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Banking and Development : Observations in Reforms' Era

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Banking and Development: Observations in Reforms' Era

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Abstract

In the context of wide regional disparities emerging in the process of development, the banks have an additional responsibility in India. That responsibility is to enter the under developed regions and to mobilize and channelize resources into local economic activities such that local development is promoted. In this context and using simple descriptive statistics methods, this study analyzes the regional disparities in the background and existence of the role of 'social banking'. The study observes that the regional disparity in terms of per capita net district domestic product exists in spite of the increasing credit distributions to all areas. Surprisingly, this happens even with the consideration of usual socio-economic factors. Therefore, it feels that the future research may explore more on the 'social banking' addressing regional disparities issues.

Key words: Regional disparities, Social banking, Local development

JEL Classifications: G20, G21, E50, E51, E52, E58, E58, E59, O10, R10, R11, R58, A10, A11

1. Introduction

It is a well-known fact that financial institutions, particularly commercial banks, play an important role in promoting national and local level development. The banks mobilize resources from people and channelize them into investment in various economic activities, which promote growth and development. Recognizing this fact, the Governments of India have in recent times adopted banking reforms to strengthen and to activate banks.

In the context of wide regional disparities emerging in the process of development, the banks have an additional responsibility. That responsibility is to enter the under developed regions and to mobilize and channelize resources into local economic activities such that local development is promoted.

2. Objectives

Objectives for this study are (1) to review the banking and socio-economic developments in reforms' era in the context of developmental focus like regional disparities and (2) to investigate the status of 'social banking' with the corporate social performance and corporate financial performance linkage and their functional relation in India particularly in the state of Karnataka. In turn, the outcomes can be injected for policy formulation and this can be directed to priority (socially thrust) sectors, which promote local development and thereby reduce regional disparities.

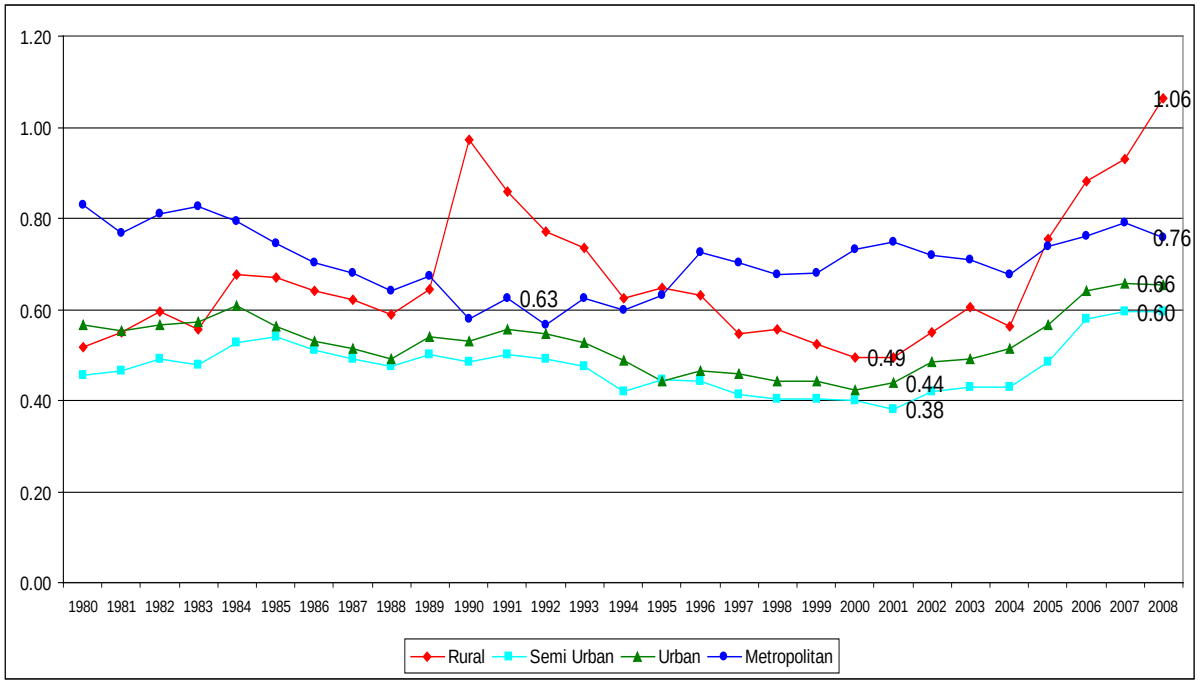
3. Data and Methodology

Required data are collected from websites like *www.rbi.org.in, www.indiastat.com, www.educationforallinindia.com/page163.html, www. des.kar.nic.in/indexie.html, and www.mospi.gov.in*. Other source of data is from the various issues of Money & Banking, Economic Intelligence Service, Centre for Monitoring Indian Economy Private Limited. This study has relied on the simple descriptive statistics methods.

4. Observations and Discussions

One of banking performance indicators is the credit to deposit ratio (C/D) that indicates the financial resource mobilization in the form of credit disbursement out of total deposit (e.g. presented in Mahapatra, 2005 and 2006). It is believed that higher C/D ratio leads for higher resource allocation and hence lower-regional disparities with increasing growth. It is observed that in the rigorous reforms period i.e. from the year 1991 to till today the credit deposit ratios are moving upwards among rural, urban, and semi-urban areas. This C/D ratio for rural area has increased from 0.49 in 2000 to 1.06 in 2008. Semi-urban and urban areas follow the same trend. That is the C/D ratio has increased from 0.38 & 0.44 in 2001 to 0.60 & 0.66 in 2007 respectively. The metropolitan area has also the same increasing trend with regard to the C/D ratio. That is, it has increased from 0.63 in 1991 to 0.76 in 2008 (Figure 1).

