**STATEMENT OF THE**

**AMERICAN DENTAL ASSOCIATION**

**TO THE**

**COMMITTEE ON INDIAN AFFAIRS**

**AND THE**

**COMMITTEE ON HEALTH, EDUCATION, LABOR AND PENSIONS**

**U.S. SENATE**

**ON**

**S. 1057**
**THE INDIAN HEALTH CARE IMPROVEMENT ACT AMENDMENTS OF 2005**

**SUBMITTED BY**

**ROBERT M. BRANDJORD, D.D.S.**
**PRESIDENT-ELECT**

**JULY 14, 2005**

## Executive Summary

The American Dental Association (ADA) has been concerned about access for underserved populations for many years and has been working on the development of models to respond to various access challenges. Since October 2003, when the ADA established a task force to explore the options available for delivering high quality oral health care services to Alaska Natives in the approximately 200 rural villages in Alaska, the Association has attempted to work to find solutions that would be acceptable to all stakeholders. At a November 15, 2004 meeting with tribal leaders the ADA and Alaska Dental Society (ADS) extended an invitation to work together to address the access backlog issue. This was followed-up with a letter from the ADA and ADS presidents to all tribal health directors.

The response to our backlog initiative was at first encouraging, but unfortunately, it appeared that villages that had voiced some initial interest in the program decided not to pursue it. One of the reasons given for that was the difficulty in credentialing dentists to come to Alaska. The ADA approached the Joint Commission on Accreditation of Healthcare Organizations (JCAHO) in an effort to seek a solution to the credentialing paperwork burden. The ADA also established a new full time position within the Association for an employee who would help coordinate the placement of dentists in Indian Health Service (IHS) and tribal programs.

Contrary to some misconceptions, the tribes, the IHS and the ADA all agree on most issues affecting the Dental Health Aide Program--including the concept that expanding the Community Health Aide Program (CHAP) to include dental health aides who can provide education and preventive services is a reasonable response to address the needs of Native Alaskans in rural villages.

The one concept that the dental community unequivocally opposes is allowing non-dentists, including Dental Health Aide Therapists (DHATs), who are inadequately trained and unlicensed, to perform irreversible surgical procedures--such as extracting teeth, drilling cavities or performing pulpotomies (which are similar to root canals), because doing so would risk patients' safety and health. The Alaska Board of Dental Examiners agrees with the dental community. The Board, in response to a unanimous vote, stated in a February 7, 2005 letter to the Alaska Attorney General that DHATs are practicing dentistry illegally.

Providing dental services to Alaska Natives in remote villages is complicated by many factors and the failure to properly diagnose and to take appropriate and timely actions in the event of complications has real life consequences. For example, many adult patients have other diseases—diabetes, heart problems, etc.—which add to the complexity and make treatment more dependent on comprehensive training. Also, it is not possible to predict the more routine, "simple" extractions from the complicated procedures before the process begins. The dental community's concern is that DHATs' training is not

adequate to help them recognize cases such as these—cases in which failure to do so could put the patient at great risk.

While the ADA recognizes that in any given procedure things can go wrong for either a dentist or a therapist, the difference is that a dentist can draw upon a more extensive set of knowledge, skills, and abilities to problem solve and apply a more advanced level of skills as needed. This disparity in potential problem solving and level of skills is understandable given the fact that dentists typically undergo four years of training in dental school after completing their undergraduate work (generally totaling 8 years of higher education), while DHATs are provided training only over a 2 year period after graduating from high school. To underscore the educational gap between the foreign-trained DHAT and other members of the dental team, it is important to note that the entry point for a dental hygienist, who cannot perform the irreversible procedures the DHAT may be permitted to do, is a minimum of two-years of post-secondary education. Also, unlike DHATs, both dentists and dental hygienists are licensed and must undergo independent verification of their competency by a state board, including passing a clinical examination.

The ADA believes that it is a false choice that Native Alaskans will have either no care or care provided by DHATs.

The ADA has suggested that it would be preferable to put a dental health aide in <u>every</u> village to provide oral health prevention and education, establish a coordinator position to work with the tribes to bring <u>more dentists</u> to the villages, and reduce the credentialing paperwork redundancy.

In addition, the ADA believes there is a better alternative program -- an Alaska-based solution for an Alaska access problem. Four dental experts, including the current dental director of the Alaska Native Medical Center in Anchorage, Alaska, recommended that the best way to deliver care to the Alaska Natives is to make the current delivery system more efficient by using more dental assistants and providing more dental chairs for each dentist. Also, as part of that program, the experts recommended the development of a new Community-based Oral Health Provider (COHP). COHPs, like DHATs, would be mid-level providers, but they would have an expanded management role (in addition to an expanded clinical role), which will significantly enhance the efficiency of the current delivery system. COHPs, who could be trained in Alaska in about 12 to 18 months, would coordinate care, provide preventive services and help with oral health education and nutrition so that when dentists are in the village clinics, they are much more productive and efficient. The ADA believes this promising model, many aspects of which have already proven to be successful in the Southcentral Foundation program, is a better solution for Alaska tribal programs. A paper on this model has been given to staff.

Finally, the ADA supports language passed last year in the House Resources Committee in H.R. 2440, and which we understand will be reintroduced this year, which supports the dental health aide program but prohibits non-dentists from performing irreversible procedures on patients.

My name is Robert Brandjord. I am president-elect of the American Dental Association (ADA) and a practicing oral surgeon from Minnesota. Thank you for providing the Association with the opportunity to comment on S. 1057, the Indian Health Care Improvement Act.

I am here to express the ADA's strong support for using dental health aides and other innovations in dental care delivery to help reduce the disproportionate burden of dental disease that many Alaska Natives suffer from today. At the same time, I am here to state the ADA's unequivocal opposition to experimenting on Alaska Natives by allowing non-dentists to perform irreversible dental surgical procedures.

The 152,000 members of the ADA, representing over 72 percent of the profession, believe strongly that all Americans deserve access to dental care. We are committed to working with all stakeholders to find short- and long-term solutions to providing that care, especially to low-income and geographically isolated populations for whom access to dentists is difficult and who, consequently, suffer a disproportionate degree and severity of dental disease.

Since October 2003, when the ADA established a task force to explore the options available for delivering high quality oral health care services to Alaska Natives in the approximately 200 rural villages in Alaska, the Association has attempted to work with the Indian Health Service (IHS), the Alaska Native Tribal Health Consortium (ANTHC), and the Alaska Dental Society (ADS) to try to find solutions acceptable to all.

The task force traveled to Alaska in March 2004 and met with IHS and tribal representatives, ADS leadership and Alaska dentists. Some members of the task force conducted a site visit of Hooper Bay (population about 1,200) and Chevak (about 250 people), villages within the Yukon-Kuskokwim Health Corporation (YKHC). In addition, six members of the ADA's Council on Government Affairs (CGA) spent a week in various Alaska villages providing pro bono dental services as guests of the IHS and the respective tribal health programs. The council members submitted reports to the task force.

All six council dentists (and, subsequently, the task force) agreed that a dental health aide (i.e. a Primary Dental Health Aide I or II) in every village to provide education and prevention would be of great value. Some additional observations by the six dentists: the homes in the villages do not have running water and the water is of such poor quality that soft drinks are the beverage of choice; candy and sugar drinks are ingested throughout the day and are readily available in the village store; smokeless tobacco is used by children; despite significant need for care, the adult population does not generally demand care until there is pain; the majority of dental procedures on adults are emergency based (extractions) with no recall program; and tooth decay is rampant and often visible on children's teeth.

