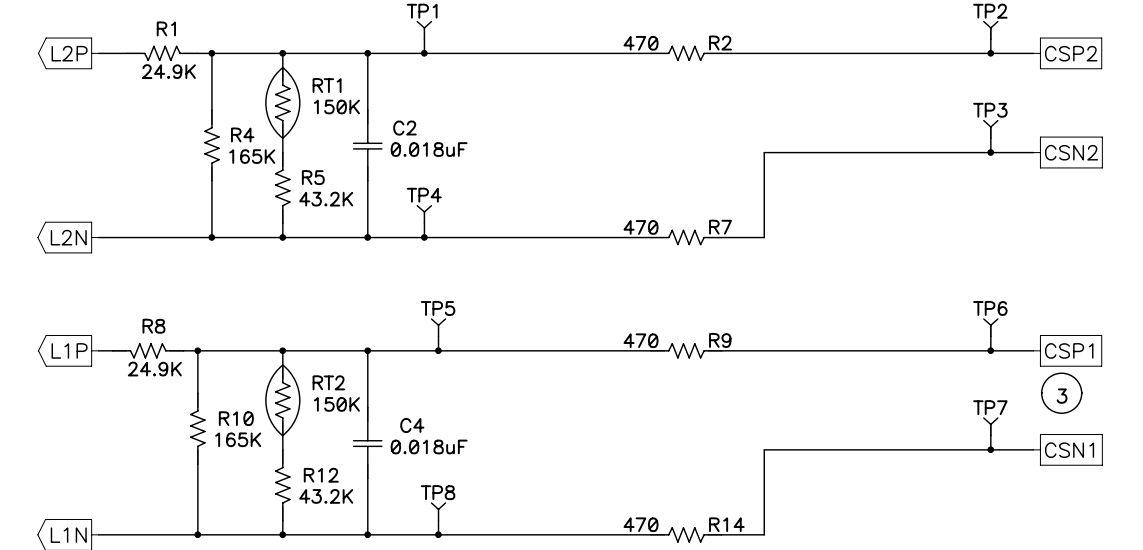


Current Feedback Selection and Filtering



C100, R100, C101, R101 added in Test July 13 to dampen 100MHz ringing: Needed in "noise sensitive" applications

Best part for L1 & L2 is IHLP4040DZERR56M01 but was not available for Test

July 16, 2010  
R17 and R19 increased from zero ohms to 5.6 to slow down turn on of hi side FETs to reduce max Vds on low side FETs from 29V to 20V.

