

**YAMPA VALLEY ELECTRIC
ASSOCIATION, INC.**

STEAMBOAT SPRINGS, COLORADO

INTEGRATED RESOURCE PLAN

March 2007

YAMPA VALLEY ELECTRIC ASSOCIATION, INC.

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CURRENT PROFILE:

Yampa Valley Electric Association, Inc. has prepared this Integrated Resource Plan (IRP) to comply with the Energy Policy Act of 1992. The IRP analysis was conducted by projecting future load levels and utilizing Resource Planning Guide (RPF) software provided by the Western Area Power Administration (WAPA) as a planning tool.

YVEA is a distribution cooperative located in Northwestern Colorado. The cooperative is headquartered in Steamboat Springs, Colorado, with another office in Craig, Colorado. The YVEA service territory consists of areas in Routt, Moffat, Grand, Rio Blanco, Eagle Counties in Colorado and Carbon County in Wyoming.

LOAD PROFILE:

The Association billed an average of 24,906 electric meters in 2006. The system peak demand was 117,184 kW in December, 2006 and the annual kWh sales for the year 2006 were 542,676,560. The Association has an all-power requirements contract with Xcel Energy in excess of the WAPA hydro allocation.

The YVEA customer base is mainly residential with 83% of total meters given a residential rate and sales to residential customers make up 37.8% of the total sales. System load and sales are growing on the YVEA system.

Average number billed:	2006	2005	2001
Residential	20,529	20,068	18,642
Commercial	4,236	4,058	3,659
Irrigation	117	114	97
Large Power	14	14	15
Public Street Light	10	9	9

KWh sales per rate class:	2006	2005	2001
Residential	206,815,823	194,918,498	174,700,750
Commercial	169,618,842	161,641,265	157,332,210
Large Power	161,928,924	151,170,240	126,699,282
Irrigation	2,960,211	2,441,747	2,418,999
Public Street Lights	1,352,760	1,338,975	1,327,236

The Association does not have a load shifting strategy. YVEA does have a time-of-use (TOU) rate for large power customers. One customer is presently utilizing the program. The TOU rate was designed to not require any subsidy from other ratepayers. Rates for all rate classes are based on energy sales, with no demand component.

WAPA supplies approximately 4% of the total energy required by YVEA member-owners. YVEA first submitted an IRP in 1997 and annual updates have since followed.

GREEN POWER:

Yampa Valley Electric has contracted with Xcel Energy for a portion of the Ponnequin Wind Facility in Northern Colorado. For 2007, the renewable wind energy program is sold out and the Association maintains a waiting list. This situation should be remedied in 2007 when YVEA will acquire approximately 30,000 Renewable Energy Credits through the Association's wholesale contract with Xcel Energy. There are approximately 406 member-consumers who purchase a minimum of one block of wind energy per month. Consumers may purchase a minimum of 1 block (100 kWh) with no minimum monthly contract required. The cost per block is \$3.00.

<u>Wind Energy</u>	<u>2006</u>	<u>2005</u>	<u>2001</u>
YVEA purchase from Xcel Energy	1,029,771 kwh	953,556 kwh	863,943 kwh
YVEA sales to customers	944,167 kwh	821,900 kwh	860,600 kwh

Yampa Valley Electric currently has one customer who has signed an Interconnection Agreement for Photovoltaic Energy Net Metering contract. The lone customer has not generated any power back into the YVEA grid. The Association has a filed tariff (Company Rate 50) for qualifying facilities with a design capacity of 10 kw or less.

Renewable Energy, while a laudable long-term goal and one that brings a lot of self satisfaction to some customers, may not be a viable answer for the areas electricity needs. Wind energy may be the low-cost resource when wind is blowing; but according to NREL there are no economically viable wind sites in the YVEA service area. The Association believes that no renewable resources will provide the large "base load" resource that the utility needs to meet growing demand.

RATES:

The Association has four basic rate classes, with all rates being billed energy only, with no demand component. YVEA has only one demand rate, with one customer, and that rate is designed for large power customers over 1000 kw demand. In 2002, YVEA began passing on a fuel cost adjustment to customers. The fuel cost adjustment is a direct pass through from YVEA's power supplier. The fuel cost adjustment fluctuates monthly.

