The Connected Workforce Solution

for Frontline Workers in Large Enterprise Manufacturing

Redzone

champions frontline
teams to work with
purpose and win
the day, every day.

State of the Industry

Manufacturers have experienced huge upheaval related to the COVID-19 pandemic. For some it meant massive surges in demand; for others it meant pivoting to new segments and categories. Combined with new safety protocols to keep workers healthy, manufacturers have had to be resourceful and adapt. Additionally, the omni-present challenges of increased complexity and the continuous struggle to recruit and retain talent have been further exacerbated by the pandemic. These compounding factors result in an industry under constant pressure to do more with less and to find new ways of leveraging the existing workforce to drive profitability.

Over the past decade, large general manufacturers have invested in continuous improvement (CI) programs that resulted in plant and process improvements, but have leveled off in terms of overall equipment effectiveness (OEE). Moreover, CI teams struggle to influence the broad frontline workforce—especially when spread across a global plant network. As the return on investment for technology has waned, the next big opportunity is activating your frontline workers as your productivity engine.

In the quest for further improvement in manufacturers, top-down initiatives have been generally underwhelming, with expensive and disruptive software investments in Enterprise Resource Planning (ERP), Manufacturing Execution Systems (MES), and Computerized Maintenance Management Systems (CMMS) that produce masses of data, but don't translate into improvements that move the needle. The problem is often blamed on low sophistication or engagement on the shop floor and has been met with yet another round of investments in automation to automate people out of production with little more than expensive proof-of-concepts and no viable ROI to be seen.

The workforce is changing and the worker of today has different expectations when coming to work. They expect technology and connectedness like they have in their home life where they participate in vast social networks. They are digital natives looking to make a difference. Indeed, people are not the problem, they are an opportunity looking for a solution. Read on to see how your frontline workers are your best opportunity to increase growth and profitability.

These are the reasons we created the Redzone Connected Workforce Solution. This brochure outlines how breaking down silos, aligning teams around a common goal, and engaging your frontline workers will give your plant network the agility to respond to all the challenges above and unlock enormous opportunity for all stakeholders.

> **"**...the aim of leadership should be to improve the performance of man and machine, to improve quality, to increase output, and simultaneously to bring pride of workmanship to people.**"**

Dr. W. Edwards Deming
Quality and Management Guru

Productivity **NOW**!

Redzone delivers rapid productivity across your entire plant network.

Whether you are looking for growth or profitability, Redzone unlocks an average increase of 10–20% productivity across larger more sophisticated plants (with high starting OEE baselines); while delivering as much as twice that improvement for less mature factories (with lower baselines) in your plant network – without adding people or equipment.
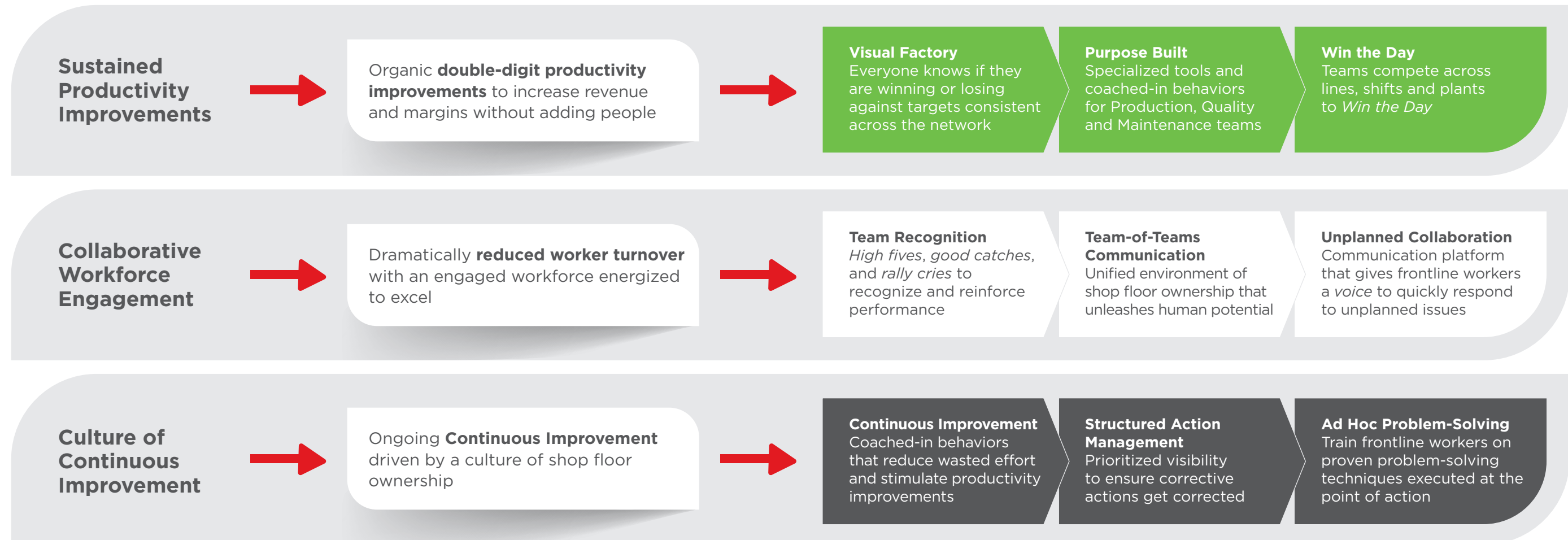
We work with your plant and CI leadership to lay out a success plan that can be achieved at each plant in your network. Our goal is to enable and reinforce your chosen improvement methods with desired behaviors and instituting new activities where there are gaps. This goal becomes the obsession for our collective teams.

