

Alexa Fluor[®] 700 anti-mouse Ly-6C Antibody

Catalog# / Size	128023 / 25 µg 128024 / 100 µg
Clone	HK1.4
Regulatory Status	RUO
Other Names	Lymphocyte antigen 6 complex, locus C
Isotype	Rat IgG2c, κ
Description	Most hematopoietic cells express one or more members of Ly-6 family. The expression of Ly-6 varies with development stage and activation. Ly-6C is a 14-17 kD GPI-linked surface protein expressed on mouse monocyte/macrophage cells, endothelial cells, neutrophils, and some T cell subsets. Ly-6C is reported to be an indicator of memory CD8 ⁺ T cells.

Product Details

Verified Reactivity	Mouse
Antibody Type	Monoclonal
Host Species	Rat
Immunogen	L3 cloned CTL cells
Formulation	Phosphate-buffered solution, pH 7.2, containing 0.09% sodium azide.
Preparation	The antibody was purified by affinity chromatography and conjugated with Alexa Fluor [®] 700 under optimal conditions.
Concentration	0.5 mg/ml
Storage & Handling	The antibody solution should be stored undiluted between 2°C and 8°C, and protected from prolonged exposure to light. Do not freeze.
Application	FC - Quality tested
Recommended Usage	<p>Each lot of this antibody is quality control tested by immunofluorescent staining with flow cytometric analysis. The suggested use of this reagent is ≤0.25 µg per million cells in 100 µl volume. It is highly recommended that the reagent be titrated for optimal performance for each application.</p> <p>* Alexa Fluor[®] 700 has a maximum emission of 719 nm when it is excited at 633 nm / 635 nm. Prior to using Alexa Fluor[®] 700 conjugate for flow cytometric analysis, please verify your flow cytometer's capability of exciting and detecting the fluorochrome.</p> <p>Alexa Fluor[®] and Pacific Blue™ are trademarks of Life Technologies Corporation.</p> <p>View full statement regarding label licenses</p>
Excitation Laser	Red Laser (633 nm)
Application Notes	<p>Clone HK1.4 does not block the binding of clone RB6-8C5⁸.</p> <p>Additional reported applications (for relevant formats of this clone) include: <i>in vitro</i> activation of T cells¹⁻³ and immunohistochemistry of frozen sections⁴.</p>
Application References	<ol style="list-style-type: none">1. Jutila MA, <i>et al.</i> 1988. <i>Eur. J. Immunol.</i> 18:1819. (Activ)2. Herold KC, <i>et al.</i> 1990. <i>Diabetes</i> 39:815. (Activ)3. Havran WL, <i>et al.</i> 1988. <i>J. Immunol.</i> 140:1034 (Activ)4. Flanagan K, <i>et al.</i> 2008. <i>J. Immunol.</i> 180:3874. (IHC)5. Makaroff LE, <i>et al.</i> 2009. <i>P. Natl. Acad. Sci. USA</i> 106:4799. (FC)6. Zuber J, <i>et al.</i> 2009. <i>Genes Dev.</i> 23:877. (FC) PubMed7. Ribechini E, <i>et al.</i> 2009. <i>Eur. J. Immunol.</i> 39:3538.8. Ma C, <i>et al.</i> 2012. <i>J. Leukoc. Biol.</i> 92:1199.
(PubMed link indicates BioLegend citation)	

