

**Navigation Charges:
Proposals by the NSBA and the BHBF**

Report by the Chief Executive, Director of Planning and Resources
and Collector of Tolls

Summary: In a meeting at the end of January the Authority's Chairman invited the Norfolk and Suffolk Boating Association (NSBA) and the Broads Hire Boat Federation (BHBF) to look at tolls and how they impact on the different fleets. This report sets out the methodology being suggested by the NSBA and the BHBF for the structure of the tolls system in advance of the October meeting when the Committee will be formally consulted on the level of charges for 2014/15.

1 Background

- 1.1 Last year's decision on navigation charges followed the deliberations of a Tolls Working Group which proposed a reduction for smaller craft which was endorsed by the Navigation Committee and the Broads Authority. The result was that over half the boats on the Broads had a reduction or no increase in their tolls. However, because of the existing relationship between 'entry level' craft and larger craft, the change in the relative charges for different sized craft resulted in the larger weekly hired cruisers paying higher tolls as well as the larger private craft.
- 1.2 At a meeting at the end of January with the Norfolk and Suffolk Boating Association (NSBA) and the Broads Hire Boat Federation (BHBF) concerns about the disproportionate impact on the hire boat companies and on the larger private craft of the changes were expressed. In response the Chairman of the Authority invited the two organisations to look at the impact on the different fleets and make suggestions to the Authority about a revised toll structure. Copies of the relevant correspondence and the proposal from the NSBA and BHBF are attached in Appendix 1 to this report.

2 Analysis

- 2.1 The NSBA/BHBF proposals provide an alternative charging structure based on the 2013/14 position. The key difference between this and the structure recommended by the Navigation Committee last October and

adopted by the Broads Authority, is that the NSBA/BHBF proposals would have resulted in some smaller boats seeing higher toll increases while for larger boats the impact would be moderated, particularly for the weekly hired boats.

- 2.2 The main element involves a reduction in that part of the toll varying with size coupled with an increase in that part which is fixed, which takes effect after a transition stage from entry level to 10 m². As a result, it allows the multiplier to be reduced from 2.65 to 2.64, introduces relatively higher charges for boats between 6m² and 25m² and relatively lower charges for the boats of 29 m² and above as demonstrated by the graph in Appendix 2.
- 2.3 Using the information provided by the two organisations the following tables show the impact there was/would have been in terms of % changes in tolls on the numbers of craft in selected categories between the actual 2013-14 figures (left hand column) and the NSBA/BHBF's suggested structure (right hand column).

6,350 Private Motor Boats (Non-electric)

Current Structure		NSBA/BHBF Proposal
2,357	Reduction/No Increase	1,132
1,203	0 - 3%	319
2,790	+ 3%	4,899

1,193 Sailing Boats

Current Structure		NSBA/BHBF Proposal
1,161	Reduction/No Increase	788
24	0 - 3%	123
14	+ 3%	282

1,088 Private Auxiliary (Non-electric)

Current Structure		NSBA/BHBF Proposal
388	Reduction/No Increase	280
464	0 - 3%	108
236	+ 3%	700

885 Weekly Hire

Current Structure		NSBA/BHBF Proposal
21	Reduction/No Increase	0
135	0 - 3%	885
729	+ 3%	0

The main beneficiaries of the NSBA/BHBF proposals are the largest boats on the Broads and the weekly hired fleet. Boats between 6 m² and 24 m² and day boats would make a higher contribution than they have done this year.

- 2.4 The Authority's Chairman has also asked the NSBA/BHBF to consider how such a new structure could be implemented for 2014/15, given that the Authority's Financial Strategy has outlined a 3% across the board increase, and the overall percentage change for some craft at the smaller end of the fleet would be substantial. The NSBA/BHBF recommendation on this will not be available until the Navigation Committee meets in October to consider the issue of setting the toll levels for 2014-15.
- 2.5 The NSBA/BHBF approach can be compared to the current position by means of the following table in respect of the current year's figures.

Broads Authority 2013-14	NSBA/BHBF Proposal
<i>Pros</i>	<i>Pros</i>
Reduction in charges for the smallest craft $\leq 5\text{m}^2$ to encourage more people on to the water.	Reduction in charges for the smallest craft $\leq 5\text{m}^2$ to encourage more people on to the water.
Addresses concerns about the cost for a small dinghy with an outboard motor which was approaching £100 and was higher than on other waters.	Addresses concerns about the cost for a small dinghy with an outboard motor which was approaching £100 and was higher than on other waters.
Overall 52% of boats received either no increase or a reduction in their charges. Only c. 32% above inflation.	Below inflationary increases for the weekly hired boat fleet.
Hired Day boats saw a reduction or no increase in charges	Reduces the increases for the larger private boats. A Broom 35 Coupe for example, 35' 1" long (40 m ²) would have had an increase of £17.46 (+ 5%) from £373.94 to £391.90 rather than £26.86 (+7%) to £400.80
<i>Cons</i>	<i>Cons</i>
Private Motor and sailing craft over 21m ² and weekly hired craft over 29m ² had an above inflationary increase.	Approximately half of the boats on the Broads would have seen increases above inflation.

Because of the fixed relationship between private and hired boats this had an adverse impact on the commercial fleet.	Mid-range vessels, such as the Microplus 503 – a small 16' 6" cabin cruiser (10m ²) would have had an increase of £6.66 (+5%) rather than a reduction of £2.54 (-2%)
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- 2.6 The views of the Committee are sought on the NSBA/BHBF proposals including the statement that the charges for the smallest craft (£90.00 for motor boats 5m² and under) should neither be maintained at the current level nor be further reduced.

Background papers: None

Author: John Packman, Andrea Long, Bill Housden, Trudi Wakelin and Lorna Marsh

Date of report: 16 August 2013

Broads Plan Objectives: None

Appendices: APPENDIX 1 - Correspondence with the NSBA and BHBF
APPENDIX 2 - Graphical comparison of the structures

APPENDIX 1 Correspondence with the NSBA and BHBF

From: Stephen Johnson
Sent: 06 August 2013 14:32
To: Richard Card
Cc: Paul Greasley; John Packman; davidbroad@btinternet.com
Subject: RE: NSBA BHBF tolls proposals

Dear Richard,

Thank you for these documents, for which I acknowledge receipt, as well as thanks to you and your committee for the hard work, time and thought that you all have put into consideration of the figures and the impacts.

I think it is not true to say that I am in broad agreement with the approach, but I have encouraged you to come forward with proposals which we can consider carefully and think about implementing. Indeed, it would be wrong for me to express a view about whether this means of approaching the tolls issue is the correct one to take before receiving advice on the matter from the Navigation Committee! So I await the debate for this year about how to structure the tolls with some interest.

There is one further tricky issue that we have to consider, of course. Your proposals for a revised toll structure which you have shown in parallel with the actual structure apply to the current financial year, 2013-14. Our Business Plan is predicated on a rise in tolls of 3% for 2014-15. If this - or a rise of any size - is deemed appropriate by the Navigation Committee and/or Authority, we will have to determine how this should be implemented: have you thought about this might be done?

To take just one example out of your figures, if there were to be a net rise in tolls of 3%, the owner of a motorised craft of 10m² could be facing a rise from this year's £134.40 not just to £143.60 (your figure), but to £147.90 (your figure plus 3%), which would be a 10% rise from the 2013-14 figure. In this case, even if the owner looks back at the 2012-13 figure, the 2014-15 rise would still be around 9.25%. This is likely to cause quite a storm - are we all ready for this?

Regards

Stephen Johnson
Chair
Broads Authority

From: Richard Card [richard.card1@btinternet.com]
Sent: 05 August 2013 20:19
To: Stephen Johnson
Cc: Paul Greasley; John Packman; davidbroad@btinternet.com
Subject: NSBA BHBF tolls proposals

Dear Stephen

Please find attached a letter about the BHBF/NSBA revised Tolls proposals, together with a workbook showing them in detail.

Also attached for your convenience are our letter sent to you in March and a selection of the calculations from our original proposals.

