Chapter 5
Technologies Enabling Omni-Channel:
Understanding Key Success Factors for IT Framework

Rohit Das
MET Institute of Management, India

ABSTRACT

The retail industry has been scaling up by better co-ordination among channel partners, improving shipment delivery time at a lower possible cost over last few years. Looking at the Indian scenario, large logistics companies such as Bluedart, FedEx, Gati, etc. have launched dedicated services for online retailers. However, entrance and elevation of e-commerce focused logistic companies such as Chhotu, Mudita, Unicommerce and Delhivery seem to be promising and can be the real game changer. These companies offer solutions that address the various pain-points pertaining to the supply chain of e-commerce companies, which traditional and big supply chain & logistic providers so far failed to do. This is a global phenomenon. Despite considerable improvement in recent past, many logistics providers still struggle to cope up with inadequate infrastructure leading to operational inefficiencies to support their services. Some of such operational concerns, but not limited to, are wrong delivery, unaccepted shipment pick-ups, product unavailability leading to promise to deliver.

INTRODUCTION

One of the intentions of retail supply chain was to fulfil stores. Supply chain faces many challenges: increasing sense among retailers that they aren't just missing out on some demand but they are missing out on a lot of demand, escalating pressure on inventory turns and margins, lack of visibility of inventory. Annual growth rate of sales by E-commerce is 20%. Sales through online medium are surging rapidly which is making the retailers to not only grow but to increase customer loyalty. Due to mass shifting of global customers towards E-commerce is forcing the retail and logistics industries to change how they

operate. All aspects of the retail industry such as strategic location and total real estate footprints are getting influenced by this trend.

Evolution of retail sales to more robust Omni-channel environment has been in the mind of executives of supply chain for more than a decade (Brown and Reid, 1955). As in many of the cases, companies don't want to lose a single sale will without any serious consideration open up new channels to take new orders. Hence fulfilling these orders becomes a challenge. The order size arising from customer directly is very small and often a single unit. Hence, these types of orders are delivered directly to customers rather that shipping it in bulk to stores. So there is decline in bulk shipping rates such as truckload carries which are cheap in comparison to the emerging parcel shippers. These ongoing changes should be addressed in supply chain; otherwise the resulting new business would be less profitable (Cullen, 1990).

As with any new concept Omni-channel retailing strategy also consists of leaders and laggards. With the help of technology even laggards have an opportunity to become successful in this field. Omni-channel retailing problems can be solved with the help of technology. In the following sections we attempt to take a closer look at the trends in omni-channel retailing, the key challenges that it presents to supply chain operations and how technology can ensure that profitability is maintained as new sales channels are pursued. There is also an attempt to present an IT framework (Gillett, 1973). The analysis presented focuses on the challenges in supporting omni-channel and how Information Technology can help to integrate Customer Order Management and the different stores (Kline, 1994).

Many retailers struggle to break silos that are built around their IT and Marketing departments, between their IT and operations departments. Typically, we see that, when the CIO went off and focused on big, enterprise-level technologies rooted in multi-year analysis, road mapping and complex implementations, the CMO would go about his or her business of building brand with a keen focus on creative, messaging and media (Forrester Consulting, 2014). Each department has their own goals and objectives and go about doing own things. Marketing and Operations departments should break the silos and work with IT department to make use of the technologies available (Balfour et. al., 1998).

As companies grow and needs change, they'll often switch platforms. But IT needs for Omni-channel is much more than just about the platforms. But clarity is required for who owns the digital strategy. IT leading technology roadmaps that aren't tied to eCommerce and marketing strategies. For Omni-channel, IT is just an enabler but has a big role to play. Marketing and the Operations teams must be talking to the IT team and creating their plans (Donthu et al., 1999). Omni Channel strategy just wont with silos and working with processes of yesterday.

To thrive in today's always-on, always-with-you digital environment and to stay one step ahead of the competition retailers need to be more nimble and responsive. The retailers need to be faster at driving innovative new ideas and no longer have "3-year IT Roadmap". This means the IT strategy is more flexible and demand for innovative technologies that can power customer experiences across today and tomorrow's growing touchpoints (Baroudi and Orlikowski, 1988). The IT Strategy is to provide a means to collect and harness data to drive decisions across the retail enterprise.

Breaking Silos

One important way how retailers are breaking silos is by being innovative in team formation, setting up innovation centres realigning internal processes, etc. Let's understand some of these ideas by the retailers in this section.

Related Content

Modeling of Hybrid Production Systems with Constant WIP and Unreliable Equipment
Mehmet Savsar (2011). *International Journal of Information Systems and Supply Chain Management (pp. 46-66).*
www.irma-international.org/article/modeling-hybrid-production-systems-constant/58914

Near Candidate-Less Apriori With Tidlists and Other Apriori Implementations
Mehmet Bicer, Daniel Indictor, Ryan Yangand Xiaowen Zhang (2022). *International Journal of Applied Logistics (pp. 1-22).*
www.irma-international.org/article/near-candidate-less-apriori-with-tidlists-and-other-apriori-implementations/286163

Coordinating a Platform Supply Chain for Fresh Produce: Integrating Corporate Social Responsibility
Wei Chen, Ruochen Zhaoand Molin Liu (2025). *International Journal of Information Systems and Supply Chain Management (pp. 1-26).*
www.irma-international.org/article/coordinating-a-platform-supply-chain-for-fresh-produce/374218

Proposed Framework for Research in the Triple A (Agility, Adaptability, Alignment) in Supply Chains
Ivan Arana-Solares, Jose Machucaand Rafaela Alfalla-Luque (2011). *Managing Global Supply Chain Relationships: Operations, Strategies and Practices (pp. 306-321).*
www.irma-international.org/chapter/proposed-framework-research-triple-agility/48475

Impact of Industry 4.0 on Human Resources Systems: The Emergence of Work 4.0
Myriam Ertzand Adam Skali (2022). *Increasing Supply Chain Performance in Digital Society (pp. 278-303).*
www.irma-international.org/chapter/impact-of-industry-40-on-human-resources-systems/306353