

VIBE CODING A POWER BI EMBEDDED PORTAL FROM ZERO TO HERO IN 60



WHO AM I?

Peer Grønnerup

Technical Architect & Community Advocate at Tabular Editor

Software-developer roots and proudly “strategically lazy”

I automate so I don’t have to repeat myself!

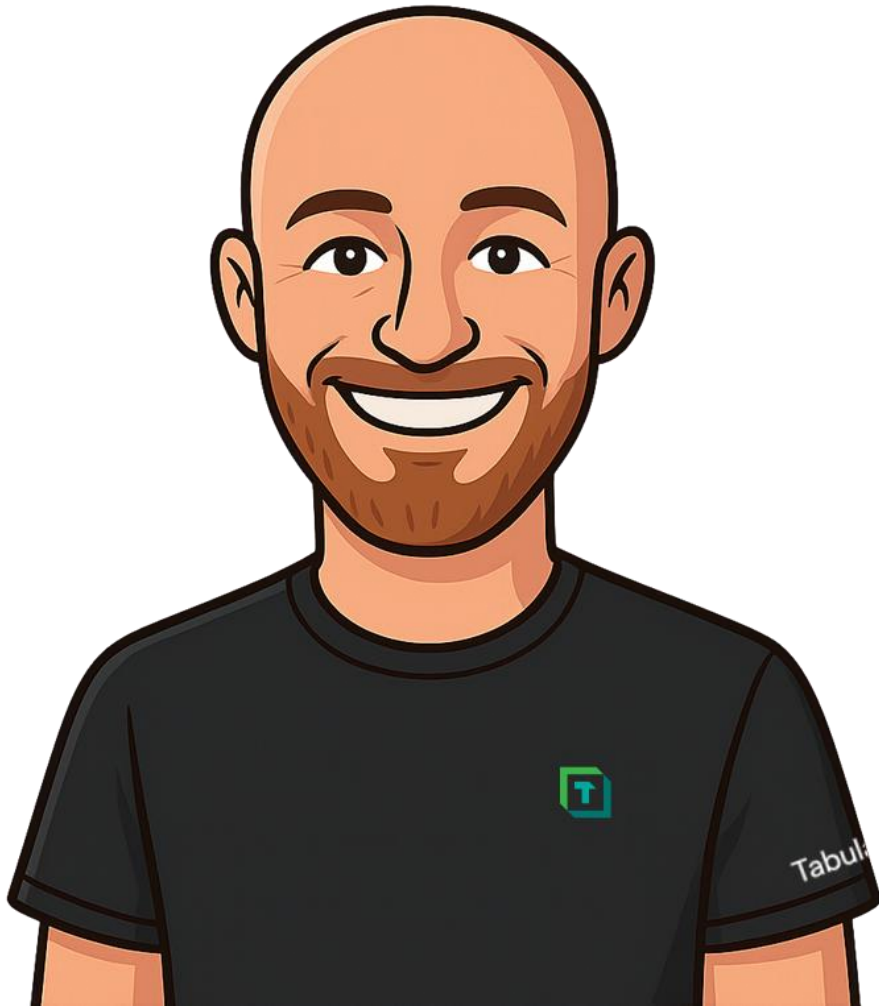
15+ years building BI and Data Platform solutions

