Confederation of Indian Industry
125 Years: 1895-2020

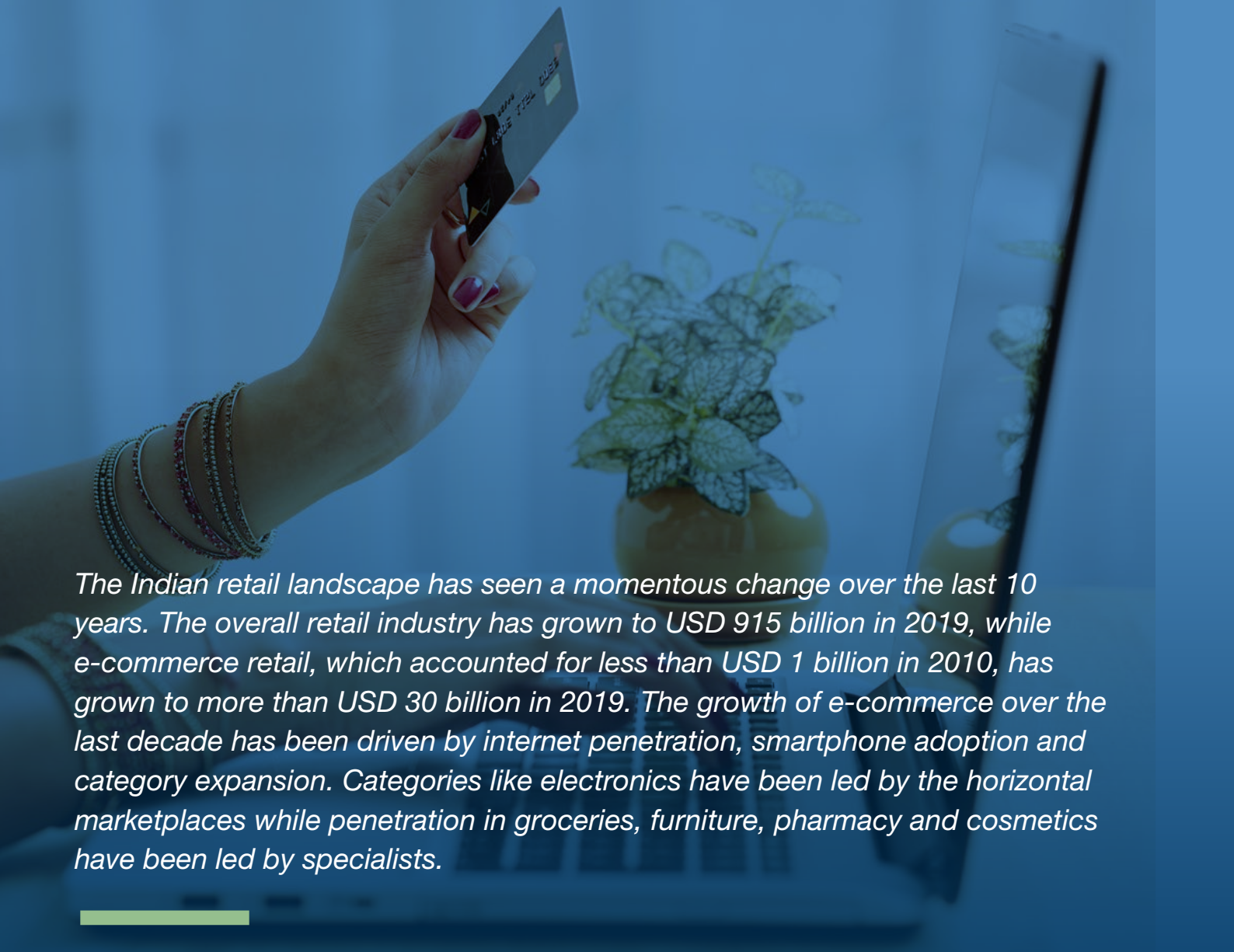
A&M

INDIA CORPORATE SOLUTIONS GROUP

Enabling the Next Wave of E-Commerce in India Through Supply Chain Innovation

TABLE OF CONTENTS

E-COMMERCE RETAIL (B2C) MARKET TO BE MORE THAN A USD 100 BILLION OPPORTUNITY BY 2024



The Indian retail landscape has seen a momentous change over the last 10 years. The overall retail industry has grown to USD 915 billion in 2019, while e-commerce retail, which accounted for less than USD 1 billion in 2010, has grown to more than USD 30 billion in 2019. The growth of e-commerce over the last decade has been driven by internet penetration, smartphone adoption and category expansion. Categories like electronics have been led by the horizontal marketplaces while penetration in groceries, furniture, pharmacy and cosmetics have been led by specialists.

EXHIBIT 1 | MARKET SIZE AND PENETRATION OF RETAIL CHANNELS

RETAIL CHANNEL	MARKET SIZE (USD BN)[2]			MARKET PENETRATION (%)		
	CY17	CY19	CY24E	CY17	CY19	CY24E
Traditional	643	775	1,326	87%	85%	80%
Modern	76	110	237	10%	12%	14%
E-commerce	17	30	103	2%	3%	6%
TOTAL	**737**	**915**	**1,666**			

Source: A&M analysis, Industry reports

E-commerce is also one of the well-funded sectors, having received more than USD 30 billion in M&A and PE deals[1] in the last three years alone.

