

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re patent of: BONUTTI, et al.	§
	§
U.S. Patent No. 7,404,804	§ Petition for <i>Inter Partes</i> Review
	§
Issued: July 29, 2008	§
	§ Attorney Docket No.: 026027.0000
Title: FINGER ORTHOSIS	§ Customer No.: 111393
	§ Real Party in Interest: Lantz Medical, Inc.
	§

PETITION FOR INTER PARTES REVIEW

Pursuant to the provisions of 35 U.S.C. §§ 311-319, Lantz Medical, Inc. (“Petitioner”) hereby petitions the Patent Trial and Appeal Board to institute an *inter partes* review of claim 1 of United States Patent No. 7,404,804 (“the ‘804 Patent”) (Exhibit 1001) that issued on July 29, 2008, to Peter M. Bonutti, resulting from U.S. Patent Application No. 11/181,238, filed on July 14, 2005. According to USPTO records, the ‘804 Patent is currently assigned to Bonutti Research, Inc. (“Patentee”).

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**I. COMPLIANCE WITH REQUIREMENTS FOR A PETITION FOR
INTER PARTES REVIEW**

**A. Certification that U.S. Patent No. 7,404,804 May Be Contested by
Petitioner**

Petitioner certifies it is not barred or estopped from requesting *inter partes* review (“IPR”) of U.S. Patent No. 7,404,804 (the ‘804 patent) (Exhibit 1001). Neither Petitioner, nor any party in privity with Petitioner, has filed a civil action challenging the validity of any claim of the ‘804 patent. The ‘804 patent has not been the subject of a prior IPR review by Petitioner or a privy of Petitioner.

Petitioner also certifies this petition for *inter partes* review is filed within one year of the date of service of a Complaint (Exhibit 1003) alleging infringement of a patent. Petitioner was served with a Complaint alleging infringement of the ‘804 patent on April 22, 2014, which led to *Bonutti Research, Inc. et al v. Lantz Medical, Inc.*, Civil Action No. 1:14-cv-00609 in the United States District Court, Southern District of Indiana.

Because the date of this petition is less than one year from April 22, 2014, this petition complies with 35 U.S.C. § 315(b).

B. Fee for Inter Partes Review (§ 42.15(a))

The Director is authorized to charge the fee specified by 37 CFR § 42.15(a) to Carson Boxberger LLP’s Deposit Account No. 506567.

C. Mandatory Notices (37 CFR § 42.8(b))

1. Real Party in Interest (§ 42.8(b)(1))

The real party in interest of this petition pursuant to § 42.8(b)(1) is Lantz Medical, Inc. (“Lantz”) located at 7750 Zionsville Road, #800, Indianapolis, Indiana 46268.

2. Other Proceedings (§ 42.8(b)(2))

The ‘804 patent is not the subject of any civil actions other than *Bonutti Research, Inc. et al v. Lantz Medical, Inc.*, Civil Action No. 1:14-cv-00609. However, Petitioner is contemporaneously filing requests for IPR for U.S. patent nos. 7,112,179 (Claim 26); 7,955,286 (Claims 26-31, 33); and 8,784,343 (Claims 1-4).

3. Designation of Lead and Backup Counsel

	Lead Counsel	Backup Counsel
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4. Service Information (§42.8(b)(4))

Service on Petitioner may be made by mail or hand delivery to Lead Counsel, Jacque R. Wilson at Carson Boxberger LLP, 301 W. Jefferson Blvd., Suite 200, Fort Wayne, IN 46802. Mr. Wilson's fax number is (260) 423-4329.

Service may be made by mail or hand delivery to Backup Counsel, Cedric D'Hue at D'Hue Law LLC, P.O. Box 421972, Indianapolis, IN 46242-1972. Mr. D'Hue's fax number is (202) 446-2951.

II. RELIEF REQUESTED

Petitioner requests IPR of Claim 1 of the '804 patent on the grounds set forth below, and requests that the Claim be found unpatentable. An explanation of how Claim 1 is unpatentable is provided below, including where each element can be found in the prior art publications and the relevance of the prior art references.

