2011

Economic Structure and Performance of the Australian Retail Industry

Submission of the National Retail Association Limited

The National Retail Association is Australia's largest and most representative retail industry association. Its core constituency is the national retail chains, the majority of whom are members of NRA, but its membership also embraces many small and medium Australian family businesses.

This submission is in response to the Productivity Commissions call for submissions into the public enquiry on "Economic Structure and Performance of the Australian Retail Industry" under its terms of reference, and with consideration of the published issues paper.

NRA is completely unequivocal in asserting that the reform of the current tax and customs regime pertaining to "low value threshold" for imports is the predominant matter for the Productivity Commission, and one requiring urgent resolution.

This submission will largely limit its response to the issues surrounding the "Appropriateness of current indirect tax arrangements" specifically the operation of the low value importation threshold as outlined in section 4 of the issues paper.

NRA submission to the Productivity Commission
1St June 2011

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1.0 Executive Summary

Australian based companies will never be able to compete with those internationally based companies that enjoy a Tax/Duty free status in one of the fastest growing innovative and global industries – online retailing.

Given governments would normally actively support newly emerging domestic industries, particularly if they have the potential to be global, the continuation of a policy that penalises a local industry seems at best misguided and at worst politically expedient.

If a domestic online retailer were to offer ***exactly*** the same products, delivery times, informational content, on exactly the same web site as an international competitor, had the same cost structure and purchased on the same terms from the same supplier, they would still have to charge a customer between 11% and 23% more for the same product. This price difference is purely from the imposition of tax and duty on one competitor and not on the other.

This entrenched disadvantage will ultimately drive the domestic competitor out of business, as one would expect in a competitive market. Domestic online retailers have survived, so far, because "other" factors have protected them from the full effects of the regulatory advantages their international competitors benefit from when competing in the Australian market.

These "other" factors include cost of overseas delivery, time to deliver, fear of the payment system internationally, trust/familiarity with the overseas retail brands, warranty and support issues on products etc. These "other" factors are now being minimised with trusted payment partners (PayPal), reduced delivery times and costs being reduced (or absorbed), increasing customer experiences, which is therefore leading to higher levels of trust and familiarity with purchasing offshore.

Current Situation

Online penetration of the domestic retail market has lagged international standards (4.7% versus 8%). Within this, offshore competitors have secured a high, and ever-increasing share (currently 35%).

Base Case

Over the next five years, as these "other" factors continue to be minimised, domestic online penetration is expected, at a minimum, to draw level with the current international standard of 8%. Within this, international competitors are expected to makeup all of these gains, increasing their share of the online retail market in Australia to 65%. Domestic online retailers will retain approximately the same level of business in dollar terms as they have currently, with the exception of Food, which will continue to grow and remain 100% domestic.

The end result of this will be the transfer of approximately $10billion in sales annually out of local discretionary retail businesses to overseas online retailers. Consequently, approximately ***53,000 jobs*** will be "exported" from domestic retail sites and stores to 'Pick-and-Pack' operations overseas.

Realistic Outcome

The "price" advantage offered by the tax/duty policy also impacts store based operators, on the same basis 11%-23% higher prices, which when added to the "structural" store based cost disadvantages (higher domestic wages/rents/taxes), results in greater price differentials between overseas online competitors and domestic stores.

The current (but growing) 8% online penetration of Retail sales in overseas markets is based largely on price parity with stores.

Given online shopping in Australia, as with overseas markets is largely motivated by price, and that a large "price disparity" exists domestically, it is likely that future online penetration in Australia will reach 12% in the next 5 years (UK is currently at 11%). Most of the growth will come from domestic non-Food stores and most will go to overseas online competitors.

This will see the movement of $20billion of sales annually out of non-Food Stores to overseas online retailers over the next 5 years and will result in the "exportation" of about ***105,000 jobs*** from domestic stores to 'Pick-and-Pack" operations overseas.

Without the market distortions caused by the tax/duty policy, the domestic market would evolve normally and there would be a natural progression towards the online environment at the base case rate of 8%. Furthermore, under these natural market conditions, domestic competitors would normally retain the majority of the growth. Since online retailing employs less people than traditional bricks-and-mortar retailing,

there would be a natural reduction in the employment base of approximately 17,000 jobs, which would offset the total jobs "exported" offshore, as detailed above. However, the current, abnormally high overseas online sales, has already "exported" jobs which would reduce this offset.

This submission has focused on employment, as this is an important political and social issue. However, there are many more negative economic impacts that have not been included, in order to limit the length of the submission. In addition, only direct retail employment has been quantified. In reality, the flow-on effects (retail has the second highest multiplier effect in the domestic economy) to support industries such as distribution, importers, brand owners, and manufacturing, would be considerable.

This submission has also not fully addressed the cost competitive structure of the Australian store-based retailers versus other countries, although we note that sale productivity per employee in Australia exceeds that of the United States. Given the local standard of living and input costs (such as wages and rental, caused by scarcity), it is improbable that Australia will be a low cost retail location. What is apparent is that the Internet exposes this and does so more markedly because of the added tax/duty advantage currently available to international online competitors.

Finally, this submission has addressed many of the items raised during the public debate on this issue as reasons not to act. Specifically, the cost of processing by customs has not been fully explored because of the lack of information on actual costs, alternate process or exploration of working overseas models, notably the UK. The NRA urges the Productivity Commission to fully investigate these issues on the basis that a policy of "full" compliance to GST and Duty in cross border transactions is economically essential and that an implementation solution needs to be found. Any compromise on full compliance driven by a break even on processing costs versus revenue collection needs to consider:

- The full economic impact of non-compliance, specifically the flow-on costs to the domestic economy inclusive of lost employment (highlighted in this submission), but also the multiplier effect within the domestic economy.
- A full and comprehensive review of the current actual costs to process and alternative approaches including a review of global benchmarks. Benchmarking processing costs on an existing domestic system that was built for an entirely different set of circumstances and then using this as a reason not to act, given the magnitude of the impact on the economy, is inexcusable.

2.0 The Case for a Level Playing Field for Australian Retailers

2.1 What Market distortions result from the threshold policy?

As noted in the Inquiry's issues paper, there are two components in the current Tax/Customs policy that relate to the low value importation threshold that have significant flow-on effects to the structure and competitiveness of the domestic retail industry. These components relate to GST payments and customs payments.

To illustrate the impact on retail prices consider two **identical** items purchased from an overseas supplier at a cost of $100. These items are to be sold online in Australia under **identical** conditions to a consumer. The delivery costs and times are the same, the items are displayed on identical web sites, with identical ranges of products, with identical customer reviews and identical payment options. Further to this each competitor has identical cost structures and neither one is more or less efficient than the other.

Competitor # 1 is a non-domestic online retailer who sells the product to a domestic customer at a mark up of $50, as the item is under the $1000 threshold no GST or duty is payable. Therefore, at a price of $150 the retailer makes a margin of 33% which is within the typically in the range of 20%-60% for the retail industry.

Competitor # 2 is a domestic online retailer. They import the product as part of a domestically based buying operation and then sell to the same customer. Unless the domestic competitor "breaks" its imports into parcels of less than $1000 both GST and customs duty will be payable on the items.

The amount of customs tarrifs payable varies from 0% to 10% based on the type of item, in this case costing $0 to $10. Additionally, there are standard customs clearance costs for logements (avoided by Competitor #1 under import self assessment-SAC's), along with the cost of collection of GST, which adds a minimum of $2 to the domestic competitor costs.

For the domestic online retailer to make the same $50 margin as its overseas competitor then the item will have a margin loaded cost base of between $152 and $162 before GST. As GST is payable the price to the customer will then be between $167 and $178.

It is worth noting that the capital markets generally require competitors to achieve comparable % margins which means that the final margin achieved on this increased cost base and retail price needs to be the same % as the international online competitor, namely 33%(pre GST) or between $51 (no duty) and $57 (10% duty) as opposed to $50. Consequently the sell price can range from $168 to $182 or 12%-23% higher than the international competitor .

If the domestic retailer is willing to have a lower % margin but the same $ margin the customers price will still be 11%-19% higher.
For clarity, the comparison described above is illustrated in Table 1 below.

Table 1

	Online retailer		
	Australian	International	
Cost of Goods	$ 100.00	$ 100.00	Sourced from identical overseas supplier
Tariff costs	$ 10.00		Varies from 0% to 10% based on type of item(see below)
Compliance costs	$ 2.00		Customs charges for lodged documents and GST collecton costs
Gross margin	$ 50.00	$ 50.00	**assume flat $ margin for both competitors**
Pre GST price	$ 162.00	$ 150.00	
GST	$ 16.20		
Total Price	$ 178.20	$ 150.00	**19%** **"Price Gap"**

Gross margin* (%Sales pre GST)	31%	33%	Typical retail ranges 20%(electrical) to 60% (specialty apparel)

IF margin % the same for both competitors (add)

Add to Margin	$ 6.00		**assume flat % margin for both competitors**
plus GST cost	$ 0.60		
Total Price	$ 184.80	$ 150.00	**23%** **"Price Gap"**

"Price Gap" - Sensitivity to Tariff costs

	"Price Gap"		
Tariff cost	Fix$Margin	Fix%Margin	**Typical categories**
10%	**19%**	**23%**	Apparel
5%	**15%**	**18%**	General Merchandise
0%	**11%**	**12%**	Electronics

* Margin changes have little effect on "Price Gap"

It is worth noting that varying the % margin has very little effect on the outcome in terms of the Price Gap %. Furthermore it should be noted that both competitors have to transport the product from the source to the customer, arguably one has a more complex route (the domestic competitor via customs, pick and pack domestically and re-shipping) and higher domestic postal costs(not bound by treaty pricing), counterbalanced by potential scale economies for the domestic competitor.

Given the current fluid movement and clearance of delivered items into Australia, it could be argued, under the threshold system that economies of scale may favour the non-domestic competitor. Having said this, the premise of this comparison is that all other items are equal in terms of cost structure, and the recovery of freight from the consumer is equal in both cases.

Conclusion

It is clear that, from just applying the current customs threshold to two identical competitors, (assuming all other aspects of their business's are equal i.e. range, customer service, convenience, information on product etc), the price to a consumer is markedly impacted.

The minimum price difference is 11% up to a maximum of 23%.

If any "comparable" retailer has this type of sustained competitive advantage over another, the later will ultimately fail and go out of business.
The remainder of this Section 2 examines the extent to which this will impact;
(a) Domestic online businesses
(b) Domestic store based retailers
In the later case "comparability" will be a key issue.

2.2 What is the impact on Consumer behaviour?

Given that the current threshold level results in a sustained price difference to a consumer of between 11% (typically electronic goods) and 23% (typically apparel and footwear) for two identical competitors, what impact will this have on spending by consumers with either competitor over time?

The starting point is again to consider this one variable with every other aspect of the competitors business being identical.

To determine the impact of "price" alone on consumer behaviour in the retail environment, this submission draws from over 20 years of global experience and specific, competitively sensitive information. Given the potential leakage of this knowledge most of the following can be tested privately by the Commission but for the sake of this report will be in a general context only.

From the operations of some of the largest retail loyalty programs globally it has been observed that a reward of less than 5% in "perceived" value has minimal switching benefit and is generally done to "hold" sales or to elicit information from customers in order to serve and/or target them better with offers, to which they will respond more favourably and thus fund the programs costs. From 5% to 10% "perceived" value there is quantifiable and significant switching although very few programs can afford to sustain this level of costs on an ongoing basis and so this level of discounting tends to be in transient programs only.

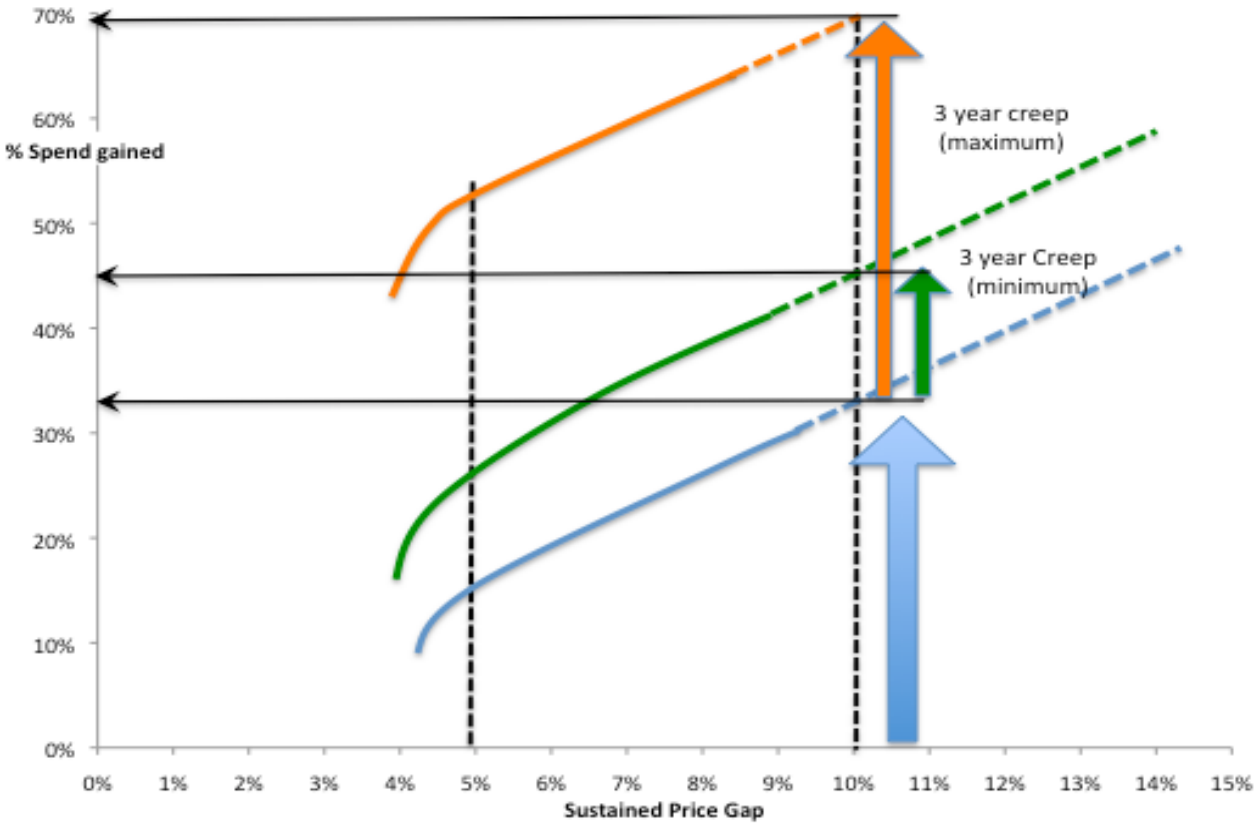
The reason these programs are typically difficult to make profitable is that the offer need to be available to existing loyal customers (otherwise the business runs the risk of alienating them) and therefore substantially reduces profit from the "base spend" of these customers while gaining only marginal profit for their incremental spend.

A related problem with any program is the measurement of outcomes given the variable nature of customers behaviour and the complexity of the decision making process.

The following graph represents the accumulation of data that covers most forms of retail from Department Stores, General Merchandise, Specialty Apparel, Food, Liquor and Private Label Apparel. The consumers that were involved are in the hundreds of thousands and their behaviour has been tracked at least two years prior to any change and over three years after the introduction of discounts. The sample group was over 40,000 for the tracking study; with total data capture assured to a very high level.

Furthermore, during the period of engagement and tracking of customer's behaviour none of the retail formats involved changed their offer in any substantial way. Most of the customers were already shopping in a significant way with the formats prior to the offer of a discount and had a base line of spend from which their increased spend was measured. Historic growth in base line spend was assumed to continue and was subtracted from overall increased spend to isolate the increased spend that resulted from the discounts alone.

<u>Graph 1:</u> Impact of "Price" on Spend



From Graph 1 it can be seen that for a sustained price gap (discount) of 10%, retail customers initially increased spend by 32%. Over a period of three years the same customers increased spend between 47% and 70%.

This illustrates that there is significant movement of customers spend both initially and overtime as price differentials are seen to be real and consistent.

It is interesting to note that the "range" of sustainable price differences, caused by the current import threshold, of 11% to 23%, is outside the range of the observations graphed above.

Critically, there was a significant switching cost to consumers, as they had to go back to the same stores to get the discounts. This is not the case online where switching is just a click away. A recent study[27] conducted in the US on Internet transactions confirms these results; where a 6% sales tax differential led to customers moving 50% of spend immediately.

Without providing specific information in this submission, as to the basis of the above, it could be argued that it is not applicable as the retail environment and basis of competition may have be driven primarily by "Price" and other dimensions were less important in the customers decision making set. While this is not the case, for example the top end of the price gap range represented Department Stores, we should turn our

attention to the consumer drivers of the current online market to answer the applicability of "Price" as a significant factor in consumer's preferences.

The table below is a sample of customer research into online retailing and illustrates consumers' reasons for shopping online.

Table 2: Consumer Reasons for Shopping Online

	UK(1)	Spain(2)	Aust(3)	Aust(4)	Aust(5)	Aust(6)
Price/cost	72%	34%	82%	39%	68%	81%
Convienience	95%	29%	73%	29%	65%	16%
Information	61%	21%	67%			
Range	74%	14%	42%		46%	

1 OFT UK based telephone interviews 1000 and 1000 omnibus surveys-2007
2 Spanish survey 5005 interviews, detailed 380 heavy shoppers used for study of reasons for shopping-2004
3 Aust Survey of 3000 consumers who visit the getprice site (skewed to price hunters)-2011
4 Aust Survey by Frost & Sullivan of 1000 online consumers-2010
5 Sands Ferraro-2010
6 The Australian Institute 2011, 1411 consumers-Primary reason for shopping shown

Surveys 1,2 and 5 allowed multiple selections so the percentage of respondents does not total 100%. Clearly, from this limited sample, "Price" is one of the key drivers and at least one of the top three factors that influence customer's decisions when purchasing online.

2.3 How does this impact Online Retail competition?

Given there is a real and sustainable price gap between Australian online retailers and their international competitors and a key driver of consumer behaviour is "Price" so how does this play out in the Australian market place?

Historically, the penetration of online retail in Australia has lagged the UK and the USA by about five years. Criticism has been levelled at the domestic players on the basis that:

(i) The larger store-based operators are so concerned about protecting their store-based franchises that they have not invested in the online format for fear of cannabalisation.

(ii) There is insufficient "scale" for independent "pure play" operators to establish themselves. "Scale" primarily in purchasing and logistics but access to a full range from international suppliers is also limited for a small domestic online competitor.

(iii) There is little innovative use of new techniques to engage and sell to customers. This includes linkages to new social networking groups, the active use of information both from customers themselves and from supplier sources, new tools for checking shop based offers, use of location identification and mobile browsing/shopping behaviour.

In more recent times the growth appears to be coming from international competitors and not the domestic participants . Our domestic online market now ranks as one of the key targets for online competitors from other countries. For example, of 247 US web based retailers survey recently by "Internet Retailer", Australia was noted as a top-three

overseas market. Given the relatively small size of our market this bears some examination.

While all of the above critisims of the Australian Retail industries online offers are completely valid in terms of the current *outcome* (relatively poor competitive offers). The *reasons* for the current situation may be quite different from those offered.

Consider this, in 2005 when the tax threshold was increased, most online retail markets were relatively embrionic, in the US penetration was approximately 4%, in the UK it was below 3% and in Australia it was below 2%. For the 5 years to 2010, online offers have markedly evolved but what has remained consistent is that "Price" was, and continues to be, a key determinate in the consumers decision making process.

As illustrated in section 2.1 of this submission, even if an Australian online competitor could offer an identical experience to a consumer, and possessed exactly the same cost structure, range of products and informational content, they would still be anywhere from 11% to 23% more expensive.

The Australian competitor has one of two options to pursue, match price and remain commercially inferior to the international competitor, and in most cases not reach investment hurdles for investor either within larger organisation or via the capital markets. Or, leave prices at a higher levels and hope that "other" factors counterbalance the advantage that international competitor have.

It seems that Australian Online participants did a bit of both. They remained relatively uncompetitive on price and did not invest in the business sufficiently to remain comparable in their customer offerings (content, range, innovation etc). What mitigated the loss of domestic customers spend, were "other" factors that disadvantaged the international players. These include a lack of consumers trust in the payment system internationally, lack of trust in the unknow international retailer, expenses and the risk of delays in delivery, warranty and service of goods etc.

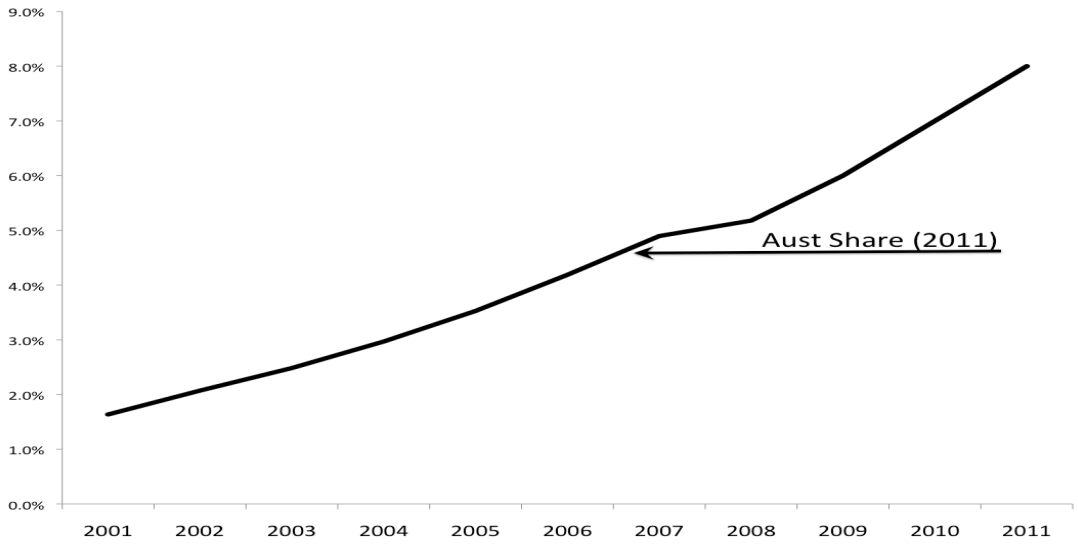
Therefore, in the last 5 years, domestic growth has not matched the international benchmarks (USA and UK). Going forward these "other" factor are becoming minimised. The payment system has been markedly improved with PayPal and other trusted intermederies.

As consumers become familiar with overseas retailers, trust evolves and is reinforced by good service, delivery times (aided by Customs SAC's process for items under the threshold) are very good and delivery costs are often absorbed or partially offset by the retailer (who is potentially re-investing some of the price advantage they have over domestic players).

It is likely that in the next 5 years penetration rates will equalise and, importantly, most of the growth will go to the international participants who have a sustainable competitive advantage on price and have minimised "other" factors that have previously, adversely affected them. Equally, with this as a backdrop, it is very unlikely that domestic online competitors will be able to compete given the lack of development of capabilities in the last 5 years (they have to catch up first) and the entrenched competitive disadvantage they have on price (as a result of a tax/duty impost).

To quantify these impacts in a very broad sense consider the graph and table below

<u>Graph 2:</u> Online Share of Total Retail-US



Source: US Census Bureau (2001-2008); Industry estimates (2008-2011), excluding automotive, food and beverage, gasoline stores, Food Services and Drinking places and Fuel dealers.

<u>Table 3:</u> Online Share of Total Retail- Europe

Source: Centre for Retail Research- http://www.retailresearch.org/onlineretailing.php

As the Australian penetration(5%) lags the US (8%) and the UK(11%) by 5 years, and Europe currently averages 6% it is not unreasonable to assumed that Australian penetration will increase to at least 8% within the next 5 years.

To determine which online competitor shares most in this market we need to revisit the logic previously outlined in Section 2.1 and 2.2. To be opportunistic, assume that the current gap on capabilities is closed quickly and the offer provided by both competitors (international or domestic) is equal, on all relevent dimensions accept price (identical range, information, convienience, service, delivery timeliness etc). For price, assume that the only difference is that caused by the tax threshold (11% to 23%).

How will this affect the outcome in terms of competitors share?
As discussed in section 2.2 a sustained price gap of only 10% resulted in an increase spend of up to 70% over a 3 yr period. Currently the international competitors share of online sales in Australia is about 35%. As the Food online sales are all Australian we should focus only on the Non-Food sector where the international competitors have a share of approximately 43%.

Consistently applying the results discussed in section 2.2 would mean that customers would "switch" their share of non-food spend from domestic to international competitors on the same basis. Namely, the international share of non-food online sales would increase from 43% to 73% (43% plus 70% times 43%). Coupled with the growth of the online market as a share of the total retail (shown above) to 8%, this would result in the following split of the domestic online market between international and domestic competitors.

Table 4: Australian Online Market – Share by competitor

	Estimate	*Forecasts($b)**					5 Yr Growth	
Year	2010	2011	2012	2013	2014	2015	**%pa**	**$b**
Domestic	$6.8	$7.2	$7.5	$7.7	$7.6	$7.3	1.5%	$1
International	$3.6	$5.0	$6.6	$8.6	$10.8	$13.3	29.7%	$10
Total	$10.4	$12.2	$14.2	$16.2	$18.4	$20.6	14.7%	$10

Online share	4.7%	5.3%	6.0%	6.7%	7.3%	8.0%	of total retail
Domestic share	65%	59%	53%	47%	41%	35%	of total online retail

* assumes (1) Total Retail Market grows 3%pa to 2015
(2) Domestic online food of $1.8b(2010) remains 100% domestic and grows at 4%

Table 4 has a relatively conservative estimation of the online market in 2010, where estimates of the total size of the market range from $8b to $19b (see Appendix 2). Similarly, most estimates put the total online share of international players at 40% of total retail, for this submission we have assumed 43% of the Non-Food, with 100% of the Online food being captured domestically, leaving an average share for the international players of only 35%.

As with most detailed analysis, based on a series of assumptions, which are stretched into the future, it is always important to stand back and look at the results and ask, is it possible that this will happen.

Is it possible, that all growth in the Non-Food online retail sector will go predominantly to international competitors? That increased penetration of Total Retail Market domestically, on a consistent basis as other developed countries (up to 8.0%), will go largely to those competitors that have already done this in their own domestic competitive markets? That the result will be a 65% share of the total domestic online market by international offshore competitors, or a 73% share of the non-food online market?

Consider a recent Sydney Morning Herald online survey, shown below. While not scientifically robust this is indicative that the above assertions about the future are potentially well founded by those who count, the shoppers.

It becomes more probable that the trend to overseas online competitors will continue upon examination of online retail execution by competitor. The domestic competitors are markedly trailing the overseas competitors in most aspect of execution. In order to limit the size of this submission a comparison will not be included.

While the ability to buy under the Tax/Duty threshold has certainly been exploited by customers, using overseas online retailers as their partners, this has resulted in lack of investment domestically with capabilities now seriously behind those international competitors. This will only serve to accelerate the trend of share gains (in the online space), even with measures to equally tax competitors, it will be some time before domestic capabilities match those of the international players.

Considering Table 4 above, based on international experience, the online share of Total Retail will most likely increase to 8% by 2015. This share has to come from Domestic Store based retailers.
It is important now to discuss the overlap between Stores and online for two reasons;

(1) What does it mean to Store Base retailers to lose a large share of the markets growth to the online businesses? Given that most of the gains in the online market will go to international competitors (as outlined above) how does this affect the local market/economy (see the next section)?

(2) If the "Price" advantage supplied by the inequities of the tax/duty regime provides the same relative advantage to the international online retailers, versus the domestic Store retailers, is the share of 8% low? Will we see greater penetration overtime as the "other" mitigating consumer concerns (outlined above) regarding online spending overseas evaporate or are largely mitigated?

Taking a very simplistic view of the second item above, if we assume that the online penetration rate is similarly affected by long term price differentials as discussed above and only allowing for those that arise from the impact of the Tax threshold (namely 11%-23% between Store and Online) then we could expect switching of a similar order. That is if the baseline penetration is 8% of sales then this would potentially increase by 70% to 13.6%. While the UK is currently close to 11% using 13.6% would appear aggressive however 12% is probably a reasonable scenario. So, as with Table 4 (for an 8% share), Table 5 illustrates the impact on Domestic retail assuming the total market grows at 3% Food is unaffected and grows at 4%, as does Online-Food.

Table 5: Australian Online Market – Share by competitor

	Estimate	*Forecasts($b)**					5 Yr Growth	
Year	2010	2011	2012	2013	2014	2015	**%pa**	**$b**
Domestic	$6.8	$7.2	$7.5	$7.7	$7.6	$7.3	1.5%	$1
International	$3.6	$6.8	$10.4	$14.4	$18.8	$23.7	45.4%	$20
Total	$10.4	$14.1	$18.0	$22.1	$26.4	$31.0	24.4%	$21

Online share	4.7%	6.1%	7.6%	9.1%	10.5%	12.0%	of total retail
Domestic share	65%	51%	42%	35%	29%	24%	of total online retail

* assumes (1) Total Retail Market grows 3%pa to 2015
(2) Domestic online food of $1.8b(2010) remains 100% domestic and grows at 4%

The resultant total online growth of 24% pa over 5 years may appear high, however the current online growth in Europe, where the current penetration rate is higher (6%-see Table 3), is 20% pa. Additionally, as shown in table 15 (below) inbound parcels growth is 42% for the current year.

We can see from the above analysis that between $10b and $20b of retail sales could move from Non-Food Stores to online competitors, of which most, if not all will go to international online competitors.

2.4 How does this impact Australian Store retailers?

To context the discussion about the Australian Store based retail market, a quick top line review of the market, using ABS statistics as updated to Feb 2011, is required.

Firstly, for this analysis we will exclude Cafés, restaurants and takeaway food, which is generally the accepted way of defining the domestic retail market. The ABS statistics are further broken down into five key areas outlined below.

Table 6: Australian Total Retail Market (ABS)

	Turnover ($b) 2011*
Food & Liquor	$97
Household goods	$43
Clothing, footwear & acc	$19
Dept Stores	$19
Other retailing	$34
	$212

* annual to Feb 2011, excludes online sales

Given that the Food sector is largely insulated from the penetration of Global online retailers for the purposes of this submission the domestic market will be grouped into Food ($97b) and Non-Food ($115). Furthermore, as online retail sales ($10b estimated in 2010, see Appendix 2) are not included in the ABS statistics they must be added to encapsulate the entire retail market, as shown below.

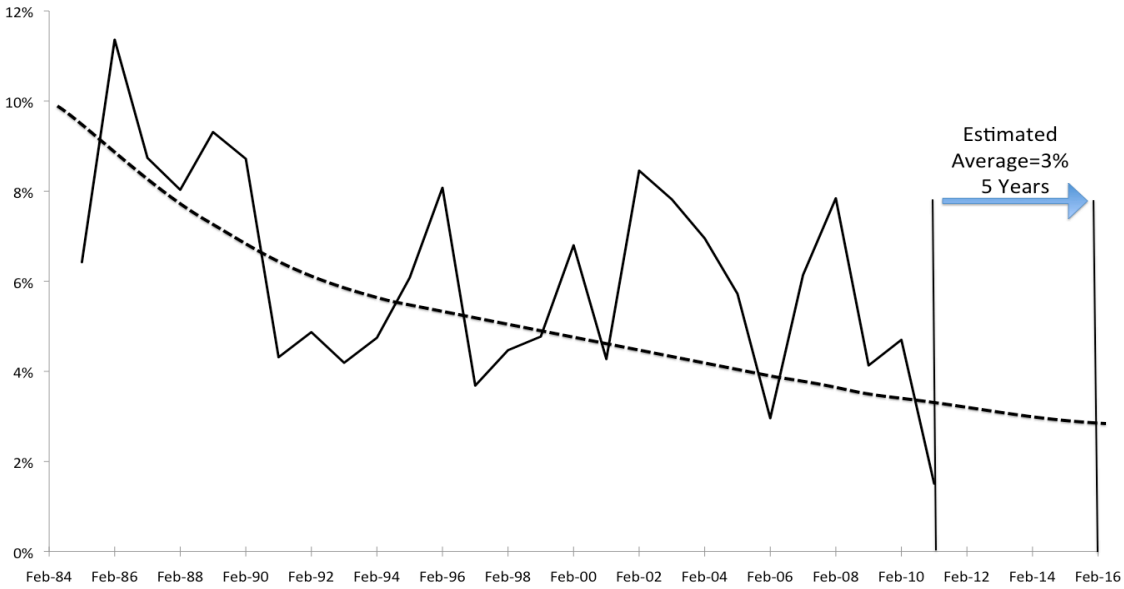
Table 7: Australian Total Retail Market (including Online)

	Turnover ($b) 2011*
Food	$97
Non-Food	$115
Online	$10
	$223

* annual to Feb 2011

The Total Retail Market has shown varying historic levels of growth over the last 26 years on a decreasing trend as shown below.

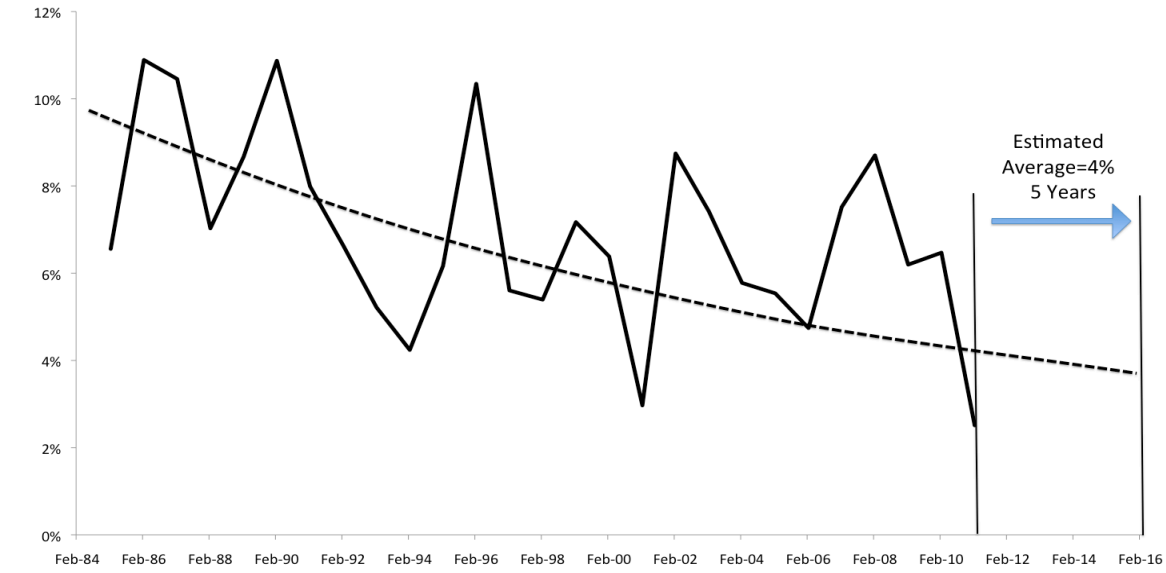
Graph 3: Australian Total Retail Sales Growth (pa)



Source-ABS (excluding Restaurants, Cafes and Takeaway Food)

For the next 5 years, it will be assumed that the Total Market will grow on average by 3% pa consistent with the trend shown above. The Food (& liquor) segment has generally grown at a stronger rate than the average as shown below.

Graph 4: Australian Food & Liquor Sales Growth (pa)

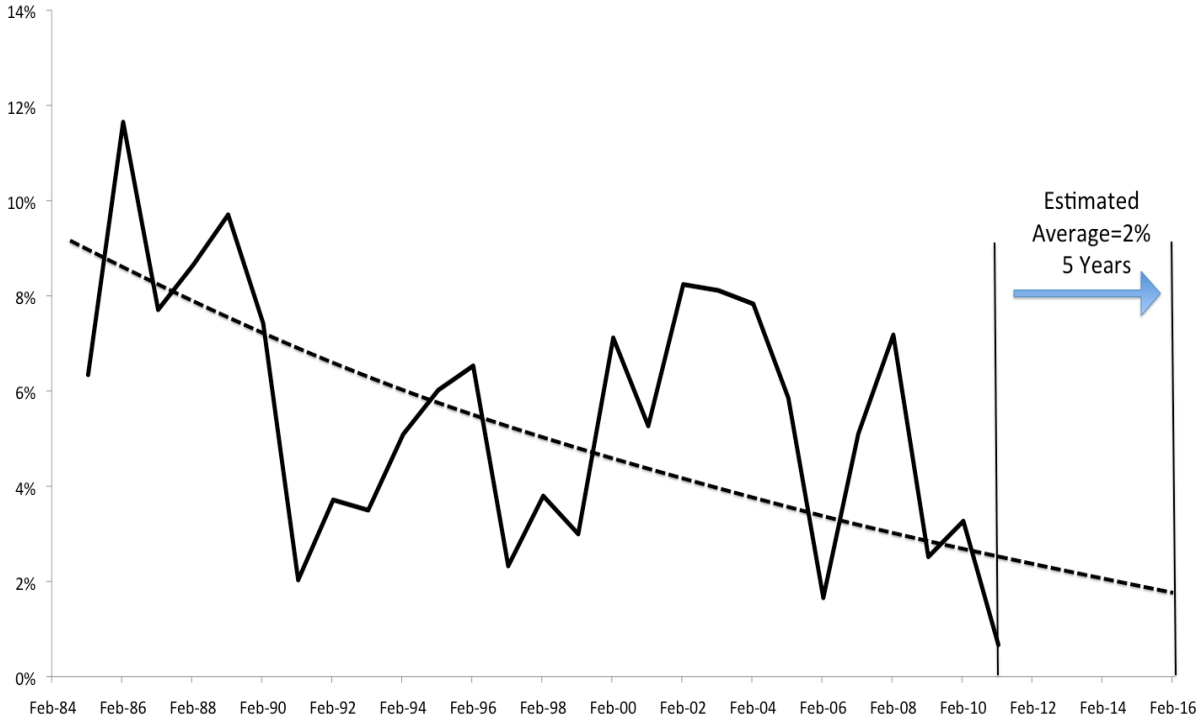


Source-ABS, (excluding Restaurants, Cafes and Takeaway Food)

For the next 5 years it is assumed that this trend will continue and Food will grow at 4% pa consistent with the trend shown above.

The Non-Food segment of the Australian market has traditionally grown at a slower rate than Food and is more varied but is still trending downward on a growth basis, as shown below;

Graph 5: Australian Non-Food Sales Growth (pa)



Source-ABS, excluding Food and Liquor, Restaurants, Cafes and Takeaway Food.

For the next 5 years, if the total market grows at 3%, the Food sector at 4%, and the online sales penetration reaches the international benchmarks, of today, in 5 years time (8% of Total Retail), the Non-Food Store based sector will have minimal growth as shown below.

Table 8: Forecast Australian Total Retail Market by Type

	Estimate	*Forecasts($b)*					5 Yr Growth	
Year	2010	2011	2012	2013	2014	2015	%pa	$b
Food	$97	$101	$105	$109	$113	$118	4.0%	$21
Non-Food	$115	$116	$117	$118	$119	$119	0.7%	$4
Online	$10	$12	$14	$16	$18	$21	14.7%	$10
Total	$223	$229	$236	$243	$250	$258	3.0%	$35
Online share	4.7%	5.3%	6.0%	6.7%	7.3%	8.0%		

The implications are clear, not only will the Australian online retailers not grow, as discussed in the previous sections, but the entire Non-Food sector of the Retail market will have minimal growth. Of the total growth in our domestic market, over the next 5 years, almost 1/3 will go to international online retailers.

The analysis so far, has been based on some fairly straightforward metrics and assumptions namely:

(i) That online purchases will move to represent the same % of retail spend in Australia in the next 5 years, as they currently do in other developed comparable economies (notably the US and UK).

(ii) That the international retailers who have a natural price advantage of 11% to 23% (due to the current import threshold of $1000) and currently exceed the domestic competitors execution capabilities will attract all of the incremental spend online. Prior barriers to using international retailers online, such as security of payment, trust in brands, and delivery speed, which historically provided some protection to domestic businesses, will be diminished or mitigated. The domestic competitors will, at best, retain current levels of turnover.

(iii) That overall retail market will follow the long-term historic trends of diminishing growth and the Food sector will be largely insulated from the overseas online competitors.

(iv) That, given the above, the domestic Non-Food sector will have minimal growth for the next 5 years.

It should be noted that, at this point, we have made no allowance for the impact that this tax/duty distortion has on the movement of trade from Traditional Stores to the online competitors. The levels of 8% online penetration in the US and UK markets occurs where there is relative parity on tax impositions between the two types of retail. This is reflected in the online prices closely following the Store based prices in both countries. This is not the case when a comparison is made with International online prices, which are significantly lower than Australian domestic store prices.

It is therefore probable that, with an added advantage in the Australian domestic market, online retail penetration levels may be higher than the 8% assumed and given that the growth in the overall market is likely to remain consistent with historic trends, and that the Food sector is naturally insulated, the impact on Non-Food could be much greater.

As discussed in Section 2.3 a more probable online penetration rate under current conditions in 5 years would be 12%. So, as with Table 8 (for an 8% share), Table 9 illustrates the impact on Domestic retail assuming the total market grows at 3%, Food is unaffected and grows at 4%, as does Online-Food.

Table 9: Forecast Australian Total Retail Market by Type

	Estimate	*Forecasts($b)*					5 Yr Growth	
Year	2010	2011	2012	2013	2014	2015	**%pa**	**$b**
Food	$97	$101	$105	$109	$113	$118	4.0%	$21
Non-Food	$115	$114	$113	$112	$111	$109	-1.1%	-$6
Online	$10	$14	$18	$22	$26	$31	24.4%	$21
Total	$223	$229	$236	$243	$250	$258	3.0%	$35
Online share	4.7%	6.1%	7.6%	9.1%	10.5%	12.0%		

This consumer led price disparity (between stores and online sites) driven outcome does not consider other competitive factors that might accelerate the use of the online environment such as Global Brand owners sidestepping domestic based distributors, the "dumping" of distressed or obsolete stock in someone else's retail market etc.

Considering only the price disparity driver, shown in Table 9, the net effect is to move another $10b from Non-Food stores to international online retailers (total movement of $20b in 5 years)

2.5 How does this impact the Australian economy?

The latest figures from the ABS showing Total Retail Employment, sales and productivity are shown below;

Table 10: Gross Retail Employment and Productivity 2011

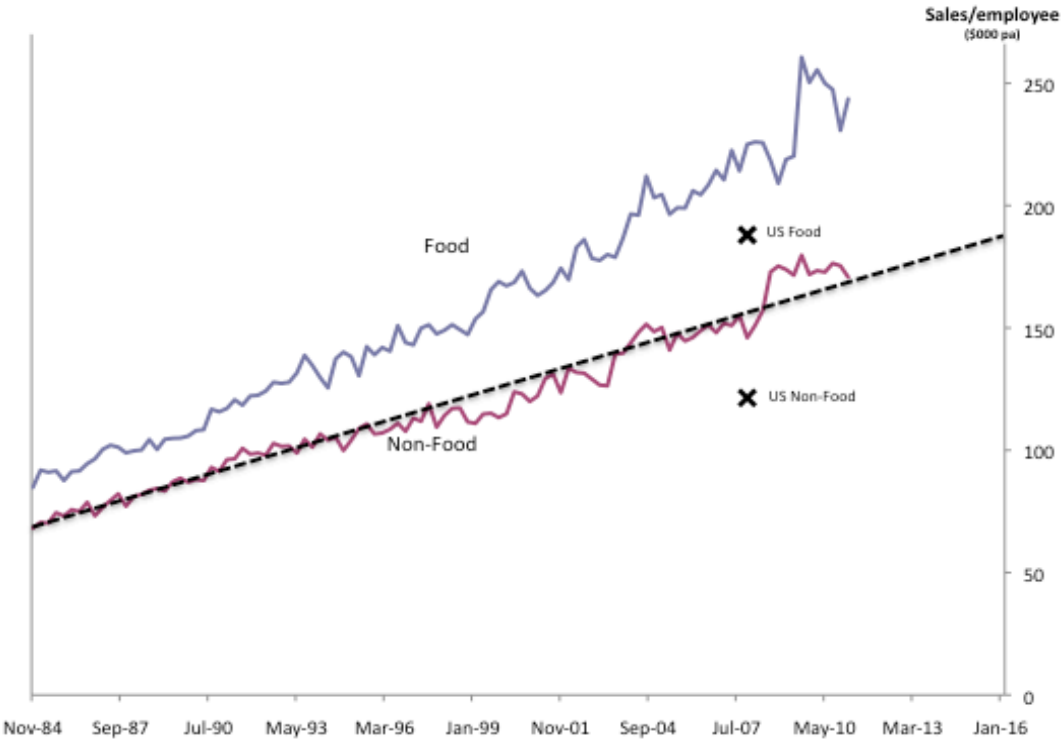
	ABS Feb 2011		
	Employees (000)	Sales* ($b)	Productivity Sale/Employee ($000pa)
Non Food-Stores	670	$114	$170
Food-Stores	399	$97	$243
Trade	41		$0
Non-Store**	15	$7	$495
Total	1124	$218	$194

* excludes Café, Resturants and Takeaway Food

** employement captures Aust online, turnover estimated

From this it can be seen that today for every $10b of sales in the Non-Food retail sector domestically, approximately 59,000 people are employed directly by retailers.
To estimate the reduction in employment within the Non-Food store based sector from not capturing future growth of approximately $10b-$20b annually by 2016 consider the following graph which shows employee productivity pa for the last 26 years.

