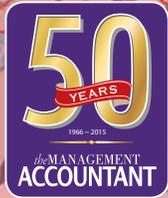


the MANAGEMENT ACCOUNTANT

THE JOURNAL FOR CMAs

OCTOBER 2015 VOL. 50 NO. 10 ₹100



DIGITAL REVOLUTION IN INDIA



THE INSTITUTE OF COST ACCOUNTANTS OF INDIA
(Statutory body under an Act of Parliament)

www.icmai.in

ADMISSION ANNOUNCEMENT

Become a Qualified CMA and Add Value to Your Career

The Institute of Cost Accountants of India is a premier professional Institute and a statutory body constituted under an Act of Parliament namely the Cost and Works Accountants Act, 1959 to regulate and develop the profession of Cost and Management Accountancy in the Country. The Institute is at the forefront for grooming the professionals to take up the challenges in the areas of Management Accounting, Resource Management, Performance Management, Financial Reporting and Strategy, Valuation Management, Risk Management, Enterprise Governance, Audit and Assurance, Taxation and Cost Management across wide spectrum of industry in the manufacturing, service and other sectors of the economy.

Role of CMAs

Corporate decision making

Resource management

Performance management

Financial reporting & strategy

Optimization of Stakeholders value

Risk management

Enterprise governance

Audit assurance & taxation

Sustainable development

Corporate social responsibility

Last date for admission :

For December 2015 Examination:
31st July 2015

For June 2016 Examination:
31st January 2016

Freedom to Pursue

- ▶ Employed persons can join and pursue the course simultaneously.
- ▶ Can be pursued along with other full time studies.
- ▶ Can be pursued through Distance Learning Mode from anywhere in India
- ▶ Option for Oral Coaching through experienced faculties at four Regional Councils and selected Chapters across the Country.
- ▶ Option to write the examination in Hindi medium
- ▶ An excellent record of campus placement.
- ▶ Admission open through out the year.

Eligibility

COURSE	FOR ADMISSION	FOR APPEARING IN EXAMINATION
Foundation	10th Pass	12th Pass
Intermediate	Foundation (pass) or Graduate (pass or appearing)	Foundation (pass) or Graduate (pass)

Tuition Fee Structure

FOUNDATION COURSE	INTERMEDIATE COURSE	FINAL COURSE
₹4,000/-	₹20,000/-	₹17,000/-

Practicing Areas for Cost Accountants

(A) Audit under different statutes & authorizations

- Cost Audit under Companies Act
- Compliance Audit
- Internal Audit
- Stock Audit, Forensic Audit and Concurrent Audit of bank
- Audit under Value Added Tax Act/Rule of States
- Special Audit under Central Excise Act
- Special Audit under Service Tax Act
- Customs valuation under Customs Act
- Certified Facilitation Centre's (CFCs)-under ACES-CBEC scheme
- Cost and Management Accounting Consultancy
- Management Consultancy work

(B) Certification of various returns/ forms prescribed by various Ministries & Departments of Government of India

- Ministry of Commerce
- Ministry of Consumer Affairs, Food & Public Distribution
- Ministry of Corporate Affairs
- Ministry of Finance
- Ministry of Textiles
- Directorate General of Foreign Trade (DGFT)
- Fertilizer Industry Coordination Committee (FICC)
- National Pharmaceutical Pricing Authority (NPPA)

For prospectus and other admission details, contact four Regional Councils at Chennai, Delhi, Kolkata, Mumbai and our Chapters in almost 100 cities all over the country.'



THE INSTITUTE OF COST ACCOUNTANTS OF INDIA (Statutory Body under an Act of Parliament)

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BEHIND EVERY SUCCESSFUL BUSINESS DECISION, THERE IS ALWAYS A **CMA**



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The Institute of Cost Accountants of India

THE INSTITUTE OF COST ACCOUNTANTS OF INDIA (erstwhile The Institute of Cost and Works Accountants of India) was first established in 1944 as a registered company under the Companies Act with the objects of promoting, regulating and developing the profession of Cost Accountancy.

On 28 May 1959, the Institute was established by a special Act of Parliament, namely, the Cost and Works Accountants Act 1959 as a statutory professional body for the regulation of the profession of cost and management accountancy.

It has since been continuously contributing to the growth of the industrial and economic climate of the country.

The Institute of Cost Accountants of India is the only recognised statutory professional organisation and licensing body in India specialising exclusively in Cost and Management Accountancy.

MISSION STATEMENT

The CMA Professionals would ethically drive enterprises globally by creating value to stakeholders in the socio-economic context through competencies drawn from the integration of strategy, management and accounting.

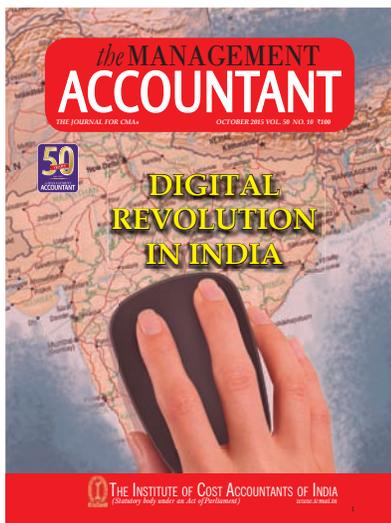
VISION STATEMENT

The Institute of Cost Accountants of India would be the preferred source of resources and professionals for the financial leadership of enterprises globally.

IDEALS THE INSTITUTE STANDS FOR

- to develop the Cost and Management Accountancy profession
- to develop the body of members and properly equip them for functions
- to ensure sound professional ethics
- to keep abreast of new developments

*Behind every successful business decision,
there is always a CMA*



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“CMAs can study the pattern for cost of generation, identifying inefficiencies in cost management, eliminate inefficiencies will help reduce the costs significantly”

CMA Anil Sardana, CEO & MD, Tata Power

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Greetings!

Digital India is an initiative of Government of India to integrate the government departments or jurisdictions and the people of India. Digital India is an umbrella program which will restructure and re-focus several existing schemes to bring in a transformative impact. The vision of Digital India programme also aims at inclusive growth in areas of electronic services, products, manufacturing and job opportunities etc. It is centered on three key areas -

- I. Digital Infrastructure as a utility to every citizen
- II. Governance & services on demand
- III. Digital Empowerment of citizens

Impact of Digital India

- According to a recent McKinsey report, Digital India would help the country to boost GDP up to \$1 trillion by 2025.
- The Digital platform could create employment opportunities. The Digital India project itself will create employment opportunities for Direct 1.7 Cr. and Indirect at least 8.5 Cr. which will help in fighting against unemployment problems in India.
- Country can get benefited in many sectors, such as agriculture, rural E- education, etc.
- Digital platform could establish e-Governance & e-Services across India.
- High speed internet shall be made available in all rural villages in India as a result imbalanced growth in the rural and urban areas can be removed.
- The poor literacy rate in India is due to unavailability of physical infrastructure in rural and remote areas. In this juncture, m-Education services, high speed internet can play an important role by reaching remote masses.
- Through the mobile and internet banking, the dream each person having a bank account could be achieved.
- Digital India encourage education and knowledge sharing procedure which impact on the quality of life

and lead to social modernization.

- In Digital platform the next generation technologies could help in lowering the carbon footprint by reducing fuel consumption, waste management, greener workplaces and thus leading to a greener ecosystem.
- The Digital platforms through Digital Inclusion could save time and reduce unnecessary costs in near future.

Challenges to implement Digital India Project:

High cost of implementation: Approximate cost of implementing this immense project is Rs. 100,000 Cr in ongoing schemes and Rs. 13,000 Cr for new schemes & activities.

Coordination problem: Accomplishment of this program requires participation of several departments and demanding efficient inter-governmental coordination. So quality Leadership and support of all the involved departments are very crucial.

Infrastructure: To achieve this project India will need massive Data Centres to hold the data of entire country and infrastructural development in rural India is very much required as the physical infrastructure at customer premises are unaffordable by most of the rural Indians. The government needs to realise the strong capability being built in the private sector and needs to leverage that.

Cyber security: We have seen several incidences of cybercrime on corporate and individual level during the past few years. Hence, the Digital India project demands very strong network security at all levels of operation.

This issue also presents a good number of articles on the cover story theme 'Digital Revolution in India' by distinguished experts and authors as well as an interview from industry stalwart. We look forward to constructive feedback from our readers on the articles and overall development of the journal. Please send your mails at editor@icmai.in.

We thank all the contributors to this important issue and hope our readers enjoy the articles.

PRESIDENT'S COMMUNIQUE



Industry-Institute relationship will be strengthened with more and more initiatives like CFO/HR meets

CMA Pramodkumar Vithaldasji Bhattad
President
The Institute of Cost Accountants of India

You have the right to work, but never to the fruit of work. You should never engage in action for the sake of reward, nor should you long for inaction.

Bhagwad Gita

My Dear Professional Colleagues,

Namaskaar.

CFO/HR Meets

As part of our resolve to further strengthen our linkage with the Industries, CFO/HR Meets were organised at Chennai, Mumbai, Delhi and Kolkata by the Training and Placement Department of the Institute. During these events I could meet around 150 Top leaders from the Industry and hear their expectations from the Institute. The deliberations of these meets will be taken to its logical conclusions and I assure that the Industry-Institute relationship will be taken to different levels with more and more such initiatives.

15 Days Pre-Placement Orientation and Campus Placement Program

The Institute has been taking various steps to enhance the professional and employable skills of the June 2015 final qualified students. As part of this initiative, for the first time, 15 days Pre-Placement Orientation Program was conducted at eight locations by the Training and Placement Department of the Institute to provide maximum mileage to the students for facing their post qualification professional life. I had interacted with most of the participants during this program to understand their reactions and feedback. Apart from these initiatives, department has also planned the Campus Placement Programs for the June 2015

final qualified students during the months of October and November 2015 at different locations across the country. I wish success to all the students participating in this Program and trust they would find their future through this initiative.

Matters relating to CRA-4

Form CRA-4 was issued by the MCA on 11th September 2015 and due to some anomalies represented by the Institute, the same was revised and again uploaded on 25th September 2015. There were still some issued involved with this. Again on Institute's representation relating to issues with CRA-4, the MCA has advised the Companies filing Cost Audit Reports in CRA-4 to raise the "Ticket" for their queries on filing of CRA-4 on the MCA website. As informed by Cost Audit Branch, the queries are attended by the MCA Help Desk on Hourly basis. The Institute is in constant touch with the Ministry to resolve the other related issues.

Empanelment of Cost Accountants as Arbitrators

I am pleased to inform you that on the representation sent by the PD Department of the Institute, the Indian Council of Arbitration has authorized Cost Accountants and Cost Accounting Firms for empanelment in the panel of arbitrators under the category of financial experts. I urge upon the members who are desirous to be empanelled as Arbitrators may send their application to the Indian Council of Arbitration.

PRESIDENT'S COMMUNIQUE

Government notifies Cost Auditing Standards

In a much awaited development, Government of India, Ministry of Corporate Affairs, on 10th September, 2015 granted Central Government's approval to the FOUR Cost Auditing Standards. These Standards have come into force with immediate effect.

Administration Department

I am pleased to inform that process for 13th National Awards for Excellence in Cost Management has been started. A screening committee under the Chairmanship of Dr. Ashok Haldia has been formed. The necessary questionnaire for the purpose shall be hosted on the website very soon.

Advanced Studies

The Directorate of Advanced studies has concluded the admission to its second batch of its three advanced diploma courses namely, Business Valuation, Internal Audit and IS Audit and Control. My best wishes to all those members who have enrolled for the courses.

Continuing Professional Development Department

CMAs interested to act as Speaker/ Presenter in the CPD Programs / Webinars may please come forward to contribute to the profession by supporting the CPD Programmes/Webinars of the Institute. The Committee invites brief profile of the interested members for empanelment of Technical Experts. For details, please visit the website of the Institute. The Committee announced "Corporate Cost Management Week" on the theme 'Business Excellence through Cost Management' during 12-18 October 2015 across country.

Examination Department

Results of Foundation online examination held on 19th September 2015 were declared on 22nd September 2015. 32.1 % of examinees passed the examinations of this term. I congratulate the students who passed the examination and welcome them to CMA course. I hope they will succeed in their endeavor with dedication and hard work.

ICWAI MARF Programs

I wish to inform that during the month program for the officers of NBBC Ltd was organised on "Indian Accounting Standards (IND ASs)" at New Delhi.

Another program on the topic was organized at Hyderabad. Program on "Advance Tax, TDS and Tax Planning" and "Contracts and their Management" were organized at Goa. A workshop for the executives of CPSEs and SLPEs was organized for Department of Public Enterprises on "International Financial Reporting Standards (IFRS) & Indian Accounting Standards (IND ASs)" at New Delhi.

International Affairs Department

Chairman, WTO, International Affairs and Sustainability Committee of the Institute attended a meeting with the representatives of ACCA at New Delhi on 9th September 2015 to discuss the progress made in implementation of MOU. Senior officials of the Institute also attended the meeting. The Institute in association with its Overseas Centers has launched a "CMA Global Connect Series of Webinars" and the first webinar was organized on 12th September 2015. I am thankful to the Toronto and American Overseas Centers of the Institute for taking this initiative. The meeting of PAIB of IFAC was held at New York and attended by the Institute's representatives. Next SAFA Events are scheduled to be held at Dhaka, Bangladesh and that of CAPA at Seoul, Korea. Institute will be duly represented in these events.

Membership Department

In its drive to increase the membership base, department is following up with persons whose names have been removed from the Register of members, owing to non-payment of fees, to apply for Restoration of membership. To avail of the benefits of membership, I call upon final passed students having required experience, to apply for Associate membership of the Institute. Steps are being taken by the Members' Facilities & Services Committee to simplify and increase the online facilities available on the Institutes website for members.

Professional Development Department

The PD department is in process of bringing out guidance notes on the topics which are important to the CMA profession.

Research & Journal Department

It is heartening to know that the Directorate in association with Department of Commerce, Malda College

The Institute in collaboration with WBSRLM has been successfully conducting training programs on 'Introducing Community Audit for SHGs' through CMAs as Master Trainers in 19 districts of West Bengal, in 18 different venues and so far trained about 1500 women participants to create a pool of efficient Community Auditors for SHGs across the state.

organized a two-day UGC sponsored National Seminar on "Financial Inclusion: Challenges and Prospects" at Malda College, West Bengal on September 12 and 13, 2015. The training program on 'Introducing Community Audit for SHGs' with the assistance of WBSRLM, was successfully conducted. This six days residential training program was conducted by sixty CMAs (Qualified and Intermediate) as Master Trainers in 19 districts of West Bengal in 18 different venues and trained about 1500 women participants to create a pool of efficient Community Auditors for SHGs. ASSOCHAM and Institute jointly organized the summit "Ease of Doing Business: Unfinished Agenda" in New Delhi on September 15, 2015. Knowledge Study Report "Ease of Doing Business: Unfinished Agenda" prepared by the Directorate of Research & Journal of the Institute got released during the summit. A National Skill & Entrepreneurship Development Program was held at Howrah organized jointly by National Skill Development Agency (NSDA) and the Institute in coordination with Entrepreneurship Development Institute of India, (EDI), Gujarat. Department also arranged a Round Table Discussion on "Financial Inclusion: are we still far ahead" jointly organized by University of Calcutta, Calcutta Stock Exchange Centre of Excellence in Financial Markets and the Institute.

