I. REQUIREMENTS TO THE PROGRAM

To be admitted into the program the applicant must have completed all the requirements for the B.S. in Mathematics degree. Then s/he must fulfill the following:

a. Complete a total of forty eight (48) units of graduate courses in mathematics, [twenty four (24) units of required courses and twenty four (24) units of electives].

b. Pass a comprehensive examination, a written exam that covers three areas, two of which must be the areas of algebra and analysis. The third area may be chosen by the student from other fields covered by the courses s/he has taken. A student who has passed the comprehensive exam may be awarded the degree of Master of Science in Mathematics if s/he applies for it.

c. Submit a doctoral dissertation which is considered by the department an original contribution to existing knowledge. Doctoral dissertation will count for twelve (12) units toward the total sixty units (60) units required.

d. Proof of submission of a paper containing results of the dissertation to a Science Citation Indexed journal (ISI) or reputable refereed international journal.

e. Presentation of dissertation results in an international or national conference in mathematics.

II. REQUIRED SUBJECTS (24 units)

- Ma 249 Matrix Analysis
- Ma 250 Algebraic Structures I
- Ma 251 Algebraic Structures II
- Ma 260 Topological Structures
- Ma 265 Modern Real Analysis I
- Ma 267 Modern Complex Analysis I
- Ma 295A 2 Seminar in Real Analysis II

Any of the following Seminar in Geometry series (Ma 295C):

- Ma 295C.1 Seminar in Finite Geometry
- Ma 295C.4 Seminar in Groups and Design
- Ma 295C.8 Seminar in Hyperbolic Geometry
- Ma 295C.9 Geometric Crystallography
- Ma 295C.10 Seminar in Color Symmetry
- Ma 295C.11 Seminar in Tilings and Patterns

III. ELECTIVES (24 units)

IV. COMPREHENSIVE EXAMINATIONS

V. DISSERTATION AND ORAL DEFENSE (12 units)