

Chapter 2: Emotional drivers and cognitive triggers in designing personalized service interactions

2.1. Introduction to Personalized Service Interactions

Despite the profound changes over recent decades in the relationships between firms and consumers, fueled mainly by advances in information technology, academic theorists have frequently overlooked this new reality. Product marketing, more specifically the traditional 4Ps (product, pricing, placement, promotion) approach still dominates. Service marketing and management is dominated by the modified 4Ps framework of services marketing - services and products are essentially the same, with a few tweaks to reflect the intangibility, inseparability, heterogeneity, and perishability inherent in service offerings. Products must be designed around buyer wants and preferences, and priced and promoted accordingly; goods-focused financial and production criteria always dominate (Brakus et al., 2009; Lemon, 2016; Alibage & Jetter, 2017).

In service interactions, however, the relationship between a provider and a consumer is much more dynamic. Most services are produced and consumed at the same time and place in real-time, and the desire is for services to involve varying degrees of interaction between the provider and the consumer, creating a tailored experience. This means perceptions of service interaction should be weighed more heavily than perceptions of the product bonsai model. Experiences should not be thought about as a new category of offering but as a new lens for addressing how all companies will create value. Service interactions cannot be designed using traditional P-based strategies. Efforts to improve service interactions must be made by managing interactions on the ground. Yet these very interactions are being transformed by technology in ways that produce startlingly familiar - yet different outcomes.

Although service experiences are more intangible and personal than those associated with products, we submit that there are also benefits to be derived from products becoming more experiential and less tangible. This returns us to the subject of interactions. Novel advancements in technology promise to facilitate the development

of far more tailored experiences offered by-products than ever. As products and experiences increasingly draw on the realms of service, we can now consider a hybrid bonsai model of value co-creation. Value, rather than perceptions of products or services, now needs to be posited at the intersection of products, services, and experiences (Puccinelli et al., 2009; Verhoef et al., 2009; Zhou et al., 2021).

2.1.1. Significance of Tailored Service Experiences

In an esoteric sense, personalization symbolizes an adaptive and enhancing creation of experiences that are unique and special for the engaging individual. Yet in everyday usage and by mere exposure, the user has experienced the term personalization in distinction to standardization ubiquitously when it comes to services via online channels. Depending on the context, the term personalization is interchangeable with other commonly used terms like customization or individualization. However, the focus of this thesis is on service interactions, which include a strong service component of the entire offering and additional service delivery activities. In this specialized area, the desirable experience of service recipients and delivery is critical for success at various phases.



Fig 2 . 1 : Creating Unique Service Interactions

Successful companies are aware of the significance of the service experience for them and their clients. Thus, they are investing substantially in creating exceptional service experiences. This holds especially true for the new market players, servicing customers via the Internet. Nevertheless, the importance of service experiences is often neglected in the area of classical service providers, like banks and airlines, who seem to focus myopically on back-office efficiencies, widening the gap between standard service provision and what is feasible. Having acknowledged that the one-size-fits-all paradigm

does not satisfy a customer's or a business partner's growing appetite, service interactions are turning out to become an attractive and promising area of service marketing. But there is much to explore. Blank-canvas projects, intended to allow service designers to rethink business fundamentals yield only little outcomes.

2.2. Understanding Emotional Drivers

Customer satisfaction is positively influenced by service providers' efforts to design practical personalized services following customers' needs and preferences. Companies are rarely fully aware of their customers' situations or unique characteristics. However, service providers can access adequate data about customers and derive such information from it by utilizing data mining and analytical tools. This information can help automate service interactions based on customer and context profiles with little or no human involvement. Delivering highly tailored services can be a challenge for service providers because consumers often unconsciously develop whimsical service preferences that are difficult to derive from operational data. These preferences often have an emotional nature, which makes recognizing them challenging.

