



**Department of Energy**  
Western Area Power Administration  
Desert Southwest Customer Service Region  
P.O. Box 6457  
Phoenix, AZ 85005-6457

**Via Email: [jmt@krsaline.com](mailto:jmt@krsaline.com)**

**MAR 19 2012**

Ms. Jennifer Torpey  
K. R. Saline & Associates, PLC  
160 North Pasadena, Suite 101  
Mesa, AZ 85201-6764

**Re: Aguila Irrigation District 5-year Integrated Resource Plan**

Dear Ms. Torpey:

Thank you for submitting this plan to Western Area Power Administration (Western). The report, dated December 12, 2011, covers the reporting period of **2012 through 2016**. This letter is your formal notice that this report has been reviewed and approved.

Data from all customers will be included in our annual report which is provided to Congress and others.

For annual updates, please use our automated on-line reporting system at <http://www.wapa.gov/FormsAuth/Login.aspx?ReturnUrl=/irpsubmit/irpsubmit.aspx>.

Western has a wide range of information on our Energy Services web site, [www.wapa.gov/es](http://www.wapa.gov/es), which may help you implement your plan. You may also call our PowerLine at (800) 769-3756 for personal assistance. If you do not have access to the web site, have questions on the guidelines, or need assistance in implementing your report action plan, please contact me at (602) 605-2659 or [colletti@wapa.gov](mailto:colletti@wapa.gov).

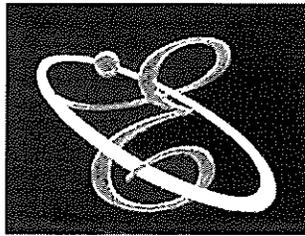
Please do not hesitate to call if I may be of further assistance in this or any other Energy Services related matter.

Sincerely,

A handwritten signature in black ink that reads "Audrey Lynn Colletti".

Audrey Lynn Colletti  
Public Utilities Specialist

cc: Darrick Moe  
Joe Mulholland  
Jay Moyes



ENERGY OUTFITTERS, LLC

**Via E-mail & USPS**

January 5, 2011

Mr. Darrick Moe  
Regional Manager  
Western Area Power Administration  
Desert Southwest Region  
P. O. Box 6457  
Phoenix, AZ 85005-6457

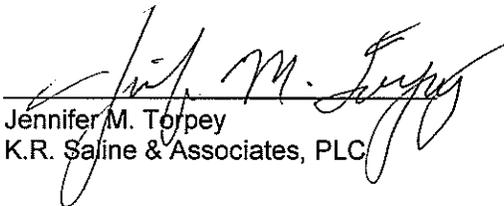
Re: Aguila Irrigation District Integrated Resource Plan

Dear Mr. Moe,

As you know, Western Area Power Administration's ("Western") Integrated Resource Planning Approval Criteria require Western's customers to submit updated Integrated Resource (or Small Customer) Plans to the appropriate Regional Manager every five years after Western's approval of the initial Plan. Enclosed on behalf of Aguila Irrigation District ("AID"), pursuant to 10 C.F.R. § 905.13(b), is the third five-year update to AID's Integrated Resource Plan. This update was approved by AID's Board of Directors at a public meeting held on December 12, 2011.

If you have any questions regarding this Integrated Resource Plan, please do not hesitate to contact me.

Sincerely,



Jennifer M. Torpey  
K.R. Saline & Associates, PLC

Enclosure

cc: Jay Moyes (w/encl.)  
Joe Mulholland (w/encl.)  
Audrey Colletti (electronic only)

# **INTEGRATED RESOURCE PLAN**

**THIRD FIVE-YEAR UPDATE**

**AGUILA IRRIGATION DISTRICT**

December 12, 2011

# Table of Contents

	<u>Page #</u>
Profile Data	
<u>Board of Directors</u>	3
<u>Contact Persons</u>	3
District Goals and Objectives	5
Competitive Situation	
<u>District Contract Information</u>	5
<u>Regulations Applicable to District</u>	5
<u>Competition With District Service</u>	5
Load and Resource Information	
<u>Historical and Five-Year Load Forecast</u>	6
<u>Load Profile Information</u>	6
<u>Supply Side Resources</u>	6
<u>Demand Side Resources</u>	8
Identification and Comparison of Resource Options	8
Designation of Options	8
Action Plan	
<u>Resource Action Plan</u>	9
<u>Conservation Action Plan</u>	10
<u>Validation and Evaluation</u>	10
Environmental Effects	11
Public Participation	12
Appendices	
Appendix A—Map of District Boundary	
Appendix B—Rate Schedule	
Appendix C—Load and Resource Information	
Appendix D—Integrated Resource Plan Public Meeting Notice	

## Profile Data

Aguila Irrigation District (“AID” or “the District”) is a political subdivision of the State of Arizona. AID is an irrigation district formed pursuant to Title 48 Chapter 19 of the Arizona Revised Statutes. The District was formed in 1938 and re-activated in 1984 for the purpose of providing power primarily for use in pumping water for irrigation. AID has been providing electrical service to its service area since 1987.

AID is located primarily in western Maricopa County, with a small portion in La Paz County, Arizona. The District has a service area of approximately 30,000 acres, nearly all of which are irrigable acres. AID serves predominantly irrigation pumping loads, with a small amount of other agriculturally related loads. The irrigation pumps served by the District are owned and operated by the District’s customers, as are the other agriculturally related facilities. A map of AID’s service area is provided in **Appendix A**.

