



Field Site Survey & Inventory Capture



Field reality to trusted network data.



Neotropic

Backed by 15+ year building OSS
for telecom operators

EXECUTIVE SUMMARY

Tiuquin is a field operations platform designed specifically for telecommunications networks.

It enables telecom teams to reliably capture information in the field and transform it into structured, reusable, and trustworthy data.

Tiuquin supports **two critical and complementary use cases**:

- **Standardized Site Surveys**
- **Field-Based Inventory Capture and Reconciliation**

While these use cases serve different operational needs, they share a common foundation: **reliable field data captured once, at the source, under real-world conditions.**

Tiuquin is **inventory-agnostic, offline-first, open source**, and backed by **Neotropic's 15+ years of OSS experience.**

THE COMMON PROBLEM IN TELECOM FIELD OPERATIONS

Across telecom organizations, field activities suffer from the same structural issues:

- Fragmented data capture (Excel, photos, notes, generic apps)
- Across telecom organizations, field activities suffer from the same structural issues: Fragmented data capture (Excel, photos, notes, generic apps)
- Non-standardized site surveys

- Inventories that do not reflect the physical network
- High dependency on individual expertise
- Costly rework, audits, and project delays

The root cause is not a lack of effort in the field, nor simply the absence of a tool. It is the lack of formal, clearly defined, and prioritized processes for site surveys and field inventory activities.

These processes are often treated as secondary or operational details, and their impact remains hidden until inconsistencies accumulate and begin to severely affect projects, costs, and operational reliability.

Only when the problem becomes complex and expensive does it gain visibility — by then, correcting it is already costly and disruptive.

SITE SURVEY

Site surveys are a critical input for:

- Network design
- Procurement
- Deployment
- Inventory creation

However, in practice, site surveys are often:

- Non-replicable
- Highly dependent on individual expertise
- Poorly structured



- Difficult to validate and reuse

Errors introduced during site surveys usually surface **late**, when fixing them is expensive

• TIUQUIN FOR SITE SURVEY

Tiuquin transforms site surveys into a **replicable and controlled process**.

Key Capabilities

- Guided survey execution, step by step
- Template-driven structure defined upfront
- Mandatory fields and validations enforced in the field
- Evidence capture linked to survey sections
- Offline-first execution
- Technical review and approval workflow

Tiuquin ensures that every site survey follows the same logic, regardless of who executes it.

SITE SURVEY USE CASE

Standardized Site Surveys for Deployment Projects

Scenario

- Multiple sites

- Multiple field crews
- Tight deployment timelines

With Tiuquin

Survey templates are defined once

- Field crews execute guided surveys
- Evidence is captured consistently
- Engineering reviews and approves results

Value Delivered

- Reduced rework
- Fewer late design changes
- Faster project execution
- Higher confidence in field data



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THE INVENTORY PROBLEM

In many telecom networks:

- Physical changes are not synchronized with inventory systems
- Inventory updates are reactive and project-based



- Data is fragmented across formats and teams
- Trust in inventory as a source of truth is low

As a result, inventories drift away from the real network over time.

TIUQUIN FOR INVENTORY

Tiuquin does **not replace your inventory system**.

Instead, it acts as the **field capture and reconciliation layer** that feeds reliable data into any inventory or OSS.

Key Capabilities

- Structured asset capture in the field
- Guided data entry by asset type
- Detection of discrepancies (missing, extra, mismatched assets)
- Evidence and traceability per asset
- Incremental and continuous inventory updates
- Offline operation in field environments

INVENTORY USE CASE

Use Case 1 — Greenfield Inventory (From Scratch)

For operators without a reliable inventory:

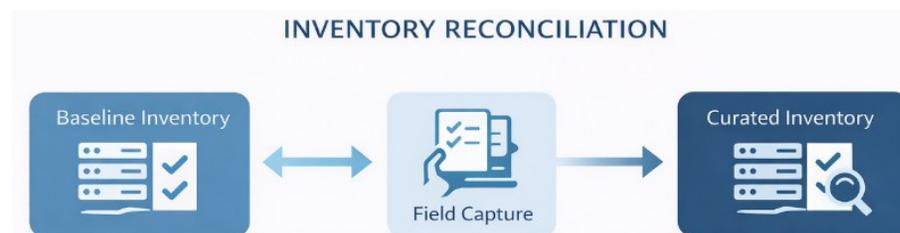
- Capture physical assets directly in the field
- Associate evidence and location references

- Build a trusted baseline progressively

Use Case 2 — Inventory Verification & Reconciliation

For operators with existing inventories:

- Compare expected inventory vs field reality
- Identify discrepancies
- Update inventory incrementally, without “big bang” projects
- Reduced rework
- Fewer late design changes
- Faster project execution
- Higher confidence in field data



KEY DIFFERENTIATORS

- **Inventory-Agnostic**
Works with any OSS or inventory system.
- **Site Survey + Inventory in One Platform**
A unified approach to field data.



- **Offline-First by Design** Built for real telecom field conditions.
- **Open Source**
Transparent, extensible, no vendor lock-in.
- **Cost-Effective**
Accessible to small, medium, and large operators.

OSS ECOSYSTEM FIT

Tiuquin is designed to operate as a **field data capture layer**, not as a replacement for existing OSS or inventory systems.

- Field data is captured in a **structured and reusable format**
- Outputs are ready to feed **any OSS or inventory platform**
- Compatible with Kuwaiba as well as third-party systems
- No forced dependency or vendor lock-in

This allows operators to **formalize field processes** while preserving their current OSS architecture.

