

Thinking Outside of the Cereal Box: An Innovative Solution for Package Resealability

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From Olympic champions to kid-friendly characters, countless cultural icons have graced American breakfast tables on cereal boxes for decades. The dominant packaging format—bag-in-box—has served its purpose for just as long. It's easy to stack in a cabinet or stash in a desk drawer, but it does have pitfalls. As consumers increasingly hunt and criticize any seemingly excess packaging, the cereal box seems like obvious prey. And as the trend toward keeping products fresher longer to reduce food waste continues to take hold, trying unsuccessfully to tuck away the plastic bag inside a cereal box could become a distant memory.

Certainly, a handful of consumer product goods (CPGs) companies have taken measures to reduce the packaging material used for their breakfast products or even introduce completely new formats; yet, walk down the cereal aisle at any local grocery store and bag-in-box remains the norm. According to a 2009 report from Hoover's Inc., the U.S. cereal industry boasts annual revenue of more than \$9 billion, but it remains highly concentrated with 80% generated by only four major manufacturers (2). Despite this industry dominance, it seems that smaller specialty brands and retailers are leading the way in innovative alternatives to the bag-in-box.

The question constantly arises as to why resealable closures have not been implemented on numerous products, and cereal remains the most bewildering for packaging professionals and consumers alike. With new technologies and packaging solutions, however, the cereal aisle is long overdue for a material makeover.

- New packaging solutions for the cereal market can help provide added consumer convenience and reduce the environmental impact compared to traditional bag-in-box formats.
- Resealable flexible pouches have lower energy consumption, greenhouse gas emissions, and solid waste generation than bag-in-box cereal packaging.
- Ideal for dry goods, snacks, and bread products, the reach of resealable flexible packaging extends far beyond the cereal aisle.

Resealable Pouches: The Breakfast of Sustainability Champions

Reducing the amount of materials used in the manufacture of product packaging and minimizing the product-to-package ratio are among the most efficient ways to enhance the sustainability of a package. It seems counterintuitive, then, that bag-in-box cereal packaging has withstood the industry shift toward environmental friendliness. This is especially perplexing when considering that flexible pouches offer all of these sustainability benefits, while simultaneously providing the option for a convenient resealable closure.

To bolster these sustainability claims, Zip-Pak, a global leader for resealable packaging solutions, based in Glenview, IL, U.S.A., recently commissioned an independent life cycle inventory to quantify the benefits of resealable flexible packaging compared to rigid alternatives. The study, conducted by Franklin Associates, Inc., confirmed that resealable flexible pouches had lower energy consumption, greenhouse gas emissions, and solid waste generation than bag-in-box cereal packaging (1). Specifically, the research found that a 20-ounce bag-in-box cereal package consumed 85% more energy, generated 3.5 times more waste, and 2 times more greenhouse gas than the 21-ounce flexible pouch

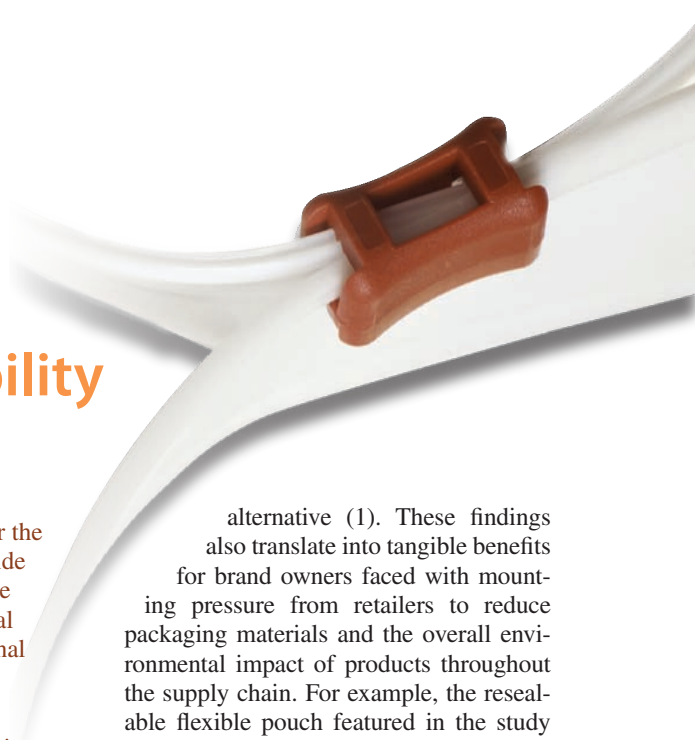
alternative (1). These findings also translate into tangible benefits for brand owners faced with mounting pressure from retailers to reduce packaging materials and the overall environmental impact of products throughout the supply chain. For example, the resealable flexible pouch featured in the study scored 47% higher on Wal-Mart's sustainability scorecard compared to the standard bag-in-box package. As the retailer moves closer to full implementation of the scorecard, cereal manufacturers must work closely with their suppliers to ensure their products meet sustainability standards.

The Newest Tricks of the Trade

Wal-Mart's packaging standards have certainly proved challenging for many CPGs, but consumers are demonstrating their increasing packaging prowess as well, especially when it comes to the staples of the breakfast table. Last year, a simple redesign of Tropicana orange juice cartons resulted in consumer resistance, prompting the brand to abandon its new sleek look for the consumer-preferred traditional package. With that in mind, it is to be expected that changing a package as iconic as the cereal box could result in a similar uproar.