AID is governed by a three-member Board of Directors elected by freeholders of property within AID’s boundaries. Its current staff consists of a part-time manager and part-time administrative support. The District’s current Board of Directors and relevant contact persons are detailed below.

- **Board of Directors**

Paul Fleming  
Stephen Martori  
[vacant]

- **Contact Persons**

Paul Fleming  
President  
Aguila Irrigation District  
7332 E. Butherus Dr., Suite 200  
Scottsdale, AZ 85260-2426  
Ph: (480) 998-1444

Jay I. Moyes, Legal Counsel  
Moyes Sellers & Hendricks, Ltd.  
1850 N. Central Ave., Ste.1100  
Phoenix, AZ 85004-4541  
Ph: (602) 604-2141  
Fax: (602) 274-9135  
jimoyes@law-msh.com

Jeffrey Woner, District Manager  
K. R. Saline & Associates, PLC  
160 N. Pasadena, Ste. 101  
Mesa, AZ 85201-6764  
Ph: (480) 610-8741  
Fax: (480) 610-8796  
jjw@krsaline.com

AID purchases Hoover power and related firming power resources (collectively, the Hoover Resources) from the Arizona Power Authority (“the Authority”), and it also purchases supplemental power from Arizona Public Service Company (“APS”). In addition, AID is a party to the Hoover Resource Exchange Program that permits AID and other similarly situated utilities to integrate and exchange Hoover Resources. The power and energy from APS and the Authority are transmitted over the Parker-Davis transmission system, the Pacific Northwest-Pacific Southwest Intertie transmission system and the transmission system of APS. Under a contract with APS, the power and energy are delivered over APS’s facilities from the transmission system delivery points to the customers of AID. AID does not own any portion of the electrical transmission or distribution system. Certain distribution transformers located at AID customer locations are owned by certain AID customers.

AID currently levies an assessment through the Maricopa and La Paz County assessors to cover a portion of its operating expenses; the remainder of its expenses is met with power revenues. The policies for service and rates for power provided by AID to its customers are determined and set by its Board of Directors. A copy of AID’s current rate schedule is attached as **Appendix B**.

The overall financial feasibility of the farming operations of AID landowners is materially dependent upon the cost of AID electrical power to pump the irrigation water. AID purchases the majority of its power resources from the Authority and APS.

The current projection of the District loads for the upcoming two-year period does not indicate that additional resources are needed. The scheduling and utilization of the District’s resources has been managed through the Resource Exchange Program for the Hoover Resources. This resource management program has provided the necessary flexibility for the District to re-pattern its resources monthly to meet its changing loads. With the continuation of this program, and careful management of current loads and resources, there is not any need for additional resources for the District in the near term. Therefore, the District will use its current entitlements of Hoover Resources with intermittent purchases of APS supplemental power to meet its projected loads through the two-year planning period. For the five-year planning period, a need for additional resources was identified. For this timeframe, the District anticipates using its Hoover resource entitlement, the Resource Exchange Program, and APS and Southwest Public Power Resources Group (“SPPR Group”) resources to meet its projected loads.

## **District Goals and Objectives**

- Provide Reliable Electric Power at Lowest Practicable Cost, Consistent With Sound Business Principles
- Enhance Customer Financial Stability by Providing Services Which Enhance Property Values and Provide Long-Term Stability in Electric Power Rates
- Promote Energy Efficiency and the Effective Management of Water and Power Resources

## **Competitive Situation**

- **District Contract Information**

Arizona Power Authority (Hoover Power Contract)  
 Power Supply and Services Agreement with APS [Approved by FERC]  
 Southwest Public Power Resources Group/Sempra Generation (Power Purchase Agreement)

- **Regulations Applicable to District**

Energy Planning and Management Program (EPACT '00)

- **Competition With District Service**

APS provides retail service in direct competition to District service and has several retail rates that are openly available to the customers of AID. In many instances, APS and AID serve power to different loads of the same customer.

There is competition for leasing the farm ground within AID. Many of the landowners in AID and other districts lease ground to tenant farmers at net rates based upon land cost and water costs (i.e., pumping costs). Therefore, to the extent that the pumping electrical costs in AID become significantly higher than other areas, AID's landowners will be disadvantaged in the competition for tenant farmers, which may significantly impact the irrigated acreage and electric load of the District, as well as further depress property values.

## Load and Resource Information

- **Historical and Five-Year Load Forecast:**

Oct-Sep	Winter Demand CP @ Sub (kW)	Summer Demand CP @Sub (kW)	Peak Annual Growth	Energy @Substation (kWh)	Energy @Meters (kWh)	Load Factor
2002	6,014	6,685		32,030,344	30,268,675	55%
2003	6,434	6,279	-4%	32,280,568	30,505,137	57%
2004	4,683	7,309	14%	30,548,803	28,868,619	48%
2005	6,003	6,931	-5%	24,827,438	23,461,929	41%
2006	6,189	8,167	18%	31,691,462	29,948,431	44%
2007	6,363	8,464	4%	36,944,926	34,912,955	50%
2008	6,635	7,752	-8%	34,774,012	32,861,440	51%
2009	6,590	7,541	-3%	30,701,475	29,012,894	46%
2010	4,864	6,476	-14%	24,024,576	22,703,223	42%
2011	6,492	7,973	23%	39,988,053	37,788,711	57%
<b>Current Forecast</b>						
2012	6,492	7,973	0%	39,988,053	37,788,711	57%
2013	6,492	7,973	0%	39,988,053	37,788,711	57%
2014	6,492	7,973	0%	39,988,053	37,788,711	57%
2015	6,492	7,973	0%	39,988,053	37,788,711	57%
2016	6,492	7,973	0%	39,988,053	37,788,711	57%

See **Appendix C** for a summary of the historical monthly load information and a graphic illustration of how the District schedules its resources to cover its loads in a typical year.

