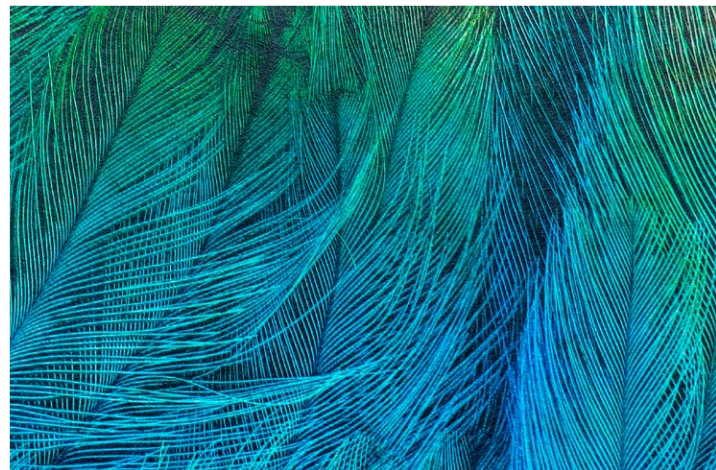
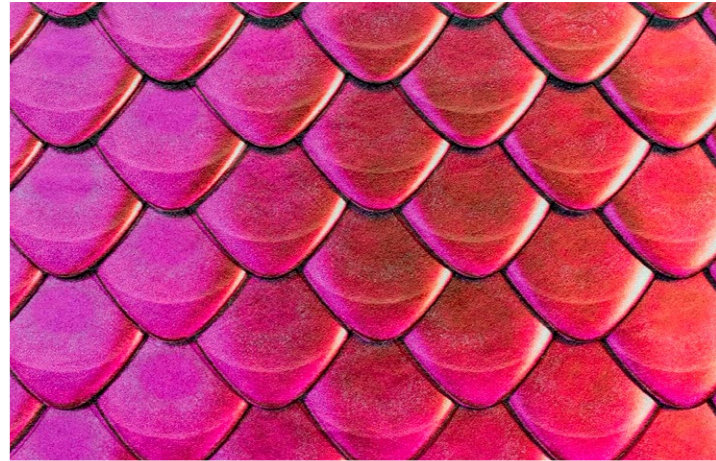


Canon



ELEVATED PRINTING

A Guide to Next-Level Printing Techniques





INTRODUCTION

Canon's PRISMAelevate XL and PRISMAguide XL software platforms enable compatible Arizona and Colorado printers to create elevated prints with texture, dimensionality, depth, and brilliance. Elevated printing is essential for creating functional and interactive applications such as ADA Braille and tactile signage. Moreover, it transforms 2D images into 3D for eye-catching and immersive experiences.

In this guide, you will discover the differences between these platforms, types of elevated print, key characteristics, and when to use each platform to realize your print objectives.

SOFTWARE THAT EMPOWERS

PRISMAelevate XL and PRISMAguide XL implement elevated printing by layering ink using varying techniques. The type of media and desired application will determine which program and printer are most suitable for your project.

PRISMAguide XL is compatible with select Colorado and Arizona printers. On Colorado series printers, up to five layers of ink produce stunning micro textures that transform 2D images and graphics into visually rich applications—such as wallpaper and wood grain finishes that look like real wood. Select Arizona printers use PRISMAguide XL for tactile applications like Braille, diagrams, and touch-friendly wayfinding graphics that generally require more rigid substrates.

PRISMAelevate XL supports select Arizona printers only. It enables textured printing of up to 4 mm in height, or 100 layers (depending on the print workflow and technique(s) utilized). PRISMAelevate XL is an excellent option for art reproduction, high-end design packaging, and prototyping.

Each platform includes production and workflow tools that support efficiencies such as accurate 3D Previews, defined elevated workflows, Smart Sampling for time and media savings, and Recipes and Hot Folders for automating consistent and repeatable results of frequent elevated print jobs.

ELEVATED PRINTING

Elevated Printing is a category of advanced printing techniques that introduce dimensionality, depth, and layered complexity to printed materials. Types of elevated print include Tactile, Textured, and Micro-Textured printing.

