MFC Tempress LPCVD Nitride Process Check List

Operator:	 Date:	

Action	Check Complete	Initial
Wafers are clean (no particles, no resist, no water, etc.)		
Locate clean designated quartz boats		
Check DCS cab purge cylinder pressure: Value (>300 psi)		
2 min leakrate check at 200C prior to Unload: Value(<12mT/min)		
• Use PSTRT200 & STDBY200		
SELECT & START LOAD/UNLOAD		
Load wafers onto designated quartz boat using vacuum wand (flats up)		
Gently clean stainsteel door and door oring with IPA/Wipe		
Gently vacuum SiC paddle to remove particles		
Load Quartz boat onto SiC paddle/cantilever at the designated location		
Press CONTINUE to load wafers into furnace		
Wait until recipe is in Standby and SELECT & START PURG200		
Wait >1 hr and repeat 2 min leakrate check: Value(<12mT/min)		
SELECT & START PURG830		
Initiate DCS Cab Purge		
Wait until furnace temp >550C		
2 min leakrate check at >550C: Value (<12mT/min)		
• Use PSTRT830 & STDBY830		
Turn on DCS flow at Gas Cab		
Verify recipe time, temp, mfc flowrates, & pressure on process recipe		
Turn on exhaust manifold N2 purge & set at 30slpm (when no abatement)		
Enable tool on CORAL		
SELECT Process Recipe & START once at temp		
DO NOT LEAVE Facility until Deposition cycle		
Shut off DCS flow at Gas Cab once Dep cycle complete		
Initiate DCS Cab Purge		
Wait until DCS Cab purge is complete		
SHUT OFF exhaust manifold N2 purge		
Wait until furnace <200C before unloading wafers(best overnight)		
Disable tool on CORAL		
Select & Start Recipe LOAD/UNLOAD		
Wait for loader to move out & stop before removing wfrs		
Gently clean door & door oring with IPA/Wipe		
Gently vacuum SiC paddle/cantilever to remove particles		
Press CONTINUE to load wafers into furnace		
SELECT & START PURG200		
Complete LPCVD logbook entries		
Place quartz boats back in the oven		
Cleanup work table with IPA/Wipe		