

Linear RF Z-MOS™

Ultra Linear Low Capacitance RF Power MOSFET

May 2003

Description

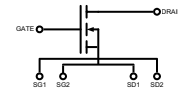
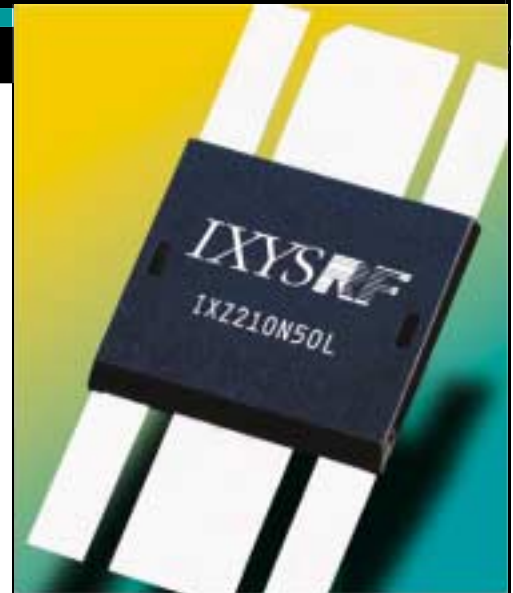
This new line of low capacitance linear RF MOSFETs are ideal for applications up to 250MHz including; 1.5T & 3T MRI, HF & VHF Base Stations and Broadcast applications.

The new linear Z-MOS™ portfolio features a BV_{DSS} voltage rating of 500V that is nearly 4 times as high as traditional RF MOSFETs. This allows for convenient higher load impedances and lower currents for a given power level. Further the combination of high performance low cost packaging combined with high voltage Z-MOS™ results in the industries lowest dollars per watt in terms of RF output power.

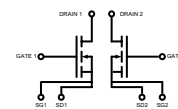
The Z-MOS™ portfolio is packaged in the low inductance, low profile, electrically isolated, surface mount DE275 and DE275X2 packages. The matched thermal coefficient of expansion between the aluminum nitride substrate and the Z-MOS™ die results in improved reliability and power cycling performance.

Advantages

- Low inout Capacitance >650pF
- High Break Down Voltage ($BV_{DSS} = 500V$)
- Low cost, high performance plastic package
- Low thermal resistance



IXZ210N50L



IXZ2210N50L

SUMMARY TABLE

Part Type	BV_{DSS}	Operating Voltage	CISS	Configuration	Pout	Frequency
IXZ210N50L	500 V	150V	625pF	Single Ended	150W	175MHz
IXZ2210N50L	500 V	150V	625pFx2	Push-Pull	300W	175MHz