

Acct #	Account	2015		2016 Budget		2016 Projected		2017 Proposed		2017 Approved		Percentage Comparison	
		Dept	Total	Dept	Total	Dept	Total	Dept	Total	Dept	Total	2016 Budget	2016 projected

705 Advertising	TP	\$79	\$1,651	\$550	\$1,750	\$1,330	\$1,330	\$2,000	\$2,000			14.3	\$0.4
	CF	\$1,572		\$1,200									

706 Salaries & Wages	TP	\$991,305	\$1,115,908	\$1,003,000	\$1,148,000	\$1,014,473	\$1,138,176	\$1,035,000	\$1,180,000			2.8	\$3.7
	CF	\$124,603		\$145,000		\$123,703		\$145,000					

707 Employee Benefits	TP	\$382,293	\$437,857	\$362,000	\$422,000	\$383,550	\$440,597	\$385,000	\$450,000			6.6	\$2.1
	CF	\$55,564		\$60,000		\$57,047		\$65,000					

708 Professional Development	TP	\$22,731	\$26,111	\$27,000	\$33,000	\$30,815	\$30,815	\$26,000	\$29,500			-10.6	\$-4.3
	CF	\$3,380		\$6,000				\$3,500					

709 Licensing Fees	TP	\$19,337	\$22,343	\$22,500	\$25,000	\$25,283	\$25,283	\$18,375	\$18,375			-26.5	\$-27.3
	CF	\$3,006		\$2,500									

Subtotal O & M Expenses			\$3,301,490		\$3,391,250		\$3,369,220		\$3,404,375			0.4	\$1.0
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OTHER EXPENSES

720 Bad Debt Expense		0	\$0		\$0		\$0		\$0				
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801 Interest Expense			\$209,167		\$197,917		\$197,917		\$181,908			-8.1	\$-8.1
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802 Debt Expense			\$65,778		\$73,032		\$73,032		\$72,674			-0.5	\$-0.5
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614 Replacement Appropriation			\$174,000		\$180,000		\$180,000		\$145,000			-19.4	\$-19.4
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Bonds Payable			\$1,337,171		\$1,492,492		\$1,492,492		\$1,500,324			0.5	\$0.5
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203 Notes Payable			\$0		\$0		\$0		\$0				
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165 CF Plant & Equipment			\$75,000		\$0		\$0		\$25,000				
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170 Office Equipment			\$7,600		\$2,500		\$2,500		\$1,750				
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171 TP Plant & Equipment			\$116,500		\$168,860		\$150,947		\$136,000				
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180 Transportation Equipment			\$0		\$0		\$0		\$0				
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Total Expenditure
Replacement Fund Contribution

TOTAL EXPENSES			\$5,286,706		\$5,506,051		\$5,466,108		\$5,467,031			-0.7	\$0.0
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2017 Budget Worksheet

Account Name: Chemicals and Amendment Materials
 Account Number: 60211: Op. Chem (TP) 60212: Amendments (CF)

General Description of Included Items: All chemicals for wastewater and biosolids treatment. Generally these include **sodium hypochlorite** for effluent disinfection, **sodium bisulfite** for de-chlorination, **polymer** for sludge thickening and dewatering. We no longer anticipate purchasing nutrient (ammonium polyphosphate) due to Auburn fiber closure. This account does not include lubricants (equip repair), salt for snow & ice removal (B&G), or fuels (vehicles or fuels). In 1994 we included amendment materials for composting as a department sub account.

Historical Perspective

Year	Budget	Actual/ (Projected)	Comments
2012	\$220,000 TP	\$227,168	3.3% over expend
	\$325,000 CF	\$352,679	8.5% over exp.
2013	\$150,000 TP	\$184,762	23% over expended
	\$200,000 CF	\$276,646	38% over exp
2014	\$150,000 TP	\$192,097	28% over expended
	\$210,500 CF	\$347,383	Outside solids
2015	\$165,000 TP	\$159,326	3.4% under expend
	\$275,000 CF	\$172,447	37% under expended
2016	\$184,500 TP	(\$210,571)	14% over expended
	\$181,000 CF	(\$208,028)	15% over expended

Outlook for 2017

There are many changes in store for 2017 in these accounts. First, we should catch a bit of a break in that we will no longer need to purchase ammonium polyphosphate for nutrient addition. Second, our polymer cost is substantially higher as a result of changing over to the screw presses. A significant portion of that is due to the use of liquid (emulsion) polymer instead of dry polymer. On an active pounds basis this is much more expensive. At the compost facility, the unit price of shavings and saw dust are down, and we are incorporating wood ash which is substantially less expensive than either sawdust or shavings. Also, it is important to note that the volume of amendment use directly relates to how much sludge we accept on a tipping fee basis as most of our material is being land applied. That said, we don't have the best track record in budgeting for amendment!

Historical Estimate: \$195,000 TP
 \$200,000 CF
 Total: \$333,000

Itemized Estimate: \$218,047 TP
 \$148,900 CF
 Total: \$368,253

Proposed Budget Amount: \$215,000 TP
 \$160,000 CF

Total: \$375,000

RI: reduced CF by \$10,000 on 11/14

2017 Budget Account Itemization

OPERATIONS CHEMICALS

Account Number: 60211

Dry Polymer: Polymer is used as a coagulant/flocculent in our activated sludge thickening and our biosolids dewatering. The price for polymer is highly dependent upon the cost of crude oil (as it is the base material) so these costs can be extremely volatile. Volumes have more than doubled in the past couple years due to issues dewatering anaerobic digested solids and the addition of the screw presses. For this year we are basing our estimate on needing a tote (275 gallons) every five calendar days and using Praestol 136 emulsion polymer.

Usage in 2016: conversion from dry to liquid polymer
Estimated need for 2017: 167,170 lbs @ \$1.15/lb = \$192,245

Sodium Hypochlorite: We have multiple years under our belt using sodium hypochlorite and the usage for effluent chlorination has been fairly stable while the price continues to decrease slightly. Between the extremely dry summer and the ability to run the tanks to near empty at season end we managed to use a lower than normal amount in 2016. We anticipate a more normal usage in 2017.

Usage in 2016: 17,000 gallons.
2017 Estimate 20,000 gallons @ \$0.6531/gal = \$13,062

Sodium Bisulfite: Sodium bisulfite is used as our dechlorination chemical. Similar to sodium hypochlorite we have had pretty stable usage year in and year out.

Usage in 2016: 91,200 lbs
2017 Estimate 100,000 lbs @ \$0.1274/lb = \$12,740

Budget Total: \$218,047

2017 Budget Account Itemization
COMPOSTING AMENDMENTS

Account Number: 60212

In the past we have paid a great premium to be able to assure that we would be able to get shavings during the winter period that is most critical to our operation. This is the second year we will not be utilizing storage and will chance the supply market. We feel comfortable that we could purchase material from other suppliers if Buddy Gower cannot supply it and have recently become comfortable with using wood ash as an amendment. We plan to continue using wood ash amendment now that we have better understanding of its marketability. Dryer solids from the LAWPCA screw presses and higher quantities of outside material has allowed for a lighter recipe of shavings. We are conservatively assuming no additional finished compost from 2016 will be used for recycle amendment. We are also assuming the amendment recipe of 3 yards sawdust + 3 yards shavings + 3 yards wood ash to 6 yards of sludge will not change.

We are expecting to compost approximately 10,500 cubic yards (with 8,500 outside material from PWD /S.Portland and only 2000 from LAWPCA). This assumes processing 250 yards per week for 42 weeks allowing for a 10-week shutdown. With 1,300 yards of finished compost being used as recycle the need for purchased amendment is estimated to be 19,700 yards.

Shavings-50 loads (120 yd loads) *\$1450 = \$72,500
Sawdust- 50 loads (120 yd loads) * \$1000 = \$50,000
Wood Ash- 165 Loads (40 yd loads) * \$160 = \$26,400

Year Total: \$148,900

2017 Budget Worksheet

Account Name: Equipment Maintenance and Repair
 Account Number: 60311: Treatment Plant 60312 Compost Facility

General Description of Included Items:

Treatment Plant: Maintenance of equipment actually in the wastewater or sludge treatment train. In addition to replacement parts for pumps, motors, blowers, controls, valves, pipes and drives, etc., this account includes lubrication for this equipment and contracted services for balancing, rebuilding and service checks. Support systems and items such as the boiler, elevator, etc, are not included and are budgeted under buildings and grounds.
 Compost Facility: Equipment directly involved in the production of compost or required for the facility to operate such as turners, blowers and biofilter. Parts of the building itself, such as roll up doors and the loader are not included. The loaders are under vehicles.

Historical Perspective

Year	Budget	Actual/(Projected)	Comments
2012	\$90,000 TP	\$57,729	35% under expend
	\$63,000 CF	\$75,106	19% over expended
2013	\$95,000 TP	\$41,420	56% under expended
	\$43,000 CF	\$65,843	53% over expended
2014	\$85,000 TP	\$82,895	On budget!
	\$35,000 CF	\$50,811	45% over expended!
2015	\$115,000 TP	\$129,218	12% over expended
	\$50,000 CF	\$35,748	28.5% under expended
2016	\$115,000 TP	(\$122,580)	6.6% over expended
	\$50,000 CF	(\$52,188)	About on budget

Outlook for 2017

These accounts have been all over the map and, frankly, are very hard to budget for because we never know what will break down. Projections are made all the more complex by what is going to be funded out of the reserve for replacement account because those expenditures show in this account or buildings and grounds until audit time when they are properly accounted for. I believe that with the current operations and maintenance management, we are getting ahead of many more issues that we did in the past. Travis, Dave and Nate are to be lauded for their efforts in this regard. Two items that remain costly at the treatment plant are the Boerger pumps that feed thickened waste activated and thickened primary sludges to the digesters and the co-gen engines.