At just ~3 percent penetration of e-commerce in 2019, the market continues to ride its next wave of growth given the significant headroom available. E-commerce penetration in retail in mature markets like the U.S. and China has reached ~15 percent and ~20 percent, respectively, by CY19, while in India it could reach ~6 percent by 2024.

Different categories are expected to witness differential growth in the next five years on back of an increasing set of suppliers selling online, increasing availability of selection online at rates competitive with brick and mortar retail, and change in buying behavior of consumers enabled by well-funded vertical e-commerce players.

Mobile phone has been the most dominant category in e-commerce, with new Chinese market entrants launching their products exclusively on e-commerce websites before reaching out through retail outlets. Two of the new entrants are now the largest suppliers of smartphones (units) in India, ahead of the erstwhile market leader before 2017.[3] This category has been one of the leading drivers of gross merchandize value (GMV) growth and continues to command the largest GMV share for the two leading e-commerce companies.

A more recent phenomenon has been the rise of online fresh groceries, led by the two leading incumbents, which had a combined market share of ~70 percent in CY19. With increasing focus of horizontal e-commerce leaders and with prepared food delivery companies entering this space, this category could further grow by five times in the next five years.

The growth in e-commerce market size has been possible only with the growth in capacity and network of logistics companies. Starting from unitary business associates, hyperlocal delivery companies, and regional and national couriers to the e-commerce delivery specialists, the logistics partners have enabled that the same selection of goods is made available to every corner of the country.

This conventional supply chain from seller to fulfilment center (FC)/logistics service provider (LSP) to customer continues to retain its relevance for over 90 percent of current e-commerce sales. From merely assured deliveries on a delivery date to same day and on-demand deliveries, this logistics ecosystem has matured over the last decade. Now, product companies are evolving newer fulfilment and delivery methods to provide a seamless experience across channels and further enhance customer delight and adoption.

In this paper, we capture a few such themes that should emerge over the next two to three years and their implications on service providers.

1 Source: Annual Deal tracker – Grant Thornton
2 USD/INR – 70
3 Counterpoint Research estimates

EXHIBIT 2 | CATEGORY-WISE E-COMMERCE MARKET AND PENETRATION, AND PENETRATION IN MATURE MARKETS

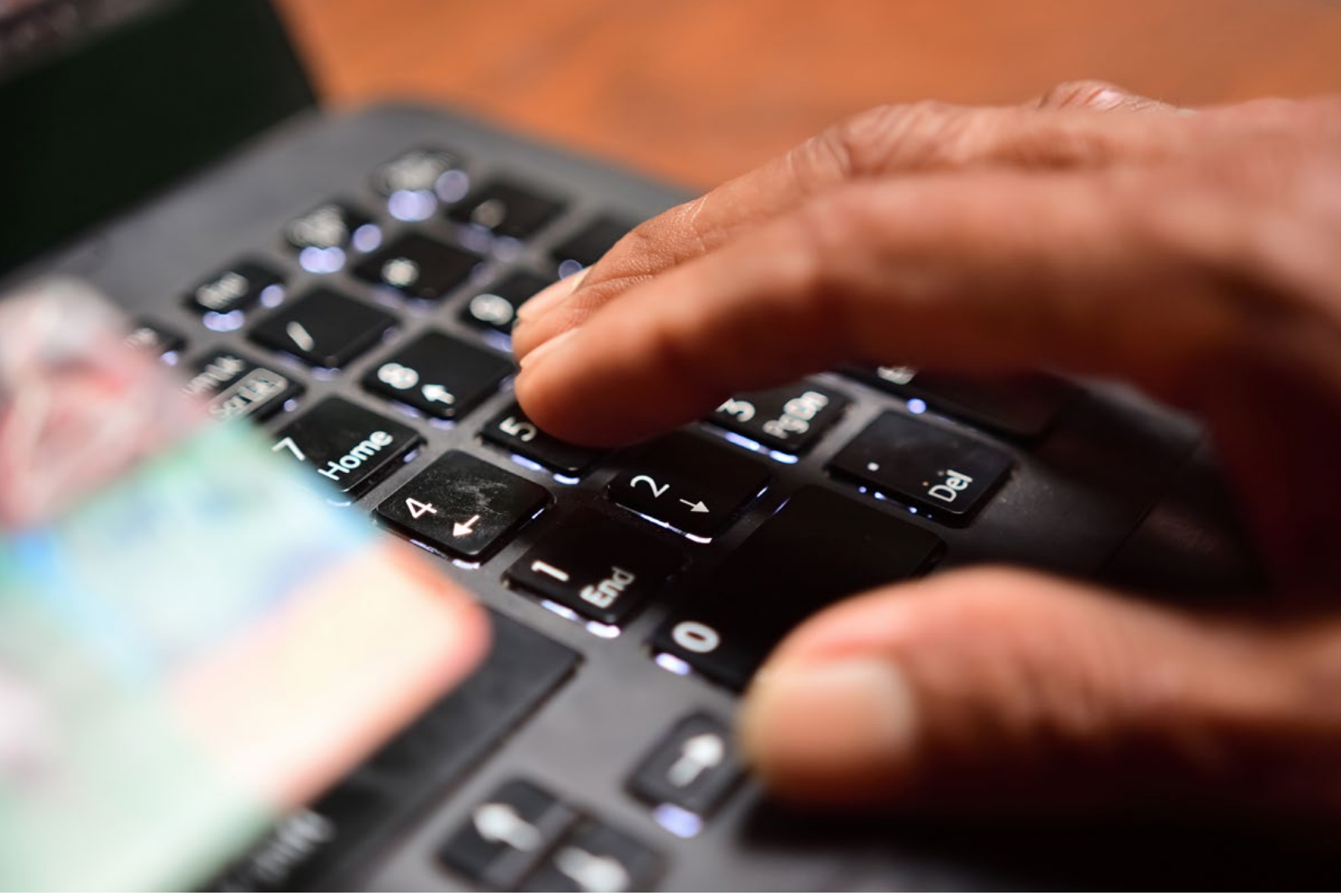
Category	Market Size (USD Bn[4])		CAGR	E-commerce Retail Penetration (%)				Customer Requirements (for next wave of growth)
	CY19	CY24E	(CY19-24) %	CY19	CY24E	CY19 (USA)	CY19 (China)	
Mobile and Accessories	10.0	23.0	18%	42%	59%	14%	44%	▪ Product demos
Apparel	5.5	12.5	18%	8%	12%	26%	34%	▪ Virtual trials and customization ▪ Seamless experience between offline and online channels ▪ Online to store pickups ▪ Kiosk ordering
TV and Appliances	2.3	8.0	29%	10%	16%	20%	45%	▪ Product demos
FMCG[5]	2.0	13.5	47%	2%	6%	6%	15%	▪ On demand deliveries ▪ 2-hour slots deliveries after 2 hours from order (98% fill rates) ▪ List based ordering
Grocery	1.8	9.5	40%	0.3%	1%	5%	5%	▪ On demand deliveries ▪ Store to customer deliveries ▪ List based ordering
Computer and IT Peripherals	1.0	2.5	20%	23%	36%	48%	55%	▪ Product demos
Furniture	0.3	2.3	55%	3%	13%	15%	11%	▪ Seamless experience between offline and online channels ▪ Integrated delivery and installation
Homeware	0.3	0.5	15%	6%	11%	19%	18%	▪ Hyperlocal fulfilment
Others[6]	7.5	31.3	33%	6%	16%	22%	25%	▪ Seamless experience between online and offline channels

