

A New Method for 3D Nanoscale Continuous Printing

A novel 3D printing technology achieves continuous and highly accurate fabrication of three-dimensional structures with feature sizes as small as 100 nanometers, offering a reliable and efficient process for nanoscale printing applications.

Advancements in 3D printing provide a reliable method of creating models and structures, allowing for the analysis of three-dimensional objects outside of the usual two-dimensional scale. Previously, designers would need to present three different views of the object. Unfortunately, some accuracy can be lost while transforming designs into a 3D structure, especially when printing nano- or microscale models.

Researchers at Purdue University have developed a 3D printer capable of printing three-dimensional structures with feature sizes as small as 100 nanometers. This printer can continuously print these models with accuracy unchallenged by current methods. Currently, no other method of printing 3D structures at this scale exists, offering a more reliable and efficient process.

Advantages:

- Continuous
- 100 nanometers
- 3D structures

Potential Applications:

- 3D printer
- Nanoscale printing

TRL: 3

Intellectual Property:

Technology ID

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Category

Materials Science &
Nanotechnology/Nanomaterials
& Nanostructures
Robotics & Automation/3D
Perception & Modeling for
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reliable 3D printing