Historical Estimate:

\$120,000 TP
 \$55,000 CF

Total: \$175,000

Itemized Estimate:

\$143,650 TP
 \$52,875 CF

Total: \$196,525

Proposed Budget Amount:

\$140,000 TP
 \$53,000 CF

Total: \$193,000

TREATMENT PLANT EQUIPMENT MAINT. & REPAIR
ACCOUNT NUMBER: 60311

2017

NOTES

SUPPLIES AND SERVICES

\$3,000	Asset Management Services	
\$10,000	SCADA system (failures & programming issues)	Power demand controls/ Training/FKC Back up
\$5,000	Siloxane Media	
\$4,500	electrical components	
\$5,000	pipng materials	
\$1,000	meter calibration	
\$3,000	bar screen parts	Replace worn drive motor wire
\$5,000	primary sedimentation basins	
\$1,500	GBT	
\$4,500	lubricants	Cogen oil changesX10
\$500	plant air compressors	
\$3,000	miscellaneous parts	
\$1,500	paints and coatings	
\$4,000	annual hoist repairs	Repair electrical boxes on clamshell
\$2,000	chemical feed pumps	# 2 bisulfite pump due for replacement
\$2,000	metal fabrication	
\$40,000	Sludge Transfer Pumps	3 Complete rebuilds 2 duplex lobe replacement
\$1,800	Electric Motors	
\$850	Valve Actuator Service	
\$3,000	Digester mix pumps	Mix pump seal rebuild
\$11,000	Digester feed line cleaning	Purchase hydro jet
\$10,000	Cogens	Misc services parts

\$122,150

PROJECTS

\$5,500	Epoxy coat influent pump, and wear ringsX2	
\$5,000	Detination sensors for Cogens	
\$3,000	Backup auto dialer	
\$3,000	Primary Thickenner backflush system	
\$5,000	Heat exchanger isolation valves	

\$21,500

\$143,650

COMPOST FACILITY EQUIPMENT MAINT. AND REPAIR
ACCOUNT NUMBER: 60312

NOTES

2017

MAINTENANCE SERVICE

biofilter piping hydro-jetting (1 @ \$4,500 each)	\$4,500	
	\$4,500	

REPAIR SERVICES

Turner hydraulic repairs	\$2,500	
Turner Electrical repairs	\$1,500	
		\$4,000

REPAIR PARTS AND SUPPLIES

turner conveyor drum tines	\$1,000	1 set needed
flights	\$4,725	full set needed (21) W//AR300 plates
conveyor chain	\$2,000	1 set needed
proximity sensors	\$500	2 unit lift/2 bin rail
Sprocket Set	\$1,750	4 sets
curing piping and fittings	\$2,000	
lubricants and filters	\$2,500	
paints and coatings	\$1,500	
Sandblasting material	\$500	
miscellaneous repairs	\$2,500	
Sweeper Arms	\$1,100	Small and Drum side needed
Blower motors	\$3,000	
Wheels	\$2,000	
Non Drive End bearing rebuild	\$800	Turner #2
	\$25,875	

PROJECTS

Turner #1 control screen	\$2,000	
Turner #1 electrical disconnect	\$1,500	
Biofilter cover system	\$15,000	includes Bowker consulting fee

budget total

\$52,875

2017 Budget Worksheet

Account Name: Buildings and Grounds Maintenance
 Account Number: 60411: Treatment Plant 60412: Compost Facility

General Description of Included Items: Maintenance of buildings, outside areas, snow plowing and support facilities not directly in the wastewater treatment train. Also included in this account are costs for miscellaneous tools, paints, light bulbs and services for the building such as HVAC and elevator maintenance.
 Compost Facility: Similar items for lawn mowing, snow removal (including roof snow shoveling) and services for the fire alarm and pumping of the septic tank (but not the biofilter—that is in equipment maintenance) are included.

Historical Perspective

Year	Budget	Actual/ (Projected)	Comments
2012	\$55,000 TP	\$54,687	On budget
	\$23,000 CF	\$24,079	5% over expended
2013	\$61,000 TP	\$51,470	16% under expend
	\$30,000 CF	\$24,673	18% under expend
2014	\$60,000 TP	\$74,846	24% over expended
	\$33,000 CF	\$33,440	On budget
2015	\$75,000 TP	\$80,363	7% over budget
	\$38,000 CF	\$50,702	Overhead doors
2016	\$72,000 TP	(\$89,640)	24.5% over expended
	\$45,000 CF	(\$43,990)	About on budget

Outlook for 2017

Due to the wide variety of items that are funded from this account and the potential for costly breakdowns of major equipment – notably the elevator and the backup generator at the treatment plant and overhead doors and make up air heaters at the compost facility, this account is difficult to budget for and has been often over expended. I believe there is often some crossover between this account and equipment maintenance and repair, making budgeting and tracking even more difficult. At the treatment plant there are a number of concrete issues that will need to be addressed over the next few years, but these are slated to be funded from the 171 (TP facilities) account. This year we continued to work on long deferred painting of the exterior of the treatment plant buildings, and we had some more costly elevator repair issues.

Historical Estimate:

\$75,000 TP
 \$32,000 CF

Total: \$97,000

Itemized Estimate:

\$96,180 TP
 \$52,275 CF

Total: \$149,955

Proposed Budget Amount: \$90,000 TP
 \$45,000 CF

Total: \$135,000

TREATMENT PLANT BUILDINGS AND GROUNDS
ACCOUNT NUMBER: 60411

NOTES 2017

OUTSIDE SERVICES		
elevator service & maintenance (maine elevator)	\$2,500	
elevator inspection & license	\$1,000	
HVAC maintenance (Nason)	\$22,180	
HVAC Repairs (Nason)	\$2,500	
parts washer & disposal (safety klean)	\$800	
generator service	\$2,500	annual inspection/PM
universal waste disposal (EPI)	\$500	
Floor Cleaning	\$2,000	Strip and wax floor X2, and Clean carpet
		\$33,980

REPAIR PARTS AND SUPPLIES		
cleaning supplies and paper goods	\$4,000	
electrical supplies	\$1,000	
tools	\$2,000	
lawn tractor repair & maintenance	\$1,000	
building paint, ice salt	\$3,500	
generator maintenance	\$500	
yard maintenance and landscaping	\$1,000	
welding supplies	\$500	
carpentry materials	\$1,500	
road and walkway repairs	\$5,000	
light bulbs & ballast	\$500	
air filters	\$8,000	Includes all HVAC filters
miscellaneous parts	\$3,000	
		\$31,500

PROJECTS		
LED pole lights	\$5,000	
Retrofit hydrants and hoses	\$5,000	
Refrigerator	\$700	
Septic station odor control	\$1,000	
On-demand hot water heater	\$4,000	
Admin VCT flooring & GBT floor coating	\$15,000	
		\$30,700

BUDGET TOTAL \$96,180

COMPOST FACILITY BUILDINGS & GROUNDS
ACCOUNT NUMBER: 60412

2017 NOTES

OUTSIDE SERVICES

\$950	refuse (andy valley)
\$2,500	hvac services
\$5,000	overhead door service
\$1,000	sprinkler system service
\$175	Transformer oil test
\$550	Switchgear IR Scan
\$350	Parts Washer
\$400	fire alarm service
\$10,925	

REPAIR PARTS AND SUPPLIES

\$550	cleaning supplies and paper goods
\$1,000	lighting/building electrical repairs
\$1,500	tools
\$300	batteries
\$1,000	building paint,ice salt
\$500	fasteners
\$1,000	yard maintenance and landscaping
\$750	welding supplies
\$800	fan belts & sheaves
\$1,000	Exhaust fan (process area)
\$300	Rooftop fan motor
\$8,700	

PROJECTS

\$2,000	Alarm System Electrical repairs
\$1,500	Fuel tank and containment
\$2,500	Asphalt repairs
\$1,000	Seal Manhole Chimney
\$6,000	LED process lights
\$1,500	Roof repair
\$8,000	Overhead door #8
\$7,150	Exhaust Fan PLC control
\$3,000	Fan Duct #2 replacement
\$32,650	

budget total \$52,275

2017 Budget Worksheet

Account Name: Vehicles
 Account Number: 60511: Treatment Plant 60512: Compost Facility

General Description of Included Items: At the treatment plant, operation of the Authority's 3 dump trucks, pickup, caravan, and backhoe/loader. Costs include fuel, tires, repairs, inspections, highway tolls and registrations. At the Compost Facility, the front end loaders and the small pickup are included. Fuel to run the Loaders at the Compost Facility and the Caterpillar Backhoe/Loader at the treatment plant is included in this account instead of in the fuels account (which is reserved for building heating fuels, the emergency generator, and any natural gas used by the A/D boilers at the treatment plant)

Historical Perspective

Year	Budget	Actual/(Projected)	Comments
2012	\$56,000 TP	\$51,358	8% under budget
	\$17,500 CF	\$21,573	23% over budget
2013	\$59,000 TP	\$55,569	6% under budget
	\$20,500 CF	\$18,880	8% under budget
2014	\$55,000 TP	\$68,553	25% over expended
	\$23,000 CF	\$18,395	20% under expended
2015	\$60,000 TP	\$58,413	On budget
	\$27,000 CF	\$26,248	On budget.
2016	\$42,000 TP	(\$40,971)	On budget
	\$20,000 CF	(\$20,990)	5% over budget

Outlook for 2017

Until this year, costs for our dump trucks were increasing each year, but those were replaced with the roll off cans and hook trucks this year. This also has the happy result of reducing the number of trips needed to support our land application program. At the compost facility, costs have been better estimated and somewhat more stable, but the 2003 Komatsu loader has continued to show its age and need more repair, but the guys still prefer it to the newer John Deere 524 loader..

Historical Estimate: \$42,000 TP \$21,000 CF
 Total: \$63,000

Itemized Estimate: \$35,675 TP \$15,615 CF
 Total: \$51,240

Proposed Budget Amount: \$40,000 TP \$17,000 CF
 Total: \$57,000

2017 Budget Account Itemization

Account Name: Vehicles

Account Numbers: 60511 and 60512

Treatment Plant

Fuel: Fuel usage for the Authority's pickup truck and mini van (gasoline) has been surprisingly constant, with changes in expenses being a function more of the unit price paid than the quantity consumed. We have reduced our fleet of trucks from 3 to 2 and maintenance should be minimal given their age. The pumper truck has been costly given its age and a replacement will most likely be necessary in 2018.

Gasoline 1,000 gallons @ \$1.65 = \$1,650

Diesel (wheelers) 6500 gallons @ \$1.75 = \$11,375

Diesel (loader -Ness) 450 gallons @ \$2.00 = \$900

Fuel Subtotal = \$13,925

Repairs:

The Authority's vehicles are as follows:

#406	Dodge pickup (plow truck)	2015	\$1,500
#408	Western Star	2016	\$1,000
#409	Western Star	2016	\$1,000
#410	Cat Loader/Backhoe	2010	\$1,000
#411	Dodge mini van.	2013	\$500
#412	Pumper Truck		\$9,000
Sub Total Preventive Maintenance and Repair			
	Tires: CAT Tires and 412		\$14,000
	Miscellaneous (Tailgate seals, load covers, body work, etc.)		\$5,500
	E-Z Pass		\$1,000
			\$1,250
	Sub Total		\$7,750

Treatment Plant Total: \$35,675

Compost Facility

Fuel (diesel-Ness)	3500 gal @ \$2.00	\$7,000
Fuel (gas - LPW)	250 gal @ \$1.65	\$415
Lubrication and Filters		\$2,000
Repairs (407:\$1500, JD: \$1700, Kom: \$1700)		\$4,900
Cutting Edge and Attachments		\$750
Miscellaneous		\$500
Compost Facility Total: \$15,565		

Combined Budget Total: \$51,240

2017 Budget Worksheet

Account Name: Residuals Disposal
Account Number: 606

General Description of Included Items: All costs related to the utilization or disposal of biosolids and the disposal of grit, grease, and screenings excluding composting costs. The account includes biosolids quality testing, farm permitting and farm field maintenance, tipping fees for grit and grease and screenings at CWS, rental of roll off cans for both screenings and regular trash and vactor can costs such as roll off can liners, scale weighing at the Lewiston landfill and taxes at the Gauthier Farm.

