



STM Global Publishing Opportunities: India and China

Victor Camlek
Vice President Market Intelligence
Healthcare & Science business of Thomson Reuters
October 2009



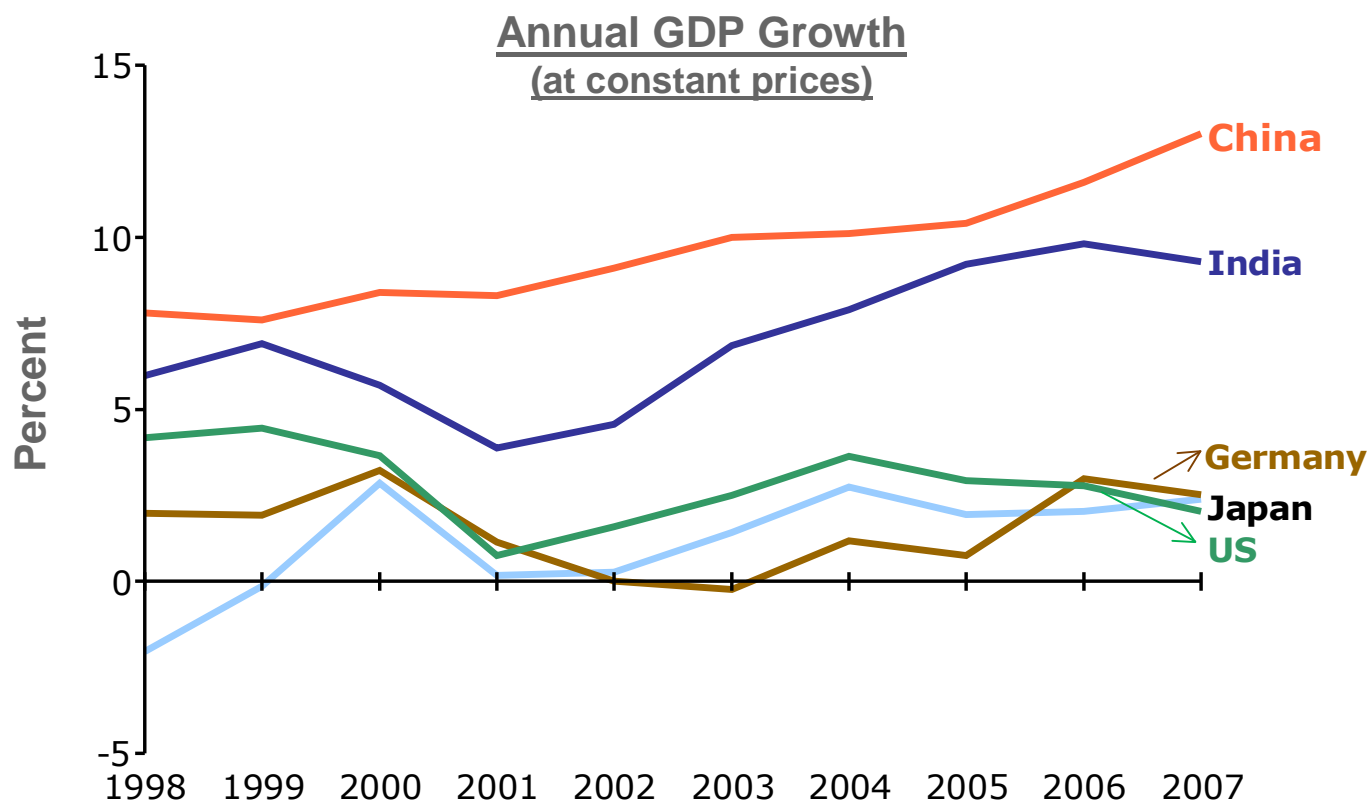
THOMSON REUTERS

STM Global Publishing Opportunities: India and China

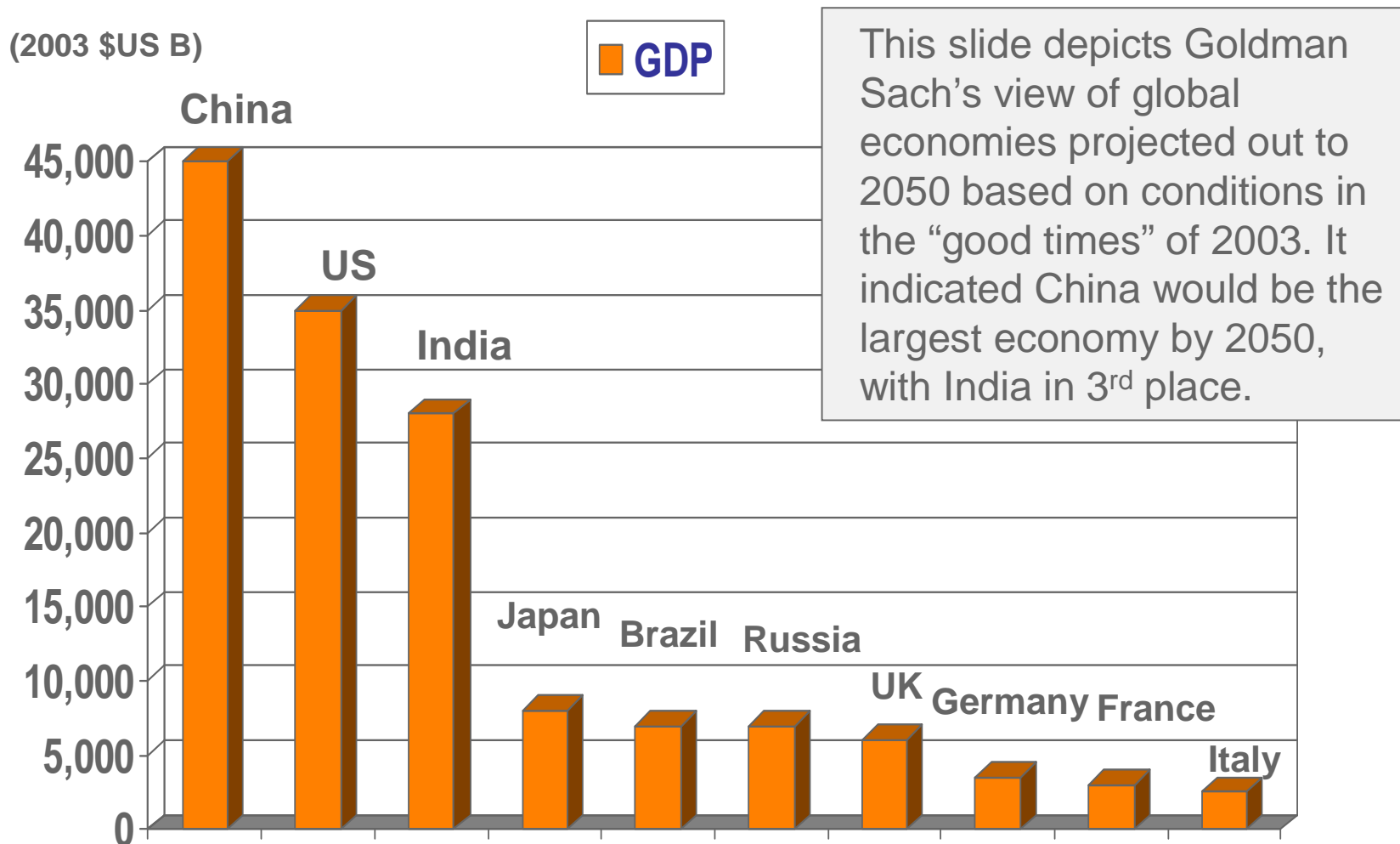
- Growth in China & India
- Publishing Market Opportunities
- Growth Drivers for STM Publishing in China
- Publishing Offshoring in India
- Conclusion

