

CLUSTAL 2.1 MULTIPLE SEQUENCE ALIGNMENT

File: /media/morpheus/disk1/fst/pep_msa/ZNF648.pst Tue Feb 1 15:00:02 2022

Page 1 of 4

```

Homo_sapiens      -----
Pan_troglodytes   -----
Macaca_mulatta    -----
Bos_taurus        -----
Equus_caballus    -----
Canis_lupus_familiaris -----
Heterocephalus_glaber -----
Rattus_norvegicus -----
Mus_musculus      -----
Chelonia_mydas    MMVDS PAECGQGRAEFGRVFAGFVSTELAAVAEISK LAPVLRDRKPM AAAGATT LICGDC 60
Pavo_muticus      -----
Pavo_cristatus    -----
Gallus_gallus     -----
1.....10.....20.....30.....40.....50.....60

```

```

Homo_sapiens      -----
Pan_troglodytes   -----
Macaca_mulatta    -----
Bos_taurus        -----
Equus_caballus    -----
Canis_lupus_familiaris -----
Heterocephalus_glaber -----
Rattus_norvegicus -----
Mus_musculus      -----
Chelonia_mydas    GKS FARKSDFK VHQRIHTGERPYKCTYCSKG FYQAS MVR RHERTHTGEKPYRCSVCDKSF 120
Pavo_muticus      -----
Pavo_cristatus    -----
Gallus_gallus     -----
.....70.....80.....90.....100.....110.....120

```

```

Homo_sapiens      -----
Pan_troglodytes   -----
Macaca_mulatta    -----
Bos_taurus        -----
Equus_caballus    -----
Canis_lupus_familiaris -----
Heterocephalus_glaber -----
Rattus_norvegicus -----
Mus_musculus      -----
Chelonia_mydas    ARSTSL LIHQNTHTGDRPYEC PFCEKTFSDPSTLLQHRKMHMGLKPFHCGICNKSFSQSS 180
Pavo_muticus      -----
Pavo_cristatus    -----
Gallus_gallus     -----
.....130.....140.....150.....160.....170.....180

```

```

Homo_sapiens      -----
Pan_troglodytes   -----
Macaca_mulatta    -----
Bos_taurus        -----
Equus_caballus    -----
Canis_lupus_familiaris -----
Heterocephalus_glaber -----
Rattus_norvegicus -----
Mus_musculus      -----
Chelonia_mydas    SFTFHRATHNTDRPFVCS ECGKAFIRSTALLKHROT HVQKAFRCGECGKVFPKLSGLRSH 240
Pavo_muticus      -----
Pavo_cristatus    -----
Gallus_gallus     -----
.....190.....200.....210.....220.....230.....240