- **Load Profile Information**

Agriculture Related—100%

See **Appendix C** for a graphical illustration.

- **Supply Side Resources**

The District anticipates that current federal resources under contract, managed through the continuation of the Resource Exchange Program, will be sufficient for the District to meet its monthly power and energy requirements through the short-term planning period when supplemented by APS power that will continue to be

purchased from time-to-time to cover any short-term power shortfalls. For the long-term planning period, the District has determined to secure an additional long-term resource to diversify its portfolio of suppliers and provide additional options for firming through the Resource Exchange Program.

As described in the District's prior Plan, AID spent several years participating with the SPPR Group in evaluating future resource opportunities. The SPPR Group is an association of forty not-for-profit electric utilities, including cooperatives, municipalities, tribal power authorities, and irrigation and electric districts providing service in Arizona, California, and Nevada. Taking advantage of the Group's size to broaden the scope of possible supplies, multiple options for resources were considered, including both construction of a generating unit and purchase of a portion of an existing generating unit. Ultimately, however, both of these options became infeasible due to economic and regulatory circumstances. The Group then issued a Request for Proposals ("RFP"), in response to which a variety of proposals could be submitted, including unit contingent proposals, turnkey proposals, 25-year purchase power agreements, slice of utility system offers in which the sale would be treated with the same firmness as native load, and the sale of existing generating units. The RFP was later modified to reflect the changing requirements of the participants, and required bids to be for unit contingent power or firm power from dedicated units, including slice of system sales. Bids were also required to be for fully dispatchable service. Ultimately, due to economic and other considerations, it was determined that the most practicable option was a long-term power purchase agreement. Beginning January 1, 2015, the District will begin operating, as a member of the SPPR Group, under its new Power Purchase Agreement with Sempra Generation.

Detailed below are the District's current contractual commitments:

Arizona Power Authority (Hoover Resources) at Eagle Eye Substation:

- Hoover A & B Capacity & Energy
  - 6,050 kW (Maximum with Hoover Firming Capacity)
  - 12,227,000 kWh (Contract Entitlement)
- Expires September 30, 2017

Power Supply and Services Agreement (APS)

- Capacity & Energy as needed
- Wheeling from Buckeye Substation to meters
- Meter Reading and Customer Billing Services
- Losses from Substation to Meters
  - Capacity loss factor: 7.9 %
  - Energy loss factor: 5.5 %
- Expires December 31, 2020

Power Purchase Agreement (Sempra Generation—through SPPR Group)

- Firm Capacity and Energy

- 3,000 kW
- Energy as needed
- Effective January 1, 2015; expires December 31, 2039

- **Demand Side Resources**

The majority of the District's electric power is utilized to pump groundwater for agricultural purposes. The following is a list of some of the on-going water conservation practices which are implemented by the District's customers to efficiently utilize groundwater and thereby electricity. Most notably, a substantial amount of the acreage being farmed in the District is now irrigated using drip irrigation systems, providing maximum conservation of water and minimum requirement of electricity for groundwater pumping.

Subsoil Drip Irrigation Systems	Graded Furrow or Border	Use of Gated Pipe
Cut-Back Irrigation	Portable Sprinklers	Micro spray Systems
Angled Rows	Uniform Slopes	Tail Water Recovery
Shortened Field Lengths	Deficit Irrigation	Irrigation Scheduling
Land Leveling	Soil & Water Amendments	Concrete Ditch Lining
Precision Tillage	Cropping Pattern-Winter vs. Summer	Alternate Furrow Irrigation

## **Identification and Comparison of Resource Options**

The identification of options for additional resources within this IRP is coordinated through an examination of the costs and benefits for each resource. Because the majority of the District's customers already implement numerous irrigation and agricultural efficiency practices in their operations, opportunities for additional energy savings through demand side management ("DSM") are very limited. However the District will continue to look for feasible additional opportunities for energy savings from evolving technological advances in agricultural practices. To the extent practicable, the District will also endeavor to promote customer awareness of pumping workshops and other similar forums for further education on advancements in water conservation practices and technology.

## **Designation of Options**

If additional resources are needed, the least cost option is identified from a cost benefit analysis. This information is considered by the Board of Directors in public meetings and combined with other information to select an Action Plan for the District which

conforms to the regulations and guidelines of the Energy Planning and Management Program. The selection of the District's Action Plan also includes consideration for reliability of service, economics, rate impacts and price elasticity, environmental effects, regulatory impacts and risks, legal considerations and risks, competitive impacts, social acceptance and public considerations and any other factors which may be identified from time-to-time which may be pertinent in selecting or implementing an Action Plan.

