5:55 4G 0 B/s 82
vulms.vu.edu.pk/ 20

BIF401 - Bioinformatics I (Quiz No. 3)

Question # 10 of 10 (Start time: 05:55:40 PM, 28 August 2022)

1 Angstrom is a unit of length equal to .....

Select the correct option

- 1^{-10}
- 1^{10}
- 10^{10}
- 10^{-10}

Solved by Muhammad Kashif

5:55 163 B/s 82
vulms.vu.edu.pk/ 20

BIF401 - Bioinformatics I (Quiz No. 3)

Question # 9 of 10 (Start time: 05:55:25 PM, 28 August 2022)

Beeta-pleated sheets are the examples of .....

Select the correct option

- ○ 3' OR 3-D OR Tertiary Structure of proteins
- ○ 4' OR 4-D OR Quaternary Structure of proteins
- ○ 1' OR 1-D OR Primary Structure of proteins
- ◉ 2' OR 2-D OR Secondary Structure of proteins

Solved by Muhammad Kashif

5:54 4G 17 B/s 82
vulms.vu.edu.pk/ 20

BIF401 - Bioinformatics I (Quiz No. 3)

Question # 7 of 10 (Start time: 05:54:50 PM, 28 August 2022)

Proteins are made by ..... of amino acids.

Select the correct option

●	Polymerization
○	Transcription
○	Translation
○	None of these

Solved by Muhammad Kashif

5:54 7.8 K/s 82
vulms.vu.edu.pk/ 20

BIF401 - Bioinformatics I (Quiz No. 3)

Question # 6 of 10 (Start time: 05:53:45 PM, 28 August 2022)

How many bonded atoms are required to constitute a dihedral angle, such as phi or psi?

Select the correct option

- 3
- 1
- 4
- 2

Solved by Muhammad Kashif

Click to

5:53 4G 0 B/s 83
vulms.vu.edu.pk/ 20

BIF401 - Bioinformatics I (Quiz No. 3) Quiz Start

Question # 5 of 10 (Start time: 05:53:03 PM, 28 August 2022)

Which of the following statements is un-true about 1' (Primary) structure of proteins?

Select the correct option

- (●) The 1-D (Primary) structure of proteins can be determined by Nuclear Magnetic Resonance (NMR)
- ( ) The 1-D (Primary) structure of proteins can be determined by Edman Degradation
- ( ) The sequence of amino acids joined by a peptide bond
- ( ) The Primary OR 1' structure of a protein determines its initial properties.

Click to Save Ans

Solved by Muhammad Kashif

5:52 331 B/s 83
vulms.vu.edu.pk/ 20

BIF401 - Bioinformatics I (Quiz No. 3)

Question # 4 of 10 (Start time: 05:52:42 PM, 28 August 2022)

Which of the following statements is true about proteins?

Select the correct option

○	Proteins are polymers of glucose
○	Proteins are polymers of peptide bonds
●	Proteins are polymers of amino acids
○	Proteins are polymers of di-sulfide bridges

Solved by Muhammad Kashif

5:52 ••• 0 B/s 83
vulms.vu.edu.pk/ 20

BIF401 - Bioinformatics I (Quiz No. 3) Quiz Start Time: (

Question # 3 of 10 (Start time: 05:52:28 PM, 28 August 2022)

Which one of the following bonds, is the reason of 2-D (2' OR Secondary) structure formation of protein?

Select the correct option

- [ ] Ionic bond
- [ ] Covalent bond
- [x] Hydrogen bond
- [ ] Peptides bond

Click to Save Answer & M

Solved by Muhammad Kashif

5:52 466 B/s 83
vulms.vu.edu.pk/ 20

BIF401 - Bioinformatics I (Quiz No. 3) Quiz

Question # 2 of 10 (Start time: 05:52:06 PM, 28 August 2022)

Which of the following is responsible for determining a protein's 3D shape?

Select the correct option

- ○ Amino acid sequence
- ○ Interaction with molecular chaperons
- ○ Peptide bond
- ◉ Interaction with other polypeptides

Click to Sav

Solved by Muhammad Kashif

5:51 74 B/s 83
vulms.vu.edu.pk/ 20

BIF401 - Bioinformatics I (Quiz No. 3) Quiz Start T

Question # 1 of 10 (Start time: 05:51:41 PM, 28 August 2022)

Which of the following statements are true about quaternary structure of proteins?

