COMPLETENESS OF EIGENFUNCTIONS FOR SCHRÖDINGER OPERATORS WITH COMPLEX POTENTIALS

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For $\alpha > 0$ consider $A_\alpha := -\frac{d^2}{dx^2} + i|x|^\alpha$ in $\mathbb{R}$ (or $\mathbb{R}_+$ with Dirichlet boundary condition at 0). If $\alpha > 2/3$, then it is known that the eigenfunctions form a complete system.

**Open problem:** Is the same true for $0 < \alpha \leq 2/3$?