

## Gartner's Hype Cycle Special Report for 2005

Jackie Fenn, Alexander Linden

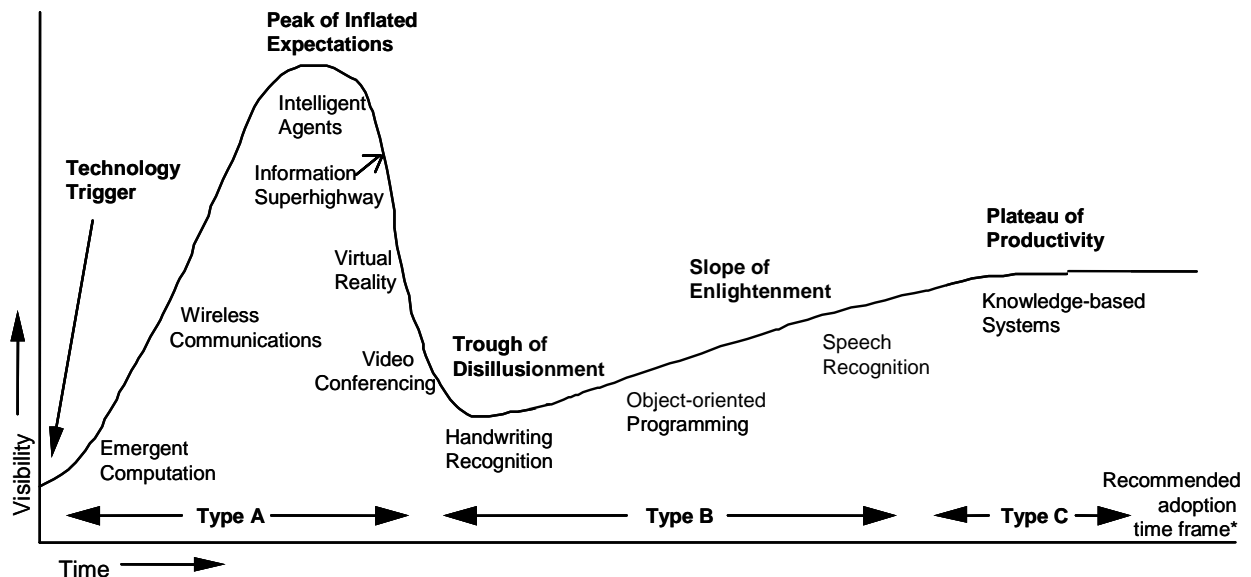
This year, we celebrate the 10th anniversary of Gartner's Hype Cycles. More than 1,600 information technologies and trends across 68 markets, regions and industries are evaluated in the most comprehensive assessment of technology maturity in the IT industry.

## ANALYSIS

Gartner's Hype Cycles highlight the relative maturity of technologies across a wide range of IT domains, targeting different IT roles and responsibilities. Each Hype Cycle provides a snapshot of the position of technologies relative to a market, region or industry, identifying which technologies are hyped, which are suffering the inevitable disillusionment and which are stable enough to allow for a reasonable understanding of when and how to use them appropriately (see "Understanding Gartner's Hype Cycles, 2005").

Ten years ago, Gartner introduced the idea of the Hype Cycle as a commentary on the common pattern of human response to technology (see Figure 1 and "When to Leap on the Hype Cycle"). Something about the pattern resonated deeply with technology planners, and Gartner received requests the following year for an update. Every year since, Gartner has published an Emerging Technologies Hype Cycle and applied the model to an ever-increasing number of IT and business domains.

