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Synthesis and Biological Activities of Novel Danshensu Amide Derivatives as Anti-Myocardial Ischemia Agents

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SUMMARY. A series of novel danshensu amide derivatives were synthesized, and the protective effects of all the compounds on rat myocardial cell lines H9C2 by hypoxia were investigated. The results showed that all the seven compounds could significantly increased cell viability compared with hypoxia group. Among these compounds, 3-(3,4-dimethoxyphenyl)-2-hydroxy-N-propylpropanamide (6) exhibited good activities, with cell viability reached 94.2 % compared to the normal. The novel danshensu amide derivatives, possessing an additional lipophilic alkyl chain showed a good lipophilicity.

KEY WORDS: Anti-myocardial ischemia activities, Danshensu amide derivatives, Lipophilicity, Synthesis,

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