

IN THE SUPREME COURT OF TENNESSEE

AT NASHVILLE

(HEARD AT COOKEVILLE)

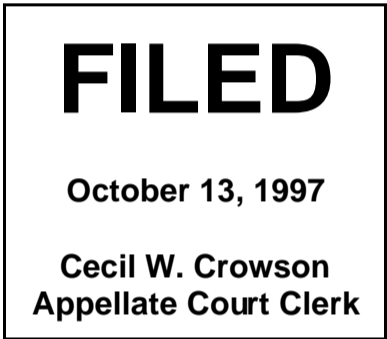
STATE OF TENNESSEE,

Appellant

v.

CORA MURPHY,

Appellee



) FOR PUBLICATION

)

) FILED: OCTOBER 13, 1997

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) DAVIDSON COUNTY

)

) HON. WALTER C. KURTZ,
) JUDGE

)

) NO. 01-S-01-9602-CC-00035

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OPINION

COURT OF CRIMINAL APPEALS AFFIRMED

BIRCH, J.

The Court of Criminal Appeals reversed the judgment of the trial court that convicted Cora Murphy, the defendant, of driving while under the influence of an intoxicant¹ and remanded the case for a new trial. We consider now the appeal of the State of Tennessee,² and we must determine whether testimony concerning an Horizontal Gaze Nystagmus ("HGN") sobriety test constitutes "scientific, technical, or other specialized knowledge" under Tenn. R. Evid. 702. We hold that the HGN test is a scientific test. To be admissible at trial, such evidence must satisfy the requirements of Tenn. R. Evid. 702 and 703 as announced in McDaniel v. CSX Transportation, Inc., ___ S.W.2d ___ (Tenn 1997). Because we are unable to determine from the record now before us whether these admissibility requirements have been met, the judgment of the Court of Criminal Appeals is affirmed, and we remand this case to the trial court for a new trial.

I

Murphy was arrested and charged with driving while under the influence of an intoxicant on May 31, 1993. At trial, the State relied primarily on the results of an HGN sobriety test. Michael Eby, the arresting officer, described the test he administered to Murphy and his conclusions therefrom as follows:

¹Tenn. Code Ann. § 55-10-401.

²Oral argument was heard in this case on October 8, 1996, in Cookeville, Putnam County, Tennessee, as part of this Court's S.C.A.L.E.S. (Supreme Court Advancing Legal Education for Students) project.

[The HGN test] works on the movement of the eyes, that --- what you check for are three different things. One, you check for smooth movement. You have them follow an object, either a pen, tip of a pen or your finger, and they're supposed to follow with their eyes. And if there's nystagmus present, their eyes will not move from side to side smoothly; they will have jumping movements in them.

Then you check for, at maximum deviation, any signs of movement. And what it is is [sic] when you get to a 45 degree angle, their eyes will jerk back and forth if there's signs of nystagmus there.

And the last one is you check for the offset [sic, onset] of it before 45 degrees.

. . . .

on all three points both the eyes [Murphy] had obvious signs of nystagmus.

Murphy was tested as she faced the flashing lights of Eby's patrol car. At trial, Eby acknowledged that nystagmus may be caused by many factors other than alcohol consumption. Eby did not conduct any other field sobriety tests, nor was Murphy's blood or breath later analyzed for alcohol content. Eby also testified concerning his general observations of Murphy made during the incident. As stated, the trial court held that the HGN test results did not constitute scientific evidence. The Court of Criminal Appeals reversed.

II

Nystagmus is an involuntary jerking movement of the eye either as it attempts to focus on a fixed point or as it moves to one side. The phenomenon results from the body's attempt to maintain orientation and balance. State v. Cissne, 72 Wash. App. 677, 865 P.2d 564, 566 (1994). "The theory behind the [HGN] test is that there is a strong correlation between the amount of alcohol a person consumes and the angle of onset of the nystagmus." State v. Witte, 251 Kan. 313, 836 P.2d 1110, 1112 (1992)(quoting Carper & McCamey, Gaze Nystagmus: Scientific Proof of DUI?, 77 Ill.B.J. 146, 147 (1988)).

The effect of alcohol consumption on nystagmus may be observed in three ways:

"Angle of Onset--the more intoxicated a person becomes, the sooner the jerking will occur as the eyes move to the side.

"Maximum Deviation--the greater the alcohol impairment the more distinct the nystagmus is when the eyes are as far to the side as possible.

"Smooth Pursuit--an intoxicated person often cannot follow a slowly moving object smoothly with his eyes." 2 Nichols, Drinking/Driving Litigation §26:01, p. 159 (1992 Supp.)

Id. at 1113.

In conducting an HGN test, the subject should be instructed to keep the head still and with one eye covered, follow

a penlight or other object with the uncovered eye. The penlight is held at eye level about 12 to 15 inches from the subject's head. It is then moved from directly in front of the subject's eyes to one side. As a person who has been consuming alcohol attempts to follow the penlight's movement, so the theory goes, nystagmus will occur sooner and be more pronounced than it would be in a person who has not consumed any alcohol.

