## **Product Datasheet**

## AKT1 [p Ser473] Antibody (17F6.B11) [Biotin] NBP2-21678

Unit Size: 0.05 mg

Store lyophilized antibody at 4C in the dark. Aliquot reconstituted liquid and store at -20C. Avoid freeze-thaw cycles.



Protocols, Publications, Related Products, Reviews, Research Tools and Images at: www.novusbio.com/NBP2-21678

Updated 10/23/2024 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/NBP2-21678



#### NBP2-21678

AKT1 [p Ser473] Antibody (17F6.B11) [Biotin]

| Product Information                                    |   |
|--|---|
| Unit Size  | 0.05 mg   |
| Concentration  | LYOPH mg/ml   |
| Storage  | Store lyophilized antibody at 4C in the dark. Aliquot reconstituted liquid and store at -20C. Avoid freeze-thaw cycles.   |
| Clonality  | Monoclonal  |
| Clone  | 17F6.B11  |
| Preservative   | 0.01% Sodium Azide  |
| <b>Reconstitution Instructions</b>                     | Reconstitute with 100 ul deionized water (or equivalent)  |
| Isotype  | IgG1 Kappa  |
| Conjugate  | Biotin  |
| Purity   | Protein A purified  |
| Buffer   | Lyophilized from 0.02 M Potassium Phosphate, 0.15 M Sodium Chloride, pH 7.2, 10 mg/mL Bovine Serum Albumin (BSA) - Immunoglobulin and Protease free   |
| Product Description                                    |   |
| Description  | Store vial at 4C prior to restoration. For extended storage aliquot contents and<br>freeze at -20C or below. Avoid cycles of freezing and thawing. Centrifuge<br>product if not completely clear after standing at room temperature. This product<br>is stable for several weeks at 4C as an undiluted liquid. Dilute only prior to<br>immediate use.<br>This Mouse Monoclonal Antibody Biotin Conjugated was purified from<br>concentrated tissue culture supernate by Protein A chromatography  |
| Host   | Mouse   |
| Gene ID  | 207   |
| Gene Symbol  | A1/74   |
|  | AKT1  |
| Species  | Human, Mouse, Rat, Monkey   |
| -  |   |
| Species  | Human, Mouse, Rat, Monkey<br>A BLAST analysis was used to suggest cross-reactivity with AKT1 pS473 from<br>human, mouse, rat and chimpanzee sources based on 100% homology with the<br>immunizing sequence. Cross-reactivity with AKT1 from other sources has not<br>been determined. Cross-reactivity with AKT2 and AKT3 has not been  |
| Species<br>Reactivity Notes                            | <ul> <li>Human, Mouse, Rat, Monkey</li> <li>A BLAST analysis was used to suggest cross-reactivity with AKT1 pS473 from<br/>human, mouse, rat and chimpanzee sources based on 100% homology with the<br/>immunizing sequence. Cross-reactivity with AKT1 from other sources has not<br/>been determined. Cross-reactivity with AKT2 and AKT3 has not been<br/>determined.</li> <li>This phospho specific monoclonal antibody is specific for phosphorylated human<br/>and mouse AKT protein at S473. A BLAST analysis was used to suggest cross-<br/>reactivity with AKT pS473 from human, mouse, rat and chimpanzee sources<br/>based on 100% homology with the immunizing sequence. Cross-reactivity with<br/>AKT from other sources has not been determined. Cross-reactivity with AKT2</li> </ul>  |
| Species<br>Reactivity Notes<br>Specificity/Sensitivity | <ul> <li>Human, Mouse, Rat, Monkey</li> <li>A BLAST analysis was used to suggest cross-reactivity with AKT1 pS473 from<br/>human, mouse, rat and chimpanzee sources based on 100% homology with the<br/>immunizing sequence. Cross-reactivity with AKT1 from other sources has not<br/>been determined. Cross-reactivity with AKT2 and AKT3 has not been<br/>determined.</li> <li>This phospho specific monoclonal antibody is specific for phosphorylated human<br/>and mouse AKT protein at S473. A BLAST analysis was used to suggest cross-<br/>reactivity with AKT pS473 from human, mouse, rat and chimpanzee sources<br/>based on 100% homology with the immunizing sequence. Cross-reactivity with<br/>AKT from other sources has not been determined. Cross-reactivity with AKT2<br/>and AKT3 has not been determined.</li> <li>AKT1 [p Ser473] Antibody (17F6.B11) was produced by repeated immunizations<br/>with a synthetic peptide corresponding to residues surrounding S473 of human</li> </ul> |



