Aerial RAN CoLab – OTA K8 Service Management Blueprint

NVIDIA Qualified Service Management Blueprint

ARC-OTA provides Kubernetes for container orchestration. Both single node and multi-node deployment topologies are supported. ARC-OTA uses helm to manage applications

- **Deployment ARC gNB :** The helm chart uses K8 deployment to create pod gNB. The gNB pod contains the containers **nv-cubb** and **oai-gnb-aerial.** Both containers are installed in the same pod to allow the use of shared memory between Layer 1 and Layer 2+. This **helm chart** is available for download from NGC.

- **Deployment ARC 5GC :** The helm-chart is installed on the CN5G server or same physical server as the gNB. This helm chart creates multiple K8 deployments depicted on left. This helm chart is available for download from the OAI GitLab repository

ARC-OTA Service Monitoring feature uses a combination of Grafana, Loki, Promtail and Prometheus. The feature was developed using open-source industry standard tools and it can be extended to specific developer needs

Reference Sterling developer extension <link XX> for additional details