

# E-Commerce Hyper Personalization

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**Abstract:** E-Commerce helps organizations to commercialize the buying and selling of goods through online transaction i.e. with the use of Internet instead of traditional marketing. Success of e-commerce depends upon the quality of personalization which can be achieved with the help of few key assets such as data collection, deep observation, simplicity, automated marketing team. Hyper-personalization is one step ahead of Personalization. It utilizes behavioural and real-time data of the customers to create highly relative communication that is relevant to the customer. This paper describes the wide range of e-commerce in various fields with its impacts and advantages of Hyper- Personalization.

**Keywords:** E-Commerce, E-Commerce types, Personalization, Hyper-personalization, Digital marketing

## I. INTRODUCTION

E-commerce is a modern way of binding consumers, administrations and businesses on a single platform with the help of the internet. It is an abbreviation of electronic commerce. With increasing number of internet penetrations the importance of e-commerce is also increasing all over the world. Geographical boundaries are vanished because wide variety of services provided by e-commerce. There is no single country in the world without implementation of e-commerce in daily life, in which CHINA stands at first position, USA at second and INDIA at the third position.

Friendly nature of e-commerce with consumers as well as with business is leading to hyper- personalization. There is nothing whose transaction cannot be done online. Consumers are satisfied because of secure transaction whereas businesses are in profit by getting customers without any physical efforts. The most important feature provided by e-commerce is equality. From huge industries to smaller companies can compete on same platform. Likewise customers are able to purchase goods of all ranges without observing the reputation of any particular shop. People are very much friendly with e-commerce because it keeps a trail of individual's interest and advertise accordingly. It impresses people with its availability.

Although social media is centre of attraction for youngsters, the consumption of data is done by e-commerce on large scale. E-commerce uses data driven method which promotes re-marketing to convey costumers without any direct conversation. There are some simulation methods developed in Artificial Intelligence to provide assistance to the queries of customers, which gives the feeling to the customer that they are wandering in real market. Some loopholes attacking on its security can be avoided by some prevention. In e-commerce Personalization was incorporated to get the personal and transactional data of customers like name, title, organization, purchase history etc., which helped the organization for better market. Hyper-personalization has stepped up one step further and it utilizes behavioural and real-time data of the customer to create highly contextual communication that is relevant to the customer and gives him a complete personalized view of products i.e. the products in which he is interested.

## II. TYPES OF E-COMMERCE

E-Commerce is categorized into six major types. They are as follows:

### 1. Business To Business (B2B):

This is nothing but the online transaction among businesses. Stakeholders involved in this transaction are manufacturer, wholesalers and retailers. It is operated by the producers and traditional commerce wholesalers. It helps smaller industries to connect with larger once for raw materials without third party interruption which further helps them to reduce production cost.

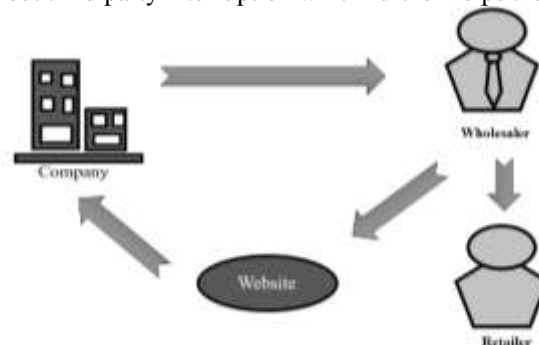


Fig. 1 Business To Business (B2B)

### 2. Business to Consumer (B2C):

Most of the people are engaged in this type of e-commerce. It reduces the commission which is obtained by traditional sellers and it is beneficial to consumer. Since there is a huge amount of traffic on such sites business organizations are also satisfied

and they easily offer discount on various products. Consumers don't need to check out for recent products, it keeps updating customer's view area. Because of competition among businesses, consumers get products of their choices in reasonable rate.

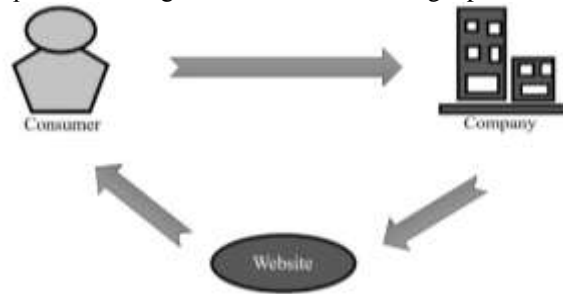


Fig. 2 Business To Consumer (B2C)

3. Consumer to Consumer (C2C):

E-commerce is best platform for re-marketing. It mainly concentrates on profit of stakeholders. It proves that role of consumer is not only to buy a product but also to resell it. Without any marketing skill consumers can resell their products with the help of third party. There is no constraint for product to be purchased. Also it gives opportunities to other consumers to buy respective products without wasting money on original products with little compromise in quality.

