

Ministry of Higher Education and Scientific Research
University of Babylon
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Synthesis of 4,5-dihydro-1H-pyrazol-3-yl benzene-1,3-diol derivatives

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بِسْمِ اللّٰهِ الرَّحْمٰنِ الرَّحِیْمِ

{تَوَفَّعَ اللّٰهُ الَّذِیْنَ اٰمَنُوْا مِنْكُمْ وَالَّذِیْنَ اُوْتُوْا الْعِلْمَ دَرَجَاتٍ}

صَدَقَ اللّٰهُ الْعَلِیُّ الْعَظِیْمُ

المجادلة - 11

الاهداء

إلى امي ثم امي ثم امي
منذ ان انجبتني حتى هذه اللحظة
كنت اماً عظيمة إلى الحد الذي أشعر فيه بأنك كثيرة علي

وإلى ابي...
بطلي الأول ... واستقامة ظهري

إلى سبب النجاح اساتذتي

وفي الختام اقف اليوم امامكم ، قلبي يملؤه مزيج من المشاعر المتناقضة ، فرحة الإنجاز
وحزن الفراق ، مشاعر ممزوجة بذكريات رحلة تعليمية طويلة ومليئة بالتحديات
والإنجازات.

Abstract

Di hydropyrazoles are five-membered non-aromatic heterocyclic compounds containing one double bond and two nitrogen atoms at adjacent positions. 2-pyrazoline synthetic and medicinal chemistry has significantly increased due to remarkable findings concerning novel synthetic strategies and biological activities. Chemotherapy is hampered by considerable toxicities of numerous anticancer agents, severely compromising patients' quality of life. In spite of the indispensable advances accomplished over the last decades in the design and development of assorted anticancer agents, current accessible treatments still have two significant limitations, the primary being the shortage of selectivity for cancer tissues, inflicting unwanted side effects. The second is the acquisition of multiple-drug resistance by cancer cells, rendering them unresponsive to standard therapy. Therefore, the development of anticancer drugs with high selectivity and low toxicity has become an imperative in medicinal chemistry.

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