

Undocketed filings for 2018: 20180000-OT

Filed By: JEA, Mary L. Moran, 21 W. Church Street, Jacksonville, FL 32202, 904.665.6216

1. With respect to the forecasting methodology, procedures, and models developed associated with Winter and Summer Peak Demand, please specify all the differences/ modifications/ improvements, if any, between what was used in JEA’s 2017 and 2018 Ten-Year Site Plans (TYSP).

JEA’s forecasting methodology/procedures/models have not change from 2017 to 2018.

2. For the 2018 TYSP, please identify and explain the measures and/or criteria, if any, JEA used to ensure the models of peak demand adequately explain historical variations and to enhance forecasting accuracy.

Over the past few years, JEA has taken a deeper look at specific large commercial customer load, trends and forecasts. JEA’s contract with FPUC ended December 31, 2017. Historically, FPUC provided JEA their peak and energy forecast. Moving forward, JEA will be working to better account for and remove FPUC’s historical impact on JEA’s forecast.

3. Please identify and explain the new measures, if any, JEA used to address the uncertainty inherent in the process of peak demand forecasting for the 2018 TYSP.

JEA has not adopted any new measures.

4. Please provide the Historical Forecast Accuracy associated with JEA’s Winter Peak Demand and Summer Peak Demand for the period 2013-2017.

Table 1. Accuracy of JEA’s Winter Peak Demand Forecasts

Forecast Actual	Winter Peak Demand Forecast Error Rate (%)					Average
	Forecasting Period Prior					
	5	4	3	2	1	
	2008 TYSP	2009 TYSP	2010 TYSP	2011 TYSP	2012 TYSP	–
2013	(23.1%)	(14.7%)	(18.0%)	(20.7%)	(14.4%)	(18.2%)
	2009 TYSP	2010 TYSP	2011 TYSP	2012 TYSP	2013TYSP	–
2014	(7.5%)	(11.6%)	(14.0%)	(7.4%)	(5.1%)	(9.1%)
	2010 TYSP	2011 TYSP	2012 TYSP	2013TYSP	2014 TYSP	–
2015	(12.6%)	(14.3%)	(7.5%)	(4.5%)	8.7%	(6.0%)
	2011 TYSP	2012 TYSP	2013 TYSP	2014 TYSP	2015 TYSP	–
2016	(21.4%)	(15.0%)	(11.5%)	0.1%	(0.7%)	(9.7%)
	2012 TYSP	2013 TYSP	2014 TYSP	2015 TYSP	2016 TYSP	–
2017	(22.5%)	(18.5%)	(8.2%)	(8.5%)	(12.3%)	(14.0%)

Note: Forecast error rate compared Actual peak demand to Firm peak demand forecast.

Table 2. Accuracy of JEA’s Summer Peak Demand Forecasts

Forecast Actual	Summer Peak Demand Forecast Error Rate (%)					Average
	Forecasting Period Prior					
	5	4	3	2	1	
	2008 TYSP	2009 TYSP	2010 TYSP	2011 TYSP	2012 TYSP	–
2013	(17.6%)	(11.8%)	(7.5%)	(12.8%)	(2.5%)	(10.4%)
	2009 TYSP	2010 TYSP	2011 TYSP	2012 TYSP	2013TYSP	–
2014	(12.2%)	(31.6%)	(12.4%)	(2.0%)	0.2%	(11.6%)
	2010 TYSP	2011 TYSP	2012 TYSP	2013TYSP	2014 TYSP	–
2015	(32.0%)	(12.5%)	(2.0%)	0.9%	6.8%	(7.8%)
	2011 TYSP	2012 TYSP	2013 TYSP	2014 TYSP	2015 TYSP	–
2016	(11.2%)	(0.1%)	3.1%	8.9%	6.4%	1.4%
	2012 TYSP	2013 TYSP	2014 TYSP	2015 TYSP	2016 TYSP	–
2017	(4.4%)	(0.6%)	4.6%	2.8%	1.7%	0.8%

Note: Forecast error rate compared Actual peak demand to Firm peak demand forecast.