```
logo
NTDB id 51852 SCIM RS01855 WP 003078276.1   MKSSKWIIATGIVLSAGILLAGC.GKSSSSTSTYSYVYTQDPDTLNYLMANRATTSDVVTNLVDGLLENDRYGNLVPALAKSWTV   84
NTDB id 475 HSISS4 RS07005 WP 021143809.1   MKKSKWLALAGVALLSVGALAACSSKSSTSGTTYGYVYNSDPESLDYITSNTGPTKTIAVTNGVDGLMEADKYGNLVPSVAEDWSV   85
NTDB id 324 STU RS16140 WP 011226306.1      MKKSKWLALAGVALLGVGVLAACSSKSNTSGTTYGYVYSSDPETLDYITSNTGPTKSVVTNGVDGLMEADKYGNLVPSVAEDWSV   85
NTDB id 292 STER RS06940 WP 011681419.1    MKKSKWLALAGVALLGVGVLAACSSKSNTSGTTYGYVYSSDPETLDYITSNTGPTKSVVTNGVDGLMEADKYGNLVPSVAEDWSV   85
consensus                                   !!*!!!****!**!*****!!*!**!! *!**!!*!!!**!!**!*!***!***!***!!!*!!!!*!*!*!!!!!!**!**!*!

logo
NTDB id 51852 SCIM RS01855 WP 003078276.1   SKDGLTYTYKLRKDAKWYTSEGEEYAGVKAQDFVTGLKYAADNKSEALYLVQDSVKGLDAYIKGETKDFSKVGVKAIDDYTVQYT   169
NTDB id 475 HSISS4 RS07005 WP 021143809.1   SQDGLTYTYKIRKGVKWYTSDGEEYADVTAKDFVTGLKHAADGKAGALYLVQDSIAGLSDYLSGANKDFSNVGVKAIDDYTLQYT   170
NTDB id 324 STU RS16140 WP 011226306.1      SKDGLTYTYKIRKGIKWYTSEGEEYANVTAKDFVTGLKHAADSKAGGIYLVQDSIAGLSDYLSGTNKDFSNVGVKAIDEYTLQYT   170
NTDB id 292 STER RS06940 WP 011681419.1    SKDGLTYTYKIRKGIKWYTSEGEEYANVTAKDFVTGLKHAADSKAGGIYLVQDSIAGLSDYLSGTNKDFSNVGVKAIDDYTLQYT   170
consensus                                   !*!!!!!!!!*!!**!!!!!*!!!!!*!*!*!!!!!!*!!!*!****!!!!!!**!!**!**!**!!!!*!!!!!!!*!!*!!!

logo
NTDB id 51852 SCIM RS01855 WP 003078276.1   LSRAETYWNSKTTNNILFPVNAAFLKSQGKNFGS.VKPSSILYNGPYLLKSLTAKSSMEFAKNPHYYDKKNVHLDNIKLTYYDGS   253
NTDB id 475 HSISS4 RS07005 WP 021143809.1   LKKPEPYWNSKTTYGLLSPVNEDFLKNKGKDFGKSTDPTSILYNGPFLLKSLTAKSSIELTKNENYWDKKNVHFDAIKLSYYDGS   255
NTDB id 324 STU RS16140 WP 011226306.1      LKQPEPYWNSKTTYSLLFPVNEDFLKNKGKDFGKSTDPTSILYNGPFLLKSLTAKSSIELVKNEHYWDKKNVHFDAIKFSYYDGS   255
NTDB id 292 STER RS06940 WP 011681419.1    LKQPEPYWNSKTTYSLLFPVNEDFLKNKGKDFGKSTDPTSILYNGPFLLKSLTAKSSIELVKNEHYWDKKNVHFDAIKFSYYDGS   255
consensus                                   !***!*!!!!!!!***!*!!!**!!!**!!*!!****!*!!!!!!!*!!!!!!!!!!!*!**!!**!*!!!!!!*!*!! *!!!!!

logo
NTDB id 51852 SCIM RS01855 WP 003078276.1   DQEALIRNFTEGAYSAARLYPNSSSFASVKKQYNNNIIYSLQDATSYYYNFNLNRQSYHHTSKKTDAQKTATQEAVLNKAFRQAI   338
NTDB id 475 HSISS4 RS07005 WP 021143809.1   DQEALERGFTDGAYSLARVYPTSSNYSSVEKKYKDNIYYTAPGASTSAIGVNIDRQSYKFSAKKTDAEKTSTKKALLNKDFRQSI   340
NTDB id 324 STU RS16140 WP 011226306.1      DQDALVRGFTDGAYNFARVFPTSSNYASVEKKYKDNIYYTAPGASTSAIGINLDRQSYKYTAKKTDSEKSSTKKALLNKDFRQAI   340
NTDB id 292 STER RS06940 WP 011681419.1    DQDALVRGFTDGAYNFARVFPTSSNYASVEKKYKDNIFYTAPGASTSAIGINIDRQSYKYTAKKTDSEKSSTKKALLNKDFRQAI   340
consensus                                   !!*!!*!*!!*!!! *!!**!*!!***!!*!*!**!!*!****!*******!**!!!!****!!!! *!**!**!*!!!*!!!*!

logo
NTDB id 51852 SCIM RS01855 WP 003078276.1   NFAYNRTSYGAQSNGKDGATKVLRNTLVPPTFVSIGDKTFGDLVSSKLVKYGSEWSDMNLADAQDAYYNPAKAKVKFAQAKAELQ   423
