Agentic AI@UIUC Info Night

Agenda

- Intro to Club Exec
- Evolution of AI
- Education Modules & Projects
- Questions

Club Exec

Ash Castelino
President and VP of Education
MS in Business Analytics

Yaseen Halabi
VP of Education
Sophomore- BS in Computer Science

Danny Silverstein
VP of Education
Senior – BS in Applied Mathematics

Aaron Wang
VP of Education
Freshman- BS in Computer Science

Aadivya Raushan
VP of Education
Freshman- BS in Computer Science

Daneil Trifnov
VP of Operations
Junior- BS in Supply Chain & Entrepreneurship

Release of ChatGPT : 2022

ChatGPT 3.5

Smart, Free and Easy to Use

IgmGuru

Before 2022, AI was mostly hidden in recommendation and search algorithms but there was no consumer facing aspect to it

ChatGPT came out late 2022 and changed the way we interact with software and technology

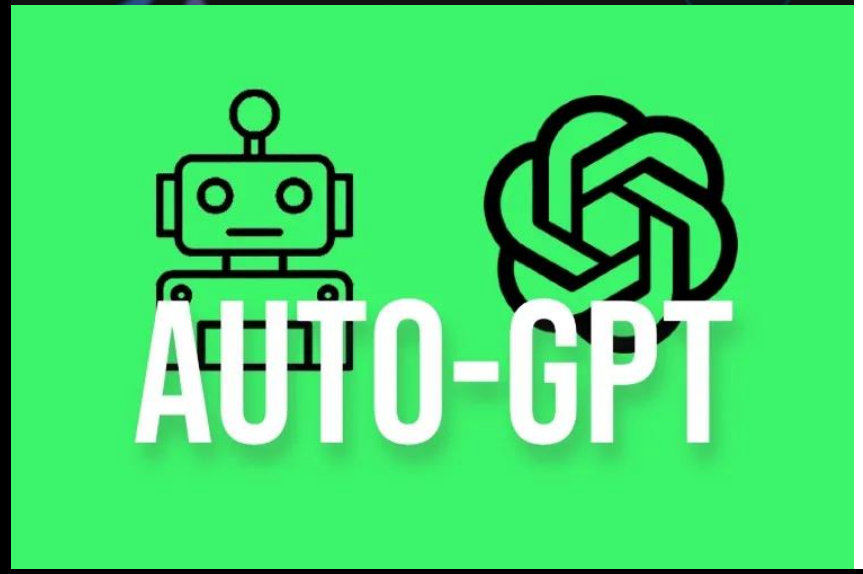
The model had a decoder only archietecture with estimated parameters of 175 billion. It used human learning feedback to improve its responses

They used a proximal policy optimization where the model practized generating responses and the reward model gave points

2023: Multimodality & The First Glimpse of Agency

Claude

LLaMA



babyagi

BabyAGI

> [!NOTE] The original BabyAGI from March 2023 introduced task planning as a method for developing autonomous agents. This project has been archived and moved to the babyagi_archive repo (September 2024 snapshot).

> [!CAUTION] This is a framework built by Yohei who has never held a job as a developer. The purpose of this repo is to share ideas and spark discussion and for experienced devs to play with. Not meant for production use. Use with cautioun.

This newest BabyAGI is an experimental framework for a self-building autonomous agent. Earlier efforts to expand BabyAGI have made it clear that the optimal way to build a general autonomous agent is to build the simplest thing that can build itself.

Check out this introductory X/Twitter thread for a simple overview.

The core is a new function framework (**functionz**) for storing, managing, and executing functions from a database. It offers a graph-based structure for tracking imports, dependent functions, and authentication secrets, with automatic loading and comprehensive logging capabilities. Additionally, it comes with a dashboard for managing functions, running updates, and viewing logs.

2024: From Chatbots to Reasoning Engines

Giving brains to AI

Multi Modality

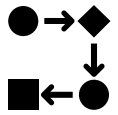
Open AI released the omini model and it was a massive technical shift because it is a single neural network trained across text, vision and audio.

Google released the **gemini 1.5 model** which introduced 1 million+ token window allowing the model to read condebasses, videos etc

OpenSource

•Meta relased the Llama 3.1 405B which became the first open source model to rival GPT-4.

