

# Robust Virtual Implementation with Incomplete Information: Towards a Reinterpretation of the Wilson Doctrine\*

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## Abstract

Placing any arbitrary restrictions on sets of first-order beliefs, we study robust virtual implementation (RVI) compatible with such restrictions. Using  $\Delta$ -rationalizability as our solution concept, we show that first-order incentive compatibility (FOIC) and Abreu-Matsushima measurability (AMM) are necessary for RVI. In quasi-transferable environments: (i) under the generic condition of first-order type diversity, FOIC is sufficient for RVI; and (ii) FOIC and AMM characterize RVI. The connections with the case of unrestricted RVI are discussed at some length.

*JEL Classification:* C72, D78, D82.

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