The six ADA dentists, all experienced practitioners, agreed that the circumstances under which they had to function in the villages created significant challenges and required the

application of all of their skills and abilities to assure that good quality dentistry was delivered. Those conclusions were consistent with the IHS practice (as told to ADA personnel attending IHS site visits over the years) of not sending inexperienced dentists to remote locations to provide dental services because they might face circumstances that they were not prepared to properly handle.

The ADA has undertaken several initiatives (described below) to try to alleviate the access problems in Alaska and stands ready to work with the IHS and tribal programs to make these efforts more effective. The Association believes that the real solution lies in an enhanced delivery system that makes the current system more efficient. To this end, the Association is open to the development of a new community-based allied provider which protects patient safety. As described in greater detail below, we can offer one approach—the Community-based Oral Health Provider model (COHP)--that appears to meet these goals and was specifically designed with input from Alaskans, using people trained in Alaska, to address the needs of the Alaska Native population.

In addition to the March 2004 visit, a portion of the task force traveled to Anchorage and met with tribal leaders on two other occasions. At a November 15, 2004 meeting the ADA and ADS extended an invitation to work together to address the access backlog issues. This effort was followed-up with a letter from the presidents of the ADA and ADS to all tribal health directors, asking them to work with the ADA and ADS to bring dentists to villages in a manner that works for all.

Unfortunately, the approximately 140 ADA member dentists who expressed an interest in volunteering to serve Alaska Native patients in two- to three-week trips were rebuffed. The Norton Sound Health Corporation requested a single dentist to serve for several months. A second request, from Metlakatla, sought one full time and one part-time dentist. As we made clear when we attempted to launch this operation, the ADA volunteers' responsibilities to their own patients precluded their serving for periods longer than two or three weeks. Even within these limits, their sheer numbers could have had a significant impact on the people most in need of care. For example, the six ADA dentists who volunteered in the winter of 2004 provided services valued at approximately $20,000 each in a single week. Five of those dentists said they were ready to return this year, and yet no corporation told us that they wanted any volunteers.

One of the obstacles to more efficiently bringing dentists (and other health care professionals) to the villages is the need to submit voluminous credentialing paperwork to each facility. This requirement applies to all providers, including those hired by the IHS and tribal programs, as well as private practitioners who want to provide care in the remote villages. Even movement from one village to another requires that a practitioner undergo a separate credentials review. (Indeed, we were told by an IHS official that this was the case when the IHS tried to bring psychiatrists, psychologists and other mental health care providers to Red Lake during last year's tragic events there.) The ADA also spoke with officials of the American College of Obstetricians and Gynecologists (ACOG). ACOG currently provides volunteer physicians for many facilities in various states that serve the American Indian population; ACOG reports it experiences significant

difficulties in credentialing and licensing, and has stopped sending doctors to Alaska and some other locations as a result.

The ADA believes this redundancy results in a very confusing, excessive, and potentially inconsistent credentialing system that serves as a disincentive to health care professionals who want to provide care to this underserved population. It also makes the IHS and tribal programs less efficient and more costly to operate. While some view these credentialing barriers as a reason to throw up their hands and discount any plan that uses volunteers to treat the backlog of dental disease in tribal villages, the ADA prefers to fight for changes in a bureaucracy that keeps willing providers from patients in need.

In an effort to explore a means of alleviating the paperwork redundancy, the ADA contacted the Joint Commission on Accreditation of Healthcare Organizations (JCAHO) with concerns that dentists who want to provide care to Alaska Natives are being unnecessarily impeded from doing so because of the lack of a uniform credentialing and privileging process. Any effort to develop a uniform credentialing process would not only help the ADA in our efforts to establish a program in Alaska and the lower 48 states, but would also help other organizations as they establish their own programs to provide care to underserved Americans.

For years, as the founding member of the "Friends of the Indian Health Service" the ADA has worked as an aggressive advocate for increased federal funding to ensure the IHS and tribal programs have the resources they need to deliver oral health care services to the

American Indian/Alaska Native (AI/AN) population. In recent months, the Association recognized it needed to do more to acquire the expertise needed to assist in the placement of dentists in IHS and tribal programs. So, the ADA established a new position within the Association – "Manager, American Indian/Alaska Native Dental Placement." We are currently recruiting for this position. The person filling this position will work with the ADS and Alaska tribes to coordinate and enhance the outreach program to get more dentists to provide oral health care in Native villages. In addition, this person will also develop a plan for a program to do outreach with tribes in the lower 48. The Association recognizes that such an effort requires a full time person who can ultimately work with the IHS and tribal programs throughout the country to help address the considerable access problems facing AI/AN populations in many parts of our country. The ADA is pursuing its commitment; to be effective, this program will need the good faith cooperation of the IHS and tribal leaders.

Contrary to some misconceptions, the ADA, the Alaska tribal leadership and IHS agree on many issues, including

- The extent and severity of oral diseases among Alaska Native children is exceptionally high.
- Access to the approximately 200 villages in rural Alaska is very difficult.
- The conditions that contribute to oral disease go beyond the delivery of oral health care services – and require behavioral changes and improved living conditions.

- An excellent means of helping to break the cycle of dental disease and provide culturally competent care is to train an individual from each village to provide dental education and prevention.
- More AI/ANs must be brought into the oral health care delivery system at all levels (including dentists) to provide culturally competent care.
- The dental vacancy rates within the IHS and among Alaska Tribal programs must be addressed.
- The expansion of the Community Health Aide Program (CHAP) to include dental health aides is a reasonable response to address the needs of those in the rural villages and, with one exception concerning DHATs performing irreversible surgical dental procedures, is enthusiastically supported by the ADA and ADS.

**Essentially, the parties disagree on one issue**.

The dental community, including the ADA, ADS, American Association of Oral and Maxillofacial Surgeons, the Academy of General Dentistry, and the American Academy of Pediatric Dentistry unequivocally oppose dental access solutions that would put patients at risk by allowing non-dentists to perform irreversible surgical procedures such as extracting teeth, drilling cavities or performing pulpotomies (which are similar to root canals).

## Patient Safety at Risk

The Alaska Board of Dental Examiners agrees with the dental community. The Board, in response to a unanimous vote, stated in a February 7, 2005 letter to the Alaska Attorney General that DHATs are practicing dentistry illegally. The Board expressed a concern that the rural citizens of Alaska are being put at risk because the unlicensed DHATs will be performing irreversible dental procedures, such as fillings, extractions and pulpotomies, which are the “exclusive duties of a licensed dentist” pursuant to Alaska law. (See Attachment)

The above dental organizations oppose non-dentists, including Dental Health Aide Therapists (DHATs) within the CHAP program, performing irreversible surgical procedures because doing so risks patient safety and health. Proponents of DHATs doing irreversible procedures cite the number of extractions and restorations (drilling teeth) performed by the DHATs during their training as evidence that they will be well prepared to perform such procedures in remote locations on both children and adults. They also predict that DHATs will know to limit themselves to less complicated procedures, leaving the more complicated extractions, for example, to dentists.

