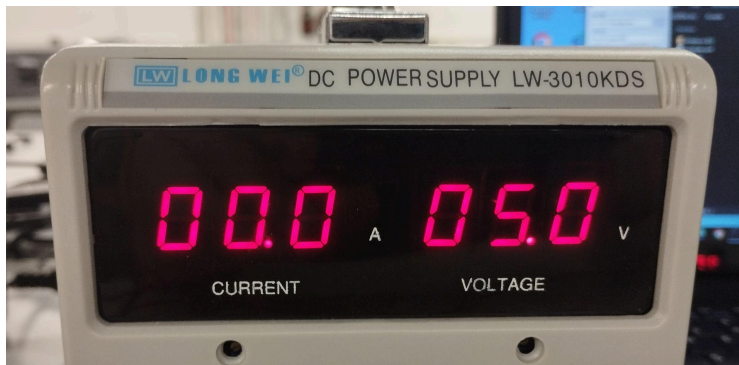
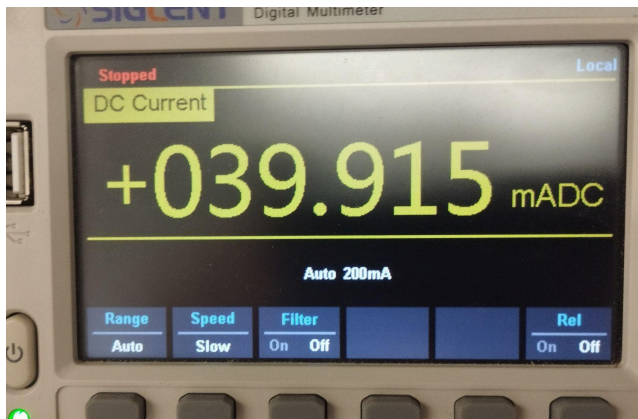


# MEDICIONES

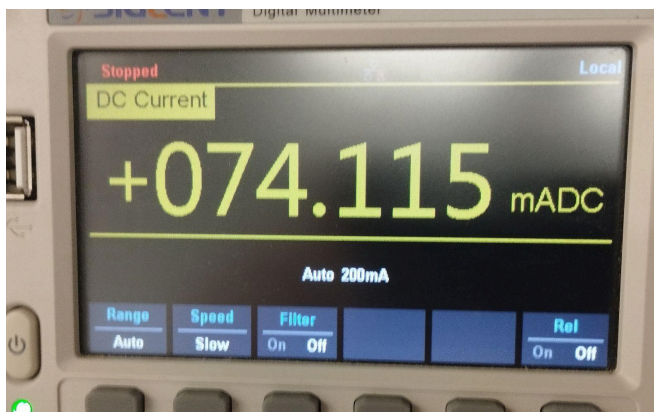
Voltaje de alimentación (conectado al pin 5V del arduino uno)



