# Island Park Village Resort Water Reserves

### Level 1 Reserve Study



Report Period - 10/01/2016 - 9/30/2016

Client Reference Number	17481
Property Type	Other
Number of Units	166
Fiscal Year End	09/30

Type of Study
Date of Property Inspection
Prepared By
Analysis Method
Funding Goal
Update No Site Visit
N/A
Dale Gifford
Cash Flow
Full Funding

Report prepared on - Thursday, June 18, 2015



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## Glossary of Commonly used Words and Phrases

# Executive Summary – Island Park Village Resort Water Reserves - ID # 17481

Information to complete this Reserve Study was gathered by performing an on-site inspection of the common area elements. In addition, we also obtained information by contacting any vendors and/or contractors that have worked on the property recently, as well as communicating with the property representative (BOD Member and/or Community Manager). To the best of our knowledge, the conclusions and recommendations of this report are considered reliable and accurate insofar as the information obtained from these sources.

Projected Starting Balance as of 10/01/2015	\$265,000
Ideal Reserve Balance as of 10/01/2015	\$57,033
Percent Funded as of 10/01/2015	465%
Recommended Reserve Contribution (per month)	\$1,320
Minimum Reserve Contribution (per month)	\$1,230
Recommended Special Assessment	\$0

Island Park Village Resort Water Reserves is the water reserves portion of the Island Park Village Resort. Island Park Village Resort is a 166-lot resort community. Construction on the community was completed in 1975.

#### **Currently Programmed Projects**

Projects programmed to occur this fiscal year (FY2015/16) include fire stand pipes replace (Comp# 2002), and culinary water system major repairs (Comp# 2090). We have programmed an estimated \$37,000 in reserve expenditures toward the completion of these projects. (See page 15)

#### **Significant Reserve Projects**

The association's significant reserve projects are culinary water system major repairs (Comp# 2090), well pumps replace (Comp# 2001), fire stand pipes replace (Comp# 2002), and PRV valve and pump house piping replace (Comp# 2003). The fiscal significance of these components is approximately 62%, 18%, 5%, and 4% respectively (see page 9). A component's significance is calculated by dividing its replacement cost by its useful life. In this way, not only is a component's replacement cost considered but also the frequency of occurrence. These components most significantly contribute to the total monthly reserve contribution. As these components have a high level of fiscal significance the association should properly maintain them to ensure they reach their full useful lives.

#### **Reserve Funding**

In comparing the projected starting reserve balance of \$265,000 versus the ideal reserve balance of \$57,033 we find the association's reserve fund to be approximately 465% funded. This indicates a strong reserve fund position. In order to maintain the strength of the account fund, we suggest adopting a monthly reserve contribution of \$1,320 (\$7.95/unit) per month. We have also included a minimum reserve contribution of \$1,230 (\$7.41/unit) per month. If the contribution falls below this rate, then the reserve fund may fall into a situation where special assessments, deferred maintenance, and lower property values are likely at some point in the future.

#### Introduction

#### **Reserve Study Purpose**

The purpose of this Reserve Study is to provide the Association with a budgeting tool to help ensure that there are adequate reserve funds available to perform future reserve projects. The detailed schedules will serve as an advanced warning that major projects will need to be addressed in the future. This will allow the Association to have ample time to obtain competitive bids for each project. It will also help to ensure the physical well-being of the property and ultimately enhance each owner's investment, while limiting the possibility of unexpected major projects that may lead to special assessments.

#### **Preparer's Credentials**

Mr. Gifford has been working in the community association industry for the last 12 years. Prior to taking a position, as the Regional Project Manager covering the Utah region, at Complex Solutions, he worked in community association management in Utah. While in community association management his positions included, Maintenance Supervisor, Senior Portfolio Manager and Vice President of Community Management. His work in community association management gave him extensive experience with; budget creation, reserves and reserve budgeting, community inspections and analyzing common area components.

- Professional Reserve Analyst (PRA) designation from Association of Professional Reserve Analysts (APRA), PRA #2320
- Reserve Specialist (RS) designation from Community Associations Institute (CAI), RS# 231
- Personally has prepared over 700 reserve studies in Salt Lake City Utah and surrounding areas
- Bachelor of Science in Chemistry from Emporia State University
- Certified Manager of Community Associations® (CMCA®) designation from the National Board of Certification for Community Association Managers (NBC-CAM)
- Association Management Specialist® (AMS®) designation from Community Associations Institute (CAI)
- Professional Community Association Manager® (PCAM®) designation from Community Associations Institute (CAI). PCAM# 1740.
- Active member and former Board member and chapter President of the Utah Chapter of Community Associations Institute (UCCAI)
- Recipient of Community Associations Institute's (CAI) annual award of Excellence in Chapter Leadership for service an achievement in 2010

#### **Budget Breakdown**

Every association conducts their business within a budget. There are typically two main parts to this budget, the Operating budget and the Reserve budget. The operating budget includes all expenses that occur on an annual basis as well as general maintenance and repairs. Typical operating budget line items include management fees, maintenance expenses, utilities, etc. The reserve budget is primarily made up of replacement items such as roofing, fencing, mechanical equipment, etc., that do not normally occur on an annual basis.

#### **Report Sections**

**Reserve Analysis:** this section contains the evaluation of the association's reserve balance, income, and expenses. It includes a finding of the client's current reserve fund status (measured as percent funded) and a recommendation for an appropriate reserve allocation rate (also known as the funding plan).

**Component Evaluation**: this section contains information regarding the physical status and replacement cost of reserve components the association is responsible to maintain. It is important to understand that while the component inventory will remain relatively "stable" from year to year, the condition assessment and life estimates will most likely vary from year to year.

### General Information and Frequently Asked Questions

#### Is it the law to have a Reserve Study conducted?

The Government requires a reserve study in approximately 20 states. Also, the Association's governing documents may require a reserve fund be established. This does not mean a Reserve Study is required, but how are you going to know if you have enough money in the reserve fund if you do not have the proper information?

#### Why is it important to perform a Reserve Study?

This report provides the essential information that is needed to guide the Association in establishing the reserve portion of the total monthly assessment. The reserve fund is critical to the future of the association because it helps ensure that reserve projects can be completed on time. When projects are completed on time, deferred maintenance and the lower property values that typically accompany it can be avoided. It is suggested that a third party professionally prepare the Reserve Analysis Study since there is no vested interest in the property.

#### After we have a Reserve Study, what do we do with it?

Please take the time to review the report carefully and make sure the component information is complete and accurate. If there are any inaccuracies, or changes such as a component that the association feels should be added, removed, or altered, please inform us immediately so we may revise the report. Use the report to help establish your budget for the upcoming fiscal year.