## Action Plan

- **Resource Action Plan**

The time period covered by the District's Action Plan is the five-year period from 2012 through 2016.

The District has determined that to provide reliable electric power at the lowest practicable cost, consistent with sound business principles, the District will continue using its entitlements of Hoover power to supply much of its projected power requirements over the five-year planning period. The current federal resources and continuation of the Authority Hoover Resource Exchange Program will be sufficient for the District to meet its monthly power and energy requirements through the short-term planning period with some purchases of APS supplemental power that will continue to be made from time-to-time to cover any short-term power deviations.

For the long-term planning period, the District has identified a need for additional resources, with the objective of increasing its options for firming resources purchased through the Resource Exchange Program, and to serve as a successor for long-term contracts which will terminate in coming years. Therefore, AID has entered into a long-term power purchase agreement as a member of a group of public power entities. Together with the District's existing contractual arrangements, this is anticipated to be sufficient to meet all of the District's requirements over the five-year planning period. No further resources will be required. The District continuously reevaluates the possible need for new resources, the availability of less costly resources and the potential for additional DSM activities. The District's Resource Action Plan enhances customer financial stability by providing services that will enhance property values and provide long-term stability in electric power rates.

Since no new resources are needed, there are no milestones to evaluate accomplishment of the Plan activities. Nevertheless, the District will monitor any adjustments to the Plan for the long-term resource needs and will annually review its electric loads and resources for any significant changes. In the event the loads of the District are projected to materially increase above those levels represented in the Load and Resource information, other than normal deviations due to cropping changes or weather impacts, the District will review its forecast

and evaluate the need for modifying its IRP and notify Western accordingly. In any event, the District will evaluate its load forecast and resource information in detail every five years and refresh its IRP, in accordance with Western's regulations.

- **Conservation Action Plan**

The District has decided to continue certain conservation activities to promote and maintain energy efficiency and customer awareness for conserving electric, water, and land resources.

**Period:** Calendar Year 2012 through 2016

**Activity:** Information Exchange Program

**Goal:** Continue funding AZMET Program to provide District farmers with real-time weather information to assist in scheduling irrigation.

**Activity Description:** AZMET Program

**Period:** Calendar Year 2012 through 2016

**Activity:** Information Exchange Program

**Activity Description:** Provide District customers with useful information on irrigation conservation practices.

- **Validation and Evaluation**

### **AZMET Program**

The District has been sponsoring the University of Arizona's Arizona Meteorological Network ("AZMET") program since 1999. This program provides meteorological data and weather-based information to agricultural and horticultural interests operating in southern and central Arizona. Meteorological data is collected from a network of automated weather stations located in both rural and urban production settings. This data includes temperature (air and soil), humidity, solar radiation, wind (speed and direction), and precipitation. AZMET also provides a variety of computed variables, including heat units (degree-days), chill hours, and reference crop evapotranspiration (ET<sub>o</sub>). This real-time information allows District customers to more accurately schedule irrigation application in keeping with current weather conditions. As irrigation is more efficient, less water must be pumped to meet the farming needs, which results in the conservation of energy. The Conservation Action Plan will be evaluated annually to determine whether or not the expected benefit to the farmers continues to be greater than the cost of continuing funding for the program.

## **Irrigation Conservation Support**

The District's farmers own and operate their own pumps, and conduct their own conservation and improvement activities on an annual basis. In an effort to support the District customers in these endeavors, the District will monitor industry communications for developments which might be of interest or assistance to them. Once identified, the District will communicate them to the District farm customers. In addition, the District will make itself available to assist the customers with further conservation activities should they request it. Overall, on a District wide basis, the ongoing conservation and improvement activities on the part of the District customers should result in overall efficiency improvements and energy savings.

## **Environmental Effects**

The District is required, to the extent practical, to minimize adverse environmental effects of new resource acquisitions. As noted above, the District has secured an additional long-term resource which will become effective January 1, 2015. In procuring this resource, the District worked collaboratively with a group of other similarly situated entities, known collectively as the SPPR Group. Options for meeting anticipated future needs were carefully considered, including the consideration of renewable resources. The SPPR Group also utilized an Independent Market Monitor bidding process overseen by the Arizona Corporation Commission to ensure the request for proposals process resulted in the best alternative, and provided an unbiased evaluation platform. However, no appropriate renewable resource was identified. The resource ultimately selected is output from a natural gas supplied plant. Selection of a gas fired generation source will help the District avoid future purchases from coal-fired generation, or market purchases from a blended fuel mix which may include nuclear or coal. For AID, the SPPR resource is intended to ultimately augment and displace current supplemental power supply arrangements which utilize a blend of thermal resources. In addition, the acquisition of this resource will allow the District the flexibility to incorporate additional renewable resources which require firming, such as wind or hydro generation. Ultimately, the District intends to utilize hydro resources and its firming capabilities through the Hoover Resource Exchange Program to meet the majority of its electric loads. To the extent the District utilizes the Resource Exchange Program and its firming capabilities to exchange and better utilize the hydro resources of the District and other similarly situated utilities, such efforts should be environmentally beneficial since such increased utilization would offset thermal generation purchases.

