

# **Adaptive Apps**

The Future is Now

**Tobias Bernard**

# Update

145



# Actual Hardware



Markets

EUR/USD1.2133  
Market Open · Apr 29, 12:42:00 AM  
+0.0038 (+0.0031%)

Apple Inc.133.58  
Market Closed · Apr 28, 10:00:03 PM  
-0.81 (-0.60%)

International Business Machines143.00  
Market Closed · Apr 28, 10:00:01 PM  
+0.99 (+0.69%)

Blanket

Nature

Rain

Storm

Wind

Sun

Full Screen

Preferences

General

Sort Folders Before Files

Expandable Folders in List View

Action to Open ItemsSingle click

Optional Context Menu Actions

Show more actions in the menus. Keyboard shortcuts can be used even if the actions are not shown.

Create Link

Delete Permanently

Performance

These features may cause slowdowns and excess network usage, especially when browsing files outside this computer, such as on a remote

Clocks

15:41

Conversation

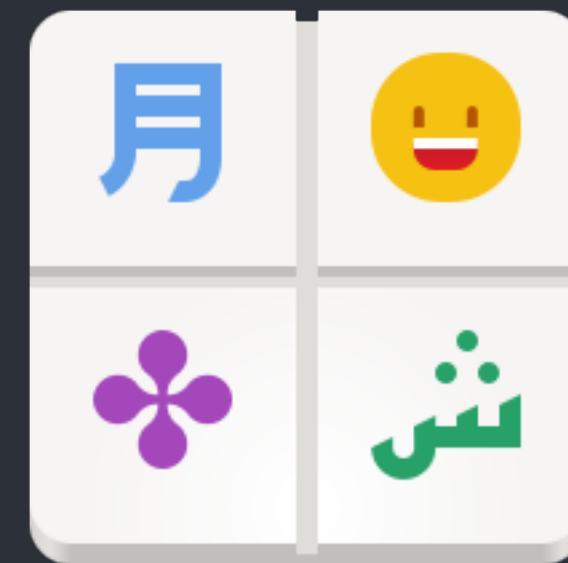
mntmn@mntmn

size/spacing test

Terminal

librem13:~/Projects/gnome-contacts  
~/Projects/gnome-contacts  
609d51d4486edd856c63 (HEAD -> master, origin/master)  
mail.com>  
2021 +0000  
translation  
90a3273433928f153037  
llens@gnome.org>  
2021 +0000  
n  
mit fe27b9164f45d71051e5b08ad630993ab844a8a9)  
c28ced1ade6d80dea2dc  
lsdegraef@gmail.com>  
2021 +0200  
development releases  
think '40.alpha' '40.beta', '40.0' is the correct  
and it by using tilde (which is commonly used to  
ring).  
e7dff0d411d3bfc03e84  
seforb@gnome.org>

