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POINT OF VIEW

Telecom COOs: Cut field ops costs by 30% with agentic or watch your competitors do it first

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Telecom COOs are bleeding $300 million+ annually on field operations that still rely on truck rolls and tribal knowledge. Agentic AI can cut those costs by 30% in 12 months. The COOs who move now gain the advantage. The ones who wait will bleed margin and talent to competitors that have already started.

To effectively use AI, the COO must work with their CIO partner to evaluate how specialized large language model (LLM) powered agents can contribute to their workforce, workflows, and processes. These AI solutions will be critical in helping field services teams perceive, reason, act, and learn as a coordinated digital and human workforce.

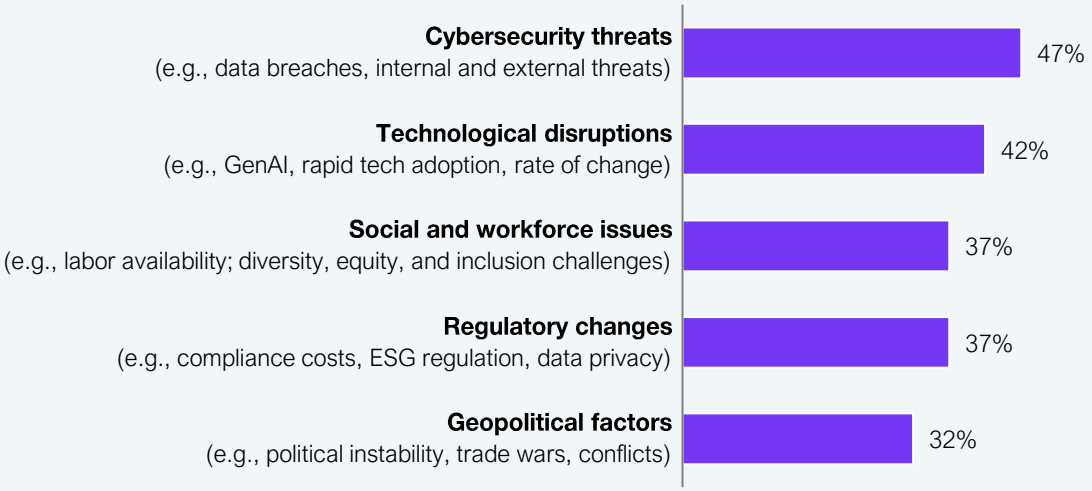
The telcos whose COOs master this transformative effort will gain advantages in operating expenses, reduce repair times, and free human experts for higher-value work. Telcos that hesitate will bleed margin and talent.

Field operations burn 60%—70% of your operating budget, but agentic AI can cut that by 30%

For the telco COO, the costs associated with field service operations can easily add up to billions of dollars annually on labor, fleets, fuel, and dispatch systems. These costs have continued to grow despite years of incremental automation across systems, processes, and people. In fact, in HFS's recent Pulse survey of leading telecommunications executives, workforce issues ranked third among factors impeding their achievement of business goals (see Exhibit 1).

Exhibit 1: After cybersecurity and emerging technologies like AI, workforce challenges are top of mind for telco leaders

What are the most concerning external factors impacting your organization's ability to achieve your business priorities?



Sample: HFS Pulse, 2025, n=19 C-suite executives from North American and European telcom firms
Source: HFS Research, 2025

Further, service outage complexity is exploding with 5G densification. Technologies like OpenRAN (ORAN), fixed wireless access, and edge services have only increased their exposure to outages, equipment failures, and upgrade costs. For a national carrier, human schedulers and static rules engines often fail to effectively juggle the thousands of simultaneous variables (such as weather, traffic, skill mix, spares, and service level agreements) required daily to achieve customer experience, business goals, or regulatory targets.

Finally, for a COO, workforce demographics are compounding the pain. For many firms, veteran technicians are retiring faster than new hires can absorb decades of tacit know-how. This workforce challenge has led to increased outsourcing costs, training costs, and skill drain as new workers are not attracted to these demanding jobs.

Agentic AI solves what manual processes cannot: $300 million in savings, 40% faster repairs

The first point of call for the COO or VP of field service operations dealing with the issues we've outlined will be their chief technology officer. The COO and CTO will need to be partners in this journey, as it will impact people, process, and technologies in potentially profound ways. Neither can solve the field ops problem alone. AI agents require deep operational context and robust technical governance. This point is reflected in HFS's Pulse survey, where 74% of telco executives indicate that process inefficiencies directly affect their operations. Thus, they are compelled to rethink how generative AI (GenAI) and agentic AI solutions can augment people to overcome process debts.

Instead of repeating past manual-labor-based habits, which include processes, manuals, and technical capabilities based on human effort and skills, the CTO and COO must design a digital-first playbook that enhances workforce capabilities through the orchestration of a team using purpose-built solutions that can amplify, augment, or act to administer a variety of field operations. This change will require an AI strategy that leverages agents, which must align with the business goals of their human teams.

The framework for success will depend on the ability to train, deploy, and optimize the process operations with an AI-first model and a human-in-the-loop staging process. Creating a new framework is not as daunting as it might seem, as field operations already rely on early agent patterns that prove what AI can tangibly take off the COO's plate. Here are some examples:

- **A ticket triage agent that** generates and classifies incidents from vast amounts of telemetry data.
- **A dispatch optimizer agent** that weighs traffic, skills, location, and parts to propose a support crew to resolve service and network issues.
- **A knowledge retrieval agent** that delivers step-by-step repair guidance to the tech's mobile device, video, or voice interface.
- **A follow-up quality assurance agent** that validates closure data and updates the carrier's network digital twin.

