BACHELOR OF ARTS IN GEOLOGY

The Bachelor of Arts in Geology prepares students for entry-level employment within the wide-ranging fields of geology. The dominant fields of geological employment include:

- · Environmental geology
- · Construction
- Petroleum geology
- · Water resources
- Mining
- Hydrogeology
- · Government regulations and compliance
- · Pipeline construction

The Bachelor of Arts in Geology degree program can be completed in eight semesters if students average sixteen hours of coursework per semester.

For more information, visit the Department of Physics, Astronomy, Geology, and Environmental Sciences.

The Bachelor of Arts degree requires the successful completion of a minimum of 72 s.h. of core and elective courses.

| COURSE | TITLE | S.H. |
|---|--|------|
| FIRST YEAR REQUIREMENT -STUDENT SUCCESS | | |
| YSU 1500 | Success Seminar | 1-2 |
| or SS 1500 | Strong Start Success Seminar | |
| or HONR 1500 | Intro to Honors | |
| General Education | Requirements | |
| ENGL 1550 | Writing 1 | 3 |
| or ENGL 1549 | Writing 1 with Support | |
| ENGL 1551 | Writing 2 | 3 |
| CMST 1545 | Communication Foundations | 3 |
| Mathematics Requ | uirement | 3 |
| Arts and Humaniti | es (6 s.h.) | 6 |
| Natural Sciences (| 2 courses, 1 with lab) (6-7 s.h.) | 7 |
| Social Science (6 s | s.h.) | 6 |
| Social and Person | al Awareness (6 s.h.) | 6 |
| Foreign Language | Requirement | |
| FNLG 1550 | Elementary Foreign Language (or FNLG 1505) | 4 |
| FNLG 2600 | Intermediate Foreign Language (or FNLG 1506) | 4 |
| Major Requiremen | ts | |
| GEOL 1505 | Physical Geology | 4 |
| & 1505L | and Physical Geology Laboratory | |
| ENST 2600 | Foundations of Environmental Science | 4 |
| & 2600L | and Foundations of Environmental Science Laboratory | |
| GEOL 2605 | Historical Geology | 4 |
| GEOL 3700 | Mineralogy | 3 |
| GEOL 3700 | Geomorphology | 3 |
| GEOL 3718 | Igneous and Metamorphic Petrology | 3 |
| GEOL 3710 | Structural Geology | 3 |
| GEOL 3704L | Structural Geology Laboratory | 1 |
| GEOL 3750 | Geoscience Seminar | 1 |
| GEOL 5802 | Sedimentology and Stratigraphy (Capstone course) | 3 |
| MATH 1570 | Applied Calculus 1 | 4 |
| Electives | Applied Calculus I | 4 |
| FIECTIAES | | |

