Reflection logs course grade

```java
public static void main(String[] args) {
		// TODO Auto-generated method stub

			Scanner input = new Scanner(System.in);
			//Creating GradeBook object
			gradebook kidsgrades = new gradebook();
			//using method to prompt the user for the 5 test grades for each of the 12
students
			kidsgrades.getgrades();
			//method to display the grades of all the students
			kidsgrades.showgrades();
			//prompting user for which student's average they want to see
			System.out.print("Please enter student whose average you want: ");
			//putting users answer as parameter for  method, then will print the return
statement of that method as the students's average
			System.out.print("Their average is: " + kidsgrades.studentAvg(input.nextInt())+
"%");

			System.out.println("");
			//prompting user for which test's average they want to see
			System.out.print("Please which test's average you want to see: ");
			//putting users answer as parameter for testAvg method, then will print the return
statement of that method as the test's average
			System.out.println("The average is: " + kidsgrades.testAvg(input.nextInt()) +
"%");
```

I started off by creating my object then from my constructor method i created two methods:
getgrades and showgrades these are used to show the grades and the average of students. I
then prompt the user to enter which students average they want to see then I put users
answer as a parameter for method, then will print the return statement of that method
as the students's average. After I put users answer as parameter for testAvg method,
then will print the return statement of that method as the test's average

```java
	int[][] grades;
	//creating scanner object to record inputs of user
	Scanner input = new Scanner(System.in);
	//constructor method to initialize the array with 12 students and 5 test grades for each student
	public gradebook() {
```

```java
            grades = new int[12][5];
    }
    //asks every student and ask user to enter each students 5 test grades then store its in the array
    public void getgrades() {
        for(int student = 0; student< grades.length; student++) {
            System.out.println("Student " + (student + 1));
            for (int test = 0; test< grades[test].length; test++) {
                System.out.print("Please enter grade for test " + (test + 1) + ": " );
                grades[student][test] = input.nextInt();
            }

        }
    }
    // every student's array of 5 test grades and outputs them below an output statement of the student whos grades
are being displayed
    public void showgrades() {
        for(int student = 0; student< grades.length; student++) {
            System.out.println("Student " + (student + 1));
            for (int test = 0; test< grades[test].length; test++) {
                System.out.println("Grade for test " + (test + 1) + ": " + grades[student][test] + "%");
            }

        }
    }
    //Takes parameter of student num to indicate which student it is then adds up all their tests grades and returns
that sum divided by 5 which is their average
    public double studentAvg(int studentNum) {
        double avg = 0;
        for (int test = 0; test<grades[studentNum-1].length; test++) {
            avg += grades[(studentNum-1)][test];
        }
        return (avg/5);


    }
    //Takes parameter of which test number then adds all of the students grades on that test and divides by 12 to get
the average and returns that quotient
    public double testAvg(int testNum) {
        int avg = 0;
        for(int student = 0; student < grades.length; student++) {
            avg += grades[student][testNum-1];

        }

        return (avg/12);
    }


}
```

I first created a 2 dimensional array to store each of the 12 students' 5 test grades as separate arrays all in one array. Creating a Scanner object to record user inputs. Then I made a Constructor method to initialize the array for 12 students that each have 5 test grades. My getGrades method which will loop through the beginning of the array and for every student it will loop through the 5 array of each student which is supposed to store the test grades. Then it will prompt the user for each test grade of every student and put them in the corresponding index Then Takes an integer parameter which is correlated to a student's number this student will be the one whose test grades are taken to return an average. Will do this by looping through the students 5 element test grade array and adding all the grades to an avg variable. This variable will be divided by 5 and then the quotient will be returned as the student's average to where the method was called from.