**Computer Science and Engineering Department**

**Thapar Institute of Engineering and Technology**

**Course Code: UCT 301**

**Formal Languages and Automata Theory**

**Tutorial 3**

1. Design Deterministic finite automata (DFA) for the following languages:
2. DFA accepts all strings over that accepts only those words that do not end with 
3. DFA accepts all strings over  that accept all strings not containing substring *00* .
4. DFA accepts all strings over  that accepts all strings not containing even number of letters.
5. DFA accepts all strings over {a, b} that accepts only those words that begin or end with a double letter.
6. Design Regular Grammar for all problem in Q1.
7. Find a string of minimum length in  not in the language corresponding to the given regular expression.
8. 
9. 
10. 

4. Draw deterministic finite automata corresponding to following regular expressions:

a) 

b) 

c) 