

Learning programming with Minecraft on OpenShift

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Agenda

- Run a Minecraft Server on OpenShift
- Change Minecraft Plugin on GitHub, restart server
- Change Minecraft Plugin in Che, HOT reload
- Use ScratchX to mod Minecraft
- Tech? Future?? You???

MSX BASIC version 2.1
Copyright 1986 by Microsoft

Disk BASIC version 1.0
Ok

```
10 print "Hi"  
20 input "A";a  
30 input "■"
```

color cload" cont list. run

**** COMMODORE 64 BASIC V2 ****

64K RAM SYSTEM 38911 BASIC BYTES FREE

READY.
█

Minecraft Server on OpenShift

<https://github.com/OASIS-learn-study/s2i-minecraft-server>

<https://github.com/OASIS-learn-study/swissarmyknife-minecraft-server>

Change Minecraft on GitHub

Change Minecraft in Eclipse Che

oasis.learn.study

OPEN community Minecraft server: OASIS.learn.study

Play!

<https://www.learn.study>

OASIS.learn.study is an *OPEN* Minecraft server community.

Connect your Minecraft (PC Java Edition 1.12.2) to:

```
oasis.learn.study
```

More?

[News](#)

[FAQ](#)

[DevOps](#)

[Sources](#)

Scratch.mit.edu

<https://github.com/vorburger/minecraft-storeys-maker/>

Code

- Motion
- Looks
- Sound
- Events
- Control
- Sensing
- Operators
- Variables
- My Blocks
- Minecraft

```
apple contains a ?
```

```
mod
```

```
round
```

```
abs of
```

Variables

```
Make a Variable
```

```
my variable
```

```
set my variable to 0
```

```
change my variable by 1
```

```
Make a List
```

My Blocks

```
Make a Block
```

Minecraft

```
when Player joins
```

```
when Entity right clicked
```

```
when inside 10 10 10 10 10
```

```
Entity speaks
```

```
/ demo
```

```
title Welcome!
```

```
when Player joins  
title Welcome!
```






```
when inside 5 33 15 13 33 15  
Jhon speaks how dare you
```



Next Steps

You're ready to start working. Your new application contains a sample codebase to get you started, as well as a README.md file that contains instructions on how to run and interact with your application.

Working Through Setup

-  Creating your new GitHub repository <https://github.com/edewit/minecraft-server>
-  Pushing your customized Booster code into the repo
-  Creating your project on OpenShift
-  Setting up your build pipeline
-  Configuring to trigger builds on Git pushes

[Start a new project](#)

PS: How to never write a Dockerfile (S2I)

```
FROM: java? openjdk?? jre-alpine???
```

```
java -jar -Xmx? -XX:+UnlockExperimentalVMOptions??
```

```
s2i build / oc new-app!
```

```
.s2i/environment: ARTIFACT_DIR, ARTIFACT_COPY_ARGS
```

fabric8/s2i-java now with Gradle & Maven Wrapper (./mvnw) support!

<https://github.com/fabric8io-images/s2i/tree/master/java/examples>

PS: How to hack into an OpenShift Cloud (*)

Some OpenShift [k8s] installations will let you expose a LoadBalancer on any port.

Others only allow HTTP ingress - e.g. OpenShift Online.

The `oc port-forward` CLI tool is a way in... put in container, and run outside!

Except it doesn't work? Unless you use `socat` magic! ;)

<https://github.com/OASIS-learn-study/oc-port-forward-container>

(*) iff ;-) you have its login token (like password)

Resources

1. <https://www.learn.study> : oasis.learn.study MC server
2. <https://github.com/vorburger/minecraft-storeys-maker>
3. <https://github.com/edewit/minecraft-sponge-plugin-s2i>
4. <https://github.com/vorburger/s2i-minecraft-server>
5. <https://github.com/vorburger/ch.vorburger.minecraft.osgi>
6. <https://www.openshift.com> (.org)

CU on our learn.study MCS

and on GitHub PRs