PI3P is dephosphorylated to PI by MTM proteins at the late endosome membrane

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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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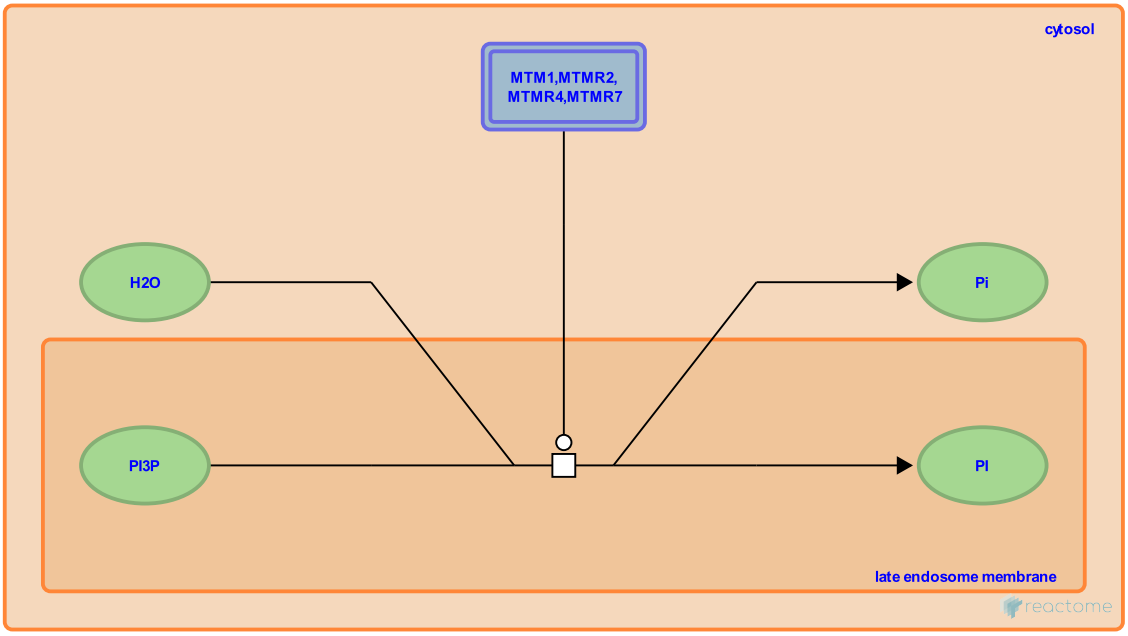
Stable identifier: R-HSA-1675795

Type: transition

Compartments: late endosome membrane, cytosol



At the late endosome membrane, myotubularin (MTM1), myotubularin-related protein 2 (MTMR2), myotubularin-related protein 4 (MTMR4), and myotubularin-related protein 7 (MTMR7) dephosphorylate phosphatidylinositol 3-phosphate (PI3P) to phosphatidylinositol (PI).

The following lists the above proteins with their corresponding literature references: MTM1 (Cao et al. 2007, Cao et al. 2008, Tsujita et al. 2004, Tronchere et al. 2004, Kim et al. 2002); MTMR2 (Cao et al. 2008, Kim et al. 2002); MTMR4 (Lorenzo et al. 2006); and MTMR7 (Mochizuki & Majerus 2003, Lorenzo et al. 2006).

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Editions

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