Historical Perspective

Year	Budget	Actual/ (Projected)	Comments
2007	\$445,000	\$547,376	23% over expended
2008	\$493,000	\$500,333	1.5% over expended
2009	\$515,000	\$417,791	19% under expend
2010	\$505,000	\$361,076	28% under expend.
2011	\$450,000	\$359,064	20% under budget
2012	\$350,000	\$396,985	13% over expend
2013	\$280,000	\$334,691	Tuner breakdown,
2014	\$291,000	\$294,009	On budget
2015	\$323,000	350,877	8.6% over expended
2016	\$308,000	(\$309,673)	On budget I hope!

Outlook for 2017

This is obviously an account that has had a huge impact on the overall bottom line for the Authority, and I have been chronically bad at projecting the final cost for residuals – generally way too optimistic. All that said, we still have a large number of fixed costs (Gauthier tax payment, analytical testing, site permits) and a number of non biosolids related charges (screenings, grease and scum, vactor pad) and while we have increased our winter time storage capabilities with improvements to the Barker pad and increased field stacking times in many of our farm permits, realistically we have to expect somewhere around 1600 yards will not be land applied and will be composted on Penley corner Rd.

Historical Estimate: \$295,000

Itemized Estimate: \$278,265

Proposed Budget Amount: \$285,000

2017 Budget Account Itemization

Account Name: Residuals Disposal
 Account Number: 60611 Treatment Plant Only (no corresponding CF account)

Land Application Costs (Casella Organics):
 8,000 cu yd * \$27.17 = \$217,360

Site License and Program Approval License Fees
 24 * (\$319+\$90) + \$900 = \$10,620

Total = \$227,980

Alternate Disposal
 CWS Landfill (Norridgewock) 25 yds = 22 tons @ \$62.93 = \$1385
 Hawk Ridge Compost Facility: 50 yds = 45 tons @ \$55.86/ton = \$2,515
 Juniper Ridge Landfill (incls trans) 50 yds = 45 tons @ \$68.32/ton = \$3,075

Field Maintenance (Barker pad, field repairs, stuck trucks, spread leachate) = \$5,000

Supplemental Nutrients for high pH soils = \$0

Biosolids Analyses:
 Metals 13 @ \$270 + Pesticides, VOA & PCBs (1) and courier fees \$4,425
 Dioxins & Furans \$0
 Misc. \$500

 Analytical Sub Total

\$4,925

Grit Disposal Costs: 163.2 tons from Vactor Pad @ \$80.12/ton = \$13,075
 Screenings and Trash Disposal at MMWAC (Tip Fee Only) \$4,200
 Bags for screenings \$2,325
 Gauthier Spreading Payments (equal to taxes) \$12,865
 Truck Scale Charges (LPW) \$1,000

TOTAL BUDGET \$278,265

Reflect 1.5% CPI increase

2017 Budget Worksheet

Account Name: Laboratory and Analytical
 Account Number: 60711: Treatment Plant 60712 Compost Facility

General Description of Included Items:
 Treatment Plant: General laboratory supplies such as glassware, filters, reagents, etc. Also included are quality control and quality assurance needs such as test standards. Lab gloves are included. New needs for digester gas testing including methane content, H₂S, and siloxanes are included. Effluent toxicity tests and other outside analytical services not directly related to residuals disposal or pretreatment are also included. Compost Facility: Costs include the mandated testing for odor, groundwater, detention ponds, etc. and some lab supplies to monitor percent solids and pH.

Historical Perspective

Year	Budget	Actual/(Projected)	Comments
2012	\$40,000 TP	\$37,686	6% under expend
	\$40,000 CF	\$50,925	groundwater sampl
2013	\$40,500 TP	\$39,028	4% under expended
	\$36,500 CF	\$38,415	5% over expended
2014	\$37,000 TP	\$38,692	5% over expended
	\$37,000 CF	\$32,410	12% under expended
2015	\$35,000 TP	\$29,105	16.8% under expended
	\$34,000 CF	\$32,655	4% under expended
2016	\$38,000 TP	(\$33,739)	Credit for Hach nutrient anal
	\$33,000 CF	(\$26,235)	20% under budget??

Outlook for 2017

At the treatment plant, the lab duties have expanded as a result of anaerobic digestion and nutrient sampling. In addition, we have had some problems with the automatic samplers and the enclosures used to keep the samples at the proper temperature prior to analysis (roughly 4°C) that have been costly. At the compost facility, the biggest variable has been groundwater monitoring as we attempt to attenuate the nitrate in the subsurface water.

Historical Estimate:	\$34,000 TP	\$30,000 CF	Total: \$64,000
Itemized Estimate:	\$30,720 TP	\$33,841 CF	Total: \$64,561
Proposed Budget Amount:	\$32,000 TP	\$32,000 CF	Total: \$64,000

	2016	2017
	Budget	Request
General lab supplies		
TNT Testing Vials and accessories	\$ 6,000	\$ 4,000
Gloves	\$ 2,600	\$ 2,600
TSS Filter paper	\$ 900	\$ 700
Glassware, pipettes, etc	\$ 2,000	\$ 1,600
Misc Reagents	\$ 1,500	\$ 1,200
pH buffer solution	\$ 900	\$ 900
Desiccants	\$ 250	\$ 300
Sample tubing/equipment	\$ 600	\$ 1,000
Cleaners and brushes/sponges	\$ 400	\$ 400
Materials for E. coli analysis	\$ 1,300	\$ 1,300
Bacharach/Drager tubes	\$ 300	\$ 300
Replacement parts		
C117	\$ 500	\$ 500
LDO/BOD Sensor caps	\$ 700	\$ 700
Deionizer parts and maint.	\$ 1,000	\$ 1,000
pH probes and parts	\$ 700	\$ 700
ORP sensors and solutions	\$ 250	\$ 250
Misc.	\$ 1,000	\$ 1,000
QA/QC		
DMR-QA	\$ 800	\$ 800
QA/QC samples/standards	\$ 800	\$ 800
Contract Services		
QC Services	\$ 1,500	\$ 1,800
Outdated Reagent Disposal	\$ 975	\$ 1,000
Effluent Clean Mercury	\$ 120	\$ 120
Hach Service Contract	\$ 4,600	\$ -
Metals Testing	\$ 500	\$ 500
Phosphorus Testing	\$ 200	\$ -
WBT testing	\$ -	\$ 6,250
New Equipment		
ORP for system 1	\$ 1,050	\$ -
SC200	\$ 1,700	\$ -
New cap for PE comp. container	\$ 200	\$ -
Fume hood	\$ 6,800	\$ -
Camera for Microscope	\$ -	\$ 800
Fish tank for effluent display	\$ -	\$ 200
2016 total	\$ 40,145	\$ 30,720

2017 Budget Account Itemization

Account Name: Laboratory Supplies and Analytical Services
 Account Number: 60712 Compost Facility.

Compost Facility:

Item	2015 Budget	2016 Budget	2017 Budget
Compost Analyses			
Metals, Nutrients, Salmonella, PCB, VOA, Semi-VOA	\$3,500	\$3391	\$3391
Dioxin (PCDD's & PCDF's)	\$0	\$0	\$0
Misc. testing	\$2,000	\$0	\$500
Biofilter Reservoir and under drain	\$20,800 (two rounds)	\$23,940 (two rounds)	\$23,700 (two rounds)
Groundwater Monitoring			
Odor Testing	\$4100	\$4100	\$4100
Amendment testing	\$250	\$250	\$250
Miscellaneous Testing (i.e. contamination)	\$300	\$300	\$300
Sub Total	\$30,950	\$33905.20	\$32,241
Lab Supplies			
pH Buffer, Filter Paper, Gloves, etc.	\$1000	\$1000	\$1000
Lab Equipment Maintenance	\$1350	\$350	\$600
Compost Facility Budget Total	\$33,300	\$33,931	\$33,841

2017 Budget Worksheet

Account Name: Industrial Pretreatment Program
 Account Number: 60811

General Description of Included Items: Equipment and outside services needed to monitor and sample effluents from significant industrial users of the sewer system. The largest single expense is for analysis of samples by independent laboratories.

Historical Perspective

Year	Budget	Actual/(Projected)	Comments
2008	\$13,000	\$10,209	21% under expend
2009	\$14,000	\$13,481	On budget
2010	\$12,500	\$14,127	13% over expend
2011	\$18,000	\$16,335	22% under budget
2012	\$14,000	\$11,591	14% under expend
2013	\$13,000	\$11,202	14% under expended
2014	\$12,000	\$11,208	On budget
2015	\$14,500	\$13,777	5% under expended
2016	\$14,000	(\$11,232)	19% under expended

Outlook for 2017

Overall this account remains pretty stable. I don't see any significant driver that will change things in this account. That said, the cost for lab services does go up from time to time like most everything does.

Historical Estimate: \$ 12,000

Itemized Estimate: \$12,150

Proposed Budget Amount: \$12,000

2017 Budget Account Itemization

Account Name: Industrial Pretreatment Program
 Account Number: 60811

Repair Parts & Supplies:
 Tubing for samplers, sample bottles \$200
 Sampling consumables pH sol, reagents, misc. \$150
 Equipment service & calibration \$300
Sub Total \$650

Laboratory Costs for STU sample analysis:
 Metals, Oil & Grease Flashpoint
 Nutrients, Formaldehyde, CN, others
 INF/EPF & DOM/COM \$9,200
 Special Monitoring \$500
Sub Total \$9,700

Equipment:
 Linko Licensing/Support \$ 1,800

Sub Total \$ 1,800

BUDGET TOTAL: \$12,150

2017 Budget Worksheet

Account Name: Safety Program

Account Number: 60911: Treatment Plant 60912: Compost Facility

General Description of Included Items:

Training courses as required by law or regulation (other courses would be included in professional development) equipment and maintenance of equipment whose sole purpose is to protect or promote the safety of plant personnel. Examples include safety harnesses for confined space entry, SCBA, toxic meters, protective clothing and immunizations for employees. This includes gloves, steel toe boots, respirators, and cartridges, etc. Also included are all the costs of running our substance testing program for safety sensitive positions (truck drivers).

Historical Perspective

Year	Budget	Actual/(Projected)	Comments
2012	\$14,000 TP	\$11,254	20% under budget
	\$2,000 CF	\$3,385	69% over budget
2013	\$14,000 TP	\$19,910	42% over budget
	\$2,000 CF	\$3,941	97% over budget
2014	\$15,500 TP	\$13,138	15% under expended
	\$3,500 CF	\$2,622	25% under expended
2015	\$16,000 TP	\$16,677	4% over expended
	\$3,500 CF	\$3,381	On Budget
2016	\$20,000 TP	(\$20,595)	On budget
	\$4,000 CF	(\$5,390)	35% over expended

Outlook for 2017

While this account is pretty stable, some years we have had purchases of needed new equipment that tend to make the account seem less predictable than it may appear. At the treatment plant we have had some cost increases due to more fire alarms, and atmospheric monitors. One item was that upgraded workstations had been budgeted here, but were removed and charged to office equipment in order to better track our purchases for office furniture and similar expenses over time. At the compost facility, a significant driver of the increased expense was to finally resolve an issue with a safety barrier at the compost storage pad and loading area.

