



AdipoUpX™ Human IFT172 AAV Particle (Overexpression)

Cat. No.:	V1225XX304
Species:	Human
Target Gene:	IFT172
Vector System:	AAV
Modulation Type:	Overexpression

This product is for research use only and is not intended for diagnostic use.

Product Overview

Description	AdipoUpX™ Human IFT172 AAV Particle (Overexpression) is a ready-to-use viral particle product that achieves stable and efficient expression of the human IFT172 gene. This protein is vital for ciliary axoneme formation, making this product an ideal tool for researching ciliopathy-related obesity. To ensure experimental reliability, all products undergo rigorous quality control, including titer, sterility, and mycoplasma testing. Our customizable platform also allows for the flexible selection of AAV serotypes for multifunctional tracking and targeted delivery.
Production Cell Line	HEK293
AAV ITR	AAV2 ITR
Promoter	CMV (default); Other universal or cell-specific promoters
Product Availability	Produced Upon Order

Specification

Titer Test	qPCR
Insert Verification	Vector genome integrity for all preparations was successfully confirmed by PCR validation.
Sterility Test	The QC assay verified the sterility of this product lot.
Mycoplasma Test	The product was confirmed free of mycoplasma contamination after being subjected to stringent quality control testing.



Other QC	Based on specific project requirements, we provide customized supplementary testing and conduct <i>in vivo</i> and <i>in vitro</i> transduction assessments to thoroughly analyze transgene expression levels and biological functions.
Storage	Following receipt, immediate transfer to a -80°C is essential to maintain product integrity.
Stability	Excellent stability for 6-12 months is guaranteed when the product is stored consistently at -80°C, a period which can extend up to 2 years. The thawed working solution is stable for 2-3 weeks at 4°C.
Shipping Condition	Our AAV viral products are shipped using dry ice.
Handling Notes	To maintain titer and prevent the damaging effects of repeated freeze-thaw cycles, it is recommended that the vector be aliquoted into low-protein-binding tubes immediately upon receipt; remember to perform all necessary operations inside a biosafety cabinet.
Intended Use	This product is intended for research use only and is not for use in diagnosis or therapeutic applications.
Product Disclaimer	Users bear ultimate responsibility for product storage, handling, and compliance with all safety protocols, laws, regulations, and biosafety requirements throughout all operational processes. While our company commits to product quality <i>via</i> rigorous internal QC inspections, we do not guarantee product performance or experimental results in any specific application due to diverse and complex conditions.

Target Profile

Gene Name	IFT172
Full Name	Intraflagellar transport 172
Gene Symbol	SLB; wim; RP71; BBS20; osm-1; NPHP17; SRTD10
Gene ID	26160
RefSeq ID-1	NP_056477.1
RefSeq ID-2	NM_015662.3
Summary	IFT172 encodes a component of the intraflagellar transport complex B, which is essential for primary cilium assembly and maintenance. Proper ciliary function is critical for signaling pathways involved in energy homeostasis and development. Mutations in IFT172 are associated with ciliopathies that frequently include metabolic abnormalities such as obesity.