



A better way for housing
organisations to manage
a field-based workforce

EBOOK



Welcome to our ebook

Whether you are already using some of the software tools designed to enhance the capabilities of housing associations, or are just looking for new ways to streamline your processes, this is for you.

Each chapter focuses on a key area of field workforce management. Together, the best-practice tips will help you significantly improve productivity, reduce costs and enhance customer satisfaction.

Contents

Click on the topics below to jump straight to a particular section.



A photograph of three business professionals in an office setting. A woman with curly hair is pointing at a computer monitor. A man in a light blue sweater is leaning over her, looking at the screen. Another woman with braided hair is sitting at the desk, also looking at the screen. The desk has a computer monitor, a keyboard, a mouse, and some papers. The background shows office shelves and lights.

1. Planning and scheduling

How can you increase productivity, reduce costs and improve customer satisfaction?
Through work optimisation, dynamic scheduling and intelligent appointment booking.



The scheduling challenge

For every housing repair organisation, planning and scheduling work will almost always take a significant amount of time; getting it wrong can have a negative impact on costs and customer service.

5 operatives with just 5 jobs each



= billions of different planning scenarios

Planning and scheduling are never simple. If you have five operatives carrying out five jobs per day at separate locations there are millions of different scenarios for allocating jobs.

There is a better way

The intelligence within your dynamic resource scheduling tool ensures that every option is considered and the best option

is selected every time. It uses data captured from other available applications to ensure that every job is intelligently allocated so it is performed by the right operative at the right time, regardless of what changes during the emerging day.

It works by optimising the schedule, managing the unexpected and booking appointments intelligently.



1.1 Optimising the schedule

Dynamic resource scheduling tools are better at optimising the schedule than planners manually inputting jobs. So, once you've told the tool what the parameters of your business are, such as shortest route or cheapest operative (based on your organisational KPIs), you can let the tool handle the complexity.

Case study

North Lanarkshire Council saw productivity in its housing repair service rise by 35 per cent (from an average of five hours per worker, per day, to 6.75 hours per worker, per day) with Dynamic Resource Scheduler (DRS).

= The equivalent of adding **12** operatives.



Two factors help you to significantly increase productivity while improving customer satisfaction:

Identifying suitable operatives

This is more than matching skills to jobs. Other factors such as required timescale, location, equipment, language, certification and annual leave, can and should be taken into account. The more rules you have, the better optimised your repairs become. However, we recommend you limit this to fewer than ten so as not to restrict flexibility.

Identifying the best operative

Identifying suitable operatives is likely to produce multiple options, now it is about identifying the best. A key factor here is travel time, and this is not based on as-the-crow-flies but needs to take into account street-level journey planning to significantly reduce travel time and costs.



1.2 Managing the unexpected

Dynamic scheduling is the key to ensuring that whatever emerges throughout the day, you are always working in the most efficient way.



Without some dynamic scheduling software, new jobs are simply allocated to the first available slot across operatives. With applications like DRS the day is re-planned to create the most efficient schedule including the new job.

Emergency repairs, job overruns and no-access incidents are all factors affecting the emerging day. Repair organisations like yours have three options:

1. You build in a buffer of free operative slots to accommodate emergencies and overruns, and live with the inefficiency this generates in resource utilisation and travel.
2. You slot emerging work into the schedule of relevant operatives on a first-availability basis, ignoring who is the best choice for each job.
3. You re-evaluate the plan and reschedule the day to take emerging work into account to ensure you maintain the optimum work schedule across all available operatives.



1.3 Booking appointments intelligently

Booking an appointment should not be about finding the next available slot, but finding the most efficient window.

The greatest opportunity for you to maximise efficiency is at the point a tenant is booking an appointment. It's vital that customer service advisors not only have a view of available slots, but also the intelligent insight about which slots are the most efficient in terms of time, cost and resource utilisation.

When appointments are being made, dynamic resource scheduling identifies the most effective use of resources by looking at the availability of appropriate operatives and the most cost-effective slots available based on resource and travel optimisation. It will then present the best slot to the call centre team, enabling them to offer this to the customer.

