



**COBIP**  
COMPUTATIONAL OMICS AND  
BIOMEDICAL INFORMATICS PROGRAM



# MASTER OF SCIENCE IN COMPUTATIONAL HEALTH INFORMATICS (CHIP)

Be part of the next generation of scientists working on biomedical informatics, computational omics, data science, and imaging to improve healthcare and public health in Africa.

[applyonline.uct.ac.za](https://applyonline.uct.ac.za)

*for 2026 enrolment*

*before the*

*30 September 2025 deadline*

**A *limited* number of full scholarships are available on a competitive basis**

Please note that applying for a scholarship is separate from applying for the programme, and only those accepted into the programme will be considered for a scholarship. If you've applied for enrolment in the programme (link above), you may proceed to apply for a scholarship. Send an email to [chipcobip@gmail.com](mailto:chipcobip@gmail.com) with:

- A letter of motivation (max 500 words) outlining your research interests and why you should be considered for the programme and scholarship
- Your full CV
- Copies of your academic transcripts



# Admission requirements

To be eligible for consideration for admission you need to:

- Have obtained at least 65% at Honours level (South Africa National Qualification Framework level 8, i.e. a qualification equivalent to a four-year degree), in accordance with UCT's general graduate admissions criteria. Your qualification should be in any suitable discipline including statistics, general biology, genetics, epidemiology, bioinformatics, computer science or engineering.
- Submit a motivation letter (500 words max) delineating your biomedical data science research interests and career goals, which will form part of your admission assessment.
- Have proven proficiency in written and spoken English.
- Be computer literate and have access to a computer and the internet.

## Areas of learning

### University of Cape Town (UCT) modules

- Bio-Computing (*core module*)
- Bioinformatics programming with python (*core module*)
- Machine learning and biomedical data science (*core module*)
- Omics Data Mining
- Omics Data Generation
- Population Genomics
- Omics-Wide Association Studies
- Pharmacogenomics and the Microbiome
- Omics for Industry
- Computational Phylogenetics

### Oregon Health & Science University (OHSU) modules

*\*Online and Asynchronous*

- Introduction to Biomedical and Health Informatics



COBIP

The scholarships are made possible through the NIH-funded (Grant Number -5U2RTW012131) Computational Omics and Biomedical Informatics Program (COBIP) at the University of Cape Town. This innovative initiative aims to foster research training in areas such as computational omics, clinical informatics, and translational research, addressing significant health challenges in Africa. The program aspires to develop interdisciplinary data science training focused on African health needs, leading to solutions that are globally relevant. COBIP's educational infrastructure and research opportunities will cultivate the next generation of researchers, driving innovation in biomedical data science across the continent.