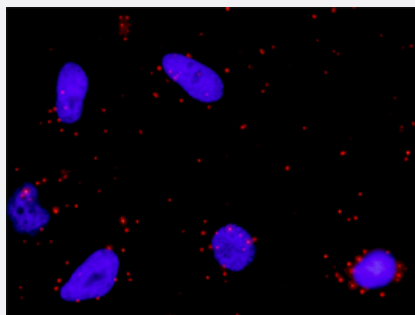


RET & MAPK1 Protein Protein Interaction Antibody Pair

Catalog # DI0281

Size 1 Set

Applications



Representative image of Proximity Ligation Assay of protein-protein interactions between RET and MAPK1. HeLa cells were stained with anti-RET rabbit purified polyclonal antibody 1:1200 and anti-MAPK1 mouse monoclonal antibody 1:50. Each red dot represents the detection of protein-protein interaction complex. The images were analyzed using an optimized freeware (BlobFinder) download from The Centre for Image Analysis at Uppsala University.

Specification

Product Description

This protein protein interaction antibody pair set comes with two antibodies to detect the protein-protein interaction, one against the RET protein, and the other against the MAPK1 protein for use in [in situ Proximity Ligation Assay](#). [See Publication Reference below](#).

Reactivity

Human

Quality Control Testing

Protein protein interaction immunofluorescence result.
Representative image of Proximity Ligation Assay of protein-protein interactions between RET and MAPK1. HeLa cells were stained with anti-RET rabbit purified polyclonal antibody 1:1200 and anti-MAPK1 mouse monoclonal antibody 1:50. Each red dot represents the detection of protein-protein interaction complex. The images were analyzed using an optimized freeware (BlobFinder) download from The Centre for Image Analysis at Uppsala University.

Supplied Product

Antibody pair set content:
1. RET rabbit purified polyclonal antibody (100 ug)
2. MAPK1 mouse monoclonal antibody (40 ug)
*Reagents are sufficient for at least 30-50 assays using recommended protocols.

Storage Instruction

Store reagents of the antibody pair set at -20°C or lower. Please aliquot to avoid repeated freeze-thaw cycle. Reagents should be returned to -20°C storage immediately after use.

Applications

- *In situ* Proximity Ligation Assay (Cell)

Gene Info — MAPK1

Entrez GeneID	5594
Gene Name	MAPK1
Gene Alias	ERK, ERK2, ERT1, MAPK2, P42MAPK, PRKM1, PRKM2, p38, p40, p41, p41mapk
Gene Description	mitogen-activated protein kinase 1
Omim ID	176948
Gene Ontology	Hyperlink
Gene Summary	The protein encoded by this gene is a member of the MAP kinase family. MAP kinases, also known as extracellular signal-regulated kinases (ERKs), act as an integration point for multiple biochemical signals, and are involved in a wide variety of cellular processes such as proliferation, differentiation, transcription regulation and development. The activation of this kinase requires its phosphorylation by upstream kinases. Upon activation, this kinase translocates to the nucleus of the stimulated cells, where it phosphorylates nuclear targets. Two alternatively spliced transcript variants encoding the same protein, but differing in the UTRs, have been reported for this gene. [provided by RefSeq]
Other Designations	OTTHUMP00000174492 extracellular signal-regulated kinase 2 extracellular signal-regulated kinase-2 mitogen-activated protein kinase 2 protein tyrosine kinase ERK2

Gene Info — RET

Entrez GeneID	5979
Gene Name	RET
Gene Alias	CDHF12, HSCR1, MEN2A, MEN2B, MTC1, PTC, RET-ELE1, RET51
Gene Description	ret proto-oncogene
Omim ID	142623 155240 162300 164761 171300 171400 209880
Gene Ontology	Hyperlink

Gene Summary

This gene, a member of the cadherin superfamily, encodes one of the receptor tyrosine kinases, which are cell-surface molecules that transduce signals for cell growth and differentiation. This gene plays a crucial role in neural crest development, and it can undergo oncogenic activation in vivo and in vitro by cytogenetic rearrangement. Mutations in this gene are associated with the disorders multiple endocrine neoplasia, type IIA, multiple endocrine neoplasia, type IIB, Hirschsprung disease, and medullary thyroid carcinoma. Two transcript variants encoding different isoforms have been found for this gene. Additional transcript variants have been described but their biological validity has not been confirmed. [provided by RefSeq]

Other Designations

RET transforming sequence|cadherin family member 12|hydroxyaryl-protein kinase|oncogene RET|receptor tyrosine kinase|ret proto-oncogene (multiple endocrine neoplasia and medullary thyroid carcinoma 1, Hirschsprung disease)