# Core Apps

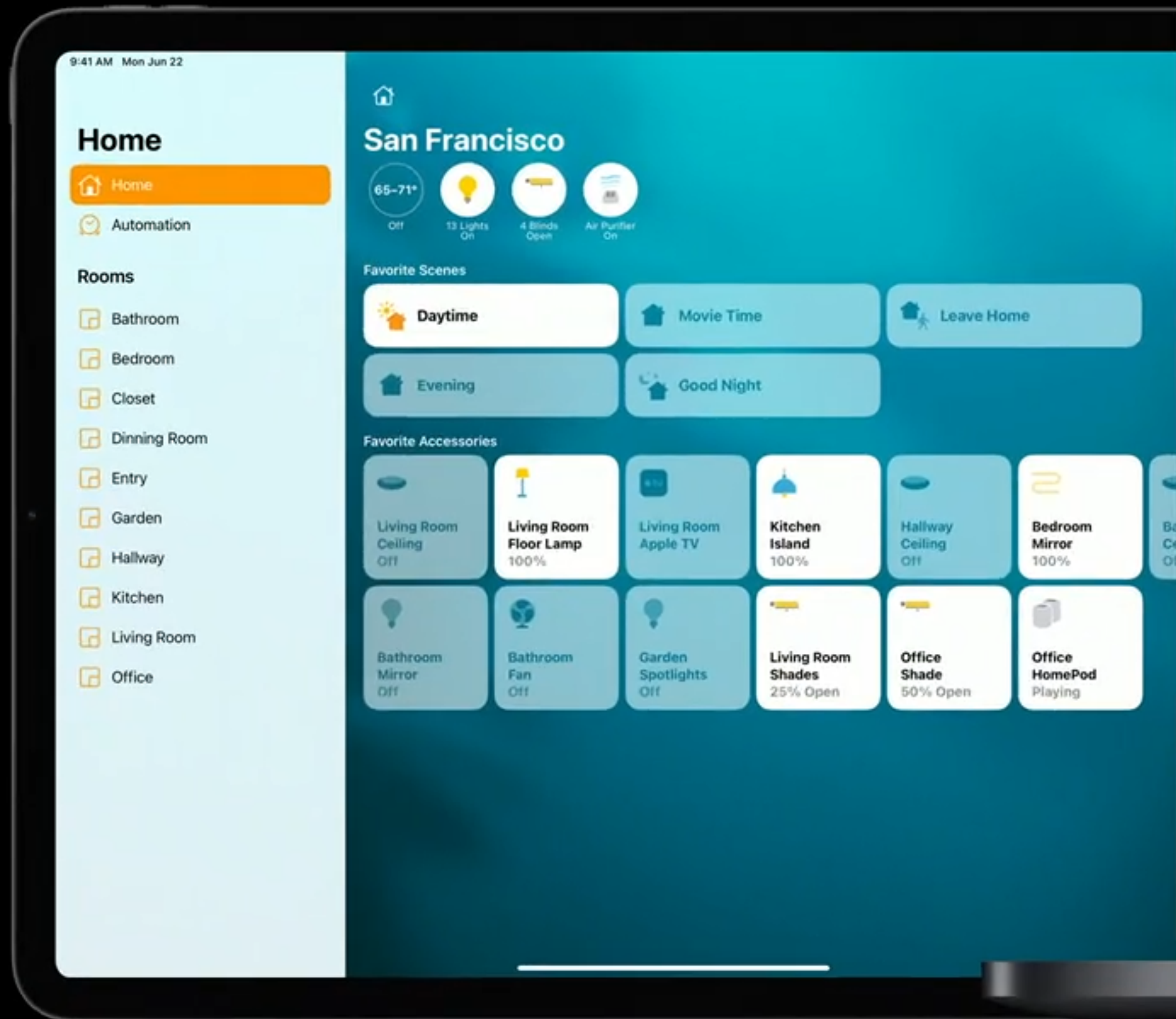


# Third Party Apps





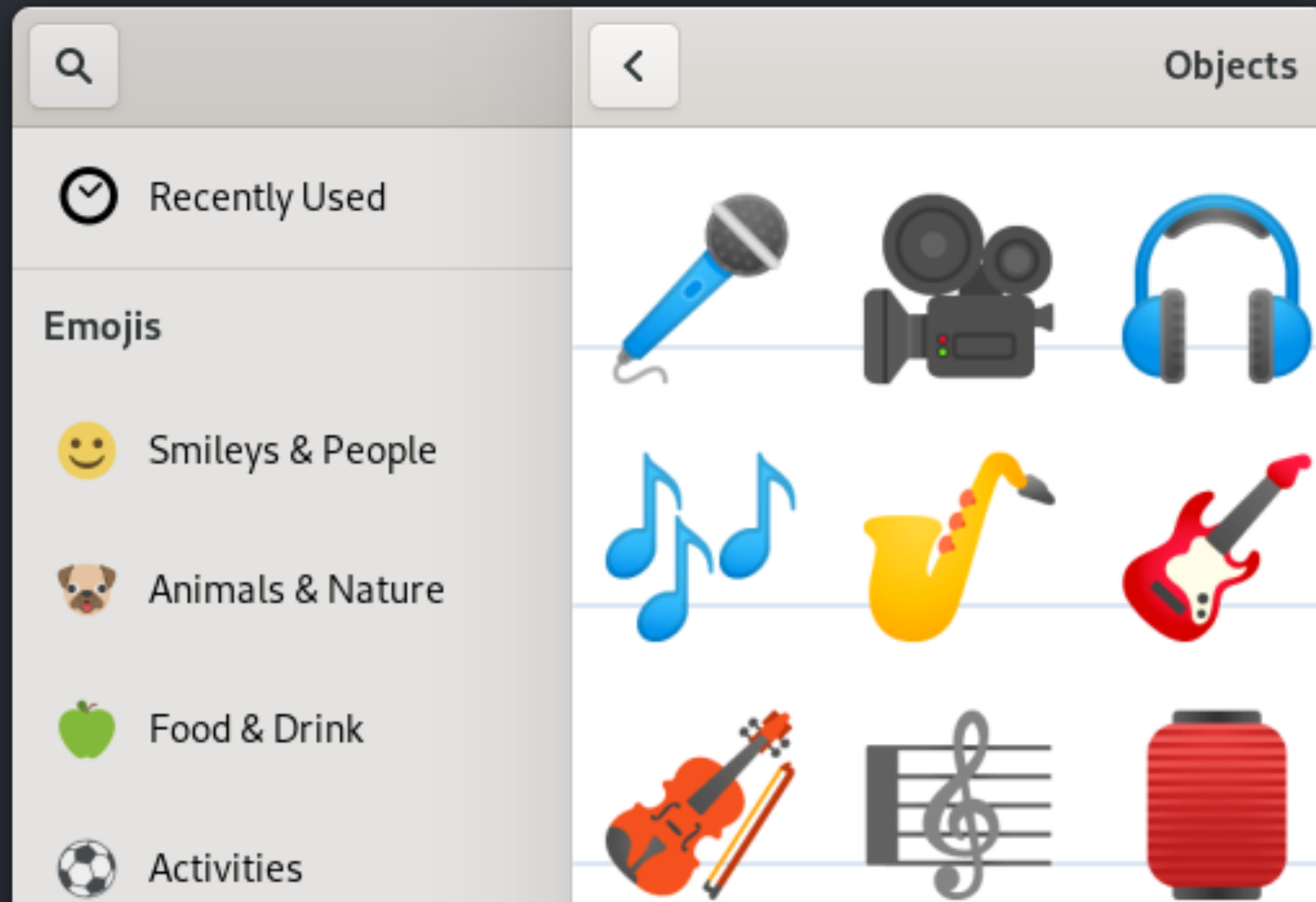




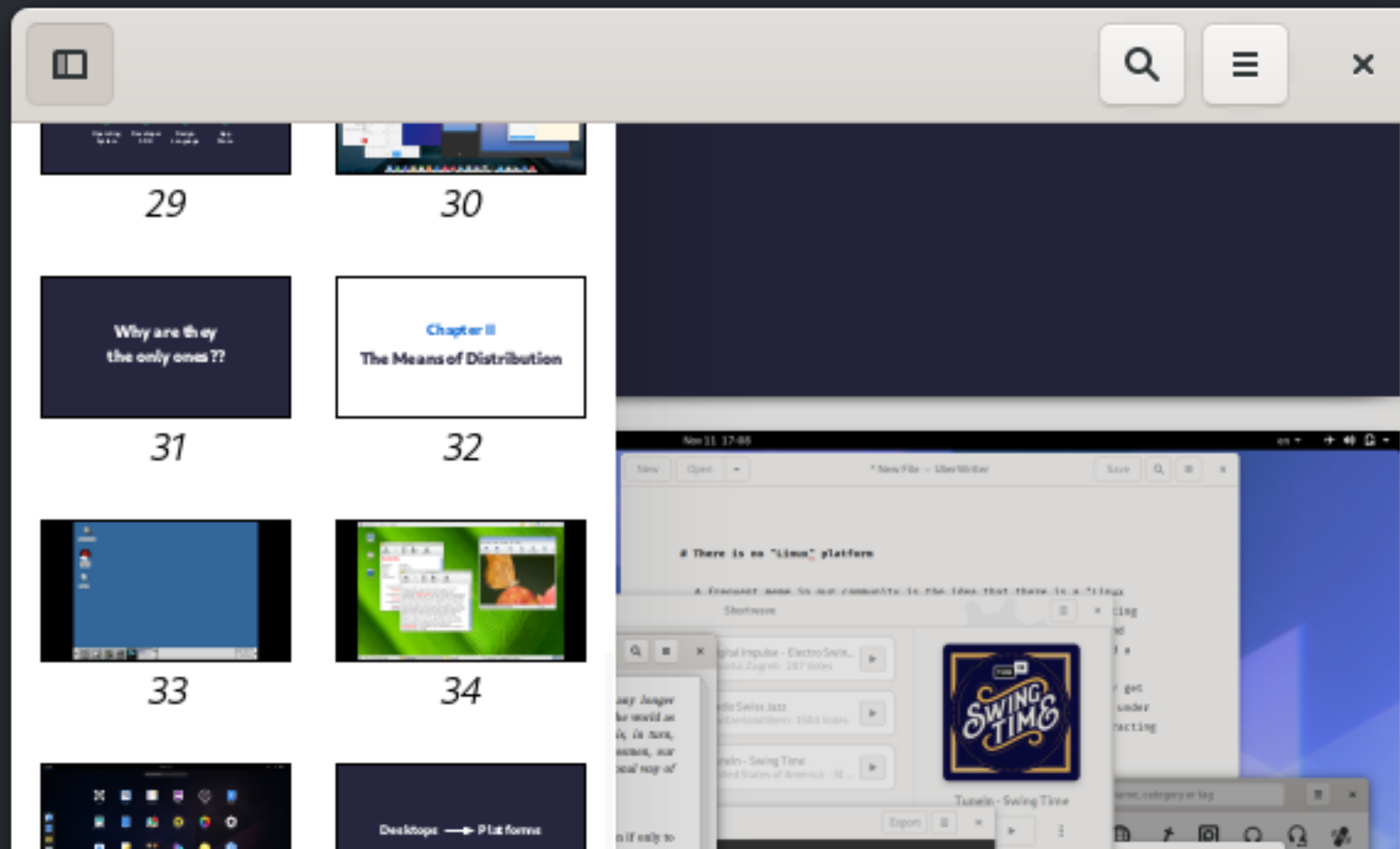


# New Widgets

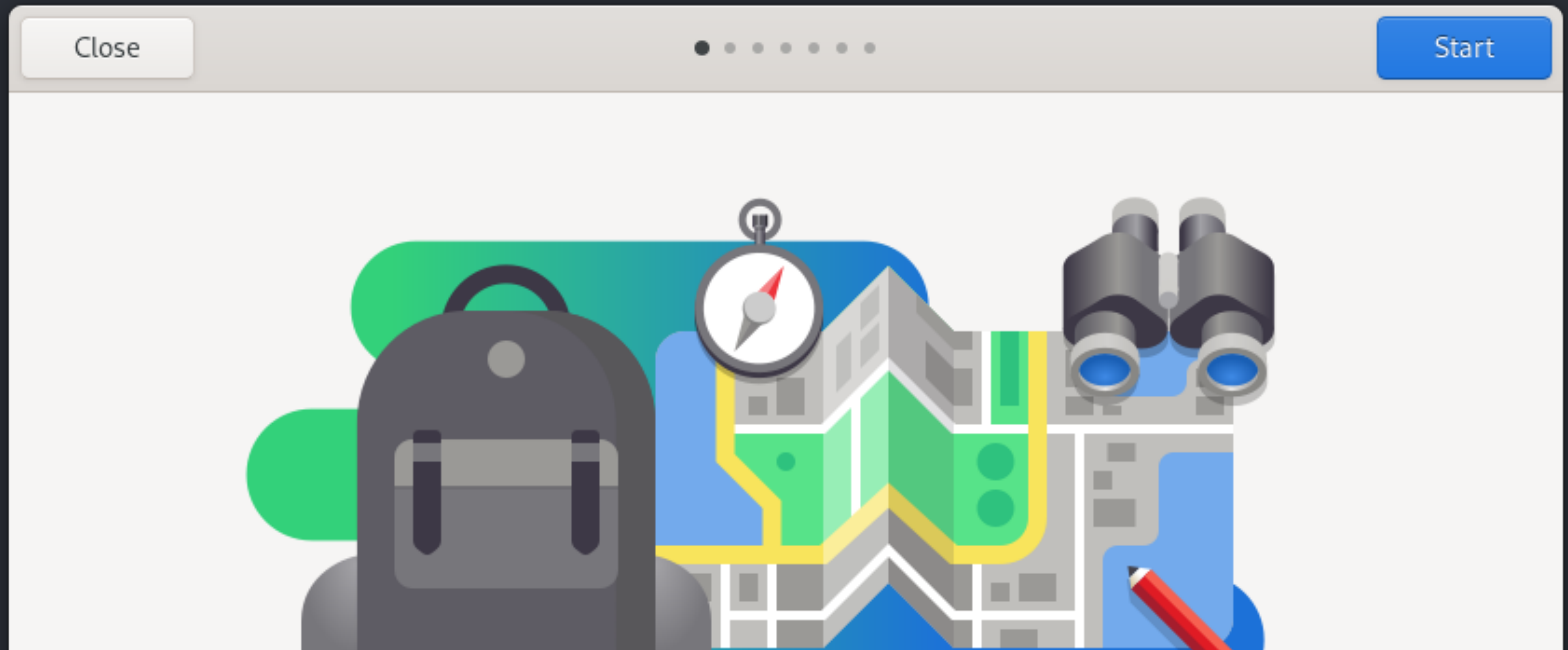