Your customer service team should then be presented with a simple screen that enables them to offer appointments in the most efficient order for your organisation.

WED 5 MAY	THURS 6 MAY	FRI 7 MAY	SAT 8 MAY
09 - 12 ★	09 - 12 ★	09 - 12 ★ ★	09 - 13 ★ ★ ★
09 - 15 ★	09 - 15 ★ ★	09 - 15 ★ ★ ★	
15 - 17 ★	15 - 17 ★ ★	15 - 17 ★ ★	

With DRS, colours and stars are used to indicate the most cost-effective appointments available.



2. First-time fix

What factors determine whether a first-time fix is achievable, and what can your organisation do to ensure that more repairs are completed during a single visit?

Let's find out.



The first-time fix challenge

To achieve the highest possible first-time fix rate, you need to align every stage in the entire repair cycle to ensure maximum effectiveness..



Accurately define
the required work



Schedule the right resource at a
convenient time for the resident



Remind the customer
about their appointment



Allow the work schedule to be
re-arranged in order to not
miss the next job



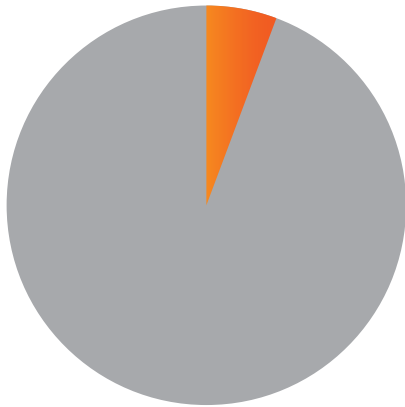
Enable workers to vary the work if
they arrive and it is not as described



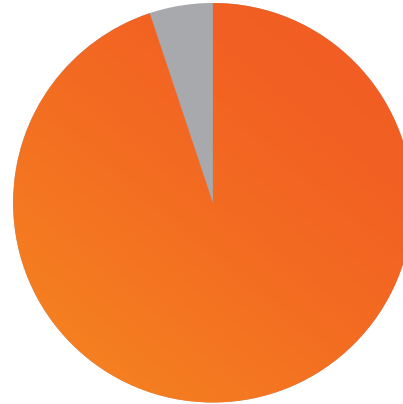
Ensure the resource
arrives on time



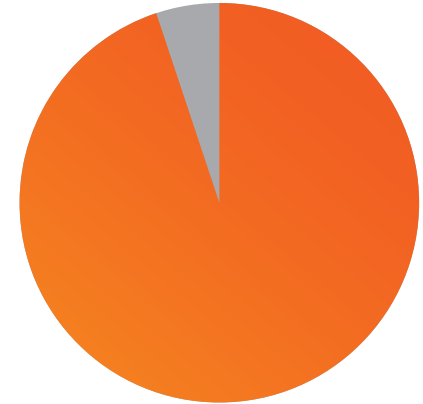
The value of getting this right



No-access rates can
fall below 5 per cent



First-time fix rates can
climb above 95 per cent



Customer satisfaction scores
can exceed 95 per cent



2.1 Accurately defining repairs

The key to achieving a high first-time fix rate is accurately defining the required repair, and then ensuring you have the right resource with the right tools and parts scheduled for the works. Easier said than done?

Effective triage

The challenge here is to gain enough information from the tenant on the likely root cause of the issue they are reporting. The two options here are simply using highly skilled contact centre agents or utilising a seamlessly integrated diagnostic application that guides the agent through the questions they need to ask in order to accurately identify the required repair.

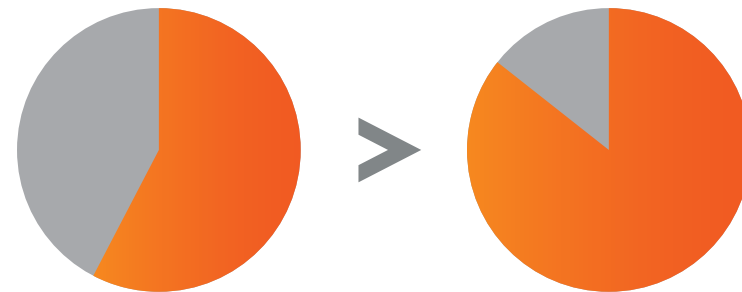
Accurate scheduling

The next challenge is scheduling the right operative with the right tools and parts to complete the repair.

