Bioinformatics session

A two-day workshop for bioinformaticians and molecular biologists with focus on the TSO500 pipeline in InPreD
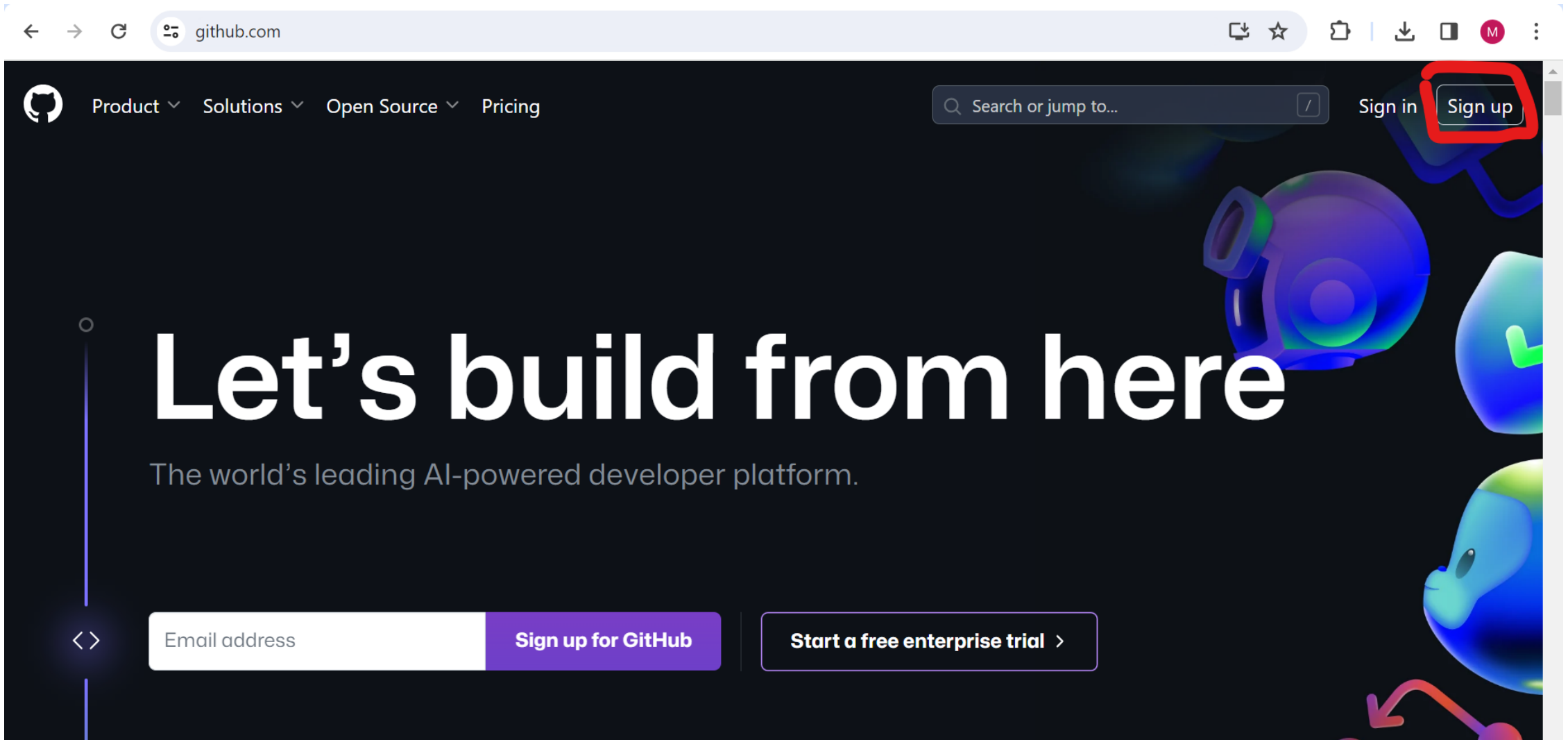
Overview

1. Setup

2. Development & Collaboration

3. Nextflow

4. tso500_nxf_workflow

5. Python

1. Setup

Create a GitHub account

- go to https://github.com/ and click on `Sign up`

1. Setup

Be added to InPreD organisation at GitHub

1. Resources

- Getting started with your GitHub account

2. Development & Collaboration

- short git introduction (basic git commands, optional)
- branching system (gitflow workflow)
- github actions (linting, testing, building)
- pull requests (best practice)
- release and semantic versioning
- licensing

- nextflow
  - general (install, best practice)
  - nf-core template
  - stubbing

- tso500_nxf_workflow
  - status
  - demonstration

- python
  - general (best practice, cli)
  - unit testing (pytest)

Resources

- Gitflow
- github actions
- nf-core
- pytest unittesting
- semantic versioning