

# Rec verifica B

sabato 3 dicembre 2022

12:11

## CONVERSIONI

$$10110111_2 = 2^0 + 2^1 + 2^2 + 2^4 + 2^5 + 2^7 = 1 + 2 + 4 + 16 + 32 + 128 = 183$$

$$C08_{16} = 8 \cdot 16^0 + 13 \cdot 16^1 + 12 \cdot 16^2 = 3288$$

$$185 = 10111001_2$$

$$976 = 3D0_{16}$$

185	1	↑
92	0	
46	0	
23	1	
11	1	
5	1	
2	0	
1	1	

976	0	↑
61	13	
3	3	

## ARITMETICA

$$\begin{array}{r} 11001001 + 1101 = \\ \hline 11010110 \end{array}$$

$$\begin{array}{r} 11001001 - 1101 = \\ \hline 10111100 \end{array}$$

$$\begin{array}{r} 11001001 \times 1101 = \\ \hline 1111001001 \\ 111001001 \\ 11001001 \\ \hline 101000110101 \end{array}$$

$$\begin{array}{r} 11001001 \div 1101 = 1101 \\ \hline 1101 \\ \hline 1100110 \\ \hline 1101 \\ \hline 110011 \\ \hline 1101 \\ \hline 0110 \end{array}$$

## COMPLEMENTO A 2

35	1	↑
17	1	
8	0	
4	0	
2	0	

$$\begin{array}{r} 0100011 + 1011100 + 1 = \\ \hline 10000000 \end{array}$$

$$\begin{array}{c|c|c} 4 & 0 & \\ 2 & 0 & \\ 1 & 1 & \end{array} \quad \overline{10 \ 000000}$$

VIRGOLA FISSA

$$\begin{array}{cccccccccc} s & 4 & 3 & 2 & 1 & 0 & -1 & -2 & -3 & -4 & -5 \\ 1 & 0 & 0 & 0 & 1 & 0 & 0 & 1 & 1 & 0 & 1 \end{array} = 34,40625$$

$$2^1 + 2^5 = 2 + 32 = 34$$

$$2^{-2} + 2^{-3} + 2^{-5} = \frac{1}{4} + \frac{1}{8} + \frac{1}{32} = \frac{8+4+1}{32} = \frac{13}{32} = 0,40625$$

VIRGOLA MOBILE

$$1 \quad \begin{array}{cccccc} & & 2 & 1 & 0 \\ 1 & 0 & 0 & 0 & 0 & 1 & 1 & 0 \end{array} \quad 0 \dots \begin{array}{cccccc} & 8 & 7 & 6 & 5 & 4 & 3 & 2 & 1 & 0 \\ 1 & 0 & 0 & 0 & 0 & 1 & 0 & 1 & 0 \end{array}$$

$$2^1 + 2^2 = 2 + 4 = 6$$

$$2^1 + 2^3 + 2^8 = 2 + 8 + 256 = 266$$

$$-266 \cdot 2^{-6}$$