Mapping FOSDEM for accessibility

The team
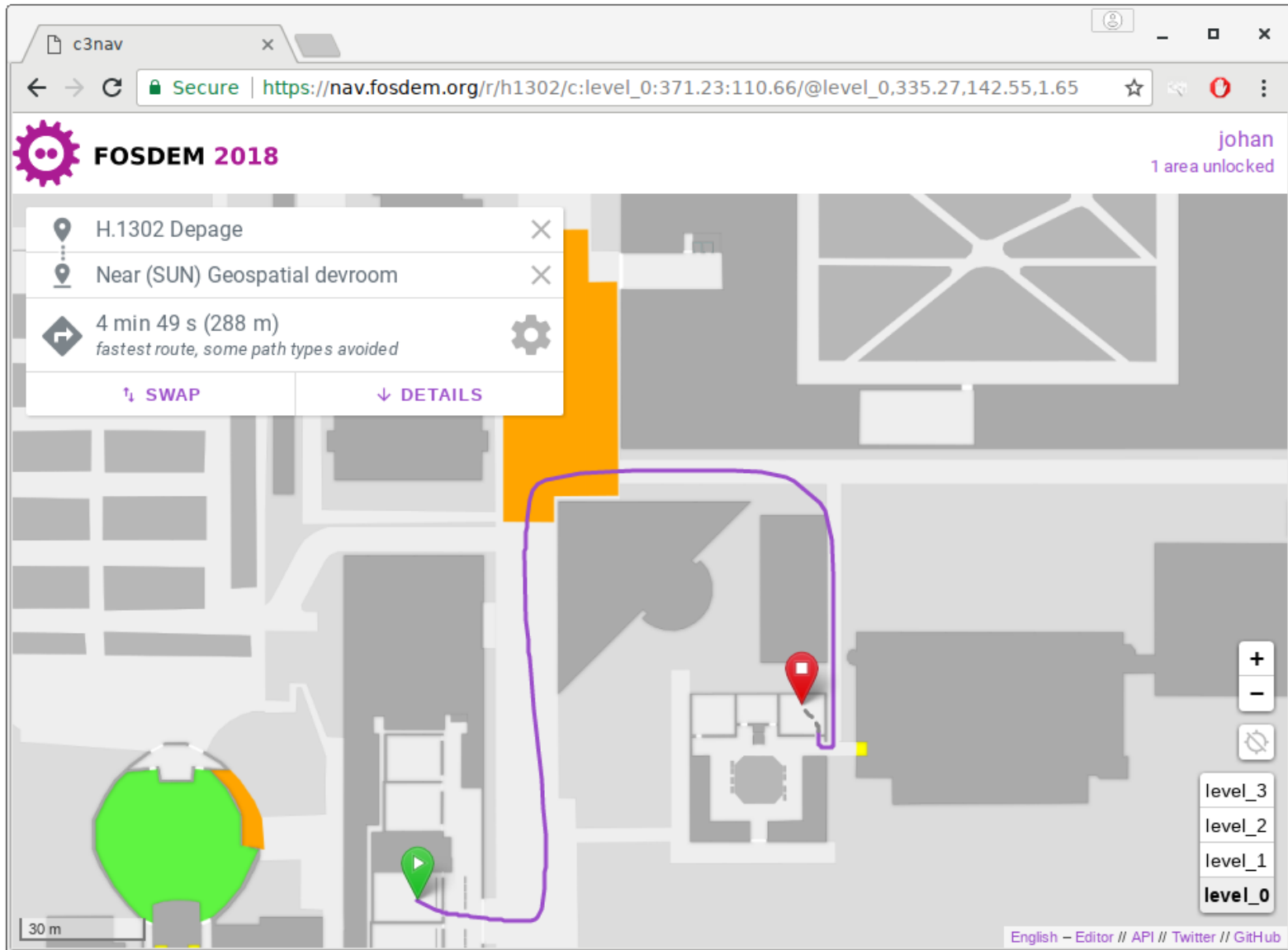
- Laura
  - https://codingcatgirl.de/
  - Created C3NAV

- Shin Ice
  - Linux Sysadmin (Germany)
  - Fosdem volunteer for different years

- Johan Van de Wauw
  - Developing sensor solutions at Fluves/Marlinks
 - Freelance data scientist
  - OSGeo, SAGA-GIS, Debian GIS

Why

After State of the Map 2016

I'm looking for a volunteer to help FOSDEM make optimal use of OpenStreetMap and make the ULB Solbosch campus openstreetmap mapping exemplary. I'm specificly thinking about indoor maps, wheelchair accessibility and (hopefully) wheelchair routing.

