IITM’s Rural Technology and Business Incubator

ANNUAL REPORT 2012
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Rural Technology and Business Incubator (RTBI) of IIT Madras is now beginning its 7th year in journey. For an organization, this is time enough to have matured. It certainly shows early indications of having done that. Its all women leadership is very young, but ready to learn quickly. Lakshmi Vaidyanathan, the Director, and Suma Prashant, the Deputy Director, supported by Seenivasan R., heading Administration and Accounts, are committed to build a strong and independent incubator. The Management Council has Sudha Raj, Jayalakshmi Umadikar, Rashmi Chinchanikar and Thenmozhi Shanmugham, all willing to work hard to take RTBI a notch up. The key will be leadership cohesion, as the organization ponders over each person's role and responsibilities. They have in them to build an incubator at IIT, which would make a difference.

RTBI is an incubator with a difference. It aims to incubate companies, which are focused on Rural India and on the disadvantaged section of the society. Naturally this is a difficult task; especially as the concept of incubation itself is new to IIT and to India. Given this, RTBI has done rather well over the last six years, having incubated 25 companies out of which only 3 companies have been unable to survive. The last year has been particularly good, as 6 companies were incubated. At the same time its exploratory ventures and venture in making have done well. RTBI's agricultural work has invited the attention of Government of Tamil Nadu, which is using RTBI's work to initially reach 3 lakh farmers in the State and aspires to scale services to the farmers across the State. Its work on health has acquired excellent partners in the National Institute for Research in Tuberculosis (NIRT) and Infectious Disease Training and Research Centre (IDTRC) in Christian Medical College Vellore and sponsorship from Ford Motor Company. It has launched a portal called Village on the Web to enable rural products to be made available in urban India through web and mobile phones. The challenge lies in converting these exploratory works into successful ventures.
The financial sustainability of an incubator associated with an educational institute in the Indian context has not yet been proven. Being one of the most successful incubators and having the legacy of TeNeT, the first group to incubate companies in an Indian institute, one would expect RTBI to be the first to show the way towards financial sustainability. This will indeed be a challenge for the young management. But such challenges have been known to bring out the best amongst youngsters.

Yet another challenge would be to integrate itself better into IIT's fold. So far, it has remained somewhat apart, with only a few faculty members playing a significant role in RTBI. Over the next few years, it has to capture the imagination of IIT's students, staff and faculty.

Last, but probably the most important, will be RTBI's task in providing better support to its incubated companies. The mentorship, the support and the environment that it provides to these newly incubated companies needs to be continuously strengthened. The task is very much like parenting. Right after birth, the company will require all the necessary care and support. During its childhood, its innocence and the uninhibited desire to learn and explore has to be fully leveraged to help it innovate with technology, business and organization. Its youth will bring up dreams and at the same time an immense urge to become independent; at this stage, the incubator has to be fully prepared to let go. Soon a mature independent young company will emerge; the incubator's task will now be to assist, watch and enjoy the company's scaling efforts. The only difference is that for an incubated company the time scale for growing up is not 17 years but anything from 18 to 36 months. The incubator does not have an opportunity to make mistakes and correct.

RTBI's destiny is to be a pioneer in incubation in India. Its leadership has to take the challenge.

Ashok Jhunjhunwala
Mission

RTBI’s mission is to design, pilot and incubate scalable business ventures with a rural focus. As an Incubator, it facilitates rural-inclusive technology and business innovation in India. Significantly it provides mentorship, funding, and an incubation eco-system suitable to entrepreneurs at any phase in their venture, including the early stage of ideation and conceptualization.

Overview

IIT Madras’ Rural Technology and Business Incubator (RTBI) is registered as a not-for-profit society on the 16, Oct 2006. Established as a formal business incubator with the inception support of the Department of Science and Technology (DST), Government of India and World Bank’s Infodev arm, the aim of RTBI is to support rural and social inclusive start-ups, primarily those that enable scalable products and services for the under-served and bottom-of-the-pyramid segment. Business incubation is seen as the strategy to enable capacity building, livelihood generation and enablement of relevant services and products for the underserved sector.

The methodology is 2 pronged:

**Incubation:** Identifying ways and means to strengthen entrepreneurs with business models for innovative, low-cost and relevant products and services. A company with a successful business model is a sure way to inspire similar companies.

**Exploration:** Developing depth and understanding of the underserved segment by sustained efforts (including a variety of independently funded initiatives) via grass root trials (involving technology creation, business modeling, service design, etc.) such as in areas like financial inclusion, energy, education, agriculture, healthcare, rural e-commerce, rural distributed production systems etc.

The aim is also to see whether viable grass root explorations could evolve sustainable and scalable business models that can eventually translate into incubations and replicable with positive impact.
The target group for RTBI is ideally social entrepreneurs in the selected expertise areas, the intention being that strengthening and supporting these individuals in their start-up aims would enable having a larger and cascading impact on the ultimate targeted beneficiary segment of the rural and underserved populace. Currently, there are over 22 companies in RTBI’s portfolio in diverse areas such as speech and mobility solutions, solar energy for home lighting, IT for diary management, packaging and marketing of organic food, using the mobile as a tool for education, etc. There are two kinds of potential target beneficiaries: One group consisting of beneficiaries via RTBI’s incubatees in terms of the product, service or livelihood impact. (For example, a family with no electricity source, that uses InteliZon’s solar energy lighting solution instead). And then a much smaller number who are direct beneficiaries by virtue of being part of a grassroots project implementation trial.

Though RTBI’s work focuses on India, the technologies, business models and social learnings from RTBI’s work have significant applicability to many of the underdeveloped and under-served communities across the globe.
OVERVIEW

RTBI's core mission is to identify, nurture and support Rural / Social inclusive startups and young entrepreneurs aspiring to evolve rural and social inclusive business models. Established in the year 2006, RTBI with its proximity to IIT Madras, seeks to enable design, development and deployment of innovative low cost technology solutions. Business incubation is the strategy and methodology for rural and social development by impacting capacity building, income generation and enablement of services.

The RTBI Incubation Pathway is a mechanism we have designed that enables tracking of the particular stage in which our client Incubatee enters, progresses and exits. Entry into the pathway is verified to be in alignment with the broad RTBI goals, incubator’s capacity and capability. Progress along the pathway is further monitored through reviews, budgetary frameworks, reports, and other triggers that are milestones on the pathway.

Functionally, RTBI’s two teams handle very diverse and highly specialized functions, The Incubation team handles planning, selection, management, funding, services and decisions related to incubatee selection and the Exploratory team handles the coordination, planning, research, management and delivery of initiatives related to specific exploratory initiatives.

A core Management and Administrative Council has been set up to assist in the organizational planning, policy, decision making and functioning of the Incubator. The Council meetings are held twice a month.

The RTBI Board meets twice annually to discuss the financials and sources of revenue of the Incubator and assesses the overall progress of its incubatees and plans on achieving sustainability of the Incubator as a whole.

Ten meetings of the RTBI Board have been conducted as on March 31st, 2012 on:

2. July 22, 2007
3. Feb 25, 2008
5. Mar 12, 2009
6. Sep 01, 2009
7. Apr 14, 2010
8. Sep 30, 2010
9. April 6, 2011
10. Sep 5, 2011
As on date, the total number of companies incubated at RTBI and their status is as follows:

<table>
<thead>
<tr>
<th>No.</th>
<th>Initiatives</th>
<th>Brief</th>
<th>Status</th>
<th>Year</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>DesiCrew Solutions P. Ltd.</td>
<td>Desi Rural BPO</td>
<td>In Progress</td>
<td>2006</td>
</tr>
<tr>
<td>2.</td>
<td>ROPE Enterprise P. Ltd.</td>
<td>Natural Fiber Life-style Products</td>
<td>In Progress</td>
<td>2007</td>
</tr>
<tr>
<td>5.</td>
<td>ejeevika HR P. Ltd.</td>
<td>Vocational Training</td>
<td>In Progress</td>
<td>2007</td>
</tr>
<tr>
<td>6.</td>
<td>AAUM Research and Analytics Pvt. Ltd.</td>
<td>Data Analytics for rural markets and consumers</td>
<td>In Progress</td>
<td>2008</td>
</tr>
<tr>
<td>8.</td>
<td>Invention Labs Engineering Products P. Ltd.</td>
<td>Mechatronics based India centric Technology Design Services</td>
<td>In Progress</td>
<td>2008</td>
</tr>
<tr>
<td>10.</td>
<td>Augurtron</td>
<td>Embedded Solutions for rural markets</td>
<td>In Progress</td>
<td>2009</td>
</tr>
<tr>
<td>11.</td>
<td>ET Interactive Design P. Ltd.</td>
<td>Design/Branding assistance to Rural artisans</td>
<td>In Progress</td>
<td>2009</td>
</tr>
<tr>
<td>13.</td>
<td>ayzh Health &amp; Livelihood Solutions P. Ltd.</td>
<td>Birthing Kits and women centric solutions</td>
<td>In Progress</td>
<td>2009</td>
</tr>
<tr>
<td>15.</td>
<td>MobiTrain Knowledge Services P. Ltd.</td>
<td>Mobile based training platform</td>
<td>In Progress</td>
<td>2011</td>
</tr>
<tr>
<td>17.</td>
<td>Phoenix Online Power Packer P. Ltd</td>
<td>Supports Rural SME's Search Engine Optimization and Web Design &amp; Applications</td>
<td>In Progress</td>
<td>2011</td>
</tr>
<tr>
<td>18.</td>
<td>Stellapps Technologies P. Ltd.</td>
<td>ICT enabled livestock management processes</td>
<td>In Progress</td>
<td>2011</td>
</tr>
<tr>
<td>21.</td>
<td>Edutor Technologies India P. Ltd.</td>
<td>Learning solutions on generic table platform including Akash for class room and at home - leveraging the cloud as an enabler.</td>
<td>In Progress</td>
<td>2012</td>
</tr>
<tr>
<td>23.</td>
<td>Transmete Solutions</td>
<td>Wireless last mile</td>
<td>Closed</td>
<td>2008</td>
</tr>
<tr>
<td>24.</td>
<td>Samvit Educational services P. Ltd.</td>
<td>Learning Management System for teaching, learning and evaluation</td>
<td>Closed</td>
<td>2009</td>
</tr>
<tr>
<td>25.</td>
<td>India Khelo Communications Pvt. Ltd</td>
<td>Identifying and nurturing local sports and talents</td>
<td>Closed</td>
<td>2009</td>
</tr>
</tbody>
</table>
THE RTBI INCUBATION PATHWAY

The different stages of Startup Lifecycle of Ideation, Innovation and Execution are defined and captured in the RTBI incubation pathway. RTBI has classified the different stages as Exploratory Phase, Venture in the making phase, Early Stage venture and Graduated Venture.

RTBI Incubation Pathway

Exploratory Phase
- Exploration
- Venture in Making
- Early stage Venture
- Graduation from Incubator

The RTBI Incubation Process Pathway visualizes incubatees entering in at any of the following 3 stages in their journey of creating and establishing a scalable startup company:

Exploratory Phase
The initial phase before formal incubation when the business plan and revenue model is not clear. This phase is a crucial learning phase for understanding the rural space since businesses attempting to operate in this area often have no reference points and past experiences to leverage. As path breakers, trial and errors and early modeling is enabled in this phase.

Venture-in-Making Phase:
This is the phase when the business models are evolving and early business planning can be attempted. An early company identity starts to emerge and initial clients are acquired.

Early Stage Venture
The venture now has developed significant certainty in the viability of its business plan and business model and it is entrepreneur has greater confidence to continue the venture until eventual graduation from the incubator.

Graduated Venture
The venture has reached a stage where the team, the business model, the client base and the revenues (of at least 1+ Crore) have come together. It is now up to the company to decide its road map and scale further.
ENTREPRENEUR SELECTION PROCESS

Selection Criteria

The main criterion for the selection is a basic willingness to work with technology, a commitment to social enterprise and development and finally the thirst to make a difference in the making of India a better place to live in. The selection procedure has been made available on the RTBI website and is briefly outlined.

Around 5-7 meritorious ideas and entrepreneurs aligned to the goals of the Incubator are selected every year. Some of these candidates have been exposed to the work being done by the TeNeT Group or youth who have heard Professor Ashok Jhunjhunwala share his vision for development at a public forum.

There are others who have heard of RTBI in entrepreneurship forums and are often interested in technology innovations and applications. With the website enhanced to allow potential incubatees and interested members to send in applications, there is an increase in the number of applicants having no prior contact or interactions with IITM/faculty exposure as well.

RTBI is also aiming at reaching out to aspiring students from various educational institutions across the country using networks such as The Indus Entrepreneurs (TiE) and major IIT campus events.

After an initial screening of the potential candidate by the Admin Council at RTBI, the Chairman conducts a face-to-face interview and the next steps are as per the flow chart below:
SERVICES PORTFOLIO

The institution provides access to the academic library and other on-campus facilities and the Industrial Consultancy Division of the Institute as well as the professional expertise and other business and technical resources of senior faculty members at IITM as an in-kind contribution.

Student Interns are also available from different departments for various projects from time to time. Highly subsidized conference and guest house facilities are also available to RTBI through its host institution.

