



DEPARTMENT OF THE AIR FORCE
HEADQUARTERS 3790TH MEDICAL SERVICE TRAINING WING (ATC)
SHEPPARD AIR FORCE BASE TX 76311-5465

REPLY TO
ATTN OF: MSD

17 SEP 1990

SUBJECT: Dental Health Update #10

10. Base Dental Surgeons and Dental Health Officers

1. **Kudos.** This issue of Dental Health Update begins by recognizing the many contributions of Col Bruce A. Matis, who from 1984 to 1989 served as the Special Consultant in Preventive Dentistry. His dedication to the preventive arena is unmatched and his concern for the USAF Dental Health Program was manifested in ways too numerous to mention. A tip of the cap to Col Matis, who is now stationed at Weisbaden AB, Germany.

2. **Special Consultant Change.** Last October, I assumed the duties and responsibilities of the Special Consultant for Dental Health to the Assistant Surgeon General for Dental Services. My address is 3790th Medical Service Training Wing/MSD, Sheppard Air Force Base, Texas 76311-5465, AUTOVON 736-2287 and I am available at any time. Even though the location of the special consultant has changed, the USAF Dental Health Course will continue to be held at Brooks Air Force Base. Lt Col Shannon Mills and the staff of the Dental Investigation Service (DIS) will serve as on-site course coordinators. DIS will, from time to time, be tasked with evaluating dental health products and instruments, but routine questions and requests for dental health information should be directed to my office.

3. **USAF Dental Health Course.** The dates for the next USAF Dental Health Course are 7-11 January 1991. As always, command dental surgeons will determine course allocations. Why January? My duties at the 3790th require my presence during the timeframes of previous dental health courses (May and December). However, we are planning for a possible shift to October in FY 92 to allow ample time for input into the following February's dental health month activities.

4. **Index to Updates.** Atch 1 is an index to this and the previous nine editions of the Preventive Dentistry/Dental Health Updates. I will try to include this with each new issue. If you are missing any of the previous updates, please contact me for replacement copies.

5. **Slide Series - Old and New.** Although each dental facility should have a copy of every slide series available through this office, sometimes they sprout legs and disappear. If you are missing any of the following slide series, they are available on a 60-day loan basis. You may reproduce them at your local audiovisual services, return the masters to me and use your copy to educate your staff, patients, school children, parent groups, etc. about the various topics they cover. Currently available are:

Child Abuse
Sealants (general information and technique)
Pediatric Dental Emergencies
Mouthguards
Smoking Cessation
Pre-Natal Dental Counseling
Peridex
Oral Health Care for Hospitalized Patients

Two new slide series have been developed and are now available on the same 60-day loan basis. The first deals with implant maintenance and consists of 20 slides and script covering the role of the dental prophylaxis technician with emphasis on proper selection and use of office and home cleaning devices. The second discusses Smokeless Tobacco - what it is, why it is so popular, and what it can do to the oral health of the user. If you would like any or all of the above series, please contact me. First come, first served.

6. Community Preventive Dentistry Award. This year I submitted the USAF Dental Health Program for the American Dental Association's Community Preventive Dentistry Award. Thanks to the 45 bases who responded to my request for examples of base level programs. The winner has not been announced yet, but the award will be presented at the October 1990 annual session. Let's keep our fingers crossed!

7. The Idea Corner. Included with this issue of the Update (Atch 2) is the inaugural edition of "The Idea Corner." It is a compilation of ideas from individual dental health officers and dental health committees all over the Air Force. Feel free to "borrow" any idea and tailor it to your local needs. It is meant to be a "recipe file" for newly appointed and seasoned dental health officers who need some new ideas or inspiration to make their programs better. The items in this edition were taken from the submissions for the Community Preventive Dentistry Award. Your support is solicited for future updates and can range from how you get a dental health message on a Leave and Earnings Statement to how you construct a float for a parade. The submitter will be credited, by name and base, for his/her contribution. The Idea Corner will be what you make it, but it has the potential of being a good source of information on HOW to get things done.

8. Post-Radiology Fluoride Therapy. Radiation treatment to the head and neck can result in the functional disruption or destruction of the major salivary glands. Reduced salivary flow or xerostomia can follow, placing the patient at risk for rampant caries. Radiation services should be aware of the dental consequences of radiation treatment, but they may not be. They may also be ignorant of the need for completing dental treatment prior to radiation therapy and the importance of fluoride therapy afterwards. If the medical treatment facility at your base offers radiation therapy, you should check

with them to ensure that these patients are routinely referred to the dental service for pre- and post-treatment dental care. For the patient's sake, make sure treatment is a coordinated effort between the two services.

9. **Dental Technician Course Graduates.** The 12-week Dental Technician Course at Sheppard AFB is a course designed for staff sergeants and technical sergeants who have demonstrated potential for leadership positions within the dental service. In addition to the administrative training these individuals receive, 55% of their time is spent in dental health related matters. Not only do they become proficient in dental prophylaxis procedures, they are required to author a dental health article suitable for publication in, at the very least, your base newspaper, and sometimes in recognized journals. More importantly, they receive guidance in establishing and conducting a dental prophylaxis training program, something that all bases should be doing. Use the talents that the graduate of this course brings to your clinic. Get him/her involved in your training program. Don't let this valuable resource wither and die on the vine.

10. **Statistics.** For your information, Air Force-wide dental service report statistics for the past five years are listed below:

| CODE | DESCRIPTION | FY 85 | FY 86 | FY 87 | FY 88 | FY 89 |
|-------|-------------|-----------|-----------|-----------|-----------|-----------|
| 01110 | Adult Pro | 1,171,519 | 1,266,572 | 1,306,618 | 1,242,751 | 1,234,418 |
| 01120 | Child Pro | 128,983 | 139,384 | 127,353 | 70,216 | 67,574 |
| 01240 | Topical F | 300,950 | 324,460 | 309,818 | 256,237 | 276,215 |
| 01330 | Ind OH Coun | 425,240 | 505,769 | 550,751 | 551,373 | 551,373 |
| 01350 | Sealants | 20,561 | 34,858 | 32,771 | 25,404 | 32,874 |

It is not surprising to see a decrease in the number of Child Prophylaxes. This is covered by the Dependent Dental Program (DDP), as is the professional application of a topical fluoride. Sealants peaked in FY 86, then decreased the next two years before rebounding in FY 89. Until just recently, sealants were not covered by the DDP as a preventive service. Thankfully, that has changed; but it's still a valuable service that we can and should offer to family member children not enrolled in the plan.

11. **FLUORIDE GUIDELINES.** Atch 3 contains an extensive summary of the current status of fluoride therapy. It is based on recommendations from the American Dental Association and recognized experts in the field. It discusses all types of fluoride therapies and treatment protocols, includes lists of ADA-accepted products and provides information on fluoride toxicity.

