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STRATEGY PATTERN

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WHAT IS THE STRATEGY PATTERN ?



This is a behavioral design pattern
that categorizes Algorithms,
Encapsulates them and uses them
interchangeably



GENERAL STRUCTURE OF STRATAGY PATTERN



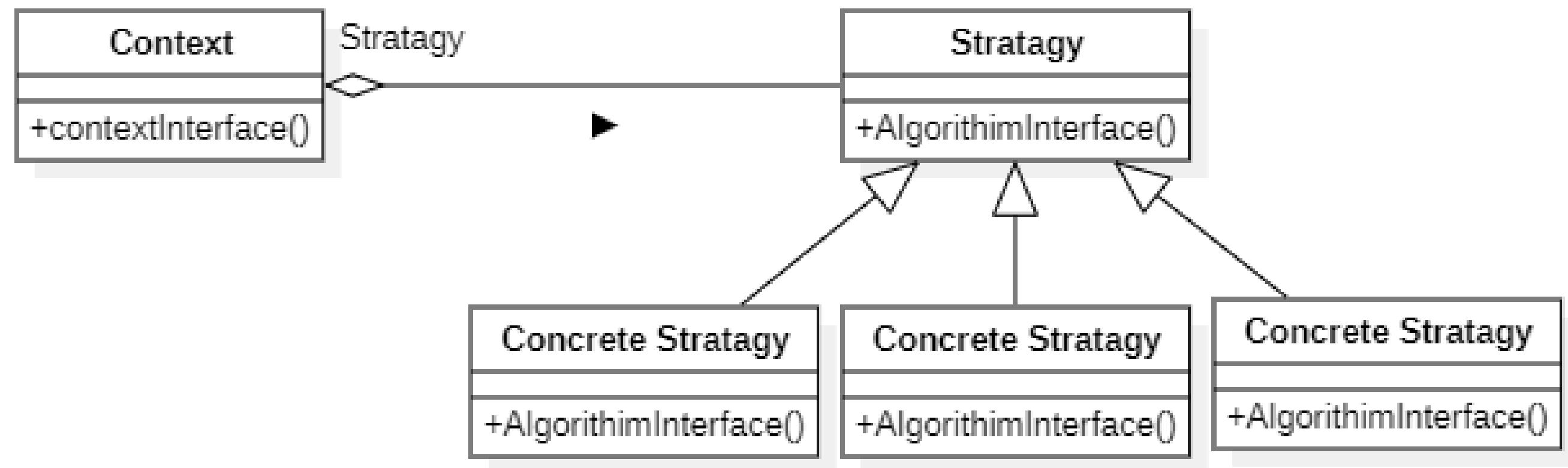


THE STRATAGY PATTERN

Context

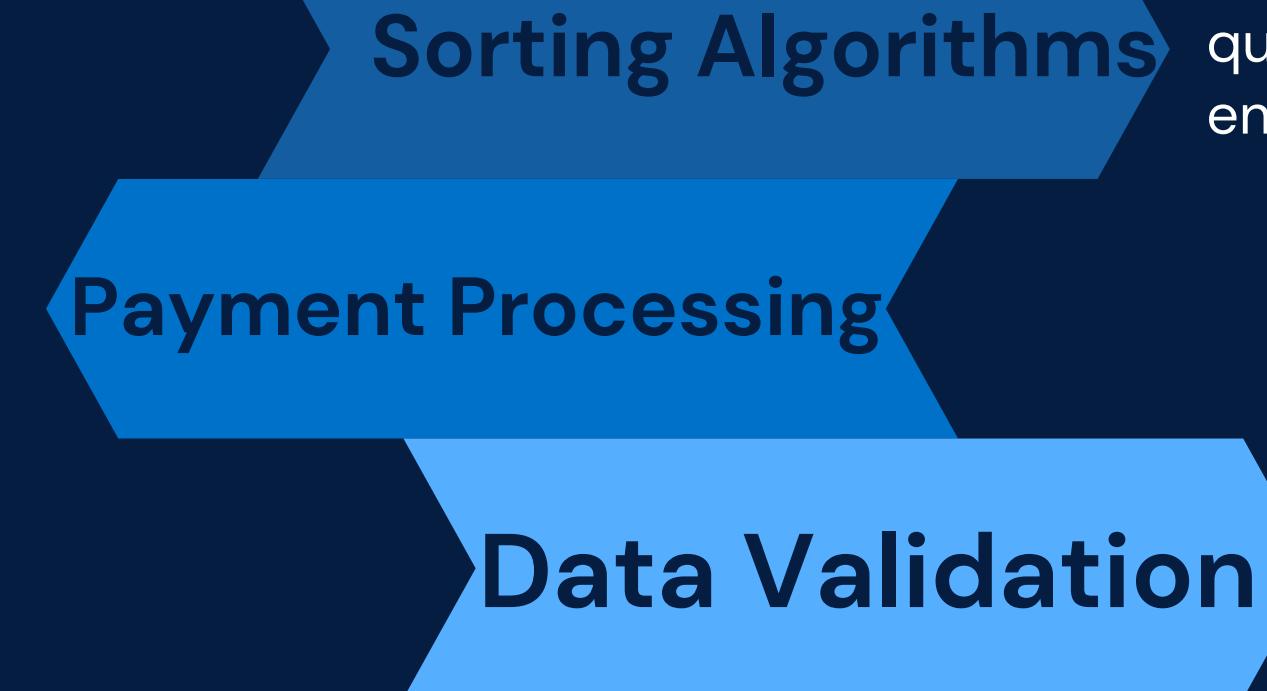
Stratagy

Concrete Stratagy



USES OF CONCRETE STRATEGY

In an application that supports multiple payment methods (e.g., credit card, PayPal, Stripe), each payment method can be implemented as a concrete strategy.



sorting algorithms like bubble sort, quick sort, merge sort, etc., can be encapsulated as concrete strategies.

In a form validation framework, different validation rules (e.g., required field, email format, numeric range) can be implemented as concrete strategies.



ADVANTAGE OF STRATAGY PATTERN

AVOIDING CONDITIONAL STATEMENTS

Avoiding conditional statements allows the strategies in the concrete classes to be reused with other use cases.

This promotes code reuse, which is good OOP Practice

A photograph showing a group of six people (three men and three women) working together at a long white conference table in a modern office. They are looking at laptops and papers, engaged in a collaborative discussion. The office has large windows and a high ceiling with exposed pipes.

DISADVANTAGE OF STRATEGY PATTERN

INCREASED NUMBER OF OBJECTS

This would imply that for every strategy added a new object has to be created with the new strategy.

CODE DEMONSTRATION



Thank's For Watching

