

UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE PATENT TRIAL AND APPEAL BOARD

MICROSOFT CORPORATION,
Petitioner

v.

INTERDIGITAL PATENT HOLDINGS, INC.,
Patent Owner

Case No. IPR2024-00306
Patent No. 9,173,054

PATENT OWNER'S SUR REPLY

Mail Stop "PATENT BOARD"
Patent Trial and Appeal Board
U.S. Patent and Trademark Office
P.O. Box 1450
Alexandria, VA 22313-1450

TABLE OF CONTENTS

I.	INTRODUCTION	1
II.	A PRESUMPTIVE NEXUS EXISTS BETWEEN THE CLAIMED INVENTION AND APPLE’S COMMERCIAL AIRDROP PRODUCT	1
	A. AirDrop embodies the claimed features because detection is done using Bluetooth.....	2
	B. AirDrop is coextensive with the claims because the claimed invention is the heart of AirDrop’s functionality	7
	C. The evidence presented does not rebut the presumption of nexus between AirDrop and the Challenged Claims	11
III.	SECONDARY CONSIDERATIONS OF NON-OBVIOUSNESS SHOW THE CHALLENGED CLAIMS ARE PATENTABLE	13
	A. The claimed invention was described before the release of AirDrop.....	15
	B. Petitioner’s arguments regarding an InterDigital license with Apple should be rejected.....	16
	C. Commercial success and industry praise.....	17
	D. Evidence of copying and long-felt but unsolved need based on continuous attempts to replicate the success of AirDrop	21
	E. The claimed invention was not disclosed in the prior art	24
IV.	CONCLUSION.....	25

TABLE OF AUTHORITIES

	Page(s)
CASES	
<i>Advanced Display Sys., Inc. v. Kent State University</i> , 212 F.3d 1272 (Fed. Cir. 2000)	21
<i>Apple Inc. v. Samsung Electronics Co.</i> , 839 F.3d 1034 (Fed. Cir. 2016)	17
<i>Brown & Williamson Tobacco Corp. v. Philip Morris Inc.</i> , 229 F.3d 1120 (Fed. Cir. 2000)	2
<i>Demaco Corp. v. F. Von Langsdorff Licensing Ltd.</i> , 851 F.2d 1387 (Fed. Cir. 1988)	7, 20
<i>Fox Factory, Inc. v. SRAM, LLC</i> , 944 F.3d 1366 (Fed. Cir. 2019)	passim
<i>Graham v. John Deere Co.</i> , 383 U.S. 1 (1966)	17
<i>In re Cyclobenzaprine Hydrochloride Extended-Release Capsule Patent Litig.</i> , 676 F.3d 1063 (Fed. Cir. 2012)	24
<i>In re GPAC Inc.</i> , 57 F.3d 1573 (Fed. Cir. 1995)	2
<i>In re Huang</i> , 100 F.3d 135 (Fed. Cir. 1996)	14
<i>Nested Bean, Inc. v. Big Beings USA Pty Ltd</i> , IPR2020-01234, Paper 34 (P.T.A.B. Jan. 24, 2022)	18
<i>Ormco Corp. v. Align Tech. Inc.</i> , 463 F.3d 1299 (Fed. Cir. 2006)	14
<i>Phillips v. AWH Corp.</i> , 415 F.3d 1303 (Fed. Cir. 2005)	4

<i>Polaris Indus., Inc. v. Arctic Cat, Inc.</i> , 882 F.3d 1056 (Fed. Cir. 2018)	2
<i>Quanergy Systems, Inc. v. Velodyne Lidar USA, Inc.</i> , 24 F.4th 1406 (Fed. Cir. 2022)	8, 9, 11
<i>Rambus Inc. v. Rea</i> , 731 F.3d 1248 (Fed. Cir. 2013)	13
<i>Stratoflex, Inc. v. Aeroquip Corp.</i> , 713 F.2d 1530 (Fed. Cir. 1983)	21
<i>Teva Pharms. Int’l GmbH v. Eli Lilly and Co.</i> , 8 F.4th 1349 (Fed. Cir. 2021)	8
<i>WBIP, LLC v. Kohler Co.</i> , 829 F.3d 1317 (Fed. Cir. 2016)	11, 13
<i>Wyers v. Master Lock Co.</i> , 616 F.3d 1231 (Fed. Cir. 2010)	2
STATUTES	
35 U.S.C. § 103	13

TABLE OF EXHIBITS

Exhibit	Description
2001	Declaration of George Edwards <i>(previously submitted)</i>
2002	June 21, 2022 Memorandum from Director Vidal to the Members of the Patent Trial and Appeal Board regarding Interim Procedure for Discretionary Denials in AIA Post-Grant Proceedings with Parallel District Court Litigation <i>(previously submitted)</i>
2003	Case Management Order, <i>InterDigital, Inc. et al. v. Lenovo Group Limited et al.</i> , Case No. 5:23-CV-493-FL, Dkt. No. 33 (E.D.N.C. Nov. 30, 2023) <i>(previously submitted)</i>
2004	Respondents' Invalidity Contentions in <i>Certain Electronic Devices, Including Smartphones, Computers, Tablet Computers, and Components Thereof</i> , Investigation No. 337-TA-1373 (ITC Nov. 28, 2023) <i>(previously submitted)</i>
2005	Appendix 1 to Respondents' Invalidity Contentions in <i>Certain Electronic Devices, Including Smartphones, Computers, Tablet Computers, and Components Thereof</i> , Investigation No. 337-TA-1373 (ITC Nov. 28, 2023) <i>(previously submitted)</i>
2006	Defendants' Preliminary Invalidity Contentions, <i>InterDigital, Inc. et al. v. Lenovo Group Limited et al.</i> , Case No. 5:23-CV-493-FL (E.D.N.C. Jan. 18, 2024) <i>(previously submitted)</i>
2007	iOS 7: What's new, https://web.archive.org/web/20130918185729/https://www.apple.com/ios/whats-new/ <i>(previously submitted)</i>
2008	OS X: How to use AirDrop, https://support.apple.com/en-us/HT203106 <i>(previously submitted)</i>
2009	Use AirDrop on your iPhone, iPad, or iPod touch, https://support.apple.com/en-us/HT204144 <i>(previously submitted)</i>
2010	RESERVED

