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Frequently hypercyclic operators on Banach spaces

We study some properties of the dynamical system associated with a bounded operator T on a separable complex Banach space X: hypercyclicity (there exists a vector which has a dense orbit under the action of T), frequent hypercyclicity (there exists a vector x with the property that the set of integers n such that $T^n(x)$ belongs to U has positive lower density for any non empty open subset U of X), existence of gaussian measures with respect to which T defines a measure-preserving ergodic transformation, etc... We consider some extensions to the Banach space setting of results which were obtained previously in the Hilbert space setting.