Source: A&M analysis, Statista, Industry sources

4 USD/INR – 70
5 FMCG includes Packaged Food, Beauty and Personal Care, Home Care, but excludes Grocery
6 Others includes Health, Eyewear, Luxury, Toys and Games, etc.

EVOLVING CUSTOMER REQUIREMENTS

Categories with standardized, boxed and sealed products such as mobile phones and consumer electronics have seen ready acceptance over the last decade. Immersive online reviews, unboxing videos, standardized product specification comparisons and product recommendations have been helpful in bridging the gap between online and offline retail experience for such categories. The resulting growth in e-commerce share for such categories is readily evident. For example, in 2019, 42 percent of all mobile and accessories sales and 23 percent of all computer and IT peripheral sales were through e-commerce. Other traditionally retail-led fast moving consumer durable (FMCD) segments have also seen an uptick in online share: 24–25 percent for televisions, 12–13 percent for washing machines and 5–6 percent for refrigerators in 2019. Consequently, large FMCD retail chains have built their own e-commerce websites as well over the past few years.



The next wave of online penetration is expected in some of the largest retail categories, FMCG, groceries and apparel as witnessed in U.S. and China markets. Price competitiveness and range of selections in e-commerce has rivalled offline retail in FMCG; however, the channel in its prevailing form has not been adequate in addressing all key customer needs. Scheduled deliveries have been provided by online grocery majors, but service providers have yet to scale up and meet requirements of on-demand deliveries. The usage of social media, chat engines and AI bots to convert **grocery lists to orders** is an innovation in this space that could improve penetration.

Apparel, currently at 8 percent penetration, too has a potential to grow two to three times over the next five years. The need for serving **higher assortment** to a customer despite the limited store and shelf space is fueling in-store kiosk-based ordering. Also, the customer need for **convenience of pickup location/availability** could result in in-store and curbside pickups in India as witnessed in other mature markets. **Social media e-commerce** that has become mainstream in China could also pick up in India.

Categories with experience goods like cosmetics, furniture and made-to-order goods like apparel (suits) and spectacles necessitate an **offline presence to educate first-time adopters**, in order to take necessary measurements with a specialist and to build the brand. Some e-commerce companies in the eyewear and beauty products space have therefore scaled up their retail stores while offering a seamless omnichannel experience and have helped e-commerce adoption in their respective categories. Made-to-measure apparel chains have one or two experience stores across Tier 1 cities, a set of travelling tailors for measurements and a seamless online channel for taking orders, with clustered manufacturing locations at the back end.

The next wave of growth in the e-commerce space could happen on the back of newer order and supply chain models that meet the unique needs of the customer.

EVOLVING OPERATING MODELS IN ORDERING, FULFILMENT AND DELIVERY

Operating models for e-commerce will evolve depending on various factors — customer requirements and change in buying behavior across product categories, availability of right technology and logistics partners to enable the supply chain improvements. With customer need of quicker deliveries and the drive of e-commerce marketplaces to reduce logistics cost, there is a rapid localization and regionalization of seller base. This has led to deepening of pickup and delivery supply chain requirements from e-commerce logistics companies. Around 40–50 percent of overall shipments are picked up from fulfilment centers, with the rest directly from sellers. In addition, to drive penetration in Tier 2 and 3 cities, both captive logistics arms of e-commerce companies and logistics service providers have been working with delivery partners/business associates to add network without the associated fixed costs. This growth in complexity of pickup and delivery network in the traditional e-commerce supply chain mandates the addition of new tech and processes for a smooth scale-up.

