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# Empirical Study Of Small And Medium Scale Enterprises In India- A Case Study

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**Abstract:**Small and medium scale enterprises are supposed to be emerging industry globally with high expansion and growth rate and has colossal impact in the evolution of entrepreneurship and have revolutionized businesses through their innovative approaches. Auto ancillary units (AAU) are small and medium scale enterprises, and being governed by automotive industries, are proving to be the growth engines of economies for developed as well as developing countries. AAU has emerged as key market in India and is expected to capture overseas opportunity in coming couple of years.

In these situations, it becomes necessary to analyze the system in depth. The present paper summarizes aspects of auto ancillaries in various domains. The results and findings will provide the managers and practitioners an opportunity to build the platform to solve managerial issues; reduce problems; meet OEM's requirement and hence improve market share. SWOT analysis, for AAU, is used for building the strategies in order to meet the global challenges and study the scope of expansion.

Index Terms: Small and Medium Scale Enterprises (SME's), Auto Ancillary Units (AAU), SWOT analysis.

#### 1. INTRODUCTION

One of major contributor in Indian economy in present economy is Automobile Industry which accounts for approximately 7.1percent of India's GDP. Auto ancillary units, which are supposed to small and medium scale enterprises (SME's), is the components industry and seen to be dominated directly by automobile industry. It is supposed to be one of the critical focal point for growth of automobile industry. AAU's, as indicated by literature (Singh et al., 2007a), holds significant contribution to the export industry and is supposed to be have approximately 750 and 6000 unorganized and organized units respectively. Singh et al., 2007b., in their work, clearly emphasized to analyze and understand the challenges in auto ancillaries in order to cope with the challenges of automobile industry.

Despite of tremendous growth in auto ancillary market and complexities involved, less attention is given by the researchers in this area. However considering the complexities involved in this sector and its direct impact on the growth of automobile sector, it becomes essential to deeply examine its issues and adopt the new technologies to boost its profitability and productivity. The present papers targets to summarize the various challenges and key issues involved in SME's like AAU's.

The objectives of paper as follows:

 To study the challenges faced by auto ancillary units

- To explore and understand the key research issues form auto ancillary units
- Perform SWOT analysis for AAU and based on the analysis suggest strategies for meeting the market challenges globally.

Remainder of the paper as follows. Section 2 discusses the various challenges the AAU's faces in the global market. Section 3 summarizes review for the key issues of AAU. A case study of AAU is presented in section 4 and SWOT analysis useful for strategy building is also done. The paper is concluded in the end.

## 2. AUTO ANCILLARY UNITS (AAU'S)

Auto ancillary units (AAU's) are considered to be small and medium scale enterprise (SME's) fragmented over 5000 players manufacturing various components and comprises of several organized and unorganized units. The AAU market can be classified into three categories- OEM market, replacement market and exports with 40% of demand are derived from OEM. Experts in this area have categorized the industry into five main area viz- chasis and body parts, parts involved in engine assembly, brake and suspension assembly parts, electrical and electronic parts, transmission and steering parts.

There are various emerging challenges in AAU's. Nowadays, the OEM's are reducing in house manufacturing and increasing the outsourcing; hence expanding the auto ancillary market while intensifying the competition simultaneously. Thus the need of investment and technical up gradation is

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transferred from OEM's to AAU's. Also, OEM's are following are implementing various inventory management techniques, JIT etc which in turn has resulted in an increase in working capital requirements of AAU's

In the globalization era, when the global car manufacturer enters into the domestic market, the quality expectations from AAU's are increasing. This leads to the improved domestic increased acceptance by global car manufacturers and improved export competitiveness. This increases investments in technology and automation in facilities.

Like the other SME's, domestic auto ancillary is likely to witness the stage when the global investors would gradually increase their stake in joint ventures formed with Indian players. When this happens, high degree of quality and technological support will be required.

Significant growth in demand for ancillary segments over short term to medium term is expected. It is hence required to completely analyze the existing issues in AAU's so that the challenges can be met.