**Figure 1. First Hype Cycle for Emerging Technologies, 1995**

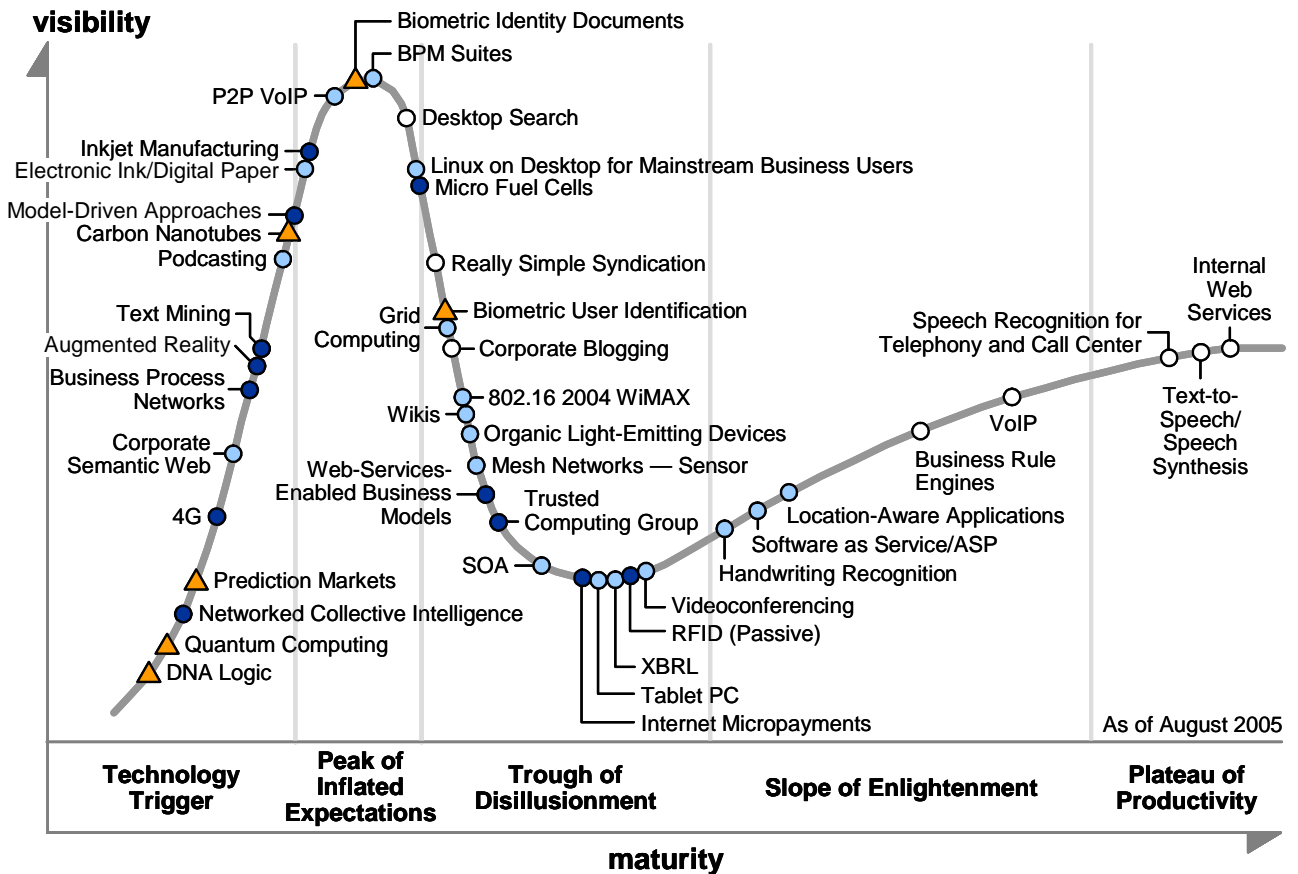


\* The recommended adoption time frame may be swayed in either direction for a technology with a particularly high or low level of potential impact within an organization. For example, a Type B company may wait until the Plateau of Productivity to invest in a technology that will result in only marginal efficiency improvements. On the other hand, a Type C company may be prepared to weather some of the learning experiences of the Slope of Enlightenment for a technology that will have a major impact on its core business processes.

Source: Gartner (January 2005)

The technologies on the 1995 Hype Cycle have evolved; wireless communications have exploded into hundreds of underlying technologies, standards and applications, and the information superhighway has manifested itself through the Internet and World Wide Web to drive ubiquitous information access, new forms of community and whole industries built around online commerce. Some technologies didn't fare so well; videoconferencing, handwriting recognition and speech recognition are still featured 10 years later on the 2005 Emerging Technologies Hype Cycle as they struggle toward mainstream adoption (see Figure 2 and "Hype Cycle for Emerging Technologies, 2005").

