

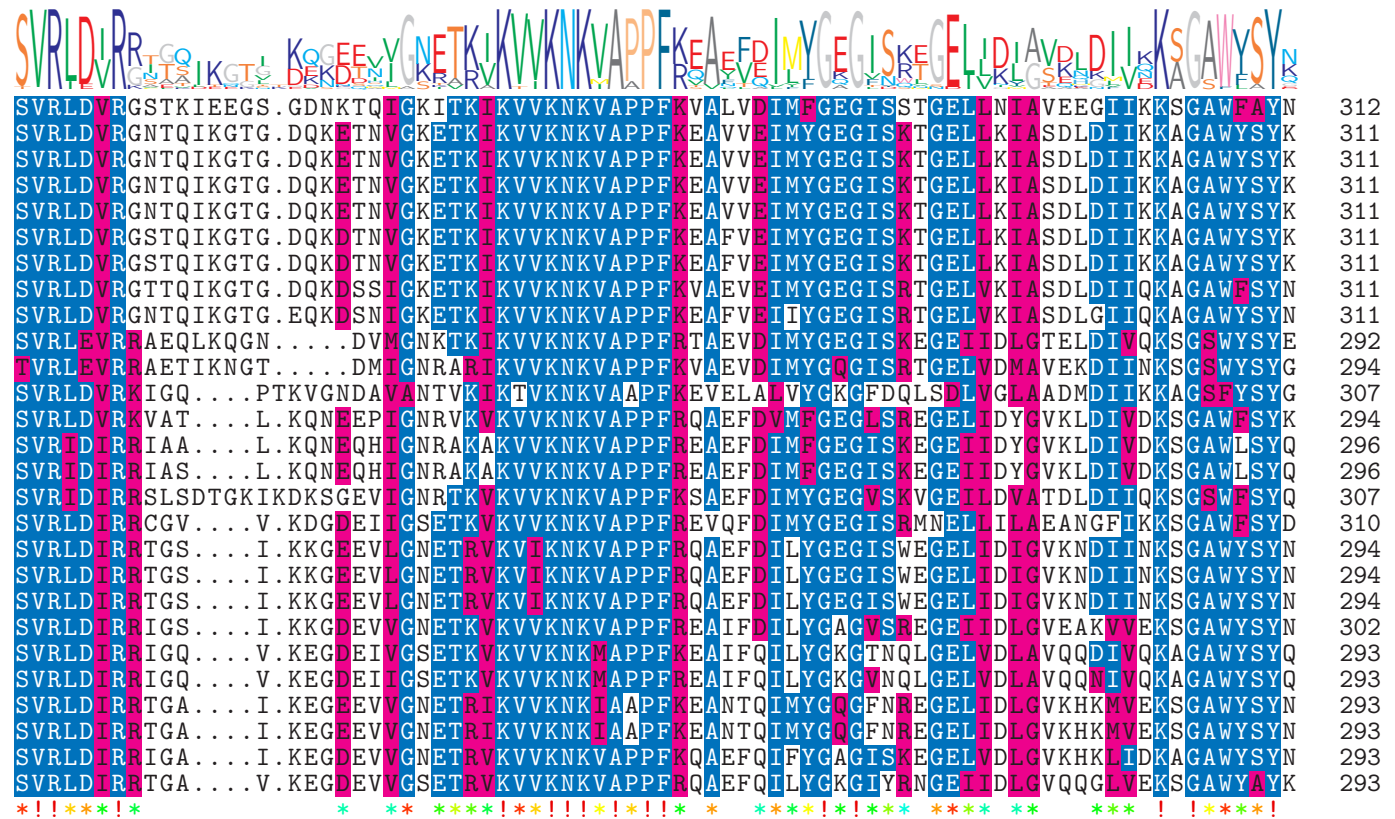
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NTDB id 600 KW2 RS01765 WP 011675413.1	MATKK....KTNFDDITKKYGA	ERDKALADALALIEKD	FGKGSIMRLGEA	.ANQKVSVVSSGSLALD	I	ALGAGGYPKGR	74
NTDB id 269 KZH43 RS08665 WP 001085462.1	.MAKK....PKKLEEISKKFGA	EREKALNDALKLIEKD	FGKGSIMRLGER	.AEQKVQVMSSGSLALD	I	ALGSGGYPKGR	73
NTDB id 228 SPD RS09265 WP 001085462.1	.MAKK....PKKLEEISKKFGA	EREKALNDALKLIEKD	FGKGSIMRLGER	.AEQKVQVMSSGSLALD	I	ALGSGGYPKGR	73
NTDB id 194 SPR RS08825 WP 001085462.1	.MAKK....PKKLEEISKKFGA	EREKALNDALKLIEKD	FGKGSIMRLGER	.AEQKVQVMSSGSLALD	I	ALGSGGYPKGR	73
NTDB id 159 SP RS09750 WP 001085462.1	.MAKK....PKKLEEISKKFGA	EREKALNDALKLIEKD	FGKGSIMRLGER	.AEQKVQVMSSGSLALD	I	ALGSGGYPKGR	73
NTDB id 527 SMSK321 RS11065 WP 001085454.1	.MAKK....PKKLDEISKKFGA	EREKALNDALKLIEKD	FGKGSIMRLGER	.AEQKVQVMSSGSLALD	I	ALGSGGYPKGR	73
NTDB id 499 SM12261 RS08315 WP 078228268.1	.MAKK....PKKLDEISKKFGA	EREKALNDALKLIEKD	FGKGSIMRLGER	.AEQKVQVMSSGSLALD	I	ALGSGGYPKGR	73
NTDB id 453 Spy49 1753c ACI62003.1	.MAKK....LKKNEEITKKFGD	ERRKALDDALKNIEKD	FGKGAVMRLGER	.AEQKVQVMSSGSLALD	I	ALGAGGYPKGR	73
NTDB id 408 SMU RS09530 WP 002262392.1	.MAKR.....IKKTEEITKKFGD	ERRKALDDALKNIEKD	FGKGAVMRLGER	.AEQKVQVMSSGSLALD	I	ALGAGGYPKGR	73
NTDB id 115 BSU 16940 NP 389576.2	MS	DRQAALDMALKQIEKQ	FGKGSIMKLGEK	.TDTRISTVPSGSLALD	T	ALGIGGYPRGR	58
NTDB id 625 LCA RS02525 WP 011374196.1	MAKD	ERQAALDAALKKIEKN	FGKGSIMRMGEK	.VDTQVSTVSSGSLALD	E	ALGVGGYPRGR	60
NTDB id 1313 DR RS12030 WP 010888966.1	MSKDATKEISAPTD	AKERSKATETAM	QIEKAFGKGSIMKLGAE	.SKLDVQVVSTGSLSLD	L	ALGVGGIPRGR	72
NTDB id 1245 Cj1673c YP 002345041.1	MDDN	KRKSLDAALKSLDKT	FGKGTILRLGDK	.EVEQIDSIGTGSVGLD	L	ALGIGGVPKGR	59
NTDB id 1214 NCTC11637 00359 SQJ03206.1	MAIDE	DKQKALISLAIKQID	KVFGKGALVRLGDK	.QVEKIDISTGSLGLDL	L	ALGIGGVPKGR	61
NTDB id 1211 C694 RS00795 WP 000963128.1	MAIDE	DKQKALISLAIKQID	KVFGKGALVRLGDK	.QVEKIDISTGSLGLDL	L	ALGIGGVPKGR	61
NTDB id 1334 RAOC RS04870 WP 004918236.1	MAKT..ETTSPND	DKKKALAAVLEKLDKT	YGKGTVMKLG	DGTVDHNI	IEVIPS	GSGLGLDLALGVGGYPKGR	68
