



The New Rules of Field Service Management

How Technology Can Help You Win

ORACLE WHITE PAPER | NOVEMBER 2014





Introduction: The New Rules

Field service managers are required to do more than ever. Corporate leaders ask that front-line managers control costs and increase customer satisfaction—without cutting corners on safety and quality. Reading between the lines, the goal is to optimize service efficiency.

To increase customer satisfaction, service businesses have implemented a variety of different strategies. Those with the size and budget to sustain a very large-scale operation have added more field technicians on the ground and more trucks in the field to ensure that all jobs are fulfilled. However, this comes at a cost. The increased capacity can be underused, which leads to diminishing margins—potentially turning a profit center into a cost center.

Another common approach is to give existing field teams more work, assuming that they will simply work harder and faster to get all of the jobs done. This can have a significantly negative impact on service levels and first-time fix rates as mobile employees race from job to job. Even worse, it can actually increase costs if miles driven between jobs escalate and employee overtime balloons.

Fortunately, for the majority of field service organizations, these are not realistic tactics. To address corporate directives and ensure the success of the field force, the better solution is a cloud-based field service management solution integrating technicians, customers, and technology. This approach addresses the challenges of providing excellent customer service in a connected and impatient world.

QUICK FACTS: Social Media Drives Increased Sharing of Customer Service Experiences

1. 45 percent of customers share bad customer service experiences while 30 percent share good customer service experiences via social media.¹
 2. More have read positive reviews (69 percent) of customer service online than negative reviews (63 percent).²
-

¹ <https://www.zendesk.com/resources/customer-service-and-lifetime-customer-value>

² Ibid.



The Challenge: Little Brother Is Watching

The consequences for failing to deliver excellent service at any stage of the customer lifecycle have become so extreme that there is very little room for error. In fact, one survey revealed that US companies deemed to have poor customer service are losing a staggering US\$41 billion a year.³ So, it should be no surprise that 44 percent of US customers are taking their business elsewhere as a result of inadequate service; and of those, 89 percent have switched service providers at least once or twice in the last year.

Unfortunately for today's field service teams, bad experiences don't stay between the customer and the service organization. Social media has given every customer a forum for publicly sharing bad customer service experiences in painful detail.

Some call this being watched by "Little Brother" because, at any time, one of the billions of smartphones in use today can snap a picture or video of poor service, shoddy work, or unsafe practices. These images are then shared with company management, regulatory compliance offices, consumer protection groups, or even the world via social channels. At every stage of the field service process, not only is someone always watching, they are empowered and enabled to take action if they are not satisfied with the service provided.

QUICK FACTS: Top Reasons Customer Service Interactions Are Deemed "Bad"

1. *Taking too long to resolve a problem*
 2. *Not resolving the problem at all*
 3. *Having to explain the problem to multiple people*
-

The Solution: Winning the Waiting Game with Technology

To optimize efficiency—and outmaneuver Little Brother—forward-thinking field service organizations are blending modern technology and predictive analytics to look at field service operations holistically. By analyzing every aspect of the customer experience, service organizations can start to leverage performance patterns and environmental factors to better plan and manage their day-to-day operations.

Field service management software is not a new technology. Large service-based enterprises, with thousands of people in the field, have used these solutions for years. The typical solution operates like an air traffic control system and distributes jobs to mobile employees against a set of systematic rules.

However, this technology is evolving rapidly and becoming more and more dynamic. Collaboration tools and mobile devices enable workforces to stay connected more than ever before. Advanced job routing engines can squeeze the white space out of a team's day without threatening wait windows, first-time fix rates, and customer satisfaction. These solutions now bring the customer into the loop, delivering frequent communications via text, e-mail, or phone as well as enabling self-service portals on the web.

³ New research from leading cloud contact center vendor NewVoiceMedia at <http://www.newvoicemedia.com/enus/news/corporate/themultibilliondollarcostofpoorcustomerservice/#sthash.RoSgEm0l.pdf>



The Facts: What to Look for in a Field Service Management Solution

Whether an organization must coordinate hundreds or thousands of field workers or is simply trying to stretch the resources of a few dozen people, effective field service management is a challenge. Assigning workers to jobs based on each employee's skill set, the availability of certain tools and parts, the shift schedule on a given day, and proximity to the job can be complex. To solve this problem, companies should consider a field service management solution that incorporates the following features.