Defining Emotional Drivers

While the concept of "emotional triggers" describes a momentary and transitory emotional state caused by an event, "emotional drivers" refer to deeper-rooted needs and motives. These motives can be lifelong lasting or show a longer-term frequency. Optionally, the term driver is associated with emotional motives that are the primary influence factors for a particular customer. Other authors considered the words "drivers" and "triggers" interchangeable, as well as the terms "emotional" and "affective." However, they stated that Hedonistic or positively valenced explanations represent "affective drivers," while theories on negatively valenced "dispositions," such as the need to belong or evolutionary disadvantages when avoiding risks, are consistent with interests of "affective triggers." For the sake of simplicity, and because this research is primarily based on the concept of Schmitt, the terms "drivers" and "emotional drivers" will be used interchangeably in the following. Consequently, we define emotional drivers as longer-term influencing factors with an emotional motive nature affecting a customer's behavior.

2.2.1. Defining Emotional Drivers

Customer experience researchers and practitioners have long recognized the importance of emotions in a customer's interaction with a service. Emotional connection, emotion experience, feeling, affective commitment, and emotional experience are all terms that

have been used to describe this phenomenon. However, they typically use these terms in different contexts and with different definitions. Therefore, a better understanding of emotions in the services context is needed. While there is no commonly accepted definition of emotion, it is generally accepted that emotions are complex psychological states experienced by humans that involve cognitive, physiological, and behavioral responses to social stimuli. These emotional reactions to significant events influence customers' behavior because emotions can affect perceptions and attitudes, cognition, attention, interpretation, and memory. Consequently, it is vital that service providers can identify customers' salient emotional drivers and emotional triggers.

An emotional driver can be defined as any critical underlying condition associated with certain desired classes of valence or arousal that can create significant and lasting emotions in a person. Emotional drivers influence the specific emotions that people experience when they envision the fulfillment of needs or wants. Hence, emotional drivers are the keys to understanding speculative emotional responses. However, no emotional driver model has received universal acceptance or even considerable attention. Most of the models have focused only on the universal needs of certain salient emotions. However, such universal needs do not provide sufficient differentiation to identify the key emotional drivers of different classes of salient emotions. This differentiation is critical since marketers are primarily concerned with advertising the needs that will drive the target emotion that will subsequently drive the behavior.

2.2.2. Types of Emotional Drivers

Emotional drivers have long been segmented. In this section, we set out to clarify these differences, presenting the more accountable classifications and identifying the main types of emotional drivers, with an emphasis on those occurring during service transactions.

Two main distinctions are made when classifying emotional drivers: basic versus self-conscious emotions; and hedonic versus nonhedonic emotions. These can be considered the two ends of a classification continuum. On one end, self-conscious emotions converge around feelings of pride, guilt, and envy that relate to conformance or violation of specific, culturally defined social standards. Positive and negative self-conscious emotions are deemed hedonic emotional drivers.

On the other end, there are basic emotions that focus on feelings such as joy, anger, sadness, distress, and fear/disgust. Each of these emotions involves a limited set of specific motivations. Those primarily related to goods and services are joy, sadness, anger, and disgust. The corresponding basic emotions are deemed non-geonic emotional drivers. Close analysis shows that the self-conscious and basic emotions set is not

exclusive and many emotions are commonly recognized as either self-conscious or non-self-conscious. Pride is regularly put in the hedonic group and closely compared with joy.

This clarification shows that almost all the emotional drivers can be hedonic emotional drivers but only hedonic emotional drivers can be classified as self-conscious emotional drivers. Service firms need to use self-conscious emotional drivers as referents for the design of service interactions inclined to generate self-hedonistic.

2.2.3. Impact of Emotions on Service Interactions

Emotions are an integral part of customer service interactions, influencing every moment of decision-making and assessment. The design of a personalized service experience should reflect these emotional interactions and try to maximize positive customer emotions while minimizing negative customer emotions. Decision-making is a process of selecting consequential options, including interpreting and anticipating their affective valence. Customers use emotions as one important factor in decisions about which service provider to use when several possible service providers satisfy functional expectations sufficiently but have differential offerings in terms of emotional attributes, such as warmth and trust. The customer audience will be attracted to service providers that communicate the emotionally positive aspects and emotions relevant to the personalized service interaction.

