Developing a startup ecosystem

LESSONS FROM THE UK





Contents

About FICCI	02
Acknowledgements	03
Foreword	
About the report	05
Growing ecosystems	06
A bird's eye view of the startup environment in London	08
Creating the Ecosystem	12
Accommodative policy from government	15
Support from government agencies	17
Strong underlying institutional and corporate support	18
Access to market can manifest in different ways	20
Human capital is as important as other infrastructure	
It is important to cultivate an entrepreneurial culture	21
Comparison with India	22
FICCI's involvement in encouraging startups	25
Our Recommendations	27

About FICCI

The Federation of Indian Chambers of Commerce and Industry (FICCI) is the largest and oldest apex business organisation in India. Its history is closely interwoven with India's struggle for independence, its industrialisation, and its emergence as one of the most rapidly growing global economies.

Our partners







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Thanks also to Dr A. Didar Singh, Secretary-General of FICCI and Rajesh Agrawal, Deputy Mayor for Business and Chairman of London & Partners, for their foreword. Given their unique experiences of both the UK and India, their joint contributions have added weight to the findings.

We look forward to advancing this agenda onward with government representatives as well as other stakeholders in India and the UK to see what we can achieve together.

Foreword



Dr A Didar Singh, Secretary-General, FICCI

The UK has a well-known and globally respected business environment, which has been encouraging the growth of startups over the last few years. India has undergone a similar journey, where metro cities are seeing a new, vibrant startup culture, especially after the success of home-grown tech giants such as Ola and Flipkart. The Indian government's policies have put the focus squarely on making India a leading startup destination.

In January 2016, the Hon'ble Prime Minister Narendra Modi announced an ambitious vision where the government could be a facilitator of entrepreneurship in the country that could provide employment for our large young population. We think these building blocks will encourage many young entrepreneurs to come forward with innovative ideas to contribute to the growth of India. Over 100 young innovators and startup companies attended the launch of the Startup India programme in New Delhi under the auspices of FICCI.

This report comes at an important point in such a journey. While we in India are very excited about the growth that we see and the opportunity this brings for innovation, creativity and creates jobs, it is also important to learn from the experiences of others that have been through the process. This report has been led by the FICCI's India Advisory Group in the UK, a team of senior NRIs who have contributed greatly to the economies of both the UK and India over their long and successful careers in a wide range of fields.

We are grateful to them for taking the lead in initiating this thought leadership initiative which we hope will be the first in many in the coming years from the Group. We hope to use the outcomes of this report for framing our policy recommendations in India with government at all levels.

As an organisation, FICCI remains firmly committed to growing and supporting the startup ecosystem in India and we look forward to helping policy makers implement some of this report's recommendations.



Rajesh Agrawal, Deputy Mayor for Business; Chairman, London & Partners

Innovative businesses are the bedrock of London's success as a city that embraces new ideas and new enterprises. Startups are a crucial feature of this ecosystem. London is Open; the truly unique convergence of talent, capital, innovation and open-ness in London has encouraged and enabled more Startups since records began. Further, these startups are flourishing. Only recently we passed an important milestone: for the first time there are more than one million registered businesses in London, 99% of which are SMEs. We are not complacent; as Deputy Mayor for Business I want to make sure London remains competitive and a straight forward place to do business.

The Government at all levels has played its role in London's success, both in responding to the financial crash and facilitating a nurturing startup ecosystem. Tools such as the Seed Enterprise Investment Scheme, using planning policy to prevent office space being converted to residential in Zone 1, and the Patent Box are game-changers for enabling micro-sized firms to scaleup. Similarly low interest rates, relatively easy access to finance, and recognition by major corporates that smaller, nimbler firms are able to innovate faster and are ideal partners, all contribute to startups attaining sustainable growth.

I congratulate FICCI on this excellent snapshot of the ingredients that contribute to the UK's successful startup culture, and I commend it to policy makers at regional and federal level. Hon. Prime Minister Modi's ambition to accelerate improvements that make it more attractive to go into business, to reduce risk for startups, the Digital India programme, and implementing some of the lessons from the UK could create a step-change in the sustainability of new businesses in India.

We need to keep improving in London too – upgrading our infrastructure – and we recognise that there is plenty to learn from new policy initiatives in India. I am fortunate enough to have succeeded in business here – testimony to India's creativity and that London is Open – and I want to see the partnership between London and India foster more bilateral business collaboration.

About the report

This report represents a new phase in research from FICCI, in conjunction with its esteemed India-UK Advisory Group, which will focus on areas of potential collaboration between the UK and India. Specifically, this report looks at the British experience in creating a thriving startup ecosystem and what learnings the Indian central and state governments may take from this.



Growing ecosystems

The UK was not traditionally known for its startup ecosystem. But a number of factors including its geographical location make it an ideal meeting place for talent as well as opportunity. Since 2010, the British government has taken a number of active steps to establish and nurture a startup ecosystem in the UK, starting with the formation of Tech City in London to introducing generous tax incentives for both entrepreneurs and investors. By the last count, the number of Startups in London increased from 440,600 in 2011 to 608.110 in 2015.

The objective of this report is to explore how the UK was able to establish a successful entrepreneurial ecosystem bringing together great ideas, entrepreneurs, investors, government policy and infrastructure, and see what could be juxtaposed to boost Indian Prime Minister's flagship StartUp India scheme.



"We want nothing less than to make the UK the technology centre of Europe."

- George Osborne, former Chancellor of the Exchequer, March 2012

Chancellor George Osborne said he wanted to make the UK the technology and innovation hub of Europe in 2012. A week before, the government had cut the temporary 50p income tax rate rate and pledged to cut the corporation tax rate to 22% by April 2014.



"The UK tech sector has been the outstanding success of the UK economy over the last decade and will be vital to the UK's success in a post Brexit world. There is much that the UK and Indian tech ecosystems can learn from each other as we look to boost our shared strengths in emerging technologies such as the Internet of Things and Artificial Intelligence.

- Julian David, CEO, TechUK

According to the Global Startup Ecosystem Ranking by benchmarking tool Startup Compass, this seems to be working. London is ranked as the sixth best startup ecosystem in the world, and the best in Europe, placing it comfortably ahead of Berlin at ninth. Although the top five are dominated by US hubs, these European hubs are in fact the fastest growing. The EY Attractiveness Survey 2016 ranked London as the number one tech destination in Europe.

