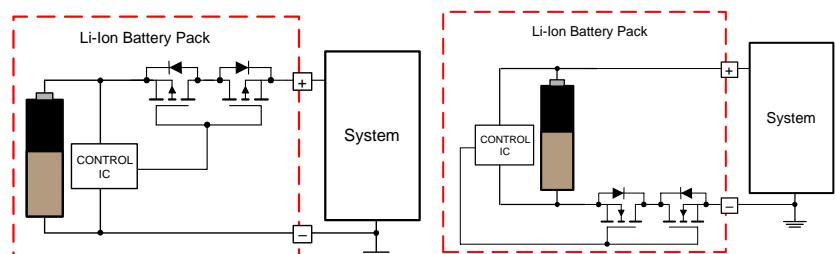


## The Best MOSFET for Li-ion Battery Protection

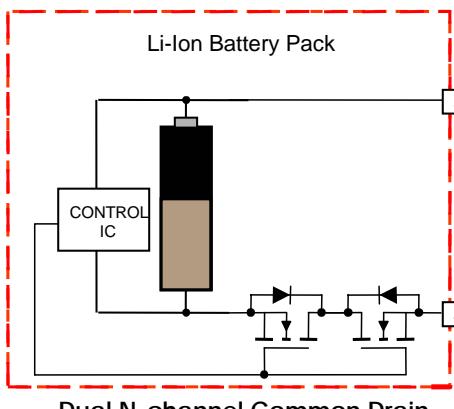


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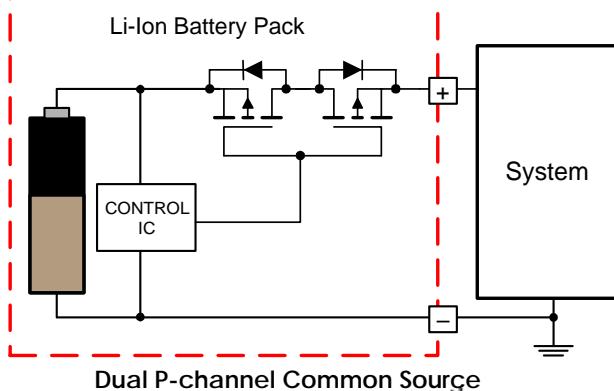
May.10<sup>th</sup> 2006



# Battery Isolation



Dual N-channel Common Drain



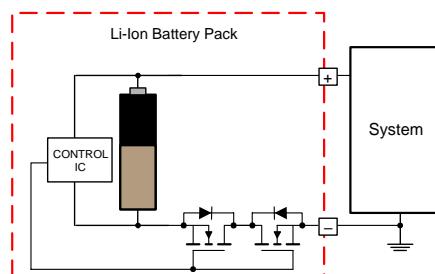
Dual P-channel Common Source

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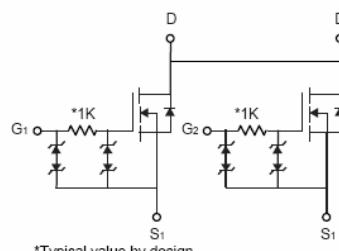
## Common-Drain MOSFET For Li-Ion Battery

- CEJ8218 (\*Pin-Pin compare ECH8601)
  - The MOSFET
    - $V_{DSS} = 20$  Volt
    - $R_{DS} = 23 \text{ m}\Omega @ 4.5 \text{ V}_{GS}$
    - $R_{DS} = 34 \text{ m}\Omega @ 2.5 \text{ V}_{GS}$
  - The Package
    - J-Lead 8 (\*Same package with ECH8601 )
    - Common-Drain
    - Isolated drain and source pins
    - Lead-free package
    - ESD protection

Released! Samples with ESD  
available NOW



J-Lead



\*Typical value by design

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# Common-Drain MOSFET For Li-Ion Battery

