

**Alexa Fluor® 700 anti-rat CD90/mouse CD90.1 (Thy-1.1)**

**Catalog # / Size:** 1612640 / 100 µg  
1612635 / 25 µg

**Clone:** OX-7

**Isotype:** Mouse IgG1, κ

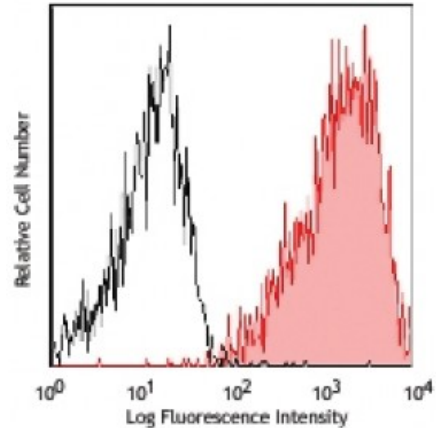
**Immunogen:** Rat thymocyte Thy-1 antigen

**Reactivity:** Other

**Preparation:** The antibody was purified by affinity chromatography, and conjugated with Alexa Fluor® 700 under optimal conditions.

**Formulation:** Phosphate-buffered solution, pH 7.2, containing 0.09% sodium azide.

**Concentration:** 0.5



LOU rat thymocytes stained with OX-7 Alexa Fluor® 700

**Applications:**

**Applications:** Flow Cytometry

**Recommended Usage:** Each lot of this antibody is quality control tested by immunofluorescent staining with flow cytometric analysis. The suggested use of this reagent is ≤0.25 microg per million cells in 100 microL volume. It is highly recommended that the reagent be titrated for optimal performance for each application.

\* Alexa Fluor® 700 has a maximum emission of 719 nm when it is excited at 633 nm / 635 nm. Prior to using Alexa Fluor® 700 conjugate for flow cytometric analysis, please verify your flow cytometer's capability of exciting and detecting the fluorochrome.

**Application Notes:** The OX-7 antibody reacts with rat CD90 and mouse CD90.1 (Thy-1.1) (which is expressed by mouse strains of AKR/J, PL, and FVB/N), but not mouse CD90.2.

Additional reported applications (for the relevant formats) include: immunohistochemical<sup>7</sup> and immunofluorescent<sup>8</sup> staining of acetone-fixed frozen sections and zinc-fixed paraffin-embedded sections, immunoprecipitation<sup>1</sup>, Western blotting<sup>1</sup>, *in vitro* activation of leukocytes<sup>2</sup>, induction of endothelial cell permeability<sup>3</sup>, induction of apoptosis in glomerular mesangial cells, and induction of glomerulonephritis *in vivo*<sup>4</sup>.

**Application References:**

1. Jeng CJ, *et al.* 1998. *J. Cell Biol.* 140:685. (IP, WB)
2. Nakashima I, *et al.* 1991. *J. Immunol.* 147:1153.
3. Ishizu A, *et al.* 1995. *Int. Immunol.* 7:1939.
4. Eitner F. 1997. *Kidney. Int.* 51:69.
5. Kawachi H, *et al.* 1992. *Clin. Exp. Immunol.* 88:399. (WB)
6. Dyer KD, *et al.* 2007. *J. Immunol.* 179:1693. (FC) [PubMed](#)
7. Daniel C, *et al.* 2012. *Lab Invest.* 92:812. (IHC)
8. Li B, *et al.* 2006. *Kidney Int.* 69:323. (IF)

**Description:** CD90, also known as Thy-1, is a 28-30 kD GPI-linked membrane glycoprotein. It is a member of the immunoglobulin superfamily and has been shown to interact with CD45 in signal transduction during lymphocyte proliferation and differentiation. CD90 is expressed on hematopoietic stem cells, neurons, thymocytes, peripheral T cells, fibroblasts, stromal cells.

- Antigen** 1. Campbell DG, *et al.* 1981. *Biochem. J.* 195:15.
- References:** 2. Hosseinzadeh H, *et al.* 1993. *J. Immunol.* 150:1670.