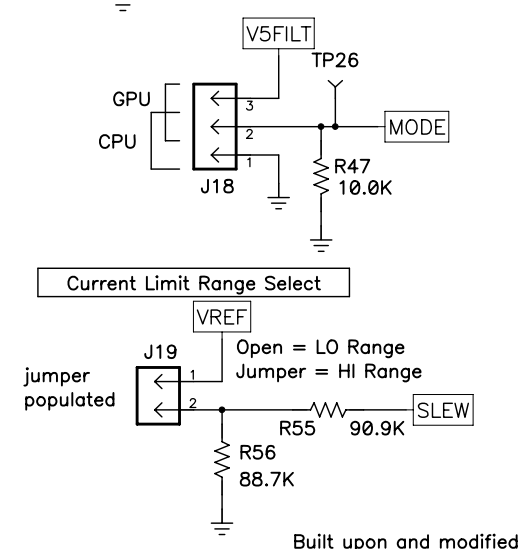
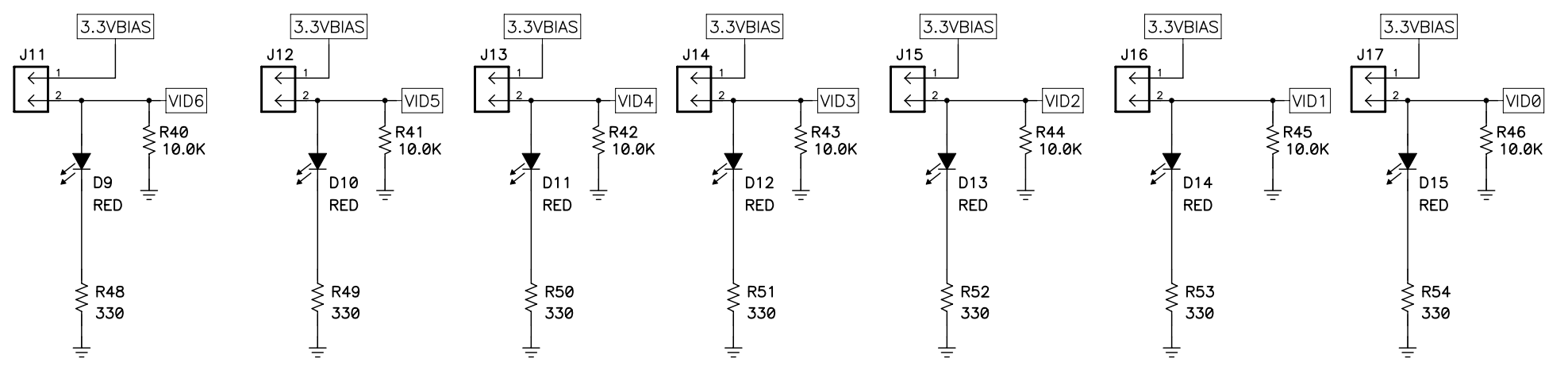
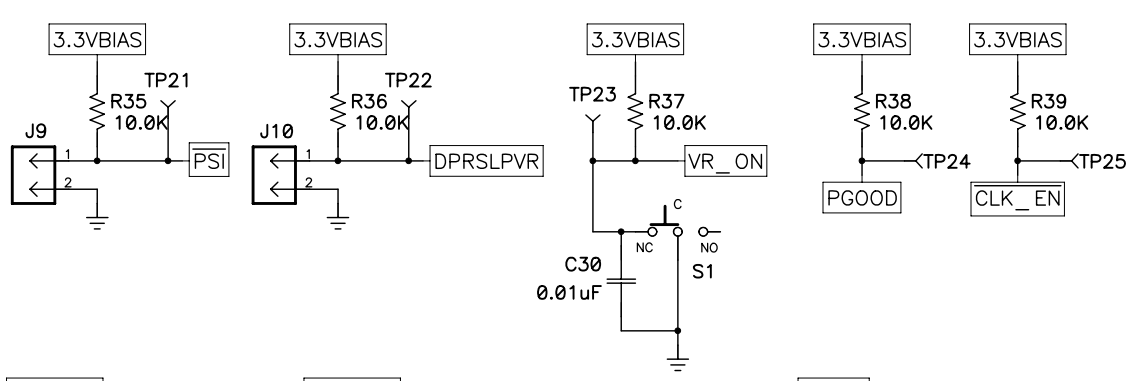
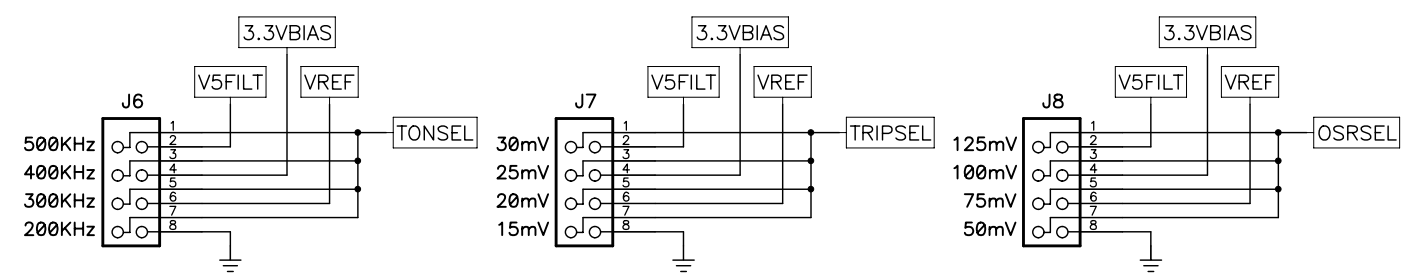
