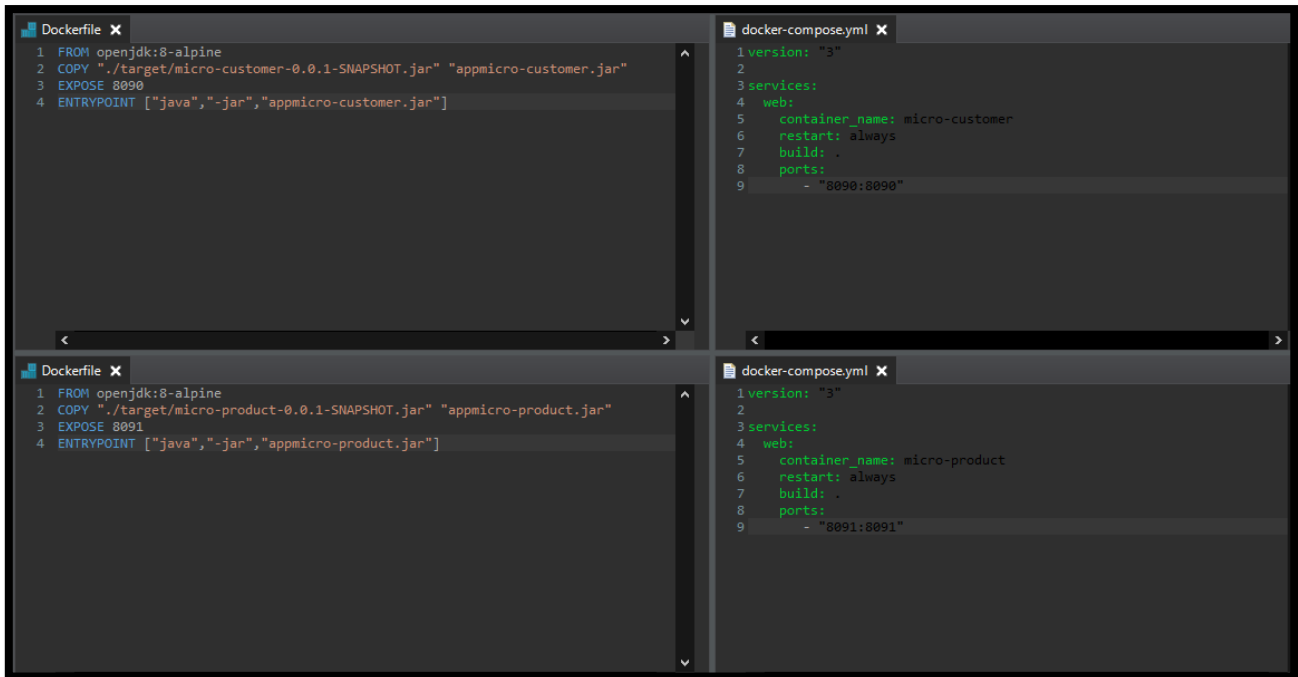


DOCKER

Se crea los archivos “Dockerfile” y “docker-compose.yml” en la raíz del proyecto.

- Microservicio Customer y Product



The screenshot displays two panels of code. The top panel shows the Dockerfile and docker-compose.yml for the 'micro-customer' service. The Dockerfile starts with 'FROM openjdk:8-alpine', copies the 'appmicro-customer.jar' file, exposes port 8090, and sets the entrypoint to run the jar. The docker-compose.yml file defines a 'web' service with container_name 'micro-customer', restart policy 'always', and port mapping '8090:8090'. The bottom panel shows the Dockerfile and docker-compose.yml for the 'micro-product' service. The Dockerfile is similar but uses 'appmicro-product.jar' and exposes port 8091. The docker-compose.yml file defines a 'web' service with container_name 'micro-product' and port mapping '8091:8091'.

