



Sustainability In The Last Mile: A 2021 Snapshot

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FORRESTER OPPORTUNITY SNAPSHOT: A CUSTOM STUDY COMMISSIONED BY BRINGG | JUNE 2021

Retailers Are Highly Concerned About Sustainability But Lack Control

In the last decade, climate change has been front and center in international treaties and government mandates. The retail industry is the most vulnerable to sustainability regulations due to its high carbon emissions in the last mile of delivery.¹ As retailers transition to a lower-carbon economy, they face increased operational risk — but they also have the opportunity to tap into a value-based consumer market where consumers are increasingly conscious of the environmental implications of their purchases.²

Briggs commissioned Forrester Consulting to explore sustainability and carbon emissions in the last mile, along with how retailers and direct-to-consumer brands track, measure, calculate, and communicate on their emissions.

Key Findings



Without industry standards in place, retailers lack consistency and rely on external support to track, calculate, communicate, and report on carbon emissions for the last mile.



Retailers struggle to entice customers to choose greener options and ensure the accuracy and visibility of carbon emission data.



Retailers are investing in technology and green fleets to reduce carbon emissions in the last mile, therefore improving their sustainability efforts.

A Lack Of Industry Standards Causes Inconsistent Sustainability Metrics

Retailers use a variety of methods to track and measure emissions in the last mile, but there is no consistency across metrics.

Transportation metrics. Up to 52% of respondents said their firms plan to implement or expand monitoring of transportation metrics. These metrics include fuel consumption, vehicle fill rate, distance per delivery, and carbon emissions per route.

Distribution metrics. Fifty-two percent reported their firms plan to implement or expand the use of distribution-focused metrics like the average delivery time and the percentage of online orders fulfilled to the home.

Strategic metrics. Half of respondents said their firms plan to implement or expand the use of strategic metrics like carbon emissions per customer or delivery.

Without industry standards for what metrics to track and measure, retailers face difficulty tracking progress against global and industry regulations.

Retailers Lack Consistency In The Metrics They Use To Track And Measure Carbon Emissions In Last-Mile Delivery

TRANSPORTATION METRICS



DISTRIBUTION METRICS



STRATEGIC METRICS



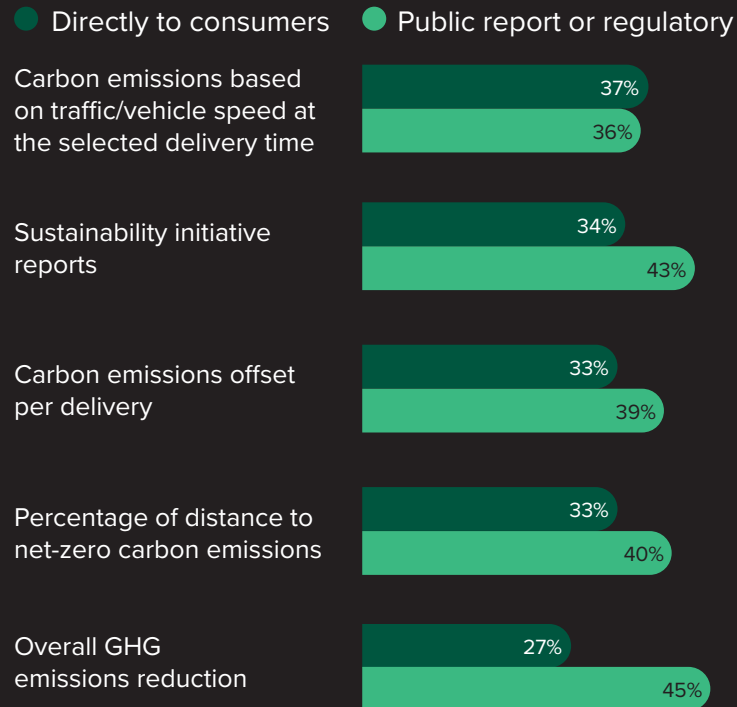
Retailers Fail To Communicate The Impact Of Consumers' Choices

Retailers must increase the visibility of their efforts to reduce carbon emissions in last-mile delivery and educate consumers on the impact their delivery choices have on carbon emissions. However, most retailers don't explain the carbon footprint of delivery options to consumers. Few actively educate consumers about trade-offs in choosing greener delivery options (42%), incentivize consumers to select the greener options (38%), or use imagery and analogies to explain carbon emission amounts (30%).

