Product Datasheet

TNF-alpha Antibody
NBP1-19532

Unit Size: 0.1 mg

Store at 4C short term. Aliquot and store at -20C long term. Avoid freeze-thaw cycles.

Reviews: 3  Publications: 14

Protocols, Publications, Related Products, Reviews, Research Tools and Images at:
www.novusbio.com/NBP1-19532

Updated 10/2/2018 v.20.1

Earn rewards for product reviews and publications.
Submit a publication at www.novusbio.com/publications
Submit a review at www.novusbio.com/reviews/destination/NBP1-19532
NBP1-19532
TNF-alpha Antibody

<table>
<thead>
<tr>
<th>Product Information</th>
</tr>
</thead>
<tbody>
<tr>
<td>Unit Size</td>
</tr>
<tr>
<td>Concentration</td>
</tr>
<tr>
<td>Storage</td>
</tr>
<tr>
<td>Clonality</td>
</tr>
<tr>
<td>Preservative</td>
</tr>
<tr>
<td>Isotype</td>
</tr>
<tr>
<td>Purity</td>
</tr>
<tr>
<td>Buffer</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Product Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Host</td>
</tr>
<tr>
<td>Gene ID</td>
</tr>
<tr>
<td>Gene Symbol</td>
</tr>
<tr>
<td>Species</td>
</tr>
<tr>
<td>Reactivity Notes</td>
</tr>
<tr>
<td>Immunogen</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Product Application Details</th>
</tr>
</thead>
<tbody>
<tr>
<td>Applications</td>
</tr>
<tr>
<td>Application Notes</td>
</tr>
</tbody>
</table>
Western Blot: TNF-alpha Antibody [NBP1-19532] - Recombinant human TNF alpha (10 ng) was separated on a 12% gel by SDS-PAGE, transferred to 0.2 um PVDF membrane and blocked in 5% non-fat milk in TBST. The membrane was probed with 2.0 ug/ml anti-TNF alpha in 5% block buffer and detected with an anti-rabbit HRP secondary antibody using chemiluminescence.

Immunocytochemistry/Immunofluorescence: TNF-alpha Antibody [NBP1-19532] - TNF alpha antibody was tested in A431 cells with DyLight 488 (green). Nuclei and alpha-tubulin were counterstained with DAPI (blue) and Dylight 550 (red).

Immunohistochemistry-Paraffin: TNF-alpha Antibody [NBP1-19532] - IHC analysis of a formalin fixed and paraffin embedded tissue section of mouse intestine using TNF-alpha antibody (NBP1-19532) at 1:300 dilution. The binding of this primary antibody to TNF-alpha protein in the section was detected using HRP-labeled secondary antibody and DAB reagent, and nuclei of cells were counterstained using hematoxylin. This TNF-alpha antibody generated an expected diffused immunostaining of this protein in the tested tissue. Staining was primarily observed in the epithelial cells and some cells showed membrane positivoty also.

Immunohistochemistry-Paraffin: TNF-alpha Antibody [NBP1-19532] - IHC analysis of a formalin fixed and paraffin embedded tissue section of mouse intestine using TNF-alpha antibody (NBP1-19532) at 1:300 dilution. The binding of this primary antibody to TNF-alpha protein in the section was detected using HRP-labeled secondary antibody and DAB reagent, and nuclei of cells were counterstained using hematoxylin. This TNF-alpha antibody generated an expected immunopositivity of this protein in the tested tissue. Staining was primarily observed in the epithelial cells while some staining was present in mucosa muscularis also.
**Publications**


Ozdemira S, Altunb S, Arslan H. Imidacloprid exposure cause the histopathological changes, activation of TNF-a, iNOS, 8-OHdG biomarkers, and alteration of caspase 3, iNOS, CYP1A, MT1 gene expression levels in common carp (Cyprinus carpio L.). Toxicology Reports 2017 [PMID: 29321977] (ICC/IF, Fish)


Details:

TNF alpha antibody (NBP1-19532) was used at 1:200 dilution for IHC-Fr staining of Tibialis anterior/TA muscle of rats 3, 7 and 14 days post-injury (subjected to freezing muscle injury and cryotherapy). TNF alpha expression was observed in CD68+ve cells and in injured muscle fibers.


