



# IHCeasy ING4 Ready-To-Use IHC Kit

Catalog Number: KHC2005

General Information

Sample type: FFPE tissue Cited sample type: Reactivity: Human, Mouse, Rat Cited Reactivity: Assay type: Immunohistochemistry Primary antibody type: Rabbit Polyclonal

Secondary antibody type: Polymer-HRP-Goat anti-Rabbit

#### Kit Component

Component	Size	Concentration
Antigen Retrieval Buffer	100 mL	50×
Washing Buffer	100 mL ×2	20×
Blocking Buffer	5 mL	RTU
Primary Antibody	5 mL	RTU
Secondary Antibody	5 mL	RTU
Chromogen Component A	0.2 mL	RTU
Chromogen Component B	4 mL	RTU
Signal Enhancer	5 mL	RTU
Counter Staining Reagent	5 mL	RTU
Mounting Media	5 mL	RTU
Control Slide	1 slide (Optional)	FFPE
Datasheet	1 Copy	
Manual	1 Copy	

## Storage Instructions

All the reagents are stored at 2-8°C. The kit is stable for 6 months from the date of receipt.

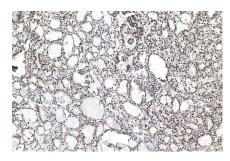
## Background

ING4, also named as p29ING4, belongs to the ING family. It is a component of the HBO1 complex which has a histone H4-specific acetyltransferase activity, a reduced activity toward histone H3 and is responsible for the bulk of histone H4 acetylation in vivo. It may inhibit tumor progression by modulating the transcriptional output of signaling pathways which regulate cell proliferation. ING4 can suppress brain tumor angiogenesis through transcriptional repression of RELA/NFKB3 target genes when complexed with RELA. It may also specifically suppress loss of contact inhibition elicited by activated oncogenes such as MYC. Represses hypoxia inducible factor's (HIF) activity by interacting with HIF prolyl hydroxylase 2 (EGLN1). ING4 is a tumor suppressor gene that interacts with NFkB and represses its transcriptional activity. Several lines of evidence suggest that the tumor suppressor gene ING4, NFkB and its target genes matrix metalloproteases MMP-2, MMP-9 and u-PA are critically involved in tumor invasion.

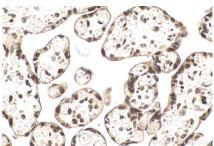
#### **Synonyms**

ING4, Inhibitor of growth protein 4, my036, p29ING4

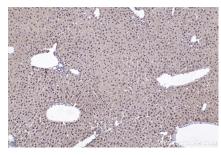
## **Selected Validation Data**



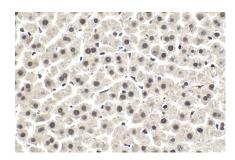
Immunohistochemical analysis of paraffinembedded human thyroid cancer tissue slide using KHC2005 (ING4 IHC Kit).



Immunohistochemical analysis of paraffinembedded human placenta tissue slide using KHC2005 (ING4 IHC Kit).



Immunohistochemical analysis of paraffinembedded mouse liver tissue slide using KHC2005 (ING4 IHC Kit).



Immunohistochemical analysis of paraffinembedded rat liver tissue slide using KHC2005 (ING4 IHC Kit).