Virtually all dentists will tell you that it is not possible to predict the more routine, “simple” extractions from the complicated procedures before treatment begins. Potential complications associated with extractions include fractures to the bones that support the teeth, aspiration of a tooth, prolonged bleeding or uncontrollable hemorrhaging, damage

to adjacent teeth and/or restorations, and expansion of an infection into the pharyngeal spaces. The dental community's concern is that DHAT training is not adequate to help them recognize cases such as these—cases which could put the patient at great risk.

Another area of enhanced risk is that many adult patients have other diseases—diabetes, heart problems—that make treatment more complex and dependent on comprehensive training. For example, the DHAT may have to assess whether there is a cardiovascular condition that might necessitate that a patient be pre-medicated with antibiotics to prevent a secondary heart infection; or assess whether a patient has hypertension and/or diabetes and whether those conditions are controlled. And, unfortunately, many adults within the Alaska Native population have one or more of these health complications. Any of the irreversible dental procedures cited above can lead to problems that can threaten not only the patients' oral health, but also their general health. In extreme cases, infections and other complications from dental procedures can be life-threatening.

High-quality dental care is much more than performing procedures — proper treatment planning calls for diagnostic skills beyond the scope of non-dentists' training. As stated by Dr. Michael Glick in his editorial in the April 2005 edition of the *Journal of the American Dental Association,* "…acquiring the clinical skills necessary to perform particular tasks is not enough to become a competent professional health care provider. To optimize the benefit of learned and acquired clinical proficiencies, these skills need to be accompanied by a comprehensive theoretical background."

The ADA recognizes that in any given procedure things can go wrong for either a dentist or a therapist. The difference is that a dentist can draw upon a more extensive set of knowledge, skills, and abilities to problem solve and apply a more advanced level of skills as needed; a DHAT cannot.

This disparity in potential problem-solving and level of skill is understandable given the fact that dentists typically undergo four years of training in dental school after completing their undergraduate work (generally totaling 8 years of higher education), while DHATs are provided only 18 months of foreign training over a 2 year period after graduating from high school. To underscore the educational gap between the DHAT and other members of the dental team, it is important to note that the entry point for a dental hygienist, who cannot perform the irreversible procedures the DHAT may be permitted to do under the CHAP program, is a minimum of two-years of post-secondary education. Also, unlike DHATs, both dentists and dental hygienists are licensed and must undergo *independent* verification of their competency by a state board, including passing a clinical examination. By contrast, DHATs are certified by the CHAP Certification Board with only one dentist member, who also serves as a DHAT supervisor. There is no independent verification of competency for DHATs.

The following is a *partial* listing of the comprehensive range of biomedical and behavioral science education, ethics and professionalism, and clinical sciences that dental schools must teach to dental students in order to be accredited. According to the Commission on Dental Accreditation (CODA), dental school graduates are expected to demonstrate:

- Knowledge of biomedical, behavioral and clinical science of sufficient depth, scope, timeliness, quality and emphasis to ensure achievement of the curriculum's defined competencies;
- An in-depth understanding of basic biological principles, consisting of a core of information on the fundamental structures, functions and interrelationships of the body systems, in which the mouth and face are a critical anatomical area existing in a complex biological interrelationship with the entire body;
- A high level of understanding of the development, spread, diagnosis, treatment and prognosis of oral and oral-related disease; and
- Biomedical science knowledge of sufficient depth and scope for graduates to apply advances in modern biology to clinical practice and to integrate new medical knowledge and therapies relevant to oral health care.

CODA clinical science requirements are equally rigorous, with required competencies caring for pediatric, adult and geriatric patients including, but not limited to:

- Patient assessment and diagnosis;
- Comprehensive treatment planning;
- Health promotion and disease prevention;
- Informed consent;
- Anesthesia, and pain and anxiety control;
- Fillings, using the full range of safe and effective materials;

- Replacement of teeth;
- Periodontal (gum disease) therapy;
- Pulpal (root canal) therapy;
- Hard and soft tissue surgery;
- Dental emergencies, such as those resulting from blows to the face or other traumatic injury;
- Malformed bite; and
- Evaluation of the outcomes of treatment.

In addition to this broad range of scientific knowledge and clinical skills, "Graduates must be competent in providing appropriate life support measures for medical emergencies that may be encountered in dental practice."

U.S. dental students are required to master all of the knowledge and skills above before graduation. And even after graduation, in almost all states, they must pass a comprehensive licensing exam, administered by an independent examiner, before they are entrusted with the health of a patient.

The contrast between a dentist's training and that of a DHAT is stark. Here is the entire course listing for the University of Otago (New Zealand) Diploma in Dental Therapy, a two year program:

First year:

- General Health Science
- Oral Health Science
- Clinical Dentistry

Second year:

- Society and Health
- Advanced Clinical Dentistry
- Dental Therapy Practice

The failure to properly diagnose complications and take appropriate and timely actions has real life consequences. According to the American Association of Oral and Maxillofacial Surgeons (AAOMS), potential complications from surgical and invasive procedures include conditions that require additional procedures, medication or other therapies beyond the scope of DHAT training, including:

- Acute or chronic infection;
- Injury to adjacent teeth, gums or bone;
- Bone fractures in the jaw or elsewhere in the face;
- Prolonged pain, swelling or even hemorrhage;
- Displacement of tooth, tooth fragments or foreign objects into the airway, gastrointestinal tract or sinus; and
- Breathing or heart problems.

AAOMS goes on to state, “We cannot envision a scenario where an irreversible procedure should be provided by someone who is not a dentist. A patient in need of irreversible dental care services should not be subjected to a lower standard of care just because he or she receives care in a particularly remote area of Alaska. While some may argue that care from a dental health aide is better than no care at all, the reality is that the potential for harm from an irreversible dental procedure is very real. . . . Steps should be set in motion so that patients seeking care for these irreversible procedures through the Indian Health Service receive their care from the most qualified professionals.”

**The Choice Is Not Between “No Care” and “Some Care”**

A common rationale used to support the use of DHATs to perform irreversible dental procedures in remote villages is that some restorative dental care is better than none. The ADA disagrees with this false choice of either no care or care provided by a DHAT. We all agree that no care is unacceptable. The choice is between licensed dentists, who typically undergo at least eight years of higher education, and high school graduates with 18 months training over a 2 year period in New Zealand.

The ADA has suggested a better alternative -- putting a dental health aide in every village to provide oral health prevention and education, establishing an ADA coordinator position to work with the tribes to bring a great many more dentists to the villages, and reducing the credentialing paperwork redundancy. If all parties work together in good faith, these goals could be accomplished.

## An Alternative Approach – An Alaskan Solution for an Alaskan Problem

The ADA asked an *independent* group of experts to come together to develop some alternate ideas on how to improve access to the Alaska Native population and to write a paper. As a result, in April 2005 Drs. Howard Bailit[1], Amid Ismail[2], Tryfon Beazoglou[3] and Tom Kovaleski[4] developed a paper titled the "Integrated Dental Health Program for Alaska Native Populations." (See Attachment)

What the authors of the paper determined is that the best way to deliver care to the Alaska Native population is to make the current delivery system more efficient. This will require more dental assistants, more dental chairs per dentist, and the creation and introduction of a newly designed position – the Community-based Oral Health Provider (COHP). The model described in this paper incorporates many of the efficiencies (such as recognizing the need to train more dental assistants and to increase the number of chairs available for each dentist) that have already proven successful in the Alaska Native Medical Center run by Dr. Kovaleski in the Southcentral Foundation in Anchorage. In addition to those efficiencies, the proposed model also calls for the development of a

[1] Howard L. Bailit, D.M.D., Ph.D.; Professor Emeritus & Director, Health Policy & Primary Care Research Center, University of Connecticut Health Center, University of Connecticut.