```

CLUSTAL 2.1 MULTIPLE SEQUENCE ALIGNMENT

File: /media/morpheus/disk1/fst/pep_msa/ZNF648.psl Tue Feb 1 15:00:02 2022

Page 2 of 4

| | | |
|------------------------|--|-----|
| Homo_sapiens | ----- | |
| Pan_troglodytes | ----- | |
| Macaca_mulatta | ----- | |
| Bos_taurus | ----- | |
| Equus_caballus | ----- | |
| Canis_lupus_familiaris | ----- | |
| Heterocephalus_glaber | ----- | |
| Rattus_norvegicus | ----- | |
| Mus_musculus | ----- | |
| Chelonia_mydas | ORMHAQGHRIEMELREEEQSRWNVPTLRFCAYDPLPDCLPLSLAVQPEESYYLTFSAYDL | 300 |
| Pavo_muticus | ----- | |
| Pavo_cristatus | ----- | |
| Gallus_gallus | ----- | |
| |250.....260.....270.....280.....290.....300 | |
| | | |
| Homo_sapiens | -----MAQVDSQDRWGEASPLSSLTTEEAH | 24 |
| Pan_troglodytes | -----MAQVDSQDRWGEASPLSSLTTEEAH | 24 |
| Macaca_mulatta | -----MAQVDSQDRWGEASPLSSLTTEEAH | 24 |
| Bos_taurus | -----MAQGDPODQWGDASPLCSLTGEAY | 24 |
| Equus_caballus | -----MAQVDPODRWDEVSPLCSLT---E | 21 |
| Canis_lupus_familiaris | -----MTOVDPOERWGVKVSALSNLTTEEAH | 24 |
| Heterocephalus_glaber | -----MAXVNFHNROGK-VPLGSLT---Q | 20 |
| Rattus_norvegicus | -----MAQVDSQERWTK-VALGGMI---R | 20 |
| Mus_musculus | -----MAQVDSQDRWTK-VPLG----- | 16 |
| Chelonia_mydas | MQSDKLGGSQWARTSMGDLQGKHRLKADIQKQKWKMASTECSERRDQEYPSSSSLAQGSY | 360 |
| Pavo_muticus | ----- | |
| Pavo_cristatus | ----- | |
| Gallus_gallus | ----- | |
| |310.....320.....330.....340.....350.....360 | |
| | | |
| | . :: | |
| Homo_sapiens | DTQMLSMNLESDDDEDGGEAEKEG-TADP---VACPRGSSPVTHENP--DLPWPHPLGKEE | 78 |
| Pan_troglodytes | DTQMLSMNLESDDDEDGGEAEKEG-TADP---VACPRGSSPVTHENP--DLPWPHPLGKEE | 78 |
| Macaca_mulatta | DTQMLSMNLESDDDEDGGEAKKEG-PADP---VACPRGSSPVTDNP--DLPWPHPLDKEE | 78 |
| Bos_taurus | DPGMLSVNLESEDEAPGKAGDQATGDPDQ-QARPRGSSQVTEENP--DLLWKHPACRKE | 81 |
| Equus_caballus | DPRMPSVNLGSEDEDDGGGETGDOGGTGDPDH-QARSKGSSQVTQDNP--DSRWQHPPGQKE | 78 |
| Canis_lupus_familiaris | DPRMLSVSLEREDEDDGGEAGDKSTGDPDH-QACFSSSSQVTQDNP--DLPWHHPSPS-ES | 80 |
| Heterocephalus_glaber | DTQMLSRDLEREDEDDGGEARNKGDIGEL-----CHSPGTHNHP--DLQGQPPSCKKE | 70 |
| Rattus_norvegicus | DSQTLNVNLESEEDDREG-----GSPVTQNT--DLQFDIQSCKEE | 60 |
| Mus_musculus | STQMLRMSLESEEDDGRKG-----GSPGTQNT--DSQFDIQSCKEE | 56 |
| Chelonia_mydas | GDRKKTNTTWCENDEGDEEEAEESDSDFHFGSGMQKDQDPVSSSSMPRESKAEDLLCEED | 420 |
| Pavo_muticus | -----MDAEVDWDSN-----STCDTG | 17 |
| Pavo_cristatus | -----MDAEVDWDSN-----STCDTG | 17 |
| Gallus_gallus | -----MDAEVDWDSN-----STCDTG | 17 |
| |370.....380.....390.....400.....410.....420 | |
| | | |
| | : . | |
| Homo_sapiens | EKFSDSS---SAGGMGQKPVEMSG-KASWSRDVTKINETQSGPGASRALGSLPSGLAHKL | 134 |
| Pan_troglodytes | EKFSDSS---SAGGMGQKPVEMSG-KASWNRDVTKIKETQSGPGASRALGTLPSGLAHKL | 134 |
| Macaca_mulatta | EKFSDSS---SAGDMGQKPVEMSG-KASWSRDVAKINETQSGPGASTALGTLPSGLAHKL | 133 |
| Bos_taurus | EKFSDSF---SAAGVGKKPMAPLRKKASWERDASKITPTEASPRASVTSPALPRGLARKW | 138 |
| Equus_caballus | EKVSDFS---RAGSVGKKPMATPGKKASWGRDESKITQDSPAETAPGVLPVLSGLSHKL | 135 |
| Canis_lupus_familiaris | EKFSSSF---SAGAMEKEPMVMPEKKASWGREKSNITQTDPPGPGAAPGTLPSDLRKL | 137 |
| Heterocephalus_glaber | EKFSDCF---TAQGVGQKPMEMSGKKPSXEREDCDITRAQDSLEAGMALDIFPGGLSHKL | 127 |
| Rattus_norvegicus | DNWSECF---RAGCVEQRPVKIPRKTNWGGRGWRITQTDSPGLQALGAPSRSLFLYK- | 116 |
| Mus_musculus | ENWPECF---SAGCVAQKPGEMPGKTSNGGKKASRITQIRDSPKLQALGAPSRSLHLK- | 112 |
| Chelonia_mydas | EVFYETFTLINANGVAKKLNMMVSLRKSDEDEESSKETLCQKWHSRPVRKPAVLRRSP | 480 |
| Pavo_muticus | EELSNDSE-----RKSTKEVGYSCLQEEVGMNYSQTHSPCRNSAGPS----- | 59 |
| Pavo_cristatus | EELSNDSE-----RKSTKEVGYSCLQEEVGMNYSQTHSPCRNSAGPS----- | 59 |
| Gallus_gallus | EELSNDSE-----RKSTKEVGYSCLQEEVGMNYSQTRSPRANAAGPS----- | 59 |
| |430.....440.....450.....460.....470.....480 | |