The State argues, and certain other jurisdictions have accepted this reasoning,³ that HGN testing is not scientific because it simply involves an officer's objective observations of the subject's physical characteristics. In this way, says the State, HGN is no different from other field sobriety tests.⁴

In our view, the HGN test does differ fundamentally from other field sobriety tests because the witness must necessarily explain the underlying scientific basis of the test in order for the testimony to be meaningful to a jury. Other tests, in marked contrast, carry no such requirement. For example, if a police

³Whitson v. State, 314 Ark. 458, 863 S.W.2d 794 (1993); State v. Murphy, 451 N.W.2d 154 (Iowa 1990); State v. Garris, 603 So.2d 277 (La. App. 2 Cir. 1992); City of Fargo v. McLaughlin, 512 N.W.2d 700 (N.D. 1994); State v. Nagel, 30 Ohio App.3d 80, 506 N.E.2d 285 (1986); State v. Sullivan, 426 S.E.2d 766 (S.C. 1993).

⁴In State v. Gilbert, 751 S.W.2d 454, 459 (Tenn. Crim. App. 1988), the Court of Criminal Appeals held that field sobriety tests were not "scientific" and therefore, not subject to Tenn. R. Evid. 702. However, the intermediate court did not specify which field sobriety tests were utilized in that case. There are several unpublished opinions by the Court of Criminal Appeals that have held that HGN test results are not scientific in nature. As author of this opinion, I acknowledge that I participated in several of those opinions while on the lower court and even authored one. After further reflection, however, I have concluded that the course we adopt today is the better-reasoned one.

officer testifies that the defendant was unable to walk a straight line or stand on one foot or count backwards, a jury needs no further explanation of why such testimony is relevant to or probative on the issue of the defendant's condition. A juror can rely upon his or her personal experience or otherwise obtained knowledge of the effects of alcohol upon one's motor and mental skills to evaluate and weigh the officer's testimony. However, if a police officer testifies that the defendant exhibited nystagmus, that testimony has no significance to the average juror without an additional explanation of the scientific correlation between alcohol consumption and nystagmus. In effect, the juror must rely upon the specialized knowledge of the testifying witness and likely has no independent knowledge with which to evaluate the witness's testimony.

And there is another distinction between the HGN test and other field sobriety tests, and it concerns measurement. Returning to examples, an officer may testify that the subject performed the "finger to nose" test successfully three out of seven attempts. Once again, no explanation is needed. In contrast, when an officer testifies that the subject's eye movement was rapid and very jerky at less than a 40 degree angle, that officer is testifying about a measurement that probably should be taken with a measuring device. Therefore, the accuracy of this testimony may be questionable in light of the officer's non-scientific measurement of a scientifically measurable phenomenon.

In Witte, the Kansas Supreme Court cogently summarized the distinction between the HGN test and other field sobriety tests:

The HGN test is distinguished from other field sobriety tests in that science, rather than common knowledge, provides the legitimacy for HGN testing. . . . HGN test results are "scientific evidence based on the scientific principle that consumption of alcohol causes the type of nystagmus measured by the HGN test." . . .

[T]he officer's opinion that the defendant "was under the influence of alcohol, to the extent it was based on the nystagmus test, rests on scientific premises well beyond [the officer's] knowledge, training, or education. Without some understanding of the processes by which alcohol ingestion produces nystagmus, how strong the correlation is, how other possible causes might be masked, what margin of error has been shown in statistical surveys, and a host of other relevant factors, [the officer's] opinion on causation, notwithstanding his ability to recognize the symptom, was unfounded."

Witte, 836 P.2d at 1115-16 (quoting Commonwealth v. Miller, 367 Pa. Super. 359, 365, 532 A.2d 1186 (1987) and People v. Williams, 3 Cal. App. 4th 1326, 1334, 5 Cal. Rptr. 2d 130 (1992)).

Tennessee Rule of Evidence 702 states:

If scientific, technical, or other specialized knowledge will substantially assist the trier of fact to understand the evidence or to determine a fact in issue, a

witness qualified as an expert by knowledge, skill, experience, training, or education may testify in the form of an opinion or otherwise.⁵

In Tennessee, evidence constitutes "scientific, technical, or other specialized knowledge" if it concerns a matter that "the average juror would not know, as a matter of course. . . ." State v. Bolin, 922 S.W.2d 870, 874 (Tenn. 1996). In our view, the average juror would not know, as a matter of course, that a correlation exists between alcohol consumption and nystagmus. Consequently, testimony concerning the HGN field sobriety test constitutes "scientific, technical, or other specialized knowledge."⁶ As such, it must be offered through an expert witness and must meet the requirements of Tenn. R. Evid. 702 and 703 as explained in McDaniel v. CSX Transportation, ____ S.W.2d ____ (Tenn 1997).

The judgment of the Court of Criminal Appeals is affirmed, and the cause is remanded to the trial court for a new trial. Costs are taxed to the State for which execution may issue, if necessary.

ADOLPHO A. BIRCH, JR., Justice

CONCUR:
Anderson, C.J.
Drowota, Reid, JJ.
O'Brien, S.J.

⁵Tennessee Rule of Evidence 702 requires that the evidence "substantially" assist the trier of fact; in contrast, the federal rule simply requires that the evidence assist the trier of fact.

⁶An apparent majority of the jurisdictions that have addressed this issue agree with our conclusion. See State v. Merritt, 36 Conn. App. 76, 647 A.2d 1021, 1026 (1994) and the authorities cited therein.