

## DESCRIPTION

<b>Species Reactivity</b>	Human
<b>Specificity</b>	Detects human WT1 in direct ELISAs.
<b>Source</b>	Monoclonal Mouse IgG <sub>1</sub> Clone # 960525
<b>Purification</b>	Protein A or G purified from hybridoma culture supernatant
<b>Immunogen</b>	<i>E. coli</i> -derived recombinant human WT1 Val195-Thr317 Accession # P19544
<b>Conjugate</b>	Alexa Fluor 350 Excitation Wavelength: 346 nm Emission Wavelength: 442 nm
<b>Formulation</b>	Supplied 0.2 mg/mL in a saline solution containing BSA and Sodium Azide.  *Contains <0.1% Sodium Azide, which is not hazardous at this concentration according to GHS classifications. Refer to the Safety Data Sheet (SDS) for additional information and handling instructions.

## APPLICATIONS

**Please Note:** Optimal dilutions should be determined by each laboratory for each application. *General Protocols* are available in the *Technical Information* section on our website.

	Recommended Concentration	Sample
<b>Intracellular Staining by Flow Cytometry</b>	0.25-1 µg/10 <sup>6</sup> cells	K562 Human Chronic Myelogenous Leukemia Cell Line fixed and permeabilized with FlowX FoxP3 Fixation & Permeabilization Buffer Kit (Catalog # FC012)

## PREPARATION AND STORAGE

<b>Shipping</b>	The product is shipped with polar packs. Upon receipt, store it immediately at the temperature recommended below.
<b>Stability &amp; Storage</b>	<b>Protect from light. Do not freeze.</b> <ul style="list-style-type: none"> <li>12 months from date of receipt, 2 to 8 °C as supplied.</li> </ul>

## BACKGROUND

WT1 (Wilms' tumor protein 1; also WT33) is a 52-54 kDa, nuclear member of the EGR C2H2-type zinc-finger family of proteins. Although its predicted MW is 49 kDa, it runs anomalously in SDS-PAGE, likely due to a high proline content. It is widely expressed, being found in developing Sertoli cells, glomerular podocytes, neurons, and CD34<sup>+</sup> stem cells. Human WT1 is 449 amino acids (aa) in length. It contains a Pro-rich domain (aa 27-83) and four consecutive C2H2 zinc finger regions (aa 323-347; 353-377; 383-405; 414-438). WT1 forms homodimers, and interacts with multiple molecules. Interaction with the zinc fingers generally promotes gene transcription, while N-terminal interactions block gene transcription. There are at least two dozen splice variants. Some are combinations of deletions of aa 250-266 and 408-410, plus an alternate start site 68 aa upstream of the standard site, and a three aa substitution for aa 1-147. Over aa 127-249, human WT1 shares 98% aa identity with mouse WT1.

## PRODUCT SPECIFIC NOTICES

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