

JAN 23 2004

**510(k) Summary**

**for**

**Perio Protect Tray**

K031809

**1. DATE PREPARED**

January 14, 2004

**2. SPONSOR INFORMATION**

Main Office

Perio Protect LLC  
3929 Bayless Avenue  
St. Louis, MO 63125

Mailing Address

Perio Protect LLC  
3929 Bayless Avenue  
St. Louis, MO 63125

Contact Person: Duane C. Keller, D.M.D.

(314) 638-4190 (telephone)  
(314) 638-3900 (facsimile)

Outside Regulatory Counsel

Gray Cary Ware & Freidenrich LLP  
1625 Massachusetts Ave., NW – Ste 300  
Washington, DC 20036

(202) 238-7749 (telephone)  
(202) 238-7701 (facsimile)

Contact Person: David L. Rosen, R.Ph., J.D.

### 3. **DEVICE NAME**

Proprietary Name: Perio Protect Tray  
Common/Usual Name: Dental Tray  
Classification Name: Disposable Fluoride Tray  
(per 21 C.F.R § 872.6870 (2002))

### 4. **DEVICE DESCRIPTION AND INTENDED USE**

The Perio Protect Tray is a custom fit tray made from impressions of the patient's mouth taken by a licensed dentist. The patient impressions are then sent to a specialized dental laboratory which makes a custom fit tray for the individual patient.

The Perio Protect Tray is intended to be used to place solutions of the clinician's choice into gingival crevices or periodontal pockets. The design of the Perio Protect Tray permits placement of solutions deeper into the crevice/pocket than is possible with traditional fluoride trays.

The choice of solution, the frequency of use, and the time the tray is to be in place are a part of the practice of dentistry, and are to be determined by the clinician.

### 5. **PREDICATE DEVICE**

Hoyt Laboratories

Disposable Fluoride Tray – K 811154

Such products are now Class I Exempt per 21 C.F.R § 872.6870 (2002)

## Substantial Equivalence Comparison

	Delivery of Oral Irrigation Materials	Indication for Use	Design	Materials	Anatomic Sites
Perio Protect Tray Fluoride Tray Hoyt Laboratories K811154	Site specific  General area specific	Irrigation / solutions  Topical fluoride application	Custom  Preformed	Elastomeric  Foam	Teeth / gingiva  Teeth

