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How Does Arnold Clark Expand Its Market in the UK and Seize Market Share

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Abstract: Against the backdrop of global efforts to combat climate change and promote the transition of the transportation sector toward sustainability—given that transportation is a major source of greenhouse gas emissions—the United Kingdom has emerged as a leader in the shift to electric vehicles (EVs). The country has implemented ambitious policies, including a ban on the sale of new petrol and diesel cars from 2030 and a mandate for all new cars and vans to achieve 100% zero emissions by 2035. Simultaneously, evolving consumer preferences for sustainable mobility have contributed to a rapidly growing yet intensely competitive EV market. Within this context, Arnold Clark faces dual pressures: aligning with national carbon neutrality goals while sustaining its market leadership. The company must also navigate a series of complex challenges: first, traditional competitors and direct-to-consumer EV manufacturers are aggressively pursuing market share through various purchase incentives; second, the EV industry depends on intricate global supply chains, with battery production and raw material procurement heavily reliant on international markets, creating risks of potential disruptions; third, consumers continue to express concerns regarding EV technology sustainability—particularly battery lifespan and reliability—as well as limitations in charging infrastructure and range anxiety compared with conventional internal combustion engine vehicles.

Keywords: UK electric vehicle (EV) market; Arnold Clark; EV market challenges

1. Introduction

Against the backdrop of global efforts to combat climate change and advance sustainable development, the transportation sector—one of the largest sources of greenhouse gas emissions—is undergoing a significant transformation. The United Kingdom has been at the forefront of promoting the transition to electric vehicles (EVs), implementing strict policies such as banning the sale of new petrol and diesel cars after 2030 and requiring all new cars and vans to achieve 100% zero emissions by 2035. At the same time, evolving consumer preferences for sustainable travel have fostered a rapidly growing yet highly competitive EV market [1].

Arnold Clark faces the dual challenge of aligning with national carbon neutrality goals while maintaining its market leadership. These challenges are multifaceted. On the competitive front, traditional automakers and direct-to-consumer EV manufacturers are aggressively pursuing market share through a variety of purchase incentives. On the supply side, the EV industry relies on complex global supply chains, with battery production and raw material procurement heavily dependent on international markets, creating potential risks of disruption. On the demand side, consumers are increasingly concerned about the sustainability of EV technology, particularly battery lifespan and reliability, as well as the limitations of charging infrastructure and range anxiety compared to conventional internal combustion engine vehicles.

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2. Analysis of the UK EV Market and Arnold Clark

The team adopts a three-tier "macro-meso-micro" analysis model to examine the UK electric vehicle (EV) market, combining macro-level PESTLE analysis, meso-level Porter's Five Forces framework, and micro-level customer profiling [2]. This approach not only strengthens the explanatory power of the research but also ensures a systematic, comprehensive, and targeted evaluation of the market. At the macro level, the analysis captures the overall market structure, clarifies strategic boundaries, and provides Arnold Clark with a broad perspective to identify opportunities and risks. The meso-level assessment examines the competitive landscape, focusing on internal industry dynamics, clarifying Arnold Clark's market position, and uncovering key competitive challenges. Finally, the micro-level analysis targets the characteristics and needs of specific customer groups, translating macro trends into actionable user insights and ensuring strategic precision. This approach aligns external environmental factors with internal capabilities and customer needs, creating a closed strategic loop.

In assessing Arnold Clark's market competitiveness, the team first identified the company's core differentiators through multi-dimensional comparisons with major competitors. Among its strengths, Arnold Clark has established a wide geographical presence through over 200 branches across the UK, offering consumers opportunities for test drives, face-to-face consultations, and immediate after-sales services. This approach contrasts sharply with Auto Trader's online-focused, light-asset model and differs from Tesla's city-centric direct-operated showroom strategy [3].

