

# **Human TOB1 Antibody**

Antigen Affinity-purified Polyclonal Goat IgG Catalog Number: AF5228

DESCRIPTION		
Species Reactivity	Human	
Specificity	Detects endogenous human TOB1 in Western blots.	
Source	Polyclonal Goat IgG	
Purification	Antigen Affinity-purified	
Immunogen	E. coli-derived recombinant human TOB1 Met1-Asn345 Accession # P50616	
Formulation	Lyophilized from a 0.2 µm filtered solution in PBS with Trehalose. See Certificate of Analysis for details. *Small pack size (-SP) is supplied either lyophilized or as a 0.2 µm filtered solution in PBS.	

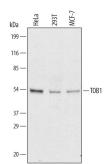
#### APPLICATIONS

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.

	Recommended Concentration	Sample
Western Blot	2 μg/mL	See Below

#### DATA

## Western Blot



Detection of Human TOB1 by Western Blot. Western blot shows lysates of HeLa human cervical epithelial carcinoma cell line, 293T human embryonic kidney cell line, and MCF-7 human breast cancer cell line. PVDF membrane was probed with 2 µg/mL of Human TOB1 Antigen Affinity-purified Polyclonal Antibody (Catalog # AF5228) followed by HRP-conjugated AntiGoat IgG Secondary Antibody (Catalog # HAF109). A specific band was detected for TOB1 at approximately 52 kDa (as indicated). This experiment was conducted under reducing conditions and using Immunoblot Buffer Group 1.

## PREPARATION AND STORAGE

**Reconstitution** Reconstitute at 0.2 mg/mL in sterile PBS.

Shipping The product is shipped at ambient temperature. Upon receipt, store it immediately at the temperature recommended below.

\*Small pack size (-SP) is shipped with polar packs. Upon receipt, store it immediately at -20 to -70 °C

Stability & Storage Use a manual defrost freezer and avoid repeated freeze-thaw cycles.

- 12 months from date of receipt, -20 to -70 °C as supplied.
- 1 month, 2 to 8 °C under sterile conditions after reconstitution
- 6 months, -20 to -70 °C under sterile conditions after reconstitution.

### BACKGROUND

TOB1 (transducer of ErbB2 protein 1) is a 45 kDa member of the BTG family of anti-proliferative proteins. It is ubiquitously expressed, and serves to negatively regulate cell cycle progression from  $G_0/G_1$  to S phase. This is accomplished by TOB1 suppression of cyclin D1 expression, which is abrogated by Erk2-mediated phosphorylation of Ser152/154/164 in response to growth factor stimulation. Human TOB1 is 345 amino acids (aa) in length and contains one NES (aa 2-14), a bipartite NLS (aa 18-40), a BTG domain (aa 42-130) that possesses antiproliferative activity, and two PAM domains (aa 133-143 and 268-278) that bind inducible PABP and regulate gene transcription. Human and mouse TOB1 (aa 1-345) are 94% aa identical when fourteen mouse-specific glutamines are excluded from the alignment.

Rev. 2/6/2018 Page 1 of 1