Graph 6: Retail Sales productivity per employee



Source-ABS retail and employment, US Census Bureau

Assuming that productivity continues to improve per employee on the historic trend line, within 5 years the expected productivity per employee for the Non-Food sector would be approximately $190,000 pa. If $10b pa of future sales are to move out of this sector and into the Online Retail sector (notably to the Overseas Online retail sector), then the impact on employment would be approximately 53,000 jobs.

It could be argued that with a fixed employment base incremental spend (or loss) does not correlate to the same reduction in employement. This has not been the case historically where employement has followed growth in sales as shown by the linear relationship in the Graph 5, where productivity gains, inclusive of inflation in prices, has resulted in a consistent average increase of 3.9%pa for Food and 3.5%pa for Non-Food. Even if this is adjusted for average price inflation over this period, there have been real productivity gains in both sectors.

They also appear better than the same global statistic from US based retailers.
The decrease in direct retail employment should be increased to take into account the flow on effect to othe industries, specifically the supply chain, domestic importers, manufactures and brand owners as well as support industries such the media agencies, catalogue producers etc. This submission will not attempt to quantify these additional job losses, however it is noted that the Retail Industry has the second largest multiplier effect domestically and therefore the total impact could be as much as twice that shown.

With 53,000 jobs moving out of the Non-Food Store base retail network how many jobs will be created in the online businesses. Given that all of the growth is going overseas then very few jobs will be domestically based. For an online operator, the primary labour forces (as with Cataloguers) exists within the consolidation, pick and pack and dispatch operations which form the hub of human activity within the business. The transport and distribution side is relatively high on cost but relatively low on its human resource costs (and employement).

For the overseas online operators most of the employement activity will therefore occur offshore. This will mean that if 53,000 jobs are lost in our domestic Non-Food stores the incremental jobs created in the alternate channel of distribution will largely be offshore.

We should, however, consider the situation where the move to online purchasing is inevitable and that our domestic operators, somehow, are able to retain all of the growth. The job losses from this “theoretical” move should then be subtracted from the above to identify what job impacts the tax threshold has in isolation, adjusted for jobs that would have been lost anyway as we move to a different form of retail structure domestically.

To quantify the “natural” reduction in the employement base as consumers move to online buying the following table illustates the employement structure for a large catalogue operation within australia.

Table 11: Catalogue operations employment productivity

	Domestic Catalogue Operations	
Employment by type	Actual	Ex Call Centre
Pick and Pack	61%	79%
Call Centre	23%	0%
Staff	16%	21%
Total	100%	100%

Sales/employee*	Actual	Ex Call Centre
All employees	$172	$223
Excluding staff	$205	$282
Pick and Pack only	$282	$282

* $000 pa

The reason for using a catalgoue operations domestically to determine the potential online impact on employment is as follows:

(i) It is most appropriate to attempt to emulate the operations of a domestic business of sufficient scale that it demonstrates the expected productivity gains from this new form of retail. As can be seen from the above once the call centre operations are removed the productivity moves from a parity position with traditional store based operations to a much more cost efficient model. Few, if any of the current domestic online operators have such scale.

(ii) In the more developed markets of the USA, UK and Germany, traditional catalogue operations have formed the basis of the new online business models. Specifically, the pick and pack operations have "bolted on" the internet front end and removed the call centre and catalogue distribution components of the business, thus reducing costs markedly, while exploiting the efficiency of the underlying distribution business. Food is one exception where new facilities have to be developed to accommodate perishable merchandise. As we have excluded the Domestic Food operations from this analysis there is no need to consider the cost structure of this component of the online businesses.

From Table 11, it can be seen that a significant part of the traditional catalogue business cost structure and employement base is in the call centre operations. Inclusive of all employment the productivity per employee is not markedly different to that of store based operations. If the call centre is removed (as is the case for an internet based business), productivity improves to around that of a Food Store.

To be conservative we will assume that for a "typical" domestic online operator (with scale, as is the case above) sales productivity per employee is $280 kpa. That is, as sales are moved from Non-Food store, as discussed above, the decrease in employement in stores is at the rate of $190k pa while fewer are employed in the online business because of the increase sales productivity ($280kpa).

Further if we consider the two options for growth of online penetration domestically in the next 5 years, namely an 8% share of retail or a 12% share the net reduction in employement is shown below;

Table 12: Employment reductions from Stores to Online

Onine share	Non-Food Store Loss		Online gain	Net Job
2016	Sales ($b)	Jobs	Jobs	Loss
8.0%	$10	52,632	35,461	**17,171**
12.0%	$20	105,263	70,922	**34,341**

From the above it can be seen that:

(i) If the domestic market were to evolve naturally and the penetration reached 8% in 2016, then 52,623 jobs would be lost in Non-Food Stores, while 35,461 jobs would be created they would all be offshore as discussed in sections 2.1 and 2.2 of this report.

(ii) If the domestic market were to accelerate its online penetration (to 12% in 2016), fuelled by the discrepancy in price between Non-Food based stores and international online competitors, then 105,263 jobs would be lost in Non-Food stores. As above, even though 70,922 jobs have been created they are all going to be offshore.

If it were not for international companies sharing online sales and therefore employment, then this transition from online to stores would only cause a reduction of 17,171 jobs over 5 years on a base of some 1.124m (1.5%).

If we compound the international online competitiveness on Price, into an increased online share and an increased penetration, the reduction in employment domestically rises to potentially 105,263 jobs over 5 years or 9.3% of the retail workforce.

The most likely net effect on employment is then 88,000 jobs lost over 5 years.

Another way to estimate the expected loss over 5 years under "normal" conditions is to assume that the market penetration goes to 8%, and the international share is 20% (similar to other countries).

Table 13: "Normal" incremental employment losses

	Estimate	*Forecasts($b)*				
Year	2010	2011	2012	2013	2014	2015
Total Retail Sales	$223	$229	$236	$243	$250	$258
Online share	4.7%	5.3%	6.0%	6.7%	7.3%	8.0%
Online Sales	$10	$12	$14	$16	$18	$21
Employment(000)						
Store loss*	55	64	75	85	97	109
Online gain**	37	43	50	58	65	73
"Expected" Loss	**18**	**21**	**24**	**28**	**32**	**35**
OS online gain***	13	9	10	12	13	15
Gross Loss	**31**	30	34	39	45	50
Incremental Loss		**-1**	**4**	**9**	**14**	**19**

100% domestic online
20% international share

* based on productivity of $190kpa/ee
** based on productivity of $280kpa/ee
*** based on a 35% share of online currently and 20% share forecast

The results from Table 13, (loss of 19,000 jobs) correspond closely to the estimated "normal" incremental loss of jobs in Table 12 (of 17,171).

Conclusion

It is expected that approximately 90,000 jobs will be "exported" overseas in the next 5 years as a result of providing overseas online retail competitors with a competitive advantage on price of between 11%-23% over domestically based stores and online competitors.

This is a direct result of the current Tax/Duty threshold and represents 7% of the total direct retail employment base and 12% of the Non-Food direct retail employment base.

3.0 The Views of Australian Family Businesses – NRA Survey

In order to validate some our projections around employment and business failure, NRA conducted a survey of a number of niche retail businesses that have been directly exposed to off-shore buying for many years. Around 200 returns have been received and overwhelmingly they argue for a levelling of the playing field and the elimination of the "low value" threshold. The following is an illustration of the views of these retailers:

Apart from having less floor traffic, the customers that do shop in our store are all comparing our prices to online (almost all international) stores. A major part of our range which is affected greatly are the small, high turnover items that people would normally purchase as add on sales are now being purchased at really cheap prices from overseas without having to even step foot into an retail outlet. Also more people are now more confident with online security than a few years ago. People who once said they would never trust an online site are now happy to give it a try because they have friends who have succeeded with online shopping. This number will continue to grow. Australian retailers need to be able to compete with international retail pricing, especially with our dollar being equal to the U.S.D. This will never happen when people can avoid G.S.T and import duty if they import items themselves.

Our sales have gone down so much that in 2 years when our lease is due to be renewed we will be closing our business unless sales improve. On a Saturday in our shop the normal sales were $4000 to $5000. Now we are lucky to make $2500. We used to have a continual flow of customers on a Saturday and Thursday and now we can go for a couple of hours without seeing a customer. When we ask certain customers where they purchased a certain tee shirt they are wearing they say "online from USA"...

If we could build the business and get back all the items I quote on and all the customers who come into the store to try on items like boots and amour just to size them up for on-line purchasing, then I would manage to put on a full time employee.

Certain USA shops are giving oz customers wholesale prices on everything in what we can only assume is an attempt to force us out of business so they can have Australia as well as the USA all to themselves. What they are doing is being very strict who they sell at wholesale prices to in the USA but in Australia they will sell at wholesale prices to anybody who asks, all they have to say is that they are setting up an online business and they will get wholesale prices from then on.

On a daily basis we are confronted with people price comparing from on line shopping. We still have to give these people service, knowing they not going to buy from us. Trying helmets and clothing for size, and then buying online. Again we still have to pay staff to serve these people for no sales.

3.1 Proportion of Product Imported

The key characteristics of retailers responding to the survey were:

- The great majority of products sold are imported - 80% of survey respondents imported more than 90% of their product.
- Most of the imports are "branded" products
- Most of the items sold were retailing at a price below $1,000

In other words, these Australian retailers are selling the same product to the same consumer as the foreign retailer – but under current government policy the Australian retailer must add the cost of GST, duty, and customs fees – resulting in a price differential ranging from between 11% and 23%

3.2 Impact of On-Line Shopping from Foreign Websites

Respondents were asked if sales have been negatively impacted by overseas products sourced on-line.

- 96% of retailers responding believe that the continued operation of the threshold has negatively impacted turnover, growth and employment.

3.3 How long has the Threshold been Undermining Australian Family Businesses

Contrary to speculation that the tax-free threshold has only impacted since the Australian dollar reached parity with the US dollar; many businesses report that the uneven playing field has been negatively affecting their businesses for at least three years. Additionally all respondents report the negative impact of the threshold has been rapidly increasing over recent years and expect it to further increase. 46% of respondents said that the negative impact extended over a period of 3 years

3.4 The Proportion of Sales Lost to Foreign Retailers

All respondents reported that the GST loophole had seriously affected sales. Respondents provided the following estimates of sales lost to foreign competitors as a result of the tax-free threshold:

- 12% of retailers estimated the loss of sales at more than 50% of total retail turnover;
- 19% of retailers estimated the loss of sales at more than 30% and less than 50% of total retail turnover;
- 26% of retailers estimated the loss of sales at more than 20% and less than 30% of total retail turnover;
- 18% of retailers estimated the loss of sales at more than 10% but less than 20% of total retail turnover.

3.5 Estimate of Cost to Retail Sector of the Tax Free Threshold:

76 retailers provided dollar estimates of sales lost as a result of the GST exemption – of these:

- 54% of retailers estimated that sales lost amounted to more than $100,000 per annum
- 20% of retailers estimated that sales lost amounted to between $50,000 and $100,000 per annum

It is estimated that the 200 survey respondents are losing $12Million dollars per annum to foreign retailers.

3.6 Impact of Tax Free Threshold on Employment

The great majority of respondents reported that employment has contracted as a result of the threshold and the competition from cheaper low-value imports. If the survey returns are representative of particular sectors of retail we estimate that the threshold has already cost over 2,000 jobs in these particular sectors alone. On average each survey respondent has shed between 1 to 2 jobs, which they attribute to the tax-free threshold.

NRA also notes the submission of Link International. Many retailers supplied by Link completed our survey.

3.7 Submission from Link International Pty Ltd

The survey results have given a clear indication to us that the biggest problem facing our industry at the moment is the attack by overseas websites, directly aimed at the Australian consumer, exploiting the GST import duty loophole. Our surveys indicate that our dealer base is losing somewhere between 10 and 20% of their total retail sales which is beginning to have an enormous affect on the profitability of their businesses and a large number of our customers have started to retrench staff in an attempt to put their businesses back into a profitable position. Unfortunately, a lot of the smaller mum and dad shops (family run businesses), that had no staff and low overheads to begin with just simply cannot compete and are closing their doors.

Since March of this year, we have received a record number of delinquent trading accounts and a record number of businesses going into receivership. We believe this is a direct result of the massive increase in overseas online ordering from the Australian consumers. We as a wholesaler are trying our best to support our dealer network by reducing our wholesale pricing and RRP pricing as quickly as we can to enable our dealers to compete online, but unfortunately there is a long time lag because, in some cases, we are carrying 12 months inventory in our warehouse, so that retail prices cannot drop as quickly as they need to. Unfortunately, because of our higher cost structure, from a wholesale point of view, and our dealers' higher costs, it is virtually impossible to get our pricing down to the level that our US competitors RRP's are currently at.

3.8 Other Comments

- Cameron Pullman from Greys Online said at a recent on-line forum "*I mean some of the challenges with Australia is that the obvious one is we've got 22 million people. And whilst the internet has a lot of efficiencies, it's actually very expensive to run, so you've got a lot of, whilst you may not have shops, you've got a lot of warehouses, you've got a lot of people in customer service, you've got a mile of people in IT. There's a whole lot of costs that come out and so in America you can be a specialist selling sandshoes and there's population enough. In Australia you have to sell a lot of stuff to be able to cover that large infrastructure, so it is a challenge.*

  [On Line Retail Forum: Sydney: 18 February 2011]

- Robbie Lewis from Wholesale Diving Supplies says in a submission to this Productivity Commission Inquiry that " *Early in our trading history we recognised and forecast a trend by consumers to move from bricks and mortar retailing to the convenience of online shopping. As a result of this, we have invested more than $M1 in building our online presence to capitalise on this growing trend and have been very successful in our venture. However we are increasingly under pressure from low cost foreign competitors .....*

  [Productivity Commission Submission: May 2011]

4.0 What are the impediments for equity in Tax/Customs policy?

4.1 Cost of Processing.

Historically, the main impediment for not reducing the threshold, notably in the last review[14] in Feb of 2010, centred on the inability for the government to break even on the cost of processing and the amount of tax and duty collected (De Minimis).

Customs supposedly works on a cost recovery basis for its charging, therefore the initiall assumption should be that this fairly reflects the current cost to process incoming documents.

This charge is currently $40.20 (increased from $30.10 in 2006) for an electronically lodged Air and Post declaration document. While there are higher charges for non-electronic lodgements, of which there are very few and for entry by Sea ($50.00) this avenue of entry is rarely if ever used under the $1000 item threshold.

If this charge does fairly reflect the costs to customs for document management then the breakeven threshold will depend not only on the GST collected but also the duty collected on the following basis

Table 14: Breakeven Threshold for Customs cost recovery-Current

Duty Rate	Breakeven Threshold	Mix (est)
0%	$402	15%
5%	$268	50%
10%	$201	35%
Average	**$265**	

From this it can be seen that on the current process and charging method a neutral position for the Customs/government would be a threshold of beween $200 and $400, the average of $265 is based on a mix that currently cannot be estimated with any degree of accuracy.

The current cost recovery basis was set on the current importation documents lodged of 3-4m pa, a reduction in the threshold could increase this number to 10m pa, assuming that only half of the current number that come under the threshold (approximately 10mpa Self assessed clearance documents including postal) qualify for document lodgement.

Given this, one would expect that the efficiency of managing these documents would increase and the real costs decrease. Furthermore, an increased revenue to the customs/duty of approximately $200mpa for processing should yeild some investment in efficiencies. Additionally, one would have to question the current cost of processing an electronic document at $40, while there is limited information on this issue it seems that NZ customs[29] can do the same task for half the cost. Clearly, transparency of costs and processes within customs and exploration of alternative processes would deem the above analysis pointless, accept that it has been the basis of prior submissions.

Other reasons for not reducing the Threshold historically are dealt with in Appendix 1 as they have little validity once examined in any detail.

If the tax threshold was lowered to $200 would this then capture sufficient transactions to reduce the negative impact on employment discussed in this submission?
The table below has been constructed from the most recent data provided by Customs on the profile of inbound air cargo(focused on Self Assessed Clearance-SAC's).

Table 15: Profile of Inbound airfreight parcels

Air Cargo- Customs					9 months				
Value		Jul08-Jun09	July09-June10		July10-Mar11			Jul10-Jun11	Growth
		Number	Number	Declared	Number	Declared	Avg	Estimated***	pa
Low	high			Value		Value	Value	Value	
$0	$100		5,819,109	$ 103,367,711	5,158,452	$117,858,716	$ 23	$ 157,144,955	52%
$101	$200		820,159	$ 116,533,459	972,898	$140,772,573	$145	$ 187,696,764	61%
$201	$300		409,585	$ 100,793,229	457,798	$112,258,108	$245	$ 149,677,477	48%
$301	$400		258,597	$ 89,594,124	267,200	$ 92,826,344	$347	$ 123,768,459	38%
$401	$500		182,895	$ 82,452,436	193,241	$ 86,878,624	$450	$ 115,838,165	40%
$501	$600		145,588	$ 80,173,743	145,619	$ 79,815,698	$548	$ 106,420,931	33%
$601	$700		116,575	$ 75,656,823	112,601	$ 73,073,912	$649	$ 97,431,883	29%
$701	$800		99,090	$ 74,363,667	99,108	$ 74,352,899	$750	$ 99,137,199	33%
$801	$900		94,922	$ 80,926,612	95,128	$ 81,177,804	$853	$ 108,237,072	34%
$901	$1,000		74,045	$ 70,274,649	77,540	$ 73,478,744	$948	$ 97,971,659	39%
SAC's*		6,758,383	8,020,565	$ 874,136,453	7,579,585	$932,493,422	$123	$ 1,243,324,563	42%
International mail**			36,000,000				$50	$ 2,340,000,000	30%
Declared		3,018,983	3,207,591				***Total***	**$ 3,583,324,563**	

*Excludes international mail, sea cargo and air cargo reported under the Special Reporter Scheme
**average value and growth estimated only
*** by mulitplying 9 month data by 12/9

This table illustrates, at a growth rate of 42%, the extraordinary increases in volumes through this Tax/Duty loophole.
It is important to note that the most critical estimate in this table is the average value of International mail parcels (shaded) which is not know with any degree of accuracy and importantly, given the total size, no information is available on the $ profile (as shown for SAC's).
Needless to say, the above table illustrates that significant transactions will still escape being taxed equitably if the level is set at $200, i.e. on current charges from Customs for electronic lodgement of a document for each parcel.

It is clear that the most cost effective way to manage inbound tax/duty collection is not to lodge an electronic clearance document for each transaction. This process has been designed for larger transactions ($ value) and is not appropriate or efficient for this new flow of small items into the country. Furthermore, it adds costs to the system and unnecessarily increases timeframes and therefore effectiveness, which should not be the outcome of any monitoring/compliance system.

Conclusion.
Using the current costs of processing within customs to justify a tax anomaly of this magnitude without a comprehensive review of actual costs and alternative processes (see Section 5- International Benchmarks) is irresponsible and economically naive.
The policy should be that GST is payable on all items sold in Australia and that Duty is payable irrespective of the size of the transaction. This is the case for the millions of transactions that go through retailer's tills every year and as described above is the case for Australian based online retailers. To exclude overseas online retailers will lead to a significant downside within the domestic economy and this decision should not be predicated on what limited information is available on alternate "processing" costs.

4.2 Current Dysfunctional Tax and Policy Settings

NRA believes that the exponential growth of offshore low value purchases provokes an urgent need to address what is fast becoming a bizarre and dysfunctional tax and customs regime.

- We have a consumption tax – the GST – which in its design was clearly intended to apply to imports – yet we exempt potentially 10% of total retail trade from the application of this tax. Already the Australia Treasury has estimated the cost of the exemption at $460M per annum rising to over $600M per annum in three years time.

- This loophole then has the potential to undermine the effective operation of the GST and inevitably increase the pressure to increase the level of the GST. Beyond this, apart from contributing to a significant weakening of Australia's retail sector, it is depriving the states of substantial amounts of GST revenue, which will support the delivery of public infrastructure and public services.

- We have a system of tariffs designed to protect Australian industry and Australian jobs (10% for apparel). Notwithstanding this, having put this system in place, we then undermine it by declining to impose the tariff on imported goods below $1,000 in value.

- We have a regime of customs clearance fees and charges. Yet we are waiving the imposition of these charges on a massive number of imported items. This has created very substantial levels of cross subsidization as mainstream importers, including retailers and suppliers to the retail sector, pay higher costs and charges to fund clearance activities associated with low value imports.
  For example, an NRA member has listed costs associated with a small shipment of goods valued at $8000, which attracted the following charges:

  Freight - $579
  Port charges & LCL unpacking - $220
  Destination delivery order fee - $62
  Destination cargo automation fee - $25
  Destination – CMR fee – $27.50
  Destination shipping line documentation fee - $35
  Port infrastructure fee - $7.75
  AQIS –packing declaration assessment - $ 40
  Destination delivery cartage - $125
  Delivery fuel surcharge - $11.25
  Customs agency fees - $165
  Duty where relevant
  GST (applied to the customs value)

  While some of these costs would not appropriately be passed on to a consumer/importer, a reasonable case can be made out that, in the event that a consumer elects to avoid normal domestic channels and chooses to import products, such consumer should be required to meet some of the costs, particularly customs costs, associated with the importation of product into Australia (in addition to GST and duty).

Some suggest that a consumer contribution to customs costs could be made by the imposition of a simple fee, say $5, on all small consignments entering the country by air cargo or international post. The fee would be collected by the express carrier or Australia Post.

- The Australian Govt is investing $50Billion in the National Broadband Network. Yet for Australia's retail sector we have a customs and tax regime that actively discourages the establishment of domestic on-line retailing channels. Many small to medium retailers have informed NRA that, for so long as they are forced to price their product 12% to 23% higher than foreign on line retailers, they cannot justify the investment in an on-line facility. The cost of the establishment and maintenance of an on-line facility is considerable and is illustrated by reference to information provided by Greys Online and Wholesale Diving Supplies.

- **Alcohol and Tobacco Product Processing**
  It is noted that alcohol and tobacco products do not enjoy the same exemption from GST, duty and customs fees as other products.
  Procedures regulate the collection of GST, duty and customs fees. These procedures, extracted from ACBP's website, are set out below:
  "If the goods you imported are tobacco and/or alcohol products with a value of A$1,000 or less, you will be sent a tax invoice by Customs and Border Protection. The information sent to you will provide payment advice, follow those directions carefully. Once payment is received from you, Customs and Border Protection will advise Australia Post to deliver your goods. If the goods have a value of more than A$1,000 then you must lodge an import declaration if you want the goods delivered to you. If you prefer <u>not</u> to pay the duty and GST and you want the goods returned to sender, you should contact Australia Post on 13 13 18."
  [Australian Customs and Border Protection Website]

  While the scale is different, ACBP already have well-established procedures in place regulating the collection of GST, duty and fees on imported goods in circumstances where a threshold does not apply.

- **Australian Consumer Law**
  While in theory Australian Consumer Law may apply to non-resident suppliers of products into Australia, the practical view is that the ACL is unlikely to be enforced in the event that non-residents breach the ACL.
  In this regard we note the supply of non-compliant product direct to Australian consumers particularly where the product falls below the low value threshold and no formal entry is required.
  Our members advise us that motorbike and bicycle parts, helmets, and non-compatible power devices, are examples of product being imported directly by consumers which is not subject to customs scrutiny and which does not comply with Australian standards.
  There are also examples of non-conforming electrical and electronic product being imported directly by consumers. In this regard the Australian Communications and Media Authority is responsible for ensuring that electrical and electronic products sold in Australia comply with Australian Standards are marked with the *C-Tick* mark or the *A-Tick* mark designating compliance.

Suppliers must ensure that products comply with the relevant Standard and must observe rigorous (and costly) testing procedures to validate that the product is compliant.
NRA recommends that ACMA and other regulators should, in conjunction with Customs, develop procedures ensuring that Australian consumers cannot directly import non-complying product. Customs should ensure that all consignments are accompanied by documentation, which discloses details of the product, or products and where non-compliance with Australian Standards is possible, customs should prevent the release of the goods until such time as steps are taken to make the products conform.
We note that the ACCC recently conducted a "national product safety surveillance operation" targeting bicycle suppliers and retailers.

Many small businesses have suggested that the ACCC might also extend its resources to ensuring that consumers are not directly importing non-compliant product into the country.

- We support the ACCC work in communicating to consumers the dangers associated with the importation of unassembled bikes, but we encourage the ACCC to also consider how it might prohibit the direct importation by consumers of non-compliant product. The ACCC also demonstrates some naiveté in encouraging consumers to take "an unassembled bike to a bicycle mechanic to ensure it's assembled according to the manufacturer's instructions and in safe working order".
- Given the rate at which the businesses of bicycle retailers are being destroyed by the tax and customs loophole, it is unlikely that retailers will have staff available for the purpose suggested by the ACCC, or that retailers will be interested in assisting consumers who are directly importing bikes in preference to supporting their local businesses.

- **Compliance with Current Customs and Tax Regime**
  Anecdotal evidence suggests that, despite Customs recent findings about its own performance, there may be significant levels of non-compliance, in terms of the enforcement of the low value threshold.
  Questions have also been raised about the effectiveness of the ATO's compliance efforts in terms of the requirement that non-resident suppliers must register for GST if they supply more than 75K of product into Australia (for consumption in Australia). As best as we can understand it, the ATO has made little effort to enforce the law in this regard.

  However, in the context of this Inquiry, we regard the issue as relatively peripheral. The major consideration does not go to the effectiveness of the current compliance regime, but to the effectiveness of the compliance effort after the playing field has been levelled

• 4.3 Historical Considerations

Only limited information appears to be available tracking the circumstances and disclosing the underpinning rationale for the low value threshold and the subsequent increases to the value of the threshold.

An early consideration of some of the issues occurred in 1998 when a Joint Parliamentary Committee considered the subject: "Internet Commerce: to buy or not to buy?" The Committee did not recommend any increase in the customs duty and sales tax free limit of $50 nor of the low value threshold, which remained at $250 (the GST was not introduced until July 1, 2000).

We are not aware of any retailer participation in this Inquiry.

4.3.1 2005 "Review"

The 2005 "review" increased the threshold to $1,000 for all consignments. Previously the threshold was $250 except for postal items. To the best of our knowledge, retailers were not consulted about any proposal to raise the threshold nor were they invited to express a view or present a submission.

It is noted that in its submission to the 2009 Board of Taxation Review the Customs Brokers and Forwarders Association (CBFCA) drew attention to a "lack of transparency" in the 2005 "review" in the following terms:

"The CBFCA would suggest that those deliberations and outcomes failed to address the impact of the Internet and as to offshore purchases and the continuing impact on revenue leakage and competitive neutrality.

The CBFCA has always held a strong view of the decision taken by the ACBP (presumed on the basis of discussions with the Department of Finance) to vary the customs duty and GST import transaction value to $1,000. The CBFCA position was, and is, that this was not appropriate for a variety of sound border security, compliance, economic and social reasons (which the CBFCA referenced to ACBP prior to the introduction of the new threshold at the cutover to the Customs Integrated Cargo Systems Import Declaration process on 12 October 2005.

The CBFCA could not, and still cannot, see any compelling reason for the transaction value threshold change in that Australia was not conforming to other economies best practice in customs processes. In fact the Australian de minimis level is at a difference with all other developed economies' custom administration."

".....On the introduction of the $1,000 customs value threshold on 12 October 2005 no substantive information or empirical evidence was provided by the ACBP by way of discussion papers and or any other formal discussion process with all the industry.

The CBFCA's perspective is that the decision of 12 October 2005 lacked transparency and as such a most appropriate outcome would be for a comprehensive review of that decision and as to the aspects of revenue leakage, competitive neutrality, tax equity and cross subsidisation in cost recovery."

[CBFCA Submission to 2010 Board of Taxation Review]

4.3.2 2010 "Board of Taxation Report"

As with previous reviews of the de minimis, this review was conducted with little or no input from the retail sector. Three or four small retail associations submitted an email to the Board of Taxation, but there was no substantive input from the retail sector.
A review of the list of those who made submissions is informative:

Review of the Application of GST to Cross-Border Transactions Submissions

Title	PDF
Australian Booksellers Association	353KB
Australian Financial Markets Association	1.6MB
Australian Music Association	74KB
Australian Sporting Goods Association	29KB
Australian Toy Association	39KB
Conference of Asia Pacific Express Carriers / PricewaterhouseCoopers	2.7MB
Corporate Tax Association	160KB
Customs Agency Services	2.4MB
Customs Brokers & Forwarders Council of Australia	1.1MB
Hawker Pacific	141KB
Institute of Charted Accountants of Australia	284KB
KPMG	40KB
PricewaterhouseCoopers	3.7MB
Taxation Institute of Australia	94KB
VATit / PricewaterhouseCoopers	2.4MB

It is submitted that there is nothing in the Commissions Terms of Reference that obliges it to slavishly follow the status quo or the outcomes of historical reviews related to the low value threshold.
To the extent that the Commission is obliged however to have regard to current policy and practice, we submit that it is also appropriate for the Commission to inquire objectively into the rationale that has underpinned the establishment of the threshold and reviews of the level of the threshold, and importantly to calibrate these underpinning facts and circumstances with the world as it is today, and will be into the immediate future.

It is NRA's opinion that the Productivity Commission should be very reluctant to adopt the findings of the 2005 review and the 2010 Board of Taxation Report without first satisfying itself that these reviews were comprehensive in nature, took into account all the relevant facts and factors, made findings based on evidence, and were fully apprised of the changed circumstances associated with on-line shopping.

In NRA's view it is reasonably clear that both the 2005 and 2010 reviews were limited in their scope and excluded any reasonable examination of the impact of the threshold on the retail sector.

Additionally, despite the finding by the Board of Taxation in 2010 that "it is not administratively feasible to bring .....low value goods into the GST system", there was only limited information before the Board justifying a conclusion that the collection of the tax was not administratively feasible.
On our reading of the material CAPEC was the only organisation that addressed the "convenience" argument, but it appears reasonably clear that in so doing CAPEC had not prepared any estimates of GST foregone. In our view the "convenience" argument cannot be run in isolation. It must be evaluated in the context of a measurement of GST (and duty and customs fees) forgone.

Given that neither CAPEC nor the Board of Taxation were prepared to estimate the revenue losses, the findings around "convenience" may not be sustainable.

By way of example, in its email submission to the Board, the Sporting Goods Association alluded to an earlier ATO estimate that the GST foregone (as a result of the threshold) for the 2008-2009 financial year would be in the order of $8M. If this information is correct, then the "convenience" argument must be re-assessed in the context of revenue foregone, on our estimate, in the order of $500M per annum.

NRA submits that it is an appropriate response to the terms of reference set for the Productivity Commission to form an objective estimate about the cost of the GST exemption for low value imports, and also form an objective estimate about the amount of duty and customs fees lost under the current regime.

NRA asserts that it is now time to revisit the 2005 and 2010 findings and to start *de novo* with a consideration of whether the low value threshold is justified and to examine the need and justification for the elimination of the threshold.

It is obviously an important part of this process that the relevant government agencies disclose the facts, information and analysis that underpinned the determination of the de minimis in the first instance, and subsequently in terms of the change in the threshold in 2005 and the Board of Taxation decision in 2010.

5.0 International Benchmarks on Customs, Tax and Duty

5.1 The UK Government Acts

A comprehensive review of the UK approach to the control of low value imports is set out in the attached House of Commons Library Paper.

By way of short summary:

- Low Value Consignment Relief (LVCR), an EU directive, was introduced in 1983 and enabled goods below the value of £18 to be imported VAT-free from all destinations outside of the EU with the aim of reducing administrative costs disproportionate to collecting small amounts of VAT.

- In the 2006 budget, the Labour government declared that: *"In 1984, a VAT-free threshold on imports of small commercial consignments from outside the EU was introduced at a level of £18, as an administrative relief. The Government is aware that this provision is currently being exploited….If the relief continues to be exploited by businesses using offshore locations, the Government will consider changes to prevent this type of behaviour"*

- In its 2011 Budget announcements the UK Government has made two important changes:

  (i) It has acted to close a long-standing VAT loophole, which enables traders on the Channel Islands to import low-value goods into the UK VAT free. Whilst a part Britain, the Channel Islands is not part of the EU and therefore not subject to VAT. This meant that local online retailers can sell to UK, or other European countries, without charging VAT provided the value of each despatch stays below a GBP 18 threshold. Over the past few years, many large traders, including Amazon, Asda and Tesco, have set up distribution operations in the Channel Islands to take advantage of this loophole. The closure of this VAT loophole is expected to raise over GBP 130 million per annum for the UK.

  (ii) The level at which LVCR applies will be reduced by the Finance Bill 2011. As of 1 November 2011, the current threshold of £18 will be reduced to £15, below which goods imported from outside the EU will be VAT-free. In addition, the Government intends to consult with the European Commission to reduce the scope of LVCR further and discuss the feasibility of derogating from current EU legislation requirements. In the event that discussions with the European Commission become ineffectual, the Government will revisit the LVCR threshold in the 2012 Budget and further reduce the LVCR threshold. The reduction of the threshold will deliver an additional £10M in revenue each year for the UK.

Further it is understood that the LVCR reduction from £18 to £15 should be considered a preliminary step, and that the UK Government is actively considering further reductions including a consideration of whether it should eliminate the LVCR altogether for certain goods.

In simple terms the UK Government views the threat of low value imports to domestic industry so seriously that it considers a reduction of $A6 a significant policy measure and it values the consequential increase in revenues by 10M per annum.

In Australia, the threshold is set at $A1000 and the Australian Treasury estimates that if the threshold were eliminated, GST revenue gained is estimated at $A460M per annum.

The contrast in policy formulation or decision-making could not be more stark.

In the UK and Europe, Governments' are moving decisively to protect domestic operators, jobs, and the economy. In Australia, government policy is currently characterised by a failure to act while local retailers endure the extraordinary and punitive impacts of the threshold which is progressively destroying Australian businesses and Australian jobs and fostering the growth of foreign retailers.

As a side note, it is worth mentioning that an online internet retailer in the UK is required to pay VAT for imported goods but can claim this amount back if the product is exported, as would be the case to Australian consumers. In this way UK based internet retailers have a tax free status as it relates to sales in Australia, a benefit they do not gain in their own domestic marketplace, courtesy of the Australian Governments taxation policy.

5.2 New Zealand

The NZ Customs Service conducted a review (Issues paper included as well as NZ employers federation submission) of the de minimis applying to imported goods earlier this year. However the review did not result in any change to the de minimis.

- The issues paper released in conjunction with the review noted that:
  The concept of de minimis in international customs practice is that the assessment and collection of tariff duty and other taxes on goods crossing the border should not be required for negligible amounts of tax revenue.

- The amount of duty below which the duty need not be collected on goods imported into New Zealand is currently $NZ60. The low value threshold is set at $NZ399 if only GST is to be levied. If GST and duty is to be levied the de minimis is applied at a lower consignment value. This is an important consideration because it can lower the notional low value threshold significantly. For example a pair of shoes imported at a customs value of $NZ220 attracts both duty of $NZ22 and GST of $NZ40.50. The combined value of duty and tax is $62.50, which is above the de minimis. Therefore in this instance, the low value threshold becomes $220NZ NOT $NZ399. For the purposes of comparison with Australia's threshold, $NZ220 = $A168, highlighting the disparity between the tax and customs regimes applying in NZ and Australia.

- The issues paper notes that for international parcels post, the Customs cost of processing an entry are $NZ24.20 on average. The same average cost applies to an entry generated out of the express airfreight sector. Customs concedes, "that on the surface...the de minimis could be lowered for international mail".

- The issue paper states that for NZ, if the low value threshold were to be increased to $NZ1000, it is estimated that $NZ24Million in taxation revenue would be foregone.

The NZ Retailers Association submission[31] to the review included the following recommendations:

- Set the "de minimis" threshold at zero
- Undertake an accurate scoping exercise to quantify the real value of lost GST & duty
- Investigate the collection models used by Canada and the UK

The NZ Retailers Association also put forward a number of options for collection of the GST and duty:

- The tax can be collected by the courier on delivery
- Rather than holding up the clearance of goods (and the cost that this incurs) it might be possible to release the goods immediately but send an invoice to the addressee for the GST
- For goods coming in through the national mail centre the option might be to have these forwarded to the nearest Post Office and the recipient could pick up from there on the payment of the appropriate GST / Duty. This is similar to the British system. This would require a card going out to the recipient to advise them of the parcel's arrival.
- The majority of transactions will be paid for by credit card (or a scheme debit card). We have thoroughly investigated the steps that the payment process goes through and believe that it may be possible to include the tax collection as part of this process. The collection process can only be done through the New Zealand bank that issued the card.

5.3 United States

The US does not apply a goods and services tax or value added tax, but sales tax is applied in most US states.
The current matter of controversy in the US is the restriction on the states in respect to attempts to collect sales tax on Internet purchases. The restriction arises from an old Supreme Court ruling (long before the Internet was on anybody's radar) to the effect that states couldn't require that retailers without a physical presence in a state, like mail-order companies, charge sales tax on their behalf.
In recent years, states have tried to find ways around that ruling. For example, the State of Texas has argued that an Amazon.com distribution centre in Dallas counted as a physical presence and sent the retailer a past-due sale tax bill for $269 million. Amazon responded by shutting down the distribution centre citing what they referred to as an "unfavourable regulatory climate."
However a few states, including New York, have established laws requiring online retailers to charge sales tax.
Research has been conducted in the US for the purpose of measuring revenue losses associated with the failure to collect sales tax on Internet purchases;

(a) A University of Tennessee research team led by economist Donald Bruce completed a research project in 2009 (University of Tennessee Research).
(b) In 2008 Glen and Sarah Ellison completed a paper titled "Tax Sensitivity and Home State Preferences in Internet" which examined the extent to which the avoidance of sales tax was a factor driving on-line sales growth (Ellison and Ellison Research).

The Ellison research findings included the following:

Data on sales of memory modules are used to explore several aspects of e-retail demand. Aggregate sales are examined in state-level regressions. Discrete choice techniques are used to examine (incomplete) hourly sales data from a price-comparison site. There is a strong relationship between e-retail sales to a given state and sales tax rates that apply to purchases from offline retailers. This suggests that there is substantial substitution between online and offline retail, and tax avoidance may be an important contributor to e-Retail activity.
.....It is important to note that the fact that consumers pay less attention to tax differences than to price differences does not imply that sales taxes are not important. Our consumers are extraordinarily sensitive to price differences, so even if the coefficient on the Sales Tax variable was 0.3, ***our estimates would be that a firm that must collect a 6% sales tax would have its sales decline by about 50%.***

.....Our most basic conclusion on sales taxes is that they are an important driver of e-retail activity. Our state-level regressions show clearly that sales are higher in states that levy higher sales taxes on traditional retail purchases. The fact that the websites we study sell so little in California is strong evidence that what we are picking up is a tax effect and not some artefact of unobserved heterogeneity. The environment we study is somewhat unusual in that consumers are highly savvy and price-sensitive, but in this environment at least, we would agree with Goolsbee's (2001) conclusion that applying sales taxes to e-retail sales could reduce e-retail demand by one-quarter or more. In our discrete-choice analysis we find that consumers do not pay as much attention to differences in taxes as they do to differences in pre-tax prices when choosing between e-retailers. Taxes do matter to consumers, though, and given how tightly distributed prices in this market are, they can have large effects on consumer behaviour.

The University of Tennessee research paper included the following:

Concerns about state and local governments' ability to collect sales taxes on remote commerce have been expressed at least dating back to the writings of John Due in the 1960s. Much of the collection problem arises because states are unable to require remote vendors to remit the tax given the nexus restrictions arising from Quill v. North Dakota.5 Perhaps the biggest consequence is that the US economy is harmed as firms change their best business practices to avoid creating a collection responsibility in certain states. For example, firms choose where to locate their sales or warehousing operations to avoid creating nexus rather than locating where they can operate most efficiently. We all lose from the higher economic costs associated with these decisions. Also, local vendors face a competitive disadvantage as consumers browse in shops on Main Street but then make their purchases online to evade the tax. There might also be distributional consequences if lower income consumers are more likely to make purchases in local stores where the tax is collected. Lost sales tax revenues have been an increasingly important issue as catalogue sales grew and more recently with the dramatic rise in electronic commerce.

6.0 Terms of Reference of Inquiry

In NRA's view the terms of reference for the inquiry are unnecessarily broad. In our view the interests of the retail sector would have been best served if the predominant focus of the inquiry were limited to the operation of the current tax and customs regime. This in turn would have enabled the Inquiry to more expeditiously deal with questions such as:

- An examination of the circumstances giving rise to the threshold,
- An examination of whether those circumstances remain relevant,
- A consideration of how the landscape has changed
- An examination of all Customs, ATO and Treasury modelling establishing the cost of collection of GST on items below $1,000 in value
- A full review of the operation of *de minimis* arrangements operating in comparable jurisdictions;
- An examination of the operation of the *de minimis* in the United Kingdom in particular
- An examination of all available options for collection of the GST, duty, and customs fees on all items
- An examination of the measures implemented by the ATO to ensure foreign retailers supplying over 75K of product into Australia are registered for GST and are paying GST
- An examination of the effectives of customs compliance activities
- An examination of the cross subsidisation of customs costs arising from the operation of the threshold and the failure to collect customs fees for items imported below the threshold

In the circumstances, NRA is unequivocal in its view that the substantive focus of the Productivity Commission's work should be on matters associated with the operation of the low value threshold.

NRA also notes that the public debate about the proposal to eliminate the low value threshold has been characterised variously by attempts to trivialise the issue on the basis that the impact on retailers is minimal, or by constant and repeated references to matters which are inherent distractions and diversions from the core issue. In this regard we note with approval the observations of media commentator Henry Rosenbloom on the subject:

No one is arguing that consumers should have limited access to offshore sites. Nor is the campaign an attempt to protect local industry, or to prop-up "inefficient" business practices or "out-of-date" business models.

It is simply an expression of dismay that an Australian Government should keep imposing a tax law that deliberately favours offshore businesses and disadvantages local businesses and employees. It is unconscionable that national tax law should work in this way.

NRA strongly encourages the Productivity Commission to stay on course and address the core issue which goes to the sustainability of the Australian on-line and bricks and mortar retail sector in the face of a tax and customs regime which punishes domestic retailers and fosters the growth and profitability of foreign retailers.

The Productivity Commission should also consider the beneficial multiplier effect of the retail sector and the negative impact on the Australian economy of a diminution in the size of the Australian retail industry. Additionally consideration should be given to the absence of any positive substitution effect generated by the shift of a significant component of economic activity offshore. It is very unlikely that the boosting off offshore retailers will in some way lead to the creation of new jobs and new industries in Australia (other than perhaps to increase the demand for express courier drivers and warehouse staff).

By way of example note that Amazon employs a total of 31,200 full-time and part-time worldwide (2010) but it currently employs no staff in Australia; and that as at 31 December 2009, eBay employed approximately 16,400 people (including temporary employees) but employed less than 20 people in Australia.

In terms of the multiplier effect, the retail industry has one of the highest multiplier effects of any industry sector. Every dollar spent in retail will generate up to two dollars in other parts of the economy.

The impact of the low value threshold on Australia's retail sector will increase substantially if the negative flow-on effects to other parts of the economy are factored in.

