

Study on Chemical Constituents, and Anticancer Activities of Certain Natural Products Isolated from Plants or Marine Drugs

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Introduction

Natural products exhibit a wide range of biological activities, which play an important role in the discovery of leads for the development of drugs for the treatment of human diseases [1]. The chemical and biological diversity of the marine environment is immeasurable and therefore is an extraordinary resource for the discovery of new anticancer drugs [2].

Experimental

NHMFL facility "Cryo-600" spectrometer was used.

Results and Discussion

Four pure active isolated compounds were dissolved in an appropriate NMR solvent, and apply different NMR experiments as $^1\text{H-NMR}$, $^{13}\text{C-NMR}$, DEPT, HSQC, HMBC, then we determine their chemical structures; an example for some NMR data of these compounds are shown in fig (1), as well as $^1\text{H-NMR}$, were applied also for different fractions to determine the nature of their containing compounds.

Conclusions

The project is going on, and in our way to publish the resulted work soon, although they were a limited access for the facility in 2018, due to spectrometer failure, and the subsequent magnet moves in the AMRIS Facility. But we plan in 2019, to use the facility more effectively, to complete our main project.

Acknowledgements

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References

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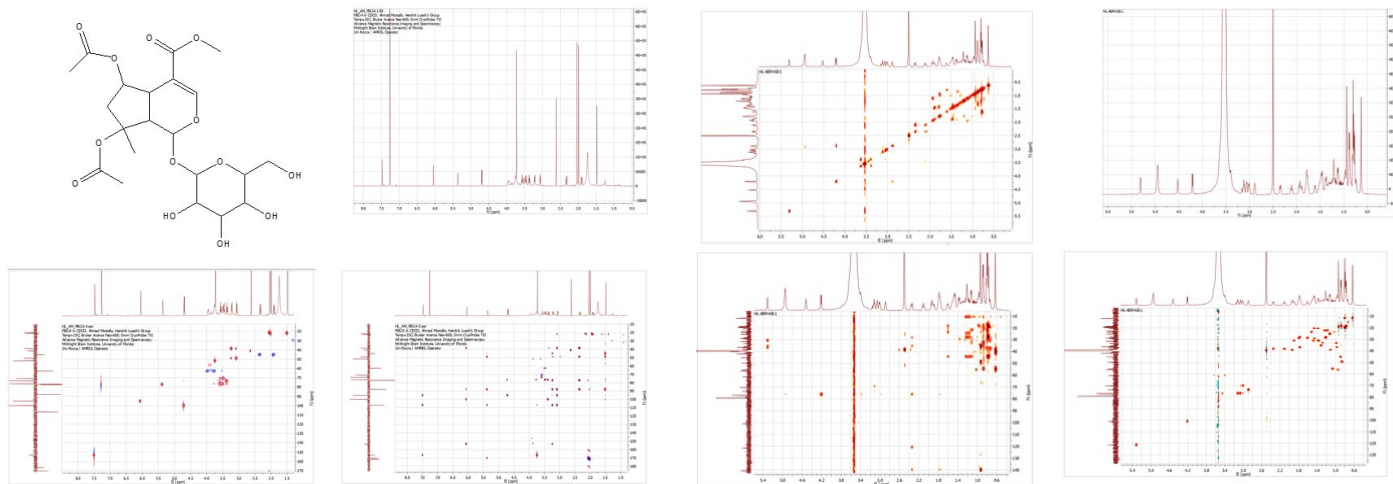


Fig.1 Examples of NMR data obtained from NMR facility for some of the pure isolated compounds.