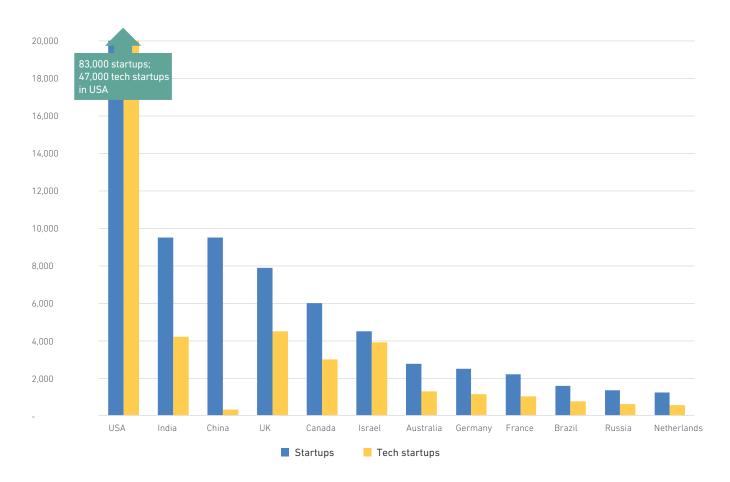


"When a man is tired of London, he is tired of life; for there is in London all that life can afford."

- Samuel Johnson, quoted in The Life of Samuel Johnson, LL.D. (1791) by James Boswell

According to figures from both Grant Thornton and Indian industry body NASSCOM, the UK has the second most vibrant startup community in the world after the USA. More startups, and in particular technology-focused startups begin life in the UK than in Canada, Israel or elsewhere in Europe. But while the more mature startup scene in the UK is booming, so is the more nascent scene in India.

Figure 1.1 The Indian startup ecosystem is booming; the UK is amongst the most vibrant in the world



Source: NASSCOM, 2015, Startup India – The Momentous Rise of the Indian Startup Ecosystem.

A bird's eye view of the startup environment in London

London is a hub for business and startup activity in the UK. London accounted for 18.2% of the total number of business in the UK, the highest proportion in the country. London saw an increase of 29,000 businesses set up in 2015, a growth rate of 6.95%, accounting for nearly a third of the total businesses set up in the country. ²

In terms of Foreign Direct Investment (FDI) into the UK, London also leads the way. London-based companies secured around \$2.3bn of the \$3.6bn raised by UK firms in 2015, more than any other European city. This compared to investment of \$791m into the UK and \$101m into London in 2010. In other words, London accounted for one seventh of the UK investment in 2010, a figure that has increased to two-thirds now. E-commerce startups have been particularly successful in raising funding recently, and there were 24 venture-capital backed exits in 2015.

The flagship initiative of the London tech boom is the creation of Silicon Roundabout, in the Old Street area of East London. According to commercial property estate agent Stirling Ackroyd, there are 3,228 tech firms for ever square kilometre within the EC1V postcode, making it the most densely populated cluster of startups and tech companies anywhere in the country. The W1 postcode forms a secondary 'western' cluster, followed by the financial district Canary Wharf, which houses Europe's largest fintech accelerator Level39. London's Silicon Roundabout is at least 16 times more densely packed than Birmingham's so-called Silicon Canal, Brighton's Silicon Pier district and even the world-renowned Silicon Fen in Cambridge.⁴



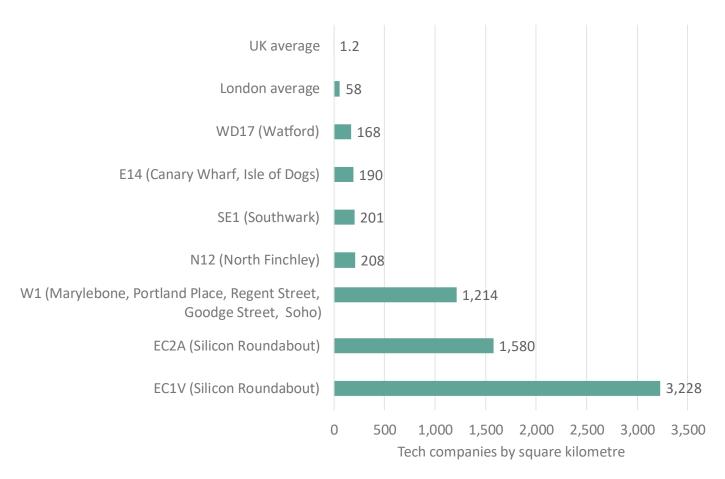
"London's startup story is also to do with intelligent positioning of the tech industry. Given the credentials of London as an established financial hub, the FCA and the UK government did a fabulous job of bringing out enabling regulations that encouraged the fintech industry to set base and flourish. It demonstrates the fact that it is important to create and develop an ecosystem by leveraging the inherent expertise of the region."

- Thomas Hellmann, Professor of Entrepreneurship and Innovation and Academic Director of the Entrepreneurship Centre. University of Oxford

³ London & Partners, 8 Oct 2015, Record Venture Capital investment in UK Tech sector over last 9 Months

TechWorld.com, 15 September 2015, Old Street's Silicon Roundabout shows no sign of giving up its crown as UK tech capital.

Figure 1.2 Tech companies by square kilometre in London and outside



Source: Stirling Ackroyd (2016).

More businesses are starting and fewer are not surviving in the UK. At least part of the growth in the birth of new enterprises in the UK over the last few years has been because of softer employment market, driving particularly the growth of one-person microenterprises.





Figure 1.3 Births and death of enterprises in the UK show that startups are booming

Source: Office of National Statistics (ONS).



"London has emerged amongst the hottest startup ecosystems, globally. In the last five years, favourable policies, a structured approach towards supporting new businesses, and an increased focus on startups has helped build the UK as an attractive region for entrepreneurs and investors alike. The UK is home to some of the best research and innovation in the world but has been underleveraged by global angels.

