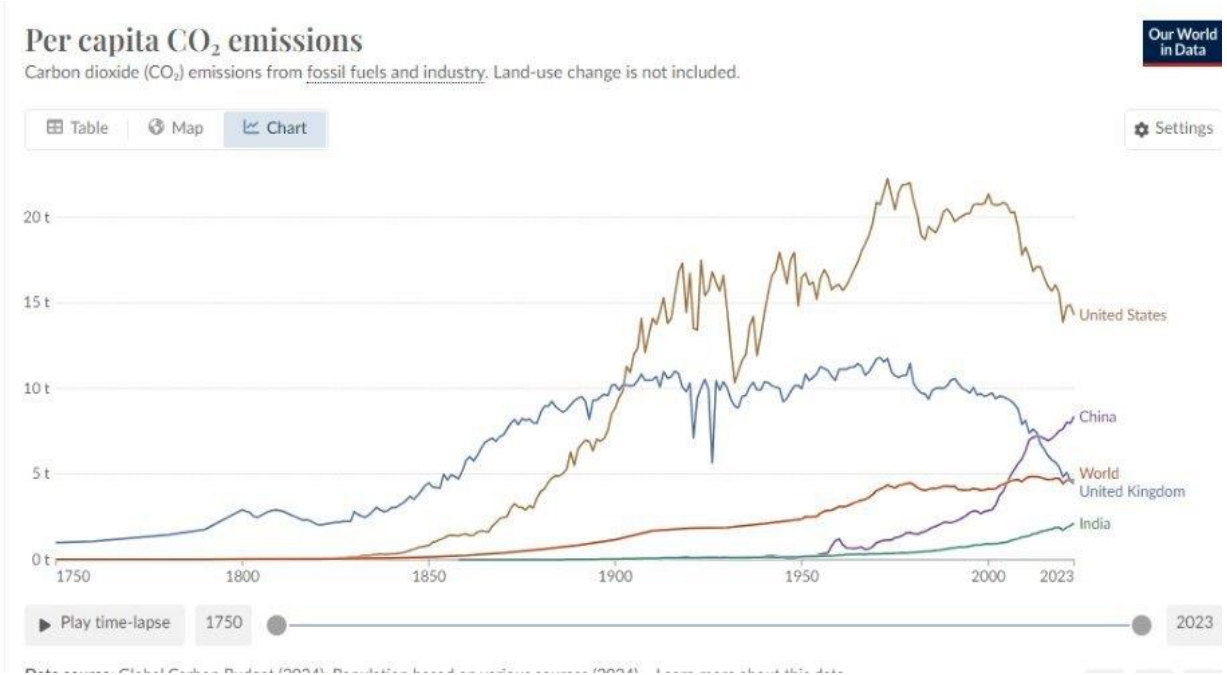
The Issue

...

Climate change has far-reaching effects on the planet, causing rising global temperatures, more extreme weather events, and rising sea levels.

