$$A = \begin{pmatrix} 4 & -5 & 2 \\ 5 & -7 & 3 \\ 6 & -9 & 4 \end{pmatrix}$$

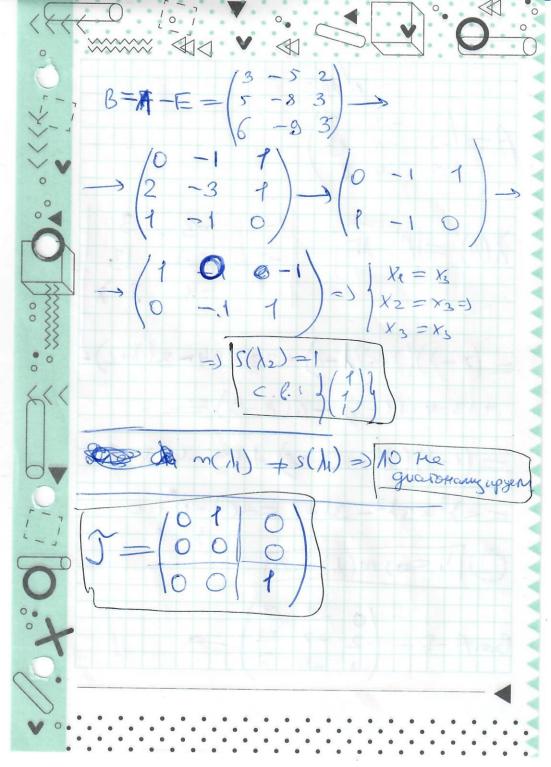
$$= \begin{pmatrix} 4 & -5 & 2 \\ 5 & -7 & 3 \\ 6 & -9 & 4 \end{pmatrix}$$

$$= \begin{pmatrix} 4 & -1/2 \\ 5 & -7 & -1/2 \\ 6 & -9 & 4 \end{pmatrix}$$

$$= \begin{pmatrix} 4 & -1/2 \\ 5 & -7 & -1/2 \\ 6 & -9 & 4 \end{pmatrix}$$

$$= \begin{pmatrix} 4 & -1/2 \\ -1/2$$

1.



0

*°

$$= -\lambda^{3} + 3\lambda^{2} - 3\lambda + 1 = -(\lambda - 1)^{3} = 0$$

$$\lambda = 1$$

$$\lambda = 1$$

$$B = A - E = \begin{pmatrix} 0 & -3 & 3 \\ -2 & -7 & 13 \\ -1 & -4 & 7 \end{pmatrix}$$

N1470

$$\begin{cases} (\lambda - 1)(\lambda + 10)(-\lambda + 1 + 10) - 360 \\ = (\lambda - 1)(\lambda + 10)(19 - \lambda) - 360 \\ = (\lambda - 1)(368 - \lambda^2 - 360) = (\lambda - 1)(1 - \lambda)(1 + 1) = 0 \\ = (\lambda - 1)^2(\lambda + 1) = 0 \\ \lambda_1 = 1 \\ \lambda_2 = -1 \end{cases}$$

$$\begin{cases} (\lambda - 1)(\lambda + 10)(19 - \lambda) - 360 \\ = (\lambda - 1)(\lambda - \lambda)(1 + 1) = 0 \\ \lambda_1 = 1 \\ \lambda_2 = -1 \end{cases}$$