Additionally, only about a third of survey respondents said their organizations report directly to consumers on overall sustainability initiatives, greenhouse gas (GHG) emission reductions, or their path to net-zero carbon emissions. To enhance last-mile sustainability in their sector, retailers must improve what and how they communicate to consumers.

“For each of the following, please specify to whom, if anyone, your organization reports these metrics on carbon emissions.”

(Select all that apply per row.)



Retailers Need Help Calculating Carbon Emissions

Carbon emission calculations require firms to combine data from different sources, making them complex. Most retailers rely on logistics providers for help with calculating carbon emissions (24%), tracking and monitoring emissions (21%), and providing relevant data (30%). In addition to logistics partners, 30% of respondents said their firms are collaborating with and seeking support from sustainability consultants.

While most retailers are immature in their ability to calculate emissions in last-mile delivery, there are some signs of progress. Around one in four shows more self-sufficiency and track their own data on green vehicles in operation and using vehicle sensors.



Thirty percent of firms leverage sustainability consultants to calculate carbon emissions.

“How does your organization calculate carbon emissions metrics for last-mile delivery?”

THROUGH SELF-SUFFICIENCY

My retail organization tracks and monitors emissions without a logistics partner.

THROUGH COLLABORATION

My retail organization collaborates with a logistics partner for calculations.

THROUGH DEPENDENCE

My retail organization is fully reliant on a logistics partner for calculations.

Retailers Will Rely On Logistics Partners In The Future

Retailers struggle with managing their sustainability efforts on their own, but logistics partners can help. Looking into the next 12 to 24 months, survey respondents expected logistics partners to provide:

Regular reporting and visibility into data. Over 40% of respondents expected regular reports on carbon emission data from standard logistics metrics, while 40% expected access and visibility into carbon emissions data.

Support with customer communications. Thirty-seven percent of respondents want partners to help their organizations effectively communicate to customers about carbon emission reduction.

Technology to enhance sustainability and monitoring. One-third of respondents also expected logistics partners to leverage technology to optimize routes, driver efficiency, and share data in real time.

Enhancements in their own sustainability efforts. Logistics partners will also need to improve their own sustainability performance and hold drivers accountable for a green driving style.

“Which of the following describe characteristics or capabilities you expect your logistics provider to provide and what characteristics and capabilities do you expect of them in the future?”

42%

Daily/weekly/monthly reports on our carbon emission data from standard logistics metrics

40%

Visibility into carbon emission data

38%

The ability to track and optimize average fill rate of the vehicles

37%

The ability to help us effectively communicate to customers about carbon emission reduction in last-mile delivery

37%

A fully green fleet

36%

Improved performance in their carbon emission reduction efforts

Consumers Might Be Green, But Are Hard To Entice

Despite the reliance on logistics partners, retailers still struggle with sustainability in the last mile across:

Technology. Whether it's consolidating data across multiple carriers (50%) or gaining visibility into data their logistics partners collect (44%), respondents experienced technology-related issues.

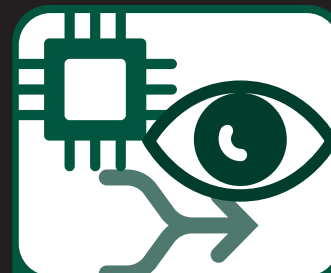
Execution. Respondents said it was challenging to optimize delivery (50%) and find green logistics partners to support their firms (47%).

Customers. Respondents found it difficult to provide consumers with green delivery options (43%), entice them to make greener choices (53%), and educate them about the impact of their choices (52%).

Measurement. Respondents reported their firms struggle with accessing granular data (49%) and measuring carbon emissions (45%).

A standard industry framework could provide clarity for retailers and provide guidance in achieving their sustainability efforts.