Reviews in the service literature also stress the cognitive interactions in simple emotional and cognitive triadic models, providing evidence that both emotions and cognition are important in service interactions and jointly impact service experience on very different levels. Yet, empirical research in service delivery is sparse and has emphasized cognitions, following the more general research trend of neglecting the importance of emotions in provider–customer interactions. Research in psychology stresses that emotions can influence cognition and decision-making, both in terms of the actual, momentary interactions and as part of a longer, cumulative timeframe of the provider–customer relationship. The emotional atmosphere and emotions elicited in a person but also self-created in the course of the emotional episode, have strong effects. Emotions can even influence learned and cognitive decision rules – the considered parameters and their importance – what emotions are formed and experienced during service interactions and how emotional triggers support the design of the personalized service experience.

2.3. Cognitive Triggers in Service Design

1. Overview of Cognitive Triggers

Cognitive triggers in service interactions are mental shortcuts, heuristics, or cues that can be triggered by and combined with external factors on the process level and enable customers to make decisions regarding their service encounters in an automatic and evaluative mode. The underlying mental models of customers can be utilized by service companies to make selections regarding services, outcomes, or experiences easier for customers, by understanding the processes, specific heuristics, and rules of thumb that the heuristics represent. Creating and designing triggers in service encounters leads customers to service choices in a way that, even if the customers realize they are being guided in making that decision, they believe that leadership is both conscious and benevolent. By instilling faith in leadership, the trust that is created engages customers and ensures that they take the services or paths designed for them in the cognitive tunnel.

2. The Role of Cognitive Triggers in Decision Making

In many cases, the judgments and decisions of customers are heavily influenced by what they see or by how a particular problem is presented to them. The responding influence created by elements in the environment imposes this choice and a prescribed solution due to requirements of availability and accessibility. Change is easy, intuitive, avoids explanation and justification, and usually requires little thinking. This influence may stem from the fact that decision-makers – and humans at large – are cognitive misers. They always seek the most efficient way to cope with an information-saturated environment. Humans are usually logical and rational, and apply such approaches when it is appropriate to the particular situation; they avoid hard work when the goals at that moment could be achieved by less demanding work. However, there are circumstances under which a business/service operator can stimulate customers to simplify their factors of choice, behavior engagement, and judgments.

2.3.1. Overview of Cognitive Triggers

The question of how to optimize complex choices has stimulated a host of interdisciplinary studies that consider and utilize cognitive triggers in choice architecture to deter or direct destination decision-maker behaviors. By utilizing insights from behavioral science and experimentation to identify and apply behavioral triggers that can nudge individuals toward the most appropriate choice, service firms can design more effective customer decision-making environments. The successful implementation of triggers allows service designers to maximize the anticipated benefits to the customer and/or the economy while reducing the probability and risk of undesired outcomes. Thus, the practical application of cognitive behavior modeling through cognitive triggers can

enhance service innovation. Currently, practical insights regarding how to apply cognitive triggers to inform service design and optimization are scarce. The present research reveals critical conceptual foundations to assist a firm understanding of cognitive triggers. In addition, we discuss the function and use of decision-making and interaction cognitive triggers, demonstrate trigger effect magnitude differences by behavior function, and present insights into cognitive trigger pairing.

In contrast to general cognitive design principles, which ease cognitive load or frustration, cognitive triggers draw from an understanding of human measurement error or cognitive dissonance and address the cognitive biases that impede good decision-making to enhance rather than just ease service interaction challenges. Cognitive triggers can create special service cues or prompts that lead to better interaction. Cognitive triggers can de-bias choice stimulus environments. When coupled with emotional drivers, they allow deeper resonance with authentic behavioral cues that lead consumers to both better decisions and a better service experience. Enhancing the quality of decision-making and choice enhances the health of service systems. This is most clearly seen and experienced in the heuristics and programming of choice architecture of nudge theory-based systems.

