Appendix 1:

- A. Medical licensure applications: We analysed initial application forms for independent medical licensure from all 13 MRAs in Canada in 2021. Where full applications were unavailable on MRA websites or Medical Council of Canada application portal, we requested and obtained these directly from MRAs. We identified key topics related to regulation of physicians with medical conditions based on a scoping literature review, and extracted licensure application questions related to physician health, leaves of absence, professional competence, and fitness to practice for analysis.
- B. Alignment of medical licensure applications with consensus-based recommendations: We conducted a scoping literature review of peer-reviewed and gray literature to identify and compile Canadian and U.S. recommendations about medical licensure questions. We extracted recommendations that were applicable to the specific wording of questions related to physician health in licensure applications (Evidence A). The recommendations selected for analysis were also consistent with recommendations previously studied in well-established US-based work on licensure of physicians with medical conditions, which provides preliminary evidence that adherence to these specific recommendations may influence rates of physician disclosure (1–3). The extracted recommendations included: (1) licensure applications should focus on current impairment (not presence of illness or treatment), (2) should not ask about past impairment, and (3) should not distinguish between mental and physical health. We analysed medical licensure applications against these recommendations, and coded applications for their adherence to recommendations.
- C. Critical policy analysis: To further our analysis, we employed Carol Bacchi's Problem Representation Analysis approach to investigate how a problem is constructed by the policies that aim to solve it (4). We identified links between what existing policies achieve and the assumptions underlying them (4). Critical policy analysis is a social constructivist method which acknowledges policy development as political and value-laden. In employing this method, we aimed to understand foundational assumptions within existing licensure policies, and potential unintended consequences for both public and physician health.

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