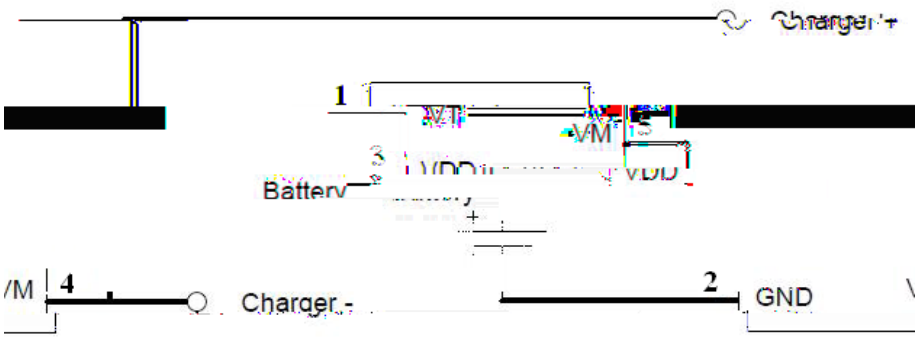
BRCL3230EME / BRCL3230EME
MOSFET
BRCL3230EME SOT23-5
BRCL3230EME

The BRCL3230EME series product is a high integration solution for lithium-lion/polymer battery protection.BRCL3230EME contains advanced power MOSFET, high-accuracy voltage detection circuits and delay circuits.
BRCL3230EME is put into an ultra-small SOT23-5 package makes it an ideal solution in limited space



(1)

(2)

Notes

/Parameter	/Symbol	/Value	/Unit

Equivalent FET on Resistance

/ Functional Description

BRCL3230EME

MOSFET

25mΩ

The BRCL3230EME monitors the voltage and current of a battery and protects it from being damaged due to overcharge voltage, overdischarge voltage, overdischarge current, and short circuit conditions by disconnecting the battery from the load or charger. The peripheral circuit is very simple. The MOSFET is integrated and its $R_{DS(ON)}$ is as low as 25mΩ typical.

/ Normal Operating mode

If no exception condition is detected, charging and discharging can be carried out freely. This condition is called the normal operating mode.

/ Overcharge Condition

VCU ,

TCU BRCL3230EME FET

1 VCL BRCL3230EME

2 BRCL3230EME

VM 0.7V

BRCL3230EME VCU

VCU BRCL3230EME VCU

VCU

VM 1

VCU VCU

1 2 VCU

1 2

/ Overcharge Condition

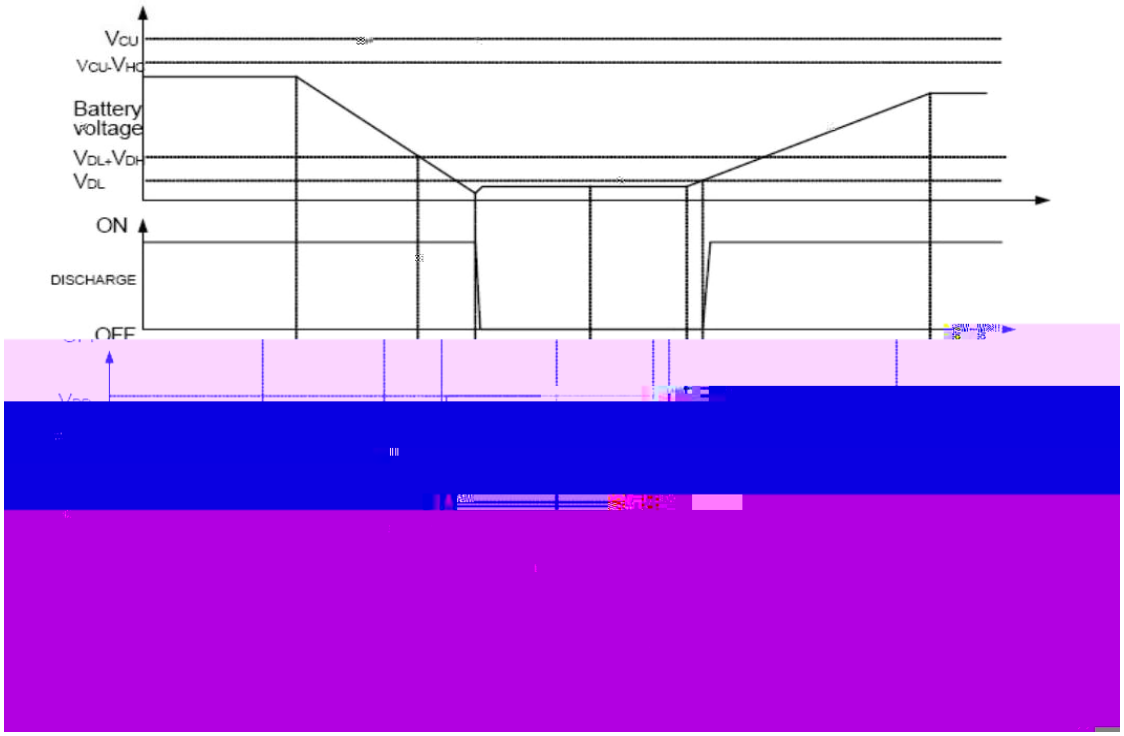
The BRCL3230EME detects this voltage and releases the overcharge condition. Consequently, in the case that the battery voltage is equal to or lo

