

Assignment 9

Please submit the following java programs in a zipped folder on Canvas:

- Video Game Inventory:
 - Video Game Class (20 pts) – VideoGame.java
 - Video game Collection (30 pts)– GameCollection.java
 - Video Game Driver (10 pts)– VGDriver.java

Remember to include the pledge as a comment in every single file that you submit, followed by your name and U number.

“I pledge my Honor that I have not cheated, and will not cheat, on this assignment”

[insert name here], [insert U-number here]

Not including the pledge will result in a **50%** deduction of points for every file that does not have it. And no, putting one pledge as a comment on Canvas does not count.

Video Game Inventory

On canvas, you received an Array of Objects example that shows you how to manage a DVD collection. Modify that code so that it manages a Videogame collection instead.

You will need to perform the following steps:

Using the DVD class as a template:

1. Create a class called VideoGame that has the following private members:
 - Game title (String)
 - Game publisher (String)
 - Year the game was released (int)
 - Platform the game is played on (String)
 - Price of the game (double)
 - Completed status (boolean)
2. Modify the constructor so that it sets up a VideoGame object
3. Modify the toString so that it displays the contents of the VideoGame object
 - Modify the if statement so that if the status is true, add the string “Finished” to the data.

Using the DVDCollection class as a template:

1. Create a class called GameCollection that has the following private members:
 - o An array of VideoGame objects
 - o Amount of games (int)
 - o total cost of games (double)
2. Modify the constructor so that it creates a VideoGame array of size 100
 - o Keep the initial values of count and totalValues from the template
3. Modify the addDVD method (call it addGame) so that it accepts the 6 corresponding parameters for a video game to set up a VideoGame object
4. Modify the toString method to Display information for the VideoGame collection
5. Modify the increaseSize method so that it doubles the size of the VideoGame array if needed

Using the Movie class is as template:

1. Create a driver program called GameDriver, that tests your VideoGame Array object
2. Use the addGame method to add at least three games to the array
3. Check the contents of the array
4. Add at least one more game to the array using the addGame method
5. Check the updated contents of the array

A sample of the output is shown below:

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My Video Game Collection

Number of Games: 3

Total cost: \$60.97

Average cost: \$20.32

Video Game List:

|         |      |                   |             |               |           |
|---------|------|-------------------|-------------|---------------|-----------|
| \$15.99 | 1997 | Final Fantasy VII | Square Enix | PlayStation   | Finished! |
| \$19.99 | 2004 | Ninja Gaiden      | Ubisoft     | Xbox          |           |
| \$24.99 | 2005 | Kingdom Hearts II | Square Enix | PlayStation 2 | Finished! |

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My Video Game Collection

Number of Games: 4

Total cost: \$82.92

Average cost: \$20.73

Video Game List:

\$15.99	1997	Final Fantasy VII	Square Enix	PlayStation	Finished!
\$19.99	2004	Ninja Gaiden	Ubisoft	Xbox	
\$24.99	2005	Kingdom Hearts II	Square Enix	PlayStation 2	Finished!
\$21.95	2013	Tomb Raider	Square Enix	PlayStation 3	