Exhibit	Description
2011	About Bluetooth, Wi-Fi, and cellular on your iPhone, iPad, or iPod touch, https://support.apple.com/en-us/HT204681 <i>(previously submitted)</i>
2012	Use AirDrop on your Mac, https://support.apple.com/en-us/HT203106 <i>(previously submitted)</i>
2013	Compare iPhone models, https://www.apple.com/iphone/compare/?modelList=iphone-14-pro,iphone-15-pro,iphone-15 <i>(previously submitted)</i>
2014	Apple Platform Security, AirDrop security, https://support.apple.com/guide/security/airdrop-security-sec2261183f4/1/web/1 <i>(previously submitted)</i>
2015	How to use AirDrop on your iPhone or iPad, https://support.apple.com/en-us/HT204144 <i>(previously submitted)</i>
2016	How to use AirDrop on your iPhone or iPad, IDG1373_0003864–3866 <i>(previously submitted)</i>
2017	InterDigital Form 8-K, filed by InterDigital, Inc. with the Securities and Exchange Commission on October 2, 2022 <i>(previously submitted)</i>
2018	InterDigital Form 10-K, filed by InterDigital, Inc. with the Securities and Exchange Commission on February 13, 2023 <i>(previously submitted)</i>
2019	Mike Dano, <i>InterDigital inks seven-year, \$938M patent deal with Apple</i> , Light Reading, https://www.lightreading.com/5g/interdigital-inks-seven-year-938m-patent-deal-with-apple#close-modal <i>(previously submitted)</i>
2020	Apple Unveils iOS 7, https://www.apple.com/newsroom/2013/06/10Apple-Unveils-iOS-7/ <i>(previously submitted)</i>
2021	RESERVED

Exhibit	Description
2022	RESERVED
2023	Brian Hall, <i>How iOS 7's AirDrop Could Transform the Way We Share</i> , ReadWrite, June 28, 2013, https://readwrite.com/ios-7s-airdrop-has-the-potential-to-dramatically-change-how-we-share-content/ (previously submitted)
2024	Lucy Hattersley, <i>AirDrop Review</i> , Macworld, Sept. 29, 2013, https://www.macworld.com/article/667098/airdrop-review.html (previously submitted)
2025	Adrian Kingsley-Hughes, <i>5 Thing Apple Needs to Fix in iOS, OS X and iCloud</i> , Forbes, Apr. 17, 2013, https://www.forbes.com/sites/adriankingsleyhughes/2013/04/17/5-things-apple-needs-to-fix-in-ios-os-x-and-icloud/?sh=5fc4eb5b49c0 (previously submitted)
2026	Georgi Zarkov, <i>With Samsung's Answer to AirDrop, You Can Even Send Files to Your Fridge</i> , Phone Arena, Jan. 24, 2020 (previously submitted)
2027	Chris Hoffman, <i>AirDrop 101: Easily Send Content Between Nearby iPhones, iPads, and Macs</i> , How-To-Geek, Jan. 31, 2015, https://www.howtogeek.com/208143/use-airdrop-to-wirelessly-send-content-between-nearby-iphones-ipads-and-macs/ (previously submitted)
2028	Catherine Shu, <i>Google to Close Bump and Flock, Its Recently Acquired File Sharing Apps</i> , Tech Crunch, Jan. 1, 2014, https://techcrunch.com/2013/12/31/google-to-close-bump-and-flock-its-recently-acquired-file-sharing-apps/ (previously submitted)
2029	Padla Rei, <i>Android Beam API Being Deprecated by Google</i> , Android Community, Dec. 20, 2018, https://androidcommunity.com/android-beam-api-being-deprecated-by-google-20181220/ (previously submitted)

Exhibit	Description
2030	Pratik Ghone, <i>How to Nearby Share? Apple has AirDrop; Android has Nearby Share</i> , Exhibit.tech, Feb. 20, 2024, https://www.exhibit.tech/trending-tech-news/how-to-nearby-share-apple-has-airdrop-android-has-nearby-share (previously submitted)
2031	Tomio Geron, <i>Google Acquires Bump Mobile App</i> , Forbes, September 16, 2013, https://www.forbes.com/sites/tomiogeron/2013/09/16/google-acquires-bump-mobile-app/?sh=30f58b322975 (previously submitted)
2032	Charles Arthur, <i>Google Buys Smartphone File-Swapping App Bump as Sharing Grows</i> , The Guardian, Sept. 17, 2013, https://www.theguardian.com/technology/2013/sep/17/google-bump-smartphone-apple-airdrop (previously submitted)
2033	Anthony Wing Kosner, <i>Apple Has Developers (Mostly) Convinced that iOS 7 Will Make Them More Money</i> , Forbes, June 12, 2013, https://www.forbes.com/sites/anthonykosner/2013/06/12/apple-has-developers-mostly-convinced-that-ios-7-will-make-them-more-money/?sh=299b3ced71d7 (previously submitted)
2034	Christopher de Looper, <i>Android's Nearby Share Just Can't Compete with AirDrop</i> , DigitalTrends, Feb. 9, 2021, https://www.digitaltrends.com/mobile/android-nearby-share-stacks-up-against-apple-airdrop/ (previously submitted)
2035	Jacob Kastrenakes, <i>Google's Files Go App is Kind of Like AirDrop for Android</i> , The Verge, Nov. 7, 2017, https://www.theverge.com/2017/11/7/16617380/google-files-go-app-android-airdrop-file-management (previously submitted)
2036	Tom Warren, <i>Windows 10's Version of AirDrop Lets You Quickly Share Files Between PCs</i> , The Verge, Nov. 8, 2017, https://www.theverge.com/2017/11/8/16625130/microsoft-windows-10-airdrop-near-share-feature (previously submitted)

Exhibit	Description
2037	Mishaal Rahman, <i>Google's Fast Share is an Upcoming AirDrop-like File Sharing Tool for Android</i> , XDA Developers, June 29, 2019, https://www.xda-developers.com/fast-share-android-beam-airdrop-android/ (previously submitted)
2038	Aamir Siddiqui, <i>Fast Share, Google's Upcoming AirDrop-like Service, Gets Renamed to Nearby Sharing Ahead of Release</i> , XDA Developers, Jan. 13, 2020, https://www.xda-developers.com/fast-share-google-upcoming-airdrop-service-renamed-nearby-sharing/ (previously submitted)
2039	Richard Nieva, <i>Android is Finally Getting Its Version of Apple's AirDrop</i> , CNet, Aug. 4, 2020, https://www.cnet.com/tech/mobile/android-is-finally-getting-its-version-of-apples-airdrop-called-nearby-share/ (previously submitted)
2040	David Pierce, <i>Google's AirDrop Competitor, Nearby Share, is Reportedly Getting a Big Upgrade</i> , The Verge, Apr. 19, 2022, https://www.theverge.com/2022/4/19/23032545/google-nearby-share-airdrop-update-android (previously submitted)
2041	Max Weinbach, <i>Quick Share is Samsung's Alternative to AirDrop for Galaxy Phones</i> , XDA Developers, Jan. 23, 2020, https://www.xda-developers.com/quick-share-samsung-alternative-airdrop-galaxy-phones/ (previously submitted)
2042	Lisa Eadicicco, <i>Samsung just added 2 of the iPhone's most-coveted features to its new Galaxy S20 phones</i> , Bus. Insider, Feb. 12, 2020, https://www.businessinsider.com/samsung-galaxy-s20-apple-iphone-best-features-airdrop-facetime-2020-2 (previously submitted)
2043	Steven Musil, <i>Samsung Reportedly Working on Quick Share, an AirDrop-like Sharing Feature</i> , CNet, Jan. 23, 2020, https://www.cnet.com/tech/mobile/samsung-reportedly-working-on-quick-share-an-airdrop-like-sharing-feature/ (previously submitted)

