

NOTE: This disposition is nonprecedential.

**United States Court of Appeals
for the Federal Circuit**

JACK O. CARTNER AND MOTRIM, INC.,
Plaintiffs-Appellants,

v.

ALAMO GROUP, INC.,
Defendant-Cross-Appellant

2013-1293, -1314

Appeals from the United States District Court for the Northern District of Ohio in No. 07-CV-1589, Judge Lesley Brooks Wells.

Decided: April 11, 2014

PHILIP J. MOY, JR., Fay Sharpe LLP, of Cleveland, Ohio, argued for plaintiffs-appellants.

BRYAN A. SCHWARTZ, Benesch, Friedlander, Coplan & Aronoff, LLP, of Cleveland, Ohio, argued for defendant-cross-appellant.

Before DYK, MOORE, and WALLACH, *Circuit Judges.*

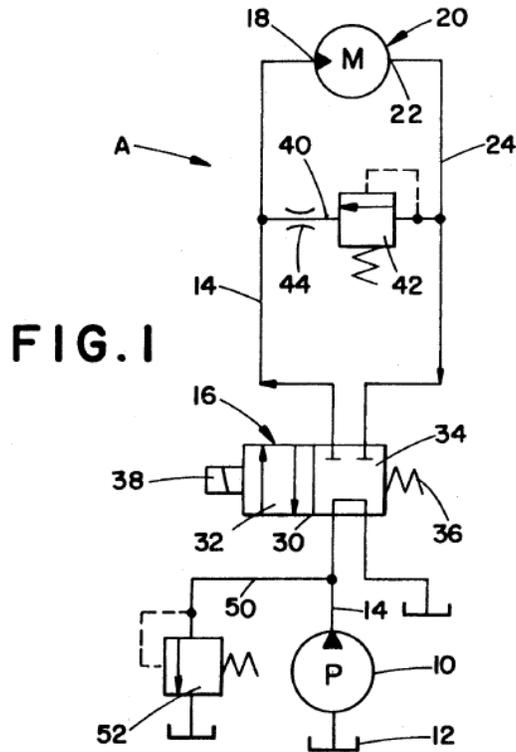
WALLACH, *Circuit Judge*.

This is a patent infringement case in which Jack O. Cartner and Motrim, Inc. (“Cartner”) asserted infringement of claims 5 and 12 of U.S. Patent No. 5,197,284 (“the ’284 patent”) against Alamo Group, Inc. (“Alamo”). After years of litigation, including a prior appeal to this court, the parties agreed to a consent judgment of noninfringement, which the district court entered on March 2, 2010. Soon after, Alamo moved for exceptional-case attorney fees under 35 U.S.C. § 285 (2006). The district court found the case was exceptional and awarded Alamo \$358,516.44 in post-appeal litigation attorney fees and costs. Cartner appeals the district court’s exceptional case finding, and Alamo cross appeals the amount of the attorney fees award. Because the district court properly found this case exceptional, and because it did not abuse its discretion in determining the fee award, this court affirms.

BACKGROUND

I. The ’284 Patent

Hydraulically-driven motors are often used to power lawn mowers, ditchers, and similar equipment. Prior art hydraulic motors without an effective deceleration system were problematic, because: (1) the cutting blades could continue to freewheel and cause damage to the surrounding area, or (2) the motor could come to a “precipitous stop,” placing “great strain[]” on the motor and “the fasteners connecting the cutting blade to the motor.” ’284 patent col. 1 ll. 25–49. The ’284 patent claims systems and methods for decelerating a hydraulic motor by using a “deceleration circuit.” *Id.* col. 1 ll. 13–16. The ’284 invention “gradually brings a hydraulic motor to a stop” after communication is blocked between the motor and the pump. *Id.* col. 2 ll. 58–60. Figure 1 depicts the preferred embodiment of the claimed deceleration circuit.



Id. Fig. 1. The system includes a hydraulic pump 10, a hydraulic motor 20, and a hydraulic circuit that connects the pump to the motor. The hydraulic circuit has three fluid lines: (1) the first fluid line 14 extends from the pump 10 to the motor 20 through a control valve 16, (2) the second fluid line 24 extends between the control valve 16 and the motor 20, and (3) the third fluid line 40 connects the first fluid line to the second fluid line, and includes a relief valve 42 and a flow control orifice 44.

The control valve 16 must be in the “open” position for the hydraulic motor to operate. When the control valve 16 is open, fluid is pumped from the reservoir 12 through fluid line 14, past the motor 20, down the second fluid line

24, and back into the reservoir 12. This hydraulic circuit causes the motor to rotate for the purpose of, e.g., turning blades to cut the grass.