Formal interactions with IITM events such as with Genesis, the IITM business plan competition and informal interactions with other rural initiatives such as RuTAG (Rural Technology and Action Group), SRP (Socially Responsible Projects), LRAMP (Lemelson Foundation’s initiative to support grass roots innovation), etc. have been initiated.

RTBI has also leveraged the host institution IIT Madras in jointly organizing an important workshop for assigning rural technology needs. IITM further provided a platform to show case RTBI and Incubation as well as some of our incubatees in the recent PAN-IIT Forum.

Advice and Mentoring

- RTBI surrounds you with incredibly proven mentors. Startups get great advice on their vision, products and strategy, ensuring the best possible start towards success.

Infrastructure

- RTBI is currently housed within IIT-Madras, so world-class technologists and academicians are mere footsteps away
- Air-conditioned office space (nearly 2000 sq. ft. for RTBI plus nearly 1500 sq. ft. for startup clients) including network access and connectivity and an uninterrupted electricity and water facility is provided by IITM
- Customized HRM tool
- Company structuring & Legal Advice.
- In-house IPR services.
Connections

- Startups have unfettered access to top-notch resources (including seasoned entrepreneurs and investors)

Finance

- Seed capital
- Mobilizing finances through banks / venture capitalists / Angel Investors
- Linkages to other internal/external financiers

Services Offered

RTBI has actively performed and supports in all of the following activities:

- Business model planning
- Mentoring - Strategy / Technology mentorship
- Joint Technology / Prototype development
- Initial rural linkages and pilot launch
- IPR services & Accounting services
- Funding avenues through Agencies / venture capitalists/ Angel Investors
- Networking Platforms, Linkages with public/private funding bodies
ENABLING FUNDING ASSISTANCES

TECHNOLOGY DEVELOPMENT BOARD (TDB):

RTBI conducted 3rd PMC Committee Meet on the 30th March 2012, wherein 4 projects for an amount of Rs.70 lakhs were recommended.

RTBI received in-principal sanction for Rs.70 lakhs, out of the total sanction amount of Rs.100 lakhs, and disbursed to the following incubatees:

<table>
<thead>
<tr>
<th>Name of the incubatees</th>
<th>Amount disbursed</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rope Enterprises Pvt Ltd</td>
<td>Rs. 8 lakhs</td>
</tr>
<tr>
<td>Invention Labs Engg (P) Ltd</td>
<td>Rs. 25 lakhs</td>
</tr>
<tr>
<td>Uniphore Software Systems Pvt Ltd</td>
<td>Rs. 22 lakhs</td>
</tr>
<tr>
<td>Microspin Machine Works Pvt Ltd</td>
<td>Rs. 22 lakhs</td>
</tr>
<tr>
<td>Stellapps Technologies Pvt Ltd</td>
<td>Rs. 23 lakhs</td>
</tr>
</tbody>
</table>

Rs.1 crore funding support received has been successfully disbursed.

MICRO SMALL MEDIUM ENTERPRISES (MSME):

RTBI conducted the 3rd Sub Committee Meet on 2nd March 2012 wherein 4 projects were recommended for an amount of Rs.32.88 lakhs and received in-principal sanction for 2 projects, Newdigm Healthcare Technologies Pvt Ltd and Unclassroom Learning India Pvt Ltd, for an amount of Rs.12.50 lakhs along with infrastructure development charges to Incubator Rs.70K.

DEPARTMENT OF INFORMATION TECHNOLOGY:

RTBI has received in-principal sanction of Rs.40 lakhs in the first sanction released out of Rs.1.55 crore, the balance of Rs.1.15 lakhs is pending for release. The Validity of the scheme is for 1 year and 9 months, i.e up to 31st March 2014. RTBI has laid down process and procedures to disburse Rs.32.50 lakhs during the month of October 2012, the balance amount of Rs.7.50 lakhs is towards infrastructure development.
RTBI as an Incubator has evolved its model of incubation with learnings gained over the last 6 years, just as has the country’s startup ecosystem changed with a growing number of entrepreneurship ecosystems enablers, business plan contests, accelerators, seed-camps, and entrepreneurship summits.

Sustainability of an incubator ties in strongly with the value creation of the incubator and its ability to continue achieving positive cash flows. To make this happen, our challenge lies in leveraging our entrepreneurial support potential towards building a much larger entrepreneurial ecosystem, making RTBI and Chennai as a whole an entrepreneurial hub. This we must do by enabling suitable marketing channels and entering into partnerships that can work coherently with other ecosystem enablers such as idea generators (e.g., power of ideas), accelerators, startup showcase and venture forums, technology forums, innovation forums, etc. for both scaling up our incubatees as well as going beyond that.

There is a strong need for aligning the access and interaction between successful, passionate mentors and young incubatees to enable leveraging past experiences and expertise towards improving the success rate of startups at national and global levels. Having said that, identification of like-minded individuals who would support RTBI’s unique vision as well as always maintain the best interests of the adopted incubatee is a challenge we need to address.

Availability of early stage funding to bridge the gap before mainstream Venture Capital investment can impact significantly the growth of startups. Enabling these funding avenues for both our incubatees and startups in general is an opportunity space that RTBI hopes can be addressed.

Further, unique to RTBI is the challenge of aligning exploratory work to incubation in ways that can powerfully enable the creation of incubations in grassroots areas such as agriculture, technology commercialization from internal research initiatives, co-aligning interested incubatees in areas of exploratory work towards better interaction and cross leveraging, etc.

We clearly plan to have our hands full the year ahead.
<table>
<thead>
<tr>
<th>Incubatee</th>
<th>Name</th>
</tr>
</thead>
<tbody>
<tr>
<td>17</td>
<td>DesiCrew</td>
</tr>
<tr>
<td>18</td>
<td>ROPE</td>
</tr>
<tr>
<td>19</td>
<td>Uniphore</td>
</tr>
<tr>
<td>20</td>
<td>Intelizon</td>
</tr>
<tr>
<td>21</td>
<td>eJeevika</td>
</tr>
<tr>
<td>22</td>
<td>Aaum</td>
</tr>
<tr>
<td>23</td>
<td>Arogyam</td>
</tr>
<tr>
<td>24</td>
<td>Invention Labs</td>
</tr>
<tr>
<td>25</td>
<td>Vastra</td>
</tr>
<tr>
<td>26</td>
<td>Augurtron</td>
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<tr>
<td>27</td>
<td>ET Interactive</td>
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<td>28</td>
<td>Trayi</td>
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<td>29</td>
<td>ayzh</td>
</tr>
<tr>
<td>30</td>
<td>Microspin</td>
</tr>
<tr>
<td>31</td>
<td>MobilTrain</td>
</tr>
<tr>
<td>32</td>
<td>Newdigm</td>
</tr>
<tr>
<td>33</td>
<td>Phoenix</td>
</tr>
<tr>
<td>34</td>
<td>Stellapps</td>
</tr>
<tr>
<td>35</td>
<td>UnClassroom</td>
</tr>
<tr>
<td>36</td>
<td>Swayambhu</td>
</tr>
<tr>
<td>37</td>
<td>Edutor</td>
</tr>
<tr>
<td>38</td>
<td>Mego</td>
</tr>
</tbody>
</table>
DesiCrew Solutions is a rural BPO company, pioneering a new vision for stimulating inclusive growth in India. With a decentralized business model providing competitive outsourcing solutions to clients and meaningful employment opportunities in rural areas, we have established a technology driven, profit making social enterprise.

**Services Offered**

Digitalization, HR process support, Transcription, Localization, Secondary Research, designing e-learning content are some of the services we offer to clients. We have contributed to over 40% cost savings for our existing clients. Our performance has also proved the efficacy of rural BPOs in being able to handle a lot more than just low-end data entry work.

**Our People**

Employment at DesiCrew makes a significant impact on the lives of its employees and their families. 60% of our staff are women. We have had happy stories of our employees being able to fund their education, support their family and make a positive change to their lifestyles. DesiCrew recruits local candidates, thereby helping create wealth within the community, by the members of the community.

**Management Team**

Ramesh Maganti joined DesiCrew as the CEO in October ‘11. Ramesh has been a serial entrepreneur with early stage involvement in scaling three technology start-ups.

Manivannan J.K is the COO. An alumnus of Anna University and IIM Bangalore, he was largely instrumental in implementing GramIT – the rural BPO initiative of Byrraju Foundation.

Janardhan.N, a Chartered Accountant with over 23 years of experience across Automobile, Telecom & Retail Finance companies, joined DesiCrew as the CFO in April 2012.
Rope International provides consumers with world-class home décor and designer home furnishing products made by highly skilled rural artisans using cutting edge design and natural materials. Rope's customers in India and around the world are retailers catering to discerning consumers of high quality, well-designed, natural fiber products.

Rope's manufacturing facilities are located in rural Tamil Nadu, where over 1,000 rural artisans work, producing products designed in-house. With a portfolio of over 1,000 designs, Rope is the leading producer of such products in India. Rope's mission is also to provide sustainable livelihoods to these rural artisans, increasing their family incomes of artisans while providing dependable employment, insurance and provident fund contributions. Rope has impacted several thousand families in the last five years of its existence. Building on its successes and experiences, Rope is now fast expanding its reach within India and abroad, diversifying its product portfolio.

Rope has developed a scalable, hub and spoke based rural production model, which provide skills and create local employment opportunities for hitherto un-skilled or semi-skilled rural population, especially women.

The team at ROPE consists of Sreejith, Co-founder and Managing Director, Patrick Fischer, Co-founder and Director, and aided by a strong and diverse advisory board constituting Dr. Ashok Jhunjhunwala, Dr. Aarti Kawlra, Mr. Sateesh Andra and Mr. Paul Basil.

Rope was selected as one of the top 25 Social Enterprises of India by Outlook Business in 2011. ROPE was also awarded India’s second most promising enterprise award by Business World weekly in May 2009. ROPE won the YES award for best business model using ICT by YES systems.
Uniphore uses revolutionary speech technologies to give companies complete mobility - empowering them to connect with customers and conduct business through any mobile phone, 24 x 7, online or offline, and in any language. With Multilingual Speech Recognition and Voice Biometrics, we develop and deliver mobile solutions to enable:

**Enterprise Mobility:** data collection, new customer acquisition, agent/customer servicing, sales and supply-chain management, and multi-lingual content delivery

**Financial Services:** conduct banking and commercial transactions using any basic mobile phone

**Value Added Services:** customized Speech-based VAS applications to enhance business operations and offerings

Started in 2008 with incubation support at IIT-M’s Rural Technology and Business Incubator, Uniphore's technologies are already being used by a half million end users. Customers across industries recognize the unique ability of speech technology to give them total mobility, while enhancing their service delivery, increasing their efficiency, and reducing their costs.
Intelizon is focused on using state of the art optical, electronic and firmware technology for creating affordable energy-efficient products for the rural and semi-urban markets.

Intelizon was founded by Dr. Kushant Uppal who spent over 15 years developing leading technology products and businesses in Silicon Valley, California. He has incubated and managed multiple businesses with sales upwards of Rs.1000 Million and has deep experience in manufacturing, R&D and marketing. In 2006, Dr. Kushant ventured to create energy efficient products which would have tremendous rural market potential.

Intelizon currently has 20 employees, and a further 20 assemblers with outsourcing partners, creating our products. We grew from Rs.1 crore of sales in FY11 to Rs.2.5 crores in FY12. Products sold under the Nippo brand have been streamlined to the LED bulb and lantern systems. We are in discussions with Sukam and Crompton to launch products under their brand. We have received equity investments of over 4 crore from Venture East and Emergic Capital as well as a Rs. 90 lakh loan from ICICI and an Rs. 30 lakh loan from TDB to date.

Kushant has an MS and PhD in materials science from University of Southern California and a B-tech from IIT Madras. The company was incorporated in February 2007 and has a 5 member strong R&D team, 5 members focused on sales, 7 in operations and 3 in administrations.

Some among the Intelizon products Zon Light, Zon Street, Zonbulb and Zon home are below,

Intelizon has received several recognition which includes Finalist on Red Herring Asia in 2010, Finalist at Sankalp 2009 and as India’s Hottest Start-Up by Business Today, March 2009.
“eJeevika Human Resources Pvt. Limited” is an enterprise that aims to provide Vocational Training Solutions to the various Govt. and Industry bodies. eJeevika leverages the ICT infrastructure of the country and connects the various ends of the value chain of the Vocational Training ecosystem. eJeevika has been incubated at IITM’s Rural Technology and Business Incubator (RTBI) in 2007. eJeevika’s service offerings are listed below:

**Creation of Employability Courses:** eJeevika has been running blended learning courses on Microsoft office, English Speaking, and Basic Corporate Etiquette in its centers. It has created e-Learning and Classroom based courses for prestigious organizations like the State Bank of India, Nimmi-DGET, Tamilnadu Regional Institutes, Titan, Cholamandalam, NIS Sparta to name a few. eJeevika specialises in creating Multiple language courses targeting the 'Desi' youth from 'Bharat'.

