

Product Information

SILu™MAB Adalimumab - Stable Isotope Labeled Monoclonal Antibody Standard

recombinant, expressed in CHO cells

Catalog Number **MSQC11**

Storage Temperature $-20\text{ }^{\circ}\text{C}$

Product Description

SILu™MAB Adalimumab is a recombinant, stable isotope-labeled, monoclonal antibody which incorporates [$^{13}\text{C}_6$, $^{15}\text{N}_4$]-Arginine and [$^{13}\text{C}_6$, $^{15}\text{N}_2$]-Lysine. Expressed in CHO cells, SILuMAB Adalimumab is designed to be used as an internal standard for analysis of Adalimumab in human serum.

Each vial of SILuMAB Adalimumab contains the labeled antibody lyophilized from a solution of phosphate buffered saline. Vial content was determined by measuring absorbance at 280 nm (A_{280}) and using an extinction coefficient ($E^{0.1\%}$) of 1.4.

Sequence Information

SILuMAB Adalimumab Heavy Chain:

EVQLVESGGGLVQ~~GR~~SLRLSCAASGFTTFDDYAMHWVRQAP
GK**GLEWVSAITWNSGHIDYADSVEGRF**FTISRDNKNSLYLQ
MNSLRAEDTAVYYCAKVS~~Y~~LSLSTASSLDYWGQGTLLVTVSSAS
TKGPSVFPLAPSSKSTSGGTAALGCLVKDYFPEPVTVSWNS
GALTSGVHTFPAVLQSSGLYSLSSVVTVPSSSLGTQTYICN
VNHKPSNTKVDKKEPKSCDKTHCTCPPEPELLGGPSVFL
FPPKPKDTLMISRTPEVTCVVDVSHEDPEVKFNWYVDGVE
VHNAKTPREEQYNSTYRVVSVLTVLHQDWLNGKEYKCKV
NKALPAPIEKTIISKAKGQPREPQVYTLPPSRDELTKNQVSL
TCLVKGFIYPSDIAVEWEESNGQPENNYKTTTPVLDSDGSFFL
YSKLTVDKSRWQQGNV~~F~~SCSVMEALHNHYTQKSLSLSPG

SILuMAB Adalimumab Light Chain:

DIQMTQSPSSLSASVGRVTITCRASQGI~~R~~NYLAWYQQKPG
KAPKLLIYAAS~~T~~LQSGVPSR**FSGSGSTDFTLTISSLPED**
VATYTCQRYNR**APYTFGQTK**VEIKRTVAAPSVFIFPPSDE
QLKSGTASVCLLNNFYPREAKVQWKVDNALQSGNSQESVT
EQDSKSTYLSLSTLTLSKADYEEKHKVYACEVTHQGLSSPV
TKSFNRGEC

See Table 1. regarding underlined and bolded tryptic digest fragments.

Precautions and Disclaimer

This product is for R&D use only, not for drug, household, or other uses. Please consult the Safety Data Sheet for information regarding hazards and safe handling practices.

Preparation Instructions

SILuMAB Adalimumab recovery is maximized when 0.1% formic acid is used for reconstitution of the lyophilized product. Reconstitution with other solvents may reduce recovery. Do not freeze after reconstitution.

1. Briefly centrifuge the vial at $10,000 \times g$ to collect the product at the bottom of the vial.
2. Add 500 μL of ultrapure water containing 0.1% formic acid to the vial.
3. Mix the contents by gently inverting the vial a minimum of 5 times.
4. Allow the vial to stand at room temperature for at least 15 minutes and repeat mixing by inversion.

Storage/Stability

Store the lyophilized product at $-20\text{ }^{\circ}\text{C}$.

Legal Information

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SILu is a trademark of Sigma-Aldrich Co. LLC.

JK,PJ,MAM 08/17-1

Table 1.

Adalimumab-Specific Peptide Sequences Liberated from SiLuMAb Adalimumab by Tryptic Digest

Universal Peptide Sequence	Location
GLEWVSAITWNSGHIDYADSVEGR	Heavy chain
APYTFGQGK*	Light chain
FSGSGSGTDFTLTISSLQPEDVATYYCQR	Light chain

*Provide the best signal for LC-MRM MS