



NASSCOM®



WOMEN AND IT SCORECARD - INDIA

A SURVEY OF 55 FIRMS SPRING 2017

Foreword

Diversity in the technology industry workforce worldwide has been a topic of deliberation for a long while. Numerous reports suggest that the ratio of women opting for STEM courses in their academics and technology streams in the careers is not sufficient. There are societal influencers (STEM is too hard, marriage, childbirth, family responsibilities, etc.). There is an increasing trend among technology firms to have "only for women" jobs, but these efforts are hampered by the lack of women with necessary qualifications.

Global studies indicate that:

- Corporations with at least 10% women on boards have 2.5%-5% higher returns on equity
- Firms where women are at least 30% of C-Suite have 15% higher profitability than others
- Gender diverse teams perform significantly better than more homogenous teams

India's IT-BPM industry currently employs nearly 3.9 million people, of which over 34% are women (~1.3 million). While this percentage is much better than the overall female share (24%) of India's total workforce, an analysis indicates that over 51% of entry level recruits are women; over 25% of women are in managerial positions but <1% are in the C-Suite.

In order to thoroughly understand the profile of women in the Indian IT-BPM industry, NASSCOM has partnered with The Open University (UK) to come out with a "Women and IT Scorecard – India" that brings together, for the first time, a comprehensive set of evidence to demonstrate and understand the differences in participation rates between women and men in the IT-BPM workforce in India. It also benchmarks these within an international context.

The scorecard aims to inform policy and industry stakeholders of the Indian IT-BPM industry to enable them to continue their long standing efforts towards ensuring gender equality in the workplace. Firms within the IT-BPM industry can use this scorecard to benchmark their gender inclusive policies and practices.

The report begins with an analysis of women's representation in the IT-BPM workforce in India and includes an overview of the participation of women in Computer Science and IT related subjects in Higher Education. A key component of this scorecard is discussion surrounding women's progression in their career stages and their participation in senior management and C-Suite roles. Lastly, the discussion profiles the companies included in the survey by focusing on their policies and practices that support gender inclusive workspaces.

We hope you find this report useful.

R Chandrashekhar President NASSCOM

Foreword

The Open University is delighted to present this Women and IT Scorecard – India which is being launched at the NASSCOM Diversity and Inclusion Summit in Bangalore. The OU has a long history of supporting diversity and inclusion, having been established 50 years ago to enable access to higher education for those previously excluded. Our current commitment to gender equality in STEM is demonstrated by our membership of the UK's Athena SWAN Charter. We have recently renewed our Bronze Award and have a 4 year action plan to ensure gender equality is embedded in all of our processes and practices. Institutional change is challenging, but to remain a competitive organisation, whether in business or education, we must ensure that all staff and (in our case) students are recognised and supported in all their diversity.

This report has been produced by a research team based at the OU Parvati Raghuram, Clem Herman, Esther Ruiz Ben and Gunjan Sondhi - who are working on a persistent and highly important problem - the under representation of women in IT and Computing. The situation is particularly acute in the UK, and the comparative study of gender, skilled migration and IT in UK and India hopes to learn from the Indian experience where the proportion of women is much higher. This learning will be highly valuable for the UK economy as well as for us as educators, to inform how we may help to support more women into the sector.

I hope you will find this report informative and interesting, and that it will help to support the implementation of gender equality policies and practice in your own organisations.

Peter Horrocks CBE Vice Chancellor of The Open University UK

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Key Findings

Employment in IT and IT services

- The number of women employed in the IT industry in India has seen a rapid increase over the past 10 years – nearly 30% of employees of our surveyed companies were women. This contrasts with stagnation or decline in the participation of women in IT in many Western countries.
- The majority of women employed in the IT industry in India are graduates with most of them holding a degree in Engineering and Technology.
- Men and women have similar levels of qualification at each stage of the career ladder within IT companies in India.
- The majority of women working in the IT industry in India are under 30 and single.
- Women are concentrated at lower career levels and there are fewer women in top positions in IT companies in India.
- Men and women start their careers in IT companies in India at similar ages but women progress more slowly, so men at senior positions are often younger than women at a similar level.

Employer challenges

- The two most common barriers that IT companies in India say they encounter in employing women are the challenge of combining work with family commitments and dealing with government's regulations on working hours and parental leave.
- IT companies in India face a significant problem of retention following maternity leave, and are concerned about the levels of women not returning to work.

Qualifications in IT

- Women represented 46.8% of the postgraduates in IT and Computing during the academic year 2014-2015 in India. This is more than double the rate seen in the UK.
- Women represented approximately a quarter of the graduates in STEM disciplines in India in the academic year 2015-16. In the UK this figure is 40%, mainly due to high numbers of women studying biological sciences and subjects allied to medicine.