III. IDENTIFICATION OF CLAIMS BEING CHALLENGED (§ 42.104(b))

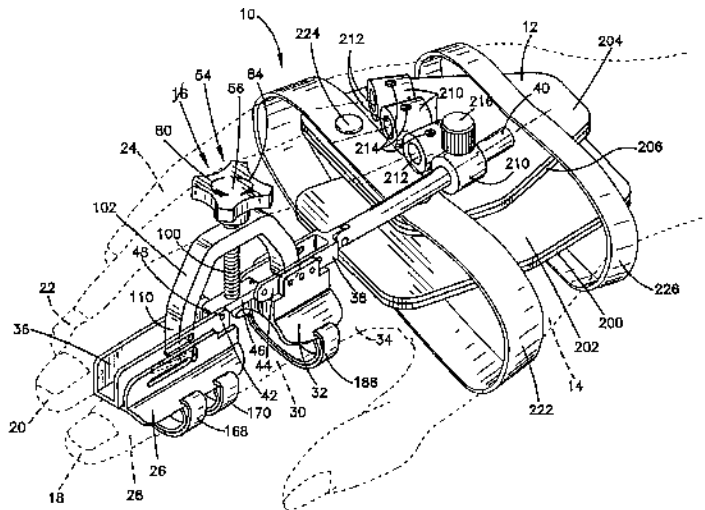
Claim 1 of the '804 patent is unpatentable because it is anticipated pursuant to 35 U.S.C. § 102(a) and (b).

Specifically, Claim 1 of the '804 patent is anticipated pursuant to 35 USC § 102 (a) and (b) by U.S. Patent 5,683,351 (Exhibit 1008), issued November 4, 1997; and by the JACE H440, Hand-CPM Softgoods/Splint Kit (Exhibit 1009) on sale at

least as early as 1994 – and the JACE H440’s brochure. Patentee did not cite these references during prosecution of the ‘804 patent.

Petitioner’s proposed construction of the contested claims, the evidence relied upon, and the precise reasons why the claims are unpatentable are provided below. The evidence relied upon in this petition is listed in the attached Exhibit List.

IV. BACKGROUND INFORMATION ON THE ‘804 PATENT



U.S. Patent No. 7,404,804 (“the ‘804 Patent”) issued from U.S. Patent Application Serial Number 11/181,238. The earliest effective filing date of the ‘804 patent is September 18, 2000. The ‘804 Patent includes six independent claims and twelve claims dependent from those independent claims. The independent claim at issue is Claim 1. During prosecution, the Claim was rejected under 35 U.S.C. § 102(b) as anticipated by U.S. Patent 5,503,619 of Bonutti. In

response, a terminal disclaimer was filed, and the limitation of “removably attachable to the finger” was added to Claim 1 to overcome the '619 patent.

Claim 1 of the '804 patent reads as follows:

A finger orthosis for positioning a joint in a finger on a hand of a patient, the finger orthosis comprising: a hand cuff positionable on the hand of the patient; and a bending mechanism removably attached to the finger, and selectively attachable to the hand cuff, and including first and second bending portions and a force transmitting mechanism connected to an interposed between the first and second bending portions.

V. DEFINITION OF A PERSON OF ORDINARY SKILL IN THE ART

“A person of ordinary skill in the art at the time of the invention of the . . . [‘804 patent] . . . would be an occupational therapist, physical therapist, mechanical engineer, and/or biomedical engineer with three to five years of experience designing or evaluating the design of orthotics.” (Exhibit 1005, page 4)

VI. LEGAL STANDARD FOR CONSTRUCTION OF CLAIM TERMS IN IPR

A claim subject to IPR is given its “broadest reasonable construction in light of the specification of the patent in which it appears.” 37 C.F.R. § 42.100(b). The broadest reasonable construction should be determined, in part, by taking into

account the subject matter Patentee contends infringes the claims and the constructions Patentee has advanced in litigation. Also, if Patentee contends terms in the claims should be read to have a special meaning, those contentions should be disregarded unless Patentee also amends the claims compliant with 35 U.S.C. § 112 to make them expressly correspond to those contentions. *See* 77 Fed. Reg. 48764 at II.B.6 (August 14, 2012); cf. *In re Youman*, 679 F.3d 1335, 1343 (Fed. Cir. 2012).

