

SLC26 – Multifunctional anion exchanger family

Human gene name	Protein name	Predominant substrates ^{*)}	Tissue distribution and cellular / subcellular expression	Link to disease	Human gene locus	Sequence accession ID	Splice variants and their features
SLC26A1	Sat-1	E / SO ₄ ²⁻ , HCO ₃ ⁻ , oxalate	liver, kidney (basolateral), pancreas, brain		4p16.3	NM_022042 NM_213613 NM_134425	
SLC26A2	DTDST	E / SO ₄ ²⁻ , Cl ⁻	widespread	diastrophic dysplasia, atelosteogenesis II, achondrogenesis IB, multiple epiphyseal dysplasia type 4.	5q31-q34	NM_000112	
SLC26A3	DRA	E / HCO ₃ ⁻ , Cl ⁻ , SO ₄ ²⁻ , oxalate	intestine, sweat gland, pancreas, prostate	congenital chloride diarrhea, (colon cancer)	7q31	NM_000111	
SLC26A4	pendrin	E / I ⁻ , HCO ₃ ⁻ , Cl ⁻ , formate	inner ear, kidney, thyroid	Pendred syndrome, enlarged vestibular aqueduct	7q31	NM_000441	
SLC26A5	prestin		inner ear	deafness	7q22.1	NM_198999 NM_206885 NM_206884 NM_206883	
SLC26A6	Pat-1	E / Cl ⁻ , HCO ₃ ⁻ , oxalate, SO ₄ ²⁻ , formate	widespread		3p21.3	NM_022911 NM_134263 NM_134426 NM_001040454	
SLC26A7		E / Cl ⁻ , HCO ₃ ⁻ , SO ₄ ²⁻ , oxalate	kidney (basolateral)		8q23	NM_052832 NM_134266	
SLC26A8	Tat-1	E / SO ₄ ²⁻ , Cl ⁻ , oxalate	testis (sperm)		6p21	NM_052961 NM_138718	
SLC26A9		E / SO ₄ ²⁻ , Cl ⁻ , oxalate	lung, stomach		1q31-q32	NM_052934 NM_134325 NM_0011426	
SLC26A10		O			12q13	NM_133489	
SLC26A11		E / SO ₄ ²⁻	placenta, kidney, brain		17q25.3	NM_173626	

*) C: Cotransporter; E: Exchanger; F: Facilitated transporter; O: Orphan transporter

References:

Original versions of the SLC table:

[Mount DB, Romero MF.](#) The SLC26 gene family of multifunctional anion exchangers. *Pflugers Arch.* 2004 Feb;447(5):710-21.

[Chambard JM, Ashmore JF.](#) Sugar transport by mammalian members of the SLC26 superfamily of anion-bicarbonate exchangers. *J Physiol.* 2003 Aug 1;550(Pt 3):667-77

Questions & Comments