2012-2013 Graduate Calendar

The information published in this Graduate Calendar outlines the rules, regulations, curricula, programs and fees for the 2012-2013 academic years, including the Fall Semester 2012, the Winter Semester 2013 and the Summer Semester 2013.

For your convenience the Graduate Calendar is available in PDF format.

If you wish to link to the Graduate Calendar please refer to the Linking Guidelines.

The University is a full member of:

• The Association of Universities and Colleges of Canada

Contact Information:

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Disclaimer

The Office of Graduate Studies has attempted to ensure the accuracy of this on-line Graduate Calendar. However, the publication of information in this document does not bind the university to the provision of courses, programs, schedules of studies, fees, or facilities as listed herein.

Limitations

The University of Guelph reserves the right to change without notice any information contained in this calendar, including any rule or regulation pertaining to the standards for admission to, the requirements for the continuation of study in, and the requirements for the granting of degrees or diplomas in any or all of its programs.

The university will not be liable for any interruption in, or cancellation of, any academic activities as set forth in this calendar and related information where such interruption is caused by fire, strike, lock-out, inability to procure materials or trades, restrictive laws or governmental regulations, actions taken by the faculty, staff or students of the university or by others, civil unrest or disobedience, Public Health Emergencies, or any other cause of any kind beyond the reasonable control of the university.

The University of Guelph reaffirms section 1 of the Ontario Human Rights Code, 1981, which prohibits discrimination on the grounds of race, ancestry, place of origin, colour, ethnic origin, citizenship, creed, sex, sexual orientation, handicap, age, marital status or family status.

The university encourages applications from women, aboriginal peoples, visible minorities, persons with disabilities, and members of other under-represented groups.

Collection, Use and Disclosure of Personal Information

Personal information is collected under the authority of the University of Guelph Act (1964), and in accordance with Ontario's Freedom of Information and Protection of Privacy Act (FIPPA) http://www.e-laws.gov.on.ca/DBLaws/Statutes/English/90f31_e.htm. This information is used by University officials in order to carry out their authorized academic and administrative responsibilities and also to establish a relationship for alumni and development purposes. Certain personal information is disclosed to external agencies, including the Ontario Universities Application Centre, the Ministry of Training, Colleges and Universities, and Statistics Canada, for statistical and planning purposes, and is disclosed to other individuals or organizations in accordance with the Office of Registrarial Services Departmental Policy on the Release of Student Information. For details on the use and disclosure of this information call the Office of Registrarial Services at the University at (519) 824-4120 or see <a href="http://www.uoguelph.ca/registrar/index.cfm?i

Statistics Canada - Notification of Disclosure

For further information, please see Statistics Canada's web site at http://www.statcan.gc.ca and Section XIV Statistics Canada.

Address for University Communication

Depending on the nature and timing of the communication, the University may use one of these addresses to communicate with students. Students are, therefore, responsible for checking all of the following on a regular basis:

Email Address

The University issued email address is considered an official means of communication with the student and will be used for correspondence from the University. Students are responsible for monitoring their University-issued email account regularly.

Home Address

Students are responsible for maintaining a current mailing address with the University. Address changes can be made, in writing, through the Office of Graduate Studies.

Name Changes

The University of Guelph is committed to the integrity of its student records, therefore, each student is required to provide either on application for admission or on personal data forms required for registration, his/her complete, legal name. Any requests to change a name, by means of alteration, deletion, substitution or addition, must be accompanied by appropriate supporting documentation.

Student Confidentiality and Release of Student Information Policy Excerpt

The University undertakes to protect the privacy of each student and the confidentiality of his or her record. To this end the University shall refuse to disclose personal information to any person other than the individual to whom the information relates where disclosure would constitute an unjustified invasion of the personal privacy of that person or of any other individual. All members of the University community must respect the confidential nature of the student information which they acquire in the course of their work. Complete policy at http://www.uoguelph.ca/policies.

