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#### **Abstract**

This paper analyzes the post-privatization performance and organizational changes of a Pakistani State Owned Enterprise (SOE). Drawing on the concept of sustainable development, this study examines the performance of the firm from three perspectives – economic, social and environmental. The analysis is based on data gathered from annual reports, public documents and semi-structured interviews with key personnel. This study reveals substantial improvement in company profitability. However instead of increase in operational efficiency, the main reason for improved profitability is increase in sale prices and decrease in employee related cost which has negative social implications. Environmental performance of the company has improved mainly in those areas where there is a case for increase in economic performance. The case study concludes that the main focus of the new management was on economic performance rather than concerns for sustainable development. Various organizational changes were made after privatization to ensure quick decision making on various proposals that enhances shareholder value in the company.

**Keywords:** privatization, sustainable development, performance evaluation, state owned enterprises, Pakistan.

## 1. Introduction

Privatization programs are widely imposed on less developed countries (LDCs) by International Financial Institutions (IFIs) as a part of the Structural Adjustment Programs

(SAPs) (Uddin & Hopper, 2003). It is argued that private enterprises outperformed public enterprises due to the better and efficient allocation of resources and much clearer principal agent relationships (Xu & Uddin, 2008). Pakistan, one of the biggest recipient of the economic assistance from IFIs, has started the privatization process in late eighties under the SAPs (Tahir, 2014). The objective of this paper is to analyze the post-privatization performance and organizational changes in a Pakistani state-owned enterprise (SOE) from the perspective of sustainable development (SD).

The issue of whether privatization improves the organizational performance has been the area of interest for many researchers both in developed and less developed countries (Tsamenyi, Onumah, & Tetteh-Kumah, 2010; Uddin & Hopper, 2001; 2003). Research findings so far have been mixed and controversial. Prior studies have mainly focused on economic aspects of performance at both macro and micro level of analysis. In recent years researchers has focused on social aspects of performance through a set of financial and non-financial indicators. However, the myopic approach adopted by researchers restricted the evaluation of multi-dimensional aspects (economic, social, and environmental) of privatization, particularly at the organizational level (Tsamenyi et al., 2010). Particularly, the literature lacks in providing examination of privatization impacts on environmental performance at the organizational level.

This paper contributes to the literature by analyzing multi-dimensional assessment of post-privatization performance that takes into account both financial and non-financial indicators. This paper draws on the concept of sustainable development (SD) and its three dimensional (economic, social and environmental) approach in evaluating post-privatization impact at the organizational level. Within each dimension, different performance indicators were used that were mainly derived from the prior literature on post-privatization performance analysis, World Bank (WB) studies and Global Reporting Initiative (GRI) Guidelines on Sustainability Reporting.

Changes at the organizational level (including management accounting and control system) are considered as central link to the privatization process and its outcomes. Prior studies generally analyzed outcomes of privatization by focusing on either economic impact at the macro level or financial and operating performance at the micro level (Redda, 2007). Our knowledge about the post-privatization changes at the organizational level is embryonic. This paper also provides detailed analysis of the organizational changes after privatization and how these changes are implicated in the performance of an organization.

Overall, this paper contributes to the accounting for privatization literature by adding the dimension of environment to the post-privatization performance evaluation and by linking it with organizational changes. This paper demonstrates that the SD performance evaluation provides a broader appreciation of the performance as compared to studies that focus on narrow (economic) aspects of performance. This study argues that SD performance evaluation approach enables understanding of multifarious consequences of privatization. This paper also expected to contribute privatization policies in LDCs by providing empirical evidence of the real consequences of privatization.

#### 2. Literature Review

# 2.1 Privatization and Organizational Performance

The term "Privatization" has common public currency from the early 1980s. Prior to this date the word "denationalization" was preferred when referring to the sale of state-owned industries (Parker, 2009). Privatization is an important economic policy that most

commonly involves change of ownership and/or control of enterprise from public sector to private (Adam, Cavendish, & Mistry, 1992; Kikeri, Nellis, & Shirley, 1994). Since 1980s, it has been adopted widely all over the world to solve various economic, political, social, and administrative problems (Bennington & Cummane, 1997). World Bank, International Monetary Fund (IMF) and other western donors encouraged privatization especially in LDCs as a solution to economic failures and unique problems (e.g. inefficiency, bureaucracy, political involvement, corruption) of SOEs (Vernon-Wortzel Lawrence H, 1989). In most of the cases privatization programs are imposed on LDCs as part of the structural adjustment programs and as a conditions for bailing out the ailing economies of these countries (Cook & Kirkpatrick, 1995; Kikeri et al., 1994; Uddin & Hopper, 2001)

Theoretically privatization is advocated on the basis of productive and allocative efficiency gains (Xu & Uddin, 2008). Private sector companies are assumed to be more efficient as their sole objective of profit maximization enables them to deploy efficiency enhancing technologies in contrast to SOEs which generally have multiple conflicting objectives (e.g. economic, social, political). Privatization presupposes that the government is willing to accept the firm's objectives (i-e profit maximization) and market's actions. Other government objective which a public firm might have been instructed to follow should then be pursued through taxation or subsidization policies, or given up completely (Bös, 1991). Moreover due to clarity of principal agent relationship (Tsamenyi et al., 2010) and property rights, management of private companies is more motivated towards efficiency in contrast to management of SOEs which is poorly motivated, badly paid and inadequately monitored (Hemming & Mansoor, 1988). Therefore advocates assume that ownership changes will induce better management controls that improve productive and allocative efficiency (Yarrow & Vickers, 1985; Hemming & Mansoor, 1988).

Stemming from micro-economic theories of agency and property rights, productive efficiency emphasizes the micro-economic benefits. These benefits includes increase in; market's power to control and incentivize, economic efficiency, worker productivity, employee earnings, corporate investments, access to foreign markets and capital. Consumers are also assumed to be benefited in terms of better quality and lower prices of products and services (Cook & Uchida, 2003; Perotti & Van Oijen, 2001; P. Plane, 1992; Patrick Plane, 1997). At the macro level allocative efficiency theory predicts that privatization through its very process (that mainly involves competition) will facilitate broader development goals. These goals include increased private sector investments, GDP and employment, better resource allocation, reduction in government subsidies and public sector deficit, increased international trade, lowering of unemployment, reduction in poverty and inequality and long term economic development (Cook & Kirkpatrick, 1995; Megginson & Netter, 2001; Parker & Kirkpatrick, 2005; P. Plane, 1992; Patrick Plane, 1997; Sheshinski & López-Calva, 2003). The main limitation of these theories is their focus on narrow economic lens. These theories predict innovations and efficiency improvements through change of ownership by assuming superior management controls (including accounting). Such improvements are assumed to result in improved economic performance which leads to improved social and environmental performance (Adam et al., 1992; Bös, 1991). However, apart from economic reasons, there are also social and political reasons for privatization that inlcludes political orientation, effects on service costs and delivery and social welfare (Kouser, Azid & Ali, 2011).

Most of the research on privatization in both developed and less developed countries had been undertaken from the narrower economic lens either at the macro level or at micro level that envisions privatization to bring economic benefits (Josiah, Burton, Gallhofer, & Haslam, 2010). For example, Boubakri and Cosset (1998) conducted a performance review of 79 privatized firms in 21 developing countries. Based on economic indicators, their analysis found significant increases in profitability, operating efficiency, capital investment, output and employment. They also found decline in leverage and increase in dividends. Similarly Kouser, Azid & Ali (2012) in their comprehensive study of financial and operating performance of privatized firms in Pakistan found significant increase in profitability, efficiency, investment, employment and dividends after privatization. On the contrary, in a study covering 72% of the total privatization transactions, Hakro and Akram (2009) found insignificant improvement in the performance indicators after privatization. There is whole range of research conducted in such manner, results of which are divided between showing significant improvements and no significant improvements (Parker & Kirkpatrick, 2005).