Convenient appointments

With the right resource identified, you need to find the most convenient time when the worker can gain access to the property — agreeing an appointment during the initial call is essential.

First-time Fix Rates Increase



According to the Aberdeen Group, first-time fix rates can be increased from **62 per cent** to **86 per cent** by having an effective triage process in place.



2.2 Ensuring access

First-time fix is dependent on the operative being able to gain access to the property when they visit — a no-access incident is a wasted visit and another appointment that needs to be scheduled.

Keeping customers informed

With dynamic resource scheduling software it's easy to keep customers informed. Each appointment can be confirmed automatically by email or SMS, with reminders being sent at time intervals such as 24 or 48 hours before the job is due. When an operative updates the job on their mobile device to say that they are en route to the property, a SMS can be sent to remind the tenant.



North Lanarkshire Council's no-access rate dropped from 40 per cent to just 3 per cent through the use of DRS and Job Manager.

Keeping commitments

By using mobile working software to track worker progress and a dynamic scheduling application to re-allocate work between colleagues, you can increase the likelihood that every appointment is met.



The percentage of appointments kept by residents of The City of Edinburgh Council rose from 78 to 96 per cent after it implemented DRS and Job Manager.



2.3 Enabling work variations

Basic repairs can turn into something more complex, and jobs can simply take longer than expected. The best way to deal with this is to allow enough time for the worker to complete the task. But how do you do that?

Sanctioning work variations

By seamlessly integrating your mobile working solution with your dynamic resource scheduling application, planners gain full and immediate visibility of the day's work and its progression, allowing them to sanction job variations and re-align work items to ensure the emerging day is taken in their stride.



According to the Aberdeen Group, 13 per cent of failed first-time fix cases were due to the operative not having enough time to complete the work.

Managing the impact of the unexpected

The right mobile working and resource scheduling software can help you manage the emerging day by dynamically re-allocating work based on real-time information of activity being performed. As a result, your organisation can ensure these work variations have the least impact on other works scheduled and commitments to residents.



Bernicia's customer satisfaction from its repairs service increased from 77 per cent to 91 per cent within the first six months of using DRS.



3. Mobile working

Migrating to mobile working delivers added value for your organisation, your workforce and your tenants. Here's why.



Paper systems or mobile app?

You may have always managed your teams using static, off-line and / or paper-based processes, but that doesn't mean it's the most efficient. Here's the comparison.

Instead of everyone carrying paperwork, re-keying data, all that driving and all those phone calls, your mobile workers could use mobile devices. They would then always have information to hand, and managers could benefit from automatically updated systems and real-time visibility.



A Briefcase Of Paperwork



One Mobile Device



Driving Back To Base



Information Now
On Hand



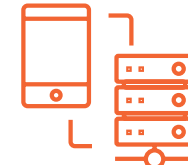
Office Chases For An Update



Real-Time Visibility



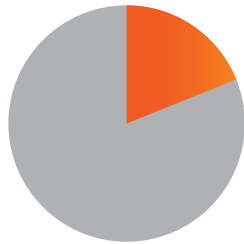
Re-Keying Paperwork



Auto Update Office
Systems



The impact of mobile working



20% Increase in productivity
North Lanarkshire Council

Since implementing mobile working technology, the average best-day performance (across all the inspectors) rose from 15 to 20 visits; the council also made annual savings of £400,000 on outgoing calls and £250,000 on postage.



