

## MODELLING THE AGGLOMERATED GST REFUND AND ITS ADVERSE IMPACT ON WORKING CAPITAL REQUIREMENT

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### Abstract

*The present research work attempts to examine the constructs accountable for the accumulation of GST Refund with the government and its corresponding adverse impact on the accelerated working capital requirement of the industry. Under the GST regime, the input tax can be adjusted against the output tax and the balance if any shall be carried forward until it is fully recouped. The unadjusted input tax shall remain with the government, which undoubtedly enhances the working capital requirement or otherwise could be invested in to the fruitful projects and can contribute in the overall return of the organization. The over demanding working capital requirement due to the GST mechanism had surely made a dent on the industrial liquidity and is sending their future of the industry into dark. The present research work further investigates the exact influence of the accumulation of the GST on the working capital requirement of the industry. The extensive research work in this direction exhibit that five factors (legal provision, e-filing, Technical barriers, Transaction cost and GST mechanism) which are responsible for the agglomeration of working capital requirement such as. Among the five accountable constructs legal provision and constructs relating to e-filing are the most accountable reasons causing harassment of the enhanced working capital requirement.*

*The whole research work involved the proposed model derived by the researcher on the basis of literature reviewed in this direction. Firstly, the model was explored by the researcher using exploratory factor analysis on the basis of 16 statements using 7 point Likert scale taken from literature reviewed. Then the SEM technique is used through AMOS 18.0 to confer the proposed model and various hypothesis were set and tested during the research work. Five Factor model was explored and confirmed by the researcher which determines the level of pending GST refund with the government. Lastly, the impact of accumulated GST refund on the excessive working capital requirement was measured and remedies to this chronic problem are discussed.*

**Keywords:** GST, GST Refund, Working Capital

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## **Introduction**

One of the biggest flaws in the earlier VAT system was the accumulation of VAT refund with the government, which had made a dent on the working capital requirement and the industrial units always knocking the doors of the lending financial institutions to enhance the short-term liquidity (Arora, 2013). Obviously, implementation of the GST by the reverent Prime Minister Mr. Narendra Modi assumed the only answer to this giant problem especially in case of EOUs. However, the scenario was indifferent, up to some extent, the fruits of GST implementation were eaten up the government but the opposition party hammered the ruling party, as the GST was unable to vanish the problem of accumulation of tax refund with the government. The reason behind the failure was the compulsory invoicing by the registered GST dealers but it was not possible in case of the unregistered dealers (whose annual turnover was lessor than the prescribed limit of Rs. 20 lakh) or the casual dealers. In India, everybody avoids the legal formalities and therefore they do not record the turnover in their books when it exceeds the legal limits (Anitha, 2016). The next vital issue, which had ever existed in India that the exports are zero-rated and the exporters cannot collect the output GST from the customers when the goods or services are disposed of by the EOUs or SEZ organizations(Bansal,2017). Hence the question of output GST does not arise and therefore the dealers cannot adjust the input GST which ultimately they have to claim from the government though filling GST return well in time otherwise they may be penalized as per legal proceedings. The present study focuses on this serious issue and try to explore the factors accountable for the accumulated GST refund and its adverse impact on the working capital requirement. To confer the accountable factors confirmatory analysis technique has been used by the researchers and to evaluate the impact of the various constructs on the working capital requirement the SEM technique is the best suitable tool in this situation.

The long awaited accumulated GST refund had hammered the working capital requirement to the industrial units, which in turn are knocking the door of the financial institutions to full fill the requirement of the shortage of working capital(**Gayatri,2018**). They in turn has to claim the accumulated refund pending with the government in time to facilitate the working capital requirement which can be used in expansion development of the business. The GST law provides sophisticated reasons to the registered dealers to

