

Patent Owner's Preliminary Response
IPR2025-00188 (U.S. Patent No. 8,982,691)

UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE PATENT TRIAL AND APPEAL BOARD

CISCO SYSTEMS, INC,
Petitioner,

v.

WSOU INVESTMENTS d/b/a BRAZOS LICENSING AND
DEVELOPMENT,
Patent Owner.

Case IPR2025-00188
Patent 8,982,691

**PATENT OWNER'S PRELIMINARY RESPONSE
UNDER 35 U.S.C. §§ 311-19 AND 37 C.F.R. § 41.100, ET SEQ.**

TABLE OF CONTENTS

I.	INTRODUCTION	1
II.	INSTITUTION SHOULD BE DENIED UNDER 35 U.S.C. § 314(A).....	2
A.	<i>Fintiv</i> Factor 1: Petitioner Has Not Requested a Stay of the District Court Proceeding, nor Is the District Court Likely to Grant One	5
B.	<i>Fintiv</i> Factor 2: Trial in the District Court Will Occur Months Before the Board’s Deadline for a Final Written Decision.....	8
C.	<i>Fintiv</i> Factor 3: The Court and the Parties Have Invested Heavily in the Parallel Proceeding.....	11
D.	<i>Fintiv</i> Factor 4: The Petition and the Parallel Proceeding Raise Almost Completely Overlapping Issues.....	13
E.	<i>Fintiv</i> Factor 5: The Petitioner Is the Parallel Proceeding Defendant	19
F.	<i>Fintiv</i> Factor 6: No Other Circumstances Outweigh the Factors Favoring Denial of Institution.....	19
III.	THE CHALLENGED PATENT—U.S. PATENT NO. 8,982,691	22
A.	Overview	22
B.	Claims of the ’691 Patent.....	27
C.	Notice of Allowance of the ’691 Patent.....	28
IV.	PERSON OF ORDINARY SKILL IN THE ART (POSITA)	28
V.	CLAIM CONSTRUCTION.....	29
VI.	PETITIONER DOES NOT SHOW THAT EITHER OF SUBSTANTIVE GROUNDS 1 OR 2 ARE REASONABLY LIKELY TO SUCCEED.....	29
A.	Legal Standard for Obviousness	30
B.	Ground 1: Petitioner Does Not Show That Challenged Claims 1-10 Are Obvious over EDC_525, EDC_892, and Hanif.....	33
1.	Overview of Asserted Prior Art	33
2.	EDC_525 in Combination with EDC_892 and Hanif Does Not Render Obvious the Challenged Claims.....	35

C.	Ground 2: Petitioner Does Not Show That Challenged Claims 1-10 Are Obvious over EDC_525, EDC_892, Hanif, and Li.	40
1.	Overview of Asserted Prior Art	40
2.	EDC_525 in Combination with EDC_892 and Hanif and Li Does Not Render Obvious the Challenged Claims	42
VII.	CONCLUSION	42

TABLE OF AUTHORITIES

CASES

<i>ADT LLC v. Vivint, Inc.</i> , IPR2022-00634, Paper 7 (PTAB Oct. 4, 2022).....	34
<i>Apcon, Inc. v. Gigamon Inc.</i> , IPR2020-01579, Paper 9 (PTAB Mar. 16, 2021).....	23
<i>Apple Inc. v. Fintiv, Inc.</i> , IPR2020-00019, Paper 15 (PTAB May 13, 2020)	2,11
<i>Apple Inc.</i> , 979 F.3d 1332 (Fed. Cir. 2020)	9
<i>Arendi S.A.R.L. v. Apple Inc.</i> , 832 F.3d 1355 (Fed. Cir. 2016)	34
<i>AT&T Serv.</i> , IPR2024-00992, Paper 14 (PTAB Dec. 16, 2024)	14
<i>Becton, Dickinson & Co. v. Tyco Healthcare Group, LP</i> , 616 F.3d 1249 (Fed. Cir. 2010)	42
<i>Boe Tech. Grp. Co. v. Element Cap. Com. Co. Pte. Ltd.</i> , IPR2023-00808, Paper 9, 2023 WL 7715885, (PTAB Nov. 15, 2023)	15
<i>Cisco Sys. Inc., v. Video Solutions Pte. Ltd.</i> , IPR2024-00194, Paper 7 (PTAB Mar. 28, 2024).....	10
<i>Code200, UAB v. Luminate Networks, Ltd.</i> , IPR2020-01506, Paper 10 (PTAB Feb. 16, 2021).....	19
<i>eClinicalWorks, LLC v. Decapolis LLC</i> , IPR2022-00229, Paper 10 (PTAB Apr. 13, 2022)	12
<i>EIS Inc. v. IntiHealth Ger GmbH</i> , No. 19-1227-GBW, 2023 U.S. Dist. LEXIS 188297 (D. Del. Aug. 30, 2023).....	22, 25
<i>E-One, Inc. v. Oshkosh Corp.</i> , IPR2019-00161, Paper 16 (PTAB May 15, 2019)	12
<i>Gen. Plastic</i> , IPR2016-01357, Paper 19 (PTAB Sept. 6, 2017))	13

<i>Headwater Research LLC v. Samsung Elecs. Co.</i> , No. 2:22-CV-00422-JRG-RSP, 2024 U.S. Dist. LEXIS 94021 (E.D. Tex. May 27, 2024).....	6
<i>Heart Failure Techs., LLC v. Cardiokinetix, Inc.</i> , No. IPR2013-00183, Paper 12 (PTAB July 31, 2013)	36
<i>Immersion Sys. LLC v. Midas Green Techs., LLC</i> , PGR2021-00104, Paper 15 (PTAB Jan. 31, 2022)	11
<i>KSR Int’l Co. v. Teleflex Inc.</i> , 550 U.S. 398 (2007)	34, 35
<i>Monsanto Tech. LLC v. E.I. DuPont de Nemours & Co.</i> , 878 F.3d 1336 (Fed. Cir. 2018)	35
<i>NHK Spring Co. Ltd. v. Intri-Plex Techs., Inc.</i> , IPR2018-00752, Paper 8 (PTAB Sept. 12, 2018)	12
<i>NXP USA, Inc. v. Impinj, Inc.</i> , PGR2022-00005, Paper 17 (PTAB May 2, 2022)	11
<i>OpenSky Indus., LLC v. VLSI Tech. LLC</i> , IPR2021-01064, Paper 102 (PTAB Oct. 4, 2022).....	24
<i>Orthopediatrics Corp. v. K2M, Inc.</i> , IPR2018-01548 (PTAB Mar. 1, 2019)	32
<i>Phillips v. AWH Corp.</i> , 415 F.3d 1303 (Fed. Cir. 2005)	32
<i>Plastic Indus. Co. v. Canon Kabushiki Kaisha</i> , IPR2016-01357, Paper 19 (PTAB Sept. 6, 2017)	3
<i>Portsmouth Network Corp. v. Cisco Systems, Inc.</i> , No. 2:23-CV-00441-JRG, Dkt. 77 (E.D. Tex. Oct. 21, 2024)	8
<i>Samsung Elecs. Co. v. Clear Imaging Research, LLC</i> , IPR2020-01401, Paper 12 (PTAB Feb. 17, 2021).....	22
<i>Samsung Elecs.</i> , IPR2020-01401, Paper 12.....	23
<i>Sand Revolution II, LLC v. Cont’l Intermodal Grp.</i> , IPR2019-01393, Paper 24 (PTAB June 16, 2020)	13

Patent Owner’s Preliminary Response
IPR2025-00188 (U.S. Patent No. 8,982,691)

<i>SB IP Holdings, LLC v. Vivint, Inc.</i> , No. 4:21-cv-00912-ALM, Dkt. 59 (E.D. Tex. Apr. 6, 2023)	7
<i>Sipnet EU S.R.O. v. Straight Path IP Group, Inc.</i> , No. IPR2013-00246 (PTAB October 11, 2013).....	36
<i>SK Hynix Inc. v. Netlist, Inc.</i> , Case IPR2017-00561, Paper 36 (PTAB. July 5, 2018).....	35
<i>Sotera Wireless, Inc. v. Masimo Corp.</i> , IPR2020-01019, Paper 12 (PTAB Dec. 1, 2020)	2, 20
<i>Teso LT UAB</i> , IPR2021-00122, Paper 12 (PTAB Apr. 20, 2021).....	19
<i>U.S. Venture, Inc. v. Sunoco Partners Mktg. & Terminals L.P.</i> , IPR2020-00728, Paper 10 (PTAB Oct. 1, 2020)	20
<i>Verizon Bus. Network Servs. LLC v. Huawei Techs. Co.</i> , IPR2020-01278, Paper 12 (PTAB Jan. 26, 2021)	24
<i>WesternGeco LLC v. ION Geophysical Corp.</i> , 889 F.3d 1308 (Fed. Cir. 2018).....	21
<i>William Wesley Carnes, Sr., Inc. v. Seaboard Int’l Inc.</i> , No. IPR2019-00133 (PTAB May 8, 2019).....	36