12. P & H Indices. There have been some changes to the P & H Indices that will be included in the next change to AFR 162-1. Atch 4 contains a draft of the proposed instructions. Pay particular attention to the P2 index and all H indices.



LAURENCE P. CRIGGER, Col, USAF, DC
Special Consultant for Dental Health
Programs to the Assistant Surgeon General
for Dental Services

4 Atch

1. Index
2. The Idea Corner
3. Fluoride Guidelines
4. P & H Indices Draft

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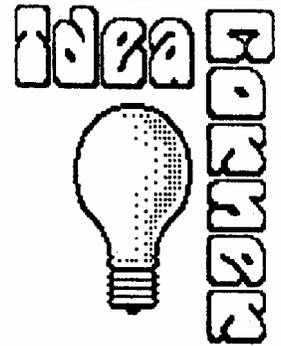
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**FOOD FOR THOUGHT
FROM
AIR FORCE DENTAL HEALTH OFFICERS**



VISIT TO THE DENTAL CLINIC (Andrews AFB, Lt Col Kloote): Children saw a brief video, "Merlin's Magic Message," had a ride in the dental chair, saw the Squirt Gun (air-water syringe), saw and heard Mr. Bumpy and Mr. Whistle with headlights (low and high speed handpiece), had an opportunity to feel the Vacuum Cleaner (HVE suction), saw pictures of their teeth (radiographs) made with a Special Camera (x-ray unit), and wore a Heavy Blanket (lead apron). Also combined Healthy Heart presentation in conjunction with Nursing Services personnel (February is also Heart Month). Children received toothbrush, dental Fun Sheet and Healthy Heart handouts.

BATMAN SKIT (Vandenberg AFB, Capt Raymond): The Joker and his goons confound the commissioner and try to foul Fluoride City's water supply with sweets, but Batman comes to the rescue and ties them up with "Bat-floss"

DENTAL HEALTH MESSAGES (Reese AFB, Capt Najera): In coordination with the Health Promotions Committee, the dental clinic put together six messages to be played for patients who call the hospital appointment desk and are placed on hold.

DENTAL HEALTH ARTICLE IDEAS (McChord AFB, Capt Takacs): Titles include: "But They Are Only Baby Teeth!", "First Impression Molds Impression", "Dental Health Starts Before You Are Born", "Dentistry Moving Painlessly Into the 90's", "Adolescence Crucial Time for Dental Care"

SMOKELESS TOBACCO PROGRAM (F.E. Warren AFB, Capt Norris): Users advised of health hazards and given literature at the periodic exam. Presentation, including slides and posters, given to various squadrons throughout the year. Wing Commander has included smokeless tobacco into a new wing regulation as part of an overall health and wellness program.

DENTAL EDUCATION FOR DIABETICS (Andrews AFB, Capt Swartz): Lecture/slide series on relationship of periodontal disease and diabetes was developed and given to diabetics in conjunction with the Diabetes Education Clinic.

SUPPORT TO HEAD START PROGRAM (Barksdale AFB, Capt Collier): Visit to head start centers includes dental exams and referral to local practitioners if treatment is required.

PUPPET SHOW (Castle AFB, Maj Naughton): "The Land of No Decay" was presented and discussed proper oral hygiene techniques and the hows and whys of caries development.

POSSIBLE SOURCES OF FUNDS: Health Promotions Committee, dental clinic O&M funds, Mental Health Clinic, medical logistics, bake sales, donations (base Thrift Shop, OWC, NCOWC. commercial companies (Oral B, Proctor & Gamble, etc), Parent-Teacher Association.

ORAL CANCER SCREENINGS (Patrick AFB, Maj Essick and Goodfellow AFB, Capt Banker): Screenings done in conjunction with a base Retiree Day.

"PLAQUEMAN" VIDEO (Hill AFB, Maj Shoff): A variation on "Batman" in which the Joker and his henchmen Tartar and Plaque try to ruin the teeth of our heroine, Miss Vicki Vale. Plaqueman shows up and eliminates Tartar with a giant scaler and shows Vicki how to find Plaque with disclosing tablets and get rid of it by brushing and flossing. The benefits of fluoride and the hazards of smoking are also presented.

WELL BABY CLINIC (Seymour-Johnson AFB, Capt Wiley): Parents of new-born babies receive dental health kits (pamphlets and infant oral swabs) at the first well-baby check-up.

PROJECT SAFE-CHILD (Seymour Johnson AFB, Capt Wiley): Base dental clinic and Security Police sponsored PROJECT SAFE CHILD to provide parents with permanent ID records (dental chart, fingerprints and

photographs) of their children. Publicized in OWC monthly magazine and on February's Leave and Earnings Statement.

DENTAL SONGS (Langley AFB, Lt Col Farhood)

1. To the tune of "Yankee Doodle Dandy"

I had a little tooth decay
I thought was temporary
but it developed every day
Until it grew quite scary

Chorus

Dentist, dentist get your drill
and keep your x-ray handy
I've got some teeth you've got to fill
I've eaten too much candy

Oh me, oh my, it's something fierce
the way my tooth is aching
because I have this toothache so
a rumpus I am making

Repeat Chorus

2. To the tune of "On Top of Old Smokey"

On top of my molars
are braces so light,
to strengthen my teeth
and correct my bite

When braces come off me
my teeth will be straight,
so I'll go to the dentist
and keep every date

I'll chew hard on apples
eat foods that I should,
brush my teeth daily
so they will look good.

I'm glad to wear braces
they're setting me right,
my teeth will be stronger
straighter and white.

3. To the tune of "Row, Row, Row Your Boat"

Brush, brush, brush your teeth
after every meal,
whiter, whiter, whiter teeth
and oh how clean they feel.

Clean; clean, clean your teeth
clean them twice a day,
thoroughly, thoroughly, thoroughly, thoroughly,
that's the only way.

Brush, brush, brush your teeth
brush them up and down
cleaner, whiter, stronger teeth
so you don't have to frown.

Brush, brush, brush your teeth
after every snack,
it will keep them clean and white
both the front and back.

Drink, drink, drink your milk
morning, noon and night,
brighter and stronger your teeth will be
and oh so very white.

Brush, brush, brush your teeth
brush three times a day,
see your dentist twice a year
to keep away decay.

DENTAL PROPHYLAXIS AT DODDS SCHOOLS (Wiesbaden AB, Major James):
Mobile dental units are set up in the school, and a prophylaxis technician is assigned to provide cleanings to over 2000 school children a year. This minimizes time away from school for the children, improves access to care and reduces the amount of time a sponsor must be away from the job to accompany the patient to the dental clinic. Parents give their consent in writing prior before treatment begins. (NOTE: Ramstein AB employs a similar approach. A permanent satellite dental clinic exists within the school. A dental officer screens health histories and provides a cursory exam before the prophylaxis phase begins.)

