

IN THE UNITED STATES DISTRICT COURT
FOR THE NORTHERN DISTRICT OF ILLINOIS
EASTERN DIVISION

LEDERGERBER MEDICAL)	
INNOVATIONS, LLC, and)	
DR. WALTER LEDERGERBER)	
)	Case No. 07 C 1593
Plaintiffs,)	
v.)	Judge Virginia M. Kendall
)	
W.L. GORE & ASSOCIATES, INC.,)	
)	
Defendant.)	

MEMORANDUM OPINION AND ORDER

Plaintiffs Ledergerber Medical Innovations, LLC (“Ledergerber”) and Dr. Walter Ledergerber (“Dr. Ledergerber”) filed suit against Defendant W.L. Gore & Associates, Inc. (“Gore”) alleging direct infringement of United States Patent No. 6,921,418 (“the ’418 patent”). Gore moves for summary judgment on patent invalidity and non-infringement grounds. Gore also moves for leave to file recently decided additional authority in support of its Motions; the Court grants that Motion and has considered the authority presented by Gore, *Anascape Ltd. v. Nintendo of America, Inc.*, 601 F.3d 1333 (Fed. Cir. 2010), and the parties’ filings regarding the application of that authority, in its analysis. For the reasons set forth below, Gore’s Motion for Summary Judgment of Invalidity of the ’418 patent is granted. Gore’s Motion for Partial Summary Judgment of Non-Infringement is denied as moot.

STATEMENT OF UNDISPUTED FACTS¹

Dr. Ledergerber is the inventor and owner of the '418 patent. (Pl. 56.1 Inv. Resp. ¶ 2.) Ledergerber is a Delaware company with its principal place of business in Chicago, Illinois, and is the exclusive licensee of Dr. Ledergerber's rights in the '418 patent. (Pl. 56.1 Inv. Resp. ¶ 3.) Gore is a Delaware corporation that manufactures and sells the Preclude MVP, a medical implant covering. (Pl. 56.1 Non-inf. Resp. ¶ 30.)

I. The Patent Application and Examination

Dr. Ledergerber filed a patent application on March 19, 2001, which eventually issued as the '418 patent on July 26, 2005. (Pl. 56.1 Inv. Resp. ¶ 8.) The issued patent is called "Dual-Sided, Texturized Biocompatible Structure." (*Id.*)

The claims of the initial patent application were as follows:

Claim 1: An implantable sheet for implantation in a body comprising: An implantable sheet of ePTFE having a first surface and a second surface, the first surface being non-textured, and the second surface being textured, the second surface having: a plurality of continuous, parallel channels extending into the thickness dimension of the sheet, the channels being formed by cutting the second surface of the sheet, a plurality of ridges disposed between the channels, forming troughs and the second surface comprising a pattern of ridges and troughs, the pattern including a plurality of parallel wells.

Claim 2: The sheet of claim 1 wherein each channel has a cross-sectional dimension of varying width.

¹ Throughout this Opinion, citations to Ledergerber's Response to Gore's Statement of Facts in Support of Motion for Summary Judgment of Invalidity of the '418 Patent and Statement of Additional Facts have been abbreviated to "Pl. 56.1 Inv. Resp. ¶ ___."; citations to Defendants' Reply to Ledergerber's Response to Gore's Statement of Undisputed Material Facts in Support of Motion for Summary Judgment of Invalidity of the '418 Patent and Statement of Additional Facts have been abbreviated to "Def. 56.1 Inv. Reply ¶ ___."; citations to Ledergerber's Response to Gore's Statement of Facts in Support of Motion for Summary Judgment of Non-Infringement of the Claims of the '418 Patent and Statement of Additional Facts have been abbreviated to "Pl. 56.1 Non-Inf. Resp. ¶ ___."; and citations to Gore's Reply to Ledergerber's Response to Gore's Statement of Facts in Support of Motion for Summary Judgment of Non-Infringement of the Claims of the '418 Patent have been abbreviated to "Def. 56.1 Non-Inf. Reply ¶ ___."

