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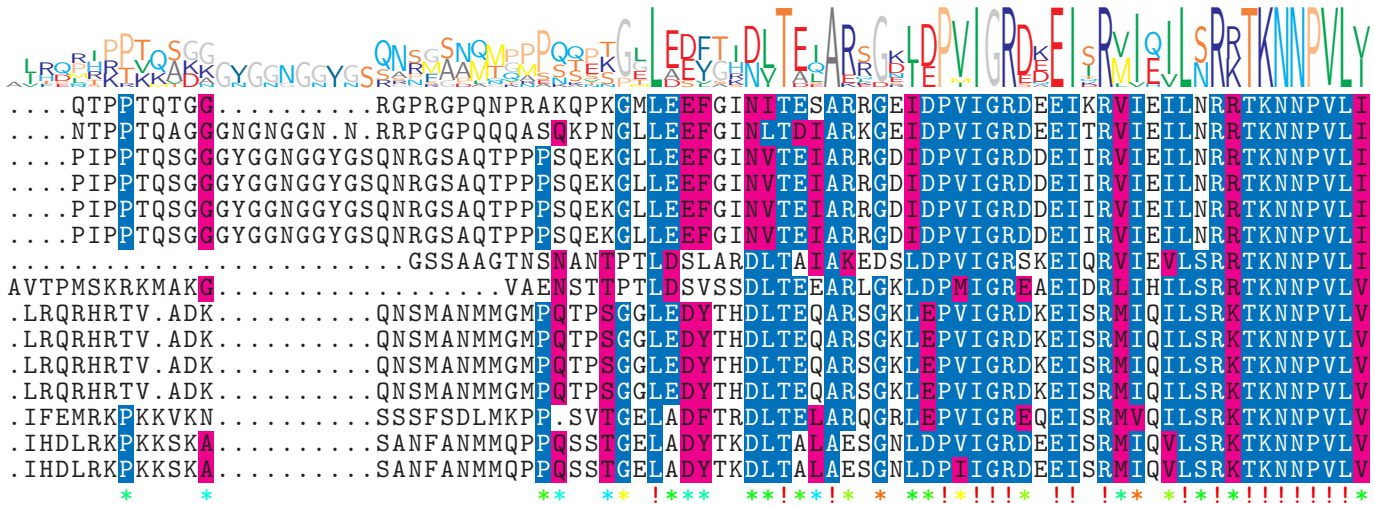
NTDB	id	601	KW2	RS02615	WP	021036805.1					MTCQNCNINEA	TI	13
NTDB	id	378	SMU	RS02690	WP	002263569.1					MTCQNCKINEA	TI	13
NTDB	id	281	KZH43	RS03550	WP	000882517.1					MTCQNCKINDS	TI	13
NTDB	id	245	SPD	RS03860	WP	000882517.1					MTCQNCKINDS	TI	13
NTDB	id	243	SPR	RS03635	WP	000882517.1					MTCQNCKINDS	TI	13
NTDB	id	241	SP	RS04015	WP	000882523.1					MTCQNCKINDS	TI	13
NTDB	id	85	BSU	O0860	NP	387967.1				.MMFGRFTERAQKVLALAQEEALARLGHNNIGTEHLLGLVREGEGTAAAKALQALGLGSEKIQEVEESLI.....GRGQEMS		75	
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NTDB	id	287	SP	RS11210	WP	001109712.1				MNYSKALNECIESAYMVAGHFHGARYLESWHLLIAMSNHSYSVAGATLNNDYPYEMDRLE....EVALELTETDYSQDET	F	75	
NTDB	id	97994	R8566	RS11230	WP	001109701.1				MNYSKALNECIESAYMVAGHFHGARYLESWHLLIAMSNHSYSVAGATLNNDYPYEMDRLE....EVALELTETDYSQDET	F	75	
NTDB	id	290	KZH43	RS10025	WP	001109677.1				MNYSKALNECIESAYMVAGHFHGARYLESWHLLIAMSNHSYSVAGATLNNDYPYEMDRLE....EVALELTETDYSQDET	F	75	
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NTDB	id	297	STER	RS00545	WP	011680614.1				...MTIYSRKMQAIFHRAQLEAERFESPFLLETWHVLLAMVEVTGSVAYLTFTDFEDRIHSEEIETA AVLAMEKRPKDLSES DI	I	81	
NTDB	id	329	STU	RS10020	WP	011225298.1				...MTIYSRKMQAIFHRAQLEAERFESPFLLETWHVLLAMVEVPGSVAYLTFTDFEDRIHSEEIETA AVLAMEKRPKDLSED I	I	81	
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NTDB	id	601	KW2	RS02615	WP	021036805.1	HLYTSVNGQKKQIDLCQNCYQI...MKS	GGQ	EAL	FG	AGNAS	NGNSDE		PFNP	FND	I	FSA	LGGQ	DFNGAASN	.	80																																																							
NTDB	id	378	SMU	RS02690	WP	002263569.1	HLYANVNGQKKQIDLCQNCYQI...MKTDP	ENG	PLNH	SQ	QNSS		INPFFD	DF	FGD	LNN	FR	A	FNNQ	DLP	.	79																																																						