In addition to maximizing the hydroelectric resources, the District's customers are involved in substantial water conservation programs in their farming practices. The investment made by the District's customers in installed water conservation technology is extensive and far-reaching. As noted above, a substantial portion of the District's irrigated acreage is now under drip irrigation systems. Their ongoing conservation practices and ongoing maintenance of conservation investments continue to conserve

significant amounts of groundwater, and thereby electricity, annually. To the extent the District sponsors conservation activities and information activities with its customers, the conservation of groundwater is the fundamental achievement, which is environmentally beneficial and economically sound.

## **Public Participation**

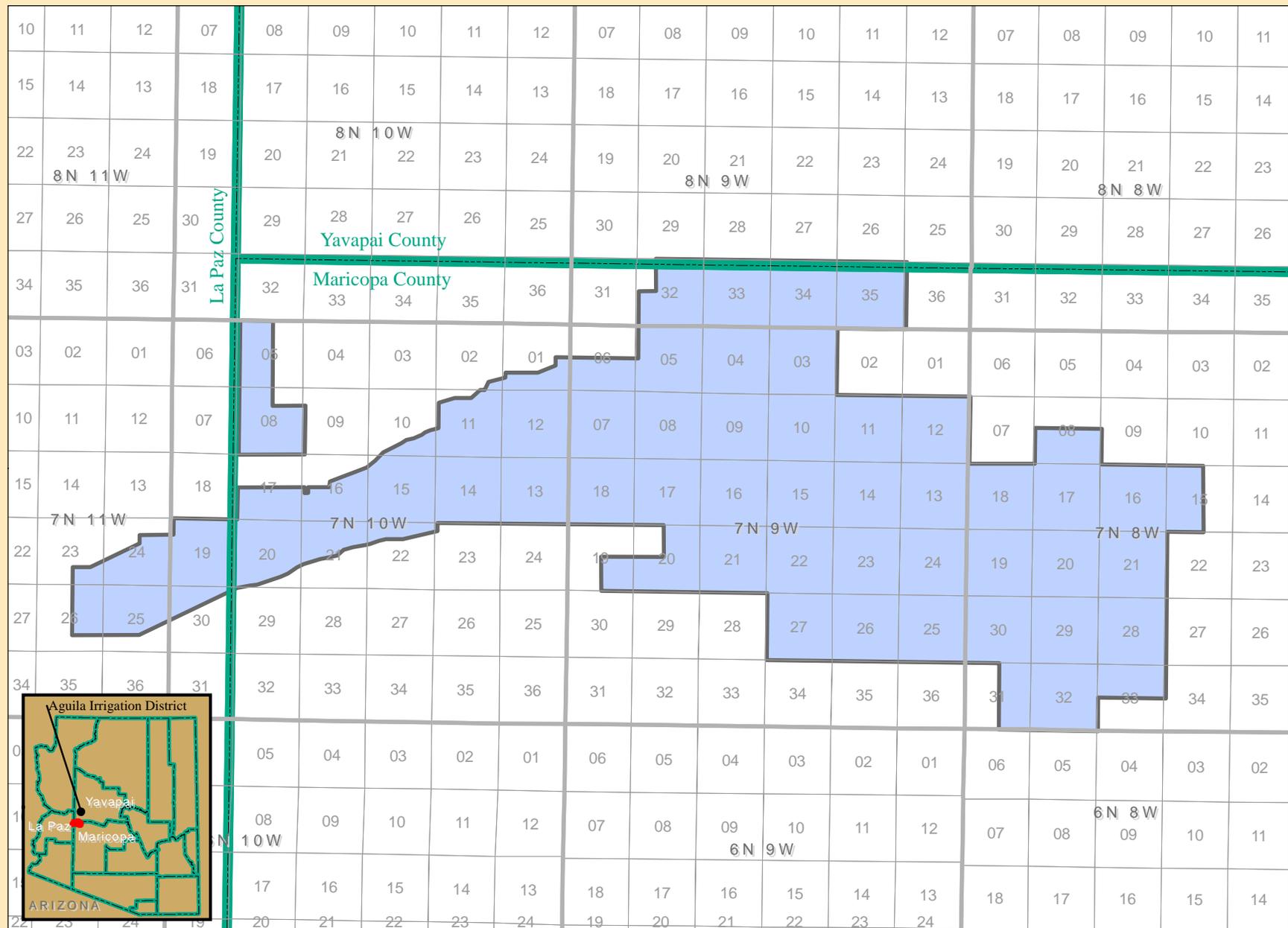
The District has held a public meeting to discuss the development of the District's IRP.

Prior to the meeting, the District posted notice in advance of the meeting, giving the time and place of the meeting and specifying that the District would be considering a draft IRP at the meeting. The notice was posted in accordance with statutory open meeting law requirements. A copy of the notice is attached as **Appendix D**.

At the meeting, the draft IRP was presented to the Board. After discussion and the opportunity for public comment, the Board authorized the preparation of a final IRP, with such revisions as the Board deemed appropriate. There were no public comments provided at the meeting or in writing.