In my dream scenario, I could provide extensive interior mapping data, hand drawn wheelchair routes, pictures if needed and answers to whatever questions may arise, and we would end up with a campus map that allows wheelchair specific routing. Even if that is probably wishful thinking, I'm sure there's some potential for improvement, and I'd be glad to hear about that...
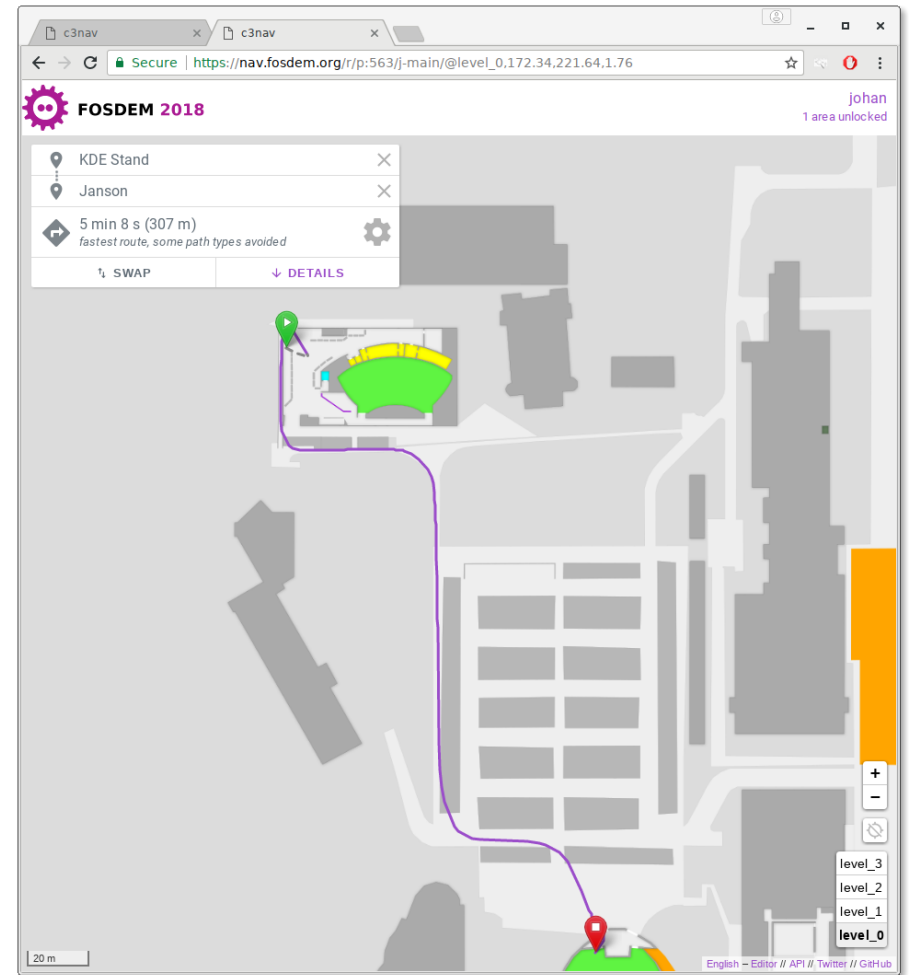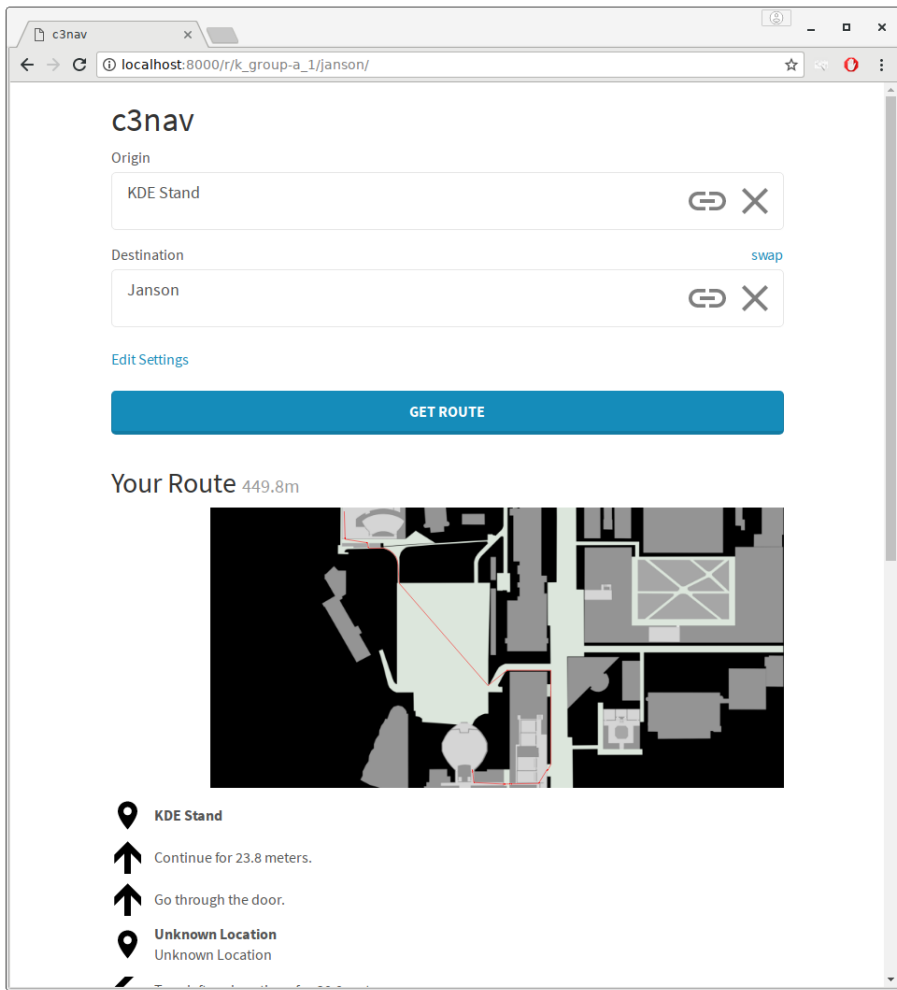
Openstreetmap
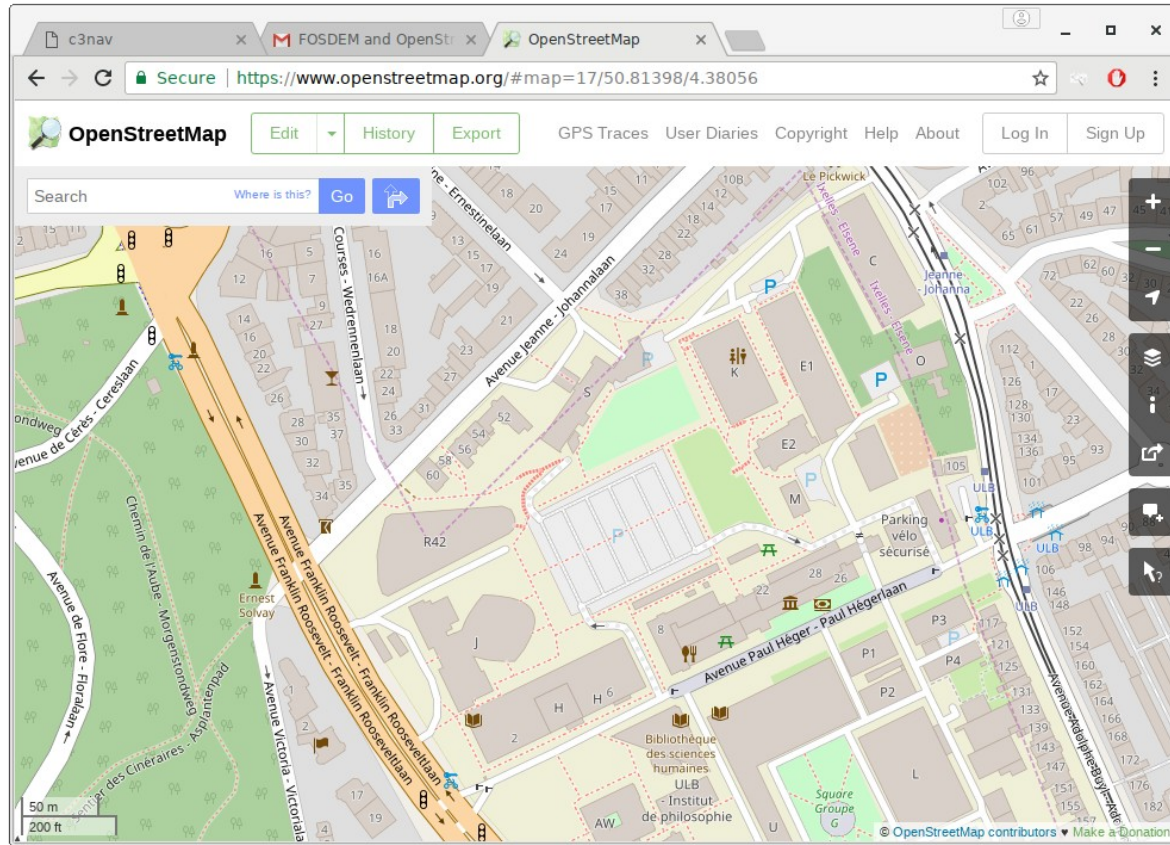
Openstreetmap

