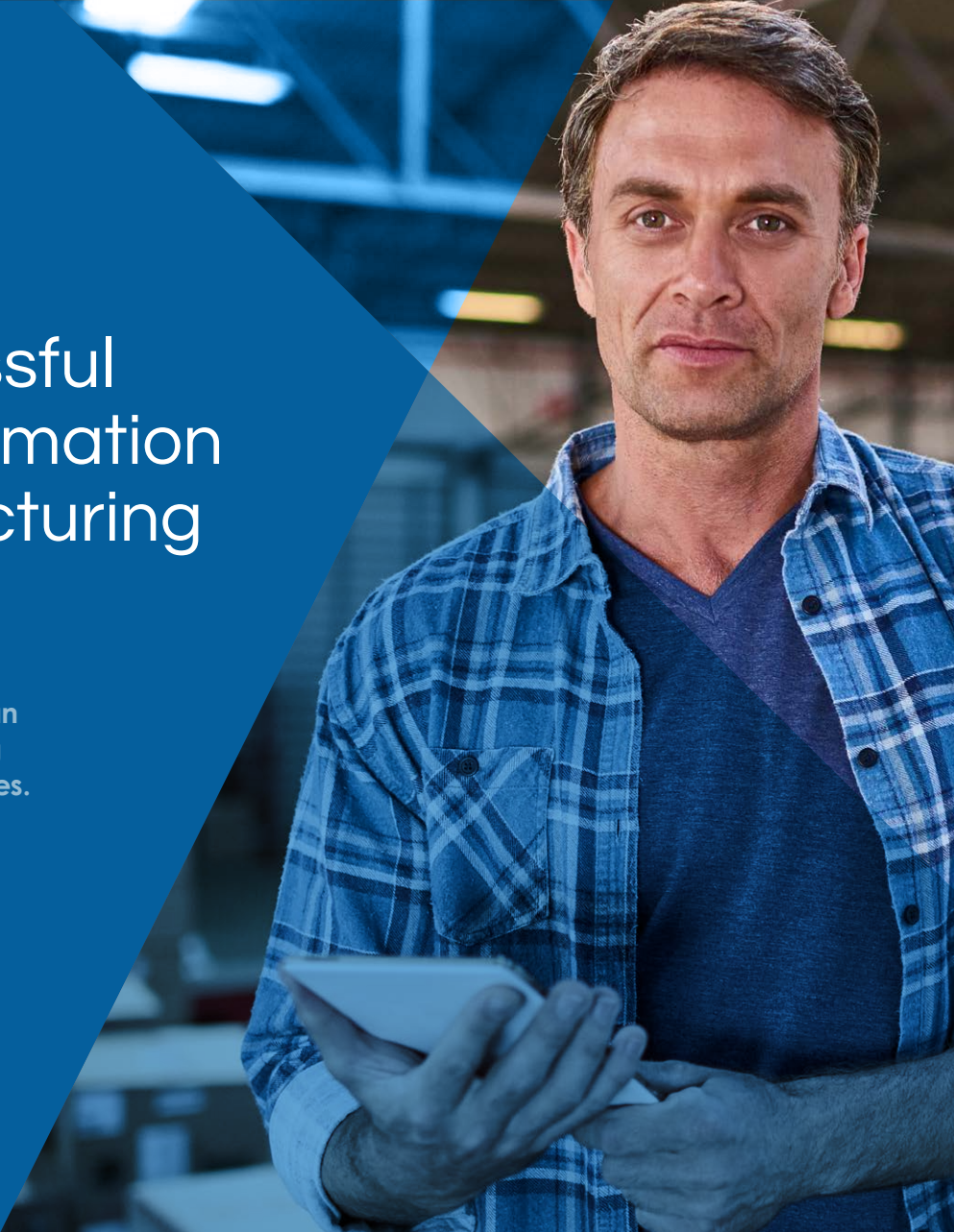




BRENNAN IT

Driving successful digital transformation in the manufacturing sector

How Brennan IT can help Australian manufacturers identify new selling strategies, channels and audiences.



Australia has a diverse and thriving manufacturing sector, including everything from cheese making to metal smelting and the production of medical equipment.



According to the Australian Department of Industry, Innovation and Science¹, the manufacturing industry currently contributes around \$100 billion to Australia's GDP annually, employs around 900,000 Australians, and contributes over 25 per cent of business expenditure on research and development.

At the same time, however, the proliferation of digital technology, combined with the growth of the global marketplace, means local manufacturers need to work even harder – and in smarter ways – to secure market share. As such, moving key technology to the cloud is becoming increasingly important in helping manufacturers to streamline and improve their operations, logistics and supply chain management, and their relationships with customers, employees and suppliers.

At Brennan IT, we have helped many Australian manufacturing businesses with their digital transformations; enabling them move some – or all – of their IT solutions to the cloud. In doing so, we follow a four step digital transformation process:

Step 1: NOW

We consider exactly where the business is at, and its unique challenges and opportunities.

