

September 29, 2009

To: WSWA Members

From: Doug Marshall, Treasurer

Re: New Rate Schedule for Discussion at Oct. 5th Annual Meeting

As discussed in my Treasurer's Report, which was distributed with the Annual Meeting Agenda, the budget we developed also requires your board to adopt a new rate structure for monthly water charges. This memo shares the Board's current thinking on rates.

Members were invited to the last 5 board meetings, when the budget and rate schedule were being developed. At next Monday's meeting, Jeff will follow our past practice, to invite comment on budgets and rate changes at a member meeting before final action, then recess the member meeting for an open board meeting and final board action.

It is difficult to increase rates to the degree proposed, especially in the current economy, but I strongly believe it is necessary. WSWA has depleted \$6K of reserves over the past 3 years, when we should instead have been building reserves for major repairs (see Treas. Rept., long term capital needs). We have an obligation to ensure that our system can dependably deliver water in the future, but candidly, I am not certain what is proposed will be adequate. I recommended the more moderate revenue levels you see, in the belief they are realistic, understandable, and (based on several conversations) acceptable. We must continue to reduce our costs, and use the savings to rebuild reserves.

Summary of Rate Schedule: The board's thinking is described below, but the biggest change is to replace the current usage charge formula (a series of fixed monthly charges over various gallonage ranges) with an incremental cost for every gallon used:

- Charge all members a base fee of \$65 each month.
- Beginning with the first gallon used, the cost is 1.2 cents/gal.
- After 3600 gallons, the cost increases by one-third of a cent, to 1.53 cents/gal.
- After 6000 gallons, the cost increases again, by half a cent, to 2.03 cents/gal.
- A member exceeding 13,500 gallons (450*30) will be assessed a surcharge of \$50, while continuing to pay 2.03 cents/gal.
- New charges will be effective 10/1/09 for parcels which are hooked up. Those not hooked up will pay monthly under the new rate structure, effective 1/1/10.

This schedule is illustrated in the attached graph and table. To learn what your monthly charges would have been under this schedule, please contact me.

The Board's Thinking: Seven meetings, dozens of emails, and the give and take involved, all gradually reconciled many differing opinions and ultimately focused our

thinking on this concept. The process was so involved, I can only give you my personal interpretation of our rationale and goals.

Our first decision was to improve the rate structure, rather than proportionally increase the schedule as has been done in the past. An incremental cost for each gallon of water would encourage wiser usage. Currently WSWA prices the first 3,000 gal/mo (100 gal/day) into a fixed charge, effectively making water “free” up to that point. Then after usage moves above 3,000 into the next price category, additional water is “free” up to 3,750 gallons (125 gpd); same from 3751 to 4500 (150 gpd); etc. During FY2008 and FY2009, we had 506 monthly billings with actual water usage; 86% were for less than 4500 gallons. So most of us, unless we happen to be aware of approaching 3000 or 4500 gallons, have little financial incentive to fix a leaky faucet or irrigate carefully.

The board considered many variations of a base fee plus per gallon usage charges. We sought a “fair” division of revenue between the two factors. We also wanted per gallon fees that would appropriately encourage conservation, without unnecessarily discouraging reasonable levels of use. After “a lot” of discussion about how to do this, the following concept seemed fair: (1) the cost to have a system “on standby” for each member to use, or not, should be shared equally in the base fee; then (2) the system’s costs of actually distributing water should be recovered from usage charges.

This makes sense, but as with all cost accounting it’s tough to sort out which costs are truly “fixed” (and would be required even if we distributed no water) and which are “variable” (and attributable to usage). For example, if we distribute no water, we still need a water manager to keep the system operable and meet regulatory requirements, but that manager would be less busy than Gary has been. In the end, I guesstimated half to 2/3 of his monthly fee would be needed to maintain a pressurized system with no usage.