We have seen the scenario change over the last few years with some very strategic initiatives like inviting the IAN to set up its operations in the UK. The UK government has played an enabling role to fuel the global angel investment into UK, and help mentor and grow UK startups across countries."

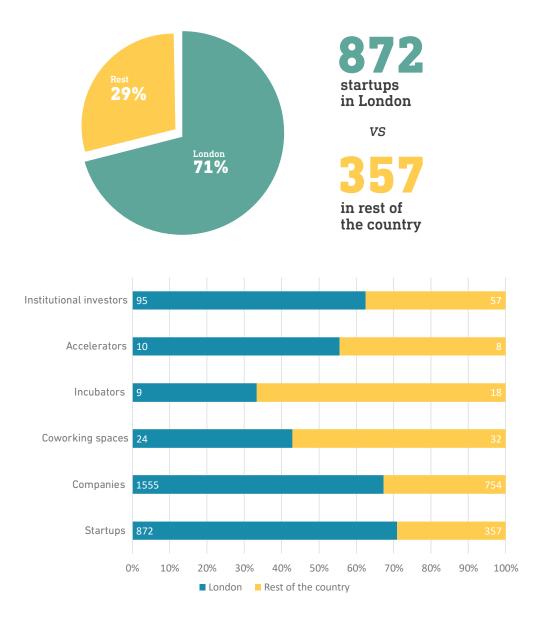
- Saurabh Srivastava, Co-Founder, Indian Angel Network; Co-Founder and past Chairman of NASSCOM

The following charts show just how concentrated the UK's startup ecosystem is in the central hub of London. While there were 43 co-working spaces, incubators and accelerators just in London, the other most buoyant tech clusters in the country, namely Manchester, Edinburgh and Cambridge had just seven, five and three respectively.

As more firms in related fields of business cluster together, they are likely to attract more competing service providers and labour. This results in greater economies of scale and network effects. Cities such as London have formed and grown to exploit such economies of agglomeration very well.

It is these network effects, combined with a welcoming government, that have attracted established angel groups. For example, India's largest business angels group, the Indian Angel Network, launched at Downing Street in 2014 as a result of consistent outreach activity from the Cabinet Office, including its Venture Capital unit at the Department for International Trade (DIT).

Figure 1.4 The UK's startup ecosystem is concentrated in the hub of London



Source: TechBritain.com map of country-wide startup community.

In summary, there are more startups being created in the UK that are surviving longer and attracting ever greater interest from global investors. London's and the UK's startup ecosystem is not just for British companies, but founders from around the world are looking to relocate there to start and grow their businesses.





"We set up specifically in London, because it is the UK hub of startup activity. The UK was the natural country to venture into after the growth of our technology venture in India and the Middle East. We were assisted not only by London & Partners, but other organisations such as FICCI, to find partners and sales channels in the country."

- Kartik Sharma, Founder and CEO, Agnitio Education

Creating the Ecosystem

Policy and incentives can be used to create a strong nucleus of activity which can generate its own momentum and become self-sustaining. There are a number of key factors which can help to drive this momentum.

On the demand side there are elements like the use of public procurement, public private partnerships and increasing private demand through incentives to work with smaller companies; and on the supply side access to funding and high quality resources.

Then there are enabling factors that are unlikely to accelerate the growth of entrepreneurial ecosystems but if not correctly established they may slow down the all-important impetus for growth. These include: both digital and traditional infrastructure, governance and strength of institutions, policy, and importantly an enabling culture or lifestyle.

The following infographic shows just what it takes to build a successful ecosystem to encourage entrepreneurship. It is not an exhaustive list, but illustrates to create a strong foundation, a number of these pillars must be in place.

Figure 1.5 Key ingredients of a successful ecosystem



While birth rates for new businesses in the UK have increased in the last two years, survival rates have also improved. In 2009, 90.8% of businesses survived one year and 41.7% survived five years according to the ONS. By 2013, the one-year survival rate had increased to 93.5%.

But most startups will survive the crucial first few years will remain micro-enterprises. What the graphic shows is that encouraging startups to take a risk on their ideas, supported by networks, visible success stories and government is only part of the challenge. For these businesses to secure significant growth in jobs, taxes and wealth, as well as the country's competitive advantage for future generations, the ecosystem needs to increase the proportion of companies which scaleup.



"Adopting a mindset of using existing resources more effectively not just providing more support is key in our current

resource-constrained world.

One of the most pressing growth challenges faced in advanced economies is how do you move beyond creating startups, to prepare the ground for companies to grow and create meaningful economic impact. We should count ourselves lucky that there are simple, inexpensive, yet deeply impactful steps that enable local ecosystem players to leverage their networks and provide them with actionable insights to stimulate the growth that we all so keenly desire to make it a more prosperous community to be a part of."

This is important because the needs of a business evolve from the ideation stage, to the bootstrapping phase to a more mature firm with growing employee base first with 10 employees, then 50, then 100 and more.

But just 39% of London startups, 45% of businesses in the South West, and 42% in Scotland survive longer than five years. From the rest, according to research by tech-focused venture capital firm Octopus Investments and the Centre for Economics and Business Research (CEBR), fast-growing small firms created 68% of all new jobs in the UK between 2012 and 2013, despite making up just 1% of the total business population.

These business, defined as having an annual turnover of £1-20m and more than 20% average yearly growth over three years, also generated 36% of UK economic growth, despite representing just 3.4% of the total UK economy.

In other words, a successful engine of growth is one where the emphasis is not on startups or entrepreneurs themselves, but on the innovation ecosystems within which they operate.

Government intervention and support can help at each stage of this process. One pillar of support from the infographic above is not enough, but all the foundations must be strong for successful long-term benefits for the entire system.



Accommodative policy from government

According to the latest Ease of Doing Business rankings from the World Bank, the UK ranks sixth best in the world, and second-best in Europe, behind Denmark. The UK catapulted from 43rd for Starting a Business in 2015 to 17th in 2016 in fact not because of some of the initiatives outlined in the graphic above but for simpler initiatives.

