

Mohd Arif Raza, Nadeem ur Rehman, Shuliang Huang*
On skew derivations as homomorphisms or anti-homomorphisms

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Abstract: Let R be a prime ring with center Z and I be a nonzero ideal of R . In this manuscript, we investigate the action of skew derivation (δ, φ) of R which acts as a homomorphism or an anti-homomorphism on I . Moreover, we provide an example for semiprime case.

Keywords: skew derivation; generalized polynomial identity (GPI); prime ring; ideal

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