STATUTES

35 U.S.C § 112	22
35 U.S.C. § 101	22
35 U.S.C. § 103(a)	30
35 U.S.C. § 314(a)	2, 21
37 C.F.R. § 42.100(b)	29
37 C.F.R. § 42.104(b)(3),.....	29
37 C.F.R. § 42.104(b)(4).....	30

EXHIBIT LIST

Exhibit No.	Exhibit Description
2001	<i>WSOU Investments LLC v. Cisco Systems</i> 24-cv-00332 (EDTX) Complaint
2002	<i>WSOU Investments LLC v. Cisco Systems</i> 24-cv-00332 (EDTX) Docket Control Order
2003	'884 Patent 2025-01-30 [4] Filing Date Accorded
2004	Docket Navigator Statistics
2005	Legal Metrics Report
2006	2024-09-23 Defendant's Invalidity Contentions
2007	Ex. D1 - Invalidity Chart – '691 Patent – Elie-Dit-Cosaque
2008	Ex. D3 - Invalidity Chart - '691 Patent – Hanif
2009	U.S. Patent No. 7,113,481
2010	Invalidity Chart - '691 Patent – Park
2011	Ex. D9 - 2024-09-23 Cisco's Ineligibility Contentions
2012	Ex. D - Ineligibility Chart - '691 Patent
2013	U.S. Patent No. 7,352,703
2014	2025-02-28 USPTO Rescinds Memorandum Addressing Denial Procedures

I. INTRODUCTION

Patent Owner WSOU Investments LLC d/b/a Brazos Licensing and Development (“Brazos” or “Patent Owner”) respectfully requests that the Board deny institution of this Petition for *inter partes* review on two grounds.

First—and particularly in light of the Patent Office’s weeks-old guidance reaffirming prior practices—the Board should exercise its discretion and deny institution based on application of the *Fintiv* factors. Owing to Petitioner Cisco Systems, Inc.’s substantial delay in filing the instant Petition, trial in the parallel District Court proceeding will occur over three months before the Board’s deadline to issue a Final Written Decision in this matter. To that end, this Petition is the earliest-filed of at least one other later-filed petition relating to the same trial, with potentially even more petitions to follow. None of these actual or potential petitions will result in a Final Written Decision before the District Court trial. Nor does this Petition raise any significant grounds for invalidity beyond that which Petitioner has asserted in the parallel District Court proceeding—and Petitioner has notably declined to execute a *Sotera* stipulation that would bind Petitioner in that District Court proceeding with respect to any invalidity ground that could have been raised in this Petition.

Second, the Petition fails to demonstrate a reasonable likelihood that Petitioner will succeed in carrying its burden to show that the challenged claims of

Brazos's U.S. Patent No. 8,982,691 (Ex. 1001 or the "'691 Patent") are unpatentable. The Petition asserts two Grounds. Ground 1 alleges that Claims 1-10 of the '691 Patent are obvious over EDC_525, EDC_892, and Hanif. Ground 2 alleges that Claims 1-10 of the '691 Patent are obvious over EDC_525, EDC_892, Hanif, and Li. Both are defective for the same reason: Petitioner fails to properly account for every claim limitation in the order in which they appear in the challenged claims. Accordingly, even if the Board considers the merits of the Petition, no proceeding need be instituted.

II. INSTITUTION SHOULD BE DENIED UNDER 35 U.S.C. § 314(A)

The Board should exercise its discretion to deny institution under *Apple Inc. v. Fintiv, Inc.*, and *Sotera Wireless, Inc. v. Masimo Corp.*, in accordance with the USPTO's February 28, 2025 guidance withdrawing the June 21, 2022 memorandum entitled "Interim Procedure for Discretionary Denials in AIA Post-Grant Proceedings with Parallel District Court Litigation." See IPR2020-00019, Paper 11 (PTAB Mar. 20, 2020) (precedential); IPR2020-01019, Paper 12 (PTAB Dec. 1, 2020) (precedential as to § II.A); see Ex. 2014. Under those authorities, the Board may deny institution of petitions when related litigation is co-pending and an IPR would not be "an effective and efficient alternative to district court litigation." *Gen. Plastic Indus. Co. v. Canon Kabushiki Kaisha*, IPR2016-01357, Paper 19 at 16-17 (PTAB Sept. 6, 2017) (precedential). When evaluating whether to deny a petition

under *Fintiv*, the Board balances six factors:

1. whether the court granted a stay or evidence exists that one may be granted if a proceeding is instituted;
2. proximity of the court's trial date to the Board's projected statutory deadline for a final written decision;
3. investment in the parallel proceeding by the court and the parties;
4. overlap between issues raised in the petition and in the parallel proceeding;
5. whether the petitioner and the defendant in the parallel proceeding are the same party; and
6. other circumstances that impact the Board's exercise of discretion, including the merits.

Fintiv, IPR2020-00019, Paper 11 at 5-6. "These factors relate to whether efficiency, fairness, and the merits support the exercise of authority to deny institution in view of an earlier trial date in the parallel proceeding." *Id.* When analyzing and weighing these factors, the Board takes "a holistic view of whether efficiency and integrity of the system are best served by denying or instituting review." *Id.*

Here, the complaint in the parallel District Court proceeding was filed on May 6, 2024 in the Eastern District of Texas. As a result of the development of that

proceeding, and as explained in further detail below, the balance of the *Fintiv* factors all weigh in favor of denying the Petition. Specifically:

(1) The likelihood of a stay in the parallel proceeding is very low;

(2) Trial in the District Court will have occurred ***more than three months before*** the projected issuance of a final written decision for the '691 Patent (should the Board institute review) because Petitioner waited more than six months after the filing of the Complaint—and several months after filing its invalidity contentions in that parallel proceeding—to file its Petition;

(3) The parties have already conducted significant discovery and will be conducting claim construction in the District Court at the time of the Board's institution decision, with trial to follow shortly thereafter;

(4) There is near-complete overlap in invalidity issues in the District Court proceeding—for which Petitioner has also not provided a *Sotera*-compliant stipulation;

(5) The Petitioner and Defendant in the parallel proceeding are the same party;
and

(6) Petitioner has failed to make out even a *prima facie* case of invalidity based on its asserted prior art references.

A. *Fintiv* Factor 1: Petitioner Has Not Requested a Stay of the District Court Proceeding, nor Is the District Court Likely to Grant One

Petitioner has neither requested a stay in the District Court proceeding, nor has it requested that the trial date be adjusted. And the likelihood of a stay being granted in the District Court proceeding in light of this Petition is very low, as Patent Owner has asserted in that proceeding two additional asserted patents that are unrelated to the '691 Patent, including one patent subject to a later-filed IPR petition (still pending institution decision) with even later projected dates for final written decision (should IPR be instituted as to that patent), and further including one patent not subject to any IPR petition at all. *See* Ex. 2002.

In particular, U.S. Patent No. 9,450,884—which is the subject of IPR petition IPR2025-00429 filed January 9, 2025, nearly eight weeks after the instant Petition—would, if an IPR were instituted as to that patent, receive a projected final written decision on July 30, 2026—approximately *five months after* the March 2, 2026 trial date in the parallel District Court proceeding. *See* Ex. 2002 and Ex. 2003.

Furthermore, asserted U.S. Patent No. 7,386,630, as of filing this Preliminary Response, has had no IPR petition filed, and therefore currently provides no basis for the District Court to stay the proceedings. *See Headwater Research LLC v. Samsung Elecs. Co.*, No. 2:22-CV-00422-JRG-RSP, 2024 U.S. Dist. LEXIS 94021 (E.D. Tex. May 27, 2024) (rejecting stay because “even an ultimate finding [by the

PTAB] invalidating all claims of the other patents would leave material disputes for the Court to decide”). But even if Petitioner elected to file an IPR petition against the '630 Patent in the six weeks remaining before Petitioner is statutorily barred from doing so, it would place a potential final written decision for the '630 Patent *at least six months after* trial will be completed in the parallel proceeding. *See* Ex. 2001 and Ex. 2002. Thus, regardless whether an IPR with respect to the instant '691 Patent is instituted, it is unlikely to simplify the issues before the District Court.

This is particularly true as Patent Owner would oppose any request to stay the District Court litigation owing to the filing of this Petition, because granting a stay of the litigation would unduly prejudice Patent Owner. A stay pending a possible institution decision in this action, a final written decision, and a potential Federal Circuit appeal of the IPR decision would deprive Patent Owner of the ability to timely enforce its patent rights. Indeed, the District Court has already scheduled: the claim construction hearing for September 3, 2025; fact discovery close for October 14, 2025; expert discovery close for November 17, 2025; and trial for March 2, 2026. *See* Ex. 2002 at 1, 3-4. A final written decision in this case (if instituted) would not be expected until June 2026, well after the conclusion of the District Court trial.

