

#### **EIF1AY Antibody (N-term)**

Affinity Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP13157a

# **Specification**

#### EIF1AY Antibody (N-term) - Product Information

Application IHC-P, WB,E Primary Accession 014602

Other Accession <u>Q6VV72</u>, <u>P47814</u>, <u>Q60872</u>, <u>Q8BMI3</u>, <u>P47813</u>,

NP\_004672.2

Reactivity Human

Predicted Mouse, Rabbit, Rat

Host Rabbit
Clonality Polyclonal
Isotype Rabbit IgG
Calculated MW 16442
Antigen Region 1-30

# EIF1AY Antibody (N-term) - Additional Information

#### **Gene ID 9086**

#### **Other Names**

Eukaryotic translation initiation factor 1A, Y-chromosomal, eIF-1A Y isoform, Eukaryotic translation initiation factor 4C, eIF-4C, EIF1AY

# Target/Specificity

This EIF1AY antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 1-30 amino acids from the N-terminal region of human EIF1AY.

# **Dilution**

IHC-P~~1:10~50 WB~~1:1000

E~~Use at an assay dependent concentration.

#### **Format**

Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.

# **Storage**

Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

#### **Precautions**

EIF1AY Antibody (N-term) is for research use only and not for use in diagnostic or therapeutic procedures.

# EIF1AY Antibody (N-term) - Protein Information



# Name EIF1AY

**Function** Component of the 43S pre-initiation complex (43S PIC), which binds to the mRNA cap-proximal region, scans mRNA 5'-untranslated region, and locates the initiation codon. This protein enhances formation of the cap-proximal complex. Together with EIF1, facilitates scanning, start codon recognition, promotion of the assembly of 48S complex at the initiation codon (43S PIC becomes 48S PIC after the start codon is reached), and dissociation of aberrant complexes. After start codon location, together with EIF5B orients the initiator methionine-tRNA in a conformation that allows 60S ribosomal subunit joining to form the 80S initiation complex. Is released after 80S initiation complex formation, just after GTP hydrolysis by EIF5B, and before release of EIF5B. Its globular part is located in the A site of the 40S ribosomal subunit. Its interaction with EIF5 during scanning contribute to the maintenance of EIF1 within the open 43S PIC. In contrast to yeast orthologs, does not bind EIF1.

Cellular Location Cytoplasm.

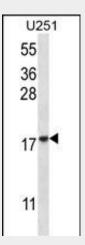
Tissue Location Ubiquitous.

#### **EIF1AY Antibody (N-term) - Protocols**

Provided below are standard protocols that you may find useful for product applications.

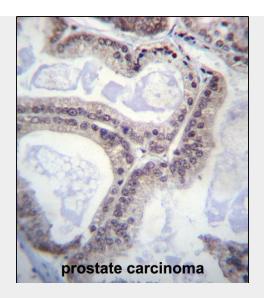
- Western Blot
- Blocking Peptides
- Dot Blot
- <u>Immunohistochemistry</u>
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

# EIF1AY Antibody (N-term) - Images



EIF1AY Antibody (N-term) (Cat. #AP13157a) western blot analysis in U251 cell line lysates (35ug/lane). This demonstrates the EIF1AY antibody detected the EIF1AY protein (arrow).





EIF1AY Antibody (N-term) (Cat. #AP13157a)immunohistochemistry analysis in formalin fixed and paraffin embedded human prostate carcinoma followed by peroxidase conjugation of the secondary antibody and DAB staining. This data demonstrates the use of EIF1AY Antibody (N-term) for immunohistochemistry. Clinical relevance has not been evaluated.

# EIF1AY Antibody (N-term) - Background

This gene encodes a protein similar to eukaryotic translation initiation factor 1A (EIF1A). EIF1A is required for the binding of the 43S complex (a 40S subunit, eIF2/GTP/Met-tRNAi and eIF3) to the 5' end of capped RNA.

# **EIF1AY Antibody (N-term) - References**

Serajee, F.J., et al. J. Child Neurol. 24(10):1258-1261(2009) Lim, J., et al. Cell 125(4):801-814(2006) Fortna, A., et al. PLoS Biol. 2 (7), E207 (2004) : Agate, R.J., et al. Mol. Biol. Evol. 21(2):384-396(2004) Skaletsky, H., et al. Nature 423(6942):825-837(2003)