



April 1, 2009

Ann Cole, Commission Clerk
Florida Public Service Commission
2540 Shumard Oak Boulevard
Tallahassee, Florida 32399-0850

Dear Ms Cole:

In accordance with Section 186.801, Florida Statutes, Seminole Electric Cooperative, Inc. hereby submits our 2009 Ten Year Site Plan.

Please do not hesitate to call me if you have any questions or comments.

Sincerely,

A handwritten signature in black ink that reads "Trudy S. Novak". The signature is written in a cursive style with a long, sweeping underline.

Trudy S. Novak
Vice-President, Bulk Power and Generation Planning

Enclosure

cc: T. Woodbury



Ten Year Site Plan
2009 - 2018
(Detail as of December 31, 2008)
April 1, 2009

Submitted To:
State of Florida
Public Service Commission

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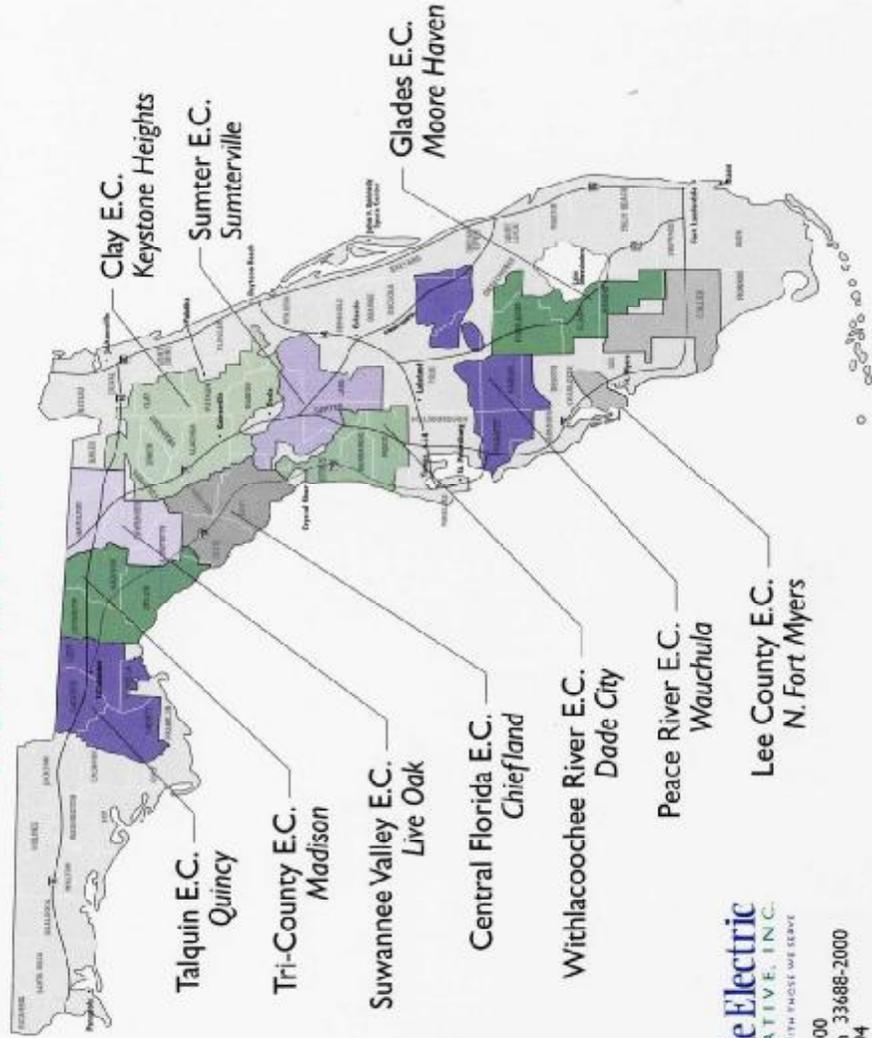
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Seminole's Member Distribution Cooperatives

FLORIDA



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1. DESCRIPTION OF EXISTING FACILITIES

1.1 Overview

Seminole Electric Cooperative, Inc. (Seminole) is a corporation organized and existing under the laws of the State of Florida for the purpose of providing reliable electric power at the lowest feasible cost to its ten distribution Members' systems. Seminole generates, transmits, purchases, and sells electric power and energy to its Member Cooperatives (Members), which are listed below:

- Central Florida Electric Cooperative, Inc.
Chiefland, Florida
- Clay Electric Cooperative, Inc.
Keystone Heights, Florida
- Glades Electric Cooperative, Inc.
Moore Haven, Florida
- Lee County Electric Cooperative, Inc.
North Fort Myers, Florida
- Peace River Electric Cooperative, Inc.
Wauchula, Florida
- Sumter Electric Cooperative, Inc.
Sumterville, Florida
- Suwannee Valley Electric Cooperative, Inc.
Live Oak, Florida
- Talquin Electric Cooperative, Inc.
Quincy, Florida
- Tri-County Electric Cooperative, Inc.
Madison, Florida
- Withlacoochee River Electric Cooperative, Inc.
Dade City, Florida

Each of Seminole's Members is engaged primarily in the distribution of retail electric power. Seminole supplies full requirements power to each of its Members under the terms of a long-term wholesale power contract. The map at the beginning of this section indicates the counties in which each Member of Seminole provides service.

1.2 Owned Resources

1.2.1 Owned Generation

Seminole serves its aggregate Member loads with a combination of owned and purchased power resources. Seminole Generating Station (SGS) Units 1 & 2, 650 MW class coal-fired units located in Putnam County, began commercial operation in February 1984 and December 1984, respectively. Midulla Generating Station (MGS) Units 1 – 3 comprise a 500 MW class gas-fired combined cycle plant located in Hardee County, which began commercial operation in January 2002. Also at the MGS site are Units 4 – 8 which comprise a 300 MW class peaking plant which began commercial operation in December 2006. Seminole also owns a 15 MW share of the Progress Energy Florida (PEF) Crystal River 3 nuclear generating unit. Seminole's owned generating facilities are shown in Schedule 1.1.

1.2.2 Transmission

Seminole serves its Members' load primarily in three transmission areas: 6% directly through its own system (Seminole Direct Serve, or SDS), 60% through the PEF system, and 34% through the Florida Power & Light (FPL) system. Seminole's owned transmission facilities consist of 278 circuit miles of 230 kV and 140 circuit miles of 69 kV lines. Seminole's owned generating facilities are interconnected to the grid at seventeen 230 kV transmission interconnections with the following utilities: FPL, JEA, City of Ocala, PEF, Hardee Power Partners, and Tampa Electric Company.

Seminole's interconnections, all of which are at 230 kV, are shown in Schedule 1.2. Seminole contracts with FPL and PEF for firm network transmission service for its Member loads which connect to their respective transmission areas.

1.3 Purchased Power Resources

1.3.1 Purchases from Central Station Generating Resources

Seminole's capacity portfolio currently includes power under firm purchased power agreements with the following electric utilities and independent power producers (all ratings are for winter unless otherwise noted):

- Progress Energy Florida
 - PEF Intermediate Blocks – 450 MW of firm system intermediate capacity through 2013, with certain early termination options, and 150 MW from January 2014 through December 2020.
 - PEF Base – Between 150-225 MW of firm system base capacity through December 2009 (capacity output varies by month); 150 MW from January 2012 to December 2013; and 250 MW from January 2014 through May 2016.
 - PEF Winter Seasonal Peaking – 600 MW of firm winter seasonal system peaking capacity from January 2014 through December 2020.
 - PEF System Average – 150 MW of firm system average capacity from January 2014 through May 2016.
 - PEF Partial Requirements (PR) – Load following requirements service for Seminole's Member load in the PEF area in excess of Seminole's designated committed capacity. This arrangement provides Seminole some flexibility to

modify the amount purchased in future years by modifying its committed capacity. PR service is primarily a peaking-type resource, with quantities varying by month based upon Seminole's committed capacity designations and actual monthly coincident demands. Seminole's actual purchased PR capacity for 2008 was 715 MW winter and 350 MW summer.

- PEF Virtual Delivery Point – Additional 150 MW of system average requirements-type load following service beginning January 2010 and increasing and/or decreasing to track Seminole Member load in the FPL area through July 2020.
- City of Gainesville - Full requirements service for a specified delivery point (approximately 19 MW peak demand in 2008) with certain notice provisions for termination beyond 2012.
- Reliant Energy Florida, LLC - 364 MW firm peaking capacity through December 2009, increasing to 546 MW from December 2009 through May 2014, from Reliant's Osceola combustion turbine units in Osceola County..
- Oleander Power Project, L.P. (a subsidiary of Southern Power Company) - 546 MW firm peaking capacity, thru December 2015, from three combustion turbine units in Brevard County.
- Calpine Construction Finance Company, L.P. - 360 MW of firm intermediate capacity, through May 2014, from Calpine's gas-fired Osprey combined cycle plant in Polk County.
- Hardee Power Partners, Limited (a subsidiary of Invenergy LLC) - 356 MW first call

reserve capacity from the Hardee Power Station (HPS) in Hardee County to cover forced and scheduled outages of Seminole's base load generation. After the current contract ends in December 2012, a new agreement commences for the full 445 MW capacity output of HPS that extends through December 2027.

- FPL Peaking – Between 50-75 MW of firm system peaking capacity through December 2009 (capacity output varies by month).
- FPL Intermediate – 200 MW of firm system intermediate capacity from June 2014 to May 2021.

1.3.2 Renewable Energy Purchases

Seminole is among the leaders in Florida with the amount of capacity purchased from renewable energy facilities. Seminole currently has 95 MW of renewable capacity under contract from the following sources:

- Lee County Resource Recovery - 55 MW of firm waste-to-energy capacity through December 2028.
- Telogia Power, LLC – 12.5 MW of firm capacity, through November 2023, from a biomass (wood and paper waste) facility located in Liberty County.
- Bio-Energy Partners – 7 MW of firm capacity, through December 2009, from a landfill gas-to-energy facility located in Broward County.
- Landfill Energy Systems – 15 MW (total) of firm capacity from new waste-to-energy facilities in Seminole and Brevard Counties. These contracts extend through March 2018.
- Timberline Energy LLC – 1.6 MW of firm capacity from a new landfill gas-to-energy facility in Hernando County, Florida. The contract extends through March 2020. Seminole

has a second contract with Timberline Energy to purchase 3.2 MW of firm capacity from a new landfill gas-to-energy facility currently under construction in Sarasota County. Capacity purchases begin in December 2009 and extend through March 2021.

**Schedule 1.1
Existing Generating Facilities as of December 31, 2008**

Plant	Unit No.	Location	Unit Type	Fuel		Fuel Transportation		Alt Fuel Days Use	Com In-Svc Date (Mo/Yr)	Expected Retirement (Mo/Yr)	Gen. Max Nameplate (MW)	Net Capability (MW)	
				Pri	Alt	Pri	Alt					Summer	Winter
SGS	1	Palatka	ST	BIT/PC	N/A	RR	N/A	N/A	02/84	Unk	715	658	665
SGS	2	Palatka	ST	BIT/PC	N/A	RR	N/A	N/A	12/84	Unk	715	658	665
MGS	1-3	Hardee County	CC	NG	DFO	PL	TK	N/A	01/02	Unk	587	488	567
MGS	4-8	Hardee County	CT	NG	DFO	PL	TK	N/A	12/06	Unk	312	270	280
Crystal River	3	Citrus County	ST	NUC	N/A	TK	N/A	N/A	03/77	Unk	890	15	15
Abbreviations:	<u>Unit Type</u> Unk – Unknown N/A – Not applicable ST - Steam Turbine, including nuclear CC - Combined Cycle CT – Combustion Turbine			<u>Fuel Type</u> BIT - Bituminous Coal NG - Natural Gas NUC – Nuclear PC – Petroleum Coke DFO - No. 2 Diesel Fuel Oil				<u>Fuel Transportation</u> PL – Pipeline RR – Railroad TK – Truck					
Note:	The nameplate capacity for Crystal River Unit 3 is the total unit capability. The net capability is Seminole's share.												

