

## CCR Simulator User Manual

Jack Ward

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Version 1

\*\*\*\*\*Table of Contents\*\*\*\*\*

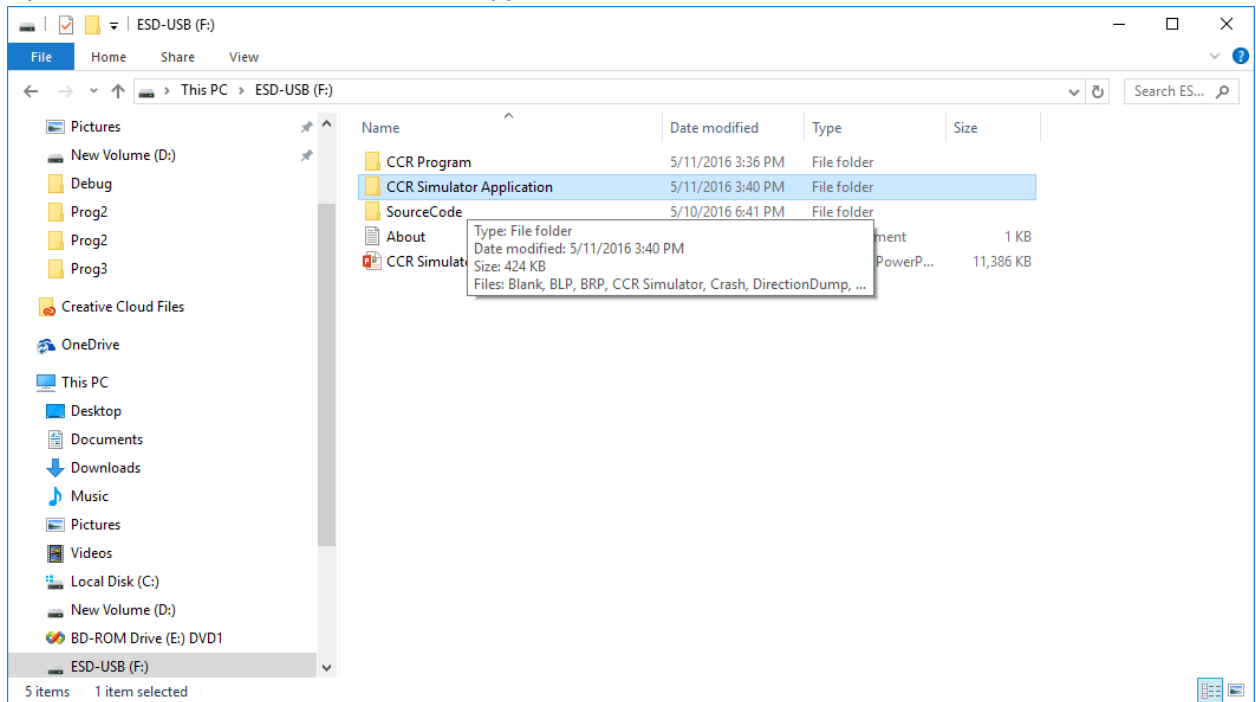
<u>Page Number</u>	<u>Content</u>
Page 1	Opening The Application
Page 2	Creating a Track
Page 3	Creating Turnouts
Page 4	Creating Turnouts (Continued...)
Page 5	New/Save/SaveAs/Open/Exit
Page 6	New/Save/SaveAs/Open/Exit (Continued...)
Page 7	Running the Simulator
Page 7.5	Adding and Removing Trains
Page 8	Adding and Removing Trains (Continued...)
Page 8.5	Controlling Trains
Page 9	Flipping Turnout Switches

