

City of Kodiak

Harbor Rates

Harbor Rate Study

- **Recommendations from Northern Economics – Option 1**
 - 18.5% increase and increase based on Producer Price Index each year for the next 4 years i.e. average 2.8% increase each year
- **Alternative Recommendation – Option 2**
 - 6% non-compounding increase per year

Council Questions & Concerns

Council Action::

- Postponed rate increase (both options) pending more discussion, information and time for public feedback

Council Questions & Concerns:

- Not enough time for customers to prepare for rate increase July 1, 2016
- What will the cost impact be to user?
- Why is the moorage rate higher per foot for larger vessels ?
- How do we compare to other markets ?

User Cost Impacts: Option 1

18.5% Year One; Average 2.8% Each Year Thereafter

Table : 1

Vessel Length	ANNUAL FEE PER FOOT					
	Current Rate	FY 17 (Jan 1, 2017)	FY 18 (July 1, 2017)	FY 19 (July 1, 2018)	FY 20 (July 1, 2019)	FY 21 (July 1, 2020)
0 to 40 feet	\$30.00	35.55	36.55	37.56	38.62	39.7
41 to 60 feet	\$41.00	48.58	49.94	51.34	52.78	54.25
61 to 80 feet	\$61.00	72.28	74.3	76.39	78.52	80.72
81 to 100 feet	\$71.50	84.73	87.1	89.54	92.05	94.63
101 to 120 feet	\$82.00	97.17	99.89	102.69	105.56	108.52
121 to 150 feet	\$89.00	105.46	108.41	111.45	114.57	117.78
151 + feet	\$100.00	118.5	121.81	125.23	128.74	132.34

Table : 2

Vessel Length	ANNUAL FEE PER VESSEL					
	Current Rate	FY 17	FY 18	FY 19*	FY 20	FY 21
40 feet	\$1,200.00	1,422.00	1,461.82	1,502.75	1,544.82	1,588.08
60 feet	\$2,460.00	2,914.80	2,996.41	3,080.31	3,166.56	3,255.23
80 feet	\$4,880.00	5,782.40	5,944.31	6,110.75	6,281.85	6,457.74
100 feet	\$7,150.00	8,473.00	8,710.24	8,954.13	9,204.85	9,462.58
120 feet	\$9,840.00	11,660.00	11,986.48	12,322.10	12,667.12	13,021.80
150 feet	\$13,350.00	15,819.00	16,261.93	16,717.27	17,185.35	17,666.39
151	\$15,100.00	17,893.50	18,394.52	18,909.57	19,439.03	19,983.32

User Cost Impacts: Option 2 (6% per year for 5 years)

Table : 3

Vessel Length	ANNUAL FEE PER FOOT (6% increase per year)					
	Current Rate	FY 17	FY 18	FY 19	FY 20	FY 21
		(Jan 1, 2017)	(July 1, 2017)	(July 1, 2018)	(July 1, 2019)	(July 1, 2020)
0 to 40 feet	\$30.00	\$31.80	\$33.60	\$35.40	\$37.20	\$39
41 to 60 feet	\$41.00	\$43.46	\$45.92	\$48.38	\$50.84	\$53.30
61 to 80 feet	\$61.00	\$64.66	\$68.32	\$71.98	\$75.64	\$79.30
81 to 100 feet	\$71.50	\$75.79	\$80.08	\$84.37	\$88.66	\$92.95
101 to 120 feet	\$82.00	\$86.92	\$91.84	\$96.76	\$101.68	\$106.60
121 to 150 feet	\$89.00	\$94.34	\$99.68	\$105.02	\$110.36	\$115.70
151 + feet	\$100.00	\$106.00	\$112.00	\$118.00	\$124.00	\$130.00

Table : 4

Vessel Length	ANNUAL FEE PER VESSEL (6% increase per year)					
	Current Rate	FY 17	FY 18	FY 19*	FY 20	FY 21
40 feet	\$1,200.00	\$1,272.00	\$1,344.00	\$1,416.00	\$1,488.00	\$1,560.00
60 feet	\$2,460.00	\$2,607.60	\$2,755.20	\$2,902.80	\$3,050.40	\$3,198.00
80 feet	\$4,880.00	\$5,172.80	\$5,465.60	\$5,758.40	\$6,051.20	\$6,334.00
100 feet	\$7,150.00	\$7,579.00	\$8,008.00	\$8,437.00	\$8,866.00	\$9,295.00
120 feet	\$9,840.00	\$10,430.40	\$11,020.80	\$11,611.20	\$12,201.60	\$12,792.00
150 feet	\$13,350.00	\$14,151.00	\$14,952.00	\$15,753.00	\$16,554.00	\$17,355.00
151	\$15,100.00	\$16,006.00	\$16,912.00	\$17,818.00	\$18,724.00	\$19,630.00