BRCL3230EME

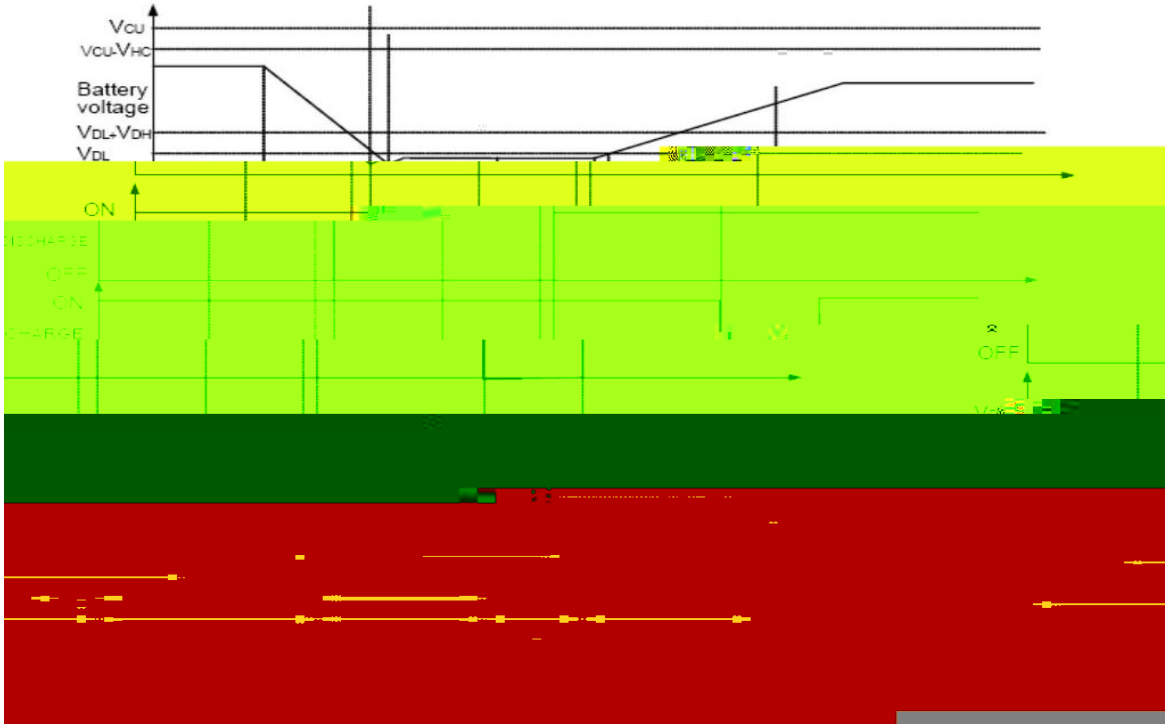
0V / 0V Battery Charging Function

/ Timing Chart

/Charger Detection

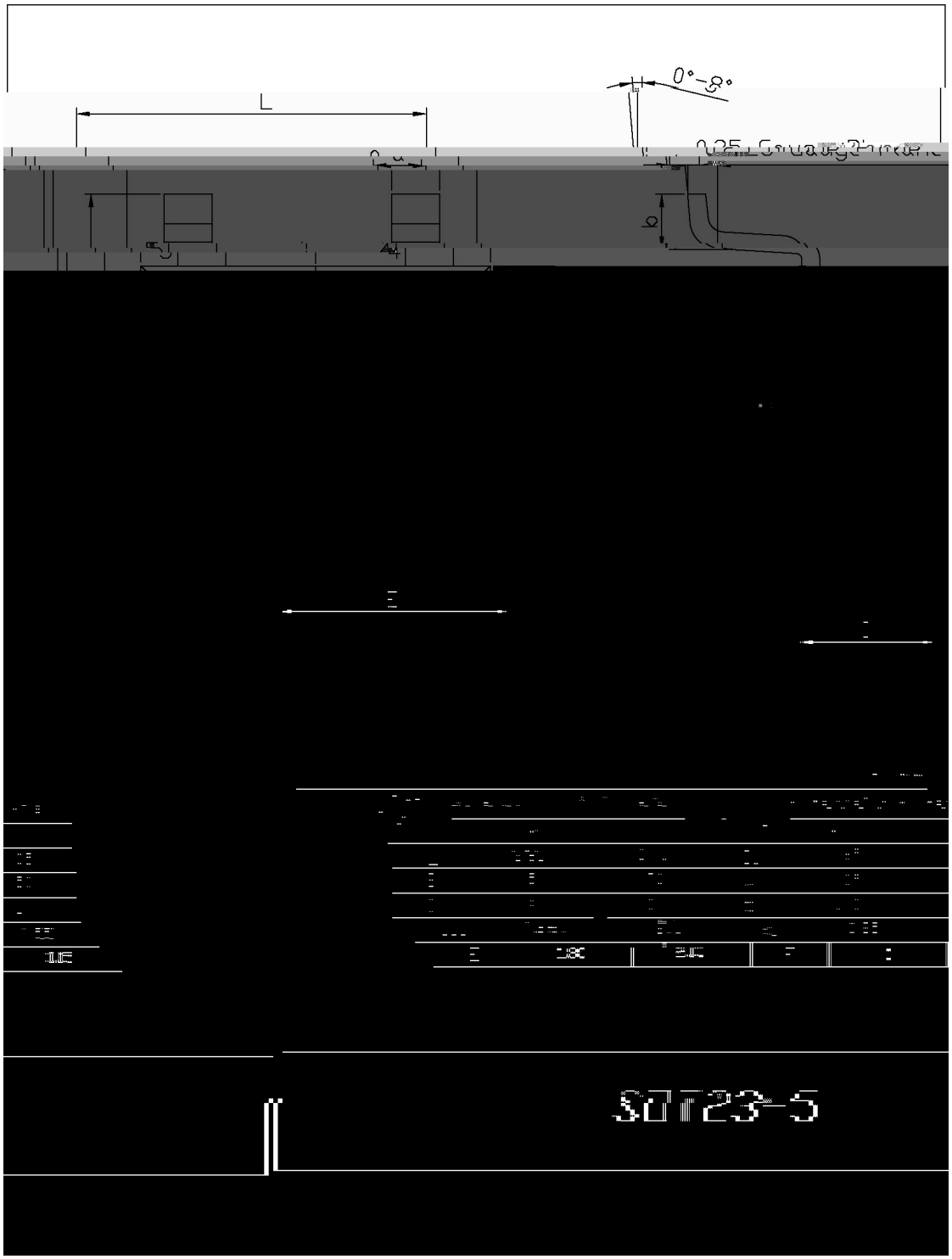


/Abnormal Charge Detection

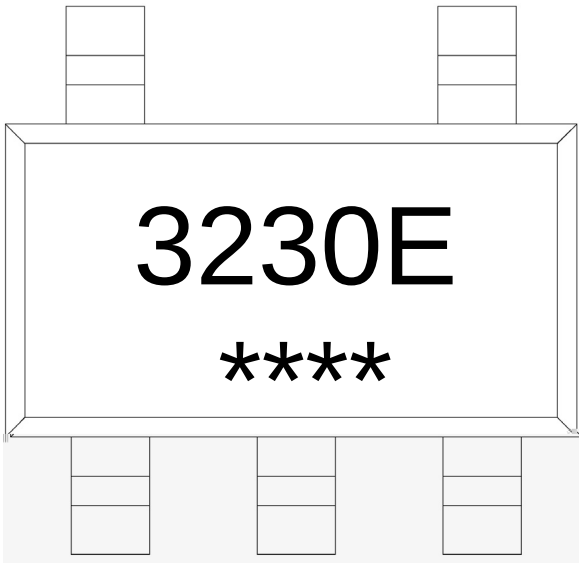


Notes: (1) Normal condition (2) Overcharge voltage condition (3) Overdischarge voltage condition (4) Overcurrent condition

/ Package Dimensions



/ Marking Instructions



3230E

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Note:

3230E:	Product Type.
****:	Lot No. Code, code change with Lot No.

( ) / Temperature Profile for IR Reflow Soldering(Pb-Free)