Kind regards
Richard

NORFOLK & SUFFOLK BOATING ASSOCIATION



The Broads Hire Boat Federation

5 August 2013

Dr Stephen Johnson
Chairman
Broads Authority
Yare House
62-64 Thorpe Road
Norwich
NR1 1RY

Dear Stephen

NSBA/BHBF Tolls Proposals refined

When we met you and John Packman on 17 June to discuss the NSBA/BHBF's proposals sent to you on 28 March this year, you expressed broad agreement with them but asked us to come back with proposals for a 'ramp' between entry level craft (generally those under 6 sq m) and craft of a larger size (which we should determine). We have worked on this and attach our agreed proposals. For your convenience, we also attach our 28 March letter and a selection from our March proposals consisting of the summary sheet and the three sheets for (non-electric) motor craft.

After many iterations, and with the objective of providing the 3% increase in tolls revenue predicated by the BA, we have adjusted our original proposals for craft from entry level to 9.99 sq m. From 10 sq m onwards our original proposed rates apply with a marginally higher fixed rate than originally proposed. Because of the different size-compositions of private and hire boats this adjustment has most effect on private boats. We have also reduced the multiplier for weekly hire craft (and all other hire craft besides day boats).

We would emphasise the following points:

- The structure is analogous to the existing structure for auxiliary craft (motorised sailing craft) where there is currently a change of rates at 14 sq m.
- The change in tolls between 2012 and 2013 resulted in hire boats overall having to pay 3.9% more in tolls, 0.9% more than the 3% set by the BA. Our original

proposals had reduced this to a 2.5% increase, but the adjusted proposals have reduced it further to 2.3%. This is a consequence of proposing a lower variable rate (8.26 as opposed to actual 8.88 in 2013) applying to craft over 10 sq m, and reducing the multiplier.

- The summary sheet of our attached July proposals shows how the 3% increase from 2012 to 2013 under these proposals would have applied to different types of craft. These % changes are not uniform across all types of craft, but those types with proposed decreases or low increases involve concentration at entry level. The % changes are therefore biased by the large reduction in the entry level rate. As in our original proposals, we have not proposed any alteration for entry level craft, because we understood this to be outside our terms of reference.
- Note that, overall, the effect of our proposals in relation to the 2012 tolls is fairly even within the private and the hire fleets.
- The impact of a particular tolls structure depends on the size-composition of the fleets. Our iterations are based on data supplied by the BA Collector of Tolls as at February 2013. There are many sizes of craft, between the smallest and the largest, in each fleet where, at that time, there were no craft of certain sizes and we have not included all of these in our schedules, although the same structure would, of course, apply to them.

Please note that the file for the July proposals starts with a guide to the tolls structure and to the content of the following sheets for each of the main type of craft.

We are sending you these proposals now, on the understanding that John Packman desires time to present a report to the Navigation Committee.

Yours sincerely

Richard Card, Chairman, NSBA

Paul Greasley, Chairman, BHBF

Cc David Broad
John Packman

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NORFOLK & SUFFOLK BOATING ASSOCIATION



The Broads Hire Boat Federation

28 March 2013

Dr Stephen Johnson
Chairman
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Dear Stephen

NSBA/BHBF Tolls Proposals

Introduction

When we met you, David Broad and John Packman on 29 January 2013 it was agreed that the NSBA and BHBF should examine the impact of the tolls on the different fleets of craft and report back to the Authority by Easter with any proposals for change for consideration by the Authority. Our proposals are set out below and (in more detail) in the attachment to this letter.

We have had three meetings, at each of which we have discussed papers setting out the impact of the methodology underlying the tolls scheme for 2013-14, and containing proposals for changes in that methodology together with full exemplification of their effect.

The mutual trust and respect which exists between our two sides has meant that our discussions have been open, frank and positive.

The reason for proposing changes

We are agreed that the toll-charges set by the Authority for 2013-14 have the following adverse effects:

- The hire boat industry is particularly badly hit by the tolls-increases in respect of hire motor cruisers.
- Larger craft bear substantial increases, whereas smaller craft receive a reduced toll.

Our proposals would remove these consequences and would produce a more equitable solution.

The extent and operation of our proposals

The changes proposed relate to motor/sail/auxiliary sail craft in excess of 5m², both private and hire. We have not proposed changes to the 2013-14 toll-charges for canoes, sailboards, rowboats etc, entry level craft (motor or sail of 5m² or less) and miscellaneous craft such as houseboats, wherries and workboats. In totality these craft currently make a relatively minor contribution to tolls income, and we have understood that consideration of them was outside our terms of reference.

Our proposals are presented on the basis of the numbers of craft of each type which were used for the Authority's tolls review in respect of 2013-14 and on the basis of the Authority's projected tolls income in 2013-14. Thus, our proposals indicate what the toll-charges would have been in 2013-14 if our proposals had been adopted.

Our proposals

The essential features of our proposals are that:

- We have adhered to the Guiding Principles and Criteria approved by the Authority on 23 November 2012.
- We have discovered by analysis that the toll-charges for motor/sail/auxiliary sail craft are driven by a relevant fixed element and a relevant variable element as well as by the relevant, well known multipliers for hire craft and discounts for particular types of craft. We have altered the fixed elements and the variable elements which were applied by the Authority in determining the 2013-14 toll-charges.
- Currently, the incrementally increasing toll-charges apply to all sizes of motor/sailing/auxiliary sail craft above the entry level band. The entry level toll-charges provide the starting point, in that one unit of a variable amount derived from the entry level band toll-charge for that type of craft is added for each successive square metre above the entry level. This has depressed the amount payable by craft above but near to the entry level band. We propose de-coupling entry level toll-charges so that there is an independent threshold at 6m² for the incremental increases.
- This de-coupling has enabled us to reduce the variable amounts. This reduction coupled with an increase in the fixed amounts has avoided the anomalous results produced by the current toll-charges under which smaller craft bear reduced tolls whereas larger craft bear substantially increased tolls.
- As a result of the above changes the lines showing toll-charges in relation to boat size are less steep than the present ones.
- Within around £500, our proposals would achieve the Authority's projected tolls income for 2013-14 in respect of motor/sail/auxiliary sail in excess of 5 m² while at the same time achieving the equitable solution referred to above.

The adoption of our proposals would mean that private tollpayers would have paid approximately £14,500 more in 2013-14 and commercial tollpayers would have paid £15,000 less.

We are agreed that the approach adopted above (with any necessary adjustment of the variable and fixed amounts) could be applied in setting the toll-charges for 2014/15 in respect of motor/sail/auxiliary sail craft in excess of the entry level band. We also consider that that year should be the first step in a longer term adjustment of toll charges. Our proposals would not, of course, fix the amount of tolls payable in 2014-15 in respect of canoes, sailboards, rowboats etc, entry level craft and miscellaneous craft but we would be opposed to any form of protection being given to such craft against an overall increase in tolls.

Yours sincerely

Richard Card, Chairman, NSBA

Paul Greasley, Chairman, BHBF

Cc David Broad
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Mock-up of toll schedule sheet - a Guide

Each toll is made up of a fixed rate and an incremental amount (depending on size and the set variable rate); this does not apply to entry-level craft, where there is just one fixed rate.

The tolls structure is based on values of these fixed and variable rates set for private motor craft; various multipliers or factors are applied to these for other types of craft.

The tolls structure (actual and proposed) can be thought of as a staircase with given treads and heights for the stairs. It is a simple structure such that anyone can calculate by a piece of simple arithmetic what the toll will be for any particular boat. It means that the printed BA Tolls Schedule need only provide the toll rates for smaller boats (in practice up to the 20m² rate); from thereon the incremental amount can be added on.

Rates for tolls structure

The 3 columns under this heading give the values of the above rates actually set for 2012-13 (column 2012: uncoloured column) and 2013-14 (column 2013A: coloured grey), and what is proposed to replace the existing 2013 rates as a basis for setting the rates for 2014-15 (column 2013P: coloured yellow).

		2012	2013A	2013P	Essence of the proposals
The 1st 5 rows here apply to every type of craft, depending on size. The rates for auxiliary craft differ because the entry level is at a larger size.	Fixed ≤10 m ²	57.94	45.60	36.40	In place of uniform fixed and variable rates applying from entry-level upwards, as in 2012 and in 2013, the proposal involves different rates above & below 10m ² . This allows the variable rate for craft larger than 10m ² to be less than it would otherwise have to be to provide the same income.
	Variable ≤ 10 m ²	7.90	8.88	10.72	
	Fixed ≥ 10 m ²	57.94	45.60	61.00	
	Variable ≥ 10 m ²	7.90	8.88	8.26	
Entry level rate applies to all craft (those smaller than 6m ² , except in the case of auxiliary craft). Although the toll rate is set by the BA, it is made up of the fixed rate and the variable rate applied to 5m ² .	Entry level rate	97.44	90.00	90.00	Entry level rates apply as set for 2013.
All the above rates are in £s					
Different multipliers apply to different types of hire craft.	Multiplier	2.70	2.65	2.64	The proposed structure provides 3% increase on 2012, with a reduced weekly hire multiplier (shown here).
Different factors apply to sail-only craft & to craft powered with electric engine.	Sail factor	0.50	0.50	0.50	The proposed structure provides the 3% increase on 2012 set by the BA, roughly the same revenue as in 2013, with benefit to the hire trade from both the lower variable rate and from the reduced hire multiplier.