•**Open source models** like **Phi-3 and Gamma** proved that you can run high quality AI locally on your computer



Reasoning

•Open AI released chain of thought reasoning models where the model thinks for 10-30 secs before answering user questions

•Popularity of coding agents like **Devin** and **OpenDevin** started getting popular

Video Generation

- Open AI released Sora that proved that **scaling Diffusion Transformers** could lead to emergent physics.
- Google released google veo which provides high output and **professional cinematography**

2025 : Dawn of the Agentic Era

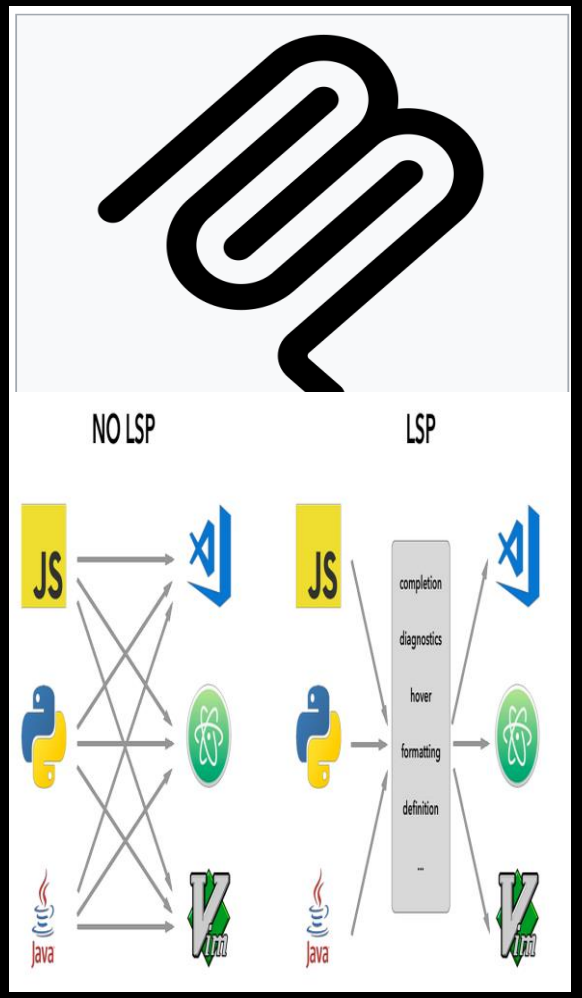
Peak Models

Gemini 3

Claude Opus 4.5

Agentic Browsers

Protocol Standardization



Coding Agents

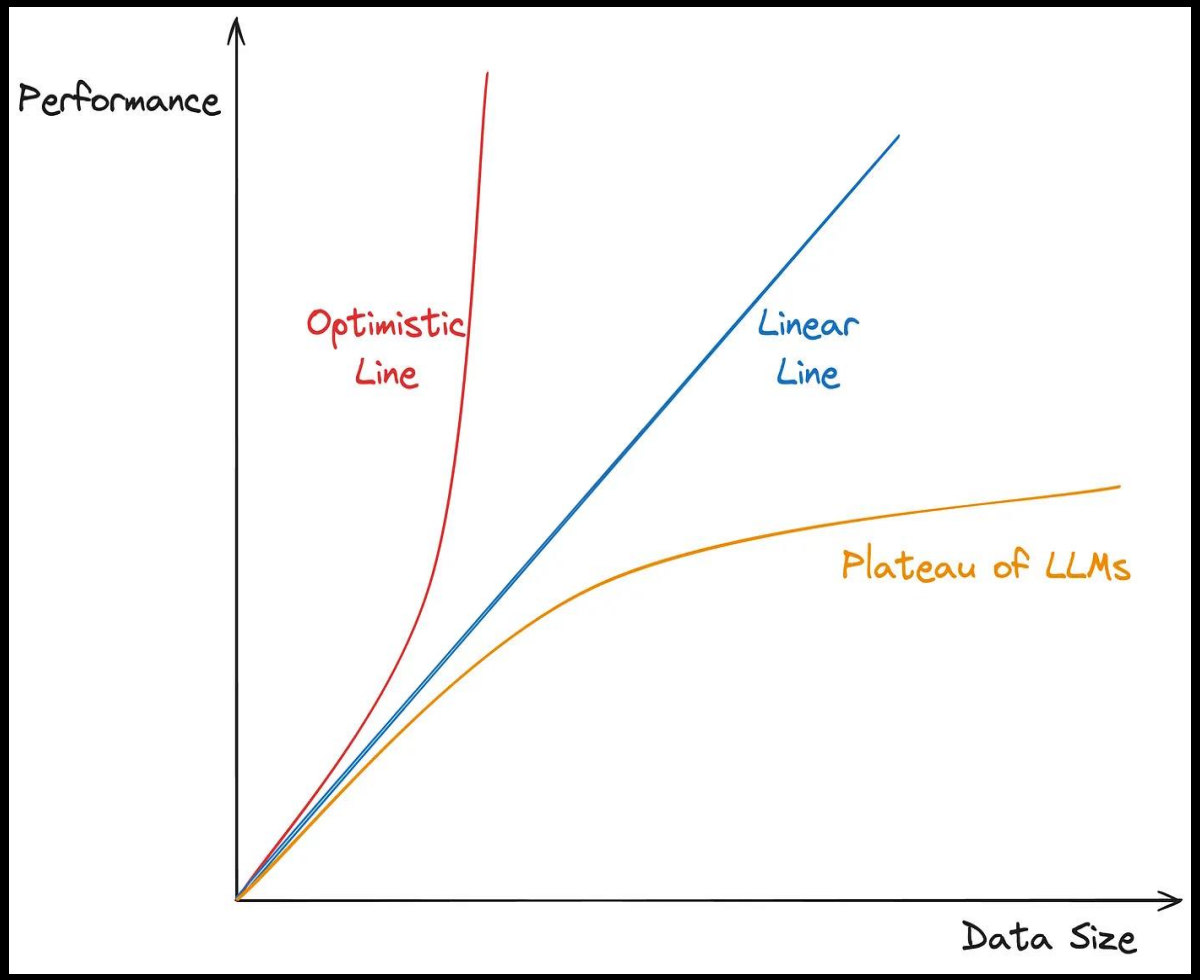
CLAUDE CODE

OpenAI Codex

Cursor AI

igmGuru

Plateau of AI Models



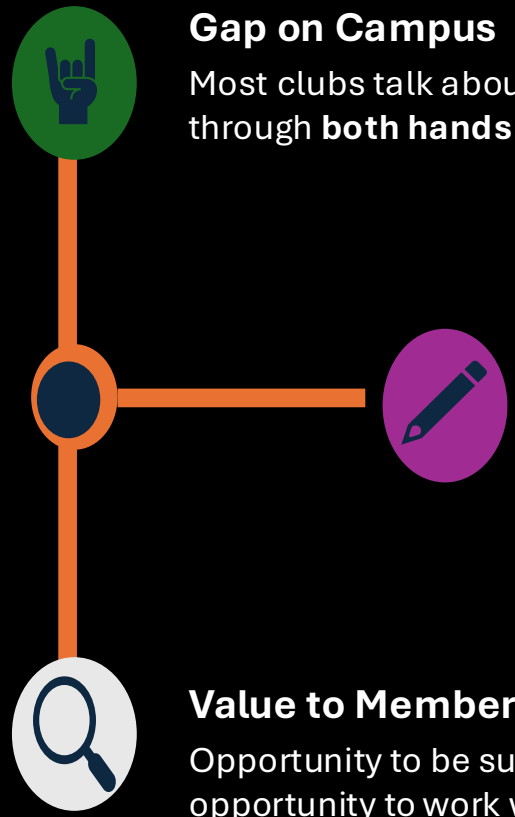
By late 2024, researchers confirmed that we had actively exhausted high-quality, human readable data

Self Attention Mechanism has saturated in performance as we are increasing context windows with every model release

Frontier models also are heavy energy compute with the latest models costing $1 to $5 billion in energy compute

With the base models hitting a plateau the only way to make the most out of the models is through providing the right context around these LLMS

The First Student Org Focused on Agentic AI



Gap on Campus

Most clubs talk about AI broadly or briefly but very few talks about Agentic AI and even few teach it through **both hands on hands off learning**

Our Differentiation

We are the **first club focuses on educating students on agentic ai and rag** where we will teach around multi-agent architecture, voice agents, MCPS etc and how to use it to **solve business problems**

Value to Members

Opportunity to be surround with people from a diverse range of majors/experience where you will get the opportunity to work with peers from a **wide range of backgrounds**

How to Join the Club

- If you are a member or developer attend weekly lectures — active participation is key, attendance will be taken.
- Lectures will be every Monday, SCD Sunset Studio 7-9pm
- If you are Attendance is required to engage in hands-on projects.
- Every lecture will follow with project team discussion
- Consistent involvement ensures access to projects and future technical lead and exec opportunities with the club

From First Principles to Mastery

- Our Lectures focus on what is happening in the real world but we make sure we focus on the fundamentals as well
- Our tech stack will change depending on the lecture modules but it will mostly revolve around python, openai api and langgraph.
- We charge $25 dollar membership for developers which will give them access to club resources, lectures and workshops.
- Check our discord for more information

Application Link

Discord Link

Questions?