



CSpritz - Accurate detection of protein disorder

Version 1.2

Title: PF3D7_1227300.fasta
emailaddress: mubasher.mohammed@su.se
pid: 1976228859

Status: finished

NB: The data will be kept for **two weeks**, after which it will be **deleted** without further notice.

Available files: [\(help\)](#)

Your input parameters:

Fasta sequences (amino, secondary structure, disorder, confidence):

Disorder plot:

Graph of PDB homologue(s) found::

Disorder Prediction (with disorder probability):

Protein statistics :

HTML

TXT

PDF

PDF

TXT

TXT

Disordered residues and stats: [\(help\)](#)[illegible]

Total amino acids:	1162
Total % disorder:	65.74
Total no. of disordered regions > 30 amino acids:	7
Total no. of disordered regions > 50 amino acids:	4
Number of disordered segments:	28
Length distribution of segments (N to C terminal order):	10 1 11 1 163 20 1 37 10 1 2 102 11 2 149 30 3 2 32 3 74 25 6 1 7 2 47 11

[illegible]

59 ELM motif(s) in total found in disordered residues

```
seq : MVDIKNIVVR
S.S. : CCCHHHHHHH
alpha: 0247899999
beta : 0000000000
coil : 9752100000
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      52      61
seq  : KKYESYNKTIH
S.S. : HHHHHCCCCC
alpha: 98776431122
beta : 00000000011
coil : 01123568765

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99          108          118          128          138          148          158
seq : HKFNEKRKRENNMKKNVIDNNIYKKYRILNRINKNGHVEANKLHCVHHKNVEYMNINKLNKHMMICFNDM
S.S. : CCCCCCHHHHHHHHHHHCCCCCCCCCHHHHHHHHHHHCCCCCECCCCECCCCCHHHHHHHHHHHCCCCCCCCC
alpha: 5432466777765553333478877776542100011211111112344455544443332111
beta : 00000000000000000000000000000000111110000354224432000122221100000001121000
coil : 3466533212233445555521111101224678853355444567764323333344455445788
      169          178          188          198          208          218          228
seq : KCDISIYLKQTSEDIQKNEKQNDKLILPSFGSLKKNIYMKNNTNRRCITPNLFYKNNNDHLKCLKKNR
S.S. : CCCCCCHHHHHHHHHHHHHHHHHCCCCCHCCCCCCCCCCCCCCCCCCCCCEEEECCHCCCCCHHHCHCC
alpha: 12356554321456766554433442221122222211000000001232311123445543321
beta : 0000000011110000000000000001000000000012332100135554322221000000100000
coil : 7776333345665322234445554446666777666544567888643345554467887654334678
      239          248          258
seq : SPIYLCEDNLKKRKDI IKNMIKE
S.S. : CCCCCCHHHHHHHHHHHHHHHHHHHHH
alpha: 011125777888899999999999
beta : 00121000000000000000000000
coil : 886654222111110000000000
```

```

      282      291
seq  : C N N N N N D K N N N L E V N Y A I N
S.S. : H C C C C C C C C C C H H H H H H C
alpha: 4 4 3 2 1 1 1 2 2 2 1 2 2 4 5 6 6 5 4
beta  : 1 0 0 0 0 0 0 0 0 0 1 2 3 2 1 1 1 0 0
coil  : 4 4 6 7 7 7 7 7 7 7 6 4 2 1 2 1 2 3 5

```

d.protein.bio.unipd.it/cspritz/work/pid_1976228859/batch/PF3D7_1227300.fasta cspritz.html

Linear motif(s):

Linear motif(s):

Linear motif(s):

Linear motif(s):

2/5

330 339 349 359
seq : EKMNMKKEQLSITHNNEMENIINEKKIHKKNEEYHKN
S.S. : HHHHHHHHHCCCCCHHHHHHHCCCCCCCCCHHCCC
alpha: 9998767654322234678887543221111455322
beta : 000000000001000000000000011110000001
coil : 0001222345666665321112455667777544665

SS Motif for disorder segment 6:
(start,end): (375,384)

seq : IAEKNALCRH
S.S. : HHHHHHHHHH
alpha: 9998888888
beta : 0000000000
coil : 0001111111

SS Motif for disorder segment 7:
(start,end): (416,517)

416 425 435 445 455 465 475
seq : QNLSLPLPVEEERDIQKEVRPYHNEEKKKKHNNNNNNNNNNICNNNNNNNVSNINNSGCNNFNMMENMN
S.S. : CCCCCCCCCCHHHHHHHHHCCCCCCCCCCCCCCCCCCCCCHHHHHCCCCCCCCCCCCCCCCCCCCCHCCC
alpha: 10000000045677765432100111212222111123444443221111222111112223444432
beta : 01110000000000000001111000000000000001112221111124332100000000000000
coil : 8778999943322234456778777766678887544322356776544456788877666544566
486 495 505 515
seq : DLSKHKCKDIKENYIYNDKNNITMEDKIKITYY
S.S. : CCCCCCCCCCCCCCCCCCCCCCHHHHHHEEEE
alpha: 33332223333322111111566533333
beta : 00000010000112332100022000123443
coil : 665566665555443457776633332223

