

**IN THE UNITED STATES DISTRICT COURT
FOR THE EASTERN DISTRICT OF TEXAS
SHERMAN DIVISION**

KT IMAGING USA, LLC,

Plaintiff

-against-

PANASONIC CORPORATION and
PANASONIC CORPORATION OF NORTH
AMERICA,

Defendants

Civil Action No.: 4:19-cv-485-ALM

Jury Trial Demanded

FIRST AMENDED COMPLAINT FOR PATENT INFRINGEMENT

Plaintiff KT Imaging USA, LLC (“KTI” or “Plaintiff”), by way of this Complaint against Defendants Panasonic Corporation (“Panasonic-Japan”) and Panasonic Corporation of North America (“Panasonic-North America”) (collectively “Panasonic” or “Panasonic Defendants”), alleges as follows:

PARTIES

1. Plaintiff KT Imaging USA, LLC is a limited liability company organized and existing under the laws of the State of Texas, having its principal place of business at 106 E 6th Street, Suite 900, Austin, TX 78701.
2. On information and belief, Defendant Panasonic-Japan is a Japanese corporation with an address at 1006 Oaza Kadoma Kadoma-shi Osaka 571-8501 Japan.
3. On information and belief, Defendant Panasonic North-America is a Delaware corporation with its principal place of business at Two Riverfront Plaza, 828 McCarter Highway, Newark, NJ 07102.

JURISDICTION AND VENUE

4. This is an action under the patent laws of the United States, 35 U.S.C. §§ 1, *et seq.*, for infringement by the Panasonic Defendants of claims of U.S. Patent No. 6,876,544; U.S. Patent No. 7,196,322; U.S. Patent No. 8,004,602; U.S. Patent No. 6,590,269 and its Ex Parte Reexamination Certificate; and U.S. Patent No. 8,314,481 (collectively “the Patents-in-Suit”).

5. This Court has subject matter jurisdiction pursuant to 28 U.S.C. §§ 1331 and 1338(a).

6. Panasonic-Japan is subject to personal jurisdiction of this Court because, *inter alia*, on information and belief, (i) Panasonic-Japan has committed and continues to commit acts of patent infringement in the State of Texas, including by making, using, offering to sell, selling, and/or importing the accused products into Texas; (ii) Panasonic-Japan purposefully supplies and directs the accused products for storage, warehousing, and sales by distributors and resellers in the State of Texas; and (iii) Panasonic-Japan delivers its products into the stream of commerce with the expectation that they will be purchased by consumers in the State of Texas. In addition, or in the alternative, this Court has personal jurisdiction over Panasonic-Japan pursuant to Fed. R. Civ. P. 4(k)(2).

7. Panasonic-North America is subject to personal jurisdiction in this Court because, *inter alia*, on information and belief, (i) has committed and continues to commit acts of patent infringement in the State of Texas, including by making, using, offering to sell, selling, and/or importing the accused products into Texas; and (ii) has a regular and established place of business in the State of Texas.

8. Venue is proper as to Panasonic-Japan in this district under 28 U.S.C. § 1391(c) because, *inter alia*, Panasonic-Japan is a foreign corporation.

9. Venue is proper as to Panasonic-North America in this district under 28 U.S.C. §§ 1391(b) and 1400(b) because, *inter alia*, Panasonic is subject to personal jurisdiction in this

judicial district, Panasonic has regularly conducted business in this judicial district, certain of the acts complained of herein occurred in this judicial district, and Panasonic has a regular and established place of business in this judicial district located at 3461 Plano Parkway, The Colony, TX 75056.