Recommendations

The survey results suggest a number of ways in which companies can continue to move towards making workspaces more gender inclusive:

For individual companies

Although high level policies may exist in companies, there is a need to train line managers in managing maternity so that they feel empowered to support and retain women employees.

For Industry

Measures and policies supporting women's progression within IT may have limited impact unless companies can act together across the whole IT sector to prevent women's career stagnation at entry and middle IT career levels.

For other sectors

The IT sector is leading the way in India in implementing policies and practices to ensure that women are given the opportunities and support required for their successful career advancement within the sector, by recognising that recruiting and retaining women requires a different approach than business as usual.



1 Introduction to the study

The Women and IT Scorecard – India is a key output of an ongoing project entitled <u>Gender</u>. <u>Skilled Migration and IT: a comparative study of India and the UK (GSM-IT)</u>. This project is funded by the Economic and Social Research Council (ESRC) UK, and is being conducted by a team of researchers at the Open University, UK. The project brings together the experiences of tech workers in two countries – India and the UK – with two key aims:

- 1. The project compares the experiences of IT workers in India and the UK to see what the UK can learn from the Indian case to increase the participation of women in the tech sector.
- 2. The research explores the insights of migrant women and men who move between UK and India and have experience of both work cultures in order to obtain new insights into gender norms in each country as well as best practice.



2 Employment in IT and IT services

2.1 Employment Numbers

A number of different data sources show that the participation of women in IT in India is consistently rising. In 2011, according to the Indian National Sample Survey (NSS) data, women represented 21% of the Indian IT labour force. A 2014 figure from the World Bank Enterprise Survey – India estimated this figure to have risen to nearly 27%; and the 2016 India Skills report [20] has updated that estimate to up to 30%. According to this report Software and IT constitutes the second largest non- agricultural sector, after Pharma and Care (41%), in which women are better represented among the twelve industrial sectors of the Indian economy.

This is only matched by Telecom and allied areas sector (30%). Telecom has of course a much longer history in India and is a longer-established industry than the IT sector. IT's numbers are even more impressive when we cast it against the more 'traditional' STEM related labour sectors and women's relatively lower participation in those sectors. The sectors with the lowest participation of women are Engineering and Automotive where women represent 15.15% of the workforce, Manufacturing (17%) or Core sector (Oil and Gas, Power, Steel, Minerals) with 19.19% [10; 14; 13].

The results of our survey, GSM-IT, mirror the findings of other reports. It indicates that on average women comprise 30% of the IT-BPM workforce. In fact, in 75% of the companies, women were 20-40% of the workforce. Only 20% of the companies had less than 20% women in their workforce (see Figure 1).

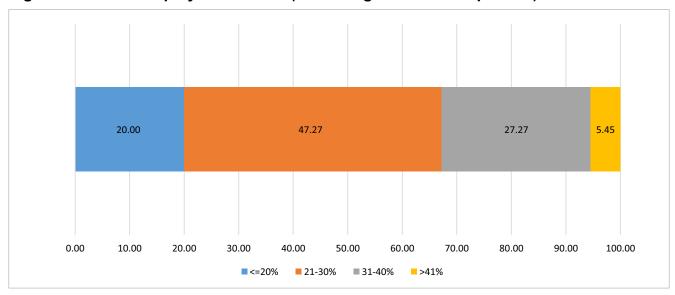


Figure 1: Female employees in firms (Percentage of firms' responses)

Source: GSM-IT SURVEY 2017

The participation of women in the Indian IT sector needs to be contextualised within the broader Indian labour force, and women's labour force participation rate. A recent study shows that women's participation in the Indian workforce is only 29%¹ compared to more than 80% for men. The majority of men and women in India are employed within the agriculture sector (65% women and 46% men), but the tech sector is the second largest employer of women in the non-agriculture sector; and considering its relatively short history in India (only three decades old), this is an impressive accomplishment in its 'short life'.

The efforts of the companies and stakeholders have been a contributing factor in achieving this growth in the number of women in India's IT sector. Particular human resources policies and practices such as transportation, flexible working hours, parental leave, anti-harassment, healthcare, and an emphasis on recognising and supporting women's needs (especially mothers) have led to this positive trend. This will be explored further in section 3.

¹ proportion of a country's working-age [female] population (ages 15 and older) that engages in the labour market, either by working or actively looking for work, expressed as a percentage of the working-age population. (UNDP definition)

2.2 Demographic characteristics

According to the NSS data, the majority of women working in IT in India in 2011 were under the age of 30 years and were unmarried (see NSS Chart 1 and 2 in Appendix II). Our findings reflect the young demographic composition of the work force (see Figure 2).