However, the analysis also highlights areas for improvement. In digital capabilities, Arnold Clark's online platform lags behind the mature online trading system of Auto Trader and Tesla's fully digital car purchase experience in terms of user experience and functional completeness. In the EV retail sector, its relatively late market entry has resulted in limited experience in interpreting technical specifications and integrating charging ecosystems, leaving it behind competitors who specialize in electric vehicles [4].

3. Theoretical Application and Tool Selection

3.1. Introducing New Theories

This report introduces the Circular Economy and Diffusion of Innovations theories to ensure that the strategy is environmentally and resource sustainable while aligning with policy guidance and ESG requirements [5]. At the same time, these frameworks help understand user characteristics and assist Arnold Clark in formulating market strategies to accelerate EV adoption among consumers.

3.1.1. Circular Economy

The Circular Economy is a sustainable development concept that contrasts with the linear economic model. It emphasizes the principles of reduction, reuse, and efficient resource utilization, featuring low consumption, low emissions, and high efficiency. By establishing a closed-loop system, the Circular Economy aims to minimize resource use, extend product life cycles, reduce waste, and improve resource utilization efficiency [6].

Battery lifecycle management is a crucial component of achieving sustainability in the EV industry. Batteries, as core EV components, are costly to produce, difficult to recycle, and pose potential environmental risks. Without effective detection, certification, and recycling mechanisms, concerns over battery degradation and replacement costs can hinder the growth of the second-hand EV market [7]. Reuse and recycling form the key pathways in a circular system: while interconnected, each focuses on different aspects.

Circular Economy principles maximize value by extending service life. When battery capacity drops to 75-80%, batteries are not discarded but repurposed for secondary use after professional testing and evaluation. In applications such as low-speed electric vehicles and emergency power supplies, retired batteries retain residual value. This secondary

utilization extends overall battery lifespan, increases material value output, and fulfills the core principle of reuse.

Recycling is essential for resource efficiency in the Circular Economy. Arnold Clark positions itself as a leader in this area, establishing a management model that spans sales, use, and recycling, supported by a recycling network and incentive mechanisms. Key materials such as lithium, cobalt, and nickel are extracted and regenerated through advanced recycling processes. Efficient technologies reduce energy consumption, increase metal recovery rates, lower procurement costs, and mitigate environmental hazards from land-filling, thereby supporting closed-loop recycling.

3.1.2. Diffusion of Innovation

The Diffusion of Innovation theory explains how new products or technologies spread within social systems over time through specific channels. It provides insight into the adoption process of innovations and helps identify strategies to accelerate uptake. In the context of EVs, the promotion of charging infrastructure follows this diffusion pattern while facing unique adoption barriers [8].

The UK EV market remains in the early adoption stage, with initial consumers typically possessing higher incomes, fixed parking spaces, and access to charging. The diffusion process exhibits clear user stratification: innovators actively adopt home charging solutions, early adopters influence subsequent groups, the early majority relies on verification of network coverage and stability, and the late majority remains cautious, with laggards sticking to traditional vehicles until charging infrastructure is widespread and cost-effective.

Arnold Clark can facilitate adoption by investing in and expanding charging infrastructure. A high-density network reduces dependence on private parking and simplifies usage, thereby enhancing consumer confidence and trust. This strategy accelerates the transition from early adopters to the early majority, boosting overall market penetration.

3.2. Tools Analysis

The team employed PESTLE analysis, Porter's Five Forces framework, and SWOT analysis to evaluate the UK EV market and Arnold Clark's position. Each tool offers distinct strengths and limitations, and together they provide a multi-dimensional perspective for strategic decision-making.

3.2.1. PESTLE Analysis

PESTLE analysis systematically identifies and evaluates external factors that influence the UK EV market, highlighting forces that may support or hinder Arnold Clark's strategic initiatives [9]. By examining macro-level drivers-including political regulations, economic trends, technological advancements, social attitudes toward sustainability, legal frameworks, and environmental considerations-PESTLE provides a holistic understanding of the market environment. This approach enables Arnold Clark to anticipate regulatory shifts, align with sustainability policies, and identify emerging opportunities, such as growing consumer demand for low-carbon mobility solutions. It also helps detect potential threats, including supply chain disruptions, fluctuating raw material costs, and evolving competitive pressures, thereby guiding more informed strategic decision-making.