User Annual Cost Impacts

Option 1 VS Option 2

Table : 2

Vessel Length	ANNUAL FEE PER VESSEL (18.5% year one, 2.8% thereafter)					
	Current Rate	FY 17	FY 18	FY 19*	FY 20	FY 21
40 feet	\$1,200.00	1,422.00	1,461.82	1,502.75	1,544.82	1,588.08
60 feet	\$2,460.00	2,914.80	2,996.41	3,080.31	3,166.56	3,255.23
80 feet	\$4,880.00	5,782.40	5,944.31	6,110.75	6,281.85	6,457.74
100 feet	\$7,150.00	8,473.00	8,710.24	8,954.13	9,204.85	9,462.58
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151	\$15,100.00	\$16,006.00	\$16,912.00	\$17,818.00	\$18,724.00	\$19,630.00

Build & Operating Cost - Per slip

Table : 5

Slip Length	(1) Build Cost Per LF	(2) Total Build Cost Per Slip	(3) Annual Build Cost Per Slip	(4) Annual Operating Cost Per Slip (\$60 ft)	(5) Total Annual Slip Cost	(6) Total Annual Revenue per slip	Percent of Cost Billed
23	1,593	36,639	1,221	1,380	2,601	1,092	42%
24	1,593	38,232	1,274	1,440	2,714	1,140	42%
30	1,593	47,790	1,593	1,800	3,393	1,425	42%
40	1,593	63,720	2,124	2,400	4,524	1,900	42%
48	1,593	76,464	2,549	2,880	5,429	2,808	52%
55	1,593	87,615	2,921	3,300	6,221	3,188	52%
60	1,858	111,480	3,716	3,600	7,316	3,510	48%
62	1,858	115,196	3,840	3,720	7,560	4,867	64%
85	1,947	165,495	5,516	5,100	10,616	7,566	71%
100	2,528	252,800	8,427	6,000	14,427	8,900	62%
110	2,528	278,080	9,269	6,600	15,869	10,945	69%
150	2,780	417,000	13,900	9,000	22,900	15,975	70%
151	2,780	419,780	13,993	9,060	23,052	17,743	77%

Build Cost Formula: total cost divided by total linear footage of facility (1), x length of slip = build cost per linear foot (2), divided by 30 year life cycle = slip build cost per year (3).

- 23 to 62 foot slips build cost based on PND estimates for replacement (2016).