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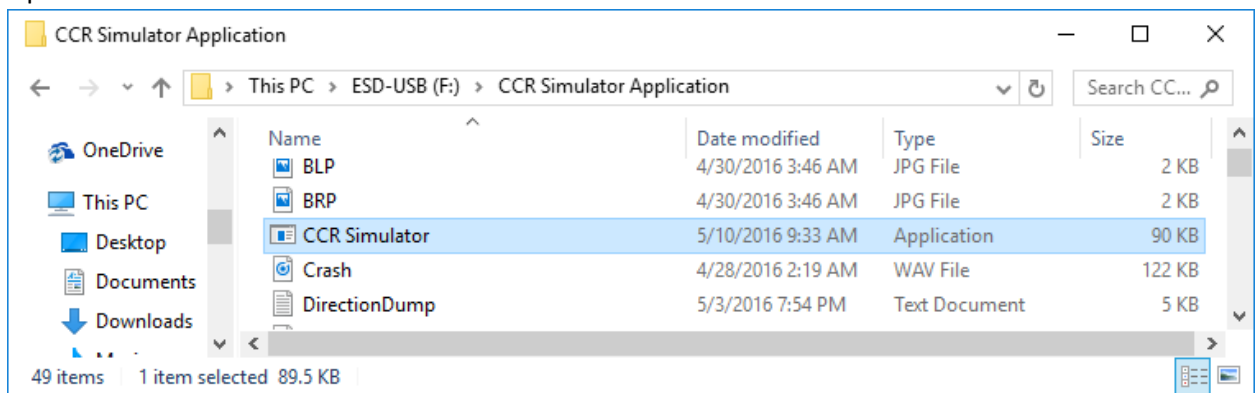
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## Opening The Application

- 1) Open the folder labeled CCR Simulator Application.

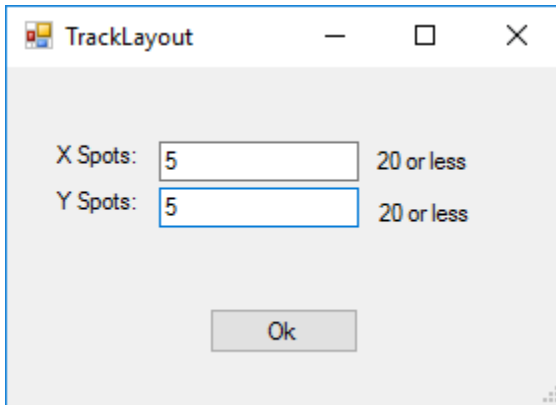


- 2) Open the file called CCR Simulator.exe

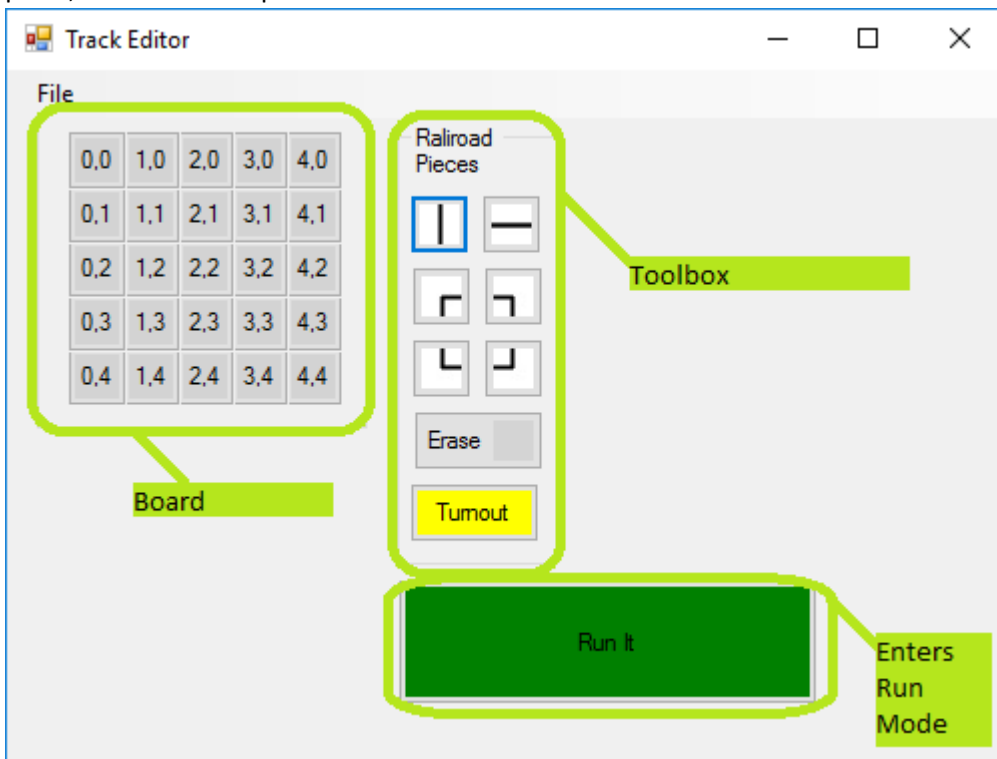


## Creating A Track

- 1) Type the Desired Track Size into the two text boxes. (keep the size under 20)
- 2) When finished, click OK



- 3) This is the Track Editor Screen. To create a track, select a track piece from the box Toolbox labeled "Railroad Pieces", then click on a spot on the board to the left. If you want to change piece, select another piece from the Toolbox.