Closing the control valve 16 traps the fluid in the upper portions of the fluid lines, and “gradually brings [the] hydraulic motor to a stop.” *Id.* col. 2 l. 58. When the control valve is closed, the third fluid line transports fluid between the first and second fluid lines, “thereby enabling the motor to continue turning.” *Id.* col. 2 ll. 50–51. The relief valve 42 and flow control orifice 44, located in the third fluid line, “restrict[] the rate of fluid flow” past the motor, *id.* col. 2 ll. 51–53, and “limit[] the speed” at which the fluid can flow past the motor, *id.* col. 2 ll. 19–20. The motor eventually comes to a complete stop.

Asserted claim 5 recites:

A hydraulic motor deceleration system comprising:

a pump;

a hydraulic motor;

a hydraulic circuit interconnecting said pump and said motor, said circuit comprising:

a first hydraulic fluid line extending between said pump and said motor,

a first control valve located in said first fluid line for controlling the communication of fluid between said pump and said motor,

a second hydraulic fluid line interconnecting said control valve and said motor,

a third hydraulic fluid line interconnecting said first and second hydraulic lines,

a relief valve located in said third fluid line, and

a flow control orifice located in said third fluid line, and said flow control orifice being con-

stantly operative, said third fluid line allowing a flow of hydraulic fluid from said second fluid line to said first fluid line even when said control valve is in a closed position, *as regulated by said relief valve*, and wherein said flow control orifice limits the speed with which such flow takes place.

Id. col. 8 l. 48–col. 9 l. 4 (emphasis added to relevant claim language). The other asserted claim, claim 12, states:

A method for decelerating a hydraulic motor when the motor is *disconnected* from a hydraulic pump, said method comprising:

providing a hydraulic circuit interconnecting the motor and the pump, said hydraulic circuit including first and second hydraulic fluid lines which communicate, respectively, with an inlet and an outlet of said motor and a first valve which controls a flow of hydraulic fluid from said pump to said motor through at least one of said first and second fluid lines;

blocking a flow of fluid from said motor to said pump;

allowing a flow of fluid between said first and second fluid lines *without a loss of fluid* thereby enabling said motor to continue turning; and

allowing the speed of rotation of said motor by restricting the rate of flow or fluid through said first and second fluid lines wherein said step of slowing comprises the subsidiary steps of:

providing a third hydraulic fluid line which selectively communicates said first and second fluid lines *as regulated by a relief valve*; and

providing a flow control orifice in said third fluid line, said flow control orifice being constantly

operative to throttle fluid flow through said third fluid line.

Id. col. 10 ll. 1–26 (emphases added to relevant claim terms).

II. The Parties and Procedural History

Plaintiff-Appellant Motrim sells industrial mowing and trimming equipment and is the exclusive licensee of the '284 patent. Cartner is Motrim's president and the named inventor of the '284 patent. Alamo also supplies mowing and trimming equipment, including the two different brands of mowers accused in this case: (1) the Tiger mowers and (2) the Alamo mowers.

On May 30, 2007, Cartner filed a patent infringement complaint against Alamo, asserting, *inter alia*, claims 5 and 12 of the '284 patent. In particular, Cartner asserted claim 12 against the Alamo mowers, and claims 5 and 12 against the Tiger mowers. On May 21, 2008, the district court issued an order construing the disputed claim terms. *Cartner v. Alamo Grp., Inc. (Cartner I)*, No. 1-07-CV-1589, 2008 WL 2169005 (N.D. Ohio, May 21, 2008). The parties then filed a joint stipulation that the court's construction of one phrase in claims 5 and 12—"said flow control orifice being constantly operative"—rendered the claims invalid for lack of written description under 35 U.S.C. § 112, and the district court entered final judgment of patent invalidity.

Cartner appealed, and this court modified the construction of the "control orifice" limitation and vacated and remanded the judgment of invalidity on June 17, 2009. *Cartner v. Alamo Grp., Inc. (Cartner II)*, 333 F. App'x 565 (Fed. Cir. 2009). On remand, the parties resumed discovery in the district court with respect to infringement. In January 2010, Cartner contacted Alamo's counsel to propose dismissing the action with prejudice. The parties filed a Joint Motion for Consent

Judgment on February 22, 2010, and the district court entered the consent judgment of noninfringement on March 2, 2010.