Tax Research Department

The department is organizing programs and seminars on pan-India basis on GST and the issues relating to it. The members are advised to attend these programs in order to update their knowledge.

Technical Department

Cost Accounting Standards Board: I wish to inform you that the Cost Accounting Standards Board of the Institute in its 79th meeting held on 18th September 2015, has released the Exposure Draft of CAS-3 on Production and Operation Overheads (Revised 2015) for public comments / suggestions. I request all of you

to send your views / suggestions to the CASB Secretariat for further improvement before the last date. The draft is available on the CASB webpage. The Board has also issued the statement of Mandatory Application of CASs with dates for the information of the members. The statement is also available on the CASB Webpage.

Cost Auditing Standards Board: The Cost Auditing Standards Board of the Institute has also met on 19th September 2015 and has approved the release of Exposure Draft of Cost Auditing Standard on Audit Evidence which shall be hosted on the website shortly. In view of issuance of FOUR Cost Auditing Standards duly approved by the Government and also setting up target for release of at least 15 more Cost Auditing Standards before 31st March 2016, the Board is working overtime and has also drawn up a roadmap to achieve the target.

I wish prosperity and happiness to members, students and their family on the occasion of Gandhi Jayanti, Durga Puja, Dasshera and Laxmi Puja.

With warm regards,



(CMA P.V. Bhattad)

1st October 2015

Round Table Discussion on “Financial Inclusion”



A Round Table Discussion on “Financial Inclusion: are we still far ahead!” had been organized by the Directorate of Research and Journal of the Institute on September 28, 2015 at EIRC Auditorium of the Institute. Shri B. Madhav Reddy, President, Calcutta Stock Exchange being the chief guest deliberated on the topic in details. He stressed on the importance of payment banks which necessarily would play the role as a big game changer as far as Indian habits and the Indian economy are concerned. He expressed his satisfaction on the reduction in the percentage of NPAs in Microfinance Institutions. Shri Sukamal Basu, Ex CMD, Bank of Maharashtra said that India being a paradoxical country, there exists a huge difference between the rich and the poor. He firmly believes the need of financial literacy to the poor sections of the society to reach the downtrodden. He also stressed on the attitude change of the banks which have become mainly profit motive. He regretted the fact that the banks have forgotten the jargon to serve the poor. He narrated the famous quote of Swami Vivekananda - If the poor boy cannot come to education, education must go to him and said that financial literacy must prevail in each and every section of the society to make financial inclusion effective. He also emphasised that the Institute should come forward and play its role in this regard. Dr. Tanupa Chakraborty, Assistant Professor, Department of Commerce, University of Calcutta said although RBI is spearheading in the right direction and certain initiatives have been undertaken like Business Correspondence Model to boost financial inclusion in India yet these are not sufficient enough. The supply side is abundant but there is a scarcity in the demand aspect that needs to be taken care of and to make the people aware in this aspect she thinks that political contribution could play a big role. CMA Biswarup Basu (Council Member) and CMA Arup Shankar Bagchi, Director (Membership) of the Institute also shared in brief their views on the concerned theme. Prof. Dhruba Ranjan Dandapat, Department of Commerce, Calcutta University being the moderator of the session highlighted his ideas on the discussion. At the end there was a questionnaire session beautifully resolved by the eminent dignitaries on the dais. Dr. Ashis Kr. Sana, Associate Professor, Calcutta University concluded the programme with the vote of thanks.

theMANAGEMENT ACCOUNTANT

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PAPERS INVITED

Cover stories on the topics given below are invited for 'The Management Accountant' for the four forthcoming months.

Issue Month	Themes	Subtopics
November 2015	Cost Management Strategy for Economic Sustainability	<ul style="list-style-type: none"> • Tourism & Hospitality industry • MSME sector • Telecom industry • Healthcare sector • Education sector • Insurance sector • Transport secto
December 2015	Green Accounting and Sustainability	<ul style="list-style-type: none"> • Welfare measurement and reporting practices • Health, Safety and Environmental (HSE) Reporting • Environmental accounting (EA) and auditing • Green Accounting for Corporate Sustainability • Current practice and future prospects of EA • Green issues in developing countries • Green Accounting and Role of CMAs
January 2016	Strengthening Indian Banking System	<ul style="list-style-type: none"> • Cure to stressful assets • Strategic Cost Management • Basel Accords & Risk Management • Project Financing • Forensic Accounting and Auditing • SME Lending Models of Public sector banks • Emerging areas like Small / Payment / Mudra Banks • Role of CMAs
February 2016	Agricultural Innovation and Sustainability	<ul style="list-style-type: none"> • Agricultural entrepreneurship • Agro-tourism • Organic farming • Innovation, productivity & food security • Sustainability indicators • Role of co-operatives • Agricultural Value Chain Development • Agro-producers and Supermarkets in India

The above subtopics are only suggestive and hence the articles may not be limited to them only.

Articles on the above topics are invited from readers and authors along with scanned copies of their recent passport-size photograph and scanned copy of declaration stating that the articles are their own original and have not been considered for publication anywhere else. Please send your articles by e-mail to editor@icmai.in in latest by the 1st of the previous month.



Directorate of Research & Journal

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ICAI-CMA SNAPSHOTS



Shri Arvind Kejriwal, Hon'ble Chief Minister, Govt. of NCT of Delhi with CMA Manas Kumar Thakur, Vice President of the Institute in a discussion at the summit on "Ease of Doing Business: Unfinished Agenda" held on September 15, 2015 in New Delhi.



CMA R S Sharma, Former CMD ONGC, Chairperson, Quality Review Board of ICAI, met Shri Tapan Ray, IAS, Secretary, Government of India, Ministry of Corporate Affairs, on 21.09.2015 in New Delhi to discuss QRB related issues.



Release of the Knowledge Study Report at the summit "Ease of Doing Business: Unfinished Agenda" in New Delhi jointly organized by the Associated Chambers of Commerce and Industry of India and the Institute on September 15, 2015.

From Left: Dr Lalit Khaitan, Chairman NRD, ASSOCHAM, Shri D S Rawat, Secretary General ASSOCHAM, Shri Arvind Kejriwal, Hon'ble Chief Minister, Govt. of NCT of Delhi, CMA Manas Kumar Thakur, Vice President of the Institute, Shri K K Sharma, IAS, Chief Secretary, Govt of NCT of Delhi.

ICAI-CMA SNAPSHOTS



CMA P.V. Bhattad, President, CMA Kunal Banerjee, Former President, Council Members and other Regional Council Members of the Institute during the inaugural session of 'Pre Placement Orientation Programme' and seminar on 'Costing Taxonomy & e filing of the Cost Audit Report'.



CMA P.V. Bhattad, President of the Institute addressing the gathering at 'Meet the President' program on September 5, 2015 at Chennai.



CMA K. Suryanarayanan, Chairman, PD, Taxation & Task Force addressing at the PD Meet on 'An Insight into AS-18 (Related Party Transactions/Disclosures)'.

From Left: CMA H. Padmanabhan, Council Member, CMA M P Vijay Kumar, CFO, Sify Technologies Ltd, Speaker and CMA P. Raju Iyer, Council Member



CMA K. Sanyasi Rao, Chairman, SIRC lighting the traditional lamp during oral coaching inauguration. From Left: CMA Sankar P. Panicker, Chairman, Students' Facilities, Coaching Administration & Skill Development and Smt. Jyothi Satish, Chairman, IT and Infrastructure & Women's Wing.



The Institute organized CFO/HR Summit on 'Conversion of Potential Talent to Required Talent' held at New Delhi on September 19, 2015.



Digital Marketing of Drugs: A Paradigm Shift

Pharma companies are increasingly looking to cut corners as a major part of their budget is expended on sales reps. Digital marketing has emerged as a worthy alternative and the companies are warming up to it.



Somnath Mukherjee
Vice President
Healthcare & Life Science
ValueLabs LLP, Kolkata

Socio-economic structures and the global demographic context are dramatically changing in the pharmaceuticals business. A June 2007 report by PricewaterhouseCoopers (PwC), titled Pharma 2020: The Vision, identified seven reasons for the change. These include the soaring burden of chronic diseases, increasing influence of healthcare policy-

makers and payers on what a doctor can prescribe, rising instances of pay for performance, blurring boundaries between different healthcare forms, highly varied markets of the developing world, where the demand for medicines is likely to grow exponentially over the next 13 years, governments beginning to focus on prevention rather than treatment (investment in preemptive measures yet to happen), and regulators becoming more risk averse.

All these challenges, needless to say, have a direct impact on how drugs are sold in the market. To add to these, another important area is to identify the alternate marketplace of an out-patented drug. As a result, it is becoming increasingly important to define appropriate markets and an effective sales strategy for pharma products, an optimal sales and marketing strategy that can minimise the risk associated with the said challenges.

Obsolescence of sales reps

The pharma industry has traditionally worked to promote its products through campaigns. A PwC survey observed that between 1996 and 2005, the total real spending on pharma promotions rose from \$11.4 billion to \$29.9 billion in the US. As a result, till very recently, pharma companies used to spend 40 percent of their marketing budget on sales representatives. Many of the biggest companies are now saturated with sales reps and their selling techniques are increasingly becoming ineffective. No surprise that the pharma lobby has initiated several measures to reduce overheads associated with sales reps.

Pfizer, for instance, started this trend in 2005, and many other organisations followed suit. The industry eventually shed nearly 60,000 positions by the end of 2006. To find an alternative marketing means, John Mack, reported in *Pharma Marketing News* 2014, that in the Cegedim Strategic Data (CSD) Audit, 20 pharma companies that spent the most on total promotion—which includes traditional professional detailing, e-detailing, direct-to-consumer (DTC) advertising, professional meetings, and journal advertising—spent \$14,784 billion in 2013. This does not include the cost of supplying drug samples.

Digital marketing and beyond

The key question, therefore, is to find the new avatar

of pharma marketing. But before we jump to a conclusion, let us further analyse the major trends in this space in 2015. As these trends significantly impact marketing strategies, the question really is whether the landscape has changed at all since 2006. The answer is an emphatic 'yes' and there are five major trends through which the change manifested itself.

Trend 1:

Rapid shift in consumer behaviour with increased proliferation of the internet, mobile technologies and social media. Changing patient/doctor behaviour demands a move to multichannel selling models, informed by deep customer analytics.

Trend 2:

Price pressures, reducing sales force effectiveness, and increasing cost of interaction, demands an innovative commercial platform that is enabled by an intensive digital and multichannel framework.

Trend 3:

Social media providing a wealth of untapped and unstructured data on consumers. Companies seek ways to 'simplify' the information, processes and services in this space.

Trend 4:

The risk of a lot of medical reps losing their jobs over the next few years because of high costs. Healthcare, as outlined by PwC, will go on to become completely patient-centric by 2020. Keeping the patient at the centre, the concentric circle will comprise of the pharma value chain, the payer and the provider. In 2006, it was more of three separate units trying to build a model, without having adequate coordination between them. The units, by 2020, will be connected with seamless data exchange systems.

Keeping all these trends and changes in perspective, the pharma industry—in collaboration with information technology (IT)—has come forward to create a transformational business model, one that would take complete ownership of people, processes and tools, and provide an end-to-end solution for pharma companies in the areas of sales and marketing. For pharma companies, this solution should be based on a 'commercially aligned' and 'customer centric' business model so that they can outsource their sales and marketing process from start to finish.



Essentially, this solution would have building blocks that include a digital marketing framework (CRM/SFA, sales analytics, social media analytics, mobility solutions), contract sales organisation (for improvement in sales force effectiveness), an MCM framework (MCM, campaign management and reporting), hosting (SFA and core apps), and other BPO/KPO services.

Multichannel marketing and business benefits

With this proposed solution of marketing enablement, there is expected to be a distinctive value proposition. As indicated before, the fundamental objective of this model is to enable pharmaceutical sales and marketing organisations with a technologically forward, commercially aligned and customer centric business model. This would help them to measure and continuously improve their sales and marketing initiatives leading to simplified processes, increased return on investments, enhanced sales force effectiveness, and improved relationship with all stakeholders in the pharma ecosystem, including physicians and patients. Some of the resultant business benefits are as follows.

Identification:

A transformational business model that would enable clients to have a commercially-aligned, collaborative and streamlined environment, and greater flexibility to adapt to changes in interactions with customers.

Management:

End-to-end outsourced sales and marketing processes, data consolidation from various key stakeholders of the pharma ecosystem, employing business analytics on the data to derive meaningful

information that can be acted upon.

Tracking and reporting:

Establishing essential key performance indicators (KPIs) to track and continuously improve on benefits; accurate and simplified reporting, i.e. reporting as a service.

Recognition:

Simplified processes, increased return on investments, enhanced sales force effectiveness and improved relationship with all the stakeholders in the pharma ecosystem including physicians and patients.

Conclusion

With the advent of concepts like multi-channel marketing to facilitate DTC, the pharma industry is still not fully geared to adopt digital marketing. In 2013, 20 top pharma companies spent around \$14,784 billion, and from the DTC perspective, the actual spent rate always falls behind by 25 percent of the expected value. This proves that there is always room for improvement and sooner they warm up to the digital medium, the faster it will increase sales. With the introduction of digital models like multi-channel marketing, pharma industries are looking at various CRM tools to enable this strategy.

Lastly, the pharma industry expects this new digital platform to be an extended sales and marketing organisation enabled by IT, to simplify the process, reduce costs, improve market share, and boost profitability. It is a joint responsibility of the pharma companies to adopt new digital platforms to come up with new features to cope up with expectations. **MA**

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Payments Banks: Empowering Digital India



The setting up of payment banks is an exciting opportunity for digital financial inclusion. They have the potential to overhaul existing banking habits.



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The Reserve Bank of India (RBI) has recently decided to set up payments banks to pave the way for revolutionising cashless payment services across the country. The payment banks have the potential to change banking habits of the people, as more and more people entering the formal banking network are likely to act as a game changer for the economy. The payments bank license will enable to build a more comprehensive portfolio of banking and financial products and services, accelerating India's transformation into a digital economy. The payment banks will also make people less dependent on cash even for small sums, and since a mobile wallet could

be a bank account soon, the move could have a big impact on mobile commerce (m-commerce) over time.

A payment bank is a type of non-full service niche bank. A bank licensed as a payments bank can only receive deposits and provide remittances according to the requirement of the customer. It cannot carry out any type of lending activities. Such banks help to reach the financial inclusion targets of the country, and are largely meant for migrant labours, low income households, medium and small scale enterprises (MSMEs) and different types of unorganised sector entities.

Financial inclusion is the main goal behind creating payment banks. It is easier this way for a person to get a bank account. Besides, there is a need for transactions and savings accounts for the underserved population

The background

Setting up of payments banks was not an overnight idea of the RBI. On 27 August, 2013, the central bank published on its website, a policy discussion paper titled Banking Structure in India—The Way Forward. The paper observed that there is a need for niche banking in India and differentiated licensing could be a desirable step in this regard, particularly for infrastructure financing and wholesale and retail banking. Subsequently, the committee on Comprehensive Financial Services for Small Businesses and Low Income Households, headed by Nachiket Mor, also examined the issues relevant to an ubiquitous payment network and universal access to savings. The committee recommended the licensing of payments banks to offer financial services to the hitherto excluded sections of the population. This committee released its report in January, 2014. Finance minister, Arun Jaitley, announced in the 2014-15 Union Budget: “After making suitable changes to current framework, a structure will be put in place for continuous authorization of universal banks in the private sector in the current financial year. RBI will create a framework for licensing small banks and other differentiated banks. Differential banks serving niche interest, local area banks, payment bank etc, are contemplated to meet credit and remittance needs of small businesses, unorganized sector, low income household, farmers and

migrant workforce.”