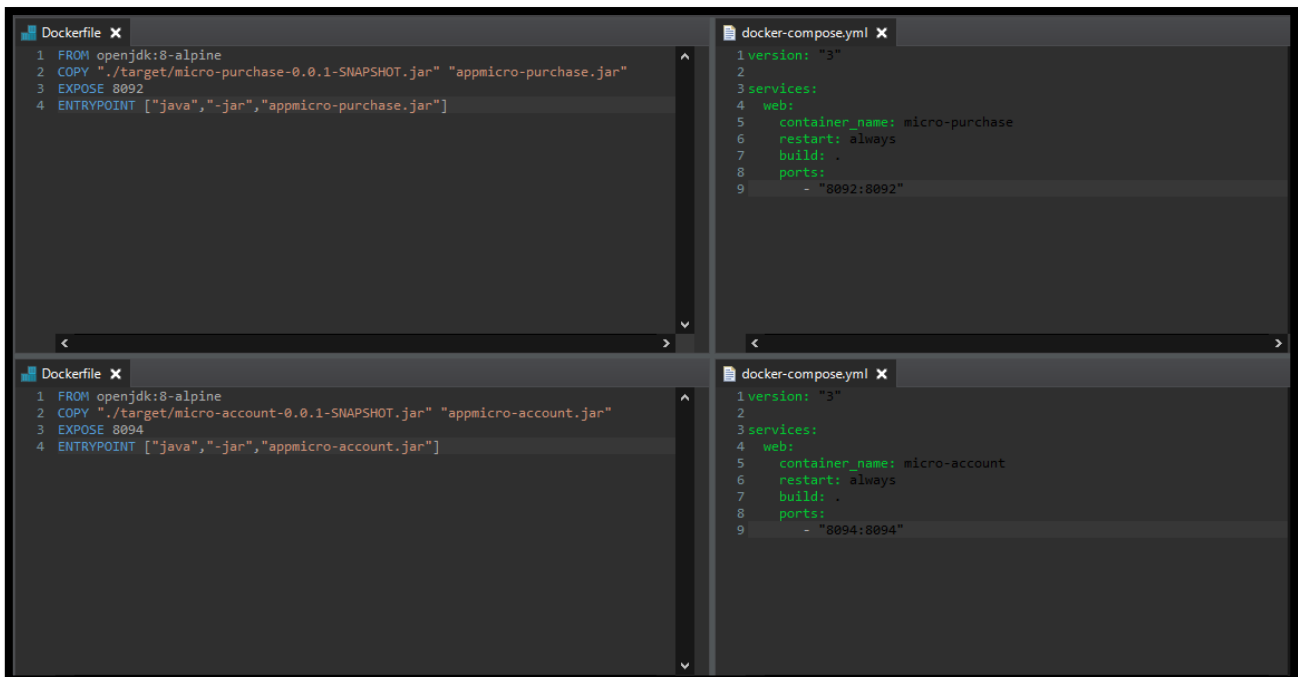
```
Dockerfile
1 FROM openjdk:8-alpine
2 COPY ./target/micro-customer-0.0.1-SNAPSHOT.jar "appmicro-customer.jar"
3 EXPOSE 8090
4 ENTRYPOINT ["java", "-jar", "appmicro-customer.jar"]

docker-compose.yml
1 version: "3"
2
3 services:
4   web:
5     container_name: micro-customer
6     restart: always
7     build: .
8     ports:
9       - "8090:8090"

Dockerfile
1 FROM openjdk:8-alpine
2 COPY ./target/micro-product-0.0.1-SNAPSHOT.jar "appmicro-product.jar"
3 EXPOSE 8091
4 ENTRYPOINT ["java", "-jar", "appmicro-product.jar"]

docker-compose.yml
1 version: "3"
2
3 services:
4   web:
5     container_name: micro-product
6     restart: always
7     build: .
8     ports:
9       - "8091:8091"
```