- CEG8208

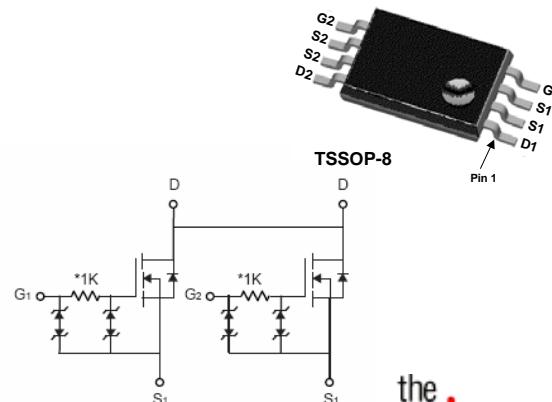
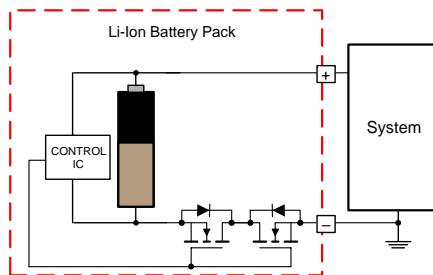
- The MOSFET

- $V_{DSS} = 20$  Volt
  - $R_{DS} = 22 \text{ m}\Omega @ 4.5 V_{GS}$
  - $R_{DS} = 32 \text{ m}\Omega @ 2.5 V_{GS}$

- The Package

- TSSOP-8
  - Common-Drain
  - Isolated drain and source pins
  - Lead-free package
  - ESD protection

**Released! Samples with ESD available NOW**



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# Common-Drain MOSFET For Li-Ion Battery

- CEG8205A

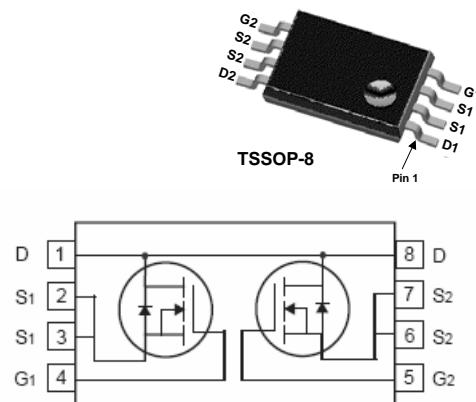
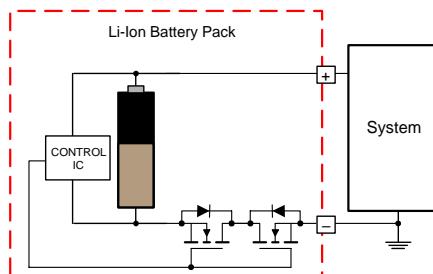
- The MOSFET

- $V_{DSS} = 20$  Volt
  - $R_{DS} = 27.5 \text{ m}\Omega @ 4.5 V_{GS}$
  - $R_{DS} = 35.5 \text{ m}\Omega @ 2.5 V_{GS}$

- The Package

- TSSOP-8
  - Common-Drain
  - Isolated drain and source pins
  - Lead-free product is acquired

**Part shipping in high volume!**



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## Common-Drain MOSFET For Li-Ion Battery

- CEG8205

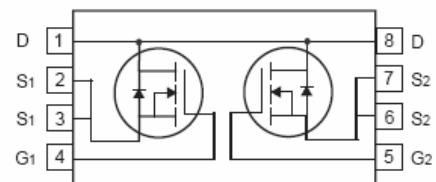
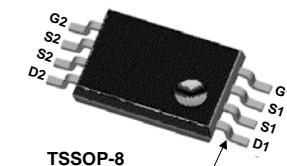
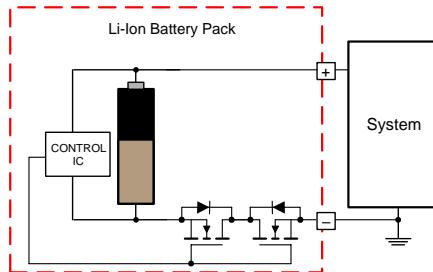
- The MOSFET

