

Business Analytics Major - Bachelor of Science (BS)

Why major in business analytics? We live in a data driven world.

Business analytics (BA) is the ability to use statistics, quantitative analysis, and information modeling to shape and make business decisions. The business analytics major features a multi-disciplinary curriculum that focuses on developing new insights and understanding of business performance based on data and statistical methods. The program incorporates a wide range of required and elective courses covering topics including: statistics, data visualization, databases, data mining, business forecasting, and performance analysis.

Graduates of the BA program will be prepared to succeed in a data-driven world and will gain exposure to a variety of cutting-edge software platforms and techniques used to store, transform, analyze, visualize, and interpret business data. Graduates have a wide variety of excellent career prospects. Your knowledge of how BA works to improve business processes and decisions will prepare you for a rewarding career in the business analytics area.

Many BA majors participate in an internship experience in their junior or senior year. The internships earn university credit that applies to the major program. Most are paid and many lead to employment following graduation.

Major requirements

(College of Business Administration)

College of Business Administration (CBA) core requirements

All students enrolled in any program within the college are required to complete the following:

- College of Business (CBA) core courses (<https://catalog.uwlax.edu/undergraduate/businessadministrationcba/#CBACore>)
- [CBA upper division prerequisite requirement](#) - Most professional, upper division courses (300/400 level) in the CBA require students to have the following to register into the course:
 - A grade of "C" or better in ACC 221, ACC 222, BLAW 205, ECO 110, ECO 120, ENG 110/ENG 112, MTH 160/MTH 175/MTH 207, and STAT 145/STAT 245;
 - 54 credits or higher earned (or in progress).

Curriculum

24 credits

Code	Title	Credits
Core		
IS 300	Data Management for Business Problem Solving and Decision Making ¹	3
IS 320	Enterprise Systems for Decision Making and Data Analytics	3
IS 360	Management of Business Analytics	3
IS 440	Business Data Visualization and Communication	3
Group 1		

Select one of the following: 3

ECO 307	Introduction to Econometrics
STAT 305	Statistical Methods

Group 2

Select nine credits of the following: 9

ACC 327	Accounting Information Systems
CS 115	Introduction to Python Programming
GEO 305	Geographic Information Systems and Science I
GEO 405	Geographic Information System and Science II
IS 340	Information Systems Security and Data Assurance Management
IS 401	Management Information Systems: Analysis and Design
IS 405	Special Topics in Information Systems
IS 411	Management Information Systems: Project Management and Implementation
IS 451	CBA Management Information Systems Internship
FIN 437	Financial Modeling
MGT 402	Healthcare Analytics Management
MKT 465	Digital Marketing and Analytics
MKT 467	Marketing Analytics
STAT 443	Categorical Data Analysis
STAT 445	Correlation and Regression Analysis
STAT 446	Analysis of Variance and Design of Experiments
STAT 448	Operations Research
STAT 449	Applied Multivariate Statistics
or a course listed in Group I not used above	

Total Credits 24

¹ Requires completion of IS 220.

² No more than six credits can double count with another major or minor.

Degree requirements

All students must complete the general education, college core, major/minor, and university degree requirements in order to qualify for a degree. The easiest way to track all of these requirements is to refer to the Advisement Report (AR) found in the Student Information System (WINGS) Student Center. All enrolled students have access to the AR.

- General education (<http://catalog.uwlax.edu/undergraduate/generaleducation/>)
- College core (p. 1)
- Baccalaureate degree requirements (p. 2)

College of Business Administration core requirements

All students enrolled in any program within the college must complete the 16 business core courses listed below and all requirements for the major (see department listings). MGT 449 must be taken in the semester of graduation.

Code	Title	Credits
ACC 221	Accounting Principles I ¹	3
ACC 222	Accounting Principles II ¹	3

BLAW 205	The Legal and Ethical Environment of Business ¹	3
ECO 110	Microeconomics and Public Policy ¹	3
ECO 120	Global Macroeconomics ¹	3
ECO 230	Data Analysis for Business Applications	3
ENG 110	College Writing II ¹	3
	or ENG 112 College Writing AP (Advanced Placement)	
FIN 355	Principles of Financial Management	3
IS 220	Information Systems for Business Management	3
MGT/MKT 301	Business Communication	3
MGT 308	Organizational Behavior	3
MGT 393	Production and Operations Management	3
MKT 309	Principles of Marketing	3
MTH 160	Mathematics for Business ¹	4-5
	or MTH 175 Applied Calculus	
	or MTH 207 Calculus I	
STAT 145	Elementary Statistics (or equivalent) ¹	4
	or STAT 245 Probability and Statistics	
Capstone - taken in the semester of graduation		
MGT 449	CBA Capstone: Applied Business Strategy	3
Total Credits		50-51

¹ A grade of "C" or better required.

Upper division prerequisite requirement

Most professional, upper division courses (300/400 level) in the CBA require students to have the following to register into the course:

1. A grade of "C" or better in ACC 221, ACC 222, BLAW 205, ECO 110, ECO 120, ENG 110/ENG 112, MTH 160/MTH 175 /MTH 207, and STAT 145/STAT 245;
2. 54 credits or higher earned (or in progress).

