

Sgo1 rabbit pAb**Cat#: orb766309 (Manual)**

For research use only. Not intended for diagnostic use.

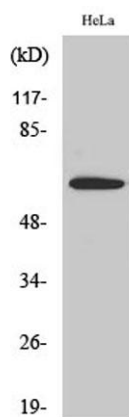
Product Name	Sgo1 rabbit pAb
Host species	Rabbit
Applications	WB;IHC;IF;ELISA
Species Cross-Reactivity	Human;Rat;Mouse;
Recommended dilutions	Western Blot: 1/500 - 1/2000. Immunohistochemistry: 1/100 - 1/300. ELISA: 1/20000. Not yet tested in other applications.
Immunogen	The antiserum was produced against synthesized peptide derived from human SGOL1. AA range:271-320
Specificity	Sgo1 Polyclonal Antibody detects endogenous levels of Sgo1 protein.
Formulation	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide..
Storage	Store at -20°C. Avoid repeated freeze-thaw cycles.
Protein Name	Shugoshin-like 1
Gene Name	SGOL1
Cellular localization	Nucleus . Chromosome, centromere . Chromosome, centromere, kinetochore . Cytoplasm, cytoskeleton, spindle pole . Cytoplasm, cytoskeleton, microtubule organizing center, centrosome . Localizes to the inner centromere throughout prophase until metaphase and disappears at anaphase (PubMed:16541025). Centromeric localization requires the presence of BUB1 and the interaction with PPP2R1A (PubMed:16580887)(PubMed:16541025)(PubMed:15604152). Colocalizes with NEK2 at the kinetochore (PubMed:17621308). Colocalizes with and SS18L1 at the kinetochore (PubMed:16582621). Phosphorylation by AUKRB and the presence of BUB1 are required for localization to the kinetochore (PubMed:17617734). Isoform 1 primarily localizes to

kinetochores during G2 phase and mitotic prophase, metaphase, and anaphase and does

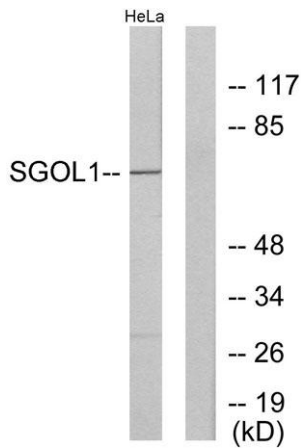
Purification	The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen.
Clonality	Polyclonal
Concentration	1 mg/ml
Observed band	64kD
Human Gene ID	151648
Human Swiss-Prot Number	Q5FBB7
Alternative Names	SGOL1; SGO1; Shugoshin-like 1; hSgo1; Serologically defined breast cancer antigen NY-BR-85

Background

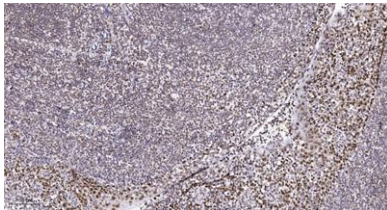
The protein encoded by this gene is a member of the shugoshin family of proteins. This protein is thought to protect centromeric cohesin from cleavage during mitotic prophase by preventing phosphorylation of a cohesin subunit. Reduced expression of this gene leads to the premature loss of centromeric cohesion, mis-segregation of sister chromatids, and mitotic arrest. Evidence suggests that this protein also protects a small subset of cohesin found along the length of the chromosome arms during mitotic prophase. An isoform lacking exon 6 has been shown to play a role in the cohesion of centrioles (PMID: 16582621 and PMID:18331714). Mutations in this gene have been associated with Chronic Atrial and Intestinal Dysrhythmia (CAID) syndrome, characterized by the co-occurrence of Sick Sinus Syndrome (SSS) and Chronic Intestinal Pseudo-obstruction (CIPO) within the first four decades of life (PMID:25282101). Fibro



Western Blot analysis of various cells using Sgo1 Polyclonal Antibody cells nucleus extracted by Minute TM Cytoplasmic and Nuclear Fractionation kit (SC-003, Invent biotech, MN, USA).



Western blot analysis of lysates from HeLa cells, using SGOL1 Antibody. The lane on the right is blocked with the synthesized peptide.



Immunohistochemical analysis of paraffin-embedded human tonsil. 1, Antibody was diluted at 1:200(4° overnight). 2, Tris-EDTA,pH9.0 was used for antigen retrieval. 3,Secondary antibody was diluted at 1:200(room temperature, 45min).