Active & Intelligent Packaging

Marylene Lombardi - Global Head of Packaging Procurement- Senior Director Berlin – 9th PCIF -Oct 5th 2023







Marylene Lombardi Global Head of Packaging Procurement, Senior Director

Mary is currently Global Head of Packaging Procurement at Kraft Heinz.

Mary has held several leadership roles within Global Procurement team at GSK and Coca-Cola and has over 20 years of experience in different aspects of procurement and Supply Chain mainly within Packaging categories.

She is currently based in Amsterdam, Netherlands







One of the largest food and beverage companies in the world



in net sales (2022)

40+

countries with dedicated
Kraft Heinz employees (2022)







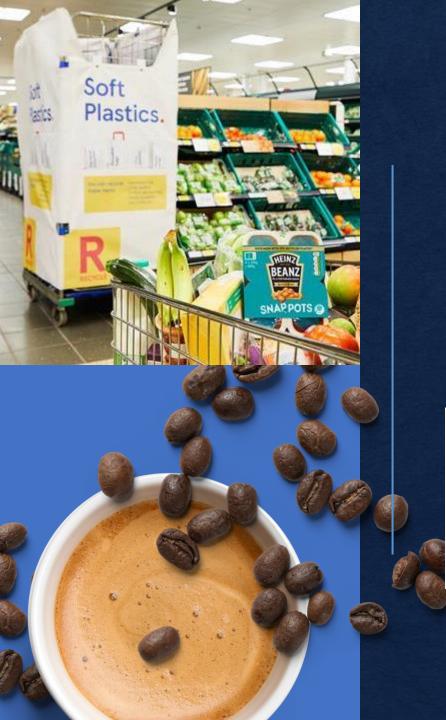


~440M

meals donated to combat food insecurity globally with partners (2021) ~37K

employees worldwide

Unparalleled portfolio of iconic & new brands in retail & foodservice channels









Sustainable Packaging

Packaging waste can have a significant detrimental impact on the environment and is an industrywide challenge that we must all do our part to address. That's why Kraft Heinz is committed to taking steps to reduce our operational packaging impacts, as well as to support the move toward a more circular economy









Smart Packaging bring value across value chain linking Physical & Digital Worlds driving value for Operations (traceability, label info), Customers (engagement, compliance, efficiency), Consumers (interaction, engagement) and ESG (recycling & sorting)



SMART PACKAGING: large category of packaging that leverages technology to provide functionality that goes beyond simply housing a product

Two main types: Intelligent Packaging and Active Packaging



Improved quality (incl freshness), compliance, authentication, traceability, extended shelf life, anti-counterfeiting, brand security, supply chain costs, waste reduction, increase profit, transparency, convenience ...



Cost, Technology availability, legal challenges, Consumer awareness

Some Definitions ...

INTELLIGENT PACKAGING*: monitor the condition of packaging or the environment surrounding the package", They have the ability to communicate the conditions of the packaged product but they do not interact with the product ...

Examples of Intelligent Solutions:

Sensors and Tags, NFC Technology in packaging, Printed Electronics, RFID Technology, Track, Trace and Control Systems, Telecommunications, IT solutions, software, Time- and temperature indicators, Hardware (logistical), Supply chain order,- controland information systems, Anti-theft devices, Tamper proofing and Anti Counterfeit Systems, Mobile Commerce, Transport & Logistics

ACTIVE PACKAGING*: maintain and even improve the properties and quality of the packaged product, thereby extending its shelf-life"*(eg: ethylene absorber in banana, meat oxygene barrier /Oxygen scavengers for food packaging applications, active barrier, control product still fresh, moisture ...) Several applications for fresh food like fruit, vegetables or cheese, meat... vs ambient food

Examples of Active Solutions

Bio-Chemical active films, Antimicrobial packaging; Oxygen, CO_2 , Gas-scavenging, Moisture controlled Packaging, Active labels, Nano-technology enabled packaging



Some datas ...















food in a minute

from Wattie's

















Kraft*Heinz*

Examples of KraftHeinz Smart Packaging in the market

"Enhance the consumer experience with Packaging"











JET-PUFFED: Glow in the dark marshmallow bag (US)



Jet-Puffed constellation was created which fans can discover via a custom AR filter, by scanning a QR code on back of the packaging or at smoregazing.com to encourage fans to get outside and #GoSmoregazing.

"JET-PUFFED knows that finding a bag of marshmallows outside under the dark night sky can sometimes be challenging. As we gear up for the first day of summer and prime marshmallow roasting season, we wanted to give fans a way to enjoy their smores no matter if it's day or night," ... "The new glow-in-the-dark packaging makes it easy to find your bag of marshmallows when the sun sets around the glowing campfire."

Jet-Puffed is encouraging all marshmallow lovers to #GoSmoregazing this summer – stargazing with a bag of smores - for a chance to win a free S'moregazing kit.

