## Assignment 4

```
Q1
```

```
Initializing two test accounts...

First account: Balance = $ 5000.00, Annual Rate = 0.05

Second account: Balance = $ 2500.00, Annual Rate = 0.05

Calculating first month's interest...

First account: Balance = $ 5020.83, Annual Rate = 0.05

Second account: Balance = $ 2510.42, Annual Rate = 0.05

Modifying the interest rate...

Calculating the second month's interest...

First account: Balance = $ 5050.12, Annual Rate = 0.07

Second account: Balance = $ 2525.06, Annual Rate = 0.07

Withdrawing $2500 from account 1...

First account: Balance = $ 2550.12

Attempting to withdraw account 2 below $100 minimum...

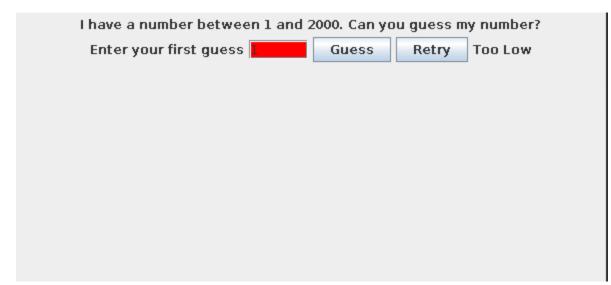
ERROR: Performing transaction would bring balance below $100 minimum!

Your account will be closed, and the balance

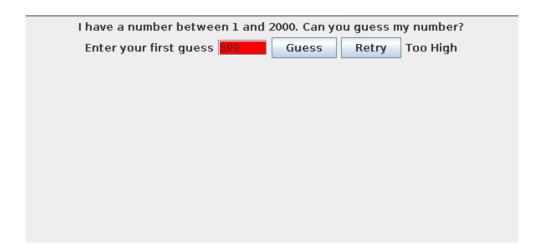
will be sent as a check to mailing address on file.

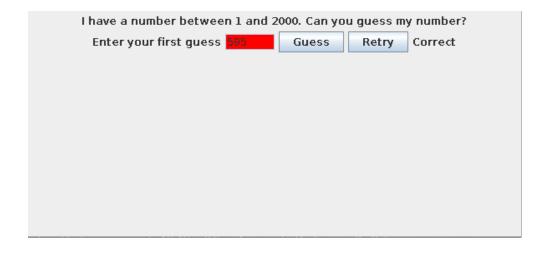
Exiting demo program...
```

 $\mathbf{Q}^2$ 



I have a number between 1 and 2000. Can you guess my number?			
Enter your first guess 2000	Guess	Retry	Too High





Richard Davis CSCI 2070 Dr. Jackson 11 April 2016

 $\mathbf{Q3}$ 

ERROR: Cannot divide by 0!				
Standard	Standard			
7	8	9	I	
4	5	6	*	
1	2	3	-	
0		=	+	

2.0 / 1.0 = 2.0 Standard			
Standard			
7	8	9	1
4	5	6	*
1	2	3	-
0		=	+

2.0 * 0.0 = 0.0			
Standard			
7	8	9	ſ
4	5	6	*
1	2	3	
0		=	+

42.0 - 40.0 = 2.0			
Standard			
7	8	9	1
4	5	6	*
1	2	3	-
0	·	=	+

40.0 + 2.0 = 42.0			
Standard			
7	8	9	1
4	5	6	*
1	2	3	-
0		=	+

**Q4** 

```
Richard Davis's Space Company
Enter the profit for month 1 ->200.00
Enter the profit for month 2 ->300.00
Enter the profit for month 3 ->80.00
Enter the profit for month 4 ->800.00
Enter the profit for month 5 ->23.50
Enter the profit for month 6 ->12.50
Enter the profit for month 7 ->34.55
Enter the profit for month 8 ->900.00
Enter the profit for month 9 ->150.00
Enter the profit for month 10 ->75.40
Enter the profit for month 11 ->90.00
Enter the profit for month 12 ->1200.00
The total profit for the year: $ 3865.95
The average monthly profit: $ 322.16
Month with highest profit: Month 12
Month with lowest profit: Month 6
```

```
Enter the profit for month 1 ->-11

ERROR: profit cannot be negative. Reenter.

Enter the profit for month 1 ->12

Enter the profit for month 2 ->1

Enter the profit for month 3 ->23

Enter the profit for month 4 ->44

Enter the profit for month 5 ->33

Enter the profit for month 6 ->234

Enter the profit for month 7 ->90

Enter the profit for month 8 ->23

Enter the profit for month 9 ->89

Enter the profit for month 10 ->900

Enter the profit for month 11 ->100

Enter the profit for month 12 ->20

The total profit for the year: $ 1569.00

The average monthly profit: $ 130.75

Month with highest profit: Month 10

Month with lowest profit: Month 2
```