

Graphical Apps without an OS

Single codebase apps everywhere

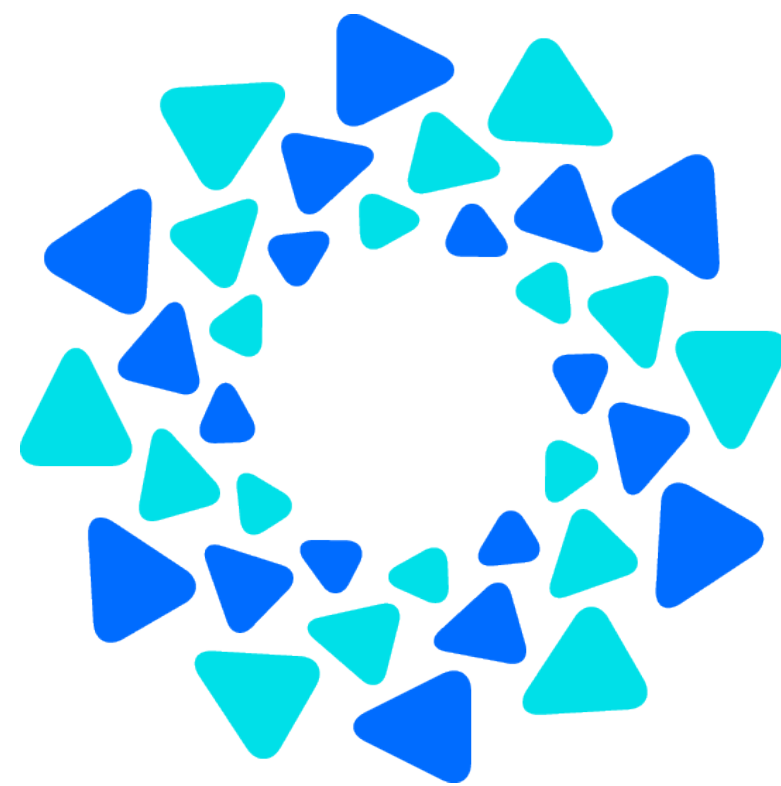
Hello GopherCon!

- Andrew/Andy Williams
- Coder, Founder, Author
- Go/Fyne developer since 2018
- CEO Apptrix.ai
- First time here!



Fyne Introduction

- Write once, run anywhere!
- No user libraries or setup
- Native apps, store support
- Easy to get started
- Promoting good engineering