9. Watson NB, *et al.* 2015. *J Immunol.* 194:2796. [PubMed](#)

Product Citations

1. Lin C, *et al.* 2020. *Cancer Immunol Res.* 632:8. [PubMed](#)
2. Lee JH, *et al.* 2022. *EBioMedicine.* 77:103903. [PubMed](#)
3. Kaczanowska S, *et al.* 2021. *Cell.* 184(8):2033-2052.e21. [PubMed](#)
4. Kolawole A, *et al.* 2015. *J Virol.* 90: 1499-1506. [PubMed](#)
5. Groza D, *et al.* 2018. *Oncoimmunology.* 7:e1424676. [PubMed](#)
6. Denk D, *et al.* 2022. *Immunity.* 55:2059. [PubMed](#)
7. Suresh R, *et al.* 2020. *J Immunother Cancer.* 8:. [PubMed](#)
8. Minutti CM, *et al.* 2019. *Immunity.* 50:645. [PubMed](#)
9. Lindborg JA *et al.* 2017. *The Journal of Neuroscience.* 37(43):10258-10277 . [PubMed](#)
10. Zhang X, *et al.* 2020. *Elife.* 9:00. [PubMed](#)
11. Jackson-Jones LH, *et al.* 2020. *Immunity.* 52:700. [PubMed](#)
12. Domingos-Pereira S, *et al.* 2019. *Cancer Immunol Res.* 7:621. [PubMed](#)
13. Parrish KE, *et al.* 2021. *Biopharm Drug Dispos.* 42:137. [PubMed](#)
14. Li Y, *et al.* 2021. *Brain Behav Immun.* 91:267. [PubMed](#)
15. Leylek R, *et al.* 2019. *Cell Rep.* 29:3736. [PubMed](#)
16. Deng M, *et al.* 2020. *Nat Commun.* 11:2193. [PubMed](#)
17. Dmitrieva-Posocco O *et al.* 2019. *Immunity.* 50(1):166-180 . [PubMed](#)
18. Yong L, *et al.* 2022. *Nat Commun.* 13:4255. [PubMed](#)
19. Ritzel RM, *et al.* 2021. *Glia.* 69:746. [PubMed](#)
20. Otvos B, *et al.* 2021. *Clin Cancer Res.* 27:2038. [PubMed](#)
21. Hu Y, *et al.* 2021. *Cell Death Dis.* 12:743. [PubMed](#)
22. Cianciaruso C, *et al.* 2020. *Cell Reports.* 27(10):3062-3080.e11.. [PubMed](#)
23. Nacer A, *et al.* 2014. *PLoS Pathog.* 10:1004528. [PubMed](#)
24. Velázquez F, *et al.* 2016. *J Immunol.* 196: 1305 - 1316. [PubMed](#)
25. Chhatbar C *et al.* 2018. *Cell reports.* 25(1):118-129 . [PubMed](#)
26. Clemente-Casares X, *et al.* 2017. *Immunity.* 47:974. [PubMed](#)
27. Issah Y, *et al.* 2021. *Elife.* 10:. [PubMed](#)
28. Ortega-Molina A, *et al.* 2021. *Cell Reports.* 36(2):109372. [PubMed](#)
29. Tähtinen S, *et al.* 2022. *Nat Immunol.* 23:532. [PubMed](#)
30. Jin J, *et al.* 2020. *Cell Reports.* 30(12):4124-4136. [PubMed](#)
31. Li Z *et al.* 2018. *Immunity.* 49(4):640-653 . [PubMed](#)
32. Dyer DP *et al.* 2019. *Immunity.* 50(2):378-389 . [PubMed](#)
33. Koyama M *et al.* 2019. *Immunity.* 51(5):885-898 . [PubMed](#)
34. Pessoa Rodrigues C, *et al.* 2020. *Sci Adv.* 6:eaaz4815. [PubMed](#)
35. Buschor S, *et al.* 2017. *PLoS Pathogens.* 13(6):e1006476. [PubMed](#)

RRID

AB_10640119 (BioLegend Cat. No. 128023)
AB_10643270 (BioLegend Cat. No. 128024)

Antigen Details

Structure	14-17 kD protein (134 amino acids), member of the Ly-6 family of GPI linked protein. Ly6 family members share structure homology throughout a distinctive cystein rich protein domain that incorporates O-linked carbohydrates.
Distribution	Ly-6C is expressed primarily on bone marrow myeloid populations, monocytes/macrophages, neutrophils, endothelial cells, and some T cell subsets. Ly-6C is also a marker of memory CD8 ⁺ T cells.
Cell Type	Endothelial cells, Macrophages, Monocytes, Neutrophils, T cells
Biology Area	Immunology
Molecular Family	CD Molecules
Antigen References	1. Jutila MA, <i>et al.</i> 1988. <i>Eur. J. Immunol.</i> 18:1819. 2. Cerwenka A, <i>et al.</i> 1998. <i>J. Immunol.</i> 161:97.
Gene ID	17067

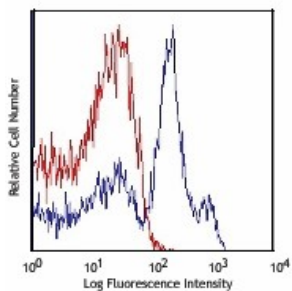
Related Protocols

[Cell Surface Flow Cytometry Staining Protocol](#)

Other Formats

Pacific Blue™ anti-mouse Ly-6C, APC anti-mouse Ly-6C, Purified anti-mouse Ly-6C, Biotin anti-mouse Ly-6C, FITC anti-mouse Ly-6C, Alexa Fluor® 647 anti-mouse Ly-6C, PE anti-mouse Ly-6C, PerCP/Cyanine5.5 anti-mouse Ly-6C, PE/Cyanine7 anti-mouse Ly-6C, Alexa Fluor® 488 anti-mouse Ly-6C, Alexa Fluor® 700 anti-mouse Ly-6C, APC/Cyanine7 anti-mouse Ly-6C, PerCP anti-mouse Ly-6C, Brilliant Violet 570™ anti-mouse Ly-6C, Brilliant Violet 421™ anti-mouse Ly-6C, Brilliant Violet 510™ anti-mouse Ly-6C, Brilliant Violet 605™ anti-mouse Ly-6C, Brilliant Violet 711™ anti-mouse Ly-6C, Purified anti-mouse Ly-6C (Maxpar® Ready), Brilliant Violet 785™ anti-mouse Ly-6C, PE/Dazzle™ 594 anti-mouse Ly-6C, APC/Fire™ 750 anti-mouse Ly-6C, TotalSeq™-A0013 anti-mouse Ly-6C, Brilliant Violet 650™ anti-mouse Ly-6C, TotalSeq™-C0013 anti-mouse Ly-6C, TotalSeq™-B0013 anti-mouse Ly-6C, APC/Fire™ 810 anti-mouse Ly-6C Antibody

Product Data



C57BL/6 bone marrow cells stained with HK1.4 Alexa Fluor® 700

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