Town of Selmer, Tennessee

Aldermen
John Smith
John Finlayson
Paul Simpson
Lloyd Tennyson
Edward Smith

DAVID ROBINSON, Mayor ANN HENDERSON, Recorder Neal Burks, Chief of Police Anthony Carr, Fire Chief Terry Abernathy, Attorney Bill Webb, City Judge Jim Replogle, Building Inspector Theadies Sebree, Street Dept. Mike Dickey, Sanitation Dept.

March 6, 2009

Mr. Kevin Morris, Public Health County Director Tennessee Department of Health Hardeman County Health Department P.O. Box 670 10825 Old Highway 64 Bolivar, TN 38008

Dear Kevin,

As you may have recognized from some of the responses to your testimony before the Selmer Board of Aldermen on February 24th, concerning the depth of your review of the current information concerning water fluoridation, we were frustrated by the inability to answer to our satisfaction the direct questions that I believe are pertinent to the Town of Selmer making a due diligence decision about the continuation of adding a specific substance to our water supply with the intention that our consumers are compelled to eat and drink this substance for, conceivably, the rest of our lives; so I appreciate your offer to answer my detailed questions in writing.

We have read the documents you have submitted, and I appreciate the benefit of our Board receiving your collective counsel. We have also received your documentation from the American Dental Association and your list of other entities endorsing water fluoridation.

Having received your Department's position on the general issue of fluoridation, we now turn to you for specific data and respectfully request that you focus and restrict your responses to the specific question as posed, so that the Board has no confusion between the data we request and your endorsement.

As you have projected to this Board that you have performed a thorough review of the available data, and ask that we rely upon your endorsement, we ask that you tender your response to this request by April 1st so that we may consider your information in any future decision-making.

For the sake of clarity, please provide uncombined, specific, separately numbered, and corresponding written responses for each of the questions below. Where applicable, please answer yes or no and provide a justification for the response. For data that is not specific to Selmer but is gathered for McNairy County, please so indicate.

144 North Second Street \bullet Selmer, Tennessee 38375 \bullet (731) 645-3241 Fax (731) 646-1462 www.selmer-tn.com

This institution is an equal opportunity provider, and employer

- 1) Are you able to provide an estimate for the full range of daily water ingestion by consumers in Selmer, including specific ranges for laborers, athletes, the excessively thirsty such as those individuals with diabetes, and those encouraged by health professionals to use water for health or detoxifying purposes? If yes, please submit the data specific to this request and identify the published source of your estimates.
- 2) Are you able to identify the estimated range of total daily water ingestion by infants and children by age in Selmer? If yes, please submit the data specific to this request and identify the published source of your estimates.
- 3) Is there any identifiable range of water consumption, age of consumer, population afforded equal protection, list of populations with specific diseases, or list of populations with higher risk for certain diseases or harmful effects, for which the health department takes the position that the Town of Selmer does not have the mission of providing delivery of water that is safe for lifetime consumption without anticipated adverse health effect? If so, please state for what occurrence or population the health department advises that the Town's duty to provide stewardship over the public drinking water ceases? If not, please state No.
- 4) As the free-fluoride ion is not removed by simple carbon filtration, what is the estimated cost for installation and yearly maintenance for a whole-house residential water treatment system to limit drinking, cooking, and dermal fluoride exposures from baths and showers for a family of four? Please identify your source.
- 5) Has the Tennessee Department of Health informed the general public of Selmer, or any medical professionals attending to the personal health of citizens of Selmer, of any specific foods, beverages or produce that may contain significant concentrations of fluoride that consumers may consider in supplementing their daily exposures or restricting their daily exposures?

If you have provided such information, please submit the date or dates on which such information was disseminated in our community, and the method of dissemination, along with a copy of such notice. If you have not provided such information to the general public, please so state.

- 6) If the Tennessee Department of Health has not provided the public with specific knowledge of sources of fluoride exposure, does the health department contend that the health department has no duty, nor any other government entity has a duty, to inform the consumer of sources of fluoride exposures while advising water operators to increase exposures through the water supply? If no government entity has such a duty, please so state. If there is a duty to inform the public by some government entity, please identify that entity.
- 7) With the publication of the National Research Council Report on Fluoride in December 2006, and evidence contained therein that endocrine systems and thyroid

functions are impaired at exposure levels to fluoride below the consumption levels expected from drinking optimally fluoridated water, does the department of health or the water system operator have any duty of care as a learned intermediary to inform the consumer of contraindications when a direct water additive with such identified risks is purposely administered? Please state Yes, if so. If not, please state No.