USAF DENTAL SERVICE

FLUORIDE USAGE GUIDELINES



September 1990

USAF DENTAL SERVICE FLUORIDE USAGE GUIDELINES

I. General considerations

A. An assessment of the National Toxicology Program (NTP) report

1. Congress commissioned the NTP of the National Institute of Environmental Health Sciences to study the chronic toxicity and carcinogenicity of sodium fluoride.
2. Groups of male and female rats and mice were given drinking water containing 0, 11, 45 and 79 ppm fluoride as sodium fluoride for two years. There were 80 animals in the control and high-dose groups and 50 in the low- and mid-dose groups.
3. Preliminary data reported the occurrence of osteosarcomas in male rats (0/80 in control rats, 0/50 in low-dose rats, 1/50 in high-dose rats) and squamous cell carcinomas in the tissues of the oral cavity in male and female rats (MALE: 0/80 in control rats, 0/50 in low-dose group, 1/50 in mid-dose group and 1/80 in high-dose group; FEMALE: 1/80 in control rats, 0/50 in low-dose group, 0/50 in mid-dose group and 3/80 in high-dose group). Both rats and mice had dose-related fluorosis and female rats had osteosclerosis of long bones. Evidence for bone tumor formation in male rats was too weak to be attributed to fluoride.
4. If extrapolated to humans, the chronic exposure received by rats with 45 and 79 ppm fluoride would be equivalent to humans exposed to drinking water that contained 27 and 47 ppm fluoride for most of their life-span. Furthermore, the kinds of bone cancers found in the study animals are extremely rare in humans.
5. The NTP's Board of Scientific Counselors Technical Reports Review Panel concluded that the two-year study showed only "equivocal evidence of carcinogenic activity" in male rats and "no evidence of carcinogenic activity" in female rats or male or female mice. Bottom line: there is no

continued support for the use of fluoride for the prevention of tooth decay.

6. The study did NOT, as previously reported in the press, provide evidence that fluoride causes cancer. Other studies conducted by the U.S. National Cancer Institute and other bodies have shown no correlation between water fluoridation and cancer. The only risk from drinking fluoridated water is dental fluorosis, and it occurs at about two times the optimal level of 1 ppm.

B. Basic concepts of fluoride therapy

1. Fluoride applications to the teeth should be custom-designed to meet the dental needs of the patient. Avoid using routine or "automatic" procedures for all patients, whether they be adults or children.
2. Fluoride effects are additive. No single treatment or procedure provides maximum disease control. Both professionally-applied and over-the-counter fluoride products are beneficial. Use multiple therapies when caries activity warrants.
3. Use agents and procedures proven to be safe and effective. Refer to Journal of the American Dental Association (JADA) for specific brand-name products accepted by the ADA. (Latest issue to include this information is Vol. 116, No. 2, February 1988, pp. 260-270.)
4. A dental prophylaxis is NOT an absolute prerequisite for a topical fluoride.
5. A fluoride containing prophylaxis paste is NOT a topical fluoride treatment. No prophy paste has been accepted by the ADA for its cariostatic properties. In addition to removing stain and polishing the teeth, they should be used to replenish fluoride lost during tooth polishing.
6. Although the caries process itself differs in enamel and dentin, it is identical in permanent vs. deciduous teeth

and in teeth of children vs. adults. Therefore, the benefit in adults with active caries is comparable to that seen in children.

7. ADULTS: Most adults should receive an annual dental prophylaxis and a tooth polishing using a fluoride containing prophylaxis paste. The frequency of topical fluoride treatments for adults should be determined by the level of dental caries activity or susceptibility. Adults with no caries activity do NOT need a topical fluoride annually.
8. CHILDREN: Children under 4 years of age may benefit from topical fluoride applications, although caries is becoming more rare in this age group. If topical fluorides are applied, USE EXTREME CAUTION. The potential for inadvertent swallowing, nausea and vomiting is real. Take extra precautions: (1) Use no more fluoride than necessary; (2) Use high volume evacuation; (3) Place child in upright position to minimize swallowing; and (4) Monitor the patient constantly.

B. Classification of caries activity

1. Minimal or inactive caries (no smooth surface caries in past three years*)
2. Active caries (caries in past three years, but less than three smooth surface lesions per year)
3. Rampant caries (three or more smooth surface lesions per year)
4. Other (recurrent caries, radiation caries, root caries)

* Fluorides are somewhat less effective on pit and fissure caries. Sealants should be emphasized in these areas.

C. Use of fluorides

1. Caries control

2. Dental hypersensitivity
 3. Remineralization of orthodontic decalcifications
 4. Adjunct to periodontal therapy
- D. Types of fluoride therapy
1. Systemic fluorides
 - a. Communal and school water fluoridation (only one), or
 - b. Pediatric fluoride supplements (but not both)
 2. Topical fluorides
 - a. Office/professionally applied topicals (gels or solutions with high concentration of fluoride)
 - b. Fluoride dentifrices (with low concentrations of fluoride)
 - c. Self-applied fluorides (rinses or gels with low concentration of fluoride)

II. Systemic fluorides

A. Water fluoridation

1. Communal fluoridation
 - a. Requires no effort by beneficiary.
 - b. Optimal concentration varies with temperature of area and resultant potential for water consumption (e.g., 1.0 ppm in moderate climates, 1.2 ppm in cooler climates, 0.7 ppm in hot climates). Little or no mottling below 1 ppm.
 - c. 25-30% reduction in caries prevalence*

*Caries reduction rates are somewhat tempered by the fact that caries rates in general have decreased significantly in recent years. As a result, large effects are more difficult to demonstrate than in the past.

d. No evidence of adverse effects upon mortality, cancer rates, congenital diseases

2. School water fluoridation

a. Optimal is 4.5 times that of fluoride concentration in water supply

b. 20% reduction in caries prevalence has been reported

B. Pediatric fluoride supplements

1. Prescribe if drinking water contains less than optimal concentration of fluoride. Begin supplementation early: liquid form (two dosages available: 4 drops = 1 mg and 8 drops = 1 mg) until age 2; chewable tablet form (three dosages available: 1.0 mg, 0.50 mg and 0.25 mg) after age 2.