- Temporary data

- Floors

- Wheelchair access

- Routing
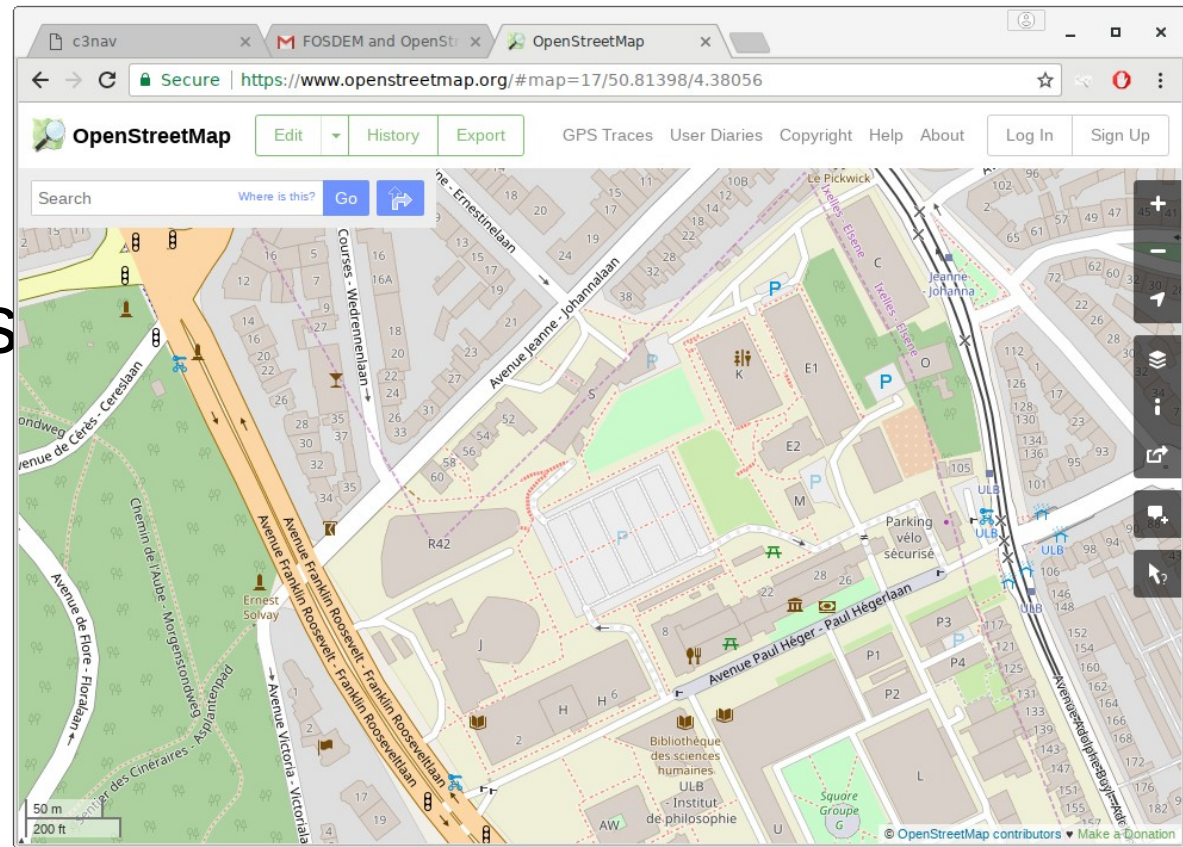
Proposal: use c3nav, an indoor navigation tool built for the CCC conference
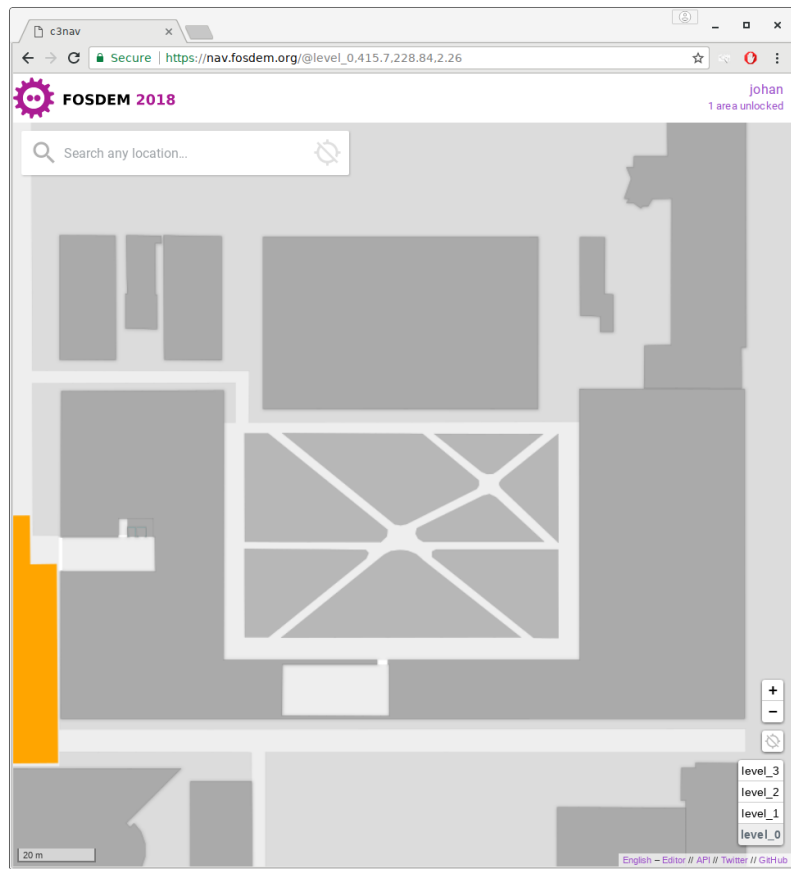
https://34c3.c3nav.de/

