

Supporting Information

Design, Synthesis and Antimicrobial Evaluation of Dihydropyrimidone based Organic-inorganic Nano-hybrids

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Contents

1. Experimental: Cytotoxic activity
2. ^1H NMR of Compound **4e**
3. ^{13}C NMR of Compound **4e**
4. Mass spectra of compound **4e**
5. IR spectra of compound 4a
6. IR spectra of compound Ag@4a
7. IR spectra of compound Cu@4a
8. IR spectra of compound AU@4a
9. XRD spectra of compound Ag@4a
10. XRD spectra of compound Cu@4a
11. XRD spectra of compound Au@4a
12. TGA spectra of compound Ag@4a
13. TGA spectra of compound Cu@4a
14. TGA spectra of compound Au@4a

Experimental

Cytotoxic Activity

The cytotoxicity of **Ag@4b**, **Cu@4b** and **Au@4c** was determined through MTT assay, using HeLa cells seeded in a 96-well flat-bottomed microplate in growth medium (100 μ L) and incubated at 37 °C under a 5 % CO₂ atmosphere for 24 h. All test compound and blank analysis were performed and 10 μ L of MTT in PBS was added to each well. The microplate was incubated at 37 °C under a 5 % CO₂ atmosphere for another 3 h. The medium was then removed, and DMSO (100 μ L) was added to each well. The absorbance spectrum of each solution was measured at 570 nm. The dose dependent cytotoxicity of **Ag@4b**, **Cu@4b** and **Au@4c** was determined using different concentrations of given organic-inorganic nanoaggregates using the above mentioned conditions.