Schedule 1.2 Transmission Grid Interconnections with Other Utilities		
Interconnection	Voltage (kV)	Location
FPL	230	Rice
FPL	230	Rice
FPL	230	SGS
FPL	230	SGS
PEF	230	Martin West Tie Point
PEF	230	Silver Springs Tie Point
PEF	230	Silver Springs
PEF	230	Dearmin Tie Point
JEA	230	Jax Heights Tie Point
City of Ocala	230	Silver Springs North
City of Ocala	230	Silver Springs North
FPL	230	Charlotte
PEF	230	Vandolah
PEF	230	Vandolah
TECO	230	Hardee Sub
Hardee Power Partners	230	Hardee Sub
Hardee Power Partners	230	Hardee Sub

Note: This table describes physical facility interconnections, which do not necessarily constitute contractual interconnections for purposes of transmission service or interconnections between control areas.

1.4 Demand Side Management (DSM) and Energy Conservation

As a generation and transmission rural electric cooperative that does not serve retail end-use customers, Seminole cannot offer conservation or DSM programs directly to retail consumers. However, Seminole promotes Member involvement in DSM through its wholesale rate signals and via two specific demand management programs: (1) a Coordinated Load Management Program; and (2) a Load Management Generation Program. In 2008, Seminole and its ten Members engaged in a joint initiative to expand demand-side resources. The primary elements of this initiative include an expansion of consumer education relating to energy efficiency and a joint assessment of the feasibility and effectiveness of specific demand-side management, energy efficiency, and energy conservation programs.

1.4.1 Seminole's Member Programs

The demand-side management programs offered by Seminole's Members include residential load control, load management generation, distribution system voltage reduction, and alternative rate options for interruptible, time of use, and curtailable service. These programs provide an aggregate demand management capability of approximately 235 MW.

All Members promote energy conservation and energy efficiency. Most Members offer in-home energy audits at no cost, and all members distribute compact florescent light bulbs at no cost. Member web sites are focused on educating consumers on the benefits of energy conservation and energy efficiency. Most web sites offer energy saving tips, offer on-site energy audits, provide tools for consumers to perform on-line energy audits, and provide links to Touchstone Energy's Home Energy Library. In October 2007, one member began offering consumer rebates for energy efficiency improvements including ceiling insulation, HVAC efficiency upgrades, and solar hot

water systems. As a part of Seminole's small photovoltaic interconnection program, Seminole's Members now have over fifty such systems connected to their distribution systems. Under Seminole's net metering program, many of these systems have been converted over to the net metering format. Finally, over the past 15 years, Seminole's Members have significantly reduced their energy purchases from Seminole by lowering their distribution system line losses. In aggregate, annual distribution line losses have decreased approximately 3%. This translates to a reduction in Seminole's total system energy requirements by over 400,000 MWh.

1.4.2 Seminole's DSM Programs

Seminole's Load Management Generator Program allows its Members to partner with their retail customers to install "behind the meter" customer-based distributed generation (DG) to operate as dispatchable load management resources for Seminole's system, while providing on-site backup generation to improve customer reliability. The demand management benefits to Seminole due to the Members' participation are included under Members' Programs above.

Under Seminole's Coordinated Load Management Program, Seminole coordinates the Members' residential load control and load management generator programs which reduce Seminole's peak demand. Seminole's load and energy forecast takes into account reductions due to the residential load control program and the load management generator programs.

1.4.3 Conservation

Seminole's Members have implemented a range of energy efficiency and energy conservation programs which have reduced Seminole's total requirements for electric energy. Except as described specifically below, these reductions have not been specifically quantified or estimated but are included in Seminole's load history. As such, Seminole's load forecast effectively extrapolates the

growth of past programs into the future.

The current load forecast has been adjusted to estimate the expected impact of two expected influences on consumer energy use: (1) an estimate of the effects of the 2005 Energy Policy Act, and (2) Seminole's strategic initiative to mitigate growth in annual residential energy usage per consumer by 2011.

An evaluation of the 2005 Energy Policy Act revealed that two areas of improved efficiency standards, central air conditioning and heat pump heating, would have the most significant impact on future energy sales of Seminole's members.

In an effort to coordinate and further promote energy conservation, Seminole and its Members formed an energy efficiency working group in 2008. This group will share information on successful energy efficiency programs and jointly assess feasibility and effectiveness of specific programs.

Finally, the members routinely evaluate the economic feasibility of maintaining their current programs into the future. During each load forecast study Seminole evaluates the member's load management programs for anticipated future changes. None of Seminole's members have announced plans to expand their load management programs at this time although several are evaluating the feasibility of expansion. As a result, Seminole has not projected any further growth in the load management program over the forecast period.

2. FORECAST OF ELECTRIC DEMAND AND ENERGY CONSUMPTION

2.1 Consumer Base and Related Trends

2.1.1 Service Area Economy

Seminole's Member systems provide electricity to Member consumers in 46 of Florida's 67 counties. The area served is bounded on the west and north by the Apalachicola River and the Georgia border respectively, extending down to the southwestern and south-central regions of Florida. The service territory encompasses a variety of geographic and weather conditions as well as a diverse mix of economic activity and demographic characteristics.

2.1.2 Population and Consumers

Population growth in Florida (including Seminole Members' service areas) is significantly influenced by migration from northern states. Therefore, national economic factors influencing migration have a large impact on population growth in areas served by Seminole's Members. Historically, Seminole's residential consumer growth rate has exceeded the rate of growth for Florida as a whole. For the 1998-2007 period, Seminole's residential customer growth rate was 3.5 percent, higher than the statewide growth rate of 2.6 percent.

2.1.3 Income

Statistics indicate that almost 40 percent of the income in Florida comes from non-wage sources such as dividends, interest, rent, and transfer payments. This is approximately 10 percentage points higher than national averages. This statistic is reflective of a higher population concentration of retirees. Historically, these types of income are relatively stable and consequently help smooth the impacts of economic change on the Florida economy and Member service areas.

2.2 Forecast Results

2.2.1 Overview

The forecast projection reflects a poor economic outlook for Florida and the nation as a whole over the next few years. Beginning in 2014, the residential consumer growth rate becomes consistent with the growth experienced by the Seminole system during most of the 1990's. However, the residential usage per consumer growth rate is projected to be much lower over the entire forecast period, reflecting higher real prices, higher appliance efficiency standards, and more energy conservation by consumers.

Beginning in 2010, Seminole will only serve a portion of the load requirements of Lee County Electric Cooperative (LCEC) and in 2014 will no longer serve LCEC. This has the effect of lowering Seminole's long-term energy and demand growth rates.

2.2.2 Population and Consumers

Historical and forecasted population for Seminole Members' service area is shown on Schedules 2.1 through 2.3. Seminole's Members serve significant portions of the less urbanized areas of the state which are located adjacent to metropolitan areas. These cooperative-served areas are less saturated and are impacted by suburban growth around these urban centers. It is therefore reasonable to expect continued higher consumer growth rates for Seminole's Members than for Florida as a whole.

2.2.3 Usage per Consumer

Residential usage per consumer increased annually until 2003, reaching a high of 14,598 in that year. This value has decreased since then, to 14,235 in 2007. For the period 2000-2007, residential usage per consumer for the Seminole system was comparable to the two largest investor-

owned utilities which serve similar regional loads. Schedule 1.3 summarizes survey results for 1994 and 2005 (Seminole's most recent survey). During this period, larger homes were built and appliance saturations steadily increased.

Schedule 1.3 Homes and Electric Appliance Saturations (%)		
	1994	2005
Single Family Homes	64	66
Homes > 2000 sq ft	18	26
Homes < 1200 sq ft	29	22
Primary Space Heating	80	87
Air Conditioning	93	97
Heat Pump	33	51
Water Heater	93	91
Refrigerator	99	99
Television	99	98
Home Computers	18	69
VCR	78	80
Electric Range	79	86
Microwave Oven	92	97
Dishwasher	59	73
Clothes Dryer	79	87
Pool Pump	15	16
SOURCE: "Residential Survey," Seminole Electric Cooperative, Inc., 1994 and 2005		

It is expected that usage per consumer will remain flat after 2010. Air conditioning in homes is reaching maximum saturation, while higher efficiency of new air conditioning, new appliance energy efficiency standards, and an increase in the real price of electricity are collectively having a negative impact on residential energy usage. However, survey results suggest that past growth has been not only in traditional appliance loads, but also in new loads such as home computers and other electronic equipment. Further expansion in electro-technology in the home will be an important

influence on future usage per consumer. In 2008, Seminole's average residential usage was 13,728 KWh. Seminole's average residential usage is projected to increase 0.4% annually through 2017, lower than the 1.2 % projected for Florida.

Commercial usage per consumer is much lower on the Seminole system (54,808 KWh in 2007) than in Florida as a whole (80,762 KWh). This difference is even starker considering that Seminole Members' commercial usage also includes industrial consumers, whereas the Florida average does not. Seminole's Member commercial sector is dominated by small commercial loads. Commercial/industrial usage per consumer is projected to increase at an average annual growth rate of 1.4 percent through 2018.

2.2.4 Energy Sales and Purchases

Residential energy sales are projected to grow at 0.2% annually between 2009 and 2018. The energy sales forecast reflects energy savings from historical conservation efforts, incremental conservation growth at the same rate of adoption, and a conservation estimate based primarily on the 2005 Energy Policy Act. Commercial energy sales are projected to grow at an annual average of 1.5 percent over the same period. These statistics for growth include the effect of the departure of LCEC from Seminole's load responsibility in 2014.

2.2.5 Peak Demand

Seminole's winter peak demand is projected to increase at an average annual rate of 0.9% over the ten-year planning horizon, while summer peak demand is projected to increase at an average annual rate of 0.7% over the same period. Similarly, these growth statistics include the departure of LCEC in 2014.

Seminole as a whole, as well as the majority of its Member systems, is expected to continue

to be winter peaking. For the Seminole system, winter peaks are expected to be approximately 16% higher than summer peaks. The continued winter-peaking nature of the Seminole system is due primarily to continued prominence of electric space-heating saturation in the foreseeable future.

The peak demand in Seminole's current load forecast reflects no additional load management. However, during 2008, as part of a recently adopted strategic initiative, Seminole and its Members began assessing the viability of a range of demand side alternatives.

Seminole stipulates that it counts its consumer demand once and only once, on an aggregated and dispersed basis, in developing its actual and forecast consumer demand values.

2.2.6 Forecast Scenarios

Seminole creates a high and low population growth scenario in addition to the base forecast. Because Seminole's system is primarily residential load, population is the primary driving force behind Seminole's load growth. Therefore, high and low population growth scenarios are developed for each Member system based on the University of Florida's Bureau of Economic Business Research's (BEBR) alternative scenarios.

Schedules 2.1, 2.2, and 2.3 summarize energy usage and consumer Members by customer class. Schedules 3.1.1, 3.1.2, and 3.1.3 provide summer peak demand forecasts for base, high population and low population scenarios. Schedules 3.2.1, 3.2.2, and 3.2.3 provide similar data for winter peak demand.

**Schedule 2.1
History and Forecast of Energy Consumption and
Number of Customers by Customer Class**

Year	Estimated Population Served by Members	RESIDENTIAL			
		Members Per Household	GWh	Avg. Number of Customers	Average KWh Consumption Per Customer
1999	1,332,589	2.20	7,993	607,059	13,167
2000	1,367,127	2.19	8,550	623,151	13,721
2001	1,403,692	2.19	8,755	640,290	13,673
2002	1,442,180	2.18	9,543	660,416	14,450
2003	1,485,457	2.16	10,016	686,136	14,598
2004	1,539,863	2.16	10,221	713,547	14,324
2005	1,600,374	2.15	10,807	744,618	14,513
2006	1,663,858	2.13	11,153	780,688	14,286
2007	1,709,836	2.13	11,444	803,957	14,235
2008	1,743,397	2.16	11,105	808,924	13,728
2009	1,777,236	2.17	11,609	819,608	14,164
2010	1,688,059	2.17	11,054	777,149	14,224
2011	1,730,488	2.16	11,405	800,365	14,250
2012	1,772,914	2.15	11,757	824,999	14,250
2013	1,815,340	2.13	12,154	852,124	14,263
2014	1,541,155	2.09	10,504	737,132	14,250
2015	1,574,503	2.07	10,834	760,277	14,250
2016	1,609,078	2.05	11,182	784,734	14,250
2017	1,643,655	2.03	11,529	809,031	14,250
2018	1,678,227	2.02	11,867	832,798	14,250

Schedule 2.2
History and Forecast of Energy Consumption and
Number of Customers by Customer Class

Year	COMMERCIAL			Other Sales (GWh)	Total Sales (GWh)
	GWh	Avg. Number of Customers	Average KWh Consumption Per Customer		
1999	3,109	59,043	52,657	126	11,228
2000	3,415	62,842	54,343	135	12,100
2001	3,549	66,729	53,185	126	12,430
2002	3,727	68,742	54,217	163	13,433
2003	3,961	70,263	56,374	161	14,138
2004	4,195	74,260	56,491	167	14,583
2005	4,472	77,548	57,668	142	15,421
2006	4,737	84,346	56,162	159	16,049
2007	4,840	88,338	54,808	165	16,449
2008	4,892	86,153	56,786	162	16,158
2009	5,018	88,817	56,496	173	16,800
2010	4,908	85,045	57,711	168	16,130
2011	5,147	87,829	58,600	172	16,724
2012	5,325	90,342	58,940	176	17,258
2013	5,643	92,862	60,766	181	17,988
2014	5,058	81,121	62,347	163	15,725
2015	5,215	83,280	62,621	167	16,216
2016	5,383	85,541	62,935	171	16,736
2017	5,556	87,805	63,282	175	17,260
2018	5,734	90,069	63,657	180	17,781

NOTE: Commercial class includes industrial customers; Other sales class includes lighting customers.