Figure 1: C/D ratios for Scheduled Commercial Banks (According to Population Group)



Note: C/D ratio = Credit (in Rupees) / Deposit (in Rupees). Source: The Handbook of Statistics on the Indian Economy, Reserve Bank of India, 2008-09.

However, in the reforms era the rate of change of C/D ratio varies across the areas with the range of 10% and -10%. It is seen that the rate of change of C/D ratio has increased from -11.49% in 1991 to 14.32% in 2008 for rural areas. The rate of change of C/D ratio has decreased from 3.74% in 1991 to -0.06% in 2008 for semi-urban areas. The rate of change of

C/D ratio has decreased from 5.34% & 7.76% in 1991 to -0.43% & -4.43% in 2008 for urban and metropolitan areas respectively (Table 1 and Figure 2). From these results, it is clear that during the reforms era, the banking habit among the ruralities is catching up much faster compare to that among the urbanites.

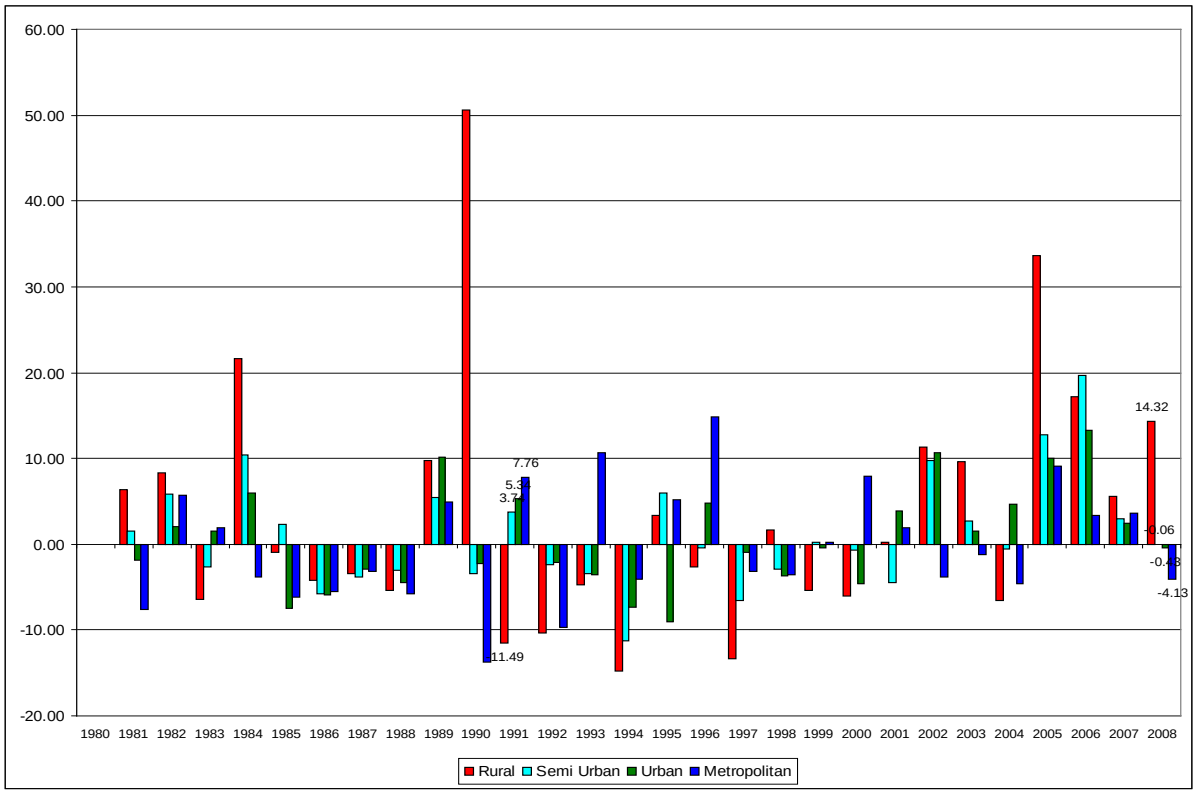
Table 1: Rate of change of C/D ratio (%) for SCBs (According to Population Group)

Year	Rate of change of C/D ratio (%)			
	Rural	Semi-Urban	Urban	Metropolitan
1981	6.33	1.57	-1.90	-7.61
1982	8.28	5.82	2.01	5.65
1983	-6.36	-2.58	1.53	1.95
1984	21.65	10.41	6.02	-3.86
1985	-0.96	2.37	-7.45	-6.22
1986	-4.24	-5.80	-5.88	-5.51
1987	-3.37	-3.82	-2.95	-3.17
1988	-5.34	-3.02	-4.47	-5.82
1989	9.75	5.47	10.14	4.87
1990	50.66	-3.43	-2.30	-13.69
1991	-11.49	3.74	5.34	7.76
1992	-10.41	-2.33	-2.16	-9.63
1993	-4.69	-3.44	-3.52	10.64
1994	-14.73	-11.24	-7.33	-4.10
1995	3.42	5.93	-9.06	5.18
1996	-2.67	-0.36	4.86	14.87
1997	-13.34	-6.62	-0.96	-3.12
1998	1.72	-2.88	-3.64	-3.54
1999	-5.44	0.19	-0.42	0.19
2000	-6.08	-0.73	-4.59	7.96
2001	0.21	-4.53	3.87	1.96
2002	11.37	9.81	10.72	-3.83
2003	9.65	2.73	1.53	-1.22
2004	-6.61	-0.59	4.63	-4.61
2005	33.66	12.79	10.04	9.06
2006	17.14	19.73	13.28	3.35
2007	5.60	2.92	2.50	3.58
2008	14.32	-0.06	-0.43	-4.13

Note: C/D ratio = Credit (in Rupees) / Deposit (in Rupees). Rate of change of C/D ratio = $[(C/D_t - C/D_{t-1}) / (C/D_{t-1})] \times 100$.