> **"** It's a closed loop management operating system for your shop floor, where you have a plan, do, check, act cycle in there with all the reporting and the checks and balances. And that's truly how we use it today across our portfolio companies. **"**
>
> Robin Olsson
> **Managing Director, Kainos Capital LP**

Plant Outcomes

| **Sustained Productivity Improvements** | → | Organic **double-digit productivity improvements** to increase revenue and margins without adding people | → | **Visual Factory** Everyone knows if they are winning or losing against targets consistent across the network | **Purpose Built** Specialized tools and coached-in behaviors for Production, Quality and Maintenance teams | **Win the Day** Teams compete across lines, shifts and plants to *Win the Day* |

| **Collaborative Workforce Engagement** | → | Dramatically **reduced worker turnover** with an engaged workforce energized to excel | → | **Team Recognition** *High fives*, *good catches*, and *rally cries* to recognize and reinforce performance | **Team-of-Teams Communication** Unified environment of shop floor ownership that unleashes human potential | **Unplanned Collaboration** Communication platform that gives frontline workers a *voice* to quickly respond to unplanned issues |

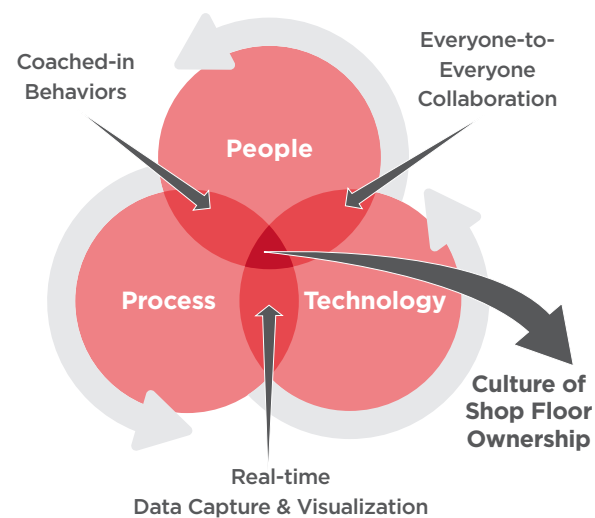| **Culture of Continuous Improvement** | → | Ongoing **Continuous Improvement** driven by a culture of shop floor ownership | → | **Continuous Improvement** Coached-in behaviors that reduce wasted effort and stimulate productivity improvements | **Structured Action Management** Prioritized visibility to ensure corrective actions get corrected | **Ad Hoc Problem-Solving** Train frontline workers on proven problem-solving techniques executed at the point of action |

The Power of Culture

At Redzone we know that ordinary people can achieve extraordinary things. But even more impactful is when your culture recognizes and rewards the extraordinary until it becomes the norm. That is the power of culture. Your frontline teams are your secret weapon and Redzone fosters a culture of shop floor ownership that results in organic continuous improvement (CI).