Exhibit	Description
2044	Chris Welch, <i>Samsung Confirms its AirDrop-like ‘Quick Share’ is Launching on the Galaxy S20</i> , The Verge, Feb. 11, 2020, https://www.theverge.com/2020/2/11/21133825/samsung-galaxy-s20-quick-share-airdrop-easy-sharing-feature (<i>previously submitted</i>)
2045	Nelson Aguilar, <i>AirDrop for Windows? Check Out Android's New File-Sharing Tool for the PC</i> , CNet, July 20, 2023, https://www.cnet.com/tech/services-and-software/airdrop-for-windows-check-out-androids-new-file-sharing-tool-for-the-pc/ (<i>previously submitted</i>)
2046	Aisha Malik, <i>Google and Samsung are merging Nearby Share and Quick Share into a singular cross-Android solution</i> , Tech Crunch, Jan. 9, 2024, https://techcrunch.com/2024/01/09/google-and-samsung-are-merging-nearby-share-and-quick-share-into-a-single-sharing-solution/ (available at https://web.archive.org/web/20240915140652/https://techcrunch.com/2024/01/09/google-and-samsung-are-merging-nearby-share-and-quick-share-into-a-single-sharing-solution/) (last visited September 25, 2024) (<i>previously submitted</i>)
2047	Google announces AirDrop-like feature called Quick Share for Pixel phones; <i>Know how it will work</i> , The Bus. Standard, Feb. 1, 2024, https://www.tbsnews.net/tech/google-announces-airdrop-feature-called-quick-share-pixel-phones-know-how-it-will-work-785766 (<i>previously submitted</i>)
2048	Order No. 18: Initial Determination Granting-in-Part Joint Motion to Amend the Procedural Schedule and Extend the Target Date by One Month, <i>Certain Electronic Devices, Including Smartphones, Computers, Tablet Computers, and Components Thereof</i> , Investigation No. 337-TA-1373 (ITC Dec. 20, 2023) (<i>previously submitted</i>)

Exhibit	Description
2049	Microsoft Support, Sharing things with nearby devices in Windows, https://support.microsoft.com/en-us/windows/share-things-with-nearby-devices-in-windows-0efbfe40-e3e2-581b-13f4-1a0e9936c2d9 <i>(previously submitted)</i>
2050	Microsoft Support, Fix problems with nearby sharing in Windows, https://support.microsoft.com/en-us/windows/fix-problems-with-nearby-sharing-in-windows-e6f5db3a-48c3-04f6-13d6-84db6f821455 <i>(previously submitted)</i>
2051	Windows Experience Blog, What's new in the Windows 10 April 2018 Update, https://blogs.windows.com/windowsexperience/2018/04/30/whats-new-in-the-windows-10-april-2018-update/ <i>(previously submitted)</i>
2052	Kevin Parrish, <i>How to Use Nearby Share on Android Devices</i> , DigitalTrends, Feb. 26, 2021, https://www.digitaltrends.com/mobile/how-to-use-nearby-share-on-android/ <i>(previously submitted)</i>
2053	Ed Bott, <i>Windows 10 Tip: Use Nearby Sharing to Transfer Files, Photos, and More</i> , ZDNet, July 14, 2018, https://www.zdnet.com/article/windows-10-tip-use-nearby-sharing-to-transfer-files-photos-and-more/ <i>(previously submitted)</i>
2054	Michael Muchmore, <i>How to Use Nearby Sharing in Windows 10</i> , PCMag, May 4, 2018, https://www.pcmag.com/how-to/how-to-use-nearby-sharing-in-windows-10 <i>(previously submitted)</i>
2055	Declaration of Nathaniel E. Frank-White, July 25, 2024 <i>(previously submitted)</i>
2056	Shel Israel, <i>Why Apple Had To Release Its Terrible Maps App Now</i> , Forbes, September 29, 2012 (updated October 1, 2012), https://www.forbes.com/sites/shelisrael/2012/09/29/apples-maps-strategy-china-today-tomorrow-the-world/

Exhibit	Description
2057	Mark Bonchek and William Patrick, <i>Why Apple Music Missed a Beat</i> , Harvard Business Review, September 25, 2015, https://hbr.org/2015/09/why-apple-music-missed-a-beat
2058	Julian Chokkattu, <i>Review: Apple Vision Pro</i> , WIRED, March 20, 2024, https://www.wired.com/review/apple-vision-pro/

I. INTRODUCTION

Microsoft Corporation (“Petitioner” or “Microsoft”) and its real-party-in-interest (“RPI”), Lenovo’s, arguments in their Reply to Patent Owner’s Response (Paper 33, “Reply”) are unpersuasive and fail to overcome the compelling secondary considerations that merit patentability for the Challenged Claims. Petitioner fails to rebut the presumption of nexus afforded to the Challenged Claims. Further, even if Petitioner is found to have rebutted the presumption of nexus, Petitioner has failed to show that a nexus does not exist between the secondary considerations and the Challenged Claims. In an effort to avoid a finding of clear nexus, Petitioner improperly reads limitations into the Challenged Claims and incorrectly suggests that because Apple’s AirDrop product uses Wi-Fi, it is not embodied by the Challenged Claims. Both of these arguments fail.

Further, even if the Board finds that a presumption of nexus doesn’t exist, Patent Owner has shown that a nexus in fact exists between the Challenged Claims and AirDrop. For these reasons, the Board should find the Challenged Claims patentable over the cited prior art.

II. A PRESUMPTIVE NEXUS EXISTS BETWEEN THE CLAIMED INVENTION AND APPLE’S COMMERCIAL AIRDROP PRODUCT

For evidence of secondary considerations of obviousness “to be accorded substantial weight, its proponent must establish a nexus between the evidence and

the merits of the claimed invention.” *Wyers v. Master Lock Co.*, 616 F.3d 1231, 1246 (Fed. Cir. 2010) (quoting *In re GPAC Inc.*, 57 F.3d 1573, 1580 (Fed. Cir. 1995)). A patentee is entitled to a presumption of nexus “when the patentee shows that the asserted objective evidence is tied to a specific product and that product ‘embodies the claimed features, and is coextensive with them.’” *Fox Factory, Inc. v. SRAM, LLC*, 944 F.3d 1366, 1373 (Fed. Cir. 2019) (quoting *Polaris Indus., Inc. v. Arctic Cat, Inc.*, 882 F.3d 1056, 1072 (Fed. Cir. 2018) (quoting *Brown & Williamson Tobacco Corp. v. Philip Morris Inc.*, 229 F.3d 1120, 1130 (Fed. Cir. 2000))). In other words, a presumption of nexus is proper when the “patentee shows that the asserted evidence is tied to a specific product and that product ‘is the invention disclosed and claimed.’” *Id.* The patentee must only “demonstrate that the product is essentially the claimed invention.” *Id.* at 1374. “Thus, if [additional] unclaimed features amount to nothing more than . . . insignificant features, presuming nexus may nevertheless be appropriate.” *Id.*

As shown below, Petitioner failed to rebut the presumption of nexus between the Challenged Claims and AirDrop.