2. Dose dependent on age and percentage of optimal concentration present. See chart below (Ref: JADA Vol 113, No. 9, September 1986, pp. 506-565).

| Percent of optimal F concentration* | Birth-2 (mg) | Age 2-3 (mg) | Age 3-13 (mg) |
|--|-----------------|-----------------|------------------|
| Less than 30% | 0.25 | 0.50 | 1.00 |
| 30-70% | 0.00 | 0.25 | 0.50 |
| over 70% | 0.00 | 0.00 | 0.25 |

* Usually presented as "less than .3 ppm, .3-.7 ppm and over .7 ppm based on optimum concentration of 1 ppm. You may have to adjust your dosages based on the optimum concentration of fluoride in the drinking water in your particular locale.

3. Give after brushing, before bedtime. Take not earlier than

15 minutes after milk or 2 hours after food is ingested. Tabs should be chewed, swished for one minute and swallowed. Avoid adding drops to liquids to drink if possible - place directly in mouth instead. No eating or drinking for 30 minutes.

4. Never prescribe more than a total of 120 mg F. Verify that child is not also taking vitamins with fluoride prescribed by a pediatrician and that school water is not fluoridated. Double dosing can cause fluorosis.
5. Continue dosing to age 12-13 or when second permanent molars erupt, then consider switching to an over-the-counter rinse if caries activity justifies its use. (Compliance always a problem in older children)
6. Breast milk contains no fluoride. Totally breast-fed or premade formula-fed infants should be supplemented.
7. Advise parents to discontinue supplements during extended stays in fluoridated areas away from home. Always consult a dentist if permanent relocation takes place.
8. Key to success: conscientious parent(s) and compliance of child.
9. Accepted products include (list taken from JADA Vol 116, February 1988 and may not be complete, check for ADA Seal of Acceptance):
 - a. **Fluoritab Liquid - Fluoritab Corp (1 mg F per 4 drops)**
 - b. **Fluoritab Tablets - Fluoritab Corp (1 mg F per tab)**
 - c. **Flura-Drops - Kirkman Laboratories, Inc (1 mg F per 4 drops)**
 - d. **Flura-Lox - Kirkman Laboratories, Inc (1 mg F per loz)**
 - e. **Flura-Tablets - Kirkman Laboratories, Inc (1 mg F per tab)**
 - f. **Karidium Sodium Fluoride Liquid - Lorvic Corp (1 mg F per 8 drops)**
 - g. **Karidium Sodium Fluoride Tablets - Lorvic Corp (1 mg F per tab)**
 - h. **Luride Sodium Fluoride Drops - Colgate-Hoyt Laboratories (1 mg F per 8 drops)**

- i. **Luride Sodium Fluoride Loxi-Tabs- Colgate-Hoyt Laboratories (.25 mg, .5 mg, or 1 mg tabs)**
- j. **Luride-SF Loxi-Tabs - Colgate-Hoyt Laboratories (1 mg F per loxi-tab)**
- k. **NaFrinse Acidulated Oral Rinse and Systemic Supplement - Orachem Pharmaceuticals (contains 0.044 percent NaF)**
- l. **Pediaflor Drops - Ross Laboratories**
- m. **Phos-Flur Oral Rinse Supplement, 4 flavors - Colgate-Hoyt Laboratories (contains 0.044 percent NaF)**

10. Prenatal fluorides: no proven benefit, generally not recommended.

III. Topical fluorides

A. Office/professionally applied topicals (gels or solutions with high concentration of fluoride)

1. Frequency of application

a. Minimal or Inactive Caries

(1) ADULT: Not indicated

(2) CHILDREN: One application every 3-6 months is ideal, but at least once a year

b. Active or Rampant Caries

(1) ADULT: Series of 4-5 applications in a 4-6 week period, followed by supplementary single treatments every 3-6 months until caries is under control

2) CHILDREN: Same regimen as adult

2. Currently recommended systems

a. Three systems only (current thinking suggests no differences in efficacy, although in the past, 2% sodium fluoride required several applications vs. one time application of 1.23% acidulated phosphate fluoride)

(1) 1.23% acidulated phosphate fluoride (APF) gel or solution

- (a) Good patient acceptance, especially in children
- (b) May etch porcelain restorations and some composites- coat surfaces with vaseline or cocoa butter, or use a 2% sodium fluoride solution or gel instead)
- (c) No difference between solutions, gels and thixotropic gels, but most clinicians use thixotropic gels
- (d) Accepted products include (list taken from JADA Vol 116, February 1988 and may not be complete, check for ADA Seal of Acceptance):

- 1 **Centra Guardian Angel Topical Fluoride Gel - Patterson Dental Co**
- 2 **Checkmate 1.23% APF Topical Gel, 3 flavors - Oral-B Laboratories**
- 3 **Fluorident Liquid - Premier Dental Products**
- 4 **Fluorident 1.23% APF Topical Gel, 2 flavors - Premier Dental Products**
- 5 **Flura-Gel 1.23% APF Topical Gel - Cadco Dental Products**
- 6 **Gel II 1.23% APF Topical Gel, 16 oz, 8 flavors - Oral-B Laboratories, Inc**
- 7 **Healthco Fluoride Gel VM, 4 flavors - Healthco International**
- 8 **Healthco Topical Fluoride Gel - Healthco International**
- 9 **Iradicav APF Solution - Johnson & Johnson**
- 10 **Karidium APF Topical Gel - Lorvic Corp**
- 11 **Karidium APF Topical Solution - Lorvic Corp**
- 12 **Karidium Thixotropic APF Topical Gel, 2 flavors - Lorvic Corp**
- 13 **Kerr Fluoride Gel - Kerr Manufacturing Co**
- 14 **Luride 1.2% APF Topical Gel, 6 flavors - Colgate-Hoyt Laboratories**
- 15 **Luride 1.2% APF Topical Solution - Colgate-Hoyt Laboratories**

- 16 **Nupro Flo 1.23% APF Topical Gel, 4 flavors - Johnson and Johnson**
- 17 **Perfect Choice 1.23% APF Thixotropic Topical Fluoride Gel, 10 flavors, Challenge Products, Inc**
- 18 **Phos-Flur Oral Rinse Supplement, 4 flavors - Colgate-Hoyt Laboratories**
- 19 **Predent Topical Fluoride Treatment Gel - Harry J. Bosworth Co**
- 20 **Rafluor New Age Gel - Pascal Co, Inc**
- 21 **Rafluor Topical Gel - Pascal Co, Inc**
- 22 **Rafluor Topical Solution - Pascal Co, Inc**
- 23 **Sultan Topical Fluoride Gel - Sultan Dental Products**
- 24 **Thera-Flur APF Topical Gel-Drops - Colgate-Hoyt Laboratories**
- 25 **Thixo-Flur 1.2% APF Topical Gel, 3 flavors - Colgate-Hoyt Laboratories**