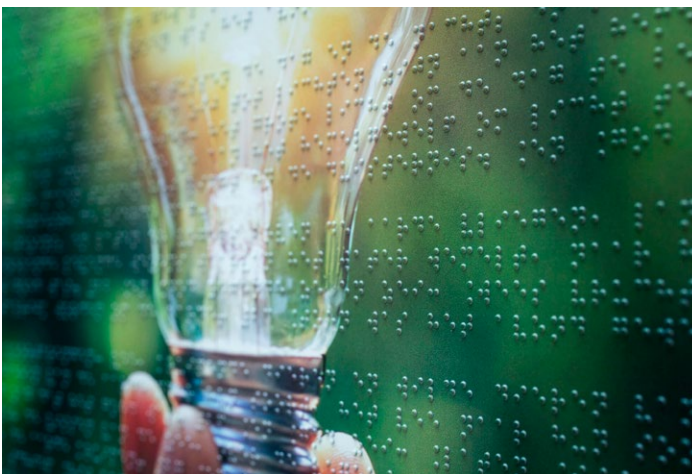
Elevated Printing should not be confused with layered printing—an industry standard for achieving double-sided printing, day-night backlits, traditional backlits, and block-out print applications. Layered printing can be implemented with PRISMAguide XL on both the Colorado and Arizona series printer.

TACTILE PRINTING

Tactile printing creates raised, touchable surfaces designed for functional interaction, such as reading by touch. These prints are often used for accessibility, especially for individuals with visual impairments. PRISMAguide XL is an ideal choice for tactile printing on select Arizona series printers.

| Key Characteristics | Example Applications on the Arizona printer series |
|---|--|
| <ul style="list-style-type: none">• Produces elevated elements with precise height and shape• Prioritizes legibility, ink hardness, and consistency for touch• Often used with Braille or tactile symbols | <ul style="list-style-type: none">• Braille signage—raised dots that form Braille characters• Tactile maps or diagrams—raised lines and textures representing spatial layouts• Wayfinding graphics—touch-friendly directional signs in public spaces |

Requirements for ADA Braille tactile signage rest solely with the producer and print service provider. To meet ADA Braille compliance, the PSP must validate the correct media to ensure application longevity, and proper ink adhesion to build solid and even layers. Canon does not provide formal compliance certification for ADA Braille; however PRISMAguide XL's production and workflow tools—such as Smart Sampling, Recipes, and Hot Folders—can help you achieve ADA Braille compliance.



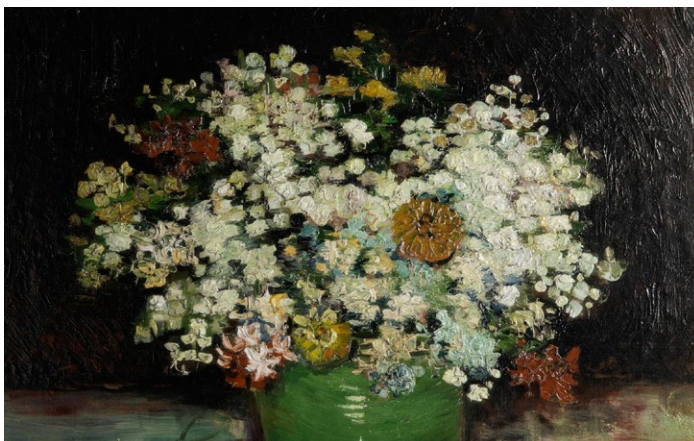
Braille and wayfinding graphics achieved with PRISMAguide XL on the Arizona series printer.

