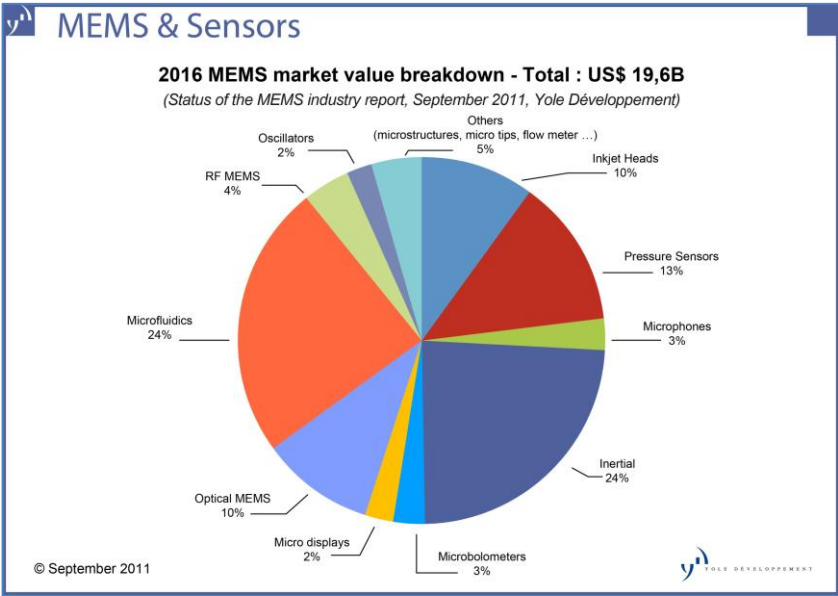


## 2011, the year of MEMS announces Yole Développement

Lyon, France – Dec. 12, 2011 – Jean-Christophe Eloy, President & CEO, Yole Développement presents you his vision of the MEMS industry: 2011 is clearly the year of changes. First time that the MEMS business is reaching \$10B... First time a MEMS company is really approaching \$1B... Invensense IPO... WiSpry MEMS antenna matching device in volume production and in mobile phones... Fabless MEMS is becoming a viable business model... Apple has created a MEMS team... Google has created a MEMS team... Facebook has created a MEMS team ...



The MEMS business is changing definitively: 2011 has been the year of the transition of the MEMS market into big business with clear signs of the adoption and wide diffusion of these devices. Sensors, especially MEMS sensors, are becoming the center of all systems, enabling them to interact with the external world and sense what is happening. This is good for the MEMS industry in general and also for each company involved in MEMS business: from smart munitions to cardiac rhythm management; from smart phone functionality to oil drill monitoring...

*“But there is still a long road to drive before reaching a \$100B business: the integration of MEMS devices is still complex for system manufacturers, delaying fast market adoption,”* says Jean-Christophe Eloy. The ability of MEMS manufacturers to simplify the system integration work will directly impact the growth of MEMS business. A strong collective push of MEMS companies has to be applied to create a MEMS ecosystem in order to simplify the

integration of MEMS into larger systems and modules, enabling non MEMS specialists to use them without a steep learning curve, which is still the case for many applications.

### **What could happen next?**

*“Well, the growth of MEMS business has always been linked to new applications of existing devices (more inertial devices in more mobile systems...) and brand new devices (antenna matching finally on the market with MEMS technology, introduction of the first MEMS based micro fuel cells, Mirasol MEMS based display having its first volume application...)”, explains Yole Développement’s CEO. “This is exactly what will happen in 2012: a few new devices will be introduced in volume production and more units will be produced in inertial sensors, microphones, electronic compass, pressure sensors... and always more pressure on price pushing the device maker to redefine their value proposition by, for example, selling functions and not only devices. This is where the major changes will happen in 2012: if MEMS companies want to preserve their margins, they have to remember that MEMS is all about selling functions and micro-systems.”*

These facts also explain why so many MEMS companies are now the target of acquisition by semiconductor or system makers: first, the MEMS companies have reached a real maturity on the market and second, the VC’s that have invested 10 years ago in a MEMS start-up are now able to get their return on investment... A significant number of semiconductor companies have identified MEMS as a growing area and the M&A in MEMS is a clear sign of such interest. So we can expect both growth of the MEMS unit volume in 2012 and more M&A...

About Yole Développement – [www.yole.fr](http://www.yole.fr)

Beginning in 1998 with Yole Développement, we have grown to become a group of companies providing market research, technology analysis, strategy consulting, media in addition to finance services. With a solid focus on emerging applications using silicon and/or micro manufacturing Yole Développement group has expanded to include more than 40 associates worldwide covering MEMS, Microfluidics & Medical, Advanced Packaging, Compound Semiconductors, Power Electronics, LED, and Photovoltaic. The group supports companies, investors and R&D organizations worldwide to help them understand markets and follow technology trends to develop their business.

#### **CUSTOM STUDIES**

- Market data, market research and marketing analysis
- Technology analysis
- Reverse engineering and reverse costing
- Strategy consulting
- Corporate Finance Advisory (M&A and fund raising)

#### **TECHNOLOGY & MARKET REPORTS**

- Collection of reports
  - Players & market databases
  - Manufacturing cost simulation tools
  - Component reverse engineering & costing analysis
- More information on [www.yole.fr](http://www.yole.fr)

## **MEDIA**

- Critical news, Bi-weekly: Micronews, the magazine
  - In-depth analysis & Quarterly Technology
- Magazines: MEMS Trends– 3D Packaging – PV  
Manufacturing – iLED – Power Dev'
- Online disruptive technologies website: [www.i-micronews.com](http://www.i-micronews.com)
  - Exclusive Webcasts
  - Live event with Market Briefings

## **CONTACTS**

For more information about :

- Services : Jean-Christophe Eloy ([eloy@yole.fr](mailto:eloy@yole.fr))
- Reports: David Jourdan ([jourdan@yole.fr](mailto:jourdan@yole.fr))
- Media : Sandrine Leroy ([leroy@yole.fr](mailto:leroy@yole.fr))

**###**