Data Sheet (Cat.No.TMAY-02513)

Anti-BLVRB Antibody (9A653)

Product Details

Ig Type:	Mouse IgG2a
Reactivity:	Human
Conjugation:	Unconjugated
Clone:	9A653
Purification:	Protein A

Applications

Verified Activity:	Anti-BLVRB mouse monoclonal antibody at 1:500 dilution. -Lane A: K562 Whole Cell lysate. -Lysates/proteins at 30 µg per lane. -Secondary -Goat Anti-Mouse IgG H&L (Dylight800) at 1/15000 dilution. -Developed using the Odyssey technique. -Performed under reducing conditions. -Predicted band size:22 kDa. -Observed band size:22 kDa
Application:	WB
Recommended	WB: 1:500-1:2000

Properties

Stability & Storage:	Store at 2°C-8°C for 1 month. Store at -20°C or -80°C for 12 months. Avoid repeated freeze-thaw cycles. Preservative-Free.
Shipping:	Shipping with blue ice.

Antigen Details

Immunogen:	Recombinant Protein: Human BLVRB / biliverdin reductase B protein (TMPY-02519)
Antigen Species:	Human
Synonyms:	HEL-S-10;SDR43U1;FLR;BVRB;biliverdin reductase B

Research Background

Biliverdin reductase (hBVR) is a serine/threonine kinase that catalyzes reduction of the heme oxygenase (HO) activity product, biliverdin, to bilirubin. BVR consists of an N-terminal dinucleotide-binding domain (Rossmann-fold) and a C-terminal domain that contains a six-stranded β-sheet that is flanked on one face by several α-helices. The C-terminal and N-terminal domains interact extensively, forming the active site cleft at their interface. Biliverdin reductase (BVR) catalyzes the last step in heme degradation by reducing the γ-methene bridge of the open tetrapyrrole, biliverdin IXα, to bilirubin with the concomitant oxidation of a β-nicotinamide adenine dinucleotide (NADH) or β-nicotinamide adenine dinucleotide phosphate (NADPH) cofactor. It is now recognized that human BVR (hBVR) is a dual-specificity kinase (Ser / Thr and Tyr) upstream activator of the insulin/insulin growth factor-1 (IGF-1) and mitogen-activated protein kinase (MAPK) signaling pathways. Human BVR (hBVR) is essential for MAPK-extracellular signal-regulated kinase (ERK)1/2 (MEK)-eukaryotic-like protein kinase (Elk) signaling and has been

identified as the cytoplasm-nuclear heme transporter of ERK1/2 and hematin, the key components of stress-responsive gene expression.

Tel:781-999-4286 E_mail:info@targetmol.com Address:34 Washington Street,Wellesley Hills,MA 02481