

Light Sensor Subsystem Po

Team Number:	105
Project Name:	Electric Blinds
Team Member Names:	Timmy, Abriana, Keith
Version:	Donovan Calderon

A. List ALL major components (active devices, integrated circuits, voltage regulators, resistors, capacitors, or passive elements

All Major Components	Component Name	Part Number	Supply Voltage Range
	Opamp	MCP6004-E/P	+5V to 5V
	CDS PHOTORESISTOR	PDV-P8103	+5V to 150V
	PIC18F57Q43 CURIOSITY NANO	DM164150	1.8V to 5.5V

B. Assign each major component above to ONE power rail below. Assign different power rails in the design. Add additional power rails or change the power rail voltages if

+5V Power Rail	Component Name	Part Number	Supply Voltage Range
----------------	----------------	-------------	----------------------

c1. Regulator or Source Choice	PIC18F57Q43 CURIOSITY NANO	MCP6004-E/P	1.8 5.5 +5V
	Opamp	DM164150	5 +(
	CDS PHOTORESISTOR	PDV-P8103	150
	Total Current		
	+5V regulator	LM7805	(ran
Total Remaining Current			
-5V Power Rail	Component Name	Part Number	Supp Vola Ran
	Opamp	DM164150	(ran
Total Current			

c3. Regulator or Source Choice	-5V Regulator	(full part number)	(range)
Total Remaining Current			
Total Remaining Current			
C. For each power rail above, select a specific voltage regulator using the same process as for major component selection. Confirm that the Total Remaining Current Available on each rail above is not negative.			
+5V Power Rail	Component Name	Part Number	Supply Voltage Range
c1. Regulator or Source Choice	+5V regulator	LM7805	(range)
D. Select a specific external power source (wall supply or battery) that can supply all the regulators with all the power rails simultaneously. If multiple power sources, list each separately below and indicate which regulator is powered by which source. Confirm that the Total Remaining Current Available on each power rail is not negative.			

<i>External Power Source 1</i>	Component Name	Part Number	Supply Voltage Range
Power Source 1 Selection	PIC18F57Q43 CURIOSITY NANO	(full part number)	1.8V 5.1V
Power Rails Connected to External Power Source 1	+5V Regulator	LM7805	+0V 35V
<i>Total Remaining Current Available on External Power Source 1</i>			