£5000 saved per worker
Salix homes

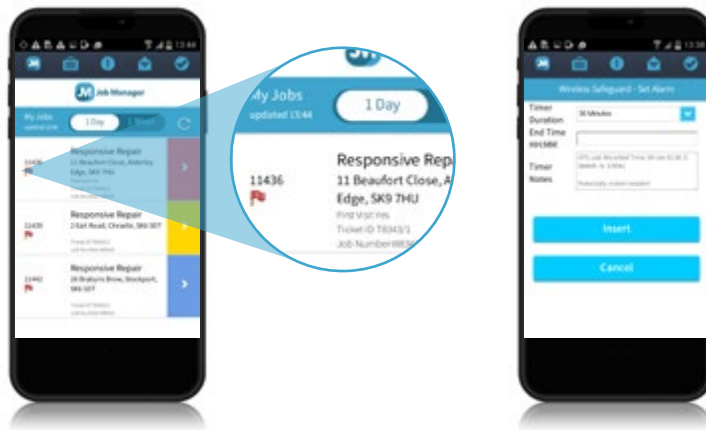
£500,000

Actual cost reduction per annum
South Gloucestershire Council



3.1 Removing paper

The first significant value that mobile working offers is the removal of paper — job sheets, order sheets, work sheets and time sheets that slow down your field-based workers.



Information at hand

With access to work history from a mobile device, every operative understands the full history of the task in hand. They can then diagnose the issue more quickly and fix it far more effectively, without the need to return to base or call for help.

Electronic data capture

By using electronic forms on the mobile device, both the quality and completeness of information collected in the field is dramatically improved. Complement this with the ability to take a photo, collect a signature or scan a bar code, and life is made far easier for field workers.

Zero admin

Data collected on the mobile is validated and automatically posted into the relevant dynamic scheduling, housing management, repairs, customer relationship management (CRM) or document management system. There is no longer any need for admin resource struggling to transcribe operative-completed forms — a significant saving in people hours.



3.2 Real-time visibility

With paper-based systems, managers and planners can see where each operative has been, but only at the end of each day. With mobile working, they can see where each worker is right now.



Work progress updates

Because operatives have the ability to update job status in real-time from their mobile device, managers have constant control over their operation; they can ensure that all works are on track and when issues arise, they can deal with them immediately in order to minimise the impact on productivity and the tenant.

Location tracking

Location services on mobile devices enable managers and planners to see where every operative is right now, and where they have been. This information can be used for audit trails, as well as lone worker and operational actions.

Real-time scheduling

With each operative connected, the scope for rescheduling the emerging day is vastly expanded. With full, real-time visibility over worker locations and job progress, planners can adjust work schedules and send them directly to operatives with the click of a button — no need for calling around and juggling paperwork.



3.3 Empowering operatives

Mobile working is not just about enabling operatives to work more productively, it's about making the processes of your entire organisation more efficient.



Orders and appointments

By providing mobile workforce management apps on mobile devices, field-based workers are able to order specific parts to complete work and to schedule additional appointments while they are with the tenant — reducing admin overhead and streamlining processes.

Lone workers

When operatives are working alone or out-of-hours, the mobile device can act as their lone worker support with an emergency capability to indicate if assistance is required and to raise the alarm.

Cross-discipline application

Operatives can also directly log tenant requests on their mobile device, such as reporting anti-social behaviour or the need to see a housing officer — all of which can streamline processes, take work out of the back office and deliver a better customer service.

A smiling male technician in a blue polo shirt and tool belt, holding a yellow level and talking on a mobile phone, standing next to a white van. The background shows a residential building with a tiled roof.

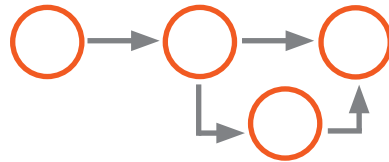
4. Voids and planned maintenance

Dynamic resource scheduling software can help your organisation accelerate the turnaround of void projects and optimise planned maintenance activity.



The voids challenge

What is the best way to blend resources across responsive repairs and project- based work such as voids, programmed capital works or cyclical servicing?



How do you sequence work to optimise the use of each trade?



How do you reduce void timescales and increase rental income?



