# FINAL PROJECT REPORT

MANAGING SUPPLY CHAINS

LAKSHIT ADHIKARI 401908008

# Managing Supply Chains: Final Project Report

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## Introduction

Supply chain management is the process of coordinating and optimizing the flow of goods, services, and information from the point of origin to the point of consumption. It involves the planning, execution, and monitoring of all activities involved in the production, procurement, transportation, warehousing, and distribution of goods or services. A well-designed supply chain structure can help companies reduce costs, improve efficiency, enhance customer satisfaction, and gain a competitive advantage in the marketplace.

The supply chain structure can be divided into several components, including suppliers, manufacturers, distributors, retailers, and customers. Each component plays a vital role in ensuring the smooth and efficient flow of products or services through the supply chain network. Effective supply chain management requires companies to manage relationships with all of these stakeholders and to develop strategies that balance cost, speed, and quality.

This report aims to provide an in-depth analysis of the supply chain structures of two of the world's largest e-commerce companies, Amazon and Alibaba. Both companies have developed extensive supply chain networks that are designed to provide customers with fast and reliable service. Amazon and Alibaba have disrupted traditional retail models by leveraging their supply chain structures to offer customers a wide selection of products at competitive prices.

This report will examine how Amazon and Alibaba manage their respective supply chain networks and evaluate the strengths and weaknesses of their supply chain structures. We will also analyze the challenges these companies face in managing their supply chains and the strategies they employ to overcome these challenges. Additionally, we will compare and contrast the supply chain structures of Amazon and Alibaba to gain insights into effective supply chain management practices that can be applied in other business contexts. Overall, this report aims to provide a comprehensive analysis of the supply chain structures of Amazon and Alibaba and to offer recommendations for improving supply chain management practices.

# **Supply Chain at Amazon**

Amazon was founded by Jeff Bezos in 1994 as an online bookstore, with the initial idea of providing a platform for people to buy books online. The company quickly expanded to sell a variety of other products, including electronics, apparel, and home goods. Over the years, Amazon has continued to grow and innovate, introducing new services like Amazon Prime, which offers free shipping and access to streaming video and music content, and Amazon Web Services, which provides cloud computing and other services to businesses.

Today, Amazon is one of the largest and most successful companies in the world, with a market capitalization of over \$1.5 trillion as of early 2023. It employs over 1.3 million people worldwide and operates in a variety of industries, including e-commerce, streaming media, and cloud computing. Despite its massive size, Amazon has continued to focus on innovation, investing heavily in research and development to create new products and services.

### **Management Board**

Jeffrey P. Bezos: Executive Chairman

**Andy Jassy: CEO** 

Brian T. Olsavsky: Senior Vice President and Chief Financial Officer

Douglas J. Herrington: Chief Executive Officer, Worldwide Amazon Stores

The board of directors includes individuals like Indra Nooyi, the former CEO of PepsiCo, and Daniel Huttenlocher, the Dean and Vice Provost of Cornell Tech. With a strong leadership team in place, Amazon seems poised for continued success in the years to come.

Amazon is a leading e-commerce giant that offers a wide range of products and services to millions of customers worldwide. The company has built a strong reputation for its exceptional customer service, fast delivery, and competitive pricing. These attributes have been achieved by an effective supply chain structure that operates efficiently and effectively. Amazon has a diverse supply chain structure that involves numerous activities and processes. The company's supply chain can be categorized into four main components, which include procurement, inventory management, logistics, and customer service.