3.2.2. Porter's Five Forces Analysis

Porter's Five Forces framework assesses competitive dynamics within the UK EV market, offering insights into the intensity of competition and the relative bargaining power of key players. This analysis examines the threat of new entrants, the bargaining power of suppliers and buyers, the intensity of rivalry among existing competitors, and the potential impact of substitute products. By applying this framework, Arnold Clark

can better understand its market position, anticipate challenges from both traditional automakers and direct-to-consumer EV manufacturers, and identify critical competitive pressures. The insights gained support the formulation of targeted strategies, such as differentiating service offerings, strengthening supply chain resilience, and developing long-term market positioning [10].

3.2.3. SWOT Analysis

SWOT analysis evaluates Arnold Clark's internal strengths and weaknesses alongside the external opportunities and threats in the UK EV market. Strengths may include its extensive offline network, brand recognition, and service capabilities, while weaknesses could relate to digital capabilities or limited EV-specific experience. Opportunities involve growing EV adoption, supportive government policies, and technological advancements, whereas threats include intensified competition, supply chain risks, and consumer concerns about battery sustainability and charging infrastructure. While SWOT provides a foundational overview of strategic positioning, its effectiveness depends on maintaining objectivity, conducting regular updates, and integrating findings with complementary tools such as PESTLE and Porter's Five Forces. This ensures that the insights generated are actionable, evidence-based, and directly applicable to strategic planning.

4. Measure Discussion

4.1. Selection of the Decision Matrix

After conducting macro- and micro-level analyses of the UK EV market and assessing Arnold Clark's internal strengths and weaknesses, the team proposes four feasible strategic measures to help the company expand its market share and revenue sources. A Decision Matrix is employed to quantitatively evaluate these measures, ensuring transparency and rigor in the analysis process. The four proposed measures are:

- 1) After-sales and maintenance service system
- 2) Green electric fleets
- 3) Battery lifecycle management and recycling
- 4) Construction of charging infrastructure

The Decision Matrix offers the advantage of simultaneously considering multiple factors, such as competitiveness, sustainability, cost, risk, and benefit. By assigning weights to each evaluation criterion, the most critical aspects of Arnold Clark's current strategy are highlighted. Scores and final rankings for each measure are calculated with clear methodology, allowing for review and adjustment in subsequent stages. Presenting the results in tabular form facilitates quick comparison of overall advantages and the strengths and weaknesses of each option across specific criteria, simplifying complex information.

However, the method has limitations. Important criteria may be overlooked when defining options, potentially affecting decision accuracy. The subjectivity involved in assigning weights and scoring can also influence the objectivity of results. Nevertheless, the simplicity, transparency, and efficiency of the Decision Matrix make it a practical tool for evaluating strategic measures.

4.2. Measures Evaluation

To select the optimal strategy among the four options, the team established five evaluation criteria and assigned weights based on strategic priorities. Sustainability (weight 5) and Benefit (weight 4) were given the highest importance, reflecting Arnold Clark's long-term focus on market growth and environmental performance. The matrix calculation indicates that Battery Lifecycle Management and Recycling, along with Construction of Charging Infrastructure, score the highest, significantly surpassing After-sales and Maintenance Service System and Green Electric Fleets.

Battery reuse addresses growing demand for stationary energy storage, while recycling reduces environmental impact and enables the recovery of valuable metals. By establishing its own battery recycling system, Arnold Clark can control the process, mitigate risks, and align with circular economy principles-reducing environmental impact, extending resource life, lowering replacement costs, and enhancing the economic and environmental appeal of EVs. This also supports a differentiated brand image emphasizing sustainability and battery safety.