C3NAV

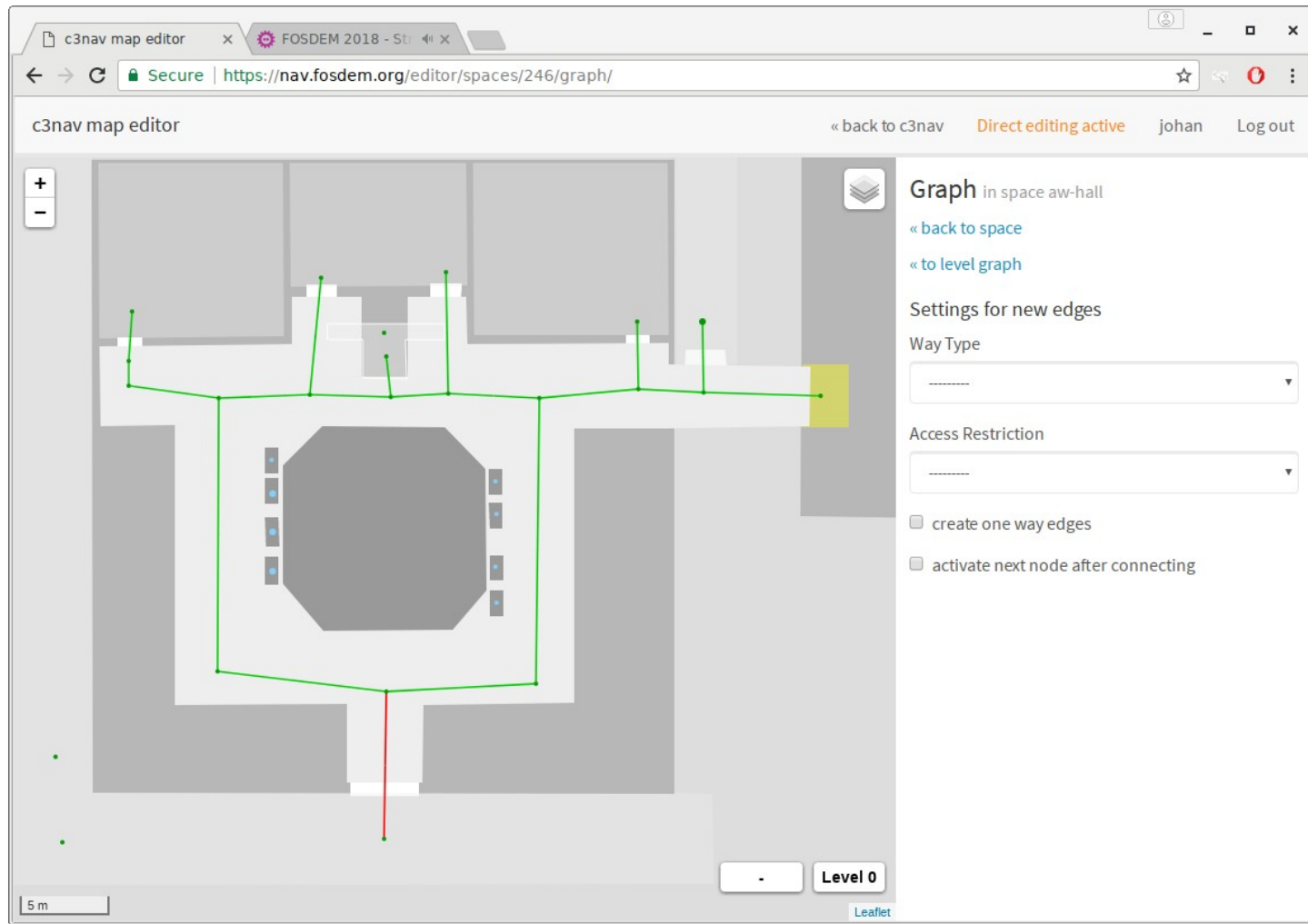# Challenges of indoor mapping

- What is level 0

Editor

- (demo)
- Hierarchic:
- Level
  - Space
    - Area
    - Obstacle
    -

Graph

C3NAV supports more than we use

- Elevation