Furthermore, even if Petitioner requests a stay in the underlying District Court proceeding (though it has yet to do so), the District Court is unlikely to grant such a

request. Judge Gilstrap of the United States District Court of the Eastern District of Texas denies approximately 82% of contested motions to stay pending IPR. *See* Ex. 2004 (showing nearly 68% and 54% of motions to stay pending IPR denied in 2023 and 2024, respectively); Ex. 2005 at 13 (showing a total win rate of 26.9% and a win rate of 16% in 2024 on contested motions to stay pending IPRs in the Eastern District of Texas); *see also id.* at 61 (showing Judge Gilstrap granting a total of 17.7% contested motions to stay pending IPRs); *see also SB IP Holdings, LLC v. Vivint, Inc.*, No. 4:21-cv-00912-ALM, Dkt. 59 at 2 (E.D. Tex. Apr. 6, 2023) (“When a motion to stay is filed before the PTAB institutes post-grant review, courts in this district typically refrain from ruling on the motion pending action by the PTAB or deny the motion without prejudice to refile in the event that the PTAB institutes a proceeding.”); *Portsmouth Network Corp. v. Cisco Systems, Inc.*, No. 2:23-CV-00441-JRG, Dkt. 77 at 2 (E.D. Tex. Oct. 21, 2024) (“[T]his Court has a consistent practice of denying motions to stay when the PTAB has yet to institute post-grant proceedings.”). Moreover, the significant resources the parties and the District Court are likely to expend up to and shortly after an institution decision in this action may issue—which would encompass at least claim construction, source code review, and infringement and invalidity contentions—make it even less likely that the District Court will look favorably upon any request by Petitioner to stay those proceedings. *See also* § II.C *infra*.

Therefore, because (as even Petitioner admits) there is no evidence of a stay being sought in the parallel proceeding, nor any evidence that such a stay is likely to be granted should such a stay be sought, this first *Fintiv* factor weighs in favor of denying institution.

B. *Fintiv* Factor 2: Trial in the District Court Will Occur Months Before the Board's Deadline for a Final Written Decision

The District Court in the parallel proceeding has set a trial date of March 2, 2026. *See* Ex. 2002 at 1. This trial date is consistent with Petitioner's admitted median time to trial statistics for the E.D. Tex. venue of 21.6 months from filing of the complaint, which indicates a projected February 2026 trial date. *See* Pet. at 14. Furthermore, almost a year has passed since Patent Owner filed the parallel proceeding in District Court, but thus far no movement of the trial date (or any other Court hearing date) has occurred. *See* Ex. 2002 at 1-5 Despite the alignment of both Petitioner's venue statistics and the actual scheduled trial date for the parallel District Court proceeding, Petitioner implicitly asks the Board to disregard these data points indicating when trial will occur, in citing to inapposite case law—concerning a different district court entirely—for the proposition that “a court's general ability to set a fast-paced schedule is not particularly relevant . . . where, like here, the forum itself has not historically resolved cases so quickly.” Pet. at 14 n.1 (citing *In re Apple Inc.*, 979 F.3d 1332 (Fed. Cir. 2020)). But adopting Petitioner's improper approach—

which asks that the Board disregard the data showing that the Eastern District of Texas, and Judge Gilstrap in particular, can reasonably be expected to return a trial verdict months before the Board would be expected to issue a final written decision—to this factor would render it effectively meaningless. Rather, no alternative measures exist for measuring proximity of the District Court's trial date to a Board's projected date for issuing a final written decision—nor does Petitioner purport to propose any.

As a result, because all information available indicates that the Board's projected date for issuance of a final written decision on June 17, 2026 is more than three months after the District Court's scheduled trial date of March 2, 2026, this second *Fintiv* factor weighs against institution¹. See *Fintiv*, IPR2020-00019, Paper

¹ Petitioner cites to a single decision issued under the now withdrawn “Interim Procedure for Discretionary Denials in AIA Post-Grant Proceedings with Parallel District Court Litigation,” in which the PTAB found that because the parallel district court proceeding would go to trial within a few weeks of the Board's projected date for final written decision, this factor weighed as neutral. See Pet. at 14 (citing *Cisco Sys. Inc., v. Video Solutions Pte. Ltd.*, IPR2024-00194, Paper 7 at 9-10 (PTAB Mar. 28, 2024) (finding that the trial date would likely occur in “early-March” and that

11 at 9 (“If the court’s trial date is earlier than the projected statutory deadline, the Board generally has weighed this fact in favor of exercising authority to deny institution . . .”). Indeed, the Board has weighed this factor as favoring denial for similar (and shorter) gaps between trial in the parallel proceeding and a final written decision. *See Immersion Sys. LLC v. Midas Green Techs., LLC*, PGR2021-00104, Paper 15 at 11 (PTAB Jan. 31, 2022) (jury trial starting four months ahead of final written decision favored discretionary denial); *NXP USA, Inc. v. Impinj, Inc.*, PGR2022-00005, Paper 17 at 8-9 (PTAB May 2, 2022) (two-month period between trial date and deadline for final decision weighed in favor of discretionary denial); *Apple Inc. v. Fintiv, Inc.*, IPR2020-00019, Paper 15 at 12-13 (PTAB May 13, 2020) (second factor favors denial because “the currently scheduled District Court trial is scheduled to begin two months before our deadline to reach a final decision”); *eClinicalWorks, LLC v. Decapolis LLC*, IPR2022-00229, Paper 10 at 9 (PTAB Apr. 13, 2022) (favoring denial where jury trial was “roughly one to two months” before final decision); *cf. also E-One, Inc. v. Oshkosh Corp.*, IPR2019-00161, Paper 16 at

the statutory deadline for final written decision was “March 28”). In contrast, here the trial in the parallel District Court proceeding for the ’691 Patent will occur on March 2, 2026—more than three and a half months ***before*** the projected statutory deadline for issuance of a final written decision on June 17, 2026.

6-9 (PTAB May 15, 2019) (one-month period between trial date and deadline for final written decision weighed in favor of discretionary denial) (applying pre-*Fintiv* *NHK* standard).

In contrast, granting institution here would frustrate one of the primary objectives of the AIA, which is “to provide an effective and efficient alternative” to district court litigation. *NHK Spring Co. Ltd. v. Intri-Plex Techs., Inc.*, IPR2018-00752, Paper 8 at 19-20 (PTAB Sept. 12, 2018) (quoting *Gen. Plastic*, IPR2016-01357, Paper 19 at 15-19 (PTAB Sept 6, 2017)). If the Board were to institute this Petition, any potential final written decision would issue well after the District Court trial concludes. Thus, instituting IPR under such circumstances could not be viewed as an “alternative” to litigation—but would instead simply create more litigation, in a separate forum. Accordingly, because the District Court’s trial date is more than three months before the anticipated Final Written Decision date, this second *Fintiv* factor weighs heavily in favor of denial.

C. *Fintiv* Factor 3: The Court and the Parties Have Invested Heavily in the Parallel Proceeding

Petitioner and Patent Owner have invested substantial resources in the parallel proceeding, including providing infringement contentions, reviewing source code, producing documents, serving and responding to interrogatories, serving eligibility contentions, as well as locating, reviewing, and charting prior art to generate

invalidity contentions in which Petitioner has asserted twelve primary printed prior art references (including the primary references for all grounds asserted in this Petition) and fifteen secondary references. *See* Ex. 2006 at 37-39; *see also Sand Revolution II, LLC v. Cont'l Intermodal Grp.*, IPR2019-01393, Paper 24 at 10 (PTAB June 16, 2020) (investment in invalidity contentions is relevant to third *Fintiv* factor). Petitioner also waited four months after receiving Patent Owner's infringement contentions before filing this Petition, for which similar delay the PTAB has previously found to weigh in favor of denying institution. *See AT&T Serv.*, IPR2024-00992, Paper 14 at 12-15 (PTAB Dec. 16, 2024) ("Petitioner waited five months to file the Petition after receiving Patent Owner's infringement contentions, and Petitioner has not presented any factual evidence to justify this delay.") (*citing Fintiv*, IPR2020-00019, Paper 11 at 11-12).

Moreover, upon projected issuance of an institution decision in this proceeding on or about June 17, 2025, the parties will also be in the middle of the claim construction process in the parallel District Court proceeding, and will have already exchanged proposed claim terms for construction and proposed constructions for those terms, and will have also filed a joint claim construction statement. *See* Ex. 2002 at 5. In addition, opening claim construction briefs will be filed and document production will be substantially complete only five weeks after the institution decision and (as noted above) trial will occur less than nine months

thereafter. *See* Ex. 2002 at 1, 3-5. Thus, because of the substantial investment that either has already been made or will have been made by the parties and the Court as of, and shortly after, the time of an institution decision, this third *Fintiv* factor weighs in favor of denying institution. *See, e.g., Boe Tech. Grp. Co. v. Element Cap. Com. Co. Pte. Ltd.*, IPR2023-00808, Paper 9 at 23, 2023 WL 7715885, at *8 (PTAB Nov. 15, 2023) (“the parties and the District Court ha[d] invested substantial resources in th[e] litigation” because, *inter alia*, “[s]ignificant discovery ha[d] been completed, including the exchange of infringement and invalidity contentions, document requests and interrogatories, and proposed claim terms for construction”).

