


Schedule for 2310506				
BIOINFORMATICS I (3 credits)				
First semester (2021)				
Time: TH, FR 14.00 - 16.00	Co-ordinator: Teerapong			
Room: COM1, MVRH				
Microsoft Teams: 2310506 Bioinformatics -				
Team Code: nd4c8nu				
Topic	Lect	Prac	Date	Instructor
1. Introduction to Bioinformatics	1	1	13-Aug	Teerapong
2. Databases				
2.1 Data banks of biological information	2	2	19, 20 Aug	Rath
2.2 Retrieval of information and data mining	1	1	26-Aug	Rath
2.3 Submitting sequences to the databases	1	1	27-Aug	Rath
3. Sequence analysis I				
3.1 Sequence alignment	2	2	2, 3 Sep	Teerapong
3.2 Databases searching	1	1	9-Sep	Teerapong
3.3 Phylogenetic analysis	1	1	10-Sep	Anchitta
4. Protein analysis				
4.1 Protein sequence analysis	2	2	16,17 Sep	Surasak
4.2 Molecular modeling	1	1	23 Sep	Thanyada
<b>Mid-term examination: สัปดาห์ 27 Sep - 1 Oct 2021 [01-Oct-2021, 08:30 - 11:30]</b>				
4.2 Molecular modeling (continued)	1	1	7 Oct	Thanyada
4.3 Prediction of protein tertiary structure by homology modeling	2	2	8, 14 Oct	Thanyada
4.3 Computer simulation	3	3	15, 21, 28 Oct	Thanyada
4.4 Protein design	3	3	29 Oct, 4, 5 Nov	Thanyada
6. Gene expression and genome analysis (High-throughput data analysis)				
6.1 Identification of gene structures/Genome sequencing and annotation	4	4	11, 12, 18, 19 Nov	Teerapong
6.2 Analysis of high throughput expression data	2	2	25, 26 Nov	Teerapong
<b>Final examination: สัปดาห์ 29 Nov - 14 Dec 2021 [01-Dec-2021, 13:00 - 16:00]</b>				