2.3.2. The Role of Cognitive Triggers in Decision-Making

Cognitive triggers play a significant role in the decision-making process, from choice architecture to nudges and cues. Factors such as defaults, priming, framing, and temporal difference are at the forefront of how choices are architected. The design of many service choices has a large influence on whether or how they are undertaken. For instance, leaving tasks such as tax filing to be done at the end of the tax year risks that people put them off for too long. Tourism service companies can alleviate - through choice architecture - the fact that tourists tend to procrastinate the booking of their vacations. Instead of just presenting the choice of the tourism product to be booked, they could architect the choice such that a default travel period is set if the vacation is not booked by a certain date, as well as inform the customer about the possibility of extending or reducing this vacation window. Some heuristics, like taking the last vacation week will save the traveler high season prices, or booking a product that is close to another – in time or programmatic decision – will certainly help decision makers.

While some tend to look only at the consequences expressed in utility changes, others like to consider the satisfaction of the customer, at least short or medium term, in addition to the long-term alternative-based decision utility. This element has raised some skepticism. There is, however, no evidence that satisfaction and decision alone matter, even if they reflect somewhat different perspectives and periods of the decision process.

In most cases, the optimization of consequences and decision satisfaction is consciously and unconsciously balanced.

2.3.3. Cognitive Biases and Their Influence

A cognitive bias is essentially an aspect of incentive, behaving in a specific way in terms of our beliefs, biasing one toward using heuristics. If a heuristic is activated to assist with judgment or decision-making, an individual may be more likely to exhibit confirmation bias, also known as directional, consensus, or belief bias. Hence, one tends to search for, and interpret, favoring variability for confirmations of what one already believes. Such biases can seriously compromise a designer's ability to look outside of their experiential and perceptual filters. The availability heuristic is often incorrectly used for decision-making since the heuristic is supposed to simplify the process of decision-making. The potential of these heuristics is more likely than not to be flawed and lead to sub-optimal decisions. Individuals are very often impulsive and quickly process and consume experiences and/or information. This umbrageous aspect of individual participants interacting with businesses leads to an inclination or tendency toward certain poor behaviors. The framing effect states that identical stimuli can reward and punish appropriately selected aspects of that stimulus, thereby leading to opposite decision-making tendencies. Another behavioral heuristic utilizes the anchoring effect, whereby an initial assessment of an experience in perceptual terms becomes a psychological anchor that one continues to use.

In an interaction, if the first experience is perceived as negative, over time the negative assessment 'bubbles up' and creates an experience 'worth forgetting', because it is attributed greater weight by the customer than several positive experiences. The focus theory suggests that people become centered on the predominant aspect or aspect dimensional level in service. When a customer experiences multiple aspects during a service exchange, the aspect that stands out the most from his or her expectations will likely be valued the most and have a strong influence on how he/she evaluates the service experience, and that recollection will then tend to bias subsequent evaluations of service interactions. This is biased information processing.

2.4. The Intersection of Emotions and Cognition

The research domain acknowledging the growing importance of cognitive and emotional processes originated to bridge the gap between early cognitive efforts, which neglected the multifaceted role of emotions, to more recent cognitive-inspired research in the area of emotion. Cognition was initially viewed as an autonomous process underpinning the traditional information processing perspective. Such an isolated view of cognition and

attempts to study internal mental processes only through constructs such as memory, perception, and attention created a distinct, if not prevalent disconnect between cognitive science and the field of emotion.

The resulting dichotomy gave rise to a critique of cognitive models that ignored the emotional mediation of information processing. Early research argued against a modular view that presented cognition as a well-ordered set of independent mental processes; instead, it proposed that cognition derives from a multitude of specialized systems with strong emotional ties that shape and mediate the flow of information inside or across cognitive systems. Feedback loops between cognition and emotion are quite abundant at both the input and output ends of cognitive processing, particularly in the forms of unmediated perceptual flows and autonomic expressions, both of which strongly influence the workings of cognitive states and processes.

Given the above points, we would argue the acceptance of coping in both cognitive science and the science of emotion completes the necessary convergence between a social approach to emotion grounded in the historical roots of Vygotsky's work on the socio-cognitive origins of internal thought processes together with the role of autonomous internal emotional states and advanced theory-of-mind skills in the understanding of sociocognitive functioning during development.