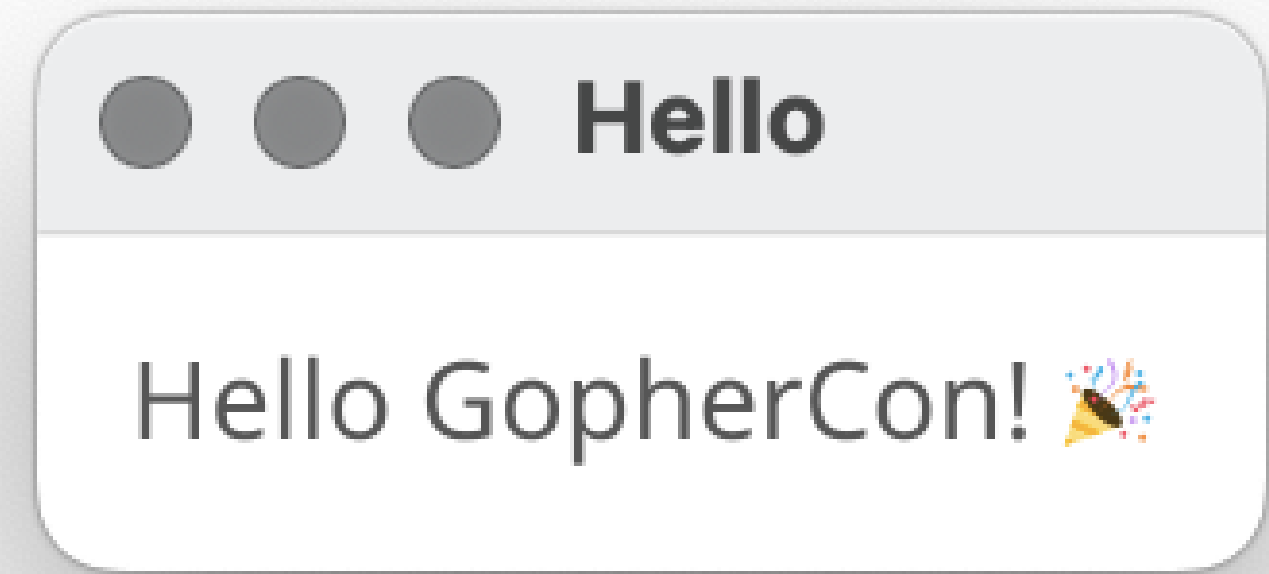
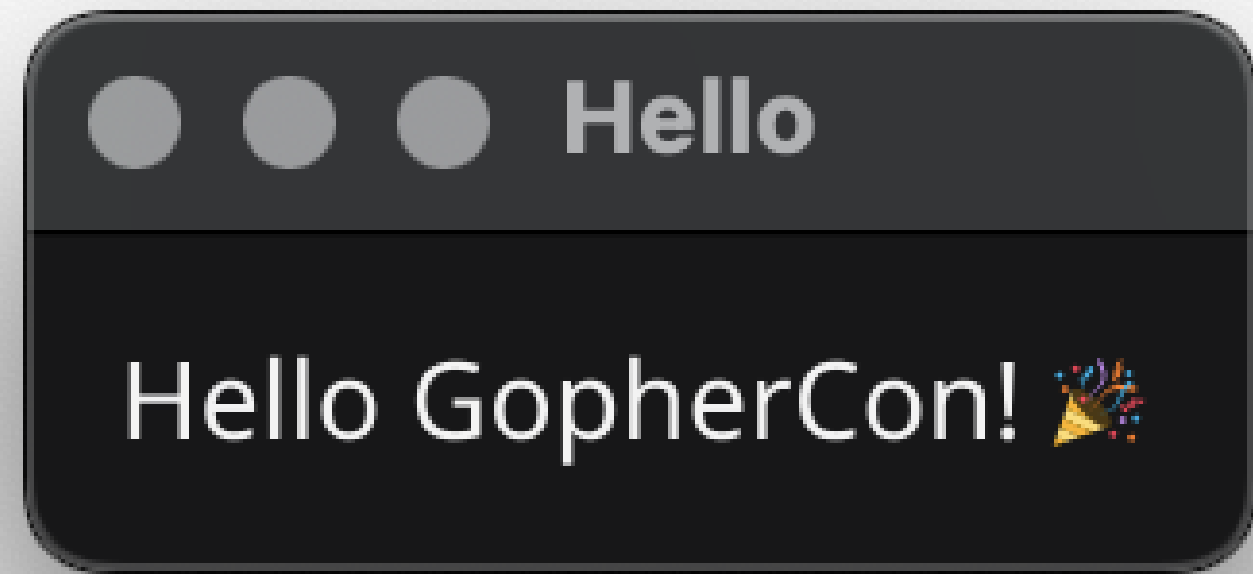