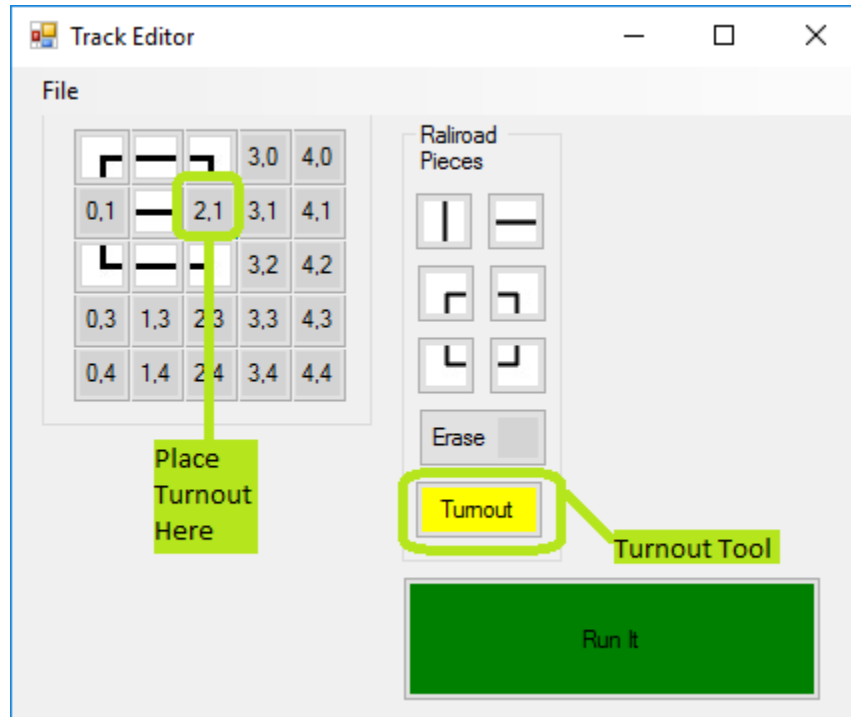


The pieces can be written over by a new piece. They can also be erased. To Erase a piece, click the Eraser Tool, and then click the spot on the Board that contains the Track Piece you wish to remove.

