

## **Pre and Post Privatization Assessment and Banks' Performance: A Case of South Asian Countries**

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### **Abstract**

We investigate the pre and post-privatisation performance of the banking sector in Pakistan, Bangladesh and India. We use five years pre and post-privatization data from financial reports of the privatized banks. We apply ratio analysis and paired sample t-test to analyze the results. We find Pakistani banking sector performed well after privatization while Indian and Bangladeshi banking sector shows the insignificant difference in performance after privatization.

**Keywords:** Liquidity; Profitability; Efficiency; Performance; Privatization

### **Introduction**

Business success is a key element of every firm. Firms take necessary steps to improve their efficiency and profitability. Various approaches are employed to achieve such objectives and privatization is one of these approaches. In privatization, State-Owned Enterprises (SOE's) performance increases through proper allocation of assets and financial resources. Privatization tends to sell SOEs to the private sector (Kausar, Gul, Khan & Iqbal, 2014). Science, the last two decades, a trend in global SOE's business to Private Owned Enterprises (POE's) is increased. At the start privatization faced great criticism, later it was realized that it is one of important ways to foster operational efficiency of SOEs. In 1990s many European countries started privatization such as Spain, Germany, UK and Italy. Likely to European countries, many governments in Asia also initiated privatization at a lower level in their countries such as Pakistan, Bangladesh, India and China etc. Although in developing countries it becomes the most important to improve firm

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performance because of the increasing corruption and inefficiency, SOEs have failed to provide due benefits to the people (Baum, Hackney, Medas, & Sy, 2019)

The firms owned by the state are less efficient as compared to firms hold by private entities (Shaban & James, 2018). Privatization took place in various developing and developed countries to convert the government's role in economic development in 1980s. After gaining the experience in this field by many countries which became the base of privatization for future implementation on such SOE's which does not provide or fulfill the required expectation. Because of some internal problems the SOE's resources are not fully and efficiently utilized to get the required outcomes. To resolve these inherent problems government finds that without government intervention competitive market performs better. There are two important components of economic restructuring such as deregulation & privatization to produce rapid economic development through industrialization (Khan, 2004).

Privatization may improve profitability, operating efficiency, liquidity, provide fiscal relief, and motivate investors greatly (Quartey & Quartey, 2019). Especially in transition economies like Paksitan, privatization may bring more fruitful results in terms of economic efficiency and may attract more foreign investment (Cevik, 2020). Work has been done on privatization in the long run in many countries including Pakistan, India and Bangladesh but no work has been done in the short-run (Immediate basis) according to Khalid (2006) and García & Anson (2007). This study investigates how performance of SOEs changes after privatization in Pakistan, India and Bangladesh banking sector. Efficiency and prosperity are the outcomes of privatization to some extent. Currently, privatization is one of the interesting areas for researchers and they find that there are many aspects that can create different outcomes after privatization and on the privatization process. This study may help consumers and investors in taking decisions regarding deposits and investment by comparing the performance of public and private sector banks through following the current study. It is helpful for the government if it prefers privatization as a tool to improve firms' efficiency and to see how it effects performance of firms which will ultimately help improve economy. Since 1991, Pakistan, India and Bangladesh embarked upon privatization and so far, many enterprises have been privatized but the success of this process is based on the experienced gain by the privatization efforts in other countries. In view of this fact, this study informs policymakers and the public about the real picture of the cross-culture privatization by judging the effect of privatization on SOEs' financial performance.

The major objective is to determine change in performance before and after privitization, operating efficiency, liquidity and profitability of privatized

banks in Pakistan, India and Bangladesh. Furthermore, it investigates either there is an improvement in the performance, operating efficiency, liquidity and profitability after privatization.

There are five sections of this study. Section 1 describes the introduction and research gap, literature is discussed in part 2, section 3 explains the methodology. Empirical results are elaborated in part 4 followed by a conclusion in the last section.

