

**ORIGINAL  
FILE COPY**

1  
2  
3  
4  
5  
6  
7  
8  
9  
10  
11  
12  
13  
14  
15  
16  
17  
18  
19  
20  
21  
22  
23  
24  
25

**REBUTTAL TESTIMONY OF WILLIAM C. GOUCHER, P.E.  
BEFORE THE FLORIDA PUBLIC SERVICE COMMISSION  
ON BEHALF OF  
SOUTHERN STATES UTILITIES, INC.  
DOCKET NO. 950495-WS**

DOCUMENT NUMBER-DATE  
**03393 MAR 21 88**  
FPSC-RECORDS/REPORTING

1 Q. WHAT IS YOUR NAME AND BUSINESS ADDRESS?

2 A. My name is William C. Goucher, P.E., and my  
3 business address is 1000 Color Place, Apopka,  
4 Florida 32703.

5 Q. WHAT IS YOUR POSITION WITH SOUTHERN STATES  
6 UTILITIES, INC.?

7 A. I am a Senior Project Engineer in the Operations  
8 and Engineering Department.

9 Q. WHAT IS YOUR EDUCATIONAL BACKGROUND AND WORK  
10 EXPERIENCE?

11 A. I received a Bachelor of Science in Engineering  
12 degree from the University of South Florida in 1972  
13 with a major in Structures, Materials and Fluids.  
14 In 1976, I received a Master of Science degree from  
15 Florida Technological University (now the  
16 University of Central Florida) in Environmental  
17 Engineering.

18 Following the receipt of my Master's degree, I  
19 was employed in a consulting engineering capacity  
20 for the better part of the next 15 years. I began  
21 as a project engineer with Dawkins & Associates,  
22 Inc. on various 201 Facility Planning efforts,  
23 involving gathering and evaluating data and  
24 providing environmental and economic analyses of  
25 feasible design alternatives, plus preliminary

1           engineering.    Later I advanced into a design  
2           engineering role for various wastewater pumping  
3           station/force main systems, rehabilitation of  
4           various gravity interceptors and pumping stations,  
5           and wastewater treatment plant designs.  At Boyle  
6           Engineering Corporation, I was the design engineer  
7           for the Water Conserv II distribution network for  
8           citrus irrigation of reclaimed water and for  
9           treatment plant upgrade and expansion.  With both  
10          Boyle and with Post, Buckley, Schuh & Jernigan, I  
11          was a project manager for various treatment plant  
12          upgrading and expansions, effluent storage and  
13          pumping facilities, transmission pipelines, and  
14          various effluent disposal systems.

15                 From 1992 to 1994, as City Engineer/Assistant  
16          the Public Works Director for the City of  
17          Casselberry, Florida, I managed the Engineering  
18          Division of Public Works Department.  As such, I  
19          was responsible for the engineering design of  
20          various lift stations, sanitary sewers, water  
21          mains, and drainage systems; for technical review  
22          of water and wastewater design work by outside  
23          consultants; for the operating and capital  
24          improvements budget; as well as the day-to-day  
25          engineering input for all phases of city government.

1           As the West Region Engineer for Southern  
2 States Utilities since August 1994, I manage the  
3 engineering capital projects in a seven-county  
4 region containing 27 water and 15 wastewater  
5 systems. As such, I am responsible for preparing  
6 and managing capital budgets and schedules,  
7 overseeing consulting engineering firms and their  
8 designs, and continuing that project management  
9 through construction and start-up.

10       **Q.   WHAT ARE YOUR PROFESSIONAL AFFILIATIONS?**

11       A.   I am a member of the Water Environment Federation  
12       and the Florida Pollution Control Association.

13       **Q.   HAVE YOU EVER TESTIFIED BEFORE A REGULATORY AGENCY?**

14       A.   No, I have not.

15       **Q.   WHAT IS THE PURPOSE OF YOUR REBUTTAL TESTIMONY?**

16       A.   During customer service hearings, several customers  
17       expressed doubt that the majority of plant being  
18       placed into service by SSU was to fulfill safety or  
19       regulatory mandates. Sugarmill Woods Witnesses  
20       Bertram and Hansen also submitted pre-filed  
21       testimony raising similar questions. It appears  
22       from their testimony that the witnesses are  
23       assuming that "regulatory mandate" is synonymous  
24       with "environmental justification". Although a  
25       regulatory mandate may have an environmental

1 justification, it is not always the case. Attached  
2 as Exhibit \_\_\_\_\_ (WCG-1) is a schedule identifying  
3 the regulatory mandate projects placed into service  
4 for the service areas under my responsibility.  
5 This exhibit also identifies the reasons each  
6 project was performed and the safety or regulatory  
7 mandate for the project. The only specific projects  
8 which any outside witness have taken exception to  
9 are the potable water ground storage tank to be  
10 completed for the Sugarmill Woods service area, and  
11 the Sugarmill Woods wastewater treatment plant  
12 improvements.

