

# SYNTHESIS OF ETHYL 9-METHYL-3-[3-(R-AMINO)-3-OXOPROPYL]THIENO[3,2-*e*][1,2,4]TRIAZOLO[4,3-*c*]PYRIMIDINE-8-CARBOXYLATES

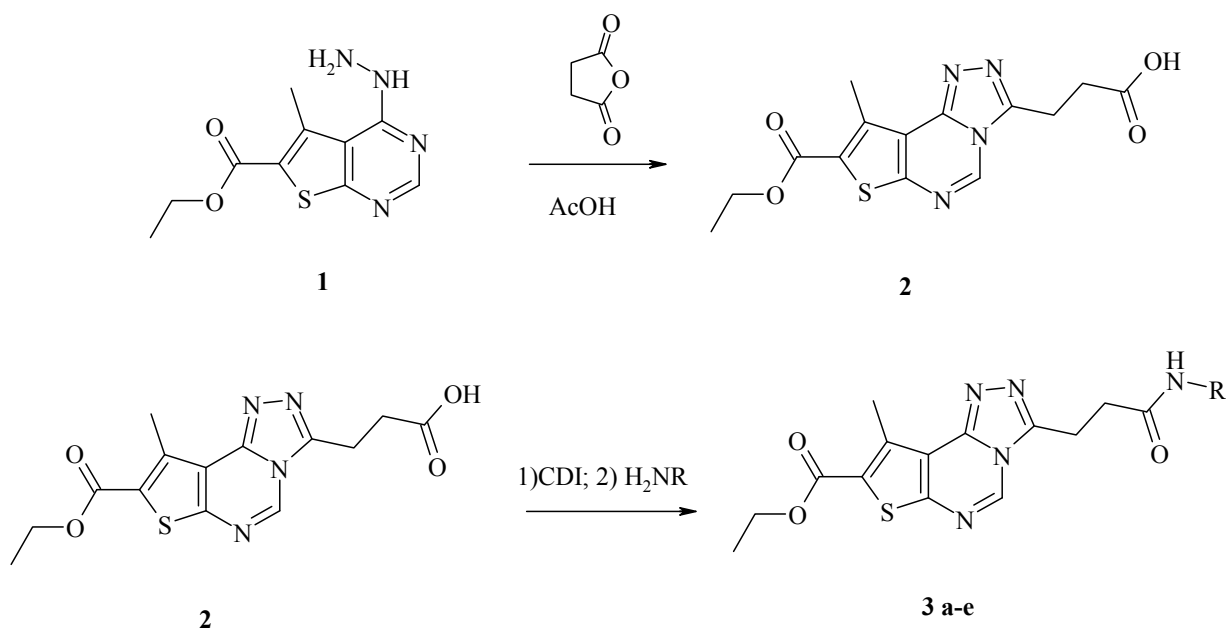
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Some derivatives of thieno[3,2-*e*][1,2,4]triazolo[4,3-*c*]pyrimidines are known as the compounds with wide range of biological activity. Many of them were reported as antifungal and antimicrobial agents. Therefore the development of highly effective methods for obtaining of such potently biologically active heterocyclic compounds is of the great importance. The possible approach to these compounds is interaction of 4-hydrazinothieno[2,3-*d*]pyrimidines with carboxylic acids anhydrides; but the interaction of ethyl 4-hydrazino-5-methylthieno[2,3-*d*]pyrimidine-6-carboxylate with succinic anhydride has not been studied yet. We have performed this reaction in acetic acid media at boiling for 5-6 hours. The product isolated has been identified as the product of triazole ring closure. The reaction has been performed according to the scheme.

Scheme



Reaction of the compound **2** with amines has been performed via coupling procedure promoted by 1,1'-carbonyldiimidazole.

The structures of all of the compounds obtained were confirmed by <sup>1</sup>H NMR spectral data. The screening of the amides **3** for their antimicrobial activity has been performed.