 <https://www.linkedin.com/in/peergroennerup/>

 <https://peerinsights.hashnode.dev>

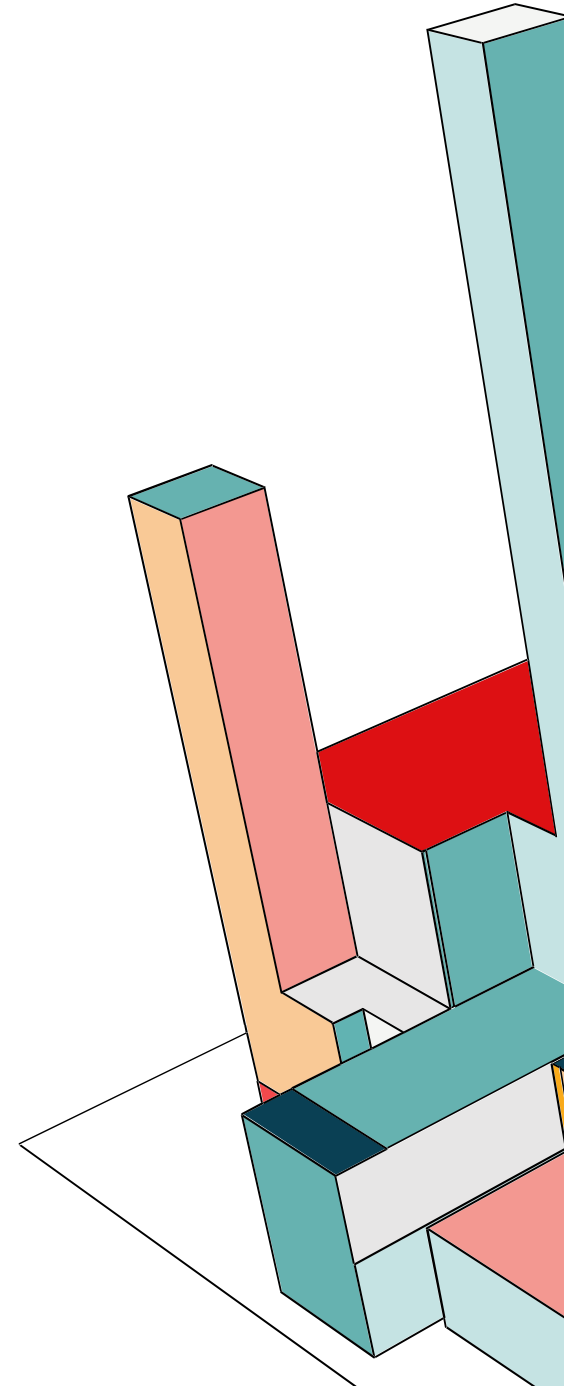
 <https://github.com/gronnerup>

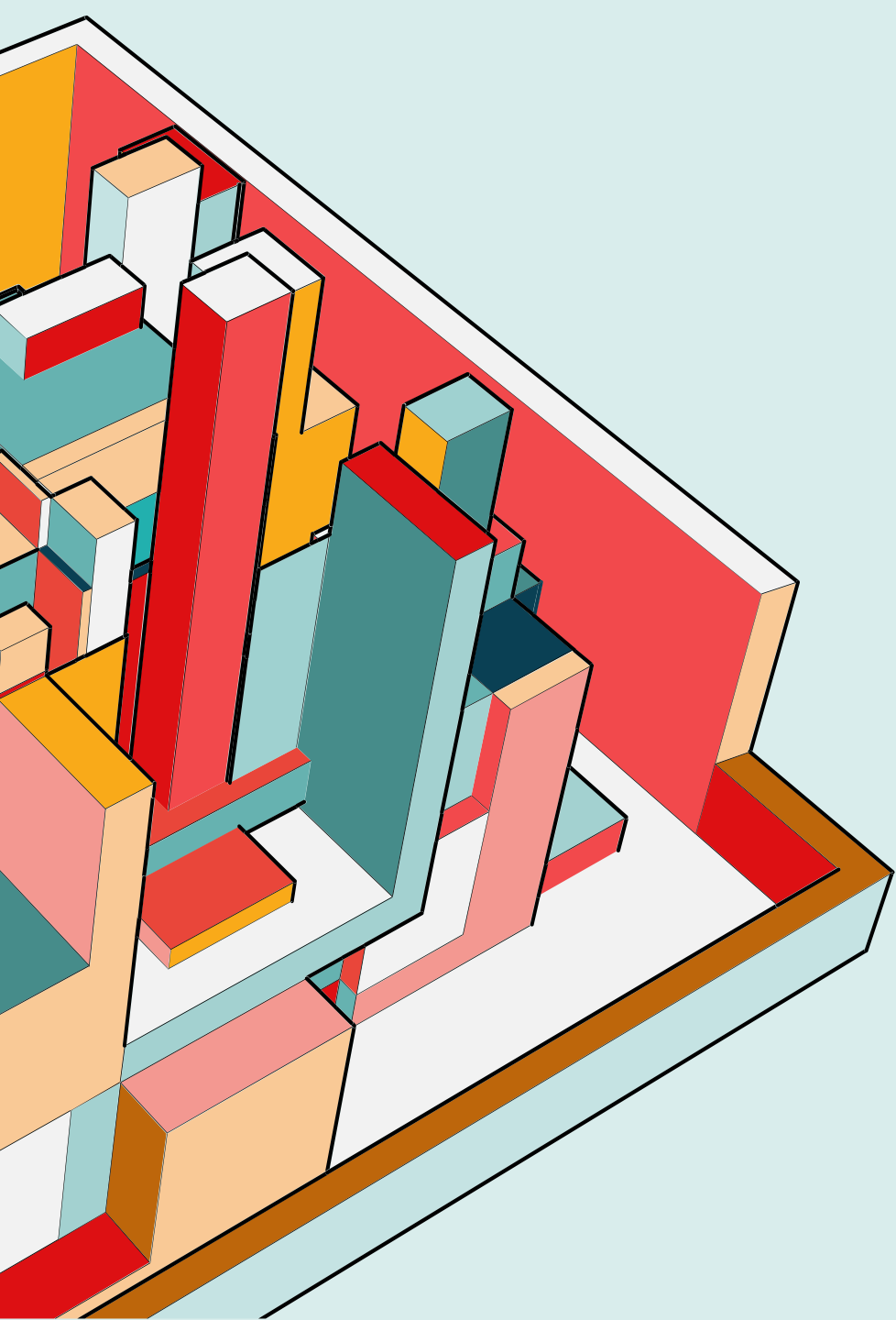
 <https://www.tabulareditor.com>



WHERE ARE WE GOING TONIGHT?