A. AirDrop embodies the claimed features because detection is done using Bluetooth

Petitioner asserts that a presumption of nexus does not exist because “AirDrop does not embody the claims, at least because it does not perform the claimed

‘detecting, by the WTRU using Bluetooth, a plurality of other WTRUs.’” Reply at 3. This is untrue. Petitioner first argues that AirDrop does not embody the Challenged Claims because in AirDrop the sending WTRU does not receive a signal from the plurality of detected WTRUs via Bluetooth. *Id.* at 4. Petitioner tries to conflate “detecting” with receiving signals which shortchanges the meaning of detecting, ultimately improperly reading a limitation into the “detecting” limitation. *See id.* Detecting, as claimed, includes the process of identifying other WTRUs and only requires that Bluetooth is involved at some point in the detection. Petitioner, however, attempts to improperly insert a limitation requiring that *only* Bluetooth can be used when “detecting.” Petitioner’s argument ignores the fact that Bluetooth is still used by the WTRU to detect a plurality of WTRUs as allowed by the claims.¹ The fact that AirDrop establishes a peer-to-peer Wi-Fi signal is not prohibited by the claims as Petitioner suggests, rather, it is required.²

Petitioner muddies the waters by arguing “[a]t best, the Bluetooth signal emitted by the sending device *solicits* nearby devices to respond using Wi-Fi.” *Id.*

¹ Petitioner concedes that in AirDrop, the WTRU “emits a Bluetooth signal” to detect the plurality to WTRUs. *See* Reply at 3-4.

² Claim limitations 1[f] and 23[f] require transferring “by the WTRU to the selected another WTRU over WiFi” Ex-1001, 10:66-65, 12:6-7.

This, however, is Petitioner improperly reading limitations into the claim language. *See Phillips v. AWH Corp.*, 415 F.3d 1303, 1323 (Fed. Cir. 2005) (noting the importance of “avoid[ing] the danger of reading limitations from the specification into the claim”). Petitioner points to one specific embodiment in the specification and drawings to show that the WTRU merely “solicits” rather than detects. Reply at 5 (“For example, FIG. 4 shows that detection occurs ‘in response to solicitation’”). But this argument is fatally flawed. The Federal Circuit has acknowledged that “although the specification often describes very specific embodiments of the invention, we have *repeatedly warned against* confining the claims to those embodiments.” *Phillips*, 415 F.3d at 1323 (citations omitted) (emphasis added). Yet this is exactly what Petitioner is attempting to do.

The one claim limitation³ Petitioner argues is not embodied by AirDrop, limitation 1[b] recites, “detecting, by the WTRU over Bluetooth, another WTRU” Ex-1001, 10:57. Petitioner argues that because claim limitation 1[b] does not

³ Petitioner also challenges claim limitation 23[b], but for the purposes of this sur-reply both limitations are materially the same. *See* Reply at 3 (“Claim elements [1.3] and [23.3] require that a sending device detect other devices using Bluetooth”); Ex-1001, 11:64-65 (“circuitry configured to detect, by the WTRU over Bluetooth, another WTRU”).

claim the use of Wi-Fi in detecting the plurality of WTRUs, AirDrop does not embody the claims. *See* Reply at 6 (“the written description describes using Bluetooth for discovery (EX1001, 5:38-6:3) but makes no mention of using Wi-Fi for discovery or detection”). This interpretation, however, reads into the plain language of claims 1 and 23 that *only* Bluetooth may be used in detecting the plurality of WTRUs in proximity to the WTRU. Nowhere in the Challenged Claims is the detecting of the plurality of WTRUs limited to only Bluetooth. *See* Ex-1001, 10:53-13:19. Claim limitation 1[b] only requires that Bluetooth be used in some capacity in detecting the plurality of WTRUs, not that *only* Bluetooth be used in the detection process. In fact, Petitioner’s argument bolsters Patent Owner’s nexus between AirDrop and the Challenged Claims because it acknowledges that a Wi-Fi communication channel is established that can later be used to transfer files as required by claim limitations 1[f] and 23[f]. Ex-1001, 10:64-65 (“transferring, by the WTRU to the selected another WTRU over WiFi, the selected media.”). It is undisputed that AirDrop uses Bluetooth when searching for WTRUs in proximity. Reply at 4 (“the Bluetooth signal emitted by the sending device *solicits* nearby devices to respond”) (emphasis in original); Paper 22 at 10 (“AirDrop enables information to be shared between wireless devices by using Bluetooth to discover and pair devices”). Just because the “sending” WTRU receives a peer-to-peer Wi-Fi

signal in AirDrop does not alter the fact that Bluetooth was also used in the detection process when the “sending” WTRU detects proximate WTRUs via Bluetooth.

Detecting using Bluetooth is undeniably present in AirDrop. For AirDrop to work, both the WTRU and the plurality of WTRUs must have Bluetooth turned on:

How to use AirDrop on your iPhone or iPad

Use AirDrop to share and receive photos, documents, and more with other Apple devices that are nearby.

Before you begin

- Make sure that the person you're sending to is nearby and within Bluetooth and Wi-Fi range.
- Check that you and the person you're sending to have Wi-Fi and Bluetooth turned on. If either of you have Personal Hotspot on, turn it off.
- Check if the person you're sending to has their AirDrop set to receive from Contacts Only. If they do, and you're in their Contacts, they need to have your Apple ID's email address or mobile number in your contact card for AirDrop to work.
- If you're not in their Contacts, have them [set their AirDrop receiving setting to Everyone](#) in order to receive the file.

You can put your AirDrop receiving setting to [Contacts Only](#) or [Receiving Off](#) at any time to control who can see your device and send you content in AirDrop.

Ex-2016, 2 (How to use your iPhone or iPad) (annotated). This proves that AirDrop does not work without using Bluetooth for detection. If that is not the case, Petitioner has failed to present any evidence to the contrary.

Further, Petitioner ignores the other five claim limitations recited in Claim 1, which can be taken as an admission that the other five claim limitations are embodied in AirDrop. Instead, Petitioner relies on a limitation that **isn't** present in the “detecting” limitation of the Challenged Claims to attempt to rebut the presumption of nexus between the Challenged Claims and AirDrop.

Thus, Petitioner’s argument that “[a]t best, the Bluetooth signal emitted by the sending device *solicits* nearby devices to respond using Wi-Fi. But any detecting by the sending device happens separately, using identity information sent over peer-to-peer Wi-Fi” falls short. Reply at 4. It is clear that AirDrop embodies the claims and supports a presumption of nexus between the Challenged Claims and AirDrop.