According to Food Industry Executive Magazine 2020, 30% of food processors claim that labor is their biggest challenge. The typical response has been to throw technology at the problem and automate humans out of production. This throws the People-Process-Technology triad out of balance putting people into a background role. Redzone has shown that people are in fact your productivity engine and need to be empowered, not over-powered.

The Redzone Connected Workforce Solution unleashes pent-up productivity in your Production, Quality and Maintenance teams and brings them together into a team-of-teams whose whole is greater than the sum of its parts. The result? Increased capacity with expanded margins that are sustainable over the long term.

Our coaching model energizes your frontline teams with an improvement mindset that better supports your CI teams and their projects. With new behaviors and a voice that people listen to, workers feel empowered and enabled to be better every day. This results in a culture of shop floor ownership and engagement that brings pride and dignity back to manufacturing.

Coached-in Behaviors

Everyone-to-Everyone Collaboration

People

Process   **Technology**

Real-time Data Capture & Visualization

Culture of Shop Floor Ownership

> " Think about manufacturing processes. First of all, it's always people, process, and technology. And it's about empowering people to solve their problems. Redzone gives you that ability. "

Pablo Cussati | **SVP Manufacturing, Ventura Foods**

Transformation Across the Enterprise

Today's manufacturers are racing headlong toward digital transformation to leverage a new category of technology that promises a competitive edge and rapid time to value. But too many of those promises leave manufacturers still wanting for real solutions to their real problems. A seemingly never ending stream of one size fits all proof-of-concepts (POCs) peter out quickly or drag on-and-on indefinitely leaving executives wondering "When will we see real results that flow to the bottom line?"

Top-down enterprise solutions like ERP, MES, SCADA and CMMSs have laid deep foundations and vast IT infrastructures that leave little room for flexibility or agility. Designed principally to provide executive visibility for strategic decision-making, they provide little aid to the frontline worker trying to keep up with the plans handed down from on high. The people-process-technology triad is out of balance with complexity growing faster than workflows and people can keep up with.

Multiply all those solutions across your plant network and the model blows up. Every plant is different. Every line has its nuances. Every location has inherent cultural characteristics. And the CI approaches, while effective, struggle to affect the broad changes required across the plant populations that are needed to make any technology change stick with the people who make it work.

Why? Because a rigid, top-down approach is too difficult to manage in a large, distributed organization. What is needed is a network-wide, bottom-up approach that focuses on addressing the real impediments to improvement – unplanned issues.

You need a way to get every associate rowing their plant in the same direction as all the other rowers and plants. Why not start with the rowers? Redzone's unique approach drives plant/network standardization that is designed around the unplanned collaboration required to address issues when they occur, before they become problems. Purposeful flexibility designed around purposeful communication enabled by modern social network concepts align everyone to the same plan; while giving them easy to use tools that make each role more productive.

Digital transformation? Start with digital human transformation. They will tell you what is needed.

The FIVE Cs of Redzone

Culture

Ask any manufacturing leader what they want to improve most across their plant networks and they'll say "the culture". No other connected workforce solution addresses this critical component of human resources like Redzone.

Communication

Redzone connects everyone to everyone else with a digital identity giving dignity and purpose back to the frontline teams. Translations and multi-media enhance communication across diversity and language barriers with tools to support shop floor and executive communication styles alike.

Collaboration

The key to Redzone is bringing Production, Quality and Maintenance teams together in a regular cadence that we call *forums* e.g., (lineside huddles, twice per shift). These interconnected *forums* allow teams to team up on resolving unplanned issues to get, or stay, on track. Connect those same teams across your distributed plant network with workflows and historical archives to share best practices and lessons learned.

Celebration

Rewarded behavior is repeated behavior and it's surprising how rarely manufacturers celebrate individual, team, and even company performance. The Redzone platform enables ad hoc *high fives*, *good catches* and *rally cries* to raise awareness across the plant network and keep individuals motivated to perform, as well as sharing plant-wide results and productivity gains.

