CASE STUDY:
**Industrial Supplier's D365 Implementation**

Dynamics 365

# Supporting Growth with Microsoft Dynamics 365

**How the largest Dynamics 365 implementation in the southern hemisphere saved millions through test automation and hybrid on-shore/off-shore delivery.**

**KEY OUTCOMES:**

- $1 million saved from offshore testing
- 50 days saved per testing cycle from automation
- Largest D365 implementation in the southern hemisphere
- Over 40 systems integrated
- 32 Microsoft Dynamics 365 modules implemented

**DELIVERED:**

- System testing
- System integration testing
- Test automation
- Test management
- Performance testing
- Security testing
- User acceptance testing
- On-shore/off-shore delivery

## Problem

Like many established businesses, this leading supplier of tools, safety and industrial supplies identified that its current IT infrastructure was not equipped to keep up with its ambitions for market share growth.

In 2018 they decided to embark on a digital transformation program that would consist of updating a 30-year-old collection of legacy customer engagement, sales, and finance systems. These systems would better support back-office staff and deliver a seamless omni-channel experience for customers, enabling them to browse, place orders and manage their account seamlessly both in-store and online.

The hardware supplier chose Microsoft Dynamics 365 and its range of enterprise resource planning and customer relationship management applications to support their core business processes around sales, retail, manufacturing, and delivery of industrial and safety supplies.

Their Dynamic 365 instance would need to meet over 2,000 business requirements and integrate with over 40 different systems, including financial, manufacturing, banking, reporting, sales, and procurement. This made it the largest Dynamic 365 implementation in the southern hemisphere.

**TECHNOLOGIES:**

- Microsoft Dynamics 365
- D365 Accounts Payable
- D365 Accounts Receivable
- D365 Asset Management
- D365 Audit Workbench
- D365 Budgeting
- D365 Cash and Bank Management
- D365 Common
- D365 Consolidations
- D365 Cost Accounting
- D365 Cost Management
- D365 Credit and Collections
- D365 Enterprise Credit Management
- D365 ExFlow
- D365 Expense Management
- D365 Fixed Assets
- D365 General Ledger
- D365 Human Resources
- D365 Inbound Transport Management
- D365 Inventory Management
- D365 Master Planning
- D365 Organisation Administration
- D365 Procurement and Sourcing
- D365 Product Information management
- D365 Production Control
- D365 Project Management and accounting
- D365 Retail and Commerce
- D365 Sales and Marketing
- D365 System administration
- D365 Tax
- D365 Trade Revenue Management
- D365 Treasury Automation Suite
- D365 Warehouse Management
- Dell Boomi

**TOOLS:**

- Selenium WebDriver
- Microsoft EasyRepro

## Solution

To ensure that all parts of this implementation were working correctly, they would need a testing partner with a breath of knowledge in end-to-end system, system integration, test automation, and performance testing. Planit were selected to deliver upon this based on our experience with Dynamics 365 as well as the breadth and depth of skills across our permanent team of consultants.

Our solution needed to be engineered to suit this complex implementation. Beyond addressing the large number of business requirements, this also involved integrating a wide range of systems, with numerous legacy systems being connected via Dell Boomi. And since there was no significant in-house IT presence within the hardware supplier, we would work closely with numerous external providers across multiple project phases.

Once the test planning and strategy was complete, we worked alongside the development partners to design, test and deliver code in sprints, before running End-to-End testing and supporting User Acceptance Testing.

In order to ensure an optimal level of test coverage for this large scale project, we created a Selenium-based custom test automation framework which incorporated and extended Microsoft's open source EasyRepro framework for the FinOps modules.

Our manual and automated testing efforts spanned across Dynamics 365, its 32 modules and the 40+ integrated systems. This consisted of system, system integration, performance, security, and user acceptance testing. We also provided performance testing consultancy and leadership for their new web platform.

Working in tandem with our delivery team, Planit's dedicated account manager actively collaborated with the hardware supplier's management team to form new solutions when plans changed.

By providing additional resource flexibility and creating an extended testing window with our offshore team, we were able to ramp up and down responsively as requirements demanded. And when faced with document design issues and delays in development, the Planit test delivery team worked proactively to maintain cadence, investigating and following-through on issues where there was no reliable reference documentation.

**ABOUT PLANIT:**

At Planit, we are experts in quality engineering and assurance. Supported by our D365 Centre of Excellence and Accelerators, our specialist consultants can support you in achieving a successful implementation.

Ask us how our free-to-access accelerators can save your Dynamics 365 implementation up to $100,000!

**Contact us** →

## Outcome

With phase 1 of the project complete, we cemented our position as the hardware supplier's most trusted partner, alongside Microsoft. This was owed to the quality of our advice in navigating the many complex challenges encountered and our ability to continue delivering in accordance with the project plan.

Through this initial stage, we created and executed over 3,500 test cases, and designed over 530 automated test cases.

By leveraging our offshore team, we were able to save the supplier approximately $1 million in testing costs. A similar saving has been realised by utilising offshore resources for ongoing testing, aside from our specialist onshore performance and security services.

The test automation framework we built, and the automated test cases run on it, have the potential to save 50 days of manual test execution effort each time the test suite needs to be run.

Having impressed with the quality of our people, flexibility of our partnership and commitment to achieving project goals, we are now continuing beyond this initial implementation. The next phase of the project involves designing and executing an additional 4,000 test cases, with the goal of automating approximately 30% of these for regression purposes.