



## Faculty of Engineering and Technology University of Dhaka

### B.Sc. Engineering Rules for Engineering College/Institutes (Effective from 1<sup>st</sup> Year 2022-2023):

#### B.Sc. Engineering Rules Proposal for Engineering College/Institutes (Effective from 1<sup>st</sup> Year 2022-2023)

##### 1.1 The B.Sc. Engineering Program

The B.Sc. Engineering program in affiliated engineering colleges/institutes under the Faculty of Engineering and Technology, University of Dhaka is a four academic year program. The program comprises eight semesters, each having duration of six academic calendar months to be distributed as follows:

- Classes:** Fifteen active weeks
- Preparatory Leave:** Maximum two weeks
- Semester Final Examination:** Two/three weeks
- Vacation:** Only the usual vacation of the University of Dhaka will be applicable
- Result Publication:** Within two months from the last date of theory examination is desirable

##### 1.2 Admission

- Students will be admitted to the respective departments of affiliated engineering colleges/institutes as per rules of the University of Dhaka
- Each year application requirements will be defined by the Faculty of Engineering and Technology of the University of Dhaka.
- Departments can define specific requirements of subject-wise score in admission test with the approval of the faculty of Engineering and Technology of the University of Dhaka.

##### 1.3 Definition of Credit

- For theoretical courses fifteen class-hour of fifty minutes each is defined as one credit.
- For practical or laboratory courses, thirty class-hour is defined as one credit.

##### 1.4 Credit Requirements for the B.Sc. Engineering Program

- Total credits : 145 to 165
- Credits for core courses (theory) : 66 to 107
- Credits for practical courses : 21 to 47
- Credits for general education : 6 to 38
- Credits for mathematics and statistics : 9 to 18
- Credits for projects/field study : 0 to 10
- Credits for course viva : 0 to 4

##### 1.5 Grades and Grade Points

The University Grants Commission (UGC) of Bangladesh approved grading system applies to calculate letter grades and grade points. Letter grades and grade points will be awarded on the basis of marks obtained in the written, oral and practical examination according to the following table:

Marks	Letter Grade	Grade Point
80% and Above	A+	4.00
75% to < 80%	A	3.75
70% to < 75%	A-	3.50
65% to < 70%	B+	3.25
60% to < 65%	B	3.00
55% to < 60%	B-	2.75
50% to < 55%	C+	2.50
45% to < 50%	C	2.25
40% to < 45%	D	2.00
Less Than 40%	F	0.00
	I	Incomplete
	W	Withdrawn

- Only "D" or higher grades will be counted as credits earned by a student.
- A student obtaining "F" grade in any course will not be awarded degree.
- CGPA (Cumulative Grade Point Average) is the weighted average of the grade points obtained by a student in all the courses. CGPA will be calculated according to the following formula:

$$CGPA = \frac{\sum(\text{grade points in a course} \times \text{credits for the course})}{\text{total credits taken}}$$

- (d) In the tabulation process, only the total marks of a student in any course will be rounded-up to next number and the published result of the program will show only the earned letter grades and grade points in courses and the Cumulative Grade Point Average (CGPA) at the end of each semester.

### 1.6 Marks Distribution for a Course

#### (a) Theory Course

- (i) Class attendance : 5%  
(ii) In-course examination : 25% (2 In-courses)  
(iii) Final examination : 70%
- Total Marks : 100%**

#### (b) Lab Course

- (i) Lab attendance : 10%  
(ii) Continuous evaluation : 30%  
(iii) Final examination : 60%

#### (c) Project

- (i) Defense : 60%  
(ii) Report : 40%

#### (d) Field Study / Internship

- (i) Presentation : 40%  
(ii) Report : 60%

#### (e) Comprehensive viva

All courses : 100%

#### (f) Guideline for Attendance Mark

Attendance (%)	Marks (05)	Marks (10)
90 and above	05	10
85 to 89	04	08
80 to 84	03	06
75 to 79	02	04
60 to 74	01	02
Less than 60	00	00

### 1.7 Examination Committee Formation

- (a) At the beginning of each academic session, an examination committee shall be formed by the Faculty of Engineering and Technology for every academic year of each department. If a department exists in more than one college/institute, a single examination committee will be formed.
- (b) The examination committee will consist of four members proposed by the Faculty of Engineering and Technology.
- (c) The examination committee members are a Chairman, two internal members and one external member.
- (d) In each examination committee, at least two members will be from the University of Dhaka including Chairman and external member of the examination committee. However, an external member might be from any public university in case of requirement of expertise in the relevant subject/domain/field.
- (e) Dean or at least an Assistant Professor from the departments under Faculty of Engineering and Technology of the University of Dhaka can act as the Chairman of the examination committee.
- (f) The examination committee will be responsible for all examination related activities as per University rules.
- (g) An eligible faculty member can serve as Chairman/member of the two examination committees at most.
- (h) Role of the Examination Committee:
- (i) Chairman of the examination committee will act as a course coordinator for the academic session. The role of a course coordinator is to monitor the academic activities by consulting the college/institute authorities as well as examination committee members and report to the Dean, Faculty of Engineering and Technology to avoid any unexpected situation.
  - (ii) Prepare a detail academic calendar for the particular semester approved by the Dean, FoET.
  - (iii) Prepare lab and final examination schedule, recommend lab examiners and question setters, moderate

and print questions for the final examination.