Residential energy rate	\$0.05613 per kwh	no demand charge
Commercial energy rate	\$0.06249 per kwh	no demand charge
Large Power Energy rate	\$0.06482 per kwh	no demand charge
Large Power TOU rate	\$0.03924 per kwh	\$15.00 demand
Irrigation Energy rate	\$0.05230 per kwh	no demand charge

RESIDENTIAL ENERGY CONSERVATION:

Yampa Valley Electric continues to investigate potential energy conservation activates. In March of 2007, Yampa Valley Electric will introduce a compact fluorescent light (CFL) program. The Association will give away one free CFL to each residential customer who returns a coupon supplied in the Association's newsletter. The Association will sell additional CFLs to customers at the Association's wholesale cost. The utility hopes that its customers will replace the top five used incandescent bulbs with CFLs.

ENERGY AUDITS:

Yampa Valley Electric provides energy audits for residential and commercial services. The audits are provided at no charge to the consumer and allow the consumer to make better use of their energy dollars. The YVEA employee will provide the consumer with a checklist of energy savings ideas and project cost savings analysis. The consumer then has the information to make wise decisions regarding their electric usage. The Association stresses energy conservation, environmental issues and ways to make homes/businesses more energy efficient in its quarterly newsletter. The environment is important to us; the Board of Directors, the employees and their families live in the area we serve.

SITUATION ANALYSIS:

The area served by Yampa Valley Electric Association Inc. has experienced an expanding economy and increase in population for the past several years. The growth is related to the tourist industry and the quality of life experienced in the Yampa Valley. As part of this growth, YVEA has had a corresponding increase in the number of new customers. Natural gas service is available to a wide area of YVEA's customer base and is normally chosen as the fuel-of-choice for water and space heating. In the rural areas, propane is selected by most for space and water heating.

Growing energy consumption in the United States, combined with concerns about national energy security, has brought to the forefront a need for the reliance on and demand for domestic energy sources. This has paved the way for oil and natural gas development in Northwest Colorado and Southern Wyoming. Energy development has enormous potential for increased electric demand in the area. YVEA is preparing for projects that include various gas development activities, such as drilling, processing plants and compression facilities. In 2007, YVEA expects a potential growth of about 10 to 12 megawatts of new gas load.

YVEA's residential rates are competitive with surrounding electric providers and in most cases, the Association's rates are lower. Capital credits are paid on a rotation at the Board of Director's discretion.

There are no supply limitations in the wholesale power purchase agreement with Xcel Energy, nor does there appear to be a generation shortage in Northwestern Colorado. Xcel Energy has addressed emissions in their IRP and are reducing emission rates of SO₂, NO_x and CO₂ through the pursuit of pollution control upgrades, renewable and newer more efficient units.

PUBLIC PARTICIPATION:

Customers of Yampa Valley Electric were given opportunities to provide input during the preparation of the IRP. Public input was solicited from all YVEA customers concerning the IRP and possible programs to be included. A legal notice was published in both area papers and radio advertisements were placed with local radio stations.

Three customers provided input to the IRP process. Two customers indicated YVEA should investigate the need for additional alternative energy sources, such as wind, geothermal and

photovoltaic power. One customer felt the Association should adhere to the true intent of “net metering” and not the avoided wholesale power cost payment.

ACTION PLAN:

Yampa Valley Electric has no shortages of energy or demand with the current power purchase contract. The all power requirement contract with Public Service Company of Colorado does not end until the year 2022. Because of lack of limitations, YVEA had adequate energy and capacity for on-peak periods for the life of the contract.

A project load growth graph is provided showing what the Association believes to be a low, average and high projected growth in demand and energy.

Historical Load Growth

	Kwh	Kw	Kwh Growth	Kw Growth
1990	346,704,336	90,040	Base Year	Base Year
1991	359,054,405	84,153	3.6%	-6.5%
1992	372,014,916	79,759	3.6%	-5.2%
1993	367,050,246	84,283	-1.3%	5.7%
1994	382,180,821	83,801	4.1%	-0.6%
1995	384,452,952	87,313	0.6%	4.2%
1996	405,282,643	94,132	5.4%	7.8%
1997	410,182,101	90,013	1.2%	-4.4%
1998	416,943,431	92,199	1.6%	2.4%
1999	432,091,674	96,766	3.6%	5.0%
2000	448,709,410	98,272	3.8%	1.6%
2001	462,478,477	99,492	3.1%	1.2%
2002	496,759,367	106,655	7.4%	7.2%
2003	486,905,048	103,661	-2.0%	-2.8%
2004	494,938,567	110,687	1.6%	6.8%
2005	511,510,725	114,332	3.3%	3.3%
2006	542,676,560	117,184	6.1%	2.5%