Continuous Improvement

Accelerate the results from your CI programs with an entire workforce that has been digitally inspired in lean methodologies. Better understanding of the *why* helps your limited CI staff to create a culture of purpose-driven improvement.
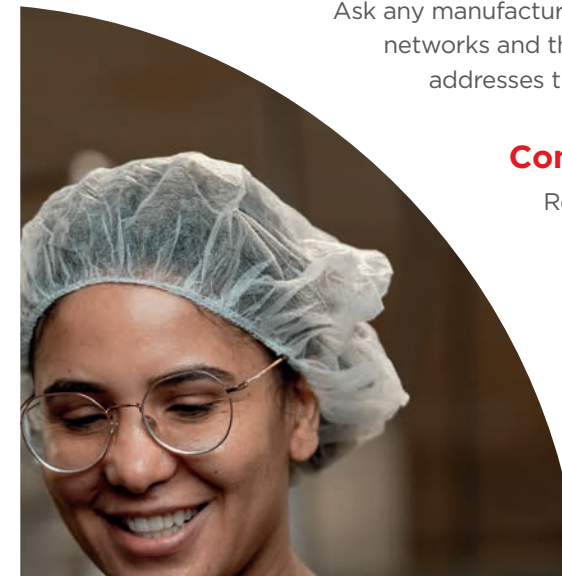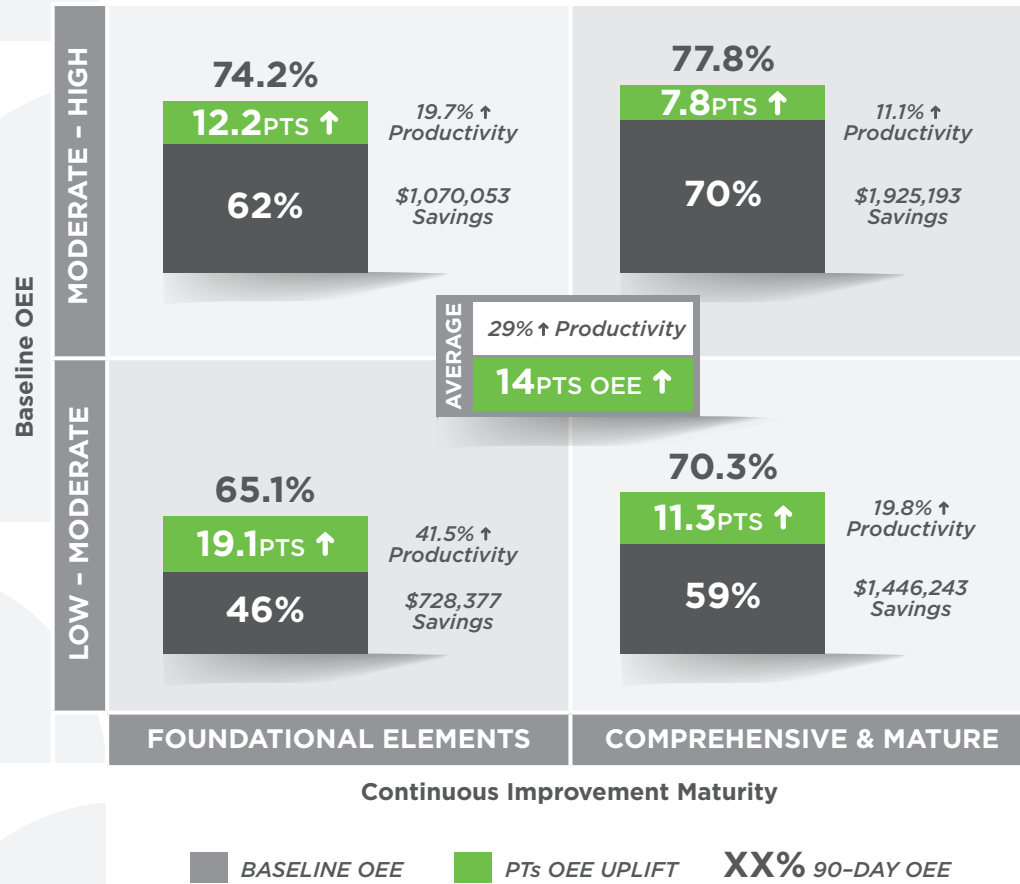
Typical Results

Transformational Results in 90 Days

ALL Redzone customers experience uplifts that are sustainable over time—augmenting and accelerating your existing CI methods and programs. When multiple plants are deployed together, their teams can collaborate and support each other for even more rapid results.