**Figure 2. Hype Cycle for Emerging Technologies, 2005**



**Plateau will be reached in:**

- less than 2 years
- 2 to 5 years
- 5 to 10 years
- ▲ more than 10 years
- ⊗ obsolete before plateau

**Acronym Key**

- |  |  |
|--|--|
| <b>4G</b> fourth generation                | <b>SOA</b> service-oriented architecture                     |
| <b>ASP</b> application service provider    | <b>VoIP</b> voice over Internet Protocol                     |
| <b>BPM</b> business process management     | <b>WiMAX</b> Worldwide Interoperability for Microwave Access |
| <b>P2P</b> peer to peer                    | <b>XBRL</b> Extensible Business Reporting Language           |
| <b>RFID</b> radio frequency identification |  |

Source: Gartner (August 2005)

Although the specific technologies change over the years, the Hype Cycle's underlying message endures: *Don't invest in a technology just because it is being hyped or ignore a technology just because it is not living up to early overexpectations.* Be selectively aggressive — identify which technologies could be beneficial to your business, and evaluate them earlier in the Hype Cycle. For technologies that will have a lower impact on your business, let others learn the difficult lessons, and adopt the technologies when they are more mature.

This year, the Hype Cycle Special Report contains 68 Hype Cycles published in four sets: Communications and IT Services; Infrastructure and Operations; Software and Applications; and Regions and Vertical Sectors.

## Communications and IT Services

Communications and IT Services Hype Cycles present the evolving worlds of wired and wireless networking, call center and speech technologies, and the latest assessment of the IT services market, with its frenzy to deliver globally across the spectrum of IT and business process services.

Wireless technologies in particular continue to evolve rapidly, including an ongoing proliferation of 802.11 standards and a level of development of software and services that outpaces that of the underlying hardware. In addition, confidence is returning to the broader communications and networking sector, with greater investment by vendors for product differentiation, resulting in accelerated technology advancements:

- "Hype Cycle for Contact Center Infrastructure, 2005"
- "Hype Cycle for Enterprise Speech Technologies, 2005"
- "Hype Cycle for IT Services, 2005"
- "Hype Cycle for Networking and Communications, 2005"
- "Hype Cycle for Network Service Provider Infrastructure, 2005"
- "Hype Cycle for Telecommunications, 2005"
- "Hype Cycle for Wireless Hardware, Software and Services, 2005"
- "Hype Cycle for Wireless Networking, 2005"

## Infrastructure and Operations

Infrastructure and Operations Hype Cycles include hardware, operating systems and key infrastructure technologies, as well as infrastructure management issues.

This year's set of Hype Cycles show how a growing focus on a key topic can give rise to a rapid expansion of technologies, standards and applications. The recent explosion of interest in security means that the Information Security Hype Cycle is now joined by drill-down Hype Cycles on data security, biometrics, identity access management, infrastructure protection and vulnerability management:

- "Hype Cycle for the Uses of Biometric Technologies, 2005"
- "Hype Cycle for Data Security, 2005"
- "Hype Cycle for Human-Computer Interaction, 2005"
- "Hype Cycle for Identity and Access Management Technologies, 2005"
- "Hype Cycle for Information Security, 2005"
- "Hype Cycle for Infrastructure Protection, 2005"
- "Hype Cycle for IT Operations Management, 2005"
- "Hype Cycle for Linux, 2005"
- "Hype Cycle for Open-Source Software, 2005"
- "Hype Cycle for PC Technologies, 2005"

- "Hype Cycle for Printing Markets and Management, 2005"
- "Hype Cycle for Semiconductors, 2005"
- "Hype Cycle for Server Technologies, 2005"
- "Hype Cycle for Storage Software Technologies, 2005"
- "Hype Cycle for Storage Technologies, 2005"
- "Hype Cycle for Vulnerability Management, 2005"

### **Software and Applications**

Software and Applications Hype Cycles span the core IT domains of application development, integration and architecture, through portals and workplace technologies, and into business applications such as customer relationship management and supply chain management.

