

Layout of a Broadband Circular Waveguide to Coaxial Transition*, F. SCHÖNFELD,

E. WEIHRETER, BESSY (Berlin, Germany);

Y.C. TSAI, K.R. CHU, Tsing Hua University,

(Hsinchu, Taiwan) - Broadband coupling of higher

order cavity modes to an external load one way to

suppress multibunch instabilities in electron storage

rings. A numerical study is presented based on the

HFSS program to simulate the transmission properties

of a circular waveguide to coaxial transition. Such a

transition combined with a coaxial broadband rf-

vacuum-window allows to place the rf-absorbing

materials outside the vacuum.

* Work supported by the Bundesministerium für Bildung, Wissenschaft, Forschung und Technologie and by the Land Berlin.