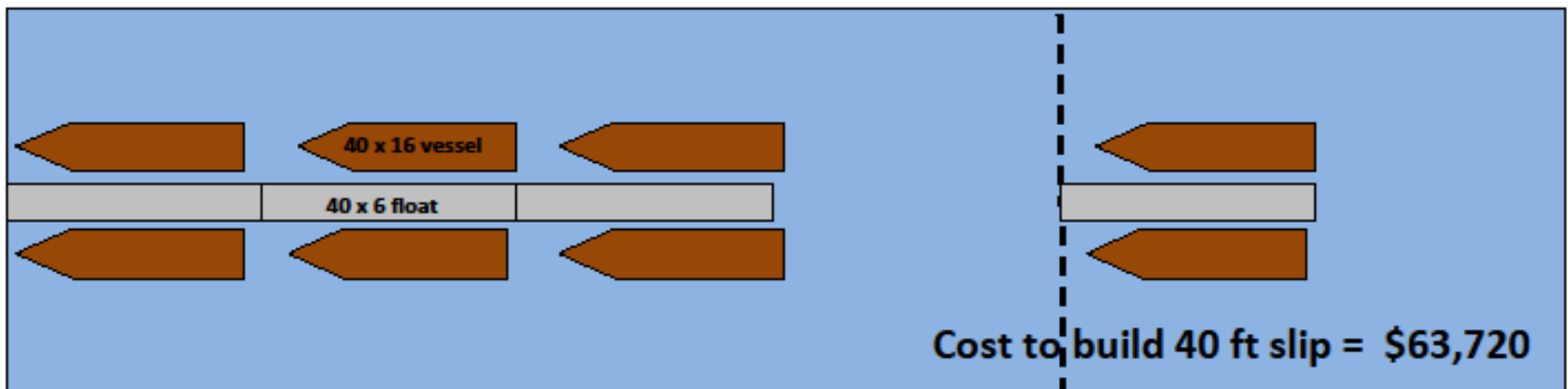
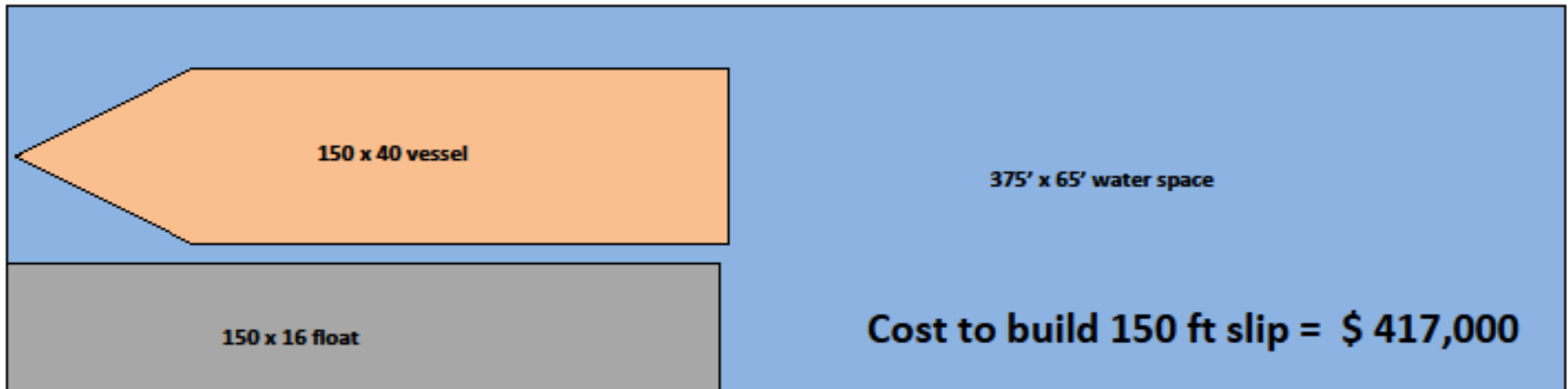
- M, and P floats build cost based on actual cost (2008).

- N float build cost based on M&P actual cost (2008) plus inflation adjustment of 10%.

Operational cost Formula: 50% of annual harbor enterprise operating cost (1,802,500), divided by total linear feet of moorage = cost per linear foot x length of slip = annual operational cost per slip (4).

Annual Revenue per slip formula: Total transient revenue (525k) divided by total moorage linear feet (30k) = transient revenue per linear foot (17.50) x slip length = transient revenue per slip, + exclusive revenue per slip = total annual revenue per slip (6).