- Microservicio Purchase y Account



The screenshot displays two panels of code. The top panel shows the Dockerfile and docker-compose.yml for the 'micro-purchase' service. The Dockerfile starts with 'FROM openjdk:8-alpine', copies the 'appmicro-purchase.jar' file, exposes port 8092, and sets the entrypoint to run the jar. The docker-compose.yml file defines a 'web' service with container_name 'micro-purchase', restart policy 'always', and port mapping '8092:8092'. The bottom panel shows the Dockerfile and docker-compose.yml for the 'micro-account' service. The Dockerfile is similar but uses 'appmicro-account.jar' and exposes port 8094. The docker-compose.yml file defines a 'web' service with container_name 'micro-account' and port mapping '8094:8094'.

```
Dockerfile
1 FROM openjdk:8-alpine
2 COPY ./target/micro-purchase-0.0.1-SNAPSHOT.jar "appmicro-purchase.jar"
3 EXPOSE 8092
4 ENTRYPOINT ["java", "-jar", "appmicro-purchase.jar"]

docker-compose.yml
1 version: "3"
2
3 services:
4   web:
5     container_name: micro-purchase
6     restart: always
7     build: .
8     ports:
9       - "8092:8092"

Dockerfile
1 FROM openjdk:8-alpine
2 COPY ./target/micro-account-0.0.1-SNAPSHOT.jar "appmicro-account.jar"
3 EXPOSE 8094
4 ENTRYPOINT ["java", "-jar", "appmicro-account.jar"]

docker-compose.yml
1 version: "3"
2
3 services:
4   web:
5     container_name: micro-account
6     restart: always
7     build: .
8     ports:
9       - "8094:8094"
```

- Microservicio Deposit y Withdrawal

The screenshot displays two panels of code for the 'Deposit y Withdrawal' microservices. The top panel shows the configuration for the 'Deposit' service, and the bottom panel shows the configuration for the 'Withdrawal' service. Each panel contains a Dockerfile on the left and a docker-compose.yml file on the right.

Top Panel (Deposit Service):

```
Dockerfile
1 FROM openjdk:8-alpine
2 COPY ./target/micro-deposit-0.0.1-SNAPSHOT.jar "appmicro-deposit.jar"
3 EXPOSE 8096
4 ENTRYPOINT ["java", "-jar", "appmicro-deposit.jar"]

docker-compose.yml
1 version: "3"
2
3 services:
4   web:
5     container_name: micro-deposit
6     restart: always
7     build: .
8     ports:
9       - "8096:8096"
```

Bottom Panel (Withdrawal Service):

```
Dockerfile
1 FROM openjdk:8-alpine
2 COPY ./target/micro-withdrawal-0.0.1-SNAPSHOT.jar "appmicro-withdrawal.jar"
3 EXPOSE 8095
4 ENTRYPOINT ["java", "-jar", "appmicro-withdrawal.jar"]

docker-compose.yml
1 version: "3"
2
3 services:
4   web:
5     container_name: micro-withdrawal
6     restart: always
7     build: .
8     ports:
9       - "8095:8095"
```

- Microservicio Credit y Payment

The screenshot displays two panels of code for the 'Credit y Payment' microservices. The top panel shows the configuration for the 'Credit' service, and the bottom panel shows the configuration for the 'Payment' service. Each panel contains a Dockerfile on the left and a docker-compose.yml file on the right.

Top Panel (Credit Service):

```
Dockerfile
1 FROM openjdk:8-alpine
2 COPY ./target/micro-credit-0.0.1-SNAPSHOT.jar "appmicro-credit.jar"
3 EXPOSE 8097
4 ENTRYPOINT ["java", "-jar", "appmicro-credit.jar"]

docker-compose.yml
1 version: "3"
2
3 services:
4   web:
5     container_name: micro-credit
6     restart: always
7     build: .
8     ports:
9       - "8097:8097"
```

Bottom Panel (Payment Service):

```
Dockerfile
1 FROM openjdk:8-alpine
2 COPY ./target/micro-payment-0.0.1-SNAPSHOT.jar "appmicro-payment.jar"
3 EXPOSE 8098
4 ENTRYPOINT ["java", "-jar", "appmicro-payment.jar"]

docker-compose.yml
1 version: "3"
2
3 services:
4   web:
5     container_name: micro-payment
6     restart: always
7     build: .
8     ports:
9       - "8098:8098"
```

