

DESCRIPTION

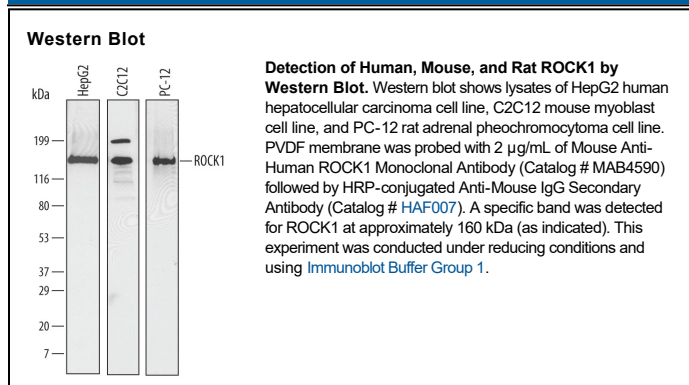
Species Reactivity	Human/Mouse/Rat
Specificity	Detects human ROCK1 in direct ELISAs and Western blots. In Western blots, no cross-reactivity with recombinant human ROCK2 is observed.
Source	Monoclonal Mouse IgG ₁ Clone # 701118
Purification	Protein A or G purified from hybridoma culture supernatant
Immunogen	<i>E. coli</i> -derived recombinant human ROCK1 Ala629-Thr829 Accession # Q13464
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



PREPARATION AND STORAGE

Reconstitution	Sterile PBS to a final concentration of 0.5 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

ROCK1 is a ubiquitously expressed serine/threonine kinase that is a downstream target of the small GTPase RhoA. ROCK1 is involved in diverse cellular functions, including smooth muscle contraction, actin cytoskeleton organization, cell adhesion and motility, and gene expression (1). ROCK1 contributes to the development of cardiac fibrosis and induction of fibrogenic cytokines in cardiomyocytes in response to pathological stimuli. ROCK1 knockout mice exhibit reduced perivascular and interstitial fibrosis, which is associated with reduced expression of a variety of extracellular matrix (ECM) proteins and fibrogenic cytokines (2).

References:

1. Zhao, Y.M. *et al.* (2004) Dev. Biol. **275**:183.
2. Zhang, C. *et al.* (2006) FASEB J. **20**:916.