B. AirDrop is coextensive with the claims because the claimed invention is the heart of AirDrop’s functionality

Petitioner further asserts that the Challenged Claims are not coextensive with AirDrop. Reply at 6-7. AirDrop, however, is coextensive with the Challenged Claims because all unclaimed features are insignificant. A presumption of nexus is appropriate when the product is coextensive with the claimed invention. *Fox Factory*, 944 F.3d at 1373. A product is coextensive with the claimed invention when the product is the invention that is “disclosed and claimed.” *Id.* at 1374 (quoting *Demaco Corp. v. F. Von Langsdorff Licensing Ltd.*, 851 F.2d 1387, 1392 (Fed. Cir. 1988)). This does not mean, however, that the product must be perfectly described by the claims. *Id.* (“Indeed, there is rarely a *perfect correspondence* between the claimed invention and the product” (emphasis in original)). In fact, the only requirement is that “the patentee demonstrate that the product is essentially the claimed invention.” *Id.* (citing *Demaco*, 851 F.2d at 1392). Importantly, “the mere existence of one or more unclaimed features does not necessarily mean presuming

nexus is inappropriate.” *Id.* at 1376. A presumption of nexus can be improper when the unclaimed features are significant. *Quanergy Systems, Inc. v. Velodyne Lidar USA, Inc.*, 24 F.4th 1406, 1418 (Fed. Cir. 2022) (citing *Teva Pharms. Int’l GmbH v. Eli Lilly and Co.*, 8 F.4th 1349, 1361 (Fed. Cir. 2021)) (“the fact finder must consider the unclaimed features of the stated products to determine their level of significance and their impact on the correspondence between the claim and the products”). Unclaimed features are significant when they are “critical” and “materially impact[] the product’s functionality.” *Id.*

Petitioner argues that AirDrop is not coextensive with the claimed invention because “AirDrop includes significant, unclaimed features.” Reply at 7. While AirDrop contains unclaimed features, none of the features are significant, particularly to the comparison between AirDrop and the Challenged Claims. Petitioner claims that AirDrop’s unclaimed features, such as “device visibility controls implemented using iCloud services-based authentication; security, including encryption; and tight integration within the Apple ecosystem” prove that AirDrop is not coextensive with the claimed invention. *Id.* at 7-8. However, none of these features are “critical” to the functionality of AirDrop.

AirDrop is an application used on Apple devices that allows users to “share and receive photos, documents, and more.” Ex-2015, 1 (Ex-2055, 84-88). The only “critical” feature or feature that “materially impacts [AirDrop’s] functionality” is the

ability to detect other devices using Bluetooth and further establishing a Wi-Fi communication channel for the transfer of files. While the unclaimed features Petitioner points to may have some value to consumers or may be useful in some context, none of these unclaimed features are “critical” or “material” to the core functionality of AirDrop, which is the seamless transfer of files between two devices.

Further, the fact that AirDrop only works within the Apple ecosystem is not a “significant unclaimed feature” as claimed by Petitioner. Reply at 10. The compatibility of an application with various devices is irrelevant to the core functionality of the application. Apple’s internal design choice, that AirDrop is only compatible with Apple devices, is not a “feature” at all, it is simply just that: a design choice. Apple’s choice to not make AirDrop available on third-party devices is not material to the underlying functionality of AirDrop. *See Quanergy Systems*, 24 F.4th at 1418. To hold otherwise would ensure that no feature on a cellular device operating on a first proprietary platform (like Apple’s iOS operating system) could ever have nexus with an identical feature operating on a second, competing proprietary platform (like Google’s Android system). Petitioner’s argument that “AirDrop benefited from the Apple ecosystem and market dominance” can only be true if every Apple product or software benefits from the same, which isn’t true. *See e.g.*, Ex-2056; Ex-2057; Ex-2058. Petitioner paints with a broad brush, seeking to distinguish AirDrop from the Challenged Claims by focusing on features far afield

from the claims themselves. The Board should reject this argument and Petitioner's artificial construct of "the Apple ecosystem" because it has no support in law and seeks to draw an artificial line that would require perfect identity between Challenged Claims and implementations to which those claims have nexus.

Petitioner makes a conclusory statement that "certain features show that AirDrop at best is a software component of Apple products" which confuses the crux of the analysis. Reply at 10 (citing *Fox Factory*, 944 F.3d at 1377). First, there is no dispute that AirDrop is a software component of, for example, an iPhone. But a comparison of the Challenged Claims to an iPhone is not the test for nexus. The test for nexus is whether a component of an iPhone, like AirDrop, is covered by the claims of the '933 and '054 patents – which has been definitively proven in the briefing. Second, Petitioner attempts to confuse the analysis by claiming that because AirDrop "is only a component of a commercially successful machine or process," a presumption of nexus cannot exist. *See id.* While that is true (e.g., that AirDrop is a component of the commercially successful iPhone), that analysis is only proper when a patentee attempts to claim the commercial success of the "commercially successful machine or process" rather than the commercial success of the component. Here, the patented invention, AirDrop, is commercially successful independently from the iPhone as evidenced by the secondary considerations. *Infra*

Section III. Patent Owner is not claiming the commercial success of the iPhone to show a presumptive nexus.

Any unclaimed features of AirDrop are not “critical” and do not “materially impact the functionality” of AirDrop, making Airdrop coextensive with the claimed invention. Petitioner’s smokescreen suggesting that other aspects of “the Apple ecosystem” somehow bear on the nexus between the Challenged Claims and AirDrop should be rejected as contrary to prevailing law. Thus, a presumption of nexus clearly exists between the Challenged Claims and AirDrop. *Quanergy*, 24 F.4th at 1417 (quoting *Fox Factory*, 944 F.3d at 1373 (citation omitted)) (“We presume a nexus ‘when the patentee shows that the asserted objective evidence is tied to a specific product and that product embodies the claimed features, and is coextensive with them.’”).

C. The evidence presented does not rebut the presumption of nexus between AirDrop and the Challenged Claims

Petitioner has failed to present sufficient evidence to rebut the presumption of nexus shown between the Challenged Claims and AirDrop. “A patent challenger may present evidence showing that the proffered objective evidence was ‘due to extraneous factors other than the patented invention.’” *Quanergy*, 24 F.4th at 1418 (quoting *WBIP, LLC v. Kohler Co.*, 829 F.3d 1317, 1329 (Fed. Cir. 2016)). Petitioner relies on (1) the reading in of a claim limitation from the specification that does not

exist in the Challenged Claims and (2) insignificant unclaimed features. Reply at 3-6; 7-11. Petitioner claims “extraneous factors such as Apple’s market share and ecosystem” should rebut the presumption of nexus between the Challenged Claims and AirDrop. *Id.* at 11. However, allowing broad “extraneous factors” that will exist in any case to rebut the presumption of nexus would lead to incongruous results. As noted above, such an approach would enable a party to argue that nexus can never exist when the subject matter of Challenged Claims is operating on separate, distinct, proprietary operating systems that will inevitably have differences. Petitioner is suggesting an exception here that would obviate the rule and preclude a finding of nexus based on the insignificant, unclaimed features to which Petitioner seeks to draw the Board’s attention. Finally, Petitioner wholly fails to point to specific features, and their alleged importance to the nexus analysis, that support its position, and this failure of proof is terminal to Petitioner’s arguments. Likewise, Petitioner repeats its unpersuasive argument that unclaimed features support a rebuttal of nexus.

