

The monograph gives a comprehensive exposition of this beautiful theory. Most of the results are in book form for the first time. It is well written and clearly presented. The author has tried to make it as self-contained as possible by including some introduction to the dilation theory and functional model of contractions. Each chapter starts with a lucid summary of what is to come and each section ends with a set of well-chosen exercises. It can serve as a graduate textbook after a standard functional analysis course, a book for seminar topics or a monograph for research reference. It is also a stepping stone toward a better understanding of Sz.-Nagy and Foiaş' contraction theory as presented in [5].

The reviewer noticed relatively few misprints. Some discrepancies of the terminology do occur: antilinear map (p. 37) is the same as conjugate linear map (p. 64); $\{T\}''$ (p. 74) has been called double commutant (p. 182) and bicommutant (p. 227). To the references he would suggest to add [1, 3, and 6].

In summary, the author has done an outstanding job presenting a part of operator theory which, because of its intrinsic interest and potential applications to systems theory, deserves more attention among practitioners in this field.

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BULLETIN (New Series) OF THE
AMERICAN MATHEMATICAL SOCIETY
Volume 21, Number 1, July 1989
©1989 American Mathematical Society
0273-0979/89 \$1.00 + \$.25 per page

Stratified Morse theory, by M. Goresky and R. MacPherson. Springer-Verlag, Berlin, Heidelberg, New York, 1988, xiv + 272 pp., \$75.00. ISBN 3-540-17300-5

An important tool in the investigation of the topology of a differentiable manifold M is the classical Morse theory. Given a Morse function ϕ , i.e., a proper differentiable function $\phi: M \rightarrow \mathbf{R}$, bounded from below and