

## **Product datasheet for UM870053**

# 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

### MRPS7 Mouse Monoclonal Antibody [Clone ID: UMAB156]

#### **Product data:**

**Product Type:** Primary Antibodies

Clone Name: UMAB156
Applications: IF, IHC, WB

Recommended Dilution: WB 1:2000, IHC 1:200

Reactivity: Human
Host: Mouse
Isotype: IgG2a

Clonality: Monoclonal

**Immunogen:** Human recombinant protein fragment corresponding to amino acids 38-242 of human

MRPS7 (NP\_057055) produced in E.coli.

**Formulation:** PBS (pH 7.3) containing 1% BSA, 50% glycerol and 0.02% sodium azide.

**Concentration:** 0.5~1.0 mg/ml (Lot Dependent)

**Purification:** Purified from mouse ascites fluids or tissue culture supernatant by affinity chromatography

(protein A/G)

Conjugation: Unconjugated

Storage: Store at -20°C as received.

**Stability:** Stable for 12 months from date of receipt.

**Gene Name:** mitochondrial ribosomal protein S7

Database Link: NP 057055

Entrez Gene 51081 Human

Q9Y2R9

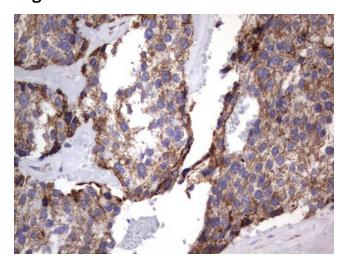


Background:

Mammalian mitochondrial ribosomal proteins are encoded by nuclear genes and help in protein synthesis within the mitochondrion. Mitochondrial ribosomes (mitoribosomes) consist of a small 28S subunit and a large 39S subunit. They have an estimated 75% protein to rRNA composition compared to prokaryotic ribosomes, where this ratio is reversed. Another difference between mammalian mitoribosomes and prokaryotic ribosomes is that the latter contain a 5S rRNA. Among different species, the proteins comprising the mitoribosome differ greatly in sequence, and sometimes in biochemical properties, which prevents easy recognition by sequence homology. This gene encodes a 28S subunit protein. In the prokaryotic ribosome, the comparable protein is thought to play an essential role in organizing the 3' domain of the 16 S rRNA in the vicinity of the P- and A-sites. Pseudogenes corresponding to this gene are found on chromosomes 8p and 12p. [provided by RefSeq, Jul

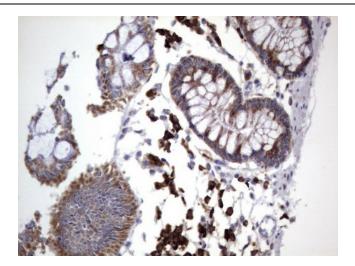
**Synonyms:** bMRP27a; MRP-S7; RP-S7; RPMS7; S7mt

### **Product images:**

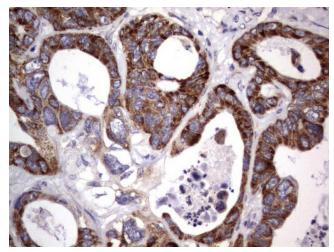


Immunohistochemical staining of paraffinembedded Adenocarcinoma of Human breast tissue using anti-MRPS7 mouse monoclonal antibody. ([UM800053]; heat-induced epitope retrieval by 1mM EDTA in 10mM Tris, pH9.0, 120°C for 3min)

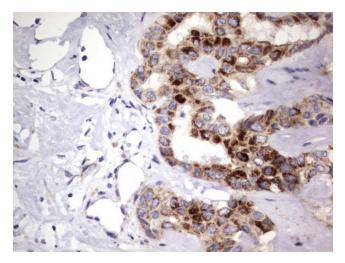




Immunohistochemical staining of paraffinembedded Human colon tissue using anti-MRPS7 mouse monoclonal antibody. ([UM800053]; heat-induced epitope retrieval by 1mM EDTA in 10mM Tris, pH9.0, 120°C for 3min)

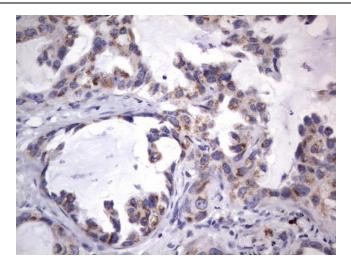


Immunohistochemical staining of paraffinembedded Adenocarcinoma of Human colon tissue using anti-MRPS7 mouse monoclonal antibody. ([UM800053]; heat-induced epitope retrieval by 1mM EDTA in 10mM Tris, pH9.0, 120°C for 3min)

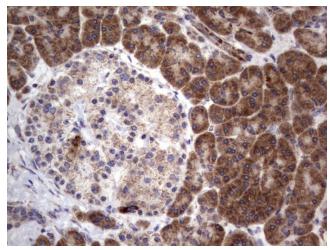


Immunohistochemical staining of paraffinembedded Carcinoma of Human liver tissue using anti-MRPS7 mouse monoclonal antibody. ([UM800053]; heat-induced epitope retrieval by 1mM EDTA in 10mM Tris, pH9.0, 120°C for 3min)