CLUSTAL 2.1 MULTIPLE SEQUENCE ALIGNMENT

File: /media/morpheus/disk1/fst/pep_msa/ZNF648.fst Tue Feb 1 15:00:02 2022

Page 3 of 4

```

      .               .               :
Homo_sapiens      LGQMQLPLGDRLPAGDDGYSGANQDAVLDPVPSFSPNGKYLCAHKSVDTSAGNSSI----- 189
Pan_troglodytes   LGQMQLPLGDRLPAGDDGDSRANQDAVLDPVPSFSPNGKYLCAHKSVDTCAGNSSI----- 189
Macaca_mulatta    LGQMQLPLGDRLPAGDDGDSRANQGTVLAVPSSFPNGKYLCAHKSADTSAEYNSI----- 188
Bos_taurus        FGETOPPRASLPAGDEADSRANLDATLGVP SNFLGSARYFRAQKDGDKSPDNSSAG----- 194
Equus_caballus    LGQRQPPGVSLPAGDDGDSRANLEAALGVPSFSGPGSYFRAQKVDRASNNSSI----- 190
Canis_lupus_familiaris LGRTQPLRDSLPGGDDGDSRANLDAALGVASNFPETGRYFCAQRGIDTSPEDSSI----- 192
Heterocephalus_glaber VDYTQSPRNSLPAGDDGDAKANQDTALNAPWGFLGPXECLCMQKGAATSPDSSSI----- 182
Rattus_norvegicus -VQMQLPLRDSV--GSDRVKKENKDPASEALTSTFLDTGGSFGTQNSLEASSLDKNSI----- 169
Mus_musculus      -VQIQPLRDSV--GSDGGKKANKDPASEVPNSFLDSGGYFEAQNVSVEASSLDKNSI----- 165
Chelonia_mydas    QGIKHFGRVLPSSSTEYVDITVVTLDSDLDDPARDSLPCNGMESIKSYMTRKVEGGVFPGNP 540
Pavo_muticus      -DKQELPTESQHEDKEIYQTYQKQGESTAGIFVPSSTNLDLQCEDKTLQRSSSE----- 113
Pavo_cristatus    -DKQELPTESQHEDKEIYQTYQKQGESTAGIFVPSSTNLDLQCEDKTLQRSSSE----- 113
Gallus_gallus     -DKQELPTESQHEDKEIYQTYQKQGESTAGIFVPSSTNLDLQCEDKTLQRSSSE----- 113
.....490.....500.....510.....520.....530.....540

```

```

      :
Homo_sapiens      -LCFPRPGSNWDLPTQETH-----TPACASATPASLA-AAVLAKARNSRKVQNOAGRREGG 243
Pan_troglodytes   -LCFPRPGSNWDLPTQETH-----TPACASATPASLA-AAVLAKARNSRKVQNOAGRREGG 243
Macaca_mulatta    -LCFPRPGSNWDLSTRETH-----TPACASATPASLT-AAVLAKAQRSGKVQNOAGGREDDG 242
Bos_taurus        -ACVPKAGGSWDLSTQETH-----TPAQESATQACLAVEEALAKARKGSKDPNPAGSGEGR 249
Equus_caballus    -ACFPKLGGSWDLPTQETR-----TPAQGSATAARLA-EAVLAKARTGQKGOHPAGAGEGG 244
Canis_lupus_familiaris -MCFPKPGGSWDLPTQETR-----APAQGSAPPAGLA-AAVRAKARIGRKGQNPAGARQGA 246
Heterocephalus_glaber -ECFPKSGRSWDLPTXGTH-----TLAQDSAAPASLA-AAVFTKTLNSGKRGEPPGRCPKRG 236
Rattus_norvegicus -EHFPRFES-----TPAQTSSIPAGLA--AGLVKAQGSRKAAQGVGPEGSR 212
Mus_musculus      -EHFPRSES-----TLVCTPTIPASL-----LVKVRSSRKVGQAGPEGSG 205
Chelonia_mydas    SMDFSKPGGSKELPLKRKRGVKWLNPKAANKPAETAGSVGALKAAATVRRVRIGAQQVGSS 600
Pavo_muticus      -----RSKRSRRRRARGD 125
Pavo_cristatus    -----RSKRSRRRRARGD 125
Gallus_gallus     -----HSKRSRRRRARGD 125
.....550.....560.....570.....580.....590.....600