fyne

Fyne Hello World

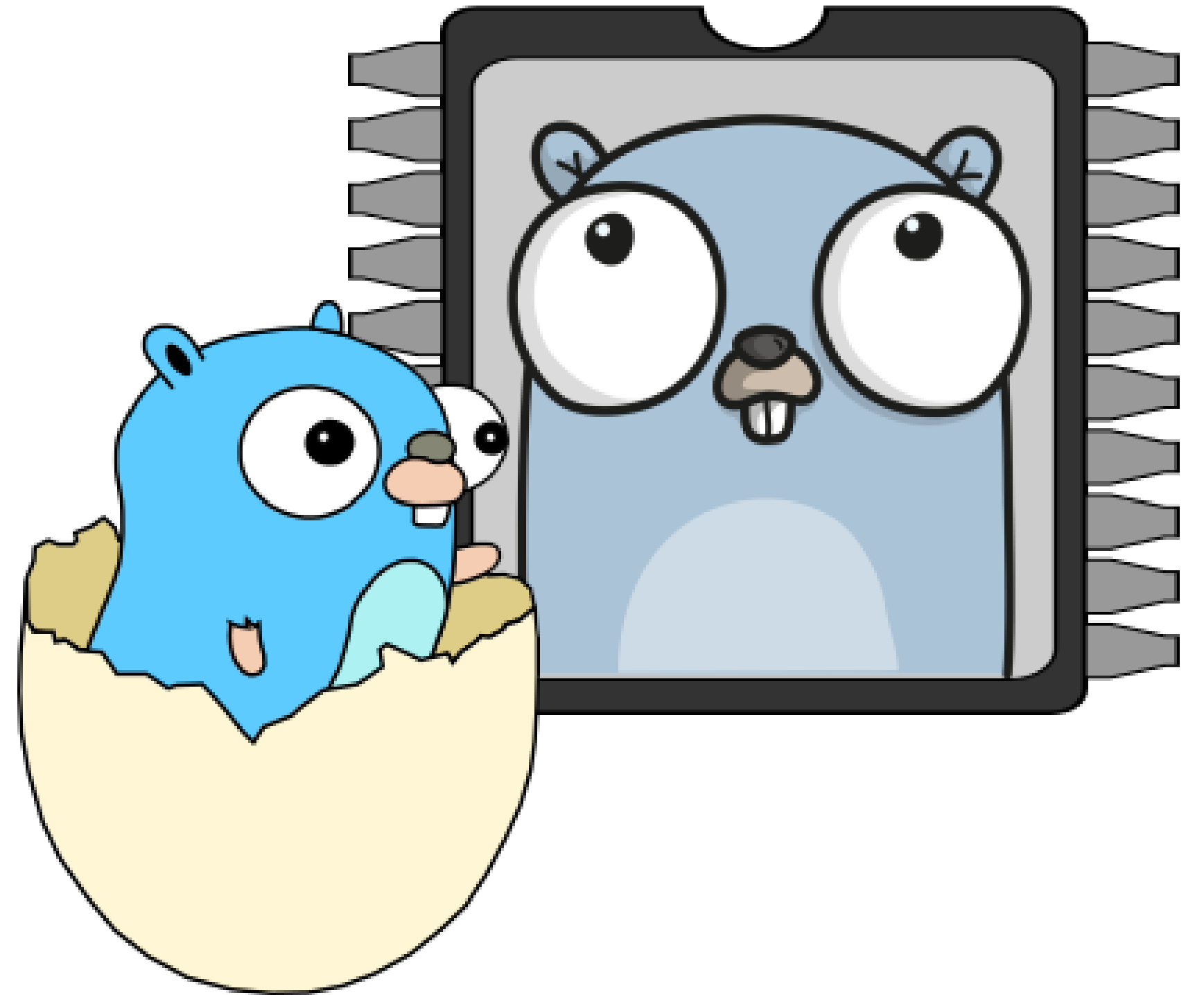
```
1 package main
2
3 import (
4     "fyne.io/fyne/v2/app"
5     "fyne.io/fyne/v2/widget"
6 )
7
8 func main() {
9     a := app.New()
10    w := a.NewWindow("Hello")
11
12    w.SetContent(widget.NewLabel("Hello GopherCon! 🐹"))
13    w.ShowAndRun()
14 }
```

