ON QUASI–∗–n–PARANORMAL OPERATORS

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Abstract. For a positive integer \( n \), an operator \( T \in B(H) \) is called quasi-\( ∗-n \)-paranormal if
\[
\|T^{2+n}x\| \|T^2x\| \geq n \|T^n x\| \|T^nx\| \quad \text{for every } x \in H,
\]
which is a further generalization of hyponormal and a subclass of normaloid. In this paper, we give necessary and sufficient conditions for \( T \) to be a quasi-\( ∗-n \)-paranormal operator. And prove that the spectrum is continuous on the class of all quasi-\( ∗-n \)-paranormal operators.


Keywords and phrases: quasi-\( ∗-n \)-paranormal operator, spectral continuity, normal operator.

REFERENCES