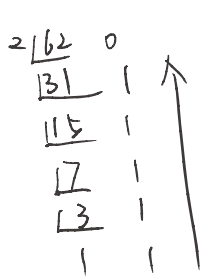
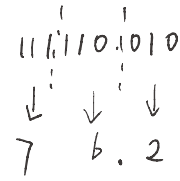
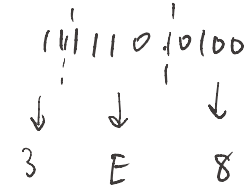
数系作业1

6. $(62.25)_{10} \rightarrow (?)_2 \rightarrow (?)_8 \rightarrow (?)_{16}$





76.2



3E.8

而 $0.25 = 2^{-2}$

$\therefore (62.25)_{10} = (111110.01)_2 = (76.2)_8 = (3E.8)_{16}$

7. $-54 = (10110110)_2$. $-30 = (10011110)_2$

$\therefore -54 = [11001010]_{补}$,

$-30 = [11100010]_{补}$

$-54 + -30 = [10101100]_{补}$ (丢符号位进位).

$= (1\,1010100)_2 = -(64+16+4) = -84$.

8.
$$\begin{array}{r} 08D \\ +\ 03F \\ \hline 0CC \end{array}$$

10 $(10000110)_{8421}$，$(10100100)_{余3码}$

$=2^7+2^2+2^1$

$=134$

$(10100100)_{8421}$

$=2^7+2^5+2^2$

$=128+32+4=164.$

则$(10100100)_{余3}$

$=164-3=161.$

11 1 1 0 1 0 0 0 1

⊕ ⊕ ⊕ ⊕ ⊕ ⊕ ⊕

1 0 1 1 1 0 0 1

14 (+1011)，(−1011)，(+0.0011)，(−0.0011)

原	01011	11011	0.0011	1.0011
反	01011	10100	0.0011	1.1100
补	01011	10101	0.0011	1.1101

19 (1) 10111001 ✗

(2) 01101010 ✓

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