

The borel–cantelli lemma / Tapas Kumar Chandra

Deskripsi Lengkap: <https://lib.ui.ac.id/detail?id=20426544&lokasi=lokal>

Abstrak

This monograph provides an extensive treatment of the theory and applications of the celebrated Borel-Cantelli Lemma. Starting from some of the basic facts of the axiomatic probability theory, it embodies the classical versions of these lemma, together with the well known as well as the most recent extensions of them due to Barndorff-Nielsen, Balakrishnan and Stepanov, Erdos and Renyi, Kochen and Stone, Petrov and the present author. The versions of the second Borel-Cantelli Lemma for pair wise negative quadrant dependent sequences, weakly \ast -mixing sequences, mixing sequences (due to Renyi) and for many other dependent sequences are all included. The special feature of the book is a detailed discussion of a strengthened form of the second Borel-Cantelli Lemma and the conditional form of the Borel-Cantelli Lemmas due to Levy, Chen and Serfling. All these results are well illustrated by means of many interesting examples. All the proofs are rigorous, complete and lucid. An extensive list of research papers, some of which are forthcoming, is provided. The book can be used for a self study and as an invaluable research reference on the present topic.