Richa Pandey Mishra, Founder and CEO, brings in 8 years of Sales and Marketing experience with various Print Media groups of the country. eJeevika is in early stage of revenue generation, has received seed funding of Rs. 5 Lakhs and an MSMF fund of Rs. 6.25 Lakhs. It has also secured a soft loan of Rs. 1.5 Lakh from Villgro Foundation.

**Sector Specific Course Delivery**

- Skill Gap Studies - District Level
  In Cuddalore, Thiruvalluvar and Kanchipuram District, TN

- Categorized Data Base of
  Job Seekers - District Level

- Network of Training Delivery Partner’s District Level

- Network of Placement Partner’s District Level

**Vocational Training Eco systems-Innovative Solution Provider-End to End**
Aaum Research
and Analytics Pvt. Ltd.

Aaum Research and Analytics Private Limited (Aaum) founded by IIT Madras alumnus with extensive experiences working with Fortune 100 companies in the North America and Asia Pacific. Incubated at RTBI with a focus on researching and devising sophisticated analytical techniques to solve pressing business needs of corporations, government and NGOs, Aaum Research and Analytics offers three lines of business;

- **Advanced analytics** - Building appropriate statistical models through which clients can measure and grow their business.

- **Competitive intelligence** - Provide actionable insights to clients for their business excellence.

- **Livelihood** - Perform livelihood services ranging from promotion of livelihoods, implementation services, livelihood and feasibility studies.

**Competitive Advantage** – Advanced analytics, Predictive analytics, Rural analytics

### A few accomplishments

1. Partnership with Actuate to provide end-to-end Analytical/BI solutions to international markets. The alliance creates new market opportunities for Aaum and enhances its presence in US and other countries where the market demand is increasing rapidly.

2. The company is working on a first of a kind 'credit scoring' initiative for rural Self Help Groups supported by NABARD with pilots in Thiruvallur and Virudhunagar districts. The founder envisions this initiative to become a credit bureau initiative in the next 2 years.

Rajesh Kumar, our founder, is an entrepreneur with robust experience in project management, quantitative and qualitative data analysis, business intelligence and process consulting with Fortune 100 organizations. He has a B.Tech in Mechanical Engineering from IIT Madras and MBA from IIT Kanpur. Professor Dr. Ashok Jhunjhunwala (IIT Madras), Mr. Puneet Gupta(IFMR Mezzanine Finance) and Professor Prakash Sai (IIT Madras) constitute Aaum’s advisory board.
Arogyam Organics private limited was founded with a vision to make organic certified products available to Tier-2 and Tier-3 cities, as most of the certified organic food products are exported and availability in local market is almost negligible. Arogyam Organics is marketing the certified Organic food products under the brand name of “Bhojanam” and traditional varieties under the brand name of “Paarambharyam”.

Under “Bhojanam” brand, AOPL has 65 categories of products and “Paarambharyam” has 12 categories of products. AOPL’s two brands have been recognized as the leading brands in Organic market for clean, processed high quality organic products sourced directly from the farmers, hence streamlining the supply chain without middle men costs involved. Hence AOPL aims to supply at a better price than most of the competitors in the segment and pass on the savings directly to producers towards getting a maximum output for their farm products.

For the first time in India AOPL has produced and marketed ADT-43 Paddy certified seeds with Organic certification. Seeraga Samba, a popular and scented traditional Paddy variety (whose seeds were only exchanged by farmers) has been made commercially available by AOPL.

AOPL was incorporated and incubated at RTBI in 2008 and started full time operation in February 2010. AOPL has raised an investment of Rs. 26 Lakhs from RTBI, Villgro foundation and individual investors. The company has formed a network of 6 franchises, 24 retail outlets and 4 bulk traders. AOPL has a storage facility with a capability to store 12,000 MT to handle heavy production requirements.

AOPL is founded by Arumugasamy, Founder and CEO, who has secured a Diploma in Agriculture from Gandhigram University and an M.A. from Annamalai University. He brings in his strong procurement experience in Madras Fertilizers Pvt. Ltd., Sincere Plantation Ltd. as first field officer at CIKS continuing on for 13 years, he held the important role of Program Director before spinning off AOPL. Arumugasamy has authored more than 60 books, CDs and Manuals on organic farming.
Invention Labs Engineering Products Pvt. Ltd.

Invention Labs was founded by Mr. Ajit Narayanan, Chairman and CEO, in year 2007 with an initial seed fund of Rs. 2.5 Lakhs from RTBI. Ajit is an alumnus from IIT Madras with an M.Tech in Electrical Engineering.

Invention Labs has developed Avaz, an augmentative speech synthesizer, alternative communicative device for the voice impaired and Cerebral Palsy affect children. Avaz won the prestigious MIT Technology Review Award for the year 2011. Ajit was named “Innovator of the year 2011” from India.

Invention Labs have launched Avaz application on Apple's iPad platform this year and will be available as downloadable software for iPads around the world. The initial feedback has been positive. They are also working on launching Danish version of Avaz shortly to tap the potential market in Denmark, which does not have a product of this kind.

In step with the company's growth in business, the company is building their Intellectual capital assets, with a 30% increase in head-count since last year.
Vastra - Custom Attire (INDIA) Pvt. Ltd.

Vastra- Custom Attire (INDIA) Pvt Ltd is an initiative in distributed garment production started first in rural and urban Tamil Nadu. Vastra works with Self Help Groups who are trained for tailoring garments and customized institutional wear as per the requisite quality standard. Vastra augments the training further thereby providing the finest quality stitched garments.

Incepted in the year 2009, Vastra is engaged in manufacturing and supplying of Customized uniforms which cater to the needs of Schools, Hospitals, Factories, Restaurants, Security guards and Buying-Houses. Within a short period of time, Vastra has carved a niche by way of its range of specialized garments and institutional wear.

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Augurtron provides High-End Embedded Technology Product Engineering through research, development and productization in the Audio-video, Networking and Platform domains. With the aim to be a world class company in the Embedded Technology Domain, Augurtron was incubated at RTBI in 2009. Augurtron offers services as complete Turnkey solutions from Concept to Product, and through technology partnerships on a consultancy basis.

Augurtron has filed two technology patents in joint work collaborated with RTBI and generated revenues of Rs. 26 Lakhs in the financial year ending 2011-12. The company services benefits technology companies, consumer product companies and research organizations.

Originally operating as Augur Systems, a proprietorship company since its incubation in 2009, has recently registered and incorporated as a private limited company in 2011. Augurtron has received grant funding from the Ministry of Small and Medium Enterprises for about Rs. 5.5 lakhs in 2010. Currently, the company is 6 members strong.

Padmalakshmi Shankar, the founder of Augurtron, comes with a deep system understanding on wide technology areas and has pioneered many successful products and solutions in her career span of 15 years. As a founding member and earlier Product Head of Novatium Solutions, she was responsible for churning out products on various embedded platforms from concept to production. Prior to Augurtron and Novatium Solutions, she has worked at Polaris Software Labs, Reliance Petroleum Ltd and Midas Communications. Her long association with TeNet group at IIT Madras has led to many innovative initiatives.

The Augurtron team brings in passion for technology. Their diverse experiences are in the field of embedded firmware porting, application design, user interfaces, DSP programming and ARM/DSP integrations, media frameworks.
ÉT Interactive Design Pvt. Ltd.

Founded in late 2009, ét is a dedicated Design consultancy firm working with the Indian craftsmen & Artisans. Led by two professional designers Robin Mathew & Ruhi Munjial, The Company was established with the prime motto of upliftment of rural crafts.

The Company has been proactively working with government agencies and private companies for providing a new dimension to rural products. The experienced team of designers and product innovators have left a mark of the craft clusters around the country like Tripura Bamboo, Agartala, Weaving Clusters, Karur, Tamil Nadu, Carpet weaving, Madurai, Tamil Nadu, Juti making in Punjab etc.

The company also has an extension serving to private clientele with Design & Sourcing services. The company has established themselves as a leading service provider to various Indian and international lifestyle brands like Nike, Westside, SG Cricket, Wildcraft, Indian Terrain, The Loot etc.

In extension to this the company has recently launched a brand of Contemporary, Designer Craft Products under the brand name “The Desi Theory.” The brand caters as a retail platform to craft clusters and is being retailed through high-end boutiques and undertaking corporate bookings.
Trayi founded by Narasimma Prasad develops research-based learning solutions that optimize the individual learning styles of the students. The goal is to help students in rural areas to develop persistence, positive self-concept and resilience to attain success in academic and personal life. With the above goal in focus, Trayi works on changing the culture of classroom-learning by developing products which fosters effective learning strategies and innovative pedagogies through the use of ICT.

Languagementor.in is a flagship product, an English language acquisition process which has been crafted based on the promoters’ experience in working with the students from rural campuses and follows a research-based approach and systems to Web-based language acquisition process.

Interactive Learning model comprises of Four Levels of English course, each level between 84 – 104 hours Six months to complete each level. Blended learning – 60% WBT and 40% ILT (Instructor Led Training) Curriculum design is based on students levels ILT Session (Instructor led training) for oral, group and game activities Computer based training for listening, vocabulary enhancement.

Trayi has an employee head count of 7 and has received incubation support including a seed fund of Rs. 4.5 lakhs in 2011.
Life saving ~ Life changing.
Health and Livelihood Solutions for Rural Women

THE CHALLENGE: Millions of pregnant women each year go into labour without a safe and sterile birthing environment. As a result, many women are exposed to debilitating infections, a leading cause of maternal and infant mortality.

THE SOLUTION: ayzh offers low-cost, high-quality health products designed and assembled for women by women in rural regions. We give our target beneficiaries (underprivileged women worldwide) economic opportunity while introducing healthy, life-saving products to a large, untapped market.

PRODUCT: ayzh’s flagship product, JANMA, is a $2 clean birth kit that prevents infection at childbirth reducing maternal and infant mortality. Additional products under development include: a newborn kit, a post-partum hemorrhage kit, and a groundbreaking menstrual hygiene solution for women.

COMPETITION: Few companies have been able to create affordable, quality products that rural markets want and are able to afford. ayzh has developed a core set of customers, usually neglected, and serves them with products designed specifically to meet their needs.

MILESTONES: ayzh has sold 15,000 JANMA clean birth kits to date; has orders for 60,000 more over the next 8 months with strong interest from Africa and has secured funding to pilot its second product SHISHU – new born kit.

Social Impact
To date, approximately 50,000 people in India, Haiti, and Ghana have been positively impacted by the use of ayzh products, and we expect to impact 25 million by 2015.

Awards & Associations
Echoing Green (2012); Index Award (2011); D-Lab, MIT (2011); World Health Care Congress (2011); Ashoka Changemakers (2010); Clinton Global Initiative (2010); Maternal Health Task Force, Harvard (2010); TED (2009)
MicroSpin Machine Works
Pvt. Ltd.

Microspin Machine Works (MMW) was incubated and incorporated in April 2011, and founded by L Kannan and S S Krishnakumar. RTBI had invested Rs. 5L as seed fund and TDB funding for Rs.22 Lakhs was sanctioned, towards commercialization of Microspin technology. MMW has recently been sanctioned an amount of Rs.187.5 Lakhs from NSDC for Scale-up.

MMW had made a turnover of 10 Lakhs in the first year and expects to do a turnover of Rs. 1 Crore in the current year. The set of Microspinning line of machines are;

Patents

The core process of Micro-spinning is based on a pending patent application vide No. 3885/CHE/2010 dated Dec 20, 2010, titled “Method and Apparatus for Carding of Staple Fibres”. We are proud to state that we have received the report from International Patent Search Authority (ISA), Vienna, upholding all the 27 Claims in our Application.

Award:

The Microspinning technology has been awarded The 2012 Innovation for India Award by the Marico Innovation Foundation under the social category.

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MobilTrain is a Knowledge Services Company that specialises in providing mobile based training to people in various sectors. Their USP is “concise, smart parcels of content” called “QuickLearnsTM” accessible through the participant’s mobile phone and is ideal for stakeholders in large scale education/training ecosystems looking to optimize training time and cost.

The learning modules are designed to facilitate behavioural change and promote skill development across verticals.

It leverages the power of mobile on-the-go learning and address the need for continuous learning by offering modules in multiple languages that engage both rural and urban populations; the learning tips are sent via SMS.

In the past 18 months, MobilTrain has taken the idea of mobile-enabled teacher training to various areas of Tamil Nadu including Tiruchi, Madurai, Vellore, and Dharmapuri. With almost 1000 participants on board, the company is working on a marketing strategy to capture a larger school base in the coming year.

The company has also conducted a trial of its mobile-enabled learning strategy in the healthcare vertical with success at Voluntary Health Services and the healthcare organization has signed on for a programme.

In the next year, the company plans to scale its operations in the southern states and hopes to grow its participant base considerably. It also hopes to create partnerships with mobile service operators and others who can create market base for this product outside India.
Newdigm provides healthcare solutions for resource limited settings. Their flagship product - clinical decision-support system (DSS) technology helps rural health-workers in arriving at a diagnosis, treatment and follow-up plan for patients. The mobile-phone based system guides health-workers in eliciting patient history, signs and symptoms and analyzes the fed data through accredited medical protocols assisting in prompt and appropriate decisions.