## **Literature Review**

In 1990 it is observed that a huge loss occurred in foreign reserves and imbalance in external accounts in Pakistan and it is the main reason behind financial sector reforms and liberalization. Strong regulatory and effective banking system are the main objectives of privatization. There are different schools of thoughts of privatization. Analysis of property rights concludes that SOEs due to many reasons lose efficiency and effectiveness however privately owned businesses on contrary become more efficient and resilient. The separation of management and ownership does not lead to any change in the performance of the private banks. The manager and the political motives play an important role in the performance of the company in public ownership. The products can be produced more cheaply in the competitive market environment through privatization (Hayek, 1984; Caplan, 1999). Competition results in the improvement of efficiency (Littlechild, 2018). The principal-agent theory argues that there is no efficient mechanism available in the SOEs by which principals can limit the actions of their agents which is the main reason for inefficiency. Agents (Managers) have no motive to achieve efficiency because the reward is weak and not related to the profit in SOEs (Bos, 1991; Hamada, 2018). The managerial behavior in private ownership is linked to the expected future profits of the firms. They have been given more incentives by owners so that they try to maximize shareholders' wealth. As the above-discussed schools of thought are favoring POEs and suggest that moving from SOEs to POEs is beneficial for the whole economy. Public enterprises are major players in the debate of privatization. Public enterprises have to account for about ten percent of Gross Domestic Product (GDP) as reported by Shirley (1983). It is also believed that later in 1980, public enterprises become a greater burden on the economies of underdeveloped nations and became major source of outstanding debts. It is argued that privatization enhances profitability, operating efficiency and liquidity of the firm (Rizwan, 2015).

In the last decade, privatization is in a greater discussion in the empirical literature. In cases of most enterprises, the privatization improves their efficiency in terms of higher profits, increases efficiency, payment of dividends to

shareholders, and employment (Megginson Nash, & Randenborgh, 1994). Warzynski (2003) finds that privatization fosters profitability. Rizwan (2015) suggests that private ownership results in a higher rate of equity increased and return on earning assets also increased. The results of his study suggest that banks also benefits from the process of privatization as it increases their profits. Ochieng and Ahmed (2014) research on the performance of Kenyan aviation industry and conclude that liquidity and liability ratios are improved after privatization. This indicates an increase in financial efficiency. The study suggests that efficiency and profitability are increased post-privatization.

García & Anson (2007) check the fundamental attributes of the Spanish privatization and liberalization forms and the performance of firms which underwent privitization. They conclude that in the long run privatization improves the firms' performance but the same is not true in the short run. The most profitable public enterprises record the largest improvements in performance post-privatization. The overall effects of privatization are not always found positive (Havrylyshyn, & McGettigan, 2001). Wallsten (2000) conducts research in Africa and Latin America and finds that network improvements may be the reasons behind the competition. Omran (2007) finds that privatized banks are better in performance as compared to banks having majority shares held with government or any mixed structure.

Khalid (2006) and Garecia and Anson (2007) confirm that the performance of a firm increases after privatization in the long run however on immediate basis it may also give the same results. However, it is found that there are mixed results after privatization because some ratios are improved and some ratios give contrary results. Most of the studies investigate the post-privatization effects after three to five years of privatization of banks have recorded greater improvements in efficiency and performance (Boardman, Vining, & Weimer, 2016; Jiang, Yao and Feng, 2013). Similar results are observed from the bank reforms carried out in China. The study suggests that the privatization of banks has both short-run and long-run benefits on performance and efficiency about the cost and profit of privatized banks (Jiang & Yao, 2017). The private banks manage risk more efficiently than state-owned banks (He, Chen, & Liu, 2017). Moreover, it reveals that privatization brings significant benefits to SOEs regarding performance, efficiency, risk-taking and wealth creation (Gakhar, & Phukon, 2018). It is argued that private banks outperform public banks. Based on the above discussion, we develop the following hypotheses:

*H1: Profitability ratios of banks significantly differ in pre and post privatization*