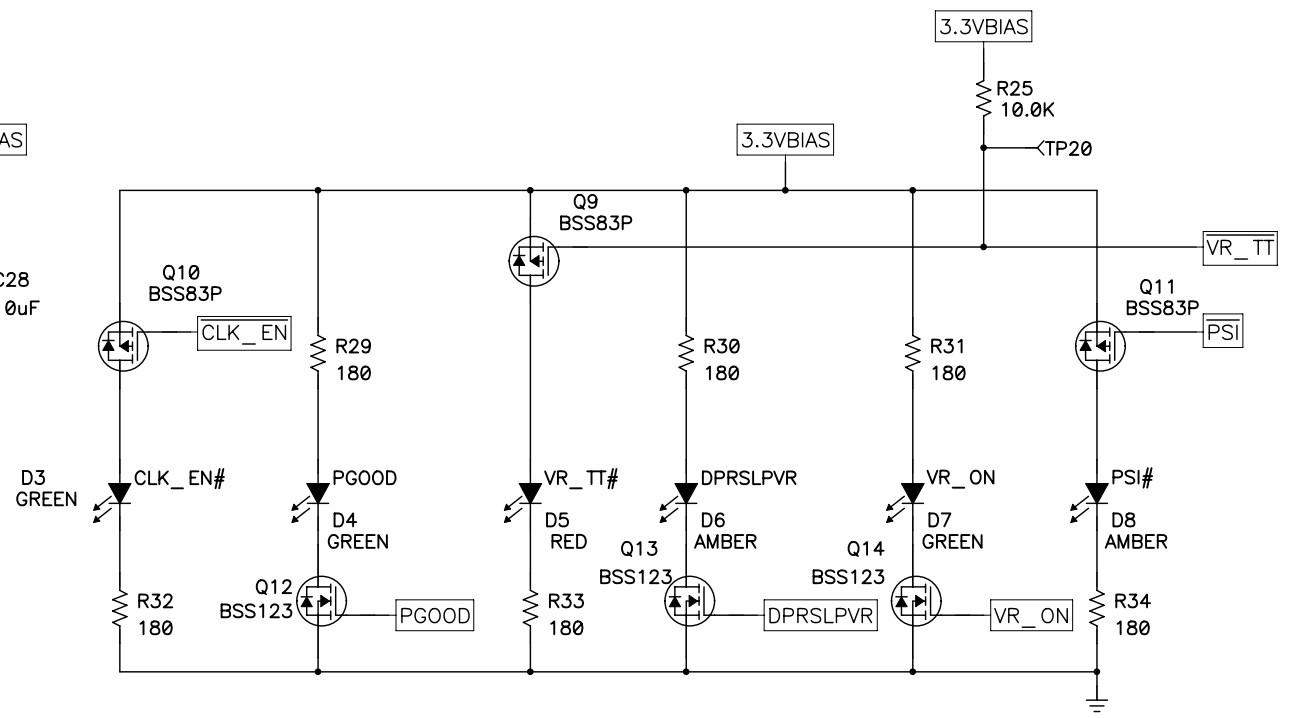
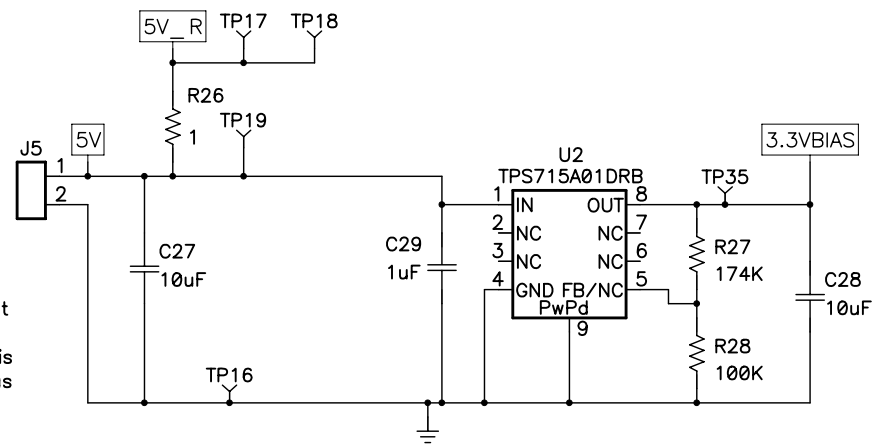
Updates from EVM:  
R24, R15, L1, L2 add J19 jumper

