

Docker Compose Multi Node Broker with FilePulse and Schema Registry

version: "3.2"

services:

zookeeper:

image: bitnami/zookeeper:3

ports:

- 2181:2181

environment:

ALLOW_ANONYMOUS_LOGIN: "yes"

kafka-0:

image: bitnami/kafka:2

ports:

- 9092:9092

environment:

KAFKA_CFG_ZOOKEEPER_CONNECT: zookeeper:2181

ALLOW_PLAINTEXT_LISTENER: "yes"

KAFKA_LISTENERS: >-

INTERNAL://:29092,EXTERNAL://:9092

KAFKA_ADVERTISED_LISTENERS: >-

INTERNAL://kafka-0:29092,EXTERNAL://localhost:9092

KAFKA_LISTENER_SECURITY_PROTOCOL_MAP: >-

INTERNAL:PLAINTEXT,EXTERNAL:PLAINTEXT

KAFKA_INTER_BROKER_LISTENER_NAME: "INTERNAL"

depends_on:

- zookeeper

kafka-1:

image: bitnami/kafka:2

ports:

- 9093:9093

environment:

KAFKA_CFG_ZOOKEEPER_CONNECT: zookeeper:2181

ALLOW_PLAINTEXT_LISTENER: "yes"

KAFKA_LISTENERS: >-

INTERNAL://:29092,EXTERNAL://:9093

KAFKA_ADVERTISED_LISTENERS: >-

INTERNAL://kafka-1:29092,EXTERNAL://localhost:9093

KAFKA_LISTENER_SECURITY_PROTOCOL_MAP: >-

INTERNAL:PLAINTEXT,EXTERNAL:PLAINTEXT

KAFKA_INTER_BROKER_LISTENER_NAME: "INTERNAL"

depends_on:

- zookeeper

kafka-2:

image: bitnami/kafka:2

ports:

- 9094:9094

environment:

KAFKA_CFG_ZOOKEEPER_CONNECT: zookeeper:2181

ALLOW_PLAINTEXT_LISTENER: "yes"

KAFKA_LISTENERS: >-

INTERNAL://:29092,EXTERNAL://:9094

KAFKA_ADVERTISED_LISTENERS: >-

INTERNAL://kafka-2:29092,EXTERNAL://localhost:9094

KAFKA_LISTENER_SECURITY_PROTOCOL_MAP: >-

INTERNAL:PLAINTEXT,EXTERNAL:PLAINTEXT

KAFKA_INTER_BROKER_LISTENER_NAME: "INTERNAL"

depends_on:

- zookeeper

schema-registry:

```
image: docker.io/bitnami/schema-registry:7.2
hostname: schema-registry
container_name: schema-registry
depends_on:
- kafka-0
- kafka-1
- kafka-2
ports:
- "8081:8081"
environment:
- SCHEMA_REGISTRY_LISTENERS=http://0.0.0.0:8081
- SCHEMA_REGISTRY_KAFKA_BROKERS=PLAINTEXT://kafka-0:29092,PLAINTEXT://kafka-1:29092,PLAINTEXT://kafka-2:29092
- SCHEMA_REGISTRY_HOST_NAME=schema-registry
```

connect-file-pulse:

```
image: streamthoughts/kafka-connect-file-pulse:2.5.0
container_name: connect
depends_on:
- kafka-0
- kafka-1
- kafka-2
- schema-registry
ports:
- "8083:8083"
- "8000:8000"
environment:
CONNECT_BOOTSTRAP_SERVERS: 'kafka-0:29092,kafka-1:29092,kafka-2:29092'
CONNECT_REST_ADVERTISED_HOST_NAME: connect
CONNECT_REST_PORT: 8083
CONNECT_GROUP_ID: compose-connect-group
CONNECT_CONFIG_STORAGE_TOPIC: docker-connect-configs
CONNECT_CONFIG_STORAGE_REPLICATION_FACTOR: 3
CONNECT_OFFSET_FLUSH_INTERVAL_MS: 10000
CONNECT_OFFSET_STORAGE_TOPIC: docker-connect-offsets
CONNECT_OFFSET_STORAGE_REPLICATION_FACTOR: 3
CONNECT_STATUS_STORAGE_TOPIC: docker-connect-status
CONNECT_STATUS_STORAGE_REPLICATION_FACTOR: 3
CONNECT_KEY_CONVERTER: org.apache.kafka.connect.storage.StringConverter
CONNECT_VALUE_CONVERTER: io.confluent.connect.avro.AvroConverter
CONNECT_VALUE_CONVERTER_SCHEMA_REGISTRY_URL: http://schema-registry:8081
CONNECT_INTERNAL_KEY_CONVERTER: "org.apache.kafka.connect.json.JsonConverter"
CONNECT_INTERNAL_VALUE_CONVERTER: "org.apache.kafka.connect.json.JsonConverter"
CONNECT_ZOOKEEPER_CONNECT: 'zookeeper:2181'
# kafka-connect-file-pulse is installed as a confluent-hub component
CONNECT_PLUGIN_PATH: "/usr/share/java,/usr/share/confluent-hub-components/"
CONNECT_LOG4J_ROOT_LOGLEVEL: "INFO"
# CONNECT_LOG4J_LOGGERS:
io.streamthoughts=DEBUG,org.apache.zookeeper=ERROR,org.I0Itec.zkclient=ERROR,org.reflections=ERROR
# Uncomment for debugging the connector during development cycle
# KAFKA_OPTS: "-agentlib:jdwp=transport=dt_socket,server=y,address=8000,suspend=n"
kafdrop:
image: obsidiandynamics/kafdrop:latest
ports:
- 9000:9000
environment:
KAFKA_BROKERCONNECT: >-
kafka-0:29092,kafka-1:29092,kafka-2:29092
depends_on:
- kafka-0
- kafka-1
- kafka-2
```