At this point of industry evolution, business application innovation is critically dependent on innovative infrastructure technologies, and the Business Application Technologies Hype Cycle reflects the impact, penetration and maturity of such technologies in this context. Other Hype Cycles demonstrate how technologies such as radio frequency identification have expanded in scope enough to warrant their own Hype Cycles, which cover a range of subtechnologies and applications:

- "Hype Cycle for Application Development, 2005"
- "Hype Cycle for Application Integration and Platform Middleware, 2005"
- "Hype Cycle for B2B CRM Technologies, 2005"
- "Hype Cycle for B2C CRM Technologies, 2005"
- "Hype Cycle for Business Application Technologies, 2005"
- "Hype Cycle for Business-Centric Supply Chain Management, 2005"
- "Hype Cycle for Business Intelligence and Data Warehousing, 2005"
- "Hype Cycle for Collaboration and Communication, 2005"
- "Hype Cycle for Content Management, 2005"
- "Hype Cycle for Corporate Performance Management, 2005"
- "Hype Cycle for CRM Customer Service and Support, 2005"
- "Hype Cycle for CRM Marketing Applications, 2005"
- "Hype Cycle for CRM Sales, 2005"
- "Hype Cycle for E-Learning, 2005"
- "Hype Cycle for Enterprise Asset Management, 2005"
- "Hype Cycle for the High-Performance Workplace, 2005"
- "Hype Cycle for Portal Ecosystems, 2005"

- "Hype Cycle for Radio Frequency Identification, 2005"
- "Hype Cycle for Web Services, 2005"
- "Hype Cycle for XML Technologies, 2005"

### **Regions and Vertical Sectors**

Regional Hype Cycles address the significant disparity of technology adoption across geographic regions. Many technologies depend on the existence of an ecosystem that develops differently around the world. User adoption and needs can differ because of political, cultural and financial factors.

Vertical-Sector Hype Cycles reflect the status of technologies in a particular industry. Similar to regions, different industries have varying business needs. Thus, the positioning of technologies may well be different on an industry Hype Cycle — earlier or later, or maturing faster or slower — than on a Hype Cycle that offers a generic, cross-industry perspective. These Hype Cycles also include technologies and trends specific to an industry that do not appear on other Hype Cycles.

### **Regions**

- "Hype Cycle for Emerging Technologies in China, 2005"
- "Hype Cycle for Emerging Technologies in India, 2005"
- "Hype Cycle for Emerging Technologies in Japan, 2005"
- "Hype Cycle for Emerging Technologies in Latin America, 2005"

### **Vertical Sectors**

- "Hype Cycle for Automotive Electronics, 2005"
- "Hype Cycle for the Automotive Industry, 2005"
- "Hype Cycle for the Banking Industry, 2005"
- "Hype Cycle for Consumer Goods, 2005"
- "Hype Cycle for Consumer Technologies, 2005"
- "Hype Cycle for Government, 2005"
- "Hype Cycle for Healthcare Payers, 2005"
- "Hype Cycle for Healthcare Provider Applications and Systems, 2005"
- "Hype Cycle for Healthcare Provider Technologies, 2005"
- "Hype Cycle for Investment Services, 2005"
- "Hype Cycle for Life Sciences, 2005"
- "Hype Cycle for Manufacturing, 2005"
- "Hype Cycle for the Media Industry, 2005"
- "Hype Cycle for the Oil and Gas Industry, 2005"

- "Hype Cycle for Product Life Cycle Management, 2005"
- "Hype Cycle for Retail Technologies, 2005"
- "Hype Cycle for Transportation, 2005"
- "Hype Cycle for Utility Industry Applications and Business Processes, 2005"
- "Hype Cycle for Utility Industry Technologies, 2005"

## **REGIONAL HEADQUARTERS**

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Corporate Headquarters  
56 Top Gallant Road  
Stamford, CT 06902-7700  
U.S.A.  
+1 203 964 0096

European Headquarters  
Tamesis  
The Glanty  
Egham  
Surrey, TW20 9AW  
UNITED KINGDOM  
+44 1784 431611

Asia/Pacific Headquarters  
Level 7, 40 Miller Street  
North Sydney  
New South Wales 2060  
AUSTRALIA  
+61 2 9459 4600

Latin America Headquarters  
Av. das Nações Unidas 12.551  
9 andar—WTC  
04578-903 São Paulo SP  
BRAZIL  
+55 11 3443 1509