United States Court of Appeals for the Federal Circuit

HUSKY INJECTION MOLDING SYSTEMS LTD., Appellant

v.

ATHENA AUTOMATION LTD., Cross-Appellant

2015-1726, 2015-1727

Appeals from the United States Patent and Trademark Office, Patent Trial and Appeal Board in No. IPR2013-00290.

Decided: September 23, 2016

MATTHEW L. CUTLER, Harness, Dickey & Pierce, PLC, St. Louis, MO, argued for appellant.

MARSHALL JOHN SCHMITT, Michael Best & Friedrich, LLP, Chicago, IL, argued for cross-appellant. Also represented by GILBERTO EDUARDO ESPINOZA, MARTIN L. STERN.

JOSEPH MATAL, Office of the Solicitor, United States Patent and Trademark Office, Alexandria, VA, argued for intervenor Michelle K. Lee. Also represented by NATHAN K. KELLEY, SCOTT WEIDENFELLER. Before LOURIE, PLAGER, and STOLL, Circuit Judges.

Opinion for the court filed by *Circuit Judge* LOURIE.

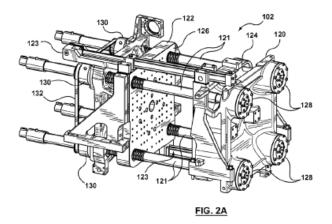
Opinion concurring in part and dissenting in part filed by *Circuit Judge* PLAGER.

LOURIE, Circuit Judge.

Husky Injection Molding Systems Ltd. ("Husky") appeals from the U.S. Patent and Trademark Office Patent Trial and Appeal Board's ("the Board") inter partes review decision finding claims 1, 4-16, 18, and 20-22 of U.S. Patent 7,670,536 ("the '536 patent") anticipated. Athena Automation Ltd. v. Husky Injection Molding Sys. Ltd., No. 2013-00290, 2014 WL 5454543, at *23 (P.T.A.B. Oct. 23, 2014) ("Final Written Decision"). Athena Automation Ltd. ("Athena") cross-appeals from the Board's decision finding claims 2, 3, 17, and 19 of the '536 patent not anticipated. Athena Automation Ltd. v. Husky Injection Molding Sys. Ltd., No. 2013-00290 (P.T.A.B. Feb. 23, 2015) (decision on rehearing); see Joint App. ("J.A.") 56–65. For the reasons that follow, we dismiss Husky's appeal for lack of jurisdiction; we vacate the Board's decision on incorporation by reference and its finding of no anticipation with respect to claims 2, 3, 17, and 19; and we remand for further consideration of those latter claims.

BACKGROUND

The '536 patent discloses a molding machine having a clamp assembly comprising, *inter alia*, a stationary platen 120, a movable platen 122, tie bars 121, tie bar locks 130 that couple the tie bars to the movable platen, and clamp actuators 128 that supply a clamping force to the tie bars. '536 patent col. 8 l. 58-col. 9 l. 46. Figure 2a, reproduced below, depicts the clamp assembly.



Id. fig.2a. When the two platens, each attached to a mold support structure, 124, 126, are brought together, a mold cavity is created "in which a molded article may be molded . . . once the extruder 104 injects, under pressure, the injectable molding material into the mold cavity." *Id.* col. 9 ll. 6–10; *id.* col. 9 ll. 20–24.

The claims of the '536 patent specifically recite a lock and a method for using that lock to couple the tie bars 121 to the movable platen $122.^{1}$ *Id.* col. 9 ll. 29–31. The lock

¹ Claim 1 represents the product claims, '536 patent col. 16 ll. 12–27, and claim 18 represents the method claims, *id.* col. 18 ll. 6–17. Both are reproduced below.

- 1. A lock of a molding system having a rod and a platen, the lock comprising:
 - a lock member associated with the rod that is movable between a clamped position and a released position by a clamp assembly; and
 - a complementary lock member associated with the platen; the lock member and the

has two interlocking components, one associated with the tie bar (lock member 510) and one with the platen (complementary lock member 512). *Id.* col. 11 ll. 55–58; *id.* col.

complementary lock member cooperatively operable to move between a lockable condition and an unlockable condition; wherein

the complementary lock member is engagable with the lock member within a relatively lower flex zone of the platen;

the relatively lower flex zone of the platen being a

portion of the platen adjacent to the rod and having a flex that is lower relative to a relatively higher flex zone of the platen also adjacent to the rod.

18. A method of actuating a lock of a molding system having a rod that is movable between a clamped position and a released position by a clamp assembly and a platen, the method comprising:

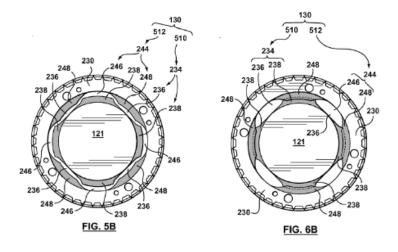
engaging a lock member associated with the rod with a complementary lock member associated with the platen at a position located proximate to a relatively lower flex zone of the platen;

the relatively lower flex zone of the platen being a

portion of the platen adjacent to the rod and having a flex that is lower relative to a relatively higher flex zone of the platen also adjacent to the rod.

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11 l. 67-col. 12 l. 3. The complementary lock member 512 comprises a sleeve 230 rotatably mounted to a bore (hole) in the corner of the movable platen, which receives tie rod 121 and its lock member 510. *Id.* col. 12 ll. 6–21. The two lock members engage, and the teeth of each lock member align, when sleeve 230 is rotated. *Id.* As shown below, Figure 5b reflects the unlockable condition, and Figure 6b reflects the lockable condition.



Id. fig.5b, fig.6b. Once the two lock members engage, the clamp on the stationary platen applies a clamping force, locking the two platens together and assembling the mold. *Id.* col. 13 ll. 12–21.