Thus, Petitioner suggests, for the sake of rational analysis only, that the “broadest reasonable” construction to be applied in this proceeding for these limitations is at least as broad as what Patentee is asserting in the pending litigation. For this reason, Petitioner presents below (except where indicated) the proposed claim constructions urged by Patentee.

VII. CONSTRUCTION OF TERMS IN THE ‘804 PATENT

A. “orthosis”

The claim language "orthosis" should be construed to mean "an orthopedic appliance or apparatus used to support, align, prevent, or correct deformities or to improve function of movable parts of the body," as defined by the Miller-Keane Encyclopedia and Dictionary of Medicine, Nursing, and Allied Health, Seventh Edition Copyright 2003 by Saunders, an imprint of Elsevier, Inc. (Exhibit 1005, page 18)

B. “bending mechanism”

Patentee, via expert opinion, asserts in the above reference litigation, that the phrase “bending mechanism” if it is to be construed at all, should mean “assembly of parts designed or constructed to bend a finger.” (Exhibit 1006, page 30)

C. “removably attachable to the finger”

Patentee, via expert opinion, asserts in the above referenced litigation that the phrase, “removably attachable,” if it is to be construed at all, should mean “capable of being attached to the finger in a way that it can be removed”. (Exhibit 1006, page 31)

D. “first and second bending portions”

Patentee, via expert opinion, asserts in the above referenced litigation that the phrase, “first and second bending portions,” if it is to be construed at all, should mean “first and second portions or parts of the bending mechanism”. (Exhibit 1006, page 32)

E. “a force transmitting mechanism connected to and interposed between the first and second bending portions”

Patentee, via expert opinion, asserts in the above referenced litigation that the phrase, “a force transmitting mechanism connected to and interposed between the first and second bending portions,” if it is to be construed at all, should mean “a part or parts that is configured to transmit force to and compel the motion of the

first and second bending portions, and is located between the first and second bending portions.” (Exhibit 1006, page 34)

VIII. CLAIM CHART FOR ‘804 PATENT

CLAIM/ELEMENT	PRIOR ART
1. A finger orthosis for positioning a joint in a finger on a hand of a patient the finger orthosis comprising:	<ul style="list-style-type: none"> • U.S. Patent 5,683,351 (Col. 4, ll. 7-10) • JACE H440, Hand-CPM Softgoods/Splint Kit 1992 Operating Manual (product description)
a hand cuff positionable on the hand of the patient;	<ul style="list-style-type: none"> • U.S. Patent 5,683,351 (Col. 4, ll. 50-55 and Fig. 1) • JACE H440, Hand-CPM Softgoods/Splint Kit 1992 Operating Manual (Fig. 2)
and a bending mechanism removably attachable to the finger,	<ul style="list-style-type: none"> • U.S. Patent 5,683,351 (Col. 4, ll. 35-49 and Figs. 12-14 (100)) • JACE H440, Hand-CPM Softgoods/Splint Kit 1992 Operating Manual (Figs. 10, 11, 12, and 13)
and selectively attachable to the hand cuff,	<ul style="list-style-type: none"> • U.S. Patent 5,683,351 (Col. 4, ll. 35-49 and Figs. 7, 8, and 10 (100)) • JACE H440, Hand-CPM Softgoods/Splint Kit 1992 Operating Manual (Figs. 8 and 13)
and including first and second bending portions and	<ul style="list-style-type: none"> • U.S. Patent 5,683,351 (Col. 10, ll. 25-61, and Fig. 16 (104)(204)(214) and (224)) • JACE H440, Hand-CPM Softgoods/Splint Kit 1992 Operating Manual (Fig. 13)
and a force transmitting mechanism connected to and interposed between the first and second bending portions.	<ul style="list-style-type: none"> • U.S. Patent 5,683,351 (Figs. 16, 22(B), and Col. 15, ll. 55-67) • JACE H440, Hand-CPM Softgoods/Splint Kit 1992 Operating