Historical Estimate:

\$16,500 TP
\$3,500 CF

Total: \$20,000

Itemized Estimate:

\$24,150 TP
\$4,250 CF

Total: \$28,400

Proposed Budget Amount: \$22,000 TP

\$4,000 CF

Total: \$26,000

2017 Budget Account Itemization

Account Name: Safety Program
Account Number: 60911 TP, 60912 CF

TREATMENT PLANT

Hazmat/CS Rescue Team/Medical:

Annual physicals for CS rescue team	\$700
CSRT Equipment	\$500
CSRT Stipend	\$1500
AED Pads	\$100
SCBA Maintenance	\$800
Electrical worker equipment	\$450
Sub Total	\$4,050

Occupational Health and Prevention:

Medical (new hires, hearing tests, fit tests, immunization, random drug tests)	\$3,550
Sub Total	\$3,250

First Aid Supplies:

First Aid Kit Supplies	\$ 400
Other misc. First Aid	\$ 50
Sub Total	\$ 450

Atmospheric Monitoring/Fire Protection:

In Plant Atmospheric Monitors	\$1,500
Portable Confined Space Meters	\$ 500
Fire Alarm/Sprinkler Inspection	\$500
Hoist Inspection	\$700
Sub Total	\$3,200

Consumable Items: (Gloves, goggles, chore boots, PVC rain gear, Hearing protection, respirators, etc.)

Steel Toe Boots/Shoes	\$3000
Sub Total	\$2000

Equipment:

Fire Extinguisher Maintenance-TP	\$ 1200
SCBA Bottle	\$1200
Fall Protection Equipment (harness, anchors, SRL)	\$ 400
Life Rings & Fiberglass Cabinets	\$ 200
2 gas detection monitors	\$4600
Sub Total	\$7,600

Random Drug Testing Program (truck drivers):
Lab Corp and Affiliated Health

\$300

Universal Waste Disposal (fluorescent lamps, etc.)

\$300

Treatment Plant Total: \$24,150

COMPOST FACILITY

Occupational Health and Prevention:
Respirator evals, Immunizations

\$100

First Aid Supplies:

\$100

Respirator Cartridges, Masks, etc.

\$1,500

Fire Extinguisher maintenance

\$150

Gloves, hard hats, etc.

\$400

Arc Flash Study

\$2,000

Compost Facility Total: \$4,250

BUDGET TOTAL : \$28,400

2017 Budget Worksheet

Account Name: Electric Power

Account Number: 61111: Treatment Plant 61112: Compost Facility

General Description of Included Items:

CMP and Constellation New Energy (ME Power Options) charges for power used. As a "time of use" customer at the treatment plant, we have significant demand charges as well as different rates for power used on peak and off peak. At the compost facility, our charges include a line service maintenance charge of \$122.54 per month (down from \$176.71).

Historical Perspective

Year	Budget	Actual/(Projected)	Comments
2012	\$350,000 TP	\$305,382	12.7% under budget
	\$65,000 CF	\$50,878	22% under budget
2013	\$290,000 TP	\$300,645	4% over budget
	\$49,000 CF	\$73,942	51% over budget
2014	\$208,000 TP	\$249,088	20% over expended
	\$44,000 CF	\$65,033	Process outside solids
2015	\$242,000 TP	\$234,744	On budget
	\$67,000 CF	\$51,649	23% under expended
2016	\$194,500 TP	(\$198,731)	About on budget
	\$62,000 CF	(\$60,646)	About on budget

Outlook for 2017

Over the years we have done quite a bit to control our energy use including many energy efficiency projects, buying power in multi-year discounted packages, trying to shed load during annual ISO system peaks, etc. We have been off of the ICAP since July (due to Travis and operators working hard to use the Co-Gen engine and manage our load during the system peak in the summer of 2015) I believe we were able to be off peak this year as well. At the compost facility I believe the biggest factor is how much outside material we process next year (and how long our annual maintenance shutdown lasts) I am thinking we will be down for less time and process more. We will also be looking at trying to reduce our load during the peak at the compost facility to reduce the ICAP charge there in years to come. It remains a point of pride that we have continued to reduce our power costs which were around half a million dollars per year for the combined facilities less than ten years ago.

Historical Estimate:	\$205,000 TP	\$60,000 CF	Total: \$265,000
Itemized Estimate:	\$177,941 TP	\$61,285 CF	Total \$239,226
Proposed Budget Amount:	\$180,000 TP	\$60,000 CF	Total: \$240,000

2017 Budget Account Itemization

Treatment Plant (CMPAcct # 551-027-1624-001)											
Month	2016	2017	Combined supply and delivery per kwh	Budget Power cost	Demand \$	ICAP \$	Budget Total Cost	Compost Facility -- (CMP Acct# 551-111-7883-001)			
								2016	2017	Aver Rate	Power \$
Jan	143,100	120000	\$0.0556	\$6,670	\$6,700	\$0	\$13,370				
Feb	119,700	120000	\$0.0556	\$6,670	\$6,700	\$0	\$13,370				
Mar	119,100	120000	\$0.0556	\$6,670	\$6,700	\$0	\$13,370				
Apr	164,700	130000	\$0.0556	\$7,225	\$7,500	\$0	\$14,725				
May	206,700	150000	\$0.0556	\$8,337	\$7,500	\$0	\$15,837				
Jun	177,300	150000	\$0.0556	\$8,337	\$7,500	\$0	\$15,837				
Jul	163,500	150000	\$0.0556	\$8,337	\$7,500	\$0	\$15,837				
Aug	139,500	150000	\$0.0556	\$8,337	\$7,500	\$0	\$15,837				
Sept	155,100	130000	\$0.0556	\$7,225	\$6,700	\$0	\$13,925				
Oct	(170000)	130000	\$0.0556	\$7,225	\$6,700	\$0	\$13,925				
Nov	(170000)	120000	\$0.0556	\$6,670	\$6,700	\$0	\$13,370				
Dec	(160000)	120000	\$0.0556	\$6,670	\$6,700	\$0	\$13,370				
Totals	1,888,700	1,590,000		\$88,372	\$84,400	\$0	\$172,772				
Yearly KWH totals	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	
	3,439,200	3,570,000	3,432,800	2,953,200	3,249,600	3,228,400	3,213,095	2,334,175	1,987,300	1,888,700	
Compost Facility -- (CMP Acct# 551-111-7883-001)											
Month	2016	2017	Aver Rate	Power \$	Demand \$	Capacity \$	Total Cost				
Jan	58,344	57000	\$0.0610	\$3,477	\$1,700	\$250	\$5,427				
Feb	57,324	57000	\$0.0610	\$3,477	\$1,700	\$250	\$5,427				
Mar	55,210	57000	\$0.0610	\$3,477	\$1,700	\$250	\$5,427				
Apr	60,384	57000	\$0.0610	\$3,477	\$1,700	\$250	\$5,427				
May	46,308	45000	\$0.0610	\$2,745	\$1,700	\$250	\$4,695				
Jun	40,392	40000	\$0.0610	\$2,440	\$1,500	\$250	\$4,190				
Jul	36,516	35000	\$0.0610	\$2,135	\$1,000	\$250	\$3,385				
Aug	6,732	6500	\$0.0610	\$397	\$1,000	\$250	\$1,647				
Sept	10,200	10000	\$0.0610	\$610	\$1,500	\$250	\$2,360				
Oct	(60000)	57000	\$0.0610	\$3,477	\$1,700	\$250	\$5,427				
Nov	(60000)	57000	\$0.0610	\$3,477	\$1,700	\$250	\$5,427				
Dec	(60000)	57000	\$0.0610	\$3,477	\$1,700	\$250	\$5,427				
Totals	556,200	535,500		\$32,666	\$18,600	\$3,000	\$54,266				

2017 Budget Worksheet

Account Name: Fuels
 Account Number: 61211: Treatment Plant 61212: Compost Facility

General Description of Included Items: Natural gas for the treatment plant boilers and #2 fuel Oil for the standby generator. Propane at the compost facility. Fuel costs for the loaders at both facilities are included in the vehicles accounts.

Historical Perspective

Year	Budget	Actual/(Projected)	Comments
2012	\$71,000 TP	\$60,684	14% under budget
	\$79,000 CF	\$54,587	30% under budget
2013	\$72,000 TP	\$73,980	7% over expended
	\$63,000 CF	\$62,135	14% under expended
2014	\$71,000 TP	\$69,879	On budget
	\$56,000 CF	\$93,985	68% over expended
2015	\$71,000 TP	\$51,334	27% under expended
	\$66,000 CF	\$56,288	15% under expended
2016	\$75,000 TP	\$56,414	25% under exp mild winter
	\$45,000 CF	\$31,998	29% under exp

Outlook for 2017

The biggest problem in budgeting this account has been the volatility in fossil fuel prices over the last few years. It is apparent that the switch from oil to natural gas at the treatment plant in 2010 and from steam to hot water had a major positive effect on our costs. At the compost facility the big need is warm the air enough to remove the moisture from the building, but failures in components of the make-up air heaters have often caused us to use more fuel than expected or really needed. In addition, in 2014 we had a vaporizer failure that essentially drained our storage tanks one weekend. I think we all recall that the winter of 2016 was unusually mild which was also good for the fuel budget.

Historical Estimate: \$60,000 TP
 \$50,000 CF
 Total: \$110,000

Itemized Estimate: \$67,855 TP
 \$43,500 CF
 Total: \$111,355

Proposed Budget Amount: \$64,000 TP
 \$46,000 CF
 Total: \$110,000

2017 Budget Account Itemization						
Account Name: Fuels						
Account Numbers: 61211 and 61212						
Treatment Plant						
Month	TP Quantity 100 ft ³	AD Quantity 100 ft ³	Cost of Gas per ccf	Delivery cost per ccf	Customer Charge	Total Cost
January	8,500	400	\$0.95	\$0.27	\$175	\$11,033
February	8,500	500	\$0.95	\$0.27	\$175	\$11,155
March	8,000	500	\$0.95	\$0.27	\$175	\$10,545
April	5,500	400	\$0.95	\$0.27	\$175	\$7,373
May	3,000	200	\$0.95	\$0.27	\$175	\$4,079
June	500	150	\$0.75	\$0.27	\$175	\$838
July	20	150	\$0.75	\$0.27	\$175	\$348
August	20	150	\$0.75	\$0.27	\$175	\$348
September	20	250	\$0.75	\$0.27	\$175	\$450
October	1,500	300	\$0.75	\$0.27	\$175	\$2,011
November	5,000	300	\$0.95	\$0.27	\$175	\$6,641
December	8,500	400	\$0.95	\$0.27	\$175	\$11,033
Totals	49,060	3,700			\$2,100	\$65,855
1,000 gallons of diesel for emerg generator \$2,000						
Treatment Plant total = \$67,855						
Compost Facility						
January to May: 32,000 gallons @ \$1.00 = \$32,000						
September to December: 10,000 gallons @ \$1.15 = \$11,500						
Compost Facility Total = \$43,500						

2017 Budget Worksheet

Account Name: Water and Utilities
Account Number: 613

General Description of Included Items: Water purchased from Lewiston Public Works. A significant portion of the water used at the treatment plant is recycled effluent. Before 2003 we did not have a water account at the compost facility as all water was supplied by on an onsite well, since that time we have added a little money for a water cooler due to slightly elevated levels of arsenic found in the well water.