Select the correct option

- ○ 4' (Quaternary) structure of proteins are formed by peptide chains that make-up the protein
- ○ Proteins comprised of only single chain have a quaternary structure
- ● Combinations of Alpha helices, Beta sheets, coils and loops help form 3' structures
- ○ 4' Structures of proteins are formed as a result of hydrophobic interactions between non-polar R-groups

Click to Save Answ

Solved by Muhammad Kashif

1:14 188 B/s 50
vulms.vu.edu.pk/ 18

IF401 - Bioinformatics I (Quiz No. 3) Quiz Start Time: 01:08 P

uestion # 10 of 10 (Start time: 01:13:35 PM, 28 August 2022)

Which of the following statements is un-true about 2' (Secondary) structure of proteins?

lect the correct option Reload

- 2' Structures of proteins are formed as a result of Hydrogen bond formation between N and C termini in a protein backb
- 2' structures of proteins include Alpha helices and Beta sheets
- 2' Structures of proteins are formed as a result of peptides bond formation between N and C termini in a protein backb
- Hydrogen bonds are the reason of 2' structures of proteins

Click to Save Answer & Move t

Solved by Muhammad Kashif

1:13 188 B/s 50
vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3)

Question # 9 of 10 (Start time: 01:13:22 PM, 28 August 2022)

1 Angstrom is a unit of length equal to .....

Select the correct option

- ○ 10^{10}
- ● 10^{-10}
- ○ 1^{-10}
- ○ 1^{10}

Solved by Muhammad Kashif

1:13 387 B/s 50
vulms.vu.edu.pk/ 18

Question # 8 of 10 (Start time: 01:13:06 PM, 28 August 2022)

Which one of the following bonds, is the reason of 2-D (2' OR Secondary) structure formation of protein?

Select the correct option

- Peptides bond
- Hydrogen bond
- Covalent bond
- Ionic bond

Click to Save Answer

Solved by Muhammad Kashif

1:12 ••• 1.6 K/s 50
vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3)

Question # 7 of 10 (Start time: 01:12:45 PM, 28 August 2022)

Which of the following statements are true about quaternary structure of proteins?

Select the correct option

- ○ 4' (Quaternary) structure of proteins are formed by peptide chains that make-up the protein
- ○ Combinations of Alpha helices, Beta sheets, coils and loops help form 3' structures
- ○ 4' Structures of proteins are formed as a result of hydrophobic interactions between non-polar R
- ◉ Proteins comprised of only single chain have a quaternary structure

Solved by Muhammad Kashif

Click to

1:12 ... 4G 0 B/s 50
vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3)

Question # 6 of 10 (Start time: 01:11:30 PM, 28 August 2022)

Which of the following is responsible for determining a protein's 3D shape?

Select the correct option

- ○ Peptide bond
- ◉ Interaction with other polypeptides
- ○ Amino acid sequence
- ○ Interaction with molecular chaperons

Solved by Muhammad Kashif

1:11 2.7 K/s 50
vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3) Qu

Question # 5 of 10 (Start time: 01:09:49 PM, 28 August 2022)

How many bonded atoms are required to constitute a dihedral angle, such as phi or psi?

Select the correct option

- [ ] 1
- [x] 4
- [ ] 3
- [ ] 2

Solved by Muhammad Kashif

Click to S

1:09 222 B/s 51
vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3)

Question # 4 of 10 (Start time: 01:09:37 PM, 28 August 2022)

At isoelectric pH, an amino acid exists as

Select the correct option

- ○ Cation
- ○ None of these
- ◉ Zwitterion
- ○ Anion

Solved by Muhammad Kashif

1:09 ... 4G 0 B/s 51

vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3)

Question # 3 of 10 (Start time: 01:09:23 PM, 28 August 2022)

Beeta-pleated sheets are the examples of .....

Select the correct option

- (●) 2' OR 2-D OR Secondary Structure of proteins
- ( ) 4' OR 4-D OR Quaternary Structure of proteins
- ( ) 1' OR 1-D OR Primary Structure of proteins
- ( ) 3' OR 3-D OR Tertiary Structure of proteins

Solved by Muhammad Kashif

VU LMS VU VU LMS

1:09 484 B/s 51
vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3)

Question # 2 of 10 (Start time: 01:08:59 PM, 28 August 2022)

Lysine is represented by one-letter code i.e.,

Select the correct option

- [ ] L
- [ ] Y
- [ ] I
- [x] K

Solved by Muhammad Kashif

1:08 317 B/s 51
vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3)

Question # 1 of 10 (Start time: 01:08:39 PM, 28 August 2022)

Which of the following statements are true about 3-D (Tertiary) structure of proteins?