Schedule 2.3
History and Forecast of Energy Consumption and
Number of Customers by Customer Class

Year	Sales for Resale (GWh)	Utility Use & Losses (GWh)	Net Energy for Load (GWh)	Other Customers (Avg. Number)	Total Number of Customers
1999	0	939	12,167	3,593	669,695
2000	0	994	13,094	3,765	689,758
2001	0	864	13,294	3,901	710,920
2002	0	1,257	14,690	5,106	734,264
2003	0	1,640	15,778	5,240	761,639
2004	0	1,830	16,413	5,307	793,114
2005	0	1,345	16,766	5,544	827,710
2006	0	1,306	17,355	5,101	870,135
2007	0	1,221	17,670	5,089	897,384
2008	0	1,171	17,329	5,045	900,122
2009	0	1,277	18,077	5,296	913,721
2010	0	1,214	17,344	5,328	867,522
2011	0	1,258	17,982	5,444	893,638
2012	0	1,298	18,556	5,561	920,902
2013	0	1,352	19,340	5,676	950,662
2014	0	1,153	16,878	5,629	823,882
2015	0	1,189	17,405	5,739	849,296
2016	0	1,229	17,965	5,853	876,128
2017	0	1,267	18,527	5,967	902,803
2018	0	1,304	19,085	6,083	928,950

Schedule 3.1.1
History and Forecast of Summer Peak Demand (MW) - Base Case

Year	Total	Wholesale	Retail	Distributed Generation	Residential		Commercial		Net Firm Demand
					Load Mgmt.	Cons.	Load Mgmt.	Cons.	
1999	2,719	2,719	0	N/A	92	N/A	N/A	N/A	2,627
2000	2,774	2,774	0	N/A	121	N/A	N/A	N/A	2,653
2001	2,837	2,837	0	N/A	104	N/A	N/A	N/A	2,733
2002	3,140	3,140	0	66	99	N/A	N/A	N/A	2,975
2003	3,250	3,250	0	77	158	N/A	N/A	N/A	3,015
2004	3,359	3,359	0	58	74	N/A	N/A	N/A	3,227
2005	3,690	3,690	0	73	78	N/A	N/A	N/A	3,539
2006	3,862	3,862	0	74	130	N/A	N/A	N/A	3,658
2007	4,021	4,021	0	77	105	N/A	N/A	N/A	3,839
2008	3,793	3,793	0	63	100	N/A	N/A	N/A	3,630
2009	4,131	4,131	0	102	97	N/A	N/A	N/A	3,932
2010	3,976	3,976	0	99	90	N/A	N/A	N/A	3,787
2011	4,135	4,135	0	99	90	N/A	N/A	N/A	3,946
2012	4,262	4,262	0	99	90	N/A	N/A	N/A	4,073
2013	4,459	4,459	0	99	90	N/A	N/A	N/A	4,270
2014	3,859	3,859	0	85	55	N/A	N/A	N/A	3,719
2015	3,975	3,975	0	85	55	N/A	N/A	N/A	3,835
2016	4,098	4,098	0	85	55	N/A	N/A	N/A	3,958
2017	4,221	4,221	0	85	55	N/A	N/A	N/A	4,081
	4,342	4,342	0	85	55	N/A	N/A	N/A	4,202

Historical load management data is actual amount exercised at the time of the seasonal peak demand.
Forecast data is the maximum amount available.

Schedule 3.1.2 Forecast of Summer Peak Demand (MW) - <i>High Case</i>									
Year	Total	Wholesale	Retail	Distributed Generation	Residential		Commercial		Net Firm Demand
					Load Mgmt.	Cons.	Load Mgmt.	Cons.	
2009	4,245	4,245	0	102	97	N/A	N/A	N/A	4,046
2010	4,180	4,180	0	99	90	N/A	N/A	N/A	3,991
2011	4,413	4,413	0	99	90	N/A	N/A	N/A	4,224
2012	4,607	4,607	0	99	90	N/A	N/A	N/A	4,418
2013	4,864	4,864	0	99	90	N/A	N/A	N/A	4,675
2014	4,249	4,249	0	85	55	N/A	N/A	N/A	4,109
2015	4,415	4,415	0	85	55	N/A	N/A	N/A	4,275
2016	4,603	4,603	0	85	55	N/A	N/A	N/A	4,463
2017	4,794	4,794	0	85	55	N/A	N/A	N/A	4,654
2018	4,984	4,984	0	85	55	N/A	N/A	N/A	4,844

Schedule 3.1.3 Forecast of Summer Peak Demand (MW) - <i>Low Case</i>									
Year	Total	Wholesale	Retail	Distributed Generation	Residential		Commercial		Net Firm Demand
					Load Mgmt.	Cons.	Load Mgmt.	Cons.	
2009	4,063	4,063	0	102	97	N/A	N/A	N/A	3,864
2010	3,860	3,860	0	99	90	N/A	N/A	N/A	3,671
2011	3,973	3,973	0	99	90	N/A	N/A	N/A	3,784
2012	4,048	4,048	0	99	90	N/A	N/A	N/A	3,859
2013	4,196	4,196	0	99	90	N/A	N/A	N/A	4,007
2014	3,596	3,596	0	85	55	N/A	N/A	N/A	3,456
2015	3,669	3,669	0	85	55	N/A	N/A	N/A	3,529
2016	3,744	3,744	0	85	55	N/A	N/A	N/A	3,604
2017	3,816	3,816	0	85	55	N/A	N/A	N/A	3,676
2018	3,886	3,886	0	85	55	N/A	N/A	N/A	3,746

**Schedule 3.2.1
History and Forecast of Winter Peak Demand (MW) - Base Case**

Year	Total	Wholesale	Retail	Distributed Generation	Residential		Commercial		Net Firm Demand
					Load Mgmt.	Cons.	Load Mgmt.	Cons.	
1998-99	3,416	3,416	0	N/A	220	N/A	N/A	N/A	3,196
1999-00	3,389	3,389	0	N/A	180	N/A	N/A	N/A	3,209
2000-01	3,769	3,769	0	N/A	143	N/A	N/A	N/A	3,626
2001-02	3,691	3,691	0	N/A	125	N/A	N/A	N/A	3,566
2002-03	4,308	4,308	0	58	95	N/A	N/A	N/A	4,155
2003-04	3,672	3,672	0	56	85	N/A	N/A	N/A	3,531
2004-05	4,107	4,107	0	65	91	N/A	N/A	N/A	3,951
2005-06	4,365	4,365	0	63	77	N/A	N/A	N/A	4,225
2006-07	4,240	4,240	0	105	109	N/A	N/A	N/A	4,026
2007-08	4,426	4,426	0	72	133	N/A	N/A	N/A	4,221
2008-09	4,993	4,993	0	78	150	N/A	N/A	N/A	4,765
2009-10	4,629	4,629	0	99	133	N/A	N/A	N/A	4,397
2010-11	4,739	4,739	0	99	133	N/A	N/A	N/A	4,507
2011-12	4,881	4,881	0	99	133	N/A	N/A	N/A	4,649
2012-13	5,035	5,035	0	99	133	N/A	N/A	N/A	4,803
2013-14	4,476	4,476	0	85	82	N/A	N/A	N/A	4,309
2014-15	4,613	4,613	0	85	82	N/A	N/A	N/A	4,446
2015-16	4,755	4,755	0	85	82	N/A	N/A	N/A	4,588
2016-17	4,902	4,902	0	85	82	N/A	N/A	N/A	4,735
2017-18	5,049	5,049	0	85	82	N/A	N/A	N/A	4,882
2018-19	5,195	5,195	0	85	82	N/A	N/A	N/A	5,028

Historical load management data is actual amount exercised at the time of the seasonal peak demand.
Forecast data is the maximum amount available

Schedule 3.2.2 Forecast of Winter Peak Demand (MW) - High Case									
Year	Total	Wholesale	Retail	Distributed Generation	Residential		Commercial		Net Firm Demand
					Load Mgmt.	Cons.	Load Mgmt.	Cons.	
2009-10	4,888	4,888	0	99	133	N/A	N/A	N/A	4,656
2010-11	5,019	5,019	0	99	133	N/A	N/A	N/A	4,787
2011-12	5,245	5,245	0	99	133	N/A	N/A	N/A	5,013
2012-13	5,563	5,563	0	99	133	N/A	N/A	N/A	5,331
2013-14	4,912	4,912	0	85	82	N/A	N/A	N/A	4,745
2014-15	5,107	5,107	0	85	82	N/A	N/A	N/A	4,940
2015-16	5,320	5,320	0	85	82	N/A	N/A	N/A	5,153
2016-17	5,547	5,547	0	85	82	N/A	N/A	N/A	5,380
2017-18	5,776	5,776	0	85	82	N/A	N/A	N/A	5,609
2018-19	6,006	6,006	0	85	82	N/A	N/A	N/A	5,839

Schedule 3.2.3 Forecast of Winter Peak Demand (MW) - Low Case									
Year	Total	Wholesale	Retail	Distributed Generation	Residential		Commercial		Net Firm Demand
					Load Mgmt.	Cons.	Load Mgmt.	Cons.	
2009-10	4,609	4,609	0	99	133	N/A	N/A	N/A	4,377
2010-11	4,591	4,591	0	99	133	N/A	N/A	N/A	4,359
2011-12	4,676	4,676	0	99	133	N/A	N/A	N/A	4,444
2012-13	4,849	4,849	0	99	133	N/A	N/A	N/A	4,617
2013-14	4,204	4,204	0	85	82	N/A	N/A	N/A	4,037
2014-15	4,291	4,291	0	85	82	N/A	N/A	N/A	4,124
2015-16	4,379	4,379	0	85	82	N/A	N/A	N/A	4,212
2016-17	4,467	4,467	0	85	82	N/A	N/A	N/A	4,300
2017-18	4,552	4,552	0	85	82	N/A	N/A	N/A	4,385
2018-19	4,636	4,636	0	85	82	N/A	N/A	N/A	4,469

Schedule 3.3.1
History and Forecast of Annual Net Energy for Load (GWh) - Base Case

Year	Total	Conservation		Retail	Total Sales	Utility Use & Losses	Net Energy for Load	Load Factor %
		Residential	Commercial					
1999	12,167	N/A	N/A	0	11,228	939	12,167	43.5
2000	13,094	N/A	N/A	0	12,100	994	13,094	46.6
2001	13,294	N/A	N/A	0	12,430	864	13,294	41.9
2002	14,690	N/A	N/A	0	13,433	1,257	14,690	47.0
2003	15,778	N/A	N/A	0	14,138	1,640	15,778	43.3
2004	16,413	N/A	N/A	0	14,583	1,830	16,413	53.1
2005	16,766	N/A	N/A	0	15,421	1,345	16,766	48.4
2006	17,355	N/A	N/A	0	16,049	1,306	17,355	46.9
2007	17,671	1	N/A	0	16,449	1,221	17,670	50.1
2008	17,330	1	N/A	0	16,158	1,171	17,329	46.9
2009	18,107	30	N/A	0	16,800	1,277	18,077	43.3
2010	17,395	51	N/A	0	16,130	1,214	17,344	45.0
2011	18,099	117	N/A	0	16,724	1,258	17,982	45.5
2012	18,767	211	N/A	0	17,258	1,298	18,556	45.6
2013	19,648	308	N/A	0	17,988	1,352	19,340	46.0
2014	17,288	410	N/A	0	15,725	1,153	16,878	44.7
2015	17,907	502	N/A	0	16,216	1,189	17,405	44.7
2016	18,507	542	N/A	0	16,736	1,229	17,965	44.7
2017	19,236	708	N/A	0	17,260	1,267	18,527	44.7
2018	19,907	822	N/A	0	17,781	1,304	19,085	44.6