NTDB	id	281	KZH43	RS03550	WP	000882517.1	HLYTNLNGKQKKQIDLCQNCYKI...IKTDP	NNS	LF	KG	MTD	LNNRD		FDP	FG	DF	FND	LNN	FR	PSS	N..TP	.	76																																																					
NTDB	id	245	SPD	RS03860	WP	000882517.1	HLYTNLNGKQKKQIDLCQNCYKI...IKTDP	NNS	LF	KG	MTD	LNNRD		FDP	FG	DF	FND	LNN	FR	PSS	N..TP	.	76																																																					
NTDB	id	243	SPR	RS03635	WP	000882517.1	HLYTNLNGKQKKQIDLCQNCYKI...IKTDP	NNS	LF	KG	MTD	LNNRD		FDP	FG	DF	FND	LNN	FR	PSS	N..TP	.	76																																																					
NTDB	id	241	SP	RS04015	WP	000882523.1	HLYTNLNGKQKKQIDLCQNCYKI...IKTDP	NNS	LF	KG	MTD	LNNRD		FDP	FG	DF	FND	LNN	FR	PSS	N..TP	.	76																																																					
NTDB	id	85	BSU	O0860	NP	387967.1	QTIHYTPRAKKVIELSMDEARKLGHSYV	GTE	HL	LL	GL	IRE	GEGVAARV	LNN	L	GV	SL	NKAR	QQVL	QL		LC	SNET		147																																																			
NTDB	id	610	V4T04	RS10165	WP	012897346.1	STLRFSPRAFEVMTAASFLAIHNSEAV	GTE	HL	Y	ALL	QVE	D	G	FL	QL	KL		QKINIV	S	RKE	LE	KRT	GL	KV	P	ES	SK	153																																															
NTDB	id	287	SP	RS11210	WP	001109712.1	TELPFSRRLQVLFD	EA	EY	VAS	V	HAKV	L	GTE	HV	Y	AIL	H	D	G	NAL	AT	R	L	ER	A	G	F	S	Y	E	D	K	K	D	Q	V	K	I	A	A	L	R	R	N	L	E	E	R	A	G	W	T	R	E	D	L	K	A	160																
NTDB	id	97994	R8566	RS11230	WP	001109701.1	TELPFSRRLQVLFD	EA	EY	VAS	V	HAKV	L	GTE	HV	Y	AIL	H	D	G	NAL	AT	R	L	ER	A	G	F	S	Y	E	D	K	K	D	Q	V	K	I	A	A	L	R	R	N	L	E	E	R	A	G	W	T	R	E	D	L	K	A	160																
NTDB	id	290	KZH43	RS10025	WP	001109677.1	TELPFSRRLQILFD	EA	EY	VAS	V	HAKV	L	GTE	HV	Y	AIL	H	D	G	NAL	AT	R	L	ER	A	G	F	S	Y	E	D	K	K	D	Q	V	K	I	A	A	L	R	R	N	L	E	E	R	A	G	W	T	R	E	D	L	K	A	160																