- Claim 3: The sheet of claim 1 wherein the pattern is periodic.
- Claim 4: The sheet of claim 1 wherein the pattern is repetitive.
- Claim 5: The sheet of claim 1 wherein the pattern is uniform.
- Claim 6: The sheet of claim 1 comprising a laminated structure.
- Claim 7: The sheet of claim 1 wherein the plane of the ridge regions is substantially parallel to the plane of the trough regions.
- Claim 8: The sheet of claim 1 wherein the second surface is arranged to stimulate high tissue ingrowth.
- Claim 9: The sheet of claim 1 wherein the second surface is arranged to disorganize scar tissue.
- Claim 10: The sheet of claim 1 wherein the channels and ridges are straight.
- Claim 11: The sheet of claim 1 wherein the first surface is substantially planar.
- Claim 12: The sheet of claim 1 wherein the channels comprise v-shaped cuts.

(Pl. 56.1 Inv. Resp. ¶9.) The specification of the '418 patent states: "The implant coverings usable in connection with this invention may be manufactured from any material which promotes limited tissue ingrowth into the material, and has a high biocompatibility and low reactivity and disorganizes scar tissue at the implant/body interface. Expanded PTFE (ePTFE) is a preferred material for this invention." (Pl. 56.1 Inv. Resp. ¶ 10.)

The '418 patent issued from application 09/813,091, and was the sixth in a continuously pending chain of applications. (Pl. 56.1 Inv. Resp. ¶ 12.) The first patent application in the chain is application 07/137,871, which was filed on December 22, 1987 and issued as U.S. Patent No. 5,282,856. (Def. 56.1 Inv. Reply ¶ 6.) Each of the subsequent five applications in the chain references the earlier applications, and each application purports to be a divisional, continuation or

continuation-in-part of a preceding application. (*Id.*) Application 08/823,119, which eventually issued as U.S. Patent No. 6,228,116, was the application in the chain immediately preceding the application for the '418 patent, and was the only application pending in the U.S. Patent & Trademark Office (PTO) when application 09/813,091 for the '418 patent was filed on March 19, 2001. (Pl. 56.1 Inv. Resp. ¶¶ 13, 14.) Application '116 describes a medical “tissue expander,” and was not a direct copy of the entire contents of Dr. Ledergerber’s original 1987 application, but rather only a continuation-in-part of that earlier application. (Pl. 56.1 Inv. Resp. ¶¶ 15, 38.)

Application 08/823,119 is a continuation in part of application no. 08/198,651, the third in the chain of applications, which issued as U.S. Patent No. 5,653,755 (“’755 patent”). (Pl. 56.1 Inv. Resp. ¶ 17.) The specification of application 08/198,651 and the ‘755 patent that issued from that application included a drawing (Fig. 10) and descriptive text disclosing (a) a dual-textured sheet of ePTFE, i.e., a sheet of ePTFE having a first surface that is non-textured (smooth) and a second surface that is textured (not smooth) and (b) in which the textured surface has a plurality of continuous, parallel channels and ridges forming troughs and a plurality of parallel wells. (Pl. 56.1 Inv. Resp. ¶ 18.) The specification also included text stating that the implant coverings of the invention “may be manufactured from any material which promotes limited tissue ingrowth into the material, and has a high biocompatibility and low reactivity and disorganizes scar tissue at the implant/body interface. Expanded PTFE (PTFEe) is a preferred material for this invention.” (Pl. 56.1 Inv. Resp. ¶ 19.)

In an Office Action dated November 6, 2003, the patent examiner rejected the claims in the '418 patent application because they did not provide an adequate written description of the invention as required by 35 U.S.C. § 112 ¶ 1. (Pl. 56.1 Inv. Resp. ¶ 26.) In response, Dr. Ledergerber

amended the specification of the '418 patent application on August 29, 2002 and April 7, 2003 to add what became Fig. 12 of the '418 patent and its associated descriptive text. (Pl. 56.1 Inv. Resp. ¶ 27.) Dr. Ledergerber also added the text now at column 8 lines 22-67 of the '418 patent which states in substance that any biocompatible material can be used in practicing the invention and that ePTFE is a preferred material. (*Id.*) The PTO Examiner initially disapproved the applicant's request to add Fig. 12 to the drawings as constituting "new matter," but eventually withdrew the objection because '418 patent application 09/813,091 expressly "incorporated by reference" the '755 patent in its "entirety." (Pl. 56.1 Inv. Resp. ¶¶ 32, 33.) After the August 29, 2002 and April 7, 2003 amendments were permitted, the PTO examiner withdrew the initial rejection of the claims. (Pl. 56.1 Inv. Resp. ¶ 34.)