- 8) The National Research Council 2006 report on fluorides says that kidney patients and diabetics are "susceptible subpopulations" that are particularly vulnerable to harm from ingested fluorides. This statement was made without regard to whether the fluoridated water is at 1ppm concentration or up to 4ppm concentration. If Selmer continues to fluoridate its water, what specific steps will the Tennessee Department of Health take to ensure that all kidney patients and diabetics in our area are made aware of this information? How will the Tennessee Department of Health pay for these steps?
- 9) Since fluorides accumulate over time in the body's pineal gland (per the National Research Council report on fluorides), and since the report indicated that "the elderly are another population of concern because of their long-term accumulation of fluoride into their bones," a) other than by a painful bone biopsy or indirect indicators such as blood or urine fluoride levels, how can a Selmer-area resident learn the specific amount of fluoride that has accumulated over time in his or her bones or joints, and b) who is to pay for costs related to any method you suggest?
- 10) Please identify any subset of the population that the health department has determined does not have readily-available and affordable access to beverages, such as fruit juice from concentrate, juices containing white grape juice, sodas from leading vendors such as Coca-Cola and Pepsi, teas in powder, bag or prepackaged form; processed foods such as cereals, mechanically de-boned chicken, processed lunch meats, prepared-to-eat fish products; produce such as head lettuce, leaf lettuce, tomatoes, tomato paste, potatoes, cabbage, grapes, raisins, and citrus fruits; and/or any other combination of prepared foods, beverages and produce that may contain significant concentrations of fluoride. For any subset of the population in Selmer or McNairy County identified, please submit the study, and the number of individuals represented as not having access to these foods.
- 11) If, as purported, there are no labeling requirements, and if in fact commercially available foods do not routinely divulge the fluoride content of readily-available processed foods, beverages, and produce, how does the health department contend that consumers are able to evaluate their exposures in order to increase or reduce their fluoride consumption?
- 12) Does the Tennessee Department of Health consider the American Dental Association a reliable source for determining recommended dosages for certain children's ages for supplemented fluoride in non-fluoridated communities, as represented by the CDC's reference to the ADA's fluoride supplement schedule? If so, upon what authority from Congress does the American Dental Association merit the right to establish dosage schedules for prescription drugs?

- 13) Based on the estimates of the full range of water consumption by age in your answer in #2 above, please determine the amount of excess fluoride consumed by each children's age range drinking the "optimally" fluoridated tap water, in comparison to the ADA supplement schedule of what a health professional would be able to prescribe for the same age range.
- 14) What is the EPA's Integrated Risk Information System (IRIS) Reference Dose (RfD) for fluoride?
- 15) Please provide a determination of how many, or what percentage of, infants in Selmer will exceed the RfD for fluoride if their infant formula is mixed with fluoridated tap water. Please identify the source of your information.
- 16) Please provide a determination of how many or what percentage of children in Selmer will exceed the RfD for fluoride when considering the full range of water consumption and fluoride from sources other than water. Please identify the source of your information.
- 17) As in your prepared presentation to our Board you continually made reference to the American Dental Association, does the Tennessee Department of Health recognize any specific authority that the American Dental Association may possess to determine the safety or effectiveness of a specific product intended to treat or prevent disease? If Yes, please so state.

If Yes, from where is the ADA's authority to determine claims of health safety and effectiveness for a specific product derived?

- 18) Does the American Dental Association's claim of safety and effectiveness, or the Tennessee Department of Health's claim of safety and effectiveness, extend to the specific American Development Corporation hydrofluorosilicic acid product as added to the Selmer public water supply? If so, please state Yes.
- 19) As this issue is often contentious and confusing in terms, please do not confuse this request as a request for epidemiological studies for which the study design does not question whether the subjects drank the tap water, the volume of water the subjects drank, nor the subjects' exposures to fluoride from other sources -- in other words, without isolating for quantitative exposure to the substance to determine confidence in its causative effect.