- Stairs
- 3D export
- Location based on wifi
- Android app

Coordinate system

- Map was not originally projected

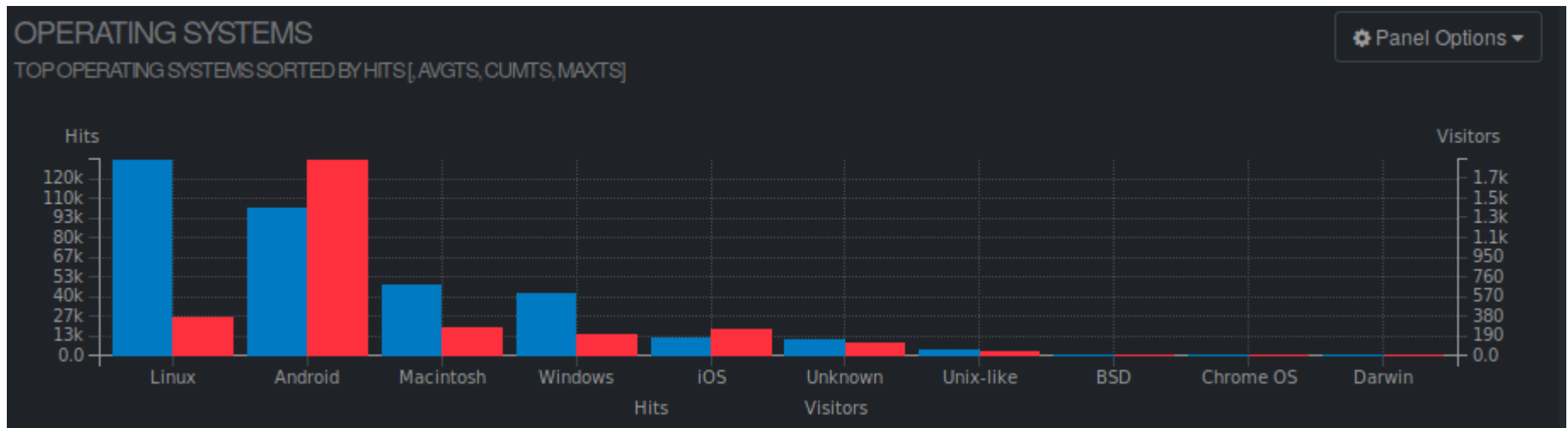- If we get this right we can use other tools to work with the data