# Back Swipe



# Utility Panes

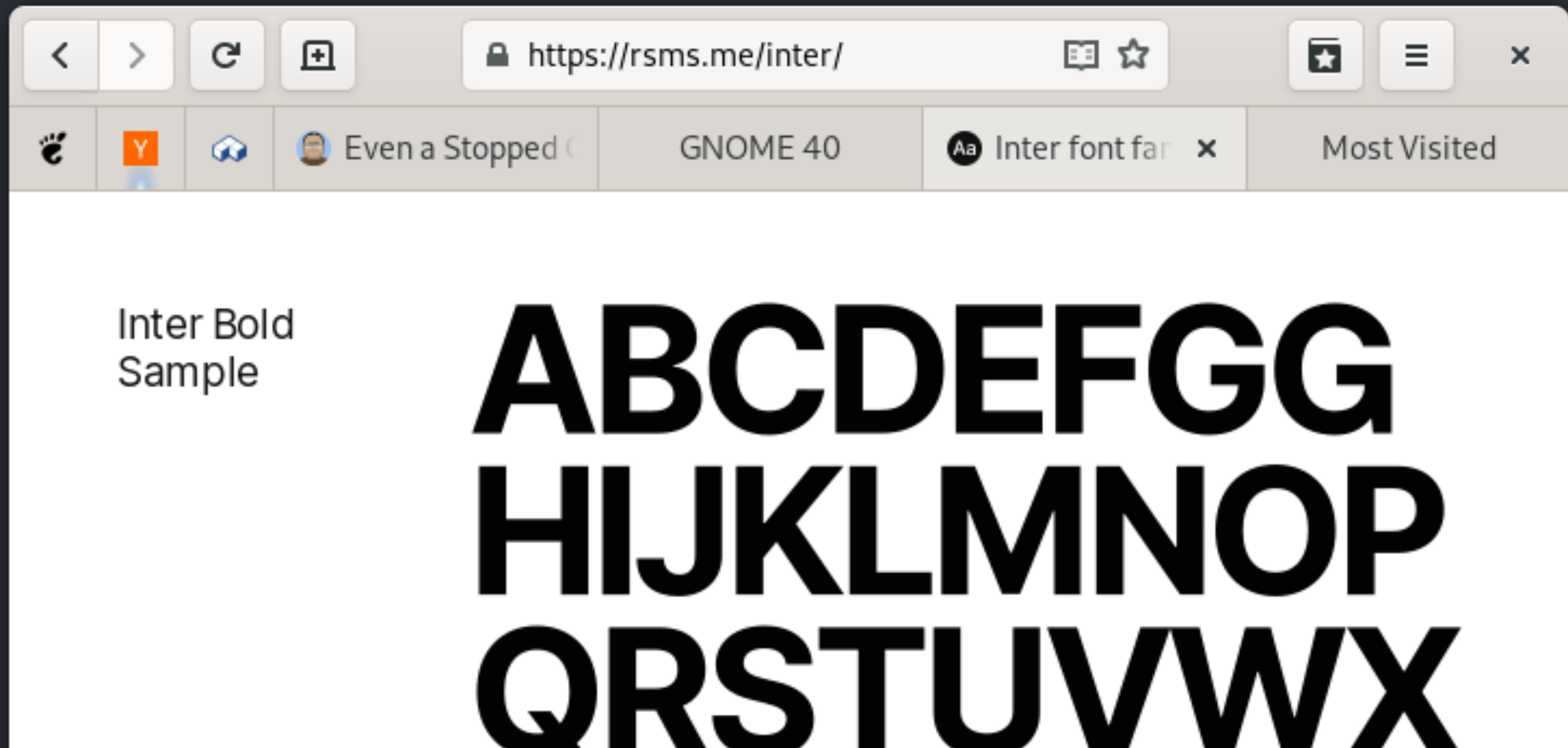


# Carousel

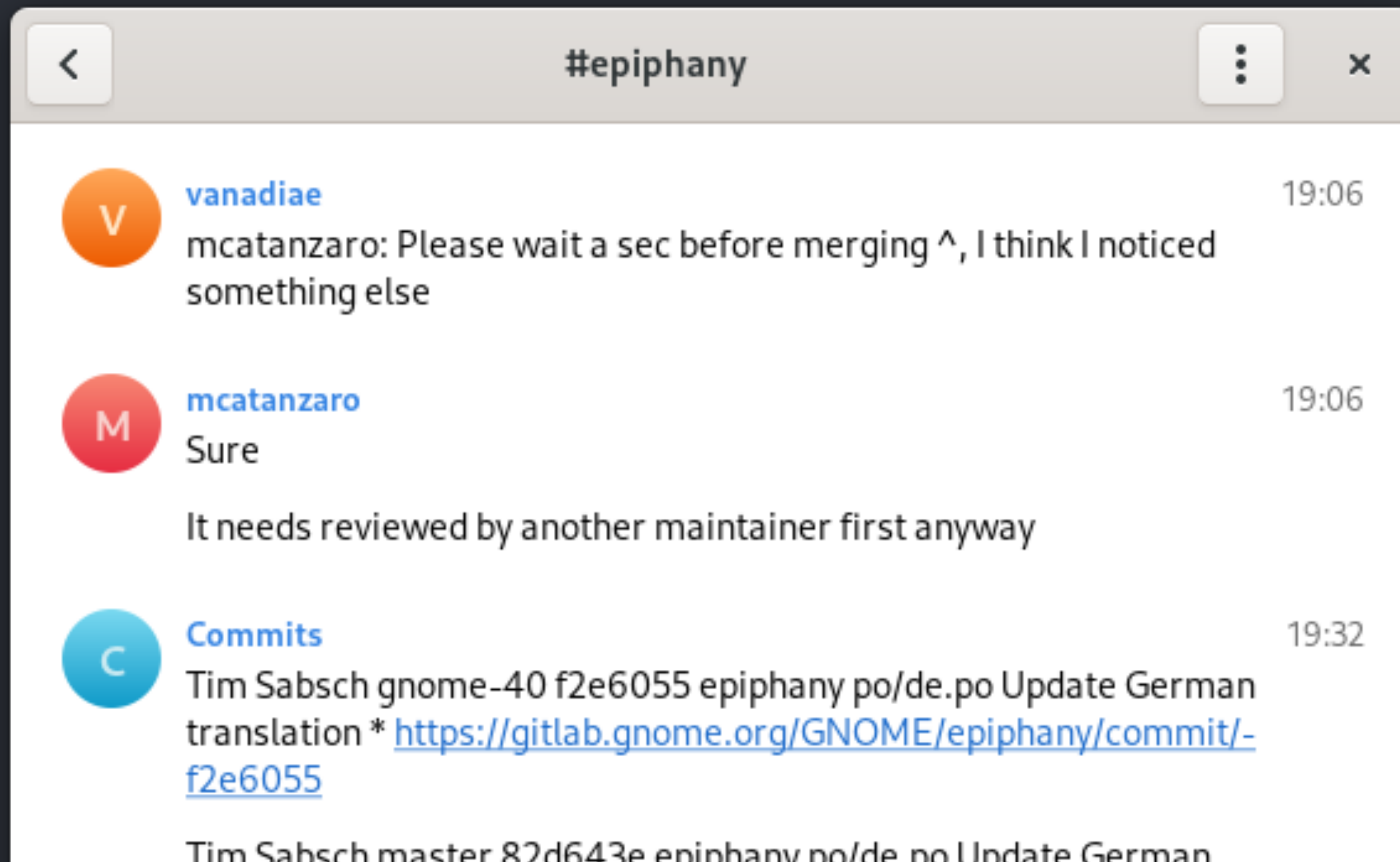




# Tabs



# Avatars



# And More!

Rounded Corners

Flexible Headerbars

Status Page

Column → Clamp

# **Hardware Support Metadata**





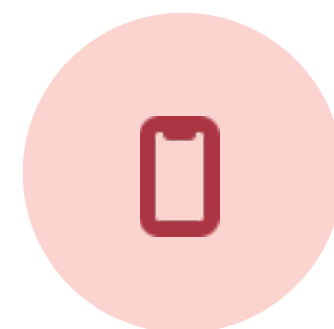
## **Adaptive**

Works on phones, tablets,  
and desktops



## **Desktop only**

Not optimized for touch  
devices or phones



## **Mobile only**

Requires a gyroscope



## **Missing hardware**

Needs a physical  
keyboard or gamepad

# com.domain.app.metainfo.xml

```
<requires>  
    <display_length compare="ge">360</display_length>  
</requires>
```

```
<recommends>  
    <control>keyboard</control>  
    <control>pointing</control>  
    <control>touch</control>  
</recommends>
```