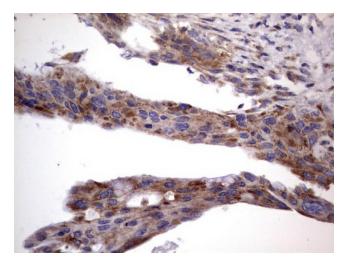




Immunohistochemical staining of paraffinembedded Carcinoma of Human lung tissue using anti-MRPS7 mouse monoclonal antibody. ([UM800053]; heat-induced epitope retrieval by 1mM EDTA in 10mM Tris, pH9.0, 120°C for 3min)

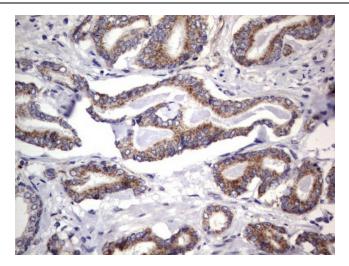


Immunohistochemical staining of paraffinembedded Human pancreas tissue using anti-MRPS7 mouse monoclonal antibody. ([UM800053]; heat-induced epitope retrieval by 1mM EDTA in 10mM Tris, pH9.0, 120°C for 3min)

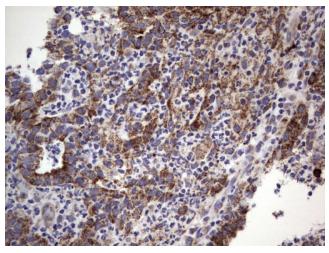


Immunohistochemical staining of paraffinembedded Carcinoma of Human pancreas tissue using anti-MRPS7 mouse monoclonal antibody. ([UM800053]; heat-induced epitope retrieval by 1mM EDTA in 10mM Tris, pH9.0, 120°C for 3min)

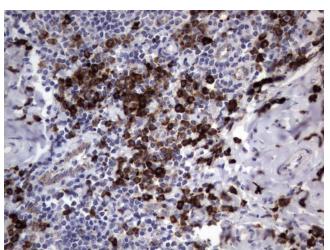




Immunohistochemical staining of paraffinembedded Human prostate tissue using anti-MRPS7 mouse monoclonal antibody. ([UM800053]; heat-induced epitope retrieval by 1mM EDTA in 10mM Tris, pH9.0, 120°C for 3min)

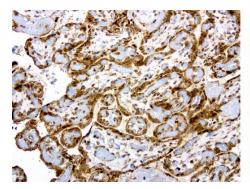


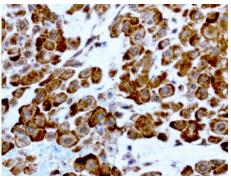
Immunohistochemical staining of paraffinembedded Human lymph node tissue using anti-MRPS7 mouse monoclonal antibody. ([UM800053]; heat-induced epitope retrieval by 1mM EDTA in 10mM Tris, pH9.0, 120°C for 3min)



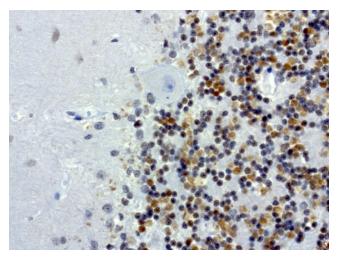
Immunohistochemical staining of paraffinembedded Human tonsil using anti-MRPS7 mouse monoclonal antibody. ([UM800053]; heatinduced epitope retrieval by 1mM EDTA in 10mM Tris, pH9.0, 120°C for 3min)



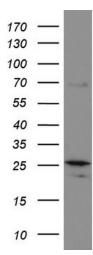




Immunohistochemical staining of paraffinembedded human composit of placenta using anti-MRPS7 clone UMAB156 mouse monoclonal antibody at 1:200 dilution 1mg/mL and detection with Polink2 Broad HRP DAB. [UM800053] requires heat-induced epitope retrieval with citrate pH6.0 in a presure cooker for 3 minutes at 110C. The image shows membranous and cytoplasmic staining in trophoblast cells.

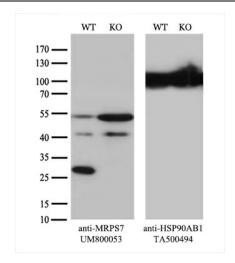


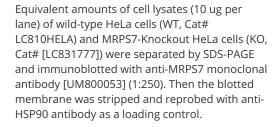
Immunohistochemical staining of paraffinembedded human normal brain using anti-MRPS7 clone UMAB156 mouse monoclonal antibody at 1:200 dilution 1mg/mL and detection with Polink2 Broad HRP DAB. [UM800053] requires heat-induced epitope retrieval with citrate pH6.0 in a presure cooker for 3 minutes at 110C

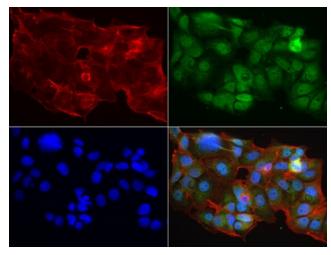


Western blot analysis of HCT116 cell lysate (35ug) by using anti-MRPS7 monoclonal antibody.









Immunofluorescent staining of MCF-7 cells using anti-MRPS7 mouse monoclonal antibody ([UM800053], green, 1:50). Actin filaments were labeled with Alexa Fluor® 594 Phalloidin (red), and nuclear with DAPI (blue).