- Introduction
 - Power BI Embedded
 - Vibe coding
- **Live vibe coding an MVP of a Power BI Embedded Portal**
 - The idea and goal for today
 - Setup & prerequisites
- Wrap-up + Q&A





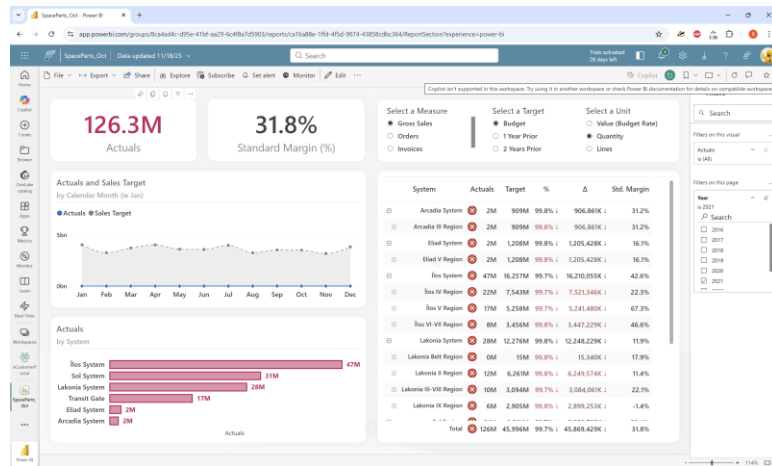
INTRODUCTION

POWER BI EMBEDDED

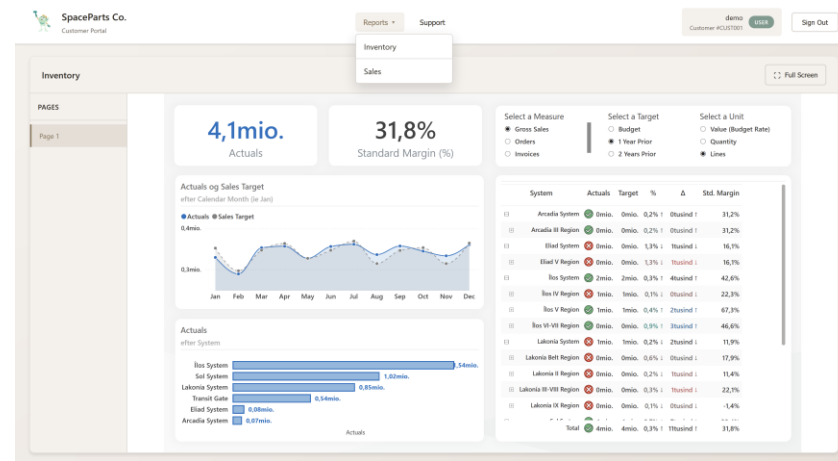


WHAT IS POWER BI EMBEDDED?

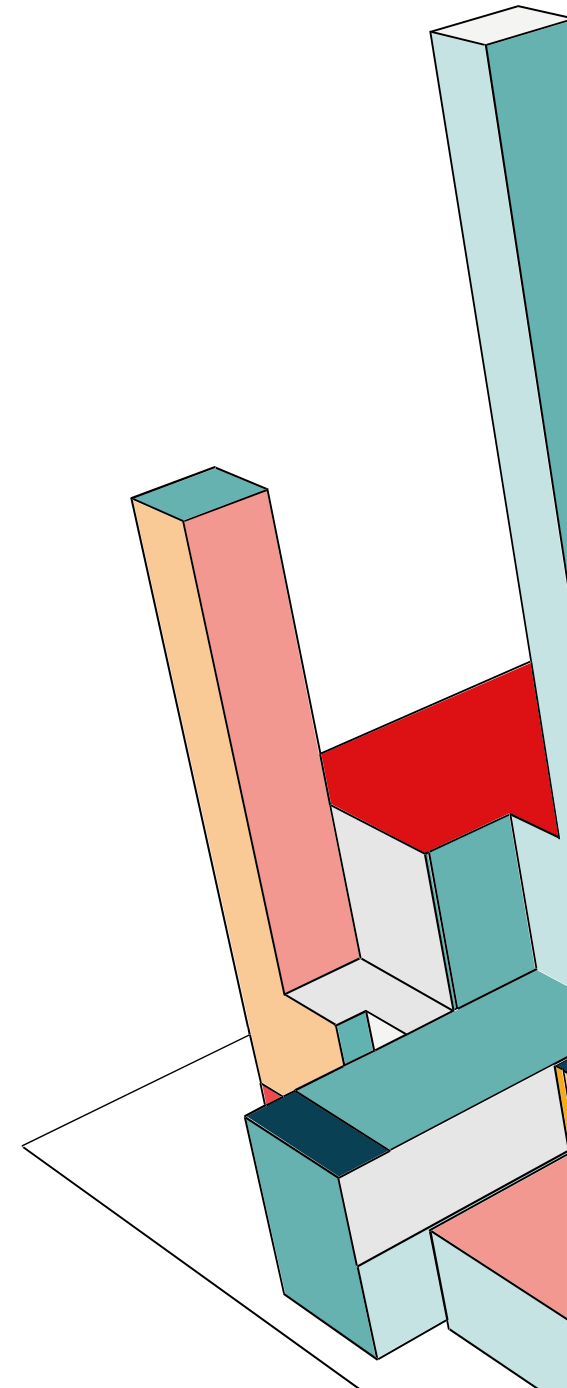
- It's a way to embed Power BI reports etc. into your applications
- Supports both internal and external audience
- Control and white-label the experience fully