Please provide a true and complete copy of any chronic toxicological studies on the health and behavioral effects of continued consumption of hydrofluorosilicic acid, the actual substance added to Selmer's water supply.

If the Tennessee Department of Health is able to provide a specific toxicological study on the long term health effects of hydrofluorosilicic acid, please identify the dated peerreviewed journal in which the study was published, from what entity the actual chemical was sourced, and a list of any contaminants that were included.

If you cannot provide a true and complete copy, please state that the Tennessee Department of Health cannot produce a chronic toxicological study on the health and behavioral effects of hydrofluorosilicic acid.

- 20) Is it true that fluorides are more effective in preventing cavities on the flat surfaces of the teeth, where only approximately 15% of cavities occur, than in the pits and grooves of the back molars, where approximately 85% of cavities occur?
- 21) If a chemical manufacturer of hydrofluorosilicic acid will not declare that their specific product, inclusive of any contaminants, is effective at reducing the incidence of tooth decay when ingested in dilution amounts consistent with fluoridation goals of 0.7 to 1.2 milligrams of fluoride ion per liter, and safe for the full range of expected human consumption at these dilution ranges, including for infants, children, the elderly, and other populations afforded equal protection, as intended by our Town's decision to add the product to the public drinking water, will the Tennessee Department of Health endorse its addition to the public water supply? If so, please state Yes. If not, please state No.
- 22) If a chemical supplier of hydrofluorosilicic acid will not make such a claim for their specific product, will the Tennessee Department of Health make such a claim, and indemnify the chemical supplier and our water system against the occurrence of adverse health effects or claims of harm?
- 23) If a chemical manufacturer of hydrofluorosilicic acid does not fulfill the published requirements for all direct water additives for manufacturer's certification to meet ANSI/NSF Standard 60 as Tennessee laws, regulations, or codes require, does the Tennessee Department of Health support or endorse that specific product's addition to Selmer's public water supply? If so, please state Yes. If not, please state No.
- 24) As the cover story of the July 2000 Journal of the American Dental Association (JADA) clarifies that even if tooth enamel were to contain as much as 1000 parts per million fluoride as a result of systemic ingestion it would not be any more protective of acid dissolution (decay) than if the tooth enamel contained its normal 20 parts per million, or 100 parts per million as it is found in fluoridated communities or with subjects that take fluoride supplements, can the Tennessee Department of Health produce any peer-reviewed physiological studies that refute this finding, and show physiologically that the fluoride content of the enamel from systemic ingestion is directly correlated to being more protective of acid dissolution?

If yes, please identify and produce a copy of the peer-reviewed journal or journals in which the physiological study or studies were published after the appearance of the JADA article, and the corresponding response or responses from the author of the July 2000 JADA article.

If the department cannot produce a specific physiological study (not review), as opposed to the non-qualified epidemiological studies referred to above, please state No.

25 Please identify the entity that the Tennessee Department of Health asserts bears the burden of cost for installation and maintenance of any fluoride removal system for a consumer identified in government scientific literature as unusually susceptible to fluoride's adverse health effects, i.e., the consumer, an entity promoting or endorsing fluoridation, the local dental society, the American Dental Association, an insurance company, the water system operator, the Tennessee Department of Health, etc.

Please identify under what conditions any entity listed above may be held accountable for these costs.

- 26) Please identify the entity that the Tennessee Department of Health asserts bears the burden of determining the "objectionable" nature of any dental fluorosis, i.e., the parent, the child, the attending dentist, the local dental society, the American Dental Association, an insurance company, the child at age of maturity, the water system operator, the Tennessee Department of Health, etc.
- 27) CDC data (MMWR, Aug. 26, 2005) show that approximately 2-4% of citizens experience permanent and costly-to-repair moderate and severe dental fluorosis teeth damage (staining and pitting) from fluorides. For citizens with this teeth damage who do not wish to live the balance of their lives with the disfigurement, but who do not have funds to pay for teeth veneers or other teeth repair, who does the Tennessee Department of Health say should pay for their teeth repair work; i.e., the parent, the child, the attending dentist, the local dental society, the American Dental Association, an insurance company, the child at age of maturity, the water system operator, the Tennessee Department of Health, etc.
- 28) What specific percentage of citizens experiencing a) mild, b) moderate, and c) severe dental fluorosis would the Tennessee Department of Health consider to be an acceptable upper limit percentage of persons with each of these conditions both in Selmer or any given city? What we are looking for here is not a generalized statement that reducing dental fluorosis is desirable and a description of methods to hopefully reduce the amount occurring, but rather actual, specific numerical percentages for acceptable upper limit amounts and a justification as to how these numbers were attained.
- 29) Should individuals with moderate or severe dental fluorosis be personally willing to accept these conditions as an acceptable side effect for the public as a whole to continue use of fluorides for cavity reduction?
- 30) Please identify the estimated current cost for a dental veneer intended to repair "objectionable" dental fluorosis, the length of service that the dental industry expects a veneer to provide, and the estimated number of replacements that an individual receiving a veneer should expect over a lifetime.

