	MS – GEOG	MS – CART/GIS	MS – CART/GIS (ACCELERATED/NON-THESIS)	MS – CART/GIS (ONLINE/NON-THESIS)	PHD
Minimum Credits	30 cr (16 cr as UW-MSN grad)	30 cr (16 cr as UW-MSN grad)	30 cr	32 cr	51 cr (32 cr taken as a UW-MSN grad)
Maintain GPA	3.0	3.0	3.0	3.0	3.0
Breadth *(typically not seminars)*	Phys + Hum + P/E + Cart/GIS + Stats One can be doublecounted for coursework	Quant methods + 2 math courses + 2 int or adv geog courses One can be doublecounted for coursework	Quantitative Methods	Quantitative Methods + 2 courses in and/or GIS	Phys + Hum + P/E + Cart/GIS + Stats
Coursework Requirements *(min of 50% must be graduate course work - see definition below)*	Geog 765 (1cr) + Geog 766 (3cr) 2 grad courses 300-level and above Both must be Geography One can doublecount for breadth Cannot include seminars 2 (3-cr) Geog seminars w/ 2 diff faculty	Geog 765 (1cr) + Geog 766 (3cr) Geog 370 (Intro Cart) (4cr) Geog 377 (Intro GIS) (4cr) Geog 378 (Geocomputing) (3cr) Geog 970 (GIScience Seminar) (3cr) Two courses (6-8 cr) of Geog 570 (Problems in Cart) Geog 572 (Graphic Design in Cart) Geog 575(Interactive Cart and Geo Geog 577 (EnvModeling with GIS) Geog 578 (GIS Applications) Geog 579 (Spatial Analysis)	Geog 370 (Introduction to Cartography) – 4 cr. Geog 377 (Introduction to GIS) – 4 cr. Geog 378 (Introduction to Geocomputing) – 4 cr. Geog 778 (Practicum in GIS Development) – 4 cr. 14 credits from the following courses: Geog 560 (Advanced Quantitative Methods) Geog 572 (Graphic Design in Cartography) – 4 Geog 574 (Spatial Database) – 4 cr. Geog 575 (Interactive Cart and Geovis) – 4 cr. Geog 576 (Spatial Web and Mobile Prog) – 4 cr. Geog 578 (GIS Applications) – 4 cr. Geog 579 (GIS and Spatial Analysis) – 4 cr.	Geog 378 (Geocomputing) – 4 cr. Geog 572 (Graphic Design in Cartography) – 4 cr. Geog 574 (Spatial Database) – 4 cr. Geog 575 (Interactive Cart and Geovis) – 4 cr. Geog 576 (Spatial Web and Mobile Prog) – 4 cr. Geog 579 (GIS and Spatial Analysis) – 4 cr. Geog 777 (Capstone in GIS Development) – 4 cr. Geog 778 (Practicum in GIS Development) – 4 cr.	Geog 765 (1cr) 2 (3-cr) Geog seminars w/ 2 diff faculty Cannot use seminars completed as MS student
Master's Thesis	Proposal typically in Geog 766 (2nd semester) Research/data analysis in summer + 3rd sem Final draft submitted/defended in 4th sem +/- summer		N/A	N/A	N/A
Minor	N/A		N/A	N/A	any coursework completed as a UW-Madison Geog graduate student can be used Opt A – 9 cr in one, non-Geog dept Opt B (Dist) – 9 cr in 2+ non-Geog depts
Skills	N/A		N/A	N/A	(4 options)- any coursework completed as a graduate student can be used · Competence in non-Eng lang · Quant skills (6 cr of int or adv courses) · Qual skills (6 cr of int or adv courses) · Quant + Qual (6 cr of int or adv courses)
Preliminary and/or Qualifying Exams *(completion advances student to "Dissertator" status)*	N/A		N/A	N/A	General exam - 8 hours Covers one of the breadth areas Specific exam Devised and graded by individual's committee Dissertation proposal Proposal must orally defended before a thesis committee
Dissertation	N/A		N/A	N/A	Follow Grad School formatting requirements Must be orally defended
Advisor	Your Advisor, who is also the chair (or co-chair) of your Committee must be graduate faculty in Geography (or affiliated with Geog). Note: the GIS Professional Programs Program Director acts as the advisor for all Non-Thesis (Online and Accelerated) M.S. -- Cartography/GIS students.				
Committee	Your Committee must have a min of 3 members, 2 of whom must be grad faculty (or former grad faculty up to one year after resignation/retirement) and two of whom must be affiliated with the Geography Department.		N/A	N/A	Committee must have a min of 5 members Four must be grad faculty (or former grad faculty up to 1 year after resignation/retirement) and at least 2 of whom must be Geography faculty. At least one must be non-Geography (i.e., not affiliated w/Geog)
Public Talk	15-20 minute public talk required should be within a month of final defense must be in a venue open to all members of the department		N/A	N/A	30-40 minute public talk required should be within a month of final defense must be in a venue open to all members of the department
Graduate Course Work definition	Graduate course work can include UW-Madison courses (including but not limited to online, thesis/research, independent study, and practicum/internship credits) that satisfy one of the following guidelines: • numbered 700 and above; OR • numbered 300-699 that are specifically designed for graduate students in a graduate program; OR • numbered 300-699 that assess graduate students separately from undergraduate students; OR • numbered 300-699 that have a graduate student enrollment >50% in any given semester.				
Prior Course work	With approval, students can count up to 6 credits of grad course work from other institutions	With approval, students can count up to 7 credits of grad course work from other institutions.	With approval, students can count up to 7 credits of grad course work from other institutions		With approval, students can count up to 9 credits of grad course work from other institutions