

Junctophilin 2 / JPH2 Antibody (C-Terminus)
Rabbit Polyclonal Antibody
Catalog # ALS13023**Specification**

Junctophilin 2 / JPH2 Antibody (C-Terminus) - Product Information

Application	IHC
Primary Accession	Q9BR39
Reactivity	Human, Mouse, Rat
Host	Rabbit
Clonality	Polyclonal
Calculated MW	74kDa KDa

Junctophilin 2 / JPH2 Antibody (C-Terminus) - Additional Information**Gene ID** 57158**Other Names**

Junctophilin-2, JP-2, Junctophilin type 2, JPH2, JP2

Target/Specificity

Multiple isoforms of JPH2 are known to exist.

Reconstitution & Storage

Short term 4°C, long term aliquot and store at -20°C, avoid freeze thaw cycles. Store undiluted.

Precautions

Junctophilin 2 / JPH2 Antibody (C-Terminus) is for research use only and not for use in diagnostic or therapeutic procedures.

Junctophilin 2 / JPH2 Antibody (C-Terminus) - Protein Information**Name** JPH2 ([HGNC:14202](#))**Function**

[Junctophilin-2]: Membrane-binding protein that provides a structural bridge between the plasma membrane and the sarcoplasmic reticulum and is required for normal excitation-contraction coupling in cardiomyocytes (PubMed:20095964). Provides a structural foundation for functional cross-talk between the cell surface and intracellular Ca(2+) release channels by maintaining the 12-15 nm gap between the sarcolemma and the sarcoplasmic reticulum membranes in the cardiac dyads (By similarity). Necessary for proper intracellular Ca(2+) signaling in cardiac myocytes via its involvement in ryanodine receptor-mediated calcium ion release (By similarity). Contributes to the construction of skeletal muscle triad junctions (By similarity).

Cellular Location

[Junctophilin-2]: Cell membrane {ECO:0000250|UniProtKB:Q9ET78}; Peripheral membrane protein {ECO:0000250|UniProtKB:Q9ET78}. Sarcoplasmic reticulum membrane

{ECO:0000250|UniProtKB:Q9ET78}; Single-pass type IV membrane protein
{ECO:0000250|UniProtKB:Q9ET78}. Endoplasmic reticulum membrane
{ECO:0000250|UniProtKB:Q9ET78}; Single-pass type IV membrane protein
{ECO:0000250|UniProtKB:Q9ET78}. Note=The transmembrane domain is anchored in sarcoplasmic reticulum membrane, while the N-terminal part associates with the plasma membrane. In heart cells, it predominantly associates along Z lines within myocytes. In skeletal muscle, it is specifically localized at the junction of A and I bands
{ECO:0000250|UniProtKB:Q9ET78}

Tissue Location

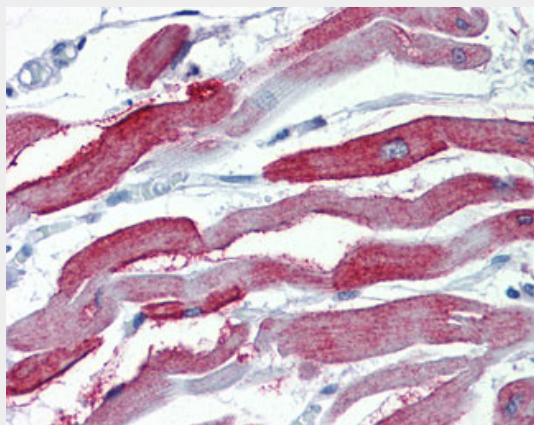
Specifically expressed in skeletal muscle and heart.

Junctophilin 2 / JPH2 Antibody (C-Terminus) - Protocols

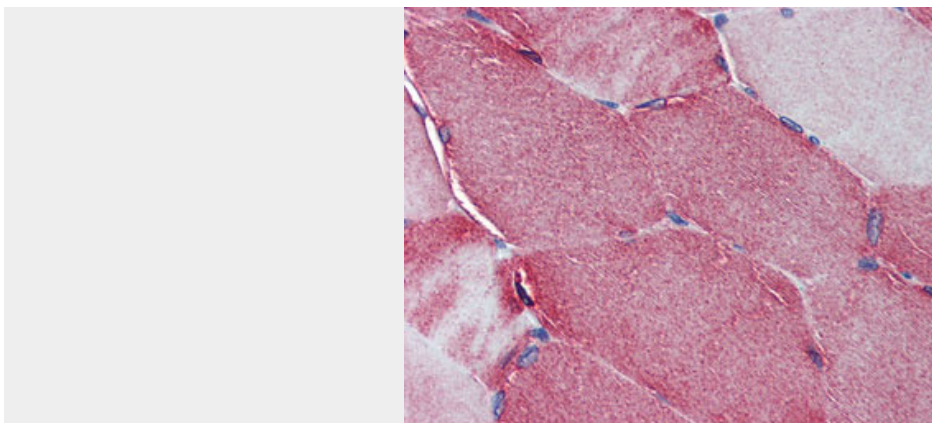
Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

Junctophilin 2 / JPH2 Antibody (C-Terminus) - Images



Anti-JPH2 antibody IHC of human heart.



Anti-JPH2 antibody IHC of human skeletal muscle.

Junctophilin 2 / JPH2 Antibody (C-Terminus) - Background

Junctophilins contribute to the formation of junctional membrane complexes (JMCs) which link the plasma membrane with the endoplasmic or sarcoplasmic reticulum in excitable cells. Provides a structural foundation for functional cross-talk between the cell surface and intracellular calcium release channels. JPH2 is necessary for proper intracellular Ca^{2+} signaling in cardiac myocytes via its involvement in ryanodine receptor-mediated calcium ion release. Contributes to the construction of skeletal muscle triad junctions.

Junctophilin 2 / JPH2 Antibody (C-Terminus) - References

Stavrides G.S.,et al.Submitted (NOV-1999) to the EMBL/GenBank/DDBJ databases.
Deloukas P.,et al.Nature 414:865-871(2001).
Mural R.J.,et al.Submitted (SEP-2005) to the EMBL/GenBank/DDBJ databases.
Nishi M.,et al.Biochem. Biophys. Res. Commun. 273:920-927(2000).
Olsen J.V.,et al.Cell 127:635-648(2006).