**Background:** India is a decade behind the Million Development Goal targets and faces an acute shortage of doctors. For rural-remote areas, the solution to health delivery lies with the empowerment of local semi-skilled health-workers. We believe our decision-support technology can bridge the skill and confidence gap among these health-workers and improve their efficiency and efficacy in delivering timely, quality and affordable health.

Currently, the DSS presently caters to maternal and child health (under – 5 years) and chronic illness in adults. This essentially covers conditions causing over 70% deaths in expecting mothers and children (over 2 million in India alone), and all iceberg diseases in adults. Newdigm is working with NRHM and health NGOs for development of new tech. solutions and health delivery models and their implementations. So far, the initiative has been self-funded.

The company was incorporated in 2010 by a team of doctors and engineers with expertise in public health and low-cost mobile technology. It was incubated in RTBI in 2011.

**RECOGNITIONS:**

- Best E-health Award 2011, E-World
- ET Power of Ideas, Class of 2011
- Final 5, Piramal Healthcare 2011
- Social entrepreneurship and Business competitions at IIT-M, IIM-A,B,C and BITS Pilani
- Best e-Health Initiative, The Manthan Award 2011
Founded in 2012, POPP Private Limited is an IT service provider for companies. We offer a creative, professional and cost effective ONE STOP IT SOLUTIONS to fulfill business growth and varied IT needs of our clients. We build a solid and respected business by specializing in Application Development, Web Development, SEO, Reputation Management, PHP, WordPress etc. By 2010 we started the company with the name PHOENIX WEBMASTERSZ; we have been working for many clients globally fulfilled their needs as per their requirements. By 2012 PHOENIX WEBMASTERSZ changed call sign as PHOENIX ONLINE POWER PACKERS Pvt. Ltd. (POPP Pvt. Ltd.)

Our own Energy:

- Acquiring Stimulating as well as Tough Workforce.
- Devoted Smart working staff member's users regarding twenty four hours expert services.
- Supply associated with results inside particular TAT
- Fun Conversation and also opinions program in avoiding Difference.

Our own Fundamental Aim is definitely:

- To fulfill out there that necessity by using amazing excellent connected with perform on time reported by buyer specification.
- To make program for you to client full satisfaction so to accomplish work/job on realistic fee.

- To supply the results with time having 100% accuracy and reliability stage and also TAT confirmed.
- To try and do art around Global financial means and also top quality deal with practice is definitely incorporated straight into every single challenge.

Our Services:

- SEO (Search Engine Optimization)
- Reputation Management
- PHP websites
- Word press
- Application Development
- Web Development
- Mobile Apps development
- Web Hosting
- Logo Designing
- Banner Designing

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Stellapps was founded in April 2011 by 7 Telecom and IT industry experts (ex-Wiproites) with over 15 years of industry experience in providing Cloud-based, wireless Machine-to-Machine (M2M) solutions for the Agriculture sector. With a vision of delivering “Quality of Life enhancing solutions and Touch every life every day”, Stellapps has deployed SmartMoo™ - a small-farm automation solution with features for efficient herd management, productivity improvement and hygienic milk production, enabling rural entrepreneurship that includes the Bottom-of-the-Pyramid (BoP).

Stellapps’ SmartMoo™ solution's first product release – SmartMilk™, was deployed in a few farms and one processing centre in Karnataka, overcoming many significant challenges last year. India's first three station milking parlor with semi-automated milking controls and mechanisms was a highlight of the first release.

SmartMoo™ is deployed for customers – especially, dairies focusing on production with captive farms. Through media coverage in several newspapers, including Times of India, The Hindu, Bangalore Mirror, Dainik Bhaskar etc. Stellapps has over 300 leads across India and ASEAN region and is in a good shape to meet its revenue targets for the year. The ability to convince customers to pay for the Cloud based services on a per-liter or per-cow basis has been a key business model breakthrough.

With distributed wireless M2M data gathering from distributed farms, Stellapps believes that its model can help take Agri/Dairy to a new dimension with sensor-driven, cloud-based, agile business analytics. Its upcoming SmartMilk™ Releases will build on Phase One's solution, while the advanced analytics will revolutionize the cattle gene pool in the country - not just for fostering high-yielding cows but also improving the yield-average in the country.
Founded in January 2012, Unclassroom’s vision is to become the most fun and engaging way for individuals to learn employable skills. We started out with a focus on technology skills, specifically the PHP programming language & Facebook Application Development. Till date, we have created and launched three courses that are delivered via an online interactive learning platform that we have built. A provisional patent has also been filed for the above platform.

Since launching the platform over 2,000 students from 25 different countries have taken our courses. We also conducted an online event in partnership with the National Entrepreneurship Network (NEN) in which over 300 students participated. In addition, we regularly conduct workshops for college students.

Unclassroom has also been covered by leading Indian papers such as The Hindu and Indian Express Buzz.

We offer courses via a "freemium" model where some lessons are FREE and a fee is charged for access to the full course. We have also developed Intellectual Property around online skill assessments as part of our platform and we will be launching a suite of assessment products based on the same.

We expect to become profitable in 2013.

STUDENT FANS
- 900+ likes on our Facebook page.
- Over 1,400 students have joined our online group on Facebook.

PRESS MENTIONS
- The Hindu
- Express Buzz

FEATURED APPS BUILT BY OUR STUDENTS
Facebook conversation saver
- Built by Vinay Kumar after completing our course on Facebook Application Development.

Photo blog
- Built by Vineeth C.K. after completing our course on web development with PHP and MySQL.
Swayambhu Biologics Private Limited was incorporated in Nov 2010, with a focus to sustain, support and promote high tech agriculture, horticulture and related economics. In early 2012 Swayambhu was brought into the RTBI fold for incubation of pioneering technologies in Agriculture and Solid Waste Management.

Swayambhu is presently imparting technology to compost sugar industry wastes and converting it into a high quality manure as part of Joint Venture with Varun Phosphates and Bioorganics Pvt. Ltd. The ARBIT media (Proprietary) developed by Swayambhu accelerates the composting in 21 days instead of traditional methods that take 45-60 days or even 90 days. This technology is likely to be absorbed by 25 industries countrywide within two years and can grow to 200 in 5 years. Swayambhu’s ARBIT media also comports Coir pith in 27 days compared to 60-90 days using existing methods.

Swayambhu has also signed a JV agreement with M/s Jagathi Agrowtechs Private Limited to design, and develop Poly house high tech Agriculture. Under this project Swayambhu Biologics will help 25 small farmers build poly houses of 1000 sq.m each and will impart relevant technologies to generate hi-value crops under controlled conditions.

Since commencing business after incubation in Apr 2012, Swayambhu has already secured 5.5 lakhs technology transfer fee. The production based royalty for technology transferred for two companies is expected to be around 60 lakhs per annum from the year 2013-14. The company has a staff strength of 6 and expected to increase to 12 by this financial yearend.

Swayambhu is headed by Mr R Balaji, Managing Director, a technologist for over a decade under Dr C V Seshadri is experienced in commercializing research concepts bridging the rural – industry void.
Edutor Technologies is e-learning Solutions Company focused on making Tablets an essential tool in the hands of a student. The easy intuitive interface of the tablet and accessibility of compelling content/learning material on the tablets enable significant improvement in the efficiency and efficacy of learning experiences for the student.

Edutor mobile learning environment and cloud based course delivery engine enables teachers/institutions deliver their courses on their new-age digital devices and improve their productivity.

Edutor Technologies objective is to make new age digital devices like Tablets an essential tool in the hands of all students across the spectrum. Edutor creates and aggregates highly interactive and engaging curriculum aligned digital content from across the world.

Edutor solution also enables educational institutes/schools to deploy the tablets across their student and teacher community and help drive a better teaching/learning experience.

The end goal is to have scalable technology solutions for improving learning outcomes for a large student body and Edutor is at the forefront of that innovation.

Ramkumar Gollamudi is the Founder and CEO, has an MBA from University of California, Los Angeles, MS from Iowa State University and B.Tech from Indian Institute of Technology, Madras. Senior management team includes. Mr. Prasanna Boni - Founder and COO, MBA from Indian Institute of Management, Ahmedabad and B.Tech from Indian Institute of Technology, Madras, Mr. Kumar Narasipuram - Founder and VP Engineering, Mr. Ramesh Karra, Founder and VP Sales and Marketing.
Wireless and Mobile technology have completely transformed the way we live today. Technological advances in these two fields have been astounding and opportunities endless. At the onset of this technological revolution, we at MeGo, are gearing up for the next wave – disruptive products that uniquely blend wireless and mobile. Co-founded by Hrushikesh Mehtadele and Mandar Gosavi, MeGo was incorporated in November 2011, with a generous grant given by Dr. Santosh Vempala of Georgia Tech, USA and incubation support provided by IITM’s Rural Technology Business Incubator. Within a year of its incorporation, MeGo has already launched three products.

X-WiFi (eXtreme WiFi) - X-WiFi is a radical new solution for providing ultra-fast WiFi in large sized flats at an affordable cost, built on novel patent pending technologies developed at MeGo. With durable hardware, state-of-art security, easy installation and maintenance, X-Wifi delivers unmatched performance.

Paperwala - In spite of the proliferation of smarter electronic news-readers, newspapers still remain extremely popular, due to portability and offline availability. Paperwala, a free Android application, brings newspaper reading experience on your smartphone or tablet. It is already available on Google Play.

MeGo Meeting – Studies show that meaningful communication of a hospitalized patient with his loved ones is of prime importance to his fast recovery. MeGo Meeting is a video communication and collaboration platform built for the health care industry, which allows communication between patients, patient-friends, doctors and hospital admin staff.
Exploratory Initiatives

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Financial Inclusion

The objective of this initiative is to take banking services to the unbanked masses in the rural areas. For a country like India, it is virtually not possible to build branches in every nook and corner of the country. In order to facilitate this, RBI set out guidelines where banks can partner with third party agents who in turn would provide banking services to the rural masses on behalf of the bank called a Business Correspondent (BC). A BC reaches the Mobile Payments Forum of India (MPFI) jointly formed by IITMs Rural Technology and Business Incubator (RTBI) and Institute for Development and Research in Banking Technology (IDRBT) in the year 2007, is an industrial forum that brings together more than 100+ organizations from various sectors for providing mobile payments in an interoperable and heterogeneous environment including rural masses. It helped RBI define the policy for Mobile Payments and developed inter-operability guidelines so that any customer of any bank / financial institution, being serviced by any telecom operator using any payment technology on his / her phone can make payment to any other person with a different bank, service provider and using any other technology.

Interbank Mobile Payment Service (IMPS) of the National Payments Corporation of India (NPCI) were started in the year 2010 using these Interoperability guidelines. It currently facilitates person to person mobile payments and is offered by 50 member banks. The next step towards facilitating mobile payments is enabling Merchant payments, which is now live with 8 participating banks and allows payments such as electricity bill, mobile top-up, DTH recharge etc., with select merchants.

The future for mobile payments is to go the USSD way, as it does not require any application download and can be used on any basic, low end mobile phone. Stakeholders such as Telecom, Technology Service Providers and Banks are working towards achieving this.

Facilitating mobile payments for various services in the areas of Agriculture, Rural e-Commerce, Rural Distributed workflow, Education will be explored by RTBI in the years to come.
Energy

Shortage of Electricity is a major concern in India today, as huge shortage exists in urban and rural areas. It affects every aspect of our lives and contributes negatively in a very significant manner to our incomes and to the growth of the GDP.

IIT Madras has been examining the use of solar PV for electricity at its centers including Center for Science and Technology for Rural India (CSTRI), Telecom Center of Excellence (TCOE) and Rural Technology and Business Incubator (RTBI). It has been working on decentralized electricity generation using solar PV and using it, possibly in Direct Current (DC) form, for commercial buildings, rural and urban homes and for pumping water in agricultural fields. TCOE has taken a lead and is likely to soon come out with an extensive study on how to optimize energy usage in a cellular Base Station site; the report called “Powering Cellular Base Stations: A Quantitative Analysis of Energy Options -- Solar PV, Diesel Generators, Batteries and Electrical Grid” is likely to be released in early October of 2012. Its solar pump is likely to be ready by the end of 2012.

Health Care

Optimal healthcare delivery depends not only on increasing access to healthcare services but also on being able to closely follow up with the patients and on ensuring the completion of treatment protocol. This remains a challenge everywhere but more so in rural India.

IITM’s Rural Technology and Business Incubator’s health initiatives aspire to develop and implement simple, affordable, and scalable Information and Communication Technology enabled solutions, especially mobile phone-based solutions, to act as a platform that provides patient-centered services in addition to facilitating healthcare delivery in India.

RTBI’s and Uniphore’s mobile based data entry and voice authentication system which facilitated Maternal and Child Healthcare delivery in rural and tribal regions of Madhya Pradesh was awarded “Top Innovator of Top 11 in 2011 Innovators Challenge at mHealth Summit organized by Rockefeller Foundation & mHealth Alliance”.