What a sheet for a particular type of boat shows (hypothetical example)

SIZE (m ²)	No. of Boats	Cum. no.			Tolls		% change on 2012		Income		
			2012	2013A	2013P	2013A	2013P	2012	2013A	2013P	
	No. computed from BA Tolls Office data Feb 2013										
A size is a m ² band, extending up to the next whole m ² , as shown for size 1		The cumulative number is the running total of boats up to and including the given size		Grey fill used for 2013 data	Yellow fill used for proposed tolls						
1(≥1 but < 2)	2	2	131.54	119.25	118.80	-9%	-10%	263.09	238.50	237.60	
2	4	6	131.54	119.25	118.80	-9%	-10%	526.18	477.00	475.20	
3	25	31	131.54	119.25	118.80	-9%	-10%	3288.60	2981.25	2970.00	
4	16	47	131.54	119.25	118.80	-9%	-10%	2104.70	1908.00	1900.80	
5	6	53	This line indicates the end of entry-level craft.								
6	1	54	142.21	131.02	132.95	-8%	-7%	142.21	131.02	132.95	
7	0	54	152.87	142.78	147.10	-7%	-4%	0.00	0.00	0.00	
8	0	54	163.54	154.55	161.25	-5%	-1%	0.00	0.00	0.00	
9	0	54	174.20	166.31	175.40	-5%	1%	0.00	0.00	0.00	
10	4	58	This row is the end of the proposed middle stage in the structure; tolls here are the same whether calculated by the below 10 m ² rates or by the above 10 m ² rates.								
11											
12											
13	10	68									
14	0	68	227.53	225.14	233.16	-1%	2%	0.00	0.00	0.00	
	A line here indicates some change in the existing structure for this type of craft.										
15	2	70	238.19	236.91	244.07	-1%	2%	476.39	473.82	488.14	
This column goes up to the largest size in Feb 2013		50% of craft are smaller than or within the MEDIAN size									
Total	70					Overall effect on income					
						-8.7%	-8.8%	6801	6210	6205	
			NB The proposals deliberately set out to alter the total income for various types of craft whilst keeping overall income to BA the same. In this example, craft of this type overall actually pay 8.7% less in 2013 than in 2012, and the proposal involves a reduction of 8.8% on 2012.								
Example of calculation:											
The red cell is size 15: - in this column, variable rate ≥ 10m ² = 8.26, fixed rate ≥ 10m ² = 61.00											
So incremental amount = 8.26x15=			123.90								
add on fixed rate			+ 61.00								
			184.90								
This column has multiplier 2.64 and sail factor 0.5, so the toll =184.90 x 2.64 x 0.5 =			244.07								

Tolls Income Summary: motor/auxiliary sail/sailing craft, private and hire*						
	No.	2012	2013A	2013P	2013P compared to 2012	2013P compared to 2013A
Private						
Motor	6350	1356975	1401309	1407773	+3.7%	+0.5%
Motor - Electric	262	20442	19396	19666	-3.8%	+1.4%
Auxiliary	1088	147466	149891	152718	+3.6%	+1.9%
Auxiliary - Electric	99	8603	8580	8690	+1.0%	+1.3%
Sailing	1193	68069	64865	66576	-2.2%	+2.6%
Total private	8992					
Hire						
Motor (Weekly hire)	885	846753	888371	866646	+2.3%	-2.4%
Motor (Day hire)	255	127914	126696	131220	+2.6%	+3.6%
Motor (Day hire) - Electric	55	16613	16145	17016	+2.4%	+5.4%
Auxiliary	45	21955	22650	22738	+3.6%	+0.4%
Sailing	107	13981	13354	13564	-3.0%	+1.6%
Total hire	1347					
Total	10339	2628770	2711258	2706606	+3.0%	-0.2%
Total Private (above craft)		1601555	1644042	1655423	+3.4%	+0.7%
Total Hire (above craft)		1027216	1067216	1051183	+2.3%	-1.5%
Propn Private (above craft)		60.9%	60.6%	61.2%		
Propn Hire (above craft)		39.1%	39.4%	38.8%		
* There are other types of craft not shown above and other users besides private and hire.						
Thus the totals shown above do not cover the whole of the tolls income.						

