

coRAN LABS



SATORI
SOLUTIONS

RAN Insights rApp



RAN Insights rApp



Modern RAN networks generate massive volumes of PM counter data, but extracting actionable insights remains a challenge. Traditional tools rely on raw metrics and generic dashboards, limiting operational visibility.

RAN Insights rApp bridges this gap by converting raw PM data into meaningful, operator-ready intelligence.

KPI Computation Engine

- Processes real-time PM counter streams
- Computes key RAN KPIs:
- Throughput (DL/UL)
- PRB utilization
- RSRP, SINR, CQI
- BLER, MCS, UE count

Converts raw data into usable performance insights

Intelligent Alerting

- Configurable KPI thresholds
- Multi-level severity (Critical / Warning / Info)
- Deduplication and auto-resolution

Ensures reliable and actionable alerts

Seamless Integration

- Works with standard PM counter pipelines
- REST APIs for external system integration
- EIAP, ORAN, 3GPP compliant

Compatible with multi-vendor RAN environments



How It Works

- PM counter data is ingested in real time
- KPI engine processes and computes metrics
- Alert engine evaluates thresholds
- Data is stored for trend analysis
- Dashboard and APIs deliver insights

Architecture Highlights

- Real-time data ingestion pipeline
- KPI computation and enrichment layer
- Alerting engine with configurable rules
- Time-series storage (InfluxDB)
- Web dashboard + REST APIs

KPI Coverage

Resource Utilization

- PRB Usage DL
- PRB Usage UL
- Available PRBs
- PRB DL (raw)
- PRB UL (raw)

Throughput

- DL Throughput
- UL Throughput
- TX Bytes
- RX Bytes

UE / Capacity

- Active UE Count
- Active UE Max
- Active UE Avg
- Total UEs (gNB)

Radio Quality

- RSRP
- CQI
- DL BLER
- UL BLER
- MCS DL
- MCS UL
- Rank Indicator

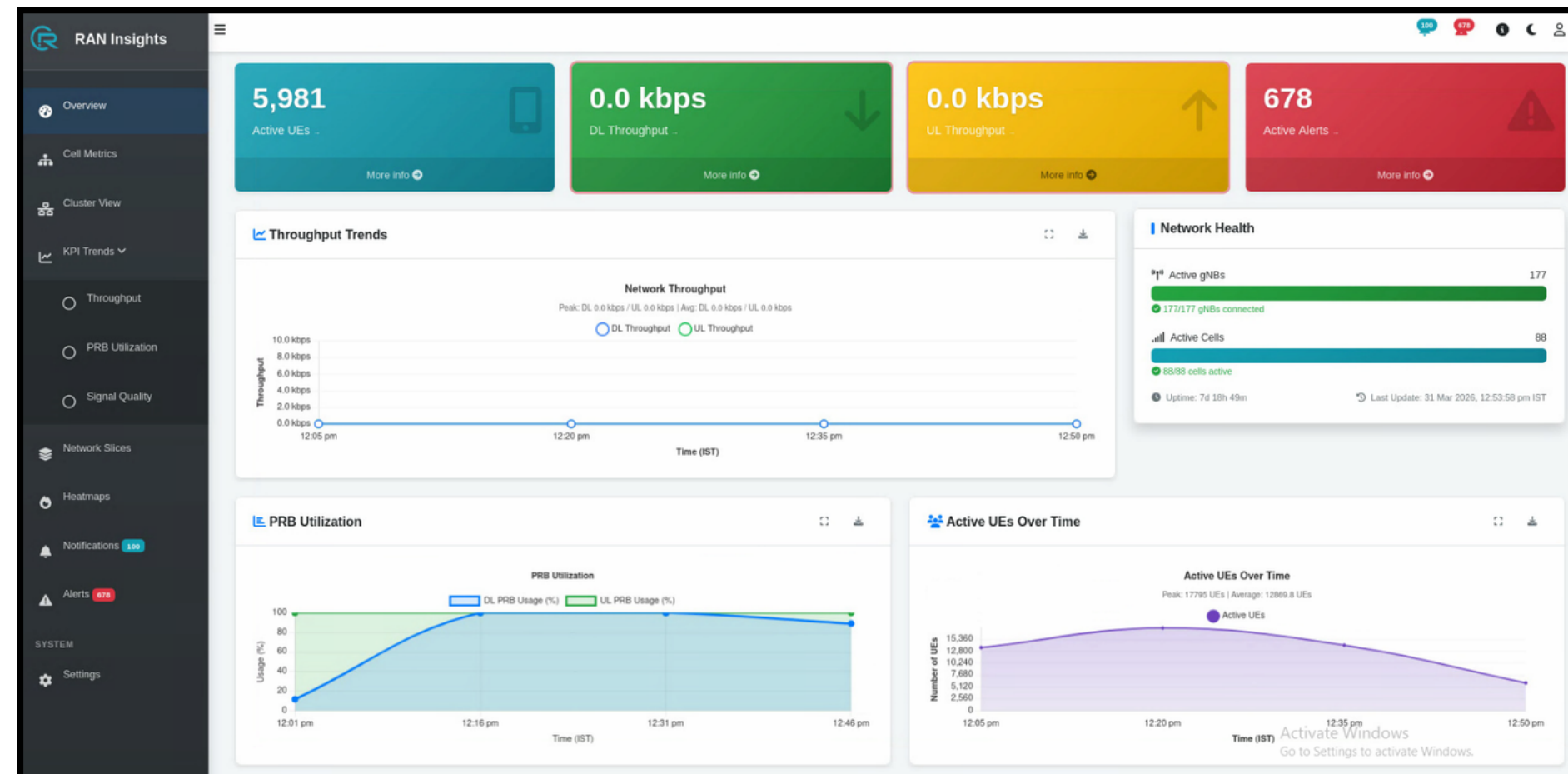
DTX / Failures

- PUSCH DTX
- PUCCH DTX



Interactive Dashboard

- Network-wide KPI overview
- Cell-level performance monitoring
- KPI trend analysis (15 min → 7 days)
- Heatmaps and topology views
- Alert and notification management



All insights in a single unified interface

The interactive dashboard provides multiple views for KPI monitoring and analysis, including PRB utilization, heatmaps, gNB-level insights, alerts, notifications, and cluster-level views.

The **Ericsson Intelligent Automation Platform (EIAP)** provides Service Management and Orchestration (SMO) for Open RAN and further enhances openness, network management, and automation by supporting multi-vendor and multi-technology RAN environments.

EIAP is supported by open interfaces and the industry's leading Software Development Kit (SDK) to enable an ecosystem of developers with all the capabilities needed to innovate, build, validate, share and operate rApps.