For effective and efficient functioning of payments banks, the RBI released the draft licensing guidelines inviting public opinion, on 17 July, 2014. The final guidelines were issued on 27 November. The RBI, on 1 January, 2015, issued clarifications to the 144 queries raised by the public. In February, 2015, it released the list of 41 organisations that had applied for the payment bank license. The applications were scrutinized by an external advisory committee headed by Mor. Finally, on 19 August, the RBI issued ‘in-principle’ licenses to Aditya Birla Nuvo, Airtel m-commerce Services, Cholamandalam Distribution Services, department of posts, Fino Paytech, National Securities Depository Ltd (NSDL), Tech Mahindra, Reliance Industries, and Vodafone M-pesa. Licenses were also issued to Dilip Shanghvi, founder of Sun Pharmaceuticals, and Vijay Shekhar Sharma, CEO of Paytm.

Brief profile of the licensees

Here is a brief profile of the 11 successful bidders.

Aditya Birla Nuvo:

It is best positioned to capitalise on Idea Cellular’s retail network and Aditya Birla Finance’s expertise.

Airtel m-commerce Services:

It already has a pan-India telecom network and mobile money services. They are well positioned to leverage the payment bank licence with 1.5 million retail outlets.

Cholamandalam Distribution Services:

Cholamandalam is the listed subsidiary of the Murugappa Group having a network of 534 branches spread across the county and a captive base of 7.5 lakh customers. Around 75 per cent of their branches are located in tier-II and tier-III cities.

Department of posts:

The post offices, presently, are half-way to become full-fledged banks. They have the widest network, stretched to even the remotest corners, and grassroots personnel.

Fino Paytech:

It is a financial inclusion solutions and services company and has a wide network. It is capable to cater to micro-customers facilitating payments and has a large business correspondent network across 500 districts. It is also prepared to collaborate with other players on the retail front.

NSDL:

It is the custodian of ₹119.82 lakh crore worth of securities. It has a network of 270 depository participants, spanning 17,265 service centres, in 1,632 cities and towns.

Reliance Industries:

The State Bank of India (SBI) has proposed a 30 per cent stake in Reliance Industries Payments Banks. A partnership with SBI and impending launch of Reliance Jio makes it a formidable player.

Tech Mahindra:

The company is technologically ready to launch its payments bank. They have a strong relation with Mahindra Finance. The company already has relevant experience in the field with mobile payment platforms Mobomoney and Mobiquity.

Vodafone m-pesa:

With over 90,000 m-pesa agents, Vodafone is already providing money transfer services to the remote areas in a safe and secure manner. They strongly desire to boost the m-pesa mobile payments service with nearly one lakh banking agents. They also have 1.7 million retail outlets and a deep market penetration.

Dilip Shanghvi:

The managing director of Sun Pharmaceuticals has partnered with Norwegian telecom major Telenor and IDFC.

Vijay Shekhar Sharma:

Founder of Paytm, which has 30 million mobile wallets in the country. Paytm's share is 18 million.

Regulations

The 'in-principle' license is valid for 18 months, within which the payment banks must fulfil all the necessary requirements. They are not allowed to engage in banking activities within the period. The RBI will consider granting full license if the licensees meet the following set of regulations.

1. The bank should be fully networked from the beginning.
2. The minimum capital requirement is ₹100 crore.
3. It cannot form subsidiaries to undertake non-banking activities
4. Initially the deposits will be capped at ₹1 lakh per customer, but it may be raised by RBI based on performance.

5. The bank cannot undertake lending activities.
6. The payments banks must have at least 25 per cent of its branches in the unbanked rural areas.
7. The bank must use 'payments bank' as part of its title to differentiate from other banks.
8. The bank should be registered as a public limited company under Companies Act, 2013.
9. Promoter stake, for the first five years, must be at least 40 per cent.
10. Foreign share holding will be allowed, subject to the FDI rules for private banks.
11. The voting rights will be regulated by the Banking Regulation Act, 1949.
12. Shareholder voting rights is capped at 10 percent, which can be raised to 26 per cent by RBI.
13. Any acquisition of more than five percent will require RBI approval.
14. The majority of the bank's board of directors should consist of independent directors appointed according to RBI guidelines.

Payments banks will bridge the last mile between bank branches and the remote customer living in a rural pocket. They will essentially rely on technology to reach payment services to all customers, using mobiles as a banking vehicle

Objectives

Financial inclusion is the main goal behind creating payments banks. It is easier this way for a person to get a bank account. Besides, there is a need for transactions and savings accounts for the underserved population, and remittances have macro-economic benefits for the region receiving them, as well as micro-economic benefits to the recipients. Higher transaction cost for remittances diminish these benefits. The primary objective behind setting up of payment banks will be to further financial inclusion by providing small saving accounts and payments/remittance services to the migrant labour workforce, low income households, small businesses, other unorganised sector entities and users, by enabling high volume-low value transactions in deposits and payments/remittance services in a secure, technology driven environment.

Scope

Payment banks would be permitted to set up its own

branches, ATMs, business correspondents, and similar things to undertake only certain restricted activities, permitted to banks under the Banking Regulation Act, 1949. They are as follows.

1. Payments banks can accept demand deposits, current deposits and savings bank deposits from individuals, small businesses and other entities, as permitted. No non-resident Indian (NRI) deposits can be accepted.
2. They will be permitted to issue ATM/debit cards but not credit cards.
3. Payments banks are permitted to issue pre-paid payment instruments (PPIs) according to instructions issued from time to time under the Payment and Settlement Systems Act, 2007. However, the outstanding balances in PPIs will be deployed as per the relevant pattern of funds.
4. The banks may offer internet banking services. They are expected to leverage technology to offer low cost banking solutions.
5. They are allowed to function as business correspondents of other bank, subject to RBI guidelines
6. Payment banks can accept remittances to be sent to, or receive remittances from multiple banks under approved RBI mechanisms like RTGS, NEFT, IMPS and others.
7. Payment banks will be permitted to handle international fund transfer in the nature of personal payments or remittances on the current account. All facilities/approvals for such transactions are subject to RBI approval.
8. Payments banks can undertake other non-risk sharing simple financial services that do not require any commitment of their own funds. These include distribution of mutual fund units, insurance products, pension products, and others, with prior approval of the RBI and after due compliance.
9. The banks are allowed to undertake utility bill payments on behalf of its customers and the general public.
10. Payments banks cannot set up subsidiaries to undertake non-banking financial activities. The other financial and non-financial services activities of the promoters, if any, should be kept distinctly ring-fenced and not involved with the banking and financial services business of the bank.

Advantages

According to the RBI governor Raghuram Rajan, payment banks are add-ons to banks rather than competitors. In his opinion, "Payments banks will be feeders into the universal banks. Payments Banks cannot do something universal banks can do." Payment Banks will complement the existing system by traversing the last mile. They will revolutionise the Indian banking system making it very exciting for customers and existing lenders will have to improve service to retain depositors. Thus, banking will become more competitive and interesting.

The involvement of India Post would transform social welfare and subsidy schemes. The government's LPG, kerosene, and food and fertilizer subsidies can now be routed through regular and payment banks

Payment banks will bridge the last mile between bank branches and the remote customer living in a rural pocket. They will essentially rely on technology to reach payment services to all customers, using mobiles as a banking vehicle. Mobiles go even where humans don't. Physically, branches will be still needed for functions like opening an account, depositing cash, and others. But all day-to-day payments, including peer to peer payments, can be done remotely. The mobile phone will become the virtual ATM and small payment cheque book.

Banking costs would also come down because of intense competition driven by the expected proliferation of payment banks. Presently, there are several costs for banking services like above limit ATM transactions, additional cheque books, big money transfers, maintenance of minimum balances, and demand draft issue fees. Cost will also come down when payment banks start offering zero balance accounts and low cost services.

The involvement of India Post would transform social welfare and subsidy schemes. The government's LPG, kerosene, and food and fertiliser subsidies can now be routed through regular and payment banks. India Post already has a presence where banks do not, and Airtel, Vodafone, and Idea would soon reach customers through mobile enabled payments systems.

Mobile banking will create conditions for cashless banking. This means over a time the mobile will perform the same role as credit and debit cards, obviating the need for too many cash payments. Even ATM expansion can be slowed down in cities and focused on distant villages or towns.

Payment banks will be considered as an additional tool to eliminate black money from the financial system. A government that wants to eliminate black money, can effectively do so once a 95 per cent mobile and Jan Dhan penetration rate is achieved. India is very close to reaching the one billion mobile base, and Jan Dhan is set to have reached all the households.

The government will be one of the biggest beneficiaries of payment banking, as it will expand its access to

cheap funds. Banks are major investors in government bonds. While this will remain so even after the entry of payment banks, the sheer impact of additional money coming into these bank accounts which can be invested in short-term government bills, means that short-term rates will come down, and the government can borrow more cheaply.

Bank depositors can expect to earn higher short terms deposit rates from payments banks, and the existing four percent savings bank returns may fade away. After payments banks, RBI will license 'small banks' that have to focus on loans to small borrowers and not big corporates. Once this happens, non-banking finance companies will become small banks and make financial inclusion more complete from the small borrower's perspective.

Conclusion

Payments banks focus on micro-customers, and the mandate is to create an effective payment ecosystem and propose to build that on the current network and also collaborate with other players on the retail front. Payment banks are a different product market from the current way in which existing banks operate. Universal banks, on their part, have to provide full and effective service. The banking will thus become more competitive and the customer will have different alternatives to do the banking transactions. Within no time every Indian will have a bank account and payment banks will be key enablers. However the All India Bank Employees Association (AIBEA) has criticised the introduction of payments banks, as a direct attempt to boost private sector banking and to minimise the role of public sector banks and their market share. The main job of payment banks is to collect deposits. They will cut the routes of public sector banks. This would increase banking costs. One has to wait and see the efficiency and effectiveness of payment banks in digital India. **MA**

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Digitally Empowering

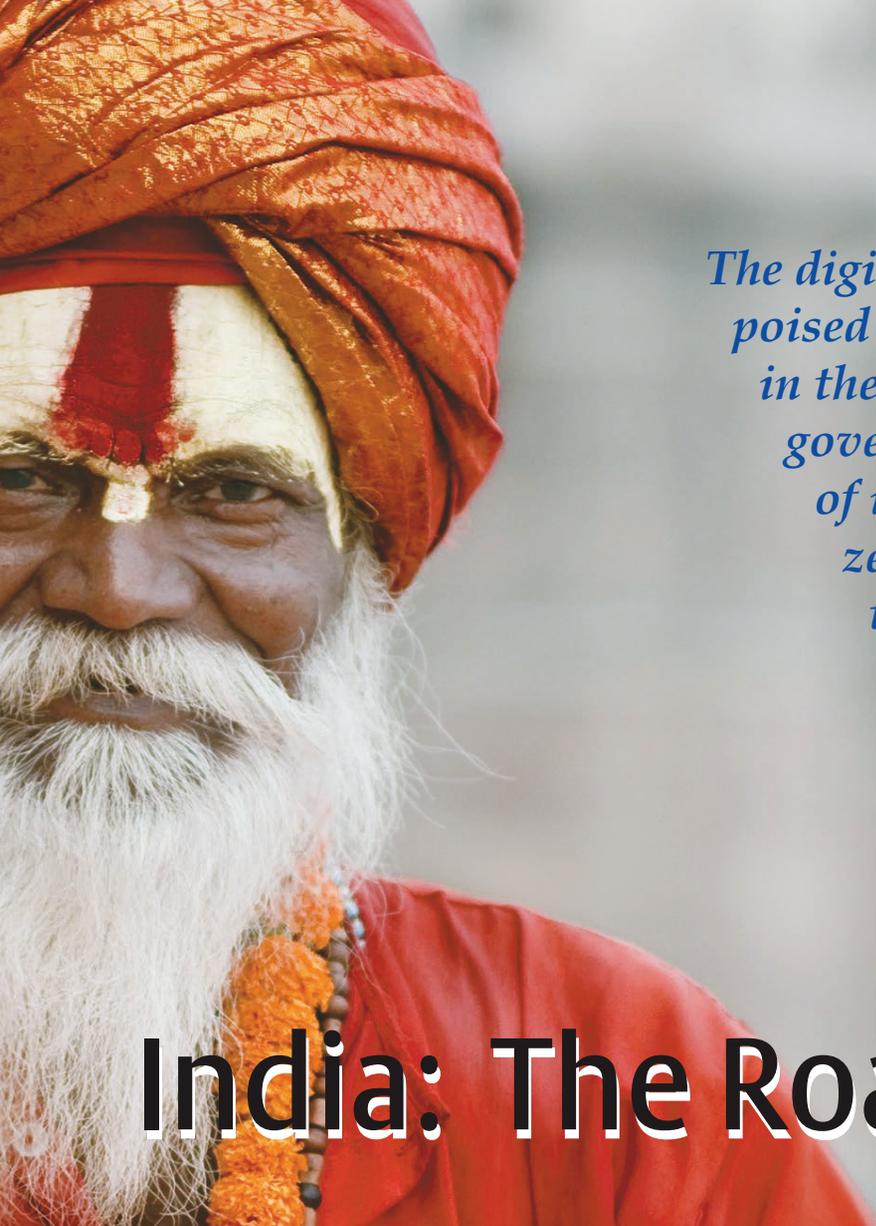


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The main objective of the Digital India Programme is to improve the service delivery to citizens, businesses, government employees, and others, blending information and communications technology (ICT) with administrative reforms. This is expected to make the government more efficient, bring down costs and increase transparency in the functioning of various departments and cater to the un-served and under-served areas of the country. India had over 260 million internet users as of June 2015 that included 188 million from urban areas and the balance from rural areas. Internet penetration in the country is about 40 percent in urban India and 10 percent in the rural areas. It is apparent that there is a huge potential to connect people through this medium. Mobile internet users in the rural areas have grown by 60 percent annually to cross 45 million in 2014.



The digital wave in India is poised to create great strides in the functioning of the government and delivery of its services to citizens, helping transform the life experiences of 1.2 billion Indians and drive the India growth story.

India: The Road Ahead

Vision areas of Digital India

In order to transform India into a digitally empowered society and a knowledge-based economy, the programme has been divided into three major areas: digital infrastructure as a utility to citizens, governance and services on demand, and digital empowerment of people. All the three areas have to work together to make it a reality. Digital India is not merely a technical issue. It is much more about social, economical, political and cultural issues and challenges. A holistic approach is required to build a digitally-enabled society.



Empowerment is a process of awareness and capacity building, leading to greater participation, decision-making power, and control. It is a process that is both individual and collective. Digital empowerment of the citizens involves universal digital literacy, universal access to digital resources, services in regional languages, documents/certificates on cloud, collaborative digital platforms for participative governance, and portability of entitlements through cloud.

