

SSN College of Engineering
Department of Computer Science and Engineering
III year - UCS1512 – Microprocessors Lab

Academic Year: 2020 -2021
Semester: V

Batch: 2018-2022

Experiment No. 8: Case conversion

Input: letters through keyboard

Output: case converted letters on the fly

Hint:

Use dos interrupt 21H with AH=01 to read the letters with echo

Use AH=2 to display the letters to standard output device

Program

```
ASSUME CS:CODE,DS:data
data SEGMENT
COUNT equ 10h
data ends
CODE SEGMENT
START:MOV AX,data
      MOV DS,AX
      MOV CX,COUNT ; LOOP COUNTER
L1:MOV AH,1 ; INPUT CHARACTER,
    INT 21H ; AL = CHARACTER, ASCII(hex) :A-Z=41-5A, a-z=61-7A
    CMP AL,60H
    JNC UPPER
    ADD AL,20H
    JMP SKIP
UPPER:SUB AL,20H ; CONVERT TO UPPER CASE
SKIP:MOV AH,2 ; CHARACTER OUTPUT FUNCTION
      MOV DL,AL ; CHARACTER MUST BE IN DL
      INT 21H ; DISPLAY THE CHARACTER
      LOOP L1 ; REPEAT LOOP
      MOV Ah,4CH
      INT 21H
CODE ENDS
end start
```