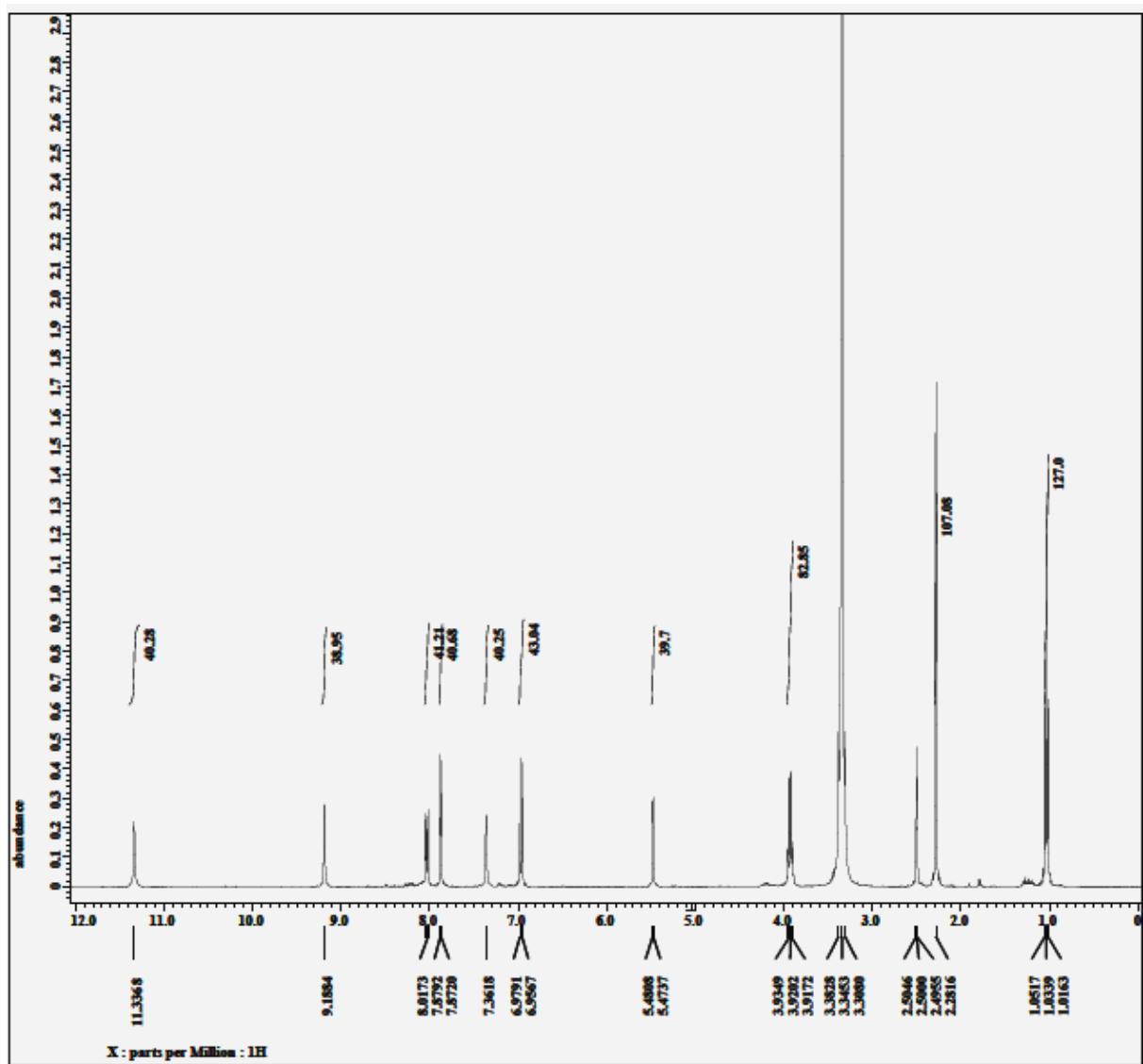


Figure 1S: ¹H NMR of Compound 4e

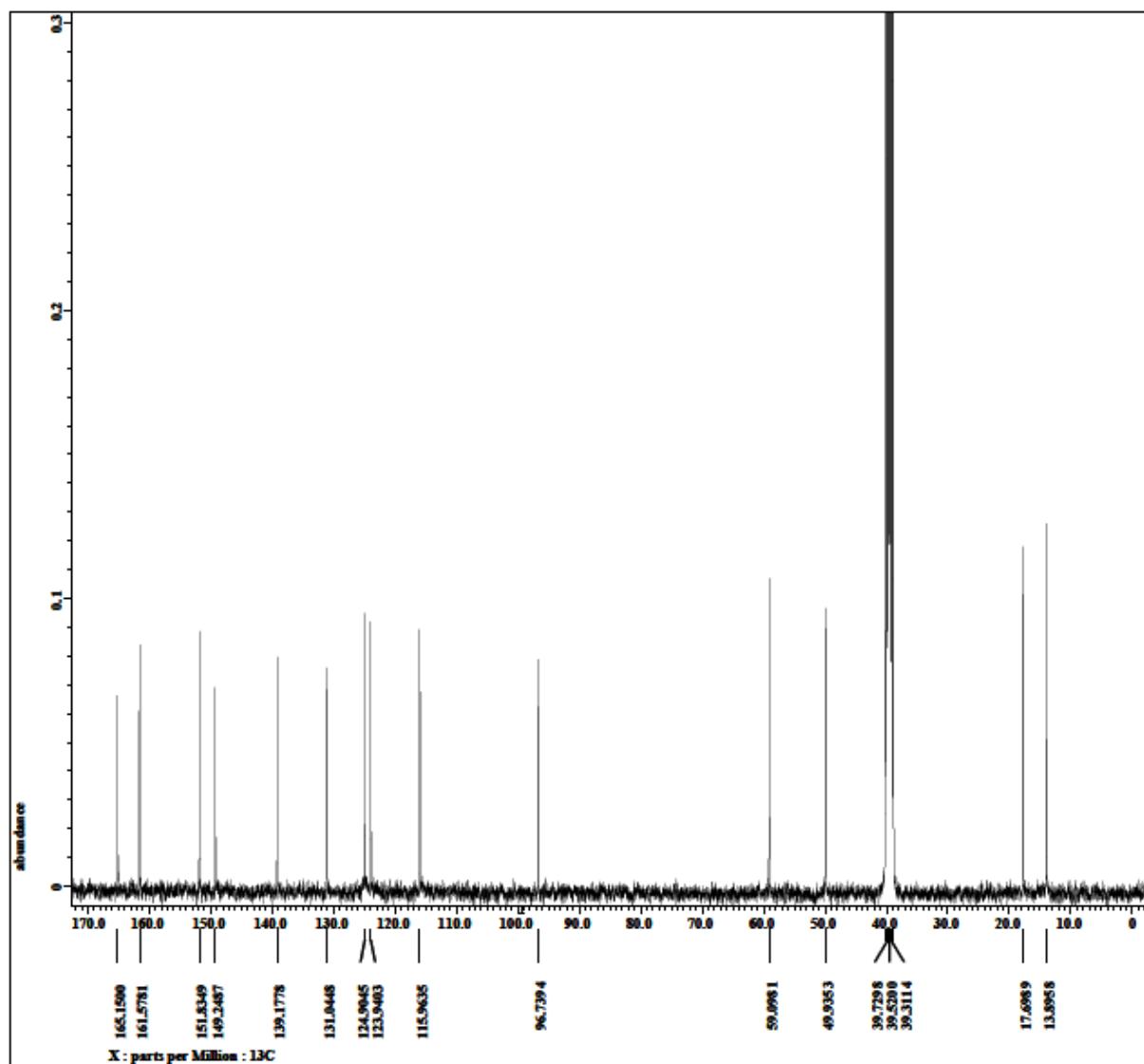


Figure 2S: ^{13}C NMR of Compound 4e

Line#:1 R.Time:2.687(Scan#:507)
MassPeaks:297
RawMode:Averaged 2.683-2.690(506-508) BasePeak:183(206145)
BG Mode:Calc. from Peak Group 1 - Event 1

