A Work Project, presented as part of the requirements for the Award of a Master's degree in
Management from the Nova School of Business and Economics.
Business in Practice: Driving Transformation in the Automotive Industry – A Comprehensive Analysis & Personal Insights
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Abstract

In an era of sustainability-driven transformations in the automotive industry, a group of students participated in a business simulation with the goal of crafting a strategy towards electrification and value creation. This thesis, divided into two parts, explores the theoretical framework underpinning the company's strategic approach. Simultaneously, it delves into the personal aspects of leadership and conflicts faced during this endeavor.

Keywords

Automotive Industry; Simulation; Sustainability; Team Dynamics

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I. Leaftech's Firm Analysis

A. Introduction

In the dynamic business realm, the interplay of sustainability, technology, and consumer preferences is reshaping corporate strategies (Mckinsey 2016). In this context, the automotive industry, accounting for 20 percent of global greenhouse gas (GHG) emissions (Heineke and Laverty 2023), is undergoing a profound transformation. The pressing need to reduce vehicle emissions, paired with announcements of bans on internal combustion engine (ICE) vehicles in many developed nations, has left original equipment manufacturers (OEMs) with no choice but to adapt (KPMG 2019).

As the automotive sector races toward a new world, the mission is to guide a company through sustainable reinvention, gaining market share in a fiercely competitive automotive landscape and delivering a product portfolio aligned with evolving customer preferences (IndustryMasters 2023). LeafTech, the simulated company, commits to accelerating the global adoption of electric vehicles and sustainable transportation solutions. Rooted in this mission lies a deeper purpose: to drive positive environmental and societal change. Strategic transformation requires carefully examining internal strengths via the Strategic Diamond Framework and external factors through Porter's Five Forces and PESTEL Analysis. The following chapter delves into Leaftech's marketing navigation through the STP Analysis and the marketing mix, representing the conduit for the strategy's translation into market action. This shift requires merging sustainability with innovation, a pivot at the core of the company's strategy. The innovation journey will then be approached via the three phases of the Innovation Cycle: Discover, Deliver, and Develop. Upholding innovation, sustainability, and customer-centric values, LeafTech aims to transform the automotive landscape.

B. Strategy: LeafTech's Road to Sustainability

Porter (1996) highlights the strategic importance of discerning what not to do, underscoring the significance of organizational prioritization in aligning Leaftech's efforts with its goals. As we navigate through strategic decision-making, competitive advantage rests in establishing and preserving a difference. This difference can be anchored in addressing customer needs, enhancing accessibility, or diversifying the range of products and services offered (Porter 1996). The company acknowledges that enhancing operational efficiency alone by minimizing DOI and maximizing factory utilization does not suffice for achieving the highest value added in the simulation (Porter 1996). In this sense, Porter's generic strategies describe a company's pursuit of competitive advantage within its chosen market scope. A differentiation strategy is relevant when a firm competes in a competitive market, possesses distinctive capabilities that are difficult for rivals to replicate, and targets nonprice-sensitive customers (Porter 1980). By taking this route, LeafTech aims to foster enhanced brand loyalty and justify a premium pricing strategy (Kopp 2021). Furthermore, the company's strategic vision extends to a Blue Ocean Strategy, tapping into unknown market space free of competition (Kim 2023). The pioneering launch of the Micro 0E represents this approach, generating demand for a previously untapped segment. Successful strategies build upon comprehensive excellence and integration (Porter 1996). To effectively pursue differentiation and blue ocean strategies, Leaftech must possess distinctive resources, capabilities, and strategic arenas that set it apart in the highly competitive automotive industry. In fact, these elements are centered on innovation, revealing the latest R&D developments on connectivity, extended range, and autonomous driving. The Strategy Diamond Framework (Hambrick 2001) (Figure 1) provides a valuable perspective for understanding these critical aspects of the company's strategic positioning.

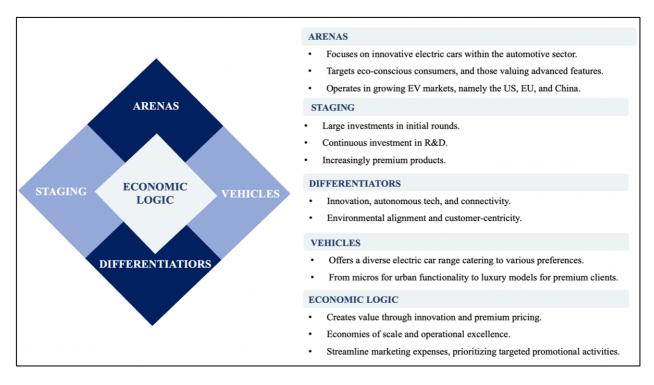


Figure 1 - Strategy Diamond Framework

The evolving social, technological, and environmental landscape portrayed in the simulation pointed toward electrification. The unfolding of events, including the \$20B investment into charging stations in Q6, the shift in buyer preferences in Q14, and the unveiling of 'Project Green Car' in Q16 (IndustryMasters 2023), mirror worldwide predictions. In the face of these developments, LeafTech's resolute ambition was to expedite full electrification. Even though the automotive companies are optimistic about reaching this point, they foresee it will take longer to achieve it. BMW and the group's Mini and Rolls-Royce brands plan to have 50% and 100% EV sales share by 2030, respectively. The plan is well underway, with BMW Group's 112.3% increase in EV revenues during Q1 2023 compared to the preceding year. Anticipations for 2024 are equally promising, with the primary growth drivers projected to be fully electric vehicles from the high-end premium segment, including the new BMW 7 Series and the enhanced BMW X7 (BMW Group 2023a). The following PESTEL Analysis (Aguilar 2008) (Figure 2) addresses the impact of global disruption, technological advancements, and evolving consumer behaviors in the automotive industry.

Political

 The evolving political landscape has introduced fluctuations in trade tariffs between major economies like the US, EU, and China, impacting LeafTech's international business operations, and pricing strategies.

Economic

• The increasing number of buyers market potential in various regions impact LeafTech's sales and expansion strategies.

Social

Social attitudes toward sustainable transportation are reinforced by the growing awareness of environmental issues, increasing the demand for
eco-friendly alternatives. This enhances Leaftech's consumer appeal.

Technological

The growth of fast and accessible charging stations addresses range anxiety concerns and promotes EV adoption. Furthermore, LeafTech's investment in connectivity, autonomous driving, and charging infrastructure positions it to leverage these technological trends effectively.

Environmental

• The push for reduced carbon emissions plays a vital role, as LeafTech's focus on electric vehicles and sustainable transportation solutions becomes a competitive advantage.

Legal

· Stringent regulations that dictate emissions standards drives the company's focus on developing vehicles with lower carbon footprints.

Figure 2 - PESTEL Analysis Framework

Despite the potential for electrification, short-term barriers to achieving mass market penetration persist, particularly concerning electric vehicles' cost and range limitations (McKinsey 2023). Acknowledging this, LeafTech initiated its R&D investments as early as Q4 with connectivity technology and Q5 with automated parking and infotainment services (Appendix 1).

On the other hand, with operational production lines across the three major regions, LeafTech is strategically positioned to offer its services globally. An analysis of the market dynamics in the first year indicated that the demand for ICE vehicles remained dominant in the US, EU, and China markets. However, Competitor C had already made headway by introducing two electric vehicles, and Competitors A and B had entered the scene with four hybrid models. When applying Porter's Five Forces Framework (Porter 1980) (Figure 3), it becomes clear that the bargaining power of buyers and the rivalry among competitors are prominent. This is due to high competition in a nearly saturated market, giving customers substantial bargaining power and the ability to switch to substitute products if expectations are not met.

