

## 5.0 features (which have not been back-ported to 4.x)

- Netty 4.2
  - IO\_Uring
- HTTP client service selection
  - Address resolver (K8S, SRV, DNS)
  - Load balancing
- gRPC
  - gRPC Web
  - Timeout and deadlines
- TCP server/client shutdown
- JVM related changes
  - Java 11 base
  - Finalizer removal
  - Biased locking removal
  - Partial Java module support
- Micrometer performance improvements

# 5.0

- HTTP client
  - Fine grained SSL configuration (per request)
  - Unpooled connections
- DNS client
  - Resolver support improvements

## 5.x planned features (at the moment)

- More service resolver integration
- HTTP/3
- Vert.x shutdown and restart

# Eclipse Vert.x major release lifecycle (community)

- Upon a major version release X.0
  - Previous major (X-1)
    - Remains supported for two years
    - Possibly more as best effort
- Feature development for X.Y
- Next major release X+1
  - Development begins when evolution requires significant changes
  - Partial backport of new features to X.Y

# Quarkus support

- Quarkus 3
  - ships with Vert.x 4.5.x
- RHBQ
  - Major vertx components are supported (core, web, SQL client, Redis client, gRPC)
  - [https://docs.redhat.com/en/documentation/red\\_hat\\_build\\_of\\_quarkus/3.8/html/release\\_notes\\_for\\_red\\_hat\\_build\\_of\\_quarkus\\_3.8/assembly\\_release-notes-quarkus\\_quarkus-release-notes#on\\_difference-between-rhbq-and-community\\_quarkus-release-notes](https://docs.redhat.com/en/documentation/red_hat_build_of_quarkus/3.8/html/release_notes_for_red_hat_build_of_quarkus_3.8/assembly_release-notes-quarkus_quarkus-release-notes#on_difference-between-rhbq-and-community_quarkus-release-notes)
- Enabling support
  - <https://quarkus.io/blog/magic-control/>
  - Benefits : CVE updates / open support tickets with SLA
  - Already part of your contract

# Quarkus support

- Component support
  - <https://access.redhat.com/articles/7040491>
  - Micrometer / tracing reimplementation in Quarkus
  - Noticeable components that are not supported
    - Kafka client
    - Mongo client
    - Kotlin language
  - Unsupported component
    - Ask / negotiate exception with Thomas Q.
    - Otherwise considered as third-party library
- Vert.x 5
  - Winter 2025 - Spring 2026

# Noticeable 4.x features

- Virtual threads
- TCP traffic shaping
- Client/server certificate replacement
- Dynamic SQL pool connection creation
- Web client URI templates
- HTTP Proxy