```

```

      :               .               : * : * : : . * : : *
Homo_sapiens      EAEARPYRCLRGGRAFQKPSKPLSPAETRGGAAKRYACELCGKAYSHRGTLQOHRRLHTG 303
Pan_troglodytes   EAEARPYRCLRGGRAFQKPSDPLSPAETRGGAAKRYACELCGKAYSHRGTLQOHRRLHTG 303
Macaca_mulatta    EAEARPHRRRLRGGRACQKPSRQLSPAETRGG--AKRYACELCGKAYSHRGTLQOHRRLHTG 301
Bos_taurus        QGEARPYKCLRGGRAVQK-----SLG--AKPYACELCGKAYSHRATLQOHRRLHTG 298
Equus_caballus    QEEVRPNKCRRAGRAFQKPSNRLSPAQTRG--AKPYACELCGKAYSHRGTLQOHRRLHTG 302
Canis_lupus_familiaris QGEAHFYKCLRGGRAFKPSPLSPSPQPRG--TKPHTCELCGKAYSHRGTLQOHRRLHTG 304
Heterocephalus_glaber ADQGVHTGRQAAGPCGER-----VAKPYACELCRKAYSHRGTLQOHRRLHTG 283
Rattus_norvegicus QEEEGPDRCVQGRRAFQKSSSELQVSAEQRG--IKPYVCQLCGKAYSHRSTLQOHRRLHTG 270
Mus_musculus      QEEEGLDRCVR---AFQKSTKVQVPAEHG--SKPYVCQLCGKAYSHRSTLQOHRRLHTG 260
Chelonia_mydas    EVEERPYKCMQCGRFAFKSSNLLSHIDTHSG--AKPYACELCGKAYSHQGTLOQHKRLHTG 659
Pavo_muticus      NENDLLDGVFDAEPASGK-----ALSYRCKKCGASFHAMSELQOHKRTHLV 171
Pavo_cristatus    NENDLLDGVFDAEPASGK-----ALSYRCKKCGASFHAMSELQOHKRTHLV 171
Gallus_gallus     NENALLDGAFDAEPASGK-----ALSYRCKKCGASFQGTSELOQHKRTHLV 171
.....610.....620.....630.....640.....650.....660

```

```

      * . : * . . * : : : * * * . : : : * : : * : : *
Homo_sapiens      ERPYQCSFCDKAYTWSSDHRKHIRTHTGEKPYPCPDGKAFVRSSDLRKHQRMNHSNNKP 363
Pan_troglodytes   ERPYQCSFCDKAYTWSSDHRKHIRTHTGEKPYPCPDGKAFVRSSDLRKHQRMNHSNNKP 363
Macaca_mulatta    ERPYQCSFCDKAYTWSSDHRKHIRTHTGEKPYPCPDGKAFVRSSDLRKHQRMNHSNNKP 361
Bos_taurus        ERPYQCPFCDKAYTWSSDHRKHIRTHTGEKPYPCPDGKAFVRSSDLRKHQRMNHSNDKP 358
Equus_caballus    ERPYRCPFCDKAYTWSSDHRKHIRTHTGEKPYPCPDGKAFVRSSDLRKHQRMNHSNNKP 362
Canis_lupus_familiaris ERPYQCPFCDKAYTWSSDHRKHIRTHTGEKPYPCPDGKAFVRSSDLRKHQRMNHSNDKP 364
Heterocephalus_glaber ERLHPCPFCDKAYTWSSDHRKHIRTHTGQKAX-----LVRSSDLHKHQSNNMRSSDKP 335
Rattus_norvegicus ERPYRCPFCDKAYTWSSDHRKHIRTHTGEKPYGCPDCGRAFVRSSDLRKHQRMNHSNDKP 330
Mus_musculus      ERPYRCPFCDKAYTWSSDHRKHIRTHTGEKPYGCPDCGRAFVRSSDLRKHQRMNHSNDKP 320
Chelonia_mydas    ERPYKCPFCVKAYTWSSDYRKHIRTHTGEKPYKCLDCEKAFVRSSDLRKHQRMNHSNDKP 719
Pavo_muticus      ENSYRCPVCAKEFFRAANLRMHKLIHNSDRPHKCPECDKGFIRIADVWRHLRNVHKIERS 231
Pavo_cristatus    ENSYRCPVCAKEFFRAANLRMHKLIHNSDRPHKCPECDKGFIRIADVWRHLRNVHKIERS 231
Gallus_gallus     ENSYRCPVCAKEFFRAANLRMHKLIHNSDRPHKCPECDKGFIRIADVWRHLRNVHKIERS 231
.....670.....680.....690.....700.....710.....720