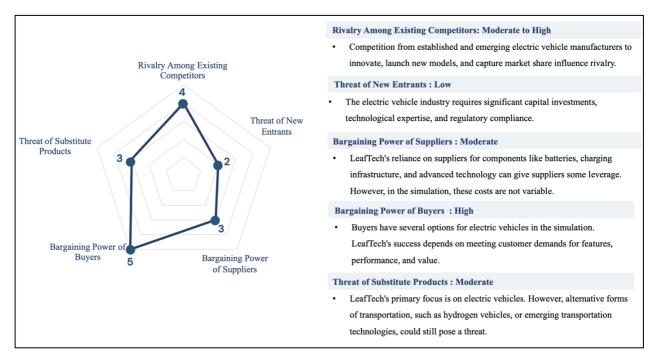


Figure 3 - Porter's Five Forces Framework

Similarly to the BMW Group, Leaftech offers products designed for current and future generations, symbolizing premium personal mobility through cutting-edge innovations and a commitment to shaping the future of sustainable transportation (BMW Group 2023b). On the other hand, Leaftech aligns with various United Nations Sustainable Development Goals (SDGs), tapping into the eco-conscious consumer market. This vision is further emphasized in the upcoming section.

C. Marketing: LeafTech's Pursuit of Premium Excellence

A marketing strategy incorporates various initiatives to foster financial growth and ensure organizational sustainability (Nuseir and Madanat 2015). A thorough market analysis, including competitors' strategies, customer needs, and the organization's resources, is needed to devise a result-oriented marketing strategy (Winer 2004). Firstly, Leaftech identified internal strengths such as R&D capabilities, available funds to invest, and global presence. However, the initial vehicle portfolio faced regulatory pressures and lacked customer appeal,

prompting the need for strategic restructuring. Regarding customer preferences, the marketing director observed a growing emphasis on environmental concerns, cost-effectiveness, and technological advancements (Forbes 2021). However, these preferences varied across regions in the simulation (Appendix 2). In the US, automobiles symbolize status, warranting higher expenditures on luxury, convertible, and SUV models. Conversely, the EU market values functionality, while the Chinese market prioritizes practicality, leading both regions to favor compact and executive vehicles optimized for urban mobility. Regarding the competitive landscape, contenders B and C demonstrate robust technological advancements translating into significant initial market shares across all regions. Thus, it underscored the imperative for Leaftech to bridge the innovation gap through substantial R&D and product development investments.

A marketing segmentation approach is taken to understand customers' needs, allowing improved responsiveness regarding the product to offer. Leaftech identified a segment comprising environmentally conscious customers from younger generations, with mid to high-income levels (demographic); who valued innovation, advanced technology, and ecofriendly alternatives (psychographics); across the US, EU, and China regions (geographic). This segmentation allowed Leaftech to target early adopters of EV technology, emphasizing advanced features and driving experiences and positioning itself as a premium provider.

The second step involves developing the marketing mix, including price, place, product, and promotion. The fundamental concept of the marketing mix is to excel by understanding and fulfilling customer needs and requirements (Kotler and Armstrong 1972), thereby enhancing customer loyalty toward the company's products (Nuseir and Madanat 2015).

Product, constituting the initial "P" of the marketing mix, refers to a good introduced into the market for consumption or use by customers to fulfill their needs (Kotler and Armstrong 1972). Leaftech boasts a diverse vehicle portfolio, covering luxury, executive, compact,

SUV, and convertible models, appealing to a broad audience (Appendix 3). The management of these products' lifecycle is crucial, not just due to the significant upfront costs but also because of its impact on market acceptance (J. D. Townsend 2013). This involves dynamic product introduction and discontinuation decisions, considering emission levels, revenues, and gross margin. As inferred previously, Leaftech's strategy involves promoting full electrification, even at the expense of immediate profitability. Therefore, Diesel models were phased out in Q16 due to a 20% demand drop. This approach extended to gasoline compacts and convertibles, replaced by hybrid versions with reduced emissions, demonstrating an outstanding commitment to environmental responsibility.

On the other hand, price is a pivotal factor in meeting customer needs (Nuseir and Madanat 2015). Price represents the value assigned to a product and greatly influences repurchase decisions (Kotler and Armstrong 1972). Moreover, it is crucial for customer satisfaction and product loyalty (Peter and Donnelly 2012). Leaftech introduces products to the market at a high initial price through a price-skimming strategy. Over time, depending on customer reactions and market dynamics, the company gradually reduces prices (Hayes 2022). Highly loyal customers tend to trust a company's products more and are willing to pay premium prices (Reichheld and Sasser 1990). In Q14, Leaftech achieved 100% customer satisfaction (Appendix 4), which enabled the company to command a higher premium for its technological innovations, emphasizing a strong value proposition. This strategic approach establishes Leaftech as a symbol of cutting-edge technology, aligning with the company's goal of cultivating brand loyalty among consumers who seek the latest advancements. On the other hand, poor pricing decisions can hinder organizations from capitalizing on valuable market opportunities, leading to financial decline (Khouja and Robbins 2005). For instance, when the Lux34E was launched in Q16 at a price 22% higher than the competition average, it only secured a 4.1% market share, the lowest among luxury-class vehicles. It was not until

Q22, after an 11% price reduction, that it achieved the highest market share across all vehicle classes at 5.2% (Appendix 5). Moreover, regional variations in willingness to pay influence pricing, with a 1% premium applied in the USA and a 1% promotion in Asia. Operational feedback also shapes price adjustments, enabling LeafTech to fine-tune its pricing strategy based on factors like production capacity and demand. For example, in response to a surplus of 27.7k City L23 units and to align supply with demand, LeafTech implemented a substantial price reduction of 15% in Q19. This strategic move maintained competitiveness and secured a leading position in revenues within the compact class (Appendix 6) and a 39.8% gross margin in Q20.

Lastly, promotion techniques significantly impact a product's pricing, as they are vital in attracting and persuading customers to make purchases (Nuseir and Madanat 2015). LeafTech has two primary promotion approaches: car-specific and general for the overall brand. The product lifecycle highly influences the car-specific approach, as in each phase the vehicles demand a tailored promotional approach (Novák 2011). During the introduction phase, Leaftech prioritizes creating awareness and generating anticipation by allocating nearly up to the 3% of revenue maximum limit. As the product advances into the growth phase, the firm gradually curtails marketing expenses. In the maturity phase, where the product holds a stable market position, promotional efforts continue, albeit with a more costeffective approach. Finally, in the decline phase, the spending in marketing gets closer to the 0.5% of revenue mark to ensure the product's withdrawal from the market (Novák 2011). Additionally, LeafTech employs a strategy of increasing marketing expenses for low-demand products. When a product faces excessive inventory levels and underperforms, we boost marketing expenditure per car sold, and vice-versa, which inversely relates to the product's price variation. The objective is to stimulate demand, clear surplus inventory, and improve the product's market performance. Overall, Leaftech's fleet exclusively consisted of ICE vehicles initially, and marketing expenses were relatively modest, amounting to 1.55% of revenue after the first year. However, as LeafTech introduced new cars, the company intensified customer promotions, training, print, and TV campaigns. This can be seen as a strategy of pushing demand, as the emphasis is on actively driving and stimulating demand (Novák 2011). Leaftech continued its demand-creation efforts by showcasing a \$20M luxury prototype in Q12 to position the brand as a provider of high-quality, innovative products, mirroring a strategy similar to BMW's through the i7 prototype (Ewing 2023). As Leaftech's global market share grew to a market-leading weighted average of 39% in Q22 (Appendix 7), the marketing expenses as a percentage of revenue decreased, shifting towards a strategy that relied on the product's inherent features to attract customers. By the end of the simulation, the marketing spend per revenue reached 3.6% (Appendix 8). For context, in 2022, both BMW and Mercedes-Benz Groups allocated 4.3% and 6.3% of revenue to selling expenses (BMW Group 2023c) (Mercedes-Benz Group 2023). LeafTech's lower percentage spending on marketing indicates effective management of marketing costs compared to other premium providers in the automotive industry.

