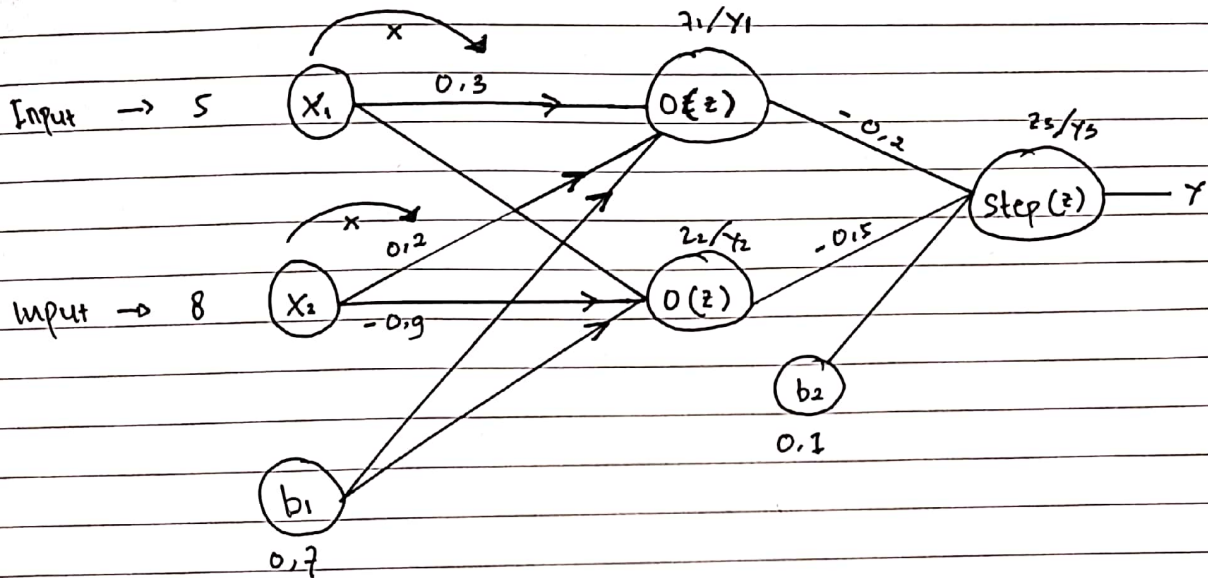


Exercise 1



Penyelesaian

$$\begin{aligned} z_1 &= (5)(0.3) + (8)(0.2) + 0.7 \\ &= 1.5 + 1.6 + 0.7 \\ &= 3.8 \end{aligned}$$

$$\begin{aligned} z_2 &= (8)(0.9) + 0.7 \\ &= 7.2 + 0.7 \\ &= 7.9 \end{aligned}$$

$$\begin{aligned} y_1 &= \text{sigmoid}(z_1) \\ &= \frac{1}{1 + e^{-3.8}} = 0.978 \end{aligned}$$

$$\begin{aligned} y_2 &= \text{sigmoid}(z_2) \\ &= \frac{1}{1 + e^{-7.9}} = 0.999 \end{aligned}$$

$$\begin{aligned} z_3 &= (0.978)(-0.2) + (0.999)(-0.5) + 0.1 \\ &= -0.1956 + (-0.4995) + 0.1 \\ &= -1.2951 + 0.1 \\ &= -1.1951 \end{aligned}$$

$$\begin{aligned} z_3 &= z \leq 0 \\ \text{Maka } y_3 &= 0 \end{aligned}$$

Data ke	Target	Realita.	$t - \gamma$	$(t - \gamma)^2$
1	1145	1125	20	400
2	1286	1300	-14	196
3	1867	1879	-12	144
4	1380	1391	-11	121
5	1341	1351	-10	100
6	6138	6153	-15	225
7	8912	8937	-25	625
8	4193	4205	-12	144
9	4841	4868	-27	729
10	2104	2111	-7	49
			TOTAL	2733

$$\begin{aligned}
 MSE &= \frac{\text{Total}}{\text{banyak data}} \\
 &= \frac{2733}{10} \\
 &= 273,3
 \end{aligned}$$

$$\begin{aligned}
 MSE &= \frac{1}{n} \cdot \text{total} \\
 &= \frac{1}{10} \cdot 2733 \\
 &= 273,3
 \end{aligned}$$