*H2: Efficiency ratios of banks significantly differ in pre and post privatization*

*H3: Liquidity ratios of banks significantly differ in pre and post privatization*

*H4: Performance of banks significantly differ in pre and post privatization.*

## **Methodology**

The purpose of this study is to analyze the difference in the performance of banks before and after the privatization in Pakistan, Bangladesh and India. We use operating efficiency, liquidity and profitability ratios to measure the banks' performance. We extract data from the financial statements of privatized banks in selected countries. We select five banks in Pakistan, four banks in India and three banks in Bangladesh which are privatized and have a time span of 5 years of both before and after privatization. First, we apply pre and post-privatization ratio analysis. Secondly, we use a paired sample t-test to know how financial performance of banks change before and after privatization in terms of individual ratios as well as for overall performance. To evaluate the performance of the SOEs, the year of privatization is assigned a zero value and the average ratio of the company's performance is calculated.

## **Profitability**

It shows the ability of the firms' that how they generate the profit. There may be a evidence of financial performance improvement. We use three ratios to measure the profitability including return on assets (ROA), return on equity (ROE) and net profit margin (NPM)."

### ➤ Net Profit Margin (NPM)

After offsetting the expenses from net revenues, it displays the amount of each dollar sale. If the company is efficient to convert its sales into net profit, then its net profit margin will be high.

$$NPM = \frac{EBIT}{SALES}$$

➤ Return on assets (ROA)

It measures the amount of profit generated on investment in assets. This ratio shows how the assets are used effectively to increase the net profit after tax. An increase in this ratio means that the financial performance of the firms is improved following privatization.

$$ROA = \frac{EBIT}{TOTAL\ ASSETS}$$

➤ Return on equity (ROE)

It means that how much profit earned from the equity of their owners. ROE measures the return earned on the owner's equity.

$$ROE = \frac{EBIT}{EQUITY}$$

How much efficiently the company uses the resources of its owners is indicated by this ratio. The wealth of shareholders is maximizing by management due to this ratio that's why it is of great importance.

### **Liquidity**

The liquidity ratio of a company determines how a company is able to pay its debt so easily. These ratios explain that how much a firm is liquid to meet its obligations? Basically, two ratios are used in this study to measure the liquidity of banks after privatization. Liquidity is measured by the current ratio and quick ratio which are expected to improve in the period of post-privatization.

➤ Current Ratio

It is a measure of a firm's short-term solvency. The current ratio is related to firms' ability to handle debts and loans in the short term. The current ratio helps to understand whether resources held with the firm are capable to pay back the debts of that firm. This ratio is helpful for potential creditors to let them know whether to offer short term loans to a firm or not. The current ratio can also give a sense of the efficiency of a company's operating cycle.

$$CR = \frac{CURRENT\ ASSETS}{CURRENT\ LIABILITIES}$$

➤ Quick Ratio

This ratio entails the extent to which a company is sufficient enough having highly liquid funds to fulfill its immediate and short terms obligations. For this reason, the inventory is excluded from current assets.

$$QR = \frac{CURRENT\ ASSETS - INVENTORY}{CURRENT\ LIABILITIES}$$

**Operating Efficiency**

It is determined by two proxies: Total asset turnover (TATO) and receivable turnover (RTO) which refer sales to assets and receivable collection period in one accounting period respectively.

➤ Asset Turnover

This ratio related to the competence of management that identifies how quickly firms has become able to convert its assets into sales in an accounting period.

$$AT = \frac{Net\ Sales}{Average\ Total\ Assets}$$

➤ Receivables Turnover

This ratio identifies how quickly firms becomes able to acquire account receivels and convert it into cash in an accounting period.

$$RT = \frac{Net\ Sales}{Average\ Account\ Receivables}$$

**Empirical Results**

We use a paired sample t-test to check how performance is affected before and after privatization. Taking the average of pre and post-privatization performance t-test is drawn to assess the relationship between each ratio for all banks included in our sample.