Historical Perspective

Year	Budget	Actual/(Projected)	Comments
2012	\$28,000 TP	\$18,044	35% under budget
	\$250 CF	\$301	20% over budget
2013	\$22,000 TP	\$18,169	17% under budget
	\$250 CF	\$343	37% over budget
2014	\$22,000 TP	\$30,585	39% over budget
	\$300 CF	\$368	23% over budget
2015	\$24,000 TP	\$20,716	14% under budget
	\$300 CF	\$305	On budget
2016	\$40,650 TP	(\$45,102)	
	\$350 CF	(\$277)	

Outlook for 2017

At the treatment plant, we changed our dewatering process to screw presses and emulsion polymer, both of which use a significant volume of water. We are budgeting for a booster pump system to replace our existing booster pumps and are hopeful that this can be utilized for the dewatering equipment, thus significantly reducing our usage. At the Compost facility we are only talking about 5 gallon bottles of drinking water. We have had some foaming when using plant water for polymer make up and have switched to city water, but will attempt again with the emulsion polymer once we have a new booster pump system online.

Historical Estimate: \$32,000 TP \$300 CF

Itemized Estimate:

Water use: (400,000 per quarter) * \$2.67/100 cu ft = \$22,000
 Water use: (300,000 per quarter) * \$2.67/100 cu ft = \$16,020
 Hydrant charges: 4 * \$575 = \$2,300

TP Total: \$38,060

Itemized budget total: \$38,060 TP
\$300 CF

Proposed Budget Amount: \$38,000

2017 Budget Worksheet

Account Name: Landfill Monitoring and Maintenance
 Account Number: 61511

General Description of Included Items: The largest portion of this account is for sampling and analyzing samples from the monitoring wells at the land fill on River Rd, Lewiston. We also pay sewer charges to LPW and include money to maintain access roads and to annually cut the grass growing over the closed out fill. There is no corresponding compost facility account.

Historical Perspective

Year	Budget	Actual/ (Projected)	Comments
2011	\$15,500	\$14,634	Only budgeted ½ year leachate
2012	\$25,000	\$25,355	ON budget
2013	\$25,000	\$16,620	33% under budget
2014	\$25,000	\$21,445	14% under budget
2015	\$26,000	\$33,174	28% over budget
2016	\$32,500	(\$33,015)	

Outlook for 2017

We sent out RFPs for well sampling at the landfill now that we have an updated environmental monitoring plan and better understand what DEP is requiring of us. As recommended in the updated plan we are to properly close out 7 abandoned wells onsite which we anticipate doing this year. Sewer charges for leachate are assumed to remain the same.

Historical Estimate: \$26,000

Itemized Estimate:

\$9,100	Water Quality Monitoring
\$5,360	Sewer charges for leachate (\$1340/qr)
\$2,500	Mowing (bush hogging)
\$500	Roadway Maint and Erosion Control
\$10,000	Close out 7 wells
\$27,460	Total

Proposed Budget Amount: \$27,000

2017 Budget Worksheet

Account Name: Office Expense
 Account Number: 70111: Treatment Plant 70112: Compost Facility

General Description of Included Items:
 Office supplies, postage and post office box rental, computer equipment and programs, copier supplies and maintenance, time clock rental and Board meeting costs.

Historical Perspective

Year	Budget	Actual/ (Projected)	Comments
2012	\$9,000 TP \$250 CF	\$9,150	2 % over budget
2013	\$9,500 TP \$250 CF	\$10,272	8% over budget
2014	\$8,700 TP \$250 CF	\$9,195	6% over expended
2015	\$10,250 TP \$250 CF	\$8,935	13% under expended
2016	\$11,000 TP \$250 CF	\$142	43% under expended
		(\$506)	16% over expended

Outlook for 2017

This minor (dollar wise) account was either on budget or under expended for many years, but in 2011, for example, we had about \$400 in un-budgeted expenditure for the A D groundbreaking. This year we purchased some workstation equipment that was originally budgeted under the safety account, but I believe is better tracked in office equipment, this makes it look like we had over expenditures that we really did not. The budget at the treatment plant will need to increase by about \$1400 to cover our expanded computer system back up as voted on by the Board of directors in October.

Historical Estimate: \$12,000 TP
 \$250 CF
 \$12,250 Total

Itemized Estimate: \$12,475 TP
 CF – no detailed estimate.

Proposed Budget Amount: \$12,250 TP
 \$250 CF
 \$12,500 Total

2017 Budget Account Itemization

Account Name: Office Expense (Treatment Plant and Compost Facility)
 Account Numbers: 70111 and 70112

STAPLES and WB MASON:	
Copy and Printer Paper \$1,100	
Pads, Pens, Binders, etc. \$950	
Calendars, planners, etc. \$300	
Paychecks \$400	
Miscel Office Items \$750	
Total = \$3,500	
COMMERCIAL PRINTING, FULL COURT PRESS/STAPLES	
Envelopes, business cards, compost and Septic receiving slips	
Special Bulletins, etc.	
Total = \$500	
FRANCOTYP-POSTALIA	
Postage Meter rental and postage rate chips \$700	
Total = \$500	
POSTMASTER	
Rental of Post Office Box \$490	
Postage \$1,200	
Total = \$1,690	
PORTLAND COMPUTER COPY (PCCI)	
Copier Service Agreement \$625	
Copies over agreement \$150	
Repairs & miscel \$100	
Total = \$875	
ADVANCED MICRO SERVICES	
Local area network (LAN) support and maintenance	
Mozy Pro Server back-up \$38.95/month	
AVG cloud care \$36/month	
Total = \$400	
Total = \$475	
Total = \$435	
SIMPLEX	
Time cards	
Total = \$200	
PAYROLL	
Direct Deposit \$39.75/week	
Quickbooks \$569/yr	
Total = \$2700	
LOGMEIN.COM	
Total = \$400	
MISCELLANEOUS	
Other Miscellaneous Items	
Wireless keyboard for TV	
CF printer	
Total = \$800	

Itemized Budget Total: \$12,475

2017 Budget Worksheet

Account Name: Telephone and Communications
 Account Number: 70211: Treatment Plant 70212: Compost Facility

General Description of Included Items:
 Telephone costs including long distance, fax and cellular phones in trucks and for the hazmat team, pagers and "walkie-talkies" for in plant communications, and internet access charges.

Historical Perspective

Year	Budget	Actual/ (Projected)	Comments
2012	\$5,400 TP	\$5,040	On budget
	\$1,900	\$1,879	On budget
2013	\$5,400 TP	\$5,285	on budget
	\$1,900 CF	\$1,465	23% under budget
2014	\$4,500 TP	\$7,053	57% over expended
	\$1,500 CF	\$1,113	20% under expended
2015	\$4,500 TP	\$6,291	40% over expended!
	\$1,400 CF	\$951	32 under expended
2016	\$6,500 TP	(\$6,074)	6% under expended
	\$1,250 CF	(\$1,170)	About on budget

Outlook for 2017

In looking at the largest portion of this account, telephone service, the "controllable portion", long distance service, accounts for only 15% to 30% of our monthly bill. The other items included in this account are also pretty small such as internet hosting and the two cell phones we keep in the hook trucks used for hauling biosolids to farms and the compost facility.

Historical Estimate: \$7,000 TP
 \$1,250 CF
 Total \$8,250

Itemized Estimate: \$8,030 TP
 \$1,800 CF
 Total: \$9,830

Proposed Budget Amount: \$7,500 TP
 \$1,500 CF
 Total \$9,000

2017 Budget Account Itemization

Account Name: Telephone and Communications
 Account Numbers: 70211 and 70212

Treatment Plant:

Telephone Lines (3 voice only, 1 fax/voice, 2 dedicated to computer call in call out)
 (Service from Earth Link)
 Local Service:
 Long Distance
 Fees
 Taxes and surcharges (All in monthly fee \$290.00)

Subtotal \$3,480

Cell Phones - 2 for use in dumps and 1 in pumper)
 (Service from Verizon Wireless)
 Monthly charges (\$105/mo)

Subtotal \$1,260

Pagers (1 for on call from SCADA system)
 (Service from SPCK)

\$170

Internet Hosting Fees
 (Intermedia hosted exchange \$9/user x 15)

\$1620

System Repair and Maintenance
 Service from Bricknet

\$500

Cogen Remote Service

\$1000

Treatment Plant Total.....\$8,030

Compost Facility

Telephone Service (2 lines voice, fax and alarm auto dialer)
 \$98//mo - Fairpoint

\$1,175

Internet (\$45.99/month)
 Modem \$75

\$625

Compost Facility Total.....\$1,800

2017 Budget Worksheet

Account Name: Insurance
 Account Number: 703 (I have not separated costs for the Treatment Plant & Compost Facility)

General Description of Included Items:
 Worker's Compensation, Multi Peril, Boiler and Machine, and Motor Vehicle insurance policies. Due to the difficulty in separating out the two facilities, the accounts are budgeted together. Health Insurance is budgeted under Employee Benefits.

Historical Perspective

Year	Budget	Actual/ (Projected)	Comments
2007	\$102,000 TP & CF	\$82,319	Compet bidding
2008	\$83,000 TP & CF	\$76,057	8% under expended
2009	\$5,000 TP & CF	\$69,308	Changed W.Comp
2010	\$69,000 TP & CF	\$58,207	16% under exp.
2011	\$70,000 TP & CF	\$68,671	on budget
2012	\$69,000 TP & CF	\$68,882	on budget
2013	\$72,500 TP & CF	\$82,589	14% over budget
2014	\$80,000 TP & CF	\$84,688	6% over expended
2015	\$90,000 TP & CF	\$93,734	4% over expended
2016	\$102,000 TP & CF	(\$106,817)	5% over expended

Outlook for 2017

In 2009 we switched our Worker's Compensation coverage from Maine Municipal Association to Maine Employer's Mutual Insurance. Over the longer period, we have had problems with worker's compensation claims of the "repetitive injury" nature. This resulted in our "experience modifier" which was at 1.35 increasing to 1.63. We are currently back to 1.27. Unfortunately, we had another major claim in 2015/2016 which has not been figured into our rating yet, and is still an "open claim" at this time. Due to a long span of lost time payments, I have to think this is going to be a big hit eventually. The other factor that has increased our premiums is the anaerobic digestion project. This has two ramifications, first more dollar value of assets to insure and secondly the two failures of the Co-Gen engines will undoubtedly raise our future rates.

Historical Estimate: \$110,000 TP & CF

Itemized Estimate: \$137,114 TP & CF

Proposed Budget Amount: \$125,000 TP & CF

2017 Budget Worksheet

Account Name: Legal and Audit

Account Number: 704 Treatment Plant and Compost Facility

General Description of Included Items:

This account includes legal services including labor disputes (historically the largest single item), legal services for pretreatment regulations and regulatory issues with the State or the Federal Government, and financial audit costs. Legal services associated with capital projects financing are not included in this account; they are normally included in the bond costs.

