IN THE UNITED STATES DISTRICT COURT FOR THE DISTRICT OF DELAWARE

GODO KAISHA IP BRIDGE 1,

Plaintiff,

DEMAND FOR JURY TRIAL

v.

C.A. No. 24-341-RGA

SEAGATE TECHNOLOGY LLC, SEAGATE TECHNOLOGY (US) HOLDING, INC., SEAGATE TECHNOLOGY (THAILAND) LIMITED, SEAGATE SINGAPORE INTERNATIONAL HEADQUARTERS PTE. LTD., and SEAGATE TECHNOLOGY (NETHERLANDS) B.V.,

Public Version -Filed: July 15, 2024

Defendants.

FIRST AMENDED COMPLAINT AND JURY DEMAND

Plaintiff Godo Kaisha IP Bridge 1 ("IP Bridge" or "Plaintiff") brings this civil action against Seagate Technology LLC ("STL"), Seagate Technology (US) Holding, Inc. ("STH"), Seagate Technology (Thailand) Limited ("Seagate Thailand"), Seagate Singapore International Headquarters Pte. Ltd. ("Seagate Singapore"), and Seagate Technology (Netherlands) B.V. ("Seagate Netherlands") (collectively, "Seagate" or "Defendants").

NATURE OF SUIT

- This is a civil action for patent infringement under the laws of the United States,
 U.S.C. § 1, et seq.
- 2. Defendants have infringed and continue to infringe one or more claims of U.S. Patent Nos. 7,884,403 (the "'403 patent"), 8,319,263 (the "'263 patent"), 11,737,372 (the "'372 patent"), 11,968,909 (the "'909 patent"), 10,367,138 (the "'138 patent"), 9,608,198 (the "'198 patent"), 9,123,463 (the "'463 patent"), 10,680,167 (the "'167 patent"), and 8,405,134 (the "'134

patent") (collectively, the "Asserted Patents") at least by making, using, selling, offering for sale, and importing into the United States devices that infringe, and were made by a process that infringes, one or more claims of each of the Asserted Patents, and induced and contributed to others' infringement of one or more claims of the Asserted Patents.

3. IP Bridge is the legal owner by assignment of the entire right, title, and interest in and to the Asserted Patents, which were duly and legally issued by the United States Patent and Trademark Office ("USPTO"). IP Bridge seeks monetary damages and injunctive relief to address past and ongoing infringement of its valuable patent portfolio.

THE PARTIES

- 4. Plaintiff Godo Kaisha IP Bridge 1 is a Japanese entity, with a place of business at c/o Sakura Sogo Jimusho, 1-11 Kanda Jimbocho, Chiyoda-ku, Tokyo, 101-0051 Japan.
- 5. Defendant Seagate Technology LLC is a corporation incorporated under the laws of the State of Delaware and has a place of business at 47488 Kato Road, Fremont, California 94538. It may be served through its registered agent for service, The Corporation Trust Company, Corporation Trust Center, 1209 Orange Street, Wilmington, DE 19801. On information and belief, Seagate Technology LLC is a wholly-owned subsidiary of Seagate Technology (US) Holdings, Inc.
- 6. Defendant Seagate Technology (US) Holdings, Inc. is a corporation incorporated under the laws of the State of Delaware and has a place of business at 47488 Kato Road, Fremont, California 94538. It may be served through its registered agent for service, The Corporation Trust Company, Corporation Trust Center, 1209 Orange Street, Wilmington, DE 19801.

- 7. Defendant Seagate Technology (Thailand) Limited is a Thailand corporation with a place of business at 1627 Moo 7, Teparuk Rd, Tambol Teparuk, Amphur Muang, Samutprakarn 10270, Thailand.
- 8. Defendant Seagate Singapore International Headquarters Pte. Ltd. is a Singapore corporation having a place of business at 90 Woodlands Avenue 7, Singapore 737911, Singapore. Defendant Seagate Singapore International Headquarters Pte. Ltd. also maintains an address at Koolhovenlaan 1, 1119 NB Schiphol-Rijk, The Netherlands.
- 9. Defendant Seagate Technology (Netherlands) B.V. is a Netherlands corporation having a place of business at Tupolevlaan 105, 1119 PA Schiphol-Rijk, The Netherlands.

 Defendant Seagate Technology (Netherlands) B.V. also maintains an address at Jubilee House,
 Globe Park, 3rd Ave., Marlow SL7 1EY, UK.
- 10. Defendants develop, manufacture, use, import, offer for sale, and sell certain products, including hard disk drives ("HDDs"), for consumers in the United States, including in the State of Delaware. For example, accused products were purchased at a Best Buy in Delaware.

JURISDICTION AND VENUE

- 11. This action arises under the patent laws of the United States, Title 35 of the United States Code. This Court has subject matter jurisdiction over this action pursuant to 28 U.S.C. §§ 1331 and 1338(a).
 - 12. This Court has personal jurisdiction over Defendants.
- 13. STH and STL are subject to general personal jurisdiction in the State of Delaware because they are incorporated in the State of Delaware, and thus reside in this District. In addition, on information and belief STH and STL have purposefully availed themselves of the benefits of doing business in the District of Delaware by designing, manufacturing, distributing, promoting, marketing, selling, offering for sale, and importing the Accused Products (defined

below) and deriving substantial revenue from such activities by placing those products into the stream of commerce with the expectation that they will be purchased by consumers within the District of Delaware.

- 14. On information and belief, Seagate Thailand makes HDDs in Thailand.

 https://efoia.bis.doc.gov/index.php/documents/export-violations/export-violations-2023/1497e2836/file. According to a 2011 press release, Seagate Thailand makes hard disk drives.

 https://investors.seagate.com/news/news-details/2011/Seagate-Thailand-Invests-1-Billion-BahtTo-Expand-Its-Operations-In-Thailand/default.aspx. According to Seagate's 2023 10-K, Seagate has two facilities in Thailand that manufacture drives and drive assemblies.

 https://d18rn0p25nwr6d.cloudfront.net/CIK-0001137789/73579808-2f43-4bde-9354cffac2ea1c41.pdf, p. 33.
- 15. According to publicly available importation records, Seagate Thailand regularly ships HDDs from foreign countries, such as China, Taiwan, Thailand, and Vietnam, to the United States. On information and belief, Seagate Thailand uses an agent, DSD Tracking of Redondo Beach, CA, as its importer of record for those HDDs that Seagate Thailand shipped to the United States. On information and belief, Seagate Thailand sells and offers for sale at least one of the Accused Products in the United States and imports into the United States at least one of the Accused Products directly and through its agent DSD Tracking.
- 16. For example, on information and belief Seagate Thailand manufactured the Seagate IronWolf Pro 16TB HDD and the Seagate Exos X24 HDD, shown below.

Seagate IronWolf Pro 16TB HDD

Seagate Exos X24 HDD



- 17. The Seagate IronWolf Pro 16TB HDD and the Seagate Exos X24 HDD each states it was a "Product of Thailand" (shown above).
- 18. The Seagate IronWolf Pro 16TB HDD is offered for sale from Best Buy within Delaware. https://www.bestbuy.com/site/6545785.p. The Seagate Exos X24 HDD is available on Amazon.com for shipment to Delaware. https://www.amazon.com/Seagate-Exos-Enterprise-Internal-Drive/dp/B0CM293XCL. On information and belief, Seagate Thailand makes the Seagate IronWolf Pro 16TB HDD and Seagate Exos X24 HDD in Thailand, imports them into the United States directly and through its agent, and then offers them for sale and sells them in the United States.

- 19. On information and belief, Seagate Thailand has purposefully availed itself of the benefits of doing business in the District of Delaware by selling, offering for sale, and importing into the United States the Accused Products and has derived substantial revenue from such activities by placing those products into the stream of commerce with the expectation that they will be purchased by consumers within the District of Delaware.
- 20. On information and belief, Seagate Singapore makes HDDs in Singapore and China. See https://efoia.bis.doc.gov/index.php/documents/export-violations/export-violations-2023/1497-e2836/file. According to publicly available importation records, Seagate Singapore regularly ships HDDs from foreign countries, such as China, to the United States. On information and belief, Seagate Singapore uses an agent, UPS Supply Chain Solutions of Alpharetta, GA, as its importer of record for those HDDs that Seagate Singapore ships to the United States. On information and belief, Seagate Singapore sells and offers for sale at least one of the Accused Products in the United States and imports into the United States at least one of the Accused Products directly and through its agent UPS Supply Chain Solutions.
- 21. For example, Seagate Singapore is listed as a manufacturer of the Seagate Expansion 18TB HDD, shown below.

Seagate Expansion 18TB HDD



- 22. The Seagate Expansion 18TB HDD is offered for sale from Best Buy within Delaware. https://www.bestbuy.com/site/6463054.p. On information and belief, Seagate Singapore makes the Seagate Expansion 18TB HDD in Singapore, imports them into the United States directly and through its agent, and then offers them for sale and sells them in the United States.
- 23. On information and belief, Seagate Singapore has purposefully availed itself of the benefits of doing business in the District of Delaware by selling, offering for sale, and importing into the United States one or more of the Accused Products and has derived substantial revenue from such activities by placing those products into the stream of commerce with the expectation that they will be purchased by consumers within the District of Delaware.
- 24. On information and belief, Seagate Netherlands sells, offers for sale, and works in concert with other Defendants to sell and offer for sale at least one of the Accused Products in

the United States. For example, on information and belief the Seagate IronWolf Pro 16TB HDD and the Seagate Exos X24 HDD both list the address of Seagate Netherlands, shown below.

Seagate IronWolf Pro 16TB HDD

Seagate Exos X24 HDD



- 25. The Seagate IronWolf Pro 16TB HDD is offered for sale from Best Buy within Delaware. https://www.bestbuy.com/site/6545785.p. The Seagate Exos X24 HDD is available on Amazon.com for shipment to Delaware. https://www.amazon.com/Seagate-Exos-Enterprise-Internal-Drive/dp/B0CM293XCL.
- 26. On information and belief, Seagate Netherlands has purposefully availed itself of the benefits of doing business in the District of Delaware by selling, offering for sale, and

working in concert with other Defendants to sell and offer for sale at least one of the Accused Products in the United States and has derived substantial revenue from such activities.

- 27. This Court has specific personal jurisdiction over Defendants at least because, on information and belief, they have made, sold and offered to sell the Accused Products in the United States, including in the District of Delaware, and have imported the Accused Products into the United States, including in the District of Delaware.
- 28. Venue is proper in this District under 28 U.S.C. §§ 1391 and 1400(b). STH and STL are incorporated in this District, and thus reside in this district.
- 29. Venue is proper against Seagate Thailand, Seagate Singapore, and Seagate Netherlands under 28 U.S.C. § 1391(c)(3) because they are foreign corporations and venue is proper in any district against a foreign corporation.
- 30. Defendants are properly joined because, on information and belief, they have acted in concert with each other to develop, design, manufacture, distribute, promote, market, sell, offer for sale and import the Accused Products in the United States and within Delaware. Accordingly, the relief requested in this action arises out of the same transaction, occurrence, or series of transactions and will require resolution of common questions of law and fact.

BACKGROUND

IP Bridge's Patented Technologies

31. IP Bridge owns a patent portfolio directed to magnetoresistive devices, such as hard disk drives, with a magnetic tunnel junction ("MTJ") ("MTJ Patent Portfolio") based on a magnesium oxide layer ("MgO"). The sole inventor of the patent portfolio, Dr. Shinji Yuasa, is widely recognized as a luminary in the field of MgO-based MTJs because of his fundamental contributions to the field. His patents cover a groundbreaking innovation that dramatically

improves the density of information that can be accurately written to and read from a hard disk drive.

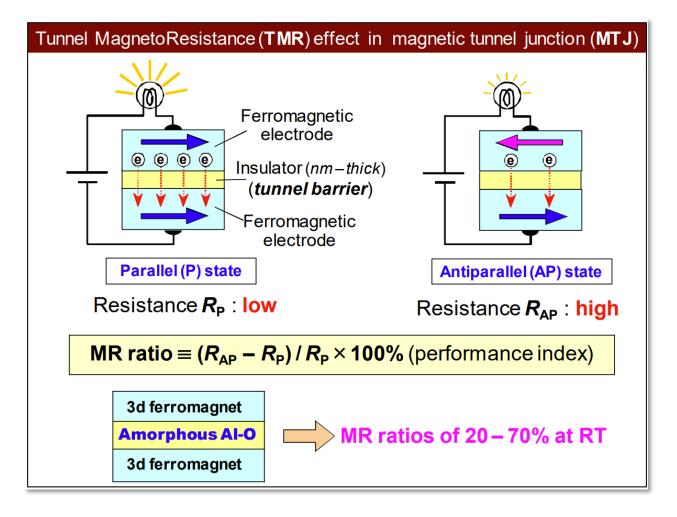
- 32. Dr. Yuasa received a PhD in Physics from Keio University (Yokohama, Japan) in 1996. After receiving his doctorate, he served as a staff scientist at the National Institute of Advanced Industrial Science and Technology ("AIST"). Since 2010, he has been a director of an AIST research center and a professor at University of Tsukuba. Since 2000, he has been studying thin film magnetism and spintronics, more specifically the tunnel magnetoresistance ("TMR") effect and spin-transfer torque ("STT") in magnetic tunnel junctions and their applications to various devices such as magnetic sensors and magnetoresistive random-access-memory ("MRAM"). According to the IEEE Magnetics Society, Dr. Yuasa's most important scientific achievements are the development of MgO-based MTJs and their applications to read/write heads of hard disk drives and STT-MRAM—precisely the subject of this complaint.
- 33. For his pioneering contribution to the MgO-based MTJs, Dr. Yuasa has been awarded or co-awarded more than 20 prizes, including:¹
 - The Science and Technology Prize (2016), by the Minister of Education, Culture, Sports, Science and Technology for "Studies on giant tunnel magnetoresistance effect."
 - JSPS Prize (2010) on "Development of High Performance Magnetic Tunnel Junction Devices."
 - Tsukuba Prize (2009 5 million yen) on "Discovery of giant tunnel magnetoresistance in MgO-based magnetic tunnel junctions and its industrial applications."
 - Inoue Harushige Prize (2009) on "Magnesium oxide tunnel magnetoresistive element and its mass production technology."
 - Prime Minister Prize (2008) on "Development of high-performance magnetic tunnel junctions for ultra-high-density hard disk drives."

¹ https://www.jst.go.jp/impact/sahashi/en/system/index.html

- Asahi Award (2008) on "Studies on development and application of tunnel magnetoresistive effect (TMR)."
- IBM Japan Science Prize (2007) on "Studies on tunnel magnetoresistive effects and their application."
- Tokyo Techno Forum 21 Gold Medal Prize (2006) on "Study on spintronics technology for MRAM."
- Marubun Science Prize (2006) on "Study on tunnel magnetoresistance effect."
- Ichimura Science Prize (2005). A prize of 1 million yen was awarded to S. Yuasa.
- The Young Scientists' Prize (2005) by the Minister of Education, Culture, Sports, Science and Technology on "Development of MgO-based magnetic tunnel junctions."
- 34. Dr. Yuasa is the sole inventor on the Asserted Patents, which resulted from his award-winning development of MgO-based MTJs in and before 2004. IP Bridge obtained ownership of the MTJ Patent Portfolio in 2021 by assignment from its previous owners (AIST and Japan Science and Technology Agency).
- 35. The Asserted Patents are directed to a particular structure for the read/write heads of hard disk drives ("HDD") that improves the density of information that can be accurately written to and read from an HDD.
- 36. More specifically, the Asserted Patents are directed to a MTJ structure comprising a thin insulating layer (a tunnel barrier layer) sandwiched between two ferromagnetic metal electrodes. The concept of a "tunnel barrier" is illustrated in the slide below.² The two electrodes produce electrical resistance. When the magnetization directions of the two ferromagnetic electrodes are aligned (as shown on the left below), the electrical resistance in the direction perpendicular to the interface between the layers is smaller than the electrical resistance when the two ferromagnetic electrodes have anti-parallel magnetization.³

² Dr. Yuasa's IEEE Distinguished Lecturer presentation, accessible at https://www.ewh.ieee.org/r6/scv/mag/MtgSum/Meeting2012_05_Presentation.pdf, pg. 12.

³ See Exhibit A, '403 Patent, 1:21-41, Figs. 8(A)-(B).



- 37. Based on this principle, magnetoresistive devices can use a MTJ structure to detect a change in magnetization by measuring electrical resistance. The percentage ratio of the different electrical resistances at the two magnetization alignments (parallel vs. anti-parallel) is referred to as a magnetoresistance ("MR") ratio, which is a known performance metric of magnetoresistive devices. The higher the MR ratio, the more sensitive the device is to detect changes in magnetization.
- 38. Dr. Yuasa's work improved MTJs in multiple respects. ('403 patent at 9:15-24 "In accordance with the invention, a larger magnetoresistance than in the conventional MTJ device can be obtained, and the output voltage of the MTJ device can be increased. At the same time, the resistance value of the MTJ device can be reduced so that it is optimized for MRAM. The

invention thus enables the level of integration of MRAM using the MTJ device to be readily increased. In accordance with the invention, the output voltage value of the MRAM roughly doubles over prior art, making the MTJ device of the invention suitable for very large scale integrated MRAMs of gigabit class."). For example, the MTJs can exhibit an increased MR ratio. ('403 patent at 9:15-17 "In accordance with the invention, a larger magnetoresistance than in the conventional MTJ device can be obtained, and the output voltage of the MTJ device can be increased."). Further, they can exhibit lower resistance and therefore can support higher electrical currents. ('403 patent at 6:52-56 "When there are oxygen vacancy defects, the potential barrier height of the MgO tunnel barrier is thought to decrease (such as in the range of 0.10 to 0.85 eV; more specifically, 0.2 to 0.5 eV), which is thought to result in an increase in the tunneling current.").

39. Before Dr. Yuasa's invention, conventional MTJ structures used an amorphous aluminum oxide ("Al-O") tunnel barrier layer with a small MR ratio of 70%. Dr. Yuasa recognized that when atoms in the tunnel barrier are arranged in an orderly fashion (e.g., using a crystalline MgO layer), as opposed to the amorphous Al-O layer, electrons are not scattered. This lack of scattering causes coherent tunneling to occur, which improves the MTJ device's performance. To that end, embodiments of the Asserted Patents are directed to the formation of a tunnel barrier that comprises a highly-ordered MgO tunnel barrier layer sandwiched between two ferromagnetic electrodes, as depicted below and in Figure 1(B) of the '403 Patent. The Asserted Patents disclose an MR ratio as high as 146% when measured at a temperature of 20

⁴ See '403 Patent, 2:21-31.

