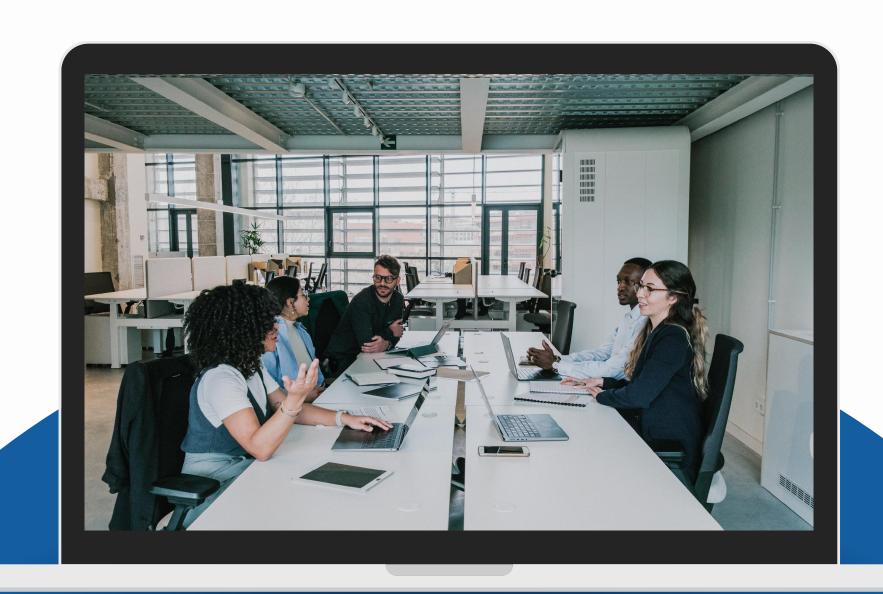


## RwandaYouthworks

# **Rwanda Youth Labor Market Analysis**

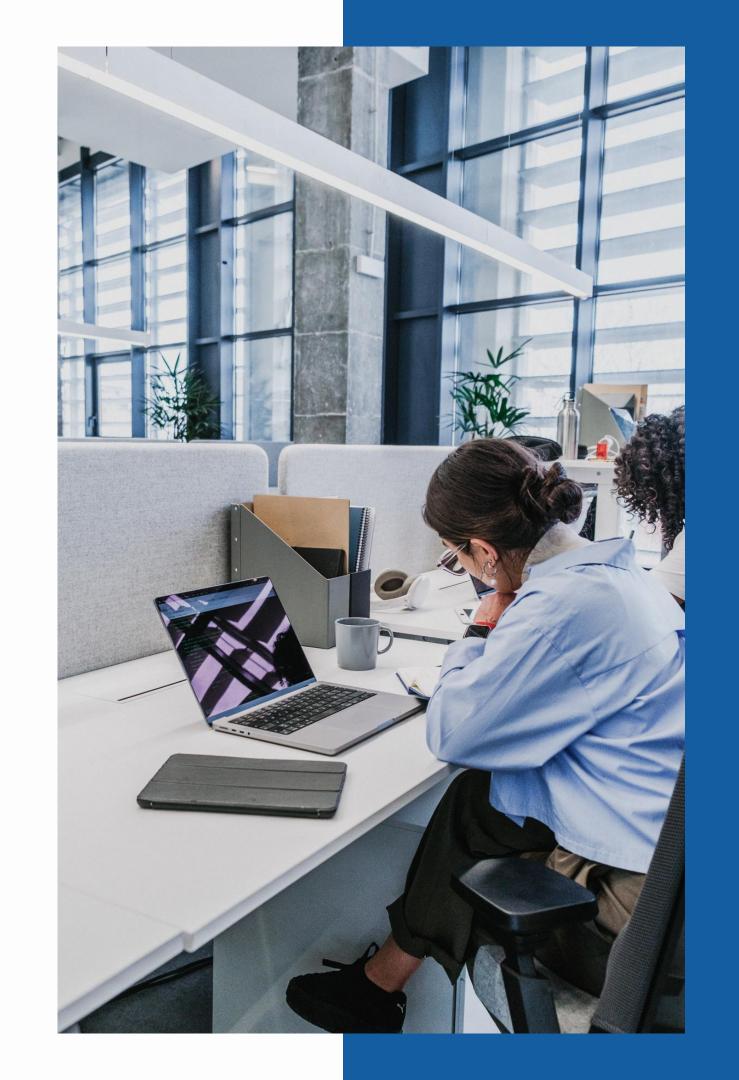
#### Team Members:

- Niyibigira Geredi
- Ngoga Alexis
- Nzambazamariya Odile



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## Problem statement

Youth unemployment in Rwanda is a pressing issue, where youth face a notably higher unemployment rate of **16.6%** compared to adults at **10.3%**. Despite Rwanda's remarkable economic growth averaging **7.5%** GDP growth since 2000[1].