With changing category mix and changing customer requirements across categories, newer fulfilment and delivery models are growing in prominence. Some of the key evolving models are as follows:

1. APPAREL – ORDER TO STORE: INSTORE KIOSK

A typical apparel chain has a range of 1,000–2,000 SKUs and more of old season inventory in its warehouses. Of this, 500 SKUs are typically displayed in store due to lack of space and constraints in placing the entire range across store locations and city tiers. This results in the retailer not being able to display the entire range of merchandize available, and the customer must choose from a limited selection presented.

This has resulted in the order to store model, in which customers have access to the complete inventory present across the apparel chain's warehouses through an in-store kiosk, and their orders are picked up and delivered to the store within a specified period for trials and fitment adjustments. Obsolete inventory can also be sold throughout the year instead of in select sale events. Also, the supply chain costs of such a model is less than 30 percent of the cost of a traditional e-commerce model.

The value proposition of this model is stronger especially in Tier 2 and 3 cities where retail chains choose to limit their SKUs. One of India's leading apparel retail major sells ~10 percent of its inventory in such cities through kiosks.

Key challenges:

- Warehouses capable of dispatching routine shipments as well as kiosk orders to retail outlets are needed.
- Back-end IT infrastructure is needed to flash live inventory levels and orders that can be fulfilled across kiosks.
- Merchandizing team needs to have the necessary tools to do pooled demand forecasting — for regular merchandize and those serviced through kiosks.

EXHIBIT 3 | TYPICAL SUPPLY CHAIN FOR ORDER TO STORE MODEL

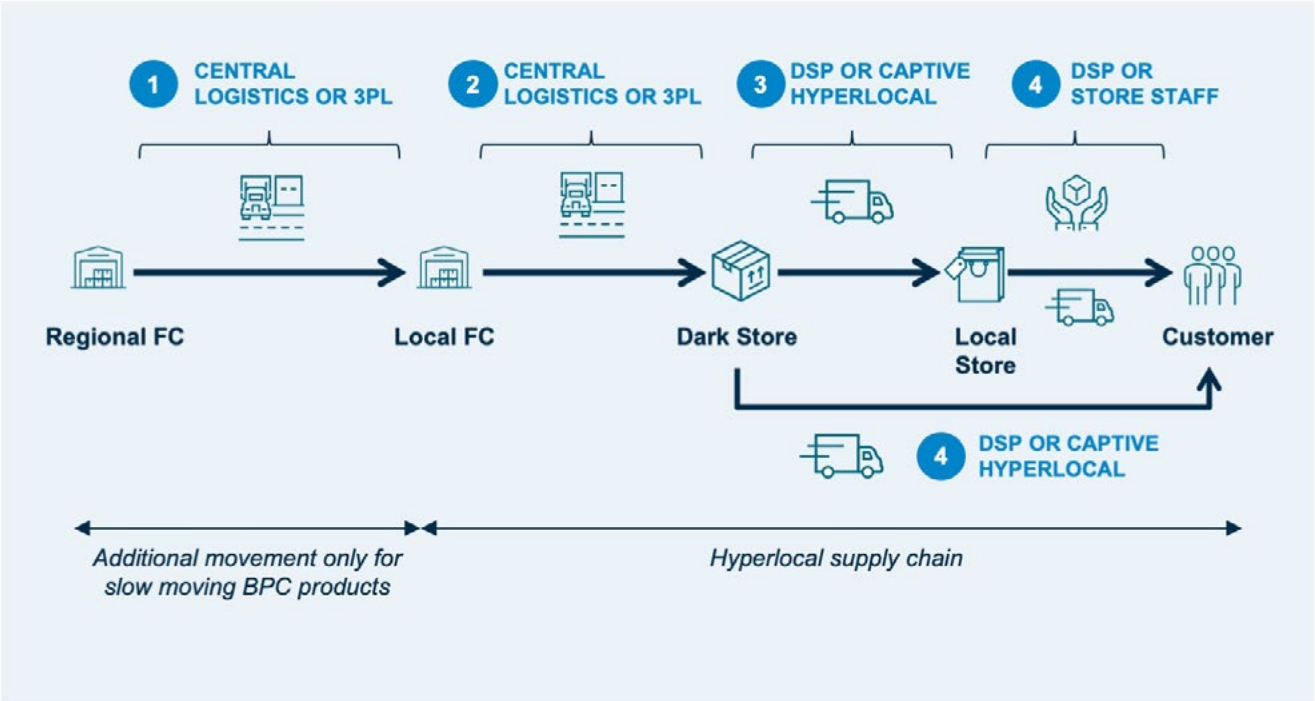
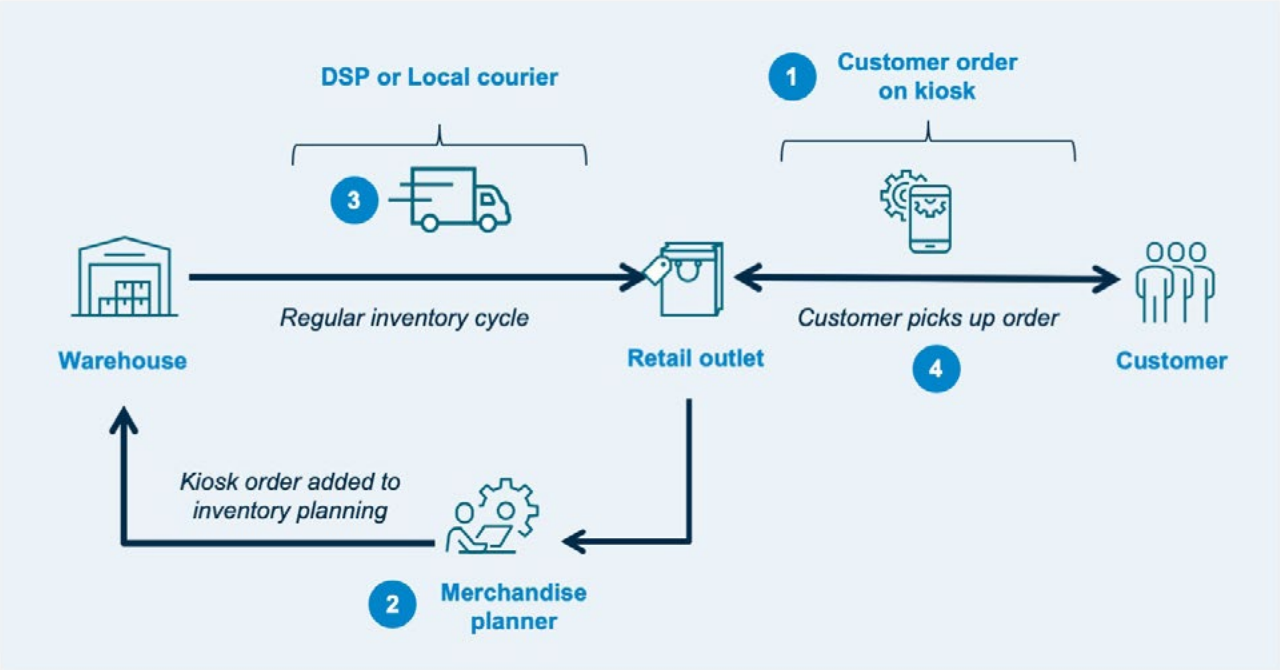


