

**Booklet for**  
**Admission session from 2014-15 to 2019-20**  
**Undergraduate Programs**



**Department of Computer Science and Engineering**  
**Faculty of Electrical and Electronic Engineering**  
**Dhaka University of Engineering & Technology, Gazipur**

**Cumulative Complete Credit**

<b>Name of Semester</b>	<b>Credit</b>	<b>Cumulative Total Credit</b>
1 <sup>st</sup> year 1 <sup>st</sup> semester (exempted)	<b>20.5</b>	<b>-</b>
1 <sup>st</sup> year 2 <sup>nd</sup> semester	<b>21.75</b>	<b>21.75</b>
2 <sup>nd</sup> year 1 <sup>st</sup> semester	<b>20</b>	<b>41.75</b>
2 <sup>nd</sup> year 2 <sup>nd</sup> semester	<b>21.25</b>	<b>63</b>
3 <sup>rd</sup> year 1 <sup>st</sup> semester	<b>21.25</b>	<b>84.25</b>
3 <sup>rd</sup> year 2 <sup>nd</sup> semester	<b>21.25</b>	<b>105.5</b>
4 <sup>th</sup> year 1 <sup>st</sup> semester	<b>18.75</b>	<b>124.25</b>
4 <sup>th</sup> year 2 <sup>nd</sup> semester	<b>21.25</b>	<b>145.5</b>
<b>Total credit with exempted</b>	<b>166</b>	<b>Cumulative Total Credit(145.5)</b>

**1<sup>st</sup> year 1<sup>st</sup> semester (Exempted)**

Sl. No.	Course No.	Course Title	Theory hrs/week	Sessional hrs/week	Credits
1.	Math-1411	Mathematics-I	3	0	3
2.	Ph-1413	Physics-I	3	0	3
3.	Ph-1414	Physics-I Sessional	0	3	1.5
4.	Ch-1415	Chemistry-I	3	0	3
5.	Ch-1416	Chemistry-I Sessional	0	3	1.5
6.	CSE-1811	Computer Fundamentals	3	0	3
7.	CSE-1812	Computer Fundamentals Sessional	0	3	1.5
8.	Hum-1417	Government and Sociology	4	0	4
<b>Total</b>			<b>16</b>	<b>9</b>	<b>20.5</b>

Contact Hours: 16T + 9S = 25 hrs/ week  
Total credits: 20.5

No. of Theory Courses: 5  
No. of Lab / Sessional courses: 3

**1<sup>st</sup> year 2<sup>nd</sup> semester**

Sl.No .	Course No.	Course Title	Theory hrs/week	Sessional hrs/week	Credits
1.	CSE-1121	Structured Programming Language	4	0	4
2.	CSE-1122	Structured Programming Language Sessional	0	3	1.5
3.	CSE-1823	Digital Logic & System Design	3	0	3
4.	CSE-1824	Digital Logic & System Design Sessional	0	3/2	0.75
5.	CSE-1124	Drawing & CAD Project Sessional	0	3/2	0.75
6.	Math-1421	Mathematics – II	4	0	4
7.	Ph-1423	Physics – II	4	0	4
8.	Ph-1424	Physics – II Sessional	0	3/2	0.75
9.	Hum-1427	English and Economics	3	0	3
<b>Total</b>			<b>18</b>	<b>7.5</b>	<b>21.75</b>

Contact Hours: 18T + 7.5 S = 25.50 hrs/week  
Total credits: 21.75

No. of Theory Courses: 5  
No. of Lab / Sessional courses: 4

**2<sup>nd</sup> year 1<sup>st</sup> semester**

Sl. No.	Course No.	Course Title	Theory hrs/week	Sessional hrs/week	Credits
1.	CSE-2513	Discrete Mathematics	3	0	3
2.	CSE-2111	Object Oriented Programming	4	0	4
3.	CSE-2112	Object Oriented Programming Sessional	0	3	1.5
4.	EEE-2813	Electronic Devices & Circuits	3	0	3
5.	EEE-2814	Electronic Devices & Circuits Sessional	0	3/2	0.75
6.	Math-2411	Mathematics-III	4	0	4
7.	Ch-2415	Chemistry – II	3	0	3
8.	Ch-2416	Chemistry - II Sessional	0	3/2	0.75
<b>Total</b>			<b>17</b>	<b>6</b>	<b>20.00</b>