BACKGROUND

10. On April 5, 2005, the United States Patent and Trademark Office duly and lawfully issued U.S. Patent No. 6,876,544 (“the ’544 Patent”), entitled “Image Sensor Module and Method for Manufacturing the Same.”
11. On March 27, 2007, the United States Patent and Trademark Office duly and lawfully issued U.S. Patent No. 7,196,322 (“the ’322 Patent”), entitled “Image Sensor Package.”
12. On August 23, 2011, the United States Patent and Trademark Office duly and lawfully issued U.S. Patent No. 8,004,602 (“the ’602 Patent”), entitled “Image Sensor Structure And Integrated Lens Module Thereof.”
13. On July 8, 2003, the United States Patent and Trademark Office duly and lawfully issued U.S. Patent No. 6,590,269, entitled “Package Structure for a Photosensitive Chip.” On June 28, 2011, the United States Patent and Trademark Office duly and lawfully issued an Ex Parte Reexamination Certificate for the ’269 Patent (“the ’269 Patent”).
14. On November 20, 2012, the United States Patent and Trademark Office duly and lawfully issued U.S. Patent No. 8,314,481 (“the ’481 Patent”), entitled “Substrate Structure for an Image Sensor Package and Method for Manufacturing the Same.”
15. KTI is the assignee and owner of the right, title, and interest in and to the Patents-in-Suit, including the right to assert all causes of action arising under said patents and the right to any remedies for infringement of them.

16. Panasonic has infringed and continues to infringe the Patents-in-Suit. For example, as set forth below, the Panasonic Toughpad FZ-G1 tablet, Panasonic Toughbook CF-31 and all other products with substantially similar imaging sensors (“Accused Products”) infringe claims of the Patents-in-Suit.

NOTICE

17. By letter dated June 4, 2019, KTI notified each of the Panasonic Defendants of the existence of the ’544, ’322, and ’602 Patents, and of infringement thereof by Panasonic. KTI’s letter identified an exemplary infringing Panasonic product and an exemplary infringed claim for each of these patents. KTI’s June 4, 2019 letter invited Panasonic to hold a licensing discussion with KTI.

18. The Panasonic Defendants have had notice of the ’269 Patent and the ’481 Patent at least as of the time of filing of this First Amended Complaint.

COUNT I: INFRINGEMENT OF THE ’544 PATENT BY PANASONIC

19. Plaintiff incorporates the preceding paragraphs as if fully set forth herein.

20. On information and belief, Panasonic has infringed the ’544 Patent pursuant to 35 U.S.C. § 271(a), literally or under the doctrine of equivalents, by making, using, offering to sell, selling in the United States or importing into the United States the Accused Products.

21. For example, on information and belief, Panasonic has infringed and continues to infringe at least claim 1 of the ’544 Patent by including an image sensor module to be mounted to a printed circuit board in each of the Accused Products. *See* Ex. 1 (FZ-G1 front-facing camera). The front facing image sensor module in the Accused Products comprises a substrate having an upper surface formed with a plurality of first connection points and a lower surface formed with a plurality of second connection points, which is electrically connected to the printed circuit board. *See* Exs. 1-2 (FZ-G1 front-facing camera). The image sensor module further comprises a

photosensitive chip mounted to the upper surface of the substrate. *See* Ex. 3 (FZ-G1 front-facing camera). The image sensor module further comprises a plurality of wires for electrically connecting the photosensitive chip to the first connection points on the upper surface of the substrate. *See id.* The image sensor module further comprises a frame layer mounted to the upper surface of the substrate to surround the photosensitive chip, an inner edge of the frame layer being formed with an internal thread from top to bottom, and a transparent layer being fixed by the frame layer such that the photosensitive chip may receive optical signals passing through the transparent layer. *See* Exs. 1-2. The image sensor module further comprises a lens barrel formed with a chamber at a center thereof and an external thread at an outer edge thereof, the external thread being screwed to the internal thread of the frame layer, wherein the lens barrel has a through hole and an aspheric lens from top to bottom. *See* Exs. 1-2.

22. On information and belief, Panasonic has induced infringement of the '544 Patent pursuant to 35 U.S.C. § 271(b), by actively and knowingly inducing, directing, causing, and encouraging others, including, but not limited to, its partners, resellers, distributors, customers, and end users, to make, use, sell, and/or offer to sell in the United States, and/or import into the United States, the Accused Products by, among other things, providing the accused products and incorporated image sensor technology, specifications, instructions, manuals, advertisements, marketing materials, and technical assistance relating to the installation, set up, use, operation, and maintenance of said products.