[2] Amid I. Ismail, Dr.P.H., M.P.H., M.B.A., B.D.S., Director, Program in Dental Public Health, Professor, School of Dentistry, Professor, Epidemiology, School of Dentistry, University of Michigan.

[3] Tryfon Beazoglou, Ph.D., Professor, Health Economics, University of Connecticut Health Center, University of Connecticut.

[4] Thomas Kovaleski, D.D.S., Dental Director Southcentral Foundation, Alaska Native Medical Center, Anchorage, Alaska.

COHP, essentially a prevention and community-based person who can provide preventive care, education, as well as coordination and preparatory service for the dental team when it travels to a village. COHPs, who could be trained at the University of Alaska in about 12 to 18 months, coordinate care, provide preventive services, and help with oral health education and nutrition so that dentists are much more productive and efficient in the village clinics. DHATs are not envisioned in this model, as the dentist will perform the irreversible procedures.

In summary, the panel recommended:

- With a relatively modest investment in facilities and allied dental health personnel, the current delivery system can be greatly improved, providing significantly more services to the entire population. Sustainable improvement requires the prevention of disease and efficient delivery of therapeutic services.
- COHPs are needed to improve the oral health of remote village residents. Led by a centrally-based dentist(s), COHPs should be responsible for the organization of the overall provision of community and personal level oral health services to clusters of villages. Their management role should include organizing community level health promotion and disease prevention programs, directing the activities of the dental health aides, and increasing the efficiency of visiting dentist teams to villages. Their clinical role should include providing oral health screenings, primary and secondary preventive services, gross tooth decay removal and stabilization, secondary

prevention of mild periodontal diseases, and under dentist supervision pain and infection control.

- The ANTHC, ADA, American Dental Education Association should work collaboratively to develop a national model for training these new oral health care providers in Alaska. More generally, a major effort is needed to recruit, educate, and retain a local dental workforce that is committed to working with licensed dentists in Alaska and is culturally competent to serve the needs of this population.

The ADA recognizes the potential usefulness of the "Integrated Dental Health Program for Alaska Native Populations" as a delivery system that could significantly improve oral health care access for Alaska Natives in the remote villages in Alaska. We know it will work because many of the fundamental aspects of the program have already proven successful in the Southcentral Foundation program. It is an Alaska-developed solution for an Alaska access problem and deserves to be implemented by other tribal programs interested in significantly improving access with a relatively modest increase in investment.

**Indian Health Care Improvement Act**

**S. 1057**

The Association appreciates the efforts of the committee to address the concerns raised last year about DHATs performing irreversible dental procedures by modifying section 121 of S. 1057 to provide for a study of the dental health aide program. However, this

provision continues to allow DHATs to perform irreversible dental procedures, which the ADA cannot support.

As stated above, the ADA believes very strongly that patients are unnecessarily placed at a higher risk when non-dentists are permitted to perform irreversible procedures, such as extractions, the diagnosis and treatment of caries, and pulpotomies. This is especially true when there are other models out there, such as the alternative program using Community-based Oral Health Providers. Frankly, the ADA does not understand why IHS and tribal leaders insist on supporting a delivery system that uses minimally-trained and unlicensed persons (and is acceptable no where else in the United States) when an Alaska-designed solution that will significantly enhance the efficiency of the current system, which relies on the delivery of services by skilled dentists, is available.

The ADA continues to support the approach taken in last year's House Resources Committee's version of section 121 of the Indian Health Care Improvement Act, H.R. 2440, which prohibited non-dentists from performing irreversible dental procedures. It is our understanding that this provision will be reintroduced this year and we urge the Senate to adopt similar language.

# ATTACHMENT

FAXED 2-8-05

## DIVISION OF OCCUPATIONAL LICENSING

*Frank H. Murkowski, Governor*

February 7, 2005

Gregg D. Renkes, Attorney General
Department of Law
P.O. Box 110300
Juneau, Alaska 99811-0300

Dear Mr. Renkes:

I am writing to alert you to the fact that there are people in rural Alaska practicing dentistry illegally. They are being allowed to practice dentistry without possessing the Alaskan license to do so.

At our December 3, 2004, meeting, the Board of Dental Examiners was informed that recently trained Dental Health Aid Therapists (DHAT ) were going to begin their work in the villages of rural Alaska. At several of its meetings this past year, the Board has received formal presentations and frequently discussed the pros and cons of the work that DHAT's will be doing as they relate to the statutes and laws of our state, and the Board's mission to protect the public.

AS 08.36.360 defines the "Practice of Dentistry" as: a person engages in the practice of dentistry who

(1) performs or holds out to the public as being able to perform dental operations;
(2) diagnoses, treats, operates on, corrects, attempts to correct, or prescribes for a disease, lesion, pain, injury, deficiency, deformity, or physical condition, malocclusion or malposition of the human teeth, alveolar process, gingiva, maxilla, mandible, or adjacent tissues; * * *
(6) extracts or attempts to extract human teeth;
(7) exercises control over professional dental matters or the operation of dental equipment in a facility where the acts and things described in this section are performed or done;
(8) evaluates, diagnoses, treats, or performs preventive procedures related to diseases, disorders, or conditions of the oral cavity, maxillofacial area, or adjacent and associated structures; a dentist whose practice includes the services described in this paragraph may only perform the services if they are within the scope of the dentist's education, training, and experience and in accord with the generally recognized ethical precepts of the dental profession; nothing in this paragraph requires a person licensed under AS 08.64 to be licensed under this chapter.

As you can see from the enclosed copy of an article from Anchorage's local paper, DHAT's are and will be practicing dentistry without a license by performing "basic dental practices" and returning to Alaska to "hang a shingle." We have been advised that they will also be doing fillings, pulpotomies (root canals on baby teeth), and tooth extractions. These are all invasive and irreversible dental procedures and according to Alaska statute, the exclusive duties of a licensed dentist. Additionally, the Board has been told by Dr. Nagle, that the DHAT's will be able to provide care to anyone in the village that the village tribal elders or corporation officers authorize them to provide care for. We can only assume from this that the DHAT's care will not be limited to village native residents.

P.O. Box 110806, Juneau, Alaska 99811-0806
Telephone: (907) 465-2534 Fax: (907) 465-2974 Text Telephone: (907) 465-5437
Email: license@commerce.state.ak.us Website: http://www.commerce.state.ak.us/occ/

At it's December meeting, the Board of Dental Examiners unanimously directed the Board's president to write you this letter and request that the Department of Law take appropriate action that it would normally take against a person who is practicing a profession without a license. Also, the dentists authorizing this care are in violation of AS 08.36.315(6) and (10).

AS 08.36.315. **Grounds for discipline, suspension, or revocation of license.** The board may revoke or suspend the license of a dentist, may reprimand, censure, or discipline a dentist, or both, if the board finds after a hearing that the dentist

(6) … permitted the performance of patient care by persons under the dentist's supervision, that does not conform to minimum professional standards of dentistry regardless of whether actual injury to the patient occurred; ***

(10) permitted a dental hygienist or dental assistant who is employed by the dentist or working under the dentist's supervision to perform a dental procedure in violation of AS 08.32.110 or AS 08.36.070(a)(10)….