The '116 patent does not contain Fig. 12 and its descriptive text, but does refer to two other patents owned by Dr. Ledergerber, specifically U.S. Patent Nos. 4,955,907 and 5,383,929. (Pl. 56.1 Inv. Resp. ¶ 38, Def. 56.1 Inv. Reply ¶ 32.) Fig. 12 and its descriptive text was disclosed in each of the first three patent applications in the patent chain, including the application which issued as patent '755. (Def. 56.1 Inv. Reply ¶ 6.)

II. Non-Infringement

Plaintiffs assert that Gore's PRECLUDE MVP products infringe claims 1-6, 8, and 10-11 of the '418 patent. (Pl. 56.1 Non-Inf. Resp. ¶ 34.) Gore describes its product as being "composed of a trilaminate design that includes layers of ePTFE sandwiching a layer of a GORE proprietary elastomeric perfluoropolymer known within Gore as PATT." (Def. 56.1 Non-Inf. Reply ¶ 9.) Gore further describes the product as an "ePTFE membrane" that has "a smooth barrier that is intended

to minimize neural tissue attachment and an ingrowth surface that is intended for biological fixation and sealing.” (Def. 56.1 Non-Inf. Reply ¶ 18.)

Gore’s PRECLUDE product is composed of three parts - the “DAB,” the “PATT,” and the “SLIM.” (Pl. 56.1 Non-Inf. Resp. ¶ 30.) The bottom layer, referred to as the Dura Adhesion Barrier (DAB), is a sheet of ePTFE with an exposed “non-textured” (i.e., smooth) surface. (Pl. 56.1 Non-Inf. Resp. ¶ 31, Def. 56.1 Non-Inf. Reply ¶ 11) The middle layer, or “PATT,” is an amorphous copolymer of tetrafluoroethylene and perfluoromethylvinyl ether. (Pl. 56.1 Non-Inf. Resp. ¶ 32.) PATT is a nonporous material which does not permit tissue ingrowth into its surface. (Pl. 56.1 Non-Inf. Resp. ¶ 33.) The top layer, referred to as Single Layer Ingrowth Material (SLIM), is composed of a layer of ePTFE (Def. 56.1 Non-Inf. Reply ¶ 11).

As part of the manufacturing process for the PRECLUDE MVP product, the “DAB,” “PATT,” and “SLIM” layers of material are laminated together to form a composite sheet, with the “PATT” layer sandwiched between the “DAB,” and “SLIM” ePTFE layers. (Def. 56.1 Non-Inf. Reply ¶ 12.) Following this lamination, the top layer of ePTFE is laser etched in a linear pattern down to the middle PATT layer, resulting in a textured (non-smooth) surface having a linear pattern of “ridges and valleys.” (Def. 56.1 Non-Inf. Reply ¶ 16.)

STANDARD OF REVIEW

Summary judgment is proper when “the pleadings, depositions, answers to interrogatories, and admissions on file, together with the affidavits, if any, show that there is no genuine issue as to any material fact and that the moving party is entitled to judgment as a matter of law.” Fed. R. Civ. P. 56(c). In determining whether a genuine issue of fact exists, the Court must view the evidence and draw all reasonable inferences in favor of the party opposing the motion. *Bennington v.*

Caterpillar Inc., 275 F.3d 654, 658 (7th Cir. 2001); *see also Anderson v. Liberty Lobby, Inc.*, 477 U.S. 242, 255 (1986). However, the Court will “limit its analysis of the facts on summary judgment to evidence that is properly identified and supported in the parties’ [Local Rule 56.1] statement.” *Bordelon v. Chi. Sch. Reform Bd. of Trs.*, 233 F.3d 524, 529 (7th Cir. 2000). Where a proposed statement of fact is supported by the record and not adequately rebutted, the court will accept that statement as true for purposes of summary judgment. An adequate rebuttal requires a citation to specific support in the record; an unsubstantiated denial is not adequate. *See Albiero v. City of Kankakee*, 246 F.3d 927, 933 (7th Cir. 2001); *Drake v. Minn. Mining & Mfg. Co.*, 134 F.3d 878, 887 (7th Cir. 1998) (“Rule 56 demands something more specific than the bald assertion of the general truth of a particular matter[;] rather it requires affidavits that cite specific concrete facts establishing the existence of the truth of the matter asserted.”).

