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Title: Fractional conductance in ultraclean nanowires.

Abstract: The quantisation of conductance was observed more than three decades ago in electrostatically defined, narrow channels in quantum wells (quantum wires). Recent experiments on ultraclean nanowires in the low electron density and weak confinement regime demonstrated the existence of fractionally quantised conductance in the absence of a magnetic field [1, 2]. The experiments will be explained, and existing theories will be discussed.

1. S. Kumar et al. Phys. Rev. Lett. 122, 086803 (2019)
2. S. Kumar and M. Pepper Appl. Phys. Lett. 119, 110502 (2021)