Default experience



Your experience



POWER BI EMBEDDED OPTIONS

2 embedding options

- External
 - Requires a capacity
 - Pro or PPU for development
- Internal
 - Require individual licenses

Feature	External users	Internal users
Authentication	App managed	Microsoft Entra ID
Licensing	F, P or A-SKU*	Pro, PPU, P or +F64 SKU
Primary use case	External facing apps	Internal business apps
Ownership	App owns data	User owns data
Implementation	Custom coding	Secure embed (iframe) Custom coding

* No user licenses required

WHY EMBED?



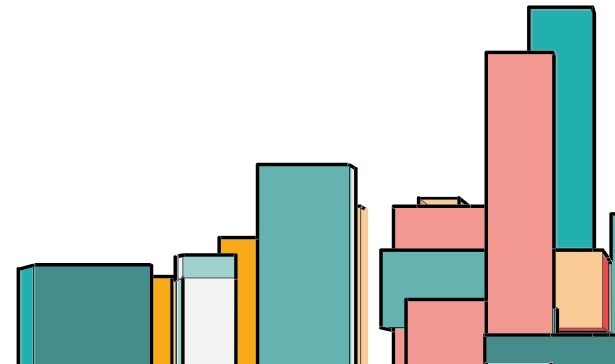
- Better user adoption
- Seamless UX (branding + layout)
- Control access & navigation
- Can be low-code or no-code
- Cost saving
- Use it internally or externally
 - Intranet
 - Customer portal



THE CONS OF EMBEDDED ANALYTICS



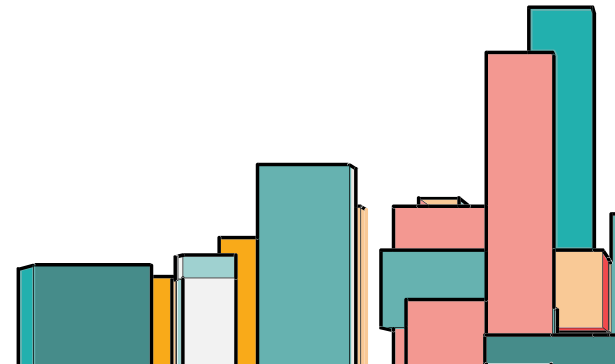
- Requires a capacity = complex pricing and capacity planning
- More engineering effort
- Operational complexity
 - Multi-tenant design
 - Life-cycle management
 - Authentication
 - Hosting
- Feature parity nuances



THE CONS OF EMBEDDED ANALYTICS



- Requires a capacity = complex pricing and capacity planning
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VIBE CODING

Preparing for some groovy coding

AN INTRODUCTION TO VIBE CODING

- Vibe coding an AI-powered development practice
- It requires no to little technical skills
- It requires no heavy upfront design og planning
- It is a shifts from writing lines of code to creating products simply by describing ideas in natural language
- Let your energy, ideas and intuition lead the way
- 8-year-old girl codes with Cursor AI:
<https://youtu.be/o5uvDZ8srHA?si=jE8N3eQ7fTFYKhyr>

← Post



Andrej Karpathy 
@karpathy



There's a new kind of coding I call "vibe coding", where you fully give in to the vibes, embrace exponentials, and forget that the code even exists. It's possible because the LLMs (e.g. Cursor Composer w Sonnet) are getting too good. Also I just talk to Composer with SuperWhisper so I barely even touch the keyboard. I ask for the dumbest things like "decrease the padding on the sidebar by half" because I'm too lazy to find it. I "Accept All" always, I don't read the diffs anymore. When I get error messages I just copy paste them in with no comment, usually that fixes it. The code grows beyond my usual comprehension, I'd have to really read through it for a while. Sometimes the LLMs can't fix a bug so I just work around it or ask for random changes until it goes away. It's not too bad for throwaway weekend projects, but still quite amusing. I'm building a project or webapp, but it's not really coding - I just see stuff, say stuff, run stuff, and copy paste stuff, and it mostly works.