Schedule 3.3.2 Forecast of Annual Net Energy for Load (GWh) - <i>High Case</i>								
Year	Total	Conservation		Retail	Wholesale	Utility Use & Losses	Net Energy for Load	Load Factor %
		Residential	Commercial					
2009	18,571	30	N/A	0	17,242	1,299	18,541	45.5
2010	18,322	51	N/A	0	17,001	1,270	18,271	44.8
2011	19,311	117	N/A	0	17,860	1,334	19,194	45.8
2012	20,283	211	N/A	0	18,677	1,395	20,072	45.7
2013	21,416	308	N/A	0	19,634	1,474	21,108	45.2
2014	19,012	410	N/A	0	17,334	1,268	18,602	44.8
2015	19,862	502	N/A	0	18,040	1,320	19,360	44.7
2016	20,750	542	N/A	0	18,830	1,378	20,208	44.8
2017	21,786	708	N/A	0	19,640	1,438	21,078	44.7
2018	22,770	822	N/A	0	20,451	1,497	21,948	44.7

Schedule 3.3.3 Forecast of Annual Net Energy for Load (GWh) - <i>Low Case</i>								
Year	Total	Conservation		Retail	Wholesale	Utility Use & Losses	Net Energy for Load	Load Factor %
		Residential	Commercial					
2009	17,822	30	N/A	0	16,545	1,247	17,792	44.8
2010	16,939	51	N/A	0	15,715	1,173	16,888	44.0
2011	17,378	117	N/A	0	16,062	1,199	17,261	45.2
2012	17,812	211	N/A	0	16,378	1,223	17,601	45.2
2013	18,457	308	N/A	0	16,882	1,267	18,149	44.9
2014	16,111	410	N/A	0	14,630	1,071	15,701	44.4
2015	16,539	502	N/A	0	14,943	1,094	16,037	44.4
2016	16,919	542	N/A	0	15,260	1,117	16,377	44.4
2017	17,415	708	N/A	0	15,567	1,140	16,707	44.4
2018	17,851	822	N/A	0	15,867	1,162	17,029	44.3

Schedule 4						
Previous Year and 2-Year Forecast of Peak Demand and Net Energy for Load by Month						
Month	2008 Actual		2009 Forecast		2010 Forecast	
	Peak Demand MW	NEL GWh	Peak Demand MW	NEL GWh	Peak Demand MW	NEL GWh
January	4,221	1,419	4,584	1,495	4,397	1,433
February	3,345	1,226	3,507	1,214	3,403	1,167
March	2,844	1,259	2,956	1,290	2,882	1,234
April	2,834	1,281	3,003	1,318	2,872	1,255
May	3,566	1,573	3,321	1,527	3,173	1,451
June	3,576	1,659	3,596	1,674	3,450	1,599
July	3,590	1,695	3,716	1,832	3,552	1,745
August	3,604	1,709	3,932	1,944	3,787	1,866
September	3,630	1,623	3,616	1,681	3,497	1,619
October	3,113	1,353	3,292	1,474	3,167	1,413
November	3,182	1,254	2,689	1,228	2,647	1,194
December	3,406	1,278	3,307	1,400	3,275	1,368
ANNUAL		17,329		18,077		17,344

2.3 Forecast Assumptions

2.3.1 Economic and Demographic Data

Seminole's economic and demographic data base has four principal sources: (1) population from the "Florida Population Studies" furnished by the BEBR, (2) housing permits, income, and employment data furnished by Moody's Economy.com (3) electricity price data from Seminole's Member cooperatives "Financial and Statistical Reports" (RUS Form 7), and (4) appliance and housing data from the "Residential Appliance Surveys" conducted by Seminole and its Member systems since 1980.

Population is the main explanatory variable in the residential and commercial/industrial consumer models. Historical population data by county is obtained for the 46 counties served by Seminole Member systems. Combining the county forecasts yields a population forecast for each Member. Three sets of population forecasts for each county are provided by the BEBR: low, medium, and high scenarios. Historical population growth trends are analyzed to determine the most appropriate combination of scenarios for each Member system. Low and high population scenarios are also developed for each Member.

Real Per Capita Income (RPCI) is an explanatory variable in the residential and commercial/industrial usage per consumer models. The Consumer Price Index for All Urban Consumers (CPI-U) published by the U.S. Bureau of Labor Statistics is used to convert historical nominal income to real values. Total non-farm employment (EMPL) is also used in the commercial/industrial energy usage model. County forecasts of RPCI and EMPL are taken from Moody's Economy.Com's, October 2008 long-term economic forecast.

The real price of electricity is used in the residential and commercial/industrial energy models. The real price is calculated by dividing KWh sales for each consumer class by the corresponding revenue, and then by deflating the result by the CPI-U. For the forecast, the real price of electricity is assumed to increase in the future based on system-wide historical retail rates.

Appliance saturations and housing data are obtained from Seminole's Residential Appliance Survey. The information from the surveys is combined with the residential consumer forecast to produce weighted appliance stock variables for space-conditioning appliances which are used in the residential energy usage model and the peak demand load factor model.

2.3.2 Weather Data

Seminole obtains hourly weather data from the National Oceanic and Atmospheric Administration (NOAA) for six weather stations located in or around Seminole's Member service area. To better reflect weather conditions in each Member's service territory, different weather stations are assigned to individual Member systems based on geographic proximity.

Monthly heating degree hours (HDH) and cooling degree hours (CDH) are used in the energy usage models, while the peak demand models use HDH and CDH on Seminole's peak days. Seminole uses different temperature cut-off points for air conditioning and space heating demand. In addition, there are different winter cut-off values for Members in the northern versus the southern regions.

2.3.3 Sales and Hourly Load Data

Monthly operating statistics have been furnished by the Member systems to Seminole back to 1970. Included in this data are statistics by class on number of consumers, KWh sales, and revenue. This data is the basis for consumer and energy usage models. Hourly loads for each Member and

the Seminole system, as well as the Members' monthly total energy purchases from Seminole, are collected from over 180 delivery points. Such data, taken from January 1979 to the present, is a basis for hourly load profile forecasts and modeling peak demand.

2.4 Forecast Methodology

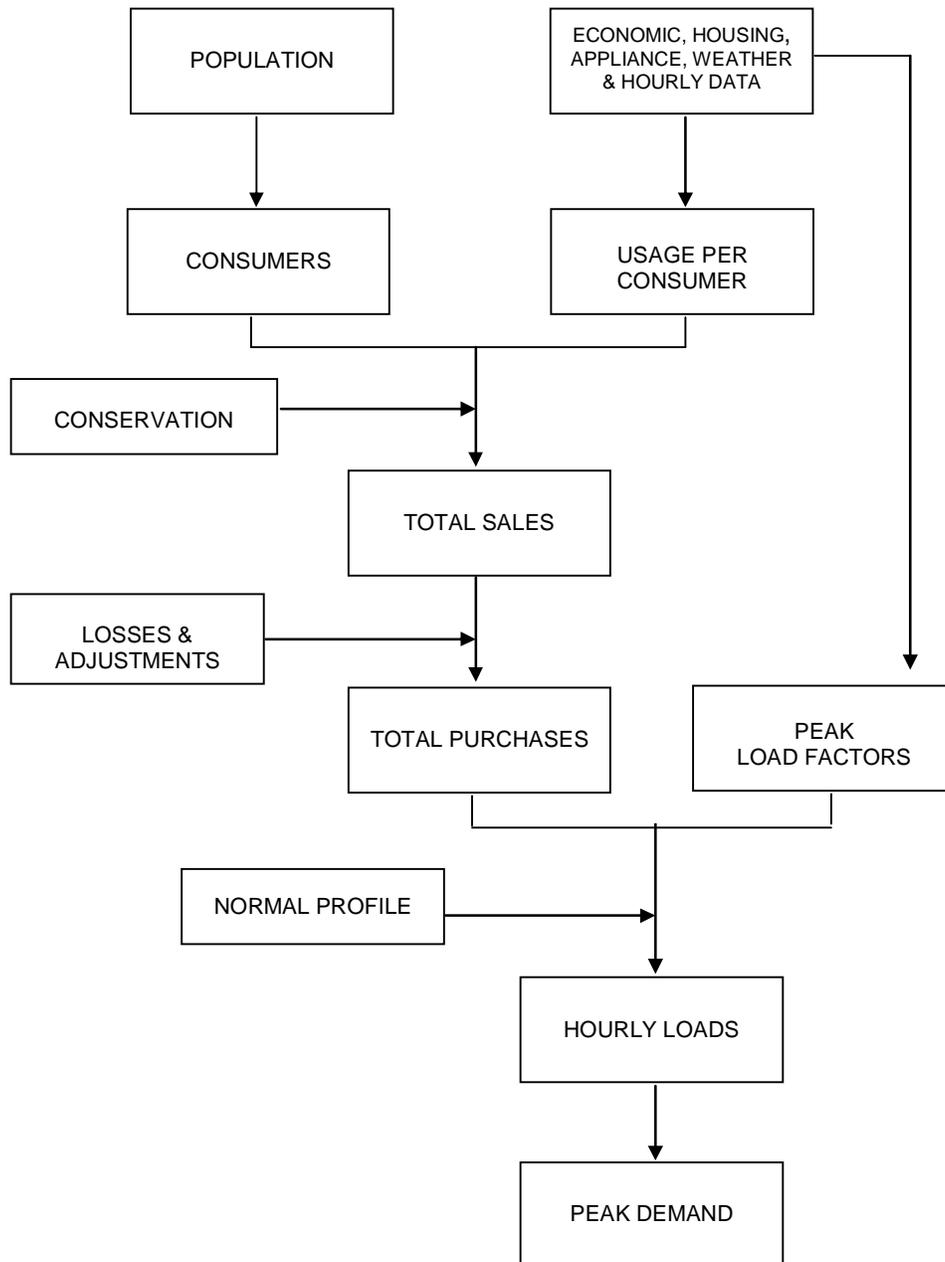
Seminole's Integrated Forecasting System consists of the following sub-models:

- (1) Residential Consumer Model
- (2) Appliance Model
- (3) Commercial/Industrial Consumer Model
- (4) Other Class Consumers Model
- (5) Residential Energy Usage Model
- (6) Commercial/Industrial Energy Usage Model
- (7) Other Class Energy Usage Model
- (8) Peak Demand Load Factor Model
- (9) Hourly Load Profiles and Load Management

Each model consists of ten sub-models because each Member system is modeled and forecast separately. Individual Member model results are aggregated to derive the Seminole forecast. Figure 1 on the following page shows the Integrated Forecasting System.

Figure 1

Integrated Forecasting System



2.4.1 Consumer Models

For each Member, annual consumers are a function of the Member's service area population, with a first-order auto-regressive correction used when necessary. The amount of new residential housing permits was found to be a significant variable in six of the Members' residential consumer models. Forecasts are benchmarked using 2008 estimated actual data. Seasonally adjusted monthly forecasts are developed from annual data. Expected new large commercial consumers are included.

Other consumer classes generally include irrigation, street and highway lighting, public buildings, and sales for resale, which represent less than 2 percent of Seminole's Members' total energy sales. A few Member systems include some of these classes in the commercial/industrial sector. For the others, annual consumer forecasts are projected using regression analysis against population, or a trending technique.

2.4.2 Appliance Model

The Appliance Model combines the results of the Residential Consumer Model with data from the Residential Appliance Survey to yield forecasts of space-heating and air-conditioning stock variables which are used in the Residential Energy Usage Model and the Peak Demand Load Factor Model. Annual forecasts of the shares for the following home types are produced: single-family, mobiles, and multi-family homes. Each home type is segregated into three age groups. Next, annual forecasts of space-conditioning saturations are created. Finally, the air-conditioning saturations and the space-heating saturations are combined with housing type share information, resulting in weather-sensitive stock variables for heating and cooling.