(2) 8% stannous fluoride (SnF_2) solution

- (a) Poor taste
- (b) Usually must be mixed fresh daily or weekly (one commercial product does exist)
- (c) Can stain silicates, arrested carious lesions
- (d) Accepted products include (list taken from JADA Vol 116, February 1988 and may not be complete, check for ADA Seal of Acceptance):

1 **Stannous Fluoride 8% - Young Dental Mnfct Co**

(3) 2% neutral sodium fluoride (NaF) gel or solution

- (a) Treatment of choice for root caries or in cases of root sensitivity (stannous fluoride will stain; APF may be irritating)
- (b) Also well-tolerated by children

(c) Accepted products include (list taken from JADA Vol 116, February 1988 and may not be complete, check for ADA Seal of Acceptance):

1 Sodium Fluoride Solution 2% - Young Dental Manufacturing Co

3. Procedures

a. Gels (1.23% APF or 2.0% NaF)

- (1) Rinse mouth thoroughly with water. Seat patient upright and use saliva ejector to remove saliva from floor of mouth during application.
- (2) Fill upper and lower, full arch trays 1/3 full with gel (or modify if using quadrant application in children under 4)
- (3) Use compressed air to remove saliva from teeth as much as possible before application of the loaded trays.
- (4) Place the loaded trays in position and gently squeeze the buccal and lingual surfaces to cause the gel to flow between the teeth.
- (5) Instruct the patient to bite lightly on the tray and allow it to remain in the mouth for 4 minutes. (1 minute applications can be considered, but the total fluoride uptake and resultant efficacy will be diminished, and 4 minutes is the ADA recommended application time)
- (6) Have the patient expectorate immediately and repeatedly for at least one minute upon completion of the topical treatment. Advise patient not to eat, drink or rinse for 30 minutes following the treatment.

b. Solutions (8% SnF₂, 1.23% APF or 2.0% NaF)

- (1) If using SnF₂, prepare a fresh solution by adding one level measure of stannous fluoride crystals (6505-00-253-7819) in an IRM powder scoop to 10 ml of deionized water; one SnF₂ preparation and all APF and NaF solutions are commercially-available.
- (2) Seat patient upright and isolate both an upper and lower right or left quadrant from salivary contamination using cotton rolls. Use saliva ejector throughout.
- (3) Dry tooth surfaces with compressed air.
- (4) SnF₂ will stain silicate restorations; protect them with vaseline or cocoa butter or use APF or NaF solutions. Keep SnF₂ solutions off the tongue.
- (5) Keep all tooth surfaces continuously wet by loading a cotton swab frequently with the fluoride solution.
- (6) Application time should be 4 minutes. Commence timing when the last tooth in the half-mouth area is wet.
- (7) Repeat on opposite side of the mouth.
- (8) Have the patient expectorate immediately and repeatedly for at least one minute upon completion of the topical treatment. Advise patient not to eat, drink or rinse for 30 minutes following the treatment.

B. Fluoride dentifrices

1. Recommend only ADA-accepted or FDA-approved products that have a proven efficacy. Others may contain ingredients that bind fluoride and make it ineffective.

2. CHILDREN: use small amount (about size of a pea) to avoid ingestion of excess fluoride
3. 25-35% reduction in caries prevalence reported
4. Accepted products include (list taken from JADA Vol 116, February 1988 and may not be complete, check for ADA Seal of Acceptance):
 - a. Regular Strength Aim Toothpaste, Mint, Regular (MFP) - Chesebrough-Pond's Inc
 - b. Extra Strength Aim Toothpaste (MFP, 1500 ppm F) - Chesebrough-Pond's Inc
 - c. Aqua-Fresh Fluoride Toothpaste(MFP) - Beecham Products
 - d. Aqua-Fresh for Kids Toothpaste (MFP) - Beecham Products
 - e. Colgate Gel Toothpaste with MFP - Colgate-Palmolive Co
 - f. Colgate with MFP Fluoride - Colgate-Palmolive Co
 - g. Colgate Tartar Control Formula Gel (NaF) with 3.3% pyrophosphate - Colgate-Palmolive Co
 - h. Colgate Tartar Control Formula Toothpaste (NaF) with 3.3% pyrophosphate - Colgate-Palmolive Co
 - i. Crest Doble Accion Toothpaste (NaF) - Procter & Gamble
 - j. Crest Toothpaste for Kids, Super Cool Gel (NaF) - Procter & Gamble
 - k. Crest Toothpaste, Mint, Regular (NaF) - Procter & Gamble
 - l. Gel Formula Crest (NaF) - Procter & Gamble
 - m. Crest Tartar Control Formula Toothpaste, Mint, Regular (NaF) with 5.0% pyrophosphate - Procter & Gamble
 - n. Dentaguard Fluoride Toothpaste - Colgate-Palmolive Co
 - o. Gleem (NaF) - FDA approval only
 - p. Macleans Fluoride Toothpaste, Mildmint, Peppermint (MFP) - Beecham Products
 - q. Zact HP Toothpaste - Rydelle-Lion, Inc
 - r. Zact Smoker's Gel - Rydelle-Lion, Inc
 - s. Zact Smoker's Toothpaste - Rydelle-Lion, Inc

C. Self-applied fluorides rinses

1. Home-applied rinses

- a. Daily home rinses recommended as an adjunct for use in

certain rampant or high-risk caries patients until their caries rates are under control or for patients undergoing orthodontic care. They are not a substitute for other forms of fluoride therapy.

- b. Use only ADA-accepted and FDA-approved products, generally every evening after brushing and before bedtime.
- c. Accepted products include (list taken from JADA Vol 116, February 1988 and may not be complete, check for ADA Seal of Acceptance) (over-the-counter preparations contain 0.05% NaF with 0.023% available fluoride):
 - (1) Act Fluoride Anti-Cavity Dental Rinse (nonprescription) - Johnson & Johnson
 - (2) Fluorigard Anti-Cavity Dental Rinse (nonprescription) - Colgate-Palmolive Co
 - (3) Kolynos Fluoride Dental Rinse (nonprescription) - Whitehall Laboratories
 - (4) Reach Fluoride Dental Rinse (nonprescription) - Johnson & Johnson
 - (5) Iradicav 0.2% Neutral Sodium Fluoride Mouthrinse (prescription) - Johnson & Johnson
 - (6) NaFrinse Acidulated Oral Rinse and Systemic Supplement (prescription) - Oracem Pharmaceuticals
 - (7) NaFrinse, 0.05% (prescription) - Medical Products Laboratories
 - (8) Phos-Flur Oral Rinse Supplement, four flavors (prescription) - Colgate-Hoyt Laboratories
 - (9) Point-Two Dental Rinse, 4 oz, 1 gal (prescription) - Colgate-Hoyt Laboratories
 - (10) Preventive Dental Fluoride 0.2% Sodium Fluoride Oral Solution (prescription) - B.M.G. Pharmaceutical Products Inc
- d. Follow manufacturer's directions for use. Do NOT use in children under 6 years of age.