13 Sugarmill Woods' witness Buddy L. Hansen has  
14 pre-filed testimony which, on the one hand suggests  
15 that there should be no margin reserve because  
16 SSU's investments are for growth (page 15, line 20)  
17 but on the other hand suggests that the ground  
18 storage tank should be a 1 MG tank instead of a .5  
19 MG tank because, (1) a 0.5 MG tank is "probably"  
20 inadequate to meet the County fire flow  
21 requirements (page 16, line 22), and (2) because of  
22 "economies of scale" (page 17, line 3). While SSU  
23 agrees that economies of scale would justify  
24 construction of the larger tank, present FPSC  
25 policies regarding "used and useful" percentages

1 discourage this practice. Although the April 1992  
2 Five Year Capital Requirements Plan indicated a 1.0  
3 MG tank to be designed and constructed in 1995 and  
4 1996, a hydraulic analysis performed as part of the  
5 master planning effort later that year recommended  
6 a 0.5 MG tank at the water treatment plant No. 2  
7 location. The construction was proposed for 1993-  
8 94 but was later delayed because the rate of growth  
9 in Sugarmill Woods (and thus the need for the  
10 project) had slowed. The regulatory mandate for  
11 this project is the Citrus County fire flow  
12 ordinance, which is based on the numbers of  
13 residences in the service area. Because the three  
14 wells placed in service in 1991 pump directly into  
15 the water distribution system, fire flow and peak  
16 demand flows were able to be met by the well pumps.  
17 The ability to meet these demands with existing  
18 facilities is the reason that SSU did not install  
19 those additional wells in 1993, 1995, and 1997 as  
20 referred to by Mr. Hansen at page 16, line 6 of his  
21 pre-filed testimony. As DEP witness Ms. Sandra  
22 Sequeira confirms at page 11, line 21 of her pre-  
23 filed testimony, the Sugarmill Woods treatment  
24 facilities and distribution system are sufficient  
25 to serve its present customers. The assumption is

1  
2  
3  
4  
5  
6  
7  
8  
9  
10  
11  
12  
13  
14  
15  
16  
17  
18  
19  
20  
21  
22  
23  
24  
25

that Ms. Sequeira's conclusion is based on meeting maximum day and peak hour demands (FDEP criteria only, without considering fireflows per se.)

Witness Hansen is nearly correct that strict adherence with the Citrus County fire flow ordinance (86-10) would dictate a tank size of approximately 600,000 gallons. Actually 700,000 gallons would be required by that ordinance. The closest standard size is 750,000 gallons. However, the Citrus County requirement is based on a storage volume equal to 50 percent of the sum of the 2500 gpm fire flow, coincident with a calculated peak hour demand of 2075 gpm for 5 hours. This requirement does not take into consideration the pumping capacities of the existing wells (3000 gpm firm capacity) which are also on line with the distribution system. Also, a fire flow duration of 5 hours may be reasonable for an urban or industrial area, but not for an almost exclusively residential area such as Sugarmill Woods. The high service pumping facilities are designed for the 2500 gpm fire flow demand (using the well pump capacities to provide coincident draft), but storage was designed to provide a more reasonable duration of two hours, minimum. The size of this

1 tank, however, was dictated more by the hydraulic  
2 analysis.

3 The reason for the tank project identified in  
4 the MFRs is regulatory mandate. As indicated in  
5 Exhibit \_\_\_\_ (WCG-1), SSU is required to construct  
6 the tank to meet the Citrus County fire flow  
7 regulations, and FDEP Rules 62-555.320(4) and (7).  
8 FDEP Rule 62-555.320(4) requires that all public  
9 water systems provide for a minimum chlorine  
10 contact time and maintain a chlorine residual  
11 throughout the system, while FDEP Rule 62-  
12 555.320(7) requires that high service pumping  
13 facilities be provided to maintain a minimum  
14 pressure of 20 psi at maximum hourly demand.  
15 Growth within the service area, without  
16 compensating increases in plant capacity, can cause  
17 capacity shortcomings, and the existence of those  
18 shortcomings would result in the potential for  
19 those water systems being out of compliance with  
20 the regulations, thus the justification as  
21 "regulatory mandate" is correct. If one considers  
22 that inadequate fire flow capacity may result, a  
23 justification of "safety" would also be valid.

24 In regard to the Sugarmill Woods wastewater  
25 treatment plant, the capacity of the treatment



1 plant is 0.5 MGD. Although the oxidation ditch  
2 portion of the treatment facilities could be rated  
3 at 0.7 MGD, the limiting process is the final  
4 clarifier. Its permitted capacity is 0.5 MGD,  
5 although there has been some discussion that the  
6 permitted capacity should be only 0.4 MGD. It was  
7 originally proposed to add a second clarifier,  
8 which would allow for a capacity change to the 0.7  
9 MGD as permitted. However, because the influent  
10 flows were only approximately 0.25 MGD at the time  
11 final design and permitting were completed, the  
12 second clarifier and resulting higher capacity were  
13 not required, and not constructed. Similarly, the  
14 expansion of the spray irrigation site was also not  
15 required at this time. The following components  
16 were constructed, for the following reasons:

- 17 1. Sludge digester modifications and lime  
18 stabilization - EPA 40 CFR Part 503  
19 regulations to meet Class "B" requirements for  
20 pathogen reduction and vector attraction  
21 reduction.
- 22 2. Pretreatment headworks modifications -  
23 Wastewater transmission system surges have  
24 resulted in raw sewage spills at this  
25 structure. FDEP Rule 62-600.740(2) prohibits

1           such spills.

