Expression of CCND1 is stimulated by CTNNB1:TCF4,LEF1 and inhibited by VENTX:TCF4,LEF1

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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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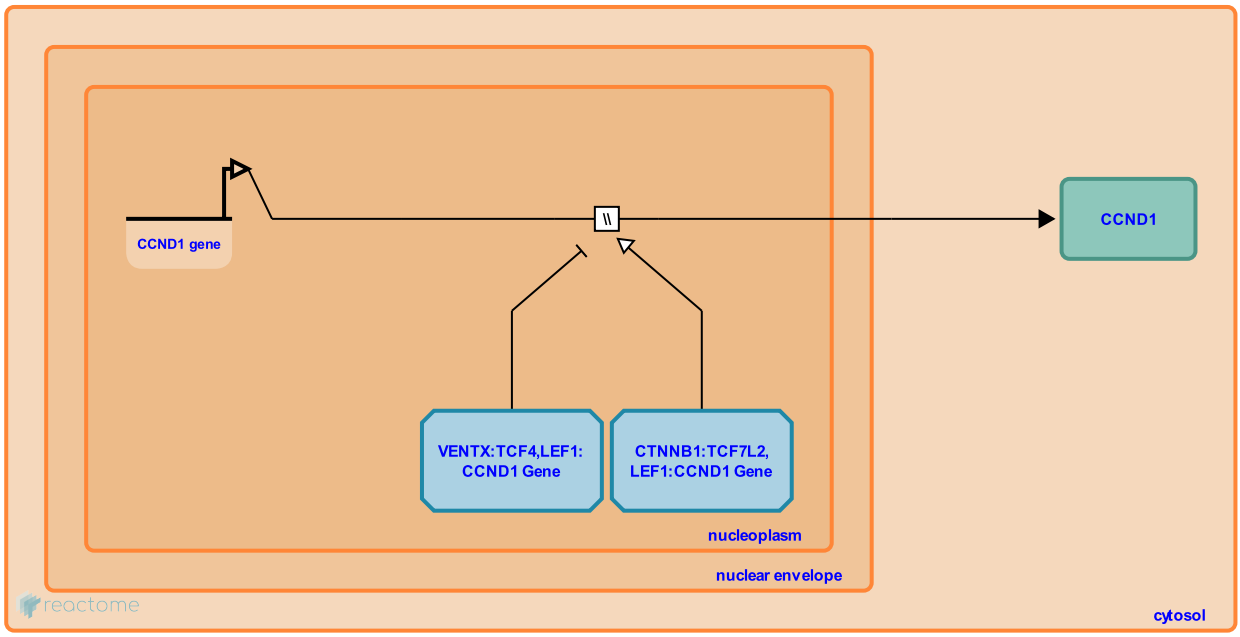
Stable identifier: R-HSA-8853956

Type: omitted

Compartments: nucleoplasm



While the complex of beta-catenin (CTNNB1) and TCF4/LEF1 transcription factors stimulates cyclin D1 (CCND1) transcription, binding of VENTX to TCF4 and/or LEF1 results in the inhibition of CCND1 transcription. VENTX is predominantly expressed in hematopoietic cells and its interaction with TCF4/LEF1 is implicated in the inhibition of cellular proliferation induced by WNT signaling (Gao et al. 2010).

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Editions

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