The UK has some of the basics covered well. It takes less than a day to check the availability of a unique company name, complete the application form IN01 and file for registration with Companies House. To contact HM Revenue and Customs takes just a day, as does signing up for employer's liability insurance, while registering for Pay-As-You-Earn takes just three days. Applying to a county court to claim money owed by a person or business via the Small Claims or mediation procedures can be applied for online and is proportionate to the size of the claim, although the cost of and length of time taken to resolution has increased in recent years. Compliance requirements for proportionate to the size of enterprise, with self-employed and micro-enterprises having lower reporting requirements.

One of the key policy innovations in the UK has been the introduction of the SEIS and its associated EIS. These schemes enable smaller investors to invest in startups or later-stage companies by providing tax relief providing downside protection as well as relief on the gains. As well as giving an exemption from capital gains tax, any loss suffered (net of income tax relief) can be claimed as a capital loss to set against capital gains of the same year, or to be carried forward to set against gains in future years.



"Investor friendly policies and tax initiatives give the desired impetus to an emerging entrepreneurial ecosystem like that in the UK. EIS and SEIS are amongst the most favourable schemes introduced by the UK government in support of investors willing to invest in startups and at the same time help boost the country's economy. High tax on investment returns invariably reduce the risk-taking appetite of investors who would otherwise be keen to invest in unconventional and original ideas. For startups, access to pure capital in exchange for equity and a strong network of engaged investors has a long-term positive impact on the venture's growth.

A conducive business environment for both startups and investors is the way to lead Europe's largest startup hub to become relevant in the global entrepreneurial ecosystem."

- David Best, Non-Executive Director, Senior plc; investor, Indian Angel Network

The introduction of these schemes has coincided with historically low interest rates in the UK, with the Bank of England reducing the base rate from 5% to a historic low of 0.5% in 2009, then again to 0.25% in 2016, encouraging savers to seek returns elsewhere.

The following infographic outlines some of the major policy and regulatory changes from the UK government that could impact startups or other young businesses.

Figure 1.6 Major policy and regulatory changes in the UK

Positive Negative Neutral April 2011 Corporation tax cuts: For small companies reduced from 21% to 20%. Main corporation tax rate cut to 26%, and cut further in successive years. July 2012 Seed Enterprise Investment Scheme (SEIS): To encourage investment Sep 2012 in new startups by providing private investors with up to 50% of investments (up to £150,000) back in income tax relief. Start Up Loans scheme: Aimed at helping people launch small companies by offering personal loans of up to £25,000, at Jan 2013 **Simplifying land registration:** According to the World Bank, the government gave itself 400 days to transform 25 major services, a fixed interest rate of 6% per annum. including land registration, by making them simpler, clearer and £231.8m has been lent, of which £69.7m faster to use. In 2013/14 the land registry increased its productivity by 21% despite a 16% rise in applications. In 2014, 76% of substantive applications were submitted electronically. recouped but £72.4m written off or fall into default. 5 April 2013 **R&D tax credit:** Relief has existed from 2002 to reduce the cost of corporate R&D and thereby encourage R&D activities. From 2013, a special Expenditure Credit (RDEC) allows larger companies to recognise the benefit of their R&D claim effectively as a grant against cost. Loss makers are also able to claim cash back. Jan 2014 **Growth vouchers:** Designed to help small April 2013 businesses pay for expert advice on a Patent Box: Enables companies to effectively reduce corporation tax matched funding basis rate to 10% for income from patents, applicable to worldwide with the government, income from the exploitation of certain inventions. including on recruitment, raising finance, management April 2014 training and marketing. Only £3.6m of £30m EIS: For investments into later-stage startups by providing investors **Greater public sector** with up to 30% of their investments (of up to £500,000) back in procurement from SMEs: A 2010 aim was to allocated paid out. income tax relief. increase central government spending with SMEs from 6.3% of Nov 2014 the budget to 25% by Starting a business: Providing model articles for use in 2015. The figure stood at 10.3% by 2014, thanks to preparing memorandums and articles of association the benefits of clearer April 2015 e-tendering, more April 2015 Visa changes: prompt payment for Restrictions on part-time work rights SMEs and simplifying **R&D tax relief:** Although relief existed from 2002 to reduce the cost of corporate R&D and thereby encourage R&D activities, small companies can claim a super-deduction of 225% of R&D cost pre-qualification. in 2012, followed in subsequent years by against taxable profits. the removal of post-study work visas, expansion of credibility interviews and the creation of the Starting a Business: UK made starting a business easier by NHS health surcharge March 2016 speeding up tax registration. of £150-200. **Commercial Property** Stamp Duty cuts: Property worth up to £150,000 will be exempt April 2016 from this transaction tax Capital Gains Tax cut: From 28% to 20% for higher rate taxpayers, on the sale of property or and from 18% to 10% for those on the basic rate. January 2016 land, funded by an increase from 4% to 5% Visa changes: Migration for properties of Advisory Committee £250,000 or more. proposés levy on October 2015 employers hiring from Visa changes: Tier 1 Exceptional Talent Visa introduced focusing on abroad, higher non-EU talent for early-stage firms trying to scale up. minimum salaries and a clampdown on overseas IT contractors.

Source: FICCI.

While some of these initiatives do not directly benefit new startups, they do create a more holistic wider ecosystem of support for businesses, one in which startups can thrive within value chain.

For example, after a number of high-tech company departures from the UK, the government was keen to improve the country's attractiveness to such companies. The Patent Box scheme was introduced not for new startups, but for more established companies as an additional incentive to develop, commercialise and retain innovative patented technology. The regime is intended to apply to the worldwide income arising from the exploitation of inventions which benefit from a qualifying patent. The scheme is amongst the most competitive in the world and although it is complex, a network of appropriate financial and legal advice readily available in London means companies are able to take advantage of it.

The phasing-in rules mean that the full benefit of the 10% effective rate will be phased in over five years, with 80% of the full benefit being available in 2015. It is specifically aimed at the tech and life sciences industries, where the time taken from discovery of molecule to trial to market may be a number of years.

The government has made available a number of grant schemes, including through Innovate UK, which commits around £500m annually through nearly 100 funding competitions in emerging and enabling technologies, infrastructure systems, health and life sciences and manufacturing and materials. Horizon 2020 is an EU grant offering around €79bn in cash grants, as well as other regional grants.