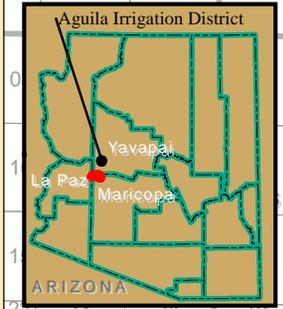
1 in = 2 miles

### APPENDIX A -- Map of District Boundary



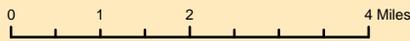
Sources: Township Range Section: 2010 ESRI  
 AID Boundary: Verified by KRS&A with  
 legal records  
 Boundary last updated in 2009

ksadad2011\PRP\MAP\AID Created: 08/20/2006 Edited: 06/14/2011 BLS Arcview 10



## Aguilá Irrigation District

- Legend**
- Townships
  - County Boundary
  - Sections
  - District Boundary



**DISCLAIMER:**  
 K.R. Saline & Associates, PLC  
 Does not warrant the accuracy  
 or location of the facilities shown



**Aguila Irrigation District  
Rate Schedule  
Effective March 2008**

**Rate 3**

Demand (\$/kW/Month)	\$7.56
Energy (\$/kWh)	\$0.0372
Customer (\$/meter/Month)	\$60.00

**AGUILA IRRIGATION DISTRICT**

*Demand @ Meters (kW)*

Year	October	November	December	January	February	March	April	May	June	July	August	September	Max
2002	3,843	4,523	5,016	5,149	4,905	5,539	5,287	5,527	6,157	5,767	5,323	5,282	6,157
2003	4,312	5,199	5,926	5,755	5,162	4,784	5,631	5,779	5,783	5,286	5,062	4,650	5,926
2004	4,313	2,425	3,295	3,857	3,354	4,050	5,115	4,916	5,828	5,927	6,537	6,732	6,732
2005	5,529	2,570	1,614	1,892	1,221	3,932	4,813	5,954	6,383	6,308	6,248	5,660	6,383
2006	5,700	3,621	3,496	3,576	4,019	5,386	5,303	6,837	7,522	7,281	7,186	6,962	7,522
2007	4,588	4,019	5,658	5,311	5,845	5,860	6,460	7,326	7,795	7,744	7,608	6,835	7,795
2008	5,785	5,398	6,111	4,137	4,274	5,196	6,216	7,140	7,066	6,931	6,731	5,572	7,140
2009	4,511	5,570	4,224	4,156	4,927	6,069	6,549	6,945	5,816	6,186	4,367	3,821	6,945
2010	2,445	4,003	4,480	4,156	1,099	3,718	5,391	5,432	5,859	5,964	5,408	5,075	5,964
2011	4,542	2,559	5,786	4,419	4,673	5,979	5,930	6,189	7,195	7,256	7,250	7,343	7,343

*Demand @ Substation (kW)*

Year	October	November	December	January	February	March	April	May	June	July	August	September	Max
2002	4,173	4,911	5,446	5,591	5,326	6,014	5,740	6,001	6,685	6,262	5,780	5,735	6,685
2003	4,682	5,645	6,434	6,249	5,605	5,194	6,114	6,275	6,279	5,739	5,496	5,049	6,434
2004	4,683	2,633	3,578	4,188	3,642	4,397	5,554	5,338	6,328	6,435	7,098	7,309	7,309
2005	6,003	2,790	1,752	2,054	1,326	4,269	5,226	6,465	6,931	6,849	6,784	6,145	6,931
2006	6,189	3,932	3,796	3,883	4,364	5,848	5,758	7,423	8,167	7,906	7,802	7,559	8,167
2007	4,982	4,364	6,143	5,767	6,346	6,363	7,014	7,954	8,464	8,408	8,261	7,421	8,464
2008	6,281	5,861	6,635	4,492	4,641	5,642	6,749	7,752	7,672	7,526	7,308	6,050	7,752
2009	4,898	6,048	4,586	4,512	5,350	6,590	7,111	7,541	6,315	6,717	4,742	4,149	7,541
2010	2,655	4,346	4,864	4,347	1,193	4,037	5,853	5,898	6,362	6,476	5,872	5,510	6,476
2011	4,932	2,779	6,282	4,798	5,074	6,492	6,439	6,720	7,812	7,878	7,872	7,973	7,973