**Table 1: Mean Differences**

	PAKISTAN			INDIA			BANGLADESH		
	Pre	Post	p-value	Pre	Post	p-value	Pre	Post	p-value
<b>Profitability</b>									
Return on Equity (ROE)	27.89	19.89	0.04**	14.73	12.56	0.19	9.63	10.29	0.45
Return on Assets (ROA)	0.78	1.59	0.08*	0.78	0.6*	0.09*	0.58	0.39	0.33
Net Profit Margin (NPM)	19.75	51.03	0.04**	18.31	11.74	.009***	1.11	0.18	.004***
<b>Liquidity</b>									
Current Ratio (CR)	1.19	0.96	0.08*	0.44	1.88	0.16	1.28	1.25	0.38
Quick Ratio (QR)	0.39	0.35	0.22	13.11	16.73	0.05**	1.06	0.84	.008***
<b>Efficiency</b>									
Total Asset Turnover (TATO)	0.03	0.05	0.07*	0.05	0.07	0.09*	0.07	0.09	0.39
Receivable Turnover (RTO)	0.03	0.04	.003***	0.06	0.08	0.014**	0.03	0.03	0.34

Note: 1%, 5% & 10% significance level is represented by \*\*\*, \*\* & \* respectively

In Table 1, we explain the results of selected ratios. We find that in Pakistan, most of the ratios are showing a positive trend after privatization which is similar to Omran (2007). We find that ROE and NPM show a significant difference before and after privatization as ROE decreases however NPM increases significantly while different of ROA is insignificant. CR and QR insignificantly differ pre and post-privatization but mean values suggest improvement after privatization. Total assets turnover insignificantly differs but receivables turnover increases after privatization and this difference is significant having p value less than 0.05. The mean value of both ratios is increased after privatization. In Indian banks, NPM has a significant change before and after privatization while ROA & ROE are insignificant. QR shows a significant change before and after privatization while CR remains insignificant. While both ratios provide an increase in mean values after privatization.

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Efficiency ratios, receivables turnover shows a significant change before and after privatization but total asset turnover remains insignificant. But both ratios mean values show improving trend after privatization. In the context of Bangladeshi bank's profitability ratios, NPM significantly differences out of 3 ratios between pre and post-privatization. Liquidity ratios, QR shows a significant change before and after privatization and the other one is insignificant (CR). The efficiency ratio, both measures show the insignificant change before and after privatization But one ratio (TATO) has positive improvement after privatization. Overall we find a mixed trend in the performance of the banks after privatization regarding profitability, liquidity and efficiency which is similar to previous studies of Earle and Telegdy (2002); and Wallsten (2001). Therefore, different countries have different results after privatization.

**Table-2: Paired Samples t-test**

	Paired Differences					t-value	DF	Sig.(2-tailed)
	Mean	Std. Dev.	Std. Error Mean	95% Confidence Interval of the Difference				
				Lower	Upper			
Pair Pak PRE-POST	-11.37	19.81	7.49	-29.69	6.95	-2.51	6	0.003
Pair IND PRE-POST	0.55	3.19	1.21	-2.40	3.49	0.45	6	0.334
Pair BANG PRE-POST	0.098	0.47	0.18	-0.34	0.54	0.55	6	0.303

In table 2, we find a significant improvement after privatization in Pakistan. One reason for this may be the fact that privatization occurred much before the financial crisis in Pakistan. Therefore, it is the reason that Pakistani banks performed better after privatization. According to several studies, the financial crisis of 2007-2008 has not affected the Pakistani banking industry due to its strong regulations and documentation. Results also show that, in Indian and Bangladeshi banking sectors, privatization did not go well in terms of change in performance.