RTBI has been working in the area of Healthcare for the last five years exploring on several models, working with private practitioners, indigenous healthcare providers and public healthcare systems. Our experiences in the past, have given us an understanding on what could go a mile more in solving rural healthcare problems. However the
issues are far from plenty. The forte of using technology for managing and assisting public healthcare delivery is gaining momentum.

One of our initiatives from recent times is to implement and evaluate how mobile phones can be used to manage Tuberculosis, a communicable disease that needs a prolonged period of rigorous treatment and remaining a major public health challenge in India.

A simple yet dynamic system customized for every TB patient enrolled, to help in their treatment adherence and ensure follow-up to treatment completion was developed by IITM’s RTBI. The problem statement was defined by Infectious Disease Training and Research Centre, Christian Medical College Vellore. The initiative is a joint partnership between IITM’s RTBI, CMC Vellore and University of New South Wales, Australia. This public health priority program currently involves mobile phone based registration of TB patients and enabling adherence to the recommended treatment regimen through customized SMS and/or Voice reminders in local language.

This work is being carried out under the IU-ATC project funded by the Department of Science and Technology (DST), Government of India and the UK EPSRC Digital Economy Program. We are currently in pilot and exploring to see how such simple interventions impacts the patient and the healthcare system, and whether it can be replicated for other health conditions.

Rural Distributed Production System (RDPS)

The Need:

Distributed manufacturing franchise models (falling under SMEs, Small and Medium Enterprises) are being promoted in rural areas as a means to provide sustainable livelihood options to many rural people. They need support in terms of training, logistics and monitoring production.

The Solution:

Considering the power fluctuations and computer scarcity in rural areas, a mobile technology based solution, namely Rural Distributed Production System (RDPS) was conceived to address the challenges faced by distributed franchise enterprises.

Partner:

ROPE is one such enterprise having similar challenges. So, RTBI partnered with ROPE to implement this across ROPE's production centers.

Components:

- Front end, a mobile application and backend, an enterprise database
- GPRS component (to be downloaded and used on GPRS enabled Java handsets)
  - a mobile application with Simple Forms to update Stock transfers and daily production data
- Web component - reports like Wage calculation, Attendance, Stock transfer, production generated from the enterprise data.
Lessons Learnt and Way Forward

In 2011, initial field trials were conducted at ROPE's Production Center in T.Kallupatti near Madurai. Training was given to the supervisors on how to use the system. Although the system could not be used in live production, the lessons learnt were valuable to take this forward into the next phase. It was planned to integrate this with another similar RTBI initiative called Partial Document Retrieval (PDR) which was an outcome of the Xerox-RTBI engagement, as a means to leverage the common aspects in both and implement it with other SMs.

PDR is a mobile based application to enter and update daily production data that are stored in spreadsheet. Since RDPS, as an ERP system that maintains data in the DB and has report generation options, the PDR front end can be integrated with RDPS. This integration is currently under progress.

e-VyapaarSewa - Online marketplace

Overview:
e-VyapaarSewa(eVS) is an online market place for rural SHGs created with an aim to provide sustainable livelihood options to the SHG women. The system provides platform for rural SHGs to widen their reach and increase client base by bringing together different stakeholders involved. This eventually helps in avoiding the need for middle men, hence reducing the supply chain and increasing fair trade opportunities.

eVS is a multi-modal platform that leverages the power of mobile technologies by bringing in a Voice component also in addition to a web portal, seamlessly integrating both through a common master database. It's a collaborative effort amongst three partners, IITM, RTBI and Sasken with the initial field trials conducted through Women SHGs in Kaniyakumari with Sasken's help.

Web component:
- An Online e-commerce portal for users to browse through products, place orders, make payments and get the products delivered
- An admin portal for producers to add/update product data.
- For integration with the Uniphore's IVR system, RTBI has designed and implemented SOAP Web Services
Voice Component:
• An Interactive Voice Response system for buyers to place and make order enquiries using phones
• For Producers to update product data and make order enquiries

Way Forward:
• In an effort to bring in more producers who are directly or indirectly involved in enhancing livelihoods under eVS, the next half year plan is to customize the portal for RTBI's three Incubatees, ROPE, Vastra, Arogyam
• A collaboration with iViL of IIT Madras to bring about linkages to more SHGs

• Soft Launch of the system in July-August with the above producers

Xerox Corporation – IITM's RTBI
Open Innovation Project

The focus of this project is to understand unique facets and limitations of traditional distributed workflows and design applications which enhance productivity in the rural context. The project started in Dec 2008 and is currently in its fourth year. This is a collaborative initiative between RTBI, Xerox Corporation, USA, IIT Madras and IIT Mandi and is funded by Xerox Corporation.
Current Status

The first year of the project was focused on an ethnographic and technology-focused study of existing rural workflows. In the second year, two key focus areas - Partial Document Retrieval and Controlled Document Access - were identified for study and trial deployment and workflow application design for these was done. The third year was focused on the design, prototype development and field trial of the applications, as well as on researching the challenges involved in adding access control and security in distributed rural workflows. The fourth year's focus was narrowed down to the Controlled Document Access and extensive pilots and field trials in preparation for a possible commercialized venture in Year Five. The Partial Document Retrieval project from Year Three was pursued independently from the Xerox Project, with a view to integrate with the exploratory venture for RDPS. This is now an RTBI-only internal project initiative, distinct from the official scope of the Xerox-RTBI Open Innovation Project.

A previously created prototype for automating need and role-based Controlled Document Access was improved and converted into an online web browser-based design. The application was primarily motivated by the needs of Rural BPOs, a growing segment in India which requires lightweight and cost-effective document management solutions for daily operations. However, it can be used in any scenario that requires distributed document editing and subsequent aggregation such as proofreading, translation, and digitization operations. Among the salient features of the application is the ability to provide partial role-based access to document content (a key mechanism to ensure document confidentiality), automatic and manual workload distribution among multiple users and quality control through duplication and conflict resolution. The prototype is being expanded to include capability to support translation workflows from English to 6 other Indian languages (Hindi, Tamil, Telugu, Kannada, Bangla and Gujarati)

Access Control Methods for Rural Workflows

Research and study of access control methods and challenges involved in distributed document access is currently underway at IIT Mandi. One of the key outcomes of this research would be the development of an Access Control Framework for Rural BPOs that would address specific security requirements in the rural context.
The Agricultural Exploratory Initiatives at RTBI are involved in developing solutions using Information and Communication Technologies (ICT) for providing information in a sustainable and accessible manner such that an environment for more remunerative agriculture processes can be created for farmers. There is a strong need today to align the needs of farmers, their existing experience and knowledge base with modern agricultural trends and practices, by personalizing the information that is being delivered to them so that the information flows both ways.

RTBI aims to harness the present day technology platforms and use them innovatively, to build tools that will help bridge the information gaps existing between farmers and extension workers / agricultural scientists. We are also trying to understand and surmount the challenges that face the ICT movement in Indian agriculture so that our initiatives can have a truly significant impact on the farming community.

RTBI's agricultural exploratory initiative recently received a major impetus in the form of a sanctioned partnership with the Department of Agriculture, Government of Tamil Nadu for using innovative technologies to deliver various end-user services to farmers throughout the state of Tamil Nadu. Currently, simple tools involving only the use of mobile phones have been developed by RTBI and are being adopted by the Department of Agriculture for providing services to the farmers. Mention of this partnership has also been made in the Policy Note tabled by the Minister of Agriculture, in the Tamil Nadu Legislative Assembly.

As of March 2012, RTBI conducted a hands-on training programme in these mobile applications, for Agricultural Officers and Assistant Agricultural Officers to help them use these tools effectively. Soon, services like booking Farm Machinery online, procuring crop inputs, generic crop advisory as well as farm and farmer specific advisories will also be provided to farmers. We expect RTBI to play a very crucial role in measuring the impact of these services and offering innovative solutions that will assist in the large-scale implementation of the initiative, as envisaged by the Government.
In another successful partnership, the National Institute of Agricultural Extension Management (MANAGE) based in Hyderabad are being assisted in setting up an Agricultural Advisory System at their KVK (Krishi Vigyan Kendra), Gaddipalli in Nalgonda district, on a pilot basis. The technological solution that RTBI is providing MANAGE involves a unique combination of cutting edge technologies such as an Interactive Voice Response (IVR) system (developed by our Incubatee Uniphore Software Systems) for farmers to register themselves in the system along with a personalized web interface for every farmer containing farmer specific information - a farmer 'dashboard'. Farmers can use a simple mobile phone to interact with the expert, who will be using the farmers' dashboard to provide personalized context-specific advice. Covering 15 crops and serving farmers in the Nalgonda district in the pilot phase, this initiative is expected to be launched very soon.

The National Agricultural Innovation Project (NAIP) funded project 'Development of ICT based Tools / Technology towards an Interactive Multimedia Agriculture Advisory System' has now entered its final phase and has seen the successful implementation of many of the innovative features outlined in the proposal. This year saw the setting up of an Agricultural multimedia advisory call-center, at RTBI through which an expert could easily provide farm and crop-specific advisories to farmers. A wide range of queries were answered by the expert with even farmers who were not registered in the project calling in asking for agricultural advice.

The popular tool developed by RTBI, that has been much appreciated by farmers has been the PDIU (Pest Disease Image Upload) *feature that allows farmers to upload pest or disease infested images to the system. The expert is alerted to this upload who immediately calls the farmer to provide relevant advisory. Though not part of the objectives outlined in the original NAIP proposal, this tool was built based on the relevance and the impact that it would have on the farming community.

*PDIU application was built under the Agriculture work undertaken as part of the IUATC collaboration, wherein RTBI is involved in Work Package: e-Agriculture – Disease Mitigation and Management System, along with other partners.

RTBI is thus well-placed to share its technological knowledge as well as field learnings to interested agripreneurs who can effectively turn these exploratory ideas into mutually and financially enriching partnerships with farmers.

**IU-ATC**

IU-ATC of excellence in next generation networks systems and services is a virtual joint research initiative which will put in place a focused agenda to support collaborative joint research programs, and technology transfer between the UK and India.

The initial 30 month Phase 1 of an overall 5-year joint programme between the UK and India was evaluated early 2012 and the work packages were further pruned down based on the accomplishments in Phase 1 and the ones that could possibly fulfill the premise of Theoretical Work, Patents and Standard Practice and Commercialization aspects were pulled through to Phase 2. In February 2012, the various institutes both from India and UK met together in IITM Research Park to define the work packages for Phase 2 and also the roles of each of the institute that were participating in the work package respectively.
So as part of Phase 2, RTBI will be part of Group 1 – Applications and Services and will be working on the following work packages:

<table>
<thead>
<tr>
<th>Work Package Title</th>
<th>Indian Institutes</th>
<th>UK Institutes</th>
</tr>
</thead>
<tbody>
<tr>
<td>WP1: e-Agriculture Disease Mitigation and Management System</td>
<td>IIT Madras*, RTBI, IIT Mandi and IIT Delhi</td>
<td>University of Bristol* and Cambridge University</td>
</tr>
<tr>
<td>WP 2 – e-Health towards Public Health Care Delivery and Management of Health Conditions</td>
<td>RTBI*, IIT Madras and IIT Mandi</td>
<td>University College London* ICT and Cambridge University</td>
</tr>
<tr>
<td>WP 3 – Social TV Virtual Classroom for Education</td>
<td>IIT Madras* and RTBI</td>
<td>Cambridge University*</td>
</tr>
</tbody>
</table>

*Lead Institutes in the respective Work Packages

<table>
<thead>
<tr>
<th>Industrial Partners</th>
</tr>
</thead>
<tbody>
<tr>
<td>Uniphore Software Systems, Government of Tamil Nadu – Department of Agriculture, Tamil Nadu Agricultural University (TNAU), Christian Medical College (CMC) Vellore, National Institute for Research in Tuberculosis (NIRT), Augurtron, British Telecom, NPTEL, Infectious Disease Training and Research Center (IDTRC)</td>
</tr>
</tbody>
</table>

The IU-ATC consortium’s financial support received to date is from Indian Department of Science and Technology, UK Engineering and Physical Sciences Research Council (EPSRC) INTERACT 5, UK Trade and Investment and the British High Commission India.

**Completed Pilots**

**Namma Ooru Website (NOW):**

IIT Madras’s Rural Technology and Business Incubator (RTBI) and National Internet Exchange of India (NIXI) collaborated in November 2010 to create Namma Ooru Website (NOW). An Initiative envisioned as a tool to disseminate the village specific information and create a global identity for our Indian Villages.

The Grand Finale of the Namma Ooru Website - Award Ceremony was held on 17th December 2011 at Central Lecture Theatre, IIT Madras. The Grand Finale was attended by eminent dignitaries, rural youth, Panchayat Presidents and ward members and rural elders of the respective villages, college faculty members and Principals from the student’s colleges, members of the press and members of IITM’s RTBI. The rural participants who created the top 11 websites assemble with their respective team member and gave a brief presentation of their village website.
The Grand Finale came to an end with Prof. Bhaskar Ramamurthi, Director, IIT Madras - our Chief Guest giving away the Trophies to the winning groups.