23. On information and belief, Panasonic has committed the foregoing infringing activities without a license.

24. On information and belief, Panasonic knew the '544 Patent existed, knew of an exemplary infringed claim of the '544 Patent, and knew of exemplary infringing Panasonic

products while committing the foregoing infringing acts thereby willfully, wantonly and deliberately infringing the '544 Patent.

COUNT II: INFRINGEMENT OF THE '322 PATENT BY PANASONIC

25. Plaintiff incorporates the preceding paragraphs as if fully set forth herein.

26. On information and belief, Panasonic has infringed the '322 Patent pursuant to 35 U.S.C. § 271(a), literally or under the doctrine of equivalents, by making, using, offering to sell, selling in the United States or importing into the United States the Accused Products.

27. For example, on information and belief, Panasonic has infringed and continues to infringe at least claim 1 of the '322 Patent by including an image sensor module in each of the Accused Products. *See Ex. 1.* The image sensor module in the Accused Products comprises a substrate having an upper surface, and a lower surface on which second electrodes are formed, and a frame layer arranged on the upper surface of the substrate, a cavity formed between the frame layer and substrate, and a plurality of first electrodes are formed on the frame layer. *See Exs. 1-2.* The image sensor module in the Accused Products further comprises a photosensitive chip mounted on the upper surface of the substrate and located within the cavity, and electrically connected to the first electrodes of the frame layer. *See Exs. 1-3.* The image sensor module in the Accused Products further comprises a lens holder having an upper end face, a lower end face, and an opening penetrating through the lens holder from the upper end face to the lower end face, the upper end of the opening formed with an internal thread and the lower end of the opening formed with a breach, so that the internal diameter of the upper end of the opening is smaller than the lower end of the opening, the lens holder adhered on the upper surface of the substrate by glue, wherein, the frame layer is located within the breach of the lens holder. *See Ex. 1.* The image sensor module of the Accused Product further comprises a lens barrel having an upper end face, a lower end face, and an external thread screwed to the internal thread of the lens holder. *See id.*

28. On information and belief, Panasonic has induced infringement of the '322 Patent pursuant to 35 U.S.C. § 271(b), by actively and knowingly inducing, directing, causing, and encouraging others, including, but not limited to, its partners, resellers, distributors, customers, and end users, to make, use, sell, and/or offer to sell in the United States, and/or import into the United States, the Accused Products by, among other things, providing the accused products and incorporated image sensor technology, specifications, instructions, manuals, advertisements, marketing materials, and technical assistance relating to the installation, set up, use, operation, and maintenance of said products.

29. On information and belief, Panasonic has committed the foregoing infringing activities without a license.

30. On information and belief, Panasonic knew the '322 Patent existed, knew of an exemplary infringed claim of the '322 Patent, and knew of exemplary infringing Panasonic products while committing the foregoing infringing acts while committing the foregoing infringing acts, thereby willfully, wantonly and deliberately infringing the '322 Patent.

COUNT III: INFRINGEMENT OF THE '602 PATENT BY PANASONIC

31. Plaintiff incorporates the preceding paragraphs as if fully set forth herein.

32. On information and belief, Panasonic has infringed the '602 Patent pursuant to 35 U.S.C. § 271(a), literally or under the doctrine of equivalents, by making, using, offering to sell, selling in the United States, or importing into the United States the Accused Products.