EXHIBIT 4 | TYPICAL SUPPLY CHAIN FOR DARK STORE MODEL



2. FMCG/GROCERY AND MEAT/ PHARMACEUTICALS – DARK STORE

Most warehouses and fulfilment centers for e-commerce companies are located outside the cities. This is optimal for typical e-commerce deliveries where sorted shipments are moved to branches and then to customers. However, this does not completely serve the requirements of on-demand same day deliveries for FMCG and grocery items. The solution, therefore, is to create multiple dark stores within the city (typically 10,000–20,000 sq. ft. facilities) from which milk runs to customers can be made, minimizing the order-to-delivery time and, consequently, the last mile transportation costs to customers.

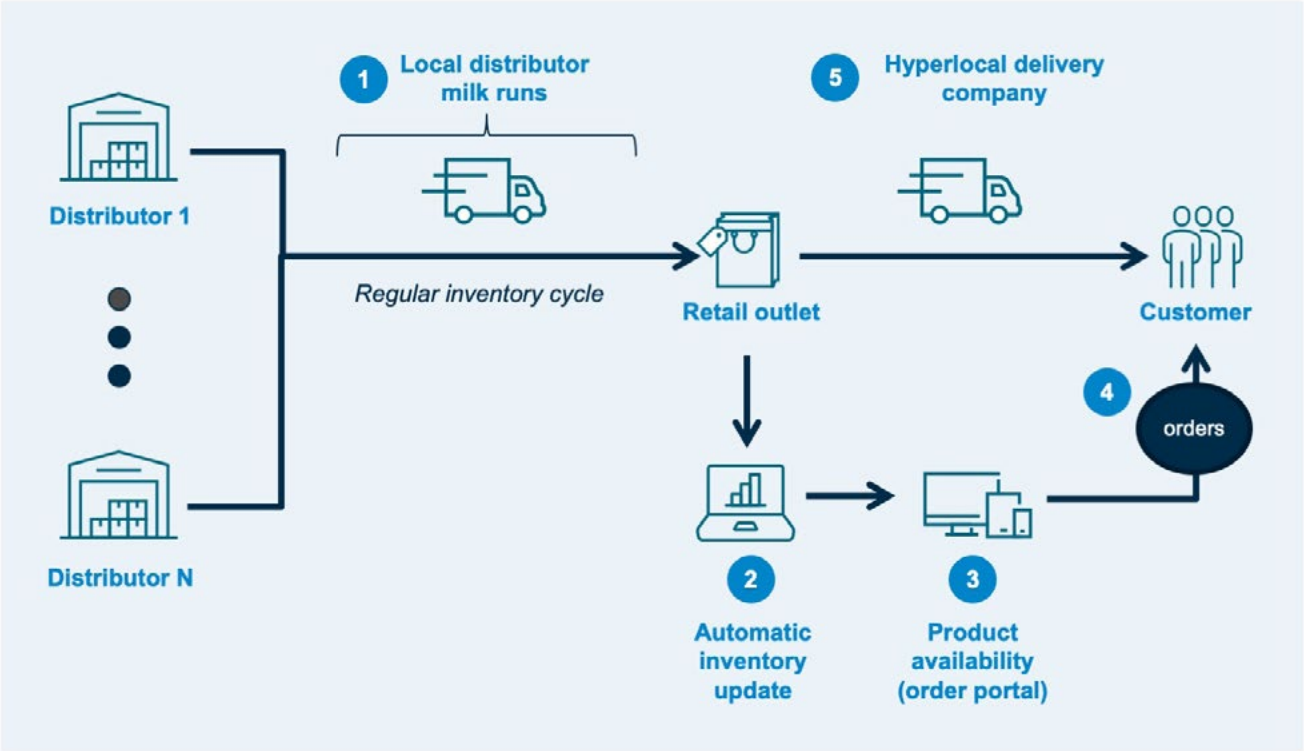
The model also allows e-commerce companies to become master distributors that can serve retailers in an area, making multiple deliveries in a day and optimizing the inventory held at retailer's end.

