



Republic of the Philippines  
Department of Education  
Region VII, Central Visayas  
**SCHOOLS DIVISION OF BOHOL**  
City of Tagbilaran



July 17, 2017

DIVISION MEMORANDUM

No. 354s. 2017

**LITER OF LIGHT WORKSHOP**

**TO: SCHOOLS DISTRICT SUPERVISORS/ ACTING PSDSs  
ELEMENTARY & SECONDARY PRINCIPALS/SCHOOL HEADS  
TEACHERS CONCERNED**

1. The Department of Energy in partnership with the Province of Bohol and DepEd Division of Bohol will conduct the "Liter of Light" Workshop on Friday, July 21, 2017 from 9:00AM to 4:00pm at Lourdes National High School, Lourdes, Panglao, Bohol.

2. The participants are thirty-four (34) Grade V and Grade VI pupils (17 boys & 17 girls), two (2) Class Advisers from Lourdes Elementary School, Panglao District and eleven (11) TLE Electronics Teachers from various secondary schools identified below, to wit:

1. *Dexter Dizaon* ... *Pangangan NHS, Calape*
2. *Jonas Ledesma* ... *Biking TVHS, Dauis*
3. *Cirilo Monton* ... *Lourdes NHS, Panglao*
4. *Johndion Ruloma* ... *MARTNSF, Calape*
5. *Glad Norman Limocon*...*MARTNSF, Calape*
6. *Gregorio Apale* ... *San Roque NHS, Albirquerque*
7. *Alberto Antipas* ... *Alicia TVHS, Alicia*
8. *Alberto Rombo* ... *Lourdes NHS, Panglao*
9. *Gilbert Nuera* ... *Tagum Sur NHS, Trinidad*
10. *Sabino Vallecer* ... *Bantolinao NHS, Antequera*
11. *Agustin Cajigal* ... *Valencia TVHS, Valencia*
12. *Edgar Quimpan* ... *Pilar TVHS, Pilar*

3. The TLE Electronics Teachers are instructed to study in advance and familiarize with the installation of the solar lamp (see the attached diagram) and are requested to bring soldering and other electronic tools during the workshop. Transportation of participants shall be chargeable against school MOOE funds subject to the usual auditing rules and regulations of the COA, while the meals shall be provided by the Department of Energy.

