



January 21, 2021

CoreLink, LLC  
% Nathan Wright, M.S.  
Engineer & Regulatory Specialist  
Empirical Testing Corp.  
4628 Northpark Drive  
Colorado Springs, Colorado 80918

Re: K202637

Trade/Device Name: F3D Corpectomy System  
Regulation Number: 21 CFR 888.3060  
Regulation Name: Spinal Intervertebral Body Fixation Orthosis  
Regulatory Class: Class II  
Product Code: MQP, PLR

Dear Mr. Wright:

The Food and Drug Administration (FDA) is sending this letter to notify you of an administrative change related to your previous substantial equivalence (SE) determination letter dated December 23, 2020. Specifically, FDA is updating this SE Letter as an administrative correction.

Please note that the 510(k) submission was not re-reviewed. For questions regarding this letter please contact Brent Showalter, Ph.D., OHT6: Office of Orthopedic Devices, (240) 402-1840, [Brent.Showalter@fda.hhs.gov](mailto:Brent.Showalter@fda.hhs.gov).

Sincerely,

**Brent Showalter -S**

Brent L. Showalter, Ph.D.  
Assistant Director  
DHT6B: Division of Spinal Devices  
OHT6: Office of Orthopedic Devices  
Office of Product Evaluation and Quality  
Center for Devices and Radiological Health



December 23, 2020

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Regulatory Class: Class II  
Product Code: MQP, PLR  
Dated: November 20, 2020  
Received: November 23, 2020

Dear Mr. Wright:

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. Although this letter refers to your product as a device, please be aware that some cleared products may instead be combination products. The 510(k) Premarket Notification Database located at <https://www.accessdata.fda.gov/scripts/cdrh/cfdocs/cfpmn/pmn.cfm> identifies combination product submissions. 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. Please note: CDRH does not evaluate information related to contract liability warranties. We remind you, however, that device labeling must be truthful and not misleading.

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 device-related adverse events) (21 CFR 803) for devices or postmarketing safety reporting (21 CFR 4, Subpart B) for combination products (see <https://www.fda.gov/combination-products/guidance-regulatory-information/postmarketing-safety-reporting-combination-products>); good manufacturing practice requirements as set forth in the quality systems (QS) regulation (21 CFR Part 820) for devices or current good manufacturing practices (21 CFR 4, Subpart A) for combination products; and, if applicable, the electronic product radiation control provisions (Sections 531-542 of the Act); 21 CFR 1000-1050.

Also, please note the regulation entitled, "Misbranding by reference to premarket notification" (21 CFR Part 807.97). For questions regarding the reporting of adverse events under the MDR regulation (21 CFR Part 803), please go to <https://www.fda.gov/medical-devices/medical-device-safety/medical-device-reporting-mdr-how-report-medical-device-problems>.

For comprehensive regulatory information about medical devices and radiation-emitting products, including information about labeling regulations, please see Device Advice (<https://www.fda.gov/medical-devices/device-advice-comprehensive-regulatory-assistance>) and CDRH Learn (<https://www.fda.gov/training-and-continuing-education/cdrh-learn>). Additionally, you may contact the Division of Industry and Consumer Education (DICE) to ask a question about a specific regulatory topic. See the DICE website (<https://www.fda.gov/medical-devices/device-advice-comprehensive-regulatory-assistance/contact-us-division-industry-and-consumer-education-dice>) for more information or contact DICE by email ([DICE@fda.hhs.gov](mailto:DICE@fda.hhs.gov)) or phone (1-800-638-2041 or 301-796-7100).

Sincerely,

  
**Brent Showalter -S**

Brent L. Showalter, Ph.D.

Assistant Director

DHT6B: Division of Spinal Devices

OHT6: Office of Orthopedic Devices

Office of Product Evaluation and Quality

Center for Devices and Radiological Health

Enclosure

## 4. INDICATIONS FOR USE STATEMENT

DEPARTMENT OF HEALTH AND HUMAN SERVICES Food and Drug Administration <b>Indications for Use</b>	Form Approved: OMB No. 0910-0120 Expiration Date: 06/30/2020 See PRA Statement on last page.
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510(k) Number (if known)  
K202637

Device Name

**F3D Corpectomy System**

Indications for Use (Describe)

The F3D Corpectomy devices are vertebral body replacement devices intended for use in the cervical (C2-T1) and thoracolumbar spine (T1-L5).

When used in the cervical spine (C2-T1), F3D Corpectomy devices are intended for use in skeletally mature patients to replace a diseased or damaged vertebral body caused by tumor fracture or osteomyelitis, or for reconstruction following corpectomy performed to achieve decompression of the spinal cord and neural tissues in cervical degenerative disorders. These spacers are intended to restore the integrity of the spinal column even in the absence of fusion for a limited time period in patients with advanced stage tumors involving the cervical spine in whom life expectancy is of insufficient duration to permit achievement of fusion, with bone graft used at the surgeon's discretion.

When used in the thoracolumbar spine (T1-L5), F3D Corpectomy devices are intended for use to replace a collapsed, damaged, or unstable vertebral body due to tumor or trauma (i.e., fracture). These spacers are designed to provide anterior spinal column support even in the absence of fusion for a prolonged period.

The interior of the spacers can be packed with autograft or allogenic bone graft comprising cancellous and/or corticocancellous bone graft and/or demineralized allograft bone with bone marrow aspirate as an adjunct to fusion.