D. *Fintiv* Factor 4: The Petition and the Parallel Proceeding Raise Almost Completely Overlapping Issues

The issues raised in this Petition overlap almost completely with those in the parallel District Court proceeding. Specifically, Petitioner's primary prior art references for all asserted grounds of invalidity in this proceeding (U.S. Patent Publication No. 2004/0218525 to Elie-Dit-Cosaque (“EDC_525”), U.S. Patent Publication No. 2004/0246892 to Elie-Dit-Cosaque (“EDC_892”), and U.S. Patent Publication No. 2009/0292943 to Hanif (“Hanif”)) are also asserted as grounds for invalidity in the parallel District Court proceeding. Pet. at 17-19; *see also* Ex. 2006 at 37-39, Ex. 2007 and Ex. 2008. In particular, Petitioner's Invalidity Contentions asserts U.S. Patent No. 7,352,703 (“Elie-Dit-Cosaque”), which states on its face was

previously published as “US 2004/0218525” (primary asserted reference in support of this Petition) and also that “application Ser. No. 09/998,362, filed Nov. 29, 2001, in the name(s) of David Elie-Dit-Cosaque and Maher Ali, which is (are) hereby incorporated reference for all purposes,” where application Ser. No. 09/998,362 was published as U.S. Patent Publication No. 2004/0246892 (also asserted in support of this Petition). *Id.*; *see also* Ex. 2013 U.S. Patent No. 7,352,703 at Prior Publication Data, 1:8-14, and 5:58-63; Ex. 2009 U.S. Patent No. 7,113,481 at Application No. and Prior Publication Data. Petitioner's other prior art reference asserted across all grounds for invalidity in this Petition, U.S. Patent Publication No. 2009/0292943 to Hanif, is also asserted in Petitioner's Invalidity Contentions. *See* Ex. 2006 and Ex. 2008.² Thus, for the two statutory grounds put forward in the Petition, six of seven

² Patent Owner briefly notes an apparent mislabeling within Petitioner's invalidity contentions exhibit chart D3 for Hanif, which appears to mistakenly refer to an incorrect publication number “U.S. Pat. App. Pub. No. 2006/0013127 (‘Hanif’).” *See* Ex. 2008 at 1. Petitioner's Invalidity Contentions cover pleading correctly lists “U.S. Patent Publication No. 2009/0292943 (‘Hanif’)” as a primary prior art reference (the same reference asserted in the instant Petition)—and also correctly lists the application number mistakenly associated with Hanif in Invalidity

references are asserted in Petitioner's invalidity contentions in the parallel District Court proceeding. The seventh reference, Chinese Patent Publication No. CN101645848A to Li et al., is asserted only as the last reference in a four-reference combination with EDC and Hanif for the last portion of the last element of independent claims 1 and 6 ("*signaling . . . said fully disjoint path as the Backup LSP to said Bypass LSP*"). Pet. at 83, 86-87. Petitioner points to Li as disclosing the concept of a "failover sequence would be controlled based on priority (i.e., with a higher-priority backup path being used first in case of failure and a lower-priority backup path being used if the higher-priority path also fails)" in connection with this claim element. *See* Pet. at 80. But that disclosure in Li is substantially similar to the "Dynamic Path protection" that Petitioner also puts forward in the parallel District Court proceeding for this claim element in the "Park" reference ("Design of a dynamic path protection mechanism in MPLS networks"), which also describe selecting a higher priority backup path:

The proposed mechanism selects one of LSPs which have the same destination as the primary LSP does. If there are many LSPs, only one LSP are selected by the following order:

1. The LSP which has the least utilization.
2. The LSP with the least RX/TX packets in any interface, if utilization of each LSP is not known.

Contention Exhibit D3 as being associated with the Izaiku reference. *See* Ex. 2006 at 37.

3. The best effort LSP, if there is still a tie.
4. The LSP which is not selected as a backup LSP before, if there is still a tie.
5. One LSP at random if there is still a tie.

See Ex. 2010 at 23. Thus, the overlap in asserted prior art between this Petition and the parallel District Court proceeding is nearly complete.

Further, there is complete overlap between the claims challenged in the instant Petition and those challenged in the parallel District Court proceeding. Specifically, Petitioner states without explanation that it is challenging claims 1-10 in this Petition and that the parallel proceedings assert only claims 6-10 for infringement—thus implying that the validity of claims 1-5 will be addressed only in connection with the Petition. *See* Pet. at 16. But claims 1-5 are merely the method versions of apparatus claims 6-10 and thus are, with regards to invalidity, substantively identical to each other. Indeed, Petitioner's own actions in the parallel District Court proceedings confirm this analysis, because Petitioner substantively charts ***only claims 1-5 and the preamble of claim 6*** with respect to the same prior art disclosures asserted in the Petition, while merely referring back to claims 1-5 for the remainder of claims 6-10. *Compare* Invalidity Contention Exhibit D1 at 1-129 (charting U.S. Patent No. 7,352,703 (“Elie-Dit-Cosaque”) against ’691 Patent claims 1-5 and preamble of claim 6) *with id.* at 129-132 (charting remainder of claim 6 and claims 7-10 only by reference to claims 1-5); *compare also* Exhibit D3 at 1-94 (charting

U.S. Patent Publication No. 2009/0292943 to Hanif against '691 Patent claims 1-5 and preamble of claim 6) *with id.* at 94-97 (charting remainder of claim 6 and claims 7-10 only by reference to claims 1-5). Furthermore, the Petition itself treats claims 1-5 equivalently to claims 6-10, in stating, "Claims 6-10 merely repeat the subject matter of claims 1-5 but are phrased as computer-readable-medium claims instead of method claims. Accordingly, claims 6-10 would have been obvious for the same reasons as claims 1-5 discussed above." Pet. at 74.

Therefore, Petitioner's common prior art challenges to the overlapping claims renders the "overlap in issues between the two proceedings [] substantial." *Code200, UAB v. Luminate Networks, Ltd.*, IPR2020-01506, Paper 10 at 11-12 (PTAB Feb. 16, 2021); *see also Teso LT UAB*, IPR2021-00122, Paper 12 at 10 (PTAB Apr. 20, 2021) (finding "the overlap in issues between the two proceedings is substantial" where common art and common challenges to the independent claim were presented in both proceedings); *see also eClinicalWorks*, IPR2022-00229, Paper 10 at 12 (*Fintiv* factor 4 weighed in favor of denial where preliminary invalidity contentions showed overlap of asserted claims, art and arguments asserted in the petition); *U.S. Venture, Inc. v. Sunoco Partners Mktg. & Terminals L.P.*, IPR2020-00728, Paper 10 at 11-12 (PTAB Oct. 1, 2020) (overlap between primary references asserted in petition and litigation weighed in favor of denial).

In addition to the nearly identical prior art references and claims at issue in both proceedings, Petitioner notably has not stipulated to refrain from asserting any references in the District Court that it *could have raised in the Petition* in accordance with *Sotera Wireless, Inc. v. Masimo Corp.*, IPR2020-01019, Paper 12 (PTAB Dec. 1, 2020) (precedential as to § II.A) as specified in the USPTO's February 28, 2025 guidance withdrawing the June 21, 2022, memorandum entitled "Interim Procedure for Discretionary Denials in AIA Post-Grant Proceedings with Parallel District Court Litigation." *See* Ex. 2014, Pet. at 15, and Ex. 2006 at 37-39. Rather than attempting to reduce duplicative proceedings by making a *Sotera* stipulation, Petitioner appears to have instead chosen to continue pursuing the additional 10 primary and 15 secondary references listed in its invalidity contentions (all of which it could have raised in the instant proceeding) even if institution of this Petition is granted. *See* Ex. 2006 at 37-39. This is in contravention of the purposes of *Inter Partes* Review's purpose to provide an efficient alternative to litigation. *See WesternGeco LLC v. ION Geophysical Corp.*, 889 F.3d 1308, 1317 (Fed. Cir. 2018) (*Inter Partes* Review is intended to be a "quick and cost effective alternative[] to litigation.") (quoting H. Rep. No. 112-98, at 40, 48 (2011)).

Consequently, because of the almost complete overlap of claims and prior art at issue, as well as Petitioner's failure to make a *Sotera* stipulation, this fourth *Fintiv* factor weighs heavily in favor of denying institution.

E. *Fintiv* Factor 5: The Petitioner Is the Parallel Proceeding Defendant

Petitioner concedes that it is the defendant in the parallel proceeding. Pet. at 15. But Petitioner improperly argues this factor should not weigh against institution because “[t]hat is true of most petitioners in IPR proceedings.” *Id.* Adopting Petitioner’s improper approach would effectively render this factor meaningless—because under Petitioner’s logic, it would not matter whether a petitioner was or was not a parallel proceeding defendant, as neither scenario would ever weigh in favor of denying institution. While Patent Owner agrees that this single factor alone should not be dispositive in denying institution, it is nonetheless a significant factor to be weighed—and, following the Board’s prior practice, “because the petitioner and the defendant in the parallel proceeding are the same party, this [fifth *Fintiv*] factor weighs in favor of discretionary denial.” *Samsung Elecs. Co. v. Clear Imaging Research, LLC*, IPR2020-01401, Paper 12 at 21-22 (PTAB Feb. 17, 2021) (quoting *Fintiv*, IPR2020-00019, Paper 15 at 15).