Comparison of 150 ft slips vs. 40 ft slip



St Herman Harbor

Shipyard &
Travelift site

P

N

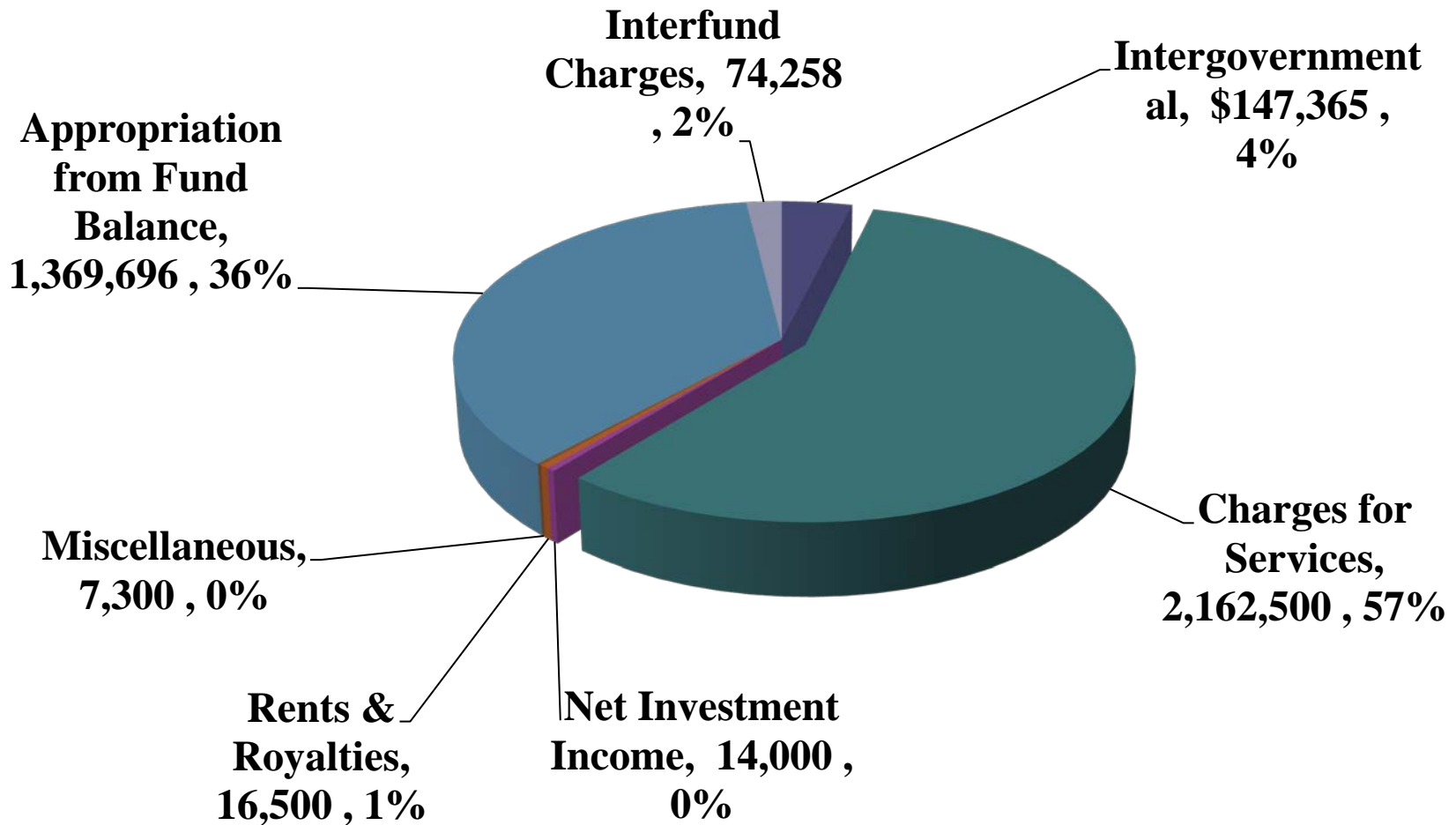
M

- N float cost 5 million in 2000
- M&P floats cost 9.2 million in 2008
- Estimated E thru L floats replacement cost 29 million