IX. PRECISE REASONS FOR RELIEF

A. U.S. Patent No. 5,683,351 (Exhibit 1008) Anticipates Claim 1 of the ‘804 Patent.

U.S. Patent No. 5,683,351 (Exhibit 1008) discloses “therapeutic continuous passive motion device for rehabilitating a user’s hand.” (Exhibit 1008, Abstract). The ‘351 patent issued on September 27, 1994, more than one year before the earliest effective filing date of the ‘804 patent. However, Patentee for the ‘804 patent failed to provide this publically available reference to the USPTO. Thus, the ‘351 patent (Exhibit 1008) is previously undisclosed prior art to the ‘804 patent at least pursuant to 35 U.S.C. § 102 (a) and (b). Moreover, claim 1 of the ‘804 patent is invalid in view of the ‘351 patent (Exhibit 1008), which, as demonstrated below, anticipates every element of claim 1 of the ‘804 patent.

Claim 1 of the ‘804 Patent recites “a finger orthosis for positioning a joint in a finger on a hand of a patient, the finger orthosis comprising.” Using Patentee’s analysis of this Claim (Exhibit 1007), the ‘351 patent (Exhibit 1008) discloses this element of Claim 1 of the ‘804 patent at Col 4, Lines 7-10. (Exhibit 1010, ¶ 20)

Claim 1 of the ‘804 patent further recites “a hand cuff positionable on the hand of the patient.” Using Patentee’s analysis of this Claim (Exhibit 1007), the

‘351 patent (Exhibit 1008) discloses this element of Claim 1 of the ‘804 patent at Col. 4, Lines 50-55 and Fig. 1. (Exhibit 1010, ¶ 21)

Claim 1 of the ‘804 patent further recites “a bending mechanism removably attachable to the finger.” Using Patentee’s analysis of this Claim (Exhibit 1007), the ‘351 patent (Exhibit 1008) discloses this element of Claim 1 of the ‘804 patent at Col. 4, Lines 35-49; Figs. 12-14 (100). (Exhibit 1010, ¶ 22)

Claim 1 of the ‘804 patent further recites “[that the bending mechanism is] selectively attachable to the hand cuffs.” Using Patentee’s analysis of this Claim (Exhibit 1007), the ‘351 patent (Exhibit 1008) discloses this element of Claim 1 of the ‘804 patent at Col. 4, Lines 35-49 and Figs. 7,8 and 10(100). (Exhibit 1010, ¶ 23)

Claim 1 of the ‘804 patent further recites “[that the bending mechanism includes] first and second bending portions.” Using Patentee’s analysis of this Claim (Exhibit 1007), the ‘351 patent (Exhibit 1008) discloses this element of Claim 1 of the ‘804 patent at Col. 10, Lines 25-61, and Fig. 16 (104)(204)(214) and (224). (Exhibit 1011, ¶ 24)

Claim 1 of the ‘804 patent further recites “[a] force transmitting mechanism connected to and interposed between the first and second bending portions.” Using Patentee’s analysis of this Claim (Exhibit 1007), the ‘351 patent (Exhibit 1008)

discloses this element of Claim 1 of the '804 patent at Fig. 16 and Fig. 22(B) and Col. 15, lines 55-67. (Exhibit 1010, ¶ 25)

As shown in the attached Exhibit 1007, this anticipation analysis of Claim 1 of the '804 patent mirrors the analysis argued by Patentee to demonstrate that Petitioner's commercial product is covered by Claim 1 of the '804 patent. Based on the foregoing, a reasonable likelihood exists that Petitioner will prevail in its challenge of Claim 1 of the '804 patent. The USPTO should, thus, initiate IPR proceedings and find Claim 1 of the '804 patent invalid pursuant to 35 U.S.C. § 102(a) and/or (b).

