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Nota di contenuto	Front matter -- Introduction -- Contents -- Chapter 1. Multivalued maps: general properties -- Chapter 2. Measures of noncompactness and condensing multimaps -- Chapter 3. Topological degree theory for condensing multifields -- Chapter 4. Semigroups and measures of noncompactness -- Chapter 5. Semilinear differential inclusions: initial problem -- Chapter 6. Semilinear inclusions: periodic problems -- Bibliographic notes -- Bibliography -- Index
Sommario/riassunto	The theory of set-valued maps and of differential inclusion is developed in recent years both as a field of its own and as an approach to control theory. The book deals with the theory of semilinear differential inclusions in infinite dimensional spaces. In this setting, problems of interest to applications do not suppose neither convexity of the map or compactness of the multi-operators. These assumption implies the development of the theory of measure of noncompactness and the construction of a degree theory for condensing mapping. Of particular interest is the approach to the case when the linear part is a generator of a condensing, strongly continuous semigroup. In this context, the existence of solutions for the Cauchy and periodic problems are proved as well as the topological properties of the

solution sets. Examples of applications to the control of transmission line and to hybrid systems are presented.
