Input file

```
File   Edit   View   Git   Project   Build   Debug   Test   Analyze   Tools   Extensions   Window   Help        Search (Ctrl+Q)

                              Debug  ▼  x64                    ▶ Local Windows Debugger ▼ ▷

AssemProg.txt*  ⊟ X
      1    ;this is a test
      2            org    100
      3    hi      read   x;this comment is immediately after statement
      4            load   1,x
      5    hay    store   1,y ; This is the another comment.
      6            write     1,x
      7            bp        1,hi
      8            halt
      9        ;test comment
     10    x        dc      5
     11    y        ds      99
     12    b        dc      555
     13    a        dc      100
     14        end
```
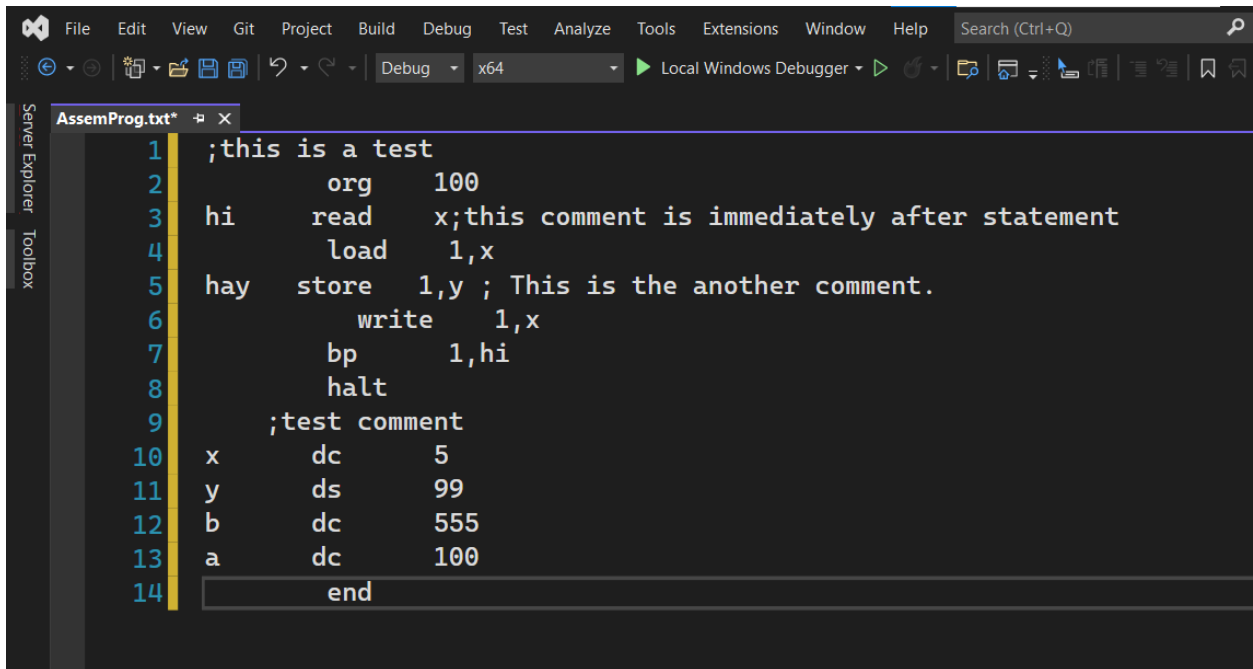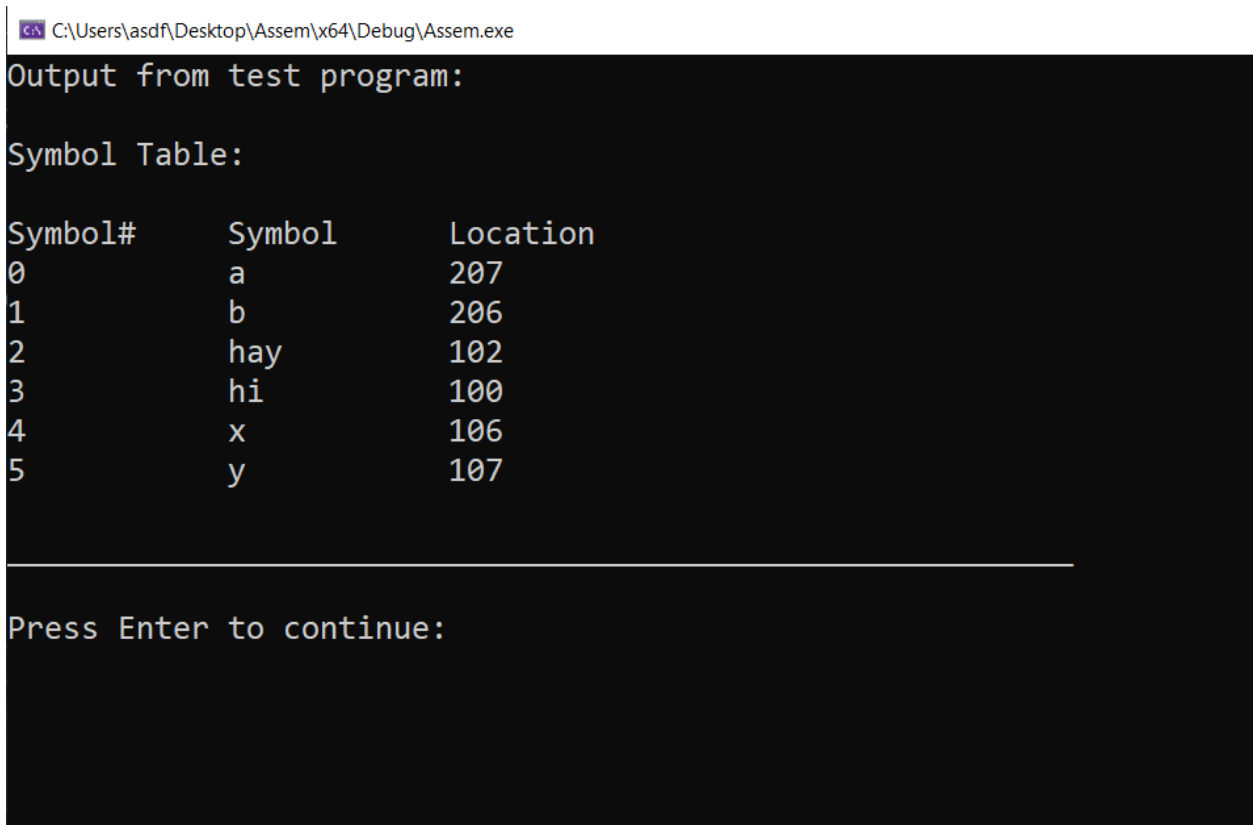
Initial output screen

```
C:\Users\asdf\Desktop\Assem\x64\Debug\Assem.exe

Output from test program:

Symbol Table:

Symbol#        Symbol         Location
0              a              207
1              b              206
2              hay            102
3              hi             100
4              x              106
5              y              107


_____


Press Enter to continue:
```

