Transimpedance amplifier made with OPA657



Overview

Online Simulation of the Transimpedance Amplifier Circuit. This fast photodiode transimpedance amplifier is based on a high- speed JFET- input op amp OPA657.

Article Content

OPA657 1.6-GHz, Low-Noise, FET-Input Operational Amplifier

1 3 Description The OPA657 device combines a high-gain bandwidth, low-distortion, voltage-feedback operational amplifier with a low-voltage noise JFET-input stage to offer a very high dynamic range

OPA657 Datasheet (PDF)

Description: OPA657-DIE 1.6-GHz, Low-Noise, FET-Input Operational Amplifier. Manufacturer: Texas Instruments.

Bare Die Product Detail: OPA657

Transimpedance Amplifier - OPA657: 1.6GHz, Low Noise, Fet -Input Operational Amplifier

1.6GHz, Low Noise, FET-Input Operational Amplifier (Rev. E)

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The OPA657 combines a high gain bandwidth, low distortion, voltage-feedback op amp with a low voltage noise JFET-input stage to offer a very high dynamic range amplifier for high precision ADC

Online Simulation of a Transimpedance Amplifier Circuit

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OPA657 datasheet

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SBOS197 – DECEMBER 2001 1.6GHz, Low-Noise, FET-Input

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OPA657: Used the OPA657 as a transimpedance amplifier, but the

Hi Aditya, I have already used that tool, but it does not support the OPA657. However, I tried calculating with the OPA818 (Performance upgrade to OPA657), and I found that the tool gives

TINA/Spice/OPA657: LTspice Transimpedance Amplifier Simulation Part ...

Part Number: OPA657 Other Parts Discussed in Thread: TINA-TI,, OPA656 Tool/software: TINA-TI or Spice Models I''m having issues with the OPA657 Rev. E model in LTspice. I''m using the amplifier

OPA657: Multi gain stage transimpedance amplifier using analog switches ...

Part Number: OPA657 Other Parts Discussed in Thread: OPA859, OPA858 Hi everybody, I am trying to design a selectable gain stage using the OPA657 and an analog switch. I

OPA 657 as transimpedance

I want to use OPA657 as transimpedance amplifier for data rates upto 100 Mbps. My photodiode is OPF430 which has capacitance of 2pF when biased negative (from datasheet).

OPA657 Datasheet (PDF)

Part #: OPA657. Download. File Size: 390Kbytes. Page: 20 Pages. Description: 1.6GHz, Low-Noise, FET-Input OPERATIONAL AMPLIFIER. Manufacturer: Texas Instruments.

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Transimpedance Amplifiers (TIA): Choosing the Best Amplifier for the ...

So, for the 1st stage, choose the best operational amplifier (by using the analysis method developed here) while operating at the highest Transimpedance gain possible which still allows the entire

Transimpedance Amplifier using OPA 657

As a first remark, OPA657 isn''t unity gain stable. Unfortunately none of your configurations will result in stable amplifier operation. Referring to the virtual OP simulations in post

opa657 transimpedance mode

This is based on calculations using the equations in the following application note: Transimpedance Considerations for High-Speed Operational Amplifiers - sboa122. Since you are dealing with pulses,

Transimpedance Considerations for High-Speed Amplifiers

In general (and from a noise perspective), FET input amplifiers such as the OPA657 are best for large or very large transimpedance gain with low-to-medium bandwidth because of the post-amplifier filter

OPA857 Ultralow-Noise, Wideband, Selectable-Feedback Resistance ...

The OPA857 is a wideband, fast overdrive recovery, fast-settling, ultralow-noise transimpedance amplifier targeted at photodiode monitoring applications. With selectable feedback resistance, the

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