

# Business Analytics B.A.

## Business Analytics Major

The B.A. Business Analytics major requires a minimum of 120 total hours to graduate. This total includes UNIFI/General Education requirements and the following specified major requirements, plus electives to complete the minimum of 120 hours.

### Required Business Core

Business Administration, Interdepartmental		
BUSINESS 1000	Introductory Seminar for Business Professionals	0
BUSINESS 2000	Business Professionals in Training	0
Accounting		
ACCT 2120	Principles of Financial Accounting	3
ACCT 2130	Principles of Managerial Accounting	3
Marketing		
MKTG 2110	Principles of Marketing	3
Management		
MGMT 2080	Introduction to Information Systems	3
MGMT 3100	Legal and Social Environment of Business	3
or ACCT 3075	Legal and Ethical Concepts for Accountants	
MGMT 3154	Operations Management	3
MGMT 3965/5965	Organizational Behavior	3
MGMT 4175	Strategic Management *	3
Finance		
FIN 3130	Corporate Finance	3
Economics		
ECON 1011	Statistics for Business Analytics	3
ECON 2090	Decision Analytics	3
ECON 1041	Principles of Macroeconomics	3
ECON 1051	Principles of Microeconomics	3
Mathematics		
STAT 1772	Introduction to Statistical Methods	3
Emphasis requirements (students choose only one area of emphasis)		18
<b>Total Hours</b>		<b>60</b>

\* The rest of the business core must be completed before MGMT 4175 is taken.

## Emphases

### Decision Support

#### Required

Economics

ECON 3371	Economic and Business Forecasting	3
Management		
MGMT 2032	Introduction to Programming for Business	3
MGMT 2036	Business Analytics Fundamentals	3
MGMT 3120	Database Management and Theory	3
MGMT 3121	Advanced Business Analytics	3
<b>Electives (Choose one of the following)</b>		<b>3</b>
Economics		
ECON 3373/5373	Introduction to Econometrics	
Finance		
FIN 3210	Financial Modeling and Analytics *	
Management		
MGMT 3122	Business Intelligence	
Marketing		
MKTG 3116/5116	Marketing Analytics	
<b>Total Hours</b>		<b>18</b>

\* FIN 3120 has prerequisites of ACCT 2120; C- or better in FIN 3130; FIN 3160; STAT 1772 or equivalent; ECON 1041; ECON 1051; ECON 1011 or MATH 1421; junior standing.

## Artificial Intelligence

### Required

Management		
MGMT 2032	Introduction to Programming for Business	3
MGMT 2038	AI Foundations for Business	3
MGMT 3124	Applied Programming for AI in Business	3
MGMT/PHIL/RELS 3974	Ethics, Responsible AI, and Business	3
MGMT 4100	Applied AI Projects for Business	3
MGMT 3138	Generative AI and Natural Language Processing for Business	3
<b>Total Hours</b>		<b>18</b>

Note: Business Analytics majors (any emphasis) are allowed to double major with Management Information Systems. Business Analytics: Decision Support emphasis students may pursue the Certificate in Applied AI for Business.

## Business Analytics B.A.

### Four-Year Plan

#### Business Analytics: Decision Support, B.A.

This is a sample plan of study with a suggested sequencing of classes for the major. University electives may be applied to earn additional academic majors, minors, or certificates. Students should regularly meet with their academic advisor to plan their specific semester schedule to include UNIFI/General Education program and/or university elective hours required.

