CD19 is phosphorylated

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Introduction

Reactome is open-source, open access, manually curated and peer-reviewed pathway database. Pathway annotations are authored by expert biologists, in collaboration with Reactome editorial staff and cross-referenced to many bioinformatics databases. A system of evidence tracking ensures that all assertions are backed up by the primary literature. Reactome is used by clinicians, geneticists, genomics researchers, and molecular biologists to interpret the results of high-throughput experimental studies, by bioinformaticians seeking to develop novel algorithms for mining knowledge from genomic studies, and by systems biologists building predictive models of normal and disease variant pathways.

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Literature references

Fabregat, A., Sidiropoulos, K., Viteri, G., Forner, O., Marin-Garcia, P., Arnau, V. et al. (2017). Reactome pathway analysis: a high-performance in-memory approach. *BMC bioinformatics, 18*, 142. ↗

Sidiropoulos, K., Viteri, G., Sevilla, C., Jupe, S., Webber, M., Orlic-Milacic, M. et al. (2017). Reactome enhanced pathway visualization. *Bioinformatics, 33*, 3461-3467. ↗

Fabregat, A., Jupe, S., Matthews, L., Sidiropoulos, K., Gillespie, M., Garapati, P. et al. (2018). The Reactome Pathway Knowledgebase. *Nucleic Acids Res, 46*, D649-D655. ↗

Fabregat, A., Korninger, F., Viteri, G., Sidiropoulos, K., Marin-Garcia, P., Ping, P. et al. (2018). Reactome graph database: Efficient access to complex pathway data. *PLoS computational biology, 14*, e1005968. ↗

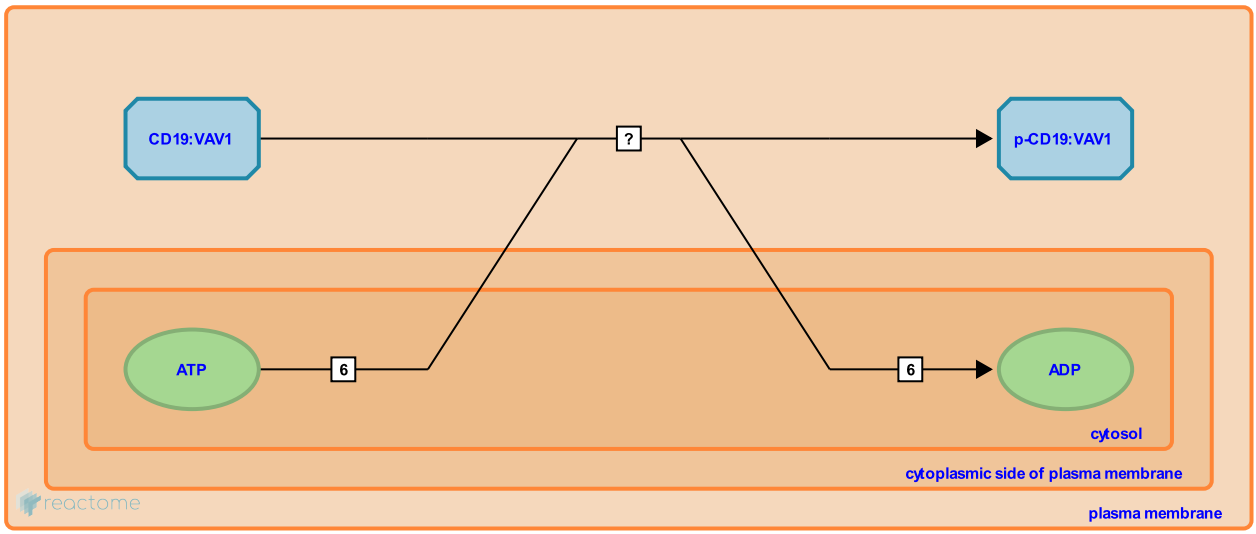
CD19 is phosphorylated ↗

Stable identifier: R-HSA-9606883

Type: uncertain

Compartments: plasma membrane

Inferred from: Cd19 is phosphorylated (Mus musculus)



In response to BCR activation, CD19 in a stable complex with VAV1 is phosphorylated by Src kinases (Chalupny et al. 1993, inferred from mouse homologs in Xu et al. 2002), one of which may be LYN (inferred from mouse homologs).

Literature references

Kanner, SB., Wee, SF., Gilliland, LK., Schieven, GL., Aruffo, A., Ledbetter, JA. et al. (1993). Tyrosine phosphorylation of CD19 in pre-B and mature B cells. *EMBO J, 12*, 2691-6. ↗

Editions

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