2. School Based Rinse Programs

- a. Uses 0.2% NaF rinse on a weekly basis

- b. Sanctioned by ADA, FDA and National Institutes of Health
- c. Effective in both fluoridated and non-fluoridated areas
- d. NOT recommended for children under 6 years of age

D. Fluoride Gels

1. Daily home gels can be used as an adjunct for use in certain rampant or high-risk caries patients until their caries rates are under control or for patients undergoing orthodontic care. They are not a replacement for other forms of fluoride therapy.
2. Available products contain 0.4% stannous fluoride or 1.1% NaF (1000 ppm)
3. Follow manufacturer's directions for use. Do NOT use in children under 6 years of age.
4. Accepted products include (list taken from JADA Vol 116, February 1988 and may not be complete, check for ADA Seal of Acceptance)
 - a. Karigel-N, 1.1% Neutral Sodium Fluoride Gel - Lorvic Corp
 - b. Thera-Flur Neutral Sodium Fluoride Topical Gel-Drops - Colgate-Hoyt Laboratories
 - c. Activus 0.4% Stannous Fluoride Treatment Gel, 2, 3 & 4.3 oz - Scherer Laboratories, Inc
 - d. Basic 0.4% Stannous Fluoride Dental Gel, 4.3 oz - Basic Dental Products, Inc
 - e. Control 0.4% Stannous Fluoride Home Fluoride Treatment Gel, 4.3 oz - Arizona Dental Products, Inc
 - f. Easy-Gel 0.4% Stannous Fluoride Gel, 120 g - Du-More, Inc
 - g. Flo-Gel 0.4% Stannous Fluoride Home Fluoride Treatment Gel, 4.3 oz - Continental Quest Corp
 - h. Gel-Kam 0.4% Stannous Fluoride Gel for Home Treatment, 2.3, 3.5 or 4.3 oz - Scherer Laboratories
 - i. Gel-Pro 0.4% Stannous Fluoride Gel, 4.3 oz - Supro, Inc
 - j. Perfect Choice 0.4% Stannous Fluoride Home Fluoride Treatment Gel, 4.3 oz - Challenge Products, Inc

5. Both gels and dentifrices deliver the same 1000 ppm F.
But because they contain no abrasive systems, gels should
not be a substitute for dentifrices.
6. Can be used with custom trays

IV. Prophylaxis Pastes

- A. Accomplish all prophylaxes with a fluoride-containing prophy
paste
- B. Follow polishing with a topical fluoride treatment to
replenish fluoride lost during the procedure.
- C. Alternative products
 1. Flour of pumice + 8% stannous fluoride
 - (a) Prepare fresh solution described above.
 - (b) Wet the pumice with the 8% stannous fluoride solution
 2. Commercially available prophy pastes (e.g., Luride,
Preventodontic, Nupro)
- D. Procedure
 1. Apply paste with a rotating rubber prophy cup in a logical
sequence.
 2. Expose tooth surfaces to the paste for at least 5 seconds
 3. Use prophy brush for occlusal surfaces and unwaxed dental
floss to draw paste through interproximal contacts
 4. Instruct patient to expectorate excessive paste. Patients
may be permitted to rinse, but should be cautioned not to
swallow (can cause nausea in some patients).

V. Fluoride Toxicity

- A. Office morbidity/mortality usually due to gross errors and failure to follow established guidelines.
- B. Acute fluoride toxicity
 1. Lethal dose is 32 mg F per kilogram of body weight or 15 mg F per pound, although exposure to amounts less than lethal dose can cause a variety of symptoms and may require treatment.
 2. Symptoms: nausea, vomiting, abdominal pains, diarrhea
 3. Death from lethal dose usually occurs in 2-4 hours
 4. Treatment depends on dosage and may include
 - a. Getting subject to physician quickly (always)
 - b. Inducing vomiting and gastric lavage
 - c. Giving milk , 5% calcium gluconate or calcium lactate orally or 10% calcium gluconate intravenously
 - d. Supporting patient in case of shock
 5. Calculating lethal dose of fluoride-containing products
 - a. Must know concentration of fluoride in product
(Example: 1.0% F = 10 mg F/gram or ml; 0.1% F = 1 mg F/gram or ml)
 - b. Must know weight of patient (remember lethal dose is related to weight)
 - c. Formula
 - (1) Lethal amount = LA
 - (2) Weight of patient = W (kg or lb)

(3) Lethal dose = LD (mg/kg or mg/lb)

(4) Amount of fluoride in product = AF (mg F/gram) (If expressed as mg NaF instead of mg F, multiply by 0.45 to convert to mg F)

(5) Formula: $LA = W \times LD/AF$

d. Specific examples

(1) Dentifrice or toothpaste

(a) $AF = 0.1\% F$ or 1 mg F/gram

(b) Weight of patient = 50 lbs

(c) $LA = 50 \text{ lbs} \times 15 \text{ mg F/lb} / 1 \text{ mg F/gram} = \underline{750 \text{ grams toothpaste}}$

(2) Topical Fluoride (1.23% APF Solution)

(a) $AF = 12.3 \text{ mg F/ml}$

(b) Weight of patient = 50 lbs

(c) $LA = 50 \text{ lbs} \times 15 \text{ mg F/lb} / 12.3 \text{ mg F/ml} = \underline{61 \text{ ml solution}}$

(3) Topical Fluoride (8% SnF₂ solution with 1.94% F)

(a) $AF = 19.4 \text{ mg F/ml}$

(b) Weight of patient = 50 lbs

(c) $LA = 50 \text{ lbs} \times 15 \text{ mg F/lb} / 19.4 \text{ mg F/ml} = \underline{39 \text{ ml solution}}$

(4) Topical Fluoride (2% NaF)

(a) $AF = 2 \text{ mg F/ml} \times .45 = 9 \text{ mg F/ml}$

(b) Weight of patient = 50 lbs

(c) $LA = 50 \text{ lbs} \times 15 \text{ mg F/lb} / 9 \text{ mg F/ml} = \underline{83 \text{ ml solution}}$

6. Calculating amount of fluoride ingested (FI) per kg of body weight

- a. Formula for fluoride solutions: $FI = \%F \times 10 \text{ mg/ml} \times \text{amount swallowed in ml} \times R / \text{Weight of patient in kg}$
($R = .5$ for NaF; $.25$ for SnF₂; and 1 for APF)