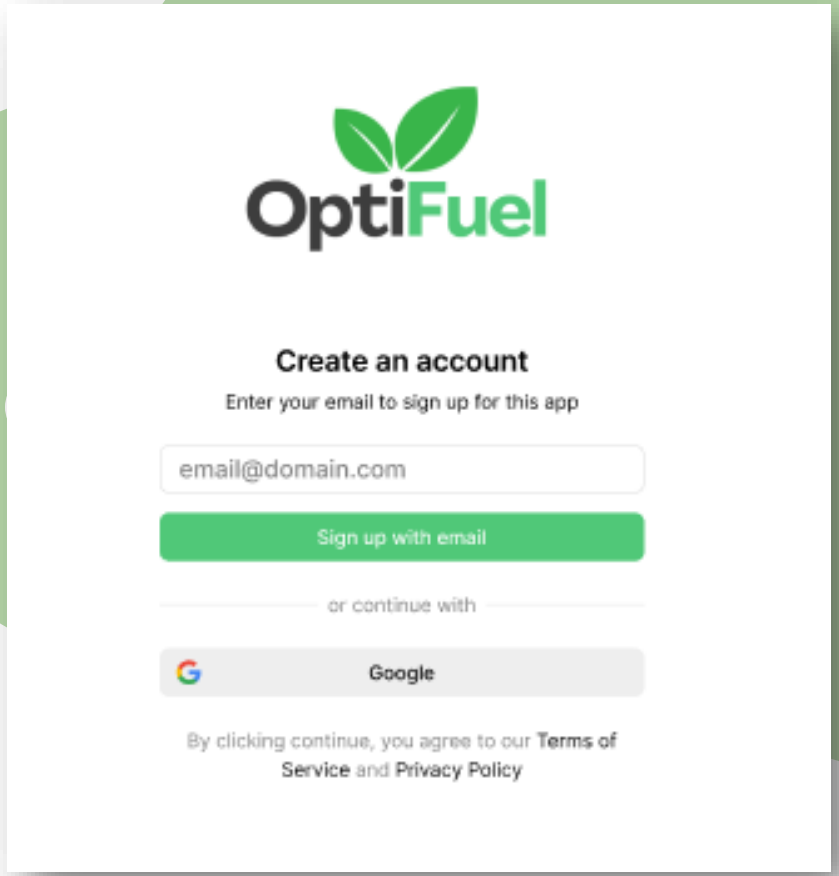
Graphical Representation



- Since the widespread use of fossil fuels began, annual CO2 emissions have steadily increased, significantly contributing to global climate change.

Introducing: OptiFuel

By: Sade W, Derek M, Gary M, and Kenden B



OUR COMPANY

OptiFuel uses advanced language models to analyze energy usage, providing sustainable solutions that reduce fuel costs and environmental impact, with both short- and long-term cost analyses.

01

The issues

Climate change & inefficient energy management.

02

Our Solution

NLP, ML, Iot integration, prediction analytics, and etc.

03

Comparative Analysis

Where our product fills the gap

04

CONCLUSION

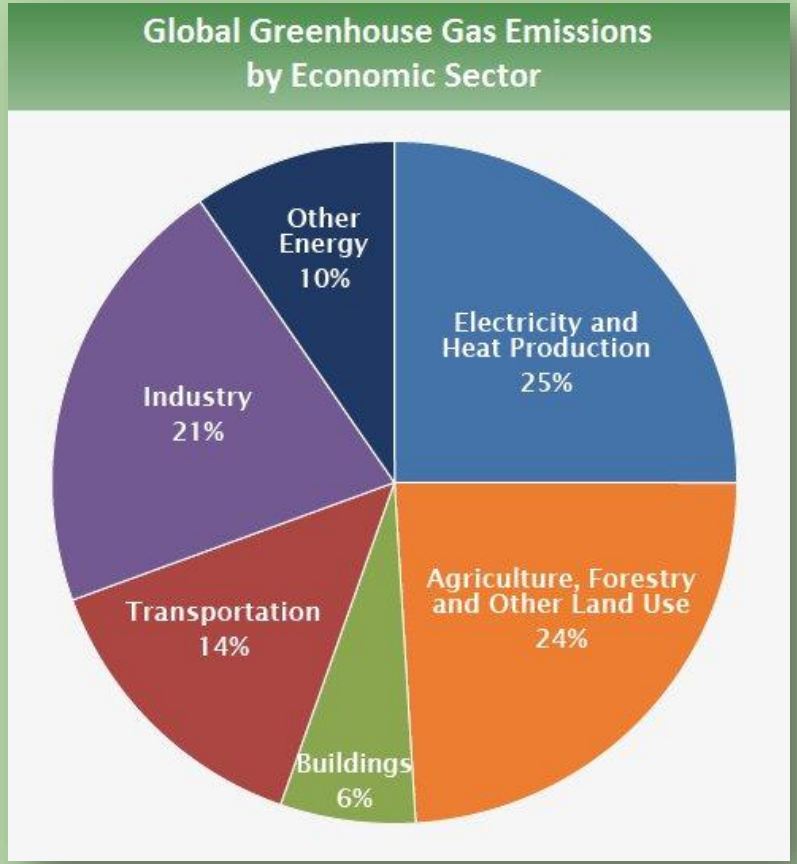
Recap of the main points

01

The Issue

- Industries such as transportation, electricity, heat production, agriculture, and forestry produce a lot of CO2 emissions due to their use of burning fossil fuels

- Did you know studies suggest that 20-30% of energy costs in companies can be attributed to inefficiencies?