### 6. DEVICE TESTING

#### PERFORMANCE DATA

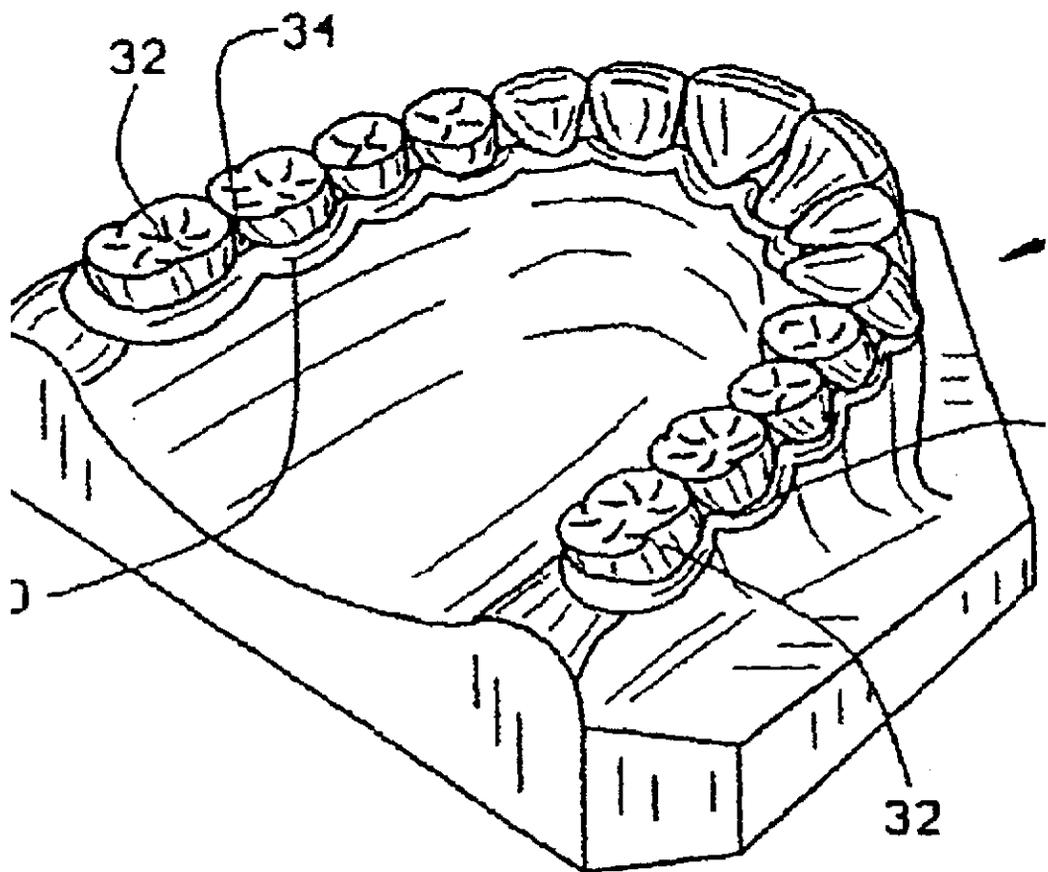
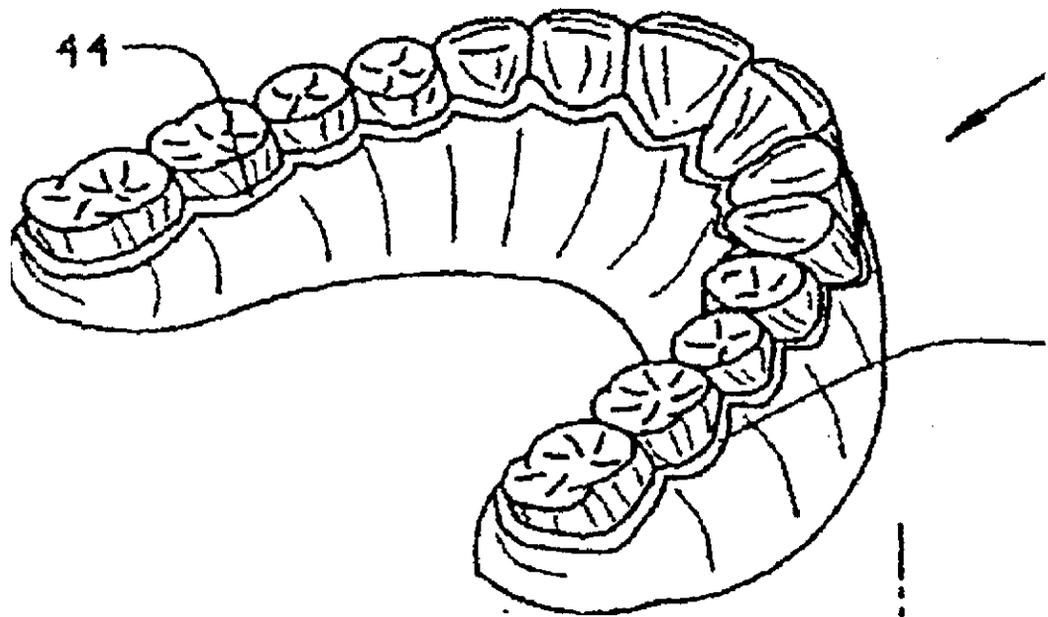
- A. *Data demonstrating different solutions used in the clinician's practice of dentistry are delivered to the teeth and surrounding tissues by use of the Perio Protect Tray.*

*Sodium Fluorescein dye was mixed in an aqueous solution and applied to the Perio Protect Tray with one drop of Peroxyl (hydrogen peroxide) gel. Sodium Fluorescein is a phosphorescent dye that can be illuminated under a black light.*

*The patients wore the trays 10 – 15 minutes in the morning and evening for one day. The patients were examined 24 hours later and a black light was used to illuminate the region around the teeth. Sodium fluorescein dye was observed in the gingival sulcus.*