#1: $FI = 1.23\% F \times 10 \text{ mg/ml} \times 9 \text{ ml} \times 1 / 22.7 \text{ kg} = 4.9 \text{ mg/kg}$
#2: $FI = 1.23\% F \times 10 \text{ mg/ml} \times 18 \text{ ml} \times 1 / 22.7 \text{ kg} = 9.8 \text{ mg/kg}$
#3: $FI = 1.23\% F \times 10 \text{ mg/ml} \times 27 \text{ ml} \times 1 / 22.7 \text{ kg} = 16.2 \text{ mg/kg}$

#4: $FI = 8\% \text{ SnF}_2 \times 10 \text{ mg/ml} \times 5.5 \text{ ml} \times .25 / 22.7 \text{ kg} = 4.8 \text{ mg/kg}$
#5: $FI = 8\% \text{ SnF}_2 \times 10 \text{ mg/ml} \times 11 \text{ ml} \times .25 / 22.7 \text{ kg} = 9.7 \text{ mg/kg}$
#6: $FI = 8\% \text{ SnF}_2 \times 10 \text{ mg/ml} \times 19 \text{ ml} \times .25 / 22.7 \text{ kg} = 16.7 \text{ mg/kg}$

#7: $FI = 2\% \text{ NaF} \times 10 \text{ mg/ml} \times 11 \text{ ml} \times .5 / 22.7 \text{ kg} = 4.8 \text{ mg/kg}$
#8: $FI = 2\% \text{ NaF} \times 10 \text{ mg/ml} \times 22 \text{ ml} \times .5 / 22.7 \text{ kg} = 9.7 \text{ mg/kg}$
#9: $FI = 2\% \text{ NaF} \times 10 \text{ mg/ml} \times 37 \text{ ml} \times .5 / 22.7 \text{ kg} = 16.2 \text{ mg/kg}$

- b. Formula for fluoride dentifrice: $FI = 1 \text{ mg F/g} \times \text{amount swallowed in g} / \text{Weight of patient in kg}$

#1: $FI = 1 \text{ mg F/g} \times 200 \text{ g} / 22.7 \text{ kg} = 8.8 \text{ mg/kg}$
#2: $FI = 1 \text{ mg F/g} \times 370 \text{ g} / 22.7 \text{ kg} = 16.3 \text{ mg/kg}$

- c. Formula for fluoride tablets: $FI = \# \text{ tablets swallowed} \times \text{mg NaF per tablet} \times .5 / \text{Weight of patient in kg}$

#1: $FI = 200 \text{ tab} \times 1.0 \text{ mg F per tab} \times .5 / 22.7 \text{ kg} = 4.4 \text{ mg/kg}$
#2: $FI = 750 \text{ tab} \times 1.0 \text{ mg F per tab} \times .5 / 22.7 \text{ kg} = 16.5 \text{ mg/kg}$

7. Emergency treatment for fluoride overdose

- a. For doses less than 5.0 mg/kg body weight

- (1) Give calcium (milk) orally to relieve GI symptoms
- (2) Observe for a few hours
- (3) Induced vomiting not necessary

- b. For doses more than 5.0 mg/kg but less than 15 mg/kg body weight

- (1) Induce vomiting with emetic
- (2) Endotracheal intubation instead for patients with depressed gag reflex
- (3) Give orally soluble calcium (milk, 5% calcium gluconate, or calcium lactate)

(4) Admit to hospital and observe for a few hours

c. For doses more than 15 mg/kg body weight

(1) Admit to hospital immediately

(2) Induce vomiting

(3) Begin cardiac monitoring; observe for peaking
T-waves and prolonged Q-T intervals

(4) 10% calcium gluconate intravenously (slowly);
monitor calcium and potassium levels

(5) Maintain adequate urine output with diuretics if
necessary

(6) Take supportive measures for shock

(4) Admit to hospital and observe for a few hours

c. For doses more than 15 mg/kg body weight

(1) Admit to hospital immediately

(2) Induce vomiting

(3) Begin cardiac monitoring; observe for peaking
T-waves and prolonged Q-T intervals

(4) 10% calcium gluconate intravenously (slowly);
monitor calcium and potassium levels

(5) Maintain adequate urine output with diuretics if
necessary

(6) Take supportive measures for shock

The following tables were adapted from "A guide to the use of fluorides for the prevention of dental caries", JADA, Vol 113, No. 9, September 1986, pp. 502-561. They offer a quick reference guide to the use of fluoride supplements, professionally applied topical fluorides, rinses and gels for home use, and fluoride dentifrices. They are based on the age of the patient, fluoride concentration in the drinking water (based on optimal 1 ppm), and the caries activity of the patient.

BIRTH TO 24 MONTHS

| | Supplement | Topical | Home | Dentifrice |
|------------------------|-----------------------|--|------|------------|
| No caries < .3 ppm | .25 mg daily Drops | No | No | Yes |
| No caries .3-.7 ppm | No | No | No | Yes |
| No caries >.7 ppm | No | No | No | Yes |
| Active <.3 ppm | .25 mg daily Drops | APF sol or gel Twice a year 4 minutes (or 2% NaF) | No | Yes |
| Active .3-.7 ppm | No | APF sol or gel Twice a year 4 minutes (or 2% NaF) | No | Yes |
| Active >.7 ppm | No | APF sol or gel Twice a year 4 minutes (or 2% NaF) | No | Yes |

BIRTH TO 24 MONTHS - cont

| | Supplement | Topical | Home | Dentifrice |
|----------------------|-----------------------|---|------|------------|
| Rampant <.3 ppm | .25 mg daily Drops | APF sol or gel Four times a year 4 minutes (or 2% NaF) | No | Yes |
| Rampant .3-.7 ppm | No | APF sol or gel Four times a year 4 minutes (or 2% NaF) | No | Yes |
| Rampant >.7 ppm | No | APF sol or gel Four times a year 4 minutes (or 2% NaF) | No | Yes |

25 TO 36 MONTHS (2-3 YRS)

| | Supplement | Topical | Home | Dentifrice |
|------------------------|-----------------------|--|------|------------|
| No caries < .3 ppm | .5 mg daily Drops | No | No | Yes |
| No caries .3-.7 ppm | .25 mg daily Drops | No | No | Yes |
| No caries >.7 ppm | No | No | No | Yes |
| Active <.3 ppm | .5 mg daily Drops | APF sol or gel Twice a year 4 minutes (or 2% NaF) | No | Yes |

