



Synthesis, Characterization and Antimicrobial Screening of Novel Thieno[2,3-*d*]Pyrimidine Derivatives

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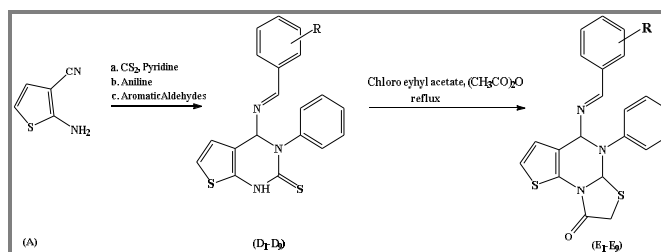
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ABSTRACT

A Series of new thieno[2,3-*d*]pyrimidine derivatives 4- $\{[(E)-(substituted\ phenyl)methylidene]amino\}$ -5-phenyl-5,5a-dihydro-4H-[1,3]thiazolo [3,2-*a*]thieno[3,2-*e*]pyrimidin-8(7H)-one (**E₁-E₉**) have been synthesized from 2-aminothiophene-3-carbonitrile. The newly synthesized compounds have been characterized by FT-IR, ¹H NMR and elemental analysis. They have also been screened for their antimicrobial activity against two Gram-positive, two Gram-negative and one fungal strain by broth dilution method. Some of the compounds have shown significant activity.

Graphical Abstract



Synthesis of Thieno[2,3-*d*] Pyrimidine containing Compounds

Keywords: Thieno[2,3-*d*] Pyrimidine, Thiazolidinone, Characterization, Antimicrobial activity.