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Sommario/riassunto

The book aims to provide the reader with an updated general presentation of multiscale/multiresolution approaches in turbulent flow simulations. All modern approaches (LES, hybrid RANS/LES, DES, SAS) are discussed and recast in a global comprehensive framework. Both theoretical features and practical implementation details are addressed. Some full scale applications are described, to provide the reader with relevant guidelines to facilitate a future use of these methods.