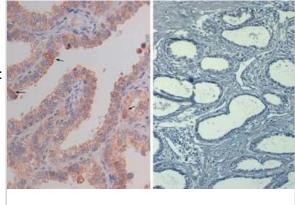
Page 2 of 4 v.20.1 Updated 10/23/2024

| Recommended Dilutions | Western Blot 1:500-1:3000, Flow Cytometry 1:10-1:1000, ELISA 1:20000,<br>Immunohistochemistry 20 ug/mL, Immunocytochemistry/ Immunofluorescence<br>1:500-1:3000, Immunohistochemistry-Paraffin 20 ug/mL   |
|-----------------------|---|
| Application Notes     | This product is tested for ELISA, immunohistochemistry, immunoprecipitation<br>and western blotting. Expect a band approximately 56 kDa in size corresponding<br>to phosphorylated AKT protein by western blotting in the appropriate cell lysate<br>or extract. This phospho-specific monoclonal antibody reacts with human and<br>mouse AKT pS473 and shows minimal reactivity by ELISA against the non-<br>phosphorylated form of the immunizing peptide. Specific conditions for reactivity<br>should be optimized by the end user. For immunohistochemistry use formalin-<br>fixed paraffin-embedded sections. No pre-treatment of sample is required. |

#### Images

Western Blot: AKT1 [p Ser473] Antibody (17F6.B11) [Biotin] [NBP2-21678] - Western Blot of AKT1 [p Ser473] antibody (17F6.B11) [Biotin]. Lane 1: GST tagged AKT1 active recombinant protein. Lane 2: none. Load: 25 ng per lane. Primary antibody: AKT1 phospho S473 Biotin Conjugated antibody at 1:1,000 for overnight at 4C. Secondary antibody: HRP Streptavidin secondary antibody at 1:40,000 for 30 min at RT. Block for 30 min at RT. Predicted/Observed size: 79 kDa, 79 kDa for AKT1 phospho S473. Other band(s): none

Immunohistochemistry: AKT1 [p Ser473] Antibody (17F6.B11) [Biotin] [NBP2-21678] - Immunohistochemistry of AKT11 [p Ser473] antibody (17F6.B11) [Biotin]. Tissue: prostate at 40X. Fixation: FFPE buffered formalin 10% conc. Antigen retrieval: Heat, Citrate pH 6.2. Pressure Cooker, left. (pH 9 shown on right as negative control). Primary antibody: AKT1sS473 biotin 20 ug/mL for 1 h at RT. Secondary antibody: Streptavidin Conj. HRP at 10 ug/ml. Localization: nuclear and occasionally cytoplasmic. Staining: antibody as precipitated red signal with a hematoxylin purple nuclear counterstain.



kDa

150

100

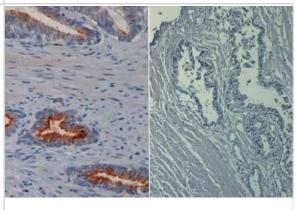
60 -

50 -

40 -

30 -20 - 1

Immunohistochemistry: AKT1 [p Ser473] Antibody (17F6.B11) [Biotin] [NBP2-21678] - Immunohistochemistry of AKT11 [p Ser473] antibody (17F6.B11) [Biotin]. Tissue: prostate at 40X (left) with negative control (right). Fixation: FFPE buffered formalin 10% conc. Antigen retrieval: Heat, Citrate pH 6.2. Pressure Cooker. Primary antibody: AKT1 pS473 biotin at 20 ug/mL for 1 h at RT. Secondary antibody: Streptavidin Conj. HRP at 10 ug/ml. Localization: nuclear and occasionally cytoplasmic. Staining: antibody as precipitated red signal with a hematoxylin purple nuclear counterstain.



