TERRAVISION ZETEL
Next Gen Communications Technology

TERRAVISION ZETEL PRIVATE LTE/5G NETWORKS

Australian-Owned Industrial Communications Networks

25+ years proven history of industrial IoT and communications. Australian innovation for Australian environments.

strategic alliance partner

TEKKO_

COMPANY OVERVIEW

TerraVision is an industry leader in real-time tracking, reporting and information systems with over 25 years of proven history delivering solutions to agencies, governments and commercial industries globally.

Headquartered in Perth, Western Australia, TerraVision specialises in breakthrough software and hardware technologies in data acquisition, communications, telemetry and analytics.

Core Business

TerraVision delivers tailored solutions to increase productivity, efficiency, and performance across business operations in:

- **Mining & Resources**
- **Maritime & Offshore**
- **Passenger Transport**
- **Fisheries Management**
- **Mobile Network Communications**
- **Government & Emergency Services**

Location: 30/17 Ogilvie Road, Mt Pleasant, Western Australia 6153
Contact: +61 (08) 9364 5788
nathan@terravision.com.au
Web:
www.terravision.com.au

ZETEL PRIVATE LTE & 5G NETWORKS

Overview

TerraVision Zetel is a proprietary Private LTE and 5G network solution purpose-built for industrial and remote applications. Unlike consumer-focused telecommunications networks designed for public carriage, Zetel is engineered from the ground up for industrial and mining applications.

TerraVision Zetel is designed, developed and supported entirely in Australia. Our Australian-based engineering and support team provides rapid response and dedicated network support.

WHY WE'RE DIFFERENT

Industrial Grade Design

Our Zetel networks are designed, configured and delivered specifically for mining and remote industrial applications. Our networks by design incorporate an MTC (Machine Type Communication) LTE topology network that achieves all of the LTE network design features without extra investment into unnecessary complexity for public carrier networks via the technology proliferation. The Network is scalable in bandwidth and resource allocation and is built upon ITU-R 4G LTE and 3GPP - Release 13 standards for LTE and 3GPP - Release 16 and above for 5G.

What differentiates and highlights TerraVision Zetel Private LTE & 5G from other wireless network offerings is its industrial grade, wide-area wireless design with the assurance of telco-grade robustness and resilience, without the pitfall of translating carrier grade network architecture into a mining environment. Our Private LTE offers the best level of security and performance for an industrial mining application, wth QoS within the DAQ environment

Turn-Key Delivery

Zetel is readily deployable as a complete turn-key solution, end-to-end to the broader site OT network, with other business enablement and value-adds. TerraVision Zetel Private LTE & 5G technology incorporates a broad scope of COTS equipment, as well as provision for significant capacity upgrade in line with the Principals ongoing business development and scalability compared to other wireless technology solutions.

Local Core

In Private Mining networks, we recognise the need for stand-alone, local core delivery. Our Zetel uNet™ Evolved Packet Core (EPC) and 5G core for private networks are provided as a software suite configured solely for local operations on-site, designed to operate within a site's local network environment.

Our local core design and configuration is intended to keep all user traffic and application data local within the site network. While remote monitoring and management can occur outside the local network, all essential core functionalities are maintained and confined to the on-site environment. Specifications regarding the provisioning of virtual machines and appliance requirements are readily suppliable upon request.

Industrial RAN

Our Radio Access Network (RAN) infrastructure is built upon proprietary application on OEM industrial hardware.

We understand the need for industrial, rugged radio equipment that will last and continue to perform in remote & harsh Australian mining environments long after delivery. For this reason, we only work with RAN hardware that we've tried and tested and know will stand the test of time in mining.

All our RAN equipment is IP rated with high dust and vibration resilience and standard with warranties that actually support the hardware we deliver.

If we trust it, you can too.

Scalable Architecture

We recognise that there is no 'one size fits all' when it comes to network design, so we work to remain agile with our architecture so as to allow for a tailored solution for our clients requirements. As growth requires scalability, our Zetel networks will scale from a compact single-node deployment to distributed multi-site architecture.

This scalability isn't theoretical; it's engineered into our core design through our modular EPC architecture.

TerraVision delivers complete end-to-end tailored solutions, not just equipment sales. Our turnkey approach encompasses RF engineering and propagation modeling, spectrum licensing guidance and regulatory liaison, civil works coordination and tower engineering, equipment procurement and logistics, installation and commissioning, integration with site, comprehensive training and knowledge transfer and ongoing support and optimisation.