2           3. Chlorine Contact Chamber - FDEP Rule  
3           62.600.440(4)(b) requires a minimum chlorine  
4           detention time of 15 minutes at peak hour  
5           flow. The former practice of injection at the  
6           effluent manhole, with detention in the  
7           effluent pipeline did not assure continuous  
8           compliance with this rule.

9           4. Auxiliary power - Although not specifically  
10          required by rule for this facility, letters  
11          from FDEP strongly suggested inclusion of  
12          standby power to insure continuous treatment  
13          to the required levels.

14          Witness Hansen questions SSU's attempts to be pro-  
15          active in terms of construction of facilities to be  
16          prepared for growth, and yet complains about SSU  
17          continuously being as close to 100% used and useful  
18          as possible.

19          Sugarmill Woods Witness Bertram has suggested  
20          that the reason for iron problems at many of SSU's  
21          water plants in Citrus County is that either the  
22          wells are too shallow, or not adequately sealed  
23          from the shallow, iron-bearing aquifer. While both  
24          of these conditions could cause iron (or other  
25          contamination) of wells, this is not necessarily

1 the case. Older wells were drilled to shallower  
2 depths, but even the more recently drilled, deeper  
3 wells in these areas have contained iron near, or  
4 above the MCL. In SSU's statewide experience, and  
5 through discussions with local well drillers and  
6 hydrologists, we have noted that a deeper well may  
7 yield somewhat lower iron levels, but may contain  
8 higher sulfides, or chlorides. Local well drillers  
9 have shared this experience. The subsurface  
10 geology varies considerably in the state, as does  
11 the depth to the Floridan Aquifer. These facts and  
12 the direct and indirect connections to surface  
13 waters dictate water quality. There are simply  
14 areas in the state that have poor groundwater  
15 quality. As a former employee of Hillsborough  
16 County, I would expect that Witness Bertram would  
17 be aware of that fact, since Hillsborough County is  
18 importing a great deal of their water from Pasco  
19 County due to the poor quality of local water  
20 sources.

21 **Q. HAS SSU PRESENTED COMMISSION STAFF, PUBLIC COUNSEL**  
22 **AND THE OTHER PARTIES WITH PLANT IN SERVICE**  
23 **INFORMATION AS OF DECEMBER 31, 1995?**

24 A. Yes. Exhibit \_\_\_\_\_ (WCG-2) provides a schedule  
25 identifying the actual plant placed in service by

1 SSU in 1995 in the service areas under my  
2 responsibility. Only five (5) of the twenty-one  
3 1995 projects show no in-service amounts -- of  
4 these, 2 were expensed, 2 were carried over to 1996  
5 and 1 was cancelled. The total cost of these five  
6 projects was only \$136,423 or only 4.4% of the  
7 total cost of \$3,083,518 projected in the MFRs.  
8 The remainder of the projected investments were in  
9 fact made in projects placed into service.

10 **Q. COULD YOU EXPLAIN WHY TWO PROJECTS WERE EXPENSED?**

11 A. Yes, the two Lead and Copper projects totaling  
12 \$3,946 were completed but expensed under SSU's  
13 expense/capitalization procedures. These two  
14 projects are part of the five 1995 projects showing  
15 no in-service amount referred to earlier.

16 **Q. CAN YOU EXPLAIN WHY ONE OF THE PROJECTS UNDER YOUR**  
17 **RESPONSIBILITY WAS CANCELLED?**

18 A. Yes, one project under my responsibility in the  
19 MFRs for \$2857 was cancelled because of an ability  
20 to reuse existing dual chlorine scales from another  
21 plant that was converted to hypochlorination. For  
22 project 95CW430 in SugarMill Woods, SSU reused the  
23 scales to save the Company and its customers money.  
24 In fact, equipment, including entire package  
25 plants, have been reused by SSU to save money.

1 Q. WERE THERE ANY PROJECTS COMPLETED IN 1995 UNDER  
2 YOUR RESPONSIBILITY WHICH WERE NOT PROJECTED TO BE  
3 COMPLETED IN THE MFR PROJECTIONS FOR 1995?

