

# Active Transglutaminase 2 (His-tagged), human recombinant

**CATALOG #:** 7700-10 10 mU  
7700-100 100 mU

**ALTERNATIVE NAMES:** TG2, tTG, tissue transglutaminase, transglutaminase C, TGC, protein-glutamine-gamma-glutamyltransferase, TGM2.

**SOURCE:** *E. coli*

**FORM:** Lyophilized.

**FORMULATION:** Lyophilized from 5 mg/ml solution in a proprietary buffer.

**PURITY:** ≥90% by SDS-PAGE

**MOL. WT.:** 79.5 kDa (1-687 aa + N-terminal polyhistidine tag).

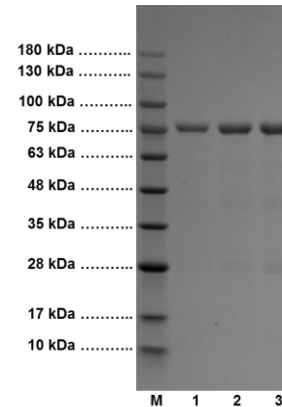
**STORAGE CONDITIONS:** Stable for at least 1 year as supplied. Reconstitute to 0.1-0.5 mU/μl in 20 mM Tris, 120 mM NaCl, 10 mM DTT, pH 7.5 containing 20% glycerol. Aliquot and store at -80°C. Avoid repeated freezing and thawing cycles.

**BACKGROUND:** Tissue transglutaminase, a 78-kDa calcium dependent enzyme (EC 2.3.2.13), is found both in the intracellular and the extracellular spaces of various types of tissues. TG2 crosslinks proteins between the ε-amino group of a lysine residue and the γ-carboxamide group of glutamine residue, creating an inter- or intramolecular bond that is highly resistant to proteolysis (protein degradation). TG2 also possesses deamidation, GTP-binding/hydrolyzing, and isopeptidase activities. Intracellular TG2 is thought to play an important role in apoptosis, while extracellular TG2 has been linked to cell adhesion, ECM stabilization, wound healing, receptor signaling, cellular proliferation, and cellular motility.

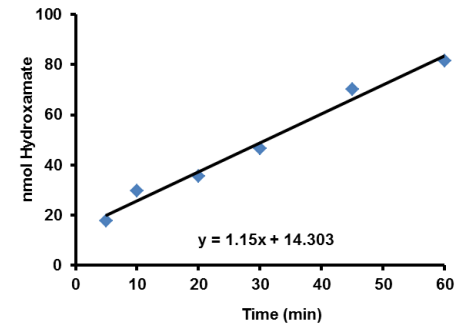
**SPECIFIC ACTIVITY:** BioVision's Active His-tagged TG2 has been tested for its activity. It has a specific activity of >400 mU/mg. 1 U of TG2 activity is the amount of enzyme that will catalyze the formation of 1 μmol of hydroxamate per min as measured using Transglutaminase Activity Assay Kit (Colorimetric) (BioVision Cat # K571-100).

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

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



SDS-PAGE (4-20%) of Human TG2:  
M: Protein Marker  
1: Human TG2 (5 μg)  
2: Human TG2 (10 μg)  
3: Human TG2 (15 μg)



Measurement of Human-TG2 activity by Transglutaminase Activity Assay Kit (Colorimetric) (K571-100)

**RELATED PRODUCTS:**

- Transglutaminase Activity Assay Kit (Colorimetric) (Cat. No. K571-100)
- Active SIRT6 (GST-tagged), human recombinant (Cat. No. 7697-20, -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)
- Gamma Glutamyl Transferase Activity Fluorometric Assay Kit (Cat. No. K785-100)
- Factor IXa Activity Assay Kit (Fluorometric) (Cat. No. K364-100)
- Gamma Glutamyl Transferase Activity Colorimetric Assay Kit (Cat. No. K784-100)
- Factor Xa Inhibitor Screening Kit (Fluorometric) (Cat. No. K362-100)
- Factor Xa Activity Fluorometric Assay Kit (Cat. No. K361-100)