The literature indicates that the objective of privatization is to increase firm profitability, liquidity and efficiency. In the current study, comparing each ratio separately provides an improvement after privatization which is in line with various studies in the literature. But as per the overall result of this study, the performance of the firm after privatization is increased in Pakistan which is

similar to Megginson Nash, and Randenborgh, (1994); Ehrlich, Gallais-Hamonno, Liu, and Lutter, (1994); Kikeri, and Nellis, (2004); Warzynski (2003), Ochieng, and Ahmed, (2014), but mixed result in India and Bangladesh are found, which are similar to the Martin and Parker (1995); Earle and Telegdy (2002); Frydman, Gray, Hessel, and Rapaczynski (1999); Villalonga (2000) and Wallsten (2001). Recent study from Egypt also analyzed effects of privatization of more than 60 companies during five year period on their profitability, efficiency, investment and other indicators. Authors found significant support for the notion that privatization significantly improved the performance measured in terms of operational efficiency, profitability and capital investment (Abdeldayem & Dulaimi, 2019). However, the findings of our study are in line with the consensus that privatization improves firm performance.

## **Conclusion**

Privatization is one of the strategies adopted by the government to sell their assets wholly or partially to private owners to meet the business needs in a dynamic environment and increase the performance. The purpose of our study is to assess the difference between the pre and post-privatization performance of the banks in Pakistan, India and Bangladesh. This study evaluates the performance of privatized banks for which government occurred the privatization deals during their respective years of privatization. We find a mix results regarding Pakistani banks' performance before and after privatization. It is revealed that banks' performance after privatization has significantly better than what it was before privatization. It is concluded that privatization yields benefits for Pakistani banks in terms of improved performance (due to the proper allocation of resources and proper execution of the right procedure) while India and Bangladesh need to improve the rules and regulations. So just privatization cannot increase performance if the procedure of privatization is not accurately taking place. It also depends upon the country's culture, economic conditions and environment. The government may adopt privatization which is favorable in the Pakistani environment. We suggest future directions to study the impact of privatization on the SOEs operational performance and economic growth.

## References

- Abdeldayem, M. M., & Dulaimi, S. H. A. (2019). Privatisation and financial performance in Egypt since 1991. *Asian Economic and Financial Review*, 9(4), 461-479. doi:10.18488/journal.aefr.2019.94.461.479
- Baum, A., Hackney, C., Medas, P., & Sy, M. (2019). Governance and State-Owned Enterprises: How Costly is Corruption? (N. Gueorguiev & C. Pattillo Eds.): International Monetary Fund.
- Boardman, A. E., Vining, A. R., & Weimer, D. L. (2016). The long-run effects of privatization on productivity: Evidence from Canada. *Journal of Policy Modeling*, 38(6), 1001-1017.
- Bos, D. (1991). Privatization: A theoretical treatment. *OUP Catalogue*.
- Caplan, B. (1999). The Austrian search for realistic foundations. *Southern Economic Journal*, 65(4), 823-838.
- Cevik, S. (2020). You are suffocating me: Firm-level analysis of state-owned enterprises and private investment. *Journal of Comparative Economics*. doi:10.1016/j.jce.2019.12.004
- Earle, J. S., & Telegdy, Á. (2002). Privatization methods and productivity effects in Romanian industrial enterprises. *Journal of Comparative Economics*, 30(4), 657-682.
- Ehrlich, Isaac, Georges Gallais-Hamonno, Zhiqiang Liu, and Randall Lutter. "Productivity growth and firm ownership: An analytical and empirical investigation." *Journal of Political Economy* 102, no. 5 (1994): 1006-1038.
- Frydman, R., Gray, C., Hessel, M., & Rapaczynski, A. (1999). When does privatization work? The impact of private ownership on corporate performance in the transition economies. *The quarterly journal of economics*, 114(4), 1153-1191.