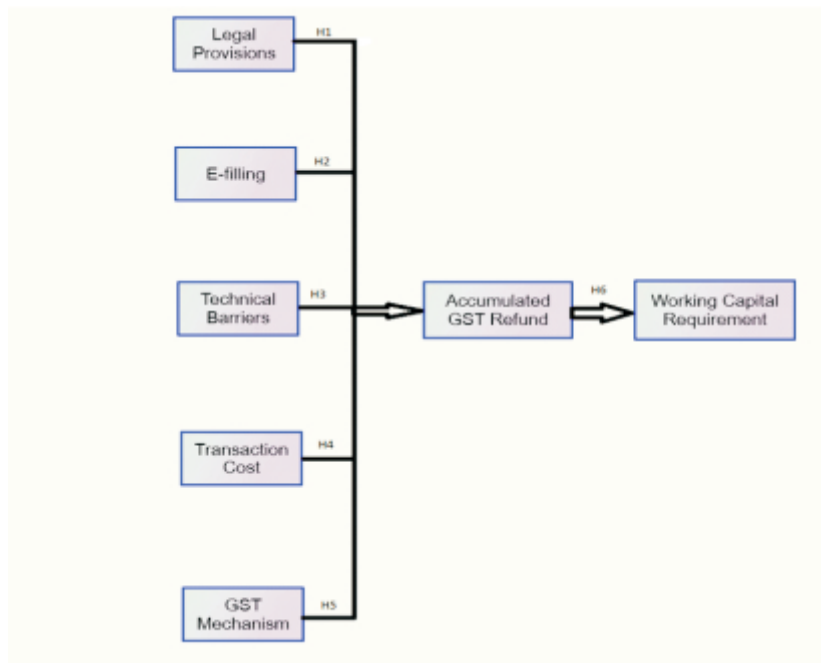
claim the pending refund or otherwise to adjust the output tax against the input tax. The provisions for GST are user friendly and online in nature as against at the time of VAT which were cumbersome in nature. The situation when the question of GST refund arises.

The impact of the implementation issues is more evident and severe for the exporters, the study said. Prior to GST, exporters were upfront exempted from paying any duties. However, under GST, they are required to first pay the tax and later claim refunds. This constrained their working capital, at least once after the regime switch, since exporters would have had to adjust to the new tax regime. Under GST, they can avail 90% of the input tax refund within 7 days, but only after the goods are exported out of India.

The relevant date provision embodied in Section 54 of the CGST Act, 2017, provision contained in Section 77 of the CGST Act, 2017 and the requirement of submission of relevant documents as listed in Rule 1(2) of Refund Rules is an indicator of the various situations that may necessitate a refund claim. A claim for refund may arise on account of:

1. When goods and services are exported
2. When goods are supplied to the Special Economic Zone.
3. If the dealers are deemed exporters.
4. Refund of taxes on purchase made by UN or embassies etc.
5. Refund arising on account of judgment, decree, order or direction of the Appellate Authority, Appellate Tribunal or any court
6. Refund of accumulated Input Tax Credit on account of inverted duty structure
7. Finalization of provisional assessment
8. Refund of pre-deposit
9. Excess payment due to mistake
10. Refunds to International tourists of GST paid on goods in India and carried abroad at the time of their departure from India
11. Refund on account of issuance of refund vouchers for taxes paid on advances against which, goods or services have not been supplied
12. Refund of CGST & SGST paid by treating the supply as intrastate supply which is subsequently held as inter-State supply and vice versa

**Proposed Model for there search: Figure 1**



### **Hypothesis of the study**

Firstly, the accumulation of the GST refund is the result of cumbersome legal provision about which the GST dealers are not well known, create problem to them in getting GST refund from the Government(Emily,2017). The dealers assume that the legal provisions are complex and involves too many documentation formalities for which they are not willing to deal with. The next problem in this category they face is that the tax authorities do not follow the system properly and harass them to claim their GST refund in time(Kaur,2018). To evaluate this, issue the following hypothesis were chalked out and verified during the research process:

H1: Legal provisions has positive impact on Accumulated GST Refund.

H1a: Complex legal provisions positively related to Legal Provision.

H1b: Documentation formalities are positively related to Legal Provision.

H1c: Fund Shortage is positively related to Legal Provision.

H1d: Harassments of Dealers is positively associated with Legal Provision.

H5a: Tax Authorities are positively related to Legal Provision.

Secondly, the next factor, which is accountable for the accumulation of GST refund, is the problems involved in the e-filing such as down server due to heavy traffic on the online server or some other technical issues involved in the e-filing(Bikky,2018). When the return does not match of the party concerned, the refund is put on hold until the discrepancies exist. Likewise, is some mistakes are found by the tax authorities the refund is not sanctioned by the officials(Deepak,2018). GST is a new phenomenon for the accountant and the chartered accountant, which a non professional cannot understand. Our country lacks of educated and technical employees having both technical and accounts knowledge.

H2: E-filing is positively related with Accumulated GST Refund.

H2a: Down Server is associated with E-Filing.

H2b: Mismatch of return is associated to E-Filing.

H2c: Minor Mistakes positively related to E-Filing.

H2d: Skilled Employees are positively related to E-Filing.

Thirdly, the Technical Barriers results in agglomeration of GST refund with the government. The process of GST Portal is partially manual and partially online (Priydarshi,2017). Since, too many returns ought to be filled by the GST dealers and there is always possibility of some mistakes by them which causes unnecessary delay in the execution of GST refund to them well in time(Gaytri,2018). The following hypothesis were tested:

H3: Technical barriers are positively with Accumulated GST Refund.

