

SLC27 – Fatty acid transporter family

Human gene name	Protein name	Aliases	Predominant substrates #)	Transport type / coupling ions #)	Tissue distribution and cellular / subcellular expression	Link to disease	Human gene locus	Sequence accession ID	Splice variants and their features
SLC27A1	FATP1		LCFA, VLCFA	LCFA transport, VLCFA activation	adipose tissue, muscle, brain, heart	unknown	19p13.1	NM_198580	unknown
SLC27A2	FATP2	VLACS	LCFA, VLCFA	LCFA transport, VLCFA activation	kidney cortex, liver	unknown	15q21.2	NM_003645.3	one splice-variant
SLC27A3	FATP3		LCFA, VLCFA	LCFA transport, VLCFA activation	lung, multiple organs	unknown	1q21.1	NM_024330	unknown
SLC27A4	FATP4		LCFA, VLCFA	LCFA transport, VLCFA activation	mainly distributed in intestine, skin and placenta	(restrictive dermatopathy: OMIM 275210)	9q34	NM_005094	unknown
SLC27A5	FATP5	VLCS-H2	LCFA, bile acids	LCFA transport, bile acid re-conjugation	liver-specific isoform	unknown	19q13.4	NM_012254.2	unknown
SLC27A6	FATP6	VLCS-H1	LCFA, VLCFA	LCFA transport, VLCFA activation	heart-specific isoform	unknown	5q23	NM_014031 NM_001017372	unknown

#) LCFA: Long-chain fatty acids, VLCFA: Very-long-chain fatty acids

References:

Original version of the SLC table:

[Stahl A.](#) A current review of fatty acid transport proteins (SLC27). *Pflugers Arch.* 2004 Feb;447(5):722-7

SLC27A2 splice variant:

[Black PN, DiRusso CC.](#) Vectorial acylation: linking fatty acid transport and activation to metabolic trafficking. *Novartis Found Symp.* 2007;286:127-38; discussion 138-41, 162-3, 196-203.

Questions & Comments