| Science Electives | | |
|------------------------|---|------|
| | of 21 s.h. from the following: | 21 |
| ASTR 2609 | Moon and Planets | |
| BIOL 2601 & 2601L | General Biology 1: Molecules and Cells and General Biology I: Molecules and Cells Laboratory | |
| BIOL 2602 | General Biology 2: Organisms and Ecology | |
| & 2602L | and General Biology: Organisms and Ecology | |
| | Laboratory | |
| CHEM 1515 | General Chemistry 1 | |
| & 1515L | and General Chemistry 1 Laboratory | |
| CHEM 1516 | General Chemistry 2 | |
| & 1516L | and General Chemistry 2 Laboratory | |
| GEOG 2630 | Weather | |
| MATH 2670 | Applied Calculus 2 | |
| PHYS 1501 & 1501L | Fundamentals of Physics 1 and Fundamentals of Physics Laboratory 1 | |
| GEOL 2602 | Introduction to Oceanography | |
| PHYS 1502 | Fundamentals of Physics 2 | |
| & 1502L | and Fundamentals of Physics Laboratory 2 | |
| STAT 3717 | Statistical Methods | |
| Science Electives | II: | |
| Select a minimum | of 20 s.h. from the following: | 20 |
| ENST 3700 | Environmental Chemistry | |
| & 3700L | and Environmental Chemistry Lab | |
| GEOL 3702 | Glacial Geology | |
| GEOL 3706 | Geology of Economic Mineral Deposits | |
| GEOL 3709 | Subsurface Investigations | |
| GEOL 3714 | Principles of Paleontology | |
| GEOL 3716 | | |
| GEOL 3720 | Field Investigations in Geology | |
| ENST 3751 | Water Quality Analysis | |
| & 3751L | and Water Quality Analysis Lab | |
| ENST 3780 | Environmental Research | |
| ENST 3781 | Environmental Sampling Methods | |
| GEOL 4804 GEOL 4824 | Ground Water | |
| | Tectonics | |
| GEOL 4825 GEOL 4899 | Geophysical Well Log Analysis | |
| | Special Topics | |
| GEOL 5805 | ology Field Camp (4 s.h. minimum) | |
| ENST 5810 | Special Problems in Geology Environmental Safety | |
| GEOL 5810 | Groundwater Resource Evaluation | |
| GEOL 5815 | Geology and the Environment 2 | |
| GEOL 5817 | Environmental Geochemistry | |
| ENST 5860 | Environmental Regulations | |
| | emester Hours: 108-111 s.h. | |
| Total Semester Ho | | -121 |
| Total Semester Ho | 120 | -121 |
| Year 1 | | |
| Fall | | S.H. |
| YSU 1500 | Success Seminar | 1 |
| GEOL 1505 | Physical Geology | 4 |
| & 1505L | and Physical Geology Laboratory | |
| ENGL 1550 | Writing 1 | 3-4 |
| or ENGL 1549 | or Writing 1 with Support | |
| CHEM 1515 & 1515L | General Chemistry 1 and General Chemistry 1 Laboratory | 4 |
| GER Arts and Hum | • | 3 |
| OLITAITS AIR HUII | Idinities Lieutive | 3 |

| GEOL 3750 | Geoscience Seminar | 1 |
|---------------------|--|-------|
| 02020100 | Semester Hours | 16-17 |
| Spring | ocinester riours | 10 11 |
| GEOL 2605 | Historical Geology | 4 |
| ENGL 1551 | Writing 2 | 3 |
| CHEM 1516 | General Chemistry 2 | 4 |
| & 1516L | and General Chemistry 2 Laboratory | · |
| GEOG 2626 | World Geography | 3 |
| | Semester Hours | 14 |
| Year 2 | | |
| Fall | | |
| GEOL 3700 | Mineralogy | 4 |
| MATH 1570 | Applied Calculus 1 | 4 |
| ENST 2600 | Foundations of Environmental Science | 4 |
| & 2600L | and Foundations of Environmental Science | |
| | Laboratory | |
| GEOL 3750 | Geoscience Seminar (Optional) | 1 |
| | Semester Hours | 13 |
| Spring | | |
| GEOL 3718 | Igneous and Metamorphic Petrology | 4 |
| Science Elective II | | 3-5 |
| CMST 1545 | Communication Foundations | 3 |
| Science Elective I | | 3-5 |
| Science Elective I | | 3-5 |
| | Semester Hours | 16 |
| Year 3 | | |
| Fall | | |
| GEOL 3701 | Geomorphology | 3 |
| FNLG 1550 | Elementary Foreign Language | 4 |
| GER Social Science | e Elective | 3 |
| GEOL/ENST 3700- | Science Elective II | 3-4 |
| GEOL 3750 | Geoscience Seminar (Optional) | 1 |
| Science Elective I | | 3-5 |
| | Semester Hours | 17 |
| Spring | | |
| GEOL 3704 | Structural Geology | 3 |
| & 3704L | and Structural Geology Laboratory | |
| FNLG 2600 | Intermediate Foreign Language | 4 |
| GER Arts and Hum | | 3 |
| GEOL/ENST Scien | | 3-4 |
| ENST 5810 | Environmental Safety | 3 |
| | Semester Hours | 16 |
| Year 4 | | |
| Fall | 0 1 0 1 (0 1) | _ |
| GEOL 3750 | Geoscience Seminar (Optional) | 1 |
| GER Social Person | | 3 |
| | + Science Elective II | 3-4 |
| | + Science Elective II | 3-4 |
| Elective Course | | 3 |
| Elective Course | | 3 |
| | Semester Hours | 16 |
| Spring | | _ |
| GEOL 5802 | Sedimentology and Stratigraphy (Capstone Course) | 3 |
| Science Elective I | ourse) | 3-5 |
| | + Science Elective II | 3-5 |
| GEOL/ENS1 3/001 | Science Elective II | 3-4 |

| PHIL 2631 | Environmental Ethics (GER Social and Personal Awareness) | 3 |
|-----------------|--|---------|
| Elective Course | | 3 |
| | Semester Hours | 15 |
| | Total Semester Hours | 123-124 |

