

UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE PATENT TRIAL AND APPEAL BOARD

INDUCTEV, INC.
Petitioner,

v.

WITRICITY CORPORATION,
Patent Owner.

Case IPR2024-00105
Patent 10,027,184

PATENT OWNER'S PRELIMINARY RESPONSE TO PETITION

TABLE OF CONTENTS

I. INTRODUCTION.....	1
A. Overview – The Petition Should Be Denied Under Section 325(d).....	1
B. The '184 Patent.....	2
C. Relevant Prosecution History	3
D. Claim Construction	5
II. THE <i>ADVANCED BIONICS</i> TWO-PART ANALYSIS FRAMEWORK.....	6
III. <i>ADVANCED BIONICS</i> PART ONE: THE SAME OR SUBSTANTIALLY THE SAME PRIOR ART WAS PREVIOUSLY PRESENTED TO THE USPTO	7
A. Petitioner’s Grounds 1 and: Fells and Cook were previously considered by the Office.....	7
B. Petitioner’s Ground 3	7
C. Petitioner’s Ground 4	10
IV. <i>ADVANCED BIONICS</i> PART TWO: PETITIONER FAILED TO ASSERT OR SHOW A MATERIAL ERROR MADE BY THE EXAMINER.....	12
V. CONCLUSION.....	15

TABLE OF AUTHORITIES

CASES

<i>Advanced Bionics, LLC v. Med-El Elektromedizinische Gerate GmbH,</i> IPR2019-01469 (PTAB Feb. 13, 2020).....	1-2, 5-9, 11-12, 14-15
<i>Duodecad IT Services Luxembourg S.À.R.L., et al. v. WAG Acquisition, LLC,</i> IPR2015-01036 (PTAB Oct. 20, 2016).....	14
<i>Eyenovia, Inc. v. Sydnexis,</i> IPR2022-00963 (PTAB Nov. 8, 2022).....	13
<i>Google LLC v. Valtrus Innovations Ltd.,</i> IPR2022-01197 (PTAB Jan. 3, 2023)	13
<i>In re Lee,</i> 277 F.3d 1338, 1345 (Fed. Cir. 2002)	14
<i>Ivantis, Inc. v. Sight Sciences, Inc.,</i> IPR2022-01533 (PTAB Mar. 27, 2023).....	14
<i>Microsoft Corp. v. ThroughPuter, Inc.,</i> IPR2022-00757 (PTAB Nov. 1, 2022).....	12
<i>St. Clair Intellectual Prop. Consultants, Inc. v. Canon Inc.,</i> 412 Fed. Appx. 270, 276 (Fed. Cir. 2011)	14
<i>Standard Oil v. American Cyanamid,</i> 774 F.2d 448, 454 (Fed. Cir. 1985)	14

STATUTES

35 U.S.C. § 325(d)	1, 5-7, 13-15
--------------------------	---------------

EXHIBIT LIST

Ex. 2001 - U.S. Patent No. 9,442,172

Ex. 2002 - File History of U.S. Patent No. 9,442,172

Ex. 2003 - U.S. Patent Application Publication No. 2008/0211320 (“Cook-320”)

I. INTRODUCTION

A. Overview – The Petition Should Be Denied Under § 325(d)

This is a prototypical example of IPR that 35 U.S.C. § 325(d) and *Advanced Bionics, LLC v. Med-El Elektromedizinische Gerate GmbH*, IPR2019-01469, Paper No. 6 at 7 (PTAB Feb. 13, 2020) (precedential) (“*Advanced Bionics*”) were intended to prevent. Here, Petitioner does not assert that any one reference anticipates even one claim of WiTricity’s U.S. Patent No. 10,027,184 (the “’184 Patent”) (Ex. 1001). Instead, Petitioner only asserts grounds based on alleged obviousness. For each of its four grounds, the Petition relies on its primary reference (Fells (Ex. 1005)), which was considered in *both* the prosecution of the patent at issue (WiTricity’s ’184 Patent) *and* its parent (U.S. Pat. No. 9,442,172) (“the ’172 Patent”) (Ex. 2001). Moreover, in two of its four grounds, the Petition relies on Fells *alone*.¹