D. Innovation: Designing Tomorrow's Transportation Solutions

Innovation is defined as introducing something new, or a new idea or method (Merriam-Webster 2023). The first definition portrays innovation as an outcome, while the second presents innovation as a process. In fact, innovation should be considered both, in order to realize its full potential (Kahn 2018). Innovation management faces two contingencies: uncertainty, which is tied to the rate of change of technologies, and complexity, driven by technological and organizational interdependencies (Tidd 2001). In the automotive industry, innovation management is complex due to high uncertainty and complexity, which demands

adaptability and continuous learning from industry participants (Tidd 2001). Recognizing the dual nature of innovation and addressing the challenges posed by uncertainty and complexity, LeafTech relies on the Discover, Deliver, and Develop model (Golob and Flores 2015) to stay ahead of technological shifts.

In the Discovery phase, the marketing and innovations directors collaborate to scan the market and competition for potential opportunities. This involves closely examining the evolution of customer preferences, notably the surging demand for EVs and cutting-edge technologies, especially within the luxury segment (J. D. Townsend 2013).

During the Development phase, the innovation director outlines the technical specifications of the offerings, entailing investments in disruptive technology-driven trends, namely electrification, autonomous driving, and connectivity (Mckinsey 2016). The interplay between innovative product development and supporting infrastructure is paramount in the automotive industry (J. D. Townsend 2013). In fact, this approach is consistent with the United Nations Sustainable Development Goals, particularly Goal 9, which emphasizes three crucial elements of sustainable development: infrastructure, industrialization, and innovation (SDG). Notably, in the initial two years Leaftech allocated \$2.310M to R&D for product development and infrastructure, equivalent to 6.8% of revenue. To put this in perspective, in 2022, General Motors, a leading innovator in the automotive industry, allocated 6.3% of its revenue to R&D, while the top 10 innovative automotive companies averaged 4.1% (WardsAuto 2023). This data underscores Leaftech's exceptional commitment to sustainability and innovation as it strives to deliver the latest and most advanced features to the market. On the other hand, it is crucial to note that the benefits of innovation are temporary, emphasizing the importance of ongoing product innovation in the competitive automotive sector (J. D. Townsend 2013). Leaftech's R&D investments persisted until the final allocation in Q14, totaling \$400M for infrastructure enhancement. Additionally, LeafTech adopted an open innovation approach, seeking an opportunity to explore new ideas and markets. The company committed \$400M to a collaborative venture with a car manufacturer in Q24 to leverage external expertise (Powell 1990) and explore car-sharing strategies, ultimately resulting in an annual profit contribution of \$428M.

Furthermore, in alignment with the United Nations Sustainable Development Goal 12, which advocates for sustainable production and consumption patterns, Leaftech strongly emphasizes product durability. Durability is the likelihood that a product will remain operational over a certain period or usage level (Mayyas et al. 2012). By designing products with extended lifespans, Leaftech actively contributes to reducing resource consumption and minimizes waste generation. These sustainability principles are gaining prominence across the automotive industry, with initiatives such as the Environmental Product Declaration (EPD) introduced by the Volvo Car Corporation (Mayyas et al. 2012). Additionally, leading Asian automobile manufacturers like Toyota, Honda, and Nissan have incorporated sustainability into their manufacturing practices. For instance, Toyota Corporation significantly focuses on three sustainability pillars: reduction, recycling, and reuse (Mayyas et al. 2012).

Finally, in the Delivery phase, the marketing and innovation directors coordinate the product launches, aligning market competition with consumer preferences and the company's current fleet status. In this sense, Leaftech's product innovation initiatives can be categorized into three types (Kahn 2018). Firstly, the company engages in product improvements by introducing upgraded versions of our models, incorporating enhanced features into each iteration. An illustration includes the replacement of the hybrid compact and convertible models with more advanced electric versions of the vehicles. Furthermore, introducing the Micro OE in Q11 represented a New-to-the-World product, creating an entirely new market segment. This innovation can be characterized as radical (Lettice 2002), part of a

diversification strategy aimed at expanding the product portfolio. Finally, the launch of the Offroad EL23E in Q22, following the success of its predecessor SUV12E, signifies a Line Extension. This new model provides incremental benefits, such as an extended range and Connectivity Level III, designed to cater to the preferences of premium customers.

In effect, pursuing a high rate of product introductions and substantial R&D spending leads to lower short-term profitability and ROI (Tidd 2001). This phenomenon can be attributed to disruptive innovations often having a slow initial adoption rate, appealing to only a slim portion of the market (Zapata and Nieuwenhuis 2010). In this regard, the Diffusion of Innovation Theory illustrates that the adoption rate accelerates as more consumers accept the innovation and eventually reaches a critical mass (Beal and Bohlen 1956). In Q15, Leaftech successfully phased out all ICE vehicles and renewed its fleet, with three cars in the growth phase and two in the introduction phase. Becoming a market pioneer in the exclusive production and sale of electric vehicles marked a significant milestone, aligning with achieving Sustainable Development Goal 13, aimed at reducing emissions. However, the company experienced its lowest added value in that quarter, amounting to \$644M. The heavy investments, coupled with limited short-term demand, made it challenging to attain the desired levels of profitability. Nevertheless, as technology advances and consumers gain additional information, mainstream conventional products eventually lose appeal (Zapata and Nieuwenhuis 2010). A notable example of the slow short-term adoption of disruptive innovation was the introduction of Executive 23E in Q11. Targeting a premium consumer segment, the innovation director incorporated top-of-the-line features into the car. Even so, the consumers were not yet attracted to such advanced features. Competitor C's Executive vehicle, equipped with more traditional features and priced at a 15% discount, led category revenues until user preferences shifted in Q14. Despite these initial challenges, a higher rate of product introduction and R&D investment correlates positively with long-term business

value enhancement (Clayton and Turner 1998, 2000). From Quarter 15, Leaftech's total value added remarkably increased by 516%, reaching \$3.426M in Q28 (Appendix 9), highlighting the significance of continuous innovation efforts in Leaftech's journey.

E. Conclusion

In summary, the simulation experience facilitated by IndustryMasters proved to be an intense and immersive journey. It illuminated several critical aspects of the corporate world, influencing not only my professional development but also revealing fundamental principles of management.

A key takeaway from this simulation was the realization of how the departments within a company must collaborate for it to thrive, all aligned with a shared strategic vision. The interdependence between marketing, innovation, and strategy arose during the company's shift towards sustainable electric vehicles (EVs). The strategy outlined a long-term vision for this transition, emphasizing sustainability and EV technology leadership. Simultaneously, the marketing director conducted market research, identifying environmentally conscious consumers who value cutting-edge technology and innovation. This informed the innovation director's choices for EV development, focusing on extended range, connectivity, and autonomous driving. As a result, LeafTech successfully launched a series of electric vehicles that met sustainability goals and resonated with the target audience.

In effect, strategy emerged as a central theme throughout the simulation. It became evident that a well-defined and adaptable strategy is paramount to effectively guiding a company's decision-making processes. Moreover, anticipating and understanding customer preferences before implementing a marketing strategy is fundamental in navigating the highly competitive landscape of the automotive industry. Flexibility in marketing strategies is

pivotal, as we need to respond to the ever-changing forces of the market influenced by governmental regulations, changing consumer preferences, and prevailing market competition. Additionally, market intelligence fulfills a pivotal role in innovation. It is not enough to design and launch the most innovative product, as it must fit with market needs. Understanding customer behavior, industry trends, and competitive landscapes is crucial for driving successful innovation. Moreover, as Leaftech continually introduced new products and adapted to evolving customer preferences, sustained innovation proved vital for the company's long-term success. This necessitates fostering a corporate culture marked by curiosity, adaptability, and a commitment to learning from both achievements and setbacks. Furthermore, recalling the wisdom of Henry Ford, "If I had asked people what they wanted, they would have said faster horses". This insight reinforces the importance of thinking beyond the evident and embracing innovative thinking.

Overall, the simulation experience with LeafTech was an immersive learning journey that deepened my understanding of the automotive industry and equipped me with invaluable skills and perspectives. It highlighted the significance of strategy, marketing, and innovation, as well as collaboration, adaptability, and customer-centricity, in navigating the complex terrain of the corporate world. As I step into the future, equipped with the knowledge and insights from this simulation, I am well-prepared to make a meaningful impact in the professional landscape.