ZETEL PRIVATE LTE & 5G NETWORKS

TerraVision Zetel networks are built on our proprietary network core (EPC/5GC), radio access network (RAN), spectrum and the integration layer that connects everything together.

Network Core (Zetel uNet™ EPC/5GC)

The Zetel uNet™ core network is the intelligence center of the private LTE/5G system. Unlike public carrier cores designed for millions of subscribers across national infrastructure, Zetel is purpose-built for industrial deployments—compact, efficient, and optimised for Machine Type Communication not just consumer smartphone traffic.

4G LTE Core Architecture

Our LTE core implements the complete 3GPP Release -13 standard but with a uniquely compact architecture. All network functions—Mobility Management Entity (MME), Serving Gateway (SGW), Packet Data Network Gateway (PGW), Home Subscriber Server (HSS), Policy and Charging Rules Function (PCRF), and Equipment Identity Register (EIR) can operate within a single physical environment for small to medium deployments.

This integration isn't just about reducing infrastructure, it dramatically reduces inter-component latency, simplifies troubleshooting, accelerates deployment, and eliminates the complex inter-vendor integration that plagues traditional EPC implementations. For larger deployments requiring geo-redundancy or capacity beyond 2,000+ users, the architecture can be distributed while maintaining the same software stack and management interfaces.

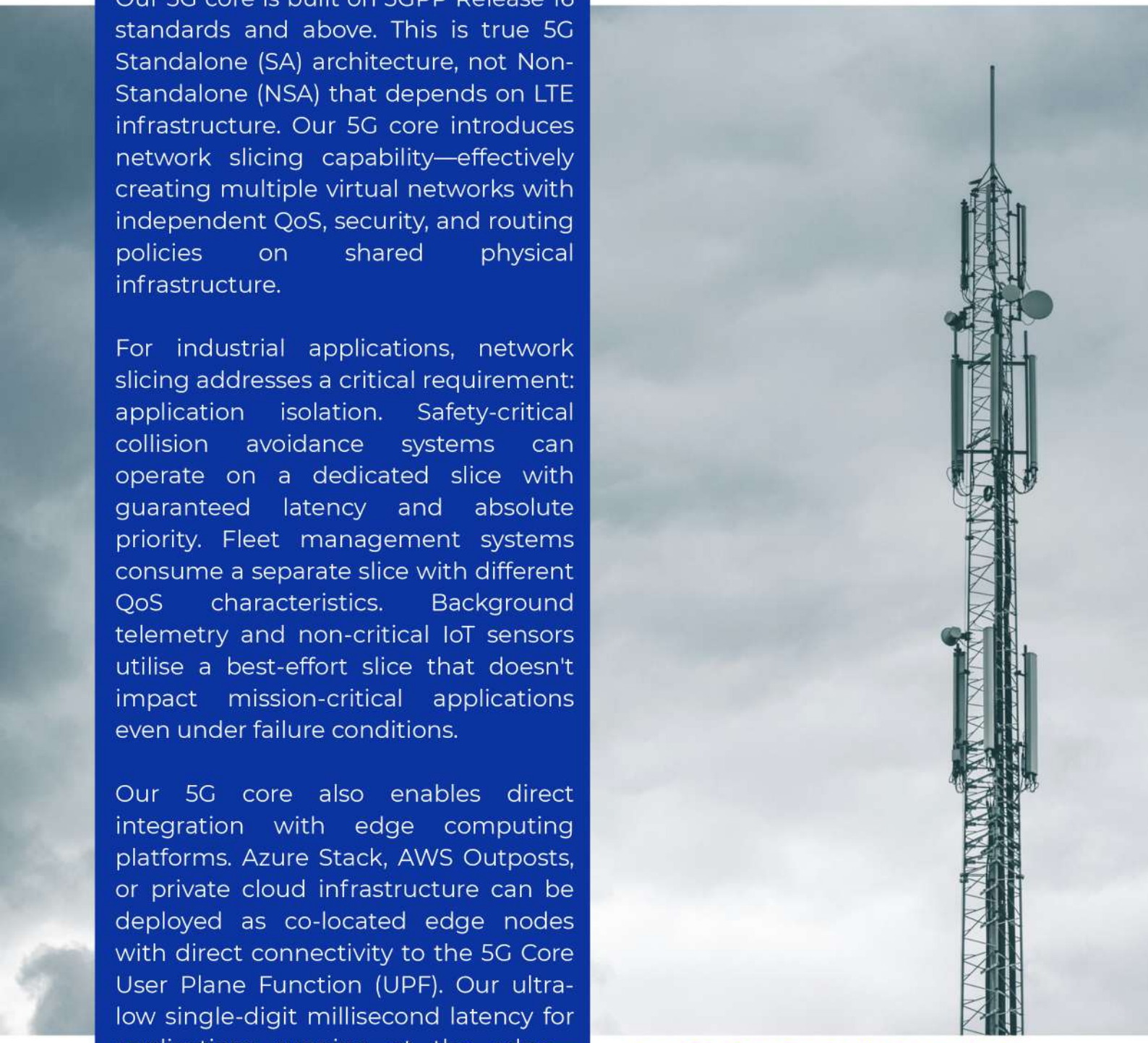
The embedded PCRF is particularly significant. In traditional EPC deployments, PCRF is a separate system requiring Diameter protocol integration, complex policy rules syntax, and specialised skills to operate. Zetel integrates PCRF functionality directly into the core environment. Entirely configurable QoS policies, traffic prioritisation, and bandwidth allocation are built into our Zetel managed service delivery.

