**INTERMEDIATE PROGRAMMING  
Package Activity**

**1-BSCS-.2**: Marasigan, Vem Aiensi A. April 26, 2022

**SOURCE CODE**

**(class: Author)**

**package** objectMethods;

**class** Author

{

**private** String author;

**private** String email;

**private** String gender;

Author(String author, String email, String gender)

{

**this**.author = author;

setEmail(email);

setGender(gender);

}

**public** String getAuthor()

{

**return** author;

}

**public** **void** setAuthor(String author)

{

**this**.author = author;

}

**public** String getEmail()

{

**return** email;

}

**public** **void** setEmail(String email)

{

**if** (emailValidity(email))

{

**this**.email = email;

}

**else**

{

System.***out***.println("Invalid email! Set to empty string.");

**this**.email = " ";

}

}

**public** String getGender()

{

**return** gender;

}

**public** **void** setGender(String gender)

{

**if** (gender == "Male" || gender == "Female")

{

**this**.gender = gender;

}

**else**

{

System.***out***.println("Invalid gender! Set to Unknown.");

**this**.gender = "Unknown";

}

}

**boolean** emailValidity(String email)

{

**for** (**int** count = 0; count<email.length(); count++)

{//e-mails must contain '@'

**if** (email.charAt(count) == '@')

{

**return** **true**;

}

}

**return** **false**;

}

**void** print()

{

System.***out***.println("AUTHOR\t: " + author);

System.***out***.println("GENDER\t: " + gender);

System.***out***.println("E-MAIL\t: " + email);

System.***out***.println();

}

}

**(class: Book)**

**package** objectMethods;

**class** Book

{

**private** String bookTitle;

**private** Author author;

**private** **double** price;

**private** **int** stock = 0;

Book(String bookTitle, Author author, **double** price, **int** stock)

{

**this**.bookTitle = bookTitle;

**this**.author = author;

setPrice(price);

setStock(stock);

}

**public** String getBookTitle()

{

**return** bookTitle;

}

**public** **void** setBookTitle(String bookTitle)

{

**this**.bookTitle = bookTitle;

}

**public** Author getAuthor()

{

**return** author;

}

**public** **void** setAuthor(Author author)

{

**this**.author = author;

}

**public** **double** getPrice()

{

**return** price;

}

**public** **void** setPrice(**double** price)

{

**if** (price >= 0)

{

**this**.price = price;

}

**else**

{

System.***out***.println("Note: Price should be positive! Set to 0");

**this**.price = 0.0;

}

}

**public** **int** getStock()

{

**return** stock;

}

**public** **void** setStock(**int** stock)

{

**if** (stock >= 0)

{

**this**.stock = stock;

}

**else**

{

System.***out***.println("Book stocks cannot be negative! Set to 0\n\n");

}

}

**public** String getAuthorName()

{

**return** author.getAuthor();

}

**void** print()

{

System.***out***.println("Book Title : " + bookTitle);

author.print();

}

}

|  |  |
| --- | --- |
| **Sample 1 (main class)**  **package** objectMethods;  **public** **class** BookObject  {  **public** **static** **void** main(String[] args)  {  Author author1 = **new** Author("Marcus Laurence", "milaurence@neu.edu.ph", "Male");  author1.print();    Book bk1 = **new** Book("Java Book", author1, 1499, 10);  bk1.print();    author1.setEmail("cuscus@gmail.com");    author1.print();  bk1.print();    bk1.getAuthor().setEmail("Laurence.marcus@gmail.com");  bk1.print();  }  } | **Sample 2 (main class)**  **package** objectMethods;  **public** **class** BookObject  {  **public** **static** **void** main(String[] args)  {  Author author1 = **new** Author("Marcus Laurence", "milaurenceneu.edu.ph", "SheMale");  author1.print();    Book bk1 = **new** Book("Java Book", author1, -1499, -10);  bk1.print();    author1.setEmail("cuscusgmail.com");    author1.print();  bk1.print();    bk1.getAuthor().setEmail("Laurence.marcusgmail.com");  bk1.print();  }  } |

**SCREENSHOTS**

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**LINK FOR RUNNING VIDEO:**[**https://drive.google.com/file/d/1artnufItkxWSbkeu0lzmY2KR6eXbVRqw/view?usp=sharing**](https://drive.google.com/file/d/1artnufItkxWSbkeu0lzmY2KR6eXbVRqw/view?usp=sharing)