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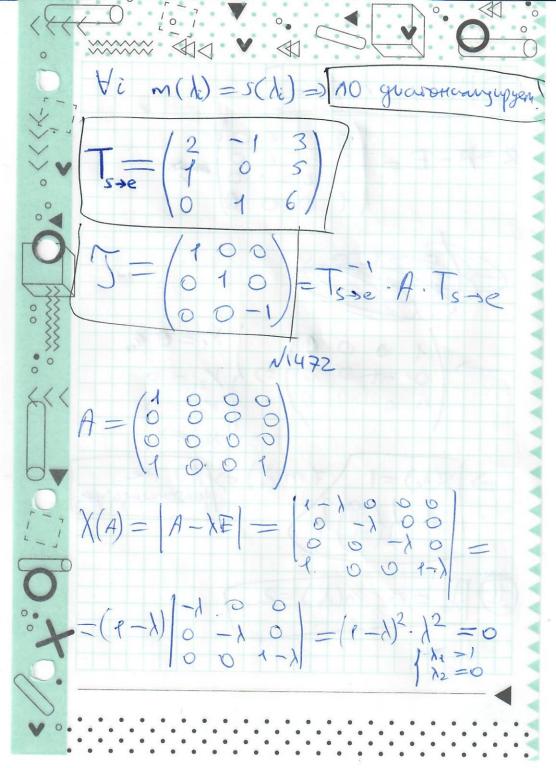
$$\begin{cases} (\lambda - 1)(\lambda - \lambda)(1 + 1) = 0 \\ \lambda_1 = 1 \\ \lambda_2 = -1 \end{cases}$$

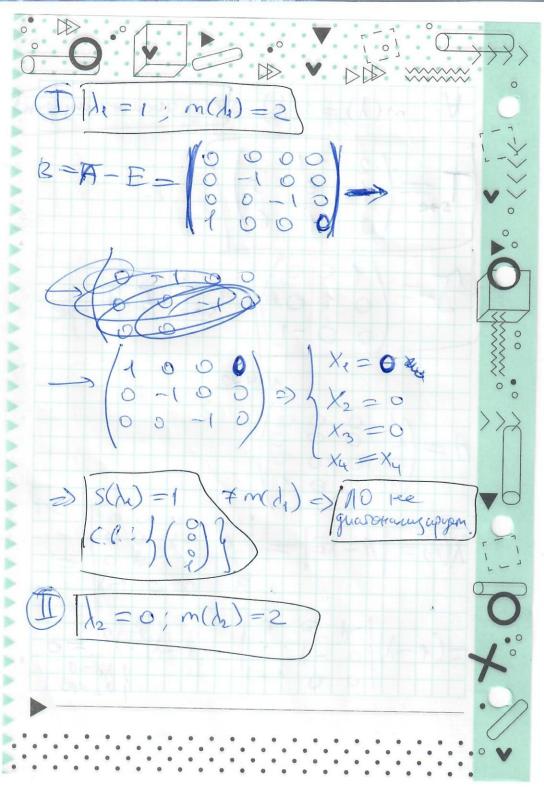
$$\begin{cases} (\lambda - 1)(\lambda - \lambda)(1 + 1) = 0 \\ \lambda_1 = 1 \\ \lambda_2 = -1 \end{cases}$$

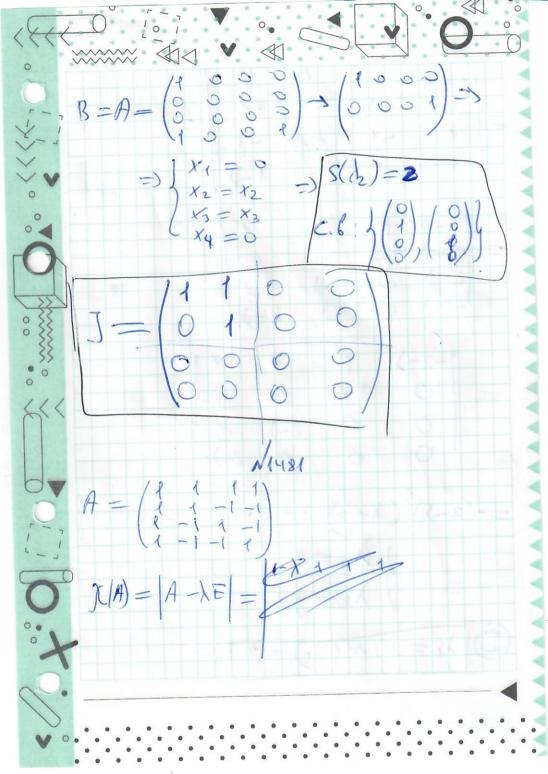
$$\begin{cases} (\lambda - 1)(\lambda - \lambda)(1 + 1) = 0 \\ \lambda_1 = 1 \\ \lambda_2 = -1 \end{cases}$$