The problem with apprehending the impacts of privatization on such narrow economic lens is that it is myopic and unable to reveal the full impacts of privatization (Tsamenyi et al., 2010). Moreover prior studies highlighted the problems with the methodology. Sole reliance on quantitative analysis makes it difficult, almost impossible, to bring context into the research which play an important role in affecting the performance and therefore interpreting the results. This limitation calls for some more holistic analysis that involves both broadening the lens and the methodology (Josiah et al., 2010).

Recently some researchers deviate from this narrower economic lens and provide a much broader appreciation of the real impacts of privatization by bringing social, political and cultural factors into consideration. The use of qualitative case studies also started to emerge that bring into light the unique context of each case within which to interpret the results. For example, Shaoul (1997) questions the claims of the government that privatization bring benefits to customers, industry and community. In her critical analysis of the impact of privatization in the water companies of England and Wales, she concludes that such claims are not realized in practice. Cole and Cooper (2006) revealed the negative impact of UK rail privatization in terms of deskilling, the loss of railway staff tacit knowledge and skills and railway safety. Similarly, Jupe (2009) through critical financial analysis highlight the distributional issues by showing the extensive and continuing transfers from the taxpayers and passengers to the financial elite. Even though such critical studies are sparse in developed countries, we can find very few studies focusing on broader appreciation of privatization in less developed countries (Parker & Kirkpatrick, 2005; Uddin & Hopper, 2003; Wickramasinghe & Hopper, 2005).

In case of Bangladesh, Uddin and Hopper (2003) challenged the claim of the World Bank about the success of privatization and found only one out of eleven companies that could be judged as commercial success when viewed in socio-economic terms. They also questioned the narrow criteria adopted by the World Bank – namely profitability – and the neglect of other criteria's that includes returns to society, financial transparency and accountability, employment conditions and quality of life. Public enterprises serve much broader goals than only profitability, so measuring privatization impact by profitability ratio seems to be unreasonable without further analysis or contextual appreciation (Josiah et al., 2010).

In case of Sri-Lanka, Wickramasinghe and Hopper (2005) found an initial improvement in the performance of the privatized company. However that improvement could not last longer due to the cultural asymmetry. In case of China, Xu and Uddin (2008) found no significant improvement in the performance of the main business of the privatized firm. Their empirical evidence stood against the claims of reformers about improved working life. Their work revealed a declining tendency in employment and wages, poor working conditions, strict controls particularly for workers and employees in privatized companies. However in case of Ghana, Tsamenyi et al. (2010) found significant increase in employment, quality of products and services and overall improved financial and non-financial performance in two firms after privatization.

Due to lack of studies that captures the multifarious impacts of privatization in LDCs, this literature review highlights the need for further research in the area that provides much broader appreciation by incorporating some previously ignored aspects of performance. The literature review revealed that even among the recent studies that focus on social, cultural and political implications of privatization, there is no appreciation of environmental implications. There are very few studies that analyzes post-privatization outcome from the aspect of environmental performance in addition to social and economic (Rodrigues, 2003). There is dearth of studies that analyze the performance from these three perspectives together. The need to evaluate post-privatization performance from the three perspectives together is important as it is argued that privatization bring positive changes in socio-environmental performance in addition to economic and leads to sustainable development (Jenkins, 2000). The World Bank (2000) is also promoting privatization for sustainable development of the country and argues for the need to refocus postprivatization performance measures from existing short-term financial orientation to that of long term qualitative analysis focusing on social and environmentally sustainable development.

# 2.2 Privatization and Organizational Changes

Privatization is usually followed by some organizational changes. Central to these changes is management accounting and control system (MACS). In theory, privatization is assumed to improve management controls that should induce better performance and help in achieving development goals (Redda, 2007). However, there is general lack of empirical research on organizational changes after privatization in general and changes in management accounting & controls in particular. These changes are considered as the central link between performance and development after privatization especially in LDC's (Cook & Kirkpatrick, 1995).

The limited empirical evidence showed some important changes after privatization. In their study of a Bangladeshi soap company, Uddin and Hopper (2001) found computerized management information system, improved market information and production scheduling after privatization. They also found superior and more commercial management controls. However these management controls were negatively impacting employment, wages, and quality of working life and employee rights (Uddin & Hopper, 2003). Similarly new MACS (including integrated software package for planning and control), activity based costing, cost cutting measures, budget based managerial performance evaluation and budget training were introduced after the corporatization of Ghanaian gold mine (Tsamenyi & Hopper, 2003). Wickramasinghe, Hopper, and Rathnasiri (2004) reported better MACS after privatization which contributed to some extent to improved performance. The company, however failed to perform as the new system was corrupted due to cultural

asymmetry. Findings of the work of Hoque and Alam (2004) revealed wide-ranging organizational changes that included participative management styles, decentralized organizational structures, multi-dimensional performance management systems, workers participation and new incentive policy for workers.

In a case study of a Chinese privatized company, Xu and Uddin (2008) found a change in management controls after privatization characterized by decentralization and de-layering of the privatized company. Among other organizational changes noticed in that study includes introduction of a new management control instrument (Comprehensive Enterprise Management Software) and restructuring of marketing department to respond customer requirements. Post-privatization organization changes resulted in more authority and control over performance by owner-managers. Owner managers devised remuneration packages in a manner that favored them while negatively impacting the workers in terms of pay, working conditions and performance measurement. Tsamenyi et al. (2010) found improved performance due to better management controls in two Ghanaian SOEs. Both enterprises implemented formal commercial oriented budgetary control systems and automated accounting and information systems. A similar finding has been reported in a Sri-Lankan case study where more commercial budgeting practices were adopted after privatization (Wickramasinghe & Hopper, 2005).

## 3. Research Objectives and Questions

The main objective of this paper is to analyze the post-privatization performance and organizational changes of a state-owned enterprise from Pakistan. The key research question we address is:

➤ How has the performance of a state-owned enterprise changed after privatization from the perspective of sustainable development?

The key question is divided into following sub-questions:

- a) What are the impacts of privatization on sustainable development (socio-economic and environmental) performance?
- b) What form of organizational changes occurs after privatization and how they impact sustainable development performance?

# 4. Three Dimensions of Sustainable Development Performance

The necessity and desirability of pursuing sustainable forms of development have gained considerable currency over the last two decades. Sustainability is rising up the agenda globally (CIMA, 2010). Sustainable development (SD) has been championed at intergovernmental, national, regional and sectoral levels and now appears to be cemented in the public policy domain (Jan Bebbington, 2007). The World Bank is also promoting socially and environmentally sustainable private sector development and privatization for sustainable development. According to the World Bank (2001, p. xxi) "It is not enough to improve the quality of people's lives today; we have to ensure that short-term gains do not come at the expense of constrained opportunities for future development.....sustainable environmental management is an essential condition for long-term economic growth and lasting improvements in people's well-being".

SD in the current world environment is a challenging concept as it confronts the basic "economic model of the world that runs through conventional accounting and finance" (Gray, 2002, p. 372). It seeks to marry economic betterment with social and environmental protection. The main argument is that economic development should not be at the expense

of environmental degradation (Jones, 2010). SD, however is a fluid concept which has been transformed so as to meet various mutually exclusive outcomes (Bebbington, 2001). Governments have started the process of shaping and guiding the economic system to deliver SD outcomes rather than a much narrower focus on economic growth. These moves at the macro-level are now shaping the demands for the corporations to contribute towards sustainable development. As a result, companies are now taking initiatives that seek to allow them to address their social, environmental and economic impacts (CIMA, 2010). This paper will evaluate whether, and how, the activities and performance of the company conform to the principles of SD after privatization.

SD is a difficult concept to define with precision and this makes evaluating SD performance challenging. SD is most frequently defined as "development that meets the needs of the present without compromising the needs of future generations" (WCED, 1987). The common conceptualization is that current economic activity leads to social and environmental outcomes which are neither ecologically sustainable nor socially just. SD is thus a form of economic activity (leading) to development that meets the dual criteria of social and environmental sustainability.