H3a: Refund Mechanism is related to the Technical Barrier.

H3b: Tax Evasion are positively related to Technical Barrier.

H3c: Minor Mistakes positively related to Technical Barrier.

Fourthly, Cost is also one of the major factor results in accumulation of GST refund. Every month each GST dealers have to file minimum of three online return and has to pay the consultancy fees to the professional or has to hire additional employees to manage it(Shrivastva,2018). There is always a confusion while the goods are exported as to how the exchange rates will be decided to refund the accumulated refund(Sahai,2018). To evaluate this the following hypothesis were drafted:

H4: Acceleration in Cost is positively with Accumulated GST Refund.

H4a: Transaction Cost is related to the Cost.

H4b: Exchange rates are positively related to Cost.

Fifthly, GST mechanism fails due to its implementation part such as Collecting a tax and later to refund is inefficient system(Kumar,2017). Further the exports are kept zero rated which undue block the working capital with the government (The Hindu,2017). The exporters have to pay input tax while buying the goods but there is zero output tax to these dealers which ultimately has to claim from the government.

H5: GST mechanism is positively with Accumulated GST Refund.

H5a: Wrong treatment is related to the GST mechanism

H5b: Zero rated exports are positively related to GST mechanism.

Lastly, there is definite dent on the working capital requirement due to the GST provisions. The delay caused by the complex GST provisions have badly hammered on the working capital requirement to the industrial units. Therefore, the last proposed hypothesis under the study is:

H6: Agglomeration of GST refund is positively associated with the working capital requirement.

### **Data Collection**

The empirical research design contains the collection of empirical data relating to the Factors accountable for the Accumulation of GST refund and it's correspond impact on the working capital requirement. The descriptions of the survey items are shown in Table 1. Respondents were requested to indicate their perceptions with regard to the importance of each item based on a seven-point Likert scale of 1-7, with 1 scoring the lowest point 'not important at all,' to 7 scoring the highest point 'extremely important. The primary data of this work comes from a survey of 400 industrial units located in the three districts of the Punjab State, which are Jalandhar, Ludhiana and Amritsar, with the help of well-drafted and pre-tested structured interview schedule. The universe of the study comprises of the industrial units located in the three districts of the Punjab State.

**Measurement model**

**Table 1 : Results of Exploratory Factor Analysis and Reliability Test**

Construct	Item	Description of Survey Item	Factor Loading	Cronbach X
<b>Legal Provisions</b>	<b>X1</b>	Cumbersome Procedure	0.932	0.9215
	<b>X2</b>	Too many documentation formalities	0.951	
	<b>X3</b>	Govt. is always short of fund and insist on adjustment	.893	
	<b>X4</b>	Tax authorities harass the dealers	0.887	
	<b>X5</b>	Tax authorities are not following the system	0.862	
<b>E-Filling</b>	<b>X6</b>	Down server of the Government.	.973	.8724
	<b>X7</b>	Mismatch of Return	0.910	
	<b>X8</b>	Minor mistakes in filling	0.813	
	<b>X9</b>	Skilled Employees are not available for e-filling	.865	
<b>Technical Barriers</b>	<b>X10</b>	The process of ITC refund is partly electronic and partly manual	0.851	0.7841
	<b>X11</b>	<b>Fraud by dealers</b>	0.822	
	<b>X12</b>	Delay in refund in case of minor mistake	0.779	
<b>Cost</b>	<b>X13</b>	Increase in transaction cost	0.865	0.8862
	<b>X14</b>	Confusion over exchange rate.	0.821	
<b>GST</b>	<b>X15</b>	Collecting a tax and later to refund	0.843	0.7912

Source : Author's Calculation

**Testing of Hypothesis**

To explore the impact of the various constructs on the Agglomeration of GST refund and thereby its adverse impact on the working capital requirement I validate the constructs deploying SEM. For example, Y be agglomeration of GST refund that depends upon b1(Legal Provisions), b2 (E-Filling), b3(Technical Barrier), b4(Excessive Transactions Cost) and b5(GST Compliance). It is hypothesized Accumulation of GST Refund, y (Observable), satisfies the following relation:

$$Y = b_1 + b_2 + b_3 + b_4 + b_5 + e = N + e \text{----- (1)}$$

In the above equation  $e$  is an error term with. As all the exogenous variables  $b_1$ ,  $b_2$ ,  $b_3$ ,  $b_4$  and  $b_5$  are hypothesized to lead to the latent endogenous variable  $y$  positively.