2.4.3 Energy Usage Model

The Residential Energy Usage Model is a combination of econometric and end-use methods.

For each Member system, monthly residential usage per consumer is a function of heating and cooling degree variables weighted with space-conditioning appliances, real price of electricity, and real per capita income. Forecasts are benchmarked against weather-normalized estimated energy in 2008, the last year of the analysis period. The usage per consumer forecast is multiplied by the consumer forecast to produce monthly residential energy sales forecasts.

For each Member system, monthly commercial/industrial usage per consumer is a function of heating and cooling degree variables, real price of electricity, real per capita income, total non-farm employment, and dummy variables to explain abrupt or external changes. A first order autoregressive correction is used when necessary. Forecasts of energy usage per consumer are benchmarked to 2008 estimates, the last year of the historical period. Energy usage per consumer forecasts are combined with the consumer forecasts to produce monthly commercial/industrial energy sales forecasts. Expected new large commercial loads are included in the forecast.

Historical patterns of energy usage for other classes have been quite stable for most Members and usage is held constant for the forecast period. Trending methodology is used for the Members with growth in this sector.

2.4.4 Total Energy Sales and Energy Purchases

Residential, Commercial/Industrial, and Other classes energy sales forecasts are summed to create total retail energy sales forecasts for each Member system. Retail energy sales forecasts are converted to Member energy purchases from Seminole at the delivery point using historical averages of the ratio of calendar month purchases to retail billing cycle sales for each Member. Therefore, these adjustment factors represent both energy losses and billing cycle sales and calendar month purchases differences. The latter, as a function of weather and billing days, often changes erratically.

2.4.5 Peak Demand Load Factor Model

The Seminole peak demand forecast is derived after the Member monthly peak demands and hourly load forecasts have been created. Member peak demands are derived by combining the forecasts of monthly load factors with energy purchases from Seminole. Monthly peak demand load factors are a function of heating and cooling degree variables, precipitation, air-conditioning and space-heating saturations, and heating and cooling degree hours at the time of the Member's peak demand. Two seasonal equations for each Member system are developed: one for the winter months (November through March) and the other for the summer months (April through October). The forecasted monthly load factors are combined with the energy purchases from Seminole forecasts to produce forecasts of monthly peaks by Member.

2.4.6 Hourly Load Profiles

Hourly demand forecasts are created using an algorithm that contains the following inputs: normal monthly hourly profiles, maximum and minimum monthly demands, and energy. This algorithm produces monthly hourly load forecasts by Member. Seminole peak demands are derived by summing the Members' hourly loads and identifying the monthly coincident maximum demands.

2.4.7 Scenarios

In lieu of economic scenarios, Seminole creates a high and low population growth scenario in addition to the base population forecast. Because Seminole's system is primarily residential load, population is the primary driving force behind Seminole's load growth. Therefore, high and low population growth scenarios are developed for each Member system based on the BEBR's alternative scenarios.

3. FUEL REQUIREMENTS AND ENERGY SOURCES

Seminole's nuclear, coal, oil, and natural gas requirements for owned and future generating units are shown on Schedule 5 on the next page. Seminole's total system energy sources in GWh and percent for each fuel type are shown on Schedules 6.1 and 6.2, respectively, on the following pages.

Seminole has additional requirements for capacity in the 2016 and beyond time frame. Seminole has reflected capacity additions which are assumed to be from a portfolio of resources such as gas/oil, nuclear, and renewable resources.

**Schedule 5
Fuel Requirements For Seminole Generating Resources**

Fuel Requirements		Units	Actual 2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018
Nuclear		Trillion BTU	1	1	1	1	1	1	1	1	1	9	20	23
Coal		1000 Tons	3830	3658	4334	4235	4180	4120	4145	4079	4105	5248	5581	5667
Residual	Total	1000 BBL	0	0	0	0	0	0	0	0	0	0	0	0
	Steam	1000 BBL	0	0	0	0	0	0	0	0	0	0	0	0
	CC	1000 BBL	0	0	0	0	0	0	0	0	0	0	0	0
	CT	1000 BBL	0	0	0	0	0	0	0	0	0	0	0	0
Distillate	Total	1000 BBL	58	46	49	48	47	46	47	46	46	59	62	63
	Steam	1000 BBL	41	41	49	48	47	46	47	46	46	59	62	63
	CC	1000 BBL	0	0	0	0	0	0	0	0	0	0	0	0
	CT	1000 BBL	17	5	1	0	0	0	0	0	0	0	0	0
Natural Gas	Total	1000 MCF	7299	12242	21119	19124	19673	19805	20478	15690	17399	11222	10881	11916
	Steam	1000 MCF	0	0	0	0	0	0	0	0	0	0	0	0
	CC	1000 MCF	4027	11609	18761	16002	17040	17000	18186	14221	15759	8779	8024	8043
	CT	1000 MCF	3272	633	2357	3122	2633	2804	2292	1469	1641	2443	2857	3873

NOTE: Above fuel is for existing and future-owned generating resources (excluding purchased power contracts). Totals may not add due to rounding.

Schedule 6.1 Energy Sources (GWh)													
Energy Sources	Units	Actual		2009	2010	2011	2012	2013	2014	2015	2016	2017	2018
		2007	2008										
Inter-Regional Interchange	GWh	0	0	0	0	0	0	0	0	0	0	0	0
Nuclear	GWh	119	273	225	124	116	309	296	417	383	1013	1903	2166
Coal	GWh	10241	10555	10998	10452	10271	10547	10606	10641	10743	13144	13625	13836
Residual	Total	40	629	0	0	0	0	0	0	54	21	0	0
	Steam	0	629	0	0	0	0	0	0	54	21	0	0
	CC	19	0	0	0	0	0	0	0	0	0	0	0
	CT	21	0	0	0	0	0	0	0	0	0	0	0
Distillate	Total	1446	95	35	31	46	29	38	44	46	42	37	38
	Steam	500	24	29	28	28	27	28	27	27	35	37	37
	CC	878	2	0	0	0	0	1	0	0	0	0	0
	CT	68	69	6	3	18	2	9	17	19	7	0	0
Natural Gas	Total	5477	5369	4781	4079	4832	4911	5656	3762	4067	2116	1799	1941
	Steam	560	1341	491	340	105	59	64	76	32	8	1	3
	CC	4097	3796	3861	3153	3417	3629	4510	3190	3401	1837	1547	1594
	CT	820	232	430	587	1311	1223	1081	496	634	272	251	344
NUG	GWh	0	0	0	0	0	0	0	0	0	0	0	0
Renewables	GWh	347	408	663	678	673	701	696	699	708	702	268	166
Other	GWh	0	0	1374	1979	2043	2059	2048	1315	1405	927	895	938
Net Energy for Load	GWh	17670	17329	18077	17343	17982	18556	19340	16878	17406	17966	18527	19085

NOTE: Net interchange and PEF system purchases are included under source fuel categories.
Totals may not add due to rounding.



**Schedule 6.2
Energy Sources (Percent)**

Energy Sources	Units	Actual 2007	Actual 2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018
Inter-Regional Interchange	%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
Nuclear	%	0.67%	1.58%	1.25%	0.72%	0.65%	1.66%	1.53%	2.47%	2.20%	5.64%	10.27%	11.35%
Coal	%	57.96%	60.91%	60.84%	60.26%	57.12%	56.84%	54.84%	63.04%	61.72%	73.16%	73.54%	72.50%
Residual	Total	0.23%	3.63%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.31%	0.12%	0.00%	0.00%
	Steam	0.00%	3.63%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.31%	0.12%	0.00%	0.00%
	CC	0.11%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
	CT	0.12%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
Distillate	Total	8.18%	0.55%	0.19%	0.18%	0.26%	0.16%	0.19%	0.26%	0.26%	0.23%	0.20%	0.20%
	Steam	2.83%	0.14%	0.16%	0.16%	0.15%	0.15%	0.14%	0.16%	0.16%	0.19%	0.20%	0.20%
	CC	4.97%	0.01%	0.00%	0.00%	0.00%	0.00%	0.01%	0.00%	0.00%	0.00%	0.00%	0.00%
	CT	0.38%	0.40%	0.03%	0.01%	0.10%	0.01%	0.05%	0.10%	0.11%	0.04%	0.00%	0.00%
Natural Gas	Total	31.00%	30.98%	26.45%	23.52%	26.87%	26.47%	29.25%	22.29%	23.36%	11.78%	9.71%	10.17%
	Steam	3.17%	7.74%	2.71%	1.96%	0.58%	0.32%	0.33%	0.45%	0.18%	0.04%	0.01%	0.02%
	CC	23.19%	21.91%	21.36%	18.18%	19.00%	19.56%	23.32%	18.90%	19.54%	10.22%	8.35%	8.35%
	CT	4.64%	1.34%	2.38%	3.38%	7.29%	6.59%	5.59%	2.94%	3.64%	1.51%	1.36%	1.80%
NUG	%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%	0.00%
Renewables	%	1.96%	2.35%	3.67%	3.91%	3.74%	3.78%	3.60%	4.14%	4.07%	3.91%	1.45%	0.87%
Other	%	0.00%	0.00%	7.60%	11.41%	11.36%	11.10%	10.59%	7.79%	8.07%	5.16%	4.83%	4.91%
Net Energy for Load	%	100.00%	100.00%	100.00%	100.00%	100.00%	100.00%	100.00%	100.00%	100.00%	100.00%	100.00%	100.00%

NOTE: Net interchange and PEF system purchases are included under source fuel categories.
Totals may not add due to rounding.

4. FORECAST OF FACILITIES REQUIREMENTS

Seminole's load is located primarily within three control areas: PEF, FPL, and Seminole Direct Serve (SDS). Seminole is obligated to serve all loads in the FPL and SDS areas, and load up to a specified capacity commitment level in the PEF area during the term of the PEF Partial Requirements Contract. Seminole must also supply appropriate reserves for the load it is responsible for serving. Seminole meets its total committed load obligation using a combination of owned generation and purchased capacity resources. Member loads in the PEF control area in excess of the specified PEF capacity commitment level are served through PR purchases from PEF. PEF has the contractual obligation to plan to meet these requirements.

Seminole requires approximately 1,600 MW of new generation by the summer of 2016 to replace expiring power purchase contracts and serve its Members' load growth. Seminole is planning to meet a portion of such capacity needs in that time frame by constructing a new 750 MW pulverized coal unit at SGS. Seminole's April 2004 all-source RFP for base load capacity determined that SGS Unit 3 was the most economical alternative. Seminole began the permitting and need petition process in March 2006 with the commercial operation date originally scheduled for May 2012. Seminole received a determination of need approval from the Florida Public Service Commission in August 2006, and the required land use approval was issued by the State of Florida's Power Plant Siting Board in December 2006.

Certification under the Florida Electrical Power Plant Siting Act was deemed complete by the Florida Department of Environmental Protection (FDEP), and final approval was expected in April 2007. However, in August 2007, the FDEP issued a Final Order denying Seminole's application for certification based on procedural issues associated with approval of facilities under the Power Plant

Siting Act. Seminole appealed the FDEP's decision through the Fifth District Court of Appeal, and Final Certification was issued on August 18, 2008. The FDEP issued a final Prevention of Significant Deterioration permit on April 3, 2008. This permit is now subject to additional third party appeals which have delayed the in-service date of SGS Unit 3 until May 2016.

Seminole's capacity expansion plan also currently includes the construction of three 170 MW class combustion turbine units at a new site in Gilchrist County. These three units are scheduled to enter service in 2015.

In addition, Seminole is currently in discussions with PEF regarding an ownership share of the proposed Levy County nuclear units currently scheduled to enter service in 2016 and 2017, respectively.

