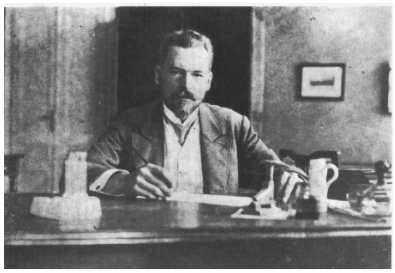

Contribution ID: **48** Type: **30 minute lecture**

Restart: The Physics Of Starting Anew

Thursday, December 3, 2020 4:30 PM (30 minutes)

Stopping a process in its midst—only to start it all over again—may prolong, leave unchanged, or even shorten the time taken for its completion. Among these three possibilities, the latter is particularly interesting as it suggests that restart can be used to expedite the completion of complex processes involving strong elements of chance. This turned out to be important in computer science where restart drastically improves performance of randomized algorithms, but is not less relevant to many physical, chemical, and biological processes where restart plays a central role. In this talk, I will provide an introduction to the theory of restart phenomena and review some of its applications in statistical, chemical, and biological physics.

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