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//Lawerence Kelly
//lab 2
#include <cmath>
#include <iostream>
#include <vector>
using namespace std;

int main(){
    int n = 0;
    int sum = 0;
    int hGrade = 0;
    int lGrade = 0;
    int numHigh = 0;
    int numLow = 0;
    int mean;
    int standardDeviation = 0;
    vector<int> grades;
    cout << "Please Input Grades for Evaluation..."<<endl;

    for (int i = 0;true;++i){//The scope of 'i' is only inside of the for loop
        cin >> n;
        if (n < 0){ //if it's a neagitive number it isn't pushed to the stack
            break;
        }
        grades.push_back(n);//Stores your grades in the vector
    }

    cout << "Number of Grades: "<<    grades.size()<< endl;//Number of Grades in
Vector
    lGrade = grades[0];
    hGrade = grades[0];
    for(int i = 0; i < grades.size(); ++i){
        sum += grades[i]; //[]sub//sum+= == sum = sum +
        if (hGrade < grades[i]){
            hGrade = grades[i];
            ++numHigh;//cout these
        }
        if (lGrade > grades[i]){
            lGrade = grades[i];
            ++numLow;
        }
    }

    cout << "The average is.. "<< sum/grades.size()<<endl;
    cout << "The highest grade is..." << hGrade << endl;
    cout << "This many students are attaing the highest grade.."<< ++numHigh
<< endl;

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        cout << "The Lowest grade is..."<< lGrade <<endl;
        cout << "This many students are attaing the lowest grade..."<< ++numLow <<
endl;
}
```