

ILLINOIS POLLUTION CONTROL BOARD
January 7, 1982

VILLAGE OF BARTLETT,)
)
) Petitioner,)
)
) v.) PCB 81-109
)
) ILLINOIS ENVIRONMENTAL PROTECTION AGENCY,)
)
) Respondent.)

EDWARD MRAZ, VILLAGE ATTORNEY, APPEARED ON BEHALF OF PETITIONER.

OPINION AND ORDER OF THE BOARD (by J. Anderson):

This matter comes before the Board on the petition for variance filed by the Village of Bartlett (Village) on June 29, 1981 as amended September 11, 1981. The Village seeks variance from the 1.0 mg/l maximum barium concentration limitation of Rule 304(B)(4) of Chapter 6: Public Water Supplies. On October 26, 1981 the Illinois Environmental Protection Agency (Agency) filed its Recommendation in support of grant of variance. Hearing was held November 2, 1981 pursuant to timely filed objections, although neither objector appeared at the hearing.

The Village of Bartlett, population over 6,500, is located in Cook and DuPage Counties. The Village operates and maintains six public water supply wells, and proposes to operate a seventh. Proposed Well #7, DuPage County, has been drilled but is not yet operational, and has a barium content of 2.54 mg/l. Well #7 is expected to provide 25.4% of the DuPage County Zone's water needs.

The waters from the three wells (Wells #1, 2, 3) located in the Village's Cook County Zone cannot practicably be blended with waters of the wells located in the DuPage County Zone. DuPage County Wells #4 and #6 are currently being blended to reduce Well #4's 2.54 mg/l barium level and Well #6's iron level. However, waters from Wells #4 and #6 cannot practicably be blended with waters from Well #7. Well #5 has a hydrogen sulfide "problem", but its waters could be blended with those of Well #7. However, Well #5's past performance leads the Village to believe that Well #5 cannot produce sufficient quantities of water to create a blend which will comply with the 1.0 mg/l barium standard. This conclusion is also based on the fact that Well #7's pumping capacity is 750 gpm, while that of Well #5 is 300 gpm, which would cause problems of control in the mixing ratio (R. 10).

Dale Marting, Village Engineer, and designer of Wells #4, 5, 6, and 7, has explored the possibility of lime softening to bring Well #7 into compliance. The initial capital cost of such a system is estimated to be at least \$1.3 million and possibly as much as \$5 million, with annual operating costs estimated to be \$61,900. Depending on an individual's volume of water usage, installation of the lime softening system would impose a rate increase of between \$6 and \$33 per quarter (R. 10-11, Ex. 3).

Mr. Marting testified that some inquiry had been made concerning an ion exchange system. However, a detailed evaluation of the costs of this system were not made once it was learned that such systems are generally more costly and more difficult to operate than are lime softening systems (R. 12).

The Village presented testimony of George Andrae, Senior Environmental Engineer for the DuPage County Health Department in support of its assertion that grant of variance would not impose a risk to the health of its water users. Mr. Andrae calculated that, because the waters of Well #7 have a sulfate content of 28 mg/l, the formation of insoluble barium sulfate reduces the concentration of ionized barium in the Village's water to only .07 mg/l. Since barium sulphate cannot be assimilated by the body, Mr. Andrae believes that consumption of water from Well #7 poses no risks to health (R. 17).

The Agency did not appear or present testimony at hearing. In its Recommendation, it agreed with all of the Village's assertions. The Agency has recommended grant of variance until January 1, 1984, consistent with Section 1416 of the Safe Drinking Water Act.

The Board finds that denial of variance would impose an arbitrary or unreasonable hardship, based on the costs of compliance, and the lack of threat to public health. Variance is accordingly granted until January 1, 1984, subject to conditions.

This Opinion constitutes the Board's findings of fact and conclusions of law in this matter.

ORDER

1. Petitioner, the Village of Bartlett, is granted a variance from the 1.0 maximum barium concentration limit of Rule 304(B)(4) of Chapter 6: Public Water Supply until January 1, 1984 subject to the following conditions:

a) As expeditiously after identification of a feasible compliance method as is practicable, but no later than January 1, 1983, Petitioner shall submit to the Agency a program (with increments of progress) for bringing its system into compliance with barium standards.

b) Petitioner shall continue to take all reasonable measures with its existing equipment to minimize the level of barium in its finished water.

c) Pursuant to Rule 313(D)(1), on or before March 30, 1982 and every three months thereafter Petitioner will send to each user of its public water supply a written notice to the effect that Petitioner has been granted a variance from the 1.0 mg/l maximum barium standard by the Pollution Control Board. The notice shall state the average content of barium in samples taken since the last notice period during which samples were taken.

2. Within forty-five days of the date of this Order, Petitioner shall execute and forward to the Illinois Environmental Protection Agency, Enforcement Programs, 2200 Churchill Road, Springfield, Illinois 62706, a Certificate of Acceptance and Agreement to be bound to all terms and conditions of this variance. This forty-five day period shall be held in abeyance for any period this matter is being appealed. The form of the certificate shall be as follows:

CERTIFICATE

I, (We), _____, having read the Order of the Illinois Pollution Control Board in PCB 81-109, dated _____, understand and accept the said Order, realizing that such acceptance renders all terms and conditions thereto binding and enforceable.

Petitioner


By: Authorized Agent

Title

Date

IT IS SO ORDERED.

I, Christan L. Moffett, Clerk of the Illinois Pollution Control Board, hereby certify that the above Opinion and Order was adopted on the 7th day of January, 1982 by a vote of 4-0.



Christan L. Moffett, Clerk
Illinois Pollution Control Board