5G Core Architecture

Our 5G core is built on 3GPP Release 16 standards and above. This is true 5G Standalone (SA) architecture, not Non-Standalone (NSA) that depends on LTE infrastructure. Our 5G core introduces network slicing capability—effectively creating multiple virtual networks with independent QoS, security, and routing policies on shared physical infrastructure.

For industrial applications, network slicing addresses a critical requirement: application isolation. Safety-critical collision avoidance systems can operate on a dedicated slice with guaranteed latency and absolute priority. Fleet management systems consume a separate slice with different QoS characteristics. Background telemetry and non-critical IoT sensors utilise a best-effort slice that doesn't impact mission-critical applications even under failure conditions.

Our 5G core also enables direct integration with edge computing platforms. Azure Stack, AWS Outposts, or private cloud infrastructure can be deployed as co-located edge nodes with direct connectivity to the 5G Core User Plane Function (UPF). Our ultra-low single-digit millisecond latency for applications running at the edge—enabling use cases like real-time video analytics, AI-driven predictive maintenance, and autonomous equipment control that wasn't available with previous-generation network latency.



Key 5G Core Capabilities Include:

- Service-Based Architecture (SBA): Microservices-based design for flexibility and scalability
- Network Slicing: Multiple logical networks on shared infrastructure with independent QoS
- Ultra-Low Latency: Sub-20ms latency achievable
- Enhanced Security: Built-in encryption, authentication, and threat detection
- Massive IoT Support: as required

SPECTRUM MANAGEMENT & LICENSING

Spectrum is arguably the most critical and least understood aspect of Private LTE 5G network implementation. Without access to radio frequency spectrum, the most sophisticated network equipment is merely expensive electronics unable to transmit signal.

TerraVision provides comprehensive spectrum strategy and licensing support.

Regulatory Liaison Services

TerraVision manages the complete spectrum licensing process on behalf of clients including:

- Regulatory research and spectrum availability analysis
- Interference analysis and coordination with existing license holders
- Preparation and submission of Apparatus License applications
- Technical coordination with regulatory engineers
- Ongoing license management and renewals
- Coordination with public carrier spectrum holders where necessary

This service is particularly valuable for organisations new to spectrum licensing. The regulatory landscape is complex, applications require specific technical parameters and justifications, and approval timelines vary from weeks to months depending on jurisdiction and band congestion.

LTE Bands

We support the full range of FDD and TDD LTE bands subject to regulatory licensing availability. Band selection depends on spectrum availability in your region as well as propagation requirements.

5G NR Bands

Our 5G equipment supports n78 (3.4GHz - 4GHz) where regulatory frameworks permit private licensing.

INTEGRATION CAPABILITES

Our networks are not designed to operate in isolation—they're built to integrate with existing industrial systems, IT infrastructure, and operational workflows. TerraVision provides comprehensive integration support across multiple domains.

Mining & Industrial Systems Integration:

Integration isn't simply "provide connectivity." We configure QoS policies and measures that prioritise different data traffic appropriately: real-time FMS Dispatch, CAS, HPGPS receiving highest priority with guaranteed delivery and background telemetry and reporting applications utilising available capacity without impacting real-time applications.