TEXTURED PRINTING

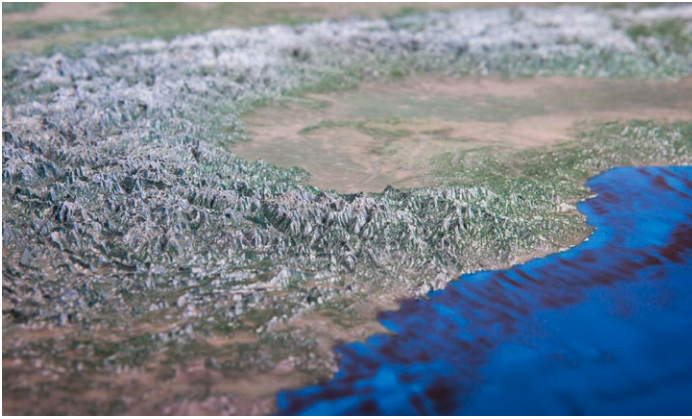
Textured printing is a decorative printing technique that adds artistic elevation or surface texture to mimic the look and feel of traditional materials or artistic media. Unlike tactile prints, textured prints are primarily visual and aesthetic rather than functional. For example, fine art reproductions can be created using textured printing that imitates the height and thickness of brushstrokes, capturing the organic essence of painted surfaces using Canon's proprietary UVgel ink.

PRISMAelevate XL produces up to 4 mm height of ink making it a strong choice for fine art, interior and exterior décor, luxury packaging applications, and more.

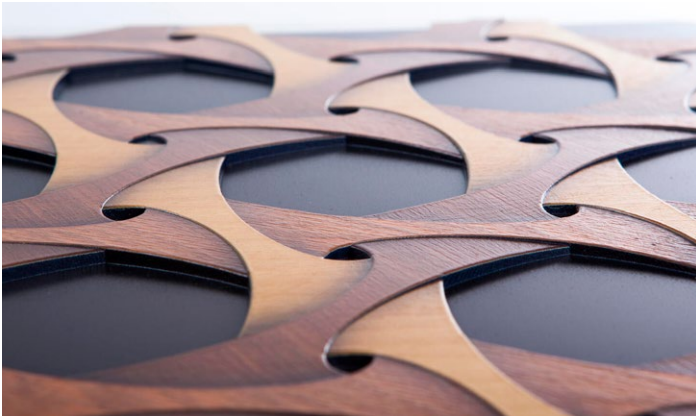
| Key Characteristics | Example applications on the Arizona printers |
|---|--|
| <ul style="list-style-type: none">• Mimics natural textures or artistic brushwork• Adds depth and realism to flat prints• Often used in fine art, décor, and luxury packaging | <ul style="list-style-type: none">• Canvas art reproductions simulated brushstrokes to replicate oil paintings• Wood grain panels—printed textures resembling real wood• Luxury packaging—embossed or textured finishes for premium branding• Packaging prototyping• Semi-permanent point-of-purchase displays |



Textured printing with paint brush stroke appearance achieved with PRISMAelevate XL on the Arizona printer series.



A textured topographical map achieved with PRISMAelevate XL on the Arizona printer series.



Textured wood panel tile achieved with PRISMAelevate XL on the Arizona printer series.