Figure 2: Women by age group and occupation level (Percentage of firms' responses)

Age Group	<=24	25-29	30-35	>35	Don't know/ Can't say
Entry Level	91%	13%	4%	4%	4%
Individual Contributors	35%	93%	15%	5%	2%
Middle Manager Level	4%	65%	80%	9%	2%
Senior Management/ Director level	2%	5%	62%	62%	
Top Level/C-Suite		9%	84%	11%	

Source: GSM-IT SURVEY 2017

One important point to note about the Indian tech sector is that it benefits from India's demographic dividend [14]. The UK and other Western countries are facing the challenges of a small talent pool. In contrast, the Indian tech industry benefits from a young, highly educated, technically savvy population. The younger mean age of Indian industry in comparison to those of UK for instance, also means that the workforces are at different points in their respective life-courses. The younger population in India also means that nearly 50% of the women in the industry are unmarried, and have relatively fewer caring responsibilities than their married counterparts. In addition to India's demographic dividend, it is also a factor of the relatively 'young age' of the IT industry in India.

2.3 Leadership pipeline

Research on leadership suggests that companies with a gender-diverse board perform significantly better than their competitors. These companies achieve a 42% higher return in sales, 66% greater return on invested capital, and 53% higher return on equity [9]. This high return has only been achieved by a minority of firms globally.

The results of the GSM-IT survey reveal that the majority of women working in the surveyed IT companies are at the entry or individual contributor's career levels. The higher the career level is, the lower the participation of female employees (see Figure 3 below).

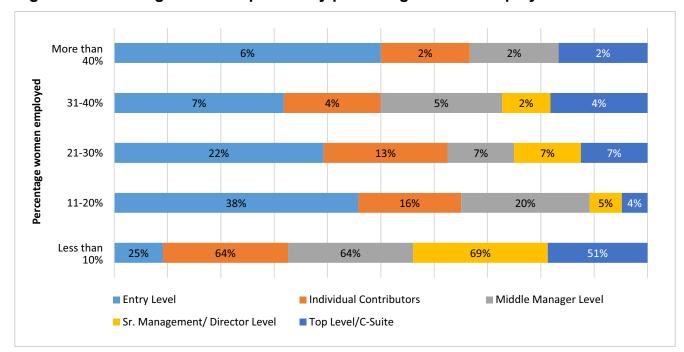


Figure 3: Percentage firms' responses by percentage women employed at career levels

Source: GSM-IT SURVEY 2017

When looking at the age of men compared to women in career progression paths of the surveyed IT companies, a clear pattern emerges. Both men and women start their careers at similar age levels. However, at senior career stages differences begin to emerge: men at this level are predominately younger (between 30-35 years old) (see Figure 4 below) than women (>35 years old) (see Figure 2).

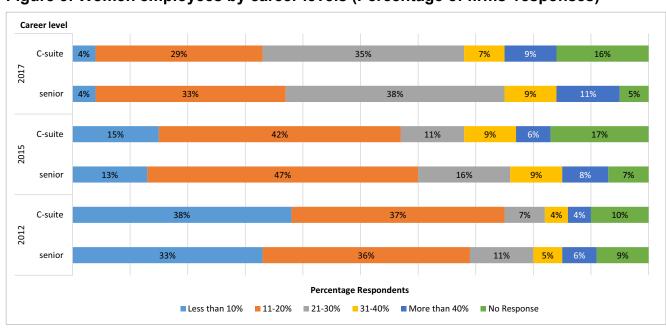
Figure 4: Age groups of male employees at different company career stages (Percentage of firms' responses)

Age Group	<=24	25-29	30-35	>35	Don't know/ Can't say
Entry Level	87%	16%	4%	2%	4%
Individual Contributors	35%	93%	16%	5%	2%
Middle Manager Level	4%	64%	80%	11%	2%
Senior Management/ Director level	2%	9%	56%	64%	
Top Level/C-Suite	2%	5%	91%	7%	

Source: GSM-IT SURVEY 2017

The age and career level snapshot provides only short term insight. These need to be located and viewed over time. GSM-IT gathered longitudinal data from the participating firms on the percentage of women holding positions at Senior Management/Director level and Top-level/C-suite level. The data points to a positive pattern.

Figure 5: Women employees by career levels (Percentage of firms' responses)



Source: GSM-IT SURVEY 2017

The data was gathered with the aim of capturing the changes over time across companies (see Figure 5). In 2012, only 22% of the companies had more than 20% women at senior level, and 15% of companies surveyed had over 20% women at C-suite level. By 2015, the number of firms with more than 20% women at senior and C-suite levels had increased to 33% and 26% respectively.

In 2017, it is estimated² that the number of firms that have more than 20% women at senior level will increase to nearly 60%, and nearly 51% of firms will have more than 20% of women at C-suite level. Overall, the Indian IT sector is heading in the right direction toward recruiting and retaining more women in leadership roles.