6.1 Other Considerations for the Retail Sector

While there are other matters that warrant attention these should be assessed in terms of the capacity of the Productivity Commission to influence change.
Consider the following:

6.1.1 Occupancy Costs - Planning and Zoning

The majority of retailers will assert that occupancy costs in Australia are too high. It is considered that the levels of occupancy costs are in part attributable to a concentration of shopping centre ownership and inflexible and inappropriate planning and zoning laws. However planning matters are currently the subject of another Productivity Commission report while other matters pertaining to occupancy costs were the subject of a recently concluded Productivity Commission review into retail shop leasing arrangements in 2008.

Many retailers hold the view that high occupancy costs in Australia are in part attributable to the limited options available to retailers on where to locate their businesses. This means that retailers face restricted choices in making location decisions and in evaluating the business case for a move from established high rent retail precincts to precincts where lower rents may be available.

This predicament is in turn partly attributable to the lack of flexibility and the over regulation of planning and zoning arrangements across Australia.

In this regard NRA notes that COAG has requested the Commission to undertake performance benchmarking in 2010 of States and Territories' planning and zoning systems and land development assessments. We note that in this process the

Commission was asked to report on best practice approaches, which might be used to support competition.

NRA notes that the Productivity Commission has now released its Final Report on its Benchmarking Report into Planning, Zoning and Development Assessment.

The report includes a section (Chapter 8) on "Competition and Retail Markets" and an Appendix (Appendix H) dealing with the "Competitive Aspects of Retail Markets".

In particular NRA is supportive of the Productivity Commission conclusions, which advocate more flexibility in zoning arrangements, which over time, if delivered, will create more options for retailers who are unable to continue to meet the high costs of occupancy in traditional, enclosed shopping centres.

These conclusions are:

"There are constraints imposed by planning and zoning systems which could be considered to unjustifiably restrict entry into markets and reduce the flexibility with which businesses can operate in a particular zone or centre. The extent and nature of such restrictions vary considerably between local government areas and cities but.....measures which unjustifiably restrict competition where they were used include highly prescriptive requirements such as:

- *Descriptions of businesses allowed in particular zones in some council plans in New South Wales, Victoria and Western Australia*
- *Site-specific restrictions on type and size of businesses allowed*
- *Restrictions on business numbers and use of floorspace for different activities"*

[Pages 350-351 of the Report]

"There are some features of planning and zoning systems which, if implemented, would be likely to improve the competitiveness of the relevant markets.

The combination of highly prescriptive zoning and few large commercial sites within activity centres has led businesses to push for special consideration of their business type and/or attempts to locate in out-of centre locations and industrial zones which present fewer restrictions for them. A reduction in the prescriptiveness of zones and allowable uses (particularly those relating to business definitions and/or processes) would facilitate new retail and business formats to locate in existing business zones without necessitating rezoning and other changes to council plans to accommodate various business models."
[Page 352 of the Report]

6.1.2 Retail Employment

Employment recovery in the retail sector following the global financial crisis has been much slower than has been the case in the general economy. Since February 2008, as disclosed by ABS Quarterly Labour Force data, total retail employment has grown by only 0.63%. Over the same period, total employment in all industries in Australia has grown by 5.71%.

More significantly, retail has shed over almost 60,000 full time jobs between February 2008 and February 2011 with full time jobs declining from 699,200 to 641,800. This is a decline in full time jobs of 8.21%, which contrasts with a growth in total full time jobs for all industries of 4.05%.

It is true that most of the diminution of retail full time jobs has been off-set by an increase in part-time jobs which increased over the same period from 542,300 to 607,600. However part-time jobs do not attract the same hours as full time jobs and the decline of full-time employment is an indicator of the lack of confidence in the sector and the challenging trading conditions.

Retail was the largest employer of labour. It is now the second largest employing sector in the Australian economy. Significantly retail is the largest employer of young people in Australia. It is these sectors that carry a disproportionate burden in inducting young people from school to work and in delivering critical employability skills to young Australians. The protection of employment opportunities for young people is an important consideration.

6.1.3 Retail Labour Costs:

The retail sector has been seriously, and unfairly treated, by an award modernisation process instituted on a promise that no employer would be worse off. In a process wherein no evidence was allowed to be called and no right of appealed allowed, retailers were ultimately forced to meet increased labour costs in the order of 10%. While the increases were subject to phasing in arrangements, the cumulative impact of modernisation increases and general wage increases is in the order of 6% per annum. It would be delusory for retailers to expect the Productivity Commission to right the wrongs inflicted on the sector by the award modernisation process.
Labour costs are the highest operating cost for retailers other than costs of occupancy and costs of goods sold. The combined impact of award modernisation increases and minimum wage panel increases means that award based retailers are confronted with annual increases of approximately 6% in the immediate future (2% modernisation, 4% minimum wages). In an environment of weak demand and rising occupancy costs, these increases are not sustainable and will inevitably impact on staffing levels and the staffing mix within the retail sector.

Additionally the full impact of award modernisation costs on the broader and non-award retail sector will not be known until the transitional arrangements have ended and all enterprise agreements have been re-negotiated.

6.1.4 Trading Hours

The retail sector continues to be damaged in its competition with other parts of the broader leisure, hospitality and entertainment sector, by the operation in some parts of Australia of completely unnecessary trading hours restrictions. At the centre of these entirely unsustainable restrictions is the prohibition on retailers in Adelaide from trading on all public holidays. This prohibition produced absurd outcomes over the Christmas-New Year period and the Easter-Anzac Day break. A Productivity Commission recommendation in this area is entirely appropriate with specific mention of the need to achieve a uniform trading hour's regime across the country.

6.1.5 Training Incentives

The Australian Government announced in the May Budget that it would immediately discontinue the allocation of funding to retailers in connection with the delivery to their staff of a Certificate II qualification. The impact of the withdrawal of funding will be both less training and the inevitable diminution of service standards and productivity, or increased costs for retailers as they fully fund the training effort. Neither is a welcome outcome.

It is appropriate for the Productivity Commission to support the retail sector in its effort to achieve equity within the VET sector and battles against an obsession with the traditional trades, the construction sector and the resources and mining sector.

6.1.6 Carbon Tax

Retailers are concerned about the impact of the carbon tax on their cost structures and on consumer demand.

The carbon tax will impact on retailers in a number of areas across the supply chain including by way of higher utilities and transport costs. If large businesses and consumers are to be compensated arising from the introduction of a carbon tax, then there is an impeccable case for the payment of compensation to retailers and fast food operators, particularly small and medium family businesses. If this does not occur, the critical consideration will be whether these increased costs of operation will be offset by increased consumer demand.

In this regard much will depend on the level of compensation, how the compensation is paid to consumers, and whether consumers are disposed to save or spend the compensation. On balance it is difficult to contemplate that carbon tax compensation will stimulate the discretionary spend.

If retailers are not compensated for increased costs attributable to the carbon tax, then it will put upward pressure on prices and further significantly and negatively impact on the competitiveness of Australian retailers.

7.0 References

1. JP Morgan (2010) *Online Retailing – Reviewing the Competition Threats Posed by Technology and the Web.*
2. Citigroup (2010) *Online Retailing-What's in Store? Issue 33.*
3. The Australian Centre for Retail Studies (2010) – *Consumer Trends Report.* Sands and Ferraro.
4. Access Economics (2010) – *Household E-Commerce Activity and Trends in Australia. Report for the Department of Broadband, Communications and the Digital Economy.*
5. Australian Government- Customs and Border protection services website www.customs.gov.au/site/low-value-threshold.asp.
6. The Australian Sporting Goods Association(2010)- *Research Paper on the low value importation threshold.*
7. Commonwealth Competitive Neutrality Complaints Office- *Customs Treatment of Australia Post, investigation No. 5.*
8. University of Valencia- *Research paper on "Segmenting consumers by E-shopping behaviour and online purchase intentions" using CHAID technique.*
9. Australian Customs and Border Protection Services- *Compliance Update report (Feb2010)*
10. PriceWaterhouseCoopers – Submission to the Board of Taxation on behalf of CAPEC on a "Review of the low value importation threshold (Sept 2009).
11. Australian Customs Notice No 2006/21. *Changes to Import Processing Charges (2006)*
12. Australian Customs – *Enhanced Compliance Campaign "Low Value Import Threshold" Initial observations (Mar 2011).*
13. GetPrice- Customer research 3000 consumers on profile and behaviour (Feb 2011)
14. Board of Taxation (Feb 2010) report to the Assistant Treasurer on "Review of the application of GST to cross-border transactions".
15. Morgan Stanley (Dec 2010)- Australian Retail "*Internet Retailing Boom Reaches Down Under"*
16. CBFCA submission to the Board of Taxation (Sept 2009)
17. Office of Fair Trading (UK) – *Internet shopping an OFT market Study*
18. Centre for Retail Research – online retailing website www.retailresearch.org/onlineretailing.php.
19. ABS document 6291.0.55.003 Labour Force, Australia, Detailed, Quarterly Table 06. Employed persons by Industry Subdivision and sex.
20. US Census Bureau, E-Commerce Multi-sector Report Table 1054. Retail Trade Sales-Total and E-Commerce by kind of business.
21. US Census Bureau, Table 1041. Wholesale and Retail Trade- Establishments, Sales, Payroll, and Employees.
22. ABS time series workbook 8501.0 Retail Trade, Australia TABLE 1 Retail Turnover, by Industry Group.
23. Frost and Sullivan report *Australian ecommerce Market 2010*. Based on consumer surveys.

24. Forrester research report *e-Commerce Secure Insight,* released Nov 2010 Australian online retail professionals
25. Productivity Commission (2011), *'Economic Structure and Performance of the Australian Retail Industry: Issues Paper'*, March Ebrill, L., Keen, M., Bodin, Jean-Paul. & Summers, V.
26. IBM Institute for Business Value Retail (2011) *Capitalising on the Smarter Consumer*, Australian consumers (916respondents).
27. The Australian Institute- technical brief No 8 May 2011, *The rise and rise of online retail.*
28. MIT(US) Ellison & Ellison-*Tax Sensitivity & Home State Preferences in Internet Purchasing (2008).*
29. Customs (NZ) *Issues Paper-Review of De Minimis (2011)*
30. University of Tennessee, Bruce William and Luna – *State and local Government Sales Tax Revenue Losses from Electronic Commerce (2009).*
31. NZ Retailers association – Submission for NZ customs inquiry "*De Minimis Discussion Paper"(2011)*
32. UK House of Commons Paper (2011) – "*VAT on postal packages*"

Appendix 1

Confusing the debate – Addressing "other" items of debate.

Much of the debate on the import threshold has centred on non-comparable situations or unrelated items, by parties that have either an economic incentive (freight companies) or a political issue if the threshold is lowered. Some of these are covered below for completeness.

(1) "Australian retailers have not embraced online retailing" and therefore we should let people shop online avoiding GST and duty because the overseas competitors are better. This is a self-fulfilling prophecy; by providing a sustained advantage of this scale to international players there will never be a viable Australian Online retail industry. In most cases where a government wants to nurture and develop an emerging industry they provide incentives to that industry until such time as it can stand on its own two feet. It is both rare (if not unique) and seems illogical to provide a marked advantage to an offshore competitor and then question why the domestic industry is not investing in, or developing, competing business models. The only way a domestic online business can compete with this disadvantage is to be markedly better on some other aspect that drives the business, whilst charging customers more. As shown in Table 2, consumers rank "Price" as a primary driver of online purchasing behaviour, this is unlikely to change. The order of magnitude of the price flow through (11% to 23% higher prices) is unlikely to be compensated for by over performance on other dimensions (range, convenience, information, customer feedback) by a domestic competitor. With the exception of Food, which is naturally protected by the perishable nature of its products, current counterbalancing items that compensate the local competitor are rapidly being equalised. This includes consumers concerns about overseas delivery times and trusting overseas retailers. With familiarity comes trust and consumers are now becoming familiar with the overseas options, further, as shown above, delivery costs into Australia are imbedded in the local competitors cost structure, the overseas retailer charges these directly to the consumer thus clouding the comparable price of the products. Other perceptions that have protected domestic players from the full effects of their cost disadvantage such as security of payments and personnel information are being diminished via trusted options such as PayPal. In short, as comparability of services offered by both competitors becomes more equal the impact of a reduced cost structure to one (the offshore competitor) will become more important in driving the business further and the share of online transactions going overseas will only grow.

(2) "Australian Retailers are uncompetitive and make too much money" as evidenced by the price differences you see online and (connecting the dots) the relatively high returns to shareholders. As defined in the scope of this submission this broad and complex issue is not address sufficiently here. However, returns in the industry are driven by the large participants and by the largest sector-Food. Australia is the most concentrated retail food market in the world, which arguably drives returns in the industry. Therefore, if Australian retailers were

uncompetitive, it is most likely to manifest itself in the most concentrated part of the retail industry, namely food. Perversely this retail sector is probably the only one that is absolutely insulated from international online competition because of the perishable nature of its product(s). To draw a conclusion that Australian retail returns can be altered, by keeping the threshold high, is illogical when those returns are most probably the result of a duopoly that is naturally insulated from the high import threshold.

More recently, "researchers" (see Ref 27) have even been foolish enough to ask consumers *"what mark-up do you think retailers should have*". Clearly politically motivated and lacking any real research logic, this presumes firstly that the consumers understands the difference between margin and mark-up, then assumes that the consumer has a reason to not want a low number (everyone wants a lower price) and then finally for an informed response the respondent would be expect to understand the different cost structures within the industry to determine an appropriate response. In this particular case the "researcher" then went on to compare the response with a derived mark-up from the national accounts data, which are notoriously inaccurate at a margin level. On this point alone a comparison with publicly available data from some of the major retailers would have shown that the analysis was markedly flawed as shown below

Public Information(annual reports)			**Institute of Australia-May 2011**	
	GP	**Markup***	**Category**	**Markup****
Myer (annual report)	40%	**66%**	Clothing and footwear	**142%**
DJs annual report	40%	**66%**	Clothing and footwear	**142%**
JBHI fi	22%	**28%**	Electronics	**85%**
			DVDs	**40%**
Woolworths supermarkets	24%	**32%**	Food	**47%**
Woolworths Big W	30%	**43%**	General Merchandise	**97%**
Woolworhs Dick Smiths	23%	**30%**	Electronics	**85%**

** from ABS input/output data 2006-07
* could be overstated as includes some "other income items"

(3) "Cost neutrality of customs/GST compliance below $1000 is not possible". While this argument will be shown in this submission to be largely unsupported, it has been actively promoted by the special interest groups (freight/courier companies) that benefit from moving product GST and Duty free under "self assessment" into the country. It is worth making two additional points.

Firstly, implementation of any government based revenue gather activity costs money and by definition will not add to the efficiency of the free enterprise capital markets. The parties that bear these costs are as varied as the revenue sources. GST implementation costs were borne largely by the retail sector, personal tax (under self assessment) is borne largely by the individual, stamp duty compliance is borne by the real estate industry and individually by property owners and so on.

Secondly, within subsets of any collection activity the amount collected can often be less than the cost of collection, however if these areas are not policed and a free ride is given to participants the free market will quickly work this out and where possible structure activities to take advantage of this discrepancy. This is what has

happened with the $1000 threshold, not only as it relates to competitors offering products to consumers but also for business that can now split incoming shipments where duty is payable and avoid this payment as well as mandatory customs charges. An added advantage is that speed and efficiency of the movement of product into the country is increased because of the avoidance of "processing" by customs.

(4) "The current threshold for incoming passengers is $900 so why should the Internet be different"? This is the classic "apples and oranges" debate. As it has been included in prior submission, it should at least be commented on.

Currently over 10 million items are entering Australia annually under the threshold. When there is a viable business model that finds it efficient to pays individuals to make 10 million trips overseas in order to bring back items worth about $300 to save a maximum of $60 (GST and maximum duty), then this is a worthy debate. Given that it is unlikely anyone will take this argument seriously this submission will make no further comment.

(5) "Because the threshold was historically at one level adjusted for inflation it now should be a bigger number". As with the prior item, comment is made in this submission merely because this has been included in prior submissions as logic for increasing the threshold (notably in the 2005 review where the cost of books was used to illustrate how inflation worked). This argument assumes that the original level was correct, which it may not have been. Further it assumes that the world is unchanging and circumstances and market forces are unchanged, and they are not. For example, in the 2005 review where the threshold was increased from the 1976 level of $250 (where this inflationary logic was used), economic circumstances had changed radically with the introduction of the GST, which markedly changed the benefits for competitors importing under the threshold. While this item could be dismissed more clearly with further debate it will not be address further in this submission.

(6) "Comparison of a number of specific items between geographic regions shows that retail prices in Australia are too high". As stated previously the cost structure of the domestic retail industry is not covered in this submission. It is likely that there are structural reasons why Australia will never be a low cost retail industry (notably rates of pay and the cost of real estate). However, it is worth making the following points as it relates to comparisons made on the prices of individual items across different geographies (countries typically).

(i) Comparison of a handful of products across retail geographies is hardly a statistically sound way of comparing prices. In a department store alone there can be over 1.4m stock keeping units (SKU's), discount department stores 75,000 SKUs, and a supermarket 50,000 SKU's, to isolate 5 or 6 items and compare is an invalid process.

(ii) There are many variations in price of any one product within a region. This could be a function of marketing at that time, the mix a particular retailer wants to have, where one product has little margin while another has a lot, or a competitive positioning statement, that this store won't be beaten on price for this item, while other items in the mix are where that retailer makes

margin. Alternatively, markdowns to clear existing old, or obsolete stock occur daily in retail and within a global market place the probability that this will occur somewhere on almost any item increases markedly. It is misleading to refer to significant price disparity by item only between overseas online retailers and domestic retailers where variations in price by product regularly exceed 50% between domestic competitors for the reasons outlined above.

(iii) *Scale economies* in manufacturing mean that the major brand manufactures want to get scale in production as quickly as possible on a new product. They will provide new products to the largest markets (typically the US) at a reduced margin to achieve such scale. Within these markets scale of distribution (at retail) also exists, the formats are more consistent and can be structured so (real estate is more flexible), the volume per store is increase as higher traffic areas are chosen in larger catchments etc. Products such as the Apple IMac and the Sony Bravia, which have been compared between geographies, would most likely be "pushed" into the US market at a lower margin (and therefore price) by the manufacturer looking to achieve scale.

(iv) *Product life cycle*. Almost all products, but particularly the type typically compared, have a life cycle within each market. The price of these products follows that life cycle. At the start of the cycle the product is relatively expensive and as it becomes widely distributed its price reduces (in some cases markedly). Further, as with (iii) most major brand owners/manufactures want to launch their products first into the biggest markets (US). By the time these products are released in Australia they have been released for some time in other markets and their prices have dropped. To compare the same product that has different release dates in each market is not a valid comparison. The timeframe for product price movements in newer technology and rapidly evolving products can mean that within months of a launch the product price may have been reduced by as much as 20-40%.

(7) "Because the price difference (of selected items) is more than 12%-23% then it wont make a difference to consumers if the GST and Duty is charged".
We submit that, if this reasoning is correct, it might just as effectively be deployed to support the elimination of the threshold because if the threshold is removed the following states of mind will apply:

- Consumers still buy the offshore product hence choice is not restricted and the consumer is satisfied with the price (still think that they have got a bargain)
- Retailers will be happy because the playing field is levelled
- Treasury will be happy because they have restored the integrity of the GST, delivered competitive neutrality, and collected the tax
- While customs will be required to give formal entry to an increased number of consignments, more customs revenue will be collected
- Other users will be happy because the current cross-subsidisation that results from low value imports not attracting any customs clearance fees can be wound back, and these users should look forward to a reduction of customs costs

(8) Despite the overwhelming research that points to "price" being the dominant driver of consumer preferences online (see table 2) there are still examples of selective or inappropriate use of "research" results.
For example, reference has been made to the ACMA survey in the Commissions Issues paper that 74% of respondents cited convenience and 38% cited price. It should be pointed out that this survey canvassed all internet commerce uses (not just retail products), where

- 70% of respondents said they completed banking transactions online
- 68% of respondents said they paid bills on-line
- 41% of respondents said that they looked at buying, selling or renting property on-line

In all of these activities, convenience is the self-evident and dominant driver. There is no price advantage in completing banking on line or paying bills on line. If the survey data were disaggregated, it would be of interest to establish the predominant reason in the case of the purchase of retail goods on-line. We strongly suspect that price would be ranked ahead of convenience as shown in most other studies.

Appendix 2

The Exponential Growth of On-Line Shopping

The absence of hard data measuring the extent of, and the impact of, on-line retailing in Australia is universally acknowledged. However circumstantial evidence of the exponential growth of on-line shopping abounds.
This material, which is set out below, allows the formulation of reasonable forecasts about the growth of on-line shopping, including the growth of off-shore on-line shopping, and allows estimates to be made of the impact of this growth on Australian retail sales and on GST revenues etc.

For this report the current on-line market in Australia is assumed to be $10 billion and that the foreign retailers' share of this market is 35%. Following is a summary of information that led to this assumption.

Frost and Sullivan[23]

- Based on a survey of 1000 Australian online shoppers and in-depth interviews with local e-tailers for the calendar year 2010, Frost and Sullivan estimate the size of the Australian online market at **$12billion pa**. They also estimate that the overseas competitors' share of this market is approximately 40%. "Price" is stated as the primary driver for consumers.

Forrester Research[24]

- A Forrester–PayPal report released in November 2010 based on a survey of 114 Australian online retail professionals was the basis for an estimate of the total online retail market (excluding ticketing and travel) of $19.5billion. This estimate included what appears to be a high estimate for the food sector of $5billion; therefore excluding food the estimate was **$14.5billion pa**.
- In a report released on 28 January 2011, Forrester concluded that online sales currently make up 7% of all local retail sales and that Australian online retail sales will reach $33.3Billion in 2015.

CitiBank[2]

- Estimates that the current total online domestic sales equals **$11-$12billion pa**, with the international share of the market at between 32% and 38%.
- The growth in offshore online, using the Australian Customs data, shows 43% growth for 9 months to March 2011.
- In terms of offshore sales, the Australian Customs Service has said that 7.78 million transactions were made in FY10 under $1,000. lf we assume an average transaction size of $500, the total value is $3.9 billion. While not all sales under $1,000 are from online retailers, there may be further online transactions over $1,000 and therefore a valid range in our opinion is $3.5- $4.5 billion in online sales to offshore websites.

JP Morgan[1]

- After adjusting for food, estimated the Australian online market to be between **$8billion and $12billion**.
- We believe that the rapid evolution of the Internet and technology in general is both supporting and changing modern consumer behaviour. We identify the following global themes that are currently emerging: 1) Information is empowering the consumer; 2) The web is mobile; 3) The web is social; 4) The web is personal; 5) The web is local; and 6) The web is comprehensive.
- We believe that the rapid evolution of the Internet and technology poses the following competition threats for retailers: 1) The threat of increased price transparency; 2) The threat that those not innovating online will lose market share; 3) The threat of vertical integration; and 4) foreign competition threats.
- We believe these threats impact all retailers. However, we suggest the foreign competition threat posed by online retailing is a bigger issue for Australian retailers relative to retailers in larger markets such as the US and UK, due to foreign competitors from larger markets being able to effectively compete against Australian retailers on the basis of exclusivity, range, and price.
- For Australian retailers (particularly discretionary retailers), we thus expect the advancement of technology and online retailing to create downside risk to medium- and long-term sales growth and gross margins, which in turn implies downside risk to medium- and long-term EBIT margins.
- We note Australia is already considered a large market for international retailers. *Internet Retailer* surveyed 247 US web-only retailers, chain retailers, cataloguers and consumer brand manufacturers and released its results in April 2010. According to the survey, 75.2% of merchants were selling internationally (including Canada) and 14.5% of the 75.2% selling internationally generated more than 25% of their total web sales from customers outside the US. More importantly, Australia was noted as a top three overseas market for those US merchants selling overseas.

Ferrier Hodgson: James Stewart - Partner (ABC TV Inside Business 11 Feb 2011)

- Traditional retailing is likely to come under further pressure from internet shopping as on line expands its share of the retail market from 2-3 percent to 7-8 percent
- British and US retail markets had already reached the 7-8 percent threshold and Australia was likely to catch up.

Colliers International Quarter 4 2010 Research and Forecast Report

- The total value of eCommerce activity by consumers in Australia is hard to quantify, in particular the split between domestic and international sales.
- Retail sales data released by the Australian Bureau of Statistics (ABS) only captures a small proportion of Internet spending via domestic retailers that submit their data. However, this excludes pure online retailers, as well as purchases made on international websites.
- Various sources estimate the value of online spending to range from 3% to 11% of total retail sales.It is estimated that approximately one third of Australian online shopping expenditure is now conducted on overseas websites

Ibis World

- The rise of online group-buying and daily-discount retailers has been swift and staggering. IBISWorld research shows how far these retailers have come: from nothing only a few years ago, to a multimillion-dollar market today. While traditional brick-and-mortar retailers are struggling to attract customer dollars, sales for online group-buying and daily-discount retailers are soaring.
- The hugely popular online group-buying and daily-discount sector has grown from a base of virtually nothing five years ago to be worth $377 million in 2010-11. Offering three major selling propositions – group voucher discounts, clearance goods and travel – this sector is now the fastest-growing retail platform in Australia.
- The sector includes some of the newest players in Australia's retail sphere such as Cudo, Spreets, Ozsale, Catch of the Day and Stardeals, and accounts for 1.8% of Australia's total online retail spend of **$21.3 billion.**
- While brick-and-mortar retailers are struggling with sales that are expected to grow by just 2.3% in 2010-11, online discount retailers' sales are booming. IBISWorld estimates online discount retailers will double their revenue by 2015-16, exceeding $650 million and accounting for 2.1% of online retail spend. Total online shopping is expected to increase from $21.3 billion in 2010-11 to reach $30.8 billion by 2015-16.
- The world's first group-buying website Groupon opened in the United States in November 2008. It is now proclaimed the fastest-growing company in history and is estimated to be worth $15 billion. The company launched in Australia in March 2011 under the brand Stardeals.
- Australia already has over a dozen group-buying websites including Cudo, Spreets and Scoopon, offering an average discount of 60% from the normal retail price.
- From small beginnings, the sector is no longer the domain of small independent operators, with major acquisitions in the past 12 months by some big names. In January 2011, Yahoo!7 purchased Spreets for $40 million; Cudo is owned by Nine Entertainment; the Ten Network owns Our Deal; James Packer has bought into Deals Direct (owners of Dealme.com.au); and Twitter purchased Ozsale for $14 million. Furthermore, New York-based global hedge fund Tiger Global is understood to be close to securing a 30% stake in Scoopon, which owns Catch of the Day

PayPal-Malt Feller: Managing Director of PayPal (Australia):

- *While domestic eCommerce is growing fast, Australian retailers cannot ignore the number of Australians shopping overseas. Indeed, PayPal figures show a 74 per cent increase in the amount of money sent overseas in the last year alone. The number of overseas shoppers using PayPal is also increasing, at the beginning of 2008, approximately 465,822 customers made an overseas transaction and in September 2010, a staggering 1.2 million Australians bought online from overseas retailers.*
  [eCommerce report prepared by PayPal in November 2010]
- *It's very clear Australian e-commerce is booming. There's tremendous amount of domestic SMBs that are benefiting from that growth and it's just very clear that that domestic growth that you were just alluding to is really driving the size of the market that we people think is roughly about 26 billion in 2010. That growth is accelerating. We'll see growth of 11% already this year and see further growth we expect will take the market to 36 billion by 2013.*
  [On Line Retail Forum: Sydney: 18 February 2011]

EBay-Deb Sharkey

- *Online shopping has hit a critical inflection point where millions of Australians are increasingly buying products online that they used to buy in physical stores and this is just the beginning of a new and exciting growth sector.*
- *Australian's spent just under $27 billion online in 2010 and ecommerce is forecasted to grow at 11% year in year through 2013. Now the buoyant e-commerce growth is a stark contrast to overall retail, which was flat last December and for most of last year. We are seeing a clear consumer behaviour shift towards online shopping. We're seeing that on eBay where Australian based sales grew more than 10 times faster than retail last year.*
- *There is tremendous growth yet to come in e-commerce in this country. With online representing just 4% of overall retail, that's less than half its contribution in the US and the UK. Clearly we're still at very early days.*
- *10 million Australians shop online and they spend an average of one hour and 40 minutes every week doing it. The most popular e-commerce categories are travel, groceries, appliances, computers and electronics*
- *Today 78% of all items on eBay are brand spanking new. Sales in our two largest categories, fashion and electronics, are dominated by new products. Seventy nine per cent of clothes, 67% of electronics.*

[On Line Retail Forum: Sydney: 18 February 2011]

DHL and CAPEC (Conference of Asia Pacific Express Carriers)-Ben Somerville

- *Now we're certainly seeing, our business is certainly seeing an increase in online retail, that's obviously no secret. But we're seeing it in the EU, we're seeing it in some of our emerging markets, for instance in the Middle East and Eastern Europe, and we're also seeing it through the States and right through Asia Pacific. So it's not just a phenomenon that's unique to this part of the world. It's obviously being fuelled by the strong Australian dollar, that's again no surprise, which has been touched on already.*
- *Our shipment volumes, just to give you an idea of what inbound shipments into Australia we're seeing, we're seeing double digit growth. We've seen the actual volume of shipments increase year on year by 14%, and the weight, the kilos of shipments coming in is also growing at over 20% year on year.*
- *In terms of our trade lanes inbound into Australia, our biggest trade lane is the United States, and in the lead up to the Christmas period last year which is obviously our peak period for the air express sector, we saw growth of over 130% compared to December 2009, so as you can see it's an enormous growth.*

(On Line Retail Forum: Sydney: 18 February 2011)

Australia Post- Mark Crawford

- *The growth online is so exceptional that nearly over 70% of our business today is driven through e-commerce in one form or another. It's quite extensive and it's one to which we acknowledge that we must be a part of and must be working with our customers and listening to our customers to grow in that business.*

(On Line Retail Forum: Sydney: 18 February 2011)

Google Australia-Jason Pellegrino: Head of Strategy and Sales Operations

- *We've found that four out of five Australian consumers are using the internet to aid their purchase decisions. This could include finding, researching, pricing, purchasing or even reviewing products and services. And two out of three Australian consumers are using the internet to find local products and services. This could be a local restaurant, a local plumber or a local footwear retailer. And the range of products and services that they're looking for online is not really any different to what they're looking for offline and is broad and is vast.*
- *Now although these numbers highlight that the Australian consumer is already online it continues to grow and it shows no sign of slowing down. During the recent Christmas period shopping related searches on Google by Australian users increased 36% year on year.*
- *The Australian consumer, just like the international consumer, no longer sees online and offline as differentiated channels and that's been pointed to consistently this morning. They want to interact with brands and products and services at a different time and at a location that suits them. In fact over 50% of Australian consumers research products online and then go on to purchase that product in a physical store.*
- *Globally mobile searches on Google have more than doubled over the last year and the growth we're seeing in Australia from Australian users is even higher. Traffic from mobile customers can now contribute a material proportion of an online businesses' traffic. And as a teaser of things to come I read an interesting article by a research firm called WSGN who in research on a Japanese market pointed to the fact that a typical large retailer in a Japanese market can expect 25% of their revenue to come via m-commerce, or mobile transactions, which is enormous.*
- *You can see that the consumer is exactly the same consumer that is shopping in malls. That they're deciding how and when they want to engage with retailers and brands and the retailers and brands are providing them the opportunity to do that.*

(On Line Retail Forum: Sydney: 18 February 2011)

Australian Customs –ACBP website

- While all air cargo imported into Australia is required to be reported to Customs and Border Protection, there is no requirement to declare if the goods were bought on-line.
- Air cargo is one of three avenues by which low value goods can be imported into Australia – they can also come in through sea cargo and international mail.
- The majority of low value goods are imported through international mail or air cargo, with very few through sea cargo (i.e. <1%).
- In 2009-10, the total volume of imports of all air cargo reported was 11,228,156.
- In 2009-10, there were over 36 million items of international mail imported – the vast majority of these were valued under the threshold

Global: E-Commerce Delivery Report 2011

The "Global E-Commerce Delivery Report 2011" shows that delivery and logistics have become an important factor for e-commerce in the competition for customers. This report covers facts and trends about deliveries within E-Commerce for 22 countries. Its key findings include:

- In the US, more and more traditional retailers are seeking to compete with the efficiency and shipping speed of online merchants such as Amazon.com.
- French E-Commerce player 3 Suisses invested into the modernization of its logistics activities, while the company already offers 24-hour delivery.
- In Germany, major logistics companies within E-Commerce are Deutsche Post / DHL, DPD, GLS, Hermes and UPS.
- The bottleneck of China's E-Commerce industry seems to be logistics, with a growth of +30% year-on-year in terms of packages delivered, lagging far behind the growth of the online shopping market.
- In Brazil, an increasing number of logistics companies, such as Total Express, Correios and Tegma, are investing into E-Commerce delivery.

Global: Retail Industry Guide

This publication includes detailed data on market size and segmentation, textual analysis of the key trends and competitive landscape, and profiles of the leading companies. Highlights

- Global online retailing is one of the fastest growing sector of the Retail industry with a compound average growth rate (CAGR) of 18% spanning 2005-2009 and in 2009 represented $US350billion annually.

http://www.researchandmarkets.com/product/3bd68d/global_retail_industry_guide

US: The Internet Retailer

The Internet Retailer Top 500 Guide includes the following analysis of e-commerce industry market and competitive trends:

- Sales of the Top 500 retailers grew 18% in 2010, outperforming the overall U.S e-commerce industry, which grew 14.8% to $165 billion, according to the Department of Commerce.
- US web sales now account for 7.9% of total U.S retail sales (excluding food service and fuel), up from 7.2% a year earlier.
- Led by Amazon.com, web-only merchants in the Top 500 increased their online sales by 30.6% to $56.89 billion last year.
- Total web sales for all chain retailers in the Top 500 grew 11.3% to $55.32 billion in 2010
- For two-thirds of the 64 department store, specialty apparel, general merchandise and other chain retailers included in the Top 500 Guide, online sales growth in 2010 exceeded gains in same-store sales
- The combined web sales of consumer brand manufacturers ranked in the Top 500 grew 12.9% last year to $17.5 billion.
- The collective web sales of all Top 500 catalogue/call centre companies increased 10.8% to $20.43 billion in 2010

US: TraQline

- *Brick-and-mortar specialty retailers in the US are seeing more of their shoppers migrate to Amazon and other online outlets to find the best deals on brand-name items. Categories including kitchen appliances and portable power tools saw an especially big shift because of lower online prices, and Amazon's share of online sales of kitchen electrics rose to 35% from 17% between 2005 and 2010.*

- *Take Amazon.com, whose relentless growth has undercut the raison d'être of specialty retailers. That is true both in books—where Borders Group recently filed for bankruptcy protection—and in electronics.*

- *Indeed, Amazon's electronics and non-media revenue rose 66% to $18 billion last year, helping it lift market share in different segments. TraQline estimates that Its share of LCD TV sets, for instance, nearly tripled, to 3.7% at the end of 2010 from 1.3% in 2007. Its share of portable audio devices rose to 11% from 4.6% in the same period*

Appendix 3

Current Retail Performance

The current performance of the retail sector is demonstrated by the data contained in the tables below.

The retail trade data is to be interpreted in the context that typical or standard annual growth in retail sales is considered by some to be 6%. This rate of growth is not evident in any category. In fact when the categories most exposed to the discretionary spend are analysed it is apparent that the annual rate of growth over the last 12 months has been negative or anaemic. We refer in particular to household goods, clothing and footwear, and department store data.

The state-by-state data shows the variation in performance across the country.

- In NSW, after a middle year recovery in 2010, retail trade has fallen well below the traditional benchmark for annual growth with a rate of only 1.35% recorded in March this year.

- Victoria has been the most resilient of all the states and territories showing normal growth rates during the middle of 2010 but the rate of growth this year has moderated.

- In Queensland trading conditions have been difficult with the performance of southeast Queensland and Far North Queensland particularly poor.

- In SA retail trade showed modest growth through to October 2010 but has fallen away since then.

- Trading conditions in WA have been unpredictable with significant month on month fluctuations. Growth in February and March this year has been near the traditional benchmark.

- Tasmania's retail sector has been trading in recessionary conditions for the entire year recording negative year on year growth since at least April 2010.

- In both the ACT and NT growth has been minimal and well below the trend.

Current Retail Performance – By category and State

(ABS seasonally adjusted, excluding café and Restaurants)

Category (Year to)	Food	Household Goods	Clothing, Footwear & personal accessories	Department Stores	Other Retailing	Australia Total
April 2010	0.28%	0.94%	-4.78%	-4.73%	1.51%	0.81%
May 2010	2.37%	-0.22%	-3.62%	-5.82%	0.77%	0.24%
June 2010	1.76%	-0.10%	-0.85%	1.60%	1.02%	0.83%
July 2010	3.67%	0.46%	2.23%	0.29%	2.81%	2.44%
Aug 2010	2.35%	0.87%	-0.01%	-0.41%	6.52%	2.22%
Sept 2010	1.79%	1.76%	3.65%	0.74%	6.05%	2.63%
Oct 2010	2.85%	1.76%	-1.69%	-3.21%	3.59%	1.77%
Nov 2010	1.11%	0.69%	-3.74%	-2.39%	4.40%	0.77%
Dec 2010	1.77%	3.45%	1.91%	-0.51%	2.62%	1.93%
Jan 2011	4.12%	-1.90%	-3.34%	-4.08%	4.19%	1.28%
Feb 2011	5.76%	0.44%	1.01%	0.73%	4.91%	3.65%
Mar 2011	**3.69%**	**1.69%**	**0.55%**	**-4.26%**	**3.89%**	**2.31%**

State (Year to)	NSW	VIC	QLD	SA	WA	TAS	NT	ACT
April 2010	1.84%	2.67%	-1.04%	3.63%	4.27%	-0.32%	5.22%	2.70%
May 2010	2.32%	2.81%	-2.40%	1.83%	0.86%	-0.87%	3.96%	1.31%
June 2010	2.83%	3.57%	-0.72%	1.46%	1.20%	-1.35%	5.50%	2.16%
July 2010	4.88%	6.53%	2.49%	3.72%	0.07%	-1.05%	4.44%	1.92%
Aug 2010	5.01%	5.80%	1.15%	3.17%	2.77%	-1.54%	3.81%	1.75%
Sept 2010	4.03%	5.82%	1.14%	3.33%	4.43%	-2.10%	5.35%	1.75%
Oct 2010	0.65%	6.02%	0.32%	3.16%	2.65%	-2.81%	-1.72%	2.76%
Nov 2010	0.12%	4.30%	0.55%	-0.89%	1.52%	-2.13%	-3.23%	1.75%
Dec 2010	0.72%	5.80%	1.36%	0.91%	1.33%	-2.63%	-2.79%	1.52%
Jan 2011	1.23%	2.72%	1.56%	0.43%	3.27%	-2.90%	1.94%	3.84%
Feb 2011	3.63%	2.76%	4.82%	1.58%	5.70%	-2.33%	3.00%	2.61%
Mar 2011	**1.35%**	**3.61%**	**2.09%**	**0.76%**	**4.67%**	**-3.38%**	**1.86%**	**0.84%**

ABS Employment data

Quarter	All Employment		Part-Time Employment		Full Time Employment	
	Retail	All Industries	Retail	All Industries	Retail	All Industries
Nov-2007	1,263,300	10,677,300	558,000	3,004,400	705,300	7,672,900
Feb-2008	1,241,600	10,773,700	542,300	2,984,800	699,200	7,788,900
May-2008	1,240,400	10,833,800	580,000	3,122,200	660,300	7,711,500
Aug-2008	1,217,000	10,843,200	579,400	3,067,600	637,600	7,775,600
Nov-2008	1,221,100	10,893,500	583,900	3,083,800	637,100	7,809,700
Feb-2009	1,235,600	10,902,700	593,800	3,111,300	641,800	7,791,400
May-2009	1,229,000	10,927,300	599,700	3,235,900	629,200	7,691,400
Aug-2009	1,169,600	10,859,900	566,200	3,266,400	603,400	7,593400
Nov-2009	1,214,200	10,992,500	572,100	3,256,400	642,000	7,736,200
Feb-2010	1,199,800	11,084,100	591,900	3,286,200	607,900	7,797,900
May-2010	1,200,000	11,170,400	582,200	3,338,500	617,800	7,831,900
Aug-2010	1,203,900	11,208,300	590,200	3,348,100	613,700	7,860,200
Nov-2010	1,250,100	11,395,400	611,000	3,344,200	639,000	8,051,100
Feb-2011	1,249,400	11,388,600	607,600	3,284,500	641,800	8,104,000
Feb 11 v Feb 08	**0.63%**	**5.71%**	**12.04%**	**10.04%**	**-8.21%**	**4.05%**

Appendix 4

Included Papers

1. MIT(US) Ellison and Ellison – *Tax Sensitivity and Home State Preferences in Internet purchasing (2008)*

2. University of Tennessee, Bruce William and Luna – *State and local Government Sales Tax Revenue Losses from Electronic Commerce (2009).*

3. NZ Retailers association – Submission for NZ customs inquiry "*De Minimis Discussion Paper"(2011)*

4. UK House of Commons Paper (2011) – "*VAT on postal packages"*

5. NZ Customs (2011) – "*Issues Paper: Review of De Minimis*

Tax Sensitivity and Home State Preferences in Internet Purchasing[1]

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Tax Sensitivity and Home State Preferences in Internet Purchasing

August 2008

Abstract

Data on sales of memory modules are used to explore several aspects of e-retail demand. Aggregate sales are examined in state-level regressions. Discrete choice techniques are used to examine (incomplete) hourly sales data from a price-comparison site. There is a strong relationship between e-retail sales to a given state and sales tax rates that apply to purchases from offline retailers. This suggests that there is substantial substitution between online and offline retail, and tax avoidance may be an important contributor to e-retail activity. Geography matters in two ways: consumers prefer purchasing from firms in nearby states to benefit from faster shipping times; and appear to have a separate preference for buying from in-state firms.

1 Introduction

The recent growth of Internet retail (e-retail) has attracted a great deal of attention in the academic literature and popular press.[1] The future of e-retail is of interest for both intellectual and practical reasons. Intellectually, e-retail provides nice opportunities to examine consumer and firm behavior. Practically, e-retail could have significant effects on the economy. It has grown steadily at about 25% per year since the collapse of the dot-com "bubble." And even a small e-retail industry could have a substantial impact on traditional retail, which employs as many Americans all manufacturing industries combined.

In this paper we investigate aspects of consumer behavior that will have a substantial impact on the future of Internet and traditional retail. We focus on two main issues. First, we examine the extent to which the success e-retail has had is due to the *de facto* tax-free status of most e-retail purchases in the U.S.[2] This bears on the relative efficiency of e-retail, and is important to understanding what may happen if states are able to tax online sales.[3] Second, we examine the geography of e-retail. It is commonly supposed that geographic differentiation is an important factor allowing traditional retail stores to maintain the markups over marginal cost they need to survive. Branding, obfuscation, or other factors may allow e-retailers to survive even without geographic differentiation, but knowing whether geographic differentiation is really eliminated is also important for understanding what market structure might evolve.[4]

[1] See, for example, Goolsbee (2000), Smith (2001), Chevalier and Goolsbee (2003), and Ellison and Ellison (2008).

[2] Forty five U.S. states levy sales taxes on traditional retail purchases. Each of these states also has laws assessing "use taxes" on purchases that its residents make from out-of-state firms. However, the Supreme Court ruled in *Quill vs. North Dakota* (1992) that absent new federal law, a state could not compel a firm without substantial physical "nexus" in that state to collect use taxes on its behalf. The 1998 Internet Tax Nondiscrimination Act makes explicit that web presence alone does not constitute nexus. While consumers are obligated to self-report use-tax liability, few do in practice. Note that states are able to collect sales taxes on e-retailers' in-state sales.

[3] The Internet Tax Nondiscrimination Act has been extended to 2014, but there are two other ways in which the *de facto* tax-free status of Internet purchases in the U.S. might be threatened in the near future. First, the legal definition of nexus continues to be challenged in the courts on various fronts. For example, Amazon is fighting the state of New York over a law that attempts to broaden nexus to include the presence in New York of firms that earn referral fees for sending customers to Amazon. In addition, eighteen states have joined the Streamlined Sales Tax Project in an attempt to simplify and harmonize their sales tax laws. The Project's goals are to encourage online retailers to agree to collect use taxes for sales made in those eighteen states and, eventually, to pave the way to federal legislation requiring collection of use taxes.

