



CLEAN ROOM RATES
 UCI Integrated Nanosystems Research Facility
 Effective 11/01/2016



USAGE RATES & FEES	Minimum Time (hours)	Internal (UC Users)		External Users			
		Rate	Monthly Cap ¹	Rate	Commercial Monthly Cap	Sponsor Monthly Cap ²	Academic Monthly Cap
User One-time Fee		\$500		\$750			
Clean Room Usage (Hourly Fee)		38 hr	\$1,520	110 hr	\$4,400	\$3,300	\$3,300
Staff time		\$125		\$225			
Key Fee (One-time)		\$10		\$10			
Hazardous waste disposal/ liter (cost varies)							
EQUIPMENT RATES							
Depositions Tools							
CHA Mark 50 Evaporation (superuser tool)	1.50	\$25 hr		\$50 hr			
E-Beam 1 evaporation (Temescal CV-8)	3.00	\$15 hr		\$25 hr			
E-Beam 2 evaporation (Temescal CV-14) (superuser tool)	3.00	\$15 hr		\$25 hr			
CHA Thermal evaporation (SEC-600-RAP)	3.00	\$20 hr		\$30 hr			
PE 4400 Sputtering (superuser tool)	3.00	\$15 hr		\$25 hr			
PE 2400-A Sputtering (superuser tool)	3.00	\$15 hr		\$25 hr			
PE 2400-B Sputtering (superuser tool)	3.00	\$15 hr		\$25 hr			
Electric Plating		no charge		no charge			
ALD Atomic Layer Deposition Cambridge	No Min	\$15 hr		\$25 hr			
Applied MST MVD 100	0.50	\$20 hr		\$30 hr			
Lithography Tools							
Canon i4 4000 Stepper (superuser tool)	0.25	\$150 hr		\$160 hr			
Karl Suss MA6 Mask Aligner	0.50	\$30 hr		\$40 hr			
Karl Suss MA56 Mask Aligner	0.50	\$30 hr		\$40 hr			
Karl Suss MJB-3 Mask Aligner	0.50	\$20 hr		\$30 hr			
Kasper Mask Aligner model 3001	0.50	\$20 hr		\$30 hr			
Quintel Mask Aligner	0.50	\$20 hr		\$30 hr			
UV Flood exposure system	0.25	\$15 hr		\$25 hr			
Spinners	No Min	\$10 hr		\$20 hr			
Dry Etching							
STS System DRIE	0.50	\$40 hr		\$50hr			
New SPTS DRIE	0.50	\$40 hr		\$50hr			
Plasma-Therm RIE Model 780	0.50	\$35 hr		\$45 hr			
Trion ICP/RIE	0.50	\$25 hr		\$35 hr			
Ion Milling	3.00	\$15 hr		\$25 hr			
XeF2 Pulsing Etcher	0.50	\$25 hr		\$35hr			
Plasma Technology Model 800MP RIE	0.50	\$35 hr		\$45 hr			
Plasma Technology Model DP800 UP	0.50	\$30 hr		\$40 hr			
Laser Ablation Tool Resonetics RAPIDX250	0.50	\$45 hr		\$55 hr			
Plasma-Asher							
Gasonics Downstream Plasma Ashing	0.25	\$20 hr		\$30 hr			
Technics II 500	0.25	\$15 hr		\$25 hr			
Plasma line asher	0.25	\$15 hr		\$25 hr			
Anatech LTD Plasma SP100	0.25	\$15 hr		\$25 hr			
Hot Embossing							
Nano Imprinter Jenoptik Hex03	0.50	\$40 hr		\$50hr			
CVD System							
Plasma-Therm PECVD Model 780	1.00	\$20 hr		\$30 hr			
BMR Low Temp PECVD (superuser tool)	0.50	\$20 hr		\$30 hr			
Anicon LTO CVD (superuser tool)	3.00	\$20 hr		\$30 hr			
ASM LPCVD low-stress nitride, poly (superuser tool)	1.00	No Charge		No Charge			
First Nano Furnace (Easy Tube 3000)	No Min	\$40 hr		\$50hr			
Diffusion Furnaces							
6 inch Dry and Wet Oxidation Tube (superuser tool)	1.00	\$10 hr		\$20 hr			
4 inch Dry Oxidation Tube	1.00	\$10 hr		\$20 hr			
4 inch long anneal Tube	1.00	\$10 hr		\$20 hr			
4 inch sintering Tube	1.00	\$10 hr		\$20 hr			
4 inch Boron Tube (superuser tool)	1.00	\$15 hr		\$25 hr			
2 inch Nano furnace Tube (superuser tool)	1.00	\$10 hr		\$20 hr			
6 inch mini-brute thermal bonding Tube	1.00	\$10 hr		\$20 hr			
4 inch mini-brute Tube	1.00	\$10 hr		\$20 hr			
Heatpulse 610 RTA	1.00	\$20 hr		\$30 hr			
Anodic Bonding Furnace up to 4 inch (superuser tool)	1.00	\$5 hr		\$15 hr			
Characterization							
SEM Hitachi 4700 / EDAX	0.50	\$40 hr		\$50 hr			
HS200 Confocal Microscope / Profiler (superuser tool)	0.25	\$20 hr		\$30 hr			
Dektaks	No Min	\$15 hr		\$25 hr			
Tencor FLX-2320A Stress measurement tool	No Min	No Charge		No Charge			
Nanospec AFT / Nanometrics 200	No Min	No Charge		No Charge			
Gaertner ellipsometer (superuser tool)	No Min	No Charge		No Charge			
Tousimis 815C CPD (superuser tool)	1.00	\$25 hr		\$35 hr			
Back-End Processing Tools							
K&S 780 Dicing Saw (superuser tool)	0.50	\$20 hr		\$30 hr			
K&S Wedge Bonder	0.50	\$20 hr		\$30 hr			
K&S Gold Ball Bonder	0.50	\$20 hr		\$30 hr			
Hybrid Ball Bonder	0.50	\$20 hr		\$30 hr			
Cincinnati Sub-Zero Environmental chamber	1.00	\$10 hr		\$20 hr			
Tenney Environmental chamber	1.00	\$10 hr		\$20 hr			
Inert Environment Blue M Oven 600 Degree	1.00	\$5 hr		\$15 hr			
HDMS Oven	1.00	\$5 hr		\$15 hr			

¹The Cleanroom Usage Monthly Cap is applied per account. The Equipment Monthly Cap is applied per tool usage for each account, service requests and staff training are not included.

² The Sponsor Cap Rate applies to Government or Academic Sponsored projects