Recombinant Rat Hmox1, His-tagged

Cat. No. Hmox1-31R **Lot. No.** (See product label)

SPECIFICATION

Product Overview	Recombinant Rat Hmox1, fused with His tag, was expressed in E. coli.
Species	Rat
Source	E.coli
Description	Heme-oxygenase is a ubiquitous enzyme that catalyzes the initial and rate-limiting steps in heme catabolism yielding equimolar amounts of biliverdin, iron and carbon monoxide. Biliverdin is subsequently converted to bilirubin and the free iron is sequestered to ferritin. These products have important physiological effects as carbon monoxide is a potent vasodilator; biliverdin and bilirubin are potent antioxidants; and the free iron increases oxidative stress and regulates the expression of many mRNAs.There are three isoforms of heme-oxygenase, HO-1, HO-2 and HO-3; however HO-1 and HO-2 are the major isoforms as they both have been identified in mammals.
Form	50mM Tris/HCl pH7.5, 5mM Bme, 0.15NaCl, 10% glycerol
Molecular Mass	~32kDa
Purity	>90% pure by SDS - PAGE analysis.
Storage	-20°C; 1 year+ Avoid freeze/ thaw cycle.

GENE INFORMATION

Tel: 1-631-559-9269 1-516-512-3133
Email: info@creative-biomart.com Fax: 1-631-938-8127
45-1 Ramsey Road, Shirley, NY 11967, USA

Gene Name	Hmox1 heme oxygenase (decycling) 1 [Rattus norvegicus]
Official Symbol	Hmox1
Synonyms	HMOX1; heme oxygenase (decycling) 1; heme oxygenase 1; heme oxygenase (decyclizing) 1; Ho1; Heox; Hmox; Ho-1; HEOXG; hsp32;
Gene ID	24451
mRNA Refseq	NM_012580
Protein Refseq	NP_036712
Pathway	Heme degradation, organism-specific biosystem; Iron uptake and transport, organism-specific biosystem; Keap1-Nrf2, organism-specific biosystem; Metabolism, organism-specific biosystem; Metabolism of porphyrins, organism-specific biosystem; Mineral absorption, organism-specific biosystem; Mineral absorption, conserved biosystem;
Function	enzyme binding; heme binding; heme binding; heme oxygenase (decyclizing) activity; heme oxygenase (decyclizing) activity; heme oxygenase (decyclizing) activity; heme oxygenase (decyclizing) activity; metal ion binding; oxidoreductase activity; phospholipase D activity; protein binding; protein homodimerization activity; protein homodimerization activity; signal transducer activity; signal transducer activity;

Tel: 1-631-559-9269 1-516-512-3133
Email: info@creative-biomart.com Fax: 1-631-938-8127
45-1 Ramsey Road, Shirley, NY 11967, USA