Seminole has a FERC-filed qualifying facility (QF) program which complies with the requirements of the Public Utility Regulatory Policies Act (PURPA). When competitively bidding for power supplies, Seminole continues to solicit proposals from QF and renewable energy facilities. Seminole also evaluates all unsolicited QF and renewable energy proposals for applicability to the cooperative's needs. As a result of its market interactions, Seminole has signed several purchased power contracts for renewable energy. In 1999, Seminole entered into a power purchase agreement with a renewable energy facility, Lee County Resource Recovery, for 35 MW of capacity (increased to 55 MW (in November 2007). More recently, Seminole has signed contracts with Telogia Power, LLC, a 12.5 MW biomass (wood waste) burning facility in Liberty County; Bio-Energy Partners, a 7 MW landfill methane gas burning facility in Broward County, Landfill Energy Systems, with 15 MW total capacity coming from two waste-to-energy projects in Seminole and Brevard Counties, and Timberline Energy, with 4.8 MW total capacity coming from two landfill gas-to-energy facilities in

Hernando and Sarasota Counties. These renewable resources are projected to serve approximately 4% of Seminole's total energy requirements in 2009.

Schedules 7.1, 7.2, and 8 include the addition of approximately 1,700 MW of capacity by 2019 at SGS, Gilchrist, and yet-unspecified sites. Such capacity is needed to replace expiring purchased power contracts and/or to maintain Seminole's reliability criteria. These needs are specified for planning purposes and represent the most economical mix of resource types for Seminole's needs.

Future economic studies, in conjunction with Seminole's competitive bidding process, will allow Seminole to further optimize the amount, type, and timing of such capacity. The units at unknown sites are shown for purposes of identifying capacity need, and in consideration of Seminole's competitive bidding process and/or bilateral discussions with existing power suppliers for purchased alternatives, do not represent at this time a commitment for construction by Seminole.

**Schedule 7.1
Forecast of Capacity, Demand and Scheduled Maintenance at Time of Summer Peak**

Year	Total Installed Capacity (MW)	Firm Capacity Import (MW)		Firm Capacity Export (MW)	Firm QFs (MW)	Capacity Available (MW)		System Firm Summer Peak Demand (MW)		Reserve Margin Before Maintenance MW % of Pk	Scheduled Maintenance (MW)	Reserve Margin After Maintenance MW % of Pk	
		PR and FR	Other Purchases			Total	Less PR and FR	Total	Obligation				
2009	2,089	333	2,155	0	0	4,577	4,244	3,932	3,599	645	0	645	17.9%
2010	2,099	362	2,080	0	0	4,541	4,179	3,787	3,425	754	0	754	22.0%
2011	2,099	377	2,080	0	0	4,556	4,179	3,946	3,569	610	0	610	17.1%
2012	2,111	377	2,230	0	0	4,718	4,341	4,073	3,696	645	0	645	17.5%
2013	2,111	387	2,354	0	0	4,852	4,465	4,270	3,883	582	0	582	15.0%
2014	2,152	115	1,993	0	0	4,260	4,145	3,719	3,604	541	0	541	15.0%
2015	2,152	119	2,121	0	0	4,392	4,273	3,835	3,716	557	0	557	15.0%
2016	3,662	122	792	0	0	4,576	4,454	3,958	3,836	618	0	618	16.1%
2017	3,789	125	760	0	0	4,674	4,549	4,081	3,956	593	0	593	15.0%
2018	3,789	128	896	0	0	4,813	4,685	4,202	4,074	611	1	611	15.0%

NOTES: 1. Total installed capacity and the associated reserve margins are based on Seminole's current base case plan and are based on a 15% reserve margin criterion.

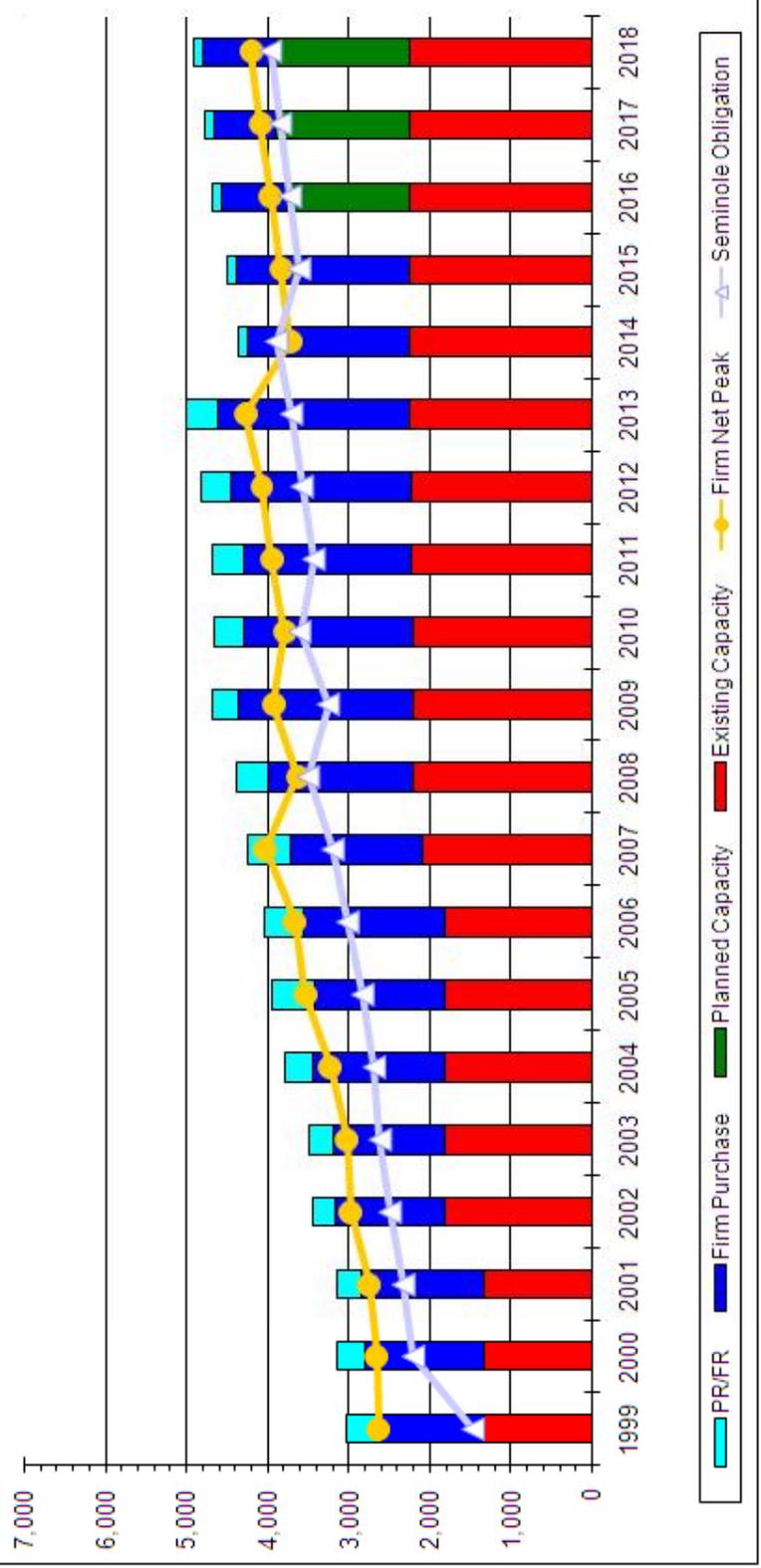
2. Firm Capacity Import/Other Purchases include a firm purchase power contract from Hardee Power Partners, through December 31, 2012, for 287 MW of first-call capacity from the Hardee Power Station to back up 1240 MW of Seminole Generating Station and Crystal River Unit 3.

3. Firm Capacity Import/PR and FR includes partial requirements and full requirements purchases.

4. Seminole's firm obligation demand does not include PR and FR purchases.

5. Seminole is not responsible for supplying reserves for FR and PR purchases. Percent reserves are calculated at 15% of Seminole's obligation and include any surplus capacity.

Figure 1: History and Forecast Of Total Resources And Peak Demand
Summer



**Schedule 7.2
Forecast of Capacity, Demand and Scheduled Maintenance at Time of Winter Peak**

Year	Total Installed Capacity (MW)	Firm Capacity Import (MW)		Firm Capacity Export (MW)	Firm Capacity QFs (MW)	Capacity Available (MW)		System Firm Summer Peak Demand (MW)		Reserve Margin Before Maintenance		Scheduled Maintenance (MW)	Reserve Margin After Maintenance		
		PR and FR	Other Purchases			Total	Less PR and FR	Total	Obligation	MW	% of Pk		MW	% of Pk	
2009/10	2,196	794	2,345	3,139	0	0	5,335	4,541	4,380	3,586	955	26.6%	0	955	26.6%
2010/11	2,206	809	2,345	3,154	0	0	5,360	4,551	4,489	3,680	871	23.7%	0	871	23.7%
2011/12	2,218	823	2,495	3,318	0	0	5,536	4,713	4,631	3,808	905	23.8%	0	905	23.8%
2012/13	2,218	803	2,584	3,387	0	0	5,605	4,802	4,784	3,981	821	20.6%	0	821	20.6%
2013/14	2,259	108	3,134	3,242	0	0	5,501	5,393	4,290	4,182	1,211	29.0%	0	1,211	29.0%
2014/15	2,259	108	2,707	2,815	0	0	5,074	4,966	4,426	4,318	648	15.0%	0	648	15.0%
2015/16	2,979	112	2,145	2,257	0	0	5,236	5,124	4,568	4,456	668	15.0%	0	668	15.0%
2016/17	3,860	114	1,431	1,545	0	0	5,405	5,291	4,715	4,601	690	15.0%	0	690	15.0%
2017/18	3,991	118	1,463	1,581	0	0	5,572	5,454	4,861	4,743	711	15.0%	0	711	15.0%
2018/19	3,991	120	1,629	1,749	0	0	5,740	5,620	5,007	4,887	733	15.0%	0	733	15.0%

NOTES: 1. Total installed capacity and the associated reserve margins are based on Seminole's current base case plan and are based on a 15% reserve margin criterion.

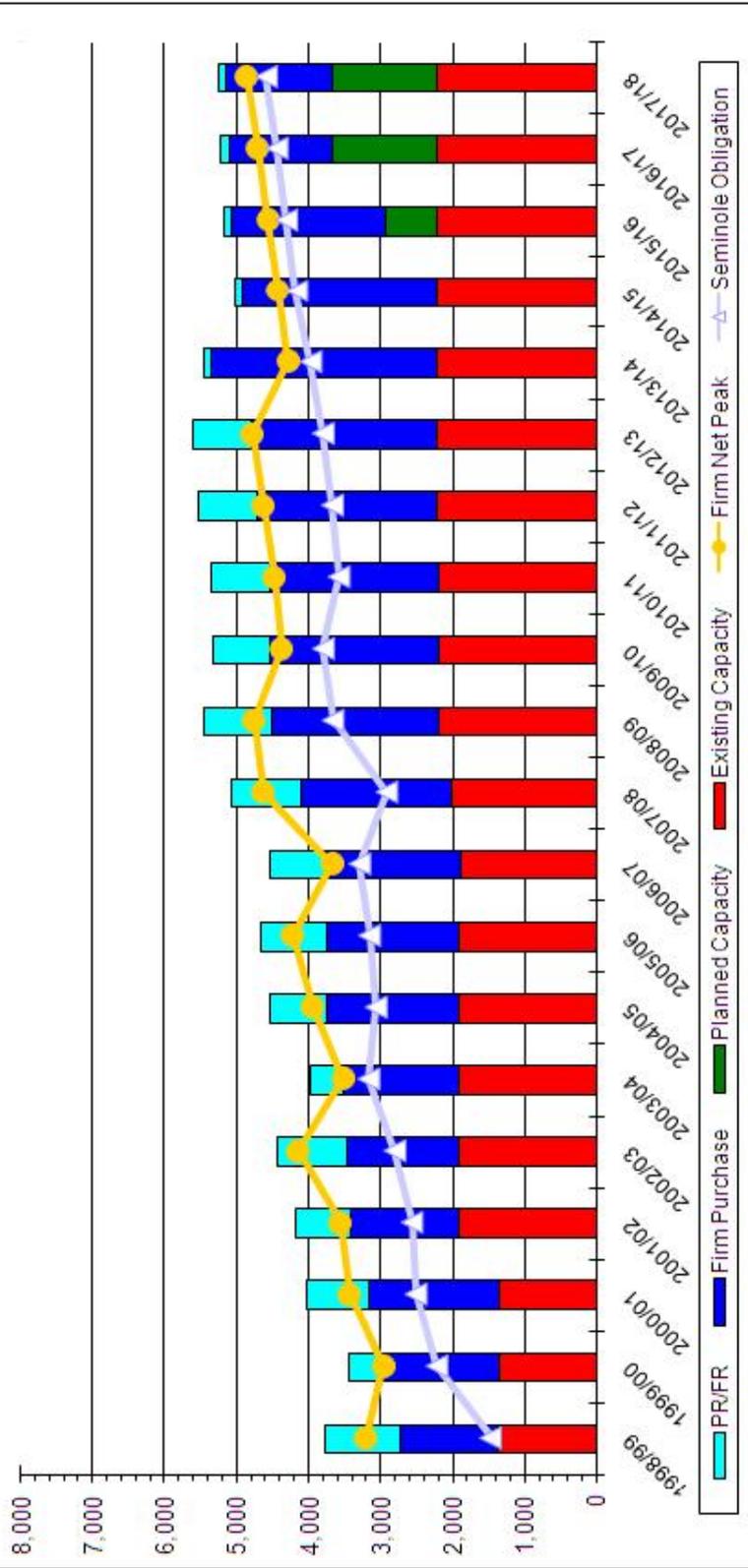
2. Firm Capacity Import/Other Purchases include a firm purchase power contract from Hardee Power Partners, through December 31, 2012, for 356 MW of first-call capacity from the Hardee Power Station to back up 1240 MW of Seminole Generating Station and Crystal River Unit 3.

