

# Photodiode as current source

## Student Group

First Name	Surname	Matrikel Nr.

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### Photo Diode as current source

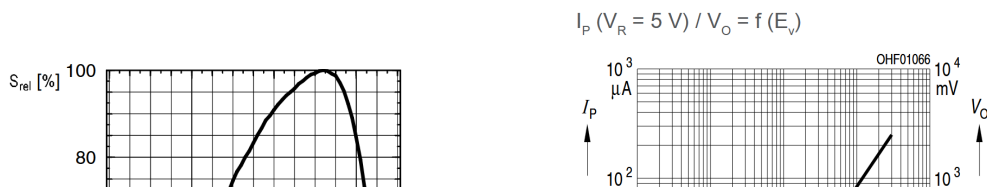


Fig. 3: Inverting Op-Amp: Photo Diode as current source



Fig. 4: Inverting Op-Amp: Photo Diode as current source

$$U_{DD} \approx 10\text{V}, U_{SS} \approx -10\text{V}$$

Complete the arrows in the schematic of the circuit.  
 Take the values for  $U_1, U_2, U_{OUT}$  from figure ##.  
 Use these values to calculate the sum of the voltages at node  $N_{12}$ .  
 Compare your result by measurement.

$$U_1 \approx$$

$$U_2 \approx$$

$$U_{OUT} \approx$$

$$\text{Calculated } N_{12} \approx$$

$$\text{Measured } N_{12} \approx$$

What are your results?

$\{\rm \dots\}$

$\{\rm \dots\}$

$\{\rm \dots\}$

What will happen if you short-circuit  $R_2$ ?  
 Try it and explain your results.

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