Contact Hours: 17T + 6S = 23 hrs/week  
Total credits: 20.00

No. of Theory Courses: 5  
No. of Lab / Sessional courses: 3

**2<sup>nd</sup> year 2<sup>nd</sup> semester**

Sl. No.	Course No.	Course Title	Theory hrs/week	Sessional hrs/week	Credits
1.	CSE-2120	Visual Programming Sessional	0	3	1.5
2.	CSE-2521	Data Structure	3	0	3
3.	CSE-2522	Data Structure Sessional	0	3/2	0.75
4.	EEE-2823	Electrical Drives and Instrumentation	3	0	3
5.	EEE-2824	Electrical Drives and Instrumentation Sessional	0	3/2	0.75
6.	Math-2421	Mathematics-IV	4	0	4
7.	CSE-2124	Numerical Methods Sessional	0	3	1.5
8.	CSE-2821	Digital Electronics & Pulse Technique	3	0	3
9.	CSE-2822	Digital Electronics & Pulse Technique Sessional	0	3/2	0.75
10	CSE-2823	Computer Architecture	3	0	3
<b>Total</b>			<b>16</b>	<b>10.5</b>	<b>21.25</b>

Contact Hours: 16T + 10.5S = 26.5 hrs/week  
Total credits: 21.25

No. of Theory Courses: 5  
No. of Lab / Sessional courses: 5

**3<sup>rd</sup> year 1<sup>st</sup> semester**

Sl. No.	Course No.	Course Title	Theory hrs/week	Sessional hrs/week	Credits
1.	CSE-3114	Software & Hardware Project	0	3/2	0.75
2.	CSE-3511	Algorithm Design & Analysis	3	0	3
3.	CSE-3512	Algorithm Design & Analysis Sessional	0	3	1.5
4.	CSE-3311	Database Systems	3	0	3
5.	CSE-3312	Database Systems Sessional	0	3/2	0.75
6.	Math-3411	Mathematics-V	4	0	4
7.	CSE-3211	Theory of Computation	3	0	3
8.	CSE-3811	Microprocessor and Assembly Language	3	0	3
9.	CSE-3812	Microprocessors and Assembly Language Sessional	0	3/2	0.75
10.	CSE-3110	Internet Programming Sessional	0	3	1.5
<b>Total</b>			<b>16</b>	<b>10.5</b>	<b>21.25</b>

Contact Hours: 16T + 10.5S = 26.5 hrs/week  
Total credits: 21.25

No. of Theory Courses: 5  
No. of Lab / Sessional courses: 5

**3<sup>rd</sup> year 2<sup>nd</sup> semester**

Sl. No.	Course No.	Course Title	Theory hrs/week	Sessional hrs/week	Credits
1.	CSE-3122	Mobile Application Development Project	0	3	1.5
2.	CSE-3221	Operating System	3	0	3
3.	CSE-3222	Operating System Sessional	0	3/2	0.75
4.	CSE-3223	Compiler Design	3	0	3
5.	CSE-3224	Compiler Design Sessional	0	3/2	0.75
6.	Hum-3423	Industrial Management & Accounting	4	0	4
7.	CSE-3421	Data Communication	3	0	3
8.	CSE-3422	Data Communication Sessional	0	3/2	0.75
9.	CSE-3621	Information System Analysis & Design	3	0	3
10.	CSE-3622	Information System Analysis & Design Sessional	0	3/2	0.75
<b>Total</b>			<b>16</b>	<b>9</b>	<b>20.5</b>

Contact Hours: 16T + 9S = 25 hrs/week  
Total credits: 20.5

No. of Theory Courses: 5  
No. of Lab / Sessional courses: 5

**Amended** (Amended for admission session from 2016-17 to 19-20):

Sl. No.	Course No.	Course Title	Theory hrs/week	Sessional hrs/week	Credits
1.	CSE-3722	Ethics in Computer Science and Engineering		3/2	0.75