Retailers Face Carbon Emissions Management Challenges In Multiple Areas



TECHNOLOGY
CHALLENGES



EXECUTION
CHALLENGES



CUSTOMER
CHALLENGES



MEASUREMENT
CHALLENGES

Retailers Are Investing In Technology To Improve Last-Mile Sustainability

With high concerns and interest in the impact of corporate social responsibility and climate change in retail, firms have an opportunity to invest in carbon emission reduction in the last mile by investing in:

Technology to optimize the supply chain. Nearly 60% of retail decision-makers in our study plan to implement or expand their organizations' investments in technology to optimize delivery routes, vehicle fill rates, order allocations, and location planning across warehouses and stores.

Improving distribution tactics. Retailers aim to improve fleet and driver efficiency with automated fleet selection logic.

Access to better insights. To tackle the data issues mentioned earlier, retailers also plan to invest in real-time data on carbon emissions and connect systems with logistics partners to track and share data.

“What are your organization’s plans to use these tactics to support carbon emission reduction in the last mile?”

Using technology to optimize delivery routes

59%

Using technology to optimize inventory and order allocation and location planning across our warehouses/distribution centers/stores

56%

Expanding our delivery capacity by engaging external green fleets on demand

55%

Investing in establishing a zero-carbon transportation fleet for last-mile delivery

53%

Moving locations of distribution centers and/or terminals and hubs to reduce carbon emissions per delivery

51%

Retailers Need To Set Last-Mile Sustainability Goals

In addition to direct investments, retailers take tactical steps to improve sustainability operations by:

- Aligning internally.** Retailers train employees on integrating sustainability practices into their work and setting sustainability performance goals.
- Leveraging external experts.** Sustainability consultants help retailers enhance their ability to track, monitor, and report on sustainability efforts.
- Monitoring partners.** Retailers plan to monitor logistic providers and set sustainability requirements. Thirty percent of respondents reported their firms plan to only work with green logistic partners. Firms concerned about the impact of climate change and carbon emissions can build a framework of initiatives around these opportunities.

“What steps does your organization plan to take or to do more of to improve your initiatives around carbon emissions reduction in logistics and fulfillment?”



Train employees on how to integrate sustainability practices into their work



Work with sustainability consultants to enhance our ability to track, monitor, and calculate our carbon emissions



Actively monitor logistics partners' sustainability performance



Establish set of sustainability criteria and carbon emissions requirements that all logistics partners must meet going forward



Goal employees on sustainability practices and/or performance



Require all logistics partners to share carbon emissions data

Conclusion

Retailers and direct-to-consumer brands have an opportunity to step ahead of the requirements of local governments and regulators and delight empowered green consumers. They can do so by working closely with their customers and their logistics partners to enhance sustainability in the last mile.

- Define clear benchmarks and metrics to ensure a common understanding within the ecosystem on what to track, measure, and communicate.
- Overcome the challenge of providing customers with transparent and accurate data and look to solutions that allow you to communicate to your customers the impact of their green delivery choices.
- Logistics partners will need technology to reduce carbon emissions and provide retailers with advanced, real-time emissions data.

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Methodology

This Opportunity Snapshot was commissioned by Bringg. To create this profile, Forrester Consulting supplemented this research with custom survey questions asked of operations, logistics, or sustainability decision-makers in North America and Europe in retail or direct to consumer businesses with more than \$10 million in e-commerce sales revenue. The custom survey began and was completed in May 2021.

ENDNOTES

¹Source: "Forrester Infographic: Optimize Your Response To The Climate Crisis," Forrester Research, Inc., October 13, 2020.

²Source: "The Empowered Customer Is Green," Forrester (<https://www.forrester.com/fn/37Y6cfLOKXECDD9NGVeISc>).

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Demographics

REGION	
North America	49%
Europe	51%

E-COMMERCE REVENUE	
\$10M to \$99M	29%
\$100M to \$499M	40%
\$500M to \$999M	16%
\$1B to \$5B	11%
>\$5B	4%

ROLES	
Operations	56%
Warehouse and logistics	41%
Sustainability/ESG	3%

SENIORITY	
C-level executive	15%
Vice president	47%
Director	38%

A white Forrester van is parked on a city street. In the background, there are several tall buildings, including a modern glass skyscraper and a historic stone building with a clock tower. The scene is set in an urban environment with trees and other vehicles visible.

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