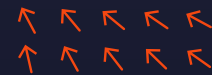




EBOOK

Smart Document Solutions for Digital Manufacturing



Visit us at GoNitro.com

Introduction

Like many industries, the manufacturing sector is going digital because traditional ways of working aren't fast or flexible enough to handle today's challenges. From supply chain disruptions and rising material costs to labor shortages and changing customer expectations, manufacturers need tools that help them stay competitive in a global market.

Manufacturing businesses can solve many of these problems by finding opportunities to work smarter, not harder.

This guide will help you harness the power of digital tools and workflows to unlock new possibilities and stay ahead in the rapidly evolving manufacturing landscape.





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CHAPTER 01

Digital Workflow Trends in Manufacturing

IDC's Worldwide Digital Transformation Spending Guide forecasts that digital transformation spending will reach \$3.9 trillion by 2027, with discrete manufacturing accounting for about 18% of that spending worldwide. The key drivers in accelerating digital transformation for manufacturing workflows include: creating resilient and agile supply chain processes; automating contract management; enhancing the value chain; improving the customer lifecycle; bridging gaps in operational workflows; and reducing costs.

Nitro helps manufacturers achieve these outcomes with our cost-effective and scalable PDF editing, eSign, and analytics solutions.



We support digital workflow transformation with intuitive, easy-to-implement tools tailored to manufacturers' needs.

These tools empower teams to:

- ✔ Automate manual processes, reducing production delays, and cutting costs across operations.
- ✔ Simplify procurement and employment contracts, ensuring faster approvals and smoother onboarding for both vendors and employees.
- ✔ Streamline paperless workflows to accelerate document management and approvals—from purchase orders to production schedules.
- ✔ Secure collaboration and approvals on critical documents such as orders, contracts, engineering drawings, and compliance records.



CUSTOMER STORY

Howden achieves PDF standardization

With more than two dozen PDF products in use—many lacking the latest version or security updates—Howden's 6,000 employees struggled with fragmented workflows and software compatibility issues that impacted efficiency.

By partnering with Nitro, Howden's IT team standardized the organization's PDF solution, increasing efficiency by creating streamlined PDF editing processes that eliminated the need for—and cost of—additional tools.

“

Digitizing our workflows has been huge for our teams. Our payroll process for our hourly rate staff is a great example of that. What was once a paper-heavy process that needed manual signing by five or six managers is now 100% digital. It has reduced a huge number of hours and made us more efficient.”

AIDEN CURRAN, IT SERVICE DELIVERY MANAGER
HOWDEN



CHAPTER 02

Enhance Operational Efficiency

In the manufacturing industry, efficiency is everything—and that extends to how documents are handled throughout the production lifecycle. And yet, many manufacturers still rely on manual or legacy document preparation processes that are slow, error-prone, and disconnected.

Without the right digital tools, manufacturing teams can waste hours formatting (and reformatting) PDFs, waiting for feedback, and tracking down signatures—leading to bottlenecks, missed deadlines, and compliance risks.

With Nitro's PDF editing and eSign solutions, manufacturing teams can accelerate workflows, reduce errors, and simplify tasks such as contract approvals, compliance document preparation, and secure signature collection.

A recent Forrester study commissioned by Nitro, “The Total Economic Impact™ of Nitro Pro Business,” found that enterprise organizations—and specifically manufacturers—are concerned about security due to the lack of standardization in their digital document management and signature tech stacks.

Many of the study participants reported they weren't able to expand tool adoption and standardize document workflows due to high licensing costs. As a result, many employees installed freeware without IT approval, exposing their organizations to multiple security risks.

“I was reviewing our PDF editing usage globally, and I was shocked by what I found: We had around 47 different types of software installed, with some freeware downloaded from illegitimate locations.”

IT SERVICE DELIVERY MANAGER
MANUFACTURING



Accelerate performance with Nitro's digital document solutions



Comments and annotations

Enhance collaboration with Nitro's markup tools, designed to draw attention to text and consolidate feedback seamlessly. Use features such as highlighting, crossing out, underlining, adding notes, and replacing text to simplify the revision process and ensure clear communication.



Editing features

Perform essential PDF edits with ease, from redacting sensitive customer information to inserting professional touches such as hyperlinks, watermarks, logos, and page numbers. Nitro makes it simple to annotate, format, and customize documents to meet specific needs.



