OriGene Technologies, Inc.
9620 Medical Center Drive, Ste 200
Rockville, MD 20850, US
Phone: +1-888-267-4436
https://www.origene.com
techsupport@origene.com
EU: info-de@origene.com
CN: techsupport@origene.cn

Product datasheet for TA301511

DRP1 (DNM1L) Rabbit Polyclonal Antibody

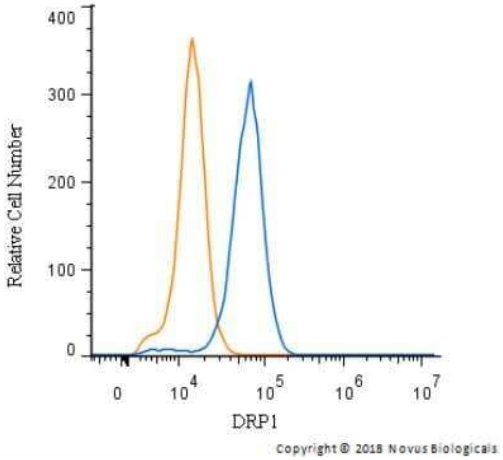
Product data:

Product Type:	Primary Antibodies
Applications:	FC, IHC, IP
Recommended Dilution:	Immunoprecipitation: 1.0 ug/ml, Immunohistochemistry: 2.5 ug/ml, Immunohistochemistry-Paraffin: 2.5 ug/ml, Flow Cytometry: 1:1000
Reactivity:	Human, Primate, Mouse, Hamster, Rat
Host:	Rabbit
Isotype:	IgG
Clonality:	Polyclonal
Immunogen:	A synthetic peptide made to an internal region within residues 500-600 of the human protein. [Swiss-Prot# O00429]
Formulation:	Tris-glycine, 150mM NaCl and 0.5% sodium azide
Purification:	Immunogen affinity purified
Conjugation:	Unconjugated
Storage:	Store at -20°C as received.
Stability:	Stable for 12 months from date of receipt.
Gene Name:	dynamin 1-like
Database Link:	NP_036192 Entrez Gene 74006 MouseEntrez Gene 114114 RatEntrez Gene 10059 Human O00429
Background:	A human dynamin-related protein, DRP1 contributes to mitochondrial division in mammalian cells. It plays this important role in mitochondrial fission at steady state and during apoptosis. DRP1 is required for proper cellular distribution of mitochondria, and in mutant neurons, mitochondria are largely absent from synapses, thus providing a genetic tool to assess the role of mitochondria at synapses.
Synonyms:	DLP1; DRP1; DVLP; DYMPLE; EMPF; EMPF1; HDYNIV
Protein Pathways:	Endocytosis, Fc gamma R-mediated phagocytosis

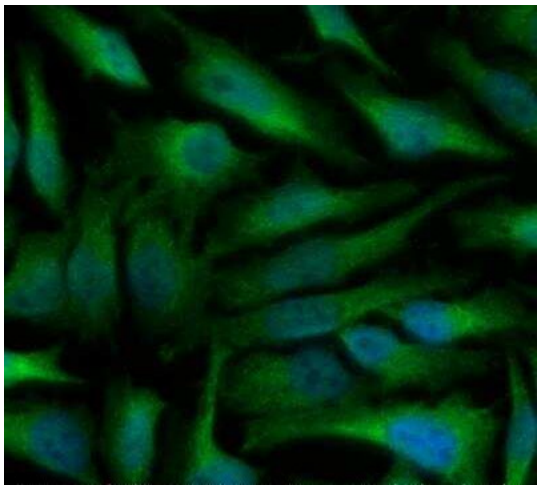
View online »

Product images:

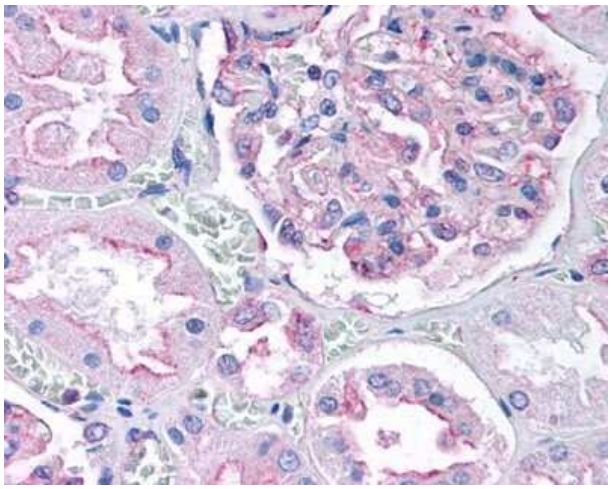
Simple Western: DRP1 Antibody TA301511 - Image shows a specific band for DUX4 in 0.5 mg/mL of HeLa lysate. This experiment was performed under reducing conditions using the 12-230 kDa separation system.



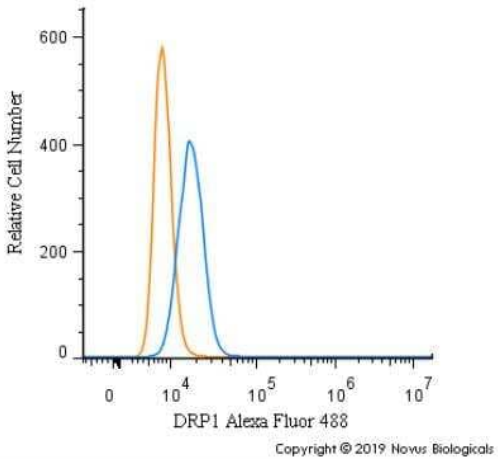
Flow Cytometry: DRP1 Antibody TA301511 - An intracellular stain was performed on HeLa cells with TA301511 and a matched isotype control. Cells were fixed with 4% PFA and then permeablized with 0.1% saponin. Cells were incubated in an antibody dilution of 2.5 ug/mL for 30 minutes at room temperature, followed by Rabbit IgG (H+L) Cross-Adsorbed Secondary Antibody, Dylight 550.



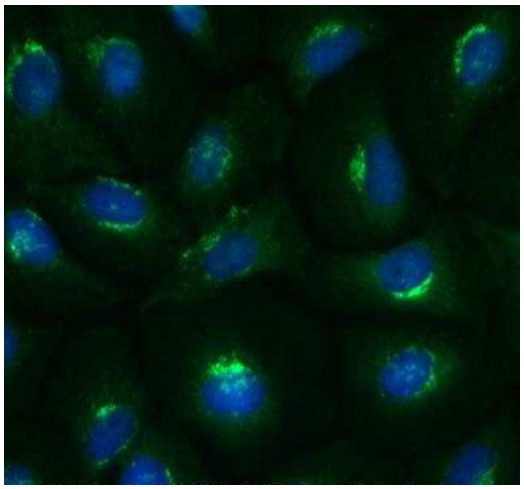
Immunocytochemistry/Immunofluorescence: DRP1 Antibody TA301511 - HeLa cells were fixed for 10 minutes using 10% formalin and then permeabilized for 5 minutes using 1X PBS + 0.5% Triton X-100. The cells were incubated with anti-DRP1 at 5 ug/mL overnight at 4C and detected with an anti-rabbit Dylight 488 (Green) at a 1:500 dilution. Nuclei were counterstained with DAPI (Blue). Cells were imaged using a 40X objective.