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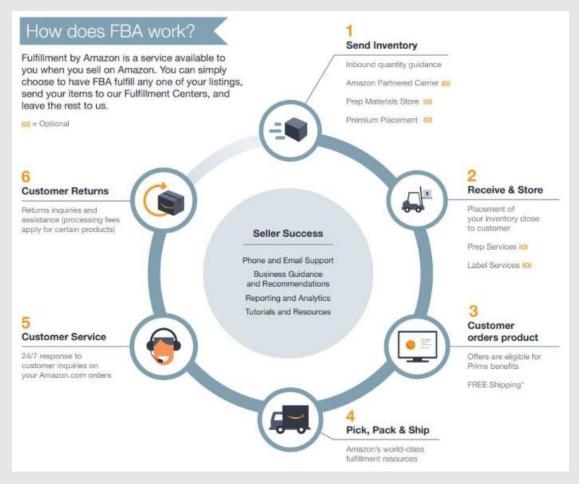


Figure 1: Fulfilment by Amazon

## **Supply Chain Essentials**

#### **Procurement**

The company uses a combination of direct procurement and third-party procurement to ensure that it has a reliable supply of products. Direct procurement involves sourcing products directly from manufacturers. This strategy allows Amazon to reduce its costs and have greater control over the quality of products it sells.

Third-party procurement involves sourcing products from wholesalers and retailers. This strategy allows Amazon to expand its product range without having to invest in inventory or logistics.

### **Inventory Management**

Amazon's inventory management strategy involves a combination of just-in-time (JIT) and safety stock inventory management techniques. JIT inventory management involves receiving products from suppliers only when they are needed. This strategy reduces the amount of inventory that Amazon has to hold, thus reducing its costs. Safety stock inventory management involves holding a certain amount of inventory as a buffer against unexpected fluctuations in demand.

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### **Logistics**

Amazon's logistics strategy is based on speed and efficiency. Amazon operates a vast network of fulfilment-centres, which are strategically located near major population centres. These fulfilment-centres are equipped with advanced technology, such as robots and conveyor belts, to ensure that products are processed quickly and efficiently.

Amazon also has its own delivery network, which includes delivery vans and airplanes. The company uses advanced logistics software to optimize its delivery routes and ensure that products are delivered to customers in the shortest possible time.

<u>Customer service</u> is a vital aspect of any supply chain. Amazon is renowned for its excellent customer service, which is based on its customer-centric approach. The company offers a range of customer service options, including email, phone, and chat support.

Amazon's customer service team is trained to handle customer queries and complaints promptly and efficiently. The company also has a generous returns policy, which allows customers to return products within a specified period for a full refund.

### **Future Recommendations**

### **Increasing Transparency:**

Amazon can enhance transparency in its supply chain by providing customers with more information about the products they purchase. This can include details about the manufacturing process, the source of raw materials, and the environmental impact of the product. By providing customers with this information, Amazon can enhance customer trust and loyalty.

Reducing Environmental Impact: Amazon can enhance its sustainability efforts by reducing the environmental impact of its supply chain. This can include using more eco-friendly packaging, optimizing delivery routes to reduce carbon emissions, and sourcing products from environmentally responsible suppliers. By reducing its environmental impact, Amazon can enhance its reputation and appeal to customers who are increasingly concerned about the environment.

**Enhancing Agility:** Amazon can enhance its agility by improving its forecasting capabilities and its ability to respond quickly to changes in demand. This can include using advanced analytics to predict demand and optimize inventory levels, and enhancing its distribution network to enable faster delivery times. By enhancing its agility, Amazon can better respond to changing customer needs and remain competitive in an ever-changing marketplace.

Amazon's supply chain structure is complex and multi-faceted, involving a wide range of suppliers, distributors, and logistics providers. The company has built a strong reputation for its exceptional customer service, fast delivery, and competitive pricing, which has been achieved by an effective supply chain.

# **Supply Chain at Alibaba Group**

Alibaba Group Holding Limited, commonly known as Alibaba, is a multinational technology conglomerate based in China. The company was founded in 1999 by Jack Ma, who is also known as Ma Yun, a former English teacher. Initially, Alibaba was a B2B (business-to-business) marketplace that connected Chinese manufacturers with foreign buyers. Over the years, the company diversified its business model and expanded into e-commerce, online payment systems, cloud computing, and digital media.

