

# Tanzanian Water Wells



Water pump functionality in rural schemes  
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# Background

- Developing country
- Population of 67.4 Million
- GDP of US \$67.8 Billion
- Growth projection 6% 2025



# Goals

- Address some important UN sustainable dev goals in TZ
  - Water access
  - Water sanitation
  - Poverty reduction
- Mission improving methods
  - Identification
  - Action

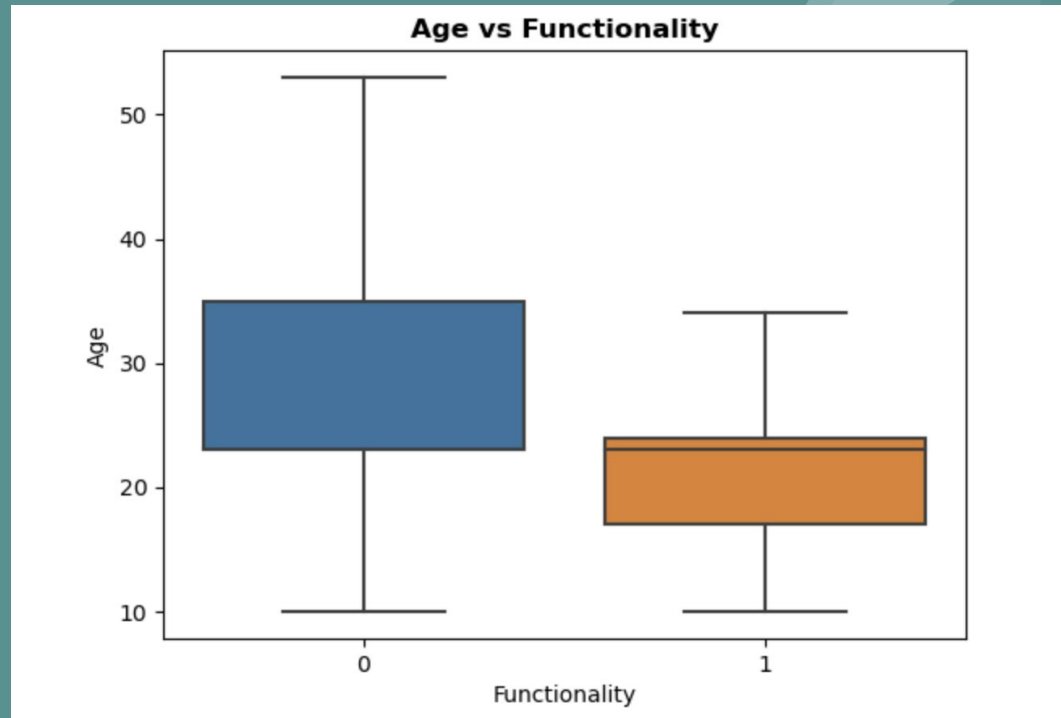


# Water scarcity

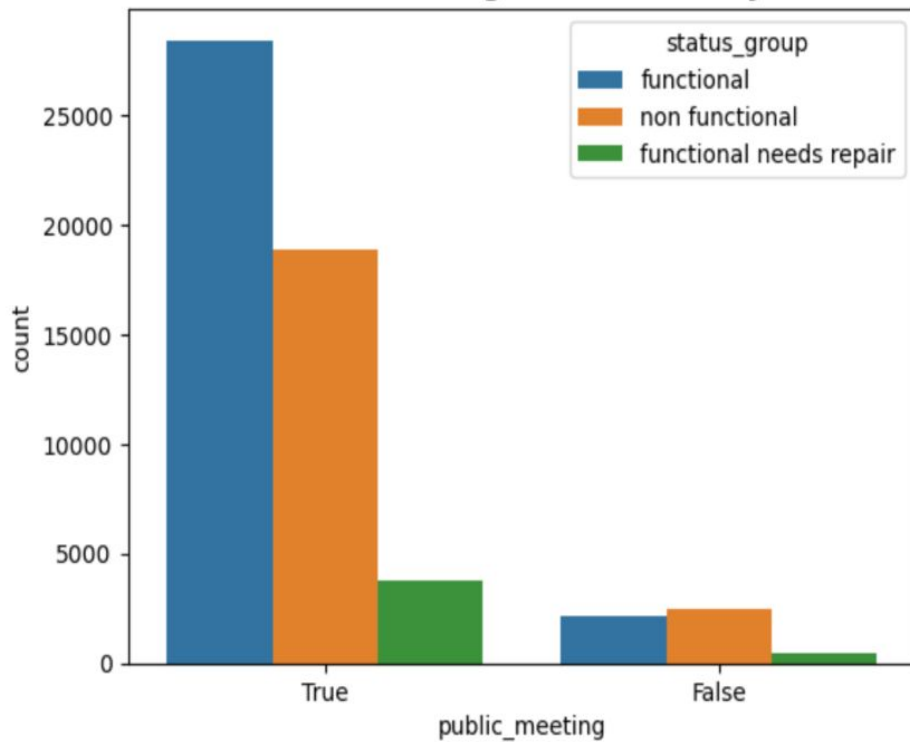
“...(28% of the population) lack access to safe water.. (73%) lack access to safely managed household sanitation facilities” (water.org).