- $V_{DSS} = 20$  Volt
  - $R_{DS} = 30 \text{ m}\Omega @ 4.5 V_{GS}$
  - $R_{DS} = 40 \text{ m}\Omega @ 2.5 V_{GS}$

- The Package

- TSSOP-8
  - Common-Drain
  - Isolated drain and source pins
  - Lead-free product is acquired

**Part shipping in high volume!**



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## Dual N-Ch MOSFET For Li-Ion Battery

- CEM9926A

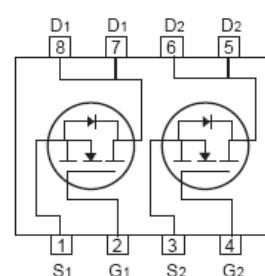
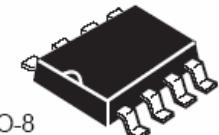
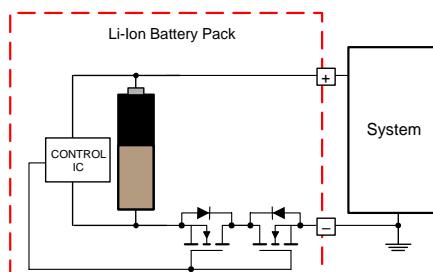
- The MOSFET

- $V_{DSS} = 20$  Volt
  - $R_{DS} = 30 \text{ m}\Omega @ 4.5 V_{GS}$
  - $R_{DS} = 40 \text{ m}\Omega @ 2.5 V_{GS}$

- The Package

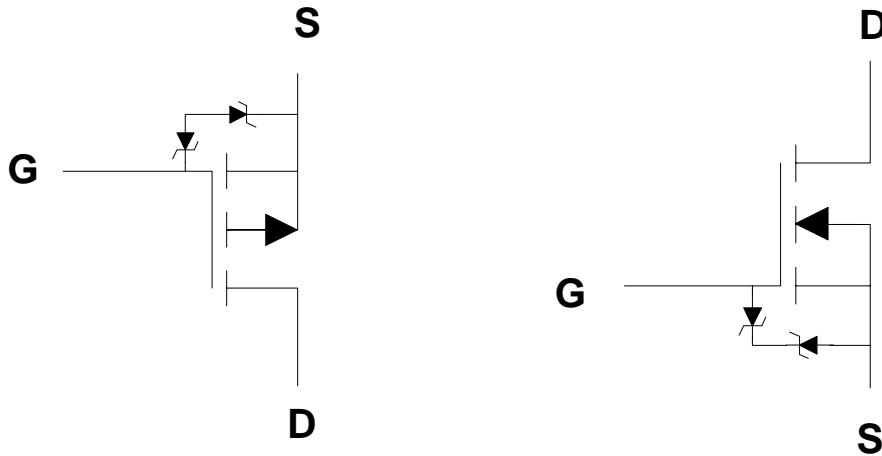
- SOIC-8
  - Isolated drain and source pins
  - Lead-free product is acquired

