IN THE UNITED STATES DISTRICT COURT
FOR THE EASTERN DISTRICT OF WISCONSIN
MILWAUKEE DIVISION

GENTEX CORPORATION Plaintiff, v. TRAFFIC AND PARKING CONTROL CO., INC. Defendant.	Civil Action No. 2:19-cv-00901 **JURY TRIAL DEMANDED**

COMPLAINT FOR PATENT INFRINGEMENT

Plaintiff Gentex Corporation ("Gentex"), by its undersigned attorneys, demands a trial by jury on all issues so triable and brings this action against Defendant Traffic and Parking Control Co., Inc. ("TAPCO") as follows:

NATURE OF THE ACTION

1. This is a civil action for infringement of U.S. Patent No. 7,148,813 ("the '813 Patent"). A true and correct copy of the '813 Patent is attached hereto as Exhibit A.

THE PARTIES

2. Plaintiff Gentex is a corporation organized under the laws of the State of Michigan, with a principal place of business at 600 N. Centennial St., Zeeland, MI 49464.

3. Upon information and belief, TAPCO is a corporation organized and existing under the laws of the State of Wisconsin, having a principal place of business at 5100 W. Brown Deer Road, Brown Deer, WI 53223.

JURISDICTION AND VENUE

4. This is an action for patent infringement arising under the patent laws of the United States, Title 35 of the United States Code § 100, *et seq*.

5. This Court has jurisdiction over the subject matter of this action pursuant to 28 U.S.C. §§ 1331, 1338(a).

6. Venue is proper in this Judicial District under 28 U.S.C. § 1400(b) because TAPCO is incorporated in this Judicial District, has committed acts of patent infringement complained of herein in this Judicial District, and has a regular and established place of business in this Judicial District.

7. This Court has personal jurisdiction over TAPCO because TAPCO's principal place of business is located in this Judicial District and TAPCO regularly conducts business in this Judicial District. TAPCO has purposefully availed itself of the privilege of conducting activities within this Judicial District. TAPCO's activities in this Judicial District are continuous and systematic and give rise to the liabilities sued upon herein. More specifically, upon information and belief, TAPCO's activities in this Judicial District include, *inter alia*, making, selling, and offering to sell infringing products in this Judicial District, and marketing and advertising infringing products in this Judicial District. Upon information and belief, TAPCO does extensive business within the State of Wisconsin and earns substantial amounts of revenue through its contacts with this Judicial District. These activities far exceed the minimum requisite contacts.

GENTEX AND ITS INNOVATIONS

8. Founded in 1974, Gentex is a leading supplier of products for the global automotive, aerospace, and fire protection industries. Gentex's core competencies and products are quickly enabling new innovation in industries focused on convenience, security, safety, and mobility.

9. In 2018, Gentex held over 500 United States patents covering various innovations in the automotive industry. The '813 Patent is one such patent.

10. The '813 Patent, titled "Light Emitting Traffic Sign Having Vehicle Sensing Capabilities," was duly and legally issued on December 12, 2006, to inventor Frederick T. Bauer. Gentex is the owner of all right, title, and interest in the '813 Patent.

11. The '813 Patent is subject to a 369-day patent term adjustment, which sets the effective date of expiration as March 23, 2024.

12. The '813 Patent relates generally to a traffic system for alerting a driver of a motor vehicle to a traffic sign. The traffic system comprises a sensor, a light source, and a control unit conjunctively arranged to alert a motor vehicle operator when the system detects that the motor vehicle is not acting in conformance with a traffic sign. This novel arrangement is exemplified in, for example, independent claims 24 and 33.

13. Figure 2 of the '813 Patent illustrates an embodiment of the '813 Patent.

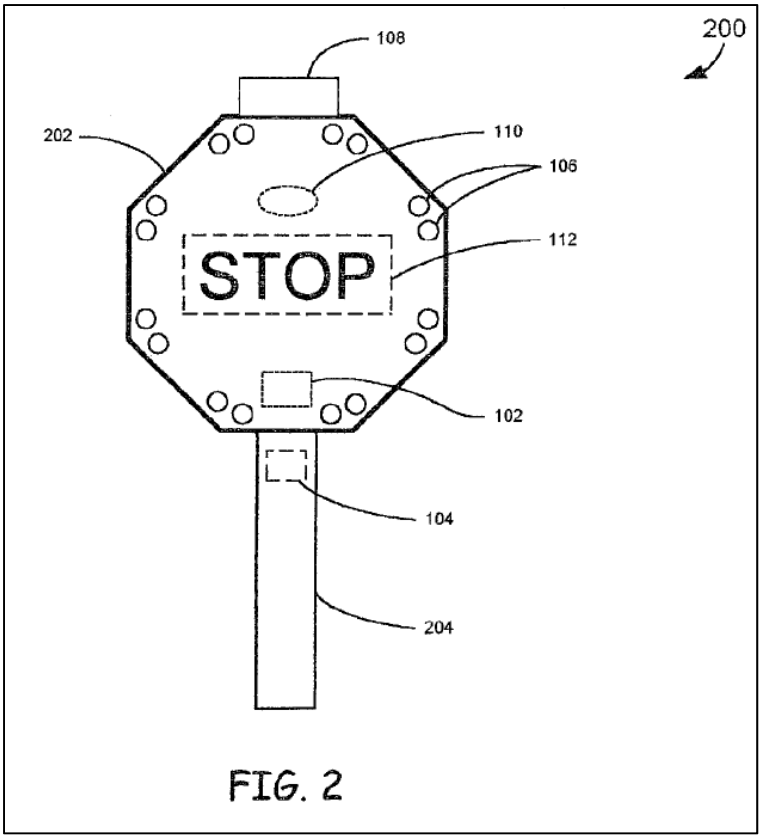


FIG. 2

14. The ’813 Patent overcomes the shortcomings of prior illuminated traffic systems through incorporating intelligent alert features. For example, the ’813 Patent describes one such intelligent feature: “According to one embodiment of the present invention, a driver approaching a sign is not alerted if their vehicle is performing in accordance with the sign. If, for instance, a driver’s speed is within prescribed limits and a sensor indicates that a vehicle is slowing properly for a stop sign, then there is little reason to flash lights or otherwise distract a driver who obviously sees the stop sign. By the same token, if a vehicle is traveling within specified limits on a highway, there is little reason to use emitted light to draw a driver’s attention to a speed limit sign that the driver is obviously obeying. The idea is to avoid alerting a driver when all is okay.” ’813 Patent at 2:61-3:5.

