**Instruction on how to run the App**

About the solution

The solution is composed of two projects

* ToyRobot.App (Console Application in C#) 🡪 This is the main code that handles the simulation of toyrobot movement.
* ToyRobot.Test (Standard .net framework class library in C#) 🡪 This is the class library that is used to run Unit Testing.
* FYI: I used Dictionary and Reflection in some part of the code to avoid using several switch and/or if else ladder.

Running the unit test

How to run the unit test?

The easiest way to run unit test is by simply right clicking the ToyRobot.Test and select Run Test from the context menu.

For your reference you may watch this video.



If the menu did not appear then you must open the Test Explorer by going to Test > Test Explorer

A screenshot of a computer

Description automatically generated with medium confidence

Running the actual App

In running the actual app there are two options that you can use in order to validate the output based on the input commands.

* Manual Typing series of commands.
* By calling a text file that contains the series of command.

The program will prompt you to answer whether you would like to run from a text file

“Would you like to process from text file? (Y/N)”

For manual simply choose N or n

For running from text file simply choose Y or y

NOTE: Other keys will be ignored, meaning it will wait until Y/y or N/n is pressed.

For manual

You will need to enter each command and terminate each command by pressing enter. To view the result you will need to type in REPORT and press enter.

You can watch this video for reference



NOTE: There had been some modification in the code since this video was created but the process is still the same.

Testing from file

After pressing Y or y you will be prompted to type the path and filename of the file.

Example:

I have this file inside my C:\temp folder



Therefore, all I need to do is simply type in the complete path as the app prompts me to Input the filename.

“Please enter filepath and filename:” C:\temp\sample.txt

Once you press enter the result will be shown.

You can watch this video for your reference



Unit testing and app testing are all working as expected. I also have tried all the Use Case in the document you have provided, and all use case did pass.