33. For example, on information and belief, Panasonic has infringed and continues to infringe at least claim 1 of the '602 Patent by including an image sensor structure with an integrated lens module in the Accused Products. *See* Ex. 4 (FZ-G1 rear-facing camera). The image sensor structure in the Accused Products comprises a chip having a plurality of light-sensing elements arranged on a light sensing area of a first surface of the chip, a plurality of first conducting pads

arranged around the light-sensing area and electrically connected to the light-sensing elements, and at least one conducting channel passing through the chip and electrically connected to the first conducting pads at one end as well as extending along with a second surface of the chip. *See Exs. 4-5 (FZ-G1 rear-facing camera).* The image sensor structure in the Accused Products comprises a lens module comprising a holder having a through hole and a contact surface on a bottom of the holder, wherein the contact surface is combined with the first surface, and at least one lens completely embedded inside the through hole and integrated with the holder. *See Ex. 4.*

34. On information and belief, Panasonic has induced infringement of the '602 Patent pursuant to 35 U.S.C. § 271(b), by actively and knowingly inducing, directing, causing, and encouraging others, including, but not limited to, its partners, resellers, distributors, customers, and end users, to make, use, sell, and/or offer to sell in the United States, and/or import into the United States, the Accused Products by, among other things, providing the accused products and incorporated image sensor technology, specifications, instructions, manuals, advertisements, marketing materials, and technical assistance relating to the installation, set up, use, operation, and maintenance of said products.

35. On information and belief, Panasonic has committed the foregoing infringing activities without a license.

36. On information and belief, Panasonic knew the '602 Patent existed, knew of an exemplary infringed claim of the '602 Patent, and knew of exemplary infringing Panasonic products while committing the foregoing infringing acts while committing the foregoing infringing acts, thereby willfully, wantonly and deliberately infringing the '602 Patent.

COUNT IV: INFRINGEMENT OF THE '269 PATENT BY PANASONIC

37. Plaintiff incorporates the preceding paragraphs as if fully set forth herein.

38. On information and belief, Panasonic has infringed the '269 Patent pursuant to 35 U.S.C.

§ 271(a), literally or under the doctrine of equivalents, by making, using, offering to sell, selling in the United States, or importing into the United States the Accused Products.

39. For example, on information and belief, Panasonic has infringed and continues to infringe at least claim 2 of the '269 Patent by including a package structure for a photosensitive chip in each of the Accused Products. *See Ex. 1.* The package structure in the Accused Products comprises a substrate having an upper surface and a lower surface opposite to the upper surface. *See Ex. 2.* The package structure in the Accused Products comprises a frame layer having a first surface and a second surface opposite to the first surface, the frame layer being formed on the substrate with the first surface contacting the upper surface of the substrate, so as to form a cavity together with the substrate. *See Ex. 2.* The package structure in the Accused Products comprises a photosensitive chip placed on the upper surface of the substrate and within the cavity. *See Ex. 1.* The package structure in the Accused Products comprises a plurality of wires for electrically connecting the substrate to the photosensitive chip. *See Ex. 3.* The package structure in the Accused Products comprises a transparent layer arranged on the frame layer to cover the photosensitive chip, wherein the second surface of the frame layer is formed with a depression in which the transparent layer is placed to cover the photosensitive chip. *See Exs. 2 and 6.* The package structure in the Accused Products comprises a plurality of projections each having a suitable height and formed within the depression of the frame layer. *See Exs. 6-7 (FZ-G1 front-facing camera).*

40. On information and belief, Panasonic has induced infringement of the '269 Patent pursuant to 35 U.S.C. § 271(b), by actively and knowingly inducing, directing, causing, and encouraging others, including, but not limited to, its partners, resellers, distributors, customers, and end users, to make, use, sell, and/or offer to sell in the United States, and/or import into the

United States, the Accused Products by, among other things, providing the accused products and incorporated image sensor technology, specifications, instructions, manuals, advertisements, marketing materials, and technical assistance relating to the installation, set up, use, operation, and maintenance of said products.

41. On information and belief, Panasonic has committed the foregoing infringing activities without a license.

COUNT V: INFRINGEMENT OF THE '481 PATENT BY PANASONIC

42. Plaintiff incorporates the preceding paragraphs as if fully set forth herein.

43. On information and belief, Panasonic has infringed the '481 Patent pursuant to 35 U.S.C. § 271(a), literally or under the doctrine of equivalents, by making, using, offering to sell, selling in the United States, or importing into the United States the Accused Products.