Details:

TNF alpha/TNFa antibody used for IHC-P on whole shoulders of adult male Sprague-Dawley rats subjected to STZ induced hyperglycemia for 8 weeks - shoulders fixed in formalin, cut 7um longitudinal sections, peroxidase blocked in 3% H2O2/methanol 48C for 30 min, non-specific protein blocked with 4% dried milk in PBS /Blotto for 20 min, primary used at 1:750 dilution/PBS and incubated 4C ON followed by detection via goat anti-rabbit peroxidase-conjugated/HRP - DAB method. Immunostaining image not shown, but staining score on Supraspinatus tendon and Superior capsule tissues shown in Table 2.

**Procedures**

**Immunohistochemistry Protocol specific for TNF alpha antibody (NBP1-19532)**

**Immunohistochemistry-Paraffin Embedded Sections**

**Antigen Unmasking:**
Bring slides to a boil in 10 mM sodium citrate buffer (pH 6.0) then maintain at a sub-boiling temperature for 10 minutes. Cool slides on bench-top for 30 minutes.

**Staining:**
1. Wash sections in deionized water three times for 5 minutes each.
2. Wash sections in wash buffer for 5 minutes.
3. Block each section with 100-400 ul blocking solution for 1 hour at room temperature.
4. Remove blocking solution and add 100-400 ul diluted primary antibody. Incubate overnight at 4 C.
5. Remove antibody solution and wash sections in wash buffer three times for 5 minutes each.
6. Add 100-400 ul biotinylated diluted secondary antibody. Incubate 30 minutes at room temperature.
7. Remove secondary antibody solution and wash sections three times with wash buffer for 5 minutes each.
8. Add 100-400 ul Streptavidin-HRP reagent to each section and incubate for 30 minutes at room temperature.
9. Remove secondary antibody solution and wash sections three times in wash buffer for 5 minutes each.
10. Add 100-400 ul DAB substrate to each section and monitor staining closely.
11. As soon as the sections develop, immerse slides in deionized water.
12. Counterstain sections in hematoxylin.
13. Wash sections in deionized water two times for 5 minutes each.
14. Dehydrate sections.
15. Mount coverslips.

**Immunocytochemistry/Immunofluorescence Protocol for TNF alpha Antibody (NBP1-19532)**

**Immunocytochemistry Protocol**

Culture cells to appropriate density in 35 mm culture dishes or 6-well plates.

1. Remove culture medium and add 10% formalin to the dish. Fix at room temperature for 30 minutes.
2. Remove the formalin and add ice cold methanol. Incubate for 5-10 minutes.
3. Remove methanol and add washing solution (i.e. PBS). Be sure to not let the specimen dry out. Wash three times for 10 minutes.
4. To block nonspecific antibody binding incubate in 10% normal goat serum from 1 hour to overnight at room temperature.
5. Add primary antibody at appropriate dilution and incubate at room temperature from 2 hours to overnight at room temperature.
6. Remove primary antibody and replace with washing solution. Wash three times for 10 minutes.
7. Add secondary antibody at appropriate dilution. Incubate for 1 hour at room temperature.
8. Remove antibody and replace with wash solution, then wash for 10 minutes. Add Hoechst 33258 to wash solution at 1:25,000 and incubate for 10 minutes. Wash a third time for 10 minutes.
9. Cells can be viewed directly after washing. The plates can also be stored in PBS containing Azide covered in Parafilm (TM). Cells can also be cover-slipped using Fluoromount, with appropriate sealing.

*The above information is only intended as a guide. The researcher should determine what protocol best meets their needs. Please follow safe laboratory procedures.*
Limitations
This product is for research use only and is not approved for use in humans or in clinical diagnosis. Primary Antibodies are guaranteed for 1 year from date of receipt.

For more information on our 100% guarantee, please visit www.novusbio.com/guarantee

Earn gift cards/discounts by submitting a review: www.novusbio.com/reviews/submit/NBP1-19532

Earn gift cards/discounts by submitting a publication using this product: www.novusbio.com/publications