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Food Safety and Quality Assurance

The interdepartmental program is the focal point for graduate teaching and research in food safety and quality assurance. The MSc program in food safety and quality assurance is intended to prepare food scientists, food engineers, veterinarians and others with appropriate scientific backgrounds for participation in food safety monitoring and maintenance in the food industry and in government. Students wishing to undertake graduate studies at the MSc level with emphasis on food safety and quality assurance will enter the program through a participating department. The participating academic units are Biomedical Sciences, Marketing and Consumer Studies, Environmental Biology, Food Science, Pathobiology, Population Medicine, and Engineering.

Administrative Staff

Chair

Art Hill (112 Food Science, Ext. 53875) arhill@uoguelph.ca

FSQA Graduate Coordinator

Keith Warriner (126 Food Science, Ext. 56072) kwarrine@uoguelph.ca Graduate Secretary

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knorwell@uoguelph.ca **Graduate Faculty** Shai Barbut Professor, Food Science Herman J. Boermans Associate Professor, Biomedical Sciences Milena Corredig Professor, Food Science Lisa Duizer Assistant Professor, Food Science H. Douglas Goff Professor, Food Science Mansel W. Griffiths Professor, Food Science Arthur R. Hill Professor and Chair, Food Science Robert W. Lencki Associate Professor, Food Science Loong-Tak Lim Associate Professor, Food Science Alejandro G. Marangoni Professor, Food Science Massimo Marcone Associate Professor, Food Science S. Wayne Martin Professor, Population Medicine Scott A. McEwen Professor, Population Medicine Yoshinori Mine Professor, Food Science Peter Purslow Professor, Food Science Koushik Seetharaman Associate Professor, Food Science Jack T. Trevors Professor, Environmental Biology **David Waltner-Toews** Professor, Population Medicine

Keith Warriner Associate Professor, Food Science Anne Wilcock Associate Professor, Marketing and Consumer Studies Rickey Y. Yada

Professor, Food Science

MSc Program

Admission Requirements

The program is most suitable for those with an undergraduate science background or for those currently employed in the food area in government regulatory work or in the processing industry who desire upgrading of skills and knowledge. Applicants for admission to this program must meet the university minimum admission requirement of a baccalaureate in an honours program (or the equivalent) or a DVM from a recognized university or college with an average standing of at least second-class honours ('B-' average). Applicants will be expected to have completed undergraduate courses that prepare them for participation in the core graduate courses and electives of the program. Undergraduate upgrading may be necessary to ensure sufficient background in topics such as microbiology, toxicology, statistics, and analytical methods.

Degree Requirements

Completion of the program requires a minimum of eight courses (or 4.5 credits) acceptablefor graduate credit. This includes the seminar course which has a value of 0.5 credit. Allstudents must complete:FSQA*6000[0.50]Food Safety and Quality Assurance Seminar

	FSQA*6500	[1.00]	Food Safety and Quality Assurance Research Project		
	This project is equal to 1.0 credit and counts as one course of the eight required courses.				
	FSQA*6600	[0.50]	Principles of Food Safety and Quality Assurance		
	FSQA*6150	[0.50]	Food Quality Assurance Management		
At least four additional courses, in consultation with the student's advisory committee.					

Suitable courses are listed below. Other courses, not listed here, also may be considered. Up to two senior undergraduate courses can be taken. At least one course must be taken from each of three of the participating departments, including the department in which the student is registered. The courses selected will depend upon the student's background, specialty, interest and area of project research. The normal duration of the program will be three to four full-time semesters.

Graduate Diploma

Admission Requirements

The program is most suitable for those with an undergraduate science background or for those currently employed in the food area in government regulatory work or in the processing industry who desire upgrading of skills and knowledge. Applicants for admission to this program must meet the university minimum admission requirement of a baccalaureate in an honours program (or the equivalent) or a DVM from a recognized university or college with an average standing of at least second-class honours ('B-'average). Applicants will be expected to have completed undergraduate courses that prepare them for participation in the core graduate courses and electives of the program. Undergraduate upgrading may be necessary to ensure sufficient background in topics such as microbiology, toxicology, statistics, and analytical methods.