Course	Title	Hour
<b>Freshman</b>		
<b>Fall</b>		
BUSINESS 1000	Introductory Seminar for Business Professionals	0
ECON 1041	Principles of Macroeconomics	3
STAT 1772	Introduction to Statistical Methods	3
ENGLISH 1005	College Writing and Research	3
UNIFI/General Education or University Electives		6
<b>Hours</b>		<b>15</b>
<b>Spring</b>		
ECON 1051	Principles of Microeconomics	3
ECON 1011	Statistics for Business Analytics	3
UNIFI/General Education or University Electives		9
<b>Hours</b>		<b>15</b>
<b>Sophomore</b>		
<b>Fall</b>		
MGMT 2080	Introduction to Information Systems	3
ACCT 2120	Principles of Financial Accounting	3
BUSINESS 2000	Business Professionals in Training	0
UNIFI/General Education or University Electives		9
<b>Hours</b>		<b>15</b>
<b>Spring</b>		
ACCT 2130	Principles of Managerial Accounting	3
ECON 2090	Decision Analytics	3
MKTG 2110	Principles of Marketing	3
UNIFI/General Education or University Electives		6
<b>Hours</b>		<b>15</b>
<b>Junior</b>		
<b>Fall</b>		
MGMT 2032	Introduction to Programming for Business	3
MGMT 3965/5965	Organizational Behavior	3
MGMT 3100	Legal and Social Environment of Business	3
UNIFI/General Education or University Electives		6
<b>Hours</b>		<b>15</b>
<b>Spring</b>		
FIN 3130	Corporate Finance	3
MGMT 2036	Business Analytics Fundamentals	3
MGMT 3154	Operations Management	3
UNIFI/General Education or University Electives		6
<b>Hours</b>		<b>15</b>

#### Senior

<b>Fall</b>		
MGMT 3121	Advanced Business Analytics	3
MGMT 3120	Database Management and Theory	3
UNIFI/General Education or University Electives		9
<b>Hours</b>		<b>15</b>
<b>Spring</b>		
ECON 3371	Economic and Business Forecasting	3
MGMT 4175	Strategic Management	3
Business Analytics Elective		3
UNIFI/General Education or University Electives		6
<b>Hours</b>		<b>15</b>
<b>Total Hours</b>		<b>120</b>

#### Business Analytics: Artificial Intelligence, B.A.

This is a sample plan of study with a suggested sequencing of classes for the major. University electives may be applied to earn additional academic majors, minors, or certificates. Students should regularly meet with their academic advisor to plan their specific semester schedule to include UNIFI/General Education program and/or university elective hours required.

Course	Title	Hour
<b>Freshman</b>		
<b>Fall</b>		
BUSINESS 1000	Introductory Seminar for Business Professionals	0
ECON 1041	Principles of Macroeconomics	3
ENGLISH 1005	College Writing and Research	3
STAT 1772	Introduction to Statistical Methods	3
UNIFI/General Education or University Electives		6
<b>Hours</b>		<b>15</b>
<b>Spring</b>		
ECON 1051	Principles of Microeconomics	3
ECON 1011	Statistics for Business Analytics	3
UNIFI/General Education or University Electives		9
<b>Hours</b>		<b>15</b>
<b>Sophomore</b>		
<b>Fall</b>		
MGMT 2080	Introduction to Information Systems	3
ACCT 2120	Principles of Financial Accounting	3
BUSINESS 2000	Business Professionals in Training	0
UNIFI/General Education or University Electives		9
<b>Hours</b>		<b>15</b>
<b>Spring</b>		
ACCT 2130	Principles of Managerial Accounting	3
ECON 2090	Decision Analytics	3
MKTG 2110	Principles of Marketing	3
UNIFI/General Education or University Electives		6
<b>Hours</b>		<b>15</b>

<b>Junior</b>		
<b>Fall</b>		
MGMT 2032	Introduction to Programming for Business	3
MGMT 3100	Legal and Social Environment of Business	3
MGMT 3965/5965	Organizational Behavior	3
UNIFI/General Education or University Electives		6
<b>Hours</b>		<b>15</b>
<b>Spring</b>		
FIN 3130	Corporate Finance	3
MGMT 2038	AI Foundations for Business	3
MGMT 3154	Operations Management	3
UNIFI/General Education or University Electives		6
<b>Hours</b>		<b>15</b>
<b>Senior</b>		
<b>Fall</b>		
MGMT 3124	Applied Programming for AI in Business	3
MGMT 3138	Generative AI and Natural Language Processing for Business	3
MGMT 4175	Strategic Management	3
UNIFI/General Education or University Electives		6
<b>Hours</b>		<b>15</b>
<b>Spring</b>		
MGMT 3974/5974	Ethics, Responsible AI, and Business	3
MGMT 4100	Applied AI Projects for Business	3
UNIFI/General Education or University Electives		9
<b>Hours</b>		<b>15</b>
<b>Total Hours</b>		<b>120</b>