⁵ See '403 Patent, 5:9-14.

⁶ See '403 Patent, Fig. 1(B).

degrees Kelvin ("K"), and 88% at a temperature of 293K (i.e., room temperature), which "represent the highest MR ratios that have so far been obtained at room temperature."⁷

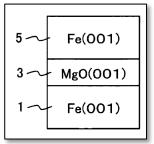


Fig. 1(B)

- 40. In some embodiments, the MgO layer is also formed with oxygen vacancy defects, such that the atomic ratio of Mg and O are no longer stoichiometric (that is, 1:1), but instead 1:x, where x < 1. The inventor recognized that when there are oxygen vacancy defects, a potential barrier height Φ of the MgO tunnel barrier is reduced from 3.6 electron volts ("eV") (for an ideal MgO crystal) to a range of 0.10 to 0.85 eV, and more specifically 0.2 to 0.5 eV, which lowers the resistance of the tunnel barrier. The patents describe a method (Simmons' formula) of how the tunnel barrier is determined.
- 41. Shortly after making this discovery, Dr. Yuasa filed the first priority Japanese patent application to the MTJ patent portfolio on March 12, 2004. Dr. Yuasa first published his research finding of a "giant MR ratio" based on MgO tunnel junctions in the *Japanese Journal of Applied Physics*, and in *Nature Materials* on April 2 and October 31 of the same year, respectively. ¹⁰ The *Nature Materials* paper has been cited almost 4,000 times according to Google Scholar.

⁷ See '403 Patent, 7:46-51.

⁸ See '403 Patent, 6:47-7:2.

⁹ See '403 Patent, 7:3-45.

¹⁰ Yuasa, S., Fukushima, A., Nagahama, T., Ando, K., & Suzuki, Y. (2004). "High tunnel

- 42. The Asserted Patents were well-known to manufacturers of HDDs because the Asserted Patents and their published applications are frequently cited during prosecution of patent applications owned by manufacturers of HDDs.
- 43. The Asserted Patents belong to a family whose members have been cited over 60 times in the prosecution of third-party patent applications. For example, the Asserted Patents and their published applications have been cited during prosecution of patent applications owned by Toshiba Corp., Hitachi Global Storage Technologies Netherlands B.V., Fujitsu Ltd., NEC Corp., TDK Corp., Samsung Electronics Co., Ltd., International Business Machines (IBM) Corporation, Western Digital Technologies, Inc., and Seagate Technology LLC.
- 44. Seagate was well-aware of Dr. Yuasa's' groundbreaking work. For example, in 2006 a group of Seagate researchers first reported using TMR heads in Seagate's HDDs. 11 In that report, the Seagate authors describe "[r]ecently published results using MgO as a barrier material has shown giant TMR ratios in excess of 100%," and cited a 2005 paper co-authored by Dr. Yuasa. The Seagate researchers recognized that Dr. Yuasa's breakthrough "provid[es] more opportunity for extending TMR recording head applications" and reported that "for the first time" the industry's "first commercial TMR heads [were] used in Seagate laptop and desktop drives."

magnetoresistance at room temperature in fully epitaxial Fe/MgO/Fe tunnel junctions due to coherent spin-polarized tunneling." *Japanese Journal of Applied Physics*, 43(4B), L588.; Yuasa, S., Nagahama, T., Fukushima, A., Suzuki, Y., & Ando, K. (2004). "Giant room-temperature magnetoresistance in single-crystal Fe/MgO/Fe magnetic tunnel junctions." *Nature Materials*, 3(12), 868-871.

¹¹ Mao, S., *et al.*, "Commercial TMR heads for hard disk drives: characterization and extendibility at 300 gbit2," *IEEE Transactions on Magnetics*, vol. 42, no. 2, pp. 97-102, Feb. 2006, doi: 10.1109/TMAG.2005.861788.

45. Consistent with Dr. Yuasa's invention, the Seagate researchers reported that their TMR reader had a barrier height in the claimed range of around 0.1 eV (i.e., 100 meV):

A. Tunnel Barrier Physics

Ultra-low RA tunneling stack fabrication is challenging in volume production. Typically, TMR readers exhibited classical parabolic tunneling negative resistance drop against the applied voltage or current. The current-voltage (*I-V*) characteristics were fit to the Brinkman-Dynes-Rowell model of tunneling [12], which revealed the barrier height to be around 100 meV with barrier width around 8.5 Å. It shows also typical negative

46. Defendants have further praised Dr. Yuasa's achievements in journal articles published by their researchers. For example, in a 2007 article co-authored by two Seagate employees, the authors made several extrapolations from Dr. Yuasa's *Nature Materials* paper. ¹² In a 2010 journal, lead author Sameh Hassan of Seagate cited Dr. Yuasa's work on annealing as having "attracted much attention for various kinds of materials." ¹³ In another 2013 article, several Seagate authors cited Dr. Yuasa's work multiple times as showing he "extensively studied" different issues "experimentally," including MTJs. ¹⁴ And Seagate researchers have repeatedly appeared at the same conference presentations as Dr. Yuasa. ¹⁵

¹² Runggera, I., Rochaa, A., Mryasovb, O., Heinonenc, O., Sanvito, S., "Electronic transport through Fe/MgO/Fe(1 0 0) tunnel junctions." *Journal of Magnetism and Magnetic Materials* 316 (2007) 481-483.

¹³ Hassan, S., *et al.*, "Interfacial structure and magnetic properties of Co2FeAl0.5Si0.5 /MgO heterostructures." *Journal of Applied Physics* 107, 103919 (2010).

¹⁴ Gangmei, P., Neudert, A., Marcham, M., Hicken, R., Gubbins, M., Cao, X., Lamberton, R., Johnston, A., "Thermal and spin-transfer-torque excitation of precessional modes in magnetic tunnel junction nanopillars with symmetric interfaces and a thick free layer." *Physical Review B*, 88, 134415 (2013).

¹⁵ For example, the AVS 50th International Symposium on Magnetic Interfaces and Nanostructures (https://www2.avs.org/symposium2003/Sessions/Session_MI-MoA.html), the 2018 NIMS Award Ceremony and Award Lecture (https://www.nims.go.jp/nimsweek/2018/pdf/

- 47. Defendants have also cited Dr. Yuasa's work in their own patents. For example, STL's U.S. Patent No. 8,551,626, directed to a "CCP-CPP magnetoresistive reader with high GMR value," at 1:40-45 discusses Dr. Yuasa's published U.S. Patent Application No. 2008/0026253 as providing a useful example of a GMR device. The examiner also cited Dr. Yuasa's published application to STL in prosecution.
- 48. As another example, STL cited the '134 patent in an Information Disclosure Statement (IDS) to the USPTO during the prosecution of STL's U.S. Patent No. 9,633,678 (the "'678 patent") on September 29, 2015.

IP Bridge's Asserted Patents

- 49. This complaint focuses on three IP Bridge patents.
- 50. IP Bridge is the current owner by assignment of the entire right, title, and interest in and to the '403 patent titled "Magnetic Tunnel Junction Device and Memory Device Including the Same." The '403 patent issued on February 8, 2011. The patent is generally directed to a particular structure of magnetoresistive devices, such as the read/write heads of HDDs that improves the density of information that can be accurately written to and read from an HDD. A copy of the '403 patent is attached as Exhibit A.
- 51. IP Bridge is the current owner by assignment of the entire right, title, and interest in and to the '263 patent titled "Magnetic Tunnel Junction Device." The '263 patent issued on November 27, 2012. The patent is generally directed to a particular structure for magnetoresistive devices, such as the read/write heads of HDDs that improves the density of

<u>day1e_flyer_nw20180911.pdf</u>), and the 8th International Symposium on Metallic Multilayers (https://www.scl.kyoto-u.ac.jp/~ono/MML2013/PDF/PosterList.pdf).

information that can be accurately written to and read from an HDD. A copy of the '263 patent is attached as Exhibit B.

- 52. IP Bridge is the current owner by assignment of the entire right, title, and interest in and to the '372 patent titled "Method of Manufacturing a Magnetoresistive Random Access Memory (MRAM)." The '372 patent issued on August 22, 2023. The patent is generally directed to a particular structure for magnetoresistive devices, such as the read/write heads of HDDs that improves the density of information that can be accurately written to and read from an HDD. A copy of the '372 patent is attached as Exhibit C.
- 53. IP Bridge is the current owner by assignment of the entire right, title, and interest in and to the '909 patent titled "Method of manufacturing a magnetoresistive random access memory (MRAM)." The '909 patent issued on April 23, 2024. The patent is generally directed to a particular structure for magnetoresistive devices, such as the read/write heads of HDDs that improves the density of information that can be accurately written to and read from an HDD. A copy of the '909 patent is attached as Exhibit D.
- 54. IP Bridge is the current owner by assignment of the entire right, title, and interest in and to the '138 patent titled "Magnetic tunnel junction device." The '138 patent issued on July 30, 2019. The patent is generally directed to a particular structure for magnetoresistive devices, such as the read/write heads of HDDs that improves the density of information that can be accurately written to and read from an HDD. A copy of the '138 patent is attached as Exhibit E.
- 55. IP Bridge is the current owner by assignment of the entire right, title, and interest in and to the '198 patent titled "Magnetic tunnel junction device." The '198 patent issued on March 28, 2017. The patent is generally directed to a particular structure for magnetoresistive devices, such as the read/write heads of HDDs that improves the density of information that can

be accurately written to and read from an HDD. A copy of the '198 patent is attached as Exhibit F.

- 56. IP Bridge is the current owner by assignment of the entire right, title, and interest in and to the '463 patent titled "Magnetic tunnel junction device." The '463 patent issued on September 1, 2015. The patent is generally directed to a particular structure for magnetoresistive devices, such as the read/write heads of HDDs that improves the density of information that can be accurately written to and read from an HDD. A copy of the '463 patent is attached as Exhibit G.
- 57. IP Bridge is the current owner by assignment of the entire right, title, and interest in and to the '167 patent titled "Magnetic tunnel junction device." The '167 patent issued on June 9, 2020. The patent is generally directed to a particular structure for magnetoresistive devices, such as the read/write heads of HDDs that improves the density of information that can be accurately written to and read from an HDD. A copy of the '167 patent is attached as Exhibit H.
- 58. IP Bridge is the current owner by assignment of the entire right, title, and interest in and to the '134 patent titled "Magnetic tunnel junction device." The '134 patent issued on March 26, 2013. The patent is generally directed to a particular structure for magnetoresistive devices, such as the read/write heads of HDDs that improves the density of information that can be accurately written to and read from an HDD. A copy of the '134 patent is attached as Exhibit I.
- 59. IP Bridge has complied with its obligations under 35 U.S.C. § 287 for each of the Asserted Patents. IP Bridge has not sold any product nor offered any service within the scope of any claim of the Asserted Patents. IP Bridge is aware that the prior assignee of the Asserted

Patents had licensed the Asserted Patents, but on information and belief none of those licensees sold any product covered by any claim of the Asserted Patents.

Defendants' Incorporation of IP Bridge's Patented Technologies Into Their Devices

- 60. The allegations provided below are exemplary and without prejudice to IP Bridge's infringement contentions. In providing these allegations, IP Bridge does not convey or imply any particular claim constructions or the precise scope of the claims. IP Bridge's claim construction contentions regarding the meaning and scope of the claim terms will be provided under the Court's scheduling order and local rules.
- 61. The infringing products include without limitation: read/write heads for hard disk drives ("HDDs"); hard disk drives incorporating read/write heads, whether internal or external drives; and all Defendants' hardware made, used, offered for sale, sold, and imported from March 2018 going forward that incorporate such read/write heads and hard disk drives.
- 62. The infringing products thus also include without limitation: Seagate Exos HDDs (e.g., ST8000NM000A); Seagate IronWolf HDDs (e.g., ST4000VN008); Seagate IronWolf Pro HDDs (e.g., ST16000NE000); Seagate BarraCuda HDDs (e.g., ST2000LM015); Seagate FireCuda HDDs (e.g., ST8000DX001); Seagate FireCuda Gaming HDDs (e.g., STKL5000400); Seagate FireCuda Gaming HDDs; Seagate Lyve HDDs (e.g., STJX60000400, STJG16000400); Seagate SkyHawk HDDs (e.g., ST8000VX010, ST24000VE002); Seagate One Touch External Hard Drive HDDs (e.g., STKC5000400, STLC20000400); Seagate Ultra Touch External Hard Drive HDDs (e.g., STMA2000400); Seagate Game Drive for PS5 HDDs (e.g., STLV5000100); Seagate Game Drive for Xbox HDDs (e.g., STKW8000400); Seagate Portable Drive (e.g., STGX1000400); Seagate Expansion Desktop HDDs (e.g., STKP24000400); Seagate Expansion Portable HDDs (e.g., STKM5000400); Seagate Photo HDDs (e.g., STJS2000400); Seagate Photo Drive HDDs;

Seagate Basic HDDs (e.g., STJL5000400); Seagate Backup Plus HDDs (e.g., STHP5000400); Seagate Starfield Special Edition Game Drive HDDs (e.g., STMJ5000400); Seagate StarWars Edition HDDs (e.g., Hans Solo, Luke Sywalker, Darth Vader, Boba Fett, Grogu, Beskar Ingot, The Mandalorian,); Seagate Marvel Edition HDDs (e.g., God of War Ragnarök, Black Panther, King of Wakanda, Shuri, Okoye, Ghost-Spider, Spider-Man, Miles Morales); and all HDDs offered under the Exo, IronWolf, BarraCuda, FireCuda, Nytro, Lyve, SkyHawk, One Touch, Ultra Touch, Game Drive, Portable Drive, Expansion, Photo, Photo Drive, Basic, Backup Plus, Starfield, Star Wars, and Marvel brands (all together with the prior paragraph, the "Accused Products").

- 63. The Accused Products are non-limiting examples that were identified based on publicly available information, and IP Bridge reserves the right to identify additional infringing activities and products, including, for example, on the basis of information obtained during discovery.
- 64. As detailed below and in Exhibits AA-II, each limitation of at least one claim of each of the Asserted Patents is literally present in the Accused Products, and is literally practiced by Defendants' personnel, agents, and customers who use the Accused Products. To the extent that any limitation is not literally present and practiced, each such limitation is present and practiced under the doctrine of equivalents.
- 65. Defendants have made extensive use of IP Bridge's patented technologies, including the technology described and claimed in the Asserted Patents. IP Bridge requests that this Court award it damages sufficient to compensate for Defendants' infringement of the Asserted Patents, find this case exceptional and award IP Bridge its attorneys' fees and costs, and grant an injunction against Defendants to prevent ongoing infringement of the Asserted Patents.

COUNT I

(Infringement of U.S. Patent No. 7,884,403)

66. IP Bridge incorporates by reference and realleges all the foregoing paragraphs of the Complaint as if fully set forth herein.

Direct Infringement by All Defendants

- 67. STL directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '403 patent, including at least claim 5, including by having made, making, using, selling, and offering for sale in the United States, and by importing into the United States, the Accused Products.
- 68. For example, STL is listed as a manufacturer on the Seagate IronWolf Pro 16TB HDD and the Seagate Exos X24 HDD, shown below.

Seagate IronWolf Pro 16TB HDD

Seagate Exos X24 HDD





- 69. Additionally, according to publicly available importation records, STL regularly imports into the United States HDDs shipped by at least Seagate Thailand and Seagate Singapore, which, on information and belief, includes at least one of the Accused Products.
- 70. On information and belief, STH directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '403 patent, including at least claim 5, including by directing STL to make, use, sell, and offer for sale in the United States, and import into the United States, the Accused Products.
- 71. In addition, on information and belief, STH, by itself, and via an agent, directly infringed the '403 patent by offering for sale, selling and importing the Accused Products to the

United States and via their alter egos, agents, intermediaries, distributors, importers, customers, subsidiaries, and consumers.

- 72. STH is vicariously liable for the infringing conduct of its subsidiaries, related companies, affiliates and agents, including STL (under both the alter ego and agency theories) because, as an example and without limitation to any particular legal theory, on information and belief, STL is and has been essentially the same company as STH, and STH has and has had the right to control STL's infringing acts and received a direct financial benefit from STL's infringement. For example, on information and belief, STH is located at the same address as STL: 47488 Kato Road, Fremont, California 94538. On information and belief, STH has the same telephone number as STL: (408) 658-1000. On information and belief, STL is wholly owned by STH. On information and belief, STH's Vice President, Michael J. Small, is one of STL's two managers. On information and belief, Johnny Choi an officer of STH is the other of STL's two managers.
- 73. On information and belief, Seagate Thailand has directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '403 patent, including at least claim 5, by selling and offering for sale in the United States, including, to at least STL and by importing into the United States, the Accused Products.
- 74. For example, on information and belief, Seagate Thailand manufactured the Seagate IronWolf Pro 16TB HDD and the Seagate Exos X24 HDD, shown below.

Seagate IronWolf Pro 16TB HDD

Seagate Exos X24 HDD



- 75. On information and belief, Seagate Thailand infringed the '403 patent by offering for sale and selling in the United States, and by importing into the United States, the Accused Products directly and via their alter egos, agents, intermediaries, distributors, importers, customers, subsidiaries, and consumers.
- 76. Alternatively, on information and belief, Seagate Thailand is an agent for STL. See In re Hard Disk Drive Suspension Assemblies Antitrust Litig., Civil Action Nos. 19-md-02918-MMC 20-cv-01217-MMC 320-cv-01217 MMC, 2023 WL 3483242, at *4 (N.D. California) ("Antitrust Case") (STL admitting that Seagate Thailand acted as its agent with respect to purchase of certain components for hard disk drives).

- 77. On information and belief, Seagate Singapore has directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '403 patent, including at least claim 5, by selling and offering for sale in the United States, including, to at least STL and by importing into the United States, the Accused Products.
- 78. For example, Seagate Singapore is listed as a manufacturer of the Seagate Expansion 18TB HDD, shown below.

Seagate Expansion 18TB HDD



- 79. On information and belief, Seagate Singapore infringed the '403 patent by offering for sale and selling in the United States, and importing into the United States, the Accused Products directly and via their alter egos, agents, intermediaries, distributors, importers, customers, subsidiaries, and consumers.
- 80. As another example, on information and belief, Seagate Singapore has offered for sale and has sold the Accused Products to STL. *In re Hard Disk Drive Suspension Assemblies*Antitrust Litig., 2023 WL 3483242, at *8, n. 11 (N.D. Cal. May 15, 2023) ("[a]lthough Seagate

Plaintiffs identify, as a third category, 'Seagate [Technology] LLC's internal purchase of HDDs in the United States for sale in the United States' ..., those purchases constitute Seagate [Technology] LLC's purchases of HDDs from Seagate Singapore").