Finally, Petitioner argues that AirDrop’s objective indicia is due to “features known in the art, such as detection using Bluetooth and transfer using Wi-Fi.” *Id.* However, this is an incorrect interpretation of the case law. The Federal Circuit has held that “[w]hile objective evidence of nonobviousness lacks a nexus if it exclusively relates to a feature that was ‘known in the prior art,’ the obviousness

inquiry centers on whether ‘the claimed invention as a whole’ would have been obvious.” *WBIP*, 829 F.3d at 1330 (quoting *Rambus Inc. v. Rea*, 731 F.3d 1248, 1257 (Fed. Cir. 2013)) (cleaned up). Here Petitioner has not suggested that the Challenged Claims are embodied in a single prior art reference “as a whole” and instead rely on combinations of prior art references under 35 U.S.C. § 103. For this reason, the combination of using Bluetooth for detection and Wi-Fi for data transfer, along with the other claimed features, is nonobvious and patentable in view of the secondary considerations provided by Patent Owner.

For these reasons, Petitioner has failed to rebut Patent Owner’s showing of a presumption of nexus between the Challenged Claims and Apple’s AirDrop product.

III. SECONDARY CONSIDERATIONS OF NON-OBVIOUSNESS SHOW THE CHALLENGED CLAIMS ARE PATENTABLE

Even if the Board does not find a presumption of nexus, a “nexus in fact” exists between the Challenged Claims and AirDrop.⁴ “A finding that a presumption of nexus is inappropriate does not end the inquiry into secondary considerations,” in fact, “the patent owner is still afforded an opportunity to prove nexus by showing

⁴ A presumption of nexus applies in this case, and Petitioner has failed to rebut that presumption. However, even if the Board finds that a presumption of nexus is not proper, Patent Owner has shown that a “nexus in fact” exists.

that the evidence of secondary considerations is the ‘direct result of the unique characteristics of the claimed invention.’ *Fox Factory*, 944 F.3d at 1373-74 (quoting *In re Huang*, 100 F.3d 135, 140 (Fed. Cir. 1996)).

Petitioner argues that Patent Owner fails to show how “any license, commercial success, praise or other supposed consideration are the direct result of any aspect of the claimed invention.” Reply at 12. Further, Petitioner repeats their insufficient arguments that the secondary considerations are somehow due to “unclaimed features or other extraneous factors.” *Id.* The exhibits provided by Patent Owner show that the secondary considerations are a “direct result of the unique characteristics of” the Challenged Claims. *Fox Factory*, 944 F.3d at 1374 (quoting *In re Huang*, 100 F.3d at 140).

Petitioner also claims that the secondary considerations related to Bluetooth for detection and Wi-Fi for data transfer cannot be used to support nonobviousness. Reply at 13 (citing *Ormco Corp. v. Align Tech. Inc.*, 463 F.3d 1299, 1312 (Fed. Cir. 2006)). However, the novel combination of the claims, including the combination of Bluetooth for detection and Wi-Fi for data transfer in WTRUs, were not, as a whole, present in the prior art and as a matter of law can be used to support nonobviousness. *Ormco*, 463 F.3d at 1312 (“[w]hen a patentee can demonstrate commercial success, usually shown by significant sales in a relevant market, and that the successful

product is the invention disclosed and claimed in the patent, it is presumed that the commercial success is due to the patented invention” (citation omitted)).

Therefore, the evidence disclosed by Patent Owner supports a direct connection between the novel features of the claim and objective indicia of nonobviousness.

A. The claimed invention was described before the release of AirDrop

Petitioner asserts that “AirDrop cannot support any objective indicia because AirDrop was released before the named inventors claimed or described the claimed features.” Reply at 13. However, Petitioner’s suggestion that Patent Owner copied AirDrop holds no water. First, the Patent Office allowed the claims to issue when filed, showing that the Examiner felt the language of the Challenged Claims was fully supported by the patent specification. Second, for the reasons discussed in the briefing in IPR2024-00537 and IPR2024-00538, the Patent Office was correct.⁵

⁵ To the extent that Petitioner is attempting to leverage priority arguments from the Papers in IPR2024-00537 and -00538 into this proceeding, this is improper. Petitioner did not challenge the priority dates of the challenged patents in this proceeding.

Therefore, the claimed invention was described prior to the release of AirDrop and the Board should consider the secondary indicia of nonobviousness presented by Patent Owner.

B. Petitioner’s arguments regarding an InterDigital license with Apple should be rejected

Petitioner argues that because there is no license of record, any arguments made by Patent Owner related to a license between InterDigital and Apple should be “afforded no weight.” Reply at 14. However, Petitioner has no one else to blame but themselves for the absence of a license in the record. Petitioner claims that Patent Owner sought an “overly restrictive” agreement that Petitioner couldn’t agree to and when Petitioner proposed a compromise, Patent Owner refused to agree. Reply at 14 n.2. In fact, third-party Apple would not agree to allow in-house counsel from Petitioner to have unrestricted access to one of their licensing agreements. Petitioner knew this because counsel for InterDigital in this proceeding served as an intermediary in attempting to negotiate the terms of a Protective Order and, unfortunately, agreement could not be reached. With that in mind, it is improper for Petitioner to now use Patent Owner’s failure to facilitate an agreed Protective Order between Petitioner and Apple as a sword when it’s “overly inclusive” proposed Protective Order served as a shield to ensure that no license agreement could be presented to the Board. Evidence of the existence of (but not the content of) the

license agreement in question can be found in public SEC filings. Ex-2017, 2 (InterDigital 8-K, October 3, 2022); Paper 22 at 36-37.