Fortunately, for both cereal manufacturers and consumers, new packaging technologies are on the horizon that could meet the demand for both a box and a pouch. Semiflexible containers, for instance, provide consumers with the ability to stack boxes in a cabinet while still offering the convenience of a resealable closure. Such innovative concepts also meet the need to keep products fresh throughout the last use, helping to reduce food waste, which can emit harmful carbon dioxide during decomposition in a landfill. In order to provide CPGs with resealable solutions that deliver consumer convenience and enhance brands, resealable packaging manufacturers continue to partner with packaging professionals throughout the supply chain to develop innovative technologies that will meet the evolving needs of both retailers and consumers.

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Slider Technology: A Packaging “Lucky Charm”

When it comes to solutions for cereal brands, environmentally friendly and sustainable slider closures could be a lucky charm. This technology consists of ergonomically designed slider clips, which can be easily applied to premade cereal pouches, creating a convenient, resealable package. From a consumer perspective, resealable packaging adds value to the purchase, indicating that the cereal will remain fresh and crisp, without the frustration of a bulging bag-in-box alternative. Slider clips allow for multiserve portions using the original package, thus eliminating the need for transferring cereal to a generic unbranded container. Cereal manufacturers will appreciate the lengthened exposure that their package-printed messaging receives, ultimately serving to strengthen brand recall. New slider technology uses less material, reducing manufacturing costs and making it an even more feasible solution for brand managers. Consumers will appreciate that the visibly smaller slider clip further reduces the environmental footprint of their packaging.

Real Results of Going Resealable

Malt-O-Meal, the largest producer of bagged cereals in the United States, is no stranger to the tangible benefits of resealable packaging. In 1997, the company first introduced recloseability with peelable pressure-sensitive labels to its packaging.

Continuing on its path of innovation, three years later, Malt-O-Meal consulted with Zip-Pak to implement a packaging solution that would influence consumers at the point of purchase by communicating added convenience. A pour-spout zipper was then implemented to provide reliable product protection, allowing the customer to neatly dispense cereal directly from the bag.

Implementing the Pour-Spout

To incorporate the benefits of a zipper in a pour-spout design, Malt-O-Meal implemented the resealable zipper to ensure freshness. The package, which also incorporates a freshness barrier—an additional seal located below the zipper—adds freshness protection and tamper evidence. These solutions function together to offer barriers against air, moisture, dust, and insects, protecting product integrity and extending freshness.

Benefits of the Unique Design

An important aspect of the design is that the zipper stretches across only two-thirds

of the top of the bag. When the bag is unzipped, or “opened,” the zipper acts as a built-in pour-spout. The shorter zipper length means that less zipper material is required. With one-third less material needed for each package, supplier costs and warehouse inventory are reduced.

According to Mick Kaschmitter, packaging technology manager for Malt-O-Meal, “Not only did the new design reestablish us as an innovator within the industry, it saves us money, too!”

In testing, consumers opened, poured, and closed the bags many times, and the zipper functioned at superior levels throughout the life of the product. Even upon repeated use, the zipper profiles did not clog. The pour-spout solution was easy to incorporate into the finished pouches, enabling a maximization of the technology already in place and an elimination of potential overhead.

“We were able to use Zip-Pak’s innovative technology and redesign our package to provide a greater level of convenience without costly implementation,” Kaschmitter said. “At the same time, our costs are down and the sales of our bagged cereals have increased over 25%. The new package design has definitely been a worthwhile investment.”

Good for All Grains

The reach of resealable flexible packaging extends far beyond the cereal aisle. Ideal for dry goods, snacks, and bread products, resealable closures enhance consumer convenience and help keep products fresh throughout the last use. For example, Honeytop Specialty Foods, a market leader in the supply of ethnic breads, tortillas, and pancakes throughout the United Kingdom and Europe, has introduced convenient new resealable packaging for its range of tortilla wraps, sold under the brand of a leading U.K. retailer. Honeytop

implemented a flow wrapper featuring a resealable closure applicator unit and is the first to adopt the new technology, allowing the company to maintain product freshness and help consumers reduce food waste. The technology allows a product to be opened and reclosed at the consumer’s convenience, maintaining quality until the entire contents are consumed. In addition, the new resealable package allows brand owners to keep valuable marketing messages in front of the consumer up to the last use of the pack.

“Private label brands in the U.K. retail for up to 50 percent less on average than their brand name counterparts,” says Lloyd Dicks, area sales manager at Zip-Pak. “The state of the global economy gives food retailers an opportunity to grow market share of their own product lines. Coupling the price difference with a resealable closure that offers convenience and reduces the risk of premature food spoilage can help private label brands compete on store shelves.”

Meeting Consumer Demand

Consumer demand for convenience and sustainability is undoubtedly increasing. Cereal brand managers have the opportunity to meet these increasing demands, while differentiating their products through resealable packaging. Our favorite cereal brands and their iconic characters will continue to grace breakfast tables, but when it comes to their packaging, brand owners and consumers are beginning to think outside the cereal box.

References

1. Franklin Associates, Ltd. LCI of flexible and rigid packaging used for deli meat and breakfast cereal. Prairie Village, KS, U.S.A., 2007. *Unpublished.*
2. Hoover’s Inc. Breakfast cereal manufacturing business reports. Published online at www.hoovers.com.



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