- Microservicio Transaction

The screenshot displays two Dockerfile and docker-compose.yml files side-by-side. The top row shows the Dockerfile for 'micro-transaction' and its corresponding docker-compose.yml. The bottom row shows the Dockerfile for 'micro-wallet' and its corresponding docker-compose.yml.

```
Dockerfile
1 FROM openjdk:8-alpine
2 COPY ./target/micro-transaction-0.0.1-SNAPSHOT.jar "appmicro-transaction.jar"
3 EXPOSE 8093
4 ENTRYPOINT ["java","-jar","appmicro-transaction.jar"]

docker-compose.yml
1 version: "3"
2
3 services:
4   web:
5     container_name: micro-transaction
6     restart: always
7     build: .
8     ports:
9       - "8093:8093"

Dockerfile
1 FROM openjdk:8-alpine
2 COPY ./target/micro-wallet-0.0.1-SNAPSHOT.jar "appmicro-wallet.jar"
3 EXPOSE 8099
4 ENTRYPOINT ["java","-jar","appmicro-wallet.jar"]

docker-compose.yml
1 version: "3"
2
3 services:
4   web:
5     container_name: micro-wallet
6     restart: always
7     build: .
8     ports:
9       - "8099:8099"
```

- Api Gateway y Mongo

The screenshot displays two Dockerfile and docker-compose.yml files side-by-side. The top row shows the Dockerfile for 'app-api-gateway' and its corresponding docker-compose.yml. The bottom row shows the Dockerfile for 'mongo' and its corresponding docker-compose.yml.

```
Dockerfile
1 FROM openjdk:8-alpine
2 COPY ./target/api-gateway-0.0.1-SNAPSHOT.jar "app-api-gateway.jar"
3 EXPOSE 8080
4 ENTRYPOINT ["java","-jar","app-api-gateway.jar"]

docker-compose.yml
1 version: "3"
2
3 services:
4   web:
5     container_name: api-gateway
6     restart: always
7     build: .
8     ports:
9       - "8080:8080"

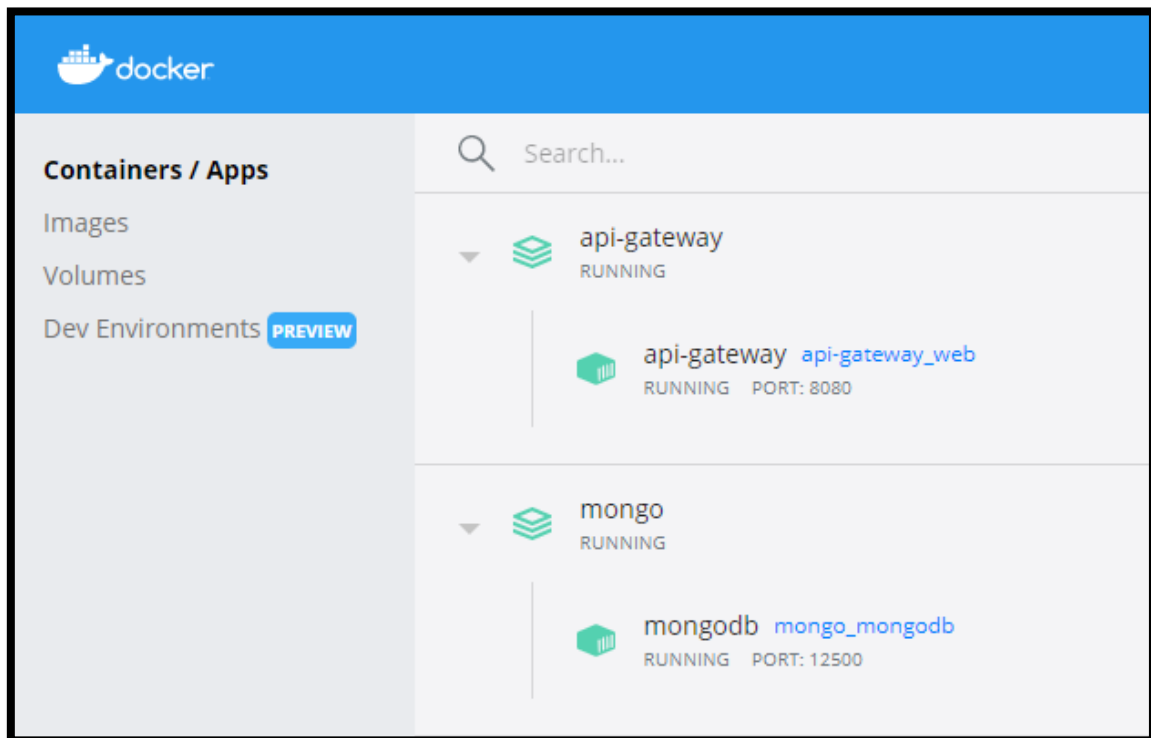
Dockerfile
1 FROM mongo:4.2.9-bionic

docker-compose.yml
1 version: "3"
2
3 services:
4   mongodb:
5     build:
6       context: .
7       dockerfile: Dockerfile
8     container_name: mongodb
9     restart: always
10    environment:
11      MONGO_INITDB_USERNAME: usermongo
12      MONGO_INITDB_PASSWORD: passmongo
13      MONGO_INITDB_DATABASE: bank
14    ports:
15      - 12500:27017
16    volumes:
17      - ./mongo:/etc/mongo
18 volumes:
19   mongo: {}
20
21
```