NTDB	id	289	SPD	RS10700	WP	001109677.1	TELPFSRRLQILFD	EA	EY	VAS	V	HAKV	L	GTE	HV	Y	AIL	H	D	G	NAL	AT	R	L	ER	A	G	F	S	Y	E	D	K	K	D	Q	V	K	I	A	A	L	R	R	N	L	E	E	R	A	G	W	T	R	E	D	L	K	A	160																
NTDB	id	377	SMU	RS09275	WP	002262344.1	MILEQSHALKRTL	EA	AAA	I	S	Q	V	T	HAK	E	V	GTE	HV	L	F	A	M	L	N	P	N	L	L	A	T	R	L	E	L	V	G	F	HAK	D	D	G	E	S	I	R	L	L	D	R	K	V	T	E	R	Y	A	G	F	S	K	E	D	I	K	A	164									
NTDB	id	329	STER	RS00545	WP	011680614.1	DLRAQSPALEAML	Q	E	A	Q	E	I	A	S	V	T	G	A	E	V	G	S	H	V	L	M	A	F	L	L	H	K	D	L	M	V	C	R	L	E	V	A	G	F	Q	Y	K	D	S	D	K	P	R	I	I	D	L	R	R	S	L	E	R	N	A	G	L	S	K	Q	D	L	K	A	166
NTDB	id	297	STU	RS10020	WP	011225298.1	DLRAQSPALEAML	Q	E	A	Q	G	I	A	S	V	T	G	A	E	V	G	S	H	V	L	M	A	F	L	L	H	K	D	L	M	V	C	R	L	E	V	A	G	F	Q	Y	K	D</																											

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NTDB id 601 KW2 RS02615 WP 021036805.1
NTDB id 378 SMU RS02690 WP 002263569.1
NTDB id 281 KZH43 RS03550 WP 000882517.1
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NTDB id 243 SPR RS03635 WP 000882517.1
NTDB id 241 SP RS04015 WP 000882523.1
NTDB id 85 BSU 00860 NP 387967.1
NTDB id 610 V4T04 RS10165 WP 012897346.1
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NTDB id 97994 R8566 RS11230 WP 001109701.1
NTDB id 290 KZH43 RS10025 WP 001109677.1
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NTDB id 377 SMU RS09275 WP 002262344.1
NTDB id 297 STER RS00545 WP 011680614.1
NTDB id 329 STU RS10020 WP 011225298.1
consensus



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NTDB id 601 KW2 RS02615 WP 021036805.1
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NTDB id 297 STER RS00545 WP 011680614.1
NTDB id 329 STU RS10020 WP 011225298.1
consensus



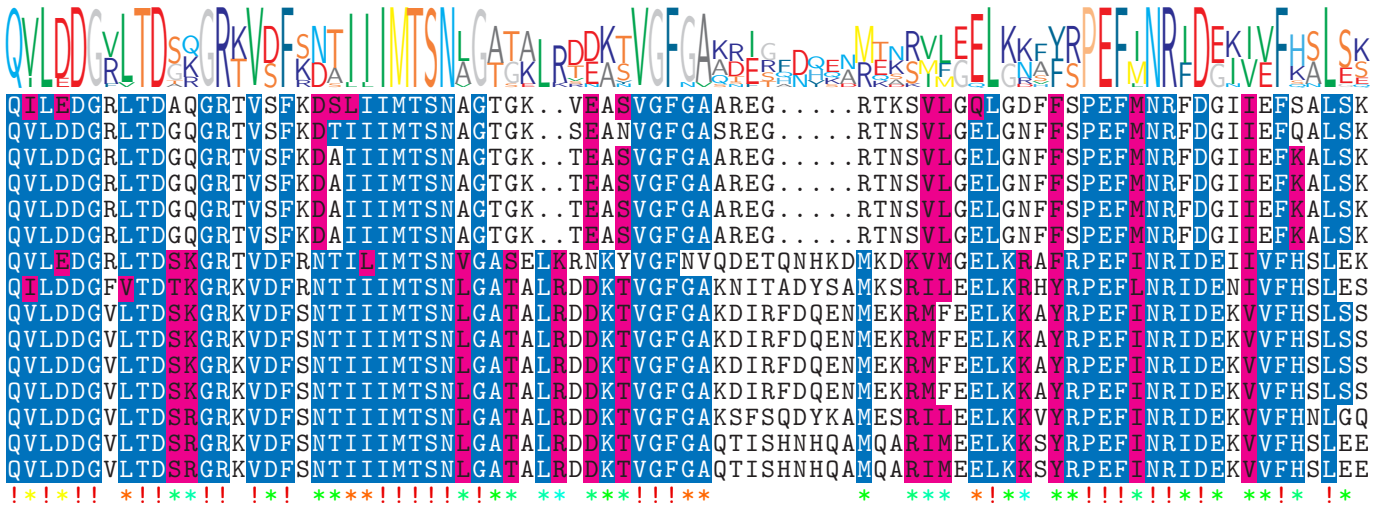
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NTDB id 378 SMU RS02690 WP 002263569.1	KLDKENTP	VITEKN	IEVI	VEQK	TNIPVGEL	LKEKE	EQSQL	IHLADD	DLKTRVIGQDA	AVDKI	AKAIRNRV	CLGTPN	RPIGSFL	LFVGP	489	