The exploratory factor analysis depicts the most important factor, which is accountable for the accumulation of GST refund is the complex legal provisions, which exist in GST Act and need to be reduced in order to smoothen the GST refund mechanism such as complex procedure, too many documentation formalities. The government always insists on adjusting the input tax credit against the output credit rather than refunding the excess amount. The factor loading on these variables  $X_1$ ,  $X_2$ ,  $X_3$ ,  $X_4$ ,  $X_5$  are .932, .951, .893, .887 and .862. The variable  $X_2$  is highly loaded among the variables, which means it is the most important reason responsible for this factor and  $X_1$  is the second highest loaded variable. So we can say that the cumbersome documentation involving too much formalities need to be cope up to smoothen the GST refund procedures.

After exploring, the five factors with the help of Exploratory Factor Analysis the next step is confirm these factor whether responsible for the accumulation of the GST refund. However, the previous study showed that there is no such technique to test the importance of the Exploratory Factor analysis. Contrary to this, we have a hypothetically or empirically based conception of the construction of measured constructs which factors and permits us to test the appropriateness of a particular “measurement model” to the data.

The five factors projected model so obtained with the help of EFA is represented in the figure 1 to measure the factors accountable for the agglomeration of GST Refund, which is tested, with the help of AMOS 19.0 to approve to the five factors and to determine the model fit to explore the various factors causing GST refund agglomeration.

After the exploratory factor analysis the next step was to conduct the validation and reliability analysis of the given data to further proceed the confirmatory factor analysis . though the Cronbach alpha is duly computed to measure the reliability scale of the data but some researcher also suggest to measure the composite reliability scale of the data to find the reliability scale of the given data before further analysis is done.



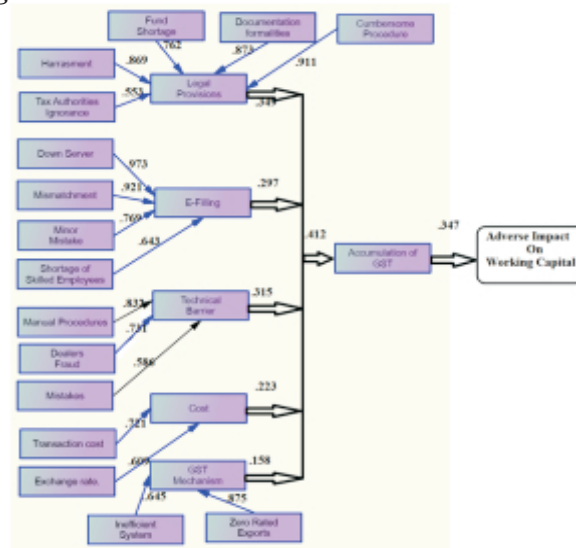
**Table 2: Reliability and Validity Analysis**

Variable	Composite Reliability	Average Variance Extended(AVE)	Maximum Shared Variance(MSV)	Average Shared Variance(ASV)
Job Opportunities	0.806	0.569	0.427	0.285
Infrastructure	0.659	0.546	0.349	0.233
Desire	0.743	0.525	0.394	0.262
Personal Factors	0.843	0.596	0.447	0.298
Social Factors	0.698	0.513	0.370	0.247

Source : Author's Calculation

Table 2 clearly shows the reliability scale duly computed which show that the data is reliable as the computed value of the Composite Alpha is greater than is 0.7 which is acceptable and fit for the further analysis. To validate convergent validity, the AVE is computed which is above 0.5 is acceptable for further analysis. The discriminant validity is found to be true as the two laid down conditions should be true i.e.  $MSV < AVE$  and  $ASV < AVE$  which are true as depicted in the above table 2.

**Figure 2: SEM model for Accumulated GST refund**



The above depicts the model testing of the hypothesized model along with the factor loading of the respective constructs. Five factors model is tested with the help of AMOS 18.0. Among the five factors Legal Provisions is the most accountable factor causing unnecessary delay of the GST refund. There is dire need to abolish the formalities involved in the GST mechanism of what the dealers are still not used to be. The next important factor is E-filing which requires the uninterrupted internet at a very high speed, as the dealer's complaint that the servers most of the time remain either down or busy due to enormous traffic. Further the dealers are not well educated and are less aware about the legal provisions relating to the GST.

