

APPLIED URBAN AQUACULTURE, UNDERGRADUATE CERTIFICATE

The Certificate in Applied Urban Aquaculture is open to all students seeking a bachelor's degree from UWM, as well as those who previously received a bachelor's degree from UWM or any other accredited college or university. Urban aquaculture techniques developed at UWM School of Freshwater Sciences promote the use of integrated, fish and vegetable production systems that utilize green technology, water reuse, zero effluent discharge, and energy conservation.

Learn concepts, apply methods, and develop solutions:

- Monitor water chemistry and microbial activity
- Perform harvesting and husbandry techniques
- Identify and diagnose pathogens and diseases
- Operate and oversee life support and recirculating aquaculture systems
- Create and implement aquaculture operating procedures

For more information contact Dr. Jhonatan Sepulveda, *Assistant Professor of Freshwater Sciences, Certificate Coordinator*, at sepulveo@uwm.edu.

Application Deadlines

- Fall – March 1st
- Spring – December 1st

Admissions

To be admitted to the university as non-degree students, individuals must meet regular university admission requirements (<http://catalog.uwm.edu/admission-costs/undergraduate-admission/>). Students who are not currently enrolled and have not applied to UW-Milwaukee in the past need to fill out an online application and pay the application fee. All applicants must submit transcripts that provide evidence of the following required coursework (or equivalent) prior to admission:

Code	Title	Credits
CHEM 104	General Chemistry and Qualitative Analysis	5
BIO SCI 152	Foundations of Biological Sciences II	4
MATH 116	College Algebra	3

To formally declare your intent to pursue the Certificate in Applied Urban Aquaculture, complete the Declaration Form and make an appointment with the certificate coordinator.

Program Requirements

Students must complete 15 credits (5 courses) with a minimum grade point average of 2.75. Courses for this certificate may not be taken on a credit/no credit basis.

Code	Title	Credits
FRSHWTR 511	Ichthyology	3
FRSHWTR 562	Principles of Aquaculture Systems	3

FRSHWTR 563	Finfish Aquaculture and Nutrition Principles	3
FRSHWTR 564	Water Quality in Aquaculture	3
FRSHWTR 567	Fish Health	3
Total Credits		15

Credits earned at other accredited institutions equivalent to courses in the certificate program may be accepted in partial fulfillment of the program requirements, subject to review by the Certificate Program Advisory Committee. This information should be included on the Declaration Form for approval when you apply to the certificate program.

To Apply

I have a Bachelor's Degree and am not currently enrolled in a degree program.

1. Contact Jhonatan Sepulveda Villet (sepulveo@uwm.edu) to review unofficial transcripts for prerequisites.
2. Apply online as a degree seeking certificate student at <https://apply.wisconsin.edu/> and submit official transcripts. (There is no application fee for former UWM students; all others must pay the fee.)
3. SFS reviews application and submits decision to Office of Undergraduate Admissions.
4. Complete and submit the Applied Urban Aquaculture Declaration Form (<http://uwm.edu/freshwater/wp-content/uploads/sites/48/2014/07/AUA-Declaration-Form1.pdf>) to Mallory Kaul (minorm@uwm.edu).

I am enrolled at another UW System school and have achieved at least junior status.

1. Contact Jhonatan Sepulveda Villet (sepulveo@uwm.edu) to review unofficial transcripts for prerequisites.
2. Your current undergraduate advisor completes a pre-authorization form.
3. Apply online as a degree seeking certificate student at <https://apply.wisconsin.edu/> and submit official transcripts.
4. SFS reviews application and submits decision to Office of Undergraduate Admissions.
5. Complete and submit the Applied Urban Aquaculture Declaration Form (<http://uwm.edu/freshwater/wp-content/uploads/sites/48/2014/07/AUA-Declaration-Form1.pdf>) to Mallory Kaul (minorm@uwm.edu).

I am at least a junior at UWM.

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4. Certificate plan is added to your PAWS account.

There is no additional application fee for current UWM students.

Gainful Employment

The Applied Urban Aquaculture Program is subject to gainful employment regulations (<http://uwm.edu/financialaid/apply-for-aid/eligibility/non-degree-students/>).

U.S. Department of Education Gainful Employment Certificate Disclosure Information. (<https://wwwdev.uwm.edu/freshwater-2/academics/applied-urban-aquaculture/gainful-employment-disclosure/>)