Please, kindly respond as soon as possible. The Board is concerned that we are putting our rural citizens at risk by allowing high school graduates who have attended a non-accredited dental program in a foreign country to practice dentistry in our state.

Please feel free to contact me by phone at my office in Anchorage, 274-7691.

Sincerely,

Robert E. Warren, DDS
Alaska Board of Dental Examiners
President

# ATTACHMENT

**April 2005**

# Integrated Dental Health Program

# for Alaska Native Populations

**Howard Bailit, D.M.D.**

**Tryfon Beazoglou, Ph.D**

**Amid Ismail, D.D.S.**

**Thomas Kovaleski, D.D.S.**

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## *Executive Summary*

During recent discussions of proposed changes in the dental care system for Alaska Natives, the American Dental Association (ADA) asked a group of dental care experts to independently study and make recommendations on the current and proposed systems. The primary problem is that the 125,000 members of the Alaska Native community, and especially those living in villages that are not accessible by roads, have a high prevalence of untreated dental diseases.

Faced with an acute problem, the Alaska Native Tribal Health Consortium (ANTHC) developed a new delivery plan for rural villages; locally recruited dental health aides and therapists will live in the rural villages and provide community and personal level preventive and treatment services. The Panel supports this general plan and suggests that with modifications it could be more effective.

The Panel offers these recommendations:

- With a relatively modest investment in facilities and allied dental health personnel, the current delivery system can be greatly improved, providing significantly more services to the entire population. Sustainable improvement requires the prevention of disease and efficient delivery of therapeutic services.
- Community-based oral health providers (COHPs) are needed to improve the oral health of remote village residents. Led by a centrally-based dentist(s), COHPs should be responsible for the organization of the overall provision of community and personal level oral health services to clusters of villages. Their management role should include organizing community level health promotion and disease prevention programs, directing the activities of the dental health aides, and increasing the efficiency of visiting dentist teams to villages. Their clinical role should include providing oral health screenings, primary and secondary preventive services, gross tooth decay removal and stabilization (ART), secondary prevention of mild periodontal diseases, and under dentist supervision pain and infection control.
- The ANTHC, ADA, American Dental Education Association should work collaboratively to develop a national model for training these new oral health care providers in Alaska. More generally, a major effort is needed to recruit, educate, and retain a local dental workforce that is committed to working in Alaska and is culturally competent to serve the needs of this population.

A financial analysis of different options proposed for improving the efficiency of the delivery system indicates that a relatively modest addition to currently planned expenditures will result in major gains in the number of patients receiving care annually. As the system becomes more efficient, the cost per patient treated or service provided are expected to decrease.

## I. Introduction

During the past several months, the ADA, the US Indian Health Service, the Alaska Native Tribal Health Consortium, and others have been involved in discussing the proposed changes in the oral health care system for Alaska Natives. To obtain a wider view of the issue, the ADA asked four nationally recognized dental care experts to examine and make recommendations on the current and proposed oral health care systems. This report represents the group's independent views; it has not been approved or modified by the ADA. The members of the ad Hoc Panel and their contact information are seen in Attachment A.

The two primary data sources used in this report come from the Indian Health Service - the oral health of the Alaska Native populations[1] and from the Southcentral Foundation of the Alaska Native Medical Center – dental delivery system organization, staffing, utilization, and expenditures. Attachment B presents detailed information on the Southcentral Foundation system. Information provided by different informants on other Alaska Tribal dental systems varied widely. Thus, the analyses presented in this report will probably have to be adjusted as more data become available on individual Tribal programs.

## II. Problem Definition

Epidemiological studies indicate that the 125,000 members of the Alaska Native community have a significantly higher prevalence of untreated decay,

periodontal diseases and their sequelae - pain, infection, and missing teeth - than other US populations. In the early half of the 20$^{th}$ century, Alaska Natives had one of the lowest dental caries experiences in North America. The incidence and severity of dental caries significantly increased as traditional lifestyles and dietary habits changed (e.g., canned drinks).

It appears that the current dental care system has not been able to effectively prevent and treat oral diseases in this population. The problems are especially acute for the approximately 50 percent of the population that lives in remote villages not accessible by roads.

There are multiple, separately organized and managed, delivery systems that provide personal dental services to the population. Overall, the system appears adequately funded and has sufficient numbers of licensed dentist positions to provide care, but operates with varying levels of effectiveness. Some important limitations in the current system include: 1) many dentists are assigned by the Indian Health Service or are contractors and do not have a long-term commitment to living and practicing in Alaska; 2) there are too few allied dental health personnel and operatories per dentist; 3) few providers are village-based staff who can provide culturally competent and continuous community and personal level services; 4) there are insufficient local training programs to prepare dental residents, hygienists, dental assistants, etc. who have a long-term commitment to serving Alaska Native populations; and 5) the productivity and efficiency of the current system is variable and can be improved substantially.

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[1] The 1999 Oral Health Survey of American Indian and Alaska Native Dental Patients: Findings, Regional Differences and National Comparisons, Indian Health Service, 2000.

## III. Alaska Native Tribal Health Consortium (ANTHC) Plan

Faced with an acute oral health problem, the ANTHC developed a new strategy to provide preventive and therapeutic services to the significant segment of the population residing in remote villages that are only accessed by plane or boat. The plan calls for the establishment of locally recruited dental health aides to live in the villages and provide community and personal level preventive oral health services. This strategy has excellent potential to reduce the incidence and prevalence of disease and to provide the community with continuous, culturally competent care.

Another plan feature is training locally recruited dental therapists to permanently reside in the villages and provide screening, pain and infection management services, personal preventive care, and some restorative services to patients under the indirect supervision of dentists. The new system is supported with grant funds from multiple Medical Foundations and is in the process of being implemented. The effectiveness of the new system will not be known for several years.

In this proposal, COHPs replace therapists on the dental team. These new dental personnel have considerable potential, if they are integrated into an effective delivery system for villages. Specific recommendations for this new auxiliary are included in the next section of this report.

## IV. Recommendations

The ad Hoc Panel offers several recommendations for consideration by the ANTHC leadership. In order of priority, they include:

**1. Improve the Effectiveness and Efficiency of the Delivery System**

Although the ANTHC plan has the potential to improve access to care and oral health in villages, it does not address the larger problem of the overall effectiveness of the dental delivery system for the entire Alaska Native population. In this regard, the dental care delivery system run by the different Tribal corporations can be greatly improved with a relatively modest investment in new facilities and allied dental health personnel. The basic problem faced by the ANTHC system is common to many safety net dental delivery systems. The productivity of dentists is low, because of inadequate investment in dental operatories, allied health personnel and financial incentive plans for personnel. A related issue may be the need to put more resources into the management of the delivery system. This includes experienced managers, training programs, information systems etc. Further, many operational efficiencies may be realized if the different Tribal corporations worked cooperatively in the management of the overall system. To this end, the ANTHC should consider the formation an over-sight organization to coordinate the management of the different Tribal dental care systems. In the initial phases of this effort consultants from the dental profession and industry should be used as needed. As seen in the financial analysis section, without additional dentist positions, it should be possible to provide care to 65 percent or more of the population, annually.