Private Motor -			Rates for tolls structure										
Non Electric			2012	2013A	2013P								
		Fixed ≤10 m ²	57.94	45.60	36.40					2012 data are without colour			
		Variable ≤10 m ²	7.90	8.88	10.72					Actual tolls for 2013 (2013A)			
		Fixed ≥10 m ²	57.94	45.60	61.00					are shown with grey			
		Variable ≥10 m ²	7.90	8.88	8.26					What 2013 tolls would have been under the			
		Entry level rate	97.44	90.00	90.00					proposals (2013P) are shown with yellow			
SIZE	No. of	Cum.	Tolls (£)					% change on 2012		Income (£)			
(m ²)	Boats	No.	2012	2013A	2013P	2013A	2013P			2012	2013A	2013P	
1	11	11	97.44	90.00	90.00	-8%	-8%			1071.84	990.00	990.00	
2	75	86	97.44	90.00	90.00	-8%	-8%			7308.00	6750.00	6750.00	
3	172	258	97.44	90.00	90.00	-8%	-8%			16759.68	15480.00	15480.00	
4	227	485	97.44	90.00	90.00	-8%	-8%			22118.88	20430.00	20430.00	
5	248	733	97.44	90.00	90.00	-8%	-8%			24165.12	22320.00	22320.00	
6	231	964	105.34	98.88	100.72	-6%	-4%			24333.54	22841.28	23266.32	
7	168	1132	113.24	107.76	111.44	-5%	-2%			19024.32	18103.68	18721.92	
8	159	1291	121.14	116.64	122.16	-4%	1%			19261.26	18545.76	19423.44	
9	160	1451	129.04	125.52	132.88	-3%	3%			20646.40	20083.20	21260.80	
10	188	1639	136.94	134.40	143.60	-2%	5%			25744.72	25267.20	26996.80	
11	278	1917	144.84	143.28	151.86	-1%	5%			40265.52	39831.84	42217.08	
12	273	2190	152.74	152.16	160.12	0%	5%			41698.02	41539.68	43712.76	
13	167	2357	160.64	161.04	168.38	0%	5%			26826.88	26893.68	28119.46	
14	218	2575	168.54	169.92	176.64	1%	5%			36741.72	37042.56	38507.52	
15	275	2850	176.44	178.80	184.90	1%	5%			48521.00	49170.00	50847.50	
16	169	3019	184.34	187.68	193.16	2%	5%			31153.46	31717.92	32644.04	
17	123	3142	192.24	196.56	201.42	2%	5%			23645.52	24176.88	24774.66	
18	141	3283	200.14	205.44	209.68	3%	5%			28219.74	28967.04	29564.88	
19	121	3404	208.04	214.32	217.94	3%	5%			25172.84	25932.72	26370.74	
20	156	3560	215.94	223.20	226.20	3%	5%			33686.64	34819.20	35287.20	
21	199	3759	223.84	232.08	234.46	4%	5%			44544.16	46183.92	46657.54	
22	355	4114	231.74	240.96	242.72	4%	5%			82267.70	85540.80	86165.60	
23	220	4334	239.64	249.84	250.98	4%	5%			52720.80	54964.80	55215.60	
24	103	4437	247.54	258.72	259.24	5%	5%			25496.62	26648.16	26701.72	
25	86	4523	255.44	267.60	267.50	5%	5%			21967.84	23013.60	23005.00	
26	87	4610	263.34	276.48	275.76	5%	5%			22910.58	24053.76	23991.12	
27	134	4744	271.24	285.36	284.02	5%	5%			36346.16	38238.24	38058.68	
28	169	4913	279.14	294.24	292.28	5%	5%			47174.66	49726.56	49395.32	
29	125	5038	287.04	303.12	300.54	6%	5%			35880.00	37890.00	37567.50	
30	111	5149	294.94	312.00	308.80	6%	5%			32738.34	34632.00	34276.80	
31	85	5234	302.84	320.88	317.06	6%	5%			25741.40	27274.80	26950.10	
32	62	5296	310.74	329.76	325.32	6%	5%			19265.88	20445.12	20169.84	
33	105	5401	318.64	338.64	333.58	6%	5%			33457.20	35557.20	35025.90	
34	74	5475	326.54	347.52	341.84	6%	5%			24163.96	25716.48	25296.16	
35	103	5578	334.44	356.40	350.10	7%	5%			34447.32	36709.20	36060.30	
36	70	5648	342.34	365.28	358.36	7%	5%			23963.80	25569.60	25085.20	
37	105	5753	350.24	374.16	366.62	7%	5%			36775.20	39286.80	38495.10	
38	102	5855	358.14	383.04	374.88	7%	5%			36530.28	39070.08	38237.76	
39	59	5914	366.04	391.92	383.14	7%	5%			21596.36	23123.28	22605.26	
40	55	5969	373.94	400.80	391.40	7%	5%			20566.70	22044.00	21527.00	
41	64	6033	381.84	409.68	399.66	7%	5%			24437.76	26219.52	25578.24	
42	65	6098	389.74	418.56	407.92	7%	5%			25333.10	27206.40	26514.80	
43	37	6135	397.64	427.44	416.18	7%	5%			14712.68	15815.28	15398.66	
44	22	6157	405.54	436.32	424.44	8%	5%			8921.88	9599.04	9337.68	
45	17	6174	413.44	445.20	432.70	8%	5%			7028.48	7568.40	7355.90	
46	40	6214	421.34	454.08	440.96	8%	5%			16853.60	18163.20	17638.40	
47	19	6233	429.24	462.96	449.22	8%	5%			8155.56	8796.24	8535.18	
48	25	6258	437.14	471.84	457.48	8%	5%			10928.50	11796.00	11437.00	
49	11	6269	445.04	480.72	465.74	8%	5%			4895.44	5287.92	5123.14	
50	7	6276	452.94	489.60	474.00	8%	5%			3170.58	3427.20	3318.00	
51	11	6287	460.84	498.48	482.26	8%	5%			5069.24	5483.28	5304.86	
52	9	6296	468.74	507.36	490.52	8%	5%			4218.66	4566.24	4414.68	
53	4	6300	476.64	516.24	498.78	8%	5%			1906.56	2064.96	1995.12	
54	18	6318	484.54	525.12	507.04	8%	5%			8721.72	9452.16	9126.72	
55	7	6325	492.44	534.00	515.30	8%	5%			3447.08	3738.00	3607.10	
56	2	6327	500.34	542.88	523.56	9%	5%			1000.68	1085.76	1047.12	
57	4	6331	508.24	551.76	531.82	9%	5%			2032.96	2207.04	2127.28	
58	1	6332	516.14	560.64	540.08	9%	5%			516.14	560.64	540.08	
59	0	6332	524.04	569.52	548.34	9%	5%			0.00	0.00	0.00	
60	4	6336	531.94	578.40	556.60	9%	5%			2127.76	2313.60	2226.40	
61	0	6336	539.84	587.28	564.86	9%	5%			0.00	0.00	0.00	
62	3	6339	547.74	596.16	573.12	9%	5%			1643.22	1788.48	1719.36	
63	1	6340	555.64	605.04	581.38	9%	5%			555.64	605.04	581.38	
64	1	6341	563.54	613.92	589.64	9%	5%			563.54	613.92	589.64	
65	0	6341	571.44	622.80	597.90	9%	5%			0.00	0.00	0.00	
66	0	6341	579.34	631.68	606.16	9%	5%			0.00	0.00	0.00	
67	0	6341	587.24	640.56	614.42	9%	5%			0.00	0.00	0.00	
68	1	6342	595.14	649.44	622.68	9%	5%			595.14	649.44	622.68	
69	2	6344	603.04	658.32	630.94	9%	5%			1206.08	1316.64	1261.88	
70	1	6345	610.94	667.20	639.20	9%	5%			610.94	667.20	639.20	
71	1	6346	618.84	676.08	647.46	9%	5%			618.84	676.08	647.46	
No craft now until													
76	1	6347	658.34	720.48	688.76	9%	5%			658.34	720.48	688.76	
77	1	6348	666.24	729.36	697.02	9%	5%			666.24	729.36	697.02	
No craft now until													
84	1	6349	721.54	791.52	754.84	10%	5%			721.54	791.52	754.84	
85	0	6349	729.44	800.40	763.10	10%	5%			0.00	0.00	0.00	
86	1	6350	737.34	809.28	771.36	10%	5%			737.34	809.28	771.36	
				Overall effect on income									
Total	6350					3.3%	3.7%			1356975	1401309	1407773	

Private Motor -			Rates for tolls structure									
Electric				2012	2013A	2013P						
		Fixed ≤10 m ²		57.94	45.60	36.40			2012 data are without colour			
		Variable ≤ 10 m ²		7.90	8.88	10.72			Actual tolls for 2013 (2013A)			
		Fixed ≥ 10 m ²		57.94	45.60	61.00			are shown			with grey
		Variable ≥ 10 m ²		7.90	8.88	8.26			What 2013 tolls would have been under the			
		Entry level rate		97.44	90.00	90.00			proposals (2013P) are shown			with yellow
		Electric factor		70%	70%	70%						
SIZE	No. of	Cum.		Tolls (£)			% change on 2012			Income (£)		
(m ²)	Boats	No.		2012	2013A	2013P	2013A	2013P		2012	2013A	2013P
1	5	5		68.21	63.00	63.00	-8%	-8%		341.04	315.00	315.00
2	28	33		68.21	63.00	63.00	-8%	-8%		1909.82	1764.00	1764.00
3	59	92		68.21	63.00	63.00	-8%	-8%		4024.27	3717.00	3717.00
4	50	142	MEDIAN	68.21	63.00	63.00	-8%	-8%		3410.40	3150.00	3150.00
5	41	183		68.21	63.00	63.00	-8%	-8%		2796.53	2583.00	2583.00
6	18	201		73.74	69.22	70.50	-6%	-4%		1327.28	1245.89	1269.07
7	10	211		79.27	75.43	78.01	-5%	-2%		792.68	754.32	780.08
8	7	218		84.80	81.65	85.51	-4%	1%		593.59	571.54	598.58
9	5	223		90.33	87.86	93.02	-3%	3%		451.64	439.32	465.08
10	4	227		95.86	94.08	100.52	-2%	5%		383.43	376.32	402.08
11	10	237		101.39	100.30	106.30	-1%	5%		1013.88	1002.96	1063.02
12	3	240		106.92	106.51	112.08	0%	5%		320.75	319.54	336.25
13	6	246		112.45	112.73	117.87	0%	5%		674.69	676.37	707.20
14	2	248		117.98	118.94	123.65	1%	5%		235.96	237.89	247.30
15	1	249		123.51	125.16	129.43	1%	5%		123.51	125.16	129.43
16	2	251		129.04	131.38	135.21	2%	5%		258.08	262.75	270.42
17	1	252		134.57	137.59	140.99	2%	5%		134.57	137.59	140.99
18	1	253		140.10	143.81	146.78	3%	5%		140.10	143.81	146.78
19	1	254		145.63	150.02	152.56	3%	5%		145.63	150.02	152.56
20	0	254		151.16	156.24	158.34	3%	5%		0.00	0.00	0.00
21	3	257		156.69	162.46	164.12	4%	5%		470.06	487.37	492.37
22	2	259		162.22	168.67	169.90	4%	5%		324.44	337.34	339.81
23	1	260		167.75	174.89	175.69	4%	5%		167.75	174.89	175.69
24	0	260		173.28	181.10	181.47	5%	5%		0.00	0.00	0.00
25	0	260		178.81	187.32	187.25	5%	5%		0.00	0.00	0.00
26	0	260		184.34	193.54	193.03	5%	5%		0.00	0.00	0.00
27	0	260		189.87	199.75	198.81	5%	5%		0.00	0.00	0.00
28	1	261		195.40	205.97	204.60	5%	5%		195.40	205.97	204.60
29	0	261		200.93	212.18	210.38	6%	5%		0.00	0.00	0.00
30	1	262		206.46	218.40	216.16	6%	5%		206.46	218.40	216.16
							Overall effect on income					
Total	262						-5.1%	-3.8%		20442	19396	19666