Source: The Handbook of Statistics on the Indian Economy, Reserve Bank of India, 2008-09.

Figure 2: Rate of change of C/D ratio (%) for Scheduled Commercial Banks (According to Population Group)



Economic development can be measured in terms of net state/district domestic product at factor prices where it usually helps to regenerate deposits and to further credit disbursements such that sustainable growth continues. From Table 2 and 3, it can be seen that there is a mixed result on the relationship between C/D ratio and net state domestic product at factor costs as well as per capita net state domestic product at factor costs. For the financial year of 2006-07 selected Indian states like Goa, Punjab, Tamil Nadu, and Uttar Pradesh are having lower C/D ratios with higher net state domestic products than other states. In contrast, for the same financial year selected Indian states like Kerala, West Bengal, Rajasthan, and Karnataka are having higher C/D ratios with lower net state domestic products than other states.

From Table 3, it can be seen that in the financial year 2006-07 selected Indian states like Goa, Tamil Nadu, Assam, and Mizoram are having lower C/D ratios with higher per capita net state domestic products than other states. In contrast, for the same financial year selected Indian states like Kerala, West Bengal, Rajasthan, and Karnataka are having higher

C/D ratios with lower per capita net state domestic products than other states[1]. It is also observed that coefficient of variation[2] values on C/D ratio series for selected states (proxy for all India) are decreasing (Table 2). This implies that credit disbursement out of total deposit is improving throughout the reforms period. However, Maharashtra has the highest C/D ratio and Goa has the lowest C/D ratio where both have higher per capita state domestic products than other states (i.e. Rs. 44,966 and Rs. 98,765 respectively, Table 3). Therefore, here the point is that bank performance indicator C/D ratio alone may not be helpful indicator of growth and of 'social banking'.

With these observations, let us now focus on the particular case of the state of Karnataka. From Table 4 and Figure 3, it can be seen that up to the financial year of 2002-03 the rate of change of C/D ratio is positive where both the net bank domestic product and net state domestic product are increasing. In the financial year of 2003-04, the rate of change of C/D ratio is negative at about -2.95% where as the rate of change of net state domestic product is at about 1.95%. Here the rate of change of net state domestic product is falling when there is negative rate of change of C/D ratio. That is compared to the previous financial years the net state domestic product rate is increasing at a rate of about 1.95%. As the rate of change of C/D ratio increases in the financial years of 2004-05 and 2005-06, it is observed that the status of both the net bank domestic product and net state domestic product show an increasing trend during the same years. However, in the financial year of 2006-07 the rate of change of C/D ratio increases at a lower rate of 6.85% where as the rate of change of net bank domestic product shows an increasing rate of 12.67% but the rate of change of net state domestic product is increasing at a lower rate of 5.97%.

[1] Here some of economic indicators like 'literacy' (≈ below Post Graduation educational level) alone may not help for economic development, as survey statistics reports that states like Kerala, Karnataka have high literacy rate (around 99% and 67% respectively) along with lower net state domestic products as well as per capita net state domestic products than other states.

[2] Coefficient of variation is equal to standard deviation divided by mean i.e. $\sigma / \bar{x}$, where $\sigma = \sqrt{\frac{\sum (x - \bar{x})^2}{n-1}}$. The application part can be seen in the study of Noorbakhsh (2003).

Table 2: C/D ratio and net state domestic product at factor cost with constant (1999-2000) prices (Rupees crore).

Selected Indian States	00-01	01-02	02-03	03-04	04-05	05-06	06-07	08	09	NSDP 06-07	NSDP 07-08	NSDP 08-09
Mizoram	0.29	0.36	0.31	0.40	0.59	0.54	0.58	0.56	0.59	2629	2887	3184
Goa	0.27	0.28	0.28	0.27	0.30	0.28	0.30	0.29	0.27	13274	16555	NA
Assam	0.38	0.70	0.62	0.36	0.42	0.49	0.53	0.41	0.38	57378	62852	NA
Odisha	0.42	0.51	0.57	0.59	0.75	0.79	0.73	0.57	0.51	81392	92603	106092
Punjab	0.42	0.44	0.43	0.46	0.50	0.56	0.65	0.66	0.66	107553	123457	141511
Madhya Pra	0.42	0.44	0.44	0.48	0.58	0.64	0.64	0.60	0.57	113221	123230	NA
Kerala	0.52	0.50	0.52	0.50	0.61	0.67	0.65	0.65	0.60	123366	140889	NA
Rajasthan	0.50	0.55	0.55	0.63	0.77	0.86	0.91	0.82	0.80	129093	147714	167261
Karnataka	0.62	0.69	0.71	0.69	0.80	0.93	1.00	0.78	0.77	174742	203703	NA
West Bengal	0.43	0.49	0.50	0.54	0.57	0.61	0.68	0.61	0.61	240775	274897	NA
Tamil Nadu	0.32	0.34	0.36	0.38	0.42	0.46	0.50	1.13	1.09	243351	268667	299119
Uttar Pradesh	0.84	0.78	0.77	0.67	0.76	0.81	0.77	0.45	0.42	271750	303228	350297
Maharastra	0.91	0.89	0.93	0.96	1.05	1.09	1.19	0.95	0.91	435055	504951	NA
Average	**0.49**	**0.54**	**0.54**	**0.53**	**0.63**	**0.67**	**0.70**	**0.65**	**0.63**	**153352**	**174279**	**NA**
CV	**0.40**	**0.33**	**0.35**	**0.34**	**0.32**	**0.33**	**0.33**	**0.35**	**0.35**	**0.78**	**0.79**	**NA**

Note: C/D ratio = Credit (in Rupees) / Deposit (in Rupees), NA: Not Available. Randomly states are taken into consideration from each of regions of the country based on higher C/D ratio values. Source: RBI Data Base: *www.rbi.org.in*, The Handbook of Statistics on the Indian Economy, Reserve Bank of India, 2008-09, and Money & Banking, Economic Intelligence Service, Centre for Monitoring Indian Economy Private Limited, 2008.