3 **Employment Policies**

3.1 Recruitment

The survey data reveals that employee referrals and on-campus recruitment are the most gender balanced modes of recruitment. Employee referral is also the most common source for recruiting male and female IT specialists. There appears to be a gender differences in other methods of recruitment, particularly where the mode of recruitment is online. More men than women are recruited through Internet advertisements (see Figure 6 below).

² Estimates have been provided by the respective HR managers based on their hiring forecasts.

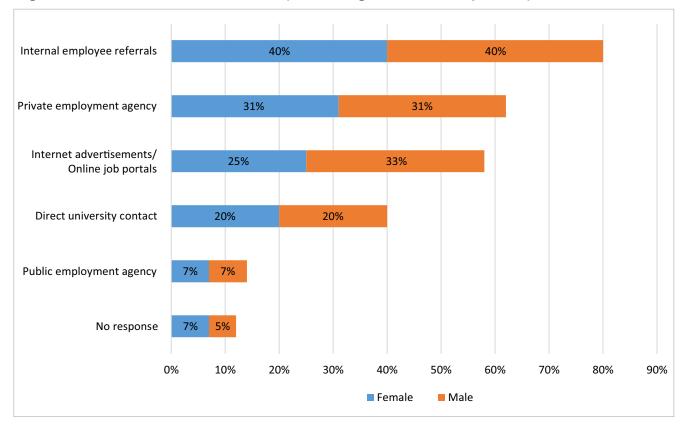


Figure 6: Sources of recruitment — (Percentage of firms' responses)

Source: GSM-IT SURVEY 2017

It is important not to conflate a company's awareness and concern of the issues surrounding gendered recruitment with the actual hiring practices where women maybe disadvantaged. Awareness of the challenges of recruiting and retaining women who have greater caring responsibilities, particularly those with child caring responsibilities, also translates into better programs and policies that actively aim to recruit women from this demographic due to their significant experience in the industry. An awareness of the challenges that women may face within the Indian context has led to companies preparing and running recruitment campaigns targeted solely at women. These programs and actions differ based on the different demographic that is targeted.

Figure 7: Perceived constraints for recruitment in the surveyed firms (Percentage of firms responses)

Constraints for Hiring	Uniquely	Equally	Uniquely	Don't know/
Constraints for fining	attributed to female employees	attributed to both female and male employees	attributed to male employees	can't say
Having a degree or qualification in a non-technical area	15%	62%	11%	13%
Cause disruption in work environment	15%	64%	5%	16%
Require additional benefits and other expenses such as providing separate workplace facilities that make them expensive employees	24%	58%	7%	11%
Need to provide safe transport to and from work	36%	55%	2%	7%
Having had a break in career (e.g. due to family care)	45%	53%	2%	
Challenges of hiring given government regulations such as working hours and parental leave	60%	27%	4%	9%
Wondering if they can combine work with their family commitments	71%	18%	2%	9%

Source: GSM-IT SURVEY 2017



3.2 Career progression

Existing research within Western countries and India shows that women's careers in high technology companies tend to stagnate at the middle management level. The higher the career level, the lower the participation of female employees [20]. In our surveyed companies this pattern is similar. More women are employed in early career levels than in top positions (see Figure 8 below).

Career Levels 11% Top Level/C-Suite 15% 42% Senior Management/ **Director Level** Middle Manager Level 18% 47% Individual Contributors 22% 4% 13% 49% **Percentage Respondents** ■ Less than 10% ■11-20% ■ 21-30% ■ 31-40% ■ More than 40% ■ No Response

Figure 8: Women employed by career levels — Fiscal Year 2015 (Percentage of firms' responses)

Source: GSM-IT SURVEY 2017

However, the years of work experience are almost exactly the same for male (see Figure 9 below) and female employees (see Figure 9 below) at the different career levels. This may indicate that those few women who have achieved senior roles in the surveyed companies have followed similar career patterns to their male colleagues. This correlates with research in other countries which shows that part time work or career breaks can affect the progression of women's careers in IT [1; 5; 6; 7; 16; 17; 22; 25; 26].



Figure 9: Years of work experience for female IT specialists at different career stages

Career Levels	1-5 years	6-10 years	>10 years	Don't know/Can't say
Entry Level	93%			7%
Individual Contributors	69%	67%	2%	
Middle Manager Level	11%	80%	47%	
Senior Management/ Director level	2%	27%	89%	
Top Level/C-Suite		4%	87%	11%

Source: GSM-IT SURVEY 2017

A particular characteristic of the Indian tech industry is the high mobility of employees. IT workers tend to change employers frequently and build their careers in several companies and organizations along their professional trajectories, rather than staying in one company ^[20; 5]. This means that measures and policies supporting women's progression within IT may have limited impact unless companies can act together across the whole IT sector to prevent women's career stagnation at entry and middle IT career levels.

