Technical Exercise

Thank you for participating in this technical exercise.

Each item listed as part of the technical test and technical suggestions in this document are optional.

You will need to plan your time wisely, and start from your area of strength, frontend, or backend, to implement as much as you can.

If you are unable to address any of the technical issues in this exercise, please send your thoughts & approach to us together with what you have finished.

Requirements

Goals:

The following tasks help the team to understand your technical skill set and problem-solving methodology.

Tasks:

You are about to create an online web application system for a bookstore using ASP.NET MVC (C#). Below are the books available in the store.

- CQRS for Dummies (Book ID: "9b0896fa-3880-4c2e-bfd6-925c87f22878")
- Visual Studio Tips (Book ID: "0550818d-36ad-4a8d-9c3a-a715bf15de76")
- NHibernate Cookbook (Book ID: "8e0f11f1-be5c-4dbc-8012-c19ce8cbe8e1")

With the following functions:

- The application **should list** all books in the bookstore.
- The application **should allow** customer to search books in the bookstore.
- The application **should allow** customer to reserve a book in the store. It will generate a booking number once the book reservation has been made.
- The application **should not allow** to reserve a book that has been reserved by other customer.

Bonus Point

- Implement Event Sourcing and CQRS pattern.
- Mitigate Security Risks.

Your solution should

- Have source code and resource files well organised.
- Have source code and comments properly formatted.
- Use design patterns properly.
- Use Git for version control and have properly organised commits.

Other References

- https://learn.microsoft.com/en-us/aspnet/mvc/overview/getting-started/
- https://cqrs.nu/

Your submission

Please include the following details for your work when replying back, thank you in advance!

Git repository URL(s): e.g., GitHub or Bitbucket, etc.