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The Role of GST in Enhancing Tax Compliance and Revenue Collection in India

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Abstract

The Goods and Services Tax (GST) was introduced in India on July 1, 2017, as a comprehensive indirect tax reform aimed at unifying the country's complex tax structure. This study examines the role of GST in enhancing tax compliance and revenue collection. By replacing multiple indirect taxes with a single tax framework, GST has streamlined tax administration, reduced cascading effects, and widened the tax base. The adoption of technology-driven compliance mechanisms, such as e-invoicing, GST returns, and real-time tracking, has significantly improved transparency and minimized tax evasion. Additionally, the Input Tax Credit (ITC) system has incentivized businesses to comply with tax regulations, fostering a culture of voluntary compliance. Despite initial challenges like technical glitches, compliance burdens, and transitional issues, GST has led to a steady increase in tax revenue for the government. The study highlights how GST has contributed to formalizing the economy and improving overall revenue efficiency. However, ongoing reforms, simplification of tax rates, and addressing sector-specific concerns remain crucial for maximizing its benefits. This research provides insights into the effectiveness of GST in achieving its intended objectives and suggests measures for further improving tax compliance and revenue collection in India.

Keywords: Goods and Services Tax, Tax Compliance, Revenue Collection, Input Tax Credit (ITC).

Introduction

The introduction of the Goods and Services Tax (GST) in India on July 1, 2017, marked a significant shift in the country's taxation system. It replaced multiple indirect taxes, including VAT, excise duty, and service tax, with a unified tax structure aimed at simplifying tax administration and improving compliance. By eliminating the cascading effect of taxation, GST has made the tax system more efficient and transparent. The tax is structured into Central GST (CGST), State GST (SGST), and Integrated GST (IGST), ensuring a seamless flow of credit across the supply chain and reducing tax evasion.

One of the primary objectives of GST is to enhance tax compliance by leveraging digital tools such as GST returns, e-invoicing, and the e-way bill system. These mechanisms have not only improved accountability but also widened the tax base by bringing more businesses under the formal economy. Additionally, the implementation of the Input Tax Credit (ITC) system has encouraged businesses to adhere to compliance norms.

Despite initial challenges like technical issues and compliance burdens, GST has shown positive trends in revenue collection. This study explores the impact of GST on tax compliance and revenue generation, highlighting its effectiveness while identifying areas for further improvement.

Review of Literature

Gupta & Jain (2019) highlights how GST has improved tax compliance by introducing a structured filing system and digital record-keeping. The research emphasizes that businesses are now more inclined to adhere to tax regulations due to the seamless Input Tax Credit (ITC) mechanism and real-time monitoring by tax authorities.

Thyagaraju, 2020 This paper provides a brief history of Indian taxes and explores the shift to GST. Opinions on the reform vary among manufacturers, traders, and the broader society. Global news highlights GST as a major achievement of the Government. The paper discusses the evolution of GST, its challenges, revenue impact, and government efforts. The implementation of GST aims to enhance resource allocation, boost GDP, and increase exports. However, despite government initiatives, the current tax system is still regarded as complex and challenging for many.

Sharma & Verma (2020), GST has led to a steady increase in indirect tax revenue by minimizing leakages in the tax system. The study compares pre-GST and post-GST revenue trends, indicating that tax collection efficiency has improved due to reduced tax evasion and a broader taxpayer base.

Jaspreet Kaur, Resham Chopra, Navita Nathani, 2017 conducted an analysis on the Perception of Taxpayers Towards GST using a Fiscal and Social Psychology Model Approach. Their research examined the feasibility of implementing GST, pinpointing crucial factors that illuminate the perspectives of tax authorities. Drawing upon Fiscal and Social Psychological Theories as a framework, the study sought to comprehend the behavior of individual taxpayers.

Vineet Chouhan, Pushpkant Shakdwipee, Shagufta Khan, 2017 undertook a study titled "Assessing Awareness of GST Implementation: A Survey of Small Business Owners in Rajasthan." Their study sought to assess the awareness level among small business owners regarding GST and to identify potential challenges arising from inadequate awareness. They examined 148 small business owners in Rajasthan to determine their comprehension of GST regulations and the assistance provided under GST laws. The findings of the study revealed a significant deficiency in awareness among small business owners regarding GST and its regulations.

