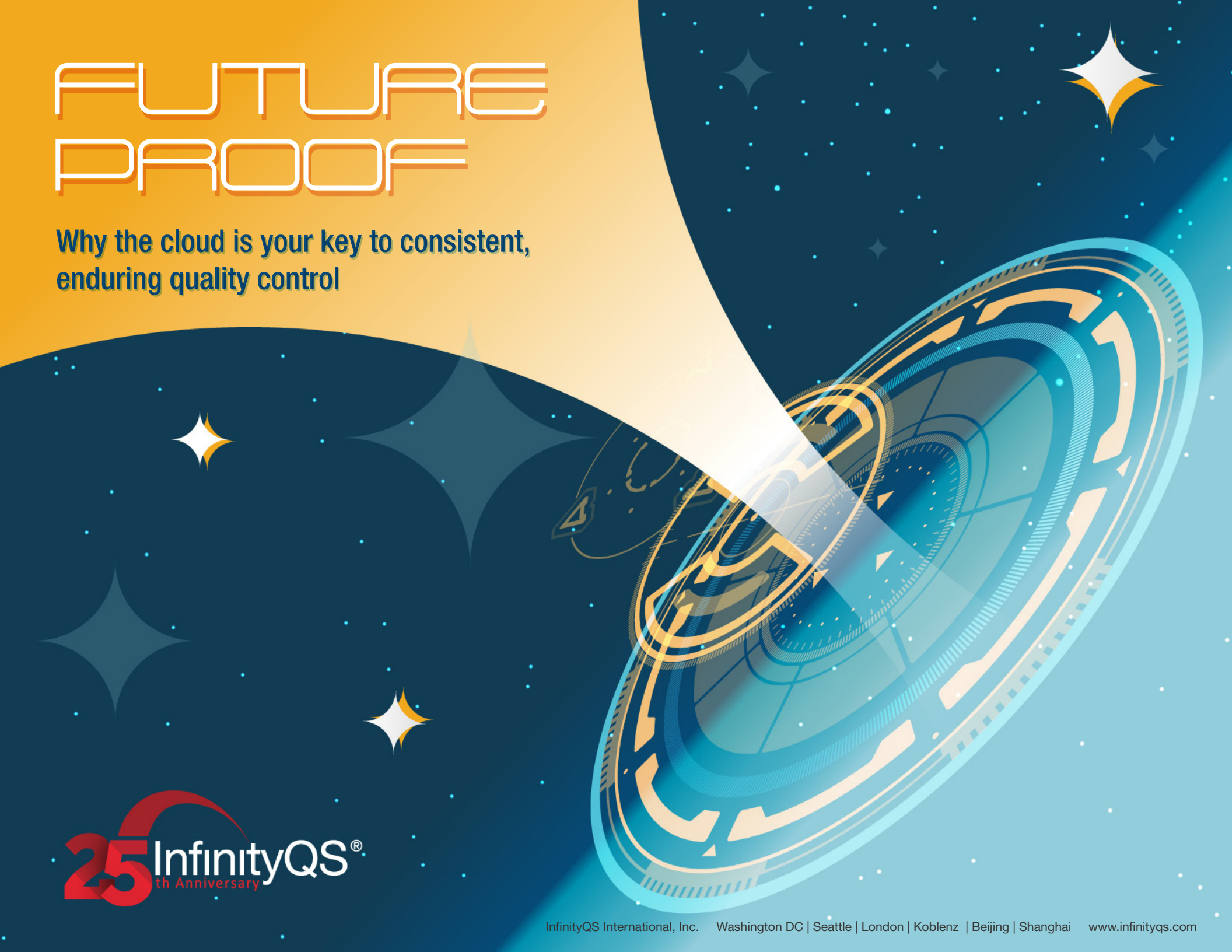
FUTURE PROOF

Why the cloud is your key to consistent, enduring quality control



25th Anniversary InfinityQS®

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Change may be Risky

BUT THE FUTURE HAS REAL REWARDS…

Join us in a time machine. Once inside, we travel to a time where quality data, regardless of location, is instantly available through one centralized point of command. Where data can be gathered, and analyses conducted, in or near real-time. Where the entire supply chain can be integrated within a single quality management system. And where executives and managers get a global view of all their manufacturing assets, facilitating informed decisions for targeted correction and improvement.