SS Motif for disorder segment 8:
(start,end): (579,589)

579 588
seq : FEYDKKKNIQF
S.S. : HHHCCCCCHH
alpha: 65433332456
beta : 21100000111
coil : 12366666432

SS Motif for disorder segment 9:
(start,end): (608,756)

608 617 627 637 647 657 667
seq : YYQYNMNMNEKGPDKYNSFQIYEKKKKVTNVLEIQKDEDILKKDVTNEWANPTGLKKKILHLLKGGTQ
S.S. : HHHHCCCCCCCCCCCCCHHHHHHHCCCCCEEECCCCCHHHCCCCCCCCCCCCCHHHHHHHHHCCCCC
alpha: 44433221100012222344455542111113333222456544322233201234667777521011
beta : 222210000000011112232210012322343310000000000000000000001000000012
coil : 3223467788987655653221234676555222356643344556776657877643211111368875
678 687 697 707 717 727 737
seq : INKDNEHNMNKFVPIYNNSSLVNILSGYNAHDIKEQKGGDSLKCEESFYFDENGYFKYKKKKRKAKEFFN
S.S. : CCCCCCCCCCCCCCHHHHHHHCCCCCHHHHCCCCCCCCCCCCCCCCCCCCCCCCCCCCCHHHHC
alpha: 111123433211122245666554311144555542111222233322211222322222345542
beta : 2100000001222321011111111110000000000001222222100012332211100111111
coil : 5677654566565446642212334577654433456888765444444567775434455666532236
seq : HNYSTSYNY
S.S. : CCCCCCCCC
alpha: 111122233
beta : 111111222
coil : 776665543

SS Motif for disorder segment 10:
(start,end): (767,796)

Linear motif(s):
residues (335,341) LIG_MAPK_1 = KKEQLSI
residues (336,339) LIG_PDZ_3 = KEQL
residues (347,350) LIG_PDZ_3 = MENI

Graph of Probability(helix, strand, coil)
PDF
Amino SS Probability(helix, strand, coil)
TXT

Linear motif(s):
Graph of Probability(helix, strand, coil)
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TXT

Linear motif(s):
residues (418,424) LIG_SH3_3 = LSLPPLP
residues (421,424) LIG_WW_2 = PPLP
residues (424,427) LIG_TRAF2_1 = PVEE
residues (438,441) LIG_SH2_GRB2 = YHNE
residues (454,457) LIG_SH2_GRB2 = YNNI
residues (495,499) LIG_APCC_KENbox_2 = IKENY
residues (499,502) LIG_SH2_STAT5 = YIYN
residues (506,512) LIG_FHA_2 = NITMEDK
residues (510,513) LIG_PDZ_3 = EDKI

Graph of Probability(helix, strand, coil)
PDF
Amino SS Probability(helix, strand, coil)
TXT

Linear motif(s):
residues (583,589) LIG_MAPK_1 = KKKNIQF

Graph of Probability(helix, strand, coil)
PDF
Amino SS Probability(helix, strand, coil)
TXT

Linear motif(s):
residues (622,625) LIG_SH2_STAT5 = YFNS
residues (632,642) LIG_MAPK_1 = KKKKVTNVLEI
residues (635,641) LIG_FHA_1 = KVTNVLE
residues (645,648) LIG_PDZ_3 = DEDI
residues (665,671) LIG_MAPK_1 = KKKILHL
residues (667,671) LIG_CYCLIN_1 = KILHL
residues (692,695) LIG_SH2_GRB2 = YNNS
residues (716,719) LIG_PDZ_3 = DDSL
residues (719,723) LIG_RB = LKCEE
residues (723,727) LIG_BRCT_BRCA1_1 = ESFYF
residues (726,729) LIG_SH2_STAT5 = YFDE
residues (732,735) LIG_SH2_STAT5 = YFKY

Graph of Probability(helix, strand, coil)
PDF
Amino SS Probability(helix, strand, coil)

767776786
seq : NNKMDENIYNNNNNNNNNDIKINKLTIKDK
S.S. : CCCCCCHHECCCCCCCCCECCCCCCC
alpha: 322333433332221111111111111111
beta : 10000123332111111244433343210
coil : 576655322245666677643344544677

SS Motif for disorder segment 11:
(start,end): (810,812)

seq : SNY
S.S. : CCC
alpha: 333
beta : 001
coil : 555

SS Motif for disorder segment 12:
(start,end): (847,878)

847856866876
seq : YGKKEKLFSDDLYKKSINKNICNDISEKNESL
S.S. : HCCCCCEEECCCCCCCCCCCCCCCCCCCC
alpha: 5200000000112222222221011211110
beta : 00001355421001111222221100000122
coil : 36887533467766666554456877678766