#### How often do we review and update our Reserve Study?

There is a misconception that a Reserve Study is good for an extended period of time since the report has projections for a thirty year period. The assumptions, interest rates, inflation rates and other information used to create this report change each year. Scheduled events may not happen, unpredictable circumstances could occur, deterioration rates can be unpredictable and repair/replacement costs will vary from causes that are unforeseen. These variations alter the results of the Reserve Study. The Reserve Study should be professionally reviewed each year by having a Level III "no site visit" update reserve study performed. The Reserve Study should be professionally updated every three years by having a Level II "site visit" update reserve study performed.

#### What is a "Reserve Component" versus an "Operating Component"?

A "Reserve" component is an item that is the responsibility of the association to maintain, has a limited useful life, predictable remaining useful life, typically occurs on a cyclical basis that exceeds one year, and costs above a minimum threshold amount. An "Operating" component is typically a fixed expense that occurs on an annual basis.

#### What are the GREY areas of "maintenance" items that are often seen in a Reserve Study?

One of the most popular questions revolves around major "maintenance" items, such as painting the buildings or seal coating the asphalt. You may hear from your accountant that since painting or seal coating is not replacing a "capital" item, it cannot be considered a reserve component. However, it is the opinion of several major Reserve Study providers, including Complex Solutions, that these components meet the criteria of a reserve component.

#### Information and Data Gathered:

The information contained in this report is based on estimates and assumptions gathered from various sources. Estimated life expectancies are based upon conditions that were readily visible and accessible at the time of the site visit. While every effort has been made to ensure accurate results, this report reflects the judgment of Complex Solutions, Ltd. and should not be construed as a guarantee or assurance of predicting future events.

#### What happens during the Site Visit?

During the site visit we identify the common area components that we have determined require reserve funding. These components are quantified and a physical condition is observed. The site visit is conducted on the common areas as reported by client.

#### What is the Financial Analysis?

We project the starting balance by taking the most recent reserve fund balance as stated by the client and add expected reserve contributions to the end of the fiscal year. We then subtract the expenses of any pending projects. We compare this number to the Fully Funded Balance and arrive at the Percent Funded level. Based on that level of funding we then recommend a Funding Plan to help ensure the adequacy of funding in the future.

#### Measures of reserve fund financial strength are as follows:

- 0% 30% Funded is considered a "weak" financial position. Associations that fall into this category are more likely to have special assessments and deferred maintenance. Action should be taken to improve the financial strength of the reserve fund.
- **31% 69% Funded** is considered a "fair" financial position. Associations that fall into this category are less likely to experience special assessments and deferred maintenance than being in a weak financial position. Action should be taken to improve the financial strength of the reserve fund.
- **70% 99% Funded** is considered a "strong" financial position. Associations that fall into this category are less likely to experience special assessments and deferred maintenance than being in a fair financial position. Action should be taken to improve the financial strength of the reserve fund.
- 100% Funded is considered an "ideal" financial position. Action should be taken to maintain the financial strength of the reserve

#### **Disclosures:**

Information provided to the preparer of a reserve study by an official representative of the association regarding financial, historical, physical, quantitative or reserve project issues will be deemed reliable by the preparer. A reserve study will be a reflection of information provided to the preparer of the reserve study. The total of actual or projected reserves required as presented in the reserve study is based upon information provided that was not audited.

A reserve study is not intended to be used to perform an audit, an analysis of quality, a forensic study or a background check of historical records. An on-site inspection conducted in conjunction with a reserve study should not be deemed to be a project audit or quality inspection.

The results of this study are based on the independent opinion of the preparer and his experience and research during the course of his career in preparing Reserve Studies. In addition the opinions of experts on certain components have been gathered through research within their industry and with client's actual vendors. There is no implied warrantee or guarantee regarding our life and cost estimates/predictions. There is no implied warrantee or guarantee in any of our work product. Our results and findings will vary from another preparer's results and findings. A Reserve Study is necessarily a work in progress and subsequent Reserve Studies will vary from prior studies.

The projected life expectancy of the reserve components and the funding needs of the reserves of the association are based upon the association performing appropriate routine and preventative maintenance for each component. Failure to perform such maintenance can negatively impact the remaining useful life of the component and dramatically increase the funding needs of the reserves of the association.

This Reserve Study assumes that all construction assemblies and components identified herein are built properly and are free from defects in materials and/or workmanship. Defects can lead to reduced useful life and premature failure. It was not the intent of this Reserve Study to inspect for or to identify defects. If defects exist, repairs should be made so that the construction components and assemblies at the community reach the full and expected useful lives.

**Site Visits:** Should a site visit have been performed during the preparation of this reserve study no invasive testing was performed. The physical analysis performed during the site visit was not intended to be exhaustive in nature and may have included representative sampling. Estimated life expectancies and life cycles are based upon conditions that were readily accessible and visible at the time of the site visit. We have assumed any and all components have been properly built and will reach normal, typical life expectancies. A reserve study is not intended to identify or fund for construction defects. We did not and will not look for or identify construction defects during our site visit. In addition, environmental hazards (such as lead paint, asbestos, radon, etc.), have been excluded from this report.

#### **Update Reserve Studies:**

**Level II Studies:** Quantities of major components as reported in previous reserve studies are deemed to be accurate and reliable. The reserve study relies upon the validity of previous reserve studies.

**Level III Studies:** In addition to the above we have not visited the property when completing a Level III "No Site Visit" study. Therefore we have not verified the current condition of the components.

Insurance: We carry general and professional liability insurance as well as workers' compensation insurance.

Actual or Perceived Conflicts of Interest: There are no potential actual or perceived conflicts of interest that we are aware of.

**Inflation and Interest Rates:** The after tax interest rate used in the financial analysis may or may not be based on the clients reported after tax interest rate. If it is, we have not verified or audited the reported rate. The inflation rate may also be based on an amount we believe appropriate given the 30-year horizon of this study and may or may not reflect current or historical inflation rates.

