

DESCRIPTION

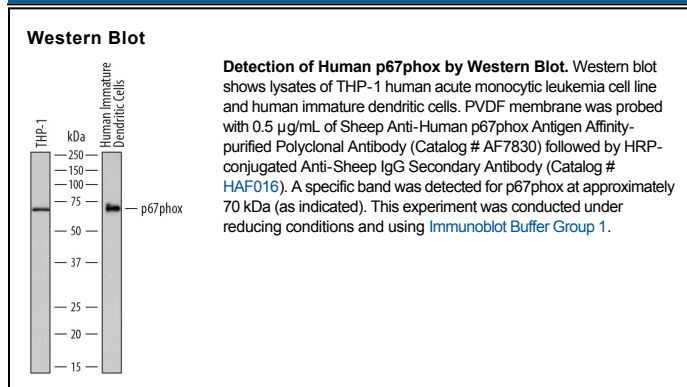
Species Reactivity	Human
Specificity	Detects human p67phox in direct ELISAs and Western blots.
Source	Polyclonal Sheep IgG
Purification	Antigen Affinity-purified
Immunogen	<i>E. coli</i> -derived recombinant human p67phox Lys355-Val526 (His389Gln) Accession # P19878
Formulation	Lyophilized from a 0.2 µm filtered solution in PBS with Trehalose. See Certificate of Analysis for details. *Small pack size (-SP) is supplied 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	0.5 µg/mL	See Below

DATA



PREPARATION AND STORAGE

Reconstitution	Sterile PBS to a final concentration of 0.2 mg/mL.
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. <ul style="list-style-type: none"> • 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

P67phox (67 kDa phagocyte oxidase; also NCF2 and NADPH oxidase activator 2) is a 67-70 kDa cytosolic member of the NCF2/NOXA1 family of proteins. It is expressed in multiple cell types, including B cells, endothelial cells, phagocytic cells such as neutrophils and macrophages and, to some degree, fibroblasts. Upon phagocytosis, phagocytes generate superoxide for the purpose of killing ingested microbes. This occurs through the formation and activation of a complex termed NADPH oxidase, which consists of membrane-associated cytochrome b558, plus Rac GTPase and three SH3 domain-containing components, p47phox and a p67phox:p40-phox dimer. Human p67phox is 526 amino acids (aa) in length. It contains two TPR repeats that participate in scaffold formation (aa 11-98), an SH3 domain (aa 240-299), an OPR motif that regulates PB1 interactions (aa 351-429), and a C-terminal SH3 domain (aa 457-516). There is one splice variant that shows a deletion of aa 231-293, and multiple point mutations along the length of the molecule. Over aa 355-526, human p67phox shares 76% aa identity with mouse p67phox.