

# The Asia-Pacific Telecommunications Marketplace

by Cindy Payne, Founder and Managing Director & Jonathon Gould, Co-Founder and Director, Asia-Pacific Connections

With 712 million telecommunications subscribers, 36 per cent of the world's total, Asia-Pacific is the largest regional telecommunications marketplace in the world. China, in terms of network capacity and subscribers, is the world's largest national telecommunications marketplace. India, with a 37 million fixed-line telephone network, although among the world's largest, serves only 3.7 per cent of the country's one billion people. Despite its many technologically sophisticated regions and companies, much of the region, and especially its SMEs, suffer from a lack of adequate telecommunications-based services.



Cindy Payne is the Founder and Managing Director of Asia-Pacific Connections. Ms Payne brings over 20 years experience of Asia-Pacific sales, marketing and general management to the company. Located in the region since 1991, Ms Payne founded Asia-Pacific Connections in 1993 to assist IT companies to expand into and across Asia-Pacific. Prior to launching Asia-Pacific Connections, Ms Payne managed the Asia-Pacific distribution sales business for Quantum Corporation, a major hard disk drive manufacturer. She grew the business from its 1986 start-up phase to a complex business with revenues exceeding US\$90 million. Previously, Ms Payne held Asia-Pacific marketing management positions at two global distributors. Ms Payne is a frequent speaker at industry conferences and often has articles published in industrial journals. In addition, Ms Payne has served on the boards of several professional women's associations. She was the founding chairperson of Singapore Women in Technology (SWIT.) Ms Payne has two Bachelor of Arts degrees in International Studies and Languages from Miami University, Ohio, USA.



Jonathon Gould is the Co-founder and Director of Asia-Pacific Connections. He has over 20 years of sales, marketing and general management experience in the finance and technology industries, including nine years in Asia-Pacific and two years in Europe. Until May 2002, Mr Gould was Senior Vice-President, Business Development, Maestro International, MasterCard's global online debit system. He was responsible for building the Maestro brand, and increasing cards usage and acceptance globally. From 1997 to 2000, Mr Gould was Senior Vice-President, Marketing for MasterCard Asia-Pacific. In that role, Mr Gould led the regional support programmes including advertising and promotions, sponsorships, communications, new product development, acceptance development and market research. Prior to joining MasterCard, Mr Gould was the General Manager, Asia-Pacific, for VeriFone Pte Ltd, where he spent over eight years working throughout Asia-Pacific, building their business to US\$70 million. Mr Gould began his career in the payments industry at Union Bank of California. Mr Gould earned a Master's degree in Business Administration (MBA) from the University of Michigan at Ann Arbor and a Bachelor of Arts degree in Economics from the University of California, Los Angeles. Mr Gould is recognised as a leader in Asia-Pacific marketing and frequently speaks at industrial conferences and seminars.

The Asia-Pacific region has an intriguing mix of businesses. The region has advanced, technologically sophisticated cities and hosts centres of high technology. The region also has large sophisticated, world-class, multinational companies that use the best and latest concepts and technologies to compete in the world's marketplaces. In contrast, the region also has vast areas where today's advanced technology and business methods are largely unheard of. The bulk of the Asia-Pacific region's businesses, and the employers of the majority of the region's workers, are small and medium enterprises.

The SMEs in the Asia-Pacific region, like their counterparts throughout the world, need all the help they can get to

keep their businesses going, to compete and profit. Unfortunately, for the most part, they get little help from the information and communication technologies (ICTs) that drive the progress of more advanced firms around the world. SMEs in much of the region have limited access to telephony, let alone high-speed broadband links to the Internet, and have few possibilities to own, maintain or effectively use computers with sophisticated systems. This sort of access to technology, though, is exactly what SMEs need. SMEs have to contend with many serious problems:

▲ Limited financial, human and technological resources

▲ Limited access to advanced

communications and information technology

▲ Limited knowledge of advanced business methodology

▲ Limited access to information about the best practices in their own fields

▲ Limited access to training

▲ Limited knowledge of and access to national, regional and world markets.