Optical character recognition (OCR)

Transform scanned documents and images into fully searchable and editable text with Nitro's optical character recognition (OCR) tool. Once converted, Nitro's PDF tools can be used to modify text, apply password protection, and more—ensuring easy digital access to actionable information.



Shapes and measurements

Add precision to documents with Nitro's shapes and measurement tools. Insert lines, rectangles, or freeform drawings with customizable styles, colors, and opacity, or use the measurement tool to calculate distances, areas, and perimeters based on a defined scale. These tools are ideal for adding detailed notes or performing point-to-point evaluations in technical workflows.



Quick electronic signing

Quickly complete forms and gather approvals with Nitro's integrated eSign solution. Add credibility with customizable "sign here" stamps and streamline workflows by sending documents for signature directly from Outlook and Word.

Nitro's intuitive PDF editing and eSign tools are easy to master, making the transition to digital processes seamless across the entire organization—from the factory floor to the executive suite. In fact, Nitro Analytics tracked our manufacturing customers as saving 170 hours on average each month by eSigning.

Note: eSign requirements and regulations may vary by country.



Some of our contracts may need to be signed by 50 people, and it used to take around five weeks. It's now taking 1.5 days on average."

MANUFACTURING CUSTOMER, FORRESTER TOTAL ECONOMIC IMPACT™ OF NITRO PRO BUSINESS



CHAPTER 03

Advance Sustainability

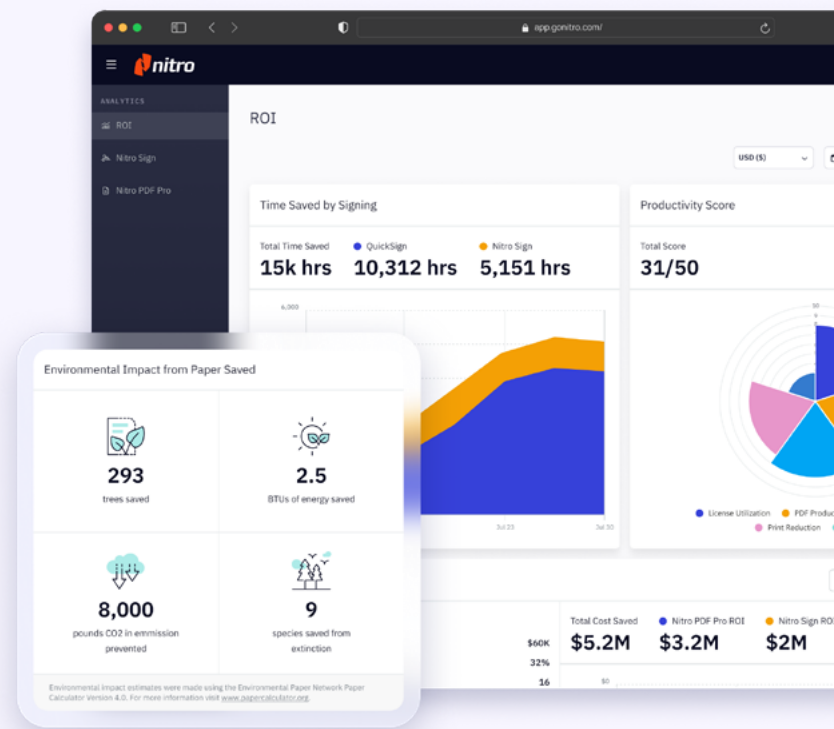
Sustainability is a hot topic in the manufacturing sector. Many businesses are looking for ways to improve energy efficiency, minimize waste, and adopt renewable energy sources, all while maintaining profitability and meeting compliance standards.

Digitalization presents a huge opportunity to make strides toward these goals by limiting waste and maximizing the output of all resources—both human and machine.

Although regulatory and compliance standards vary widely by country, manufacturers worldwide embrace environmental, social, and governance (ESG) best practices to reduce waste, improve operational efficiency, attract investors and customers, and meet regulatory requirements.

Nitro Analytics makes it easy to measure the impact of sustainability efforts by tracking metrics.

- ✓ Paper saved by eSigning
- ✓ Time saved by eSigning
- ✓ Productivity score
- ✓ Pounds of CO₂ emissions prevented
- ✓ Environmental impact
- ✓ Trees saved
- ✓ British thermal units (BTUs) of energy saved



Core components of an ESG strategy in manufacturing

Environmental

This includes reducing waste, cutting carbon emissions, and optimizing energy use in manufacturing processes.

Social

This focuses on how companies treat their employees, customers, and communities.