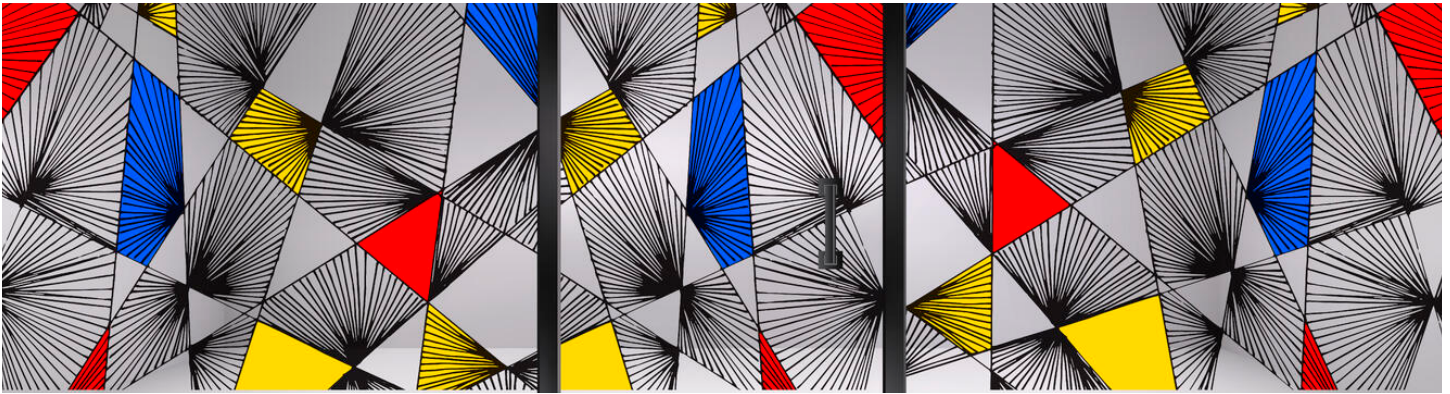
MICRO-TEXTURED PRINTING

Micro-textured printing is similar to textured printing in that its primary purpose is visual and aesthetic enhancement rather than functional. This elevated printing technique is accomplished with PRISMAguide XL on the Colorado printer series, where applications such as wallpapers and micro-textured labels have minimal tactile feel but are visually enhanced with up to five layers of ink for a subtle, textured effect.

| Key Characteristics | Example Applications on the Colorado printer series |
|---|--|
| <ul style="list-style-type: none"> • Adds an embossed look and depth to applications • Often used in interior décor for wallcoverings • Often applied to decals to provide depth and realism | <ul style="list-style-type: none"> • Micro-textured wallpapers • Interior and exterior décor with wood-like textures • Micro-textured labels • Luxury packaging featuring embossed or textured finishes for premium branding |



Micro textured wall applications produced with PRISMAguide XL on the Colorado series printers



Textured printing with paint brush stroke appearance achieved with PRISMAelevate XL on the Arizona printer series.



Stunning wallpaper graphics achieved with PRISMAguide XL on the Colorado printer series.



Embossed decal application achieved with PRISMAguideXL on the Colorado printer.

SMART TOOLS FOR ELEVATED PRINT

PRISMAelevate XL and PRISMAguide XL's smart tools not only enable elevated printing techniques but also streamline production with workflows designed to optimize your business operations. Tools such as 3D Previews, defined elevated workflows, Smart Sampling, Recipes, and Hot Folders can automate and simplify advanced print job preparation.

Onscreen 3D Previews allow the operator to accurately visualize how an application will appear before committing the print to media. This feature helps save time, media, and ink by providing an efficient way to proof your print application.

Defined Elevated Workflows included in both platforms help accelerate production with automated layering functions like Brila, Alto, and Alto Plus. Operators simply select the appropriate workflow to achieve a successful elevated application.

Smart Sampling tests multiple samples in a single batch, helping to avoid costly media and ink waste. It optimizes print quality by selecting the best print mode for each ink layer, eliminating much of the guesswork and time spent on traditional one-off proofs.

