INTRODUCTION

Offshore Outsourcing: General Electric does it. Extreme Networks does it. When General Electrics did it in 1998 at the beginning of the outsourcing boom, the company saved $125 million annually.1 When Extreme Networks did it, the company reduced costs 40 percent. From large multinationals to small start-ups, many companies realize the profitability in offshore outsourcing that it has become a popular almost necessary management tool. It is more likely than not that a company that utilizes offshore outsourcing looked to India since it captures approximately 80–84 percent of the business process outsourcing (BOP) market.2 As the premier country for outsourcing, India has many key characteristics that helped create a sustainable environment for BPO to flourish. However this rapidly growing IT sector in India is a double edge sword where the growth rate exceeds the rate companies can train the shrinking size of engineers. As the Indian market matures, wages will increase due to shortage of engineers and real estate prices also increase leading investors to look elsewhere. Besides a few countries in Africa such as Ghana and South Africa, many of the countries are untouched. More specifically, Zambia has many characteristics, some of which are similar to India that makes it a potential success in offshore outsourcing. This report first analyzes the characteristics of India that make it a premier outsourcing country and then compares them to Zambia to see if the African country is a viable possibility as an outsourcing location.

1. WAGE DIFFERENTIAL

If any business process or function that is necessary but does not add to the productivity or value of the company, then it is strategically better to outsource those non-core business processes to another company that focuses primarily in that function. This allows companies to focus on their core competency, increasing overall profitability. At the same time it is also a financial tool that cuts operational cost mainly due to the cheaper labor force that is available abroad. Thus, many offshore outsourcing is done in poorer nations where the labor is at a minimum cost. In America a software engineer can cost about $60 per day compared to $6 in India.3 This wage difference of 90 percent can cut a firm’s operation costs to as low as 40 percent, providing a cushion in case anything awry.

<table>
<thead>
<tr>
<th>Average Salaries of Programmers</th>
<th>Country</th>
<th>Salary Range</th>
</tr>
</thead>
<tbody>
<tr>
<td>Poland and Hungary</td>
<td>$4,800 to $8,000</td>
<td></td>
</tr>
<tr>
<td>India</td>
<td>$5,880 to $11,000</td>
<td></td>
</tr>
<tr>
<td>Philippines</td>
<td>$6,564</td>
<td></td>
</tr>
<tr>
<td>Malaysia</td>
<td>$7,200</td>
<td></td>
</tr>
<tr>
<td>Russian Federation</td>
<td>$5,000 to $7,500</td>
<td></td>
</tr>
<tr>
<td>China</td>
<td>$8,952</td>
<td></td>
</tr>
<tr>
<td>Canada</td>
<td>$28,174</td>
<td></td>
</tr>
<tr>
<td>Ireland</td>
<td>$23,000 to $34,000</td>
<td></td>
</tr>
<tr>
<td>Israel</td>
<td>$15,000 to $38,000</td>
<td></td>
</tr>
<tr>
<td>USA</td>
<td>$60,000 to $80,000</td>
<td></td>
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</tbody>
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Source: CIO magazine, November 2002, Smart Access Survey, Merrill Lynch

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2. LABOR FORCE

What sets India apart from other nations with similar advantageous wage differential for outsourcing is the large educated population, many of who are engineers. There are more than 2 million graduates including over 20 percent engineers, annually to feed the growing outsourcing market in India. Out of the 2 million graduates every year, 200,000 of them are from India Institute of Technology (IIT) which is ranked in the top five for best universities in Asia for science and technology by AsiaWeek magazine.\(^4\) IIT produces many prolific graduates including Rajat Gupta, the first Indian born CEO of a US transnational (McKinsey & Co.), Vinod Khosla, founding CEO of Sun Microsystems as well as Arun Netravali, president of Bell laboratories. The large educated population can be attributed to the importance of education in Indian families.

\[\text{Yearly Graduates with Natural Science and Engineering Degrees 1998}\]

Source: National Science Foundation (Science and Engineering Indicators, 1998).
Note: Figures are by country where degree granted and may include foreign nationals.

