Thank you for your warm welcome. I am grateful for the opportunity to be here today. I'd especially like to thank Senator Lester Jackson, who is also one of my colleagues in the dental community, for this wonderful invitation.

The first question that’s probably on your mind is: “What is the American Dental Association?” The ADA was founded in 1859, and is the oldest and largest national dental association in the world. Seven out of 10 dentists in the United States belong to the American Dental Association. In total, our membership stands at 156,000 dentists, including 3,000 dentists right here who belong to Georgia Dental Association, one of our state dental societies.

As the largest dental organization, we serve as the “umbrella” organization for the entire dental profession. The American Dental Association represents all dentists: general practitioners, specialists, academicians, researchers, those working in industry and community health, and those in the armed forces.

We pride ourselves on being a valuable resource to the dental profession as well as to the public.

We are educators and advocates. We are committed to the highest of ethical standards in the dental profession, and believe that our status as trusted health professionals clarifies that we place the greater good of our patients and our communities ahead of personal interests. Our mission—the goals we strive to achieve as an organization—involves protecting and advancing the public’s oral health as well as promoting
understanding and goodwill throughout the dental community. As dentists and as human beings, we are united in the ideal of service.

Some Americans have access to the best dental care in the world and, as a result, enjoy excellent oral health. But tens of millions still do not have this privilege, owing to such factors as poverty, geography, lack of education and health literacy, and language or cultural barriers.

Especially key to improving this situation is specifically targeting oral health literacy deficiencies to help individuals learn more about how to prevent dental disease and remain disease free. This includes working with new mothers to educate and empower them, so they can prevent early childhood tooth decay in their own families by not putting their babies to bed with a bottle of juice or milk. Too often, we hear people say they don’t go to the dentist because they aren’t in pain. In the year 2000, Surgeon General David Satcher called dental disease the “Silent Epidemic.”

We need to end the silence and spread the word that getting an oral health examination before experiencing pain is the best way to prevent serious and sometimes life-threatening oral disease.

With each passing year, science uncovers more evidence of the importance of oral health to overall health. Early diagnosis, preventive treatments and early intervention can prevent or halt the progress of most diseases of the mouth—diseases that, when left untreated, can have painful, disfiguring and lasting negative health consequences. Yet millions of American children and adults lack regular access to routine dental care, and many of them suffer needlessly from conditions, which are, for the most part, preventable. Oral health disparities cut across economic, geographic and ethnographic lines. The communities most adversely affected are racial and ethnic minorities, the elderly and disabled, and the poor. As an enlightened society, we must no longer tolerate preventable oral health disparities.
The nation’s dentists have long sought to stem and turn the tide of untreated disease. However, dentists alone cannot bring about the profound change needed to correct the gross disparities in oral health. We need the support of policymakers to increase oral health education programs for children and adults, and to support sufficient funding for Medicaid providers to ensure, for instance, that every Georgia dentist will participate in the program.

The ADA is well aware that anti-fluoridation groups—like the Lillie Center, located in Ellijay, Georgia—have appealed to civil rights leaders to join their cause to discontinue community water fluoridation throughout America. They have claimed that because African Americans suffer disproportionately from kidney disease and diabetes, that fluoridated water unfairly and negatively impacts the community.

The best available scientific evidence indicates that individuals with chronic kidney disease or diabetes can consume optimally fluoridated water without negative health consequences. In fact, good oral health, provided in part by fluoridation, can help individuals with these conditions have fewer overall health issues.

Furthermore, in 2008, following a review of the available science, the National Kidney Foundation released a paper on fluoride intake and kidney disease. In that paper, which is available on their Web site, they state that there is no consistent evidence that the retention of fluoride in people with advanced stages of chronic kidney disease, who consume optimally fluoridated drinking water, results in any negative health consequences. Compared to other nutrient intakes, fluoride is a secondary concern.

This is also true for diabetics who suffer from unchecked oral infection due to untreated tooth decay and periodontal, or gum disease. From research conducted by the National Institute of Dental and Craniofacial Research with American Indians—who have the highest rate of diabetes of any minority—we know that treating and eliminating oral infection significantly improves a diabetic’s overall health. Knowing that minority populations suffer disproportionately from diabetes, the most important thing to ensure
is that they receive the benefits of fluoridation and all effective preventive strategies, starting from infancy and continuing throughout their lives.

Another allegation is that adding fluoride to community water is equivalent to forcibly medicating people. Foods and beverages have been used as vehicles for delivering nutrients and minerals for many decades. Fortifying water with fluoride to prevent tooth decay is similar to fortifying salt with iodine to prevent thyroid problems, or milk with vitamin D to prevent rickets. Additionally, many of you are familiar with the 1996 government mandate that cereals and grains be fortified with folic acid to prevent birth defects.

Community water fluoridation is not a Tuskegee experiment. As the vast majority of public health experts agree, it is the single most effective and impactful public health measure of this century. It is not targeted solely to the African American community. Fluoridation has been instituted because the underlying problem of dental disease is widespread, the disease burden is distributed unfairly, the evidence of preventive intervention is strong, and alternative strategies are not reaching those who need them the most. It is the most unbiased approach in America to ensuring that all of our citizens have the same level of prevention.

The only known risk associated with drinking fluoridated water is the milder forms of enamel fluorosis, which are characterized by white spots or streaks in teeth. These spots are not readily apparent to the casual observer and have no effect on tooth function. It is true that fluorosis has increased in this country, even in non-fluoridated communities. This is due in large part to the fact that Americans are now getting fluoride from multiple sources, including water, fluoride supplements and the ingestion of fluoride toothpaste. This was not the case in 1945 when the first city—Grand Rapids, Michigan—added fluoride to its water.