Behind the scenes

- C3NAV
  - Python3 (3.6)
  - Django
  - Leaflet
- Optionally
  - Postgres
  - Redis
  - Celery
  - Memcached (tiles)

Want more

- https://nav.fosdem.org

- https://nav.fosdem.org/editor/

- Grab the data:

  – https://nav-test.fosdem.org/data

- Get C3NAV

- Get our deploy scripts (ansible maps and maps-tileserver roles)

  – https://github.com/FOSDEM/infrastructure/tree/master/ansible/playbooks/roles/maps

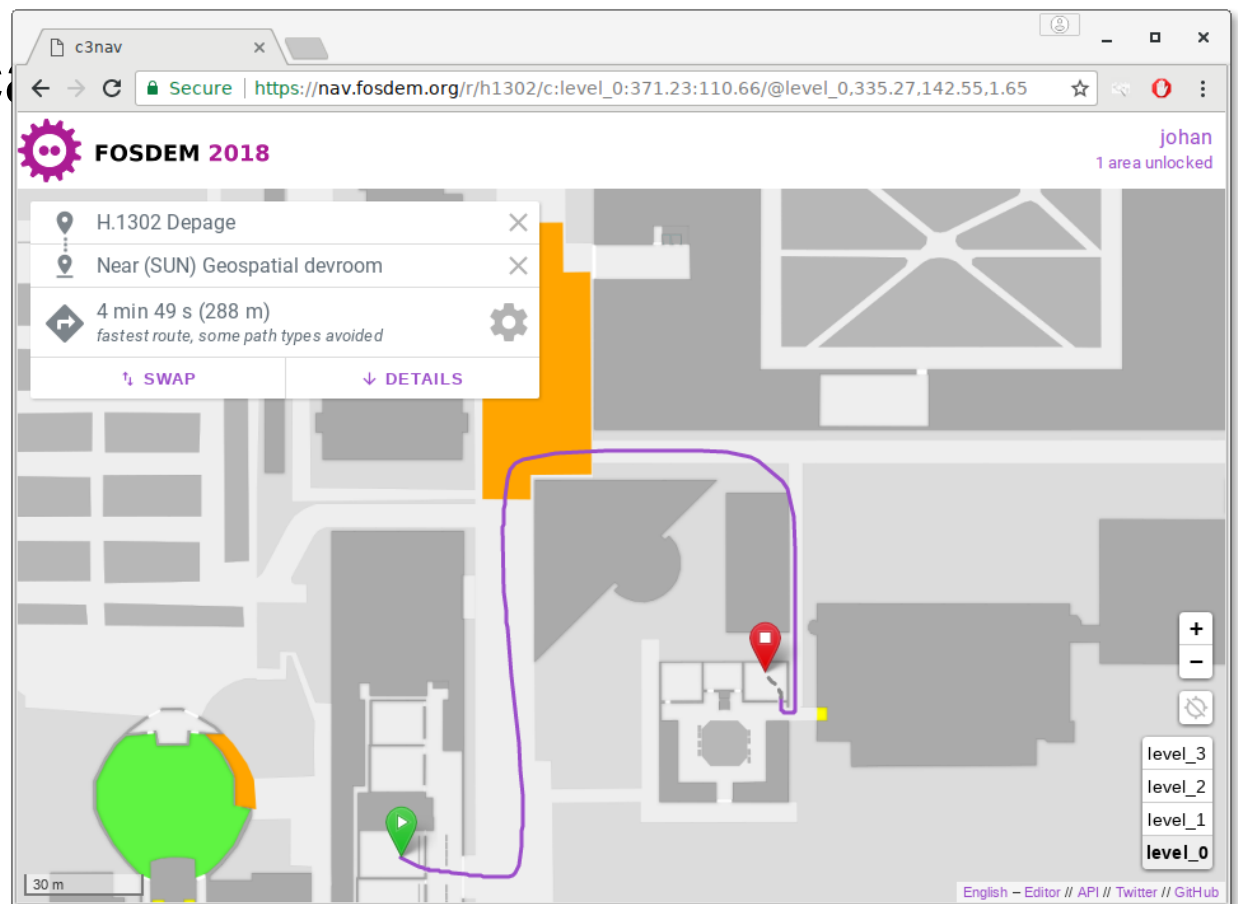 – https://github.com/FOSDEM/infrastructure/tree/master/ansible/playbooks/roles/maps-tileserver

