2014 Product Catalog

BioLegend®

General Information

Technical Charts and Protocols

Mouse Immunology Antibodies

Rat Immunology Antibodies

Human Immunology Antibodies

Cytokine and Chemokine Antibodies

Recombinant Proteins for Bioassay

Imunoassays

Cell Biology Antibodies

Secondary Reagents

Isotype Controls

Buffers, Solutions, and Chemicals

Index of Catalog Numbers

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Toll Free 1.877.BIOLEGEND (246.5343)
For your convenience, here is a list of abbreviations used throughout this catalog:

- **aa**: amino acids
- **Ab**: Antibody
- **Activ**: Activation
- **AKP**: Alkaline phosphatase
- **APC**: Allophycocyanin
- **Apop**: Apoptosis
- **Ar Ham**: Armenian Hamster
- **Av**: Avidin
- **BA**: Bioassay
- **BCA**: Bicinchoninic acid protein assay
- **Block**: Blocking
- **Bov**: Bovine (Cow)
- **BV421™**: Brilliant Violet 421™
- **BV510™**: Brilliant Violet 510™
- **BV605™**: Brilliant Violet 605™
- **BV650™**: Brilliant Violet 650™
- **BV711™**: Brilliant Violet 711™
- **BV785™**: Brilliant Violet 785™
- **CMCD**: Complement-mediated cell depletion
- **Chick**: Chicken
- **ChIP**: Chromatin Immunoprecipitation
- **CNS**: Central nervous system
- **Costim**: Costimulatory or costimulation
- **Cy**: Cyanine (dye)
- **Cyt**: Cytotoxicity
- **CyTOF®**: Mass Cytometry
- **Deplete or Depletion**: Cell depletion
- **ELISA**: Enzyme-linked immunosorbent assay
- **ELISA Capture/Detection**: Capture or detection reagent for enzyme-linked immunosorbent assay
- **ELISPOT**: Enzyme-linked immunosorbent spot assay
- **ELISPOT Capture/Detection**: Capture or detection reagent for enzyme-linked immunosorbent spot assay
- **EU**: Endotoxin Unit
- **FA**: Functional assay
- **FC**: Flow cytometry
- **FITC**: Fluorescein isothiocyanate
- **GPI**: Glycosylphosphatidylinositol
- **Gt**: Goat
- **Gt**: Goat
- **HRP**: Horseradish peroxidase
- **Hs**: Horse (Equine)
- **Hu**: Human
- **ICC**: Immunocytochemistry
- **ICFC**: Intracellular Staining for Flow Cytometry
- **IF**: Immunofluorescence microscopy
- **Ig**: Immunoglobulin
- **IHC**: Immunohistochemistry
- **IP**: Immunoprecipitation
- **kD**: Kilodalton
- **LEAF™**: Low Endotoxin, Azide-Free (<0.1 EU/µg of protein)
- **LPS**: Lipopolysaccharide
- **µg**: Microgram
- **mAb**: Monoclonal antibody
- **mg**: Milligram
- **Ms**: Mouse
- **MHC**: Major histocompatibility complex
- **Neut**: Neutralization
- **ng**: Nanogram
- **NHP**: Non-Human Primate
- **NK**: Natural killer cells
- **PBMC**: Peripheral blood mononuclear cells
- **PE (or R-PE)**: Phycoerythrin
- **pg**: Picogram
- **Rab**: Rabbit
- **RIA**: Radioimmunoassay
- **SAv**: Streptavidin
- **SDS-PAGE**: SDS polyacrylamide gel electrophoresis
- **Stim**: Stimulation
- **Syr Ham**: Syrian Hamster
- **TCR**: T cell receptor
- **TNFRSF**: TNF receptor superfamily
- **TNFSF**: TNF superfamily
- **Treg**: T regulatory cells
- **Ultra-LEAF™**: Lower Endotoxin, Azide-Free (<0.01 EU/µg of protein)
- **WB**: Western blotting
Company Profile

BioLegend develops world-class, cutting-edge antibodies and reagents for biomedical research, manufactured in our state-of-the-art facility in San Diego, CA. Our mission is to accelerate research and discovery by providing the highest quality products at an outstanding value, along with superior customer service and technical support.

