SHAKUNTALA KRISHANA INSTITUTE OF TECHNOLOGY KD-64

ASSIGNMENT (UNIT-1)

Business math

Q1.

If $A=\begin{pmatrix}1 & 2 & 3\\ 4 & 5 & 6\\ 7 & 8 & 9\end{pmatrix}$, $B=\begin{pmatrix}1 & 7 & 0\\ 1 & 3 & 1\\ 2 & 4 & 0\end{pmatrix}$, find $A+B$.

Q2. Find the adjoint of the matrix:

$$\begin{bmatrix}1 & -1 & 2\\ 4 & 0 & 6\\ 0 & 1 & -1\end{bmatrix}$$

Q3.Explain of Diagonal and identity matrix with example.

Q4.write some point to use of matrix in business.

Q5.write the formula of inverse of matrix with example a 2*2 matrix.

Q6.find the rank of a matrix 3*3:

$$A=\begin{bmatrix}1 & 2 & 3\\ 4 & 5 & 6\\ 7 & 8 & 9\end{bmatrix}$$

Q7.write down the types of matrix with example.

Q8.Solution to a system of equation by the ad-joint matrix methods.

$$2x+4y-10z=-2\ ,3x+9y-21z=0,x+5y-12z=1$$

Q9. Solution to a system of equation by the Guassian Elimination Method.

$$x+2y-z=3,\ 2x-y+2z=6,\ x-3y+3z=4$$

: Q10.what do you mean by square matrix with example.

Q11.find the multiplication of Matrix:

$$M = \begin{vmatrix} 1 & 2 & 3 \\ 4 & 5 & 6 \end{vmatrix} \text{ and } N = \begin{vmatrix} 7 & 8 \\ 9 & 10 \\ 11 & 12 \end{vmatrix}$$

Q12.what are the difference between identity and Diagonal Matrix.

Q13.Explain Lower triangular and Upper triangular Matrix with example.

Q14.Explian the scalar and null matrix with Example.

Q15.Find the inverse of Matrix:

$$A = \begin{bmatrix} 1 & 2 & 3 \\ 4 & 5 & 6 \\ 7 & 8 & 9 \end{bmatrix}$$