How to Run Program: Open the sln file, navigate to the main file and run the program. Follow the prompts and enter integers for every menu prompt. For the infix prompt you may enter alphabetic characters as well as numeric characters. For every other prompt, it is required that you enter integers.

Output: Goes left image, then right, then next page

```
Welcome to Assignment 3
                                                      Welcome to the Queue
1. Expression Manager
                                                     1. Enter an item into the queue
2. Queue
                                                      2. Remove item from queue
3. Quit
                                                      3. Print first item in queue
What part of the assignment would you like to do? 1
                                                     4. Check if Queue is empty
Please enter an infix expression: A + B * C
                                                      5. Get size of Queue
Postfix expression: ABC*+
                                                     6. Quit
                                                     What would you like to do? 5
Welcome to Assignment 3
                                                      The size of the queue is 4 element(s)
1. Expression Manager
2. Queue
                                                     Welcome to the Queue
3. Quit
                                                      1. Enter an item into the queue
What part of the assignment would you like to do? 2
                                                     2. Remove item from queue
                                                     3. Print first item in queue
Welcome to the Queue
1. Enter an item into the queue
                                                     4. Check if Queue is empty
2. Remove item from queue
                                                     5. Get size of Queue
3. Print first item in queue
                                                     6. Quit
4. Check if Queue is empty
                                                     What would you like to do? 3
5. Get size of Queue
                                                     Front Item: 1
6. Ouit
What would you like to do? 4
                                                     Welcome to the Queue
Queue is empty
                                                     1. Enter an item into the queue
                                                     2. Remove item from queue
Welcome to the Queue
                                                     3. Print first item in queue
1. Enter an item into the queue
                                                     4. Check if Queue is empty
2. Remove item from queue
                                                     5. Get size of Queue
3. Print first item in queue
4. Check if Queue is empty
                                                      6. Quit
5. Get size of Queue
                                                     What would you like to do? 2
6. Quit
                                                     Item: 1 was removed
What would you like to do? 1
What number would you like to add to the queue? 1
                                                     Welcome to the Queue
                                                     1. Enter an item into the queue
Welcome to the Queue
                                                     2. Remove item from queue
1. Enter an item into the queue
                                                     3. Print first item in queue
2. Remove item from queue
                                                     4. Check if Queue is empty
3. Print first item in queue
                                                     5. Get size of Queue
4. Check if Queue is empty
                                                     6. Quit
5. Get size of Queue
                                                      What would you like to do? 3
6. Quit
                                                      Front Item: 2
What would you like to do? 1
What number would you like to add to the queue? 2
                                                     Welcome to the Queue
Welcome to the Queue
                                                      1. Enter an item into the queue
1. Enter an item into the queue
                                                      2. Remove item from queue
2. Remove item from queue
                                                      3. Print first item in queue
3. Print first item in queue
                                                     4. Check if Queue is empty
4. Check if Queue is empty
                                                     5. Get size of Queue
5. Get size of Queue
                                                      6. Quit
6. Quit
                                                     What would you like to do? 5
What would you like to do? 1
                                                     The size of the queue is 3 element(s)
What number would you like to add to the queue? 3
                                                     Welcome to the Queue
Welcome to the Queue
                                                      1. Enter an item into the queue
1. Enter an item into the queue
                                                     2. Remove item from queue
2. Remove item from queue
3. Print first item in queue
                                                     3. Print first item in queue
4. Check if Queue is empty
                                                      4. Check if Queue is empty
5. Get size of Queue
                                                      5. Get size of Queue
6. Quit
                                                      6. Quit
What would you like to do? 1
                                                     What would you like to do? 4
What number would you like to add to the queue? 4
                                                      Queue is not empty
```

```
Welcome to the Queue
1. Enter an item into the queue
2. Remove item from queue
3. Print first item in queue
4. Check if Queue is empty
5. Get size of Queue
6. Quit
What would you like to do? 6
Goodbye!!!
Welcome to Assignment 3
1. Expression Manager
2. Queue
3. Quit
What part of the assignment would you like to do? 3
Goodbye!!!
D:\School\Data Structures and Algorithms\Assignment 2\Assignment 3\x64
\Debug\Assignment 3.exe (process 13096) exited with code 0.
To automatically close the console when debugging stops, enable Tools-
>Options->Debugging->Automatically close the console when debugging st
ops.
Press any key to close this window . . .
```