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An Analytical Study on Public Expenditure and Economic Growth

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ABSTRACT

The current study only uses secondary data in its analysis. The study's goal is to find out how government expenditure affects the economic growth of India. GDP was treated as the dependent variable, whereas government expenditure was treated as an independent variable. The impact of an independent variable on a dependent variable was examined using regression analysis. The period from 2001–02 to 2018–19 was selected to examine patterns in both economic growth and government expenditures. According to the study, government spending has a significant effect on India's economic growth. According to the study, an increase in government expenditure of one-unit results in a 0.99% increase in GDP growth. This is because public expenditure creates multiple effects in an economy.

Keywords: *Economic Growth, G.D.P, Impact, Public expenditure, Public spending*

India, as one of the fastest-growing economies globally, has witnessed a remarkable transformation in its public expenditure policies over the years. This analytical study aims to investigation into the relationship between public spending and economic growth in India. It is crucial to look at historical trends in India in order to comprehend the effect of public spending on economic growth. India's public spending policies have witnessed considerable changes during the last few decades. Both economic reforms and changing societal requirements have been the driving forces behind these transformations.

In the early years of independence, India focused on building a strong public sector to drive economic growth. The government heavily invested in industries, infrastructure, and social sectors. However, the 1991 economic reforms marked a shift towards liberalization and privatization. The focus shifted to creating an enabling environment for private investments while continuing to invest in crucial sectors.

Government Spending and Indian Economic Growth: An Empirical Analysis

Using varied techniques, several studies have looked at how government spending affects India's economic development. According to one of these studies, government expenditure on education has a significant and large effect on both short- and long-term economic growth. Education-related investments help create a trained workforce, which in turn boosts productivity and creativity.

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Another study highlighted the negative impact of government expenditure on agriculture on long-term economic growth. While short-term effects were also negative, they were more pronounced. This suggests that reallocating resources from agriculture to other sectors might be beneficial for overall economic growth in the long run.

Investment spending was found to have a positive but negligible impact on long-term economic growth and a negative but substantial effect in the short run. This implies that while investments contribute to economic growth, their effect may take time to materialize fully.

Surprisingly, both the short- and long-term effects of defence spending on economic growth were positive and insignificant. This discovery raises the possibility that defence spending may indirectly benefit other economic areas, such as technology advancement and employment creation.

Spending on health was found to have a favourable and significant impact on economic growth in both the short and long terms. This underscores the importance of investing in healthcare infrastructure and services to improve the overall well-being of the population and enhance productivity**.**

Objectives:

1. to understand the patterns in government spending and economic development.
2. to investigate the impact of governmental spending on India's economic growth.
3. to investigate the connection between governmental spending and economic growth.

Hypothesis:

1. Ho: Public expenditures won't have an impact on GDP growth.
2. Ho: Public expenditure and the GDP growth rate are do not depend on one another.

Research Methodology:

The current analysis only uses secondary data, which was gathered from websites run by the government. books, research papers, articles, RBI bulletins, internet sources, etc. Public expenditure was taken as an independent variable, while GDP was taken as a dependent variable. Regression analysis was used to analyse the effect of an independent variable on a dependent variable. The 2001–02 to 2018–19 period was chosen in order to know the trends of public expenditure and the GDO growth rate. The data was analysed using SPSS.