To help you follow this thinking, we revised the chart of accounts you see in our P&L and Budget spreadsheet. The “Water System Operations” costs should be covered by the usage charges, except some of Gary’s contract payment was reallocated to the base fee. The base fee also covers “Overhead” items, and all present and future money for maintenance and improvement (the capital cost lines in the P&L), because those are needed to keep the system going, today and into the future. Anyone could second guess my specific cost allocations, but I hope everyone agrees the concept is sensible.

That process indicated a base fee in the range of \$60-65/month, for 37 of us to finance a fully functional system even if no water is used. We decided on \$65, which provides more revenue stability, but not before examining alternatives based at \$55 and \$60.

We regularly asked ourselves what would be “fair” to those who are not yet hooked up, who now pay \$480/year. Those who now are hooked up but use no water would see an increase to \$65. As the board saw it, both groups enjoy the same benefit of being able to

use water at any time, and both should bear (through a \$65 base fee) the same cost of maintaining the infrastructure as other members – while in fairness to them, we active members should bear the cost of making the water flow, through the per gallon charges.

Developing “fair” per gallon charges also required much discussion, analysis, and give and take. My best interpretation of our data indicates that the average cost to pump, treat, and deliver water is just under 1.5 cents/gal. It is interesting that many municipal systems charge heavy industrial users LESS per gallon, because it costs less to deliver in larger quantities. But to encourage conservation, we continue WSWA’s tradition of progressive pricing, rather than a flat rate such as 1.4 or 1.5 cents/gal. This also fit with our goal of using rates to help members see how their usage fits into the overall picture.

The attached price graph shows a line with three segments, at three different slopes. The slope depicts price/gal, and the area under the line would equal total cost at each volume of usage. The first segment rises at 1.2 cents/gal for the first 3600 gallons. There, the slope increases slightly, by a third of a cent to 1.53 cents/gal, until 6000 gallons. The 3rd segment is steeper, by half a cent to 2.03 cents/gal. At 13,500 gallons, we add a \$50 surcharge (not shown on the graph). At each of these usage levels, we send a signal.

Why send the first signal at 3600 gallons? I had done earlier calculations to project future water use at full buildout (37 fully occupied parcels), based on “average usage by an occupied single family residence during our four peak usage months” (June-Sept, when owners tend to be here full time and tend to have more guests). Analyzing the past two years of data, using different assumptions, I concluded that expectable residential usage would be in the range of 110-130 gallons per day.

So for our rate schedule, I suggested 120 gpd (or, times 30, 3600 gal/month) as the point to increase the cost/gal. Adding a third of a cent/gal at that point informs the member that “*you are now using more than average*”. We are not necessarily trying to discourage that much use, but felt 1.53 cents/gal would provide some conservation incentive and would fully cover the average cost of delivery.

Our current understanding of the maximum sustainable delivery capacity of our system, divided among our 37 memberships, is around 200 gal/day. This may increase as we invest in the system or decrease as we learn more during the years ahead, but for now it makes sense to send a second conservation signal, that above 200 gpd “*you are exceeding your 1/37th share of the system capacity – and therefore must contribute half a cent/gal more, to benefit those whose below average use makes water available to you*”. Higher usage is not necessarily bad, as long as the water is available, but 6000 is a logical point to ask the user to help reward those in the first tier, by paying 2.03 cents/gal.

One other message that we want to reinforce, is the statement on our water certificates that we may use “up to 450 gallons per day” (subject also to rules established per the

bylaws). The new schedule includes a \$50 surcharge for exceeding (450 times 30 =) 13,500 gal/month. My forecast indicated that when we reach 37 fully occupied parcels, if the residences continue to average anything like 120 gpd, there should be no need to reduce the current 450 gpd maximum. My projection is not board policy, and of course it will change as circumstances change, but for now it appears we can comfortably sell more water to those willing to pay more. This is good news for them, and also for those in the lowest usage category: additional money from higher volume users (at 2.03 cents/gal) allows us to charge the first tier only 1.2 cents, instead of the average cost of delivery (nearly 1.5 cents), saving roughly \$9/mo for a 3000 gal user.

