Anti-PD-L1-mlgG1e3 InvivoFit™
Recombinant mouse monoclonal antibody against murine PD-L1
Catalog code: pdl1-mab15-1, pdl1-mab15-10
https://www.invivogen.com/anti-pdl1-mlg1e3-invivofit

For research use only, not for diagnostic or therapeutic use
Version 21A12-MM

PRODUCT INFORMATION
Contents:
Anti-PD-L1-mlgG1e3 InvivoFit™, provided azide-free and lyophilized, is a purified monoclonal antibody (mAb). It is available in two pack sizes:
- 1 mg
- 10 mg
Target: Programmed cell death ligand 1 (PD-L1)
Species reactivity: Reacts with human and murine PD-L1
Source: CHO cells
Sequence: ~65% murine (constant region) and ~35% humanized (variable region)
Isotype: Murine IgG1e3 (D265A mutation; no effector function)
Light chain type: Kappa
Purification: By affinity chromatography with protein G
Formulation: 0.2 µm filtered solution in 150 mM sodium chloride, 20 mM sodium phosphate buffer with 5% saccharose.
Administration: Suitable for parenteral delivery in mice
Tested applications: Flow cytometry and ELISA

Antibody resuspension (2 mg/ml)
Note: Ensure you see the lyophilized pellet before resuspension.
Resuspend Anti-PD-L1-mlgG1e3 InvivoFit™ with sterile water:
- Add 500 µl to 1 mg
- Add 5 ml to 10 mg

Storage and stability:
- Product is shipped at room temperature. Store lyophilized antibody at -20°C. Lyophilized product is stable for at least 1 year.
- Reconstituted antibody is stable for 1 month when stored at 4°C and for 1 year when aliquoted and stored at -20°C. Avoid repeated freeze-thaw cycles.

Quality control:
- Binding of Anti-PD-L1-mlgG1e3 InvivoFit™ to mouse PD-L1 has been validated using flow cytometry with EL4 cells expressing membrane bound mouse PD-L1.
- The complete sequence of this antibody has been verified.
- <5% aggregates (confirmed by size exclusion chromatography).
- Anti-PD-L1-mlgG1e3 InvivoFit™ is guaranteed sterile and its endotoxin level is <1 EU/mg of the protein (determined by the LAL assay).

BACKGROUND
Programmed cell death ligand 1 (PD-L1; also called B7-H1 or CD274) is a transmembrane protein expressed on antigen-presenting cells. PD-L1 binds to programmed cell death protein 1 (PD-1) on T cells and contributes to T cell exhaustion during chronic infections. Moreover, it has been shown that the engagement of PD-1 on T cells by PD-L1 on tumor cells is associated with the immune escape of tumors. Clinical trials have highlighted the anti-tumor efficacy of PD-L1 blockade targeting the PD-1/PD-L1 pathway.

DESCRIPTION
Anti-PD-L1-mlgG1e3 InvivoFit™ is a recombinant mAb designed for in vivo studies in mice. It features the variable region of the previously described anti-PD-L1 atezolizumab1 and the engineered murine IgG1e3 constant region. Atezolizumab (formerly known as MPDL3280A) is a therapeutic mAb that targets programmed cell death ligand 1 (PD-L1), blocking the interaction with its receptor PD-1. This mAb binds both murine and human PD-L1.

Atezolizumab contains an engineered constant region designed to limit effector functions, such as antibody-dependent cytotoxicity and complement-dependent cytotoxicity2. However, as it is a humanized antibody, it is immunogenic in mice. To overcome this issue, Anti-PD-L1-mlgG1e3 InvivoFit™ was generated by recombinant DNA technology so that it is ~65% murine (constant region). Notably, its constant region contains a point mutation D265A (a replacement of aspartic acid by alanine at position 265), resulting in the complete loss of cytolytic effector function.

This antibody is produced in CHO cells and purified by affinity chromatography with protein G.


RELATED PRODUCTS

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<td>bgal-mab15-1</td>
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<tr>
<td>Anti-hPD-L1-hlgG1 (N298A) (Atezolizumab)</td>
<td>hpd1-mab12</td>
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<td>Anti-mPD-1-mlgG1e3 InvivoFit™</td>
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Other mouse anti-mouse antibodies are available such as anti-mCTLA4. For more information, visit: https://www.invivogen.com/mouse-anti-mouse-mabs.