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Autore	Zhang Matthew Huaiquan
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Nota di contenuto	Title Page; Copyright; Table of Contents; Preface; Introduction; Acknowledgments; About the Author; List of Symbols; Chapter 1: Introduction; 1.1 Wind Resource Assessment as a Discipline; 1.2 Micro- siting Briefing; 1.3 Cascade of Wind Regime; 1.4 Uncertainty of Wind Resource; 1.5 Scope of the Book; References; Chapter 2: Concepts and Analytical Tools; 2.1 Surface Roughness and Wind Profile; 2.2 Speed-up Effect of Terrain; 2.3 Shelter Effect of Obstacles; 2.4 Summary; References; Chapter 3: Numerical Wind Flow Modelling; 3.1 Modelling Concept Review; 3.2 Linearised Numerical Flow Models 3.3 Mass-Consistent Models3.4 CFD Models; 3.5 Meso Scale NWP Models; 3.6 Inherent Uncertainties in Wind Flow Modelling; 3.7 Summary; References; Chapter 4: Wind Park Physics and Micro-siting; 4.1 Wind Power Density; 4.2 Wind Power Conversion; 4.3 Wind Turbine Wake Effects; 4.4 Wind Turbine Micro-siting; 4.5 Summary; References; Chapter 5: Wind Statistics; 5.1 Statistics Concepts Review; 5.2 Wind Data Time Series; 5.3 Mean Wind Speed of the Whole Time Series; 5.4 Weibull Distribution; 5.5 Estimating Weibull Parameters; 5.6 Extreme

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