Introduction to the Exercises

How to survive the exercise code.

Prerequisites

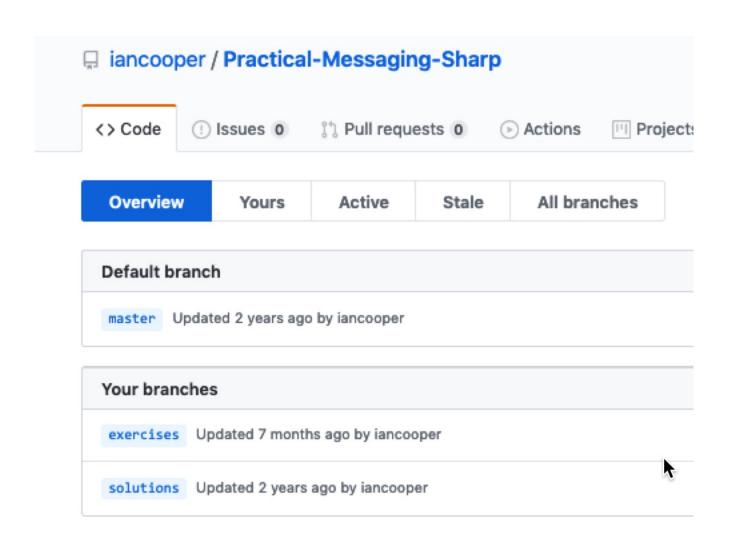
- Rabbit MQ (RMQ)
 - You need RMQ installed as it is the middleware we use for these examples
 - We use RMQ because it does not require cloud accounts and is easy to install and work with
 - Docker
 - We provide a Docker Compose file with the exercises, that if you have Docker installed can be used to run RMQ
 - Navigate to one of the directories containing the docker-compose.yml file
 - Run docker-compose up –d
 - Run docker ps to confirm that RMQ is running
 - We use a Linux container (if you are running on Windows, adjust settings)
 - Native
 - Install from https://www.rabbitmq.com/download.html

Patterns

- There are videos which introduce key patterns in messaging
 - There are many more patterns catalogued by Hohpe here
- Many of these patterns also have associated exercises
 - They show you how one type of middleware, RabbitMQ, can be used to implement these patterns

Exercises

- The exercises are in GitHub
 - They have supporting, short videos in Dropbox.
 - The videos explain key messaging patterns
 - The exercises let you write code to try some of these patterns yourself
- Solutions and Exercises are different branches
 - The master branch is blank, the solutions and questions are branches
 - You have the solutions as a clue if you need it
 - One way to work is to locally use the exercise branch, have solutions open in your browser
 - That way, if you get stuck, you can look for a hint and switch back



Steps

Watch a messaging patterns video
If there is an associated exercise
Do the exercise

Repeat

I am here to help, if you get stuck or have questions.

What Do You Do?

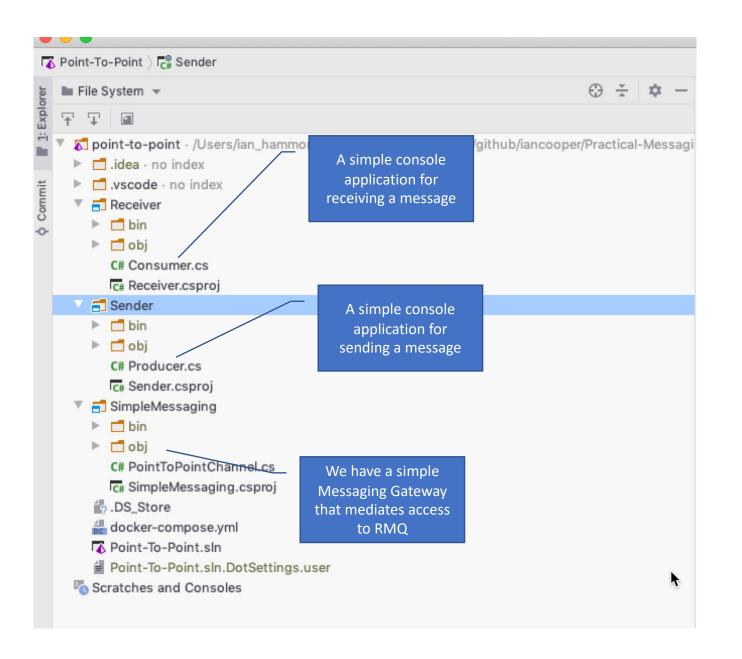
- In each exercise there is code that is missing, replaced by comments
- You need to provide the appropriate code, as indicated by the comments
- Once you have the code building, you run the samples to see how it works
- You may wish to have the RMQ management console open, to observe what is happening on the server