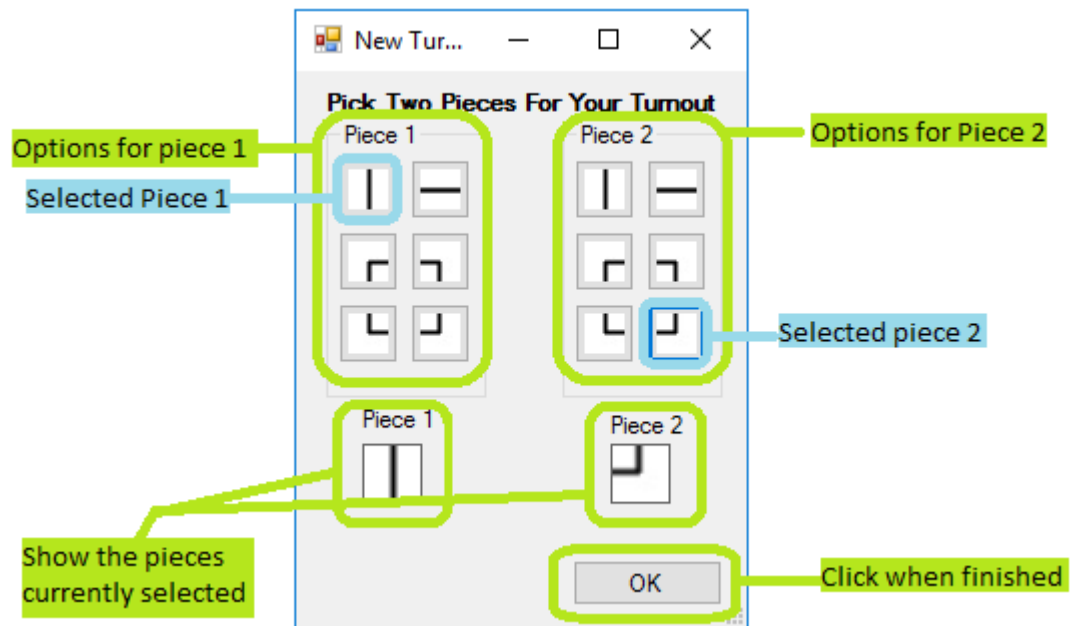


## Creating Turnouts

- a. Click the Turnout Tool in the Toolbox. Then click on the location on the board where you wish to place the turnout.

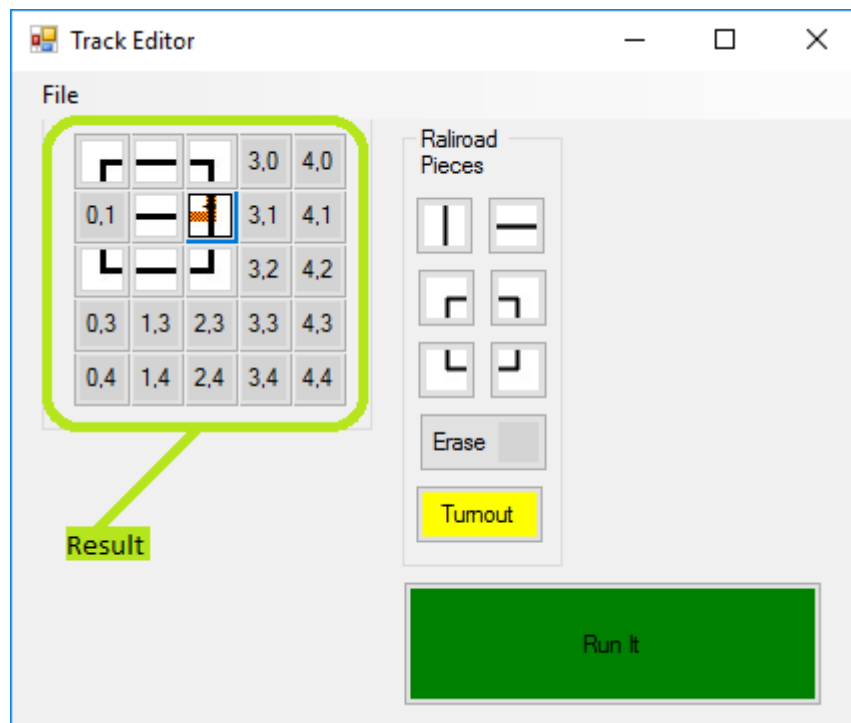


- b. A selection menu will pop up. Select the two options you want the turnout to have and click ok.



(Selection Menu)

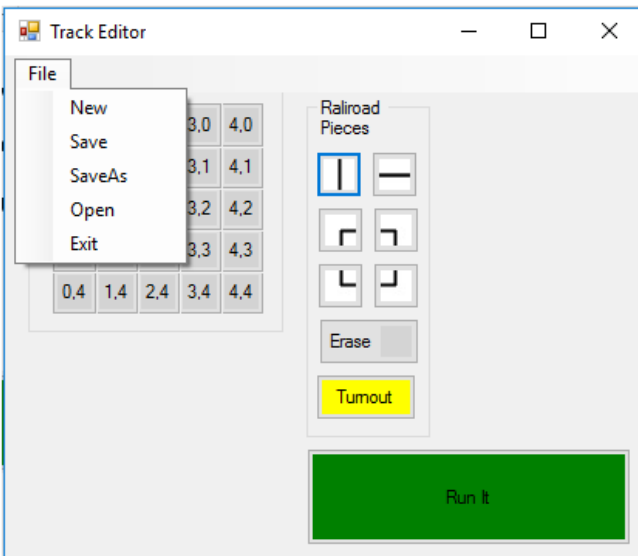
### Creating Turnouts (Continued...)



