



**Founded**  
1998

**Headquarters**

AmberWave Systems  
13 Garabedian Drive  
Salem, NH 03079  
Phone: 603-870-8700  
Fax: 603-870-8607

**Executive Management**

*Richard Faubert*  
President, CEO

*C. Wade Sheen, Ph.D.*  
Vice President of Marketing and  
Business Development

*Anthony Lochtefeld, Ph.D.*  
Vice President of Research

**Board Of Directors**

Chairman of the Board  
*Richard Faubert*  
AmberWave Systems

*William Frezza*  
Adams Capital Management

*Clinton W. Bybee*  
ARCH Venture Partners

*David Mooring*  
Independent Director

*William J. Merritt*  
InterDigital Communications

*Dara Mitchell*  
3i

**Media Contacts**

*Sonja Fridell*  
AmberWave Systems  
603-870-8779  
sfridell@amberwave.com

*Stacey Gaswirth*  
Shelton Group  
972-239-5119, ext. 132  
sgaswirth@sheltongroup.com

**Company Overview**

AmberWave Systems is at the forefront of research and development of advanced technologies for semiconductor manufacturing.

Realizing that research and development is the lifeblood of industry advancement, AmberWave Systems provides a bridge between promising research within universities around the world and commercialization of the results of that research.

By fostering research and development at the university level, joint research through our partners program, and by collaborating with other R&D facilities, AmberWave Systems patents and licenses technologies that will allow the semiconductor industry to continue the phenomenal success of silicon.

AmberWave Systems, a materials research science company with an intellectual property (IP) business model, is delving deep into the physical properties of silicon in order to find new uses – along with associated manufacturing processes – to meet tomorrow’s technology demands.

AmberWave Systems’ first research and development endeavor was strained silicon, which increases speed and at the same time, reduces power consumption within a silicon chip. Strained silicon “stretches” or strains the molecular lattice of silicon, and in turn, reduces resistance and increases mobility of charge carriers.

A recent AmberWave invention called Aspect Ratio Trapping (ART) is a technology that may open the door to even faster, more powerful chips that could find their way into a wide range of applications, from silicon photonics to improved photo-voltaic cells.

In the case of silicon photonics, ART allows manufacturers to combine different materials onto a silicon base, forming chips that use light pulses to carry data, similar to fiber optic technology. The result is increased speed of data transmission far faster than today’s systems allow.

To date, AmberWave Systems has more than 150 patents issued and pending for its technology developments. By complementing its IP licenses with a range of manufacturing and technical support services, AmberWave Systems enables licensees to integrate its technology into leading manufacturing processes.

AmberWave Systems has recently acquired Aonex Technologies, Inc. and its suite of materials-integration technologies originating from the California Institute of Technology (Caltech). Aonex’s materials processing expertise complements AmberWave’s existing competency in laminate materials and, more broadly, advanced semiconductor integration technologies.

Seventy percent of the company’s employees have technical backgrounds or are dedicated to technology research, working primarily at the Company’s corporate headquarters facility in Salem. The company’s 30,000 square-foot facility includes a class-10 clean room, which incorporates state-of-the-art epitaxy and metrology equipment.

**Funding**

To-date, AmberWave Systems has raised \$91 million in funding. Investors include: 3i, Adams Capital Management, Arch Venture Partners, The Hillman Company and TeleSoft Partners. As the company matures, fees from licensing its intellectual property portfolio will fund the company’s continued research and development activities.