VOICE SERVICES

Beyond basic IP connectivity, TerraVision provides voice application-layer services that enhance private network utility:

- VoLTE (Voice over LTE & 5G): High-definition voice calls over the data network, replacing traditional mobile voice services. This is particularly valuable for operations moving to IP-based communications infrastructure.
- VOIP & Push-to-Talk over Cellular (PoC): Instant push-to-talk functionality similar to two-way radios but with network coverage and integration with dispatch systems. Our Zetel Expedite™ product provides complete PoC server functionality.

PROVEN PROJECT EXPERIENCE

TerraVision has proven time and again it's capabilities in the most remote mining environments

WESTERN AUSTRALIA MINING OPERATION

TerraVision was contracted to design and commission a Private LTE network for a large mining operation in Western Australia. The project presented significant technical challenges: 40 square kilometers of coverage across active mining areas including pits, stockpiles, and waste dumps; harsh environmental conditions with temperature extremes and dust; remote tower locations requiring standalone solar power; and integration with multiple mission-critical systems including Hexagon Mining FMS with Dispatching, Collision Avoidance and BluePipe real-time tracking.

The network design incorporated five remote solar-powered tower sites at heights of 20-25 meters, two fixed infrastructure site locations with grid power, and four mobile LTE trailers for optimal infill coverage in mining pits. All remote locations utilised standalone solar arrays connected via point-to-point and point-to-multipoint microwave links for backhaul.

WA MINING OPERATION

40 Square Kilometers
of minesite

challenging mine terrain
Environment

5x towers requiring
Solar Power

mission critical
Integration

two fixed infrastructure site
Locations

four mobile LTE
Trailers

active pit & mining area
Coverage

exceeded required
Targets

successfully deployed
13 LTE CELLS

Technology Implementation

- Private LTE Band 28 (700MHz)
- Zetel uNet™ EPC with integrated MME, SGW, PGW, HSS, and embedded PCRF for advanced QoS management
- Macro & small cell eNodeBs in sector and omnidirectional configurations
- Point to Point & Point to Multipoint microwave link bakchaul
- Standalone solar arrays with battery storage

Deployment Timeline and Results:

TerraVision commissioned the first site, a single LTE small-cell on a 20m standalone solar tower in mid-February. The network environment was live and satisfying all integration testing requirements within 2 weeks. The network expanded to 5 tower sites within 4 weeks, fully equipped with advanced LTE features including S1 and X2 high-speed handover and comprehensive QoS management.

The operational network supported a fleet of 61 vehicles equipped with LTE Modems for Hexagon Mining FMS, CAS, plus 20 data acquisition applications, BluePipe real-time tracking and reporting, and TerraVision CASA monitoring systems. Fleet integration; physical installation of CPE modems in each vehicle and configuration with onboard systems was completed within an additional 8 weeks.

PRODUCT PORTFOLIO

TerraVision provides comprehensive hardware and software product families designed specifically for private LTE and 5G network deployments. Our portfolio emphasises industrial-grade reliability, flexible deployment options, and integration with existing infrastructure.

Radio Access Network

Industrial IP65 Macro & small cell eNodeB-BBU & RRH configurations

Andrew industrial sector Antenna assemblies

LTE Communications Trailers: Mobile/Relocatable Coverage

Mast and Tower Solutions: Structural Infrastructure

Client Premises Equipment (CPE): User Devices

Evolved Packet Core

Zetel uNet™ Core Network Software

Zetel uBoss™ Subscriber Management

Zetel uManager™ Network Management System

Zetel Expedite™ IMS: VoLTE and Rich Communication Services

SOLUTIONS

Zetel uNet™ Core Network Software

The Zetel uNet™ software comprises the complete EPC/5GC network functions that power your private network. This isn't commercial off-the-shelf telecommunications software adapted for industrial use. It's purpose-designed from inception for private network deployments in industrial and remote environments.

The software architecture implements a compact, highly integrated design where traditional EPC network elements (MME, SGW, PGW, HSS, PCRF, EIR) operate as cooperating processes within a unified software stack. This integration eliminates the inter-element communication overhead, complex diameter protocol configurations, and multi-vendor integration challenges that plague traditional EPC implementations.