Most commentators agree that SD is comprised of three dimensions: economic, social and environmental aspects (Bebbington, 2007; Gudmundsson & Hojer, 1996; Milne, 1996; Van den Bergh, 1996; WCED, 1987; Westing, 1996). This multi-dimensional concept is not directly measurable and requires a set of indicators to enable performance toward its multiple objectives to be assessed. Keeping in view the multiplicity of dimensions such performance analysis usually requires multiple units of measurement (financial and non-financial) using quantitative and qualitative tools where appropriate. For example for measuring economic performance, financial units of measurement are usually preferred but they may not be appropriate for measuring social and environmental performance and this requires wide range of tools and indicators (Lamberton, 2005). For the purpose of this paper, guidance is drawn from relevant literature on post-privatization performance analysis, World Bank studies and GRI Guidelines on Sustainability Reporting with respect to the indicators that could provide broader appreciation of SD performance under each of three different aspects.

According to Bebbington (2007), there are three approaches for SD performance measurement and analysis. The first one is to provide an overview of SD performance by using a variety of indicators relating to each of the three dimensions and presenting them together. Such an approach will be used in this paper to carry out organizational level performance analysis. The problem with this approach is that it ignores the interlocking nature of social, environmental and economic issues. In this approach, there is no single way to combine indicators and multiple interpretations are possible. The other two approaches however provide explicit decision rules and the possibility of a single figure being drawn out to represent the overall performance but they are complex and require extensive data which was not available due to limited accessibility to the case company. Because of such limitations, these methods are ignored in this paper.

#### 5. Research Methods

In order to achieve the objectives of this research, case study approach was deemed appropriate. According to Yin (2013), a case study is "...an empirical inquiry that investigates a contemporary phenomenon (the "case") in depth and within its real-world context". Case studies involve a detailed exploration, typically with information

accumulated over a phase of time, of a phenomenon within their context. (O'Gorman & MacIntosh, 2014). The fundamental objective is to generate an analysis of the context and processes which enlightens the theoretical questions being researched. Case study approach is most suitable for answering 'how' and 'why' questions. Since this study is concerned with how question of the organizational performance after privatization, case study approach was deemed appropriate.

The case company, hypothetically referred as Alpha is a fertilizer company from Pakistan that was privatized in 2005. Before privatization, the company was jointly owned by the Government of Pakistan and Abu Dhabi. The company is now 100% owned by a consortium of two local business groups. The company is one of the largest fertilizer complexes in Pakistan that is engaged in the manufacturing of calcium ammonium nitrate, nitro phosphate (compound fertilizer), besides ammonia, nitric acid and urea.

The data collection that spans for almost one month relied on multiple sources. First documents (including reports from government departments, financial institutions, industry experts and corporate reports) were analyzed to get background information about the privatization process, state of the industry and of the case company. Then, annual reports of the company were analyzed for the performance evaluation. The analysis was carried out for the period of 10 years from 2001-2010. The period was chosen so as get insights about both pre and post privatization performance. Further, semi-structured interviews were conducted with 3 managers from Alpha Company. These managers were drawn from finance, human resource and corporate communications department of the company. For seeking views of the pre and post-privatization performance, mangers that were aware of the performance in both periods were contacted and interviewed. The interviewees were mainly asked to comment on the different aspects of the performance and to provide explanation of the findings that were discovered during the analysis. In addition to this, the interviewees were mainly asked to describe the organizational changes that occurred after privatization.

# 6. Overview of Privatization and Fertilizer Industry in Pakistan

Pakistan has started privatization process in late eighties when SAPs actually began to dictate Pakistan's economic policies (Zaidi, 2005). Privatization was declared as the primary economic objective in the year 1990 and a plan to divest 118 State Owned Enterprises (SOEs) was approved. For the realization of plans and institutionalization of privatization, the Privatization Commission (PC) was established with the mission to "foster competition, ensuring greater capital investment, competitiveness, and modernization, resulting in enhancement of employment and provision of improved quality of products and services to the consumers and reduction in fiscal burden" (Hakro & Akram, 2009, p. 2).

Legally, the Economic Reforms Order of 1972 was countered by the ratification of the Protection of the Economic Reforms Ordinance 1991 (Siddiqui, 2007). Starting at a good pace, during 1991-92, 69 manufacturing units were privatized, however after that period pace became slow due to turbulent political environment and only 21 additional manufacturing units could be privatized until 2000 (Kemal, 2000). Thereafter creation of a new Ministry of Privatization and promulgation of PC Ordinance gives more autonomy, clarity and powers for privatization which once again speed up the process. Since 1991 to June 2010, the PC completed 167 transactions for PKR 476.421 billion (PC, 2011). Privatization is the still the cornerstone of economic policy of Pakistan and been adopted invariably by all the governments (Kemal, 2000).

Fertilizers industry (manufacturing and distributing fertilizers) is crucial to an economy that is traditionally and predominantly agriculture-based (Shaoul & Momin, 2004). The fertilizer industry helps ensure that farmers have the nutrients they need to grow enough crops and to meet the world's requirements for food, fiber and energy. Any "natural or manufactured material that contains at least 5% of one or more of the three primary nutrients - nitrogen (N), phosphorous (P), or potassium (K) - can be considered a fertilizer" (IFA, 2011). Fertilizers are an essential component of long-term food security, agricultural market stability and sustainable farming.

In Pakistan, fertilizer industry is the backbone of agriculture sector which contributes to 22% of GDP and also provide extensive employment opportunities as 45% of the labor force is engaged in the agriculture sector. Moreover it provides major industrial crops (principally cotton) and paves the way for development of domestic textile which is the major contributor (approx. 57%) to the country's overall exports (CCOP, 2010). In this way fertilizer industry is making directly or indirectly significant contribution to the national economy. From the consumer perspective this industry provides essential goods or services and accounts for significant part of consumer spending thereby directly or indirectly affecting the quality of life of people. Another interesting aspect of this industry is that it aims to make land fertile but at the same time it is responsible for lot environmental issues (like air pollution in the form of CO2 emissions, water contamination etc.). With this much strategic importance of agriculture sector in terms of its socio-economic and environmental (sustainability) implications and the fact that fertilizer industry is the backbone, any government policy related to fertilizer industry may have far reaching socioeconomic and environmental impacts which shall be evaluated in a holistic and critical manner.

## 6.1 Fertilizer Industry of Pakistan before Privatization

At the time of independence in 1947, there were no fertilizer plants in Pakistan in spite of the fact that the country was largely agrarian. In the initial years, fertilizer demand was completely met through imports. Recognizing the strategic importance of the proper use of fertilizer on agricultural production, initial efforts were made by the government in the 1960s to build indigenous fertilizer capacity in the country. Among the early initiatives, two joint ventures were formed under the names Pak American Fertilizer Ltd (PAFL) and Pak Arab Fertilizer Ltd. These ventures were established under the umbrella of the National Fertilizer Corporation (NFC) which was the first major public sector initiative formed with the objective of keeping prices at reasonable and affordable levels. However, the cornerstone for urea manufacturing was laid via the gas discovery at Mari in1957, which later resulted in the formation of the first private sector fertilizer enterprise in 1965– Esso Pakistan Fertilizer Company (EPFC) (now renamed Engro Fertilizers Ltd). Thus the early years of fertilizer manufacturing were marked by a duopoly, with NFC being a public enterprise and EPFC being a private entity (CCOP, 2010).

