

Zero-Setup Workshops with GitHub Codespaces

David Smith
Cloud Advocate, Microsoft
[@revodavid](https://twitter.com/revodavid)

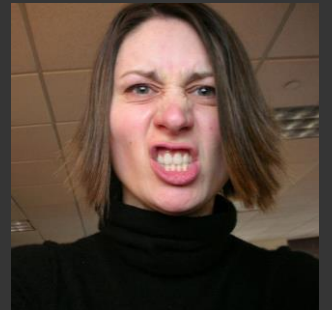


"It works on my machine..."



How do I install R?

Your code doesn't work!



But I'm running Debian...

I'm getting "out of memory errors"



Dev Containers

A standardized container setup, designed for running code

- `.devcontainer` folder in repository

Same experience for every user

100% Open Source, CLI for integration into other services

More info: <https://containers.dev/>

.devcontainer/Dockerfile

```
# R version: 4, 4.1, 4.0
```

```
ARG VARIANT="4"
```

```
FROM rocker/tidyverse:${VARIANT}
```

```
RUN install2.r --error --skipinstalled --ncpus -1 \  
    devtools \  
    tidyverse \  
    ...
```

.devcontainer/devcontainer.json

```
"settings": {  
    "r.rterm.linux": "/usr/local/bin/radian",  
},  
  
"postCreateCommand": "sudo rstudio-server start",
```

Summary

Create tutorials / workshops as GitHub repositories

Include scripts, data, notebooks, instructions

Include and configure Dev Container

Software environment to support code

Participants: Run in GitHub Codespaces

Available with GitHub Enterprise or GitHub Education

(or locally: github.com/revodavid/devcontainers-r)

Thank you!

Slides, links and Dev Container:
github.com/revodavid/devcontainers-rstudio



David Smith
davidsmi@microsoft.com
@revodavid

Microsoft Workshop Library

A library of AI/ML and Data workshops with Dev Container support and “train-the-trainer” videos

Topics include:

- [Explore and Analyze Data with R](#)
- [Introduction to Regression Models with R and Tidymodels](#)
- [Introduction to Classification Models with R and Tidymodels](#)

github.com/microsoft/workshop-library