

Differential Analysis on Complex Manifolds

In developing the tools necessary for the study of complex manifolds, this comprehensive, well-organized treatment presents in its opening chapters a detailed survey of recent progress in four areas: geometry (manifolds with vector bundles), algebraic topology, differential geometry, and partial differential equations. Subsequent chapters then develop such topics as Hermitian exterior algebra and the Hodge *-operator, harmonic theory on compact manifolds, differential operators on a Kahler manifold, the Hodge decomposition theorem on compact Kahler manifolds, the Hodge-Riemann bilinear relations on Kahler manifolds, Griffiths's period mapping, quadratic transformations, and Kodaira's vanishing and embedding theorems.

The third edition of this standard reference contains a new appendix by Oscar Garcia-Prada which gives an overview of the developments in the field during the decades since the book appeared.

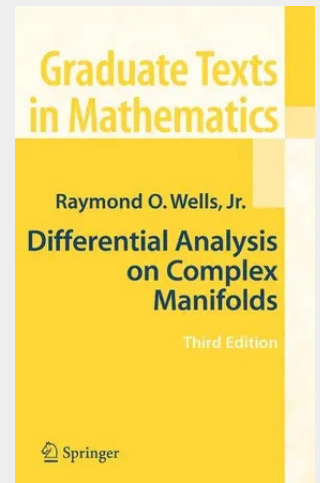
From a review of the 2nd Edition:

"...the new edition of Professor Wells' book is timely and welcome...an excellent introduction for any mathematician who suspects that complex manifold techniques may be relevant to his work."

Nigel Hitchin, Bulletin of the London Mathematical Society

"Its purpose is to present the basics of analysis and geometry on compact complex manifolds, and is already one of the standard sources for this material."

In developing the tools necessary for the study of complex manifolds, this comprehensive, well-organized treatment presents in its opening chapters a detailed survey of recent progress in four areas: geometry (manifolds with vector bundles), algebraic topology, differential geometry, and partial differential equations. Subsequent chapters then develop such topics as Hermitian exterior algebra and the Hodge *-operator, harmonic theory on compact manifolds, differential operators on a Kahler manifold, the Hodge decomposition theorem on compact Kahler manifolds, the Hodge-Riemann bilinear relations on Kahler manifolds, Griffiths's period mapping, quadratic transformations, and Kodaira's vanishing and embedding theorems. The third edition of this standard reference contains a new appendix by Oscar Garcia-Prada which gives an overview of the developments in the field during the decades since the book appeared. From a review of the 2nd Edition: „the new edition of Professor Wells' book is timely and welcome...an excellent introduction for any mathematician who suspects that complex manifold techniques may be relevant to his work.“ Nigel Hitchin, Bulletin of the London Mathematical Society „Its purpose is to present the basics of analysis and geometry on compact complex manifolds, and is already one of the standard sources for this material.“



52,38 €

48,95 € (zzgl. MwSt.)

Lieferfrist: bis zu 10 Tage

Artikelnummer: 9780387738918

Medium: Buch

ISBN: 978-0-387-73891-8

Verlag: Humana

Erscheinungstermin: 31.10.2007

Sprache(n): Englisch

Auflage: Third Auflage 2008

Serie: Graduate Texts in Mathematics

Produktform: Gebunden

Gewicht: 641 g

Seiten: 299

Format (B x H): 160 x 241 mm