02: Components of Our Solution

NLP

Will process textual data, extracting relevant insights or metrics from reports, emails, or feedback.

Anomaly Detection

Critical application of AI, where systems identify unusual patterns, behaviors, or observations that deviate significantly from normal expectations.

ML

Automates tasks, improving decision-making, predictive modelling and optimizing operations.

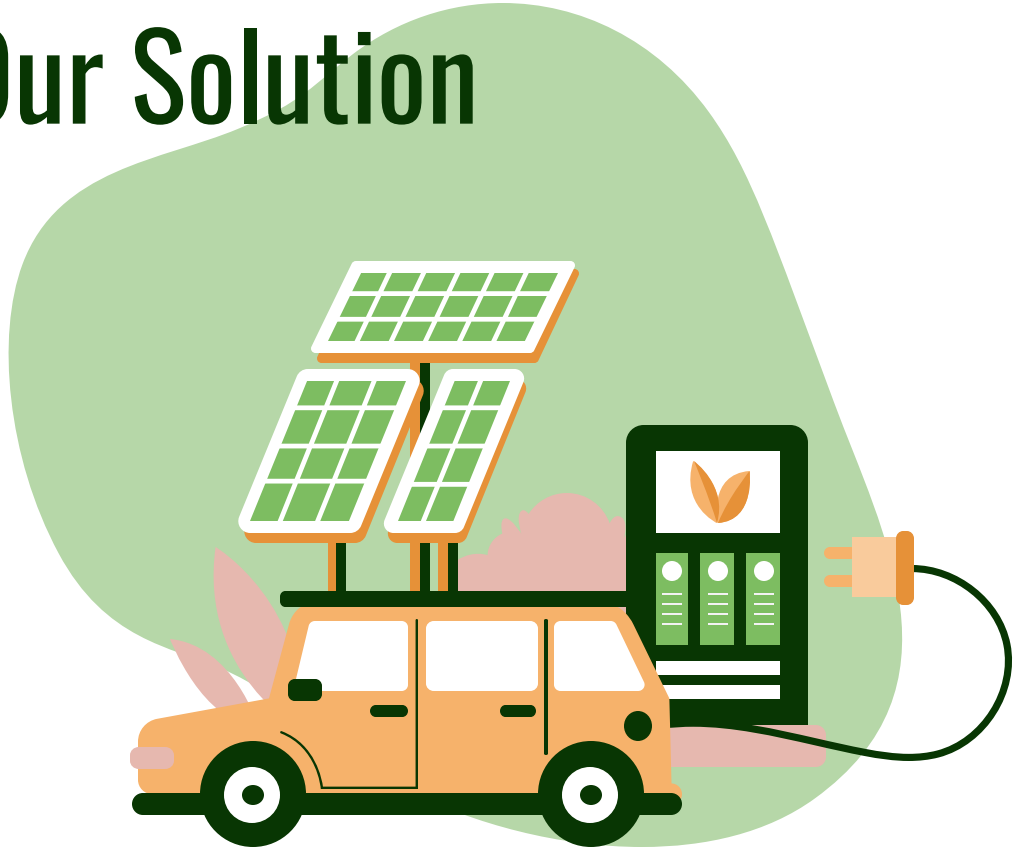
02: Components of Our Solution

Monitoring Fuel Usage

IoT integration: AI can process real-time data from IoT sensors

Fuel Efficiency Optimization

Route Optimization: AI-powered tools like GPS systems can calculate the most fuel-efficient routes



