



1P-437-C100

## Monoclonal Antibody to HLA-G Phycoerythrin (PE) conjugated (0.1 mg)

Clone: 87G

**Isotype:** Mouse IgG2a

**Specificity:** The antibody 87G recognizes both membrane-bound and soluble forms of HLA-G

(HLA-G1 and HLA-G5). HLA-G belongs to the MHC Class I molecules (MHC Class

lb; nonclassical) and it is expressed on the surface of trophoblast cells. The antibody 87G blocks interaction of HLA-G with inhibitory receptors.

Regulatory Status: RUO

Immunogen: HLA-B27 transgenic mice were imunized with H-2 identical murine cells

transfected with and expressing genes encoding HLA-G and human

beta2-microglobulin.

Species Reactivity: Human

Negative Species: Mouse, Rat

Preparation: The purified antibody is conjugated with R-Phycoerythrin (PE) under optimum

conditions. The conjugate is purified by size-exclusion chromatography.

Concentration: 0.1 mg/ml

Storage Buffer: The reagent is provided in stabilizing phosphate buffered saline (PBS) solution

containing 15mM sodium azide.

Storage / Stability: Store in the dark at 2-8°C. Do not freeze. Avoid prolonged exposure to light. Do not

use after expiration date stamped on vial label.

**Usage:** The reagent is designed for Flow Cytometry analysis.

Suggested working dilution is 1:10. Indicated dilution is recommended starting

point for use of this product. Working concentrations should be determined by the

investigator.

**Expiration:** See vial label

Lot Number: See vial label



## PRODUCT DATA SHEET

## References:

\*Lee N. et al.: The membrane-bound and soluble forms of HLA-G bind identical sets of endogenous peptides but differ with respect to TAP association. Immunity 3(5), 591(1995).

\*Riteau B. et al.: HLA-G1 co-expression boosts the HLA class I-mediated NK lysis inhibition. Int Immunol. 13(2), 193 (2001).

\*Sageshima N, Ishitani A, Omura M, Akasaki M, Umekage H, Katabuchi H, Okamura H, Hatake K: Necrotic feature of the trophoblasts lacking HLA-G expression in normal and pre-eclamptic placentas. Am J Reprod Immunol. 2003 Mar;49(3):174-82.

\*Ishitani A. et al.: Protein Expression and Peptide Binding Suggest Unique and Interacting Functional Roles for HLA-E, F and G in Maternal-Placental Immune Recognitions. The Journal of Immunology 171, 1376 (2003).

\*Polakova K, Bandzuchova E, Hofmeister V, Weiss EH, Hutter H, Russ G: Binding analysis of HLA-G specific antibodies to hematopoietic cells isolated from leukemia patients. Neoplasma. 2003;50(5):331-8.

\*Wiendl H: The non-classical MHC molecule HLA-G protects human muscle cells from immune-mediated lysis: implications for myoblast transplantation and gene therapy. Brain. 126(Pt 1), 176 (2003).

\*Menier C, Saez B, Horejsi V, Martinozzi S, Krawice-Radanne I, Bruel S, Le Danff C, Reboul M, Hilgert I, Rabreau M, Larrad ML, Pla M, Carosella ED, Rouas-Freiss N: Characterization of monoclonal antibodies recognizing HLA-G or HLA-E: new tools to analyze the expression of nonclassical HLA class I molecules. Hum Immunol. 2003 Mar;64(3):315-26.

\*Polakova K, Krcova M, Kuba D, Russ G: Analysis of HLA-G expression in malignant hematopoetic cells from leukemia patients. Leuk Res. 2003 Jul;27(7):643-8.

\*Hackmon R, Hallak M, Krup M, Weitzman D, Sheiner E, Kaplan B, Weinstein Y: HLA-G antigen and parturition: maternal serum, fetal serum and amniotic fluid levels during pregnancy. Fetal Diagn Ther. 2004 Sep-Oct;19(5):404-9.

\*Rouas-Freiss N, Moreau P, Ferrone S, Carosella ED: HLA-G proteins in cancer: do they provide tumor cells with an escape mechanism? Cancer Res. 2005 Nov 15;65(22):10139-44.

\*Shobu T, Sageshima N, Tokui H, Omura M, Saito K, Nagatsuka Y, Nakanishi M, Hayashi Y, Hatake K, Ishitani A: The surface expression of HLA-F on decidual trophoblasts increases from mid to term gestation. J Reprod Immunol. 2006 Dec;72(1-2):18-32.

\*LeMaoult J, Caumartin J, Daouya M, Favier B, Le Rond S, Gonzalez A, Carosella ED: Immune regulation by pretenders: cell-to-cell transfers of HLA-G make effector T cells act as regulatory cells. Blood. 2007 Mar 1;109(5):2040-8.

Unless indicated otherwise, all products are For Research Use Only and not for diagnostic or therapeutic use. Not for resale or transfer either as a stand-alone product or as a component of another product without written consent of EXBIO. EXBIO will not be held responsible for patent infringement or other violations that may occur with the use of our products. All orders are accepted subject to EXBIO's term and conditions which are available at www.exbio.cz.