Network functions include:

- Mobility Management Entity (MME) for UE registration, authentication, tracking, paging, handover management, and session control.
- Serving Gateway (SGW) and Packet Data Network Gateway (PGW) for user plane traffic routing, policy enforcement, QoS management, and external network connectivity.
- Home Subscriber Server (HSS) with integrated Authentication Center (AUC) for subscriber database, authentication vector generation, and SIM credential management.
- Policy and Charging Rules Function (PCRF) for QoS policy definition, bandwidth allocation, traffic prioritisation, and charging rule enforcement.
- Equipment Identity Register (EIR) for device blacklist/whitelist management and stolen device detection.

The software runs on standard Linux platforms (CentOS, RHEL recommended) or Windows Server, operates on bare-metal hardware or within virtual machines (VMware, KVM, Hyper-V), and scales from small single-server deployments to multi-node distributed architectures for geo-redundancy or high availability.

COMPLETE EPC/5GC NETWORK FUNCTIONS

Zetel uBoss™ Subscriber Management

Zetel uBoss™ provides web-based subscriber provisioning and operational management. This is the interface where operations teams manage SIMs, configure user profiles, set QoS policies, and handle day-to-day subscriber lifecycle events—no command-line interfaces or professional services required for routine operations.

Key capabilities include:

- SIM lifecycle management (activate new SIMs, suspend for security, terminate and reclaim IMSI numbers)
- Service profile configuration (data speed tiers, QoS classes, allowed APNs, content filtering policies)
- User self-service portals (optional) where end users can view usage, manage profiles, and request support
- Bulk provisioning tools for activating large quantities of SIMs efficiently during fleet rollouts
- Usage monitoring and reporting (data consumption, session history, application usage patterns).

The system integrates with external identity management (Active Directory, LDAP) for single sign-on and centralised user management, supports role-based access control (RBAC) for delegating administrative functions without full system access, and provides REST APIs for integration with existing OSS/BSS systems or workflow automation.

Zetel uManager™ Network Management System

Zetel uManager™ implements FCAPS-compliant network management (Fault, Configuration, Accounting, Performance, Security)—the telecommunications industry standard framework for managing complex networks.

Fault Management provides real-time monitoring dashboards showing network health, alarm management with configurable thresholds and escalation rules, notification systems (email, SMS, SNMP traps) for critical events, and historical alarm logs for troubleshooting and trend analysis.

Configuration Management supports device configuration backup and versioning, bulk configuration updates across multiple network elements, configuration templates for standardising deployments, and audit trails showing who changed what and when for compliance and troubleshooting.

Performance Management includes KPI monitoring (throughput, latency, cell load, error rates), historical trending and capacity planning analysis, scheduled reports delivered automatically to operations teams, and performance baseline comparisons identifying degradation before users notice.

The NMS implements standard protocols (SNMP, Syslog, Telnet/SSH, web-based interfaces) for multi-vendor compatibility. Third-party network elements (switches, routers, microwave backhaul) integrate into unified management views—preventing the proliferation of separate management tools that create operational complexity.

Zetel Expedite™ IMS: VoLTE and Rich Communication Services

While not included in base private LTE deployments, many organisations want voice calling capability over their LTE networks. Zetel Expedite™ provides IP Multimedia Subsystem (IMS) functionality enabling VoLTE (Voice over LTE), Push-to-Talk over Cellular (PoC), video calling, conferencing, instant messaging, and presence services.

The Expedite™ IMS implements standard SIP-based call control, interworking with traditional PSTN/PLMN networks via media gateways, SMS-over-IP for text messaging compatibility, and application servers for value-added services (voicemail, call forwarding, conferencing, PoC dispatch consoles).

This capability transforms private LTE from data-only connectivity into complete unified communications infrastructure—replacing aging radio systems, reducing dependence on public mobile voice services, and enabling integration between voice and data applications (click-to-call from dispatch systems, location-aware emergency calling, voice-activated equipment control).

For mining and industrial operations, PoC functionality is particularly valuable. Unlike traditional two-way radios with limited range and dedicated infrastructure, PoC leverages the LTE network's site-wide coverage while providing familiar push-to-talk operation. Dispatch consoles integrate with fleet management systems, allowing supervisors to communicate with operators directly from dispatch screens. Voice quality exceeds traditional radio with HD audio codecs, and the system scales to hundreds of talk groups without frequency planning constraints.

Zetel Expedite™ is available as an add-on module to existing Private LTE deployments or as an integrated component of new installations. The system operates on the same network infrastructure—no separate voice network required—and shares spectrum efficiently with data applications through QoS prioritisation.

