

## PE/Cyanine7 anti-human TCR C $\beta$ 1 Antibody

<b>Catalog# / Size</b>	383515 / 25 tests 383516 / 100 tests
<b>Clone</b>	JOVI.1
<b>Regulatory Status</b>	RUO
<b>Other Names</b>	T cell receptor beta constant 1, TRBC1
<b>Isotype</b>	Mouse IgG2a, $\kappa$
<b>Description</b>	The T cell receptor beta chain constant region-1 (TCR C $\beta$ 1), also known as TRBC1, is a segment of the TCR beta chain that forms the constant region of the T cell receptor. The rearrangement of TCR genes during T cell development leads to the selection of one of two TCR beta constant regions – C1 or C2. Detection of TRBC1 within a comprehensive T cell panel can be used as evidence of clonality akin to the use of kappa/lambda light chain detection in the diagnosis of plasma cell malignancies.

### Product Details

---

<b>Verified Reactivity</b>	Human
<b>Antibody Type</b>	Monoclonal
<b>Host Species</b>	Mouse
<b>Immunogen</b>	Transgenic mouse lymphocytes expressing human V $\beta$ 3-C $\beta$ 1 TCR
<b>Formulation</b>	Phosphate-buffered solution, pH 7.2, containing 0.09% sodium azide and BSA (origin USA)
<b>Preparation</b>	The antibody was purified by affinity chromatography and conjugated with PE/Cyanine7 under optimal conditions.
<b>Concentration</b>	Lot-specific (to obtain lot-specific concentration and expiration, please enter the lot number in our <a href="#">Certificate of Analysis</a> online tool.)
<b>Storage &amp; Handling</b>	The antibody solution should be stored undiluted between 2°C and 8°C, and protected from prolonged exposure to light. <b>Do not freeze.</b>
<b>Application</b>	<a href="#">FC - Quality tested</a>
<b>Recommended Usage</b>	Each lot of this antibody is quality control tested by <a href="#">immunofluorescent staining with flow cytometric analysis</a> . For flow cytometric staining, the suggested use of this reagent is 5 $\mu$ L per million cells in 100 $\mu$ L staining volume or 5 $\mu$ L per 100 $\mu$ L of whole blood. It is recommended that the reagent be titrated for optimal performance for each application.
<b>Excitation Laser</b>	Blue Laser (488 nm) Green Laser (532 nm)/Yellow-Green Laser (561 nm)
<b>Application Notes</b>	Clone JOVI.1 can interfere with the binding of clone IP26 on target cells.
<b>Application References</b>	1. Viney, J L <i>et al.</i> 1992. <i>Hybridoma</i> . 11:701-13. 2. Horna, Pedro <i>et al.</i> 2021. <i>Int J Mol Sci</i> . 22:1817.
<b>(PubMed link indicates BioLegend citation)</b>	
<b>RRID</b>	AB_3699030 (BioLegend Cat. No. 383515) AB_3699030 (BioLegend Cat. No. 383516)

### Antigen Details

---

<b>Structure</b>	Predicted 20 kD Ig-like protein
<b>Distribution</b>	T lymphocytes
<b>Cell Type</b>	Leukemia, Lymphocytes, T cells, Thymocytes
<b>Biology Area</b>	Cancer Biomarkers, Cell Biology, Immunology
<b>Molecular Family</b>	TCRs

**Antigen References**

1. Minden, M D and T W Mak. 1986. *Blood*. 68:327-36.
2. Davis, M M *et al.* 1997. *Ciba Found Symp.* 204:94-100.
3. Maciocia, Paul M *et al.* 2017. *Nat Med.* 23:1416-23.

**Gene ID** [28639](#)

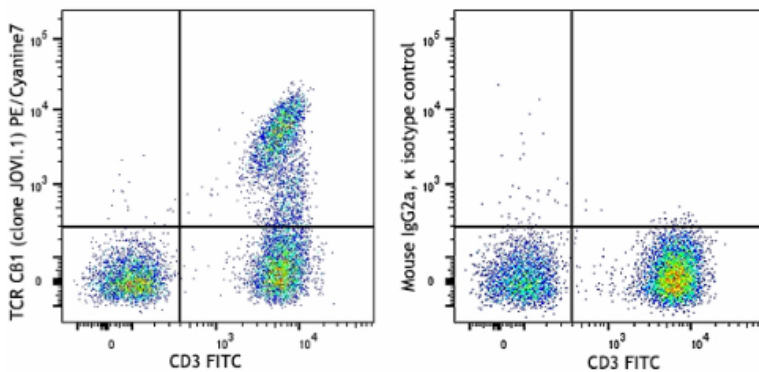
**Related Protocols**

- [Cell Surface Flow Cytometry Staining Protocol](#)

**Other Formats**

Purified anti-human TCR Cβ1, APC anti-human TCR Cβ1, PE anti-human TCR Cβ1, PerCP/Cyanine5.5 anti-human TCR Cβ1, FITC anti-human TCR Cβ1, Biotin anti-human TCR Cβ1, Spark Blue™ 550 anti-human TCR Cβ1 (Flexi-Fluor™), Spark Blue™ 574 anti-human TCR Cβ1 (Flexi-Fluor™), Spark Violet™ 538 anti-human TCR Cβ1 Antibody, PE/Cyanine7 anti-human TCR Cβ1 Antibody, Pacific Blue™ anti-human TCR Cβ1 Antibody, APC/Fire™ 750 anti-human TCR Cβ1 Antibody, Spark Red™ 718 anti-human TCR Cβ1 Antibody, PE/Dazzle™ 594 anti-human TCR Cβ1 Antibody

**Product Data**



Human peripheral blood lymphocytes were stained with anti-human CD3 (clone UCHT1) FITC and anti-human TCR Cβ1 (clone JOVI.1) PE/Cyanine7 (left) or mouse IgG2a, κ PE/Cyanine7 isotype control (right).

For Research Use Only. Not for diagnostic or therapeutic use.

This product is supplied subject to the terms and conditions, including the limited license, located at [www.biolegend.com/terms](http://www.biolegend.com/terms) ("Terms") and may be used only as provided in the Terms. Without limiting the foregoing, BioLegend products may not be used for any Commercial Purpose as defined in the Terms, resold in any form, used in manufacturing, or reverse engineered, sequenced, or otherwise studied or used to learn its design or composition without express written approval of BioLegend. Regardless of the information given in this document, user is solely responsible for determining any license requirements necessary for user's intended use and assumes all risk and liability arising from use of the product. BioLegend is not responsible for patent infringement or any other risks or liabilities whatsoever resulting from the use of its products.

BioLegend, the BioLegend logo, and all other trademarks are property of BioLegend, Inc. or their respective owners, and all rights are reserved.

8999 BioLegend Way, San Diego, CA 92121 [www.biolegend.com](http://www.biolegend.com)  
 Toll-Free Phone: 1-877-Bio-Legend (246-5343) Phone: (858) 768-5800 Fax: (877) 455-9587