Husky's former owner and president ("Schad") is also a co-inventor of the '536 patent. In 2007, Schad assigned the '536 patent to Husky. Shortly thereafter, Schad sold Husky to a private equity group, and left to form Athena. In 2012, Athena filed a petition for *inter partes* review at the Board, challenging the patentability of all 22 claims in the '536 patent. Athena asserted, *inter alia*, that various claims of the '536 patent were anticipated either by U.S. Patent Application 2004/0208950 ("Glaesener") in combination with its incorporation by reference of U.S. Patent 5,753,153 ("Choi") (together, "Glaesener/Choi"), or by U.S. Patent 5,417,913 ("Arend").

Husky filed a preliminary response, arguing only that assignor estoppel barred Athena from filing a petition for review. The Board rejected that argument and instituted review. Athena Automation Ltd. v. Husky Injection Molding Sys. Ltd., No. 2013-00290, 2013 WL 8595976, at *2, *7 (P.T.A.B. Oct. 25, 2013) ("Institution Decision"). It first reasoned that the equitable doctrine, "a defense to certain claims of patent infringement," id. at *7 (quoting Semiconductor Energy Lab. Co. v. Nagata, 706 F.3d 1365, 1369 (Fed. Cir. 2013)), does not provide for an exception to the otherwise broad statutory mandate that "a person who is not the owner of a patent may file with the Office a petition to institute an inter partes review of the patent," 35 U.S.C. § 311. The Board further found a comparison to 17 U.S.C. § 1337(c) instructive, in that Congress provided for "all legal and equitable defenses" in an ITC investigation, but not in *inter partes* review. Institution Decision at *7.

In 2014, the Board issued its final written decision. It found that claims 1, 4–16, 18, and 20–22 were anticipated by Arend, *Final Written Decision* at *23, and that claims 2, 3, 17, and 19 were *not* anticipated by Glaesener/Choi, *id.* at *16–17. With respect to the latter, the Board declined to address whether two paragraphs in Glaesener incorporate Choi by reference,² instead finding that even

² The first relevant paragraph in Glaesener recites: "The tie-bar nuts can be secured to the rear wall 16 by any appropriate mechanism, such as the *pineapple and toothed-ring mechanism* described in [Choi]." Glaesener ¶ 0035 (emphasis added). The second paragraph recites: "All cross-referenced patents and application[s] referred

assuming sufficient incorporation, the reference combination still fails to teach the recited limitations "in the same form and order as listed in the claims." Id. at *16. Notably, the Board found that Athena failed to explain what Glaesener incorporates from Choi, much less how Choi's clamping device would secure the components of Glaesener's molding machine. Id. at *17.

Athena requested rehearing of the final decision, and the Board granted the request in part. J.A. 64. In doing so, the Board expressly addressed incorporation by reference, and found that Athena failed to show that Glaesener incorporates any portion of Choi for purposes of anticipation. Specifically, it reasoned that Athena submitted no evidence or explanation supporting what a skilled artisan would understand the "pineapple and toothed-ring mechanism" in Choi to be, J.A. 60, nor were Choi and Glaesener clear as to what was meant to be incorporated, J.A. 62. For that reason only, the Board reaffirmed its finding that Athena failed to prove anticipation of claims 2, 3, 17, and 19. J.A. 63–64.

Husky timely appealed from the Board's decision with respect to claims 1, 4–16, 18, and 20–22; Athena timely cross-appealed from the Board's decision with respect to claims 2, 3, 17, and 19. We have jurisdiction to review the Board's final decision under 28 U.S.C. § 1295(a)(4)(A).

DISCUSSION

I. HUSKY'S APPEAL

Husky's appeal focuses exclusively on whether assignor estoppel may bar a party from filing a petition for *inter partes* review at the Patent and Trademark Office. Husky contends that Athena is in privity with Schad, the assign-

to in this specification are hereby incorporated by reference." Id. \P 0049.

or of the '536 patent, and, as such, is estopped from challenging the claims of the '536 patent. Accordingly, Husky continues, the Board acted outside of its statutory authority when it instituted review and found claims 1, 4–16, 18, and 20–22 unpatentable as anticipated. As Husky only argues that Athena is estopped from seeking *inter partes* review, and not that the claims are not anticipated on the merits, we consider only the estoppel question. For the reasons that follow, we dismiss Husky's appeal for lack of jurisdiction.

А

We begin with necessary context. In 2011, Congress created the *inter partes* review process, *inter alia*, as a means for the Patent and Trademark Office to efficiently review issued patents. Sections 311 through 319 carefully describe the requirements of and mechanism for review. See 35 U.S.C. §§ 311–319. Of particular importance is § 314(d), which provides that "the determination by the Director whether to institute inter partes review under this section shall be final and nonappealable." Id. § 314(d) (emphasis added). Since § 314(d)'s inception, we have had several opportunities to address whether and to what extent it limits our ability to review the institution decision. E.g., Achates Reference Publ'g, Inc. v. Apple Inc., 803 F.3d 652, 657–58 (Fed. Cir. 2015); In re Cuozzo Speed Techs., LLC, 793 F.3d 1268, 1273 (Fed. Cir. 2015), aff'd, Cuozzo Speed Techs., LLC v. Lee, 136 S. Ct. 2131 (2016); In re Procter & Gamble Co., 749 F.3d 1376, 1378 (Fed. Cir. 2014); In re Dominion Dealer Sols., LLC, 749 F.3d 1379, 1381 (Fed. Cir. 2014); St. Jude Med., Cardiology Div., Inc. v. Volcano Corp., 749 F.3d 1373, 1375 (Fed. Cir. 2014).

We first held in *St. Jude* that § 314(d) bars interlocutory review of a decision to deny *inter partes* review. 749 F.3d at 1375. In doing so, we characterized § 314(d) as a "broadly worded bar on appeal," and reasoned that such a

result comports with 35 U.S.C. §§ 141(c) and 319, which only authorize appeals from a final written decision. *Id.* at 1375–76; *see* 35 U.S.C. § 141(c) ("A party to an inter partes review . . . who is dissatisfied with the final written decision of the [Board] may appeal the Board's decision"); *id.* § 319 ("A party dissatisfied with the final written decision of the [Board] may appeal the decision . . .").

