UNIB20007 Genetics, Health, and Society

Credit Points:	12.50
Level:	2 (Undergraduate)
Dates & Locations:	2010, Parkville This subject commences in the following study period/s: Semester 1, Parkville - Taught on campus. lectures and tutorials
Time Commitment:	Contact Hours: 36 hours: 12 weeks of two 1-hour lectures per week (24hrs) plus one 1-hour tutorial/workshop per week (12hrs). Total Time Commitment: 120 hours
Prerequisites:	N/A
Corequisites:	N/A
Recommended Background Knowledge:	N/A
Non Allowed Subjects:	N/A
Core Participation Requirements:	For the purposes of considering request for Reasonable Adjustments under the Disability Standards for Education (Cwth 2005), and Students Experiencing Academic Disadvantage Policy, academic requirements for this subject are articulated in the Subject Description, Subject Objectives, Generic Skills and Assessment Requirements of this entry. The University is dedicated to provide support to those with special requirements. Further details on the disability support scheme can be found at the Disability Liaison Unit website: http://www.services.unimelb.edu.au/disability/
Coordinator:	Prof Ingrid Winship
Contact:	**iwinship@unimelb.edu.au (mailto:iwinship@unimelb.edu.au)**
Subject Overview:	The Human Genome Project has defined the blueprint of human life. This has enabled not only greater clarity and understanding of the science of genetics but also an awakening of the personal meaning of heredity, with ethical, spiritual, and cultural dimensions. Because each human being has a unique genome which can potentially be identified, it is not hard to imagine the delicate web of dilemmas that will arise from consideration of the human genome as a utility. For example, predictive testing for a late onset condition entails a complex set of problems; including a person's right to know or not to know facts that cannot be 'unknown'; ownership of the genes (are they owned by the individual or the family, an organisation or a country?); and difficult insurance and privacy concerns. Genomics is not contained within the boundaries of science, but crosses into many other disciplines and fields, including medicine, psychology, sociology, ethics, law, religion, spirituality, and society. This subject will provide students with a greater understanding of genomics and its ramifications, enabling collaboration and debate across many different disciplines and facets of society. The subject will comprise six themes, each addressing a different area affected by recent genomic developments. The proposed themes are: (1) Nature and nurture. What is the human genome and what does it contribute to who we are? (2) Reading the future. What can genes tell us about ourselves and our potential children, and what do we really want to know? What is the impact of genetic testing for medical conditions? What is the link between clinical genetics and special education? (3) The psychology of visible and invisible differences. This theme explores the psychological ramifications for people with genetic disorders that cause obvious disfigurement. (4) Genes and the law. Legal and ethical implications of genomics will be addressed, including termination of pregnancy following genetic testing, IVF procedures, disputed paternity, genetic discrimination in insurance and employment, patenting genes, and genetics in solving crimes. (5) Genes and relationships. What connects families? How do we understand donor-assisted conception, paternity "fraud," and complex "blended" families? (6) Genetics and art. The influence and inspiration of genomics on various media will be explored.

	Lecturers and tutors from different disciplines and faculties will be involved in teaching relevant themes.
Objectives:	On completion of the subject, students should: • Understand the science of human genomics and its role in forming who we are. • Have increased insight into the personal, familial, social, ethical, and legal ramifications of developments in human genomics. • Appreciate the ethical, legal, and societal dilemmas inherent in gene-related decisions, and be able to consider all of the relevant arguments.
Assessment:	(1) Three multiple choice tests of 30 minutes duration each, worth 10% each, evenly spread throughout the semester (30%)(2) Class presentation of 10 minutes duration on an allocated topic, presented during the second half of the semester (10%); and(3) Final written examination (2 hrs), during the examination week (60%).
Prescribed Texts:	Reading and reference material will be provided by lecturers or tutors at the commencement of each theme.
Breadth Options:	This subject potentially can be taken as a breadth subject component for the following courses: # **Bachelor of Arts (https://handbook.unimelb.edu.au/view/2010/B-ARTS)** # **Bachelor of Biomedicine (https://handbook.unimelb.edu.au/view/2010/B-BMED)** # **Bachelor of Commerce (https://handbook.unimelb.edu.au/view/2010/B-COM)** # **Bachelor of Environments (https://handbook.unimelb.edu.au/view/2010/B-ENVS)** # **Bachelor of Music (https://handbook.unimelb.edu.au/view/2010/B-MUS)** # **Bachelor of Science (https://handbook.unimelb.edu.au/view/2010/B-SCI)** # **Bachelor of Engineering (https://handbook.unimelb.edu.au/view/2010/355AA)** You should visit **learn more about breadth subjects (http://breadth.unimelb.edu.au/breadth/info/index.html)** and read the breadth requirements for your degree, and should discuss your choice with your student adviser, before deciding on your subjects.
Fees Information:	Subject EFTSL, Level, Discipline & Census Date, http://enrolment.unimelb.edu.au/fees
Generic Skills:	On completion of the subject, students should have developed the following skills: · Ability to integrate material from diverse disciplines and to discuss the effect of recent developments on different disciplines. · Ability to assess critically information from a range of sources including its quality and relevance to the question under consideration. · Ability to present a broad-based and reasoned discussion on a related topic.