15. The intelligent features of '813 Patent "also conserve[] energy and preserve[] a driver's piece of mind, avoiding nuisance warnings when there is no need." '813 Patent at 3:6-7. Thus, the '813 Patent addresses the shortcomings of other traffic systems at the time.

TAPCO'S INFRINGEMENT

16. Through its website, https://www.tapconet.com/store, catalogs, and other methods of distribution, TAPCO markets, offers for sale and sells products it manufactures, as well as products manufactured by others.

17. TAPCO manufactures, offers for sale, sells, distributes, installs, and services traffic systems, including various Intelligent Warning Systems.

18. Upon information and belief, the Intelligent Warning Systems include TAPCO's own BlinkerStop® products (e.g., BlinkerStop® Flashing LED STOP Sign R1-1), TAPCO's own BlinkerSign® products (e.g., BlinkerSign® Flashing LED Railroad Crossing (Symbol) Sign W10-1, BlinkerSign® Flashing LED WRONG WAY Sign R5-1A, BlinkerSign® Flashing LED YIELD Sign R1-2, BlinkerSign® Flashing LED SPEED LIMIT Sign R2-1, BlinkerSign® Flashing LED Stop Ahead (Symbol) Sign W3-1, BlinkerSign® Flashing Signal Ahead Sign W3-3, BlinkerSign® LED Bike Lane (Symbol) Sign W11-1, BlinkerSign® LED School Crossing (Symbol) Sign S1-1, BlinkerSign® Flashing LED Pedestrian Crossing (Symbol) Sign W11-2, Flashing LED Curve Warning BlinkerSign®, Vehicle Clearance LED BlinkerSign®, and Flashing Railroad Crossing LED BlinkerSign®), TAPCO's own BlinkerBeacon™ Solar Flashing LED Beacon, TAPCO's own BlinkerChevron™ Dynamic Curve Warning Systems, and TAPCO's own Emergency Warning Solutions.

19. Upon information and belief, the Intelligent Warning Systems also include Radar Feedback Signs manufactured by others but offered for sale, sold, and installed by TAPCO, including, for example, SafePace® 100, SafePace® 250, SafePace® 450, SafePace® 475, SafePace® 550, SafePace® 600, SafePace® 625, SafePace® 700, SafePace® 800, SafePace® Evolution 11, SafePace® Evolution 12, Fast-275, Fast-350, Fast-400, Fast-475, Fast-650, Fast-820, Fast-3450, and Fast-3350.

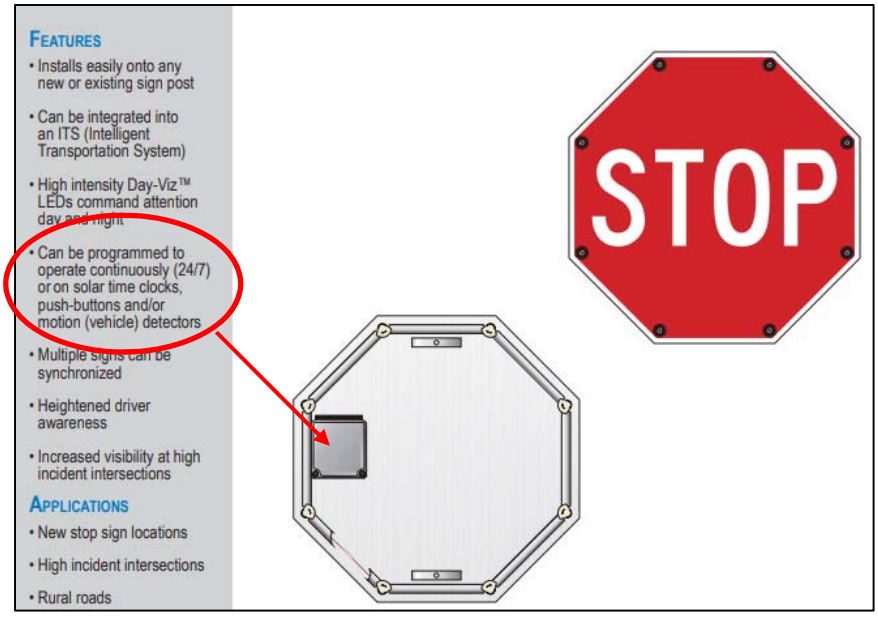
20. TAPCO offers the above-identified Intelligent Warning Systems with various activation modes, including radar-based vehicle detection.

21. One example of the Intelligent Warning Systems made, offered for sale and sold by TAPCO is the radar-enabled BlinkerStop® Flashing LED STOP Sign R1-1 ("BlinkerStop System").

22. The BlinkerStop System features a BlinkerStop® LED Stop Sign, which features surrounding LEDs that illuminate based on programming.