We then held in *Cuozzo* that § 314(d) precludes review of the Director's earlier decision to institute, even after a final written decision. In Cuozzo, the Director instituted an *inter partes* review of certain claims, relying on several references not cited in the petition with respect to those claims. See 793 F.3d at 1272 ("Although Garmin's petition with respect to claim 17 included the grounds on which the PTO instituted review, the petition did not list Evans and Wendt for claim 10 or Wendt for claim 14."). Cuozzo challenged the Director's decision, contending that the Director may only initiate an *inter partes* review proceeding on the grounds "identifie[d] . . . with particularity" in the petition, as set forth in 35 U.S.C. \$ 312(a)(3). *Id.* at 1272–73. We declined to review Cuozzo's challenge, noting that § 314(d) broadly "exclude[s] all review of the decision whether to institute," and is not just "directed to precluding review only before a final decision." Id. at 1273. As we stated, a "declaration that the decision to institute be 'final' cannot reasonably be interpreted as postponing review until after issuance of a final decision on patentability." Id. Such an interpretation would render § 314(d) superfluous, "given that § 319 and § 141(c)already limit appeals to appeals from final decisions." Id.; see also id. ("Because § 314(d) is unnecessary to limit interlocutory appeals, it must be read to bar review of all institution decisions, even after the Board issues a final decision.").

Cuozzo petitioned the Supreme Court to grant *certiorari*, and the Court did so. Following oral argument, the Court affirmed our decision, concluding that the "text of the 'No Appeal' provision, along with its place in the overall statutory scheme, its role alongside the Administrative Procedure Act, the prior interpretation of similar patent statutes, and Congress'[s] purpose in crafting inter partes review, all point in favor of precluding review of the Patent Office's institution decisions."³ Cuozzo Speed Techs., LLC v. Lee, 136 S. Ct. 2131, 2141 (2016) ("Cuozzo II"). The Court acknowledged the "strong presumption" in favor of judicial review, but noted that "clear and convincing' indications, drawn from 'specific language,' 'specific legislative history,' and 'inferences of intent drawn from the statutory scheme as a whole" show that Congress intended to bar review. Id. at 2140. The Court relied on two aspects in particular: the language of § 314(d), and the nature of the legal dispute at issue.

With respect to the first, the Court noted that § 314(d) unquestionably provides that the determination whether to institute *inter partes* review "shall be final and nonappealable." That mandate operates with particular force in view of Congress's objective in creating the *inter partes* review process, "giving the Patent Office significant power to revisit and revise earlier patent grants," as well as the existence of similar provisions in related patent statutes. *Id.* at 2139–40 (citing both 35 U.S.C. § 319 and 35 U.S.C. § 312 (2006) (repealed) (highlighting the nonreviewability

³ The Supreme Court issued its decision in *Cuozzo II* after briefing and oral argument concluded in this case. We therefore requested simultaneous, supplemental briefing from the parties and the Patent and Trademark Office relating to the impact of the Supreme Court's decision on this case. *See Husky Injection Molding Sys. Ltd. v. Athena Automation Ltd.*, Nos. 2015-1726, -1727, ECF No. 55 (Fed. Cir. July 18, 2016). Those briefs were submitted on July 28, 2016. *Id.* ECF Nos. 58, 61, 62.

of the determination to initiate *inter partes* reexamination) with respect to the latter point).

With respect to the second, the Court noted that "the legal dispute at issue [there was] an ordinary dispute about the application of certain relevant patent statutes concerning the Patent Office's decision to institute inter partes review," particularly the "related statutory section, § 312," and that the express language of § 314(d) "must, at the least, forbid an appeal that attacks a 'determination ... whether to institute' review by raising this kind of legal question." *Id.* at 2139. The Court emphasized that review is foreclosed "where the grounds for attacking the decision to institute inter partes review consist of questions that are *closely tied to the application and interpretation of statutes related to* the Patent Office's decision to initiate inter partes review." *Id.* at 2141 (emphasis added).

The Court did, however, leave open the possibility that § 314(d) may nevertheless allow for review of appeals that "implicate constitutional questions, that depend on other less closely related statutes, or that present other questions of interpretation that reach, in terms of scope and impact, well beyond 'this section."" *Id.* The Court further noted that it did not "categorically preclude review" of any final decision where the agency acted outside of its statutory authority, *e.g.*, "canceling a patent claim for 'indefiniteness under § 112' in inter partes review." *Id.* at 2141– 42; *see also* 35 U.S.C. § 311(b) ("A petitioner may request to cancel [a claim] only on a ground that could be raised under section 102 or 103.").

In line with the latter exception, we have similarly determined that we may review a challenge to the institution decision if it relates to the Board's *ultimate authority to invalidate a particular patent*. That ultimate invalidation authority is purely tied to the patent challenged and the nature of the review requested; it is not a question of who petitions for review. Achates, 803 F.3d 652; see Wi-Fi One, LLC v. Broadcom Corp., 2015-1944, slip op. at 8–9 (Fed. Cir. Sept. 16, 2016) (holding that Achates remains good law in light of the Supreme Court's decision in Cuozzo II, specifically concluding that § 315 is a statute closely related to the decision whether to institute); Versata Dev. Grp., Inc. v. SAP Am., Inc., 793 F.3d 1306 (Fed. Cir. 2015), cert. denied, No. 15-1145, 2016 WL 1029054 (U.S. June 27, 2016).