F. *Fintiv* Factor 6: No Other Circumstances Outweigh the Factors Favoring Denial of Institution

Where the bulk of the *Fintiv* factors weigh in favor of denial—as shown above—the Board has found that it “need not decide whether the merits of Petitioner’s asserted grounds are particularly strong because it would not impact [the] ultimate determination under Section 314(a)” and “the merits do not outweigh

the other *Fintiv* factors.” *NXP USA*, PGR2022-00005, Paper 17 at 12-13 (where factor 1 was neutral and factors 2-5 favored or slightly favored denial, factor 6 was neutral because it “would not impact [the] ultimate determination”); *Samsung Elecs.*, IPR2020-01401, Paper 12 at 23-25 (where factors 1 and 4 slightly favored denial, factors 2 and 3 strongly favored denial, and factor 5 weighed in favor of denial, those factors outweighed any merits of the case considered in factor 6); *Apcon, Inc. v. Gigamon Inc.*, IPR2020-01579, Paper 9 at 26 (PTAB Mar. 16, 2021) (merits of the petitioner’s grounds do not outweigh the other factors in light of the strength of factors 1-5).

Nonetheless, while the weight of the preceding five factors on their own heavily merit the Board denying institution of the Petition, Patent Owner also explains below that not only has Petitioner failed to assert any anticipatory prior art, Petitioner has also failed to make even a *prima facie* case of obviousness having failed to identify where the asserted references disclose “obtaining the nodes traversed by an end-to-end path of said Bypass LSP from said Point of Local Repair Node to said Merge Point node” as required by independent claims 1 and 6. *See* § VI *infra*. Thus, even if Petitioner’s reference to the recently withdrawn “compelling evidence” standard formerly promulgated under the June 21, 2022 memorandum entitled “Interim Procedure for Discretionary Denials in AIA Post-Grant Proceedings with Parallel District Court Litigation” were relevant (which it is not),

Petitioner incorrectly asserts that it demonstrates such “compelling” evidence in the Petition. Indeed, the failure to present even a *prima facie* obviousness assertion in the Petition also merits denial of institution.³ See *Verizon Bus. Network Servs. LLC v. Huawei Techs. Co.*, IPR2020-01278, Paper 12 at 15 (PTAB Jan. 26, 2021); *Fintiv*, IPR2020-00019, Paper 11 at 15 (“[I]f the merits of the grounds raised in the petition are a closer call, then that fact has favored denying institution when other factors favoring denial are present.”).

Finally, the District Court can resolve more disputed issues than the limited nature of IPR proceedings, which can only address a limited set of validity challenges. While IPR proceedings were once thought to be vehicles to settle validity questions concerning a patent, history has informed that IPR proceedings often only address *some* validity issues, leaving others for the district courts to deal with. When

³ Every IPR Petition necessarily alleges, as Petitioner does here, that the asserted prior art teaches limitations that were missing from the prior art examined during prosecution. See, e.g., Pet. at 15-16. But such generic allegations do not alone rise to the level of “compelling” merits. See, e.g., *OpenSky Indus., LLC v. VLSI Tech. LLC*, IPR2021-01064, Paper 102 at 49 (PTAB Oct. 4, 2022) (“a compelling-merits challenge is a higher standard than the reasonable likelihood required for the institution of an IPR under 35 U.S.C. § 314(a)”).

a patent survives an IPR, it in fact **adds** complexity to the proceeding, as the district court must then weigh questions of the scope of IPR estoppel. *See, e.g., EIS Inc. v. IntiHealth Ger GmbH*, No. 19-1227-GBW, 2023 U.S. Dist. LEXIS 188297 at 7-15 (D. Del. Aug. 30, 2023) (addressing scope of IPR estoppel). And for other validity issues beyond the reach of IPRs, like the 35 U.S.C. § 101 and 35 U.S.C § 112 issues referenced in Petitioner's District Court ineligibility and invalidity contentions *See* Ex. 2006 at 74-76, 79-80 and Ex. 2011 , the IPR proceeding will be of limited use.

Accordingly, for the reasons stated above, including this and each of the remaining *Fintiv* factors, all six factors weigh in favor of the Board exercising its discretion to deny institution.

III. THE CHALLENGED PATENT—U.S. PATENT NO. 8,982,691

A. Overview

The '691 Patent, entitled *System and Method Providing Standby Bypass for Double Failure Protection in MPLS Network*, provides a system and method of providing protection to Bypass Label Switched Paths (LSP) in Multiprotocol Label Switched (MPLS) Fast Reroute (FRR) systems to accommodate double-fault scenarios to the extent possible given the system configuration. *See* Ex. 1001 at 2:10-13. The inventions disclosed in the '691 Patent help mitigate network outages and associated downtime, thereby ensuring network reliability. *Id.* at 2:5-6.

Service providers using MPLS networks frequently employ fault-protection mechanisms to minimize the negative effects of any unexpected failures in the network. *Id.* at 1:14-16. One prior art method of fault mitigation is known as Fast Re-Route (FRR), which overcomes single faults by routing around a local fault from an upstream node through a backup path that rejoins the primary LSP downstream of the fault. *Id.* at 1:38-48. While this method of fault mitigation “provides faster recovery because the decision of recovery is strictly local,” FRR protects only against single faults; in other words, if both the primary LSP and the backup LSP cease operating (i.e., if there are two faults), the network will experience a loss of service. *Id.* at 1:49-2:6.

The inventors of the '691 Patent disclosed systems and techniques “for providing a Backup [LSP] to an already established Bypass LSP.” *Id.*, cl. 1; *see also id.* at 2:15-17. In relevant part, the inventors disclosed:

establishing a Bypass LSP having a Point of Local Repair node [(PLR)] and a Merge Point node [(MP)]; obtaining the nodes traversed by the end-to-end path of the Bypass LSP from the Point of Local Repair Node to the Merge Point node; generating a request to a path calculator using the nodes traversed by the end-to-end path of the Bypass LSP for a disjoint path connecting the Point of Local Repair Node to the Merge Point node; receiving a response from the path calculator and in the event that a fully disjoint path connecting the Point of Local Repair Node to the Merge Point node is available, then signaling the disjoint path as a Backup LSP to the Bypass LSP.

Id. at 2:17-28.

Figure 3 of the '691 Patent, which is reproduced below as annotated, is instructive. In the example embodiment disclosed in Figure 3, MPLS Label Switch Router PE1 is connected to Label Switch Router PE6 through several intervening nodes. Of note is the Primary LSP 380 (denoted as a dashed line, and further annotated with yellow highlighting) which traverses from node PE1, to PE2, to PE5, and ends at PE6. Fault 390 occurs along the Primary LSP between nodes PE2 (the Point of Local Repair) and PE5 (the Merge Point node), which, if unaddressed, would sever the connection between PE1 and PE6. A Bypass LSP 381 (denoted as a dotted line, and further annotated with green highlighting) routes around fault 390 and traverses from PE2 (i.e., just “upstream” of fault 390) to node PE3 and from there to PE5. Bypass LSP 381 thus allows communication to flow from PE1 to PE6 with minimal interruption. However, if *another* fault were to occur along the Bypass LSP 381 (e.g., fault 391 between PE2 and PE3, or fault 392 between PE3 and PE5), a Backup LSP 382 (denoted as a dashed-and-dotted line, and further annotated with blue highlighting) that spans from PE2, to PE4, to PE5, and from there to PE6 is needed to route around the double fault. *Id.* at 5:47-58.

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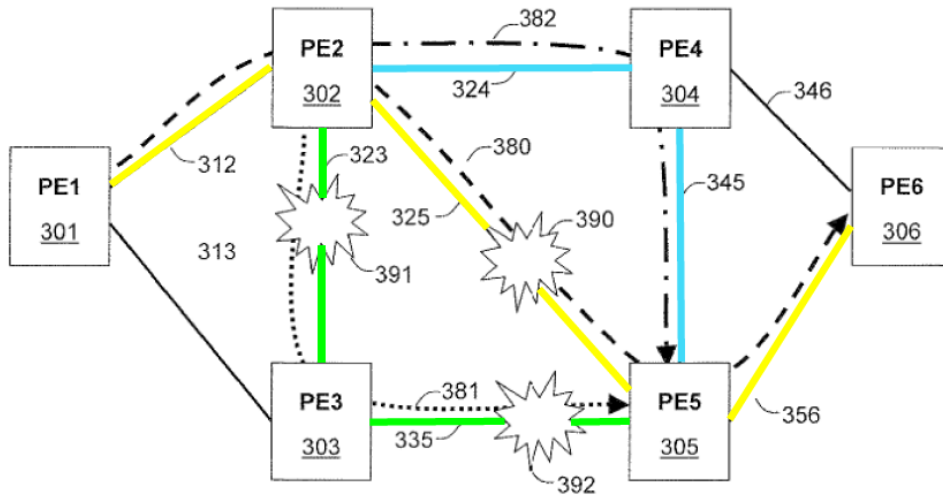


Fig. 3

Figure 4 of the '691 Patent, also reproduced below, depicts a flowchart describing the method of providing a Backup LSP for a Bypass LSP.