Table 3: C/D ratio and per capita net state domestic product at factor cost with constant (1999-2000) prices

Selected Indian States	CD 2006-07	PCNSDP2006-07 (Rs.)
Goa	0.30	98765
Tamil Nadu	0.50	39180
Assam	0.53	21540
Mizoram	0.58	29504
Madhya Pradesh	0.64	18750
Kerala	0.65	38747
Punjab	0.65	44280
West Bengal	0.68	30014
Odisha	0.73	22174
Uttar Pradesh	0.77	16365
Rajasthan	0.91	22859
Karnataka	1.00	33137
Maharashtra	1.19	44966
Average	**0.70**	**35406**

Source: RBI Data Base: *www.rbi.org.in*, The Handbook of Statistics on the Indian Economy, Reserve Bank of India, 2008-09, Money & Banking, Economic Intelligence Service, Centre for Monitoring Indian Economy Private Limited, 2008, and Supplement of Paper 1 of Census 2001, Registrar General of India, Government of India, New Delhi, *http://www.educationforallinindia.com/page163.html*

As Table 4 shows, the estimated correlation coefficients between series like the rate of change of C/D ratios and the rate of change of net bank domestic product as well as net state domestic product take the values of 0.66 and 0.99 respectively, where '*t*' test statistics shows that these observational values are significant at 1% level. Therefore, from all these observations it is clear that there is a unidirectional relationship between the rate of change of C/D ratio and rate of change of net bank domestic product as well as net state domestic product. It can be inferred here that both net bank domestic product and net state domestic product depend on the priority sectors' development initiated by credit disbursements from bank deposits. Here the priority sectors identified for credit disbursements are financial and professional services, trading, and personal consumption purposes. Professional and other services include services related to 'computers, engineering, technical, and medical activities, hotels and restaurants, recreational, cultural & sporting activities, repairs & servicing of household goods, motor vehicles, office accounting & computing, machinery and other similar activities. Other services include post & telecommunication services, real estate,

renting of machinery & equipment, research and development, public administration and defense, education, health services, other community and social services'[3]. Trading includes both wholesale and retail trading and personal loan includes loans for housing, consumer durables etc. Bank activity on these priority sectors are usually considered as part of 'social banking'. Social banking is supposed to improve the quality of life and hence the productive human capital formation that leads for socio-economic development further.

Table 4: Rate of change of C/D ratios, Net Banking Product at Factor Cost with constant (1999-2000) prices (Rupees crore) & its rate of change, and Net Karnataka State Domestic Product at Factor Cost with constant (1999-2000) prices (Rupees crore) & its rate of change.

FY	C/D	Change in C/D Ratios	NBP	Change in NBP	NSDP	Change in NSDP
1999-00	NA	NA	5329	0.00	90532	0.00
2000-01	0.619	0.00	5650	7.611	91136	0.67
2001-02	0.689	11.31	6080	16.727	92788	1.81
2002-03	0.711	3.19	7097	3.297	97765	5.36
2003-04	0.690	-2.95	7331	13.559	99669	1.95
2004-05	0.805	16.67	8325	18.342	109808	10.17
2005-06	0.934	16.02	9852	19.559	122697	11.74
2006-07	0.998	6.85	11779	12.667	130018	5.97
2007-08	0.780*	-21.84	13271q	9.291	144527	11.16
2008-09	0.766**	-1.80	14504a	9.29	151937	5.13

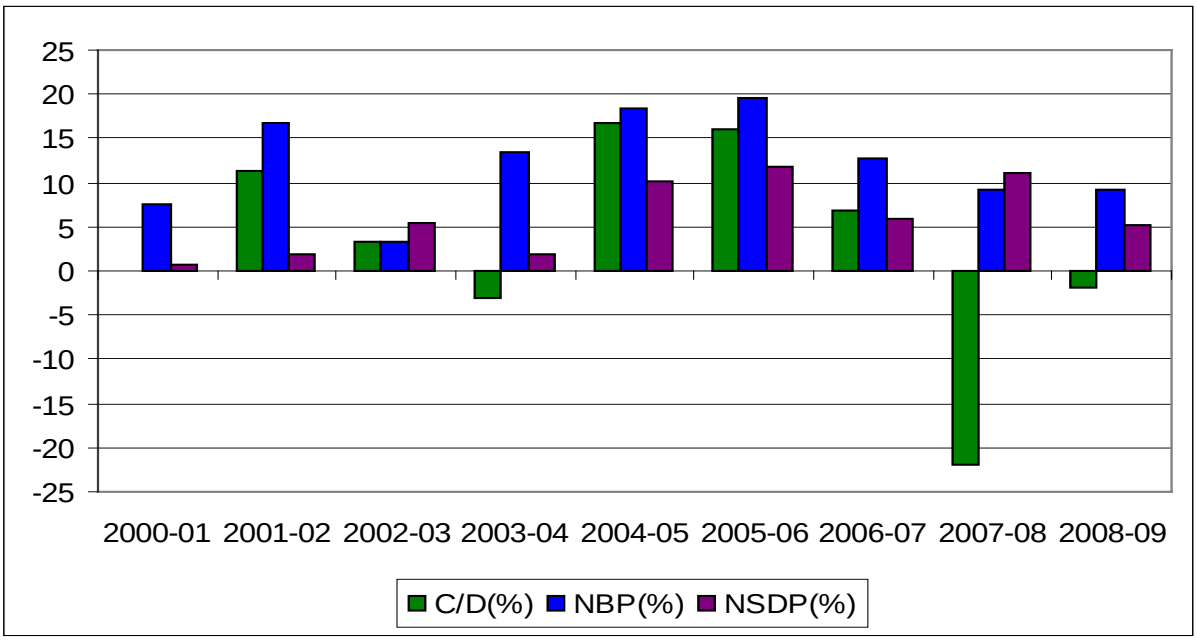
Note: *, ** For the year of 2008 and 2009, q = quick estimates and a = advance estimates, NA: Not Available. Source: The Handbook of Statistics on the Indian Economy, Reserve Bank of India, 2008-09, Money & Banking, Economic Intelligence Service, Centre for Monitoring Indian Economy Private Limited, 2008, and The Directorate of Economics and Statistics, Government of Karnataka, *http://des.kar.nic.in/indexie.html*.