It is true that minority populations have more fluorosis than other populations. We do not know the reason for this phenomenon, and research concerning this matter is
continuing. The ADA, along with the CDC and other federal health agencies, has tracked fluorosis trends for many years. After confirming the data, we joined the government earlier this year in supporting their recommendation that all areas of the country should use one level to fluoridate drinking water—0.7 ppm. That level was chosen to retain the oral health benefits of fluoridation while at the same time helping to reduce the potential for enamel fluorosis.\(^8\)

There is one other thing about fluorosis that you should know. Research published in 2009\(^9\) reports that molars with fluorosis are more resistant to tooth decay than molars without fluorosis. At the end of the day, would you rather see your child with a few, often difficult to identify, white spots on their teeth, or die of a brain abscess resulting from an untreated tooth infection, like 11 year-old Deamonte Driver did seven years ago? His death is a national disgrace—and it is incumbent upon all of us to prevent these tragedies. Our society deserves the best dental care available, and community water fluoridation, which is cost effective and safe, is one solution that should continue to be offered throughout the country.

I want to stress that there is a great deal of misinformation regarding water fluoridation. I say “misinformation” because the evidence reviewed and cited by fluoridation opponents is inconsistent and scientifically inconclusive about the harmful potential of fluoride levels in drinking water.

For example, there has been a movement among opponents to link fluoridated water to osteosarcoma, a rare bone cancer more prevalent in young males—despite a lack of scientific evidence showing any association.

In fact, a new study published in July 2011 in the *Journal of Dental Research*\(^{10}\) found that bone fluoride levels are not associated with osteosarcoma. This most recent study was conducted by a team of researchers from Harvard University, the Medical College of Georgia, and the National Cancer Institute.
Besides decades of proven safety and effectiveness, there are additional reasons for policymakers—like you—to support water fluoridation. Fluoridation is a public health measure that actually saves money.\textsuperscript{11}

One study estimated that the fluoridation program in Colorado was associated with an annual savings of $148.9 million in 2003, or approximately $61 per person,\textsuperscript{12} and a study done by the CDC in 1999\textsuperscript{14} concluded that Louisiana spent $36 less on each child enrolled in Medicaid who lived in fluoridated parishes. On the other hand, one of the most expensive safety net programs for states is Medicaid, and in these tough economic times, policymakers continue to look for ways to trim or reduce the costs of these programs. Be aware that eliminating water fluoridation would have a serious negative impact on Georgia’s Medicaid dental program. Since there are 900,000 children in Georgia enrolled in Medicaid, and by utilizing the 1999 cost data, we conclude that eliminating fluoridated water could lead to an increase in Medicaid costs by at least $32 million dollars a year.

Some have said that they don’t oppose fluoride, but think that it should be applied in a dentist’s office. While fluoride varnish has been proven to be effective, the ADA does not believe this approach is practical, or will have the greatest decay preventive effect in the communities where it is needed most. For children, ages six years or older, 75 percent of tooth decay in permanent teeth was found in 33 percent of their population, primarily low income.\textsuperscript{15} Fluoride varnishes applied in a dental office require two to four appointments each year.\textsuperscript{16} Many low income parents don’t have the means to leave their jobs and take their children out of school to meet these obligations.

Before fluoridation, the typical schoolchild developed three to four new cavities each year. It was commonplace for individuals to receive dentures as graduation or wedding gifts. The loss of all of one’s teeth in early adulthood was viewed as a way of life. Today, many people simply do not have that type of decay burden—thanks in large part to the role fluoridation plays in preventing decay. We must not lose sight of the remarkable progress that has been made. No one wants to return to an era of rampant
tooth decay. We must share the benefits of good oral health with all of our citizens, not just those with the means to access preventive and routine care.

In summary, the ADA and the Georgia Dental Association believe that community water fluoridation is valuable because:

- The benefits are available to the entire community regardless of socioeconomic status, educational attainment or other social variables.¹⁷

- Individuals don’t need to change their behavior to obtain the benefits of fluoridation.⁴

- Fluoridation benefits both children¹⁸ AND adults¹⁹ and

- Fluoridation is more cost effective than other forms of fluoride treatments or applications. And, individuals can have a lifetime of fluoridated water for less than the cost of one silver filling.¹¹

Our dental organization is not alone in its support for fluoridation. Community water fluoridation is also endorsed by the American Academy of Pediatrics, the American Medical Association, the American Public Health Association, the Association of State and Territorial Dental Directors, the World Health Organization and many other organizations and agencies.²⁰

Maintaining existing fluoridated water supplies, and encouraging the expansion of new ones, is an important component of this strategy. Discontinuing water fluoridation would be akin to withholding treatment, and could lead to the corrosion of lives, children being robbed of otherwise bright futures, and the aggravation of chronic and expensive-to-treat medical conditions.
We need to rally support for fluoride in the water supply. The scientific evidence supporting fluoride is overwhelming. We need the confidence and understanding of every governmental body that has a stake in, and a concern for, the overall health of the citizens in America. This is especially true of policymakers. We need your support. The citizens of Georgia need your support. Otherwise, we may miss an opportunity to effect lasting, positive change.

The ADA is attempting to address the issue of access to quality dental care by the most expedient, cost-effective, and most comprehensive means. We have a vision of a healthier, more productive nation. I know you want these same things for the residents of Georgia, and the members of the ADA and the Georgia Dental Association stand ready to work with you to achieve this vision.

Thank you.
Reference List for Dr. Gist Speech 9-17-11


