Private Networks for Manufacturing

The **first edge API platform** that extends interference-free wireless coverage throughout facilities and gives you the freedom to control access to on-site infrastructure on a device-by-device basis.

THE PROBLEM

DATA IS THE LIFEBLOOD OF MANUFACTURING

Manufacturing is the point where technology meets machines, and when that connection isn't rock solid, disaster can occur. Sensitive data must be secured from intrusions, but latency can't be tolerated by factory automation. Real time monitoring has to be precisely that - real time - or it's going to have significant effects on productivity and profitability.

24%
Manufacturing & Transport combined share of overall market in 2030.

From video surveillance of production lines and other automated service alerts to industrial robots that have to be precise to millionths of a inch, traditional unmanaged spectrum systems like Wi-Fi are too crowded, slow and unreliable to solve the needs of the modern manufacturer.

WE MAKE CREATING PRIVATE LTE NETWORKS EASY SO YOU CAN CREATE YOUR PRODUCTS

THE ALEF SOLUTION

BETTER COVERAGE
Blanket facilities with reliable wireless signals without the interference issues of Wi-Fi

MORE CONTROL
Segment access for mission critical machinery or provide tiered service for guaranteed throughput
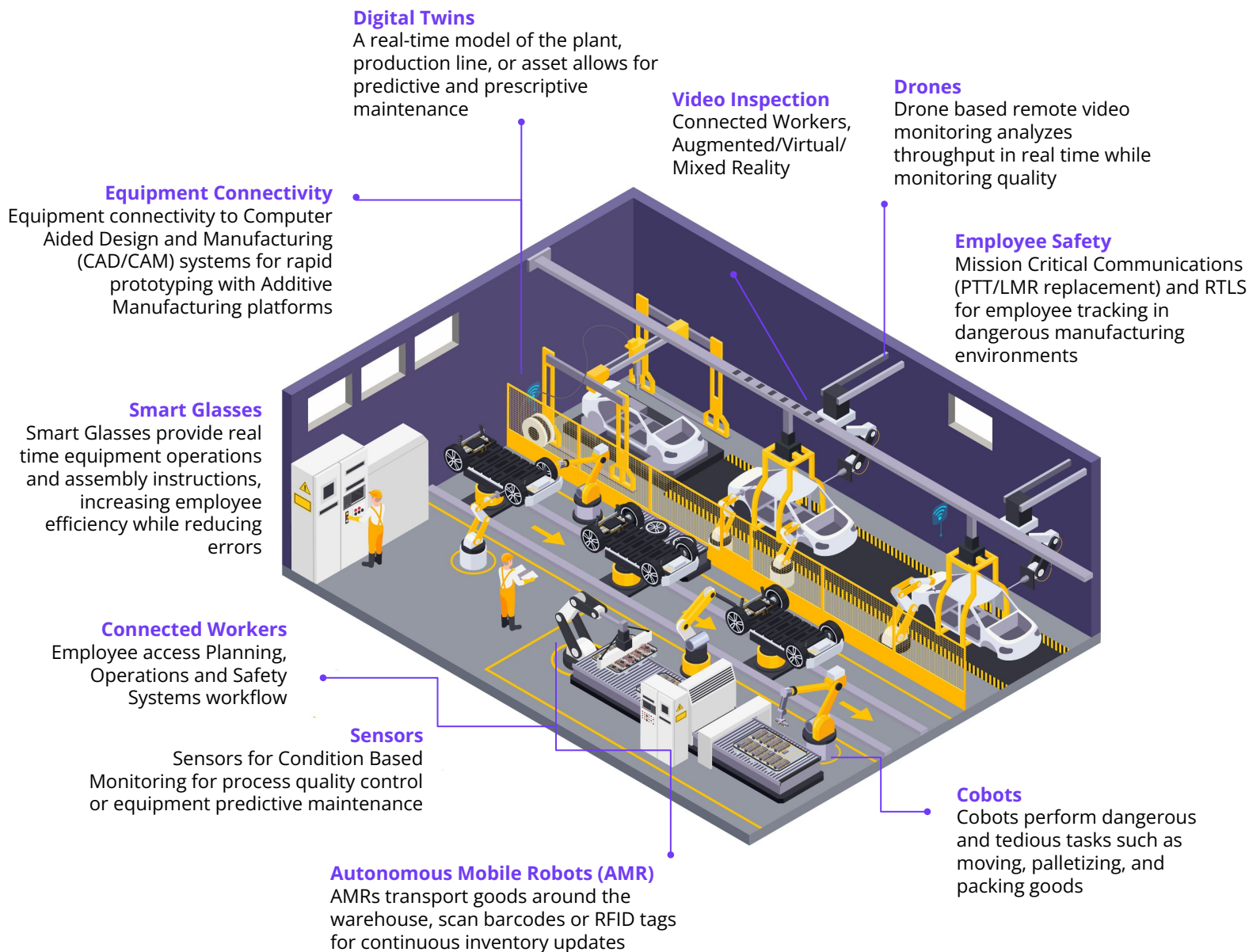
CARRIER CLASS SECURITY
Secure data end-to-end with managed spectrum, keeping data within your existing firewalls

COST, SPACE & TIME SAVINGS
Remove the need for expensive on prem solutions and the massive footprint they require

Interested to learn more about how you can get a private mobile network for your facility?

Learn more at **alefedge.com**

Use Case: Building a Connected Manufacturing Facility

Digital Twins
A real-time model of the plant, production line, or asset allows for predictive and prescriptive maintenance

Video Inspection
Connected Workers, Augmented/Virtual/Mixed Reality

Drones
Drone based remote video monitoring analyzes throughput in real time while monitoring quality

Equipment Connectivity
Equipment connectivity to Computer Aided Design and Manufacturing (CAD/CAM) systems for rapid prototyping with Additive Manufacturing platforms

Employee Safety
Mission Critical Communications (PTT/LMR replacement) and RTLS for employee tracking in dangerous manufacturing environments

Smart Glasses
Smart Glasses provide real time equipment operations and assembly instructions, increasing employee efficiency while reducing errors

Connected Workers
Employee access Planning, Operations and Safety Systems workflow

Sensors
Sensors for Condition Based Monitoring for process quality control or equipment predictive maintenance

Cobots
Cobots perform dangerous and tedious tasks such as moving, palletizing, and packing goods

Autonomous Mobile Robots (AMR)
AMRs transport goods around the warehouse, scan barcodes or RFID tags for continuous inventory updates

Private Mobile Networks implement carrier-class dependability and rock-solid mobility—the kind facility network managers and workers can depend on.

Industry Validation

VentureBeat

"Alef's **expertise in APIs**, building strong developer relationships and solid track record of enabling enterprises' mobile applications with Edge Points serving as the mobile abstraction layer are helping to **create the mobile network-as-a-service (MNaaS) market**."

tcs TATA CONSULTANCY SERVICES

"**Simplifying the process of deploying mobile networks** inside the enterprise security perimeter will make it faster and easier for companies to integrate new technologies and applications"

Learn more at **alefedge.com**