Universal digital literacy

Digital literacy is the ability of individuals and communities to understand and use digital technologies for meaningful actions within life situations. It ensures digital literacy to the disadvantaged community by 'reaching out to the unreached'. The National Digital Literacy Mission (NDLM) aims to make rural citizens

digitally literate by various training programmes. The scheme is being monitored at the district, state and central level. The associates of the mission include industry partners, international organisations, and civil and academic institutions.

The Digital Empowerment Foundation (DEF) was formed to 'inform, communicate and empower'. The DEF spreads digital literacy and provides access to information and knowledge to the marginalised communities in remote areas using digital tools. The digital literacy, safety and security initiative of DEF and Google India, imparts digital literacy to ensure user protection in India. It advocates digital security and privacy needs through various workshops.

The focus as of now is to make at least one person e-literate in every home. Common service centres play a critical role to take digital literacy to the remotest locations of the country. National Institute of Electronics and Information Technology (NIELIT), an autonomous society under the department of electronics and information technology (DeitY) has identified over 5,000 facilitation centres across the country for training on courses that would enable a person to carry out e-governance transactions through computers and other basic activities like email and internet browsing. NIELIT has signed a memorandum of understanding with industry partners to jointly conduct courses and online examinations on digital literacy. The objectives include empowering rural communities through digital literacy, providing rural citizen services through digital means, and generating social, cultural and economic advantages to rural communities with information and content gateway.

The National Digital Literacy Mission (NDLM) aims to make rural citizens digitally literate by various training programmes. The scheme is being monitored at the district, state and central level.

Universal access to digital resources

The Digital India Programme aims to provide digital resources to be universally accessible to all people. The District Public Library Programme is a collaboration of DEF and the Bill & Melinda Gates Foundation (linked to its Global Libraries initiative) to improve access to critical information and knowledge resources for the library community, including the disadvan-

taged groups towards social and economic empowerment. The project facilitates and strengthens the capacities of the district public libraries as access and resource centres with the support of ICT tools to benefit library users and others, with critical information resources, knowledge support and capacity building interventions.

The main objectives are envisaging the role and functions of district public libraries to meet the changing needs of people, identifying and recommending the most suitable and sustainable public library models, providing a proactive international standard public library system, offering necessary information, knowledge and services to the citizens and stakeholders, facilitating training, skill development and capacity building of library personnel, increasing library traffic and providing a network of support and strong partnerships, and imparting ICT skills and training to NGOs, self help groups, schools, and medium and small scale industries.

Over 88 percent Indians converse in regional languages and more than 50 percent of the population speaks in Hindi. There is a great opportunity for using regional language in digital India. The regional language content penetration, however, is growing at a slow pace.

Services in Indian languages

Over 88 percent Indians converse in regional languages and more than 50 percent of the population speaks in Hindi. There is a great opportunity for using regional language in digital India. The regional language content penetration, however, is growing at a slow pace. The urban penetration stands at 43 percent, whereas the rural penetration is 57 percent, indicating a greater acceptance of regional language content. This is likely to attract more people to use the internet.

Thus, there is need to create regional language websites and apps. This, in turn, requires creation of digital media in local languages that includes promotions and digital campaigns. Providing regional language call centre support and smartphone content will enable the pool of non-English people to warm up to the internet. This will open up new market segments. The B2C connect will help in understanding

the needs and preferences of the rural market. the government will be able to reach every nook and corner and digitisation would empower the citizens.

Documents/certificates on the cloud

Digital Locker is a virtual cyber vault for the safe-keep of documents like certificates, important papers and similar things. It allows an individual with an Aadhaar card and a linked mobile phone to sign up for the services. It is a personal storage space to securely e-store documents and links of official certificates. It is a convenient way to store certificates in a digitised format and can be shared. Various agencies will be able to store documents into the locker. Each digital locker comes with 1 GB of free memory. This facility will contribute for the reduction in administrative overheads and frauds. There is no hassle to physically carry the documents.

So far, 8.3 lakh people that signed up for the service, have uploaded 4.3 lakh documents. Using biometric authentication process, a person can link a mobile number to his/her identity, which in turn becomes a digital signature. In order to cater to the uneducated, an assisted mechanism will help open the Digital Locker. A common service centre in each panchayat of the country will offer all kinds of digital services.

Participative governance

The government can be in touch with its citizens 24x7 through digital platforms. Citizens will be engaged through social media and online messaging for open and easy access to information. DeitY has launched the 'mygov' (mygov.nic.in) digital platform to facilitate collaborative and participative governance. DeitY maintains a Facebook page and has two lakh followers. It works on the 'discuss, do and disseminate' approach. The mobile app for MyGov has all these features. This ensures transparency and provides a platform for the citizens to offer suggestions and also participate in decision making process. The government's performance will be up for close scrutiny by the citizens as well as stakeholders comprising conflicting interest groups. Citizens become more demanding customers and the performance of the government can be judged and also compared with other governments across the world. This allows real-time participation in the governmental processes.

Portability of entitlements via cloud

All government entitlements available on the cloud is a great move if it is multilingual and mobile enabled. Seamless portability of entitlements across various agencies and government departments would relieve people from carrying physical documents and greatly reduce administrative overheads in government departments. As documents can be shared online, anytime, anywhere access can be made and is expected to drastically reduce time in delivering services to the citizens.

Challenges

The road to digital empowerment in India has thrown up some great challenges and opportunities.

1. Effective co-ordination, efficient monitoring system, and capacity building are all real challenges. A high degree of cooperation and commitment among the various departments is essential. Only a stable government with a strong conviction can help achieve this.
2. All panchayat members, teachers in government schools, health workers, and government employees must be made digitally literate first.
3. The budget for this project is insufficient. Greater participation of all stakeholders namely, the corporates, citizens, NGOs and the government is the need of the hour.
4. Lack of ICT infrastructure is a major hurdle. A sound digital infrastructure that provides smooth exchange of information is required. The existing ICT infrastructure has to be deployed to its full potential.
5. Digital transformation means that all processes of various government departments and agencies have to be revamped and reengineered. This must be done at a rapid pace to meet the expectations of the people.
6. Lack of standardisation is a major hurdle in digital empowerment. Different manufacturers use different operating systems that lead to problems in data transfer and interoperability of e-government applications. Standard communication platforms need to be built so that sharing of data becomes easier.
7. A weak monitoring and evaluation system will paralyse the ambition of digital India. Continuous and close scrutiny of its functioning needs to be

- ensured for the program to be on the right track.
8. Lack of last-mile internet connectivity is another major challenge. Internet penetration has to take place at a rapid pace. High speed broadband connectivity must be ensured to all 2.5 lakh gram panchayats through the National Optical Fibre Network (NOFN) project within the timeframe.
 9. Library professionals have to be trained to accelerate the transformation of traditional libraries to digital ones. There are challenges to integrate information technologies, digital library tools and software, models for resource development, IT training needs, content development, and copyright management. More than creating digital libraries, their management is a big challenge. It involves hardware, software and collection management, preservation/archiving, financial management and access management that require substantial planning, both financial as well as technical.
 10. Data security is a big concern. When everything is connected to the internet, it is a great challenge to manage the security because of inter-wired connections and exchange of information. All security and privacy concerns must be considered and precautionary measures should be taken while entering into agreements with the cloud computing service provider.
 11. Digitisation metrics include ubiquity, affordability, reliability, speed, usage and skills. India is currently classified as a constrained digital economy and is lacking in all these and will have to take a quantum leap to compete globally.
 12. Many citizens may not be comfortable with the rapid pace of empowerment. Political parties, unable to digest these developments, are likely to throw up complications and retard the progress. This requires a strong commitment and coordination of all stakeholders. A stable government will go a long way to achieve this.
 13. The digital divide between urban and rural areas must be bridged to ensure sustainable development. There are budget and power generation constraints, high initial and recurring expenditures, and social, cultural and economic problems that make access to digital information difficult for majority of the population.
 14. E-waste management, impact of digitisation on

climate change are to be borne in mind when implementing Digital India Programme.

Opportunities

There are great opportunities for manufacturers in the electronic field, for farmers, for businesses, for women in particular, and the medical, financial and other sectors. With bigdata, huge opportunity awaits business analytics. All government services will be done digitally, with plenty of opportunities for software and hardware professionals. IT and IT related jobs will be in great demand.

Digital literacy provides enormous opportunities to the education sector. Regional language keyboards are vital for deeper internet penetration. Also, translating features have to be enhanced to provide better user experience. The 'e' of everything is going to create a class of entrepreneurs, capable of providing employment rather than seek jobs. Knowledge networking provides unprecedented potential to every individual in a truly networked India. Digital empowerment will also ensure that citizens have a say and participate in governance.

Conclusion

In a diverse country like India, there is an urgent need to accelerate inclusive growth. Digitisation would lead to a great change in the functioning of various government departments. Workflows, processes, operations, methodology and frameworks needs to be reengineered. The government has to ensure that its own capacity, norms, structures and risk management methods are in tune with the strategic digital vision. It will have to apply project management techniques to maximise the benefits. Digital empowerment is only the beginning and can only be achieved with the cooperation and concerted efforts of all the stakeholders. **MA**

References

1. www.ndlm.in accessed on 22/08/2015
2. <http://pubdics.worldbank.org> Interview with Dr. Rajendrakumar
3. <http://defindia.org/national-digital-literacy-mission-3/>
4. <http://india.gov.in/spotlight/digilocker-online-document-storage-facility>

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Digital Currency Precautions



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Guwahati

Digital currency is being extensively used for various transactions especially to settle e-commerce transactions. Bitcoin is one such digital or virtual currency that can be generated through complex computer software systems based on strong cryptographic principles.

The physical form of currency, under a central banking system, has recently come in contrast to digital currency, which is operated by a computer generated device called cryptography or cryptology. Cryptography is a portmanteau word, derived from the Greek words *kryptos* meaning secret, and *graphein* meaning writing (or *logia* which means study). According to several experts, Roman emperor Julius Caesar, used cryptography with a shift of three to communicate with his generals. A similar technique was used by carving cipher text on stone in Egypt. Cryptography was also recommended in Kamasutra as a way for lovers to communicate without discovery.

Today, cryptography is the study and practice of techniques for secure communication in the presence of third parties or adversaries. It is about constructing and analysing protocols, thereby avoiding the influence of adversaries. It is a means of secret commu-

nication covered under a protocol, encoded using a cryptic format and can be only decoded by someone with a purposefully designed password, code or key to overcome the various aspects of information security that includes confidentiality and integrity, authentication and non-repudiation. Digital currency facilitates settlement of ecommerce transactions. Some of the applications of cryptography in business include ATM cards, computer passwords, ecommerce and e-banking.

Digital currency, among its various names, is electronic money that acts as an alternative currency, generated through a computer program. Currently, alternative digital currencies are not printed by government-endorsed central banks nor necessarily backed by national currency. Digital currency may be of two types: crypto currency and non-crypto currency. The former relies on cryptography to create and manage

the currency. They are peer-to-peer, decentralised, and are mostly based on the first crypto currency, Bitcoin. Some of the examples of crypto currencies, other than Bitcoins, are litecoins, peercoins and namecoins. E-gold, Digital Monetary Trust, Ripple and Ven are some non-crypto currencies.

Objectives of the study

The present research has been undertaken to study and examine the genesis and implication of the circulation of Bitcoins.

Meaning

Eminent American economist, Milton Friedman, once called for the abolition of the Federal Reserve and advocated for its replacement by an automated system which would increase the money supply at a steady and predetermined rate and also put a lid on inflation. This was materialised, albeit not by a central bank, but via the introduction of a decentralised digital currency in 2009 as innovated by a pseudonymous developer, Satoshi Nakamoto which is referred to as bitcoin. It refers to both the protocol and transaction network, and the currency itself.

Bitcoin is a virtual currency that can be generated through complex computer software systems. It is a peer to peer digital currency network, based on an open source protocol which makes use of a public transaction log. It is also called crypto currency as it uses public key cryptography. When paying with bitcoins, there will be no exchange of physical currency or tokens between the buyer and the seller. The buyer, instead, requests for, and updates to a public transaction log, the block chain. Under the bitcoin payment system, all new transactions are automatically broadcast across the entire network and analysed in portions, called blocks. Besides the unconfirmed transactions, each block contains the digest for the last block to get the nod from the network. That last block will always come from the tip of the longest chain of blocks currently on the network. This chain is, in effect, the official log confirmation that all the previous blocks rose up. It is maintained by a decentralised network that verifies and timestamps payments. The operators of this network, known as 'miners', derive income as transaction fees on newly minted bitcoins, which is thus, a distributed digital currency based on strong cryptographic principles. Each coin is assigned

to the owner's public key and is transferable via cryptographically signed messages.

Bitcoin is a virtual currency that can be generated through complex computer software systems. It is a peer to peer digital currency network, based on an open source protocol which makes use of a public transaction log.

Present scenario

The bitcoin is a virtual currency and can be used for electronic purchases and transfers. It has many other benefits and advantages over the traditional paper currencies. With the increase in popularity, the bitcoin, has become the world's most expensive currency. Majority of bitcoin transactions are used for speculative investments and only a small number is used for real commercial and retail purposes. By August 2013, the value of all bitcoins in circulation exceeded \$1.5 billion, with millions of dollars worth of bitcoins exchanged daily. At present, the total number of bitcoin units generated is about 12 million.

There is a growing trend of companies to accept bitcoin as a form of payment. Companies like WordPress, Overstock, Reddit and BuySellBitcoin, have already set themselves apart as bitcoin operators. More recently, the University of Nicosia also decided to accept the digital currency for payment of tuition and other fees.

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Operational mechanism

Bitcoins cannot be converted into a physical form or any other form. It is cryptographically designed without any physical form or content. In order to operate bitcoins, a person is required to keep cash deposit in a bank account. The person can then transfer the amount through internet banking to the bit currency server, which in turn, converts the cash into crypto currency or bitcoins. This can be accommodated in any external device. The spending mechanism and transferring of money has become easy and fast. While

buying a product or service, the buyer should ask the seller whether the party accepts bitcoins like in the case of credit card transactions. Perhaps a time would come when there would be signage outside a mall, stating 'bitcoin is accepted here'. Then all payments and transfers can be made via digital currency from an external drive. However, to make bitcoins customised, there should be a link or agreement between a server and the other party. The transaction can take place, only when both parties agree to accept payment and receipts through bitcoins.

The basic essence of bitcoin transactions are as follows.

- a. Create a bank account and take a deposit from the customer.
- b. Establish a third party facility outside the bank-customer relation.
- c. Bit currency transaction would be created by establishing a counter-party contract between the server and a bitcoin user.
- d. Payment of stamp duty may be facilitated through timestamping to make the contract valid.
- e. The bitcoin user will transfer the normal cash from the bank account to the server in the portal through an encoded language.
- f. The server will credit the user account by decoding the language through a predetermined password or key.
- g. Then the server, from the bitcoin user portal, will make all payments, and incur all expenditures on behalf of its user, in exchange of a fee.

All bitcoin transactions are secured using public-key encryption, a technique which underpins many online dealings. It works by generating two mathematically related keys in such a way that the encrypting key cannot be used to decrypt a message and vice-versa. One of these, the private key, is retained by an individual. The other key is made public. In the case of bitcoin transactions, the intended recipient's public key is used to encode payments, which can then only be retrieved with the help of the associated private key. The payer, meanwhile, uses his own private key to approve any transfers to a recipient's account.