3. Firm Capacity Import/PR and FR includes partial requirements and full requirements purchases.

4. Seminole's firm obligation demand does not include PR and FR purchases.

5. Seminole is not responsible for supplying reserves for FR and PR purchases. Percent reserves are calculated at 15% of Seminole's obligation and include any surplus capacity.

Figure 2: History and Forecast Of Total Resources And Peak Demand
Winter



5. OTHER PLANNING ASSUMPTIONS AND INFORMATION

5.1 Plan Economics

Power supply alternatives are compared against a base case scenario which is developed using the most recent load forecast, fuel forecast, operational cost assumptions, and financial assumptions. Various power supply options are evaluated to determine the overall effect on the present worth of revenue requirements (PWRR). All other things being equal, the option with the lowest long-term PWRR is normally selected. Sensitivity analyses are done to test how robust the selected generation option is when various parameters change from the base study assumptions (e.g., load forecast, fuel price, and capital costs of new generation).

5.2 Fuel Price Forecast

5.2.1 Coal

Spot and long term market commodity prices for coal (at the mine) and transportation rates have shown increased volatility in recent years. This condition is expected to continue into the future, as supply, transportation and world energy markets affect US coal prices. The underlying value of coal at the mine will continue to rise with increased coal demand and direct mining costs. Additional coal delivered price increases and volatility will come from the cost of railcars, handling service contracts and transportation capacity impacts. As long-term rail transportation contracts come up for renewals, the railroads have placed upward pressure on delivered coal costs to increase revenues and support the expansion of new track capacity and related facilities..

5.2.2 Oil

Steady growth in oil demand, reflected in a continuation of tight supplies, will continue to result in high oil prices in the future. Due to volatility in the world energy market for crude oil and

refined products, local markets for fuel oils will continue to transmit volatility to the energy market. Additional pressure to market pricing will be applied by governmental rules and laws for improved fuel qualities and the use of only ultra-low sulfur oil required by 2013.

5.2.3 Natural Gas

Continued extreme price volatility is expected. While natural gas prices have been forecasted to decline over the next few years and then increase over the long term, price volatility will be significantly impacted by weather related events and world market conditions. Rising demand for natural gas in all sectors of industry cannot be met solely by increasing domestic natural gas production. Thus, there will be additional pressure on imports of liquefied natural gas (LNG) to meet the future requirement for natural gas. Supply and demand are expected to remain in balance over the long term, but short-term imbalances will have a significant impact on prices. The natural gas market prices have been linked to world energy markets, which could be supported by an international gas cartel in the future.

5.2.4 Coal/Gas Price Differential

Seminole's underlying fuel price forecast assumes that a significant spread will continue to exist within the forecast period and beyond between coal and gas. This coal/gas price differential is the primary economic driver for Seminole's strategy to add coal capacity to the generation mix in 2016 to meet base load needs. Seminole's base fuel price forecast for this Ten-Year Site Plan takes into account future carbon emission initiatives, such as taxation or emission credits, that will impact the market prices for all fuels.

If legislation that penalizes carbon emissions is enacted in future years, Seminole's costs to use all fossil fuels will rise since all fossil fuels emit carbon dioxide when burned. Seminole has

performed sensitivities which suggest that the forecast coal/gas price differential is significant enough to retain coal as the economically favored base load fuel option even in conjunction with a moderate carbon emissions cost. In the event that carbon emissions legislation is passed, the market value and associated price of natural gas in the existing unregulated commodity market may rise to compensate to some degree for the penalty imposed on coal, the competing fuel.

5.3 Modeling of Generation Unit Performance

Existing units are modeled with forced outage rates and heat rates for the near term based on recent historical data. The long term rates are based on a weighting of industry average data and expected or manufacturers' design performance data.

5.4 Financial Assumptions

Expansion plans are evaluated based on Seminole's forecast of market-based loan fund rates.

5.5 Generation Resource Planning Process

Seminole's primary long-range planning goal is to develop the most cost-effective way to meet its Members' load requirements while maintaining high system reliability. Seminole's optimization process for resource selection is based primarily on total revenue requirements. For a not-for-profit cooperative, revenue requirements translate directly into rates to our Member distribution cooperatives. The plan with the lowest revenue requirements is generally selected, assuming that other factors such as reliability impact, initial rate impact, and strategic considerations are neutral. Seminole also recognizes that planning assumptions change over time so planning decisions must be robust and are, therefore, tested over a variety of sensitivities. A flow chart of Seminole's planning process is shown in Figure 4.

The impact of DSM and conservation in Seminole's planning process is included in the load

forecast. Given the nature of Seminole's power supply arrangements, reduction in peak demand does not usually affect the operation of Seminole's generating resources in the PEF area, but instead reduces the amount of PR purchases required from PEF. However, in Seminole's direct serve area and the FPL area, DSM reduces peak demand and Seminole resource needs to meet the demand.

Seminole considers cost effective energy efficiency and conservation resources as its first priority resource option in meeting future expansion needs. Seminole has committed to work jointly with its Members to assess the feasibility and effectiveness of demand-side resources.

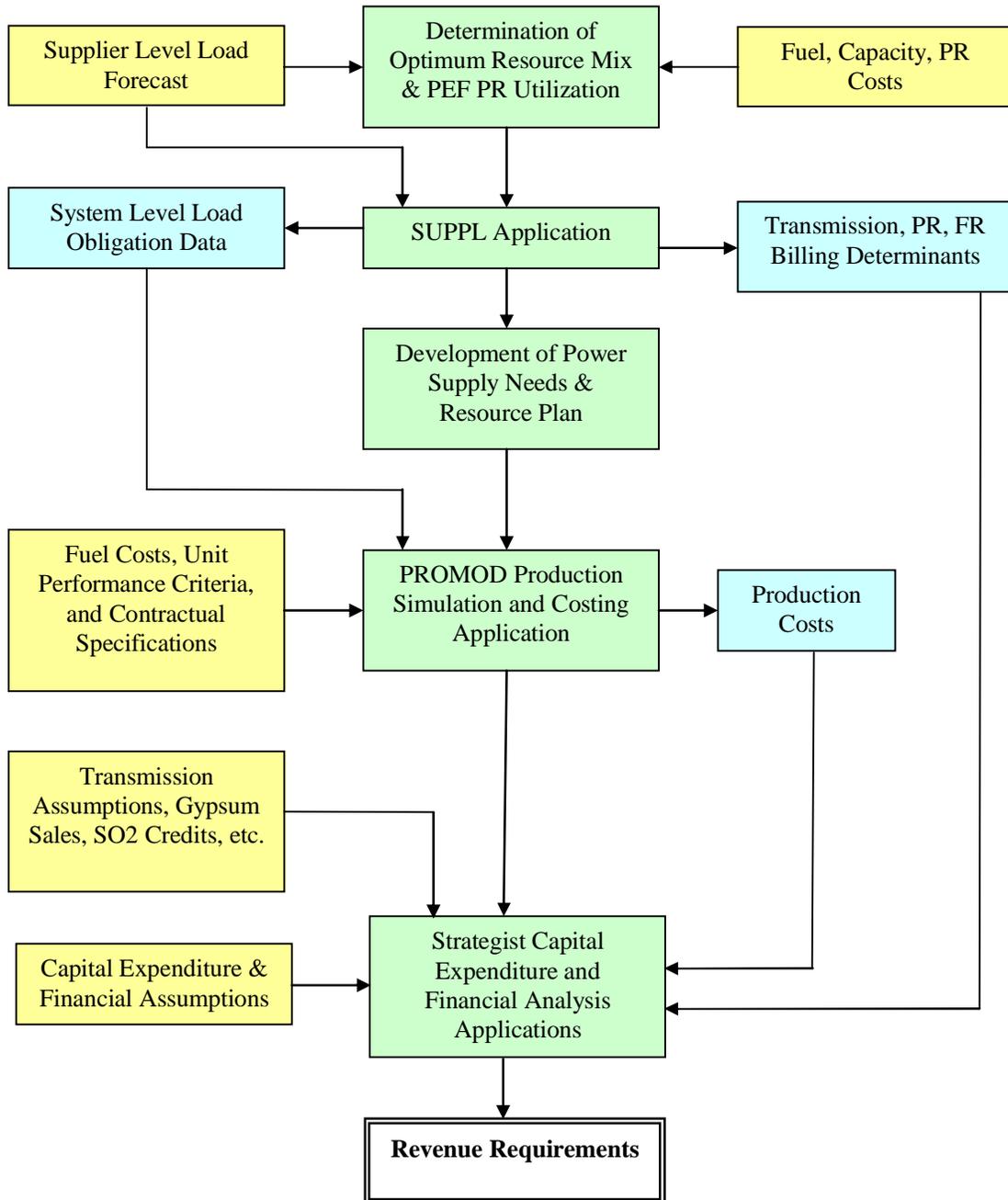
5.6 Reliability Criteria

The total amount of generating capacity and reserves required by Seminole is affected by Seminole's load forecast and its reliability criteria. Reserves serve two primary purposes: to provide replacement power during generator outages and to account for load forecast uncertainty. Seminole has two principal reliability criteria: (1) a minimum reserve margin of 15% during the peak season, and (2) a 1% expected unserved energy (EUE) limitation. Both the minimum reserve margin and EUE criteria serve to ensure that Seminole has adequate generating capacity to provide reliable service to its Members and to limit Seminole's reliance on interconnected neighboring systems for emergency purchases.

In addition to these two primary reserve criteria, Seminole also adheres to an additional criterion to ensure that it maintains winter reserve capacity to cover weather sensitivity during the winter season. This additional criterion was implemented due to the amount of Seminole's weather-sensitive load in conjunction with the restrictions on the use of Hardee Power Station capacity through the winter season of 2012.

Figure 4

Resource Planning Process



5.7 Strategic Concerns

In the current rapidly changing utility industry, strategic and risk related issues are becoming increasingly important and will continue to play a companion role to economics in Seminole's power supply planning decision process.

Seminole values resource flexibility as a hedge against a variety of risks, as evidenced by a generation portfolio which includes as much purchased capacity as owned capacity. Owned and/or other long-term purchased resources contribute stability to a power supply plan while short-term purchase arrangements add flexibility. For purchased power agreements, system-type capacity versus unit-specific power is also a consideration. System capacity, which is sourced from many generating units, is more reliable, and agreements can be structured to reduce Seminole's reserve requirements. Flexibility in fuel supply is another significant strategic concern. A portfolio that depends on diverse fuel requirements is better protected against extreme price fluctuations, supply interruptions, and transportation instability. Seminole believes that the existing and future diversity in its power supply plan has significant strategic value, leaving Seminole in a good position to respond to market and industry changes.

Seminole's decision to add a third coal unit at SGS is for reliability and economic reasons, but also to avoid an over-reliance on natural gas for Seminole's future energy needs. The addition of the third coal unit is consistent with Seminole's fuel and portfolio diversity goals.