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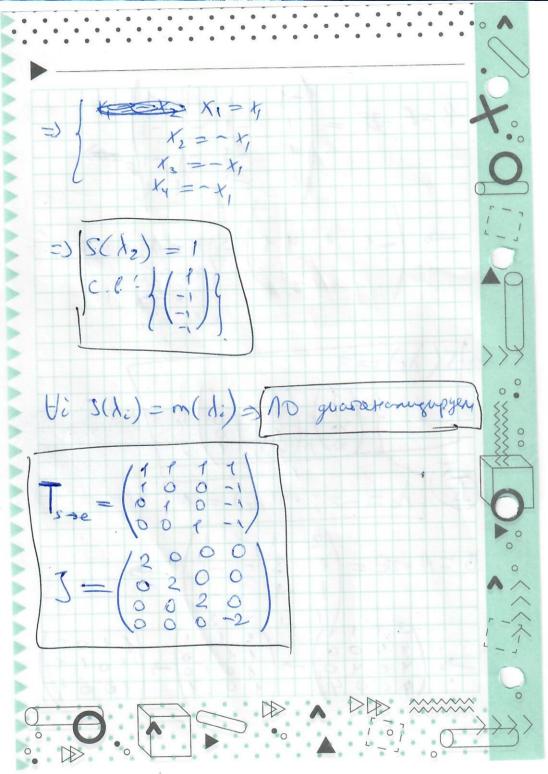
$$\begin{cases} (\lambda - 1)(\lambda - \lambda)(1 + \lambda$$