(https://www.tapconet.com/solar-led-division/flashing-led-stop-sign-blinkerstop?di=caab&so=daab)

23. The BlinkerStop System features a programmable control unit.



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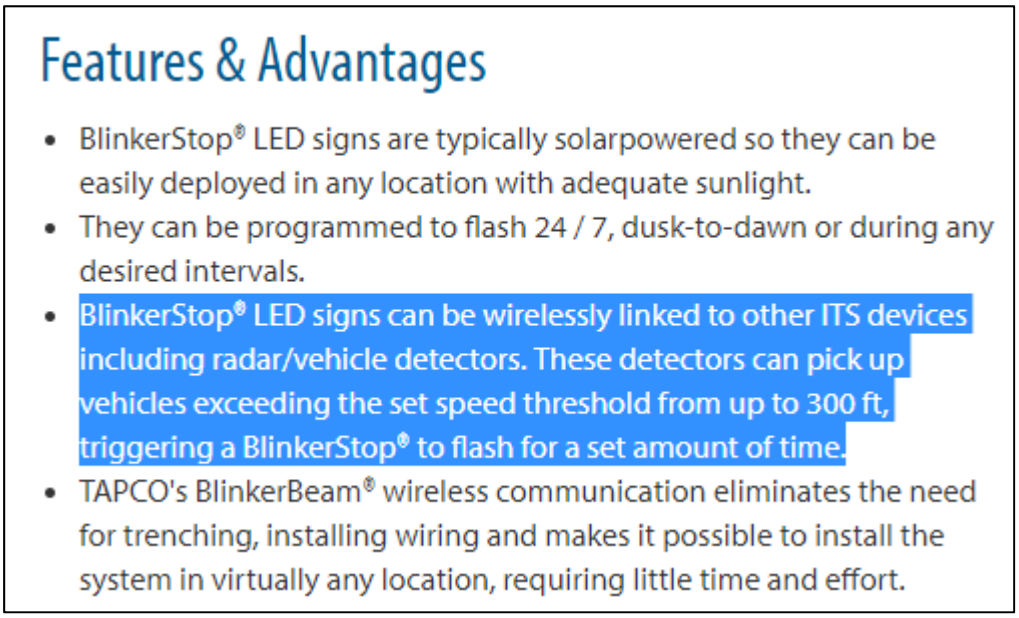
24. BlinkerStop System features a radar detector or sensor that detects the speed of a moving vehicle.



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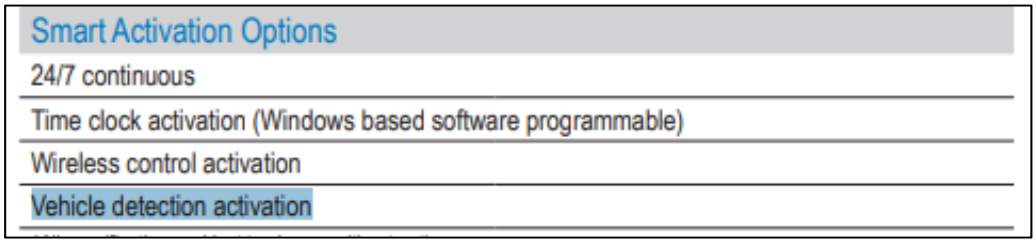

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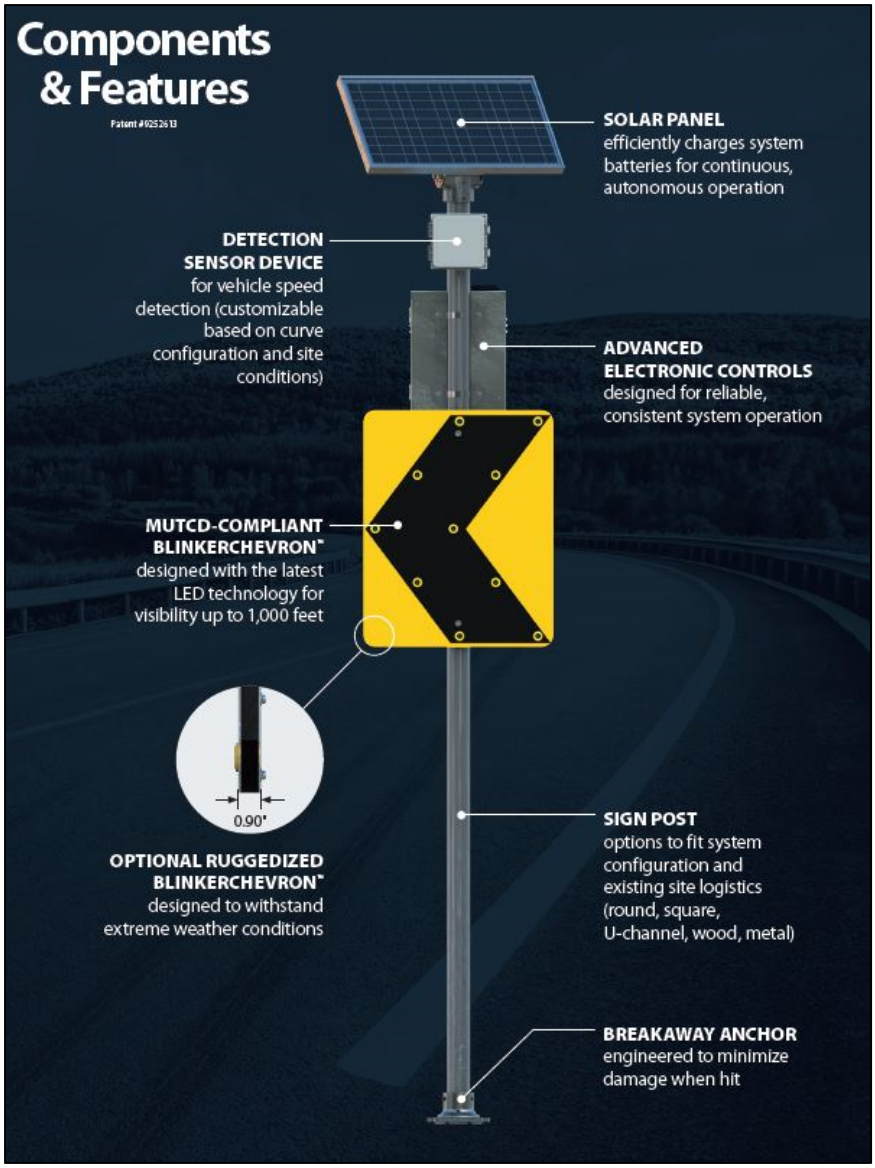
25. Upon information and belief, the BlinkerStop System is programmed such that the LEDs are illuminated only when an approaching vehicle's speed exceeds a certain threshold such that the vehicle is not likely to stop in conformity with the sign.

