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Everything About Kolmogorov Was Unusual...

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Andrei Nikolaevich Kolmogorov belonged to a select group of people who left one with the feeling of having touched someone unusual, someone great and extraordinary, the feeling of having met a wonder.

Everything about Kolmogorov was unusual: his entire life, his school and college years, his pioneering discoveries in many areas of mathematics and also in other disciplines, meteorology, hydrodynamics, history, linguistics and pedagogy. His interests were unusually diverse, including music, architecture, poetry and travel. His erudition was unusual; it seemed as if he had an educated opinion about everything.

His manner of talking was unusual, somewhat blurred; his walk was unusual.

One's feelings after meeting Kolmogorov, after a simple conversation with him, were unusual. One sensed that he had continuously intensive brain activity.

Kolmogorov's circle of students was unusually large. His letters to his students and friends were unusual. They contained unusual ideas and unexpected twists; they were models of letter writing.

Kolmogorov's childhood was unusual. He grew up without a mother; his mother died in childbirth. When he was five years old Kolmogorov made his first mathematical discovery: $1 = 1^2$, $1 + 3 = 2^2$, $1 + 3 + 5 = 3^2, \ldots$. He used to offer various logical and arithmetic problems to his playmates. For example, what is the number of different ways to sew on a button with four holes? These problems appeared in the house magazine *Spring Swallows*, published by Kolmogorov's aunts, who took care of his upbringing and who ran a small school for him and his friends. Kolmogorov recalled that a standard problem about the meeting point of two travelers moving at different speeds was "uninteresting from a logical point of view."

FIG. 1. *Kolmogorov at age 5 with his aunt, Vera Yakovlevna.*

His schoolfellows stated that as a student Kolmogorov was forever thinking about something. In later years he participated in some pranks. To the delight of his schoolmates and the frustration of his young physics teacher, he announced several times that he had invented a perpetual motion machine. Each time he described his device in such a sophisticated manner that it was difficult to find the error. The teacher tried to respond but her arguments were easily overturned.

As a student Kolmogorov's circle of interests was extremely wide. He was seriously interested in biology. He later wrote that "my first strong impression of the power and significance of scientific study was imparted by K. A. Timiriazev's *The Life of Plants*. At 14 he learned higher mathematics from the encyclopedia of Brokhaus and Efron by filling in the gaps in all the proofs. He was captivated by the game of chess. He attended chess competitions, but soon abandoned the game forever. He took a fancy to history and sociology, dreamed about a just system of government and wrote a utopian

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