NTDB id 1389 A4U84 RS07560 WP 021112712.1	.MAENKKSSKNNTV..VKQVEPEQ	KKQALEAALAIQIEKQ	FGKGSIMKLGQT	.EQLDIESVSTGSLGLDL	L	ALGIGGLPMGR	76
NTDB id 1130 NGFG RS03960 WP 003688695.1	MSD	DKSKALAAALAIQIEKS	FGKGAIMKMDGSQ	QEEENLEVISTGSLGLDL	L	ALGVGGLPRGR	60
NTDB id 1124 NGFG RS03960 WP 003688695.1	MSD	DKSKALAAALAIQIEKS	FGKGAIMKMDGSQ	QEEENLEVISTGSLGLDL	L	ALGVGGLPRGR	60
NTDB id 1123 OK783 RS03845 WP 003688695.1	MSD	DKSKALAAALAIQIEKS	FGKGAIMKMDGSQ	QEEENLEVISTGSLGLDL	L	ALGVGGLPRGR	60
NTDB id 1427 RS RS02760 WP 011000510.1	.MEDG.....K..KAASMSA	EKQKALAAALAIQIEKQ	FGKGSIMKMDA	.EVEPVQVVSTGSLGLD	V	ALGVGGLPRGR	68
NTDB id 1074 ABD1 RS10195 WP 000344167.1	MDEN	KSKALQAALSQIEKQ	FGKNTVMRLGDN	.TVQAVEAVSTGSLTLD	I	ALGIGGLPKGR	59
NTDB id 1022 ACIAD RS06390 WP 004925639.1	MDDN	KSKALQAALSQIEKQ	FGKNTVMRLGDN	.TVQAVEAVSTGSLTLD	I	ALGIGGLPKGR	59
NTDB id 1165 A1552VC RS01565 WP 000344154.1	MDEN	KQKALAAALGQIEKQ	FGKGSIMRLGDN	.RAMDVETISTGSLSLD	I	ALGAGGLPMGR	59
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NTDB id 409642 GQR50 RS02975 WP 011707431.1	MDQN	KQKALAAALGQIEKQ	FGKGSIMRLGDS	.KTMDIEAISTGSLSLD	V	ALGIGGLPCGR	59
NTDB id 1205 PSJM300 05545 AFN77183.1	MDEN	KKRALAAALGQIEKQ	FGKGAVMRMGDH	.DRQAIPSISTGSLGLD	I	ALGIGGLPKGR	59
consensus		* * *	* * *	* * *	* * *	* * *	


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NTDB id 600 KW2 RS01765 WP 011675413.1
NTDB id 269 KZH43 RS08665 WP 001085462.1
NTDB id 228 SPD RS09265 WP 001085462.1
NTDB id 194 SPR RS08825 WP 001085462.1
NTDB id 159 SP RS09750 WP 001085462.1
NTDB id 527 SMSK321 RS11065 WP 001085454.1
NTDB id 499 SM12261 RS08315 WP 078228268.1
NTDB id 453 Spy49 1753c ACI62003.1
NTDB id 408 SMU RS09530 WP 002262392.1
NTDB id 115 BSU 16940 NP 389576.2
NTDB id 625 LCA RS02525 WP 011374196.1
NTDB id 1313 DR RS12030 WP 010888966.1
NTDB id 1245 Cj1673c YP 002345041.1
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NTDB id 1211 C694 RS00795 WP 000963128.1
NTDB id 1334 RAOC RS04870 WP 004918236.1
NTDB id 1389 A4U84 RS07560 WP 021112712.1
NTDB id 1130 NGFG RS03960 WP 003688695.1