Historical Perspective

Year	Budget	Actual/(Projected)	Comments
2010	\$8,200 TP & CF	\$12,400	Little Brown Church
2011	\$12,000 TP & CF	\$9,254	Personel issue, under
2012	\$10,500 TP & CF	\$10,267	On budget
2013	\$10,000 TP & CF	\$8,015	20% under expended
2014	\$10,000 TP & CF	\$16,009	MPERS issue
2015	\$16,000 TP & CF	\$13,496	15% under budget
2016	\$16,000 TP & CF		

Outlook for 2017

Traditionally the largest variable expenditure in this account had been legal help with union/personnel issues. Some years we have needed legal help with biosolids related matters – mostly permitting or ordinance issues. In 2009 and 2010 we spent some on issues associated with the little brown church and the first tee program. In 2014/2015 we have had significant costs for dealing with an issue with employee eligibility in the Maine PERS system which is still on-going, however the deductible is already covered. One potential wild card would be the cost of our financial audit if we choose to switch to another accounting firm from Horton McFarland and Vessey.

Historical Estimate: \$12,000 TP & CF

Account Details for 2017

Financial Audit (HM&V – incl single audit?)	\$7,500
Miscellaneous Legal (labor issues, bad debt collection)	\$5,000
Third party meter reader (Bill Short)	\$4,000
Total	\$16,500

Proposed Budget Amount: \$16,000 TP & CF

2017 Budget Worksheet

Account Name: Advertising and Public Relations
 Account Number: 705 Treatment Plant and Compost Facility

General Description of Included Items:

Advertising for employees as needed (historically the largest single item), listing of industries in non compliance with pretreatment regulations, notices of public hearings or meetings, compost marketing efforts including our ad in the yellow pages, and miscellaneous public relations efforts.

Historical Perspective

Year	Budget	Actual/(Projected)	Comments
2010	\$2,400 TP & CF	\$1,462	24% under expend
2011	\$2,000 TP & CF	\$2,239	16% over budget
2012	\$2,000 TP & CF	\$1,291	35% under budget
2013	\$1,700 TP & CF	\$845	50% under budget
2014	\$1,500 TP & CF	\$1,202	28% under budget
2015	\$2,000 TP & CF	\$1651	17% under budget
2016	\$1,750TP & CF	(\$ 1,330)	

Outlook for 2017

As a practical matter, compost advertising is the largest "discretionary" or "controllable" expenditure in this account. We have done some additional compost advertising but not much that required expenditures. The other item that affects the expenditure in this account is advertising for new employees.

Historical Estimate: \$1,700 TP & CF

2017 Account Details

\$1000 Ad in Sun Journal Gardening Supplement, and other Sun Journal Compost Ads
 \$300 Ads in miscellaneous local papers
 \$250 Public Notices to be published
 \$450 Help Wanted Ads

Total \$2,000

Proposed Budget Amount: \$2,000 (\$1000 TP, \$1000 CF)

2017 Budget Worksheet

Account Name: Salaries and Wages
 Account Number: 70611: Treatment Plant 70612: Compost Facility

General Description of Included Items:
 Self Explanatory.

Historical Perspective

Year	Budget	Actual/ (Projected)	Comments
2012	\$900,000 TP	\$902,765	On budget
	\$135,000 CF	\$124,012	8% under budget
2013	\$930,000 TP	\$928,795	on budget
	\$135,000 CF	\$138,896	3% over budget
2014	\$948,000 TP	\$959,834	1% over budget
	\$150,000 CF	\$136,373	9% under budget
2015	\$970,000 TP	\$991,305	1% over budget
	\$141,000	\$124,603	CFM worker comp
2016	\$1,003,000 TP	(\$1,014,473)	1% over budget
	\$145,000 CF	(\$123,703)	CFM worker comp

Outlook for 2017

Year after year, despite the fact that we have been very close to budget on a percentage basis most years, a small variation can have a disproportionate impact on the overall budget. In 2011 we completed a management transition from 4 supervisory positions to 3 and at the compost facility we operated for most of the fourth quarter with 2 employees instead of 3. Again in 2013 we had significant periods when we had positions unfilled due to retirements and leaves of absence. In 2014 I think we were slightly over budget due to overtime connected with startup of the anaerobic digester project. One factor that makes this account a bit more challenging to forecast is the use of comp time. While comp time allows employees to take time off at 1 and 1/2 hours for each hour of overtime, at the end of the year we end up paying the balance of comp time left on the books, and this can be a significant "hit" at year end making my quarterly estimates off. The Union Contract contains a 2.0% COLA for 2017. Partially as a result of A/D and reduced solids production we have had less overtime at the compost facility, still it is hard not to notice a trend in under budgeting at the treatment plant and over budgeting for the compost facility.

Historical Estimate:

\$1,044,000 TP
 \$148,000 CF

Total: \$1,192,000

Itemized Estimate:

\$1,028,750 TP
 \$143,450 CF

Total: \$1,172,200

Proposed Budget Amount: \$1,035,000 TP
 \$145,000 CF

Total: \$1,180,000

2017 Budget Account Itemization

Account Name: Salaries and Wages Account Number: 706

Name	Position	Step	Ann Date	1/1/17rate	bef anv pay	post anv rt	post an pay	est OT hrs	est OT pay	call in/on call/ op holi/stipends/HI waiver	Total Pay
P. Drouin	lab tech	9	27-May	\$23.05	\$19,362	\$23.52	\$29,165	25	\$873	\$700	\$50,100
D. Cook	millwright	11	30-May	\$21.94	\$19,307	\$21.94	\$26,328	30	\$987	\$700	\$47,323
W. Burnham	millwright	4	12-Nov	\$19.12	\$33,651	\$19.52	\$6,246	30	\$987	\$700	\$47,323
L. Drolson	asst oper	10	24-Sep	\$21.51	\$25,812	\$21.94	\$19,307	50	\$1,629	\$700	\$46,449
J. Adams	millwright	5	19-Mar	\$19.52	\$9,370	\$19.90	\$31,840	20	\$593	\$2,290	\$46,593
N. Melanson	mechanic	11	18-Aug	\$23.99	\$26,902	\$23.99	\$15,785	25	\$900	\$6,534	\$52,620
W. Cwik	lead oper	11	19-Nov	\$23.99	\$45,101	\$23.99	\$4,798	200	\$7,197	\$8,425	\$66,121
S. Lagasse	lead oper	11	7-Jul	\$23.99	\$13,434	\$23.99	\$36,465	200	\$7,197	\$10,644	\$67,741
M. Melanson	millwright	1	7-Nov	\$18.08	\$31,821	\$18.43	\$5,898	20	\$548	\$700	\$38,966
E. Varney	operator	5	23-Jan	\$20.77	\$3,323	\$21.19	\$40,685	35	\$1,101	\$8,378	\$53,487
J. McDevitt	Comp Tech	3	6-Jan	\$19.98	\$799	\$20.38	\$41,575	25	\$757	\$1,556	\$44,687
T. Jacobs	asst oper	11	13-Nov	\$21.94	\$39,492	\$21.94	\$6,143	20	\$629	\$1,760	\$46,397
C. Currier	CFT/MW	5	11-Jun	\$20.77	\$21,601	\$21.19	\$21,601	40	\$1,259	\$954	\$45,415
E. Cavers	operator	4	2-Jan	\$20.38	\$42,390	\$20.77	\$0	100	\$3,086	\$6,721	\$52,198
Total Estimated Union Wages											\$706,418
E. Woods	pretr/safety		8-Sep	\$26.49			\$55,099	40	\$1,589	\$690	\$57,379
C. Taylor	admin asst		19-Apr	\$23.40			\$48,672	5	\$176	\$1,590	\$50,438
I. Lary	Compliance		30-Nov	\$23.07			\$47,986	25	\$865	\$450	\$49,301
M. Pelletier	comp spvr		12-Apr	\$23.99			\$49,899	50	\$1,799	\$1,050	\$53,348
R. Lenfestey	treasurer						\$2,000				\$2,000
D. Madsen	plant super		11-Oct				\$69,864			\$6,174	\$76,038
T. Peaslee	a. super		29-May				\$81,143			\$390	\$81,533
C. Richardson	superint		27-Jun				\$95,356			\$390	\$95,746
Treatment Plant											\$1,028,750
Compost Facility											\$143,450
Total Estimated Non Union Wages											\$465,782

Notes: Lead Operator, Operator and Assistant Operator includes the portion of \$4500 per year payments from contract to move to 40 hr week that are taken as pay. Some portions are in employee benefits. If operators personnel are putting into 457 plans. Also includes pay for taking a lower level of health insurance. Assuming CF manager pay for only 2/3 of year due to that position being vacant while CF manager out on workers comp.

Budget Total **\$1,172,200**

2017 Budget Worksheet

Account Name: Employee Benefits
 Account Number: 70711: Treatment Plant 70712: Compost Facility

General Description of Included Items:

Health insurance premiums, Steel toe work boots, social security co-payments, and retirement plan payments (State Retirement System and ICMA) operator stipends paid to 457 plans, and retiree life insurance premiums.

Historical Perspective

Year	Budget	Actual/(Projected)	Comments
2012	\$330,000 TP	\$307,125	7% under budget
	\$52,000 CF	\$39,262	24% under budget
2013	\$340,000 TP	\$296,955	13% under budget
	\$61,000 CF	\$39,164	36% under budget
2014	\$337,000 TP	\$336,931	3% under expended
	\$50,000 CF	\$47,165	% over expended
2015	\$367,000 TP	\$382,293	4% over expended
	\$65,500 CF	\$55,564	15% under exp
2016	\$362,000 TP	(\$383,550)	6% over expended
	\$60,000 CF	(\$57,047)	5% under expended

Outlook for 2017

One significant change that has kept this account lower has been the shift to stipends for uniforms, as this has shifted that cost from benefits to wages. Roughly 55% of the cost for this account is Health insurance premiums. The change in health insurance plans from POS-C to PPO 500 has saved a significant amount in premiums, but as yet we do not have good information on the use of/cost for the HRA (whereby the Authority reimburses employees for deductible and co-insurance charges up to a maximum of \$750 per year for employee only and \$1,500 per year for employee plus children, family or married coverage). I have heard from Debbie Bridges of MMEHT that PPO premiums are set to increase by 11.25% for 2017.