### 3. KEY ISSUES IN AAU'S

SME's are considered to backbone for the growth of all countries (Agwu and Emeti, 2014). Uzoo (2004) mentioned in their study that SME's is positively influencing the distribution of income both functional and nominal terms. Similar trends are being observed in components manufacture SME's i.e. AAU's. This section discusses some research issues for auto ancillary SME's

## (A) Supply Chain Management (SCM) practices

Globally, in the environment of competition and uncertainty, emphasis on quality parameters like delivery target, costs etc have increased the importance of SCM in all the units including SME's like auto ancillary units. Proper control and focus on the SCM issues and helps to deliver right product/service at appropriate time, cost and quality (Basher 2010) and thus study of SCM practices helps to promote effective utilization of all resources in order to improve productivity. Many studies have been conducted by the researchers which exhibits the relation of SCM and SME's. All these facts equally fits to auto ancillary SME's. Cost effective SCM proves to be critical tool for survival of SME's (Quayle 2003) and also leads to the reduced chances of risk, more prompt customer responsiveness, reduction in inventory items etc (Meehan and Muir, 2008). Koh et al (2007) in his study clearly stated the benefits of SCM in SME's and leads to similar results. The well defined approach of SCM in field of SMEs, including AAU's, helps to meet time constraints and balance the costs thus improving the operational efficiency of the unit (Thakkar et al., 2009).

#### (B) Vendor Development

In order to improve the production rates and materials management, vendor are necessary for automobile OEM's and helps to reduce obsolete items and improve customer satisfaction levels (Gunasekaren et al., 2000). In this situation vendor development becomes an important issue to be considered. Vendor development helps in strategically improving the performance of buyers and vendors (Humphreys et al., 2005).

#### (C) Performance Measurement System (PMS)

PMS is considered to an important aspect for all firms and needs to be extremely flexible and reactive to market changes (Garengo et al., 2007). Storey (1994) found that SME's exhibits distinct characteristics that differentiate them from the majority of larger counterparts. It, thus, becomes necessary in this situation to establish efficient PMS for SME's like auto ancillaries. These systems helps to formulate the strategy and are formal devices which helps proper control and formulation of strategies and also helps the manager, both service as well as operational managers, to improve the operations. Early stages of performance measurement were based on strategic planning but later the received several criticisms. Kalpan and Norton (1993) introduced the new theory of Balanced Scorecard approach for performance measurement, which emphasis a balance between the use of financial and non financial measures to achieve strategic alignment.

#### (D) Information Technology (IT) Applications

In today's era information technology (IT) tools have become the integral part of all types of industry. Its use in business increases the productivity and assists to manage intra- and inter-organizational affairs. Vanpoucke et al (2017), Azam (2015), Kumar et al (2015), Song et al (2016), Valaei and Rezaei (2016) have highlighted the importance of IT tools in SME's, where they strongly believe that improper use of IT tools the quality and consistency of SME's is badly affected. This is in line with the study by Mandal (2007) where he found that application of IT tools in SME's makes the cost effective use of new technologies in production, marketing networking. Automobile OEM's are approaching the target of cost competitiveness and decreasing their levels of integration by hiving off certain component division into separate companies; thereby giving the opportunities for expansion to domestic AAU's. In these situations, use of proper communication

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technologies becomes necessary to attain the levels of satisfaction of OEM's.

## (E) Total Quality Management (TQM)

TQM is a continuous improvement process which involves everyone and everything in SME. TQM, if properly implemented, proves to be a valuable asset which produces important competitive capabilities and source of competitive advantage (Demirbag et al., 2006). With well applied theories of TQM, the firms achieves greater degree of productivity and efficiency, improved morale of employees, improved management labor relations and high performance rating through TQM (Singh et al., 2007a). For properly implementing TQM, focus on employees training, leadership, top management commitment and information sharing should be given by auto ancillaries.

#### 4. CASE STUDY

This section of paper discusses the insights from ISO 14000 certified AAU situated in northern part of India. The AAU is manufacturing three types of products for seven OEM's and follows Toyota Production System (TPS). There are 34 total production lines with 4 to 5 workstations on each line and product layout is followed. The average processing time at each workstation is 50-60 seconds. Technique of POKA-YOKE is strictly followed and one production line is fixed for one type of product. AAU is following customer focused approach and takes its capacities in line with production schedules of OEM's. This helps to meet desired quality product at right time and place.

