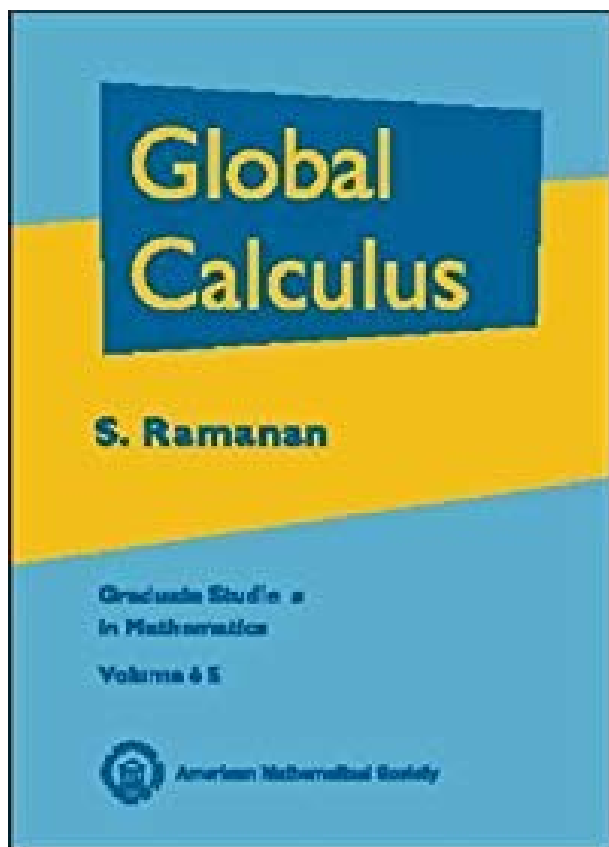


Global Calculus.



Published:	October 3rd 2005 by American Mathematical Society
ISBN10:	0821837028
Author:	S. Ramanan
Genre:	Uncategorized
Pages:	316
Language	English
Goodreads Rating:	5.00
ISBN13:	9780821837023

[Global Calculus..pdf](#)

[Global Calculus..epub](#)

The power that analysis, topology and algebra bring to geometry has revolutionized the way geometers and physicists look at conceptual problems. Some of the key ingredients in this interplay are sheaves, cohomology, Lie groups, connections and differential operators. In *Global Calculus*, the appropriate formalism for these topics is laid out with numerous examples and applications by one of the experts in differential and algebraic geometry. Ramanan has chosen an uncommon but natural path through the subject. In this almost completely self-contained account, these topics are developed from scratch. The basics of Fourier transforms, Sobolev theory and interior regularity are proved at the same time as symbol calculus, culminating in beautiful results in global analysis, real and complex. Many new perspectives on traditional and modern questions of differential analysis and geometry are the hallmarks of the book. The book is suitable for a first year graduate course on global analysis.