NTDB id 1124 NGFG RS03960 WP 003688695.1
NTDB id 1123 OK783 RS03845 WP 003688695.1
NTDB id 1427 RS RS02760 WP 011000510.1
NTDB id 1074 ABD1 RS10195 WP 000344167.1
NTDB id 1022 ACIAD RS06390 WP 004925639.1
NTDB id 1165 A1552VC RS01565 WP 000344154.1
NTDB id 1142 GTF74 RS11550 WP 000344154.1
NTDB id 409642 QGR50 RS02975 WP 011707431.1
NTDB id 1205 PSJM300 05545 AFN77183.1
consensus

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NTDB id 600 KW2 RS01765 WP 011675413.1	DEKIGQGA	EKAKNYLKEHQDV	DEIDHKVRAAHG	LDDSEVAETEEETT	ASKTKAK	AKKEEKAVETEEIELELED		387
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NTDB id 228 SPD RS09265 WP 001085462.1	DEKIGQGS	ENAKKYLAEHPEIF	DEIDKQVRSKFGL	IDGEEVSEQDTENKK	DE	PKKEEA..VNEEVPLDLGDELEI		384
NTDB id 194 SPR RS08825 WP 001085462.1	DEKIGQGS	ENAKKYLAEHPEIF	DEIDKQVRSKFGL	IDGEEVSEQDTENKK	DE	PKKEEA..VNEEVPLDLGDELEI		384
NTDB id 159 SP RS09750 WP 001085462.1	DEKIGQGS	ENAKKYLAEHPEIF	DEIDKQVRSKFGL	IDGEEVSEQDTENKK	DE	PKKEEA..VNEEVPLDLGDELEI		384
NTDB id 527 SMSK321 RS11065 WP 001085454.1	DEKIGQGS	ENAKKYLADNPEVFAE	IDHQVRVQFGL	IDGEEAAE	SKKDE	VAQVDS..VNEEVTLDLGDELEI		380
NTDB id 499 SM12261 RS08315 WP 078228268.1	DEKIGQGS	ENAKKYLADNPEIF	DEIDHQVRVQFGL	IDGEEIAE	SKKDE	AAQVDS..VNEEVTLDLGDELEI		380
NTDB id 453 Spy49 1753c ACI62003.1	GEKIGQGS	ENAKRYLADHPQLF	DEIDRKVRVKFGL	LEESEEEESAMAVASE	E.....	TDDLALDLNNGIEI		376
NTDB id 408 SMU RS09530 WP 002262392.1	GEKIGQGS	ENAKKFLADNPEIF	DDIDHKVRVQYGL	IEEDNTEEKQSSKEK	ETDEK..	ADKNLVLELDDTIEL		381
NTDB id 115 BSU 16940 NP 389576.2	EERLGGG	RENAKQFLKENKDIM	LMIQEQIREHYGL	DNNGVVQQAEETQEEL	EFEE..E.....			348
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NTDB id 1313 DR RS12030 WP 010888966.1	DERIGQG	KEKTIAYIAERPEME	QEIRDRVMAAIRAGN	AGEAPALAPAPAAPEAA	EA.....			363
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NTDB id 1214 NCTC11637 00359 SQJ03206.1	DKKLGGG	RENAKALLKEDKALA	DEITLKI	KESIGSNEEIMPLPDEPLEEME				347
NTDB id 1211 C694 RS00795 WP 000963128.1	DKKLGGG	RENAKALLKEDKALA	DEITLKI	KESIGSNEEIMPLPDEPLEEME				347