As indicated in the maturity matrix below, the productivity improvement that each plant can expect is a function of the baseline OEE of that plant and the maturity of the team at each plant. Consider where your plants fit and start multiplying your savings! We proudly report these miraculous customer results. Don't be surprised if yours are higher than you expect – that is the typical customer experience!

Initial 90–Day Benchmark Results Matrix

	FOUNDATIONAL ELEMENTS	COMPREHENSIVE & MATURE
MODERATE – HIGH	**74.2%** 12.2 PTS ↑ 62% *19.7% ↑ Productivity* *$1,070,053 Savings*	**77.8%** 7.8 PTS ↑ 70% *11.1% ↑ Productivity* *$1,925,193 Savings*
AVERAGE	*29% ↑ Productivity* **14 PTS OEE ↑**	
LOW – MODERATE	**65.1%** 19.1 PTS ↑ 46% *41.5% ↑ Productivity* *$728,377 Savings*	**70.3%** 11.3 PTS ↑ 59% *19.8% ↑ Productivity* *$1,446,243 Savings*

Baseline OEE (vertical axis)

Continuous Improvement Maturity (horizontal axis)

Legend:
- ▢ BASELINE OEE
- ▢ PTs OEE UPLIFT
- **XX%** 90-DAY OEE

Rapid Time to Value

Unlike disruptive enterprise software technologies, that take 6-18 months and armies of IT and OT professionals to implement, Redzone's proven, repeatable deployment methodologies scale across your network so plants deploy in concert.

The Redzone team assesses each plants' requirements and installs a tried-and-tested cloud footprint tailored to each environment. No heavy IT or OT technology to install, integrate and customize; so you're up and running in weeks, with each phase of deployment and coaching completed in **90 days!**

Coaches teach the same fundamental behaviors and skills of *The Redzone Way* at each plant so teams and leaders can share lessons learned and best practices in real time, not after the fact.

With the **Frontline Collaboration Platform**, all users learn to communicate and *know the score* thanks to the visual factory of the initial **Productivity** solution.

Users hit the ground running, typically making productivity differences immediately after their first training session.

Teams learn the behaviors of standard work within their own functional groups and how to better work with the key members of Production, Quality and Maintenance from each line throughout the day to assess whether they are winning or losing against the plan. Everything that happens in a day is captured in the *forums* making issues readily visible (and searchable) for improvement activities and knowledge sharing across the plant network.
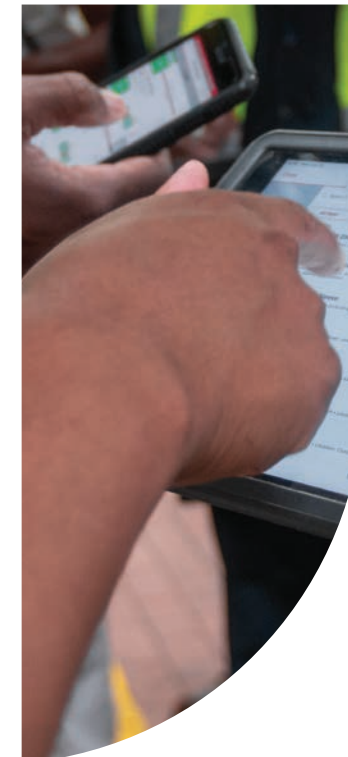
> "One of the things that we learned from Redzone was this very intense focus on results in a very compressed timeframe. We're focused on results, but sometimes we got in our own way. We just weren't moving fast enough."
>
> Terry LeDoux
> **VP of Digital Manufacturing, Nestlé Purina Pet Care**

The Redzone Connected Workforce Solution →

The Redzone Connected Workforce Solution has been specifically designed to fill the needs of the different groups required to keep your factory humming. By enabling each team with an over-arching team-of-teams philosophy, productivity improvements occur organically.

