Welcome to the Akraino Wiki

Akraino is an open source software stack that improves the state of edge cloud infrastructure for carrier, provider, and IoT networks.

Akraino offers new levels of flexibility to scale edge cloud services quickly, to maximize the applications or subscribers supported on each server, and to help ensure the reliability of systems that must be up at all times.

Akraino also provides processing power closer to endpoint customer devices to meet application latency requirements of less than ~20 milliseconds.

This open source software stack intends to provide critical infrastructure to:

- Enable line speed processing
- Enable high throughput
- Reduce latency
- Improve availability
- Lower operational overhead
- Provide scalability
- Address security needs
- Improve fault management

The Akraino community is focused on Edge APIs, Middleware, Software Development Kits (SDKs) and will allow for cross-platform interoperability with 3rd party clouds. The Edge Stack will also enable the development of Edge applications and create an application w/ Virtual Network Function (VNF) ecosystem.

The Akraino Wiki is a collaboration tool for the Akraino community to work together and publish documents.

Integration Projects (aka "Blueprints")

- 5G MEC System Blueprint Family
- AI/ML and AR/VR applications at Edge
- Automotive Area
- CPS Robot Blueprint family
- Edge Video Processing
- Integrated Cloud Native NFV/App stack family (Short term: ICN)
- Integrated Edge Cloud (IEC) Blueprint Family
- IoT Area
- KubeEdge Edge Service Blueprint
- Kubernetes-Native Infrastructure (KNI) Blueprint Family
- Metaverse Area
- MicroMEC
- Network Cloud Blueprint Family
- OpenMined PipelineDP
- Public Cloud Edge Interface (PCEI) Blueprint Family
- Smart Data Transaction for CPS
- StarlingX Far Edge Distributed Cloud
- Tami COVID-19 Blueprint Family
- Telco Appliance Blueprint Family
- Time-Critical Edge Compute

Feature Projects

- Cluster Health & Overload Monitoring Platform (CHOMP) Feature Project
- Support of OVS-DPDK in Airship
- Akraino Portal Feature Project
- Akraino Validation Framework
- MEC API Framework
- API Gateway
- Akraino Profiling
- Akraino Regional Controller
- Backup and Restore (Snappy) Feature Project
- KONTOUR

Help Us Improve the Wiki

This Wiki is owned by the Akraino Community. Contributions are always welcomed to help make it better!

In upper right, select Log In. You will need a Linux Foundation Account (can be created at http://myprofile.linuxfoundation.org/) to log-in. For a Wiki tutorial, please see Confluence Overview. Thank you!

Recent space activity

- ysemi ysemi
  Akraino Release 6 Marketing updated about 2 hours ago • view change
- Jack Liu
  Blueprint Maturity Reviews updated about 4 hours ago • view change

Links

- Akraino Website
- General overview of Akraino
- Community Meetings & Calendar
- Join LF Edge
- Network Cloud Family Seed Code (Network Cloud Blueprint)
Meetings of IEC Type 3: Android cloud native applications on Arm servers in edge updated about 5 hours ago • view change

Tina Tsou
Akraino Africa Community Lab (pending review) commented yesterday at 8:49 PM

Kendall Perez
Technical Steering Committee (TSC) updated yesterday at 8:05 PM • view change