# **Component Inventory**

Category	ID#	Component Name	Useful Life (yrs.)	Remaining Useful Life (yrs.)	Best Cost	Worst Cost
Mechanical Equip	. 710	Emergency Generator - Replace	25	23	\$14,000	\$16,000
Utility Systems	2001	Pump House Pump - Replace	15	10	\$6,000	\$10,000
	2001	Well Pumps - Replace	15	10	\$34,000	\$38,000
	2002	Fire Stand Pipes - 2012 - Replace	20	17	\$1,800	\$2,200
	2002	Fire Stand Pipes - Replace	20	0	\$10,800	\$13,200
	2003	PRV Valve & Pump House Piping - Re	epla 20	15	\$11,000	\$13,000
	2004	Expansion Tank - Replace	20	15	\$700	\$900
	2005	Variable Frequency Drives - Replace	15	10	\$1,500	\$2,500
	2090	Culinary Water System - Major Repair	rs 3	0	\$24,000	\$26,000



## **Funding Summary**

Beginn	nina	<b>Assum</b>	ptions
3			

# of units	166
Fiscal Year End	30-Sep
Budgeted Monthly Reserve Allocation	\$417
Projected Starting Reserve Balance	\$265,000
Ideal Starting Reserve Balance	\$57,033

### **Economic Assumptions**

Projected Inflation Rate	3.00%
Reported After-Tax Interest Rate	0.25%

### **Current Reserve Status**

Current Balance as a % of Ideal Balance	465%
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### Recommendations

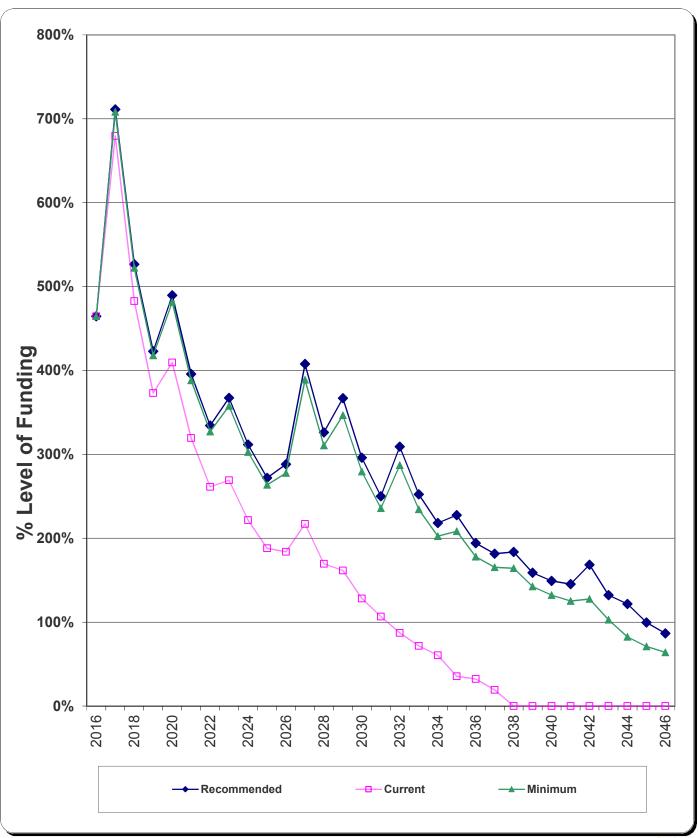
Recommended Monthly Reserve Allocation	\$1,320
Per Unit	\$7.95
Future Annual Increases	0.00%
For number of years:	30
Increases thereafter:	0.00%
Minimum Recommended Monthly Reserve Allocation	\$1,230
Per Unit	\$7.41
Future Annual Increases	0.00%
For number of years:	30
Increases thereafter:	0.00%

### **Changes From Prior Year**

Recommended Increase to Reserve Allocation	\$903
as Percentage	217%
Minimum Recommended Increase to Reserve Allocation	\$813
as Percentage	195%



## **Percent Funded - Graph**





# **Component Inventory**

Category	ID#	Component Name	Useful Life (yrs.)	Remaining Useful Life (yrs.)	Best Cost	Worst Cost
Mechanical Equip	. 710	Emergency Generator - Replace	25	23	\$14,000	\$16,000
Utility Systems	2001	Pump House Pump - Replace	15	10	\$6,000	\$10,000
	2001	Well Pumps - Replace	15	10	\$34,000	\$38,000
	2002	Fire Stand Pipes - 2012 - Replace	20	17	\$1,800	\$2,200
	2002	Fire Stand Pipes - Replace	20	0	\$10,800	\$13,200
	2003	PRV Valve & Pump House Piping - Re	epla 20	15	\$11,000	\$13,000
	2004	Expansion Tank - Replace	20	15	\$700	\$900
	2005	Variable Frequency Drives - Replace	15	10	\$1,500	\$2,500
	2090	Culinary Water System - Major Repair	rs 3	0	\$24,000	\$26,000



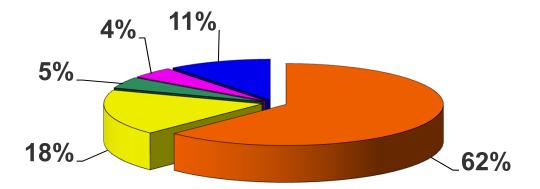
## **Significant Components**

ID#	Component Name	Useful Life	Remaining Useful Life	Average Current	Significance: (Curr Cost/UL)		
	·	(yrs.)	(yrs.)	Cost	As \$	As %	
710	Emergency Generator - Replace	25	23	\$15,000	\$600	4.4978%	
2001	Pump House Pump - Replace	15	10	\$8,000	\$533	3.9980%	
2001	Well Pumps - Replace	15	10	\$36,000	\$2,400	17.9910%	
2002	Fire Stand Pipes - 2012 - Replace	20	17	\$2,000	\$100	0.7496%	
2002	Fire Stand Pipes - Replace	20	0	\$12,000	\$600	4.4978%	
2003	PRV Valve & Pump House Piping - Rep	20	15	\$12,000	\$600	4.4978%	
2004	Expansion Tank - Replace	20	15	\$800	\$40	0.2999%	
2005	Variable Frequency Drives - Replace	15	10	\$2,000	\$133	0.9995%	
2090	Culinary Water System - Major Repairs	3	0	\$25,000	\$8,333	62.4688%	



## **Significant Components - Graph**

- ■2090 Culinary Water System Major Repairs
- ■2001 Well Pumps Replace
- ■2002 Fire Stand Pipes Replace
- ■2003 PRV Valve & Pump House Piping Replace
- ■All Other



ID#	Component Name	Useful Life	Remaining Useful Life	Average Current	Signification (Curr Co	
		(yrs.)	(yrs.)	Cost	As\$	As %
2090	Culinary Water System - Major Repair	3	0	\$25,000	\$8,333	62%
2001	Well Pumps - Replace	15	10	\$36,000	\$2,400	18%
2002	Fire Stand Pipes - Replace	20	0	\$12,000	\$600	5%
2003	PRV Valve & Pump House Piping - Re	20	15	\$12,000	\$600	4%
All Other	See Expanded Table For Breakdown				\$1,407	11%

