

HDMI Buffer/Repeater 3.3V 40-Pin TQFN EP T/R

Manufacturer: [Diodes Inc](#)

Package/Case: TQFN40

Product Type: Drivers

RoHS: RoHS Compliant/Lead free 

Lifecycle: Obsolete



Images are for reference only

[Inquiry](#)

General Description

PI3HDX511F is a low power HDMI 1.4b ReDriver and Display- Port dual mode level shifter supporting 3.4Gbps data rate with 48-bpp Deep Color support. For mobile platforms, extending battery hours have been one of the most challenges. PI3HDX511F has rich power saving states management features to extend battery hours less than 1mA stand-by current, passive-type DDC switch, output squelch, HPD (Hot plug Detect) detection and dual power supply (1.5/3.3V) option. PI3HDX511F also designed to support both source and sink side system application. For dual side application, it supports wide range EQ setting, data/clock pin swapping, double termination/ open-drain output and DDC buffer options. Main applications are computers, display monitors and related peripheral devices.

Key Features

Low power multi purpose HDMI 1.4b compliant redriver with DisplayPort dual mode level shifter with many pin-strapping configuration options

Operation up to 3.4 Gbps per lane (340MHz pixel clock)

4K Ultra HD, 3D Video formats (1080p, 1080i, 720p), 48-bit per pixel Deep Color support

Low standby current <1mA with DDC passive switch mode

Flexible 6 steps equalization control steps with 3 steps pre-emphasis: 2.5, 5, 7.5 dB for short range or 5, 10, 15 dB for long range application.

Pre-emphasis control 3 steps: 0, 1.5, 2.5 dB

Configurable HDMI or DisplayPort dual-mode input with pin stripping option

Automatic output squelch and HPD function for power saving states management at no input signal condition

Clock & Data pin swap function for sink side application: D2/D1/D0/CLK or CLK/D0/D1/D2

Active DDC buffer modes for long range application

Single(3.3V) or Dual power supply (3.3/1.5V) operation

Integrated ESD protection on I/O pins for 8kV contact per IEC61000-4-2, level 4 and 8kV HBM

40-pin TQFN(ZL40) 3x6mm package

Application

Notebook/ Desktop computers

Monitors, A/V receivers

Dongle and Switch boxes

Embedded Video/Display systems



Recommended For You

PI3HDX414FCEEX

Diodes Inc

LQFP80

PI3HDX511E2LSE

Diodes Inc

QFN

PI3HDX511DZLE+DAX

Diodes Inc

80-BQSOP