

BTech CSE- Curriculum Structure of batch admitted 2015 onwards

I semester (B1)

| Sr.No | Course | | Contact Hours | | | | Credits |
|-------|------------|--|---------------|---|---|-------|---------|
| | No. | Title | L | T | P | Total | |
| 1. | 15B11HS111 | Life Skills | 1 | 1 | - | 2 | 2 |
| 2. | 15B11MA111 | Mathematics-1 | 3 | 1 | - | 4 | 4 |
| 3. | 15B11PH111 | Physics-1 | 3 | 1 | - | 4 | 4 |
| 4. | 15B11EC111 | Electrical Science-1 | 3 | 1 | - | 4 | 4 |
| 5. | 15B11CI111 | Software Development Fundamentals-I | 3 | 1 | - | 4 | 4 |
| 6. | 15B11HS112 | English | 2 | 1 | - | 3 | 3 |
| 7. | 15B17PH171 | Physics Lab-1 | - | - | 2 | 2 | 1 |
| 8. | 15B17EC171 | Electrical Science Lab -1 | - | - | 2 | 2 | 1 |
| 9. | 15B17CI171 | Software Development Lab-I | - | - | 4 | 4 | 2 |
| | | TOTAL | | | | 29 | 25 |

II semester (B2)

| Sr.No. | Course | | Contact Hours | | | | Credits |
|--------|------------|--|---------------|---|---|-------|---------|
| | No. | Title | L | T | P | Total | |
| 1. | 15B11HS211 | Economics | 2 | 1 | - | 3 | 3 |
| 2. | 15B11MA211 | Mathematics-2 | 3 | 1 | - | 4 | 4 |
| 3. | 15B11PH211 | Physics-2 | 3 | 1 | - | 4 | 4 |
| 4. | 15B11EC211 | Electrical Science -2 | 3 | 1 | - | 4 | 4 |
| 5. | 15B11CI211 | Software Development Fundamentals-II | 3 | 1 | - | 4 | 4 |
| 6. | 15B11CI212 | Theoretical Foundations of Computer Science | 3 | 1 | - | 4 | 4 |
| 7. | 15B17PH271 | Physics Lab-2 | - | - | 2 | 2 | 1 |
| 8. | 15B17EC271 | Electrical Science Lab -2 | - | - | 2 | 2 | 1 |
| 9. | 15B17CI271 | Software Development Lab-II | - | - | 2 | 2 | 1 |
| | | TOTAL | | | | 29 | 26 |

III semester (B3)

| Sr.No. | Course | | Contact Hours | | | | Credits |
|--------|------------|------------------------|---------------|---|---|-------|---------|
| | No. | Title | L | T | P | Total | |
| 1. | Xxxxx | HSS Elective - 1 | 2 | 1 | - | 3 | 3 |
| 2. | 15B11CI311 | Data Structures | 3 | 1 | - | 4 | 4 |

| | | | | | | | |
|----|------------|---|---|---|---|----|----|
| 3. | 15B11EC314 | Introduction to Digital Systems | 3 | 1 | - | 4 | 4 |
| 4. | 15B11CI312 | Database Systems and Web | 3 | 1 | - | 4 | 4 |
| 5. | 15B11CI313 | Computer Organisation and Architecture | 3 | 1 | - | 4 | 4 |
| 6. | 15B17CI371 | Data Structures lab | - | - | 2 | 2 | 1 |
| 7. | 15B17EC374 | Digital Systems Lab | - | - | 2 | 2 | 1 |
| 8. | 15B17CI372 | Database Systems and Web lab | - | - | 2 | 2 | 1 |
| 9. | 15B17CI373 | Computer Organisation and Architecture Lab | - | - | 2 | 2 | 1 |
| | | TOTAL | | | | 27 | 23 |

IV semester (B4)

| Sr.No. | Course | | Contact Hours | | | | Credits |
|--------|------------|--|---------------|---|---|-------|---------|
| | No. | Title | L | T | P | Total | |
| 1. | Xxxxx | HSS Elective - 2 | 2 | 1 | - | 3 | 3 |
| 2. | 15B11MA301 | Probability and Random Processes | 3 | 1 | - | 4 | 4 |
| 3. | 15B11CI411 | Algorithms and Problem Solving | 3 | 1 | - | 4 | 4 |
| 4. | 15B11CI412 | Operating Systems and Systems Programming | 3 | 1 | - | 4 | 4 |
| 5. | Xxxxx | CS Elective-1 | 3 | 1 | - | 4 | 4 |
| 6. | 15B11GE301 | Environmental Science | 3 | - | - | 3 | 3 |
| 7. | 15B17CI471 | Algorithms and Problem Solving Lab | - | - | 4 | 4 | 2 |
| 8. | 15B17CI472 | Operating Systems and Systems Programming Lab | - | - | 2 | 2 | 1 |
| | | TOTAL | | | | 28 | 25 |