AN INTRODUCTION TO VIBE CODING

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Pure vibe coding

vs.

**Responsible AI-assisted
development**

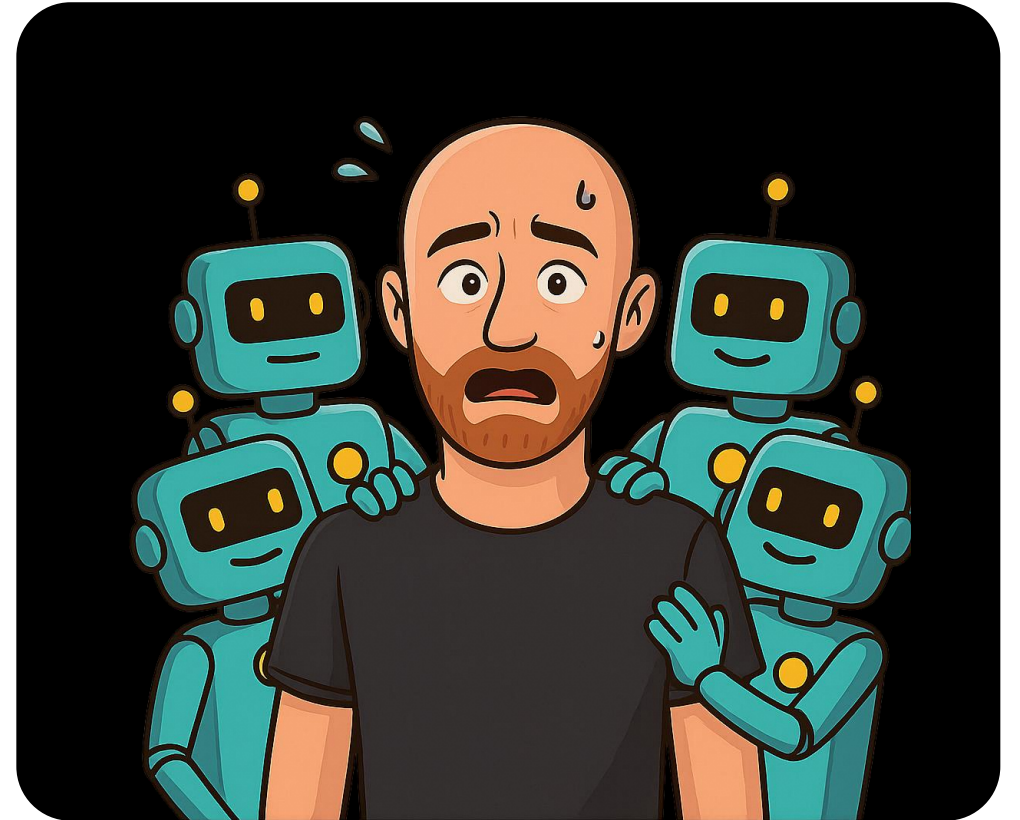
FEEL THE VIPE - IT'S PURE AND IT'S ALL GOOD