Support from government agencies

Regional inward investment agencies such as London & Partners offer pro-bono assistance in finding partners and investors, as well as subsidised office space.

The DIT's Dealmaker network is a team of 19 successful entrepreneurs in London, regionally in the UK and elsewhere in the world, which help people set up and expand their businesses from the UK. The government's Global Entrepreneur Programme (GEP) helps overseas entrepreneurs and early stage technology businesses or startups relocate their business to the UK. The hand-holding support programme has so far helped create over 1,000 jobs in the UK economy over the last few years.

The DIT's Tech Rocketship Awards help scout for some of India's best and brightest talent in technology startups including some FICCI prize-winners, who then win a trip to the UK, with access to British expertise and advice and a chance to pitch to potential investors.



"The Tech Rocketship Awards is a fantastic opportunity for deserving startups to showcase their ideas in front of business leaders and investors."

- Mohandas Pai, Co-Founder, Partner and Chairman, Aarin Capital; Judge, UKTI Tech Rocketship Awards

These initiatives must be viewed in the context of a government that actively champions startups, and takes them on international trade delegations to provide them wider exposure and access to markets they would not otherwise have at the start of their entrepreneurial journey.

Strong underlying institutional and corporate support

It is well known that the UK has strong institutions, be it policy-making, regulatory or legal. But there are two other parts to this institutional framework that are also vitally important.

The first is that London is one of the foremost global hubs for professional and financial services. Therefore, access to the best advice and knowledgeable networks is readily available. For the UK's fintech scene for example, this is particularly helpful, because it means strong institutional support, but also ready access to early adopters and distribution channels of innovative new products. Level39, Europe's largest incubator, benefits from being at the heart of Canary Wharf, a major financial district that is home to world or European headquarters of numerous major banks, professional services firms and media organisations.

India's first edtech incubator, EduGild in Pune, is modelled on Emerge Venture Lab, spun out of Saïd Business School in Oxford and set up in London. Emerge was able to attract applications to its competitive accelerator program from around the world precisely because of its access to such networks.

Silicon Roundabout is perhaps the best showcase for London and the UK's success in attracting tech to the country. It is where Google set up a new campus in 2012 and where a slew of incubators have established. A £25m scheme for the setup of superfast broadband in the area was introduced as the area grew. However, increases in property prices and higher wages due to a widening skills gaps in technology has meant some startups are being priced out.

Access to finance is vital for the journey from startup to scaleup

Given the UK's strength in financial services, with London in particular a hub for Indian and other investments, backed by the accommodative SEIS and EIS tax breaks, finance is comparatively more accessible than in other countries.

According to data from EY's Startup Barometer Germany report, London startups received over £1bn in investment in the first six months of 2016, while UK startups received £1.7bn in the first six months of the year, up from £1bn in the first half of 2015. London's investments were the highest for any European city and formed the majority of the funds received by UK startups.



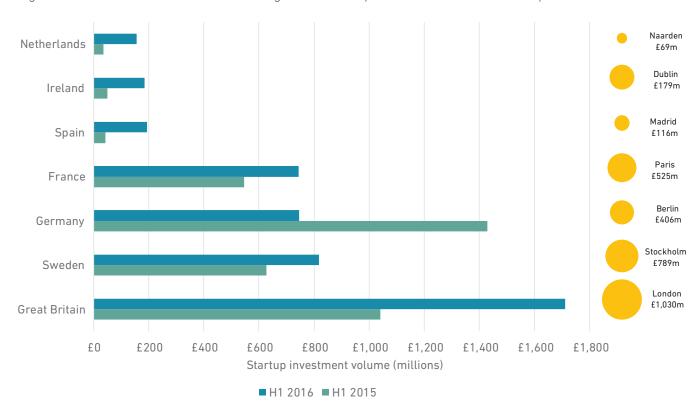


Figure 1.7 London and Berlin receive the greatest startup investment volume in Europe

Source: City AM, 22 August 2016, Startups in London raised more funding than in any other European city this year.

Aside from equity finance, the UK has seen a number of innovative products develop elsewhere in capital markets, that are aimed at startups and SMEs. The Start Up Loans funding scheme for entrepreneurs works through regional delivery partners in the UK to provide loans of £500 to £25,000. Peer to peer lending has become mainstream after Zopa's launch to the public in 2005, and subsequent offerings from RateSetter in 2009 and Funding Circle in 2010.

Germany and the UK lead the way in Europe in terms of startup exits. According to US startup database CB Insights, the UK had the second highest level of exits in the world, behind the US and just ahead of India, Canada and Germany.⁷ The European Tech Exits Report 2015 by Tech.eu and the Nordic Web said 119 companies exited in the previous 12 months from Germany, and 89 from the UK. ⁸

Nine of the top 20 exits in Europe were British companies. Most investment has been homegrown and the prevalence of IPOs is still low.

Fintech investment, particularly payments, has seen the highest growth over the past few years. The attractiveness of edtech remains muted, and while acute funding shortages in the National Health Service means medtech is becoming less attractive, digital health and big data are likely significant areas of future growth.

Looking ahead, Cybersecurity, Internet of Things and Artificial Intelligence are likely growth areas. These are helped by the triangle of Oxford, Cambridge and London, where universities have deep expertise in applied mathematics, computer science, and machine learning.

 $^{^{6}}$ The Times of India, 22 September 2016, India ranks 3rd in tech startup exits.

Geektime, Germany, 3 February 2016, UK lead explosion in European startup exits in 2015

Access to market can manifest in different ways

Having a good access to market is in part reliant on being in the middle of a self-sustaining and growing ecosystem, but also on support from government and established platforms which provide this access, and a benevolent hand from large corporates.

Through clearer e-tendering, simpler pre-qualification and other changes, central government has actively encouraged procurement from SMEs.

By having an ecosystem of accelerators and incubators with regular after-work networking events, pitch presentation support and matchmaking, startups can meet potential investors, partners and clients through an organised network of activity. At Level39 for example, senior banking executives will regularly visit to scout for new ideas they can adapt and integrate into their businesses.

Often, these incubators are run in London by large corporates such as Microsoft and Google. Some banks provide their corporate banking clients access to client and export opportunities as part of their value proposition.

