### IN THE UNITED STATES DISTRICT COURT FOR THE EASTERN DISTRICT OF TEXAS MARSHALL DIVISION

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	)	
AUTOBRILLIANCE, LLC,	)	С
	)	
Plaintiff,	)	J
	)	
V.	)	
	)	
HYUNDAI MOTOR GROUP, HYUNDAI	)	
MOTOR COMPANY, and KIA MOTORS	)	
CORPORATION	)	
Defendants.	)	
	)	

Case No.

JURY TRIAL DEMANDED

### **COMPLAINT FOR PATENT INFRINGEMENT**

Plaintiff AutoBrilliance ("AutoBrilliance" or "Plaintiff") for its Complaint against Defendants Hyundai Motor Group, Hyundai Motor Company, and Kia Motors Corporation (collectively "Defendants") alleges as follows:

### THE PARTIES

1. AutoBrilliance is a limited liability company organized and existing under the laws of the State of Texas, with its principal place of business located at 209 East Austin Street, Marshall, Texas 75670.

2. Upon information and belief, Defendant Hyundai Motor Group and Defendant Hyundai Motor Company are Korean corporations, both with their principal place of business located at 12 Heolleung-ro Seocho-gu Seoul 06797, Republic of Korea (South). Upon information and belief, each of Hyundai Motor Group and Hyundai Motor Company does business in Texas and in the Eastern District of Texas, directly or through intermediaries.

3. Upon information and belief, Defendant Kia Motors Company is a Korean corporation with its principal place of business located at 730-7 Mok-dong, Yangcheon-gu Seoul,

Seoul, 07946 Republic of Korea (South). Upon information and belief, Defendant Kia Motors Company does business in Texas and in the Eastern District of Texas, directly or through intermediaries.

### **JURISDICTION**

4. This is an action for patent infringement arising under the patent laws of the United States, 35 U.S.C. §§ 1, *et seq*. This Court has jurisdiction over this action pursuant to 28 U.S.C. §§ 1331 and 1338(a).

5. This Court has personal jurisdiction over Defendants. Defendants regularly conduct business and have committed acts of patent infringement and/or have induced acts of patent infringement by others in this Judicial District and/or have contributed to patent infringement by others in this Judicial District, the State of Texas, and elsewhere in the United States.

6. Venue is proper in this Judicial District pursuant to 28 U.S.C. § 1391 because, among other things, Defendants are not residents in the United States, and thus may be sued in any judicial district pursuant to 28 U.S.C. § 1391(c)(3).

7. Defendants are subject to this Court's jurisdiction pursuant to due process and/or the Texas Long Arm Statute due at least to their substantial business in this State and Judicial District, including (a) at least part of its past infringing activities, (b) regularly doing or soliciting business in Texas, and/or (c) engaging in persistent conduct and/or deriving substantial revenue from goods and services provided to customers in Texas.

### PATENT-IN-SUIT

8. On March 8, 2008, the United States Patent and Trademark Office duly and legally issued U.S. Patent No. 7,337,650 (the "650 Patent") entitled "System and Method for Aligning

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Sensors on a Vehicle". A true and correct copy of the '650 Patent is available at: https://pdfpiw.uspto.gov/.piw?PageNum=0&docid=7337650.

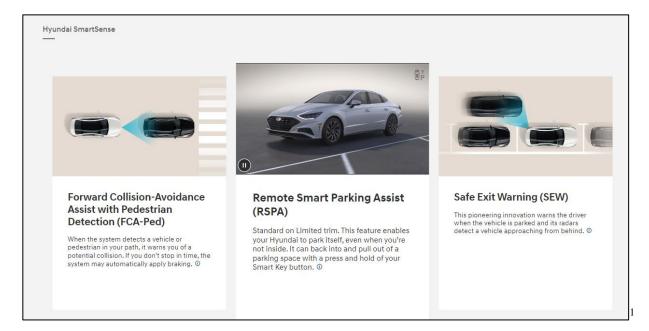
9. AutoBrilliance is the sole and exclusive owner of all right, title, and interest in the '650 Patent (the "Patent-in-Suit") and holds the exclusive right to take all actions necessary to enforce its rights to the Patent-in-Suit, including the filing of this patent infringement lawsuit. AutoBrilliance also has the right to recover all damages for past, present, and future infringement of the Patent-in-Suit and to seek injunctive relief as appropriate under the law.

