Assembly of the PGN:PGRP-LC oligomer receptor 'signalling complex'

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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

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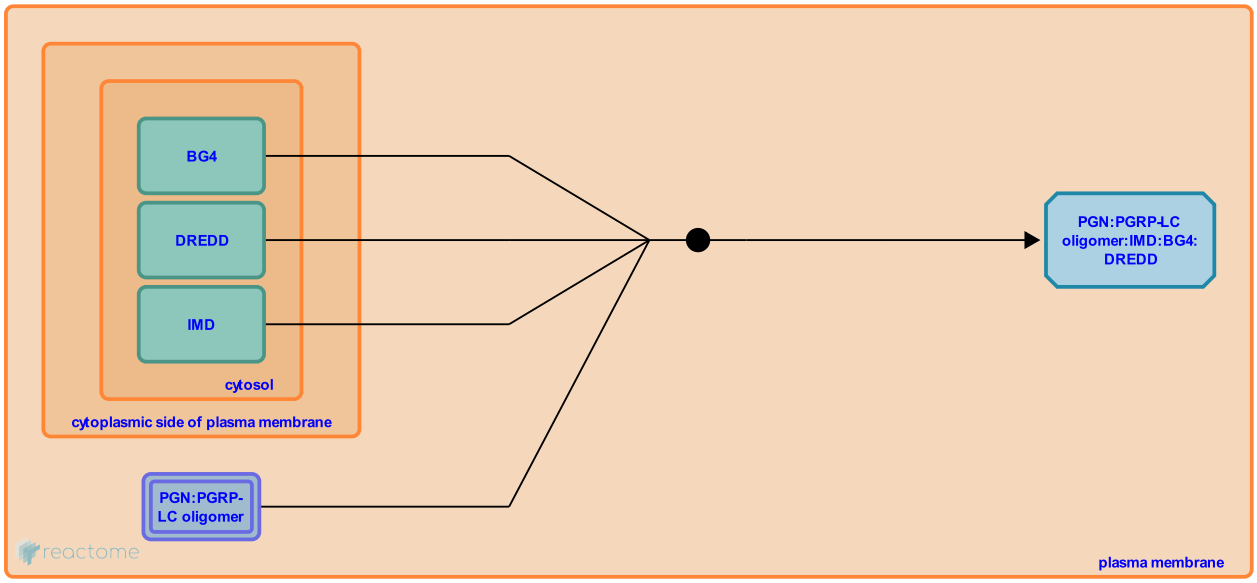
Stable identifier: R-DME-209221

Type: binding

Compartments: cytosol, plasma membrane

Inferred from: TNF:TNFR1 binds TRADD, TRAF2 and RIPK1 (Homo sapiens), FasL:Fas binds FADD (Homo sapiens)



Upon ligand binding and receptor multimerisation at the plasma membrane, a 'signalling complex' is assembled. The adaptor protein, IMD, binds to the cytoplasmic part of the receptors, while another adaptor protein, DFADD (BG4), binds to IMD through their respective death domains. The caspase-8 orthologue, DREDD, binds to BG4 through interaction between their respective death-inducing (DID) domains.

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Editions

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