26. A second example of the Intelligent Warning Systems offered for sale and sold by TAPCO are TAPCO's Curve Warning Solutions, including the BlinkerChevron™ Dynamic Curve Warning System ("BlinkerChevron System").

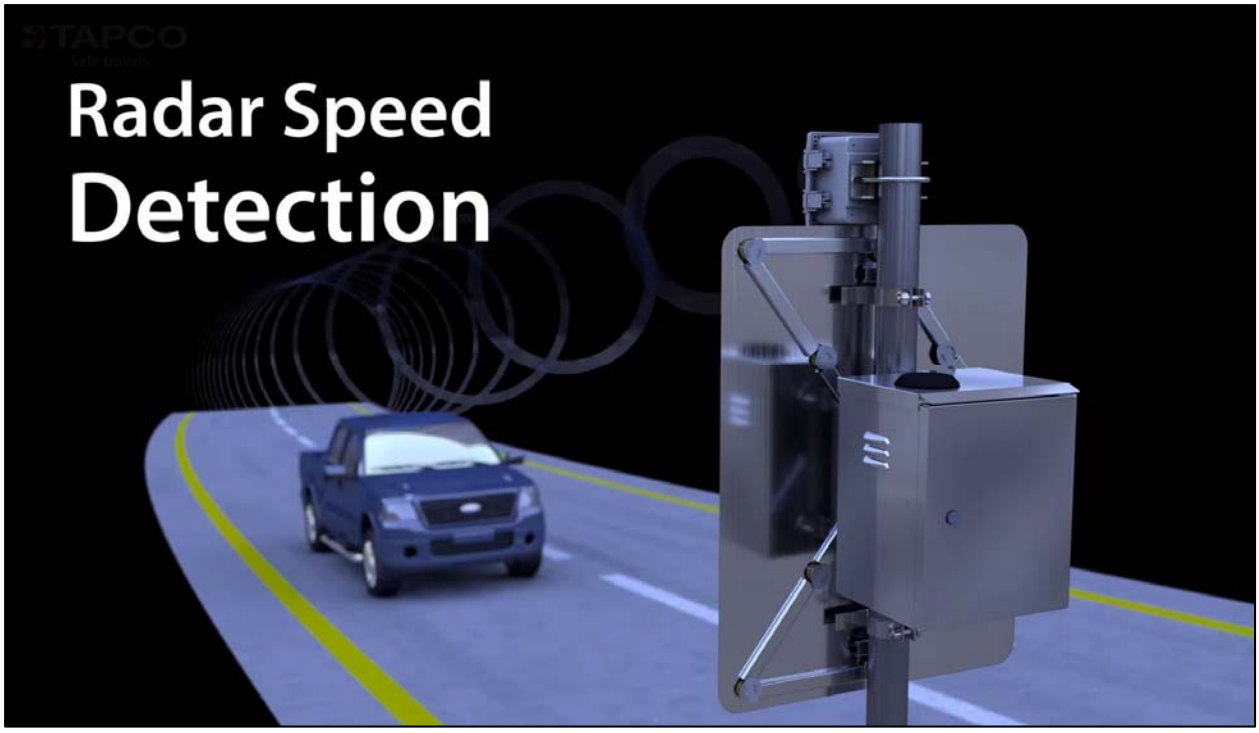
27. Upon information and belief, the BlinkerChevron System is manufactured by TAPCO.

28. The BlinkerChevron System features one or more Day-Viz® LED enhanced solar powered chevron signs, each of which features LEDs arranged in chevron formation, which are activated according to a program.



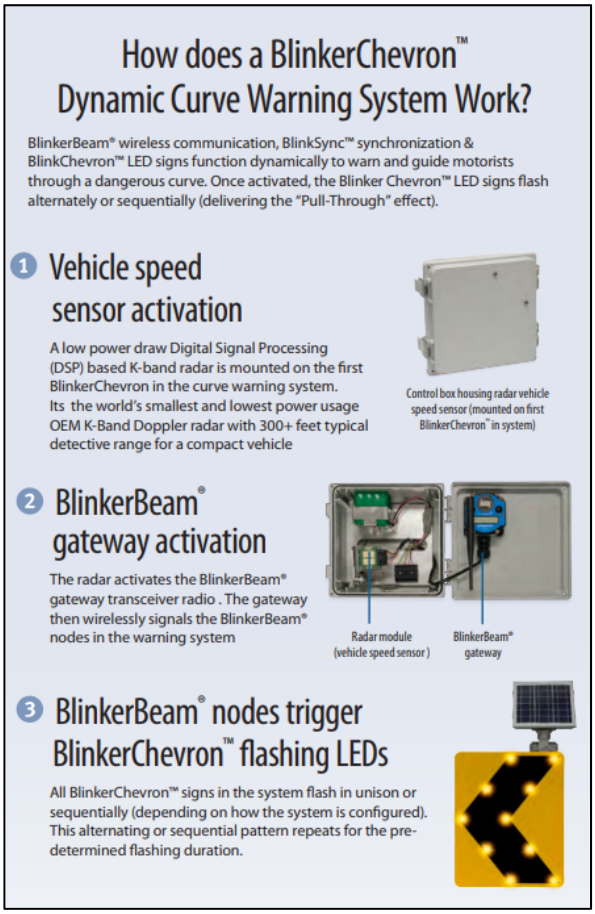
29. The BlinkerChevron System features a programmable control unit, such as the BlinkerBeam® wireless controller.

30. The BlinkerChevron System features an ultra-low power radar to detect and flash one or more chevron signs.



31. According to TAPCO, "Speed detection is the most popular option to activate the system. If a vehicle is traveling too fast for the curve, the system activates, alerting the driver to the dangerous curve ahead."

