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Autore	Clayton Aubrey
Titolo	Bernoulli's fallacy : statistical illogic and the crisis of modern science / / Aubrey Clayton
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Nota di contenuto	Introduction -- 1. What is probability? -- 2. The titular fallacy -- 3. Adolphe quetelet's bell curve bridge -- 4. The frequentist jihad -- 5. The quote-unquote logic of orthodox statistics -- 6. The replication crisis/opportunity -- 7. The way out.
Sommario/riassunto	"There is a logical flaw in the statistical methods used across experimental science. This fault is not just a minor academic quibble: it underlies a reproducibility crisis now threatening entire disciplines. In an increasingly data-reliant culture, this same deeply rooted error shapes decisions in medicine, law, and public policy with profound consequences. The foundation of the problem is a misunderstanding of probability and our ability to make inferences from data. Aubrey Clayton traces the history of how statistics went astray, beginning with the groundbreaking work of the seventeenth-century mathematician Jacob Bernoulli and winding through gambling, astronomy, and genetics. He recounts the feuds among rival schools of statistics, exploring the surprisingly human problems that gave rise to the

discipline and the all-too-human shortcomings that derailed it. Clayton highlights how influential nineteenth- and twentieth-century figures developed a statistical methodology they claimed was purely objective in order to silence critics of their political agendas, including eugenics. Clayton provides a clear account of the mathematics and logic of probability, conveying complex concepts accessibly for readers interested in the statistical methods that frame our understanding of the world. He contends that we need to take a Bayesian approach-incorporating prior knowledge when reasoning with incomplete information-in order to resolve the crisis. Ranging across math, philosophy, and culture, Bernoulli's Fallacy explains why something has gone wrong with how we use data-and how to fix it"--