- 81. On information and belief, Seagate Netherlands has directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '403 patent, including at least claim 5, by selling and offering for sale in the United States the Accused Products.
- 82. For example, on information and belief the Seagate IronWolf Pro 16TB HDD and the Seagate Exos X24 HDD both list the address of Seagate Netherlands, shown below.

Seagate IronWolf Pro 16TB HDD

Seagate Exos X24 HDD



- 83. On information and belief, Seagate Netherlands infringed the '403 patent by offering for sale and selling the Accused Products in the United States either directly and via their alter egos, agents, intermediaries, distributors, importers, customers, subsidiaries, and consumers.
- 84. For example, and without limitation, Seagate's devices including their hard disk drives meet each and every limitation of claim 5 literally and under the doctrine of equivalents, as set forth in Exhibit AA and incorporated here.

Seagate's Knowledge of the '403 Patent

- 85. Since at least September 29, 2015, STL has known of the '403 patent. As discussed above, during the prosecution of STL's '678 patent, STL cited the '134 patent in an IDS to the USPTO. The '134 patent is a continuation of a continuation of the '403 patent, and the '403 patent is printed on the face of the '134 patent. Thus, by identifying the '134 patent to the USPTO, on information and belief, STL was also aware of the '403 patent as early as September 29, 2015.
- 86. In addition, on information and belief, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands have all known about the '403 patent since at least 2018. As discussed above, Seagate was well-aware of Dr. Yuasa's foundational work, having discussed and excerpted his *Nature Materials* paper and other work in journals, cited his work in patents assigned to Seagate, and presented at the same conferences.
- 87. In addition, between 2014 and 2017 there was a litigation in Japan between AIST and Japan Science and Technology Agency—the prior owners of MTJ Patent Portfolio, which includes the Asserted Patents—and Nippon Seagate Inc. ("Nippon Seagate"). Among other patents, the prior owners sued Nippon Seagate on JP 4,963,744 (the "JP '744 patent"), a Japanese counterpart to the Asserted Patents. The JP '744 patent claims priority to the same Japanese patent applications as all of the Asserted Patents at issue here, JP 2004-071186 and JP 2004-313350, and contains analogous disclosure to the Asserted Patents. For example, the JP '744 patent includes a magnetic barrier height limitation that also appears in the Asserted Patents. In May 2017, a Japanese court found that three Seagate HDDs infringed the JP '744 patent.
- 88. By 2018, Nippon Seagate, Seagate Technology PLC ("STP"), and STL began negotiating a license to patents in the MTJ Patent Portfolio, on behalf of themselves and on

behalf of their affiliates, with the prior owners of the Asserted Patents, AIST and Japan Science and Technology Agency. As part of those negotiations, the prior owners offered to license the Asserted Patents (then in existence), including the '403, '263, '134, '463, and '198 patents. Instead of taking a license to all the patents in the MTJ Patent Portfolio, worldwide, including the Asserted Patents, Nippon Seagate, STP, and STL instead chose only to license the Japanese counterparts to the Asserted Patents. The decision of Nippon Seagate, STP, and STL *not* to license the Asserted Patents when given the opportunity to do so occurred no later than sometime in 2018.

- 89. Nippon Seagate, STP, and STL's license to the Japanese counterparts of the Asserted Patents, but not the Asserted Patents themselves, was executed in March 2019. STL was thus aware of the '403 patent, which issued in 2011, and that STL did not have a license to it.
- 90. On information and belief, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands all became aware of the '403 patent at least as early as 2018 when Nippon Seagate, STP, and STL were negotiating a license with the prior owners of the Asserted Patents. The license agreement that Nippon Seagate, STP, and STL executed covered not only themselves, but also all affiliates, which the license agreement defined as any company that any of the named entities had ownership, management, or over 50% of the voting rights over. STP, a named party to the license agreement, is the ultimate owner of STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands. When STP was offered a license to the Asserted Patents (then in existence) in 2018, and declined to take such a license, it was declining that license on behalf of not only itself, but its affiliates, which include STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands, according to the license agreement. Thus, STH, Seagate

Thailand, Seagate Singapore, and Seagate Netherlands each had actual knowledge of the '403 patent and that each did not have a license to it, or at a minimum acted with willful blindness to those facts, at least as early as 2018.

91. In addition, since at least as early as April 3, 2024, all Defendants have actual notice of the '403 patent through their stipulated acceptance of service of IP Bridge's original Complaint. D.I. 18.

Induced Infringement by All Defendants

- known that the Accused Products infringe at least claim 5 of the '403 patent. Since at least as early as 2018 and no later than April 3, 2024, Defendants have known that the Accused Products infringe at least claim 5 of the '403 patent when used by customers and other users, when imported by others, and when sold and offered for sale by third parties, such as Best Buy. *See*, *e.g.*, https://www.bestbuy.com/site/brands/seagate/pcmcat166600050107.c. For example, a search of best Buy's website of sales locations in or near the 19702 ZIP code for Newark, Delaware with available external hard drives returns 15 results, with results 1, 3, and 5 located in Delaware. *See* https://www.bestbuy.com/site/store-locator.
- 93. Since at least as early as 2018 and no later than April 3, 2024, Defendants have induced infringement and continue to induce infringement by actively encouraging customers and other users to directly infringe at least claim 5 of the '403 patent. Defendants have provided materials that induce customers and others to use, offer for sale, and sell the Accused Products in a manner that infringes at least claim 5 of the '403 patent. Defendants have done so, for example, on websites, in user manuals, in product documentation, and in other advertising materials. For example, Seagate's website touts its hard drives. *See, e.g.*,

https://www.seagate.com/products/hard-drives/ and https://www.seagate.com/products/external-

hard-drives/. Seagate's website also contains detailed documentation and product manuals on how to use its hard drives. See https://www.seagate.com/search/?keyword=HDD and https://www.seagate.com/search/?keyword=hard%20drive. As another example, Defendants encourage the use of the IronWolf Pro HDD, the IronWolf HDD, the BarraCuda HDD, and the Exos HDD in applications such as laptops, mobile storage, external storage systems, all-in-one PCs, ultra-slim desktop PCs, servers, and data centers. See, e.g., https://www.seagate.com/www-content/datasheets/pdfs/ironwolf-12tbDS1904-9-1707US-en_US.pdf, https://www.seagate.com/www-content/datasheets/pdfs/barracuda-2-5-DS1907-3-2005US-en_US.pdf, and https://www.seagate.com/www-content/datasheets/pdfs/exos-7-e8-datasheet-DS1957-2-1904US-en_US.pdf.

94. Since at least as early as 2018 and no later than April 3, 2024, Defendants have induced infringement and continue to induce infringement by actively encouraging third-party distributors and resellers to directly infringe at least claim 5 of the '403 patent by working in concert with distributors and resellers to sell and offer for sale the Accused Products and have actively encouraged such sales and offers for sale. For example, Seagate's 2023 10-K states that Seagate sells products to "major OEMs, distributors and retailers," that Seagate's "distributors generally enter into non-exclusive agreements for the resale of our products... with limited rights of return and price protection" and other "sales programs to distributors on a quarterly and periodic basis to promote the sale of selected products in the sales channel," and that the "retail channel... typically require[s] greater marketing support, sales incentives and price protection periods." https://dl8rn0p25nwr6d.cloudfront.net/CIK-0001137789/73579808-2f43-4bde-9354-cffac2ea1c41.pdf at 9. Seagate also notes that it is "dependent on sales to distributors and

retailers, which may increase price erosion and the volatility" of sales, because a "substantial portion" of its sales have "been to distributors and retailers of disk drive products." *Id.* at 15, 18. The Accused Products are available at such distributors and retailers, for example Best Buy. *See, e.g.*, https://www.bestbuy.com/site/brands/seagate/pcmcat166600050107.c.

- 95. Since at least as early as 2018 and no later than April 3, 2024, each of the Defendants (including STH, STL, Seagate Thailand, Seagate Singapore, and Seagate Netherlands) has actively and knowingly induced third-party retailers, distributors, integrators, and end-users of the Accused Products to directly infringe one more claims of the '403 patent, including at least claim 5.
- 96. On information and belief, STL induced and continues to induce infringement of the '403 patent by importing into the United States, making, selling, and offering to sell the Accused Products with the intention that third-party resellers (such as Best Buy) offer for sale (as described above) and sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.
- 97. On information and belief, STH induced and continues to induce infringement of the '403 patent by directing STL, as its agent and alter ego, to import into the United States, make, sell, and offer to sell the Accused Products with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States. On information and belief, STH and STL have induced and continue to induce infringement of the '403 patent by working in concert with other Defendants to offer for sale and sell the Accused Products in the United States.
- 98. On information and belief, Seagate Thailand and Seagate Singapore have induced and continue to induce infringement of the '403 patent by making the Accused Products with the

intention that STL and other third parties import them into the United States and by importing into the United States themselves directly and through their agents and by offering for sale and selling the Accused Products, with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.

- 99. On information and belief, Seagate Netherlands induced and continues to induce infringement of the '403 patent by making, selling, and offering for sale the Accused Products with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.
- 100. On information and belief, each Defendant is actually aware of the '403 patent, or at a minimum acted with willful blindness to the existence of the '403 patent, for the reasons explained above.
- minimum was willfully blind that, its actions will induce the infringement of the Asserted Patents at least as early as 2018 because: (1) the Japanese court found that Seagate's HDDs infringed at least one of the Japanese counterparts to the Asserted Patents, and (2) the claims of that Japanese patent are substantially similar to claims of the Asserted Patents, including at least claim 5 of the '403 patent. The infringement finding of the Japanese court put Seagate on notice that, if sold in countries other than Japan (where Seagate had a license), Seagate's HDDs would infringe the counterparts of the licensed Japanese patents, including the Asserted Patents. On information and belief, not only was STL on notice of such infringement by being a party to the license to the Japanese counterparts of the Asserted Patents, but STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands all had actual notice as being an affiliate of STP, or at a

minimum were willfully blind to such infringement, and thus expressly covered by the license agreement and bound by STP and STL's decision not to accept a license to the Asserted Patents despite being offered a license to the Asserted Patents in 2018.

- 102. On information and belief, Defendants thus knew that they did not have a license to the Asserted Patents because STP and STL, acting on behalf of their affiliates, declined such a license when one was offered in 2018, knew that the Seagate HDDs infringed the Asserted Patents through the Japanese court's finding of infringement of at least one of the Japanese counterparts that had claims which are substantially similar to the claims of the Asserted Patents, but chose to sell the Accused Products to third-party retailers and in turn to customers in the United States anyway, thus inducing infringement of the '403 patent.
- 103. In addition, Defendants have known since at least April 3, 2024, that their respective actions (described above) induce third parties (such as Best Buy and end users) to infringe the '403 patent through their stipulated acceptance of IP Bridge's original Complaint. D.I. 18.
- 104. Defendants' actions, as detailed in the foregoing paragraphs, have induced and continue to induce customers to use, sell, offer for sale, and import into the United States the Accused Products, which when used as designed and for their intended purpose necessarily infringe the '403 patent.

Contributory Infringement by All Defendants

105. Since at least as early as 2018 and no later than April 3, 2024, all Defendants have contributorily infringed at least claim 5 of the '403 patent by importing into the United States, making, selling and offering to sell their Accused Products within the United States as described previously.

- 106. On information and belief, each Defendant is actually aware, or at a minimum willfully blind to the existence, of the '403 patent for the reasons explained above.
- 107. The Accused Products are not staple articles or commodities of commerce with substantial noninfringing uses. The Accused Products are designed, configured, and adapted to work with both other Seagate devices and other third-party devices, such as personal computers, laptops, servers, server farms, and other computer systems. The Accused Products have no substantial purpose other than as part of infringing devices and accordingly are not staple articles or commodities of commerce.
- 108. Moreover, on information and belief, each Defendant is actually aware, or at a minimum acted with willful blindness to the fact, that the read/write heads in the Accused Products are a material part of the invention of at least claim 5 of the '403 patent at least as early as 2018 because: (1) the Japanese court found that Seagate's HDDs infringed at least one of the Japanese counterparts to the Asserted Patents, and (2) the claims of that Japanese patent are substantially similar to claims of the Asserted Patents, including at least claim 5 of the '403 patent. The infringement finding of the Japanese court put Seagate on notice that, if sold in countries other than Japan (where Seagate had a license), Seagate's HDDs would infringe the counterparts of the licensed Japanese patents, including the Asserted Patents. On information and belief, not only was STL on notice of such infringement by being a party to the license to the Japanese counterparts of the Asserted Patents, but STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands all had actual notice as being an affiliate of STP, and thus expressly covered by the license agreement and bound by STP and STL's decision not to accept a license to the Asserted Patents despite being offered a license to the Asserted Patents in 2018, or at a minimum acted with willful blindness to such infringement.

- 109. On information and belief, Defendants thus knew that they did not have a license to the Asserted Patents because STP and STL, acting on behalf of their affiliates, declined such a license when one was offered in 2018, knew that the Seagate HDDs infringed the Asserted Patents through the Japanese court's finding of infringement of a Japanese counterpart with claims which are substantially similar to the claims of the Asserted Patents, but chose to sell the Accused Products to third-party retailers and in turn to customers in the United States anyway, thus contributing to those parties' infringement of the '403 patent.
- 110. In addition, Defendants have known since at least April 3, 2024, that the read/write heads in the Accused Products are a material part of the invention of at least claim 5 of the '403 patent through their stipulated acceptance of IP Bridge's original Complaint. D.I. 18.

Willful Infringement By All Defendants

- 111. Since at least September 29, 2015, STL knew or should have known, or at a minimum acted with willful blindness to the fact that the Accused Products infringe one or more claims of the '403 patent, including at least claim 5. As discussed above, during the prosecution of STL's '678 patent, STL cited the '134 patent in an IDS to the USPTO. The '134 patent is a continuation of a continuation of the '403 patent, which means: (1) it has substantially the same disclosure as the '403 patent and (2) the '403 patent is printed on the face of the '134 patent. By citing the disclosure of the '134 patent in an IDS to the USPTO, STL acknowledged that the '403 patent (having the same disclosure as the '134 patent) was material to the patentability of the pending claims covering STL's own HDD technology. On information and belief, STL thus knew or should have known, or at a minimum acted with willful blindness to the fact that Seagate's HDDs infringed the '403 patent as of at least September 29, 2015.
- 112. Since at least 2018, STL along with the remaining Defendants knew or should have known, or at a minimum acted with willful blindness to the fact that, the Accused Products

infringe one or more claims of the '403 patent, including at least claim 5. As discussed above, during Nippon Seagate, STL, and STP's negotiations with the prior owners of the Asserted Patents for a license in 2018, the prior owners of the Asserted Patents offered to license the Asserted Patents (then existing), which included the '403 patent, to Nippon Seagate, STL, and STP, which those Seagate entities declined. On information and belief, such a license, if Nippon Seagate, STL, and STP had accepted it, would have covered not only those Seagate entities, but each of their affiliates, which, according to the terms of the license agreement, would have covered STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands.

- Patents in 2018 on behalf of themselves and their affiliates, it was with the knowledge that Seagate's HDDs infringed at least one of the Japanese counterparts of the Asserted Patents, which, as discussed above, has claims that are substantially similar to the claims of the Asserted Patents. When Nippon Seagate, STL, and STP declined to accept a license to the Asserted Patents in 2018 on behalf of themselves and their affiliates, at least STL had actual knowledge that its HDDs, including the Accused Products, infringed the Asserted Patents, including claim 5 of the '403 patent, if made, sold, and offered for sale in the United States and imported into the United States. When STL, having declined to take a license to the Asserted Patents, and instead make, sell, offer to sell, in the United States and import into the United States the Accused Products, it willfully infringed at least claim 5 of the '403 patent.
- 114. STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands have willfully infringed at least claim 5 of the '403 patent as well. On information and belief, when Nippon Seagate, STL, and STP negotiated a license with the prior owners of the Asserted Patents, it was done on behalf of not only those three named Seagate entities, but also on behalf

of STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands as the named entities affiliates because the eventual license extended to such affiliates as well. Through that negotiation and because of the Japanese court's infringement decision, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands all had actual knowledge, or at a minimum acted with willful blindness to the fact, that Seagate's HDDs infringed the Japanese counterparts of the Asserted Patents, that the claims of the Asserted Patents were substantially similar to claims of the Japanese counterpart that was found to be infringed by the Japanese court, and that Seagate was not taking a license to the Asserted Patents despite being offered one. STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands thus willfully infringed at least claim 5 of the '403 patent when each acted to make, offer to sell, and sell in the United States, and import into the United States, the Accused Products without the license that the prior owners of the Asserted Patents had offered in 2018 but which Seagate declined to take.

- Seagate's making, using, offering for sale, and selling in the United States and importing into the United States, the Accused Products (described with respect to each Defendant above) despite knowing that Seagate's HDDs infringed a claim in a Japanese counterpart that is substantially similar to claims in the Asserted Patents, including claim 5 of the '403 patent, and did not have a license to the Asserted Patents demonstrate the willful nature of Seagate's infringement.
- 116. STL's infringement of the '403 patent has been willful since at least September 29, 2015. The remaining Defendants' infringement of the '403 patent has been willful since at least 2018. Seagate's ongoing infringement of the '403 patent continues to be willful. Seagate has chosen to import, manufacture, use, offer to sell, and sell the Accused Products, even after having notice of the '403 patent, knowing that such products would infringe the '403 patent.

- 117. The foregoing description of Seagate's infringement is based on publicly available information and information that IP Bridge has in its possession. IP Bridge reserves the right to modify this description, including, for example, on the basis of information about the Accused Products that it obtains during discovery.
- 118. IP Bridge has been and is being irreparably harmed, and has incurred and will continue to incur damages, as a result of Seagate's infringement of the '403 patent.
- 119. Seagate's infringement of the '403 patent has damaged and continues to damage IP Bridge in an amount yet to be determined, but no less than a reasonable royalty.

COUNT II

(Infringement of U.S. Patent No. 8,319,263)

120. IP Bridge incorporates by reference and realleges all the foregoing paragraphs of the Complaint as if fully set forth herein.

