Transport of Mature mRNA Derived from

an Intronless Transcript

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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. ↗

Reactome database release: 70

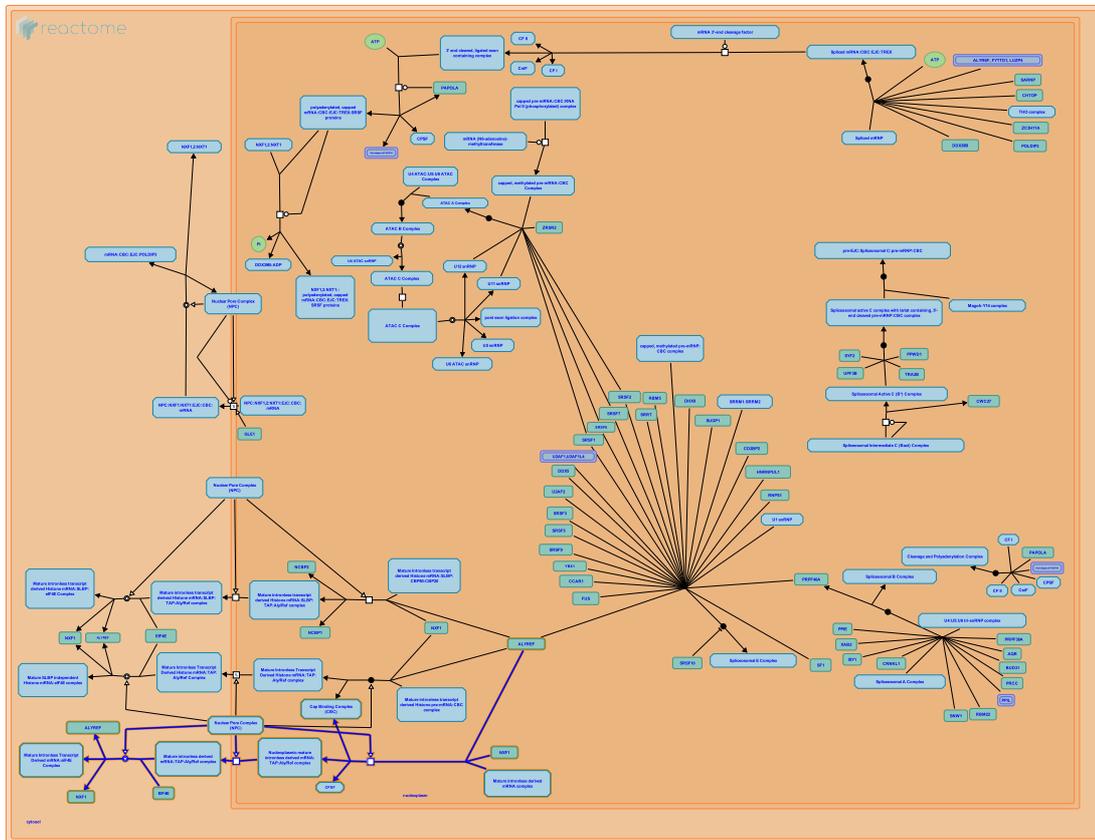This document contains 1 pathway and 3 reactions (see Table of Contents)

Transport of Mature mRNA Derived from an Intronless Transcript ↗

Stable identifier: R-SSC-159231

Compartments: nucleoplasm, nuclear envelope, cytosol

Inferred from: Transport of Mature mRNA Derived from an Intronless Transcript (Homo sapiens)

This event has been computationally inferred from an event that has been demonstrated in another species.

The inference is based on the homology mapping from PANTHER. Briefly, reactions for which all involved PhysicalEntities (in input, output and catalyst) have a mapped orthologue/paralogue (for complexes at least 75% of components must have a mapping) are inferred to the other species. High level events are also inferred for these events to allow for easier navigation.

<a href='/electronic_inference_compara.html' target = 'NEW'>More details and caveats of the event inference in Reactome. For details on PANTHER see also: <a href='http://www.pantherdb.org/about.jsp' target='NEW'>http://www.pantherdb.org/about.jsp