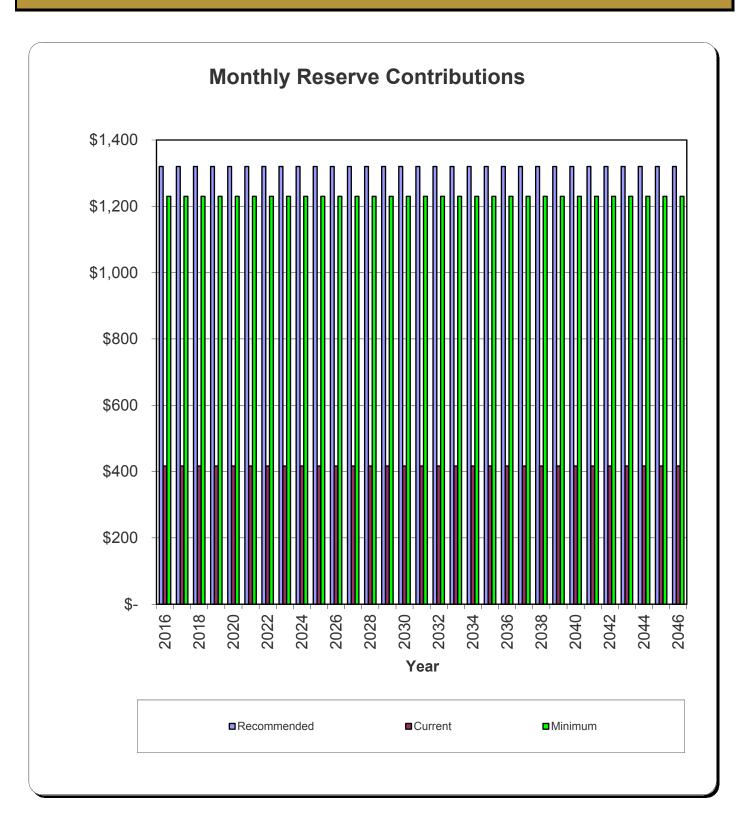


## **Yearly Summary**

Year	Fully Funded Balance	Starting Reserve Balance	% Funded	Reserve Contributions	Interest Income	Reserve Expenses	Ending Reserve Balance
2016	\$57,033	\$265,000	465%	\$15,840	\$637	\$37,000	\$244,477
2017	\$34,375	\$244,477	711%	\$15,840	\$632	\$0	\$260,948
2018	\$49,558	\$260,948	527%	\$15,840	\$673	\$0	\$277,461
2019	\$65,622	\$277,461	423%	\$15,840	\$680	\$27,318	\$266,663
2020	\$54,467	\$266,663	490%	\$15,840	\$687	\$0	\$283,191
2021	\$71,566	\$283,191	396%	\$15,840	\$729	\$0	\$299,759
2022	\$89,641	\$299,759	334%	\$15,840	\$733	\$29,851	\$286,481
2023	\$77,990	\$286,481	367%	\$15,840	\$737	\$0	\$303,057
2024	\$97,229	\$303,057	312%	\$15,840	\$778	\$0	\$319,676
2025	\$117,551	\$319,676	272%	\$15,840	\$779	\$32,619	\$303,676
2026	\$105,408	\$303,676	288%	\$15,840	\$703	\$61,820	\$258,398
2027	\$63,361	\$258,398	408%	\$15,840	\$667	\$0	\$274,904
2028	\$84,281	\$274,904	326%	\$15,840	\$663	\$35,644	\$255,764
2029	\$69,687	\$255,764	367%	\$15,840	\$660	\$0	\$272,264
2030	\$91,955	\$272,264	296%	\$15,840	\$701	\$0	\$288,805
2031	\$115,497	\$288,805	250%	\$15,840	\$669	\$58,891	\$246,423
2032	\$79,711	\$246,423	309%	\$15,840	\$637	\$0	\$262,899
2033	\$104,151	\$262,899	252%	\$15,840	\$674	\$3,306	\$276,107
2034	\$126,582	\$276,107	218%	\$15,840	\$658	\$42,561	\$250,044
2035	\$109,933	\$250,044	227%	\$15,840	\$646	\$0	\$266,530
2036	\$137,325	\$266,530	194%	\$15,840	\$660	\$21,673	\$261,356
2037	\$143,937	\$261,356	182%	\$15,840	\$616	\$46,507	\$231,305
2038	\$125,914	\$231,305	184%	\$15,840	\$599	\$0	\$247,743
2039	\$156,019	\$247,743	159%	\$15,840	\$603	\$29,604	\$234,582
2040	\$157,325	\$234,582	149%	\$15,840	\$543	\$50,820	\$200,146
2041	\$137,631	\$200,146	145%	\$15,840	\$400	\$96,314	\$120,072
2042	\$71,326	\$120,072	168%	\$15,840	\$320	\$0	\$136,233
2043	\$103,097	\$136,233	132%	\$15,840	\$291	\$55,532	\$96,832
2044	\$79,513	\$96,832	122%	\$15,840	\$262	\$0	\$112,934
2045	\$113,335	\$112,934	100%	\$15,840	\$302	\$0	\$129,076



### **Reserve Contributions - Graph**





## **Component Funding Information**

ID	Component Name	٦n	RUL	Quantity	Average Current Cost	Ideal Balance	Current Fund Balance	Monthly
710	Emergency Generator - Replace	25	23	(1) Generator	\$15,000	\$1,200	\$5,576	\$59.37
2001	Pump House Pump - Replace	15	10	(1) Pump	\$8,000	\$2,667	\$12,390	\$52.77
2001	Well Pumps - Replace	15	10	(2) Pumps	\$36,000	\$12,000	\$55,757	\$237.48
2002	Fire Stand Pipes - 2012 - Replace	20	17	(1) Fire Stand Pipes	\$2,000	\$300	\$1,394	\$9.90
2002	Fire Stand Pipes - Replace	20	0	(6) Fire Stand Pipes	\$12,000	\$12,000	\$55,757	\$59.37
2003	PRV Valve & Pump House Piping - Replace	20	15	(1) System	\$12,000	\$3,000	\$13,939	\$59.37
2004	Expansion Tank - Replace	20	15	(1) Tank	\$800	\$200	\$929	\$3.96
2005	Variable Frequency Drives - Replace	15	10	(2) VFD's	\$2,000	\$667	\$3,098	\$13.19
2090	2090 Culinary Water System - Major Repairs		0	(1) System	\$25,000	\$25,000	\$116,160	\$824.59
					\$112,800	\$57,033	\$265,000	\$1,320