## 4<sup>th</sup> year 1<sup>st</sup> semester

Sl. No.	Course No.	Course Title	Theory hrs/week	Sessional hrs/week	Credits
1.	CSE-4000	Project and Thesis-I	0	3	1.5*
2.	CSE-4110	Technical Writing and Presentation	0.75	0	0.75
3.	CSE-4711	Simulation & Modeling	3	0	3
4.	CSE-4712	Simulation & Modeling Sessional	0	3/2	0.75
5.	CSE-4813	Peripherals & Interfacing	3	0	3
6.	CSE-4814	Peripherals & Interfacing Sessional	0	3/2	0.75
7.	CSE-4411	Computer Networks	3	0	3
8.	CSE-4412	Computer Networks Sessional	0	3/2	0.75
9.	Option – I		3	0	3
10.	Option – I Sessional		0	3/2	0.75
11.	Option – II		3	0	3
<b>Total</b>			<b>15.75</b>	<b>9</b>	<b>20.25</b>

Contact Hours: 15.75T + 9S =24.75 hrs/week

Total credits: 20.25

No. of Theory Courses: 5

No. of Lab / Sessional courses: 5

\* Credit Transferred to 2<sup>nd</sup> Semester

### List of Optional Courses:

**Option – I** (One Subject should be selected from the following courses):

Sl. No.	Course No.	Course Title	Theory hrs/week	Sessional hrs/week	Credits
1.	CSE-4511	Computational Geometry	3	0	3
2.	CSE-4512	Computational Geometry Sessional	0	3/2	0.75
3.	CSE-4815	VLSI Design	3	0	3
4.	CSE-4816	VLSI Design Sessional	0	3/2	0.75
5.	CSE-4619	Machine Learning	3	0	3
6.	CSE-4620	Machine Learning Sessional	0	3/2	0.75
7.	CSE-4615	Digital Image Processing	3	0	3
8.	CSE-4616	Digital Image Processing Sessional	0	3/2	0.75

**Option-II** (One Subject should be selected from the following courses):

Sl. No.	Course No.	Course Title	Theory hrs/week	Sessional hrs/week	Credits
1.	CSE-4413	E-commerce and Internet Security	3	0	3
2.	CSE-4513	Graph Theory & Algorithm	3	0	3
3.	CSE-4817	Digital Signal Processing	3	0	3
4.	CSE-4611	Human Computer Interaction	3	0	3
5.	CSE-4817	Digital Signal Processing	3	0	3

**4<sup>th</sup> year 2<sup>nd</sup> semester**

Sl. No.	Course No.	Course Title	Theory hrs/week	Sessional hrs/week	Credits
1.	CSE-4000	Project & Thesis-II	0	3	3.00
2.	CSE-4621	Computer Graphics & Multimedia	4	0	4
3.	CSE-4622	Computer Graphics & Multimedia Sessional	0	3/2	0.75
4.	CSE-4623	Artificial Intelligence	3	0	3
5.	CSE-4624	Artificial Intelligence Sessional	0	3/2	0.75
6.	CSE-4721	Software Engineering	3	0	3
7.	Option – I		3	0	3
8.	Option-I Sessional		0	3/2	0.75
9.	Option – II		3	0	3
<b>Total</b>			<b>16</b>	<b>7.5</b>	<b>21.25</b>

Contact Hours: 16T + 7.5S = 23.5 hrs/week

Total credits: 21.25

No. of Theory Courses: 5

No. of Lab / Sessional courses: 4

\*1.5 Credit transfer from 1<sup>st</sup> semester**Option-I:** One Courses should be selected from the following courses:

Sl. No.	Course No.	Course Title	Theory hrs/week	Sessional hrs/week	Credits
1.	CSE-4311	Geographical Information System	3	0	3
2.	CSE-4312	Geographical Information System Sessional	0	3/2	0.75
3.	CSE-4629	Pattern Recognition	3	0	3
4.	CSE-4630	Pattern Recognition Sessional	0	3/2	0.75
5.	CSE-4631	Bioinformatics	3	0	3
6.	CSE-4632	Bioinformatics Sessional	0	3/2	0.75

**Option-II:** One Courses should be selected from the following courses:

Sl. No.	Course No.	Course Title	Theory hrs/week	Sessional hrs/week	Credits
1.	CSE-4421	Communication Engineering	3	0	3
2.	CSE-4521	Parallel & Distributed Processing	3	0	3
3.	CSE-4625	Neural Networks & Fuzzy System	3	0	3
4.	CSE-4627	Robotics and Computer Vision	3	0	3
5.	CSE-4641	Knowledge Engineering	3	0	3
6.	CSE-4725	Fault Tolerant System	3	0	3
7.	CSE-4727	Information System Management	3	0	3
8.	CSE-4821	Advanced Computer Architecture	3	0	3