Built upon and modified from HPA-470

Tested: See Test and Thermal reports

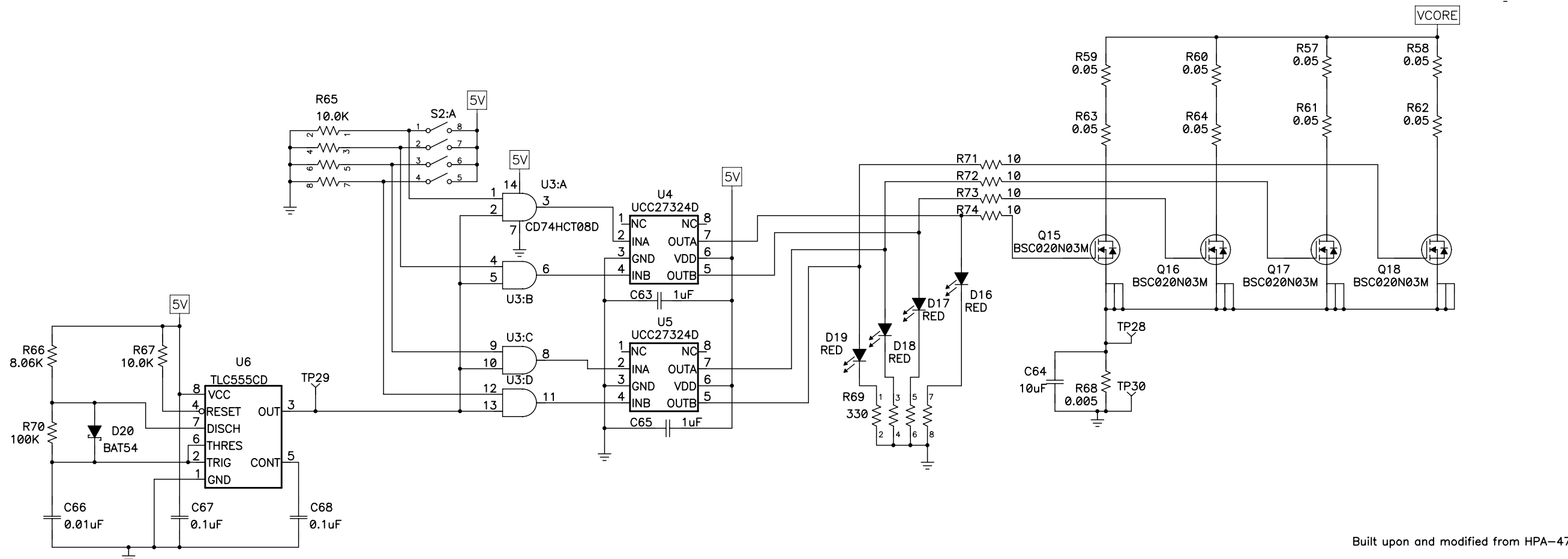
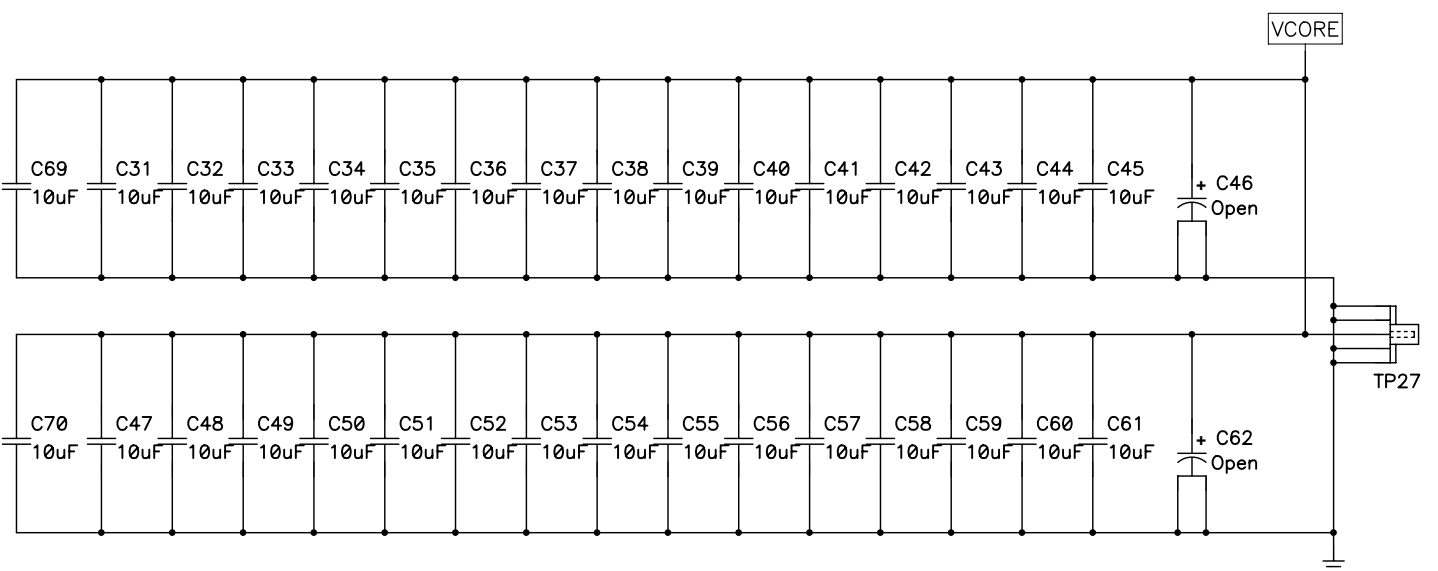
Title TPS51621 2 phase; 48A EVM		
Size C	Number PMP5800	Rev A
Date July 16, 2010		Drawn by Josh Mandelcorn
Filename PMP5800_revA.sch		Sheet 1 of 3