4 A. Yes. We completed and placed into service two  
5 projects which were not included in the MFRs but  
6 were placed into service in 1995. These projects  
7 are referred to as the Pine Ridge Booster Station  
8 (94CW036) and the State Road 19 Utility Relocations  
9 for Salt Springs (95CW733). The in service amounts  
10 for these two projects were \$166,803 and \$26,829,  
11 respectively. It is not unusual and in fact is to  
12 be expected that the necessity to complete projects  
13 not budgeted will arise during the course of the  
14 year as a result of inspections by environmental  
15 regulators, the imposition of new and unexpected  
16 permit conditions at permit renewal time, equipment  
17 failures or other similar circumstances. Due to  
18 the limitations on capital available to SSU, when  
19 projects like these arise, we typically review  
20 other projects under our responsibility to  
21 determine whether they can be cancelled or delayed  
22 so that we can remain within the capital budget.  
23 Of course, if projects are mandated by public  
24 health or environmental concerns there might be no  
25 room for compromise on such projects. SSU requests

1           that the actual cost of these projects be  
2           considered by the Commission as an offset to any  
3           reduction that the Commission would make to rate  
4           base so long as total revenue requirements are not  
5           increased.

6           **Q.    COULD YOU PLEASE IDENTIFY THE CURRENT STATUS OF THE**  
7           **PROJECT UNDER YOUR RESPONSIBILITY WHICH WAS**  
8           **INCLUDED IN THE MFRS FOR 1995 BUT NOT PLACED INTO**  
9           **SERVICE.**

10          A.    The one project identified in Exhibit \_\_\_\_\_ (WCG-2)  
11           which was under my responsibility and which was not  
12           placed into service in 1995 was the wastewater  
13           treatment plant improvements to the Point O'Woods  
14           facilities (94W062). These facilities were  
15           substantially complete on September 15, 1995, but  
16           were not placed in service until January 23, 1996.  
17           Booking of the project as "in service" was delayed  
18           solely due to delays in obtaining DEP clearance for  
19           use.

20          **Q.    DOES THAT CONCLUDE YOUR REBUTTAL TESTIMONY?**

21          A.    Yes, it does.

**SOUTHERN STATES UTILITIES, INC.**  
**PLANT ADDITIONS & REGULATORY REQUIREMENT(S)**  
 West Region

Year	Project	Description	Plant In Service Amount	Regulatory Mandate
<b>Apache Shores - Water</b>				
1995	95CO211	LG WATER METER RETROFIT	232.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	18.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	5.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	323.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	578.00	
<b>Citrus Park - Water</b>				
1994	93CW598	WATER METER ADDITION	1,530.00	17-555.320(8)
1995	95CO211	LG WATER METER RETROFIT	535.00	62-555.320(6)\*(8), SJRWMD 40C-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	41.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	13.00	62-555.320(6)\*(8), SJRWMD 40C-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	747.00	62-555.320(6)\*(8), SJRWMD 40C-2, 25-30.262,263,264
		Subtotal	2,866.00	

Year	Project	Description	Plant In Service Amount	Regulatory Mandate
------	---------	-------------	-------------------------	--------------------

Citrus Springs - Water				
1993	91CW388	PORTABLE GENERATORS	28,445.15	17-55.320(6),350(1)
1993	93CW507	CHLORINE BOOSTER PUMP	925.08	17-555.320(5)
1994	92CW477	CHLORINE ALARMS	745.16	FDEP Inspection letter 4/24/92, 17-555.320(5)
1995	95CO211	LG WATER METER RETROFIT	2,735.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	209.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	64.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1996	95CWzzz	0.5 GST/HIGH SERV PUMP	715,903.00	62-555.320(7), 350(1)
1996	96RO057	LARGE METER RETROFIT	3,822.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	752,848.39	
Citrus Springs - Wastewater				
1993	91CW341	MONITORING WELL PUMP	202.50	17-160.300(1)
1994	93CW665	WWTP UPGRADE	127,634.42	17-600.410, 600.440, 640.600
		Subtotal	127,836.92	
Crystal River Highlands - Water				
1995	93CW247	WTP IMPROVEMENT	64,346.09	17-550,17-555.315, 350
1995	95CO211	LG WATER METER RETROFIT	113.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	9.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	3.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	157.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	64,628.09	
Gibsonia Estates - Water				
1995	92CW010	AUXILIARY POWER	37,210.30	62-555.320(6)
1995	95CO211	LG WATER METER RETROFIT	248.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	19.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	6.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	347.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	37,830.30	



Year	Project	Description	Plant In Service Amount	Regulatory Mandate
------	---------	-------------	-------------------------	--------------------

Golden Terrace - Water				
1994	92CW565	INTERCONNECT WITH CITY OF INVERNESS	84,447.35	17-550.320, 350, C.O. 92-2012
1995	95CO211	LG WATER METER RETROFIT	162.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	12.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	4.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	226.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	84,851.35	
Gospel Island Estates - Water				
1995	95CO211	LG WATER METER RETROFIT	12.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	1.00	62-555.320(5)a
1996	96RO057	LARGE METER RETROFIT	17.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	30.00	
Herabel Heights - Water				
1995	95CO211	LG WATER METER RETROFIT	486.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	37.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	11.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	679.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	1,213.00	
Lake Gibson - Water				
1994	92CW326	WTP FENCE	1,498.39	17-555.310,315
1995	95CO211	LG WATER METER RETROFIT	1,178.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	90.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	28.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	1,646.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	4,440.39	
Lake Gibson - Wastewater				
1993	91CW002	WWTP EXPANSION/IMPROVEMENTS/PH METERS	497,666.62	17-600.405, 410
1994	91CW367	FLOW METER	3,478.12	17-601.300
		Subtotal	501,144.74	