NTDB id 281 KZH43 RS03550 WP 000882517.1	KITDQDTP	IISEKT	IEHI	IEQK	TNIPVGD	LKEKE	EQSQL	IHLAED	LKSHVIGQDD	DAVDK	IAKAIRNRV	CLGTPN	RPIGSFL	LFVGP	488	
NTDB id 245 SPD RS03860 WP 000882517.1	KITDQDTP	IISEKT	IEHI	IEQK	TNIPVGD	LKEKE	EQSQL	IHLAED	LKSHVIGQDD	DAVDK	IAKAIRNRV	CLGTPN	RPIGSFL	LFVGP	488	
NTDB id 243 SPR RS03635 WP 000882517.1	KITDQDTP	IISEKT	IEHI	IEQK	TNIPVGD	LKEKE	EQSQL	IHLAED	LKSHVIGQDD	DAVDK	IAKAIRNRV	CLGTPN	RPIGSFL	LFVGP	488	
NTDB id 241 SP RS04015 WP 000882523.1	KITDQDTPS	IISEKT	IEHI	IEQK	TNIPVGD	LKEKE	EQSQL	IHLAED	LKSHVIGQDD	DAVDK	IAKAIRNRV	CLGTPN	RPIGSFL	LFVGP	488	
NTDB id 85 BSU 00860 NP 387967.1	EKQGGENSE	VTVDD	IAMV	VSSW	TGVPVSK	IAQTET	DKLLN	MENIL	LHSRVIGQDE	EAVVAVAKAV	RRARACL	KDPK	RPIGSFL	FLGP	546	
NTDB id 610 V4T04 RS10165 WP 012897346.1	SVKEDKRQE	VTDQA	VVAVASTL	TGVPIT	QMTKSE	ESDR	LINLEK	ELHKRV	VGQEEAT	ISAVS	RAIRRAR	GVADSR	RP	GSF	FLGP	555
NTDB id 287 SP RS11210 WP 001109712.1	EVVPV.YKD	LVTESD	ILTTLSRL	SGIPVQKL	TQTD	AKKYL	NLEAEL	LHKRVIGQD	QAVSS	ISRAIRN	NQS	GIRSHK	RPIGSFM	FLGP	550	
NTDB id 97994 R8566 RS11230 WP 001109701.1	EVVPV.YKD	LVTESD	ILTTLSRL	SGIPVQKL	TQTD	AKKYL	NLEAEL	LHKRVIGQD	QAVSS	ISRAIRN	NQS	GIRSHK	RPIGSFM	FLGP	550	
NTDB id 290 KZH43 RS10025 WP 001109677.1	EVVPV.YKD	LVTESD	ILTTLSRL	SGIPVQKL	TQTD	AKKYL	NLEAEL	LHKRVIGQD	QAVSS	ISRAIRN	NQS	GIRSHK	RPIGSFM	FLGP	550	
NTDB id 289 SPD RS10700 WP 001109677.1	EVVPV.YKD	LVTESD	ILTTLSRL	SGIPVQKL	TQTD	AKKYL	NLEAEL	LHKRVIGQD	QAVSS	ISRAIRN	NQS	GIRSHK	RPIGSFM	FLGP	550	
NTDB id 377 SMU RS09275 WP 002262344.1	KPLLKKRAE	VKVED	ILATLSKL	SGIPVKKL	TQAD	SKKYL	NLEREL	LHKRVIGQD	DAVSS	ISRAIRN	NQS	GIRVGG	RPIGSFM	FLGP	553	