3. LANGUAGE

Looking at the graph above, Russia and China produces more yearly graduates with Science and Engineering Degrees than India. But why is there more outsourcing in India than either of those countries? English is the key. As a former British colony, English is one of the two official languages of India whereas Russia and China have their own native tongues. It would be useless to a company if a programming code is in Russian or Chinese. And the idea of training all the employees to read and write English would be cost intensive and pointless.

4. LOCATION

Almost a day’s flight away, the geographical location of India may not seem ideal but it is. India’s location halfway around the world translates to a large time differential advantage of 10.5 hours between the U.S. (E.S.T) and India. Basically while the American businessman is sleeping, the Indian engineer is working so that companies are able to provide round-the-clock service to their customers and meet deadlines.

5. GOVERNMENT SUPPORT

NASSCOM, funded entirely by its member ICT-related companies, is the Indian chamber of commerce of the ICT software and services industry. It was set up to facilitate business and trade in software and services and to encourage advancement of research in software technology as well as ensuring quality of service, and the enforcement of Intellectual Property Rights in the Indian Software industry.

“NASSCOM has representatives in various committees in the Government of India including the Ministry of Information Technology, Ministry of Commerce, the Ministry of Finance, Department of Telecommunication, Ministry of Human Resources Development, Ministry of Labor and and the Ministry of External Affairs. NASSCOM also acts as a consulting body for various State Governments in India.

NASSCOM has played a key role in enabling the government in India to develop industry friendly policies. NASSCOM has been a proponent of free trade, arguing for zero tariff protection, strong intellectual property and data protection laws, deregulation of the telecom market and the creation of software technology parks and private sector participation in the education system – measures which have resulted in significant growth of the industry.”

THE IMPACT ON INDIA

From the beginning of offshore outsourcing by ESD in the 1970s and 1980s when the technology gap was significant, India has come a long way to where its today. The country has rapidly adjusted its ICT infrastructure to accommodate this increasing influx of foreign investment which is only going to grow. According to NASSCOM McKinsey Report 2002, outsourcing in India is projected to increase significantly to over $24 billion by 2008. This rapid progress to abridge the technological gap in the last decade is largely due to the privatization or reduced governmental control starting with the laying of the first private undersea cable. More bandwidth is also available to companies through Videsh Sanchar Nigam Limited (VSNL) which negotiated contracts to use parts of several international cables. Along with advancement in ICT sector, India is starting to have a burgeoning middle class. Before the influx of foreign investment, many of the educated Indians traveled abroad for schooling or employment and rarely returned to

5 http://www.economist.com/printedition/displayStory.cfm?Story_ID=3177136
their homeland. Now many young Indians have chosen to stay and make the most of the new jobs available. As Subhash R. Arya puts it, “If I had not been working here, I would have been studying in the U.S. for a higher degree education. It’s a much better place to stay with family and friends.”

As Thomas Freidman says, the world is flattening. This is true as outsourcing only becomes more popular. The offshore outsourcing model has proved extremely successful in quality of service, increasing profitability and reducing operational costs that it has become an indispensable tool for companies that want to remain competitive. Sandra Notardonato, a Senior Analyst at Robert W. Baird & Co. foresees that “large companies that want to be formidable competitors in the IT services industry will need to provide the one-stop solution…that means global IT and outsourcing.” Her views do not go unjustified. A recent IBM study showed companies that outsourced its information and communication technology (ICT) performed better than their peers.

With such a successful and powerful tool that can increase profitability and greatly reduce costs, offshore outsourcing is only expected to grow as seen in the chart above. Currently the outsourcing market is and Forrester Research forecasts the upward trend to continue to $146 billion in 2008. A large portion of this market is captured by India.

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whose IT services and IT-enabled services account for 47 percent of its total exports. According to Gartner research, as many as 400 out of the Fortune 500 companies looked to India to participate in offshore outsourcing. However this rapid increase and continued growth in ICT sector may be saturating India’s market. Many investors are nervous about how much longer these companies can continue to recruit, train and retain enough technical professionals to support 40% growth per year. As the Indian market is maturing, there will be a shortage of laborers and thus wages will increase. Additionally, real estate prices will increase making India not as profitable as it was before. Investors are starting to look else where such as China, Malaysia, Latin America and other poorer nations.