**2. Integrate Dental Health Aides and Community Oral Health Providers into Village Delivery System**

As previously noted, the proposed system for villages developed by the ANTHC has many advantages. The ad Hoc Panel believes that the system could be made substantially more effective with some modification and expansion of the role of COHP and with a greater focus on the integration of the dental health aides and COHPs into the village delivery system.

In terms of organizational position, the COHPs should be assigned to a cluster of villages to serve around 2,000 residents. COHPs should have a dental assistant to provide personal services efficiently and at least two dental health aides for the delivery of community and personnel level prevention programs. Two or more specific dentists should be assigned responsibility for the clinical management of each COHP village dental team and should visit the villages periodically to provide dental services. The dentists should be in frequent communications with their COHP and should have an on-call schedule to deal with emergencies. The dentists and the COHP team should be responsible for assuring that most village residents are screened, receive appropriate educational and primary and secondary preventive and treatment services annually.

In terms of clinical responsibilities, COHPs and dental health aides should screen at least 85 percent of residents twice per year, provide primary and secondary preventive treatments for caries and periodontal diseases, remove gross tooth decay where appropriate and insert temporary filling materials or sealants using the Atraumatic Restorative Treatment (ART) techniques (with or without minor removal of caries-destroyed dental tissues using hand instruments

or a small round bur in a slow speed handpiece), treat mild periodontal diseases by prophylaxes and scalings, and manage acute pain and infection under the direction of dentists. The proposed use of COHPs to restore teeth with permanent filling materials is not an appropriate use of their time and skills. Because of the severity of disease and complexity of treatment commonly seen in this population, COHPs will have insufficient skills to permanently restore a large percentage of carious teeth. They will have a greater impact on the oral health of Alaska Natives by preventing and controlling caries and periodontal diseases with the described clinical duties. This approach will also be more cost-effective, based on studies published by the World Health Organization on the use of advanced dental auxiliaries in rural areas.[2] A letter from the Pan American Health Organization supporting the use of ART and offering to collaborate in training of COHPs in this technique is seen in Attachment C. Finally, COHPs can be trained in Alaska to provide these services in approximately 12 months.

In terms of management responsibilities, COHPs should direct the activities of the dental team assigned to local communities (i.e., dental health aides and assistants), integrate dental programs with the overall plan for local medical and public health services, and organize the activities of the periodic dentist visits to villages. A more detailed description of the clinical and management roles of COHPs is presented in Attachment D.

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[2] ART is successful as a long-term temporary restoration (1-2 years) for Class I and Class II restorations (Frencken JE, Holmgren CJ. ART: A minimal intervention approach to manage dental caries. Dent Update 2004;31:295-8).

In addition, an effective management structure needs to be in place to integrate these new allied dental health personnel into the overall village delivery system. Thus, the current system of dentist visits to villages needs to be modified to make better use of these resources. The changes recommended in the overall dental care system for villages, including the integration of dental health aides and COHPs, are presented in Appendix E.

**3. Establish Training Programs**

Clearly, the long-term success of the delivery system for the 125,000 Alaska Native population depends on recruiting, educating, and retaining a local workforce that is committed to working in Alaska and is culturally competent to serve the needs of this population. Although beyond the scope of this report, a major effort needs to be made to:

- Recruit Alaska Natives into the dentistry, hygiene, COHP, assisting and dental health aides.
- Establish residency training programs in Alaska Tribal hospitals for general dentistry and the recognized specialties of dentistry.
- Develop managerial training programs to prepare the personnel needed to manage the dental delivery system.

## V. Financial and Outcome Analyses

The ad Hoc Panel presents two options for increasing the overall capacity of the dental care system to serve the needs of the Alaska Native population. There are many variations on these two options, and they are presented to provide a framework for further discussion of these issues.

Further, as already noted, estimates of the number dentists, operatories, and allied health staff in the other Alaska Tribal programs varied widely. As such, the Panel recognizes that the numbers used in the analyses may not accurately reflect the current situation. As such, additional analyses may be necessary.

Options

1. Have the other Alaska Tribal programs operate at the same level of efficiency as the Southcentral Foundation. This organization has recently made a major and successful effort to improve the efficiency and productivity of its dental delivery system. The details are provided in Attachment B.
2. Have the other Alaska Tribal programs operate at the same level of as the Southcentral Foundation (Option 1) and establish COHPs and dental health aides in villages.

Current System Configuration

Table 1 compares the delivery configuration for the Southcentral Foundation region with the other Tribal programs (combined).

**Table 1**
**Current Dental Delivery System Configuration**

| **Foundation** | **Population** | **Dentists** | **Operatories** | **Assistants** | **Hygienists** | **Other Staff** |
|---|---|---|---|---|---|---|
| Southcentral | 45,000 | 26 | 52 | 64 | 8 | 27 |
| Other | 80,000 | 36* | 47 | 50 | 10 | 56 |
| Total | 125,000 | 62 | 99 | 114 | 18 | 83 |

*15 positions are open and being recruited.

Compared to the other Alaska Tribal programs, the Southcentral Foundation has more dentists per eligible and more operatories, assistants, and hygienists per dentist. Under this configuration, the Southcentral Foundation treats 47.2 percent (actual) of the eligible population annually and the other Alaska Tribal programs about 33.0 percent (estimation based on 36 dentists). Compared to the national private sector dental delivery system, the current system (Southcentral Foundation and Other) for Alaska Natives has far fewer operatories and allied health staff per dentist.

Approximately 60,000 of the 125,000 eligibles live in 200 villages that cannot be accessed by road. For this population, dentists and their staff need to fly to the villages periodically to provide services. These villages will be the base of operations for the dental health aides and COHPs. It is estimated that the villages range in size from 60 to 1,400 residents and that 200 villages need to be served. The analysis assumes that one COHP team that includes at least one COHP, one dental assistant and two dental health aides will have responsibility for managing several contiguous villages, totaling an average of 2,000 people. Some unknown percentage of people living in remote villages obtain dental care when visiting central area clinics. For this analysis we assume that 25 percent of village residents will receive care in these clinics. This reduces the target population that needs therapeutic services from 60,000 to 45,000.

Increase System Capacity

**Option I - Configure other Alaska Tribal Programs Similar to Southcentral Foundation**

This will require building 25 more dental operatories and employing 40 more dental assistants and one more hygienist. The other Alaska Tribal programs appear to have adequate numbers of administrative staff.

**Option II – Add Dental Health Aides and COHPs to Option I**

Twenty three dental COHPs teams, eight in the Southcentral Foundation and 15 in other Alaska Tribal programs will be employed and assigned with dental aides and a dental assistant to serve the 200 villages. It is assumed that the COHP teams will operate (actually see patients) 200 days a year and treat at least 20 patients per day. This includes services provided by the two dental health aides and the COHP working with a dental assistant. Thus, each dental team can be expected to provide 4,000 visits per year and to serve about 1,700 patients, based on 2.32 visits per person. Thus, some 85 percent of the target population will receive screening, prevention, and therapeutic services by the COHP teams.

Impact on Utilization

Table 2 presents the expected impact of the two options on utilization rates.