V semester (B5)

| Sr.No. | Course | | Contact Hours | | | | Credits |
|--------|--------------------------------|--|---------------|---|---|-------|---------|
| | No. | Title | L | T | P | Total | |
| 1. | Xxxxx | HSS Elective-3 | 2 | 1 | - | 3 | 3 |
| 2. | 15B11CI511 15B11CI512 | Computer Networks OR Embedded Systems | 3 | 1 | - | 4 | 4 |
| 3. | 15B11CI513 OR 15B11CI514 | Software Engineering OR Artificial Intelligence | 3 | 1 | - | 4 | 4 |
| | | Selected Foreign Language | 2/3 | | | 2/3 | Audit |
| 4. | Xxxxx | Science Elective - 1 | 3 | 1 | - | 4 | 4 |
| 5. | 15B19CI591 | Minor Project – 1 | | | | | 5 |
| 6. | 15B17CI571 | Computer Networks Lab OR | - | - | 2 | 2 | 1 |

| | | | | | | | |
|----|--------------------------------|--|---|---|---|--------|----|
| | OR 15B17CI572 | Embedded Systems Lab | | | | | |
| 7. | 15B17CI573 OR 15B17CI574 | Software Engineering Lab OR Artificial Intelligence Lab | - | - | 2 | 2 | 1 |
| 8. | 15B17CI575 | Open Source Software Lab | - | - | 2 | 2 | 1 |
| 9. | 15B17CI576 | Information Security Lab | - | - | 2 | 2 | 1 |
| | | TOTAL | | | | 25/26+ | 24 |

VI semester (B6)

| Sr.No. | Course | | Contact Hours | | | | Credits |
|--------|--------------------------|---|---------------|---|---|-------|---------|
| | No. | Title | L | T | P | Total | |
| 1. | Xxxxx | HSS Elective -4 | 2 | 1 | - | 3 | 3 |
| 2. | 15B11CI611 15B11CI612 | Theory of Computation and Compiler Design OR Theory of Programming Languages | 3 | 1 | - | 4 | 4 |
| 3. | Xxxxx | CS Elective-2 | 3 | 1 | - | 4 | 4 |
| 4. | Xxxxx | CS Elective-3 | 3 | 1 | - | 4 | 4 |
| 5. | Xxxxx | Science Elective - 2 | 3 | 1 | - | 4 | 4 |
| | | Selected Value Added Course | 2/3 | | | 2/3 | Audit |
| 6. | 15B17CI671 15B17CI672 | Compiler Design Lab OR Programming Languages Lab | - | - | 2 | 2 | 1 |
| 7. | 15B19CI691 | Minor Project-2 | - | - | | | 5 |
| | | TOTAL | | | | 24 | 25 |

Students will undergo 6 weeks Industrial Training during Summer Vacation after 6th Semester.

VII semester (B7)

| Sr.No. | Course | | Contact Hours | | | | Credits |
|--------|------------|----------------------|---------------|---|---|-------|---------|
| | No. | Title | L | T | P | Total | |
| 1. | Xxxxx | CS Elective-4 | 3 | 1 | - | 4 | 4 |
| 2. | Xxxxx | CS Elective-5 | 3 | 1 | - | 4 | 4 |
| 3. | Xxxxx | CS Elective-6 | 3 | 1 | - | 4 | 4 |
| 4. | Xxxxx | Open Elective - 1 | 3 | | - | 3 | 3 |
| | | | | | | | |
| 5. | 15B19CI791 | Major Project Part-1 | - | - | | | 4 |
| 6. | 15B19CI792 | Term Paper | - | - | - | - | 3 |
| 7. | 15B19CI793 | Summer Training Viva | - | - | - | - | 2 |
| | | TOTAL | | | | 15+ | 24 |

VIII semester (B8)

| Sr.No. | Course | | Contact Hours | | | | Credits |
|--------|------------|----------------------|---------------|---|---|------------|-----------|
| | No. | Title | L | T | P | Total | |
| | | | | | | | |
| 1. | Xxxxx | CS Elective-7 | 3 | 1 | - | 4 | 4 |
| 2. | Xxxxx | CS Elective-8 | 3 | 1 | - | 4 | 4 |
| 3. | Xxxxx | Open Elective - 2 | 3 | | - | 3 | 3 |
| 4. | 15B19CI891 | Major Project Part-2 | - | - | | | 12 |
| | | TOTAL | | | | 11+ | 23 |

Total Credits for B. Tech. –195