Matchline wedges reduce dose nonuniformities near the edges of abutting photon beams. The matchline wedge broadens the penumbra causing the *hot* or *cold* spot due to an overlap or gap between the fields to be distributed over a larger area. We have evaluated a dynamic matchline wedge (DMW) using film dosimetry. The dose distributions presented were created with experimental software provided by the linac manufacturer. This program provides control of the movement of a collimator jaw during the radiation exposure. We present dose distributions for several possible applications of DMW's including the matching of adjacent: 1) non-divergent (half-blocked) photon fields, 2) divergent photon fields, and 3) photon-electron fields. The effect of gaps and overlapping of adjacent fields is also presented. The DMW has several advantages over static versions: (1) The possibility of an error in positioning the wedge is one concern that is eliminated when using the dynamic matchline wedge. (2) Because there is no mechanical wedge to be accurately positioned, the setup time is faster. (3) With the dynamic matchline wedge it is relatively easy to tailor the DMW to the desired matchline dose distribution as opposed to having to manufacture multiple physical wedges.