

OPEN MEETING AGENDA ITEM



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ORIGINAL



UNS Electric, Inc.
P.O. Box 711
Tucson, Arizona 85702

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2013 JAN 31 P 1:53

AZ CORP COMMISSION
DOCKET CONTROL

January 31, 2013

Arizona Corporation Commission
DOCKETED

JAN 31 2013

DOCKETED BY

Chairman Bob Stump
Commissioner Gary Pierce
Commissioner Brenda Burns
Commissioner Bob Burns
Commissioner Susan Bitter Smith

RE: Integrated Resource Planning - Docket No. E-00000A-11-0113

Dear Commissioners:

UNS Electric, Inc. ("UNS Electric" or the "Company") submits the following answers in response to Commissioner Pierce's January 11, 2013 letter regarding generating capacity.

Question 1: What is the existing reserve capacity for each load-serving entity, and how does that compare with the reserve capacity for that entity over the past twenty years?

UNS Electric's reserve capacity for 2012 was 9%. For reliability purposes, UNS Electric has generally maintained its operating reserve margins between 7% - 12% since UNS Energy, Inc. acquired the Citizens Utilities electric assets in 2003. To put this in context with UNS Electric's load and resources, UNS Electric began operating in 2003. Until mid-2007, UNS Electric received all of its power from a full requirements contract from Arizona Public Service (which was a holdover arrangement from Citizens). UNS Electric's system peak load for 2012 was 438 MW. However, UNS Electric has limited generating resources and currently has only 161 MW of generating capacity. Attachment A sets forth a list of UNS Electric's generating sources. As a result, during the last 5 years UNS Electric has relied on the merchant wholesale market for approximately 300 to 400 MW of firm purchased power resources. Moreover, as part of UNS Electric's on-going hedging practices, UNS Electric firms up its summer capacity requirements with a variety firm purchased power products with various counterparties prior to the delivery year. Attachment B provides a graph showing UNS Electric's historical loads and resources for the period 2003-2012 and Part 1 of Attachment C provides specific reserve capacity information for the period 2003-2012.



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Question 2: What are the load-serving entities' existing off-system sales and how do those sales compare with previous sales over the past twenty years?

Please see Line 2 of Attachment C, which sets forth this information for the period 2003-2012.

Question 3: What is the outlook for off-system sales for each load-serving entity in the future?

Please see Line 3 of Attachment C, which sets forth current estimates for the period 2003-2032.

Question 4: What has been the aggregate capacity factor (actual load served divided by the system load serving capacity) for each load-serving entity over the last twenty years for the following:

- a. at system peak load for the year,
- b. at average load during the peak month,
- c. at average annual load,
- d. at average load during the lowest load month?

Please see Lines 4a-d of Attachment C, which set forth this information for the period 2003-2012.

Question 5: Are there reasons to believe that maintaining and even increasing the existing excess reserve capacity in the short-term will mitigate rate increases in the future when an eventual economic recovery will inevitably increase electric demand?

Because UNS Electric only owns peaking generating resources that supply approximately 30% of the Company's peak demand, UNS Electric relies heavily on the regional wholesale power market and thus continuously monitors the supply and demand fundamentals for the Desert Southwest region. Based on current market conditions, merchant combined cycle generation assets are valued at substantial discount to new build resources. Given UNS Electric's current ability to rely on the wholesale market for short-term power purchases, increasing the existing reserve capacity requirements in the short-term would put upward pressure on customer's rates today. However, given UNS Electric's large capacity deficit, a long-term purchase power agreement or an existing merchant plant purchase based on today's asset valuations could potentially mitigate future rate increases for UNS Electric's customers.



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I trust the above information addresses your questions. Please contact me if you have any questions or would like additional information.

Sincerely,

A handwritten signature in black ink that reads "Michael Sheehan". The signature is written in a cursive style with a prominent flourish at the end.

