



## Anti- Tumor endothelial marker 8 (TEM8), rabbit Polyclonal Antibody

**Catalog No.** GB-30021    **Quantity:** 250 $\mu$ l    **Applications tested:** ELISA, Western blot  
**Antigen species:** Human    **Reactivity:** Human  
**Host species:** Rabbit    **Form:** Antiserum

### Target description

The protein encoded by this gene is a type I transmembrane protein and is a tumor-specific endothelial marker that has been implicated in colorectal cancer. This protein has also been shown to be a docking protein or receptor for Bacillus anthracis toxin, the causative agent of the disease, anthrax. The binding of the protective antigen (PA) component, of the tripartite anthrax toxin, to this receptor protein mediates delivery of toxin components to the cytosol of cells. Once inside the cell, the other two components of anthrax toxin, edema factor (EF) and lethal factor (LF) disrupt normal cellular processes. Three alternatively spliced variants have been described. Transcript Variant: This variant (1) encodes the largest isoform which has a unique 200 aa carboxy terminus.

### Antigen

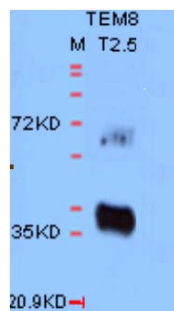
This polyclonal antibody was raised by immunizing rabbit with human TEM8 synthetic peptide, located near its N-terminal domain.

### Application

The antibody specificity was assayed by ELISA with the synthetic TEM8 peptide antigen and by Western blot with the recombinant mouse TEM8 protein. The antibody titer is more than 500K for ELISA. It has not been tested in the other applications. However, for the first testing, we recommend 1/5,000 dilution for ELISA, 1/5000 dilution for Western blot analysis (WB) of recombinant protein, 1/2000 dilution for tissue extracts or cell lysates, 1/100 dilution for immuno-histochemistry (IHC) staining on frozen cryosections, 1/50 dilution for IHC staining on paraffin embedded sections

### Related Products

1. Anti-TEM1 pAb (GB-10374).
2. Anti-TEM2 pAb (GB-30131)
3. Anti-TEM3 pAb (GB-30132).
4. Anti-TEM4 pAb (GB-30133)
5. Anti-TEM5 pAb (GB-10011).
6. Anti-TEM5 pAb (GB-30028).
7. Anti-TEM5 pAb (GB-30088)
8. Anti-TEM8 pAb (GB-10344).
9. Anti-TEM8 pAb (GB-10009).
10. Anti-TEM8 pAb (GB-10010).
11. Anti-TEM8 pAb (GB-30133).



5000X dilution of the first antibody:GB-30021  
X-ray film exposed 5 seconds with the ECL kit.

### Western Blot Protocol

1. Block with 3%BSA/TBST for 1 hour at RT.
2. Wash blot with 0.05% TBST 3 X 15 minutes.
3. Add 5000X dilution of antibody.
4. Incubate for 1 hour at RT.
5. Wash blot with 0.05% TBST 3 X 15 minutes.
6. Add appropriate amount of correct secondary antibody, goat anti-rabbit antibody conjugated with HRP). Incubate for 1 hour at RT.
7. Wash blot 3 X 15 minutes with 0.05% TBST at RT.
8. Add HRP substrate and develop

### Storage

It is supplied as lyophilized serum. Redissolve the lyophilized powder with 250 microliter sterile water will restore the original condition. Store at 4°C for short term application. For long-term storage, aliquot and store at -20°C.

### References

1. Akash Nanda, Eleanor B. Carson-Walter, Steven Seaman, Thomas D. Barber, Jason Stampfl, Sujay Singh, Bert Vogelstein, Kenneth W. Kinzler, and Brad St. Croix. TEM8 Interacts with the Cleaved C5 Domain of Collagen  $\alpha$ 3(VI). Cancer Research 64, 817-820 (2004).
2. Darran J. Wigelsworth, Bryan A. Krantz, Kenneth A. Christensen, D. Borden Lacy, Stephen J. Juris, and R. John Collier. Binding Stoichiometry and Kinetics of the Interaction of a Human Anthrax Toxin Receptor, CMG2, with Protective Antigen. The Journal of Biological Chemistry. 279 (22), 23349-23356 (2004).