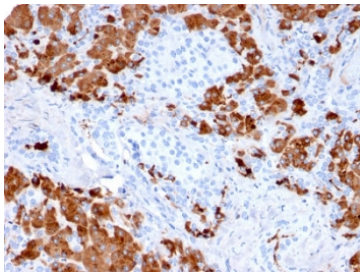
Carboxypeptidase A1 Antibody / CPA1 [clone CPA1/2712] (V3986)

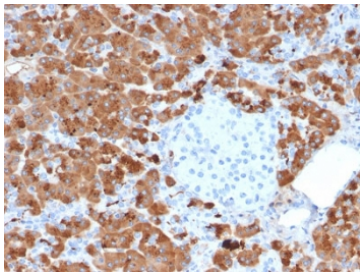
Catalog No.	Formulation	Size
V3986-100UG	0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide	100 ug
V3986-20UG	0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide	20 ug
V3986SAF-100UG	1 mg/ml in 1X PBS; BSA free, sodium azide free	100 ug
V3986IHC-7ML	Prediluted in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide; *For IHC use only*	7 ml

Bulk quote request

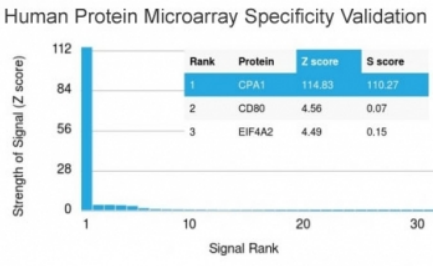
Availability	1-3 business days
Species Reactivity	Human
Format	Purified
Host	Mouse
Clonality	Monoclonal (mouse origin)
Isotype	Mouse IgG2c, kappa
Clone Name	CPA1/2712
Purity	Protein G affinity
UniProt	P15085
Localization	Cytoplasmic, secreted
Applications	Immunohistochemistry (FFPE): 1-2ug/ml for 30 min at RT Western blot: 1-2ug/ml
Limitations	This Carboxypeptidase A1 antibody is available for research use only.



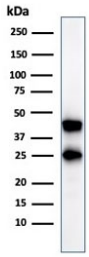
IHC testing of FFPE human pancreas with Carboxypeptidase A1 antibody (clone CPA1/2712). HIER: boil tissue sections in pH6, 10mM citrate buffer, for 10-20 min followed by cooling at RT for 20 min.



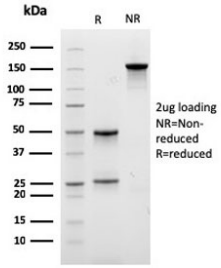
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Analysis of HuProt(TM) microarray containing more than 19,000 full-length human proteins using Carboxypeptidase A1 antibody (clone CPA1/2712). These results demonstrate the foremost specificity of the CPA1/2712 mAb.
Z- and S- score: The Z-score represents the strength of a signal that an antibody (in combination with a fluorescently-tagged anti-IgG secondary Ab) produces when binding to a particular protein on the HuProt(TM) array. Z-scores are described in units of standard deviations (SD's) above the mean value of all signals generated on that array. If the targets on the HuProt(TM) are arranged in descending order of the Z-score, the S-score is the difference (also in units of SD's) between the Z-scores. The S-score therefore represents the relative target specificity of an Ab to its intended target.



Western blot testing of pancreas lysate with Carboxypeptidase A1 antibody (clone CPA1/2712). Predicted molecular weight ~47 kDa.



SDS-PAGE analysis of purified, BSA-free Carboxypeptidase A1 antibody (clone CPA1/2712) as confirmation of integrity and purity.

Description

Human pancreatic procarboxypeptidase A exists as three different active forms, two of which are designated carboxypeptidase A1 (CPA1) and carboxypeptidase A2 (CPA2). CPA1, also known as CPA, is a 419 amino acid secreted monomeric protein that is highly expressed in pancreatic tissue. Functioning as a pancreatic exopeptidase, CPA1 uses zinc as a cofactor to catalyze the release of C-terminal amino acids from a variety of proteins, thereby playing a key role in protein digestion and degradation. Via its catalytic activity, CPA1 is also thought to be involved in zymogen (proenzyme) inhibition, probably functioning to block enzyme activation pathways. Abnormal levels of CPA1 are associated with pancreatic cancer, suggesting a possible role in either tumor progression or tumor suppression events.

For additional tissue-specific detection and characterization of CPA1 expression as a pancreatic acinar cell marker, see our Carboxypeptidase A1 antibody clone CPA1/8163R featuring validated IHC and western blot data.

Application Notes

Optimal dilution of the Carboxypeptidase A1 antibody should be determined by the researcher.

1. The prediluted format is supplied in a dropper bottle and is optimized for use in IHC. After epitope retrieval step (if required), drip mAb solution onto the tissue section and incubate at RT for 30 min.

Immunogen

Full length recombinant human protein was used as the immunogen for the Carboxypeptidase A1 antibody.

Storage

Store the Carboxypeptidase A1 antibody at 2-8oC (with azide) or aliquot and store at -20oC or colder (without azide).

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