32. TAPCO provides its customers and prospective customers with brochures explaining how the BlinkerChevron System works, as depicted to the right.



33. Additional examples of the Intelligent Warning Systems offered for sale and sold by TAPCO include BlinkerRadar™ Driver Feedback Systems.

34. Upon information and belief, the BlinkerRadar Driver Feedback Systems are manufactured by TAPCO.

35. The BlinkerRadar Driver Feedback Systems feature speed-related signs, such as a traditional Speed Limit sign or a School Speed Limit Sign.

36. The BlinkerRadar Driver Feedback Systems feature surrounding LEDs and an LED display that illuminate based on programming.

37. The BlinkerRadar Driver Feedback Systems feature a programmable control unit.

38. The BlinkerRadar Driver Feedback Systems feature a radar detector.

39. According to TAPCO, "BlinkerRadar systems combine driver feedback signs with warning alerts to provide an added level of speed awareness in school zones and problem areas."

40. Upon information and belief, BlinkerRadar Driver Feedback systems are programmed to, for example, flash surrounding LEDs in response to an approaching vehicle's detected speed, when the detected speed exceeds an established threshold, such that it is determined the vehicle is not likely to proceed in conformity with the identified legal or advisory speed limit.

41. Upon information and belief, TAPCO has had actual knowledge of the '813 Patent since at least as early as March 8, 2019, when it received a letter from Gentex identifying the '813 Patent and providing claim charts mapping exemplary models of TAPCO's Intelligent Warning Systems to claims 24 and 33 of the '813 Patent.

CAUSE OF ACTION
INFRINGEMENT OF U.S. PATENT NO. 7,148,813
(35 U.S.C. § 271)

42. Plaintiff incorporates the foregoing allegations as if fully realleged and restated herein.

43. Upon information and belief, the '813 Patent is valid and enforceable.

44. Upon information and belief, in violation of 35 U.S.C. § 271(a), TAPCO has directly infringed and continues to directly infringe the '813 Patent, literally and/or under the doctrine of equivalents, by making, selling, offering for sale, and/or importing relevant configurations of the Intelligent Warning Systems in the United States in satisfaction of the elements of one or more claims of the '813 Patent.

45. Relevant configurations of the BlinkerStop System are exemplary of the infringing Intelligent Warning Systems.

46. Exemplary independent Claim 24 of the ’813 Patent recites the following:

[Preamble] A traffic control device for a stop sign, the device comprising:

[1] a sensor for providing a motor vehicle detection signal;

[2] at least one light source;

[3] a control unit coupled to the sensor and the at least one light source,

[4] the control unit periodically illuminating the at least one light source responsive to the motor vehicle detection signal when the detected motor vehicle is not acting in conformance with a stop sign,

[5] wherein illumination associated with said traffic sign is unaffected by the detected motor vehicle when the detected motor vehicle is likely to act in conformance with said stop sign.

47. Upon information and belief, TAPCO makes, sells, and/or offers for sale the traffic control device for a stop sign of Claim 24.

’813 Patent, Claim 24 Preamble

48. The Preamble of exemplary Claim 24 of the ’813 Patent reads as follows: “A traffic control device for a stop sign, the device comprising:”.

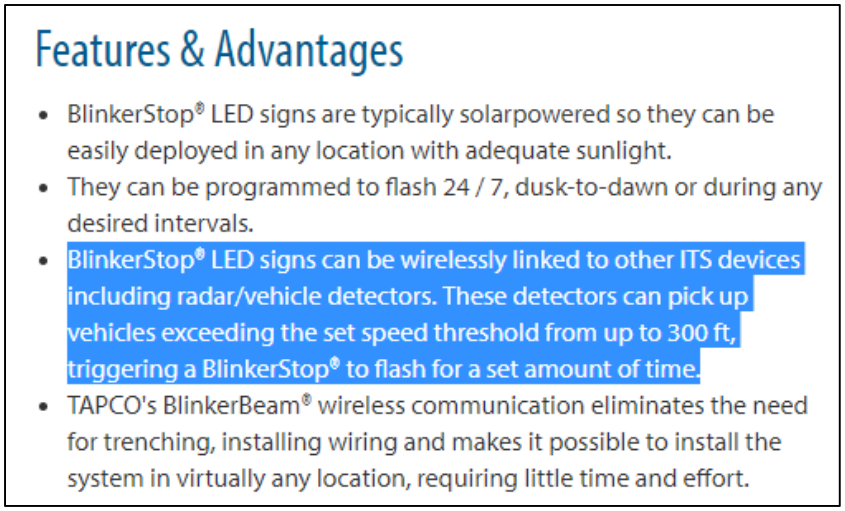
49. Upon information and belief, and to the extent the Preamble is determined to be a limitation of the claim, the BlinkerStop System is a traffic control device for a stop sign in satisfaction of the Preamble of Claim 24 of the ’813 Patent.

(https://www.tapconet.com/solar-led-division/flashing-led-stop-sign-blinkerstop?di=caab&so=daab)

'813 Patent, Claim 24 [1]

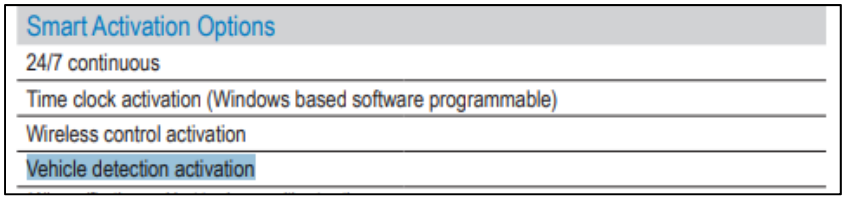
50. Element 1 of exemplary Claim 24 of the '813 Patent reads as follows: "a sensor for providing a motor vehicle detection signal."

51. Upon information and belief, relevant configurations of the BlinkerStop System satisfy element 1 of Claim 24 of the '813 Patent. For example, relevant configurations of the BlinkerStop System comprise radar/vehicle detectors that sense an approaching vehicle's speed.



