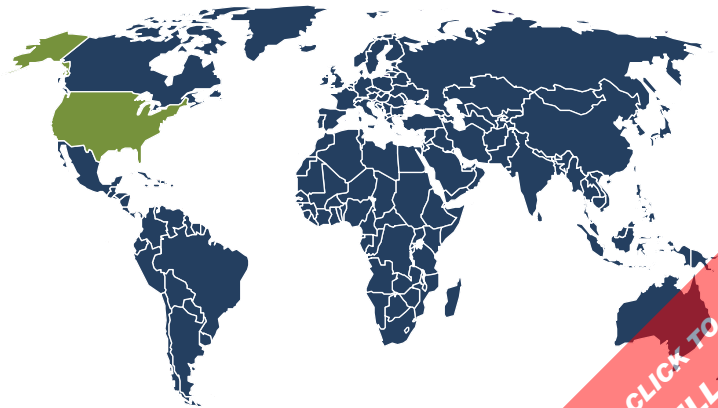**Freedonia Focus Reports**
US Collection

Intelligent Packaging:
United States

October 2015

Highlights

Market Environment
 Historical Trends | Key Economic Indicators | Environmental and Regulatory Factors
 Product Developments

Segmentation and Forecasts
 Products | Markets

Industry Structure
 Industry Composition and Characteristics | Additional Companies Cited

Resources

www.freedoniafocus.com

ABOUT THIS REPORT

Scope & Method

This report forecasts US intelligent packaging demand in US dollars at the manufacturers' level to 2019. Total demand is segmented by product in terms of:

- color indicating packaging
- smartphone-enabled interactive packaging
- time-temperature indicators (TTIs)
- other products such as pharmaceutical compliance monitoring and active reminder systems, produce ripeness-indicating labels, and beverage oxygen-sensitive dyes.

Excluded from the scope of this report are radio frequency identification (RFID) tags, data loggers, readers, software, and similar products serving security and supply chain tracking and monitoring functions. Also excluded are TTIs for nonpackaging uses, such as temperature testing labels for industrial equipment. However, RFID tags used for diagnostic or informational functions are included.

Total demand is also segmented by market as follows:

- beverages
- food
- pharmaceuticals
- other markets such as diagnostic kits and equipment, certain heat-sensitive cosmetics, and organs for transplants.

To illustrate historical trends, total demand is provided in an annual series from 2004 to 2014; the various segments are reported at five-year intervals for 2009 and 2014.

This report quantifies trends in various measures of growth. Growth (or decline) expressed as an average annual growth rate (AAGR) is the least squares growth rate, which takes into account all available datapoints over a period. Growth calculated as a compound annual growth rate (CAGR) employs, by definition, only the first and last datapoints over a period. The CAGR is used to describe forecast growth, defined as the expected trend beginning in the base year and ending in the forecast year. Readers are encouraged to consider historical volatility when assessing particular annual values along the forecast trend, including in the forecast year.

Key macroeconomic indicators are also provided at five-year intervals with CAGRs for the years corresponding to other reported figures. Other various topics, including profiles of pertinent leading suppliers, are covered in this report. A full outline of report items by page is available in the Table of Contents.

Sources

Intelligent Packaging: United States (FF30049) is based on *Active & Intelligent Packaging*, a comprehensive industry study published by The Freedonia Group in October 2015. Reported findings represent the synthesis and analysis of data from various primary, secondary, macroeconomic, and demographic sources including:

- firms participating in the industry, and their suppliers and customers
- government/public agencies
- national, regional, and international non-governmental organizations
- trade associations and their publications
- the business and trade press
- indicator forecasts by The Freedonia Group
- the findings of other industry studies by The Freedonia Group.

Specific sources and additional resources are listed in the Resources section of this publication for reference and to facilitate further research.

Industry Codes

The topic of this report is related to the following industry codes:

NAICS/SCIAN 2007 North American Industry Classification System		SIC Standard Industry Codes	
322221	Coated & Laminated Packaging Paper Mfg	2671	Packaging Paper & Plastics Film, Coated & Laminated
322222	Coated & Laminated Paper Mfg	2672	Coated & Laminated Paper, NEC
322223	Coated Paper Bag & Pouch Mfg	2673	Plastics, Foil, & Coated Paper Bags
323110	Commercial Lithographic Printing	2752	Commercial Printing, Lithographic
326112	Plastics Packaging Film & Sheet (including Laminated) Mfg		

Copyright & Licensing

The full report is protected by copyright laws of the United States of America and international treaties. The entire contents of the publication are copyrighted by The Freedonia Group, Inc.

Table of Contents

**To return here, click on any Freedonia logo or the Table of Contents link in report footers.
PDF bookmarks are also available for navigation.**

RESOURCES

The Freedonia Group, Inc   www.freedoniagroup.com

3338 Active & Intelligent Packaging, October 2015   see study contents
Related Industry Studies
  3323 World Packaging Machinery, September 2015   see study contents
  3319 Produce Packaging, August 2015   see study contents
  3308 Wine Packaging, August 2015   see study contents
  3283 World Cups & Lids, July 2015   see study contents
  3269 World Pharmaceutical Packaging, July 2015   see study contents
  3297 Beverage Containers, June 2015   see study contents
  3291 Labels, June 2015   see study contents
  3263 Meat, Poultry & Seafood Packaging, April 2015   see study contents
Related Focus Reports
  Beverage Containers: United States   see report contents
  Packaging: United States   see report contents
  Pharmaceutical Packaging: United States   see report contents
  Pouches: United States   see report contents
  Protective Packaging: United States   see report contents
Freedonia Custom Research, Inc   see capabilities

Trade Publications

Beverage World   www.beverageworld.com
BrandPackaging   www.brandpackaging.com
PackagePrinting   www.packageprinting.com
Packaging Digest   www.packagingdigest.com
Packaging Strategies   www.packagingstrategies.com
Packaging World   www.packworld.com
The Packer   www.thepacker.com
Pharmaceutical & Medical Packaging News   www.pmpnews.com
Plastics News   www.plasticsnews.com

Agencies & Associations

American Institute for Packaging and the Environment   www.ameripen.org
United States Census Bureau   www.census.gov
United States Food and Drug Administration   www.fda.gov
United States International Trade Commission   www.usitc.gov
World Health Organization   www.who.int

Environmental Impact. Please consider the environment before printing this report. Freedonia Focus Report collections feature environmentally friendly products distributed entirely via electronic channels.