From our water scheme data:

- 61% functional
- 37% non-functional



**Public meeting and functionality**



# 77%

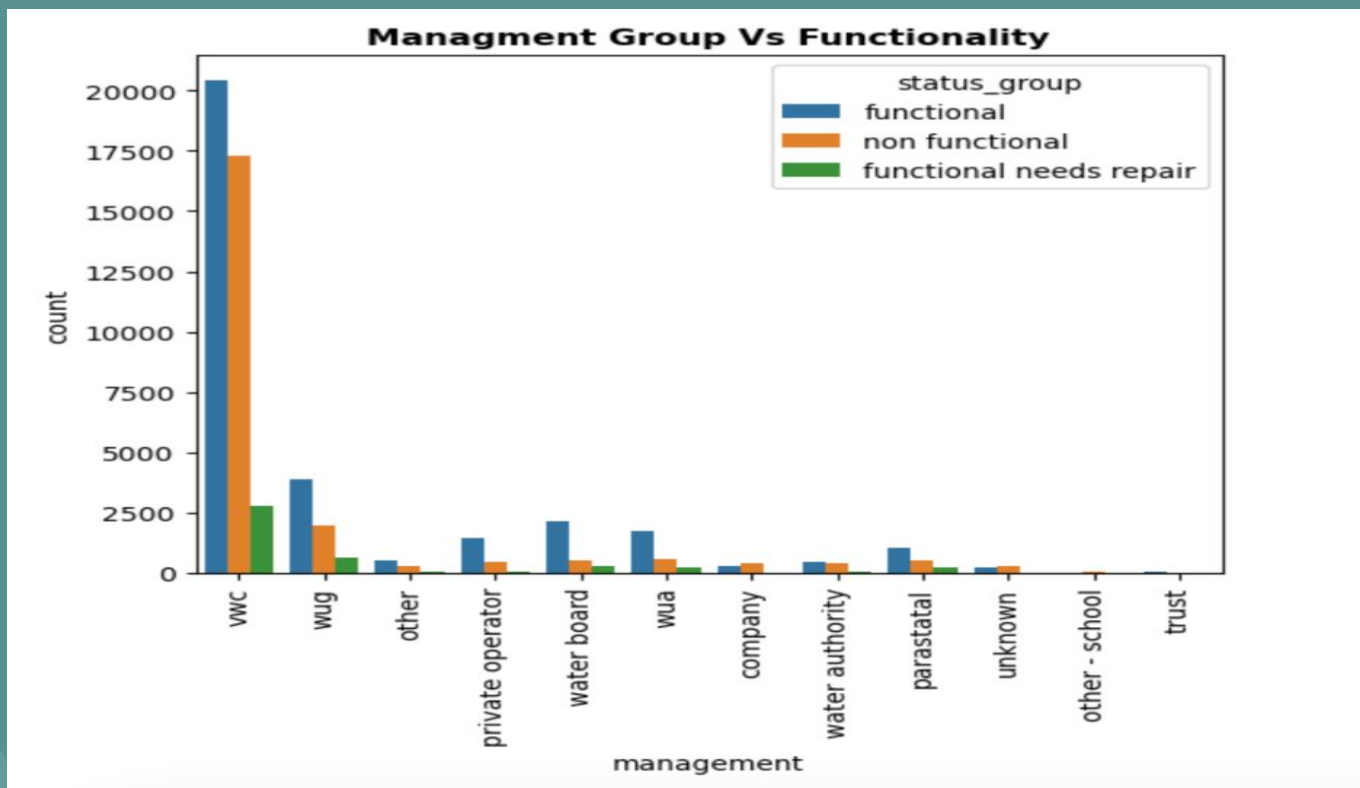
Balanced Accuracy

Predictive Model Given a schemes Features

## Top 10 features affecting Functionality

Quantity_group
Water point
Source
Installer
Gps height
Payment
Construction year
Public meeting
Extraction type
Scheme management



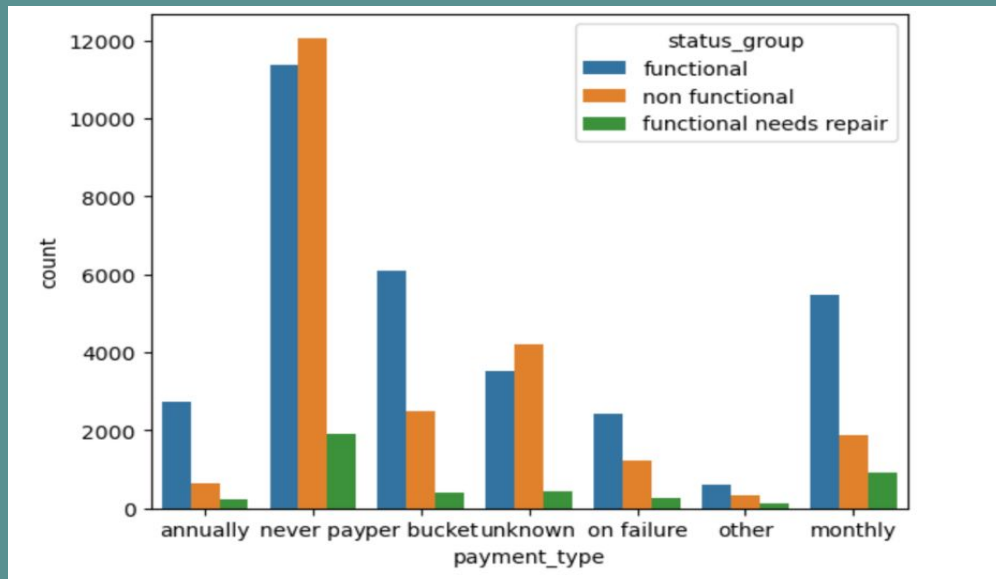


# Recommendations

- Community engagement
- Proactive Maintenance
- Adopting This Model



## Next steps



- Improve model with better data
- Identify micro lending possibilities

# Thank you!