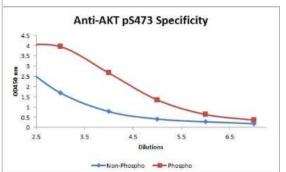


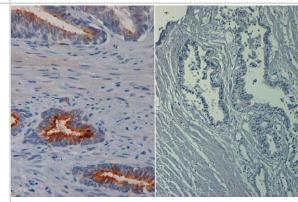
ELISA: AKT1 [p Ser473] Antibody (17F6.B11) [Biotin] [NBP2-21678] -ELISA of AKT1 [p Ser473] antibody (17F6.B11) [Biotin]. Antigen: BSA conjugates of AKT1 phospho S473 and AKT non-phospho S473. Coating amount: 0.1 ug per well. Primary antibody: AKT1 phospho S473 Biotin Conjugated antibody at 5 ug/mL. Dilution series: 3-fold. Mid-point concentration: 5 ng/mL AKT1 phospho S473 Biotin Conjugated antibody. Secondary antibody: Peroxidase streptavidin secondary antibody at 1:10,000. Substrate: TMB

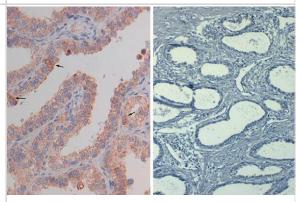
Immunohistochemistry of mouse anti AKT phospho S473 biotin conjugated. Tissue: prostate at 40X (left) with negative control (right). Fixation: FFPE buffered formalin 10% conc. Antigen retrieval: Heat, Citrate pH 6.2. Pressure Cooker. Primary antibody: AKT pS473 biotin at 20 ug/mL for 1 h at RT. Secondary antibody: Streptavidin Conj. HRP at 10 ug/ml. Localization: nuclear and occasionally cytoplasmic. Staining: antibody as precipitated red signal with a hematoxylin purple nuclear counterstain.

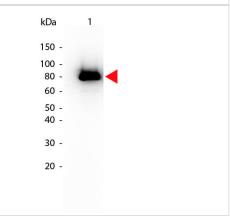
Immunohistochemistry of mouse Anti-AKT pS473 (MOUSE) Biotin Conjugated. Tissue: prostate at 40X. Fixation: FFPE buffered formalin 10% conc. Antigen retrieval: Heat, Citrate pH 6.2. Pressure Cooker, left. (pH 9 shown on right as negative control). Primary antibody: AKTsS473 biotin 20 ug/mL for 1 h at RT. Secondary antibody: Streptavidin Conj. HRP at 10 ug/ml. Localization: nuclear and occasionally cytoplasmic. Staining: antibody as precipitated red signal with a hematoxylin purple nuclear counterstain.

Western Blot of Mouse anti-Akt phospho S473 Biotin Conjugated antibody. Lane 1: GST tagged AKT1 active recombinant protein. Lane 2: none. Load: 25 ng per lane. Primary antibody: Akt phospho S473 Biotin Conjugated antibody at 1:1,000 for overnight at 4C. Secondary antibody: HRP Streptavidin secondary antibody at 1:40,000 for 30 min at RT. Block for 30 min at RT. Predicted/Observed size: 79 kDa, 79 kDa for Akt phospho S473. Other band(s): none













#### Novus Biologicals USA

10730 E. Briarwood Avenue Centennial, CO 80112 USA Phone: 303.730.1950 Toll Free: 1.888.506.6887 Fax: 303.730.1966 nb-customerservice@bio-techne.com

#### **Bio-Techne Canada**

21 Canmotor Ave Toronto, ON M8Z 4E6 Canada Phone: 905.827.6400 Toll Free: 855.668.8722 Fax: 905.827.6402 canada.inquires@bio-techne.com

#### **Bio-Techne Ltd**

19 Barton Lane Abingdon Science Park Abingdon, OX14 3NB, United Kingdom Phone: (44) (0) 1235 529449 Free Phone: 0800 37 34 15 Fax: (44) (0) 1235 533420 info.EMEA@bio-techne.com

### **General Contact Information**

www.novusbio.com Technical Support: nb-technical@biotechne.com Orders: nb-customerservice@bio-techne.com General: novus@novusbio.com

### Products Related to NBP2-21678

| Streptavidin Native Protein                 |
|---|
| Mouse IgG1 Isotype Control (11711) [Biotin] |
| Recombinant Human AKT1 His Protein          |
| TNF-alpha [Unconjugated]                    |
|   |

#### 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/NBP2-21678

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

www.novusbio.com