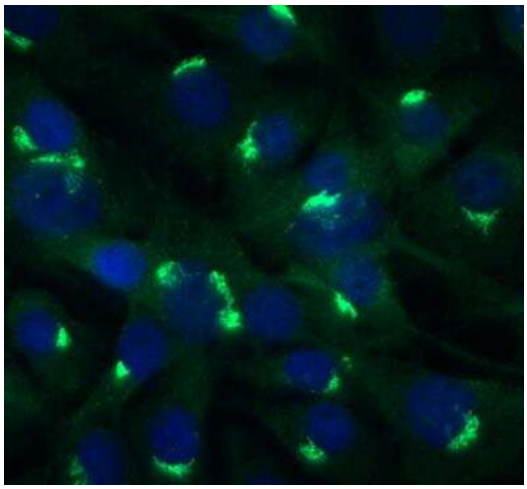
Immunohistochemistry: DRP1 Antibody TA301511 - Staining of renal tubular epithelium and visceral epithelial cells of the glomerulus. Human kidney cortex, 40X magnification.



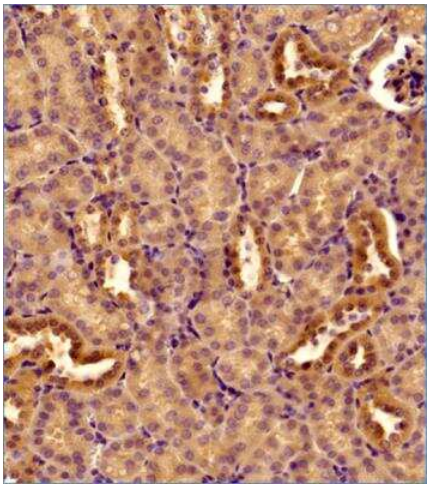
Flow Cytometry: DRP1 Antibody TA301511 - An intracellular stain was performed on HeLa cells with DRP1 Antibody TA301511AF488 (blue) and a matched isotype control (orange). Cells were fixed with 4% PFA and then permeabilized with 0.1% saponin. Cells were incubated in an antibody dilution of 5 ug/mL for 30 minutes at room temperature. Both antibodies were conjugated to Alexa Fluor 488.



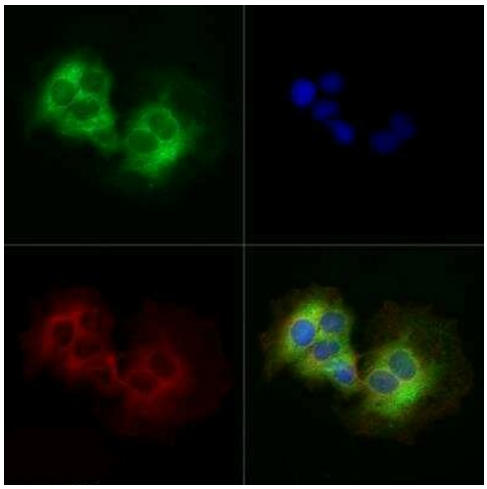
Immunocytochemistry/Immunofluorescence: DRP1 Antibody TA301511 - PC12 cells were fixed for 10 minutes using 10% formalin and then permeabilized for 5 minutes using 1X PBS + 0.05% Triton-X100. The cells were incubated with anti-DRP1 Antibody at 2 ug/ml overnight at 4C and detected with an anti-rabbit Dylight 488 (Green) at a 1:500 dilution. Nuclei were counterstained with DAPI (Blue). Cells were imaged using a 40X objective.



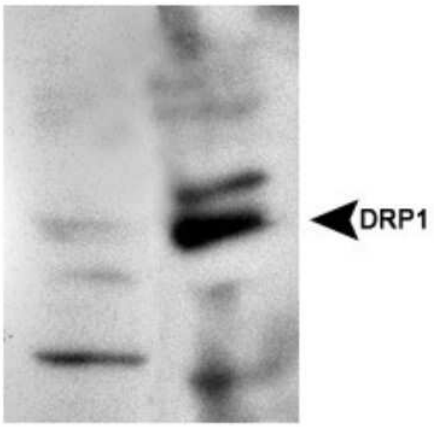
Immunocytochemistry/Immunofluorescence: DRP1 Antibody TA301511 - NIH3T3 cells were fixed for 10 minutes using 10% formalin and then permeabilized for 5 minutes using 1X PBS + 0.05% Triton-X100. The cells were incubated with anti-DRP1 Antibody at 2 ug/ml overnight at 4C and detected with an anti-rabbit Dylight 488 (Green) at a 1:500 dilution. Nuclei were counterstained with DAPI (Blue). Cells were imaged using a 40X objective.



