

PACKAGING:



PRINT



WRAP



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PACK



In collaboration with



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THE PACKAGING MARKET OPPORTUNITY

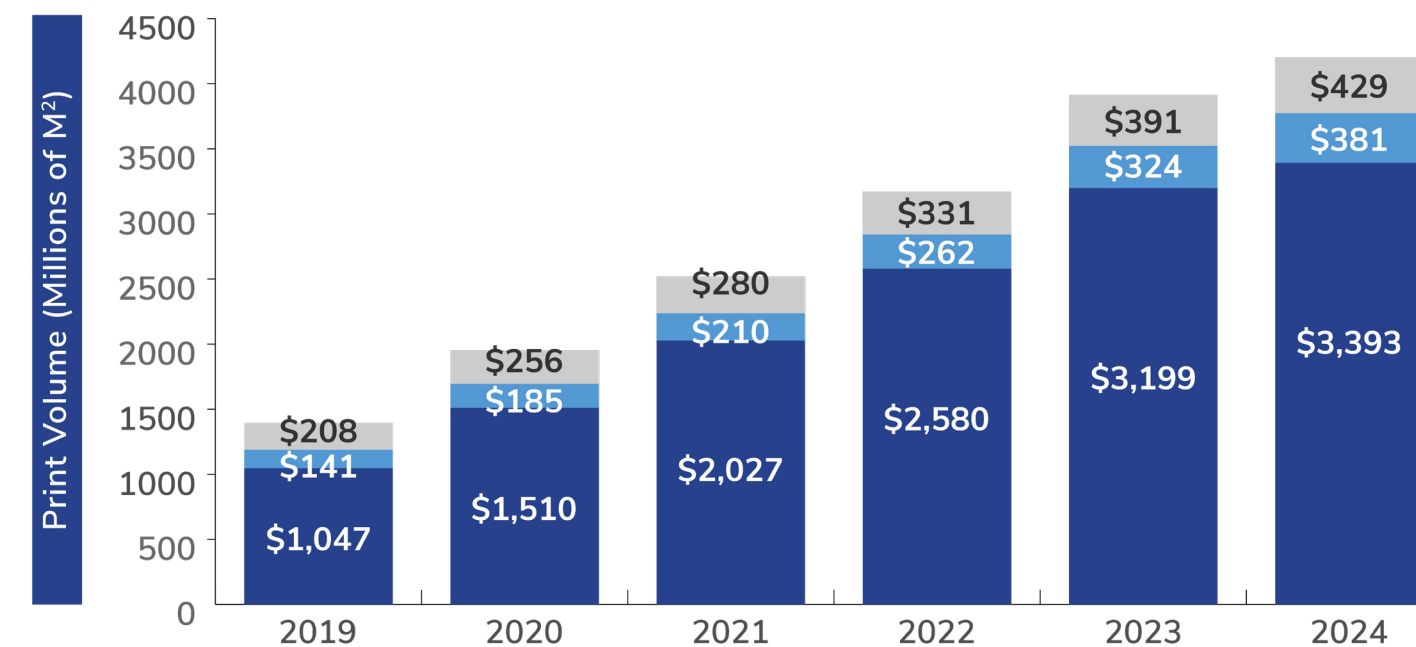
Many industries have taken a hit due to the ongoing effects of COVID-19, but the packaging market is an exception to this rule. Keypoint Intelligence recently published its annual forecast numbers for color digital packaging printers. Packaging print volumes for color digital corrugated, flexible packaging, and folding carton printers are expected to experience healthy growth across the forecast period. Print volumes for corrugated printers will demonstrate particularly strong growth.

This growth can be partially attributed to ongoing demand for packaging materials—during the pandemic, consumers and businesses have increased their online purchasing practices. Some consumers continue to stockpile certain essential items due to ongoing uncertainty about the future. All of these items must be packaged and shipped, so the packaging market is not as affected by the downturn that is plaguing many other industries. The result is healthy growth in print volumes across the forecast period.



THE PACKAGING MARKET OPPORTUNITY

PACKAGING PRINT VOLUME FORECAST



Source: Color Digital Corrugated, Flexible Packaging, and Folding Carton Market Forecasts, Keypoint Intelligence 2020

Color Digital Corrugated Printers

CAGR=

26.5%

Color Digital Flexible Packaging Printers

CAGR=

22.0%

Color Digital Folding Carton Printers

CAGR=

15.5%

PACKAGING PRINTING INVOLVES MUCH MORE THAN JUST BOXES!

When most people think about packaging, primary packaging and shipping boxes that are used for home and business delivery are what come to mind. Although shipping boxes represent a huge portion of the packaging market in terms of volume, there are also opportunities for small batch and mid-volume runs within this industry.