4. Immediate dissemination of this Memorandum is desired.

*W. Bongalos*  
**WILFREDA D. BONGALOS, Ph.D., CESO VI**

Schools Division Superintendent

SGOD/dvd





LITER OF LIGHT  
AT NIGHT

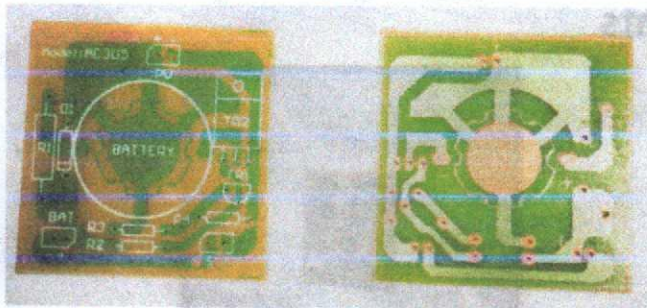


# SOLAR LAMP CIRCUIT

ver. 3

Engr. Alfred Caras

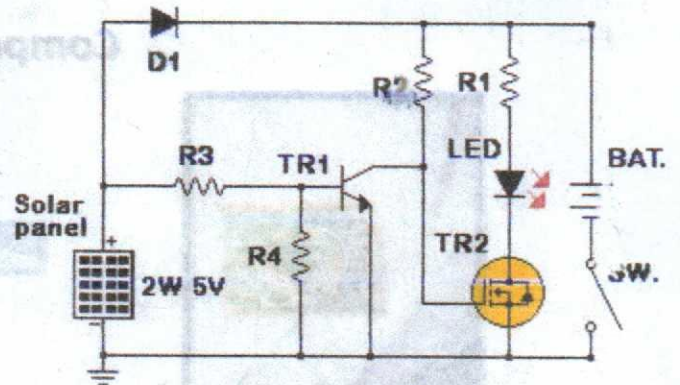
## PCB Layout



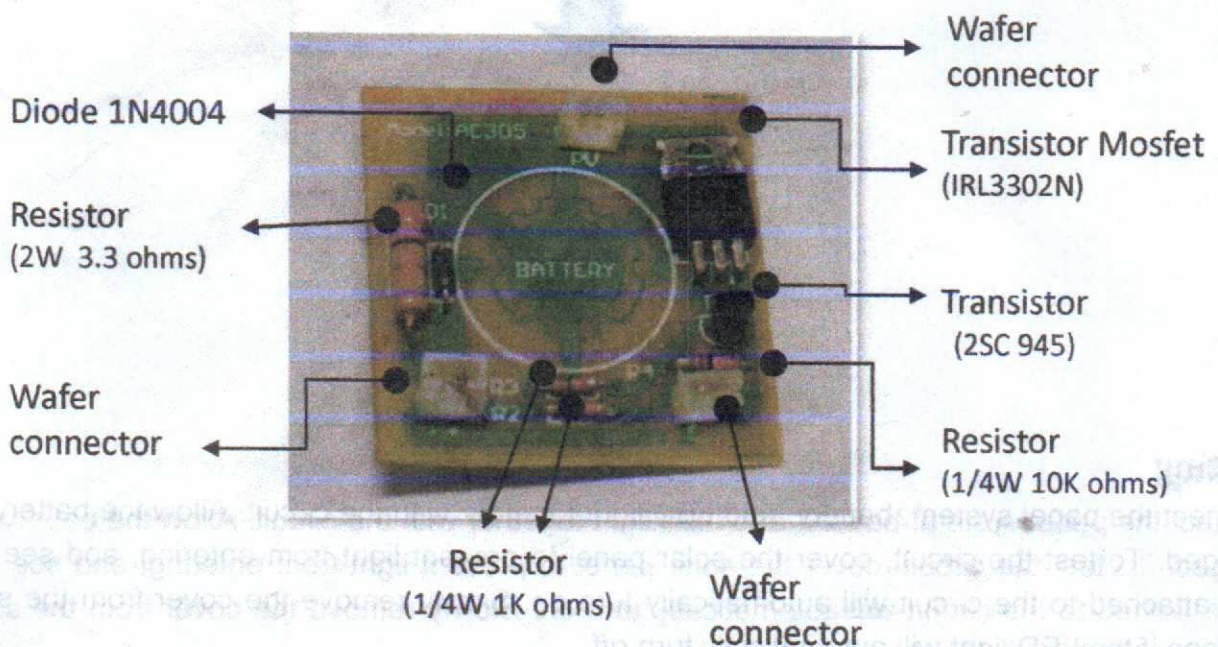
(Front Side)

(Back Side)

## Schematic Diagram



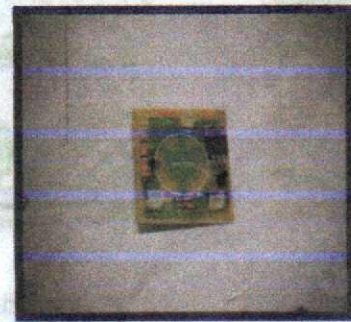
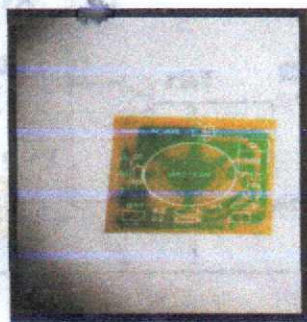
## Placement Guide



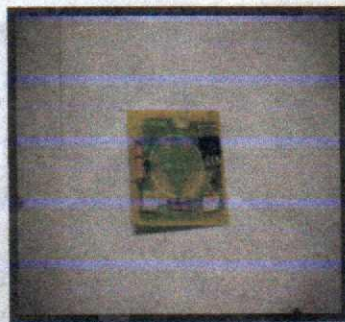




## Components



Step 1: Solder first the  $\frac{1}{4}$  W resistors and diode.  
 Step 2: Solder 2W resistor and transistors.  
 Step 3: Solder all wafer connectors.



## Testing

Connect the panel system, battery, and LED light together with the circuit. Allow the battery to be fully charged. To test the circuit, cover the solar panel to prevent light from entering, and see if the LED light attached to the circuit will automatically turn on. Slowly remove the cover from the solar panel, and see if the LED light will automatically turn off.