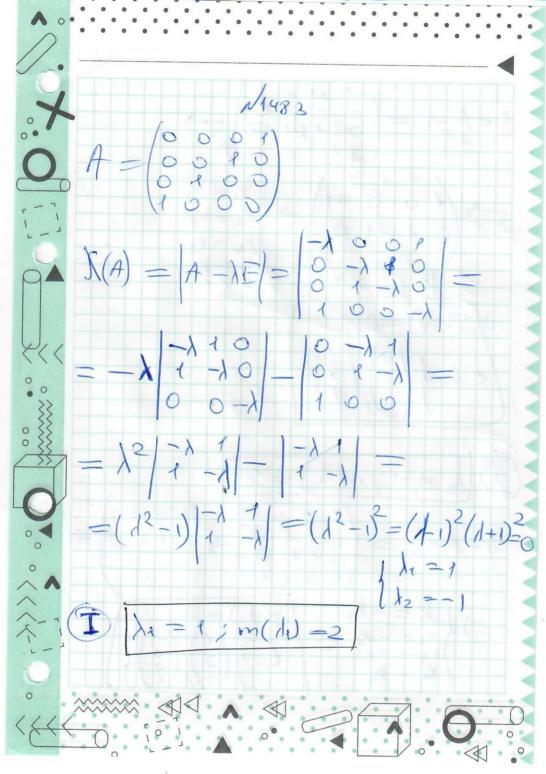


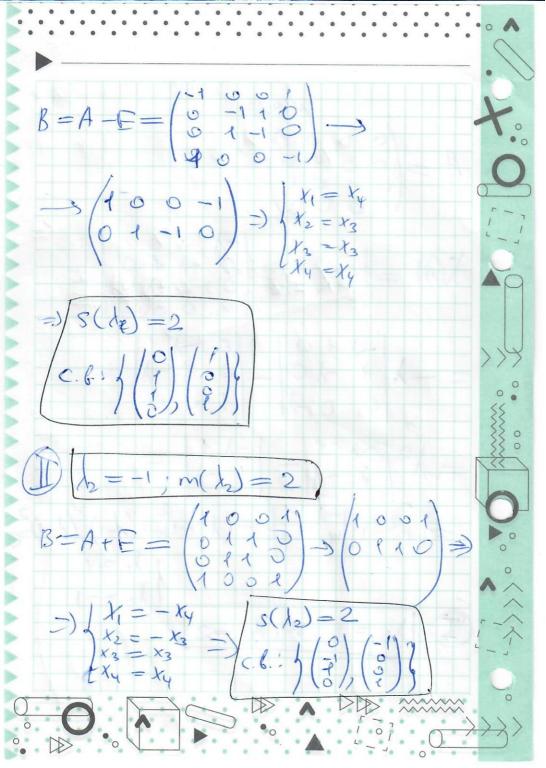


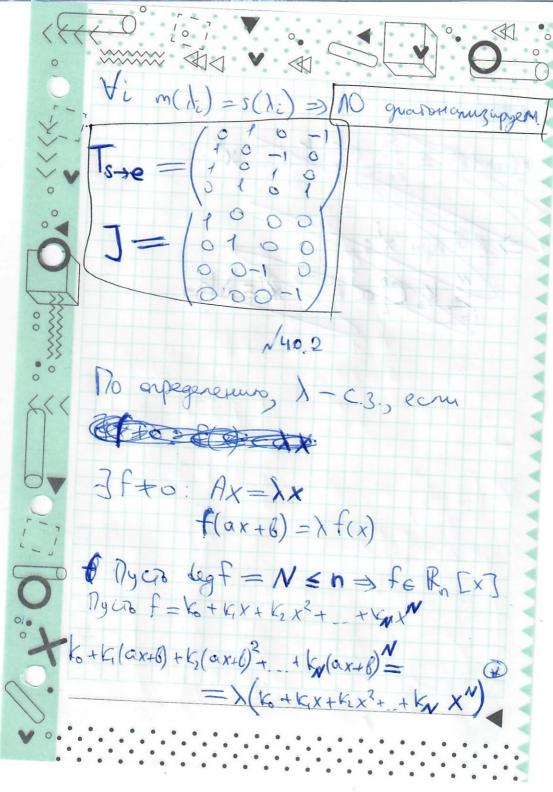


A-2F = 2+ 13+ Kg $\begin{pmatrix} 1 \\ 0 \\ 1 \end{pmatrix} \begin{pmatrix} 1 \\ 0 \\ 0 \\ 1 \end{pmatrix}$ 3111 1100