HERE'S THE FUNNY THING: WE DIDN'T HAVE TO GO ANYWHERE.

The future just described is available to manufacturers today. But for too many managers, moving ahead feels risky. How can they be sure that their next investments will not be doomed to premature obsolescence? How can they be confident that change will bring a productive step forward, rather than a costly disruption of current production? Challenged to strike the right balance between the rewards of improved quality control and the risks of technology failure, many professionals prefer to stay with the status quo.

Yet staying still has its own risks. Traditional quality management technologies have been built around an IT model that's no longer up to date. Based on local site implementations that produce local reports and limited visual displays, such as control charts, these tools lack the flexibility, reach and interconnectivity that defines modern information systems.

Fortunately, there is a way forward that allows you to seize the rewards of improved quality controls while minimizing the risks of technological change. In this paper, we'll blaze a trail for progress that can address and overcome fear, and create a platform for ongoing progress that remains inherently "future proof," allowing you to take advantage of advancing technologies as they emerge.

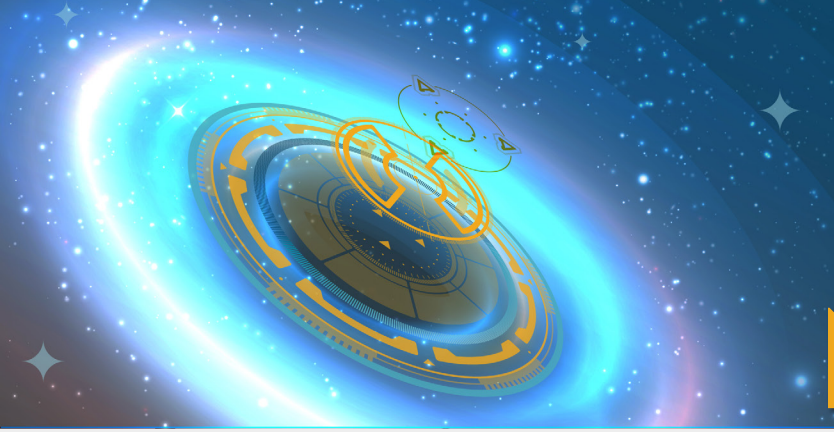
Assessing the Risks

WHY INVEST IN CHANGE?

*Decision makers **NEED** the kind of insights only an up-to-date and fully standardized quality system can fulfill.*

Given that updates can be costly and time-consuming—without guarantee of comparable returns in value—why invest in change at all? The short answer is that in an industry driven by innovation, advances in manufacturing processes are outstripping improvements in quality control.

But even when the need for change is recognized (often by virtue of mergers and acquisitions, or by an ever-elongated supply chain), managers struggle with real risks that cannot be simply dismissed. **Future-proofing your quality system means overcoming these formidable obstacles:**



INCONSISTENCY: No one begins with a global system. Instead, quality control has been applied plant by plant, line by line (and in some cases, machine by machine). Local technicians may get the operational feedback they need. But without standardization of data, data collection, and quality processes, lessons learned in one area cannot be applied anywhere else. The resulting "apples and oranges" data outputs make it impossible to see the big picture—to compare and contrast plants/lines/machines to identify best practices and target the most urgent areas for improvement.