3.3 Parental policies

Parental policies at the company level can help to support retention and progression of women especially measures targeted at supporting women to return to work after maternity leave [6]. This is one of the major challenges that Indian companies within the IT sector have been trying to navigate over the past decade to ensure a gender inclusive workplace.

The companies surveyed did not perceive the costs related to maternity leave as a constraint but their key concerns were the low rate of return to work, and managing changes in working patterns after maternity. However there was a significant perception among HR managers that women returning from maternity leave might not be able to balance work and caring responsibilities. (see Figure 10 below).

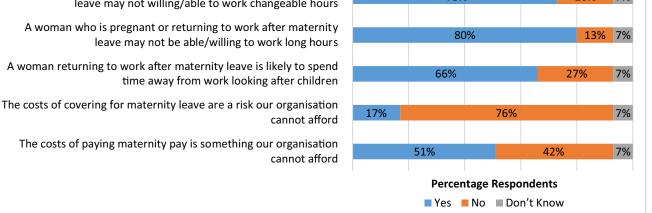
A woman who is pregnant or returning to work after maternity 73% 20% 7% leave may not willing/able to work changeable hours A woman who is pregnant or returning to work after maternity

Figure 10: Concerns regarding Pregnancy and Maternity (Percentage of firms' responses)

leave may not be able/willing to work long hours

A woman returning to work after maternity leave is likely to spend time away from work looking after children

cannot afford The costs of paying maternity pay is something our organisation



Source: GSM-IT SURVEY 2017

Moreover, the two most common concerns among the surveyed companies in terms of managing employees' pregnancy at work are firstly the uncertainty of the return to work for those going on maternity leave, and secondly the management of workloads for other team members. The surveyed companies perceive pregnancy as easier to manage for women with fixed-term or casual contracts (see Figure 11 below).

Figure 11: Issues managing pregnancy in the surveyed companies (Percentage of firms' responses)

Issues	Extremely difficult to manage	[2]	[3]	[4]	Extremely easy to manage	Not sure/ depends
Pregnancy among those on short or fixed term contracts/appointments	9%	4%	15%	33%	27%	13%
Sickness absences during pregnancy	9%	7%	15%	44%	24%	2%
Arranging and managing maternity cover	2%	2%	22%	38%	33%	4%
Managing workloads for other members of the team	5%	9%	24%	36%	22%	4%
Costs associated with Statutory Maternity Pay		4%	16%	47%	27%	5%
The uncertainty of whether those on maternity leave will return to work	9%	5%	24%	38%	18%	5%
Levels of sickness absence for those returning from maternity leave	2%	9%	18%	38%	27%	5%
The impact of part time or flexible working during pregnancy	5%	4%	20%	47%	16%	7%
Communication with women whilst they are on maternity leave	4%	4%	16%	45%	27%	4%
Managing the negative attitudes of other employees	2%	2%	16%	56%	20%	4%
Pregnancy amongst casual employees without contracts/agency workers/ those on zero hours contracts	2%	4%	11%	45%	22%	16%

Source: GSM-IT SURVEY 2017

The key lesson that other countries and sectors can take from the Indian IT sector is the recognition that recruiting and retaining women requires a different approach to their usual recruitment practices. The Indian IT sector is leading the way in implementing policies and practices to ensure that women are given the opportunities and support required for their successful career advancement within the sector.

4 Qualifications in IT and STEM

The underrepresentation of women in IT as well as in Science, Technology, Engineering and Mathematics (STEM) qualifications is a worldwide problem. A UNESCO report ^[23] shows that from a global perspective female researchers and scientists are underrepresented. Psychological as well as cultural and socio-economic factors contribute to perpetuate a low participation of women in academic science and technology areas ^[19; 20]. What is also evident is that while women excel in STEM related programs, and their enrolment in undergraduate and masters level is often equal to men; at doctoral levels and above as they enter the labour market, their participation rates drop. In India, women represent the majority of grade school and college science and mathematics teachers whereas in high profile Technology Institutes their participation only reaches 10-12%. The primary carer responsibilities are a contributing factor in this drop. However it is not the sole contributor: women in India face similar structural barriers in their careers to women across the world ^[3; 18].

4.1 Higher Education

According to the UNESCO Education statistics, in the majority of the countries, less than 30% of graduates in STEM programmes at tertiary level education institutions were women. India ranks amongst the higher percentages of women at 42%, closely trailed by Eastern European States – Poland (41.1%) and Romania (41.1%). A breakdown of programmes that comprise the broad field of STEM (Engineering, Manufacturing and Construction, Information and Communication Technologies, and Natural Sciences, Mathematics and Statistics), shows that India outranks other countries with respect to the percentage of women enrolled in these program at tertiary level.