In the other two grounds (2 and 4), the Petition again relies on Fells but in view of Cook (Ex. 1006), which – like Fells – also was considered in by the Office in *both* the ’184 Patent and its parent.² Thus, each of Petitioner’s grounds relies on

¹ See Petition grounds 1 and 3. In ground 3, Petitioner argues that Claim 12 would have been obvious in view of Fells alone because Petitioner asserts that Fells discloses an “enclosure.” Pet. at 61-62. As will be explained in further detail, Petitioner also argues that Ono, like Fells, discloses an enclosure housing element claimed in Claim 12 of the ’184 Patent. Pet. at 63.

² Like the argument in Ground 2, in Ground 4 Petitioner argues that Claim 13 of the ’184 Patent would have been obvious over Fells in view of Cook. As will be explained in more detail, Petitioner also asserts that, although Cook and Wang

art that was considered by the Office twice, or features that Petitioner argues are the same as features in the art previously considered twice by the Office. Accordingly, it would be a waste of the Board's time and unfairly burden the Patent Owner ("PO") to revisit the same or substantially the same art and disclosures previously considered during prosecution. *Advanced Bionics*, at 8-9.

B. The '184 Patent

On July 17, 2018, the '184 Patent, titled "Foreign Object Detection In Wireless Energy Transfer Systems," was duly and lawfully issued by the United States Patent and Trademark Office. WiTricity owns the '184 Patent by assignment. The '184 Patent discloses and claims a wireless energy transfer system for charging, for example, electric vehicles. The energy transfer system detects whether a foreign object has moved onto or over the source resonator by positioning a magnetic sensor within the magnetic field of the wireless energy transfer system. Claim 1 '184 Patent is reproduced below:

1 . A wireless energy transfer system with foreign object debris detection, the system comprising:
a wireless energy transfer source comprising a source resonator configured to generate an oscillating magnetic field; and
a foreign object debris detection system comprising:
at least one magnetic field sensor; and

(Ex. 1008) do not disclose the power provided in their systems, in view of Cook or Wang, a POSA would have been motivated to design the Fells' system to provide power in excess of the 3.3 kW claimed in Claim 13. Pet. at 66-70.

at least one readout circuit configured to measure one or more electrical parameters of the at least one magnetic field sensor;

wherein the at least one magnetic field sensor is positioned within the magnetic field of the wireless energy transfer system; and

wherein the foreign object debris detection system is configured to verify that foreign object debris has not moved onto or over the source resonator during generation of the oscillating magnetic field.

C. Relevant Prosecution History

The '184 Patent issued on July 17, 2018, from an application filed on June 1, 2016, and claiming priority from U.S. Patent Application No. 13/608,956, now the '172 Patent (Ex. 2001), which claims priority to a provisional patent application filed on September 9, 2011.

During prosecution of the '184 Patent, the Examiner explicitly considered the patents that issued from the Fells pre-grant publication and specifically considered Cook, both now relied on by Petitioner. Both the Fells and Cook references were listed on the same IDS, and initialed by the Office as considered on Dec. 20, 2017. (Ex. 1002 at 62 and 71). Fells and Cook were also considered during prosecution of the '172 Patent, which as noted is the parent of the '184 Patent. During prosecution of the '172 Patent, while listed on separate Information Disclosure Statements, both Fells and Cook were initialed by the Office as considered on July 16, 2015. Ex. 2002 at 315. Likewise, U.S. Patent Application Publication No. 2008/0211320 to Cook ("Cook-320") (Ex. 2003), which is the pre-grant publication of U.S. Patent No.

9,774,086 to Cook (“Cook-086”) (Ex. 1012), also was explicitly considered by the Examiner during prosecution of both the ’184 patent and its parent, the ’172 Patent. Specifically, the Office initialed that it considered Cook-086 on December 20, 2017, and July 16, 2015, for the ’184 Patent and ’172 Patent, respectively. Ex. 1002 at 142; Ex. 2002 at 315.