Docking of the Mature intronless derived transcript derived mRNA, TAP and Aly/Ref at the NPC ↗
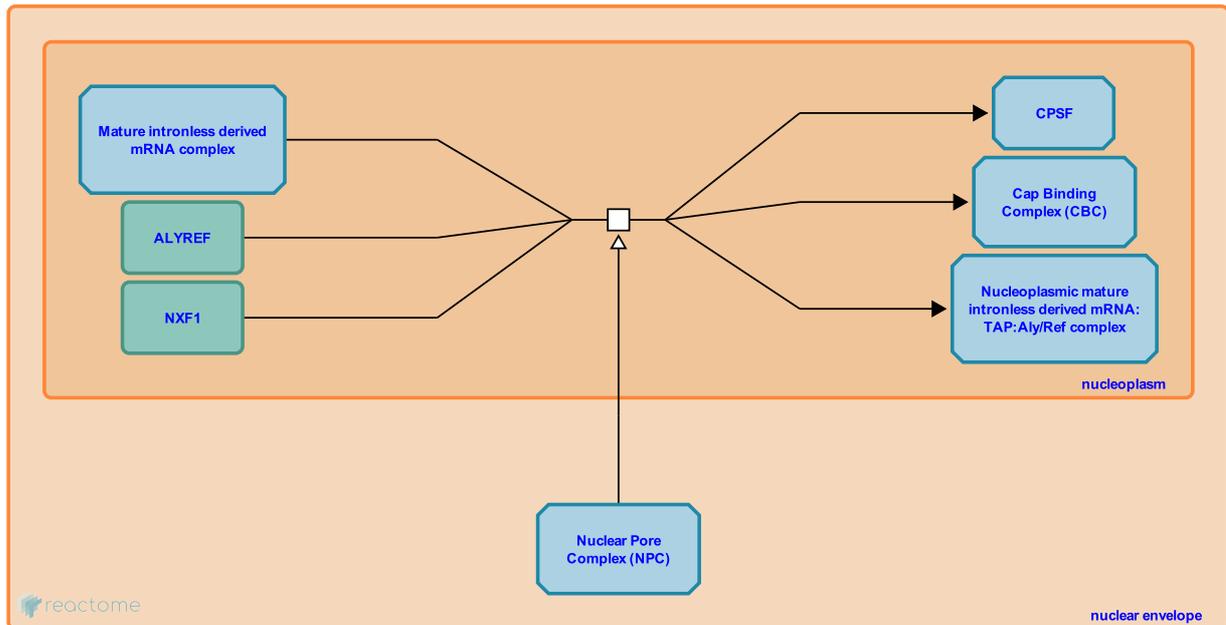
Location: Transport of Mature mRNA Derived from an Intronless Transcript

Stable identifier: R-SSC-77594

Type: transition

Compartments: nucleoplasm, nuclear envelope

Inferred from: Docking of the Mature intronless derived transcript derived mRNA, TAP and Aly/Ref at the NPC (Homo sapiens)

This event has been computationally inferred from an event that has been demonstrated in another species.

The inference is based on the homology mapping from PANTHER. Briefly, reactions for which all involved PhysicalEntities (in input, output and catalyst) have a mapped orthologue/paralogue (for complexes at least 75% of components must have a mapping) are inferred to the other species. High level events are also inferred for these events to allow for easier navigation.

<a href='/electronic_inference_compara.html' target = 'NEW'>More details and caveats of the event inference in Reactome. For details on PANTHER see also: <a href='http://www.pantherdb.org/about.jsp' target='NEW'>http://www.pantherdb.org/about.jsp

Followed by: Transport of the Mature intronless transcript derived mRNA:TAP:Aly/Ref Complex through the NPC

# Transport of the Mature intronless transcript derived mRNA:TAP:Aly/Ref Complex through the NPC ↗

Location: Transport of Mature mRNA Derived from an Intronless Transcript

Stable identifier: R-SSC-158441

Type: transition

Compartments: nuclear envelope, cytosol, nucleoplasm

Inferred from: Transport of the Mature intronless transcript derived mRNA:TAP:Aly/Ref Complex through the NPC (Homo sapiens)
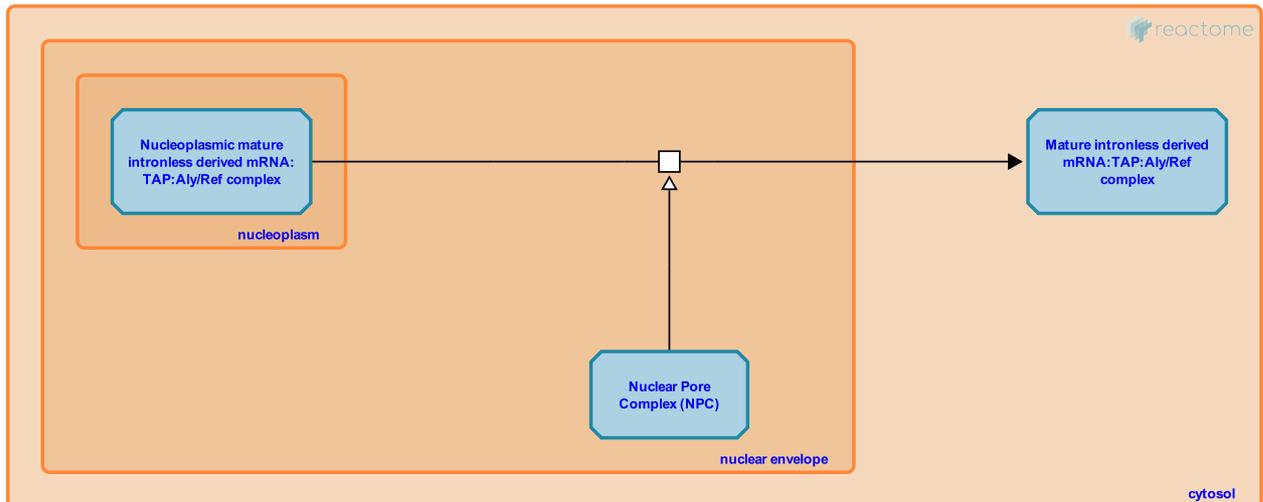
This event has been computationally inferred from an event that has been demonstrated in another species.