Direct Infringement by All Defendants

- 121. STL directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '263 patent, including at least claim 1, including by making, using, selling, and offering for sale in the United States, and importing into the United States, the Accused Products.
- 122. On information and belief, STH directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '263 patent, including at least claim 1, including by directing STL as its agent and alter ego to make, use, sell, and offer to sell in the United States, and import into the United States, the Accused Products.
- 123. On information and belief, Seagate Thailand and Seagate Singapore have directly infringed and continue to directly infringe, literally and equivalently, one or more claims of the

'263 patent, including at least claim 1, by importing into the United States, and selling and offering for sale in the United States, the Accused Products.

- 124. On information and belief, Seagate Netherlands has directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '263 patent, including at least claim 1, by selling and offering for sale in the United States the Accused Products.
- 125. For example, and without limitation, Seagate's devices including their hard disk drives meet each and every limitation of claim 1 literally and under the doctrine of equivalents, as set forth in Exhibit BB and incorporated here.

Seagate's Knowledge of the '263 Patent

- 126. On information and belief, STL has known of the '263 patent since at least September 29, 2015. As discussed above, during the prosecution of STL's '678 patent, STL cited the '134 patent in an IDS to the USPTO. The '134 patent is a continuation of the '263 patent, and the application leading to the '263 patent is printed on the face of the '134 patent. By the time STL cited the '134 patent in the IDS (2015), that application had long since issued as the '263 patent (in 2012). Thus, by identifying the '134 patent to the USPTO, on information and belief, STL was also aware of the '263 patent as early as September 29, 2015.
- 127. In addition, on information and belief, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands have all known about the '263 patent since at least 2018. As discussed above, Seagate was well-aware of Dr. Yuasa's foundational work, having discussed and excerpted his *Nature Materials* paper and other work in journals, cited his work in patents assigned to Seagate, and presented at the same conferences.
- 128. In addition, as discussed above, in May 2017, a Japanese court found that three Seagate HDDs infringed the JP '744 patent, which lead to Nippon Seagate, STP, and STL

negotiating a license on behalf of themselves and their affiliates to the Japanese counterparts of the Asserted Patents. As part of those negotiations, the prior owners of the Asserted Patents offered to license the Asserted Patents (then in existence), including the '403, '263, '134, '463, and '198 patents. Instead of taking a license to all the patents in the MTJ Patent Portfolio, worldwide, including the Asserted Patents, Nippon Seagate, STP, and STL instead chose only to license the Japanese counterparts to the Asserted Patents. The decision of Nippon Seagate, STP, and STL *not* to license the Asserted Patents when given the opportunity to do so occurred no later than sometime in 2018. STL was thus aware of the '263 patent, which issued in 2012, and that STL did not have a license to it.

Seagate Netherlands all became aware of the '263 patent at least as early as 2018 when Nippon Seagate, STP, and STL were negotiating a license with the prior owners of the Asserted Patents. The license agreement that Nippon Seagate, STP, and STL executed covered not only themselves, but also all affiliates, which the license agreement defined as any company that any of the named entities had ownership, management, or over 50% of the voting rights over. STP, a named party to the license agreement, is the ultimate owner of STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands. When STP was offered a license to the Asserted Patents (then in existence) in 2018, and declined to take such a license, it was declining that license on behalf of not only itself, but its affiliates, which include STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands, according to the license agreement. Thus, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands each had actual knowledge of the '263 patent and that each did not have a license to it, at least as early as 2018, or at a minimum acted with willful blindness to those facts.

130. In addition, since at least as early as April 3, 2024, all Defendants have actual notice of the '263 patent through their stipulated acceptance of service of IP Bridge's original Complaint. D.I. 18.

Induced Infringement by All Defendants

- 131. Since at least as early as 2018 and no later than April 3, 2024, Defendants have known that the Accused Products infringe at least claim 1 of the '263 patent.
- 132. Since at least as early as 2018 and no later than April 3, 2024, Defendants have known that the Accused Products infringe at least claim 1 of the '263 patent when used by customers and other users, when imported by others, and when sold and offered for sale by third parties, such as Best Buy. *See, e.g.*,

https://www.bestbuy.com/site/brands/seagate/pcmcat166600050107.c. For example, a search of best Buy's website of sales locations in or near the 19702 ZIP code for Newark, Delaware with available external hard drives returns 15 results, with results 1, 3, and 5 located in Delaware. *See* https://www.bestbuy.com/site/store-locator.

133. Since at least as early as 2018 and no later than April 3, 2024, Defendants have induced infringement and continue to induce infringement by actively encouraging customers and other users to directly infringe at least claim 1 of the '263 patent. Defendants have provided materials that induce customers and others to use, offer for sale, and sell the Accused Products in a manner that infringes at least claim 1 of the '263 patent. Defendants have done so, for example, on websites, in user manuals, in product documentation, and in other advertising materials. For example, Seagate's website touts its hard drives. *See, e.g.*,

https://www.seagate.com/products/hard-drives/ and https://www.seagate.com/products/external-hard-drives/. Seagate's website also contains detailed documentation and product manuals on how to use its hard drives. See https://www.seagate.com/search/?keyword=HDD and

https://www.seagate.com/search/?keyword=hard%20drive. As another example, Defendants encourage the use of the IronWolf Pro HDD, the IronWolf HDD, the BarraCuda HDD, and the Exos HDD in applications such as laptops, mobile storage, external storage systems, all-in-one PCs, ultra-slim desktop PCs, servers, and data centers. See, e.g., https://www.seagate.com/www-content/datasheets/pdfs/ironwolf-pro-18tb-DS1914-16-2011US-en_US.pdf,
https://www.seagate.com/www-content/datasheets/pdfs/ironwolf-12tbDS1904-9-1707US-en_US.pdf, https://www.seagate.com/www-content/datasheets/pdfs/barracuda-2-5-DS1907-3-2005US-en_US.pdf, and https://www.seagate.com/www-content/datasheets/pdfs/exos-7-e8-datasheet-DS1957-2-1904US-en_US.pdf.

induced infringement and continue to induce infringement by actively encouraging third-party distributors and resellers to directly infringe at least claim 1 of the '263 patent by working in concert with distributors and resellers to sell and offer for sale the Accused Products and have actively encouraged such sales and offers for sale. For example, Seagate's 2023 10-K states that Seagate sells products to "major OEMs, distributors and retailers," that Seagate's "distributors generally enter into non-exclusive agreements for the resale of our products... with limited rights of return and price protection" and other "sales programs to distributors on a quarterly and periodic basis to promote the sale of selected products in the sales channel," and that the "retail channel... typically require[s] greater marketing support, sales incentives and price protection periods." https://dl8rn0p25nwr6d.cloudfront.net/CIK-0001137789/73579808-2f43-4bde-9354-cffac2ea1c41.pdf at 9. Seagate also notes that it is "dependent on sales to distributors and retailers, which may increase price erosion and the volatility" of sales, because a "substantial portion" of its sales have "been to distributors and retailers of disk drive products." *Id.* at 15, 18.

The Accused Products are available at such distributors and retailers, for example Best Buy. *See, e.g.*, https://www.bestbuy.com/site/brands/seagate/pcmcat166600050107.c.

- 135. Since at least as early as 2018 and no later than April 3, 2024, each of the Defendants (including STH, STL, Seagate Thailand, Seagate Singapore, and Seagate Netherlands) has actively and knowingly induced third-party retailers, distributors, integrators, and end-users of the Accused Products to directly infringe one more claims of the '263 patent, including at least claim 1.
- 136. On information and belief, STL induced and continues to induce infringement of the '263 patent by importing into the United States, making, selling, and offering to sell the Accused Products with the intention that third-party resellers (such as Best Buy) offer for sale (as described above) and sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.
- 137. On information and belief, STH induced and continues to induce infringement of the '263 patent by directing STL, as its agent and alter ego, to import into the United States, make, sell, and offer to sell the Accused Products with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States. On information and belief, STH and STL have induced and continue to induce infringement of the '263 patent by working in concert with other Defendants to offer for sale and sell the Accused Products in the United States.
- 138. On information and belief, Seagate Thailand and Seagate Singapore have induced and continue to induce infringement of the '263 patent by making the Accused Products with the intention that STL and other third parties import them into the United States and by importing into the United States themselves directly and through their agents and by offering for sale and

selling the Accused Products, with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.

- 139. On information and belief, Seagate Netherlands induced and continues to induce infringement of the '263 patent by making, selling, and offering for sale the Accused Products with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.
- 140. On information and belief, each Defendant is actually aware of the '263 patent for the reasons explained above, or at a minimum acted with willful blindness to its existence.
- will induce the infringement of the Asserted Patents at least as early as 2018, or at a minimum acted with willful blindness to such inducement, because: (1) the Japanese court found that Seagate's HDDs infringed at least one of the Japanese counterparts to the Asserted Patents, and (2) the claims of that Japanese patent are substantially similar to claims of the Asserted Patents, including at least claim 1 of the '263 patent. The infringement finding of the Japanese court put Seagate on notice that, if sold in countries other than Japan (where Seagate had a license), Seagate's HDDs would infringe the counterparts of the licensed Japanese patents, including the Asserted Patents. On information and belief, not only was STL on notice of such infringement by being a party to the license to the Japanese counterparts of the Asserted Patents, but STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands all had actual notice as being an affiliate of STP, and thus expressly covered by the license agreement and bound by STP and STL's decision not to accept a license to the Asserted Patents despite being offered a license to the Asserted Patents in 2018, or at a minimum acted with willful blindness to such infringement.

- 142. On information and belief, Defendants thus knew that they did not have a license to the Asserted Patents because STP and STL, acting on behalf of their affiliates, declined such a license when one was offered in 2018, knew that the Seagate HDDs infringed the Asserted Patents through the Japanese court's finding of infringement of at least one of the Japanese counterparts with claims that are substantially similar claims as the Asserted Patents, but chose to sell the Accused Products to third-party retailers and in turn to customers in the United States anyway, thus inducing infringement of the '263 patent.
- 143. In addition, Defendants have known since at least April 3, 2024, that their respective actions (described above) induce third parties (such as Best Buy and end users) to infringe the '263 patent through their stipulated acceptance of IP Bridge's original Complaint. D.I. 18.
- 144. Defendants' actions, as detailed in the foregoing paragraphs, have induced and continue to induce customers to use, sell, offer for sale, and import into the United States the Accused Products, which when used as designed and for their intended purpose necessarily infringe the '263 patent.

Contributory Infringement by All Defendants

- 145. Since at least as early as 2018 and no later than April 3, 2024, all Defendants have contributorily infringed at least claim 1 of the '263 patent by importing into the United States, making, selling and offering to sell their Accused Products within the United States as described previously.
- 146. On information and belief, each Defendant is actually aware of the '263 patent for the reasons explained above, or at a minimum acted with willful blindness to its existence.
- 147. The Accused Products are not staple articles or commodities of commerce with substantial noninfringing uses. The Accused Products are designed, configured, and adapted to

work with both other Seagate devices and other third-party devices, such as personal computers, laptops, servers, server farms, and other computer systems. The Accused Products have no substantial purpose other than as part of infringing devices and accordingly are not staple articles or commodities of commerce. The read/write heads in the Accused Products are a material part of the invention of at least claim 1 of the '263 patent.

- 148. Moreover, on information and belief, each Defendant is actually aware that the read/write heads in the Accused Products are a material part of the invention of at least claim 1 of the '263 patent at least as early as 2018, or at a minimum acted with willful blindness to those facts, because: (1) the Japanese court found that Seagate's HDDs infringed at least one of the Japanese counterparts to the Asserted Patents, and (2) the claims of that Japanese patent are substantially similar to claims of the Asserted Patents, including at least claim 1 of the '263 patent. The infringement finding of the Japanese court put Seagate on notice that, if sold in countries other than Japan (where Seagate had a license), Seagate's HDDs would infringe the counterparts of the licensed Japanese patents, including the Asserted Patents. On information and belief, not only was STL on notice of such infringement by being a party to the license to the Japanese counterparts of the Asserted Patents, but STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands all had actual notice as being an affiliate of STP, and thus expressly covered by the license agreement and bound by STP and STL's decision not to accept a license to the Asserted Patents despite being offered a license to the Asserted Patents in 2018, or at a minimum acted with willful blindness to such infringement.
- 149. On information and belief, Defendants thus knew that they did not have a license to the Asserted Patents because STP and STL, acting on behalf of their affiliates, declined such a license when one was offered in 2018, knew that the Seagate HDDs infringed the Asserted

Patents through the Japanese court's finding of infringement of at least one of the Japanese counterparts with claims that are substantially similar to claims of the Asserted Patents, but chose to sell the Accused Products to third-party retailers and in turn to customers in the United States anyway, thus contributing to those parties' infringement of the '263 patent.

150. In addition, Defendants have known since at least April 3, 2024, that the read/write heads in the Accused Products are a material part of the invention of at least claim 1 of the '263 patent through their stipulated acceptance of IP Bridge's original Complaint. D.I. 18.

Willful Infringement By All Defendants

- minimum acted with willful blindness to the fact that the Accused Products infringe one or more claims of the '263 patent, including at least claim 1. As discussed above, during the prosecution of STL's '678 patent, STL cited the '134 patent in an IDS to the USPTO. The '134 patent is a continuation of the '263 patent, which means: (1) it has substantially the same disclosure as the '263 patent and (2) the application leading to the '263 patent is printed on the face of the '134 patent, the '263 patent having been issued for three years by the time STL field its IDS. By citing the disclosure of the '134 patent in an IDS to the USPTO, STL acknowledged that the '263 patent (having the same disclosure as the '134 patent) was material to the patentability of the pending claims covering STL's own HDD technology. On information and belief, STL thus knew or should have known, or at a minimum acted with willful blindness to the fact that Seagate's HDDs infringed the '263 patent as of at least September 29, 2015.
- 152. Since at least 2018, STL along with the remaining Defendants knew or should have known, or at a minimum acted with willful blindness to the fact that, the Accused Products infringe one or more claims of the '263 patent, including at least claim 1. As discussed above, during Nippon Seagate, STL, and STP's negotiations with the prior owners of the Asserted

Patents for a license in 2018, the prior owners of the Asserted Patents offered to license the Asserted Patents (then existing), which included the '263 patent, to Nippon Seagate, STL, and STP, which those Seagate entities declined. On information and belief, such a license, if Nippon Seagate, STL, and STP had accepted it, would have covered not only those Seagate entities, but each of their affiliates, which, according to the terms of the license agreement, would have covered STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands.

- Patents in 2018 on behalf of themselves and their affiliates, it was with the knowledge that Seagate's HDDs infringed the Japanese counterparts of the Asserted Patents, which, as discussed above, has substantially the same claims as the claims of the Asserted Patents. When Nippon Seagate, STL, and STP declined to accept a license to the Asserted Patents in 2018 on behalf of themselves and their affiliates, at least STL had actual knowledge that its HDDs, including the Accused Products, infringed the Asserted Patents, including claim 1 of the '263 patent, if made, sold, and offered for sale in the United States and imported into the United States. When STL, having declined to take a license to the Asserted Patents, and instead make, sell, offer to sell, in the United States and import into the United States the Accused Products, it willfully infringed at least claim 1 of the '263 patent.
- willfully infringed at least claim 1 of the '263 patent as well. On information and belief, when Nippon Seagate, STL, and STP negotiated a license with the prior owners of the Asserted Patents, it was done on behalf of not only those three named Seagate entities, but also on behalf of STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands as the named entities affiliates because the eventual license extended to such affiliates as well. Through that

negotiation and because of the Japanese court's infringement decision, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands all had actual knowledge, or at a minimum acted with willful blindness to the fact, that Seagate's HDDs infringed at least one of the Japanese counterparts of the Asserted Patents, that the claims of the Asserted Patents were substantially similar to that Japanese counterpart and that Seagate was not taking a license to the Asserted Patents despite being offered one. STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands thus willfully infringed at least claim 1 of the '263 patent when each acted to make, offer to sell, and sell in the United States, and import into the United States, the Accused Products without the license that the prior owners of the Asserted Patents had offered in 2018 but which Seagate declined to take.

- 155. STL, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands
 Seagate's making, using, offering for sale, and selling in the United States and importing into the
 United States, the Accused Products (described with respect to each Defendant above) despite
 knowing that Seagate's HDDs infringed claims of a Japanese counterpart with claims that are
 substantially similar to claims of the Asserted Patents, including claim 1 of the '263 patent, and
 did not have a license to the Asserted Patents demonstrate the willful nature of Seagate's
 infringement.
- 156. STL's infringement of the '263 patent has been willful since at least September 29, 2015. The remaining Defendants' infringement of the '263 patent has been willful since at least 2018. Seagate's ongoing infringement of the '263 patent continues to be willful. Seagate has chosen to import, manufacture, use, offer to sell, and sell the Accused Products, even after having notice of the '263 patent, knowing that such products would infringe the '263 patent.

- 157. The foregoing description of Seagate's infringement is based on publicly available information. IP Bridge reserves the right to modify this description, including, for example, on the basis of information about the Accused Products that it obtains during discovery.
- 158. IP Bridge has been and is being irreparably harmed, and has incurred and will continue to incur damages, as a result of Seagate's infringement of the '263 patent.
- 159. Seagate's infringement of the '263 patent has damaged and continues to damage IP Bridge in an amount yet to be determined, but no less than a reasonable royalty.

COUNT III

(Infringement of U.S. Patent No. 11,737,372)

160. IP Bridge incorporates by reference and realleges all the foregoing paragraphs of the Complaint as if fully set forth herein.

Direct Infringement by All Defendants

- 161. STL directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '372 patent, including at least claim 1, including by making, using, selling, and offering for sale in the United States, and importing into the United States, the Accused Products.
- 162. On information and belief, STH directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '372 patent, including at least claim 1, including by directing STL as its agent and alter ego to make, use, sell, and offer to sell in the United States, and import into the United States, the Accused Products.
- 163. On information and belief, Seagate Thailand and Seagate Singapore have directly infringed and continue to directly infringe, literally and equivalently, one or more claims of the '372 patent, including at least claim 1, by importing into the United States, and selling and offering for sale in the United States, the Accused Products.

- 164. On information and belief, Seagate Netherlands has directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '372 patent, including at least claim 1, by selling and offering for sale in the United States the Accused Products.
- 165. For example, and without limitation, Seagate's devices including their hard disk drives meet each and every limitation of claim 1 literally and under the doctrine of equivalents, as set forth in Exhibit CC and incorporated here.

Seagate's Knowledge of the '372 Patent

166. Since at least as early as April 3, 2024, Seagate has known of the '372 patent when Seagate stipulated to accepting IP Bridge's original Complaint. D.I. 18.

