

Honda Develops New Multi-View Vehicle Camera System to Provide View of Surrounding Areas

September 18 2008



Front Blind View.

Honda Motor announced that it has developed a multi-view camera system which displays views from multiple wide-angle CCD cameras on the vehicle's navigation screen to reduce blind spots, support smooth parallel or garage parking, and support comfortable and safe driving in a 3-way intersection where there is limited visibility or on narrow roads. This new multi-view camera system will be applied first to the all-new Odyssey which is scheduled to go on sale in Japan in October of this year.

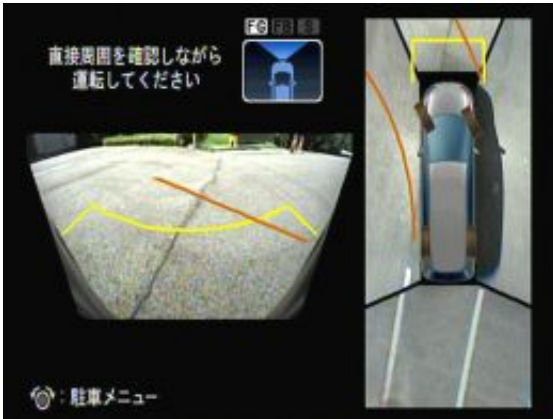
The multi-view camera system includes four wide-angle CCD cameras located in the front and rear of the vehicle and on the right and left door

mirrors. The new system synthesizes images from these cameras and displays the synthesized image on the navigation screen with additional information including a projection line, which shows the vehicle's projected trajectory calculated based on steering angle information, and a reference line, which provides a reference for the distance between the vehicle and approaching obstacles. This provides support to the driver in parking, enhancing visibility, and avoiding contact in narrow driving conditions.

Based on its unique approach to safety, Honda has been researching and developing various visibility enhancing technologies from the standpoint of active safety. In 2001, Honda introduced a rear view camera system which enhances rear visibility while backing up; in 2003, Honda developed the Adaptive Front Lighting System (AFS) which improves nighttime visibility during turning; and in 2004, Honda developed the Intelligent Night Vision System which detects pedestrians that are in or approaching the vehicle's path and provides the driver warnings during nighttime driving. These technologies are already being installed to Honda vehicles which are currently on sale .

Configuration of the Multi-View Camera System:

1. Front camera
2. Side cameras (driver side door mirror/front passenger side door mirror*)
3. Rear camera
4. Camera ECU



Front View + Grand View

About the Multi-View Camera System

- Parking support – supports the driver during parallel or garage parking

- Parking assistance

Grand view and parking assistance can be displayed on the same screen. The instruction will provide easy and accurate parking

- Rear View + Grand View

The image will provide additional visibility for the ground around the vehicle and in back of the vehicle. The projection line and reference line will help the driver confirm the exact parking spot.

- Visibility support – further reduces blind spots in front and on sides during driving in 3-way intersections or on narrow roads with tight turns

- Front Blind View

The 180-degree wide-angle image helps the driver confirm safety on right and left sides of the vehicle.

- Front View + Grand View

The image will provide additional visibility for the ground around the vehicle and in front of the vehicle. The projection line helps the driver confirm driving trajectory.

- Tight driving support – helps the driver pull vehicle to the edge of the road or avoid contact in narrow driving conditions

- Side View

The image will provide additional visibility for the right and left sides of the vehicle. The reference line helps the driver confirm the distance from obstacles.

Provided by Honda

Citation: Honda Develops New Multi-View Vehicle Camera System to Provide View of Surrounding Areas (2008, September 18) retrieved 8 April 2024 from <https://phys.org/news/2008-09-honda-multi-view-vehicle-camera-view.html>

<p>This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.</p>
--