Patel et al. (2018) discusses the initial challenges faced by businesses during GST implementation, including high compliance costs and technical difficulties. However, it also

highlights how continuous reforms, such as rate rationalization and policy adjustments, have contributed to an improved tax structure over time.

Mehta & Singh (2022) explore how GST has contributed to bringing more businesses into the formal economy. The study notes that the increased registration of firms under GST has expanded the taxpayer base, leading to higher revenue collection and better financial discipline across industries.

Kumar & Reddy (2021) analyze the role of technology-driven compliance mechanisms such as e-invoicing, GST returns, and the e-way bill system. The research finds that digital interventions have enhanced transparency, reduced fraudulent practices, and simplified tax filing, thereby increasing compliance rates among businesses.

Objectives of the Study

The principal objective of this study is to:

- To analyze the impact of GST on tax compliance
- To evaluate the effectiveness of GST in revenue collection
- To study the role of technology in GST compliance
- To identify challenges faced by businesses in GST compliance
- To provide recommendations for improving GST policies

Research Methodology

Research Design

This study followed a mixed-method research approach, incorporating both qualitative and quantitative analysis to assess the impact of GST on tax compliance and revenue collection in India. The study employs a descriptive and analytical research design to explore the effectiveness of GST in improving tax administration and increasing government revenue.

Data Collection Methods

- **Primary Data**
 - A structured survey conducted among taxpayers, business owners, tax consultants, and GST practitioners to understand their experiences with GST compliance.
 - A sample size was 100 respondents and used random and purposive sampling methods.
- **Secondary Data**
 - Government reports from GST Council, Ministry of Finance, and Central Board of Indirect Taxes & Customs (CBIC).
 - Research papers, articles, and reports published in peer-reviewed journals and industry publications.
 - GST revenue data published by Reserve Bank of India (RBI) and National Statistical Office (NSO).

Data Analysis Techniques

- Descriptive statistics (mean, percentage, and frequency) used to analyze survey responses.
- Comparative analysis of pre-GST and post-GST revenue collection trends conducted.
- Correlation used to determine the relationship between GST compliance and revenue generation.
- Qualitative content analysis performed on interview transcripts to identify key themes and policy implications.

Scope and Limitations

- The study focuses on Indian businesses and tax authorities, primarily analyzing small, medium, and large enterprises across different industries.
- The study is limited to publicly available data and responses from surveyed participants, which may not fully capture all informal sector activities.

This methodology ensures a comprehensive assessment of GST's role in tax compliance and revenue collection, offering valuable insights for policymakers and stakeholders.

Results and Discussion

Impact of GST on Tax Compliance

GST has significantly influenced tax compliance in India by streamlining the tax structure and reducing complexities. The implementation of digital tax filing mechanisms, such as GST returns, e-invoicing, and the e-way bill system, has improved transparency and reduced tax evasion. The survey results indicate that GST has improved tax compliance and transparency while increasing government revenue. However, challenges persist for SMEs, particularly regarding compliance complexity and tax rate variations. Policymakers should focus on simplifying GST procedures to enhance ease of doing business.

Furthermore, the introduction of the **Input Tax Credit (ITC) system** has incentivized businesses to ensure proper invoicing and record-keeping, thereby enhancing voluntary tax compliance. Tax authorities have also leveraged data analytics and real-time tracking to identify discrepancies, leading to increased accountability among taxpayers.

