Defending Your Methods Part 3: Returning Predictable Results

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Defensive Coding

Clean Code



- Improves Comprehension
- Simplifies Maintenance
- Reduces Bugs

Testable Code



Unit Tests



- Improves Quality
- Confirms Maintenance
- Reduces Bugs

Validation



Exception Handling



- Improves Predictability
- More Consistent
- Reduces Bugs

Method Results

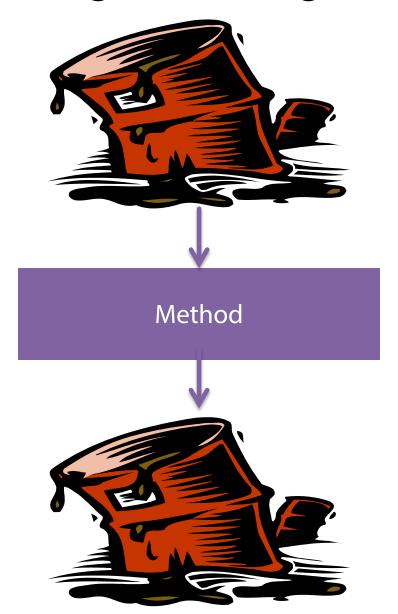
Value

Exception(s)

Multiple Values

Null

Garbage In / Garbage Out



Examples

```
var result = customer.CalculatePercentOfGoalSteps(this.GoalTextBox.Text,
                                                 this.StepsTextBox.Text);
customer.ValidateEmail();
customerRepository.Add(customer);
var customer = customerRepository.Find(this.IdTextBox.Text);
var customerList = customerRepository.Find(this.NameTextBox.Text);
                                       Multiple Values
    Value
                     Exception(s)
                                                                Null
```

Returning Null

```
String message = null;

Nullable<decimal> result = null;
decimal? result = null;

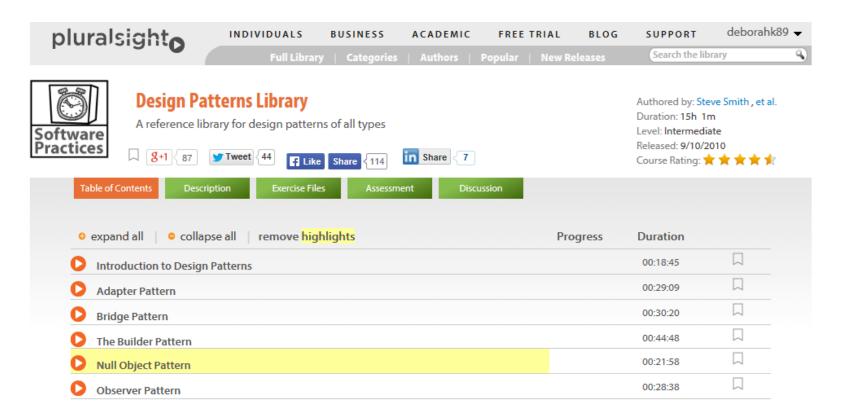
Customer customer = null;

List<Customer> customerList = null;
```

Returning Null

var customer = customerRepository.Find(this.IdTextBox.Text);

var customerList = customerRepository.Find(this.NameTextBox.Text);



Summary

```
var result = customer.CalculatePercentOfGoalSteps(this.GoalTextBox.Text,
                                                 this.StepsTextBox.Text);
customer.ValidateEmail();
customerRepository.Add(customer);
var customer = customerRepository.Find(this.IdTextBox.Text);
var customerList = customerRepository.Find(this.NameTextBox.Text);
                                       Multiple Values
    Value
                     Exception(s)
                                                                Null
```