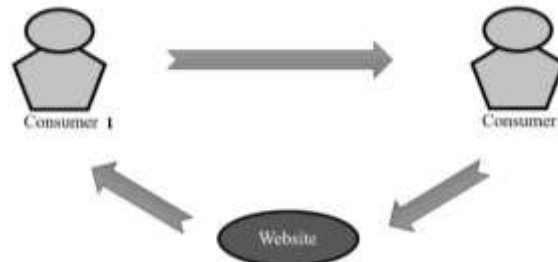


Fig. 3 Consumer To Consumer (C2C)

4. Consumer to Business (C2B):

It reverses the traditional sense of marketing. It is an example to show interdependency between consumer and business. Though businesses have strong manpower they need some logic based stuffs which are fulfilled by consumers. Consumer can apply for copyright before handing over the product to business for long time profit. Example products can be logos, photographs, etc. Consumers can be a temporary part of any organization without being employee of it. It builds the consumer's confidence and keeps several opportunities in front of one to progress himself.

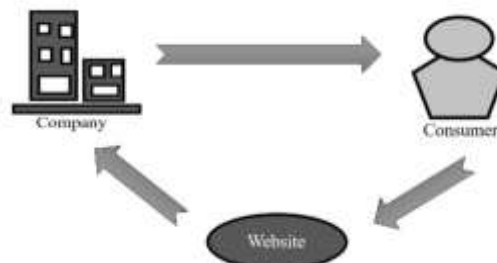


Fig. 4 Consumer To Business (C2B)

5. Business to Administration (B2A):

Sometimes it may possible that there is no individual consumer should be serviced. In such cases public administrations are the client. It occurs in fields like employment, security and many other social services. For an individual consumer e-commerce uses data driven method likewise IT services to administrations according to their needs. This indirectly satisfies individual and government as well. It maintains neutrality in society. The stakeholders involved in this may be third party which makes public administration to communicate with business.

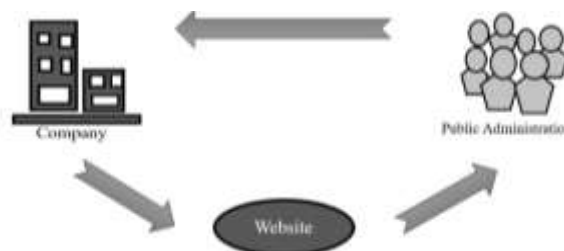


Fig. 5 Business To Administration (B2A)

### 6. Consumer to Administration (C2A):

It supports democracy by easily connecting people to administrations to place their opinions and to show their disappointments. Consumers can be aware of their responsibilities with this type. Also administrations experiences presence of consumers and it may lead to transparency. Online bill payment, taxes, e-health are the examples of it. B2A and C2A are thus concern about efficiency and easy usability of services provided to the citizens by government and vice versa.

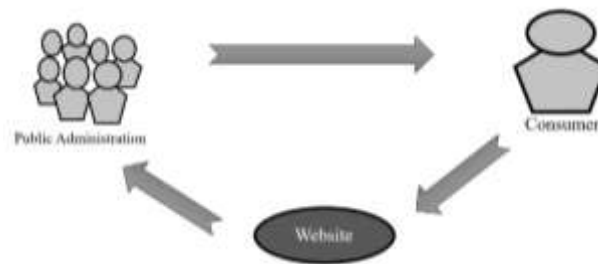


Fig. 6 Consumer to Administration (C2A)

## III. REASONS BEHIND GROWTH OF E-COMMERCE:

### 1. Growth of mobiles with internet:

Growth of e-commerce is considerable, which is 19% all over the world and 90% of the INDIA. India have 119 crore of unique mobile connection and 48 crore of internet penetrations. People prefers post-paid recharge or pre-paid unlimited offers to use data as much they want. Now a days Reliance “Jio” has major contribution in growth of e-commerce. Because of home delivery services like Zomato, Swiggy, Amazon pantry, etc consumers are attracted towards e-commerce. Due to increasing importance of Smartphone everyone prefers digital marketing and it helps in growth of e-commerce.