Data analysis & interpretation

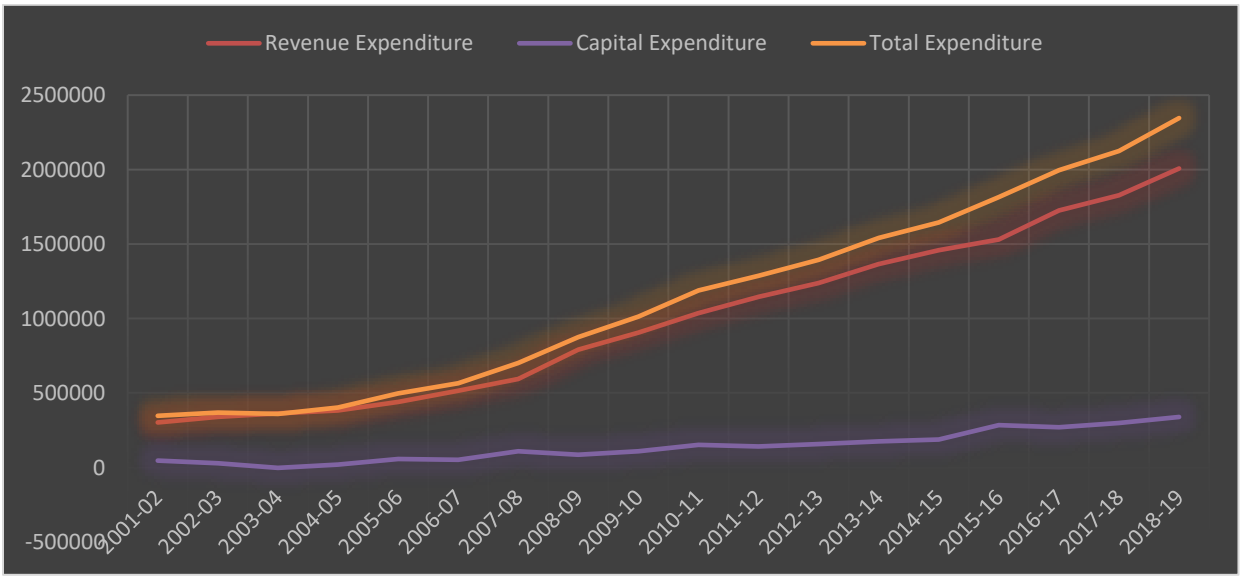
Table No.1

Public Expenditure of the Central Government

Sr. No	Year	Rev. Expenditure (in Crore)	Capital Expenditure (in Crore)	Total Expenditure (in Crore)
1	2001-02	301776	44813	346589
2	2002-03	340093	27133	367226
3	2003-04	363031	-3207	359824
4	2004-05	383032	19536	402568

Sr. No	Year	Rev. Expenditure (in Crore)	Capital Expenditure (in Crore)	Total Expenditure (in Crore)
5	2005-06	440303	56310	496613
6	2006-07	514313	50620	564933
7	2007-08	593659	108327	701986
8	2008-09	790594	84238	874832
9	2009-10	905473	107720	1013193
10	2010-11	1036061	151837	1187898
11	2011-12	1145955	141042	1286997
12	2012-13	1237755	155822	1393577
13	2013-14	1366170	175296	1541466
14	2014-15	1457882	187460	1645342
15	2015-16	1530689	284268	1814957
16	2016-17	1725760	270309	1996069
17	2017-18	1827565	297869	2125434
18	2018-19	2007399	338569	2345968

Source: https://dea.gov.in/indian-public-finance-statistics



The revenue, capital, and overall expenditures of the Indian central government from the fiscal years 2001–02 through 2018–19 is displayed in the table and graph above.

Table No.2
Revenue and Capital Expenditure as a Percentage of Total Expenditure

Sr. No	Year	Revenue Expenditure (%)	Capital Expenditure (%)
1	2001-02	87.07	12.92
2	2002-03	92.61	7.38
3	2003-04	100.89	-0.89
4	2004-05	95.14	4.85

Sr. No	Year	Revenue Expenditure (%)	Capital Expenditure (%)
5	2005-06	88.66	11.33
6	2006-07	91.03	8.96
7	2007-08	84.56	15.43
8	2008-09	90.37	9.62
9	2009-10	89.36	10.63
10	2010-11	87.21	12.78
11	2011-12	89.04	10.95
12	2012-13	88.81	11.18
13	2013-14	88.62	11.37
14	2014-15	88.60	11.39
15	2015-16	84.33	15.66
16	2016-17	86.45	13.54
17	2017-18	85.98	14.01
18	2018-19	85.56	14.43

Source: Researcher own Calculation

Interpretation:
The central government of India's revenue and capital expenditure proportion of total expenditures from the fiscal years 2001–02 to 2018–19 is shown in the following table.

