Abstracts

Design of an electronically-steerable phased array for wireless power transmission using a magnetron directional amplifier

M.C. Hatfield and J.G. Hawkins. "Design of an electronically-steerable phased array for wireless power transmission using a magnetron directional amplifier." 1999 MTT-S International Microwave Symposium Digest 99.1 (1999 Vol. I [MWSYM]): 341-344 vol.1.

A conventional microwave oven magnetron may be converted into a high gain amplifier with independent frequency, phase and amplitude control. From this building block, a phased array for wireless power transmission may be constructed. Using the design approach detailed herein, a steerable beam was demonstrated at UAF in June 1998.

❑ Return to main document.