Platforms which convene different elements of this ecosystem in the same place on a regular basis are vital. Through such initiatives, governments can help create a strong brand for innovation on the international stage, such as at 22@Barcelona or Hannover Messe. Such brands can help to attract both talent and finance to the ecosystem and provide a platform for businesses in the area to launch internationally.

London Tech Week saw 40,520 attendees at 302 events in 207 venues in 2016. The International Festival for Business in Liverpool, marketed as the "world's largest business festival", attracted an estimated 24,000 delegates in 2016, with representatives from 98 countries. In India, Prime Minister Modi's Make In India week in February 2016 was a first-of-its kind in India and attracted 65,500 participants from more than 11,000 companies.

Trade promotion contracts which receive central government funding have Key Performance Indicators linked to the outcomes generated and impact produced. Some include "service deliveries", a measure of how many potential beneficiaries have been reached, or explicit measures of jobs "created or safeguarded". Some are clumsy measures, but generally emphasise the importance of measuring the right KPIs to ensure there is impact generated for the economy.





Human capital is as important as other infrastructure

Startups grow out of ideas, and so even before digital and physical infrastructure is considered, human capital is paramount, not just homegrown but borders which allow the best and brightest to join the ecosystem. Having a vibrant higher education sector is of vital importance to ensuring the right talent is identified and nurtured. Incubators in the UK regularly have matchmaking sessions for co-founders and mentors.

The prevalence of tech startups also changes the makeup of the job market, with jobs such as content strategist, UX/UI designer and growth hacker far more in demand than just a few years ago.

But there are some risks. The UK's decision to vote for Brexit has caused uncertainty for this ecosystem. Access to markets, availability and mobility of labour as well as investor appetite may all suffer by bringing additional complexity and economic risk.

The government and its Migration Advisory Committee must play a careful balancing act between conflicting demands to cut immigration without harming economic activity, through further tightening of the skilled immigration. In the past few years, these have resulted in restrictions on part-time work rights in 2012, followed in subsequent years by the removal of post-study work visas, expansion of credibility interviews and the creation of the NHS levy.

It is important to cultivate an entrepreneurial culture

An important aspect is the ecosystem feedback involving two primary dimensions – the diversity dimension and the dynamic dimension. While the former involves the creation of all the inputs needed to build successful startups, as the report thusfar covers, the latter takes a few iterations of entrepreneurs failing before making it big.

There are several interrelated aspects to this. Entrepreneurs must be encouraged to innovate without fear of failure, and turning to startups rather than more traditional, "safer" paths must be an attractive culture and lifestyle choice. This requires strong role models, but also peer pressure to drive young bright minds to entrepreneurism and startups rather than alternative more traditional paths.

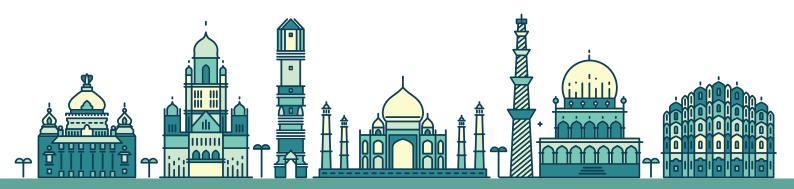
According to a YouGove survey commissioned by Google in 2016, British teenagers have little interest in starting their own companies. The pollsters found that only 22% of people aged 15-18 believed that they would likely start their own business, most seeing it as risky. 9

The young startup lifestyles of Berlin and London have undoubtedly helped grow their attractiveness, particularly in Berlin's case in the last few years. While policy and a government's helping hand can create top-down initiatives for support, this is very much a bottom-up approach and must be carefully cultivated over time. This is critical for the ecosystem to be self-sustaining and to grow organically in the long run.

⁸ ITProPortal.com, 22 March 2016, Google launches Future Founders in the UK to inspire teens.

⁹ Credit Suisse, July 2013, Research note: India Market Strategy.

Comparison with India



India takes a unique approach to entrepreneurialism and startups. According to Credit Suisse, only sub-Saharan Africa, at 55%, has a larger unorganised economy than India. The latest official data from 2011-12 shows 69% of urban employment is in the informal sector, while Credit Suisse reckons this figure is as high as 90%. The majority of these are employed in microenterprises.

India ranks 130th in the World Bank's Ease of Doing Business rankings, although it is eight best in the world for protecting interests of minority investors. For Starting a Business, it is 150th, but the government has actively taken steps to improve this, reflected in a jump of twelve places in overall Ease of Doing Business from the previous rankings.

But like the UK, India too was not known for its startups. But startups that are innovation and technology driven have increasingly become the backbone of a new India, and could be key drivers for several of the government's programmes such as Make In India, Digital India, Startup India as well as employment generation. There is a strong willingness among aspiring entrepreneurs to take risks and establish new business models.

This attitudinal shift amongst urban young people

has been in part due to the success they see of home-grown ventures Flipkart, Snapdeal and Ola, or of newer startups such as 2016 Economic Times Startup of the Year winner Freshdesk.

There are a number of challenges for Indian startups, from the stage of incorporation through the stages of raising capital, hiring resources, scaling up and making an exit. There is a need to address such bottlenecks to minimise failures and ensure that the startups graduate to becoming scaleups. In global hubs such as London, failure for startups is accepted but entrepreneurs in developing countries such as India could be seen as braver as they are taking comparatively greater risks in the face of adverse situations.

The Indian government is taking steps to make it easier to do business for startups, including the launch of Startup India, through which the government has been vocal about its encouragement for entrepreneurialism and the startup community.



"It is easier to get an appointment with the relevant government official to discuss regulatory issues than with fund managers. This brings a lot of positive synergies into the startup ecosystem in India."

- Shyam Menon, Co-Founder and Investment Director, Infuse Ventures; Chevening Program Fellow

Many of the accelerators, incubators and coworking spaces in the UK are set up by serial entrepreneurs or large corporates, and act as a community focus for co-founders, mentors, investors and potential clients to interact. For example, American coworking space provider WeWork, established in 2010, has a number of locations in London as well as other notable hubs across the world. India's coworking spaces tend to be homegrown and localised, as a sign of an industry which has not yet matured.

