

Review Form 3

Journal Name:	Asian Plant Research Journal
Manuscript Number:	Ms_APRJ_126727
Title of the Manuscript:	Calotropis procera Mediated Synthesis of silver Nanoparticles and its Antibacterial Effect on Selected Pathogens
Type of the Article	

Review Form 3

PART 1: Review Comments

Compulsory REVISION comments	Reviewer's comment	Author's Feedback (Please correct the manuscript and highlight that part in the manuscript. It is mandatory that authors should write his/her feedback here)
<p>Please write a few sentences regarding the importance of this manuscript for the scientific community. Why do you like (or dislike) this manuscript? A minimum of 3-4 sentences may be required for this part.</p>	<p>This manuscript on the <i>Calotropis procera</i>-mediated synthesis of silver nanoparticles (AgNPs) offers valuable insights into eco-friendly and sustainable nanotechnology. The study not only explores an innovative, green synthesis approach using <i>Calotropis procera</i> extract but also demonstrates the antibacterial efficacy of the synthesized AgNPs against select pathogenic bacteria. Given the rise of antibiotic resistance, this research holds promise for developing alternative antimicrobial agents that leverage natural resources. It contributes to the growing field of green nanotechnology and could lead to practical applications in healthcare, offering potential for novel antibacterial treatments.</p>	
<p>Is the title of the article suitable? (If not please suggest an alternative title)</p>	<p>Yes, the title of the article is suitable.</p>	
<p>Is the abstract of the article comprehensive? Do you suggest the addition (or deletion) of some points in this section? Please write your suggestions here.</p>	<p>The abstract is informative and includes the essential findings of the study. However, here are some suggestions to enhance its clarity and comprehensiveness: Start with a statement of the research objective to set a clear context, such as, "This study investigates the green synthesis and antibacterial potential of silver nanoparticles (AgNPs) using <i>Calotropis procera</i> leaf extract." Mention why each characterization technique was used, such as linking UV-Vis to confirming nanoparticle formation, or FTIR to identifying functional groups, to strengthen the rationale for each analysis. It would be helpful to indicate if the antibacterial activity is compared to a standard antibiotic or control, giving a clearer sense of its significance. Conclude with a sentence on the implications or potential applications of these findings, reinforcing their impact, e.g., "This study demonstrates an efficient, eco-friendly method for synthesizing AgNPs with strong antibacterial potential, which could be valuable for developing alternative antimicrobial agents."</p>	
<p>Are subsections and structure of the manuscript appropriate?</p>	<p>Yes, all subsections and structure of the manuscript are appropriate.</p>	
<p>Please write a few sentences regarding the scientific correctness of this manuscript. Why do you think that this manuscript is scientifically robust and technically sound? A minimum of 3-4 sentences may be required for this part.</p>	<p>The manuscript appears scientifically robust and technically sound. The introduction provides a comprehensive background, linking the traditional uses of <i>Calotropis procera</i> to its potential as a reducing and stabilizing agent for synthesizing silver nanoparticles (AgNPs). The methodology is well-detailed, describing each step in sample preparation, synthesis, and characterization, making the experimental process reproducible. The use of multiple characterization techniques—UV-Vis, FTIR, SEM-EDX, TEM, and XRD—strengthens the reliability of findings by confirming the formation, size, structure, and composition of AgNPs through different analyses. Furthermore, the antibacterial testing against multiple pathogens, with results clearly showing zones of inhibition, adds rigor to the assessment of the synthesized AgNPs' efficacy. This combination of thorough background, detailed methods, comprehensive characterization, and quantitative antibacterial results suggests a well-rounded and scientifically reliable study.</p>	
<p>Are the references sufficient and recent? If you have suggestions of additional references, please mention them in the review form.</p>	<p>Kindly add some more references in methodology area.</p>	

Review Form 3

Minor REVISION comments Is the language/English quality of the article suitable for scholarly communications?	Yes, The language/English quality of the article is suitable for scholarly communications. 1. Just read thoroughly and check all the grammatical error. 2. Focus on et. al. in everywhere in the manuscript. It must be similar in throughout the study.	
Optional/General comments	NA	

PART 2:

	Reviewer's comment	Author's comment (if agreed with reviewer, correct the manuscript and highlight that part in the manuscript. It is mandatory that authors should write his/her feedback here)
Are there ethical issues in this manuscript?	<i>(If yes, Kindly please write down the ethical issues here in details)</i>	

Reviewer Details:

Name:	Shubhrat Maheshwari
Department, University & Country	Sam Higginbottom University of Agriculture, Technology and Sciences, India