The data shows that the Revenue and Capital Expenditure as a Percentage of Total Expenditure made about 85% to 95%. whereas the proportion of capital spending stayed at 15%.

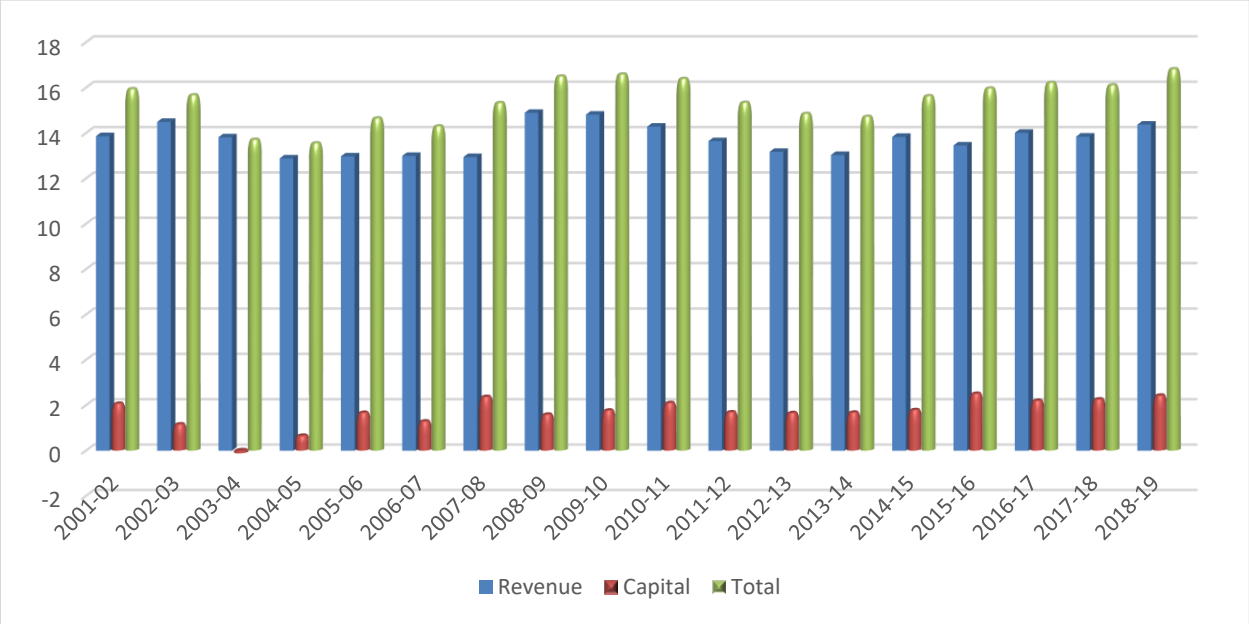
The data clearly shows that the proportion of revenue expenditure as percentage of total expenditure is much higher than the proportion of capital expenditure.

Table No.3
Revenue Expenditure, Capital expenditure, as percentage of GDP

Sr. No	Year	Revenue expenditure (%)	Capital expenditure (%)	Total expenditure (%)
1	2001-02	13.87	2.06	15.93
2	2002-03	14.50	1.15	15.66
3	2003-04	13.82	-0.12	13.70
4	2004-05	12.89	0.65	13.54
5	2005-06	12.98	1.66	14.64
6	2006-07	13.00	1.28	14.29
7	2007-08	12.95	2.36	15.32
8	2008-09	14.90	1.58	16.49
9	2009-10	14.82	1.76	16.58