Diploma Requirements

All students must complete the following five courses:

in students must comprete the following nee courses.				
FSQA*6100	[0.50]	Food Law and Policy		
FSQA*6150	[0.50]	Food Quality Assurance Management		
FSQA*6200	[0.50]	Food Safety Systems Management		
FSQA*6600	[0.50]	Principles of Food Safety and Quality Assurance		
POPM*6350	[0.50]	Safety of Foods of Animal Origins		
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Courses

FSQA*6000 Food Safety and Quality Assurance Seminar S,F [0.50] Provides experiential training in forms of communication that are likely to be required

in professional or academic careers in food science and technology.

Restriction(s): This course is open only to students in the MSc FSAQ program.

FSQA*6100 Food Law and Policy F [0.50]

The fundamentals of food policy development and Canadian and international food law are learned and practiced through online presentations, independent study and online interactions with other students and industry professionals.

Restriction(s): Offered by distance education only.

FSQA*6150 Food Quality Assurance Management W [0.50]

Examination and review of principles and concept of quality assurance and their application to consumer products and services. Topics include applied aspects of total-quality management principles.

Restriction(s): Offered by distance education only.

FSQA*6200 Food Safety Systems Management W [0.50]

Food safety systems are studied in four modules. (1) A brief review of plant hygiene and HACCP principles. Students with insufficient background will do supplemental study in these areas; (2) HACCP implementation and verification; (3) HACCP-based food safety programs in Canada; and (4) International Food Safety Management Systems.

Restriction(s): Offered by distance education only.

FSQA*6500 Food Safety and Quality Assurance Research Project S,F,W [1.00]

An original research project related to food safety and quality assurance which includes the preparation of a written report suitable for publication and an oral presentation of the findings to the graduate faculty.

FSQA*6600 Principles of Food Safety and Quality Assurance S,F [0.50]

An integrated approach to factors affecting food safety and quality including microbial and chemical contamination is provided. Major food-borne disease outbreaks are studied as examples. Modern methods of quality management to minimize contamination of processed foods is discussed.

Restriction(s): Offered by distance education only.

Other Graduate Courses Suitable for Credit in this Program

Biomedical Sciences				
BIOM*6440	[0.50]	Biomedical Toxicology		
Engineering				
ENGG*6110	[0.50]	Food and Bio-Process Engineering		
ENGG*6160	[0.50]	Advanced Food Engineering		
Food Science				
FOOD*6190	[0.50]	Advances in Food Science		
FOOD*6710	[0.25]	Special Topics in Food Chemistry		
FOOD*6720	[0.25]	Special Topics in Food Microbiology		
FOOD*6730	[0.25]	Special Topics in Food Physics		
FOOD*6740	[0.25]	Special Topics in Food Processing		
FOOD*6750	[0.25]	Special Topics in Food for Health		
FOOD*6760	[0.25]	Special Topics in Food Quality		
Human Heath	Human Heath and Nutritional Sciences			
HHNS*6400	[0.50]	Functional Foods and Nutraceuticals		
HHNS*6410	[1.00]	Applied Functional Foods and Nutraceuticals		
Pathobiology				
PABI*6000	[0.50]	Bacterial Pathogenesis		
PABI*6550	[0.50]	Epidemiology of Zoonoses		
Population Medicine				
POPM*6200	[0.50]	Epidemiology I		
POPM*6210	[0.50]	Epidemiology II		
POPM*6350	[0.50]	Safety of Foods of Animal Origins		
Plant Agriculture				
PLNT*6110	[0.50]	Fruit and Vegetable Technology		
Undergradua	te Cours	ses Suitable for Credit in this Program		
Food Science				
FOOD*3030	[0.50]	Food Chemistry I		
FOOD*4120	[0.50]	Food Analysis		
FOOD*4090	[0.50]	Functional Foods and Nutraceuticals		
Human Health and Nutritional Sciences				
NUTR*4510	[0.50]	Toxicological Aspects of Nutrition		
D. I. C. M.		U		

 Population Medicine

 POPM*4040
 [0.50]
 Epidemiology of Food-Borne Diseases