Historic View: Growth in China & India

- The decade prior to the current economic crisis saw GDP growth for China + India consistently much higher than US, Germany + Japan
- In general, most forecasts were quite optimistic about prospects



The 2003 Forecast of the World in 2050



Then: The Economic Crisis Hit

- In April '09, the IMF stated the world was in the “*deepest post–World War II recession by far,*” caused by “*a massive financial crisis and acute loss of confidence*”

This raised the global economic question: Are China and India insulated from the overall economic crisis that followed the “sub-prime” mortgage crisis in the U.S.?

- In October '09, the IMF projected economic decline/growth rates for 2009 & 2010 as follows:

Region	2009P	2010P
World	(1.4%)	+2.5%
US	(2.7%)	+1.5%
Euro area	(4.2%)	(0.3%)
China	+8.5%	+9.0%
India	+5.4%	+6.4%

The Prognosis is Encouraging

“While all of the major advanced economies are projected to shrink in 2009 and recover only gradually thereafter, the large emerging economies (particularly China and India) are expected to experience only a slowdown not a contraction in 2009 and generally retain much better medium term prospects than the advanced economies.”

– PWC, January 2009

“Although China and India both have unique vulnerabilities, each can also better insulate their economies from the future vagaries of global market turmoil, for example, by putting in place long-term strategies to make their economies more resilient to global market downturns.”

– Professor Shalendra D. Sharma, PhD, Dept. of Politics, Univ. of San Francisco



Expert Views of Notable Economic Drivers

India

- Economy *has* been affected by global financial crisis
 - Foreign investment “dried up”
 - Cuts in outsourced work from banking and finance industries + call centers
- Concerns about drought potential
 - If severe, could affect 2/3 of the population
 - Government would have to provide some sort of stimulus, which would increase budget deficits
- Some positive signs
 - The “brain drain” has stopped due to growing prosperity; per capita, wages are up 7-8% over the last decade
 - The rupee has held its own (not as volatile as some other AP countries)
 - Some private capital is returning (from both foreign and local investors)

China

- Recent growth due to:
 - Massive Government stimulus package in Nov '08 (US\$600B)
 - Huge surge in bank lending
- Long run view is “strongly optimistic”
 - But China can't maintain the high growth its seen without continued high level of investment
- Growth will likely slow from current 9-10% rates down to ~6% out to 2020/2030 due to:
 - Declining birth rate
 - Rural-urban migration has peaked
- STM research market outlook is “highly positive”
 - Major priority to build up high tech development & knowledge infrastructure



Following the Global Recession: India

India: Growth Has Continued Despite Some Impact

India's industrial output growth in July slowed from a 16-month high in June, but manufacturing continued to hum, signaling that a recovery in Asia's third largest economy is still on track.

Analysts said demand ahead of the upcoming festival season will ensure industrial activity expands at a steady clip, while a late burst in monsoon rains and a slew of social schemes will temper any fall in rural incomes.

The index for industrial production expanded 6.8% from a year earlier in July, after a revised 8.2% increase in June, data from the Central Statistical Organisation showed Friday.



Following the Global Recession: India, continued

India's Drought Is Worst Since 1972

India's meteorological department declared the country's four-month monsoon season had ended, leaving behind what it said was the country's worst drought in decades, with rains 23% below normal.

The drought could threaten India's otherwise robust economic growth. About half of India's 1.2 billion people depend on agriculture for their livelihood.

Sanjit Das for The Wall Street Journal India estimated 600 million farmers rely heavily on annual monsoon rains: 60% of its farmland is rain-fed, with the rest relying on irrigation.

Many economists forecast that gross domestic product will expand about 6% this year, but the weak monsoon already has sent food prices skyrocketing and is expected to stoke inflation.



Following the Global Recession: China

China Pledges To Continue Supportive Policies for Economic Rebound

China sees its economy on an upward trend and will continue to implement the proactive fiscal policy and moderately eased monetary policy to support growth as the rebound is yet to be stable, said Chinese Finance Minister Xie Xuren Tuesday [October 6].