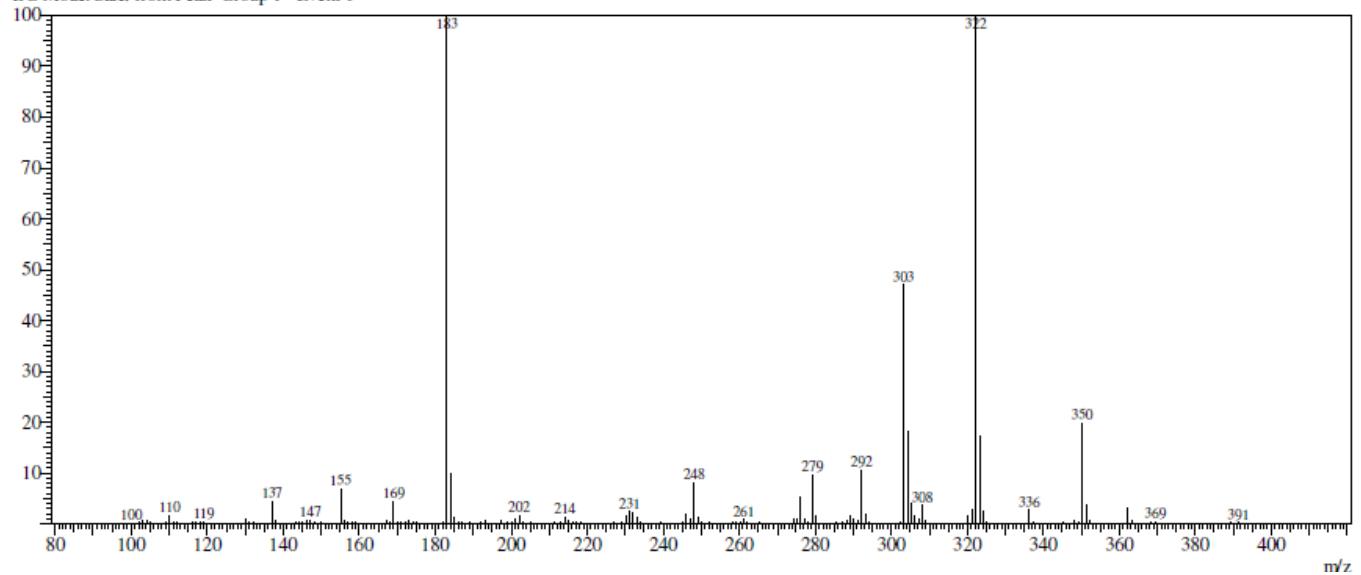


Figure 3S: Mass spectra of compound 4e

RC SAIF PU, Chandigarh

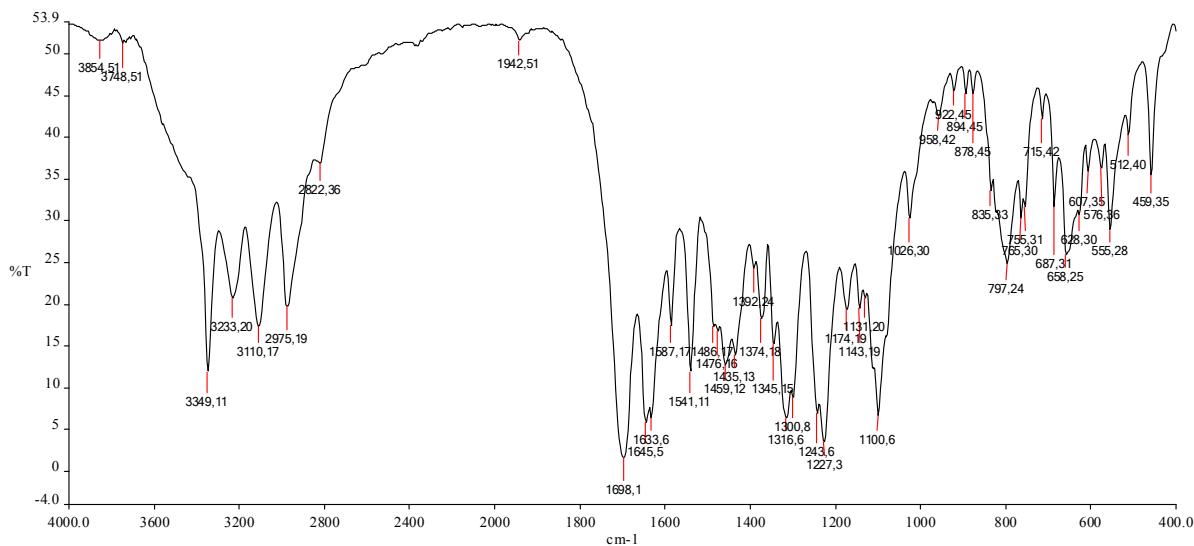