# com.domain.app.desktop

```
X-Purism-FormFactor=Workstation;Mobile;
```

## Use real pixel sizes ✓

```
<requires>  
  <display_length compare="ge">360</display_length>  
</requires>
```

## Do NOT use named values ✗

```
<requires>  
  <display_length compare="ge">small</display_length>  
</requires>
```

The Future



# Widget Library

Moves faster than GTK

In sync with our design patterns

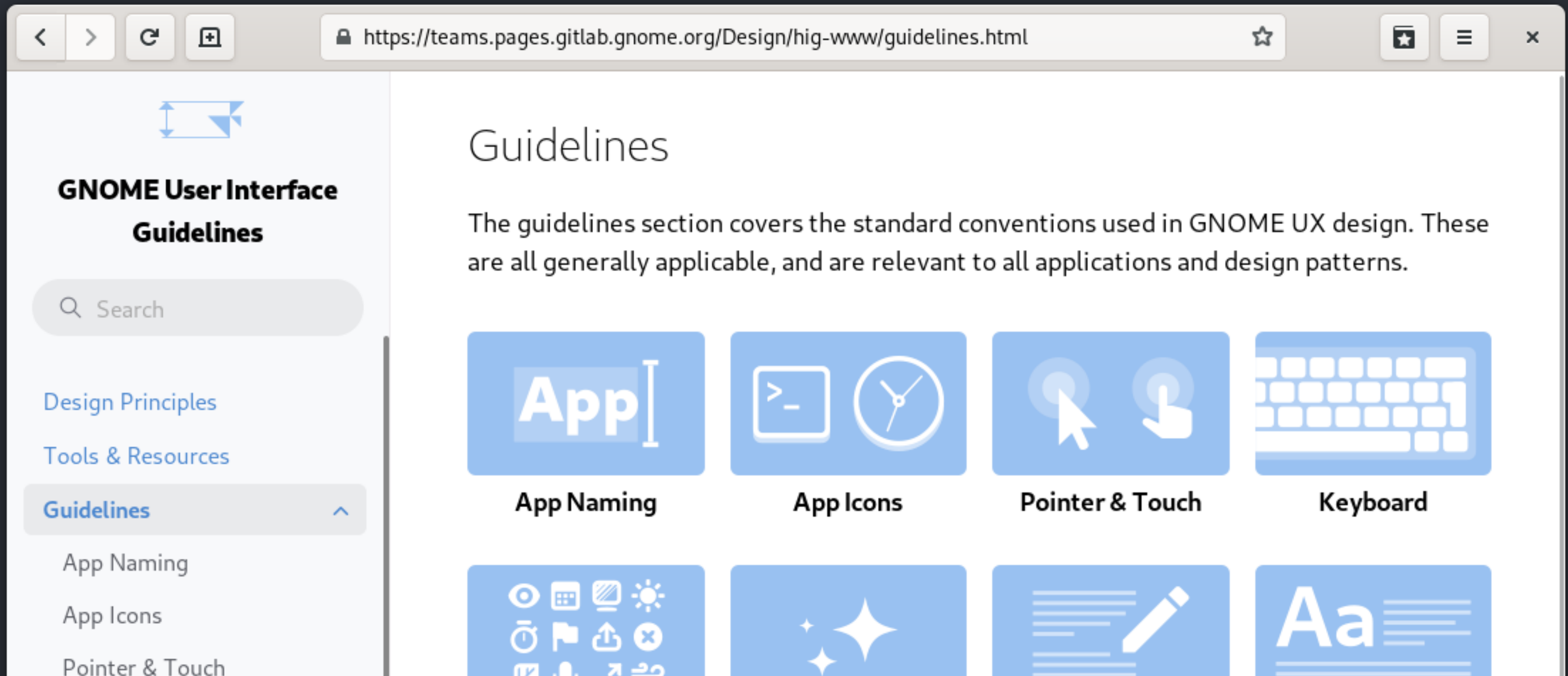
Platform-specific