TEAM A

TEAM B

How do you combine responsive repairs and planned maintenance workforces to reduce costs and increase efficiencies?



How do you easily view and manage the timescales of all repair work in progress?



4.1 The impact of Project Planner

To help you answer these questions and overcome the voids challenge, we have created an additional, optional module to our dynamic resource scheduling software. Project Planner allows organisations to take greater control of responsive and planned works to make them more efficient.



"Since the implementation of project planner the average time taken in having a home ready to be re-let has reduced by 5 days."

Mark Best, Call Centre Manager



"Project Planner is unique in the way it breaks down complex maintenance projects, such as void properties, into manageable chunks of work."

Margaret Slingsby,
Performing & Productivity Manager



4.2 Planning and scheduling voids

The scheduling requirements for planned works are very different from those for reactive work. With planned work, a more holistic approach is required taking into consideration not only multiple tasks but the interdependency of these tasks.



Plumber



Electricians



Carpenters



Decorators

Modelling scenarios

Project Planner gives you the ability to model the sequence of tasks within each project so you can optimise the use of your resources.



Scheduling works

The software allows you to minimise travel and the use of contractors (when internal resources are available) by giving you visibility over the entire workforce when scheduling works.



Identifying issues

It enables you to identify potential issues during the planning stage and ensure contingencies are built into the schedule to minimise disruption and slippage.



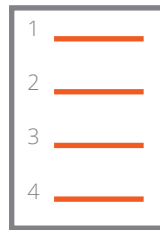
Tracking in real time

Project Planner enables the continuous tracking of your projects, identifying issues and overruns early and dynamically rescheduling work to minimise impact and potential idle time of trades.



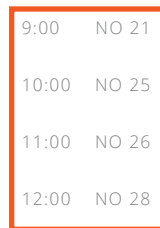
4.3 Appointing planned maintenance

Creating the optimum sequence of activities helps drive efficiency in the process of appointing cyclical maintenance.



Efficiently planning maintenance

Where planned maintenance spans multiple properties, your organisation needs to make the most efficient use of resources. Project Planner enables you to manage such activity as a programme rather than a set of individual tasks, enabling you to schedule activity in the most productive way.



Optimising appointments

By grouping and sequencing tasks, Project Planner is able to create the most cost-effective schedule of appointments. This can then be used to set appointments with tenants to ensure the maximum number of tasks can be completed each day.



Monitoring progress

Project Planner enables you to track progress against your programme of works to ensure work is completed within the required timescales. It also enables you to take any overruns into account within the schedule in a dynamic way.



4.4 Maximising resource productivity

Using the right dynamic resource scheduling software you can link your segmented teams and gain visibility over your entire workforce to improve productivity.



TEAM

Dynamically reassigning resources

As project plans are automatically transitioned into schedules, you gain full visibility of resource utilisation and task progress. This ensures that resources can be dynamically reassigned within the team so each project remains on-track.



TEAM A



TEAM B

Cross-team task sharing

You can easily share tasks across different teams (those dealing with reactive and planned works) to significantly increase productivity and accelerate job completions.



Reducing travel

Cross-team visibility also enables a better use of resources based on location. For example an emergency repair may be better served by a void operative working nearby, which minimises travel time.



Combining tasks

By linking responsive repair scheduling with planned maintenance you can combine tasks to further improve the use of resources. For example, a responsive repair on a property that has a future planned maintenance task scheduled can be linked and completed during the same visit.

A man with grey hair and a beard, wearing a light-colored suit jacket over a blue shirt, is smiling and holding a tablet. The background is dark and out of focus.

5. Business insight

Operational data provides intelligent, actionable insight to deliver added value to your business — if you have the right solution to make use of it.



The business intelligence opportunity

With the right business intelligence solution you can transform the wealth of data collected by your dynamic resource scheduling and mobile working applications into actionable business insight.

In this way you can make more informed decisions about which resources you need, and where best to deploy them, to continually improve the efficiency and effectiveness of your organisation.

