

**NQO1 Rabbit mAb**  
**Catalog # AP75819****Specification**

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**NQO1 Rabbit mAb - Product Information**

Application	<b>WB, IP</b>
Primary Accession	<a href="#">P15559</a>
Reactivity	<b>Human, Rat</b>
Host	<b>Rabbit</b>
Clonality	<b>Monoclonal Antibody</b>
Calculated MW	<b>30868</b>

**NQO1 Rabbit mAb - Additional Information****Gene ID** 1728**Other Names**  
NQO1**Dilution**  
WB~~1/500-1/1000  
IP~~N/A**Format**  
Liquid**NQO1 Rabbit mAb - Protein Information****Name** NQO1 {ECO:0000303|PubMed:1657151, ECO:0000312|HGNC:HGNC:2874}**Function**

Flavin-containing quinone reductase that catalyzes two- electron reduction of quinones to hydroquinones using either NADH or NADPH as electron donors. In a ping-pong kinetic mechanism, the electrons are sequentially transferred from NAD(P)H to flavin cofactor and then from reduced flavin to the quinone, bypassing the formation of semiquinone and reactive oxygen species (By similarity) (PubMed:<a href="http://www.uniprot.org/citations/8999809" target="\_blank">8999809</a>, PubMed:<a href="http://www.uniprot.org/citations/9271353" target="\_blank">9271353</a>). Regulates cellular redox state primarily through quinone detoxification. Reduces components of plasma membrane redox system such as coenzyme Q and vitamin quinones, producing antioxidant hydroquinone forms. In the process may function as superoxide scavenger to prevent hydroquinone oxidation and facilitate excretion (PubMed:<a href="http://www.uniprot.org/citations/15102952" target="\_blank">15102952</a>, PubMed:<a href="http://www.uniprot.org/citations/8999809" target="\_blank">8999809</a>, PubMed:<a href="http://www.uniprot.org/citations/9271353" target="\_blank">9271353</a>). Alternatively, can activate quinones and their derivatives by generating redox reactive hydroquinones with DNA cross-linking antitumor potential (PubMed:<a href="http://www.uniprot.org/citations/8999809" target="\_blank">8999809</a>). Acts as a gatekeeper of the core 20S proteasome known to degrade proteins with unstructured regions. Upon oxidative stress, interacts with tumor

suppressors TP53 and TP73 in a NADH-dependent way and inhibits their ubiquitin-independent degradation by the 20S proteasome (PubMed:<a href="http://www.uniprot.org/citations/15687255" target="\_blank">15687255</a>, PubMed:<a href="http://www.uniprot.org/citations/28291250" target="\_blank">28291250</a>).

#### Cellular Location

Cytoplasm, cytosol {ECO:0000250|UniProtKB:P05982}

#### NQO1 Rabbit mAb - Protocols

Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

#### NQO1 Rabbit mAb - Images