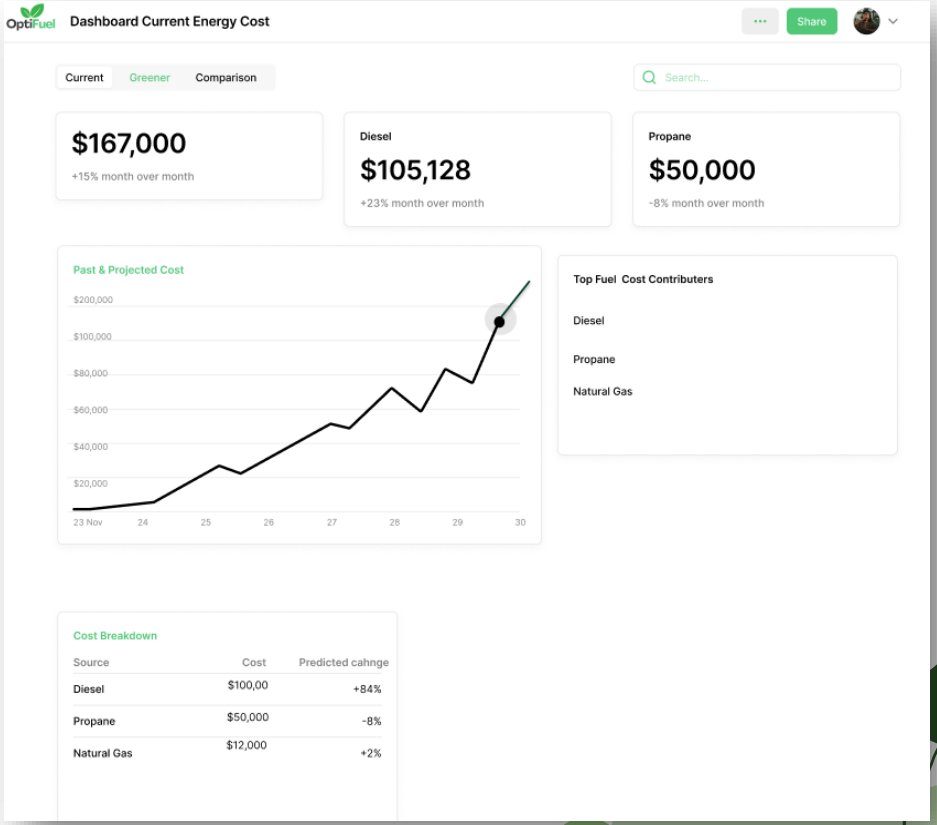
02: Components of Our Solution

BI

Leverages artificial intelligence (AI) and machine learning (ML) to enhance data analysis, visualization, and decision-making processes.

Predictive Analytics Tools

Leverages artificial intelligence (AI) and machine learning (ML) to enhance data analysis, visualization, and decision-making processes.



03: Our Competitors

General Electric Company	Exxon Mobil	Dominion Energy
General Electric leverages AI to streamline power plant management and ensure smooth grid operations.	Siemens Energy is using AI extensively in its operations, particularly in enhancing grid management, energy production, and system performance.	Through AI-based forecasting, Dominion maximizes solar and wind energy production, reducing dependency on fossil fuels and lowering carbon emissions.

04: Conclusion

Helping Climate Change

Studies have shown that when renewable energy sources (solar, wind, hydro) are adopted on a significant scale, carbon dioxide emissions from the energy sector can decrease by as much as **70-90%** by 2050, depending on the region and pace of transition.

Utilizing AI

According to a McKinsey report, **AI adoption has the potential to increase business productivity by 40% or more**, as it enables automation of repetitive tasks, predictive analytics, and personalized customer experiences.

Helping Businesses

Businesses adopting renewable energy have reported savings of **up to 20-40%** in energy costs over time, depending on their energy mix and efficiency measures.

Thank You!