**Table 3 Results of Confirmatory Factor Analysis**

Construct and Measurement Item	Standardized Item Construct Loading	t-value	R-Square
X1	0.9638	22.1400	0.8856
X2	0.9153	14.5800	0.5832
X3	0.8667	18.5350	0.6414
X4	0.7964	23.3388	0.7336
X5	0.5940	17.9496	0.7180
X6	0.9126	11.5122	0.7005
X7	0.9652	22.3490	0.8740
X8	0.9129	23.4522	0.9381
X9	0.8713	14.5122	0.7005
X10	.9432	16.6238	0.7521
X11	0.9023	13.4191	0.6523
X12	0.7529	11.2341	0.5912
X13	0.8809	17.2312	0.8721
X14	0.7541	11.1231	0.6912
X15	0.8123	16.7383	0.7923
X16	0.7652	13.2457	0.6912
<b>Latent Variable equations</b>			
1	0.4048	8.1456	

*Source : Author's Calculation*

The Model obtained after the requisites amendments in the initial model is acceptable and is fit to the observed data ( $\chi^2 = 273.1661$ ,  $p < .001$ ; GFI = 0.8606; AGFI = 0.8235; CFI = 0.902; TLI = 0.9765; IFI = 0.919; NFI = 0.923 and RMSEA = 0.0771) it shows that all the constructs of the conceptual model are perfectly loaded. The computed value reveals an appropriate fit of the measured model by using the data so collected with the help of

the questionnaire with the collected data with the help of questionnaire. Hence, it can be concluded that the SEM model confers the hypothetical model, which causes the GST accumulation and has badly hammered on the working capital requirement.

The conceptual model was AMOS 18.0 and the actual model fit is obtained to verify the hypothesis which were proposed at the initial stage of research work. Five factors were explored and tested during the research work and model testing as depicted in figure 2. The model contains five constructs which are Legal Provisions, E-Filling, Technical Barrier, Costs and GST mechanism and also the related variables to these constructs.

<b>Hypot he sis</b>	<b>Effect</b>	<b>Loading</b>	<b>Hypothesis Result</b>
H1	Legal provisions has positive impact on Accumulated GST Refund.	0.3480	Significant
H1a	Complex legal provisions positively related to Legal Provision.	0.9638	Significant
H1b	Documentation formalities are positively related to Legal Provision.	0.9153	Significant
H1c	Fund Shortage is positively related to Legal Provision.	0.8667	Significant
H1d	Harassments of Dealers is positively associated with Legal Provision.	0.7964	Significant
H1e	Tax Authorities are positively related to Legal Provision.	0.5940	Significant
H2	E-filling is positively related with Accumulated GST Refund.	0.3480	Significant
H2a	Down Server is associated with E-Filling.	.4048	Significant
H2b	Mismatch of return is associated to E-Filling.		
H2c	Minor Mistakes positively related to E-Filling	0.9126	Significant
H2d	Skilled Employees are positively related to E-Filling.	0.9652	Significant
H3	Technical barriers are positively with Accumulated GST Refund.	0.9129	Significant
H3a	Refund Mechanism is related to the Technical Barrier.	0.8713	Significant

*Source : Authior's Calculation*

Assessing the significance of the hypothesized relationships after applying bootstrapping, t-statics are obtained which can be used to evaluate the significance of the hypothesis. Two-tail t-static at significance level of 5% were used to test the path coefficient, if their calculated values are greater than 1.96 it means the hypothesis is significant otherwise insignificant.

After the model was tested with the help of AMOS, the proposed hypothesis H1, H2, H3, H4 and H5 respectively were tested with the help of computed t-static which were found to be significant at 0.05% level of significance, so we can conclude that there is positive association among the five proposed constructs and their adverse impact on the accumulation of GST refund. After computing the factors accountable for the accumulation of the GST refund, their impact on the accelerated working capital requirement was analyzed with the help of t-static and the computed value of the t-static was .4215 is quite greater than the tabulated value at 5% level of significance.

### **Conclusion**

The purpose of the above study was particularly to access the factors accountable for the accumulation of the GST refund with the government and its correspondent impact on the accelerated working capital requirement on Indian industry. Five factors were explored with the help of exploratory factor analysis such as legal provision, e-filing, Technical barriers, Transaction cost and GST mechanism. Among the five responsible variables Legal Provisions was confirmed to be the most important reason causing undue harassment to the dealers relating to the long pending GST refund and thereby enhances working capital requirement for which these units are knocking the doors of the lending institutions. There is dire need to take the appropriate steps by the government well in time otherwise the future of the MSI industry will be in dark. Secondly, the dream of digital India would only be fulfilled only and only if the government provides suitable internet penetration so as to smooth filling of GST return by the dealers without any risk at low cost. It would certainly remove the intermediaries which causes delay and increase in the transaction cost of filling GST return.

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