Telecommunications, especially broadband access to the Internet, and information technology can help improve this situation but, generally speaking, SMEs will need significant help to adopt these new technologies. Government and

Connect-World Asia-Pacific

www.connect-world.com

## REGIONAL TELECOMMUNICATIONS MARKET

Figure 1: Absolute and relative size of broadband market in western Europe



Source: European Broadband Access Services Market Analysis Update, 2002-2006, IDC #B7341, October 2002

international agency programmes do help to some extent, but most digital inclusion programmes are aimed at the individual and not the SME. Entirely new strategies are needed to effectively promote the digital inclusion of SMEs, programmes that include training, the development of appropriate native language systems and content, and affordable access to the necessary equipment. Fortunately, the Asia-Pacific region has the skills and the industries to provide the hardware and software the SMEs need.

representing 36 per cent of the world's total. And unlike telecommunications markets in the rest of the world, the Asia-Pacific telecommunications market shows no signs of the malaise that has afflicted other more-developed telecoms markets.

According to recently-released research from international research firm, International Data Corporation (IDC), the telecommunications services marketplace in Asia-Pacific (excluding Japan) will be valued at US\$137 billion

reports that China is now the world's largest telecommunications marketplace, both in terms of network capacity, as well as the number of subscribers. By the end of the year 2001, Chinese telecommunications carriers had made an aggregated investment of US\$32 billion in telecommunications infrastructure, an increase of 15.3 per cent over 2000. This investment helped generate subscribers, while the revenue from related services totalled US\$43.2 billion in 2001. By May 2002, China had 220 million fixed-lines – of which only 29 per cent were subscribed – and 240 million mobile networks, of which only 13 per cent were used. So China still has ample capacity to fulfil its unabated consumer demand.

ITU confirms that China leads the world in mobile users and is second only to the United States in fixed-line penetration. Providers of fixed-line services include China Telecom, China Mobile, China Unicom, China Netcom, Jitong, China Railways Corporation and ChinaSat. Of these, only China Mobile and China Unicom are licensed to provide mobile services. China Telecom is by far the dominant carrier – in 2000, it had a turnover of US\$10.4 billion, boasting 53 per cent of China's telecommunications industry revenue.

China plans to make the 2008 Beijing Olympics a showcase for the country's IT and telecommunications infrastructure. To that end, it is investing heavily in 16 major information communication and technology (ICT) projects to ensure visitors receive a rich and personalised experience during the Games, with minimised language barriers. Major projects include:

▲ The provision of key digital and data centres

▲ Wireless networking and systems management

▲ Optical networks

▲ 2G/2.5G/3G-compatible mobile systems

▲ A fully-commercial CDMA network (at the moment China's dominant networks are GSM-only).

Figure 2: At the top of the world

Distribution of telephone subscribers by region, 1991, 1996 and 2001



Note: America refers to Western Hemisphere. Source: ITU World Telecommunication Indicators Database.

According to the International Telecommunications Union (ITU), in 2001, Asia-Pacific emerged as the largest telecommunications marketplace in the world. Between 1991 and 2001, the number of telecommunications subscribers in Asia-Pacific increased from 122 million to 712 million,

by the end of 2003. Growth will be driven by deregulation and pent-up demand for telecommunications services from less-developed countries throughout the region, especially in the up-and-coming economic powerhouses of China and India.

The US Department of Commerce

China plans to make the 2008 Beijing Olympics a showcase for the country's IT and telecommunications infrastructure. To that end, it is investing heavily in 16 major information communication and technology (ICT) projects to ensure visitors receive a rich and personalised experience during the Games, with minimised language barriers. Major projects include:

▲ The provision of key digital and data centres

▲ Wireless networking and systems management

▲ Optical networks

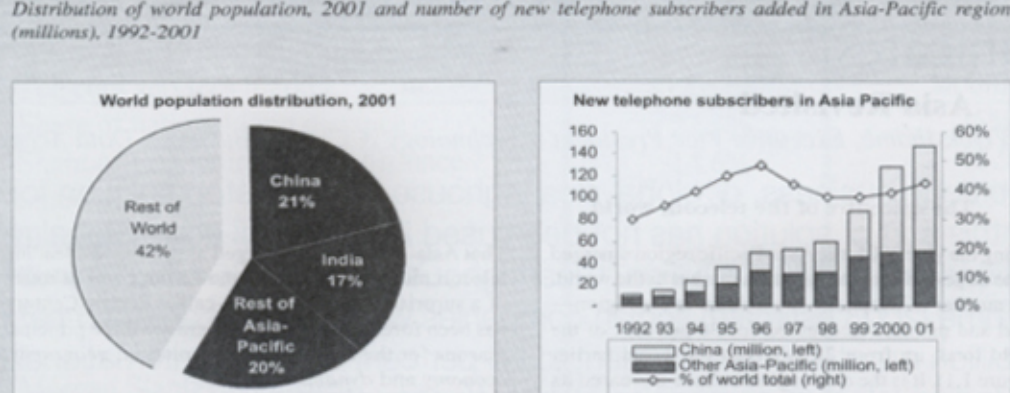
▲ 2G/2.5G/3G-compatible mobile systems

▲ A fully-commercial CDMA network (at the moment China's dominant networks are GSM-only).