Built for Plant & Network-Wide Collaboration

Redzone takes the connected worker concept to another level by enabling and encouraging purposeful communication from the shop floor to the top floor and everywhere in between. When everyone is in the loop and engages when they're needed, wait time is reduced and things get done!

Redzone
The Connected Workforce Solution

Productivity Compliance Reliability Learning

Collaboration

SaaS Cloud Mobile 1st No Code <6/mo.ROI Multinational API SOC Type 2 BI + Analytics

Frontline Collaboration Platform

Redzone is built on a digital communication platform that empowers frontline team members to communicate with all levels of the business to significantly increase plant productivity by creating an environment for teams to instantly react to unplanned issues at the point of activity.

Everyone-to-Everyone Communication

• Promote a culture of openness and ownership by giving everyone a digital identity and a voice

• Mobile communication including video-conferencing and multi-lingual chats with pictures and video

• Top-down/bottom-up, enterprise-wide broadcasts such as company-wide updates or safety alerts

Team-of-Teams Collaboration

• Brings functional groups together for ad hoc, unplanned issue resolution

• Structured *forums* for lineside huddles, daily and weekly *vital signs* meetings

• Record messages for shift handovers, safety alerts and future improvement opportunities

• Broadcast *play calls* and *rally cries* to keep everyone rowing in the same direction

Team Celebration

• Publicly recognize individual or team performance to drive pride and dignity among your workforce

• Immediately call out individuals with a *high five* or *good catch* when they happen to highlight and encourage superior performance

• Reinforce desired behaviors such as standard work and going above and beyond the call

• Acknowledge accomplishments with leader highlights and Town Halls

> " What Redzone has really offered us is the ability to communicate at all levels, and really stay in touch with what's going on, on the shop floor. "
>
> Tony Scotti
> **President, Taylor Farms**

Productivity

Redzone's Productivity solution significantly increases productivity in each plant by creating the environment for frontline teams to eliminate waste and solve problems on the frontlines in real time.

Visual Factory

- Highly visual, easy to read dashboards to immediately understand how a team is winning or losing vs. targets
- Real-time productivity metrics such as Overall Equipment Effectiveness (OEE) to measure throughput without the typical manual, error-prone and rear-view monitoring
- Standard operating procedures and work instructions available plant-network-wide
- Combining automated data from PLCs, sensors and IIoT devices with human context

Problem Solving

- Ad hoc problem solving at the point of activity
- Structured action management for accountability to get things fixed
- Manage corrective action meetings for assignments and accountability
- Pareto analysis to keep focused on the vital few issues

Kaizen

- Built-in Continuous Improvement tools (Fishbone, 5 Whys, etc.) for resolving larger scope issues
- Business intelligence tools to quantify top challenges and report financial benefits across the plant network

90-Day Productivity Coaching Program

Coached-in skills focus on mid-run problem solving on the frontlines, the score and activities are shared across the plant to improve the outcome of every hour, of every shift, on every line. Coaches drive home the philosophy of *Win the Day* and close out by celebrating the step-change in performance improvement with a Town Hall event.

> **"** Finding Redzone was one of the best things for us as a company. It's really helped us from a productivity standpoint. **"**

Jeff Bruns | **LPNA Group VP, Golden State Foods**

Compliance

Redzone's Compliance solution dramatically reduces waste and giveaway through better material utilization by transforming your Quality Assurance program from reactive to proactive. The result is confidence in your quality system with quicker, more impactful audits.

Paperless Quality

- Reduce administrative burden and non-compliance risk with online, 21CFR, part 11 compliant, records
- Eliminate errors and delays caused by manual, paper-based quality inspection and transposition into your system of record
- Automatic alerts triggered by specification non-compliance to minimize the impact and disruption of potential quality issues
- E-signatures to eliminate manual recording while maintaining accountability

Statistical Process Control

- Statistical Process Control (SPC) X-Bar and R charts for operators to reduce variation and increase profits
- Alert when out-of-tolerance/specification conditions are approaching to take pre-emptive action before waste is produced
- Deep statistical analysis (Cp, Cpk, Cm, and more) to understand true capacity

Audits and Checklists

- Always be audit-ready with automatically collected and formatted data making audit prep unnecessary
- Real-time auditing with weighted scoring to eliminate audit prep, streamline audit execution and increase resulting score
- Automatically trigger inspections, failure reports and actions per HACCP plan to reduce missed checks and risks

90-Day Compliance Coaching Program

Coach in a *Quality 1st* mindset across the plant network and make it everyone's, responsibility. Focus on the collection of real-time quality data and procedures for monitoring quality issues to catch them before they produce excess waste. Coaches spend time driving for continuous audit readiness with real-time prevention of potential quality issues.