# 6.2 Shift in Government Policy towards Privatization

During 1990's there was a shift in government policy when it was decided not to set up any fertilizer unit in the public sector and leave this highly profitable sector entirely to the private hands. The government also decided to deregulate the economy and exploit the potential of private sector in increasing the fertilizers production in the country. The deregulation of the fertilizer sector attracted considerable additional investment in the sector as a result of which the production capacity of the sector doubled from 2.95m tonnes

in 1990. Moreover, it has also been decided to privatize some of the existing fertilizer units owned by the government and managed by NFC. The first plant to be privatized was Pak-China Fertilizer, which was bought by the Schon Group in 1992. After this the process of privatization became very slow largely due to the political instability, which plagued the 1990s. Pak Saudi Fertilizer was purchased by Fauji Fertilizer Company in 2001 for a purchase price of PKR 7.3 billion. This was the second fertilizer plant to be privatized. The process of privatization reached to its climax when Alpha fertilizers Limited (the case company) was purchased by a consortium of two leading business groups group in 2005 followed by the privatization of Pak American fertilizers Ltd (purchased by Azgard-9) in 2006 (NFDC, 2010).

## 6.3 Current Outlook of the Fertilizer Indutry of Pakistan

The fertilizer sector in Pakistan currently comprises of eight companies none of which are in the public sector. Fauji Fertilizer Company Limited (FFCL) is the largest fertilizer manufacturer in the country with a designed production capacity of 1,887 thousand tonnes of urea (including the production capacity of Pak Saudi Fertilizer). Among the other companies include Fauji Fertilizer Bin Qasim Limited (FFBL), Dawood Hercules Chemical Limited (DHCL), Pakarab Fertilizers Limited (PFL), Pak American Fertilizers Limited (PAFL), Hazara Phosphate Fertilizer Limited (HALPHA) and Fatima Fertilizers Limited (FFL). The figure below showed the ownership structure of these companies.

An important aspect of the fertilizer industry of Pakistan is that ownership is concentrated in four major groups which are controlling the eight fertilizer companies. Among the four major groups include Fauji Foundation controlling FFC and FFBL, Dawood Group controlling DHCL and Engro Corporation, Fatima & Arif Habib Group controlling PFL and FFL, Azgard-9 controlling PAFL and HALPHA (CCOP, 2010).

## 7. Research Findings

## 7.1 Performance Analysis of Alpha Ltd – The Case Study

This section presents findings of the case study in relation to the post-privatization performance from the perspective of economic, social and environmental impacts. These findings are summarized in Table 1.1-1.3 and are discussed under three separate sections below.

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#### 7.2 Economic Performance

The company was profitable since 1986 and performed well since commencing operations. Before privatization of Alpha, all performance indicators were positive and apparently there was no need to privatize this highly profitable venture. Alpha was privatized in 2005 when its performance was at its peak as the reported profit (PKR 1.8 billion) for the year ending 2004 was highest ever since its commencement in 1979. There was an increase of 61.29% in net profits before tax as compared to the last year. This highest profitability was mainly because of the improvement in the operational efficiency, capacity utilization (almost 99%), increased production (highest ever production of 836,474 metric tons) and increased sales (24.36% increase in net sales). Return on Equity (ROE) and Return on Assets (ROA) was at record level of 144.4% and 38.05% respectively. Capital expenditure and dividends also reaches highest level.

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Despite of all this positive performance and positive indicators which reaches at its peak in year 2004, Alpha was privatized in 2005 as per government policy towards totally privatizing the fertilizer industry and to make further expansion through private sector development. This government policy was mainly dictated by the international financial institutions and was based on the assumptions of positive improvement in economic social and environmental performance. An interesting point is that Alpha Company was privatized at a cost of PKR 14 billion when it's annual after tax profits were on average PKR 1.5 billion and the company was giving almost 60% dividends to its shareholders and was also contributing approximately PKR 1 billion to national exchequer in the form of taxes, levies and other duties.

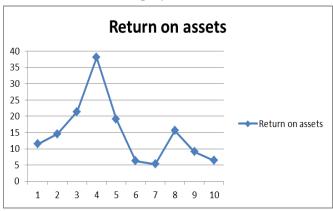
Table 1: Post-Privatization changes in Economic Performance of Alpha Ltd.

Indicators	Changes in Performance	Analysis
Capacity Utilization	Deteriorated	Before privatization capacity utilization reaches record level of 99%. After privatization it was on average 90%. Main reason is curtailment of gas and plant outages
Revenues	Improved substantially	There is almost 400% increase in revenues during the post-privatization period. Additional revenue comes from carbon credits, subsidy from government on NP Fertilizer and increase in sale prices
ROE	Decreased	Increase in reserves after privatization which increases the equity base decreases ROE.  Ignoring this fact ROE has improved since privatization on account of higher earnings.
ROA	Decreased	Revaluation of assets at fair value increases the asset base thereby decreasing ROA. Ignoring this factor ROA has improved on account of higher earnings
GP Margin, EBITDA, NP Margin	increased significantly	Increase in sales revenue, decrease in wages and salaries, better productivity
Subsidies	Continued	To provide incentive to the farmer for balanced use of fertilizer government as NP price in international market was high and farmer can't afford and they were substituting it with nitrogenous fertilizer.
Contribution to National Exchequer	Slight improvement.	Pre privatization PKR 1367 million in 2004 and post privatization PKR 1614 million in 2008.
Productivity	increases	Mainly on account of decrease in workers and additional investment to revamp and modernize machinery.

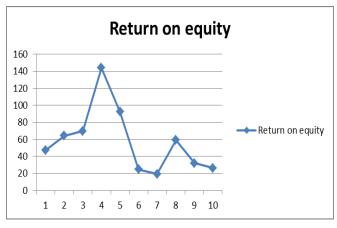
For the year ending 2005 when the company was privatized, production, sales and profits were lower. Decrease in production and sales was attributed to curtailment of gas and this along with post-retirement benefit and other allowances to Golden Handshake Scheme (GHS) and Voluntary Separation Scheme (VSS) optees result in a decrease in profits. In 2006, there was increase in profit as compared to previous year. However there was decrease in sales revenue by 6%. Increase in profit was mainly due to some prior period tax adjustments and decrease in provisions. During that period company's contribution to national exchequer on account of taxes, levies and duties amount to PKR 1043 million, a significant increase of 30% as compared to last year.

The most dramatic change in the financial performance of Alpha Company occurs in year ending Dec, 2008 when it earns after tax profit of 7,160 million, highest ever in the history of the company since its formation in 1973. This profit was also higher than the earnings of all other companies operating in the sector as FFC earned 6,525 million, Engro 4240 million, Dawood Hercules 3,063 million and FFBCL 2,900 million. Officials of the company attribute this high income to CDM project through which company sell carbon credits in the international markets. An interesting aspect is that ROE and ROA were lower as compared to pre-privatization period but highest since Privatization. One of the reasons for lower ROE and ROA was revaluation of assets after privatization which significantly increases the asset base of the company.

Return on Equity from 2001 - 2010

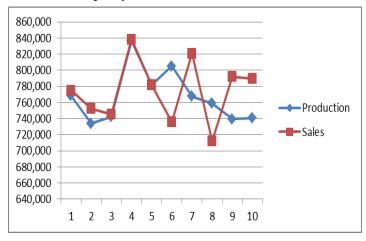


Return on Assets from 2001 - 2010

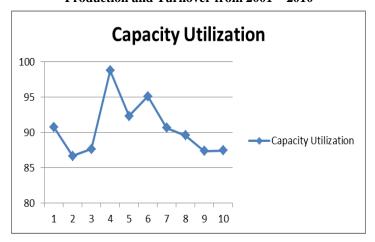


Lower ROE and ROA also indicates decrease in efficiency after privatization. There was a sharp decrease in the capacity utilization, production and sales after privatization. This means that higher profitability in 2008 cannot be attributed to increase in operational efficiencies.