Further on the topic of "large usage", many of us have associated it with "commercial" users. I had to adjust my thinking after learning that during the just completed fiscal year, the highest user in 9 of the 12 months was a residence rather than a "commercial" establishment, and the only time any member exceeded 450 gpd involved a leak at a residence. Over the past two years, the highest total user has been a residence.

If future water usage remains at the average levels of the past two fiscal years, these rates would generate \$37,364/yr. But we expect reductions in usage will bring this figure down to roughly \$36,000/yr – our budget target. Two larger users are already taking steps to conserve. Two years ago, we increased usage rates by 25%, but then generated LOWER revenues the following year, apparently in response to higher price. One goal this year was to avoid setting per-gallon charges so high they would further reduce usage. The purpose of WSWA is to deliver the water that is available, not to unnecessarily discourage its use. It would be silly to have invested in 200 gpd average capacity, but then finance it in a way that encourages that water to go unused, even at full buildout.

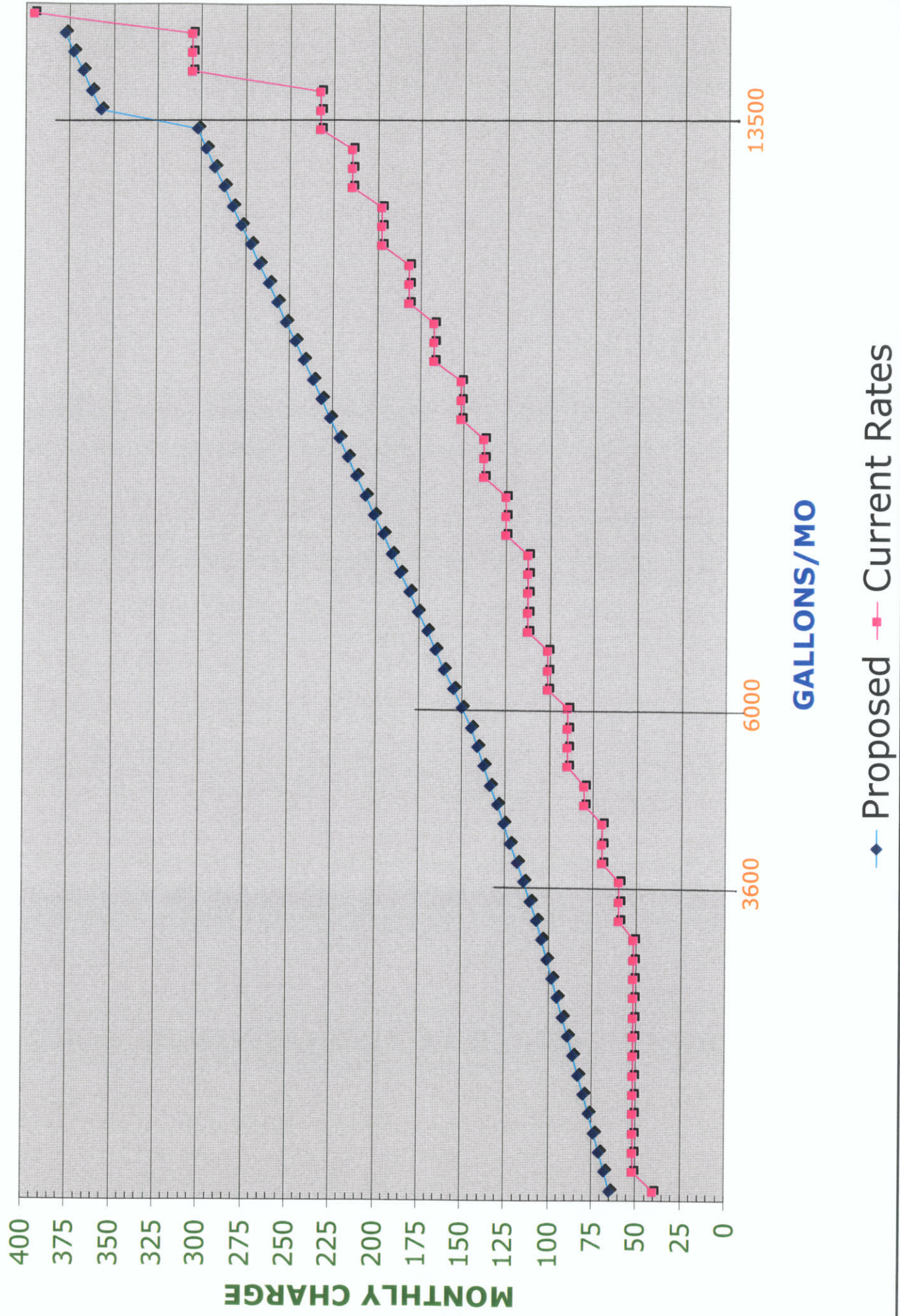
There are other aspects to WSWA's fee schedule. The board voted to change the fee for transferring a membership (from one owner to a successor) from \$37.50 to \$100. We once adopted a fee of \$10 for late payments, but it has not been enforced. We expect to do so, beginning with the November billing for October usage, when the new rates become effective. You are welcome to pre-pay \$100 or so, as a cushion, and then pay each month's charges as they are incurred.

