

Sisteme de ecuatii in Z_n

$$ex: \begin{cases} 1. x + \hat{3}y + z = \hat{0} \\ 2. x + y + \hat{2}z = \hat{4} \\ 3. \hat{2}x + \hat{3}y + \hat{2}z = \hat{0} \end{cases} \quad \mathbb{Z}_5$$

$$\Delta = \begin{vmatrix} \hat{1} & \hat{3} & \hat{1} \\ \hat{1} & \hat{1} & \hat{2} \\ \hat{2} & \hat{3} & \hat{2} \end{vmatrix} = a \quad , \quad \text{daca } \Delta \text{ este inversabil}$$

$$\Delta_x = \begin{vmatrix} \hat{0} & \hat{3} & \hat{1} \\ \hat{4} & \hat{1} & \hat{2} \\ \hat{0} & \hat{3} & \hat{2} \end{vmatrix} = c \quad , \quad x = c * a^{-1}$$

$$\Delta_y = \dots$$

$$\Delta_z = \dots$$