Table: 1 Descriptive Statistics of Survey Responses on GST Compliance

Survey Question	Mean	Percentage (%)	Frequency (N=100)
GST has simplified tax compliance for businesses	4.2	80%	80
GST has increased the compliance burden for SMEs	3.8	65%	65
Digital GST filing (e-invoicing, e-way bill) is effective	4.5	90%	90
Businesses require external assistance for GST filing	4.1	75%	75
GST has reduced tax evasion and increased transparency	4.3	85%	85
Multiple tax slabs create confusion in compliance	3.9	70%	70
GST compliance has increased government revenue	4.6	92%	92

- **GST Simplification vs. Compliance Burden** – About 80% of respondents agreed that GST has simplified tax compliance, with a mean score of 4.2. However, 65% of

SMEs still feel an increased compliance burden due to frequent policy changes and digital adaptation.

- **Effectiveness of Digital Filing** – A high agreement (90%) was found for digital GST mechanisms (e-invoicing, e-way bill), with a mean score of 4.5, indicating that technology has enhanced compliance processes.
- **Need for External Assistance** – 75% of businesses reported needing external help for GST filing, showing that compliance is still complex for smaller enterprises.
- **Reduction in Tax Evasion** – A strong 85% of respondents acknowledged that GST has increased transparency and minimized tax evasion.
- **Confusion Due to Multiple Tax Slabs** – 70% of respondents stated that multiple GST rates create confusion, suggesting a need for tax rate rationalization.
- **Revenue Collection Growth** – A significant 92% of respondents believe that GST has effectively increased government revenue, showing strong confidence in its fiscal impact.

GST and Revenue Collection Trends

An analysis of GST revenue data reveals a **steady increase in tax collections** since its implementation. Government reports indicate that monthly GST collections have consistently crossed **₹1.5 lakh crore in 2023**, compared to the initial years where collections were unstable. This upward trend suggests that the broadening of the tax base and enhanced compliance measures have positively impacted revenue generation.

The **reduction in tax evasion** has been another notable outcome. Before GST, businesses often engaged in under-reporting of sales to evade taxes under the VAT and excise duty regimes. With **real-time monitoring and automated tax reconciliation**, the GST framework has minimized such loopholes. However, challenges such as **fake invoicing and input credit frauds** remain areas of concern, requiring stricter enforcement.

Correlation Analysis: Relationship Between GST Compliance and Revenue Generation

To analyze the relationship between GST compliance and revenue generation, Pearson's correlation coefficient was used. The study aimed to determine how increased GST compliance influences tax revenue collection.

Table: 2 Correlation Coefficient Results

Variables	Pearson Correlation (r)	Significance (p-value)
GST Compliance & Revenue Growth	0.82	0.000 (p < 0.05)
Digital GST Filing & Revenue Growth	0.76	0.000 (p < 0.05)
ITC Utilization & Tax Collection	0.71	0.002 (p < 0.05)

Interpretation of Correlation Analysis

- Strong Positive Relationship (r = 0.82) Between GST Compliance and Revenue Growth
 - A high correlation of 0.82 indicates that as GST compliance increases, tax revenue generation also rises significantly.

- Improved tax compliance ensures accurate reporting, reduces tax evasion, and enhances revenue collection.
- Significant Positive Correlation ($r = 0.76$) Between Digital GST Filing and Revenue Growth
 - Digital compliance mechanisms such as e-invoicing, e-way bills, and GST return filing play a crucial role in ensuring tax transparency and reducing fraudulent practices.
 - The strong correlation (0.76) suggests that businesses adopting digital filing contribute to improved tax revenue collection.
- Moderate Positive Relationship ($r = 0.71$) Between ITC Utilization and Tax Collection
 - The Input Tax Credit (ITC) mechanism allows businesses to claim tax credits on purchases, encouraging proper invoicing and compliance.
 - The moderate correlation (0.71) suggests that higher ITC claims lead to better tax revenue collection, as businesses are incentivized to declare accurate sales and purchases.
- Significance ($p\text{-value} < 0.05$) Validates the Results
 - The p-values (all < 0.05) confirm that the relationships observed are statistically significant, meaning they are unlikely to be due to random chance.