Indeed, we first established that principle in Versata, in an analogous covered business method ("CBM") review context. See 793 F.3d at 1320. During a CBM review, the Board may only evaluate and invalidate a CBM patent, as expressly defined by statute. Id. "If a particular patent is not a CBM patent, there is no proper pleading that could be filed to bring it within the [Board]'s § 18 [CBM review] authority." Id.; cf. id. at 1322 (distinguishing Cuozzo by noting that there a proper petition could have cited all the prior art, "thereby plainly giving the PTAB authority to invalidate the patent at issue in the IPR"). Accordingly, a determination whether the challenged patent satisfies the CBM criteria necessarily relates to the Board's ultimate invalidation authority, and we held that we may review such a determination, even when made during institution. Id. at 1315, 1319-20; cf. Cuozzo, 793 F.3d at 1273 ("[T]he IPR statute [does not] expressly limit the Board's authority at the final decision stage to the grounds alleged in the IPR petition.").

We then elaborated on that principle in *Achates*, holding that procedural limits placed on when certain parties must file for review do not relate to the Board's ultimate authority to invalidate a patent. *See Achates*, 803 F.3d at 657–59. Specifically, *Achates* involved the time bar in 35 U.S.C. § 315(b).⁴ *Id.* at 653. The Patent and Trademark Office determined that Apple's petitions for review did not trigger the time bar and instituted review. *Id.* at 654. On appeal, Achates argued that we could review that determination because it "goes to the Board's ultimate authority to invalidate the patents." *Id.* at 657. We disagreed.

In particular, we acknowledged that "compliance with the time-bar does not itself give the Board the power to invalidate a patent. Instead, the time-bar $[(\S 315(b))]$ sets out the procedure for seeking IPR," id. at 658, in contradistinction to the express authorization in CBM review for the Board to institute review of, and perhaps invalidate, a CBM patent, cf. Versata, 793 F.3d at 1320–21. At best, a time bar prevents *particular petitioners* from challenging a patent, Achates, 803 F.3d at 657, but that does not affect the Board's authority to later invalidate that patent: "The Board may still invalidate a claim challenged in a timebarred petition via a[nother] properly-filed petition from another petitioner." Id.; accord id. ("Just as the pleading in *Cuozzo* could have been sufficient by the inclusion of the missing prior art reference, . . . the timeliness issue here could have been avoided if Apple's petition had been filed a year earlier or if a petition identical to Apple's were filed by another[.]"); cf. Versata, 793 F.3d at 1320 (noting that no proper pleading "could be filed to bring [the patent] within the PTAB's § 18 authority"). Because the question for review involved who could petition for review rather than whether the Board could ultimately invalidate the patent, we held that we lacked jurisdiction to review

⁴ 35 U.S.C. § 315(b) provides: "An inter partes review may not be instituted if the petition requesting the proceeding is filed more than 1 year after the date on which the petitioner . . . is served with a complaint alleging infringement of the patent."

the time-bar determination from the institution decision. *See Achates*, 803 F.3d at 659.

The above-discussed cases establish a two-part inquiry for determining whether we may review a particular challenge to the decision whether to institute. First, we must determine whether the challenge at issue is "closely tied to the application and interpretation of statutes related to the Patent Office's decision to initiate inter partes review," or if it instead "implicate[s] constitutional questions," "depend[s] on other less closely related statutes," or "present[s] other questions of interpretation that reach, in terms of scope and impact," "well beyond 'this section." Cuozzo II, 136 S. Ct. at 2141 (emphasis added). If the latter, our authority to review the decision to institute appears unfettered. But if the former, § 314(d)forbids our review. One further exception remains, however. At the second step of the inquiry, we must ask if, despite the challenge being grounded in a "statute closely related to that decision to institute," id. at 2142, it is nevertheless directed to the Board's ultimate invalidation authority with respect to a specific patent, id. at 2141; see also Versata, 793 F.3d at 1319-20; Achates, 803 F.3d at 657. If so, we may review the challenge.

В

It is with that context in mind that we now turn to the instant case. As in the cases noted above, Husky's appeal challenges the institution decision, specifically the Board's determination during the institution phase that assignor estoppel cannot bar an assignor or his or her privies from petitioning for *inter partes* review. According to Husky, that determination involves "an interpretation issue that reaches, in terms of scope and impact, well beyond § 314," *see* Appellant's Suppl. Br. 1, and, moreover, it necessarily implicates the Board's invalidation authority with respect to the '536 patent, *see*, *e.g.*, Appellant's Reply Br. 36–43.

For those reasons, Husky asserts that we have jurisdiction to review the assignor estoppel determination.

We are mindful of the otherwise powerful presumption favoring judicial review of agency determinations, but in applying the foregoing framework, we conclude that we lack the authority to review the Board's determination in its institution decision that assignor estoppel does not apply at the Patent and Trademark Office.

First, we conclude that the question whether assignor estoppel applies in full force at the Patent and Trademark Office does not fall into any of the three categories the Supreme Court specifically mentioned as reviewable. Nothing about the question implicates a constitutional concern such as a due process violation, and no party contends as much. *Cuozzo II*, 136 S. Ct. at 2141.

Nor does it "depend on other less closely related statutes." Id. As an initial matter, the doctrine of assignor estoppel does not derive from statute. Rather, it is an equitable doctrine that arose in the patent infringement context to prohibit an assignor or his or her privies from stating the patent rights earlier assigned are of no value. Diamond Sci. Co. v. Ambico. Inc., 848 F.2d 1220 (Fed. Cir. In Diamond Scientific, we reasoned that the 1988). "implicit representation by the assignor that the patent rights that he is assigning (presumably for value) are not worthless" must be honored, *id.* at 1224, for "[t]o allow the assignor to make that representation at the time of the assignment (to his advantage) and later to repudiate it (again to his advantage) could work an injustice against the assignee," *id.* Thus, the question of assignor estoppel itself does not "depend on other less closely related statutes."

