ECONOMIC IMPACT STUDIES AND DATA GATHERING

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INTRODUCTION:

Winston Churchill, the renowned British Prime Minister and honorary citizen of the United States of America, is reputed to have said that, "A pessimist sees the danger in every opportunity, and an optimist sees the opportunity in every danger." This inaugural USVI Revenue Estimating Conference and the subset of which I am about to discuss must be captured in the ambit of "Economic Impact Studies and Data Gathering" and within the matrix of the optimist opportunity space and not the pessimist danger continuum.

Where we stand today in the USVI is not new in terms of the challenges facing the body Economics and the body Politics. What is pivotal, however, is that our thrust must now be to consider serious economic impacts and structural policies that will enable us to gather data thereby moving us forward in a positive manner. We have to seize the opportunities ahead of us. In that regard it could be said that what lies within our abilities and what lies ahead of us, in terms of opportunities, are vast potentialities for restructuring and transforming the VI economy. It will not be a quick fix, but we who are tasked to be part of this new positive change are confident that positive changes will come.

What is an Economic Impact Study or an Analysis?

By and large, an economic impact study is a specific, clear and coherent examination of an event or an action that will permit us to understand structure and measure the changes in economic events that will affect policy direction and development. Economic impact studies are usually conducted when decision makers are concerned about the impact and incidence of a proposed policy, or when it is desirous to have a policy implemented. Out of impact studies, we would normally seek to measure and or estimate the marginal changes in the proposed activity between two scenarios. In scenario one, the idea is to observe what will happen if a new policy is put in place, and in scenario two, the idea is to observe what will happen if nothing happens, and remains as is; that is, the status quo ante.

First, let me say, as you would note from my colleagues that data abound in the USVI. What we have to do is to begin to collate all of the financial data in such a manner that we are up to date and that such data are the same across the board. This is one of the many tasks of the group of us who could collectively be called the Financial Team. What we will present today is a first step in coming to grips with the vital contention which states that decisions in today's world must be data driven. I will give a synopsis of some of the many concerns of our area, especially as those concerns pertain to the economic and fiscal side of the economy.

Table One

ECONOMIC INDICATORS 2006 - 2013								
	2006	**2007**	**2008**	**2009**	**2010**	**2011**	**2012**	**2013**
Resident Population	113,689	114,743	115,852	107,343	106,405	105,784	105,169	105,000
Gross Domestic Product	4,635	4,853	4,266	4,260	4,406	4,288	4,143	3,792
Individual Income Taxes (Gross)	388.8	426.9	433.4	327.9	334.4	353.6	333.2	327.4
Corporate Income Taxes (Gross)	185.6	152.7	177	50.7	61	54.4	45.7	62.5
Taxes	642.7	653	621.4	400.3	492.4	518.8	598.8	641
Total Revenues	699.1	728	678.7	483	591	636.8	668.8	682.1
Total Expenditures	708.3	843.3	889.2	877.2	1,168.60	847.4	802.7	850.9
R - E	(9.2)	(115.3)	(210.5)	(394.2)	(577.6)	(210.6)	(133.9)	(168.8)

Sources

Bureau of Economic Research (BER): Resident Population, Individual Income Taxes, and Corporate Taxes

Bureau of Economic Analysis (BEA): GDP

Office of Management and Budget (OMB): GVI Financial Analysis 2013 - Taxes, Total Revenues and Total Expenditures

In Table One, we present some Economic Data for the period 2006 through 2013. The data for the years 2014 through 2016 will be presented later. Of central moment, a few points should be noted.

- First, the overall goods and services Gross Territorial Product (GTP) in the USVI have been on a downward drift. While we will note some upward movement between 2014 and 2015, there seems to be some secular structural problems for 2016. I will explain this a little later and give our assumption underpinning that contention. This is in row three, here called Gross Domestic Product, GDP, or as we use it in the USVI, Gross Territorial Product, GTP.
- Second, Individual Income Tax, the workhorse of the Revenue stream, has also been on a downward drift. Given its prominence in overall revenues, it averaged about 31%, from about 36% in 2003, to 25% in 2013; this is clearly a major cause for concern. This subset

of the data shows, in very graphic terms, that the Expenditures stream has been outpacing the Revenue stream every year, an average of $227.51Million. This cannot continue. The VI Law requires that there should be a balanced budget. Economic planning is made easier when revenues are not outstripped by expenditures.