**Capacity Utilization from 2001 – 2010** 



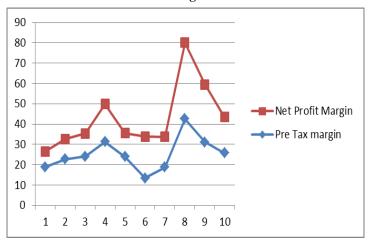
**Production and Turnover from 2001 – 2010** 



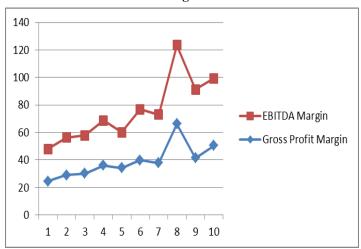
Despite of higher cost of sales as compared to previous years, the company managed to pocket pre-tax profits of PKR 8,342.48 million mainly because of the increase in revenues. However that increases in revenue was mainly because of the revenue from CDM project, subsidy from the government and increase in sale price of fertilizers in the international market. Annual report of 2008 showed revenue of PKR 1 billion from CDM project and subsidy of PKR 3 billion provided by government for the sale of NP fertilizer. This analysis was corroborated from the interview data in which one of the senior accounts executive of the company commented that "higher performance was due to increase in revenues on account of sales of carbon credits, provision of subsidy by the government on phosphate fertilizers and increase in sales prices in the international markets followed by

higher price charged by the company". If we remove these changes in revenue from sale of carbon credits and increase in fertilizer prices, then we don't see any improvement in the performance of the company. For the year 2009 and 2010, government withdraws subsidy and international prices go down. That's why profits of the company fell down as compared to 2008.

GP and EBITDA Margin from 2001 - 2010



Pre Tax and NP Margin from 2001 – 2010



Charging higher prices to customers have some social implications (which will be discussed in the social performance section) in terms of their impact on agriculture sector and people that belongs to that sector. Privatization is assumed to remove subsidies, increase competition and provide better quality products and services to the customers at low prices. Contrary to these assumptions what we observe in this case study is that after privatization not only government continue to provide subsidies to the company but the company also through its monopolistic position exerts significant influence on pricing. The company not only passed on any change in the cost structure to the end consumers but also fluctuations in the international market.

# 7.3 Social Performance

After privatization of Alpha Company, the new management offered golden handshake scheme to all employees. Those who don't want to opt for golden handshake were given guarantee for one year job. The option was availed by almost all of the employees with very few exceptions. Later on some employees were re-recruited at a package equal to or greater than the package before privatization. Such kind of layoffs and re-recruitment are common practices in privatized companies. In some cases this is used as a strategy to exploit employees but in this case all the re-recruitments were made at an equal or above package. Probing this point one of the company official from human resource department commented "this strategy was only used to get rid of least required employees and the ones who were creating problems during the privatization process while at the same time retaining most wanted employees and those favoring the process".

The company also withdraws some port-retirement benefits (pensions) to the new employees and devised a new payroll system. Before privatization the company's employees were classified into two grades only (executive grade and worker grade) for payroll purposes. After privatization the new management introduced thirteen grades for payroll purposes. When interviewed, one of the payroll managers commented "the top management of the company devised the payroll system favoring them while putting lower grade employees at a disadvantage". Such changes in the payroll created a class system with the effect of transfer of wealth from the poor to the rich.

Table 2: Post-privatization changes in Social Performance of Alpha Ltd.

SOCIAL PERI	SOCIAL PERFORMANCE				
Indicators	Changes in Performance	Analysis			
Number of employees	Decreased	Clean sweep of employees after privatization. Afterwards employees who were productive and favoring the process of privatization re-recruited at an equal or above package.			
Employee benefits	Decreased	Pension withdrawn and new payroll system devised to favor executives creating a class system.			
Safety standards	Improved	New initiatives were taken to further improve the safety standards.			
Community and Social Welfare	Increased	Increasing number of initiatives were taken after privatization at a quick pace			
Employee Development	Improved	Complete HR function established with a focus on career development			
Customer development	Improved	Number of customer awareness programs increased after privatization			
Competition & Pricing	Monopoly retained, prices increased	Prices of fertilizer increases four times after privatization. ALPHA still maintains its monopolistic position in complex fertilizers (CAN and NP)			

Alpha Company, since its inception was active in community and social welfare programs. In this regard in April 1993 Alpha welfare trust was established with the objectives of payment of monthly stipends to deserving families, provision of financial assistance for daughter's marriage, deserving students, medical aid to needy casual employees and interest free loan facility to low paid employees. The company also has paid special attention to the educational facilities for children of the employees. Besides this Alpha has an housing colony spread over an area of 130 acres which carries the facilities of hospital, park, shopping center, guest house, officers club, officers mess, transport and workers recreation club. When asked the question about social and community welfare initiates before and after privatization the corporate communications and CSR manager commented "management in different periods take different initiatives keeping in mind the needs and demands of that period but in general the new management after privatization is more quick and responsive towards the needs and demands and in taking various initiates of social responsibility"

During the year 2008 the company contributed PKR. 12.434 million to different hospitals and medical institutes country-wide. One of the unique initiatives taken in the fertilizer industry by Alpha Company was the establishment of a Biological Laboratory in 2007 that becomes fully functional in 2008 and hundreds of farmers benefited from this facility. In that laboratory insect predators are mass multiplied in the laboratory and then supplied to the growers for release in the field. These predators can be used to control insect pests of various crops like sugarcane, cotton, maize, sorghum, vegetables and citrus. Such facility aimed at the reduction of pesticide use, control insects biologically and minimizes environmental pollution. In the year 2008, Alpha Company also held farmers awareness programs. These programs were intended to improve farmer's knowledge and perception about Alpha's products as well as to improve farm's productivity and profitability through the use of balanced fertilizers.

Another initiative that shows Alpha Company's long standing commitment towards community development and social welfare is the construction of a kidney and Psychiatric Hospital for the treatment of workers and poor people of the area. The hospital was established as a Public-Private partnership. For the establishment of the hospital 50% was contributed by the government and the remaining 50% was contributed by the company. The land for this project was provided for free by the company.

Safety standards are procedures were good before Privatization as evident from the data taken from the annual report of year ending 2004 which confirmed 5.3 million man hours without lost workday injury to any employee since April 2003. This was all time record since start up in 1979. After privatization, the management of Alpha take some new initiatives for further improvement in safety standards and for the year ended Dec 31, 2009 the company achieved 6.5 million safe working man hours without any lost time injury which is an indication of the importance given by Alpha for safe operations.

One of the negative social implications of the privatization of the company is the impact of increase in fertilizer prices on its use and farm yield. Economic performance of the company indicates a substantial increase in revenues and gross profit margins after privatization. Analysis indicates the major contributor for this increase is increase in sales price. Fertilizer prices are deregulated by the government of Pakistan and are now completely driven by market forces with some occasional intervention of the state. Before 2008 government was providing some subsidy on gas feed stock but now it is withdrawn. Competition analysis of the Fertilizer industry indicates that the industry on the whole is

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concentrated by four major groups with each having a significant power over the pricing and any change in the cost structure or change in the international market prices can be easily passed to customers. Moreover Alpha has a monopoly in the production of complex fertilizers (NP and CAN) which are their main products. This monopolistic position put the company in a position to charge any price to the customers.

This competition and pricing has real social implications as farmers' cannot afford this ever increasing price and they either decrease fertilizer use or start substituting phosphate fertilizer (expensive) with the nitrogenous fertilizer (cheap) thus not making the balanced use of fertilizer. This results in lesser farm yield impacting the food inflation and food security in the country. Issues of food inflation and security are then linked to poverty, corruption, law and order situation which are the big issues in less developed nations. So in our opinion fertilizer companies are earning profits at the expense of earnings of farmers (who are the poor people) and food security. Fertilizers are meant for sustainable farming but excess prices charged by the fertilizer companies in quest for better financial performance resulted in unsustainable farming.

# 7.4 Environmental Performance

The new management after privatization gave priority to the environmental concerns and remedial actions were taken promptly. Water Conservation, waste water treatment, air pollutants, global warming and hazardous waste disposal are the key concerns of modern era. Measures were taken to control environmental pollution (i-e. gaseous emissions, liquid effluents, solid wastes and noise pollution). Initiatives were taken by the new management for environmental protection. These initiatives also impacted financial performance positively and helped attaining better sustainable development performance. One of the initiatives in this regard is Clean Development Mechanism (CDM) project. CDM projects, at the international level, are mainly driven by the "Kyoto Protocol" which was established in 1997. The CDM project resulted in Certified Emission Reductions (CERs) which can be sold internationally. A global carbon market was created which allowed credits from clean energy in the developing world to be sold to offset emissions in the developed countries.