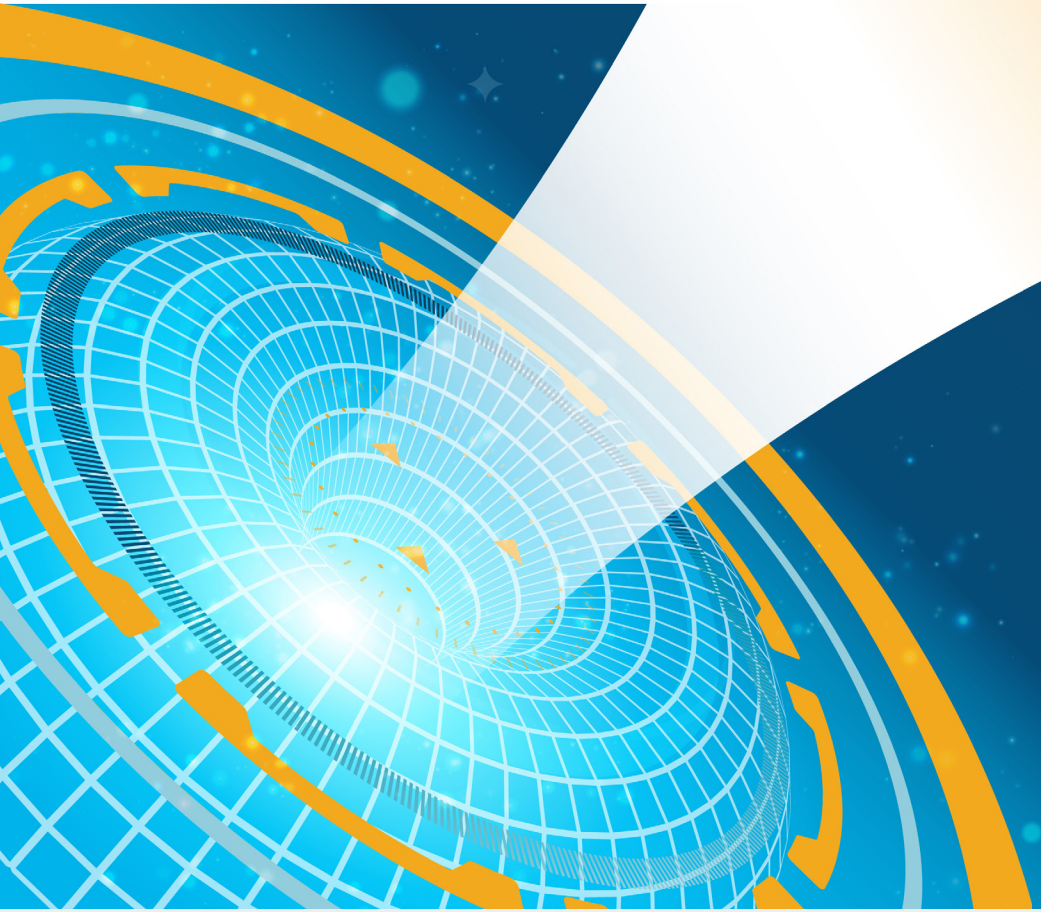
OBSOLESCENCE: We call it the "ticking time bomb"—as servers and systems age, it isn't easy keeping up with vendor updates, especially when every upgrade can mean downtime and disruption. But with each update manufacturers let pass, they deny themselves the full value of the system they own. Worse, many current quality systems haven't kept up with contemporary technology. Too many manufacturers depend on software that is ten to fifteen years old—or at least two to three versions behind—risking "orphan" status that may make support difficult or impossible.

That obsolescence is commonly compounded with neglect. It's only natural that manufacturers would focus their investments on their core business: production. But when they habitually make quality systems a low priority, quality control falls further and further behind.

COMPLACENCY: For many manufacturers, the typical practice has been for each plant and its quality system to develop its own practices and standards. Part of this approach can be attributed to natural territoriality—a desire to protect our own turf. But the greater part may be caused by tunnel vision. The inability to see how operations data can have greater value beyond its local context in its second life prevents a deeper analysis of data for continuous improvement opportunities. At the higher levels of management, decision makers need the kind of insights only an up-to-date and fully standardized quality system can fulfill.

Approaching the Rewards

ON DEMAND MEANS IN CONTROL



Perhaps the biggest roadblock to change, and the greatest reinforcement of the status quo, is one underlying assumption—that updates and improvements to quality systems have to be made at each plant location. Faced with multiple lines and locations, manufacturers find the challenges daunting. When they look ahead to potential expansions, mergers and acquisitions, their prospects look downright depressing.

But what if, instead of recreating your quality system (and recommitting to your investment) site by site, you could link all your manufacturing components to one centralized system, as necessary? What if, instead of making unique updates, improvements and/or additions at each plant, you could make global changes from your desktop?

The truth is, you can. Through a combination of networking, wireless technologies, and the cloud, you can shift from a capital-intensive on-premises model of quality control to a much more cost-effective on-demand system that gives you the flexibility you need to master growth.