Expanding charging infrastructure alleviates range anxiety and improves consumer acceptance of EVs. Implementing a Three-Tier Model to match different usage scenarios can deepen user engagement, strengthen Arnold Clark's position within the EV ecosystem, and-in line with Diffusion of Innovations theory-accelerate market adoption and generate long-term operational revenue.

In contrast, a reliable after-sales service system improves customer satisfaction and loyalty but has limited appeal for new buyers compared to core product performance and usability. It is unlikely to drive rapid market share growth in the short term and requires ongoing investment in technical training. Developing a green electric fleet directly supports carbon reduction targets and social responsibility goals but involves substantial upfront costs and financial risk, which could constrain fleet expansion and operational stability.

Based on this quantitative evaluation, the team recommends prioritizing Battery Lifecycle Management and Recycling, along with Construction of Charging Infrastructure. These initiatives balance market potential, sustainability, and competitive advantage, supporting Arnold Clark's long-term development in the UK electric vehicle market.

5. Process Reflection

5.1. Limitation Analysis

During the project, the team identified several limitations that may affect the depth of analysis and the reliability of conclusions.

First, insufficient data availability presented a significant constraint. The team primarily relied on secondary sources such as industry reports and public data, lacking direct, first-hand information that could accurately capture consumer preferences, purchase drivers, and concerns. Furthermore, internal and historical sales data, customer service records, and operational insights from Arnold Clark were unavailable. This limitation restricted the team's ability to analyze the most direct indicators of market performance and internal capabilities. As a result, some information may be outdated, particularly given the rapidly evolving nature of the EV market, potentially affecting the precision of forecasts and strategic judgments.

Second, the weighting and scoring in the Decision Matrix involved a degree of subjectivity. Although the team used collective discussion to align weights with Arnold Clark's strategic priorities, scoring relied on individual experience and intuition rather than rigorous quantitative validation. Differences in professional background, past experience, and cognitive frameworks among team members could lead to varying assessments of the same factors. Even when consensus was reached, certain viewpoints may have been equalized or dominated in discussion, potentially introducing bias into the final evaluation and affecting the robustness of the conclusions.

5.2. Improvements and Optimization

To overcome these limitations and enhance the objectivity, depth, and reliability of the analysis, several improvements are proposed.

First, primary data collection should be expanded and refined. Carefully designed questionnaires and in-depth interviews can capture core consumer insights, including purchase intentions, price sensitivity, and pain points, across diverse age groups, income levels, and car usage scenarios. Open-ended questions can uncover hidden challenges,

such as long charging waiting times, battery degradation concerns, or user experience issues. This approach would generate actionable insights to guide the optimization of products, services, and strategic initiatives.

Second, the scientific rigor of weight assignment should be strengthened. Currently, the Decision Matrix relies heavily on subjective judgment, which may introduce bias and reduce the accuracy of strategic evaluation. Implementing structured methods such as the Analytic Hierarchy Process (AHP) can provide an objective framework to quantify decision criteria weights. This approach reduces subjective influence, ensures consistency in evaluation, and enhances the reliability and credibility of strategic recommendations.

By adopting these improvements, future analyses will produce more comprehensive, objective, and data-driven insights. Consequently, the resulting strategic plans will be more adaptable, evidence-based, and capable of responding effectively to the dynamic EV market environment, strengthening Arnold Clark's decision-making and long-term competitiveness.

6. Conclusion and Recommendation

Analysis of Arnold Clark's position in the UK electric vehicle (EV) market reveals a highly dynamic and rapidly evolving landscape, shaped by stringent net-zero policies, shifting consumer preferences, and intense competition from both traditional automakers and direct-to-consumer EV manufacturers. Through a structured multi-stage analysis integrating PESTLE, Porter's Five Forces, and SWOT frameworks, the central challenge emerges: how to maintain market leadership while simultaneously aligning with national net-zero objectives, seizing additional market share, and diversifying revenue streams.