Features & Advantages

- BlinkerStop® LED signs are typically solarpowered so they can be easily deployed in any location with adequate sunlight.
- They can be programmed to flash 24 / 7, dusk-to-dawn or during any desired intervals.
- BlinkerStop® LED signs can be wirelessly linked to other ITS devices including radar/vehicle detectors. These detectors can pick up vehicles exceeding the set speed threshold from up to 300 ft, triggering a BlinkerStop® to flash for a set amount of time.
- TAPCO's BlinkerBeam® wireless communication eliminates the need for trenching, installing wiring and makes it possible to install the system in virtually any location, requiring little time and effort.

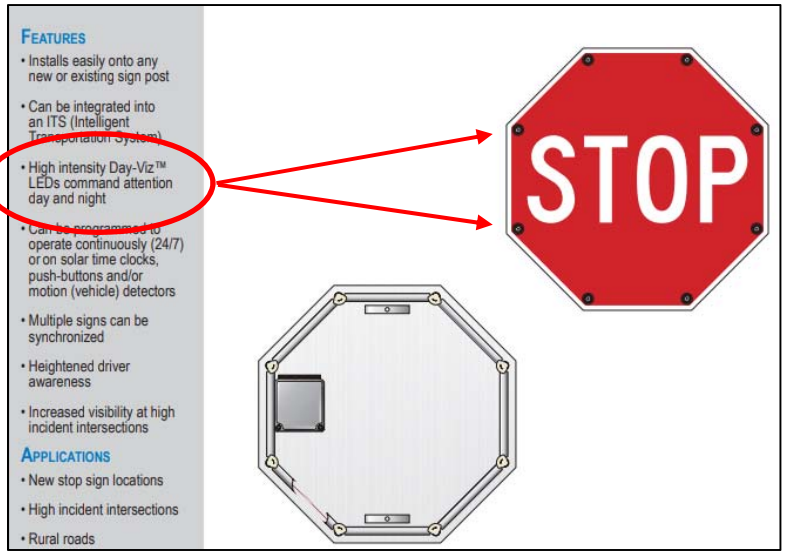


Smart Activation Options
24/7 continuous
Time clock activation (Windows based software programmable)
Wireless control activation
Vehicle detection activation

'813 Patent, Claim 24 [2]

52. Element 2 of exemplary Claim 24 of the '813 Patent reads as follows: "at least one light source."

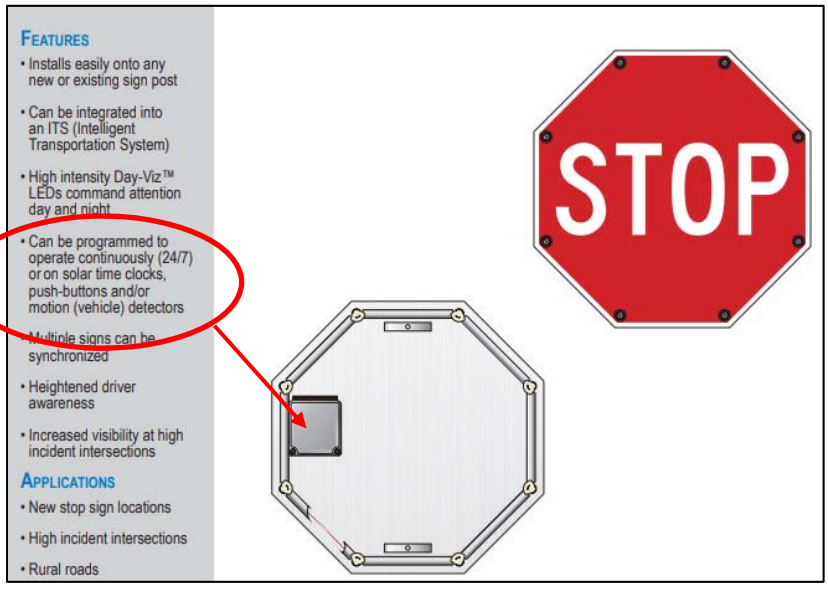
53. Upon information and belief, the BlinkerStop System satisfies element 2 of Claim 24 of the '813 Patent. For example, the BlinkerStop System comprises eight LED light sources.



'813 Patent, Claim 24 [3]

54. Element 3 of exemplary Claim 24 of the '813 Patent reads as follows: "a control unit coupled to the sensor and the at least one light source."

55. Upon information and belief, relevant configurations of the BlinkerStop System satisfies element 3 of Claim 24 of the '813 Patent. For example, relevant configurations of the BlinkerStop System comprise a programmable device that is coupled to the radar/vehicle detector and the eight LEDs.



'813 Patent, Claim 24 [4]

56. Element 4 of exemplary Claim 24 of the '813 Patent reads as follows: "the control unit periodically illuminating the at least one light source responsive to the motor vehicle detection signal when the detected motor vehicle is not acting in conformance with a stop sign."

57. Upon information and belief, relevant configurations of the BlinkerStop System satisfies element 4 of Claim 24 of the '813 Patent. For example, relevant configurations of the BlinkerStop System comprise a programmable device that triggers the eight LED light sources, when the radar/vehicle detector detects a vehicle exceeding the set speed threshold, and thus not likely to stop at the sign. In certain relevant configurations of the BlinkerStop System, the programmable device triggers the eight LED light sources at multiple frequencies based on multiple speed thresholds.

'813 Patent, Claim 24 [5]

58. Element 5 of exemplary Claim 24 of the '813 Patent reads as follows: "wherein illumination associated with said traffic sign is unaffected by the detected motor vehicle when the detected motor vehicle is likely to act in conformance with said stop sign."

59. Upon information and belief, relevant configurations of the BlinkerStop System satisfies element 5 of Claim 24 of the '813 Patent. For example, relevant configurations of the BlinkerStop System are programmed such that the LED light sources are not activated when the vehicle approaching is not exceeding a set speed threshold and is therefore likely to stop.