Figure 4S: FTIR of compound 4a

RC SAIF PU, Chandigarh

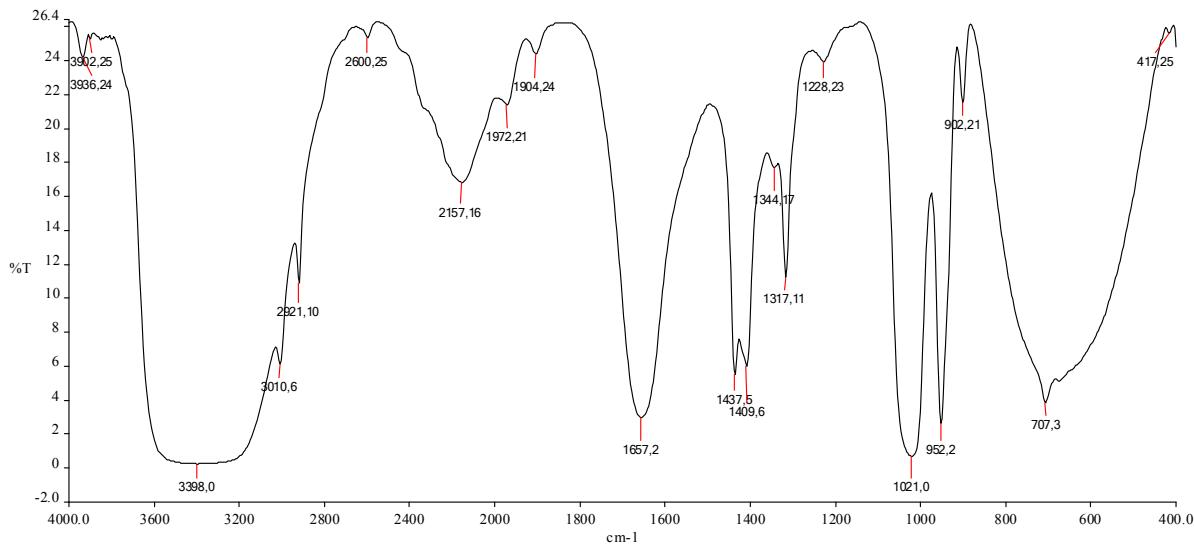


Figure 5S: FTIR of compound Ag@4a

RC SAIF PU, Chandigarh