90 days to proof of value, 365 days to production: The deployment roadmap

The following three phases, encompassing 90, 180, and 365 days, comprise a recommended starting point to prove the value of an agentic AI solution for field services.

90-day sprint: Prove the value of an agentic AI solution in field service (proof of concept)

The goal of the first 90 days is proof of value, not perfection.

1. Stand up a project team combining leaders in field services, technology, and your services partner. This team should develop, train, and experiment with AI-enabled models ingesting at least six months of ticket, workforce, and telemetry data.
2. Use agentic AI solutions to surface high-impact use cases and build a minimally viable product that can act as a dispatch optimizer agent.
3. Track the agent's functionality across key performance indicators that directly tie to cost and customer impact, such as the percentage of validated times a telco must provide on-site physical services and "truck rolls," which include workers, mileage, and mean time to repair (MTTR) costs.
4. Continuously seek ways to improve how agents handle data and their outputs. Engage your technology teams and partners to seek further improvements and advancements as new models, tools, and methodologies enter the market.

180-day scale-out: Industrialize

The next 180 days are about turning a working prototype into a dependable operational capability.

1. Deploy an AI factory and acceleration toolkit for orchestrating data flow between people and machines. For example, you can deploy a tool like Cognizant's Neuro® Multi Agent Accelerator. Developing your own model or adopting a partner's model is important to ensure that governance, guardrails, and operational oversight are effectively applied.
2. Advance your agentic AI efforts by adding knowledge retrieval, cloud, and on-site assist agents. By training new agents and educating people on how to develop and work with them, you can integrate both with existing field service modules, geographic information systems, and interactive voice response systems (IVR) APIs to eliminate friction in dispatch and scheduling. These further contextualize how to get field services resources to the right sites in the correct order.
3. Establish recurring data and AI audits with clear ownership and action cycles. As you develop more agents and the data in and out increases, tracking the data lineage, human in the loop, and audit logs is essential.

365-day production: Agent and people orchestration

By month 12, the objective is to run agent-led and human-led workflows as one coordinated system.

1. Implement multi-agent support and management tools. For example, Cognizant offers managed multi-agent services that provide 24/7 solutions for managing field service tickets, service events, and reporting.

2. Use these experiences to expand into adjacent systems or workflows associated with field services, such as network capacity planning, preventive maintenance, and billing anomaly detection.

3. Work with your technology teams to embed continuous learning loops that enable agents to suggest new automations via the open-source accelerator. These should be fed to your CTO's AI development team or your services provider for industrialization.

Four risks that kill AI deployments (and how to mitigate them)

In the case of adopting AI, there are clear "below the line" advantages to be reaped across technology, processes, and people. However, there are risks associated with not having a strong partnership at the onset of developing the strategy we have been outlining. For the COO and CTO to get the most from their field services and AI efforts, they should work with a partner that brings these capabilities:

1. **Clean up dirty or siloed data** → AI accelerators that include data wrangling pipelines and telemetry adapters.

2. **Manage AI model or LLM drift** → Architecting cloud agnostic designs and letting telcos swap models without rebuilds.

3. **Support regulatory scrutiny** → Securing private data channels with role-based access as part of the solutions foundation.

4. **Mitigate change management fatigue** → Provide tools and frameworks that allow for pairing operations leaders with AI coaches.

One example of how an IT services partner is helping telcos augment their field services teams appeared in the *HFS Horizons: Telecom Service Providers, 2025* report. Cognizant is leveraging its investments in frontier and reasoning models, combined with agentic AI, to abstract, codify, and contextualize information relevant to a major US telco's field operations.

In Cognizant's example, the telecom operator was dealing with driving improvements across truck rolls, workforce management, MTTR, customer scheduling, and more. Using AI, the CTO can abstract structured and unstructured data from multiple systems to automate the data needed to plan better, schedule, and execute service delivery, workforce capacity planning, and field operations. For the telco, Cognizant is an example of a partner that can facilitate solutions with partners like Google Cloud Platform to enhance data availability in a secure cloud model.

Other telcos can potentially benefit from the results Cognizant achieved in this example:

- A projected reduction in field ops costs of over $300 million in the next three years.

- Improved customer satisfaction from better service delivery and resolution.

- Stronger customer loyalty and upsell opportunities related to a stronger trust in services delivered by the telco, especially to its business customers.

This pattern of abstracting data, streamlining scheduling, and accelerating MTTR is replicable across any telco with similar field ops complexity.

The Bottom Line: Deploy agentic AI in field ops now, or watch competitors cut costs 30% while you're still scheduling truck rolls manually.

Field operations consume 60%–70% of telecom operating budgets and present the single largest cost optimization opportunity in the industry. Agentic AI, automation, and digital workflows enable 30% cost reductions, 40% faster MTTR, and measurably improved customer experience.

The COOs and CTOs who partner now to deploy AI-powered dispatch optimization, knowledge retrieval, and predictive maintenance will gain 12–18 months of competitive advantage. Those who hesitate will bleed margin, lose talent to competitors offering better tools, and hand market share to carriers who have already started.

You have three choices: lead this transformation, follow competitors who moved first, or become the cautionary tale about what happens when you optimize yesterday's model while the industry moves on.

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