<div align="center">

Department of Mathematics, Computer Science,
and Statistics
Data Science Major

</div>

The Data Science major consists of 15 units, including 6 foundational courses, 5 core courses, 3 electives, and a senior-year experience.

Requirement Checklist:

Foundational Courses (6)

MATH 135: Calculus I _____
MATH 136: Calculus II _____
CS 140: Introduction to Computer Programming _____
CS 219: Techniques of Computer Science _____
STAT 113: Applied Statistics _____
STAT 213: Applied Regression Analysis ____

Core Courses (5)

MATH 217: Linear Algebra _____
CS 256: Data Structures _____
CS 345: Database Systems _____
DATA 234: Introduction to Data Science (Currently STAT 234) _____
DATA 352: Statistical and Machine Learning _____

Electives Choose 3, at least 1 from Group 1.

Group 1 (Technical electives)

MATH 205: Multivariable Calculus _____
MATH 230: Differential Equations _____
MATH 318: Graph Theory _____
CS 332 : Web Programming _____
CS 340 : Software Engineering _____
CS 362: Algorithm Analysis _____
CS 374: Artificial Intelligence _____
STAT 226: Statistical Methods of Data Collection _____
STAT 325: Probability _____
STAT 326: Mathematical Statistics _____
STAT 343: Time Series Analysis _____

Group 2 (applied electives)

BIOL 303: Biostatistics _____
CHEM 205: Quantitative Analysis _____
CHEM 342: Thermodynamics and Kinetics _____
ECON: 342: Econometrics _____

GEOL 233: Geographic Information Systems _____
GEOL 319: Hydrology and Hydrogeology _____
GEOL 333: Advanced Geographic Information Systems _____
GEOL 362: Geochemistry _____
ENVS 323: Environmental Epidemiology _____
ENVS 393: Energy Life Cycle _____
PCA 365: The Rhetoric of Algorithms _____
PHYS 221: Modern Physics I _____
PHYS 222: Modern Physics II _____
PSYC 205: Research Methods in Psychology _____
PSYC 401: Fundamental of Learning _____
SOC 301: Quantitative Research Methods _____

Courses not listed here may potentially be approved by the department chair as electives.

Capstone Experience (SYE) Choose One:

DATA 450: Applied Data Science Seminar _____
DATA 489/498: Independence/Honors SYE _____
A summer fellowship approved by the department chair _____
An internship approved by the department chair _____

Fall 20 ___	**Spring 20 ___**	**Fall 20 ___**	**Spring 20 ___**