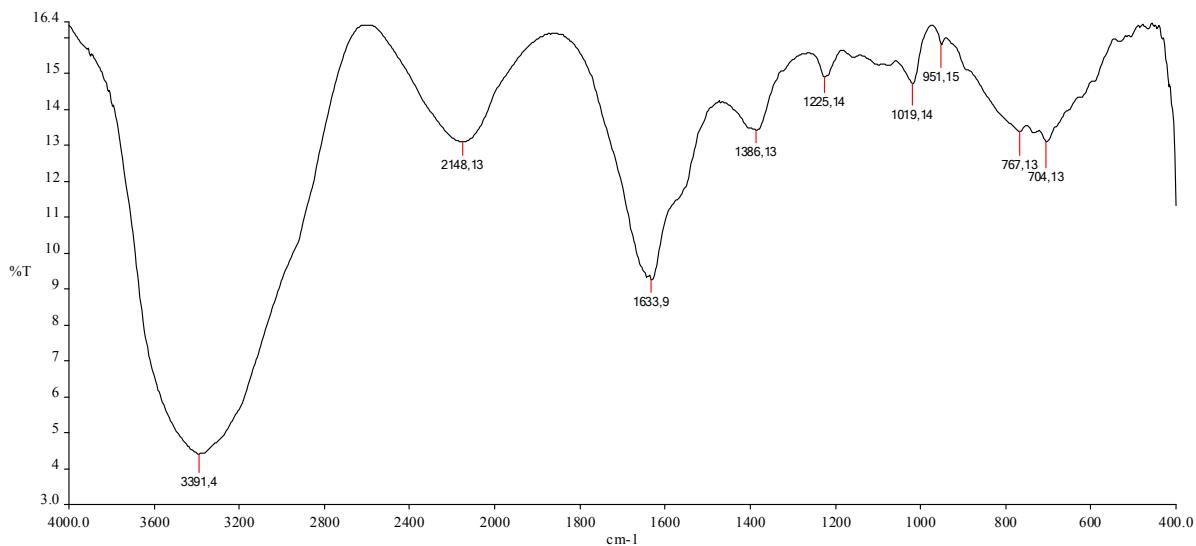


Figure 6S: FTIR of compound **Cu@4a**

RC SAIF PU, Chandigarh

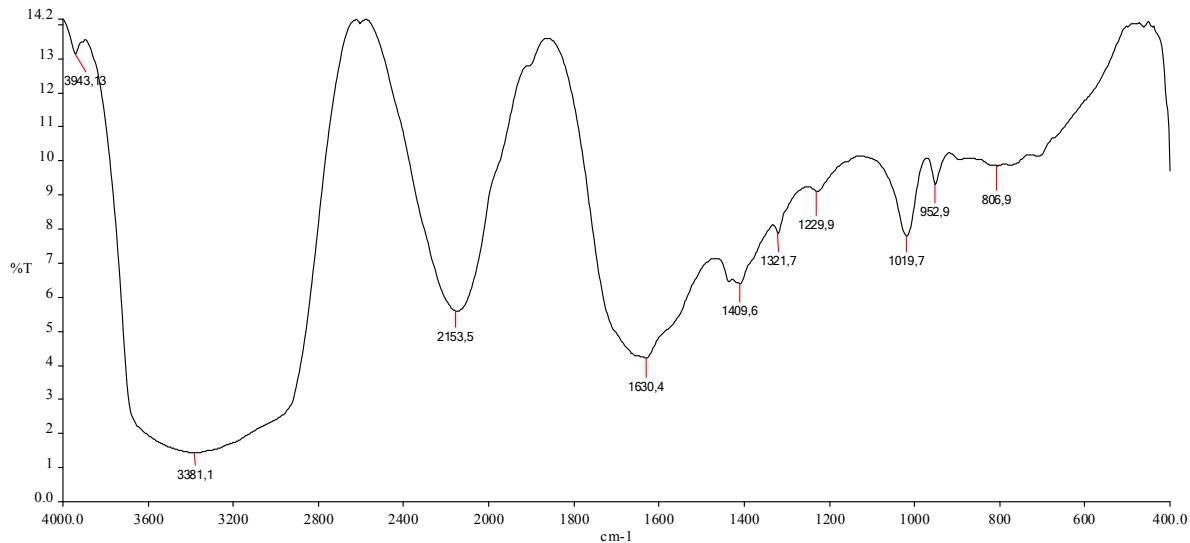


Figure 7S: FTIR of compound **Au@4a**

