

**18<sup>èmes</sup> Journées de la Matière Condensée**  
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## **"QUANTUM MATERIALS, TRANSPORT AND FRUSTRATION"**

### ***Titre* : QUANTUM MATERIALS, TRANSPORT AND FRUSTRATION**

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Quantum Materials with strong correlations and exotic excitations are at the forefront of present solid state research. Frustration, competing interactions and low dimensions drive quantum phase transitions to exotic phases such as spin liquids with topological properties and fractionalized excitations. This mini-colloquium aims at bringing together experts in experiment and analytical and numerical theory to advance the current perspective on important questions of the field. Special interest will be given to quantum fluctuations, anomalous transport properties, real space topology and the interplay between disorder and quantum coherence. Target systems include frustrated pyrochlores, two-dimensional and quasi-2D frustrated systems, graphene bilayers, Kitaev systems and other magnetic insulators showing anomalous transport effects.

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