2.4.1. How Emotions Influence Cognitive Processes

Over 2,000 years ago, the ancient Greek philosopher asserted that emotions - as well as logic - play an essential role in persuasion. Today we know both emotions and cognition processes are also involved in the design of compelling interactions personally tailored to meet individual user needs. Emotional and cognitive processes have been considered mutually exclusive systems for judgment and decision-making for several decades. Traditionally, emotions were framed as disruptive in cognitive processing contexts, being an unhelpful factor to "sound" cognitive processing. Such traditional cognitive models aimed to describe a uniquely rational and logical individual ruling out the influence of emotion on human action. However, it has become clear that emotions influence many cognitive processes relative to marketing and interaction influence. Specifically, cue selections that precede more complex decision-making or judgment processes are affected by positive and negative emotional states, with consumers making more advantageous decisions in a state of joy or happiness.

Emotion primarily affects cognitive elaboration amount and intensity - both the prototype of associative memory and the range of representations accessible at a given time. Additionally, emotions can influence choice strategies applied, affecting random access from the memory of possible choices and their attributes, and thus the overall

provided insights into how task-specific design features of service contexts impact cognitive load and as a result customers' emotional responses, which in turn affect service outcomes. Lacking further understanding of how task-specific design features trigger dynamics of cognitive load and affect customers' subsequent emotional responses when facing a challenging service interaction, leads to implicit and disjointed guidance for guidelines. Worrying about an unfulfilled need for product information has been found to affect task performance and customers' subsequent emotional responses and satisfaction levels.

2.5. Designing Personalized Service Interactions

Inherently distinctive service interactions are typically highly engaging experiences because they are catered to individuals. However, it is difficult to achieve true “one-of-a-kind” personalized interactions in digital immersive service contexts due to a lack of underlying service and contextual drivers attributed to the typical absence of physical elements. Currently, the trend for most service interactions is to be designed around a script, either laid out in advance or delivered by an autonomous or semi-autonomous service agent, such that the exchange becomes undifferentiated. Digital immersive experiences designed as distinct combinations of content, context, and service are superbly enabled to elicit and accentuate emotions that resonate with service experience contributors, tune them to the same emotional frequency, engage them collaboratively, and cater to their particular tastes. They also extend the actor-observer effect to service experiences, so enhancing the sense of agency, enjoyment, and ownership.

Giving inherent service content a distinguishable emotional charge generates the template for a specialization design. Alternatively, proactively inducing shared feelings in an audience can lead to an active co-creation design. Whether realized via a specialization or co-creation design, a digital immersive service experience is captivating only while engaged. Hence, its hyperreality needs to foster a suspension of disbelief and afford sensory enrichment via well-tuned emotional engagement and the elicits of the actor-observer effect, tuning contributors into a zone from which they cannot be tempted away. It is at this instance that their service roles turn from being conditional to experiential and the relevant trigger is real-time availability of pertinent cognitive capacity.

2.5.1. Framework for Personalization

While there is extensive academic literature about the emotional and cognitive aspects of behavior change in the areas of behavioral economics, consumer psychology, and persuasion, we were unable to find concepts directly geared towards personalization in

service interactions. This is surprising, as personalization is a major touchpoint for service differentiation, and is linked to customer loyalty and retention. To help designers who want to offer clear and engaging personalized services, we built upon the emotional drivers and cognitive triggers for behavior change and formulated a conceptual framework: the Emotional Drivers and Cognitive Triggers Framework for Personalization.

In the ETP framework, we utilize the emotional drivers that help shape healthy actions (the four ‘A’s: achievement, association, altruism, and autonomy), as well as the hierarchical organization of the eight cognitive triggers that help shape healthy actions. This cocktail of emotional drivers and cognitive triggers can be tailored to fit the area of concern that needs shaping: the right motivation and action, and the appropriate timing, are paramount in service interactions. Together they suggest highly personalized choices of the style, the content, and the timing of the communicated message. The ETP framework helps service designers curate a personalized experience that targets an individual. Personalized behavioral communication services can also be used to detect, prevent, and communicate about behavioral problems in a modular way. Behavioral communication services aim to motivate the person affected to take small steps towards behavioral change and offer more and more help as they improve. Thus, service designers are obliged to incorporate these drivers and triggers into their design expert knowledge regarding the behavioral domain of the service concerns.