Your board has done a tremendous amount of work to think through these concepts. Some tweaking must be expected from year to year, especially if we see more inflation. But we believe it makes sense, and that it will generate the approximate level of revenue needed to sustain WSWA over the next few years. "A third of a cent" and "half a cent" provide appropriate conservation signals, while helping us understand how our individual water use fits with "the big picture". We look forward to your feedback before finalizing.

Thanks for your interest and support,



COMPARE WITH CURRENT RATE SCHEDULE



WSWA RATE ILLUSTRATION TABLE

Annual Meeting, October 4, 2009

Monthly Gallons	Base Rate Per Mo.	Below avg. Tier		Medium Tier		Conserv. Tier		Total Monthly Bill	Levels in Green Represented 84% of all Members' Monthly Charges FY2008 & 09		
		Rate/gal	with first gallon used	Rate/gal	above	Rate/gal	above		Current Level	\$ Incr.	
Unconn.	65							65.00	40.00	\$ 25.00	46%
0	65	0.00	0.00	0.00	0.00	0.00	0.00	65.00	51.25	\$ 13.75	<250
250	65	3.00	0.00	0.00	0.00	0.00	0.00	68.00	51.25	\$ 16.75	Blue is 38% of Mbr Billings
500	65	6.00	0.00	0.00	0.00	0.00	71.00	51.25	\$ 19.75		
750	65	9.00	0.00	0.00	0.00	0.00	74.00	51.25	\$ 22.75		
1000	65	12.00	0.00	0.00	0.00	0.00	77.00	51.25	\$ 25.75		
1250	65	15.00	0.00	0.00	0.00	0.00	80.00	51.25	\$ 28.75		
1500	65	18.00	0.00	0.00	0.00	0.00	83.00	51.25	\$ 31.75		
1750	65	21.00	0.00	0.00	0.00	0.00	86.00	51.25	\$ 34.75		
2000	65	24.00	0.00	0.00	0.00	0.00	89.00	51.25	\$ 37.75		
2250	65	27.00	0.00	0.00	0.00	0.00	92.00	51.25	\$ 40.75		
2500	65	30.00	0.00	0.00	0.00	0.00	95.00	51.25	\$ 43.75		
2750	65	33.00	0.00	0.00	0.00	0.00	98.00	51.25	\$ 46.75		
3000	65	36.00	0.00	0.00	0.00	0.00	101.00	51.25	\$ 49.75		
3250	65	39.00	0.00	0.00	0.00	0.00	104.00			16% above	
3500	65	42.00	0.00	0.00	0.00	0.00	107.00			3000 gals	
3750	65	45.00	0.50	0.50	0.00	0.00	110.50		59.84	\$ 50.66	
4000	65	48.00	1.32	1.32	0.00	0.00	114.32				
4250	65	51.00	2.15	2.15	0.00	0.00	118.15				
4500	65	54.00	2.97	2.97	0.00	0.00	121.97		69.50	\$ 52.47	
4750	65	57.00	3.80	3.80	0.00	0.00	125.80				

