

DESCRIPTION

Species Reactivity	Human
Specificity	Recognizes human Glut2 expression on human Glut2-transfected NS0 cells, but not on control transfectants. Was shown to detect Glut2 on the surface of the human intestinal cell line Caco2 (2) in flow cytometry and on fixed cells in immunocytochemistry tests. Based on flow cytometric tests on transfected cells, this antibody has no cross-reactivity with human Glut1 or human Glut3.
Source	Monoclonal Mouse IgG _{2A} Clone # 199017
Purification	Protein A or G purified from hybridoma culture supernatant
Immunogen	NS0 mouse myeloma cell line transfected with human Glut2 Met1-Val524 Accession # P11168
Conjugate	Alexa Fluor 647 Excitation Wavelength: 650 nm Emission Wavelength: 668 nm
Formulation	Supplied 0.2 mg/mL in a saline solution containing BSA and Sodium Azide. See Certificate of Analysis for details. *Contains <0.1% Sodium Azide, which is not hazardous at this concentration according to GHS classifications. Refer to the Safety Data Sheet (SDS) for additional information and handling instructions.

APPLICATIONS

Please Note: Optimal dilutions should be determined by each laboratory for each application. *General Protocols* are available in the *Technical Information* section on our website.

	Recommended Concentration	Sample
Flow Cytometry	0.25-1 µg/10 ⁶ cells	NTERA-2 Human cell line

PREPARATION AND STORAGE

Shipping	The product is shipped with polar packs. Upon receipt, store it immediately at the temperature recommended below.
Stability & Storage	Protect from light. Do not freeze. <ul style="list-style-type: none"> 12 months from date of receipt, 2 to 8 °C as supplied.

BACKGROUND

Glut2 belongs to the facilitative glucose transporter protein family that comprises 13 members. It is an integral membrane protein with 12 transmembrane domains. Glut2 is expressed predominantly in liver, intestine, kidney, and pancreatic beta-cells. It is a low-affinity glucose transporter that has been suggested to function as a glucose sensor in pancreatic beta-cells and facilitate either glucose uptake or efflux from cells depending on the nutritional state (1).

References:

1. Olson, A.L. and J.E. Pessin (1996) *Annu. Rev. Nut.* **16**:235.
2. Mahraoui, L. *et al.* (1994) *J. Biochem.* **298**:629.

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