Nevertheless, a determination whether assignor estoppel applies at the Patent and Trademark Office in the *inter partes* review context necessarily requires an *interpretation* of 35 U.S.C. § 311(a) ("[A] person who is not the owner of a patent may file"). See Institution Decision at *7 ("Consequently, under the statute, an assignor of a patent, who is no longer an owner of the patent at the time of filing, may file a petition requesting *inter partes* review. This statute presents a clear expression of Congress's broad grant of the ability to challenge the patentability of patents through *inter partes* review." (emphasis added)). We must therefore assess whether § 311 constitutes a "closely related" or an "other less closely related" statute. See Cuozzo II, 136 S. Ct. at 2141.

Even though the Supreme Court did not set forth any specific framework for determining if a statute is "closely related," the statutes "closely related" to the decision whether to institute are necessarily, and at least, those that define the metes and bounds of the *inter partes* review process. And an interpretation of § 311 and its prescription of "a person who is not the owner of a patent may file" to either include or foreclose assignor estoppel is *very* "closely related" to any decision to initiate *inter partes* review.

Husky focuses on the third exception set forth by the Supreme Court, arguing that the question of assignor estoppel is ultimately an "interpretation of an issue that reaches, in terms of scope and impact, well beyond § 314." Appellant's Suppl. Br. 1. We do not agree. Section 314 describes the threshold determination the Patent and Trademark Office must make before it can institute a review; namely, the Director must first determine "that the information presented in the petition . . . shows that there is a reasonable likelihood" the petitioner would prevail on the patentability grounds raised. 35 U.S.C. § 314(a). The scope of the section thus pertains to arguments concerning patentability and the necessary strength of those arguments before the Director is authorized to initiate review. The question of assignor estoppel implicates those very same concerns; if assignor estoppel applies, an assignor or his or her privies may not challenge the patentability of the patent earlier assigned, and any petition filed by an assignor or his or her privies falls far short of the "reasonable likelihood" standard guarding against improper institution. See Mentor Graphics Corp. v. Quickturn Design Sys., Inc., 150 F.3d 1374, 1377 (Fed. Cir. 1998) ("Assignor estoppel prevents a party who assigns a patent to another from later challenging the validity of the assigned patent."). The impact of assignor estoppel thus cannot be divorced from the very precise scope of § 314 simply to justify our review. The issue is not "well beyond this section," and hence it is beyond our review.

Although we conclude that the assignor estoppel question is not entitled to review under the three exceptions in Cuozzo II, we must nevertheless further determine if, despite the question's close ties to the decision to institute, the question relates to the Board's ultimate invalidation authority. We conclude that it does not.

As in this case, both Versata and Achates involve statutes "closely related" to the decision to initiate the respective reviews, as we have defined such statutes here today. Nevertheless, in Versata, we held that we could review a determination whether a certain patent met the statutory definition of a CBM patent because that question necessarily related to the Board's ultimate authority to invalidate that patent during a CBM review. 793 F.3d at 1315, 1319–20. As noted above, and in contrast, we elaborated in Achates that the Board's invalidation authority derives from the patent challenged and the type of the review requested; it is not a question of who petitions for review. We thus held that a bar preventing *particular petitioners* from challenging a patent does not impact the Board's invalidation authority, for "[t]he Board may still invalidate a claim challenged in a time-barred petition via a[nother] properly-filed petition from another petitioner." Achates, 803 F.3d at 657.

As we have stated, assignor estoppel operates to prevent "one who has assigned the rights to a patent (or [a] patent application) from later contending that what was assigned" lacks value. *Diamond Sci.*, 848 F.2d at 1224. It does not foreclose all challenges to a patent's validity from the remainder of the general public. *See id.* ("The essence of the principle of fair dealing which binds the assignor of a patent in a suit by the assignee, even though it turns out that the patent is invalid or lacks novelty, is that in this relation the assignor is not part of the general public but is apart from the general public." (citation and quotation marks omitted)). To that end, it does not prevent a tribunal from evaluating the validity of any challenged claims generally, but rather simply limits the parties that may ask the tribunal for such an evaluation.

In that way, assignor estoppel differs from the certain statutory limits placed on the Board's authority in a CBM review. In Versata, the determination in guestion turned on the type of patent involved, for the nature of the patent alone made it subject to "a special [Board] power to invalidate." 793 F.3d at 1321. In contrast, assignor estoppel "does not itself give the Board the power to invalidate a patent." See Achates, 803 F.3d at 658. Rather, it is of a piece with the procedural limits deemed unreviewable in Achates, where those limits effectuated the orderly progress of *inter partes* review. As we reasoned, a failure to follow the time bar by one petitioner would not foreclose all future review by the Board; it would simply prevent a particular petitioner from challenging the patent's claims. Id. at 657. Likewise, that one petitioner may be estopped from challenging the patent does not foreclose all future review by the Board of that patent. Indeed, "[t]he fact that the petition was defective is irrelevant because a proper petition could have been drafted." See Cuozzo, 793 F.3d at 1274. Ultimately, any question concerning assignor estoppel necessarily implicates who may petition for review, and, as we have held, such a question falls outside of the narrow exceptions to the otherwise broad ban on our review of the decision whether to institute.

For the reasons articulated above, we conclude that we lack jurisdiction to review the Board's determination on whether assignor estoppel precludes it from instituting *inter partes* review. We therefore dismiss Husky's appeal, and express no opinion on the merits of the Board's conclusion that assignor estoppel may not bar an assignor or his or her privies from petitioning for *inter partes* review.

II. ATHENA'S CROSS-APPEAL

The question before us in the cross-appeal relates to incorporation by reference, and ultimately to anticipation.

We review the Board's legal conclusions *de novo*, *In re Elsner*, 381 F.3d 1125, 1127 (Fed. Cir. 2004), and the Board's factual findings underlying those determinations for substantial evidence, *In re Gartside*, 203 F.3d 1305, 1316 (Fed. Cir. 2000). A finding is supported by substantial evidence if a reasonable mind might accept the evidence to support the conclusion. *See Consol. Edison Co. v. NLRB*, 305 U.S. 197, 229 (1938).