II. Personal Reflection

A. Introduction

In the business world, conflict is an inevitability, a force that can either drive growth and innovation or sow discord and stagnation. How we navigate and resolve conflicts within a team can determine not only the team's immediate success but also its long-term potential. In effect, as Thomas Isgar infers, "Conflict can destroy a team which has not spent time learning to deal with it."

This chapter delves into two pivotal critical incidents that significantly shaped the simulation experience. The first incident revolves around the use of sarcasm, while the second centers on a heated discussion. These incidents offer a chance to examine moments of tension and disagreement, analyzing the reactions elicited and the measures taken to promote growth and positive change. Through a reflective lens, I aim to obtain valuable insights into the complexities of teamwork, conflict resolution, and personal development within a dynamic and competitive corporate environment.

B. Critical Incident #1: Implication of Sarcasm on Team Dynamics

During the second week of the simulation, LeafTech's cohesiveness flourished as the group dedicated time during university hours and outside to build strong bonds. When collaborators actively engage in project creation and advancement, they typically find more enjoyment in their work and demonstrate a higher level of commitment (Elmuti 1996). In fact, the collective team mood, referred to as the affective state shared by team members at a particular moment (Kelly and Barsade 2001), was consistently positive. We understood that by

embracing our individuality while respecting and supporting each team member's uniqueness, the team's unity would become a powerful one (Towery 1997).

Nevertheless, despite our unity, the performance in the simulation regarding critical key performance indicators (KPIs) such as revenue, sustainability, and total value-added left room for improvement compared to other groups. As the marketing director, I felt particularly responsible for the underwhelming revenues and was determined to improve our results. Team members should commit time and energy to discover extraordinary ways of achieving their objectives (Knight 2015). Thus, I took on the responsibility of conducting comprehensive research at home, developing an Excel file to analyze our competitors.

As we approached the third year of the simulation, we gathered in the conference room, ready to discuss the decisions. I was eager to present the analysis I had been working on diligently. The best option was introducing the electric compact in the Chinese market. However, during the discussion, one of my teammates presented an alternative idea that diverged from my well-prepared proposal. Initially, I felt a sense of frustration and uncertainty, as the suggestion seemed to lack the depth and research I had put into my recommendation. Furthermore, I questioned how the decision aligned with the person's role. Knowing we needed to act strategically to stay competitive, I couldn't shake off the urgency that enveloped me, hampering my understanding of the colleague's perspective.

In the heat of the moment, I responded with sarcasm, expressing my disagreement in a way that was not conducive to constructive teamwork. My teammate, who had put forth the alternative idea, appeared taken aback and hurt by my reaction. The atmosphere in the room suddenly became tense, and my colleagues shifted uncomfortably in their seats, sensing the discord among us. I regretted my impulsive response almost immediately, realizing that it was not only unprofessional but also detrimental to our team dynamics. The camaraderie we had nurtured within the team seemed momentarily fractured. The realization that my

comment had been hurtful weighed heavily on me, and I felt a surge of guilt and regret.

Sarcasm, a form of verbal irony, can convey a negative and critical attitude towards individuals or situations Cheang and Pell 2008), and is often seen as less confrontational than direct criticism (Gerrig and Goldvarg 2000). However, despite its potentially non-hurtful intent, the negative connotations associated with sarcasm can undermine trust and damage interpersonal relationships within teams, resulting in subpar performance (Huang, Gino, and Galinsky 2015). In the aftermath of the incident, I engaged in an introspective process to understand my role in the unfolding events. I acknowledged that my thought process had been clouded by emotions and frustration over the perceived impracticality of the idea. My response had been triggered by a sense of urgency to voice my concerns, but I had failed to consider the emotional toll sarcasm would take on my colleague.

Lencioni (2010) addresses the absence of trust as a team's first and foundational dysfunction. Trust is the willingness to be vulnerable and transparent with one another, to admit mistakes, and to ask for help without fear of judgment or reprisal. Team members must be open and honest, leading to guarded communication and genuine collaboration (Lencioni 2010). In fact, team members often hesitate to participate in productive, constructive conflicts when there is a lack of trust. Moreover, the fear of conflict results in avoiding disagreements or uncomfortable conversations, with individuals opting for superficial harmony instead (Lencioni 2010). Consequently, I found myself engaging in both the dysfunctions of the absence of trust and fear of conflict. Instead of directly confronting the issue, I resorted to sarcasm to convey my dissent, unintentionally fostering an environment of distrust. Later in the session, another team member hesitated to share an approach they had in mind, recalling the tension caused by my sarcasm previously. This hesitancy deprived the team of a potentially game-changing idea and highlighted how my actions had inadvertently suppressed creativity.

Reflecting on this episode, I realize the significance of psychological safety and trust in fostering effective teamwork. Gittel and Carmelli (2009) highlight the potential consequences of irony and sarcasm in communication, emphasizing how such language can create a hostile work environment and undermine trust among team members. My critical incident became a vivid example of how the absence of psychological safety hinders open communication and impedes the free flow of ideas.

My response to the incident was shaped by a sincere desire to rectify the situation. I approached my colleague privately, taking responsibility for my words, and offered a heartfelt apology. I conveyed my genuine appreciation for their contribution to the team and admitted that my response had been unwarranted and unprofessional. My colleague accepted my apology graciously, and we candidly talked about how we could better communicate and collaborate moving forward. To address the impact of this incident on our team dynamics, I took the initiative to implement a mediation system as a proactive measure. As a team of seven students, we acknowledged that conflicts and disagreements were inevitable, but we wanted to ensure they were addressed healthily and respectfully. Thus, I designated two team members as mediators who had received training in conflict resolution and communication techniques. Mediation can be understood as an extension and elaboration of the negotiation process, entailing the involvement of a neutral third party, who is acceptable to all parties involved and who maintains impartiality (Moore 1988). The primary role of this neutral mediator is to facilitate and guide the contending parties in voluntarily reaching a mutually acceptable settlement (Moore 1988). Thus, when a disagreement occurs, the involved parties can approach the mediators, facilitating a private and confidential discussion to understand each individual's perspective and concerns.

The mediation system proved valuable in enhancing my emotional intelligence and conflict resolution skills. For instance, during a disagreement over a management decision on capitalizing on the car-sharing concept, the mediators helped us reach a fair and balanced solution. Moreover, as we engaged in more open conversations through the mediation process, we noticed reduced tension and an increased sense of trust among team members. Implementing the peer mediation system not only allowed me to navigate disagreements effectively but also empowered me to grow. It reinforced the importance of emotional intelligence in team dynamics and taught me valuable skills in conflict resolution that will be invaluable in my future endeavors. Overall, this proactive step towards creating a harmonious and high-performing team environment proved beneficial, as everyone's voice was valued, and conflicts were seen as opportunities for growth and learning.

Ultimately, this incident has taught me that communication is a powerful tool that builds or erodes team cohesion (Maduka et al. 2018). Embracing self-reflection and a growth mindset, I am committed to evolving as a team member and a leader, ensuring my words inspire positivity, inclusivity, and productivity. Moving forward, I am determined to practice empathy and active listening, recognizing the significance of each team member's input and experiences. Through this transformation, I hope to contribute to a thriving team environment that harnesses the collective strengths of all its members for the greater success of our shared goals and allows for constructive debate. After all, as Lencioni (2010) brilliantly states, great teams are open and honest, and "unafraid to air their dirty laundry". They openly discuss mistakes, weaknesses, and concerns without fear.

C. Critical Incident #2: Inflexibility in Group Discussion

As we started achieving remarkable results as a team and secured the top position in total revenues, our marketing strategy garnered well-deserved recognition for its accomplishments. As the department lead, I felt unwavering confidence in my strategy and

decisions. These successes increased interest from other groups seeking discussions about my approach. My confidence was soaring, thanks to the introduction of mediators in our talks and the newfound self-awareness in interactions and communication.