Select the correct option

○	Primary structure of proteins determines the tertiary structure
○	3' structures are formed by different peptide chains that make up the proteins
●	Combinations of Alpha helices, Beta sheets, coils and loops help form 3' structures
○	3' Structures of proteins are formed as a result of hydrophobic interactions between polar R-gro

Click to

Solved by Muhammad Kashif

VU LMS VU VU LMS

1:06 60 B/s 51
Find...

Properties of Loop

- Loops connect helices and sheets
- Loops vary in length and 3-D configurations
- Loops are mostly located on the surface of proteins
- Loops are more "acceptable" of mutations
- Loops are flexible and can adopt multiple conformations
- Loops tend to have charged and polar amino acids
- Loops are frequently components of active sites Coils
- Secondary structure that are not helices, sheets, or recognizable turns
- Disordered regions, but also appear to play important functional roles

Loops and Coils are also secondary structure which form the first structures after folding of protein's amino acids. Loops and Coils are very important 2' structures in that they form active sites of proteins.

172: Tertiary Structures of Proteins

2' structures include alpha helices, beta sheets, loops and coils. Upon combination of 2' structures, a tertiary or 3' structure is formed.3' structure is next level of structure organization.



Solved by M

Formation of 3' structure

- Hydrophobic interactions between nonpolar R-groups
- Covalent bonds in the form of Disulphide bridges

Combinations of Alpha helices, Beta sheets, coils and loops help form 3' structures. Covalent bonds and hydrophobic interactions enforce the 3' structure.

173: Quaternary Structures of Proteins

4' structures or quaternary structures are formed by different peptide chains that make up the protein. Multimeric proteins which comprise of multiple peptides form 4' structures.

1 2 3 4 5 6 7 8 9 0
q w e r t y u i o p
a s d f g h j k l
z x c v b n m
?123 , .

Amino Acid	3-Letter Code	1-Letter Code
Alanine	Ala	A
Cysteine	Cys	C
Aspartic acid or aspartate	Asp	D
Glutamic acid or glutamate	Glu	E
Phenylalanine	Phe	F
Glycine	Gly	G
Histidine	His	H
Isoleucine	Ile	I
Lysine	Lys	K
Leucine	Leu	L
Methionine	Met	M
Asparagine	Asn	N
Proline	Pro	P
Glutamine	Gln	Q
Arginine	Arg	R
Serine	Ser	S
Threonine	Thr	T
Valine	Val	V
Tryptophan	Trp	W
Tyrosine	Tyr	Y

There are two methods for obtaining 1' structure.

- Edman Degradation
- Tandem Mass Spectrometry

Databases

Solved by Muhammad Kashif

1' structure databases are essentially protein sequence databases. Examples include Uniprot, Swissprot amongst se others.

Protein sequences are the primary structures of proteins. The primary or 1' structure of a protein determines its ini properties.1' structure lays the foundation for 2' structures

170: Secondary Structures of Proteins - I

The primary or 1' structure of a protein determines its basic properties and 1' structure lays the foundation for 2' structures. 2' structures are also referred to as secondary structures.

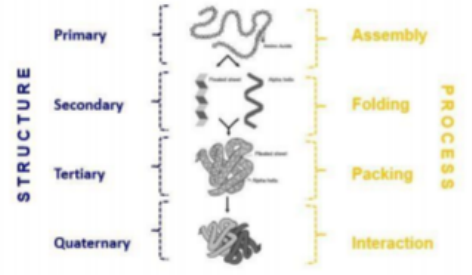


Figure 30.13 Organization of Secondary Structure

Formation of 2' structure

C- Terminus is negatively charged .N-terminus is positively charged. C and N termini can therefore make Hydrogen Bonds. Hydrogen Bonds are the reason of 2' structure formation.

1:03 ••• 0 B/s 52
vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3)

Question # 10 of 10 (Start time: 01:03:21 PM, 28 August 2022)

Lysine is represented by one-letter code i.e.,

Select the correct option

- ○ Y
- ● K
- ○ L
- ○ I

Solved by Muhammad Kashif

1:03 547 B/s 52
vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3)

Question # 9 of 10 (Start time: 01:03:07 PM, 28 August 2022)

Beeta-pleated sheets are the examples of .....