The All India Survey in Higher Education (AISHE) report shows that women represent 46.8% of the postgraduates in IT and Computing for the years 2014-15³ (see Figure 12 below).

³ http://aishe.nic.in/aishe/viewDocument.action?documentId=206 (Accessed 27/01/2017)

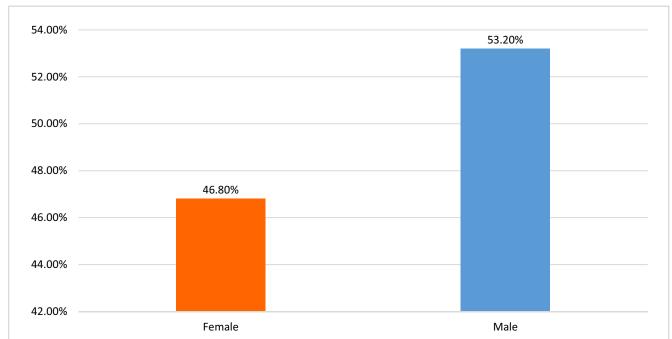


Figure 12: Out-turn/Pass-out at Post Graduate Level in IT & Computing

Source: AISHE report 2016: T-116

The GSM-IT survey results reflect the strength of this talent pool across different career stages. These are important indicators for understanding women's career progression in IT companies in India. In our surveyed companies the most common qualification for men (see Figure 13 below) and women (see Figure 14 below) at entry and contributor career stages are B.E. and B. Tech. At senior management and top positions men and women have similar levels of qualification, often having MBAs or other management degrees.

Figure 13: Qualifications held by female IT specialists at different career levels (Percentage of firms' responses)

	BE/ B.Tech	BCA/ BCS	MCA/ MCS	M.Tech/ MS	BBA/MBA/Other Management qualification	Others	No Response
Entry Level	89%	15%	11%	7%			2%
Individual Contributors	78%	15%	9%	13%	4%		
Middle Manager Level	69%	5%	13%	20%	16%		
Senior Management/ Director level	20%	4%	5%	36%	60%	4%	
Top Level/ C-Suite	4%	4%		16%	67%	7%	11%

Source: AISHE report 2016: T-116

Figure 14: Qualifications held by male IT specialists at different career levels (Percentage of firms' responses)

	BE/ B.Tech	BCA/ BCS	MCA/ MCS	M.Tech/ MS	BBA/MBA/ Other Management qualification	Architect	Ph.D	Others	No Response
Entry Level	91%	15%	11%	7%					2%
Individual Contributors	78%	15%	9%	13%	4%				
Middle Manager Level	69%	5%	11%	20%	18%				
Senior Management/ Director level	18%	2%	5%	36%	58%	2%		2%	
Top Level/ C-Suite	5%	2%		20%	67%		2%	67%	7%

Source: AISHE report 2016: T-116

Overall, the proportion of women across the three fields of study locate India in an enviable position of having a larger pool of tertiary level educated women in STEM fields, especially when compared to Western countries. This large talent pool is one of the factors that leads to a higher percentage of women within the Indian tech sector.



5 Women and IT: an international comparison

5.1 Employment numbers

Many countries in the West are seeing a decline in the number of women participating in the tech sector. By contrast the trend in the BRIC group of countries has been the opposite. As Figure 15 below shows, BRIC countries have more women working in the IT sector than Western countries such as the US or UK.

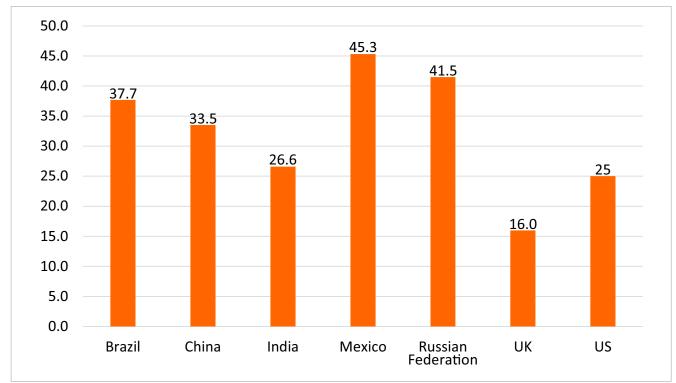


Figure 15: Women as percentage of overall IT workforce

Source: World Bank Enterprise survey, NCWIT, and BCS7

According to the Women in Tech: The Facts report from the National Center for Women and Information Technology (NCWIT), the US has witnessed a continual decline in the number of women working in its IT sector. The percentage of women working in the sector dropped from 36% in 1991 to 24% in 2015. The participation of women in the UK is even lower. In the period 2005-2015 the percentage of women in the sector has fluctuated between 16-18% according to the annual publication Women in IT Scorecard by the British Computing Society. The rising trend in India is in contrast to the decline in the US and stagnation in the UK [15].