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- Gakhar, D. V., & Phukon, A. (2018). From welfare to wealth creation: A review of the literature on privatization of state-owned enterprises. *International Journal of Public Sector Management*, 31(2), 265-286.
- García, L. C., & Ansón, S. G. (2007). The Spanish privatization process: Implications on the performance of divested firms. *International Review of Financial Analysis*, 16(4), 390-409.
- Hamada, K. (2018). Privatization neutrality theorem: When a public firm pursues general objectives. *The Japanese Economic Review*, 69(1), 59-68.
- Havrylyshyn, O., & McGettigan, D. (2000). Privatization in transition countries. *Post-Soviet Affairs*, 16(3), 257-286.
- Hayek, F. A. (1984). *Money, capital & fluctuations: early essays*. Routledge.
- He, L., Chen, L., & Liu, F. H. (2017). Banking reforms, performance and risk in China. *Applied Economics*, 49(40), 3995-4012.
- Jiang, C., & Yao, S. (2017). Banking reform and bank performance in China. In *Chinese Banking Reform* (pp. 57-92). Palgrave Macmillan, Cham.
- Jiang, C., Yao, S., & Feng, G. (2013). Bank ownership, privatization, and performance: Evidence from a transition country. *Journal of Banking & Finance*, 37(9), 3364-3372.
- Kausar, A., Gul, F., Khan, R. M., & Iqbal, M. (2014). The impact of privatization on the financial performance of banking industry: A comparison of privatized and public banks in Pakistan. In *First International Conference on Emerging Trends in Engineering, Management and Sciences (ICETEMS-2014)*. Peshawar, Pakistan.
- Khalid, U. (2006). The effect of privatization and liberalization on banking sector performance in Pakistan. *SBP Research Bulletin*, 2(2), 403-425.
- Khan, H. A. (2004). Development as freedom. *CIRJE Discussion Paper No. F-257*, Graduate School of Economics, University of Tokyo, Tokyo, Japan.

- Kikeri, S., & Nellis, J. (2004). An assessment of privatization. *The World Bank Research Observer*, 19(1), 87-118.
- Littlechild, S. (2018). Regulation and the nature of competition. *Journal of Air Transport Management*, 67, 211-223.
- Martin, S., & Parker, D. (1995). Privatization and economic performance throughout the UK business cycle. *Managerial and Decision Economics*, 16(3), 225-237.
- Meggison, W. L., Nash, R. C., & Van Randenborgh, M. (1994). The financial and operating performance of newly privatized firms: An international empirical analysis. *The Journal of Finance*, 49(2), 403-452.
- Ochieng, M. D., & Ahmed, A. H. (2014). The effects of privatization on the financial performance of Kenya airways. *International Journal of Business and Commerce*, 3(5), 10-26.
- Omran, M. (2007). Privatization, state ownership, and bank performance in Egypt. *World Development*, 35(4), 714-733.
- Quartey, J.D., & Quartey Joyece A. (2019). Towards survival of state owned enterprises in sub-saharan africa: do fiscal benefits matter?. *International Journal of Economics, Commerce and Management*, 5(7), 207-234
- Rizwan, M. (2015). Impact of privatization in banking sector: A case study of MCB and ABL. *Journal of Business and Management*, 17(1), 95-100.
- Shaban, M., & James, G. A. (2018). The effects of ownership change on bank performance and risk exposure: Evidence from Indonesia. *Journal of Banking & Finance*, 88, 483-497.
- Shirley, M. (1983). *Managing state-owned enterprises*. The World Bank.
- Vickers, J., & Yarrow, G. K. (1988). *Privatization: An economic analysis* (Vol. 18). MIT press.
- Villalonga, B. (2000). Privatization and efficiency: differentiating ownership effects from political, organizational, and dynamic effects. *Journal of Economic Behavior & Organization*, 42(1), 43-74.

Hunjra, A. I., Ali, A., & Bakari, B. (2019). JHSS. XXVII (1)

Wallsten, S. J. (2001). An econometric analysis of telecom competition, privatization, and regulation in Africa and Latin America. *The Journal of industrial economics*, 49(1), 1-19.

Warzynski, F. (2003). Managerial change, competition, and privatization in Ukraine. *Journal of comparative economics*, 31(2), 297-314.