DISCUSSION

I. Defendants’ Motion for Summary Judgment of Invalidity of the Claims of the ’418 Patent

A patent is presumed to be valid. *See Proctor & Gamble Co. v. Teva Pharm. USA, Inc.*, 566 F.3d 989, 994 (Fed. Cir. 2009). Clear and convincing evidence, sufficient to “place[] in the fact finder an abiding conviction that the truth of [the] factual contentions [is] highly probable,” is necessary to invalidate a patent. *Id.* (internal quotation omitted); *see also Eisai Co. Ltd. v. Dr. Reddy’s Labs., Ltd.*, 533 F.3d 1353, 1356 (Fed. Cir. 2008) (noting “the movant’s burden to prove invalidity by clear and convincing evidence”).

A patent whose invention is disclosed or described in prior written materials more than one year before the patent issues is invalid under 35 U.S.C. § 102(b) unless the patent is, for some

reason, entitled to the benefit of an earlier filing date. A prior patent is a written publication, and an inventor's own prior patent can raise a § 102(b) invalidity bar. *See Lacks Indus., Inc. v. McKechnie Vehicle Components USA, Inc.*, 322 F.3d 1335, 1346 (Fed. Cir. 2003).

A. The 35 U.S.C. § 120 “Benefit of an Earlier Filing Date” Allowance

Here, the invention disclosed in the '418 patent (issued in 2005) is referenced in the '755 patent (issued in 1997), and would thus be within the scope of § 102(b). Ledergerber claims that the '418 patent is valid notwithstanding that disclosure, however, because it is entitled to the benefit of the earlier filing date of 1987, the year in which the first application in a continuous series was filed. Section 120 of the Patent Act allows for such a claim if certain requirements are met, namely: (1) the invention claimed must have been claimed in a prior-filed application; (2) the prior-filed application must have been filed by the same inventor; (3) the patent application is filed before the termination of proceedings of an application entitled to the filing date of the first application; and (4) it must contain a specific reference to the earlier filed application. “The plain and unambiguous meaning of [§] 120 is that any application fulfilling the requirements therein shall have the same effect as if filed on the date of the application upon which it claims priority.” *Transco Prods., Inc. v. Performance Contracting, Inc.*, 38 F.3d 551, 556 (Fed. Cir. 1994) (internal quotation omitted). Critical to the § 120 analysis is the question of whether “the claims of the later-filed application [are] supported by the written description in the parent” such that it is clear “that the inventor invented the claimed invention as of the filing date sought.” *Anascape, Ltd.*, 601 F.3d at 1335.

The parties do not dispute that Dr. Ledergerber's original 1987 application disclosed the invention described in the '418 patent or that both the original and the '418 patents were filed by the same inventor. Nor do the parties dispute that one of the patent applications in the chain was

pending at the time that the application, which became the '418 patent, was filed. The sole issue is whether the final requirement, continuity of disclosure of the claimed invention, was met here. In plain terms, in order for the last patent application in a series of any length to be entitled to the priority date of the parent application, continuity of disclosure of the claimed invention must be maintained through the chain of patents leading up to the patent-in-suit. *See, e.g., Zenon Envtl., Inc. v. U.S Filter Corp.*, 506 F.3d 1370, 1378 (Fed. Cir. 2007). That disclosure must meet the requirements of 35 U.S.C. § 112 ¶ 1, specifically, it must “contain a written description of the invention” sufficient to “enable any person skilled in the art to which it pertains . . . to make and use the same.”

Here, therefore, if continuity of written disclosure of the claimed invention was not maintained through the chain of patent applications which began in 1987, then the '418 patent would be invalid for anticipation under 35 U.S.C. § 102(b). If, however, the continuity of disclosure was maintained, then the application which issued as the '418 patent is entitled to the priority date of the first application in the chain, which predated the allegedly anticipatory description contained in the '755 patent, and the '418 patent would be valid. Application no. 09/813,091, which issued as the '418 patent, was the sixth in the chain of applications at issue here, but application 08/823,119 (for the '116 patent) was the only application still pending in the PTO when application no. 09/813,091 was filed. Since the '119 application was the only patent application pending when the application for the '418 patent was filed, continuity must be achieved through that application per the terms of 35 U.S.C. § 120, which requires co-pendency of applications.²