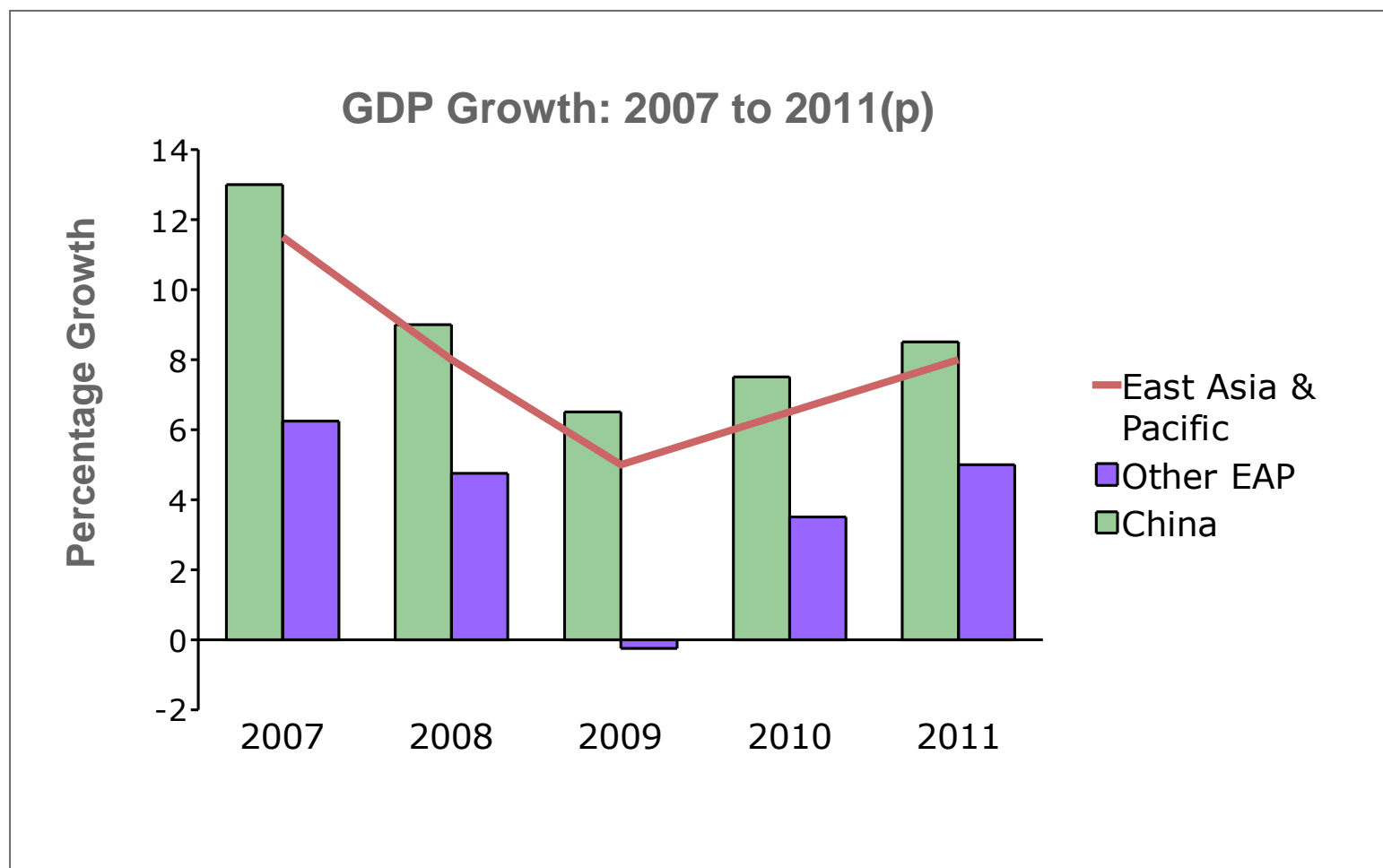
“We are seeing more positive signs and an up-ward trend in the Chinese economy. However, we are also soberly aware that the economic rebound is yet to be stable, firm, and balanced,” said Xie in a speech to the plenary session of the International Monetary Fund (IMF) and the World Bank annual meetings held in Istanbul, Turkey.

“China will continue with the proactive fiscal policy and moderately eased monetary policy, further implement and improve the policy package, and ensure the achievement of our social and economic development goals,” he told the meeting.



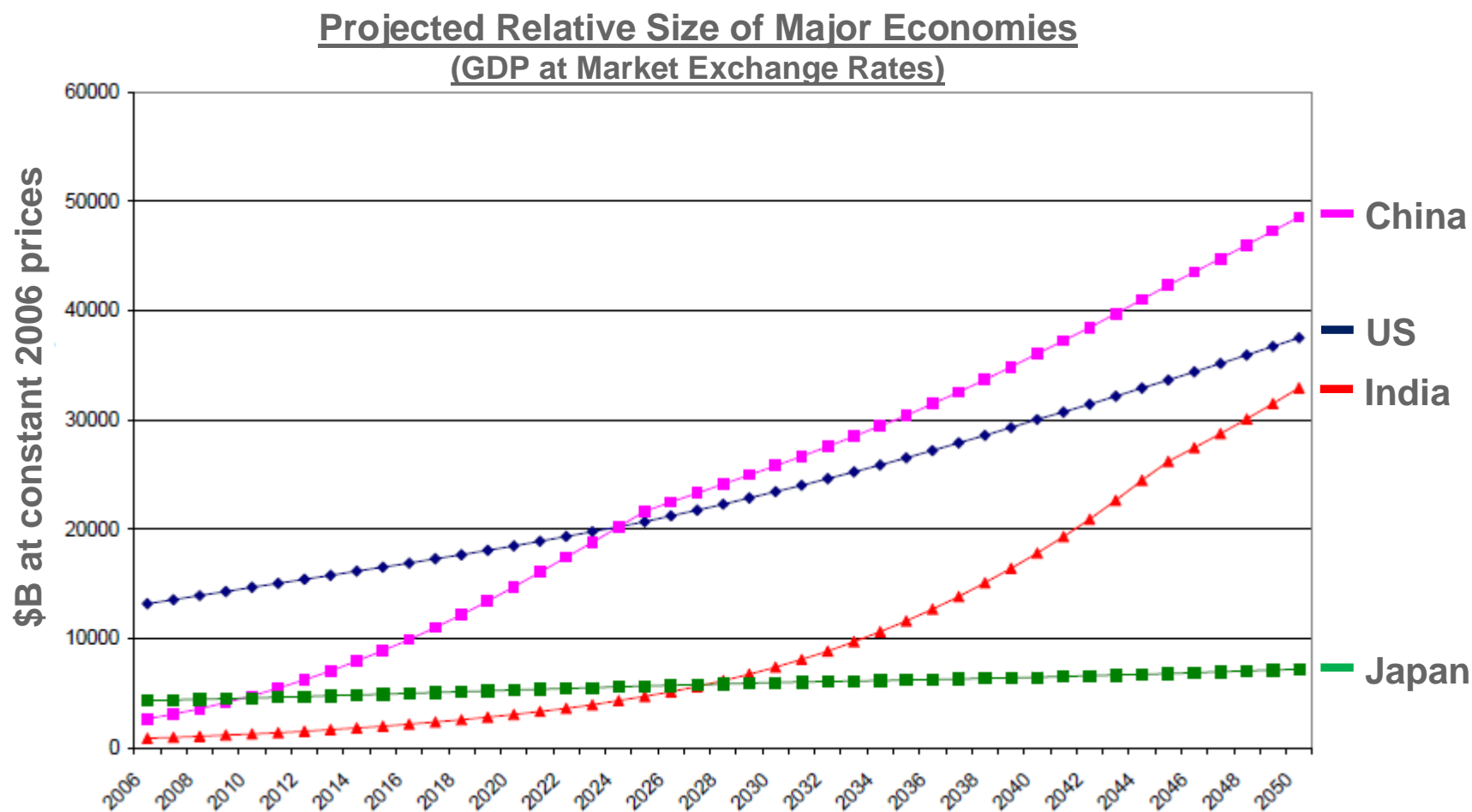
World Bank Projects AP Recovery Led by China

