H.B. Fuller is a Global Market Leader in Adhesives

Global Reach. Local Expertise.

Key Facts

35 Countries
30 Technology Centers
71 Manufacturing Facilities
10,000 Adhesive Solutions

H.B. Fuller (NYSE: FUL) – Connecting What Matters™
Circular Economy Movement

- Ellen MacArthur Foundation
- Manufacturing thoughtfully to gain economic, social and environmental benefits
- Designing with waste-out approach
A Circular Economy

Only 9% of the economy is circular

2025 Global Market Size for Circular Products

$4.5 trillion potential

$405 billion - existing

United States Municipal Waste %

- 52% Landfilled
- 13% Recycled
- 25% Incinerated
- 10% Composted

United States generated 267.8 million tons of municipal solid waste (MSW) in 2017

Source: Future of eCommerce, EPA

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Manufacturer challenge

- Millennials and Gen Zs are becoming primary consumer buyers and they demand brands demonstrate eco-conscious behaviors
Millennial & Gen Z Consumer Packaging Attitudes

- 77% of Gen Z more likely to purchase Food/Beverage brands that have clear publicly stated sustainability goals.
- 75% of Millennials & Gen Z believe that brands should have to pay for product that ends up in landfill
- 30% of Millennials & Gen Z avoid Food/Beverage brands with excess packaging

### Desired Focus for Food/Beverage Brands

<table>
<thead>
<tr>
<th>USA Gen Z</th>
<th>USA Millennials</th>
<th>Canada Gen Z</th>
<th>Canada Millennials</th>
</tr>
</thead>
<tbody>
<tr>
<td>3. Eliminate Plastic Packaging</td>
<td>3. 100% Recyclable Packaging</td>
<td>3. 100% Recyclable Packaging</td>
<td>3. 100% Recyclable Packaging</td>
</tr>
</tbody>
</table>

Source: H.B. Fuller custom survey.
Waste-Out Packaging Design

Eliminated Hi-Cone plastic 6-pack rings
Waste-Out Packaging Design

Reduced secondary packaging by 35%
Implementation Examples
Replacing Plastic Rings with Corrugated Design: Key Parameters

Machine Environment
- Speed
- Compression
- Open Time

Adhesive Properties

Pack Characteristics

Target:
- Maximal pack security/stability
- Minimum adhesive transfer

Multipack Design

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Reduction in Corrugated: Implementation

- Establish baseline
  - What issues/concerns do you have with your current packaging?
    - Identify weak points in your boxes
    - Understand packaging requirements
- A/B Testing
  - Variables can include, control, various paper weights of corrugated/liners and reinforcement tapes
- Application
  - Reinforcement tape solutions can be applied at wet end, dry end of corrugator or offline
H.B. Fuller: Your Industry Partner

• Market knowledge
• Adhesives and reinforcement tapes fit-for-purpose
• Team dedicated to packaging design adhesive innovation
• On-demand technical support
• Equipment/corrugator collaboration
H.B. Fuller Packaging Adhesives & Tapes

- Fast setting to keep up with production demand
- Global supply chain network
- Help meet sustainability goals

<table>
<thead>
<tr>
<th>Product Name</th>
<th>Technology</th>
<th>Reduces Corrugated</th>
<th>Reduces Plastic</th>
<th>Equipment Investment needed</th>
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</thead>
<tbody>
<tr>
<td>Advantra®</td>
<td>Hot melt</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
</tr>
<tr>
<td>Sesame Tape®</td>
<td>NA</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
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</tbody>
</table>
Adhesive leader in multipack bundling

• Industry trusted Advantra® hot melts
• Separate out well during Old Corrugated Container Repulping process
• Non-fiber tearing / fiber tearing as desired
• Dries clear to preserve packaging aesthetics

We work with packaging makers and CPG brands collaboratively to reduce excess packaging
Sesame® Tape & Straub Design Company Equipment

**Wet End Application – Corrugator**
- Top of the board applications
- High strength hot melt technology
- Roll to roll splicing

**Dry End Application – Corrugator**
- Top of the board PSA application
- Manual to fully automated systems
- Auto compensating brake design

**In-Line Applications – Converting**
- Mounted on existing folder gluers
- 250 to 750 fpm
- Single head to multiple

**Stand Alone Applications – Converting**
- Auto feed table
- 250 to 750 fpm
- Single head to multiple with splicing capabilities

- Tech Service Support
- Operator Training
- Design Support
- Custom Mockups

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Are you ready to help CPG brands meet their sustainability goals?
Thank you!

Amber Fischer
Amber.fischer@hbfuller.com

Jackie Holden
Jackie.holden@hbfuller.com

www.hbfuller.com/sustainable-packaging