**Software engineering documentation**

The software engineering methodology: Lean methodology

**Use case diagram**

**System modelling**

1. Context model

User

Packing list

Bag

Item

1. Interaction model

**Use case diagram**

**Sequence diagrams**

UserPacking app

Open application

Display welcome screen

Select items to pack

Display item list

Add item to packing list

Confirm item addition

Remove item from packing list

Confirm item removal

Mark item as packed

Confirm item as packed

View packing list

Display current packing list

Finalize and confirm packing list

Close packing app

1. Structural model

Toiletries

+type: string

+brand: string

+size: string

Clothing

+type: string

+material: string

+size: string

Item

-name: string

-quantity: number

+getName (): string

+getQuantity (): number

Bag

-items: item []

+addItem (item: Item): void

+removeItem (item: Item): void

+

1. Behavioral model

Packing app

User

Bag

Choose items to pack

Add items to pack Check if item

fits in the bag

alt Item added

Item added successfully

Item can’t fit

Item can’t fit in the bag

Remove item from bag

Remove item

Item removed successfully