Business Analytics

Department Information

- **Program Director:**
  Fred Riggins, Ph.D.
- **Program Adviser:**
  Elizabeth Worth, M.Ed.
- **Email:**
  elizabeth.worth@ndsu.edu
- **Department Location:**
  200 Barry Hall
- **Department Phone:**
  701-231-5845
- **Department Web Site:**
  www.ndsu.edu/business/programs/graduate/msba/ (http://www.ndsu.edu/business/programs/graduate/msba/)
- **Credential Offered:**
  M.S.
- **Test Requirement:**
  GMAT or GRE

The Master of Science in Business Analytics (MSBA) program at North Dakota State University (NDSU) is a non-thesis, professional program structured to serve qualified students with undergraduate degrees in a variety of fields, although it may be particularly attractive to students with undergraduate degrees in business, computer science, engineering, and statistics. The program is designed to provide students with advanced applied problem solving skills and an understanding of business analytics methodologies and tools mastery. Students get hands-on experience with the most up-to-date tools and methodologies for data management, data modeling, visualization, and data mining.

NDSU business analytics faculty use a variety of teaching methods including case studies, group and individual projects, computer applications, student presentations, and discussion. Many classes take place in the Barry Hall computer labs. The program has a significant capstone experience where students work with local companies analyzing real data and solving real-world problems with data. The program is designated as a STEM program reflecting the technical nature of current data analytics practices.

In addition to the Graduate School application requirements, the GMAT/GRE is required. Individuals seeking admission to the MSBA program may request a waiver of the GMAT/GRE requirement if they meet one of the following requirements:

- The applicant holds a terminal degree (e.g., Ph.D., M.D., J.D.).
- The applicant has a minimum of five (5) years of recent, post-bachelor’s, full-time, professional work experience that is relevant to business analytics and data science.

Appropriate documentation (i.e. official transcript, Statement of Purpose, resume) is required to be uploaded to the application file. It does not, however, guarantee a waiver. Applicants should request the waiver in their Statement of Purpose and provide the rationale for the waiver request. Applicants are reviewed on a case-by-case basis, and waiver approval is determined at the discretion of the MSBA program coordinator.

**MSBA Program Curriculum (30 credits):**

<table>
<thead>
<tr>
<th>Code</th>
<th>Title</th>
<th>Credits</th>
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<tbody>
<tr>
<td></td>
<td><strong>Data Analysis Foundations</strong></td>
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<tr>
<td>CSCI 765</td>
<td>Introduction To Database Systems</td>
<td>3</td>
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<td>STAT 725</td>
<td>Applied Statistics</td>
<td>3</td>
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<td><strong>Business Analytics Foundations</strong></td>
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<tr>
<td>MBA 722</td>
<td>Marketing Analytics and Customer Intelligence</td>
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<td>MBA 723</td>
<td>Digital Marketing</td>
<td>2</td>
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<tr>
<td>MBA 751</td>
<td>Business Analytics Concepts</td>
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<td>MBA 752</td>
<td>Business Analytics Strategy</td>
<td>2</td>
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<tr>
<td>MBA 753</td>
<td>Business Analytics Methods</td>
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<td></td>
<td><strong>Business Analytics Advanced Courses</strong></td>
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<tr>
<td>MIS 720</td>
<td>Visualization and Reporting</td>
<td>2</td>
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<tr>
<td>MIS 740</td>
<td>Advanced Business Analytics Methods</td>
<td>2</td>
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MIS 790 Graduate Seminar 2

**Business Analytics Focus and Field Experience** 8
Electives - choose from approved list or with advisory's approval 3
MIS 795 Field Experience 5

**Somnath Banerjee, Ph.D.**  
University of Central Florida, 2015  
Field: Marketing

**James Caton, Ph.D.**  
George Mason University, 2016  
Field: Economics

**Linlin Chai, Ph.D.**  
Iowa State University, 2016  
Field: Marketing

**Anne Denton, Ph.D.**  
University of Mainz, 1996  
Field: Computer Science

**Supavich Pengnate, Ph.D.**  
Oklahoma State University, 2013  
Field: Management Information Systems

**Frederick Riggins, Ph.D.**  
Carnegie Mellon University, 1994  
Field: Management Information Systems

**Limin Zhang, Ph.D.**  
University of Arizona, 2005  
Field: Management Information Systems