44. For example, on information and belief, Panasonic has infringed and continues to infringe at least claim 1 of the '481 Patent by including a substrate structure for an image sensor package in each of the Accused Products. *See* Ex. 8 (CF-31 front facing camera). The substrate structure in the Accused Products comprises a bottom base having an upper surface formed with a plurality of first electrodes, and a lower surface formed with a plurality of second electrodes, wherein an insulation layer is coated between first electrodes and in direct surface contact with the upper surface of the bottom base. *See* Ex. 9 (CF-31 front-facing camera). The substrate structure in the Accused Products comprises a frame layer arranged on and in direct surface contact with the first electrodes and the insulation layer to form a cavity together with the bottom base, wherein the insulation layer is interposed between the bottom base and the frame layer. *See* Exs. 8, 9, and 10 (CF-31 front-facing camera).

45. On information and belief, Panasonic has induced infringement of the '481 Patent pursuant to 35 U.S.C. § 271(b), by actively and knowingly inducing, directing, causing, and

encouraging others, including, but not limited to, its partners, resellers, distributors, customers, and end users, to make, use, sell, and/or offer to sell in the United States, and/or import into the United States, the Accused Products by, among other things, providing the accused products and incorporated image sensor technology, specifications, instructions, manuals, advertisements, marketing materials, and technical assistance relating to the installation, set up, use, operation, and maintenance of said products.

46. On information and belief, Panasonic has committed the foregoing infringing activities without a license.

PRAYER FOR RELIEF

WHEREFORE, KTI prays for judgment in its favor against the Panasonic Defendants for the following relief:

- A. Entry of judgment in favor of KTI against the Panasonic Defendants on all counts;
- B. Entry of judgment that the Panasonic Defendants, jointly and severally, have infringed the Patent-in-Suit;
- C. Entry of judgment that the Panasonic Defendants' infringement of the Patents-in-Suit has been willful;
- D. An order permanently enjoining the Panasonic Defendants from infringing the Patent-in-Suit;
- E. Award of compensatory damages adequate to compensate KTI for the Panasonic Defendants' infringement of the Patent-in-Suit, in no event less than a reasonable royalty trebled as provided by 35 U.S.C. § 284;

- F. Award of reasonable attorneys' fees and expenses against the Panasonic Defendants pursuant to 35 U.S.C. § 285;
- G. KTI's costs;
- H. Pre-judgment and post-judgment interest on KTI's award; and
- I. All such other and further relief as the Court deems just or equitable.

DEMAND FOR JURY TRIAL

Pursuant to Rule 38 of the Fed. R. Civ. Proc., Plaintiff hereby demands trial by jury in this action of all claims so triable.

Dated: November 6, 2019

Respectfully submitted,

/s/ Stafford Davis

Stafford Davis

State Bar No. 24054605

sdavis@stafforddavisfirm.com

Catherine Bartles

State Bar No. 24104849

cbartles@stafforddavisfirm.com

THE STAFFORD DAVIS FIRM, PC

The People's Petroleum Building

102 North College Avenue, 13th Floor

Tyler, Texas 75702

Tel: (903) 593-7000

Fax: (903) 705-7369

Dmitry Kheyfits

dkheyfits@kblit.com

KHEYFITS BELENKY LLP

4 Embarcadero Center, Suite 1400

San Francisco, CA 94111

Tel: 415-429-1739

Fax: 415-429-6347

Andrey Belenky

abelenky@kblit.com

Hanna G. Cohen

hgcohen@kblit.com

KHEYFITS BELENKY LLP
1140 Avenue of the Americas, 9th Floor
New York, NY 10036
Tel: 212-203-5399
Fax: 212-203-5399

*Attorneys for Plaintiff
KT Imaging USA, LLC*