This has been adopted by some of early entrants in FMCG deliveries and could see an uptick with newer players entering this space. The B2B dark store model is in early stages of adoption and could see adoption over the next five years.

Key challenges:

- Inventory may be owned by the e-commerce company, and management of inventory shrinkage/ wastage at dark stores is core to the operations.
- Online orders may need to be routed through the nearest store. Offline and online orders need to be cumulated and processed together.
- Management of multiple types of inventory — cold/ chilled/normal, FIFO dispatches and management of expiry dates of products.

EXHIBIT 5 | TYPICAL SUPPLY CHAIN FOR STORE TO CUSTOMER DELIVERIES



3. FMCG/GROCERY – STORE TO CUSTOMER DELIVERIES

This is an inventory lean model in which orders for on-demand goods like FMCG and groceries are fulfilled from a list of empaneled retail stores. To improve penetration and reduce turnaround time and costs for deliveries, companies are innovating to bring Kirana shops to their supply chain network.

Large retail chains could also partner with delivery companies to provide this service.

Some of the e-commerce majors have partnered with retail majors while online food delivery companies have partnered with local supermarkets to deliver this service. This model saw an increased adoption during the lockdown period with restrictions imposed on delivery of nonessential goods. Approximately 55 percent of FMCG and grocery deliveries are estimated to be currently delivered through this model.

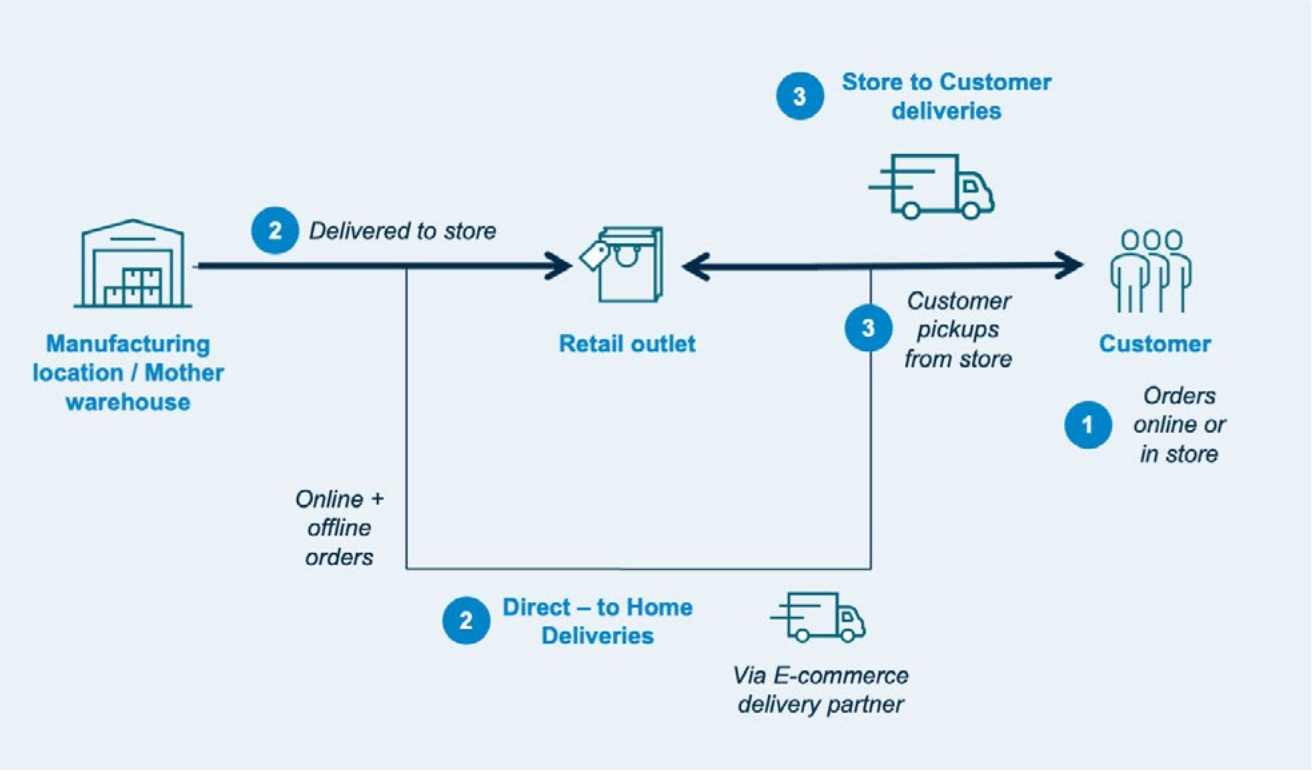
Key challenges:

- Store level inventory needs to be synced live with the systems of the e-commerce service provider.
- To deliver from Kiranas, e-commerce companies may need to provide software where sales is captured, and inventory is regularly updated.
- Model requires hyperlocal delivery capabilities.