Some stats

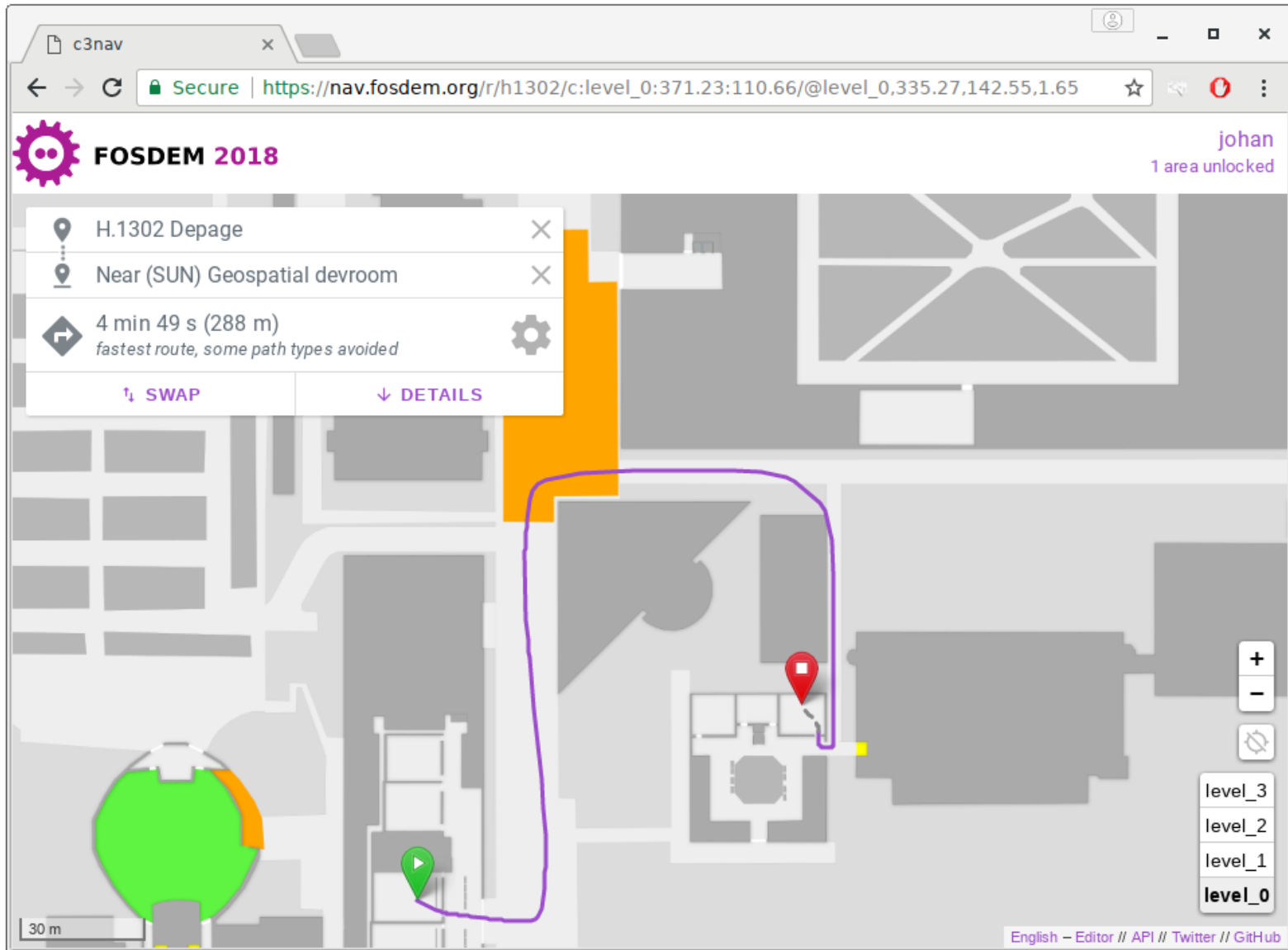- 3195 unique visitors

- Approx 100k hits/day

Discuss

- Specific needs for a conference make C3NAV very useful
  - Perhaps we ca... back?

Thanks for your attention

Help clean up!

- Take everything you see which does not belong here
- Do the same when going through the corridor
- If you have some spare time – go to the infodesks and help with breakdown
-
- Let me know if you make a report
- You can give feedback on talks:
- https://fosdem.org/2018/schedule/event/geo_fosdem/
-
- Johan <at> gisky.be