Anticipation is a fact question that we review for substantial evidence. In re Gleave, 560 F.3d 1331, 1334 (Fed. Cir. 2009). A prior art document may anticipate a claim if it describes every element of the claimed invention, either expressly or inherently. See Advanced Display Sys., Inc. v. Kent State Univ., 212 F.3d 1272, 1282 (Fed. Cir. 2000). Other material may be considered as part of that prior art document if it is incorporated by reference. Id.

A host document incorporates material by reference if it "identif[ies] with detailed particularity what specific material it incorporates and clearly indicate[s] where that material is found in the various documents." *Id.* Whether and to what extent material is incorporated by reference is a question of law we review *de novo*. *See Harari v. Lee*, 656 F.3d 1331, 1334 (Fed. Cir. 2011). In making such a determination, we assess whether a skilled artisan would understand the host document to describe with sufficient particularity the material to be incorporated. *Id*.

Athena's cross-appeal contests the Board's determination that the prior art Glaesener does not incorporate the prior art Choi by reference, and thereby the Board's finding that claims 2, 3, 17, and 19 are not unpatentable as anticipated. Two specific paragraphs in Glaesener are at issue. The first reads: "The tie-bar nuts can be secured . . . by any appropriate mechanism, such as the pineapple and toothed-ring mechanism described in [Choi]." Glaesener ¶ 0035. The second reads: "All cross-referenced patents and application[s] referred to in this specification are hereby incorporated by reference." *Id.* ¶ 0049. The Board determined that neither paragraph identifies with sufficient particularity what material from Choi Glaesener meant to incorporate.

On appeal, Athena contends that it provided evidence establishing that a skilled artisan would understand with sufficient particularity what the "pineapple and toothedring mechanism" language referred to in Choi. Alternatively, Athena contends that the second statement effects a broad incorporation that cannot be negated by the use of a more precise incorporation statement elsewhere.

We agree; Glaesener identifies with sufficient particularity what it incorporates from Choi. As an initial matter, the fact that Choi does not recite either of the words "pineapple" or "toothed-ring" throughout its disclosure is ultimately of no moment. The incorporation standard relies only on the reasonably skilled artisan and his or her ability to deduce from language, however imprecise, what a host document aims to incorporate. *See Harari*, 656 F.3d at 1331; *Advanced Display*, 212 F.3d at 1283; *cf. Gleave*, 560 F.3d at 1334 (A "reference need not satisfy an ipsissimis verbis [word-for-word] test" to anticipate.). Even so, Choi explicitly identifies toothed components when discussing its securing/clamping assemblies, *i.e.*, its locking mechanism. And, importantly, Figure 3A discloses the only locking mechanism in Choi.

Referring to Figs. 3A and 3B, in order for the securing/clamping assembly 22a of platen 14 to function with the tie bar 2a, tie bar 20a includes an elongated end section having a plurality of spaced protrusions in the form of *teeth* 38a separated by longitudinally extending inner slots 40a as shown in Fig. 3B. Accordingly, at the end of tie bar 20a is a *toothed outer surface*, as shown in Fig. 3A. The *toothed outer surface* of tie bar 20a is in the form of longitudinal outer strips of *teeth* 39a extending in the axial direction of the tie bar, wherein the *teeth* 38a are preferably aligned in a radial direction on the tie bar and separated by a space in the axial direction....

Outer strips of *teeth* 39a and slots 40a of tie bar 20a are adapted to engage and align, respectively, with inner *teeth and grooves* of securing/clamping assembly 22a Securing/clamping assembly 22a is comprised of a member in the form of a piston 44a Piston 44a includes an outer surface 46a and an inner surface with *axially extending teeth* 48a separated by spaces in the axial direction, which are adapted to engage *teeth* 38a of the strips of *teeth* 39a of tie bars 20a. A slight axial clearance is provided between the *teeth* 38a of tie bars 20a and the inner *teeth* 48a of *toothed piston* 44a to allow for relative movement

Choi, col. 5 l. 40-col. 6 l. 5 (emphases added). A reasonably skilled artisan would thus appreciate Glaesener's reference of "pineapple and toothed-ring" to describe, with sufficient particularity, the above-referenced disclosure in Choi. To find otherwise would be to undervalue the

knowledge of a skilled artisan. Indeed, Athena identified Figure 3a as the "pineapple and toothed-ring mechanism" Glaesener referred to both in its petition for *inter partes* review and during its trial at the Board. *See* J.A. 113–14; J.A. 441–42. Nothing more was required.

Glaesener's two paragraphs, ¶ 0035 and ¶ 0049, accordingly work in concert to incorporate at least some portions of Choi. It is therefore of no consequence whether Glaesener's broader statement in fact incorporates the rest of Choi, *i.e.*, in its entirety. *Cf. Harari*, 656 F.3d at 1335–36. Ultimately, the Board erred in determining that Glaesener does not incorporate Choi for purposes of anticipation. Because the Board provided no further reasoning why claims 2, 3, 17, and 19 were not anticipated, we vacate and remand for the Board to evaluate anticipation in the first instance in light of Glaesener/Choi.

CONCLUSION

We have considered the remaining arguments in both appeals, but find them unpersuasive. For the foregoing reasons, we dismiss Husky's appeal for lack of jurisdiction; we vacate the Board's decision on incorporation by reference and its finding of no anticipation with respect to claims 2, 3, 17, and 19; and we remand for further consideration consistent with this opinion.

DISMISSED IN PART, VACATED AND REMANDED IN PART

COSTS

Costs to Athena.

United States Court of Appeals for the Federal Circuit

HUSKY INJECTION MOLDING SYSTEMS LTD., Appellant

v.

ATHENA AUTOMATION LTD., Cross-Appellant

2015-1726, 2015-1727

Appeals from the United States Patent and Trademark Office, Patent Trial and Appeal Board in No. IPR2013-00290.