Se ejecuta los comandos:

- `docker-compose build`: Para construir la imagen.
- `docker-compose up`: Para levantar la imagen.

➤ Gateway y Mongo



➤ Microservicios


The screenshot shows the Docker Desktop interface. On the left is a sidebar with navigation options: 'Containers / Apps' (selected), 'Images', 'Volumes', and 'Dev Environments' (with a 'PREVIEW' button). The main area features a search bar and a list of five running containers, each with a dropdown arrow, a Docker icon, and a name. Below each container name is a detailed view showing the container name, status ('RUNNING'), and port.
















Container Name	Status	Port
micro-account	RUNNING	8094
micro-credit	RUNNING	8097
micro-customer	RUNNING	8090
micro-deposit	RUNNING	8096
micro-payment	RUNNING	8098

Containers / Apps

Images


Volumes

Dev Environments **PREVIEW** Search...

-   **micro-product**
RUNNING
-  **micro-product** [micro-product_...](#)
RUNNING PORT: 8091
-   **micro-purchase**
RUNNING
-  **micro-purchase** [micro-purchase...](#)
RUNNING PORT: 8092
-   **micro-transaction**
RUNNING
-  **micro-transaction** [micro-transacti...](#)
RUNNING PORT: 8093
-   **micro-wallet**
RUNNING
-  **micro-wallet** [micro-wallet_web](#)
RUNNING PORT: 8099
-   **micro-withdrawal**
RUNNING
-  **micro-withdrawal** [micro-withdraw...](#)
RUNNING PORT: 8095

- Config Server y Eureka están en la nube.

← → ↻ az-eureka-server.azurewebsites.net

HOMELAST 1000 SINCE STARTUP

System Status

Environment	N/A	Current time	2021-07-13T20:43:13 +0000
Data center	N/A	Uptime	03:51
		Lease expiration enabled	false
		Renews threshold	20
		Renews (last min)	12

DS Replicas

Instances currently registered with Eureka

Application	AMIs	Availability Zones	Status
API-GATEWAY	n/a (1)	(1)	UP (1) - bb4c27bae96a:api-gateway:8080
EUREKA-SERVER	n/a (1)	(1)	UP (1) - az-eureka-server.azurewebsites.net:eureka-server:443
MICRO-ACCOUNT	n/a (1)	(1)	UP (1) - c13f0324dbce:micro-account:8094
MICRO-CREDIT	n/a (1)	(1)	UP (1) - 245c7af8fc81:micro-credit:8097
MICRO-CUSTOMER	n/a (1)	(1)	UP (1) - e1dc387a2ca5:micro-customer:8090
MICRO-DEPOSIT	n/a (1)	(1)	UP (1) - 8bd46164e654:micro-deposit:8096
MICRO-PAYMENT	n/a (1)	(1)	UP (1) - fe4f97eaaec:micro-payment:8098
MICRO-PRODUCT	n/a (1)	(1)	UP (1) - e73fdff7d6e9:micro-product:8091
MICRO-PURCHASE	n/a (1)	(1)	UP (1) - c56cbfd827dc:micro-purchase:8092
MICRO-TRANSACTION	n/a (1)	(1)	UP (1) - e82ff6d6e4e2:micro-transaction:8093
MICRO-WALLET	n/a (1)	(1)	UP (1) - 2d5c98c4b551:micro-wallet:8099
MICRO-WITHDRAWAL	n/a (1)	(1)	UP (1) - f9016142f3e2:micro-withdrawal:8095