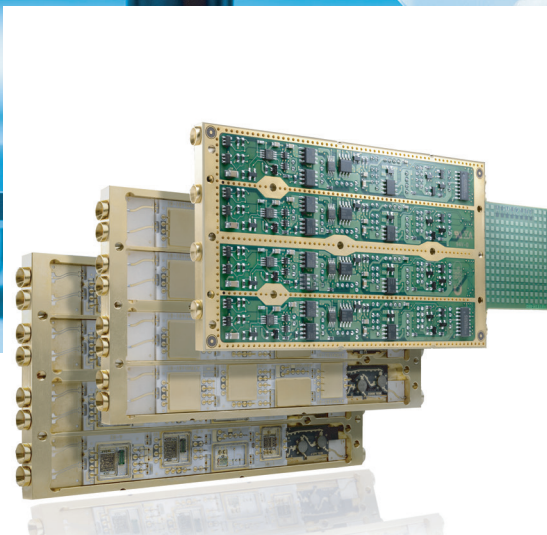




SANMINA

**Optical, RF, Microwave,
PCBA & System Assembly**

**Leadership in RF
and Optical
Design, NPI &
Technology**



Ottawa, Canada



The Sanmina Ottawa, Canada, facility partners with some of the world's most advanced technology leaders to create complex optical and RF/Microwave products. With experience in Optical, RF and Microelectronics, we provide Product Design and Development, Test Engineering, Process Engineering, and New Product

Introduction (NPI) support for Component, Module and System-Level Applications. We also manage all aspects of product manufacturing, along with implementing product-sustaining and cost-reduction strategies. Sanmina continuously invests in improving our production processes and characterizing key supplier component variations to meet the on-going demands associated with designing and manufacturing state-of-the-art optical and RF microwave products. We've developed a library of design building blocks/models and manufacturing process variations to reduce risk in the product design phase. This allows us to refine our design tools to match production results and enable our simulation models to accurately predict performance and yields before the first prototype is built, speeding time-to-market.

Sanmina Worldwide

Manufacturing Capabilities

- Full-Service, Microelectronic Assembly and Test
- Complex Optical Assembly, including Active/Passive alignment & Specialty Fiber Splicing
- Experience with Complex Connectorization Custom Packaging, Flex Circuit and Thick-Wide Backplane Technologies
- Precision Automated SMT Assembly with 01005 & Flip Chip Capability
- System-Level Integration, Box-Build and Test
- Value-Add/Value Engineering (VA/VE) Services

Testing Capabilities

- Advanced Test Solutions for Complex Optical, RF & Microwave Products
- Turnkey Test Development: End-to-end Test, Functional and Structural
- Comprehensive Test Facilities: 2D/3D X-Ray
- Flying Probe (FP), In-circuit Test (ICT), Advanced Optical Inspection (AOI) and PC JTAG/Boundary Scan
- Environmental Stress Test (EST)/ Burn-in Facilities

Engineering Capabilities

- Full Turnkey Design for Optical, RF and Microwave Products
- Product Design, Qualification, NPI
- RF/Microwave, Optical, Microelectronics
- 100-200-400Gb/s Components & Integrated Opto-Electronic Modules
- Custom Microelectronic and Optical Packaging Design
- Custom Process Engineering for Complex Optical and Microelectronic Assembly
- VAVE, Product Sustaining

Logistics Services

- Direct Order Fulfillment
- Build-to-Order (BTO)/Configure-to-Order (CTO)

Certifications

- ISO 9001, 14001 and 13485
- TL 9000
- AS9100
- Controlled Goods Registered



CABLES

- Zhangpu, CN
- Monterrey, MX
- Port Glasgow, UK
- San Jose, CA

GLOBAL SERVICES

- Bogota, CO
- Brno, CZ
- Buenos Aires, AR
- El Paso, TX
- Guadalajara, MX
- Johannesburg, ZA
- Penang, MY
- Tatabánya, HU
- Thailand, TH
- Juarez, MX
- Markham, ON
- Melbourne, AU
- Mexico City, MX
- Sao Paulo, BR
- Basingstoke, UK
- Kunshan, CN
- Singapore, SG
- San Jose, CA
- Fort Mill, SC

DESIGN CENTERS

- Carrollton, TX
- Chennai, IN
- Colorado Springs, CO
- Guadalajara, MX
- Kanata, ON
- Singapore, SG
- Yasu, JP
- Huntsville, AL

INTEGRATED MANUFACTURING SERVICES

- Carrollton, TX
- Campinas, BR
- Chennai, IN
- Fermoy, IR
- Guadalajara, MX
- Gunzenhausen, GR
- Haukipudas, FI
- Huntsville, AL
- Kanata, ON
- Kenosha, WI
- Kunshan, CN
- Ma'alot, IL
- Manchester, NH
- Örnköldsvik, SW
- Pathum Thani, TH
- Penang, MY
- Port Glasgow, UK
- San Jose, CA
- Shenzhen, CN
- Singapore, SG
- Tatabánya, HU
- Salt Lake City, UT
- Reynosa, MX

PLASTICS

- Turtle Lake, WI

PCB

- San Jose, CA
- Costa Mesa, CA
- Singapore, SG
- Wuxi, CN

BACKPLANES

- San Jose, CA
- Guadalajara, MX

MECHANICAL SYSTEMS

- Austin, TX
- Fremont, CA
- Guadalajara, MX
- Houston, TX
- Newark, CA
- Shenzhen, CN
- Suzhou, CN

ABOUT SANMINA CORPORATION

Sanmina Corporation is a leading integrated manufacturing solutions provider serving the fastest-growing segments of the global Electronics Manufacturing Services (EMS) market. Recognized as a technology leader, Sanmina provides end-to-end manufacturing solutions, delivering superior quality and support to Original Equipment Manufacturers (OEMs) primarily in the medical, communications networks, defense and aerospace, industrial and semiconductor systems, multimedia, computing and storage, automotive and clean technology sectors. Sanmina has facilities strategically located in key regions throughout the world.

©2018 Sanmina Corporation. Sanmina is a trademark or registered trademark in the U.S. and/or other jurisdictions of Sanmina Corporation. All trademarks and registered trademarks are the property of their respective owners. For more information, visit www.sanmina.com.