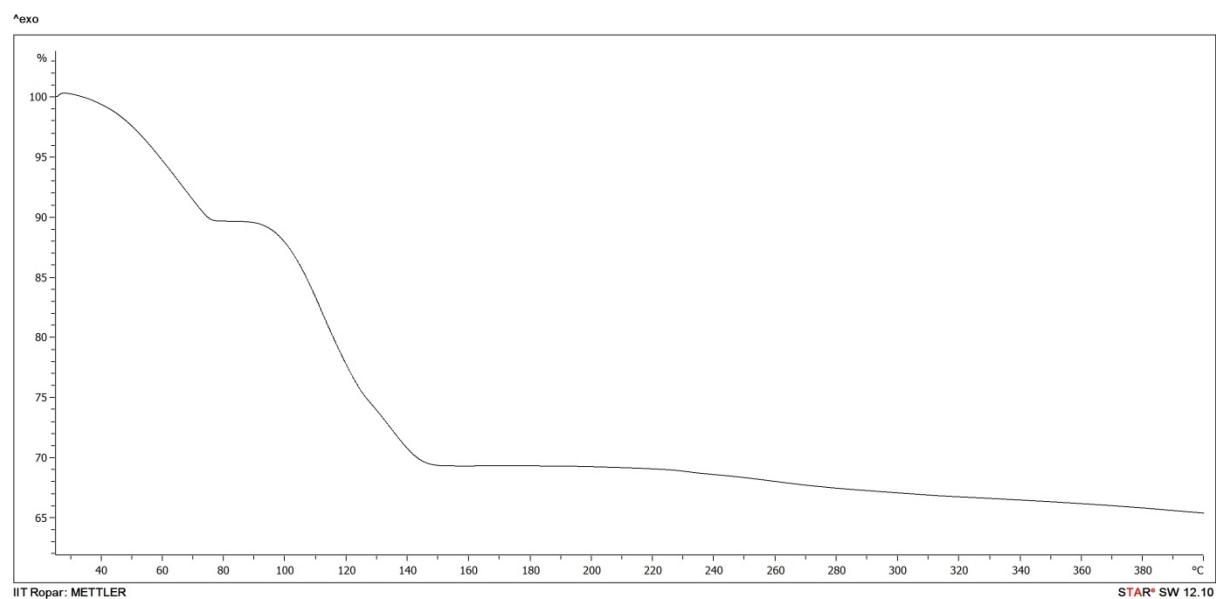


Figure 8S: TGA of compound Ag@4a

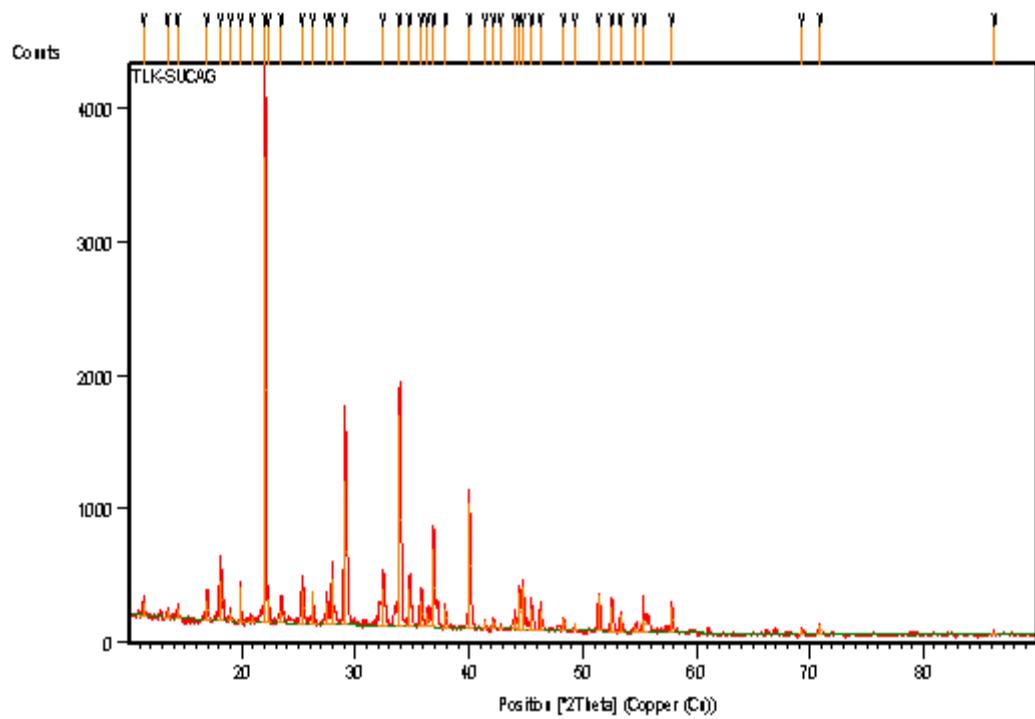


Figure 9S: XRD of compound Ag@4a