### FACTUAL ALLEGATIONS

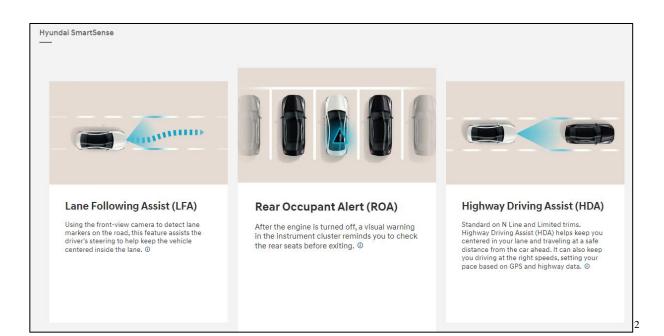
10. The '650 Patent generally discloses systems and methods for automotive vehicle sensor calibration and adjustment. The technology described in the '650 Patent was developed by inventors Dan Alan Preston and David N. Olmstead at Medius Inc. For example, technology covered by at least one claim of the '650 Patent is found in Defendants' automotive vehicles equipped with multiple sensors which establish a vehicle body reference frame, a sensor reference frame, and processor to determine misalignment including, but not limited to, the Hyundai Venue, Hyundai Kona, Hyundai Kona Electric, Hyundai Kona N, Hyundai Santa Cruz, Hyundai Tucson, Hyundai Tucson Hybrid, Hyundai Plug-in Hybrid, Hyundai Santa Fe, Hyundai Santa Fe Hybrid, Hyundai Santa Fe Plug-in Hybrid, Hyundai Palisade, Hyundai Ioniq 5, Hyundai Fuel Cell, Hyundai Ioniq 6, Hyundai Elantra, Hyundai Elantra Hybrid, Hyundai Elantra N, Hyundai Sonata, Hyundai Sonata N, Hyundai Sonata Hybrid, Kia Soul, Kia Seltos, Kia Sportage, Kia Sorento, Kia Carnival MPV, Kia Telluride, Kia Niro, Kia Sportage Hybrid, Kia Miro Plug-in Hybrid, Kia Sorento Hybrid, Kia Sportage Plug-in Hybrid, Kia Niro EV, Kia EV6, Kia Sorento Plug-in Hybrid, Kia Rio, Kia Rio 5-Door, Kia Forte, Kia K5, Kia Stinger, among other automotive vehicles ("Accused Hyundai-Kia Vehicles"). The Accused Hyundai-Kia Vehicles implement the

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technology through the Hyundai SmartSense System and/or Kia Drive Wise System, which implements at least the following technologies: Forward Collision-Avoidance Assist with Pedestrian Detection, Remote Smart Parking Assist, Safe Exit Warning, Lane Following Assist, Highway Driving Assist, Driver Attention Warning, Blind-Spot Collision-Avoidance Assist, Smart Cruise Control with Stop & Go, Forward Collision-Avoidance Assist with Junction Turning, Surround View Monitor, Blind-Spot Collision Warning with Available Blind-Spot View Monitor, Lane Keeping Assist, Rear Cross-Traffic Collision Avoidance Assist, and Low Beam Assist-Dynamic, among other systems:



<sup>&</sup>lt;sup>1</sup> See https://www.hyundaiusa.com/us/en/vehicles/sonata.



Hyundai SmartSense





When you're going in reverse, it lets you know if its sensors detect a vehicle approaching from the left or right. It may even apply the brakes automatically if needed. @



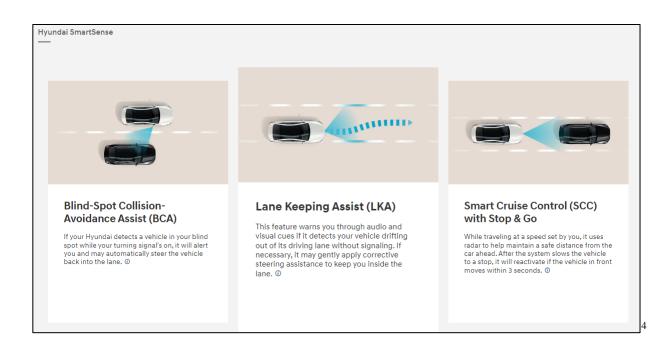
### High Beam Assist (HBA)