This method provides a degree of security against theft. But it does not prevent a bitcoin owner from spending his bitcoins twice, which is also the virtual analogue of counterfeiting. In a centralised system, this is done

by clearing all transactions through a single database. A transaction in which the same user tries to spend the same money a second time can then be rejected as invalid.

Implications

Bitcoins are not an illegal or illicit currency. It is a technique derived by IT and computer science experts. The technology, as such, is not bad. Its biggest advantage is that the identity of the users, buyers and sellers remain undisclosed. Money market regulators and central banking authorities fear that when the identity of the parties engaged in a transaction is not disclosed, it becomes a non-compliance of the know your customer (KYC) mandate.

Legally, bitcoin exchanges are subject to the same regulations as trading commodities. For instance, in the US, an exchange must report any transaction above \$15,000, a policy meant to prevent money laundering. For taxation purposes, reimbursing somebody for a product or service in bitcoins is considered as barter. The tax code provides for such practices but its enforcement is tough.

Settlement of transactions through bitcoins or crypto currency may lead to the creation of financial intelligence and may not be always put to good use within the knowledge of money market regulating authorities. Settlement of transactions by suppressing the identity of the parties could lead to the supply of unaccounted money in the hands of the users of the digital currency system. Besides, bitcoins can be easily diverted to terror financing, illegal arms trade, sports betting, pornography, drug trafficking, human trafficking, and illicit narcotics trade. The issues have already been included in the agenda of the G20 summit for global agreement on the matters to resolve the crisis. The increasing use of virtual transactions may call for another G-20 summit

Bitcoins have been created through a web portal which may have far reaching consequences in the domestic money market because the currency flowing across the globe has no limits. The cause of concern is not the state-of-the art crypto currency and the technological advancement in money market operation that has been thrown open to the financial intelligence map in the first decade of the 21st century. The main concern is the negative effect of performing business transactions in a virtual world, or e-world, because this

currency does not require any formal authorisation and approval for circulation under any regulating agency. The adversaries and third parties with computer knowledge are venturing into it in a public log. Consequences of unchecked granting of permission to telecom companies creating their protocols in the website, shook the government. The Supreme Court, as a result, cancelled 122 licenses of defaulting companies in February, 2012, and directed the Telecom Regulatory Authority of India (TRAI) to make a fair and equitable distribution of telecom licenses only to deserving parties. The Reserve Bank of India (RBI) must move cautiously because unchecked growth of digital currency, sans a physical form, may create a turmoil in the financial market. Digital currency transactions may also violate the provisions of the Prevention of Money Laundering Act, 2002.

In the second part of the present century, regulatory mechanisms will be totally engrossed in streamlining the operation of digital currency for good use and contributing to the welfare of the society. The central banking authorities in the US, the UK, China and India have shown much response by introducing strong legislative devices and regulatory norms so that the international trade and business transactions, e-market operations and m-commerce operations can be conducted at a faster pace, and at the same time, without jeopardising the human face of development.

Questions unanswered

There are financial and legal issues involved in bitcoin transactions. Besides, there are operational, financial, and security risks associated with them. These issues demand serious consideration from banking authorities, taxation and auditing authorities, accounting and reporting authorities. Some of these concerns are as follows.

1. Whether it is regarded as a kind of legal tender?
2. Is it backed by the central banking authority?
3. Whether adequate security checks are followed while generating, transferring and using bitcoins?
4. Can any party, in exchange of benefits through bitcoins, refuse acceptance or payment?
5. Is it protected under the Information Technology Act?
6. Can we measure its impact on the domestic money

supply, purchasing power, and inflation rate?

7. Can it be controlled and used under the provisions of the Banking Regulation Act, 1949?
8. Does it attract any stamp?
9. Can bitcoin transactions be brought under VAT, Service Tax and Income Tax Act?
10. Can the capital flight under international operations be brought under the regulation of FDI, portfolio investment, FEMA and FIPB?

The above concerns warrant scrutiny from various regulatory authorities and legislative bodies to remove the hurdles in allowing digital currency to be in circulation.

Conclusion

Man's quest for innovation and intellectual upliftment knows no bounds. Hundreds of years ago, there was a practice of offering olive garlands to the winner of an Olympic event. Rewarding an athlete in formal currency was not prevalent then. The convention could be revived as a measuring scale to offer rewards for goods and services in exchange of a virtual currency or bitcoin. History repeats itself and the similarity between the olive plant leaves and virtual currency can't be ignored.

Regulatory intervention, however, is required from the state authorities. Working of money exchange in this virtual environment, by itself, is a sign of advancement of knowledge and manifestation of human intellect. Institutional effort is warranted to ensure that such intellectual creativity is used for the larger good of the society. Regulatory mechanisms must be established to meet the dual objectives and at the same time encourage human innovation in financial transactions. Regulatory intervention is therefore, not only essential but a sufficient condition to meet the 21st century challenges. **MA**

References

- King Lee, Turban, Viehland, (2013), *E-Commerce—A Managerial Perspective*, Pearson Education, New Delhi
The Economic Times, 27 December, 2013
<http://www.economist.com>
<http://en.wikipedia.org>

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Framework and Leveraging IT as a Key Enabler in

BPR



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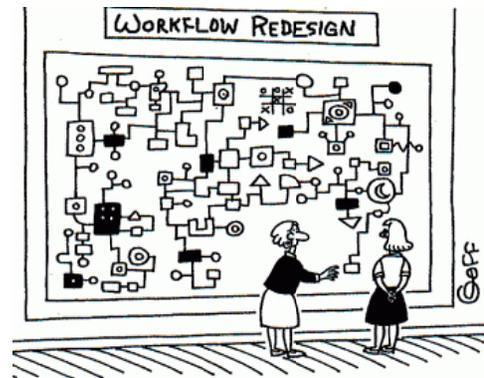
BPRs have been instrumental in driving radical process transformation for organizations yielding substantial benefits in terms of cost optimization, process efficiencies and enhancing customer satisfaction

Core business processes, over the years, can become increasingly complex, inefficient, time consuming and overwhelming, adding successive layers of unnecessary steps and review tollgates that substantially add to costs, reduce organisational efficiency, increase process cycle times and end frustrating customers both within and outside the organisation. This is when one has to strategically reevaluate the core business processes for a radical redraw through business process reengineering (BPR).

BPR is the new buzzword in strategic business management sessions as organisations are continuously looking for opportunities to optimise costs and enhance bottomlines. Global organisations operate in challenging and volatile world markets that have shown anaemic growth, coupled with inflationary pressures in areas of rising labour costs. Organisations are relentlessly exploring different avenues to enhance margins. With limited leverage on the topline measures, they are looking inwards at their internal cost structures and finding innovative ways to delight their customers through excellent service and product offerings while leveraging new age technologies.

The origins of BPR can be traced back to the 1700s when Adam Smith, in his epochal *Wealth of Nations* (1776), suggested separating work areas to increase productivity. Frederick Taylor, in the 1880s, suggested that managers use process reengineering methods to discover the best processes for performing work, and that these processes be reengineered to optimise productivity.

In 1990, Michael Hammer, a former computer science professor at the Massachusetts Institute of Technol-



"And this is where our ED workflow redesign team went insane."

Diagram 1: Workflow complexity

ogy (MIT), claimed in the *Harvard Business Review* that the major challenge for managers is to obliterate forms of work that do not add value, rather than using technology for automating it. The statement implicitly accused managers of having focused on wrong issues, technology in general, and more specifically information technology (IT), which has been used primarily for automating existing processes rather than using it as an enabler for making non-value adding work obsolete.

In all the initiatives so far, IT has played a key role as an enabler to seamlessly connect internal and external business partners. This has been made successful with the meteoric increase in the performance of computer power coupled with a sharp drop in the costs of computing. Diagram 2 shows the cost of computing for different fundamental technologies. Once the switch was made to electronic computing and modern com-

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puter architecture, the progress was rapid and virtually unbroken even as the transitions were made from one major technology to another. The decline in the cost of computation from the earliest period till today, ranged from around \$10,000 per MUCP (million units of computer power) in the late 19th century to around \$0.0000001 per MUCP today, an improvement of approximately a trillion.

Those who have lived in the 1980s would be able to

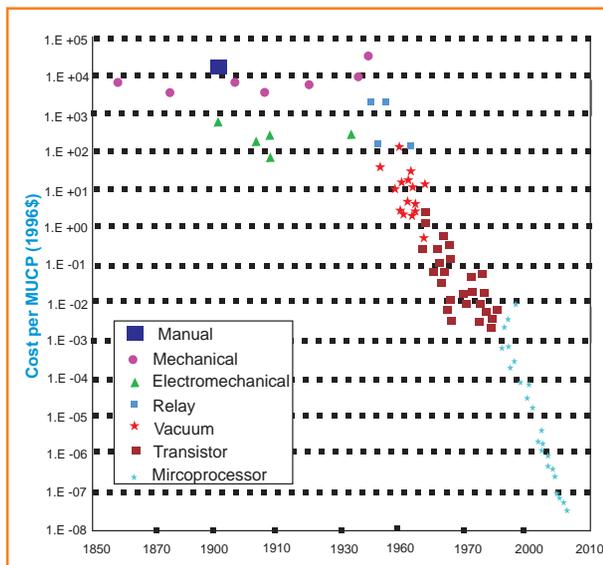


Diagram 2: Cost of computing

draw some real life examples of BPR that have been possible with IT. Let's take banking as an example. Not too long ago, withdrawal of money from a bank account meant visiting the particular bank's branch.

BPR is the new buzzword in strategic business management sessions as organisations are continuously looking for opportunities to optimise costs and enhance bottomlines. Global organisations operate in challenging and volatile world markets that have shown anaemic growth

A cheque was to be filled up, followed by a signature verification verified by the bank's officials. A person had to then stand in a queue, to physically withdraw the money. It was a pretty demanding ordeal for a customer. But with the advent of collaborative computing, and a powerful universal core banking solution, money can be withdrawn in a matter of seconds. This has been possible because of reengineering. Customers

today have access to funds via a global network of ATMs and branches. Most banking processes have been transformed—with customer centricity at its core—to provide self-service, secure online solutions making branch visits rare. Banks have reaped rewards in areas of business process efficiency, cost optimisations, and profitability.

Having explored the origins of BPR and the strategic role IT can play to harness project goals and objects, let us briefly summarise what BPR is and is not.

What it is	What it is not
Transformation or radical change, enhances key performance, indicators of cost, quality, service, and velocity	Incremental change
Eliminates existing process structures and replaces them with innovative solutions	Automate existing business process
Restructures the entire organisation, needs strong leadership support and change commitment	Focusing on individual parts of the process, silo focus
Customer centric, leverages IT to transform business processes that delights customers, both internal and external	Deployment of an IT solution to speed up existing processes

BPR methodologies

There is vast body of knowledge available to practitioners who want to learn and apply BPR methodologies. Five of the most common methodologies are process reengineering life cycle, integrated BPR, object-oriented business engineering methodology, McKinsey BPR (diagram 3), and Accenture BPR.

The underlying goals of each methodology are somewhat similar. The McKinsey BPR methodology, for instance, has three key transformational phases.

Phase 1—Definition of the core process scope by examining the current state:

Identifying the most important processes to implement the strategy with the highest value delivery, followed by measuring the performance gap, and a root cause analysis. Value stream mapping and the identification of wastes are key issues. This helps in identifying the processes where the primary value stream takes place and has the highest contribution to business objective achievement. One can leverage various quality tools like a pareto analysis to identify the high impact areas

of improvement. Effectively, the core processes with the highest impact on organisational performance are selected and targeted as the initial objects. One needs to decompose the process into smaller sub-processes to make them manageable tasks that are similar to a work

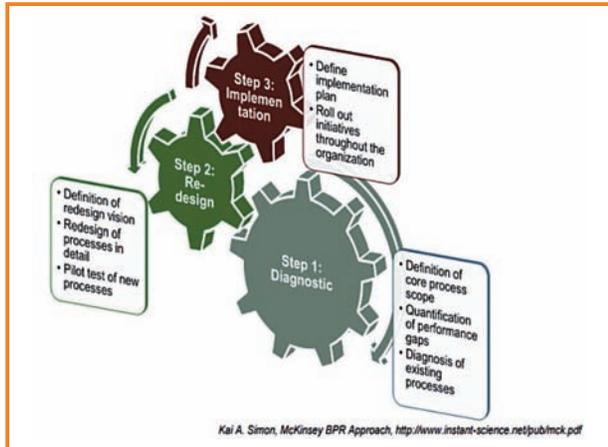


Diagram 3: BPR Methodology - McKinsey

breakdown structure used in project management methodologies. It involves setting up of performance goals that are SMART (simple, measurable, attainable, realistic, and timely). The project charter involves plans with the business leaders and stakeholders to get sponsorship, funding and support for the BPR initiative.

Phase 2—The redesign phase:

This starts with an overall description of the future objectives of the organisation and the business processes existing within it. It also describes the new overall business process and the primary sub-processes and interconnections. In this phase, a detailed map of the processes' future design is developed. The new process design needs to be tested to verify the process logic. Implications need to be identified and described to inform the change specification activity. Stakeholder inputs and organisational experts are to be onboarded. Actual changes in work practices, organisational structures and technological systems are outlined, based on the process design scheme and the identified organisational and technological implications. The phase also involves cost estimations for the necessary changes that are balanced against the targeted benefits from the new process.

Piloting plays a pivotal role here. Project managers entrusted with BPR need to undertake continued

rounds of experimentation and evaluation and ensure that the project is aligned with the end goals and objectives. A key theme of piloting is building a minimum viable product (MVP). It boils down to fundamental functions of the project necessary for basic execution. The essential functions are determined by the hypothesis being tested. Based on these test results, project managers determine whether they want to continue down the path (persevere) or pivot out to a different solution path. In this age of rapidly changing customer needs, MVPs ensure that BPR initiatives go through continued rounds of prototyping, ensuring optimal use of investment.

In all the initiatives so far, IT has played a key role as an enabler to seamlessly connect internal and external business partners. This has been made successful with the meteoric increase in the performance of computer power coupled with a sharp drop in the costs of computing

Phase 3—Implementation:

This is the result phase of all the BPR initiatives. One needs to put in place an implementation plan outlining scheduled risk mitigation activities, training, and monitoring. Piloting the implementation in phases is required for a global footprint spanning multiple geographies. Some prefer or may need a complete full-fledged rollout. Also, the resources being required for the implementation must be defined and assigned. One of the key areas to consider here are communication and effective change management. The change management programme is the detailed description of how the new processes, and the related organisation and technology, are to be introduced. A change management programme includes time plans, training, workshops, and similar things. It also involves resource allocation, feedback mechanisms and adverse events handling.

Another important aspect, is the migration plan, which describes how changes can be introduced without disrupting ongoing operations. While one may have diligently tested and tuned as pilots in a lab-environment, the 'real' process needs to be adjusted to ensure performance according to defined objectives. One has to conclude the project by capturing the lessons learnt in a document and schedule the

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final milestone review with the project stakeholders. Borrowing from a six sigma DMAIC methodology, this is where the improvement takes place and a control phase is established to ensure that the organisation reaps the envisaged gains.