[4] See Brynjolfsson and Smith (2001), Chevalier and Goolsbee (2003), Baye and Morgan (2004), Ellison (2005), and Ellison and Ellison (2008).

The environment we study is that examined in Ellison and Ellison (2008): we look at consumers shopping for computer memory modules using the Pricewatch.com search engine. For a period of approximately one year, we have hourly data on the twelve lowest prices listed on Pricewatch for each of several products. We know the state in which the e-retailer listing each price is located. Our quantity data is unusually good in one respect and unusually bad in another. The bad part is that we only observe purchases from two of the listed websites (both located in California), so we do not know how many consumers purchased from other websites (or from traditional retailers). The good part is that the data are at the individual order level and include each consumer's location.

The structure of the data provides a nice opportunity for examining consumer preferences and behavior. First, the fact that we observe the state in which each consumer is located creates an opportunity to look at the effects of geography and taxes: we can quantify the extent to which our websites sell more in states that levy higher sales taxes—taxes primarily affect the firm's competitive position relative to traditional retailers—and to states that are nearby. Second, there is substantial turnover in the Pricewatch lists, both in terms of which websites make the list of the twelve lowest-priced and in their price ranking. Hence, there are many hours in which our two websites are mostly competing against other California e-retailers, and others in which they are competing against e-retailers in New Jersey, Illinois, Oregon, etc. with similar prices. Looking at how state-specific sales in a given hour are affected by the competitors' locations is another way to identify geography and tax effects.

The paper is organized around two analyses designed to exploit different sources of variation. In Section 3 we exploit the time-invariant factors—state-level tax rates and differences in state-to-state shipping times—in the simplest way possible. We run cross-section regressions examining the total number of orders received from each state over the course of the year. These regressions provide clear evidence that tax savings are an important motivation for online shopping: our e-retailer's sales are substantially greater in high-tax states than in low-tax states. We can provide an additional piece of supporting evidence to bolster the case that the differences are due to taxes and not due to unobserved consumer heterogeneity: our e-retailer sells *much* less in California than in comparable

states. (This would be expected under the tax hypothesis because our e-retailer must charge sales tax on sales to California residents.) These cross-section regressions provide some weak evidence that geography matters for shipping-time reasons.

Section 4 applies standard demand estimation techniques in an unusual way to exploit the hourly variation in the data: we estimate discrete choice models that use as their dependent variable the number of orders of a given product from consumers in a particular state in a particular hour.[5] The nonstandard part of the application is that we only have data on consumer purchases from two of the listed firms. Normally, one applies discrete choice models to datasets containing all firms' market shares. Having data on all firms is, however, not necessary to identify the model given that we have substantial intertemporal variation in the characteristics of the competitors. It is this variation that helps us learn about substitution between e-retailers, how much attention consumers pay to geography, taxes, and so forth, simply by looking at how our firm's sales go up and down as rivals' prices and locations change.

The discrete-choice analysis provides some evidence that consumers pay attention to differences in the taxes between e-retailers. There is also evidence that geography still matters. In particular, consumers are estimated to have a preference for purchasing from e-retailers located in their own state.

Our work is related to a number of previous papers. The standard reference on Internet taxation is Goolsbee (2000). It examines a 1997 survey in which 25,000 consumers were asked whether they had ever bought products online. Consumers living in states with higher sales tax rates are found to be more likely to have bought products online. The big-picture conclusion is that subjecting e-retailers to taxation could reduce online sales by 24%. One motivation for the the tax part of our paper is to address a couple potential concerns about Goolsbee's work: an elasticity derived from analyzing whether consumers ever purchase anything on the Internet could be very different from the elasticity of total quantity with respect to taxes (which will reflect more the behavior of intensive Internet shoppers); and one could also worry that some of the tax effects he finds could be due to

[5]These regressions include dummy variables for each state so that the results derive from variation that is independent of the variation that identifies the cross-section regressions of Section 3.

differences in unobserved consumer characteristics across states (driven, for example, by California and Washington having high sales taxes as well as populations inclined to use the Internet).[6] Our tax results also relate, of course, to the literature on the effects of sales taxes on location and consumer behavior in traditional retail, *e.g.* Fox (1986) and Walsh and Jones (1988).

A number of other papers have used data from price search engines to examine aspects of e-retail demand. Brynjolfsson and Smith (2001) examines consumers who visited Even-Better.com in 1999. It has a puzzling finding on taxes: consumers are estimated to be twice as sensitive to differences in taxes as they are to differences in item prices.[7] It also finds strong evidence that consumers prefer branded e-retailers over lesser known firms. One limitation is that they do not actually have any quantity data. The quantity data is imputed by assuming that that consumers purchased from the e-retailer they visited last. Ellison and Ellison (2008) examines the same Pricewatch data as this paper. It notes that websites attracting customers via Pricewatch.com have extremely price-elastic demand, and investigates how it is that firms are able to maintain nontrivial markups. The primary observations on this count are that firms engage in a great deal of obfuscation, and that an adverse selection disincentive for price cutting, like that described in Ellison (2005), appears to be present. Baye, Gatti, Kattumen and Morgan (2006) examine clickstream data on consumers shopping for PDAs through the Kelkoo.com search engine in 2003. They note that the lowest-priced firms gets a large number of extra clicks and address a number of interesting questions: how price-sensitivity varies with the number of listed firms; how screen- and price-rank separately influence demand; etc.[8]

We are not aware of any other work on spatial differentiation between e-retailers. A number of papers have examined spatial differentiation in traditional retail, including Weisbrod, Parcells and Kern (1984), Chiou (2008), and Davis (2008).

[6] Despite the examples of California and Washington, sales taxes in the U.S. are, in fact, not positively correlated with the demographic controls for computer usage we employ. For example, Louisiana, Tennessee, Oklahoma, and Alabama each have both one of the eight highest average tax rates in the country and a below average fraction of households with home Internet access. Goolsbee casts doubt on the unobserved heterogeneity explanation for his results by using extensive household-level demographic controls, by including MSA dummies, and by showing that tax rates are not correlated with ownership of computers.

[7] This could be explained as an artifact of price endogeneity if higher prices are associated with higher unobserved quality whereas higher taxes are not.

[8] See Baye, Morgan, and Scholten (2006) for more on search and and price dispersion.

2 Data

In this paper we examine sales of four different types of memory modules, 128MB PC100, 128MB PC133, 256MB PC100, and 256MB PC133.[9] Our price data were obtained by downloading the first (or first and second) screens from Pricewatch's memory price lists on an hourly basis from from May 2000 to May 2001 (with some gaps). Pricewatch is a price search engine where potential consumers can choose product categories, 128MB PC100 memory modules, for instance, and be given a list of participating retailers selling products in that category sorted by price. Consumers can then click through to one (or more) of the listed retailers to obtain more information or complete a transaction. Some information on retailer location, shipping terms, etc., is given to the consumer on the Pricewatch page before clickthrough. Pricewatch is still in operation, although the details of its interface, the rules it enforces, and the markets it serves have changed somewhat over the past few years.

Our data on the 128MB modules include information on the twenty four lowest-priced websites listed on Pricewatch. The data on 256MB modules include information on the twelve lowest-priced websites. There is a fair amount of turnover and reshuffling of the price lists from day to day (and even from hour to hour in some periods). Over the course of the year there is a dramatic decrease in prices. For example, in the space of a year the price of a 128MB module fell from about $120 to about $20.

Pricewatch does not calculate sales taxes for consumers on these pages, but it does list the home state of each retailer so that a consumer who knew the tax rate in his home state (and understood that sales taxes will apply if and only if he buys from an in-state firm) could take sales tax differences into account. We downloaded the state locations as well.

We obtained quantity data for these products from an Internet retailer that gets most of its traffic from Pricewatch. It operates two similar websites, which typically have different prices for the products studied.[10] The quantity data again cover May 2000 to May 2001

[9] As described in Ellison and Ellison (2008), our e-retailer sells three versions of each of these types of memory modules. The three versions are clearly ranked in quality. In this paper, we restrict our attention to the lowest quality "generic" version of each type of memory module. This is the only quality level for which one can easily use Pricewatch to identify competitors' prices. Low quality memory also accounts for the majority of our firm's sales.

[10] There are several possible motivations for having multiple websites: they may be given different looks

with some gaps. The raw data are at the level of the individual order. We use data on approximately 15,000 orders. The available data on each order include the website from which the customer made the order, detail on what was ordered, and the shipping address. Our e-retailer is just one of many listing products for sale on Pricewatch. A rough estimate is that 100,000 other consumers visited Pricewatch during our sample period and purchased a corresponding product from one of the e-retailers for which we do not have quantity data.

We also use a few state-level variables. The most important of these is the state's average sales tax rate. Sales tax rates vary by county and locality in many states. Our data are averages across the various jurisdictions within a state computed by a private firm. We collected data on UPS ground shipping times by querying the UPS website. These data include both shipping times from our e-retailer's zip code to each state, and a state-to-state shipping time matrix.[11] Our other state level variables come from Census Bureau datasets: the fraction of households with home Internet access as reported in a 2001 survey, the population of each state in the 2000 census, and the number of computer stores and gas stations reported in the 1997 Census of Retail Industries.

3 Analysis of aggregate state-level sales

In this section we take the most straightforward approach to examine how the time invariant variables in our dataset—sales tax rates and shipping times—affect consumer demand. We construct measures of the total number of orders received from each state, and use regressions to, for example, look at whether our e-retailer sells more in states with high sales taxes than in states with low sales taxes.

3.1 Summary statistics

The regressions in this section will have 51 observations: one for each state and the District of Columbia. We use two primary dependent variables: $Quantity128$ is the number of orders

and consumers may have heterogeneous reactions; it allows the websites to be more specialized (which seems to be attractive to some consumers); it facilitates experimentation; it may help promote private-label branded products; The firm may occupy multiple places on the Pricewatch screen.

[11] UPS provides these data on a zip code to zip code basis and there can be some within-state variation. We typically collected data using one zip code from the the largest population center in the state. In some cases where a state did not have one dominant population center and the shipping time varied we took an average of the times for the two largest population centers.

for 128MB modules received over the course of the year from a given state; $Quantity256$ is the corresponding number for 256MB modules.[12] Summary statistics for the basic regressions are presented in Table 1. Our e-retailer sells 204 128MB memory modules to the average state over the course of the year. This ranges from a low of 19 in the District of Columbia to a high of 762 in Texas. Unit sales of 256MB memory modules are about half as large. The average sales tax rate is 5.7 percent. Four states have no state or local sales taxes. The UPS ground shipping time from our retailer to the average state is about 4 days.[13] The percentage of households with home Internet access varies from a low of 40.6% in the District of Columbia to a high of 70.2% in New Hampshire. The average state has 230 computer stores. The ratio of computer stores to gas stations ranges from a low of 0.041 in West Virginia to a high of 0.184 in California.

Although prices are not used in this state-level anaysis, they are relevant for the interpretation of some results. The mean price of a 128MB memory module is $70. The mean price of a 256MB memory module is $139. A one percentage point difference in tax rates, then, adds 70 cents on average to a 128MB module but $1.39 to a 256MB module.

3.2 Basic results

To analyze how the number of orders received from state s is related to the state's tax rate we estimate a negative binomial regression model, i.e. we assume

$$\begin{aligned} Quantity_s &\sim \text{Poisson}(\mu_s) \\ \log(\mu_s) &= \beta_0 + \beta_1 OfflineSalesTaxRate_s + \beta_2 California_s + \beta_3 ShippingTime_s \\ &\quad + \beta_4 \frac{ComputerStores_s}{GasStations_s} + \beta_5 InternetAccess_s + \beta_6 \log(Population_s) + \epsilon_s, \end{aligned}$$

where the ϵ_s are independent random variables with $e^{\epsilon_s} \sim \Gamma(\theta, \theta)$, and estimate the parameters by maximum likelihood.[14] One can think of this as similar to estimating a linear regression with $\log Q_s$ as the dependent variable.

[12] Note that in doing this we are summing both over the two websites for which we have data and over the two speeds of each size memory module: PC100 and PC133. We do this because there is no reason to expect that taxes or geography would have a different impact across websites or speeds.

[13] The minimum value of 1.5 days reflects that shipping times are one day for shipments to Southern California and two days for shipments to Northern California.

[14] The Poisson regression model is the special case of the negative binomial with $\theta = \infty$. In applied work it is common to find that a specification test can reject the Poisson model in favor of other models that allow for more dispersion. The particular assumption that the errors are distributed like the logarithm of a gamma

Table 2 presents coefficients obtained from estimating the regression above on the total unit sales to each of the 51 states. The first column uses 128MB memory module sales as the dependent variable. The results indicate that sales taxes have a large effect on online sales. The 5.94 coefficient estimate on *OfflineSalesTaxRate* indicates that a one percentage point increase in a state's sales tax increases the number of orders our e-retailer receives from that state by about 6%. The average sales tax rate in our data is 5.7%. Hence, in a typical state, online purchases would be predicted to decrease by about 30% if the offline sales tax were eliminated. Goolsbee argues that this is a good forecast for the impact of taxing online sales—the implicit assumption is that achieving tax parity between online and offline retail should have a similar effect regardless of whether it is achieved by increasing online taxes or by decreasing offline taxes.

The coefficient on the *California* dummy provides additional support for the view that what we have estimated is a tax effect and not an artifact of unobserved state-level heterogeneity. What would we predict about our firm's sales to California if the coefficient on *OfflineSalesTaxRate* is truly a tax effect? First, since our firm has no tax advantage relative to brick and mortar stores in California—its California customers must pay sales tax—we would expect its sales to be about 35% lower than one would otherwise predict given state covariates.[15] Second, our firm has a disadvantage relative to non-California e-retailers when selling in California. One would expect that this disadvantage would lead to an additional reduction in sales. The estimated coefficient on *California* indicates that sales to California customers are about 67% lower than sales to comparable states. It is implausible that an effect of this magnitude could be due to an unobserved distaste for online shopping on the part of Californians.

The estimate on the *ShippingTime* variable provides some weak evidence that geography still matters on the Internet. Sales are estimated to be reduced by about 10% if UPS ground shipping to the destination state is one day longer.

random variable (as opposed to being normally distributed for example) is motivated by the fact that a relationship between Poisson and gamma random variables allows the likelihood to be evaluated without a numerical integration. The distribution of Q_s turns out to be negative binomial which is what gives the model its name. Section 19.9.4 of Greene (1997) provides a clear description of the model. Hausman, Hall and Griliches (1984) discuss a number of models for count data.

[15] The *OfflineSalesTaxRate* variable is equal to 7.25% for California.

The coefficients on the other control variables seem reasonable. Sales are higher in states where the fraction of residents with Internet access is higher. We cannot reject that the coefficient is one, which would correspond with sales being proportional to the number of people with home Internet access. The coefficient on the computer store-gas station ratio might be expected to have either sign: it reflects both interest in computers and the availability of computer parts at traditional retail stores. The estimated coefficient is positive but not statistically significant. Population is obviously a strong determinant of aggregate sales. Potential reasons why the coefficient might be less than one include that population is an imperfect proxy for the potential market size (which is affected by income, business activity, and other factors), and that larger population states may have better offline retail.

The second column of Table 2 presents coefficient estimates from a regression with orders for 256MB memory modules as the dependent variable. These results are very similar: sales are substantially higher in states that levy higher sales taxes on traditional retail purchases; sales are notably lower in California; there is weak evidence that shipping times may affect sales; the effects of the other demographic variables are similar.

As mentioned above, a potential concern is that the estimated tax effect could be an artifact of omitted state characteristics correlated with both interest in online shopping and the tax variable.[16] To address this concern the third and fourth columns add a number of additional demographic characteristics that one might imagine were correlated with interest in online shopping: the state's median household income (in thousands), the fraction of households with a computer, and two measures of educational attainment of the over-25 population: the fraction with a bachelor's degree and the fraction with a graduate or professional degree. All four of the new measures are positively correlated with the home internet access and computer store to gas station ratio. Adding these somewhat collinear variables leads to some changes in the coefficients on the existing control variables, but only strengthens the tax-related conclusions.[17] The coefficient on the sales tax rate gets slightly larger increases in significance in both regressions. The coefficient on the California dummy

[16]The states with the highest tax rates are Louisiana, Tennessee, Washington, New York, and Texas. The states with the lowest tax rates are Montana, Delaware, New Hampshire, Oregon, and Alaska.

[17]The *Home Computer* and *Internet Access* variables are particularly collinear with a correlation of 0.90.

gets slightly smaller and increases in significance.

4 A Discrete-Choice Analysis

The Pricewatch environment exhibits an unusual degree of short-term variation in competitive conditions. This variation provides a nice opportunity to gain additional insight into e-retail demand and consumer behavior. In this section we use discrete-choice models to explore substitution between e-retailers and the effects of geography and sales taxes.

4.1 Motivation

The analysis in this section is designed to exploit an important source of short-term variation in our data: turnover in the relative price rankings. The following discussion should provide some intuition first, for how that turnover arises, and second, how it might be useful for identification.

Reshufflings in the price rankings are quite common.[18] There are an average of 4.1 price changes per day among the top twelve firms. Firms jumping onto the list account for about one of these. Frims raising their prices to drop off the list are about 0.8. The remaining 2.3 are smaller price changes that just reorder the list. About three-quarters of these are price cuts. They are usually one or two dollars and move the price-cutting firm up by one to four places. In total, the 4.1 price changes result in 18.3 rank changes. At the firm level, there is clearly heterogeneity in position preferences: four of the ten websites we see most often have average positions of between two and four immediately following their price changes, whereas four others have average post-reset positions between ten and eleven-and-a-half. Activity levels are relatively similar: rates of price changes among the ten most frequently present websites vary from 0.2 to 0.5 price changes per day.

The retailers selling through Pricewatch are not large firms with sophisticated operations research staffs. Some are probably being run out of the back room of a retail computer store. The retailer that provided us with data is probably more typical: a proprietor working long hours; a single part-time programmer helping maintain the websites; someone doing accounting; a few customer service representatives; and a shipping room staff putting

[18] All statistics in this paragraph refer to the 128MB PC100 data.

products in boxes. The firm had dozens of products listed for sale on Pricewatch. The proprietor would manually monitor the position of the more important ones on the Pricewatch screen during breaks in his other management responsibilites.

The largest source of churning in the Pricewatch lists is a simple mechanical one: the price of a 128MB memory module declined from about $120 early in the year to about $25 dollars by the end of our sample. Firms naturally cut retail prices as wholesale acquisition costs declined. There was also substantial entry and exit: 113 websites appear in the top twenty-four at some point during the year. In addition, we cannot rule out some demand-driven price changes.

Figure 1 presents an actual example of turnover that is somewhat atypical, but makes for a nice illustration: it shows the twelve e-retailers listed on the first screen of Pricewatch's 128MB PC100 memory page at 9am and 11am on August 1, 2000. Note that two e-retailers made price changes between these two times. Coast-to-Coast Memory of New Jersey, which offered the lowest price of $112 at 9am, raised its price sufficiently so as to disappear from the top twelve by 11am. UpgradePlanet.com of Virginia, which was on the second page of the 9am list at $128, reduced its price to $111 and took over the top slot.

The first three columns show information presented on Pricewatch: the e-retailers' names, their locations, and their prices. The fourth through the sixth columns contain numbers not presented on the Pricewatch site but which consumers could compute from the given information: the tax-inclusive prices that customers in New Jersey, Virginia, and California, respectively, would pay if they purchased from each of the e-retailers.[19]

We use this example to help illustrate how price turnover is useful for identification. Recall that we observe sales for two websites. However, we observe not just total sales but sales *into each state* at each hour. This fact, along with the turnover in relative price rankings, is crucial for our estimation strategy.

To think about how this works, suppose that our sales data were from Connect Computers.[20] At 9am Connect Computers' tax-inclusive price for New Jersey residents is lower than that of any other website. At 11am Connect Computers' tax-inclusive price for New

[19] A consumer, of course, would need to know his or her local sales tax rate and the fact that sales taxes are only assessed on in-state sales to make this calculation.

[20] Connect Computers is, in fact, not one of the websites from which we have data.

Information on Pricewatch			Price	Price	Price
Website	State	Price	into NJ	into VA	into CA
Pricewatch ranking at 9:01am EDT					
Coast-to-Coast Memory	NJ	112	118.72	112	112
Connect Computers	CA	113	113	113	121.64
Computer Craft	FL	114	114	114	114
Advanced PCBoost	CA	115	115	115	123.80
1st Choice Memory	CA	116	116	116	124.87
Jazz Technology	CA	117	117	117	125.95
Memplus.com	CA	117	117	117	125.95
Portatech	CA	119	119	119	128.10
Augustus Technology	CA	120	120	120	129.18
EconoPC	IL	120	120	120	120
Advanced Vision	CA	121	121	121	130.26
Computer Super Sale	IL	122	122	122	122
Pricewatch ranking at 11:01am EDT					
UpgradePlanet.com	VA	111	111	115.99	111
Connect Computers	CA	113	113	113	121.64
Computer Craft	FL	114	114	114	114
Advanced PCBoost	CA	115	115	115	123.80
1st Choice Memory	CA	116	116	116	124.87
Jazz Technology	CA	117	117	117	125.95
Memplus.com	CA	117	117	117	125.95
Portatech	CA	119	119	119	128.10
Augustus Technology	CA	120	120	120	129.18
EconoPC	IL	120	120	120	120
Advanced Vision	CA	121	121	121	130.26
Computer Super Sale	IL	122	122	122	122

Figure 1: Sample Pricewatch rankings: 128MB PC100 memory modules on August 1, 2000

Jersey residents is only the second lowest. Accordingly, if consumers pay attention to sales taxes we would expect Connect Computers' sales into New Jersey to be higher at 9am than at 11am. Similarly, its sales into Virginia would be higher at 11am than at 9am. We can estimate tax effects controlling for a home state preference by looking at how the magnitude of the 9am-11am drop in Connect's New Jersey sales compares with the 9am-11am increase in Connect's Virginia sales. A comparison of Connect's California sales at 9am and 11am will teach us about substitution between retailers: shipping times from New Jersey and Virginia to California are the same, so the comparison should help us learn how many consumers shift from the second-lowest to the low-priced firm when the low-priced firm reduces its price by one dollar.

4.2 Methodology

Let N_{sht} be the number of consumers in state s purchasing a particular type of memory module in hour h of day t from the twenty-four (or twelve for 256MB modules) websites whose prices we observe. Assume that consumer k's utility if he purchases from website i is

$$\begin{aligned} u_{iksht} &= \beta_1(Price_{iht} + \beta_2 SalesTax_{isht}) + \beta_3 ShippingTime_{is} + \beta_4 HomeState_{is} \\ &\quad + \beta_5 NeighborState_{is} + \beta_6 SecondScreen_{iht} + \beta_7 SiteB_i + \epsilon_{ik}, \end{aligned}$$

where *SalesTax* is the sales tax in dollars due on the purchase, *ShippingTime* is the UPS ground shipping time, *HomeState* is a dummy variable for whether website i is in state s, *NeighborState* is a dummy for whether website i is in a state bordering state s, *SecondScreen* is a dummy indicating whether website i only appears on the second screen of results, *SiteB* is a dummy for one of the two websites from which we have quantity data, and ϵ_{ik} is a logit random variable independent of the right hand side variables (and of the additional right hand side variables and the error η_{hst} introduced below).

Writing X_{sht} for the vector of attributes on the right hand side of this expression, we have the familiar logit formula for the number of consumers in state s buying from website i conditional on the total number of purchases N_{sht}:

$$E(Q_{isht}|X_{sht}, N_{sht}) = N_{sht} \frac{e^{\beta X_{isht}}}{\sum_{j=1}^{24} e^{\beta X_{jsht}}}$$

Our dataset only contains sales from two particular websites. It does not contain the number of consumers purchasing from other websites, from traditional retailers, or not at all. The total number of consumers buying through Pricewatch is affected by a number of factors: there are clear day-of-week and hour-of-day effects; Internet use is climbing over our sample period; there are substantial price declines that should increase aggregate demand; there is variation in the online-offline price gap; and there may be intertemporal price effects with the size of the potential consumer pool at a given time being affected by past prices. Our data will not allow us to separately identify all of these effects. The approach we take is simply to specify a flexible functional form for the aggregate Pricewatch demand that could reflect each of the effects. Specifically, we assume

$$N_{sht} = \delta_s \overline{q}_h e^{\gamma_1 MinPrice_{ht} + \gamma_2 Weekend_t + \gamma_3 TimeTrend1_t + ... + \gamma_6 TimeTrend4_t} + \eta_{hst},$$

where δ_s is a state fixed effect to be estimated, $\overline{q}_h$ is an hour-of-day fixed effect, $MinPrice_{ht}$ is the lowest price listed on Pricewatch, $Weekend_t$ is a weekend dummy, the $TimeTrend$ variables allow for linear time trends with slopes changing every ninety days, and η_{hst} is a random error term assumed to have mean zero conditional on the right hand side variables in this equation.[21]

We estimate the model via nonlinear least squares, using hour-website-destination state sales as the dependent variable. The large number of observations reflects that we have data on hourly sales into 50 states by two websites in up to 8000 hours.[22] We carry out the estimation four times to obtain independent estimates using data on each of the four products: 128MB PC100 modules, 128MB PC133 modules, 256MB PC100 modules, and 256MB PC133 modules.

[21] Note that we do not include an "outside good" in the discrete-choice set as one might do to attempt to estimate the effect of a logit-inclusive value on aggregate demand. We are thus implicitly assuming, for example, that the total sales by Pricewatch e-retailers to state s are not affected by the states in which the e-retailers are located and the difference between the n^{th} loweset price and the lowest price. We do this because we have little data to estimate such effects, think they must be small, and prefer a more parsimonious model in which fewer coefficients are used to capture aggregate demand effects. Reasons why any inclusive-value effects would be hard to find include that prices on Pricewatch are almost always tightly bunched, and that, in any state other than California, having more than one or two e-retailers on the list from that state is extremely rare.

[22] We drop California from the analysis because the fact that our retailer and most other retailers are located there would make demand different under reasonable departures from our assumptions: "outside goods" could be more important because there will be hours when all of the top firms are California firms that would impose sales tax; and the impact of taxes would differ if there was a random coefficient on the tax variable rather than a coefficient that is homogeneous across comsumers.

Note that we are assuming that it is not necessary to use instruments for the prices on the right hand side of the above equations. We think endogeneity is not a big concern for two main reasons. First, we think the firms have little information about demand shocks. We say this both because there is little information to be had—one would need to identify demand shocks that made moving up on the list and then drifting back down over the course of a few days better than staying put—and because our interaction with the one firm leads us to believe that firms have very little capability to uncover sophisticated demand patterns. Second, even if firms did have information about demand shocks not available to us, we do not think it could be a large part of the variation we are using to identify price and, especially, tax effects. Returning to our example, the tax effect and home-state effect are identified by the sizes of the increase/decrease in Connect Computers' sales into New Jersey and Virginia when Coast-to-Coast Memory and UpgradePlanet.com switch places. Both Coast-to-Coast Memory and UpgradePlanet.com make the vast majority of their sales outside both of these states, so even if they were perfectly informed, one would expect that their decisions about where to be on the list would mostly reflect national demand shocks, not demand shocks in New Jersey and Virginia. With regard to price effects, our main estimate is an effect of relative prices. Most rank changes do not reflect active decision-making: the 4.1 price changes per day lead to 18.3 rank changes per day as each price change bumps several other firms up or down by one position. The drift in position between price changes comprises much of the variation that drives our estimates. Even if firms were jumping up when it was a relatively good time be high on the list, we would be seeing our firm jumping into a high position when it knew demand was good in that position and being pushed out of a high position when other firms knew demand was good in that position. Hence, it is not clear if there would be a correlation between demand levels and our firm's relative price. Endogeneity could be more of a worry with regard to the price effect that is included in the number-of-consumers equation. This estimate is not a focus, however, so we are happy to regard it just as a reduced-form control variable rather than as a demand elasticity.

4.3 Summary Statistics

Table 3 reports summary statistics separately for each of the four types of memory modules. The unit of observation is an hour-state-website. Given that our websites sell zero memory modules to a typical state in a typical hour, average sales figures at this level are quite low. For example, the average number of 128MB PC100 modules sold by a website in one particular hour to one particular state is 0.007.[23] *Price* is the price charged by our websites. Mean prices are about $70 for 128MB modules and about $140 for the 256MB modules. The dramatic price declines that occurred over the year are visible in the minimums and maximums for this variable. *MinPrice* is the lowest price listed on Pricewatch in the hour in question. Our firm's 128MB prices are about $2 to $4 higher than this on average. Its average rank on the Pricewatch list is sixth. The average gap between our firm's 256MB price and the lowest available price is larger. Much of this is due to a period when one firm offered these modules at a very low price. Our firm's average rank is still about sixth. We do not include California in our estimation, so all consumers in the dataset would not need to pay sales tax to buy from our websites. They would need to pay sales tax if they bought from an in-state firm.[24] The average tax that would be paid if buying from an in-state firm is about $5 for a 128MB module and about $9 for a 256MB module.

4.4 Basic Results

Table 5 presents coefficient estimates obtained by performing separate nonlinear least squares estimations on the data for each of the four products: 128MB PC100, 128MB PC133, 256MB PC100, and 256MB PC133. In many ways, the four sets of results are similar.

The most basic fact about the Pricewatch environment is that it is intensely competitive (as we previously noted in Ellison and Ellison (2008)). The coefficients on *Price* in the four columns range from -0.40 to -0.81. The estimate for 128MB PC100 memory modules, for example, corresponds to an own-price elasticity of -35 (holding all variables fixed at their sample means). The estimates are extraordinarily significant. The decrease in demand that

[23] We count a single order of multiple memory modules as having quantity one. For most of our time period, our firm limited purchases of memory modules to one per order.

[24] Customers living in states that do not have a sales tax are an exception.

occurs when our firm raises its price (or is undercut) is so large as to be impossible to miss.

The coefficients on the time-trend variables illustrate the growth (and decline) of Pricewatch over our sample period. The coefficient on *TimeTrend1* in the first column indicates that overall demand was growing at about 2% per day (equivalent to 75% per month) in the first three months of our sample (May-August, 2000). Growth rates for later periods are obtained by adding all of the earlier coefficients. The estimates indicate that sales decreased 50% per month in the fall of 2000, and then declined by a very small percentage per month over the final two quarters of our sample. Growth rates for the other three products are similar, suggesting these patterns are not just product-specific fluctuations.

Figure 2 presents a graph of the hour dummies.[25] They indicate that online shopping picks up substantially between 7am and 11am, continues at approximately the 11am level past the normal workday, remains at about two-thirds of the peak value until midnight, and then drops off substantially until 6am. The large number of late-night purchases suggests that greater availability may be an important factor differentiating e-retail from traditional retail.

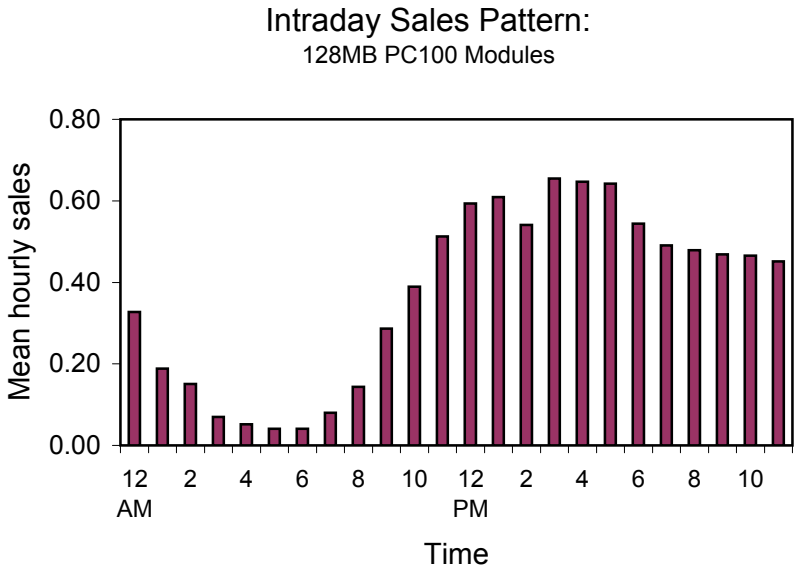

Figure 2: Intraday Sales Pattern: 128MB PC100 memory modules

[25]Recall that we simply set these to the sample mean quantities for each hour rather than making them part of the nonlinear least squares estimation. Sample means are computed on a time-zone adjusted basis with the times of all purchases being recorded from the consumer's perspective.

4.5 Taxes

Recall that in our demand specification consumers are assumed to evaluate products on the basis of $Price + \beta_2 SalesTax$, with $SalesTax$ measured in dollars. Hence, an estimate of one on the $SalesTax$ coefficient would correspond to the standard rational model in which consumers care only about their total expenditure and an estimate of zero would correspond to consumers who are entirely insensitive to tax differences.[26]

The most general conclusion we draw from the four sets of results is that consumers pay less attention to sales taxes than the standard model predicts. The estimates in the four columns are 0.05 (s.e. 0.08), 0.33 (s.e. 0.08), 0.06 (s.e. 0.07), and 0.95 (s.e. 0.38). Note that the first three are significantly different from unity while the second and last are significantly different from zero. We interpret this as evidence that consumers are paying attention to taxes but not as much as to price differences of a similar magnitude.

It is important to note that the fact that consumers pay less attention to tax differences than to price differences does not imply that sales taxes are not important. Our consumers are extraordinarily sensitive to price differences, so even if the coefficient on the $SalesTax$ variable was 0.3, our estimates would be that a firm that must collect a 6% sales tax would have its sales decline by about 50%.

4.6 Geography

Geography enters our demand model in two ways. First, $ShippingTime$ allows for the possiblity that consumers may prefer to buy from e-retailers in nearby states because they will have faster delivery times with standard ground shipping. We find limited evidence of such an effect in these regressions. Two of the four estimates are negative and significant. A coefficient of 0.05 on the $ShippingTime$ variable would indicate that the extra shipping time required to ship a product across the country—about 4 days more than a local shipment—reduces demand by a little less than 20%. This effect is, however, small relative to the price effects in our model: a 50 cent price increase will also reduce demand by 20%.

[26] There are clearly other "rational" models in which the coefficient would be greater than or less than one. An example of the former is if price is a signal of quality so that a high price-zero tax offer is preferable to a low price-high tax offer with the same total expenditure. Examples of the latter would be a model in which consumers have nonselfish preferences and value payments to local governments.

Second, we included the $HomeState$ and $NeighborState$ dummies to allow for the possibility that consumers may have an additional preference for buying from in-state firms. Here, we find stronger evidence that geography does matter. All four estimates on the $HomeState$ variable are positive and three of the four are significant. Two of the four $NeighborState$ estimates are positive and significant. The magnitudes of the coefficient estimates indicate that the home-state preference will roughly offset a two dollar price difference. Such preferences could exist for a variety of reasons. Consumers may simply prefer patronizing a local firm. Or local firms could enjoy a reputational advantage. Or there may be direct benefits from purchasing locally, like the ability to make returns in person.[27] Regardless of their origin, however, such preferences would also favor a more geographically dispersed e-retail sector.

In light of our earlier estimates that consumers pay less attention to differences in sales taxes than to differences in prices, the home-state preference will outweigh the sales-tax disadvantage on moderately priced items. For example, if the $SalesTax$ coefficient is 0.33, the $Price$ coefficient is -0.5, the $HomeState$ coefficient is 1.0 and the tax rate is 6%, then the home-state preference will outweigh the tax disadvantage on items costing $100 or less. The finding that the home state preference is nearly strong enough to outweigh the tax-disadvantage of buying from an in-state firm contrasts with what we saw in our state-level analysis. There, we saw that our firm sells much less in California than in other states. Here, we find that it fares worse in other states when competing against a local firm than when competing agaist other out-of-state firms. One way to reconcile these findings could be a model in which there is heterogeneity in the home state preference. For example, it could be that 25% of consumers have a strong home-state preference and 75% have none. Then, when our firm is competing for California customers it must split the 25% who like California firms with several other California retailers (resulting in a low share), whereas it would sell less into New Jersey when it is competing for a New Jersey customer because it would lose almost all of the 25% with a home-state preference and still face 10 competitors

[27] In practice, we doubt that the latter two effects are very important. We believe that many of these firms are pure e-retailers who are not known in their communities and that most would not accept in-person returns. The firm we visited did not even have a sign on its building giving its name, and explained that this reduced the risk of theft. Having recourse in state courts could be another benefit.

for the other 75% of the New Jersey population. We cannot, however, provide any strong support for this story over may others, *e.g.,* it could be that consumers in some states have a strong preference for buying locally whereas California consumers do not.

5 Conclusion

In this paper we have examined Internet retail demand using two different approaches: a cross-sectional analysis of demand in different states and a discrete-choice analysis of demand at an hourly frequency. The two analyses exploit separate sources of variation in the data: the state-level analysis ignores all of the variation in competitive conditions; and the discrete-choice analysis uses state fixed effects to absorb any persistent factors like tax rates.

Our most basic conclusion on sales taxes is that they are an important driver of e-retail activity. Our state-level regressions show clearly that sales are higher in states that levy higher sales taxes on traditional retail purchases. The fact that the websites we study sell so little in California is strong evidence that what we are picking up is a tax effect and not some artifact of unobserved heterogeneity. The environment we study is somewhat unusual in that consumers are highly savvy and price-sensitive, but in this environment at least, we would agree with Goolsbee's (2001) conclusion that applying sales taxes to e-retail sales could reduce e-retail demand by one-quarter or more. In our discrete-choice analysis we find that consumers do not pay as much attention to differences in taxes as they do to differences in pre-tax prices when choosing between e-retailers. Taxes do matter to consumers, though, and given how tightly distributed prices in this market are, they can have large effects on consumer behavior.

The state-level analysis indicates that geography still matters in e-retail. The websites we study make more sales to states that are closer to California in a shipping-time metric. In the discrete-choice analysis we find that consumers have a preference for buying from in-state e-retailers. We think this is an interesting result on the sources of geographic differentiation. It has implications for market structure that would differ from what one would obtain from thinking about shipping times. A world where consumers care about purchasing from their home state could lead to a less concentrated e-retail sector with

many small firms, whereas a world where consumers do not have a home-state preference but do care about shipping times could lead to a sector dominated by a few large firms that effectively use distributed warehouses to minimize both shipping times and sales tax liabilitites.

Taken together we also see our results as suggesting that bounds on consumer rationality or consumer search and computation costs may be important. Taxes matter to our consumers, but we find a less than one-for-one with item prices. Brynjolfsson and Smith (2001), in contrast, found that consumers react twice as strongly to tax differences as they do to item price differences. One source of the difference could be that they study an environment in which taxes are explicity presented to consumers in a list that is sorted on the basis of tax-inclusive prices.[28]

Technically, our analysis is standard. What could perhaps be more broadly useful is our suggestion that discrete-choice models may be usefully applied to datasets containing quantity data for one firm. Price data for all of the firms in a market are fairly easy to come by. Quantity data are much harder to obtain. There may, however, be many other situations like ours where quantity data could be obtained from one firm. (This could even be done in a field experiment.) Our example suggests that this may be a fruitful way to explore interfirm competition.

[28]Hossain and Morgan (2006) find that consumers do not fully take shipping costs into account in a neatly-designed field experiment involving selling items on eBay. A commonality between shipping costs in their experiment and tax differences on Pricewatch is that the shipping cost differences were easily available in the item descriptions, but some effort would have been required to learn the differences.

References

Baye, Michael, Rupert J. Gatti, Paul Kattuman, and John Morgan (2006). "Clicks, Discontinuities, and Firm Demand Online", Indiana University, University of Cambridge, and University of California-Berkeley, mimeo.

Baye, Michael, and John Morgan (2004). "Price Dispersion in the Lab and on the Internet: Theory and Evidence," *Rand Journal of Economics*, 35 (3), 449-466.

Baye, Michael, John Morgan, and Patrick Scholten (2006). "Information, Search, and Price Dispersion," in T. Hendershott, ed. *Handbook of Economics and Information Systems*, Amsterdam: Elsevier.

Brown, Jeffrey and Austan Goolsbee (2002). "Does the Internet Make Markets More Competitive? Evidence from the Life Insurance Industry," *Journal of Political Economy*, 110 (3), 481-507.

Brynjolfsson, Erik and Michael Smith (2001). "Consumer Decision-making at an Internet Shopbot," *Journal of Industrial Economics,* 49 (4), 541-558.

Chevalier, Judith and Austan Goolsbee (2003). "Price Competition Online: Amazon Versus Barnes And Noble," *Quantitative Marketing and Economics*, 1 (2), 203-222.

Chiou, Leslie (2008). "Empirical Analysis of Competition Between Wal-Mart and Other Retail Channels," *Journal of Economics and Management Strategy*, forthcoming.

Davis, Peter (2008). "Spatial Competition in Retail Markets: Movie Theaters," *RAND Journal of Economics*, 37 (4), 964-982.

Ellison, Glenn (2005). "A Model of Add-on Pricing," *Quarterly Journal of Economics*, 120 (2), 585-637.

Ellison, Glenn and Sara Fisher Ellison (2005). "Lessons about Markets from the Internet," *Journal of Economic Perspectives*, 19 (2), 139-158.

Ellison, Glenn and Sara Fisher Ellison (2008). "Search, Obfuscation, and Price Elasticities on the Internet," *Econometrica*, forthcoming.

Forman, Chris, Anindya Ghose, and Avi Goldfarb (2008). "Competition Between Local and Electronic Markets: How the Benefit of Buying Online Depends on Where You Live," *Management Science*, forthcoming.

Fox, William (1986). "Tax Structure and the Location of Economic Activity Along State Border," *National Tax Journal*, 39 (4), 387-401.

Goolsbee, Austan (2000). "In a World without Borders: The Impact of Taxes on Internet Commerce," *Quarterly Journal of Economics*, 115 (2), 561-576.

Goolsbee, Austan (2001). "Competition in the Computer Industry: Online Versus Retail," *Journal of Industrial Economics*, 49 (4), 487-499.

Greene, William H. (1997): *Econometric Analysis*. Prentice Hall.

Hausman, Jerry, Bronwyn Hall and Zvi Griliches (1984): "Economic Models for Count Data with an Application to the Patents-R&D Relationip," *Econometrica* 52, 909-938.

Hossain, Tanjim and John Morgan (2006): "...Plus Shipping and Handling: Revenue (Non)Equivalence in Field Experiments on eBay," *Advances in Economic Analysis & Policy*, 6, Article 3.

Walsh, Michael and Jonathan Jones (1988). "More Evidence on the 'Border Tax' Effect: The Case of West Virginia," *National Tax Journal*, 41 (2), 261-265.

Weisbrod, G., R. Parcells and C. Kern (1984). "A Disaggregate Model for Predicting Shopping Area Market Attraction," *Journal of Retailing*, 60 (1), 65-83.

Zentner, Alejandro (2006). "Measuring the Effect of File-Sharing on Music Purchases," *Journal of Law and Economics*, 49, 63–90.

Variable	Mean	St.Dev	Min	Max
$Quantity128$	203.5	176.0	19.0	762.0
$Quantity256$	85.6	84.3	5.0	391.0
$OfflineSalesTaxRate$	0.057	0.021	0.000	0.084
$InternetAccess$	0.57	0.07	0.41	0.70
$ShippingTime$	3.89	0.92	1.50	5.00
$\frac{ComputerStores}{GasStations}$	0.092	0.034	0.041	0.184
$\log(Population)$	15.02	1.04	13.11	17.33
$Income$	41.35	6.29	29.70	55.15
$FractionBA$	0.15	0.03	0.09	0.22
$FractionGrad$	0.09	0.03	0.05	0 .21
$HomeComputer$	0.57	0.06	0.42	0.68

Table 1: Summary statistics for state-level regressions

	Dependent Variable			
	Quantity128	*Quantity256*	*Quantity128*	*Quantity256*
OfflineSalesTaxRate	5.96	6.33	6.14	7.21
	(2.16)	(2.59)	(3.04)	(2.93)
California	-1.03	-0.84	-0.99	-0.81
	(4.01)	(3.21)	(4.64)	(3.43)
ShippingTime	-0.10	-0.07	-0.08	0.002
	(2.04)	(1.32)	(1.40)	(0.03)
Internet Access	1.89	1.04	3.72	0.36
	(2.62)	(1.25)	(2.82)	(0.23)
$\frac{ComputerStores}{GasStations}$	1.90	4.39	2.61	5.48
	(1.11)	(2.29)	(1.42)	(2.41)
$\log(Population)$	0.85	0.89	0.90	0.93
	(20.54)	(18.98)	(22.77)	(19.24)
Income			-0.04	-0.02
			(4.05)	(2.01)
Fraction BA			1.53	1.50
			(0.78)	(0.63)
Fraction Grad			1.49	-1.54
			(0.69)	(0.56)
Home Computer			0.12	2.15
			(0.08)	(1.20)
Observations	51	51	51	51

Note: The first two columns report estimates from negative binomial regressions with *Quantity128* and *Quantity256* as dependent variables. The third and fourth columns add additional control variables. t-statistics in parentheses.