10	2010-11	14.29	2.09	16.38
11	2011-12	13.65	1.68	15.33
12	2012-13	13.18	1.65	14.84
13	2013-14	13.04	1.67	14.71
14	2014-15	13.84	1.78	15.62
15	2015-16	13.46	2.50	15.96
16	2016-17	14.02	2.19	16.21
17	2017-18	13.85	2.25	16.10
18	2018-19	14.38	2.42	16.81

Source: Researcher own Calculation



Interpretation:

- The above table shows revenue expenditure and capital expenditure as a percentage of G.D.P from the financial year 2001–02 to 2018–19.
- The data shows that the proportion of revenue expenditure as a percentage of G.D.P was on average almost 14%, whereas the proportion of capital expenditure remained on average at 1.70% throughout the year.
- The data clearly shows that the proportion of revenue expenditure as a percentage of G.D.P was higher than the proportion of capital expenditure.
- On the other side, the proportion of total expenditure as a percentage of G.D.P was around 15 percent, which is looking very low. It is also observed that the proportion of total expenditure as a percentage of G.D.P has remained almost the same for all the years. There are no big changes in it.

Table No.4
G.D.P at Current price from 2001-02 to 2018-19

Sr. No	Year	G.D. P	Annual Changes
1	2001-02	2175260	-
2	2002-03	2343864	7.193421
3	2003-04	2625819	10.73779
4	2004-05	2971464	11.63214
5	2005-06	3390503	12.3592
6	2006-07	3953276	14.23561
7	2007-08	4582086	13.72323
8	2008-09	5303567	13.60369
9	2009-10	6108903	13.18299
10	2010-11	7248860	15.72602
11	2011-12	8391691	13.6186
12	2012-13	9388876	10.62092
13	2013-14	10472807	10.34996
14	2014-15	10527674	0.521169
15	2015-16	11369493	7.404191
16	2016-17	12308193	7.626627
17	2017-18	13195005	6.720816
18	2018-19	13952478	5.42895

Source: - Journal of Management Research and Analysis, July-September, 2020;73):114-121

Interpretation:
The above table shows G.D.P at Current price and its annual changes since the financial year of 2001-02 to 2017-18

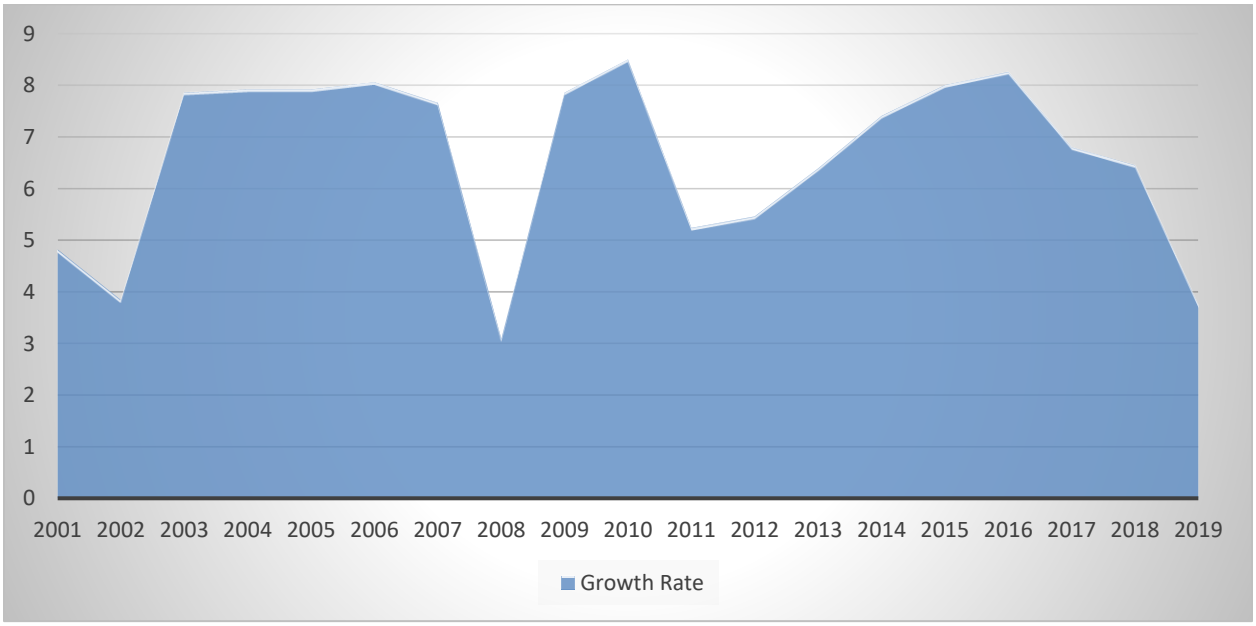
Data clearly show that the G.D.P increased from 2001-02 to 2006-07. After that, there was a partial decline until 2009-10, and it remained stable from 2007 to 2009. Then it increased in the years 2010–11, after which the G.D.P ratio can be seen to decrease continuously.