From Table 5, it may be seen that in many cases the rates of change of financial and professional credit to total deposit are negative or lower throughout the financial periods from

[3] I thank CMIE Team, Bangalore branch for explaining the term 'Professional and other services'.

1993-94 to 2007-08 where the rates of change of net state domestic product are also have lower values (see Table 4). Therefore, the point is that higher finance & professional credit to total deposit ratio is associated with higher net state domestic product and vice versa. The credit for trade and personal consumption to total deposit shows similar trends (Table 6 and 7). Therefore, credit disbursement in relation to deposit mobilization will certainly help economic development through its utilizations and thereby development in the long-run too.

Figure 3: Rate of change of C/D ratio, Net Banking Product, and Net State Domestic Product Value in Karnataka



However, the C/D ratios or credits out of total deposit in monetary units heavily depend on bank-lending interest rate. From customers' side, if bank-lending interest rate increases credit disbursement decreases as demand for credits decreases. To make it efficient the income out of their deposit (as a whole in the banking sector) is required to be higher so that further reinvestment on it will have attraction to promote sustainable lending. Therefore, deposit mobilization will be efficient at further credit disbursements on priority sectors. However, the professional standard of banking perception is that if lending interest rate increases then credit disbursement also increases as interest-earning income (return) will increase. This helps further reinvestment for priority sectors. Therefore, from both sides bank-lending interest rate is the proxy for the bank interest-income that covers its costs like interest on deposits.

Table 5: Ratio of finance and professional service credit to total deposit and its rate of change in Karnataka

FY	FPS Credit (Rs. Crore)	Total Deposit (Rs. Crore)	FPSC/TD	ROC of FPSC/TD (%)
1993-94	698	15827	0.044	0.00
1994-95	925	19699	0.047	6.82
1995-96	1386	23541	0.059	25.53
1996-97	1640	26820	0.061	3.39
1997-98	2089	31900	0.065	6.56
1998-99	2114	38295	0.055	-15.38
1999-00	2691	45911	0.059	7.27
2000-01	3099	54743	0.057	-3.39
2001-02	3511	62953	0.056	-1.75
2002-03	4683	75329	0.062	10.71
2003-04	5973	93652	0.064	3.23
2004-05	8055	107683	0.075	17.19
2005-06	13037	133376	0.098	30.67
2006-07	22672	171230	0.132	34.69
2007-08	26902	209609	0.128	-3.03

Source: Money & Banking, Economic Intelligence Service, Centre for Monitoring Indian Economy Private Limited, 2001 to 2009 issues.

Table 6: Ratio of total trade credit to total deposit and its rate of change in Karnataka

FY	TT Credit (Rs. Crore)	Total Deposit (Rs. Crore)	TTC/TD	ROC of TTC/TD (%)
1993-94	1057	15827	0.067	0.00
1994-95	1268	19699	0.064	-4.48
1995-96	1460	23541	0.062	-3.13
1996-97	1728	26820	0.064	3.23
1997-98	2179	31900	0.068	6.25
1998-99	2301	38295	0.060	-11.76
1999-00	2740	45911	0.060	0.00
2000-01	2435	54743	0.044	-26.67
2001-02	3156	62953	0.050	13.64
2002-03	3624	75329	0.048	-4.00
2003-04	4363	93652	0.047	-2.08
2004-05	5475	107683	0.051	8.51
2005-06	7099	133376	0.053	3.92
2006-07	12705	171230	0.074	39.62
2007-08	13258	209609	0.063	-14.86

Source: Money & Banking, Economic Intelligence Service, Centre for Monitoring Indian Economy Private Limited, 2001 to 2009 issues.

Table 7: Ratio of personal loan to total deposit and its rate of change in Karnataka

FY	Personal Loan (Rs. Crore)	Total Deposit (Rs. Crore)	PL/TD	ROC PL/TD (%)
1993-94	1142	15827	0.072	0.00
1994-95	1367	19699	0.069	-4.17
1995-96	1995	23541	0.085	23.19
1996-97	2510	26820	0.094	10.59
1997-98	2983	31900	0.094	0.00
1998-99	3618	38295	0.094	0.00
1999-00	4908	45911	0.107	13.83
2000-01	5823	54743	0.106	-0.93
2001-02	8449	62953	0.134	26.42
2002-03	11511	75329	0.153	14.18
2003-04	17526	93652	0.187	22.22
2004-05	25886	107683	0.240	28.34
2005-06	37374	133376	0.280	16.67
2006-07	45696	171230	0.267	-4.64
2007-08	51108	209609	0.244	-8.61

Source: Money & Banking, Economic Intelligence Service, Centre for Monitoring Indian Economy Private Limited, 2001 to 2009 issues.

Both in constant and changing lending rate cases it is well known that bank revenue (return) should be greater than the cost and if this is not the case then at least equality is expected either to be with normal gain (from customers' view) or to cover the average variable cost of banking business (from bankers' view). Now customers have the expectation of maximization of their value with decreased value of the bank-lending interest rate whereas, bankers have the expectation of minimization of cost burden and hence maximization of revenue with increased value of bank-lending interest rate. Therefore, it seems the demand for and supply of the bank lending interest rate depends on the market interaction between the customer (buyer) and banker (seller). Buyers have the willingness to purchase the bank products at lower lending rate and sellers have the willingness to sell their products at higher lending rate. Therefore, the trade off for this lending interest rate is the matter of concern particularly when the banking heads for social banking. The effects of the lending rate on credit disbursements to priority sectors need to be examined in the context of regional developmental disparities.