Having engaged in dialogues about effectively managing conflict, we had proactively anticipated and mitigated its potentially destructive consequences (Toegel and Barsoux 2016). Our commitment to addressing potential issues before they escalated demonstrated an understanding of nurturing healthy team dynamics. Through these discussions, we realized that team conflict did not solely arise from differing opinions but rather from a perceived incompatibility in how team members approached thinking (Toegel and Barsoux 2016). Equipped with this insight, we handled disagreements constructively, seeking to understand underlying thought processes and motivations that led to divergent perspectives.

Amidst this, my focus shifted from exploring alternative approaches to maintaining my marketing strategy, as I figured that searching and experimenting would no longer guarantee us positive outcomes (Janssen, Van De Vliert, and West 2004). In effect, integrating entirely new ideas would demand significant time and effort (Ford and Sullivan 2004), scarce resources at this point in our pursuit of excellence. Thus, convinced that I had discovered the formula for success, a newfound confidence began to influence my decision-making.

Nevertheless, the pressure to maintain our growth and defend the top position began to intensify. Just a day before our meeting, we engaged in the Team Dynamic Clinics, where we received insightful feedback from teammates. While my overall evaluation was positive (Appendix 10), I was disheartened by the feedback on one particular component - 'Having relevant knowledge, skills, and abilities'. Understanding that my self-perception did not align with my peers' perceptions shook my confidence, casting a shadow over my usual enthusiasm. I realized I had succumbed to the Dunning-Kruger effect, wherein individuals with limited competence in a field tend to overestimate their abilities compared to their peers

(Kruger and Dunning 1999).

As the team geared up for the crucial decision-making session in the fifth year of the simulation, the weight of responsibility and the lingering disappointment from the previous day began to influence my emotions and thinking process. Shortly after we started the session, one of the operations directors suggested increasing the production line of a car. I initially disagreed due to the potentially irreversible changes it could bring to pricing and marketing expenses. My enthusiasm to express my point of view was genuine, as I believed it was the best course of action for our team's progress. However, I failed to consider how my enthusiasm might overwhelm my peers or fuel skepticism, as highlighted by Toegel and Barsoux (2016). As the debate intensified, the mediators agreed with the operations directors' proposal, leaving me feeling isolated in my perspective and triggering a growing unease within me. My initial passion gradually transformed into stubbornness as I clung to my viewpoint with unwavering determination. Emotions ran high, and the air in the room became tense. I was resolute in my conviction, passionately believing that my approach was the right path for the team's success. However, I also felt a sense of anxiety and vulnerability beneath that conviction. I feared that considering alternative perspectives or conceding might undermine the hard-earned progress we had achieved. As the tension escalated, my emotions got the best of me. My heart raced, and my voice grew louder as I vehemently interrupted others, desperate to prove the validity of my viewpoint. In the heat of the moment, I realized that the team was witnessing a side of me they hadn't seen before - a side driven by anxiety and fear of failure.

In retrospect, the lower grade in one aspect of the peer review triggered feelings of defensiveness and insecurity, prompting me to overcompensate for what I perceived as a shortage in my abilities. This desire to prove myself and showcase my competence drove me to assertively advocate for my perspective during decision-making, resulting in a stubborn

and inflexible stance. Moreover, as a fiery-red personality (Appendix 11), my impulsive and competitive nature played a significant role in the incident (Jung 1991). My strong-willed and purposeful demeanor determined me to see my viewpoint through, and my competitive drive intensified the response. The need to be perceived as highly capable and knowledgeable fueled a determination to "win" the argument, causing me to be less receptive to alternative ideas and dissenting opinions. Thus, by inadvertently undermining the collaborative nature of the team's decision-making process, I should have noticed the importance of cooperation and fostering respectful relationships among team members (Smith 1996). Furthermore, the fear of challenging my assertive stance and my desire to dominate the discussion may have discouraged my colleagues from sharing their valuable insights. Therefore, the incident's negative outcome can be attributed to my impulsive nature and frustration from the peer assessment, while coping with the mounting pressure of the final stages of the simulation. In effect, these factors clouded my judgment and prevented me from objectively assessing the situation. In this process, I overlooked the potential flaws in my plan and undervalued my teammates' contributions. As highlighted by Elmuti (1996), the accelerated pace of change demands teams to be dynamic, adaptable, and creative. However, my reluctance to entertain alternative ideas hindered the team's ability to adapt to changing circumstances. Fundamentally, we must embrace constructive debate and consider diverse perspectives to make well-informed decisions (Fletcher and Hartley 2023).

Following this critical incident, I once again recognized the significance of regular self-reflection as a means of personal growth and improved decision-making. Therefore, I engaged in a "Mindfulness in Leadership" online course to strengthen my self-awareness and mindfulness. In fact, numerous studies have documented the positive impacts of mindfulness on individual health, psychological well-being, and overall functioning (Chiesa and Serretti 2011). Similarly, Atkins and Parker (2012) contend that mindfulness can enhance prosocial

values and behaviors by mitigating defensiveness in emotionally challenging circumstances. Hopefully, this will equip me with valuable techniques to become more attuned to my emotions and reactions. I am now incorporating regular self-reflection sessions into my routine. During these moments of introspection, I review my past actions, decisions, and interactions. By examining my behavior with a critical eye, I can identify patterns and triggers that may lead to impulsive or defensive responses. This practice of self-reflection has become an essential aspect of my leadership journey, enabling me to cultivate emotional intelligence and make more thoughtful and empathetic decisions.

In addition to self-reflection, I recognize the importance of actively seeking feedback from my teammates and peers. Constructive feedback provides invaluable insights into how my actions and decisions impact the team dynamics. In fact, it serves diverse functions, such as guiding team activities, identifying potential errors, and stimulating discussion among team members (Gabelica et al. 2014). To ensure that feedback is effective, it should not only point out areas for improvement but also provide valuable learning information that ignites cognitive engagement (Molloy and Boud 2013). Therefore, I proactively engage in open conversations with my colleagues, encouraging them to share their perspectives on my leadership style and decision-making process. By creating a safe and non-judgmental space for feedback, I foster an environment where team members feel comfortable expressing their honest opinions, and I welcome feedback as an opportunity for improvement.

In conclusion, while rooted in good intentions, my fiery-red approach can inadvertently hinder the group's ability to assess situations and make the best decisions collectively. The failure to consider and respect the insights of four team members who disagreed with me deprived us of a more comprehensive evaluation of the options. Acknowledging the potential tension between our team's ready-fire-aim and analytical approaches (Toegel and Barsoux 2016), I am unwaveringly committed to fostering an atmosphere of mutual respect and open

dialogue. Furthermore, I am aware of the role of effective peer feedback in enhancing cooperation and teamwork. Therefore, I am committed to embracing a growth mindset, where feedback is not only welcomed but actively sought, to continually improve both as an individual and as a team member.

D. Conclusion

In the symphony of teamwork, I envision teams as packs of wolves. As cohesion, cooperation, and training determine the survival of a wolf pack (Towery 1997), collective prosperity relies on cohesion, trust, and a shared commitment to learning.

On a personal level, this simulation experience has profoundly shaped my understanding of the future employee and leader I aspire to be. I have learned that managing emotions, making calculated decisions, and maintaining composure in high-pressure situations are invaluable skills. This simulated corporate environment proved to be decisive in developing these qualities, preparing me for the dynamic, ever-evolving nature of the professional world. Additionally, I now recognize the role of self-reflection and peer feedback in enhancing decision-making within a team. In response to the critical incidents encountered, I took the initiative to implement a mediation system, enrolled in a mindfulness in leadership course, and fostered an environment where feedback is actively encouraged as a tool for personal and collective growth. These efforts underscore my commitment to continuous improvement and my aspiration to be an empathetic, reflective, and adaptable leader in the face of future challenges.

