10320 Camino Santa Fe, Suite A
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999

ACVR1C / ALK7 Antibody (N-Terminus)

Rabbit Polyclonal Antibody

Catalog # ALS12646

Specification

ACVR1C / ALK7 Antibody (N-Terminus) - Product Information

Application	**WB, IHC-P**
Primary Accession	Q8NER5
Reactivity	**Human, Mouse, Rat**
Host	**Rabbit**
Clonality	**Polyclonal**
Calculated MW	**55kDa KDa**
Dilution	**WB~~1:1000** **IHC-P~~N/A**

ACVR1C / ALK7 Antibody (N-Terminus) - Additional Information

Gene ID 130399

Other Names
Activin receptor type-1C, 2.7.11.30, Activin receptor type IC, ACTR-IC, Activin receptor-like kinase 7, ALK-7, ACVR1C (HGNC:18123)

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

Precautions
ACVR1C / ALK7 Antibody (N-Terminus) is for research use only and not for use in diagnostic or therapeutic procedures.

ACVR1C / ALK7 Antibody (N-Terminus) - Protein Information

Name ACVR1C (HGNC:18123)

Function
Serine/threonine protein kinase which forms a receptor complex on ligand binding. The receptor complex consists of 2 type II and 2 type I transmembrane serine/threonine kinases. Type II receptors phosphorylate and activate type I receptors which autophosphorylate, then bind and activate SMAD transcriptional regulators, SMAD2 and SMAD3. Receptor for activin AB, activin B, activin E and NODAL. Upon NODAL binding, activation results in increased apoptosis and reduced proliferation through suppression of AKT signaling and the activation of Smad2-dependent signaling pathway in pancreatic beta-cells, trophoblasts, epithelial or neuronal cells (PubMed:15531507, PubMed:15150278). Acts as a positive regulator for macrophage activation partially through down-regulation of PPARG expression (By similarity).

Cellular Location
Membrane; Single- pass type I membrane protein

Tissue Location
Present in pancreas, heart, colon, small intestine, ovary and the hippocampus, medulla oblongata and putamen of the brain Isoform 1, isoform 2, isoform 3 and isoform 4 are all expressed in the placenta throughout pregnancy.

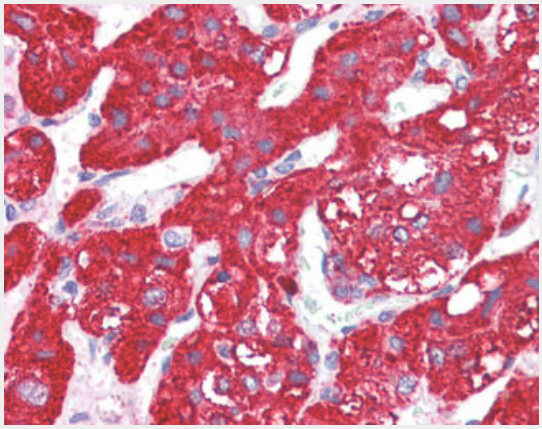
Volume
50 µl

ACVR1C / ALK7 Antibody (N-Terminus) - Protocols

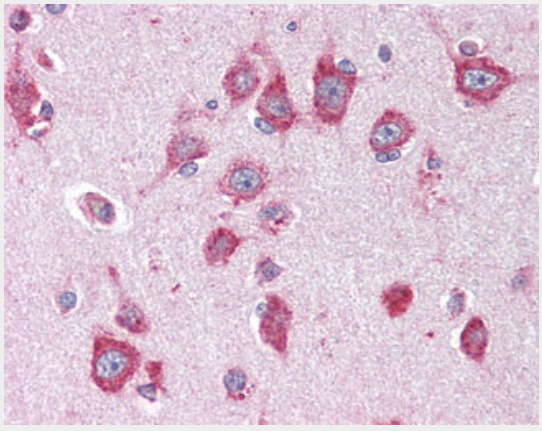
Provided below are standard protocols that you may find useful for product applications.

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

ACVR1C / ALK7 Antibody (N-Terminus) - Images



Anti-ACVR1 antibody IHC of human adrenal.



10320 Camino Santa Fe, Suite A
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999

Anti-ACVR1 antibody IHC of human brain, cortex.

ACVR1C / ALK7 Antibody (N-Terminus) - Background

Serine/threonine protein kinase which forms a receptor complex on ligand binding. The receptor complex consisting of 2 type II and 2 type I transmembrane serine/threonine kinases. Type II receptors phosphorylate and activate type I receptors which autophosphorylate, then bind and activate SMAD transcriptional regulators, SMAD2 and SMAD3. Receptor for activin AB, activin B and NODAL. Plays a role in cell differentiation, growth arrest and apoptosis.

ACVR1C / ALK7 Antibody (N-Terminus) - References

Bondestam J.,et al.Cytogenet. Cell Genet. 95:157-162(2001).
Roberts H.J.,et al.Biol. Reprod. 68:1719-1726(2003).
Hillier L.W.,et al.Nature 434:724-731(2005).
Xu G.,et al.J. Clin. Endocrinol. Metab. 89:5523-5534(2004).
Greenman C.,et al.Nature 446:153-158(2007).