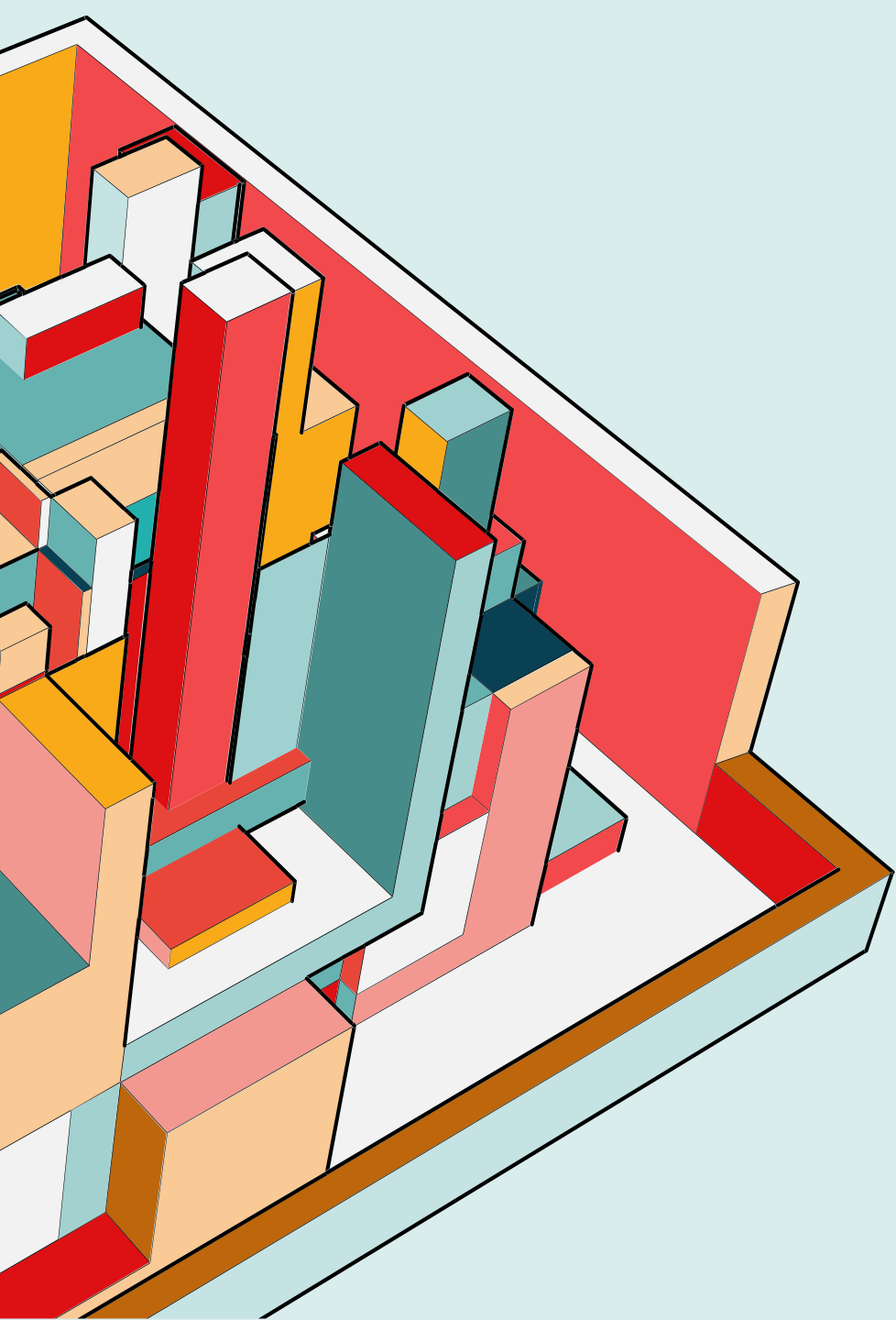
- Speed
- Creativity
- Easy to iterate
- Accessibility
- Fast prototyping



THE DANGERS OF PURE VIBE CODING

- Messy code
- No long-term structure
- Hard to debug
- Loss of understanding
- Security gaps





VIBE CODING...

POWER BI EMBEDDED

The goal for todays session....



