| Module Name                       | Environmental Economics   |
|-----------------------------------|---|
| Module level, if applicable       |   |
| Code, if applicable               | GEL 3309  |
| Subtitle, if applicable           |   |
| Semester(s) in which the module   | Fourth (4 <sup>th</sup> ) semester  |
| Person responsible for the module | Dr. Rika Harini, M.P  |
| Lecturer                          | 1. Dr. Rika Harini, M.P   |
|                                   | 2. Dr. Sudrajat, M.P  |
| Language                          | Bahasa Indonesia  |
| Relation to curriculum            | Elective  |
| Type of teaching, contact hours   | STAR (Student Teacher Aesthetic Role-Sharing) is an optimal   |
|                                   | combination between SCL (Student Centered Learning) and   |
|                                   | TCL (Teacher Centered Learning).  |
|                                   | Lecture: 1400 minutes   |
| Workload                          | Lecturer, including homework and discussion = 14  |
|                                   | meetings x 100 minutes each   |
|                                   | Examination = 2 meetings x 100 minutes each   |
|                                   | Total workload = 1600 minutes   |
| Credit points                     | 2   |
| Requirements according to the     | Must attended lecture for more than 70%   |
| examination regulations           |   |
| Recommended prerequisites         | -   |
| Module objectives/intended        | 1. After following The Concept of Environmental   |
| learning outcomes                 | Economics, students are able to: explain concept economic, environment, environmental economics, material equlibrium, cost benefit analysis, and environmental protection  2. After following Basic Theory of Environmental Economics students are able to: explain production theory, consumption theory, and welfare theory  3. After following Economic Overview Toward Environmental Problem students are able to: explain cost information, transaction, market failure function, cost benefit analysis case toward government expenditure  4. After following Historical Development of Environmental Economics students are able to: explain early economic paradigm, environmental paradigm, post war economic and rice environmentalism, institutional economic paradigm, market model of environmental management, policy analysis (fixed standard versus cost benefit framework), economic value, environmental value, sustainable economic growth, and sustainable development  5. After following Economic Natural Resources, students |
|                                   | are able to: explain growth curve, rate of exploitation, preservation value, cost and revenue   |

|                           | <ol> <li>After following Environmnet and Development Countries, students are able to: explain dependent on natural resources, interconnection resource, economic cost of resource, economic incentive, and natural resource management policy</li> <li>After following Circular Economy students are able to: explain narrow and holistic views of environmental and economic; explain environmental economic interaction, circular economic and existence theorems</li> <li>After following Measuring Environmental Damage I (Total Economic Value), students are able to: explain meaning of valuation, use of economic valuation, cost, benefit, willingness to pay, willingness to accept, total economic value, option value, existence value, and empirical of option and existence value</li> <li>After following Measuring Environmental Damage II (Valuation Methodology), students are able to: explain total economic value, decision making, direct-indirect valuation, hedonic price approach, contingent value approach, and willingness to pay versus willingness to accept</li> <li>After following Optimal Level Pollution, students are able to: explain pollution as externality, optimal externality, alternative definition of pollution, types of externality and who are the pollution</li> <li>After following Environmental Standard, Taxes and Subsidies, students are able to: explain inefficiency of standard-setting, taxes versus standards, and pollution reduction subsidies</li> </ol> |
|---------------------------|--|
| Content                   | <ol> <li>The Concept of Environmental Economics</li> <li>Basic Theory of Environmental Economics</li> <li>Economic Overview Toward Environmental Problem</li> <li>Historical Development of Environmental Economics</li> <li>Economic Natural Resources</li> <li>Environment and Development Countries</li> <li>Circular Economy</li> <li>Measuring Environmental Damage I (Total Economic Value)</li> <li>Measuring Environmental Damage II (Valuation Methodology)</li> <li>Optimal Level Pollution</li> <li>Environmental Standard, Taxes and Subsidies</li> </ol>  |
| Study and examination     | Quiz (10%), Homework (10 %), mid semester examination  |
| requirements and forms of | (30%), and final semester examination (50 %). Examination  |
| examination               | formed in written test.  |
| Media employed            | - Internet   |

|              | - Computers  |
|--------------|--|
|              | - Interactive video                                |
|              | - LCD projector                                    |
| Reading list | Reksohadiprodjo, Sukanto. 2000. Ekonomi Lingkungan |
|              | (Suatu Pengantar). BPFE, Yogyakarta.               |
|              | Suparmoko, 1997, Ekonomi Sumberdaya Alam dan       |
|              | Lingkungan, BPFE, Yogyakarta.                      |