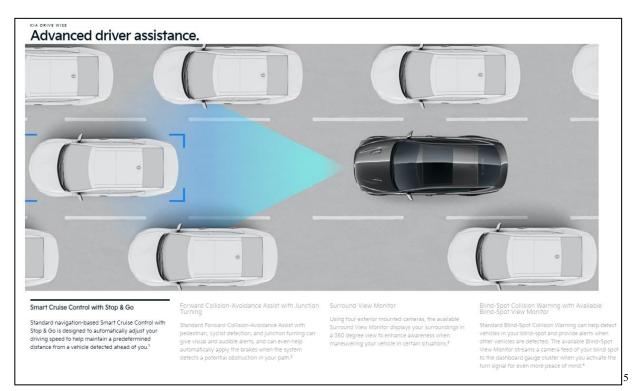
Constantly turning your high beams off and on can be a hassle, which is why this thoughtful feature automatically does it for you. It can detect oncoming vehicles and toggle between high and low beams accordingly.



# Driver Attention Warning (DAW)

To help prevent potential accidents, this system monitors your driving patterns to detect drowsy or inattentive driving. Once detected, it alerts you with a sound cue coupled with a warning message on the instrument cluster. O

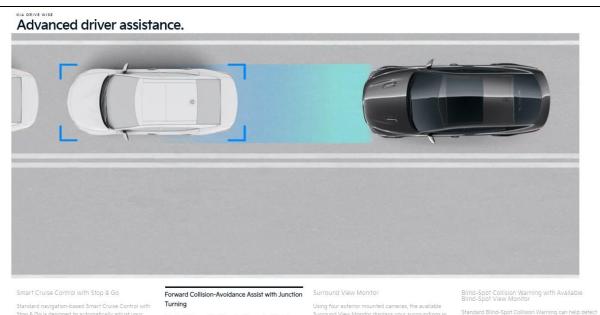




<sup>&</sup>lt;sup>4</sup> *Id*.

<sup>&</sup>lt;sup>5</sup> See <u>https://www.kia.com/us/en/stinger#safety</u>.

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Standard navigation-based Smart Cruise Control with Stop & Go is designed to automatically adjust your driving speed to help maintain a predetermined distance from a vehicle detected ahead of you.<sup>1</sup>

Standard Forward Collision-Avoidance Assist with Standard Forward Counsion-Avoidance Assist with pedestrian, cyclist detection, and junction turning can give visual and audible alerts, and can even help automatically apply the brakes when the system detects a potential obstruction in your path.<sup>2</sup> Using four exterior mounted cameras, the available Surround View Monitor displays your surroundings in a 360 degree view to enhance awareness when maneuvering your vehicle in certain situations.<sup>3</sup>

# vehicles in your blind-spot and provide alerts when other vehicles are detected. The available Blind-Spot View Monitor streams a camera feed of your blind spot

to the dashboard gauge cluster when you activate the turn signal for even more peace of mind.<sup>4</sup>



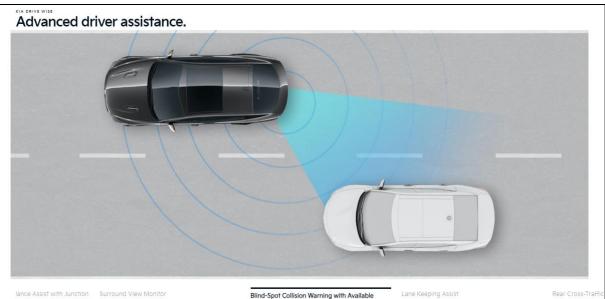
3 Smart Cruise Control with tain a predetermined tected ahead of you.1

Using four exterior mounted cameras, the available Surround View Monitor displays your surroundings in a 360 degree view to enhance awareness when maneuvering your vehicle in certain situations.<sup>3</sup>

Standard Lane Keep Standard Blind-Spot Collision Warning can help detect vehicles in your blind-spot and provide alerts when other vehicles are detected. The available Blind-Spot View Monitor streams a camera feed of your blind spot to the dashboard gauge cluster when you activate the turn signal for even more peace of mind.<sup>4</sup>

<sup>6</sup> *Id*.

