



National Transportation Safety Board

Washington, D.C. 20594

Safety Recommendation

Date: February 23, 2004

In reply refer to: H-04-06

Mr. Charlie Gauthier
Executive Director
National Association of State Directors of Pupil Transportation Services
6928 Rock Hill Road
The Plains, Virginia 20198-1916

The National Transportation Safety Board is an independent Federal agency charged by Congress with investigating transportation accidents, determining their probable cause, and making recommendations to prevent similar accidents from occurring. We are providing the following information to urge your organization to take action on the safety recommendation in this letter. The Safety Board is vitally interested in this recommendation because it is designed to prevent accidents and save lives.

This recommendation addresses pretrip briefings and emergency evacuation training. The recommendation is derived from the Safety Board's investigation of an October 13, 2001, work zone accident¹ involving a school bus that plunged off the West Papillion Creek Bridge in Omaha, Nebraska, and is consistent with the evidence it found and the analysis it performed. As a result of this investigation, the Safety Board has issued seven safety recommendations, one of which is addressed to the National Association of State Directors of Pupil Transportation Services (NASDPTS). Information supporting this recommendation is discussed below. The Safety Board would appreciate a response from you within 90 days addressing the actions you have taken or intend to take to implement this recommendation.

On Saturday, October 13, 2001, about 2:00 p.m. central daylight time, a 2000 Thomas Built Buses, Inc., 78-passenger school bus carrying 27 Seward High School students and 3 adults (excluding the driver) was traveling westbound through a work zone on U.S. Route 6 in Omaha, Nebraska. As the Seward bus entered the work zone lane shift at the approach to the West Papillion Creek Bridge, it encountered a 1986 Motor Coach Industries 52-passenger motorcoach carrying Norfolk High School students traveling eastbound. Although no collision occurred between the Norfolk and Seward buses, the westbound school bus departed the traveled roadway on the right and subsequently struck the W-beam barrier on the approach to the bridge, steered to the left momentarily, and then steered abruptly back to the right, striking the W-beam again and,

¹ For more information, read National Transportation Safety Board, *School Bus Run-Off Bridge Accident, Omaha, Nebraska, October 13, 2001*, Highway Accident Report NTSB/HAR-04/01 (Washington, DC: NTSB, 2004).

finally, a three-rail barrier between the guardrail and the concrete bridge railing. The bus passed through the remains of the three-rail barrier, rode up onto the bridge's sidewall, and rolled 270 degrees clockwise as it fell about 49 feet, landing on its left side in a 1-foot-deep creek below the bridge. Three students and one adult sustained fatal injuries. The remaining passengers and the busdriver sustained injuries ranging from serious to minor.

The National Transportation Safety Board determined that the probable cause of this accident was the failure of the Nebraska Department of Roads to recognize and correct the hazardous condition in the work zone created by the irregular geometry of the roadway, the narrow lane widths, and the speed limit. Contributing to the accident was the accident bus driver's inability to maintain the bus within the lane due to the perceived or actual threat of a frontal collision with the approaching eastbound motorcoach and the accident bus driver's unfamiliarity with the accident vehicle. Contributing to the severity of the accident was the failure of the traffic barrier system to redirect the accident vehicle.

On-scene inspection of the forward and aft roof hatches in the accident vehicle showed that the latches to open them were in the closed position, and student passengers indicated that they kicked open or kicked out the emergency hatches rather than attempting to open them as designed. The Safety Board concluded that had the Seward school district conducted emergency evacuation drills and demonstrations for all students, the passengers' ability to open emergency exits and evacuate the vehicle in an emergency would have been greatly improved.

Although State law requires and Federal guidelines recommend twice-yearly school bus evacuation drills for *all* students who ride school buses, which would have included demonstrations on opening the emergency exits, very few of the students on the accident bus had received such training. In fact, postaccident interviews with student passengers revealed that only one student had received school bus emergency evacuation training while in high school and that only four students had received any form of school bus emergency evacuation training in either elementary or middle school. According to the Seward school district's transportation director,² although two evacuation drills are conducted each school year, none of the accident bus's passengers had received such training because most of them rode buses only for special events. The director added that Seward's school buses only pick up students who live outside the city limits, noting that friends or family normally drive students who live inside the city limits to school. The circumstances of this accident demonstrate that pretrip safety information may be critically important for students who ride school buses sporadically, since they may be less familiar with the bus's general layout and escape routes than regular riders.

The Seward students' lack of emergency evacuation training is not atypical. According to your organization's December 2003 survey of State Directors of Transportation, only 15 States require that students who ride buses for extracurricular functions receive pretrip safety information and only 9 States require physical demonstration of the operation of emergency exits. Despite the Federal recommendation in the National Highway Traffic Safety Administration's Highway Safety Program Guideline No. 17, *Pupil Transportation Safety*, that operators conduct pretrip briefings on the location and operation of emergency exits and the adoption of that recommendation in *National School Transportation Specifications and*

² Safety Board interview with the Seward School District Transportation Supervisor, October 15, 2001.

Procedures, the survey shows that most schools do not conduct pretrip briefings before every school-related activity trip, and few States have adopted this practice.

Therefore, the National Transportation Safety Board recommends that the National Association of State Directors of Pupil Transportation Services:

Prepare a report that can be used by the State Directors to influence their States to require pretrip briefings before school-related activity trips on school buses or school-chartered buses and subsequently assist the States in developing criteria for such briefings, to include training all students regarding the location and use of emergency exits. (H-04-06)

The Safety Board looks forward to partnering with NASDPTS on the pretrip briefing issue.

The Safety Board also issued safety recommendations to the Federal Highway Administration, Nebraska Department of Roads, Omaha Fire Department, and Thomas Built Buses, Inc. In response to the recommendation in this letter, please refer to H-04-06. If you need additional information, you may call (202) 314-6607.

Chairman ENGLEMAN CONNERS, Vice Chairman ROSENKER, and Members CARMODY, GOGLIA, and HEALING concurred with this recommendation.

By: Ellen Engleman Connors
Chairman