Editorial: Clarifying PRX Quantum's Acceptance Criteria

John Wheeler once said: "We live on an island surrounded by a sea of ignorance. As our island of knowledge grows, so does the shore of our ignorance." His words aptly capture the nature of scientific progress—each discovery expands the frontier of what remains to be explored. The rapid growth of quantum science brings not only remarkable breakthroughs but also an increasing volume of research. At *PRX Quantum*, our role is to identify and publish the most significant advances—those that transform the way we think, introduce exceptional new tools, or open entirely new directions. Our commitment to high selectivity ensures that the journal remains a home for research with broad and lasting impact.

To enhance transparency in our selection process, we have refined our acceptance criteria to more clearly explain the high standards that have always guided our decisions. Our editorial process—including a substantial rate of desk rejections—is designed to ensure that authors, referees, and editors invest their time in a constructive and meaningful review. Through expert consultation and internal discussions, we carefully evaluate each submission to determine whether it aligns with the journal's mission.

A common misconception is that rejection implies a lack of scientific merit. This is not the case. Many well-executed studies may not meet our selectivity criteria yet still represent valuable contributions to the field. Our role as editors is to ensure that *PRX Quantum* publishes articles that shape and advance quantum science and technology in truly exceptional ways.

Our revised acceptance criteria are set to highlight a single challenging standard: exceptionality. We are committed to publishing papers that demonstrate exceptional impact in at least one of the following ways.

- 1. Exceptional advance pushing quantum science and technology in a new and consequential direction.
- 2. Exceptional connection linking different areas within quantum science and technology or bridging the field with other scientific disciplines.
- 3. Exceptional capabilities introducing engineering, computational, material, or methodological advances that address major challenges in the field.
- 4. Exceptional insight addressing a timely topic of high impact and broad interest across the multidisciplinary quantum community.

Prospective authors are encouraged to critically assess their submissions against these criteria before submitting. Research that meets these standards is strongly encouraged. Submissions that do not meet these criteria may be better suited for other *Physical Review* journals or less-selective venues, where they can receive a more appropriate review.

PRX Quantum continues to serve as a leading venue for outstanding research in quantum science—expanding upon the highly selective standards that characterize APS's premier journals, Reviews of Modern Physics, Physical Review Letters, and Physical Review X, while establishing a distinct editorial approach within the PRX series.

We thank the scientific community for its ongoing engagement and look forward to receiving submissions that challenge, expand, and redefine our understanding of quantum science and technology.

Katiuscia Cassemiro Chief Editor Stephen Bartlett Lead Editor

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