*Energy @ Meters (kWh)*

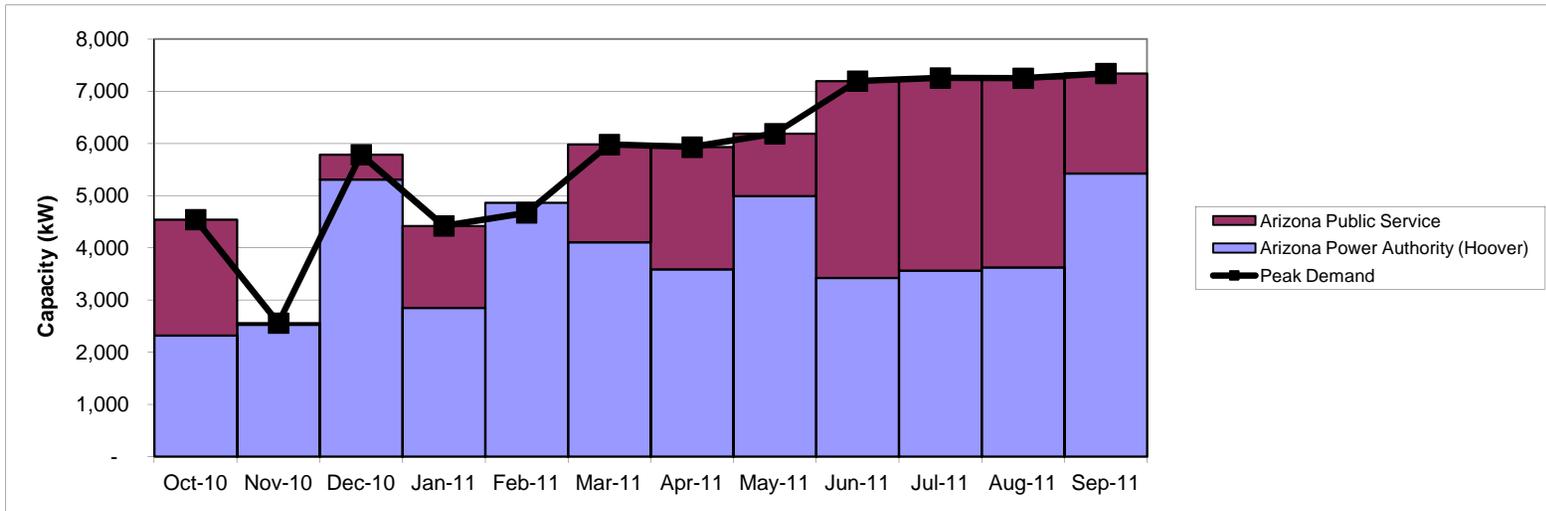
Year	October	November	December	January	February	March	April	May	June	July	August	September	Total
2002	1,389,634	1,505,364	1,743,683	2,535,229	1,668,179	2,164,129	2,930,072	3,955,426	3,713,184	3,340,086	3,022,288	2,301,401	30,268,675
2003	1,300,204	1,597,456	2,418,756	2,574,762	766,561	1,587,022	3,558,448	3,689,142	3,824,079	3,835,087	3,046,072	2,307,548	30,505,137
2004	1,567,824	612,902	1,278,753	1,766,159	1,006,407	1,591,271	2,771,891	2,979,708	3,836,773	4,125,256	3,770,055	3,561,620	28,868,619
2005	1,786,547	484,101	119,015	113,665	179,917	383,933	1,435,284	3,066,811	4,636,169	4,640,182	3,242,403	3,373,902	23,461,929
2006	1,557,051	862,059	1,027,539	1,216,192	1,265,500	1,831,866	2,626,626	3,708,551	5,273,599	4,200,896	3,749,474	2,629,078	29,948,431
2007	1,400,862	1,960,327	2,227,769	969,946	1,528,734	1,707,504	3,030,219	4,496,290	4,854,559	5,065,084	3,961,379	3,710,282	34,912,955
2008	1,356,821	2,146,775	1,394,231	840,994	1,228,409	2,927,387	4,225,082	4,519,295	4,683,250	3,709,879	3,443,732	2,385,585	32,861,440
2009	1,889,202	2,228,867	1,239,027	929,333	1,267,607	2,805,162	3,972,964	3,920,625	3,146,973	3,610,200	2,464,210	1,538,724	29,012,894
2010	843,765	983,362	963,936	1,366,599	220,515	929,462	2,510,670	3,063,013	2,470,073	3,860,307	2,758,600	2,732,921	22,073,223
2011	1,188,667	761,652	3,015,018	1,957,147	1,612,630	3,229,757	3,920,187	3,734,753	4,324,000	4,792,016	5,124,689	4,128,195	37,788,711

*Energy @ Substation (kWh)*

Year	October	November	December	January	February	March	April	May	June	July	August	September	Total
2002	1,470,512	1,592,978	1,845,167	2,682,782	1,765,269	2,290,084	3,100,605	4,185,636	3,929,295	3,534,483	3,198,188	2,435,345	32,030,344
2003	1,375,877	1,690,430	2,559,530	2,724,616	811,176	1,679,388	3,765,553	3,903,854	4,046,644	4,058,293	3,223,357	2,441,850	32,280,568
2004	1,659,073	648,574	1,353,178	1,868,951	1,064,981	1,683,885	2,933,218	3,153,130	4,060,077	4,365,350	3,989,476	3,768,910	30,548,803
2005	1,890,526	512,276	125,942	120,280	190,388	406,278	1,518,819	3,245,303	4,905,999	4,910,246	3,431,114	3,570,267	24,827,438
2006	1,647,673	912,232	1,087,343	1,286,976	1,339,153	1,938,483	2,779,498	3,924,393	5,580,528	4,445,393	3,967,697	2,782,093	31,691,462
2007	1,482,394	2,074,420	2,357,428	1,026,398	1,617,708	1,806,883	3,206,581	4,757,979	5,137,099	5,359,877	4,191,935	3,926,224	36,944,926
2008	1,435,789	2,271,720	1,475,377	889,941	1,299,904	3,097,764	4,470,986	4,782,323	4,955,820	3,925,798	3,644,161	2,524,429	34,774,012
2009	1,999,156	2,358,589	1,311,140	983,421	1,341,383	2,968,425	4,204,195	4,148,810	3,330,130	3,820,317	2,607,630	1,628,279	30,701,475
2010	892,873	1,040,595	1,020,038	1,446,137	233,349	983,558	2,656,794	3,241,284	2,613,834	4,084,981	2,919,153	2,891,980	24,024,576
2011	1,257,849	805,981	3,190,495	2,071,055	1,706,487	3,417,732	4,148,346	3,952,120	4,575,661	5,070,916	5,422,951	4,368,460	39,988,053