2.5.2. Techniques for Emotional Engagement

The need for emotional engagement by users of services has been established in the literature, and discussions of various technologies designed specifically for creating positive emotional experiences and engagement have led to research guidelines. There is also support for the consideration of different types of emotions at different stages of the user journey. It is equally important to understand what mechanisms can be used to create such affordances of products and services. The types of interaction cues that can be used in Emotional Design include aesthetic cues, symbolic cues, conceptual cues, feedback cues, and narrative cues. Based on these insights, both symbolic cues and narrative cues are examined here more closely. Service designers can use symbolic cues to signal what kinds of experiential and participatory values are available to users via a given service. Narrative cues relate to experiential triggers present in service, and they can help guide the design and configuration of those underlying mechanisms.

Several narrative triggers include the exploration trigger, the threat trigger, the curiosity trigger, and the self-discovery trigger. Generic narrative cues signal that the user can expect pre-packaged social experiences, while specific narrative cues inform them about a fully-fledged storyline influencing choices and consequences. In the context of service

design, understanding both general narrative and experiential triggers provides the designers with the tools to identify and fulfill user needs through positive emotional engagement. Such procedures involve multiple facets of user interaction, including the processes of exploration and discovery, cognitive and social learning, and immersion.

2.5.3. Utilizing Cognitive Triggers in Design

Consumers judge service interactions as personal, to compare mentally and emotionally with treasured moments of receiving and providing service. In addition, services involve an interaction process, during which time cannot be retrieved and every moment matters. For these reasons, serenity and joy are priority emotional segments to maximize the service interaction. They should be achieved by designing processes that generate positive emotional triggers during the interaction. First, joy and serenity can co-exist with seven experiential benefits. It is by providing elements that enhance the exploratory, social, and emotional benefits that joy and serenity may be fully achieved. The exploratory benefit is related to novelty and discovery. The social benefit derives from sharing the experience with others. The emotional benefit refers to feelings and mood. The assortment of elements to create the experience must be carefully considered to fulfill the anticipated personal emotions that consumers connect to the service. For example, being among the first to discover a new product or sharing the excitement with peers at a concert is part of every innovative product service and entertainment experience.

As a social being, a consumer derives a personal benefit when creating something unique for herself or others. This is called the creative benefit, which provides positive emotions of joy and serenity by designing amazing and unique service experiences of interpersonal bonding. Such elements of co-design vary according to the service offered but can incorporate creating new menus in a restaurant, helping to design a car, and commemorating losses through designing unique funeral arrangements, among others. By triggering the creative benefit, the service becomes unique, personal, and emotional, while providing serenity and joy effects for both parties. The creation itself provides positive emotions while the consumers wait for the finished service. The anticipation stage of the process thus becomes a positive experiential moment. Overall, there is no single formula to create a joyful, serene, and memorable moment of interaction.

2.6. Future Directions in Service Design

1. Emerging Trends

Many organizations are working on designing how customers interact more seamlessly and conveniently with their services. However, several different trends are emerging in-service experiences, some of which support growing service personalization, while other emerging trends offer more commoditized offerings that downplay the value of human effort in the service experience. Services, which provide value through human effort have been a focal point of research in the service marketing and service operations equivalently. However, with the increasing utilization of Artificial Intelligence (AI) as a way to perform service tasks related to customer transactions, have the decision of how to design service interactions offering different degrees of human involvement changed. So how can service design help organizations to intelligently stylize their service offerings in a market of hypercompetitive marketing conditions?

2. The Role of AI in Personalization

Intelligence that allows customer artificial service interactions may reduce the need to have human agents performing all the tasks associated with the service interaction, allowing companies to streamline their costs. In this process, companies have adopted a variety of methods such as outsourcing, offshoring, and even tools that support the automation of repetitive service tasks. Examples of this practice include chatbots or self-help kiosks in the airline industry, developed to help customers deal with many of the inquiries that otherwise would necessitate interacting with a customer service representative in the call center. Services should now be designed around an automated environment operating under the supervision of a human agent, only for an edge experience that requires such intervention.