Request a Graduation Evaluation after completing 80-85 s.h. from the STEM Advising Center, 2325 Moser Hall, (330) 941-2512.

| Advising Center, 23 | 25 Moser Hall, (330) 941-2512. | |
|---------------------------|---|-------|
| Year 1 | | |
| Fall | | S.H. |
| YSU 1500 | Success Seminar | 1 |
| GEOL 1505 | Physical Geology | 4 |
| & 1505L | and Physical Geology Laboratory | |
| ENGL 1550 or ENGL 1549 | Writing 1 or Writing 1 with Support | 3-4 |
| CHEM 1515 & 1515L | General Chemistry 1 and General Chemistry 1 Laboratory | 4 |
| GER Arts and Hum | anities Elective | 3 |
| GEOL 3750 | Geoscience Seminar | 1 |
| | Semester Hours | 16-17 |
| Spring | | |
| GEOL 2605 | Historical Geology | 4 |
| ENGL 1551 | Writing 2 | 3 |
| CHEM 1516 | General Chemistry 2 | 4 |
| & 1516L | and General Chemistry 2 Laboratory | |
| GEOG 2626 | World Geography | 3 |
| | Semester Hours | 14 |
| Year 2 | | |
| Fall | | |
| GEOL 3700 | Mineralogy | 4 |
| MATH 1570 | Applied Calculus 1 | 4 |
| ENST 2600 | Foundations of Environmental Science | 4 |
| & 2600L | and Foundations of Environmental Science Laboratory | |
| GEOL 3750 | Geoscience Seminar (Optional) | 1 |
| | Semester Hours | 13 |
| Spring | | |
| GEOL 3718 | Igneous and Metamorphic Petrology | 4 |
| Science Elective II | | 3-5 |
| CMST 1545 | Communication Foundations | 3 |
| Science Elective I | | 3-5 |
| Science Elective I | | 3-5 |
| | Semester Hours | 16 |
| Year 3 | | |
| Fall | | |
| GEOL 3701 | Geomorphology | 3 |
| FNLG 1550 | Elementary Foreign Language | 4 |
| GER Social Science | | 3 |
| | Science Elective II | 3-4 |
| GEOL 3750 | Geoscience Seminar (Optional) | 1 |
| Science Elective I | | 3-5 |
| | Semester Hours | 17 |
| Spring | | |
| GEOL 3704 & 3704L | Structural Geology | 3 |
| & 3704L FNLG 2600 | and Structural Geology Laboratory Intermediate Foreign Language | 4 |
| GER Arts and Hum | 5 5 5 | 3 |
| OLITAITS dIIU MUIII | annico | 3 |

| | Total Semester Hours | 121-122 |
|------------------------|--|---------|
| | Semester Hours | 15 |
| Elective Course | | 3 |
| PHIL 2631 | Environmental Ethics (GER Social and Personal Awareness) | 3 |
| GEOL/ENST 370 | 00+ Science Elective II | 3-4 |
| Science Elective | 2 | 3-5 |
| GEOL 5802 | Sedimentology and Stratigraphy (Capstone Course) | 3 |
| Spring | Semester Hours | 16 |
| Elective Course | | 3 |
| Elective Course | | 3 |
| GEOL/ENST 370 | 00+ Science Elective II | 3-4 |
| GEOL/ENST 370 | 00+ Science Elective II | 3-4 |
| GER Social Pers | onal Awareness | 3 |
| Fall GEOL 3750 | Geoscience Seminar (Optional) | 1 |
| Year 4 | Cemester risults | |
| | Semester Hours | 14 |
| ENST 5810 | Environmental Safety | 1 |
| GEOL/ENST Sci | ence Elective II | 3-4 |

Request a Graduation Evaluation after completing 80-85 s.h. from the STEM Advising Center, 2325 Moser Hall, (330) 941-2512.