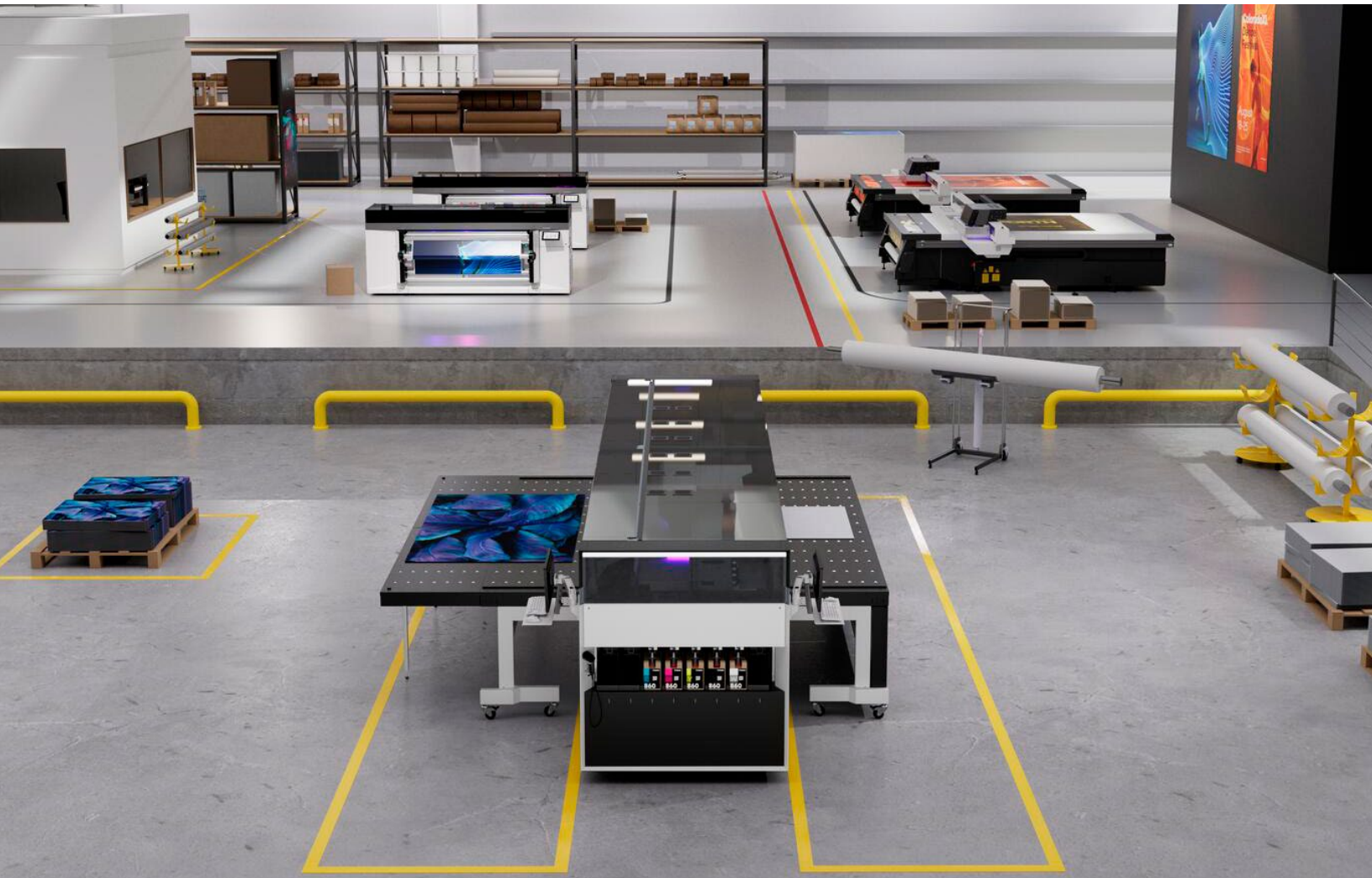
Recipes are preformatted print settings that can be customized to help reduce time, media, and ink waste. Complex and frequently used Recipes can be saved in Hot Folders, automating repeat workflows.

PRISMAelevate XL is enhanced by **HeightIQ**—an AI-based tool that generates height maps for elevated printing. HeightIQ intelligently analyzes light, contrast, and shape to transform 2D images from flat to elevated 3D imagery. This tool helps to significantly reduce height map creation time from 10 hours to approximately one hour on average.

CONCLUSION

Today's print service providers are constantly looking for new ways to impress and attract new clients. PRISMAelevate XL and PRISMAguide XL are powerful software solutions that enable advanced elevated printing techniques, creating new avenues for business growth. At Canon, we design products with remarkable features and industry-leading machine performance. Our premier software platforms for advanced elevated printing are helping to revolutionize the way we bring ideas to life.

| PRISMAguide XL Compatible Printers | PRISMAelevate XL Compatible printers |
|---|--|
| <ul style="list-style-type: none">• Arizona 135 GT• Arizona 1200 series• Arizona 1300 series• Arizona 2200 series• Arizona 2300 series with FLXflow• Arizona 6100 series• Arizona 6100 Mark II series• Colorado 1630• Colorado 1650• Colorado M-series• Colorado XL | <ul style="list-style-type: none">• Arizona 1300 series (IJC357 & IJC358 ink sets only)• Arizona 1300 FLOW series (IJC357 & IJC358 ink sets only)• Arizona 2300 FLXflow series (IJC357 & IJC358 ink sets only)• Arizona 1200 series (IJC257 ink set, only supports Brila and Alto functionality)• Arizona 2200 series (IJC257 ink set, only supports Brila and Alto functionality) |





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