

NXP brings GaN technology mainstream

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At IMS2011 this week, NXP Semiconductors N.V. is showcasing a live demo of its next-generation products based on Gallium Nitride (GaN) technology.

The GaN demo includes a 50-W wideband amplifier, the CLF1G0530-50, covering 500 to 3000 MHz; 2.1-GHz and 2.7-GHz Doherty power amplifiers for base stations; and a 100-W amplifier, the CLF1G2535-100, covering 2.5 - 3.5 GHz.

NXP has developed its high-frequency, high-power GaN [process technology](#) in collaboration with United Monolithic Semiconductors and the Fraunhofer Institute for Applied [Solid State Physics](#).

NXP is now uniquely positioned as the largest [semiconductor company](#) to offer both LDMOS and GaN solutions. Engineering samples of NXP's first GaN power amplifiers are available immediately.

NXP's GaN devices are manufactured on SiC substrates for enhanced RF and thermal performance. Target end-user applications for NXP's GaN include cellular communications, wideband amplifiers, ISM, PMR, radar, avionics, RF lighting, medical, CATV and digital transmitters for cellular and broadcast.

"As GaN continues to gain traction, the entry of major semiconductor companies such as NXP helps to validate GaN as a 'technology of choice' for RF power semiconductors, and will help to accelerate broader adoption," said ABI Research director Lance Wilson.

NXP's GaN broadband power amplifiers are expected to be available for volume production at the end of 2011.

Provided by NXP

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