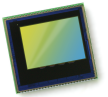# OV7955

Applications

- Rear View Camera
- Surround View
- Smart Automotive Camera
- Drive Recorder
- Lane Departure Warning
- Blind Spot Detection
- Night Vision with Active Illumination

Product Features

- industry's smallest automotive package
- exceptional low-light performance for 1 lux requirements
- supports NTSC and VGA outputs
- color and B&W sensor options
- automatic exposure/gain with 16 zone control
- crop and resize
- built-in memory for custom register settings
- aperture/gamma correction
- low power consumption
- AEC-Q100 qualified
- 2 layer multicolor overlay
- defective pixel correction
- optimized for digital progressive and analog applications
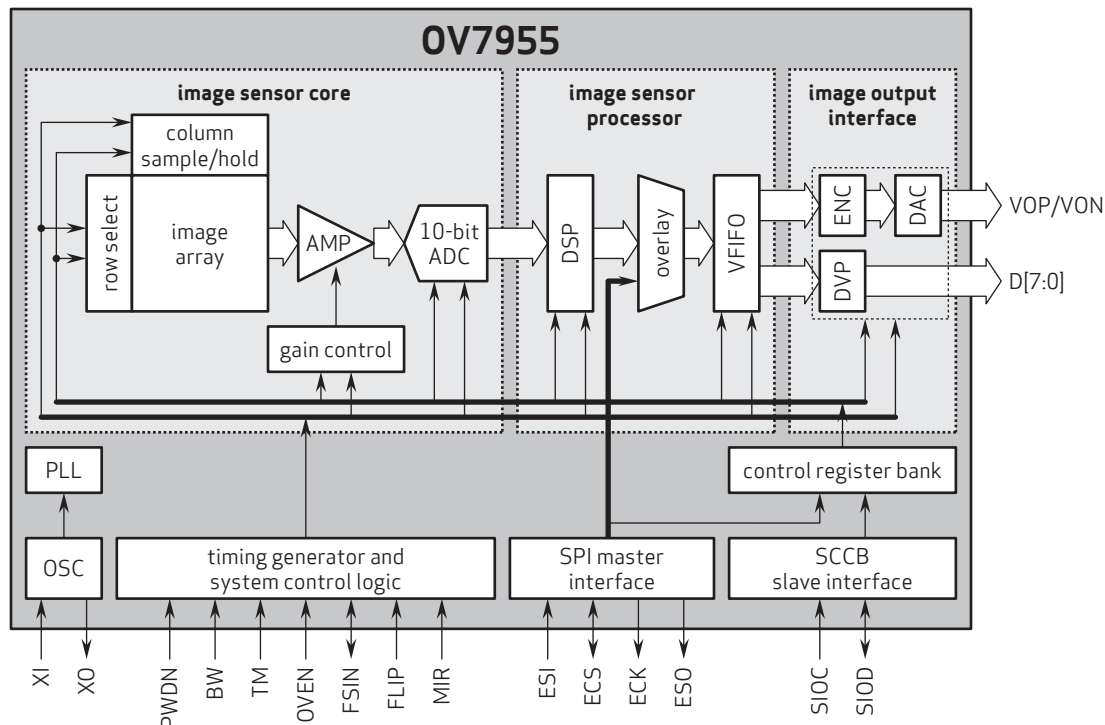- single 3.3 V power supply

Product Specifications

- active array size: 672 x 492
- power supply:
  - core: 1.5V
  - analog: 3.14 - 3.47V
  - I/O: 1.7 - 3.47V
- power requirements:
  - active: 200 mW
  - standby: 20 µA
- temperature range:
  - operating: -40°C to +105°C ambient temp and -40°C to +115°C junction temp
- output formats: NTSC (TV port), VGA (DV port)
- optical size: 1/3.7" (NTSC)
- lens chief ray angle: supports up to 25°
- maximum image transfer rate:
  - VGA: 60 frames per second (DV)
  - NTSC: 60 fields per second (TV)
- sensitivity: 16 V/lux-sec
- shutter: rolling shutter
- max S/N ratio: 38 dB
- dynamic range: 71 dB @ 8x gain
- scan mode: progressive
- pixel size: 6.0 µm x 6.0 µm
- dark current: 10.7 mV/sec @ 60°C junction temperature
- image area: 4032 µm x 2952 µm
- package dimensions: 5660 µm x 5360 µm

Functional Block Diagram