Step 2: VISION

We formulate a solid vision for the future based on critical desired outcomes.

Step 3: PLAN

We bring together the 'now' and the 'vision' with a workable, pragmatic plan.

Step 4: EXECUTE

We then help the client successfully execute their plan according to their unique requirements.



In this whitepaper, we elaborate upon each of these four steps, share the results from a recent Microsoft survey of Australian SMB manufacturers, and outline our recommendations for how manufacturing businesses can successfully evolve their technology in order to gain an all-important competitive advantage.

¹ Australian Department of Industry, Innovation and Science, *Manufacturing performance*: (accessed 15 May 2017)



STEP 1: THE NOW

Understanding the key challenges facing SMBs in manufacturing



At Brennan IT, we start every project by focusing, in detail, on understanding our clients' unique predicaments and needs.

This includes examining their appetite for risk and for change; their growth and performance issues; the set-up of their infrastructure; and any current technology limitations. We also consider any staff issues, or client experience and supplier issues.

Typically, we see several common challenges in the manufacturing sector. These include:

International competition

According to a recent *Sector Competitiveness Plan* by Australia's Advanced Manufacturing Growth Centre, most Australian manufacturing firms don't have the capacity to compete on an international scale with countries such as China.²

"The majority of Australian companies do not report characteristics such as R&D collaboration; the introduction of new goods, services or processes; the use of science, technology, engineering and maths – or STEM – skills; supply of overseas markets; or increasing IT expenditure," the plan says.

Dayle Wilson, General Manager of Operations at Brennan IT, agrees that growing international

competition is a significant threat for Australian manufacturers, who need to adapt or risk being left behind.

He says that right now, Australian manufacturers face two key types of international competition. The first comes, primarily, from China, where there is an abundance of low tech cheap labour. The second comes from countries such as Japan, which has considerable high tech capability, especially in areas such as automation and robotics.

"Without the right technology in place, Australia just can't compete globally with countries such as China, where labour costs are just so much less, or with other countries that are investing heavily in technology innovation," he says.

"Increasingly, Australian manufacturers need to be looking for ways to work faster and more effectively, while delivering a superior customer experience. Customers will buy locally when feasible, so manufacturers need to make it easy and compelling for them to do so," he adds.

² Australian Financial Review, *Australian manufacturers lack competitive edge*, (13 Jan 2017)



Lack of access to highly skilled talent

According to a recent Microsoft *SMB Landscape Report*³, there are 286,000 people employed in small manufacturing businesses (0 – 19 employees) within Australia, and a further 260,000 employed in medium businesses (20 – 199 employees).

However, as the working population in the manufacturing sector is ageing, SMBs face an acute shortage in skilled labour. High operational costs and the uncertainty in returns hinders potential newcomers wanting to enter the workforce.

Wilson agrees that the lack of available talent is one of the biggest problems in the sector. “Typically, manufacturing firms have difficulties attracting skilled technical employees, and most don’t even know what they need to do in order to attract the right talent. Fortunately, in many ways, the cloud is providing an alternative to finding the right skills in-house,” he says.

Lack of technology insight

The manufacturing sector has been slow to adapt when it comes to technology.

According to recent Microsoft research⁴, 70 per cent of manufacturing SMBs feel it’s highly critical to be educated on the latest technology directions, however only half believe they have good working knowledge of these trends. In addition, only 10 per cent of manufacturing SMBs are using CRM software, and only 40 per cent are using cloud-based products, with more than half using it for data storage only.

However, despite the slow uptake of IT innovation in the sector, manufacturers are now in a situation where they *must* adapt the way they work – or risk losing market share. Typically, Australian manufacturers are therefore now far more open and accepting of technology solutions than ever before.

“Interestingly, one of the key challenges we face now is that businesses now know they need the cloud, and they want to use technology in order to change, but they just don’t know how to do so, in what areas, or where to get started. Our role is to help each of our clients find the path that’s right for them,” says Wilson.

³ Microsoft, *SMB Landscape Report*

⁴ Microsoft, *Industry Insights report, 2017*



STEP 2: THE VISION

Helping SMBs create a robust plan for the future



Today, when it comes to helping our manufacturing clients plan for the future, technology is a vital consideration.

According to a recent Microsoft customer survey⁵, 87 per cent of manufacturing SMBs believe technology is very critical to support them in *running* their business, and 70 per cent believe it is very critical in helping them *grow* their business.

At Brennan IT, once we have determined our clients' needs, we work closely with them to prepare a detailed vision for their technology transformation.

This can include new selling strategies, creating a competitive advantage, and crucial productivity and efficiency benefits. We also determine how our clients want to attract and retain staff in the future, how they want to organise their supplier and client relationships, how they can achieve full compliance and security and ensure the greatest possible return on their technology investment.

Typically, we help our clients create a vision that will enable several key benefits.