III. References

- Aguilar, Francis J. 2008. "Scanning the Business Environment." In *Routledge EBooks*, 39–62. https://doi.org/10.4324/9780080914343-8.
- Atkins, Paul W. B., and Sharon K. Parker. 2012. "Understanding Individual Compassion in Organizations: The Role of Appraisals and Psychological Flexibility." *Academy of Management Review* 37 (4): 524–46. https://doi.org/10.5465/amr.2010.0490.
- Bartram, Dave, and Robert A. Roe. 2008. "Individual and Organisational Factors in Competence Acquisition." In *BRILL EBooks*, 71–96. https://doi.org/10.1163/9789087903725_006.
- Beal, George M., and Joe M. Bohlen. 1956. "THE DIFFUSION PROCESS." *Increasing Understanding of Public Problems and Policies*, January, 111–21. https://doi.org/10.22004/ag.econ.17351.
- Bishop, Sue Marquis, Mark A. Lau, Shauna L. Shapiro, Linda E. Carlson, Nicole Anderson, James Carmody, Zindel V. Segal, et al. 2004. "Mindfulness: A Proposed Operational Definition." *Clinical Psychology-Science and Practice*11 (3): 230–41. https://doi.org/10.1093/clipsy.bph077.
- BMW Group. 2023a. "BMW GROUP STRATEGY." 2023. Accessed July 29, 2023. https://www.bmwgroup.com/en/company/strategy.html.
- BMW Group. 2023b. "Company Reports." 2023. Accessed August 4, 2023. https://www.bmwgroup.com/en/investor-relations/company-reports.html.
- BMW Group. 2023c. "High Pace: Electric vehicle sales BMW brand more than double again in Q1." April 4, 2023. Accessed August 10, 2023. https://www.press.bmwgroup.com/portugal/article/detail/T0412898PT/high-pace:-electric-vehicle-sales-bmw-brand-more-than-double-again-in-q1.

- Carmeli, Abraham, and Jody Hoffer Gittell. 2009. "High-Quality Relationships, Psychological Safety, and Learning from Failures in Work Organizations." *Journal of Organizational Behavior* 30 (6): 709–29. https://doi.org/10.1002/job.565.
- Cheang, Henry S., and Marc D. Pell. 2008. "The Sound of Sarcasm." *Speech Communication* 50 (5): 366–81. https://doi.org/10.1016/j.specom.2007.11.003.
- Chiesa, Alberto, and Alessandro Serretti. 2011. "Mindfulness Based Cognitive Therapy for Psychiatric Disorders: A Systematic Review and Meta-Analysis." *Psychiatry Research-Neuroimaging* 187 (3): 441–53. https://doi.org/10.1016/j.psychres.2010.08.011.
- Clayton, Tony, and Graham Turner. 1998. "Brands, Innovation and Growth: A PIMS Study of Brand Value." *International Journal of Innovation Management* 02 (04): 455–68. https://doi.org/10.1142/s1363919698000201.
- Collins, Nancy L. 1996. "Working Models of Attachment: Implications for Explanation, Emotion, and Behavior." *Journal of Personality and Social Psychology* 71 (4): 810–32. https://doi.org/10.1037/0022-3514.71.4.810.
- Edmondson, Amy C. 2018. The Fearless Organization: Creating Psychological Safety in the

 Workplace for Learning, Innovation, and

 Growth. https://ci.nii.ac.jp/ncid/BB2750129X.
- Elmuti, Dean. 1996. "The Perceived Impact of Team-based Management Systems on Organizational Effectiveness." *International Journal of Manpower*, December. https://doi.org/10.1108/01437729610154136.
- Ewing, Steven. 2023. "2023 BMW I7 Promises Full-Size Luxury and EV Power." *CNET*, April 9, 2023. Accessed September 4, 2022. https://www.cnet.com/roadshow/pictures/2023-bmw-i7-prototype/.
- Fletcher, Ben, and Chris Hartley. 2023. "Into All Problem-Solving, a Little Dissent Must Fall." *People & Organizational Performance Practice*, February,

- 4. https://www.mckinsey.com/~/media/mckinsey/business%20functions/people%20and%20organizational%20performance/our%20insights/into%20all%20problem%20solving%20a%20little%20dissent%20must%20fall/into-all-problem-solving-a-little-dissent-must-fall-vf.pdf.
- Forbes. 2021. "The Future Of Automotive And Mobility." Forbes Innovation. May 5, 2021.

 Accessed August 8, 2023. https://www.forbes.com/sites/sap/2021/05/05/the-future-of-automotive-and-mobility/.
- Ford, Cameron M., and Dianne M. Sullivan. 2004. "A Time for Everything: How the Timing of Novel Contributions Influences Project Team Outcomes." *Journal of Organizational Behavior* 25 (2): 279–92. https://doi.org/10.1002/job.241.
- Gabelica, Catherine, Piet Van Den Bossche, Sven De Maeyer, Mien Segers, and Wim Gijselaers. 2014. "The Effect of Team Feedback and Guided Reflexivity on Team Performance Change." *Learning and Instruction* 34 (December): 86–96. https://doi.org/10.1016/j.learninstruc.2014.09.001.
- Gerrig, Richard J., and Yevgeniya Goldvarg. 2000. "Additive Effects in the Perception of Sarcasm: Situational Disparity and Echoic Mention." *Metaphor and Symbol* 15 (4): 197–208. https://doi.org/10.1207/s15327868ms1504_1.
- Golob, Matic, and Myrna Flores. 2015. "Presentation (PDMA 2015) on Human-Centred Set-Based Innovation Framework to Enhance Innovation: Integrating Set-Based Concurrent Engineering with Design Thinking." *ResearchGate*, November. https://www.researchgate.net/publication/283934649_Presentation_PDMA __2015_on_Human-centred_Set-based_Innovation_Framework_to_Enhance_Innovation_Integrating_Set-

based Concurrent Engineering with Design Thinking.

- Hambrick, Donald. 2001. "Are You Sure You Have a Strategy?" JTOR. 2001. Accessed July 14, 2023. https://www.jstor.org/stable/4165785.
- Hayes, Adam. 2022. "Price Skimming Definition: How It Works and Its Limitations." *Investopedia*,

May. https://www.investopedia.com/terms/p/priceskimming.asp.

- Heineke, Kersten, and Nicholas Laverty. 2023. "The Future of Mobility." *McKinsey Quarterly*, February. https://www.mckinsey.com/industries/automotive-and-assembly/our-insights/the-future-of-mobility-mobility-evolves.
- Huang, Li, Francesca Gino, and Adam D. Galinsky. 2015. "The Highest Form of Intelligence:

 Sarcasm Increases Creativity for Both Expressers and Recipients." *Organizational Behavior and Human Decision Processes* 131 (November): 162–77. https://doi.org/10.1016/j.obhdp.2015.07.001.
- IEA. 2023. "Global EV Outlook 2023 Analysis IEA." April 2023. Accessed August 19, 2023. https://www.iea.org/reports/global-ev-outlook-2023.
- IndustryMasters. 2023. "Business Simulations for Virtual Learning." January 31, 2023. https://www.industrymasters.com/business-simulations.
- Janssen, Onne, Evert Van De Vliert, and Michael West. 2004. "The Bright and Dark Sides of Individual and Group Innovation: A Special Issue Introduction." *Journal of Organizational Behavior* 25 (2): 129–45. https://doi.org/10.1002/job.242.
- Jung, Carl Gustav. 1991. Psychological Types. Psychology Press.
- Kahn, Kenneth B. 2018. "Understanding Innovation." *Business Horizons* 61 (3): 453–60. https://doi.org/10.1016/j.bushor.2018.01.011.
- Kelly, Janice R., and Sigal G. Barsade. 2001. "Mood and Emotions in Small Groups and Work Teams." *Organizational Behavior and Human Decision Processes* 86 (1): 99–130. https://doi.org/10.1006/obhd.2001.2974.