 $^{7}$  Id.



n, and junction turning can rts, and can even help akes when the system tion in your path.2

Using four exterior mounted cameras, the available Surround View Monitor displays your surroundings in a 360 degree view to enhance awareness when maneuvering your vehicle in certain situations.<sup>3</sup>

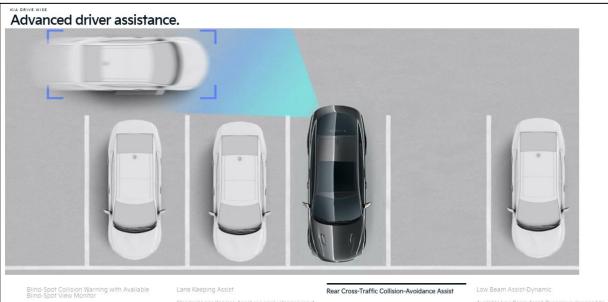
Blind-Spot Collision Warning with Available Blind-Spot View Monitor

Standard Blind-Spot Collision Warning can help detect vehicles in your blind-spot and provide alerts when other vehicles are detected. The available Blind-Spot View Monitor streams a camera feed of your blind spot to the dashboard gauge cluster when you activate the turn signal for even more peace of mind.<sup>4</sup>

Standard Lane Keeping Assist can apply steering input to help maintain course if it defects your Stinger getting too close to lane markers.<sup>8</sup>

even help apply th sensors also alert

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Standard Blind-Spot Collision Warning can help detect vehicles in your blind-spot and provide alerts when other vehicles are detected. The available Blind-Spot

to the dashboard gauge cluster when you activate the turn signal for even more peace of mind.<sup>4</sup>

Standard Lane Keeping Assist can apply steering input to help maintain course if it detects your Stinger getting too close to lane markers.<sup>5</sup>

If a collision is imminent while you're reversing out of your parking spot, standard Rear Cross-Traffic Collision-Avoidance Assist can help alert the driver or even help apply the brakes. Front and rear parking sensors also alert when approaching obstacles.<sup>6</sup>

Available Low Beam Assist-Dynamic is designed to track with your steering angle and vehicle speed to help enhance directional lighting.<sup>7</sup>

<sup>8</sup> Id.

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The Hyundai SmartSense System and the Kia Drive Wise System utilize multiple sensors to establish a vehicle body reference frame, a sensor reference frame, and processor to determine misalignment.

# FORWARD COLLISION – AVOIDANCE ASSIST (FCA) - (SENSOR FUSION)

Forward Collision-Avoidance Assist is designed to detect the vehicle, a pedestrian or cyclist ahead in the roadway through front view camera recognition and front radar signals to warn the driver that a collision is imminent, and if necessary, application of emergency braking.

# 

Take the following precautions when using Forward Collision-Avoidance Assist:

- This Forward Collision-Avoidance Assist is only a supplemental Forward Collision-Avoidance Assist and it is not intended to, nor does it replace the need for extreme care and attention of the driver. The sensing range and objects detectable by the sensors are limited. Pay attention to the road conditions at all times.
- Drive at posted speed limits and accordance to road conditions.
- Always drive cautiously to prevent unexpected and sudden situations from occurring. Forward Collision-Avoidance Assist does not always stop the vehicle completely.

# Forward Collision-Avoidance Assist Settings Setting features



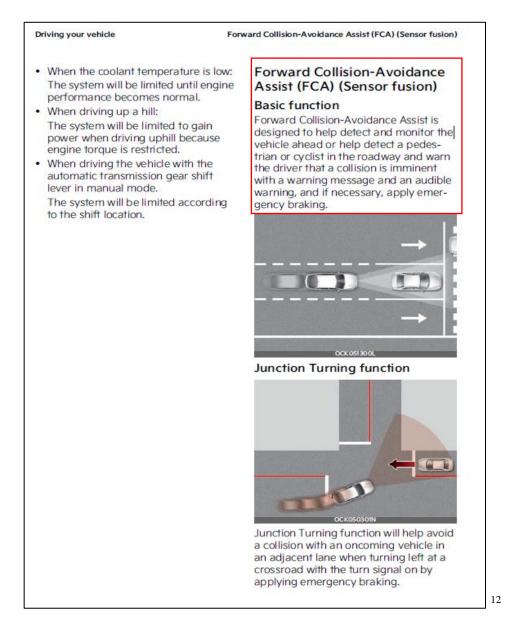
# Forward Safety

The driver can activate Forward Collision-Avoidance Assist by placing the ignition switch to the ON position and by selecting:

'User Settings → Driver Assistance → Forward Safety'

- If you select 'Active Assist', Forward Collision-Avoidance Assist activates. Forward Collision-Avoidance Assist produces warning messages and warning alarms in accordance with the collision risk levels. Braking assist will be applied in accordance with the collision risk.
- If you select 'Warning Only', Forward Collision-Avoidance Assist activates and produces only warning alarms in accordance with the collision risk levels. Braking assist will not be applied in this setting.
- If you select 'Off', Forward Collision-Avoidance Assist deactivates. If you turn the ESC off stage 2, Forward Collision-Avoidance Assist deactivates and the warning light comes on.