From Table 8, it can be seen that during the financial years between 1993-94 and 2004-05, the bank-lending interest rate (in percentage change) values are either higher, negative or lower at -31.12% or 6.67%. It is also seen that during this period most of the credit on priority sectors to total deposit (in percentage change) values are negative. Again, for the financial year 2007-08 the bank-lending rate is a higher positive value at about 28.21% with negative change of credit on personal loan to total deposit at about -4.64%. Therefore, with these negative values, it seems priority sectors of the state of Karnataka are still neglected in spite of higher lending (with higher C/D ratio) compared to other regions of the country. This shows that there is skewed resource allocation and distribution among all sectors of the state economy and this could be a reason for increasing regional developmental disparities.

From Table 9, it can be seen that the coefficient of variations for year-wise per capita net district domestic products (PCNDDP) are increasing for south and north regions from 35% & 14% to 48% & 30% respectively. The combined standard deviation[4] value for year

[4] Combined standard deviation values are calculated considering south and north regions of the state of Karnataka for the base year 1999-2000 and the present year 2006-07. CSD represents as $\sqrt{\frac{(n_1-1)(\sigma_1)^2+(n_2-1)(\sigma_2)^2}{(n_1+n_2-2)}}$

wise per capita net district domestic product samples with both south and north regions is increasing from Rs. 5, 262/- in 1999-00 to Rs. 12,328/- in 2006-07. From the above example, it seems that the null hypothesis namely there is no inequality between the year wise sample mean values of PCNDDP for south and north regions of the state of the Karnataka is rejected at 95% confidence level. In addition, with inflationary pressure the region wise average per capita net district domestic product difference is at the compound annual growth rate of 8% for the year 2006-07.

From Table 10, it can be seen that the coefficient of variations for year-wise PCNDDP are increasing for south and north regions from 35% & 14% to 48% & 30% respectively. The combined standard deviation value for year wise per capita net district domestic product samples is increasing from Rs. 5,262/- in 1999-00 to Rs. 5,263/- in 2006-07. From the above example, it seems that the null hypothesis namely there is no inequality between the year wise sample mean values of PCNDDP for south and north regions of the state of the Karnataka is rejected at 95% confidence level. In addition, without inflationary pressure the region wise average per capita net district domestic product difference is growing at the compound annual growth rate of 4% for the year 2006-07. Therefore, it can be concluded that irrespective of inflationary pressure the regional disparities in terms of average per capita net district domestic product differences do exist in the state of Karnataka.

Coming to individual district wise disparities in the state, it is observed that south & north regions have both developed and less developed districts in terms of their net per capita domestic products. From Table 11, it can be seen that developed districts like Bangalore, Dakhin Kannada, Kodagu, Bellary, and Dharwad have high per capita net district domestic products where as underdeveloped districts like Bellary, Bidar, Gulbarga, Raichur, and Koppal have low per capita net district domestic products. In addition, from Table 12 and 13 it may be seen that coefficient of variations for district-wise C/D ratio series considering almost all population groups are decreasing from the year 1997 to 2007. For particular regions like Raichur and Bidar the coefficient of variations for C/D ratio series are increasing implying further worsening situations with regard to credit disbursements. That is, with rise in region wise per capita net district domestic product difference the credit disbursement out of total deposit is deteriorating in these particular two districts. However, as a whole it can be

said that in spite of the improvements on credit disbursements the regional disparities in terms of per capita net district domestic product differences do still prevail. Interestingly this observation fits with even increasing trend of the number of savings/current accounts in the banking business[5].

Table 8: Rate of change of Finance and professional service credit, total trade credit, personal loan to total deposit ratios, and bank lending interest rate in Karnataka

FY	Rate of change of FPSCTTD (%)	Rate of change of TTCTTD (%)	Rate of change of PLTTD Ratio(%)	Rate of change of bank Lending Interest Rate
1993-94	0.00	0.00	0.00	-9.09
1994-95	6.82	-4.48	-4.17	6.67
1996-97	25.53	-3.13	23.19	18.75
1997-98	3.39	3.23	10.59	-3.29
1998-99	6.56	6.25	0.00	-6.80
1999-00	-15.38	-11.76	0.00	-6.57
2000-01	7.27	0.00	13.83	-7.81
2001-02	-3.39	-26.67	-0.93	-3.39
2002-03	-1.75	13.64	26.42	-14.04
2003-04	10.71	-4.00	14.18	-31.12
2004-05	3.23	-2.08	22.22	-8.89
2005-06	17.19	8.51	28.34	13.01
2006-07	30.67	3.92	16.67	12.23
2007-08	34.69	39.62	-4.64	28.21

Source: Money & Banking, Economic Intelligence Service, Centre for Monitoring Indian Economy Private Limited, 2001 to 2009 issues.

[5] Here, data on the number of accounts with banking business are not reported because of two reasons. First, as usual it is with increasing situation. Second, the observation on resource mobilization through the channel of credit out of total scarce deposit is more viable than on the number of saving/current accounts without its worth wise classifications.

