## Final Report

### Methods and Tools in SW Development

I. Group Information

Group Number: 5

Group Member names/netIDs:

o rp1349

• Rushma Parajuli

Khem Bahadur Dhami
o kbd167
Safal Niraula
o st1663
Khem B Hamal
o kbh346
Group GitHub/GitLab repo link:
https://github.com/rushmaparajuli39/Methods-Tools-Group5
Who was assigned to do what?
- Rushma and Khem Dhami were assigned to write the program.
- Safal and Khem Hamal were to complete the documentation and final report.

### II. Updated Detailed Class Diagrams

# When creating your project, did any of your classes change? Why did they have to change? Were the changes adding or removing items?

Yes, we had to change couple of things with our project. We had 'Item Categories' listed in our design document but instead of making the class for 'Item Categories', we went different way and made three separate categories namely 'books', 'movies' and 'comics'. Since the class 'item categories' that we were initially planning on creating mostly reflected on items (books, movies, and comics), we created the classes separately. We added a column in 'inventory' database representing a 'category'. Books is category 1, 'movies' is category 2 and comics is 3.

# -ISBN: VARCHAR -Price: INT -Title: VARCHAR

+AddBooks()

+displayPrice()

Fig. 1: Updated Diagram (Class Books)

## Movies -Name: VARCHAR -Type: VARCHAR -Price: INT +AddMovies() +displayPrice()

Fig. 2: Updated Diagram (Class Movies)

# Comics -Title: VARCHAR -Publisher: VARCHAR -Price: INT +AddComics() +displayPrice()

Fig. 3: Updated Diagram (Class Comics)

#### III. Conclusions

# If you were to flesh out your project more, what requirements do you think could be added?

→ If we were to flesh out our project more, we could have created more sections for individual categories, could have added more sections like 'New Releases', could have put a 'Sort by' section where we could sort by price from lowest to highest or highest to lowest, features like 'Customer Service' and 'Contact Us' could have been added, etc.

# Are there any overall design choices you wish you could have changed in hindsight? What are they and why?

Although, we tried to implement multiple classes, we failed to integrate the shopping cart properly throughout the code. Also, the classes that we planned initially had to change different methods in order to function properly and completely while trying to integrate the MySQL database. Overall, if this was an individual assignment then the same person who was integrating the design could have thought out the process for the code well.

Also, creating some control flow diagrams and more UML diagrams would have helped us in implementation of the overall program.

# What difficulties did your group have?

→ Other than everyone's time management, I don't think, we ever had much of a difficulty doing this project.

# What did your group learn overall from the project?

→ We got an opportunity to learn so much from each other. It surely helped us in broadening our programming skills. MySQL was something none of us had used before, so it was great time learning and poking around in it. Honestly, we are all surprised how effectively we worked as a team.