

b. Square DT signal

```
clc;
clear all;
close all;
N = input('Enter the number of Samples:');
n = 0:0.1:N;
s = square(2*n);
stem (n,s);
xlabel ('time');
ylabel ('amplitude');
title ('square wave')
grid on;
```

This code asks the user to input the number of samples (**N**), creates a time vector (**n**) from 0 to **N** with a step size of 0.1, generates a square wave (**s**) using the `square()` function with a frequency of 2, and finally plots the square wave using `stem()`. Labels and titles are added to the plot for clarity, and the grid is turned on to assist with visualization.