Table 2: State-level regressions

Variable	Mean	St.Dev	Min	Max	Mean	St.Dev	Min	Max
	128MB PC100				128MB PC133			
Quantity	0.007	0.085	0	4	0.006	0.077	0	4
Price	66.24	34.37	21	123	73.82	36.55	21	131
MinPrice	62.51	33.36	20	122	71.50	37.06	20	131
Rank	6.40	4.12	1	21	5.97	4.41	1	21
	Number of Obs.: 793950				Num. Obs.: 707350			
	256MB PC100				256MB PC133			
Quantity	0.002	0.047	0	3	0.004	0.064	0	4
Price	130.77	65.22	43	258	146.52	79.79	39	291
MinPrice	121.13	58.39	43	215	135.99	73.50	39	269
Rank	5.79	3.15	1	12	6.20	3.08	1	12
	Number of Obs.: 645200				Num. Obs.: 648150			

Table 3: Summary statistics for individual-level regressions

	Product			
	128MB PC100	128MB PC133	256MB PC100	256MB PC133
Variables affecting choices between sites				
$Price$	-0.56	-0.81	-0.43	-0.40
	(64.17)	(53.76)	(37.08)	(58.46)
$SalesTax$	0.05	0.33	0.06	0.95
	(0.59)	(3.89)	(0.78)	(2.50)
$HomeState$	0.47	1.40	1.06	0.75
	(2.27)	(5.83)	(3.33)	(1.21)
$NeighborState$	-0.05	-0.34	0.73	0.64
	(0.38)	(2.33)	(4.85)	(6.95)
$ShippingTime$	-0.03	-0.07	0.06	-0.05
	(1.28)	(2.00)	(1.69)	(2.09)
$SecondScreen$	-1.32	-0.60		
	(1.94)	(2.68)		
Variables affecting total Pricewatch demand				
$Weekend$	-0.42	-0.41	-0.37	-0.73
	(20.38)	(16.21)	(9.42)	(20.69)
$MinPrice$	-0.03	-0.03	-0.02	-0.03
	(14.09)	(13.04)	(11.00)	(16.82)
$TimeTrend1$	0.02	0.02	0.01	0.03
	(12.66)	(15.39)	(3.39)	(8.47)
$TimeTrend2$	-0.04	-0.03	-0.01	-0.05
	(11.54)	(8.93)	(2.95)	(8.62)
$TimeTrend3$	0.02	0.00	-0.00	0.01
	(10.36)	(1.01)	(2.30)	(4.08)
$TimeTrend4$	-0.00	-0.01	0.01	0.01
	(4.00)	(5.60)	(5.34)	(10.86)
Observations	793950	707350	645200	648150
R^2	0.03	0.02	0.01	0.03

Note: Dependent variables are number of distinct customers in each of ten states ordering from each of websites A and B in each of approximately 7900 hours. Regressions also contain state and website dummies. t-statistics are in parentheses.

Table 4: Discrete-choice model of hourly sales of memory modules in ten states

State and Local Government Sales Tax Revenue Losses from Electronic Commerce[1]

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State and Local Government Sales Tax Revenue Losses from Electronic Commerce

EXECUTIVE SUMMARY

The development of new technologies and digital processes has had a profound effect on the U.S economy as e-commerce sales have grown from $995.0 billion in 1999 to $2,385 billion by 2006. The rapid growth in e-commerce affects state and local economies in several important ways. First, state and local governments continue to lose sales and use tax revenues because of the inability to collect taxes that are due. Second, firms change their best business practices to avoid creating a collection responsibility in certain states. Firms choose to locate their selling or warehousing activities to avoid creating nexus rather than locating where they can operate most efficiently. Also, local vendors face a competitive disadvantage to e-commerce competitors as consumers browse in shops on Main Street but then make their purchases online to evade the tax. Finally, there may be distributional consequences if lower-income consumers are more likely to make purchases in local stores where the tax is collected.

We estimate state and local sales tax losses arising from e-commerce for 46 states and the District of Columbia using both a baseline forecast and an optimistic forecast for e-commerce growth. B2B (business-to-business) sales account for approximately 93 percent of total e-commerce. In the baseline case, we estimate that annual national state and local sales tax losses on e-commerce will grow to $11.4 billion by 2012 for a six-year total loss of $52 billion. The more optimistic growth case estimates losses to reach $12.65 billion by 2012 and an aggregate loss of $56.3 billion.

We view our estimates as lower bounds on the expected sales tax revenue losses. First, we use a conservative methodology for forecasting e-commerce. Second, we did not seek to account for the additional losses associated with non-registered vendors operating in the states. Third, we assume that the taxability of e-commerce transactions is the same as for overall commerce, even though we suspect that the ability to evade the tax should shift the mix of e-commerce more towards taxable sales.

Changing the law to require remote vendors to collect sales and use taxes would recover a significant portion of the estimated losses, although we acknowledge that some noncompliance would remain More importantly, our estimates are revenue losses associated with e-commerce and not all remote sales, and yet the proposed legislation covers other types of remote commerce, such as mail order, telephone orders, and deliveries made across state lines by unregistered businesses. Estimating the sales tax revenue losses associated with all remote commerce is beyond the scope of this study, but we believe the revenue implications are much larger than for e-commerce alone. For example,

applying the methodology we used to estimate e-commerce losses, we estimate losses relating only to the B2C (business-to-consumer) component of mail orders sales to be $6.8 billion by 2012. As a result, total revenue gains from requiring various forms of remote vendors to collect sales and use tax will be significantly larger than what we estimate in this report for e-commerce.

INTRODUCTION

The advent and remarkable development of digital technologies and e-commerce have had profound effects on the U.S. economy. New products and innovative ways to sell, deliver and receive goods and services have developed. New technologies are affecting almost every aspect of business processes and every industry, dramatically enhancing productivity of the U.S. economy. Both pre-existing and new firms have benefited from integrating digital technologies into production processes and the advances have been an important factor in the country's economic growth since at least the mid-1990s.

Specifically, using new technologies and digital processes to facilitate remote commerce have been a visible benefit to a wide range of businesses and their customers. E-commerce sales have grown at a vigorous pace for nearly 10 years and we believe that the tempo will remain very strong. According to the U.S. Bureau of the Census, e-commerce sales grew from $995.0 billion in 1999 to $2,385 billion by 2006, a 13.3 percent compound annual growth rate.[2]

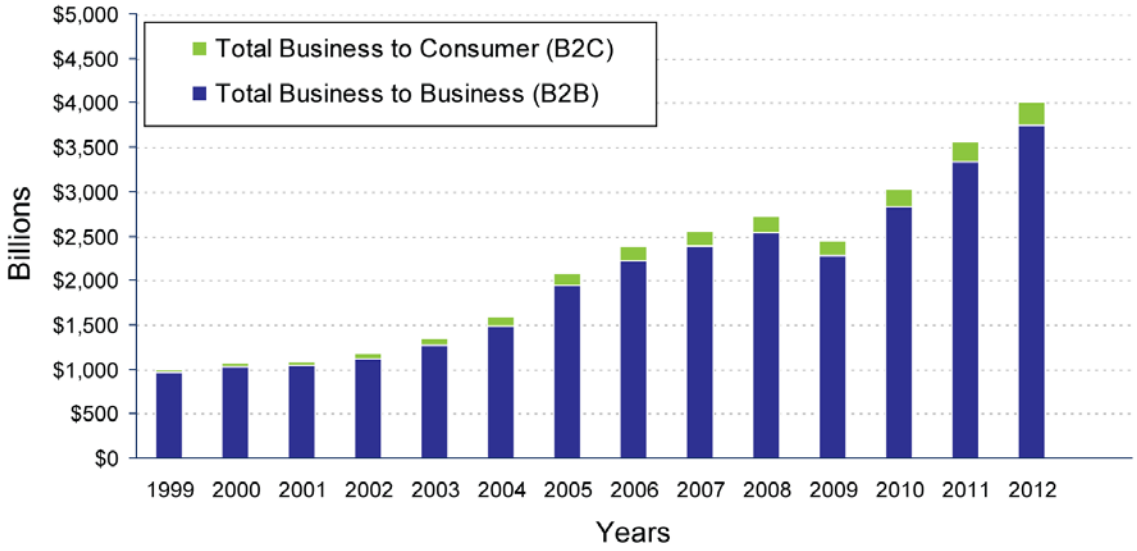
Past and expected future performance of e-commerce sales are illustrated in Figure 1 (including our baseline forecast from 2007 through 2012). We expect e-commerce sales to continue rising through the 2012 forecast horizon. E-commerce activity slowed during the recession at the beginning of the decade and is likely to slow again along with the rest of the economy during the current recession. Nonetheless, it should be noted that despite the current recession, the initial analysis of *Internet Retailer* suggests that 2008 e-commerce sales expanded 21.4 percent from the previous year.[3] We are forecasting a sound, though less vibrant, 9.0 percent annual increase from 2006 through 2012. Most e-commerce sales continue to be business to business (B2B) transactions.[4] B2B represented 92.8 percent of e-commerce sales in 2003, and rose slightly to 93.3 percent in 2006. The balance is of course business to consumer (B2C) sales. These findings evidence that the greatest implications of e-commerce to date have been on the ways that businesses work with each other rather than the ways that businesses relate to final consumers.

[2] See http://www.census.gov/eos/www/2006/all2006tables.html.
[3] See http://www.internetretailer.com/dailyNews.asp?id=29389.
[4] For general discussion purposes in this report, B2B sales are those made by manufacturers and wholesalers and B2C sales are those made by retailers. We recognize that manufacturers and wholesalers sell to individual consumers and retailers sell to businesses but we have no data allowing us to provide a detailed analysis of individual buyers. Sales by service providers are split evenly between B2B and B2C.

IMPLICATIONS FOR SALES TAX REVENUES

Concerns about state and local governments' ability to collect sales taxes on remote commerce have been expressed at least dating back to the writings of John Due in the 1960s. Much of the collection problem arises because states are unable to require remote vendors to remit the tax given the nexus restrictions arising from *Quill v. North Dakota.*[5] Perhaps the biggest consequence is that the US economy is harmed as firms change their best business practices to avoid creating a collection responsibility in certain states. For example, firms choose where to locate their sales or warehousing operations to avoid creating nexus rather than locating where they can operate most efficiently. We all lose from the higher economic costs associated with these decisions. Also, local vendors face a competitive disadvantage as consumers browse in shops on Main Street but then make their purchases online to evade the tax. There might also be distributional consequences if lower income consumers are more likely to make purchases in local stores where the tax is collected. Lost sales tax revenues have been an increasingly important issue as catalog sales grew and more recently with the dramatic rise in electronic commerce.

Figure 1: Estimated Total E-Commerce Sales



*Sales-taxing states only.

Several inclusive study groups have been formed during the past decade to investigate wide dimensions of e-commerce transactions and the relationship with state-local taxation, including whether e-commerce transactions should be incorporated into the sales tax base and if so how best to integrate these

[5] *Quill Corp. v. North Dakota*, 504 U.S. 298 (1992).

transactions into the base. The National Tax Association's *Communications and Electronic Commerce Project* was one of the first careful investigations into e-commerce tax implications. It was followed closely by the congressionally-initiated *Advisory Commission on Electronic Commerce*. More recently and more comprehensively, the *Streamlined Sales Tax Project* has tackled these issues through the operations of the Streamlined Sales Tax Governing Board and associated activities.

At the same time, a number of studies have been conducted on the revenue losses associated with the inability of state and local governments to enforce sales and use tax collections on transactions conducted through e-commerce. Among the earlier studies are three performed by us (Bruce and Fox, 2000, 2001, and 2004). These studies were based on the available information of the day, but were constrained by very limited experience with the extent of e-commerce and its taxability. This study updates estimates of the amount of sales and use taxes that states are unable to collect because of transactions that take place through e-commerce. The current analysis benefits from much richer history and data on the levels of e-commerce activity, the industries in which e-commerce transactions are conducted, and the taxability of these transactions.

The remainder of the report is broken into three sections. The first provides our estimates of the sales tax losses by state and the aggregate for the nation through 2012. The second provides several extensions of our analysis, including the effects of proposed legislation with a small seller exemption. The final section discusses our methodology in significant detail.

FINDINGS

National Findings

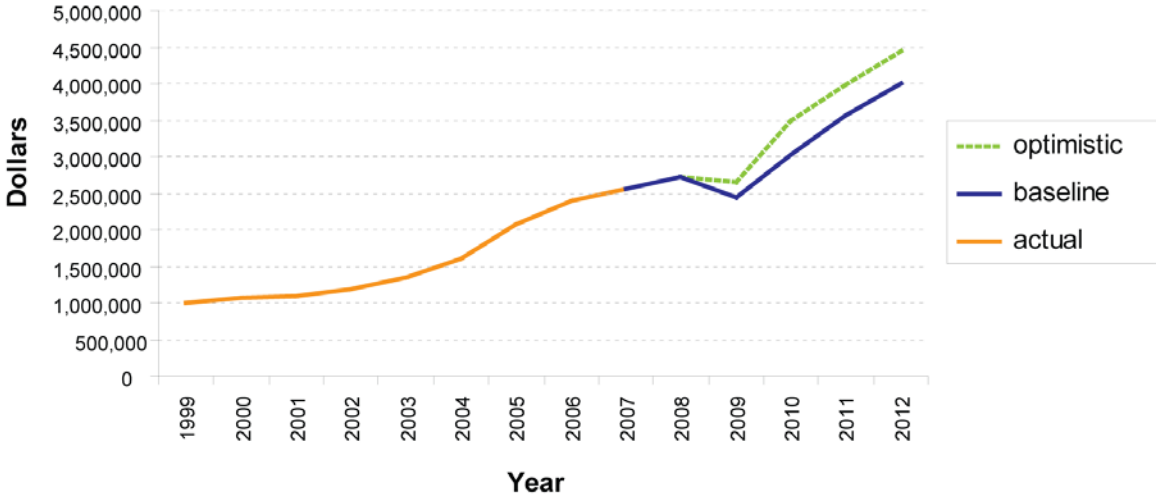
Estimated state and local sales tax revenue losses are reported in Table 1 for every sales-taxing state including Alaska, [6] using both a baseline forecast and an optimistic forecast for the economy.[7] The only difference between these two cases is the rate of economic growth, which results in a more vigorous forecast of e-commerce sales in the optimistic scenario. Details of the methodology used to prepare the e-commerce estimates are provided below.

Figure 2 shows actual e-commerce growth for the period 1999-2006 and our baseline and optimistic estimates for 2007-2012.[8] In the baseline case we forecast e-commerce sales to rise from $3.0 trillion in 2010 to $4.0 trillion in 2012. The national state and local sales tax loss on these transactions is

[6] Alaska has no state sales tax but has local sales taxes. Thus, the aggregate of Alaska local governments is included in our estimates for sales taxing jurisdictions.
[7] As we note in the methodology section, we believe the estimates presented are the lower bounds of the sales tax revenue losses from e-commerce based on two different forecasts of e-commerce growth.
[8] Our forecast horizon must begin at the end of the Census data, even though the first two years have already occurred.

expected to grow from $8.6 billion in 2010, the first year following the recession, to $11.4 billion in 2012. The losses total $52.1 billion over our six year forecast horizon. These losses are equal to what states would collect if they could achieve 100 percent compliance on the sales and use taxes due on e-commerce sales and arise because states are unable to enforce collection, particularly because of limitations such as those imposed by *Quill v. North Dakota*. The losses arise because 25 percent of taxes due on e-commerce go uncollected. The revenue losses associated with a more optimistic estimate of e-commerce growth are about 10 percent higher. It is important to realize that the estimated sales and use taxes that are currently collected on these transactions are much greater than our estimates of the loss. We estimate sales tax collections on e-commerce transactions to rise from about $26.1 billion in 2010 to $34.5 billion in 2012.

Figure 2: E-Commerce History and Forecasts



To be sure, the revenue losses in Table 1 are not necessarily what states would stand to collect if Congress permitted states to require remote vendors to collect and remit taxes. Our estimates also depend on whether the legislation includes a small vendor exception. Some noncompliance would remain after such a policy change, but several facets of our methodology lead us to view our estimates as lower bounds on the expected revenue losses. First, we used a conservative methodology for forecasting e-commerce. Second, we did not seek to account for the additional losses associated with non-registered vendors operating in states. Third, we assumed that the taxability of e-commerce transactions is the same as for overall commerce even though we suspect that the ability to evade the tax should shift the mix of e-commerce more towards taxable sales.

More importantly, our estimates are revenue losses associated with e-commerce and not all remote sales. We rely on U.S. Census definitions of e-

commerce which begin with data from the Bureau's various surveys. One example is the survey underlying the 2006 Annual Retail Trade Report, which employs the following definition, "E-commerce sales and other operating receipts are sales of goods and services where an order is placed by the buyer; or price and terms of the sale are negotiated over an Internet, extranet, EDI network, electronic mail or other online system. Payment may or may not be made online."[9] Thus, sales that are consummated or negotiated via telephone or the mail are not included in our analysis but federal legislation allowing states to require remote vendors to collect the tax would also apply to these transactions. Further, vendors that sell to businesses and residents in surrounding states (and other non-registered vendors operating in the states) are not likely to collect the tax on many sales that are delivered to the other states. Again, the legislation would apply to these transactions. Proposed legislation may also pertain to taxation of telecommunications and this is not considered in this report.

Estimating the sales tax revenue losses associated with all remote commerce is beyond the scope of this study, but we believe the revenue implications are much larger than for e-commerce alone. One indication is the revenue loss associated with non-e-commerce sales by non-store retailers,[10] which are one category of B2C transactions. These non-store retailers had $115.6 billion in 2006 sales beyond their $75.2 billion in electronic commerce sales, evidencing that e-commerce only comprises 40 percent of the sales of non-store retailers. These are the B2C sales by retailers that operate without a store front, and this amount does not include similar B2B sales. Given that B2B dominates the e-commerce side, the B2B remote sales conducted in means other than e-commerce are presumably much larger than B2C.[11]

To get some sense of the additional revenue impact of federal legislation on non-e-commerce sales, we forecasted the non-e-commerce sales forward to 2012. We then added the non-e-commerce remote sales (for example, catalog sales by retailers with stores) by retailers with stores (except for the sales of motor vehicles), which are a little less than one-tenth as large as the non-store retailers. We then applied the same methodology as we describe below for e-commerce and estimated that states are losing $6.8 billion in sales tax collections on these transactions. This loss in tax revenues for the non-e-commerce sales is very large, and it is more than one half as large as our total estimates of losses from e-commerce sales (which amounted to $11.4 billion in 2012). It is important to keep in mind that the $6.8 billion estimate does not include two other forms of non-e-commerce remote transactions that we believe account for even larger tax revenue losses: remote B2B sales other than e-commerce and non-registered vendors and other activity along state borders.

[9] See http://www.census.gov/svsd/retlann/pdf/06sa44c.pdf.
[10] These are large and small retailers that sell through various channels that include online, catalog, and television, but do not sell through retail stores. The specific firms categorized as non-store retailers are determined through the Census survey process but could include retailers such as Amazon, Zappos, and 1-800-flowers. The Census separately categorizes the online sales from the other types of sales for these vendors.
[11] Unfortunately, the Census does not report comparable sales for B2B.

Our approach is described in detail in the methodology section beginning on page 13. This paragraph provides an overview of some aggregate results. In general, state sales taxes apply to sales of tangible goods unless the state otherwise exempts them, but apply only to specifically identified services. States vary widely to the extent that they exempt goods and impose the sales tax on services. Using the (non-DC) average taxability for each NAICS category along with each category's share of total e-commerce, we find that 18.2 percent of e-commerce transactions is taxable, with a range from 9.0 percent in Michigan to over 20 percent in a number of states (see Table 2).[12] Thus, we estimate that five-sixths of e-commerce sales are not taxable under current statutes. Determination of taxability is described in greater detail below. We estimate a compliance rate of about three-fourths (75.1 percent) on the taxable sales, with non-compliance on the remaining taxes that are due. Combined, we estimate that taxes are uncollected on a little more than four percent of e-commerce.

[12] See discussion on taxability of e-commerce sales starting on page 15.

Table 1: National Total State and Local E-Commerce and Revenue Losses ($millions)

	2007	2008	2009	2010	2011	2012
Baseline E-Commerce Growth Scenario						
Total Business-to-Business E-commerce	2,325,701	2,480,011	2,231,283	2,767,010	3,253,412	3,656,856
Total Business-to-Consumer E-commerce	168,081	179,233	161,257	199,975	235,128	264,285
Total E-Commerce	2,493,782	2,659,244	2,392,540	2,966,985	3,488,540	3,921,140
Estimated Taxes Due	29,177	31,113	27,992	34,713	40,815	45,877
Estimated Taxes Collected	21,931	23,386	21,041	26,093	30,679	34,484
Estimated Total State and Local Revenue Loss	**7,246**	**7,726**	**6,951**	**8,620**	**10,136**	**11,393**
Optimistic E-Commerce Growth Scenario						
Total Business-to-Business E-commerce	2,325,701	2,486,222	2,408,247	3,184,050	3,634,500	4,060,293
Total Business-to-Consumer E-commerce	168,081	179,682	174,047	230,115	262,669	293,442
Total E-Commerce	2,493,782	2,665,904	2,582,294	3,414,165	3,897,170	4,353,735
Estimated Taxes Due	29,177	31,191	30,212	39,945	45,596	50,938
Estimated Taxes Collected	21,931	23,445	22,710	30,025	34,273	38,288
Estimated Total State and Local Revenue Loss	**7,246**	**7,746**	**7,503**	**9,920**	**11,323**	**12,650**

Table 2: Overall Taxability of Electronic Commerce

State	Percent Taxable
Arkansas	11.61
Arizona	18.14
Colorado	16.16
Connecticut	10.59
District of Columbia	22.89
Florida	16.83
Illinois	23.28
Kansas	21.60
Kentucky	17.84
Louisiana	22.89
Massachusetts	18.71
Michigan	8.97
Minnesota	21.01
North Carolina	14.40
North Dakota	11.86
Nebraska	16.45
New Jersey	10.49
Nevada	22.38
Ohio	15.43
Oklahoma	15.45
Pennsylvania	19.08
Rhode Island	14.01
South Carolina	18.32
South Dakota	15.53
Tennessee	16.33
Texas	11.80
Vermont	16.39
Washington	12.59
West Virginia	19.24
Non-DC Average*	18.24

*Note: This value is assigned to all non-responding states.

State Findings

State level calculations are provided in Tables 3 through 6. These tables contain our estimates for the combination of state and local governments under the baseline scenario.[13] Results for the optimistic scenario are in Appendix A.[14] Table 3 provides our estimates of the tax revenue that are due on taxable e-commerce transactions given our estimates of taxability and our forecasts of e-commerce purchases by residents and businesses within each state. We anticipate that $34.7 billion in sales taxes will be due in 2010, and this amount will rise to $45.9 billion by 2012. The amounts vary radically across states depending on the size of each state's economy and characteristics of each state's sales tax structure. For example, $5.8 billion will be due in California alone in 2010.

Table 4 reports our estimates of the sales taxes that are actually collected on e-commerce for each state. Again, the collections vary dramatically by state with over $2.1 billion expected to be collected in New York alone in 2010. Table 5 contains our estimates of the uncollected taxes, or the losses associated with the inability to collect taxes that are due. The losses are equal to the values that are due as reported in Table 3 minus those that are collected, as reported in Table 4. We estimate that California will fail to collect more than $1.4 billion in 2010 and more than $8.7 billion over our six year forecast horizon[15] because of limitations arising from nexus and other restrictions on administrative options. Finally, to better illustrate the overall budgetary impact of the estimated e-commerce revenue losses, we show e-commerce sales tax revenue losses as a percent of the 2007 adjusted state and local sales tax revenues from all sources in each state in Table 6. We find that the losses average 2.9 percent of collections in 2010, and 3.8 percent of collections in 2012. The lowest percentage loss is estimated to occur in Michigan (excluding Alaska) and the highest in Louisiana. The differences in the relative loss arise because of variation in the state tax structures including tax rates and the share of transactions that are taxable.

We also estimated the revenue losses for New York City and Chicago (Cook County). The losses attributable to these cities, which include losses for both state and local taxes, account for nearly half of their respective states' totals (see Table 7). For example, New York City will lose $433 million in 2012 and Chicago will lose $254 million in 2012.

[13] The loss is based on the state rate plus the weighted average local rate. The weighted average local rate is calculated as local sales tax collections divided by the state sales tax base. The loss allocated to local governments can be calculated by using the ratio of the weighted average local rate to the total rate.
[14] While the revenue losses under the optimistic scenario are larger than the loss under the baseline scenario, the revenues collected would also be higher under the optimistic scenario.
[15] Of course, California has already foregone the revenue in 2007 and 2008, two years that were important to development of a large fiscal gap that necessitated a higher sales tax rate among other policy responses.

Table 3: Total State and Local Sales and Use Taxes Due on E-Commerce ($millions)

	Baseline Scenario						
	2007	2008	2009	2010	2011	2012	Total
Alabama	429.7	458.2	412.3	511.2	601.1	675.7	3,088.2
Alaska	3.8	4.0	3.6	4.5	5.3	6.0	27.3
Arizona	928.2	989.8	890.5	1,104.3	1,298.5	1,459.5	6,670.8
Arkansas	285.5	304.4	273.9	339.7	399.4	448.9	2,051.7
California	4,898.3	5,223.3	4,699.5	5,827.8	6,852.3	7,702.0	35,203.2
Colorado	438.0	467.0	420.2	521.1	612.7	688.6	3,147.5
Connecticut	161.3	172.0	154.7	191.9	225.6	253.6	1,159.0
District of Columbia	90.1	96.0	86.4	107.2	126.0	141.6	647.3
Florida	2,056.0	2,192.4	1,972.5	2,446.1	2,876.1	3,232.7	14,775.7
Georgia	1,043.5	1,112.8	1,001.2	1,241.5	1,459.8	1,640.8	7,499.6
Hawaii	149.5	159.4	143.4	177.9	209.2	235.1	1,074.5
Idaho	117.1	124.9	112.4	139.3	163.8	184.2	841.7
Illinois	1,299.9	1,386.1	1,247.1	1,546.5	1,818.4	2,043.9	9,341.8
Indiana	497.2	530.2	477.0	591.5	695.5	781.8	3,573.3
Iowa	223.0	237.8	214.0	265.3	312.0	350.7	1,602.7
Kansas	380.0	405.2	364.6	452.1	531.6	597.5	2,731.2
Kentucky	291.5	310.9	279.7	346.9	407.8	458.4	2,095.3
Louisiana	989.1	1,054.7	948.9	1,176.8	1,383.6	1,555.2	7,108.4
Maine	80.6	85.9	77.3	95.9	112.7	126.7	579.1
Maryland	467.3	498.3	448.3	556.0	653.7	734.7	3,358.3
Massachusetts	331.7	353.7	318.3	394.7	464.0	521.6	2,384.0
Michigan	360.0	383.9	345.4	428.3	503.6	566.1	2,587.3
Minnesota	590.1	629.3	566.2	702.1	825.5	927.9	4,241.1
Mississippi	338.4	360.9	324.7	402.7	473.4	532.2	2,432.3
Missouri	534.9	570.4	513.2	636.4	748.3	841.1	3,844.4
Nebraska	153.9	164.1	147.6	183.1	215.3	242.0	1,105.9
Nevada	431.3	460.0	413.8	513.2	603.4	678.2	3,099.9
New Jersey	513.4	547.5	492.6	610.9	718.3	807.3	3,690.0
New Mexico	304.0	324.1	291.6	361.6	425.2	477.9	2,184.4
New York	2,334.3	2,489.1	2,239.5	2,777.2	3,265.4	3,670.3	16,775.8
North Carolina	545.7	581.9	523.6	649.3	763.4	858.1	3,921.9
North Dakota	39.9	42.6	38.3	47.5	55.9	62.8	287.1
Ohio	783.0	834.9	751.2	931.6	1,095.3	1,231.2	5,627.2
Oklahoma	354.6	378.2	340.2	421.9	496.1	557.6	2,548.7
Pennsylvania	871.2	929.0	835.8	1,036.5	1,218.7	1,369.9	6,261.2
Rhode Island	72.0	76.7	69.0	85.6	100.7	113.1	517.1
South Carolina	315.0	335.9	302.2	374.7	440.6	495.2	2,263.5
South Dakota	72.2	77.0	69.3	85.9	101.0	113.5	519.0
Tennessee	1,047.7	1,117.2	1,005.1	1,246.5	1,465.6	1,647.3	7,529.3
Texas	2,230.4	2,378.3	2,139.8	2,653.6	3,120.0	3,506.9	16,029.1
Utah	224.8	239.7	215.7	267.4	314.5	353.4	1,615.5
Vermont	60.7	64.7	58.2	72.2	84.9	95.4	436.1
Virginia	528.1	563.1	506.7	628.3	738.8	830.4	3,795.4
Washington	753.3	803.2	722.7	896.2	1,053.7	1,184.4	5,413.6
West Virginia	126.0	134.3	120.9	149.9	176.2	198.1	905.4
Wisconsin	360.1	384.0	345.5	428.5	503.8	566.2	2,588.1
Wyoming	70.5	75.2	67.7	83.9	98.7	110.9	506.9
TOTAL	29,176.8	31,112.6	27,992.3	34,713.2	40,815.2	45,876.6	209,686.7

Table 4: Total State and Local Sales and Use Tax Collections on E-Commerce Sales ($millions)

	Baseline Scenario						
	2007	2008	2009	2010	2011	2012	Total
Alabama	321.4	342.7	308.3	382.3	449.6	505.3	2,309.6
Alaska	2.8	3.0	2.7	3.4	4.0	4.5	20.4
Arizona	693.0	739.0	664.9	824.5	969.5	1,089.7	4,980.5
Arkansas	213.1	227.2	204.4	253.5	298.1	335.0	1,531.2
California	3,687.1	3,931.7	3,537.4	4,386.7	5,157.9	5,797.5	26,498.4
Colorado	328.1	349.9	314.8	390.4	459.0	515.9	2,358.0
Connecticut	120.7	128.7	115.8	143.6	168.9	189.8	867.5
District of Columbia	67.5	71.9	64.7	80.3	94.4	106.1	484.8
Florida	1,544.8	1,647.3	1,482.0	1,837.9	2,161.0	2,428.9	11,101.8
Georgia	782.6	834.5	750.8	931.1	1,094.8	1,230.5	5,624.4
Hawaii	111.4	118.7	106.8	132.5	155.8	175.1	800.3
Idaho	87.6	93.5	84.1	104.3	122.6	137.8	629.8
Illinois	977.5	1,042.4	937.8	1,163.0	1,367.4	1,537.0	7,025.2
Indiana	373.0	397.7	357.8	443.8	521.8	586.5	2,680.5
Iowa	166.6	177.7	159.9	198.2	233.1	262.0	1,197.5
Kansas	289.1	308.3	277.4	344.0	404.5	454.6	2,077.9
Kentucky	221.6	236.3	212.6	263.7	310.0	348.5	1,592.7
Louisiana	737.3	786.2	707.4	877.2	1,031.4	1,159.3	5,298.9
Maine	60.2	64.2	57.7	71.6	84.2	94.6	432.6
Maryland	350.2	373.4	336.0	416.6	489.9	550.6	2,516.7
Massachusetts	248.2	264.7	238.2	295.3	347.3	390.3	1,784.0
Michigan	270.0	287.9	259.1	321.3	377.7	424.6	1,940.6
Minnesota	440.5	469.7	422.6	524.1	616.2	692.6	3,165.7
Mississippi	252.7	269.4	242.4	300.6	353.4	397.3	1,815.8
Missouri	400.9	427.5	384.6	477.0	560.9	630.4	2,881.4
Nebraska	114.9	122.5	110.2	136.7	160.7	180.6	825.6
Nevada	323.9	345.4	310.8	385.4	453.1	509.3	2,327.8
New Jersey	384.7	410.2	369.1	457.7	538.1	604.8	2,764.5
New Mexico	227.3	242.4	218.1	270.5	318.0	357.5	1,633.9
New York	1,783.8	1,902.2	1,711.4	2,122.3	2,495.4	2,804.9	12,820.1
North Carolina	409.8	436.9	393.1	487.5	573.2	644.3	2,944.8
North Dakota	30.2	32.2	29.0	35.9	42.2	47.5	217.0
Ohio	587.2	626.1	563.3	698.6	821.4	923.2	4,219.7
Oklahoma	265.1	282.7	254.3	315.4	370.8	416.8	1,905.2
Pennsylvania	651.2	694.4	624.8	774.8	911.0	1,024.0	4,680.3
Rhode Island	53.5	57.0	51.3	63.6	74.8	84.1	384.4
South Carolina	235.7	251.4	226.2	280.5	329.8	370.7	1,694.3
South Dakota	53.3	56.8	51.1	63.4	74.5	83.8	382.9
Tennessee	786.4	838.6	754.5	935.6	1,100.1	1,236.5	5,651.6
Texas	1,676.8	1,788.1	1,608.7	1,995.0	2,345.7	2,636.5	12,050.8
Utah	168.5	179.7	161.7	200.5	235.8	265.0	1,211.2
Vermont	44.7	47.7	42.9	53.2	62.5	70.3	321.3
Virginia	396.5	422.8	380.4	471.7	554.6	623.4	2,849.3
Washington	574.0	612.0	550.7	682.9	802.9	902.5	4,124.9
West Virginia	93.8	100.0	90.0	111.6	131.2	147.5	674.0
Wisconsin	269.7	287.6	258.8	320.9	377.3	424.1	1,938.4
Wyoming	52.3	55.8	50.2	62.3	73.2	82.3	376.1
TOTAL	21,931.2	23,386.3	21,040.8	26,092.7	30,679.5	34,483.9	157,614.4

Table 5: Total State and Local Sales and Use Tax Revenue Losses from E-Commerce Sales ($millions)

	Baseline Scenario						
	2007	2008	2009	2010	2011	2012	Total
Alabama	108.3	115.5	103.9	128.9	151.6	170.4	778.6
Alaska	1.0	1.0	0.9	1.1	1.3	1.5	6.8
Arizona	235.2	250.8	225.6	279.8	329.0	369.8	1,690.3
Arkansas	72.4	77.2	69.5	86.2	101.3	113.9	520.4
California	1,211.2	1,291.6	1,162.1	1,441.1	1,694.4	1,904.5	8,704.8
Colorado	109.9	117.1	105.4	130.7	153.7	172.7	789.5
Connecticut	40.6	43.2	38.9	48.3	56.7	63.8	291.5
District of Columbia	22.6	24.1	21.7	26.9	31.6	35.5	162.5
Florida	511.2	545.1	490.4	608.2	715.1	803.8	3,673.9
Georgia	260.9	278.2	250.3	310.4	365.0	410.3	1,875.2
Hawaii	38.2	40.7	36.6	45.4	53.4	60.0	274.2
Idaho	29.5	31.4	28.3	35.1	41.2	46.4	211.9
Illinois	322.3	343.7	309.3	383.5	450.9	506.8	2,316.6
Indiana	124.2	132.5	119.2	147.8	173.8	195.3	892.8
Iowa	56.4	60.1	54.1	67.1	78.9	88.7	405.3
Kansas	90.9	96.9	87.2	108.1	127.1	142.9	653.2
Kentucky	69.9	74.6	67.1	83.2	97.8	109.9	502.5
Louisiana	251.8	268.5	241.6	299.6	352.2	395.9	1,809.5
Maine	20.4	21.7	19.6	24.3	28.5	32.1	146.6
Maryland	117.1	124.9	112.4	139.3	163.8	184.1	841.6
Massachusetts	83.5	89.0	80.1	99.3	116.8	131.3	600.0
Michigan	90.0	96.0	86.3	107.1	125.9	141.5	646.7
Minnesota	149.6	159.6	143.6	178.0	209.3	235.3	1,075.3
Mississippi	85.8	91.5	82.3	102.1	120.0	134.9	616.5
Missouri	134.0	142.9	128.6	159.4	187.5	210.7	963.0
Nebraska	39.0	41.6	37.4	46.4	54.6	61.3	280.4
Nevada	107.4	114.6	103.1	127.8	150.3	168.9	772.1
New Jersey	128.8	137.3	123.5	153.2	180.1	202.5	925.5
New Mexico	76.6	81.7	73.5	91.1	107.2	120.5	550.5
New York	550.4	586.9	528.1	654.9	770.0	865.5	3,955.7
North Carolina	136.0	145.0	130.4	161.8	190.2	213.8	977.1
North Dakota	9.8	10.4	9.4	11.6	13.6	15.3	70.1
Ohio	195.8	208.8	187.9	233.0	274.0	307.9	1,407.5
Oklahoma	89.5	95.5	85.9	106.5	125.3	140.8	643.5
Pennsylvania	220.0	234.6	211.0	261.7	307.7	345.9	1,580.9
Rhode Island	18.5	19.7	17.7	22.0	25.8	29.0	132.7
South Carolina	79.2	84.5	76.0	94.2	110.8	124.5	569.3
South Dakota	18.9	20.2	18.2	22.5	26.5	29.8	136.1
Tennessee	261.3	278.6	250.7	310.9	365.5	410.8	1,877.7
Texas	553.6	590.3	531.1	658.6	774.4	870.4	3,978.3
Utah	56.3	60.0	54.0	66.9	78.7	88.5	404.3
Vermont	16.0	17.0	15.3	19.0	22.3	25.1	114.8
Virginia	131.6	140.4	126.3	156.6	184.1	207.0	946.0
Washington	179.3	191.2	172.0	213.3	250.8	281.9	1,288.7
West Virginia	32.2	34.3	30.9	38.3	45.0	50.6	231.4
Wisconsin	90.4	96.4	86.7	107.6	126.5	142.1	649.7
Wyoming	18.2	19.4	17.5	21.6	25.4	28.6	130.7
TOTAL	7,245.6	7,726.3	6,951.4	8,620.4	10,135.8	11,392.7	52,072.2

Table 6: Total State and Local Sales and Use Tax Revenue Losses from E-Commerce Sales as a Percentage of 2007 Sales and Use Tax Collections

	Baseline Scenario					
	2007	2008	2009	2010	2011	2012
Alabama	2.67	2.84	2.56	3.17	3.73	4.19
Alaska	0.56	0.59	0.53	0.66	0.78	0.87
Arizona	3.00	3.20	2.88	3.57	4.19	4.71
Arkansas	1.92	2.05	1.84	2.29	2.69	3.02
California	2.96	3.16	2.84	3.52	4.14	4.65
Colorado	2.25	2.39	2.15	2.67	3.14	3.53
Connecticut	1.34	1.43	1.28	1.59	1.87	2.10
District of Columbia	2.77	2.95	2.65	3.29	3.87	4.35
Florida	2.22	2.37	2.13	2.65	3.11	3.50
Georgia	2.50	2.67	2.40	2.97	3.50	3.93
Hawaii	1.56	1.66	1.50	1.86	2.18	2.45
Idaho	2.31	2.46	2.21	2.75	3.23	3.63
Illinois	3.53	3.76	3.39	4.20	4.94	5.55
Indiana	2.29	2.44	2.20	2.73	3.20	3.60
Iowa	2.44	2.60	2.34	2.90	3.41	3.83
Kansas	3.05	3.25	2.93	3.63	4.27	4.79
Kentucky	2.16	2.30	2.07	2.57	3.02	3.39
Louisiana	3.76	4.01	3.60	4.47	5.26	5.91
Maine	1.93	2.06	1.85	2.30	2.70	3.04
Maryland	2.30	2.45	2.20	2.73	3.21	3.61
Massachusetts	1.97	2.10	1.89	2.35	2.76	3.10
Michigan	1.13	1.20	1.08	1.34	1.58	1.77
Minnesota	2.95	3.14	2.83	3.50	4.12	4.63
Mississippi	2.71	2.89	2.60	3.23	3.79	4.26
Missouri	2.57	2.74	2.47	3.06	3.60	4.05
Nebraska	2.25	2.40	2.16	2.67	3.14	3.53
Nevada	3.19	3.40	3.06	3.79	4.46	5.01
New Jersey	1.54	1.65	1.48	1.84	2.16	2.43
New Mexico	2.73	2.91	2.62	3.25	3.82	4.29
New York	2.79	2.97	2.68	3.32	3.90	4.39
North Carolina	1.83	1.95	1.75	2.17	2.56	2.87
North Dakota	1.45	1.54	1.39	1.72	2.03	2.28
Ohio	2.12	2.26	2.03	2.52	2.96	3.33
Oklahoma	2.59	2.76	2.48	3.08	3.62	4.07
Pennsylvania	2.48	2.64	2.38	2.95	3.47	3.90
Rhode Island	2.11	2.25	2.02	2.51	2.95	3.32
South Carolina	2.37	2.53	2.28	2.82	3.32	3.73
South Dakota	1.84	1.96	1.76	2.18	2.57	2.89
Tennessee	3.04	3.24	2.91	3.61	4.25	4.78
Texas	1.89	2.02	1.81	2.25	2.64	2.97
Utah	2.29	2.44	2.19	2.72	3.20	3.60
Vermont	2.56	2.73	2.45	3.04	3.58	4.02
Virginia	2.38	2.54	2.28	2.83	3.33	3.74
Washington	1.92	2.05	1.84	2.28	2.68	3.02
West Virginia	2.47	2.64	2.37	2.94	3.46	3.89
Wisconsin	2.04	2.18	1.96	2.43	2.86	3.21
Wyoming	2.03	2.16	1.94	2.41	2.83	3.19
TOTAL	2.43	2.60	2.33	2.90	3.40	3.83

Note: 2007 Collections are actually the adjusted 2007 state base multiplied by the sum of the state and local sales and use tax rates. The lone exception is Alaska, for which actual 2007 collections are used.

Table 7: Total State and Local Sales and Use Tax Revenue Losses from E-Commerce Sales ($millions) Chicago and New York City

	Baseline Scenario					
	2007	2008	2009	2010	2011	2012
Illinois Total	322.3	343.7	309.3	383.5	450.9	506.8
Chicago	145.6	155.3	139.7	173.3	203.7	229.0
Non-Chicago Illinois	176.7	188.4	169.5	210.2	247.2	277.9
New York Total	550.4	586.9	528.1	654.9	770.0	865.5
New York City	248.4	264.9	238.3	295.5	347.5	390.6
Non-NYC New York	302.0	322.1	289.8	359.3	422.5	474.9
	Optimistic Scenario					
Illinois Total	322.3	344.6	333.8	441.3	503.7	562.8
Chicago	145.6	155.7	150.8	199.4	227.6	254.3
Non-Chicago Illinois	176.7	188.9	183.0	241.9	276.2	308.5
New York Total	550.4	588.4	570.0	753.6	860.2	960.9
New York City	248.4	265.5	257.2	340.1	388.2	433.7
Non-NYC New York	302.0	322.9	312.7	413.5	472.0	527.3

Effects of a *de minimis* Rule in the Context of Enhanced Vendor Compliance

A federal law permitting states to require remote vendors to collect the sales and use taxes has been proposed in various formats. In some cases, a *de minimis* rule has been included as one aspect of the legislation. We estimated the reduction in revenues that states could expect to collect with federal legislation that did not impose a collection responsibility on firms with e-commerce sales below certain thresholds. The *de minimis* rule would have a different effect if it is based on total sales of the vendor, since their total sales could be much greater than their e-commerce sales. Also, the effects would be very different if the *de minimis* rule applied to all firms with sales under the threshold and not only to remote vendors.

The effects are relatively large based on the expectation that a significant share of e-commerce is conducted by small vendors. Specifically, we find that a *de minimis* threshold of $1 million would lower expected state collections by $2.6 billion in 2010, after taking into account use tax collection paid by buyers. The amount would rise to nearly $3.4 billion by 2012. This means, for example, that the price tag for a $1 million small vendor exception is 30.0 percent as large as our estimate of losses in 2012. As shown in Table 8, the impact on expected collections varies with the chosen *de minimis* threshold.