During prosecution of the ’184 Patent, the Office issued a first Office Action on Jan. 2, 2018, rejecting a number of claims as being anticipated by the prior art. The Office found what is now Claim 1 patentable over the prior art of record (including Fells, Cook, and Cook-320). Office Action at pp. 4-5 (Ex. 1002 at 149-150). The Patentee amended a number of the claims (including Claim 16) in response. The USPTO then issued a Notice of Allowance on March 15, 2018. Relative to Claim 1, the Examiner found that “none of the prior art of record discloses or suggests a foreign object debris detection system comprising: at least one magnetic field sensor; and at least one readout circuit configured to measure one or more electrical parameters of the at least one magnetic field sensor, wherein the at least one magnetic field sensor is positioned within the magnetic field of the wireless energy transfer system, in combination with the remaining claimed features.” Notice of Allowance at p. 2 (Ex. 1002 at 247). And relative to Claim 16, the Examiner found that “none of the prior art of record discloses or suggests performing a health and/or status check of the wireless energy transfer source; and

verifying that no foreign object debris has moved onto or over the source resonator, prior to positioning the vehicle over the source resonator, in combination with the remaining claimed features.” *Id.*

D. Claim Construction

In this Preliminary Response, WiTricity argues that the Board should in its discretion decline to institute under §325(d) and the *Advanced Bionics* two-part framework. Hence, the Board need not formally construe any claim terms of the ’184 Patent to decline institution. Rather, the Board need only conclude that – as WiTricity shows below – the prior art relied upon by Petitioner is the same or substantially the same as art previously considered by the Office and Petitioner has not shown a material error by the Office.

Nothing in this Patent Owner’s Preliminary Response should be construed to mean that Patent Owner agrees with Petitioner regarding what a particular prior art reference discloses or that certain features of the prior art meet any element of any claim in the ’184 Patent. Rather, Patent Owner argues in this Preliminary Response only that the references and particular features in certain references are the same or substantially the same as the art previously considered by the Office. While the Petitioner asserts that the prior art relied upon in the Petition discloses the subject

matter of the challenged claims of the '184 Patent (Petition at 6), Patent Owner specifically denies such assertion.³

II. *ADVANCED BIONICS* TWO-PART ANALYSIS FRAMEWORK

The Board has discretion to determine whether to institute *inter partes* review, and 35 U.S.C. § 325(d) provides that the Director may elect not to institute a proceeding if the challenge to the patent is based on matters previously presented to the Office. *Advanced Bionics*, at 7.

In an analysis under § 325(d), *Advanced Bionics* set forth a two-part framework: (1) determining whether the same or substantially the same art previously was presented to the Office or whether the same or substantially the same arguments previously were presented to the Office; and (2) if either condition of the first part of the framework is satisfied, determining whether the petitioner has demonstrated that the Office erred in a manner material to the patentability of challenged claims. *Id.* at 8. The purpose of the *Advanced Bionics* two-part framework reflects a commitment by the Board to defer to previous Office evaluations of the evidence of record unless the Petitioner can show that the Office made a material error.

³ WiTricity reserves all of its rights in this or other proceedings to argue, among other things, claim constructions for the terms in the claims of the '184 Patent and what the art relied on by Petitioner discloses or does not disclose.

III. *ADVANCED BIONICS* PART ONE: THE SAME OR SUBSTANTIALLY THE SAME PRIOR ART WAS PREVIOUSLY PRESENTED TO THE USPTO.

A. Petitioner's Grounds 1 and 2 – Fells and Cook were previously considered by the Office.

As an initial matter, Petitioner's arguments regarding Section 325(d) and the two-part *Advanced Bionics* analysis appear to be an afterthought as it presents its entire argument in only four sentences. Petitioner apparently admits that *Advanced Bionics* Part One is met with respect to its grounds 1 and 2 because it only argues that Part One is not met regarding grounds 3 and 4. Of course, Petitioner must concede that in grounds 1 and 2, the only references Petitioner relies upon (Fells (grounds 1 and 2) and Cook (ground 2)) were both considered by the Office during the prosecution of the '184 Patent *and* its parent. So for grounds 1 and 2, the same art was previously considered by the Office.