2.6.1. Emerging Trends

Widespread exposure to digital and Data Digital technologies and their capability to support the automation of customer service touchpoints have led to increased customer expectations regarding service personalization. Customers want to feel unique, choosing products, services, and experiences that talk to their emotions and can deliver that sense of immersion and closeness that they are after. After the almost wildest rise of technology in recent decades, we are experiencing a time when digital tools have to serve humans, and not the other way around. The great design challenge of the 21st century is how to personalize experiences before, during, and after service delivery, ensuring a seamless and emotionally gratifying experience for customers and profitable outcomes for businesses. As artificial experiences are taking over, customer desires to enhance their human experience, creating immersion with virtual and augmented reality, gaming,

and experiential marketing, all fueled by digital technologies. Customization is a hot trend, and more and more technology-based service tools are enabled to support service personalization. Virtual reality, augmented reality, and digital interactions can help recreate the effects of goods and services, triggering cognitive and emotional responses that predict customer buying behavior. Digital-native generations are seeking ultra-personalized services that feed on their emotional instincts and emotional influencers, using insights coming from the emotions and sentiments triggered when experiencing a brand, product, or service.

Design for personalization is both exciting and risky. As services increasingly draw on the Digital layer to trigger emotions that pave the way for cognitive acceptance, how do we nourish customer trust while ensuring success, satisfaction, and joy in service experiences? Companies adopting a digital-first approach for the personalization of customer interactions should be aware of and counter the risk of alienating customers even more, through the application of algorithms that shape service interactions based on data analysis, which can lead to increased commoditization and disengagement and more negative emotional experiences, especially for high-involvement customers. Service Acting, service emotion, and service cognition theories can act as a guide for Physical stage dominant companies, wanting to scale digitally, to productively incorporate AI-enabled solutions for personalized service experience interactions, and rely on new-age customers' emotional and cognitive responses to such novel interactions.

2.6.2. The Role of AI in Personalization

While the trend towards greater emphasis on user empowerment, independence, and emancipation may make it seem counterintuitive to suggest that emerging trends in service personalization will progress still further at the expense of the individual, there are several reasons why the opposite appears likely. Firstly, the continued improvement and refinement of AI technologies can be expected to extend the capabilities and reach of service providers. The latest generations of machine learning techniques, particularly developments in the fields of machine learning and natural language processing, have made it far easier and more cost-effective for organizations to leverage data. Companies are now able to analyze much larger quantities of consumer data, generating insights that seemed beyond the reach of their capabilities just a few years ago. Mass personalization in terms of anticipating and fulfilling individual customer needs based purely on historical patterns of behavior is an increasingly attractive proposition for service organizations.

While concerns regarding data security and privacy are rightly at the forefront of public attention and governmental regulations are starting to change the data collection

landscape, it is inevitable that the scale and scope of data available to businesses will continue to grow. The potential predictive power of AI-driven analytics is staggering—even upon data collected with consent and for purposes other than immediate customer engagement. One branch of behavioral science maintains that user behaviors are more predictive of attitudes and emotions than what consumers themselves report, and without a compelling unprompted reason for why it should be different, there is no reason why these behavioral indicators should be less rich and effective for service design and service delivery than the subjective evaluations preferred by designers working in a more traditional model.