SERVICE OFFERINGS

Consulting & Design

Site Surveys: Physical site assessment, spectrum analysis, interference testing

RF Engineering: Propagation modeling, coverage prediction, capacity planning

Network Design: Topology design, equipment selection, backhaul planning

Spectrum Strategy: Licensing roadmap, frequency selection, regulatory guidance

Integration Planning: Existing system analysis, migration strategy, phasing plans

Implementation & Deployment

Project Management: End-to-end delivery management, stakeholder coordination

Procurement: Equipment sourcing, logistics, import/export coordination

Civil Works: Site preparation, foundation design, tower erection (via partners)

Installation: RAN equipment, core network, CPE fleet installations

Integration: FMS, SCADA, WiFi, backhaul, corporate network connectivity

Testing & Commissioning: FAT, UAT, SAT, coverage verification, performance validation

Training: Operations, maintenance, troubleshooting, SIM management

Support & Maintenance

Warranty: Standard 12-month warranty on all equipment

Extended Warranty: Multi-year options available

Software Updates: Regular security patches and feature updates

Remote Support: Telnet, SNMP, web-based diagnostics

On-site Support: Dispatched technician response (SLA-based)

Spares Management: Critical spares inventory, advance replacement options

QUALITY & COMPLIANCE

Standards Complaince

3GPP LTE Release 13 (4G)

3GPP 5G Release 16+ (5G SA)

ITU-R 4G LTE standards

IETF SIP, Diameter, SCTP protocols

Certifications

ISO 9001 Quality Management (via partners)

FCC Class A, CE Class A (equipment)

C-Tick/RCM (Australia)

Mine-spec compliance (AS standards)

Standards Complaince

Mutual SIM/network authentication (AKA algorithm)

Air interface encryption (128/256-bit)

IPSec VPN support

RADIUS/Diameter AAA integration

Embedded cyber security controls (5G)

COMPETITIVE ADVANTAGES

Organisations evaluating connectivity solutions for remote or industrial operations typically consider several alternatives: public mobile networks, WiFi mesh systems, satellite communications, and imported private network solutions. Each has limitations that TerraVision Zetel networks directly address.

The Public Mobile Network Challenge

Public mobile operators (Telstra, Optus, Vodafone) build networks optimised for population density and consumer revenue, not industrial operations. Their coverage maps show regional towns and highways—not remote mine sites 200 kilometers from the nearest town. Even where coverage technically exists, these networks operate on "best effort" shared bandwidth principles. Your mission-critical fleet management data competes for bandwidth with consumer video streaming, social media uploads, and every other subscriber on that cell tower.

TerraVision Private LTE networks invert this model entirely. Coverage is designed precisely for your operational areas—pits, dumps, haul roads, processing facilities—not incidentally based on population patterns. Bandwidth is dedicated to your applications with enforceable Quality of Service guarantees. Public networks cannot provide these guarantees, especially during peak usage periods or network congestion events.

Cost structures differ fundamentally. Public networks charge monthly fees per SIM card—typically $50-200/month depending on data allowances. For an 80 vehicle fleet, this represents $50,000-$190,000 annually in perpetual OPEX charges. TerraVision Zetel Private LTE provides both CAPEX and OPEX models that typically achieve ROI within 18-36 months, after which ongoing costs are limited to maintenance, power, and spectrum licensing fees.

Control and security are equally critical. On public networks, your operational data traverses carrier infrastructure with varying security controls, potential government access provisions, and exposure to the carrier's cybersecurity posture. Private LTE keeps all communications within your own infrastructure, subject to your own security policies, until the controlled interconnect point to your corporate network. This matters significantly for organisations handling commercially sensitive operational data or subject to regulatory requirements around data sovereignty.

WiFi Networks: Range and Mobility Limitations

WiFi networks are ubiquitous in enterprise environments and mining operations often have substantial WiFi infrastructure investments in buildings, workshops, and high-traffic areas. These networks work well for their intended purpose—high-bandwidth connectivity in confined spaces—but fundamentally cannot scale to wide-area industrial coverage, without significant cost and complexity.

The physics are unforgiving. WiFi access points operating in unlicensed 2.4GHz or 5GHz bands typically provide 50-300 meter coverage radius in industrial environments (less with obstacles, interference, or high user density). Covering 40 square kilometers requires hundreds of access points with extensive cabling infrastructure, power distribution, and backhaul connectivity. The CAPEX and installation complexity quickly becomes untenable.