```

CLUSTAL 2.1 MULTIPLE SEQUENCE ALIGNMENT

File: /media/morpheus/disk1/fst/pep_msa/ZNF648.fst Tue Feb 1 15:00:02 2022

Page 4 of 4

```

      :      *      *      *      *      *      *      *      *      *      *      *      *      *      *      *      *
Homo_sapiens      FPCSECGLTIFNKPLSLLRHQTHLGAKPFRCPACDREFAVASRMVEHQRVHSGERPFPFCP 423
Pan_troglodytes   FPCSECGLTIFNKPLSLLRHQTHLGAKPFRCPACDREFAVASRMVEHQRVHSGERPFPFCP 423
Macaca_mulatta    FPCSECGLTIFNKPLSLLRHQTHLGAKPFRCPACDREFAVASRMVEHQRVHSGERPFPFCP 421
Bos_taurus        FPCAECGLTIFNKPLSLLRHQTHLGEKPFRCPTCDREFAVASRMMEHQRVHSGERPFPFCP 418
Equus_caballus    FPCAECGLTIFNKPLSLLRHQTHLGEKPFRCPTCDREFAVASRMMEHQRVHSGERPFPFCP 422
Canis_lupus_familiaris FPCAECGLTIFNKPLSLLRHQTHLGEKPFRCPTCDREFAVASRMMEHQRVHSGERPFPFCP 424
Heterocephalus_glaber FPCAXCGLIFNKPLSLLRHQTHLGANPFHCPCAWDCFEFSVASCTVEHQX-HSGERPFPFC 394
Rattus_norvegicus FPCAQCGLTIFNRPLSLLRHQTHLGAKPFRCSRSSREFSVASRMVEHQRVHSGERPFPFC 390
Mus_musculus      FPCAQCGLTIFNRPLSLLRHQTHLGAKPFRCSRSSREFSVASRMVEHQRVHSGERPFPFC 380
Chelonia_mydas    FPCQECGKTFNKPLSLLRHQTHLGEKPFHCPCDCGKEFAVASRMVEHQRIHTGERPYS 779
Pavo_muticus      MVILGNMGARN-PWSIVHRSQHAVEYTDQPCADN-----HKAEEDCKPYACP 278
Pavo_cristatus    MVILGNMGARN-PWSIVHRSQHTVEYTDQPCADN-----HKAEEDCKPYACP 278
Gallus_gallus     MVILGNMGARN-PWSIVHRSQHTVEYTDQPCADN-----HKAEEDCKPYACP 278
.....730.....740.....750.....760.....770.....780

```

```

      *      *      *      *      *      *      *      *      *      *      *      *      *      *      *      *
Homo_sapiens      TCGKCFTKSSNLSEHQTLHTGQRPFKADCQVAFAPPSRLVRHQRIHTGERPFPCTCCGQ 483
Pan_troglodytes   TCGKCFTKSSNLSEHQTLHTGQRPFKADCQVAFAPPSRLVRHQRIHTGERPFPCTCCGQ 483
Macaca_mulatta    TCGKCFTKSSNLSEHQTLHTGQRPFKADCQVAFAPPSRLVRHQRIHTGERPFPCTCCGQ 481
Bos_taurus        TCGKCFTKSSNLSEHQTLHTGQRPFKADCQVAFAPPSRLVRHQRIHTGERPFPCTCCGQ 478
Equus_caballus    TCGKCFTKSSNLSEHQTLHTGQRPFKADCQVAFAPPSRLVRHQRIHTGERPFPCTCCGQ 482
Canis_lupus_familiaris TCGKCFTKSSNLSEHQTLHTGQRPFKADCQVAFAPPSRLVRHQRIHTGERPFPCTCCGQ 484
Heterocephalus_glaber TCGKCFTKSSNLSEHQTLHTGQRPFKADCQVAFAPPSRLVRHQRIHTGERPFPCTCCGQ 448
Rattus_norvegicus ICGKCFTKSSNLSEHQTLHTGQRPFKADCQVAFAPPSRLVRHQRIHTGERPFPCTCCGQ 450
Mus_musculus      TCGKCFTKSSNLSEHQTLHTGQRPFKADCQVAFAPPSRLVRHQRIHTGERPFPCTCCGQ 440
Chelonia_mydas    ICGKSFTKSSNLSEHQTLHTGERPFKCEGMAFAFSSRLVRHQRIHTGERPFPCTCCGQ 839
Pavo_muticus      TCGKGFDKPNLLSKHKVIHQEKPYKCEGMAFVQLLRRLKRHQTHSGVRPFYCEECGG 338
Pavo_cristatus    TCGKGFDKPNLLSKHKVIHQEKPYKCEGMAFVQLLRRLKRHQTHSGVRPFYCEECGG 338
Gallus_gallus     TCGKGFDKPNLLSKHKVIHQEKPYKCEGMAFVQLLRRLKRHQTHSGVRPFYCEECGG 338
.....790.....800.....810.....820.....830.....840

