

**ASYMPTOTIC ESTIMATES FOR
THE APPROXIMATION AND ENTROPY NUMBERS
OF A ONE-WEIGHT RIEMANN–LIOUVILLE
OPERATOR**

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We obtain two-sided estimates for the asymptotic behavior of the approximation and entropy numbers of a one-weight Riemann–Liouville operator of an arbitrary integer order acting in Lebesgue spaces on the semiaxis.

Key words and phrases: integral Riemann–Liouville operator, approximation and entropy numbers, Lebesgue space.

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