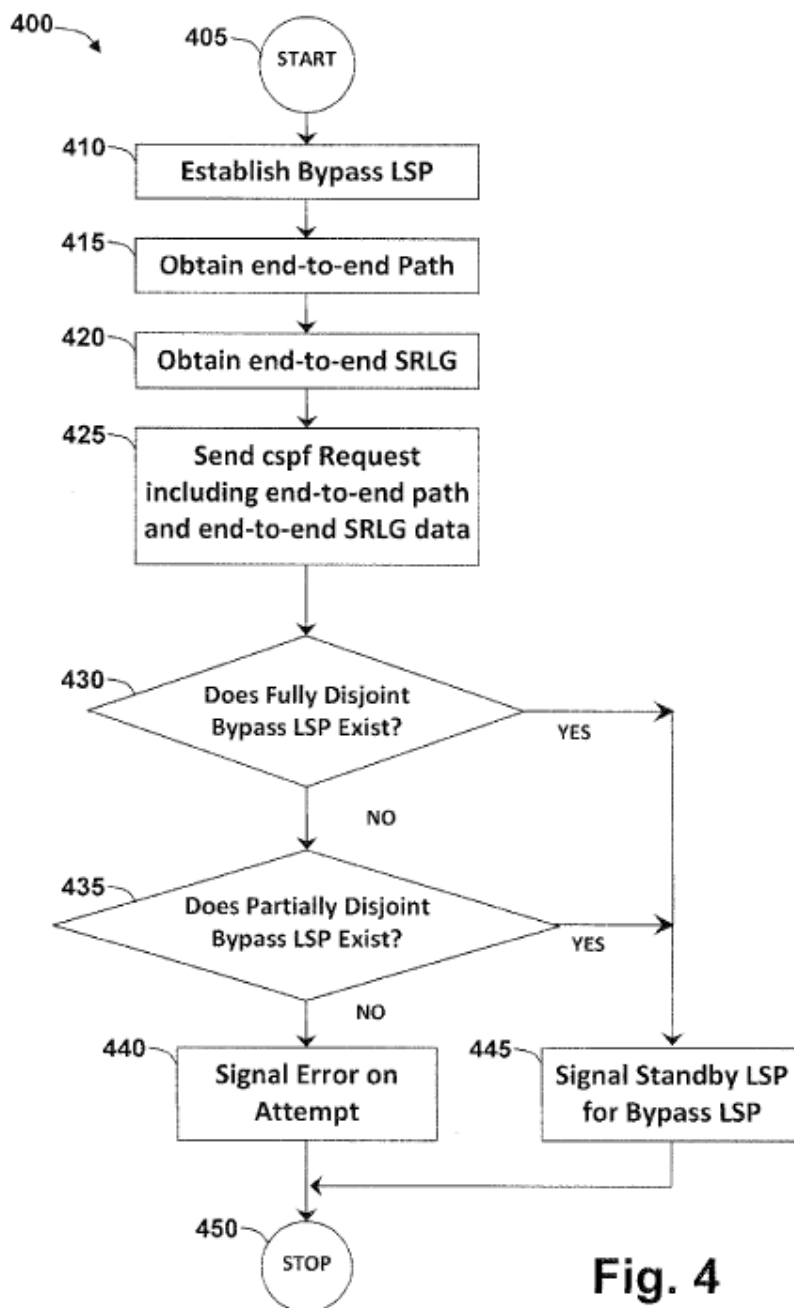


Fig. 4

B. Claims of the '691 Patent

Petitioner challenges Claims 1-10 of the '691 Patent, which includes two independent claims, Nos. 1 and 6. Claim 1, a method claim, is representative and recited below:

- 1[pre].** A method performed by a network processor of a Multiprotocol Label Switching (MPLS) label switch router for providing a Backup Label Switched Path (LSP) to a Bypass LSP already established for a Protected Primary LSP, the method comprising the steps of:
- [1.1]** protecting the Primary LSP against dual failures, comprising:
 - [1.2]** establishing the Bypass LSP for the Protected Primary LSP having a Point of Local Repair node and a Merge Point node;
 - [1.3]** obtaining the nodes traversed by an end-to-end path of said Bypass LSP from said Point of Local Repair Node to said Merge Point node;
 - [1.4]** generating a request to a path calculator using the nodes traversed by said end-to-end path of said Bypass LSP for a disjoint path connecting said Point of Local Repair Node to said Merge Point node;
 - [1.5]** receiving a response from said path calculator; and
 - [1.6]** in response to determining that a fully disjoint path connecting said Point of Local Repair Node to said Merge Point node is available, signaling, to at least one other MPLS label switch router, said fully disjoint path as the Backup LSP to said Bypass LSP.

Ex. 1001 at 7:50-8:5.

Claims 2 through 5 depend on Claim 1. Claim 6 restates the method of Claim 1 as a non-transitory machine readable storage medium, and Claim 7 through 10 depend on Claim 6.

C. Notice of Allowance of the '691 Patent

The '691 Patent's application was filed on September 28, 2012. Ex. 1002 at 127. Ultimately, the examiner granted allowance because the closest prior art did not disclose “determining if a backup to a bypass LSP can be a fully disjoint path to prevent a dual/double failure in the MPLS network” or “establishing a bypass LSP that protects a primary LSP and calculating another backup LSP to act as a backup for the bypass LSP while determining if the backup LSP and the bypass LSP are fully disjoint paths connecting the PLR [Point of Local Repair] and MP [Merge Point] nodes to ensure protection against dual failures.” Ex. 1002 at 21.

IV. PERSON OF ORDINARY SKILL IN THE ART (POSITA)

Petitioner identifies a person of ordinary skill in the art (“POSITA”) as of September 28, 2012 as a person who “would have a bachelor's degree in computer science, computer engineering, electrical engineering, or equivalent training, and approximately two years of experience working in the field of network communications and would be knowledgeable regarding MPLS techniques.” Pet. at 12. Patent Owner submits that the above POSITA at the time of the '691 Patent may

alternatively have additional years of practical and relevant work or research experience as substitution for less or different technical education, and vice versa.

V. CLAIM CONSTRUCTION

According to 37 C.F.R. § 42.104(b)(3), Petitioner has an affirmative burden to set forth how the challenged claims should be construed. *See, e.g., Orthopediatrics Corp. v. K2M, Inc.*, IPR2018-01548, Paper 9 at 10 (PTAB Mar. 1, 2019). In construing challenged claims, the Board follows the standard set by *Phillips v. AWH Corp.*, 415 F.3d 1303 (Fed. Cir. 2005) (*en banc*). *See also* 37 C.F.R. § 42.100(b). Petitioner must therefore advance a rationale for its proposed claim constructions under *Phillips* to satisfy the requirements of 37 C.F.R. § 42.104(b)(3). Here, Petitioner does not advance any claim constructions. Pet. at 12-13. As such, the '691 Patent claims should be construed in accordance with the ordinary and customary meaning of such claims as understood by one of ordinary skill in the art and the prosecution history pertaining to the patent. 37 C.F.R. § 42.100(b).

VI. PETITIONER DOES NOT SHOW THAT EITHER OF SUBSTANTIVE GROUNDS 1 OR 2 ARE REASONABLY LIKELY TO SUCCEED

Petitioner raises two grounds of unpatentability. The asserted Grounds and Challenged Claims are as follows:

- (1) Petitioner alleges that Challenged Claims 1-10 are rendered obvious over EDC_525, EDC_892, and Hanif;

(2) Petitioner alleges that Challenged Claims 1-10 are rendered obvious over EDC_525, EDC_892, Hanif, and Li.

As detailed below, both grounds fail to show a reasonable likelihood of success as to any of the Challenged Claims 1-10. Specifically, Petitioner has failed to “specify where each element of the claim is found in the prior art patents or printed publications relied upon.” 37 C.F.R. § 42.104(b)(4). As detailed above, in addition to the preamble, each of representative Claim 1 and corresponding Claim 6 contains six limitations. (*See* § III.B *supra*). But for both Ground 1 and Ground 2, Petitioner fails to show that its allegedly invalidating prior-art references disclose in any form whatsoever one of those six limitations—“obtaining the nodes traversed by an end-to-end path of said Bypass LSP from said Point of Local Repair Node to said Merge Point node” (and/or any instructions for doing so). *See* Ex. 1001, cl. 1 lim. [1.3]; *see also* cl. 6 lim. [6.3]. Accordingly, because the asserted combinations of prior art references do not teach or disclose that limitation—which appears in each of the challenged claims—Petitioner fails to demonstrate a reasonable likelihood of success.

A. Legal Standard for Obviousness

A claim is unpatentable for obviousness under 35 U.S.C. § 103(a) if the differences between the claimed subject matter and the prior art are “such that the subject matter as a whole would have been obvious at the time the invention was

made to a person having ordinary skill in the art to which said subject matter pertains.” *KSR Int’l Co. v. Teleflex Inc.*, 550 U.S. 398, 406 (2007). “Although ‘a patent can be obvious in light of a single prior art reference,’ the Federal Circuit has held that a single-reference obviousness ground requires that ‘it would have been obvious to modify that reference to arrive at the patented invention.’” *ADT LLC v. Vivint, Inc.*, IPR2022-00634, Paper 7 at 15 (PTAB Oct. 4, 2022) (quoting *Arendi S.A.R.L. v. Apple Inc.*, 832 F.3d 1355, 1361 (Fed. Cir. 2016)). “[S]ingle reference obviousness requires a showing of motivation to modify a reference when a party argues that such a modification must be made to meet the limitations of a claim.” *SK Hynix Inc. v. Netlist, Inc.*, IPR2017-00561, Paper 36 at 11 (PTAB July 5, 2018) (citing *Monsanto Tech. LLC v. E.I. DuPont de Nemours & Co.*, 878 F.3d 1336, 1346 (Fed. Cir. 2018)).