# Objectives



**Analyze Youth Unemployment Trends** 

**Forecast Employment** 

**Patterns** 

for 2025-2050



Al Powered chatbot



Support Policies
Development
with actionable
insights



Empower Youth
through career
guidance and job
Recommendations



## **DATA**

#### **Primary Dataset**

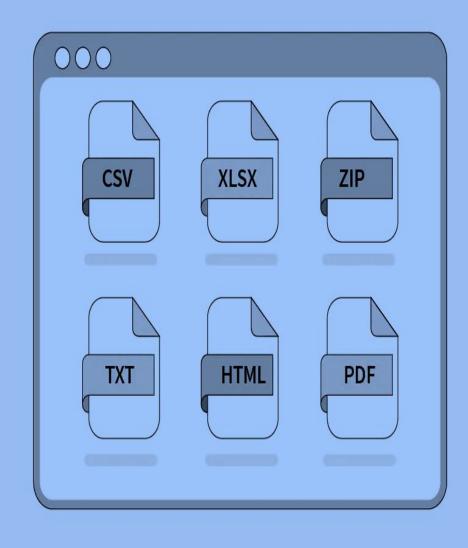
- Labour Force Survey 2022 by NISR.
- unemployment analysis from Kaggle.
- HumanDevelopmentIndex from Kaggle.