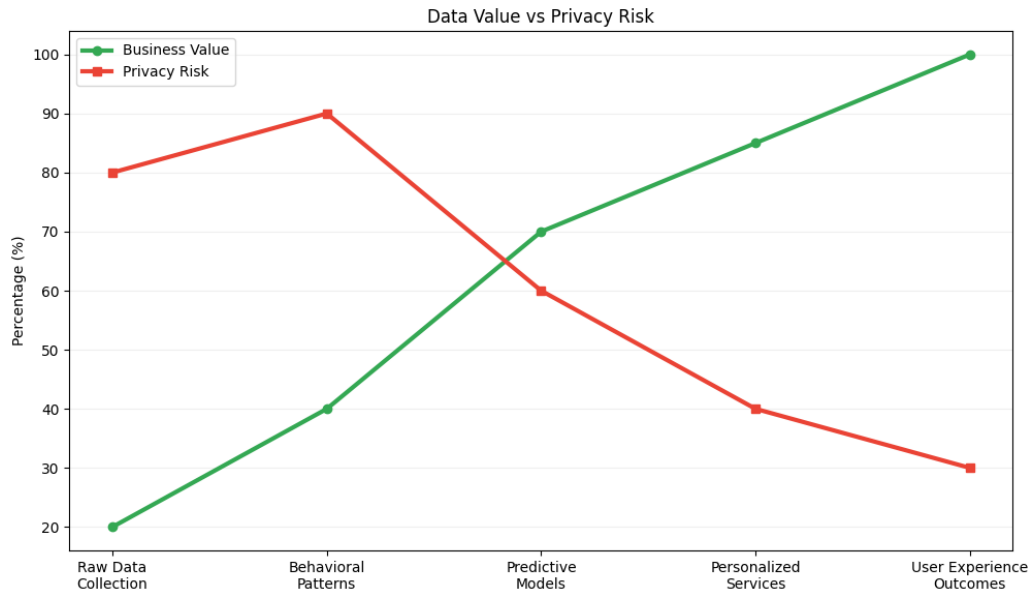


Fig 2 . 3 : Data Value vs Privacy Risk

2.7. Conclusion

This essay has discussed the effects of personalization at a system level and the challenges of segmenting customers by their emotional and cognitive preferences. The essay warns against inappropriate levels of personalization. We have used Emotional Intelligence with the creation of eight personas that can be used as the basis for interactions underpinning persuasive technology design. Working with these emotional and cognitive archetypes will allow designers to create better customer engagement experiences. One way of seeing the differing emotional motivations that people have is through the lens of attachment theory. Working with the Emotional Driver Hand will assist designers in providing suitable interaction modalities to engage with customers, allowing recognition and validation of customer preferences. Furthermore, interaction designers must be cognizant of the cognitive triggers to ensure the right type of

interaction to engage the customer how they want to be engaged. Augmented personalization recognizes that while all people have similar emotional drivers influencing everyday interaction, the relative importance placed on these drivers varies by individual. Personalization removes the bonds on customer engagement usually seen with persuasive technology and allows customers to own their contact preferences and control how they interact with a business.

Personalized service has taken on a new importance in recent years, as customers increasingly demand both more engagement and control. Responsive personalized service meets these demands. Providing both means businesses need to understand the emotional and cognitive drivers each customer holds. As more businesses implement responsive service, and use feedback and big data to determine past service patterns, there lies the potential for complacency about their customers' emotional and cognitive preferences. This complacency needs to be challenged as preferences may have changed with this new environment. Providing responsive service can help a business thrive with a loyal customer base, returned customers, and the business community and the wider world.

2.7.1. Key Takeaways and Implications for Personalized Service

Leveraging the emotional drivers and cognitive triggers may help operations managers in a wide range of service industries that rely on customer interactions, or touchpoints, to increase customers' satisfaction or loyalty. The findings may be particularly useful for some service industries where customer interaction is more extensive, such as travel and tourism, healthcare, professional services, and financial services. For service interactions where customers display greater diversity in needs and where it is important to increase customers' positive experience as well as optimize service productivity, an improved understanding of customers' emotional responses and their underlying cognitive triggers may benefit both customers and service providers. Examples include senior customers, or long-term customers, undergoing major life transitions, such as retirement or a major health concern. Other areas of research may be more interested in using this knowledge to influence specific customer behaviors. This includes donation to a charitable cause, purchase intention, and diffusion of information. For companies in highly competitive markets, improving recurring customers' decision-making is also a useful goal; they would be more willing to pay a premium for that brand and less likely to switch to competitors.

Although cognitive triggers are delivery mechanisms to elicit emotional drivers, the cost of applying cognitive triggers may or may not be justified by their impact. For example, using relevance to elicit a customer's need for security may not be justified for a company whose core competence is low operational cost and high efficiency. Doing so

may, however, make sense for a company that positions itself in a niche market, such as luxury goods, where services may be personalized to create a more positive experience.

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