- The World Bank projected in 2009 that recovery in East Asia and Pacific region would be led by China



A Recent Forecast of 2050

- Even in light of recent economic conditions, PWC still sees China, the US and India as the largest economies by 2050



STM Global Publishing Opportunities: India and China

- Growth in China & India
- Publishing Market Opportunities
- Growth Drivers for STM Publishing in China
- Publishing Offshoring in India
- Conclusion

Publishing in China & India and the STM Segment

All Publishing	Market Size 2007	Growth ('03-'07 CAGR)	Market Forecast 2012	Growth Forecast ('07-'12 CAGR)
China	\$28.3B	9.1%	\$46.3B	10.4%
India	\$5.8B	12.8%	\$8.5B	7.8%

STM Publishing in China

- Average growth has been ~14%, faster than growth of the total publication market in China; major S&T publishers forecast to see ~10% growth for 2006-2009
- Input into scientific and technological innovation “enhanced” year-by-year
- Investment in higher ed. has been increasing; especially for select universities that China hopes will become globally renowned hubs of S&T research
- Libraries have seen increased budgets for books, periodicals + related materials
- STM Publishing in India
 - Leading STM publishers are The Indian Academy of Sciences and the Council of Scientific & Industrial Research; journals are also published by other Academies, professional societies, educational institutions and some commercial firms



Recent Publisher Momentum Towards AP

Economics

- Growing economies in Asia Pacific
 - Especially China and India
 - Mature but attractive markets in Japan

Demographics

- Highly skilled workforce
 - India stands out for publishers offshoring
 - Large pool of technical workers
 - Favorable cost situation

Opportunities

- Increasing market for information services
- Favorable offshoring environment
- Internet penetration will rise dramatically

“The demand for scientific and technical materials in any particular market is linked directly to the level of research and development spending. The commitment to R&D is long established in the U.S. and Europe. Now R&D spending is on the rise in places like China and India, so publishers have increased their presence in those markets.”

– Simba, *Global STM Publishing 2008-2009, Scientific & Technical Publishing*



Global Publishers in China & India

Select Publisher Initiatives

- Product development
 - Regional content
 - Local language
 - Dedicated interface/portal
- Publishing partnerships
 - Local publishers
 - Regional academic institutions/consortia/research institutes

Publishers with Regional Facilities

- Regional sales/marketing/editorial/production facilities
 - Thomson Reuters
 - Elsevier
 - Informa/Taylor & Francis
 - Nature Publishing Group
 - Oxford Univ. Press
 - Springer
 - Wiley-Blackwell
 - Wolters Kluwer

Spotlight on Select Global STM Publisher Activity

Publisher	Initiatives Focused on China & India
Thomson Reuters	<ul style="list-style-type: none"> • Chinese language version of Science division web site • Partnership with Chinese Academy of Sciences to host <i>Chinese Science Citation</i> database • Two editorial centers in India • Partnership with Chinese Ministry of Info. Industry (MII) for the Thomson Joint Laboratory for Intellectual Property Development; Chinese users can access its patent databases via MII Lab
American Chemical Society (ACS)	<ul style="list-style-type: none"> • Chinese language version of ACS web site • Held first joint symposium between ACS + Chinese Chem. Society (CCS) in China, Nov 2008 • New US-China Workshops for Early Career Chemical Researchers to foster collaboration
Elsevier	<ul style="list-style-type: none"> • Chinese language version of Elsevier web site • <i>Chinese Journal of Natural Medicines</i> available for the first time in English on <i>ScienceDirect</i> • Co-hosted with China's <i>Science News</i> the "Attracting Academic Talent Summit" in Beijing, Jun '09 • Elsevier's S&T division China + Science News Bi-Weekly launched the "Scopus Young Scientist" award, locally referred to as the Scopus' Future Star of Science award
Nature Publishing Group (NPG)	<ul style="list-style-type: none"> • Launched Nature China & Nature India web sites to highlight region's scientific research • Launched NPG Nature Asia-Pacific to handle editorial, marketing, sales & production in the region • Co-publish with local partners 3 of China's top ranked journals in life science or chemistry
Royal Society of Chemistry (RSC)	<ul style="list-style-type: none"> • Collaboration with CCS to build presence in China • In Sep '09, RSC co-hosted the first China-UK symposium on medicinal chemistry and officially opened its Shanghai office
Springer	<ul style="list-style-type: none"> • Co-publishing initiatives with various Chinese and Indian institutions and societies; has a Chinese Scientific Publishing Advisory Board
Wiley-Blackwell	<ul style="list-style-type: none"> • Local office in India; STM publishing programs in Asia
Wolters Kluwer	<ul style="list-style-type: none"> • Maintains office in China; strategy of expanding local content in China & India

Some Recent Developments

- **China was Guest of Honor at Frankfurt Book Fair**
- **Springer and the Chinese Academy of Sciences (CAS)** announced the publication of strategic reports planning the next 40 years of progress in science and technology. All reports are co-published in English by Springer and Science Press. The Chinese edition is published by Science Press.
- **Ovid is planning a new Chinese-language interface for the OvidSP search and discovery platform.** *“Our expanding customer base in China for both our Ovid and LWW businesses makes it a strong focus area for us.”*
- **Harvard and National Library of China Digitization Project**
The project will digitize Harvard-Yenching Library’s entire 51,500-volume Chinese rare book collection
- **Thomson Reuters Report on India’s Scientific Research Output describes huge increase since 2000**