Induced Infringement By All Defendants

- 167. Defendants have known that the Accused Products infringe at least claim 1 of the '372 patent since at least as early as April 3, 2024, when Seagate stipulated to accepting IP Bridge's original Complaint. D.I. 18.
- Products infringe at least claim 1 of the '372 patent when used by customers and other users, when imported by others, and when sold and offered for sale by third parties, such as Best Buy. See, e.g., https://www.bestbuy.com/site/brands/seagate/pcmcat166600050107.c. For example, a search of best Buy's website of sales locations in or near the 19702 ZIP code for Newark, Delaware with available external hard drives returns 15 results, with results 1, 3, and 5 located in Delaware. See https://www.bestbuy.com/site/store-locator.
- 169. Since at least as early as April 3, 2024, Defendants have induced infringement and continue to induce infringement by actively encouraging customers and other users to directly infringe at least claim 1 of the '372 patent. Defendants have provided materials that

induce customers and others to use, offer for sale, and sell the Accused Products in a manner that infringes at least claim 1 of the '372 patent. Defendants have done so, for example, on websites, in user manuals, in product documentation, and in other advertising materials. For example, Seagate's website touts its hard drives. See, e.g., https://www.seagate.com/products/hard-drives/ and https://www.seagate.com/products/external-hard-drives/. Seagate's website also contains detailed documentation and product manuals on how to use its hard drives. See https://www.seagate.com/search/?keyword=HDD and https://www.seagate.com/search/?keyword=hard%20drive. As another example, Defendants encourage the use of the IronWolf Pro HDD, the IronWolf HDD, the BarraCuda HDD, and the Exos HDD in in applications such as laptops, mobile storage, external storage systems, all-in-one PCs, ultra-slim desktop PCs, servers, and data centers. See, e.g., https://www.seagate.com/wwwcontent/datasheets/pdfs/ironwolf-pro-18tb-DS1914-16-2011US-en US.pdf, https://www.seagate.com/www-content/datasheets/pdfs/ironwolf-12tbDS1904-9-1707USen US.pdf, https://www.seagate.com/www-content/datasheets/pdfs/barracuda-2-5-DS1907-3-2005US-en US.pdf, and https://www.seagate.com/www-content/datasheets/pdfs/exos-7-e8-datasheet-DS1957-2-1904US-en US.pdf.

170. Since at least as early as April 3, 2024, Defendants have induced infringement and continue to induce infringement by actively encouraging third-party distributors and resellers to directly infringe at least claim 1 of the '372 patent by working in concert with distributors and resellers to sell and offer to sell the Accused Products and have actively encouraged such sales and offers for sale. For example, Seagate's 2023 10-K states that Seagate sells products to "major OEMs, distributors and retailers," that Seagate's "distributors generally enter into non-exclusive agreements for the resale of our products... with limited rights of return and price

protection" and other "sales programs to distributors on a quarterly and periodic basis to promote the sale of selected products in the sales channel," and that the "retail channel... typically require[s] greater marketing support, sales incentives and price protection periods."

https://d18rn0p25nwr6d.cloudfront.net/CIK-0001137789/73579808-2f43-4bde-9354-cffac2ea1c41.pdf at 9. Seagate also notes that it is "dependent on sales to distributors and retailers, which may increase price erosion and the volatility" of sales, because a "substantial portion" of its sales have "been to distributors and retailers of disk drive products." *Id.* at 15, 18. The Accused Products are available at such distributors and retailers, for example Best Buy. *See*, *e.g.*, https://www.bestbuy.com/site/brands/seagate/pcmcat166600050107.cc.

- 171. Since at least as early as April 3, 2024, each of the Defendants (including STH, STL, Seagate Thailand, Seagate Singapore, and Seagate Netherlands) has actively and knowingly induced third-party retailers, distributors, integrators, and end-users of the Accused Products to directly infringe one more claims of the '372 patent, including at least claim 1.
- 172. On information and belief, STL induced and continues to induce infringement of the '372 patent by importing into the United States, making, selling, and offering to sell the Accused Products with the intention that third-party resellers (such as Best Buy) offer for sale (as described above) and sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.
- 173. On information and belief, STH induced and continues to induce infringement of the '372 patent by directing STL, as its agent and alter ego, to import into the United States, make, sell, and offer to sell the Accused Products with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States. On information and belief, STH and STL have induced and

continue to induce infringement of the '372 patent by working in concert with other Defendants to offer for sale and sell the Accused Products in the United States.

- 174. On information and belief, Seagate Thailand and Seagate Singapore have induced and continue to induce infringement of the '372 patent by making the Accused Products with the intention that STL and other third parties import them into the United States and by importing into the United States themselves directly and through their agents and by offering for sale and selling the Accused Products, with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.
- 175. On information and belief, Seagate Netherlands induced and continues to induce infringement of the '372 patent by making, selling, and offering for sale the Accused Products with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.
- 176. Each Defendant is aware that their actions (described above) induce third-party resellers (such as Best Buy) to sell the Accused Products to customers who ultimately use the Accused Products, thus inducing those third parties to infringe the Asserted Patents, including claim 1 of the '372 patent, since at least as early as April 3, 2024.
- 177. Defendants' actions, as detailed in the foregoing paragraphs, have induced and continue to induce customers to use, sell, offer for sale, and import into the United States the Accused Products, which when used as designed and for their intended purpose necessarily infringe the '372 patent.

Contributory Infringement by All Defendants

- 178. Defendants have known that the Accused Products infringe at least claim 1 of the '372 patent since at least as early as April 3, 2024, when Seagate stipulated to accepting IP Bridge's original Complaint. D.I. 18.
- 179. The Accused Products are not staple articles or commodities of commerce with substantial noninfringing uses. The Accused Products are designed, configured, and adapted to work with both other Seagate devices and other third-party devices, such as personal computers, laptops, servers, server farms, and other computer systems. The Accused Products have no substantial purpose other than as part of infringing devices and accordingly are not staple articles or commodities of commerce. The read/write heads in the Accused Products are a material part of the invention of at least claim 1 of the '372 patent.
- 180. Defendants have known since at least April 3, 2024, that the read/write heads in the Accused Products are a material part of the invention of at least claim 1 of the '372 patent through their stipulated acceptance of IP Bridge's original Complaint. D.I. 18.

COUNT IV

(Infringement of U.S. Patent No. 11,968,909)

181. IP Bridge incorporates by reference and realleges all the foregoing paragraphs of the Complaint as if fully set forth herein.

Direct Infringement by All Defendants

182. STL directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '909 patent, including at least claim 1, including by making, using, selling, and offering for sale in the United States, and importing into the United States, the Accused Products.

- 183. On information and belief, STH directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '909 patent, including at least claim 1, including by directing STL as its agent and alter ego to make, use, sell, and offer to sell in the United States, and import into the United States, the Accused Products.
- 184. On information and belief, Seagate Thailand and Seagate Singapore have directly infringed and continue to directly infringe, literally and equivalently, one or more claims of the '909 patent, including at least claim 1, by importing into the United States, and selling and offering for sale in the United States, the Accused Products.
- 185. On information and belief, Seagate Netherlands has directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '909 patent, including at least claim 1, by selling and offering for sale in the United States the Accused Products.
- 186. For example, and without limitation, Seagate's devices including their hard disk drives meet each and every limitation of claim 1 literally and under the doctrine of equivalents, as set forth in Exhibit DD and incorporated here.

Seagate's Knowledge of the '909 Patent

187. Seagate has known of the '909 patent at least as early as the service of this First Amended Complaint.

Induced Infringement By All Defendants

- 188. Seagate has known that the Accused Products infringe at least claim 1 of the '909 patent since at least as early as the service of this First Amended Complaint.
- 189. Since at least as early as the service of this First Amended Complaint, Defendants have known that the Accused Products infringe at least claim 1 of the '909 patent when used by customers and other users, when imported by others, and when sold and offered for sale by third

parties, such as Best Buy. See, e.g.,

https://www.bestbuy.com/site/brands/seagate/pcmcat166600050107.c. For example, a search of best Buy's website of sales locations in or near the 19702 ZIP code for Newark, Delaware with available external hard drives returns 15 results, with results 1, 3, and 5 located in Delaware. *See* https://www.bestbuy.com/site/store-locator.

190. Since at least as early as the service of this First Amended Complaint, Defendants have induced infringement and continue to induce infringement by actively encouraging customers and other users to directly infringe at least claim 1 of the '909 patent. Defendants have provided materials that induce customers and others to use, offer for sale, and sell the Accused Products in a manner that infringes at least claim 1 of the '909 patent. Defendants have done so, for example, on websites, in user manuals, in product documentation, and in other advertising materials. For example, Seagate's website touts its hard drives. See, e.g., https://www.seagate.com/products/hard-drives/ and https://www.seagate.com/products/externalhard-drives/. Seagate's website also contains detailed documentation and product manuals on how to use its hard drives. See https://www.seagate.com/search/?keyword=HDD and https://www.seagate.com/search/?keyword=hard%20drive. As another example, Defendants encourage the use of the IronWolf Pro HDD, the IronWolf HDD, the BarraCuda HDD, and the Exos HDD in in applications such as laptops, mobile storage, external storage systems, all-in-one PCs, ultra-slim desktop PCs, servers, and data centers. See, e.g., https://www.seagate.com/wwwcontent/datasheets/pdfs/ironwolf-pro-18tb-DS1914-16-2011US-en US.pdf, https://www.seagate.com/www-content/datasheets/pdfs/ironwolf-12tbDS1904-9-1707USen US.pdf, https://www.seagate.com/www-content/datasheets/pdfs/barracuda-2-5-DS1907-32005US-en_US.pdf, and https://www.seagate.com/www-content/datasheets/pdfs/exos-7-e8-data-sheet-DS1957-2-1904US-en US.pdf.

- 191. Since at least as early as the service of this First Amended Complaint, Defendants have induced infringement and continue to induce infringement by actively encouraging thirdparty distributors and resellers to directly infringe at least claim 1 of the '909 patent by working in concert with distributors and resellers to sell and offer to sell the Accused Products and have actively encouraged such sales and offers for sale. For example, Seagate's 2023 10-K states that Seagate sells products to "major OEMs, distributors and retailers," that Seagate's "distributors generally enter into non-exclusive agreements for the resale of our products... with limited rights of return and price protection" and other "sales programs to distributors on a quarterly and periodic basis to promote the sale of selected products in the sales channel," and that the "retail channel... typically require[s] greater marketing support, sales incentives and price protection periods." https://d18rn0p25nwr6d.cloudfront.net/CIK-0001137789/73579808-2f43-4bde-9354cffac2ea1c41.pdf at 9. Seagate also notes that it is "dependent on sales to distributors and retailers, which may increase price erosion and the volatility" of sales, because a "substantial portion" of its sales have "been to distributors and retailers of disk drive products." *Id.* at 15, 18. The Accused Products are available at such distributors and retailers, for example Best Buy. See, e.g., https://www.bestbuy.com/site/brands/seagate/pcmcat166600050107.c.
- 192. Since at least as early as the service of this First Amended Complaint, each of the Defendants (including STH, STL, Seagate Thailand, Seagate Singapore, and Seagate Netherlands) has actively and knowingly induced third-party retailers, distributors, integrators, and end-users of the Accused Products to directly infringe one more claims of the '909 patent, including at least claim 1.

- 193. On information and belief, STL induced and continues to induce infringement of the '909 patent by importing into the United States, making, selling, and offering to sell the Accused Products with the intention that third-party resellers (such as Best Buy) offer for sale (as described above) and sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.
- 194. On information and belief, STH induced and continues to induce infringement of the '909 patent by directing STL, as its agent and alter ego, to import into the United States, make, sell, and offer to sell the Accused Products with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States. On information and belief, STH and STL have induced and continue to induce infringement of the '909 patent by working in concert with other Defendants to offer for sale and sell the Accused Products in the United States.
- and continue to induce infringement of the '909 patent by making the Accused Products with the intention that STL and other third parties import them into the United States and by importing into the United States themselves directly and through their agents and by offering for sale and selling the Accused Products, with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.
- 196. On information and belief, Seagate Netherlands induced and continues to induce infringement of the '909 patent by making, selling, and offering for sale the Accused Products with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.

- 197. Each Defendant is aware that their actions (described above) induce third-party resellers (such as Best Buy) to sell the Accused Products to customers who ultimately use the Accused Products, thus inducing those third parties to infringe the Asserted Patents, including claim 1 of the '909 patent, since at least as early as the service of this First Amended Complaint.
- 198. Defendants' actions, as detailed in the foregoing paragraphs, have induced and continue to induce customers to use, sell, offer for sale, and import into the United States the Accused Products, which when used as designed and for their intended purpose necessarily infringe the '909 patent.

Contributory Infringement by All Defendants

- 199. Defendants have known that the Accused Products infringe at least claim 1 of the '909 patent since at least as early as the service of this First Amended Complaint.
- 200. The Accused Products are not staple articles or commodities of commerce with substantial noninfringing uses. The Accused Products are designed, configured, and adapted to work with both other Seagate devices and other third-party devices, such as personal computers, laptops, servers, server farms, and other computer systems. The Accused Products have no substantial purpose other than as part of infringing devices and accordingly are not staple articles or commodities of commerce. The read/write heads in the Accused Products are a material part of the invention of at least claim 1 of the '909 patent.
- 201. Defendants have known since at least the service of this First Amended Complaint, that the read/write heads in the Accused Products are a material part of the invention of at least claim 1 of the '909 patent.

COUNT V

(Infringement of U.S. Patent No. 10,367,138)

202. IP Bridge incorporates by reference and realleges all the foregoing paragraphs of the Complaint as if fully set forth herein.

Direct Infringement by All Defendants

- 203. STL directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '138 patent, including at least claim 12, including by making, using, selling, and offering for sale in the United States, and importing into the United States, the Accused Products.
- 204. On information and belief, STH directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '138 patent, including at least claim 12, including by directing STL as its agent and alter ego to make, use, sell, and offer to sell in the United States, and import into the United States, the Accused Products.
- 205. On information and belief, Seagate Thailand and Seagate Singapore have directly infringed and continue to directly infringe, literally and equivalently, one or more claims of the '138 patent, including at least claim 12, by importing into the United States, and selling and offering for sale in the United States, the Accused Products.
- 206. On information and belief, Seagate Netherlands has directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '138 patent, including at least claim 12, by selling and offering for sale in the United States the Accused Products.
- 207. For example, and without limitation, Seagate's devices including their hard disk drives meet each and every limitation of claim 12 literally and under the doctrine of equivalents, as set forth in Exhibit EE and incorporated here.

Seagate's Knowledge of the '138 Patent

208. Seagate has known of the '138 patent at least as early as the service of this First Amended Complaint.

Induced Infringement By All Defendants

- 209. Seagate has known that the Accused Products infringe at least claim 12 of the '138 patent since at least as early as the service of this First Amended Complaint.
- 210. Since at least as early as the service of this First Amended Complaint, Defendants have known that the Accused Products infringe at least claim 12 of the '138 patent when used by customers and other users, when imported by others, and when sold and offered for sale by third parties, such as Best Buy. *See, e.g.*,

https://www.bestbuy.com/site/brands/seagate/pcmcat166600050107.c. For example, a search of best Buy's website of sales locations in or near the 19702 ZIP code for Newark, Delaware with available external hard drives returns 15 results, with results 1, 3, and 5 located in Delaware. *See* https://www.bestbuy.com/site/store-locator.

211. Since at least as early as the service of this First Amended Complaint, Defendants have induced infringement and continue to induce infringement by actively encouraging customers and other users to directly infringe at least claim 12 of the '138 patent. Defendants have provided materials that induce customers and others to use, offer for sale, and sell the Accused Products in a manner that infringes at least claim 12 of the '138 patent. Defendants have done so, for example, on websites, in user manuals, in product documentation, and in other advertising materials. For example, Seagate's website touts its hard drives. *See*, *e.g.*, https://www.seagate.com/products/hard-drives/ and https://www.seagate.com/products/hard-drives/ and https://www.seagate.com/products/external-hard-drives/. Seagate's website also contains detailed documentation and product manuals on how to use its hard drives. *See* https://www.seagate.com/search/?keyword=HDD and

https://www.seagate.com/search/?keyword=hard%20drive. As another example, Defendants encourage the use of the IronWolf Pro HDD, the IronWolf HDD, the BarraCuda HDD, and the Exos HDD in applications such as laptops, mobile storage, external storage systems, all-in-one PCs, ultra-slim desktop PCs, servers, and data centers. See, e.g., https://www.seagate.com/www-content/datasheets/pdfs/ironwolf-pro-18tb-DS1914-16-2011US-en_US.pdf,
https://www.seagate.com/www-content/datasheets/pdfs/ironwolf-12tbDS1904-9-1707US-en_US.pdf, https://www.seagate.com/www-content/datasheets/pdfs/barracuda-2-5-DS1907-3-2005US-en_US.pdf, and https://www.seagate.com/www-content/datasheets/pdfs/exos-7-e8-datasheet-DS1957-2-1904US-en_US.pdf.

212. Since at least as early as the service of this First Amended Complaint, Defendants have induced infringement and continue to induce infringement by actively encouraging third-party distributors and resellers to directly infringe at least claim 12 of the '138 patent by working in concert with distributors and resellers to sell and offer to sell the Accused Products and have actively encouraged such sales and offers for sale. For example, Seagate's 2023 10-K states that Seagate sells products to "major OEMs, distributors and retailers," that Seagate's "distributors generally enter into non-exclusive agreements for the resale of our products... with limited rights of return and price protection" and other "sales programs to distributors on a quarterly and periodic basis to promote the sale of selected products in the sales channel," and that the "retail channel... typically require[s] greater marketing support, sales incentives and price protection periods." https://dl8rn0p25nwr6d.cloudfront.net/CIK-0001137789/73579808-2f43-4bde-9354-cffac2ea1c41.pdf at 9. Seagate also notes that it is "dependent on sales to distributors and retailers, which may increase price erosion and the volatility" of sales, because a "substantial portion" of its sales have "been to distributors and retailers of disk drive products." Id. at.15, 18.

The Accused Products are available at such distributors and retailers, for example Best Buy. *See, e.g.*, https://www.bestbuy.com/site/brands/seagate/pcmcat166600050107.c.

