design or shRNA sequence, please utilize our <u>custom shRNA service</u>.







Performance Guaranteed:

OriGene guarantees that the sequences in the shRNA expression cassettes are verified to correspond to the target gene with 100% identity. One of the four constructs at minimum are guaranteed to produce 70% or more gene expression knock-down provided a minimum transfection efficiency of 80% is achieved. Western Blot data is recommended over qPCR to evaluate the silencing effect of the shRNA constructs 72 hrs post transfection. To properly assess knockdown, the gene expression level from the included scramble control vector must be used in comparison with the target-specific shRNA transfected samples.

For non-conforming shRNA, requests for replacement product must be made within ninety (90) days from the date of delivery of the shRNA kit. To arrange for a free replacement with newly designed constructs, please contact Technical Services at techsupport@origene.com. Please provide your data indicating the transfection efficiency and measurement of gene expression knockdown compared to the scrambled shRNA control (Western Blot data preferred).