Table No.5
India's G.D.P Growth Rate

Sr. No	Year	G.D.P Growth (%)	Annual Change
1	2001	4.82	0.98
2	2002	3.84	-1.02
3	2003	7.86	4.06
4	2004	7.92	0.06
5	2005	7.92	0.00
6	2006	8.06	0.14
7	2007	7.66	-0.40
8	2008	3.09	-4.57
9	2009	7.86	4.78
10	2010	8.50	0.64

Sr. No	Year	G.D.P Growth (%)	Annual Change
11	2011	5.24	-3.26
12	2012	5.46	0.22
13	2013	6.39	0.93
14	2014	7.41	1.02
15	2015	8.00	0.59
16	2016	8.26	0.26
17	2017	6.80	-1.46
18	2018	6.45	-0.34
19	2019	3.74	-2.72

Source: macrptrends.net/countries/IND/india/gdp-growth-rate



The above table shows India's G.D.P growth rate from the financial year 2001–02 to 2017–18.

Ho: Public expenditures won't have an impact on G.D.P growth.
Ho: Public expenditure and the G.D.P growth rate are do not depend on one another.

Regression Results

R	R Square	Adjusted R Square	Std. Error of the Estimate
.996[a]	.993	.992	355615.209

Interpretation:
As indicated in Table 1, we can see the R-Square value is.993, which means our independent variable, i.e., expenditure, causes a 99.3% change in the dependent variable, e.g., G.D.P.

ANOVA Result					
Model	**Sum of Squares**	**df**	**Mean Square**	**F**	**Sig.**
Regression	275288964445245.160	1	275288964445245.160	2176.848	.000[b]
Residual	2023394826689.112	16	126462176668.070		
Total	277312359271934.280	17			
a. Dependent Variable: G.D.P					
b. Predictors: (Constant), Expenditure					

Interpretation:
As per the Anova test result, the p-value is.000. Hence, we say that there is a significant relationship between our independent variable, i.e., expenditure, and our dependent variable, i.e., G.D.P.

Coefficients

Model	**Unstandardized Coefficients**		**Standardized Coefficients**	**t**	**Sig.**
	B	**Std. Error**	**Beta**		
(Constant)	360515.717	169597.485		2.126	.049
Expenditure	6.050	.130	.996	46.657	.000
a. Dependent Variable: G.D.P					

Interpretation:
The coefficient result is displayed in the above table. As previously mentioned, the beta value is.996, which implies that a change of one unit in the independent variable, i.e., public expenditure, would result in a change of 0.996 units in the dependent variable, i.e., G.D.P.

Furthermore, the beta value is positive, which indicates the positive relationship between public expenditure and G.D.P growth. Or in other words we can say that when expenditure increases by one unit the G.D.P will also increase by 0.996 units.