These devices are intended to be used with FDA-cleared supplemental spinal fixation systems that have been labeled for use in the cervical, thoracic, and/or lumbar spine (i.e., posterior screw and rod systems, anterior plate systems, and anterior screw and rod systems). When used at more than two levels, supplemental fixation should include posterior fixation.

Type of Use (Select one or both, as applicable)

Prescription Use (Part 21 CFR 801 Subpart D)  Over-The-Counter Use (21 CFR 801 Subpart C)

**CONTINUE ON A SEPARATE PAGE IF NEEDED.**

This section applies only to requirements of the Paperwork Reduction Act of 1995.

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## 510(K) SUMMARY

Submitter's Name:	CoreLink, LLC
Submitter's Address:	2072 Fenton Logistics Park Blvd. St. Louis, Missouri 63026
Submitter's Telephone:	888-349-7808
Contact Person:	Nathan Wright MS Empirical Testing Corp. 719-351-0248 <a href="mailto:nwright@empiricaltech.com">nwright@empiricaltech.com</a>
Date Summary was Prepared:	September 10, 2020
Trade or Proprietary Name:	F3D Corpectomy System
Common or Usual Name:	Spinal Vertebral Body Replacement Device
Classification:	Class II per 21 CFR §888.3060
Regulation Name:	Spinal Intervertebral Body Fixation Orthosis
Product Code:	MQP, PLR
Classification Panel:	Orthopedics

### DESCRIPTION OF THE DEVICE SUBJECT TO PREMARKET NOTIFICATION:

The F3D Corpectomy Cage is a spinal vertebral body replacement device which is available in a variety of different heights, footprints, and lordotic options to suit the individual pathology and anatomical conditions of the patient. The F3D Corpectomy cage consists of a static, single-piece vertebral body replacement cage. The F3D Corpectomy devices are intended for use in the cervical (C2-T1) and thoracolumbar spine (T1-L5). They are designed to provide mechanical support to the spine while arthrodesis occurs. The F3D Corpectomy System is made from titanium alloy (Ti-6Al-4V) per ASTM F3001.

### INDICATIONS FOR USE

The F3D Corpectomy devices are vertebral body replacement devices intended for use in the cervical (C2-T1) and thoracolumbar spine (T1-L5).

When used in the cervical spine (C2-T1), F3D Corpectomy devices are intended for use in skeletally mature patients to replace a diseased or damaged vertebral body caused by tumor fracture or osteomyelitis, or for reconstruction following corpectomy performed to achieve decompression of the spinal cord and neural tissues in cervical degenerative disorders. These spacers are intended to restore the integrity of the spinal column even in the absence of fusion for a limited time period in patients with advanced stage tumors involving the cervical spine in whom life expectancy is of insufficient duration to permit achievement of fusion, with bone graft used at the surgeon's discretion.

When used in the thoracolumbar spine (T1-L5), F3D Corpectomy devices are intended for use to replace a collapsed, damaged, or unstable vertebral body due to tumor or trauma (i.e., fracture).

These spacers are designed to provide anterior spinal column support even in the absence of fusion for a prolonged period.

The interior of the spacers can be packed with autograft or allogenic bone graft comprising cancellous and/or corticocancellous bone graft and/or demineralized allograft bone with bone marrow aspirate as an adjunct to fusion.

These devices are intended to be used with FDA-cleared supplemental spinal fixation systems that have been labeled for use in the cervical, thoracic, and/or lumbar spine (i.e., posterior screw and rod systems, anterior plate systems, and anterior screw and rod systems). When used at more than two levels, supplemental fixation should include posterior fixation.

### TECHNOLOGICAL CHARACTERISTICS

The subject and predicate devices have nearly identical technological characteristics and the minor differences do not raise any new issues of safety and effectiveness. Specifically, the following characteristics are identical between the subject and predicates:

- Indications for Use
- Materials of manufacture
- Technological Characteristics and Structural support mechanism
- Sizes
- Sterilization
- Biocompatibility
- Mechanical Strength

The use of demineralized allograft bone with bone marrow aspirate packing has not been identified in a cleared predicate with indications for vertebral body replacement. The use of demineralized allograft bone with bone marrow aspirate packing was cleared in the reference device K191581.

Table 5-1 Predicate Devices

<b>510k Number</b>	<b>Trade or Proprietary or Model Name</b>	<b>Manufacturer</b>	<b>Predicate Type</b>
K183588	HAWKEYE™ Vertebral Body Replacement (VBR)	Choice Spine	Primary
K191778	Omnia Medical VBR	Omnia Medical, LLC	Additional
K180665	SANTORINI Corpectomy Cage System	K2M, LLC	Additional
K191581	Endoskeleton® TL Interbody Fusion Device	Titan Spine, Inc.	Reference
K180556	Foundation 3D Anterior Lumbar System	CoreLink, LLC	Reference

## PERFORMANCE DATA

The F3D Corpectomy System has been tested in the following test modes:

- Static axial compression per ASTM F2077
- Static torsion per ASTM F2077
- Dynamic axial compression per ASTM F2077
- Dynamic torsion per ASTM F2077
- Subsidence per ASTM F2267
- Expulsion

The results of this non-clinical testing show that the strength of the F3D Corpectomy System is sufficient for its intended use and is substantially equivalent to legally marketed predicate devices.

## CONCLUSION

The overall technology characteristics and mechanical performance data lead to the conclusion that the F3D Corpectomy System is substantially equivalent to the predicate device.