On March 16, 2010, Alamo filed a motion to declare the case exceptional pursuant to 35 U.S.C. § 285. Alamo contended Cartner's infringement claims were frivolous because they ignored multiple limitations in claims 5 and 12, including: (1) claim 12's limitation that the "motor is disconnected from a hydraulic pump" (the "disconnected" limitation), (2) claim 12's requirement that there is no loss of fluid between the first and second fluid lines during deceleration (the "loss of fluid" limitation), and (3) claim 5 and 12's limitation that the relief valve in the third fluid line regulates the flow of fluid between the second and first fluid lines (the "relief valve" limitation).

The motion was referred to the magistrate judge, who found, by clear and convincing evidence, that the case was exceptional. Over Cartner's objection, the district court adopted the magistrate judge's recommendation that Alamo had proved the case was exceptional under 35 U.S.C. § 285. *Cartner v. Alamo Grp., Inc. (Cartner III)*, No.1:07-CV-1589, 2011 WL 4457665 (N.D. Ohio Sept. 23, 2011). The district court referred the matter back to the magistrate judge to determine the amount of the attorney fee award.

Alamo requested attorney fees and costs in the amount of \$608,899.55, calculated from August 10, 2007, the date when Alamo provided Cartner with a copy of the Tiger mower schematics. The magistrate judge granted-in-part and denied-in-part, awarding \$358,516.44 in attorney fees and costs calculated from June 17, 2009, the date of this court's decision in *Cartner II* vacating the district court's invalidity judgment. The district court again adopted the magistrate judge's recommendation, this time over Alamo's objection. *Cartner v. Alamo Grp.,*

Inc. (Cartner IV), No. 1:07-CV-1589, 2013 WL 943844 (N.D. Ohio Mar. 8, 2013).

Cartner filed a timely appeal, and Alamo noted a cross-appeal. This court has jurisdiction pursuant to 28 U.S.C. § 1295(a)(1) (2012).

DISCUSSION

On appeal, Cartner argues its infringement contentions were objectively reasonable and that the district court clearly erred in finding the case exceptional. Alamo cross appeals the attorney fees award, contending Cartner's infringement arguments became frivolous long before this court's invalidity decision, and arguing the fee award should be calculated from an earlier date.

A “court in exceptional cases may award reasonable attorney fees to the prevailing party.” 35 U.S.C. § 285. For an award of attorney fees under § 285, the prevailing party must “establish by clear and convincing evidence that the case is ‘exceptional,’” and “a court must determine whether an award of attorneys’ fees is appropriate and, if so, the amount of the award.” *Highmark, Inc. v. Allcare Health Mgmt. Sys., Inc.*, 687 F.3d 1300, 1308 (Fed. Cir. 2012).

One way to show a case is exceptional is to prove litigation misconduct, which “includes advancing frivolous arguments during the course of the litigation or otherwise prolonging litigation in bad faith.” *Id.* at 1315–16; *see also Taurus IP, LLC v. DaimlerChrysler Corp.*, 726 F.3d 1306, 1328 (Fed. Cir. 2013) (“[A] case can be found exceptional when a party prolongs litigation in bad faith.”); *see also id.* (explaining “the rule that a party cannot assert baseless infringement claims and must continually assess the soundness of pending infringement claims, especially after an adverse claim construction”). An argument is frivolous when it is “at least objectively unreasonable” at the time it was made. *Highmark*, 687 F.3d at 1316. This

court reviews de novo whether an argument was objectively unreasonable. *Id.*

An attorney fees award under § 285 “must bear some relation to the extent of the misconduct,” so an argument that was frivolous for only part of the litigation must be limited accordingly. *Id.* (quoting *Special Devices, Inc. v. OEA, Inc.*, 269 F.3d 1340, 1344 (Fed. Cir. 2001)). A fee award under § 285 may only “compensate a party for the ‘extra legal effort to counteract the [] misconduct.’” *Id.* (quoting *Beckman Instr., Inc. v. LKB Produkter AB*, 892 F.2d 1547, 1553 (Fed. Cir. 1989)) (alteration in original). The district court’s award of attorney fees is reviewed for an abuse of discretion. *MarcTec, LLC v. Johnson & Johnson*, 664 F.3d 907, 916 (Fed. Cir. 2012).

