

UNITED STATES PATENT AND TRADEMARK OFFICE

BEFORE THE PATENT TRIAL AND APPEAL BOARD

MERCEDES-BENZ USA, LLC and
MERCEDES-BENZ U.S. INTERNATIONAL, INC.,

Petitioner

v.

VELOCITY PATENT LLC,

Patent Owner

Inter Partes Review of U.S. Patent No. 5,954,781
Patent Issue Date: September 21, 1999
Patent Title: Method and Apparatus for Optimizing Vehicle Operation
Case IPR No.: *To Be Assigned*

**PETITION FOR *INTER PARTES* REVIEW OF U.S. PATENT NO. 5,954,781
UNDER 35 U.S.C. §§ 311-319 AND 37 C.F.R. §42.100 *et seq.***

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I. INTRODUCTION

The claims of U.S. Patent No. 5,954,781 (the “’781 Patent”) challenged herein—independent claim 31 and dependent claim 32—recite an apparatus that uses a “speed/stopping distance lookup table” to determine whether to issue a warning to a driver of a vehicle. The table provides “the relationship between the speed at which a vehicle is traveling and the distance which the vehicle will require to come to a complete stop if travelling at that speed.” (Ex. 1001, 6:60-66.) The apparatus of claim 31 determines the speed of the vehicle and the distance between the vehicle and an object in front of it (e.g., another vehicle), and then, using the lookup table, issues a “vehicle proximity alarm” if this object is too close. Claim 32 (which depends from claim 31) adds that different speed/stopping distances can be used in the event of adverse weather.

There is nothing new about the alleged invention recited in claims 31 and 32. The inventors themselves conceded that a simple “lookup” table correlating vehicle speed and stopping distance was known. The ’781 Patent states that “[i]t is well known that the faster a vehicle travels, the longer it takes to stop,” and that “[r]oad conditions may also play a role in determining the safe separation distances.” (*Id.*, 1:53-65.) The ’781 Patent adds that the “lookup” tables are merely “based upon National Safety Council guidelines.” (*Id.*, 6:60-62.)

The prior art confirms this. The art is replete with using vehicle speed to determine a safe stopping distance, and then issuing a warning to a driver if her vehicle is closer than that distance. The following references, which are detailed in this Petition, are examples of such art: (1) European Patent Application Publication No. 0 392 953 (“**Tresse**”) (Ex. 1005); (2) U.S. Patent No. 5,357,438 (“**Davidian**”) (Ex. 1006); and (3) PCT Publication No. WO 91/07672 (“**Montague**”) (Ex. 1007). Davidian granted as a patent in 1994, before the ’781 Patent was even filed, and Montague and Tresse claim priority to patent applications even before that, in the 1980s.

Tresse, Davidian, and Montague were not considered during the prosecution of the ’781 Patent. Each reference discloses a vehicle proximity warning system that uses a “lookup” table in determining whether to issue a warning:

- **Tresse:** Ex. 1005, 3:30-32 (“The unit compares, as a priority, for a measured speed V , the value D of the distance measured with a reference distance D_r obtained from a reference table and considered to be a minimum safe distance.”);
- **Davidian:** Ex. 1006, 9:20-27 (“Computer module 90 also includes information about the vehicle braking distances as a function of speed. This is preferably in the form of a look-up table...”); and

- **Montague:** Ex. 1007, 17:23-18:4 (“[T]he comparison between the vehicle speed and the distance from the source transmitter is effected... using look up tables. The look up table contains a series of associated threshold values. If the comparison between the instantaneous vehicle speed and the determined distance between the source transmitter and the vehicle indicates that the instantaneous distance is less than the threshold required for that speed a visual and/or audible warning is given...”).

Moreover, as to claim 32, each reference contemplates using a different “safe” stopping distance in the event of adverse weather, such as rain. (Ex. 1005 (Tresse), 6:2-3, 7:26-30; Ex. 1006 (Davidian), 8:58-9:27; Ex. 1007 (Montague), 14:20-15:4.) For these reasons, and as detailed below, claims 31 and 32 of the ’781 Patent should be cancelled.

II. MANDATORY NOTICES

A. Real Parties-in-Interest

Mercedes-Benz USA, LLC, a Delaware limited liability company with its principal place of business located at 1 Mercedes Drive, Montvale, New Jersey 07645, and Mercedes-Benz U.S. International, Inc., an Alabama corporation with its principal place of business located at 1 Mercedes Drive, Vance, Alabama 35490, are real parties-in-interest (together, “**Mercedes**” or “**Petitioner**”).

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