THE IDEA AND THE GOAL FOR TODAY

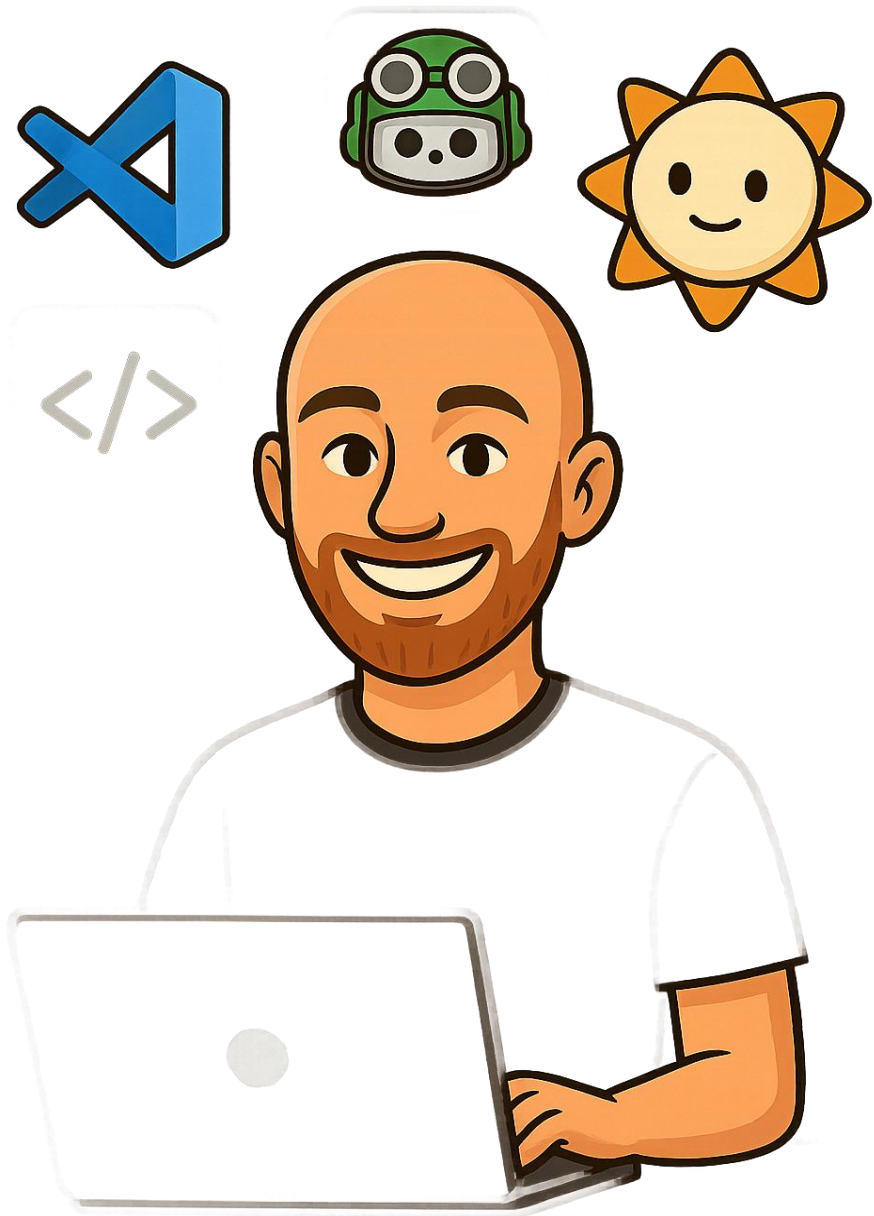
A Power BI Embedded Portal

- Targeted externals (App owns data)
- Login/authentication
- With information pages
- Support for dynamic RLS
- Add additional UX
 - Fullscreen
 - Page navigation and more...

The goal

- A fully production ready application
- Deployed and running in Azure





PREREQUISITES, TOOLING & SETUP

Overview of the foundation for vibe coding a Power BI embedded app

THE TOOLBOX AND MY PREPARATIONS

The toolbox

- VS Code
- GitHub Copilot
- Context7 MCP
- Azure App Service
- WhisperTyping
- Spotify