- Khouja, Moutaz, and Stephanie S. Robbins. 2005. "Optimal Pricing and Quantity of Products with Two Offerings." *European Journal of Operational Research* 163 (2): 530–44. https://doi.org/10.1016/j.ejor.2003.10.036.
- Kim, W. Chan. 2023. "Blue Ocean Strategy." Harvard Business Review. April 4, 2023. Accessed August 14, 2023. https://hbr.org/2004/10/blue-ocean-strategy.
- Knight, Andrew P. 2015. "Mood at the Midpoint: Affect and Change in Exploratory Search over Time in Teams That Face a Deadline." *Organization Science* 26 (1): 99–118. https://doi.org/10.1287/orsc.2013.0866.
- Kopp, Carol M. 2021. "Product Differentiation: What It Is, How Businesses Do It, and the 3

 Main

 Types." Investopedia,

 July. https://www.investopedia.com/terms/p/product_differentiation.asp.
- Kotler, Philip, and Gary Armstrong. 1972. *Principles of Marketing*. http://dro.deakin.edu.au/eserv/DU:30016693/adam-frontcovertitlepage-2009.pdf.
- KPMG. 2019. "Mobility 2030: Transforming the Mobility Landscape." *Thriving on Disruption Series*, February.
- Kruger, Justin, and David Dunning. 1999. "Unskilled and Unaware of It: How Difficulties in Recognizing One's Own Incompetence Lead to Inflated Self-Assessments." *Journal of Personality and Social Psychology* 77 (6): 1121–34. https://doi.org/10.1037/0022-3514.77.6.1121.
- Lencioni, Patrick M. 2010. The Five Dysfunctions of a Team: A Leadership Fable, 20th Anniversary Edition. John Wiley & Sons.
- Lettice, Fiona. 2002. "Disruptive Innovation Explored." *ResearchGate*, June. https://www.academia.edu/435280/Disruptive Innovation Explored.

- Maduka, Nnamdi, Helen M. Edwards, David Greenwood, Allan Osborne, and Solomon Olusola Babatunde. 2018. "Analysis of Competencies for Effective Virtual Team Leadership in Building Successful Organisations." *Benchmarking: An International Journal* 25 (2): 696–712. https://doi.org/10.1108/bij-08-2016-0124.
- Mayyas, Ahmad, Ala Qattawi, Mohammed Omar, and Dongri Shan. 2012. "Design for Sustainability in Automotive Industry: A Comprehensive Review." *Renewable & Sustainable Energy Reviews* 16 (4): 1845–62. https://doi.org/10.1016/j.rser.2012.01.012.
- Mckinsey. 2016. "Automotive Revolution: Perspective towards 2030." McKinsey & Company.

 January 1, 2016. https://www.mckinsey.com/industries/automotive-and-assembly/our-insights/disruptive-trends-that-will-transform-the-auto-industry/de-DE.
- Mercedes-Benz Group. 2023. "Reports & News | Mercedes-Benz Group." 2023. Accessed August 9, 2023. https://group.mercedes-benz.com/investors/reports-news/.
- Merriam-Webster Dictionary. 2023. "Definition of Innovation." In *Merriam-Webster Dictionary*. Accessed August 9, 2023. https://www.merriam-webster.com/dictionary/innovation.
- Molloy, Elizabeth, and David Boud. 2013. "Seeking a Different Angle on Feedback in Clinical Education: The Learner as Seeker, Judge and User of Performance Information." *Medical Education* 47 (3): 227–29. https://doi.org/10.1111/medu.12116.
- Moore, C. W., and Nicola Kemp. 1988. "The Mediation Process: Practical Strategies for Resolving Conflict." *R & D Management* 18 (1): 79. https://doi.org/10.1111/j.1467-9310.1988.tb00569.x.
- Motavalli, Jim. 2021. "Every Automaker's EV Plans Through 2035 And Beyond." *Forbes Wheels*, October 4, 2021. Accessed August 22, 2023. https://www.forbes.com/wheels/news/automaker-ev-plans/.

- Novák, David. 2011. "PROMOTION AS INSTRUMENT OF MARKETING MIX." Semantic Scholar. https://www.semanticscholar.org/paper/PROMOTION-AS-INSTRUMENT-OF-MARKETING-MIX-Nov%C3%A1k/a7ba6691bb0e869bc2e880951a156f112ade9f4e.
- Nuseir, Mohammed T., and Hilda Madanat. 2015. "4PS: A Strategy to Secure Customers' Loyalty via Customer Satisfaction." *International Journal of Marketing Studies* 7 (4). https://doi.org/10.5539/ijms.v7n4p78.
- Peter, Jerome Paul, and James H. Donnelly. 2012. *Marketing Management*. McGraw-Hill Europe.
- Porter. 1979. How Competitive Forces Shape.
- Porter, Michael E. 1980. Competitive Strategy: Techniques for Analyzing Industries and Competitors. New York: Free Press; Toronto: Maxwell Macmillan Canada.
- ——. 1996. "What Is Strategy." *Harvard Business Review* 6 (74): 61–78. https://hbr.org/1996/11/what-is-strategy.
- Powell, Walter. 1990. "Neither Market Nor Hierarchy: Network Forms of Organization." *Research in Organizational Behavior*, January. https://www.researchgate.net/publication/301840604_Neither_Market_Nor_Hierarchy_Network_Forms_of_Organization.
- PWC. 2021. "Five Trends Transforming the Automotive Industry." April 13, 2021. Accessed

 September 2,

 2023. https://www.pwc.com/gx/en/industries/automotive/publications/eascy.html.
- Rao, Dileep. 2017. "First-Movers Seldom Win, While First-Dominators Often Succeed And Achieve Staying-Power." *Forbes*, January 24, 2017. Accessed September 3, 2023. https://www.forbes.com/sites/dileeprao/2017/01/24/first-movers-seldom-win-first-dominators-mainly-do.

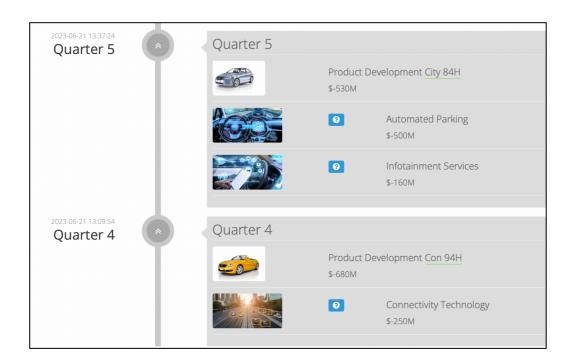
- Reichheld, Frederick F., and W. Earl Sasser. 1990. "Zero Defections: Quality Comes to Services." *PubMed* 68 (5): 105–11. https://pubmed.ncbi.nlm.nih.gov/10107082.
- Shavandi, Hassan, and Ata Zare. 2013. "Analyzing the Price Skimming Strategy for New Product Pricing." *ResearchGate*,

 December. https://www.researchgate.net/publication/287019281_Analyzing_the_price
 _skimming_strategy_for_new_product_pricing.
- Silva, Arlindo, Marco Leite, João Paulo Vilas-Boas, and Ricardo Simoes. 2018. "How Education Background Affects Design Outcome: Teaching Product Development to Mechanical Engineers, Industrial Designers and Managers." *European Journal of Engineering Education* 44 (4): 545–69. https://doi.org/10.1080/03043797.2018.1465029.
- Smith, Jonathan A. 1996. "Beyond the Divide between Cognition and Discourse: Using Interpretative Phenomenological Analysis in Health Psychology." *Psychology & Health* 11 (2): 261–71. https://doi.org/10.1080/08870449608400256.
- Tidd, Joe. 2001. "Innovation Management in Context: Environment, Organization and Performance." *International Journal of Management Reviews* 3 (3): 169–83. https://doi.org/10.1111/1468-2370.00062.
- Toegel, Ginka, and Jean-Louis Barsoux. 2016. "How to Preempt Team Conflict." *PubMed* 94 (6): 78–83, 117. https://pubmed.ncbi.nlm.nih.gov/27491198.
- Towery, Twyman L. 1997. The Wisdom of Wolves: Principles for Creating Personal Success and Professional Triumphs.
- Townsend, Anthony M., Samuel M. Demarie, and Anthony R. Hendrickson. 1998. "Virtual Teams: Technology and the Workplace of the Future." *Academy of Management Perspectives* 12 (3): 17–29. https://doi.org/10.5465/ame.1998.1109047.

