```
<figure markdown="span">
     ![Image](assets/credits.png)
     <figcaption>Active Maintainers/Creators</figcaption>
  </figure>
  The project is maintained by two core developers who each own a unique
   layer of the system.
Virtual Machine VIREX | Assembly Language SASM | Compiler ORIN | Editor Support VS Code | License GPL3
!!! tip ""
=== "Soham Metha"
   ![Soham's Avatar](https://www.github.com/Soham-Metha.png){ width="120px"
   style="border-radius: 50%;padding: 4px;" }
  > **Role**: Lead Developer <br>
  > **Modules Owned**: VIREX VM, SASM Assembler, VS Code Extension, Docs
   - Designed the **VIREX** Virtual Machine architecture.
   - Developed the **SASM Assembler** and complete instruction set.
   - Built tooling: AST visualizer, debug tools, and VS Code syntax
  extension.
   - Authored all core documentation.
   - Maintains the monorepo, versioning, and long-term roadmap.
  > *"VIREX is a hands-on way to explore systems programming, not just
  study it."* <br>
   [![](https://img.shields.io/badge/Language-C-blue)]
   (https://en.wikipedia.org/wiki/C_(programming_language)) [![]
   (https://img.shields.io/badge/Project-VIREX-success)]() [![]
   (https://img.shields.io/badge/Project-SASM-success)]()
=== "Omkar Jagtap"
         { width="120px" style="border-radius: 50%;" }
   [![](https://img.shields.io/badge/Language-C-blue)]
   (https://en.wikipedia.org/wiki/C_(programming_language)) [![]
   (https://img.shields.io/badge/Project-ORIN-orange)]() [![]
   (https://img.shields.io/badge/Target-SASM-lightgrey)]()
```

```
> **Role**: Compiler Engineer - ORIN <br>
> **Modules Owned**: ORIN Compiler (WIP), Custom Hashtable
Implementation
```

- Designing and implementing **ORIN**, the high-level language compiler targeting SASM
- Handles the full compilation pipeline: parsing, IR generation, and SASM output
- Exploring advanced features like expression optimization and static analysis
- > *"ORIN aims to make high-level programming compatible with low-level control."*

Acknowledgments

We'd like to thank:

- Tsoding, Dr Birch, Low Byte Productions, Cobb Coding for foundational resources.
- The open-source ecosystems around JVM, and language tooling.
- Friends and testers who offered feedback during early development stages.

Contact & Community

- GitHub: github.com/sohammetha/virex
- Interested in contributing? Check out CONTRIBUTING.md

VIREX is open. Hackable. Minimal. Built for builders.