



| Course | Course Title | Credits |
|-----------------------------------|--|----------|
| Social Science Foundations | | 9 |
| <i>Required Course:</i> | | |
| SS 5313 | Sustainability Science [^] | 3 |
| <i>Choose 2:</i> | | |
| SS 4120 | Sustainable Development & Communities [^] | 3 |
| SS 4700 | Communities & Research [^] | 3 |
| SS 5420 | Memory & Heritage | 3 |
| SS 5530 | Deindustrialization & the Urban Environment | 3 |
| SS 5720 | Social Thought, Contemporary Issues | 3 |
| SS 5900 | Heritage Management | 3 |

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| Socio-Ecological and Socio-Technological Systems | | 9 |
| <i>Earned through either Certificate or Coursework</i> | | |
| <i>Certificate Option:</i> | | |
| Natural Hazards & Disaster Risk Reduction* | | |
| Natural Resource & Environmental Economics | | |
| Resilient Water Infrastructure* | | |
| Water, Sanitation, & Hygiene Engineering (WASH)* | | |
| <i>OR Coursework Option: Choose 3</i> | | |
| SS 4200 | Environmental Anthropology [^] | 3 |
| SS 5400 | Sociology of the Environment | 3 |
| SS 4540/ 5550 | Global Environmental History [^] | 3 |
| SS 5325 | Water Policy, History, & Governance | 3 |
| SS 5551 | Global Industrial History | 3 |
| SS 5500 | History of Technology | 3 |
| BL 4120 | Environmental Remediation [^] * | 3 |
| GE 4220 | Mining Systems & the Environment [^] * | 3 |
| FW 5421 | Climate Change & Management in Great Lakes Forested Systems | 3 |
| FW 5371 | Snow Hydrology | 3 |
| FW 5369 | Hydrology & Watershed Management | 3 |
| BL 5421 | Lake Superior Exploration | 3 |
| BL 5447 | Stream Ecology | 3 |
| BL 5451 | Advanced Ecology | 3 |
| GE 5150 | Advanced Natural Hazards | 3 |
| CEE 4410 | Transportation Planning [^] | 3 |
| CEE 5666 | Water Resources Planning & Management* | 3 |
| FW 4400 | Urban Forestry [^] | 3 |
| FW 5115 | Restoration Ecology | 3 |
| EC 5650 | Market Failure & Environment* | 3 |
| GE 5660 | Social Dimensions of Natural Hazards | 3 |
| UN 5400 | Climate Science & Policy | 3 |

| Course | Course Title | Credits |
|---|--|----------|
| Applied Research & Inquiry Skills | | 9 |
| <i>Earned through either Certificate or Coursework</i> | | |
| <i>Certificate Option:</i> | | |
| Public Policy | | |
| Data Science Foundations | | |
| Geoinformatics* | | |
| Geospatial Data Science & Technology | | |
| Engineering Sustainability & Resilience | | |
| <i>OR Coursework Option: Choose 3</i> | | |
| SS 4211 | Ethnographic Methods [^] | 3 |
| SS 5001 | Advanced Social Science Methods | 3 |
| SS 5003 | Survey Methods | 3 |
| SS 5004 | Social Statistics | 3 |
| SS 5005 | Introduction to Agent Based Modeling | 3 |
| SS 5049 | GIS for Graduate Researchers | 3 |
| SS 4050/ 5050 | Advanced GIS Methods & Projects [^] * | 3 |
| SS 5501 | Industrial Communities | 3 |
| SS 5700 | Archaeological Field Methods | 3 |
| SS 5800 | Documentation of Historic Structures | 3 |
| SS 6002 | Research Design | 3 |

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| Professional Development Capstone | | 3 |
| <i>Choose 1</i> | | |
| SS 4000 | Independent Study | 3 |
| SS 4101 / 5101 | Energy and Climate Policy | 3 |
| SS 5015 | Cultural/Environmental Office of Surface Mining VISTA Field Service Internship | 3 |
| SS 5990 | Graduate Research | 3 |
| SS 5010 | Directed Study | 3 |
| SS 4920 / 5920 | Internship Experience | 3 |
| SS 4921 | Washington Internship-Professional Practicum | 3 |

[^]Indicates suggested Double-Count course (limit 6 credits)

*Check pre-requisites / permissions