- Design Notes:**
1. TONSEL = VREF
  2. TRIPSEL = V5FILT
  3. OSRSEL = 3.3VBIAS
  4. RATE = Float J10
  5. PCNT = Tie to 3.3V on turn-on of the IC.  
After turn-on, 3.3V equals 2-phase and AGND equals single phase.
  6. THRM & THAL# pins = THRM is used for remote temperature sensing.  
THAL# is an open drain output alarm for the THRM pin. If remote temperature sensing is not needed, leave both pins as no connects.



Built upon and modified from HPA-470

Title TPS51621 2 phase; 48A EVM		
Size C	Number PMP5800	Rev A
Date July 16, 2010		Drawn by Josh Mandelcorn
Filename PMP5800_revA.sch		Sheet 2 of 3



Built upon and modified from HPA-470

Title TPS51621 2 phase; 48A EVM		
Size C	Number PMP5800	Rev A
Date July 16, 2010	Drawn by Josh Mandelcorn	
Filename PMP5800_revA.sch	Sheet 3 of 3	

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Interface	<a href="http://interface.ti.com">interface.ti.com</a>	Energy	<a href="http://www.ti.com/energy">www.ti.com/energy</a>
Logic	<a href="http://logic.ti.com">logic.ti.com</a>	Industrial	<a href="http://www.ti.com/industrial">www.ti.com/industrial</a>
Power Mgmt	<a href="http://power.ti.com">power.ti.com</a>	Medical	<a href="http://www.ti.com/medical">www.ti.com/medical</a>
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RFID	<a href="http://www.ti-rfid.com">www.ti-rfid.com</a>	Space, Avionics & Defense	<a href="http://www.ti.com/space-avionics-defense">www.ti.com/space-avionics-defense</a>
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