EMBEDDED GPS SYSTEM

SATELLITE

MICRO

CONTROLLER

DVD-ROM

(MAP AND VOICE DATA)

GYROSCOPE

(SPEED AND DIRECTION)

GPS

RECEIVER

(POSITION DATA)

MAP DISPLAY

+

VOICE

(SCREEN)

Another advancement of the embedded system in automobiles is the navigational system using GPS system. This navigational system consists of an embedded circuitry built with a GPS receiver, a gyroscope, a DVD-ROM, main controller and a display system. The GPS receiver receives the current longitude and latitude values that are compared with the stored map. The Gyroscope and other sensors provide the road direction and speed. From all the information gathered at the microcontroller, the display system displays a navigation or route map of the destination in the display screen.