Our product areas include cell immunophenotyping, cytokines and chemokines, adhesion, cancer research, T regulatory cells, stem cells, innate immunity, cell-cycle analysis, apoptosis, and modification-specific antibodies. All of BioLegend’s reagents are supported by superior customer service and come with a quality guarantee. Our aggressive product development program, through technology licensing, collaborations, and internal hybridoma development, produces strategic reagents for use in a variety of applications including:

- Flow cytometry and mass cytometry
- ELISA and ELISPOT
- Immunoprecipitation and ChIP
- Western blotting
- Immunofluorescence microscopy
- Immunohistochemistry
- In vitro and in vivo functional assays

BioLegend offers the broadest selection of fluorochrome conjugates for multi-color flow cytometry. With our Custom Solutions Team, BioLegend is well positioned to offer a wide range of custom products and services tailored to our customers’ specific needs.

Incorporated in June 2002, BioLegend is located in San Diego, in the midst of one of the nation’s largest and fastest growing biotechnology clusters.

Quality Management System

BioLegend in San Diego, CA is now operating under an ISO 9001:2008 and ISO 13485:2003 certified quality management system. This certifies an effective quality management system, based on documentation and continuous improvement, that meets international standards for medical device and reagent manufacturing.
Ordering Information

Ordering from US and Canada:
Our Customer Service Department is available 7:00 am to 5:00 pm (PST), Monday through Friday to take and process your orders.

On-line: Visit biolegend.com/ordering

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Phone (International): 1.858.768.5800
Fax: 1.877.455.9587
E-mail: cs@biolegend.com

For most efficient order processing, please be sure that the following information is included on your purchase order or correspondence:
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2. Account number (if available)
3. Shipping address
4. Billing address
5. Catalog number, description, and correct price
6. Quantity and size required
7. Name and phone number of purchasing agent
8. Name and phone number of the end user
9. Purchase Order number
10. BioLegend quotation number (if applicable)

Shipping from BioLegend Headquarters:
All orders are shipped F.O.B. San Diego, California. Shipping and handling charges will be prepaid and added to the invoice. Domestic orders will normally be shipped by overnight air express. BioLegend reserves the right to select the best packaging and shipping method which will ensure the stability of the product and allow efficient order tracking. Our reagents are stable when shipped at ambient temperature. Please store our products under the conditions indicated on the technical information sheet upon arrival. Domestic shipments are sent overnight Monday through Thursday. International shipments are typically sent on Fridays and Mondays.

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See Inside Back Cover, “BioLegend Worldwide”, for complete contact Information.

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Visit biolegend.com/de and click “Kontakt”, “Ordering” for ordering instructions.

United Kingdom:
Visit biolegend.com/uk and click “Contact”, “Ordering” for ordering instructions.

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Visit biolegend.com/it and click “Contact”, “Ordering” for ordering instructions.

Europe, Other Countries:
Contact BioLegend Europe to place an order or be directed to our distributor.

E-mail Inquiries: infoeurope@biolegend.com
E-mail Technical Support: techeurope@biolegend.com
Phone: +44(0) 20 3475 3880
Fax: +44(0) 20 3318 3271

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The BioLegend European Distribution Center in the United Kingdom maintains the majority of our catalog items in stock for same-day delivery. We will ship via our preferred courier and shipping charges vary, depending on the weight of the shipment and the destination country. Customers will be responsible for payment of any applicable duties and taxes upon shipment arrival in their respective country. Prepayment is required.

Ordering from Japan
See Inside Back Cover, “BioLegend Worldwide”, for complete contact Information.