Current Fund Balance as a percentage of Ideal Balance: 465%

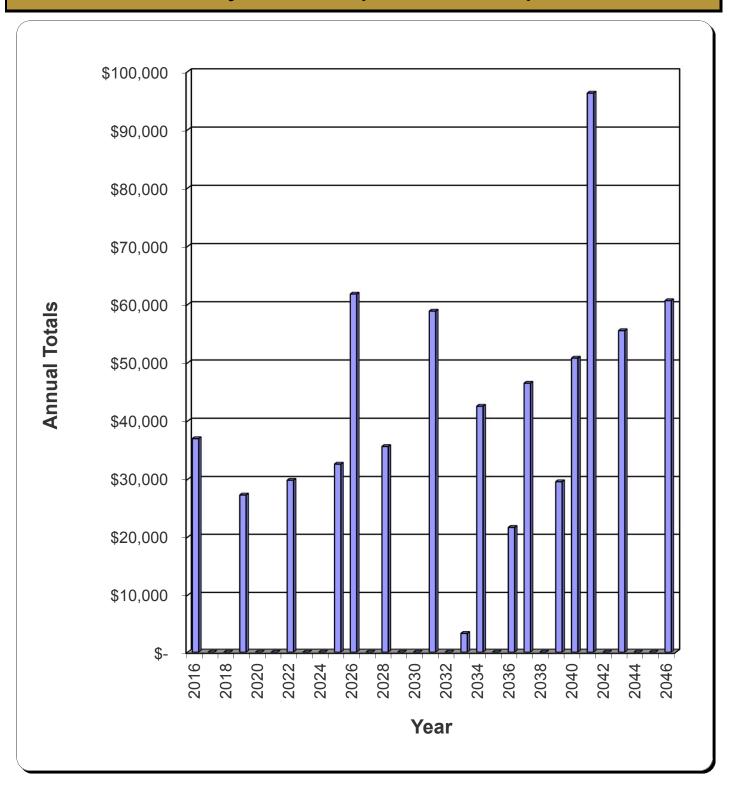


## **Yearly Cash Flow**

Year	2016	2017	2018	2019	2020
Starting Balance	\$265,000	\$244,477	\$260,948	\$277,461	\$266,663
Reserve Income	\$15,840	\$15,840	\$15,840	\$15,840	\$15,840
Interest Earnings	\$637	\$632	\$673	\$680	\$687
Special Assessments	\$0	\$0	\$0	\$0	\$0
Funds Available	\$281,477	\$260,948	\$277,461	\$293,982	\$283,191
Reserve Expenditures	\$37,000	\$0	\$0	\$27,318	\$0
Ending Balance	\$244,477	\$260,948	\$277,461	\$266,663	\$283,191
Year	2021	2022	2023	2024	2025
Starting Balance	\$283,191	\$299,759	\$286,481	\$303,057	\$319,676
Reserve Income	\$15,840	\$15,840	\$15,840	\$15,840	\$15,840
Interest Earnings	\$729	\$733	\$737	\$778	\$779
Special Assessments	\$0	\$0	\$0	\$0	\$0
Funds Available	\$299,759	\$316,332	\$303,057	\$319,676	\$336,295
Reserve Expenditures	\$0	\$29,851	\$0	\$0	\$32,619
Ending Balance	\$299,759	\$286,481	\$303,057	\$319,676	\$303,676
Year	2026	2027	2028	2029	2030
Starting Balance	\$303,676	\$258,398	\$274,905	\$255,764	\$272,264
Reserve Income	\$15,840	\$15,840	\$15,840	\$15,840	\$15,840
Interest Earnings	\$703	\$667	\$663	\$660	\$701
Special Assessments	\$0	\$0	\$0	\$0	\$0
Funds Available	\$320,218	\$274,905	\$291,408	\$272,264	\$288,805
Reserve Expenditures	\$61,820	\$0	\$35,644	\$0	\$0
Ending Balance	\$258,398	\$274,905	\$255,764	\$272,264	\$288,805
Year	2031	2032	2033	2034	2035
Starting Balance	\$288,805	\$246,423	\$262,899	\$276,107	\$250,044
Starting Balance Reserve Income	\$288,805 \$15,840	\$246,423 \$15,840	\$262,899 \$15,840	\$276,107 \$15,840	\$250,044 \$15,840
Starting Balance Reserve Income Interest Earnings	\$288,805 \$15,840 \$669	\$246,423 \$15,840 \$637	\$262,899 \$15,840 \$674	\$276,107 \$15,840 \$658	\$250,044 \$15,840 \$646
Starting Balance Reserve Income Interest Earnings Special Assessments	\$288,805 \$15,840 \$669 \$0	\$246,423 \$15,840 \$637 \$0	\$262,899 \$15,840 \$674 \$0	\$276,107 \$15,840 \$658 \$0	\$250,044 \$15,840 \$646 \$0
Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available	\$288,805 \$15,840 \$669 \$0 \$305,314	\$246,423 \$15,840 \$637 \$0 \$262,899	\$262,899 \$15,840 \$674 \$0 \$279,413	\$276,107 \$15,840 \$658 \$0 \$292,605	\$250,044 \$15,840 \$646 \$0 \$266,530
Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures	\$288,805 \$15,840 \$669 \$0 \$305,314 \$58,891	\$246,423 \$15,840 \$637 \$0 \$262,899 \$0	\$262,899 \$15,840 \$674 \$0 \$279,413 \$3,306	\$276,107 \$15,840 \$658 \$0 \$292,605 \$42,561	\$250,044 \$15,840 \$646 \$0 \$266,530 \$0
Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available	\$288,805 \$15,840 \$669 \$0 \$305,314	\$246,423 \$15,840 \$637 \$0 \$262,899	\$262,899 \$15,840 \$674 \$0 \$279,413	\$276,107 \$15,840 \$658 \$0 \$292,605	\$250,044 \$15,840 \$646 \$0 \$266,530
Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures	\$288,805 \$15,840 \$669 \$0 \$305,314 \$58,891	\$246,423 \$15,840 \$637 \$0 \$262,899 \$0	\$262,899 \$15,840 \$674 \$0 \$279,413 \$3,306	\$276,107 \$15,840 \$658 \$0 \$292,605 \$42,561	\$250,044 \$15,840 \$646 \$0 \$266,530 \$0
Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance	\$288,805 \$15,840 \$669 \$0 \$305,314 \$58,891 \$246,423	\$246,423 \$15,840 \$637 \$0 \$262,899 \$0 \$262,899	\$262,899 \$15,840 \$674 \$0 \$279,413 \$3,306 \$276,107	\$276,107 \$15,840 \$658 \$0 \$292,605 \$42,561 \$250,044	\$250,044 \$15,840 \$646 \$0 \$266,530 \$0 \$266,530
Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance Year	\$288,805 \$15,840 \$669 \$0 \$305,314 \$58,891 \$246,423	\$246,423 \$15,840 \$637 \$0 \$262,899 \$0 \$262,899	\$262,899 \$15,840 \$674 \$0 \$279,413 \$3,306 \$276,107	\$276,107 \$15,840 \$658 \$0 \$292,605 \$42,561 \$250,044	\$250,044 \$15,840 \$646 \$0 \$266,530 \$0 \$266,530
Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance Year Starting Balance	\$288,805 \$15,840 \$669 \$0 \$305,314 \$58,891 \$246,423 <b>2036</b> \$266,530	\$246,423 \$15,840 \$637 \$0 \$262,899 \$0 \$262,899 <b>2037</b> \$261,356	\$262,899 \$15,840 \$674 \$0 \$279,413 \$3,306 \$276,107 <b>2038</b> \$231,305	\$276,107 \$15,840 \$658 \$0 \$292,605 \$42,561 \$250,044 <b>2039</b> \$247,743	\$250,044 \$15,840 \$646 \$0 \$266,530 \$0 \$266,530 <b>2040</b> \$234,582
Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance Year Starting Balance Reserve Income	\$288,805 \$15,840 \$669 \$0 \$305,314 \$58,891 \$246,423 <b>2036</b> \$266,530 \$15,840	\$246,423 \$15,840 \$637 \$0 \$262,899 \$0 \$262,899 <b>2037</b> \$261,356 \$15,840	\$262,899 \$15,840 \$674 \$0 \$279,413 \$3,306 \$276,107 <b>2038</b> \$231,305 \$15,840	\$276,107 \$15,840 \$658 \$0 \$292,605 \$42,561 \$250,044 <b>2039</b> \$247,743 \$15,840	\$250,044 \$15,840 \$646 \$0 \$266,530 \$0 \$266,530 <b>2040</b> \$234,582 \$15,840
Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance Year Starting Balance Reserve Income Interest Earnings	\$288,805 \$15,840 \$669 \$0 \$305,314 \$58,891 \$246,423 <b>2036</b> \$266,530 \$15,840 \$660	\$246,423 \$15,840 \$637 \$0 \$262,899 \$0 \$262,899 <b>2037</b> \$261,356 \$15,840 \$616	\$262,899 \$15,840 \$674 \$0 \$279,413 \$3,306 \$276,107 <b>2038</b> \$231,305 \$15,840 \$599	\$276,107 \$15,840 \$658 \$0 \$292,605 \$42,561 \$250,044 <b>2039</b> \$247,743 \$15,840 \$603	\$250,044 \$15,840 \$646 \$0 \$266,530 \$0 \$266,530 <b>2040</b> \$234,582 \$15,840 \$543
Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance Year Starting Balance Reserve Income Interest Earnings Special Assessments	\$288,805 \$15,840 \$669 \$0 \$305,314 \$58,891 \$246,423 <b>2036</b> \$266,530 \$15,840 \$660 \$0	\$246,423 \$15,840 \$637 \$0 \$262,899 \$0 \$262,899 <b>2037</b> \$261,356 \$15,840 \$616 \$0	\$262,899 \$15,840 \$674 \$0 \$279,413 \$3,306 \$276,107 <b>2038</b> \$231,305 \$15,840 \$599 \$0	\$276,107 \$15,840 \$658 \$0 \$292,605 \$42,561 \$250,044 <b>2039</b> \$247,743 \$15,840 \$603 \$0	\$250,044 \$15,840 \$646 \$0 \$266,530 \$0 \$266,530 <b>2040</b> \$234,582 \$15,840 \$543 \$0
Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance Year Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available	\$288,805 \$15,840 \$669 \$0 \$305,314 \$58,891 \$246,423 <b>2036</b> \$266,530 \$15,840 \$660 \$0 \$283,030	\$246,423 \$15,840 \$637 \$0 \$262,899 \$0 \$262,899 <b>2037</b> \$261,356 \$15,840 \$616 \$0 \$277,812	\$262,899 \$15,840 \$674 \$0 \$279,413 \$3,306 \$276,107 <b>2038</b> \$231,305 \$15,840 \$599 \$0 \$247,743	\$276,107 \$15,840 \$658 \$0 \$292,605 \$42,561 \$250,044 <b>2039</b> \$247,743 \$15,840 \$603 \$0 \$264,186	\$250,044 \$15,840 \$646 \$0 \$266,530 \$0 \$266,530 <b>2040</b> \$234,582 \$15,840 \$543 \$0 \$250,966
Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance Year Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures	\$288,805 \$15,840 \$669 \$0 \$305,314 \$58,891 \$246,423 <b>2036</b> \$266,530 \$15,840 \$660 \$0 \$283,030 \$21,673	\$246,423 \$15,840 \$637 \$0 \$262,899 \$0 \$262,899 <b>2037</b> \$261,356 \$15,840 \$616 \$0 \$277,812 \$46,507	\$262,899 \$15,840 \$674 \$0 \$279,413 \$3,306 \$276,107 <b>2038</b> \$231,305 \$15,840 \$599 \$0 \$247,743 \$0	\$276,107 \$15,840 \$658 \$0 \$292,605 \$42,561 \$250,044 <b>2039</b> \$247,743 \$15,840 \$603 \$0 \$264,186 \$29,604	\$250,044 \$15,840 \$646 \$0 \$266,530 \$0 \$266,530 <b>2040</b> \$234,582 \$15,840 \$543 \$0 \$250,966 \$50,820
Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance Year Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance	\$288,805 \$15,840 \$669 \$0 \$305,314 \$58,891 \$246,423 <b>2036</b> \$266,530 \$15,840 \$660 \$0 \$283,030 \$21,673 \$261,356	\$246,423 \$15,840 \$637 \$0 \$262,899 \$0 \$262,899 <b>2037</b> \$261,356 \$15,840 \$616 \$0 \$277,812 \$46,507 \$231,305 <b>2042</b> \$120,072	\$262,899 \$15,840 \$674 \$0 \$279,413 \$3,306 \$276,107 <b>2038</b> \$231,305 \$15,840 \$599 \$0 \$247,743 \$0 \$247,743	\$276,107 \$15,840 \$658 \$0 \$292,605 \$42,561 \$250,044 <b>2039</b> \$247,743 \$15,840 \$603 \$0 \$264,186 \$29,604 \$234,582	\$250,044 \$15,840 \$646 \$0 \$266,530 \$266,530 <b>2040</b> \$234,582 \$15,840 \$543 \$0 \$250,966 \$50,820 \$200,146
Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance Year Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance Year	\$288,805 \$15,840 \$669 \$0 \$305,314 \$58,891 \$246,423 <b>2036</b> \$266,530 \$15,840 \$660 \$0 \$283,030 \$21,673 \$261,356 <b>2041</b>	\$246,423 \$15,840 \$637 \$0 \$262,899 \$0 \$262,899 <b>2037</b> \$261,356 \$15,840 \$616 \$0 \$277,812 \$46,507 \$231,305	\$262,899 \$15,840 \$674 \$0 \$279,413 \$3,306 \$276,107 <b>2038</b> \$231,305 \$15,840 \$599 \$0 \$247,743 \$0 \$247,743	\$276,107 \$15,840 \$658 \$0 \$292,605 \$42,561 \$250,044 <b>2039</b> \$247,743 \$15,840 \$603 \$0 \$264,186 \$29,604 \$234,582 <b>2044</b>	\$250,044 \$15,840 \$646 \$0 \$266,530 \$0 \$266,530 <b>2040</b> \$234,582 \$15,840 \$543 \$0 \$250,966 \$50,820 \$200,146
Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance Year Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance Year Starting Balance	\$288,805 \$15,840 \$669 \$0 \$305,314 \$58,891 \$246,423 <b>2036</b> \$266,530 \$15,840 \$660 \$0 \$283,030 \$21,673 \$261,356 <b>2041</b> \$200,146 \$15,840 \$400	\$246,423 \$15,840 \$637 \$0 \$262,899 \$0 \$262,899 <b>2037</b> \$261,356 \$15,840 \$616 \$0 \$277,812 \$46,507 \$231,305 <b>2042</b> \$120,072 \$15,840 \$320	\$262,899 \$15,840 \$674 \$0 \$279,413 \$3,306 \$276,107 <b>2038</b> \$231,305 \$15,840 \$599 \$0 \$247,743 \$0 \$247,743	\$276,107 \$15,840 \$658 \$0 \$292,605 \$42,561 \$250,044 <b>2039</b> \$247,743 \$15,840 \$603 \$0 \$264,186 \$29,604 \$234,582 <b>2044</b> \$96,832	\$250,044 \$15,840 \$646 \$0 \$266,530 \$0 \$266,530 <b>2040</b> \$234,582 \$15,840 \$543 \$0 \$250,966 \$50,820 \$200,146 <b>2045</b> \$112,934
Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance Year Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance Year Starting Balance Reserve Expenditures Ending Balance Year Starting Balance Reserve Income Interest Earnings Special Assessments	\$288,805 \$15,840 \$669 \$0 \$305,314 \$58,891 \$246,423 <b>2036</b> \$266,530 \$15,840 \$660 \$0 \$283,030 \$21,673 \$261,356 <b>2041</b> \$200,146 \$15,840	\$246,423 \$15,840 \$637 \$0 \$262,899 \$0 \$262,899 <b>2037</b> \$261,356 \$15,840 \$616 \$0 \$277,812 \$46,507 \$231,305 <b>2042</b> \$120,072 \$15,840	\$262,899 \$15,840 \$674 \$0 \$279,413 \$3,306 \$276,107 <b>2038</b> \$231,305 \$15,840 \$599 \$0 \$247,743 \$0 \$247,743 <b>2043</b> \$136,233 \$15,840	\$276,107 \$15,840 \$658 \$0 \$292,605 \$42,561 \$250,044 <b>2039</b> \$247,743 \$15,840 \$603 \$0 \$264,186 \$29,604 \$234,582 <b>2044</b> \$96,832 \$15,840	\$250,044 \$15,840 \$646 \$0 \$266,530 \$0 \$266,530 <b>2040</b> \$234,582 \$15,840 \$543 \$0 \$250,966 \$50,820 \$200,146 <b>2045</b> \$112,934 \$15,840
Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance Year Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance Year Starting Balance Reserve Expenditures Ending Balance Year Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available	\$288,805 \$15,840 \$669 \$0 \$305,314 \$58,891 \$246,423 <b>2036</b> \$266,530 \$15,840 \$660 \$0 \$283,030 \$21,673 \$261,356 <b>2041</b> \$200,146 \$15,840 \$400 \$0 \$216,386	\$246,423 \$15,840 \$637 \$0 \$262,899 \$0 \$262,899 <b>2037</b> \$261,356 \$15,840 \$616 \$0 \$277,812 \$46,507 \$231,305 <b>2042</b> \$120,072 \$15,840 \$320 \$0 \$136,233	\$262,899 \$15,840 \$674 \$0 \$279,413 \$3,306 \$276,107 <b>2038</b> \$231,305 \$15,840 \$599 \$0 \$247,743 \$0 \$247,743 <b>2043</b> \$136,233 \$15,840 \$291 \$0 \$152,364	\$276,107 \$15,840 \$658 \$0 \$292,605 \$42,561 \$250,044 <b>2039</b> \$247,743 \$15,840 \$603 \$0 \$264,186 \$29,604 \$234,582 <b>2044</b> \$96,832 \$15,840 \$262 \$0 \$112,934	\$250,044 \$15,840 \$646 \$0 \$266,530 \$266,530 <b>2040</b> \$234,582 \$15,840 \$543 \$0 \$250,966 \$50,820 \$200,146 <b>2045</b> \$112,934 \$15,840 \$302
Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance Year Starting Balance Reserve Income Interest Earnings Special Assessments Funds Available Reserve Expenditures Ending Balance Year Starting Balance Reserve Expenditures Ending Balance Year Starting Balance Reserve Income Interest Earnings Special Assessments	\$288,805 \$15,840 \$669 \$0 \$305,314 \$58,891 \$246,423 <b>2036</b> \$266,530 \$15,840 \$660 \$0 \$283,030 \$21,673 \$261,356 <b>2041</b> \$200,146 \$15,840 \$400 \$0	\$246,423 \$15,840 \$637 \$0 \$262,899 \$0 \$262,899 <b>2037</b> \$261,356 \$15,840 \$616 \$0 \$277,812 \$46,507 \$231,305 <b>2042</b> \$120,072 \$15,840 \$320 \$0	\$262,899 \$15,840 \$674 \$0 \$279,413 \$3,306 \$276,107 <b>2038</b> \$231,305 \$15,840 \$599 \$0 \$247,743 \$0 \$247,743 <b>2043</b> \$136,233 \$15,840 \$291 \$0	\$276,107 \$15,840 \$658 \$0 \$292,605 \$42,561 \$250,044 <b>2039</b> \$247,743 \$15,840 \$603 \$0 \$264,186 \$29,604 \$234,582 <b>2044</b> \$96,832 \$15,840 \$262 \$0	\$250,044 \$15,840 \$646 \$0 \$266,530 \$0 \$266,530 <b>2040</b> \$234,582 \$15,840 \$543 \$0 \$250,966 \$50,820 \$200,146 <b>2045</b> \$112,934 \$15,840 \$302 \$0



