Product Description
AZ® nLOF™ 5000 Series I-line photoresists are uniquely formulated to simplify the historically complex lift-off lithography process. You can now run a standard lithography process to get the desired lift-off profiles. The fast nLOF resists work well in both surfactant and surfactant-free TMAH developers using standard conditions.

nLOF 5000 Series resists can be used for sub 0.5µm lift-off processing.

Features
- High Throughput
- Streamlined Lift-Off Process
- Process Compatibility
- Process Extendability

Benefits
- i-line DTP ~ 100mJ/cm²
- Standard single-layer lithography process to achieve lift-off profiles.
- Easy integration with an existing process with standard process conditions!
- Achieve Lift-off profiles well beyond 0.5µm with no process enhancements!

Standard Process Conditions
Coat: 1.0 µm resist thickness
Softbake: 90ºC for 60 sec
Exposure: Nikon Stepper @ NA=0.54
          DTP = 144 mJ/cm²
PEB: 110ºC for 60 sec
Develop: AZ® 300MIF Developer for 60 sec single puddle @ 23ºC

Depth of Focus @ 0.7 µm Dense Lines

Metal Lift-off Process Results
Resist Trench
Metal Isolated Line

Resolution Capabilities
Isolated Trench
Dense Lines

0.40 µm
0.40 µm
0.38 µm
0.38 µm
Storage
Keep in sealed original containers away from oxidants, sparks, and open flame. Protect from light and heat. Keep refrigerated. Recommended storage temperature of 45°F. Empty container may contain harmful residue and/or vapors. Dispose of appropriately.

Equipment Compatibility
AZ nLOF 5000 Series resists are compatible with all commercially available wafer and photomask processing equipment. Recommended materials of construction include stainless steel, glass, ceramic, PTFE, polypropylene, and HDPE.

Solvent Safety
AZ nLOF 5000 Series resists are formulated with 100% PGMEA, a safer solvent. We recommend AZ EBR 70/30 as a compatible solvent for EBR processing, resist cleaning, basic resist stripping and re-work. AZ 300T, AZ 400T, or AZ Kwik Strip™ are recommended for typical resist stripping processes.

Handling Precautions / First Aid
Refer to current Material Safety Data Sheet (MSDS) for detailed information prior to handling.

Contact your local Clariant-AZ Electronic Materials Representative for further information at the following locations:
Somerville, NJ: 800.515.4164
Dallas, TX: 800.422.3884
San Jose, CA: 408.616.2100