

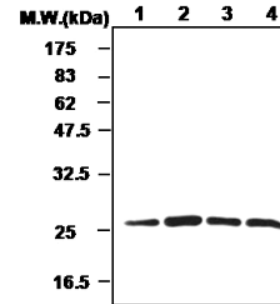
## Peroxiredoxin II (1E8) Monoclonal Antibody

<b>ALTERNATE NAMES:</b>	Peroxiredoxin 2, NKEFB, PRP, PRX2, PRXII, TDPX1, TSA, PRDX2.
<b>CATALOG #:</b>	6159-100
<b>AMOUNT:</b>	100 µl
<b>HOST:</b>	Mouse
<b>ISOTYPE:</b>	IgG1
<b>IMMUNOGEN:</b>	Recombinant human protein purified from E.coli
<b>PURIFICATION:</b>	Ammonium sulphate precipitation
<b>FORM:</b>	Liquid
<b>FORMULATION:</b>	100 µl of antibody in HEPES with 0.15 M NaCl, 0.01 % BSA, 0.03 % sodium azide, and 50 % glycerol
<b>SPECIES REACTIVITY:</b>	Human, Mouse, Rat.
<b>STORAGE CONDITIONS:</b>	Store for 1 year at -20°C from date of shipment. Avoid repeated freeze/thaw cycles.

**DESCRIPTION:** Peroxiredoxin (Prx) is a growing peroxidase family, whose mammalian members have been known to connect with cell proliferation, differentiation, and apoptosis. Many isoforms (about 50 proteins), collected in accordance to the amino acid sequence homology, particularly amino-terminal region containing active site cysteine residue, and the thiol-specific antioxidant activity, distribute throughout all the kingdoms. Among them, mammalian Prx consists of 6 different members grouped into typical 2-Cys, atypical 2-Cys Prx, and 1-Cys Prx. Except Prx VI belonging to 1-Cys Prx subgroup, the other five 2-Cys Prx isotypes have the thioredoxin-dependent peroxidase (TPx) activity utilizing thioredoxin, thioredoxin reductase, and NADPH as a reducing system. Mammalian Prxs are 20 – 30 kDa in molecular size and vary in subcellular localization: Prx I, II, and VI in cytosol, Prx III in mitochondria, Prx IV in ER and secretion, Prx V showing complicated distribution including peroxisome, mitochondria and cytosol. Prx II is involved in redox regulation of the cell. Reduces peroxides with reducing equivalents provided through the thioredoxin system. It is not able to receive electrons from glutaredoxin. May play an important role in eliminating peroxides generated during metabolism. Might participate in the signaling cascades of growth factors and tumor necrosis factor-alpha by regulating the intracellular concentrations of H<sub>2</sub>O<sub>2</sub>.

**APPLICATION:** Western blot: 1:2000 – 1:4000, ELISA, IHC-P.

**Note:** This information is only intended as a guide. The optimal dilutions must be determined by the user.



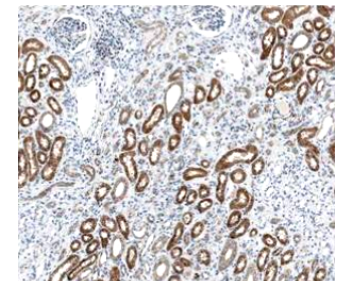
WB of cell lysates. Lane 1: HeLa Lane 2: 293T, Lane 3: SH-SY5Y, Lane 4: HepG2



IHC staining of Human normal endometrial tissue (Formalin fixed, paraffin embedded).



IHC staining of Human endometrial cancer tissue (Formalin fixed, paraffin embedded).



IHC staining of Human normal kidney tissue (Formalin fixed, paraffin embedded).

### RELATED PRODUCTS:

- Peroxiredoxin I (9D2) Monoclonal Antibody (**Cat. No. 6158-100**)
- Peroxiredoxin III (12B) Monoclonal Antibody (**Cat. No. 6160-100**)
- Peroxiredoxin IV (3A1) Monoclonal Antibody (**Cat. No. 6161-100**)
- Peroxiredoxin V (3F11) Monoclonal Antibody (**Cat. No. 6162-100**)
- Peroxiredoxin VI (4A3) Monoclonal Antibody (**Cat. No. 6163-100**)
- Human Recombinant PRDX 1 (**Cat. No. 6323-100**)
- Human Recombinant PRDX 2 (**Cat. No. 6319-100**)
- Human Recombinant PRDX 3 (**Cat. No. 6320-100**)
- Human Recombinant PRDX 4 (**Cat. No. 6324-100**)
- Human Recombinant PRDX 5 (**Cat. No. 6321-100**)
- Human Recombinant PRDX 6 (**Cat. No. 6322-100**)

**FOR RESEARCH USE ONLY! Not to be used on humans.**