EXHIBIT \_\_\_\_\_  
 PAGE 3 OF 12  
 (Calc-1)

Year	Project	Description	Plant In Service Amount	Regulatory Mandate
------	---------	-------------	-------------------------	--------------------

Lakeside - Water				
1995	95CO211	LG WATER METER RETROFIT	133.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	10.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	3.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	185.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	331.00	
Marion Oaks - Water				
1994	92CW109	LAB EQUIPMENT	3,215.30	17-550.500,550
1995	95CO211	LG WATER METER RETROFIT	3,831.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	293.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	90.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	5,353.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	12,782.30	
Marion Oaks - Wastewater				
1995	93CW256	WWTP EXPANSION	559,609.25	62-600.405, 740, 610.510, C.O. 93-4503
1995	95CW388	RETURN SLUDGE PUMP	3,571.50	62-600.410(1),\*(8)
1996	96RO049	REPLACE ELECTRIC BOX (5)	17,850.00	62-604.130, 400, 500
		Subtotal	581,030.75	

Year	Project	Description	Plant In Service Amount	Regulatory Mandate
------	---------	-------------	-------------------------	--------------------

Oak Forest - Water				
1995	95CO211	LG WATER METER RETROFIT	218.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	17.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	5.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	304.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	544.00	
Orange Hill /Sugar Creek - Water				
1995	95CO211	LG WATER METER RETROFIT	354.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	27.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	8.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	494.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	883.00	
Palm Terrace - Water				
1995	95CW715	LEAD AND COPPER CONTROL	1,973.25	62-551.500
1995	95CO211	LG WATER METER RETROFIT	1,807.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	138.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	42.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	2,525.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	6,485.25	
Palm Terrace - Wastewater				
1995	94CW516	MONITORING WELLS	2,170.84	62-522.800, 62-810.424
		Subtotal	2,170.84	
Pine Ridge - Water				
1993	89CW087	WELL #4	262,071.16	17-555.315, 320, 350
1995	95CO211	LG WATER METER RETROFIT	1,013.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	77.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	24.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	1,416.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	264,601.16	

Year	Project	Description	Plant In Service Amount	Regulatory Mandate
------	---------	-------------	-------------------------	--------------------

Point O' Woods - Water				
1994	91CW365	WTP IRON FILTERS	456,005.11	17-550.320 & C.O. 82-1613
1995	95CW718	LEAD AND COPPER CONTROL	1,973.25	62-551.500
1995	95CO211	LG WATER METER RETROFIT	524.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	40.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	12.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	732.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	459,286.36	
Point O' Woods - Wastewater				
1994	93CW525	LIFT STATION CONTROL PANEL	6,957.39	17-604.130, 400, 500
1995	94CW062	WWTP IMPROVEMENTS	103,310.30	62-610.462, 464
		Subtotal	110,267.69	
Rosemont/Rolling Green - Water				
1993	89CW018	CONSTRUCT PLANT	23,091.10	Citrus Co. Ord. 88-10, 17-555.315, 320, 350(11)
1994	94CW367	CHLORINE BOOSTER PUMP	698.87	17-555.320(4)(5)
1995	95CO211	LG WATER METER RETROFIT	183.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	14.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	4.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	256.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	24,246.97	
Samira Villas - Water				
1995	95CO211	LG WATER METER RETROFIT	3.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	4.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	7.00	
Seaboard - Water				
1994	94CW219	WTP TANK	52,616.52	17-555.350(11)
1995	95CO211	LG WATER METER RETROFIT	3,921.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	300.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	92.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	5,479.00	62-555.320(6)^(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	62,408.52	

Year	Project	Description	Plant In Service Amount	Regulatory Mandate
------	---------	-------------	-------------------------	--------------------

Seaboard - Wastewater				
1992	91CW248	WELLS	2,749.60	17-522, 17-610.424
1993	92CW198	LIFT STATION 4 & 5 UPGRADE	44,916.42	17-604.130, 400, 500
1993	93CW366	FORCE MAIN RELOCATION	11,682.93	FS 337.403
1994	90CW042	WWTP IMPROVEMENTS	1,684,112.43	Hillsborough Co. C.O. EPC5552DW, 17-302, 410, 600.410(7)
1994	93CW439	REBUILD SPRAY FIELD FLOW METER	858.70	17-601.300, 610.320, NPDES Permit F0041220
1994	93CW366	FORCE MAIN RELOCATION	630.35	FS 337.403
		Subtotal	1,744,950.43	
South Forty - Wastewater				
1992	N/A	SERVICE INSTALLATIONS	597.00	17-800
1993	92CW360	PUMP REBUILD	927.82	17-604.130, 400, 500
1993	92CW456	REBUILD MOTOR - LIFT STATION	858.20	17-604.130, 400, 500
1993	92CW413	15HP MOTOR & STARTER	802.55	17-600.410(8)
1994	94CW418	POND IMPROVEMENTS	2,043.30	17-610.415, DO42-174196
1994	92CW402	REBUILD BLOWER & SILENCER	1,128.94	17-600.410(6)
1995	94CW502	HOLDING POND LINING	33,219.84	17-610.415, DO42-174196
1995	95CW415	CHAIN LINK FENCE	2,976.25	62-610.418
		Subtotal	42,553.90	
Spring Gardens - Water				
1995	95CO211	LG WATER METER RETROFIT	186.00	62-555.320(6)1*(8), SWFWMD 40D-2, 25-30.262, 263, 264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	14.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	4.00	62-555.320(6)1*(8), SWFWMD 40D-2, 25-30.262, 263, 264
1996	96RO057	LARGE METER RETROFIT	260.00	62-555.320(6)1*(8), SWFWMD 40D-2, 25-30.262, 263, 264
		Subtotal	464.00	