Table 9: Per capita net district domestic product at current prices and regional developmental disparities

Sl.No.	Districts	PCNDDP1999-00 (Rs.)	PCNDDP2006-07 (Rs.)
1	BANGALORE	28464	72476
2	BANGALORE(R)	15398	32646
3	CHITRADURGA	13855	20088
4	DAVANAGERE	15680	24441
5	KOLAR	11761	20083
6	SHIMOGA	19058	26009
7	TUMKUR	13087	19415
8	CHIKMAGALUR	23440	28288
9	DAKHIN KANNADA	24805	43124
10	UDUPI	19560	32688
11	HASSAN	14558	21473
12	KODAGU	34135	43015
13	MANDYA	12695	18455
14	MYSORE	16679	28796
15	CHAMARAJA NAGAR	15060	16441
	SOUTHERN KARNATAKA	**18549**	**29829**
	CV	**0.35**	**0.48**
16	BELGAUM	16411	22434
17	BIJAPUR	15488	19741
18	BAGALKOT	16402	22369
19	DHARWAD	19099	32699
20	GADAG	14124	20613
21	HAVERI	14624	21089
22	UTTAR KANNADA	17371	25763
23	BELLARY	16845	42943
24	BIDAR	11865	16860
25	GULBARGA	13699	19779
26	RAICHUR	12639	18416
27	KOPPAL	13722	26384
	NORTHERN KARNATAKA	**15191**	**24091**
	CV	**0.14**	**0.30**
	CSD	**5262** (120)*	**12328** (133)*
	Average difference	**3358**	**5738 @ the compound annual Growth rate of 8%**

Note: Per capita net district domestic product for the financial year 1999-2000 and 2006-07 are picked considering inflation pressures in these regions. The compound annual growth rate = $[\{(X_{present\ year} / X_{base\ year})^{1/n}\} - 1] \times 100$, where 'n' = $T_{present\ year} - T_{base\ year}$ i.e. 'n' = 2006 – 1999, or 2007 – 2000, or (2006-07) – (1999-00) = 7 years. Source: The Directorate of Economics and Statistics, Government of Karnataka, *http://des.kar.nic.in/indexie.html.* * Calculated 't' statistic value.

Table 10: Per capita net district domestic product at constant prices (1999-2000) and regional developmental disparities

Sl.No.	Districts	PNDDP1999-2000 (Rs.)	PNDDP2006-07 (Rs.)
1	BANGALORE	28464	54087
2	BANGALORE(R)	15398	24363
3	CHITRADURGA	13855	14991
4	DAVANAGERE	15680	18240
5	KOLAR	11761	14987
6	SHIMOGA	19058	19410
7	TUMKUR	13087	14489
8	CHIKMAGALUR	23440	21110
9	DAKHIN KANNADA	24805	32182
10	UDUPI	19560	24394
11	HASSAN	14558	16025
12	KODAGU	34135	32101
13	MANDYA	12695	13772
14	MYSORE	16679	21490
15	CHAMARAJA NAGAR	15060	12269
	SOUTHERN KARNATAKA	**18549**	**22261**
	CV	**0.35**	**0.48**
16	BELGAUM	16411	16742
17	BIJAPUR	15488	14732
18	BAGALKOT	16402	16693
19	DHARWAD	19099	24402
20	GADAG	14124	15383
21	HAVERI	14624	15738
22	UTTAR KANNADA	17371	19226
23	BELLARY	16845	32047
24	BIDAR	11865	12582
25	GULBARGA	13699	14760
26	RAICHUR	12639	13743
27	KOPPAL	13722	19690
	NORTHERN KARNATAKA	**15191**	**17978**
	CV	**0.14**	**0.30**
	CSD	**5262** (120)*	**5263** (152)*
	Average difference	**3358**	**4283 @ the compound annual growth rate of 4%**

Note: Per capita net district domestic product for the financial year 1999-2000 and 2006-07 are calculated without considering inflation pressures in these regions. Per capita net district domestic product for 1999-2000 and 2006-07 are calculated by multiplying the net state domestic product deflator value of 1.00 and 1.34 respectively. The compound annual growth rate = $[\{(X_{present\ year} / X_{base\ year})^{1/n}\} - 1] \times 100$, where 'n' = $T_{present\ year} - T_{base\ year}$ i.e. 'n' = 2006 – 1999, or 2007 – 2000, or (2006-07) – (1999-00) = 7 years. Source: The Directorate of Economics and Statistics, Government of Karnataka, *http://des.kar.nic.in/indexie.html*, and Ministry of Statistics and Programme Implementation, *http://www.mospi.gov.in/.*
* Calculated 't' statistic value.

Table 11: Higher to lower per capita net district domestic product at constant prices (1999-2000)

Districts	PCNDDP 1999-2000 (Rs.)	PCNDDP 2006-07 (Rs.)
BANGALORE	28464	54087
DAKHIN KANNADA	24805	32182
KODAGU	34135	32101
BELLARY	16845	32047
DHARWAD	19099	24402
UDUPI	19560	24394
BANGALORE(R)	15398	24363
MYSORE	16679	21490
CHIKMAGALUR	23440	21111
KOPAL	13722	19690
SHIMOGA	19058	19410
UTTAR KANNADA	17371	19226
DAVANAGERE	15680	18240
BELGAUM	16411	16742
BAGALKOT	16402	16693
HASSAN	14558	16025
HAVERI	14624	15738
GADAG	14124	15383
CHITRADURGA	13855	14991
KOLAR	11761	14987
GULBARGA	13699	14761
BIJAPUR	15488	14732
TUMKUR	13087	14489
MANDYA	12695	13772
RAICHUR	12639	13743
BIDAR	11865	12582
CHAMARAJA NAGAR	15060	12269
CV	**0.31**	**0.44**

Note: Per capita net district domestic product for the financial year 2006-07 is calculated by multiplying the net state domestic product deflator value of 1.34. Source: The Directorate of Economics and Statistics, Government of Karnataka, *http://des.kar.nic.in/indexie.html*, and Ministry of Statistics and Programme Implementation, *http://www.mospi.gov.in/*