> " On the compliance side, it's really made the transparency on how do we do our things a lot more visual. It's allowed us to link everything that we do directly to how production is doing it. "
>
> Sophia Vega | **FSQA Manager, Taylor Farms**

Reliability

Redzone's Reliability solution significantly reduces unplanned downtime by connecting maintenance with operators to become more intimately involved in maintaining equipment and detecting issues early so the Maintenance team can focus on preventative maintenance (PM). Digitize your TPM pillar!

Operator Care

- Free up your maintenance resources by leveraging operators for clean/inspect/lubricate and other minor basic maintenance activities
- Reduce stoppages and unplanned downtime by enabling operators with greater ownership of the equipment they use

Operator Sense

- Catch potential downtime issues before they happen by training operators on early defect detection
- Tune operators' sight, sound, and smell senses into early-warning sensors
- Communicate potential issues to maintenance with videos to enable more single call repairs

Work Orders and PMs

- Create Doctor position and introduce Doctor's Rounds to pre-empt downtime events
- Define criticality ratings for PMs for the whole plant network to minimize wasted time and ensure high priority equipment is operational
- Track planned downtime to effectively schedule PM activities without disruption

Breakdowns

- Reduce lost productivity and frustration with instant connection to the Maintenance team
- Respond more quickly to unavoidable downtime to minimize waste and lost production capacity
- Monitor, evaluate and share event frequency for common equipment throughout the plant network to influence maintenance priority and scheduling

90-Day Reliability Coaching Program

Digitize and accelerate your TPM program and activate critical teamwork between Production and Maintenance teams. Coach Maintenance teams to educate operators on basic maintenance tasks like clean, inspect, and lubricate to give maintenance techs more time for critical PMs. Coaches activate operators' senses to extend the reach of maintenance by making operators their eyes and ears.

> **"** Redzone gets everybody on your team aligned for the future so you stop talking about what's happened in the past. A maintenance breakdown is a maintenance breakdown—that happens. What are we going to do moving forward to prevent that maintenance breakdown? 'Call the play' in Redzone! **"**

Corey Arrick | **SVP Manufacturing, Thomas Foods**

Coaching

Redzone solutions are different in that coaching players and teams is a fundamental component of the whole. Technology on its own changes nothing; a structured coaching program ensures that behaviors and workflows are reinvented using digital capabilities within the software. Applying the coaching program across the plant network creates a foundation of stability, combining leverage from cross-pollination of people and departments along with coaching experience of best-in-class workflows.

Coaching is not the training you're used to. The Redzone Way has validated that people *learn by doing* so our approach focuses on a *Watch one, Do one, Teach one* approach that burns-in new behaviors in context of specific tasks so they become second nature. We call this *coached-in* and it is fundamental to why all Redzone customers experience uplifts that stick over the long haul.

Redzone attracts the best Continuous Improvement (CI) talent from industry, but our *secret sauce* is a rigorous training program that focuses on the *vital few* elements of CI that enable your CI teams to better implement their projects. We instill the behaviors that result in *standard work* across your entire plant network.

The Role of the Redzone Coach

All Redzone coaches come from manufacturing and bring with them vast experience in running and improving plant operations. They possess the business acumen to speak and act at any level of your organization and, in fact, become a part of your operation. They extend your leadership reach and build trusting relationships across your entire organization. These coaches will not only be developing the behaviors for operators on the shop floor, but also providing senior level feedback with the plant leaders and their new digital behavioral indicators.

Redzone coaches bring out the best in your people and focus on teaching them to fish, highlighting the process changes and ownership available using real-time technology. We guide your teams through implementing new standard work behaviors that represent the best way to do each task based on extensive research and validation. This structure binds the organization together and gets your teams rowing in the same direction toward meeting and beating the production and other operational goals laid out by leadership. We call this Win the Day. However, we all know that half of what happens on the frontlines is unplanned, so we coach your teams on how to effectively resolve issues at the point of work—not needing to escalate every issue.

