



## **Building Mobile And Web Apps**

# **A Markerless Augmented Reality System for Mobile Devices**

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## Paper Summary

- A Markerless Augmented Reality System for Mobile Devices
- Research done by Alex Ufkes and Mark Fiala
- Open CV and Android Platform
- Experimental Results – mobile AR system recognizing a scene and drawing simple augmentation overlays (grid lines and cube).



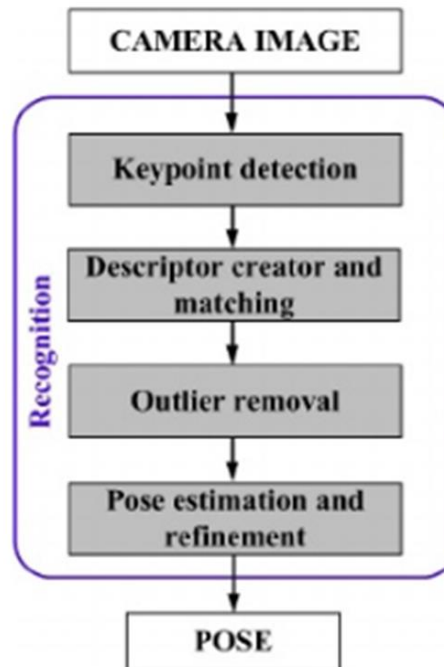
# Existing System Architecture



Figure 2 - AR pipeline overview.



# Planned System Architecture



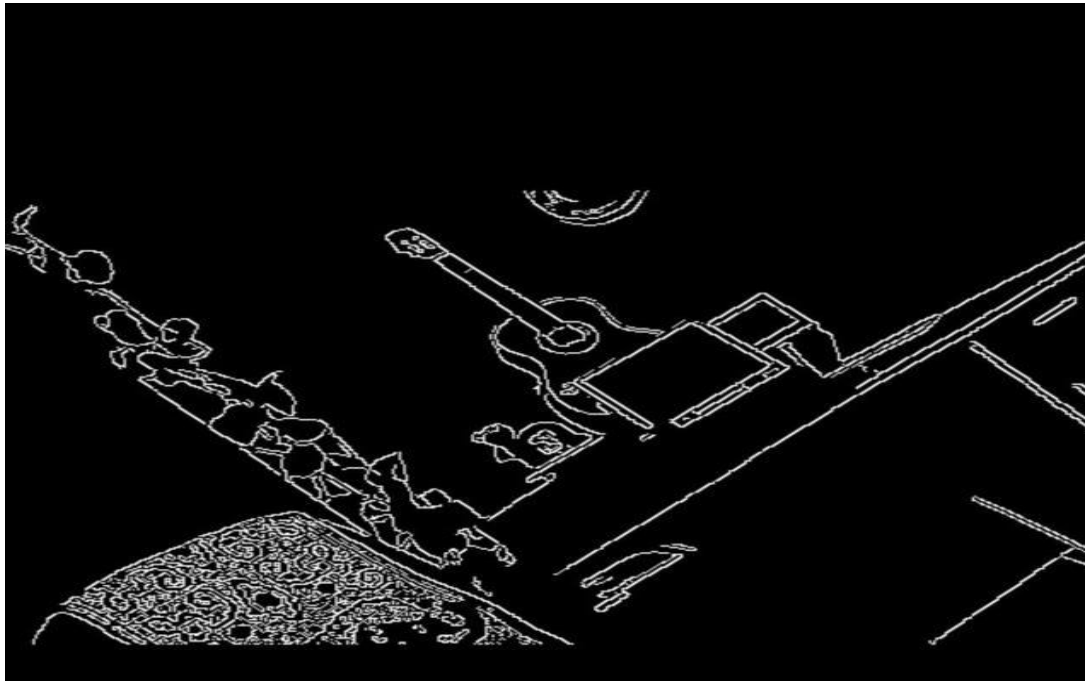


# Implementation

- Open CV
- Android Platform
- Unity 3D
- Android Studio

# Client Apps

Output of Feature Detection



# Client Apps

Output of Jet Fighter





# Client Apps

## Output of 3D Augmentation Overlay





Thank You!