

## **Dynamics of transport by helical edge states**

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Topologically nontrivial band structure of a material may give rise to special states that are confined to the material boundary and protected against disorder and scattering. Quantum spin Hall effect (QSHE) is a paradigmatic example of phenomenon in which such states appear in the presence of time-reversal symmetry in two dimensions. Whereas the spatial structure of these states has been largely studied, their dynamic properties are much less understood. We design a microwave experiment mimicking QSHE and explore the spatiotemporal dynamics of unidirectional transport of optical angular momentum (or pseudospin) by edge states.