



U.S. Department  
of Transportation  
**National Highway  
Traffic Safety  
Administration**

# ODI RESUME

Investigation: PE07-028  
Date Opened: 06/11/2007      Date Closed: 11/20/2007  
Principal Investigator: Cheryl Rose  
Subject: CNG tank exploding in a fire

Manufacturer: Honda (American Honda Motor Co.)  
Products: 2003 MY Honda Civic powered by Compressed Natural Gas (CNG)  
Population: 2000

Problem Description: During a vehicle fire, the pressure relief device (PRD) allegedly failed to activate and the compressed natural gas (CNG) tank exploded.

## FAILURE REPORT SUMMARY

	ODI	Manufacturer	Total
Complaints:	0	0	0
Crashes/Fires:	1	1	1
Injury Incidents:	0	0	0
# Injuries:	0	0	0
Fatality Incidents:	0	0	0
# Fatalities:	0	0	0
Other*:	1	1	1

\*Description Of Other: Honda informed ODI of one (1) CNG tank explosion.

Action: This Preliminary Evaluation has been closed. Honda is conducting a safety recall 07-V512 (copy attached).

Engineer: Cheryl Rose      Date: 11/20/2007  
Div. Chief: Jeffrey L. Quandt *[Signature]*      Date: 11/20/2007  
Office Dir.: Kathleen C. DeMeter *[Signature]*      Date: 11/20/2007

Summary: In mid-April 2007, Honda informed ODI of a CNG tank explosion incident that occurred on a subject vehicle. The incident occurred after an arsonist broke into a lot where multiple vehicles, including a subject vehicle, were stored and set the vehicles on fire. During the fire, the PRD on the subject vehicle allegedly failed to activate and the CNG tank exploded. The explosion occurred with fire fighters at the scene. No injuries were reported.

CNG tanks are subject to Federal Motor Vehicle Safety Standard Number 304 - compressed natural gas fuel container integrity. This standard requires that each CNG fuel container shall completely vent its contents through a PRD or shall not burst while retaining its entire contents when tested according to the standard's bonfire test procedure. A CNG tank explosion rapidly releases a large quantity of energy and could result in catastrophic injuries, deaths, and property damage.

As a result of Honda's testing and review of the involved vehicle, Honda has developed an insulator to insulate the CNG fuel tank from a locally directed flame projecting from the interior of the vehicle. Insulators will be installed behind the back seat on subject vehicles to prevent future failures of this type.

Honda's action addresses the concerns of ODI. Therefore, this investigation is closed.