Fyne Hello World



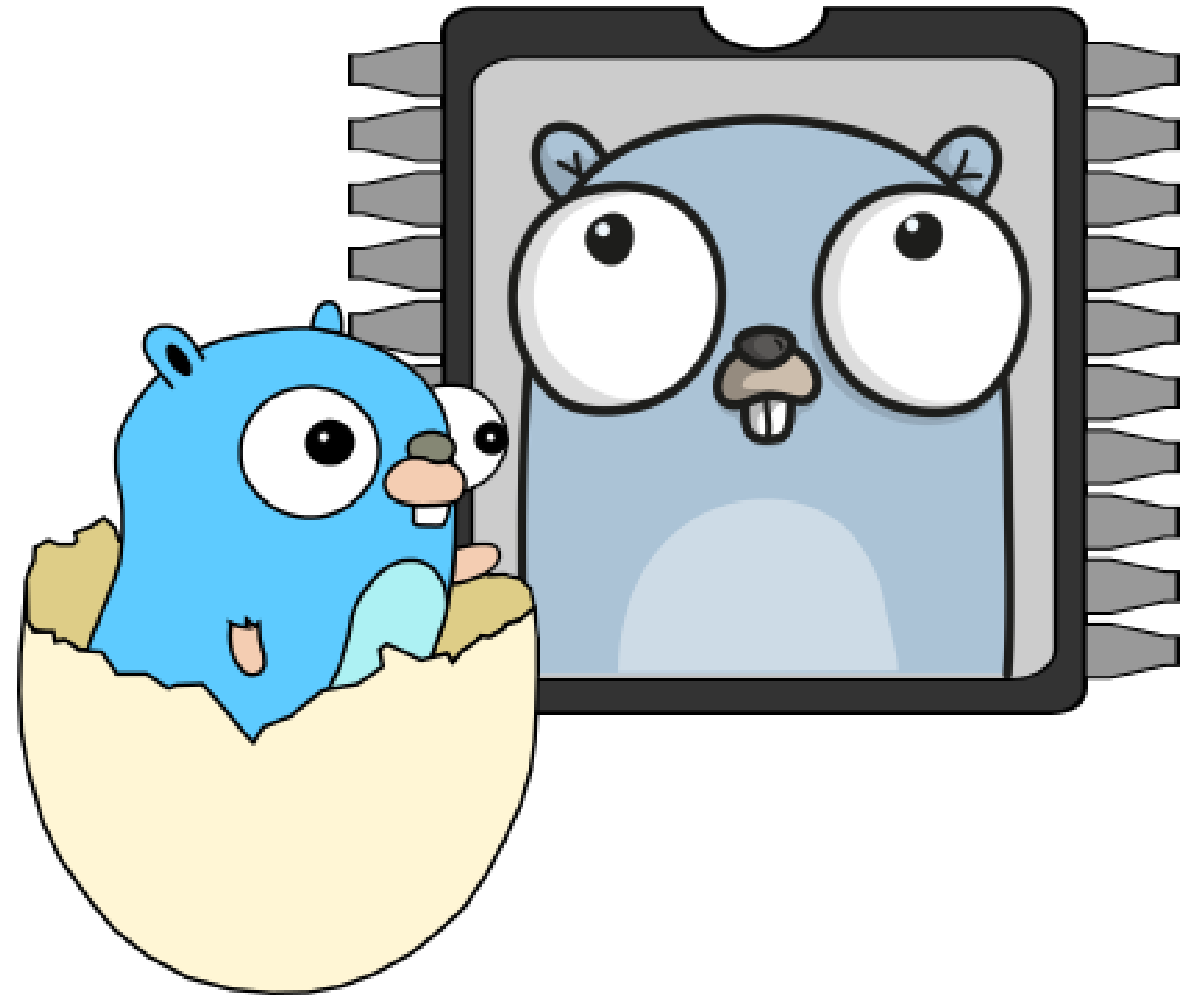
Without an Operating System?

- TinyGo for embedded
- Tamago and GOOS=none
- Custom hardware



Without an Operating System?

- TinyGo for embedded
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-
- Fyne auto-detection is limited



Bridging the driver gap

- Additional custom driver API
- (Define the draw output)
- (Process events from device)
- fyne-x for common devices