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Ordering from All Other Countries
Customers located outside of the United States may order through BioLegend distributors or through BioLegend directly. We have extensive experience in shipping to many countries directly. We will ship via our preferred courier and shipping charges vary, depending on the weight of the shipment and the destination country. Customers are responsible for payment of duties and taxes upon shipment arrival in their respective country. Orders from outside the USA and Canada typically require prepayment before shipping. Direct ordering instructions are the same as “Ordering from the US and Canada”, but include your Tax ID number for customs, as well as a copy of the import permit/license (if applicable). International shipments are typically sent on Fridays and Mondays.

International Distributors:
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Custom Solutions Team
Specialized Products and Services Tailored for Your Research

BioLegend’s Custom Solutions Team has decades of combined research and manufacturing experience in developing conjugated antibodies, flow cytometry antibody cocktails, ELISAs, multiplex assays, bioassays, recombinant proteins, and custom antibody production. We will collaborate with you to fully understand your needs, develop a specialized custom solution, and then deliver the highest caliber products and services, along with our quality guarantee. Save time and money by leveraging our expertise.

Custom Products
• Custom antibody cocktails in bulk, including cell surface and intracellular targets
• Lyophilized antibody cocktails
• Custom antibody conjugation
• Multiplex immunoassays on multiple platforms
• ELISA and ELISPOT kits and sets
• Antibody screening plates
• Recombinant protein expression

Custom Services
• Biomarker assay development services
• Sample analysis for biomarkers
• Custom manufacturing and packaging
• Monoclonal and polyclonal antibody production
• Bioassay development
• Additional needs? Let’s discuss.

Outstanding Value
As with all of our products, we provide excellent and reasonable pricing for our custom solutions.
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• Strict documentation and backup of protocols and data
• Use of regularly calibrated instruments and equipment
• Lot-to-lot consistency verified by well-defined specifications
• Highly-skilled personnel with certified biohazard training
• Daily monitoring of storage refrigerators and freezers

Let’s get started on your custom solution…
Email us at CST@biolegend.com, call 858-768-5809, or contact your local BioLegend representative.
**Technical Services**

At BioLegend, our Technical Services team is dedicated and trained to answer your questions on our products and their related applications. All of our technical service staff are highly qualified and experienced to address your needs. We welcome any suggestions or comments to help us achieve the highest level of service.

For technical support, please call us at 1-877-273-3103 (Toll-free US & Canada) or 1-858-768-5801 (International), fax your inquiry to 877-455-9587, or send your email to: techserv@biolegend.com. Our Technical Services Department hours are 7:00 am to 5:00 pm, Pacific Standard Time, Monday through Friday.

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**Quality and Satisfaction Guarantee**

Our strict quality control guidelines allow us to offer a 100% satisfaction guarantee on all our products. As exceptional quality and batch-to-batch consistency are of paramount importance for all of us at BioLegend, each batch must pass stringent biochemical and biological/immunological testing requirements. If, however, any product does not perform as indicated on its Technical Data Sheet, we will either immediately replace it or credit you the original purchase price.

Please contact our Technical Services Department if you have any questions or concerns about your product. Our Technical Service Scientists are available to help with assay design, suggest relevant positive controls, and offer troubleshooting tips.

Your satisfaction is our number one priority.

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**Quality Policy Statement**

BioLegend is a global leader in bioscience committed to world-class quality, superior customer support, and outstanding value. We achieve this position through scientific innovation, continuous improvement, customer satisfaction, and operating under an effective Quality Management System that meets Regulatory Requirements of ISO 9001:2008 and ISO 13485:2003.
Collaborate with Us

BioLegend is committed to providing researchers with the most comprehensive and cutting-edge high quality reagents for life science research. If you have developed reagents or technologies that you feel may be of interest to the life science research community, we would like the opportunity to collaborate with you to commercialize your inventions.

We look forward to developing a mutually beneficial collaboration with you. For more information about collaboration and our technology transfer process, please email: busdev@biolegend.com.