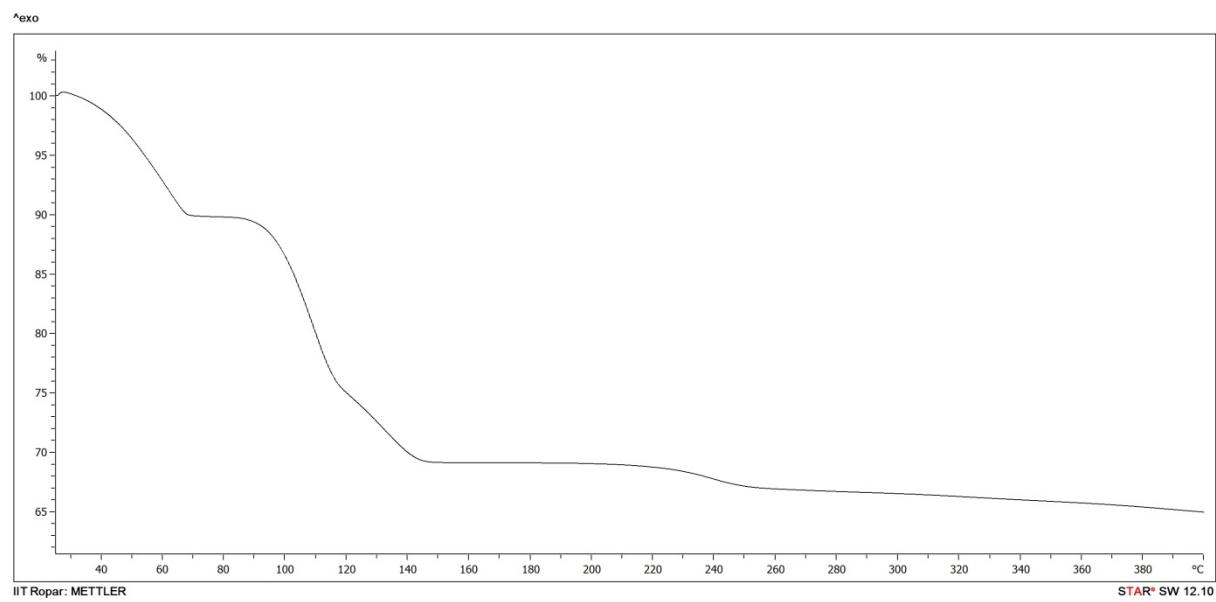


Figure 10S: TGA of compound **Cu@4a**

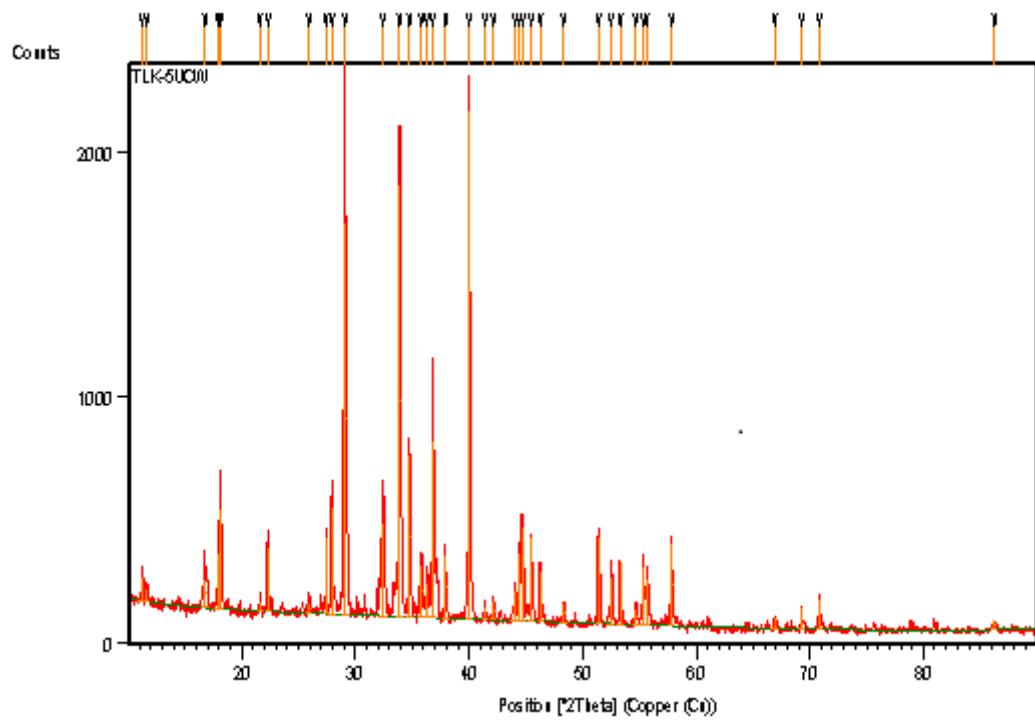


Figure 11S: XRD of compound **Cu@4a**