Table 3: Post-privatization changes in environmental performance of Alpha Ltd.

ENVIRONMENTAL PERFORMANCE				
Indicators	Changes in Performance	Analysis		
Emissions	Significant decrease in N2O omissions which is a greenhouse gas.	CDM project that generated carbon credits that are sold to developed countries and are generating additional revenue of almost PKR 1 billion.		
Solid and Liquid affluent	Not much improvement	Still there are lot of complaints for water contamination and damages to the local inhabitants.		
Energy Conservation	Improved	Number of initiatives taken to conserve energy like Cogen Plant		
Water Conservation	Improved	Number of initiatives taken to conserve water use		
Materials use	No change	No recycled material used.		
Environmental Management System	Improved	Company awarded ISO 9001:2004 after privatization		

Alpha Ltd owns and operates Nitric acid manufacturing plants. Nitrous Oxide ("N<sub>2</sub>O"), a Greenhouse Gas, is produced as a by-product of the manufacture of Nitric Acid and is emitted in the atmosphere. The new management of Alpha in 2006 conceived a project for the abatement of N2O in collaboration with Mitsubishi Corporation. Through this project company started generating saleable carbon-offset credits by reducing emissions of Nitrous Oxide (a greenhouse gas) and thus resulting in improving local environment and contributing to sustainable development in Pakistan. Highlighting the importance of the CDM project, one of the company official stated "...by means of the CDM project—the first and only such project in the country-the company has not only increased its income but also earned valuable foreign exchange for the country". For the financial year 2008, company generates revenue of approximately 1 billion PKR from the sale of carbon credits and almost similar amount of revenue is earned in the year 2009 and 2010 thus contributing to increased financial performance of the company for the respective years. This shows that the main incentive of the company for was to improve economic performance of the company while simultaneously taking care of society and environment.

In 2008, the Alpha Company was awarded ISO-14001:2004 certification, which is leading Environmental management System (EMS). The development of EMS within organizations is evolutionary. The different stages in the evolution process are legal compliance followed by focus on pollution control. Then emphasis moves from pollution control to pollution prevention and eco-efficiency with an eventual move to emphasize sustainability. Alpha is striving for continuous betterment of Environment portfolio through better process control, research and development work and improving the waste treatment systems. In recent turn around a number of initiatives were taken and maintenance jobs were performed by Alpha Company to reduce impacts of gaseous emission, liquid effluents and solid waste. Some of the recent initiatives include process optimization for Fluoride removal which has reduced 20% total dissolved solids in plant effluent as compared to 2009. In 2010, CDM was approved and generation of monitoring reports was started for verification of carbon credits. Total 54,583 numbers of CERs were

generated during the year 2010. Moreover to raise awareness among Alpha employees and their families, Earth Day and World Environment Days were celebrated and tree plantation was done on these occasions.

Despite of all these initiatives, there are lot of complaints against the company for polluting the surrounding air, land and water. Much of these complaints was before privatization and continues after privatization. All the concentration of the company seems to be on those environmental issues, management of which results in positive economic performance. All other issues that can have negative impact on economic performance are neither managed nor reported. Alpha under the private ownership is still spreading poison and toxic wastes to the surrounding polulation in the city.

# 8. Research Findings: Post-Privatization Organizational Changes

Prior to privatization the company was private limited jointly owned by the government of Pakistan and Abu Dhabi. After privatization, the company remained private limited with the change in ownership to the local business groups. In the year 2008, the status of the company was changed to public limited. However this move was not to share the good fortunes of the company with the general public, rather this move was made in order to attract more funds for expansions and improvements. Currently company is not listed on stock exchange for the purpose of issuing shares; however company's Term Finance Certificates are listed and traded on Karachi Stock Exchange, thus providing funds for expansions and improvements impacting the performance of the company.

After privatization, Oracle Financials, an Enterprise Resources Planning (ERP) System was implemented to upgrade information management and reporting technology and to replace previous management information system. The implementation of this integrated system caused significant efficiencies and enable line functions to effectively support business growth. Comparing the existing management information system with the previous, one of the interviewee commented "the new system give more autonomy and flexibility to generate different reports as compared to the previous one and this enables top management to have a firm grip on the company and its operations and help them in quick decision making which make significant improvement in the performance". In the year 2010 the company upgraded the ERP system for further improvements in the reporting and decision making. Alpha is also planning to implement the remaining ERP modules that will result in complete fully integrated ERP covering all areas of manufacturing, inventory, procurement, finance and HR.

Before Privatization, Alpha Company being the subsidiary of National Fertilizer Corporation (a public sector corporation) was under the control of directives from the Ministry of production and industries. It assigns them one year targets to be achieved. It also set quality standard and fixed demand which was then dealt by its marketing branch (NFML). Authority was centralized, protecting the interests of government. This very often resulted in inefficiencies and delay in decision making impacting the performance of the company as commented by one of the interviewee "before *privatization work was done through directives and there was distance between managers and policy makers which makes decision making very slow. He further added that in a corporate world a small delay in decision can cost you an opportunity worth millions of dollars"*.

After privatization the new management established appropriate policies and procedures, adequate organizational structure and effective monitoring to achieve the new objectives. In this regard responsibilities were assigned and authority was delegated. All the functions

were given under the authority and control of professionals who ensured effective integration and their combined efforts contributed towards the achievement of the ultimate objectives of the company. This has substantially improved the decision making and process becomes very quick as is evident from the number of initiatives taken in post-privatization period. In order to ensure effective co-ordination amongst the various divisions of the organization, a "management committee" was established. The committee, which comprised all divisional heads, was responsible for reviewing business operations & financial performance, preparing recommendations for the board based on proposals by respective divisions, strategic decision making for improvement in organizational health including human resource policies and carrying out other tasks delegated by the board.

Prior to privatization, all sale of fertilizers products were made to national fertilizers marketing limited (NFML), an associated company and there was no marketing department. NFML charge marketing incidentals to the company based on the total marketing expenses of NFML which are then divided equally to all companies under the control of the NFC. This system of charging marketing incidentals was costing more to the company resulting in sub-optimal financial performance as inefficiencies on part of NFML were easily passed to the companies. After privatization Alpha Marketing division was established with a professional head responsible for the operations of the department. Marketing division was responsible for all marketing operations like sales planning, distribution and warehousing, sales and technical support services. Due to better control and authority over the activities of the marketing department, company was able to increase sales by introducing better incentives and marketing policies.

Before privatization, budgets were production oriented and a production target was set by NFC, keeping in view the overall demand of the country, which Alpha ensures to achieve. After privatization budgets become commercial but since the demand of fertilizers is yet not fully met through indigenous production, production is still the guiding force for budget preparation. Before privatization, there was no performance management system in place. After privatization, the company through its HR function has adopted a new performance management system that covers the entire cycle of performance measurement, including evaluation of existing goals and objectives, development of next year goals and objectives / key performance indicators and identification if relevant training and development needs, post appraisal interview for face to face interaction of employees and supervising managers, career development and succession planning.

# 9. Discussion and Conclusion

The objective of this paper is to analyze the post-privatization performance from the perspective of sustainable development along with organizational changes. This paper, by presenting a case study, argues that in order to understand complete impact of privatization in LDCs, myopic economic lens is unsuitable. This paper makes a case for a holistic and broad based evaluation that covers multiple aspects of performance rather than just economic. Concept of sustainable development and its three perspectives offers a much broader view of performance. Moreover, concept of sustainable development also brings environmental performance into the context which was missing from research on privatization and its impact on firm performance. The multi-dimensional performance evaluation approach adopted in this study is considered useful in analyzing post-privatization organizational performance. Methodologically, this study has adopted the qualitative case study approach. Data was gathered from both primary sources i.e. semi-structured interviews and secondary sources including documents.