A CLOUD-BASED, ON-DEMAND QUALITY CONTROL SYSTEM SUBSTITUTES RISK WITH THE FOLLOWING REWARDS:

CONSISTENCY

Through cloud connectivity, you can replace the silos of quality control with one consistent quality system. Instead of a Babel of conflicting quality languages, all plants, all lines, and all projects can communicate with a common quality vocabulary.

Standardized vocabulary allows for "apples to apples" comparisons across various units. Information can be consolidated into one version of the truth, eliminating conflicting reports that can create confusion.

ADAPTABILITY

On-boarding can be made on demand. As new lines are introduced, or new plants obtained through construction, mergers or acquisitions, they can be connected to the quality system in a matter of days or hours—without new investments in hardware and software.

Suppliers, too, can be incorporated into the quality system without imposing capital costs (or committing complex IT resources). Through on-demand integration, manufacturers can gain visibility into the quality of raw materials before they are shipped further downstream.

FUTURE-PROOFING

Instead of the manufacturer spending time and money making software upgrades plant-by-plant, improvements are made all at once—by the quality software vendor. Future-proofing means the vendor does all the "heavy lifting," maintaining servers and software, monitoring security, and applying upgrades automatically. By shifting the burden, the manufacturer always has a quality system that is state-of-the-art and fully supported, minimizing their risk and ownership costs.

LET'S CLARIFY THE CLOUD:
FOUR POPULAR MISCONCEPTIONS AND WHY THEY'RE WRONG

1. **IT'S JUST FOR CONSUMERS.** No, the cloud has already proven that it has the strength, scale, and stability necessary for critical business operations. Think Salesforce, Dropbox, and Microsoft Office 365, for example.
2. **IT COSTS MORE.** Actually, it costs less, because you're shifting your IT burden from a large capital investment to a much more manageable operations expense.
3. **IT'S NOT SECURE.** It's true the security isn't perfect—but it isn't perfect anywhere. When you compare on-premise to cloud security, you'll find that the cloud has a much better defense record with fewer occurrences and lower frequency of attack.
4. **SUPPLIERS WON'T ACCEPT IT.** They'll do more than accept the cloud—they'll welcome it as a more effective way to integrate into your supply chain, faster and with deeper access to data.

Want to learn more? Download our free ebook, Cloud Mythbusters: Dispelling the Myths of Manufacturing in the Cloud.

MIGRATION:
MAKE THE MOST OF THE MOVEMENT

To go from on-premises quality control to on-demand quality in the cloud, you'll have to migrate your quality data. For many manufacturers, this is merely an inconvenience, one typically approached with translation engines.

But it may be wiser to think of the migration as an opportunity. Instead of regarding the migration as a technical challenge, consider it an intelligence operation. When you apply sharp minds—not just smart engines—to the task, you can investigate otherwise obscure questions:

- Are you gathering the right data?
- Have the data been structured to ensure success?
- Are the vocabularies correct?
- Are you gathering data at all the relevant stages?
- Can quality be traced from raw operations through final goods?
- Do you have data gaps?
- Can the data be rolled up across plants and/or vendors?
- Do you know what metrics you need to see?
- How can we ensure visibility into supplier quality data?
- Does the data provide quality visibility across operations?

By making the migration a true quality investigation, you can turn a chore into a chance to improve your entire quality system.

ACTIONABLE INSIGHT

Consistent, coordinated data can be "consumerized" to deliver actionable reports to decision makers beyond the manufacturing floor. By compiling various local data sets into "big picture" reports, engineers and managers can find weaknesses, identify best practices, and target areas for improvement with the highest potential return on investment.

Freed from local barriers, quality data can have a second life as a resource for strategic planning. With consistent and standardized quality information, it becomes much easier to make informed choices about which machines, processes and resources to invest in to yield better output outcomes.

MASTERY

Concentrated expertise plays to the manufacturer's advantage. Cloud-based providers have specialized resources that most manufacturers do not have or cannot otherwise afford for delivering world-class competency in connectivity, security, data archiving and disaster recovery.