(Result of Turnout Select)

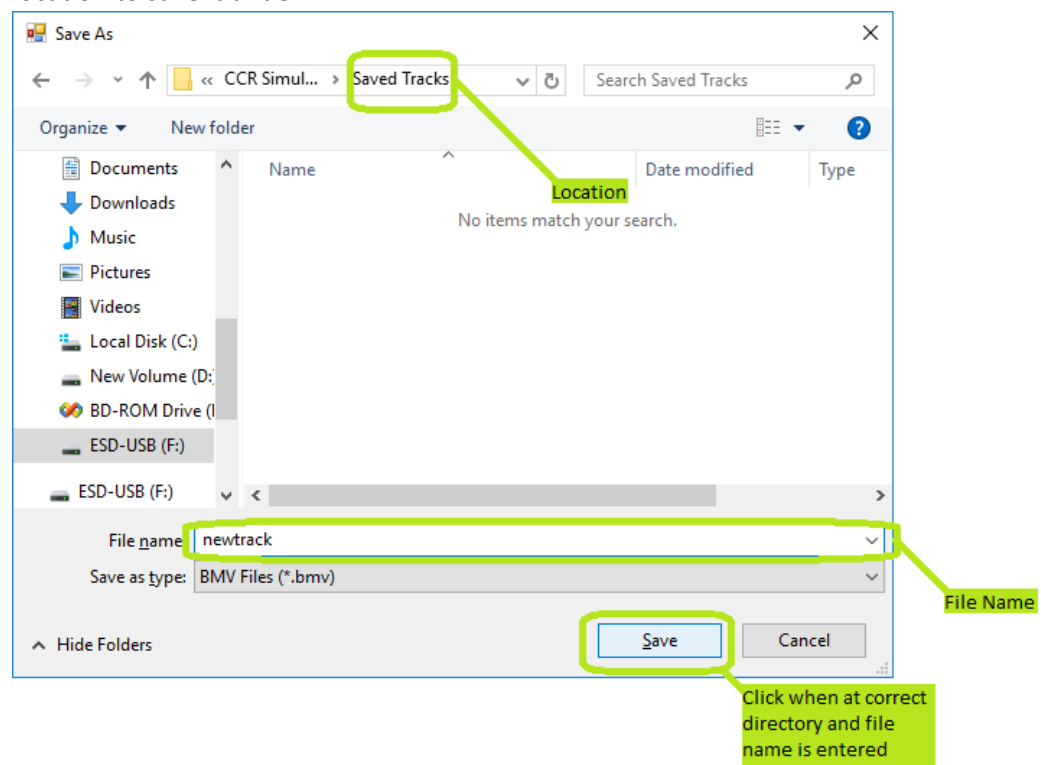
- c. WARNING – This program does not handle double reverse loops!  
(Refer to Exceptions.PDF to read about double reverse loops and other exceptions)

## New/Save/SaveAs/Open/Exit



Follow the instructions below to save, open, and create new track layouts.

