GLF76121



Nano Current Consumed Integrated Load Switch with Reset Timer

Product Brief

DESCRIPTION

The GLF76121 is an ultra-efficient I_QSmart^{TM} load switch with an integrated reset timer for wearables and IoT devices.

The /SRO pin offers a true reset function enabling the load switch to completely disconnect the load from the input battery after a reasonable long delay time. After the reset period, the main switch of the GLF76121 reconnect the output load to the input battery for normal operation. The GLF76121 offers 6 second delay time before the 750 ms reset duration.

The ultra-low I_Q enables direct interface to lower voltage chipset without any external circuit and maintains lower power consumption. The OFF input pin allows the GLF76121 to achieve complete shutdown with total downstream standby current of 7 nA typical. With the switch placed between a battery and system, this switch can help to significantly extend system battery life in mobile devices during shipping or periods of extended off time.

The GLF76121 help to reduce power consumption with the best in class R_{ON} and a breakthrough on state I_Q of only 7nA typical when the switch is on.

The GLF76121 integrated 1ms slew rate control can also enhance system reliability by mitigating bus voltage swings during switching events. Where uncontrolled switching can generate high inrush current that results in voltage droop and/or bus reset events, the GLF slew rate control specifically limits inrush current during turnon to minimize voltage droop. The output discharge function makes output voltage off quickly during the reset period.

The GLF76121 is available in 0.97 mm x 1.47 mm x 0.55mm wafer level chip scale package (WLCSP).

FEATURES

Ultra-Low I_{SD}: 7 nA Typ @ 3.6 VBAT
Ultra-Low I_Q: 7 nA Typ @ 3.6 VBAT
Low R_{ON}: 34 mΩ Typ @ 3.6 VBAT

• І_{оит} Мах : 2 А

Supply Voltage Range: 2.5 V to 5.5 V

6 Vabs max

• Reset Delay Time (/SRO Hold Time): 6 s

Reset Pulse Period: 750 ms

Turn-Off Delay Time: 6 s

Controlled Output Rise Time: 1 ms at 3.6 VBAT

 Integrated Output Discharge Switch When Disabled

Operating Temperature Range: -40 to 85 °C

HBM: 6 kV, CDM: 2 kV

Ultra-Small: 0.97 mm x 1.47 mm WLCSP

APPLICATIONS

Wearables

IoT Devices

Medical Devices

PACKAGE



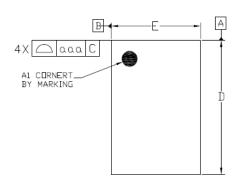


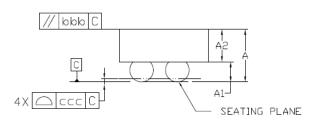
TOP VIEW

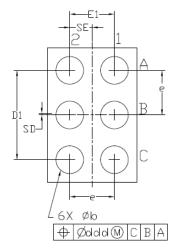
BOTTOM VIEW

0.97 mm x 1.47 mm x 0.55 mm WLCSP

PACKAGE OUTLINE







Dimensional Ref.									
REF.	Min.	Nom.	Max.						
Α	0.500	0.550	0.600						
A1	0.225	0.250	0.275						
A2	0.275	0.300	0.325						
D	1.460	1.470	1.485						
E	0.960	0.970	0.985						
D1	0.950	1.000	1.050						
E1	0.450	0.500	0.550						
Ь	0.260	0.310	0.360						
е	0.500 BSC								
SD	0.000 BSC								
SE	0.250 BSC								
Tol. of Form&Position									
999	0.10								
bbb	0.10								
333	0.05								
ddd	0.05								

Notes

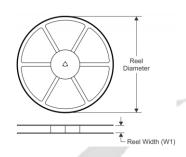
- 1. ALL DIMENSIONS ARE IN MILLIMETERS (ANGLES IN DEGREES).
- 2. DIMENSIONING AND TOLERANCING PER ANSI Y14.5M-1994.

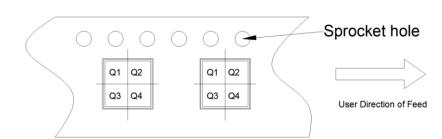
R

TAPE AND REEL INFORMATION

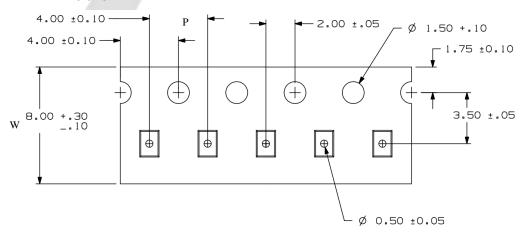
REEL DIMENSIONS

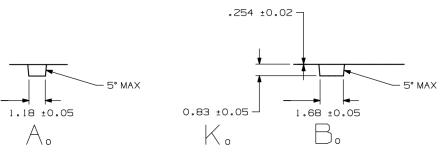
QUADRANT ASSIGNMENTS PIN 1 ORIENTATION TAPE





TAPE DIMENSIONS





Device	Package	Pins	SPQ	Reel Diameter(mm)	Reel Width W1	Α0	В0	KO	Р	w	Pin1
GLF76121	WLCSP	6	3000	180	9	1.18	1.68	0.83	4	8	Q1

Remark:

- A0: Dimension designed to accommodate the component width
- B0: Dimension designed to accommodate the component length
- C0: Dimension designed to accommodate the component thickness
- W: Overall width of the carrier tape
- P: Pitch between successive cavity centers

单击下面可查看定价,库存,交付和生命周期等信息

>>GLF(杰夫微)