## First Year

Core courses common to the study paths

**Compulsory courses**

| | | | | | |
|---|---|---|---|---|---|
| GEOG0238-1 | *Geographical Information Systems* - Jean-Paul DONNAY | 30 | 30 | - | **6** |
| SPOL2209-3 | *Environmental and land policies* - Quentin MICHEL | 30 | - | - | **3** |
| GEOG0605-1 | *Regional geography and geomorphology* - François PETIT - [4d FW] | 20 | - | [+] | **3** |
| GEOG0622-1 | *Project management* - Jean-Paul DONNAY | 10 | 10 | - | **2** |

Courses specific to the Study Path

**Compulsory courses**

| | | | | | |
|---|---|---|---|---|---|
| CLIM0002-1 | *Climate models : principles and applications* - Louis FRANÇOIS | 45 | 15 | - | **6** |
| CLIM0003-1 | *Climate changes and impacts* - Louis FRANÇOIS | 45 | 15 | - | **5** |
| CLIM0004-1 | *Zonal climatology and topoclimatology* | 15 | 15 | - | **3** |
| CLIM0010-1 | *Fortran and Linux for the climatologist* - Xavier FETTWEIS | 15 | 45 | - | **5** |
| ENVT0846-1 | *Introduction to Sustainable Development* - Marc MORMONT, Pierre M. STASSART | 20 | 5 | - | **3** |
| ENVT0877-1 | *Basis of Agrometeorology* - Bernard TYCHON | 15 | 15 | - | **3** |
| GEOG0607-3 | *Topoclimatology* - Michel ERPICUM - [2d FW] | 15 | 15 | [+] | **4** |
| MATH0221-4 | *Analysis of time series* - Pierre MAGAIN | 15 | 15 | - | **3** |
| OCEA0014-1 | *Mathematical analysis and modelling methods applied to the environment* - Eric DELHEZ | 20 | 20 | - | **4** |
| PHYS0209-2 | *Numerical methods in physics* - Thierry BASTIN | 15 | 20 | - | **4** |
| SPAT0024-2 | *Meteorology* - Louis FRANÇOIS | 40 | 20 | - | **6** |

Students who have already taken the cours *Numerical methods in physics* must choose, with the approval of the Board of Studies, one course totaling 4 ECTS not already taken in the 3rd year of Bachelor or in one of the programmes of Master in Geography.

## Second Year

**Core courses common to the study paths**

| | | | | | |
|---|---|---|---|---|---|
| GEOG0025-1 | *Research Design in Spatial Sciences* - Jean-Paul DONNAY | 10 | 10 | - | **2** |
| GEOG0646-1 | *Seminars* - COLLÉGIALITÉ | - | - | - | **2** |
| | *Notice* : Collegiality = Climatology Team | | | | |
| GEOG0658-1 | *Final thesis supervision* - COLLÉGIALITÉ | - | - | - | **3** |
| SMEM0033-1 | *Final thesis* - COLLÉGIALITÉ | - | - | - | **20** |

**Courses specific to the Study Path**

| | | | | | |
|---|---|---|---|---|---|
| CLIM0011-1 | *Energy and territories* - Bernadette MERENNE#SCHOUMAKER - [1d Mon. WS] | 15 | 15 | [+] | **3** |

**Compulsory courses**

| | | | | | |
|---|---|---|---|---|---|
| CLIM0005-1 | *Operational meteorology* - COLLÉGIALITÉ - [18d SEM] | - | - | [+] | **7** |
| | *Notice* : Collegiality = Royal Military School and Meteorological Wing | | | | |
| CLIM0001-1 | *Applied climatology* - Michel ERPICUM - [1d FW] | 20 | 10 | [+] | **3** |

**Optional courses**

**Choose two modules from :**

**Climates, natural environments and societies**

| | | | | | |
|---|---|---|---|---|---|
| CLIM0012-3 | *Urban climate* - Michel ERPICUM | 20 | - | - | **2** |
| GEOG0630-4 | *Climatic geomorphology* - Aurelia HUBERT - [4d FW] | 20 | - | [+] | **3** |
| CLIM0007-1 | *Greenhouse gases - Measures and instruments to mitigate climate change* - Emmanuel MAHIEU | 20 | - | - | **2** |
| GEOG0633-1 | *Rivers dynamics* - François PETIT - [2d FW] | 15 | 15 | [+] | **3** |

**Modelling and Climate Change**

| | | | | | |
|---|---|---|---|---|---|
| SPAT0048-3 | *Physics of the earth's atmosphere and environment* - Jean-Claude GÉRARD | 30 | - | - | **3** |
| CLIM0008-1 | *Regional climate modelling* - Xavier FETTWEIS, Louis FRANÇOIS | 30 | 20 | - | **4** |
| CLIM0009-1 | *Biogeochemical cycle modelling and global changes* - Louis FRANÇOIS | 20 | 20 | - | **3** |

**Climate Risks, Biometeorology and Developing Countries**

| | | | | | |
|---|---|---|---|---|---|
| ENVT0879-2 | *Applied agrometeorology* - Bernard TYCHON - [1d FW] | 45 | 15 | [+] | **5** |
| ENVT0881-1 | *Environmental degradation and desertification* - Pierre OZER | 20 | - | - | **2** |
| SPOL0005-2 | *International risk management seminar* - Sébastien BRUNET (Odd years) | 30 | - | - | **3** |