In contrast to India's situation with the majority of its technical work force under the age of 30 years, the average age in the IT in the UK in 2016 is 40 years. The proportion of women younger than 29 years working in the IT industry in the UK in 2016 decreased to 14% compared to the previous year whereas the proportion of male IT workers in the same age group in that time period increased by 6% [4].

5.3 Leadership Pipeline

Within IT and IT services sectors, in which women are globally underrepresented, the participation of women as company leaders is very low.

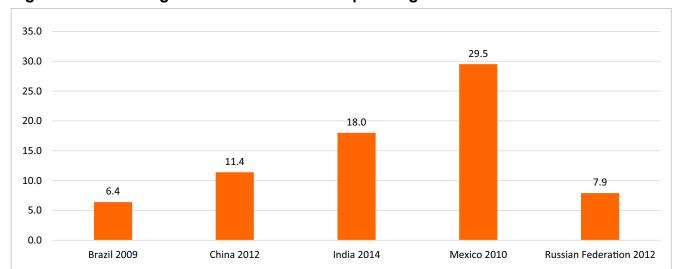


Figure 16: Percentage of firms with female top managers in IT and IT Services

Source: World Bank Enterprise Survey 2015

Among the BRIC countries, India (18%) accounts for the highest proportion of firms with female top managers in these sectors, whereas Brazil (6.4%) shows the lowest rates of IT firms with women holding top manager positions (see Figure 16).

5.4 Higher Education

A breakdown of programmes that comprise the broad field of STEM (Engineering, Manufacturing and Construction, Information and Communication Technologies, and Natural Sciences, Mathematics and Statistics), shows that India outranks other countries with respect to the percentage of women enrolled in these program at tertiary level.

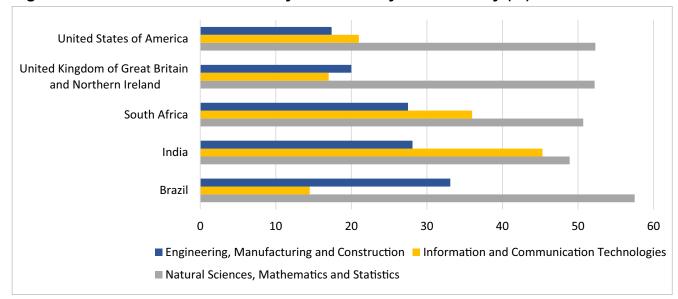


Figure 17: Women enrolled in tertiary education by field of study (%)

Source: UNESCO Institute of Statistics (2014)

Unsurprisingly, India has the highest percentage of women enrolled in Information and Communication Technologies programs at over 45% (amongst the countries highlighted). Female enrolment in India in Engineering and allied programmes is at 28.1%, second highest after Brazil (33%). However, India is lowest in the percentage of women enrolled in Natural Sciences, Mathematics and Statistics (48.9%) [20; 2; 3]. These national figures do not represent the large numbers of Indian students who study abroad. Indians make up the second largest group after Chinese who study abroad and of these 30% are women [23; 12].

6 References

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7 Appendix I Methodology

This report draws upon a new dataset collected through a company level survey, administered to HR managers in 55 IT sector companies in India across three cities: New Delhi, Bangalore and Hyderabad, where there is a high concentration of IT companies.

A market survey firm, KANTAR IMRB was employed to run the survey and engage with the HR Department of the participating companies. In each company the responses were made by a mid to senior level HR professional responsible for driving organizational development and similar HR practices.

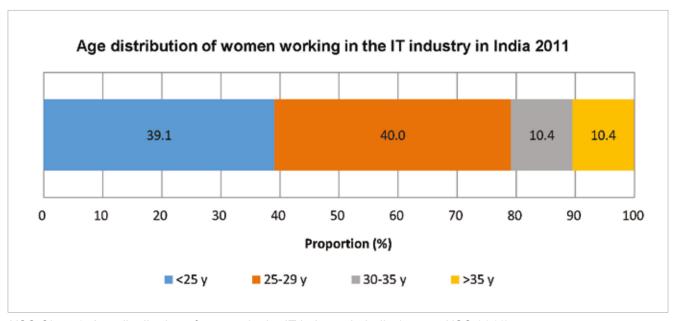
The sample has the following characteristics:

- 55 companies have been surveyed
- The sample includes small (<1001 employees), medium (1001-5000 employees) and large and very large (>5000 employees) organizations across 3 cities in India (Delhi, Hyderabad and Bangalore).