The BPR toolkit

Business processes can be analysed from a value perspective. Leaders of an organisation relentlessly examine business processes to ascertain whether they are value added i.e. those for which the customer is willing to pay, or are non-value added (NVA), i.e. have no bearing on customer value. NVAs are devil. The origins of this concept can be attributed to Taiichi Ohno, who is credited with the development of the Toyota Production System (TPS). The TPS is steeped in the philosophy of “complete elimination of all waste”. This transformational concept of manufacturing went on to become lean manufacturing in the US that devised the seven wastes—transport, inventory, motion, waiting, over production, and over processing defects—as parts of this system. This is as critical as the first step in a business process reengineering project would be to understand where the waste or the non-value added activities are. This is critical to align your transformation goals with the mission of the organisation.

Value stream mapping

A value stream analyses the complete value creation process in an organisation and then examines it closely to optimise it for the customer. In fact, it is a simple yet powerful tool that helps examine a process from the point of view of the customer and identifies areas of waste/non-value added processes and helps plan to obliterate them. Value stream mapping (VSM) is a key arsenal in the lean leader’s toolkit.

Though initially designed for analysing manufacturing processes, this toolkit has been adapted to other areas like logistics, supply chain and some service organisations. The overall VSM process follows the BPR methodology.

Step 1—Project selection, definition and measurement:

It starts by collecting data and producing the current state map indicating process times or customer (demand) requirements. Several techniques can be used to draw up the current state map, including ref-

erencing the existing process documents like SOPs or performing a visual review of the current process as it is being executed in its entirety. Other options could include surveys or interviews. The future state maps will be developed using information captured here so it’s imperative to have a correct understanding of the business.

Several of the VSM icons (diagram 3) can be used to map the current process. Additional icons can be put in as deemed appropriate but the goal here is to map the process by identifying all possible areas of waste.

Step 2: Critique the current process and map future state:

The goal of this step is to understand the pain areas in terms of waste-excessive inventory build ups, excessive cost generation, long wait times in the process, multiple workflow loops, and other issues that may be redundant or unused resources and skills. The goal is to capture all these factors.

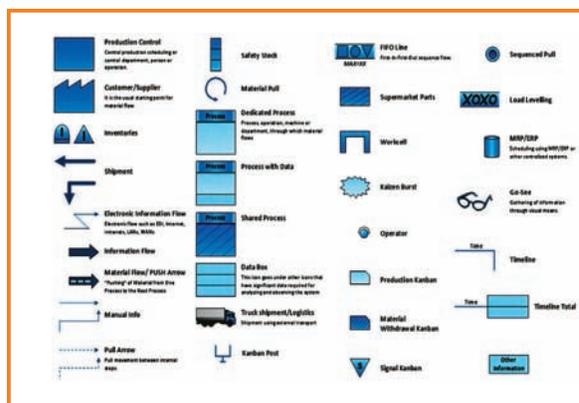


Diagram 4: Value stream mapping icons

Once the current state is known, mapping of the future state process begins. This is where project management leadership attributes of creativity, collaboration, negotiation skills, and expertise come in to play. stakeholder approval and sign offs are sought.

IT plays a critical role when defining the end state process. For example, the maintenance and operating workers at Union Carbide’s plant in Taft, Louisiana, used flowcharting to redraw their old process and create new ones. The results were a savings of over \$20 million. Ford Motor Company’s vision to streamline and reengineer its accounts payable department, is another example. Their reengineering efforts reduced staff strength in North America from 500 to just 125.

Step 3—Implementation:

This is where those months of arduous effort yield results. One has to implement the new process and build sufficient controls and validations to ensure these processes realise the expected benefits by being embraced by the organisation. One area to watch out for is to prevent users from reverting to the old processes because of resistance to change or poor training guidance.

Five elements to watch out for

BPR is not easy. Period. Galliers reported in 1998 that only around 30 percent of BPR projects were successful. It means that the larger population of reengineering projects fail. Following are some of the key points to remember in this regard.

Leadership commitment and support:

BPR projects are transformational and envisage a complete redraw of the current core processes. They need strong executive support as they play the expected role of business champions and change advocates. This is crucial for the proposed processes to be embraced by both internal and external stakeholders.

Effective change management:

Founded as a research company, Prosci has published seven longitudinal studies over the past several years, creating one of the largest bodies of knowledge in change management. According to their study, effective application of change management increases the success rate of organisational changes to as high as 96 percent. Prosci's research has shown that projects with excellent change management effectiveness are six times more likely to meet or exceed project objectives. Employees may resist change as they consider BPR as threats to their jobs, Galliers (1998) and Gerrits (1994).

Deep domain expertise:

Given the enormity of the BPR project scope, it is imperative that the project team has subject matter experts who have deep domain expertise. The goal will be to prevent making suboptimal solutions that may improve a part of the process (silo) but may have severe negative consequences to the overall success of the process. One of the challenges typically faced is that users may have a good idea of both the current

and end state, but limited expertise in the path that would realise the future state.

Communication:

One can never over-communicate. Constant updates ensure alignment with the overall needs of the stakeholder and supports adoption of new business processes. End-user training is another area that is closely linked to communication. One needs to ensure that the end-users of the reengineered process are trained effectively so that the envisioned results are truly reaped. One has to ensure that the communication is tailored for the audience, timely, accurate and well documented in terms of project quality plan, the quality log or checkpoint reports.

IT agility, adaptation, and strong control:

A central tenet of BPR is to exploit IT to support 'radical change'. Some authors view IT as the central enabler of BPR. However BPR has not really worked as expected. Davenport and Short (1990) attribute this problem to a lack of appreciation of the deeper issues, and stress that an awareness of the capabilities of IT can influence the business redesign process. They claim that IT has traditionally been used to hasten work but not to transform it and BPR is all about using IT to do things differently. Thus IT plays an important role in BPR. Properly adopting IT can barriers to respond to the rapidly changing business environment. BPR can't be successful, if it is simply used to speed up the process rather than reengineer it. While reengineering the core processes, one must ensure that process controls are not sacrificed. There are legislative, regulatory, and internal controls. Compliance is the key and the controls must be adhered to.

Conclusion

BPRs are extremely powerful initiatives that are undertaken by the strategic management to initiate radical reforms to drive cost and organisational efficiencies, dramatically improve process cycle times and aim for superior customer performance. There is a vast body of knowledge available to practitioners in terms of methodologies and toolkits. When instituted with successful change management processes, these initiatives can yield transformational benefits to the organisation.

MA

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Q & A

CMA Anil Sardana
CEO & MD Tata Power

Q Tata Power is India's one of the largest integrated power companies and you are the CMD of this prestigious company. Please share with us the experience of your journey.

For over a hundred years, Tata Power has been a part of India's growth story. This journey began in 1915, when the company commissioned its first hydro-electric power stations at Khopoli. Tata Power has been lighting up lives of people in India since the last century. What started with 12 MW today has grown into 8669 MW. It has been an incredible journey so far and our 100th anniversary this year is a reflection of all the Company core beliefs, from our commitment to sustainable development to our promise to develop the communities living around our areas of operations. The company wishes to continue on its path of giving the nation something more than just power, thereby, bringing smiles to a billion faces.

I have been the CEO & Managing Director of Tata Power since 1st February 2011. Earlier too I worked till August 2007 including being the founder CEO & MD of Tata Power Delhi Distribution Limited worked in Tata Power for more than five years.

During my tenure, Tata Power Delhi Distribution achieved benchmark performance standards—including setting a world record in 'Reduction of Aggregate Technical and Commercial Losses'. Tata Power Delhi Distribution was also bestowed the prestigious 'Silver National Award for Meritorious Performance' for two

consecutive years—2004-2005 and 2005-2006—in Power Distribution by the Prime Minister.

Q What is your outlook regarding the performance of this sector in India? What are the opportunities and challenges do you face in the power sector?

While the power sector in India has witnessed a few success stories in the last 4-5 years, the road that lies ahead of us is dotted with innumerable challenges that result from the gaps that exist between what's planned versus what has been achieved. The challenge as one sees in the recent times, especially compared to previous years, is deteriorating financial outlook of Discoms where the losses have been mounting to levels far higher than previous years. This is a matter of great concern as the buyer of merchandise has to be solvent and efficient, failing which the fiscal health of all associates in the value chain will get impacted and it would lead into vicious and unviable circle of uncertainty. Power distribution still remains a segment that needs significant reform-intervention. Going forward, a combination of tariff increases, distribution reforms, open access and enforcement of the 'obligation to serve 24X7' is required.

For a nation with a population of 1.24 billion the demand for power supply is expected to surge to 335 GW by 2017. However, this appears to be a far cry for being met, due to the demand-supply gap in terms of fuel sources and thereby the power generation. As of

February, 2014 India grappled with a peak power shortage of 5,378 MW. Eyeing a target of power supply of 335 GW, India will require a generation capacity of approximately 440 GW. This implies that we need to have an annual addition of 20 to 40 GW. This is a challenge to sustain. Despite huge coal reserves in India, the domestic power sector is facing coal shortages and has resorted to import to meet its requirements. This shortage may result in increasing non-utilisation of assets that are already built and would distract new capacity additions resulting in targets being missed. In addition, policy changes in Indonesia and Australia have significantly escalated the prices of imported coal thus making generation unviable for imported coal based power projects to function.

Poor per capita consumption of about 900 Kwh/person/year, is meagre compared to global average of 2800 kwh/person/year. This shows that quality of life cannot reach global standards unless competitive, reliable and uninterrupted supply is facilitated.

Slow pace of distribution reforms is another key concern. Power distribution still remains a segment that needs immediate policy reforms and a combination of tariff increases to reflect the increasing cost of fuels & depreciating rupee, competition &



INTERVIEW

open access and enforcement of the 'obligation to service' going forward. The distribution segment caters to 200 million consumers with a connected load of 400 GW, comprising one of the largest customer bases in the world. However, high financial losses of the discoms are hampering not just the electricity distribution but is almost becoming a question mark for generation capacity addition in India.

Q *What are the key areas that you would like to see in the forthcoming years to maintain a sustainable growth of your organisation in this industry?*

Tata Power has ambitious plans to keep fueling its multi-fold growth across the power value chain. The Company has a target of generating 18,000MW by 2022, coupled with 4000 MW of Distribution cum Decentralized Distributed generation, and intends to have a 20 – 25 per cent contribution from 'clean power sources'. Towards this end, the Company has various projects in the pipeline and is scouting both organic and inorganic route of growth. We foresee an exponential increase of renewables in the energy mix over the next few years, in line with which Tata Power is evaluating various opportunities to grow in the renewable energy space. Tata Power is one of the major investors in the space of power generation using renewable energy sources.

The Company has a generation capacity of 1383 MW from clean sources such as hydro, wind, solar, geothermal and waste gas. In the current year, Tata Power has set a target of commissioning at least 150 MW of wind farms and 50 MW of solar projects. The Company has identified states including Tamil Nadu, Karnataka, Maharashtra, Gujarat, Rajasthan, Andhra Pradesh and Madhya Pradesh with wind power generation capacity. Furthermore, Andhra Pradesh and Madhya Pradesh have already seen a lot of addition of wind generation capacity and they have also met the mandated Renewable Energy Purchase Obligation compliance.

Q *Please brief us about your current and upcoming projects.*

While Indian market continues to remain the primary focus of business for Tata Power, it also dawned on us that due to fuel shortages, landavaila-

bility cycle as per new Act and delays in various clearances, the pace of opportunities in India may move to fruition slowly. Tata Power, thus, has started making investments into projects in select international geographies to strengthen and diversify its portfolio and for greater impetus for growth, and is setting up 2,600MW of capacity abroad. Tata Power commissioned its 126 MW Dagachhu Hydro Power Corporation in FY15 in Bhutan. Additionally, the company has achieved financial closure of its 187 MW Adjaristsqali hydro project in Georgia. Two projects under the company's JV in South Africa, 134.4 MW Amakhala Emoyeni Wind Farm and 95.17 MW Tsitsikamma Community Wind Farm, are under construction. The Company is also implementing 120 MW Itezhi Tezhi Hydro Project in Zambia.

Tata Power is also developing over 200 MW of wind power projects in India. Two wind projects of 154 MW are under construction in Gujarat and Rajasthan, of which 18 MW is already commissioned. The Company has further acquired land in Gujarat and Rajasthan for developing other renewable projects. A thermal Waste Heat Recovery project at Kalinganar, of 202.5 MW is in advanced stages of execution.

Q *What are your acquisition plans in near future?*

Tata Power is looking to acquire debt-laden, distressed assets to bolster capacity and earnings. We are exploring multiple options, both green-field and through possible acquisitions. This will help enhance the market share for both solar and wind based generation. We are evaluating and will continue to evaluate opportunities to acquire projects in various stages of development across the country. The company sees opportunities in the power sector, particularly renewable energy and distribution and in turning around stressed assets.

To help achieve the target of 18,000 MW by 2022, the Company has prioritised four key regions for international play. These include African Region, South East Asian Region; Middle East Region & SAARC Region. Tata Power has deployed resources in these regional geographies to understand the market dynamics and scout for opportunities. The shortlisting of these regions has been done based on aspects like opportu-

nities, risks, likely rewards, law and order situation & ethics cum values prevalent in these geographies. SAARC grid formulation is a step in the right direction, as it will bring robustness into grid operations and hence optimize capacity utilization of connected assets, as also optimize costs of electricity for neighboring countries.

Q *What is the propose strategy for the Global Hub?*

Tata Power has ambitious plans to keep fuelling its multi-fold growth across the Power value chain. The Company aims to generate 18,000MW by 2022, coupled with 4000 MW of Distribution cum Decentralized Distributed generation, and intends to have a 20 - 25% contribution from 'clean power sources', which will include a mix of Hydro, Solar, Wind, Geothermal and Waste Gas generation. Towards this end, it has various projects in the pipeline. While Indian market continues to remain the primary focus of business for Tata Power, it also dawned on us that due to fuel shortages, land-availability cycle as per new Act & delays in various clearances, the pace of opportunities in India may move to fruition slowly. The Company, thus, has started making investments into projects in select international geographies to strengthen and diversify its portfolio and for greater impetus for growth, and is setting up 2,600MW of capacity abroad. In line with the international strategy, the Company continues to evaluate investment opportunities in Africa, Turkey, Middle East, South East Asia and the SAARC region.

Q *Please aware us about initiatives taken by your organisation to maintain sustainable Green Power generation.*

Tata Power has consistently been working towards having a 20-25 percent contribution of clean and green energy to its overall generation portfolio. Today, Tata Power's clean and green energy stands at 1383 MW. Tata Power's clean and green energy portfolio comprises of 576 MW of hydro, 56 MW of solar, 511 MW of wind and 240 MW of waste gas based generation.

We have strived to be a responsible power company by expanding our clean and green portfolio, and have implemented eco-friendly technology to generate sus-

tainable power. By introducing innovative initiatives and responsible business practices we aim to have minimal impact on the environment and continuously reduce our carbon footprint to deliver sustainable energy. The company has endeavored to lead the reform process for sustainable power and is committed to safeguarding the environment for future generations. We are constantly scouting for newer clean and green energy projects which are in line with our core business value of sustainable growth, and will further enhance and increase our clean energy footprint.

