

Knuckle Input

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Fachpraktikum Interaktive Systeme: Machine Learning and Computer Vision for HCI | Stuttgart | 11.12.2018



Current Status

- Created example images for each gesture
- Study procedure implemented in app
 - Odd UserIDs start with finger, even UserIDs with knuckle
 - Gestures in random order
- Datawriter ist implemented



Gestures

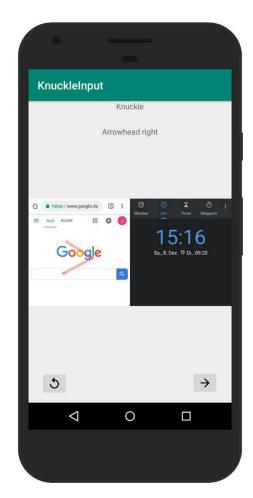
- Press
- Two knuckel press
- Swipe left/right/up/down
- Two knuckle swipe up/down
- Arrowhead left/right
- Checkmark
- L, mirrored L and Γ
- S
- Press and rotate

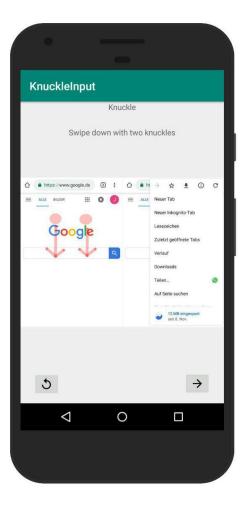
- Right-click
- Open multitasking view
- Rotate 3D object
- Open settings / app settings
- Switch between apps
- Confirm input
- Custom apps, flashlight
- Screenshot
- Change volume



App structure

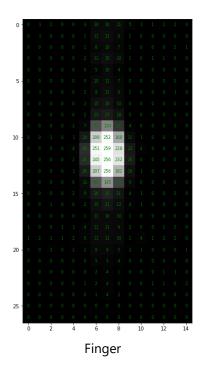




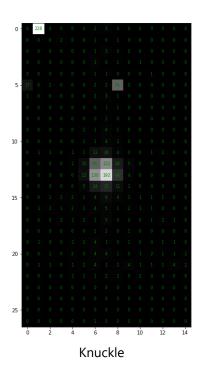




Data Collection



- Data is stored
- 24.7 to 24.8 samples/second
- Some data is lost
 - < 1%
 - DataStream is missing some characters
- Blob Detection in progress



Todo

- New blob detection, because the kernel with highest output slows down input
- Pilot study