NTDB id 475 HSISS4 RS07005 WP 021143809.1   NFAIDRTAYQSQMNGKDGAALALRNLFVPSDFVSAGDKTFGDLVTEKMSSYGDEWSGVNFTDGQDGLYNAEKAKTEFAKAKETLQ   425
NTDB id 324 STU RS16140 WP 011226306.1      NFAIDRKAYQSQINGKDGATLAVRNLFVPSDFVSAGDKTFGDLVTEKMSSYGDEWSGVNFADSQDGLYNAEKAKTEFAKAKDALQ   425
NTDB id 292 STER RS06940 WP 011681419.1    NFAIDRKAYQSQINGKDGATLGVRNLFVPSDFVSAGDKTFGDLVTEKMSSYGDEWSGVNLADSQDGLYNAEKAKTEFAKAKDALQ   425
consensus                                   !!!**! *!**!*!!!!!!****!!**!!**!!!*!!!!!!!!!**!***!!*!!!!** *!*!!**!!**!!!**!!*!!**!!

logo
NTDB id 51852 SCIM RS01855 WP 003078276.1   AKGVQFPIHLDVPADQTSKIGVQWESSMKQSVESVLGKDNVVIDIQQMSSDELNNIGYFANTAAQKDYDLYNG.GWSGDYQDPST   507
NTDB id 475 HSISS4 RS07005 WP 021143809.1   ADGVQFPIHLDLPVDQSSKINVAQAQSLKQTIEQSLGSDNVVIDVNQLSSDDIQNATLNAANAAAEDWDISNGVIWGPDYQDPST   510
NTDB id 324 STU RS16140 WP 011226306.1      ADGVQFPIHLDLPVDQSSKLNVAQAQSLKQTIEKSLGSENVVIDINQLSSDDLENVTLNAANAAAEDWDISNSVAWAPDYQDPST   510
NTDB id 292 STER RS06940 WP 011681419.1    ADGVQFPIHLDLPVNQSSKLNVAQVQSLKQTIEKSLGSENVVIDINQLSSDDLENATLNAANAAAEDWDISNSVGWAPDYQDPST   510
consensus                                   !*!!!!!!!!!!*!**!*!!**!****!*!!**!**!!**!!!!!**!*!!!***!****!**!!**!*!**! **!**!!!!!!!
```

```
logo                                      YLDIFKTTSSENTKAFMGYDDPNNAAAAQVGLKDYDALLNSAASETSDLNVRYDRYAQAQAWLEDSSLVIPLTVGNGAAPVISRL
                                          YLDTLNTKNGGSLKNFGLEPGQENDKIKTVGLDTYTTMLEEANAETNE.MKRYEKYAEAQAWLIDSGLTMPNL.SLGGTPSVTKT
NTDB id 51852 SCIM RS01855 WP 003078276.1 YLDTLNTKNGGSLKNFGLEPGQENDKIKTVGLDTYTTMLEEANAETNE.MKRYEKYAEAQAWLIDSGLTMPNL.SLGGTPSVTKT   590
NTDB id 475 HSISS4 RS07005 WP 021143809.1 YLDIFKTTSSENTKTFMGYDDPNNAAAAQVGLKDYDALLDSAASETTDLNARYDRYAQAQAWLEDSSLVIPLTVGNGAAPVISRL   595
NTDB id 324 STU RS16140 WP 011226306.1    YLDIFKTTSSENTKAFMGYDDPNNAAAAQVGLKDYDALLNSAASETSDLNVRYDRYAQAQAWLEDSSLVIPLTVGNGAAPAISRL   595
NTDB id 292 STER RS06940 WP 011681419.1   YLDIFKTTSSENTKAFMGYDDPNNAAAAQVGLKDYDALLNSAASETSDLNVRYDRYAQAQAWLEDSSLVIPLTVGNGAAPVISRL   595
consensus                                 !!!***!******!*!*******!*****!!!**!***!**!**!!*****!!**!!*!!!!!*!!*!**!*****!**!*****

logo                                      TPFTGASLQVGDKNSSSDYIKYVKPQEKVVTKKEYEQSREKWLKEKKESNEKAQKDLEKHVK
                                          VPFSRSYSLVGIKGGSSNYFKYVKLQDKIVTTKEYESAKKKWLKEKEASNKRAQDNYENHVK
NTDB id 51852 SCIM RS01855 WP 003078276.1 VPFSRSYSLVGIKGGSSNYFKYVKLQDKIVTTKEYESAKKKWLKEKEASNKRAQDNYENHVK   652
NTDB id 475 HSISS4 RS07005 WP 021143809.1 TPFTGASMQVGDKNS.SDYFKYVKPQEKVVTKKEYEQSREKWLKEKKASNEKAQKDLEKHVK   656
NTDB id 324 STU RS16140 WP 011226306.1    TPFTGASLQVGDKNSSNDYIKYVKPQEKVVTKKEYEQSREKWLKEKKESNEKAQKDLEKHVK   657
NTDB id 292 STER RS06940 WP 011681419.1   TPFTGASLQVGDKNSSNDYIKYVKPQEKVVTKKEYEQSREKWLKEKKESNEKAQKDLEKHVK   657
consensus                                 *!!******!!*!*** *! !!!!*!*!*!!*!!!!****!!!!!!* !!**!!***!*!!!
```

X non conserved

X similar

X $\geq$ 50% conserved