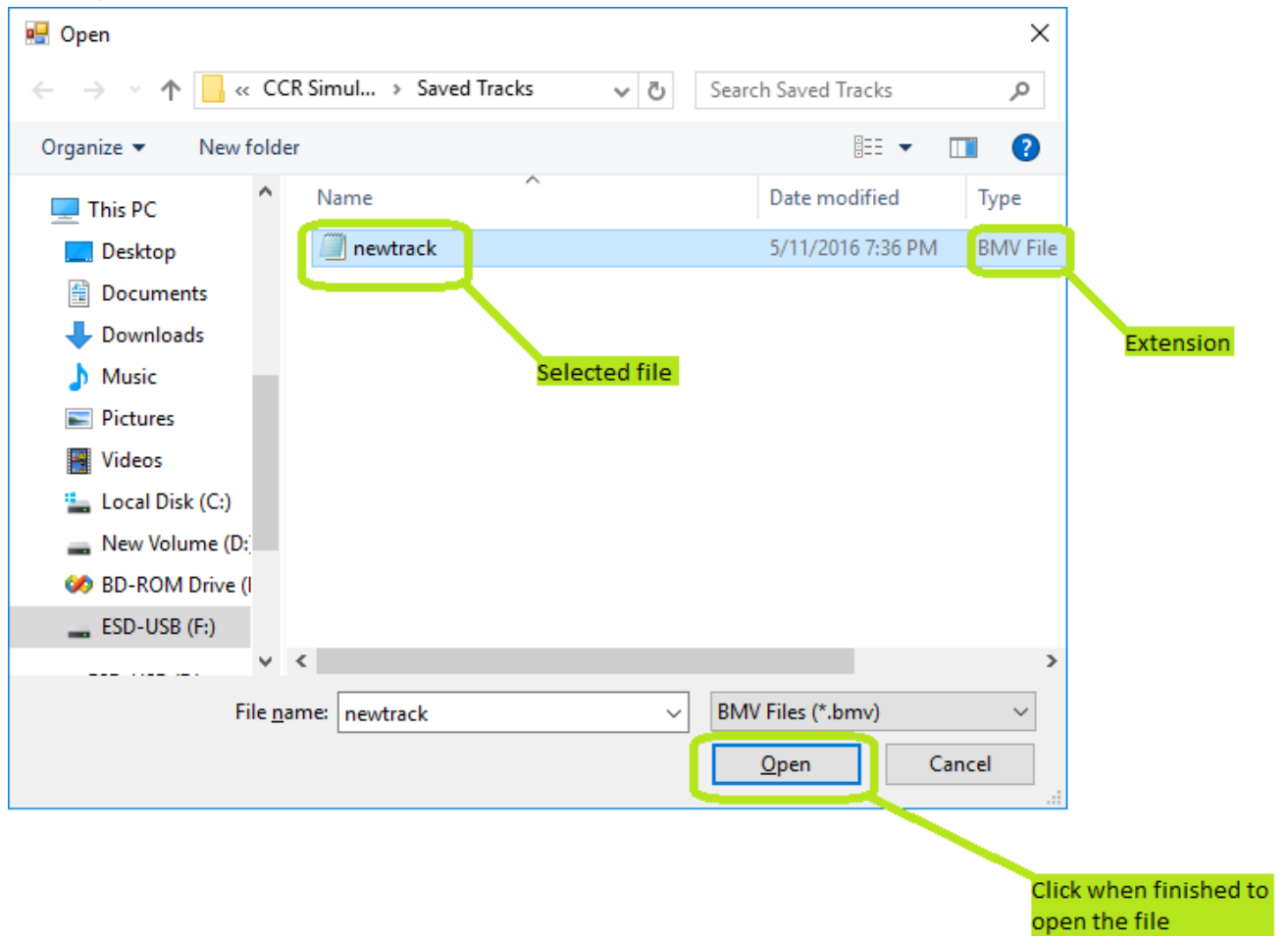
- 1) To open a new track layout, click File, and select **New**. Then enter the size of the track.  
(See Creating a track Page 2)
- 2) To save document, click File in the upper right hand corner of the Track Editor, and select **Save**.
  - a. If the document has never been saved, you will be prompted to Give it a name and location to save it under.



- b. If the document has been saved before, the old version will be saved over.
- 3) To save a document under a new name, click File, and select **SaveAs**. (See picture above in New/Save/SaveAs/Open/Exit (2-a) **Save**)

### New/Save/SaveAs/Open/Exit (Continued...)

- 4) To open an existing document, click File, and select **Open**. Then find the file you wish to open, select it, and click ok. Make sure the file extension is “.BMV”.



- 5) To exit the program, click File, and select Exit, or just click the X in the top right hand corner.

## Running the Simulator

To run the simulator, follow the steps below.

- 1) While in Edit Mode, if the track is ready, click the button labeled “Run It”



(Run Button)

- 2) Add trains to the track (See Adding Trains on Page 7.5).
- 3) While in Run Mode click the green Ready Button to enable controls.



(Ready Button)

- 4) Once you have done this, the Add Train menu item will be disabled until the red Stop Trains Button is clicked.

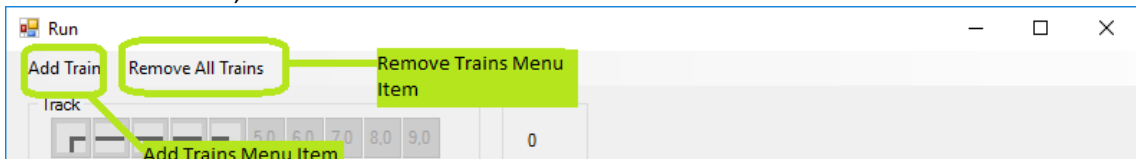


(Stop Trains Button)