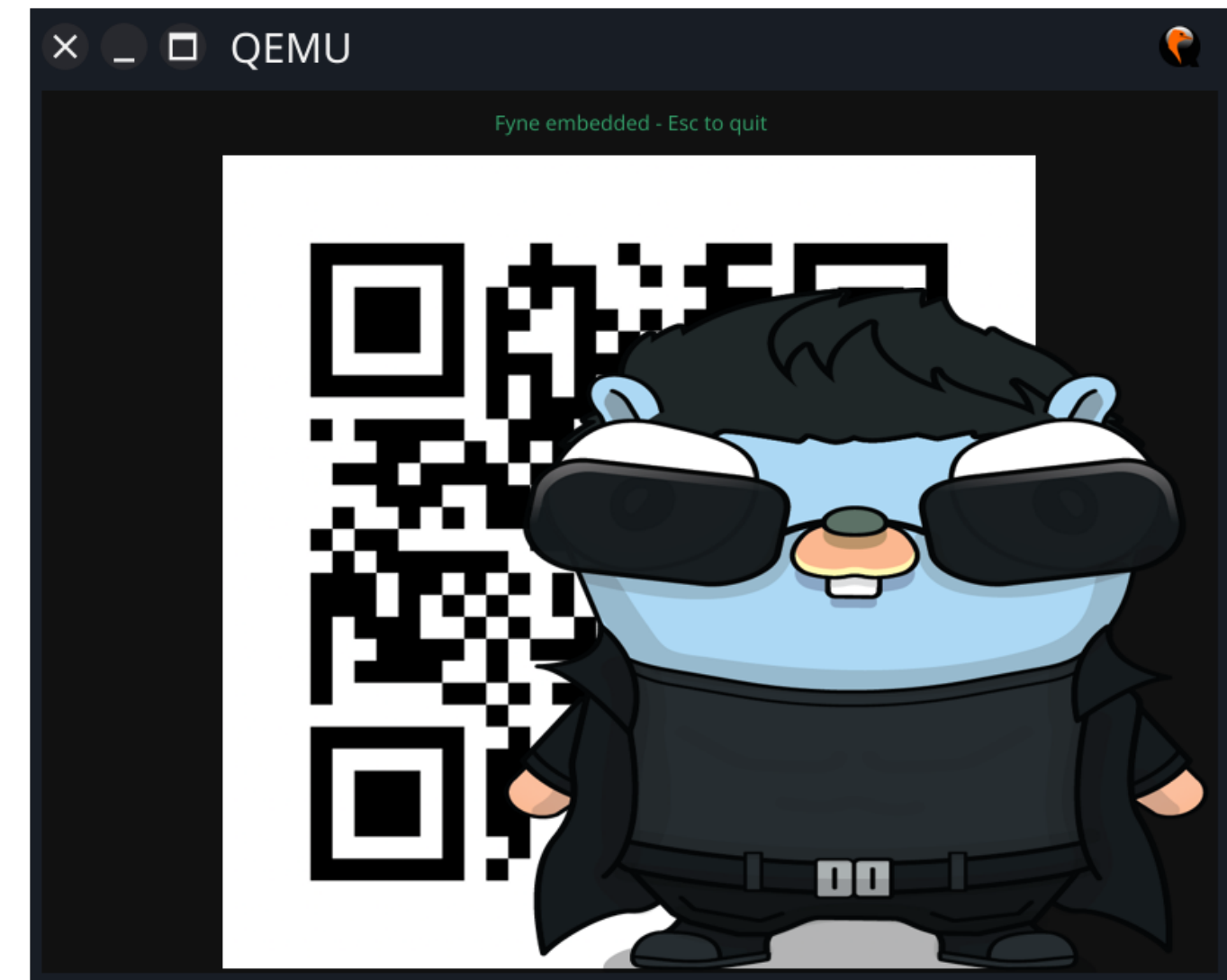
```
1      a := app.New()  
2      app.SetDriverDetails(a,  
3          xEmbedded.NewUEFIDriver())
```