In 2014, Alibaba became a publicly-traded company on the New York Stock Exchange, raising a record-breaking \$25 billion in its initial public offering (IPO). This made it the largest IPO in history at the time. Since then, Alibaba has grown into one of the world's most valuable technology companies, with a market capitalization of over \$500 billion.

### **Management Board**

Daniel Zhang - Chairman and CEO

Joe Tsai - Executive Vice Chairman

Maggie Wu - Chief Financial Officer

Jeff Zhang - President of Alibaba Cloud Intelligence

Fan Jiang - President of Taobao and Tmall

Trudy Dai - President of New Retail

Michael Evans - President of Alibaba Group

Lucy Peng - Partner and CEO of Ant Group.

Under the leadership of this management team, Alibaba continues to innovate and expand its business operations globally, with a focus on providing digital solutions for businesses and consumers alike.

### **Supply Chain Essentials**

### **Procurement**

Alibaba Group's procurement strategy involves working closely with its suppliers to ensure the quality and availability of products. The company uses various sourcing channels, including online sourcing, trade shows, and supplier referrals, to minimize supply chain risks. Alibaba Group also provides training and support to its suppliers to improve their manufacturing processes.

### **Manufacturing:**

Alibaba Group works closely with its suppliers to ensure that the products meet its quality standards and specifications. The company also provides training and support to its suppliers to improve their manufacturing processes.

### **Logistics:**

. Alibaba Group has established partnerships with various logistics providers to ensure fast and reliable delivery of products. The company also operates its logistics network, including *Cainiao* Smart Logistics, to handle its own deliveries.

#### Warehousing:

Alibaba Group has established multiple warehouses worldwide to ensure that the products are stored in optimal conditions and can be delivered quickly to customers. The company provides training and support to its suppliers to improve their manufacturing processes, including quality control and production efficiency.

#### Sales:

The company uses various marketing and sales strategies, including advertising, promotions, and discounts, to attract customers and increase sales.

### **Customer Service:**

Alibaba Group has established a dedicated customer service team to handle customer inquiries, complaints, and returns. The company uses advanced technologies, including chatbots and artificial intelligence, to improve the customer service experience and reduce response times.



Figure 2 Alibaba online space

### **Future Recommendations**

<u>Integration of blockchain technology:</u> Alibaba Group can integrate blockchain technology into its supply chain operations to enhance transparency, security, and traceability. Blockchain technology can help track products from the suppliers to the end customers, ensuring that they are authentic and comply with regulations.

<u>Sustainability</u>: Alibaba Group can adopt sustainable practices, including eco-friendly packaging, renewable energy, and waste reduction, to reduce its environmental impact and enhance its brand reputation. Sustainable practices can also lead to cost savings and improved operational efficiency.

<u>Automation</u>: Alibaba Group can invest in automation and robotics to improve warehouse efficiency, reduce operational costs, and enhance the customer service experience. Automation and robotics can also reduce the risk of errors and increase productivity.

<u>Logistics network Expansion</u>: Alibaba Group can expand its logistics network to more countries and regions to improve delivery times and reduce shipping costs. The company can also establish partnerships with local logistics providers to enhance its logistics capabilities.

**Enhance customer experience**: Alibaba Group can focus on enhancing the customer experience by providing personalized recommendations, fast and reliable delivery, and excellent customer service. The company can also use advanced technologies, including virtual reality and augmented reality, to enhance the online shopping experience.

Alibaba Group's supply chain structure and operations have been critical to its success in the e-commerce industry. The company has implemented various strategies to manage its supply chain effectively, ensuring timely delivery of high-quality products to customers worldwide. However, there are several areas where the company can improve its supply chain performance and enhance its competitiveness in the market. The future recommendations and directions for Alibaba Group's supply chain include the integration of blockchain technology, adoption of sustainable practices, investment in automation and robotics, expansion of the logistics network, and focus on the customer experience. By implementing these strategies, Alibaba Group can further enhance its supply chain performance and maintain its position as a leading e-commerce company in the world.

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