Table 8: Effects of de minimis Rules on Potential Revenue Gains from Enhanced Vendor Compliance ($millions)

de minimis Threshold	2007	2008	2009	2010	2011	2012
Below $500,000	1,489.7	1,588.6	1,429.3	1,772.4	2,084.0	2,342.4
Below $1,000,000	2,173.6	2,317.8	2,085.3	2,586.0	3,040.6	3,417.6
Below $5,000,000	2,670.4	2,847.6	2,562.0	3,177.2	3,735.7	4,198.9

Note: Entries represent reductions in the potential revenue gains at various levels of the *de minimis* threshold.

COMPARISON WITH PREVIOUS FORECASTS

Some concerns have been raised over the years about our earlier estimates. The primary issue has regarded inclusion of B2B e-commerce in our analysis. We believe that it is imperative to include B2B, and in fact do not understand any argument for excluding these transactions from a comprehensive study. Our goal is to measure the inability to collect sales and use taxes that are due on e-commerce transactions, and B2B represents over 90 percent of e-commerce sales. As shown below, about 13.0 percent of B2B e-commerce transactions are taxable. Further, we have both anecdotal evidence from state Departments of Revenue and the Washington State Compliance studies[16] evidencing that significant shares of use taxes go unpaid on business purchases of taxable goods and services. Therefore, we believe the B2B sales must be included in any comprehensive analysis of sales tax losses.

The estimates of sales tax revenue losses presented here are lower than our previous estimates. One reason for this reduction is that, as documented below, we have sought to provide a lower bound to the revenue losses that will result. The actual losses could be even greater. The lower revenue loss estimates occur despite a much higher current forecast for aggregate e-commerce sales than we previously anticipated. For example, we now believe that 2008 e-commerce transactions will total $2.7 trillion, up markedly from our previous estimate of $1.7 trillion (see Bruce and Fox, 2004). The key difference in the forecast of total transactions is that the Census data evidence a much larger baseline of e-commerce transactions than was used in our earlier analysis. In fact, the Census Bureau reports 2006 e-commerce sales as $2.4 trillion, well above our previous estimate for 2008, but Census also reports much higher e-commerce in earlier years, such as 1999, than when we made in our earlier forecasts.

The lower revenue loss results primarily because B2B sales have grown faster and remained a more dominant share of e-commerce than we had previously expected. B2C transactions are somewhat lower than those used in our earlier forecasts. This has two key effects on our results. First, a much smaller share of the transactions is taxable, since B2B is less likely to be taxable than B2C. Based on survey responses from state revenue departments, we

[16] See http://dor.wa.gov/Docs/Reports/Compliance_Study/compliance_study_2008.pdf.

expect that 13.0 percent of B2B e-commerce transactions are taxable versus 69.6 percent of B2C transactions. Second, use tax compliance for B2B is much better than for B2C, so more of the taxes that are due are collected. Indeed, compliance is generally much better than was anticipated in our earlier work. We believe that the Streamlined Project has been an important cause of better compliance, both because it has drawn attention to the taxes that are due and because the simplification provisions have facilitated collection and remittance of the tax. The combination of lower taxability and higher compliance over the last five years works together to reduce the revenue loss estimates.

METHODOLOGY

We develop estimates of the tax revenue losses associated with e-commerce using a six-step process. The steps involve differing degrees of complexity. Our analysis begins with a forecast of e-commerce activity for the years 2007 through 2012. Second, we distribute e-commerce sales to the states to yield the potential amount of taxable transactions in each state. Third, we determine the degree to which e-commerce transactions are taxable in each state. Fourth, we estimate the sales tax revenues that are due using state-specific estimates of e-commerce transactions and taxability alongside current state and local tax rates. Fifth, we determine the expected sales and use tax compliance on e-commerce transactions and therefore the expected tax collections on these transactions. Sixth and finally, we subtract the taxes collected from the taxes that are due to yield the uncollected taxes, the main goal of the study.

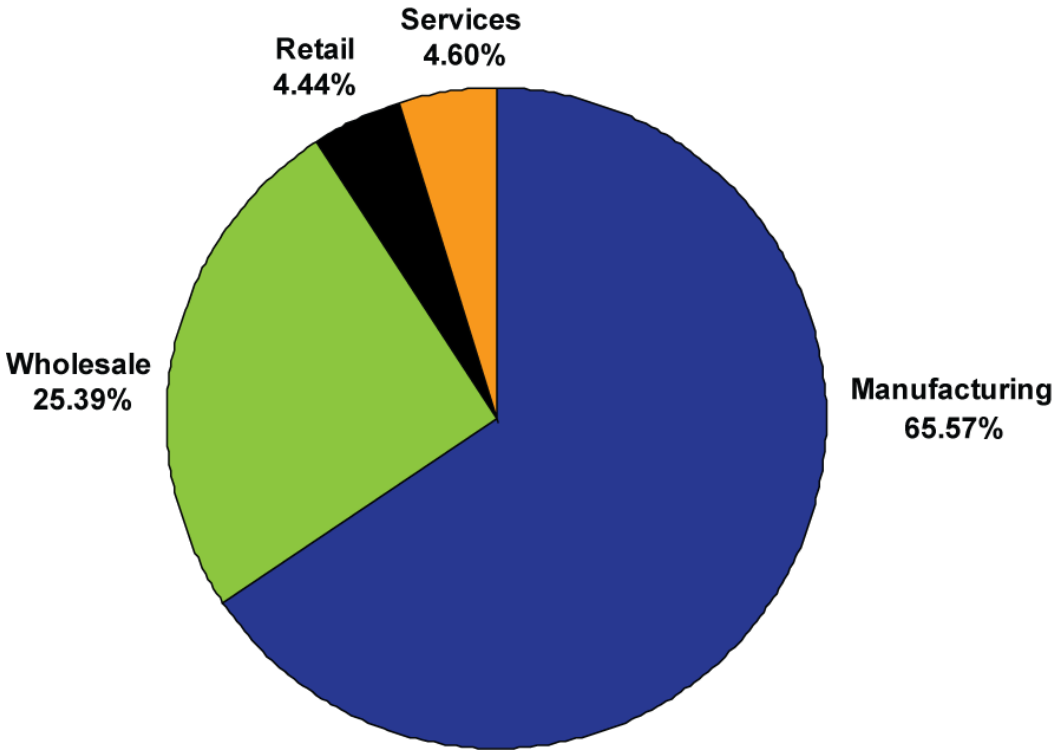
Forecasting E-Commerce Sales

E-commerce sales are available from the U.S. Bureau of the Census E-Stats data for multiple NAICS industries from 1998 through 2006. The industries are not fully consistent across the history of data, but include approximately 21 manufacturing, 19 wholesale, 18 services, and 12 retail industry groupings. These data serve as the basis for forecasts for e-commerce sales from 2007 through 2012.

We first develop a relationship between aggregate e-commerce sales and the economy by regressing the log of e-commerce shipments on the log of nominal GDP and the real GDP growth rate for 1999 through 2006. The resulting coefficients are used together with Global Insight's November 2008 baseline and optimistic forecasts for GDP and the real GDP growth rate to prepare both baseline and optimistic forecasts for aggregate e-commerce sales from 2007 through 2012. The history of e-commerce sales plus our forecasts for the baseline are illustrated in Figure 1 above.

E-commerce sales by industry are necessary to maximize the usefulness of the forecasts because taxability is best determined at the industry level rather than in aggregate. We calculated the distribution of e-commerce sales by industry for 2006 and assumed that it would remain the same over the forecast horizon. These shares are illustrated for the broad industry groupings in Figure 3, though our analysis is undertaken for more disaggregated industry categories.[17]

Figure 3: Industry Share of E-Commerce 2006



Distribution of E-Commerce Sales to the States

No consistent data are available on the geographic distribution of e-commerce purchases, and specifically by state, so it was necessary to develop a methodology to approximate the state-level allocations. First, we assume that the percent of purchases by residents and businesses in non-sales-tax states (Delaware, Montana, New Hampshire, and Oregon) is identical to these states' share of total national personal income. Thus, 2.17 percent of e-commerce sales

[17] We considered forecasting varying industry shares through 2012 but discarded this idea. The constant industry data series available to prepare the forecasts lasts only from 2002 through 2006 and the growth paths of the shares was heavily influenced by commodity price increases. Escalation of commodity prices has been substantially wrung out of the economy by the recession and our judgment is that the forecast based on this history is less reliable than simply accepting the 2006 shares.

is allocated to non-sales taxing states and the remaining 97.83 percent to sales taxing states.

Second, e-commerce transactions for sales-taxing states were distributed across states in proportion to the percentage of national aggregate adjusted state and local sales tax revenues collected in each state. This approach allows the e-commerce share to rise with the size of the state economy, breadth of the adjusted tax base, and level of sales tax rates. The estimated e-commerce share is positively related to the tax rate because the incentives for businesses and people to shop online rise with the tax rate.[18] The adjusted tax base is drawn from estimates developed by John Mikesell (2008), as we discuss below.

Taxability of E-Commerce Sales

Uncollected sales tax revenues cannot be estimated without first approximating the sales taxes that are due. Thus, we must have estimates of the share of e-commerce sales that are taxable in each state. For this purpose it is necessary to approximate the share of e-commerce transactions that is taxable and *not* the share on which taxes are collected. The task is made more complex because the taxability of transactions can depend on the purchaser[19] but the e-commerce sales data are available by vendor industry.

For purposes of determining taxability, we categorize as sales taxes all taxes that operate in a similar fashion. Thus, a number of states, such as Kentucky, North Dakota, and South Carolina, collect a tax on motor vehicle transactions but do not consider the collections as part of their sales taxes. However, for our purposes these are considered as sales taxes. A paper by John Mikesell (2008) details the propensity for states to have sales-tax-like taxes that are categorized in other pots and is used as the basis for including these related taxes.

We relied on the insights of research staffs in individual state Departments of Revenue and Taxation to estimate taxability. We asked each Department to provide detailed estimates of the expected shares of transactions in each NAICS code that are likely to be taxable in their respective state. A detailed survey instrument was sent to each Department asking them to approximate the share of sales for 51 vendor industries that would be taxable in their state. The survey instrument, provided in Appendix B, was distributed to the states through the cooperation of the Federation of Tax Administrators.[20]

[18] For example, see Goolsbee (2000) and Ellison and Ellison (2006).
[19] For example, purchases by governments and some by not-for-profits are exempt in many states.
[20] We thank Jim Eads and Ron Alt of the FTA, and respondents from 29 states plus DC (listed in Appendix 3), for their generous support of this survey effort. A conference call was held to allow states to ask questions about the survey and we participated with state officials in a number of individual calls and emails to enhance the quality of responses.

Twenty-nine states plus the District of Columbia responded to the survey, though some states did not fill in every element of the survey.[21] States were more likely to respond to the B2C portions of the survey than to the B2B, but most sought to respond with information for both types of transactions. Based on our discussions with state officials, we recognize that the best they can do is to approximate taxability of e-commerce sales for the many categories that we requested. We indicated to the states that we would use their responses as guidance but would make adjustments as appropriate. We believe that the survey provides a broad perspective on the degree of taxability and the qualitative differences across states but also believe that adjustments are appropriate in some cases. Average values from the survey are used for non-responding states and for responding states with missing values. Further, we place an upper limit on the weighted average taxability in each state to tighten the distribution of responses. This assumption, which affected two places, served to lessen our estimates of the revenue losses.

We asked states whether they used data or professional judgment in determining their answers. About two-thirds of the states relied upon data they have for gross sales (either through compliance based on tax returns or from the Economic Census) and for taxable sales. In these cases, states determined taxability by dividing the taxable sales by the gross sales. These calculations are imprecise on the portion of sales that are taxable for a number of reasons including that the categories used in state data files and the Census NAICS data may not be the same. More importantly, these calculations can at most measure taxes *collected* and not taxes that are *due*.

We believe there are three reasons that the survey responses based on data understate the actual tax that is due on e-commerce transactions. These were recognized in advance of collecting survey responses and the appropriate adjustments were discussed early on. First, actual sales tax collections reported for a particular NAICS code (the numerator in the states' calculations) in state data files normally do not include the use tax payments made on sales from the industry, so the actual sales tax collections understate the total revenues collected on transactions from the industry. Adding use tax collections associated with transactions from each industry to the sales tax collections will yield all of the taxes that are actually collected on sales from a particular industry. Second, actual sales and use tax collections do not include the amount of vendor and use tax non-compliance. Since the non-compliance also represents taxes that are due, revenue implications of non-compliance must be added to actual collections to yield taxes due as opposed to taxes collected. Third, differences between the taxability of the average *e-commerce* transaction and the average across all transactions by vendors may differ because of the mix of items sold online versus in bricks-and-mortar stores. Thus, a correction is appropriate for differences in the taxability across the mixes of transactions.

[21] Responding states are those listed in Table 2.

We corrected for the failure to include use tax collections in the survey responses and for revenues associated with non-compliance. Data reported in Due and Mikesell (1994) suggest that use tax receipts represent about 10 percent of combined sales and use tax collections.[22] We estimated the appropriate adjustments using this estimate of use tax collections along with the State of Washington's 2008 compliance study indicating 74.5 percent business compliance with the use tax and 98.3 percent compliance with the sales tax.[23] Further, we assumed 5 percent use tax compliance by consumers except for automobiles, where we assume 100 percent compliance. The result is an estimate that the tax due should be 1.226 times greater than the state estimates provided in the survey responses for those states developing their estimates with data. This approach is supported by the observation that the adjusted average taxability for states whose responses were based on data is very similar to the unadjusted average for those whose responses were based on judgment.

We chose not to make further adjustments to account for differences in the mix of transactions. We have no information on the difference in mix of goods and services sold between e-commerce and all transactions, though we suspect e-commerce transactions are more likely to be taxable because people have a greater incentive to buy taxable transactions online if they believe the sales and use taxes can be evaded. This is consistent with our attempts to develop estimates that are on the lower bound of the revenue loss.

Based on the methodology described in this section we find that 13.0 percent of B2B transactions are taxable sales in the average state and 69.6 percent of B2C transactions are taxable in the average state. State-by-state calculations are included in Table 2. These state-specific percentages are multiplied by the state e-commerce estimates to develop estimates of the sales tax base for e-commerce.

Taxes Due

The taxes that are due are calculated by multiplying each state's general sales tax rate plus its average local sales tax rate by the estimated e-commerce sales tax base. The state tax rates are taken from the Sales Tax Clearinghouse, while local tax rates are calculated as local collections divided by the state sales tax base (which itself is state sales tax collections divided by the state sales tax rate).[24]

[22] Use tax collections are surely a much larger share of receipts today because of increasing amounts of remote sales and growth in the global economy, so the older data result in an understatement of taxability.
[23] The sales and use tax compliance estimates for registered vendors only, so they are underestimates of all non-compliance by businesses. Further, we think the tendency for non-registered firms to operate in states is relatively large. We believe that use tax non-compliance by non-registered vendors is more likely to be a problem than sales tax non-compliance. Thus, we expect that the potential revenue gain from expanding sales tax collections responsibilities would be relatively greater than would occur for registered vendors and is another reason our estimates are on the low side.
[24] http://www.thestc.com/STrates.stm.

Sales and Use Tax Compliance

In our analysis, compliance has two components, vendor remittance of the tax and use tax compliance by the purchaser. We estimate use tax compliance separately for B2B and B2C sales. Vendor compliance exists when the seller collects the sales or use tax and remits the tax liability directly to the tax authorities. Use tax compliance exists when the purchaser remits the tax that is due directly to the tax authorities.

Vendor compliance is presumed to take place first, and use tax compliance is the propensity to pay taxes on the portion not collected by vendors. We assume that vendors collect the tax that is due (less sales tax non-compliance), but only for states where the vendor has nexus or has agreed to collect the tax. The vendor tax compliance was informed using results from the University of Maryland Long Tail study (Bailey et.al. 2008). The study evidences that 37 percent of e-commerce is conducted by large vendors, 20 percent by medium size vendors that generally maintain their own website and have annual gross receipts between $1 million and $10 million, and 43 percent by vendors that operate on a platform other than their own and have sales under $1 million.[25] Compliance is estimated as a weighted average of the compliance for these groups of firms. We assume that the mid-size firms comply only in the state where they are located, which means an average compliance rate of two percent. We assume that small vendors only comply part of the time even within their home state, so we assume 1 percent compliance.

We estimated large vendor compliance by selecting 100 firms from Internet Retailer's *Top 500 Guide, 2007 Edition.* Specifically we use the largest 50 firms and a random sample of 50 more firms.[26] We examined each firm's website to determine the states for which the firm collects and remits the sales and use tax. We then calculated a weighted average compliance rate for purchases from large vendors, where the 2007 e-commerce sales by firm serve as the weights. We assume that large firm vendor compliance in cases where they appear to collect based on their website is consistent with the Washington compliance study, which estimates 98.3 percent compliance for the sales tax. The average compliance for the large vendors for each state is given in Table 9. We estimate compliance by large vendors to be between 46.1 percent in Vermont and 89.3 percent in New York. Compliance is much better than existed when we developed our earlier estimates, and we believe that the Streamlined effort is an important cause.

We assume that half of B2B faces vendor compliance, and apply the above weighted average vendor compliance. The portion of this first half of B2B

[25] The small and medium size vendors may be much larger firms than is implied by these categories since only their e-commerce is included in these categorizations.
[26] Two firms were omitted from the 100 that we had randomly selected because no website could be found. Thus, our survey is based on 98 firms. For more details, see http://www.internetretailer.com/top500/.

on which vendors do not collect sales tax is assumed to be subject to use tax. The second half of B2B is assumed to only face use tax compliance.[27] B2B use tax compliance is estimated based on the Washington compliance study which provides compliance estimates derived from tax audits for a sample of registered firms. The study concludes there is 74.5 percent compliance with the use tax, so we assume this level of compliance on the taxes due on B2B sales that were not collected by vendors, though this includes no adjustment for non-registered businesses. Little data are available on individual use tax compliance except for a clear understanding that individuals seldom comply even when they are offered the opportunity to pay through their individual income tax return. Compliance for automobiles will be much better. We assume 5 percent use tax compliance by individuals for non-auto purchases and 100 percent compliance for autos.

Tax Losses

The tax losses, or uncollected taxes, are calculated as the taxes due minus the compliance.

[27] Note that this implicitly assumes that one half of B2B transactions is subject to direct reporting rather than vendor compliance.

Table 9: Compliance Rate for Large Retailers B2C Transactions

State	Compliance Rate	State	Compliance Rate
Alaska*	65.3%	Missouri	66.1%
Alabama	63.5%	Nebraksa	61.3%
Arizona	61.5%	Nevada	68.4%
Arkansas	61.1%	New Jersey	65.6%
California	71.2%	New Mexico	63.7%
Colorado	65.6%	New York	89.3%
Connecticut	64.5%	North Carolina	68.3%
District of Columbia*	65.3%	North Dakota	76.0%
Florida	69.0%	Ohio	66.7%
Georgia	66.8%	Oklahoma	63.0%
Hawaii	58.6%	Pennsylvania	63.0%
Idaho	64.2%	Rhode Island	56.5%
Illinois	70.1%	South Carolina	64.5%
Indiana	67.1%	South Dakota	47.6%
Iowa	62.4%	Tennessee	67.9%
Kansas	84.0%	Texas	69.7%
Kentucky	82.9%	Utah	66.5%
Lousisiana	59.7%	Vermont	46.1%
Maine	62.0%	Virginia	68.1%
Maryland	65.9%	Washington	85.7%
Massachusetts	64.3%	West Virginia	58.1%
Michigan	67.0%	Wisconsin	65.3%
Minnesota	61.3%	Wyoming	54.3%
Mississipi	61.4%		

*Compliance rates represent the median of all other states.

REFERENCES

Bailey, Joe et.al. 2008. “The Long Tail is Longer than You Think: The Surprisingly Large Extent of Online Sales by Small Volume Sellers,” draft paper, University of Maryland, May 12.

Bruce, Donald and William F. Fox. 2000. “E-Commerce in the Context of Declining State Sales Tax Bases,” *National Tax Journal*, 53(4) 1373-1388.

Bruce, Donald and William F. Fox. 2001. “State and Local Tax Revenue Losses from E-Commerce: Updated Estimates,” *State Tax Notes,* October 15.

Bruce, Donald and William F. Fox. 2004. “State and Local Sales Tax Revenue Losses from E-Commerce: Estimates as of July 2004,” *State Tax Notes*, August.

Due, John F. and John L. Mikesell. 1994. Sales *Taxation: State and Local Structure and Administration.* Washington: Urban Institute Press.

Ellison, Glenn and Sara Fisher Ellison. 2006. “Internet Retail Demand: Taxes, Geography, and Online-Offline Competition,” NBER Working Paper 12242, May.

Goolsbee, Austan. 2000. "In a World Without Borders: The Impact of Taxes on Internet Commerce," *Quarterly Journal of Economics,* May, vol 115(2), 561-576.

Mikesell, John L. 2008. “State Sales Taxes in Fiscal 2007,” *State Tax Notes*, May 26, 48, 647-652.

APPENDIX A

Appendix A Table 1: Total State and Local Sales and Use Taxes Due on E-Commerce ($millions)

	Optimistic Scenario						
	2007	2008	2009	2010	2011	2012	Total
Alabama	429.7	459.4	445.0	588.3	671.5	750.2	3,344.1
Alaska	3.8	4.1	3.9	5.2	5.9	6.6	29.5
Arizona	928.2	992.3	961.2	1,270.8	1,450.6	1,620.5	7,223.5
Arkansas	285.5	305.2	295.6	390.8	446.1	498.4	2,221.7
California	4,898.3	5,236.4	5,072.2	6,706.2	7,654.9	8,551.7	38,119.7
Colorado	438.0	468.2	453.5	599.6	684.4	764.6	3,408.2
Connecticut	161.3	172.4	167.0	220.8	252.0	281.6	1,255.0
District of Columbia	90.1	96.3	93.3	123.3	140.7	157.2	700.9
Florida	2,056.0	2,197.9	2,128.9	2,814.8	3,213.0	3,589.4	15,999.9
Georgia	1,043.5	1,115.5	1,080.6	1,428.7	1,630.8	1,821.8	8,120.9
Hawaii	149.5	159.8	154.8	204.7	233.6	261.0	1,163.5
Idaho	117.1	125.2	121.3	160.3	183.0	204.5	911.4
Illinois	1,299.9	1,389.6	1,346.0	1,779.6	2,031.4	2,269.3	10,115.8
Indiana	497.2	531.5	514.9	680.7	777.0	868.0	3,869.3
Iowa	223.0	238.4	230.9	305.3	348.5	389.3	1,735.5
Kansas	380.0	406.3	393.5	520.3	593.9	663.5	2,957.4
Kentucky	291.5	311.7	301.9	399.1	455.6	509.0	2,268.8
Louisiana	989.1	1,057.4	1,024.2	1,354.1	1,545.7	1,726.8	7,697.3
Maine	80.6	86.1	83.4	110.3	125.9	140.7	627.1
Maryland	467.3	499.5	483.9	639.7	730.3	815.8	3,636.5
Massachusetts	331.7	354.6	343.5	454.1	518.4	579.1	2,581.5
Michigan	360.0	384.9	372.8	492.9	562.6	628.5	2,801.7
Minnesota	590.1	630.9	611.1	807.9	922.2	1,030.3	4,592.4
Mississippi	338.4	361.8	350.5	463.3	528.9	590.9	2,633.8
Missouri	534.9	571.8	553.9	732.4	836.0	933.9	4,162.9
Nebraska	153.9	164.5	159.3	210.7	240.5	268.7	1,197.6
Nevada	431.3	461.1	446.6	590.5	674.1	753.0	3,356.7
New Jersey	513.4	548.9	531.7	702.9	802.4	896.4	3,995.7
New Mexico	304.0	324.9	314.7	416.1	475.0	530.6	2,365.4
New York	2,334.3	2,495.4	2,417.1	3,195.8	3,647.9	4,075.2	18,165.6
North Carolina	545.7	583.4	565.1	747.1	852.8	952.7	4,246.8
North Dakota	39.9	42.7	41.4	54.7	62.4	69.7	310.8
Ohio	783.0	837.0	810.8	1,072.0	1,223.6	1,367.0	6,093.4
Oklahoma	354.6	379.1	367.2	485.5	554.2	619.1	2,759.8
Pennsylvania	871.2	931.3	902.1	1,192.8	1,361.5	1,521.0	6,779.9
Rhode Island	72.0	76.9	74.5	98.5	112.4	125.6	560.0
South Carolina	315.0	336.7	326.1	431.2	492.2	549.9	2,451.0
South Dakota	72.2	77.2	74.8	98.9	112.9	126.1	562.0
Tennessee	1,047.7	1,120.0	1,084.9	1,434.3	1,637.2	1,829.1	8,153.1
Texas	2,230.4	2,384.3	2,309.5	3,053.5	3,485.5	3,893.8	17,357.0
Utah	224.8	240.3	232.8	307.8	351.3	392.4	1,749.3
Vermont	60.7	64.9	62.8	83.1	94.8	105.9	472.2
Virginia	528.1	564.6	546.8	723.0	825.3	922.0	4,109.8
Washington	753.3	805.3	780.0	1,031.3	1,177.2	1,315.1	5,862.1
West Virginia	126.0	134.7	130.5	172.5	196.9	219.9	980.4
Wisconsin	360.1	385.0	372.9	493.0	562.8	628.7	2,802.5
Wyoming	70.5	75.4	73.0	96.6	110.2	123.1	548.8
TOTAL	29,176.8	31,190.6	30,212.3	39,945.1	45,596.1	50,937.9	227,058.8

Appendix A Table 2: Total State and Local Sales and Use Tax Collections on E-Commerce Sales ($millions)

	Optimistic Scenario						
	2007	2008	2009	2010	2011	2012	Total
Alabama	321.4	343.5	332.8	440.0	502.2	561.0	2,500.9
Alaska	2.8	3.0	2.9	3.9	4.4	5.0	22.1
Arizona	693.0	740.8	717.6	948.8	1,083.0	1,209.9	5,393.2
Arkansas	213.1	227.8	220.6	291.7	333.0	372.0	1,658.1
California	3,687.1	3,941.6	3,818.0	5,047.9	5,762.0	6,437.1	28,693.7
Colorado	328.1	350.7	339.7	449.2	512.7	572.8	2,553.3
Connecticut	120.7	129.0	125.0	165.3	188.6	210.7	939.4
District of Columbia	67.5	72.1	69.9	92.4	105.4	117.8	525.0
Florida	1,544.8	1,651.4	1,599.6	2,114.9	2,414.1	2,696.9	12,021.6
Georgia	782.6	836.6	810.4	1,071.4	1,223.0	1,366.3	6,090.3
Hawaii	111.4	119.0	115.3	152.4	174.0	194.4	866.6
Idaho	87.6	93.7	90.8	120.0	137.0	153.0	682.0
Illinois	977.5	1,045.0	1,012.2	1,338.3	1,527.6	1,706.6	7,607.2
Indiana	373.0	398.7	386.2	510.6	582.9	651.2	2,902.6
Iowa	166.6	178.1	172.5	228.1	260.4	290.9	1,296.7
Kansas	289.1	309.1	299.4	395.8	451.8	504.8	2,250.1
Kentucky	221.6	236.9	229.5	303.4	346.3	386.9	1,724.7
Louisiana	737.3	788.2	763.5	1,009.4	1,152.2	1,287.2	5,737.9
Maine	60.2	64.3	62.3	82.4	94.1	105.1	468.4
Maryland	350.2	374.4	362.6	479.4	547.2	611.4	2,725.2
Massachusetts	248.2	265.4	257.0	339.9	387.9	433.4	1,931.8
Michigan	270.0	288.7	279.6	369.7	422.0	471.4	2,101.4
Minnesota	440.5	470.9	456.1	603.1	688.4	769.0	3,428.0
Mississippi	252.7	270.1	261.6	345.9	394.8	441.1	1,966.2
Missouri	400.9	428.6	415.2	548.9	626.5	699.9	3,120.1
Nebraska	114.9	122.8	119.0	157.3	179.5	200.6	894.0
Nevada	323.9	346.3	335.4	443.4	506.2	565.5	2,520.7
New Jersey	384.7	411.2	398.3	526.6	601.1	671.6	2,993.6
New Mexico	227.3	243.0	235.4	311.3	355.3	396.9	1,769.2
New York	1,783.8	1,907.0	1,847.2	2,442.2	2,787.7	3,114.3	13,882.2
North Carolina	409.8	438.0	424.3	561.0	640.3	715.4	3,188.8
North Dakota	30.2	32.3	31.3	41.3	47.2	52.7	234.9
Ohio	587.2	627.7	608.0	803.9	917.6	1,025.1	4,569.3
Oklahoma	265.1	283.4	274.5	362.9	414.3	462.8	2,063.0
Pennsylvania	651.2	696.2	674.4	891.6	1,017.7	1,137.0	5,068.0
Rhode Island	53.5	57.2	55.4	73.2	83.6	93.4	416.3
South Carolina	235.7	252.0	244.1	322.8	368.4	411.6	1,834.6
South Dakota	53.3	57.0	55.2	72.9	83.3	93.0	414.6
Tennessee	786.4	840.7	814.3	1,076.6	1,228.9	1,372.9	6,119.9
Texas	1,676.8	1,792.5	1,736.3	2,295.7	2,620.4	2,927.4	13,049.2
Utah	168.5	180.2	174.5	230.7	263.4	294.2	1,311.6
Vermont	44.7	47.8	46.3	61.2	69.9	78.1	347.9
Virginia	396.5	423.8	410.5	542.8	619.6	692.2	3,085.4
Washington	574.0	613.6	594.3	785.8	897.0	1,002.0	4,466.6
West Virginia	93.8	100.3	97.1	128.4	146.6	163.7	729.8
Wisconsin	269.7	288.3	279.3	369.3	421.5	470.9	2,099.0
Wyoming	52.3	55.9	54.2	71.6	81.8	91.4	407.3
TOTAL	21,931.2	23,444.9	22,709.6	30,025.4	34,273.1	38,288.3	170,672.5

Appendix A Table 3: Total State and Local Sales and Use Tax Revenue Losses from E-Commerce Sales ($millions)

	Optimistic Scenario						
	2007	2008	2009	2010	2011	2012	Total
Alabama	108.3	115.8	112.2	148.3	169.3	189.2	843.1
Alaska	1.0	1.0	1.0	1.3	1.5	1.7	7.4
Arizona	235.2	251.4	243.5	322.0	367.6	410.6	1,830.3
Arkansas	72.4	77.4	75.0	99.1	113.2	126.4	563.5
California	1,211.2	1,294.8	1,254.2	1,658.3	1,892.9	2,114.6	9,426.0
Colorado	109.9	117.4	113.8	150.4	171.7	191.8	854.9
Connecticut	40.6	43.4	42.0	55.5	63.4	70.8	315.6
District of Columbia	22.6	24.2	23.4	31.0	35.3	39.5	175.9
Florida	511.2	546.5	529.3	699.9	798.9	892.5	3,978.3
Georgia	260.9	278.9	270.2	357.2	407.8	455.5	2,030.5
Hawaii	38.2	40.8	39.5	52.2	59.6	66.6	297.0
Idaho	29.5	31.5	30.5	40.4	46.1	51.5	229.4
Illinois	322.3	344.6	333.8	441.3	503.7	562.8	2,508.5
Indiana	124.2	132.8	128.6	170.1	194.1	216.9	966.7
Iowa	56.4	60.3	58.4	77.2	88.1	98.4	438.8
Kansas	90.9	97.2	94.1	124.4	142.0	158.7	707.3
Kentucky	69.9	74.8	72.4	95.7	109.3	122.1	544.2
Louisiana	251.8	269.2	260.7	344.7	393.5	439.6	1,959.4
Maine	20.4	21.8	21.1	27.9	31.9	35.6	158.7
Maryland	117.1	125.2	121.3	160.3	183.0	204.4	911.3
Massachusetts	83.5	89.2	86.4	114.3	130.5	145.7	649.7
Michigan	90.0	96.2	93.2	123.2	140.6	157.1	700.3
Minnesota	149.6	160.0	154.9	204.9	233.8	261.2	1,164.4
Mississippi	85.8	91.7	88.8	117.4	134.1	149.8	667.6
Missouri	134.0	143.2	138.8	183.5	209.4	233.9	1,042.8
Nebraska	39.0	41.7	40.4	53.4	61.0	68.1	303.6
Nevada	107.4	114.8	111.2	147.1	167.9	187.6	836.0
New Jersey	128.8	137.7	133.3	176.3	201.2	224.8	1,002.1
New Mexico	76.6	81.9	79.3	104.9	119.7	133.7	596.2
New York	550.4	588.4	570.0	753.6	860.2	960.9	4,283.4
North Carolina	136.0	145.3	140.8	186.1	212.5	237.4	1,058.0
North Dakota	9.8	10.4	10.1	13.4	15.2	17.0	75.9
Ohio	195.8	209.4	202.8	268.1	306.1	341.9	1,524.1
Oklahoma	89.5	95.7	92.7	122.6	139.9	156.3	696.8
Pennsylvania	220.0	235.2	227.8	301.2	343.8	384.0	1,711.9
Rhode Island	18.5	19.7	19.1	25.3	28.9	32.2	143.7
South Carolina	79.2	84.7	82.0	108.4	123.8	138.3	616.4
South Dakota	18.9	20.2	19.6	25.9	29.6	33.1	147.4
Tennessee	261.3	279.3	270.5	357.7	408.3	456.1	2,033.3
Texas	553.6	591.8	573.2	757.9	865.1	966.4	4,307.9
Utah	56.3	60.1	58.3	77.0	87.9	98.2	437.8
Vermont	16.0	17.1	16.5	21.9	25.0	27.9	124.3
Virginia	131.6	140.7	136.3	180.2	205.7	229.8	1,024.4
Washington	179.3	191.7	185.7	245.5	280.2	313.1	1,395.5
West Virginia	32.2	34.4	33.3	44.1	50.3	56.2	250.6
Wisconsin	90.4	96.6	93.6	123.8	141.3	157.8	703.5
Wyoming	18.2	19.4	18.8	24.9	28.4	31.8	141.6
TOTAL	7,245.6	7,745.7	7,502.7	9,919.7	11,323.1	12,649.6	56,386.3

Appendix A Table 4: Total State and Local Sales and Use Tax Revenue Losses from E-Commerce Sales as a Percentage of 2007 Sales and Use Tax Collections

	Optimistic Scenario					
	2007	2008	2009	2010	2011	2012
Alabama	2.67	2.85	2.76	3.65	4.17	4.65
Alaska	0.56	0.59	0.58	0.76	0.87	0.97
Arizona	3.00	3.21	3.10	4.10	4.69	5.23
Arkansas	1.92	2.05	1.99	2.63	3.00	3.35
California	2.96	3.16	3.06	4.05	4.62	5.17
Colorado	2.25	2.40	2.33	3.07	3.51	3.92
Connecticut	1.34	1.43	1.39	1.83	2.09	2.34
District of Columbia	2.77	2.96	2.87	3.79	4.32	4.83
Florida	2.22	2.38	2.30	3.04	3.47	3.88
Georgia	2.50	2.67	2.59	3.42	3.91	4.36
Hawaii	1.56	1.67	1.62	2.14	2.44	2.72
Idaho	2.31	2.47	2.39	3.16	3.61	4.03
Illinois	3.53	3.77	3.66	4.83	5.52	6.16
Indiana	2.29	2.45	2.37	3.14	3.58	4.00
Iowa	2.44	2.61	2.52	3.34	3.81	4.26
Kansas	3.05	3.26	3.16	4.17	4.76	5.32
Kentucky	2.16	2.31	2.23	2.95	3.37	3.77
Louisiana	3.76	4.02	3.89	5.14	5.87	6.56
Maine	1.93	2.07	2.00	2.65	3.02	3.38
Maryland	2.30	2.46	2.38	3.15	3.59	4.01
Massachusetts	1.97	2.11	2.04	2.70	3.08	3.44
Michigan	1.13	1.20	1.17	1.54	1.76	1.97
Minnesota	2.95	3.15	3.05	4.03	4.60	5.14
Mississippi	2.71	2.90	2.81	3.71	4.24	4.73
Missouri	2.57	2.75	2.66	3.52	4.02	4.49
Nebraska	2.25	2.40	2.33	3.08	3.51	3.92
Nevada	3.19	3.41	3.30	4.36	4.98	5.56
New Jersey	1.54	1.65	1.60	2.11	2.41	2.69
New Mexico	2.73	2.92	2.83	3.74	4.27	4.77
New York	2.79	2.98	2.89	3.82	4.36	4.87
North Carolina	1.83	1.95	1.89	2.50	2.85	3.19
North Dakota	1.45	1.55	1.50	1.98	2.26	2.53
Ohio	2.12	2.26	2.19	2.90	3.31	3.69
Oklahoma	2.59	2.76	2.68	3.54	4.04	4.51
Pennsylvania	2.48	2.65	2.57	3.40	3.88	4.33
Rhode Island	2.11	2.25	2.18	2.89	3.30	3.68
South Carolina	2.37	2.54	2.46	3.25	3.71	4.14
South Dakota	1.84	1.96	1.90	2.51	2.87	3.21
Tennessee	3.04	3.25	3.15	4.16	4.75	5.30
Texas	1.89	2.02	1.96	2.59	2.95	3.30
Utah	2.29	2.44	2.37	3.13	3.57	3.99
Vermont	2.56	2.73	2.65	3.50	4.00	4.46
Virginia	2.38	2.54	2.46	3.26	3.72	4.16
Washington	1.92	2.05	1.99	2.63	3.00	3.35
West Virginia	2.47	2.64	2.56	3.38	3.86	4.31
Wisconsin	2.04	2.18	2.11	2.80	3.19	3.56
Wyoming	2.03	2.17	2.10	2.77	3.17	3.54
TOTAL	2.43	2.60	2.52	3.33	3.80	4.25

Note: 2007 Collections are actually the adjusted 2007 state base multiplied by the sum of the state and local sales and use tax rates. The lone exception is Alaska, for which actual 2007 collections are used.

APPENDIX B: TAXABLE SALES SURVEY

Due Date: February 4, 2009

Send to: dbruce@utk.edu

State: _____
Contact Name: _____
Best means for contact: _____

Survey Instructions

There are two options for completing this survey. **Choose one option.** Instructions for each option follow. Under Option 1, you should report the percent of sales on which taxes are due. Under Option 2, you should report the percent of sales on which taxes have been collected. We ask which option you used at the end of these instructions.

Option 1: Report the percentage of sales on which sales and use taxes are due

Please estimate the percentage of total gross receipts that are made by firms in each NAICS code that *would be taxable* if purchased in your state. Sales may not be taxable for several reasons, including (1) the sale of the type of good and service is specifically exempted, (2) your state tax base does not include the transaction, or (3) the purchaser is exempt (e.g., tax exempt organization).

You should assume perfect sales **and** use tax compliance rates. Do **not** reduce the taxability ratio because the sale is out of state because we care about the taxable sales in your state.

Examples:
Note: You do not have to include the detail of exemptions. This is included in the examples for illustrative purposes. We only need the total taxable percentage.

NAICS 441: Your state exempts the following sales of Motor vehicles and Parts:

Sales to residents of Indian reservations	About 1% of sales
Sales of autos to residents of military bases	About 3% of sales
Sales to business when used in manufacturing process	About 2% of sales
Sales to ICC permit holders	About 5% of sales
Total percentage of exempt sales	About 11%

Total Taxable Percentage for NAICS 441 = 89%

Note: Out of state sales are also exempt. However, these sales are included in the taxable percentage because we want to include the taxability of goods and services sold to the residents and businesses of your state that are accounted for through the use tax.

NAICS 334: Your state exempts the following sales made by Computer and Electronic products manufacturers:

Wholesale sales or sale for resale	About 70% of Sales
Products used as component parts in manufacturing	About 3% of Sales
Total Percentage of exempt sales	About 73%

Total Taxable Percentage for NAICS 334 = 27%

Option 2: Report the percentage of sales on which sales and use taxes has been collected

Ignore all instructions for Option 1. If you are not comfortable estimating taxability, please estimate the percent of sales on which you think taxes have been collected. You may choose to prepare the estimates using judgment or actual data. If you use data, you may divide total receipts for each NAICS code by a measure of gross sales, which are available in various Census reports. If you use another measure of gross sales, please describe it briefly below. Professors Fox, Bruce and Luna will make the necessary adjustments to convert taxes collected to taxes due. (A description of their methodology is available on request.)

Please check one of the following boxes:
I have reported percent of sales using

_____ Option 1 (based on taxes due)
_____ Option 2 (based on taxes collected)

If you checked Option 1, skip the following questions.
If you checked Option 2, please answer the following questions.

Which of the following did you use to calculate the ratios?

_____ Professional judgment
_____ Data

If you checked data above, please briefly describe your data source(s).

_____

_____

_____

Three tables follow. Table 1 is for sales by retailers, which are mostly but not exclusively sales to individuals. Similarly, Table 3 is for sales by wholesalers and manufacturers, which are mostly but not exclusively sales to other businesses. Table 2 is for sales by service firms, which are separated into those to consumers and those to businesses.

Please contact the research team at dbruce@utk.edu if you have any questions.

Thank you for your participation.

Table 1: Approximate percent of taxable sales of goods sold by retailers to households and business (consider only the types of goods sold remotely to residents and businesses of your state)

NAICS	Category	Taxable Percent
441	Motor vehicles and parts dealers	
442	Furniture and home furnishings stores	
443	Electronics and appliance stores	
444	Building materials and garden equipment and supplies stores	
445	Food and beverage stores	
446	Health and personal care stores	
447	Gasoline Stations	
448	Clothing and clothing accessories stores	
451	Sporting goods, hobby, book and music stores	
452	General merchandise stores	
453	Miscellaneous store retailers	

Please indicate the approximate percentage of gross receipts for each category of services sold to other businesses (B2B) and to individuals (B2C).

Table 2: Approximate percent of taxable sales by service providers (consider only the types of services sold remotely to residents and businesses of your state)

NAICS	Category	Taxable B2B	Taxable B2C
51	Information		
511	Publishing industries		
517	Telecommunications		
51811	Internet service providers and web search portals		
5231	Securities and commodity contracts intermediation and brokerage		
532	Rental and Leasing Services		
5415	Computer systems design and related services		

56	Administrative and Support and Waste Management and Remediation Services		
5615	Travel arrangement and reservation services		
62	Health Care and Social Assistance Services		
71	Arts, Entertainment, and Recreation Services		
72	Accommodation and Food Services		
811	Repair and maintenance		
813	Religious, grant-making, civic, professional, and similar organizations		

In Table 3, please indicate the approximate taxable percentage of total sales for each category of goods. Codes starting with 31-33 are manufacturing firms; 42 are wholesale trade; 48-49 are transportation and warehousing.

Table 3: Approximate percent of taxable sales by manufacturers and wholesalers
(Consider only the types of goods sold remotely to residents and businesses of your state)

NAICS	Vendors	Taxable Percent
311, 4244, 4245	Food products	
313, 314	Textile products	
315, 4243	Apparel	
316	Leather and allied products	
322, 4241	Paper and paper products	
323	Printing and related support activities	
325, 4246	Chemicals	
326	Plastics and rubber products	
327	Nonmetallic mineral products	
331, 4235	Primary metals	
332	Fabricated metal products	
333, 4238	Machinery	
334	Computer and electronic products	
335, 4236	Electrical equipment, appliances, and components	
4231, 336	Motor vehicles and automotive equipment	
4232, 321, 337	Furniture and home furnishings	
4233	Lumber and other construction material	
4234	Professional and commercial equipment and supplies	
42343	Computer equipment and supplies	
4237	Hardware, plumbing and heating equipment	
4242	Drugs, drug proprietaries and druggists' sundries	
324, 4247	Petroleum and petroleum products	
4248, 312	Beer, wine, and distilled beverages and tobacco	
484	Truck transportation	

492	Courier and messengers	
493	Warehousing and storage	

Further Comments:

SUBMISSION

Prepared by the

New Zealand Retailers Association

For the

New Zealand Customs Service

In respect of

De Minimis Discussion Paper

February 2011

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The New Zealand Retailers Association

The New Zealand Retailers Association (NZRA) is the most significant body in the country representing the interests of retailers. Across all store types and areas we have some 6,000 members and they in turn operate some 14,000 shop fronts. These stores range from the majority of large national retailers to thousands of owner operators.

