Direct Testimony
Richard C. Loomis

Before the Public Service Commission
of the State of Wyoming

Joint Application of
Cheyenne Light, Fuel and Power Company and
Black Hills Power, Inc.
For a Certificate of Public Convenience
and Necessity for a Gas-Fired
Electric Generating Power Plant and
Related Facilities

Docket No.20003-___-EA-11

Docket No. 20002-____-EA-11

Record No. _____

November 1, 2011

EXHIBIT
7

Table of Contents

I. Introduction and Qualifications 1

II. Purpose of Testimony 2

III. Business Overview of Black Hills Power 3

IV. Current Generating Resources 3

V. Current Generation Need 4

VI. Demand Side Management 5

Exhibits

None.

I. INTRODUCTION AND QUALIFICATIONS

1 **Q. PLEASE STATE YOUR NAME AND BUSINESS ADDRESS.**

2 A. My name is Richard C. (Chuck) Loomis. My business address is 409 Deadwood
3 Avenue, Rapid City, South Dakota 57702.

4 **Q. BY WHOM ARE YOU EMPLOYED AND IN WHAT CAPACITY?**

5 A. I am employed by Black Hills Power, Inc. ("Black Hills Power") as Vice President,
6 Operations and am testifying on its behalf.

7 **Q. BRIEFLY DESCRIBE YOUR EDUCATIONAL BACKGROUND AND**
8 **EMPLOYMENT HISTORY.**

9 A. I earned a Master of Business Administration degree from Bowling Green State
10 University in Bowling Green, Ohio, and a Bachelor of Business Administration degree
11 with a major in Accounting from the University of Toledo, Toledo, Ohio. In addition, I
12 have completed courses related to rate regulation of natural gas and electric utilities and
13 natural gas and electric distribution operations sponsored by various industry
14 organizations and associations. I joined Michigan Gas Utilities ("MGU") in 1985 as
15 General Accountant. From 1987 through 1994, I worked in positions of increasing
16 responsibility in MGU's Rates and Regulatory Affairs function, becoming Manager in
17 1992. In 1989, Aquila, Inc. (then UtiliCorp United) ("Aquila") acquired MGU from
18 Michigan Energy Resources Company and continued to operate MGU as a separate
19 division.

20 From 1994-1997, I served as State Administrator in Michigan, and in July 1997,
21 relocated to Omaha, Nebraska to become Aquila's Asset Manager for Iowa and
22 Nebraska. In this position, I was responsible for operational and financial performance of

1 Aquila's gas distribution assets serving nearly 325,000 customers in these two states. I
2 became Manager of Aquila's Nebraska Business Operations as part of a corporate
3 restructuring in 2002. I was named Aquila's Vice President, Kansas and Colorado Gas
4 Operations in February 2004. On July 14, 2008, Black Hills Corporation acquired certain
5 natural gas and electric utility assets from Aquila, including the Kansas and Colorado
6 natural gas utility assets for which I was responsible. On July 14, 2008, I joined Black
7 Hills Power as Vice President, Operations.

8 **Q. WOULD YOU PLEASE DESCRIBE YOUR RESPONSIBILITIES RELATED TO**
9 **BLACK HILLS POWER'S ELECTRIC OPERATIONS?**

10 A. I am responsible for financial and operational performance of Black Hills Power's
11 electric operations in South Dakota, Wyoming and Montana. I directly oversee state
12 operating functions, including electric distribution network operations, maintenance,
13 construction, local customer service, customer relations and community relations. I am
14 indirectly involved in the oversight of certain other functions that are centralized within
15 Black Hills Corporation, and that provide support to electric network operations.
16 Examples of central functions include regulatory and legislative affairs, human resources,
17 IT, and customer service call center functions.

18 **II. PURPOSE OF TESTIMONY**

19 **Q. WHAT IS THE PURPOSE OF YOUR TESTIMONY IN THIS PROCEEDING?**

20 A. The purpose of my testimony in this proceeding is to provide an overview of Black Hills
21 Power, including its service territory, generation fleet and current resource needs. In
22 addition, I will support the requested resource addition of a jointly owned combined cycle
23 generating unit.

III. BUSINESS OVERVIEW OF BLACK HILLS POWER

Q. PLEASE BRIEFLY DESCRIBE BLACK HILLS POWER'S HISTORY.

A. Black Hills Power and its predecessor companies have been providing electric power to the Black Hills region since 1883. Headquartered in Rapid City, today, Black Hills Power is a wholly owned subsidiary of Black Hills Corporation and is a division within Black Hills Corporation's Utilities Business Segment.

Q. PLEASE BRIEFLY DESCRIBE BLACK HILLS POWER'S BUSINESS.

A. Black Hills Power is a regulated electric utility engaged in the generation, transmission and distribution of electricity to approximately 68,000 customers in western South Dakota, northeastern Wyoming, and southeastern Montana with a service territory of approximately 9,300 square miles.