**AGUILA IRRIGATION DISTRICT**

**SCHEDULED RESOURCES TO COVER TYPICAL PEAK DEMAND**



**Resources**

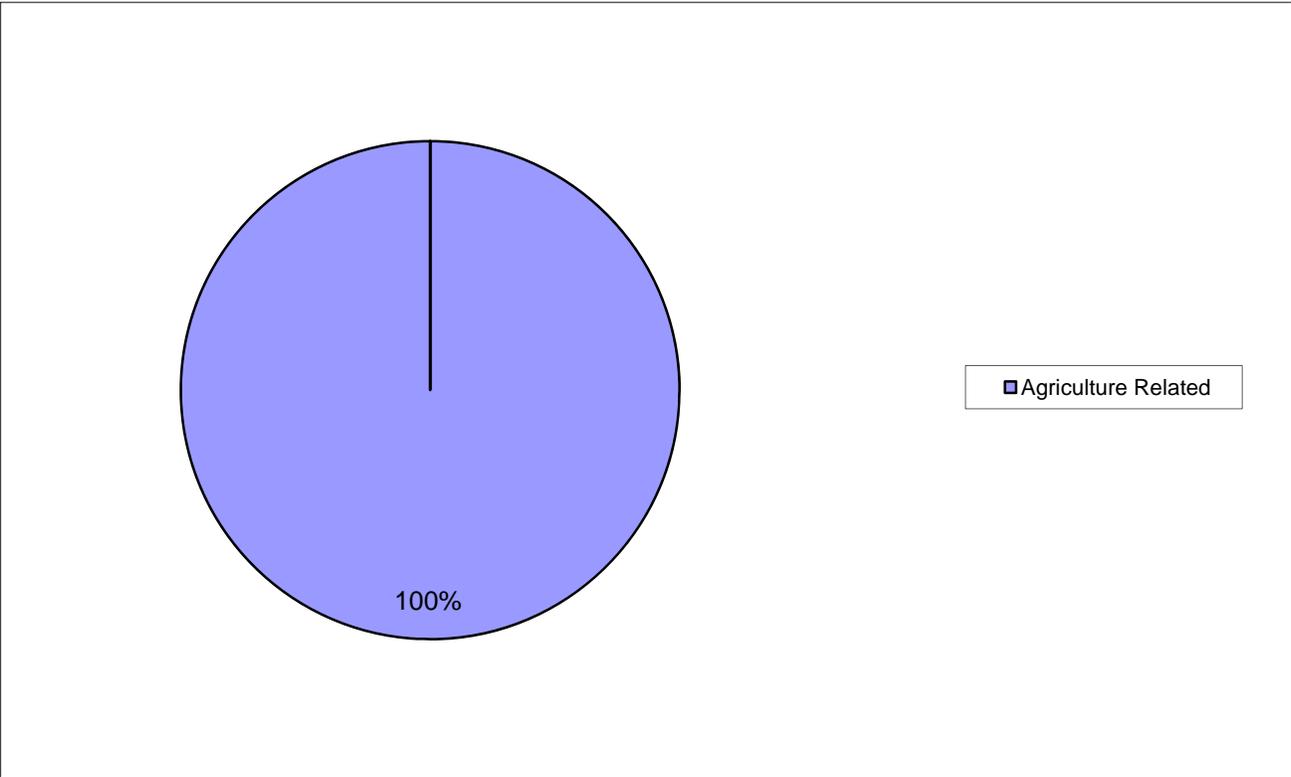
	Oct-10	Nov-10	Dec-10	Jan-11	Feb-11	Mar-11	Apr-11	May-11	Jun-11	Jul-11	Aug-11	Sep-11
Arizona Power Authority (Hoover)	2,323	2,528	5,313	2,850	4,863	4,107	3,588	4,991	3,425	3,563	3,626	5,428
Arizona Public Service	2,219	31	473	1,569	-	1,872	2,342	1,198	3,770	3,693	3,624	1,915
<b>Peak Demand</b>	<b>4,542</b>	<b>2,559</b>	<b>5,786</b>	<b>4,419</b>	<b>4,673</b>	<b>5,979</b>	<b>5,930</b>	<b>6,189</b>	<b>7,195</b>	<b>7,256</b>	<b>7,250</b>	<b>7,343</b>

**AGUILA IRRIGATION DISTRICT**

*Load Profile*

**Customer Type**  
*Agriculture Related*  
**Total**

**# of Meters**  
*54*  
**54**



## **AGUILA IRRIGATION DISTRICT**

### **PUBLIC NOTICE**

Aguila Irrigation District (“the District”) will be holding a board meeting at 8:45 a.m. on December 12, 2011 at the offices of Martori Farms, 7332 E. Butherus Drive, St. 200, Scottsdale, Arizona. At that board meeting the District will review and approve its updated Integrated Resource Plan. This Integrated Resource Plan, which is required by the Western Area Power Administration, details the District’s power resource plan for the next five years. The final Integrated Resource Plan will be available to the public at the District’s office prior to the meeting. Written comments regarding the Integrated Resource Plan will be accepted any time prior to or at the meeting. Public comments will also be accepted at this time. Please contact Jennifer Torpey at (480) 610-8741 for more information.