This study reveals that the financial performance of the Alpha Company was good since its inception and before its privatization. Despite of earning the best ever profit of PKR 1.5 billion, the company was sold in 2005 to the consortium of local business groups. The major reason for this was the privatization policy that was adopted by the GOP on the dictation of IFIs. There was strong advocacy by the IFIs that such privatization will bring positive improvement in organizational performance and country development. Analysis of the annual reports and other external documents suggests that profits of the company increases almost 4 times during the post-privatization period; however this increase in profits cannot be attributed to operational efficiency as capacity utilization, production and sales volume decreased after privatization. Rather increase in sale price, provision of subsidy by the government and financial benefits from CDM project substantially increase the revenues and resulted in higher profits.

In contrast to the argument of proponents of privatization which argued for the increased competition and better quality products and services at lower prices, empirical evidence suggests that the Alpha Company retained its monopolistic competition and increase sale prices aggressively in the post privatization period. Such increase in sale prices has real social implications in terms of the affordability and use of fertilizers in general and balanced use of fertilizers in particular. When prices goes up, farmers either stop using fertilizers or start substituting phosphate fertilizer (expensive) to nitrogenous fertilizers (cheap). Such use of fertilizers ultimately impact farm yield and leads to poverty and food security issues. The case findings reveal that the new owners were only concerned with profits and they exploit their monopolistic position by making a massive increase in prices. They also make a lot of economic, social and environmental initiatives, bottom line for which was improvement in the company's financials rather than concerns for society and environment.

The opponents of privatization claim that privatization resulted in redundancies and lesser employees' benefits. The findings of this case study support this argument and found that after privatization, new management fired all the existing employees and then rehire few employees on new employment terms and conditions (e.g. defined contribution plan was withdrawn in new package). Most of the existing employees were rehired at the same or higher packages. New management supported this layoff process in the name of efficiency by arguing that this was an effort to get rid of less productive staff. These findings are similar to the findings of Xu and Uddin (2008) and Tsamenyi et al. (2010) which showed negative impacts of privatization on employees.

The post-privatization environmental performance analysis of the Alpha Company showed that new management generated great revenue from the sale of carbon credits to developed countries. Alpha company initiated multi-million dollar CDM project for  $N_2O$  (a greenhouse gas) abatement, which resulted in saleable carbon credits. This initiative of the company was then projected as its contribution towards sustainable development. Some other initiatives were also taken to reduce waste but findings showed that company is still polluting the surrounding population. Unprocessed liquid and solid waste in the canals is one of the biggest source of water contamination and destruction of crops. The overall analysis concludes that the main attention of the new management was towards those issues (including environmental) which were recognized as positive steps towards economic and financial performance. The social and environmental issues that create a negative impact on economic and financial performance were neither managed nor reported.

In addition to that some organizational changes were also introduced, including change of company status from private to public limited, change of existing management information system from AS/400 to Oracle financials, decentralization of authority, introduction of marketing department and new budgeting and performance management systems. These organizational changes provide more funds for expansion, better information for decision making, more authority to managers for better control, better control over marketing costs and customer awareness, more commercial budgeting system and incentive based performance management system for motivating employees for better performance. According to the interviews the new owners were quick in making decisions towards achievement of new organizational objectives which had positive impact on performance. These findings correspond with other studies (e.g. Tsamenyi et al., 2010; Uddin & Hopper, 2003; Wickramasinghe & Hopper, 2005) which found positive impact of organizational changes on financial performance.

The overall conclusion that can be drawn is that post-privatization performance of the company was not improved significantly from the perspective of sustainable development. Although operating profit increased substantially, that was mainly because of increase in prices. The price increase has negative social implications. Increase in profit was also due to increase in revenues through the sale of carbon credits. Although the CDM project resulted in reduction in greenhouse gases which is good for sustainable development, the main incentive for the company was economic. Other environmental issues that could decrease financial performance were ignored. Employees also suffered from the privatization process in the form of layoffs and decrease in benefits. The better profitability of the company can also be attributed to certain organizational changes through which decision making became quick. The new owners who were entrepreneurs made quick decisions on various proposals for value creation in the company.

This paper has certain limitations. First, only three interviews were conducted due to the limited accessibility to the case company. The findings of this paper are limited to the knowledge and perception of the persons interviewed and interpretation and analysis of the researcher. Second, this paper is based on only one organization that was selected because of the ease of access. This choice of the case definitely influenced the results as the company was already performing well before privatization. There are several other cases in which organizations were either performing badly before privatization or failed to perform after privatization. Selection of these companies may result in different findings. Future studies can be directed towards such organizations for comparative analysis. Finally, there are limitations with the approach adopted in this paper for SD performance analysis. In this approach there is no specific decision rule to make conclusions which makes performance evaluation subject to individual judgment and interpretation. Despite of these limitations, in our opinion this study contributes to the literature on privatization and performance by drawing on the broad based concept of sustainable development.

## REFERENCES

Adam, C., Cavendish, W., & Mistry, P. S. (1992). Adjusting privatization: Case studies from developing countries. Portsmouth, N.H.: Reed, Heinemann.

World Bank. (2000). The quality of growth. New York: Oxford University Press.

World Bank. (2001). Making Sustainable Commitments - An Environment Strategy for the World Bank. Online [available] Retrieved on 27/12/2014,

#### Mahmood et al.

http://siteresources.worldbank.org/ENVIRONMENT/Resources/244380-1250028593656/6382907-1252510780845/6428643-1255012678534/WBG-Environment-Strategy-2001-Full.pdf

Bebbington, J. (2001). Sustainable development: a review of the international development, business and accounting literature. In Accounting Forum, 25(20, 128-157.

Bebbington, J. (2007). Accounting for sustainable development performance: Butterworth-Heinemann.

Bennington, L., & Cummane, J. (1997). The road to privatization: TQM and business planning. *International Journal of Public Sector Management*, 10(5), 364-376.

Bös, D. (1991). Privatization: a theoretical treatment: Oxford University Press, USA.

Boubakri, N., & Cosset, J. C. (1998). The financial and operating performance of newly privatized firms: Evidence from developing countries. *Journal of Finance*, 53(3), 1081-1110.

Competition Commission of Pakistan. (2010). Competition assessment of the fertilzer sector in Pakistan. [Online] Retrieved 24/08/2011, from:

http://www.cc.gov.pk/index.php?option=com\_content&view=article&id=89:competition-assessment-study-of-the-fertilizer-sector-in-pakistan&catid=2:publications&Itemid=77

CIMA. (2010). Sustainability in emerging markets: Lessons from South Africa. Retrieved 25/072011, [Online] Available: http://www.cimaglobal.com/Thought-leadership/Research-topics/Sustainability/Sustainability-in-emerging-markets-lessons-from-South-Africa/

Cole, B., & Cooper, C. (2006). Deskilling in the 21st century: the case of rail privatisation. *Critical Perspectives on Accounting*, 17(5), 601-625.

Cook, P., & Kirkpatrick, C. H. (1995). *Privatisation policy and performance: international perspectives*: Prentice Hall.

Cook, P., & Kirkpatrick, C. H. (1995). *Privatisation policy and performance: international perspectives*: Prentice Hall.

Cook, P., & Uchida, Y. (2003). Privatisation and economic growth in developing countries. *The Journal of Development Studies*, *39*(6), 121-154.

Gray, R. (2002). Of messiness, systems and sustainability: towards a more social and environmental finance and accounting. *The British Accounting Review*, 34(4), 357-386.

Gudmundsson, H., & Hojer, M. (1996). Sustainable development principles and their implications for transport. *Ecological economics*, 19(3), 269-282.

Hakro, A. N., & Akram, M. (2009). Pre-Post Performance Assessment Of Privatization Process In Pakistan. *International Review of Business Research Papers*, 5(1), 70-86.

