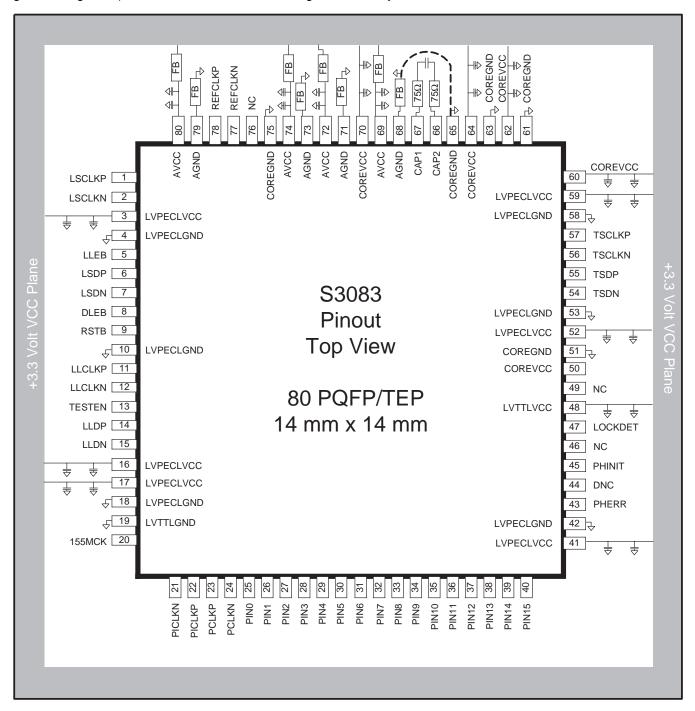


SONET/SDH/ATM S3083 EXAMPLE

The S3083 transmitter performs parallel-to-serial conversion for OC-48/STM-16 2.488 Gbit/s NRZ data. The CAP1/CAP2 capacitor should be $2.2\mu F$. The figure below illustrates the decoupling connections for the S3083 device. The ground ring is shown around the loop filter capacitor. Please note that the ring should be directly connected to the ground plane to avoid current through the ground ring. The values of the decoupling components are $0.1\mu F$ paralleled with 100pF, X7R dielectric, EIA sizes 0603 and 0805. Ferrite Bead Inductors are murata BLM31B601S or equivalent. All grounds must be tied directly to ground plane. (Note: Do not daisy chain grounds together.) AGND/GND should be tied to ground directly or via ferrites as shown.



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