Mike Sheehan
Director, Resource Planning
(520) 884-3656
msheehan@tep.com

cc: Docket Control (original and 13 copies)

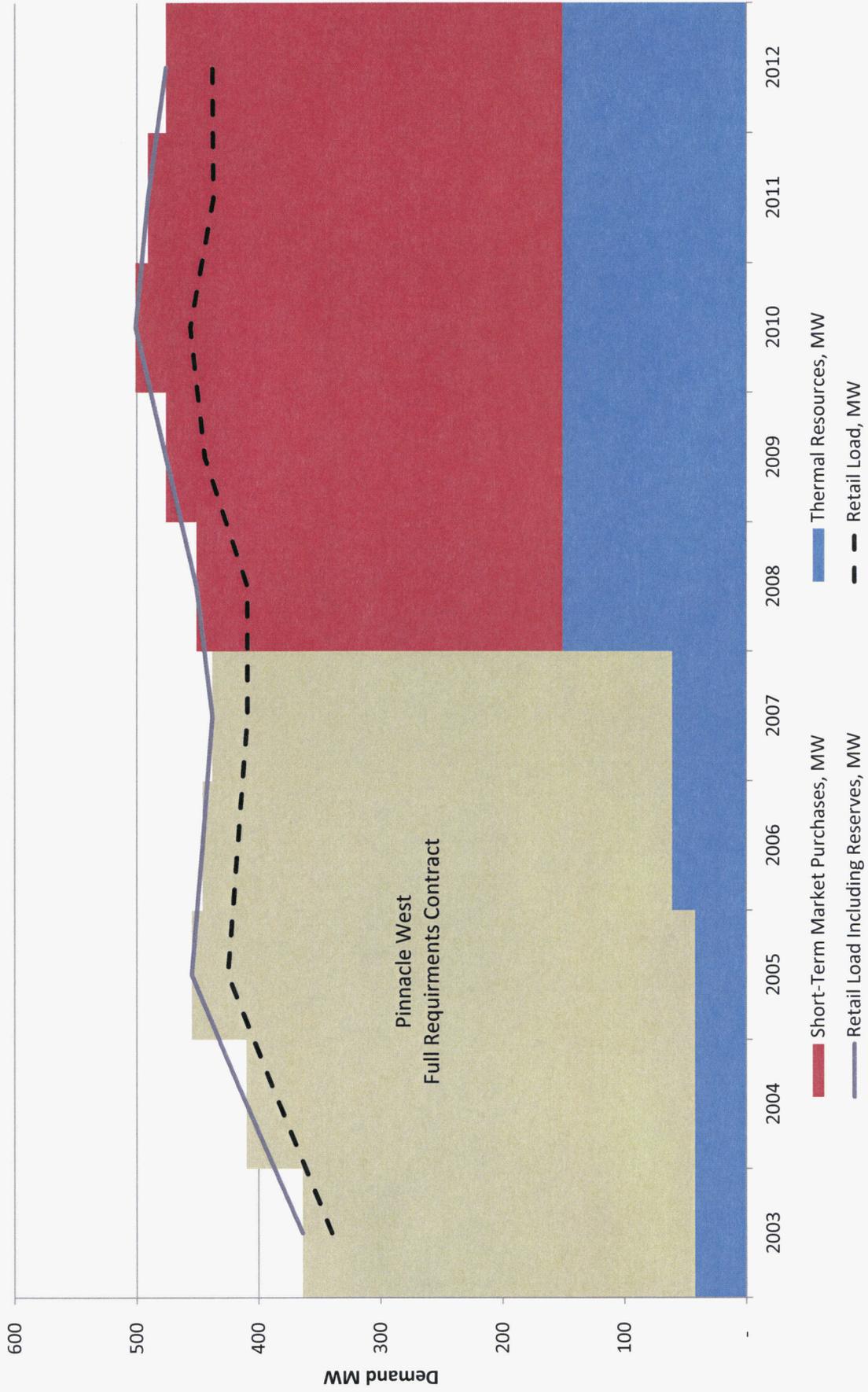
ATTACHMENT

"A"

ATTACHMENT

"B"

UNS Electric Historical Loads and Resources



ATTACHMENT

"C"