25 TO 36 MONTHS (2-3 YRS) - cont

| | Supplement | Topical | Home | Dentifrice |
|----------------------|-----------------------|---|--|------------|
| Active .3-.7 ppm | .25 mg daily Drops | APF sol or gel Twice a year 4 minutes (or 2% NaF) | No | Yes |
| Active >.7 ppm | No | APF sol or gel Twice a year 4 minutes (or 2% NaF) | No | Yes |
| Rampant <.3 ppm | .5 mg daily Drops | APF sol or gel Four times a year 4 minutes (or 2% NaF) | No | Yes |
| Rampant .3-.7 ppm | .25 mg daily Drops | APF sol or gel Four times a year 4 minutes (or 2% NaF) | No | Yes |
| Rampant >.7 ppm | No | APF sol or gel Four times a year 4 minutes (or 2% NaF) | 0.5% gel tray daily for 4 wks Then 0.05% NaF rinse daily Eval q 3 mo | Yes |

37 MONTHS TO 13 YEARS (3-13 YEARS)

| | Supplement | Topical | Home | Dentifrice |
|-----------------------|-------------------------|--|------|------------|
| No caries < .3 ppm | .25 mg daily Tablets | APF sol or gel Twice a year 4 minutes (or 2% NaF) | No | Yes |

37 MONTHS TO 13 YEARS (3-13 YEARS) - cont

| | Supplement | Topical | Home | Dentifrice |
|------------------------|-------------------------|---|--|------------|
| No caries .3-.7 ppm | .5 mg daily Tablets | APF sol or gel Twice a year 4 minutes (or 2% NaF) | No | Yes |
| No caries >.7 ppm | No | No | No | Yes |
| Active <.3 ppm | 1.0 mg daily Tablets | APF sol or gel Twice a year 4 minutes (or 2% NaF) | 0.05% NaF rinse daily Age 6 & over | Yes |
| Active .3-.7 ppm | .5 mg daily Tablets | APF sol or gel Twice a year 4 minutes (or 2% NaF) | 0.05% NaF rinse daily Age 6 & over | Yes |
| Active >.7 ppm | No | APF sol or gel Twice a year 4 minutes (or 2% NaF) | 0.05% NaF rinse daily Age 6 & over | Yes |
| Rampant <.3 ppm | 1.0 mg daily Tablets | APF sol or gel Twice a year 4 minutes (or 2% NaF) | 0.5% gel tray daily for 4 wks Then 0.05% NaF rinse daily Eval q 3 months Age 6 & over | Yes |
| Rampant .3-.7 ppm | .5 mg daily Tablets | APF sol or gel Four times a year 4 minutes (or 2% NaF) | 0.5% gel tray daily for 4 wks Then 0.05% NaF rinse daily Eval q 3 months Age 6 & over | Yes |

37 MONTHS TO 13 YEARS (3-13 YEARS) - cont

| | Supplement | Topical | Home | Dentifrice |
|--------------------|------------|--|--|------------|
| Rampant >.7 ppm | No | APF sol or gel Twice a year 4 minutes (or 2% NaF) | 0.5% gel tray daily for 4 wks Then 0.05% NaF rinse daily Eval q 3 months Age 6 & over | Yes |

OVER 13 YEARS

| | Supplement | Topical | Home | Dentifrice |
|-----------------------|------------|---|---|------------|
| No caries Any conc | No | APF sol or gel Twice a year 4 minutes (or 2% NaF) Till age 16 | No | Yes |
| Active Any conc | No | APF sol or gel Twice a year 4 minutes (or 2% NaF) Till age 16 | 0.05% NaF rinse daily | Yes |
| Rampant Any conc | No | APF sol or gel Four times a year 4 minutes (or 2% NaF) | 0.5% gel daily for 4 weeks Then 0.05% NaF rinse daily Eval q 3 months | Yes |

**INSTRUCTIONS FOR RECORDING THE AIR FORCE
PERIODONTAL AND ORAL HYGIENE INDICES**

A13-1. The Air Force Periodontal and Oral Hygiene Indices (P&H Indices) are designed to identify and provide a chronological record of the active duty patient's periodontal and oral hygiene status. These recordings are simple, rapid, and provide meaningful soft tissue and oral hygiene profiles for each patient. The indices may also facilitate the routing of patients to providers of the appropriate skill level. P&H Indices will be determined primarily by periodontal probing during during Type 2 examinations (Para 4-5a and 4-5b) but may be used at any time. Appropriate P&H scores are entered on SF 603/603A in Item 17. Other plaque and tissue indices may also be used with one procedure credit (Code 1360, limit 5) taken for each index.

A13-2. Procedure for Using the P&H Indices:

a. Periodontal (P) Index -

(1) The P Index records the patient's periodontal status. A dental officer, hygienist, or periodontal therapist using a periodontal probe and visual observation determines the appropriate designation as follows:

(a) **P0 - REQUIRES NO PERIODONTAL TREATMENT.** Gingival tissues appear healthy; no periodontal pathosis noted; prophylaxis not required except to remove extrinsic stain.

(b) **P1 - REQUIRES PROPHYLAXIS.** Bleeding occurs with periodontal probing. Probing depths are 0-3 mm. Treatment needs can be effectively met with oral hygiene reinforcement and a prophylaxis. No further evaluation is required to assess periodontal health.

(c) **P2 - REQUIRES PROPHYLAXIS AND RE-EVALUATION.** Bleeding accompanies periodontal probing. Probing depths range from 4-5 mm. Patient's periodontal status should be re-evaluated by a dental officer, dental hygienist, or periodontal therapist to assess response to therapy. These patients may benefit from a 3 or 6-month maintenance interval.

(d) **P3 - REQUIRES PERIODONTAL EVALUATION BY A DENTAL OFFICER.** Bleeding occurs with periodontal probing. Probing depths are 6 mm or greater and/or mucogingival pathosis is present which warrants further evaluation.

(e) **P4 - REQUIRES/RECEIVING PERIODONTAL THERAPY.** Patients requiring and/or receiving definitive periodontal care.

(f) **P5 - REQUIRES PERIODONTAL MAINTENANCE.** Patient has received definitive periodontal care and/or requires continued periodontal maintenance.

(2) Only a dental officer, hygienist, or periodontal therapist may change the P Index.

b. **Oral Hygiene (H) Index:**

(1) The H Index records the patient's oral hygiene status and is determined by visual inspection, radiographic review, and tactile information.

(a) **H0 - No Detectable Plaque/Calculus**

(b) **H1 - Supragingival Plaque/Calculus Detected**

(c) **H2 - Subgingival Calculus Detected**

(2) Any dental health care provider may update the H Index.

c. **Example:** If the patient requires only a prophylaxis and has supra-
gingival plaque present, inform the patient of these findings. Review and
demonstrate oral hygiene techniques, e.g., sulcular brushing and proper flossing
technique. Record P1H2 and summarize counseling in Item 17 of the patient's SF
603/603A. Take two procedure credits for Code 1360 and one credit for Code
1330.