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Stability of families of quasipolynomials of neutral type. (English. Russian original)

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Summary: This article investigates the stability of indefinite systems of difference and differential-difference equations of neutral type. Conditions are given for negativity of the real parts of the roots of quasipolynomials in families specified by convex polyhedra in the coefficient space.

MSC:

93C30 Control/observation systems governed by functional relations other than differential equations (such as hybrid and switching systems)

Cited in **2** Documents

93D05 Lyapunov and other classical stabilities (Lagrange, Poisson, L^p , l^p , etc.) in control theory

Keywords:

indefinite systems; differential-difference equations