Select the correct option

○	4' OR 4-D OR Quaternary Structure of proteins
○	3' OR 3-D OR Tertiary Structure of proteins
●	2' OR 2-D OR Secondary Structure of proteins
○	1' OR 1-D OR Primary Structure of proteins

Solved by Muhammad Kashif

1:03 ••• 4G 73 B/s 52
vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3) Quiz Start Ti

Question # 8 of 10 (Start time: 01:02:50 PM, 28 August 2022)

Proteins are made-up of amino acids; these amino acids are linked together by which of the following bonds?

Select the correct option

- ○ Hydrogen bond
- ○ Disulfide bond
- ◉ Peptide bond
- ○ Ionic bond

Click to Save Answ

Solved by Muhammad Kashif

1:02 ••• 4G 34 B/s 52
vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3)

Question # 7 of 10 (Start time: 01:02:36 PM, 28 August 2022)

1 Angstrom is a unit of length equal to .....

Select the correct option

- (●) 10^{-10}
- ( ) 10^{10}
- ( ) 1^{10}
- ( ) 1^{-10}

Solved by Muhammad Kashif

1:02 88 B/s 52
vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3) Quiz S

Question # 6 of 10 (Start time: 01:01:33 PM, 28 August 2022)

Which of the following statements is un-true about 1' (Primary) structure of proteins?

Select the correct option

- ○ The Primary OR 1' structure of a protein determines its initial properties.
- ○ The 1-D (Primary) structure of proteins can be determined by Edman Degradation
- ○ The sequence of amino acids joined by a peptide bond
- ◉ The 1-D (Primary) structure of proteins can be determined by Nuclear Magnetic Resonance (NMR)

Click to Save

Solved by Muhammad Kashif

VU LMS VU VU LMS

1:01 360 B/s 53
vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3) Quiz Start T

Question # 5 of 10 (Start time: 01:00:39 PM, 28 August 2022)

Which of the following statements are true about 3-D (Tertiary) structure of proteins?

Select the correct option

- ○ Primary structure of proteins determines the tertiary structure
- ◉ Combinations of Alpha helices, Beta sheets, coils and loops help form 3' structures
- ○ 3' Structures of proteins are formed as a result of hydrophobic interactions between polar R-groups
- ○ 3' structures are formed by different peptide chains that make up the proteins

Click to Save Answ

Solved by Muhammad Kashif

1:00 94 B/s 53
vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3) Quiz Sta

Question # 4 of 10 (Start time: 01:00:14 PM, 28 August 2022)

Which one of the following bonds, is the reason of 2-D (2' OR Secondary) structure formation of protein?

Select the correct option

- ○ Covalent bond
- ○ Peptides bond
- ◉ Hydrogen bond
- ○ Ionic bond

Click to Save A

Solved by Muhammad Kashif

1:00 ••• 1.4 K/s 53
vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3)

Question # 3 of 10 (Start time: 12:58:59 PM, 28 August 2022)

Proteins are made by ..... of amino acids.

Select the correct option

- ○ Translation
- ○ None of these
- ◉ Polymerization
- ○ Transcription

Solved by Muhammad Kashif

12:58 ••• 6.4 K/s 53
vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3) Qu

Question # 2 of 10 (Start time: 12:57:11 PM, 28 August 2022)

The 1-D (Primary) structure of proteins can be determined by .....

Select the correct option

- ○ Edman Degradation
- ◉ Both Edman Degradation & NMR
- ○ Nuclear Magnetic Resonance (NMR)
- ○ Tandem Mass Spectrometry

Solved by Muhammad Kashif

Click to S

12:57 2.5 K/s 53
vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3) Quiz Star

Question # 1 of 10 (Start time: 12:56:00 PM, 28 August 2022)

Which of the following statements are true about quaternary structure of proteins?

Select the correct option

- (●) Combinations of Alpha helices, Beta sheets, coils and loops help form 3' structures
- ( ) Proteins comprised of only single chain have a quaternary structure
- ( ) 4' Structures of proteins are formed as a result of hydrophobic interactions between non-polar R-groups
- ( ) 4' (Quaternary) structure of proteins are formed by peptide chains that make-up the protein

Click to Save An

Solved by Muhammad Kashif

12:56 54 B/s 53
vulms.vu.edu.pk/ 18

BIF401 - Bioinformatics I (Quiz No. 3) Quiz Star

Question # 1 of 10 (Start time: 12:56:00 PM, 28 August 2022)

Which of the following statements are true about quaternary structure of proteins?