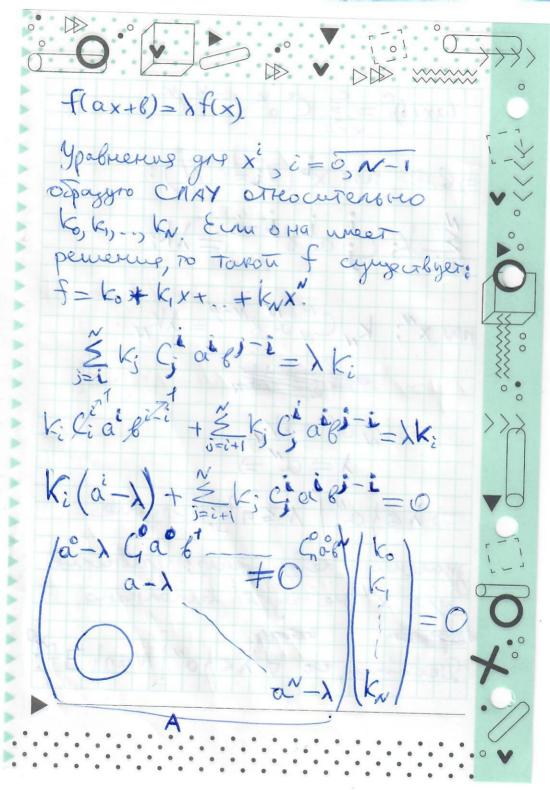


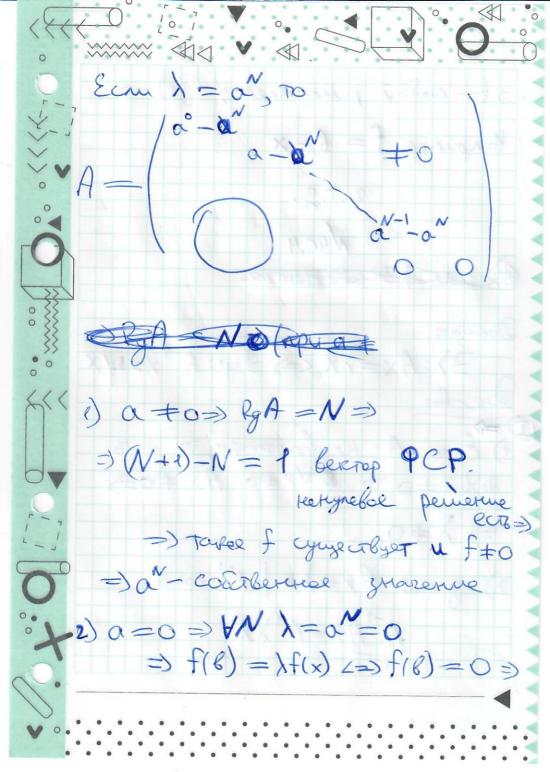


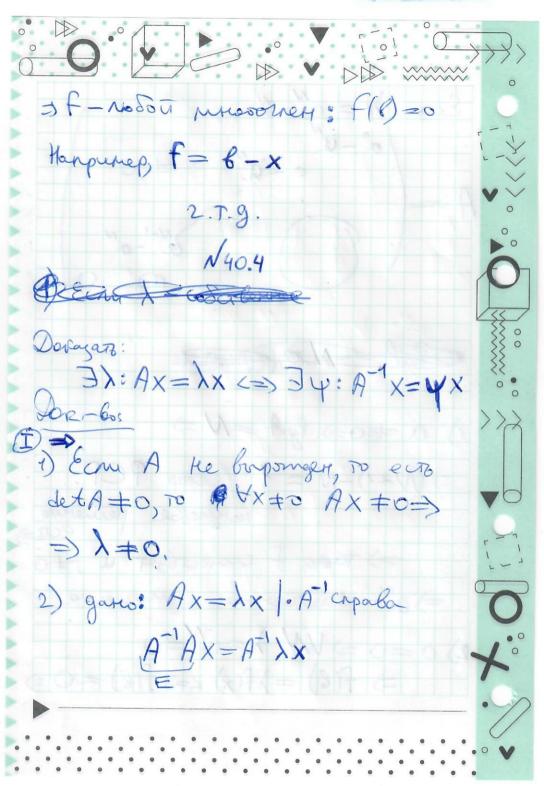




· (ax+6) = & Crak pc-kxk =) & @ hpu xi (Vi= 3N): = k; Ciabbi-i= \ki noux": KNCNOBN-N= XKN STATE => k, a"= \ k, $\lambda = \alpha' \Rightarrow$ =) \con \ N & n \ Dpyone o grs X" He Syget bononners. Decomen, un VXEJaN NEny 3 F.







 $X = A^{-1} \lambda X$ $X = \chi(A^{-1}X) \cdot \frac{\chi}{2}$ $\frac{1}{\lambda}X = A^{-1}X$ $A^{-1}X = \frac{1}{\lambda}X$ 0 $\psi = \frac{1}{\lambda}$. T.k. $\lambda \neq 0$ no t XY = YE XY A X = YX - Take y How gers Princerum @ grs A-1; $\nabla = X = X \Rightarrow \exists \psi : (A^{-1})^{-1} X = \psi X$ $A : A' x = \lambda x \Rightarrow \exists y : A x = y x$