

## COURSES

This table aims to give detailed information related to the subjects the students need to take every semester.

### A. Concentration: *Construction Management*

#### Semester 1

| No | Subject  | Credit | Status<br>(Compulsory/Elective) | Prerequisite |
|----|--|--------|---------------------------------|--------------|
| 1  | Teknologi Bahan Konstruksi<br>(Construction Material Technology) | 3      | Compulsory                      |              |
| 2  | Sistem Pengambilan Keputusan<br>(Decision Making System)         | 3      | Compulsory                      |              |
| 3  | Manajemen Konstruksi<br>(Construction Management)                | 3      | Compulsory                      |              |
| 4  | Ekonomi Teknik (Engineering<br>Economics)                        | 3      | Compulsory                      |              |

#### Semester 2

| No | Subject   | Credit | Status<br>(Compulsory/Elective) | Prerequisite |
|----|---|--------|---------------------------------|--------------|
| 1  | Manajemen Risiko Kontruksi<br>Construction Risk Management  | 3      | Compulsory                      |              |
| 2  | Metoda Konstruksi (Construction<br>Method)  | 3      | Compulsory                      |              |
| 3  | Aspek Hukum dan Administrasi<br>Proyek (Legal Aspects and Project<br>Administration)                      | 3      | Compulsory                      |              |
| 4  | Perencanaan, Penjadwalan, dan<br>Pengendalian Proyek (Project<br>Planning, Scheduling and<br>Controlling) | 3      | Compulsory                      |              |
| 5  | Metodologi Penelitian dan Statistika<br>Terapan (Research Methodology<br>and Applied Statistics)          | 3      | Compulsory                      |              |

### Semester 3

| No | Subject   | Credit | Status<br>(Compulsory/Elective) | Prerequisite |
|----|---|--------|---------------------------------|--------------|
| 1  | Etika Profesi dan Kewirausahaan<br>(Professional Ethics and<br>Entrepreneurship)    | 2      | Compulsory                      |              |
| 2  | Produktivitas dan Kualitas<br>Konstruksi (Construction<br>Productivity and Quality) | 3      | Compulsory                      |              |
| 3  | <b>Tesis</b><br>(Thesis)  | 6      | Compulsory                      |              |

### Semester 4

| No | Subject                  | Credit | Status<br>(Compulsory/Elective) | Prerequisite |
|----|--------------------------|--------|---------------------------------|--------------|
| 1  | <b>Tesis</b><br>(Thesis) | 6      | Compulsory                      |              |

### B. Concentration: *Earthquake Engineering Management*

This table aims to give detailed information related to the subjects the students need to take every semester

#### Semester 1

| No | Subject  | Credit | Status<br>(Compulsory/Elective) | Prerequisite |
|----|--|--------|---------------------------------|--------------|
| 1  | Analisis Dinamika Struktur<br>(Structural Dynamics)  | 3      | Compulsory                      |              |
| 2  | Asesmen Risiko Bencana Alam<br>(Natural Hazard Risk Assessment)                                  | 3      | Compulsory                      |              |
| 3  | Metodologi Penelitian dan Statistika<br>Terapan (Research Methodology<br>and Applied Statistics) | 3      | Compulsory                      |              |
| 4  | Pelaksanaan Bangunan Tahan<br>Gempa (Construction of Earthquake<br>Resistant Structures)         | 3      | Compulsory                      |              |

**Semester 2**

| No | Subject  | Credit | Status<br>(Compulsory/Elective) | Prerequisite |
|----|--|--------|---------------------------------|--------------|
| 1  | Evaluasi, Rekonstruksi, dan Rehabilitasi Struktur (Evaluation, Reconstruction and Rehabilitation of Structure) | 3      | Compulsory                      |              |
| 2  | Dinamika Tanah dan Teknik Kegempaan (Soil Dynamics and Earthquake Engineering)                                 | 3      | Compulsory                      |              |
| 3  | Bencana Alam dan Rekayasa Kegempaan (Natural Disaster and Earthquake Engineering)                              | 3      | Compulsory                      |              |
| 4  | Perencanaan Bangunan Tahan Gempa (Design of Earthquake Resistant Structures)                                   | 3      | Compulsory                      |              |

**Semester 3**

| No | Subject   | Credit | Status<br>(Compulsory/Elective) | Prerequisite |
|----|---|--------|---------------------------------|--------------|
| 1  | Sistem Informasi Kebencanaan (Disaster Information System)            | 2      | Compulsory                      |              |
| 2  | Pengembangan Masyarakat (Community Development)                       | 2      | Compulsory                      |              |
| 3  | Manajemen Kebencanaan (Disaster Management)                           | 2      | Compulsory                      |              |
| 4  | Pengembangan Kepribadian Profesi (Profession Personality Development) | 2      | Compulsory                      |              |
| 5  | Ekonomi Kebencanaan (Economics Disaster)                              | 2      | Compulsory                      |              |
| 6  | <b>Tesis</b><br>(Thesis)  | 6      | Compulsory                      |              |

#### Semester 4

| No | Subject                  | Credit | Prerequisite |
|----|--------------------------|--------|--------------|
| 1  | <b>Tesis</b><br>(Thesis) | 6      | Compulsory   |

This table aims to give detailed information related to the subjects the students need to take every semester

#### C. Concentration: *Transportation Planning and Engineering*

##### Semester 1

| No | Subject  | Credit | Prerequisite |
|----|--|--------|--------------|
| 1  | Rekayasa Lalu Lintas Angkutan Jalan<br>(Road Traffic and Transport Engineering)              | 3      | Compulsory   |
| 2  | Perencanaan dan Pemodelan Transportasi<br>(Transportation Planning and Modeling)             | 3      | Compulsory   |
| 3  | Ekonomi Transportasi dan Metode Appraisal<br>(Transportation and Economic Appraisal Methods) | 3      | Compulsory   |
| 4  | Sistem Manajemen Jalan Raya<br>(Highway Management System)                                   | 4      | Compulsory   |

##### Semester 2

| No | Subject  | Credit | Prerequisite |
|----|--|--------|--------------|
| 1  | Metodologi Penelitian dan Statistika Terapan<br>(Research Methodology and Applied Statistics)                        | 3      | Compulsory   |
| 2  | Bahan Konstruksi Jalan<br>(Road Construction Materials)  | 3      | Compulsory   |
| 3  | Rekayasa Jalan Raya<br>(Highway Engineering)   | 4      | Compulsory   |
| 4  | Risiko Kebencanaan dan Keselamatan Infrastruktur Transportasi<br>(Disaster Risk and Safety Transport Infrastructure) | 4      | Compulsory   |

**Semester 3**

| No | Subject   | Credit | Prerequisite |
|----|---|--------|--------------|
| 1  | Etika Profesi dan Kewirausahaan<br>(Professional Ethics and<br>Entrepreneurship)                                | 2      | Compulsory   |
| 2  | Manajemen Lalu Lintas Lanjut;<br>Transportasi Umum (Advance Traffic<br>Management for Public<br>Transportation) | 3      | Compulsory   |
| 3  | <b>Tesis</b><br>( <i>Thesis</i> )   | 6      | Compulsory   |

**Semester 4**

| No | Subject                           | Credit | Prerequisite |
|----|-----------------------------------|--------|--------------|
| 1  | <b>Tesis</b><br>( <i>Thesis</i> ) | 6      | Compulsory   |