

Name: _____

UNI: _____

Entered Program: _____

Expected Graduation: _____

Full-time students are expected to complete the program in 2 semesters of coursework. If you want to spend additional time at Columbia, please contact QMSS program staff to discuss your academic plan.

Thirty (30) points minimum are required for the degree. Students must maintain a 3.0 or above average.

Core Course Requirements

- A. Theory and Methodology (QMSS G4010)
- B. Two Seminars (QMSS G4021 **and** QMSS G4022)
- C. Data Analysis Requirement to be fulfilled by Probability and Statistics (STAT W5701)
- D. General Data Science Elective
 - a. QMSS G4070: GIS and Spatial Analysis
 - b. QMSS G5070: Modern Data Structures
 - c. QMSS G4059: Introduction to Missing Data
 - d. QMSS G4062: Social Network Analysis
 - e. QMSS G4071: Advanced GIS and Spatial Analysis
- E. Master's Thesis (QMSS G5999)
- F. Two Additional Electives

Data Science Concentration Requirements:

- G. Algorithms for Data Science (CSOR W4246)
- H. Exploratory Data Analysis and Visualization (STAT W4701 or QMSS 4063)
- I. Machine Learning for Data Science (COMS W4721)

Course Planner

Course Title	Course Number	Credits	Semester	Year
Fall Semester				
Theory and Methodology	QMSS G4010	4	Fall	
QMSS Seminar	QMSS G4021	2	Fall	
Algorithms for Data Science	CSOR W4246	3	Fall	
Data Analysis: Probability and Statistics	STAT W5701	3	Fall	
General Data Science Elective			Fall	
<i>Elective</i>			Fall	

Spring Semester

QMSS Seminar	QMSS G4022	2	Spring	
Exploratory Data Analysis and Visualization	STAT4701 or QMSS G4063	3 or 4	Spring	
Machine Learning for Data Science	COMS W4721	3	Spring	
Master's Thesis	QMSS G5999	3 or 4	Spring	
General Data Science Elective (if not completed previously)			Spring	
<i>Elective</i>			Spring	
<i>Total credits (30 min)</i>				

Thesis Title: _____

Advisor (if applicable): _____