

Active SIRT6 (GST-tagged), human recombinant

CATALOG #: 7697-20 20 µg
 7697-100 100 µg
 7697-1000 1 mg

ALTERNATIVE NAMES: SIRT6, NAD-dependent Deacetylase Sirtuin-6; Mono-ADP-ribosyltransferase Sirtuin 6; SIR2-like Protein 6; SIR2L6

SOURCE: *E. coli*

FORM: Liquid.

FORMULATION: 1 mg/ml in 50 mM Tris, 100 mM NaCl, pH 8.0 containing 20% glycerol.

PURITY: ≥85% by SDS-PAGE

MOL. WT.: 65.3 kDa (1-355 aa + N-terminal GST tag). It runs as ~62 kDa on a SDS-PAGE.

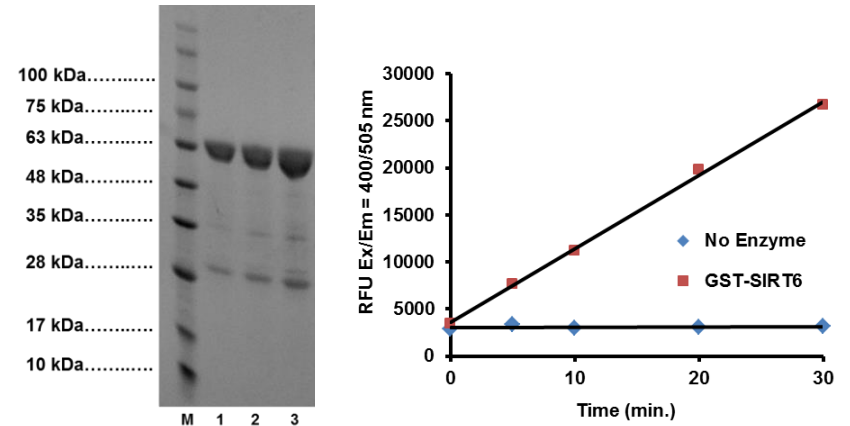
STORAGE CONDITIONS: Stable for at least 6 months as supplied. It may be further diluted to 0.1 mg/ml with 50 mM Tris, 100 mM NaCl, pH 8.0 containing 20% glycerol, and stored at -80°C in aliquots. Avoid repeated freezing and thawing cycles.

BACKGROUND: Human Sirtuins function as intracellular regulatory proteins with mono-ADP-ribosyltransferase activity. Sirtuin 6 (SIRT6) is a NAD-dependent protein deacetylase with activity towards Lys-9 and Lys-56 of histone H3. It modulates acetylation of histone H3 in telomeric chromatin during the S-phase of the cell cycle. It is required for genomic stability and for normal IGF1 serum levels and normal glucose homeostasis. It also regulates cellular senescence and apoptosis. Unlike most sirtuins, SIRT6 preferentially removes long-chain fatty-acyl, rather than acetyl, protein modifications. This activity regulates secretion of the inflammation-associated protein TNF-α.

SPECIFIC ACTIVITY: BioVision's Active GST-tagged SIRT6 has been tested for its activity using Sirtuin Activity Assay Kit (K324-100). It has a specific activity of >3 mU/mg (One unit of Sirtuin activity is the amount of enzyme that hydrolyzes the substrate to yield 1 µmol of AFC/min at 37°C).

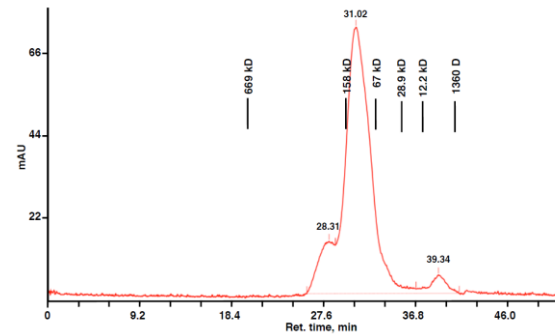
APPLICATIONS: Recombinant human SIRT6 can be used in inhibitor screening assays, activity studies, selectivity profiling, western blotting, ELISA, and numerous such applications.

For Research Use Only! Not to be used in humans.



SDS-PAGE (4-20%) of h-GST SIRT6:
 1: Protein Marker
 2: Human GST-SIRT6 (5 µg)
 3: Human GST-SIRT6 (10 µg)
 4: Human GST-SIRT6 (20 µg)

Measurement of h-GST-SIRT6 activity by Sirtuin Activity Assay Kit (K324-100).



SEC analysis of h-GST-SIRT6 using a Superose 6 column at 0.5 ml/min in 50 mM Tris and 0.25 M NaCl pH 7.5.

RELATED PRODUCTS:

- Active SIRT6 (His-tagged), human recombinant (Cat. No. 7699-20, -100, -1000)
- SIRT1 (193-747 aa) (GST-tagged), Human recombinant (Cat. No. 7264-25, -50)
- SIRT4 (GST-tagged), Human recombinant (Cat. No. 7673-20, -50)
- SIRT5 (GST-tagged), Human recombinant (Cat. No. 7674-20, -50)
- SIRT7 (2-400 aa) (His-tagged), Human recombinant (Cat. No. 7675-20, -50)
- AHCY, human recombinant (Cat. No. 4889-20, -1000)
- SIRT1 Antibody (Cat. No. 6137-100)
- SIRT4 antibody (Cat. No. 3224-100)
- SIRT5 antibody (Cat. No. 3225-100)
- SIRT7 antibody (Cat. No. 3099-100)
- SIRT6 Inhibitor Screening Kit (Fluorometric) (Cat. No. K323-100)