C:\Users\asdf\Desktop\Assem\x64\Debug\Assem.exe

```
Output from test program:

Symbol Table:

Symbol#      Symbol      Location
0            a           207
1            b           206
2            hay         102
3            hi          100
4            x           106
5            y           107


_____

Press Enter to continue:

Translation of Program:
Location  Contents            Original Statement
                              ;this is a test
0                                     org    100
100       119000106          hi     read    x;this comment is immediately after statement
101       051000106                 load    1,x
102       061000107          hay    store   1,y ; This is the another comment.
103       121000106                 write   1,x
104       161000100                 bp      1,hi
105       179000000                 halt
                              ;test comment
106       000000005          x      dc      5
107       000000099          y      ds      99
206       000000555          b      dc      555
207       000000100          a      dc      100
                                    end
_____

Press enter to continue
```

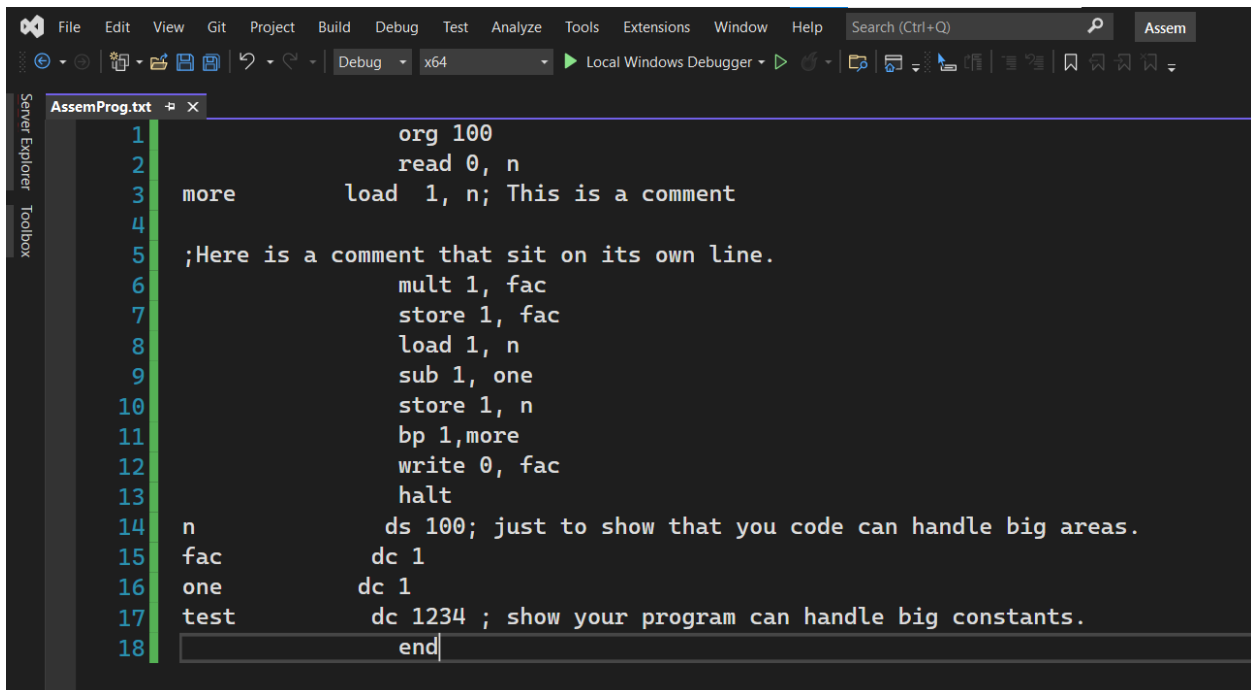After enter

```
Press enter to continue

Results from emulating program
?10
10
?144
144
?-7
-7
End of emulation

C:\Users\asdf\Desktop\Assem\x64\Debug\Assem.exe (process 81544) exited with code 0
.
To automatically close the console when debugging stops, enable Tools->Options->De
bugging->Automatically close the console when debugging stops.
Press any key to close this window . . ._
```

Another sample code from course website
Assembler language program which will read in a number "n" and then compute and print the value of n!

Input file

Debug ▾ x64   ▶ Local Windows Debugger ▾ ▷

AssemProg.txt

```
 1                      org 100
 2                      read 0, n
 3    more          load  1, n; This is a comment
 4
 5    ;Here is a comment that sit on its own line.
 6                      mult 1, fac
 7                      store 1, fac
 8                      load 1, n
 9                      sub 1, one
10                      store 1, n
11                      bp 1,more
12                      write 0, fac
13                      halt
14    n                ds 100; just to show that you code can handle big areas.
15    fac           dc 1
16    one           dc 1
17    test          dc 1234 ; show your program can handle big constants.
18                      end
```

Microsoft Visual Studio Debug Console

```
Output from test program:

Symbol Table:

Symbol#        Symbol        Location
0              fac           210
1              more          101
2              n             110
3              one           211
4              test          212



_____


Press Enter to continue:
```

```
Translation of Program:
Location  Contents            Original Statement
0                                               org 100
100      110000110                              read 0, n
101      051000110           more        load  1, n; This is a comment

                             ;Here is a comment that sit on its own line.
102      031000210                              mult 1, fac
103      061000210                              store 1, fac
104      051000110                              load 1, n
105      021000211                              sub 1, one
106      061000110                              store 1, n
107      161000101                              bp 1,more
108      120000210                              write 0, fac
109      179000000                              halt
110                          n              ds 100; just to show that you code can handle big areas.
210      000000001           fac          dc 1
211      000000001           one          dc 1
212      000001234           test         dc 1234 ; show your program can handle big constants.
                                              end


_____

Press enter to continue
```

```
Results from emulating program
?5
120
End of emulation

C:\Users\asdf\Desktop\Assem\x64\Debug\Assem.exe (process 86396) exited with code 0.
To automatically close the console when debugging stops, enable Tools->Options->Debugging->Aut
omatically close the console when debugging stops.
Press any key to close this window . . .
```