

# BIOINFORMATICS AND COMPUTATIONAL BIOLOGY, MASTER OF PROFESSIONAL STUDIES (M.P.S.)

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**Non-thesis only:** 30 credits required

<b>Course</b>	<b>Title</b>	<b>Credits</b>
BIOI601	Probability and Statistics	3
BIOI602	Principles of Data Science	3
BIOI603	Principles of Machine Learning	3
BIOI604	(Principles of Molecular Biology, Genetics, and Genomics)	3
BIOI605	(Data Sources and Data Management in Bioinformatics)	3
BIOI606	(Sequence and Alignment)	3
BIOI607	(Data Structures and Algorithms for Bioinformatics)	3
BIOI610	(Genome Annotation)	3
BIOI611	(Analysis of Gene Expression Data)	3
<b>Elective Course (choose one of the following):</b>		<b>3</b>
BIOI621	(Genome Assembly and Annotation)	
BIOI622	(Metagenomics Data Analysis)	
BIOI699	(Capstone Research)	
<b>Total Credits</b>		<b>30</b>