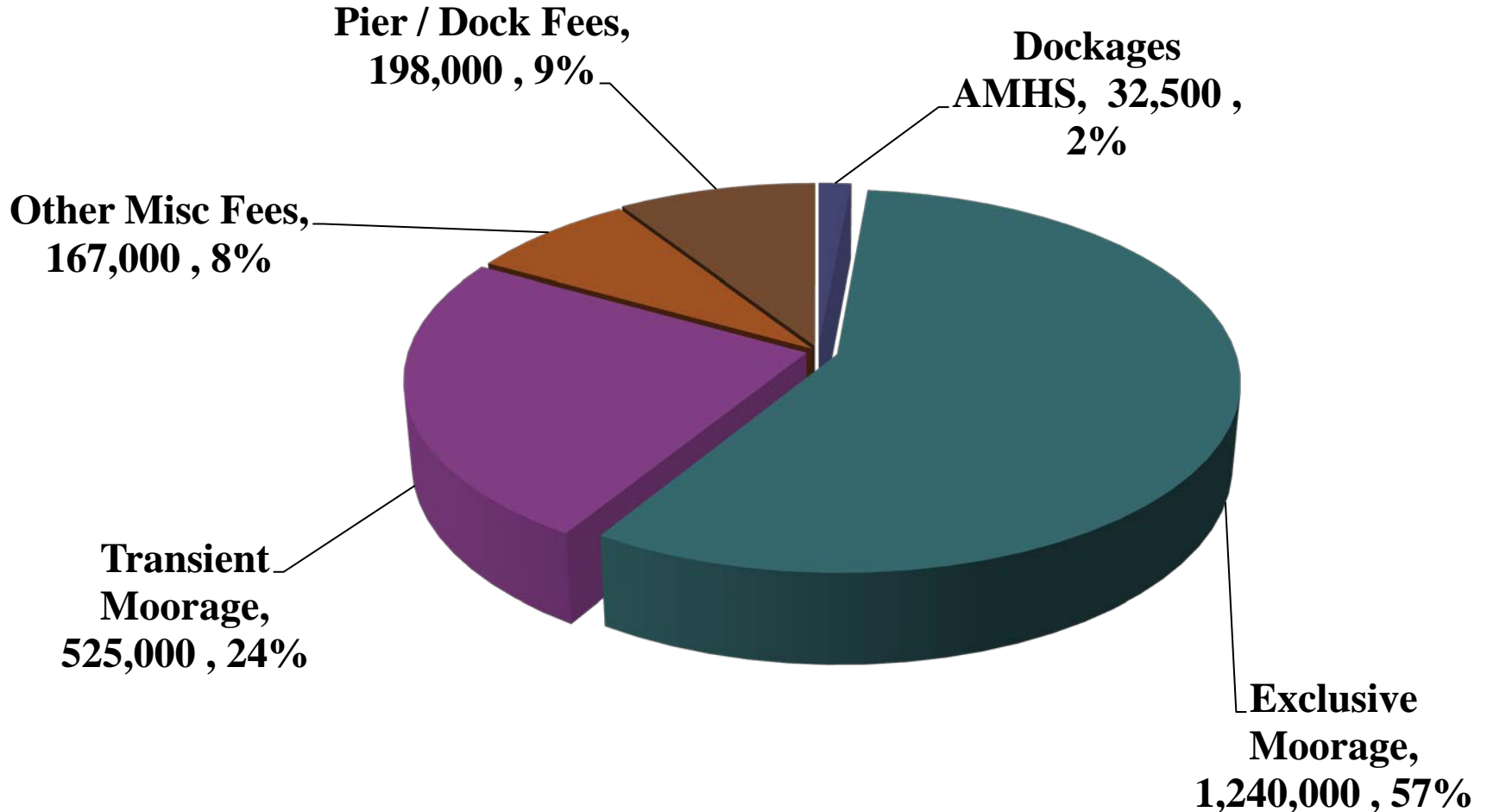
Market Comparisons

Alaska					Washington			
Vessel Size	Kodiak	Homer	Seaward	Dutch Harbor	Fisherman's Terminal	Edmonds Marina	Shilshole Bay Marina	Harbor Island
40ft	1,200.00	1,996.40	2,172.80	1,610.00	3,379.20	5,172.60	6,440.00	6,324.36
110ft	9,020.00	5,196.40	5,826.70	10,120.00	12,156.00	16,125.96	21,776.28	NA