To enter consumers must post a picture of their S'moregazing experience at #GoSmoregazing #Sweepstakes on Instagram. The kit will include a telescope, glow-in-the-dark skewers, new Jet-Puffed Camp S'mores and s'mores ingredients, glow-in-the-dark stickers and more...



Heinz: Cold Ketchup in Canada





Cold Ketchup is exactly the same as Heinz's "regular" ketchup, except with a label that turns blue when it has been properly chilled

"Thinking about how to launch, we looked to the experts in advertising cold products – beer," says Jacqueline Chao, senior brand manager at Kraft Heinz.

The Cold Ketchup launch includes a QSR partnership with Wendy's – a key partner given its national presence – where it has in-store signage to remind diners that they now have the choice to dip their hot and crispy fries in Heinz Cold Ketchup or room temperature Heinz.

Bottles of Heinz Cold Ketchup can be found at specially marked display fridges at select grocery stores and on social media where Heinz will be giving away a limited number of special-edition glass bottles of Heinz Cold Ketchup with its **temperature-activated**, icy blue label.

To get a temperature check on the debate, Heinz recently conducted a survey and found nearly half of Canadians feel the only way to eat ketchup is cold; yet 1 in 5 argue it must be consumed at room temperature.



Kraft Singles Cheese Intelligent Program in US

C https://www.refrigeratedfrozenfood.com/articles/98280-kraft-heinz-launches-intelligent-packaging

Kraft Heinz launches intelligent packaging

By incorporating TAP technology, Kraft Heinz is able to provide true 1:1 consumer connection from store to home and receive key CRM insights on their customers.



TPG Rewards, Aventura, Fla., launched what is said to be the largest on-pack intelligent packaging program for Kraft Heinz leveraging TPG's "Intelligent Packaging Platform" to create a one-of-a-kind innovative solution at Walmart nationwide.

A tamper-evident NFC tags is used to engineer intelligent IRC (Instantly Redeemable Coupon) label and using it as part of a promotional campaign creating more meaningful connections with Kraft Heinz customers, inside the store before the customers purchase, and after the purchase when the product was opened at home.

In this particular program, a savings offer including recipe content is disseminated right in-store on participating Kraft Cheese packages.

Instead of asking shoppers to use their smartphones to scan a QR code printed on packaging, Kraft lets them hold their mobile devices near a product to activate a mobile page that collects information such as email, state of residence and date of birth to enter the contest

By incorporating TAP technology, Kraft Heinz is able to provide true 1:1 consumer connection from store to home and receive key CRM insights on their customers.

Kraft Heinz and Walmart Use NFC to Tap the Full Potential of IRC Labels - YouTube

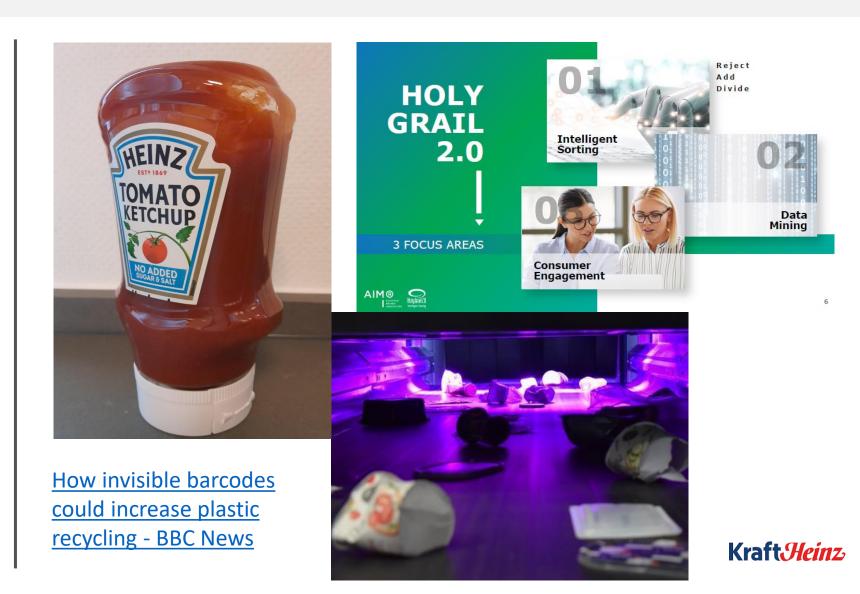
Kraft Heinz Intelligent Packaging Promotion - YouTube

Kraft Heinz "Find the KRAFT Golden Single" Demo Experience - YouTube

KraftHeinz part of Holygrail 2.0

Holygrail 2.0 project is the project managed by a consortium of FMCG companies to help the sorting of packaging in order to improve the recycling rate. This is done via Digital watermarks that can be printed on the packaging and can be detected at the sorting centers.







Thank you! Discussion & questions

Smart Packaging - Video

Food Packaging - Active Packaging - YouTube

Food Packaging - Freshness Indicator with Color Changing Smart Labels - YouTube