- B. *The force necessary to remove the Perio Protect Tray was also tested.*

*Trays were also placed in the patient's mouth. A gram gauge was used to remove the tray from the patient's mouth. Each of these tests was repeated 10 times and an average of the force necessary to remove the tray was computed.*





JAN 23 2004

Food and Drug Administration  
9200 Corporate Boulevard  
Rockville MD 20850

Perio Protect LLC  
C/O Dr. David L. Rosen  
Gray Cary Ware & Freidenrich LLP  
1625 Massachusetts Avenue NW, Suite 300  
Washington, D.C. 20036-2247

Re: K031809/S1  
Trade/Device Name: Perio Protect Tray  
Regulation Number: 21 CFR 872.6870  
Regulation Name: Disposable Flouride Tray  
Regulatory Class: I  
Product Code: KMT  
Dated: October 27, 2003  
Received: October 30, 2003

Dear Dr. Rosen:

We have reviewed your Section 510(k) premarket notification of intent to market the device referenced above and have determined the device is substantially equivalent (for the indications for use stated in the enclosure) to legally marketed predicate devices marketed in interstate commerce prior to May 28, 1976, the enactment date of the Medical Device Amendments, or to devices that have been reclassified in accordance with the provisions of the Federal Food, Drug, and Cosmetic Act (Act) that do not require approval of a premarket approval application (PMA). You may, therefore, market the device, subject to the general controls provisions of the Act. The general controls provisions of the Act include requirements for annual registration, listing of devices, good manufacturing practice, labeling, and prohibitions against misbranding and adulteration.

If your device is classified (see above) into either class II (Special Controls) or class III (PMA), it may be subject to such additional controls. Existing major regulations affecting your device can be found in the Code of Federal Regulations, Title 21, Parts 800 to 898. In addition, FDA may publish further announcements concerning your device in the Federal Register.

Please be advised that FDA's issuance of a substantial equivalence determination does not mean that FDA has made a determination that your device complies with other requirements of the Act or any Federal statutes and regulations administered by other Federal agencies. You must comply with all the Act's requirements, including, but not limited to: registration and listing (21 CFR Part 807); labeling (21 CFR Part 801); good manufacturing practice requirements as set forth in the quality systems (QS) regulation (21 CFR Part 820); and if applicable, the electronic product radiation control provisions (Sections 531-542 of the Act); 21 CFR 1000-1050.

This letter will allow you to begin marketing your device as described in your Section 510(k) premarket notification. The FDA finding of substantial equivalence of your device to a legally marketed predicate device results in a classification for your device and thus, permits your device to proceed to the market.

If you desire specific advice for your device on our labeling regulation (21 CFR Part 801), please contact the Office of Compliance at (301) 594-4613. Also, please note the regulation entitled, "Misbranding by reference to premarket notification" (21CFR Part 807.97). You may obtain other general information on your responsibilities under the Act from the Division of Small Manufacturers, International and Consumer Assistance at its toll-free number (800) 638-2041 or (301) 443-6597 or at its Internet address <http://www.fda.gov/cdrh/dsma/dsmamain.html>

Sincerely yours,



Chiu Lin, Ph., D.

Director

Division of Anesthesiology, General Hospital,

Infection Control and Dental Devices

Office of Device Evaluation

Center for Devices and

Radiological Health

Enclosure

K031809

**510(k) Number (if known):** K031809

**Device Name:** Trade Name: Perio Protect Tray

**Indications for Use:** The Perio Protect Tray is intended to be used to place solutions of the clinician's choice into gingival crevices or periodontal pockets. The design of the Perio Protect Tray permits placement of solutions deeper into the crevice/pocket than is possible with traditional fluoride trays.

The choice of solution, the frequency of use, and the time the tray is to be in place are a part of the practice of dentistry, and are to be determined by the clinician.

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Concurrence of CDRH, Office of Evaluation (ODE)



(Division Sign-Off)  
Division of Anesthesiology, General Hospital,  
Infection Control, Dental Devices

510(k) Number K031809

Prescription Use    
(Per 21 CFR 801.109)

or

Over-The-Counter Use