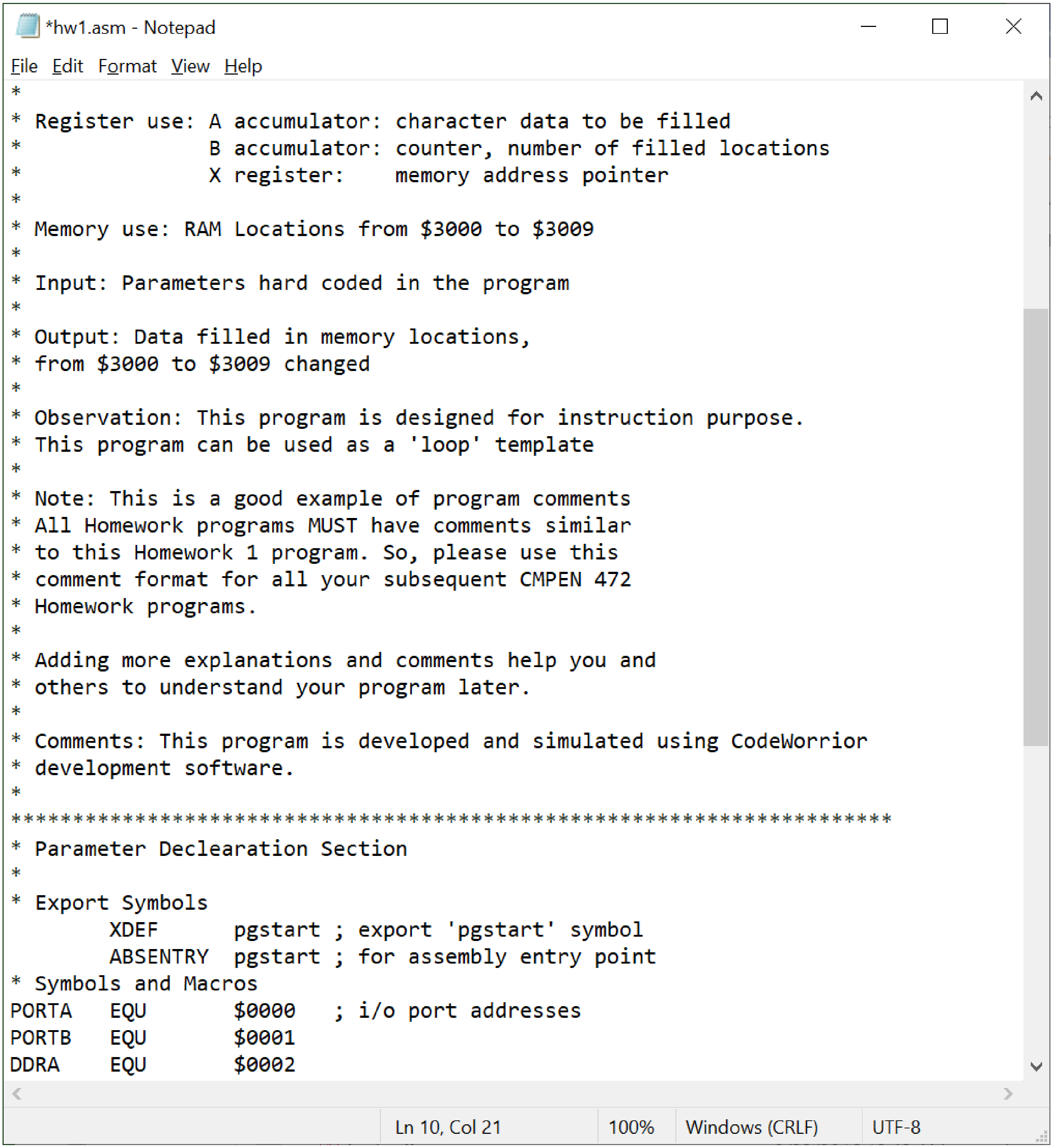
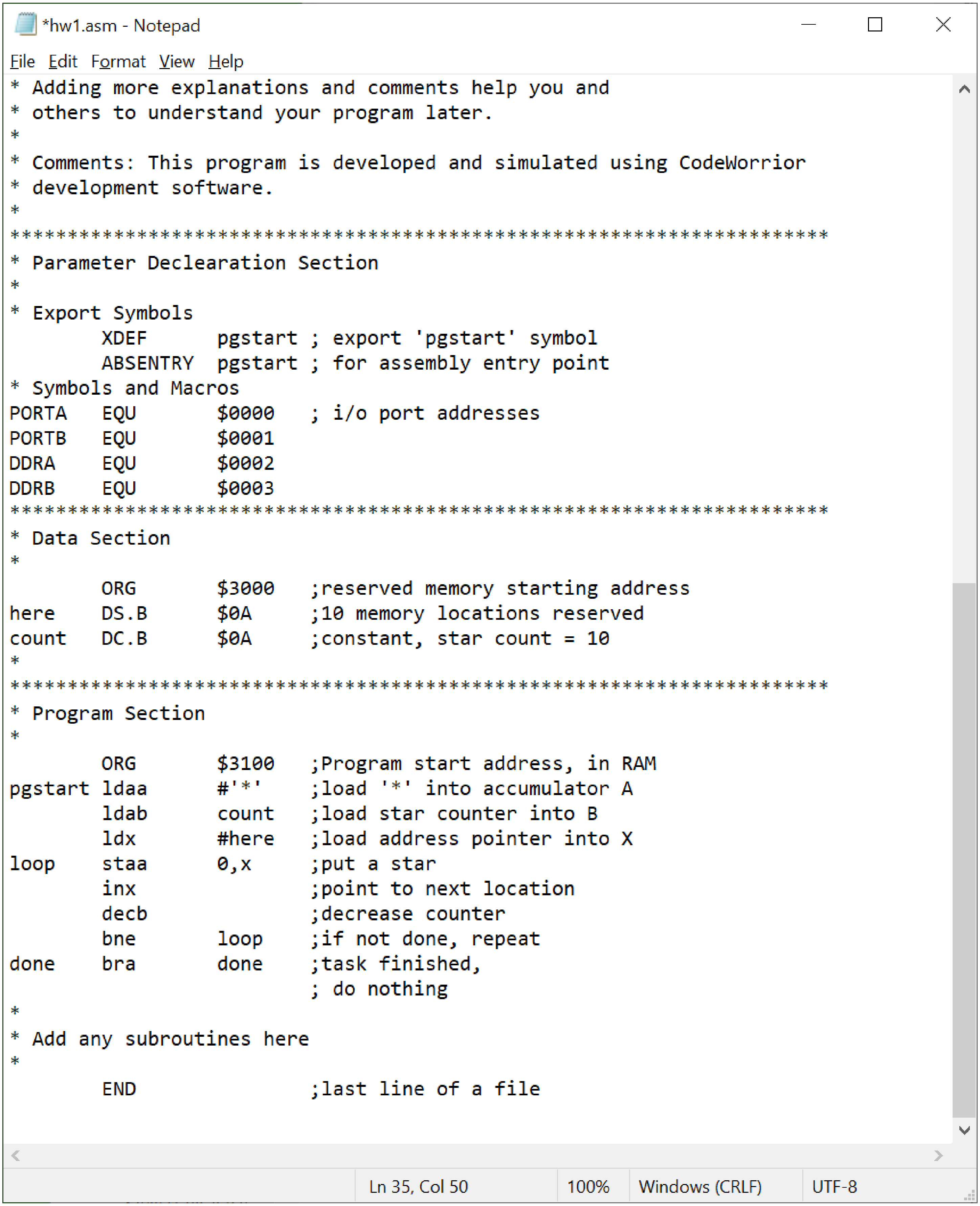


```
*
* Register use: A accumulator: character data to be filled
*               B accumulator: counter, number of filled locations
*               X register:    memory address pointer
*
* Memory use: RAM Locations from $3000 to $3009
*
* Input: Parameters hard coded in the program
*
* Output: Data filled in memory locations,
* from $3000 to $3009 changed
*
* Observation: This program is designed for instruction purpose.
* This program can be used as a 'loop' template
*
* Note: This is a good example of program comments
* All Homework programs MUST have comments similar
* to this Homework 1 program. So, please use this
* comment format for all your subsequent CMPEN 472
* Homework programs.
*
* Adding more explanations and comments help you and
* others to understand your program later.
*
* Comments: This program is developed and simulated using CodeWorrior
* development software.
*
************************************************************************
* Parameter Declearation Section
*
* Export Symbols
        XDEF      pgstart ; export 'pgstart' symbol
        ABSENTRY  pgstart ; for assembly entry point
* Symbols and Macros
PORTA   EQU       $0000   ; i/o port addresses
PORTB   EQU       $0001
DDRA    EQU       $0002
```



```
* Adding more explanations and comments help you and
* others to understand your program later.
*
* Comments: This program is developed and simulated using CodeWorrior
* development software.
*
***********************************************************************
* Parameter Declearation Section
*
* Export Symbols
        XDEF      pgstart ; export 'pgstart' symbol
        ABSENTRY  pgstart ; for assembly entry point
* Symbols and Macros
PORTA   EQU       $0000   ; i/o port addresses
PORTB   EQU       $0001
DDRA    EQU       $0002
DDRB    EQU       $0003
***********************************************************************
* Data Section
*
        ORG       $3000   ;reserved memory starting address
here    DS.B      $0A     ;10 memory locations reserved
count   DC.B      $0A     ;constant, star count = 10
*
***********************************************************************
* Program Section
*
        ORG       $3100   ;Program start address, in RAM
pgstart ldaa      #'*'    ;load '*' into accumulator A
        ldab      count   ;load star counter into B
        ldx       #here   ;load address pointer into X
loop    staa      0,x     ;put a star
        inx               ;point to next location
        decb              ;decrease counter
        bne       loop    ;if not done, repeat
done    bra       done    ;task finished,
                          ; do nothing
*
* Add any subroutines here
*
        END               ;last line of a file
```