Not only are the frontiers of dimension theory expanding, but its foundations and principles are becoming simpler and more elegant. P. Ostrand [5] has recently developed a novel approach to the study of Lebesgue covering dimension which allows one to prove in a simple and elegant fashion many of the classical theorems in dimension theory, including the theorem that $\dim X = \operatorname{Ind} X$ for metric spaces. It seems likely that his approach will ultimately lead to a greatly simplified development for the theory of Lebesgue covering dimension. Despite the elegance and efficiency of Nagami's development I would be disappointed if future works on dimension theory do not make use of Ostrand's ideas to produce an even more exciting and transparent approach to dimension theory.

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Diffusion Processes and their Sample Paths by Kiyosi Ito and Henry P. McKean, Jr., Springer-Verlag, Berlin, 1965.

This book is an excellent illustration of the thesis that once the foundation for solving a basic problem is laid, no matter how complicated the solution may be the problem will find authors equal to the task. In the present case, the historical genesis of the problem goes back to the work of W. Feller in the early 1950's, on characterizing the most general diffusion operator in one dimension. In this work the role of probability was largely confined to motivation and the aim was to characterize certain differential operators by purely analytic axioms. At the time when Feller's treatment of the subject reached its most final form (Illinois J. Math. 1957, 1958) one finds the issue stated as that