I. Cartner’s Appeal

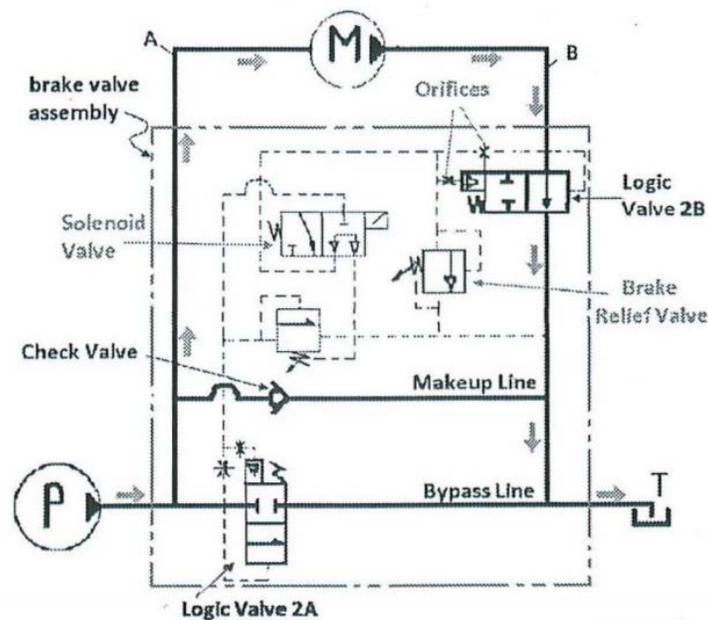
A. The “Without a Loss of Fluid” Limitation

The district court held it was frivolous for Cartner to argue that the Tiger mowers read on claim 12’s “without a loss of fluid” limitation. *Cartner III*, 2011 WL 2169005, at *3. Claim 12 recites a method for decelerating a hydraulic motor, including the steps of “blocking a flow of fluid from [the] motor to [the] pump” and “allowing a flow of fluid between [the] first and second fluid lines *without a loss of fluid* thereby enabling said motor to continue turning.” ’284 patent col. 10 ll. 13–15 (emphasis added).

Cartner added the “without a loss of fluid” limitation after the Patent and Trademark Office (“PTO”) examiner rejected claim 12 (then proposed claim 18) as anticipated by several patents, including U.S. Patent No. 4,732,076 to Ewald (“Ewald”). *See* J.A. 103, 114. Cartner argued to the PTO that proposed claim 18 was patentable over Ewald, because Ewald lost at least some fluid into the reservoir during deceleration, and thus did not circulate fluid between the first and second fluid lines “without a loss of fluid.” J.A. 115.

After reviewing this prosecution history, the district court determined that “reasonable review” of the Tiger mower schematic, which Alamo gave to Cartner early in the litigation, “indicates the similarity between the Tiger and the Ewald systems in that both evidence a loss of fluid to the tank.” *Cartner III*, 2011 WL 4457665, at *3. Because Cartner had disclaimed such a system to obtain the ’284 patent, the district court held it was unreasonable for Cartner to allege that the Tiger mowers met this limitation.

The Tiger mowers decelerate by opening logic valve 2A (depicted below), and allowing fluid to flow from the pump, through the bypass line, into the reservoir.



J.A. 938. This normal deceleration process does not recirculate fluid between the first and second lines “without a loss of fluid,” but instead *requires* diverting fluid to the tank.

Cartner nevertheless argues that he reasonably believed the Tiger mower could meet the “without a loss of fluid” limitation “under conditions of emergency shut-down.” Appellants’ Reply Br. 5. Suddenly shutting down the motor could establish a third fluid line between the motor’s input and output lines, according to Cartner, because “the pump would cease to operate and the spinning motor would act as a pump, creating suction on its intake side.” *Id.* at 4. Cartner’s proposed third line passes from the second line to the first line through the brake relief valve and the makeup line, as shown in Figure 7 below:

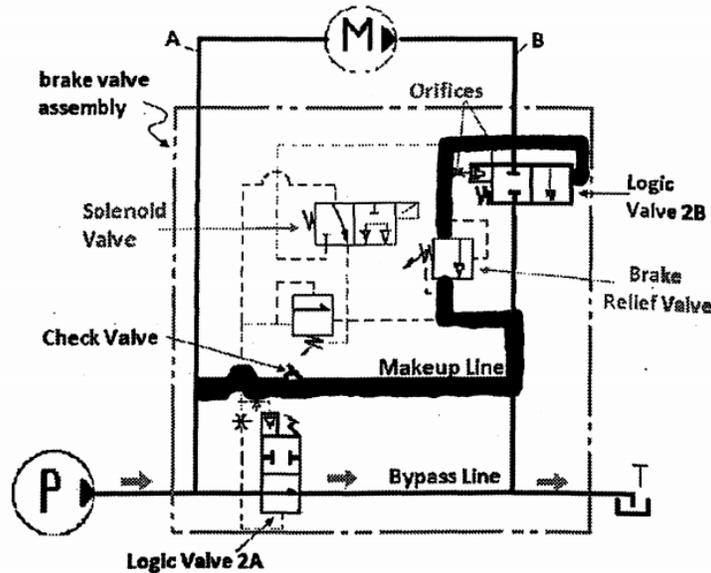


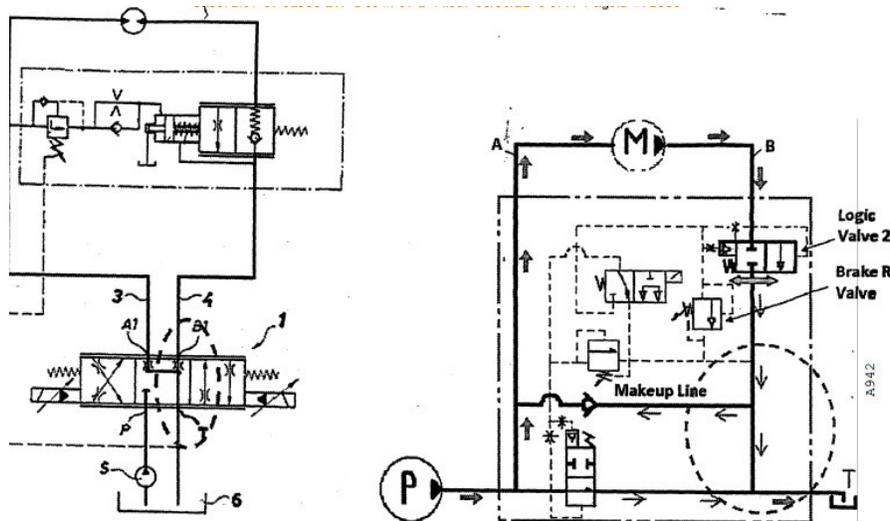
Fig. 7, alleged subroute

J.A. 943 (proposed third line in bold). Cartner maintains the proposed third line could bring fluid from the second fluid line (line B) to the first fluid line (line A) as required by claim 12. See '284 patent col. 10 ll. 1–3, 13–15 (claim-

ing a method comprising “allowing a flow of fluid between [the] first and second fluid lines”).

The limitation requires more, however; the fluid must flow through the third line “without a loss of fluid” to the tank. *Id.* col. 10 ll. 14. Cartner explains that “[w]hether any fluid would flow to the tank would be a function of the dynamic pressure conditions at that time.” Appellants’ Reply Br. 4. Cartner’s theory is that such “dynamic pressure conditions” would at least sometimes circulate fluid “without any loss of fluid” to the reservoir. *Id.* Cartner effectively argues that the Tiger mower infringes the “without a loss of fluid” limitation whenever “some fluid recirculates” past the motor. J.A. 927 (magistrate judge’s Report & Recommendation). This argument is objectively unreasonable because “by that interpretation there would be no ‘loss of fluid’ in Ewald’s device either.” J.A. 927.

The district court properly held it was frivolous to argue the Tiger mower infringed when “reasonable review” of the Tiger schematic showed its similarity to the prior art Ewald system. *Cartner III*, 2011 WL 4457665, at *3. Cartner does not contest that the Tiger schematic depicts a system similar to Ewald in this respect.



See J.A. 942 (showing the Ewald diagram on the left, and the Tiger schematic on the right). The district court correctly concluded it was objectively unreasonable for Cartner to argue the Tiger mower could meet the “without a loss of fluid” limitation when that limitation was added to distinguish a system that was, in relevant part, the same as the Tiger mower.

B. The “Regulated by a Relief Valve” Limitation

Claims 5 and 12 recite a third fluid line that “selectively communicates [the] first and second fluid lines *as regulated by [a] relief valve.*” ’284 patent col. 9 l. 1, col. 10 l. 22 (emphasis added). The parties agreed this limitation requires that the “[r]elief valve controls whether and how much fluid may flow” in the third line. *Cartner III*, 2011 WL 4457665, at *4.

As discussed, Cartner argues the Tiger mowers contain a third fluid line that flows from the second fluid line to the first fluid line through the brake relief valve and the makeup line. In his arguments on the “without a loss of fluid” limitation, Cartner stated the fluid would follow this path during an emergency shutdown, when “dynamic pressure conditions” diverted the fluid away from its normal route into the reservoir. See Appellants’ Br. 30; Reply Br. 2, 4. In an attempt to also meet the “regulated by a relief valve” limitation, Cartner argues it is the *brake relief valve* in the Tiger mower, not the dynamic pressure conditions, that “controls” fluid in the proposed “third line.” The district court found this contention frivolous, because “Mr. Cartner himself acknowledged factors other than the brake relief valve on the Tiger mower regulated ‘whether and how much fluid’ flowed through the Tiger mower ‘makeup line.’” *Cartner III*, 2011 WL 4457665, at *3.