Our membership would account for 65% – 70% of total retail expenditure (excluding the motor vehicle sector).

Within the New Zealand Retailers Association structure we also have a number of specialty groups and in the main these include retailers, importers, and suppliers of a specific product type. These specialty groups we operate are:

- Bicycle Industry
- Sporting Goods
- Jewellery
- Plumbing Distributors
- Pets/Pet Products/Equestrian Suppliers

Many of the retailers we represent are impacted by the regulations pertaining to the de minimis value and the advantages this gives consumers at the expense of the domestic economy.

It is in the interests of all of these retailers and the New Zealand economy overall that we make these submissions.

The Changing Market

The total retail market in New Zealand is valued by Statistics New Zealand at in excess of $65b (including the hospitality and motor vehicle sectors). If we eliminate these latter two categories we arrive at a retail market that it valued at $51.6b (12 months ending September quarter 2010) and this was up 1.6% on the prior 12 month period.

The market is certainly going through a period of rapid change with much more business being conducted on the internet. This area of trading comes under a range of different approaches:

i) Sales by ‘bricks and mortar’ retailers through their own web sites (NZ based).
ii) Sales by ‘bricks and mortar’ retailers through their own web site based outside of NZ.
iii) On-line only operators in NZ.
iv) On-line only operators, outside of NZ.
v) Consumer to consumer transactions (e.g. TradeMe).
vi) Business to consumer via sites such as TradeMe.

It is our belief that this type of retailing will continue to grow and we need to ensure that the tax/customs structure put in place now is appropriate for a future that will be different from today.

The New Zealand Taxation System

In 1986 the taxation system in New Zealand underwent a fundamental change. We saw the removal of product specific sales taxes, a reduction in the rate of direct tax on income and the introduction of a goods and services tax based on consumption (GST).

Initially the rate of GST was 10.0%; this moved to 12.5% in 1989 and recently in October 2010 it increased further to 15%.

GST applies to the purchase of all goods and services with the exception of financial transactions. Unlike some other countries (e.g. Australia and U.K) there are no product exemptions from GST.

In 1985/86 the collection of tax was as follows:

	$m	**%**
Income Tax (salaries & wages)	7,463	53
Income Tax (self employed and FBT)	1,833	13
Company Tax	1,207	9
Withholding Tax on Residents	-	-
Withholding Tax on Non-Residents	-	-
Total Direct Taxes	10,503	74
Goods and Services Tax	-	-
Sales Tax	1,553	11
Excise Duty	647	5
Customs Duty	742	5
Other Duties	723	5
Total Indirect Taxes	3,665	26
Total Taxes	**14,168**	**100%**

(Source: NZ Year Book)

Thus at an individual level the 1985/86 (pre GST) picture was as follows:

	$m	**%**
Income Tax – (total)	9,296	76
Sales Tax	1,553	13
Excise & Customs Duty	1,389	11
	12,238	**100**

That is at the individual level 76% of the tax we paid was based on our income and 24% was based on what we consumed.

How has this changed?

On an individual basis the figures for the 12 months ending June 2009 showed the following:

	$m	%
Income Tax – direct income	25,859	59
Income tax on interest/dividends	2,637	6
GST	11,551	27
Excise & Customs Duty	3,449	8
Total	**43,496**	**100**

Direct tax has fallen from 76% to 65% and tax on consumption has risen to 35%.

Given that we have now moved to 15% GST (an increase of 20% from the 12.5% days) the pendulum will have swung even further. Our estimate for 2011/12 would be that at least 40% of the tax we pay as individuals would be based on what we consume and not what we earn.
Consumption based taxation has been further reinforced by the recommendations of the Savings Working Group released recently. They were advocating increasing GST to 17.5%. While the Government has shied away from this at the moment (political expediency) it indicates possible, future direction.

Question… where is the fairness and equity in allowing purchases made from outside of New Zealand (under $400) to come into the country free of GST?

Answer… we believe there are two key aspects to this answer:

1 If Government policy is to shift the focus of individual taxation from a tax on income to a tax on consumption then this should be applied to **all** consumption. The excuse in the past has been about the 'cost of collection'. However, as far as we are aware no serious review of the options available has been undertaken (more on this later).

2 There are estimates offered by a variety of researchers that on-line purchasing is between 2.5% and 3.5% of total retail sales. However, the sales we are talking about are not recorded anywhere as long as the declaration is under $400 the goods simply flow straight through to the consumer. As far as we are aware no one has set out to quantify this.

However, what we do know is that every item that comes into the country potentially denies a New Zealand retailer the opportunity to make that sale, make a profit and pay tax, employ staff in New Zealand who in turn pay tax, and the GST isn't collected. The flow to the government isn't just about the GST.

It isn't just an issue for NZ Customs – there is a significant issue for IRD that goes beyond the de minimis. The Customs regulations relate to "goods" only – GST relates to "goods and services". For the purposes of this debate there are a whole raft of services that should be attracting GST – e.g. music downloads, software downloads, etc.

So… why is it only now that this problem is emerging?

GST Free Access to New Zealand

As a variety of commentators have already indicated the problem has been with us for some time (and we have been fighting the issue for some time).

What makes it more of an issue now is that:

a) GST has gone up to 15%.

b) Internet buying of goods and services from off-shore sites is reported to be growing at a significant rate.

These two factors combined are creating a significant issue and one that will grow bigger over time.

One Australian commentator recently suggested that any saving in GST would be largely 'eaten up by the shipping costs'. This simply highlights the stupidity of some commentators and the lack of thought through argument.

The price of an item on the shelf in New Zealand in general terms includes four components – the imported cost of the item, the freight to get it here, GST, and the retailers' margin. In the case of the on-line purchase we still have the cost of the goods, the on-line traders' margin and the freight cost. To simply write off the freight cost against GST is not a valid argument.

We want fairness and equity in Government policy and a level playing field for all participants. Why should a retailer in New Zealand have to compete with both the overseas retailers and the New Zealand Government?

OK… but just how big is the problem?

Scoping Out the Problem

As far as we are aware there are only limited statistics available on the number or value of parcels entering the country with an individual value of under $400 (Customs and/or NZ Post might have that data).

While some volume data would be available, the total value and therefore the GST lost is unable to be calculated. The NZ Customs discussion paper does look at some of these issues but the option of setting the de minimis to zero does not seem to have been considered.

The justification used for having a de minimis is related to the cost of collection. If collection of GST could be incorporated into the electronic (credit card) transaction process the cost of collection might be substantially less than currently considered.

The NZRA will endeavour to obtain data for credit card transactions related to off shore purchasing of goods and services.

So… what basis of valuation should be used?

Customs Value – Is This An Option?

We would argue very strongly that freight, insurance and any other cost associated with the importation of product into New Zealand should be included for the purpose of calculating GST.

To ignore these costs would distort the market even further. The New Zealand based retailer has all of these costs to contend with and therefore in the interests of fairness and equity they must be included.

So… if that's how we believe GST should be levied how do we collect it in an efficient way?

This has always been the major argument for not collecting GST/Duty under $50 (now $60). The issue is not unique to New Zealand and quite a number of countries like New Zealand operate a de minimis system. However having said that the level of the de minimis is quite varied.

For example the value of goods that can enter various countries without tax (GST or Sales Tax or Duty) being levied is highly variable.

	$NZ
Australia	1316
USA	274
Canada	27
Japan	163
Korea	177
Singapore	417
UK	38
New Zealand	400

As this indicates New Zealand (with the exception of Australia) is right up at the top end.

If Canada (NZ $27) and the UK (NZ $38) can manage a system down to this level how do they do it? How do they collect amounts of GST/Duty/Sales Tax between $20 - $400. Could this be applied to all transactions and set the de minimis to zero?

What are the collection options?

The Tax Collection Options

It is generally agreed that the current collection model for private imports above the de minimis would not be cost effective for those imports below the current de minimis – that is, the cost of collection would be greater than the revenue generated.

Therefore, if the objective is to 'do away' with the de minimis and collect GST/Duty on all goods entering the country then we need to find another way. We need a cost effective way of collecting tax.

Option 1

In some countries the tax (either GST or Sales Tax) is collected by the courier on delivery. This is a possibility but how one manages deliveries through the postal system is a little unclear.

We suspect the courier companies may not favour this approach as not all deliveries require the recipient to be present. A possibility, but probably not totally practical. The courier companies would certainly expect recompense.

Option 2

Rather than holding up the clearance of goods (and the cost that this incurs) it might be possible to release the goods immediately but send an invoice to the addressee for the GST. There maybe some collection issues (bad debts) but it might be reasonably cost effective. This would depend on all declarations of value being honest and accurate.

Option 3

For goods coming in through the national mail centre the option might be to have these forwarded to the nearest Post Office and the recipient could pick up from there on the payment of the appropriate GST / Duty. This is similar to the British system. This would require a card going out to the recipient to advise them of the parcel's arrival. However, this still leaves an issue for the collection of GST on services where a physical product doesn't enter the country.

Option 4

The majority of transactions will be paid for by credit card (or a scheme debit card). We have thoroughly investigated the steps that the payment process goes through and believe that it may be possible to include the tax collection as part of this process.

The collection process can only be done through the New Zealand bank that issued the card.

We have reviewed the other end of the transaction (i.e. the suppliers bank who acquires the transaction) and we don't believe this offers any possibilities for GST collection.

So we could have a process that would follow the steps outlined:

1 The customer goes on-line, makes their product selection and opts to pay by credit card.

2 They then move to a secure payment site.

3 We would need to check the origin of the card (is it a New Zealand card?) and the delivery address (are the goods coming into New Zealand?)

4 If the transaction confirms both of the above conditions we shift to a tax calculation (not sure how this might work) and the appropriate GST is charged and the funds debited to the card and credited to the IRD.

This part of the process requires some expert input.

This would also be benefits here for IRD as this would be by far the easiest way of collecting GST on services.

What Is Best For New Zealand

With a Government focus on consumption tax it is important that **all** consumption is treated **equally**. All purchases made locally are subject to GST, so, why not all purchases made off-shore also?

In the current environment Government is only too well aware of the diminishing tax take. Company profits have taken a beating and therefore tax owing is down. Consumer spending is flat, therefore there is no growth there. Unemployment has increased over the last few years and therefore direct income tax isn't delivering up to expectations.

Surely in this environment the Government must be interested in maximising their tax revenue.

Consider the following…

1 Collect the tax on off-shore purchases … new revenue line.

2 By the removal of the exemption off-shore buying becomes less attractive to some resulting in better sales for domestic retailers. More jobs, more profits, more tax.

For New Zealand Inc there are definite benefits in collecting the GST on all purchases being imported privately. This is both a New Zealand Customs issue (goods) and an IRD issue (services).

The motivating reason for most to buy on-line is price. However there is a downside in that consumers have no protection from the Consumer Guarantees Act. It is in the best interests of the consumer to purchase locally so they have recourse to both the Fair Trading Act and Consumers Guarantees Act. There is a cost to local retailers in complying with these Acts that is not borne by offshore suppliers.

What Is Best For the Retailers Of New Zealand

Retailers are not looking for an advantage – what the sector wants is the playing field to be as level as possible.

There are always going to be pricing differences in New Zealand v overseas markets caused by currency changes, competitive pressures, buying strengths etc. But… having to fight against an additional 15% because of our own governments action is not something that the sector wants.

It is a significant amount.

It is beyond the control of the New Zealand based retailer.

It is unfair.

Recommendations

1 Take the policy decision to set the de minimis value at zero and charge GST and Duty on all private imports where the address of the cardholder and the delivery address are both New Zealand. This should apply to both goods and services.

2 Undertake an accurate scoping exercise to quantify the real value of the lost GST and Duty on all imports no matter how small. (including both goods and services)

3 Bring together relevant experts (Visa/MasterCard, Paymark/ EFTPOS (NZ),Issuing Banks) to find a way forward.

4 Investigate the collection model used by Canada and the UK.

5 A joint working party of officials from both Customs and IRD should be formed so that a solution is found that meets the needs of both parties.

6 A work programme, with finite time objectives, should be established to conduct the necessary investigations and undertake the development work. In the meantime the current de minimis value should be retained and so should the current method of valuation.

Appendix I

Responses to specific questions raised in the NZ Customs Service discussion paper:

"Issues Paper: Review of De Minimis"
December 2010

1 Comment On The Application Of A De Minimis Based On A Minimum Amount Of Duties/Taxes

Response: a) Our overall recommendation is to set the de minimis at zero.

b) Notwithstanding that if there is to be a de minimis it should be based on the value for taxable importation. That is, the GST calculation should be based on the value including duty if any duty is applicable.

2 Trade Off Between Administrative Efficiency And Integrity

Response: In our view the integrity of the tax system is the most important aspect and this is why we would recommend that the de minimis be set at zero. As the emphasis shifts from tax on earnings to tax on consumption it is really important that the tax system be seen to be fair and equitable.

As far as we are aware the de minimis is the only situation where there is discrimination in the tax collection process.

3 "Do you agree that the nature of trade is such that the basic need for a de minimis remains"

Response: No, we do not agree. In fact if New Zealand can 'crack the collection solution' they will have a very saleable product.

4 Estimates of Volumes/Compliance Costs etc

Response: It would appear to us that there are some really fundamental gaps in the knowledge base.

We cannot accurately calculate the value of lost GST/Duty as many import shipments (under $400) come straight through the system without being noted (in value terms).

We would recommend that a comprehensive review be undertaken so that Government can fully understand what is at stake.

5 "Do you agree that the de minimis is currently set at about the right level and is operating as intended?"

Response: While the de minimis might be operating as intended it does not take account of the changing market place. We now have New Zealand companies operating in an international retail market and the de minimis gives them a government sponsored price disadvantage.

We would come back to our earlier conclusion and request that the de minimis be set at zero and that the focus goes onto finding an administrative solution.

6 "Does the current mix of taxes applying at the border mean that the de minimis needs changing in some way to ensure its underlying purpose continues to be met".

Response: In principle we would not support varying levels of de minimis value for differing circumstances. This could lead to a situation of regulation dictating behaviour.

It might be best to remove the last bits of tariff duty, set the de minimis to zero and focus on collecting all GST.

The underlying purpose of de minimis is to exempt some from the burden of tax – we disagree with this underlying purpose.

7 Views On Method Of Calculation Of GST ('Customs Value')

Response: As has already been stated the method of calculation of GST must be fair and equitable. As GST within New Zealand is based on the total price paid by the consumer the same should apply to privately imported goods. (see earlier comment re tariff duty).

8 "Relationship Between De Minimis And Wider Risk Management Issues Identified By Customs".

Response: The focus on compliance costs and the current collection model risks bringing about undesirable outcomes. The greater the level of exemption (de minimis) allowed the more relaxed the system becomes and the greater the risks. These include risks of:

- increasing counterfeit product
- greater use of 'private imports' for onwards sale

9 Alignment with Australia (2 approaches)

Response: Our views on any increase in the de minimis have been clearly stated in this submission. In fact, it has been our primary argument that the de minimis should be set at zero.

Alignment with Australia makes no sense at all as they are so far out of line with the rest of the world. It reminds one of the proud mother watching the scout troop marching past and remarking … “My Johnny is the only one marching in time”.

Our issue is that all of the other issues go away if the issue of ‘efficient collection’ can be overcome. We should focus on what will give the best outcome and not on the best compromise.

VAT on postal packages

Standard Note: SN/BT/4155
Last updated: 4 April 2011
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Generally imports into the EU are charged VAT, though EU VAT law requires Member States to exempt from VAT commercial consignments worth €10 or less. Member States may apply a higher threshold up to €22 – worth £18 – and the UK does this. For VAT purposes the Channel Islands lie outside the EU, and there have been concerns for some time that some UK retailers are taking advantage of low value consignment relief, as it is known, by selling goods over the internet VAT-free from subsidiaries based in Jersey and Guernsey.[1] It has been estimated that this practice has cost the Exchequer around £80 million a year.[2]

In the past the Labour Government was reluctant to tackle this problem by cutting the threshold for imports, because of the extra demands this would place on HM Revenue & Customs, to calculate and collect VAT on a much larger number of parcels. As an alternative approach, it sought to persuade the authorities in both Jersey and Guernsey to discourage companies setting up this type of business, with some success.[3]

However, concerns continued to be raised about the exploitation of this relief, with reports of other retailers setting up subsidiaries in the Channel Islands to sell CDs and DVDs online.[4] Recent estimates indicate the Exchequer costs from this practice have been rising, to be in the region of £140m in 2009/10.[5] In the 2011 Budget the Coalition Government announced it would cut the LVCR threshold to £15 from November 2011 and "explore options with the European Commission" to prevent the relief being exploited "for a purpose it was not intended for." It is estimated that the £3 cut in the threshold will raise £5m in 2011/12, rising to £10m in 2012/13.[6]

This note gives a short introduction to this issue.

1 For example, "Jersey to crack down on tax loophole", *Financial Times*, 28 June 2005
2 HC Deb 12 February 2009 c2147W; HC Deb 23 June 2009 c830W
3 *Budget 2007* HC 342 March 2007 para 5.142
4 "Sainsburys and Best Buy set up Channel Island websites", *Observer*, 21 November 2010
5 HC Deb 28 March 2011 c39W
6 *Budget 2011* HC 836 March 2011 para 2.158; Table 2.1 : item 38

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1 VAT relief for small commercial imports

VAT is charged on the supply of all goods and services made in the course of a business by a taxable person, unless they are specifically exempt. All businesses must register for VAT if their turnover of taxable goods and/or services is above a given threshold, which is currently £73,000.[7] VAT is charged either at the basic rate - currently 20% - or the zero rate.[8] VAT is charged on the additional value of each transaction, and is collected at each stage of production and distribution. A business pays VAT on its purchases - known as input tax, and charges VAT on its sales - known as output tax. It will settle up with HM Revenue & Customs for the difference between the two. In the end the cost of the tax is borne by the final consumer.

VAT law in this country – in line with all other Member States – is based on European VAT law. Common criteria for the VAT base across all Member States were agreed in 1977, though this legislation was consolidated in a new principal EC VAT directive (2006/112/EC).[9]

Generally imports into the EU are charged VAT. VAT is normally due at the same rate as on the supply of those goods in the relevant Member State.[10] Under European VAT law all Member States are required to exempt from VAT importations of commercial consignments of a total value not exceeding €10. Member States may, if they wish, exclude mail order goods from the €10 exemption – though the UK does not do this. The exemption does not apply to alcoholic products, perfumes and toilet waters, and tobacco or tobacco products.[11] If they wish Member States may impose a higher limit up to €22 - which is worth £18. The UK does this.[12] Obviously, setting the ceiling for low value consignment relief represents a trade-off. More tax would be collected if the limit was €10, but more Customs and postal staff would be needed to raise charges, to complete the necessary documentation and to control and enforce the collection of charges on many more consignments which no longer qualified for relief.

The £18 limit applies to goods purchased over the internet, but provision is made in EU VAT law for a higher limit to apply to gifts;[13] in brief, import VAT is not chargeable if the value of

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7 With effect from 1 April 2011 (SI 2011/897).

8 A reduced rate of 5% is charged on a small number of supplies, including the supply of domestic fuel & power.

9 Council Directive 2006/112/EC of 28 November 2006 on the common system of value added tax (OJ L 347, 11 December 2006). Article 131 of the Directive specifies those goods and services to be exempted from tax.

10 Detailed guidance is given in HM Revenue & Customs, *Imports - VAT Notice 702*, April 2010.

11 Under articles 22 & 23 of EC directive 83/181/EEC

12 The limit was set at £18 by the *Value Added Tax (Imported Goods) Relief (Amendment) Order* SI 1995/3222, which amended item 8 to group 8, schedule 2 of the *Value Added Tax (Imported Goods) Relief Order* SI 1984/746 accordingly.

13 Under EC directive 78/1035/EEC; this is implemented in UK law by SI 1986/939.

the gift is £40 or less, if the gift has been sent from one private person to another, if there is no commercial or trade element, and it is of an occasional nature only – say, for a birthday or anniversary.[14] These limits apply to goods that have been sent to the recipient, from someone outside the EU. However, for *travellers* coming into the EU, separate allowances are set for goods that they may bring in with them for their own use without paying tax or duty: limits are set for alcohol, tobacco and perfume products, as well as a general allowance for other goods, which is much higher than the limit for personal imports. Many shoppers buying goods over the internet have confused the two, and in October 2005 HM Revenue & Customs launched a campaign on this issue:

> In recent years Customs officers have seen a dramatic rise in the number of packages on which Customs duty and import VAT is due. This reflects increasing levels of internet shopping - particularly from suppliers in the United States - and has led to complaints from the public, who are either unaware of the VAT and duty implications of internet purchases costing more than £18, or mistakenly assume that the £145 'passenger's allowance' applies.
>
> People are often unaware that although the foreign sender may have completed the customs declaration form on the parcel, they are regarded as the importer of the goods. If anyone purchases goods over the Internet and the declaration is found to be false or misleading they may be liable to financial penalties or criminal prosecution. Furthermore the goods themselves will be liable to forfeiture. If in doubt about potential purchases, or have any questions about customs charges individuals should contact our National Advice Service (NAS) on 0845 010 9000.[15]

As noted, in 2005 the monetary limit for personal allowances was £145. In 2007 Member States agreed to substantially increase this limit, and, for travellers coming to the UK, the limit is now £390.[16]

In its guidance for postal users, the department explains how postal packages are examined, how duty and VAT are charged, and why the Post Office may also impose a handling fee:

> Under international postal agreements the sender must complete a customs declaration ... which in most cases should be fixed to the package. The declaration includes a description of the goods, the value and whether they are gifts or commercial items ... We examine postal packages arriving in the UK from outside the EU for prohibited or restricted goods such as drugs, indecent or obscene material, weapons, endangered species and counterfeit goods, and to confirm the description and value stated on the declaration is correct. We also check the customs declaration to determine if customs duty, excise duty and import VAT is chargeable ...
>
> Royal Mail provides several options for payment and they will inform you of the options available and the amounts payable when they contact you. A postcard or letter is usually delivered to your address, detailing the amount due and the options available for payment. Once payment has been made, the package may be collected from the post office or if you have paid on line/by phone you can arrange for it to be delivered ... If customs charges are payable upon importation, Royal Mail charge a handling fee to cover the costs for carrying out customs procedures paying any

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[14] For guidance see, HMRC, *A guide for international post users - Notice 143*, April 2010

[15] HM Revenue & Customs press notice NAT 39/05, *Online shoppers warned - 'don't let parcels cost you a packet'*, 17 October 2005

[16] Directive 2007/74/EC set the limit at €430 from 1 December 2008. The sterling equivalent of this limit was uprated from 1 January 2010 to £390 by SI 2009/3172.

> customs duties or VAT due and collecting it from you. If customs examination is required, or if information is missing from the declaration, Royal Mail open, repack and reseal the package. Royal Mail fees are itemised separately on the charge label and are collected at the same time as customs charges.[17]

The guidance also explains that the arrangements are a little different for packages from the Channel Islands:

> UK Customs has special arrangements that allow some overseas traders to charge, collect and pay over to us the import VAT for goods purchased on the internet that would normally be chargeable at the time the goods are imported. These arrangements operate under Memoranda of Understanding (MoU) signed with certain overseas customs and postal authorities. The countries who have an MoU with HMRC are: Channel Islands, Hong Kong, Singapore and New Zealand. Overseas traders wanting to use this procedure must be authorised to do so by their authorities.
>
> Once authorised, foreign businesses are issued with a unique authorisation number, which they must show on the customs declaration or packaging. Also they will include the statement 'Import VAT Pre-paid'. Where these arrangements are used you will not be charged a Royal Mail handling fee when you receive your package.[18]

2 Concerns about VAT avoidance

The Channel Islands are not part of the VAT territory of the EC – so the islands do not fall under European VAT law – although the islands are part of the EC's customs territory.[19] As a consequence exports to the EC are liable to import VAT but not customs duty. Some UK retailers have taken advantage of the rules for low value consignment relief (LVCR) to sell goods over the internet from subsidiaries based in Jersey and Guernsey to UK consumers; if goods are worth £18 or less, the retailer may sell them VAT-free.

In evidence before the Treasury Committee in February 2005, the then Economic Secretary John Healey discussed the size of the revenue loss from this practice:

> **Q489 Norman Lamb:** Mr Healey, could I just ask you while you are here about the important issue that has been raised by the Forum of Private Business about this practice of stores such as Tesco's and possibly Specsavers as well setting up operations in Jersey and selling to the domestic market in the UK DVDs, CDs and so on and managing to avoid payment of VAT and thereby managing to sell a CD for £8.90 or something, completely undercutting traders within this country. Do you first of all agree that that is unfair competition essentially and that it is something that has got to be addressed and attempts should be made to close down what likes like a loophole?
>
> **John Healey:** Certainly it is the case that some countries are using what is in this country an £18 threshold for imports of goods from outside the European Union which if they are below that value do not attract VAT or customs duty. Now it is the case that some businesses are arguing that this is an avoidance, it is not illegal but it is an avoidance and it undercuts their ability to compete effectively in the UK market. It is

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17 *Customs Notice 143*, April 2010 paras 2.1, 2.8 3.3, 3.5
18 *Customs Notice 143*, April 2010 para 3.4
19 under s 93 of *VATA 1994* & reg 136 of SI 1995/2518

> also the case that this is at present leading to a not insignificant revenue loss of about £80 million a year … As things stand at the moment, that is set to grow over the next few years to a couple of hundred million but on the other side we also see arguments from consumer groups that would like us not to reduce the threshold, as some businesses argue, but to increase it because of the benefits that would bring to the consumer. These are matters that, as you would expect, like other tax issues, we keep very carefully under review.[20]

In February 2006 the All-Party Parliamentary Small Shops Group published a report on the long term prospects of the small retail sector, finding that among those giving evidence "there is widespread belief … that many small shops across the UK will have ceased trading by 2015 with few independent businesses taking their place. Their loss, largely the result of a heavily unbalanced trading environment, will damage the UK socially, economically and environmentally." One of the many issues the report discussed was the impact of VAT-free imports from the Channel Islands:

> There are also rising concerns about the VAT loophole created by ... [LVCR] in the Channel Islands ... This VAT loophole is being exploited by large UK retailers who are simply channelling the orders through the island VAT free. The Internet has exacerbated this situation, as expressed by an Internet music retailing company: "It is affecting us to such a degree that -- we are a specialist retailer, but we cannot move into mainstream products because we could not possibly compete with the price…If they were to sell their products for no profit whatsoever, and you would sell yours at no profit, they would be still making money on the VAT margin." Examples of retailers who are exploiting this loophole include Asda and Tesco. Both retailers are selling CDs for £8.99 and DVDs for £11.89. The normal online price of a CD is between £9.99 and £11.53. Consumers may benefit from this but there are wider negative effects. For example the impact of this revenue loss to the Treasury is enormous, an estimated £80m a year rising to £200m in the next few years. [21]

The Group recommended that, "the UK Government should immediately apply the lowest threshold applicable for the relief of low value consignments and permissible in the directive, which is currently 10 euros, (approximately £7) – this would eliminate the vast majority of exploiting trade almost immediately."[22]

At this time the Forum for Private Business also campaigned on the issue, arguing that the ceiling for LVCR should be cut to €10, or that the UK should obtain dispensation from the EU to close the loophole similar to one granted the Danish Government.[23] In a report on VAT on e-commerce published in May 2006, the National Audit Office gave some details of the Danish arrangements:

> Denmark currently provides relief from import VAT for imports of small consignments of a commercial nature from outside the EU. The Danish European Community reliefs limit is DKK80 (€10). The Danish Tax Authority found that some Danish publishing companies were re-routing the distribution of certain magazines and periodicals via a third country. Random checks showed that many consignments were printed in the EU, exported at a zero-rate of VAT to a country outside the EU (mostly the Åland

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20 *Fourth Report: Excise Duty Fraud*, 15 March 2005 HC 126 2004-05 Qs 489, 491 Ev 57. A subsequent PQ stated that £40m of the £80m loss was attributable to imports from Jersey (HC Deb 25 October 2005 c310W).

21 All-Party Parliamentary Small Shops Group, *High street Britain: 2015*, February 2006 pp 38-9

22 *op.cit.* p73

23 for example, "Letter: Treasury must plug this VAT loopholes", *Financial Times*, 11 February 2006

> islands[24] and Norway) and from there sent to subscribers in Denmark free of import VAT, as each consignment was valued below Denmark's European Community Relief limit. The Danish Tax Authority's investigations in the first nine months of 2003 found that some 3.5 million magazines and periodicals were imported from the Åland islands, with an estimated loss of revenue of some DKK47 million, or around £4.5 million.
>
> The Danish government obtained a derogation from the European Commission to remove the relief on magazines and its VAT law was changed accordingly from 1 June 2005. The Danish Tax Authority is seeking a change in the EU rules to abolish the relief and introduce a new and simple VAT-collection system for small consignments, or if that is not possible a change of the EU rules allowing Member States to exclude certain goods such as magazines from the European Community relief for small consignments.[25]

In March 2006 the authorities in both Jersey and Guernsey made moves to restrict the scope of this activity. In Jersey the Government stated that it would not issue new licences to allow UK companies to create Jersey-based distributors; some licences have been issued on an annual basis, although the *Financial Times* reported that some retailers had been granted licences with no time limit.[26] Similarly the Guernsey government announced it would not give planning permission for any new warehouses for distributors acting for UK retailers.[27]

In their report on e-commerce cited above, the NAO did not make any formal recommendations about the level of LVCR, though it suggested that HMRC should do more work to ensure VAT is charged correctly on imports worth more than the de minimis limit:

> 9. On the payment of import VAT on goods ordered from outside the EU, some suppliers incorrectly describe or value the contents of commercial packages to take advantage of UK reliefs exempting from import VAT consignments valued below £18 or to reduce the amount of VAT due. While it is difficult to quantify the extent to which overseas suppliers seek to evade VAT on behalf of the recipient in this way, controls operated by Royal Mail and express carriers together with the Department's selective checks provide a safeguard which the Department views as proportionate to the VAT at risk. It could do further work to confirm that this remains the case. The Department is increasingly working in partnership with overseas organisations to operate checks at the point of dispatch on goods which are liable for import VAT. This is a more cost-effective way of ensuring the payment of import VAT, compared with operating checks at the time of importation into the UK. The Department has also run publicity campaigns to inform UK shoppers of the import VAT due on consignments ordered over the internet and these will assume greater importance if the growth in trade continues.
>
> 10. Around 45 million small commercial consignments are imported by post into the UK each year. Around half of the sales by value are from the Channel Islands where some UK-based retailers have set up business operations to take advantage of the UK reliefs in selling goods to UK customers ordering online. The Department accepts that the VAT reliefs may be claimed on this trade provided the goods are supplied by a business established outside the EU, and are imported by a private person or a business that is unconnected with the supplier. In Budget 2006 the Government

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[24] Åland is an autonomous, Swedish-speaking region of Finland.

[25] National Audit Office, *VAT on e-commerce*, 26 May 2006 HC 1051 2005-2006 p12

[26] "Jersey cracks down on retailers exploiting loophole in VAT rules", *Financial Times*, 1 March 2006

[27] "Guernsey to turn away online retailers", *Financial Times*, 2 March 2006

> announced that it is keeping under close review the way in which some UK businesses have restructured their activities to take advantage of the VAT-relief that applies to commercial consignments imported from outside the EU and will consider options for changing the relief if it continues. The States of Jersey Government has recently announced measures which are being implemented to curb the trade by UK-based retailers.[28]

3 The Labour Government's approach

In the 2006 Budget the Labour Government acknowledged that LVCR "costs the Exchequer around £85 million a year", and that "if the relief continues to be exploited by businesses using offshore locations, the Government will consider changes to prevent this type of behaviour."[29] One practitioner writing on the tax avoidance provisions contained in the Budget made the following observation:

> But what is most notable is what has not been stopped. In particular, the abuse of Jersey and Guernsey for VAT purposes with goods shipped there one day being returned the next without VAT being charged has appeared to slip through the net this time. Maybe the government is relying on the pressure it has brought to bear on the governments of the islands in question to tackle or at least limit this abuse without further legislation being required, but it remains a surprise that such a blatant scheme has not been tackled when some very obscure arrangements attract attention.[30]

In November 2006 Andrew Love put down an EDM on the issue, calling for the LVCR threshold to be cut to £7, which 35 Members signed.[31] The then Paymaster General, Dawn Primarolo, discussed the Government's options in a debate in Westminster Hall at this time:

> Should the Government decide to reform the relief, a number of options will be available. We could reduce the threshold to £7, or we could seek a derogation from the European Commission to disapply the relief to imports from the Channel Islands; or we could disapply the relief specifically to CDs and DVDs from the Channel Islands. Various combinations of those and other options will be available. In deciding which options to use, the Government will need to consider not only the impact of small UK retailers but the knock-on effects on other stakeholders and larger suppliers.
>
> The Government will have to consider the effect that changes may have on the costs to business. For example, the Royal Mail and similar express carriers would be responsible for the carrying and delivery of such packages and would incur additional costs in collecting charges from those receiving the packages. Of course, consumers and businesses would face an increase in the cost of goods purchased, not only in respect of increased VAT but from charges that those carriers would incur when clearing packages through Customs. Indeed, the Government, who are responsible

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28 *VAT on e-commerce*, 26 May 2006 HC 1051 2005-2006 p6

29 *Budget 2006* HC 968 March 2006 para 5.107. Answers to a series of PQs at this time simply stated that the Government was keeping the matter "under close review" (eg, HC Deb 6 July 2005 cc 438-9W; HL Deb 20 July 2005 c 258WA; HC Deb 25 October 2005 c310W; HC Deb 7 November 2006 c1048W).

30 Richard Murphy, "Budget 2006 : The anti-avoidance non-event", *Accounting Web.co.uk*, 22 March 2006. Mr Murphy has continued to criticise LVCR on his Tax Research blog – see, for example, "Why the Channel Islands' VAT wheeze is illegal and has to stop", 9 July 2010.

31 EDM 305 of 2006/07, 27 November 2006. 67 Members signed a similar motion which Mr Love put down in the previous Session (EDM 2668 of 2005/06).

> for collecting it, would then have to increase charges as a response. The Government take the view that we need to balance all of those interests.[32]

The Minister also explained that both Jersey and Guernsey had taken some action to reduce this type of export to the UK, although she called it "disappointing":

> Jersey announced earlier this year that UK companies operating in the CD and DVD market through third party suppliers based in Jersey would need licences to run their businesses, and that those without a licence would be required to obtain one. Such companies would be granted time-limited licences, and our understanding is that such licences will not be renewed after 28 February 2007. The state of Guernsey is unable to apply a similar rule, but it will no longer encourage new UK companies to set up and operate through third parties. Frankly, both proposals are disappointing.[33]

In the 2007 Budget it was noted that the Jersey authorities had made a commitment "in discussions with the Government, to limit the activities of companies continuing to operate on the island, with the associated revenue loss to the Exchequer" and that the UK remained in "discussion with the Guernsey authorities on this issue."[34] Nevertheless Members continued to raise concerns about the cost of this relief, and its impact on certain sectors, such as independent music retailers and specialist health food stores,[35] while the department increased its estimate of the cost of LVCR, as noted in a written answer in June 2008:

> **Mrs. Dean:** To ask the Chancellor of the Exchequer (1) what recent estimate he has made of the value of (a) food supplements and herbal remedies and (b) recorded music and films imported annually from the Crown dependencies without the imposition of value added tax under the low value consignment relief scheme; and what assessment he has made of the effect of this trade upon mainland specialist high street retailers; (2) what estimate he has made of the tax foregone by the Exchequer as a result of the provision of low value consignment relief from value added tax for personal imports from Crown dependencies; for what reasons the relief is provided; and if he will make a statement.
>
> **Jane Kennedy:** The relief reduces administrative costs for businesses, HM Revenue and Customs, the authorised postal carrier (Royal Mail), express carriers and consumers by removing the requirement to pay VAT on large volumes of low value packages.
>
> As set out in PBR 2006 the total cost of the low value consignment relief is estimated at around £90 million. HMRC tentatively estimates that around three quarters of this cost is attributable to imports from the Crown dependencies.
>
> Although HMRC collects data on the total aggregate value of goods imported from many companies in the Crown dependencies these data are not broken down into individual products such as food supplements and herbal remedies or recorded music and films.
>
> As the then Paymaster General said on 1 November 2006, Official Report, column 146WH, it is not clear that the competitive pressures on small retailers are solely or even mainly related to the VAT relief enjoyed by offshore online retailers. It is difficult

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32 HC Deb 1 November 2006 cc 145-6WH
33 HC Deb 1 November 2006 cc 145WH.
34 *Budget 2007* HC 342 March 2007 para 5.142
35 For example, EDM 1767 of 2007-08, 11 June 2008: 25 Members signed this motion.

> to disaggregate the effect of the relief from other factors, such as the substantial growth of supermarket sales, and rapid technological change in the case of the market for audio-visual products, which are increasingly sold in download form over the internet. The Channel Islands authorities have, however, applied their regulatory powers to prevent the establishment of new businesses on the Islands where these are simply attempting to take advantage of the relief, and in the case of Jersey have required several businesses to leave.[36]

In January 2009 Janet Dean raised the issue in an adjournment debate: part of her speech is reproduced below:

> The Channel Islands authorities have misled officials and Ministers by suggesting that they are cleaning up their act and preventing further relocations for the purposes of tax avoidance. Yet information supplied to me by the independent CD and DVD sector suggests that Jersey is now the fulfilment base for Asda, Play.com, CD101 and BlahDVD. Tesco, which was excluded from the island in 2006, is now reportedly operating again through a Jersey-based fulfilment business, TheHut.com. HMV and Amazon, under a sister company name of Indigo Starfish, operate out of Guernsey.
>
> The trend of major corporate names shifting their fulfilment to the Channel Islands continues, and the only benefit of the so-called tighter regime is to guarantee additional business for the operators already there. Many of the goods in question are actually manufactured in the UK, shipped to the Channel Islands and then moved back to the mainland through the mail. The sole purpose of that manoeuvre is tax avoidance. Like the Minister, I am a believer in the benefits that competition can bring to consumers, but that competition is unfair and in some cases illegal. It can have no public policy justification.[37]

In response the then Financial Secretary, Stephen Timms, gave details of the action that had been taken to discourage companies from exploiting the relief:

> Following discussions with UK officials in 2006, Jersey and Guernsey issued policy statements making it clear that they are opposed to the growth of so-called third-party facilitators on the islands. Those facilitators exist to provide logistical services to UK-based companies, enabling them to benefit from the relief by exporting UK-originating goods through the islands without making any investment in establishing wider real economic activity there. The islands' authorities recognised that that was damaging to their international reputation and credibility and undermined the UK tax base. The policy statement issued by the States of Jersey introduced a licensing regime for companies and facilitators supplying goods by post to UK consumers. Companies supplying CDs and DVDs were granted only a 12-month licence and, at the end of that period, the licences were not renewed, so a number of companies were required to leave the island: my hon. Friend mentioned a couple of them. She also said that one or two had come back in a different form; that is news to me, and I will investigate it tomorrow.
>
> Since 2007, the Jersey authorities have refused to grant a licence to any new company operating in the CD and DVD market and wishing to relocate from the UK to Jersey. Equally, any new company wanting to relocate to Jersey is required to obtain an operating licence before it can start trading. The Jersey authorities have stated their strong presumption that licences will not be granted when there is no investment in the wider economic activity on the island. Following the withdrawal of licences, only

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[36] HC Deb 18 June 2008 c992W
[37] HC Deb 27 January 2009 c272

> one big company supplying CDs and DVDs from the island to the UK remains; it is a company that has been based in Jersey for quite a long time ...
>
> As far as Guernsey is concerned, I understand that the authorities there cannot introduce a licensing system similar to the one in Jersey because of the constraints of the local constitution. However, the Guernsey authorities have adopted a policy statement quite similar to that of their Jersey counterparts and used other available powers, including planning controls and employment permits, to limit the growth of activity on the island that involves the exploitation of the relief by UK-based companies. Guernsey has made it clear to a number of UK companies involved in music retailing, including those that have been forced to close their Jersey operations, that it does not wish to see them establish activities on the island ...
>
> As a consequence of the measures taken by the Channel Island authorities, we believe that the growth in the music sector there since 2006 has been curtailed. Of course the position might change, and my hon. Friend suggested developments that might lead to such a change, but that was the case at least until very recently. Certainly the exponential growth in the cost of the relief that some feared has not materialised, despite the rapid growth in internet shopping.[38]

He went on to reiterate the disadvantages to cutting the LVCR ceiling to the €10 minimum:

> If the Government decided to reform the low-value consignment relief, a number of options would be permitted under European Community law. We could reduce the threshold to the minimum level of €10 or seek a derogation from the European Commission to remove the relief from specific goods such as health products or CDs and DVDs, or from imports from certain countries. However, although some retailers might benefit from such a change, the knock-on effects on others would have to be considered. If the threshold of the relief were reduced to the lower limit, it is estimated that up to an extra 50 million small parcels a year would be subject to VAT. That would require substantially increased resources at Her Majesty's Revenue and Customs for calculation and enforcement of import taxes. ...
>
> There would be an increase in the cost of goods, not only from the addition of the VAT, but from charges applied by the carriers for clearing packages through customs, and the associated need, in many cases, to travel to a mail delivery office to make payment. All that is on the assumption that goods would continue to come in from the Channel Islands.
>
> We are also concerned that any restriction that we apply to the current threshold, or derogations against specific goods or exporting countries, could encourage businesses to reroute their low-value goods, quite legally, through other European Union countries that maintain the higher relief threshold. For example, it would be possible to send goods from the Channel Islands to France, from France to the UK and, because France still had the higher threshold, it would not be too difficult to reproduce the benefits of the current arrangements for companies that export directly from the Channel Islands to the UK. Once goods have been given customs clearance in the European Community, they can move between Community countries without restriction. A specific example would be goods sourced from Switzerland going through Italy or Germany to other member states.[39]

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[38] HC Deb 27 January 2009 cc 275-6
[39] HC Deb 27 January 2009 cc 276-7

4 Budget 2011

In July 2010 the new Coalition Government announced that it was 'actively reviewing' the operation of LVCR, and that in assessing the case for change it would "take into account the need to balance often conflicting considerations including the impact on consumers, UK businesses and Royal Mail and other parcel operators, as well as the overall fiscal position and the practicality and cost of enforcing any changes to the operation of the relief."[40] The Government gave no further details of this review in answers to PQs, though suggested if it concluded that changes should be made, it hoped to make an announcement by the time of the 2011 Budget.[41] In his Budget speech on 23 March the Chancellor George Osborne announced that the Government would "tackle the exploitation of low value consignment relief that has left our high street music stores fighting a losing battle with warehouses in the Channel Islands."[42] The Budget report gave more details:

> The Government will reduce the LVCR threshold from £18 to £15 from November 2011. The Government will also explore options with the European Commission to limit the scope of the relief so that it can no longer be exploited for a purpose it was not intended for, and will revisit the level of the LVCR in Budget 2012 if discussions with the European Commission do not produce a workable solution to the problem of exploitation of the relief.[43]

At this time the Government published updated estimates of the cost of this practice to the Exchequer:

> **Mr Bain:** To ask the Chancellor of the Exchequer what the cost to the Exchequer of low value consignment relief as it applied to value added tax was in each of the last four financial years.
>
> **Mr Gauke:** The cost to the Exchequer of low value consignment relief, based on a constant 17.5% standard rate of VAT, would be as follows:

	Loss of VAT
Financial year	*£ million*
2006-07	95
2007-08	105
2008-09	135
2009-10	140

> In practice the actual cost would be slightly different from these figures reflecting the temporary cut in the standard rate of VAT.[44]

The cut in the LVCR threshold is projected to raise £10m in a full year, as it is estimated that sales to the UK from outside the EU under £18 were worth about £395m in 2009/10, of which £95m lies between £15 and £18.[45] In their impact assessment HM Revenue & Customs suggest that the "number of people impacted by a £3 reduction in LVCR limit is likely to be

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40 HC Deb 13 July 2010 c661W
41 HC Deb 10 January 2011 c218W
42 HC Deb 23 March 2011 c962
43 HC 836 March 2011 para 2.158
44 HC Deb 28 March 2011 c39W. The standard rate of VAT was cut to 15% between 1.12.2008 and 31.12.2009, and increased to 20% on 4.1.2011.
45 HM Treasury, *Budget 2011 policy costings*, March 2011 p43

small, and it will mostly affect some on-line shoppers," though "there are no figures available that indicate how many individual consumers import goods or how they will be affected financially." The department go on to note that the change will "reduce the attraction for UK businesses to locate outside the EU" and non-UK companies will lose a certain price advantage over UK-based businesses, but they do not quantify these impacts. They suggest that any compliance costs for fast parcel operators involved in importing goods to the UK will be negligible, but that all of these effects "will be significantly magnified if the Government's discussions with the Commission are able to identify a practical mechanism to prevent LVCR from being exploited for tax management purposes in the future."[46] Provision to cut the LVCR threshold is made in the *Finance (No 3) Bill 2011* – specifically clause 76.

