

## PE anti-human CD97 Antibody

<b>Catalog# / Size</b>	336307 / 25 tests 336308 / 100 tests
<b>Clone</b>	VIM3b
<b>Regulatory Status</b>	RUO
<b>Workshop</b>	V BP030
<b>Other Names</b>	BL-KDD/F12
<b>Isotype</b>	Mouse IgG1, κ
<b>Description</b>	CD97 is a seven-span transmembrane protein belonging to the secretin receptor superfamily, the G-protein-coupled receptor superfamily, and the EGF-TM7 family with molecular weights of 74 kD, 80 kD, and 86 kD. It is expressed on monocytes/macrophages, granulocytes, dendritic cells, and smooth muscle cells. The expression of CD97 on resting T- and B-lymphocytes is at low level, but is rapidly upregulated upon activation. CD97 binds to CD55 (decay-accelerating factor), chondroitin sulfate, integrin α5β1, and α3β1. CD97 has been shown to mediate cell adhesion and co-stimulation of T cell proliferation.

### Product Details

---

<b>Verified Reactivity</b>	Human
<b>Reported Reactivity</b>	Rhesus
<b>Antibody Type</b>	Monoclonal
<b>Host Species</b>	Mouse
<b>Immunogen</b>	KG1a (human myeloid cell line)
<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 under optimal conditions.
<b>Concentration</b>	Lot-specific (to obtain lot-specific concentration, please enter the lot number in our <a href="#">Concentration and Expiration Lookup</a> or <a href="#">Certificate of Analysis</a> online tools.)
<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 µl per million cells in 100 µl staining volume or 5 µl per 100 µl of whole blood.
<b>Excitation Laser</b>	Blue Laser (488 nm) Green Laser (532 nm)/Yellow-Green Laser (561 nm)
<b>Application Notes</b>	Clone VIM3b binds within the first EGF domain of CD97. <sup>4</sup> Additional reported applications include: western blot, immunoprecipitation.
<b>Application References</b>	1. Hamann J, <i>et al.</i> 1995. <i>J. Immunol.</i> 155:1942. 2. Lawrence DW, <i>et al.</i> 2003. <i>J. Exp. Med.</i> 198:999. 3. Yoshino N, <i>et al.</i> 2000. <i>Exp. Anim. (Tokyo)</i> 49:97. (FC) 4. Wobus M, <i>et al.</i> 2004. <i>Int. J. Cancer</i> 112:815.
<b>(PubMed link indicates BioLegend citation)</b>	
<b>Product Citations</b>	1. de Boer B <i>et al.</i> 2018. <i>Cancer cell.</i> 34(4):674-689 . <a href="#">PubMed</a> 2. Houtsma R, <i>et al.</i> 2021. <i>STAR Protoc.</i> 2:100864. <a href="#">PubMed</a>

RRID AB\_1227612 (BioLegend Cat. No. 336307)  
AB\_2076182 (BioLegend Cat. No. 336308)

## Antigen Details

---

<b>Structure</b>	Seven-span transmembrane protein belonging to the secretin receptor superfamily, the G-protein-coupled receptor superfamily, and the EGF-TM7 family, 74 kD, 80 kD, 86 kD
<b>Distribution</b>	Monocytes/macrophages, granulocytes, dendritic cells, low levels on T cells and B-lymphocytes and upregulated upon activation
<b>Function</b>	Co-stimulation, adhesion
<b>Ligand/Receptor</b>	CD55, chondroitin sulfate, integrin $\alpha 5\beta 1$ , integrin $\alpha 3\beta 1$
<b>Cell Type</b>	Dendritic cells, Granulocytes, Macrophages, Monocytes
<b>Biology Area</b>	Immunology
<b>Molecular Family</b>	CD Molecules
<b>Antigen References</b>	1. Capasso M, <i>et al.</i> 2006. <i>J. Immunol.</i> 177:1070 2. Wang T, <i>et al.</i> 2005. <i>Blood</i> 105:2836 3. Zola H, <i>et al.</i> 2007. <i>Leukocyte and Stromal Cell Molecules: The CD Markers</i> . A John Wiley & Sons Inc, Publication
<b>Gene ID</b>	<a href="#">976</a>

## Related Protocols

---

[Cell Surface Flow Cytometry Staining Protocol](#)

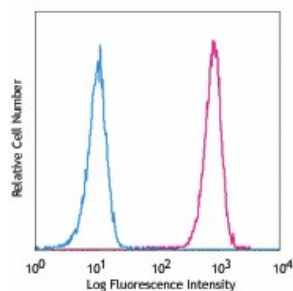
## Other Formats

---

FITC anti-human CD97, PE anti-human CD97

## Product Data

---



Human peripheral blood granulocytes stained with VIM3b PE

For research use only. Not for diagnostic use. Not for resale. BioLegend will not be held responsible for patent infringement or other violations that may occur with the use of our products.

\*These products may be covered by one or more Limited Use Label Licenses (see the BioLegend Catalog or our website, [www.biolegend.com/ordering#license](http://www.biolegend.com/ordering#license)). BioLegend products may not be transferred to third parties, resold, modified for resale, or used to manufacture commercial products, reverse engineer functionally similar materials, or to provide a service to third parties without written approval of BioLegend. By use of these products you accept the terms and conditions of all applicable Limited Use Label Licenses. Unless otherwise indicated, these products are for research use only and are not intended for human or animal diagnostic, therapeutic or commercial use.

BioLegend Inc., 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