Select the correct option

- ○ Combinations of Alpha helices, Beta sheets, coils and loops help form 3' structures
- ◉ Proteins comprised of only single chain have a quaternary structure
- ○ 4' Structures of proteins are formed as a result of hydrophobic interactions between non-polar R-groups
- ○ 4' (Quaternary) structure of proteins are formed by peptide chains that make-up the protein

Click to Save An

Solved by Muhammad Kashif

12:54 ••• 1.4 K/s 54

Google

the first character of pdb is a...

All News Images Videos Books Finance

The first character is a numeral in the range **1-9**, while the last three characters can be either numerals (in the range 0-9) or letters (in the range A-Z in the Latin alphabet). 21-Apr-2021

https://proteopedia.org › index.php

PDB identification code - Proteopedia, life in 3D

Solved by Muhammad Kashif

About featured snippets Feedback

People also ask

What is the PDB number?

What does an occupancy of 1 represent in a PDB file?

12:48 ••• 4G 551 B/s 55

The 3D structure for
is known, although tl
elements were not in
table for release 38 w
extracted.

DSSP shows:

From	To	Structure
9	13	E beta sheet
21	39	H alpha helix
50	54	E beta sheet
60	72	H alpha helix
78	81	E beta sheet
85	97	H alpha helix
101	104	E beta sheet
117	119	E beta sheet
128	136	H alpha helix
142	148	E beta sheet
151	166	H alpha helix
170	177	E beta sheet
183	196	H alpha helix
200	204	E beta sheet
208	221	H alpha helix
229	231	E beta sheet
236	239	H alpha helix
244	247	H alpha helix
251	254	E beta sheet
263	273	H alpha helix
284	303	H alpha helix
308	315	H alpha helix
320	322	E beta sheet
325	329	E beta sheet
336	337	E beta sheet
341	345	E beta sheet
351	356	E beta sheet

Solved by Muhammad Kashif

References

5:55 94 B/s 82
vulms.vu.edu.pk/ 20

BIF401 - Bioinformatics I (Quiz No. 3) Quiz Star

Question # 8 of 10 (Start time: 05:55:04 PM, 28 August 2022)

Which of the following statements are true about 3-D (Tertiary) structure of proteins?

Select the correct option

- ○ Primary structure of proteins determines the tertiary structure
- ○ 3' structures are formed by different peptide chains that make up the proteins
- ◉ Combinations of Alpha helices, Beta sheets, coils and loops help form 3' structures
- ○ 3' Structures of proteins are formed as a result of hydrophobic interactions between polar R-groups

Click to Save Ar

Solved by Muhammad Kashif

6:04 53 B/s 81
Kashif Murtaza
Just now

β-pleated sheets are the examples of .....

Select the correct option

○	1′ Structure
○	3′ Structure
●	2′ Structure
○	4′ Structure

Solved by Muhammad Kashif

18

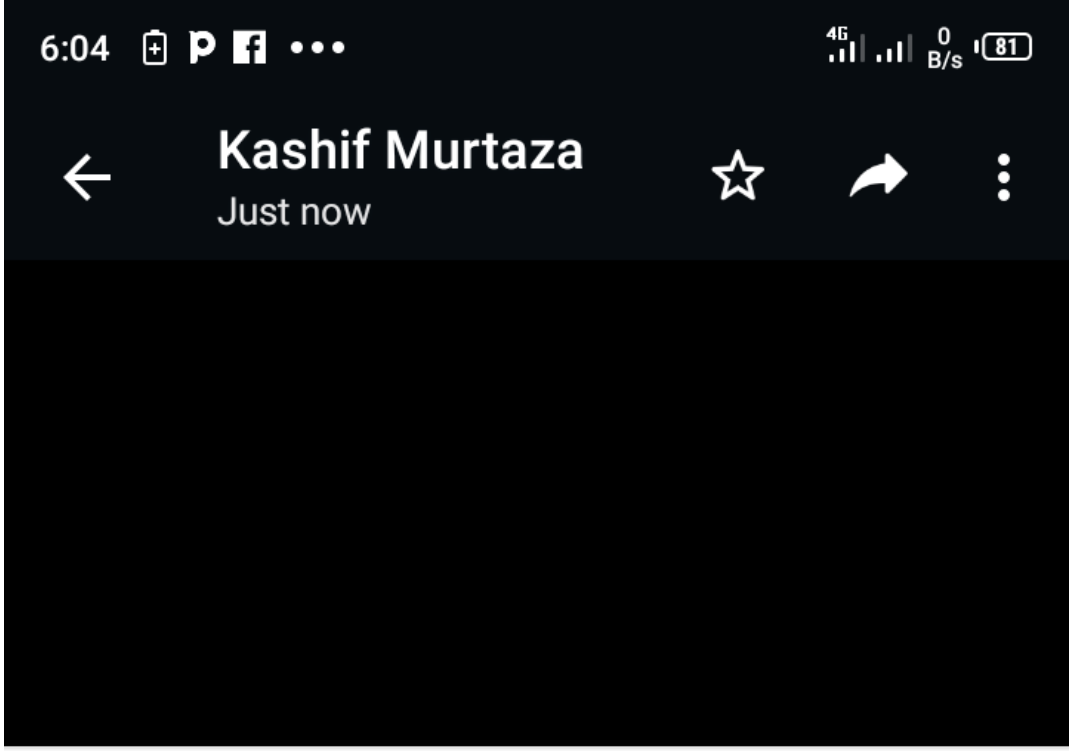
6:04 ••• 4G 0 B/s 81
Kashif Murtaza
Just now