4. OMNICHANNEL PRESENCE FOR RETAILERS

This entails a seamless experience across both online and offline formats and other mediums for engagement (web, mobile, phone, social media). Customers can order in store for delivery to home and order on the site for store pickups and home deliveries. Order information across channels is maintained on the e-commerce platform.

EXHIBIT 6 | SUPPLY CHAIN FOR OMNICHANNEL FULFILMENT



Company owned company operated stores provide the most seamless experience. Franchisees typically promote ordering from and to the store, as it directly affects their revenues, incentives and, hence, margins.

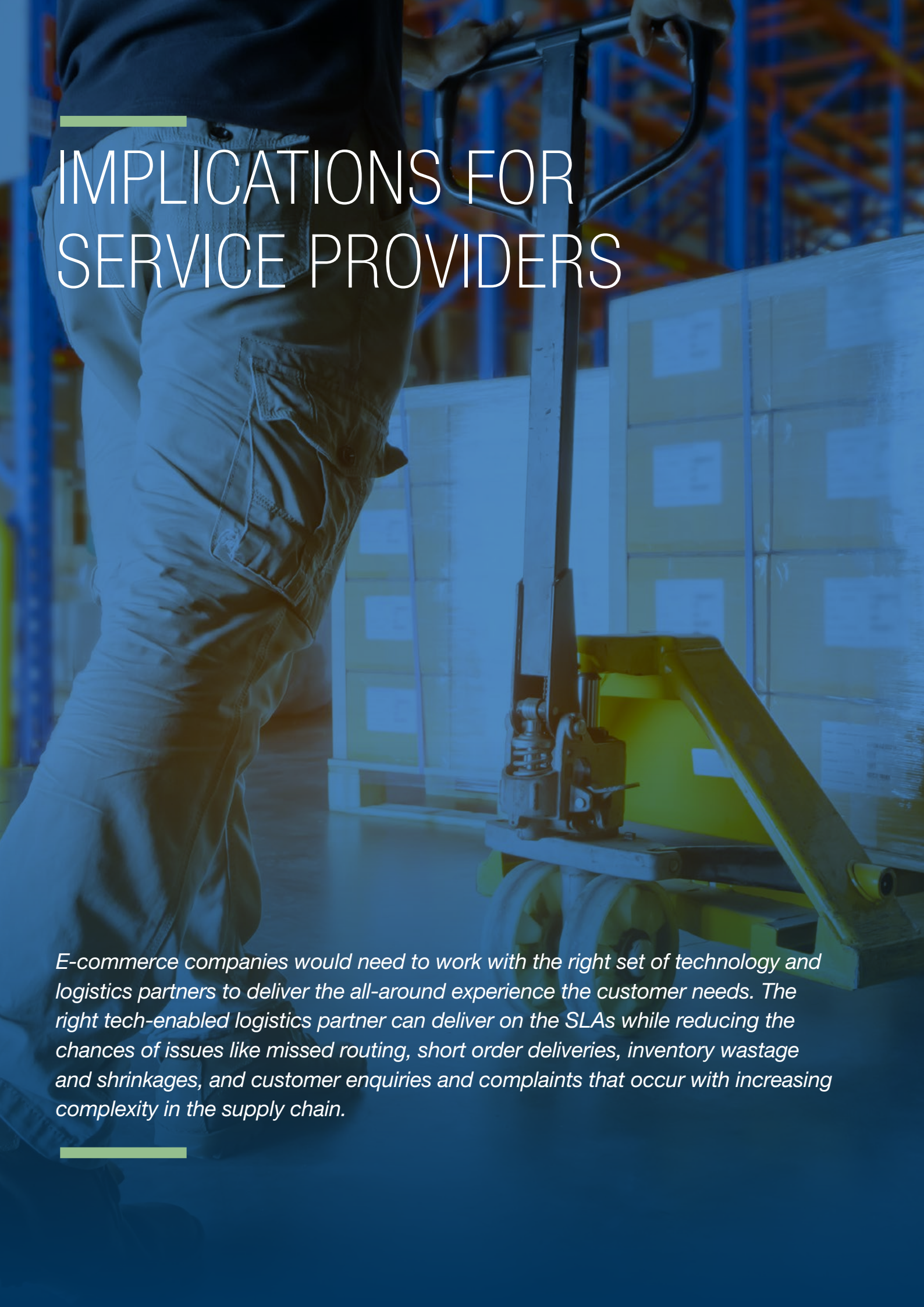
For companies selling their products across multiple e-commerce marketplaces, operating out of a single or few self-operated fulfilment centers is more inventory efficient. The inventory status therefore needs to be flashed live across the marketplaces to enable orders.

Multiple product companies like online eyewear retail chains, made-to-order apparel, and select beauty and furniture companies also operate with this model.

Key challenges:

- Comingled inventory for retail and e-commerce formats creates challenges around inventory planning and optimization.
- Warehouse operators need to have capabilities of fulfilling both shipments to retailers and individual e-commerce customers from the same facility.
- Back-end tech should be able to manage orders seamlessly across multiple marketplaces and retail outlets.
- Back-end tech infrastructure should seamlessly assign deliveries to the nearest store to minimize logistics costs and enable easy store pickups.

While the focus of this paper is on B2C deliveries, it would be prudent to note that the B2B space is also witnessing a momentous change where leading B2C marketplaces and new market entrants are developing a network of warehouses outside key consumption and production clusters, serving the needs of local SMEs and traders alike. This supply chain network is also expected to scale up rapidly with the growth in this space.