## Learning Outcomes

### Business Analytics, B.A.

- **Objective 1: Learners will demonstrate disciplinary content knowledge.**
  - Outcome 1.1. Learners will demonstrate broad knowledge of the business disciplines.
  - Outcome 1.2. Learners will plan and design interactive programs using pseudocode or flow charts using input, process, and output methodology.
  - Outcome 1.3. Learners will define and use variables and different data types (such as string, float, and integers) for program data storage.
  - Outcome 1.4. Learners will describe and implement decision structures and repetitive structures.
  - Outcome 1.5. Learners will create database objects and write simple and complex SQL queries for a relational database.
  - Outcome 1.6. Learners will use techniques for descriptive, predictive, and prescriptive analytics.
- **Objective 2: Learners will display analytical skills to aid in business decision-making.**
  - Outcome 2.1. Learners will display a broad set of quantitative skills.
  - Outcome 2.2. Learners will display appropriate use of relevant technology/software.

- Outcome 2.3. Learners will describe and use different types of mathematical, logical, and relational operators for mathematical computations.
- **Objective 3: Learners will display strong communication skills.**
  - Outcome 3.1. Learners will demonstrate strong written communication skills required for a business major.
  - Outcome 3.2. Learners will be able to use tools for creating visualizations based on different methodologies; interpret and communicate the essential aspects of data analysis.
- **Objective 4: Learners will be able to apply critical thinking skills.**
  - Outcome 4.1. Learners can resolve syntax, run-time, and logic errors.
- **Objective 5: Learners will be able to identify and ready to exhibit strong work values in contemporary organizations.**
  - Outcome 5.1. Learners will identify ethical components in business situations.
  - Outcome 5.2. Learners will display strong work values associated with professionalism, collaborative work, and DEI.

## Policies

**Note:** A copy of the Wilson College Policies may be obtained at <https://business.uni.edu/students/advising/uni-college-business-policies>.

Enrollment in upper division (3000/4000-level) business courses requires satisfactory completion of the Wilson College of Business admission requirements and any course prerequisites.

Management, MIS, Business Analytics, Human Resource Management, and Supply Chain Management majors may declare a double major and/or major and minor within the Wilson College of Business, subject to regulations imposed by those Wilson College of Business departments affected. Management majors may not major in Human Resource Management or minor in Organizational Leadership. No more than one emphasis area may be declared in Management.

All students majoring in business must complete 50% of their major coursework in the Wilson College of Business at UNI. Major coursework would include any undergraduate, credit-bearing, graded course taught in the Wilson College of Business at UNI. Business courses taken at UNI as credit/no credit do not qualify. A minimum of 10 credits must be upper division (3000-4000 level courses). A student must earn a 2.20 cumulative grade point average at UNI; and earn an overall 2.20 grade point average in business designated courses taken at UNI.

The Wilson College of Business limits the number of courses that can be counted towards major specific requirements across the College. The College will allow students to double count one major specific course between majors, with the following exceptions. These exceptions include major combinations which allow two double-counted courses:

- MIS/Business Analytics
- Real Estate/Finance: Financial Management or Investments
- Business Analytics/Economics: Business Economics

## **Business Analytics B.A.**

This guideline is not applicable to the business core. There are no limitations to the number of courses that can be double-counted towards minors and/or certificates within the College.

The Management Department may impose additional admission requirements for students wishing to declare a minor or a second Wilson College of Business major. Eligibility to declare a minor or a second Wilson College of Business major is based on competitive GPA and space availability.

## **Related Programs**

- Applied AI for Business Certificate
- Master of Business Administration