STM Publisher Focus in China & India

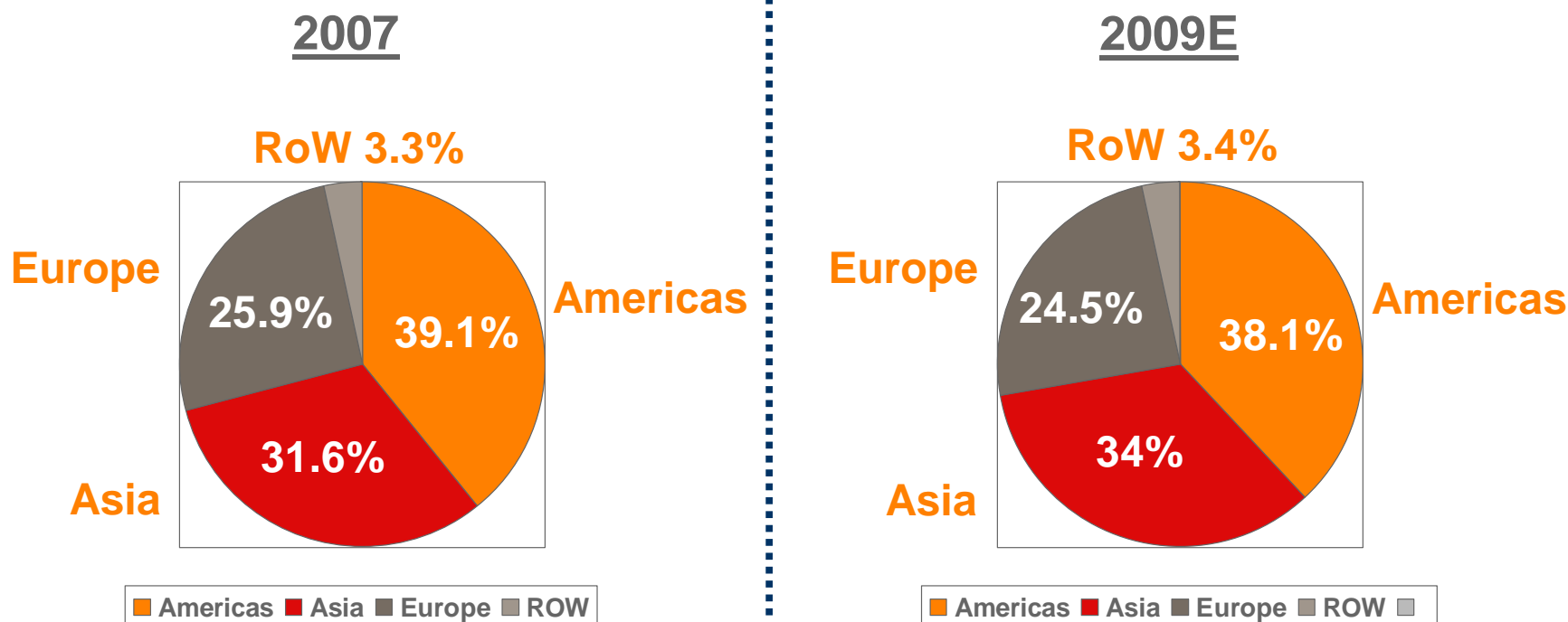
- Two areas of opportunity:
 - As markets that will both produce and consume STM content
 - As providers of offshoring services for the STM publishing industry
- China
 - China is of interest to STM publishers as a market that will both produce and consume content based on various market drivers, which we will review
 - While China does some offshoring, it is primarily with Japan; China does not have the English language skills to provide significant STM publisher services
- India
 - India will also produce/consume content, but to a lesser extent than China
 - India remains of interest for publishing offshoring services, despite some possible negativity in overall trends for offshoring in the country, as we'll see later in the presentation

STM Global Publishing Opportunities: India and China

- Growth in China & India
- Publishing Market Opportunities
- Growth Drivers for STM Publishing in China
- Publishing Offshoring in India
- Conclusion

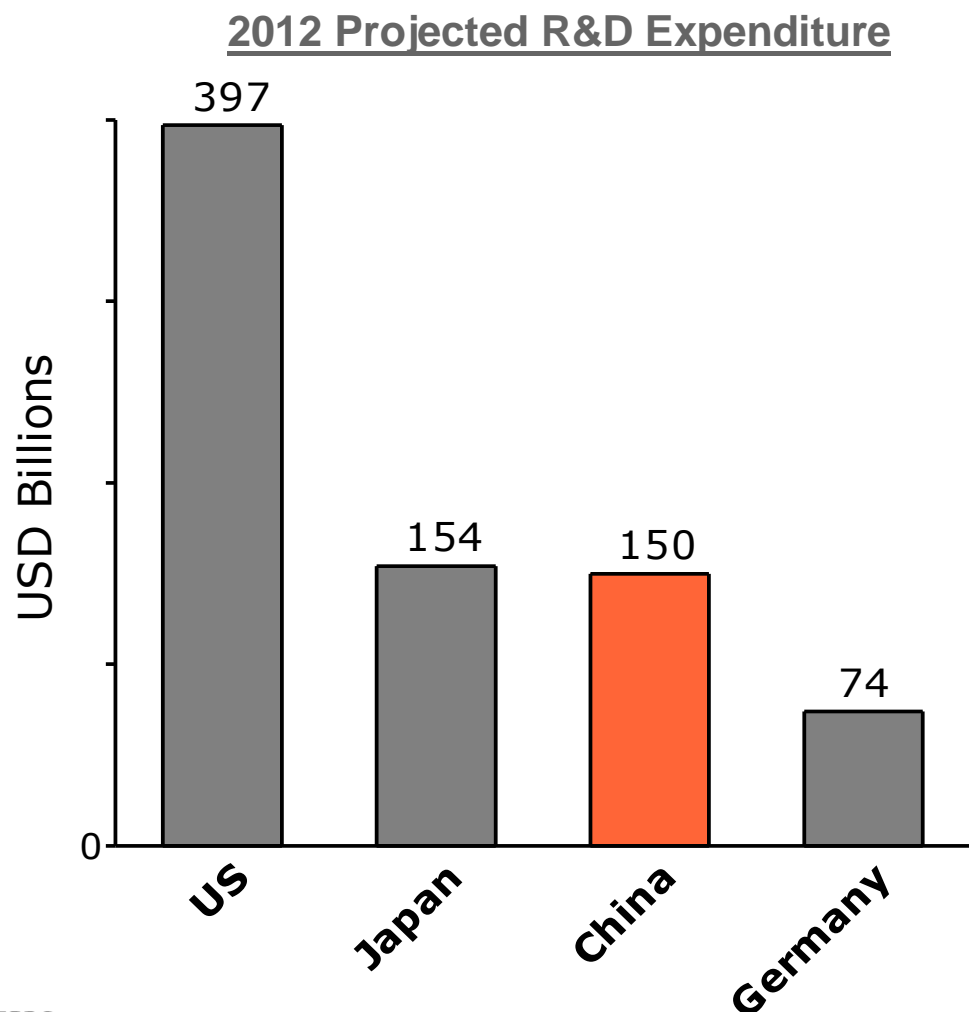
Share of Global R&D Spending by Region

R&D Magazine “expects that global R&D spending will reach \$1,143.2 billion in 2009, 3.2% higher than in 2008. As in previous reports, much of the global growth is fueled by continued expansion of R&D in Asia, although global effects have slowed R&D growth in this geographic area as well.”