In program GOR IV result page, E stand for

Select the correct option

○	Extended beta strand
○	Beta strand
●	Both beta strand & Extended beta strand
○	Helix

Solved by Muhammad Kashif



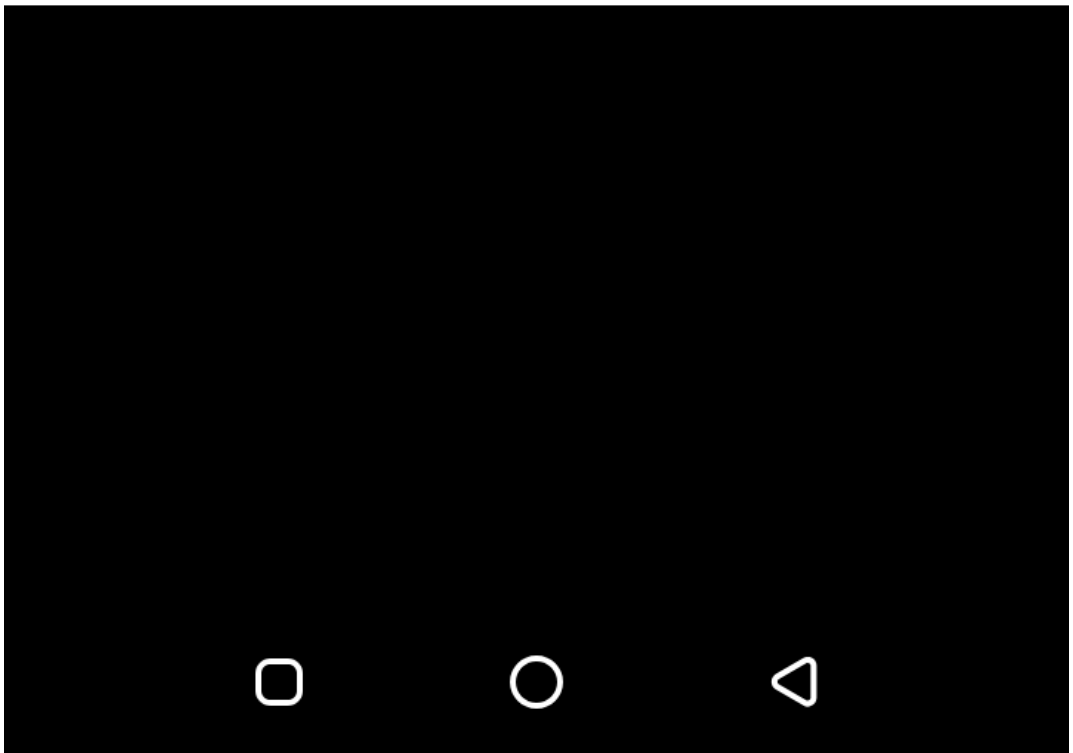
Which of the following statements about PDB is incorrect regarding its usage?

Select the correct option

Reload

- Analyze – stability and interactions of molecule, Structure fun relationships
- None of these
- Engineer and Design – Mutations, additions, deletions to manipulate the function, Facilitate tracking, discover drugs
- Compare Structures - under different conditions, bound to various molecules, in health and disease

Solved by Muhammad Kashif



6:04 ••• 6.2 K/s 81
Kashif Murtaza
Just now

The first character of PDB ID always a numeral in the range of . . .

Select the correct option

- 0 - 5
- 0 - 9
- 1 - 9
- 1 - 5

Solved by Muhammad Kashif