Year	Project	Description	Plant In Service Amount	Regulatory Mandate
------	---------	-------------	-------------------------	--------------------

Spring Hill - Water				
1993	93CW506	FLOW METERS FOR WELL # 26, # 27, # 28	17,863.98	SWFWMD 40D-2
1993	93ZZ777	WATER SERVICES	4,734.64	SWFWMD 40D-2
1994	94CW064	US 19 FDOT UTILITY RELOCATIONS	77,930.26	17-500 & 600, FS 337.403
1994	92CW389	REBUILD 3 ONAN GENERATORS	6,132.34	17-555.320(6)
1994	91CW490	PUMP & WELL REBUILD #6	6,062.59	FDEP inspection letter 10/8/93, 17-555.320, 350(1)
1994	93CW594	CHLORINE ALARMS	4,416.19	17-555.320(5)
1994	90CW123	CHLORINE ALARM SYSTEM	3,582.73	17-555.320(5)
1994	92CW230	CHLORINATOR TANK UNITS	2,358.85	17-555.320(5)
1994	92CW313	OVERHAUL MOTOR WELL #20	1,710.76	FDEP inspection letter 10/8/93, 17-555.320, 350(1)
1994	92CW324	REBUILD MOTOR - WELL # 19	1,426.88	FDEP inspection letter 10/8/93, 17-555.320, 350(1)
1994	94CW374	FLOW TOTALIZER METER	1,383.70	SWFWMD 40D-2
1994	92CW508	REBUILD WELL MOTOR #11	1,196.01	17-555.320, 350(1)
1994	93CW506	FLOW METERS FOR WELLS #26, 27 & 28	957.48	FDEP inspection letter 10/8/93, 17-555.320(8), SWFWMD 40D-2
1994	94CW353	BACKFLOW TEST KIT	742.59	17-555.360
1995	94CW464	DRIVE WIDENING	42,651.50	FS 337.403
1995	95CO211	LG WATER METER RETROFIT	37,094.00	62-555.320(8)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	2,835.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	871.00	62-555.320(8)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1996	95CWttt	1.0 MG GST/HIGH SERV PUMP	1,011,153.00	62-555.320, 350(1)
1996	95CWvvv	WELLS #30 & 31	587,356.00	62-555.320, 350(1)
1996	96RO057	LARGE METER RETROFIT	51,834.00	62-555.320(8)\*(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	1,864,293.50	

Year	Project	Description	Plant In Service Amount	Regulatory Mandate
------	---------	-------------	-------------------------	--------------------

Spring Hill - Wastewater				
1993	91CW084	WALLS AND PIPING PROJECT AT WWTP	252,071.98	17-800.410
1993	92CW259	LIFT STATION PUMP	7,845.26	17-604.130, 400, 500
1993	92CW223	LIFT STATION 25-F REHABILITATION	4,853.87	17-604.130, 400, 500
1993	93CW479	FLOW METER	3,843.93	17-801.300
1993	92CW355	REBUILD PUMP & MOTOR L/S 25-1	719.29	17-604.130, 400, 500
1993	93CW430	5 HP SUBMERSIBLE PUMP	570.00	17-800.440
1994	92CW222	WWTP EFFLUENT DISPOSAL IMPROVEMENT	877,422.42	17-810.423
1994	94CW064	US 19 FDOT UTILITY RELOCATIONS	107,617.98	17-500 & 600, 1*FS 337.403
1994	92CW468	PH CL2 ANALYZERS/COMPOSITE SAMPLER	6,303.54	17-600.440, 445, 801.500
1994	92CW330	OVERHAUL AERATOR AT STP	6,197.02	17-800.410
1994	89CW099	1 MG STORAGE TANK - UNIT 13	3,672.27	17-800, 810
1994	92CW509	REBUILD 2 EMU SUBMERSIBLE PUMPS	2,161.39	17-604.130, 400, 500
1994	94CW343	ODOR CONTROL - BLACK HAWK TIGGER	2,038.64	17-600.410(8)
1994	92CW401	REBUILD 30 HP AERATOR MOTOR	2,015.01	17-800.410
1994	91CW491	REBUILD PUMP & MOTOR FOR L/S #25	876.37	17-804.130, 400, 500
1995	94CW479	LIME STABILIZATION	850,073.03	40CFR503
1996	94CW476	CLASS I MODIFICATIONS	2,759,150.11	62-600.405, 610.482
1996	95CW720	REUSE TO TIMBER PINES	1,369,427.26	62-610.423, 462
		Subtotal	6,256,859.37	