The team in RTBI also studied the various factors that played a role in NOW implementation and documented its findings; elucidating on socio-demographic details of the rural participants such as gender distribution, educational background, access to computer, internet, distance the participants had to travel to access internet, cost of internet. Various challenges the rural participants faced while carrying the website creation, finally the perception of rural participants toward the NOW initiative was also presented.

While the initiative itself was one of a kind, the learning to RTBI was many folds. It gave us an insight on how students from rural areas and educational institutions can be harnessed to foster rural development. The key driving point is how to make such initiatives successful in long term.

Though a competition mode does surge the enthusiasm levels in young minds but sustaining the efforts for long-term impact needs to be given due-importance. Keeping these learning in mind, RTBI is exploring on avenues that can channel the potential of students and institutions from rural areas to make a larger and more pronounced impact.
PARTNERS

51 Funding Partners

53 Incubation Partners

Members of the Board 52
Funding Partners

1. Department of Science and Technology (DST), New Delhi
   a. Establishment of Rural Technology and Business Incubator
   b. Entrepreneurship Sensitization Programme

2. Indo-UK Advanced Technology Center of Excellence in Next Generation Networks Systems and Services
   a. To support collaborative PhD, Post Doctorate projects and joint research programs, and technology transfer between the UK and India.

3. Xerox Corporation, New York
   a. Distributed Workflow Systems and Applications

4. Micro, Small and Medium Enterprises (MSME), Government of India
   a. Support Entrepreneurial and Managerial Development of SM Es through Incubators

5. Technology Development Board (TDB), Government of India
   a. Seed Support System for Start-up in Incubators

6. National Agricultural Innovation Project (NAIP), Indian Council of Agricultural Research (ICAR), New Delhi
   a. Development of ICT based tools/technology towards interactive multimedia agriculture advisory services

7. National Internet Exchange of India, New Delhi
   a. Pilot initiative of “Namma Ooru” (Our Village) – Social Collaborative platform for village

8. Ministry of Rural Development, New Delhi
   a. Concurrent monitoring, supervision and impact assessment study of Mahatma Gandhi National Rural employment Act

9. Research Triangle Institute, USA
   a. Integration of multi-level Behavioural, Biological and Economic Informatics on HIV
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IIT Madras

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New Delhi

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Chairman & MD, MARG
Kotivakkam, Chennai

Dr. Nachiket Mor
Chairman, ICICI Foundation
Institute of Financial Management and Research,
Nungambakkam, Chennai
Incubation Partners: Brain League IP Services P. Ltd.

Brain League IP Services Pvt. Ltd. (Brain League) was incubated in IITM’s Rural Technology and Business Incubator (RTBI) in 2010 with the vision to provide integrated and quality end-to-end intellectual property services across the globe and to help clients generate and leverage intellectual assets for optimal commercial benefit by blending technology, management and law.

We offer services covering IP generation, protection, commercialization and management. Our services are offered by experienced personnel whose experience, specialization and training suit the requirements of the client. We provide services with a blend of technology, management and law. We are one of the first companies in India to realize the importance of blending technology, management and legal expertise in providing value added Intellectual Property services. Our well qualified team and proprietary technology enabled processes allow us to provide high quality services and maintain timelines. Our technology and legal measures enable us to maintain confidentiality of client information.

FY 2011-12 recorded Brain League has more than 300 clients, 50 full time employees and a turnover of 2 Crore.

To RTBI and incubatee companies we provide services like Patent Search and Analysis, Specification Drafting, New Application filing in different technology domains like Electronics, Mechanical and Life Sciences.

The founding team consists of:

1. Mr. Arun K Narasani - Arun is a B.Tech from IIT-Madras and P.G. from IIM-Bangalore. He also attended the Advanced Licensing Institute at Franklin Pierce Law Center, New Hampshire.

2. Dr. Kalyan C Kankanala – Dr. Kalyan is extremely passionate about teaching and offers courses on Intellectual Property as a visiting faculty at National Law School of India University, Bangalore and guest faculty at IIM-Bangalore. Dr. Kalyan has many national and international publications to his credit, which have been cited extensively. As the national expert on intellectual property for United Nations Industrial Development Organization, he helps companies move up the intellectual capital ladder through IP mining, policy implementation and business value creation.

Services Provided:

Patent Services
- Patent Search and Analysis
- Patent Drafting, Filing and Prosecution
- Infringement Analysis
- Technology Domains

Trademark Services
- Trademark Search and Analysis
- Trademark Filing, Prosecution and Registration
- Trademark Opposition

Copyright and other services

Open Source License Analysis

IP Management
- IPR Policy and Process Setup
- IP Strategy Portfolio and Process Management
- IP Analysis and Due Diligence
- IP Audit

IP Agreements and Licensing

Portfolio Management Relationship

IP Training

IITM’s Rural Technology and Business Incubator (RTBI), 1st Floor, IITM Research Park, Kanagam Road, Taramani, CHENNAI 600113
Tel: +91-44-66469865

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Tel: +91-44-66469865

303, 3rd Floor, Diamond Towers, Between Taj Tristar and Belson Taj hotels, SD Road, Patny, SECUNDERABAD 500003
Tel: +91-40-27844999

No 40, 1st Floor, 3rd Main Road, JC Industrial Estate, Kanakapura Road, BANGALORE 560062
Tel: +91-80-26860414/24/34
Fax: +91-80-26860484

www.brianleague.com

contact@brainleague.com
Incubation Partners: Agrya Consulting

Agrya Consulting is a Chennai based Chartered Accountancy firm run by a team of professionals with International experience and expertise specializing in Audits and other Financial Advisory Services.

The company specializes in the following areas;

1. vCFO services - Quality finance professional and a robust accounting system is one of the critical requirements of any business. The Laws and compliances have become very dynamic and many corporates outsource the compliances with companies Law, labour laws, direct laws, indirect taxes to external professional firm considering the robust changes happening in the Indian economy. vCFO would be a complete solution to all the financial requirements of the business. We in agrya believe in providing a very high quality Chief finance officer service at a price affordable to any business with the help of technology, automation, best business practices and processes, clear segregation of roles and responsibilities. (www.vCFO.ca)

2. End to End Accounting Solutions - On a larger perspective, bookkeeping is an essential process for every business as it keeps track of business finances, including transactions on a daily basis. Business financial analysis, based on business records is the key tool in the success of every business. We assist our client in maintaining proper books of accounts and ensure compliance with various regulations.

3. Other professional services
   a. Risk Based Internal and Management Audits
   b. Process Set up and Reviews

   c. Readiness for Audit under I GAAP, IFRS & US GAAP
   d. Tax advisory services & Investment Planning
   e. IPO readiness
   f. MIS support under various GAAP’s
   g. Valuation and Due Diligence for investment
   h. Payroll and employee related compliance
   i. Compliance reviews covering all the statues
   j. International Taxation & Transfer Pricing

Formed in November 2010, the Company has its registered office in Chennai

Founders

Priya is a Fellow member of the Institute of Chartered Accountants of India and also holds a diploma in IFRS from ACCA, London. She has 15 years of working with Big4 audit firm, served Large National and Multinational clients spread across various industries. Her specialisation include handling statutory audits, management audits, Limited Reviews, Tax audits and Group reporting under various GAAP’s.

Jayakumar is an Associate member of the Institute of Chartered Accountants of India and Company Secretary. He also holds Post Graduate Diploma in Business Management from Symbiosis. He has more than 6 years of post-qualification experience including 4 years of working with Big4 audit firm. He had specialized in handling statutory audit, Limited Reviews and clients proposing Initial Public Offer (IPO). He has advised clients in various Corporate Law, complex accounting and taxation issues.

Corporate Office:
R M Towers, Suite No. A-1, Ground Floor
No.108, Chamiers Road, Teynampet,
Chennai – 600018. India
Seminar on ICT in Veterinary Science

Conducted By: Healthcare Initiatives Team
Speech Delivered By: **Professor Dr. P. Mathiyalagan**, Ph.D.,
Professor and Head, Department of Veterinary and Animal Husbandry
Extension and Entrepreneurship, Madras Veterinary College (MVS)
Location: TCOE Conference Room
Date: February 23, 2012
Participants/ Beneficiaries: 13

With the quest of finding an answer for the question, “How ICT can be used to the benefit of a rural farmer who owns a cattle or two?” IITM’s RTBI arranged for a seminar on “ICT in Veterinary Science”. The seminar consisted of a presentation and an open discussion session covering the following topics:

- Challenges faced in veterinary science that is attributable to distance and accessibility, with a rural focus
- Ways in which ICT has been and can be used to address these challenges
- How rural veterinary clinics or services in animal husbandry are streamlined and the possible role of ICT in the same

**Learning/ Outcome:** The session was very interactive and well received among the audience. It gave an insight into the common issues faced in animal husbandry and veterinary field. The participants had an opportunity to explore the new terrain of ICT applications in Veterinary field and discuss the possible solutions that can be ventured out in the future.

IU-ATC Project Consortium Workshop

Conducted By: IU-ATC
Date: May 30 – June 1, 2011 and February 1 – 2, 2012
Location: University College London, UK and IITM Research Park, Chennai
Participants/Beneficiaries: Representatives from IUATC team in RTBI

RTBI participated in the Project consortium workshop #5 and workshop #6 in the last calendar year under the IU-ATC (India-UK Advance Technology Centre of Excellence in Next Generation Networks, Systems and Services. The overall aim of workshop #5 was to concentrate on the technical work programme outputs and to identify and assess the Key Performance Indicators.

Workshop #6 held in IITM Research Park was more focused on identifying the areas for Phase 2 of this collaboration and also the working institutions along with their roles in the respective work areas.
Workshop on How can ICT Help Agriculture

Conducted By : Agriculture Team (RTBI)
Date : August 27, 2011
Location : IITM’s Research Park, Chennai
Participants/Beneficiaries : 35

A workshop was conducted in the premises of IITM Research Park inviting representatives from Tamil Nadu Agricultural University, Department of Agriculture – Tamil Nadu Government, BKSL, EID Parrys, Ponni Sugars, Banari Amman Sugars, Bayer Crop Science, Good Greens India, IIT Madras, Uniphore and RTBI. The objective of the workshop was to understand the existing gaps in the present day agricultural system and if and how can the gaps be addressed using Information, Communication and Technology (ICT) tools.

Learning/Outcome: The workshop was interactive wherein views and opinions were expressed from different stakeholders. It was effectively concluded by saying “technology wise the system is easy and of low cost to build”. Large scale implementation and usage will improve its efficacy. Implementation and adoption by Government or private sector would help to know the impact and thereby build a sustainable, reliable and scalable system.

Workshop on How can ICT Help Agriculture

Conducted By : Agriculture Team (RTBI)
Date : November 5, 2011
Location : IITM’s Research Park, Chennai
Participants/Beneficiaries : Members from National Agro Foundation, Agri Clinic Entrepreneur, Center for Indian Knowledge Systems and RTBI

A workshop was conducted in the premises of IITM Research Park inviting Mr. Nambirajan, Surya Agri Clinic, Thiruvellore, Mr. Ramasubramaniyan, National Agro Foundation, Kancheepuram and Mr. Murugan, National Agro Foundation, Kancheepuram. The workshop provided a platform for the participants to engage and participate in discussion regarding services of Agri clinics and its functions, effectiveness of its services, and experience sharing of a successful Agriprenuer.

Learning/Outcome:
The workshop was interactive wherein we learned about the scheme launched to set up institutes to train agricultural graduates, challenges and also a success story of one of the Agriprenuer. Possible opportunities for technological interventions that would facilitate both the agriprenuer and the training institute were also discussed
Workshop on Linking Health Practitioners to Some ICT innovations in Healthcare

Conducted By: RTBI Healthcare Team  
Date: June 7, 2011  
Location: IITM's Research Park, Chennai  
Participants/Beneficiaries: Dr. Suresh (Mediscan Systems), Dr. Mohan Kameswaran (ENT Research Foundation), Mr. Rashmin Gandhi (Sankara Netralaya), Dr. Sajan Nair (Malar Fortis), Mr. Ranjith (Madras ENT Research Foundation), Professor Ashok Jhunjhunwala and Dr. Mohan Sivaprakasam from IIT Madras, Few Healthcare based Services Companies and Representatives from RTBI Neurosynaptic Communications, Stellapps, Healthxlnc, Wrig Nanosystems and some of RTBI’s exploratory initiatives on healthcare were presented. Eminent delegates and other participants participated in a discussion to propose a way-forward on ideas and future collaborations. Opinions in the field of ultrasound and imaging, ENT and Tele-mentoring programs were fervently discussed. It was unanimously suggested that future medical conferences must include a session on technology innovations to showcase initiatives that will add strength to the medical practice and its fraternity.