Result & Discussion:
The study "An Analytical Study on Public Expenditure and Economic Growth" was carried out using secondary data collected from various sources. The main aim of the proposed study is to analyse the effect of public expenditures on economic growth. The outcome of the study is as follows:

- According to the results, the share of revenue expenditure in the government's overall spending is significantly larger than the share of capital expenditure.
- the proportion of total expenditure as a percentage of G.D.P was around 15 percent, which is looking very low. It is also observed that the proportion of total expenditure as a percentage

of G.D.P has remained almost the same for all the years e.g., 2001-02 to 2018-19. There are no big changes in it.

- It was found that the G.D.P increased from 2001-02 to 2006-07. After that, there was a partial decline until 2009-10, and it remained stable from 2007 to 2009. Then it increased in the years 2010–11, after which the G.D.P ratio can be seen to decrease continuously.
- The study reveals that public spending helps promote the growth of India's economy. According to the study, an increase in public spending of one-unit results in a 0.996-unit rise in G.D.P. growth rate. This is because public expenditure creates multiple effects in an economy
- Study farther shows that our independent variable, i.e., expenditure, causes a 99.3% change in the dependent variable, e.g., GDP.

Policy Implications: Government Expenditure for Economic Progress

- Based on the empirical findings, it is evident that government spending in certain sectors can have a significant impact on India's economic growth. To foster conditions for higher labor force participation and sustained economic progress, policymakers should prioritize investment in the education sector. By improving access to quality education and vocational training, the government can equip the workforce with the skills necessary for a rapidly evolving economy.
- Additionally, reallocating resources from agriculture to other sectors, such as manufacturing and services, could lead to long-term economic growth. This could involve implementing policies that encourage diversification, promote technological advancements, and provide support to farmers transitioning to other sectors.
- Furthermore, investments in healthcare infrastructure and services are crucial for promoting economic growth. By ensuring a healthy population, the government can enhance labor productivity, reduce healthcare costs, and create a more productive workforce. Policy measures should focus on scaling up initiatives in the health sector, improving access to quality healthcare, and implementing preventive measures to address public health challenges effectively.

Conclusion:

The current research "An analytical study on Public Expenditure and Economic Growth in India: " looked into the connection between public spending and the nation's economic Growth. A study demonstrates that India's economic development is significantly influenced by governmental spending. studies have consistently shown positive correlations between public expenditure and economic growth. However, effective management of resources, fiscal discipline, and improved governance are essential for optimal utilization of public funds. By addressing these challenges, India can harness the full potential of public expenditure to fuel sustainable economic growth and improve the standard of living for its citizens.

References:

1. Abu-Bader, S. and Abu-Qarn, A. S. (2003). Government expenditures, military spending and economic growth: causality evidence from Egypt, Israel, and Syria. Journal of Policy Modeling, 25, 567–583
2. Bayraktar, N. and Moreira, E. P. (2007). The Composition of Public Expenditure and Growth: A Small-Scale Intertemporal Model for Low-Income Countries. Policy Research

Working Paper 4430.The World Bank, Economic Policy Unit.https://ecom od.net/sites/default/files/documentconference/ecomod2008/574.pdf, (Accessed June, 2011).
3. Belloc, M. and Vertova, P. (2004). How Does Public Investment Affect Economic Growth in HIPC?An Empirical Assessment.Department of Economics, University of Siena Available at http://repec.deps.unisi.it/quaderni/416, (Accessed July, 2010)
4. Devarajan, S., Swaroop, V., and Heng-fu,Z.(1996). The Composition of Public Expenditure and Economic Growth.Journal of Monetary Economics, 37, 313-344
5. Easterly, W.and S. Rebelo (1993). Fiscal Policy and Economic Growth: An Empirical Investigation. Journal of Monetary Economics, 32, 417 – 458.

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Conflict of Interest
The author declared no conflict of interest.

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