NTDB id 297 STER RS00545 WP 011680614.1	KAKFPKPA	LVDADQ	IMQTL	SRL	SGIPVEKM	TQTD	SKRYL	NLESEL	LHKRVIGQDE	AVSA	ISRAIRN	NQS	GIRTGK	RPIGSFM	FLGP	556
NTDB id 329 STU RS10020 WP 011225298.1	KAKFPKPA	LVDADQ	IMQTL	SRL	SGIPVEKM	TQTD	SKRYL	NLESEL	LHKRVIGQDE	AVSA	ISRAIRN	NQS	GIRTGK	RPIGSFM	FLGP	556
consensus	*	*****	*	**	*****!	*	*	*****	!* *	*****!	*****!	!*	* * *!	*****!	!	

NTDB id 601 KW2 RS02615 WP 021036805.1	TGVGKTELAKQLAKE	LFGSSSES	MIRFDMSEYMEKH	SVAK	LIGAPPGYGVGYE	EAGQ	LTERVVRNPYS	LILL	DETEKAHPD	VMH	MFL	567	
NTDB id 378 SMU RS02690 WP 002263569.1	TGVGKTEL	SKQLAIELFGS	EDS	MIRFDMSEYMEKH	AVAK	LVGAPPGYGVGYE	EAGQ	LTEKVRNPYS	LILL	DEVEKAHPD	VMH	MFL	574
NTDB id 281 KZH43 RS03550 WP 000882517.1	TGVGKTEL	SKQLAIELFGS	ADS	MIRFDMSEYMEKH	SVAK	LVGAPPGYGVGYE	EAGQ	LTEKVRNPYS	LILL	DEVEKAHPD	VMH	MFL	573
NTDB id 245 SPD RS03860 WP 000882517.1	TGVGKTEL	SKQLAIELFGS	ADS	MIRFDMSEYMEKH	SVAK	LVGAPPGYGVGYE	EAGQ	LTEKVRNPYS	LILL	DEVEKAHPD	VMH	MFL	573
NTDB id 243 SPR RS03635 WP 000882517.1	TGVGKTEL	SKQLAIELFGS	ADS	MIRFDMSEYMEKH	SVAK	LVGAPPGYGVGYE	EAGQ	LTEKVRNPYS	LILL	DEVEKAHPD	VMH	MFL	573
NTDB id 241 SP RS04015 WP 000882523.1	TGVGKTEL	SKQLAIELFGS	ADS	MIRFDMSEYMEKH	SVAK	LVGAPPGYGVGYE	EAGQ	LTEKVRNPYS	LILL	DEVEKAHPD	VMH	MFL	573
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NTDB id 610 V4T04 RS10165 WP 012897346.1	TGVGKTELAKALADS	VFGS	EDN	MIRVDMSEFMEKH	ST	SRLIGAPPGYGVGYE	DEGGQ	LTERVRNKPYS	VLL	DEVEKAHPD	VN	IML	640
NTDB id 287 SP RS11210 WP 001109712.1	TGVGKTELAKALA	EVLFDD	ESAL	IRFDMSEYMEK	FAA	SRLNGAPPGYGVGYE	EGGE	LTEKVRNKPYS	VLL	DEVEKAHPD	IFN	VLL	635
NTDB id 97994 R8566 RS11230 WP 001109701.1	TGVGKTELAKALA	EVLFDD	ESAL	IRFDMSEYMEK	FAA	SRLNGAPPGYGVGYE	EGGE	LTEKVRNKPYS	VLL	DEVEKAHPD	IFN	VLL	635
NTDB id 290 KZH43 RS10025 WP 001109677.1	TGVGKTELAKALA	EVLFDD	ESAL	IRFDMSEYMEK	FAA	SRLNGAPPGYGVGYE	EGGE	LTEKVRNKPYS	VLL	DEVEKAHPD	IFN	VLL	635