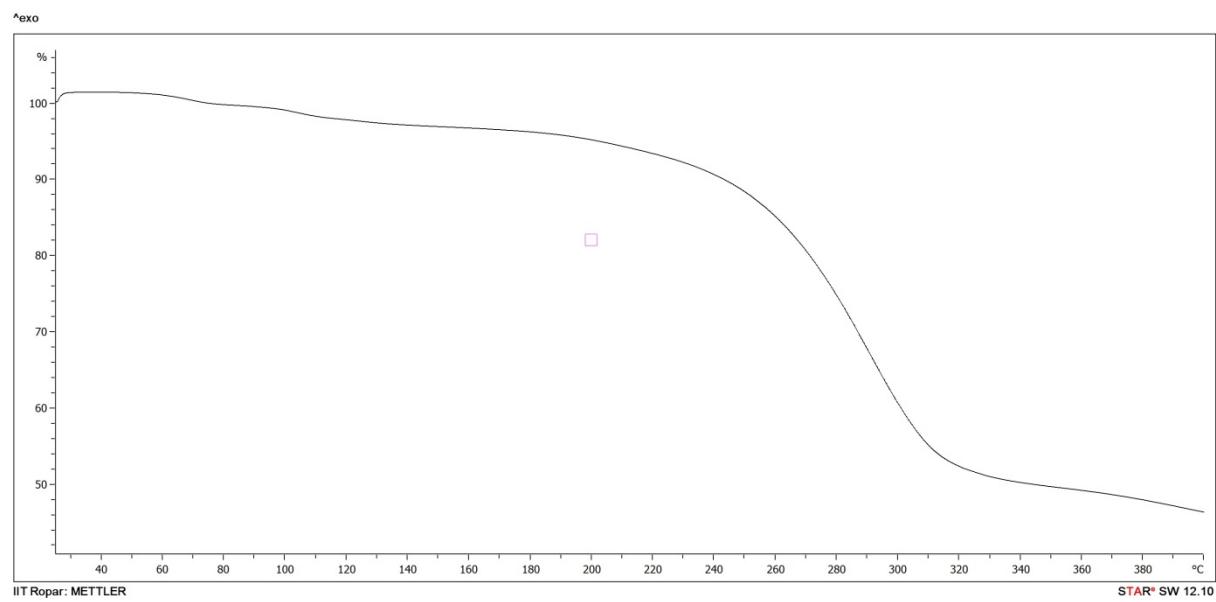


Figure 12S: TGA of compound Au@4a

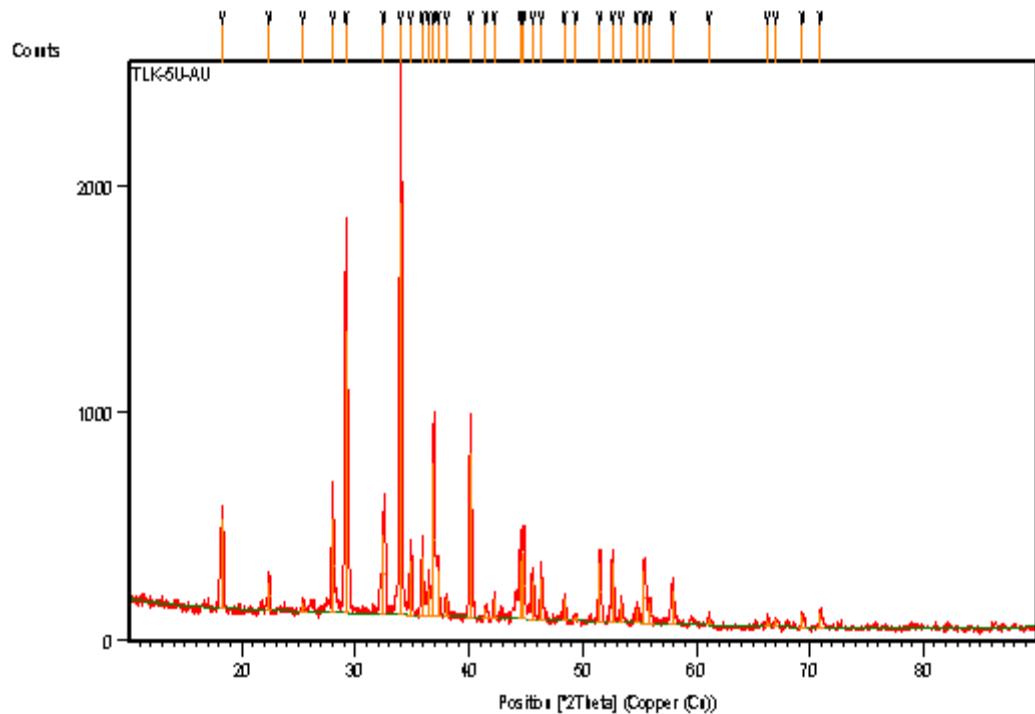


Figure 13S: XRD of compound Au@4a