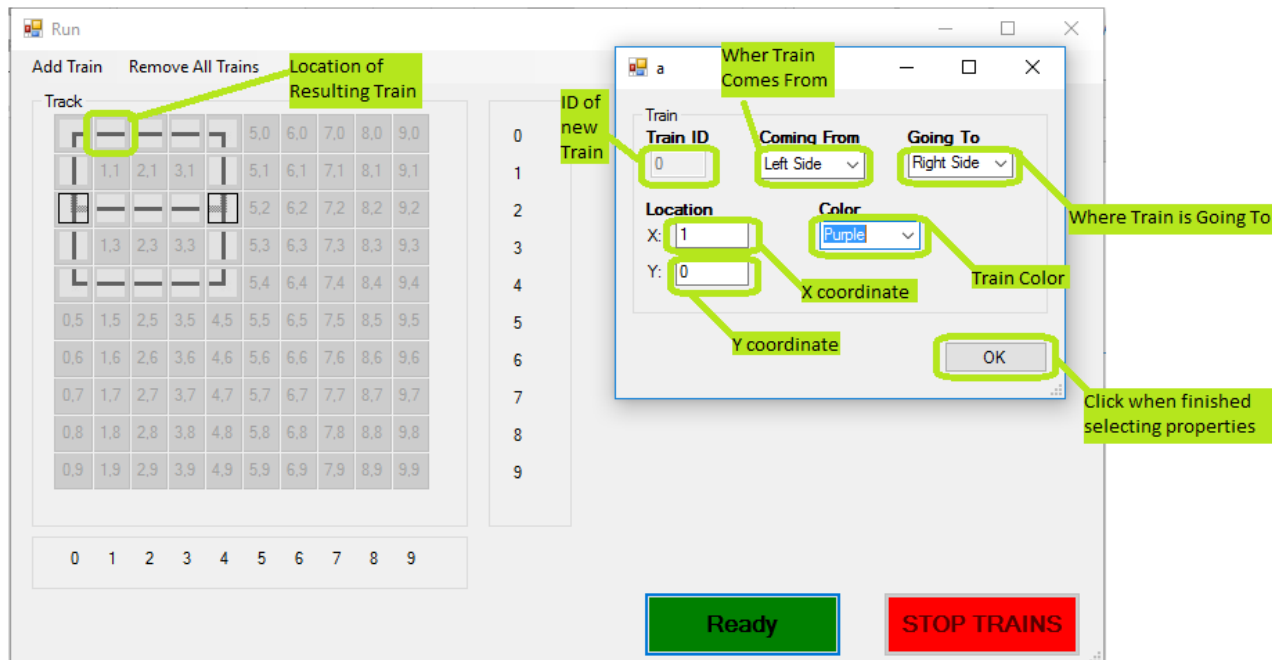
## Adding and Removing Trains

To Add Trains to the track, follow the steps below.

- 1) While in Run Mode, click on the Add Train menu item.



- 2) Enter the information for the new train into the form.
  - a. Enter the trains location into the x and y coordinate boxes.
  - b. Select a color for the train
  - c. Select where the train is going to and where it would have come from, if it were going clockwise around the track.



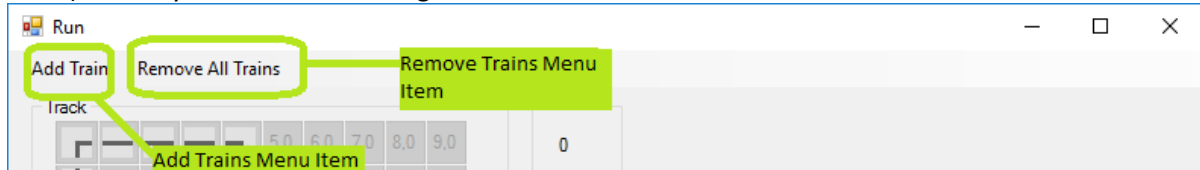
- d. Click OK when finished



### Adding and Removing Trains (Continued...)

To Remove Trains from the track, follow the steps below.

