

Phospho FT reduces D accumulation at the plasma membrane

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18/05/2024

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.

The development of Reactome is supported by grants from the US National Institutes of Health (P41 HG003751), University of Toronto (CFREF Medicine by Design), European Union (EU STRP, EMI-CD), and the European Molecular Biology Laboratory (EBI Industry program).

Literature references

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

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Reactome database release: 88

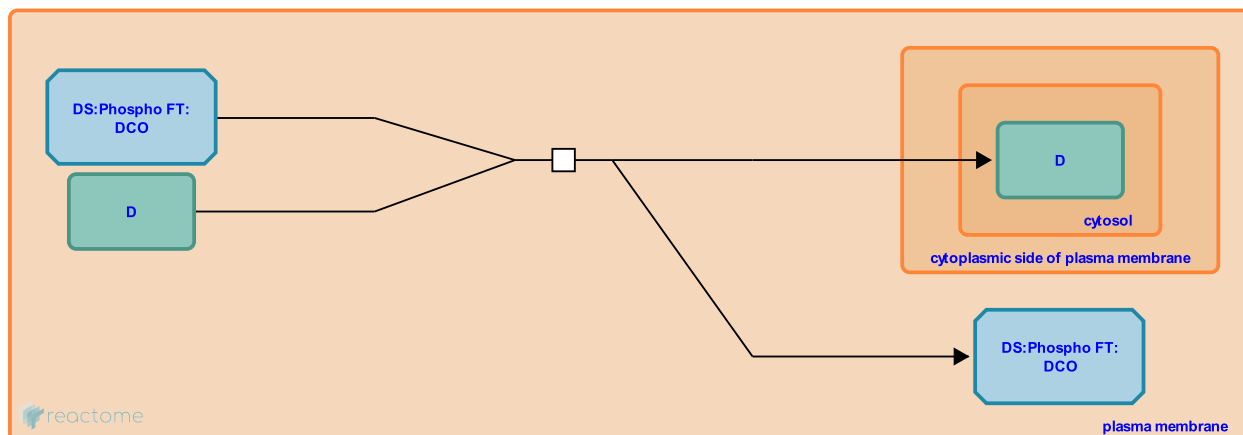
This document contains 1 reaction ([see Table of Contents](#))

Phospho FT reduces D accumulation at the plasma membrane [↗](#)

Stable identifier: R-DME-390116

Type: transition

Compartments: cytosol, plasma membrane



There are observations that Fat (FT), Dachshous (DS), and Four-jointed (FJ) modulate the subcellular localisation of Dachs (D). In the absence of FT, D accumulates at the plasma membrane. These suggest a simple model whereby signalling through FT regulates the stability of the serine/threonine kinase, Warts (WTS), by reducing protein levels of D at the plasma membrane so it fails to interact with WTS.

Literature references

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Minihan, G., Irvine, KD., Hu, WL., Rauskolb, C., Mao, Y., Hayter, H. et al. (2006). Dachs: an unconventional myosin that functions downstream of Fat to regulate growth, affinity and gene expression in *Drosophila*. *Development*, 133, 2539-51. [↗](#)

Editions

2009-01-23	Authored, Edited	Williams, MG.
2009-11-25	Reviewed	Irvine, KD.