Year	Project	Description	Plant In Service Amount	Regulatory Mandate
------	---------	-------------	-------------------------	--------------------

Sugar Mill Woods - Water				
1994	90CW368	PLANT EXPANSION	27,062.28	17-555.320, 350(1)
1994	94CW325	FLOW RECORDERS & RATE INDICATORS WTP 1 & 3	5,297.80	17-555.320(8)
1994	90CW215	GAS CHLORINATORS (3)	3,397.60	17-555.320(5)
1994	92CW457	CL2 ALARMS	2,033.74	17-555.320(5)
1995	95CO211	LG WATER METER RETROFIT	3,422.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	262.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	80.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
1996	95CWeee	0.5 MG GST/HIGH SERV PUMP	715,903.00	62-555.320(7), 350(1)
1996	96RO057	LARGE METER RETROFIT	4,782.00	62-555.320(6)\*(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	762,240.42	
Sugar Mill Woods - Wastewater				
1993	92CW098	MONITORING WELL PUMPS	3,626.54	17-522, 610.424
1995	93CW255	WWTP IMPROVEMENTS	875,037.53	17-600.405
		Subtotal	878,664.07	
Sunny Hills - Water				
1993	93CW410	EMERGENCY GENERATOR & GST FOR WELL #4	99,378.26	17-555.320(6) & 350(1)
1993	92CW304	HYDRO TANK WELL #1	15,462.12	17-555.350(1)
1993	92CW540	CHLORINE ALARMS	1,644.54	17-555.320(5)
1994	93CW410	EMERGENCY GENERATOR & GST FOR WELL #4	24,118.20	17-555.320(6) & 350(1)
1994	91CW242	CHLORINATION SYSTEM	6,490.12	17-555.320(5)
1995	95CO211	LG WATER METER RETROFIT	649.00	62-555.320(6)\*(8), NFWWMD 40A-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	50.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	15.00	62-555.320(6)\*(8), NFWWMD 40A-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	907.00	62-555.320(6)\*(8), NFWWMD 40A-2, 25-30.262,263,264
		Subtotal	148,714.24	



Year	Project	Description	Plant In Service Amount	Regulatory Mandate
------	---------	-------------	-------------------------	--------------------

<b>Sunny Hills - Wastewater</b>				
1994	89CW063	INSTALL IRRIGATION EFFLUENT PUMP	1,200.60	17-810.320
		Subtotal	1,200.60	
<b>Valrico Hills - Water</b>				
1993	91CW398	STORAGE TANK & GENERATOR	52,432.35	17-555.320(8) & 350(1)
1994	92CW645	MAIN WELL PUMP REBUILD	681.42	17-555.320, 350
1995	95CO211	LG WATER METER RETROFIT	539.00	62-555.320(6)*(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	41.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	13.00	62-555.320(6)*(8), SWFWMD 40D-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	754.00	62-555.320(6)*(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	54,460.77	
<b>Valrico Hills - Wastewater</b>				
1994	90CW433	WWTP GROUNDWATER	21,610.26	17-522.600, 610.424
1994	92CW293	CHLORINE BUILDING	1,531.93	17-800.440
		Subtotal	23,142.19	
<b>Zephyr Shores - Water</b>				
1994	91CW359	CHLORINE ALARMS	1,076.62	17-555.320(5)
1994	91CW346	CHLORINATOR IMPROVEMENTS	1,040.50	17-555.320(5)
1995	95CO211	LG WATER METER RETROFIT	738.00	62-555.320(6)*(8), SWFWMD 40D-2, 25-30.262,263,264
1995	95CC331	CHLORINATR/BSTR PMP/EJETR	56.00	62-555.320(5)a
1995	95CO101	METER TEST/INSTALL EQUIP	17.00	62-555.320(6)*(8), SWFWMD 40D-2, 25-30.262,263,264
1996	96RO057	LARGE METER RETROFIT	1,031.00	62-555.320(6)*(8), SWFWMD 40D-2, 25-30.262,263,264
		Subtotal	3,959.12	
		TOTAL	\$14,884,814.63	

F:\Engineer\SBUDW\docs\153-W.doc (Rev.3/19/96)

Year	Project	Description	Plant In Service Amount	Regulatory Mandate
------	---------	-------------	-------------------------	--------------------

- C.O. - Consent Order
- Char. Co. Agmt. - Charlotte County Agreement
- DO - Domestic Operating
- DT - Domestic Temporary
- FS - Florida Statutes
- NNC - Notice of Non-Compliance
- NWWMD - Northwest Florida Water Management District
- OGC - Office of General Counsel
- SFWMD - South Florida Water Management District
- SJRWMD - St. Johns River Water Management District
- SWFWMD - Southwest Florida Water Management District
- TOP - Temporary Domestic Operating
- WL - Warning Letter