Living in the Future

ON DEMAND IN ACTION, TODAY

Some of today's most successful manufacturers are already using cloud-hosted or on-demand quality management systems in their facilities.

Here are a few of their stories.

1 BOTTLER SERVES QUALITY CONTROL ACROSS 80 SITES, FAST

CHALLENGE:
Standardize plants

Consistent quality is absolutely crucial to consumer goods bottlers. But a key bottler faced a difficult challenge: how could it standardize its quality requirements throughout plants scattered across the world? They needed to overhaul their quality system, but replacing software plant by plant would have been prohibitively expensive.

SOLUTION:
Roll out quality on demand

By moving its quality platform to the cloud, the bottler was able to deploy its system via the Internet. In just 18 months, they were able to achieve quality consistency across more than 80 global plants.

RESULTS:
One source of truth for all its plants

Today, more than 140 plants have converted to the new system. As quality demands evolve, the bottler can deploy new checks almost instantaneously, without bringing boots to every plant. They now have a single database of standardized data, allowing it to run global analyses that have cut costs, reduced quality deficiencies, and lowered its maintenance overhead.

2 FOOD COMPANY TAKES A $2.1 MILLION BITE OUT OF WASTE

CHALLENGE:
Decrease waste, reduce variability

With $3.4 billion in annual sales, a leading consumer package food and beverage company was really cooking. But with six different manufacturing facilities and a stand-alone corporate lab, it was getting burned by difficulties gathering and analyzing quality data.

SOLUTION:
Deploy ProFicient on Demand

Once connected through the cloud, the food company was able to command its quality controls across all of its units, compiling reports that exposed previously undetected spec variances, packaging overfill "giveaways," excess scrap, and inconsistencies to the taste profile.

RESULTS:
Savor millions of dollars in savings

Through real-time monitoring and expanded data gathering, the company gained greater control of its product output, realizing $2.1 million in reduced waste in the first year of implementation. Further analyses and expanded application of the software —as well as the planned introduction of tablets for plant-floor inputs—will ensure additional savings year after year.

PRODUCE SUPPLIER MASTERS WEIGHTY ISSUES 3

CHALLENGE:
Control consistency of package weights

A leading produce supplier struggled to enforce consistent package weights among its ten facilities. The problem: If they failed to meet minimum weight requirements, they faced heavy fines; if they exceeded stated weights, they lost money on give-aways.

SOLUTION:
Connect through the cloud

Instead of making massive IT investments at each of its ten facilities, the produce producer integrated its quality system through the cloud, creating a single database for management control.

RESULTS:
Dynamic alerts, flexible responses

Once implemented, the cloud-hosted system managed a regular schedule of quality tests that consistently monitor weights and impose corrections. When the FDA applied stricter standards on raw foods, the produce company brought mobile devices to its source farms, quickly bringing its vast network of suppliers into conformance with new quality demands.

Take the First Steps

INTO THE FUTURE

Today, you can overcome the risks of traditional IT implementation to enjoy the rewards of advanced quality control. Cloud-hosted, on-demand quality control frees or "future proofs" manufacturers from building and maintaining the IT infrastructure needed to support a state-of-the-art quality management solution. It offers a simple, fast and low-maintenance way to integrate your quality controls across your entire manufacturing process, wherever they are.

Take the first step. **Contact InfinityQS today.**

About InfinityQS International, Inc.

InfinityQS International, Inc.® is the global authority on Manufacturing Intelligence and enterprise quality. The company's Manufacturing Intelligence platform, ProFicient, delivers real-time visibility from the shop floor, across the enterprise and into the supply chain, allowing top manufacturers to take control of quality. Powered by a centralized statistical process control (SPC) analytical engine, ProFicient manufacturing quality software leverages Manufacturing Intelligence to help global manufacturers improve product quality, decrease costs, maintain compliance and make smarter, datadriven business decisions. Headquartered near Washington, D.C., with offices in Seattle, London, Koblenz, Beijing and Shanghai, InfinityQS was founded in 1989 and now services more than 40,000 active licenses with over 2,500 of the world's top manufacturers including Kraft Foods, Ball Corporation, Boston Scientific, Graham Packaging and Medtronic. For more information, visit **www.infinityqs.com**.

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