```
logo
NTDB id 291154 DEH83 RS01335 WP 048800444.1   MAKQRNEIEEKYTWDLTTIFPTDEAFEMELAQVSKELKEASHLAGHLLDSADSLLKTTDIQMDLMRRIEKLYSYAHMKND   80
NTDB id 480 HSISS4 RS02090 WP 002890133.1     MSDNRTHLEEKYTWDLTTIFATDADWETEYESTVQDLKKASAYAGHLLDSAKNLLGATELYMSLMRRLEKIYVYASMKND   80
consensus                                     !  *! **!!!!!!!!!!!*!!  *! !      *!! !!* !!!!!!!!  !!  !** ! !!!!*!!*! !!*!!!!

logo
NTDB id 291154 DEH83 RS01335 WP 048800444.1   QDTRVAKYQEYQAKGMAIYSEFGQVFAFYEPEFMAITDEQYQVFLVEKPELQIYQHFFDKLLQKKPHILSQREEELLAGA   160
NTDB id 480 HSISS4 RS02090 WP 002890133.1     QDTTVGLYQEYQAKASNLYSQLSEAFAYFEPEFMALDDKKLAEFKEQEPGLGLYDHYFERLLANKDHVLSQEAEELLAAA   160
consensus                                     !!! !* !!!!!!!*  *!!     !!**!!!!!!* !     !    ! ! *! !*!**!!  !*!*!!!  !!!!!*!

logo
NTDB id 291154 DEH83 RS01335 WP 048800444.1   GEIFSAAGDTFGILDNADIVFPIVHDEEGNEVQLTHGNYISLVESKNRTVRKEAYEALYSVYEQYQHTYAKTLQTNVKVH   240
NTDB id 480 HSISS4 RS02090 WP 002890133.1     GDIFNGPTDTFNVLDNADILFPWVSDGQGDVVELTHGNFITLMESKDRDIRKGAYEAMYGTYEQFQHTYAQTLQGVVKVH   240
consensus                                     !*!! ** !!! *!!!!!!*!! !*!  !  ! !!!!!*!*!*!!! ! *!! !!!!*!  !!!*!!!!! !!!  !!!!

logo
NTDB id 291154 DEH83 RS01335 WP 048800444.1   NYNAKVRKFSSAREAALSANFIPESVYESLVSAVNKHLPLLHRYVQLRAKILGISDLKMYDVYTPLSEIDYKFTYEAALM   320
NTDB id 480 HSISS4 RS02090 WP 002890133.1     NYQAKVRHYNSARHAALAANFIPESVYDSLLESVNKHLPLLHRYLDLRKKVLGLDELKMYDVYTPLSETETALTYEESLK   320
consensus                                     !!*!!!!** !!!*!!! !!!!!!!!!*!!*  !!!!!!!!!!!* !! !*!!* *!!!!!!!!!!!! *   !!!  !

logo
NTDB id 291154 DEH83 RS01335 WP 048800444.1   KAEEVLAILGDDYLNRVKKAFSERWIDVCENQGKRSGAYSGGSYDTNAFMLLNWQDTLDNLFTLVHETGHSMHSSYTRET   400
NTDB id 480 HSISS4 RS02090 WP 002890133.1     KAEEVLAIFGEEYSKGVHAAFTERWIDVHPNKGKRSGAYSGGAYDTNAFMLLNWQDTLDNLFTLVHETGHSLHSTFTRQT   400
consensus                                     !!!!!!!! !**!    !* !!*!!!!!! *! !!!!!!!!!! !!!!!!!!!!!!!!!!!!!!!!!!!!!!!!*!!**!! !

logo
NTDB id 291154 DEH83 RS01335 WP 048800444.1   QPYVYGDYSIFLAEIASTTNENILTEKLLEEVDDDQTRFAILNHFLDGFRGTVFRQTQFAEFEHAIHKADQEGQVLTSEF   480
NTDB id 480 HSISS4 RS02090 WP 002890133.1     QPYVYGDYPIFLAEIASTTNENILTETLLKEVKDDKTRFAILNHYLDGFKGTVFRQTQFAEFEHAIHEADASGQILTADF   480
consensus                                     !!!!!!!!*!!!!!!!!!!!!!!!!! !! !! !! !!!!!!!!*!!!!*!!!!!!!!!!!!!!!!! !!   !!*!! *!

logo
NTDB id 291154 DEH83 RS01335 WP 048800444.1   LNNLYADLNEKYYGLTKEDNPQIQYEWARIPHFYYDYYVFQYATGFSAASALADKIVNGTQEDKEKYLHYLKAGNSDYPL   560
NTDB id 480 HSISS4 RS02090 WP 002890133.1     MNKLYADLNEKYYNLKAEDNYEIQFEWERIPHFYMNYYVYQYATGFAAASYLAEKIVHGTEEDKEAYLTYLKAGSSDYPL   560
consensus                                     *! !!!!!!!!!! !  !!!* !!*!! !!!!!!  !!!*!!!!!! !!! !!*!!!*!! !!!! !!*!!!!! !!!!!
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logo
                                                  NVIKKAGVDMEKEDYLNAAFAVFERRLDEFEALVEKLGLA.   600
NTDB id 291154 DEH83 RS01335 WP 048800444.1
NTDB id 480 HSISS4 RS02090 WP 002890133.1         EVIKKAGVDMTNTDYLDAAFKVFEDRLVELEALVEKGVHLS   601
consensus                                          !!!!!!!!!   !!! !!! !!! !! ! !!!!!!  * *
```

X non conserved

X similar

X $\geq$ 50% conserved