Libhandy fills this role for GTK3



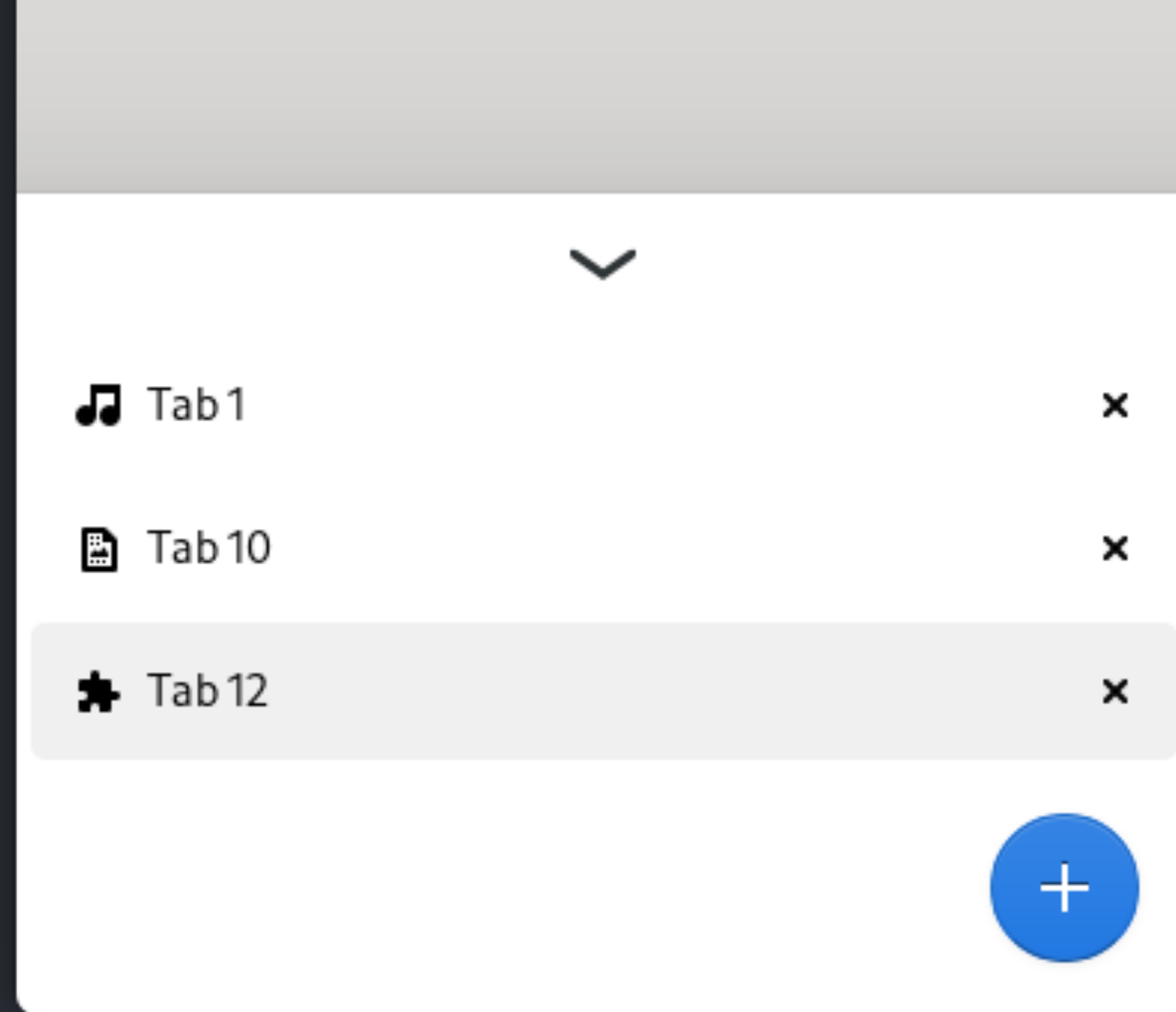
**Adwaita**

# New HIG



# Future Widgets





# Mobile Tabs

# List Row Entries

Device Name



Device Name

Ange|

Device Name

Angela's Librem 5





⚙️ General

🔔 Notifications

📱 Devices



People can find you by searching for any of these identifiers

Name

Angela Avery



Email

angela@avery.net



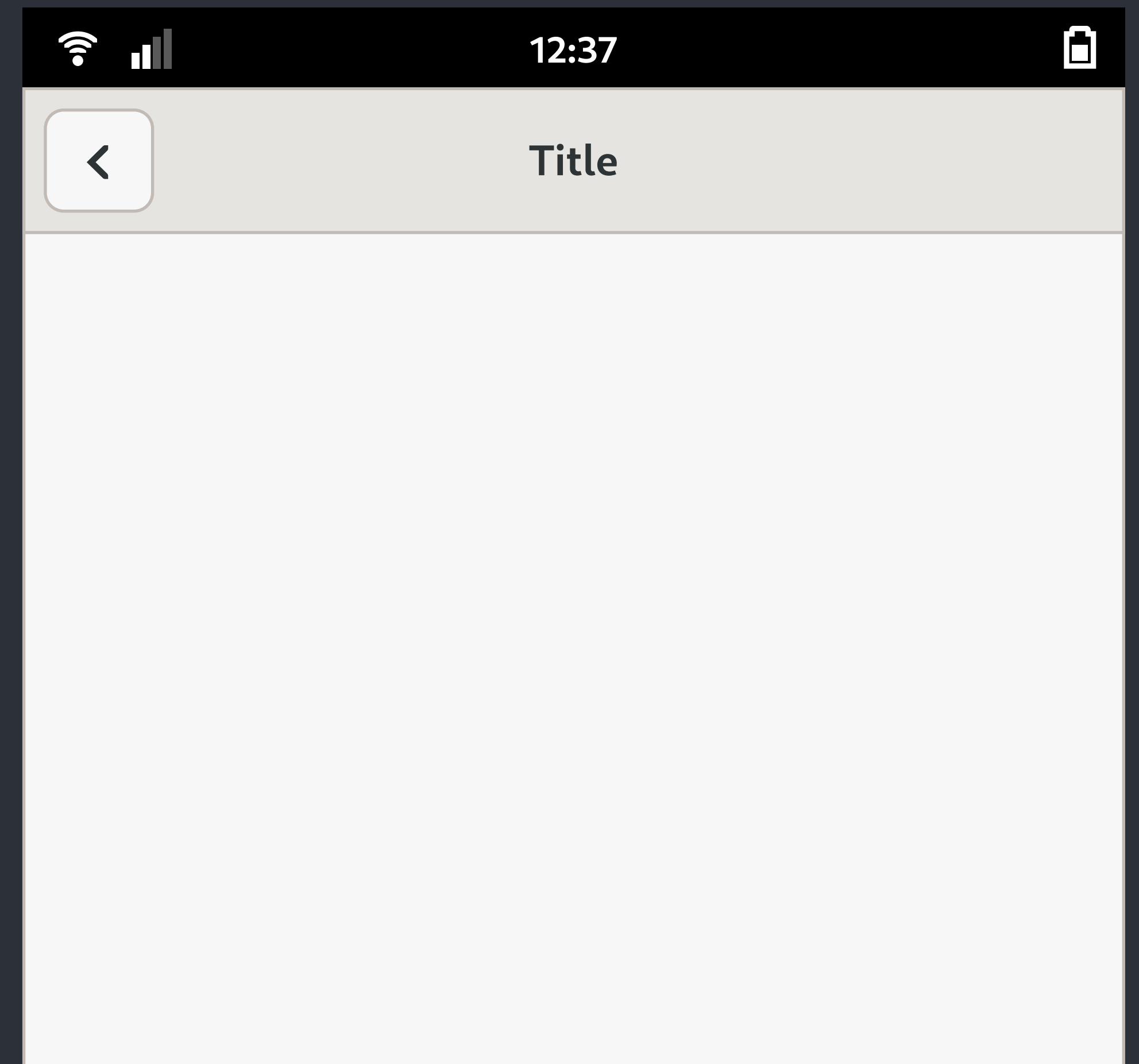
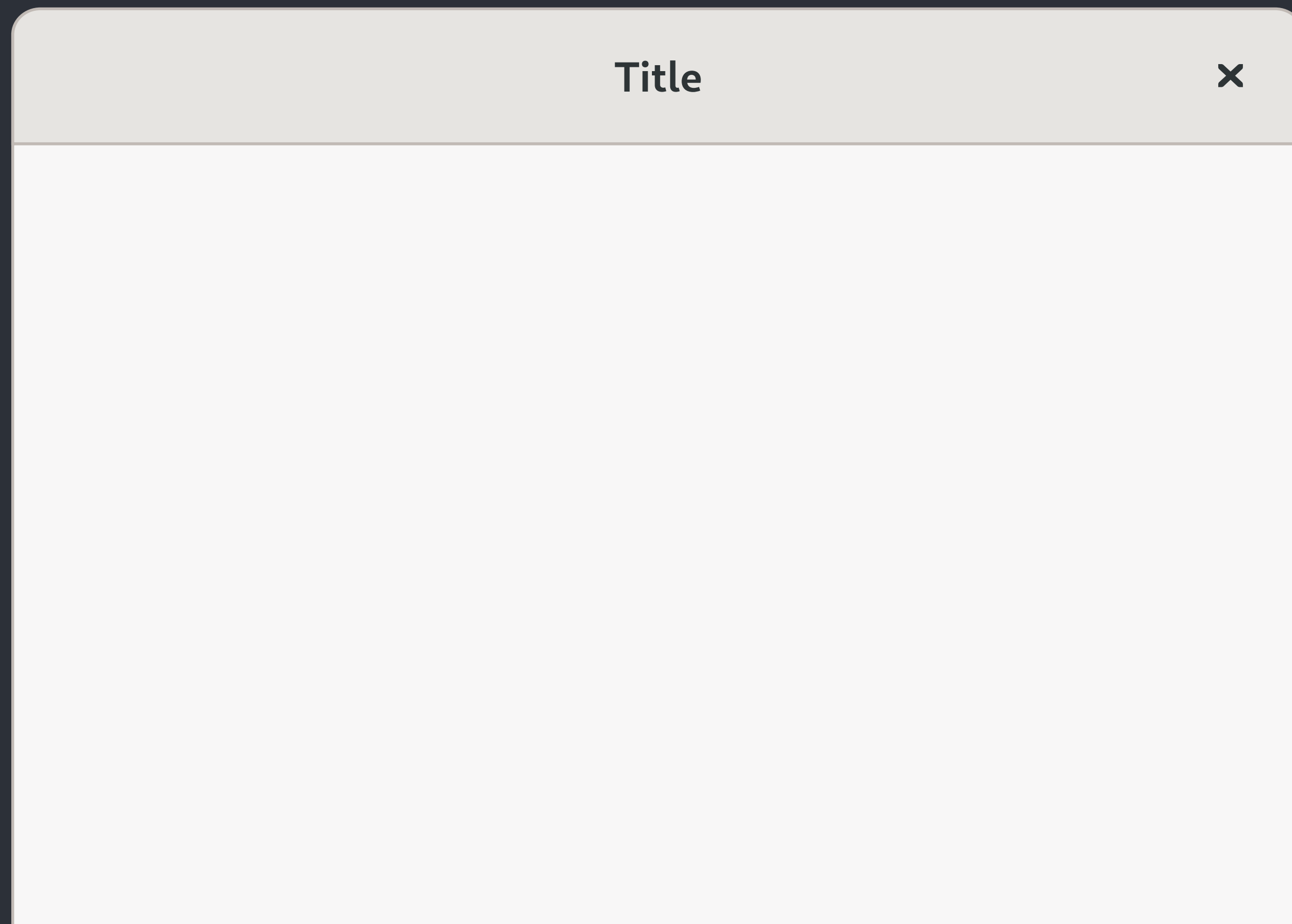
Email