NTDB id 289 SPD RS10700 WP 001109677.1	TGVGKTELAKALA	EVLFDD	ESAL	IRFDMSEYMEK	FAA	SRLNGAPPGYGVGYE	EGGE	LTEKVRNKPYS	VLL	DEVEKAHPD	IFN	VLL	635
NTDB id 377 SMU RS09275 WP 002262344.1	TGVGKTELAKALA	EVLFDD	ESAL	IRFDMSEYMEK	FAA	SRLNGAPPGYGVGYE	EGGE	LTEKVRNKPYS	VLL	DEVEKAHPD	IFN	ILL	638
NTDB id 297 STER RS00545 WP 011680614.1	TGVGKTELAKALA	EVLFDD	ESAL	LLRFDMSEYMEK	FAA	SRLNGAPPGYGVGYE	EGGE	LTEKVRNKPYS	VLL	DETEKAHPD	IFN	ILL	641
NTDB id 329 STU RS10020 WP 011225298.1	TGVGKTELAKALA	EVLFDD	ESAL	LLRFDMSEYMEK	FAA	SRLNGAPPGYGVGYE	EGGE	LTEKVRNKPYS	VLL	DETEKAHPD	IFN	VLL	641
consensus	!!!!!!!*	*!!	*	*!!*!!*!!*!!	**!	*!!*!!*!!*!!	*!!*!!	!!*!!	*!!*!!	!!*!!*!!	!!*!!*!!	!!*!!*!!	641

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NTDB id 601 KW2 RS02615 WP 021036805.1
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NTDB id 329 STU RS10020 WP 011225298.1
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NTDB id 297 STER RS00545 WP 011680614.1
NTDB id 329 STU RS10020 WP 011225298.1
consensus



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NTDB id 601 KW2 RS02615 WP 021036805.1	ISNQTQETAETTDDEEVPAE	748
NTDB id 378 SMU RS02690 WP 002263569.1	VIKASNK.VETVTKATSD.	753
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NTDB id 245 SPD RS03860 WP 000882517.1	QIKSAKK.AEVKSSEKEK.	752
NTDB id 243 SPR RS03635 WP 000882517.1	QIKSAKK.AEVKSSEKEK.	752
NTDB id 241 SP RS04015 WP 000882523.1	QIKSAKK.AEVKSSEKEK.	752
NTDB id 85 BSU 00860 NP 387967.1	VVKTTAKTN.....	810
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NTDB id 377 SMU RS09275 WP 002262344.1	KFDIV.....	813
NTDB id 297 STER RS00545 WP 011680614.1	TFTVV.....	816
NTDB id 329 STU RS10020 WP 011225298.1	TFTVV.....	816
consensus		



-  non conserved
-  similar
-  ≥ 50% conserved