Demo - QEMU

github.com/andydotxyz/presentations

-> 2025-08-27-GopherCon/demo

\$ make qemu



Demo - QEMU

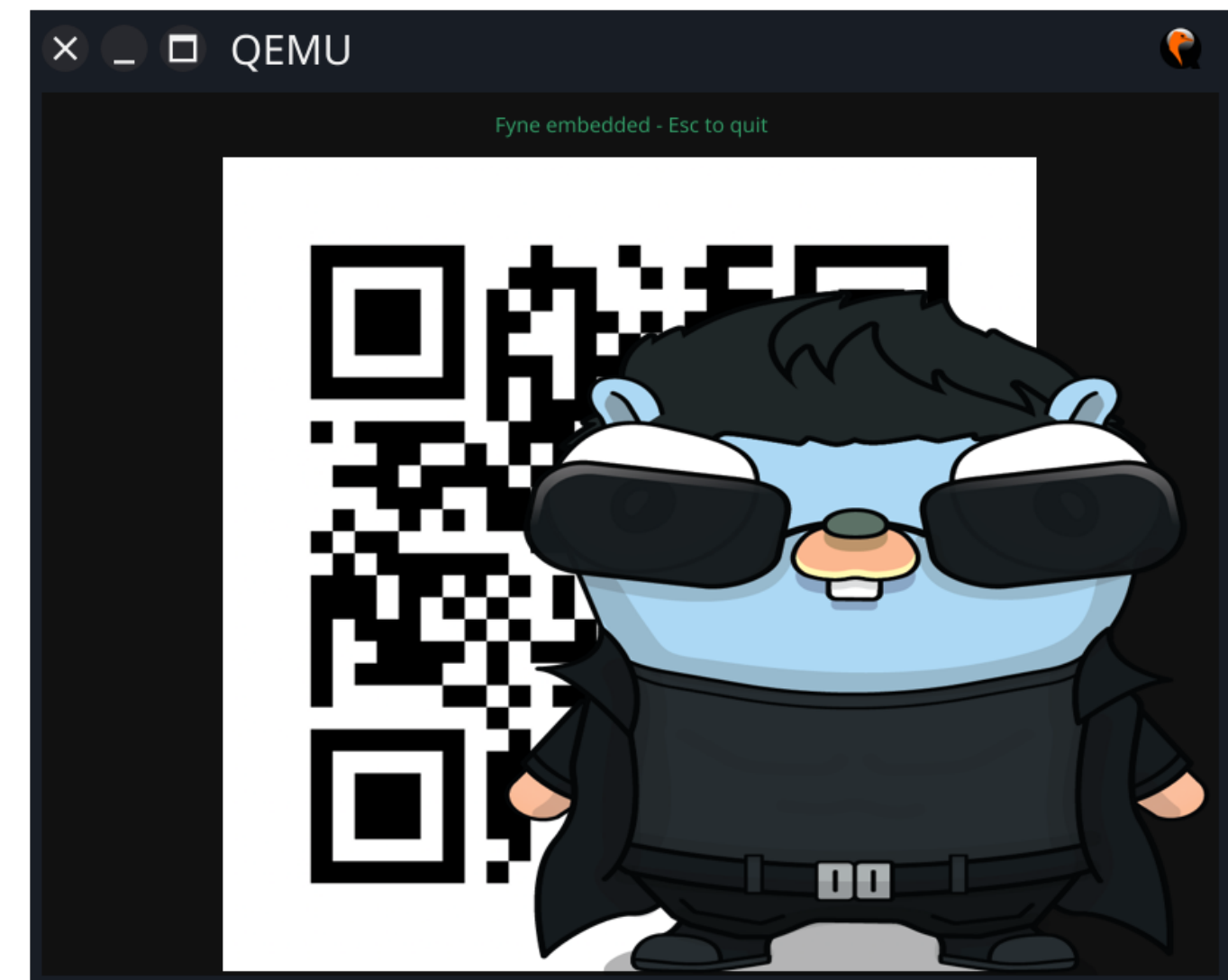
github.com/andydotxyz/presentations

-> 2025-08-27-GopherCon/demo

```
$ make qemu
```

```
$ make tinydisplay
```

```
$ go run .
```



Get involved!

- API design
- Device optimisation
- Slack/Discord/Matrix
- <https://docs.fyne.io/started>
- Fyne Conf - <https://conf.fyne.io>



Created with:

- Slydes slideshow app
- Fyne Terminal
- FyneDesk desktop
- (All Fyne.io toolkit apps)
- Presented on FyshOS



Slydes

File

4

Fyne Hello World

Fyne Hello World

Without an Operating System?

Without an Operating System?