IV. CURRENT GENERATING RESOURCES

Q. PLEASE DESCRIBE BLACK HILLS POWER'S ELECTRIC GENERATION FLEET.

A. Black Hills Power's ownership interests in electric generation resources are shown on Table 6-1 of the Black Hills Power Integrated Resource Plan attached to Eric Scherr's testimony. Black Hills Power's resources generally include coal, natural gas and diesel generating units located in Gillette, Wyoming and Rapid City, South Dakota. Black Hills Power also has long term power purchase agreements for coal and wind resources.

Q. WHAT IS THE TOTAL GENERATING CAPACITY OF BLACK HILLS POWER'S RESOURCES?

A. The net capacity of Black Hills Power's generating resources and long term power purchase agreements excluding power sales agreements is 521.5 MW. This includes the

City of Gillette's ownership in Wygen III and Montana-Dakota Utility's ("MDU") ownership in Wygen III. This figure does not include the Osage generating units that are currently in cold storage.

Q. WHAT ARE BLACK HILLS POWER'S HIGHEST SUMMER AND WINTER PEAK LOADS?

A. Black Hills Power's all time peak load of 452 MW was reached in July 2011, and a winter peak load of 408 MW was reached in January 2011. These figures include approximately 23 MW of City of Gillette load and all of MDU's Sheridan load.

V. CURRENT GENERATION NEED

Q. DOES BLACK HILLS POWER HAVE A NEED FOR ADDITIONAL GENERATION RESOURCES?

A. Yes. As a result of Federal environmental rules and regulations, Black Hills Power has a need for additional resources beginning in 2014.

Q. WHAT NEAR TERM CHANGES DOES BLACK HILLS POWER FORESEE TO ITS GENERATION FLEET SET FORTH ABOVE?

A. As discussed in more detail in the testimony of Fred Carl, Dr. Robert Pearson and Mark Lux, Federal environmental policy initiatives will result in Black Hills Power retiring three of its older coal-fired generating facilities.

Q. WHAT EFFECT WILL THESE CLOSURES HAVE ON BLACK HILLS POWER?

A. As a result of the retirement of Ben French and Neil Simpson I, Black Hills Power will lose 38 MW of net generating capacity. Osage is currently in cold storage and not

1 operating, therefore it was not included in the IRP modeling. In recent years, the plan has
2 been to retire the Osage units in 2013.

3 **Q. HAS BLACK HILLS POWER COMPLETED AN INTEGRATED RESOURCE**
4 **PLAN TO EVALUATE THE APPROPRIATE REPLACEMENT FOR THESE**
5 **GENERATING RESOURCES?**

6 A. Yes. As discussed in more detail in the testimony of Eric Scherr, Black Hills Power has
7 completed an integrated resource plan. This evaluation resulted in the determination that
8 the most appropriate and cost effective replacement for Ben French and Neil Simpson I is
9 the conversion of simple cycle combustion turbines to a combined cycle configuration.
10 Black Hills Power proposes in this docket to jointly own a combined cycle combustion
11 turbine with its affiliate company, Cheyenne Light, Fuel and Power Company.

12 **Q. IN YOUR OPINION, WHAT IS THE APPROPRIATE RESOURCE ADDITION**
13 **FOR BLACK HILLS POWER?**

14 A. In my opinion, a 58% ownership in a combined cycle unit for a net output of 55 MW is
15 the appropriate resource addition for Black Hills Power.

16 **VI. <u>DEMAND SIDE MANAGEMENT</u>**
17 **<u>AND ENERGY EFFICIENCY ACTIVITIES</u>**

18 **Q. HAS BLACK HILLS POWER ACTIVELY PROMOTED ENERGY EFFICIENCY**
19 **AND DEMAND SIDE MANAGEMENT PROGRAMS?**

20 A. Yes, it has. In June, 2011 Black Hills Power received approval from the South Dakota
21 Public Utilities Commission to implement a new Energy Efficiency Solutions Plan in
22 South Dakota (the "Plan"). The Plan was implemented on September 1, 2011. While not
23 formally approved for cost recovery in Wyoming at this time, the programs included in

1 the Plan, such as rebates for energy efficient water heaters, are available to Black Hills
2 Power customers located in South Dakota and Wyoming as well. It is too soon to
3 determine the achievability of the Plan. Black Hills Power's integrated resource plan, as
4 discussed in the testimony of Eric Scherr, assumed that Black Hills Power will achieve its
5 projected electricity savings from the Plan and also modeled a low-load scenario. Such
6 low-load could be attributed to additional successful energy efficiency or demand side
7 management efforts.
8 In addition, Black Hills Power focuses on the demand associated with its largest
9 customers or 'key accounts' and continually seeks opportunities to work with those
10 customers to shave Black Hills Power's peak demand to the benefit of both the customer
11 and Black Hills Power's entire system. These efforts include rate schedules that promote
12 shifting on-peak load to off-peak periods, special contractual arrangements to curtail load
13 during Black Hills Power's peak demand periods and assistance in power factor
14 correction or load monitoring. Black Hills Power also promotes a Residential Demand
15 Service rate that allows a customer to manage their loads during Black Hills Power's on-
16 peak periods with the use of a demand controller.
17 **Q. DOES THIS CONCLUDE YOUR DIRECT TESTIMONY?**
18 A. Yes, it does.