These small batch and mid-volume runs might include new products, promotional items, regional/seasonal packaging, prototypes, and personalized offerings. Of course, startup costs would be prohibitively expensive for offset/flexographic applications with plate production and other preparations, so digital technology is key for shorter runs and customization/personalization.

Although offset technology may be the best choice for print runs in the tens of thousands, digital technology can help in a big way with smaller quantities.



PACKAGING PRINTING INVOLVES MUCH MORE THAN JUST BOXES!



CREATING UNIQUE, EYE-CATCHING PACKAGING APPLICATIONS WITH EFI DIGITAL INKJET TECHNOLOGY

EFI™ wide- and superwide-format LED inkjet devices can be used for shorter runs of corrugated, packaging and merchandise display applications and prototyping. With the ability to print on flexible and rigid media, including thinner and heat-sensitive specialty materials, and using EFI's unique printing capabilities, such as multi-layer, white and clear ink, the packaging application possibilities are almost endless.

EFI H1625-SD



EFI VUTEk 32h



EFI VUTEk h5

Did you know?

EFI's powerful LED UV inkjet printing technology offers many benefits that add value to the production of packaging applications:

- An extended range of supported substrates, including lower cost and added-value specialty media
- Increased uptime and productivity with instant on/off and less maintenance
- Lower operating costs and fewer consumable parts
- Reduced waste with consistent color output and simple operation
- A way to satisfy customer requests for a greener print solution with low VOCs, lower power consumption, and less waste and consumables

PACKAGING APPLICATIONS



PACKAGE PROTOTYPES AND THERMOFORMING

With the help of design software and inkjet printing technology, it is now easier than ever to design and create prototype packaging for your customers. And because it's printed digitally, there's no expensive set up costs to print just one or a few or to add personalization to the design.

With direct-to-substrate thermoforming printing, it's possible to create 3D custom packaging. Using an EFI VUTEk® GSx series printer and GS-TF series ink, you can print direct to a wide range of thermoformable plastics, such as PETG. The printed substrate is then transferred to a thermoformer where the material can be heated to make it completely flexible. It is then vacuum-formed around a mold. Although the focus here is on packaging, this technique can also be used with all types of signage, promotional products, beverage lights, vending and gaming panels, and much more.