FY 2017 Harbor Revenues by Source



Harbor FY 2017 Budget - Charges for Services



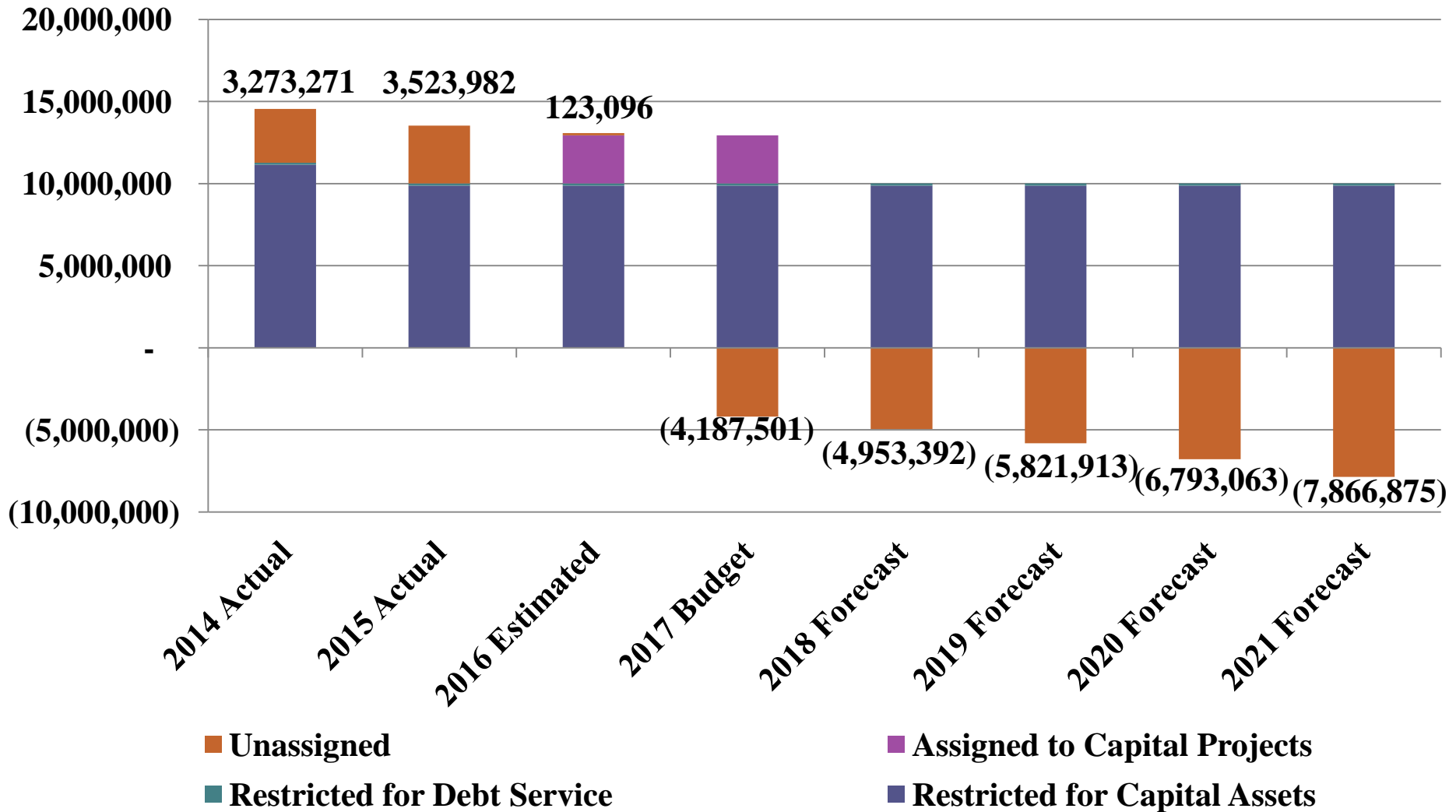
Harbor Fund Balance

	Restricted for Capital Assets	Restricted for Debt Service	Assigned to Capital Projects	Unassigned
2014 Actual	11,146,618	129,581	Unknown	3,273,271
2015 Actual	9,877,533	129,581	Unknown	3,523,982
2016 Estimated	9,877,533	129,581	2,940,901	123,096
2017 Budget	9,877,533	129,581	2,940,901	(4,187,501)
2018 Forecast	9,877,533	129,581		(4,953,392)
2019 Forecast	9,877,533	129,581		(5,821,913)
2020 Forecast	9,877,533	129,581		(6,793,063)
2021 Forecast	9,877,533	129,581		(7,866,875)

Harbor Fund – Appropriations

Year	Annual Net Deficit - Appropriations
FY 2016 Estimated	(474,216)
FY 2017 Budget	(1,369,696)
FY 2018 Forecasted	(765,891)
FY 2019 Forecasted	(868,521)
FY 2020 Forecasted	(971,150)
FY 2021 Forecasted	(1,073,812)

Harbor Fund Balance



Harbor Rate Options per Council Request

OPTIONS	FY 2017	FY 2018	FY 2019	FY 2020	FY 2021	Difference to N Economics
Option # 1 – Northern Economics	18.5% \$2,220,544	2.8% \$2,616,190	2.8% \$2,688,533	2.8% \$2,762,902	2.8% \$2,839,354	N/A
Option # 2 –	6.0% Non \$2,181,325	6.0% Non \$2,418,100	6.0% Non \$2,545,900	6.0% Non \$2,673,700	6.0% Non \$2,801,500	(\$506,998)
Option # 3 –	6.0% Compound \$2,181,325	6.0% Compound \$2,418,100	6.0% Compound \$2,561,236	6.0% Compound \$2,712,960	6.0% Compound \$2,873,788	(\$380,114)
Option # 4 –	8.0% Compound \$2,187,600	7.0% Compound \$2,482,000	6.0% Compound \$2,628,970	5.0% Compound \$2,758,794	4.0% Compound \$2,867,845	(\$202,314)
Option # 5 –	12.05% Compound \$2,200,307	9.25% Compound \$2,616,190	2.8% Compound \$2,688,533	2.8% Compound \$2,762,902	2.8% Compound \$2,839,354	(\$20,237)

Summary

- Proposed rate increase (either option) doesn't fully address the harbors financial short falls but option 1 generates \$592,240 in additional funds over the 5 year period.
- The tiered rate structure is justified based on build costs for the varying slip sizes, bigger slips cost more per SF to build.
- The smaller vessel are not charged anywhere near the build and operational cost and are far below other comparable Alaska markets.
- Large vessels are exceeding current Alaska markets after 5 years.
- What is Councils direction moving forward?