The features of a business intelligence solution



Efficiency and cost by
work type



Productivity of each
operative



Cost to serve by
geography



Efficiency of
appointments



5.1 Productivity by work type

With the right business insight tool, you gain a holistic view of all work and drill down into each job type to identify trends and accurately predict the cost to complete other jobs like it.



Benchmarking by work type

By analysing productivity by type of work, you gain an accurate benchmark, based on actual performance, of how long each type of job should take to complete, and how much it will cost.

Identifying the exceptions

With this benchmark, you can easily identify areas of work that are performing poorly, then address the cause (whether it's due to no-access, operative skill level or poor job classification) and take action.

Managing in real time

Quite often, missed service level agreements are down to office staff not being aware of a problem until it's too late. By using a software system that populates office performance dashboards with data in real-time, staff can identify problems and take immediate measures to solve them.



5.2 Productivity by field worker

With every job scheduled and tracked, you gain detailed insight into the performance of each operative and can see how this is collectively impacting your organisational performance.

Measuring individual performance

With the right business insight tool, you can measure the productivity of each field worker and even give them access to charts and data sets for their individual performance. This enables performance appraisals based on accurate and consistent data to help improve workforce efficiency.

Performance by work type

By drilling down on operative performance by work type, managers are able to quickly identify if trends associated with any work types are affecting overall operational performance.

Addressing productivity issues

By analysing individual workers' productivity by work type, and measuring this against benchmarks, you can understand the root cause of any issues and take action.





5.3 Cost by geography

With the right software solutions, managers quickly understand the geographic spread of work and operatives so they can more efficiently fulfil demand.



Work by geography

By tracking the location of each job, managers gain full visibility of work across the region as a whole and by individual areas.

Workforce by geography

To intelligently map the geographical spread of demand, and fulfil it efficiently, managers can cross-reference real-time field worker locations with the location of each job. Managers are also supported by having access to information about workers' skills, experience and availability.

Cost by geography

With this insight, managers quickly understand the cost of serving each geography; they can evaluate the financial impact of having different resources with different skills in different locations, including the option of serving some regions purely by contracted staff.



5.4 Appointment efficiency

The process of offering appointments has a significant impact on the cost of your field-based service and the productivity of your organisation as a whole. With the right technology, you can improve it.

Appointment allocation

With the right software tools, managers will be able to understand how appointments are made by the customer service team, and how the workforce is performing in terms of appointments met and first-time fixes completed.

Allocation efficiency

They can analyse the efficiency of appointment slots to see if work is being allocated in the most productive way to minimise travel and ensure that the most appropriate operative is allocated to each job.

Cost of appointment setting

Managers can analyse what proportion of work is allocated efficiently to understand the impact of these improvements on the organisation.





About Advanced

Driving productivity, insight and innovation

We enable our customers to achieve increased efficiencies, savings and growth opportunities through focused, right-first-time software solutions that evolve with the changing needs of their business and the markets they operate in.

As the third largest British software and services company in the UK, we help organisations create the right digital foundations that drive productivity, insight and innovation – all while remaining safe, secure and compliant. Our solutions for both commercial and public sector organisations simplify business challenges and deliver immediate value, positively impacting millions of people's lives.

Journey to the cloud

We have a strong track record in helping our customers' journey to the Cloud. We manage private, public and hybrid

Cloud environments as well as deliver sector specific Cloud-based solutions and services. We are certified partners with Amazon Web Services (AWS) and Microsoft, and have achieved the highest levels of accreditations. Our Cloud solutions are used by organisations of all shapes and sizes including Highways England, Performing Rights Society (PRS) and Aspire Furniture.

Field service management

Our field service management software solutions help our customers streamline their service to increase job capacity, reduce overheads and improve customer satisfaction. More than 40,000 field workers rely on our software to undertake their work every day, and over £20m has been spent in research and development of our product. Our applications can be fully integrated with their existing infrastructure, or rolled-out as independent solutions, with the option of being hosted in the Cloud.

To talk to an expert about how we can help your organisation, contact us on 08451 605 555.

Alternatively leave us a message [here](#) and we will be in touch shortly.

 t: 08451 605 555