- 213. Since at least as early as the service of this First Amended Complaint, each of the Defendants (including STH, STL, Seagate Thailand, Seagate Singapore, and Seagate Netherlands) has actively and knowingly induced third-party retailers, distributors, integrators, and end-users of the Accused Products to directly infringe one more claims of the '138 patent, including at least claim 12.
- 214. On information and belief, STL induced and continues to induce infringement of the '138 patent by importing into the United States, making, selling, and offering to sell the Accused Products with the intention that third-party resellers (such as Best Buy) offer for sale (as described above) and sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.
- 215. On information and belief, STH induced and continues to induce infringement of the '138 patent by directing STL, as its agent and alter ego, to import into the United States, make, sell, and offer to sell the Accused Products with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States. On information and belief, STH and STL have induced and continue to induce infringement of the '138 patent by working in concert with other Defendants to offer for sale and sell the Accused Products in the United States.
- 216. On information and belief, Seagate Thailand and Seagate Singapore have induced and continue to induce infringement of the '138 patent by making the Accused Products with the intention that STL and other third parties import them into the United States and by importing into the United States themselves directly and through their agents and by offering for sale and

selling the Accused Products, with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.

- 217. On information and belief, Seagate Netherlands induced and continues to induce infringement of the '138 patent by making, selling, and offering for sale the Accused Products with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.
- 218. Each Defendant is aware that their actions (described above) induce third-party resellers (such as Best Buy) to sell the Accused Products to customers who ultimately use the Accused Products, thus inducing those third parties to infringe the Asserted Patents, including claim 12 of the '138 patent, since at least as early as the service of this First Amended Complaint.
- 219. Defendants' actions, as detailed in the foregoing paragraphs, have induced and continue to induce customers to use, sell, offer for sale, and import into the United States the Accused Products, which when used as designed and for their intended purpose necessarily infringe the '138 patent.

Contributory Infringement by All Defendants

- 220. Defendants have known that the Accused Products infringe at least claim 12 of the '138 patent since at least as early as the service of this First Amended Complaint.
- 221. The Accused Products are not staple articles or commodities of commerce with substantial noninfringing uses. The Accused Products are designed, configured, and adapted to work with both other Seagate devices and other third-party devices, such as personal computers, laptops, servers, server farms, and other computer systems. The Accused Products have no substantial purpose other than as part of infringing devices and accordingly are not staple articles

or commodities of commerce. The read/write heads in the Accused Products are a material part of the invention of at least claim 12 of the '138 patent.

222. Defendants have known since at least the service of this First Amended Complaint, that the read/write heads in the Accused Products are a material part of the invention of at least claim 12 of the '138 patent.

COUNT VI

(Infringement of U.S. Patent No. 9,608,198)

223. IP Bridge incorporates by reference and realleges all the foregoing paragraphs of the Complaint as if fully set forth herein.

Direct Infringement by All Defendants

- 224. STL directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '198 patent, including at least claim 1, including by making, using, selling, and offering for sale in the United States, and importing into the United States, the Accused Products.
- 225. On information and belief, STH directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '198 patent, including at least claim 1, including by directing STL as its agent and alter ego to make, use, sell, and offer to sell in the United States, and import into the United States, the Accused Products.
- 226. On information and belief, Seagate Thailand and Seagate Singapore have directly infringed and continue to directly infringe, literally and equivalently, one or more claims of the '198 patent, including at least claim 1, by importing into the United States, and selling and offering for sale in the United States, the Accused Products.
- 227. On information and belief, Seagate Netherlands has directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '198 patent,

including at least claim 1, by selling and offering for sale in the United States the Accused Products.

228. For example, and without limitation, Seagate's devices including their hard disk drives meet each and every limitation of claim 1 literally and under the doctrine of equivalents, as set forth in Exhibit FF and incorporated here.

Seagate's Knowledge of the '198 Patent

- 229. On information and belief, STL, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands have all known about the '198 patent since at least 2018. As discussed above, Seagate was well-aware of Dr. Yuasa's foundational work, having discussed and excerpted his *Nature Materials* paper and other work in journals, cited his work in patents assigned to Seagate, and presented at the same conferences.
- 230. In addition, as discussed above, in May 2017, a Japanese court found that three Seagate HDDs infringed the JP '744 patent, which lead to Nippon Seagate, STP and STL negotiating a license on behalf of themselves and their affiliates to the Japanese counterparts of the Asserted Patents. As part of those negotiations, the prior owners of the Asserted Patents offered to license the Asserted Patents (then in existence), including the '403, '263, '134, '463, and '198 patents. Instead of taking a license to all the patents in the MTJ Patent Portfolio, worldwide, including the Asserted Patents, Nippon Seagate, STP, and STL instead chose only to license the Japanese counterparts to the Asserted Patents. The decision of Nippon Seagate, STP, and STL not to license the Asserted Patents when given the opportunity to do so occurred no later than sometime in 2018. STL was thus aware of the '198 patent, which issued in 2017, and that STL did not have a license to it.
- 231. On information and belief, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands all became aware of the '198 patent at least as early as 2018 when Nippon

Seagate, STP, and STL were negotiating a license with the prior owners of the Asserted Patents. The license agreement that Nippon Seagate, STP, and STL executed covered not only themselves, but also all affiliates, which the license agreement defined as any company that any of the named entities had ownership, management, or over 50% of the voting rights over. STP, a named party to the license agreement, is the ultimate owner of STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands. When STP was offered a license to the Asserted Patents (then in existence) in 2018, and declined to take such a license, it was declining that license on behalf of not only itself, but its affiliates, which include STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands, according to the license agreement. Thus, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands each had actual knowledge of the '198 patent and that each did not have a license to it, at least as early as 2018, or at a minimum acted with willful blindness to those facts.

232. In addition, since at least as early as the service of this First Amended Complaint, all Defendants have actual notice of the '198 patent.

Induced Infringement by All Defendants

- 233. Since at least as early as 2018 and no later than the service of this First Amended Complaint, Defendants have known that the Accused Products infringe at least claim 1 of the '198 patent.
- 234. Since at least as early as 2018 and no later than the service of this First Amended Complaint, Defendants have known that the Accused Products infringe at least claim 1 of the '198 patent when used by customers and other users, when imported by others, and when sold and offered for sale by third parties, such as Best Buy. *See, e.g.*,

https://www.bestbuy.com/site/brands/seagate/pcmcat166600050107.c. For example, a search of best Buy's website of sales locations in or near the 19702 ZIP code for Newark, Delaware with

available external hard drives returns 15 results, with results 1, 3, and 5 located in Delaware. *See* https://www.bestbuy.com/site/store-locator.

235. Since at least as early as 2018 and no later than the service of this First Amended Complaint, Defendants have induced infringement and continue to induce infringement by actively encouraging customers and other users to directly infringe at least claim 1 of the '198 patent. Defendants have provided materials that induce customers and others to use, offer for sale, and sell the Accused Products in a manner that infringes at least claim 1 of the '198 patent. Defendants have done so, for example, on websites, in user manuals, in product documentation, and in other advertising materials. For example, Seagate's website touts its hard drives. See, e.g., https://www.seagate.com/products/hard-drives/ and https://www.seagate.com/products/externalhard-drives/. Seagate's website also contains detailed documentation and product manuals on how to use its hard drives. See https://www.seagate.com/search/?keyword=HDD and https://www.seagate.com/search/?keyword=hard%20drive. As another example, Defendants encourage the use of the IronWolf Pro HDD, the IronWolf HDD, the BarraCuda HDD, and the Exos HDD in in applications such as laptops, mobile storage, external storage systems, all-in-one PCs, ultra-slim desktop PCs, servers, and data centers. See, e.g., https://www.seagate.com/wwwcontent/datasheets/pdfs/ironwolf-pro-18tb-DS1914-16-2011US-en US.pdf, https://www.seagate.com/www-content/datasheets/pdfs/ironwolf-12tbDS1904-9-1707USen US.pdf, https://www.seagate.com/www-content/datasheets/pdfs/barracuda-2-5-DS1907-3-2005US-en US.pdf, and https://www.seagate.com/www-content/datasheets/pdfs/exos-7-e8-datasheet-DS1957-2-1904US-en US.pdf.

236. Since at least as early as 2018 and no later than the service of this First Amended Complaint, Defendants have induced infringement and continue to induce infringement by

actively encouraging third-party distributors and resellers to directly infringe at least claim 1 of

the '198 patent by working in concert with distributors and resellers to sell and offer for sale the Accused Products and have actively encouraged such sales and offers for sale. For example, Seagate's 2023 10-K states that Seagate sells products to "major OEMs, distributors and retailers," that Seagate's "distributors generally enter into non-exclusive agreements for the resale of our products... with limited rights of return and price protection" and other "sales programs to distributors on a quarterly and periodic basis to promote the sale of selected products in the sales channel," and that the "retail channel... typically require[s] greater marketing support, sales incentives and price protection periods."

https://dl8rn0p25nwr6d.cloudfront.net/CIK-0001137789/73579808-2f43-4bde-9354-cffac2ea1c41.pdf at 9. Seagate also notes that it is "dependent on sales to distributors and retailers, which may increase price erosion and the volatility" of sales, because a "substantial portion" of its sales have "been to distributors and retailers of disk drive products." *Id.* at 15, 18. The Accused Products are available at such distributors and retailers, for example Best Buy. *See*, e.g., https://www.bestbuy.com/site/brands/seagate/pcmcat166600050107.c.

- 237. Since at least as early as 2018 and no later than the service of this First Amended Complaint, each of the Defendants (including STH, STL, Seagate Thailand, Seagate Singapore, and Seagate Netherlands) has actively and knowingly induced third-party retailers, distributors, integrators, and end-users of the Accused Products to directly infringe one more claims of the '198 patent, including at least claim 1.
- 238. On information and belief, STL induced and continues to induce infringement of the '198 patent by importing into the United States, making, selling, and offering to sell the Accused Products with the intention that third-party resellers (such as Best Buy) offer for sale (as

described above) and sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.

- 239. On information and belief, STH induced and continues to induce infringement of the '198 patent by directing STL, as its agent and alter ego, to import into the United States, make, sell, and offer to sell the Accused Products with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States. On information and belief, STH and STL have induced and continue to induce infringement of the '198 patent by working in concert with other Defendants to offer for sale and sell the Accused Products in the United States.
- 240. On information and belief, Seagate Thailand and Seagate Singapore have induced and continue to induce infringement of the '198 patent by making the Accused Products with the intention that STL and other third parties import them into the United States and by importing into the United States themselves directly and through their agents and by offering for sale and selling the Accused Products, with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.
- 241. On information and belief, Seagate Netherlands induced and continues to induce infringement of the '198 patent by making, selling, and offering for sale the Accused Products with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.
- 242. On information and belief, each Defendant is actually aware of the '198 patent for the reasons explained above, or at a minimum acted with willful blindness to its existence.

- 243. Moreover, on information and belief, each Defendant is actually aware its actions will induce the infringement of the Asserted Patents at least as early as 2018, or at a minimum acted with willful blindness to such inducement, because: (1) the Japanese court found that Seagate's HDDs infringed at least one of the Japanese counterparts to the Asserted Patents, and (2) the claims of that Japanese patent are substantially similar to the claims of the Asserted Patents, including at least claim 1 of the '198 patent. The infringement finding of the Japanese court put Seagate on notice that, if sold in countries other than Japan (where Seagate had a license), Seagate's HDDs would infringe the counterparts of the licensed Japanese patents, including the Asserted Patents. On information and belief, not only was STL on notice of such infringement by being a party to the license to the Japanese counterparts of the Asserted Patents, but STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands all had actual notice as being an affiliate of STP, and thus expressly covered by the license agreement and bound by STP and STL's decision not to accept a license to the Asserted Patents despite being offered a license to the Asserted Patents in 2018, or at a minimum acted with willful blindness to such infringement.
- 244. On information and belief, Defendants thus knew that they did not have a license to the Asserted Patents because STP and STL, acting on behalf of their affiliates, declined such a license when one was offered in 2018, knew that the Seagate HDDs infringed the Asserted Patents through the Japanese court's finding of infringement to the Japanese counterparts that had substantially the same claims as the Asserted Patents, but chose to sell the Accused Products to third-party retailers and in turn to customers in the United States anyway, thus inducing infringement of the '198 patent.

- 245. In addition, Defendants have known since at least the service of this First Amended Complaint, that their respective actions (described above) induce third parties (such as Best Buy and end users) to infringe the '198 patent.
- 246. Defendants' actions, as detailed in the foregoing paragraphs, have induced and continue to induce customers to use, sell, offer for sale, and import into the United States the Accused Products, which when used as designed and for their intended purpose necessarily infringe the '198 patent.

Contributory Infringement by All Defendants

- 247. Since at least as early as 2018 and no later than the service of this First Amended Complaint, all Defendants have contributorily infringed at least claim 1 of the '198 patent by importing into the United States, making, selling, and offering to sell their Accused Products within the United States as described previously.
- 248. On information and belief, each Defendant is actually aware of the '198 patent for the reasons explained above, or at a minimum acted with willful blindness to its existence.
- 249. The Accused Products are not staple articles or commodities of commerce with substantial noninfringing uses. The Accused Products are designed, configured, and adapted to work with both other Seagate devices and other third-party devices, such as personal computers, laptops, servers, server farms, and other computer systems. The Accused Products have no substantial purpose other than as part of infringing devices and accordingly are not staple articles or commodities of commerce. The read/write heads in the Accused Products are a material part of the invention of at least claim 1 of the '198 patent.
- 250. Moreover, on information and belief, each Defendant is actually aware that the read/write heads in the Accused Products are a material part of the invention of at least claim 1 of the '198 patent at least as early as 2018, or at a minimum acted with willful blindness to those

facts, because: (1) the Japanese court found that Seagate's HDDs infringed at least one of the Japanese counterparts to the Asserted Patents, and (2) the claims of that Japanese patent are substantially similar to the claims of the Asserted Patents, including at least claim 1 of the '198 patent. The infringement finding of the Japanese court put Seagate on notice that, if sold in countries other than Japan (where Seagate had a license), Seagate's HDDs would infringe the counterparts of the licensed Japanese patents, including the Asserted Patents. On information and belief, not only was STL on notice of such infringement by being a party to the license to the Japanese counterparts of the Asserted Patents, but STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands all had actual notice as being an affiliate of STP, and thus expressly covered by the license agreement and bound by STP and STL's decision not to accept a license to the Asserted Patents despite being offered a license to the Asserted Patents in 2018, or at a minimum acted with willful blindness to such infringement.

- 251. On information and belief, Defendants thus knew that they did not have a license to the Asserted Patents because STP and STL, acting on behalf of their affiliates, declined such a license when one was offered in 2018, knew that the Seagate HDDs infringed the Asserted Patents through the Japanese court's finding of infringement of a Japanese counterpart with claims that are substantially similar to claims of the Asserted Patents, but chose to sell the Accused Products to third-party retailers and in turn to customers in the United States anyway, thus contributing to those parties' infringement of the '198 patent.
- 252. In addition, Defendants have known since at least the service of this First Amended Complaint, that the read/write heads in the Accused Products are a material part of the invention of at least claim 1 of the '198 patent.

Willful Infringement By All Defendants

- 253. Since at least 2018, STL along with the remaining Defendants knew or should have known, or at a minimum acted with willful blindness to the fact that, the Accused Products infringe one or more claims of the '198 patent, including at least claim 1. As discussed above, during Nippon Seagate, STL, and STP's negotiations with the prior owners of the Asserted Patents for a license in 2018, the prior owners of the Asserted Patents offered to license the Asserted Patents (then existing), which included the '198 patent, to Nippon Seagate, STL, and STP, which those Seagate entities declined. On information and belief, such a license, if Nippon Seagate, STL, and STP had accepted it, would have covered not only those Seagate entities, but each of their affiliates, which, according to the terms of the license agreement, would have covered STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands.
- 254. When Nippon Seagate, STL, and STP declined to accept a license to the Asserted Patents in 2018 on behalf of themselves and their affiliates, it was with the knowledge that Seagate's HDDs infringed a Japanese counterpart of the Asserted Patents, which, as discussed above, has claims which are substantially similar to the claims of the Asserted Patents. When Nippon Seagate, STL, and STP declined to accept a license to the Asserted Patents in 2018 on behalf of themselves and their affiliates, at least STL had actual knowledge that its HDDs, including the Accused Products, infringed the Asserted Patents, including claim 1 of the '198 patent, if made, sold, and offered for sale in the United States and imported into the United States. When STL, having declined to take a license to the Asserted Patents, and instead make, sell, offer to sell, in the United States and import into the United States the Accused Products, it willfully infringed at least claim 1 of the '198 patent.
- 255. STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands have willfully infringed at least claim 1 of the '198 patent as well. On information and belief, when

Nippon Seagate, STL, and STP negotiated a license with the prior owners of the Asserted Patents, it was done on behalf of not only those three named Seagate entities, but also on behalf of STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands as the named entities affiliates because the eventual license extended to such affiliates as well. Through that negotiation and because of the Japanese court's infringement decision, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands all had actual knowledge, or at a minimum acted with willful blindness to the fact, that Seagate's HDDs infringed a Japanese counterpart of the Asserted Patents, that the claims of the Asserted Patents were substantially similar to the Japanese counterparts, and that Seagate was not taking a license to the Asserted Patents despite being offered one. STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands thus willfully infringed at least claim 1 of the '198 patent when each acted to make, offer to sell, and sell in the United States, and import into the United States, the Accused Products without the license that the prior owners of the Asserted Patents had offered in 2018 but which Seagate declined to take.

- 256. STL, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands
 Seagate's making, using, offering for sale, and selling in the United States and importing into the
 United States, the Accused Products (described with respect to each Defendant above) despite
 knowing that Seagate's HDDs infringed substantially the same claims as in the Asserted Patents,
 including claim 1 of the '198 patent, and did not have a license to the Asserted Patents
 demonstrate the willful nature of Seagate's infringement.
- 257. STL's infringement of the '198 patent has been willful since at least September 29, 2015. The remaining Defendants' infringement of the '198 patent has been willful since at least 2018. Seagate's ongoing infringement of the '198 patent continues to be willful. Seagate

has chosen to import, manufacture, use, offer to sell and sell the Accused Products, even after having notice of the '198 patent, knowing that such products would infringe the '198 patent.

- 258. The foregoing description of Seagate's infringement is based on publicly available information. IP Bridge reserves the right to modify this description, including, for example, on the basis of information about the Accused Products that it obtains during discovery.
- 259. IP Bridge has been and is being irreparably harmed, and has incurred and will continue to incur damages, as a result of Seagate's infringement of the '198 patent.
- 260. Seagate's infringement of the '198 patent has damaged and continues to damage IP Bridge in an amount yet to be determined, but no less than a reasonable royalty.