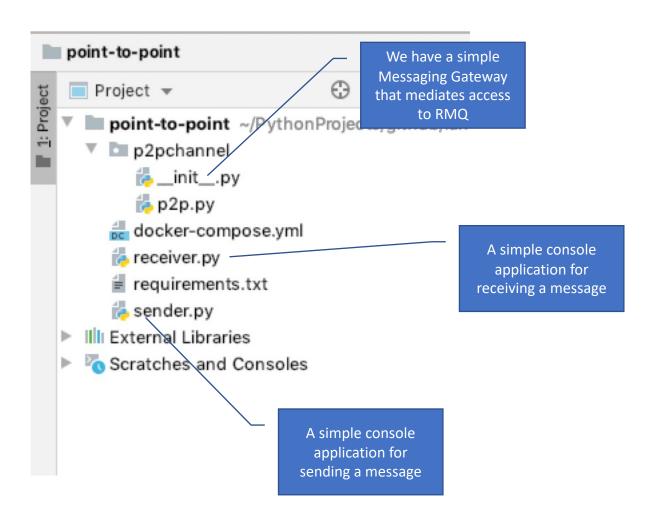
Making the Most of This

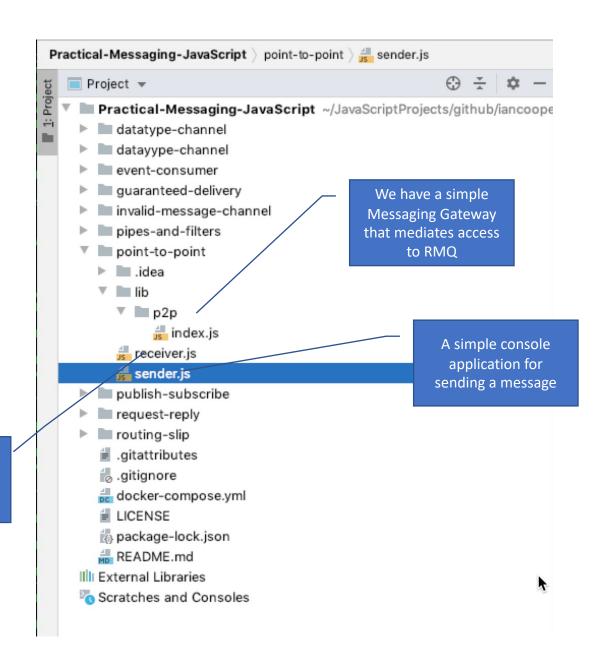
- You could just type the code from Solutions into Exercises
 - You won't learn as much though
 - It's better to try and understand what you are being asked to do, consult the RMQ client documentation etc.
 - That way you will leave here with knowledge of how to write this code yourself, and find answers to your problems.

Code Structure

- The Exercises come in three languages:
 - C#, Python, JavaScript
- The Exercises are not production code
 - They are intended to provide just enough code for the exercise
 - They omit most of the error handling production code would need
 - They trade maintainability for focus on what an exercise teaches
- They should help you understand production code
 - Working through these exercises and the workshop material will enable to understand production-grade OSS projects
 - You can see approaches to structure and error handling better there







A simple console application for receiving a message