- (iv) For faster result processing, the examination committee will prepare a 'answer script movement roadmap' according to the meeting decision and implement the roadmap through examination conduction committee (stated below) and monitor the process.
- (v) For ease of result processing, the committee will design and provide standard format for in-course, continuous assessment for lab and lab final examination (including marks distribution) marks.

### **1.8 Examination Conduction Committee**

- (a) For each college/institute, there will be an Examination Conduction Committee which will be formed as follows:
  - (i) The respective Principal will be the Chairman of that committee.
  - (ii) The department heads/chairmen of the affiliated colleges/institutes and a representative from Dean, Faculty of Engineering and Technology/Controller of Examination, University of Dhaka will act as the members of the said committee.
- (b) Role of the Examination Conduction Committee:
  - (i) Receiving semester final examination question papers from Controller of Examination/respective police station/DC office.
  - (ii) After semester final examination of course/courses, respective examination conduction committee will send the answer scripts to other colleges/institutes, according to the roadmap designed by the examination committee, in a regular interval with proper documentation. Receiving examination conduction committee will assign days for the examiners to evaluate the answer scripts, monitor time span and report to the Chairman of the examination committee in case of delay/other issues.
  - (iii) After evaluation by the 2<sup>nd</sup> examiner, the respective examination conduction committee will send the answer scripts to the Controller of Examination, University of Dhaka with proper documentation.

### **1.9 Evaluation of the Courses**

The performance of a student in a course will be evaluated in the following ways:

- (a) For a theory course the evaluation will be made on the basis of attendance, in-course examination and final examination.
- (b) For any course attendance and in-course examination will be evaluated by the course teacher/s and the mark sheets must be submitted to the Chairman of the examination committee and Controller of Examination, University of Dhaka before commencement of the semester final examination.
- (c) The percentage of attendance of students for each course along with the attendance sheet must be submitted to the respective Principal of the college/institute.
- (d) The in-course examination scripts must be shown to the students before the last class of a semester.
- (e) The final mark of the in-course will be calculated by averaging 2 in-courses (best one will not be allowed).
- (f) For theory course final examinations, there will be two examiners: course teacher of any college/institute will be the first examiner and the second examiner will be from a relevant department of affiliated colleges/institutes or the University of Dhaka or outside.
- (g) Evaluation of the Semester Final Answer Script:
  - (i) The answer scripts of final examination will be evaluated by two examiners and the average mark will be considered as the mark obtained, if the difference of two examiner marks do not exceed 20%.
  - (ii) In case of a difference of marks between the two examiners is more than 20% then the script will be evaluated by a third examiner. Marks of nearest two examiners will be taken for average.
  - (iii) If the differences of marks of third examiner from the first and second examiner become equal then average of three examiners marks will be the final mark.
- (h) The assessment of laboratory/practical/field study course will be made by observing overall performance of a student during practical (continuous evaluation), attendance, viva-voce, assignments and evaluation of lab final examination.
- (i) For fourth year, project evaluation will be made on the basis of presentation/defense and report.
- (j) For field study/internship, evaluation will be made on the basis of presentation and report.

### **1.10 Requirement to Sit for Course Final Examination**

- (i) Students having 75% or more attendance on average is eligible to appear in the semester final examination
- (ii) Student having average 60-74% attendance will be allowed to sit for the examination with a fine as per the rule of the University of Dhaka.
- (iii) Student having average attendance below 60% will not be allowed to sit for the semester final examination but may seek re-admission in the program.
- (iv) The semester final examination will be arranged in respective colleges/institutes under the supervision of the Controller of Examination, University of Dhaka.
- (v) The duration of theory course final examinations will be as follows:

Credit	Duration of examination
4 credits course	4 hours
3 credits course	3 hours
2 credits course	2.5 hours

(vi) Duration of lab examination will be defined by the examination committee in consultation with the respective department.

### 1.11 Promotion to the Next Academic Year

Promotion to the next year will be given if a student scores minimum CGPA as follows:

Year Description	CGPA
1st year to 2nd year	CGPA: 2.00
2nd year to 3rd year	CGPA: 2.25
3rd year to 4th year	CGPA: 2.50

### 1.12 Requirements for the Award of the B.Sc. Engineering Degree

- The student must earn required credits in a maximum period of six academic years starting from the date of admission at 1st year 1st semester.
- The student must obtain CGPA of at least 2.5 out of 4.00 to achieve the B.Sc. Engineering degree without "F" grade in any course.

### 1.13 Tabulations

- The examination committee will appoint two tabulators.
- The Chairman of the examination committee will receive marks of in-course, continuous evaluation, lab final and semester final examination marks from respective examiners via respective college/institute heads/department heads.
- Tabulators will receive marks of all courses from the Chairman of the examination committee.
- The two tabulators will independently prepare the tabulation sheets and compare before submitting it to the office of the Controller of Examination through the examination committee.

### 1.14 Improvement Examination

- To clear "F" grade/grades of any course/courses, a student will get two consecutive academic years complying with the time required for the degree. The best grade that a student can be awarded is B+ (B plus).
- A student may sit for the improvement examination in two consecutive academic years, for any course/courses complying with the time required for the degree where the grade obtained is less than or equal to "C+" (C plus) and the best grade that a student can be awarded is B+ (B plus). However, if the grade is not improved the previous grade shall remain valid.

### 1.15 Re-admission and Dropout

- A student may be allowed re-admission for a maximum of two times to complete the B.Sc. Engineering program.
- A student may seek re-admission provided he or she has at least 30% attendance in the previous semester or year.
- A student who is unable to get the minimum required CGPA even after taking re-admission twice will be dropped out from the academic program.