**Celebrating the
Choi-Jamiołkowski Isomorphism**
Online Event
March 1-2, 2023
(Endorsed by the National Center for Quantum
Informatics (KCIK), Gdańsk)

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Contribution ID: **8**   Type: **not specified**

The Choi-Jamio lkowski Isomorphism: when Maths meets Physics

Wednesday, 1 March 2023 16:20 (30 minutes)

I discuss the interplay between Physics and Mathematics, from a personal perspective, in the light of the celebrated Choi-Jamio lkowski Isomorphism. I argue that it is desirable that a physical law, when expressed in terms of a differential equation, should admit any initial conditions. Choi-Jamio lkowski isomorphism, complete positivity, correlations and entanglement form a facet pattern that defines the correct formulation of the dynamics of open quantum systems. A formulation that requires coordination and teamwork if all its ingredients are to be kept in perfect alignment.

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