More critically, WiFi protocols aren't designed for high-speed mobility. A vehicle traveling at 40-60 km/hr moves through WiFi cell coverage in seconds, triggering constant handovers that interrupt data sessions, cause packet loss, and create application instability. LTE protocols are specifically engineered for vehicular mobility with seamless handovers at speeds up to 350 km/hr.

Satellite Communications: Latency and Cost

Satellite connectivity remains the only option for truly remote locations beyond any terrestrial network reach. However, satellite presents inherent limitations that make it unsuitable for many industrial applications, particularly real-time control systems and safety-critical telemetry.

Geostationary (GEO) satellites operate at 35,786 km altitude, resulting in 500-600ms round-trip latency due purely to signal propagation at the speed of light. Low Earth Orbit (LEO) satellite constellations like Starlink reduce this to 20-40ms, but still cannot match terrestrial LTE networks consistently achieving sub-30ms latency. For applications like autonomous vehicle, collision avoidance, remote equipment control, or real-time fleet dispatch optimisation, these latency differences are operationally significant.

Throughput economics favor terrestrial solutions. Satellite bandwidth is shared across all subscribers in a beam coverage area and priced per Mbps, creating variable costs that scale with usage. A mining operation streaming multiple real-time video feeds, high-frequency telemetry data, and fleet communications can generate substantial monthly satellite bandwidth charges. Private LTE represents a fixed CAPEX investment with effectively unlimited internal bandwidth—throughput is limited only by the quantity of eNodeBs and backhaul capacity you deploy.

Weather resilience differs markedly. Satellite signals in Ku and Ka bands suffer significant attenuation during heavy rain (rain fade), precisely when reliable communications become most critical for safety. LTE signals at 700MHz-2600MHz bands are substantially more resilient to atmospheric conditions.

LTE SIGNALS AT 700MHZ-2600MHZ BANDS ARE SUBSTANTIALLY MORE RESILIENT

Performance and Reliability Advantages

Beyond addressing alternative solution limitations, TerraVision Zetel networks deliver absolute performance characteristics that establish new benchmarks for industrial private networks:

Guaranteed Quality of Service: Unlike shared networks, Zetel provides enforceable QoS through dedicated bearer channels, priority queuing, and bandwidth reservation. Critical safety applications (CAS, FDS) receive absolute priority; fleet management systems receive guaranteed minimum bandwidth; and background telemetry utilises available capacity without impacting real-time applications.

Sub-30ms Round Trip Latency: Consistently measured across production deployments, enabling real-time control applications, collision avoidance systems, and autonomous equipment operation. This latency performance matches wireline Ethernet networks despite wireless infrastructure.

99.5-99.99% Availability: Standard deployments achieve 99.5% uptime (approximately 44 hours annual downtime). High Availability configurations with redundant core network components and automatic failover achieve 99.99% (approximately 52 minutes annual downtime). Public networks in remote areas typically achieve 95-98% availability.

Deterministic Performance: Network behavior under load is predictable and controllable. Unlike public networks where performance degrades unpredictably during congestion, private LTE networks handle congestion through configured policies—applications either receive their guaranteed bandwidth or are denied access, never degraded to unusable levels.

Scalability Without Service Impact: Capacity expansion through adding eNodeBs or UGW instances occurs without service interruption to existing users. Growth from 50 to 500 to 5,000 users follows a linear scaling model without architecture redesign or forklift upgrades.

WHY CHOOSE TERAVISION

Proven Track Record in Industrial Communications

TerraVision brings over 25 years of continuous operation delivering industrial communications and telemetry solutions across some of Australia's most demanding environments. Our experience spans mining and resources, maritime and offshore, passenger transport, fisheries management, and government services—sectors where communications failure isn't an inconvenience but a safety and operational crisis.

This isn't our first venture into private wireless networks. Our heritage in data acquisition, telemetry, and real-time tracking systems means we understand the operational context—not just the technical specifications. When you deploy a TerraVision network, you're not buying equipment from a vendor; you're partnering with a team that understands fleet management systems, collision avoidance requirements, SCADA protocols, and the operational realities of mining environments.

TERRAVISION

ZETEL

+61 (08) 9364 5788 nathan@terravision.com.au terravision.com.au