Table 12: Regional disparities for most developed districts in Karnataka

	1997	1999	2001	2003	2005	2007
C/D ratios according to population group in Karnataka						
Karnataka						
Rural	0.66	0.67	0.68	0.71	0.81	0.88
Semi-Urban	0.56	0.57	0.53	0.59	0.68	0.73
Urban	0.51	0.47	0.49	0.49	0.60	0.71
Metropolitan	0.89	0.77	0.67	0.66	0.78	0.77
Average	0.66	0.62	0.59	0.61	0.72	0.77
CV	**0.22**	**0.18**	**0.14**	**0.13**	**0.12**	**0.09**
C/D ratios for developed districts of Karnataka (according to population group)						
Bangalore						
Rural	0.44	0.38	0.41	0.43	0.42	0.33
Semi-Urban	0.82	0.73	0.63	0.71	0.72	0.20
Urban	0.89	0.77	0.67	0.66	0.74	0.53
Average	0.72	0.63	0.57	0.60	0.63	0.35
CV	**0.34**	**0.34**	**0.25**	**0.25**	**0.29**	**0.47**
Dakhin Kannad						
Rural	0.28	0.33	0.51	0.47	0.48	0.50
Semi-Urban	0.33	0.29	0.30	0.34	0.47	0.48
Urban	0.46	0.39	0.40	0.39	0.45	0.55
Average	0.36	0.34	0.40	0.40	0.47	0.51
CV	**0.26**	**0.15**	**0.26**	**0.16**	**0.03**	**0.07**
Kodagu						
Rural	0.51	0.66	0.82	0.98	1.08	0.97
Semi-Urban	0.48	0.49	0.59	0.70	0.83	0.82
Average	0.50	0.58	0.71	0.84	0.96	0.90
CV	**0.04**	**0.21**	**0.23**	**0.24**	**0.19**	**0.12**
Bellary						
Rural	1.03	0.95	1.12	1.16	1.37	1.51
Semi-Urban	0.96	1.02	0.97	1.02	0.86	1.12
Urban	0.78	0.66	0.55	0.64	0.79	0.91
Average	0.92	0.88	0.88	0.94	1.01	1.18
CV	**0.14**	**0.22**	**0.34**	**0.29**	**0.31**	**0.26**
Dharwad						
Rural	1.12	0.77	0.85	0.90	0.98	1.03
Semi-Urban	0.66	0.65	0.68	0.81	0.92	1.04
Urban	0.52	0.49	0.57	0.55	0.66	0.86
Average	0.77	0.64	0.70	0.75	0.85	0.98
CV	**0.41**	**0.22**	**0.20**	**0.24**	**0.20**	**0.10**

Source: *www.indiastat.com*

Table 13: Regional disparities for least developed districts in Karnataka

	1997	1999	2001	2003	2005	2007
C/D ratios according to population group in Karnataka						
Karnataka Total						
Rural	0.66	0.67	0.68	0.71	0.81	0.88
Semi-Urban	0.56	0.57	0.53	0.59	0.68	0.73
Urban	0.51	0.47	0.49	0.49	0.60	0.71
Metropolitan	0.89	0.77	0.67	0.66	0.78	0.77
Average	0.66	0.62	0.59	0.61	0.72	0.77
CV	**0.22**	**0.18**	**0.14**	**0.13**	**0.12**	**0.09**
C/D ratios for least developed districts of Karnataka (according to population group)						
Tumkur						
Rural	0.81	0.87	0.89	0.94	1.18	1.10
Semi-Urban	0.41	0.37	0.33	0.37	0.47	0.65
Urban	0.50	0.56	0.51	0.57	0.71	0.77
Average	0.57	0.60	0.58	0.63	0.79	0.84
CV	**0.37**	**0.42**	**0.50**	**0.46**	**0.46**	**0.28**
Mandya						
Rural	0.68	0.73	0.71	0.81	0.89	1.08
Semi-Urban	0.37	0.39	0.44	0.53	0.67	0.74
Urban	0.49	0.49	0.53	0.55	0.70	0.78
Average	0.51	0.54	0.56	0.63	0.75	0.87
CV	**0.30**	**0.33**	**0.25**	**0.25**	**0.16**	**0.21**
Raichur						
Rural	1.09	1.27	1.19	1.62	1.93	2.16
Semi-Urban	0.94	0.96	0.89	1.12	1.48	1.67
Urban	0.50	0.53	0.48	0.64	0.76	0.72
Average	0.84	0.92	0.85	1.13	1.39	1.52
CV	**0.36**	**0.40**	**0.42**	**0.43**	**0.42**	**0.48**
Bidar						
Rural	0.96	0.96	0.87	0.95	0.99	1.25
Semi-Urban	0.69	0.62	0.45	0.56	0.57	0.71
Urban	0.44	0.38	0.36	0.38	0.4	0.42
Average	0.70	0.65	0.56	0.63	0.65	0.79
CV	**0.37**	**0.45**	**0.49**	**0.46**	**0.46**	**0.53**
Chamarajanagar						
Rural	0.92	0.92	0.73	0.73	0.72	0.87
Semi-Urban	0.59	0.59	0.55	0.65	0.81	1.02
Average	0.76	0.76	0.64	0.69	0.77	0.95
CV	**0.23**	**0.23**	**0.13**	**0.06**	**0.06**	**0.11**

Source: *www.indiastat.com*

5. Observant Findings

From the above discussions, it is concluded that regional disparity in terms of per capita net district domestic product exists in spite of the increasing credit distributions to all areas. Usual socio-economic factors like literacy (e.g. includes below post graduation educational levels, dual health[6] etc.), higher C/D ratios, and higher number of savings/current accounts with banks may not promote a sound banking system and hence a directionless developmental economy exists. Most probably, the concept of 'social banking' (where the positive interrelationship between corporate social performance (CSP) and corporate financial performance (CFP) is required) may lead to higher level of development and hence regional advanced development. However, the pattern, content, and examination of this interrelationship between CSP and CFP are matters of future research.

[6] The term 'dual health' can be understood for the controversial business activities of alcohol, tobacco, traditional medicines etceteras.

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