

Class Adapter Pattern

By Emon Dai

Definition

- A pattern that allows two classes or interfaces to work together that were not designed to work with each other
- Also known as the “Wrapper” pattern

Uses

- When there is an existing class you want to use but the current interface doesn't meet your requirements or needs
- When you want to create a new, reusable class that works with another class that is not related

Terminology

- **Target**

- The interface the client uses or wants to use

- **Client**

- Works with the objects that use Target interface (Main class)

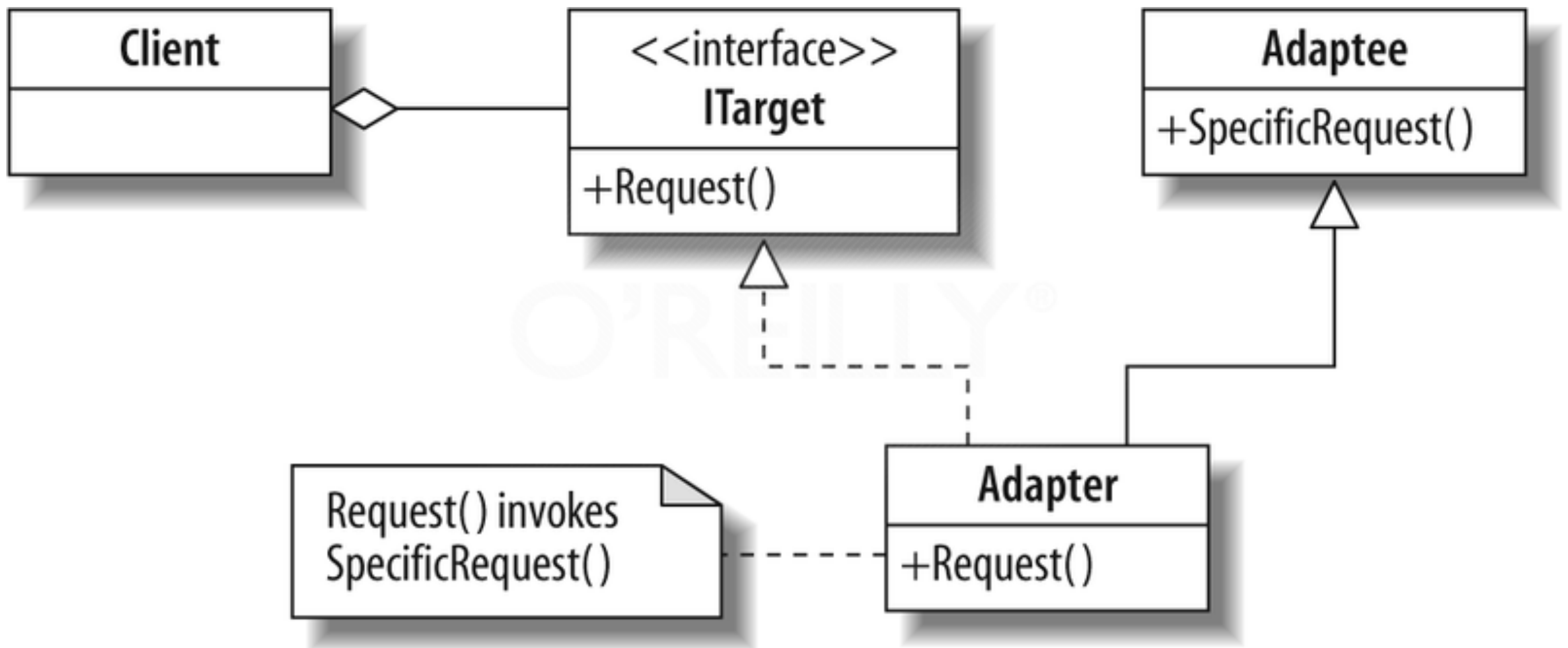
- **Adaptee**

- The interface that you want to adapt. In Java, we subclass this class

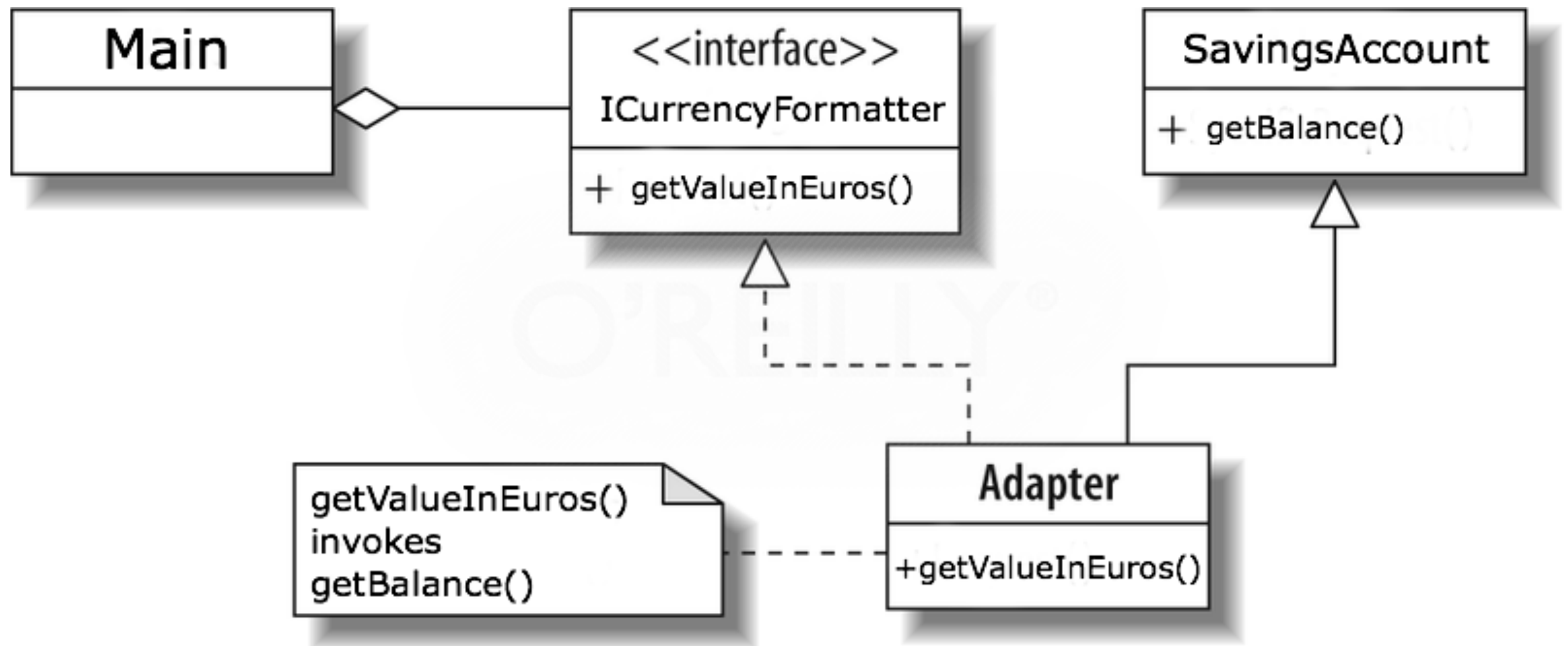
- **Adapter**

- Adapts the interface of the Adaptee so that it works with the Target interface. This inherits from the Adaptee in Java

Diagram



SavingsAccount To ICurrencyFormatter Adapter



References

- Design Patterns, Gamma, et. al., Addison Wesley, 1995, ISBN: 0201633612
- <http://www.avajava.com/tutorials/lessons/adapter-pattern.html?page=1>
- <https://msdn.microsoft.com/en-us/library/orb-9780596527730-01-04.aspx>