One of its flagship initiatives has been the Atal Innovation Mission (AIM), whose two core functions are to promote entrepreneurship and innovation, to generate innovative ideas through the support of incubators, tinkering labs, and scaleup support for established incubators.

A request for proposal for government-funded AIM incubation centres in India in 2016 led to 3,658 applications, of which 1,293 were from private academic institutions and 1,048 from corporates. The figure below shows the major startup hubs of India and where some of the key sources of applications were. AIM will provide a grant of Rs 100m to selected incubation centres for up to give years.

This is a welcome initiative and will provide not only important institutional support and facilitate access to appropriate human capital, but will also help nurture and grow a greater entrepreneurial culture in this sector. It comes after the continued success of industry body NASSCOM's 10,000 Startups Program, which was started in 2013 and aims to enable incubation, funding and support for 10,000 technology startups in India over ten years.

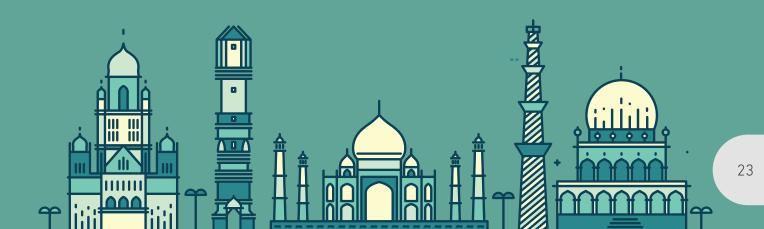
In the academic sector, technology transfer offices at universities in the UK support students to register their IP and commercialise their products. The top universities form the backbone of the startup ecosystem. These support mechanisms have been set up over time to support the commercialisation of innovation, through entities such as Imperial Ventures. Such groups provide funds with a long time horizon recognising that investing in science takes time.

In India, this support is not yet institutionalised across the country, although there are some centres of excellence, such as at IIT-Delhi.



"The proposal of the government to setup a Rs. 5,000 crores India Opportunities Venture Fund with SIDBI to enhance availability of equity to the micro, small and medium enterprises (MSME) sector is laudable. If executed properly, this scheme could effectively address a significant impediment to the growth of MSMEs."

- Deepak Komaregowda, Investment Director and Vice President, Ascent Capital



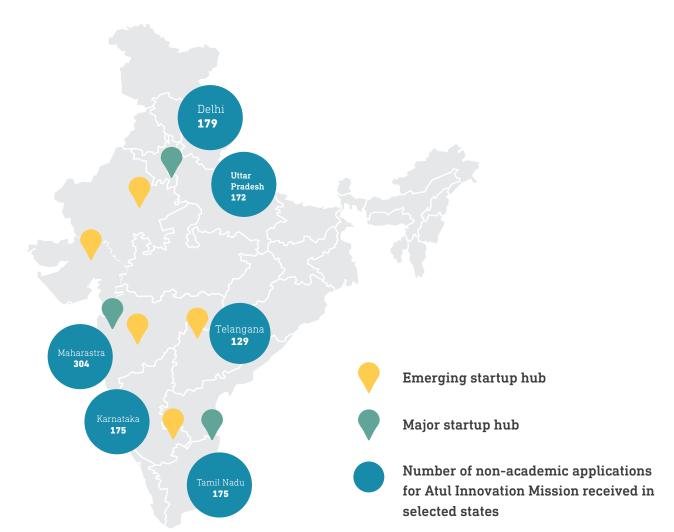


Figure 1.8 Distribution of applications received for Atal Incubation Centres and key startup hubs in India

Source: Niti Aayog, FICCI. Only selected states shown.



"Atal Innovation Mission is a welcome initiative that will enable not just critical institutional support and access to appropriate human capital but, will also help nurture and grow a robust entrepreneurial ecosystem. Some of the better-known incubators in India are hard pressed to consistently produce high-impact startups. Involving successful entrepreneurs to design and guide effective incubator programs may just become necessary.

In the West, technology transfer offices in the academia provide good support in industry engagement and IP commercialisation. FITT always strives to provide end-to-end solutions to industry, innovators and startups in the realm of technology development, IP creation and commercialisation."

- Dr Anil Wali, Foundation for Innovation and Technology Transfer, IIT-Delhi

Nearly half of the applications for the AIM incubation centres were from public and private academic institutions. This could be an important development for growing the ecosystem in India because traditionally startup entrepreneurs come from elite institutions such as IITs and IIMs, whereas in the UK the initial support starts from their universities.

NASSCOM's Startup Landscape 2014 report found that 36% of startup founders in India come from an engineering background and only 6% are women. 48% have work experience with multi-national companies and 73% of founders are less than 36 years of age. According to Bhaskar Majumdar of Unicorn India, the average age of co-founders is higher in the UK than in India. 11

The support for commercialisation need not be restricted to innovations coming out of universities. Given the propensity of founders to start their career at large corporates and be from engineering backgrounds, those companies could themselves actively encourage intrapreneurship alongside industry experts and associations.

But more research is needed here. The government can play an enabling hand to encourage industry associations to conduct surveys and research trends in technology and innovation to determine where the next scaleup opportunities are, and which sectors will offer the greatest promise in the coming decade.

FICCI's involvement in encouraging startups

The FICCI Centre for Innovation, Science & Technology Commercialisation has pioneered unique programmes with the Defence Research and Development Organisation at the Department of Science & Technology, to scout, scan, enable impact producing startups, and then mentor and scale them. The DST-Lockheed Martin India Innovation Growth Programme (IIGP) is now more than ten years old and has evaluated 7,000 startups and supported 400 innovators with product commercialisation, readiness for market, business models, IP rights, competitive positioning and mechanisms for revenue. The cumulative revenue generated by the participating companies is approximately \$860m.

To ensure that the benefits of innovation also benefit the bottom of the pyramid, FICCI, the Technology Development Board and USAID launched the Millennium Alliance in 2011, with the UK's Department for International Development and others joining the initiative subsequently. A \$50m fund was set up for assisting Indian innovations. So far, 62 social enterprises have been supported, with 12 replicating their projects across Africa and Asia and a target of 300-400 to be supported over the course of the scheme.

