Sub StockAnalysis()

'Create a script that will loop through all the of stocks per quarter (all four worksheets) and return stock statistics'

'Loop this script through all of the four worksheets'

For Each ws In Worksheets

'Define intial variables'

Dim Stock\_Ticker As String

'Define a variable to hold the total stock volume for each stock ticker'

Dim Total\_Stock\_Volume As Double

Total\_Stock\_Volume = 0

'Define a variable and value of the stock statistics' summary table'

Dim Summary\_of\_Stock\_Table\_Row As Long

Summary\_of\_Stock\_Table\_Row = 2

'Define variables for quarter open, quarter close, and quarter changes in price'

Dim Quarter\_Open As Double

Dim Quarter\_Close As Double

Dim Quarter\_Change As Double

Dim Stock\_Amount As Long

Stock\_Amount = 2

'Define percentage change and the last row'

Dim Last\_Row As Long

Dim Last\_Row\_Vale As Long

'Find the last row through all of the four worksheets'

Last\_Row = ws.Cells(Rows.Count, 1).End(xlUp).Row

'Name all the column headers for the output in the Stock Statistics' Summary Table'

ws.Range("I1").Value = "Stock Ticker"

ws.Range("J1").Value = "Quarterly Change"

ws.Range("K1").Value = "Percentage Change"

ws.Range("L1").Value = "Total Stock Volume"

'Name all the spaces for the challenge output in the Stock Statistics' Summary Table'

ws.Range("02").Value = "Greatest % Increase"

ws.Range("03").Value = "Greatest % Decrease"

ws.Range("04").Value = "Greatest Total Volume"

ws.Range("P1").Value = "Stock Ticker"

ws.Range("Q1").Value = "Value"

'Format the Stock Statistics' Summary Table to auto fit large results'

ws.Columns("I:Q").AutoFit

'Loop through last row in all worksheets. Creat a for loop.'

For I = 2 To Last\_Row

'Find and return the total volume and the stock ticker that it is associated with'

'Calculate the total volume for each stock ticker'

Total\_Stock\_Volume = Total\_Stock\_Volume + ws.Cells(I, 7).Value

'Set a conditional to find if the information is within the same stock ticker'

If ws.Cells(I + 1, 1).Value <> ws.Cells(I, 1).Value Then

Stock\_Ticker = ws.Cells(I, 1).Value

'Print output in the Stock Statistics' Summary Table'

ws.Range("I" & Summary\_of\_Stock\_Table\_Row).Value = Stock\_Ticker

ws.Range("L" & Summary\_of\_Stock\_Table\_Row).Value = Total\_Stock\_Volume

'Reset total stock volume to zero, so that it can loop through'

Total\_Stock\_Volume = 0

'Find the quarterly change in each stock ticker'

'Set values for quarter open, quarter close, and quarter change name'

Quarter\_Open = ws.Range("C" & Stock\_Amount)

Quarter\_Close = ws.Range("F" & I)

Quarter\_Change = Quarter\_Close - Quarter\_Open

'Print quarter change in the Stock Statistics' Summary Table'

ws.Range("J" & Summary\_of\_Stock\_Table\_Row).Value = Quarter\_Change

'Find the percentage change for each stock ticker.Create a if-else conditional.'

If Quarter\_Open = 0 Then

Percentage\_Change = 0

Else

Quarter\_Open = ws.Range("C" & Stock\_Amount)

Percentage\_Change = Quarter\_Change / Quarter\_Open

End If

'Formatting changes to make them more presentable. Number Format to change the type of number.'

ws.Range("K" & Summary\_of\_Stock\_Table\_Row).NumberFormat = "%"

ws.Range("K" & Summary\_of\_Stock\_Table\_Row).Value = Percentage\_Change

'Use conditial formatting to color code positive results green and negative results red'

If ws.Range("J" & Summary\_of\_Stock\_Table\_Row).Value >= 0 Then

ws.Range("J" & Summary\_of\_Stock\_Table\_Row).Interior.ColorIndex = 4

Else

ws.Range("J" & Summary\_of\_Stock\_Table\_Row).Interior.ColorIndex = 3

End If

'Reset Stock Statistics' Summary Table row so that looping can continue'

Summary\_of\_Stock\_Table\_Row = Summary\_of\_Stock\_Table\_Row + 1

Summary\_Amount = I + 1

'Assignment Solutions'

'Create solutions for each quarter. Find the "Greatest % Increase", "Greates % Decrease", and the "Greatest Total Stock Volume"'

'Redefine the last row variable'

Last\_Row = ws.Cells(Rows.Count, 11).End(xlUp).Row

'Create a for loop to make a conditional for the greatest % increase'

For I = 2 To Last\_Row

If ws.Range("K" & I).Value > ws.Range("Q2").Value Then

ws.Range("Q2").Value = ws.Range("K" & I).Value

ws.Range("P2").Value = ws.Range("I" & I).Value

End If

'Create a for loop to make a conditional for the greatest % decrease'

If ws.Range("K" & I).Value < ws.Range("Q3").Value Then

ws.Range("Q3").Value = ws.Range("K" & I).Value

ws.Range("P3").Value = ws.Range("I" & I).Value

End If

'Create a for loop to make a conditional for the greatest total stock volume'

If ws.Range("L" & I).Value > ws.Range("Q4").Value Then

ws.Range("Q4").Value = ws.Range("L" & I).Value

ws.Range("P4").Value = ws.Range("I" & I).Value

End If

Next I

'Format the results of the greatest increase and decrease to percentages using NumberFormat'

ws.Range("Q2").NumberFormat = "0.00%"

ws.Range("Q3").NumberFormat = "0.00%"

Next ws

End Sub