COUNT VII

(Infringement of U.S. Patent No. 9,123,463)

261. IP Bridge incorporates by reference and realleges all the foregoing paragraphs of the Complaint as if fully set forth herein.

Direct Infringement by All Defendants

- 262. STL directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '463 patent, including at least claim 1, including by making, using, selling, and offering for sale in the United States, and importing into the United States, the Accused Products.
- 263. On information and belief, STH directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '463 patent, including at least claim 1, including by directing STL as its agent and alter ego to make, use, sell, and offer to sell in the United States, and import into the United States, the Accused Products.
- 264. On information and belief, Seagate Thailand and Seagate Singapore have directly infringed and continue to directly infringe, literally and equivalently, one or more claims of the

'463 patent, including at least claim 1, by importing into the United States, and selling and offering for sale in the United States, the Accused Products.

- 265. On information and belief, Seagate Netherlands has directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '463 patent, including at least claim 1, by selling and offering for sale in the United States the Accused Products.
- 266. For example, and without limitation, Seagate's devices including their hard disk drives meet each and every limitation of claim 1 literally and under the doctrine of equivalents, as set forth in Exhibit GG and incorporated here.

Seagate's Knowledge of the '463 Patent

- 267. On information and belief, STL, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands have all known about the '463 patent since at least 2018. As discussed above, Seagate was well-aware of Dr. Yuasa's foundational work, having discussed and excerpted his *Nature Materials* paper and other work in journals, cited his work in patents assigned to Seagate, and presented at the same conferences.
- 268. In addition, as discussed above, in May 2017, a Japanese court found that three Seagate HDDs infringed the JP '744 patent, which lead to Nippon Seagate, STP and STL negotiating a license on behalf of themselves and their affiliates to the Japanese counterparts of the Asserted Patents. As part of those negotiations, the prior owners of the Asserted Patents offered to license the Asserted Patents (then in existence), including the '403, '263, '134, '198, and '463 patents. Instead of taking a license to all the patents in the MTJ Patent Portfolio, worldwide, including the Asserted Patents, Nippon Seagate, STP, and STL instead chose only to license the Japanese counterparts to the Asserted Patents. The decision of Nippon Seagate, STP, and STL not to license the Asserted Patents when given the opportunity to do so occurred no

later than sometime in 2018. STL was thus aware of the '463 patent, which issued in 2015, and that STL did not have a license to it.

- Seagate Netherlands all became aware of the '463 patent at least as early as 2018 when Nippon Seagate, STP, and STL were negotiating a license with the prior owners of the Asserted Patents. The license agreement that Nippon Seagate, STP, and STL executed covered not only themselves, but also all affiliates, which the license agreement defined as any company that any of the named entities had ownership, management, or over 50% of the voting rights over. STP, a named party to the license agreement, is the ultimate owner of STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands. When STP was offered a license to the Asserted Patents (then in existence) in 2018, and declined to take such a license, it was declining that license on behalf of not only itself, but its affiliates, which include STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands, according to the license agreement. Thus, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands each had actual of the '463 patent and that each did not have a license to it, at least as early as 2018, or at a minimum acted with willful blindness to those facts.
- 270. In addition, since at least as early as the service of this First Amended Complaint, all Defendants have actual notice of the '463 patent.

Induced Infringement by All Defendants

- 271. Since at least as early as 2018 and no later than the service of this First Amended Complaint, Defendants have known that the Accused Products infringe at least claim 1 of the '463 patent.
- 272. Since at least as early as 2018 and no later than the service of this First Amended Complaint, Defendants have known that the Accused Products infringe at least claim 1 of the

'463 patent when used by customers and other users, when imported by others, and when sold and offered for sale by third parties, such as Best Buy. *See, e.g.*,

https://www.bestbuy.com/site/brands/seagate/pcmcat166600050107.c. For example, a search of Best Buy's website of sales locations in or near the 19702 ZIP code for Newark, Delaware with available external hard drives returns 15 results, with results 1, 3, and 5 located in Delaware. *See* https://www.bestbuy.com/site/store-locator.

Since at least as early as 2018 and no later than the service of this First Amended 273. Complaint, Defendants have induced infringement and continue to induce infringement by actively encouraging customers and other users to directly infringe at least claim 1 of the '463 patent. Defendants have provided materials that induce customers and others to use, offer for sale, and sell the Accused Products in a manner that infringes at least claim 1 of the '463 patent. Defendants have done so, for example, on websites, in user manuals, in product documentation, and in other advertising materials. For example, Seagate's website touts its hard drives. See, e.g., https://www.seagate.com/products/hard-drives/ and https://www.seagate.com/products/externalhard-drives/. Seagate's website also contains detailed documentation and product manuals on how to use its hard drives. See https://www.seagate.com/search/?keyword=HDD and https://www.seagate.com/search/?keyword=hard%20drive. As another example, Defendants encourage the use of the IronWolf Pro HDD, the IronWolf HDD, the BarraCuda HDD, and the Exos HDD in in applications such as laptops, mobile storage, external storage systems, all-in-one PCs, ultra-slim desktop PCs, servers, and data centers. See, e.g., https://www.seagate.com/wwwcontent/datasheets/pdfs/ironwolf-pro-18tb-DS1914-16-2011US-en US.pdf, https://www.seagate.com/www-content/datasheets/pdfs/ironwolf-12tbDS1904-9-1707USen US.pdf, https://www.seagate.com/www-content/datasheets/pdfs/barracuda-2-5-DS1907-3<u>2005US-en_US.pdf</u>, and <u>https://www.seagate.com/www-content/datasheets/pdfs/exos-7-e8-datasheet-DS1957-2-1904US-en_US.pdf</u>.

Since at least as early as 2018 and no later than the service of this First Amended 274. Complaint, Defendants have induced infringement and continue to induce infringement by actively encouraging third-party distributors and resellers to directly infringe at least claim 1 of the '463 patent by working in concert with distributors and resellers to sell and offer for sale the Accused Products and have actively encouraged such sales and offers for sale. For example, Seagate's 2023 10-K states that Seagate sells products to "major OEMs, distributors and retailers," that Seagate's "distributors generally enter into non-exclusive agreements for the resale of our products... with limited rights of return and price protection" and other "sales programs to distributors on a quarterly and periodic basis to promote the sale of selected products in the sales channel," and that the "retail channel... typically require[s] greater marketing support, sales incentives and price protection periods." https://d18rn0p25nwr6d.cloudfront.net/CIK-0001137789/73579808-2f43-4bde-9354cffac2ea1c41.pdf at 9. Seagate also notes that it is "dependent on sales to distributors and retailers, which may increase price erosion and the volatility" of sales, because a "substantial portion" of its sales have "been to distributors and retailers of disk drive products." *Id.* at 15, 18. The Accused Products are available at such distributors and retailers, for example Best Buy. See, e.g., https://www.bestbuy.com/site/brands/seagate/pcmcat166600050107.c.

275. Since at least as early as 2018 and no later than the service of this First Amended Complaint, each of the Defendants (including STH, STL, Seagate Thailand, Seagate Singapore, and Seagate Netherlands) has actively and knowingly induced third-party retailers, distributors,

integrators, and end-users of the Accused Products to directly infringe one more claims of the '463 patent, including at least claim 1.

- 276. On information and belief, STL induced and continues to induce infringement of the '463 patent by importing into the United States, making, selling, and offering to sell the Accused Products with the intention that third-party resellers (such as Best Buy) offer for sale (as described above) and sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.
- 277. On information and belief, STH induced and continues to induce infringement of the '463 patent by directing STL, as its agent and alter ego, to import into the United States, make, sell, and offer to sell the Accused Products with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States. On information and belief, STH and STL have induced and continue to induce infringement of the '463 patent by working in concert with other Defendants to offer for sale and sell the Accused Products in the United States.
- 278. On information and belief, Seagate Thailand and Seagate Singapore have induced and continue to induce infringement of the '463 patent by making the Accused Products with the intention that STL and other third parties import them into the United States and by importing into the United States themselves directly and through their agents and by offering for sale and selling the Accused Products, with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.
- 279. On information and belief, Seagate Netherlands induced and continues to induce infringement of the '463 patent by making, selling, and offering for sale the Accused Products

with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.

- 280. On information and belief, each Defendant is actually aware of the '463 patent for the reasons explained above, or at a minimum acted with willful blindness to its existence.
- 281. Moreover, on information and belief, each Defendant is actually aware its actions will induce the infringement of the Asserted Patents at least as early as 2018, or at a minimum acted with willful blindness to such inducement, because: (1) the Japanese court found that Seagate's HDDs infringed at least one of the Japanese counterparts to the Asserted Patents, and (2) the claims of that Japanese patent are substantially similar to the claims of the Asserted Patents, including at least claim 1 of the '463 patent. The infringement finding of the Japanese court put Seagate on notice that, if sold in countries other than Japan (where Seagate had a license), Seagate's HDDs would infringe the counterparts of the licensed Japanese patents, including the Asserted Patents. On information and belief, not only was STL on notice of such infringement by being a party to the license to the Japanese counterparts of the Asserted Patents, but STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands all had actual notice as being an affiliate of STP, and thus expressly covered by the license agreement and bound by STP and STL's decision not to accept a license to the Asserted Patents despite being offered a license to the Asserted Patents in 2018, or at a minimum acted with willful blindness to such infringement.
- 282. On information and belief, Defendants thus knew that they did not have a license to the Asserted Patents because STP and STL, acting on behalf of their affiliates, declined such a license when one was offered in 2018, knew that the Seagate HDDs infringed the Asserted Patents through the Japanese court's finding of infringement of a Japanese counterpart with

claims that are substantially similar to claims of the Asserted Patents, but chose to sell the Accused Products to third-party retailers and in turn to customers in the United States anyway, thus inducing infringement of the '463 patent.

- 283. In addition, Defendants have known since at least the service of this First Amended Complaint, that their respective actions (described above) induce third parties (such as Best Buy and end users) to infringe the '463 patent.
- 284. Defendants' actions, as detailed in the foregoing paragraphs, have induced and continue to induce customers to use, sell, offer for sale, and import into the United States the Accused Products, which when used as designed and for their intended purpose necessarily infringe the '463 patent.

Contributory Infringement by All Defendants

- 285. Since at least as early as 2018 and no later than the service of this First Amended Complaint, all Defendants have contributorily infringed at least claim 1 of the '463 patent by importing into the United States, making, selling, and offering to sell their Accused Products within the United States as described previously.
- 286. On information and belief, each Defendant is actually aware of the '463 patent for the reasons explained above, or at a minimum acted with willful blindness to its existence.
- 287. The Accused Products are not staple articles or commodities of commerce with substantial noninfringing uses. The Accused Products are designed, configured, and adapted to work with both other Seagate devices and other third-party devices, such as personal computers, laptops, servers, server farms, and other computer systems. The Accused Products have no substantial purpose other than as part of infringing devices and accordingly are not staple articles or commodities of commerce. The read/write heads in the Accused Products are a material part of the invention of at least claim 1 of the '463 patent.

- 288. Moreover, on information and belief, each Defendant is actually aware that the read/write heads in the Accused Products are a material part of the invention of at least claim 1 of the '463 patent at least as early as 2018, or at a minimum acted with willful blindness to those facts, because: (1) the Japanese court found that Seagate's HDDs infringed the Japanese counterparts to the Asserted Patents, and (2) the claims of the Japanese patents are materially the same as the claims of the Asserted Patents, including at least claim 1 of the '463 patent. The infringement finding of the Japanese court put Seagate on notice that, if sold in countries other than Japan (where Seagate had a license), Seagate's HDDs would infringe the counterparts of the licensed Japanese patents, including the Asserted Patents. On information and belief, not only was STL on notice of such infringement by being a party to the license to the Japanese counterparts of the Asserted Patents, but STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands all had actual notice as being an affiliate of STP, and thus expressly covered by the license agreement and bound by STP and STL's decision not to accept a license to the Asserted Patents despite being offered a license to the Asserted Patents in 2018, or at a minimum acted with willful blindness to such infringement.
- 289. On information and belief, Defendants thus knew that they did not have a license to the Asserted Patents because STP and STL, acting on behalf of their affiliates, declined such a license when one was offered in 2018, knew that the Seagate HDDs infringed the Asserted Patents through the Japanese court's finding of infringement of a Japanese counterpart with claims that are substantially similar to claims of the Asserted Patents, but chose to sell the Accused Products to third-party retailers and in turn to customers in the United States anyway, thus contributing to those parties' infringement of the '463 patent.

290. In addition, Defendants have known since at least the service of this First Amended Complaint, that the read/write heads in the Accused Products are a material part of the invention of at least claim 1 of the '463 patent.

Willful Infringement By All Defendants

- 291. Since at least 2018, STL along with the remaining Defendants knew or should have known, or at a minimum acted with willful blindness to the fact that, the Accused Products infringe one or more claims of the '463 patent, including at least claim 1. As discussed above, during Nippon Seagate, STL, and STP's negotiations with the prior owners of the Asserted Patents for a license in 2018, the prior owners of the Asserted Patents offered to license the Asserted Patents (then existing), which included the '463 patent, to Nippon Seagate, STL, and STP, which those Seagate entities declined. On information and belief, such a license, if Nippon Seagate, STL, and STP had accepted it, would have covered not only those Seagate entities, but each of their affiliates, which, according to the terms of the license agreement, would have covered STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands.
- 292. When Nippon Seagate, STL, and STP declined to accept a license to the Asserted Patents in 2018 on behalf of themselves and their affiliates, it was with the knowledge that Seagate's HDDs infringed a Japanese counterpart of the Asserted Patents, which, as discussed above, had claims that are substantially similar to claims of the Asserted Patents. When Nippon Seagate, STL, and STP declined to accept a license to the Asserted Patents in 2018 on behalf of themselves and their affiliates, at least STL had actual knowledge that its HDDs, including the Accused Products, infringed the Asserted Patents, including claim 1 of the '463 patent, if made, sold, and offered for sale in the United States and imported into the United States. When STL, having declined to take a license to the Asserted Patents, and instead make, sell, offer to sell, in

the United States and import into the United States the Accused Products, it willfully infringed at least claim 1 of the '463 patent.

- 293. STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands have willfully infringed at least claim 1 of the '463 patent as well. On information and belief, when Nippon Seagate, STL, and STP negotiated a license with the prior owners of the Asserted Patents, it was done on behalf of not only those three named Seagate entities, but also on behalf of STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands as the named entities affiliates because the eventual license extended to such affiliates as well. Through that negotiation and because of the Japanese court's infringement decision, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands all had actual knowledge, or at a minimum acted with willful blindness to the fact, that Seagate's HDDs infringed the Japanese counterparts of the Asserted Patents, that the claims of the Asserted Patents were substantially similar to the claims of at least one of the Japanese counterparts, and that Seagate was not taking a license to the Asserted Patents despite being offered one. STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands thus willfully infringed at least claim 1 of the '463 patent when each acted to make, offer to sell, and sell in the United States, and import into the United States, the Accused Products without the license that the prior owners of the Asserted Patents had offered in 2018 but which Seagate declined to take.
- 294. STL, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands
 Seagate's making, using, offering for sale, and selling in the United States and importing into the
 United States, the Accused Products (described with respect to each Defendant above) despite
 knowing that Seagate's HDDs infringed claims of at least one Japanese counterpart that were
 substantially similar to the claims of the Asserted Patents, including claim 1 of the '463 patent,

and did not have a license to the Asserted Patents demonstrate the willful nature of Seagate's infringement.

- 295. STL's infringement of the '463 patent has been willful since at least September 29, 2015. The remaining Defendants' infringement of the '463 patent has been willful since at least 2018. Seagate's ongoing infringement of the '463 patent continues to be willful. Seagate has chosen to import, manufacture, use, offer to sell and sell the Accused Products, even after having notice of the '463 patent, knowing that such products would infringe the '463 patent.
- 296. The foregoing description of Seagate's infringement is based on publicly available information. IP Bridge reserves the right to modify this description, including, for example, on the basis of information about the Accused Products that it obtains during discovery.
- 297. IP Bridge has been and is being irreparably harmed, and has incurred and will continue to incur damages, as a result of Seagate's infringement of the '463 patent.
- 298. Seagate's infringement of the '463 patent has damaged and continues to damage IP Bridge in an amount yet to be determined, but no less than a reasonable royalty.

COUNT VIII

(Infringement of U.S. Patent No. 10,680,167)

299. IP Bridge incorporates by reference and realleges all the foregoing paragraphs of the Complaint as if fully set forth herein.

Direct Infringement by STL, STH, Seagate Thailand, and Seagate Singapore

300. STL directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '167 patent, including at least claim 1, including by using the claimed methods in the United States to make the Accused Products and by importing into the United States the Accused Products which are made using the claimed methods.

- 301. On information and belief, STH directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '167 patent, including at least claim 1, including by directing STL as its agent and alter ego to use the claimed methods in the United States to make the Accused Products and to import into the United States the Accused Products which are made using the claimed methods.
- 302. On information and belief, Seagate Thailand and Seagate Singapore have directly infringed and continue to directly infringe, literally and equivalently, one or more claims of the '167 patent, including at least claim 1, by importing into the United States the Accused Products which are made using the claimed methods.
- 303. For example, and without limitation, Seagate's devices including their hard disk drives are made using the method of claim 1 literally and under the doctrine of equivalents, as set forth in Exhibit HH and incorporated here.

COUNT IX

(Infringement of U.S. Patent No. 8,405,134)

304. IP Bridge incorporates by reference and realleges all the foregoing paragraphs of the Complaint as if fully set forth herein.

Direct Infringement by All Defendants

- 305. STL directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '134 patent, including at least claim 1, including by making, using, selling, and offering for sale in the United States, and importing into the United States, the Accused Products.
- 306. On information and belief, STH directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '134 patent, including at least claim

- 1, including by directing STL as its agent and alter ego to make, use, sell, and offer to sell in the United States, and import into the United States, the Accused Products.
- 307. On information and belief, Seagate Thailand and Seagate Singapore have directly infringed and continue to directly infringe, literally and equivalently, one or more claims of the '134 patent, including at least claim 1, by importing into the United States, and selling and offering for sale in the United States, the Accused Products.
- 308. On information and belief, Seagate Netherlands has directly infringed and continues to directly infringe, literally and equivalently, one or more claims of the '134 patent, including at least claim 1, by selling and offering for sale in the United States the Accused Products.
- 309. For example, and without limitation, Seagate's devices including their hard disk drives meet each and every limitation of claim 1 literally and under the doctrine of equivalents, as set forth in Exhibit II and incorporated here.

