Technical Data Sheet
PE Mouse Anti-Rat αβ T-Cell Receptor

Product Information
Material Number: 554914
Size: 0.2 mg
Concentration: 0.2 mg/ml
Clone: R73
Immunogen: Rat T blasts and rat erythrocytes
Isotype: Mouse (BALB/c) IgG1, κ
Reactivity: QC Testing: Rat
Storage Buffer: Aqueous buffered solution containing ≤0.09% sodium azide.

Description
The R73 antibody reacts with the αβ T-cell Receptor (TCR) found on most peripheral T lymphocytes, intestinal intraepithelial lymphocytes, and thymocytes. It does not react with γδ TCR-bearing cells. Cross-linked R73 mAb induces T-cell differentiation and activation. In vivo treatment with mAb R73 can suppress immune function of peripheral αβ TCR-expressing T cells, and reduce the severity of experimental autoimmune, transplant rejection, and graft-versus-host responses.

This antibody is routinely tested by flow cytometric analysis. Other applications were tested at BD Biosciences Pharmingen during antibody development only or reported in the literature.

Preparation and Storage
The monoclonal antibody was purified from tissue culture supernatant or ascites by affinity chromatography.
The antibody was conjugated with R-PE under optimum conditions, and unconjugated antibody and free PE were removed by gel filtration chromatography.
Store undiluted at 4° C and protected from prolonged exposure to light. Do not freeze.

Application Notes
Application
Flow cytometry Routinely Tested

Suggested Companion Products
<table>
<thead>
<tr>
<th>Catalog Number</th>
<th>Name</th>
<th>Size</th>
<th>Clone</th>
</tr>
</thead>
<tbody>
<tr>
<td>550617</td>
<td>PE Mouse IgG1, κ Isotype Control</td>
<td>0.1 mg</td>
<td>MOPC-31C</td>
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</tbody>
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Product Notices
1. Since applications vary, each investigator should titrate the reagent to obtain optimal results.
2. Please refer to wwwbdbiosciencescom/pharmingen/protocols for technical protocols.
3. For fluorochrome spectra and suitable instrument settings, please refer to our Fluorochrome Web Page at wwwbdbiosciencescom/pharmingen/colors.
4. Caution: Sodium azide yields highly toxic hydrazoic acid under acidic conditions. Dilute azide compounds in running water before discarding to avoid accumulation of potentially explosive deposits in plumbing.

References
Heidecke CD, Hancock WW, Jakobs F, et al. alpha/beta T cell receptor-directed therapy in rat cardiac allograft recipients. Treatment prior to allograft antigen exposure prevents sensitization and abrogates accelerated rejection. Transplantation. 1995; 59(1):78-84 (Biology)
Heidecke CD, Hancock WW, Westerholt S, et al. alpha/beta T cell receptor-directed therapy in rat allograft recipients. Long-term survival of cardiac allografts after pretreatment with R73 mAb is associated with upregulation of Th2-type cytokines. Transplantation. 1996; 61(6):948-956 (Biology)


