CoSign Digital Signature Solution Streamlines New Flyer's Processes from Design to Production

Introduction

New Flyer is a leading manufacturer within the heavy-duty transit market in Canada and the United States. Their products include drive systems powered by clean diesel, LNG, CNG and electric trolley, as well as energy-efficient gasoline-electric and diesel-electric hybrid vehicles.

New Flyer has positioned itself to provide the fastest "just-in-time" design to production capability. Consequently, New Flyer's build-to-order manufacturing results in a very high pressure and intense engineering and manufacturing environment. Their execution of the design approval process is critical to the overall success of their business.

- Customer - New Flyer
- Country - USA
- Industry - Engineering
- Applications - AutoCAD
- Number of signers - 100

The Challenge

Before implementing electronic engineer seals and digital stamps, the engineers at New Flyer were required to print out CAD drawings in order to sign and add their professional seal to the document. A typical document often requires 2 engineering approvals per page, and each drawing can comprise of up to 60 - 70 pages. The signed document is then re-scanned and uploaded into the document management system, and a hard copy is filed into a paper archive. All engineering documents are managed and archived through the UGS Teamcenter Product Lifecycle Management solution.

This entire process is extremely labor intensive, unproductive and time consuming. The engineers were also required to go to a central location where plots were generated, to place their signatures and professional seals on the final design.

The ECO (Engineering Change Order) approval process was also based on manual routing of documents among several engineers. These documents, often generated in Microsoft Word or Excel, were manually moved from tray to tray, waiting for review – wasting both time and paper, and affecting the engineers' productivity.

New Flyer's management was looking for a way to streamline their processes and cut costs. They saw the potential value of implementing an end-to-end electronic sign-off process.

The Solution: Secure Electronic Engineering Seals with Graphical Signature Support

New Flyer needed a solution that would eliminate the manual process of printing, signing and re-scanning the thousands of pages of documents generated by the design to production process. They

also needed a solution that was flexible enough to allow multiple signatures on documents of multiple formats in order to bring their entire ECO approval process online.

The electronic signature solution had to address security concerns, industry regulations, and New Flyer's specific business processes. CoSign electronic signatures offered a total solution, providing:

- **Signer authenticity** and **data integrity** – guaranteeing version control, record management, and protection against forgery/unauthorized changes;
- A **graphical signature** that includes the engineers' **professional seal** and personal signature, enabling New Flyer to comply with industry regulations;
- **Multiple application support**, consistent with New Flyer's document types (Microsoft Word and Excel, Adobe PDF, UGS' NX CAD); and
- **Multiple signature support**, following the existing business logic and engineering approval processes within the organization.

Today, over 100 engineers are using CoSign to digitally sign, date and seal approximately 300-400 engineering drawings and 250-300 ECOs per week. "Choosing CoSign's electronic signature solution allowed us to shift our energy from manual processes to increasing our efficiency and productivity," said Mark Oleski, Director of Engineering at New Flyer. "We are now poised to face our main challenge of high throughput build-to-order design and manufacturing." The company has streamlined its labor and paper-intensive process into an immediate, collaborative, fully electronic process.

The Value: Faster Time to Market and Reduced Costs

Initially, New Flyer calculated the ROI for electronic seals on hard costs only (i.e. paper, toner, scanner maintenance savings). The actual ROI was much shorter than anticipated when factoring the increased productivity and faster design-to-build approval process. The faster time-to-market and reduced costs gave New Flyer the freedom to concentrate on their core business and increase their competitive advantage.

Finally, by choosing CoSign's standards based electronic signature solution based on Public Key techology (PKI), New Flyer created an opportunity for secure online file exchange between themselves and their business partners and customers. Using standards-based electronic signatures allows any user to validate the signatures within applications such as Microsoft Word and Adobe Acrobat without installing any proprietary software.

Conclusion

New Flyer's commitment to innovation has made them a leader in the heavy-duty bus market in North America. Implementing digital engineer stamps and electronic engineer seals was a significant step in New Flyer's continuous drive to improve their internal processes, delivery time and customer satisfaction.

About New Flyer

New Flyer is a leading manufacturer within the heavy-duty transit market in Canada and the United States. New Flyer's offerings include drive systems powered by clean diesel, LNG, CNG and electric trolley, as well as energy-efficient gasoline-electric and diesel-electric hybrid vehicles. To read more, visit New Flyer website at http://www.newflyer.com/.

About CoSign Digital Signatures

ARX (Algorithmic Research) is a global provider of cost-efficient digital signature solutions for industries such as life sciences, healthcare, government, engineering, and energy. ARX's CoSign digital signature solution automates approvals affordably in a compliant manner, allowing organizations to go paperless, expedite business processes and save costs. CoSign is the only digital signature solution that is seamlessly integrated with Microsoft SharePoint and other popular DM/ECM solutions. CoSign signatures are globally accepted by external partners without the need for proprietary-validation software. CoSign is also centrally managed through the organization's user directory for reliable control of signature privileges, and ease of use and administration. Learn more about the CoSign digital signature solution.