Baccalaureate degree requirements

Candidates for the Bachelor of Arts or the Bachelor of Science degrees must accomplish the following:

1. Fulfill the general education requirements.
2. Complete at least one ethnic studies (diversity) course.
3. Complete the courses prescribed by the Undergraduate Curriculum Committee for the degree desired in the respective school or college.
4. Earn a minimum of 120 semester credits with at least a 2.00 cumulative GPA.^{1,2}
5. At least 40 credits must be earned in 300/400 level courses. Transfer courses earned or transferred at the 300/400 level apply to this requirement.
6. Complete major and minor requirements with at least a 2.00 GPA^{1,2} in each major and minor (and concentration or emphasis, if selected).
7. A minimum of 30 semester credits in residence at UWL is required for graduation. (See undergraduate resident requirement (<http://catalog.uwlax.edu/undergraduate/academicpolicies/graduation/#undergraduate-residence-requirement>).
8. Submit an application for graduation via the "Apply for Graduation" link in the WINGS Student Center as soon as the student has registered for his or her final semester or summer term in residence.

December and winter intersession graduates should apply by May 1. May and summer graduates should apply by December 1.

- ¹ Grade point average requirements for some programs will be considerably higher than 2.00. Re-entering students may be required to earn credits in excess of the 120 needed for graduation in any curriculum in order to replace credits earned in courses in which the content has changed substantially in recent years. Each case will be judged on its own merit.
- ² The grade point average recorded at the time the degree is awarded will not be affected by future enrollment.

No degree will be awarded unless all requirements are fulfilled and recorded within 30 days after the official ending date of each term.

Sample degree plan

Below is a sample degree plan that can be used as a guide to identify courses required to fulfill the major and other requirements needed for degree completion. A student's actual degree plan may differ depending on the course of study selected (second major, minor, etc.). Also, this sample plan assumes readiness for each course and/or major plan, and some courses may not be offered every term. Review the course descriptions or the class timetable (<http://www.uwlax.edu/records/regISTRATION/>) for course offering information.

The sample degree plans represented in this catalog are intended for first-year students entering UWL in the fall term. Students should use the Advisement Report (AR) in WINGS (<https://wings.uwlax.edu>) and work closely with their faculty advisor(s) and college dean's office to ensure declaration and completion of all requirements in a timely manner.

General Education Program

The general education curriculum (Gen Ed) is the common educational experience for all undergraduates at UWL. Sample degree plans include Gen Ed placeholders to ensure completion of the general education requirements. Courses may be rearranged to fit the needs or recommendations of the student's program of study. Gen Ed courses may be taken during winter term (January between the semesters) and summer to reduce the course load during regular terms (fall and spring). Students should consult with their advisor and/or the college academic services director in their college/school for assistance with course and schedule planning. Refer to the general education requirements (<http://catalog.uwlax.edu/undergraduate/generaleducation/>) for more specific details.

At least 40 credits of the 120 credits required must be earned at the 300/400-level.

Note: New students and transfer students with less than 12 credits earned are required to take FYS 100 First-Year Seminar (3 cr.) during one of their first two semesters at UWL.

This sample degree plan does not establish a contractual agreement. It identifies the minimum requirements a student must successfully complete, to qualify for a degree, in a format intended to assist the student in planning their academic career. Actual degree plans may differ.

Year 1

Fall	Credits Spring	Credits
ECO 110 or 120 (Gen Ed Global Studies/ Gen Ed Self & Society) ¹	3 ECO 110 or 120 (Gen Ed Global Studies/ Gen Ed Self & Society) ¹	3
ENG 110 or 112 (Gen Ed Literacy - Written) ¹	3 CST 110 (Gen Ed Literacy - Oral)	3

MTH 160, 175, or 207 (Depending on math placement exam results)	4 STAT 145 (Depending on math placement exam results) ¹	4
FYS 100 (Gen Ed First-Year Seminar)	3 Gen Ed Minority Cultures	3
Gen Ed Arts	2-3 Gen Ed Arts	2-3
	15	16
Year 2		
Fall	Credits Spring	Credits
ACC 221 ¹	3 ACC 222 ¹	3
IS 220	3 BLAW 205	3
Gen Ed Health & Well-Being	3 University Elective	3
Gen Ed World History	3 Gen Ed Humanistic Studies	3
University Elective	3 Gen Ed Natural Lab Science	4
	15	16
Year 3		
Fall	Credits Spring	Credits
MGT 301 or MKT 301	3 MGT 393	3
MGT 308	3 IS 300	3
ECO 230	3 ECO 307 or STAT 305 (Group 1 Course)	3
University Elective	3 University Elective	3
University Elective	3 University Elective	3
	15	15
Year 4		
Fall	Credits Spring	Credits
MKT 309	3 MGT 449	3
IS 320	3 IS 440	3
IS 360	3 Major Elective (Group 2 Course)	3
Major Elective (Group 2 Course)	3 Major Elective (Group 2 Course)	3
FIN 355	3 University Elective (300/400- level)	1
	15	13

Total Credits: 120

¹ A grade of "C" or better is required for the CBA core requirements.