IMPLICATIONS FOR SERVICE PROVIDERS

E-commerce companies would need to work with the right set of technology and logistics partners to deliver the all-around experience the customer needs. The right tech-enabled logistics partner can deliver on the SLAs while reducing the chances of issues like missed routing, short order deliveries, inventory wastage and shrinkages, and customer enquiries and complaints that occur with increasing complexity in the supply chain.

The requirements across these models are as follows:

EXHIBIT 7 | IMPLICATIONS FOR TECHNICAL AND LOGISTICS SERVICE PROVIDERS

MODEL TYPE	IMPLICATIONS – TECH SERVICE PROVIDERS	IMPLICATIONS – LSPS
Traditional e-commerce supply chain	▪ Tech to manage multiple business associates smoothly and provide the same experience to the customer ▪ Tech to coordinate and manage diverse seller pickups and inventory	▪ Training processes and standard operating procedures (SOPs) to deliver the same customer experience with delivery partners ▪ Deeper distributed pickup networks for first mile
Order to store	▪ Tech to manage and confirm real time orders from stores and kiosks ▪ Inventory forecast for normal store sales and kiosk sales	▪ Warehouse management systems that can handle normal dispatches to retail outlets and dispatches for kiosk orders ▪ Separate QC and packing methods ▪ May entail order delivery frequency different than typical milk-run schedule for outlet replenishment
Dark store	▪ Tech used to manage large warehouses may not be relevant ▪ Fresh category (groceries/meat/dairy) would need WMS capable of tracking expiry date, FIFO Dispatches and reducing wastage	▪ Separate systems to manage inventory shrinkage ▪ Inventory planning to maximize throughput from a given dark store ▪ Optimal store layout for maximum throughput in a given area
Store to customer	▪ Tech to pull store's inventory management data to the customer interface ▪ Separate tech to manage inventory at Kiranas (if part of the supply chain)	▪ Right hyperlocal delivery partner with capabilities to handle prepared food / FMCG and grocery deliveries together ▪ Set SOPs with store owners on timely processing of orders
Omnichannel	▪ Tech to manage real time inventory by tracking "in cart" and "ordered" shipments across marketplaces and stores ▪ Merchandize planning for retail vs. e-commerce	▪ Capabilities of handling central warehouses/FCs to do both store and individual dispatches ▪ Capabilities to do B2B deliveries to retail outlets as well as B2C deliveries to end customers

CONCLUSION

The e-commerce market in India is poised for annualized growth of more than 28 percent in the next five years, given the favorable adoption trends in India and the growth seen in mature markets. This growth is predicated on the growth of its enabling ecosystems. The e-commerce companies need to increase the selection (SKU width and depth) available online, both to increase the local seller base to deliver at the most optimal costs and to penetrate new categories to increase the overall market available to them.

This growth therefore would have to be enabled by logistics partners offering them deeper and deeper pickup and delivery networks. To service this, the network and capacity of logistics partners must scale up across their chain of pickup centers, fulfilment center spaces, line haul, hubs, intracity transportation, delivery centers and delivery partners. They will need to adapt to handle an increasing mix of complex products — from traditional e-commerce packages (mobiles and apparel) to heavy, bulky, fragile, temperature-sensitive and perishable products while handling multiple payment modes at the customer's end. They further need to reimagine their network to include dark stores, store to customer deliveries and composite B2B and B2C fulfilment centers. They should also look toward partnering with technology providers to offer end-to-end supply chain solutions for the emerging set of multichannel product companies.

This is now an interesting space for logistics companies and investors to review. While the service providers with a differentiated proposition could stand to gain going forward, there is ample market growth available for incumbents to grow and sustain.

A&M SERVICES

A&M assists business owners with revenue enhancement, cost optimization, investment related, and advisory and implementation support.

Revenue enhancement
Service offerings, value-based selling, customer acquisition

Cost optimization
Cost rationalization, vendor development, supply chain and network optimization

Digitization
Cost control and enhanced customer experience

Portfolio Review
Assess existing business interests and advise on overall portfolio strategy for future

Cash Management
Review, assess and program cash management initiatives for mid- and large-size companies

Investment opportunities
Identification and evaluation

MANISH SAIGAL
Managing Director
msaigal@alvarezandmarsal.com

SUDEEP MEHROTRA
Senior Director
smehrotra@alvarezandmarsal.com

RISHAV JAIN
Senior Director
rishav.jain@alvarezandmarsal.com

SHYAM SUNDAR BHUSHANKUMAR
Manager
ssundar@alvarezandmarsal.com

ABOUT ALVAREZ & MARSAL

Companies, investors and government entities around the world turn to Alvarez & Marsal (A&M) for leadership, action and results. Privately held since its founding in 1983, A&M is a leading global professional services firm that provides advisory, business performance improvement and turnaround management services. When conventional approaches are not enough to create transformation and drive change, clients seek our deep expertise and ability to deliver practical solutions to their unique problems.

With over 4,500+ people across four continents, we deliver tangible results for corporates, boards, private equity firms, law firms and government agencies facing complex challenges. Our senior leaders, and their teams, leverage A&M's restructuring heritage to help companies act decisively, catapult growth and accelerate results. We are experienced operators, world-class consultants, former regulators and industry authorities with a shared commitment to telling clients what's really needed for turning change into a strategic business asset, managing risk and unlocking value at every stage of growth.

Follow A&M on:

To learn more, visit: **alvarezandmarsal.com**

ALVAREZ & MARSAL
LEADERSHIP. **ACTION. RESULTS.**℠