B. Petitioner's Ground 3.

Regarding grounds 3 and 4, in one conclusory sentence without any analysis whatsoever, Petitioner simply states that because the Ono and Wang references were not presented to the Office during prosecution of the '184 Patent, *Advanced Bionics* Part One is not met. As will be explained in more detail below, Petitioner relies on Ono (ground 3) and then Wang (ground 4), both separately in combination with Fells. And for both Ono and Wang, Petitioner relies on them for allegedly disclosing a single feature. But that single feature relied upon in each of

Ono and Wang is – by Petitioner’s own arguments – either identical to or substantially the same as the art previously considered by the Office.

In ground 3, Petitioner first asserts that Claim 12⁴ of the ’184 Patent would have been obvious over Fells *alone*. Pet. at 60-61. Claim 12 depends from Claim 1 and adds that the system of claim further comprises an enclosure housing at least a portion of the wireless energy transfer source, wherein the foreign object debris detection system is integrated into the enclosure. Petitioner specifically asserts that Fells alone teaches a resonant tank circuit, its control unit, and “sense circuit/proximity detector” are integrated *into the enclosure* of the wireless power supply. Thus, Petitioner argues that because Fells allegedly discloses housing the detector in an enclosure, Claim 12 of the ’184 Patent is obvious in view of Fells alone. Pet. 61-62. But as noted above, Fells was already before the Office during prosecution of both the ’184 Patent *and* its parent. So *Advanced Bionics* Part One is met regarding Petitioner’s assertion in ground 3 that Fells alone makes Claim 12 obvious.

⁴ Claim 12 of the ’184 Patent is dependent on Claim 1 and reads as follows:

12. The system of claim 1, further comprising an enclosure housing at least a portion of the wireless energy transfer system, wherein the foreign object debris detection system is integrated into the enclosure.
’184 Patent, Claim 12.

Petitioner's second argument in ground 3 is that Fells in view of Ono makes Claim 12 obvious. In this argument, Petitioner asserts that just like Fells, Ono also allegedly discloses a detector coil in an "enclosure." Pet. at 60-61 (and citing Ono, Fig. 2, 4:3-47). But as just explained immediately above, Petitioner already argued that Fells alone discloses the feature of the detector in an enclosure required by Claim 12. And of course Fells was previously considered by the Examiner during prosecution of the '184 Patent and its parent.

So for the relevant feature in Ono relied upon by Petitioner, and by Petitioner's own argument, the Ono disclosure is substantially the same as the art considered by the Office – here, Fells.

Petitioner's combination of Fells and Ono satisfies *Advanced Bionics* Part One for another reason. As noted above, Petitioner relies on Ono for teaching an enclosure into which the foreign object debris detection system is integrated. The Petitioner also cites Cook-086 (Ex. 1012) for disclosing an enclosure, and in particular that a "shield ... disposed around the antenna' would 'mitigat[e]' interference caused by 'close-by objects or humans' due to their 'stray capacitance.'" *Id.* (citing Cook-086, 16:59-62).

By its argument, Petitioner effectively concedes that Cook-086 is substantially the same as Ono for the feature(s) relied on in ground 3. The pre-grant publication that corresponds to Cook-086, namely U.S. Patent Application

Publication No. 2008/0211320 to Cook (Cook-320) (Ex. 2003), was explicitly considered by the Examiner during prosecution of the '184 Patent. Accordingly, the single feature in Ono that Petitioner relies on is substantially the same as the art considered by the Office – here Cook-320.

C. Petitioner's Ground 4.

Like its argument in Ground 2, in Ground 4 Petitioner asserts that the claim at issue (Claim 13⁵) would have been obvious over Fells in view of Cook. Claim 13 depends from Claim 1 and requires that the system of Claim 1 also is configured to deliver power of more than 3.3 kW.⁶ Petitioner argues that although Cook does *not* disclose the degree of power provided in its system, a POSA would have been motivated to design the Fells' system to provide power in excess of the 3.3 kW recited in Claim 13 in view of Cook's teachings. Pet. at 66. But as explained above regarding ground 2, Petitioner admits (as it must) that both Fells and Cook were previously considered by the Office; therefore, Part One is satisfied regarding the combination of Fells and Cook.