<u>Table Two</u>

U.S. VIRGIN ISLANDS GROSS DOMESTIC PRODUCT									
	[Millions of Dollars]								
Year	**Gross Territorial Product y**	**Personal Consumption Expenditures C**		**I**		**Government Consumption Expenditures And Gross Investment G**		**Net Exports of Goods and Services (X-M)**	
			$\frac{C}{Y} = 0.554$ *Average*		$\frac{I}{Y} = 0.142$ *Average*		***0.266*** *Average*		***0.101*** *Average*
2007	**4853**	**2247**	**0.463**	**-105**	**-0.022**	**1074**	**0.221**	**1636**	**0.337**
2008	**4266**	**2244**	**0.531**	**585**	**0.137**	**1115**	**0.261**	**322**	**0.075**
2009	**4260**	**2328**	**0.546**	**559**	**0.131**	**1178**	**0.277**	**195**	**0.046**
2010	**4406**	**2398**	**0.544**	**82**	**0.019**	**1276**	**0.29**	**651**	**0.148**
2011	**4288**	**2436**	**0.568**	**432**	**0.104**	**1201**	**0.28**	**219**	**0.051**
2012	**4143**	**2458**	**0.593**	**338**	**0.082**	**1064**	**0.257**	**283**	**0.068**
2013	**3792**	**2411**	**0.636**	**389**	**0.103**	**1060**	**0.28**	**-68**	**-0.018**

Aggregate data estimates are based on the August 19th, 2014 U.S. Virgin Islands Bureau of Economic Research (BER) Release of the 2013 GDP for the U.S. Virgin Islands.

Y = C + I + G + (X - M)

In Table Two, we present data for the Economy from the components perspective, namely Consumption, Investment, Government and Net Exports, (Exports minus Imports). What is the take away from this table?

- On average, over the years in review, Consumption to GTP (or Income) was 0.554 (column four). In other words, for every dollar generated in the Economy, 55 cents were devoted to Consumption. The VI economy is an Open Economy. An Open Economy is one where imports are greater than exports. In such an economy, Average Consumption should be between 0.70 and 0.75. So, we are far away from the structural nature of what our economy should be.

- In column six, the Investment to GTP ratio is 0.142. That is, on average Investment to Income is about 14.2 percent. This is about one half of what it should be for economies such as ours. It should be noted that there is an erratic behavior in the Investment profile. This makes forward planning very troublesome.
- In column eight, the average Government to GTP over the period in question was 0.266. That is, Government expenditures' absorptive capacity was 26.6 percent. As we will see later, however, this inline government expenditure masks a reality of what the actual consumption expenditures and government expenditures are, relative to what is really spent by the Government and what is really spent on consumption.
- In the last column, the average Net Exports were 0.101, which is 10.1 percent. This, too, is below what should be the case. Our saving grace was the exports of refined products. The impact is noted in the year 2013 when the Net Exports ratio turned negative.

<u>Table Three</u>

MACRO DATA						
YEAR	GTP $Millions	TOTAL TAXES $Millions	LONG-TERM DEBT (LTD) $Millions	INCOME TAXES $Millions	CORPORATE TAXES $Millions	GROSS RECEIPT TAXES $Millions
2003	$4,159	$462.1	$830.0	$309.0	$28.0	$100.8
2004	$4,299	$557.9	$1,066.4	$343.7	$40.4	$113.1
2005	$4,457	$633.7	$1,173.2	$364.9	$117.0	$125.0
2006	$4,635	$642.7	$1,262.2	$388.8	$185.6	$143.6
2007	$4,853	$653.0	$1,168.7	$426.9	$152.7	$146.7
2008	$4,266	$621.4	$927.7	$433.4	$177.0	$147.2
2009	$4,260	$400.3	$945.2	$327.9	$50.7	$126.1
2010	$4,406	$492.4	$832.3	$334.4	$61.0	$134.5
2011	$4,288	$578.8	$925.4	$354.6	$53.5	$145.4
2012	$4,143	$598.8	$937.8	$333.3	$45.8	$150.4
2013	$3,792	$641.0	$862.3	$327.4	$62.5	$156.3

Note: Total Taxes are Net Revenues

Table Four

PER UNIT MACRO INDICATORS 2003 - 2013					
YEAR	LONG-TERM DEBT (LTD)	LONG-TERM DEBT (LTD) PER CAPITA	PER CAPITA GTP	- LTD GTP	STP GTP Implicit
	$Millions			%	%
2003	$830.0	$7,494	$37,468	20.0	80.0
2004	$1,066.4	$9,568	$38,730	24.8	75.2
2005	$1,173.2	$10,525	$40,153	26.3	73.7
2006	$1,262.2	$11,102	$40,657	27.2	72.8
2007	$1,168.7	$10,185	$42,200	24.1	75.9
2008	$627.7	$5,418	$36,776	14.7	85.3
2009	$945.2	$8,805	$39,813	22.2	77.8
2010	$832.3	$7,822	$41,456	18.9	81.1
2011	$925.4	$8,748	$40,453	21.6	78.6
2012	$937.8	$8,917	$39,457	22.6	77.4
2013	$862.3	$8,104	$35,773	22.7	77.3

Legend: LTD - Long-term Debt
GTP - Gross Territorial Product
STD - Short-Term Debt

Target Ratio of Debt-To-GTP: 60%

In Tables Three and Four, we present some per unit macro-indicators and Long-Term Debt. There we note an average Long-Term Debt of $993.7Million over the period 2003 to 2013, with a standard error of $45.21Million. At the same time, Long Term Debt per capita averaged $790Million, with a standard error of $480. While the per capita GTP average of $39,360 is on the higher end of GTP (GDP) in the Caribbean, it is only 53% of the USA average. The Long-Term Debt to GTP has been averaging 22%. Now, this is the long-term debt. Implicit to all of this is the fact that the short-term debt has been averaging 78%. From a pragmatic point of view, Debt to

GDP should be 60%. When a country has a Debt to GDP ratio above 60% that spells problems in the body economics.