Governance

This relates to company leadership, accountability, and compliance with laws and regulations.

Digitalization supports sustainable manufacturing by replacing manual, paper-based workflows and wet signatures with PDF editing and eSign software, significantly reducing waste and inefficiencies associated with physical document handling processes.

Sustainability counts

Nitro Analytics captured the global sustainability contributions of our two million business customers in 2024. By digitizing their document workflows with Nitro, our customers saved:

🌳 **5.25 billion** pages of paper
(that's 624,000 trees!)

☁️ **467 million** pounds of
CO₂ emissions

⚡ **663 billion** BTUs of energy

💧 **556 million** gallons of water



CHAPTER 04

Reduce Costs

In its 2025 Manufacturing Industry Outlook report, Deloitte suggests manufacturers can position themselves as leaders in the market by investing in their digital and data infrastructure, advanced technologies, and high-ROI use cases.

Digitalization also helps manufacturers operate more cost-effectively. This means they can spend less time and money on paperwork and more time improving production efficiency, optimizing supply chain processes, and focusing on strategic growth initiatives.



How does Nitro help manufacturers cut costs *and* improve efficiency?

- ✔ **Faster approval processes**
Electronic contract and document approvals save time and reduce labor costs associated with delays.
- ✔ **Fewer errors**
Digital document management enhances accuracy, reducing costly rework and miscommunications.
- ✔ **Optimized workforce efficiency**
Automated document handling frees employees to focus on higher-value tasks.
- ✔ **Reduced printing and postage costs**
Digitizing workflows cuts down on paper, ink, and printing supplies and eliminates the need to ship documents back and forth.



CUSTOMER STORY

Continental finds a strategic partner in Nitro

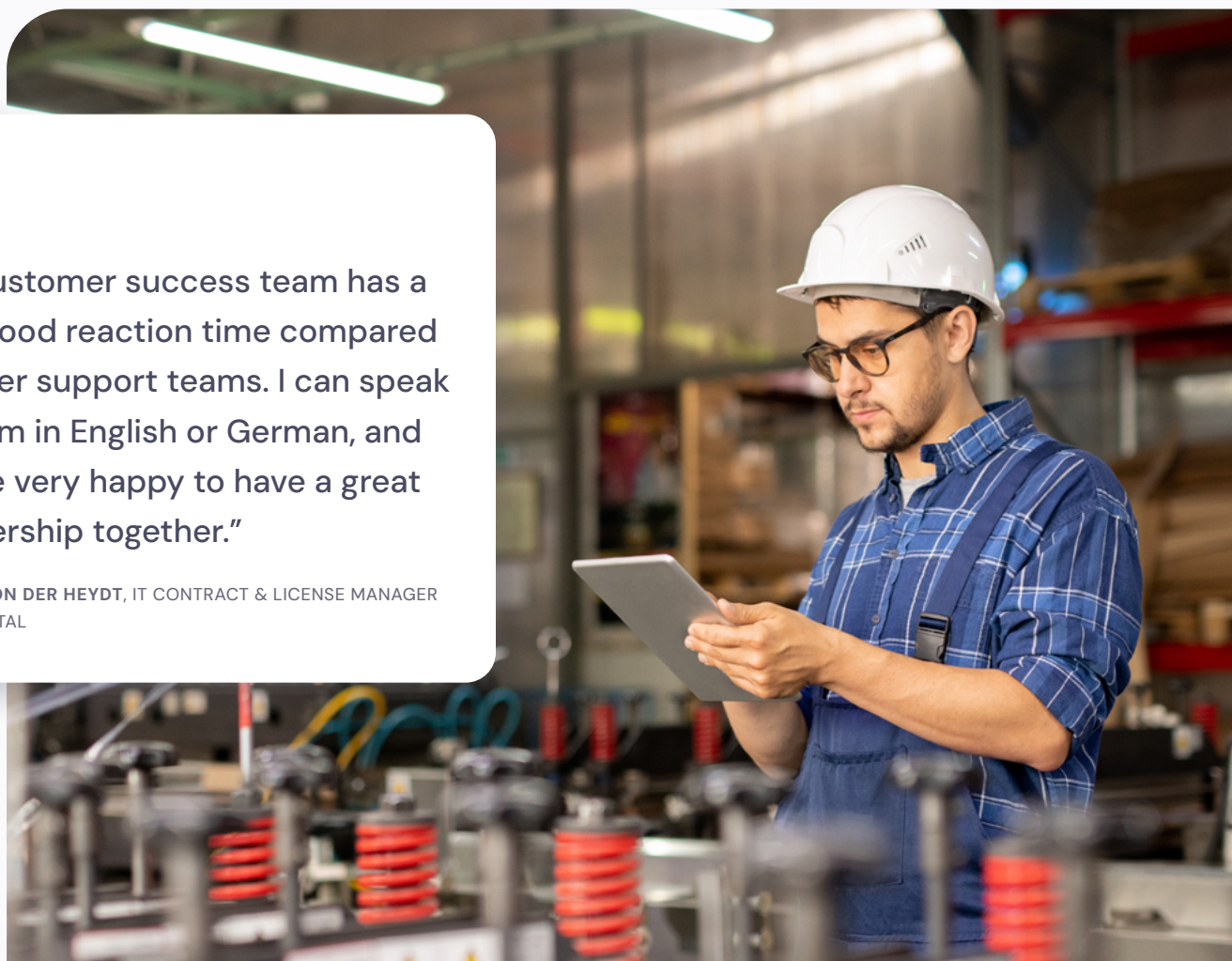
Continental, a leading automotive manufacturer with more than 200,000 workers, was unable to equip its workforce with the PDF editing tools it needed due to Adobe Acrobat's high cost per license. As a result, Continental began a search for a PDF solution that was scalable, affordable, and easy to use for IT and business users alike.