² For this reason, Ledergerber's focus on the “family of applications and patents,” and its exhaustive survey of the claims made in other applications, is unhelpful. Section 120 by its plain language requires that the application sought to be used for purposes of claiming an earlier filing date have been pending at the time the later application was filing,

B. The 35 U.S.C. § 112 Written Description Requirement

“In order to gain the benefit of the filing date of an earlier application under 35 U.S.C. § 120, each application in the chain leading back to the earlier application must comply with the written description requirement of 35 U.S.C. § 112.” *Lockwood v. Am. Airlines*, 107 F.3d 1565 (Fed. Cir. 1997). Section 112 of the Patent Act states that the “specification shall contain a written description of the invention.” 35 U.S.C. § 112. “To satisfy the written description requirement, the disclosure of the earlier filed application must describe the later claimed invention ‘in sufficient detail that one skilled in the art can clearly conclude that the inventor invented the claimed invention as of the filing date sought.’” *Tech. Licensing Corp. v. Videotek, Inc.*, 545 F.3d 1316, 1331 (Fed. Cir. 2008) (quoting *Lockwood*, 107 F.3d at 1572). However, “the earlier application need not describe the claimed subject matter in precisely the same terms as found in the claims at issue.” *Id.* “Compliance with the written description requirement is a question of fact but is amenable to summary judgment in cases where no reasonable fact finder could return a verdict for the non-moving party.” *PowerOasis, Inc. v. T-Mobile USA, Inc.*, 522 F.3d 1299, 1307 (Fed. Cir. 2007).

1. The Essential Material of the Invention Disclosed in the ’418 Patent

First, it is clear from the circumstances of the patent prosecution history that the essential material of the ’418 patent—that is, the material essential to an adequate description of the claimed invention as required by 35 U.S.C. § 112—is the material disclosed in Fig. 12 and its associated text. That graphic and text were directly taken from one of Dr. Ledergerber’s earlier patents, the ’755 patent, which explicitly claimed a medical implant covering with many similarities to the one described in the ’091 application. It is undisputed that the patent examiner initially rejected the ’091

and it is undisputed that only the ’119 application met that criteria.

application pursuant to § 112, only to then accept it after Dr. Ledergerber added Fig. 12 and its text.³ Thus, it is apparent that it was the addition of Fig. 12 and the associated descriptive text that satisfied the patent examiner's initial concern that the invention claimed in the '091 application was not adequately described. This material is therefore essential to the written description of the invention claimed by the '418 patent. As a result, it is this material that must have been disclosed either by explicit written description or by reference in the parent application to the '091 application and '418 patent, which was the '119 application.

2. Explicit Written Description

It is undisputed that the '119 application, which was in the same family of patents but which claimed a medical "tissue expander" and not a covering for medical implant devices, did not contain Fig.12, its associated text, or any materially similar information. There is no explicit written disclosure in the '119 application of a dual-textured ePTFE sheet with one textured and one-non textured side for use as a covering for medical implant devices, which is the core disclosure of the '418 patent. Ledergerber's argument to the contrary, which points to Fig. 10 of the '119 application, is not persuasive; Fig. 10 describes a textured covering made of silicone via "injection molding" and "easily texturized with any desired form or pattern." This description would not allow an individual of ordinary skill in the art to conclude that Dr. Ledergerber had also invented the dual-sided sheet of ePTFE made in a specific texture that is claimed by the '418 patent. *See Anascape, Ltd.*, 601 F.3d

³ Ledergerber argues that the examiner's allowance of the '091 application after the addition of this material necessarily implies his approval of the 1987 priority date for the application, because the examiner was aware of the prior art and would not have allowed the patent to issue unless it was entitled to that priority date. There is no written evidence that the examiner considered this issue, however, other than the self-serving testimony of Dr. Ledergerber's patent attorney. In light of the undisputed facts and the Court's legal analysis, which indicate that the application was not properly entitled to the earlier priority date, Ledergerber's assumption that the patent examiner found to the contrary is not persuasive.

at 1335. Even if the '418 ePTFE sheet might be, as Ledergerber's expert testified, a possible variation of the '119 application's Fig. 10 and associated text, a patent cannot be "presumed to support variants that are not described," which the ePTFE sheet simply is not. *Anascape, Ltd.*, 601 F.3d at 1339. Thus, there is no explicit written disclosure in the '119 application of the particular invention claimed in the '418 patent, so required by § 120.