Communication Policy Research South (CPR south) 6, Annual Conference on Communication Reform: From Research to Practice

Conducted By: Faculty of Communication Arts, Chulalongkorn University and LIRNEasia  
Date: Dec 7th - 10th, 2011  
Location: University of Chulalongkorn and Emerald Hotel, Bangkok Thailand  
Participants/Beneficiaries: 3 (From RTBI)

CPR South is a capacity building initiative in the field of Telecom Policy and Regulation in the regions of the Asia Pacific, Africa, Latin America and the Caribbean, the Middle East and North Africa. In order to promote its vision, CPR South hosts an annual conference where research papers are invited from researchers, educational institutions, policy makers etc. under various categories of the ICT field. Policy briefs of the papers, which are selected in a competitive fashion, are presented during the conference. Our paper, “Evaluating National Rural Employment Guarantee Scheme in India: A Dynamic Rural Survey Method Using Mobile Phones”, authored by Janani Rangarajan, Rajesh Kumar, Sriram Narayanamurthy, Dr. Ashok Jhunjhunwala and Suma Prashant, was accepted and shortlisted to be presented at the CPR South 6. Ms. Janani Rangarajan presented the policy brief based on the paper in the Conference. Further the paper has also been inducted into the Social Science Research Network and can be found at http://papers.ssrn.com/sol3/papers.cfm?abstract_id=1976181
**Vastra Field Trials**

Conducted By : Xerox-RTBI Team  
Date : Dec 14, 2011 and January 13, 2012  
Location : Vastra Taramani Unit, Chennai  
No. of Participants /Beneficiaries : Xerox-RTBI PDR Team and Vastra  

The Xerox-RTBI project team conducted this pilot and field study to demonstrate and train workers and supervisors in the distributed production centers in Vastra, the use of the Partial Document Retrieval (PDR) Tool. Two rounds of field trials were performed wherein the PDR application was installed in the production supervisor’s phone and used to track order status and production volumes on a daily basis. The other objectives of this trial were to fix any issues encountered during deployment, improve usability of the tool based on real-world feedback.

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**DesiCrew Field Trials**

Conducted By : Xerox-RTBI Team  
Date : October 13-14, 2011 and November 31, December 1, 2011  
Location : DesiCrew Rural BPO Palladam center  
No. of Participants /Beneficiaries : A joint pilot in which DesiCrew, Aaum Analytics and the Xerox-RTBI team did a qualitative pilot and field study of the Controlled Document Access (CDA) desktop tool

The Xerox-RTBI project team conducted this pilot and field study to demonstrate and train rural BPO workers in the use of the CDA tool. The other objectives of this trial were to fix any issues encountered during deployment, improve usability of the tool based on real-world feedback. Aaum Analytics supplied documentation for the field trial, playing the role of the client. DesiCrew performed the proofreading workflows on the documentation using the CDA tool. The highlight of the pilot was the 2nd phase were a 570 page document on the long-term requirements of NREGA in Tamil Nadu, was successfully proofread by a concurrent team of 3 BPO team members. The operation was completed in 6 hours as opposed to an estimated 16.7 hours which would have been the case in the absence of the tool. While not a comprehensive analysis of the improvements offered by the tool, it provided a valuable insight into the benefits of continuing our research. One of the key takeaways from the pilot study was the need to migrate the tool to a web-only interface. This is the key focus of Year Four of the Xerox-RTBI research collaboration.
Unconvention 2011

Conducted By: RTBI & VillGro
Date: November 2011
Location: IITM Research Park, Chennai
No. of Participants /Beneficiaries: RTBI Incubatees

RTBI co-hosted an investor clinic in Unconvention 2011, annual flagship event by Villgro, in as a part of Sankalp summit. The investor clinic was to look at 8-12 social enterprises that are investment ready to participate in the Sankalp innovation challenge, and access their model and give them feedback. Two of companies participated and pitched in the panel.

RTBI had invited Senior associates and partners from the leading investing firms, Greyghost Ventures, Omnivore capital, Acumen, Unitus Impact, IDG Ventures, New Ventures India to name a few. The event was a great success.

Sankalp 2012

Conducted By: Intellicap
Date: April 2012
Location: Taj Greenlands, Mumbai
No. of Participants /Beneficiaries: Invention Labs (RTBI Incubatee)

Sankalp is a flagship event run by Intellicap, a year-long process of selecting Social impact business ideas and awarding in India's largest forum

RTBI is one of Enterprise partner in Sankalp, Chairman Dr. Ashok Jhunjhunwala was invited to be part of the final Jury. Our incubatee company, Invention Labs won the award for Social impact category for their flagship product Avaz, an artificial speech synthesizer for disabled kids with Cerebral palsy and Autism.

RTBI FORUM MEETINGS

Conducted By: Forum committee and RTBI Council
Date: Once in a month
Location: CSD 308, ESB, IITM or RTBI Office IITM RP
No. of Participants /Beneficiaries: Staff of RTBI

Forum meeting is held every month in RTBI wherein all the employees of RTBI gather to discuss updates, share learning and give feedback. This gives an opportunity for everyone to get a glimpse of the efforts both on incubation as well as on exploratory initiatives. Presentations on various initiatives/field trips/official visits to conferences and workshops are done on a regular basis. Team activities are also conducted to bring about more interaction among different teams. Between April 2011 and March 2012 we have had 7 such forum meetings, where the monthly meetings were merged on some occasions such as RTBI’s Fifth Anniversary.
Monthly Entrepreneurs Meets

Conducted By : Incubation Team  
Date : Once in a month  
Location : IITM RP  
No. of Participants /Beneficiaries : Staff of RTBI

The monthly Entrepreneurs' Meet is a regular gathering organized by RTBI in partnership with IITM's Research Park. The intent of the meets is to bring in veteran and experienced entrepreneurs and have them share with the aspiring entrepreneurs, some of their learnings of running a successful company. Since its inception in May 2010, we have had speakers such as Murugavel Janakiram, founder of Bharat Matrimony, Badri Seshadri of Cricinfo and New Media Horizons, Sekhar Vembu of Zoho, Pravin Sekhar, Founder of Krea and Dorai Thodla, Founder of Imorph, Inc. The meet is a regular occurrence and is scheduled during the third Friday of every month. These events are open to everyone and bring together 50-100 people for each meet.

These events are conducted Monthly Entrepreneur Series talk on the 2nd Wednesday of every month. Last one organized a talk on January 2012, and the speaker was Asif Ali, Founder of ZestADZ mobile ad platform for advertisers and publishers, and sold it to Komli Media in July 2011, currently heading Komli Mobile for Asia Pacific region, a very young, passionate Tech entrepreneur.
Rural Health Care Delivery-
Experiences with ReMeDi Telemedicine Solution
in Southern Tamil Nadu

Authors: V. Thulasi Bai, Suma Prashant, Ashok Jhunjhunwala

Abstract: This paper presents the results of a pilot taken up as a study in effectiveness of delivery of health care by deploying an end to end low cost telemedicine solution using ReMeDi kit (Remote Medical Diagnostics kit) developed by Neurosynaptic Communication Private Limited (NCPL). The low-cost and multi-tasking aspects of the ReMeDi kit make it very attractive to rural healthcare providers and the kit is already being used extensively by other programs in India. Project center's were identified from villages around Tirupathur Taluk, Sivaganga District of South Tamil Nadu based on the need for health care in those villages, availability of the connectivity, availability of a hospital for backend consultation and operational feasibility. The 1st phase of the project began in March 2008 with 6 villages namely Sevalpatti, Sirugudalpatti, Eryinur, Madhavarayanpatti, Velangudi and Valayapatti. This pilot study evaluated the cultural acceptability of tele-health in the villages, scalability of health care delivery, patient traffic per center per month and explored various revenue models to make the project self sustainable. However while completion of the project, the number of centers were reduced to four due to insufficient patient flow reasons varying due to competition from a local rural medical practitioner's, choice of location did not target a significant number in population, took longer time for stability and also attrition of ANM's involved in the centers.

Conference/Publication: Med-E-Tel 2011, Electronic Proceedings of The International eHealth, Telemedicine and Health ICT Forum for Educational, Networking and Business


Real-time Bio-Surveillance Program:
Field experiences from Tamil Nadu

Authors: M. Ganesan, Suma Prashant, N. Janakiraman, Nuwan Waidyanatha

Findings: RTBP researchers conclude the health workers have acquired the ability to enter data through m-HealthSurvey application using mobile phone. However, there are some hurdles that need to be overcome like error rates, which have to be reduced, and simplification of the process of the data entry submission is required to improve real time records counts.

Conference/Publication: “Health, Poverty & Human Development: Perspectives and Issues” by Ulimiri V. Somayajulu, C.P. Prakasam, N. Audinarayana, K.E. Vaidyanathan

ISBN: 978-81-89630-24-9

Full paper: Pg 367- 382 http://rtbi.in/S1.%20N.o.%207.pdf
Experiences with Voice Based Data Entry System over Mobile Phone in Rural India

**Authors:** Ashok Jhunjhunwala, Vasumathi Anandan, Suma Prashant, Umesh Sachdev

**Abstract:** Under the Integrated Child Development Scheme of Govt. of India it was required to monitor the attendance and distribution of supplementary nutrition packets provided to rural women who visited the Anganwadi Centers. However, in Madhya Pradesh where the scheme was implemented, their current system of data collection using paper-based process has its challenges; unmanageable amounts of paper data, too much time consumed in generation and aggregation of reports, inefficiency in flow of information and tampering of data. A voice based system has been developed to support voice biometric and voice based data entry. When this system is substituted for the current paper based data collection processes, it will play a pivotal role in enabling real-time data collection from remote areas thereby reducing discrepancy in data which is most commonly observed in the data collection phase. The innovative use of Modern Voice recognition technologies indicates effective data storage and immediate access of the same. This paper aims to share experiences and the credibility of using the voice biometric system over the mobile phone to capture and monitor Maternal and Child Health data on a real-time basis.

Conference/Publication: Infrastructures for Healthcare: Global Healthcare – 3rd International Workshop

**Full paper:**
http://www.iu-atc.com/publications/Experiences%20with%20Voice%20Based%20Data%20Entry%20System%20over%20Mobile%20Phone%20in%20Rural%20India.pdf

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Dynamic Rural Survey for National Rural Employment Guarantee Scheme in India Using Mobile Phones

**Authors:** Janani Rangarajan, Rajesh Kumar, Sriram Narayanamurthy, Dr. Ashok Jhunjhunwala, Suma Prashant

**Abstract:** National Rural Employment Guarantee Act is a scheme formulated by the Government of India for the uplifting of the poorest of the poor in rural India. It has been implemented in all the states of India. The effectiveness of any scheme, especially one aimed at rural empowerment, can be measured only by studying the impact it has made in changing the lives of the beneficiaries. RTBI had evaluated the impact of NREGA in Tamilnadu by conducting a study. For this study, RTBI used a mobile phone based data gathering system instead of the regular paper based process. This paper will discuss how the questionnaire was developed, the data gathering method and the use of mobile phones as a reliable tool for conducting surveys.

Conference/Publication: Centre for Policy and Research South 6

**Full paper:** http://rtbi.in/Sl.%20No.%20o.%203.pdf
The Use of Mobile Phone as a Tool for Capturing Patient Data in Southern Rural Tamil Nadu, India

**Authors:** M. Ganesan, Suma Prashant, Vincy Pushpa Mary, N. Janakiraman, Ashok Jhunjhunwala and Nuwan Waidyanatha

**Abstract:** The present pilot study was conducted to investigate the effectiveness and efficiency gains in collect outpatient health information from primary health centres and health sub centres through mobile applications for detecting disease outbreaks in near-real-time. The researchers were also interested in evaluating the difficulties in implementing mobile health technology with health workers of lesser technical experience in electronically submitting patient data. “Evaluating a Real Time Biosurveillance Program: A pilot project” was conducted in Thiruppathur block of Sivaganga district in southern rural Tamil Nadu in India from July 2008 to July 2010. During the first year, the researchers and technicians interacted with the health workers to develop the technology. Thereafter, digital data submission using the mHealthSurvey, from the 28 rural health care centres, began in June 2009. The digitized data was analysed for unusual patterns using the TCWI (T-Cube Web Interface). Adverse events detected through TCWI were disseminated via SMS, Email, and Web with the Sahana Alerting Broker web-based software. Averages of 217 health records were collected each day for detection of adverse epidemiological events. A major advantage of the mobile phone patient data collection method was the improved timeliness for real-time detection of any disease outbreak. Besides the delays of digitizing data because of the parallel routine labor intensive paper work, the health workers in Tamil Nadu were able to submit reliable patient health data using mobile phone, which makes it a friendly, efficient, and cost effective tool of data collection.

**Conference/Publication:** Journal of Health Informatics in Developing Countries

**Full paper:** [http://rtbi.in/Si.%20No.%202.pdf](http://rtbi.in/Si.%20No.%202.pdf)

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Prototyping Socio-Technical Systems for Banking Services for Rural India

**Authors:** Timothy A Gonsalves, Yvonne Dittrich, Lakshmi Vaidyanathan, Ashok Jhunjhunwala

**Abstract:** The discussion on ICT for developing countries often focuses on interface design to include marginalized users. However, this is only part of the challenge the development of ICT in such contexts face. Based on two past projects and an ongoing one, this position paper categorizes the diverse challenges the provision of financial infrastructures for rural and underserved societies encounter. Many of these aspects do not become visible in ICT development in Europe or North America. Reflecting the experiences of the Indian projects might not only inform future such projects but also help to uncover and reconsider ‘working relations of technology production and use’ (Suchman) that are often taken for granted.