**Southern States Utilities, Inc. - West Region**  
**1995 Filed and Actual FPSC Plant in Service Additions (w/o General Plant)**  
**As of December 31, 1995**

Project #	Project Description	In-Service Date		In-Service Amount	
		Filed	Actual	Filed	Actual
<b>CRYSTAL RIVER</b>					
93CW247	WTP IMPROVEMENT	09/13/95	12/05/95	64,346	46,584 (b)
	Total Crystal River - Water			64,346	46,584
<b>MARION OAKS</b>					
95CW389	HYDRANTS	10/31/95	11/28/95	19,643	4,399
	Total Water			19,643	4,399
93CW256	WWTP EXPANSION	07/19/95	07/24/95	559,609	524,942
95CW388	RETURN SLUDGE PUMP	03/31/95	02/08/95	3,572	2,115
	Total Wastewater			563,181	527,057
	Total Marion Oaks			587,024	531,456
<b>OAK FOREST</b>					
93CW662	WTP UPGRADE	08/03/95	07/27/95	125,591	143,379
	Total Oak Forest - Water			125,591	143,379
<b>PALM TERRACE</b>					
95CW715	LEAD AND COPPER CONTROL	Expensed		1,973	0 (a)
	Total Water			1,973	0
95CW401	LIFT STATION CNTRL PANEL	05/01/95	12/01/95	3,929	3,660
94CW516	MONITORING WELLS	02/28/95	12/29/94	2,171	2,120
	Total Wastewater			6,099	5,780
	Total Palm Terrace			8,073	5,780
<b>PINE RIDGE</b>					
95CW404	FIRE HYDRANTS	12/31/95	11/28/95	21,429	19,617
	Total Pine Ridge - Water			21,429	19,617
<b>POINT O' WOODS</b>					
95CW718	LEAD AND COPPER CONTROL	Expensed		1,973	0 (a)
	Total Water			1,973	0
94CW062	WWTP IMPROVEMENTS	07/19/95		103,310	0
	Total Wastewater			103,310	0
	Total Point O' Woods			105,284	0
<b>SOUTH FORTY</b>					
94CW502	HOLDING POND LINING	04/10/95	04/29/95	33,220	13,342
95CW415	CHAIN LINK FENCE	03/31/95	08/23/95	2,976	2,333
	Total South Forty - Wastewater			36,196	15,675
<b>SUGAR MILL WOODS</b>					
95CW430	DUAL 150# CL2 SCALES(2)	Cancelled		2,857	0
	Total Water			2,857	0
93CW255	WWTP IMPROVEMENTS	09/14/95	12/05/95	875,038	846,717 (b)
	Total Wastewater			875,038	846,717
	Total Sugar Mill Woods			877,895	846,717
<b>SUNNY HILLS</b>					
95CW432	UPGRADE LIFT STATION #4A	04/30/95	12/18/95	40,178	30,773
	Total Sunny Hills - Wastewater			40,178	30,773

- (a) Completed and expensed rather than capitalized.  
(b) Reflects completion of a phase, but not entire project.  
(c) Not required because gov't authority did not perform it's project.  
(d) Refers to Refundable Advance, with zero rate base impact.

**Southern States Utilities, Inc. - West Region**  
**1995 Filed and Actual FPSC Plant in Service Additions (w/o General Plant)**  
**As of December 31, 1995**

Project #	Project Description	In-Service Date		In-Service Amount	
		Filed	Actual	Filed	Actual
<b>WEST REGION PLANT</b>					
95CW726	LINE EXTENSIONS - WATER	12/15/95	12/29/95	894,540	433,479
95CW220	NEW METERS/CHANGE OUT PRG	12/31/95	12/29/95	178,575	151,332
95CW219	WATER SERVICES	12/31/95	12/29/95	154,765	53,261
	Total Water			<u>1,227,880</u>	<u>638,071</u>
95CW725	LINE EXTENSIONS - SEWER	12/15/95	12/29/95	26,310	0
	Total Wastewater			<u>26,310</u>	<u>0</u>
	Total West Region			<u>1,254,190</u>	<u>638,071</u>
<b>ZEPHYR SHORES</b>					
93CW663	WWTP SITE IMPROVEMENTS	03/20/95		19,893	5,632 (b)
	Total Zephyr Shores - Wastewater			<u>19,893</u>	<u>5,632</u>
Total 1995 Plant In-Service Additions - As Filed in MFR's				3,135,897	2,283,684
Less: Non-FPSC Plants Project Allocation Adjustments				<u>(52,379)</u>	
Total Per MFR's				<u>3,083,518</u>	

- (a) Completed and expensed rather than capitalized.  
(b) Reflects completion of a phase, but not entire project.  
(c) Not required because gov't authority did not perform it's project.  
(d) Refers to Refundable Advance, with zero rate base impact.