## REGIONAL TELECOMMUNICATIONS MARKET

Figure 3: More than half the world's population means lots of telephones

Distribution of world population, 2001 and number of new telephone subscribers added in Asia-Pacific region (millions), 1992-2001



Source: ITU World Telecommunication Indicators Database.

India's population exceeds 1 billion people and, according to IDC, its 37-million fixed-line telephone network is one of the largest in the world. However, fixed-line penetration in the subcontinent remains remarkably low – at only 3.7 per cent. India opened its market to private competition in the early 1990s, but the incumbent carrier, Bharat Sanchar Nigam Ltd (BSNL), still remains the dominant carrier, owning over 32 million lines, with an annual growth rate of 23–24 per cent. Other players in the fixed-line market include MTNL, Tata, Bharti and Hughes. In the mobile marketplace, competition has resulted in price wars that have significantly damaged the market. In 2000, India had 17 mobile operators with 42 networks; however, after a series of mergers and acquisitions, only 16 players remain – with the dominant players being the BPL-Bhirla-AT&T-Tata alliance, Bharti-Singtel, Hutchinson and Reliance.

By 2010, India plans to ensure that fixed-line telephone penetration will increase to 15 per cent. To meet this goal, India will have to invest in its telecommunications infrastructure to the tune of an estimated US\$106 billion. According to the National Association of Software and Service Companies (NASSCOM), this investment will include a wide range of communications services like cellular, Internet, radio trunking, global mobile personal communication by satellite (GMPSC) and other value-added services.

Over the last five years, there has been mounting concern that developing

countries, which lack the resources to benefit economically from ICT, will be further marginalised by the Internet revolution. In India, this is a major issue, with NASSCOM reporting that the country's US\$13.5 billion IT industry is highly dependent on the outsourcing of IT functions from US and European-based enterprises. Infrastructure bottlenecks – such as lack of bandwidth, low-speed leased lines and slow servicing – are threatening India's IT growth. NASSCOM has warned that if India does not make these planned infrastructure improvements, it could lose at least 30 per cent of its target IT export market in the coming years.

Part of the reasons behind the steady growth and increase of the Asia-Pacific's telecommunications market is that most of the markets are manufacturing-based, export-oriented economies. The global move towards using electronic Supply Chain Management (e-SCM) technologies to reduce inventory cost and decrease time-to-market is forcing Asia-Pacific to invest in upgrading the IT and telecommunications infrastructure across the region to ensure regional competitiveness in the global economy.

According to ITU, Asia-Pacific carriers have remained viable and profitable largely because they have avoided the crippling debt that European operators assumed, while vying for third-generation (3G) mobile licences in a painfully competitive bidding process. In addition, the strategic importance of the ICT industry to the region's well-being has meant that governments have

frequently kept their stakes in the incumbent telecommunications operators – either through partial or full ownership – thus, ensuring the focus remains on development, rather than on shareholder value or short-term profit.

IDC reported in October 2002 that within the traditional data networks services marketplace, leased circuit, frame relay, DDN (only in the Peoples Republic of China), ATM, x2.5 and ISDN technologies reign supreme. Leased circuits will continue to dominate, followed by DDN (due to the sheer size of China's telecommunications market) and frame relay. The data services market has traditionally been an area of consistent revenue for service providers in the region and IDC projected it to be valued close to US\$10 billion at the end of 2002, an expected year-on-year growth of 5 per cent. However, new technologies including wireless, PSTN, VoIP, IP-VPN and broadband infrastructure and related services are expected to drive growth going forward. Broadband services alone grew 146 per cent in 2001, leading to the emergence of Metro Ethernet Internet access and the provision of managed wireless LAN services throughout urban areas across the region. As broadband penetration rates increase and users grow more dependent on wireless devices, both IDC and ITU believe there will be a definite trend away from fixed-line, towards mobile communications – especially in the less-developed countries where fixed-line infrastructure cannot accommodate demand □

Connect-World Asia-Pacific

www.connect-world.com