<sup>&</sup>lt;sup>11</sup> See <u>https://owners.hyundaiusa.com/content/dam/hyundai/us/myhyundai/manuals/glovebox-manual/2023/sonata-hybrid/2023-Sonata-Hybrid-OM.pdf</u> - 2023 Hyundai Sonata Hybrid Owner's Manual at p. 6-39.

<sup>&</sup>lt;sup>12</sup> See <u>https://manuals.plus/kia/2023-kia-stinger-owners-manual?expand\_article=1</u> – 2023 Kia Stinger Owner's Manual at p. 5-54.



11. Defendants have infringed and are continuing to infringe the Patent-in-Suit by making, using, selling, offering to sell, and/or importing the Accused Hyundai-Kia Vehicles, and by actively inducing others to make, use, sell, offer to sell, and/or import automotive vehicles including, but not limited to, the Accused Hyundai-Kia Vehicles, which are equipped with safety and driver-assistance technologies including, but not limited to, the Hyundai SmartSense System and/or the Kia Drive Wise System, thereby infringing and continuing to infringe the Patent-In-Suit.

<sup>&</sup>lt;sup>13</sup> *Id.* at p. 5-55.

### <u>COUNT I</u> (Infringement of the '650 Patent)

12. Paragraphs 1 through 11 are incorporated by reference as if fully set forth herein.

13. AutoBrilliance has not licensed or otherwise authorized Defendants to make, use, offer for sale, sell, or import any products, including any products that embody any of the claimed inventions of the '650 Patent.

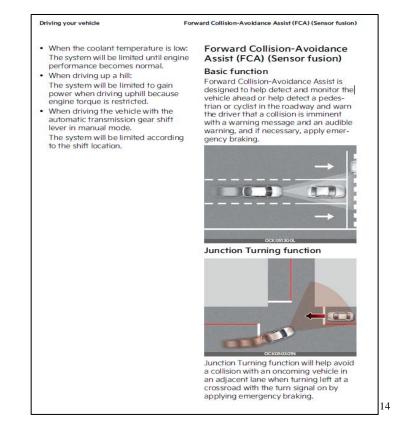
14. Defendants have and continue to directly infringe the '650 Patent, either literally or under the doctrine of equivalents, without authority and in violation of 35 U.S.C. § 271, by making, using, offering to sell, selling, and/or importing into the United States products that satisfy each and every limitation of one or more claims of the '650 Patent. Such products include, but are not limited to, the Accused Hyundai-Kia Vehicles, including the Hyundai Venue, Hyundai Kona, Hyundai Kona Electric, Hyundai Kona N, Hyundai Santa Cruz, Hyundai Tucson, Hyundai Tucson Hybrid, Hyundai Plug-in Hybrid, Hyundai Santa Fe, Hyundai Santa Fe Hybrid, Hyundai Santa Fe Plug-in Hybrid, Hyundai Palisade, Hyundai Ioniq 5, Hyundai Fuel Cell, Hyundai Ioniq 6, Hyundai Elantra, Hyundai Elantra Hybrid, Hyundai Elantra N, Hyundai Sonata, Hyundai Sonata N, Hyundai Sonata Hybrid, Kia Soul, Kia Seltos, Kia Sportage, Kia Sorento, Kia Carnival MPV, Kia Telluride, Kia Niro, Kia Sportage Hybrid, Kia Miro Plug-in Hybrid, Kia Sorento Hybrid, Kia Sportage Plug-in Hybrid, Kia Niro EV, Kia EV6, Kia Sorento Plug-in Hybrid, Kia Rio, Kia Rio 5-Door, Kia Forte, Kia K5, Kia Stinger, among other automotive vehicles, which utilize systems which use multiple sensors which establish a vehicle body reference frame, a sensor reference frame, and processor to determine misalignment including, but not limited to, the Hyundai SmartSense System and/or the Kia Drive Wise System.

