

**DESCRIPTION**

|                           |   |
|---------------------------|---|
| <b>Species Reactivity</b> | Human   |
| <b>Specificity</b>        | Detects human PEDF R/PNPLA2 in direct ELISAs. In direct ELISAs, less than 5% cross-reactivity with recombinant mouse PNPLA2 is observed.  |
| <b>Source</b>             | Polyclonal Goat IgG   |
| <b>Purification</b>       | Antigen Affinity-purified   |
| <b>Immunogen</b>          | <i>E. coli</i> -derived recombinant human PEDF R/PNPLA2<br>Val162-Thr332<br>Accession # Q96AD5  |
| <b>Formulation</b>        | Lyophilized from a 0.2 µm filtered solution in PBS with Trehalose. See Certificate of Analysis for details.<br>*Small pack size (-SP) is supplied as a 0.2 µm filtered solution in PBS. |

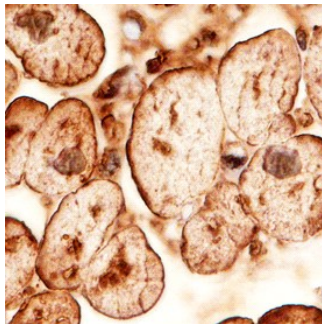
**APPLICATIONS**

**Please Note:** Optimal dilutions should be determined by each laboratory for each application. *General Protocols* are available in the *Technical Information* section on our website.

|                             | <b>Recommended Concentration</b> | <b>Sample</b> |
|-----------------------------|----------------------------------|---------------|
| <b>Immunohistochemistry</b> | 5-15 µg/mL                       | See Below     |

**DATA**

**Immunohistochemistry**



**PEDF R/PNPLA2 in Human Heart.**  
PEDF R/PNPLA2 was detected in immersion fixed paraffin-embedded sections of human heart using Goat Anti-Human PEDF R/PNPLA2 Antigen Affinity-purified Polyclonal Antibody (Catalog # AF5387) at 10 µg/mL overnight at 4 °C. Before incubation with the primary antibody, tissue was subjected to heat-induced epitope retrieval using Antigen Retrieval Reagent-Basic (Catalog # CTS013). Tissue was stained using the Anti-Goat HRP-DAB Cell & Tissue Staining Kit (brown; Catalog # CTS008) and counter-stained with hematoxylin (blue). Specific staining was localized to the sarcolemma of cardiomyocytes. View our protocol for [Chromogenic IHC Staining of Paraffin-embedded Tissue Sections](#).

**PREPARATION AND STORAGE**

|                                |  |
|--------------------------------|--|
| <b>Reconstitution</b>          | Sterile PBS to a final concentration of 0.2 mg/mL.   |
| <b>Shipping</b>                | The product is shipped at ambient temperature. Upon receipt, store it immediately at the temperature recommended below.<br>*Small pack size (-SP) is shipped with polar packs. Upon receipt, store it immediately at -20 to -70 °C   |
| <b>Stability &amp; Storage</b> | <b>Use a manual defrost freezer and avoid repeated freeze-thaw cycles.</b> <ul style="list-style-type: none"> <li>• 12 months from date of receipt, -20 to -70 °C as supplied.</li> <li>• 1 month, 2 to 8 °C under sterile conditions after reconstitution.</li> <li>• 6 months, -20 to -70 °C under sterile conditions after reconstitution.</li> </ul> |

**BACKGROUND**

PEDF R (Pigment epithelium derived factor receptor; also ATGL, PNPLA2 and desnutrin) is a 55-60 kDa member of the PNPLA family of proteins. It is expressed in adipocytes, hepatocytes, skeletal muscle, and pigment epithelium. PEDF R specifically hydrolyses triglycerides, releasing long-chain fatty acids. Human PEDF R is described as being a 504 amino acid (aa) type II transmembrane (TM) protein. Its TM segment is stated to span aa 9-29. It also contains a palatin domain (aa 10-179) with a conserved GxSxG enzymatic motif. There is one potential isoform variant that shows a deletion of aa 2-62. Over aa 162-332, human PEDF R shares 85% aa identity with mouse PEDF R.