SANTA CRUZ BIOTECHNOLOGY, INC.

Ki67 (MB67): sc-56319



BACKGROUND

Ki67 is a nuclear protein that is expressed in proliferating cells and may be required for maintaining cell proliferation. Ki67 has been used as a marker for cell proliferation of solid tumors and some hematological malignancies. A correlation has been demonstrated between Ki67 index and the histopathological grade of neoplasms. Assessment of Ki67 expression in renal and ureter tumors shows a correlation between tumor proliferation and disease progression, thus making it possible to differentiate high-risk patients. Ki67 expression may also prove to be important for distinguishing between malignant and benign peripheral nerve sheath tumors.

REFERENCES

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- Gore, S.D., et al. 1993. Validation of flow-cytometric determination of Ki-67 expression as a measure of growth factor response in acute myelogenous leukemia. Exp. Hematol. 21: 1702-1708.
- Limas, C., et al. 1993. Proliferation activity of urothelial neoplasms: comparison of BrdU incorporation, Ki-67 expression and nucleolar organiser regions. J. Clin. Pathol. 46: 159-165.
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- Li, S.H., et al. 2007. Skp2 is an independent prognosticator of gallbladder carcinoma among p27^{Kip1}-interacting cell cycle regulators: an immunohistochemical study of 62 cases by tissue microarray. Mod. Pathol. 20: 497-507.
- Lee, J.M., et al. 2007. Significance of cyclooxygenase-2 in prognosis, targeted therapy and chemoprevention of NSCLC. Future Oncol. 3: 149-153.
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CHROMOSOMAL LOCATION

Genetic locus: MKI67 (human) mapping to 10q26.2.

STORAGE

For immediate and continuous use, store at 4° C for up to one month. For sporadic use, freeze in working aliquots in order to avoid repeated freeze/ thaw cycles. If turbidity is evident upon prolonged storage, clarify solution by centrifugation.

SOURCE

Ki67 (MB67) is a mouse monoclonal antibody raised against recombinant Ki67 of human origin.

PRODUCT

Each vial contains 250 μl culture supernatant containing lgG_1 with < 0.1% sodium azide.

APPLICATIONS

Ki67 (MB67) is recommended for detection of Ki67 of human origin by immunofluorescence (starting dilution to be determined by researcher, dilution range 1:50-1:500) and immunohistochemistry (including paraffinembedded sections) (starting dilution to be determined by researcher, dilution range 1:50-1:500).

Suitable for use as control antibody for Ki67 siRNA (h): sc-37613, Ki67 shRNA Plasmid (h): sc-37613-SH and Ki67 shRNA (h) Lentiviral Particles: sc-37613-V.

Molecular Weight of Ki67 isoforms: 395/345 kDa.

SELECT PRODUCT CITATIONS

- Esposito, F., et al. 2009. Aurora B expression in post-puberal testicular germ cell tumours. J. Cell. Physiol. 221: 435-439.
- Wu, H., et al. 2018. Downregulation of RNF138 inhibits cellular proliferation, migration, invasion and EMT in glioma cells via suppression of the ERK signaling pathway. Oncol. Rep. 40: 3285-3296.
- Yu, X.H., et al. 2018. Downregulation of RIP140 in triple-negative breast cancer inhibits the growth and proliferation of cancer cells. Oncol. Lett. 15: 8784-8788.
- Qin, Q., et al. 2018. Elevated expression of POLD1 is associated with poor prognosis in breast cancer. Oncol. Lett. 16: 5591-5598.
- Yu, L.M., et al. 2018. MicroRNA-224 inhibition prevents progression of cervical carcinoma by targeting PTX3. J. Cell. Biochem. 119: 10278-10290.

RESEARCH USE

For research use only, not for use in diagnostic procedures.

PROTOCOLS

See our web site at www.scbt.com for detailed protocols and support products.

CONJUGATES

See **Ki67 (Ki-67): sc-23900** for Ki67 antibody conjugates, including AC, HRP, FITC, PE, and Alexa Fluor[®] 488, 546, 594, 647, 680 and 790.