Thanks to Nitro's simple enterprise deployment and flexible pricing, Continental has doubled its license count year after year, equipping more than 12,000 global employees with Nitro's document productivity tools and greatly reducing paper use across the organization.

“

The customer success team has a very good reaction time compared to other support teams. I can speak to them in English or German, and we are very happy to have a great partnership together.”

TOBIAS VON DER HEYDT, IT CONTRACT & LICENSE MANAGER
CONTINENTAL



CHAPTER 05

Strengthen Security and Compliance

According to a 2024 article by World Economic Forum, “3 ways manufacturers can build a culture of cyber resilience,” manufacturing has been the targeted sector for cyberattacks for three years in a row. This results in unique security and compliance challenges, such as securing legacy operations systems, minimizing supply chain and third-party risks, and controlling access to sensitive information and intellectual property.



To mitigate risk, manufacturers need to implement robust cybersecurity measures. Choose PDF editing and eSign software that prioritizes security with built-in features such as:

- ✓ Password security and encryption.
- ✓ Permanent redaction and metadata removal tools to protect confidential information.
- ✓ Personally identifiable information (PII) protection and compliance.
- ✓ Automated eSign audit trails that track every action taken on a document.
- ✓ Two-factor authentication on eSignature requests.
- ✓ SOC2, HIPAA, and ISO 27001 certifications.
- ✓ Compliance with eSign laws, regulations, and industry standards, including eIDAS, UETA, and the ESIGN Act.
- ✓ A wide range of ID verification and authentication methods, including email/SMS OTP, OIDC methods, AES/QES services, and smart cards.



CHAPTER 06

Why Choose Nitro?

Our commitment to delivering value-focused industry solutions and support to our customers is unmatched. When you choose Nitro, you gain a global team of document workflow experts backing you with:



Robust security

Nitro prioritizes your security with advanced features to protect your data and documents, ensuring compliance across all our solutions.



Personalized support

We provide white-glove customer support and a dedicated customer success team with a significantly lower minimum spend than our competitors.



Seamless scalability

Your business evolves, and Nitro lets you consolidate and scale your document software to achieve your digital transformation goals.



Transparent pricing

You can count on cost-effective pricing with no surprise fees for licenses beyond your agreement or for uncompleted eSignature requests.



Intuitive products

Designed for ease of use and quick adoption, Nitro's solutions keep team productivity high and learning curves low.

Try before you buy

The Nitro Pilot Program allows your teams to thoroughly test our PDF editing and eSign tools to see how they fit into your workflows.





Discover the Future of Manufacturing with Digitalization

Digitalization isn't just about adopting new technologies; it's about creating a smart, more sustainable future. By leveraging tools like Nitro's PDF editing, eSign, and analytics solutions, you can enhance operational efficiency, meet environmental goals, reduce costs, and improve security and compliance.

Want to learn more about how Nitro is driving digital productivity in manufacturing?

Nitro Software accelerates digital productivity worldwide. Our trusted PDF & eSign solutions empower everyone with simple, smart, and secure documents and workflows.

Visit us at GoNitro.com

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