Hemming, R., & Mansoor, A. M. (1988). Privatization and public enterprises. In P. Cook & C. Kirkpatrick (Eds.), *Privatisation in Developing Countries* (Vol. II): Edward Elgar Cheltenham.

Hoque, Z., & Alam, M. (2004). Privatization, management accounting change, and cultural values in a developing country: Case studies from Bangladesh. In: Hopper, Trevor, and Hoque, Zahirul, (eds.) Accounting and Accountability in Emerging and Transition Economies. Research in Accounting in Emerging Economies . Emerald Group Publishing, Oxford, UK, pp. 441-466.

International Fertilizers Association. (2011). What are Fertilizers? Retrieved 23/08/2011, [Online] Available: http://www.fertilizer.org/ifa/HomePage/FERTILIZERS-THE-INDUSTRY/What-are-fertilizers

Yarrow, G., & Vickers, J. (Eds.). (1985). *Privatization and the natural monopolies*: London: Public Choice Centre.

Jenkins, R. (2000). Globalisation, Trade Liberalization and Industrial Pollution in Latin America. In: Jenkins R, editor. Industry and environment in Latin America. London: Routledge, 13-42.

Jones, M. J. (2010). Accounting for the environment: Towards a theoretical perspective for environmental accounting and reporting. Accounting Forum, 34, 123-138.

Josiah, J., Burton, B., Gallhofer, S., & Haslam, J. (2010). Accounting for privatisation in Africa? Reflections from a critical interdisciplinary perspective. *Critical Perspectives on Accounting*, 21(5), 374-389.

Jupe, R. (2009). A "fresh start" or the "worst of all worlds"? A critical financial analysis of the performance and regulation of Network Rail in Britain's privatised railway system. *Critical Perspectives on Accounting*, 20(2), 175-204.

Kemal, A. R. (2000). Privatisation in Pakistan. In G. Joshi (Ed.), *Privatisation in South Asia*. New Delhi: International Labour Organisation.

Kikeri, S., Nellis, J., & Shirley, M. (1994). Privatization: lessons from market economies. *The World Bank Research Observer*, 9(2), 241-272.

Kouser, R., Azid, T. & Ali, K. (2012). Financial and operating performance of privatized firms: A case study of Pakistan. *International research journal of finance and economics (IRJFE)* Issue (87), 90-116.

Kouser, R., Azid, T. & Ali, K. (2011). Reasons for Privatization and Consequent Role of Government: Comprehensive Study Based on Early Evidence *International Journal of Contemporary Business Studies*, 2(10), 35-52.

Kouser, R., Azid, T. & Ali, K. (2011). Emergent Thinking on Privatization: A ReviewAnalysis. *Pakistan Journal of Social Sciences*, 31(1), 79-93.

Lamberton, G. (2005). Sustainability accounting—a brief history and conceptual framework. Accounting Forum, 29(1), 7-26.

Megginson, W. L., & Netter, J. M. (2001). From state to market: A survey of empirical studies on privatization. *Journal of economic literature*, 39(2), 321-389.

Milne, M. J. (1996). On sustainability; the environment and management accounting. *Management Accounting Research*, 7(1), 135-161.

National Fertilizers Development Center. (2010). Fertilizer Policy. [Online] Available: http://www.nfdc.gov.pk/policy.html. Retrieved on 24/08/2011.

O'Gorman, K., & MacIntosh, R. (2014). *Research Methods for Business and Management: a guide to writing your dissertation*: Goodfellow Publishers Limited.

Parker, D. (2009). The official history of privatisation: Taylor & Francis.

Parker, D., & Kirkpatrick, C. (2005). Privatisation in developing countries: A review of the evidence and the policy lessons. *Journal of Development Studies*, 41(4), 513-541.

#### Mahmood et al.

Privatization Commission of Pakistan. (2011). Progress to date. [Online] Available: http://www.privatisation.gov.pk/about/Progress-in-PC(latest).htm. Retrieved on 24/08/2011.

Perotti, E. C., & Van Oijen, P. (2001). Privatization, political risk and stock market development in emerging economies. *Journal of International Money and Finance*, 20(1), 43-69.

Plane, P. (1992). Productive efficiency of public enterprises: a macroeconomic analysis based on cross-section estimation of a neoclassical production function. *Applied Economics*, 24(8), 833-844.

Plane, P. (1997). Privatization and economic growth: an empirical investigation from a sample of developing market economies. *Applied Economics*, 29(2), 161-178.

Redda, B. M. (2007). Post-privatisation changes in management control, firm activities and performance: the case of Eritrea-based firms. Unpublished PhD Thesis, Department of Accounting, University of Groningen.

Rodrigues, M. G. M. (2003). Privatization and socioenvironmental conditions in Brazil's Amazonia: political challenges to neoliberal principles. *The Journal of Environment & Development*, 12(2), 205.

Shaoul, J. (1997). A Critical Financial Analysis of the Performance of Privatised Insustries: The Case of the Water Industry in England and Wales. *Critical Perspectives on Accounting*, 8(5), 479-505.

Shaoul, J., & Momin, M. (2004). A Stakeholder Analysis of Market Based Economic Policies: the case of the fertiliser industry in Bangladesh. *Research in Accounting in Emerging Economies, Accounting and Accountability in Emerging Transitional Economies*, 2(2), 407-439.

Sheshinski, E., & López-Calva, L. F. (2003). Privatization and its benefits: theory and evidence. *CESifo Economic Studies*, 49(3), 429-459.

Siddiqui, Z. H. (2007). Is industrial privatisation a viable economic policy for development? An analysis of the privatisation of public sector manufacturing inductries in Pakistan. University College London.

Tahir, P. (2014). *Economic and Social Consequences of Privatisation in Pakistan*. Friedrich-Ebert-Stiftung. Available [Online] at: http://library.fes.de/pdf-files/bueros/pakistan/11150.pdf

Tsamenyi, M., & Hopper, T. (2003). 'Management Accounting in a Gold Mining Company in Ghana. In 7th Interdisciplinary perspectives on Accounting Conferences in Madrid, Spain, July.

Tsamenyi, M., Onumah, J., & Tetteh-Kumah, E. (2010). Post-privatization performance and organizational changes: case studies from Ghana. *Critical Perspectives on Accounting*, 21(5), 428-442.

Uddin, S., & Hopper, T. (2001). A Bangladesh soap opera: privatisation, accounting, and regimes of control in a less developed country. *Accounting, organizations and society*, 26(7), 643-672.

Uddin, S., & Hopper, T. (2003). Accounting for privatisation in Bangladesh: testing World Bank claims. *Critical Perspectives on Accounting*, 14(7), 739-774.

Van den Bergh, J. C. J. M. (1996). *Ecological economics and sustainable development: Theory, methods, and applications*: Edward Elgar Publictions.

Vernon-Wortzel Lawrence H, H. (1989). Privatization: Not the only answer. *World Development*, 17(5), 633-641.

WCED, U. (1987). Our common future: Oxford: Oxford University Press.

Westing, A. H. (1996). Core values for sustainable development. *Environmental conservation*, 23(3), 218-225.

Wickramasinghe, D., & Hopper, T. (2005). A cultural political economy of management accounting controls: a case study of a textile Mill in a traditional Sinhalese village. *Critical Perspectives on Accounting*, 16(4), 473-503.

Wickramasinghe, D., Hopper, T., & Rathnasiri, C. (2004). Japanese cost management meets Sri Lankan politics: Disappearance and reappearance of bureaucratic management controls in a privatised utility. *Accounting, Auditing & Accountability Journal, 17*(1), 85-120.

Xu, W., & Uddin, S. (2008). Public sector reforms, privatisation and regimes of control in a Chinese enterprise. Accounting Forum, 32(2),162-177.

Yin, R. K. (2013). Case study research: Design and methods: Sage publications.

Zaidi, S. A. (2005). Issues in Pakistan's economy. Oxford University Press.