**Part shipping in high volume!**



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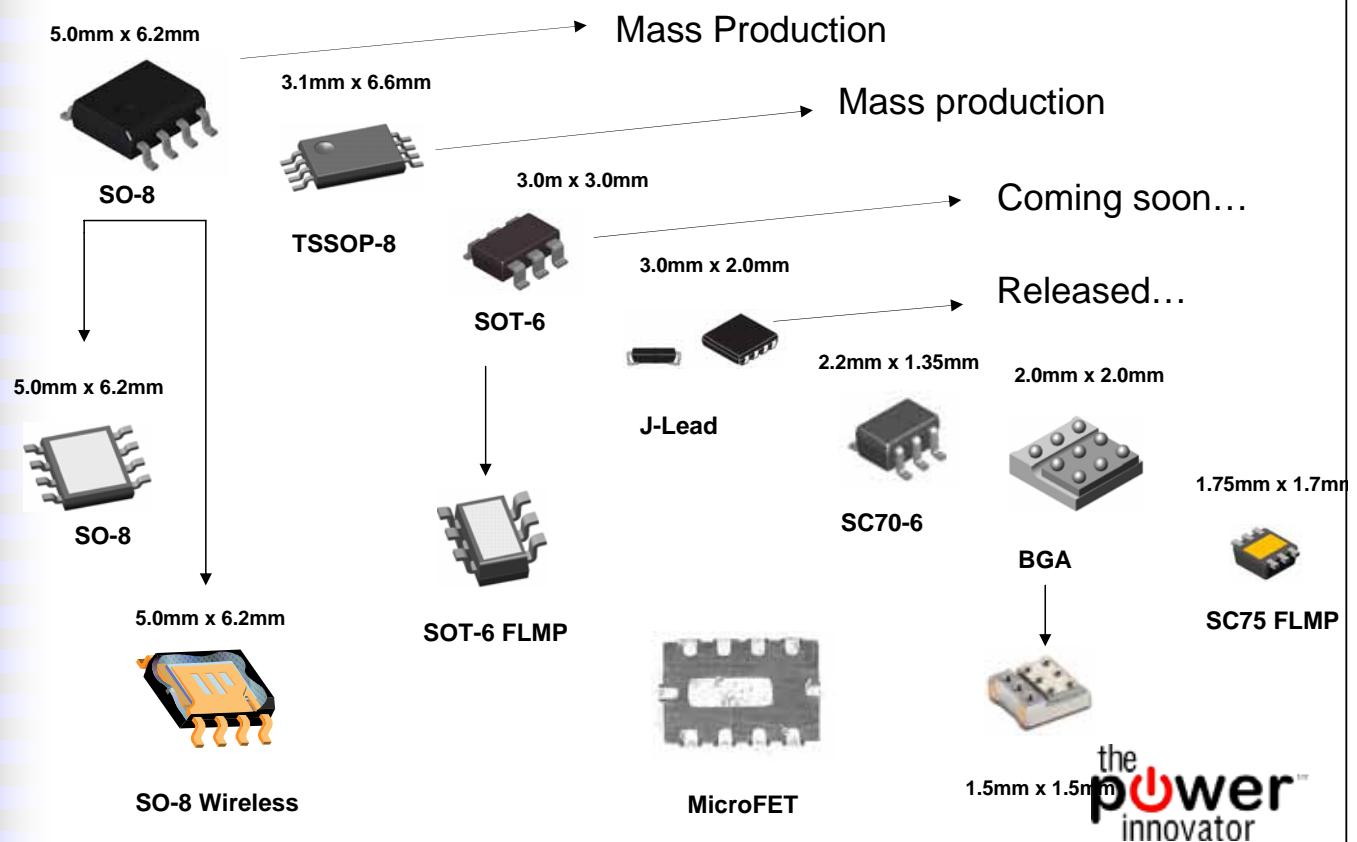
# ESD Gate Protection



- 2000 V ESD Gate protection process for TSSOP & J-Lead package
- CEG8208 /CEJ8218 released already.....

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## Packaging Roadmap



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# Cross Reference

CET Part	Fairchild	Sanyo	AOS	Vishay	Toshiba	ST Micro	Samhop
CEM9926A	FDS9926A	■	AO9926	SI9926A	■	■	SDM9926
CEG8205	FDW9926A	■	AO8822	■	TPCS8200	STC5NF20V	SDG8204
CEG8205A	FDW2512NZ	FDT2011	AO8822	SI4966	TPCS8205	STC5NF20V	SDG8204
	FDW2515NZ				TPCS8208	STC6NF30V	
CEJ8218	FDC6000NZ	ECH8601	■	■	■	■	■
CEG8208	FDW2509NZ	FDT2017	AO8810	SI6968	TPCS8212	■	STG8206
	FDW2511NZ						

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