

# Introduction to .NET – lab no. 7

Way of working: 4 persons.

Summary:

Keywords: DbContext, EF Core, Repository pattern, Migrations, Loading patterns, API Designing

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## Requirements

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Based on the previous experiences expose an Web API (keeping in mind how should parent-child management for resources be handled) for the following resources: ShoppingCart↔Products.

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## Extra info's:

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- ShoppingCart: Id, Date, Description, Total (Total is a computed field and should not be mapped and saved to database (represents the sum of all products prices) – use [NotMapped] annotation)
- Products – Id, Name, Price, Pieces, Total (Total is a computed field and should not be mapped and saved to database (represents price x pierces)).

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## Note:

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1. For Data Layer and Business Layer all the team members should work together – 30 min.
2. For the API Layer (also called Service Layer) the team (4 members) should be divided in 2 teams: one should be working for parent resource (ShoppingCart) controller and one for child. resource(Product) – 30 min.
3. In the end, the integration between teams is mandatory – 10 min.
4. The team will make use of Github during the development.
5. To test the application the team will make use of Postman.
6. The validations should be done at the service layer (using annotations like we used for MVC) and at the Data Layer using Fluent API.
7. All exercises are mandatory.
8. Encapsulation is mandatory.
9. You will receive your points at the end of the lab.
10. Working time: 70 minutes.