C. Commercial success and industry praise

Petitioner argues that Patent Owner did not provide any evidence of “sales or market share” and thus has provided no evidence of commercial success. Reply at 15. This argument fails. *See Apple Inc. v. Samsung Electronics Co.*, 839 F.3d 1034, 1054-56 (Fed. Cir. 2016) (upholding jury finding of nonobviousness where commercial success was shown in ways other than sales or market share); *see also Graham v. John Deere Co.*, 383 U.S. 1 (1966). Patent Owner has provided numerous exhibits emphasizing the commercial success afforded by AirDrop. Ex-2023, 1, 5 (Ex-2055, 68-73) (“How iOS 7’s AirDrop Could Transform the Way We Share” and “Airdrop possess the potential to spur new forms of sharing digital content and thus, potential new applications and even new businesses could spring from AirDrop”); Ex-2024, 4 (Ex-2055, 62-67) (“a fantastic technological implementation of frictionless file sharing”); Ex-2025, 1 (Ex-2055, 57-61) (“a great way to share files between systems, even big ones like video files or Photoshop files”); Ex-2024, 4 (Ex-2055, 62-67) (“[w]e’ve never encountered any system that makes it so easy to pass a file from one device to another”). Because AirDrop is embedded within Apple devices, Apple does not release public financial figures directly attributable to

AirDrop, making “sales or market share” impossible to show. However, industry commentary shows the commercial success that is attributable to AirDrop.

Next, Petitioner argues that the evidence of industry commentary provided by Patent Owner lacks “any broad industry sentiment or [fails to] include statements based on actual use of AirDrop or that the authors had sufficient industry knowledge to lend credibility to the statements.” Reply at 15. Petitioners cite to *Nested Bean, Inc. v. Big Beings USA Pty Ltd*, IPR2020-01234, Paper 34 at 46-47 (P.T.A.B. Jan. 24, 2022) for support, but *Nested Bean* is critically different. In *Nested Bean*, the Board gave the provided evidence of “customer reviews” limited weight because there was “no way of knowing whether the people reviewing the products on these general websites actually purchased and used the product.” *Id.* at 46. Unlike *Nested Bean*, the exhibits cited to by Patent Owner are from credible publishers, such as Forbes, and industry critics, such as MacWorld. *See* Ex-2023 (Ex-2055, 68-73); Ex-2024 (Ex-2055, 62-67); Ex-2025 (Ex-2055, 57-61).

Petitioner further argues that “even if considered, the cited exhibits show that any industry praise or success resulted from extraneous factors.” Reply at 16. Petitioner focuses on a single reference to support its flawed proposition that all the exhibits should be given little weight. *Id.*; Ex-2023, 5 (Ex-2055, 68-73). However, the exhibits each demonstrate that the industry praise is due to the claimed invention embodied in AirDrop. Ex-2023, 4 (Ex-2055, 62-67) (“AirDrop works by moving

media through the cloud, via Apple’s iCloud. It then establishes a Wi-Fi Direct connection between the devices to move files between points.”); Ex-2024, 2 (Ex-2055, 62-67) (“AirDrop uses Bluetooth to talk to iOS devices in the local area and then transfers files using Wi-Fi.”); Ex-2025, 1 (Ex-2055, 57-61) (“This feature allows files to be sent between Macs that are connected to the same Wi-Fi network.”). Further, if the evidence of industry praise that Patent Owner presented is attributable to “extraneous factors,” like “Apple’s unified ecosystem” as Petitioner asserts, then the same would be applicable to other Apple products and software, but it’s not. Ex-2056; Ex-2057; Ex-2058.

Petitioner argues that unclaimed security features were critical and prevent nexus. Reply at 17. Petitioner, however, strengthens Patent Owners’ commercial success evidence. Petitioner states that the evidence highlights “‘security concerns’ . . . and states that ‘users must have very easy controls over what content they choose to accept, when and from whom.’” *Id.* (quoting Ex-2023, 5-6 (Ex-2055, 68-73)). The Challenged Claims however account for this in claim limitations 1[d] and 1[e]. Ex-1001, 10:62-65 (“sending, by the WTRU, a message to transfer the selected media element to the selected WTRU; receiving, by the WTRU, an acceptance to transfer the selected media element to the selected WTRU”).

While “commercial success may be given little weight when ‘due to extraneous factors other than the patented invention, such as advertising, superior

workmanship, etc.’” Petitioner has not shown that is the case here. Reply at 17 (quoting *Demaco*, 851 F.2d at 1393). Petitioner argues that the commercial success is only because of Apple’s unified ecosystem, but provides no evidence supporting this assertion. Patent Owner has provided multiple articles denoting the success of AirDrop due to its ability to quickly locate nearby devices using Bluetooth and subsequently send files over Wi-Fi. Ex-2023 (Ex-2055, 68-73); Ex-2024 (Ex-2055, 62-67); Ex-2025 (Ex-2055, 57-61). This is also shown by the evidence of widespread copying of AirDrop by Apple’s competitors after release. *Infra* Section III.D.

Further, Petitioner asserts that there are “at least three flaws in Patent Owner’s assertion that AirDrop ‘differentiated itself . . . by utilizing Bluetooth detection to create a peer-to-peer system for Wi-Fi transmission of media between devices.’” Reply at 18 (quoting Paper 22, 39). First, Petitioner claims that Patent Owner’s exhibits suggest detection over Wi-Fi rather than Bluetooth, but that is false. *E.g.*, Ex-2024, 2 (Ex-2055, 62-67) (“AirDrop uses Bluetooth to talk to iOS devices in the local area and then transfers files using Wi-Fi.”). Second, while one exhibit (of many) may mistakenly imply that transmission of files is done over Bluetooth, this is disproven by Apple themselves. Ex-2014, 2 (Ex-2055, 89-91) (AirDrop uses “Apple-created peer-to-peer Wi-Fi technology to send files”). Third, the novel combination of the claim limitations was not well known in the prior art. *See infra* Section III.E.

Thus, based on the above, evidence of commercial success and industry praise show that the Challenged Claims are nonobvious and patentable.

D. Evidence of copying and long-felt but unsolved need based on continuous attempts to replicate the success of AirDrop

Petitioner disputes any evidence of copying or long-felt but unsolved needs. However, Petitioner's arguments misrepresent the evidence provided by Patent Owner. "Objective considerations such as failure by others to solve the problem and copying, 'may often be the most probative and cogent evidence' of nonobviousness." *Advanced Display Sys., Inc. v. Kent State University*, 212 F.3d 1272, 1285 (Fed. Cir. 2000) (quoting *Stratoflex, Inc. v. Aeroquip Corp.*, 713 F.2d 1530, 1538 (Fed. Cir. 1983)) (cleaned up). Petitioner focuses on "Bump" prior to AirDrop, rather than after the release of AirDrop. *See* Reply at 19. "Bump" was purchased by Google shortly after Apple released AirDrop, in a pursuit to copy the technology of AirDrop. Ex-2031, 1 (Ex-2055, 30-33); *See* Ex-2001 (Edwards Decl.) at ¶123. Prior to AirDrop, Bump worked by making two people "bump[] their phones together," which could be annoying and cumbersome. Ex-2031, 1 (Ex-2055, 30-33). In view of the impending release of AirDrop, Google purchased Bump in an attempt to copy AirDrop by upgrading Bump; however, this attempt failed. *See* Ex-2028, 1 (Ex-2055, 42-52) (Bump "failed to monetize successfully as other easy,

mobile-friendly ways to share information were developed, most notably Apple's AirDrop for iOS 7.").

