SANTA CRUZ BIOTECHNOLOGY, INC.

MDGI (1rFABP-299): sc-81750



BACKGROUND

Fatty acid-binding proteins, designated FABPs, are a family of homologous cytoplasmic proteins that are expressed in a highly tissue-specific manner and play an integral role in the balance between lipid and carbohydrate metabolism. FABPs mediate fatty acid (FA) and/or hydrophobic ligand uptake, transport and targeting within their respective tissues. The mechanisms underlying these actions can give rise to both passive diffusional uptake and protein-mediated transmembrane transport of FAs. FABPs are expressed in adipocytes (A-FABP), brain (B-FABP), epidermis (E-FABP, also designated psoriasis-associated FABP or PA-FABP), muscle and heart (H-FABP, also designated mammary-derived growth inhibitor or MDGI), intestine (I-FABP), liver (L-FABP), myelin (M-FABP) and testis (T-FABP). MDGI is highly expressed in the myocardium, skeletal and smooth muscle fibers, lipid and/or steroid synthesizing cells and terminally differentiated epithelia of the respiratory, intestinal and urogenital tracts.

REFERENCES

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- Ehrhardt, S., et al. 2004. Circulating concentrations of cardiac proteins in complicated and uncomplicated *Plasmodium falciparum* malaria. Trop. Med. Int. Health 9: 1099-1103.

CHROMOSOMAL LOCATION

Genetic locus: FABP3 (human) mapping to 1p35.2; Fabp3 (mouse) mapping to 4 D2.2.

SOURCE

MDGI (1rFABP-299) is a mouse monoclonal antibody raised against cardiac fatty acid binding protein (MDGI) of human origin.

PRODUCT

Each vial contains 100 $\mu g~lgG_1$ in 1.0 ml PBS with < 0.1% sodium azide and 0.1% gelatin.

APPLICATIONS

MDGI (1rFABP-299) is recommended for detection of MDGI of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 μ g per 100-500 μ g of total protein (1 ml of cell lysate)] and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

Suitable for use as control antibody for MDGI siRNA (h): sc-41245, MDGI siRNA (m): sc-41246, MDGI shRNA Plasmid (h): sc-41245-SH, MDGI shRNA Plasmid (m): sc-41246-SH, MDGI shRNA (h) Lentiviral Particles: sc-41245-V and MDGI shRNA (m) Lentiviral Particles: sc-41246-V.

Molecular Weight of MDGI: 15 kDa.

Positive Controls: mouse heart extract: sc-2254.

DATA



MDGI (1rFABP-299): sc-81750. Western blot analysis of MDGI expression in mouse heart tissue extract.

STORAGE

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

RESEARCH USE

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

PROTOCOLS

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