Corriente mínima modo Normal



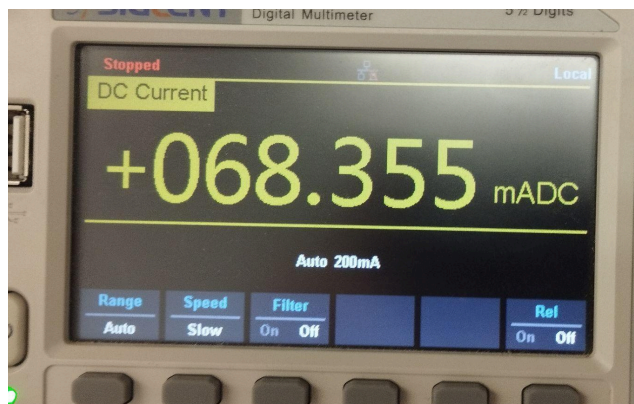
Corriente maxima modo Normal



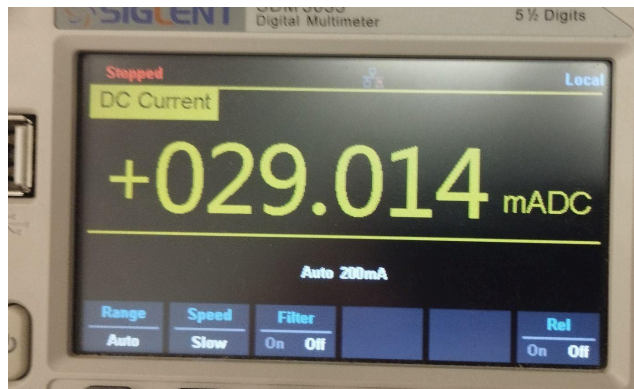
Corriente mínima modo IDLE



Corriente máxima modo IDLE



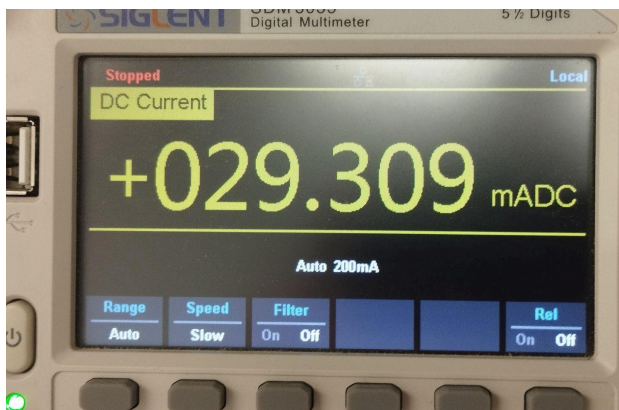
Corriente mínima modo POWER DOWN