Hydro energy projects

The company has an installed hydro capacity of 576MW, and has plants spread across Maharashtra, including Bhira, Khopoli and Bhivpuri. The company has also recently commissioned its Dagachhu project in Bhutan. Tata Power and Clean Energy Invest AS Norway (Clean Energy) and IFC InfraVentures (IFC) completed the financial closure of the 187MW Adjaristsqali hydro project in Georgia. The project, being financed by IFC, ABD and EBRD, is the largest-ever private hydropower investment in Georgia amounting to \$400 million through project financing. Furthermore, the company has further plans to increase its hydro energy generation through various projects which includes its partnership with Norway-based SN Power to develop hydro power projects in India and Nepal. The consortium has also bagged the 240MW Dugar hydro electric project in Chenab Valley in Himachal Pradesh, India.

Wind energy projects

Tata Power has an installed capacity of 511MW in wind energy, and has plants spread across five states- Maharashtra, Gujarat, Tamil Nadu, Karnataka and Rajasthan, which are the leading states in promoting wind power generation in India. The company, has recently commissioned its 24MW wind farm at Rojmal in Gujarat through its subsidiary, Tata Power.

Renewable Energy Limited (TPREL)

The company has further plans to increase wind energy generation in South Africa through Cennergi Pvt, a joint venture (JV) between Tata Power and Exxaro Resources, a South Africa-based diversified resources company. Based in South Africa, Cennergi is focused in investigation of electricity generation projects in South Africa, Botswana and Namibia. The initial project pipeline focuses on renewable energy

INTERVIEW

projects in South Africa, and Cennergi's strategy is to create a balanced portfolio of generation assets. Department of Energy, Government of South Africa, announced Cennergi (the Company's South African joint venture with Exxaro) as the preferred bidder for two wind projects of 234 MW - Amakhala 139 MW and Tsitsikamma 95 MW projects.

Solar energy projects

Tata Power has a strong portfolio of 56MW of solar generation capacity.

The company has commissioned its solar power project of 29MW solar power project in Pallaswadi, Maharashtra in May 2014 and a 25MW in Mithapur, Gujarat in January 2012. It has also executed a 3MW solar photo-voltaic plant at Mulshi, one of the largest grid-connected solar projects in the state of Maharashtra. The company had set up its first solar power plant of 110kW in 1996 at Walwhan in Lonavla. A 60.48kW solar power plant has been installed on the rooftop of one of the company's offices in Mumbai. The power generated by these solar panels is expected to take the lighting load of the entire building.

Waste gas generation

Tata Power has an installed waste-gas generation capacity of 240MW through its plants at Haldia and in Jamshedpur. The plant is based on the blast furnace and coke oven gases, waste gases from steel making process which help in reducing greenhouse gas emission significantly.

The company is also looking at other similar projects with Tata Steel.

CMAAs can study the pattern for cost of generation, identifying inefficiencies in cost management, eliminate inefficiencies will help reduce the costs significantly

Geothermal Power

A consortium led by Tata Power along with Origin Energy Ltd., Australia, and PT Supraco, Indonesia, won the Sorik Marapi geothermal project in Northern Sumatra, Indonesia. The Sorik Marapi project is estimated to support the development of approx-

imately 240MW of geothermal generation capacity and is currently under development.

Q Affordability and its impact on energy prices are the areas of concern for the future growth of renewable energy, what strategies do you like to implement for optimisation and cost reduction?

*T*he renewable energy prices have declined over the years. These are expected to become more competitive on standalone basis. Besides Renewables, conventional format of energy will be competitive provided global energy prices remain at lower cost-cycle as is the case at present.

Large format plants like Ultra Mega Solar Power projects can also help bring economies of scale and bring down the cost significantly. We need to promote more indigenous manufacturing of components that will help us reduce costs and economies of scale.

Q The solar energy is a challenge because production of the raw material is extremely volatile and keeps varying sharply across the world. How do you deal with this uncertainty?

*T*he solar industry is in a much better situation now compared to the situation it was in last 5 years. The panels that form 60-70 per cent of the cost of the projects were extremely expensive and so a lot of projects were using imported panels. Surprisingly these panels were cheaper than the indigenously manufactured panels. With the imposition of antidumping duty and the exemption of various solar energy equipments from Central Excise and Customs Duty has led to more stable prices in the Indian market.

We being an integrated company promote the use of indigenous manufacturing of the panels. Tata Power Solar is one of the largest manufacturers of solar panels and caters to many projects in India. The company currently manufactures and operates 200 MW and 180 MW of module & cell manufacturing facility in Bangalore, which is providing high quality solar components to power plants. We are a Tier-1 bankable module manufacturer, known for our high quality, efficient and reliable modules worldwide.

Q What initiatives/investments have been planned to improve your transmission and distribution

operations?

Tata Power has been a pioneer in innovation in the power sector value chain and aims at advancements in technology to provide reliable and quality power to its consumers. The company has been constantly investing and upgrading their infrastructure to make the distribution system more robust, and thus has reached out to more than 2 million customers both in Delhi and Mumbai distribution. We intend to move to smarter technologies for both Delhi and Mumbai. The company has recently launched a self-healing grid (SHG) which is a totally decentralised approach, where, in case of power fault, every substation communicates with each other and executes the best possible instruction for rapid fault isolation and restoration of supply in the network. The power restoration turnaround time is less-than-a-minute and is extremely useful in case of essential services like hospitals, banks and data centres, and the technology also reduces emissions and carbon foot-print.

To better serve our consumers, we have successfully reached 1,550 km low tension and 2,150 km of high tension network in Mumbai till date. The company is currently the only utility in Mumbai to have already piloted electricity distribution with space saving and safe technological measures such as pole mounted transformers, natural ester-filled transformers, underground feeder pillars, e-house DSS and using indigenously designed outdoor meter panel box for societies where alternative meter rooms are not available. The company has also applied an extremely critical tool in Demand Side Management and Demand Response program. The program awards consumers a financial incentive in curtailing power loads by reducing electricity usage compared to their regular consumption levels. DR is considered to be a smart grid solution where the utility works along with the consumer in voluntary load management. We see huge potential in large scale implementation of Demand response programs in India and several successful pilots done by us have emphasized this point Tata Power Delhi Distribution recently announced deploying first of its kind Smart Grid, wherein we will use Honeywell technology and services to link more than 160 buildings in its distribution network and call for temporary reductions in energy use, when demand threatens to outpace supply in grid stress conditions. This includes

power management during periods of peak consumption, as well as other grid emergency situation.

This helps alleviate stress on transmission and distribution lines, and improve supply efficiency.

The company aims to continue to implement aspects of smart grid both in Delhi and Mumbai to steer India towards more dynamic and efficient electrical grid.

Q As we know TATA is always concerned with the Issue of Corporate Social Responsibility. How critical is this to maintain, and would you highlight some of the initiatives in this regard?

The multitude of community initiatives by the Company has sowed and fostered from its earliest days, flowing from wellspring of voluntary commitment as opposed to obligatory commitment. Tata Power's community initiatives span the fields of community empowerment, income generation opportunities, ecology conservation, Self Help Group formation, drinking water and sanitation facilities, school-level interventions, and extending help to the farmers, fishermen, and other community stakeholders. Tata Power continuously undertakes a committed approach with the local community and continues to work with them on various platforms and multiple community development initiatives. The Company is also conscious of the natural resources in the vicinity of the plant and has taken appropriate steps to not just preserve them, but to also improve the flora and fauna in and around the project area.

We have a lot of initiatives for income generation among youth and women, healthcare initiatives like vaccination, health check-up camps, installation of RO plants, promote cultural programmes among the community. For education, we have project 'Shiksha Sarathi' that aims to improve the learning environment for children through better educational facilities for children living in and around its operations.

Further, the company plans to train 2 lakh skilled workers over the next decade through the Skill Development Institute. As a part of our 'Invisible Goodness' initiative for the centenary year, the company has launched new initiatives- Tata Power Skill Development Institute, 'Be Green' and 'Act for Mahseer'.

• Under the 'Be Green' initiative, the company aims

to motivate consumers to opt for e-bills to donate the collected savings for a noble cause. The company has successfully reached the figure of Rs. 4.5 Lakhs and wish to achieve at least Rs. 12 Lakhs or more based on consumer responses towards this cause.

• As a part of our 'Invisible Goodness' theme, the company has also launched 'Act for Mahseer' – largest and the most comprehensive campaign on Mahseer conservation, reaffirming the company's commitment to the cause of saving the endangered species.

Q *Cost Management always plays a pivotal role to gain competitiveness in this sector. Please suggest in what ways Cost and Management Accountants may offer their expertise more effectively in this quest.*

The Cost and Management Accountants can study the pattern for cost of generation. The tariff is determined using levelised cost of generation that includes fixed and variable costs. Fixed costs include salaries, depreciation, overheads etc. and variable costs include fuel costs. The Cost and Management Accountants can deeply study the nature of costs and help in identifying the inefficiencies in cost management. Elimination of these inefficiencies will help reduce the costs significantly.

Going forward, the Cost Accountants could help change the paradigms of the way projects are bid & built. Herein expert agencies of critical plant, equipment & systems can be called to bid on providing output from their system on per unit basis & ten aggregated to lower cost delivery of power to consumers. By this all systems will be similarly efficient eg: boiler, turbine, fuel handling, waste handling, switching & transmission etc

Q *What policy framework and initiatives would you expect from the Government to boost up this industry?*

The power sector is undergoing a lot of reforms under the new government. This year is expected to be eventful as well. We are happy that the government has realised the criticality of this sector and is restructuring areas that needed attention. However, there are some more areas that we would like to draw attention of the government. In terms of generation, simplifying

the process of setting up of projects is important that leads to a long gestation period and hampers the capacity building in the country. The recently announced 5 UMPPs under the 'Plug and Play' model is expected to provide respite to the issue. However, we need to wait and watch how that works. Policies pertaining to imported fuel based mega projects need to be suitably modified. The coal sector also needs to be opened up to private and foreign investments to bring in international player's technical and financial capability in exploration. The transmission sector should evolve through PPP model that has been successful. The need for open access has become the need of the hour.

This will promote more competition in the industry. The Amendments to the Electricity Act will bring in must desired change and believe that it will help the developers to be more focused and committed towards the sector.

Q *Would you like to give any message to those aspirants who want to be a part of your organisation?*

We would encourage and impress on young aspirants that:

- Be Ethical & value-based
- Hard work is necessary for achieving biggest dreams
- Be passionate about your work or field, love what you do
- Be focused in what you do and prioritize well
- Be proactive and focus on performance and good execution
- Be patient and a team player

TAX TITBITS



YOU ARE MOST WELCOME SIR!
THERE IS NOTHING TO SUSPECT...



CMA S. Rajaratnam
Advocate and Tax Consultant
Chennai

MAT

There is good news for foreign companies from the report of A.P. Shah committee dated 1.9.2015 recommending that Minimum Alternate Tax (MAT) should not be made applicable to them retrospectively for years prior to A.Y.2015-2016. It is reported that the Government has decided to accept the recommendation. The object of the Government in accepting the same is not to inhibit Foreign Direct Investments (FDIs), but if it is to be applicable prospectively, how does it help to encourage FDIs. Actually, there is no case in law for subjecting foreign companies in the light of the objective of a tax on book profits to neutralise avoidance of tax by non-declaration of dividend. When dividend declared by a foreign company is not

within the purview of domestic law, it should not be applicable for foreign companies, which also do not hold general meeting in India and are not subject to regulations in India. Mr. N.A.Palkhivala, the eminent jurist, described this tax itself as “constitutionally illegal, economically unsound and morally repugnant”. But when it is applied to foreign companies, it amounts to an alternate tax, which does not conform to the canons of international taxation and practice.

Two new schemes

(i) Gold Monetisation Scheme

There has been an expectation especially after the Black Money Bill, which has now become law, of some measures to tap the unaccounted cash and gold within

India. The Gold Monetisation Scheme announced on 9.9.2015, it is admitted, is only a revamped gold deposit scheme and the other is Gold Metal Loan (GML) Scheme involves only some changes in the guidelines with the risk of price changes being borne from the Gold Reserve Fund lightening the burden of borrowers serving as an incentive by tapping large amounts of gold lying idle as assets in households and institutions in India.

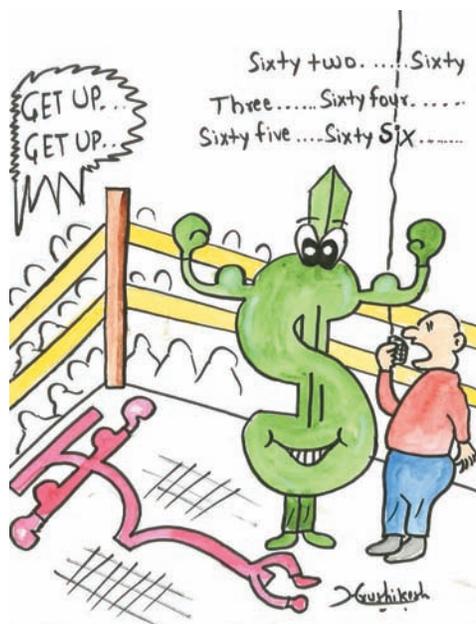
The scheme provides for tripartite legal agreements between the depositors, refiners and centres meant for collection and purity testing. Deposit can be in three categories, 1 to 3 years, 5 to 7 years and 12 to 15 years. Foreclosure is permissible. Interest rate is left to be decided by the banks on the basis of prevailing lease rates, other costs, market conditions, etc. for short term deposits. But interest rate for medium and long term deposits, however, is expected to be denominated and made payable in rupees on the value of gold deposited. Government is at liberty to use the gold for its purposes, but encashment of the bonds will be honoured from the Gold Reserve Fund. Gold metal loan account is for the benefit of jewellers, who can also borrow against the gold deposited. Jewellers will be entitled to receive physical delivery of gold from refineries for their requirements.

(ii) Sovereign Gold Bond Scheme

The other Scheme, that is announced is Sovereign Gold Bond Scheme. It is essentially a market borrowing programme to make gold available, so as to prevent import generally and smuggling in particular. These bonds are denominated in grams of gold in 5, 10, 50, 100 gms, with a cap of 500 gms per person per year. The bonds can be dematted or held physically. Both for issue and redemption, the monetary value is Reserve Bank of India reference rate. These bonds

will be available with banks, NBFCs, Post Offices and NSS agents among others. The tenure of these bonds will be 5 to 7 years. The bonds can be taken to be borrowings of the Government from the subscribers, who can use the bonds as collaterals for loan like ordinary gold. Bonds are easily marketable.

The exemption from capital gains tax is promised for both the schemes, subject to a forthcoming amendment to the Income Tax Act. The amount received towards the bonds will be credited to Gold Reserve Fund. Redemption can only be in terms of rupee. Marketing as for monetisation scheme is through all available channels.



There is not much to enthuse, those who expected a scheme to disgorge unaccounted cash and gold. The threshold requirement of KYC norms for the depositor under both the schemes will discourage investors. Without even a limited amnesty as was given for the holders of foreign income and assets, there is no incentive. There is also nothing to attract idle cash to the mainstream.

