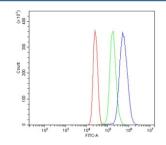


NOX2/gp91phox Antibody / CYBB (RQ6611)

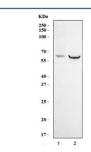
Catalog No.	Formulation	Size
RQ6611	0.5mg/ml if reconstituted with 0.2ml sterile DI water	100 ug

Bulk quote request

Availability	1-3 business days
Species Reactivity	Human
Format	Antigen affinity purified
Clonality	Polyclonal (rabbit origin)
Isotype	Rabbit IgG
Purity	Antigen affinity purified
Buffer	Lyophilized from 1X PBS with 2% Trehalose
UniProt	P04839
Applications	Western Blot : 1-2ug/ml Flow Cytometry : 1-3ug/million cells Direct ELISA : 0.1-0.5ug/ml
Limitations	This NOX2/gp91phox antibody is available for research use only.



Flow cytometry testing of human U937 cells with NOX2/gp91phox antibody at 1ug/million cells (blocked with goat sera); Red=cells alone, Green=isotype control, Blue= NOX2/gp91phox antibody.



Western blot testing of human 1) MCF7 and 2) Raji cell lysate with NOX2/gp91phox antibody. Predicted molecular weight ~65 kDa, can be observed at ~85 kDa.

Description

NOX2 (NADPH OXIDASE 2), also called CYBB (CYTOCHROME b(-245), BETA SUBUNIT), p91-PHOX or GP91-1, is a human gene encoding a glycoprotein. NOX2 is an essential component of phagocytic NADPH-oxidase, a membrane-bound enzyme complex that generates large quantities of microbicidal superoxide and other oxidants upon activation. It is mapped on Xp11.4. NOX2 assembled on DC phagosomes in a gp91-phox subunit-dependent manner, and that reactive oxygen species were produced in a more sustained manner in immature DC phagosomes than in macrophage phagosomes. As a major player in innate immune responses in neutrophils, NOX2 is also involved in adaptive immunity through its activity in DCs. In heart cells, physiologic stretch rapidly activates reduced-form NOX2 to produce reactive oxygen species (ROS) in a process dependent on microtubules (X-ROS signaling).

Application Notes

Optimal dilution of the NOX2/gp91phox antibody should be determined by the researcher.

Immunogen

Recombinant human protein (amino acids F416-H527) was used as the immunogen for the NOX2/gp91phox antibody.

Storage

After reconstitution, the NOX2/gp91phox antibody can be stored for up to one month at 4oC. For long-term, aliquot and store at -20oC. Avoid repeated freezing and thawing.