Motor Craft -		Rates for tolls structure								
Daily Hire Non Electric		2012	2013A	2013P						
	Fixed ≤10 m ²	57.94	45.60	36.40					2012 data are without colour	
	Variable ≤ 10 m ²	7.90	8.88	10.72					Actual tolls for 2013 (2013A)	
	Fixed ≥ 10 m ²	57.94	45.60	61.00					are shown	with grey
	Variable ≥ 10 m ²	7.90	8.88	8.26					What 2013 tolls would have been under the	
	Entry level rate	97.44	90.00	90.00					proposals (2013P) are shown	with yellow
	Multiplier	2.70	2.65	2.64						
No. of Cum.		Tolls (£)			% change on 2012		Income (£)			
Boats	no.	2012	2013A	2013P	2013A	2013P		2012	2013A	2013P
0	0	263.09	238.50	237.60	-9%	-10%		0	0	0.00
0	0	263.09	238.50	237.60	-9%	-10%		0	0	0.00
0	0	263.09	238.50	237.60	-9%	-10%		0	0	0.00
0	0	263.09	238.50	237.60	-9%	-10%		0	0	0.00
0	0	263.09	238.50	237.60	-9%	-10%		0	0	0.00
0	0	284.42	262.03	265.90	-8%	-7%		0	0	0.00
0	0	305.75	285.56	294.20	-7%	-4%		0	0	0.00
0	0	327.08	309.10	322.50	-5%	-1%		0	0	0.00
0	0	348.41	332.63	350.80	-5%	1%		0	0	0.00
0	0	369.74	356.16	379.10	-4%	3%		0	0	0.00
0	0	391.07	379.69	400.91	-3%	3%		0	0	0.00
13	13	412.40	403.22	422.72	-2%	3%		5361.17	5241.91	5495.32
1	14	433.73	426.76	444.52	-2%	2%		433.73	426.76	444.52
0	14	455.06	450.29	466.33	-1%	2%		0.00	0.00	0.00
6	20	476.39	473.82	488.14	-1%	2%		2858.33	2842.92	2928.82
0	20	497.72	497.35	509.94	0%	2%		0.00	0.00	0.00
1	21	519.05	520.88	531.75	0%	2%		519.05	520.88	531.75
7	28	540.38	544.42	553.56	1%	2%		3782.65	3810.91	3874.89
12	40	561.71	567.95	575.36	1%	2%		6740.50	6815.38	6904.34
20	60	583.04	591.48	597.17	1%	2%		11660.76	11829.60	11943.36
8	68	604.37	615.01	618.97	2%	2%		4834.94	4920.10	4951.80
19	87	625.70	638.54	640.78	2%	2%		11888.26	12132.34	12174.84
11	98	647.03	662.08	662.59	2%	2%		7117.31	7282.84	7288.46
2	100	668.36	685.61	684.39	3%	2%		1336.72	1371.22	1368.79
0	100	689.69	709.14	706.20	3%	2%		0.00	0.00	0.00
4	104	711.02	732.67	728.01	3%	2%		2844.07	2930.69	2912.03
15	119	732.35	756.20	749.81	3%	2%		10985.22	11343.06	11247.19
37	156	753.68	779.74	771.62	3%	2%		27886.09	28850.23	28549.91
11	167	775.01	803.27	793.43	4%	2%		8525.09	8835.95	8727.68
18	185	796.34	826.80	815.23	4%	2%		14334.08	14882.40	14674.18
18	203	817.67	850.33	837.04	4%	2%		14718.02	15305.98	15066.69
12	215	839.00	873.86	858.84	4%	2%		10067.98	10486.37	10306.14
25	240	860.33	897.40	880.65	4%	2%		21508.20	22434.90	22016.28
17	257	881.66	920.93	902.46	4%	2%		14988.19	15655.78	15341.78
36	293	902.99	944.46	924.26	5%	2%		32507.57	34000.56	33273.50
29	322	924.32	967.99	946.07	5%	2%		26805.22	28071.77	27436.04
86	408	945.65	991.52	967.88	5%	2%		81325.73	85271.06	83237.40
68	476	966.98	1015.06	989.68	5%	2%		65754.50	69023.81	67298.46
20	496	988.31	1038.59	1011.49	5%	2%		19766.16	20771.76	20229.79
21	517	1009.64	1062.12	1033.30	5%	2%		21202.40	22304.52	21699.22
30	547	1030.97	1085.65	1055.10	5%	2%		30929.04	32569.56	31653.07
32	579	1052.30	1109.18	1076.91	5%	2%		33673.54	35493.89	34461.08
28	607	1073.63	1132.72	1098.72	6%	2%		30061.58	31716.05	30764.03
51	658	1094.96	1156.25	1120.52	6%	2%		55842.86	58968.65	57146.60
14	672	1116.29	1179.78	1142.33	6%	2%		15628.03	16516.92	15992.59
85	757	1137.62	1203.31	1164.13	6%	2%		96697.53	102281.52	98951.42
14	771	1158.95	1226.84	1185.94	6%	2%		16225.27	17175.82	16603.17
55	826	1180.28	1250.38	1207.75	6%	2%		64915.29	68770.68	66426.10
3	829	1201.61	1273.91	1229.55	6%	2%		3604.82	3821.72	3688.66
31	860	1222.94	1297.44	1251.36	6%	2%		37911.08	40220.64	38792.16
16	876	1244.27	1320.97	1273.17	6%	2%		19908.29	21135.55	20370.66
5	881	1265.60	1344.50	1294.97	6%	2%		6327.99	6722.52	6474.86
0	881	1286.93	1368.04	1316.78	6%	2%		0.00	0.00	0.00
2	883	1308.26	1391.57	1338.59	6%	2%		2616.52	2783.14	2677.17
2	885	1329.59	1415.10	1360.39	6%	2%		2659.18	2830.20	2720.78
					Overall effect on income					
					4.9%	2.3%		846753	888371	866646