5000	65	60.00	4.62	0.00	129.62	79.72 \$	53.73
5250	65	63.00	5.45	0.00	133.45		
5500	65	66.00	6.27	0.00	137.27		
5750	65	69.00	7.10	0.00	141.10		
6000	65	72.00	7.92	0.00	144.92	89.75	61%
6250	65	75.00	8.75	1.25	150.00		Only 4% of billings exceeded 6000 gals
6500	65	78.00	9.57	2.50	155.07		
6750	65	81.00	10.40	3.75	160.15	101.00 \$	59.15
7000	65	84.00	11.22	5.00	165.22		
7250	65	87.00	12.05	6.25	170.30		
7500	65	90.00	12.87	7.50	175.37	112.81 \$	62.56
7750	65	93.00	13.70	8.75	180.45		
8000	65	96.00	14.52	10.00	185.52		
8250	65	99.00	15.35	11.25	190.60	125.19 \$	65.41
8500	65	102.00	16.17	12.50	195.67		
8750	65	105.00	17.00	13.75	200.75		
9000	65	108.00	17.82	15.00	205.82	138.13 \$	67.69
9250	65	111.00	18.65	16.25	210.90		
9500	65	114.00	19.47	17.50	215.97		
9750	65	117.00	20.30	18.75	221.05	151.53 \$	69.52
10000	65	120.00	21.12	20.00	226.12		
10250	65	123.00	21.95	21.25	231.20		
10500	65	126.00	22.77	22.50	236.27	167.00 \$	69.27
10750	65	129.00	23.60	23.75	241.35		
11000	65	132.00	24.42	25.00	246.42		
11250	65	135.00	25.25	26.25	251.50	181.72 \$	69.78
11500	65	138.00	26.07	27.50	256.57		
11750	65	141.00	26.90	28.75	261.65		
12000	65	144.00	27.72	30.00	266.72	197.00 \$	69.72
12250	65	147.00	28.55	31.25	271.80		
12500	65	150.00	29.37	32.50	276.87		
12750	65	153.00	30.20	33.75	281.95	214.44 \$	67.51

13000	65	156.00	31.02	35.00	287.02	
13250	65	159.00	31.85	36.25	292.10	
13500	65	162.00	32.67	37.50	297.17	232.62 \$ 64.55
13750	65	165.00	33.50	38.75	302.25	
14000	65	168.00	34.32	40.00	357.32	Only
14250	65	171.00	35.15	41.25	362.40	one or 2
14500	65	174.00	35.97	42.50	367.47	per year
14750	65	177.00	36.80	43.75	372.55	
15000	65	180.00	37.62	45.00	377.62	
15250	65	183.00	38.45	46.25	382.70	
15500	65	186.00	39.27	47.50	387.77	
15750	65	189.00	40.10	48.75	392.85	
16000	65	192.00	40.92	50.00	397.92	
						305.00 \$ 107.40
						395.00 \$ (17.38)

** Current 450 gpd "max" over 30 days = 13,500
 Institute a flat **surcharge of \$50** to anyone who exceeds
 13,500 gallons during the billing period

Financial Implications:

	Model During FYE 8/08	Model During FYE 8/09	Avg 08/09 Revenue
Would have generated	36,969	37,759	37,364
From Base Fees Conn:	24,180	28,860	76%
From Unconn charges:	4,680	13%	
From Usage Portion:	8,109	8,899	24%