

## DESCRIPTION

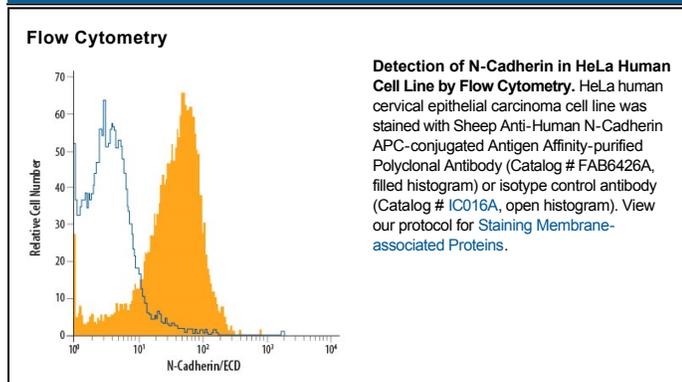
<b>Species Reactivity</b>	Human
<b>Specificity</b>	Detects human, mouse, and rat N-Cadherin in Western blots. In direct ELISA, less than 1% cross-reactivity with recombinant human (rh) E-Cadherin, rhR-Cadherin, and rhCadherin-13 is observed.
<b>Source</b>	Polyclonal Sheep IgG
<b>Purification</b>	Antigen Affinity-purified
<b>Immunogen</b>	Mouse myeloma cell line NS0-derived recombinant human N-Cadherin Asp160-Ala724 Accession # P19022
<b>Conjugate</b>	Allophycocyanin Excitation Wavelength: 620-650 nm Emission Wavelength: 660-670 nm
<b>Formulation</b>	Supplied in a saline solution containing BSA and Sodium Azide. See Certificate of Analysis for details.  *Contains <0.1% Sodium Azide, which is not hazardous at this concentration according to GHS classifications. Refer to the Safety Data Sheet (SDS) for additional information and handling instructions.

## 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.

	Recommended Concentration	Sample
<b>Flow Cytometry</b>	10 $\mu$ L/10 <sup>6</sup> cells	See Below

## DATA



## PREPARATION AND STORAGE

<b>Shipping</b>	The product is shipped with polar packs. Upon receipt, store it immediately at the temperature recommended below.
<b>Stability &amp; Storage</b>	<b>Protect from light. Do not freeze.</b> <ul style="list-style-type: none"> <li>● 12 months from date of receipt, 2 to 8 °C as supplied.</li> </ul>

## BACKGROUND

N-Cadherin (Neural Cadherin; also CD325 and Cadherin-2) is a 130-135 kDa member of the "classical" (or type I) cadherin subfamily, cadherin superfamily of proteins. It is expressed on multiple cell types, including neurons, fibroblasts, Schwann cells, endothelial cells and hepatic stellate cells. N-Cadherin mediates homotypic binding, either in *cis* (same cell) or *trans* (adjacent cell). proN-Cadherin is expressed as an 881 amino acid (aa) type I transmembrane glycoprotein. It may be initially inserted into the ER, where the 15-20 kDa prodomain (aa 26-159) is cleaved by proprotein convertase, and the mature molecule (aa 160-906) is transported to the surface. Mature N-Cadherin contains a 565 aa extracellular region (aa 160-724) that possesses five cadherin domains (aa 160-714), and a 161 aa cytoplasmic tail that undergoes phosphorylation at Tyr785. There is one splice variant that contains a 10 aa substitution for aa 839-906. Over aa 160-724, human N Cadherin shares 98% aa identity with mouse N-Cadherin.