



VectorBlox
embedded supercomputing

Microsemi Bitstream Programming

ORCA RISC V with the
VectorBlox MXP™ Matrix Processor

First Time

- Start VM and Terminal app

```
$ cd ~
```

```
$ git clone https://github.com/riscv/riscv-4th-workshop-tutorials.git
```

- Program FPGA bitstream

```
$ cd riscv-4th-workshop-tutorials/
```

```
$ cd vectorblox_tutorial/
```

```
$ source env.sh
```

```
$ cd software; vi main.c ; make clean all; cd ..
```

```
$ ./program.sh fpga          #(FPGA & ELF, 15min)
```

```
$ ./program.sh              #(ELF only, 90seconds)
```

- See LEDs blink, “Hello World” and audio pass-thru

```
$ cat /dev/ttyUSB2
```

NATIVE FlashPro Users

Drag & drop

vectorblox_tutorial/FPExpress
folder to host OS