**Table 2**
**Impact of Options on Utilization rates**

| Utilization | Current System | Option I | Option II |
|---|---|---|---|
| **Southcentral Foundation** | | | |
| Visits | 49,398 | 49,398 | 81,398 |
| Patients | 21,250 | 21,250 | 34,850 |
| % Utilization | 47.22 | 47.22 | 77.4 |
| **Other** | | | |
| Visits | 62,000 | 68,397 | 128,397 |
| Patients | 26,600 | 29,423 | 54,923 |
| % Utilization | 33.0 | 36.8 | 68.7 |

Compared to the current system, Options I and II lead to major gains in visits and patients treated. If the other Tribal programs filled their 15 open dentist positions, they would approximate the Southcentral Foundation utilization rates. The Southcentral Foundation dental program has made a first step in addressing the core problem of dentist productivity and has made a large investment in more operatories and allied dental health personnel that has led to major gains in utilization. Both the Southcentral Foundation and other Tribal programs could increase their efficiency substantially more with the addition of more operatories and allied dental health personnel per dentist.

Impact on Expenditures

This analysis of expenditures for the two options is based on current labor costs and does not take into account the impact of prevention programs on

reducing oral disease levels and the demand for care. This analysis also does not account for the costs of training more allied dental health personnel and administrators. The focus is on labor costs, since they account for a large percentage of clinic operating expenses. All labor costs include salary, 30 percent fringe benefits, and a 20 percent productivity bonus payment that 50 percent of clinical providers are expected to achieve.

**Table 3**
**Additional Labor Costs for Two Options to Improve Alaska Tribal Dental Delivery System**

| Personnel | Current | Option I | Option II |
|---|---|---|---|
| Dentists | $26,688,000 | $26,688,000 | $26,688,000 |
| Dental Assistants | 3,402,560 | 5,103,840 | 6,197,076 |
| Dental Hygienists | 1,630,800 | 1,721,400 | 1,721,400 |
| COHPs | - | - | 2,083,800 |
| Dental Health Aides | | | 1,736,500 |
| Totals | 31,721,360 | 33,513,240 | 38,426,776 |

## VI. Implementation

The ad Hoc Panel recommends that the ADA and other dental organization provide the ANTHC technical support in the design and implementation of a more effective oral health care system. The ADA and other dental organizations should also work with the ANTHC to gain political support in Alaska and nationally for building the training and delivery system infrastructure needed to implement this plan.

The major advantages of this proposal are:

- It addresses both the immediate and long-term needs of the Alaska Native population.

- The delivery system remains in the exclusive control of the Native Corporations and the ANTHC.
- The proposed system employs Alaska Natives in remote villages, since they are best able to understand the needs of the population and provide culturally competent, continuous care.
- It greatly improves access to care for village residents.
- It increases the effectiveness and efficiency of the overall system for all Alaska Natives.
- It is sustainable over time.
- It provides a standard of care that should be available to all Americans.

**Attachment A**
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The American Dental Association provided travel support for the panel for one meeting and a small stipend, $6,000 total, for the Panel.

## Attachment B
## Southcentral Foundation Dental Delivery System

The Southcentral Foundation, a non-profit Native corporation, took over the management of the dental program in 1997 and mandated a new approach to meeting the needs of the Anchorage Service Unit. The first part of the solution was to become more efficient in delivering dental care. The historical typical model was one chair, one dentist, and one assistant. A dental management consultant group Accelerated Practice Concepts, Inc. was hired to evaluate the efficiency of the dental care system. Their assessment was that more efficient models needed to be developed, and additional capacity was needed to meet the needs of the population in the Anchorage area. The new more efficient models were first applied to school aged children. For example, the "school exam" model utilized three chairs, three dental assistants, one dentist, and one hygienist. The children received bitewings, a panorex radiograph, oral hygiene instruction and disclosing by the dental assistant. The hygienist provided supra and sub-gingival scaling and pre-charts with the assistant. The dentist completed the exam and helped this team provide definitive care (e.g. simple fillings, extractions, or sealants) on all three of the children appointed during that hour. The Southcentral Foundation supported enhancement of an in-house dental assistant training program. This program utilizes credentialed dental educators teaching Native students. During 2004, 36 assistants were trained to meet the needs of the program. The Southcentral Foundation agreed to build a "state of the art" paperless and digital 27 chair dental facility on the campus of the Alaska Native Medical Center, and the facility was completed July 2003. Utilizing adult models developed by Accelerated Practice Concepts and a small increase in staff, the Fireweed Dental clinic raised its productivity substantially (Table B1).

**Table B1**
**Productivity of the Southcentral Foundation Dental Program**

| | FY 00/01 | FY 01/02 | FY 02/03 | FY03/04 |
|---|---|---|---|---|
| **Oct** | $1,055,911 | $1,092,271 | $1,324,842 | $1,779,034 |
| **Nov** | $904,029 | $906,015 | $1,284,458 | $2,238,720 |
| **Dec** | $795,965 | $967,711 | $1,257,157 | $2,200,947 |
| **Jan** | $962,561 | $1,033,009 | $1,255,611 | $2,611,374 |
| **Feb** | $923,067 | $1,019,445 | $1,195,912 | $2,548,926 |
| **March** | $1,000,909 | $1,166,336 | $1,224,683 | $2,887,142 |
| **April** | $1,008,464 | $1,203,598 | $1,298,466 | $2,957,660 |
| **May** | $1,087,680 | $1,274,903 | $1,092,131 | $2,515,743 |
| **June** | $880,120 | $1,076,595 | $947,756 | $2,594,972 |
| **July** | $826,956 | $1,182,749 | $1,179,183 | $2,817,816 |
| **Aug** | $1,102,474 | $1,230,075 | $1,049,614 | $2,823,880 |
| **Sept** | $884,319 | $1,122,983 | $1,166,877 | $3,039,033 |

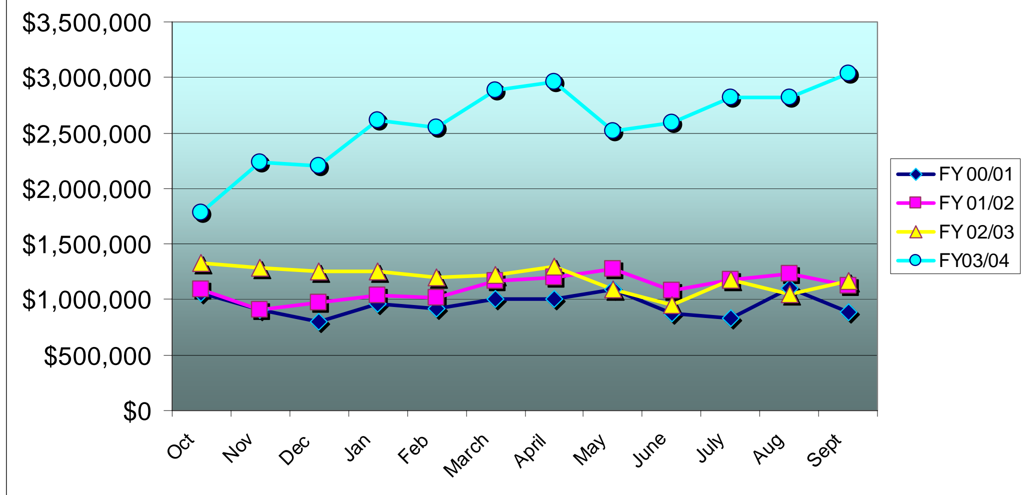
| Total: | $11,432,455 | $13,275,690 | $14,276,690 | $31,015,247 |
|---|---|---|---|---|

The impact of increased efficiency and capacity (50 chairs) has been noticed by those seeking care. Children can usually make an appointment for routine care within three weeks. The adult backlog of care is still notable with most adult patients waiting six weeks for routine care. The emergency care is very efficient with 30 to 40 patients per day treated utilizing four chairs. The electronic record with digital radiographs also provides increased efficiency and communication between the two dental clinics. The productivity of the village delivery system is also enhanced by delivering care with two or three chairs and dental assistants.