On appeal, Cartner argues the brake relief valve does “control” how much fluid flows through the third line because the brake relief valve must be open for fluid to

follow that path. Appellants' Br. 26–27, 31–32. Although conceding the brake relief valve is not the sole mechanism controlling such flow, Cartner contends that the parties' agreed construction requires only that the relief valve "controls" the flow, not that it "*solely* controls" it. Appellants' Reply Br. 6.

The district court properly determined this argument was frivolous and contradicted by Cartner's own arguments on the "without a loss of fluid" limitation. Cartner himself states that fluid will travel down this proposed third fluid line only when (1) there is an emergency shutdown and (2) the dynamic pressure conditions force the fluid to recirculate past the motor, instead of following the second fluid line toward the reservoir. *See, e.g., id.* at 4. Although the brake relief valve must be open for the fluid to follow this path, there is no reasonable argument that the brake relief valve "controls whether and how much fluid may flow." The district court correctly held Cartner's arguments with respect to the "relief valve" limitation were frivolous.

C. The "Disconnected" Limitation

Finally, the district court found Cartner engaged in litigation misconduct with respect to claim 12's "disconnected" limitation. In particular, it found: (1) Cartner's literal infringement argument was frivolous, and (2) Cartner pursued its doctrine of equivalents argument in bad faith. J.A. 9.

The preamble of claim 12 recites a method for decelerating a hydraulic motor "when the motor is disconnected from a hydraulic pump."¹ '284 patent col. 10 l. 2.

¹ Cartner does not contest that the preamble constitutes a limitation of claim 12. *See Applied Materials, Inc. v. Adv. Semiconductor Materials Am., Inc.*, 98 F.3d 1563, 1572–73 (Fed. Cir. 1996) ("Whether a preamble stating

During the *Markman* proceeding in the district court, Cartner argued the “disconnected” limitation means that “[t]he pump is not delivering pressurized hydraulic fluid to the motor.” J.A. 68. The district court rejected this broad interpretation, instead concluding the “mechanical condition of disconnection” in claim 12 requires that “the pump and motor are not connected, such that fluid cannot flow from the pump to the motor.” *Cartner I*, 2008 WL 2169005, at *10.

Cartner did not contest this claim construction on appeal to this court, but nonetheless continued to assert infringement on remand until moving to dismiss the case on February 22, 2010. The district court found that “[a]ny allegation of literal infringement” after the claim construction order was frivolous. *Cartner III*, 2011 WL 4457665, at *4. Cartner conceded it would be frivolous to argue the Alamo and Tiger mowers literally meet the “disconnected” limitation, but argued it was “prepared to assert infringement” under the doctrine of equivalents. Appellants’ Br. 36. The district court rejected this argument, finding that Cartner’s “presumptive reliance upon an unrevealed theory of infringement by equivalents[] amount[ed] to bad faith sufficient to find exceptional circumstances under § 285.” *Cartner III*, 2011 WL 4457665, at *4 (explaining Cartner “provide[d] no indication, during the entire prosecution of the case, that it regarded the ‘disconnected’ limitation as an infringement by equivalents”).

On appeal, Cartner says he was not required to disclose his reliance on the doctrine of equivalents. Although

the purpose and context of the invention constitutes a limitation of the claimed process is determined on the facts of each case in light of the overall form of the claim, and the invention as described in the specification and illuminated in the prosecution history.”).

the Northern District of Ohio's current local patent rules require disclosure of doctrine of equivalents contentions, N.D. Ohio Local Patent Rule 3.1, Cartner argues those rules did not become effective until October 22, 2009, over two years after this case was filed, Appellants' Br. 34. The district court could have applied the new rules to this action pursuant to Local Patent Rule 1.6, but apparently never did. *See* N.D. Ohio Local Patent Rule 1.6 ("For actions pending before the effective date, the Court will confer with the parties and apply these rules as the Court deems practicable."). Accordingly, Cartner maintains that "unless served with an interrogatory asking whether [he was] relying on the doctrine of equivalents, [he was] under no obligation to voluntarily reveal during fact discovery this aspect of [his] theory of the case to Alamo." Appellants' Br. 34.

