

Cr33ps

`BOOM` he said.

# Cre3ps

- Multi-agent AI fight in 3d space.
- Broadcasted in SM using minecraft has a render engine.

# Cr12ps

- Agent types:
  - Probe
  - Scout
  - Templar
  - Beacon
- Building types:
  - Nexus
  - Pylons
  - Photon Canons
- Some cool weapons:
  - Ion Canons
  - LAAAAAZOOOORRZ
  - Lava Balls

# Cr3eps

- We provide servers
- REST APIs.
- Json.
- You develop clients connecting to this API.

# Creeps

- Focus of the rush is proper usage of modern java async features.
- Not AI.
- Not Minecraft (even though you will interact with the landscape).

# CrOOps

- The better your understanding and use of async paradigm, the more agent you will be able to spawn.
- Hence, numerical domination AH AH AH !!!!  
(sadistic laugh in background).

# CroOps

- We provide a working seed project.
- You implement your ideas in it.
- There is some code in it too. Feel free to use it.

# Croops

- Unirest
  - Http Requests made easy
  - GET and POST requests
  - Abstraction of Https requests

```
Unirest.get("/status").asJson()
```

```
Unirest.post("/command").body("{}").asJson()
```



# Cr3-ps

- `Unirest.get("/status")`
- Without `as[Json|String|...]`, request is not made
- Useful when passing parameters to the request:
- `req = Unirest.post("/command");`
- `if (unit.getId() != null)`
- `req.field("unitId", unit.getId());`
- `req.asJson();`

# Cr-3ps

- Execute asynchronous code
- Signature:
- `CompletableFuture<String> future =  
CompletableFuture.supplyAsync(() -> ... )`
- `future.get()` is waiting for the lambda to execute

# Cr—ps

- CompletableFuture can chain calls on the same line
- When chaining calls, your return will be passed to the next step
- The CompletableFuture should be specialized on the type of the last step
- Final result is retrieved by `future.get()`

# Cr<3ps

```
CompletableFuture<Integer> future =  
CompletableFuture.supplyAsync(() -> {  
  
    return Unirest.get("/status").asJson();  
  
}).thenApply((response) ->  
response.getBody().getObject().get("id").getInt());
```

// Possible other thenApply

```
Integer id = future.get();
```

# ^Cr[e]\*ps\$

- Eclatez vous... et votre voisin.