Historical Estimate: \$412,000 TP

\$61,000 CF

Total: \$473,000

Itemized Estimate: \$353,970 TP

\$69,230 CF

Total: \$423,200

Proposed Budget Amount: \$385,000 TP

\$65,000 CF

Total: \$450,000

2017 Budget Account Itemization

Account Name: Employee Benefits

Number: 707 Treatment Plant; 70711 Compost Facility; 70712

Treatment Plant			
Health Insurance	# employees	LAWPCA %	Premium
married or family (Post 2006)	4	0.8	\$1,958.10
married or family (Pre 2006)	2	0.85	\$1,958.10
employee + child (Post 2006)	1	0.8	\$1,424.38
employee + child (Pre 2006)	2	0.85	\$1,424.38
employee only (Post 2006)	4	0.8	\$872.93
employee only (Pre 2006)	0	0.85	\$872.93
Total			\$75,191.04

Total MMEHT \$191,388

Compost Facility			
Health Insurance	# employees	LAWPCA %	Premium
married or family (Post 2006)	1	0.85	\$1,958.10
married or family (Pre 2006)	1	0.8	\$1,958.10
employee only (Post 2006)	1	0.85	\$872.93
Social Security and Medicare		0.0765	\$1,028,749.78
ICMA (Cook, Taylor, Richardson, N. Melanson, T Jacobs, Madsen, Peaslee, Drolson, M. Melanson)	9	0.06	\$536,508.95
MSRS (Burnham, Cwik, Lagasse, Woods, Drouin, Varney, Adams, Cavers)	8	0.08	\$440,940.11
Operator Stipends paid to retirement accounts (Cwik, Lagasse)	2		\$9,000
HRSA (Richardson, Lagasse, Woods)			\$4,500
Unemployment Compensation			\$0
Group Dynamic Flexible H S A	7		\$5.55
MainePERS Retiree Life Insurance Premium (Robichaud, Matkivich, Asselin, Blahut, Strou, D Jacobs, Petrie)	7		\$1,416.20
Total			\$353,970

Total - Treatment Plant \$353,970

Compost Facility			
Health Insurance	# employees	LAWPCA %	Premium
married or family (Post 2006)	1	0.85	\$1,958.10
married or family (Pre 2006)	1	0.8	\$1,958.10
employee only (Post 2006)	1	0.85	\$872.93
Social Security and Medicare		0.0765	\$143,450.24
ICMA (McDevitt)		0.06	\$44,687.11
MEPERS (Curie, TBD)		0.08	\$98,763.13
Group Dynamic Flexible H S A	0		\$5.55
Total			\$19,972.62

Total - Compost Facility \$69,230.53

Total Budget (MMEHT POS-C rate increase of 11.25%)

\$423,200.15

2017 Budget Worksheet

Account Name: Professional Development

Account Number: 70811: Treatment Plant 70812: Compost Facility

General Description of Included Items:

Subscriptions, seminars, classes, conventions and travel to these events, books and periodicals, regulatory update services, memberships in professional organizations, and professional certifications and licenses. Essentially all travel mileage is included in this account (such as using a personal vehicle to go to the bank, or between the treatment plant and compost facility). I have generally not specifically tracked expenses at the compost facility separately from the treatment plant in this account.

Historical Perspective

Year	Budget	Actual/(Projected)	Comments
2012	\$17,750 TP	\$26,406	49% over budget
	\$1,250 CF	\$1,018	19% under budget
2013	\$21,000 TP	24,081	15% over expended
	\$6,000 CF	\$840	????????????????
2014	\$26,000 TP	\$23,104	11% under budget
	\$3,000 CF	\$3,960	32% over expended
2015	\$22,500 TP	\$22,731	On budget
	\$6,500	\$3,380	Tuition payments?
2016	\$27,000 TP	(\$29,994)	11% over expended
	\$6,000 CF	(\$3,915)	35% under expended

Outlook for 2017

The rather large and steep increase in expenditures in this account is largely attributable to support for college level courses. The requirement for all employees to obtain a minimum grade 1 treatment plant operator's license has increased costs to some degree (both for the actual test and license fees and the ongoing educational credits needed to maintain the license). In the end I believe that LAWPCA is very fortunate to have the workforce we now employ, and support for education is one big factor in our ability to attract and retain great employees.

Historical Estimate: \$24,000 TP \$3,500 CF

Total: \$27,500

Itemized Estimate: \$27,140 TP \$3,475 CF

Total \$30,615

Proposed Budget Amount: \$26,000 TP \$3,500 CF

Total: \$ 29,500

2017 Budget Account Itemization

Account Name: Professional Development
 Account Number: Treatment Plant: 70811
 Compost Facility: 70812

Membership Dues:

\$600	MMA
\$320	Nat Safety Council
\$500	MEWEA
\$1000	WEF/NEWEA
\$100	MISC
\$1,900	NEBRA
\$410	ME Payroll Prof.
\$300	PE License x2

Books and Publications:

\$75	Bicycle (CF)
\$200	WEF Publications
\$210	Sun Journal
\$300	Misc Books & Mags

Sub Total \$5,130 (\$400 CF)

Training and Conferences:

\$100	Measuring the Lake
\$1500	JETCC/MEIWPCC
\$1000	MISC.
\$3,500	MEWEA
\$400	MWUA
\$1000	Operator Cert. Exams
\$4000	NEWEA
\$1400	Operator/Compost School/Misc.
\$500	NEBRA
\$4000	Tuition Assistance- Dave Madsen
\$250	Opacity School
\$400	Industrial Pretreatment

Sub Total \$18,050 (\$2000 CF)

Travel:

\$5,000	Conferences and Training
\$250	Routine Mileage (Bank, P.O. AW&SD)
\$1,400	Other Misc. Mileage, board refreshments

Sub Total \$6,650 (\$1000 CF)

\$27,140 TP
 \$3,475 CF
 BUDGET TOTAL \$30,615

2017 Budget Worksheet

Account Name: Licensing Fees

Account Number: 70911: Treatment Plant 70912: Compost Facility

General Description of Included Items:

Regular, operational, license fees charged by the State of Maine or the Federal Government or the Commonwealth of Massachusetts (compost registration). These may include such items as project application fees, ongoing activity fees (such as solid waste license fee for the compost facility) or license modification fees. Currently land application site licenses are included in Residuals Disposal.

Historical Perspective

Year	Budget	Actual/ (Projected)	Comments
2012	\$15,000 TP	\$14,770	On budget
	\$1,500 CF	\$737	50% under budget
2013	\$15,200 TP	\$15,410	On budget
	\$1,800 CF	\$2,841	58% over budget
2014	\$15,500 TP	\$16,792	12% over budget
	\$900 CF	\$1,565	71% over budget!
2015	\$16,500 TP	\$19,337	17% over budget
	\$2,500 CF	\$3,006	20% over budget
2016	\$22,300 TP	(\$22,583)	
	\$2,700 CF	(\$2,700)	

Outlook for 2017

This has been a very difficult account to estimate in the past due to variable MEPDES bills. In 2012 the DEP changed the MEPDES billing to keep the bills essentially where they are now. Massachusetts compost approval of suitability is now a 5-year fee and not required to be paid until 2020.

Historical Estimate: \$17,000 TP

\$2,500 CF

Total \$19,500

Itemized Estimate: TP: \$15,500 MEPDES permit

\$500 Haz Mat, Pres Vessels etc

\$350 Stormwater Permit (State)

Per # MER 05B529)

\$400 Cogen engines air permit

Totals: \$16,750 TP

\$1,625 CF

Proposed Budget Amount: \$16,750 TP

\$1,625 CF

Total: \$18,375

2017 Budget Worksheet

Account Names: Interest Expense, Principal Bond Payments, Debt Expense
 Account Numbers: 801, 231-236, 802

General Description of Included Items: These are the expenses that are paid for our long term debt. Specifically, a \$2.485M 1990 Bond for landfill closure, a \$2.5M 1991 SRLF Bond for the belt press project a \$7,147,673 1992 SRLF Bond for construction of the compost facility (these 3 have now been paid in full), a \$3,809,902 1998 SRLF Bond for the phase 1 plant improvements (grit chamber, primary sedimentation basin upgrade, chlorine system and SCADA -- and many other items such as new roof, bar screens, LAWPCA share of landfill closure and aeration retrofit, underground oil storage tank removal and replacement, etc.), \$2.0M 2001 SRLF Bond for raw sewage pumps replacement, aeration basin modifications (SCS) and dechlorination improvements and compost turner refurbishments, a \$2.0M 2005 SRLF Bond for aeration blower and primary sludge pump replacements, and the compost storage pad, and a \$1.0M 2008 SRLF Bond for disinfection changeover and RAS pump replacement with electrical upgrade. The 2010 SRLF was used to fund the DAF replacement and influent bar screen projects. The 2011 SRLF Bond is for the anaerobic digester project. Lastly, the 2015 bond is for the screw press and siloxane removal project.

Bond	Interest Expense	Principal Payment	Debt Expense	Totals by Issue
2003A SRLF ¹ int 1.45%	\$3,767.68	\$189,532.71	\$2,899,51.77	\$196,199.90
2000IFS SRLF int 2.31%	\$14,505.94	\$118,991.13	\$2,002.45	\$135,499.52
2005FR SRLF int 1.61%	\$15,766.96	\$101,992.00	\$5,887.94	\$123,646.90
2008 SRLF int 2.6%	\$19,573.34	\$53,226.37	\$3,639.99	\$76,439.70
2010 SRLF int 1.0%	\$20,326.44	\$135,986.30	\$7,815.63	\$164,128.37
2011 SRLF int int 1.0%	\$103,800.00	\$752,500.00	\$42,815.00	\$899,115.00
2015 SRLF int 0.15%	\$4,167.15	\$148,095.00	\$7,613.10	\$159,875.25
Totals	\$181,907.51	\$1,500,323.51	\$72,673.62	\$1,754,905

¹The 1998 Bond was refinanced in 2003 and reissued as 2003A.

Comments, Trends, etc.

The 2010 and 2011 bonds are structured so that we only paid administration fees in the first year, then only admin and interest in the second year and finally the full admin, interest and principal in all succeeding years. For the 2010 bond that means a flat amount from 2013 through 2030 of \$164,128.36 for the 2011 bond, we pay \$899,115.00 this year, and the bond payments continue to gradually decline thereafter.

Proposed Budget Amounts:

Interest Expense: \$181,908

Principal Bond Payments: \$1,500,324

Debt Expense (SRLF): \$72,674

2017 Budget Account Itemization

Account Name: 165 – Compost Facility Plant and Equipment, 170 – Office Equipment, 171 – Treatment Facility Plant and Equipment, 180 – Transportation Equipment

Description of Included Items: These accounts are asset accounts funded out of operating revenues. That is, they are for durable goods or projects that have some life beyond the budget year that they are purchased. Generally, the items that are funded in this manner are the smaller capital items for which bonding is not appropriate. Years ago some of these items were funded with short term notes, however, this means has not been used in the recent past.

Compost Facility Plant and Equipment (165):

Turner #2 Electrical controls package

\$25,000

Account 165 Total: \$25,000

Office Equipment:

CF Laptop with case

\$1000

5 UPS

\$750

Account 170 Total: \$1,750

Treatment Facility Plant and Equipment:

Lab exhaust fan

\$12,000

Concrete Rehabilitation

\$15,000

Roof replacement

\$35,000

Structure B actuator

\$48,000

Booster water pump system

\$26,000

Account 171 Total: \$136,000

Transportation Equipment:

Account 180 Total: \$0

Total: \$162,750

2017 BUDGET WORKSHEET

Account Name: Septic Receiving
Account Number: 403

General Description of Included Items: Treatment fees for septic wastes received, currently \$115/1000 gallons. Also included are any fines assessed to haulers.