OEM's today are following JIT philosophy and on time delivery of products to OEM at the desired place thus becomes main target. Other challenges being faced by AAU under study include high cost of capital, capacity utilization, skilled manpower and building R&D competence and ecosystem.

In order to meet above challenges, proper strategy formulation needs to be done. SWOT analysis is one such tool which is widely used. SWOT analysis has been used as an instrument to leverage the available information for improved decision- making (helems and Nixon, 2010).

The SWOT analysis is made as under:

### 5. STRENGTHS

The major strengths for auto ancillary SME's are as under:

- 1. Cost competitive labor and raw material
- 2. Expansion and growth in domestic automobile industry
- 3. Easy availability of resources at low cost
- 4. Government involvement and support

- 5. Ease of getting loans
- 6. High operational efficiency
- 7. Established manufacturing base
- 8. High interest of foreign investors
- Geographical location of Indian auto ancillary as they are closer to key automotive markets like the Middle East and Europe

## 6. OPPORTUNITIES

- 1. Acquisition in foreign markets.
- 2. The growing need to outsource
- 3. Frequent introduction of newer automobile models in the market
- 4. Growth in global automotive industry
- 5. The growth and contribution of India as global turning the country into a preferred designing and manufacturing base

With above stated strength and opportunities, there are certain positive outcomes in Indian auto component market. The foreign auto components manufacturers are seeking joint ventures with Indian AAU's. The fine quality of components manufactured in India is used as original components for vehicles made by General Motors, Mercedes, IVECO, etc.

#### 7. WEAKNESSES

- 1. Less R & D opportunities
- 2. Hindrances from top management
- 3. Limited knowledge of product liability and offshore warranty handling

## 8. THREATS

- 1. The low price component from China gives a big competition.
- Introduction of new technologies like fuel cell, hydrogen powered cell may affects AAU market.
- 3. Large number of OEMs entering in Indian market may result into migration of talents from supplier to OEMs.

In order to overcome these threats and weaknesses, the AAU's must concentrate for R&D activities and involve in innovations. The key for progress can be product specialization and introduction of newer technology in the process. Meeting strictly the quality aspects will definitely reduce the threats and weakness. Domestic manufacturers need to increase their investments in companies in the US and Europe to go closer to global markets.

AAU market is in path of revival. Domestic players are acquiring global companies to gain access to latest technology, expand their client base and diversify revenue streams. Based on the SWOT

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analysis, certain policies are suggested for making AAU market global.

- In order to get in line with global market, components makers should shift from their present paradigm to R&D activities. This will be helpful to meet the technological requirements in global market. There should be increased investment in R&D operations and laboratories which can conduct activities like analysis, simulation and engineering animations.
- Various automotive training institutes, auto design centers, special auto parks should be developed so that global market and its newer trends can be easily studied.
- Fuel efficient and hybrid technologies are in high demand overseas. The use of these technologies should be encouraged to competitive with global market.
- Use of IT enabled automobile support system like as Global Positioning Systems (GPS), Anti-Braking Systems (ABS), Automatic Speech Recognition (ASR) and safety systems should be deployed. This will help to promote the innovation in auto component industry.

#### 9. CONCLUSION

Indian Auto Component Industry is a sunrise industry with tremendous growth prospects. Auto ancillary SME's and units (AAU) are supplies a comprehensive range of high value and critical components to domestic as well as global auto makers such as General Motors, Toyota, Ford and Volkswagen. In this paper, the key issues for AAU's are discussed and an effort in this direction for providing a rigorous strategic framework for key issues of supply chain involved in ancillaries to profitably utilize the value added through it. The proper study and analysis of these issues will be helpful to meet the market need and growing challenges. SWOT analysis is done and strategies to meet demand of global market are also proposed. This will be helpful for practioners to develop the strategy for meeting the complexities involved in AAU's and other similar SME's.

Statistical analysis of the given theoretical framework can be done at each step and multi-criteria decision analysis (MCDA) methods like Total ISM, AHP,ANP, Value analysis, Fuzzy logic and others can be utilized to find the relationship between the parameters to provide better results.

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