

## 30-2846: Anti-Human CD43 APC MAb (Clone: MEM-59)

<b>Clonality :</b>	Monoclonal
<b>Clone Name :</b>	MEM-59
<b>Application :</b>	FACS
<b>Reactivity :</b>	Human
<b>Conjugate :</b>	APC
<b>Gene :</b>	SPN, sialophorin
<b>Gene ID :</b>	6693
<b>Uniprot ID :</b>	P16150
<b>Alternative Name :</b>	Leukosialin, Sialophorin, Galactoglycoprotein, GALGP, LSN, SPN, GALGP, GP5
<b>Isotype :</b>	Mouse IgG1
<b>Immunogen Information :</b>	Human T lymphocytes.

### Description

**Specificity:** The antibody MEM-59 recognizes a neuraminidase-sensitive extracellular epitope on CD43 (Leukosialin), a 95-135 kDa type I transmembrane glycoprotein (mucin-type) which is involved in lymphocyte activation. CD43 is expressed by platelets and at high levels on the surface of all leukocytes; it is negative on resting B lymphocytes and erythrocytes.

CD43 (leukosialin, sialophorin) is a transmembrane mucin-like protein with high negative charge, expressed on the surface of most hematopoietic cells. CD43 contributes to a repulsive barrier that interferes with cellular adhesion, however, in certain cases also promotes leukocyte aggregation. By interaction with actin-binding proteins ezrin and moesin CD43 plays a regulatory role in remodeling T-cell morphology and regulates cell-cell interactions during lymphocyte traffic. CD43 signaling both enhances LFA-1 adhesiveness and counteracts LFA-1 induction via other receptors. Expression of CD43 causes induction of functionally active tumour suppressor p53 protein, but in case of p53 and ARF deficiency CD43 promotes tumour proliferation and viability. It appears to be an important modulator of leukocyte functions.

### Product Info

<b>Amount :</b>	100 tests
<b>Purification :</b>	Purified antibody is conjugated with activated allophycocyanin (APC) under optimum conditions and unconjugated antibody and free fluorochrome are removed by size-exclusion chromatography.
<b>Content :</b>	Stabilizing phosphate buffered saline (PBS), pH 7.4, 15 mM sodium azide
<b>Storage condition :</b>	Store at 2-8°C. Protect from prolonged exposure to light. Do not freeze.

### Application Note

**Flow cytometry:** The reagent is designed for analysis of human blood cells using 10 µl reagent / 100 µl of whole blood or 10<sup>6</sup> cells in a suspension. The content of a vial (1 ml) is sufficient for 100 tests.

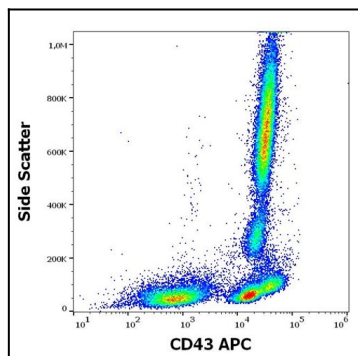


Figure 1: Flow cytometry surface staining pattern of human peripheral whole blood stained using anti-human CD43 (MEM-59) APC antibody (10  $\mu$ l reagent / 100  $\mu$ l of peripheral whole blood).

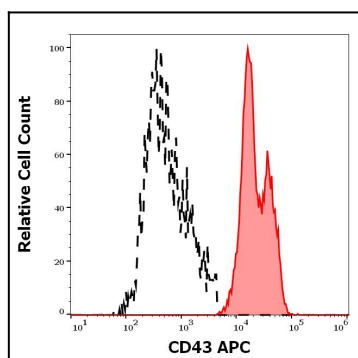


Figure 2: Separation of human CD43 positive lymphocytes (red-filled) from CD43 negative lymphocytes (black-dashed) in flow cytometry analysis (surface staining) of human peripheral whole blood stained using anti-human CD43 (MEM-59) APC antibody (10  $\mu$ l reagent / 100  $\mu$ l of peripheral whole blood).