These include:

Superior customer service

Globally, we see technology is shortening the sales process; cutting out the middle-man and connecting customers more directly with manufacturers. Thanks to the proliferation of digital technology, customers expect to be able to review information about a product, make a purchase decision and even place the order from anywhere, on any device, at any time.

“Traditionally, when it comes to larger items, people have purchased from manufacturers via a sales person. They negotiate a price, and eventually they buy the item, which may then have to be made to order, and then takes some time to arrive. Now, with the cloud, customers simply buy direct from a manufacturer via an online portal,” says Wilson.

For customers, cloud-based technology offers the ability to connect with the manufacturer directly, from any device or location, and potentially, enjoy much shorter wait times when it comes to product delivery.

⁵ Microsoft, *Industry Insights report, 2017*



Streamlined supply chain management

For manufacturers, cloud-based technology can deliver enormous time and cost savings when it comes to supply chain management.

With the right supply chain management technology in place, a manufacturer can access, process and respond to product orders in real time. This means there's no need to rely on manual input or product specifications from sales people.

“With a cloud-based supply chain management solution, everything is automated and accurate, which significantly reduces the chance of error and means far greater customer satisfaction” says Wilson.

The Internet of Things is also changing the way that manufactures are able to control and monitor their production lines. With wirelessly connected cameras in warehouses, for instance, manufacturers can instantly track when items arrive, and when they are dispatched.

Similarly, with the right technology in place, manufacturers can instantly determine if a particular machine is running too hot and therefore inefficiently – or even if a delivery of fresh food remains unrefrigerated for too long after it arrives at a supermarket depot.

More efficient logistics

There are all kinds of new mobile innovations making it possible for manufacturing businesses to cut costs and work more productively. For instance, field management software can help cut delivery costs by ensuring drivers are taking the most efficient routes, and aren't wasting precious fuel along the way.

Similarly, workers in factories and along the supply chain can check the progress of orders – and of production – simply by logging on to any device at any time.

According to Wilson, logistical analytics is a huge growth sector in Australia, and is predicted to grow considerably over the next 18 months. “For manufacturers, a huge percentage of their costs are associated with transporting and moving items from along the supply chain. With the right technology in place, manufacturers can see exactly where inefficiencies are occurring, and take proactive steps to eliminate the bottlenecks before they have long-term ramifications,” he says.



STEP 3: THE PLAN

Building a bridge between now and the future

Once we have worked with an individual manufacturing client to determine its vision, we then help them put together a solid digital transformation plan for their applications, and select an appropriate infrastructure platform (e.g. BIT cloud, public cloud or on-premise).

While based on proven processes, our recommendations are always entirely customised to suit each client's unique needs, and designed to deliver maximum value.

We use a three step assessment process when evaluating a client's apps, which covers:

Step 1: Security assessment

In determining if a client is ready for the cloud, we need to first assess their current level of infrastructure security. We consider a range of factors, including their data classification, privacy concerns, compliance and brand protection.

Step 2: Technical assessment

This includes evaluating a client's existing apps, and how suitable they are for a cloud-based environment. We also consider the operating system, the type of storage they use, any network connectivity issues, and any technical specifications that will enhance or limit success of a cloud-based system.

Step 3: Cost assessment

Lastly, we examine a client's unique financial needs and how a cloud-based solution can help them transition into a more cost-effective, pay-per-use solution.



STEP 4: THE EXECUTION

Tackling transformation to suit clients' needs

Once a plan has been put in place, Brennan IT works with our clients to break their transformation strategy down into manageable chunks, and prioritise the roll-out of projects according to individual needs and desired pace. In the manufacturing sector, downtime simply isn't an option, so having a seamless transformation process is essential.

We create a scope of work which translates into a project plan, in which we map out certain deliverables. We also define very strict success criteria.

Throughout this phase, we also help our clients to minimise any risk associated by moving their infrastructure to the cloud by:

- Avoiding or at least minimising downtime – by tackling migration in a phased manner
- Recommending a secure cloud-based solution that will provide clients with ultimate peace of mind
- Providing training and awareness – so that all staff can use the new systems quickly and easily
- Alleviating any security concerns – by providing detailed information about how to manage and overcome any potential risks
- Providing ongoing support – so any issues are quickly and effectively resolved.



Evolving your manufacturing business: where to start

While moving your applications to the cloud is becoming more and more essential, it's also vitally important that you get the right advice – and approach your digital transformation with a proven and fully customised plan.

Before you embark on any digital project, you need to consider where your manufacturing business is at NOW: what your unique challenges and needs are, whether or not the cloud is relevant, and what your overall approach should be.

The expert team at Brennan IT has considerable experience in the manufacturing sector, and we have helped a whole range of businesses to move some, or all, of their applications to the cloud, in accordance with our proven four-step methodology.

To find out more, and discuss your needs, give the team at Brennan IT a call on 1300 500 000 or visit brennanit.com.au.