

# Running surveillance software as a unikernel

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ICDD 2016

A decorative light blue triangle is located in the bottom right corner of the slide, pointing towards the top right.

# Unikernels

Otherwise known as “Library Operating Systems”:

- HaLVM
- MirageOS
- Rumpun

# What are unikernels good for?

- Virtualisation
- Isolation
- Security

# Rump Camera

1. The video format should be easily recognized by video-players
2. The total size of recorded videos should be limited, in order to avoid filling the storage medium
3. Each video should have a fixed specified length, in order to be able to create, for example, daily videos
4. The end user should have access to the surveillance videos via an easy-to-use interface

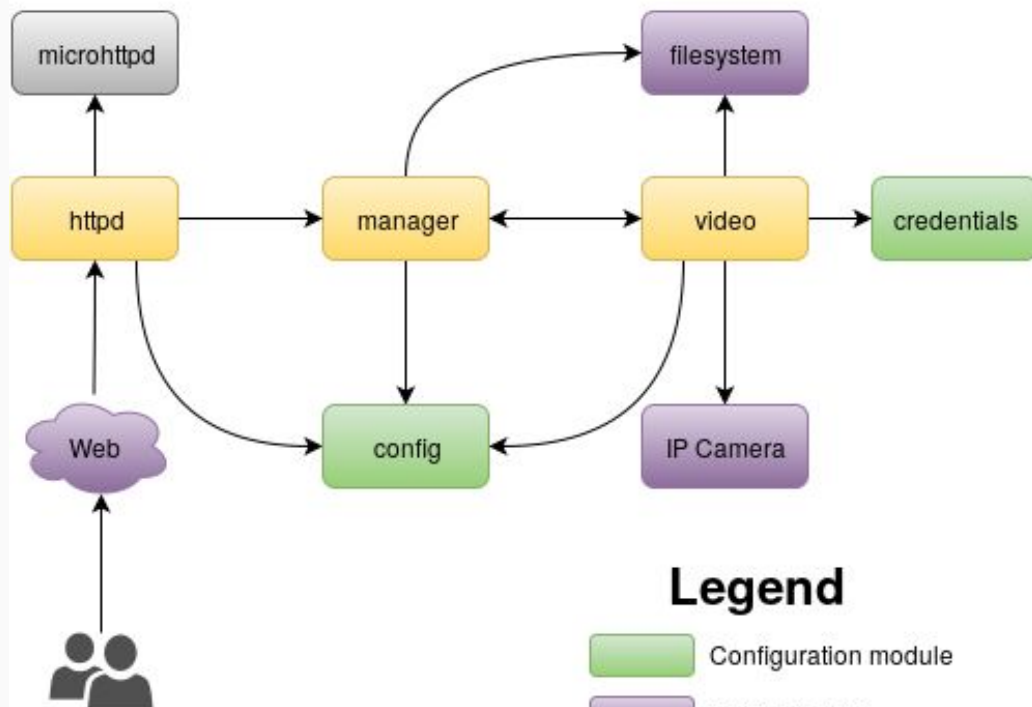
# Solutions

- MJPEG
- POSIX-like interface & meta-data storage
- Time checks & FIFO
- Web interface





# The GUI

1. [video2016-03-17-13-24-38.mjpeg \(5 MB\)](#)
2. [video2016-03-17-13-24-27.mjpeg \(4 MB\)](#)
3. [video2016-03-17-13-24-16.mjpeg \(4 MB\)](#)
4. [video2016-03-17-13-24-05.mjpeg \(4 MB\)](#)
5. [video2016-03-17-13-23-54.mjpeg \(5 MB\)](#)

# Rump Camera Architecture



## Legend

-  Configuration module
-  External entity
-  Active application module
-  Third party library
-  Users

DEMO



# Running surveillance software as a unikernel

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