```

```

      *      *      *      *      *      *      *      *      *      *      *      *      *      *      *      *
Homo_sapiens      AFARSSTLKRHQIHSGEKGFLCAECGRAFIASELAQHIRMHNGERPYPQCEDCGQAFTR 543
Pan_troglodytes   AFARSSTLKRHQIHSGEKGFLCAECGRAFIASELAQHIRMHNGERPYPQCEDCGQAFTR 543
Macaca_mulatta    AFARSSTLKRHQIHSGEKGFFCAECGRAFIASELAQHIRMHNGERPYPQCKDCGQAFTR 541
Bos_taurus        AFARSSTLKRHQIHSGEKGFLCAECGRAFRVASELAQHIRVHNGERPYPQCADCGQAFTR 538
Equus_caballus    AFARSSTLKRHQIHSGEKGFLCAECGRAFIASELAQHIRVHNGERPYPQCEDCGQAFTR 542
Canis_lupus_familiaris AFARSSTLKRHQIHSGEKGFLCAECGRAFIASELAQHIRVHNGERPYPQCEDCGQAFTR 544
Heterocephalus_glaber AFARSSALKRHXIHSGEKGFLCAECGRAFIASELAQHIRVHNGERPYPQSEDGQAVTR 508
Rattus_norvegicus AFARSSTLKRHQIHSGEKGFLCAECGRAFIASELAQHIRMHNGERPYPQCEGCGQTFTR 510
Mus_musculus      AFARSSTLKRHQIHSGEKGFLCAECGRAFIASELAQHIRMHNGERPYPQCEGCGQTFTR 500
Chelonia_mydas    AFARSSTLKRHQIHSGEKAYLCSDCGKAFRHASQLTOHMRHTGERPYPQCAQCAKFTQ 899
Pavo_muticus      TFTRLASLQRHQRIHTGEK-----PYSQDYCGHSFTIE 370
Pavo_cristatus    TFTRLASLQRHQRIHTGEK-----PYSQDYCGHSFTIE 370
Gallus_gallus     TFTRLASLQRHQRIHTGEK-----PYSQDYCGHSFTIE 370
.....850.....860.....870.....880.....890.....900

```

```

      *      *      *      *      *      *      *      *      *      *      *      *      *      *      *      *
Homo_sapiens      SNHLQRHRAKHGTCKKEPIPPSSSDE- 568
Pan_troglodytes   SNHLQRHRAKHGTCKKEPIPPSSSDE- 568
Macaca_mulatta    SNHLQRHGAKHRTCKKEPIPPSSSDE- 566
Bos_taurus        SNHLRRHQAKHHSCKKEPTTPSSSDE- 564
Equus_caballus    SNHLQRHRAKHGHACKKEPNPSSSDE- 567
Canis_lupus_familiaris SNHLQRHRAKHSTCKKEPIPPSSSDE- 569
Heterocephalus_glaber SSSLXRHRAKHDAFK-QLFPSSSDE- 531
Rattus_norvegicus SSSLQRHQAKHDTCK-EPVPSSSDE- 534
Mus_musculus      SSSLQRHQAKHDTCKKEPVPSSSDE- 525
Chelonia_mydas    STHLIRHQAKHGASNGEPFSSSDE- 923
Pavo_muticus      SGTLLRRHERTHKLDKS----- 386
Pavo_cristatus    SGTLLRRHERTHKLDKS----- 386
Gallus_gallus     SGTLLRRHERTHKLDKS----- 386
.....910.....920.....

```