## **Yearly Reserve Expenditures - Graph**





# **Projected Reserve Expenditures by Year**

Year	ID#	Component Name	Projected Cost	Total Per Annum
2016	2002	Fire Stand Pipes - Replace	\$12,000	
	2090	Culinary Water System - Major Repairs	\$25,000	\$37,000
2017		No Expenditures Projected		\$0
2018		No Expenditures Projected		\$0
2019	2090	Culinary Water System - Major Repairs	\$27,318	\$27,318
2020		No Expenditures Projected		\$0
2021		No Expenditures Projected		\$0
2022	2090	Culinary Water System - Major Repairs	\$29,851	\$29,851
2023		No Expenditures Projected		\$0
2024		No Expenditures Projected		\$0
2025	2090	Culinary Water System - Major Repairs	\$32,619	\$32,619
2026	2001	Pump House Pump - Replace	\$10,751	
	2001	Well Pumps - Replace	\$48,381	
	2005	Variable Frequency Drives - Replace	\$2,688	\$61,820
2027		No Expenditures Projected		\$0
2028	2090	Culinary Water System - Major Repairs	\$35,644	\$35,644
2029		No Expenditures Projected		\$0
2030		No Expenditures Projected		\$0
2031	2003	PRV Valve & Pump House Piping - Replace	\$18,696	
	2004	Expansion Tank - Replace	\$1,246	
	2090	Culinary Water System - Major Repairs	\$38,949	\$58,891
2032		No Expenditures Projected		\$0
2033	2002	Fire Stand Pipes - 2012 - Replace	\$3,306	\$3,306
2034	2090	Culinary Water System - Major Repairs	\$42,561	\$42,561
2035		No Expenditures Projected		\$0
2036	2002	Fire Stand Pipes - Replace	\$21,673	\$21,673
2037	2090	Culinary Water System - Major Repairs	\$46,507	\$46,507
2038		No Expenditures Projected		\$0
2039	710	Emergency Generator - Replace	\$29,604	\$29,604
2040	2090	Culinary Water System - Major Repairs	\$50,820	\$50,820
2041	2001	Pump House Pump - Replace	\$16,750	
	2001	Well Pumps - Replace	\$75,376	
	2005	Variable Frequency Drives - Replace	\$4,188	\$96,314
2042		No Expenditures Projected		\$0
2043	2090	Culinary Water System - Major Repairs	\$55,532	\$55,532
2044		No Expenditures Projected		\$0
2045		No Expenditures Projected		\$0

### **Glossary of Commonly Used Words And Phrases**

(Provided by the National Reserve Study Standards of the Community Associations Institute)

Cash Flow Method – A method of developing a reserve funding plan where contributions to the reserve fund are designed to offset the variable annual expenditures from the reserve fund. Different reserve funding plans are tested against the anticipated schedule of reserve expenses until the desired funding goal is achieved.

**Component** – Also referred to as an "Asset." Individual line items in the Reserve Study developed or updated in the physical analysis. These elements form the building blocks for the Reserve Study. Components typically are: 1) Association responsibility, 2) with limited useful life expectancies, 3) have predictable remaining life expectancies, 4) above a minimum threshold cost, and 5) required by local codes.

**Component Full Funding** – When the actual (or projected) cumulative reserve balance for all components is equal to the fully funded balance.

**Component Inventory** – The task of selecting and quantifying reserve components. This task can be accomplished through on-site visual observations, review of association design and organizational documents, a review of established association precedents, and discussion with appropriate association representatives.

**Deficit** – An actual (or projected reserve balance), which is less than the fully funded balance.

**Effective Age** – The difference between useful life and remaining useful life (UL - RUL).

**Financial Analysis** – The portion of the Reserve Study where current status of the reserves (measured as cash or percent funded) and a recommended reserve contribution rate (reserve funding plan) are derived, and the projected reserve income and expenses over time is presented. The financial analysis is one of the two parts of the Reserve Study.

**Fully Funded Balance** – An indicator against which the actual (or projected) reserve balance can be compared. The reserve balance that is in direct proportion to the fraction of life "used up" of the current repair or replacement cost of a reserve component. This number is calculated for each component, and then summed together for an association total.

FFB = Current Cost \* Effective Age / Useful Life

**Fund Status** – The status of the reserve fund as compared to an established benchmark, such as percent funded.

**Funding Goals** – Independent of calculation methodology utilized, the following represent the basic categories of funding plan goals:

- *Baseline Funding*: Establishing a reserve-funding goal of keeping the reserve balance above zero.
- *Component Full Funding*: Setting a reserve funding goal of attaining and maintaining cumulative reserves at or near 100% funded.
- *Threshold Funding*: Establishing a reserve funding goal of keeping the reserve balance above a specified dollar or percent funded amount.

**Funding Plan** – An association's plan to provide income to a reserve fund to offset anticipated expenditures from that fund.



#### Funding Principles -

- Sufficient funds when required
- Stable contributions through the year
- Evenly distributed contributions over the years
- Fiscally responsible

#### **GSF** - Gross Square Feet

**Life and Valuation Estimates** – The task of estimating useful life, remaining useful life, and repair or replacement costs for the reserve components.

#### LF - Linear Feet

**Percent Funded** – The ratio, at a particular point in time (typically the beginning of the fiscal year), of the actual (or projected) reserve balance to the ideal fund balance, expressed as a percentage.

**Physical Analysis** – The portion of the Reserve Study where the component evaluation, condition assessment, and life and valuation estimate tasks are performed. This represents one of the two parts of the Reserve Study.

**Remaining Useful Life (RUL)** – Also referred to as "remaining life" (RL). The estimated time, in years, that a reserve component can be expected to continue to serve its intended function. Projects anticipated to occur in the current fiscal year have a "0" remaining useful life.

**Replacement Cost** – The cost of replacing, repairing, or restoring a reserve component to its original functional condition. The current replacement cost would be the cost to replace, repair, or restore the component during that particular year.

**Reserve Balance** – Actual or projected funds as of a particular point in time (typically the beginning of the fiscal year) that the association has identified for use to defray the future repair or replacement of those major components that the association is obligated to maintain. Also known as "reserves," "reserve accounts," or "cash reserves." In this report the reserve balance is based upon information provided and is not audited.

**Reserve Study** – A budget-planning tool, which identifies the current status of the reserve fund and a stable and equitable funding plan to offset the anticipated future major common area expenditures. The Reserve Study consists of two parts: The Physical Analysis and the Financial Analysis.

**Special Assessment** – An assessment levied on the members of an association in addition to regular assessments. Governing documents or local statutes often regulate special assessments.

**Surplus** – An actual (or projected) reserve balance that is greater than the fully funded balance.

**Useful Life (UL)** – Also known as "life expectancy." The estimated time, in years, that a reserve component can be expected to serve its intended function if properly constructed and maintained in its present application of installation.

