№3.

а) $A = \{ n \mid n = 10^k, 0 \le k \le 2 \}$

б) $A = \{ n \mid (n > 5) \wedge (n \in \mathbb{Z}) \}$

в) $A = \{ n \mid (n < 5) \wedge (n \in \mathbb{N}) \}$

2) $A = \varnothing$

№4.

а) $A \setminus (A \setminus B) = A \cap B$

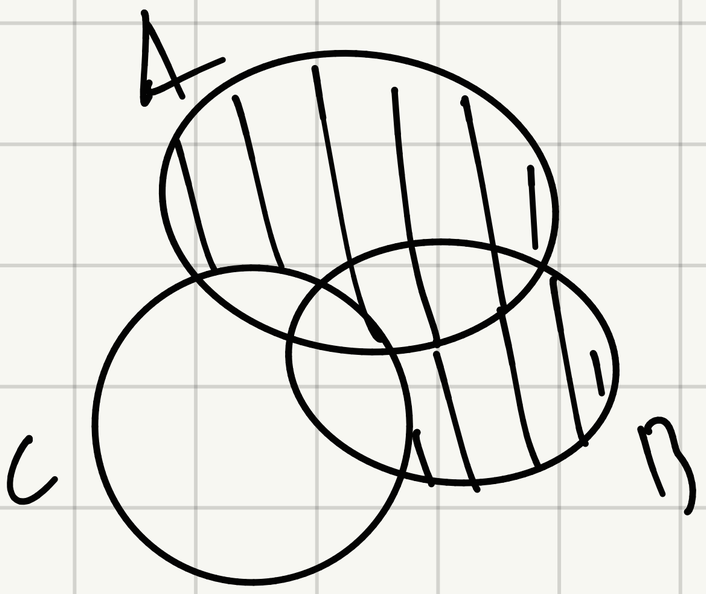
...

б) $(a \vee b) \wedge \overline{(a \wedge b)} = (a \wedge \bar{b}) \vee (b \wedge \bar{a})$

$(a \vee b) \wedge (\bar{a} \vee \bar{b})$

$a \wedge \bar{a} \vee a \wedge \bar{b} \vee$

2) $(A \cup B) \setminus C = (A \setminus C) \cup (B \setminus C)$



$$(A \vee B) \wedge \bar{C} = A \wedge \bar{C} \vee B \wedge \bar{C}$$

№6

$$A \wedge B \subseteq C \setminus (A \cup B)$$

$$(X \in (A \cap B)) \rightarrow (X \in (C \cap (\overline{A \cup B})))$$

$$(a \wedge b) \rightarrow (c \wedge \overline{a \vee b})$$

$$\overline{a \wedge b} \vee c \wedge \bar{a} \wedge \bar{b}$$

$$\bar{a} \vee \bar{b} \vee c \wedge \bar{a} \wedge \bar{b}$$

$$\overline{(a \wedge b)} \vee (c \wedge \overline{(a \vee b)})$$

$$(\bar{a} \vee \bar{b}) \vee (c \wedge (\overline{a \vee b}))$$