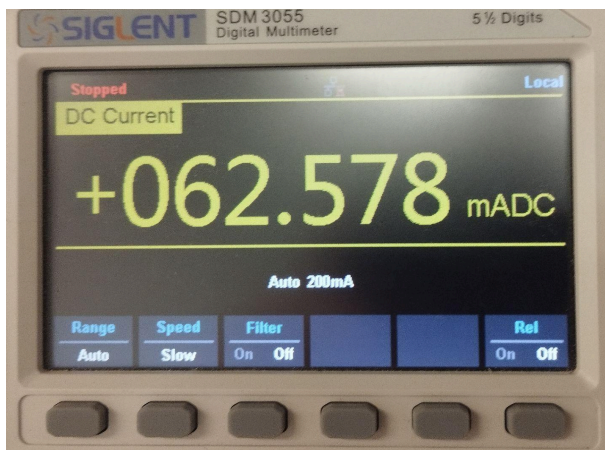
Corriente maxima modo POWER DOWN



Corriente mínima modo STANDBY



Corriente maxima modo STANDBY



## ECUACION I\_PROM

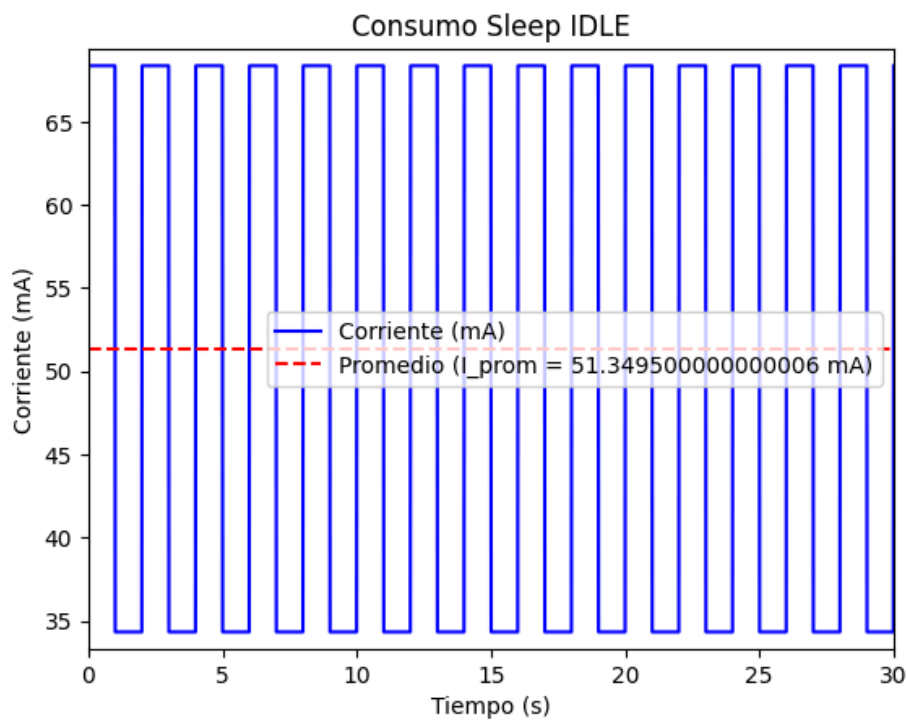
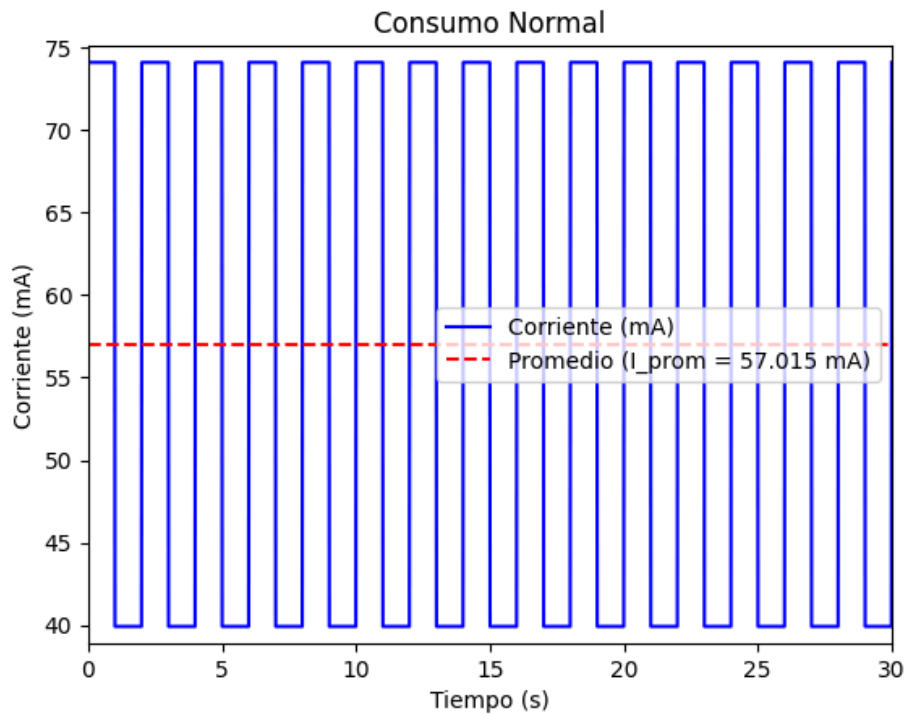
$$I_{prom} = \frac{I1 * t1 + I2 * t2}{t1 + t2}$$