The Southcentral Foundation also purchased and equipped a dental operating room at ANMC, reducing the waiting time for pediatric full mouth reconstruction. There are now less than 200 patients on the wait list, and it is decreasing. The Foundation also entered into an agreement to with Lutheran Medical Center in Brooklyn, New York to institute a residency program to train more pediatric dentists. This program will begin July 2005 with two residents and another two will be selected in 2006. The hope is to place more pediatric dentists in Alaska communities and to further reduce the backlog.

The costs to bring in dental efficiency experts (APC), train dental assistants, implement paperless/digital technology, and fly more equipment and staff to the villages are substantial. The Southcentral Foundation's ability to build a 27 chair clinic and a full-time dental operating room speak to its commitment to meeting customer needs. These improvements have resulted in better access and high staff morale and retention. The following graph (Figure B2) shows the dramatic increase in productivity when the efficiency models were implemented along with the additional capacity of the Fireweed clinic's 27 chairs. No additional staffing has been added since 2002.

**Figure B2**
**Productivity Increases in Fireweed Clinic**


Dental Clinic Production
$3,500,000
$3,000,000
$2,500,000
$2,000,000
$1,500,000
$1,000,000
$500,000
$0
Oct
Nov
Dec
Jan
Feb
March
April
May
June
July
Aug
Sept
FY 00/01
FY 01/02
FY 02/03
FY03/04

**Pan American Health Organization**

Regional Office of the World Health Organization

**Technology and Health Services Delivery**
Health Services Organization

IN REPLY REFER TO: THS/OS (ORH) 28.1 (028-05)

17 March 2005

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Dear Dr. Ismail:

I write to you concerning the position of the Pan American Health Organization for the ART dental technique and or activities in the Region on that matter. We have been very excited to hear about the possibilities of the ADA utilizing this technique among others in the development of a new dental professional as part of your recommendations to address the challenges of the profession for the future.

PAHO as the regional office of the World Health Organization, began to endorse and promote the ART technique shortly after the endorsement the WHO in 1998. Indeed we presented a proposal for funding to the Inter American Development Bank and since April 2000 have been conducting one of the largest oral health studies in order to determine the comparative cost effectiveness of ART and amalgam for use in the public oral health programs in various settings in Latin America. The Proyecto PRAT which will be ending this year.

It is true to say therefore that over the past 5 to 7 years PAHO has been vigorously promoting ART for use in the public oral health services of the Region. We have also been pushing hard for the inclusion of this technique as part of the curriculum of dental schools in the Region. A partial list of the development of ART under the leadership of PAHO is as follows.

The direct training by PAHO of over 150 dentists and auxiliaries in over 12 training courses in the last 4 years. These courses have taken place in Ecuador, El Salvador, Mexico, Nicaragua, Panama, Trinidad and Uruguay.

The adoption by a number of countries of the wide scale use of ART in their public oral health services. Uruguay was the most recent having developed a plan with PAHO's assistance in January of 2005 to begin implementation in March of 2005. Mexico earlier has developed a plan to implement over 20 million ART restorations over a 3 year period.

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## Attachment D
## Role of the Community Oral Health Provider

The COHP is a member of a team that includes dentists, hygienists, dental health aides, and dental assistants. The COHP works and lives in a village and is assigned responsibility for a cluster of villages with a total population of about 2,000. The COHP works with one or more dental assistants using both portable and fixed dental equipment.

The primary objectives of COHPs are health promotion and disease prevention and management. They identify resources and develop networks with other social and health providers in the villages; design and implement group, as well as individually tailored oral health prevention programs that are integrated with other general health promotion activities in the villages; identify opportunities for fluoridating the water; educate and train other healthcare providers on how to screen for and advise residents to promote oral health.

As dental providers, COHPs provide screening and preventive services, temporary treatment of caries (ART), and treatment of mild periodontal diseases. Under the direction and approval of dentists assigned to lead the village dental team, COHPs manage pain and infection in emergency situations when dentists are not available.

With the epidemic of severe dental caries in Alaska, COHP training should focus on community-based health promotion, prevention, triage, emergency care, and temporization (ART). They should: 1) have training in community health and be a major advocate for oral health; 2) be assigned and evaluated based on progress in promoting oral health and reducing the burden of disease; 3) serve around 2,000 residents in contiguous clusters of villages; and 4) work with and under the general supervision of two or more specific dentists. The supervising dentists should define in writing the specific duties for each COHP, based on his/her clinical skills and the needs of the population.

In summary, COHPs, directed by dentists and assisted by dental health aides and dental assistants, should provide these services:

<u>Children (school-based)</u>

- Screening and treatment triage
- Prevention of incipient lesions (secondary prevention)
- Prophylaxis
- Education (diet and self care)
- Sealants
- Fluorides
- Atraumatic Restorative Treatment (ART)
- Emergency dental care for pain/infection under direct dentist supervision.

Adults

- Examination, detection, and assessment
- Treatment triage
- Primary and secondary prevention of caries
- Prophylaxis and scaling
- Atraumatic Restorative Treatment (ART)
- Emergency dental care for pain/infection under direct dentist supervision.

**Attachment E**
**Integration of Community Oral Health Provider**
**Into Village Dental Delivery System**

**Village Size:** The following plan is for large villages with 500 or more residents. For smaller villages the staff, equipment, and other resources are reduced, but the operating principals remain the same. Since most villages have fewer than 500 residents, two chairs will be the most common configuration.

Ch**airs in Village:** 4 -5 (portable and/or fixed)

**Prior to visit:** Then COHP team take x-rays, screen all children and adults, provide personnel preventive services (e.g., sealants), excavate caries and place temporary restorations (ART), provide prophylaxes and scalings for children and adults with mild periodontal disease, estimate dental team treatment time, and schedule patients for treatment by the visiting dental team.

**Visiting Dental Team:** Dentist, dental hygienist, and three dental assistants.

**Visit:**

- Dentist verifies screening exams, prepares teeth for permanent restorations, completes complex restorations and assigns simple restoration placement and finishing to specially trained dental assistants and provides other services as needed.

- CPHP and hygienist provide local anesthesia for dentist's patients and hygienist provides prophylaxes/scalings to patients with moderate to severe periodontal disease.

- Dental assistants support dentist, insert and finish permanent restorations, and assist dental hygienist.

- COHP – Organizes patient visits and assists dentist and hygienist as needed.

**Team Productivity:**

- The combined team of dentist, hygienist, COHP, dental health aides, and dental assistants are expected to treat at least 30 patients per day.
- The team will remain in the village until all scheduled and available patients are seen.
- The team will visit each village or grouping of villages at least two times per year.

**After Team Visit:** COHP (and dental health aides) follows-up on high risk patients with intensive preventive services (e.g., fluoride varnish, prophylaxes, education) and directs community education programs.