AI for developers: Making your application smarter with Azure AI Services.

Originally from Mexico.

Tech Lead at Geneca.

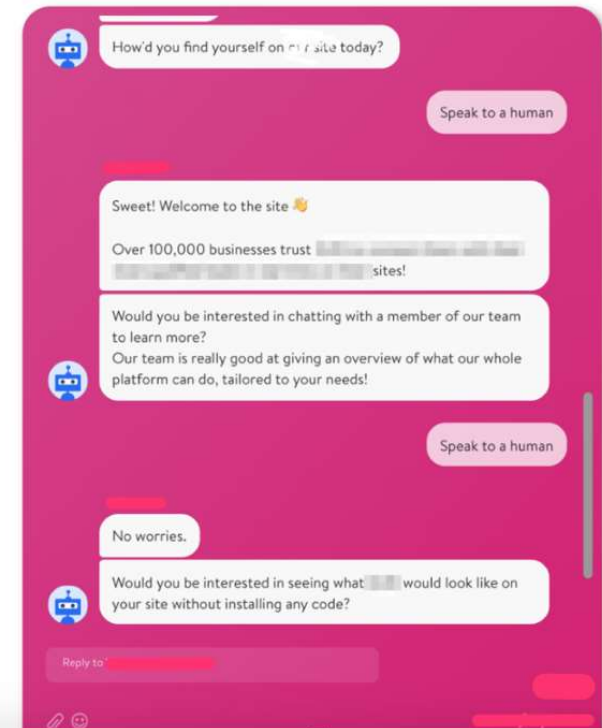Spend time with family, movies, videogames, football.

@thesoccerdev

drkclw

samueljgomez

Agenda

- AI implementation options.

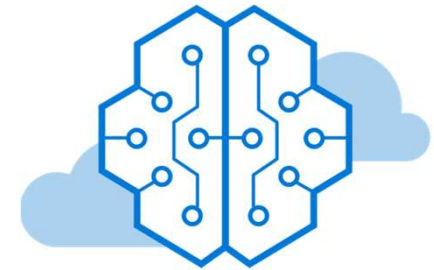- Why use Azure AI Services.

- Azure AI services APIs.

- Demo.

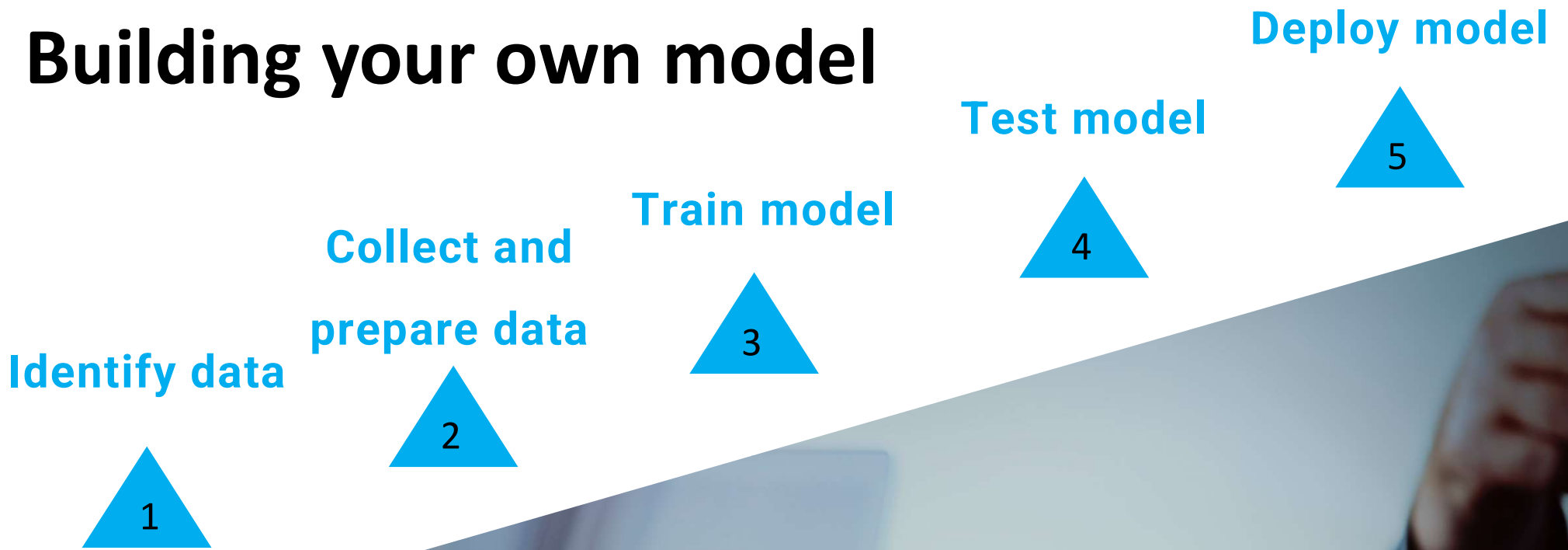# AI / ML

AI Implementation options.

Prebuilt models

Build model

Building your own model

Identify data

Collect and prepare data

Train model

Test model

Deploy model

1

2

3

4

5

Why use AI Services

- APIs for multiple scenarios.

- Easy to integrate with available SDKs:
  - C#
  - Go
  - Java
  - Javascript
  - Python

- Free tier for multiple services.

- Customizable.

API categories

 Speech

 Language

 Vision

 Decision

API categories
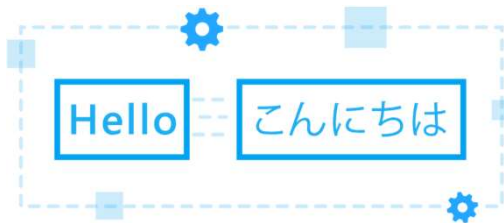
 Translator

Speech
GENECA

Speech API

Improve customer experience

Speech to text

Text to speech

Speech translation

Speaker recognition

Language

Language API

Understand conversations and text

Entity recognition

Sentiment analysis

Question answering

Conversational language understanding

Summarization

Language API

Understand conversations and text

Text analytics for health

Vision

GENECA

Vision API

Identify and analyze content

Computer Vision

Custom Vision

Face API

Decision

GENECA

Decision API

Smarter decisions

Anomaly Detector

Content Safety

Personalizer

Translator
GENECA

Translator API

Translate text

Text translation

Document translation

Custom translator

Other APIs

Other APIs

Document Intelligence

Immersive reader

Metrics advisor

Video indexer

Other APIs

Cognitive search

Bot service

Data privacy and security.

- Authentication.

- Data encrypted at rest and in transit.

- Limited access features.

- Data storage.
  - Data not stored.
  - Temporary

DEMO

What will we cover?

- Creating a resource.

- Testing APIs.

- API usage examples.
    - Vision.
    - Speech to text.
    - Language understanding.

- Custom model example.

> Let this code compile,
>
> In not an hour, but a little while.
>
> Allow this application to run with speed and zest,
>
> as this will keep users glued to my test.
>
> If my code blows up in my face,
>
> do it with style and grace.
>
> And last but not least, when all is said and run,
>
> let thy requirements have been correctly done.

https://www.rambli.com/2016/06/the-prayer-of-the-demo-gods/

Useful links.

- https://azure.microsoft.com/en-us/products/ai-services?activetab=pivot:azureopenaiservicetab.

- https://ai.azure.com/

- https://learn.microsoft.com/en-us/azure/ai-services/responsible-use-of-ai-overview

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