NTDB id 1334 RAOC RS04870 WP 004918236.1	DTKLGGG	RDITVKELIKDNPELA	ELEAKIREKLQAK					343
NTDB id 1389 A4U84 RS07560 WP 021112712.1	GTKIGQG	KNNAVKWLKENPEIA	DKLEQEIRNTLAS	NPNSVLKATASDSN	DESD...VEE...FSEEL			372
NTDB id 1130 NGFG RS03960 WP 003688695.1	GAKIGQG	KDNVRVWLKENPEIS	DEIDAKIRALNGVEMHIT	EGTQDET	DGERPEE			348
NTDB id 1124 NGFG RS03960 WP 003688695.1	GAKIGQG	KDNVRVWLKENPEIS	DEIDAKIRALNGVEMHIT	EGTQDET	DGERPEE			348
NTDB id 1123 OK783 RS03845 WP 003688695.1	GAKIGQG	KDNVRVWLKENPEIS	DEIDAKIRALNGVEMHIT	EGTQDET	DGERPEE			348
NTDB id 1427 RS RS02760 WP 011000510.1	GERIGQG	RDNCREFLRENAELARE	IEENKVREHLGVTPM	GAVTLAAEEVEED				352
NTDB id 1074 ABD1 RS10195 WP 000344167.1	GNKIGQG	KNNVIRYFEENNQIAE	EIERNIREQLLTGT	TNGAVQI.EDEE	EPDL...LLES			349
NTDB id 1022 ACIAD RS06390 WP 004925639.1	GNKIGQG	KNNVIRYLEENPQISTE	IEEAVIREQLLT	KASDQTAAHDETEE	EPDL...LES			349
NTDB id 1165 A1552VC RS01565 WP 000344154.1	GDKIGQG	KANACKYLLKENPEIA	AKTLDKKLREMLLN	PENMQLIAETSSAAD	DVEFGAVPEE	F.....		354
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NTDB id 409642 GQR50 RS02975 WP 011707431.1	GEKIGQG	KANVMKLF	ENKAMAGEVEARL	RELLLSGAVPVDDKAAPV	EAEFEFDAESEQE	FE.....		354
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consensus	***!!!	*****	**	*****	*****	**	**	*

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NTDB id 600 KW2 RS01765 WP 011675413.1		387
NTDB id 269 KZH43 RS08665 WP 001085462.1	EIEE	388
NTDB id 228 SPD RS09265 WP 001085462.1	EIEE	388
NTDB id 194 SPR RS08825 WP 001085462.1	EIEE	388
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NTDB id 408 SMU RS09530 WP 002262392.1	ED..	383
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NTDB id 1313 DR RS12030 WP 010888966.1		363
NTDB id 1245 Cj1673c YP 002345041.1		343
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NTDB id 1165 A1552VC RS01565 WP 000344154.1		354
NTDB id 1142 GTF74 RS11550 WP 000344154.1		354
NTDB id 409642 GQR50 RS02975 WP 011707431.1		354
NTDB id 1205 PSJM300 05545 AFN77183.1		347

consensus

 non conserved
 similar
 ≥ 50% conserved