**BACKGROUND**

Members of the GATA family share a conserved zinc finger DNA-binding domain and are capable of binding the WGATAR consensus sequence. GATA-1 is erythroid-specific and is responsible for the regulated transcription of erythroid genes. It is an essential component in the generation of the erythroid lineage. GATA-2 is expressed in embryonic brain and liver, HEV and endothelial cells, as well as erythroid cells. Studies with a modified GATA consensus sequence, AGATCTTA, have shown that GATA-2 and GATA-3 recognize this mutated consensus while GATA-1 has poor recognition of this sequence. This indicates broader regulatory capabilities of GATA-2 and GATA-3 than GATA-1. GATA-3 is highly expressed in T lymphocytes. GATA-4, GATA-5 and GATA-6 comprise a subfamily of transcription factors. GATA-4 and GATA-6 are found in heart, pancreas and ovary; lung and liver tissues exhibit GATA-6, but not GATA-4. Expression patterns of the various GATA transcription factors may overlap, it is not yet apparent how the GATA factors are able to discriminate in binding their appropriate target sites.

**CHROMOSOMAL LOCATION**

Genetic locus: GATA1 (human) mapping to Xp11.23; Gata1 (mouse) mapping to X A1.1.

**SOURCE**

GATA-1 (N6) is a rat monoclonal antibody raised against mouse recombinant GATA-1.

**PRODUCT**

Each vial contains 200 µg IgG2a in 1.0 ml of PBS with <0.1% sodium azide and 0.1% gelatin. Also available as TransCruz reagent for Gel Supershift and ChIP applications, sc-265-X, 200 µg/0.1 ml.

GATA-1 (N6) is available conjugated to agarose (sc-265 AC), 500 µg/0.25 ml agarose in 1 ml, for IP; to HRP (sc-265 HRP), 200 µg/ml, for WB, IHC(P) and ELISA; and to either phycoerythrin (sc-265 PE), fluorescein (sc-265 FITC), Alexa Fluor® 488 (sc-265 AF488) or Alexa Fluor® 647 (sc-265 AF647), 200 µg/ml, for IF, IHC(P) and FCM.

**APPLICATIONS**

GATA-1 (N6) is recommended for detection of GATA-1 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 immunohistochemistry (including paraffin-embedded sections) (starting dilution 1:50, dilution range 1:50-1:500).

Suitable for use as control antibody for GATA-1 siRNA (h): sc-29330, GATA-1 siRNA (m): sc-35452, GATA-1 shRNA Plasmid (h): sc-29330-SH, GATA-1 shRNA Plasmid (m): sc-35452-SH, GATA-1 shRNA (h) Lentiviral Particles: sc-29330-V and GATA-1 shRNA (m) Lentiviral Particles: sc-35452-V.

GATA-1 (N6) X TransCruz antibody is recommended for Gel Supershift and ChIP applications.

Molecular Weight of GATA-1: 47 kDa.

**STORAGE**

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

**DATA**

**SELECT PRODUCT CITATIONS**