Where, however, allegations of obviousness are premised upon multiple references, petitioners are required to demonstrate a reason to combine references. When multiple prior art references are combined, a claimed invention is not obvious unless a person having ordinary skill in the art would have been motivated to combine the references. *KSR Int’l Co. v. Teleflex Inc.*, 550 U.S. 398, 418 (2007). Claiming that two references are similar or relate to the same industry or technology is not enough. *Heart Failure Techs., LLC v. Cardiokinetix, Inc.*, No. IPR2013-00183, Paper 12 at 9 (PTAB July 31, 2013); *see also William Wesley Carnes, Sr.*,

Inc. v. Seaboard Int'l Inc., No. IPR2019-00133, Paper 10 at 18-19 (PTAB May 8, 2019) (“[A] statement of similarity, however, does not constitute an articulated reasoning with rational underpinning as to why a POSITA would combine elements of one reference with another, and why a POSITA would modify the teachings of the references to arrive at the claimed invention.”); *Sipnet EU S.R.O. v. Straight Path IP Group, Inc.*, No. IPR2013-00246, Paper No. 11 at 20 (PTAB Oct. 11, 2013). For instance, in *Heart Failure Technologies*, the PTAB held that it was not obvious to combine several references merely because they all related to heart repair devices:

The fact that [the references] all concern human heart repair is not in itself sufficient rationale for making the combination. Many heart repair devices exist. That fact alone would not make it obvious to combine their features. Petitioner must show some reason why a person of ordinary skill in the art would have thought to combine particular available elements of knowledge, as evidence by the prior art, to reach the claimed invention.

No. IPR2013-00183, Paper 12 at 9. The law requires that Petitioner show some reason why a POSITA would have thought to combine the references identified in Grounds 1 and 2 beyond the mere allegation that they both generically relate to networks.

B. Ground 1: Petitioner Does Not Show That Challenged Claims 1-10 Are Obvious over EDC_525, EDC_892, and Hanif

1. Overview of Asserted Prior Art

Petitioner alleges that Challenged Claims 1-10 of the '691 Patent are rendered obvious over the following prior art references.

a) U.S. Patent Pub. No. 2004/0218525 to Elie-Dit-Cosaque et al. ("EDC_525") (Ex. 1005)

EDC_525, published on November 4, 2004, is directed to "[a] system and method for implementing a shared protection scheme under a scenario of multiple failures in an optical network." Ex. 1005 at Abstract. As noted by Petitioner, "EDC_525 expressly refers to and incorporates EDC_892's contents by reference." Pet. at 34. EDC_525 was concerned with the challenge of ensuring network reliability and continuity in the face of multiple failures within an optical network. Ex. 1005 at ¶¶ [0003]-[0007]. EDC_525 sought to implement a shared protection scheme that can effectively restore network connections using backup paths when the working path encounters a failure. The challenge described in EDC_525 lies in computing one or more backup paths between ingress and egress nodes, which can be activated upon a failure condition. These backup paths need to be robust enough to handle multiple simultaneous failures, considering resource constraints and connectivity issues within the network. *Id.* EDC_525 aims to optimize these backup paths based on link and/or node disjointedness, ensuring that they do not share

resources with the working path, thereby reducing the likelihood of simultaneous interruption. *Id.* ¶¶ [0008]-[0009].

b) U.S. Patent Pub. No. 2004/0246892 to Elie-Dit-Cosaque et al. (“EDC_892”) (Ex. 1006)

EDC_892, published on December 9, 2004, is directed to “[i]nformed dynamic path protection for optical networks.” Ex. 1006 at Title. EDC_892 was concerned with challenges in efficiently protecting optical network connections, particularly in Wavelength-Division Multiplexed (WDM) networks. *Id.* ¶¶ [0004]-[0009]. The increasing demand for communication bandwidth necessitates the use of WDM, which allows multiple communication channels on a single fiber, significantly enhancing bandwidth. *Id.* However, managing this bandwidth is challenging, especially regarding connection protection. In WDM networks, the failure of a single fiber can lead to the loss of multiple channels, necessitating a robust protection scheme. *Id.* Traditional methods, like ring structures, involve protect fibers that are seldom used, resulting in a waste of resources. *Id.* Therefore, the need arose for a method and apparatus that efficiently protect working channels while conserving optical resources. *Id.* EDC_892 discloses dynamically allocated protection paths in a WDM network using a database to manage network status, promoting shared protection resources and reducing the need for dedicated

protection channels to enhance efficiency and resource utilization in optical networks. *Id.* ¶¶ [0010]-[0012].

c) *U.S. Patent Pub. No. 2009/0292943 to Hanif et al. (“Hanif”) (Ex. 1013)*

Hanif, published on November 26, 2009, is directed to “techniques for configuring a local repair connection for a protected connection including determining a path for the local repair connection.” Ex. 1013 at Abstract. Hanif concerns the limitations and inefficiencies associated with conventional techniques for creating local repair connections in networking environments. *Id.* ¶¶ [0002]-[0011]. These conventional methods were particularly limited in how they determined the paths for local repair connections, which are crucial for maintaining uninterrupted data transmission in the event of node or link failures in a network. *Id.* To address these concerns, Hanif discloses techniques for configuring local repair connections for protected connections, such as Label-Switched Paths (LSPs) in Multi-Protocol Label Switching (MPLS) networks to enhance the efficiency and reliability of rerouting data around failure points without disruptions. *Id.* ¶¶ [0012]-[0021].

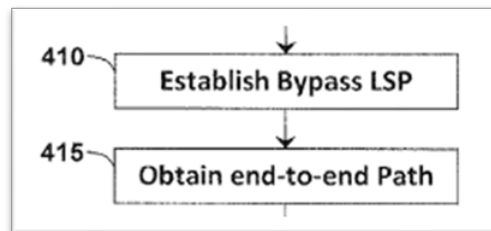
2. EDC 525 in Combination with EDC 892 and Hanif Does Not Render Obvious the Challenged Claims

Petitioner fails to make out a prima facie case of obviousness because the asserted references do not teach or disclose limitations [1.3] and [6.3]—i.e.,

“obtaining the nodes traversed by an end-to-end path of said Bypass LSP from said Point of Local Repair Node to said Merge Point node.” All '691 Patent claims challenged under Ground 1 contain the “obtaining the nodes traversed by an end-to-end path *of* said Bypass LSP from said Point of Local Repair Node to said Merge Point node” limitation or an equivalent.

According to the inventors of the '691 Patent, the nodes traversed from the “Point of Local Repair Node to said Merge Point node” comprise *the Bypass LSP* (disclosed in '691 Patent Fig. 3 at PE2 302→PE3 303→PE5 305). *See, e.g.*, Ex. 1001 at 1:47-48 (“Bypass LSP 181 provides a Bypass LSP around facility 125.”); 1:58-62 (“In FIG. 1b, the exemplary network of FIG. 1a has suffered a fault 190 to facility 125, thus interrupting LSP 180. The local protection mechanism operates to provide Bypass LSP 181 around the fault at facility 125, thus allowing continuity of service.”); 5:40-42 (“FIG. 2 facility 225 has PE2 202 as its Point of Local Repair, and PE5 205 as its Merge Point. Bypass LSP 281 provides a Bypass LSP around facility 225.”); 5:49-52 (“Bypass LSP 381 would normally compensate for the failure of facility 325 by providing an LSP connection from PE2 302 as a Point of Local Repair, to PE5 305 as its Merge Point.”). But the “end-to-end path” is comprised of *all the nodes* traversed inclusive of the Bypass LSP—i.e., the full path disclosed in Figure 3 starting at PE1 301 and ending at PE6 306. The specification of the '691 Patent makes clear that the “end-to-end path” disclosed in limitations

[1.3] and [6.3] is not merely comprised of the Bypass LSP nodes themselves, but of all nodes from one end of the path to the other end that ***also incorporate*** the Bypass LSP nodes. *See, e.g.*, Ex. 1001 at 6:10-13 (“The end-to-end path of the main Bypass LSP based upon the nodes it is traversing may be obtained from the Explicit_Route_object of the path message provided by RSVP Traffic Engineering and is obtained at step 415.”). And indeed, Figure 4 (re-excerpted below) expressly discloses the “Bypass LSP” as distinct from the “end-to-end Path”:



It is black-letter patent law that every word of the claim must be given meaning. *See Becton, Dickinson & Co. v. Tyco Healthcare Group, LP*, 616 F.3d 1249, 1257 (Fed. Cir. 2010) (holding that each distinct claim term must be given effect). When the Challenged Claims use the term “end-to-end path of said Bypass LSP,” it must mean something other than merely “Bypass LSP.” ***Conflating*** “end-to-end path” with “Bypass LSP,” as Petitioner does, is erroneous and contrary to the canons of claim construction. *See, e.g.*, Pet. at 53 (“Accordingly, it would have been obvious to a POSITA for the network topology information, which is obtained from ‘all nodes’ for ‘each link in the entire network domain,’ to include information

regarding nodes traversed by an *end-to-end path of the first backup path ('Bypass LSP')* from an ingress node ('Point of Local Repair Node') to an egress node ('Merge Point node').") (emphasis added).