B. JACE H440 (Exhibit 1009) Anticipates Claim 1 of the '804 Patent.

The JACE H440 product, as shown by the JACE H440 operating manual (Exhibit 1009), also discloses a hand orthosis. The device was on sale at least as early as 1992 - the date of publication of the operating manual - which is more than one year before the earliest effective filing date of the '804 patent. However, Patentee for the '804 patent failed to provide any information about this device to the USPTO. Thus, the JACE H440 and its operating manual are previously undisclosed prior art to the '804 patent at least pursuant to 35 U.S.C. § 102 (a) and (b). Moreover, Claim 1 of the '804 patent is invalid in view of the JACE H440 and its operating manual, which, as demonstrated below, anticipate every element of Claim 1 of the '804 patent.

Claim 1 of the '804 patent recites “[a] finger orthosis for positioning a joint in a finger on a hand of a patient, the finger orthosis.” Using Patentee’s analysis of this Claim (Exhibit 1007), the JACE H440 (Exhibit 1009) discloses this element of Claim 1 of the '804 patent in the “product description.” (Exhibit 1010, ¶ 28)

Claim 1 of the '804 patent further recites “a hand cuff positionable on the hand of the patient.” Using Patentee’s analysis of this Claim (Exhibit 1007), the JACE H440 (Exhibit 1009) discloses this element of Claim 1 of the '804 patent at Figure 2. (Exhibit 1010, ¶ 29)

Claim 1 of the '804 patent further recites “a bending mechanism removably attachable to the finger.” Using Patentee’s analysis of this Claim (Exhibit 1007), the JACE H440 (Exhibit 1009) discloses this element of Claim 1 of the '804 patent at Figures 10, 11, 12, and 13. (Exhibit 1010, ¶ 30)

Claim 1 of the '804 patent further recites “[that the bending mechanism is] selectively attachable to the hand cuff.” Using Patentee’s analysis of this Claim (Exhibit 1007), the JACE H440 (Exhibit 1009) discloses this element of Claim 1 of the '804 patent at Figures 8 and 13. (Exhibit 1010, ¶ 31)

Claim 1 of the '804 patent further recites “[that the bending mechanism includes] first and second bending portions.” Using Patentee’s analysis of this

Claim (Exhibit 1007), the JACE H440 (Exhibit 1009) discloses this element of Claim 1 of the ‘804 patent at Figure 13. (Exhibit 1010, ¶ 32)

Claim 1 of the ‘804 patent further recites “[a] force transmitting mechanism connected to and interposed between the first and second bending portions.” Using Patentee’s analysis of this Claim (Exhibit 1007), the JACE H440 (Exhibit 1009) discloses this element of Claim 1 of the ‘804 patent at Figures 11 and 13. (Exhibit 1010, ¶ 33)

As shown in the attached Exhibit 1007, this anticipation analysis of Claim 1 of the ‘804 patent mirrors the analysis argued by patentee to demonstrate that one of Petitioner’s commercial products is covered by Claim 1 of the ‘804 patent. Based on the foregoing, a reasonable likelihood exists that Petitioner will prevail in its challenge of Claim 1 of the ‘804 patent. The USPTO should, thus, initiate IPR proceedings and find Claim 1 of the ‘804 patent invalid pursuant to 35 U.S.C. § 102(a) and/or (b).

X. CONCLUSION

Because a reasonable likelihood exists that Petitioner will prevail in its challenge of Claim 1 of the “804 patent in light of the above-referenced prior art, the USPTO should initiate IPR proceedings and find Claim 1 of the “804 patent invalid pursuant to 35 U.S.C. § 102(a) and/or (b).

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CERTIFICATE OF SERVICE

I hereby certify that on this 2nd day of April, 2015 a true and complete copy of the above and foregoing was served via certified mail/return receipt requested:

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