aavery@gnome.org



Add Email

# In-Stack Dialogs



# System Dialogs

About Dialog

Keyboard Shortcuts

File Chooser

Other Portals

Powered By

GTK4



# Animation



3D

s c a l l e

# Layout Morphing



**One More Thing**

# Style Refresh

Cleaner Visuals

Better Contrast in Dark Variant

App Accent Colors

Widget Recoloring



Fractal

Matrix messaging app | Available from <https://www.flathub.org/apps/de...>

TA

Test accpuintdsf

2

Fractal

5

NR

New fancy room

FT

Fractal Test

8

Manjaro

1798

JS

Julian Sparber

TA

Test account

Arch Linux (old)

Geary

121

GS

GIMPNet IRC Bridge s...

matrix-rust-sdk

721

GN

Gitlab Notifications

8:06 AM

[GNOME/fractal]

Julian Sparber merged merge request [room: Load members only when the room is displayed \(!795\)](#)

Dennis

11:52 AM

In reply to @dennis:dnns.ruhr

Will Fractal also be a part of upcoming This Week in GNOME?

<https://thisweek.gnome.org/posts/2021/07/twig-1/> ?

Alexandre Franke: ^^^

Alexandre Franke

1:21 PM

Possibly.

We've been part of This Week in Matrix for over two years, so we have some experience in publishing updates. :)

Thib

1:36 PM

I believe it makes sense to post updates in both, since they address different (but potentially overlapping) populations :)

oxygen081 joined this room.

smiley-mcsmiles joined this room.

≡

this is a message

# Summary

Mainline Linux phones are real now

Everything is going adaptive

New widget library and HIG

GTK4 is going to be amazing

The future is

**Awesome**

# Developers

Adwaita API is not stable yet

New apps: Start with GTK4/Adwaita

GTK3 apps: Maybe wait a bit

Adwaita 1.0 release before 42

**GNOME Mobile**

**Q&A**

July 29, 14:00 UTC

[meet.gnome.org/ale-u66-xf7-kic](https://meet.gnome.org/ale-u66-xf7-kic)

# Thanks

Alex Mikhaylenko

Adrien Plazas

Guido Günther

Julian Sparber

Zander Brown

Felix Häcker

Andrei Lișiță

Bilal Elmoussaoui

Allan Day

Jakub Steiner



# Get Involved

[gitlab.gnome.org/GNOME/libhandy](https://gitlab.gnome.org/GNOME/libhandy)  
[#libhandy:gnome.org](https://twitter.com/libhandy)

[gitlab.gnome.org/GNOME/libadwaita](https://gitlab.gnome.org/GNOME/libadwaita)  
[#libadwaita:gnome.org](https://twitter.com/libadwaita)

# Thanks!

**tbernard@gnome.org**

**tbernard@mastodon.social**

Slides: [github.com/bertob/guadec2021-slides](https://github.com/bertob/guadec2021-slides)