

# *Polyclonal Antibody to Human Topo I (Scleroderma Patient Serum)*

**Catalog No. 2012 (500 units)**



## ***Description:***

Scleroderma patients may produce high titer antibody directed against human topoisomerase I (Shero et al., 1986). The immunoglobulin fraction was purified from these patients and shown to react specifically with the 100 kDa form of Topo I using Western blotting. The immune complexes produced with this reagent will bind [<sup>125</sup>I]-protein A. When intact topoisomerase I is used, a single polypeptide of 100 kDa was detected; however, sub-bands produced by proteolysis will also bind this reagent, as expected. The antibody is particularly useful as a Western blotting probe and can be used at high dilutions (>1:5,000). Cross reactivity of this antibody with other species has been demonstrated (with calf thymus). Important note about product use: Human topoisomerase I undergoes spontaneous degradation especially with repeat freezing/thawing and storage. The activity of the enzyme is not affected significantly; however, sub-bands may be detectable in Western blotting experiments.

## ***Unit Definition:***

The antibody concentration is in Western blotting units; one unit corresponds to a 1:1000 dilution of the antibody required to make 1 ml of diluted probe for a routine Western blot. Thus, 10 units of antibody will make 10 ml of diluted probe (to be added directly to a single blot).

## ***Vial Contents:***

The vial contains 500 units of purified human immunoglobulin directed against human topoisomerase I at 10 units/ul (50 ul of PBS).

## ***Shipping/Storage Conditions:***

The antibody is in sodium phosphate buffer and is shipped on wet ice (domestic US shipping) or dry ice (international shipments).

## ***References:***

Shero, J.H. Bordwell, B., Rothfield, N.F. and Earnshaw, W.C. 1986. High titers of autoantibodies to topoisomerase I (Scl-70) in sera from scleroderma patients. *Science* 231:737-740

## ***Product Application and Disclaimer***

This product is not licensed or approved for administration to humans or animals. It may be used with experimental animals only. The product is for in vitro research diagnostic studies only. The product is non-infectious and non-hazardous to human health. This information is based on present knowledge and does not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship. TopoGEN, Inc. shall not be held liable for product failure due to mishandling and incorrect storage by end user. TopoGEN's liability is limited to credit or product replacement.