PLAGER, *Circuit Judge*, concurring in part and dissenting in part.

I concur in the majority's judgment regarding vacating and remanding the cross-appeal. I dissent from the judgment that we lack jurisdiction to review the determination by the Patent Trial and Appeal Board ("Board") regarding whether assignor estoppel precludes it from instituting *inter partes* review in this case. I believe the majority's reasoning is mistaken, and I respectfully dissent from it and the conclusion to which it leads. Regrettably, the majority's view may contribute to the already-existing confusion regarding which matters this court can review on appeal from a final decision by the Board. Summarizing the case in its simplest terms, this is why:

Athena, pursuant to the statutory provisions of the America Invents Act ("AIA"), filed its petition requesting *inter partes* review of the '536 patent owned by Husky. Husky, in its preliminary response, stated its opposition to the petition. It argued that Athena was barred from filing its petition by the doctrine of assignor estoppel. The Board rejected Husky's argument; it took the position that \S 311(a) of the AIA determined who could file a petition, and that assignor estoppel did not provide an exception to \S 311(a).

The Board explained that § 311(a) provided simply that "a person who is not the patent owner" could file a petition; since Athena was not the owner, it was such a person. The Board interpreted the provision to mean just what it said and not to have an implicit exception that would prevent a petitioner, who is subject to assignor estoppel, from filing. Thus the Board applied essentially a 'plain meaning' interpretation to the language of § 311(a). Thereafter, having determined that the petition to institute was properly before it, the Board instituted review and, in due course, issued a final written decision on the merits, upholding some claims and invalidating others.

In its appeal to this court, Husky stated that the single issue in its appeal is: "Did the Board legally err by determining that, pursuant to 35 U.S.C. § 311, the doctrine of assignor estoppel does not apply to the *inter partes* review concerning the '536 patent" Appellant's Br. 1. Much of the briefing in this case focused on the application of assignor estoppel at the decision to institute stage, though some seemed to address more broadly the issue of assignor estoppel's application to Board proceedings generally. Be that as it may, the only issue properly raised by the record on appeal is the one initiated by the Board and identified by Husky: at the time an initial petition is filed, does § 311(a) incorporate an unstated exception regarding who can file an initial petition, an exception based on assignor estoppel?

Before we can address the correctness of the Board's resolution of that issue, we must first decide whether as a matter of law we can review the Board's determination, a determination that was decisive regarding whether the Board could institute *inter partes* review of the '536 patent. A statute and a Supreme Court decision govern the answer: Congress's mandate in § 314(d) that "[t]he determination . . . whether to institute an inter partes review under this section shall be final and nonappealable," and the recent opinion of the Supreme Court in *Cuozzo*.¹

It is clear from the prior opinions of this court, unquestioned by the Supreme Court, that the statute bars immediate review of a Board decision to institute an *inter partes* review, whether by interlocutory appeal,² mandamus,³ or other procedural device.⁴ What has not been

¹ Cuozzo Speed Techs., LLC v. Lee, 136 S. Ct. 2131 (2016).

² We have considered and rejected interlocutory appeal of a decision not to institute. See St. Jude Med., Cardiology Div., Inc. v. Volcano Corp., 749 F.3d 1373, 1375–76 (Fed. Cir. 2014). We also have considered and rejected interlocutory appeal or mandamus relief for a decision to institute (later vacated by the Board). See GEA Process Eng'g, Inc. v. Steuben Foods, Inc., 618 F. App'x 667 (Fed. Cir. 2015).

³ In re Procter & Gamble Co., 749 F.3d 1376, 1378– 79 (Fed. Cir. 2014).

⁴ See HP Inc. v. MPHJ Tech. Inv., LLC, 817 F.3d 1339, 1344–47 (Fed. Cir. 2016) (on appeal of a final writ-

clear is, when a *final written decision* of the Board is appealed to this court, as provided by statute,⁵ what aspects, if any, of the Board's decision to institute are then reviewable?

One part of that question is no longer in dispute—the fact that a particular issue is determined initially by the Board at the decision to institute stage does not affect the reviewability of the issue at the final written decision stage, so long as the issue remains relevant to the final merits under review. See, e.g., Versata Dev. Grp., Inc. v. SAP Am., Inc., 793 F.3d 1306, 1318–19, 1329 (Fed. Cir. 2015) (finding we could review on appeal of a final written decision whether the Board correctly took jurisdiction over the patent at issue as a CBM patent and whether the Board was authorized to rely on § 101 in CBM cases); In re Magnum Oil Tools Int'l, Ltd., No. 15-1300, 2016 WL 3974202 at *4 (Fed. Cir. July 25, 2016) (finding we could review statements made by the Board in the decision to institute that were later relied upon in the final written decision).

With regard to the larger question—on appeal to this court of a final written decision, what aspects, if any, of the initial decision to institute remain subject to review one view is that no aspect of the decision to institute is reviewable. That seems to be what the statute literally says, thus making the decision to institute entirely an administrative determination, however it is made. That is now a familiar argument, sometimes reflected in case outcomes phrased in various ways based on assorted distinctions in the cases.

ten decision, dealing with whether § 314(d) barred review of an APA challenge to the Board's decision to institute).

⁵ § 319.

A different view, one that takes into account the long tradition of judicial review of administrative decisions as well as the mandate of the APA, suggests that the bar to judicial review under § 314(d) should be understood as limited to interlocutory appeals; what Congress wanted to avoid was piecemeal appellate review. Once a final written decision is rendered, the entire case on appeal is properly before the court, including issues surrounding the Board's initial decision to institute review. In *Cuozzo*, that was essentially the position of Justice Alito, with whom Justice Sotomayor joined. *See* 136 S. Ct. at 2150–53 (Alito, J., concurring in part and dissenting in part).