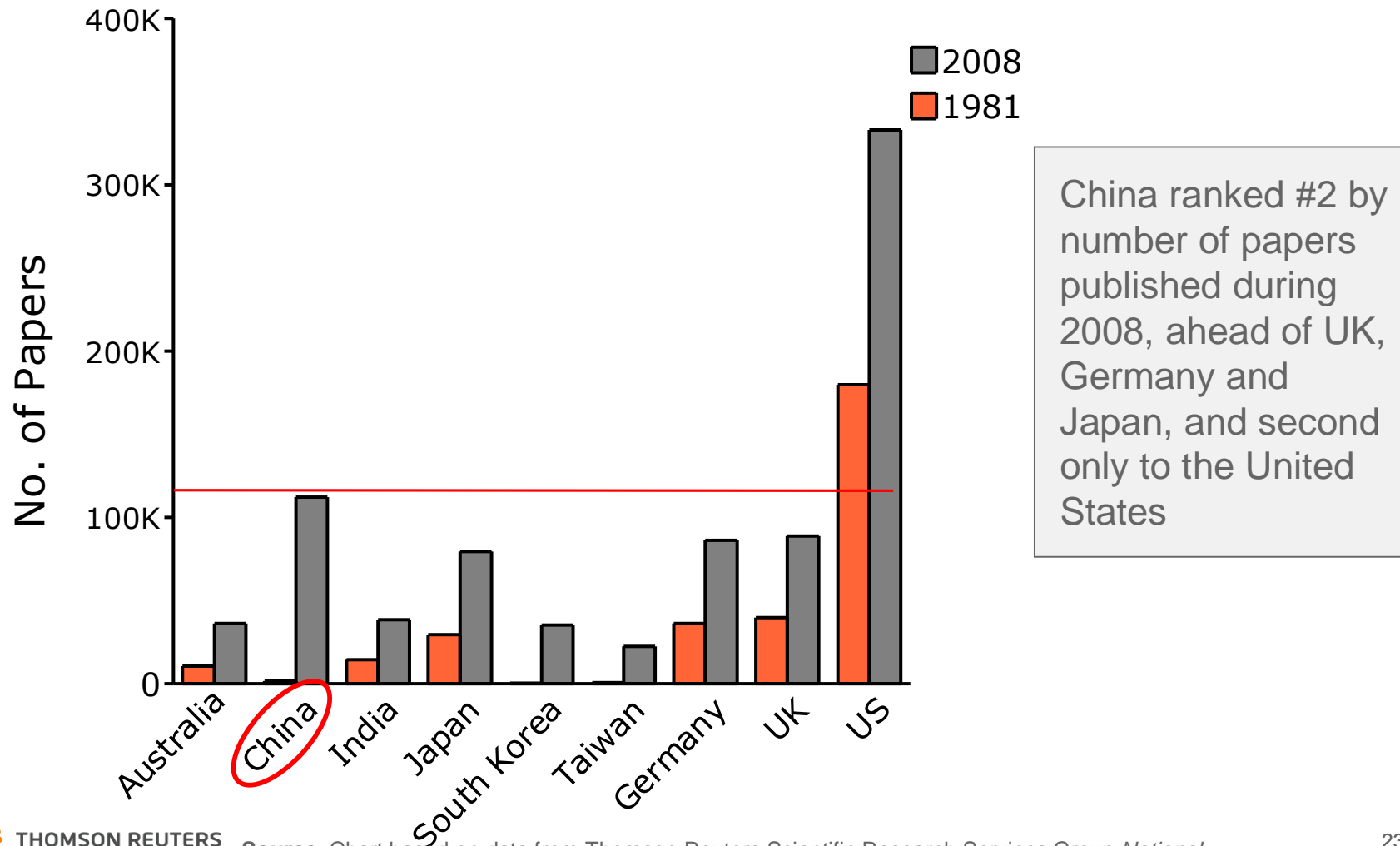
Projected R&D Spend to 2012

- By 2012, China's R&D expenditure is expected to match Japan's



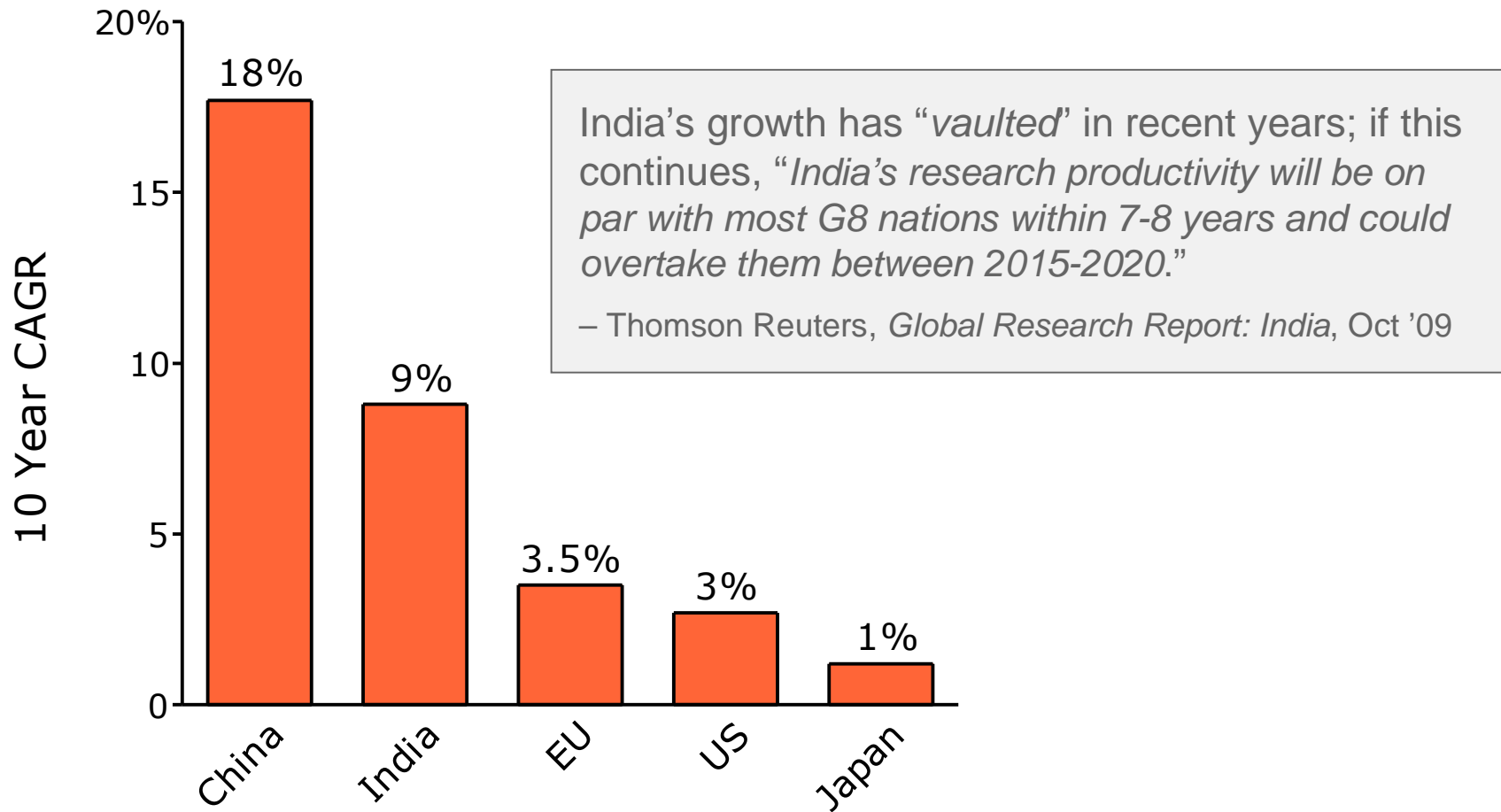
Number of Papers: 1981 vs. 2008

- Chart shows number of papers indexed by Thomson Reuters in 1981 versus 2008 that listed at least one author address for each country below



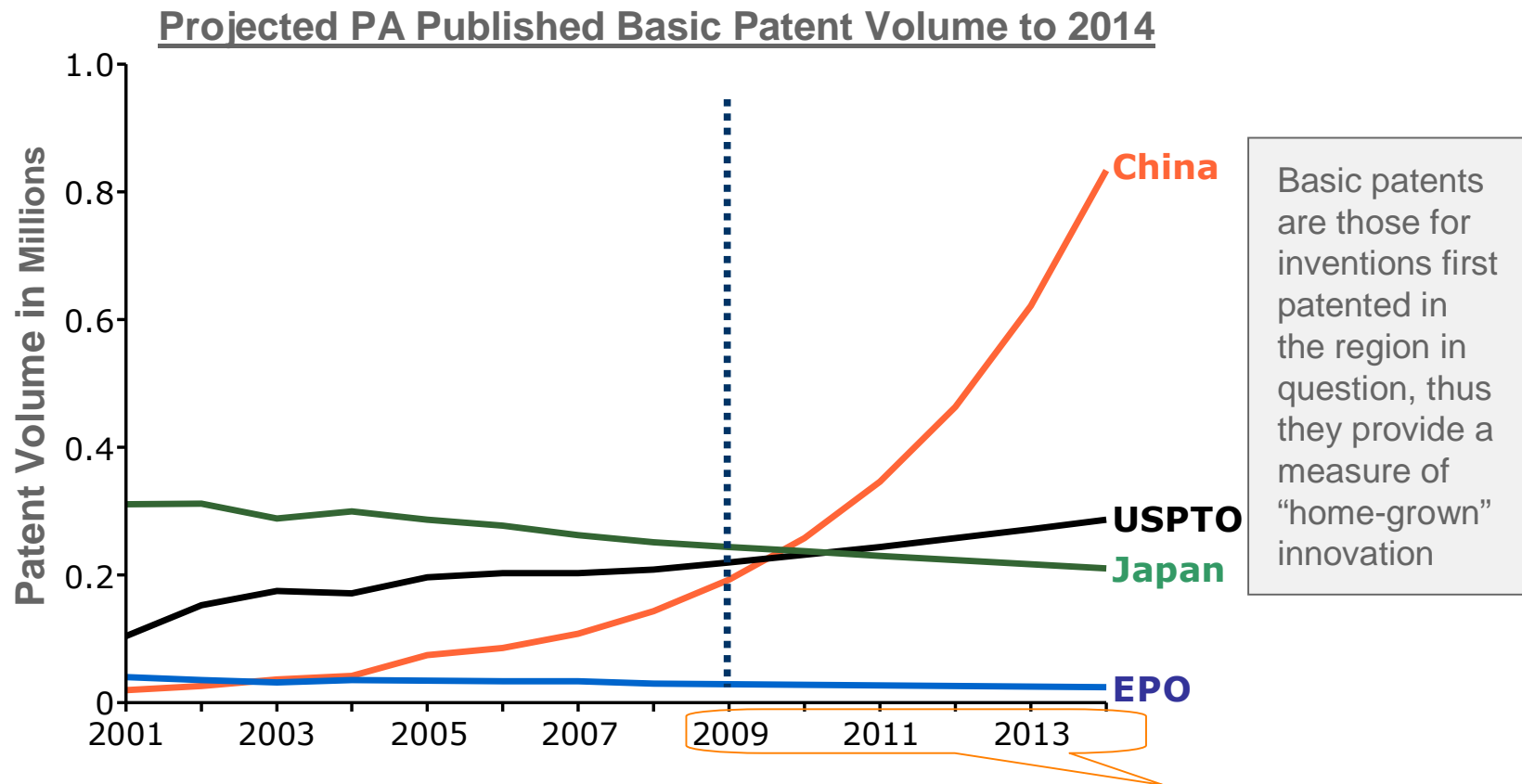
Research Output Growth Past 10 Years

- Shows CAGR (Compound Annual Growth Rate) of research papers for 1998-2008 for China and India compared to EU, US and Japan



Projected Growth in Basic Patent Volume

- If growth continues as it has from 2001-2008, the Chinese patent authority (SIPO) will overtake both the USPTO and the Japan Patent Office in 2010 and become the top PA for basic patent publishing



STM Global Publishing Opportunities: India and China

- Growth in China & India
- Publishing Market Opportunities
- Growth Drivers for STM Publishing in China
- Publishing Offshoring in India
- Conclusion

Offshoring in the Publishing Market

“Globally, all types of publishers are experiencing severe cost and competitive pressures and the need to digitize. The ability to change and adapt existing business models is crucial and being driven by falling revenues and increasing costs, competition, changing customer preferences and the advent of new media technology.”