Seagate's Knowledge of the '134 Patent

- 310. On information and belief, STL has known of the '134 patent since at least September 29, 2015. As discussed above, during the prosecution of STL's '678 patent, STL cited the '134 patent in an IDS to the USPTO.
- 311. In addition, on information and belief, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands have all known about the '134 patent since at least 2018. As discussed above, Seagate was well-aware of Dr. Yuasa's foundational work, having discussed and excerpted his *Nature Materials* paper and other work in journals, cited his work in patents assigned to Seagate, and presented at the same conferences.
- 312. In addition, as discussed above, in May 2017, a Japanese court found that three Seagate HDDs infringed the JP '744 patent, which lead to Nippon Seagate, STP, and STL

negotiating a license on behalf of themselves and their affiliates to the Japanese counterparts of the Asserted Patents. As part of those negotiations, the prior owners of the Asserted Patents offered to license the Asserted Patents (then in existence), including the '403, '263, '134, '463, and '198 patents. Instead of taking a license to all the patents in the MTJ Patent Portfolio, worldwide, including the Asserted Patents, Nippon Seagate, STP, and STL instead chose only to license the Japanese counterparts to the Asserted Patents. The decision of Nippon Seagate, STP, and STL *not* to license the Asserted Patents when given the opportunity to do so occurred no later than sometime in 2018. STL was thus aware of the '134 patent, which issued in 2013, and that STL did not have a license to it.

Seagate Netherlands all became aware of the '134 patent at least as early as 2018 when Nippon Seagate, STP, and STL were negotiating a license with the prior owners of the Asserted Patents. The license agreement that Nippon Seagate, STP, and STL executed covered not only themselves, but also all affiliates, which the license agreement defined as any company that any of the named entities had ownership, management, or over 50% of the voting rights over. STP, a named party to the license agreement, is the ultimate owner of STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands. When STP was offered a license to the Asserted Patents (then in existence) in 2018, and declined to take such a license, it was declining that license on behalf of not only itself, but its affiliates, which include STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands, according to the license agreement. Thus, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands each had actual knowledge of the '134 patent and that each did not have a license to it, at least as early as 2018, or at a minimum acted with willful blindness to those facts.

314. In addition, since at least as early as the service of this First Amended Complaint, all Defendants have actual notice of the '134 patent.

Induced Infringement by All Defendants

- 315. Since at least as early as 2018 and no later than the service of this First Amended Complaint, Defendants have known that the Accused Products infringe at least claim 1 of the '134 patent.
- 316. Since at least as early as 2018 and no later than the service of this First Amended Complaint, Defendants have known that the Accused Products infringe at least claim 1 of the '134 patent when used by customers and other users, when imported by others, and when sold and offered for sale by third parties, such as Best Buy. *See, e.g.*,

https://www.bestbuy.com/site/brands/seagate/pcmcat166600050107.c. For example, a search of best Buy's website of sales locations in or near the 19702 ZIP code for Newark, Delaware with available external hard drives returns 15 results, with results 1, 3, and 5 located in Delaware. *See* https://www.bestbuy.com/site/store-locator.

317. Since at least as early as 2018 and no later than April 3, 2024, Defendants have induced infringement and continue to induce infringement by actively encouraging customers and other users to directly infringe at least claim 1 of the '134 patent. Defendants have provided materials that induce customers and others to use, offer for sale, and sell the Accused Products in a manner that infringes at least claim 1 of the '134 patent. Defendants have done so, for example, on websites, in user manuals, in product documentation, and in other advertising materials. For example, Seagate's website touts its hard drives. *See, e.g.*,

https://www.seagate.com/products/hard-drives/ and https://www.seagate.com/products/external-hard-drives/. Seagate's website also contains detailed documentation and product manuals on how to use its hard drives. See https://www.seagate.com/search/?keyword=HDD and

https://www.seagate.com/search/?keyword=hard%20drive. As another example, Defendants encourage the use of the IronWolf Pro HDD, the IronWolf HDD, the BarraCuda HDD, and the Exos HDD in in applications such as laptops, mobile storage, external storage systems, all-in-one PCs, ultra-slim desktop PCs, servers, and data centers. See, e.g., https://www.seagate.com/www-content/datasheets/pdfs/ironwolf-pro-18tb-DS1914-16-2011US-en_US.pdf,
https://www.seagate.com/www-content/datasheets/pdfs/ironwolf-12tbDS1904-9-1707US-en_US.pdf, https://www.seagate.com/www-content/datasheets/pdfs/barracuda-2-5-DS1907-3-2005US-en_US.pdf, and https://www.seagate.com/www-content/datasheets/pdfs/exos-7-e8-datasheet-DS1957-2-1904US-en_US.pdf.

318. Since at least as early as 2018 and no later than April 3, 2024, Defendants have induced infringement and continue to induce infringement by actively encouraging third-party distributors and resellers to directly infringe at least claim 1 of the '134 patent by working in concert with distributors and resellers to sell and offer for sale the Accused Products and have actively encouraged such sales and offers for sale. For example, Seagate's 2023 10-K states that Seagate sells products to "major OEMs, distributors and retailers," that Seagate's "distributors generally enter into non-exclusive agreements for the resale of our products... with limited rights of return and price protection" and other "sales programs to distributors on a quarterly and periodic basis to promote the sale of selected products in the sales channel," and that the "retail channel... typically require[s] greater marketing support, sales incentives and price protection periods." https://dl8rn0p25nwr6d.cloudfront.net/CIK-0001137789/73579808-2f43-4bde-9354-cffac2ea1c41.pdf at 9. Seagate also notes that it is "dependent on sales to distributors and retailers, which may increase price erosion and the volatility" of sales, because a "substantial portion" of its sales have "been to distributors and retailers of disk drive products." Id. at 15.18.

The Accused Products are available at such distributors and retailers, for example Best Buy. *See, e.g.*, https://www.bestbuy.com/site/brands/seagate/pcmcat166600050107.c.

- 319. Since at least as early as 2018 and no later than April 3, 2024, each of the Defendants (including STH, STL, Seagate Thailand, Seagate Singapore, and Seagate Netherlands) has actively and knowingly induced third-party retailers, distributors, integrators, and end-users of the Accused Products to directly infringe one more claims of the '134 patent, including at least claim 1.
- 320. On information and belief, STL induced and continues to induce infringement of the '134 patent by importing into the United States, making, selling, and offering to sell the Accused Products with the intention that third-party resellers (such as Best Buy) offer for sale (as described above) and sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.
- 321. On information and belief, STH induced and continues to induce infringement of the '134 patent by directing STL, as its agent and alter ego, to import into the United States, make, sell, and offer to sell the Accused Products with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States. On information and belief, STH and STL have induced and continue to induce infringement of the '134 patent by working in concert with other Defendants to offer for sale and sell the Accused Products in the United States.
- 322. On information and belief, Seagate Thailand and Seagate Singapore have induced and continue to induce infringement of the '134 patent by making the Accused Products with the intention that STL and other third parties import them into the United States and by importing into the United States themselves directly and through their agents and by offering for sale and

selling the Accused Products, with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.

- 323. On information and belief, Seagate Netherlands induced and continues to induce infringement of the '134 patent by making, selling, and offering for sale the Accused Products with the intention that third-party resellers (such as Best Buy) sell the Accused Products to customers who ultimately use the Accused Products, all in the United States.
- 324. On information and belief, each Defendant is actually aware of the '134 patent for the reasons explained above, or at a minimum acted with willful blindness to its existence.
- 325. Moreover, on information and belief, each Defendant is actually aware its actions will induce the infringement of the Asserted Patents at least as early as 2018, or at a minimum acted with willful blindness to such inducement, because: (1) the Japanese court found that Seagate's HDDs infringed at least one of the Japanese counterparts to the Asserted Patents, and (2) the claims of that Japanese patent are substantially similar to the claims of the Asserted Patents, including at least claim 1 of the '134 patent. The infringement finding of the Japanese court put Seagate on notice that, if sold in countries other than Japan (where Seagate had a license), Seagate's HDDs would infringe the counterparts of the licensed Japanese patents, including the Asserted Patents. On information and belief, not only was STL on notice of such infringement by being a party to the license to the Japanese counterparts of the Asserted Patents, but STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands all had actual notice as being an affiliate of STP, and thus expressly covered by the license agreement and bound by STP and STL's decision not to accept a license to the Asserted Patents despite being offered a license

to the Asserted Patents in 2018, or at a minimum acted with willful blindness to such infringement.

- 326. On information and belief, Defendants thus knew that they did not have a license to the Asserted Patents because STP and STL, acting on behalf of their affiliates, declined such a license when one was offered in 2018, knew that the Seagate HDDs infringed the Asserted Patents through the Japanese court's finding of infringement of at least one of the Japanese counterparts with claims that are substantially similar to claims of the Asserted Patents, but chose to sell the Accused Products to third-party retailers and in turn to customers in the United States anyway, thus inducing infringement of the '134 patent.
- 327. In addition, Defendants have known since at least the service of this First Amended Complaint, that their respective actions (described above) induce third parties (such as Best Buy and end users) to infringe the '134 patent.
- 328. Defendants' actions, as detailed in the foregoing paragraphs, have induced and continue to induce customers to use, sell, offer for sale, and import into the United States the Accused Products, which when used as designed and for their intended purpose necessarily infringe the '134 patent.

Contributory Infringement by All Defendants

- 329. Since at least as early as 2018 and no later than the service of this First Amended Complaint, all Defendants have contributorily infringed at least claim 1 of the '134 patent by importing into the United States, making, selling and offering to sell their Accused Products within the United States as described previously.
- 330. On information and belief, each Defendant is actually aware of the '134 patent for the reasons explained above, or at a minimum acted with willful blindness to its existence.

- 331. The Accused Products are not staple articles or commodities of commerce with substantial noninfringing uses. The Accused Products are designed, configured, and adapted to work with both other Seagate devices and other third-party devices, such as personal computers, laptops, servers, server farms, and other computer systems. The Accused Products have no substantial purpose other than as part of infringing devices and accordingly are not staple articles or commodities of commerce. The read/write heads in the Accused Products are a material part of the invention of at least claim 1 of the '134 patent.
- Moreover, on information and belief, each Defendant is actually aware that the 332. read/write heads in the Accused Products are a material part of the invention of at least claim 1 of the '134 patent at least as early as 2018, or at a minimum acted with willful blindness to those facts, because: (1) the Japanese court found that Seagate's HDDs infringed at least one of the Japanese counterparts to the Asserted Patents, and (2) the claims of that Japanese patent are substantially similar to the claims of the Asserted Patents, including at least claim 1 of the '134 patent. The infringement finding of the Japanese court put Seagate on notice that, if sold in countries other than Japan (where Seagate had a license), Seagate's HDDs would infringe the counterparts of the licensed Japanese patents, including the Asserted Patents. On information and belief, not only was STL on notice of such infringement by being a party to the license to the Japanese counterparts of the Asserted Patents, but STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands all had actual notice as being an affiliate of STP, and thus expressly covered by the license agreement and bound by STP and STL's decision not to accept a license to the Asserted Patents despite being offered a license to the Asserted Patents in 2018, or at a minimum acted with willful blindness to such infringement.

- 333. On information and belief, Defendants thus knew that they did not have a license to the Asserted Patents because STP and STL, acting on behalf of their affiliates, declined such a license when one was offered in 2018, knew that the Seagate HDDs infringed the Asserted Patents through the Japanese court's finding of infringement of a Japanese counterpart with claims that are substantially similar to the claims of the Asserted Patents, but chose to sell the Accused Products to third-party retailers and in turn to customers in the United States anyway, thus contributing to those parties' infringement of the '134 patent.
- 334. In addition, Defendants have known since at least the service of this First Amended Complaint, that the read/write heads in the Accused Products are a material part of the invention of at least claim 1 of the '134 patent.

Willful Infringement By All Defendants

- 335. Since at least September 29, 2015, STL knew or should have known, or at a minimum acted with willful blindness to the fact that the Accused Products infringe one or more claims of the '134 patent, including at least claim 1. As discussed above, during the prosecution of STL's '678 patent, STL cited the '134 patent in an IDS to the USPTO. By citing the disclosure of the '134 patent in an IDS to the USPTO, STL acknowledged that the '134 patent was material to the patentability of the pending claims covering STL's own HDD technology. On information and belief, STL thus knew or should have known, or at a minimum acted with willful blindness to the fact that Seagate's HDDs infringed the '134 patent as of at least September 29, 2015.
- 336. Since at least 2018, STL along with the remaining Defendants knew or should have known, or at a minimum acted with willful blindness to the fact that, the Accused Products infringe one or more claims of the '134 patent, including at least claim 1. As discussed above, during Nippon Seagate, STL, and STP's negotiations with the prior owners of the Asserted

Patents for a license in 2018, the prior owners of the Asserted Patents offered to license the Asserted Patents (then existing), which included the '134 patent, to Nippon Seagate, STL, and STP, which those Seagate entities declined. On information and belief, such a license, if Nippon Seagate, STL, and STP had accepted it, would have covered not only those Seagate entities, but each of their affiliates, which, according to the terms of the license agreement, would have covered STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands.

- 337. When Nippon Seagate, STL, and STP declined to accept a license to the Asserted Patents in 2018 on behalf of themselves and their affiliates, it was with the knowledge that Seagate's HDDs infringed a Japanese counterpart of the Asserted Patents, which, as discussed above, has claims that are substantially similar to claims of the Asserted Patents. When Nippon Seagate, STL, and STP declined to accept a license to the Asserted Patents in 2018 on behalf of themselves and their affiliates, at least STL had actual knowledge that its HDDs, including the Accused Products, infringed the Asserted Patents, including claim 1 of the '134 patent, if made, sold, and offered for sale in the United States and imported into the United States. When STL, having declined to take a license to the Asserted Patents, and instead make, sell, offer to sell, in the United States and import into the United States the Accused Products, it willfully infringed at least claim 1 of the '134 patent.
- 338. STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands have willfully infringed at least claim 1 of the '134 patent as well. On information and belief, when Nippon Seagate, STL, and STP negotiated a license with the prior owners of the Asserted Patents, it was done on behalf of not only those three named Seagate entities, but also on behalf of STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands as the named entities affiliates because the eventual license extended to such affiliates as well. Through that

negotiation and because of the Japanese court's infringement decision, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands all had actual knowledge that Seagate's HDDs infringed a Japanese counterpart of the Asserted Patents, that the claims of the Asserted Patents were substantially similar to the claims of that Japanese counterpart, and that Seagate was not taking a license to the Asserted Patents despite being offered one. STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands thus willfully infringed at least claim 1 of the '134 patent when each acted to make, offer to sell, and sell in the United States, and import into the United States, the Accused Products without the license that the prior owners of the Asserted Patents had offered in 2018 but which Seagate declined to take, or at a minimum acted with willful blindness to those facts.

- 339. STL, STH, Seagate Thailand, Seagate Singapore, and Seagate Netherlands
 Seagate's making, using, offering for sale, and selling in the United States and importing into the
 United States, the Accused Products (described with respect to each Defendant above) despite
 knowing that Seagate's HDDs infringed claims of a Japanese counterpart with claims that are
 substantially similar to claims in the Asserted Patents, including claim 1 of the '134 patent, and
 did not have a license to the Asserted Patents demonstrate the willful nature of Seagate's
 infringement.
- 340. STL's infringement of the '134 patent has been willful since at least September 29, 2015. The remaining Defendants' infringement of the '134 patent has been willful since at least 2018. Seagate's ongoing infringement of the '134 patent continues to be willful. Seagate has chosen to import, manufacture, use, offer to sell and sell the Accused Products, even after having notice of the '134 patent, knowing that such products would infringe the '134 patent.

- 341. The foregoing description of Seagate's infringement is based on publicly available information. IP Bridge reserves the right to modify this description, including, for example, on the basis of information about the Accused Products that it obtains during discovery.
- 342. IP Bridge has been and is being irreparably harmed, and has incurred and will continue to incur damages, as a result of Seagate's infringement of the '134 patent.
- 343. Seagate's infringement of the '134 patent has damaged and continues to damage IP Bridge in an amount yet to be determined, but no less than a reasonable royalty.

REQUEST FOR RELIEF

Plaintiff respectfully requests that this Court enter judgment as follows:

- a. Declaring that Defendants have infringed, and continue to infringe, the '403, '263, '372, '909, '138, '198, '463, '167, and '134 patents;
- b. Granting a permanent injunction, enjoining Defendants and their officers, agents, employees, attorneys, and all other persons acting in concert or participation with them, from further infringement of the '403, '263, '372, '909, '138, '198, '463, '167, and '134 patents, including but not limited to the enjoining the manufacture, sale, offer for sale, importation, and use of the Accused Products and any further development of the Accused Products;
- c. Awarding Plaintiff damages adequate to compensate it for Defendants' infringing activities, including supplemental damages for any post-verdict infringement up until entry of the final judgment with an accounting as needed, together with prejudgment and post-judgment interest on the damages awarded;
- d. Declaring that Defendants' infringement has been willful;
- e. Awarding enhanced damages in an amount up to treble the amount of compensatory damages as justified under 35 U.S.C. § 284;

- f. Finding this to be an exceptional case and awarding Plaintiff its attorneys' fees and costs under 35 U.S.C. § 285 as a result of Defendants' infringement of the Asserted Patents; and
- g. Awarding Plaintiff any such other and further relief as the Court deems just and proper.

DEMAND FOR JURY TRIAL

IP Bridge demands a trial by jury on all issues so triable.

YOUNG CONAWAY STARGATT & TAYLOR, LLP

Date: July 8, 2024

OF COUNSEL:
Michael A. Albert
malbert@wolfgreenfield.com
Gerald B. Hrycyszyn
ghrycyszyn@wolfgreenfield.com
Hunter D. Keeton
hkeeton@wolfgreenfield.com
WOLF, GREENFIELD & SACKS, P.C.
600 Atlantic Avenue
Boston, MA 02210
617.646.8000 Phone
617.646.8646 Fax

Aya Cieslak-Tochigi aya.cieslak-tochigi@wolfgreenfield.com WOLF, GREENFIELD & SACKS, P.C. 605 Third Avenue, 25th Floor New York, NY 10158 212.697.7890 Phone 617.646.8646 Fax

/s/ Adam W. Poff

Adam W. Poff (#3990) Robert M. Vrana (#5666) Alexis N. Stombaugh (#6702) Rodney Square 1000 North King Street Wilmington, DE 19801 (302) 571-6600 apoff@ycst.com rvrana@ycst.com astombaugh@ycst.com

Counsel for Godo Kaisha IP Bridge 1