Hire Motor Craft -			Rates for tolls structure									
Day Boats &			2012	2013A	2013P							
Passenger	Fixed ≤10 m ²		57.94	45.60	36.40				2012 data are without colour			
Boats -	Variable ≤ 10 m		7.90	8.88	10.72				Actual tolls for 2013 (2013A)			
Non	Fixed ≥ 10 m ²		57.94	45.60	61.00				are shown with grey			
Electric	Variable ≥ 10 m		7.90	8.88	8.26				What 2013 tolls would have been under the			
	Entry level rate		97.44	90.00	90.00				proposals (2013P) are shown with yellow			
	Multiplier		3.00	2.95	2.95							
SIZE	No. of	Cum.	Tolls			%change on 2012			Income			
(m ²)	Boats	no.	2012	2013A	2013P	2013A	2013P		2012	2013A	2013P	
1	0	0	292.32	265.50	265.50	-9%	-9%		0.00	0.00	0.00	
2	0	0	292.32	265.50	265.50	-9%	-9%		0.00	0.00	0.00	
3	0	0	292.32	265.50	265.50	-9%	-9%		0.00	0.00	0.00	
4	1	1	292.32	265.50	265.50	-9%	-9%		292.32	265.50	265.50	
5	1	2	292.32	265.50	265.50	-9%	-9%		292.32	265.50	265.50	
6	0	2	316.02	291.70	297.12	-8%	-6%		0.00	0.00	0.00	
7	4	6	339.72	317.89	328.75	-6%	-3%		1358.88	1271.57	1314.99	
8	14	20	363.42	344.09	360.37	-5%	-1%		5087.88	4817.23	5045.21	
9	34	54	387.12	370.28	392.00	-4%	1%		13162.08	12589.66	13327.86	
10	33	87	410.82	396.48	423.62	-3%	3%		13557.06	13083.84	13979.46	
11	53	140	434.52	422.68	447.99	-3%	3%		23029.56	22401.83	23743.31	
12	71	211	458.22	448.87	472.35	-2%	3%		32533.62	31869.91	33537.13	
13	13	224	481.92	475.07	496.72	-1%	3%		6264.96	6175.88	6457.37	
14	4	228	505.62	501.26	521.09	-1%	3%		2022.48	2005.06	2084.35	
15	9	237	529.32	527.46	545.46	0%	3%		4763.88	4747.14	4909.10	
16	2	239	553.02	553.66	569.82	0%	3%		1106.04	1107.31	1139.64	
17	0	239	576.72	579.85	594.19	1%	3%		0.00	0.00	0.00	
18	0	239	600.42	606.05	618.56	1%	3%		0.00	0.00	0.00	
19	1	240	624.12	632.24	642.92	1%	3%		624.12	632.24	642.92	
20	0	240	647.82	658.44	667.29	2%	3%		0.00	0.00	0.00	
21	0	240	671.52	684.64	691.66	2%	3%		0.00	0.00	0.00	
22	0	240	695.22	710.83	716.02	2%	3%		0.00	0.00	0.00	
23	1	241	718.92	737.03	740.39	3%	3%		718.92	737.03	740.39	
24	0	241	742.62	763.22	764.76	3%	3%		0.00	0.00	0.00	
25	0	241	766.32	789.42	789.13	3%	3%		0.00	0.00	0.00	
26	0	241	790.02	815.62	813.49	3%	3%		0.00	0.00	0.00	
27	0	241	813.72	841.81	837.86	3%	3%		0.00	0.00	0.00	
28	0	241	837.42	868.01	862.23	4%	3%		0.00	0.00	0.00	
29	0	241	861.12	894.20	886.59	4%	3%		0.00	0.00	0.00	
30	0	241	884.82	920.40	910.96	4%	3%		0.00	0.00	0.00	
31	0	241	908.52	946.60	935.33	4%	3%		0.00	0.00	0.00	
32	0	241	932.22	972.79	959.69	4%	3%		0.00	0.00	0.00	
33	2	243	955.92	998.99	984.06	5%	3%		1911.84	1997.98	1968.12	
34	1	244	979.62	1025.18	1008.43	5%	3%		979.62	1025.18	1008.43	
35	0	244	1003.32	1051.38	1032.80	5%	3%		0.00	0.00	0.00	
36	1	245	1027.02	1077.58	1057.16	5%	3%		1027.02	1077.58	1057.16	
37	0	245	1050.72	1103.77	1081.53	5%	3%		0.00	0.00	0.00	
38	0	245	1074.42	1129.97	1105.90	5%	3%		0.00	0.00	0.00	
39	0	245	1098.12	1156.16	1130.26	5%	3%		0.00	0.00	0.00	
40	0	245	1121.82	1182.36	1154.63	5%	3%		0.00	0.00	0.00	
41	0	245	1145.52	1208.56	1179.00	6%	3%		0.00	0.00	0.00	
42	1	246	1169.22	1234.75	1203.36	6%	3%		1169.22	1234.75	1203.36	
43	0	246	1192.92	1260.95	1227.73	6%	3%		0.00	0.00	0.00	
61	2	248	1619.52	1732.48	1666.34	7%	3%		3239.04	3464.95	3332.67	
No craft now until												
68	1	249	1785.42	1915.85	1836.91	7%	3%		1785.42	1915.85	1836.91	
69	0	249	1809.12	1942.04	1861.27	7%	3%		0.00	0.00	0.00	
70	0	249	1832.82	1968.24	1885.64	7%	3%		0.00	0.00	0.00	
71	0	249	1856.52	1994.44	1910.01	7%	3%		0.00	0.00	0.00	
72	2	251	1880.22	2020.63	1934.37	7%	3%		3760.44	4041.26	3868.75	
No craft now until												
84	1	1	2164.62	2334.98	2226.78	8%	3%		2164.62	2334.98	2226.78	
No craft now until												
89	2	2	2283.12	2465.96	2348.61	8%	3%		4566.24	4931.93	4697.23	
No craft now until												
98	1	1	2496.42	2701.73	2567.92	8%	3%		2496.42	2701.73	2567.92	
						Overall effect on income						
Total			255			-1.0%	2.6%		127914	126696	131220	

Hire Motor Craft -				Rates for tolls structure								
Day Boats &				2012	2013A	2013P						
Passenger	Fixed ≤10 m ²			57.94	45.60	36.40			2012 data are without colour			
	Boats - Variable ≤ 10 m ²			7.90	8.88	10.72			Actual tolls for 2013 (2013A)			
Electric	Fixed ≥ 10 m ²			57.94	45.60	61.00			are shown		with grey	
	Variable ≥ 10 m ²			7.90	8.88	8.26			What 2013 tolls would have been under the			
	Entry level rate			97.44	90.00	90.00			proposals (2013P) are shown		with yellow	
	Multiplier			3.00	2.95	2.95						
	Electric factor			70%	70%	70%						
SIZE	No. of	Cum.		Tolls			% change on 2012			Income		
(m ²)	Boats	no.		2012	2013A	2013P	2013A	2013P		2012	2013A	2013P
1	0	0		204.62	185.85	185.85	-9%	-9%		0	0	0.00
2	0	0		204.62	185.85	185.85	-9%	-9%		0	0	0.00
3	0	0		204.62	185.85	185.85	-9%	-9%		0	0	0.00
4	0	0		204.62	185.85	185.85	-9%	-9%		0	0	0.00
5	0	0		204.62	185.85	185.85	-9%	-9%		0	0	0.00
6	1	1		221.21	204.19	207.99	-8%	-6%		221.21	204.19	207.99
7	1	2		237.80	222.52	230.12	-6%	-3%		237.80	222.52	230.12
8	0	2		254.39	240.86	252.26	-5%	-1%		0.00	0.00	0.00
9	15	17		270.98	259.20	274.40	-4%	1%		4064.76	3887.98	4115.96
10	13	30	MEDIAN	287.57	277.54	296.53	-3%	3%		3738.46	3607.97	3854.94
11	9	39		304.16	295.87	313.59	-3%	3%		2737.48	2662.86	2822.32
12	6	45		320.75	314.21	330.65	-2%	3%		1924.52	1885.26	1983.89
13	1	46		337.34	332.55	347.70	-1%	3%		337.34	332.55	347.70
14	2	48		353.93	350.88	364.76	-1%	3%		707.87	701.77	729.52
15	6	54		370.52	369.22	381.82	0%	3%		2223.14	2215.33	2290.91
16	0	54		387.11	387.56	398.88	0%	3%		0.00	0.00	0.00
17	0	54		403.70	405.90	415.93	1%	3%		0.00	0.00	0.00
18	1	55		420.29	424.23	432.99	1%	3%		420.29	424.23	432.99
							Overall effect on income					
Total	55						-2.8%	2.4%		16613	16145	17016