There was relatively little comment on this change following the Budget, though the *Times* quoted one VAT practitioner as noting that it would "still be possible for many items to be imported without customs duties or VAT being applied and there will be minimal impact to those companies currently utilizing LVCR."[47] Groups which have campaigned against LVCR were disappointed: the Forum for Private Business suggested the lower threshold would not prevent large companies exploiting the relief.[48] Similarly Richard Murphy of Tax Research UK blogged that this was good news but "it's not good enough. This allows vast amounts of abuse to continue - on almost all music for example."[49] The lobby group Retailers Against VAT Abuse (RAVAS) suggested that although the cut in the threshold was 'weak', it was significant that the Chancellor had suggested that companies using LVCR this way were, in essence, engaged in tax avoidance:

> Whilst RAVAS is disappointed in the weak reduction of the LVCR threshold to £15 in November, the clear intention to tackle VAT avoidance through LVCR is welcome and in particular the clarification that LVCR is being "exploited for a purpose it was not intended for" – terminology that is used to describe a tax abuse … the real significance of George Osborne's statement is that it puts a shadow over the legality of the current practices and if further action is taken as promised, this industry may well be dead and buried within 12 months.[50]

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46 HM Revenue & Customs, *VAT: Low Value Consignment Relief (TIIN 6820)*, 23 March 2011

47 "VAT dodge on CDs and DVDs is shut down – in part", *Times*, 24 March 2011

48 Forum for Private Business press notice, *Budget's small business growth strategy is just a first step*, 23 March 2011

49 "Channel Islands' VAT abuse - good news but not good enough", *Tax Research UK blog*, 23 March 2011

50 RAVGAS press notice, *The Message is in the Detail*, 24 March 2011. In their report the *Guardian* made a similar argument: "Tax loophole closed at last for VAT-free goods online", 24 March 2011.

ISSUES PAPER: REVIEW OF DE MINIMIS

Introduction

The Minister of Customs has asked the New Zealand Customs Service (Customs) to review the de minimis applying to imported goods.

The concept of de minimis in international customs practice is that the assessment and collection of tariff duty and other taxes on goods crossing the border should not be required for negligible amounts of tax revenue. This is because there will inevitably be a point where the costs involved in assessing and collecting the tax revenue will exceed the revenue due. The underlying objective is to facilitate the importation of low value goods.

Regulation 70 of the Customs and Excise Regulations 1996 specifies that the amount of duty below which the duty need not be collected on any goods imported into New Zealand is **$60.** Duty is defined to be tariff duty, excise equivalent duty and Goods and Services Tax (GST).

In simple terms Customs is not required to collect the duty payable on a consignment imported into New Zealand when it is $60 or less.

Purpose of this document - Stakeholder input

The purpose of this document is to provide a basis for stakeholder input into the review. This input will assist Customs in finalising its report to the Minister of Customs.

Comment on the issues raised and the analysis presented are welcome. Throughout the document questions and issues are highlighted on which your views are particularly sought.

Your input can be provided direct to the New Zealand Customs Service by writing to:

Phil Lockwood
New Zealand Customs Service,
Box 2218
WELLINGTON 6140.

or via e-mail to:

Phil.Lockwood@Customs.govt.nz

Your input needs to be received by 12 February 2011.

Executive Summary

The de minimis is intended to achieve a balance between the costs of assessing and collecting duty and the revenue received. Because over 96% of consignments entering New Zealand have no or relatively low customs values, a de minimis is required for efficient collection of duty.

A de minimis also impacts on the integrity of the taxation system: ie that intended rates of taxation are collected without discrimination. For example, by applying NZ's de minimis, a consumer may directly import goods in one consignment up to a value for taxable importation of approximately $399, and GST will not be collected at that point. The GST will never be collected if those goods are not on-sold as part of a taxable supply by a GST registered person. This may create incentives for consumers to import directly for themselves over purchases from high street retailers, for example.

Customs considers that NZ's de minimis is at an appropriate level based on its costs of transaction processing ($22.40-$26 per transaction depending on the method of importation) and the information we have on the compliance costs for importers using the International Mail Centre and those using express couriers (about $30 per transaction).

A higher de minimis would reduce overall compliance and administration costs and encourage low value importations, but it would also have the effect of undermining the integrity of the taxation system and reduce government revenue. The impacts of setting a de minimis based on a customs value of $650 or $1,000 have been examined. The taxation revenue foregone under these options is estimated to be up to $10.4m and $24m per annum respectively, which would exceed the combined compliance and administration costs of collecting it, based on current practice and cost structures. An increase in the de minimis therefore does not appear justified.

The de minimis has become linked with wider risk assessment (ie risks other than revenue eg illegal drugs) in the express airfreight environment due to the use of information supplied to clear consignments through the Electronic Cargo Information system. Customs has concerns with the quality of this information from the wider risk management perspective and would be reluctant to extend the application of ECI-based clearances through a higher de minimis without first working with the sector to improve the quality of this information.

NZ uses an amount of duty method to specify its de minimis. NZ now has both tariff duty and GST, with GST becoming more significant since its increase to 15%. By contrast the highest rate of tariff duty now in effect is 10% and most goods are free of tariff duty. GST and tariff duty are calculated differently. This makes NZ's de minimis difficult to understand and apply, especially for infrequent private importers.

A change in the de minimis to a customs value method, as used in Australia for example, may assist overcome many of the compliance issues that face infrequent private importers. A de minimis based on a customs value of $400 would roughly equate to the $60 duty payable of the current de minimis. Customs estimates this change would allow about 22,000 more consignments per annum (based on 2009/10 volumes) to enter the country under the de minimis. These would almost all be through airfreight where there may be a high freight cost component. This change in method would result in an estimated maximum loss of GST and tariff duty revenue of $2.175m per annum.

Glossary of terms used

CAPEC	Conference of Asia Pacific Express Couriers – a formal grouping of providers of commercial express airfreight services.
Customs clearance	the procedure by which imported goods enter into free circulation in the country of import. The procedure will include the calculation and payment of any duty and other taxes due, and formalities to establish that the goods are permitted to be imported under the laws in force in the importing country.
Customs value	the price paid for goods, excluding international freight and insurance costs. In NZ the customs value is expressed in NZ$ and is used for the calculation of tariff duty due on an import consignment.
De minimis	a level of government revenue which need not be collected due to the compliance and administrative costs of calculating, processing and collecting the revenue relative to the revenue itself.
Electronic Cargo Information (ECI)	an electronic version of an aircraft's manifest that is used to carry out the Customs' clearance of low value airfreight that fall within the de minimis (for goods generally valued at NZ$399 or less).
Import entry	A document required to be lodged with Customs to clear goods imported into New Zealand. It details the goods' particulars, eg, description, origin, value, duties payable, shipment details, etc. An import entry must be submitted to Customs in electronic format.
• Standard import entry	for imported goods with a Customs value of NZ$1,000 or more.
• Simplified import entry	for imported goods with a Customs value less than NZ$1,000.
Goods and Services Tax (GST)	NZ's value added tax established under the Goods and Services Tax Act 1989. It is levied at a rate of 15%, including on imported goods.
International parcel	a postal article carried across international borders by the body authorised by a government to provide international postal services governed by the Acts of the Universal Postal Union. International parcels are required by Acts of the Universal Postal Union to be accompanied by a specified customs declaration form.
Private Import Declaration (PID)	an internal Customs electronic format used to clear goods imported by private persons.

Revised Kyoto convention	the World Customs Organization's Protocol of Amendment to the International Convention on the Simplification and Harmonization of Customs Procedures.
Tariff duty	a tax generally based on the customs value of specified imported goods. In NZ tariff duty is imposed under the Tariff Act 1988 and collected by the NZ Customs Service.
Value of taxable importation	the price paid for goods, plus international freight and insurance, and tariff duty (if payable). The value of taxable importation is expressed in NZ$ and used for the calculation of Goods and Services Tax due on an import consignment.

Introduction

De minimis – mandate

New Zealand has acceded to the World Customs Organization's revised Kyoto Convention. The Convention contains a mandatory provision that requires contracting parties to specify a de minimis.

The Convention mandates two methods on which a de minimis may be based, either a:

- minimum amount of duties/taxes (where the duty payable is not collected below a specified level). **NZ uses this method**; or
- minimum value (where the duty is not collected on a consignment value below a specified level).

The Convention does not prescribe what the de minimis level should be. This is because for each individual customs jurisdiction a number of factors will need to be taken into account in setting it. As a consequence de minimis provisions vary among customs jurisdictions.

Why is this review being carried out?

Representations have been made over the last two years both to the Minister of Customs and Customs itself.

CAPEC has advocated a higher de minimis. CAPEC note that this would lower compliance costs (the costs of processing and reporting consignments for tax assessment and payment) for importers of low value express airfreight consignments. CAPEC has suggested that NZ's de minimis be increased to $125[1]. CAPEC note that this level of de minimis would more closely align NZ with Australian practice.

The Retailers Association on the other hand has suggested that a lower de minimis would bring greater consistency to the application of GST to private imports in comparison to purchases from a domestic retailer. The Association also note that with modern electronic-based trade a lower de minimis may not lead to higher compliance and administration costs.

Purpose of the review

This review is to establish if NZ's customs de minimis is working as intended, in particular:

whether it is consistent with minimising administration costs for government and compliance costs for importers in relation to revenue collection over low value import consignments

how wider border management (eg around prohibited imports and biosecurity risk goods) relates to the de minimis and might be affected by changes to it.

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[1] This was prior to the announcement that GST would increase to 15%.

The factors that will be taken into account in the review are:

the principles underpinning the de minimis
developments in border management
changes in government revenue sources and collection practices
developments in international supply chains
practice in other jurisdictions eg Australia.

Next steps

Customs will be reporting to the Minister of Customs in early 2011. Following the receipt of that report the Minister will decide what further steps will be taken.

Legal basis of New Zealand's de minimis

Section 118(a) of the Customs and Excise Act 1996 (the Act) states that regulations may be made to prescribe an amount of duty below which that duty need not be collected, and the circumstances in which that duty need not be collected.

Duty is defined in Section 2 of the Act to include tariff duty and GST[2].

Regulation 70 of the Customs and Excise Regulations 1996 specifies that the amount of duty below which the duty need not be collected on any imported goods is **$60**[3].

The table below sets out changes to the de minimis over the last 25 years and in relation to changes in GST rates. The tariff duty rates are examples to show how tariff duty in general has reduced over this time.

Year			Tariff duty rates	
	De minimis	GST	Shoes	Toys
1986	$30	10%	45%	43%
1989	$50	12.5%	39%	26.5%
2010	$60	15%	10%	5%

[2] The definition of duty includes some other taxes and levies but these do not impact on the operation of the de minimis eg anti-dumping and countervailing duties.
[3] Alcohol and tobacco products are excluded. A limited duty free concession is available to arriving passengers for these goods.

Application of NZ's de minimis

Tariff duty and GST are levied differently. Tariff duty is based on the customs value of the consignment whereas GST is levied on the total of the customs value, duty, insurance and the costs of transporting the goods to NZ (referred to as the value for taxable importation).

If only GST is to be levied, NZ's de minimis applies to a consignment with a value of taxable importation of $399 or less, ie GST at 15% on $399 is approximately $60.

If duty is also payable (tariff duty is assessed on the customs value of the consignment) then the de minimis will apply at a lower consignment value.

The following two tables illustrate the workings of the de minimis, and compare two import consignments with identical purchase prices and freight costs: one subject to tariff duty, and the other not subject to tariff duty.

Importation subject to the payment of tariff duty:

	A pair of shoes imported from the UK	**$NZ**	**Duty payable $**
A	$NZD value (Customs Value)	220	
B	Tariff duty on shoes @ 10% on Customs value	22	22
C	International freight and insurance	28	
	value for GST (sum of A to C)	**270**	
D	GST @ 15%	40.50	40.50
			62.50

Total revenue payable = B + D = $62.50 (revenue collected as it exceeds $60)

Importation that is free of tariff duty:

	Some CDs imported from the UK.	**$NZ**	**Duty payable $**
A	$NZD value (Customs Value)	220	
B	Import duty (Free)		nil
C	International freight and insurance	28	
	value for GST (sum of A to C)	248	
D	GST @ 15%	37.20	37.20
			37.20

Total revenue payable = $37.20 (revenue need not be collected as it is less than $60)

Do you have any comment on the application of a de minimis based on a minimum amount of duties/taxes?

Design of a customs de minimis

A de minimis represents a trade-off between two aspects of taxation design ie:

- **Integrity**, which suggests that the intended rates of taxation are collected without discrimination - all like transactions treated alike for taxation assessment etc. High integrity helps minimise any tendency for the application of taxes to influence investment and spending decisions in unintended ways; and

- **administrative efficiency**, which suggests that accounting for, and collection of, every last dollar of taxation revenue due cannot be practically or efficiently achieved as a point will be reached where more is being spent on administrative and collection processes than will be collected in revenue.

For example, a commercial "high value" import consignment will be assessed for tariff duty and GST at the time of importation. But by applying NZ's de minimis, a consumer may directly import goods in one consignment up to a value for taxable importation of approximately $399, and duty will not be collected at that point. The GST will never be collected if those goods are not on sold as part of a taxable supply by a GST registered person.

Note that the GST component of the duty not collected on importation due to the de minimis may still be collected later in the supply chain if the importation is by a business or person registered for GST purposes. The GST will be collected if that person or business uses the goods in a taxable supply, ie by on-selling them or using them as a component of a larger taxable supply.

The basic principle inherent in a customs de minimis also operates in other taxation procedures. For example, in NZ under provisions administered by Inland Revenue, a person that makes taxable supplies need not be registered for GST if the value of their supplies does not exceed $60,000 in a twelve-month period.

Impact of de minimis

One of the impacts of the de minimis is that it may encourage consumers to import directly for themselves rather than to purchase from a domestic retailer. These consumers must accept the risks inherent in purchasing from overseas.

Do you have any comment on the how the trade off between administrative efficiency and integrity in the designing a de minimis should be approached? What factors are most important from your perspective?

Review of de minimis

Need for a customs de mimimus

Historically the de minimis was related to the collection of tariff duty on "low value" consignments within the international mail stream. The majority of consignments within international mail were (heavy) letters, books, commercial documents and other paper. These have very low or nil customs values for tariff duty purposes.

Reporting threshold – standard import entry

The de minimis is linked in international customs practice with the reporting threshold for goods required to complete "full customs formalities". For consignments required to undergo full customs formalities, the importer must submit to a customs administration detailed

information on the classification, origin, and valuation of the goods at a consignment level to satisfy valuation elements for the calculation of duty, and statistical data for balance of trade purposes. In NZ this information is submitted in the form of a standard import entry. The rules around these matters can be complex to understand and apply. As a consequence importers use the services of a customs broker to clear goods though customs procedures.

The Act specifies a minimum consignment value of NZ$1,000 for the purposes of being required to submit a standard import entry.

Bulk and containerised sea freight and high value airfreight comprises the bulk of goods entering NZ by volume. Approximately 98% of the standard import entries lodged with Customs annually are generated through commercial channels. Very few low value consignments, (and therefore potentially subject to the de minimis) are imported through this channel.

Receipt and payment duty and other charges is carried out via deferred payment accounts, meaning commercial importers are able to well manage the cash flow implications of border clearance processes, and government revenue collection in particular.

The de minimis is therefore a largely irrelevant consideration in relation to clearance of goods through commercial cargo channels.

Low value import consignments

The working definition of a low value consignment is one falling below the value required for reporting on a standard import entry ie NZ$1,000.

Low value consignments must still be cleared by Customs. Reporting of low value consignments to Customs is generally through a Simplified Import Entry (commercial importers) or a Personal Import Declaration (private importers). This reporting enables the assessment and collection of duty on consignments to which the de minimis does not apply, ie with a value around $400 and up to $999.

The reporting required for consignments that are of such a low value that the de minimis will apply (ie around $399 and less) differs depending on the way the consignment enters NZ:

> through international parcels post – not required to be reported to Customs
> as international express airfreight – may be reported by the courier company via ECI.
> by any other method – a Simplified Import Entry (commercial importers) or a Personal Import Declaration (Private importers) is required as a minimum.

Express airfreight

While international mail still dominates in volume terms, express airfreight has emerged as a significant sector in its own right. The express airfreight sector's business model is based on servicing low weight, time sensitive international consignments.

At one end of the scale some of these consignments can be characterised as "mail in a hurry" ie time sensitive documents and other types of paper. At the other end are high value time sensitive items such as replacement parts for industrial plant.

Is there still a need for a customs de minimis?

Today the majority of import consignments still consist of items with no or very low customs values.

For example, 40.8 million consignments were imported into NZ in 2009/10. Of these 1.23 million were reported for full customs formalities (ie on a standard import entry). The remainder consisted largely of international courier items and international mail. These consignments, when they enter through express airfreight, will have higher values for GST purposes compared to the same consignment through parcels post because of the higher freight costs.

The following table gives an estimated breakdown (in percentage terms) of consignments coming through each stream requiring full entries, Private Import Declarations (PIDs), and low value ie under $400.

Clearance method	% of import consignments	Air	Sea	Mail
Standard or simplified import entry	3%	63%	35%	2%
Personal Import Declarations	0.01%	33%	1%	66%
ECI cleared or low value mail	96.99%	5.3%	less than 0.01%	94.7%
Total consignments 40.8M	100%			

Do you agree that the nature of trade is such that the basic need for a de minimis remains?

De minimis in practice

International mail

International mail is governed by internationally agreed rules, under the auspices of the Universal Postal Union, which includes the treatment of international parcels post in customs processes. International parcels post carried by the designated international mail service (NZ Post in NZ) is not subject to formal reporting to customs authorities.

Assessment and collection of duty

International mail is processed by Customs at NZ Post's International Mail Centre (IMC). It is manually screened, based on the "green customs declaration" or any invoice attached, into those items that can be released and those requiring assessment and collection of duty.

For commercial consignments, NZ Post or the importer's broker take responsibility for arranging for the goods to be formally reported by a standard or simplified import entry.

For private importations identified as exceeding the de minimis, or which for some other reason are required to compete customs formalities, a Customs Officer will create a record

(a PID) in Customs' goods processing system. Customs will contact the importer to arrange payment of the duty. In less clear cut cases a Customs Officer may have to obtain more information from the importer. Customs charges a processing fee for each PID of $22 (GST excl). In most cases a private importer will be able to complete their part of the formalities fairly straightforwardly. In other cases they may have to engage the services of a customs broker to manage the process from their end. The consignment will not be released from Customs' control until formalities have been completed.

The table below sets out the number of PIDs created by Customs for mail imports for revenue collection purposes[4] for the 2009/10 year. About the same number of consignments are passed to NZ Post and the importer's broker to clear as commercial importations. Overall less than a tenth of a percent of all international mail in 2009/10 required intervention for taxation collection purposes.

Entry Type	Total	Customs value $400 - $1,000	Customs value $1,000 +
PIDs	20,800	13,500	3,100

Express Airfreight

The express airfreight sector offers a door-to-door service which includes clearance through customs procedures. The time taken for consignments to clear customs formalities is important to this sector. Preclearance is preferred. The customs value of consignments is more spread than international parcels post, where there is a very high proportion of low customs value consignments. While the customs values of many express airfreight consignments are low, the freight cost can be high (and is added to the customs value for GST purposes).

Customs' estimates that about 2.4m consignments were imported via express couriers using the ECI reporting system for 2009/10. Of this total:

- 2.0m consignments had customs values of less than $400 and were cleared using ECI
- 126,000 consignments had customs values between $400 - $1,000 which were cleared on simplified or standard import entries
- 275,000 consignments had customs values exceeding $1,000 which were cleared on standard import entries

Assessment and collection of duty

For consignments with a value for taxable importation of $400 or more, the express courier will use in-house customs brokers to submit a simplified or standard import entry on behalf of the importer and arrange payment of duty and processing fees. Customs charges a processing fee for each standard and simplified import entry of $22 (GST excl).

[4] That is excluding PIDs generated for revenue collection over tobacco products (excluded from the de minimis), or for other non-revenue related clearances.

In 2007, CAPEC advised Customs[5] that each import entry cost its members around $20 to generate in labour and data transmission costs and when overheads are included the cost is about $30.

CAPEC members recover these costs as a component of a fee-for-service charged to the importer. An importer will have compliance costs in the form of administration processes for checking and paying the express courier's consolidated invoice.

Authorised express airfreight operators are permitted to report consignments below the de minimis threshold (ie a value for taxable importation per consignment of $399 or less) to Customs in the form of an electronic manifest – ECI. ECI reports are risk assessed by Customs and clearance given by return electronic message. Express Couriers pay Customs a processing fee of $30 for each ECI manifest submitted.

For the express courier the costs of preparing and submitting an ECI may be lower than a simplified or standard entry as the information required is largely obtainable from the invoice, and a precise tariff classification is not required. CAPEC members recover these costs as a component of a fee-for-service charged to the importer.

Do you have any comment on the estimates given for the volume of transactions or the costs of complying with revenue collection requirements through express airfreight?

How do costs vary between reporting consignments to Customs through ECI compared to the preparation of a standard or simplified import entry?

Is the de minimis operating as intended?

International parcels post

Customs charges a processing fee of $22[6] (excl GST) which is designed to recover about 90% of Customs' costs on average of processing the goods reported on an entry. The Crown meets the rest of the cost. This indicates Customs' costs of processing an entry are $24.20 on average. The specific activities to which the fee contributes are:

- processing information;
- identifying and assessing the nature of any risk associated with, or arising from, the goods;
- screening and inspecting consignments
- administration processes.

However, largely because of the manual steps involved, the effort for Customs to process a PID can be greater than the "average" entry. We estimate that an average PID requires between 20-30 minutes of officer time to process, spread across risk assessment, creating the PID record, interacting with the importer and collecting the revenue due. This would represent about $18.50 in labour costs with overheads of $7.50 on average. These

[5] Letter of 18 November 2007
[6] The fee applies to standard, simplified and PID entry types.

processes are not affected by the type of revenue collected ie tariff duty or GST. Some PIDs can take longer to process, but this may not be due to revenue-related issues.

From a private importer's perspective the compliance costs can be negligible (an invoice can be paid by credit card over the telephone for example). The importer is faced with meeting some of Customs' costs via the processing fee. If a broker is engaged the importer will have to pay for this service.

Currently an entry in the form of a PID generated out of the IMC just over the threshold for the de minimis, say $61 in duty is payable, will generate costs for Customs of about $26 on average of which $22 will be met by the consignee through a processing fee. These costs do not just relate to Customs revenue collection function but encompass all aspects of the risk assessment and clearance process. The extent of the importers' costs of clearing the goods on top of the processing fee will depend largely on whether a broker is engaged. Our experience is that most revenue-only clearances are handled by the private importer without the services of a broker.

No record is kept of the values of international mail falling under the de minimis. Customs estimates that reducing the de mimimis to $45 (roughly a consignment with a value for taxable importation of $300) would at least double the number of consignments requiring intervention for revenue collection at the IMC ie at least another 14,000 consignments a year. On average each of these would generate $52.50 in GST revenue or less than $1million in total per year. The extra resources required by Customs to process the revenue would be largely offset from the application of the processing fee, that is most of the cost would be met by the importer.

On the surface this suggests that depending on the average level of compliance costs, the de minimis could be lowered for international mail. However, the de mimimis must be applied across all methods of importation, and compliance costs for revenue collection will be higher for importations where a door-to-door service is used by the importer. A lower de mimimis would have the effect of prioritising Customs resources towards revenue collection at the IMC and away from other areas of Customs' activity eg prohibited imports.

Express Airfreight

A simplified or standard import entry generated out of the express airfreight sector on which the duty payable is on the limit of the de minimis, say $61, will generate costs for Customs on average of about $24.20 of which $22 is charged as a processing fee. This fee will be passed to the importer by the courier service along with any duty payable, either as part of an overall fee-for-service, or as a separate item on the bill.

As noted above CAPEC has advised Customs that each import entry cost its members around $20 to generate in labour and data transmission costs and when overheads are included the cost is about $30.

The costs quoted include the costs of activities that fall outside of the strict definition of compliance and administration costs in relation to tax assessment and collection.

Based on these estimates, it appears that the de minimis is operating broadly in accordance with underlying principles in the express courier environment. A reduction in the de mimimis would not appear to be justified in the express airfreight sector based on the costs of revenue collection and compliance.

Conclusion

The de minimis impacts on duty assessment and collection over low value consignments through the IMC and express courier services. The de minimis is principally aimed at achieving a balance between the costs of assessing and collecting duty and the revenue received.

Looking across both international mail and the express airfreight sector the de mimimis appears to be set at about the right level, based on the costs of revenue collection and compliance in the airfreight sector. Compliance costs may be lower for clearances through international mail but this has to be balanced against the net revenue gain of a lower de minimis (which would be small) and the impact of prioritising Customs resources towards revenue collection and away from other Customs' activity eg prohibited imports.

Do you agree with the basic conclusion reached that the de minimis is currently set at about the right level and is operating as intended?

Do you have any comments or suggestions on the way the de minimis is administered and applied by Customs on a day-to-day basis in the express airfreight or international mail sectors and which may improve the compliance aspect from the importer's perspective?

Other Developments impacting on the de minimis

Aside from the advent of the express airfreight sector, other developments over the last twenty or so years have impacted on the operation of the de minimis:

the liberalisation of import controls and the development of internet-based commerce

a decline in the importance of tariff duty as a source of government revenue and the advent of value-added taxes (ie GST in NZ)

priorities for the management of risks other than revenue at the border ie community protection (eg drugs), trade security and in NZ especially, biosecurity incursions.

Liberalisation of import controls and the development of internet-based electronic commerce

For many years the de minimis operated within a landscape of controls on trade that tended to discourage private direct importation. These included:

high rates of tariff duty
import licensing
foreign exchange controls

One of the impacts of the de minimis is that it may encourage consumers to import directly for themselves rather than to purchase from a domestic retailer. NZ's general liberalisation

of trade coupled with the advent of internet-based commerce has encouraged a steady growth in private direct importations through international parcels post and express couriers.

This has resulted in bringing into focus the compliance costs for importers of low value items. It has been raised, for instance, that the de minimis has not kept pace with inflation over the years. However, other developments have had a positive effect by reducing compliance costs. The Internet has given Customs an avenue to get advice to infrequent importers about border processes so that they can make informed decisions, for example. Telephone and internet based payment methods have reduced revenue collection costs.

Tariff Duty and Goods and Services Tax

The range of goods subject to tariff duty has narrowed over the years and rates have fallen. A number of free trade agreements are in place and more are under negotiation. The highest rate of tariff duty is now 10%.

GST was introduced at 10% in 1986 and has since taken on more prominence as a source of government revenue. GST was raised to 15% from 1 October 2010.

Tariff duty and GST are levied differently. Tariff duty is based on the customs value of the consignment whereas GST is levied on the total of the customs value, duty, insurance and the costs of transporting the goods to NZ (referred to as the value for taxable importation). As a consequence the minimis can be complex to apply, especially for infrequent private importers as it is difficult to explain in general terms how tariff duty, overseas freight and insurance influence the threshold value for GST. Explanation can only be given by reference to specific examples ie with different rates of tariff duty.

The information required to assess GST can be characterised as simpler in compliance terms from the point of view of the taxpayer than the information that has to be supplied to correctly assess tariff duty. For example, complex rules of origin are not needed for GST purposes. Lower compliance costs, combined with modern payment systems, means collection costs per dollar of revenue collected for GST are lower in comparison to tariff duty. This suggests that a case for a lower de minimis than at present may be justified – especially where goods are reported electronically to Customs eg express airfreight. The United Kingdom has different levels of de minimis for goods subject to tariff duty vs those that are only subject to Value Added Tax (VAT), for example.

However, the processing of international parcels post is not materially different depending on the type of tax collected. This suggests a higher de minimis for manual (ie international post) clearances in comparison to electronic (ie ECI clearances) as another option. However, differential levels of de minimis will tend to encourage private importers to use the international parcels post in preference to other services.

Do you have any views on whether the current mix of taxes applying at the border means the de minimis needs changing in some way to ensure its underlying purpose continues to be met?

Change in de minimis to a customs value method

A de minimis based on a maximum customs value for a consignment may be simpler to administer and apply given the complex interaction of the rules for tariff duty and GST that face infrequent private importers in applying NZ's current de minimis.

The maximum consignment value method is mandated by the Kyoto Convention, and is used by Australia who like NZ have both tariff duty and a GST. In Australia duty (ie tariff duty and GST) is not collected on an import consignment with a customs value below A$1,000. Customs value is the price paid for the consignment, ie excluding freight and insurance. By using the customs value, under the Australian approach:

> tariff duty is foregone, (for many goods there is no tariff duty levied in any case)
>
> GST only need be calculated on the purchase price of the goods, that is freight and insurance charges (and the duty if any) are not included for the purposes of calculating GST.

This makes the de minimis easy to comprehend and apply. Because tariff duty and GST are calculated on the same customs value basis, less frequent importers, when ordering goods direct over the Internet, are able at that time to ascertain any duty liability based on the e-invoice and prior to finalising the order. It also more closely matches practice in international parcels post where the green customs declaration is expressed as a customs value, and this is practically what judgements on revenue collection is based.

NZ could change to a de minimis based on a maximum customs value. A change to the Customs and Excise Act 1996 and regulations would be required to do this.

There is no simple way of converting a maximum duty de minimis of $60 to a single customs value for the purposes of defining a "no change" option. The closest would be to set a maximum consignment value at the threshold customs value at which GST is levied under the current de minimis, ie $400.

Due to excluding tariff duty and freight and insurance on the calculation of the de minimis, this would have the effect of marginally increasing the proportion of consignments coming through express airfreight to which the de minimis applies, due to freight costs being a large proportion of the total cost of low value importations. For example based on 2009/10 data, it is estimated that 22,000 more consignments would fall within a de minimis based on a Customs value of $400. We estimate that about 92% of these would come through airfreight.

In 2009/10 this would have produced a maximum loss[7] of tariff duty and GST of up to $2.175M.

This option would also impact on the integrity of the taxation system in that the treatment of freight and insurance for GST purposes would apply differently to imports subject to the de minimis compared to other imports and goods sourced within NZ. As noted earlier in this paper, any form of de minimis lessens the overall integrity of the taxation system. The relative impacts of a customs value approach vs one based on an amount of duty on integrity is matter of judgement, however it is noted that the relative importance of GST vs other taxation types has changed.

Taking this into account it may be better to use a value of taxable supply value for specifying a de minimis, and forgo any tariff duty on the consignment.

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[7] That is, if none of the GST was collected later in the domestic supply chain. This would not be the case as some of the importations will be by GST registered persons who then on-sell the goods.

Do you have any views on whether changing to a "customs value" method would materially make a difference to the compliance and administration costs around revenue collection over low value consignments?

If so, do you have any views on whether the customs value should be based on the value for duty or the value of taxable supply (ie GST value)?

If the method was changed, what costs/issues would arise for you or your member's businesses?

Relationship of de minimis to wider border risk management

Understanding the links between reporting requirements and revenue assessment and collection on the one hand and wider border risk management on the other is important to analysing the impacts of changes to the de minimis motivated to achieve lower compliance costs or more efficient tax assessment and collection.

All consignments entering NZ are subject to clearance by Customs to enable risk to be managed. This is not just the risk that revenue is being evaded but other border-related risk eg smuggling of prohibited goods such as illegal drugs, or for trade security purposes.

Modern customs administrations such as the NZ Customs Service use intelligence-driven risk management based on information submitted in the form of entries and other cargo documentation, usually in electronic form, to enable the majority of low risk trade to be facilitated through border processes and to concentrate on high risk trade.

Commercial importers lodge entries with Customs electronically, and assessment of duty and other clearance procedures are automated. In NZ an importer code is required on a standard import entry. Codes are allocated by Customs after an applicant has passed a screening process. An infrequent importer who requires a clearance via a standard import entry and who does not have an importer code must employ a customs broker who does. This level of control allows intelligence driven risk management to include known entities/persons. The information on an import entry is subject to a high degree of standardisation internationally.

Customs' performance target is to process 95% of electronically lodged entries within 30 minutes. This process also leads to other services that reduce regulatory and compliance costs to business, eg preclearance for low risk importers means customs formalities can be completed before the goods physically arrive in NZ.

The information on an import entry is now used for risk management purposes across a range of government activities, eg by MAF Biosecurity to manage the risk of biosecurity incursions. The compliance and other costs associated with preparing and submitting information to complete customs formalities cannot be compared simply to the taxation revenue produced, but also must be considered in the context of the range of government purposes to which the information is put and the other outcomes this produces for business.

Risk management – international mail

An intelligence-driven risk management approach is not possible for international mail. For international mail the risk management process commences when the mail arrives in NZ. It is largely a manual process.

Customs officers processing international mail are not just dealing with revenue matters – they are also making an assessment at the same time as to whether an item might require intervention for some other reason eg suspicion of controlled or prohibited goods. Drug detector dogs may be utilised.

MAF Biosecurity officers are also present visually checking for any biosecurity risk goods or "hitchhikers", and mail is passed through an x-ray as part of this process. The x-ray images can also be used for Customs' purposes.

International mail is a relatively high risk pathway into NZ for a range of contraband. The volume is large. Customs does not have the resources to open and inspect a high proportion of postal items, and cognisance has to be given to facilitating the majority of low risk items. Consequently there is a constant juggling of priorities at the IMC. Revenue collection over low value parcels consignments is resource intensive. The de minimis is one tool for assisting balance these priorities.

A higher de minimis would tend to reduce Customs' costs in terms of revenue collection, but this should be viewed as more of a trade-off of revenue collection vs other risk management priorities enabling resources to be diverted to manage other risks. Also the initial risk assessment process would still be required, and may attract a higher proportion of resources compared to the present if a higher de minimis has the effect of increasing the incentives to import high value items through international parcels post.

Under international agreements on the treatment of international parcels post there is no requirement for the content of parcels to be manifested by the mail service provider and, as a consequence, there is no information available to a customs administration prior to the parcels arriving in the destination country on which to make a risk assessment, whether for revenue risk or any other risk. So long as this continues the clearance of international mail will be a relatively high cost, labour intensive operation for border agencies.

Risk management – ECI reported goods

For customs clearance of low value express courier consignments, the choices were to adopt a similar model to international post (manual processing on arrival) or to use information to inform a risk management process and which would enable low risk items to be precleared. Express freight is time sensitive and so clearly the latter approach is preferred by the sector and was a principal driver behind the development of the ECI system for reporting low value consignments by authorised participants.

Authorised express airfreight operators are permitted to report consignments below the de minimis threshold (ie a value for taxable importation per consignment of $399 or less) to Customs in the form of an electronic manifest – ECI.

Customs staff are not routinely stationed at couriers' premises to undertake manual screening of low value consignments. Initial screening takes place against the information on ECI manifests. Further screening and inspections will take place for items that are

identified as being of interest. A manual ECI manifest is also used by MAF Biosecurity as part of the process of managing the risk of biosecurity incursions. Clearance is given by return electronic message.

Information reported on an ECI for each consignment includes:

a basic description of the goods

the name and address of the consignee

the consignor

a customs value

country of origin

For the courier the costs of preparing and submitting an ECI are lower than a simplified or standard entry as the information required is largely obtained from the invoice, and a precise tariff classification is not required.

Recent operations conducted by Customs confirm that express courier consignments are a risk pathway for the importation of contraband. These operations have indicated that the information supplied on ECI can vary in standard (eg inconsistency in the use of terms) and this has impacted on the effectiveness of risk assessments based on ECI, meaning that other measures have had to be bought into play. Customs is engaged with CAPEC over means to improve risk management over express courier consignments.

CAPEC's focus on the de minimis partly stems from an assumption that if it were raised then an outcome would be that a larger number of express consignments would be cleared through ECI. That is, if Customs has no taxation interest in a consignment then reporting to the level specified on a simplified or standard import entry is not required. This is correct to a certain extent. However, for Customs' part we are reluctant accept a decline in the quality of information being received overall on express consignments as this will increase risk (until the work referred to above is completed).

Customs' view is that any increase to the de minimis that has the flow-on effect of increasing the volume of consignments being submitted for clearance through ECI will have negative impacts on a range of risks in the current environment, and that this must be weighed up against the business and consumer benefits from a higher de minimis.

Do you have any comment on the relationship between the de minimis and wider risk management issues identified by Customs?

International practice

The revised Kyoto Convention does not prescribe what the de minimis level should be. This is because for each individual customs jurisdiction a number of factors will need to be taken into account in setting it, and in particular:

the state of import controls

whether tariff duty is a primary source of government revenue

whether a value added tax is in effect in addition to tariff duty

the degree to which customs processes, especially revenue assessment and collection, are automated

The table below lists the de minimis provisions of a range of customs jurisdictions with which NZ has trade relationships and translates these into a NZ$ equivalent:

Customs administration	**Value of the goods (up to)**	**Duty Amount**
Australia	AU$1,000 (NZ$1,316) [8]	-
United States[9]	US$200 (NZ$274)	-
Canada	CA$20 (NZ$27)	-
Japan	JP¥10,000 (NZ$163)	-
Korea	KR Won 150,000 (NZ$177)	-
Singapore	S$400 (NZ$417)	-
People's Republic of China	-	Renminbi 50 (NZ$10)
United Kingdom: – VAT – Customs duty	 £18 (NZ$38) -	 - £9 (NZ$20)

It can be seen that as a consequence of the interplay of these factors, de minimis provisions vary among customs jurisdictions. NZ's de minimis is not low compared to overseas practice, although many countries do use a customs value method rather than a duty foregone method. The United Kingdom has a mixed system.

Australia

Australia is NZ's major trading partner. Australia is similar to NZ in that it has both tariff duty and a GST. In Australia tariff duty and GST is not collected on an import consignment with a customs value below A$1,000. This was recently reviewed[10], but the outcome was the status quo.

[8] Based on the Customs Rates of Exchange effective on 13 October 2010
[9] The US is currently reviewing their de minimis value
[10] Review of the Application of GST to Cross-border Transactions; Board of Taxation February 2010.

Impacts of aligning with Australia's de minimis

Here we look at the impacts of a closer alignment of NZ's de minimis with that of Australia. Because NZ and Australia have different rates of tariff duty and a different rate of GST (GST is also not applied to all goods in Australia) an exact alignment is unattainable, for example the GST revenue foregone with a de minimis at a custom value of $1,000 is:

Australia – GST at 10% – A$100 revenue foregone

New Zealand – GST at 15% – NZ$150 revenue foregone.

Hence we look at the impacts of the following two scenarios:

not collecting duty on consignments with a customs value of less than NZ$1,000 ie an equivalent nominal customs value to Australia

not collecting duty on consignments with a customs value of less than NZ$650 ie an equivalent nominal level of GST forgone to Australia.

Both options would have the following financial impacts:

there would be a net reduction in GST and tariff duty collected. The majority of taxation revenue foregone would be from GST on private importations (ie by non-GST registered persons and organisations). Any imports below the threshold imported by a GST registered organisation or person would be levied later in the supply chain if used as a component in a taxable supply or otherwise on sold

cost savings to importers in the form of reduced compliance costs and from not having to pay processing fees to meet Customs' costs of processing entries

unless fees were reviewed, Customs would face a net reduction in income from cost recovery fees.

The table below summarises the estimated revenue impacts of these options, by increasing the de minimis, based on the data for low value importations for 2009/10.

De minimis	**Maximum entry[11] nos. pa**	**Maximum[12] Crown revenue foregone pa**		
		Import duty	**GST**	**Total Duty/GST**
Customs value of up to $650	112,000	$0.4M	$10M	$10.4M
Customs value of up to $1,000	215,000	$1M	$23M	$24M

[11] Standard and simplified import entries, and Private Import Declarations

[12] That is, if none of the GST was collected later in the domestic supply chain. This would not be the case as some of the importations will be by GST registered persons who then on-sell the goods.

Both options would increase the incentives for direct importation by non-GST registered persons over purchases from domestic retailers.

Either option, if adopted, would mean Customs would have to review its ECI manifest and import entry processing fees both to maintain cost recovery policy settings and to ensure income from the fees matched costs going forward. This is assuming higher rates of de minimis mean the transfer of the clearance of goods through the express airfreight channel from simplified import entries to ECI. If so, costs and cost recovery would have to be rebalanced from the entry documentation fee to the ECI manifest fee. The likely outcome would be an increase in the ECI manifest clearance fee.

Another impact would be on risk management. A higher de minimis would free up some of Customs' resources at the IMC to allocate to the management of other risks within the international parcels post. Conversely with respect to express courier consignments, and as noted earlier in this paper, Customs has concerns with the quality of ECI information for risk assessment purposes and is working with the express airfreight sector to resolve this. Customs is reluctant to recommend an increase to the de minimis reporting level until this work is completed.

Do you have any comment on the analysis of the two options identified for increasing the de minimis?

Would there be any impacts on your or your member's businesses from either of these two options that have not been identified?

Based on the compliance and administration costs of tariff duty and GST collection in the NZ context, increasing NZ's de minimis to either of these two levels does not appear to be justified. This is because the taxation revenue foregone would exceed the combined compliance and administration costs from collecting it, based on current practice and cost structures. While a higher de minimis would reduce overall compliance and administration costs and encourage low value importations it would also have the effect of undermining the integrity of the overall taxation system.

Do you agree with this conclusion? What particular considerations lead you to agree or disagree?

APPENDIX: Summary of the impacts of the three options for changes to the de minimis analysed in this issues paper.

IMPACTS OF A CHANGE IN THE DE MINIMIS FROM A DUTY AMOUNT TO A CUSTOMS VALUE AMOUNT AT VARIOUS CUSTOMS VALUES

De Minimis / **Options** ↓	**Impacts** →	**Section 118 – delegated power of the de minimis**	**Reg 70 - de minimis**	**Reg 13A – Inward cargo transaction fee**	**Reg 24A – Import entry transaction fee**	**Part II of the 2010 Tariff Document - Ref 75 - gift concession**	**Part II of the 2010 Tariff Document - Ref 81 - $700 passengers allowance**	**ECI "write off"'**	**Crown revenue – upper limit of revenue foregone p.a. (Import duty and GST)**	
									Import duty	**GST**
Change to a Customs value method (NZ$400)		Amendment to section 118(a) Primary legislation required	Amendment to reg 70 (order in council)	Presumed unchanged	Presumed unchanged	Presumed unchanged	Presumed unchanged	Value change from $399 to $400 (internal system $ value change)	$0.175M	$2M
Change to a Customs value to equate with revenue foregone in Australia (NZ$650)		Amendment to section 118(a). Primary legislation required.	Amendment to reg 70 (order in council)	Review the fee to reflect transfer of costs form entries to ECI processing.	Review of the imposition of the fee against low value imports that fall within the de minimis	Review or adjust the gift concession. Any amendment to ref 75 and/or reg 70 by order in council.	Review or adjust the allowances Any amendment to ref 81 and/or reg 70 by order in council	Value change from $399 to $650 (internal system $ value change)	$0.4M	$10M
Change to a Customs value to match Australia's A$1,000 (NZ$1,000)		Amendment to section 118(a). Primary legislation required.	Amendment to reg 70 (order in council)	Review the fee to reflect transfer of costs form entries to ECI processing.	Review of the imposition of the fee against low value imports that fall within the de minimis	Review or adjust the gift concession. Any amendment to ref 75 and/or reg 70 by order in council.	Review or adjust the allowance. Any amendment to ref 81 and/or reg 70 by order in council	Value change from $399 to $1,000 (internal system $ value change)	$1M	$23M

Notes:

1. A de minimis based on the Customs value will further dissociate the de minimis from the minimum amounts of refunds and drawbacks.
2. There would be various minor amendments to policies and procedures, publications, and Customs' website.