Pathway

- [Acute myeloid leukemia](#)
- [Adherens junction](#)
- [Axon guidance](#)
- [B cell receptor signaling pathway](#)
- [Bladder cancer](#)
- [Chemokine signaling pathway](#)
- [Chronic myeloid leukemia](#)
- [Colorectal cancer](#)
- [Dorso-ventral axis formation](#)
- [Endocytosis](#)
- [Endometrial cancer](#)
- [ErbB signaling pathway](#)
- [Fc epsilon RI signaling pathway](#)
- [Fc gamma R-mediated phagocytosis](#)
- [Focal adhesion](#)
- [Gap junction](#)
- [Glioma](#)

- [GnRH signaling pathway](#)
- [Insulin signaling pathway](#)
- [Long-term depression](#)
- [Long-term potentiation](#)
- [MAPK signaling pathway](#)
- [Melanogenesis](#)
- [Melanoma](#)
- [mTOR signaling pathway](#)
- [Natural killer cell mediated cytotoxicity](#)
- [Neurotrophin signaling pathway](#)
- [Non-small cell lung cancer](#)
- [Pancreatic cancer](#)
- [Pathways in cancer](#)
- [Pathways in cancer](#)
- [Prion diseases](#)
- [Prostate cancer](#)
- [Regulation of actin cytoskeleton](#)
- [Renal cell carcinoma](#)
- [T cell receptor signaling pathway](#)
- [TGF-beta signaling pathway](#)
- [Thyroid cancer](#)
- [Thyroid cancer](#)
- [Toll-like receptor signaling pathway](#)
- [Type II diabetes mellitus](#)
- [Vascular smooth muscle contraction](#)
- [VEGF signaling pathway](#)

Disease

- [Adenocarcinoma](#)
- [Adenoma](#)
- [Adrenal Gland Neoplasms](#)
- [Alzheimer Disease](#)
- [Anorexia Nervosa](#)
- [Asthma](#)
- [Atherosclerosis](#)
- [Bulimia](#)
- [Carcinoma](#)
- [Cardiovascular Diseases](#)
- [Cleft Lip](#)
- [Cleft Palate](#)
- [Diabetes Mellitus](#)
- [Digestive System Abnormalities](#)
- [Disease Models](#)
- [Disease Progression](#)
- [Down Syndrome](#)
- [Edema](#)
- [Endocrine Gland Neoplasms](#)
- [Esophageal Neoplasms](#)
- [Genetic Predisposition to Disease](#)
- [Genetic Predisposition to Disease](#)
- [Glomus Tumor](#)
- [Hashimoto Disease](#)

- [Head and Neck Neoplasms](#)
- [Hippel-Lindau Disease](#)
- [Hirschsprung Disease](#)
- [HIV Infections](#)
- [Hydronephrosis](#)
- [Hyperplasia](#)
- [Hypertension](#)
- [Intestinal Diseases](#)
- [Kidney Diseases](#)
- [Kidney Failure](#)
- [Lung Neoplasms](#)
- [Lymphatic Metastasis](#)
- [Macular Degeneration](#)
- [Multiple endocrine neoplasia](#)
- [Multiple Endocrine Neoplasia Type 2a](#)
- [Multiple Endocrine Neoplasia Type 2b](#)
- [Narcolepsy](#)
- [Necrosis](#)
- [Neoplasm Metastasis](#)
- [Neoplasm Recurrence](#)
- [Neoplasms](#)
- [Neurofibromatosis](#)
- [Nondisjunction](#)
- [Ovarian Neoplasms](#)
- [Pancreatic cancer](#)
- [Pancreatic Neoplasms](#)

- [Paraganglioma](#)
- [Parkinson disease](#)
- [Pheochromocytoma](#)
- [Prostate cancer](#)
- [Prostatic Neoplasms](#)
- [Pulmonary Disease](#)
- [Recurrence](#)
- [Schizophrenia](#)
- [Sleep Apnea](#)
- [Sudden Infant Death](#)
- [Syndrome](#)
- [Taste](#)
- [Thyroid Diseases](#)
- [Thyroid Neoplasms](#)
- [Thyroid Neoplasms](#)
- [Tobacco Use Disorder](#)
- [Urea Cycle Disorders](#)
- [Urinary Bladder Neoplasms](#)
- [Urogenital Abnormalities](#)
- [Vesico-Ureteral Reflux](#)
- [Vitamin A Deficiency](#)
- [von Hippel-Lindau Disease](#)
- [Von Hippel-Lindau syndrome](#)
- [Werner syndrome](#)