The inference is based on the homology mapping from PANTHER. Briefly, reactions for which all involved PhysicalEntities (in input, output and catalyst) have a mapped orthologue/paralogue (for complexes at least 75% of components must have a mapping) are inferred to the other species. High level events are also inferred for these events to allow for easier navigation.

<a href='/electronic_inference_compara.html' target = 'NEW'>More details and caveats of the event inference in Reactome. For details on PANTHER see also: <a href='http://www.pantherdb.org/about.jsp' target='NEW'>http://www.pantherdb.org/about.jsp

Preceded by: Docking of the Mature intronless derived transcript derived mRNA, TAP and Aly/Ref at the NPC

Followed by: Release of the Mature intronless derived mRNA, TAP, and Aly/Ref from the NPC

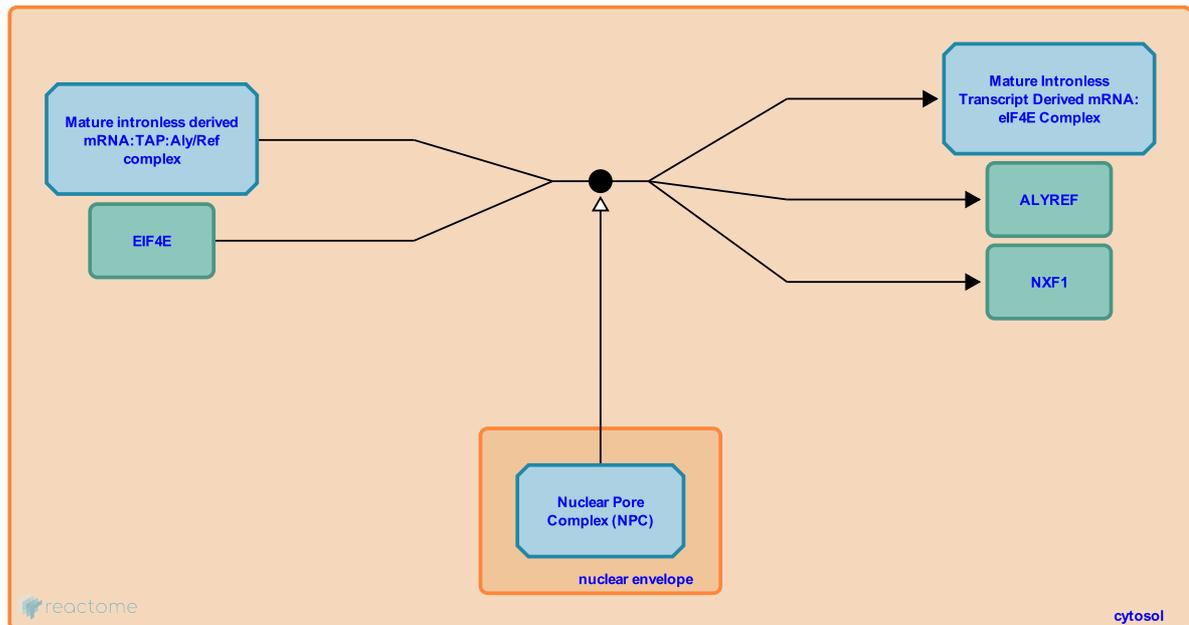## Release of the Mature intronless derived mRNA, TAP, and Aly/Ref from the NPC ↗

Location: Transport of Mature mRNA Derived from an Intronless Transcript

Stable identifier: R-SSC-158447

Type: dissociation

Compartments: cytosol, nuclear envelope

Inferred from: Release of the Mature intronless derived mRNA, TAP, and Aly/Ref from the NPC (Homo sapiens)

This event has been computationally inferred from an event that has been demonstrated in another species.

The inference is based on the homology mapping from PANTHER. Briefly, reactions for which all involved PhysicalEntities (in input, output and catalyst) have a mapped orthologue/paralogue (for complexes at least 75% of components must have a mapping) are inferred to the other species. High level events are also inferred for these events to allow for easier navigation.

<a href='/electronic_inference_compara.html' target = 'NEW'>More details and caveats of the event inference in Reactome. For details on PANTHER see also: <a href='http://www.pantherdb.org/about.jsp' target='NEW'>http://www.pantherdb.org/about.jsp

Preceded by: Transport of the Mature intronless transcript derived mRNA:TAP:Aly/Ref Complex through the NPC

Table of Contents