OUTSOURCING IN AFRICA

Almost every continent with developing countries is involved in offshore outsourcing but not so much in Africa. One of the first African countries to participate in the global IT market is Ghana whose official language is English. Affiliated Computer Systems (ACS), a Texan consulting company that provides outsourcing services and solutions, is the country’s largest private employer. It employees 2,000 Ghanaians who type at least 50 words a minute earning $4 to $5 a day - four times the legal minimum wage - and receive health insurance, meals, and subsidized transport. A handful of engineers and professionals are paid much more as well as periodically receive training in advanced technologies.

South Africa, with its Western Culture and English speaking population, is an ideal place for outsourcing. One company Direct Channel Marketing an outsource call-centre provider, has acquired a 50% stake in Callconnexions, a black-owned call centre based in Cape Town and expects to increase the number of seats by 250 people next year to meet growing demand. A large portion of Direct Channel Marketing’s investment – 76% to be exact – comes from the United Kingdom. In a survey recently conducted by Deloitte, call centers and business process outsourcing industry in Cape Town increased 39% in the number of seats and 43% in employment.

Ghana and South Africa are only two examples of successful offshore outsourcing locations. Other African nations including Kenya have had piece of India’s pie as profitable locations as well.

POTENTIAL IN ZAMBIA

Unlike the African countries surrounding it, Zambia is a peaceful country with no civil unrest. In fact, this is the same reason why numerous aid organizations are based here. This is a crucial factor in considering outsourcing locations among many others that Zambia also possesses.

10 http://www.globalenvision.org/library/3/657/
11 http://allafrica.com/stories/200512060381.html
1. **WAGE DIFFERENTIAL**
With a GDP per capita of $430 (India’s GDP per capita $543) and a high unemployment rate, Zambia also has an advantageous wage differential for outsourcing.

2. **LABOR FORCE**
Zambia is also a country where the educated will also have a hard time finding employment. There are about 200 engineering graduates from the According to the U.S. Department of State, Zambia has a higher literacy rate (60.6% women; 81.6% men) than India (overall: 55.2%).

3. **LANGUAGE**
As a former British colony like India, English is the official language of the country and also used in all the schools.

4. **LOCATION**
Zambia may not be the halfway across the world from the U.S. but it is a quarter of the way. It shares the same time zone as most of Europe and thus the timing of business transactions would be the same as if dealing with a European nation.

5. **GOVERNMENTAL SUPPORT & TRANSPARANCY**
Even some developed countries do not have it yet but in most of the governmental offices in Zambia, almost all information is in electronic format. Administering by e-governance ensures governmental transparency, more efficient the delivery of public services, and easier access to governmental information as a means to increase civic participation. This is part of Zambia’s push for increasing ICT usage for agricultural productivity, health, civic education and communication.

6. **PRIVATE SUPPORT & INVESTMENT**
Microsoft South East Africa country manager, Pierre Nel is establishing a partnership in Zambia to bring technology to the country and help train IT partners. With the U.N.’s Millennium Goals in mind, Microsoft was operating in more than 42 countries to help Africa realize its full potential and that it had partnered with governments for development through sustainable projects. In Zambia, Microsoft was also working with the University of Zambia (UNZA) in capacity building and will sponsor two lecturers for technical training as well as implement SQL Server 2005 for governmental use.

**WHY AFRICA – ECONOMIC & SOCIAL REASONS**
Perhaps the same impact on India can also
Just like India and other outsourcing countries, African countries, more specifically Zambia is economically advantageous for any business outsourcing. Not only does it have a pool of educated It possesses many similar qualities to that of the alpha outsourcing country, India.

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As many economists, investors and politicians forecast, the rate of influx of foreign investment may be greater than the rate India can handle to hire and train enough people to meet that demand. This in turn shows that the wage differential may not be as advantageous as it once was as the pool of talented individuals shrink.

**WHY AFRICA – SOCIAL REASON**

*although Africa's economic appeal is increasing, India and China are improving more quickly, widening the gap. Africans can start winning only if they move faster.*

India started out just the same as where Zambia is today – with a large technology gap. However when the outsourcing model became prevalent because of its success, many companies radar to India which is the norm. India responded to the interest and growth with . Just like inida, the Zambian government will
