

# Assignment-4

EE22BTECH11012-A.Chhatrapati

**Question 11.16.3.18)** In a non-leap year, the probability of having 53 tuesdays or 53 wednesdays is

**Solution:**

Non-leap year=365days

Since in a week 7 days are present,

365days=52weeks+1day

That 1day can be Sun,Mon,Tue,Wed,Thu,Fri,Sat

$$X = \begin{cases} 1, & \text{if that 1day is tuesday or wednesday} \\ 0, & \text{otherwise} \end{cases} \quad (1)$$

$$p_X(1) = \frac{2}{7} \quad (2)$$