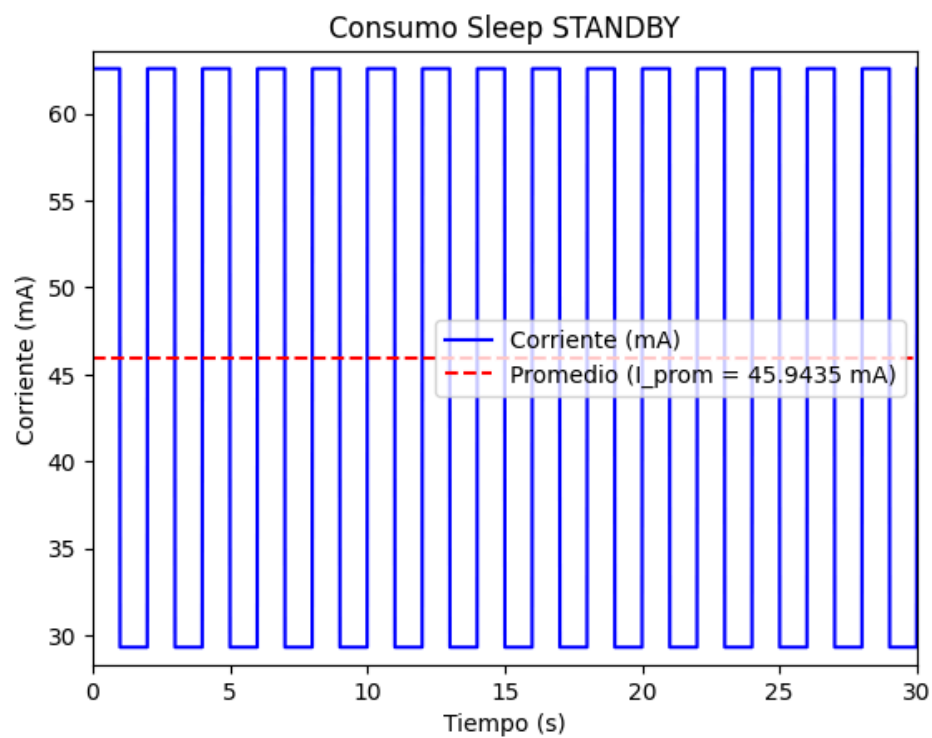
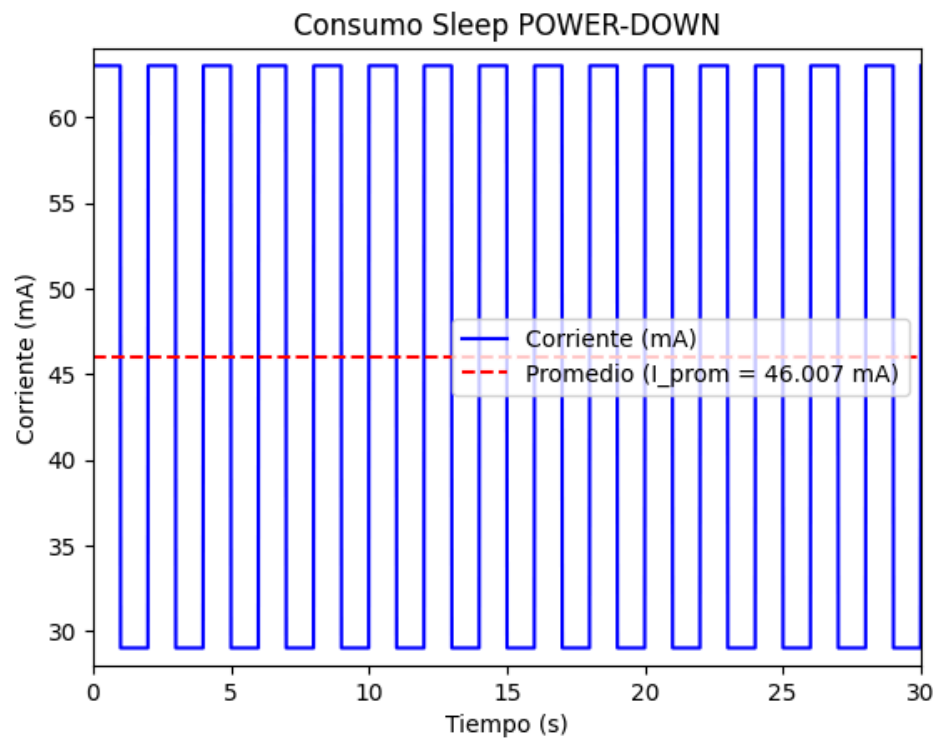
$$t1=t2$$

$$I_{prom} = \frac{t*(I1 + I2)}{2t}$$

$$I_{prom} = \frac{(I1 + I2)}{2}$$

# GRAFICAS





## CALCULOS

### Consumo Normal

Consumo = 57mAh

Capacidad de la batería = 57mAh\*4h = 228mAh

Energía en 30 segundos = 57mA\*5v\*30s = 8.55J

### Consumo modo sleep IDLE

Consumo = 51.3mAh

Capacidad de la batería = 51.3mAh\*4h = 205.2mAh

Energía en 30 segundos = 51.3mA\*5v\*30s = 7.69J

### Consumo modo sleep POWER DOWN

Consumo = 46mAh

Capacidad de la batería = 46mAh\*4h = 184mAh

Energía en 30 segundos = 46mA\*5v\*30s = 6.9J

### Consumo modo sleep STANDBY

Consumo = 45.9mAh

Capacidad de la batería = 45.9mAh\*4h = 183.6mAh

Energía en 30 segundos = 45.9mA\*5v\*30s = 6.88J



## TABLA COMPARATIVA

<b>MODO</b>	<b>I_PROM</b>	<b>BATERIA</b>	<b>ENERGIA(30s)</b>
Normal	57mA	228mAh	8.55J
Sleep IDLE	51.3mA	205.2mAh	7.69J
Sleep POWER DOWN	46mA	184mAh	6.9J
Sleep STANDBY	45.9mA	183.6mAh	6.88J