Serum Rabbit Anti-Bcl-X

Product Information

Material Number: 556361
Size: 0.1 ml
Clone: Polyclonal
Immunogen: Human Bcl-X aa. 46-66 synthetic peptide
Isotype: Rabbit Ig
Reactivity:
QC Testing: Human
Target MW: 17, 25-29 kDa
Storage Buffer: Aqueous buffered solution containing ≤0.09% sodium azide and ≤0.03% thimerosal

Description

Members of the Bcl-2 family play a major role in regulating the response of cells to a wide variety of apoptotic signals. The first member of this multifamily, Bcl-2, was discovered in the mid 1980s through its involvement in t(14;18) chromosomal translocations commonly found in a subset of follicular B-cell lymphomas. Bcl-2 blocks apoptosis, and translocation of Bcl-2 sequences from chromosome 18 onto the transcriptionally active immunoglobulin locus at chromosome band 14q32 in B cells deregulates Bcl-2 gene expression, resulting in high levels of Bcl-2 mRNA and protein expression. Deregulation of the Bcl-2 gene, by translocations or other mechanisms, appears to contribute to tumorigenesis by prolonging cell survival rather than by accelerating the rate of cell proliferation. A variety of Bcl-2 homologues have since been described in humans and other mammals, leading to the definition of a multigene family. Like Bcl-2, some Bcl-2 family members block apoptosis, whereas others promote apoptosis and inhibit Bcl-2 activity. Bcl-X is a Bcl-2 homologue that has two isoforms, resulting from alternative splicing. Bcl-X-L (long) is a 241 amino acid protein that is 47% homologous to Bcl-2 on the amino acid level. Bcl-X-S (short) is a 178 amino acid protein lacking a 63 amino acid domain that is well conserved among members of the Bcl-2 protein family. Bcl-X-L blocks cell death, whereas Bcl-X-S inhibits Bcl-2 and promotes cell death. The antibodies recognize both mouse and human Bcl-X-L (long) and Bcl-X-S (short) proteins. A synthetic peptide corresponding to amino acids 46-66 of human Bcl-X was used as immunogen. This region corresponds to a unique domain that lacks homolog with other known members of the Bcl-2 family.

Preparation and Storage

The polyclonal antibody was purified from antiserum by affinity chromatography. Store undiluted at 4°C.
**Application Notes**

**Application**

<table>
<thead>
<tr>
<th>Application</th>
<th>Tested During Development</th>
<th>Routinely Tested</th>
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<tbody>
<tr>
<td>Western blot</td>
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<tr>
<td>Immunohistochemistry-formalin (antigen retrieval required)</td>
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<tr>
<td>Immunohistochemistry-frozen</td>
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<tr>
<td>Immunohistochemistry-paraffin</td>
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**Recommended Assay Procedure:**
Applications include western blot analysis (1:1000 - 1:2000), and immunohistochemical staining (1:500 - 1:2000) of frozen tissue sections and of formalin-fixed or Bouin's-fixed, paraffin-embedded tissue sections.

**Suggested Companion Products**

<table>
<thead>
<tr>
<th>Catalog Number</th>
<th>Name</th>
<th>Size</th>
<th>Clone</th>
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<tbody>
<tr>
<td>611449</td>
<td>HeLa Cell Lysate</td>
<td>500 µg</td>
<td>(none)</td>
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<tr>
<td>554021</td>
<td>HRP Goat Anti-Rabbit Ig</td>
<td>1.0 ml</td>
<td>(none)</td>
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**Product Notices**

1. Since applications vary, each investigator should titrate the reagent to obtain optimal results.
3. This product contains thimerosal, an organic mercury compound. Mercury and mercury compounds are chemicals known to the State of California to cause birth defects or other reproductive harm. Foreseeable use of this product does not pose a known reproductive toxicity threat.
4. Caution: Sodium azide yields highly toxic hydrazoic acid under acidic conditions. Dilute azide compounds in running water before discarding to avoid accumulation of potentially explosive deposits in plumbing.

**References**