SS Motif for disorder segment 13:
(start,end): (882,884)

seq : TII
S.S. : CEE
alpha: 000
beta : 488
coil : 510

SS Motif for disorder segment 14:
(start,end): (889,962)

889898908918928938948
seq : KNLKIAMQGKNNFKENHQTGDNNNDNNNNKNNKNDNNNNNNNNKDIKNKEENNIYYNNHNLNLNYIPFD
S.S. : CCEEECCCCCCCCCCCCCCCCCCCCCCCCCCCCCCCCCHHHHCHHCCCCCCCCCCCCCCCC
alpha: 111121100001123321100011222211111111111122334433555434432223333220022
beta : 113554321000111111110000111112221111111110011110000112110000000122100
coil : 6642234678886555667888876666666667666766655444433454345666666556766

seq : NFFF
S.S. : CCCC
alpha: 2224
beta : 0111
coil : 6654

SS Motif for disorder segment 15:
(start,end): (968,992)

968977987
seq : PEQVMRTSHFSINEKMFPPKKKKKKKI
S.S. : HHHHHHCCCCCCCCCCCCCCCCCCE
alpha: 6787642122223332111112110
beta : 0000000023332100000011135
coil : 3111246754334456877766653

SS Motif for disorder segment 16:
(start,end): (1004,1009)

seq : KKINRK
S.S. : CCCCCC
alpha: 333244
beta : 000000
coil : 656655

SS Motif for disorder segment 17:
(start,end): (1070,1076)

seq : GQPEDHN
S.S. : CCCCCC
alpha: 0001110
beta : 0000000
coil : 8987778

Linear motif(s):

residues (771,774) LIG_PDZ_3 = DENI
residues (775,778) LIG_SH2_GRB2 = YNNN
residues (790,796) LIG_FHA_2 = KLTIKDK

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TXT

Linear motif(s):

Graph of Probability(helix, strand, coil)
PDF
Amino SS Probability(helix, strand, coil)
TXT

Linear motif(s):

residues (851,854) LIG_PDZ_3 = KEKL
residues (853,858) LIG_14-3-3_3 = KLFSD
residues (856,859) LIG_PDZ_3 = SDDL
residues (875,878) LIG_PDZ_3 = NESL

Graph of Probability(helix, strand, coil)
PDF
Amino SS Probability(helix, strand, coil)
TXT

Linear motif(s):

Graph of Probability(helix, strand, coil)
PDF
Amino SS Probability(helix, strand, coil)
TXT

Linear motif(s):

residues (889,893) LIG_CYCLIN_1 = KNLKI
residues (901,905) LIG_APCC_KENbox_2 = FKENH
residues (943,946) LIG_SH2_GRB2 = YNNN
residues (949,952) LIG_PDZ_3 = LDNL
residues (954,957) LIG_SH2_STAT5 = YIPF

Graph of Probability(helix, strand, coil)
PDF
Amino SS Probability(helix, strand, coil)
TXT

Linear motif(s):

residues (968,971) LIG_PDZ_3 = PEQV

Graph of Probability(helix, strand, coil)
PDF
Amino SS Probability(helix, strand, coil)
TXT

Linear motif(s):

Graph of Probability(helix, strand, coil)
PDF
Amino SS Probability(helix, strand, coil)
TXT

Linear motif(s):

Graph of Probability(helix, strand, coil)
[PDF](#)

Amino SS Probability(helix, strand, coil)
[TXT](#)

SS Motif for disorder segment 18:
(start,end): (1093,1139)

10931102111211221132

seq : EKLTTEQMENKNDGKNQFKENINKNYDNKENNINYDYIHNVDKTKIS

S.S. : CCCCHHHHHCCCCCCCCCCCCCCCCCCCCCCCCCCCCCCCCCHHHHH

alpha: 42124454431111222333210000111111113344310055666

beta : 11011122221000012221110000000000110001000000000

coil : 46763323346888654444678888887788775544588843333

SS Motif for disorder segment 19:
(start,end): (1151,1161)

11511160

seq : DLKEKYMLIES

S.S. : HHHHHHHHCC

alpha: 87665444421

beta : 00000123331

coil : 12333432236

Linear motif(s):

residues (1110,1114)
[LIG_APCC_KENbox_2 = FKENI](#)

residues (1111,1114) [LIG_PDZ_3 = KENI](#)

residues (1118,1121) [LIG_SH2_GRB2 = YDNK](#)

residues (1120,1124)
[LIG_APCC_KENbox_2 = NKENN](#)

residues (1127,1130) [LIG_SH2_SRC = YDYI](#)

residues (1129,1132) [LIG_SH2_STAT5 = YIHN](#)

Graph of Probability(helix, strand, coil)
[PDF](#)

Amino SS Probability(helix, strand, coil)
[TXT](#)

Linear motif(s):