Private Auxiliary -			Rates for tolls structure								
Non Electric			2012	2013A	2013P						
		Fixed $\leq 14 \text{ m}^2$	76.32	61.92	62.93 ($\leq 10 \text{ m}^2$)	Proposal involves changing rates at 10 m^2 , no longer at 14 m^2	2012 data are without colour				
		Variable $\leq 14 \text{ m}^2$	3.52	4.68	4.51 ($\leq 10 \text{ m}^2$)		Actual tolls for 2013 (2013A)				
		Fixed $\geq 14 \text{ m}^2$	43.42	34.20	45.75 ($\geq 10 \text{ m}^2$)		are shown with grey				
		Variable $\geq 14 \text{ m}^2$	5.87	6.66	6.23 ($\geq 10 \text{ m}^2$)		What 2013 tolls would have been under the proposals (2013P) are shown with yellow				
		Entry level rate (at 6 m^2)	97.44	90.00	90.00						
SIZE (m^2)	No. of Boats	Cum. no.	Tolls			% change on 2012		Income			
			2012	2013A	2013P	2013A	2013P	2012	2013A	2013P	
All boats below 6 m^2 are defined as motor craft											
6	11	11	97.44	90.00	90.00	-8%	-8%	1071.84	990.00	990.00	
7	14	25	100.96	94.68	94.50	-6%	-6%	1413.44	1325.52	1323.00	
8	36	61	104.48	99.36	99.01	-5%	-5%	3761.28	3576.96	3564.36	
9	31	92	108.00	104.04	103.52	-4%	-4%	3348.00	3225.24	3209.12	
10	93	185	111.52	108.72	108.03	-3%	-3%	10371.36	10110.96	10046.79	
11	95	280	115.04	113.40	114.28	-1%	-1%	10928.80	10773.00	10856.60	
12	108	388	118.56	118.08	120.51	0%	2%	12804.48	12752.64	13015.08	
13	74	462	122.08	122.76	126.74	1%	4%	9033.92	9084.24	9378.76	
14	80	542	125.60	127.44	132.97	1%	6%	10048.00	10195.20	10637.60	
15	73	615	131.47	134.10	139.20	2%	6%	9597.31	9789.30	10161.60	
16	68	683	137.34	140.76	145.43	2%	6%	9339.12	9571.68	9889.24	
17	114	797	143.21	147.42	151.66	3%	6%	16325.94	16805.88	17289.24	
18	55	852	149.08	154.08	157.89	3%	6%	8199.40	8474.40	8683.95	
19	21	873	154.95	160.74	164.12	4%	6%	3253.95	3375.54	3446.52	
20	65	938	160.82	167.40	170.35	4%	6%	10453.30	10881.00	11072.75	
21	46	984	166.69	174.06	176.58	4%	6%	7667.74	8006.76	8122.68	
22	20	1004	172.56	180.72	182.81	5%	6%	3451.20	3614.40	3656.20	
23	18	1022	178.43	187.38	189.04	5%	6%	3211.74	3372.84	3402.72	
24	7	1029	184.30	194.04	195.27	5%	6%	1290.10	1358.28	1366.89	
25	16	1045	190.17	200.70	201.50	6%	6%	3042.72	3211.20	3224.00	
26	17	1062	196.04	207.36	207.73	6%	6%	3332.68	3525.12	3531.41	
27	6	1068	201.91	214.02	213.96	6%	6%	1211.46	1284.12	1283.76	
28	9	1077	207.78	220.68	220.19	6%	6%	1870.02	1986.12	1981.71	
29	4	1081	213.65	227.34	226.42	6%	6%	854.60	909.36	905.68	
30	3	1084	219.52	234.00	232.65	7%	6%	658.56	702.00	697.95	
31	3	1087	225.39	240.66	238.88	7%	6%	676.17	721.98	716.64	
32	0	1087	231.26	247.32	245.11	7%	6%	0.00	0.00	0.00	
33	0	1087	237.13	253.98	251.34	7%	6%	0.00	0.00	0.00	
34	0	1087	243.00	260.64	257.57	7%	6%	0.00	0.00	0.00	
35	1	1088	248.87	267.30	263.80	7%	6%	248.87	267.30	263.80	
Overall effect on income											
Total	1088					1.6%	3.6%	147466	149891	152718	

Private Auxiliary -			Rates for tolls structure								
Electric			2012	2013A	2013P						
		Fixed ≤14 m ²	76.32	61.92	62.93 (≤10 m ²)	Proposal involves changing rates at 10m ² , no longer at 14m ²	2012 data are without colour				
		Variable ≤ 14 m ²	3.52	4.68	4.51 (≤ 10 m ²)		Actual tolls for 2013 (2013A)				
		Fixed ≥ 14 m ²	43.42	34.20	45.75 (≥ 10 m ²)		are shown with grey				
		Variable ≥ 14 m ²	5.87	6.66	6.23 (≥ 10 m ²)		What 2013 tolls would have been under the proposals (2013P) are shown with yellow				
		Entry level rate (at 6m ²)	97.44	90.00	90.00						
		Electric factor	70%	70%	70%						
SIZE (m ²)	No. of Boats	Cum. no.	Tolls			% change on 2012		Income			
			2012	2013A	2013P	2013A	2013P	2012	2013A	2013P	
All boats below 6m ² are defined as motor craft											
6	6	6	68.21	63.00	63.00	-8%	-8%	409.25	378.00	378.00	
7	4	10	70.67	66.28	66.15	-6%	-6%	282.69	265.10	264.60	
8	11	21	73.14	69.55	69.31	-5%	-5%	804.50	765.07	762.38	
9	6	27	75.60	72.83	72.46	-4%	-4%	453.60	436.97	434.78	
10	8	35	78.06	76.10	75.62	-3%	-3%	624.51	608.83	604.97	
11	17	52	80.53	79.38	80.00	-1%	-1%	1368.98	1349.46	1359.93	
12	12	64	82.99	82.66	84.36	0%	2%	995.90	991.87	1012.28	
13	4	68	85.46	85.93	88.72	1%	4%	341.82	343.73	354.87	
14	2	70	87.92	89.21	93.08	1%	6%	175.84	178.42	186.16	
15	0	70	92.03	93.87	97.44	2%	6%	0.00	0.00	0.00	
16	7	77	96.14	98.53	101.80	2%	6%	672.97	689.72	712.61	
17	3	80	100.25	103.19	106.16	3%	6%	300.74	309.58	318.49	
18	5	85	104.36	107.86	110.52	3%	6%	521.78	539.28	552.62	
19	4	89	108.47	112.52	114.88	4%	6%	433.86	450.07	459.54	
20	0	89	112.57	117.18	119.25	4%	6%	0.00	0.00	0.00	
21	5	94	116.68	121.84	123.61	4%	6%	583.42	609.21	618.03	
22	1	95	120.79	126.50	127.97	5%	6%	120.79	126.50	127.97	
23	2	97	124.90	131.17	132.33	5%	6%	249.80	262.33	264.66	
24	1	98	129.01	135.83	136.69	5%	6%	129.01	135.83	136.69	
25	1	99	133.12	140.49	141.05	6%	6%	133.12	140.49	141.05	
Overall increase in income											
Total	99					-0.3%	1.0%	8603	8580	8690	

Hire Auxiliary -			Variables for tolls structure							
Non Electric			2012	2013A	2013P					
		Fixed ≤14 m ²	76.32	61.92	62.93 (≤10 m ²)	Proposal involves changing rates at 10m ² , no longer at 14m ²	2012 data are without colour			
		Variable ≤ 14 m ²	3.52	4.68	4.51 (≤10 m ²)		Actual tolls for 2013 (2013A)			
		Fixed ≥ 14 m ²	43.42	34.20	45.75 (≥10 m ²)		are shown with grey			
		Variable ≥ 14 m ²	5.87	6.66	6.23 (≥10 m ²)		What 2013 tolls would have been under the proposals (2013P) are shown with yellow			
		Entry level rate (at 6m ²)	97.44	90.00	90.00					
		Multiplier	2.70	2.65	2.64					
SIZE No. of Cum.			Tolls			% change on 2012		Income		
(m ²)	Boats	no.	2012	2013A	2013P	2013A	2013P	2012	2013A	2013P
All boats below 6m ² are defined as motor craft										
6	0	0	263.09	238.50	237.60	-9%	-10%	0.00	0.00	0.00
7	0	0	272.59	250.90	249.48	-8%	-8%	0.00	0.00	0.00
8	0	0	282.10	263.30	261.39	-7%	-7%	0.00	0.00	0.00
9	0	0	291.60	275.71	273.29	-5%	-6%	0.00	0.00	0.00
10	0	0	301.10	288.11	285.20	-4%	-5%	0.00	0.00	0.00
11	0	0	310.61	300.51	301.70	-3%	-3%	0.00	0.00	0.00
12	0	0	320.11	312.91	318.15	-2%	-1%	0.00	0.00	0.00
13	1	1	329.62	325.31	334.59	-1%	2%	329.62	325.31	334.59
14	0	1	339.12	337.72	351.04	0%	4%	0.00	0.00	0.00
15	1	2	354.97	355.37	367.49	0%	4%	354.97	355.37	367.49
16	3	5	370.82	373.01	383.94	1%	4%	1112.45	1119.04	1151.81
17	3	8	386.67	390.66	400.38	1%	4%	1160.00	1171.99	1201.15
18	3	11	402.52	408.31	416.83	1%	4%	1207.55	1224.94	1250.49
19	0	11	418.37	425.96	433.28	2%	4%	0.00	0.00	0.00
20	0	11	434.21	443.61	449.72	2%	4%	0.00	0.00	0.00
21	4	15	450.06	461.26	466.17	2%	4%	1800.25	1845.04	1864.68
22	1	16	465.91	478.91	482.62	3%	4%	465.91	478.91	482.62
23	5	21	481.76	496.56	499.07	3%	4%	2408.81	2482.79	2495.33
24	2	23	497.61	514.21	515.51	3%	4%	995.22	1028.41	1031.03
25	7	30	513.46	531.86	531.96	4%	4%	3594.21	3722.99	3723.72
26	9	39	529.31	549.50	548.41	4%	4%	4763.77	4945.54	4935.66
27	0	39	545.16	567.15	564.85	4%	4%	0.00	0.00	0.00
28	0	39	561.01	584.80	581.30	4%	4%	0.00	0.00	0.00
29	1	40	576.86	602.45	597.75	4%	4%	576.86	602.45	597.75
30	2	42	592.70	620.10	614.20	5%	4%	1185.41	1240.20	1228.39
31	0	42	608.55	637.75	630.64	5%	4%	0.00	0.00	0.00
32	0	42	624.40	655.40	647.09	5%	4%	0.00	0.00	0.00
33	0	42	640.25	673.05	663.54	5%	4%	0.00	0.00	0.00
34	1	43	656.10	690.70	679.98	5%	4%	656.10	690.70	679.98
35	2	45	671.95	708.35	696.43	5%	4%	1343.90	1416.69	1392.86
Overall effect on income										
Total	45					3.2%	3.6%	21955	22650	22738