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Prices reflect list price and are subject to change without notice.

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We accept credit card purchases for US and Canada orders; please have your VISA, MasterCard, American Express, or Discover Card account number and expiration date available when placing an order. Purchase order numbers are required for all billed shipments. Payment terms are net 30 days. A 1.5% monthly late charge may be charged to accounts that are over 30 days past due. Orders from outside the USA and Canada typically require prepayment before shipping.

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The purchase of this product conveys to the buyer the non-transferable right to use the purchased amount of the product and components of the product in research conducted by the buyer (whether the buyer is an academic or for-profit entity). The buyer cannot sell or otherwise transfer

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- its components or
- materials made using this product or its components

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- resale of the product or its components, whether or not such product or its components are resold for use in research.

If the purchaser is not willing to accept the limitations of this limited use statement, BioLegend requires immediate return of the product with a full refund.

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A return authorization number is required on all returns. Please contact BioLegend Customer Service Department to obtain the authorization prior to returning any item. All claims for damaged merchandise during transit must be reported immediately to the shipping carrier, and then to BioLegend. Return authorization requests must be made within 10 working days of order receipt. All claims are subject to investigation before return authorization, replacement or credit can be issued.

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Patents

Alexa Fluor® and Pacific Blue™: U.S. Patent Nos. 5,696,157; 6,130,101; 5,798,276; 5,830,912; 6,562,632B1; 6,716,979 pending patent applications and corresponding foreign equivalents, owned by Invitrogen Corp.


Allophycocyanin (APC) conjugates: U.S. Patent No. 5,714,386

Cyanine (Cy): U.S. Patent Nos. 4,981,977; 5,268,486 and other patents pending.

R-Phycocerythrin (R-PE) and Allophycocyanin (APC): U.S. Patent Nos. 4,542,104 and 5,714,386

PE-Cy7: U.S. Patent No. 4,542,104

APC-Cy7: U.S. Patent No. 5,714,386

Peridinin chlorophyll protein (PerCP): U.S. Patent No. 4,876,190


CD62P: U.S. Patent No. 4,783,330

Antibody to Human Fusin (clone 12G5): U.S. Patent No. 5,994,515

12G5: U.S. Patent No. 5,994,515

Antibodies to Human IL-4: U.S. Patent No. 5,041,381

Antibodies to Human and Murine IL-10: U.S. Patent No. 6,239,260

Antibodies to vIL-10: U.S. Patent No. 5,756,342

Antibodies to Human and Murine IL-10 Receptor: U.S. Patent No. 5,863,796

Antibodies to Human and Murine IL-17: U.S. Patent No. 6,274,711

Antibodies to Human GM-CSF: U.S. Patent No. 5,070,013

Antibodies to Human and Murine SLAM: U.S. Patent No. 5,756,423

Antibodies to Mouse IL-6 Receptor, Mouse IL-9, Human IL-9: U.S. Patent No. 5,157,112; European Patent No. 0361284

Antibodies to Human IL-9 Receptor: U.S. Patent No. 5,962,269; European Patent No. 0643719

Antibodies to Human and Murine CD317: U.S. Patent No. 7,049,408

Annexin V: U.S. Patent No. 5,834,196

Antibodies to T-Bet: U.S. Patent Nos. 7,745,581; 7,393,944; 7,365,169

Antibodies to p27Kip1: U.S. Patent Nos. 5,688,665; 6,635,450; 6,242,575; 6,355,774


Antibodies to Gamma-H2A: U.S. Patent Nos. 6,362,317; 6,884,873

Antibodies to Human iKIR2DL4: U.S. Patent No. 7,435,801

Antibodies to Human TLR2: U.S. Patent No. 7,071,308 and Great Britain Patent No. 9,297,332

Antibodies to Human iKIR2DL4: U.S. Patent No. 7,435,801

Antibodies to Mouse TRAIL: Japan Patent No. JP585399


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