However, Alamo did serve Cartner with exactly that interrogatory. It asked Cartner to "[d]escribe in detail how the asserted patent claims apply or correspond to each Accused Product, providing a claim(s) chart explaining how each limitation of the asserted patent claims is present in each Accused Product." J.A. 659. Cartner provided an amended response *after* the adverse claim construction,² in which he continued to allege that various aspects of the Alamo and Tiger mowers literally met each relevant claim limitation. He did not mention the doctrine of equivalents. *See* J.A. 663–64. In spite of Cartner's ongoing duty pursuant to Fed. R. Civ. P. 26(e)(1)(A), he never disclosed his intention to rely on the doctrine of equivalents to meet the "disconnected" limitation. *See* Fed. R. Civ. P. 26(e)(1)(A) (requiring parties to supple-

² The district court's claim construction order was issued on May 21, 2008, and Cartner provided his amended response over two months later on August 8, 2008. *See Cartner I*, 2008 WL 2169005; J.A. 660.

ment interrogatory responses “in a timely manner” upon learning “that in some material respect the disclosure or response is incomplete or incorrect”).

The district court found “Cartner was not forthright in answering Alamo’s interrogatories, allowing Alamo to mistakenly cull fact discovery and witness depositions predicated on [Cartner’s] literal infringement theory.” *Cartner III*, 2011 WL 4457665, at *4. On appeal, Cartner argues he did not interpret the interrogatory to require disclosure of his doctrine of equivalents theory and therefore did not act in bad faith by failing to disclose it. Oral Arg. at 5:15–5:33, 6:10–6:30, *Cartner v. Alamo Grp.*, Nos. 2013-1293, -1314, available at <http://www.cafc.uscourts.gov/oral-argument-recordings/all/cartner.html>. Although the interrogatory did not mention the doctrine of equivalents by name, it asked Cartner to “[d]escribe in detail *how* the asserted patent claims apply or correspond to each Accused Product.” J.A. 659 (emphasis added). This language is best interpreted to require disclosure of *all* theories of infringement, including whether infringement is under the doctrine of equivalents.

While Cartner claims he had a good faith belief that disclosure was not required, this court must defer to the district court’s resolution of that factual question. *Molins PLC v. Textron, Inc.*, 48 F.3d 1172, 1186 (Fed. Cir. 1995) (“[T]he district court judge is in the best position to monitor parties’ litigation conduct.”); see also *Highmark*, 687 F.3d at 1310 (“We review factual findings as to subjective bad faith for clear error.”). The district court found that Cartner’s “reliance upon an unrevealed theory of infringement by equivalents[] amount[ed] to bad faith sufficient to find exceptional circumstances under § 285,” *Cartner III*, 2011 WL 4457665, at *4, and this court is not left with the “definite and firm conviction that the district court was in error,” *Alza Corp. v. Mylan Labs., Inc.*, 464 F.3d 1286, 1289 (Fed. Cir. 2006); see also *Lighting World, Inc. v. Birchwood Lighting, Inc.*, 382 F.3d 1354, 1366

(Fed. Cir. 2004) (declining to “second-guess” the district court’s finding on litigation misconduct absent a showing that its findings were “clearly flawed”).³

This court need not determine whether this instance of bad faith, standing alone, would adequately support an exceptional case finding. It is sufficient to conclude that the district court did not clearly err in finding this case exceptional under the “totality of the circumstances.” See *Yamanouchi Pharm. Co. v. Danbury Pharmacal, Inc.*, 231 F.3d 1339, 1347 (Fed. Cir. 2000) (“In assessing whether a case qualifies as exceptional, the district court must look at the totality of the circumstances.”); see also *Beckman Instr., Inc. v. LKB Produkter AB*, 892 F.2d 1547, 1551–52 (Fed. Cir. 1989) (holding that “[v]iewed individually, the specific examples of vexatious conduct recited by the district court [were] somewhat tenuous,” but “when viewed together, we cannot say that the district court’s finding of vexatious litigation was clearly erroneous”). In light of Cartner’s frivolous arguments that the accused products literally infringed the above three claim limitations, and his bad faith conduct with respect to the doctrine of equivalents argument, the district court properly found this case exceptional by clear and convincing evidence. The only remaining question, therefore, is whether the district court abused its discretion in determining the amount of the attorney fee award.