Sailing - Private				Rates for tolls structure								
				2012	2013A	2013P						
		Fixed ≤10 m ²		57.94	45.60	36.40			2012 data are without colour			
		Variable ≤10 m ²		7.90	8.88	10.72			Actual tolls for 2013 (2013A)			
		Fixed ≥10 m ²		57.94	45.60	61.00			are shown			with grey
		Variable ≥10 m ²		7.90	8.88	8.26			What 2013 tolls would have been under the			
		Entry level rate		97.44	90.00	90.00			proposals (2013P) are shown			with yellow
		Sail factor		0.50	0.50	0.50						
SIZE (m ²)	No. of Boats	Cum. no.		Tolls			% change on 2012			Income		
				2012	2013A	2013P	2013A	2013P		2012	2013A	2013P
1	12	12		48.72	45.00	45.00	-8%	-8%		584.64	540.00	540.00
2	54	66		48.72	45.00	45.00	-8%	-8%		2630.88	2430.00	2430.00
3	128	194		48.72	45.00	45.00	-8%	-8%		6236.16	5760.00	5760.00
4	175	369		48.72	45.00	45.00	-8%	-8%		8526.00	7875.00	7875.00
5	202	571		48.72	45.00	45.00	-8%	-8%		9841.44	9090.00	9090.00
6	157	728	MEDIAN	52.67	49.44	50.36	-6%	-4%		8269.19	7762.08	7906.52
7	60	788		56.62	53.88	55.72	-5%	-2%		3397.20	3232.80	3343.20
8	123	911		60.57	58.32	61.08	-4%	1%		7450.11	7173.36	7512.84
9	30	941		64.52	62.76	66.44	-3%	3%		1935.60	1882.80	1993.20
10	46	987		68.47	67.20	71.80	-2%	5%		3149.62	3091.20	3302.80
11	124	1111		72.42	71.64	75.93	-1%	5%		8980.08	8883.36	9415.32
12	44	1155		76.37	76.08	80.06	0%	5%		3360.28	3347.52	3522.64
13	6	1161		80.32	80.52	84.19	0%	5%		481.92	483.12	505.14
14	11	1172		84.27	84.96	88.32	1%	5%		926.97	934.56	971.52
15	2	1174		88.22	89.40	92.45	1%	5%		176.44	178.80	184.90
16	3	1177		92.17	93.84	96.58	2%	5%		276.51	281.52	289.74
17	1	1178		96.12	98.28	100.71	2%	5%		96.12	98.28	100.71
18	3	1181		100.07	102.72	104.84	3%	5%		300.21	308.16	314.52
19	4	1185		104.02	107.16	108.97	3%	5%		416.08	428.64	435.88
20	0	1185		107.97	111.60	113.10	3%	5%		0.00	0.00	0.00
21	3	1188		111.92	116.04	117.23	4%	5%		335.76	348.12	351.69
22	1	1189		115.87	120.48	121.36	4%	5%		115.87	120.48	121.36
23	1	1190		119.82	124.92	125.49	4%	5%		119.82	124.92	125.49
24	0	1190		123.77	129.36	129.62	5%	5%		0.00	0.00	0.00
25	0	1190		127.72	133.80	133.75	5%	5%		0.00	0.00	0.00
26	0	1190		131.67	138.24	137.88	5%	5%		0.00	0.00	0.00
27	0	1190		135.62	142.68	142.01	5%	5%		0.00	0.00	0.00
28	0	1190		139.57	147.12	146.14	5%	5%		0.00	0.00	0.00
29	1	1191		143.52	151.56	150.27	6%	5%		143.52	151.56	150.27
30	0	1191		147.47	156.00	154.40	6%	5%		0.00	0.00	0.00
31	0	1191		151.42	160.44	158.53	6%	5%		0.00	0.00	0.00
32	1	1192		155.37	164.88	162.66	6%	5%		155.37	164.88	162.66
33	0	1192		159.32	169.32	166.79	6%	5%		0.00	0.00	0.00
34	1	1193		163.27	173.76	170.92	6%	5%		163.27	173.76	170.92

Sailing - Hire			Rates for tolls structure									
			2012	2013A	2013P							
		Fixed ≤10 m ²	57.94	45.60	36.40				2012 data are without colour			
		Variable ≤ 10 m ²	7.90	8.88	10.72				Actual tolls for 2013 (2013A)			
		Fixed > 10 m ²	57.94	45.60	61.00				are shown			with grey
		Variable > 10 m ²	7.90	8.88	8.26				What 2013 tolls would have been under the			
		Entry level rate	97.44	90.00	90.00				proposals (2013P) are shown			with yellow
		Multiplier ≤ 10 m ²	2.00	2.00	2.00	new multiplier at 11 m ² , so 2 sets of variables do not give same toll at 10 m ²						
		Multiplier > 10 m ²	2.70	2.65	2.64							
		Sail factor	0.50	0.50	0.50							
SIZE (m ²)	No. of boats	Cum. no.	Tolls			% change on 2012			Income			
			2012	2013A	2013P	2013A	2013P		2012	2013A	2013P	
1	47	47	97.44	90.00	90.00	-8%	-8%		4579.68	4230.00	4230.00	
2	4	51	97.44	90.00	90.00	-8%	-8%		389.76	360.00	360.00	
3	15	66	97.44	90.00	90.00	-8%	-8%		1461.60	1350.00	1350.00	
4	6	72	97.44	90.00	90.00	-8%	-8%		584.64	540.00	540.00	
5	6	78	97.44	90.00	90.00	-8%	-8%		584.64	540.00	540.00	
6	1	79	105.34	98.88	100.72	-6%	-4%		105.34	98.88	100.72	
7	0	79	113.24	107.76	111.44	-5%	-2%		0.00	0.00	0.00	
8	0	79	121.14	116.64	122.16	-4%	1%		0.00	0.00	0.00	
9	0	79	129.04	125.52	132.88	-3%	3%		0.00	0.00	0.00	
10	4	83	136.94	134.40	143.60	-2%	5%		547.76	537.60	574.40	
11	9	92	195.53	189.85	200.46	-3%	3%		1759.81	1708.61	1804.10	
12	0	92	206.20	201.61	211.36	-2%	3%		0.00	0.00	0.00	
13	0	92	216.86	213.38	222.26	-2%	2%		0.00	0.00	0.00	
14	1	93	227.53	225.14	233.16	-1%	2%		227.53	225.14	233.16	
15	0	93	238.19	236.91	244.07	-1%	2%		0.00	0.00	0.00	
16	10	103	248.86	248.68	254.97	0%	2%		2488.59	2486.76	2549.71	
17	0	103	259.52	260.44	265.87	0%	2%		0.00	0.00	0.00	
18	0	103	270.19	272.21	276.78	1%	2%		0.00	0.00	0.00	
19	0	103	280.85	283.97	287.68	1%	2%		0.00	0.00	0.00	
20	0	103	291.52	295.74	298.58	1%	2%		0.00	0.00	0.00	
21	0	103	302.18	307.51	309.49	2%	2%		0.00	0.00	0.00	
22	4	107	312.85	319.27	320.39	2%	2%		1251.40	1277.09	1281.56	
						Overall effect on income						
Total	107					-4.5%	-3.0%		13981	13354	13564	

Appendix 2 Graphical comparison of the structures.



