Truth Table of XOR

|  |  |  |
| --- | --- | --- |
| Input X | Input Y | output |
| 0 | 0 | 0 |
| 0 | 1 | 1 |
| 1 | 0 | 1 |
| 1 | 1 | 0 |

Xor is not a linear function therefore we can not train single perceptron with sigle layer so we need multiple layers