Paper: BI-515 and BI517 Introduction to Bioinformatics & Biological Databases

CO1 Students will be able to distinguish between various types of biological data

T1 Write a short note on Proteins, Lipids, Carbohydrates, Nucleic Acids

A1 Write any five biological experiments and their outputs

Roll No	Test1	Assignment1	Total marks of attempted questions	Total Marks	Percentage	Score (3,2,1)	Target >= 60% (Y/N)
Marks	10	10	20	20			
9051	9	9	18	20	90	3	Y
9052	6	6	12	20	60	3	Y
9053	8	9	17	20	85	3	Y
9055	9	10	19	20	95	3	Y
9056	9	9	18	20	90	3	Y
9058	8	8	16	20	80	3	Y
9059	9	9	18	20	90	3	Y
9060	7	8	15	20	75	3	Y
9061	7	8	15	20	75	3	Y
					Average	**3**	

%age	score
>=60	3
50-59.9	2
40-49.0	1

CO2 Students will be able to experiment with biological data mining using various databases

PA1 Retrieve publications from PUBMED with title containing the term "Lung Cancer, published between between 2015 and 2018

PA2 Search an experimental 3D structure for Wheat Cyclophilin and download its sequence and 3D structure

Roll No	Practical Assignment1	Practical Assignment2	Total marks of attempted questions	Total Marks	Percentage	Score (3,2,1)	Target
Marks	10	10	20	20			
9051	10	9	19	20	95	3	Y
9052	8	8	16	20	80	3	Y
9053	8	9	17	20	85	3	Y
9055	10	9	19	20	95	3	Y
9056	9	9	18	20	90	3	Y
9058	8	9	17	20	85	3	Y

9059	10	10	20	20	100	3	Y
9060	8	8	16	20	80	3	Y
9061	8	8	16	20	80	3	Y
					Average	**3**	

CO3 Students will be able to classify various Bioinformatics databases

A1 List various primary, secondary and specialized data bases

Q2 Identify the type of database from the given list of databases

Roll No	**Assignment1**	**Q1**	**Total marks of attempted questions**	**Total Marks**	**Percentage**	**Score (3,2,1)**	**Target**
Marks	10	5		15			
9051	9	4	13	15	86.66666667	3	Y
9052	5	3	8	15	53.33333333	2	N
9053	8	4	12	15	80	3	Y
9055	9	5	14	15	93.33333333	3	Y
9056	9	5	14	15	93.33333333	3	Y
9058	8	4	12	15	80	3	Y
9059	8	4	12	15	80	3	Y
9060	7	4	11	15	73.33333333	3	Y
9061	6	3	9	15	60	3	Y
					Average	**2.888889**	

CO4 Students will be able to know various database retrieval and deposition systems work

A1 Differentiate between SRS and ENTREZ

A2 Write short notes on Bankit, Seqin, Webin

Roll No	**Assignment1**	**Assignment2**	**Total marks of attempted questions**	**Total Marks**	**Percentage**	**Score (3,2,1)**	**Target**
Marks	10	10		20			
9051	9	9	18	20	90	3	Y
9052	5	5	10	20	50	2	N
9053	8	8	16	20	80	3	Y
9055	9	9	18	20	90	3	Y

9056	9	9	18	20	90	3	Y
9058	8	8	16	20	80	3	Y
9059	8	8	16	20	80	3	Y
9060	6	5	11	20	55	2	N
9061	6	6	12	20	60	3	Y
				Average		**2.777778**	

CO5 Students will differentiate between various formats of biological data and know which format is suitable for a particular application.

CA1 On the given sheet match the imortant features with the repective format

A1 Explain various sections of the PDB format

Roll No	**Class Activity 1**	**Assignment1**	**Total marks of attempted questions**	**Total Marks**	**Percentage**	**Score (3,2,1)**	**Target**
Marks	10	10		20			
9051	9	9	18	20	90	3	Y
9052	7	6	13	20	65	3	Y
9053	10	9	19	20	95	3	Y
9055	9	9	18	20	90	3	Y
9056	9	9	18	20	90	3	Y
9058	8	8	16	20	80	3	Y
9059	9	9	18	20	90	3	Y
9060	7	7	14	20	70	3	Y
9061	7	7	14	20	70	3	Y
				Average		**3**	