

## Technical Data Sheet

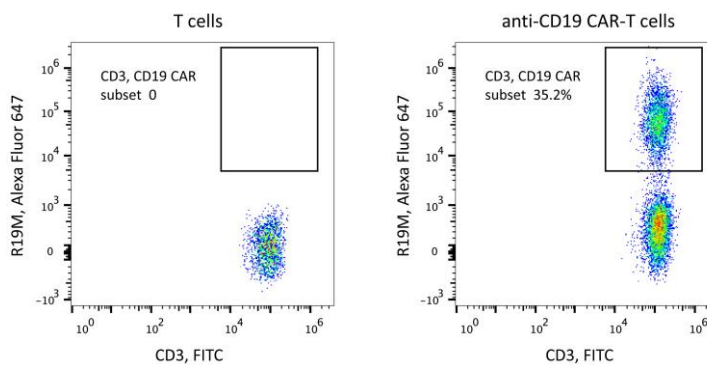
### Rabbit Anti-Mouse FMC63 scFv Monoclonal Antibody, Alexa Fluor 647

#### Product Information

Material Number:	200102
RRID	AB_2857946
Size:	100 Tests
Vol. per Test:	1 $\mu$ L
Antibody Types:	Monoclonal
Clone:	R19M
Immunogen:	scFv region of a CD19-specific mouse mAb clone FMC63
Host Species:	Rabbit
Reactivity:	Mouse
Storage Buffer:	Aqueous buffered solution containing protein stabilizer and $\leq 0.03\%$ sodium azide

#### Description

The rabbit monoclonal antibody R19M specifically binds to the scFv region of a CD19-specific mouse monoclonal antibody (mAb, clone FMC63). CD19 antigen is a B-cell specific cell surface antigen, which is expressed in all B-cell lineage malignancies and normal B-cells. The scFv region of FMC63 has been used to develop CD19-specific chimeric antigen receptor (CAR) T cells utilized in clinical trials.



*Flow cytometric analysis of anti-CD19 CAR expression on human T cells. Human T cells were lentivirally transduced with anti-CD19 CAR and cultured for 7 days.  $2 \times 10^5$  cells were stained for the expression of anti-CD19 CAR with Rabbit Anti-Mouse FMC63 scFv Monoclonal Antibody, Alexa Fluor 647 (Cat. No. 200102, right panel). Non-transduced T cells were used as a control for gating of CAR expression (left panel).*

#### Preparation and Storage

Shipped at 4°C. Store undiluted at 4°C short term (4 weeks) and protected from prolonged exposure to light. Store at -20°C in small aliquots for long term storage. Avoid freeze/thaw cycle.

The monoclonal antibody was purified by Protein A.

The antibody was conjugated with Alexa Fluor 647 under optimum conditions, and unincorporated dye was removed.

#### Application Notes

Application

Flow cytometry

Routinely Tested

#### Product Notices

- Since applications vary, each investigator should titrate the reagent to obtain optimal results.
- 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.

#### FACS Protocol

- Harvest the cells and wash the cells once by FACS buffer (PBS containing 2% of BSA).

2. Count the cells number and the viability, aliquot up to  $2 \times 10^5$  live cells into each tube. (Note: the cell viability must be  $\geq 95\%$ .)
3. Resuspend cells in 100  $\mu\text{L}$  of diluted Rabbit Anti-Mouse FMC63 scFv Monoclonal Antibody, Alexa Fluor 647 (Cat. No. 200102, 1:100 diluted in FACS buffer) for 30 min at  $4^\circ\text{C}$ .
4. Wash the cells 3 times by FACS buffer and resuspend the cells in 200  $\mu\text{L}$  PBS per sample.
5. Transfer the cells into flow tube and analyze on Flow Cytometer. Acquisition of  $>10,000$  events is performed.