Load Growth Forecast for next five years *

Projected at 1.5% Projected at 3.0% Projected at 4.5%

KWH Sales

2007	485,602,401	575,237,154	580,663,919
2008	500,170,473	583,865,711	598,083,837
2009	515,175,587	592,623,697	616,026,352
2010	530,630,855	601,513,052	634,507,142
2011	546,549,780	610,535,748	653,542,357

KW Demand

2007	123,043	124,215	125,387
2008	124,889	127,941	131,029
2009	126,762	131,780	136,926
2010	128,664	135,733	143,087
2011	130,594	139,805	149,526

* includes new projected oil/gas load starting in 2007

YAMPA VALLEY ELECTRIC ASSN., INC.
COMPARISON DEGREE DAYS - PEAK KW PER CUSTOMER

YEAR	ANNUAL DEGREE DAYS	DATE OF PEAK	ANNUAL PEAK	AVERAGE NUMBER CONSUMERS	PEAK KW PER CONSUMER	AVG.KWH RESIDENTIAL	AVG.RETURN PER KWH SOLD RESIDENTIAL
1972	9,522	Dec	29,007	7,037	4.12	9,137	1.84¢
1973	10,076	Dec	34,770	8,052	4.32	10,320	1.75¢
1974	9,811	Dec	41,824	8,950	4.67	10,299	1.91¢
1975	10,010	Dec	44,629	9,505	4.70	10,804	2.29¢
1976	9,785	Dec	49,225	10,275	4.79	10,929	2.61¢
1977	8,731	Dec	54,436	10,854	5.02	10,697	2.71¢
1978	9,304	Dec	66,417	11,584	5.73	11,243	2.91¢
1979	9,360	Jan	73,131	13,282	5.51	12,282	3.22¢
1980	8,887	Jan	69,714	14,653	4.76	11,063	3.92¢
1981	8,220	Dec	77,045	15,948	4.83	9,832	5.02¢
1982	9,813	Feb	87,893	16,488	5.33	10,827	5.77¢
1983	9,214	Jan	84,557	16,708	5.06	10,054	6.46¢
1984	9,931	Jan	91,574	16,571	5.52	10,619	6.45¢
1985	9,525	Feb	88,461	16,467	5.37	10,292	6.45¢
1986	8,382	Feb	79,595	16,288	4.88	9,715	6.50¢
1987	8,679	Dec	75,453	16,172	4.67	9,802	6.32¢
1988	8,855	Dec	83,982	16,377	5.13	10,512	6.27¢
1989	10,037	Feb	91,505	16,608	5.51	9,695	6.375¢
1990	8,843	Dec	90,040	16,926	5.31	10,166	6.843¢
1991	9,283	Jan	84,153	17,289	4.86	10,602	7.131¢
1992	7,813	Jan	79,759	17,745	4.49	9,731	7.158¢
1993	9773	Dec	84,283	18,103	4.66	10,098	7.140¢
1994	8,536	Jan	83,801	18,538	4.52	9,846	7.130¢
1995	8,646	Jan	87,313	19,179	4.55	9,550	7.160¢
1996	9,135	Dec	94,132	19,841	4.74	9,705	6.822¢
1997	9,391	Jan	90,013	20,423	4.41	9,650	7.148¢
1998	8,740	Dec	92,199	20,973	4.40	9,295	7.162¢
1999	8,868	Dec	96,766	21,232	4.56	9,352	7.165¢
2000	8,870	Dec	98,272	21,810	4.51	9,482	7.195¢
2001	8,753	Dec	99,494	22,422	4.44	9,371	7.520¢
2002	9,059	Jan	106,655	22,938	4.65	9,780	7.830¢
2003	8,554	Dec	103,661	23,337	4.44	9,444	7.980¢
2004	9,002	Dec	110,687	23,718	4.67	9,600	8.190¢
2005	8,796	Dec	114,332	24,263	4.71	9,708	8.780¢
2006	9,340	Dec	117,184	24,906	4.71	10,080	8.750¢
	5 Year Forecast						
2007	9,025	Dec	124,215	25,653	4.84	9,850	
2008	9,025	Dec	127,941	26,423	4.84	9,850	
2009	9,025	Dec	131,780	26,423	4.99	9,850	
2010	9,025	Dec	135,733	27,215	4.99	9,850	
2011	9,025	Dec	139,805	27,215	5.14	9,850	