The Redzone 90-Day Program

- A brief preparation phase to get each plant environment ready
- Develop an agreed-upon success plan for each plant
- **Win the Day** phase to align each team for immediate improvement
- **Problem Solving** phase to implement skills to address each plants' top recurring issues
- Kaizen and structured CI activities to enable the shop floor to own and drive step-change impacts to their processes
- **Celebration** to communicate success to the whole company and reward your teams for their hard-fought wins

Predictable Outcomes

- Enhanced culture leading to better team collaboration and reduced turnover
- Teams focused on the vital few things that will move the needle
- Quick wins for your frontline teams that drive a culture of improvement
- Sustainable performance improvements that accumulate to significant cost savings
- Visibility to individuals that demonstrate leadership potential for advancement consideration
- Your plant network all working to the same goal and speaking the same language

The Right Technology for Today

Key to the Redzone difference is an innovative application of the technology that people use in their everyday lives, purpose-built for production manufacturing. While digital transformation is all the rage, too many approaches offer endless possibilities but no defined solutions that deliver real results.

Mobile 1st – Where traditional technologies have been retrofitted for mobility, Redzone was designed from the ground up with a philosophy that *deskless workers* need to communicate what is happening on their line. Add the ease-of-use and multi-media capabilities of an iPad and rich, purposeful communication can happen anywhere.

Secure Cloud – Developed as a native cloud solution, every component is secured by the SOC 2 certified SaaS platform for high-availability and performance. No on-premise solution can offer the same level of data security and integrity that Redzone's native cloud platform can.

Ease of Implementation and Integration – The entire Redzone solution was architected to minimize the plant footprint for IT and OT. Using standard communication technologies and protocols such as OPC-UA, the system is up and running in days. Data streams are easy to integrate with your MES, ERP or CMMS system without custom programming or maintenance.

Low Cost of Deployment – No servers to buy, install or configure let alone maintain and upgrade. The technology is managed by the Redzone Operations team including continuous upgrades, back-up and recovery.

Multi-language – 15+ languages with automated translations so non-native-English speaking users can write in their preferred language, but can be read by others in their chosen language.

About

At Redzone we have always been focused on enabling the frontline workers in manufacturing plants to be more productive, more engaged and in turn help their companies be more profitable.

It is with that goal in mind that we have developed a new category of solutions that not only make each workers' job easier, they elevate everyone's presence in their organization to become a voice for improvement and not just another cog in the machinery.

We address that goal by giving workers a digital identity and creating an environment where frontline teams can take ownership of their own destiny and together develop a culture of respect and collaboration that results in organic Continuous Improvement.

Everyone at Redzone is focused on driving standard work, operational excellence and yes, continuous improvement, but all of those things come from our customers. We just give the technology and know-how to make it happen for them.

With offices in Miami, FL, Denver, CO and Birmingham, UK we choreograph a distributed workforce that can reach customers wherever they may be. The leadership team at Redzone have spent their careers working with manufacturing plants to enable better performance through continuous improvement methodologies. This experience allows us to pass on the systemic benefits to your people through the proper application of technology and process. We make it possible for you to bridge the gap between technical potential and actual behavior change necessary to make results *stick*.

A selection of
QAD Redzone's
Large Enterprise
customers

Join Our Growing Community

We invite you to be part of the QAD Redzone Community to participate in our Community Events where you can network with similar manufacturers to share ideas, compare success stories and learn how they have overcome similar challenges.

It is a network of people designed to help you on your lean journey; learning from your peers as you go.

Next Steps

Schedule an Opportunity Assessment
where an expert solution consultant will assess your plant and analyze your expected results.

Attend a Productivity and Quality Roadshow
to meet manufacturers like you in your region and hear first-hand how Redzone can help you improve your productivity.

Attend a Power Hour Webinar (live or replay)
to listen to Redzone customers speak on a variety of issues relevant to manufacturers today.

Visit one of our tradeshow booths
to meet with us and discuss your issues and goals directly.

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QAD | **Redzone**

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