

CSCI-128 Coding for Problem Solving
Assignment #1

Date Assigned: January 26th, 2021

Date Due: February 2nd, 2021

Questions:

2.18 What is the output from the following?

```
>>> a = 3
>>> b = -5
>>> a = b
>>> b = 22
>>> x = a * b
>>> print x
```

2.19 What is the output from the following?

```
>>> a = 4
>>> b = 2
>>> x = a / b
>>> print x
```

2.23 What is the output from the following?

```
>>> first = "Abe"
>>> last = "Lincoln"
>>> print first + last
```

2.25 What is the output from the following?

```
>>> first = "Abe"
>>> last = "Lincoln"
>>> swap = first
>>> first = last
>>> last = swap
>>> print first + " " + last
```

2.26 What is the output from the following?

```
>>> a = ord("A")
>>> b = 2
>>> x = a * b
>>> print x
```

2.27 Type the function below into the Program Area of JES, then load the program and type into the Command Area compute(). What is being computed by the following?

```
def compute():
    distanceInMiles = 3279.8
    metersPerMile = 1609.34
    distanceInMeters = distanceInMiles * metersPerMile
    turtleSpeed = 0.5
    turtleSecondsM2S = distanceInMeters / turtleSpeed
    print("Time in seconds")
    print("for turtle to Miami to Seattle:")
    print(turtleSecondsM2S)
    turtleMinutes = turtleSecondsM2S / 60
    print("In minutes:")
    print(turtleMinutes)
    turtleHours = turtleMinutes / 60
    turtleDays = turtleHours / 24
    turtleWeeks = turtleDays / 7
    print("In Weeks:")
    print(turtleWeeks)
```

2.29 Type the function below into the Program Area of JES, then load the program and type into the Command Area compute(). What is being computed by the following?

```
def compute3():
    heightInStories = 3
    feetPerStory = 10
    heightInFeet = heightInStories * feetPerStory
    metersPerFoot = 0.3048
    heightInMeters = heightInFeet * metersPerFoot
    gravityMeters = 9.81
    timeToFall = sqrt((2*heightInMeters)/gravityMeters)
    print("Time to fall (seconds):")
    print(timeToFall)
```

2.31 The following code gives the error message shown below. Fix the code.

```
>>> a = 3  
>>> b = 4  
>>> c = d * a
```

The error was:d

Name not found globally.

A local or global name could not be found. You need to define the function or variable before you try