Supporting information

Sunlight assisted synthesis of bimetallic silver-copper nanoparticles using peanut shell extract and its reusable activity against drug-resistant bacteria

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Table S1: Phytochemical analysis

Phytochemical	Assay	Result
Detection of carbohydrate	Fehling's Test	No colour change. Absence of carbohydrate
Detection of Flavonoids	Alkaline Reagent Test	Yellow colour in an alkaline medium is decolourized by adding acid. Presence of flavonoids
Detection of Amino acids	Ninhydrin test	The formation of violet colour indicates the presence of amino acids
Detection of Protein	Xanthoproteic test	No white residue indicates the absence of proteins
Detection for Tannins	Lead acetate test	Yellowish precipitate. Presence of tannins
Detection for Coumarins	NaOH treatment	Yellow colour formation indicates the presence of coumarins
Detection for Anthocyanins	Acid-base treatment	The formation of pink-red turns blue indicates the presence of anthocyanins.
Detection for Alkaloids	Dragendroff test	The formation of an orange precipitate indicates the presence of alkaloids
Detection for Emodins	Ammonia-benzene	No red colour, Absence of emodins
Detection for Saponins	Foam test	The formation of stable foam indicates the presence of saponins
Detection for Terpenoids	Salkowski test	No reddish colour. Absence of terpenoids
Detection of Polyphenol	Ferric chloride test	No bluish colour. Absence of polyphenols

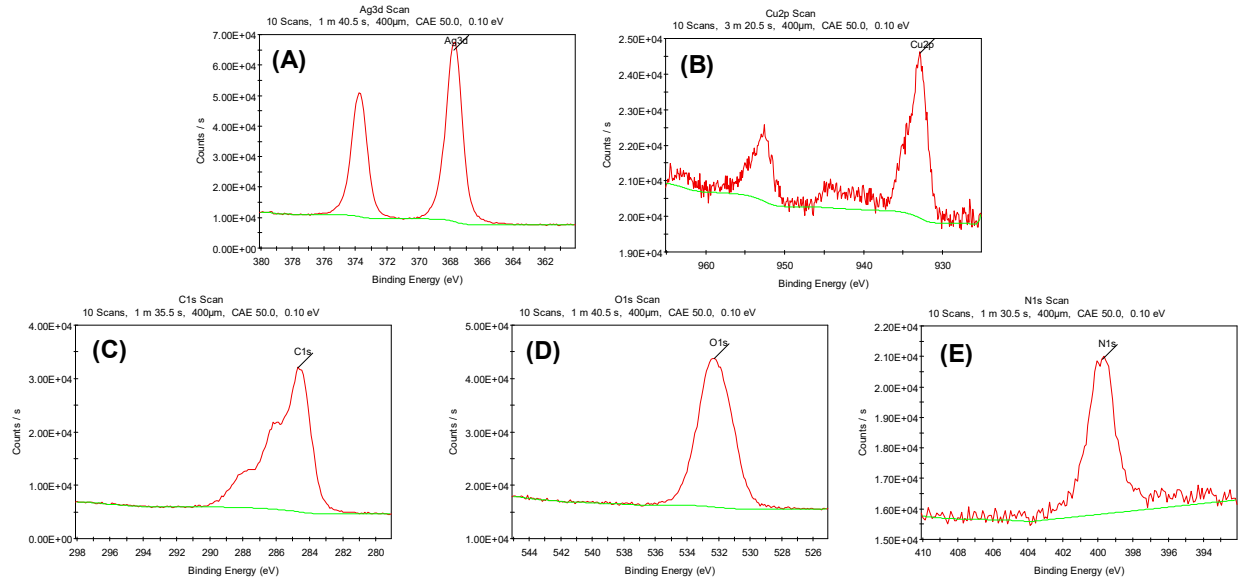
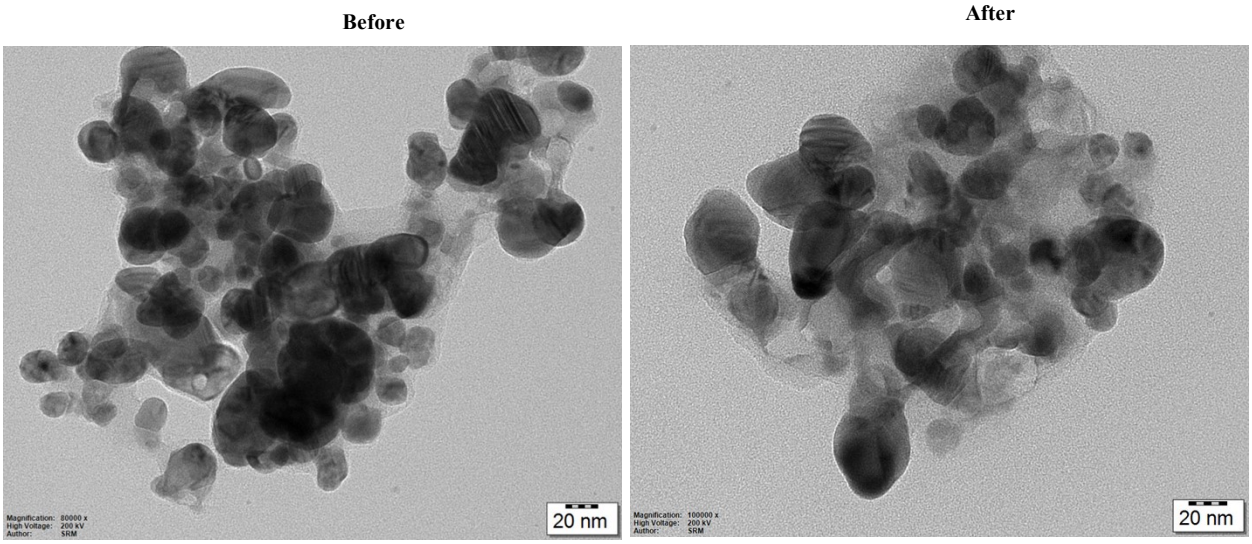


Figure S1: High resolution XPS of specific elements. (A) Ag3d of Ag-Cu NPs, (B) Cu2p of Ag-Cu NPs, (C) C1s of Ag-Cu NPs, (D) O1s of Ag-Cu NPs, and (E) N1s of Ag-Cu NPs.



Figures S2: TEM images of Ag-Cu NPs before and after their use in bacterial treatment. It is noted that the NPs remains in nanoform and stable after being used in the treatment.