Guided by the theoretical frameworks of the Circular Economy and Diffusion of Innovations, the team identified two strategic priorities using the Decision Matrix: Battery Lifecycle Management and Recycling, and Construction of Charging Infrastructure. These initiatives provide a dual advantage. First, they enhance customer trust and strengthen Arnold Clark's brand image by addressing critical consumer concerns regarding battery sustainability and charging convenience. Second, they contribute to broader market penetration, extend the lifecycle and value of resources, reduce environmental impact, and accelerate the mainstream adoption of EVs. By tackling core pain points—battery reliability and charging accessibility—these strategies align closely with both policy objectives and market expectations, while reinforcing competitive differentiation and long-term sustainability.

While limitations exist, including reliance on secondary data and the inherent subjectivity in weight allocation within the Decision Matrix, the proposed strategies represent the most feasible and impactful measures for expanding Arnold Clark's market share and creating new revenue opportunities in the UK's rapidly growing EV sector. By proactively implementing these measures, Arnold Clark can not only consolidate its competitive position but also demonstrate leadership in sustainable mobility and responsible resource management.

Looking ahead, as policy support strengthens and technological innovation accelerates, competition in the UK EV market is expected to intensify further. Establishing a leading position in battery management and charging infrastructure will enable Arnold Clark to create robust industry barriers and achieve a strategic transformation—from a traditional distributor to a fully integrated, sustainable service provider. This transformation will not only increase market share and revenues but also enhance the company's social influence, brand equity, and long-term resilience, positioning Arnold Clark at the forefront of the transition to a low-carbon, sustainable transportation ecosystem.

References

1. V. O. Ajayi, "A review on primary sources of data and secondary sources of data," *Available at SSRN 5378785*, 2023.

2. B. H. An, T. G. Lee, T. T. Khan, H. W. Seo, H. J. Hwang, and Y. S. Jun, "Optical and quantitative detection of cobalt ion using graphitic carbon nitride-based chemosensor for hydrometallurgy of waste lithium-ion batteries," *Chemosphere*, vol. 315, p. 137789, 2023.
3. I. S. Bayram, and X. Shi, "Bidirectional charging hubs in the electric vehicle retail landscape: Opportunities and challenges for the uk case," *IEEE Open Journal of Vehicular Technology*, 2024.
4. A. Ghosh, "Possibilities and challenges for the inclusion of the electric vehicle (EV) to reduce the carbon footprint in the transport sector: A review," *Energies*, vol. 13, no. 10, p. 2602, 2020. doi: 10.3390/en13102602
5. V. O. Hammed, E. W. Salako, D. Edet, J. Ederhion, B. I. Keshinro, I. A. Uwaoma, and Y. A. Alli, "Next-generation lithium-ion batteries for electric vehicles: Advanced materials, AI driven performance optimization, and circular economy strategies," *Measurement: Energy*, vol. 7, p. 100060, 2025. doi: 10.1016/j.meae.2025.100060
6. C. M. Indiatsy, S. M. Mucheru, E. N. Mandere, J. M. Bichanga, and E. G. Gongera, "The application of Porter's five forces model on organization performance: A case of cooperative bank of Kenya Ltd," 2014.
7. S. Kempston, S. R. Coles, F. Dahlmann, and K. Kirwan, "UK electric vehicle battery supply chain sustainability: A systematic review," *Renewable and Sustainable Energy Reviews*, vol. 210, p. 115216, 2025. doi: 10.1016/j.rser.2024.115216
8. T. L. Saaty, "Axiomatic foundation of the analytic hierarchy process," *Management science*, vol. 32, no. 7, pp. 841-855, 1986. doi: 10.1287/mnsc.32.7.841
9. D. L. Thompson, J. M. Hartley, S. M. Lambert, M. Shiref, G. D. Harper, E. Kendrick, and A. P. Abbott, "The importance of design in lithiumion battery recycling-a critical review," *Green Chemistry*, vol. 22, no. 22, pp. 7585-7603, 2020.
10. Y. Zhao, and G. Kaur, "The future of recycling for critical metals: Example of EV batteries," *Geosystems and Geoenvironment*, 2025.

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