– ValueNotes, “Offshoring in the Publishing Vertical – 2009”

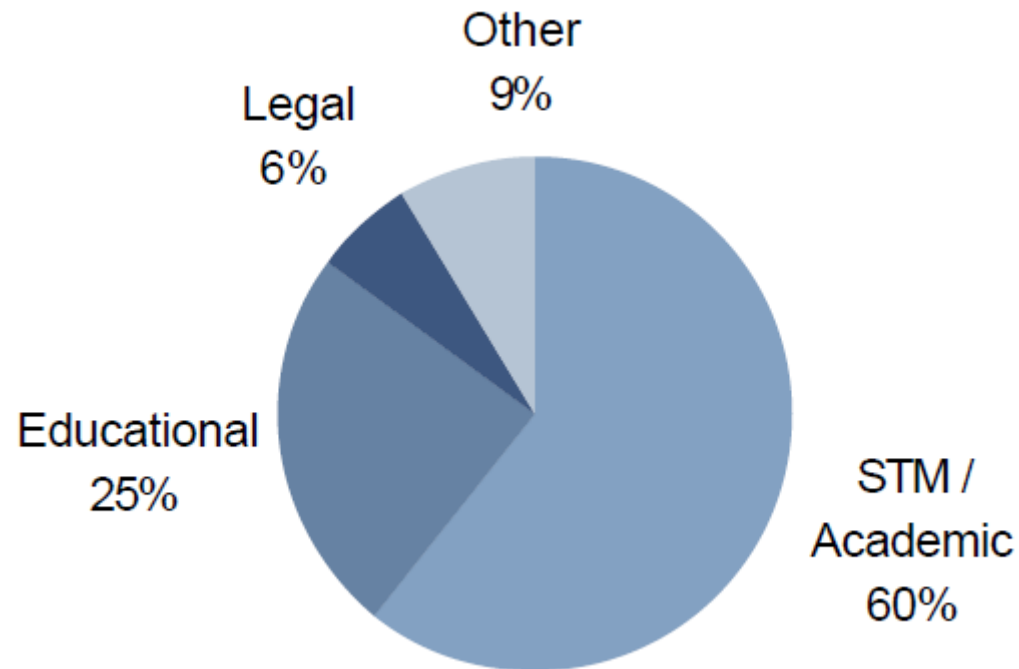
- While India has seen declines in outsourcing from other industries (primarily in banking, finance, and call centers/telemarketing), STM publishing outsourcing to India is an area that has not been hit as hard
 - STM outsourcing to India “should be fine for the foreseeable future”



Publishing Verticals

- The STM/Academic segment contributes the majority (an estimated 60%) of the revenues in offshore publishing services
- The Educational publishing segment is next at 25% of the market

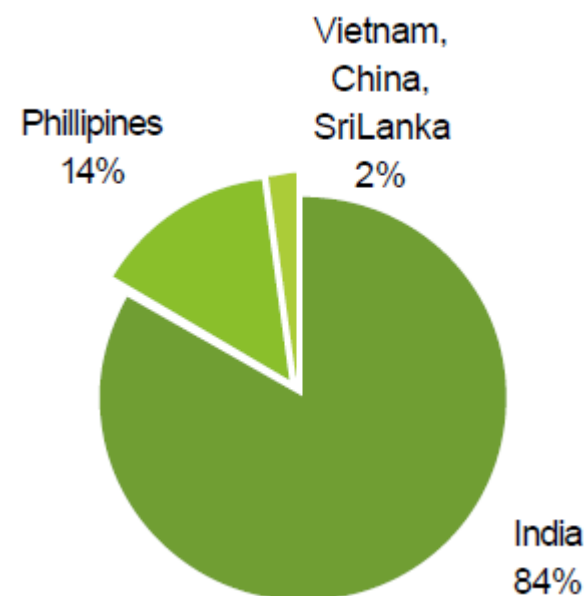
Revenue Contribution by Vertical



Publishing Offshoring Locations

- Publishing offshoring is est'd. as a \$780M market; the majority in India
 - India is by far the largest at \$660M (est. 2008), representing 84%
 - Philippines has 14% of the market
 - Followed by China, Vietnam and Sri Lanka with a combined 2%
- Drivers
 - India and the Philippines both have good English language skills and cheaper manpower
 - However, India excels due to a stronger domestic publishing history, a more entrepreneurial culture and larger resource pool availability

Revenue by Country



“As of now competency levels in other destinations have not reached the stage and maturity that India has accomplished.”

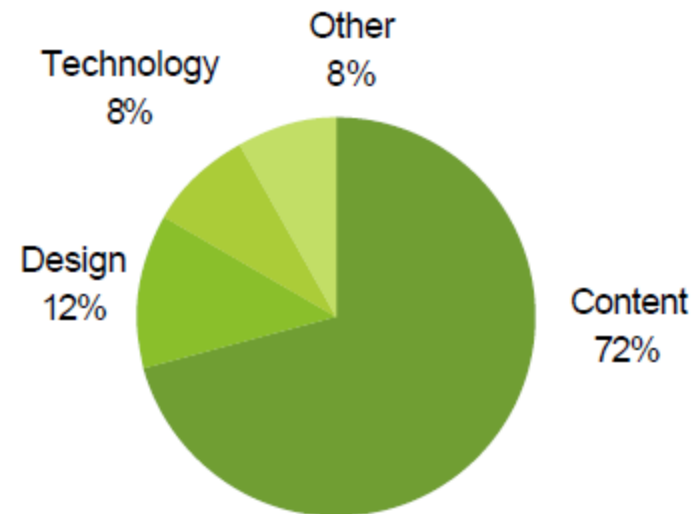
– ValueNotes



Types of Services Performed

- There has been a steady rise in the range as well as complexity of the services provided, over the last few years
- Services include
 - Content services, i.e.:
 - Acquisition
 - Copy-editing
 - Data mining
 - Fact-checking
 - Abstracting
 - Translation
 - Design services
 - Graphics editing
 - Photos/illustrations
 - Technological services
 - Tagging / metadata
 - Converting content
 - Coding and Indexing
 - Other
 - Printing

Revenue Contribution by Service



STM Global Publishing Opportunities: India and China

- Growth in China & India
- Publishing Market Opportunities
- Growth Drivers for STM Publishing in China
- Publishing Offshoring in India
- Conclusion

Conclusion

- Although the significant growth and business opportunities that have prevailed in China and India have had some negative impact from the recession the overall prognosis remains positive
- STM continues to display notable growth in each country
- The availability of highly skilled, and lower cost labor in India, creates a significant economic incentive to off-shore professional jobs including business analysts, researchers and other positions including indexers/abstractors. The major advantage is the large English-speaking population.
- There is a huge potential market for information services in “emerging countries,” led by China and India, that is attractive to publishers, at the same time that information is under some duress in established markets
- Publishers will focus on:
 - Revenue growth based on need for global content from China and India and other countries within Asia Pacific
 - Improved competitive advantages from offshoring operational processes