UNS Electric, Inc.
Integrated Resource Planning

	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012					
1 Thermal Resources, MW	42	42	47	61	61	151	151	151	151	151					
Short Term Market Purchases, MW (1)	322	368	413	385	377	300	325	350	340	325					
Firm Resource Capacity, MW	364	410	455	446	438	451	476	501	501	476					
Renewable Resources, Nonhydro, MW															
Total Capacity Including Renewables, MW	364	410	455	446	438	451	476	501	501	486					
Retail Load, MW															
Firm Wholesale Loads, MW	340	383	425	417	409	409	414	455	437	438					
Total Firm Load Obligations, MW	340	383	425	417	409	409	414	455	437	438					
Reserve Capacity, MW	24	27	30	29	29	42	37	45	54	38					
Reserve Margin, %	7%	7%	7%	7%	7%	10%	7%	10%	12%	8%					
2. Sales for Resale, GWh (2)															
3. Firm Energy Sales from System Resources, GWh	100	168	2	1	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
	364	410	455	446	438	451	476	501	501	476	501	501	476	501	476
Firm Resource Capacity (Peak Month), MW	340	383	425	417	409	409	414	455	437	438	451	476	501	501	476
4 a System Peak (Month-Year)	810%	912%	1012%	684%	670%	671%	294%	303%	289%	290%	294%	294%	303%	289%	290%
Peak Demand (MW)	159	228	264	274	275	340	311	417	441	358	444	455	437	438	438
Peak Hour Capacity Factor (3)	380%	544%	628%	449%	451%	198%	206%	276%	292%	273%	294%	294%	303%	289%	290%
4 b Average Load Served for the Peak Month	159	228	264	274	275	340	311	417	441	358	444	455	437	438	438
Average Capacity Factor including Resale (4)	378%	543%	628%	448%	450%	177%	191%	199%	190%	185%	191%	191%	201%	190%	185%
Average Load Served for the Peak Month	169	177	186	186	204	221	232	303	331	304	303	303	303	331	304
Average Capacity Factor Excluding Resale (5)	403%	421%	443%	322%	335%	147%	155%	201%	219%	207%	201%	201%	219%	207%	207%
4 c Average Load Served for the Year Including Resale	169	177	186	186	204	203	215	219	219	220	215	219	219	219	220
Average Annual Capacity Factor (6)	402%	421%	442%	327%	334%	134%	143%	145%	145%	146%	143%	143%	145%	144%	146%
Total Load Including Resale															
Average Load Served for the Year Excluding Resale															
Average Annual Capacity Factor (7)															
Total Load Excluding Resale															
4 d Lowest Load Month (Month-Year)	147	158	149	163	164	171	194	218	281	226	194	218	218	281	226
Average Load Served Lowest Load Month (Include Resale)	349%	376%	355%	266%	268%	113%	128%	144%	165%	156%	113%	128%	144%	165%	156%
Minimum Month Capacity Factor incl. Resale (8)	146	157	149	162	163	157	175	187	180	176	175	175	187	180	176
Average Load Served Lowest Load Month (Excluding Resale)	348%	375%	354%	266%	268%	104%	116%	124%	119%	115%	104%	116%	124%	119%	115%
Minimum Month Capacity Factor excl. Resale (9)															

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Minimum Month Capacity Factor excl. Resale (9)															

Notes:

(1) Historical data starts in 2003 based on the acquisition from Citizens Electric. Firm to July, 2008. UNSI was served from a Full-Requirements contracts by Pinwest. Post 2008, UNISE's load is served through firm purchased power contracts.

(2) Data Source: ITR Form 1 (Sales by Resale, Account 447). Based on aggregate system sales and includes sales transactions not sourced out of UNISE's resource capacity.

(3) Peak Demand Excluding Resale (Peak Month MW) / Firm Resource Capacity (Peak Month MW)

(4) Average Demand Including Resale (Peak Month MW) / Firm Resource Capacity (Peak Month MW)

(5) Average Demand Excluding Resale (Peak Month MW) / Firm Resource Capacity (Peak Month MW)

(6) Average Annual Demand Including Resale / Firm Resource Capacity (Month MW)

(7) Average Annual Demand Excluding Resale / Firm Resource Capacity (Peak Month MW)

(8) Average Demand Including Resale (Lowest Month MW) / Firm Resource Capacity (Peak Month MW)

(9) Average Demand Excluding Resale (Lowest Month MW) / Firm Resource Capacity (Peak Month MW)