### 2. Availability:

It is not possible to be available physically in traditional stores but with the help of e-commerce businesses are available for consumers. It reduces the efforts of retailer to be available for limited customers which are near to it. E-commerce does not use actual workers for its availability. It may use Artificial Intelligence to do so. There are no boundaries for customers. They can operate as per their convenience.

### 3. Security:

E-commerce itself stands for everything online. Lack of human interruption may cause security issues. E-commerce uses third party like Paytm, Bhima for payment, so there may be risk of payment fraud. Financial consequences affect Brand’s reputation and destroy consumers’ faith. Some prevention should be followed to avoid security attacks.

### Preventions:

- Authentication: Before any transaction to be done it is mandatory to check whether the person is authenticated or not.
- Multi-Layer: Security system should be multi-layered. SSL and SHTTP are the protocols used in security layers.
- Transparent transactions: Transactions should be verified manually to avoid fake users.
- Unique and unbreakable credentials: User should have the ability to recognize the secured websites and to set the unique password.
- Empower handlers: Intruders are enough smart to damage any e-commerce service. Hence to prevent them technically empowered man-power is required.

### 4. Reduced operational cost:

Traditional marketing enables limited number of customers to interact hence cost per transaction is high whereas in case of e-commerce huge amount of consumers are handled with equal cost of transactions. The cost of maintaining a virtual store is less than that of brick and mortar store. E-commerce requires a warehouse or direct connection with manufacturer unlike the traditional sellers requires store inventory. E-commerce does not require man-power to handle customers. Office rent, employee salary and overtime such type of terms do not exist in e-commerce. Virtual stores make profit without occupying the space and investing more time.

### 5. Quality measurement by consumer reviews:

It is a platform where consumers can place their reviews accordingly businesses improves quality of products and administrations enhances their performance. The aim of e-commerce is to satisfy customers’ need. Hence one can analyse any online service with the help of customer review. There are several methodologies used to classify reviews into positive and negative sentiments. These sentiments are nothing but the metrics of success of e-commerce services.

#### 6. Efficiency and Operability:

Availability, flexibility and data driven method increases efficiency of e-commerce services. It is easily operable and it do not require any criteria to acquire. Using various frameworks like bootstrap and CSS websites are made responsive to be user-friendly. This feature makes B2C e-commerce more effective.

#### 7. Enhanced performance using AI:

E-commerce has reduced the required amount of man-power whereas AI is helping it to do so. Performance of AI made Business Insider to predict that 85% of customer interactions will be managed without a human by as soon as 2020. The technical improvements in AI have provided a competitive edge to businesses or developers. Pinterest's chrome extension enabling user to select an item in photograph online and asking for similar item uses image recognition software implemented AI.

#### 8. Digital India:

Digital India is a best example of reason behind the growth of e-commerce. Internet Penetrations are in more amounts in urban area as compared to rural area. Indian government is trying to reduce this gap in next few years to available customers in large amount for e-commerce. Digital India has promised broadband connection to 2, 50,000 villages by 2019 and with the budget of Rs.3,073 crores for FY 18-19 and it is planning to generate numerous jobs too.

### IV. BENEFITS OF HYPER-PERSONALIZATION

Hyper-personalization has come into sight with the aim of integrating marketing, sales and social information for a more seamless and engaging consumer experience.

1. Hyper-Personalization helps to have more efficient way of individual targeting.
2. Hyper-Personalization is creating an experience that more closely mirrors the one shoppers find in brick-and-mortar stores.
3. Individualized promotions are possible.
4. Businesses are gaining more progress.
5. Business is able to merge the results into their return-on-investment (ROI) reports.

Thus Hyper-Personalization effectually connects merchandisers to keep their products and services top-of-mind, build relationships, and, ultimately, capture and retain customers The key is developing communication that is highly personalized for each recipient.

This personalized marketing environment takes into consideration consumers' very different needs and preferences, and creates highly meaningful, effective communication that ignites associations and influences behaviour.

### V. CONCLUSION

E-commerce is easily operable and time saving because there is no need to wander whole market. It is comparable and profitable. With the help of the bunch of information consumer can analyse product on the basis of price and quality. Consumers do not require higher qualification to operate it. It is benefit centred transaction service so anyone can purchase as well as sell on same platform. Since it is a platform for virtual. Organizations are benefitted by reduced operational cost. The major motive of any organization is to build the faith in consumers' mind for their product and it fails when security attacks occur. We need to provide customers with high level of personalized security with respect to their information and gain their confidence. Hyper-Personalization plays a major role for giving customers with effective E-Commerce.

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