



Climate Dynamics

By Kerry Harrison Cook

Princeton University Press. Hardback. Book Condition: new. BRAND NEW, Climate Dynamics, Kerry Harrison Cook, Climate Dynamics is an advanced undergraduate-level textbook that provides an essential foundation in the physical understanding of the earth's climate system. The book assumes no background in atmospheric or ocean sciences and is appropriate for any science or engineering student who has completed two semesters of calculus and one semester of calculus-based physics. Describing the climate system based on observations of the mean climate state and its variability, the first section of the book introduces the vocabulary of the field, the dependent variables that characterize the climate system, and the typical approaches taken to display these variables. The second section of the book gives a quantitative understanding of the processes that determine the climate state--radiation, heat balances, and the basics of fluid dynamics. Applications for the atmosphere, ocean, and hydrological cycle are developed in the next section, and the last three chapters of the book directly address global climate change. Throughout, the textbook makes connections between mathematics and physics in order to illustrate the usefulness of mathematics, particularly first-year calculus, for predicting changes in the physical world. Climate change will impact every aspect of life in...



Reviews

Extensive information for book fans. It is writter in basic words and never hard to understand. It is extremely difficult to leave it before concluding, once you begin to read the book.

-- Otis Wisoky

This publication is great. It is full of wisdom and knowledge You will not really feel monotony at at any time of the time (that's what catalogs are for relating to when you ask me).

-- Dr. Everett Dicki DDS