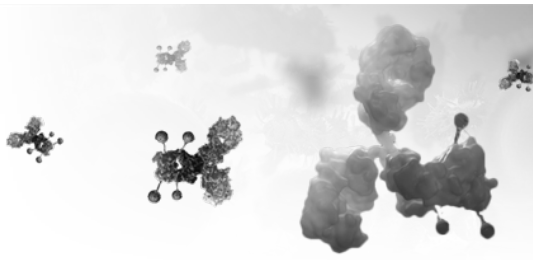

# Mouse anti-Rat SCP3 monoclonal antibody, clone 36/TDQ4 (CABT-B9317)

This product is for research use only and is not intended for diagnostic use.

## PRODUCT INFORMATION

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|---|---|
| **Immunogen** | Rat SCP3 aa. 1-109 |
| **Isotype** | IgG1 |
| **Source/Host** | Mouse |
| **Species Reactivity** | Rat, Human, Mouse, Dog, Chicken |
| **Clone** | 36/TDQ4 |
| **Purification** | The monoclonal antibody was purified from tissue culture supernatant or ascites by affinity chromatography. |
| **Conjugate** | Unconjugated |
| **Applications** | WB |
| **Format** | Liquid |
| **Concentration** | 250 μg/ml |
| **Size** | 50 μg |
| **Buffer** | Aqueous buffered solution containing BSA, glycerol, and ≤0.09% sodium azide. |
| **Storage** | Store undiluted at -20°C. |

## BACKGROUND

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|---|---|
| **Introduction** | Division of haploid germ cells during meiosis involves the pairing and recombination of |

45-1 Ramsey Road, Shirley, NY 11967, USA
Email: info@creative-diagnostics.com
Tel: 1-631-624-4882 Fax: 1-631-938-8221

| | |
|---|---|
| | homologous chromosomes. The synaptonemal complex (SC) is a meiotic protein structure that enhances chromosome pairing and segregation, affects the number and distribution of crossovers, and produces functional chiasmata from crossovers. The SC contains a central element (CE) and two lateral elements (LE) that are connected by transverse filaments (TF). Among the various SC components are two mammalian LE proteins, SCP2 and SCP3 (Synaptonemal Complex Proteins 2 and 3). SCP3 is highly similar to two other mammalian proteins, Xlr and Xmr, that are expressed in B and T lymphocytes and meiotic cells, respectively, and to members of the IF (intermediate filament) protein family. The SCP3 C-terminal region contains multiple coiled-coil domains that mediate protein-protein interactions. Via these domains, SCP3 self-assembles into transversely striated homopolymeric fibers in somatic cells. Such assembly also requires the N-terminal nonhelical domain. This function indicates that SCP3 may serve as an LE molecular scaffold to which other proteins bind and participate in recombination. |
| **Keywords** | SYCP3; synaptonemal complex protein 3; Cor1; Scp3; SCP-3; |

# GENE INFORMATION

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|---|---|
| **Entrez Gene ID** | 20962 |
| **UniProt ID** | A2RSE7 |

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Tel: 1-631-624-4882 Fax: 1-631-938-8221