The ongoing debate over the need to regulate carbon emissions has introduced a new risk for electric utilities – the risk that the most cost-effective fuels and associated technologies under current environmental regulations could change via new federal or state emissions rules. Using the best available information, Seminole has addressed this issue through its evaluation of a range of

scenarios to assess what constitutes the best generation plan to ensure adequate and competitively priced electric service to its Members.

5.8 Procurement of Supply-side Resources

Seminole plans to continue to use its all-source RFP process in conjunction with the evaluation of self-build alternatives, as the primary means of making decision on future power supply needs. In its purchased power bids, Seminole solicits proposals from utilities, independent power producers, QFs, renewable energy providers, and power marketers. Options which are proposed through the RFP process are compared to Seminole's self-build alternatives. Seminole's evaluation among its options includes an assessment of life cycle cost, reliability, strategic and risk elements.

5.9 Transmission Plans

The following table lists all 69 kV and above projects for new, upgraded, or reconfigured transmission facilities planned by Seminole over the ten-year planning horizon that are required for new generation facilities.

Status	Line Terminals		Circuits	Line Miles	Commercial In-Service Date	Nominal Voltage (kV)	Capacity (MVA)
	From	To					
Upgrade	Seminole Plant	Silver Springs N	2	49.8	2016	230	1139
New	Gilchrist Plant	Gilchrist East Switching Station	2	10	2015	230	1139

5.9.1 Transmission Facilities for Seminole Generating Station Expansion

In May 2016, Seminole plans to add a third coal-fired generating unit at SGS with a nominal output of 750 MW. The following substation upgrades would be required for the addition of SGS

Unit 3:

- Upgrade the fault duty of all breakers at SGS to 63 kA.
- Upgrade SGS/Silver Springs North circuit #1 and SGS/Silver Springs North circuit #2 line terminals at SGS to 3000 Amps.
- Upgrade the SGS/Silver Springs North circuit #1 and SGS/Silver Springs North circuit #2 line terminals at the Silver Springs North switchyard to 3000 Amps.

5.9.2 Transmission Facilities for Gilchrist Generating Station

By December 2015, Seminole plans to construct three 170 MW class gas-fired combustion turbine units at a new site in Gilchrist County. The following transmission system additions would be required for the addition of the Gilchrist units:

- Construction of a new Gilchrist East switching station along the existing PEF Ft. White – Newberry 230 kV transmission line.
- Construction of two new 230 kV circuits (rated at 3000 Amps), ten miles in length apiece, to connect the Gilchrist generating station to the new Gilchrist East switching station.

Schedule 9
Status Report and Specifications of Proposed Generating Facilities

1	Plant Name & Unit Number	Gilchrist Generating Station Unit Nos. 1 – 3
2	Capacity a. Summer (MW): b. Winter (MW):	158 (each) 170 (each)
3	Technology Type:	GE 7FA Combustion Turbine
4	Anticipated Construction Timing a. Field construction start-date: b. Commercial in-service date:	May 2010 December 2015
5	Fuel a. Primary fuel: b. Alternate fuel:	Natural Gas #2 Oil
6	Air Pollution Control Strategy	Dry Low NOx Burner
7	Cooling Method:	Air
8	Total Site Area:	Approximately 530 acres
9	Construction Status:	Planned
10	Certification Status:	Planned
11	Status With Federal Agencies	N/A
12	Projected Unit Performance Data Planned Outage Factor (POF): Forced Outage Factor (FOF): Equivalent Availability Factor (EAF): Resulting Capacity Factor (%): Average Net Operating Heat Rate (ANOHR):	0.5 5.0 95 85% 11,800 BTu/KWh (HHV)
13	Projected Unit Financial Data (\$2008) Book Life (Years): Total Installed Cost (In-Service Year \$/kW): Direct Construction Cost (\$/kW): AFUDC Amount (\$/kW): Escalation (\$/kW): Fixed O&M (\$/kW-Yr): Variable O&M (\$/MWh): K Factor:	30 1240 1150 90 Included in values above 4.08 1.63 N/A

**Schedule 9
Status Report and Specifications of Proposed Generating Facilities**

1	Plant Name & Unit Number	Seminole Generating Station Unit No. 3
2	Capacity a. Summer (MW): b. Winter (MW):	750 750
3	Technology Type:	Pulverized Coal
4	Anticipated Construction Timing a. Field construction start-date: b. Commercial in-service date:	March 2012 May 2016
5	Fuel a. Primary fuel: b. Alternate fuel:	Coal N/A
6	Air Pollution Control Strategy	Precipitator, SCR, Wet Scrubber, Wet ESP, Combustion Controls
7	Cooling Method:	Cooling towers
8	Total Site Area:	Approximately 172.8 acres
9	Construction Status:	Planned
10	Certification Status:	Certification granted by FDEP on August 18, 2008
11	Status With Federal Agencies	
12	Projected Unit Performance Data Planned Outage Factor (POF): Forced Outage Factor (FOF): Equivalent Availability Factor (EAF): Resulting Capacity Factor (%): Average Net Operating Heat Rate (ANOHR):	7.0 4.0 89 85% 9,610 BTu/KWh (HHV)
13	Projected Unit Financial Data (\$2008) Book Life (Years): Total Installed Cost (In-Service Year \$/kW): Direct Construction Cost (\$/kW): AFUDC Amount (\$/kW): Escalation (\$/kW): Fixed O&M (\$/kW-Yr): Variable O&M (\$/MWH): K Factor:	30 4466 3622 844 Included in values above 25.84 0.72 N/A

Schedule 10
Status Report and Specifications of Proposed Associated Transmission Lines

1	Point of Origin and Termination:	Originating at SECI's Gilchrist plant site; terminating at SECI's Gilchrist East Switching Station
2	Number of Lines:	Two
3	Right-of-Way	To be determined
4	Line Length:	10 miles each
5	Voltage:	230 KV
6	Anticipated Construction Timing:	December 1, 2012
7	Anticipated Capital Investment:	\$24 million (total)
8	Substation:	The Gilchrist Interconnection will require a new Seminole Gilchrist East switching station on the PEF Ft. White – Newberry 230 kV transmission line
9	Participation with Other Utilities:	N/A

6. ENVIRONMENTAL AND LAND USE INFORMATION

6.1 Seminole Generating Station (SGS) - Putnam County, Florida

SGS is located in a rural unincorporated area of Putnam County approximately 5 miles north of the City of Palatka. The site is 1,978 acres bordered by U.S. 17 on the west, and is primarily undeveloped land on the other sides. The site was certified in 1979 (PA78-10) for two 650 MW class coal fired electric generating units, SGS Units 1 & 2. On March 9, 2006, Seminole submitted a supplemental site certification application pursuant to the Florida Electrical Power Plant Siting Act for SGS Unit 3, a 750 MW coal fired electrical generating unit to be located adjacent to the existing units. SGS Unit 3 was originally scheduled to go into commercial operation in May 2012. The project received Florida Public Service Commission approval for the need on August 7, 2006 and final State Land Use approval from the Power Plant Siting Board on December 5, 2006. Final Certification was expected in April 2007. However, on August 20, 2007, the FDEP issued a Final Order denying Seminole's application for certification based on procedural issues associated with approval of facilities under the Power Site Siting Act. Seminole appealed the FDEP's decision through the Fifth District Court of Appeal, and Final Certification was issued on August 18, 2008. The FDEP issued a final Prevention of Significant Deterioration permit on April 3, 2008. This permit is now subject to additional third party appeals which have delayed the in-service date of SGS Unit 3 until May 2016.

A significant portion of the site has previously been cleared of vegetation and graded to accommodate Units 1 and 2. Units 1 and 2 went into commercial operation in February and December of 1984, respectively. The area around the SGS site includes mowed and maintained grass fields and upland pine flatwoods. Areas further away from the existing units include live oak

hammocks, wetland conifer forest, wetland hardwood/conifer forest, and freshwater marsh. A small land parcel located on the St. Johns River is the site for a water intake structure, wastewater discharge structure, and pumping station to supply the facility with cooling and service water.

The primary water uses for SGS Unit 3 will be for cooling water, wet flue gas desulfurization makeup, steam cycle makeup, and process service water. Cooling and service water will be pumped from the St. Johns River and groundwater supplied from on-site wells will be for steam cycle makeup and potable use. The site is not located in an area designated as a Priority Water Resource Caution Area by the St. Johns River Water Management District.

State-listed species that are likely to occur on the site include the bald eagle, the indigo snake, and the gopher tortoise. No known listed plants occur on the site. The site has not been listed as a natural resource of regional significance by the regional planning council.

SGS Unit 3 will impact one small shrub wetland area and a portion of forested wetlands and wetland prairie associated with a new pipeline supplying water from the river. Mitigation for these impacts will be in accordance with the requirements of the FDEP.

The local government future land use for the area where the existing units and proposed SGS Unit 3 are located is designated as industrial use.

Water conservation measures that will be incorporated into the design of SGS Unit 3 include the collection, treatment and recycling of plant process wastewater streams from SGS Unit 3 as well as Units 1 and 2. This wastewater reuse will minimize groundwater and service water uses. Small amounts of recirculated condenser cooling water (cooling tower blowdown) will be withdrawn from the closed cycle cooling tower and discharged to the St. Johns River. Site stormwater will be reused to the maximum extent possible and any not reused will be treated in wet detention ponds and

released to onsite wetlands.

The primary fuel for SGS Unit 3 will be bituminous coal. No. 2 (distillate) fuel oil will be used for startups and flame stabilization. Coal is currently, and in the future will be, delivered to the site by unit trains and fuel oil is delivered by truck. Coal for SGS Unit 3 will be stored at the site, which requires additional area and equipment to meet the requirements of the third unit. Coal pile stormwater will be collected, treated, and reused. An additional No. 2 fuel oil storage tank will be installed with the third unit. The plant maintains sufficient secondary containment for all storage tanks.

SGS Unit 3 is designed so that solid waste from the Flue Gas Desulfurization (FGD) system will be treated to produce wallboard grade synthetic gypsum and sold for use in producing wallboard. Flyash will be reused as an additive for cement and concrete. Any solid wastes that are not recycled will be stored in a double lined landfill equipped with leachate collection or transported to a permitted landfill facility.

SGS Unit 3 will utilize advanced supercritical coal boiler technology with state of the art emission controls meeting the EPA requirement for Best Available Control Technology. Air emission control systems will include Selective Catalytic Reduction (SCR) for NO_x control, wet FGD systems for SO₂ control, dry electrostatic precipitators (ESP- the collection and removal of fine particulate matter), and a wet ESP for acid gas removal. These technologies will also remove more than 90% of the mercury contained in the flue gas.

Noise emissions during operation of SGS Unit 3 will not result in sound levels in excess of the Putnam County Noise Control Ordinance. Intermittent noise sources during startup, testing, maintenance, and emergency conditions may result in elevated noise levels for short durations but

are not expected to cause a nuisance.

Additional information concerning SGS Unit 3 can be found in the "Site Certification Application and Environmental Analysis, Seminole Generating Station Unit 3" submitted to the FDEP.

6.2 Midulla Generating Station (MGS) – Hardee County, Florida

MGS is located in Hardee and Polk Counties about nine miles northwest of Wauchula, 16 miles south-southwest of Bartow, and 40 miles east of Tampa Bay. The site is bordered by County Road 663 on the east, CF Industries on the south, and Mosaic, Inc. on the north and west. Payne Creek flows along the sites south and southwestern borders. The site was originally strip-mined for phosphate and was reclaimed as pine flatwoods, improved pasture, and a cooling reservoir with a marsh littoral zone. A more detailed description of environmental and land use is available in the site certification application PA-89-25SA.

Seminole modified its site certification to construct 310 MW of combustion turbine peaking units at the MGS site. These units began commercial operation in December 2006.

6.3 Gilchrist Generating Station Site – Gilchrist County, Florida

The Gilchrist Generating Station site is approximately 530 acres in size. The site is located in the central portion of Gilchrist County, approximately 8 miles north of the City of Trenton. Much of the site has been used for silviculture (pine plantation) and consists of large tracts of planted longleaf and slash pine communities. Few natural upland communities remain. There exist large tracts that have been recently harvested, leaving xeric oak and pine remnants. A few wetland communities remain on the east side of the site with relatively minor disturbances due to adjacent silvicultural activities.