None of the prior art references asserted by Petitioner in Ground 1 discloses the "end-to-end path" as set forth in the '691 Patent, and as illustrated in the example embodiment of Figure 3 at PE1 301→PE6 306. For example, Petitioner argues that EDC_525 discloses the allocation of a backup path from an ingress node to an egress node to route around a fault occurring along a working path. Pet. at 47-49, 51-52. But critically, Petitioner equates the ingress node of the EDC_525 reference with the "Point of Local Repair Node" of the '691 Patent (equivalent to PE2 302 in the example embodiment of '691 Patent Fig. 3), and equates the egress node of EDC_525 with the "Merge Point node" of the '691 Patent (equivalent to PE5 305 in the same). *Id.* at 51. Thus, Petitioner clearly equates the backup path of EDC_525 with the admitted prior art FRR *Bypass* LSP described in the '691 Patent:

A POSITA would have understood that in order to calculate backup paths that are node disjoint, the topology information identifies the nodes traversed from the ingress node to the egress node (i.e., end-to-end); these nodes are then avoided when calculating disjoint backup paths.

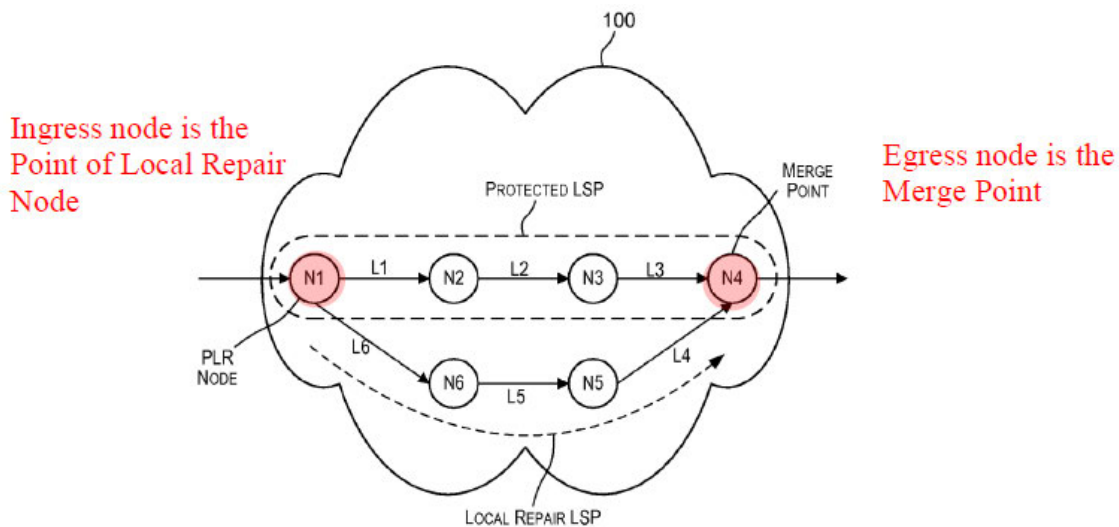
Id. at 53; *cf.* Ex. 1001 at 1:38-48. However, this does not indicate that EDC_525 disclosed "an end-to-end path" that contains, *inter alia*, the Bypass LSP "from said Point of Local Repair Node to said Merge Point node."

Petitioner also argues that “EDC_892 discloses a ‘global allocation database 26 [that] comprises one or more tables that provide a current topology of the network 10 for intelligent, dynamic creation of network paths.” *Id.* at 53. But Petitioner does not explain how this discloses “obtaining the nodes traversed by an end-to-end path.”

Similarly, Petitioner's arguments that Hanif discloses the missing limitation also fall flat:

Hanif discloses “local repair,” where both the protected LSP and the backup LSP share an “**ingress node**” that corresponds to a point of local repair node N1 (“**PLR NODE**”) and an “**egress node**” that corresponds to a merge point node N4 (“**MERGE POINT**”).

Pet. at 50 (citations omitted) (emphasis in original). Petitioner further illustrates its point with an annotated graphic (reproduced below).



Ex.1013, FIG. 1 (annotated).

Again, what this shows is *not* an “end-to-end path” as contemplated and required by the '691 Patent; it demonstrates only the same prior art Bypass LSP already described in the '691 Patent. Petitioner further confirms that Hanif concerns the determination of “*local paths* associated with *local repair LSPs*.” See Pet. at 54 (emphasis added). Further, Petitioner argues that Hanif discloses that a processor accesses memory that includes “network topology information that is used for determining local paths associated with local repair LSPs” (*id.* at 54), but does not explain what that network topology information actually is, nor whether such information discloses an end-to-end path that incorporates the Bypass LSP, nor how that processor purportedly uses that information.

Because all three prior art references of Ground 1 fail to disclose the claim limitation “obtaining the nodes traversed by an end-to-end path of said Bypass LSP from said Point of Local Repair Node to said Merge Point node,” Petitioner cannot rely on any of those references to fill that gap. Accordingly, Petitioner cannot demonstrate a *prima facie* case of obviousness under Ground 1.

C. Ground 2: Petitioner Does Not Show That Challenged Claims 1-10 Are Obvious over EDC_525, EDC_892, Hanif, and Li.

1. Overview of Asserted Prior Art

Petitioner alleges that Claims 1-10 of the '691 Patent are rendered obvious over the three prior art references asserted under Ground 1 as additionally combined

with the Li prior art reference. *See* Pet. at 83 (“The Ground 2 analysis of claim 1 is the same as in Ground 1 except as identified below.”). As such, Patent Owner incorporates by reference as if set forth fully herein its analysis and reasoning above regarding the EDC_525, EDC_892, and Hanif references. The remaining Li prior art reference is addressed below.

a) Chinese Patent Pub. No. CN101645848A to Li et al. (“Li”) (Exs. 1030-1031).

Li, published on February 10, 2010, is directed to a “Traffic Protection Method and Apparatus, And System.” Ex. 1030 at Title. Li was concerned with the issue of traffic reliability in Multi-Protocol Label Switching (MPLS) networks. *See id.* at 6. In existing systems, frequent traffic switching between a master path and backup paths causes instability and unnecessary burden on network resources, especially in unstable networks. *Id.* Li disclosed a solution to this problem with a traffic protection method and apparatus that monitors the state of the master path to detect abnormalities and switches to a backup path when the master path is abnormal. *Id.* at 7-9. Li also discloses upgrading the backup path to become the new master path, ensuring stability and reducing the number of switches thereby preventing unnecessary switching back to the original master path which minimizes frequent traffic transitions and thus improves network reliability. *Id.* at 7-9.

2. EDC_525 in Combination with EDC_892 and Hanif and Li Does Not Render Obvious the Challenged Claims

Petitioner relies on Li only for providing the “*signaling . . . said fully disjoint path as the Backup LSP to said Bypass LSP*”—i.e., limitations [1.6] and [6.6]. *See* Pet. at 83. Petitioner does not argue that Li discloses the “obtaining the nodes traversed by an end-to-end path of said Bypass LSP from said Point of Local Repair Node to said Merge Point node” limitation that is missing from the EDC_525, EDC_892, and Hanif references. *See id.* at 83-86; *see also* § VI.B.2 *supra*. Accordingly, because Petitioner fails to demonstrate that Li supplies the missing element under Ground 2, it fails to present a *prima facie* case of obviousness for the same reason that Ground 1 fails.

VII. CONCLUSION

A comprehensive review of the *Fintiv* factors reveals that the Board should exercise its discretion and decline to institute in response to the Petition. Instituting an IPR here will not serve as an efficient alternative to the parallel District Court proceeding, in light of the multiple patents at issue before the District Court, and the delayed timing of Petitioner's requests in this forum. Rather, every significant invalidity ground that Petitioner raises here will first be resolved in the District Court—and long before the Board issues even one final written decision, much less three.

Petitioner also has not established a reasonable likelihood that it will prevail on Grounds 1-2 to establish unpatentability of challenged claims 1-10 of the '691 Patent because none of Petitioner's asserted prior art references disclose the limitation "obtaining the nodes traversed by an end-to-end path of said Bypass LSP from said Point of Local Repair Node to said Merge Point node." Thus, even if the Board declines to deny institution based on the *Fintiv* factors and addresses the merits of the Petition, the Board should therefore decline to institute *inter partes* review.

Respectfully Submitted,

Dated: March 17, 2025

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(Case No. IPR2025-00188)

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CERTIFICATION UNDER 37 C.F.R. § 42.24(d)

Under the provisions of 37 C.F.R. § 42.24(d), the undersigned hereby certifies that the word count for all portions of the foregoing Patent Owner's Preliminary Response totals 9,363 words per Microsoft Word, which complies with the requirement of 14,000 words allowed under 37 C.F.R. § 42.24(d).

Dated: March 17, 2025

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CERTIFICATE OF SERVICE

As authorized by Patent Owner's Mandatory Notice, I hereby certify that on March 17, 2025, a copy of this document has been served in its entirety by electronic mail on Petitioner's lead and backup counsel.

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