

KSHV K8a Antibody

Purified Mouse Monoclonal Antibody Catalog # AO1015a

Specification

KSHV K8a Antibody - Product Information

Application Primary Accession Host Clonality Isotype **Description**

WB, IHC <u>Q2HR82</u> Mouse Monoclonal IgG2a

Kaposi's sarcoma-associated herpesvirus (KSHV) belongs to the gamma-(2)-herpesvirus subfamily and has been closely linked to the Kaposi's sarcoma, primary effusion lymphoma (PEL) and multicentric Castleman's disease. The genome of KSHV is 165-170 kb and contains at least 88 open reading frames. KSHV K8 and K8.1 open reading frames are juxtaposed and span from nucleotide (nt) 74850 to 76695 of the virus genome. A K8 pre-mRNA overlaps the entire K8.1 coding region, and alternative splicing of KSHV K8 and K8.1 pre-mRNAs each produces three isoforms (α , β , and γ) of the mRNAs.

Immunogen Purified recombinant fragment of KSHV K8α expressed in E. Coli.

Formulation Ascitic fluid containing 0.03% sodium azide.

KSHV K8a Antibody - Additional Information

Gene ID 4961462

Other Names E3 SUMO-protein ligase K-bZIP, 6.3.2.-, K8

Dilution WB~~1/500 - 1/2000 IHC~~1/200 - 1/1000

Storage Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions KSHV K8a Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

KSHV K8a Antibody - Protein Information



Name K8

Function

SUMO E3 ligase that plays a role in viral gene regulation and is essential for viral reactivation (PubMed:17652396, PubMed:20034935). Disrupts host G1 cell cycle control thus allowing viral transcription and translation to proceed at the early stages of infection. Catalyzes its own SUMO modification as well as that of its interacting partners such as host TP53 and RB1. Regulates viral gene expression and reactivation and may mediate the SUMOylation of viral promoters in the low methylated 'Lys-9' histone H3 (H3K9me) region which results in a diminution of viral gene expression after reactivation (PubMed:26197391). SUMOylates also host histone lysine demethylase 4A/KDM4A, an essential step for complete enrichment of SUMO-2/3 on the viral genome during viral transactivation and reactivation (PubMed:28212444).

KSHV K8a Antibody - Protocols

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

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

KSHV K8a Antibody - Images

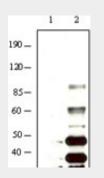


Figure 1: Western blot analysis using KSHV K8 α mouse mAb against BCBL-1 (1) and TPA induced BCBL-1 (2) cell lysate.

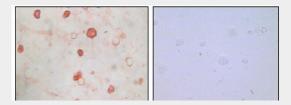


Figure 2: Immunocytochemistry analysis of TPA induced BCBL-1 cells (A) and uninduced BCBL-1 cells (B) using KSHV K8 α mouse mAb with AEC staining.



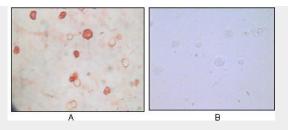


Figure 2: Immunocytochemistry analysis of TPA induced BCBL-1 cells(A) and uninduced BCBL-1 cells(B) using anti-KSHV K8α monoclonal antibody with AEC staining.

KSHV K8a Antibody - References

1. James J et al. Proc. Natl. Acad. Sci Vol. 1996. 93, pp. 14862-14867.