

K093451



NOV 20 2009

## 510(k) Summary

**Submitter:** OmniGuide, Inc.  
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Cambridge, MA 02139

**Contact Person:** Douglas W. Woodruff  
**Telephone:** 617-551-8404

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**Proprietary Name:** OmniGuide Beam Path CO<sub>2</sub> Mark III WaveGuide Fiber  
with Low Profile/Low Loss Tip

**Common Name:** CO<sub>2</sub> Laser Powered Surgical Instrument

**Classification:** 878.4810

**Product Code:** GEX

**Classification Name:** Laser surgical instrument for use in general and plastic  
surgery and in dermatology.

### **Substantial Equivalence Claimed To:**

K070157, OmniGuide Beam Path CO<sub>2</sub> Mark III WaveGuide Fiber  
K073313, OmniGuide BeamPath CO<sub>2</sub> Mark III WaveGuide Fiber With Low  
Profile Tip

**Description:**

The OmniGuide Beam Path CO<sub>2</sub> Mark III WaveGuide Fiber with Low Profile/Low Loss Tip is an accessory for CO<sub>2</sub> laser systems. It consists of a flexible fiber assembly that delivers CO<sub>2</sub> laser energy that enables minimally invasive surgery. OmniGuide Beam Path CO<sub>2</sub> Mark III WaveGuide Fiber with Low Profile/Low Loss metal tip is supplied sterile and is intended for single procedure use in conjunction with the OmniGuide Laser Adapter.

**Intended Use:**

The OmniGuide Beam Path CO<sub>2</sub> Mark III WaveGuide Fiber with Low Profile/Low Loss Tip is indicated for the incision, excision, ablation, vaporization and coagulation of body soft tissues including intra-oral tissues. It is indicated in the medical specialties of general and plastic surgery, oral/maxillofacial surgery, dentistry, dermatology, gynecology, otorhinolaryngology, gastroenterology, neurosurgery, urology, and pulmonology, and can be used in open surgical procedures as well as endoscopic minimally invasive procedures in conjunction with rigid or flexible endoscopes, such as in laryngoscopy, gastroscopy, colonoscopy, laparoscopy, thoracoscopy, hysteroscopy and bronchoscopy.

The indications for use for which the delivery system is used for are dependent upon the cleared indications for use of the laser system and those laser system accessories to which it is attached.


**Summary of Technological Characteristics:**

The device consists of an optical fiber assembly. The main functional component of the fiber assembly is a photonic bandgap reflector lining its hollow core that reflects and thereby guides CO<sub>2</sub> laser energy and an internally coated, stainless steel waveguide distal tip. The fiber assembly is 1 to 2 m long and transmits at the CO<sub>2</sub> laser emission wavelength of 10.6 μm. The fiber has 14 mm long, internally coated, stainless steel tip that is coated internally and acts as an efficient continuation of the waveguide. The new tip configuration reduces tip heating allowing the fiber to be used in continuous wave mode without heating the tip.

**Performance Data:**

Non-clinical Performance Data: The OmniGuide Beam Path CO<sub>2</sub> Mark III WaveGuide Fiber with Low Profile /Low Loss Tip performance characteristics have been evaluated through testing and analysis of laser power output and beam quality. This type of testing complies with the respective section of the FDA Guidance on the Content and Organization of a Premarket Notification for a Medical Laser (1995) and is similar to the predicate device tests. The performance of OmniGuide Beam Path CO<sub>2</sub> Mark III WaveGuide Fiber with Low Profile/Low Loss Tip and the related parameters of the predicate devices are comparable.

Clinical Performance Data: Formal clinical trials were not deemed necessary as the device is using the same technology and intended use as the predicate devices.



**Conclusions Drawn from Tests and Analysis:** The intended use and major performance parameters (energy transmission levels and beam quality) of the OmniGuide Beam Path CO<sub>2</sub> Mark III WaveGuide Fiber with Low Profile/Low Loss Tip are similar or equivalent to the characteristics of above mentioned legally marketed devices.



Food and Drug Administration  
10903 New Hampshire Avenue  
Document Control Room W-066-0609  
Silver Spring, MD 20993-0002

OmniGuide, Inc.  
% Regulatory Technology Services, LLC  
Mr. Mark Job  
1394 25<sup>th</sup> Street NW  
Buffalo, Minnesota 55313

NOV 20 2009

Re: K093451

Trade/Device Name: OmniGuide BeamPath CO<sub>2</sub> Mark III WaveGuide Fiber with Low  
Profile/Low Loss Tip

Regulation Number: 21 CFR 878.4810

Regulation Name: Laser surgical instrument for use in general and plastic surgery  
and in dermatology

Regulatory Class: Class II

Product Code: GEX

Dated: November 4, 2009

Received: November 5, 2009

Dear Mr. Job:

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 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); medical device reporting (reporting of medical

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device-related adverse events) (21 CFR 803); 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.

If you desire specific advice for your device on our labeling regulation (21 CFR Part 801), please go to <http://www.fda.gov/AboutFDA/CentersOffices/CDRH/CDRHOffices/ucm115809.htm> for the Center for Devices and Radiological Health's (CDRH's) Office of Compliance. Also, please note the regulation entitled, "Misbranding by reference to premarket notification" (21CFR Part 807.97). For questions regarding the reporting of adverse events under the MDR regulation (21 CFR Part 803), please go to <http://www.fda.gov/cdrh/mdr/> for the CDRH's Office of Surveillance and Biometrics/Division of Postmarket Surveillance.

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) 796-7100 or at its Internet address <http://www.fda.gov/cdrh/industry/support/index.html>.

Sincerely yours,



Mark N. Melkerson  
Director  
Division of Surgical, Orthopedic  
and Restorative Devices  
Office of Device Evaluation  
Center for Devices and  
Radiological Health

Enclosure

## Indications for Use

510(k) Number (if known): Not yet assigned

Device Name: OmniGuide BeamPath CO<sub>2</sub> Mark III WaveGuide Fiber with Low Profile/Low Loss Tip

### Indications For Use:

The OmniGuide Beam Path CO<sub>2</sub> Mark III WaveGuide Fiber with Low Profile/Low Loss Tip is indicated for the incision, excision, ablation, vaporization and coagulation of body soft tissues including intra-oral tissues. It is indicated in the medical specialties of general and plastic surgery, oral/maxillofacial surgery, dentistry, dermatology, gynecology, otorhinolaryngology, gastroenterology, neurosurgery, urology, and pulmonology, and can be used in open surgical procedures as well as endoscopic minimally invasive procedures in conjunction with rigid or flexible endoscopes, such as in laryngoscopy, gastroscopy, colonoscopy, laparoscopy, thoracoscopy, hysteroscopy and bronchoscopy.

The indications for use for which the delivery system is used for are dependent upon the cleared indications for use of the laser system and those laser system accessories to which it is attached.

Prescription Use   X    
(Part 21 CFR 801 Subpart D)

AND/OR

Over-The-Counter Use \_\_\_\_\_  
(21 CFR 801 Subpart C)

(PLEASE DO NOT WRITE BELOW THIS LINE-CONTINUE ON ANOTHER PAGE IF NEEDED)

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Concurrence of CDRH, Office of Device Evaluation (ODE)

*Michael Lee* for MTA  
(Division Sign-Off)  
Division of Surgical, Orthopedic,  
and Restorative Devices

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