SOUTH Dakota Department of
Water & Natural Resources
Joe Foss Building
523 East Capitol
Pierre, South Dakota 57501-3181

Tim
Usag
US EPA Reg
One Denver Place
999 18th St, Suite 1300
Denver 802

August 20, 1986

Dale Wells
8AT-AP
US EPA Region VIII
One Denver Place
999 18th Street - Suite 1300
Denver, Colorado 80202-2413

RECEIVED
AUG 25 1986
COLORADO, N. DAKOTA &
S. DAKOTA SECTION

Dear Mr. Wells:

Subject: Stack height

We have inventoried the stacks in South Dakota and found only one taller than 65 meters. Big Stone Power Plant has a 498 foot stack. The boiler for the plant was ordered in December, 1970 and the plant went on line May, 1975. The height and width of the nearby structure is 290 feet and 134 feet, respectively.

I have enclosed a copy of current South Dakota air quality rules for your information. If you have any questions, please contact Kevin Tveidt of my staff by letter or by telephoning (605) 773-3153.

Sincerely,

Joel C. Smith

Joel C. Smith, Administrator
Office of Air Quality and Solid Waste

Enclosure

SOUTH Dakota Department of
Water & Natural Resources
Joe Foss Building
523 East Capitol
Pierre, South Dakota 57501-3181

December 3, 1986

Mr. Dale Wells
U.S. EPA Region VIII
8AT-AP
One Denver Place
999 18th Street, Suite 1300
Denver, Colorado 80202-2413

Dear Mr. Wells:

Enclosed is the information you requested concerning the Big Stone Power Plant. The GEP stack height equation used is Hg = H+1.5L.

Construction Bid Let on Stack February 14, 1973
Construction Period - March 1973-June 1974
Stack Height - 498 feet
Main Boiler Building Height - 293 feet
Main Boiler Building Width - 158 feet

Hg = 293 feet + 1.5(158 feet)
Hg = 293 feet + 237 feet
Hg = 530 feet

According to our calculations, the Big Stone Power Plant stack height of 498 feet is in compliance with federal regulations.

If you have any questions, please feel free to contact me at (605) 773-3153.

Sincerely,

Douglas W. Wetzstein

Douglas W. Wetzstein
Natural Resources Analyst
Office of Air Quality and Solid Waste