**Nebraska Wesleyan University**

# BIO 2100 Introduction to Bioinformatics

## Catalog

2025-2026

## Course Description

Students will be introduced to the field of bioinformatics and learn how to use the tools and techniques used by researchers to analyze genetic information. A major portion of the course will consist of project-based learning, utilizing data from BIO 1400FYW Introduction to Biological Inquiry where students isolate a virus that infects bacteria, isolate genomic DNA from the virus and then have the DNA sequenced. During this course, students will take the DNA sequence data and analyze the sequence using bioinformatic techniques that will help to identify the genes that comprise the virus. Finally, students will prepare a poster presentation and share their findings.

*Prerequisite(s): BIO 1400FYW Introduction to Biological Inquiry or permission from instructor.*

## Course Hours

3 hours

## Departments

1. Biology