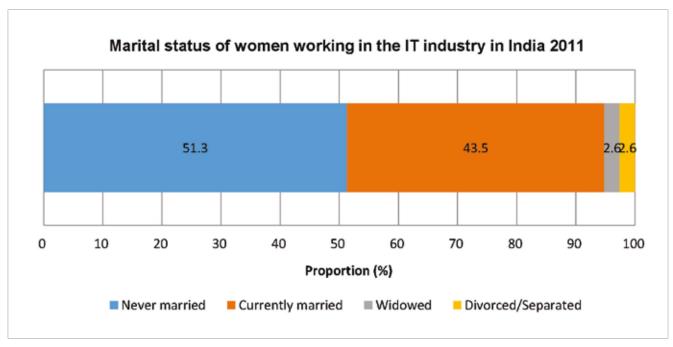
Non-probability sampling techniques have been used to recruit the respondents through panels of IT sector firms in India.



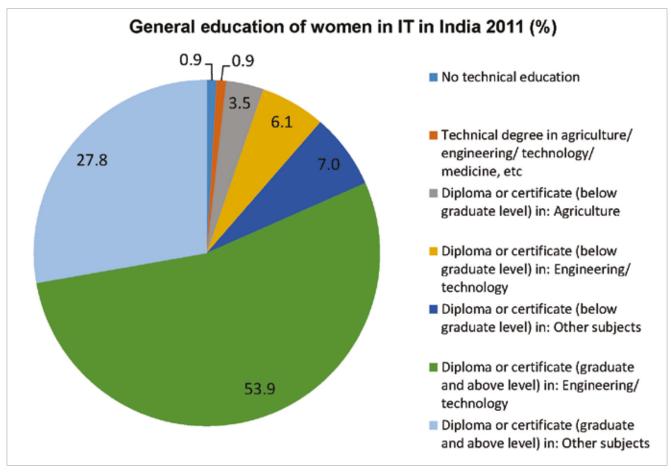
8 Appendix II NSS Charts



NSS Chart 1: Age distribution of women in the IT industry in India (source NSS 2011)



NSS Chart 2: Marital status of women working in the IT industry in India 2011 (source: NSS 2011)



NSS Chart 3: General education of women working in IT in India 2011 (source: NSS 2011)

9 GSM-IT Team at the Open University

The research team is made up of: Professor Parvati Raghuram, Dr. Clem Herman, Dr. Gunjan Sondhi and Dr. Esther Ruiz Ben. The research is based at the Open University in the Faculty of Social Sciences at the Department of Geography. The research is funded by the Economic and Social Research Council.

Professor Parvati Raghuram

Parvati Raghuram is a Professor of Geography and Migration and the OpenSpace Research Centre. The research project emerges from a series of high-profile contributions to debates on gender and skilled migration by the Parvati in both academic and policy forums. She was an expert for the meeting of the OECD-IOM on gender and skilled migration (April 2014). Parvati's work thus far has focused on how people experience and negotiate globalisation, especially as they move as gendered workers in sectors where the 'knowledge' of global knowledge societies is embodied and embedded: sectors such as medicine, education and the IT sector.

Dr Clem Herman

Clem Herman is a Senior Lecturer in the Department of Computing and Communications and is the Director of eSTEeM, the Open University's centre for STEM pedagogy (www.open.ac.uk/esteem) which promotes innovation, scholarship and enterprise in STEM open and distance learning. The focus of her research work has been to bring a critical gender analysis and a theoretical perspective to the experiences of women who return after taking a career break to work in STEM related fields. Clem is the founder and editor of the International Journal of Gender Science and Technology and is involved with a number gender and ICT research networks, nationally, across Europe and globally.

Dr Esther Ruiz Ben

Esther Ruiz Ben is a Research Associate within the Department of Geography and also holds the position of private docent at the Institute of Sociology of the Technical University of Berlin, Germany. Her research areas include professionalisation and digitalisation processes of work in the private and public sector, categorisations of work and inequalities, innovation and technology, innovation and sustainability as well as the development of research methodologies.



Dr Gunjan Sondhi

Gunjan Sondhi is a Research Associate within the Department of Geography. Gunjan's work focuses on the intersection of highly skilled mobility, gender and class. Starting from her Phd project, in which she examined international student mobility through a gender lens, she has worked on projects on experiences of highly skilled migrants in Canada, India and Singapore. Gunjan's work has appeared in Journal of Ethnic and Migration Studies, the annual publication India Migration Report 2015, Journal of South Asian Diaspora, and Compare, the Journal of British Association of International and Comparative Education.

The project is guided by a Professional Advisory Group (PAG) whose constituents include BCS – The Chartered Institute for IT, Tech London Advocates, TechUK and NASSCOM in India.

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Please feel free to contact us to discuss the report in more detail











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