Moreover, Patent Owner provided further evidence of attempted copying of AirDrop with Microsoft's Nearby Sharing and Google's Fast Share/Nearby Share. *See* Paper 22, 42-46. Microsoft's Nearby Sharing, however, never reached the success of AirDrop because Microsoft made the design choice to only allow compatibility between PCs compared to AirDrop's compatibility with many devices. Nevertheless, reviewers considered Nearby Sharing to be a copy of AirDrop. Ex-2053, 1 (Ex-2055, 153-159) (Nearby Sharing is "Windows 10 take on Apple's AirDrop."). Google's Fast Share/Nearby Share functions almost identically to AirDrop: "Rather than NFC, the service uses Bluetooth to initiate a handshake and then subsequently transfers files over a direct Wi-Fi connection." Ex-2038, 1 (Ex-2055, 227-230). Utilizing AirDrop's model of Bluetooth for detection and Wi-Fi for transfer, Google's Fast Share/Nearby Share saw some success. Ex-2040, 1 (Ex-2055, 219-222) ("When Google launched Nearby Share in 2020, Android users everywhere rejoiced. They finally had a tool to rival Apple's AirDrop, a simple way to move files between devices without having to attach them to an email or upload them to Google Drive just to download them again on a new device.").

Petitioner ignores that even since the filing of the Petition, Google and Samsung have continued to chase the success of AirDrop. In 2024, "Google

announced . . . at CES that it has collaborated with Samsung to combine their sharing solutions into a singular cross-Android solution under the Quick Share name.” Ex-2046, 1. “Apple’s AirDrop feature has been popular for a long time due to its ease of sharing contacts, images, files, etc,” and Google and Samsung are still playing catch up. This proves that AirDrop was filling a long-felt but unsolved need in the electronics industry. Ex-2047, 1 (Ex-20255, 192-195).

Petitioner further argues that Patent Owner has failed to show a long-felt but unsolved need for three additional reasons. Reply at 21. First, Petitioner argues that there was not a long-felt but unsolved need at the time of the patent’s filing date, but rather, AirDrop itself created the need. *Id.* This is untrue because the success of AirDrop, and the continued struggle of competitors to copy, shows that there was a long-felt but unsolved need for easy file transfers when a user is in proximity of another device. Second, Petitioner suggests, without evidence, that any need is derived from “interoperability / ecosystem issues” rather than the patented invention. *Id.* at 21-22. Here, Petitioner fails to show how this is the case, because Petitioner provides no evidence to support this argument. Third, Petitioner regurgitates their arguments from before, restating that Patent Owner has not shown any evidence of long-felt but unsolved need. *Id.* at 22. However, the evidence provided above by Patent Owner establishes that there indeed was a long-felt but unsolved need that was solved by the Challenged Claims and AirDrop.

Petitioner lobs one last Hail Mary by attempting to assert that Patent Owner does not “tie speed and convenience to any unique characteristic of claims 1 or 23.” *Id.* at 22. This argument fails because Patent Owner has been clear: The speed and convenience of AirDrop is directly the result of the claimed Bluetooth for proximity detection and Wi-Fi for fast file transfer.

Thus, based on the above, the Challenged Claims are nonobvious and patentable.

E. The claimed invention was not disclosed in the prior art

Petitioner argues that the claimed invention is disclosed in the prior art and therefore cannot support secondary considerations. Reply at 23. However, this argument doesn’t pass muster. Petitioner focuses on the Challenged Claims’ feature of Bluetooth for detection and Wi-Fi for file transfer, but substantially ignores the remaining claim elements and the combination of Bluetooth detection and Wi-Fi transfer embodied in the claims. *See id.* This is plainly evident since every Ground asserted in the Petition is an obviousness combination, rather than anticipation. While Petitioner pays lip service to the fact that secondary considerations “guard . . . against hindsight bias,” Petitioner ignores the significance of the reasoning. *In re Cyclobenzaprine Hydrochloride Extended-Release Capsule Patent Litig.*, 676 F.3d 1063, 1079 (Fed. Cir. 2012). Petitioner selectively presents its arguments to condition the Board to the conclusion that that the Challenged Claims must be

unpatentable, relying on hindsight bias. However, the truth is that the Patent Office found the Challenged Claims patentable at the time of filing, and since the Challenged Claims were embodied in AirDrop, the rest of the electronics industry has struggled to catch up. If the Challenged Claims were as obvious and well known in the prior art as Petitioner suggests, then the continued race to catch up to AirDrop that we've continued to see over a decade later would not exist.

Therefore, the Challenged Claims were not disclosed in the prior art and are patentable as nonobvious.

IV. CONCLUSION

For these reasons, Petitioner has failed to show that Challenged Claims 1 and 23 of the '054 Patent are unpatentable. Challenged dependent claims 2-9, 13-14, 20-22, 24-31, 33, 35-36, and 42-44, which depend from Claims 1 and 23, are patentable for the same reasons.

Dated: January 31, 2025

Respectfully submitted,

/s/ Scott W. Hejny

Scott W. Hejny

Reg. No. 45,882

shejny@mckoolsmith.com

Richard A. Kamprath

Reg. No. 65,320

rkamprath@mckoolsmith.com

MCKOOL SMITH, P.C.

300 Crescent Court, Suite 1200

Dallas, Texas 75201

Telephone: 214.978.4000

Facsimile: 214.978.4044

George Fishback

Reg. No. 76,345

gfishback@mckoolsmith.com

MCKOOL SMITH, P.C.

303 Colorado Street, Suite 2100

Austin, Texas 78701

Telephone: (512) 692-8700

Facsimile: (512) 692-8744

Counsel for Patent Owner, InterDigital

CERTIFICATION OF WORD COUNT

The undersigned hereby certifies that the portions of the above-captioned **PATENT OWNER'S SUR REPLY** specified in 37 C.F.R. § 42.24 has 5,597 words, in compliance with the 5,600 word limit set forth in 37 C.F.R. § 42.24(c)(4). This word count was prepared using Microsoft Word 2016.

Date: January 31, 2025

Respectfully submitted,

/s/ Scott W. Hejny
Scott W. Hejny
Reg. No. 45,882

CERTIFICATION OF SERVICE

The undersigned hereby certifies that the above-captioned **PATENT OWNER'S SUR REPLY** is being served on counsel for petitioner via electronic mail on, in its entirety on the following counsel of record for Petitioner:

Andrew M. Mason
Andrew.mason@klarquist.com

Sarah Jelsema
Sarah.jelsema@klarquist.com

Frank Morton-Park
Frank.morton-park@klarquist.com

Shelby Stepper
Shelby.stepper@klarquist.com

Samuel B. Thacker
Samuel.thacker@klarquist.com

Msft-Interdigital@klarquist.com.

Date: January 31, 2025

Respectfully submitted,

/s/ Scott W. Hejny
Scott W. Hejny
Reg. No. 45,882