15. Defendants have and continue to directly infringe at least claim 1 of the '650 Patent

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by making, using, offering to sell, selling, and/or importing into the United States products, such as the Kia Stinger. The Kia Stinger includes a sensor alignment system for establishing and maintaining accurate alignment of automotive sensors.

16. The Kia Stinger, equipped with the Kia Drive Wise System, comprises a mounted sensor for gathering target data around the vehicle using optical information. The Kia Stinger, equipped with the Kia Drive Wise System, further comprises a micro inertial sensor included with the sensor that measures rotation rate and acceleration along two or more axes of the sensor for the establishment of a sensor reference frame. The Kia Stinger, equipped with the Kia Drive Wise System, further comprises a separate micro inertial sensor mounted on the vehicle that measures rotation rate and acceleration along two or more axes of the vehicle for the establishment of a vehicle body reference. Upon information and belief, the Kia Stinger, equipped with the Kia Drive Wise System, further comprises a processor for determining an amount of misalignment of the sensor reference frame with the vehicle body reference frame and aligning the sensor target data with the vehicle body reference frame according to the amount of misalignment.



# <sup>14</sup> See <u>https://manuals.plus/kia/2023-kia-stinger-owners-manual?expand\_article=1</u> – 2023 Kia Stinger Owner's Manual at p. 5-54.



17. Defendants have and continue to indirectly infringe one or more claims of the '650 Patent by knowingly and intentionally inducing others, including the Defendants' customers and end-users, to directly infringe the Patent-in-Suit, either literally or under the doctrine of equivalents, by making, using, offering to sell, selling, and/or importing into the United States products that include infringing technology.

18. Defendants, with knowledge that these products, or the use thereof, infringe the '650 Patent at least as of the date of this Complaint, knowingly and intentionally induced, and

<sup>&</sup>lt;sup>15</sup> *Id.* at p. 5-55.

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continue to knowingly and intentionally induce, direct infringement of the '650 Patent by providing these products to others, including end-users, for use in an infringing manner.

19. Defendants have induced and continue to induce infringement by others, including end-users, with the intent to cause infringing acts by others or, in the alternative, with the belief that there was a high probability that others, including end-users, infringe the '650 Patent, but while remaining willfully blind to the infringement. Defendants have and continue to induce infringement by its customers and end-users by supplying them with instructions on how to operate the Accused Hyundai-Kia Vehicles in an infringing manner, while also making publicly available information on the Accused Hyundai-Kia Vehicles via Defendants' websites and other publications, including, but not limited to, Owner's Manuals.

20. AutoBrilliance has suffered damages as a result of Defendants' direct and indirect infringement of the '650 Patent in an amount to be proved at trial.

21. AutoBrilliance has suffered, and will continue to suffer, irreparable harm as a result of Defendants' infringement of the '650 Patent, for which there is no adequate remedy at law, unless Defendants' infringement is enjoined by this Court.

#### **DEMAND FOR JURY TRIAL**

Plaintiff hereby demands a jury for all issues so triable.

### PRAYER FOR RELIEF

WHEREFORE, AutoBrilliance prays for relief against Defendants as follows:

a. Entry of judgment declaring that Defendants have directly and/or indirectly infringed one or more claims of the Patent-in-Suit;

b. An order pursuant to 35 U.S.C. § 283 permanently enjoining Defendants, their officers, agents, servants, employees, attorneys, and those persons in active concert or

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participation with them, from further acts of infringement of the Patent-in-Suit;

c. An order awarding damages sufficient to compensate AutoBrilliance for Defendants' infringement of the Patent-in-Suit, but in no event less than a reasonable royalty, together with interest and costs;

d. Entry of judgment declaring that this case is exceptional and awarding AutoBrilliance its costs and reasonable attorney fees under 35 U.S.C. § 285; and

e. Such other and further relief as the Court deems just and proper.

Dated: October 2, 2023

Respectfully submitted,

/s/ John Andrew Rubino John Andrew Rubino NY Bar No. 5020797 Email: jarubino@rubinoip.com Michael Mondelli III NY Bar No. 5805114 Email: mmondelli@rubinoip.com **RUBINO LAW LLC** 51 J.F.K. Parkway Short Hills, NJ, 07078 Telephone: (201) 341-9445 Facsimile: (973) 535-0921

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## ATTORNEYS FOR PLAINTIFF, AUTOBRILLIANCE, LLC