Bridging the driver gap

9 Demo - QEMU

10 Demo - QEMU

11 Get involved!

+++
theme = "gophercon"
+++

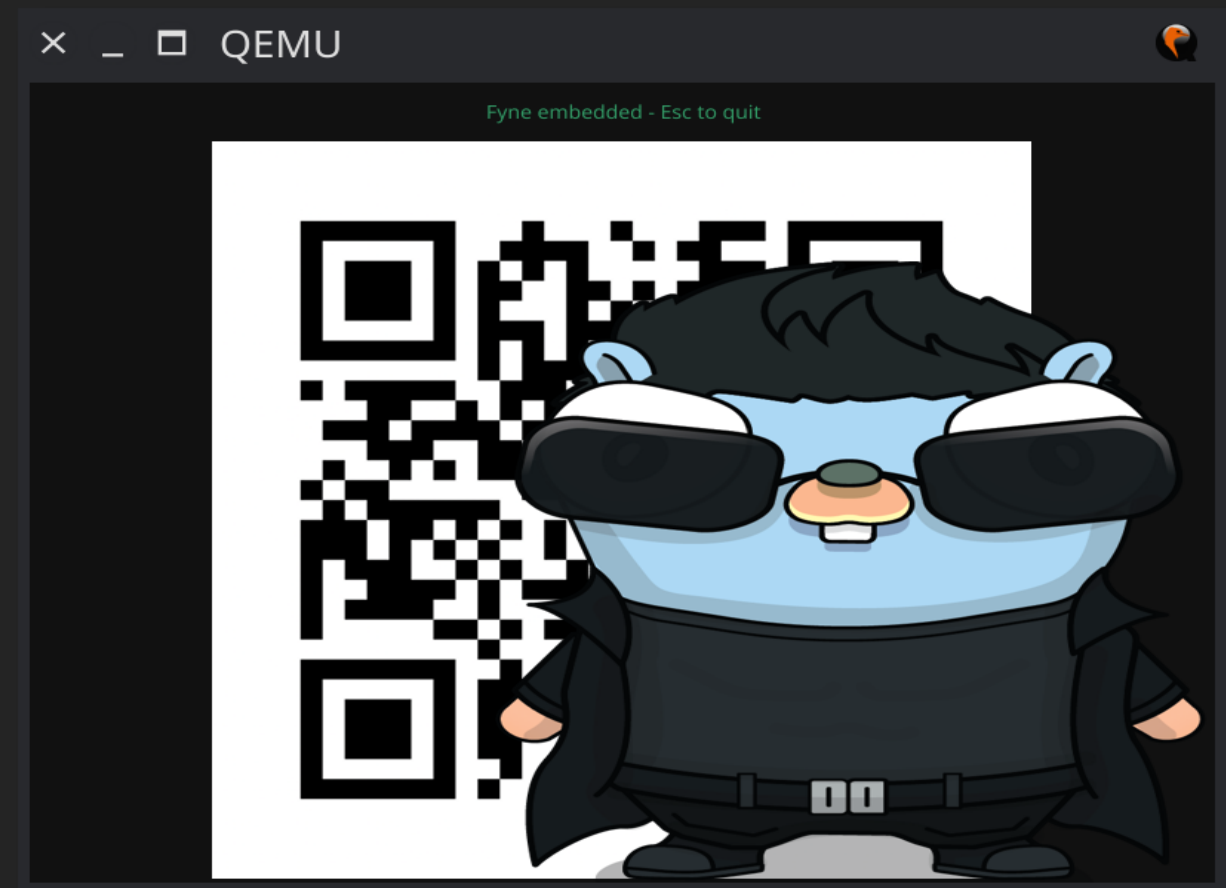
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```
2025-08-27-GopherCon/demo (main) [10:55:24]
bundled.go efi/ Makefile* README.md*
driver-other.go* go.mod* noosdemo.efi*
driver-tamago.go* go.sum* OVMF_CODE.fd*
driver-tinygo.go* main.go OVMF_VARS.fd*
andy@nostromo ~/C/A/p/2025-08-27-GopherCon/demo (main) [10:55:25]
><
```