ON FUNCTIONAL IDENTITIES OF DEGREE 2 AND
CENTRALIZING MAPS IN TRIANGULAR RINGS

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Abstract. Let R be a triangular ring with center $Z(R)$. Let $F_1, F_2, G_1, G_2 : R \to R$ be maps such that

$$F_1(x)y + F_2(y)x + xG_2(y) + yG_1(x) \in Z(R)$$

for all $x, y \in R$. The aim of the paper is to give a solution of this functional identity in certain triangular rings. As applications, centralizing additive maps of certain triangular rings are determined.

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