# Al& Careers

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Informational Webinar for Metvy Learn



Today's Agenda

- 1 Introduction
- 2 Evolution of Al
- 3 Careers in Al
- 4 Career Advice
- 5 Q&A

### Introduction

- Al Team Lead, Swiggy
- Al Scientist, Amazon Alexa Al
- Fellow in Neuroscience, Oxford
- PhD Neuroscience, UCL
- MSc Neuroscience, Oxford
- BE Electronics, DCE (DTU)
- Founder, EduChroma (Career Mentoring)
- Founder, Timing Research Forum (Research)
- Angel Investor (Tech startups)

### **Evolution of Al**

Deep Learning Era (2008-present)

- More data, cheaper data storage, cheaper compute, hardware, cloud
- 2 GPU processors for Al computations
- Datasets & Benchmarks (ImageNet) & Pretrained models ResNet, BERT
- Transfer learning from pretrained models to downstream applications
- Train increasingly big models e.g.
  GPT3 that show few-shot learning

- Techniques to overcome cost, time and effort for manual data labeling
- Narrow Al use cases in industry: from supervised to other forms of learning
- Al applications for edge devices like mobiles, wearables, loT devices
- Building Al models that respect data privacy and trained on encrypted data
- Incorporating fairness, ethics, trust, explainability, ESG into Al models

#### Careers in Al

#### Data, Models and Engineering

- Data: Analytics, Visualisation, Engineering, Modeling, Pipelines
- Models: Novel algorithms and research, deploy scalable models, publications
- Infrastructure: DataOps, DevOps,
  MLOps, Tools, Workflows, Deployment
- Management: Use cases, roadmap, product, project, team, \$ impact
- Startup: solve real user/enterprise problem, access: data, compute, talent

- Skills: Statistics, Math, Python + Libs, ML/DL + Libs, DB, Domain expertise
- Skills: Algorithms, Scientific method, Curiosity, Experiments, Read, Write
- Skills: Maintaining, versioning, monitoring code, data & models, tools
- Skills: SME in ML/AI, Product mindset, Leadership, Soft skills, Empathy
- Skills: Intuition for problem & market, quick iteration, sales, vision, leadership

### Career Advice

Jobs in Al, Career Decisions, Startups, Work & Culture

- Develop a learning habit read blogs, papers; listen to podcasts; talk to ppl
- Build domain expertise for fields of interest eg ecommerce/finance/edu
- Al is more than coding & modeling; understand how it is built in top cos.
- Optimize for jobs/companies where you can continuously learn and grow
- Early stages: focus on learning and becoming an expert, money will follow

- Select companies with inspiring manager, solid team and Al maturity
- First jobs/companies critical to career dev; learn from the best ppl
- Evaluate culture in teams: avoid high salary jobs if poor culture/leadership
- Plan your career: short-term (1-2 yrs) and longer term (4-5 yrs)
- Be open to change and learn & evolve and plan career as life-long marathon

# Reading

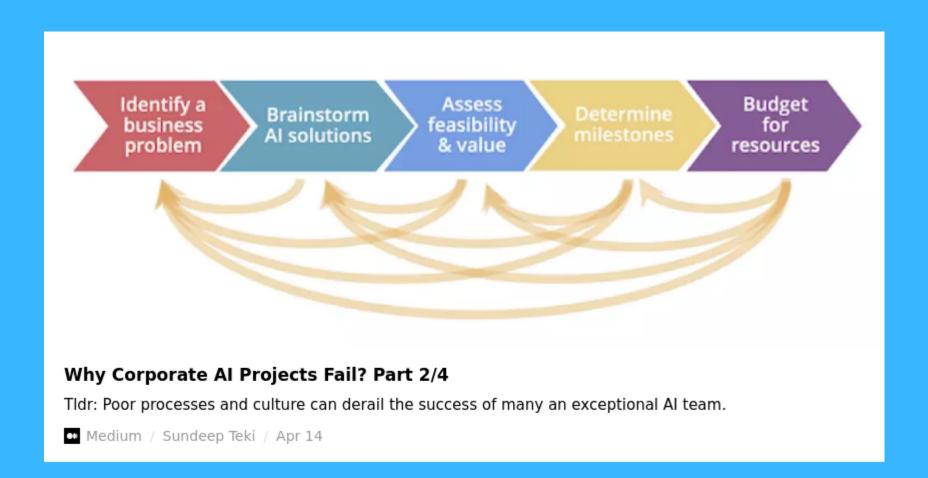
sundeepteki.org/blog



#### Why Corporate AI projects fail? Part 1/4

Tldr: Corporate Al failures can be ascribed to poor Intuition, Process, Systems, People

Medium / Sundeep Teki / Mar 15



## How to Build **Machine Learning Teams** That Deliver



#### How to Build Machine Learning Teams That Deliver

In this article, I have documented the best practices and approaches to build a productive Machine Learning team that creates positive business impact and generates economic value within corporate entities, be it startup or enterprise.

м neptune.ai / Sundeep Teki / Apr 14



Slides:

sundeepteki.org/talks.html

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