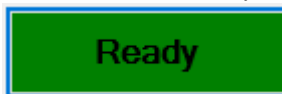
- 1) While in Run Mode, Click the Remove All Trains Menu Item
- 2) Hurray! Your trains are all gone now



### Controlling Trains

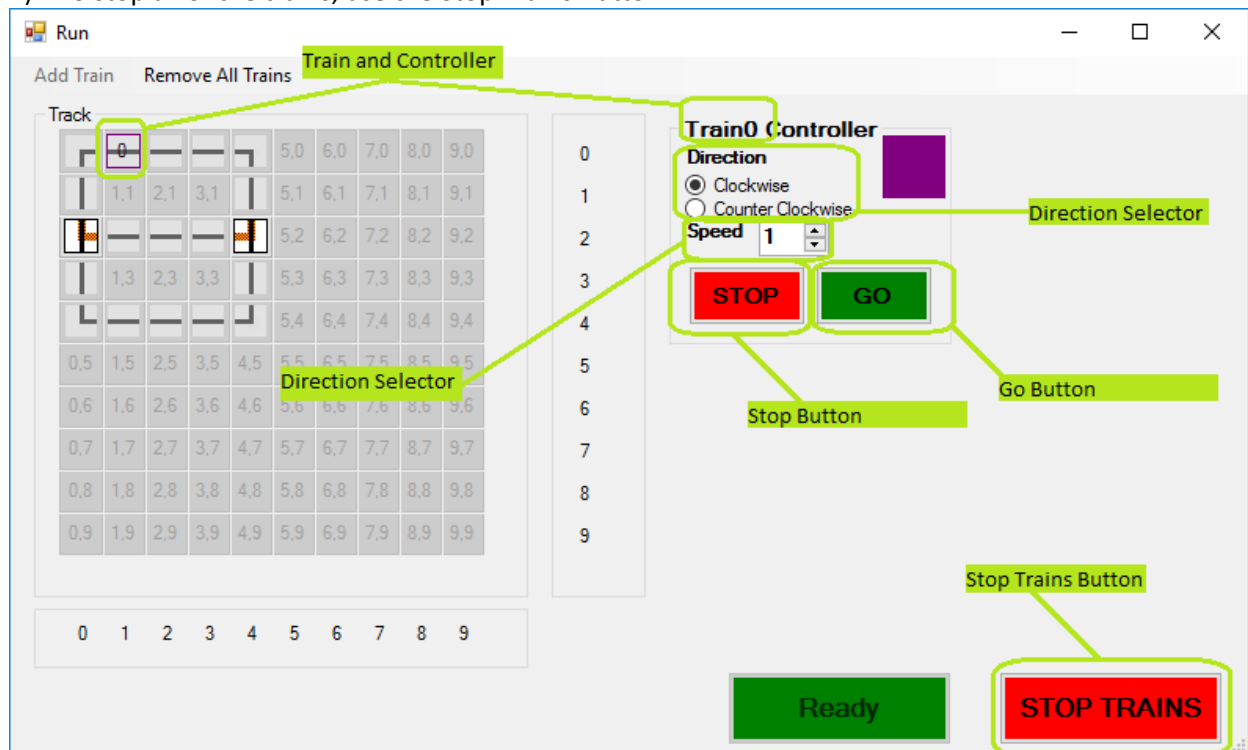
To control the trains, follow the steps below.

- 1) Make sure the Ready Button is clicked.



(Ready Button)

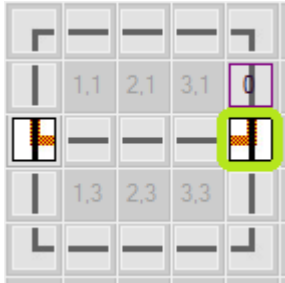
- 2) Make sure you have trains on the track
- 3) Use the find the controller associated with the train you wish to control
  - a. The highlighted track piece indicates where your train is.
  - b. The id number of the train is on the highlighted piece and the train's controller.
- 4) To increase the speed, use the speed selector
- 5) To change direction, use the Direction Selector
- 6) To stop or start the train, use the Stop Button or Go Button
- 7) To stop all of the trains, use the Stop Trains Button



### Flipping Turnout Switches

To switch a turnout, simply click it while in Run Mode (To find how to get to run mode, see Running the Simulator Page 7).

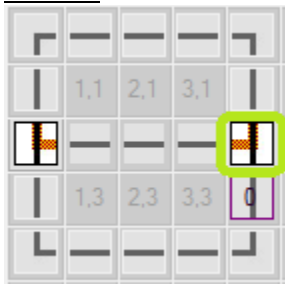
The train is indicated by the purple highlighted square.



If the turnout below the train is not clicked, it will remain the same (See Result 1).

If the turnout below the train is clicked, it will switch to the alternate option (See Result 2).

#### Result 1



#### Result 2