Comparative analysis of pre-GST and post-GST revenue collection trends conducted

Table: 3 Comparative Analysis of Pre-GST and Post-GST Revenue Collection Trends

Financial Year	Pre-GST Revenue Collection (₹ Crore)	Post-GST Revenue Collection (₹ Crore)	Growth Rate (%)
2015-16 (Pre-GST)	8,40,000	-	-
2016-17 (Pre-GST)	9,00,000	-	7.1%
2017-18 (Transition Year)	9,44,000	9,80,000	3.8%
2018-19 (Post-GST)	-	11,77,000	20.1%
2019-20 (Post-GST)	-	12,22,000	3.8%
2020-21 (COVID Impact)	-	11,36,000	-7.0%
2021-22 (Post-COVID Recovery)	-	14,83,000	30.6%
2022-23 (Post-GST)	-	18,10,000	22.0%
2023-24	-	19,50,000	7.7%

- **Steady Increase in Tax Revenue Post-GST** – The data shows a significant increase in tax revenue after GST implementation in 2017-18, with collections rising from ₹9.80 lakh crore in 2017-18 to ₹18.10 lakh crore in 2022-23.
- **Higher Growth Rate Post-GST** – Revenue growth accelerated after GST implementation, with a peak growth rate of 30.6% in 2021-22, indicating strong post-pandemic recovery and improved tax compliance.
- **COVID-19 Impact in 2020-21** – Revenue declined by 7.0% due to the economic slowdown, but GST collections rebounded in subsequent years.

- **Projected Growth for 2023-24** – With continued compliance measures, GST revenue is expected to reach ₹19.50 lakh crore, showing stable long-term growth.
- **Improved Compliance and Digital Tax Filing** – The growth trend suggests that digital compliance measures such as e-invoicing, GST return automation, and ITC tracking have contributed to revenue efficiency.

Challenges and Limitations in GST Compliance

Despite its benefits, GST compliance remains **burdensome for small businesses** due to the complexity of return filings and frequent changes in tax rates. Micro, Small, and Medium Enterprises (MSMEs) often face difficulties in maintaining digital records and navigating the IT infrastructure of GST portals. **Approximately 40% of MSMEs** in the study reported that they had to seek professional assistance for GST compliance, increasing their operational costs.

Moreover, industry-specific challenges persist. Sectors such as **real estate, textiles, and e-commerce** continue to face classification issues, affecting their ability to claim ITC effectively. Additionally, multiple tax slabs (5%, 12%, 18%, and 28%) sometimes create confusion among taxpayers, leading to compliance errors.

Policy Recommendations for Improvement

To further enhance tax compliance and revenue collection under GST, the following policy measures are suggested:

- **Simplification of GST return filing:** The government should consider reducing the frequency of return filings for small businesses to ease their compliance burden.
- **Technology upgrades and training:** Improving the GST portal's efficiency and providing training programs for MSMEs can enhance compliance rates.
- **Stronger fraud detection mechanisms:** Implementing AI-based analytics to detect fraudulent transactions can reduce instances of ITC fraud.
- **Rate rationalization:** Revisiting the tax slab structure to simplify GST rates will help in reducing classification disputes and errors.

Conclusion

The implementation of the Goods and Services Tax (GST) in India has significantly contributed to improving tax compliance and revenue collection. By replacing multiple indirect taxes with a unified tax system, GST has streamlined tax administration, reduced tax evasion, and increased transparency. The introduction of digital compliance mechanisms such as e-invoicing, GST returns, and real-time tracking has enhanced taxpayer accountability and widened the tax base. The Input Tax Credit (ITC) system has further incentivized businesses to comply with tax regulations, reducing instances of underreporting.

Despite its successes, GST compliance remains challenging for small businesses due to complex filing requirements, technical issues, and frequent policy changes. While overall revenue collection has increased, addressing sector-specific concerns and minimizing fraudulent practices such as fake invoicing remain crucial. Simplifying GST procedures, enhancing digital infrastructure, and providing better support for MSMEs can further strengthen compliance rates.

Going forward, continuous policy refinements, better enforcement mechanisms, and taxpayer education will be essential in maximizing GST's effectiveness. With sustained efforts, GST has the potential to serve as a robust tax system that not only boosts government revenue but also fosters a more transparent and efficient economic environment in India.

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