Some Suggestions and Recommendations:

1. Aggregate current expenditure should be limited to USA national norms of 15% to 20% of GTP. That we are at 26.6% or 7% to 12% above that threshold, indicates that such a scenario cannot be sustainable going forward.
2. Given the open economy nature of the Territorial economy, Investment should be 30% of GDP, and public sector investment should be about 33% of Territorial Investment. At 14%, we are 16% below what is required, if we are to have a balanced investment program. This suggests that we have to double up our investment over the next several years.
3. Our average consumption profile has to be raised from 55% to about 70%. This does not mean a radical one-step jump, but a gradual sustained upward movement to sustain the tractability of the economy going forward.
4. Net Exports has to be raised to a sustained level of about 15%. In the past, it averaged about 10.1%; that is when exportables were substantially dependent on HOVENSA. But it should be noted that Tourism is an Export, so we need to pay greater attention to this sector of the Economy with regards to its contribution. This means that the attention and focus should be on a new tourist profile: a tourist who will spend an increasing amount as opposed to one who spends at a decreasing quantum.
5. The Long-Term Debt to GTP ratio is about 22%. And the implicit short Debt to GTP ratio is about 78%. These need to be radically restructured downwards to less than 15% for the Long-Term Debt to GTP and to 45% for Short-term. The overall Debt to GTP should be no more than 60%. It should be borne in mind that the international benchmark of 60% Debt to GDP is merely given as a maximum. It is recommended that countries should strive to operate below the 60% threshold to enable them to maintain a sound, stable economy with greater degrees of fiscal soundness.
6. Between 2007 and 2013, Individual Income Taxes averaged about 8% of GTP; Corporate Taxes averaged about 1.9% of GTP, and from 2009 through 2013, the ratio of Corporate Taxes to GTP has been barely above 1%. From an impact perspective, one is not hinting at any increase in these taxes, rather the explicit impact resolve is for us to revision our system to capture more of the taxes in these two profiles. The yield to these two tax streams may not be in keeping with the fiscal and financial efforts expended to capture

the revenues. Added to that, the leakages in the system and/or instances of tax evasion, whether anecdotal or real, require greater fiscal oversight.

7. Over the last few years, Revenue to GTP has averaged about 13.19%. If one were to use this idea, and given the data of my colleagues, GTP for 2015 would be $4741 million and $4098 million for 2016; of course these are based on a heroic assumption, that all things will be equal. The standard errors are large, thus they must be taken with caution. Principal among this caution is the nature of what will take place and is taking place on the USA continent. Given some studies that we have done in the past, there is approximately one year to 18 months lag between economic impact and stimuli on the USA continent and when we feel the impact in the USVI. Thus, while the USA is banking on an approximate growth rate of about 2%, there is no guarantee that we will experience that any time soon.

CONCLUSION:

- Broadly contextured, we offer the following for 2016 and beyond. Fiscal discipline and fiscal responsibility have to be the principal pillars of the required structural transformation of the VI economy as we go forward.
- It is moment that we all recognize that debt and deficits should not operate as if they are part of our fiscal DNA. Thus we will have to begin to structure fiscal policies to manage the economy to minimize in the first instance and eliminate in the long-term, debt and fiscal deficits. Debt, as we know, is the accumulation of deficits. Deficits are basically the excess of expenditures over revenues.
- We cannot continue to focus on the fiscal side of the divide only. We have to grow the economy. Growth is the sine qua non for the development profile of where we have to go in the future. Thus as we marshal our efforts to attract new business to the Territory, we have to go after those high-yielding industries such as those in technology, intellectual property and others that would have greater transformative synergies than what we have, and what we had in the past.
- We have to develop a greater awareness for productivity in the economy. Productivity, by definition, is output divided by input. Greater labor productivity and improvements in productivity will be the key standards for us to sustain a growth economy.
- We have to develop a new vision about the attitude to work and the associated attitude to work. We cannot operate as if we are doing others a favor when indeed it should be service. We are a service-oriented economy. We have to operate in that framework.

It should be abundantly clear that there are a myriad of pieces that we all have got to put in place to move the economy from this level to a higher level. My professional view is that the requisite impacts will be manifested, as we look at the nuts and bolts of the economy and go under the hood to pay attention to the engine of the economy. In our Economy, the public and private sector are inextricably bound as they move the economy in a positive space. So, while the focus of this conference is to get a handle on the nature, scope and scale of 2016, the long term imperative is of central moment, as we seek to be more creative in our gathering of data, our use of data, and our appreciation of the essentialities of suggestive impacts of policy decisions and policy statements for growth and development of the USVI over the next several years.