- 31) Is the Tennessee Department of Health willing to openly publish photos of mild, moderate, and severe dental fluorosis, along with the pro's and con's of use and ingestion of fluorides, to enable citizens with these teeth conditions to judge the risks as well as benefit of fluorides and fluoridation for themselves?
- 32) Does CDC's statement that every dollar spent on fluoridation saves \$38 dollars in dental repair work factor in the costs of repair of teeth for persons with dental fluorosis?
- 33) Will the Tennessee Department of Health indemnify the City against any adverse health effects or claims of harm for which the Tennessee Department of Health has assured our Board will not occur?

In addition to the questions above, the following questions have been submitted for response from our black community:

- 1) The Tennessee Department of Health says that fluorides in toothpaste and water and supplements are safe, but we've learned that the Centers for Disease Control has information that shows that blacks have disproportionate amounts of teeth staining and pitting from fluorides called dental fluorosis, and that we particularly have significantly more moderate and severe dental fluorosis. Why hasn't the Tennessee Department of Health shared this information with the black community and also showed pictures of the various types of dental fluorosis to the black community?
- 2) If black residents have dental fluorosis caused by fluorides, are we expected to simply "live with it" and accept it?
- 3) Why hasn't the Tennessee Department of Health told the black community about CDC's recommendation that parents might want to consider using unfluoridated water for mixing infant milk formula?
- 4) What steps will the Tennessee Department of Health take to ensure that black families with babies and caregivers of infants and babies effectively hear and understand the news about fluoridated water and milk formula?
- 5) If a black family doesn't have money to filter household water to remove fluorides for baby milk or for family use, who can we look to for funds for bottled water or a filtration system to remove fluoride from the water?
- 6) Since blacks have disproportionately more diabetes and kidney disease, and kidney disease and diabetes are issues of real concern to the black community, why hasn't the Tennessee Department of Health told us that the National Kidney Foundation says that kidney patients should be notified of the potential risk of fluoride exposures, and that the National Research Council has designated kidney patients and diabetics as susceptible groups that are particularly more vulnerable to harm from fluorides?

- 7) What steps will the Tennessee Department of Health take to ensure that black kidney patients and diabetics find out that the National Research Council says kidney patients and diabetics are particularly susceptible to harm from ingested fluorides?
- 8) Does the Tennessee Department of Health believe it has a moral responsibility to actively share all this information with the black community?
- 9) Why has the Minority Health Department of the Tennessee Department of Health not shared the information about dental fluorosis and kidney patient and diabetic fluoride susceptibility with the TN black community?
- 10) We have learned that the National Research Council says senior citizens are more at risk from fluorides because of long term accumulation of fluorides in their bones. Why hasn't the Minority Health Department of the Tennessee Department of Health shared this with black seniors? How will this information be shared with black seniors so they actually and effectively hear it?
- 11) Does the Tennessee Department of Health believe that black and other minority families in our area who are economically disadvantaged, or who have limited computer skills, or who have limited English ability, have found, read, and fully understood the information and ramifications of CDC's statement inside its website that families with babies may wish to consider using unfluoridated water for infant formula?

Thank you for giving this request your immediate attention. At the time, I questioned whether the week that you had committed to was enough time for you to deliver your response, but as I understand that you must have prepared for your endorsement and that these issues must have been a part of your review, I look forward to your rapid reply.

Respectfully

David Robinson

Mayor, Town of Selmer

cc:

Board of Aldermen Independent Appeal