### **Key Attributes**

- Demographics
- Education
- Employment

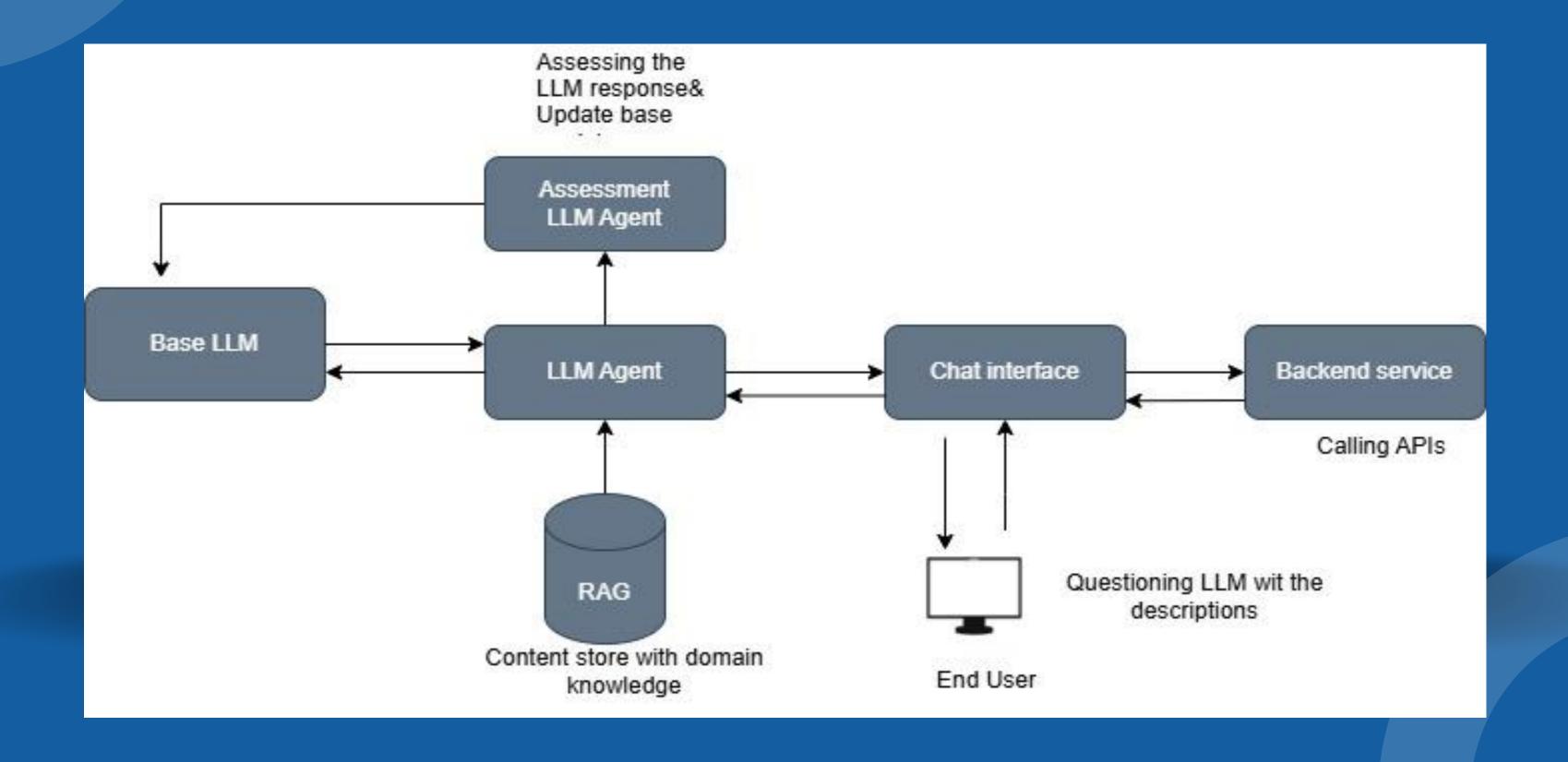
#### indicators

- Unemployment
- HDI
- Location
- working sector
- Education





## SYSTEM ARCHITECTURE



## **Technologies**



#### Programming Language

- JAVASCRIPT
- HTML & CSS
- Python



#### Frameworks and Libraries

- Dash
- Plotly
- Pandas & NumPy
- Scikit-learn
- ARIMA
- chainlit



#### **Backend Integration**

- Dynamodb
- ChromeaDb
- Dockerization
- GCP

## **AI-Powered Chatbot**



python



#### tools

- Chainlit
- OpenAl API
- Custom Event Handlers



#### **Features**

- Core Functionalities
- User Interaction Management:
- Feedback Handling
- File Processing
- Custom Events
- Al Model Integration

## **DEMO**

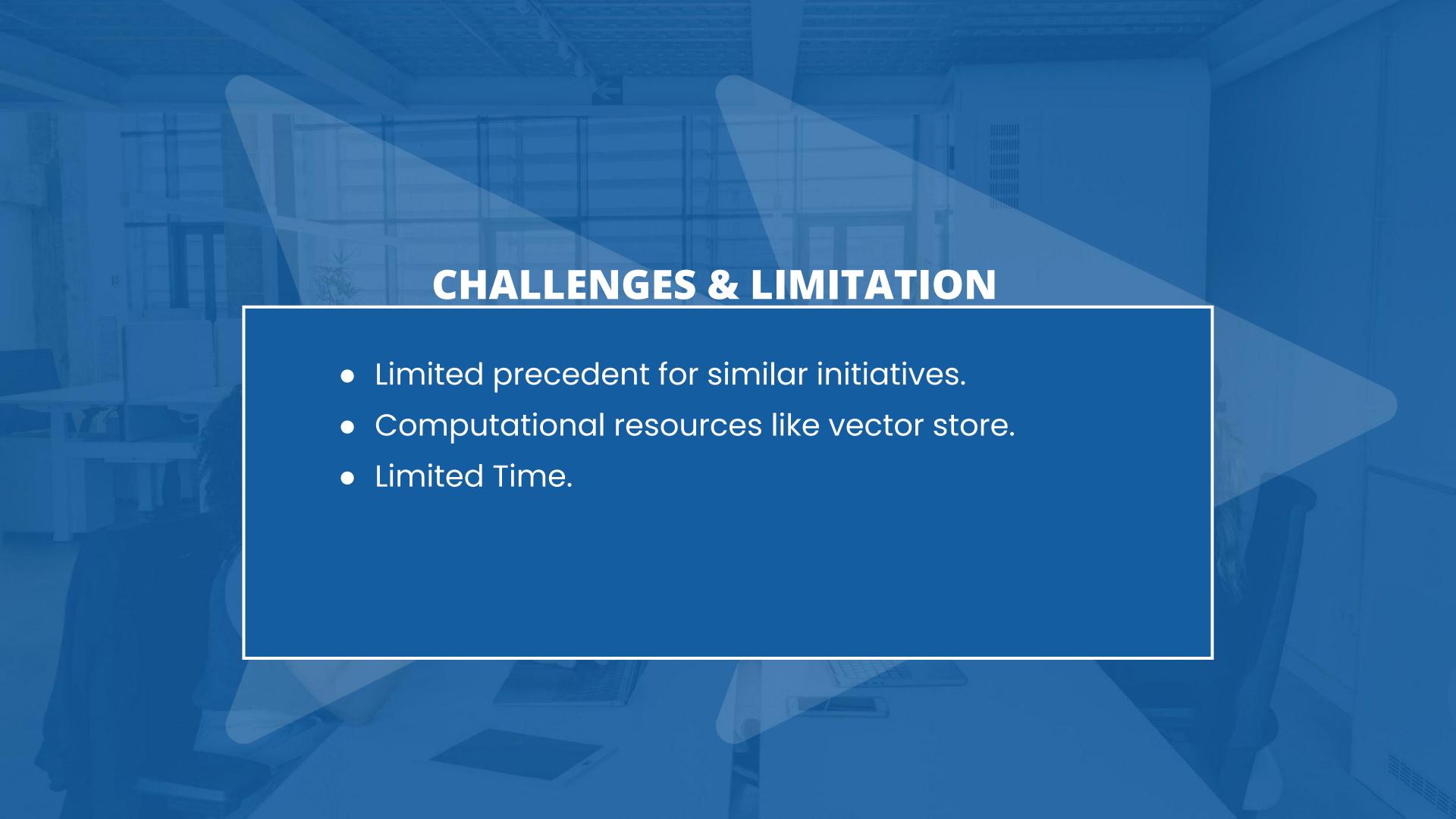
> Link: https://chainlit-app-499976136593.us-central1.run.app/





## **FUTURE WORK**

- Al voice Assistant Conversation
- Extend to high dimension data
- Integrating within other applications





# THANKYOU! Q&A