Automation That Accommodates Multiple Teams and Jobs

Field service management software should use a set of predefined rules to build the field schedule. If there is bad weather, traffic, a customer cancelation, or any other disruption to the daily schedule, the software system should allow central control of the field force to keep the schedule running efficiently and on time. Additionally, the solution needs an optimization and exception engine that will automate processes such as dispatch and manage exceptions that occur throughout the day. Finally, this same automation engine should allow for the creation of different rules for each team within a workforce.

An ideal field service management solution requires an optimization and exception engine that will automate processes such as dispatch, manage exceptions that occur throughout the day, and allow for the creation of different rules for each team within a workforce.

As an example of these rules, an organization may have a team that only performs preventive maintenance checks on installed equipment. Therefore, optimizing the team to maximize the number of checks per day without having to pay overtime would be ideal. Within this same organization, there may be a team that focuses on commissioning new equipment and, in that case, allowing overtime might be more tolerable because the faster completion of work results in the activation of a new revenue stream. A holistic system should be able to accommodate a multitude of rules for different team and job requirements.

Integration with Business Processes

Field service management software needs to enable a holistic and comprehensive approach to field service. The solution should not only include an extensive set of features, but should also integrate seamlessly into existing business processes.

First, be sure that the solution will integrate efficiently with all other back-office systems in use, such as inventory management, customer relationship management (CRM), or enterprise resource planning (ERP).

Second, verify that the solution addresses the needs of multiple stakeholders within the field service organization. This should include complete sets of tools for field technicians, as well as the dispatcher, supervisors, operations managers, contractors, customer service representatives, and even customers.

The field service management solution should not only include an extensive set of features, but should also integrate seamlessly into existing business processes.

Interaction Between the System and the Field Team

Field service management software must also enable rich interaction between the mobile workforce and the system. In addition to providing real-time routes and schedules, the system should provide tools that assist technicians with their work once they arrive at a job location: tools that allow technicians to ask for help, retrieve customer information, track down parts, and look up asset history. All of these tools must be designed to help the technicians achieve higher first-time fix rates and increased customer satisfaction. In addition, cloud-based solutions enable easy access for third-party contractors providing critical customer service support and directly interfacing with customers.

Customer Inclusion

Finally, and most importantly, a field service management solution must bring the customer into the process. Too often, the customer is left out of the service process, resulting in uncertainty and a feeling of helplessness.

Field service management solutions that can enable self-service portals should receive heavy consideration. Such self-service features enable customers to track a task, reschedule or cancel an appointment, and provide feedback to the company. The software should also allow for the creation of appointment reminders based on every customer's unique preference—phone, text, e-mail, or social media.

Bringing the customer into the process also eliminates the waiting period. Customers know exactly when to expect the technician. Being in the know reduces the likelihood of a customer turning to social media to vent about bad service. In addition, improving the service window is a prime opportunity for businesses to enhance their relationships with customers. When the job is consistently performed with efficiency, the customer will be retained for life—even if someone else can do the job for less money—and recurring revenue is secured.

A field service management solution must bring the customer into the process.

The Goal: Satisfaction Rates of 98 Percent

Having a holistic view of all aspects of the field service environment and automating all aspects of the process ensure that the right worker gets to the right job at the right time, based upon specific criteria.

Furthermore, the customer is involved and has visibility into the entire service process. Using a field service management solution that achieves this holistic view can lead to customer satisfaction rates of 98 percent. Other documented savings after integrating a field service management solution are a 15 percent increase in overall productivity of the field force, a 15 percent reduction in the number of people needed in the field, a 98 percent on-time arrival, and a 75 percent reduction—if not outright elimination—of overtime.