Month	2011	2012	2013	2014	2015	2016	2017
Jan	21,200	32,500	32,200	39,600	27,500	31,450	30,000
Feb	24,500	26,750	33,000	30,750	41,500	39,700	30,000
March	24,600	44,700	30,450	33,500	63,000	60,227	50,000
April	92,750	92,200	113,750	103,960	123,150	127,750	120,000
May	85,000	108,500	183,000	158,700	186,200	169,750	175,000
June	108,750	95,750	150,000	145,450	177,250	205,350	175,000
July	99,000	105,550	142,500	163,950	157,950	193,650	175,000
Aug	119,500	119,750	159,658	148,550	126,800	236,700	150,000
Sept	120,850	152,500	174,500	160,550	181,150	268,000	175,000
Oct	153,000	191,550	209,250	243,300	190,000	(200,000)	200,000
Nov	156,500	191,500	151,600	158,450	150,000	(80,000)	150,000
Dec	86,230	87,750	50,100	81,200	70,000	(80,000)	80,000
YrTotal	1,092,080	1,227,850	1,468,400	1,488,050	1,494,500	(1,430,000)	1,510,000

Outlook for 2017

Septage volume can be very difficult to predict on a month to month basis, due to such factors as snow cover, rain, etc. The overall health of the economy, or perhaps, how home owners feel about their economic situation, seems to have a significant impact on the volume of septage we receive.

Budget 1,500,000 gallons * \$115/1,000 gal = \$172,500

Proposed Budget Amount: \$172,500

Account Name: Septic Licensing
Account Number: 406

Licenses to Towns 25 @ \$250 = \$6,250

9 Haulers - 15 trucks @ \$25/truck = \$375

Total \$6,625

Proposed Budget: \$6,500

2017 Outside Waste Revenue - Feedstock

The Authority accepts high strength waste "feedstock" that is pumped daily to the anaerobic digesters in order to produce more methane. Currently, we have been accepting feedstocks from one main source while staff explores other feedstock options as they are available. We receive on average 17,000 gallons per week due to a genset being down for part of 2016 which inhibited LAWPCA from fully utilizing biogas from feedstocks, but feel comfortable that these volumes and sources are fairly stable and can be increased since the genset will be replaced by 2017. Feedstock availability and price stability has been increased due to a feedstock agreement between a reputable feedstock supplier and LAWPCA.

A more realistic estimate of feedstock loading could be up to 5-6 loads per week (40-48,000gallons/wk), but this can easily be set back by equipment issues or an upset digester so we chose to keep the budget estimate at 32,000 gallons/wk. We are currently accepting this feedstock at a rate of \$0.02/gallon. Moving forward, staff plans to explore additional feedstock material while also working to better understand the market in order to set appropriate rates.

2017 Estimates

$$32,000 \text{ Gallons} \times 50 \text{ weeks} \times \$0.02/\text{gallon} = \$32,000$$

2017 Outside Waste Revenue - Vector Pad Charges

The Authority accepts Vector truck waste from the City of Lewiston and the Auburn Water & Sewer District. There are times where subcontractors to these two entities also discharge. The LAWPCA Vector pad is being refitted to work more efficiently for those subcontractors and the City Vectors. The cost per discharge is based on actual expected cost (fuel, can liners, disposal, etc.) per cubic yard + \$10 per cubic yard for maintenance and future capital cost. Each vector discharge is assumed to be 1 cubic yard.

2017 Estimates

$$68 \text{ Discharges} @ \$185/\text{Discharge} = \$12,580$$

2017 Pretreatment Program Revenue

There are two components to this account: (1) dedicated funds necessary to run the industrial pretreatment program (IPP) and, (2) temporary permit fees and fines.

- (1) Due to the need for the Authority to demonstrate that we have dedicated funding sufficient to run the industrial pretreatment program (IPP) as required by EPA, the cost for the program have been broken out and billed to Lewiston Public Works and Auburn Sewerage District separately. For 2017 these cost break out as follows: 80% of the salary cost for the pretreatment and safety coordinator, 10% of the Assistant Superintendent and 10% of the Superintendent = \$63,631 plus the cost of the pretreatment program itself, \$12,150. Thus \$75,781 will be billed directly to each entity to cover the costs of this program. These costs are normally billed in December and are based upon the number of industries in each City and their flow rate and not they are "categorical" industries (those for which we have to enforce national pretreatment standards set by EPA for each category of industrial activity).

- (2) Temporary discharge fees and fines. Because these are very difficult to predict the amount has been set, albeit somewhat arbitrarily, at \$2,000.

Proposed Budget Amount: \$77,000

Total	\$77,781
Base Pretreatment Licenses	\$75,781
Temp Licenses or Fines	\$2,000

2017 Budget Worksheet

Account Name: Compost Facility Revenues
Account Number: 409

General Description of Included Items:
Generally this account reflects sales of compost.

Historical Perspective

Year	Budget	Actual/(Projected)	Comments
2008	\$82,000	\$49,139	40% below budget
2009	\$55,000	\$86,482	57% over budget!
2010	\$75,000	\$98,457	Strong demand, sold '09 left over
2011	\$90,000	\$72,215	20% below budget
2012	\$75,000	\$94,418	Sold 2011 left over inventory
2013	\$65,000	\$80,071	23% over budget estimate
2014	\$58,000	\$57,668	On budget!
2015	\$90,000	\$80,462	11% under budget
2016	\$77,000		

Outlook for 2017

In 2005 the "nominal" price per yard, including tax, was raised from \$6.00 to \$7.00 and we eliminated our deepest discount (now the largest discount, for purchases over 2,001 yards is 25%) However, we do offer a \$1.00 discount for compost purchased during our winter season – from November 1 to March 31. The Board has voted to raise our compost price by \$1.00 per cubic yard in 2014, but quality issues with compost produced from anaerobically digested material caused the price increase to be delayed. We then found we had an overstock situation (fall 2014) and again offered fairly sizeable discounts to our loyal customers that helped us in the spring. In 2015 we did raise the nominal price to \$8.00 per cubic yard, but again had some issues with wet product that kept Agresource – historically a customer good for 1,500 to 3,000 yards – from buying hardly any product. We are now producing a quality product using wood bottom ash as roughly 1/3 of our amendment mix and will be making this product solely moving forward. We received mostly positive reviews of this material with sales in 2016 so are hoping this results in an increased demand for our product in 2017.

Historical Estimate: \$80,000

Itemized Estimate: \$79,000

Proposed Budget Amount: \$79,000

2017 Budget Account Itemization

Compost Product Sales Revenue

We expect to operate in three different "modes". The first when we process all of our own solids and a small portion from other facilities, the second when all of our material is going to farms and we are only processing outside material and the last a maintenance shutdown when we will not process any solids.

1. 14 weeks (roughly Nov. 15 to Mar 1) 150 yd³ LAWPCA solids plus 100 yd³ Outside solids per week
2. 28 weeks (roughly Mar 1 to July 4 and Sept 1 to Nov 15) 250 yd³ loads of outside solids per week
3. 10 week maintenance shutdown when we will not process solids.

Compost Sales: (note: figures are based on sludge delivered to the CF and the long term average "yield" of finished product is about 1:1.5, however we also tend to see 10 to 15% shrinkage in compost volume between production and final sale). So based upon a total volume of solids processed of about 10,500 yd³, we would expect to make about 15,750 cubic yards of compost and sell about 13,388 cubic yards.

900 yds @ \$7.59 = \$6,831
288 @ \$6.62 = \$1,907
1,200 yds @ \$6.82 = \$8,184
1,800 @ \$6.14 = \$7,368
2,400 yds @ \$6.45 = \$15,480
1,500 @ \$5.63 = \$8,445
3,000 yds @ 5.69 = \$17,070
2,900 yds @ 4.97 = \$14,413
Sub Totals 13,388 yds
= \$79,698

Itemized Estimate = \$79,000

2017 Budget Worksheet

Energy Revenue – Constellation and Renewable Energy Certificates

Power Interrupt Program (Cpower)

The program which pays us to be ready to go off the grid in the event of a power emergency with the ISO New England transmission system, has recently been spun off from Constellation to C-Power. We have been working to install the required monitoring equipment needed by CPower and in the interim have been sending daily reports to them of power production from the cogen(s). We are no longer allowed to use our stand-by generator for this program due to emission laws so have been load shedding and utilizing available cogen units to allow for little to no power from the grid during these events. I am basing the current budget figure on load shedding just 350 kW of the 500+ kW we believe we are capable of shedding.

Budget amount: \$11,000

Renewable Energy Credits

As more renewable power comes on line in New England, the price we can get for each credit has been declining. Our consultant, Bill Short, was able to get our credits sold “unit contingent” (which means that we are not required to generate a minimum amount of credits, just that we will sell all we generate up to the contracted amount) for \$48.95 per REC in 2016. Due to the timing of billing we budget for ½ of the 2016 rate and ½ of the 2017 rate. Although the 2017 amounts are not determined, we have been advised to use \$25.00 per REC due to a number of factors that include the drought, facilities energy prices, and most importantly politics. We have been informed that prices are most likely to increase back closer to the \$45/REC range in 2018/19. Each renewable energy credit is a megawatt hour of electricity (or 1,000 kilowatt hours).

150 * 48.95 * 6 = \$44,055
200 * 25.00 * 6 = \$30,000

Budget amount: \$74,055

2017 Budget Worksheet

Compost Revenue – Outside Solids Tipping Fees

2015 and 2016 were very difficult years in terms of compost facility operations for many reasons. Our facility manager was out for extended period of both years and the 2015 solids coming from the treatment plant were so wet and had so high a polymer content that our product during the critical early spring marketing season was not acceptable to one of our largest customers for the North Boston area market. This led to high compost inventories, a farm giveaway program and incentive to reduce throughput rather than to increase it (and thus to reduce the outside solids coming in). All that said, with management of solids quality and limiting the volume of material from the LAWPCA treatment plant has led to our taking in a greater volume of outside material on a tipping fee basis. The biggest controlling factor at this point are turner breakdowns with limited staff to respond to them delaying most repairs.

We continue to receive roll off containers of material from the Portland Water District (Portland East End and Westbrook plants) and South Portland solids utilizing Casella Organics as a broker. This relationship is beneficial to all parties as Casella is able to guarantee solids disposal to PWD and the City of South Portland, and provide trucking and management of solids quality to us. Each roll off can has a capacity slightly greater than 35 cubic yards but generally transports around 33-35 cubic yards weighing approximately 28 tons. Our current contract with Casella pays us \$46.55 per ton for solids delivered to our Penley corner Rd facility. The contract with Casella will expire October 2017, therefore staff will be submitting a request for proposal for biosolids management to Casella and a few other early in 2017.

Assuming we can process 250 yd³ of material per week for 42 weeks (10-week summer shut down) and that the treatment plant can deliver 80% of our solids to land application then we should be able to accept 8,500 yd³ of outside material at the compost facility. Assuming each yard weighs 1,600 lbs then we should accept 6,800 tons of this material.

6,800 tons * \$46.55 = \$316,540

Total Estimate for tipping fees = 300,000