60. Relevant configurations of the BlinkerChevron System further exemplify the infringing Intelligent Warning Systems.

61. Exemplary independent Claim 33 of the ’813 Patent recites the following:

[Preamble] A traffic sign for motor vehicles, the sign comprising:

[1] a detector for monitoring the motion of an approaching vehicle; and

[2] a light source coupled to the detector;

[3] wherein the light source provides a light warning signal when an approaching vehicle is unlikely to perform in accordance with a purpose of the traffic sign, and

[4] wherein illumination associated with said traffic sign is unaffected by the detected motor vehicle when the detected motor vehicle is likely to act in conformance with said traffic sign.

62. Upon information and belief, TAPCO makes, sells, and/or offers for sale the traffic sign for motor vehicles of Claim 33.

’813 Patent, Claim 33 Preamble

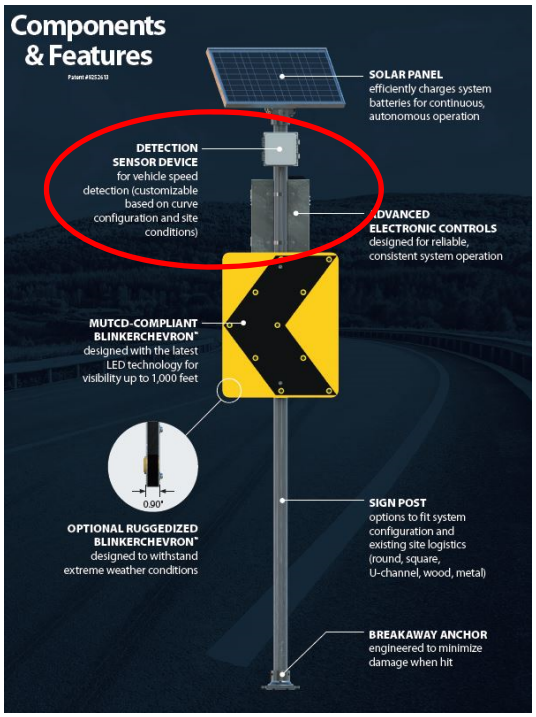
63. The Preamble of exemplary Claim 33 of the ’813 Patent reads as follows: “A traffic sign for motor vehicles, the sign comprising:”.

64. Upon information and belief, and to the extent the Preamble is determined to be a limitation of the claim, the BlinkerChevron System is a traffic sign for motor vehicles in satisfaction of the Preamble of Claim 33 of the ’813 Patent.

'813 Patent, Claim 33 [1]

65. Element 1 of exemplary Claim 33 of the '813 Patent reads as follows: "a detector for monitoring the motion of an approaching vehicle."

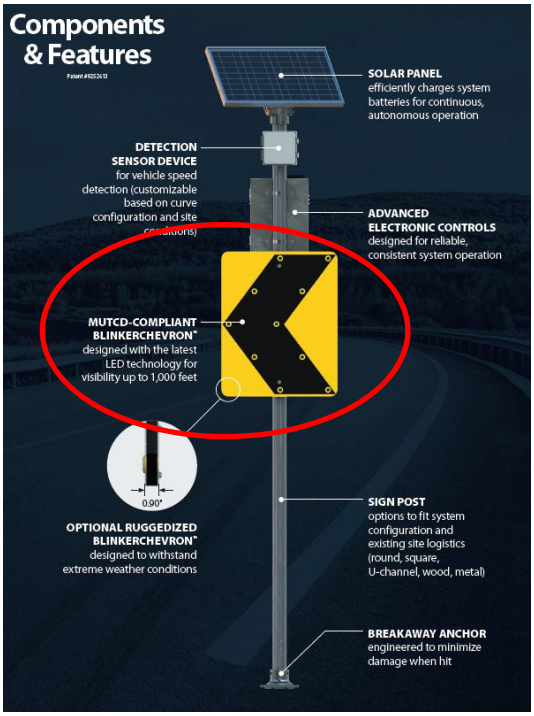
66. Upon information and belief, the BlinkerChevron System satisfies element 1 of Claim 33 of the '813 Patent. Specifically, relevant configurations of the BlinkerChevron System comprise an ultra-low power radar for monitoring the motion of an approaching vehicle.



'813 Patent, Claim 24 [2]

67. Element 2 of exemplary Claim 33 of the '813 Patent reads as follows: "a light source coupled to the detector."

68. Upon information and belief, the BlinkerChevron System satisfies element 2 of Claim 33 of the '813 Patent. Specifically, the BlinkerChevron System comprises ten LED light sources coupled to the radar detector.



'813 Patent, Claim 33 [3]

69. Element 3 of exemplary Claim 33 of the '813 Patent reads as follows: "wherein the light source provides a light warning signal when an approaching vehicle is unlikely to perform in accordance with a purpose of the traffic sign."

70. Upon information and belief, relevant configurations of the BlinkerChevron System satisfy element 3 of Claim 33 of the '813 Patent. Specifically, relevant configurations of the BlinkerChevron System are programmed such that the ten LED light sources are activated to alert the driver of an approaching vehicle when a speed threshold is exceeded such that the vehicle is unlikely to safely follow a curve in the road in accordance with the purpose of the chevron sign.

71. According to TAPCO, "Speed detection is the most popular option to activate the system. If a vehicle is traveling too fast for the curve, the system activates, alerting the driver to the dangerous curve ahead."

'813 Patent, Claim 33 [4]

72. Element 4 of exemplary Claim 33 of the '813 Patent reads as follows: "wherein illumination associated with said traffic sign is unaffected by the detected motor vehicle when the detected motor vehicle is likely to act in conformance with said traffic sign."

73. Upon information and belief, relevant configurations of the BlinkerChevron System satisfy element 4 of Claim 33 of the '813 Patent. Specifically, relevant configurations of the BlinkerChevron System are programmed such that the LED light sources are not activated when the vehicle approaching is not exceeding a set speed threshold and is therefore deemed likely to follow the curve in the road indicated by the chevron sign.