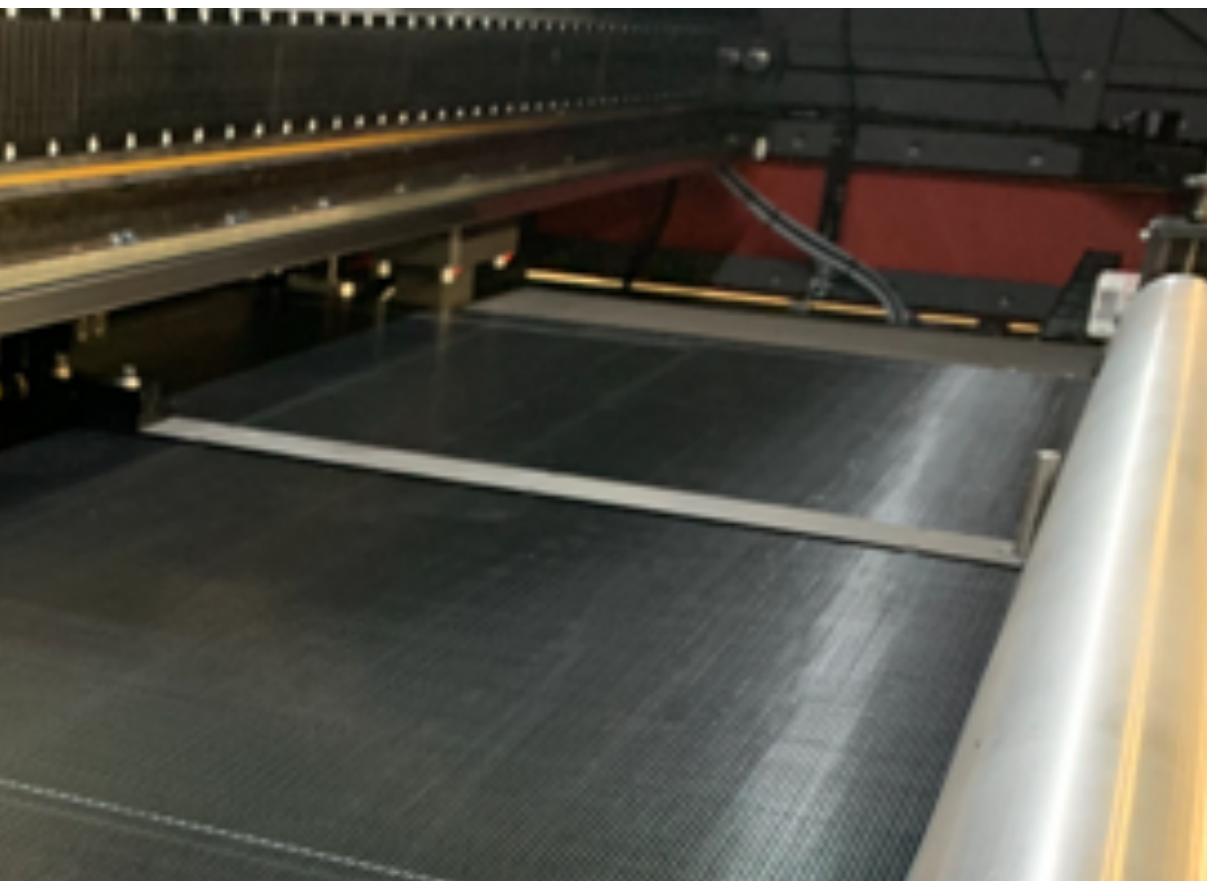
PACKAGING APPLICATIONS



A prototype thermoformed cocktail shaker package was printed on a VUTEk GSx hybrid printer using special, high-elongation inks develop specifically for thermoformed applications. Watch the video to see how the direct printed substrate is heated and vacuum formed to create the packaging insert.

Did you know?

EFI's thermoforming ink offers superior elongation characteristics for deep-draw thermoforming while maintaining opacity on various plastics and withstands heat forming and cutting without cracking, chipping or loss of adhesion



Did you know?

EFI's multi-layer printing technology allows you to print CMYK and white or clear in a single pass. EFI's VUTEK h3/h5 series printers can also print up to nine layers for realistic textures, like leather or wood grain.

CORRUGATED PACKAGING

EFI's LED UV inks provide good ink adhesion to corrugated and are flexible enough so they do not crack or chip during cutting or folding. EFI's opaque white ink is perfect for printing text and white images on kraft corrugated. Use white as a flood or spot under images to make colors pop. You can also use clear ink to create spot gloss and other special effects on corrugated packaging.

Although the vacuum table on EFI's hybrid printers successfully holds down most media, corrugated does pose some challenges. Corrugated cardboard is never completely flat because of its composition and sensitivity to storage and handling. To avoid waste and possible printhead damage, EFI offers Material Edge Guides (MEG) shown in the photo to the left, a set of metal skis for printing that easily mount to a rear MEG rail and ride on top of the table belt, to make it much easier to print on corrugated.

SPECIALTY ITEMS AND PACKING MATERIALS

Add branding to prefabricated or specialty boxes and containers. VUTEk hybrid printers can print on almost anything you can imagine up to two inches (5.08 cm) thick. Print one-offs or build a jig to print on multiple items at once. Carriage height is automatically adjusted, so the material thickness can vary from one job to the next.

You can also print direct to packing foam that is used during the shipping process. Although this media is flexible and compressible, ink adhesion is still very good. Thanks to EFI's cool cure LED technology, you can even brand and customize bubble wrap. Because the lamp temperature is low, even very thin and heat-sensitive media can be printed without deforming or melting.

Did you know?

VUTEk hybrid printers can print on anything that its vacuum table can hold, including everything from wood to very thin, transparent plastic foil.



WHY EFI?

Brand recognition within the packaging world has always relied on exceptional print quality, eye-catching color fidelity, and precise imaging. Today's digital transformation has impacted consumers' preferences, purchasing decisions, and loyalty. Consumers associate a positive product experience with personalized and relevant product branding that is attuned to their purchasing decisions. EFI's long heritage of digital printing excellence can uniquely position your print production with best-of-breed imaging technology that is specifically designed to address the rapid shift from analog to digital packaging. EFI's products help drive profit from short-run packaging applications, providing the high-impact experience that consumers have come to expect. Whether it's adding texture and dimension to flat pack and corrugated sheets, printing direct to corrugated, or even producing personalized/branded bubble wrap, EFI's extensive line of wide- and superwide-format inkjet printing technologies will drive profitability for you and your customers!

Visit our Applications that WOW! resources page for suggestions on new and creative ways to use digital print so you can break through the ordinary and stand out in a big way.



SCAN ME

MARKET INSIGHT FROM KEYPOINT INTELLIGENCE

EFI is well-positioned to service clients with a wide range of digital packaging needs because it offers all of the technologies and know-how to support these applications, including production-level flatbed, roll-to-roll and hybrid printing platforms, digital front ends, inks and coatings, and integrated workflows.

As the world continues to embrace printing at the speed of NOW, EFI's digital expertise delivers products and solutions that are uniquely positioned to address this challenge today and in the future.





We develop breakthrough technologies for the manufacturing of signage, packaging, textiles, building materials, and personalized documents, with a wide range of printers, inks, digital front ends, and a comprehensive business and production workflow suite that transforms and streamlines the entire production process, increasing your competitiveness and boosting productivity.

Visit www.efi.com or call 650-357-3500 for more information.

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