**Conference/Publication:** Learning from Marginalized Users: Reciprocity in HCI4D, Seattle, Washington, USA.

A Review on Challenges in Implementing Mobile Phone Based Data Collection in Developing Countries

Authors: Mutiah Ganesan, Suma Prashant and Ashok Jhunjhunwala

Abstract: As mobile phones are impregnating developing countries, there has also been a surge on the research of using mobile phone as a tool in solving development problems in the areas such as livelihoods, poverty alleviation, health, education, the environment and disasters. The mobile phone research is being mainly focused on developing a suitable and viable technology for rural development. Collecting and reporting field based statistics using mobile phone is aimed at reducing time latencies between the reporting to and accessing from the database. The present review was mainly focused on socio-technological challenges of mobile phone based data collection in developing countries particularly in rural areas. Mobile phone based data collection can be successfully used by zeroing the challenges by employing the solutions suggested especially for developing countries.

Conference/Publication: Journal of Health Informatics in Developing Countries

WAY AHEAD

With RTBI completing its 6th year on Oct 16th 2012, it is time for annual introspection and planning our way forward. As a business incubator, RTBI has made tremendous progress in incubating companies. As of this year, there have been 25 companies incubated in diverse variety of social and rural inclusive and impacting areas with our closure count remaining at 3. Our extensive improvements in streamlining the online incubation application process and downstream stages have resulted in many entrepreneur applicants from outside the IIT/RTBI arena. Thus process improvements including improved tracking of seed fund repayment schedules have started showing positive impacts in the area of incubation. Meanwhile, exploratory work in the area of agriculture has made tremendous strides with the Tamil Nadu government actively interested in using the work for the benefit of farmers. Exploratory workflow solutions such as the eVS (ecommerce portal for SHGs) and the Controlled Data Access Platform (for Rural BPOs, Translation and Digital publishing) as well as work in the area of Health has gained momentum and cohesion, reflecting in the increasing patent count. Our research team has also made strides in publishing more of the work done at RTBI. RTBI sent in its nomination for the WSIS award for e-enablement (eventually winning the award) and our work using voice biometric for facilitating delivery of maternal and child health service won the Top Innovator award at 2011 mHealth Summit Innovators Challenge organized by Rockefeller Foundation and the mHealth Alliance. That we are making strides is clear.

At the same time, there are challenges to overcome. An important one is the challenge of improving sustainability. This translates into steps to improving fund streams for incubation and exploratory work, establishing a methodology for technology commercialization and entrepreneurial conversion of exploratory ‘project’ work, improving value for our incubatees and most importantly strengthening our team leadership and management capabilities at multiple levels. From an external impact perspective, with the governmental structure of not-for-profit institutions undergoing changes, there are impacts that need to be better understood.

As an incubator attached with IIT Madras, RTBI has taken mini steps in working with the IIT communities in terms of the joint hosting of Genesis - the IIT Business Plan contest, participation in IIT workshops, collaboration with iViL community for eVS, assisting with IIT student interning on projects at RTBI, etc. This year, RTBI aims to improve its interaction and align more closely to IIT, increasing interactions with students and faculty in a much more systematic way.

Challenges are meant to be overcome. With a strong and committed team, it has resilience and flexibility at the helm. Further, with our plans to expand the Administrative Council with new members bringing in fresh thinking. RTBI will adapt, change and make strides forward again.

Lakshmi Vaidyanathan
The Members
IITMS Rural Technology Business Incubator (RTBI)
Chennai – 600 006.

Dear Sirs,

1. We have completed the audit of IITMs Rural Technology Business Incubator (RTBI) accounts and enclose the Balance Sheet as at 31st March, 2012 together with the Income and Expenditure Account for the period ended on that date duly signed by us under a reference to this letter. These financial statements are the responsibility of the management of the Society. Our responsibility is to express an opinion on these financial statements based on our audit.

2. We conducted our audit in accordance with the auditing standards generally accepted in India. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free of material misstatements. An audit includes examining on a test basis, evidence supporting the amounts and disclosures in the financial statements. An audit also includes assessing the accounting principles used and significant estimates made by the members, as well as evaluating the overall financial statement presentation. We believe that our audit provides a reasonable basis for our opinion.

3. We report that:

   (a) We have obtained all the information and explanations which, to the best of our knowledge and belief, were necessary for the purposes of our audit;

   (b) In our opinion, proper books of account have been kept by the Society, so far as appears from our examination of the books;

   (c) The Balance Sheet, Receipts & Payments Account and Income and Expenditure Account dealt with by this report are in agreement with the books of account;

   (d) In our opinion, and to the best of our information and according to the explanations given to us, the Balance Sheet gives a true and fair view of the state of affairs of the Society as at 31st March 2012, the Receipt and Payment Account and the Income and Expenditure Account gives a true and fair view of the transactions for the period ended on that date.

For SIVASUBRAMANIAN & RAO,
Chartered Accountants.
Firm Reg No: 003904 S

Place: Chennai.
Date: 22.08.2012

(G. SIVASUBRAMANIAN)
Partner.
M.No.22806.
## Balance Sheet

<table>
<thead>
<tr>
<th>SCHEDULE</th>
<th>As at March 31, 2012</th>
<th>As at March 31, 2011</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Rs.</td>
<td>Rs.</td>
</tr>
<tr>
<td><strong>SOURCES OF FUND</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Corpus Fund</td>
<td>717,741</td>
<td>717,741</td>
</tr>
<tr>
<td>Specific Grants / Fund</td>
<td>1</td>
<td>9,448,730</td>
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<tr>
<td>Capital Fund</td>
<td>2</td>
<td>2,171,667</td>
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<tr>
<td>Seed Fund</td>
<td>3</td>
<td>11,577,010</td>
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<tr>
<td>General Fund</td>
<td>4</td>
<td>9,402,641</td>
</tr>
<tr>
<td>Current Liabilities</td>
<td>5</td>
<td>1,609,077</td>
</tr>
<tr>
<td><strong>TOTAL</strong></td>
<td><strong>34,926,866</strong></td>
<td><strong>33,869,544</strong></td>
</tr>
</tbody>
</table>

| **APPLICATION OF FUND** |                  |                     |
| Fixed Assets           | 6  | 2,269,987       | 2,748,961           |
| Loans to Incubatees    | 7  | 11,831,450     | 5,107,460           |
| Investments on Incubatees | 8 | 395,560       | 366,050            |
| Current Assets         | 9  | 20,429,869     | 25,647,073          |
| **TOTAL**              | **34,926,866**    | **33,869,544**     |

**Notes to the accounts - Sch 10**

As per our report of even date
For **SIVASUBRAMANIAN & RAO**
Chartered Accountants

G. SIVASUBRAMANIAN
M.No. 22806
Date: 22-05-2012
Place: Chennai

For IITMs Rural Technology and Business Incubator
Dr. Ashok Jhunjhunwala
Chairman
Ms. Lakshmi Vaidyanathan
Director
## Income and Expenditure Account

<table>
<thead>
<tr>
<th>PARTICULARS</th>
<th>SCHEDULES</th>
<th>YEAR ENDED MARCH 31, 2012</th>
<th>Rs.</th>
<th>YEAR ENDED MARCH 31, 2011</th>
<th>Rs.</th>
</tr>
</thead>
<tbody>
<tr>
<td>INCOME</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>NREGA Research from UNDP/MoRD</td>
<td></td>
<td>1,296,000</td>
<td></td>
<td>1,379,950</td>
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<tr>
<td>Grants received</td>
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<td>2,259,869</td>
<td></td>
<td>3,840,996</td>
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<tr>
<td>Consultancy fee</td>
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<td>184,720</td>
<td></td>
<td>25,000</td>
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<tr>
<td>Micellaneous Income</td>
<td></td>
<td>151,286</td>
<td></td>
<td>95,220</td>
<td></td>
</tr>
<tr>
<td>Interest on Loan to Incubatee</td>
<td></td>
<td>298,252</td>
<td></td>
<td>-</td>
<td></td>
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<tr>
<td>Bank Interest (Net)</td>
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<td>305,966</td>
<td></td>
<td>427,868</td>
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<tr>
<td>Incubation Support Services</td>
<td></td>
<td>-</td>
<td></td>
<td>678,000</td>
<td></td>
</tr>
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<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>TOTAL INCOME</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td><strong>4,496,093</strong></td>
<td></td>
<td><strong>6,447,034</strong></td>
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<tr>
<td>EXPENDITURE</td>
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<td>Consultancy fee</td>
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<td>Office AC and Electricity</td>
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<td>259,010</td>
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<td>Office Rent and Maintenance</td>
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<td>472,524</td>
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<tr>
<td>Travel expenses</td>
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<td>17,757</td>
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<td>Material, software license</td>
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<td>822,377</td>
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<tr>
<td>Research and marketing fee</td>
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<td>1,036,800</td>
<td></td>
<td>550,000</td>
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<tr>
<td>Administration charges</td>
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<td>92,588</td>
<td></td>
<td>46,685</td>
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<tr>
<td>Communication and connectivity</td>
<td></td>
<td>52,987</td>
<td></td>
<td>109,606</td>
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<tr>
<td>Depreciation</td>
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<td>59,686</td>
<td></td>
<td>133,723</td>
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<td></td>
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<td><strong>2,150,396</strong></td>
<td></td>
<td><strong>3,286,653</strong></td>
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<tr>
<td>EXCESS OF INCOME OVER EXPENDITURE</td>
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<tr>
<td></td>
<td></td>
<td><strong>2,345,697</strong></td>
<td></td>
<td><strong>3,180,381</strong></td>
<td></td>
</tr>
</tbody>
</table>

Notes to the accounts - Sch 10

As per our report of even date
For SIVASUBRAMANIAN & RAO
Chartered Accountants

G. SIVASUBRAMANIAN
Partner
M.No. 22806
Date: 22.08.2012
Place: Chennai

For IITMS Rural Technology and Business Incubator

Dr. Ashok Jhunjhunwala
Chairman

Ms. Lakshmi Vaidyanathan
Director
## Receipts and Payments Account for the period from 01.04.2011 to 31.03.2012

<table>
<thead>
<tr>
<th>Receipts</th>
<th>Amount</th>
<th>Payments</th>
<th>Amount</th>
</tr>
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<tbody>
<tr>
<td><strong>Specific Project Grants / Funds</strong></td>
<td></td>
<td><strong>Business Incubation</strong></td>
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</tr>
<tr>
<td>- DST, New Delhi - Incubation</td>
<td>4,472,128</td>
<td>- DST Incubation support</td>
<td>3,977,888</td>
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<tr>
<td>- TDB, Gol, New Delhi</td>
<td>2,888,147</td>
<td>- TDB Seed Support</td>
<td>6,000,000</td>
</tr>
<tr>
<td>- MSME, Gol, New Delhi</td>
<td>1,494,586</td>
<td>- MSME Seed Support</td>
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<td>- DST - IUATC project</td>
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<td>- Incubation Overheads</td>
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<td>- NIXI, Gol, New Delhi</td>
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<td>- Incubatee reimbursement</td>
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<tr>
<td>- Incubatee Contribution</td>
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<tr>
<td><strong>Foreign Contribution</strong></td>
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<td><strong>Exploratory / Research</strong></td>
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<td>- RTI, USA</td>
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<td>- DST - IUATC project</td>
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<tr>
<td>- Xerox, USA</td>
<td>1,843,444</td>
<td>- Xerox Project</td>
<td>2,380,920</td>
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<td></td>
<td></td>
<td>- Care Project</td>
<td>580,120</td>
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<td></td>
<td></td>
<td>- NAIP Agri Advisory Service</td>
<td>3,408,543</td>
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<tr>
<td></td>
<td></td>
<td>- NIXI - Namma Ooru</td>
<td>1,879,384</td>
</tr>
<tr>
<td><strong>Other Funds</strong></td>
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<td></td>
<td></td>
</tr>
<tr>
<td>- MoRD - NREGA appraisal</td>
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<td></td>
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<tr>
<td>- Professional Consultancy</td>
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<tr>
<td>- Other receipts</td>
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</tr>
<tr>
<td><strong>Bank Interest</strong></td>
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<tr>
<td><strong>Sundry Advances (Net)</strong></td>
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<tr>
<td><strong>Opening Balances</strong></td>
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<td><strong>Closing Balances</strong></td>
<td>13,735,865</td>
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<tr>
<td>- Cash at Bank</td>
<td>23,484,972</td>
<td>- Cash at Bank</td>
<td>13,735,865</td>
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<tr>
<td>- Cheque in transit</td>
<td>1,159,200</td>
<td>- Short Term Deposits</td>
<td>6,000,000</td>
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<td><strong>TOTAL</strong></td>
<td>45,364,742</td>
<td><strong>TOTAL</strong></td>
<td>45,364,742</td>
</tr>
</tbody>
</table>

As per our report of even date
For SIVASUBRAMANIAN & RAO
Chartered Accountants

G. SIVASUBRAMANIAN
Partner
M.No. 22806
Date: 22.06.2012
Place: Chennai

For IITMS Rural Technology and Business Incubator

Dr. Aashok Jhunjhunwala
Chairman
Ms. Lakshmi Valdyanathan
Director

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