⁵ Claim 13 depends directly from Claim 1 and reads as follows:

13. The system of claim 1, wherein the wireless energy transfer source is configured to deliver power of more than 3.3 kW to a wireless power receiving device.

'184 Patent, Claim 13.

⁶ *Id.*

Petitioner also asserts that Claim 13 would have been obvious over Fells in view of Wang. Here, exactly like its argument regarding Cook and Claim 13's requirement to provide power in excess of 3.3 kW, Petitioner argues that although Wang – like Cook – does *not* disclose the degree of power provided in its system, a POSA would have been motivated to design the Fells' system to provide power in excess of the 3.3 kW recited in Claim 13 in view of Wang's teachings. But by Petitioner's own argument, Petitioner relies on Wang for the same teachings (delivering power in excess of 3.3 kW) as Petitioner argued were taught and disclosed by Cook. Because Cook was previously considered by the Office in both the '184 Patent and its parent, and Petitioner is relying on Cook and Wang *for the same feature*, it follows that Wang is substantially the same as the art (Cook) that was previously considered by the Office (and in this case, Cook was considered *twice* by the Office). It follows that Petitioner's combination of Fells and Wang, like Petitioner's combination of Fells and Cook, were the same as or substantially the same as art previously considered by the Office. Accordingly, *Advanced Bionics* Part One is satisfied for Petitioner's combination of Fells and Wang in ground 4.

IV. *ADVANCED BIONICS* PART TWO: PETITIONER FAILED TO ASSERT OR SHOW A MATERIAL ERROR MADE BY THE EXAMINER.

Regarding *Advanced Bionics* Part Two analysis, Petitioner presented its entire analysis and argument in only three conclusory sentences. Of course, Petitioner's arguments are summary conclusions with little, if any, analysis. Therefore, those arguments should accordingly be given little to no weight.

Further, Petitioner failed to argue that the Patent Office made a material error with respect to Fells and Cook and the other cumulative art before it. Pet. at 70-71. For this reason alone, the Board should "exercise discretion not to institute inter partes review." *Advanced Bionics*, Paper 6 at 8.

Instead of asserting material error, Petitioner simply asserts that the Office did not specifically discuss Fells and Cook. Pet. at 71. The Board has ruled consistently that mere silence regarding references presented to and considered during prosecution does not show material error by the Examiner. *Microsoft Corp. v. ThroughPuter, Inc.*, IPR2022-00757, Paper 10 at 21 (PTAB Nov. 1, 2022) (denying institution and rejecting petitioner's argument that the Office did not take substantive action showing consideration of cited art because "the lack of a rejection itself is not dispositive of whether there was material error.").

Also, Petitioner fails to make specific allegations that the Examiner overlooked relevant teachings in either Fells or Cook. Even if one assumes (albeit

incorrectly) that Fells and Cook individually disclose elements of the claims, this alone does not demonstrate material error. During prosecution, the Examiner allowed Claim 1 because none of the prior art of record discloses or suggests the claimed features *in combination*. The Examiner therefore did not find Claim 1 patentable because the Examiner overlooked Fells or Cook disclosing any one or more features now relied on in the Petition. Instead, the Examiner found the claims nonobvious over the prior art (including Fells and Cook) in any proper combination.

The Petitioner presents Fells and Cook on obviousness grounds, but the Petitioner provides no assertion that the Office made a material error when it found the claims of the '184 Patent nonobvious over Fells and Cook and the other prior art of record and the knowledge of a POSA. *Google LLC v. Valtrus Innovations Ltd.*, IPR2022-01197, Paper 9 at 23 (PTAB Jan. 3, 2023) (exercising §325(d) discretion to deny petition where petitioner made a “mere two-sentence assertion regarding § 325(d)” and failed to discuss with specificity how the examiner erred with respect to reference); *Eyenovia, Inc. v. Sydnexis*, IPR2022-00963, Paper 7 at 19 (PTAB Nov. 8, 2022) (exercising §325(d) discretion to deny petition where petitioner failed to show material error as no rejection was issued over IPR

references while each was before examiner or cumulative).⁷ Accordingly, the Petitioner has not met its burden under *Advanced Bionics* Part Two.

