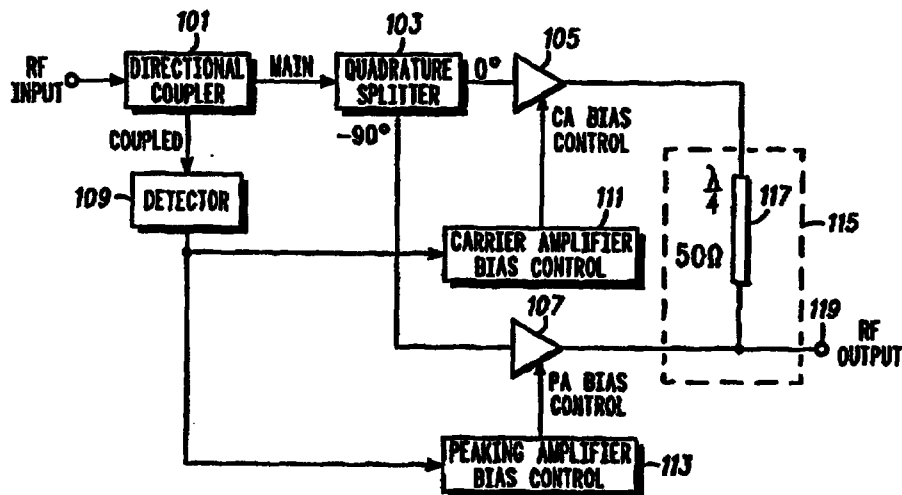


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(54) Title: **BIAS CIRCUIT FOR A POWER AMPLIFIER**

(57) Abstract

A method for amplifying an RF input signal using a power amplifier (105, 107 or 205, 207) comprises the steps of dividing or quadrature splitting (103) the RF input signal into an in-phase signal and a quadrature phase signal. A carrier amplifier bias input (111, 211) signal is varied relative to the magnitude of the RF input signal. A peaking amplifier bias input (113, 213) signal is varied relative to the magnitude of the RF input signal. The in-phase signal is amplified using a carrier amplifier (105, 205) to produce a first amplified signal. The quadrature phase signal is amplified using a peaking amplifier (107, 207) to produce a second amplified signal. The first amplified signal and the second amplified signal are combined (115, 117), in phase, to produce an output signal.