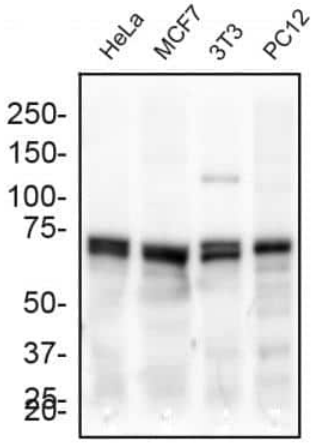
Immunohistochemistry-Paraffin: DRP1 Antibody TA301511 - Analysis of FFPE tissue section of mouse kidney using DRP1 antibody #TA301511 at 1:300. The primary antibody bound to DRP1 protein in the tissue section was detected using a HRP labeled secondary antibody and DAB reagent. Nuclei of the cells were counterstained with hematoxylin. This antibody generated a diffused cytoplasmic staining of DRP1 in the epithelial cells of various tubules and in the cells of glomeruli.



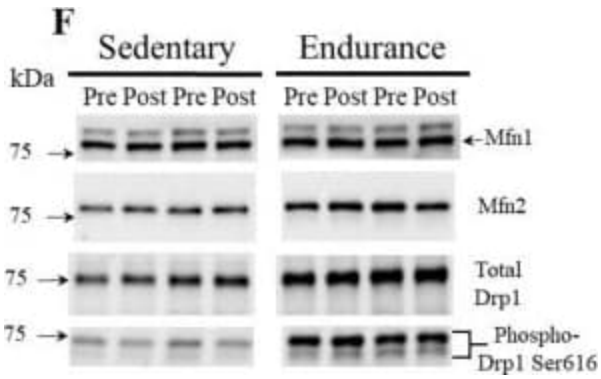
Immunocytochemistry/Immunofluorescence: DRP1 Antibody TA301511 - HeLa cells were fixed for 10 minutes using 10% formalin and then permeabilized for 5 minutes using 1X TBS + 0.5% Triton X-100. The cells were incubated with anti-DRP1 at 5.0 ug/mL overnight at 4C and detected with an anti-rabbit Dylight 488 (Green) at 1:500. Alpha tubulin (DM1A) NB100-690 was used as a co-stain at 1:1000 and detected with an anti-mouse Dylight 550 (Red) at 1:500. Nuclei were counterstained with DAPI (Blue). Cells were imaged using a 40X objective.



Western Blot: DRP1 Antibody TA301511 - Lane 1: DRP1 knockout. Lane 2: DRP1 wildtype MEFs. Stained with TA301511 at 1:500.



Western Blot: DRP1 Antibody TA301511 - Total protein from human HeLa and MCF7 cells, mouse 3T3 cells and rat PC12 cells was separated on a 7.5 % gel by SDS-PAGE, transferred to PVDF membrane and blocked in 5% non-fat milk in TBST. The membrane was probed with 2.0 ug/mL anti-DRP1 in blocking buffer and detected with an anti-rabbit HRP secondary antibody using chemiluminescence.



Assessment of skeletal muscle mitochondrial dynamic markers. (A) Total Drp1 protein content, (B) phospho-Drp1Ser616 protein content, (C) percent difference in total and phospho-Drp1Ser616 in ET participants relative to SED participants, (D) total Mfn1 protein content, (E) total Mfn2 protein content. (F) Representative western blots. Significant main effect of training: #, $p < 0.05$; ##, $p < 0.01$. Significant post-hoc training effect: *, $p < 0.05$; **, $p < 0.01$. Data are presented as mean ± SEM.