 Name: _____

ACTIVITY 17

1. What is the IEEE 754 single-precision representation of the following values?

   a. $5^{3}/_{8}$ b. $-^{1}/_{4}$ c. $-3^{7}/_{8}$

- Use `REAL4`, `REAL8` to declare single-, double-precision floating point numbers.
- Use `call WriteFloat` to display the value at ST(0). You can also `call ShowFPUStack`.
- FINIT – Initialize the FPU (call this at the beginning of main)
- FLD, FST, FSTP – Load/push a value from memory, store value to memory, store and pop
- FADD, FSUB, FMUL, FDIV with no operands: compute ST(1) op ST(0), pop both values, push result
  - To translate a formula, convert it to postfix form ("Reverse Polish Notation")
- FILD, FIST, FISTP – Load/push integer, round to integer and store, store and pop

2. Write a program that subtracts 3.1 – 3.0 and displays the result.

```
INCLUDE Irvine32.inc
.data




.code
main PROC









   exit
main ENDP
END main
```