- Townsend, Janell D., and Roger J. Calantone. 2013. "Evolution and Transformation of Innovation in the Global Automotive Industry." *Journal of Product Innovation Management* 31 (1): 4–7. https://doi.org/10.1111/jpim.12075.
- Tsui, Anne S., and Susan J. Ashford. 1994. "Adaptive Self-Regulation: A Process View of Managerial Effectiveness." *Journal of Management* 20 (1): 93–121. https://doi.org/10.1177/014920639402000105.
- United Nations Climate Change. 2015. "The Paris Declaration on Electro-Mobility and Climate Change and Call to Action." November 29, 2015. Accessed July 23, 2023. https://unfccc.int/news/the-paris-declaration-on-electro-mobility-and-climate-change-and-call-to-action.
- WardsAuto. 2023. "General Motors Tops the Auto Industry in R&D Spending." May 5, 2023.

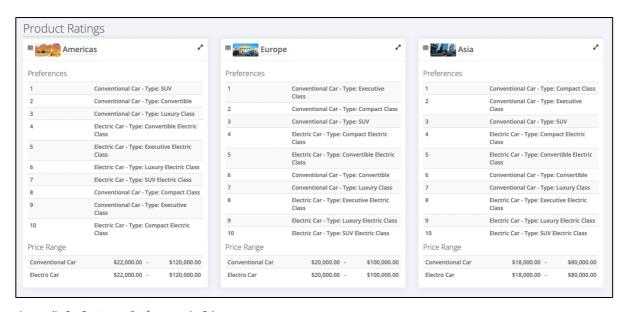
 Accessed August 2, 2023. https://www.wardsauto.com/industry-news/general-motors-tops-auto-industry-rd-spending.
- Winer, Russell S. 2004. "Customer Relationship Management on the Web." *The Internet Encyclopedia*, January. https://doi.org/10.1002/047148296x.tie029.
- Zapata, Clovis, and Paul Andre Henri Francois Nieuwenhuis. 2010. "Exploring Innovation in the Automotive Industry: New Technologies for Cleaner Cars." *Journal of Cleaner Production* 18 (1): 14–20. https://doi.org/10.1016/j.jclepro.2009.09.009

IV. Appendix



Appendix 1 - Leaftech's Initial Investments

Source: Industry Masters

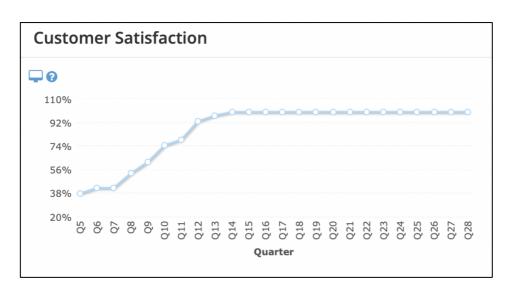


Appendix 2 - Customer Preferences in Q4

Product	Age	Emissions	DOI	Revenue	Sales Price	Market Share	Contribution Margin
Offroad EL23E	7 Quarters	0 g/mile	30 days ◆	\$830M ◆	\$65,776	4.1%	36.5% ◆
A-Office EL0E	8 Quarters	0 g/mile	30 days ◆	\$801M ◆	\$49,982	4.0%	43.6%
A-Frog ELOE	9 Quarters	0 g/mile	30 days ◆	\$1,148M	\$35,318	5.7%	43.8% ♠
SUV 12E	12 Quarters	0 g/mile	30 days	\$963M	\$63,506	4.8%	35.2%
Con EL34E	12 Quarters	0 g/mile	30 days	\$841M	\$55,448	4.2%	40.2%
Micro 0E	13 Quarters	0 g/mile	30 days	\$740M	\$24,480	3.7%	37.3%
Lux 34E	14 Quarters	0 g/mile	87 days	\$1,233M 	\$80,211	6.1%	31.3%
© City L23E	14 Quarters	0 g/mile	30 days	\$980M	\$32,363	4.9%	35.9% ♠
Executive 23E	17 Quarters	0 g/mile	44 days ◆	\$886M	\$45,014	4.4%	33.7% ♠

Appendix 3 - Leaftech's Fleet in Q28

Source: Industry Masters



Appendix 4 - 100% Customer Satisfaction in Q14

Rank	Product	Manufacturer	Туре	Segment Market Share
1	Lux 34E	Leaf Tech	Luxury Electric Class	5.2%
2	SUV 12E	Leaf Tech	SUV Electric Class	4.7%
3	Con EL34E	Leaf Tech	Convertible Electric Class	4.79
4	⋘ [®] C 1 140E	Competitor C	Luxury Electric Class	4.6%
5	Lux-E	Competitor B	Luxury Electric Class	4.6%
6	City L23E	Leaf Tech	Compact Electric Class	4.6%
7	Lux-E	Competitor A	Luxury Electric Class	4.5%

Appendix 5 - Lux34E's Market Share in Q22

Source: Industry Masters

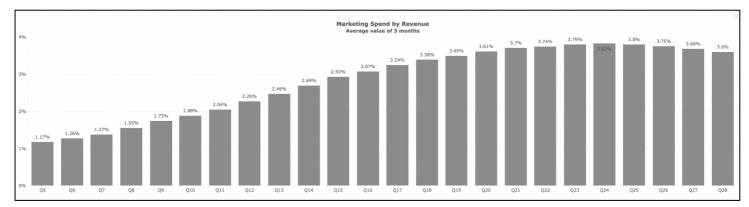
Rank	Product	Manufacturer	Туре	Sales
1	SUV 12E	Leaf Tech	SUV Electric Class	17,127
2	Micro 0E	Leaf Tech	Micro Electric	43,592
3	C 1 140E	Competitor C	Luxury Electric Class	14,758
4	Executive 23E	Leaf Tech	Executive Electric Class	21,163
5	Air-E	Competitor B	Convertible Electric Class	22,696
6	Lux-E	Competitor B	Luxury Electric Class	12,903
7	Lux-E	Competitor A	Luxury Electric Class	13,231
8	Biz-E	Competitor A	Executive Electric Class	26,263
9	Con EL34E	Leaf Tech	Convertible Electric Class	16,161
10	Lux 34E	Leaf Tech	Luxury Electric Class	10,526
11	City L23E	Leaf Tech	Compact Electric Class	26,209

Appendix 6 - City L23E's Revenues

	0
Revenue	Market Share
\$2,691M	39.2%
\$2,913M	38.1%
\$2,416M	42.5%
	\$2,691M \$2,913M

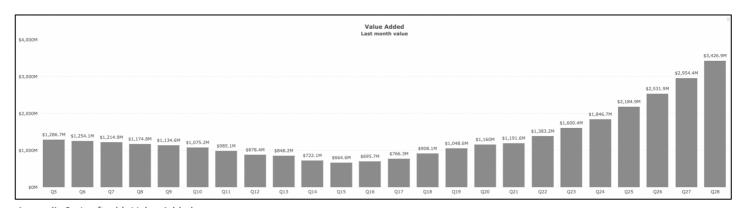
Appendix 7 - Leaftech's Market Share in Q22

Source: Industry Masters

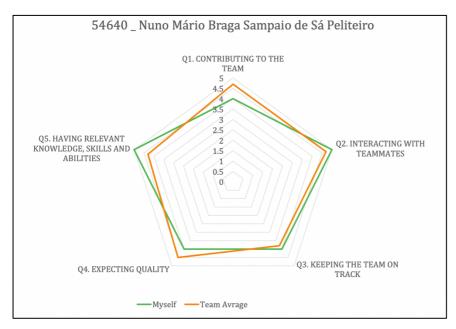


Appendix 8 - Leaftech's Marketing Spend by Revenue

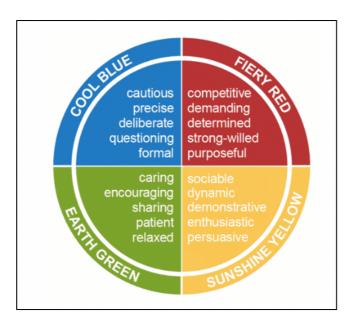
Source: Industry Masters



Appendix 9 - Leaftech's Value Added



Appendix 10 - Peer and Self-Assessment Results



Appendix 11 - Personality Types

Source: Insights Discovery