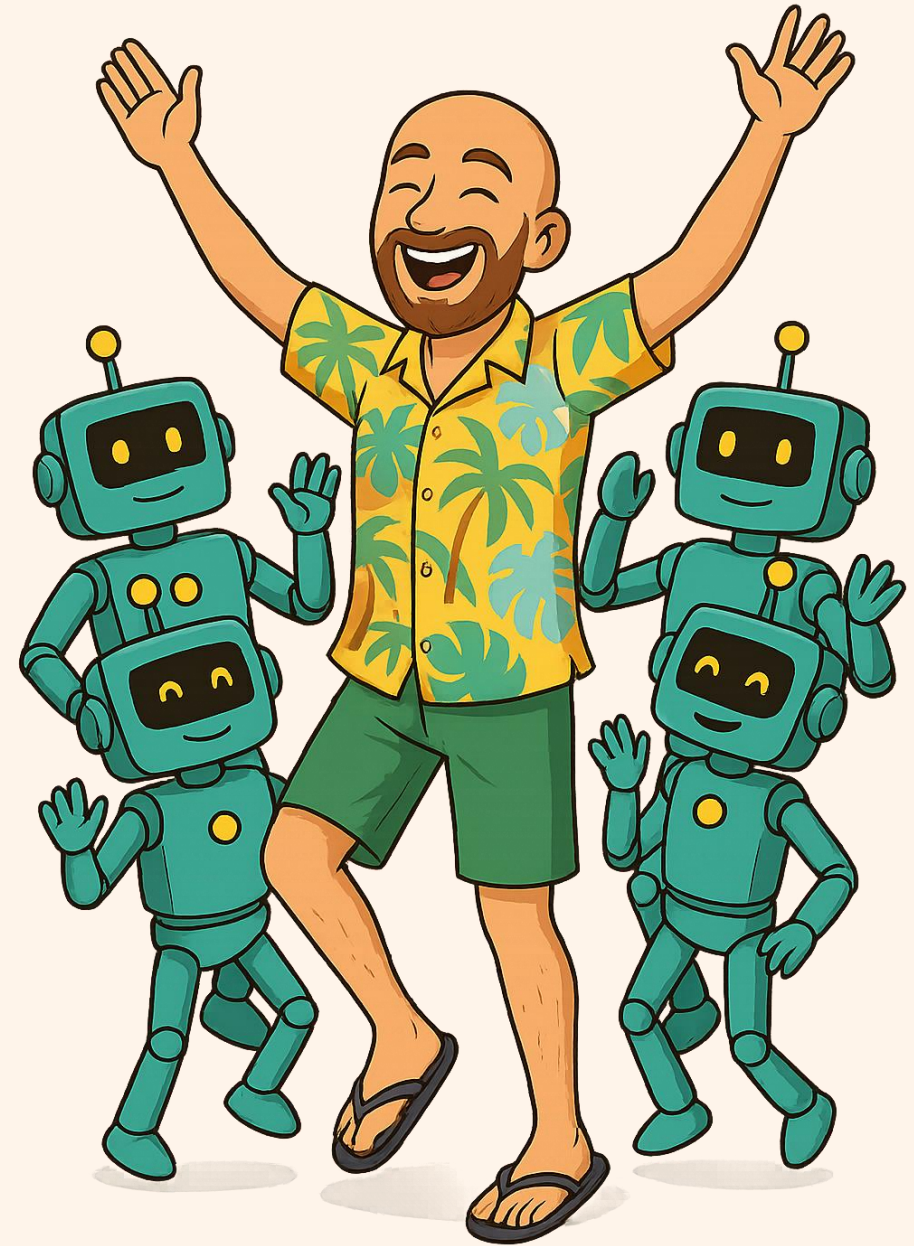
Pre-requisites for Power BI Embedded

- Power BI Workspaces containing
 - 2 report for embedding
 - A semantic model with no RLS
- Azure
 - Empty resource group created
 - Service Principal created
- GitHub Copilot instructions file



github.com/gronnerup/VibeCodingPowerBiEmbedded

**LET'S GO FEEL
THE VIBE!**





WRAP-UP + Q&A

FINAL TIPS & TAKEAWAYS

Conceptualize First

Start with a clear idea of what to build

Domain knowledge is Power

Knowing relevant frameworks, technologies etc. significantly improves AI-generated results

Iterate your development

Expect to debug and refine. AI is not a magic wand.

Instruct your agents well
asdfasdfsdf



MY RECOMMENDED VIBE CODING TOOLS

VS Code w/ GitHub CoPilot

For developers who want AI assistance in their existing IDE.

Cursor and/or Windsurf

VS Code forks. Very similar but with a few differences in the UX.
Best for pro developers who want an AI-first IDE.

Lovable

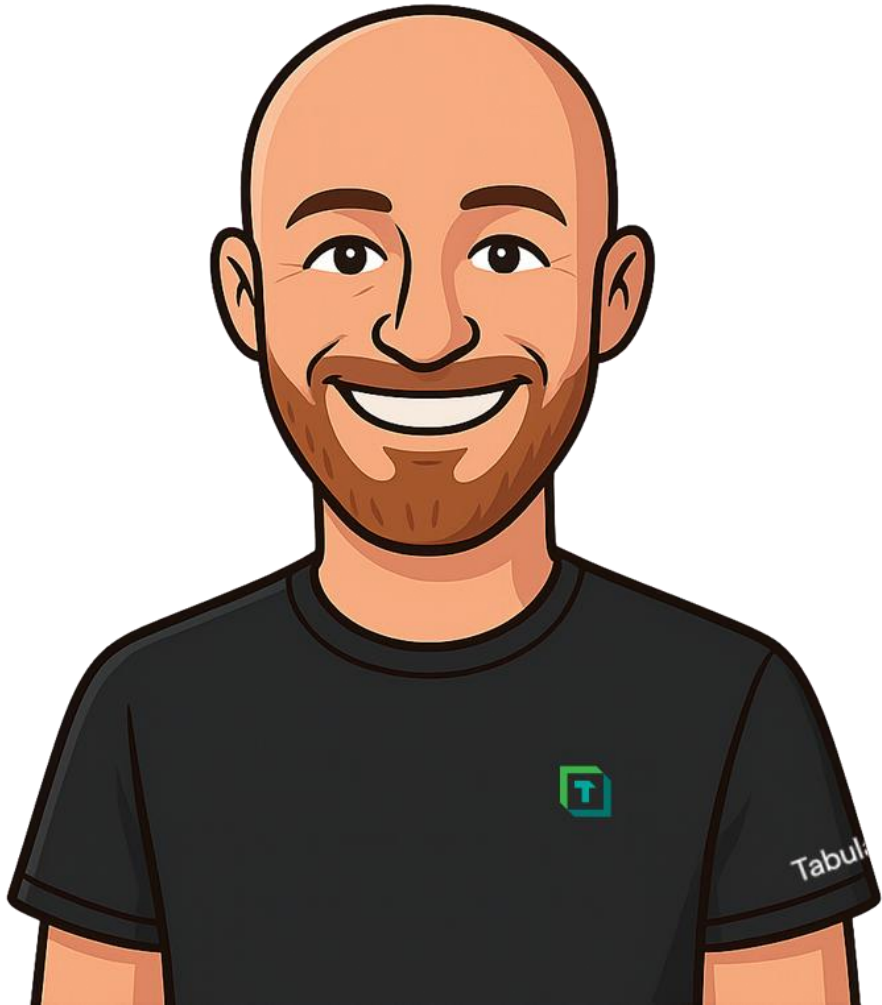
Most user friendly for non-coders and low-coders.

Claude code

Best for experienced developers. Handles complex multi-file projects.



MY REPO FOR YOU TO GET STARTED



 <https://www.linkedin.com/in/peergroennerup/>

 <https://peerinsights.hashnode.dev>

 <https://github.com/gronnerup>

 <https://www.tabulareditor.com>

THANK YOU

