Notch Activated Targets Antibody Sampler Kit

Cat# AK0207

Upon receipt, store at -20°C. Avoid freeze/thaw cycles.

PRODUCT DESCRIPTION

Notch proteins (Notch1-4) are a family of transmembrane receptors that play important roles in development and the determination of cell fate. Mature Notch receptors are processed and assembled as heterodimeric proteins, with each dimer comprised of a large extracellular ligand-binding domain, a single-pass transmembrane domain, and a smaller cytoplasmic subunit (Notch intracellular domain, NICD). Binding of Notch receptors to ligands of the Delta-Serrate-Lag2 (DSL) family triggers heterodimer dissociation, exposing the receptors to proteolytic cleavages; these result in release of the NICD, which translocates to the nucleus and activates transcription of downstream target genes. RBPSUH (Recombining Binding Protein, SUppressor of Hairless), is the DNA-binding component of the transcription complex regulated by canonical Notch signaling. Binding of Notch with RBPSUH activates a transcription activation complex that includes Mastermind-like (MAML) proteins, leading to transcriptional activation of Notch target genes. The NICD binds and activates c-Myc which functions as a transcriptional regulator with roles in various aspects of cell behavior including proliferation, differentiation and apoptosis. The tumor suppressor protein p21 Waf1/Cip1 acts as an inhibitor of cell cycle progression. The NICD-RBPSUH complex binds and activates p21 for transcription. HES1 (Hairy and Enhancer of Split 1) is one of seven members of the HES family of basic helix-loop-helix (bHLH) transcription factors that is particularly well known as a repressive mediator of the canonical Notch signaling pathway. HES1 plays a key role in mediating Notch-dependent T cell lineage commitment, and has been reported to be an essential mediator of Notch-induced T cell acute lymphoblastic leukemia (T-ALL). The active complex of cyclin D/CDK4 targets the retinoblastoma protein for phosphorylation, allowing the release of E2F transcription factors that activate G1/S-phase gene expression. Transcription of cyclin D is in part regulated by the NICD binding

PRODUCT INCLUDES

Cat No.	Product name	Quantity	Applications	Reactivity	Host
A340395	Cleaved-NOTCH1 (V1754) Polyclonal Antibody	20µL	WB, IHC, ELISA	Human, Mouse, Rat	Rabbit
A340126	NOTCH1 Polyclonal Antibody	20µL	WB, IHC, ELISA	Human, Rat	Rabbit
A340485	c-Myc Polyclonal Antibody	20µL	WB, IHC, ELISA	Human, Mouse, Rat	Rabbit
A340745	p21 Polyclonal Antibody	20µL	WB, ELISA	Human	Rabbit

A1013s	Goat Anti-Rabbit IgG (H+L) (peroxidase/HRP conjugated)	120µL	WB, ELISA	Rabbit	Goat

PRODUCT USE LIMITATION

These products are intended for research use only.