³ Cartner also challenges the district court’s determination that Cartner’s doctrine of equivalents theory is barred by the vitiation doctrine. There is no need to decide whether the vitiation doctrine renders Cartner’s doctrine of equivalents argument “objectively unreasonable,” because the district court’s bad faith finding adequately addresses Cartner’s doctrine of equivalents argument for claim 12’s “disconnected” limitation.

II. Alamo's Cross Appeal

The district court awarded Alamo \$358,516.44 in attorney fees and costs from June 17, 2009, the date of this court's decision in *Cartner II*, until December 21, 2011, the date of Alamo's fee-petition reply brief to the magistrate judge.⁴ The district court adopted the magistrate judge's finding that June 17, 2009, was "the appropriate date [from which to award fees] because it was the earliest date upon which all issues of claim construction had been resolved." *Cartner IV*, 2013 WL 943844, at *4 (quoting J.A. 1106). Although some of the conduct underlying the exceptional case finding predated *Cartner II*, the district court explained "it was only then that [Cartner's] continued assertions of infringement became clearly unjustified. At that point, with all issues of claim construction resolved, [Cartner] had no reasonable basis upon which to prolong litigation, but [he] did so nonetheless." *Id.*

On appeal, Alamo contends that Cartner's arguments became frivolous much earlier in the litigation, and that the district court abused its discretion in failing to award fees as of an earlier date. Alamo argues there was no reason to delay accrual of fees until *Cartner II*, because that appeal "had nothing to do with the three claim limitations" at issue here. Cross Appellant's Br. 36. "Rather, the prior appeal concerned the proper construction of a different claim term, 'said flow control orifice being constantly operative.'" *Id.* (quoting J.A. 408).

A district court abuses its discretion when its "decision is based on clearly erroneous findings of fact, is based on erroneous interpretations of the law, or is clearly unreasonable, arbitrary[,] or fanciful." *Forest Labs., Inc.*

⁴ Neither party contests the end date of the fee award.

v. Abbott Labs., 339 F.3d 1324, 1328 (Fed. Cir. 2003) (internal quotation marks and citation omitted). It was reasonable for the district court to start calculating the attorney fee award as of this court's prior decision in *Cartner II*, which resolved invalidity and rendered all claim constructions final. The district court's exceptional case finding was closely tied to constructions of the relevant claim limitations. At least two of Cartner's arguments were found unreasonable in view of the relevant claim constructions: (1) the "relief valve" limitation was found frivolous in light of the parties' agreed-upon construction, and (2) the "disconnected" limitation was found frivolous in light of the district court's claim construction. Although the "without a loss of fluid" limitation arguably became frivolous as of August 10, 2007, when Cartner received the Tiger schematic, this limitation applies only to the Tiger mowers, not the Alamo mowers. To the extent Alamo contends the district court should have calculated different start dates for the Alamo mowers and the Tiger mowers, the district court did not abuse its discretion in selecting one date applicable to all accused products.

Alamo further argues "*the latest date* that the case against both the Tiger and Alamo mowers became frivolous" was May 21, 2008, the date of the district court's claim construction decision in *Cartner I*. Cross Appellant's Br. 40. However, *Cartner I*'s construction of the "control orifice" limitation also rendered claims 5 and 12 invalid for lack of written description. Cartner reasonably appealed the proper construction of that claim term and prevailed. *See Cartner II*, 333 Fed. App'x at 565. It would be error to require Cartner to pay Alamo's attorney fees and costs for litigating an appeal in which Cartner prevailed. *See Phonometrics, Inc. v. Westin Hotel Co.*, 350 F.3d 1242, 1250 (Fed. Cir. 2003) (holding the district court erred by awarding attorney fees incurred in connection with the nonmovant's successful appeals).

This court's decision in *Cartner II* vacated the invalidity judgment and left Cartner free to pursue infringement, at which point Cartner was plainly unjustified in prolonging the litigation. *See MarcTec*, 664 F.3d at 919–21 (holding it was litigation misconduct for a plaintiff to “persist[] in advancing unfounded arguments that unnecessarily extended [the] litigation,” and that plaintiff’s “decision to continue the litigation after claim construction” supported the exceptional case finding). The district court’s award of \$358,516.44 properly reflects the “*extra legal effort*” Alamo had to expend to “counteract [Cartner’s] misconduct.” *See Highmark*, 687 F.3d at 1316 (quoting *Beckman*, 892 F.2d at 1553). The attorney fees award is affirmed.

CONCLUSION

For the foregoing reasons, and because this court finds Cartner’s remaining arguments unpersuasive, the district court’s exceptional case finding and attorney fees award under 35 U.S.C. § 285 are affirmed.

AFFIRMED

No costs.