## Week 1

## **Homework questions**

- 1. Design a DFA to accept the language  $L = \{ w : |w| \mod 2 = 0 \}$  over  $\sum = \{ a, b \}$ 2. Obtain DFA for the following languages, where  $\sum = \{ 0, 1 \}$
- - a. The strings start with 10
  - b. The strings end with 10
- 3. Obtain DFA for  $L = \{0^n \mid n \ge 0\}$ , where  $\Sigma = \{0, 1\}$