Petitioner also asserts that even though Fells and Cook were previously considered by the Examiner, Petitioner submitted a declaration from an alleged person of skill in the art (“POSA”) on the motivation to combine those two references. But the Examiner is considered a POSA while evaluating references during prosecution. *Duodecad IT Services Luxembourg S.À.R.L., et al. v. WAG Acquisition, LLC*, IPR2015-01036, Paper 17 at 17 (PTAB Oct. 20, 2016).⁸ And as a POSA, the Examiner is presumed to be aware of all pertinent prior art references. *Standard Oil v. American Cyanamid*, 774 F.2d 448, 454 (Fed. Cir. 1985). It follows that the Petitioner’s declaration regarding the knowledge of a POSA does not add anything to what the Examiner presumptively knew as a POSA when considering Fells, Cook, and the other references in the record during prosecution. Moreover, if simply adding a declaration from a POSA regarding a combination of references that were previously considered by the Office is enough to meet

⁷ See also *Ivantis, Inc. v. Sight Sciences, Inc.*, IPR2022-01533, Paper 14, at 19 (PTAB Mar. 27, 2023) (exercising §325(d) discretion to deny petition where petitioner argued the references in the record were not discussed by the Examiner).

⁸ Citing *St. Clair Intellectual Prop. Consultants, Inc. v. Canon Inc.*, 412 Fed. Appx. 270, 276 (Fed. Cir. 2011) and *In re Lee*, 277 F.3d 1338, 1345 (Fed. Cir. 2002).

Advanced Bionics Part Two, then nearly every Petition will meet *Advanced Bionics* Part Two and there would not be discretionary denials under §325(d).

Furthermore, “[i]f reasonable minds can disagree regarding the purported treatment of the art or arguments, it cannot be said that the Office erred in a manner material to patentability.” *Advanced Bionics*, at 8-9. Accordingly, even ignoring the Petitioner’s complete failure to allege a material error, the arguments and rationale explained in the file history of the ’184 Patent and evidence provided herein establish that, at the very least, reasonable minds can disagree regarding the Patent Office’s treatment of the cited art, including Fells and Cook. Therefore, “it cannot be said that the Office erred in a manner material to patentability,” and the Board should deny institution under § 325(d).

V. CONCLUSION

For the reasons explained above, both parts of the *Advanced Bionics* analysis confirm that the Board should exercise its discretion under § 325(d) to deny institution.

Dated: February 27, 2024

Respectfully submitted,

/Lance A. Lawson/

Lance A. Lawson, P.E., Reg. No. 44,862
Burr & Forman LLP

CERTIFICATION UNDER 37 CFR § 42.24

Under the provisions of 37 CFR § 42.24(d), the undersigned hereby certifies that the word count for the foregoing *Patent Owner's Preliminary Response to Petition* totals 3,507, which is less than the 14,000 allowed under 37 CFR § 42.24(b)(1).

Dated: February 27, 2024

/Lance A. Lawson/
Lance A. Lawson, P.E., Reg. No. 44,862
Burr & Forman LLP
101 S. Tryon St., Ste 2610
Charlotte, NC 28280
(704) 347-6475
llawson@burr.com

CERTIFICATE OF SERVICE

It is certified that a copy of the *Patent Owner's Preliminary Response to Petition* has been served on Petitioner as provided in 37 C.F.R. § 42.6(e) via electronic mail transmission addressed to the persons at the address of record as follows:

David A. Zucker david.zucker@lw.com
Jonathan M. Strang jonathan.strang@lw.com
Charles H. Sanders charles.sanders@lw.com
Blake R. Davis blake.davis@lw.com
Jeffrey G. Homrig jeff.homrig@lw.com
Razi Safi razi.safi@lw.com

Dated: February 27, 2024

/Lance A. Lawson/
Lance A. Lawson, P.E.
Burr & Forman LLP
101 S. Tryon St., Ste 2610
Charlotte, NC 28280
(704) 347-6475