MANUFACTURING
Complete Turn-Key Production Services
Medical, Military, Security, Commercial
Prototypes to Volume Production
ITAR Registered / ISO Certified

ASSEMBLY TECHNOLOGIES
World-Class Wirebond &
Flip Chip Assembly
Stud Bump / Thermocompression
Flip Chip BGA, Flex, Multi-Chip Modules,
COB, Etc. Advanced ICs, MEMS, RF,
Fluidics, Photonics

ULTRA-THIN ELECTRONICS
Wafer / Die Thinning to < 50µm
Die Attach Films, Ultra-Low-Loop
Wirebonding Flow-Over-Wire Adhesives

ENGINEERING SERVICES
Package & Substrate Design
Materials Evaluation & Selection
Assembly Process Development
Reliability Testing, F/A,
Device Qualification

For additional information contact:
Samtec Microelectronics
5050 List Drive • Colorado Springs, CO 80919
aspentechnologies.com
microelectronics@samtec.com
1-719-592-9100 • 1-800-SAMTEC-9

ITAR Certified
MANUFACTURING

Complete turn-key production services
Design, development, & production
Wirebond & Flip Chip technologies
Organic, ceramic & metal packages
- BGA, PGA, COB, DIP, QFP, QFN, CLCC, LGA
- Multi-chip modules, flex, PCB, custom packaging
MEMS: Photonics, RF, displays
- Class 100 assembly facility
Low & Medium volume production
ITAR compliant processes
Supplier Management

FLIP CHIP

Complete turn-key Flip Chip production
Organic & Ceramic substrates
Pb-Free (RoHS)
Eutectic & High Pb
Wafer solder bumping
Au Stud bumping (wafer or die)
Isotropic & anisotropic pastes & films
Thermocompression bonding (w/ Au studs)

WIREBONDING

World-class ball bonding & wedge bonding
Finest pitch available (<35 microns)
Ultra-high wire counts
Stacked die & multiple tiers
Low profile wire loops
Au, Al, & Pt wire alloys

WAFER DICING, DIE SORT & INSPECTION

Up to 300 mm wafers
Any material: Si, GaAs, glass, quartz ceramic, organics, sapphire, metals
Thin Microelectronics
Thin wafers
Stacked die
Die &wafer tracing
MIL STD & Custom inspections

SEALING AND ENCAPSULATION

RoHS compliant
Dam & fill encapsulation
Solder Sealing (complex hierarchies)
Parallel seam-sealing
Glass frit and epoxy sealing
Fine & gross leak testing
Custom marking; serialization

CUSTOM ASSEMBLY & ENGINEERING SERVICES

Package design & Engineering
Material evaluation & selection
Assembly process design
Feasibility studies
Packaging R&D
Reliability, testing, & F/A
Getter integration
Custom functional and electrical testing

For more information on microelectronic packaging, contact Samtec’s Microelectronics at: microelectronics@samtec.com