The *Cuozzo* majority did not go as far as Justices Alito and Sotomayor would; the Court determined that § 314(d) was not limited to barring interlocutory appeals. *Id.* at 2140. However, by also rejecting the 'no review of the decision to institute' view, the Court took an intermediate position that fundamentally altered the playing field. The Court readily recognized that several factors pointed in favor of precluding any review of the Patent Office's institution decisions. *Id.* at 2139–41. Nevertheless, said the Court, "in light of § 314(d)'s own text and the presumption favoring review," there is one category of cases when the bar of § 314(d) applies, and at least three others when it may not.

The one category in which the bar applies is when "the grounds for attacking the decision to institute inter partes review consist of questions that are closely tied to the application and interpretation of statutes related to the Patent Office's decision to initiate inter partes review." *Id.* at 2141. The Court then stated "that we need not, and do not, decide the precise effect of § 314(d) on appeals that [1] implicate constitutional questions, that [2] depend on other less closely related statutes, or that [3] present other questions of interpretation that reach, in terms of scope and impact, well beyond 'this section." $Id.^{6}$

Thus the Court tells us that, despite the express language of § 314(d), this court's review on appeal of a final written decision is not limited to the substantive merits of the case under §§ 102 and 103, but may include aspects of the Board's decision to institute. For us, then, the issue in this case is where does assignor estoppel fit in the Court's matrix of what now can be reviewed?⁷

Assignor estoppel is an equitable doctrine that is recognized in the common law.⁸ Given the long tradition of judicial review of administrative decision-making,⁹ and the Supreme Court's specific reference in *Cuozzo* to the APA's provisions mandating review of agency action,¹⁰ it would seem anomalous to say that the application of such a rule to proceedings before the Board, a unit of an ad-

⁷ The first category, constitutional questions, is not before us as no constitutional issues have been raised.

⁶ The Court went further to explain that it did not preclude review of a final decision when a petition raised a due process problem with the entire proceeding, nor did the Court intend to enable an agency to act outside its statutory limits. *Id.* at 2141–42. The Court observed that such "shenanigans" may be reviewable under § 319 and the APA; similar to its treatment of the three reviewability categories, the Court did not elaborate on what constitutes 'shenanigans.'

⁸ "Assignor estoppel is an equitable doctrine that prevents one who has assigned the rights to a patent (or patent application) from later contending that what was assigned is a nullity." *Diamond Sci. Co. v. Ambico, Inc.*, 848 F.2d 1220, 1224 (Fed. Cir. 1988).

⁹ See, e.g., Bowen v. Mich. Acad. of Family Physicians, 476 U.S. 667, 670 (1986); 5 U.S.C. § 702.

¹⁰ *Id.* at 2142 (citing 5 U.S.C. §§ 706(2)(A)–(D)).

ministrative agency, is exclusively for the agency to decide. Applying the *Cuozzo* criteria, we must examine whether, by basing its decision on its 'interpretation' of what would appear to be a 'related statute,' the Board has insulated itself from judicial review? I think not.

For one, the doctrine of assignor estoppel is in the nature of a common law doctrine, and not itself based on statute. We should be reluctant to allow immunizing judicial review simply because the Board may attribute its decision to an interpretation of a 'related' statute. That could open the door to possible manipulation by parties in presenting and arguing cases before the Board and this court.

More importantly, in order to honor the Supreme Court's direction to this court to exercise judicious review over determinations of the Board, including when called for by extending that review to the Board's decisions to institute, we must take a close look at what is actually involved. Even if the Board is presumed to have succeeded in tying the question of assignor estoppel to interpretation of a 'related statute,' in this case 311(a), by the way it decided the matter, it is not so clear that this is "closely tied to the application and interpretation of statutes related to the Patent Office's decision to initiate inter partes review." Id. at 2141. The decision to institute *inter partes* review is governed primarily by the specifics of § 314(a)–(c). It would not be beyond reason to consider § 311 to be instead a "less closely related statute." (The terms of the second category in *Cuozzo*).

And beyond that, the question of whether assignor estoppel applies to the decision to institute made by the Board in this case could be considered to be one that "present[s] other questions of interpretation that reach, in terms of scope and impact, well beyond 'this section."" *Id.* (The terms of the third category in *Cuozzo*). And again, the phrase, "this section," put in quotes in the original, serves as an apparent reference to the other subparts of 314.

The Supreme Court's pass of the "precise effect of § 314(d) on appeals that implicate" those categories means that this court must undertake that determination in future cases. Applying either of those *Cuozzo* categories to cases before this court, including issues decided in past cases, reveals that there is a range of reviewable issues that this court is obligated to consider. Examples may include, among others, filing deadlines and joinder and estoppel issues.¹¹

I offer no opinion as to whether the Board correctly determined that assignor estoppel does or does not apply to bar the petition in this case; that issue is yet to be addressed. In my view it is necessary that we decide that issue as part of a proper judicial review of the case before us on final written decision. Whether under the second or third of *Cuozzo's* suggested categories for review, or because it is not within *Cuozzo's* basic standard for applying the bar of § 314(d) in the first instance, the question of whether the Board properly ruled on the application of assignor estoppel to this case is clearly subject to this court's judicial power of review.

Accordingly, I find the majority's analysis of this case, its unnecessary commentary approving prior cases that may no longer be good law in light of *Cuozzo*, and its discussion of why the question of the application of assignor estoppel to this case does not relate to "the Board's ultimate invalidation authority," unhelpful. From the majority's refusal to undertake the required review of the

¹¹ Accord Judge Reyna's concurring opinion in *Wi-Fi* One, *LLC v. Broadcom Corp.*, No. 15-1944, 2016 WL 4933298, at *8–9 (Sept. 16, 2016) (Reyna, J., concurring).

HUSKY INJECTION MOLDING SYS. v. ATHENA AUTOMATION LTD.

Board's decision, the issue properly raised on appeal, I respectfully dissent.