FICCI is also the implementation partner for a three-year Google India Business Acceleration Programme, which helps to empower startups and the innovation community with digital skills training.

Many of the government's initiatives to promote the startup landscape are ones which FICCI has actively advocated in policy forums and will increase India's ranking in the World Bank's Ease of Doing Business.

Some of these include self-certification, reduced monitoring from tax authorities for three years, an 80% rebate on patent filing fees, a credit guarantee scheme for loans and a simplification of the patent and intellectual property rights schemes.

It is heartening that India has moved fast in certain areas such as accessing startup benefits. A startup can fill in a simple web form on the Startup India website to be recognised as a startup and take advantage of the relevant tax and other benefits. Much of the process relies on self-certification and a recommendation from either an incubator or government department, an existing patent filed in areas affiliated with the business activity or letter of funding.

The initiatives are a good start and reflect a drive from government to expand the ecosystem. They help reach a standardised definition for startups and form part of a move towards single window clearances.

Nevertheless, there are numerous challenges that a startup faces from incorporation through the stages of raising capital, hiring resources, scaling to the final stage of making an exit. Startups generally face high compliance requirements.



"The Indian government can rely on the creativity and drive of their population to bring ideas but they need to incentivise a strong investment ecosystem to translate those ideas into successful businesses."

- Brent Hoberman CBE, Co-Founder, lastminute.com; Co-Founder, Founders' Forum

As an example, although it takes just a few days to open up a bank account in the UK (or on-the-spot, in the case of new market entrant Metro Bank), it can take much longer in India. For foreign corporates, SMEs or startups expanding into India this process can take several months.

There are several options for reducing the compliance burden. Contributions towards employment benefits such as provident fund and employees' state insurance make it harder to recruit and retain good human capital, so the government could support these contributions for a period of 3-5 years. There could be additional assistance from government in the first three years of operations, for example through grants for operating expenses, a fund for capital expenditure or R&D, or a scheme for the reimbursement of Value Added Tax for up to Rs 5m could be considered.

Providing the same generous tax incentives to investors that exist in the UK may be difficult as India's personal and corporate tax base is much smaller, but there could be other measures that can boost the availability of finance, such as improving the treatment of losses for angels, allowing them to write off poorly performing investments for tax purposes, subject to stringent mark-to-market mechanism. Financial institutions could also be encouraged to fund startups, perhaps through specific funds for social entrepreneurship from Public Sector Undertakings, or the expansion of collateral-free or soft lending to startups.

A highly successful approach worth exploring could be the matching model, wherein governments match investments made by Angel and Venture Capital co-investment funds.

Our Recommendations

India has the potential to grow into a global innovation hub. More so than ever before, young people are excited about entering the world of startups, buoyed by the success they see of Flipkart, Snapdeal, Ola and others. The nature of startups launching in India is different from the UK, in that Indian startups focus on addressing the gap faced by end-users in their day-to-day lives.

The UK and India have a strong heritage of doing business together and the two countries share mutual strengths in technology and knowledge-based businesses. As India looks to climb in global ease of doing business rankings and the UK looks east to new markets and trade opportunities through the creation of the new DIT, there is terrific potential to work together.

Startups relocating to London from other markets not only see the UK as a gateway to selling to European markets, but increasingly to US markets too. The Indian government has an active Look East policy as well as deeper engagement in Africa, where startups can use India as a launchpad for international expansion to Asia and Africa.

This research paper has shown clearly that many of the policies responsible for establishing the UK and London in particular as a startup hub have happened in the last 5-6 years. London accounted for one seventh of the UK investment into startups in 2010, a figure that has increased to two-thirds now. To establish such an ecosystem in the backdrop of a recession and significant government budget tightening requires a commitment not only from successive governments but from other actors in the ecosystem.

The lesson for Indian policymakers is that with purpose and determination, India too can grow and nurture such an environment.

Our recommendations therefore are framed as ones which could, if implemented within a similar timeframe, could propel the startup economy in India forward.

RECOMMENDATION 1:

Provide incentives to invest for investors

The tax breaks for angels provided by the UK have been a major factor for making the UK, and London in particular, a global hot-spot for startups.

RECOMMENDATION 2:

Help scaleups, not just startups

Only very few startups will become large enough to generate significant employment and contribute to other government skills-related priorities. The Atul Innovation Mission and city / ecosystem leaders should work with existing private collaborative initiatives to promote the top 50 scale-up companies in their jurisdiction to reach the next phase of their growth.

RECOMMENDATION 3:

Direct funding for publicly funded initiatives on the basis of monitoring and evaluation

Publicly funded initiatives both at central level, such as the Atul Innovation Mission, as well as state, should be compelled to review and report on the impact of their support on Gross Value Added in the economy under their jurisdiction and jobs created, with the aim to accelerate the growth of high-potential startups or scale-ups.

RECOMMENDATION 4:

Create and support role-models

Governments should draw attention to startup leaders and their companies across the country, particularly those with large potential for job creation, which would make it easier for them to act as role models for others. It would also make it easier for them to find customers and investors both in India and abroad. The government should take technology scale-up focused trade delegations to innovation hubs around the world and seek successful outcomes from such delegations to include Memoranda of Understanding between Indian and foreign incubators and accelerators.

RECOMMENDATION 5:

Government and industry should expand their support for existing private collaborative schemes to find, support and nurture startups

Corporates can act as hotbeds for co-creation with startups, provide market opportunities through procurement and encourage a wider culture of intrapreneurship. Governments can promote direct procurement from startups approved on the Startup India website. In the UK, companies such as Microsoft, Telefonica and Barclays already run successful incubation programmes

RECOMMENDATION 6:

Government and industry should ensure the infrastructure that startups and scaleups need is catered for

Even in established startup hubs, fast internet, reliable electricity and water, good transport links and the avoidance of city-wide strikes are factors hampering growth. There should be a coordinated focus on reducing such impediments.

RECOMMENDATION 7:

UK Government should commission a report looking at the specific help the UK ecosystem could provide

While there are a number of bilateral private sector initiatives already, the UK could formally work with experts and business organisations to conduct a state-by-state assessment of where the UK could work with Indian state and central governments, as well as existing private incubators and accelerators.