74. TAPCO has indirectly infringed and is still indirectly infringing the '813 Patent in violation of 35 U.S.C. § 271(b) by actively inducing infringement of the '813 Patent.

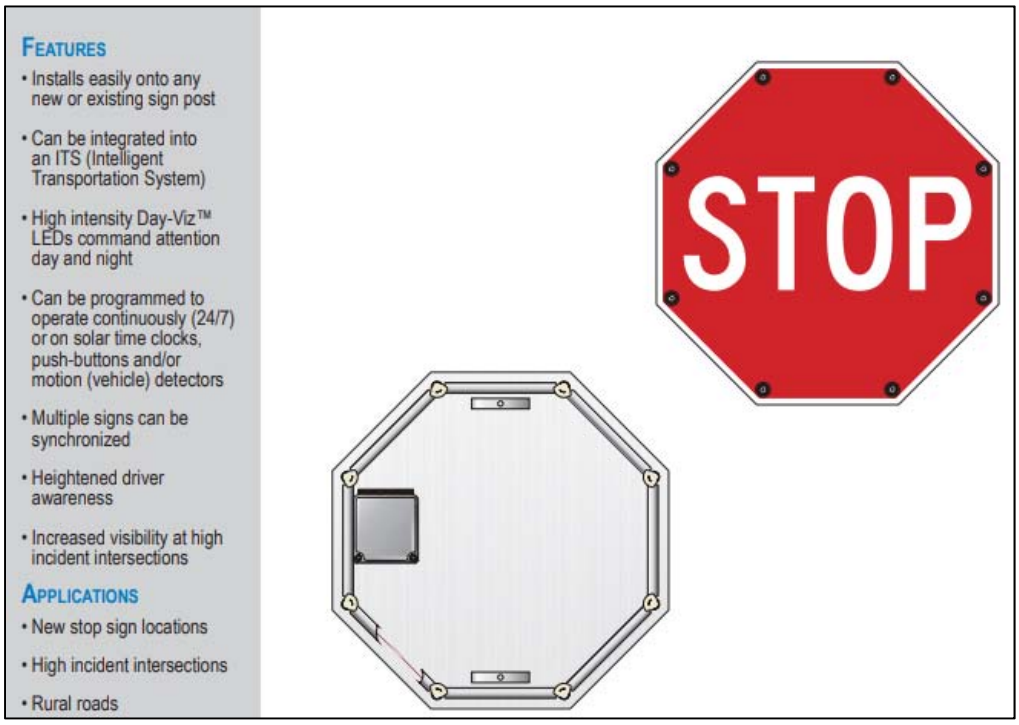
75. TAPCO, with knowledge that relevant configurations of the Intelligent Warning Systems satisfy one or more claims of the '813 Patent, has induced and continues to induce its customers to directly infringe the '813 Patent by, for example, specifically instructing such customers to make and use relevant configurations of the Intelligent Warning Systems in satisfaction of one or more claims of the '813 Patent, including Claims 24 and 33, in the manner described herein.

76. As detailed above, TAPCO has had active knowledge of the '813 Patent since at least as early as March 8, 2019. Accordingly, TAPCO has known or should have known that

relevant configurations of the Intelligent Warning Systems satisfy one or more claims of the ’813 Patent since no later than March 8, 2019.

77. Despite knowledge that relevant configurations of the Intelligent Warning Systems satisfy one or more claims of the ’813 Patent, TAPCO continues to take numerous active steps to encourage and aid and abet its customers’ direct infringement of the ’813 Patent, including to make and use the claimed systems in an infringing manner as described above.

78. Upon information and belief, TAPCO’s product marketing materials, including its website encourage its customers to set up, install, and use relevant configurations of the Intelligent Warning Systems.



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79. Upon information and belief, TAPCO has engaged in the above instructions to its customers even after knowing of the ’813 Patent.

80. Gentex will be substantially and irreparably harmed if TAPCO is not enjoined from infringing the ’813 Patent.

81. Gentex has been and continues to be injured and damaged monetarily and otherwise by TAPCO’s infringement of the ’813 Patent in violation of 35 U.S.C. § 271. TAPCO is therefore liable to Gentex for the damages suffered by Gentex.

82. By this action, Gentex seeks recovery of its damages pursuant to 35 U.S.C. § 284, including, without limitation, lost profits and a reasonable royalty.

83. Upon information and belief, TAPCO’s infringement of the ’813 Patent has been and continues to be willful, entitling Gentex to increased damages under 35 U.S.C. § 284 and to attorneys’ fees and costs incurred in prosecuting this action under 35 U.S.C. § 285.

PRAYER FOR RELIEF

WHEREFORE, Gentex prays for judgment against Defendant, and respectfully requests the following relief:

1. A judgment that Defendant has directly infringed and/or is directly infringing one or more claims of the ’813 Patent;

2. A judgment that Defendant has indirectly infringed and/or is indirectly infringing one or more claims of the ’813 Patent;

3. Entry of a permanent injunction enjoining Defendant, its officers, agents, servants, employees, and those persons acting in active concert or participation with all or any of them from further direct and/or indirect infringement of the ’813 Patent;

4. An award of damages or other monetary relief, including but not limited to, costs and pre-and post-judgment interest, to Gentex;

5. A declaration that Defendant's infringement is willful and deliberate and an increase to the award of damages of three times the amount found or assessed by the Court, pursuant to 35 U.S.C. § 284; and

6. Such other and further relief as the Court deems just and appropriate, including but not limited to, a determination that this is an exceptional case pursuant to 35 U.S.C. § 285 and an award of attorneys' fees and costs to Gentex in this action.

JURY DEMAND

Pursuant to Rule 38 of the Federal Rules of Civil Procedure, Plaintiff demands a jury trial as to all matters so triable.

Respectfully submitted,

S/*Nicole M. Jantzi*

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June 19, 2019