

ViMo: Visual Analysis of Neuronal Connectivity Motifs

- Supplementary Material -

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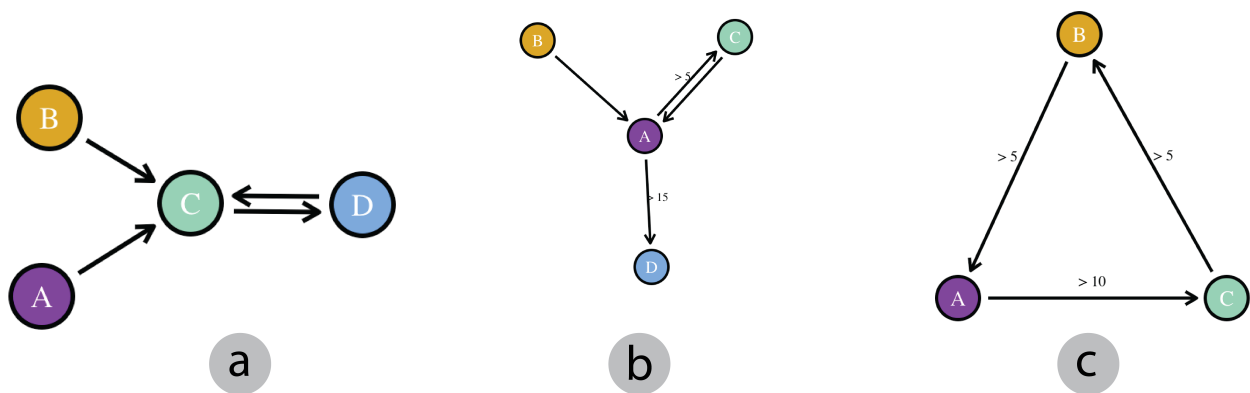


Figure 1: Examples of motifs sketched in the case study. After sketching each motif, users successfully queried the brain network for MIs and analyzed MIs in 3D. To reproduce those motif sketches, users can [import JSON files](#) found (a) [here](#), (b) [here](#), and (c) [here](#).

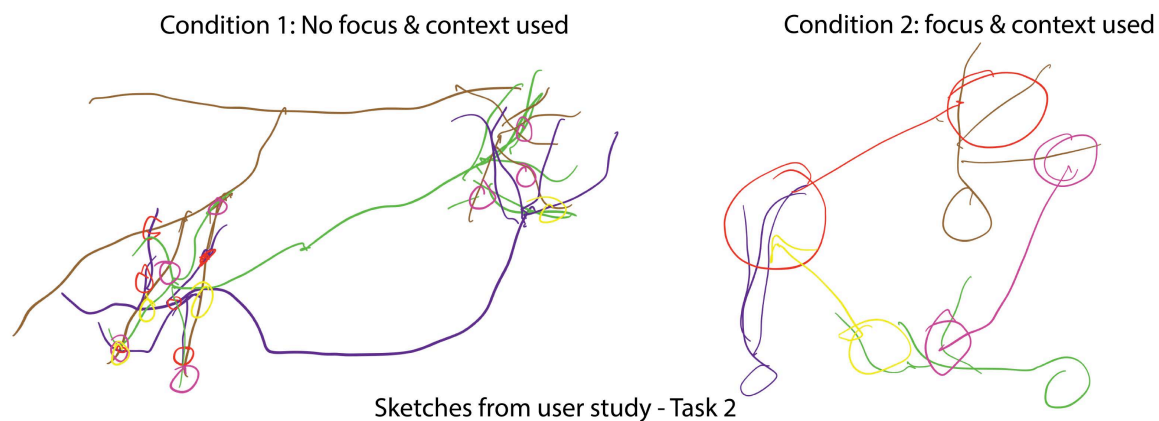


Figure 2: User illustrations of motif connectivity. In task 2 of the qualitative user study, experts illustrated their understanding of motif connectivity. For the first condition, they were not allowed to use Vimo's focus&context approach, while they were allowed to use it in the second condition. We found that using our focus&context method resulted in clearer illustrations, indicating a better understanding of motif connectivity.

Repository Overview:

- Owner: jakobtroidl
- Repository: neuronal-motifs (Public)
- Unpin, Unwatch (3), Fork (0), Star (0)
- Code, Issues (7), Pull requests (5), Discussions, Actions, Projects, Wiki, Security (7), Insights, Settings
- main branch, 72 branches, 0 tags
- Buttons: Go to file, Add file, Code

File List:

File	Commit Message	Time Ago
docs/images	added motif example	4 months ago
example_motifs	Update README.md	3 hours ago
neuronal_motifs	Merge remote-tracking branch 'origin/main' into main	23 hours ago
.gitignore	updates	2 months ago
LICENSE	first commit	10 months ago
README.md	Update README.md	4 days ago
cloudbuild.yaml	Update cloudbuild.yaml	3 days ago
docker-compose.yml	adding continuous deploy	3 months ago
package-lock.json	Merge branch 'main' into jinhan-cache	2 months ago

README.md Content:

Neuronal Motifs

An interactive tool for querying and visual analysis of network motifs in large connectomics data.

Demo

A demo is available under my-motifs.me. Before you get started, please add your personal neuprint authentication token under **Settings > Auth Token**. You can find your token [here](#).

Installation

Requirements

- Node.js
- conda

Clone the repository:

```
git clone https://github.com/jakobtroidl/neuronal-motifs.git && cd neuronal-motifs
```

Install/activate the conda environment and start the backend:

Repository Statistics:

- About: interactive search and analysis for neuronal motifs
- my-motifs.me/
- visualization, graph-visualization, connectomics
- Readme, MIT license, 0 stars, 3 watching, 0 forks
- Releases: No releases published, [Create a new release](#)
- Packages: No packages published, [Publish your first package](#)
- Contributors (4): jakobtroidl (Jakob Troidl), simonwarchol (Simon Warchol), jinhan (Jinhan Choi), KidiH (Kidist Alemu)
- Languages: JavaScript 87.7%, Python 10.8%, CSS 1.1%, Other 0.4%

Figure 3: Vimo is open-source. Our GitHub repository gives access to all code, setup instructions, user tutorials, and a live demo. <https://github.com/jakobtroidl/neuronal-motifs>