

```

commandwindow
clear
clc
A = [2, 3, 7, 9, 4; 3, 7, 9, 12, 5; 4, 8, 5, 6, 9; 5, 9, 2, 4, 5;
     6, 2, 3, 7, 8]
D = det(A)
T = transpose(A)
I = inv(A)
syms w x y z
eqn1 = 10*x+4*y-2*z == -4;
eqn2 = -3*w-17*x+y+2*z == 2;
eqn3 = w+x+y == 6;
eqn4 = 8*w-34*x+16*y-10*z == 4;
[G,B] = equationsToMatrix([eqn1, eqn2, eqn3, eqn4], [w, x, y, z])
ANS = linsolve(G,B)

```

SOLUTIONS

A =

2	3	7	9	4
3	7	9	12	5
4	8	5	6	9
5	9	2	4	5
6	2	3	7	8

D =

-765.0000

T =

2	3	4	5	6
3	7	8	9	2
7	9	5	2	3
9	12	6	4	7
4	5	9	5	8

I =

1.8915	-1.4026	-0.3124	0.7843	-0.2078
-0.4379	0.3268	0.0523	-0.0392	-0.0196
2.5725	-1.8392	-0.0863	0.7647	-0.5176
-1.8876	1.4654	0.0105	-0.6078	0.3961
-0.6222	0.3778	0.2444	-0.3333	0.1333

G =

[0, 10, 4, -2]

$\begin{bmatrix} -3 & -17 & 1 & 2 \\ 1 & 1 & 1 & 0 \\ 8 & -34 & 16 & -10 \end{bmatrix}$

B =

$\begin{bmatrix} -4 \\ 2 \\ 6 \\ 4 \end{bmatrix}$

ANS =

$\begin{bmatrix} 4 \\ 0 \\ 2 \\ 6 \end{bmatrix}$