In spite of this lack of an explicit written description, however, the '119 application may have continued the claims of the earlier patents in the chain, sufficient to serve for purposes of § 120 continuity of disclosure, if it incorporated the necessary contents of those earlier patents and applications by explicit reference.

3. Incorporation by Reference

"Incorporation by reference 'provides a method for integrating material from various documents into a host document . . . by citing such material in a manner that makes clear that the material is effectively part of the host document as if it were explicitly contained therein.'" *Zenon Env'tl*, 506 F.3d at 1378 (quoting *Cook Biotech Inc. v. Acell, Inc.*, 460 F.3d 1365, 1376 (Fed. Cir. 2006)). For material to be deemed incorporated by reference, "the host document must identify with detailed particularity what specific material it incorporates and clearly indicate where that material is found in the various [referenced] documents." *Id.* A "mere reference to another application, or patent, or publication" without particular identification of specific material, however, is not an incorporation of anything therein. . . ." *Callaway Golf Co. v. Acushnet Co.*, 576 F.3d 1331, 1346 (Fed. Cir. 2009). "Whether material has been incorporated by reference into a host document, and the extent to which it has been incorporated, is a question of law" and thus suitable for resolution at summary judgment. *Id.* "In making that determination, 'the standard of one reasonably skilled

in the art should be used to determine whether the host document describes the material to be incorporated by reference with sufficient particularity.” *Id.* at 1378-79 (quoting *Advanced Display Sys., Inc. v. Kent State Univ.*, 212 F.3d 1272, 1282 (Fed. Cir. 2000)).

Here, the ‘119 application did not specifically and explicitly incorporate Fig. 12 and the descriptive text—the essential material of the ‘418 patent and thus material that must have been continuously disclosed through the length of the chain in order for the ‘418 patent to claim the earliest priority date—from the ‘755 patent. The ‘119 application identified the prior applications in the chain, but it did not specifically indicate that it was incorporating the disclosures of those applications. As a matter of law, the mere notation of prior applications is not sufficient to incorporate by reference any contents of those prior applications. *See Application of De Seversky*, 474 F.2d 671, 674 (CCPA 1973). The ‘119 application does not specifically describe, for purposes of incorporation by reference, anything materially similar to Fig. 12 and its associated text, and thus does not incorporate those portions of the earlier applications and patents. In contrast, the ‘119 application does specifically state its intent to incorporate by reference portions of U.S. Patent No. 5,383,929 involving a pressure-adaptive structure. The absence of any such language with respect to other specific elements of the earlier patents reflects that they are not incorporated by reference with the necessary particularity and specification.

Based on the ‘119 application’s bald references to the prior patent and application numbers alone, an individual of ordinary skill in the art would have no way of knowing that Dr. Ledergerber was, at that time, in possession of the invention later claimed in the ‘418 patent. *See Tech. Licensing Corp.*, 545 F.3d at 1331. The reference to the earlier applications and patents in

the chain contained in the '119 application was therefore insufficient to satisfy the written description requirement of § 112 as required for continuity of disclosure under § 120.

CONCLUSION AND ORDER

In order for the '418 patent to be entitled to a 1987 priority date under the terms of 35 U.S.C. § 120, the invention claimed in the '418 patent must have been disclosed, either explicitly or by reference, in the '119 application, the only simultaneously pending application in the chain. It was not so disclosed. Therefore, the requirements of § 120 are not met here and the '418 patent is not entitled to the 1987 priority date. As the invention claimed in the '418 patent was undisputedly described in the '755 patent, which issued in 1997 more than three years before the application that became the '418 patent was filed, the '418 patent is invalid for anticipation under 35 U.S.C. § 102(b). The Court need not determine the moot issue of whether Gore has infringed the '418 patent.

Gore's Motion for Leave to file recently decided authority is granted. Gore's Motion for Summary Judgment of Patent Invalidity of U.S. Patent No. 6,921,418 is granted. Gore's Partial Motion for Summary Judgment of Non-Infringement is denied as moot.



Virginia M. Kendall
United States District Court Judge
Northern District of Illinois

Date: September 1, 2010