Additional benefits:

- » **Economics.** By optimizing the field service, companies can save an average of US\$5,000 to US\$20,000 per field service employee per year.
- » **Operational efficiency.** Companies using a field service management solution for their mobile workforce have reported a 40 percent decrease in distance driven per appointment, a 75 percent reduction in overtime, and a 47 percent increase in the rate of jobs completed each day.
- » **Customer satisfaction.** With a field service management solution, a customer's typical four- or eight-hour wait window can be reduced to one hour.



What If Your Customer Is a Machine?

A large percentage of field service work involves servicing remote assets that have no human element involved in the service process. Examples of such items would include utility infrastructure or possibly unmanned machines such as ATMs, vending machines, or radio towers.

At first the idea of a customer-focused field service management solution seems unnecessary, because the machine cannot log onto a self-service portal or turn to social media if a technician is late. However, this remote equipment can still interact directly with field teams throughout the entire field service cycle. Most equipment is now being designed to connect to the internet, in what is called the Internet of Things.

Machine-to-machine (M2M) technology allows equipment to proactively send alerts for service directly to the field service management solution, allowing for the immediate scheduling of technicians. This eliminates the middleman and allows for quick resolutions to problems.

The machine can also send critical performance information, allowing service teams to diagnose faults before a technician is dispatched. This increases the likelihood of a first-time problem resolution because the technician has a better understanding of the problem before arriving onsite. If a particular business relies on the maintenance of remote assets, selecting a field service management solution designed to integrate with M2M technology must be a consideration.

Case Study: Holistic Field Services for Delivery

Offering home furnishings with great design, natural materials, and exquisite craftsmanship, a US furniture retailer helps its customers create inspired living spaces. The founder and CEO has made customer service a priority throughout his organization since 1986.

Initially, the company scheduled deliveries with a full-time staff of eight customer service representatives and provided customers with a four-hour wait window for appointments. Employees invested as much as 48 person hours in planning and routing a single day's deliveries. But achieving aggressive goals for ontime delivery with this manual system became increasingly difficult as the business grew.

By applying a holistic field service management solution, the company was able to dramatically improve key service, productivity, and expense metrics:

- » 40 percent decrease in miles driven per delivery run
- » 38 percent more deliveries completed per hour
- » 95 percent customer satisfaction ratings (up from 81 percent in 2001)

QUICK FACTS: Popular Field Service Key Performance Indicators

- Miles driven
 - First-time fix rate
 - Jobs completed per day
 - Mean time to resolution
 - Net Promoter Score (NPS)
 - Percentage of capacity used
-



Conclusion

Taking a holistic approach to field service management results in more-efficient operations and improved service. Key to this approach is field service management software that builds and controls technician schedules for increased productivity and customer satisfaction. Thanks to cloud-based solutions, the mobile internet, and the ubiquitous nature of smartphone technology, field service management solutions are now becoming readily available to organizations of all sizes.




Oracle Corporation, World Headquarters

500 Oracle Parkway
Redwood Shores, CA 94065, USA

Worldwide Inquiries

Phone: +1.650.506.7000
Fax: +1.650.506.7200

CONNECT WITH US

-  blogs.oracle.com/oracle
-  facebook.com/oracle
-  twitter.com/oracle
-  oracle.com

Hardware and Software, Engineered to Work Together

Copyright © 2014, Oracle and/or its affiliates. All rights reserved. This document is provided for information purposes only, and the contents hereof are subject to change without notice. This document is not warranted to be error-free, nor subject to any other warranties or conditions, whether expressed orally or implied in law, including implied warranties and conditions of merchantability or fitness for a particular purpose. We specifically disclaim any liability with respect to this document, and no contractual obligations are formed either directly or indirectly by this document. This document may not be reproduced or transmitted in any form or by any means, electronic or mechanical, for any purpose, without our prior written permission.

Oracle and Java are registered trademarks of Oracle and/or its affiliates. Other names may be trademarks of their respective owners.

Intel and Intel Xeon are trademarks or registered trademarks of Intel Corporation. All SPARC trademarks are used under license and are trademarks or registered trademarks of SPARC International, Inc. AMD, Opteron, the AMD logo, and the AMD Opteron logo are trademarks or registered trademarks of Advanced Micro Devices. UNIX is a registered trademark of The Open Group. 1114

The New Rules of Field Service Management
November 2014