



# **Institute of Information Technology (IIT)**

## **Noakhali Science and Technology University**

**BACHELOR OF SCIENCE IN SOFTWARE ENGINEERING (BSSE)**  
**January 2020**

# Institute of Information Technology (IIT)

## Noakhali Science and Technology University

### Bachelor of Science in Software Engineering (BSSE)

#### Semester 1

Course Code	Course Title	Credit	Theory	Lab
CSE 1101	Structured Programming	1	1	0
CSE 1102	Structured Programming Lab	2	0	2
CSE 1103	Discrete Mathematics	3	3	0
STAT 1105	Probability and Statistics for Engineers-I	3	3	0
MATH 1107	Calculus and Analytical Geometry	3	3	0
GE 1109	Soft Skill Communication	3	3	0
GE 1111	Technology and Society	2	2	0
GE 1112	Technology and Society Lab	1	0	1
SE 1113	Introduction to Software Engineering	3	3	0
<b>9 Courses</b>		<b>21</b>	<b>18</b>	<b>3</b>

#### Semester 2

Course Code	Course Title	Credit	Theory	Lab
CSE 1201	Data Structure	1	1	0
CSE 1202	Data Structure Lab	2	0	2
CSE 1203	Computer Organization	2	2	0
CSE 1204	Computer Organization Lab	1	0	1
STAT 1205	Probability and Statistics for Engineers-II	3	3	0
MATH 1207	Ordinary Differential Equations	3	3	0
GE 1209	History of Emergence of Bangladesh	3	3	0
GE 1211	Bengali Literature	3	3	0
SE 1213	Object Oriented Concepts I	2	2	0
SE 1214	Object Oriented Concepts I Lab	1	0	1
<b>10 Courses</b>		<b>21</b>	<b>17</b>	<b>4</b>

**Semester 3**

Course Code	Course Title	Credit	Theory	Lab
CSE 2101	Algorithm Analysis	2	2	0
CSE 2102	Algorithm Analysis Lab	1	0	1
SE 2103	Theory of Computation	2	2	0
SE 2104	Theory of Computation Lab	1	0	1
CSE 2105	Computer Networks	2	2	0
CSE 2106	Computer Networks Lab	1	0	1
MATH 2107	Numerical Analysis for Engineers	2	2	0
MATH 2108	Numerical Analysis for Engineers Lab	1	0	1
SE 2109	Object Oriented Concepts II	2	2	0
SE 2110	Object Oriented Concepts II Lab	1	0	1
SE 2112	Software project Lab I	3	0	3
<b>11 Courses</b>		<b>18</b>	<b>10</b>	<b>8</b>

**Semester 4**

Course Code	Course Title	Credit	Theory	Lab
CSE 2201	Operating Systems and System Programming	2	2	0
CSE 2202	Operating Systems and System Programming Lab	1	0	1
GE 2203	Business Psychology	3	3	0
CSE 2205	Information Security	2	2	0
CSE 2206	Information Security Lab	1	0	1
CSE 2207	Database Management System-I	2	2	0
CSE 2208	Database Management System-I Lab	1	0	1
SE 2209	Software Requirements Spec. and Analysis	2	2	0
SE 2210	Software Requirements Spec. and Analysis Lab	1	0	1
BUS 2211	Business Studies for Engineers	3	3	0
<b>10 Courses</b>		<b>18</b>	<b>14</b>	<b>4</b>

**Semester 5**

Course Code	Course Title	Credit	Theory	Lab
SE 3101	Professional Ethics for Information Systems	3	3	0
CSE 3103	Web Technology	1	1	0
CSE 3104	Web Technology Lab	2	0	2
CSE 3105	Data Science and Analytics – DBMS II	1	1	0
CSE 3106	Data Science and Analytics – DBMS II Lab	2	0	2
BUS 3107	Business Communications	2	2	0
BUS 3108	Business Communications Lab	1	0	1
SE 3109	Design Pattern	2	2	0
SE 3110	Design Pattern Lab	1	0	1
SE 3112	Software Project Lab II	3	0	3
<b>10 Courses</b>		<b>18</b>	<b>9</b>	<b>9</b>

**Semester 6**

Course Code	Course Title	Credit	Theory	Lab
CSE 3201	Distributed Systems	1	1	0
CSE 3202	Distributed Systems Lab	2	0	2
SE 3203	Software Metrics	2	2	0
SE 3204	Software Metrics Lab	1	0	1
SE 3205	Software Security	2	2	0
SE 3206	Software Security Lab	1	0	1
CSE 3207	Artificial Intelligence	2	2	0
CSE 3208	Artificial Intelligence Lab	1	0	1
SE 3209	Software Testing and Quality Assurance	2	2	0
SE 3210	Software Testing and Quality Assurance Lab	1	0	1
SE 3211	Software Design and Architecture	2	2	0
SE 3212	Software Design and Architecture Lab	1	0	1
<b>12 Courses</b>		<b>18</b>	<b>11</b>	<b>7</b>

**Semester 7**

Course Code	Course Title	Credit	Theory	Lab
SE 4100	Internship	18	0	18
<b>1 Courses</b>		<b>18</b>	<b>0</b>	<b>18</b>

**Semester 8**

Course Code	Course Title	Credit	Theory	Lab
SE 4202	Project	6	0	6
SE 4203	Software Maintenance	2	2	0
SE 4204	Software Maintenance Lab	1	0	1
SE 4205	Software Project Management	2	2	0
SE 4206	Software Project Management Lab	1	0	1
SE/CSE 42XX	Elective	3	2	1
SE/CSE 42XX	Elective	3	2	1
<b>5 Courses</b>		<b>18</b>	<b>8</b>	<b>10</b>

**Summery**

Title	No of Subject	Credit	
CSE	14	42	
MATH	3	9	
STAT	2	6	
GE	5	15	
SE	17+1+1	51+18+6 = 75	
BUS	1	3	