Depreciation

(i) Ownership

Permissibility for depreciation depends upon ownership and use by the assessee. Where a motor car was purchased by a company registered in the name

of its director, company was denied depreciation. But the Tribunal points out that the car was paid for and shown as part of the assets of the company, so as to entitle the company to depreciation in *Kisan Ratalal Choksey Shares and Securities P. Ltd. v. Addl. CIT* [2015] 41 ITR (Trib) 114 (Mumbai) following the decision of the Bombay High Court in *CIT v. Dilip Singh Sardarsingh Bagga* [1993] 201 ITR 995 (Bom), where it was held that registration under the Motor Vehicles Act is not an essential requirement for acquiring ownership of the motor vehicle. Registration certificate is not a document of title.

(ii) Use

Assets which had been put to use in the earlier years, but was being kept ready for use, but could not be used during the relevant year due to lack of orders, do not lose the right to depreciation. It was so held by the Tribunal in *ITO v. K-Ites P. Ltd.* [2015] 41 ITR (Trib) 132 (Chennai) following its own decision in *ACIT v. Chennai Petroleum Corporation Ltd.* [2010] 2 ITR (Trib) 325 (Chennai), where the non-user was due to unavailability of raw materials.

(iii) Depreciation on Goodwill

The appellant-firm had made payments to retiring partners over and above the amount to their credit in their capital in the firm, and the additional amount was mentioned in the fixed assets schedule as goodwill and depreciation was claimed. The assessee contended, that the payment had been made to acquire commercial rights, which are intangible assets and therefore eligible for depreciation. The Tribunal in *Swastik Industries v. ITO* [2015] 41 ITR (Trib) 277 (Ahmedabad) followed the decision of the Kerala High Court in *B. Raveendran Pillai v. CIT* [2011] 332 ITR 531 (Ker), where it was held, that when the goodwill paid was for ensuring retention and continued business, it was for acquiring commercial rights of business, which was comparable with trade mark, franchise, copyright, etc., listed in the first part of clause (ii) of section 32(1). Goodwill should, therefore, be taken to be covered by the above provision of the Act entitling the assessee for depreciation. It also relied on the decision of the Supreme Court in *CIT v. Smifs Securities Ltd.* [2012] 348 ITR 302 (SC) for the proposition that goodwill is an asset under Explanation 3(b) to section 32(1) of the Act.

Reader's Query

The following query is received by a reader CMA S.Ramakrishnan.

Facts:

When an old building goes for redevelopment, the tenants in the building vacate their respective flats and hand over the same to the redeveloper or builder as per an agreement. In the interim period till the new or redeveloped building is completed, the redeveloper pays certain amount towards monthly rental to enable

the tenants to stay in an alternative accommodation, till the new building is completed.

Query:

Do these rentals paid by the redeveloper require tax deduction at source?

Can TDS be avoided if the agreement is worded as "Hardship Allowance" or any other suitable word instead of calling it as "Monthly Rent"?

Since the tenant receives these rentals and uses the same to pay rent for alternative accommodation, which he takes on lease without profit or loss on this transaction, should there be any liability?

How this receipt and expenditure is shown in the Income Tax returns of the Tenant. If there be a saving in this arrangement should it be offered for tax?

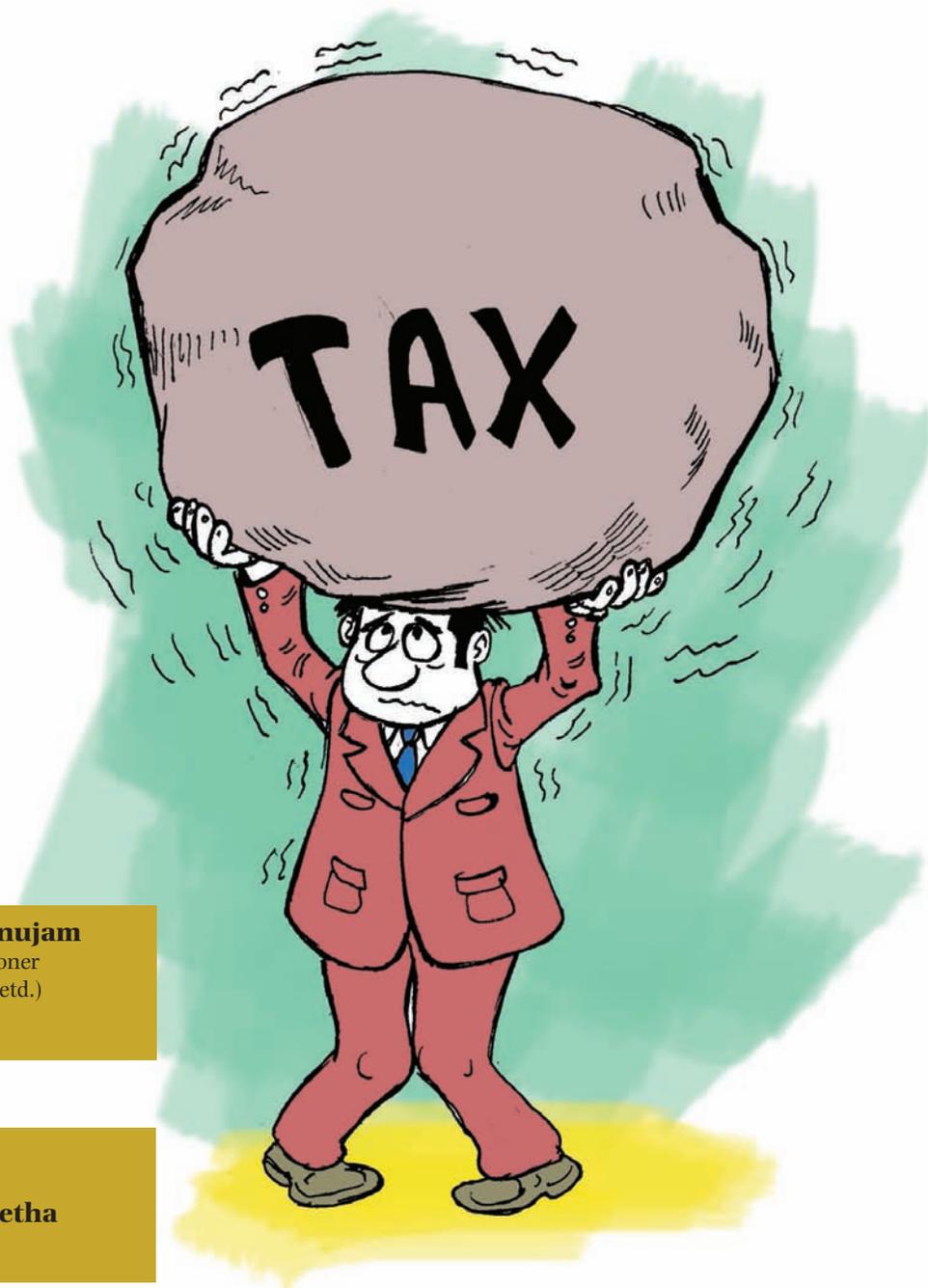
Answer:

What is received is not rent, since the redeveloper is not the landlord providing accommodation. It is a compensation for temporary deprivation of his tenancy right, which is a personal right, so that the compensation is not taxable. The nomenclature employed for the payment by itself makes no difference. It is intended to be a reimbursement. There is no requirement of tax deduction at source. At any rate, it is a decision to be taken by the payer and not the payee.

The receipt does not fall in any of the categories listed for liability, whether as salary, property, business or capital gains. It cannot fall under the head "other sources" as it is an amount received in pursuance of personal agreement between his erstwhile landlord/redeveloper to provide for alternate accommodation during his loss of tenancy. The payment of rent by the tenant is his personal expenditure. The reimbursement is an arrangement between the landlord/redeveloper and the tenants. While it is not unlikely that the Assessing Officer would infer the income to be under "other sources" on any savings in rent on the part of the tenant, it does not have the character of income, that even surplus should not be assessable, for the same reason that loss will not be deductible. There is, therefore, no income to be reported in the income tax return. **MA**

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DELAY IN DISPOSAL OF APPEALS: Declining to stay Demand **The Frown of the Court**



T.C.A. Ramanujam
Chief Commissioner
of Income Tax (retd.)
Madras



T.C.A. Sangeetha

The power to tax is the power to destroy, said Chief Justice Marshall of the US Supreme Court in a famous case. Despite the efforts of the Income Tax Department to present a friendly face, certain statutory provisions show the department in a not so friendly appearance. Assessments are made by the Assessing Officer after examining all documents and relevant evidence. In case of disagreements between the taxpayer and the taxing the department, demands are raised. Such disputed demands should normally be stayed till the disposal of the Appeal. If the Appeals are delayed, is it open to the department to pursue recovery without the assessments becoming the final? For the past several years, this issue has been troubling taxpayers. Courts have laid down that the first Appellate Authority, namely the CIT (Appeals), is competent to stay recovery till the disposal of the appeal. This enabling provision is rarely used to render justice. The department has categorised several appeals as falling in the category of High Demand Appeals. These are required to be taken out of turn and then we have the second appeal to the Income Tax Appellate Tribunal. Stay Petitions can be moved even before the Tribunal.

ITO vs. M.K.MohammedKunhi (1969) 71 ITR 815 (SC)

The question before the Court in this case was whether the Tribunal had power under the Income Tax Act to stay the recovery of the realization of the penalty imposed by the Departmental authorities on an assessee during the pendency of the appeal before the Tribunal. The Tribunal had declined to stay holding that it had no power to grant such a prayer. The Kerala High Court held that the Tribunal had such power and that the power was incidental and ancillary to its Appellate jurisdiction. The Supreme Court interpreting Section 254 of the Income Tax Act, 1961 observed that the powers conferred were of the widest possible amplitude and, therefore, must carry with them, by necessary implication, all powers and duties incidental and necessary to make the exercise of those powers effective. "It could well be said that when section 254 confers appellate jurisdiction, it impliedly grants the power of doing all such acts, or employing such means, as are essentially necessary to its execution and that the statutory power carries with it the duty in proper cases to make such orders for staying proceedings as will prevent the appeal if successful from being rendered

nugatory".

The Supreme Court further observed:

"It is needless to point out that the power of stay by the Tribunal is not likely to be exercised in a routine way or as matter of course in view of the special nature of taxation and revenue laws. It will only be when strong prima facie case is made out that the Tribunal will consider whether to stay the recovery proceedings and on what conditions, and the stay will be granted in most deserving and appropriate cases where the Tribunal is satisfied that the entire purpose of the appeal will be frustrated or rendered nugatory by allowing the recovery proceedings to continue during the pendency of the appeal".

Section 254(2A)

The failure to specify the power to stay was taken note of by the Government. Finance Act, 1999 inserted Section 254 (2A) in the Act w.e.f 1.6.1999. It was provided that every Appeal must be disposed of within a period of 4 years by the Tribunal. Finance Act, 2007 brought in the first Proviso to this section. This enabled the Tribunal, after considering the merits of the case, to pass an order of stay in an appeal filed before it and the stay was to be for a period not exceeding 180 days. The Tribunal was required to dispose of the appeal within the set period of stay. A second Proviso was also inserted laying down that if the Appeal is not disposed of within the stay period, the Tribunal may extend the period of stay depending on the facts of the case. It was also laid down that the extended period should not exceed 365 days and the Tribunal should dispose of the appeal within the period of stay. The most interesting part of 254 relates to the third proviso inserted in Section 254 by the Finance Act 2008 w.e.f 1.10.2008. This is quoted below:

"[Provided also that if such appeal is not so disposed of within the period allowed under the first proviso or the period or periods extended or allowed under the second proviso, which shall not, in any case, exceed three hundred and sixty-five days, the order of stay shall stand vacated after the expiry of such period or periods, even if the delay in disposing of the appeal is not attributable to the assessee]"

Narang Overseas (P) Ltd., vs. ITAT (2007) 295 ITR 22 (Bom)

In this case, the Bombay High Court chose to read down the third Proviso to Section 254 (2A) in such a manner that even if the period of 365 days had expired, the Tribunal could extend the stay granted, provided the delay was not attributable to the assessee. The amendment brought about by the Finance Act, 2008 sought to nullify this reading of the third Proviso by introducing the words: “even if the delay in disposing of the appeal is not attributable to the assessee”. The Bombay High Court had observed:

“It would not be possible on the one hand to hold that there is a vested right of appeal and on the other hand to hold that there is no power to continue the grant of interim relief for no fault of the assessee by divesting the incidental power of the Tribunal to continue the interim relief. Such a reading would result in such an exercise being rendered unreasonable and violative of Article 14 of the Constitution. Courts must, therefore construe and/or give a construction consistent with constitutional mandate and principle to avoid a provision being rendered unconstitutional”.

The Bombay High Court further held that the power to continue interim relief is not overridden by the language of third Proviso. There would be power in the Tribunal to extend the period of stay on good cause being shown and on the Tribunal being satisfied that the matter would not be heard and disposed of for reasons not attributable to the assessee.

CIT Vs. MarutiSuzki (India) Ltd., (2014) 362 ITR 215

The Delhi High Court pointed out that in view of the third Proviso, the Tribunal cannot extend stay beyond the period of 365 days. It was open to the department to give an assurance that coercive steps will not be taken to recover the disputed demand and then the Tribunal may adjourn the appeal hearing at the request of the Revenue. The High Court also pointed out that Section 254(2A) did not prohibit the assessee from seeking the intervention of the High Court with regard to stay of recovery. The High Court commented: “We have not examined the constitutional validity of the provisions to section 254 (2A) of the Act and the issue is left open”.

Pepsi Foods (P) Ltd., Asst. Commissioner of Income Tax 376 ITR 87

Matters came to ahead in the case of Pepsi Foods (P) Ltd., the Delhi High Court considered the constitutional validity of the third proviso. It referred to a number of rulings involving the pre-deposit requirements under the Central Excise Laws and the Debt Recovery laws. It referred to Article 14 of the Constitutional. There can be no discrimination based on impermissible or invalid classification. The third Proviso treats unequally. Those who delayed the appeal proceedings are treated in the same manner as those who have not delayed the appeal proceedings. This has led to hostile discrimination against the assessee who is not responsible for the delay in the disposal of the appeal. The Delhi High Court observed:

“It is for this reason that we find that the insertion of the expression “even if the delay in disposing of the appeal is not attributable to the assessee” by virtue of the Finance Act, 2008, violates the non-discrimination clause of Article 14 of the Constitution of India. The object that appeals should be heard expeditiously and that assesses should not misuse the stay orders granted in their favour by adopting delaying tactics is not at all achieved by the provision as it stands. On the contrary, the clubbing together of ‘well behaved’ assessee and those who cause delay in the appeal proceedings is itself violative of Article 14 of the Constitution and has no nexus or connection with the object sought to be achieved. The said expression introduced by the Finance Act, 2008 is, therefore, struckdown as being violative of Article 14 of the Constitution of India.”

Conclusion

The Delhi High Court has declared the amendment of 2008 as unconstitutional. It will be the height of harassment to insist on payment of disputed demand even when the appeal is not disposed of and the delay is not due to the assessee. The Delhi High Court had rendered justice to all the harassed taxpayers. Government in its wisdom must accept this judgment and issue instructions in accordance with the judgment of the Delhi High Court. **MA**

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DIRECT TAXES

Case Laws

- **"Landing and parking charges for Aircrafts are not for 'use of land'; attract section 194C TDS** - Landing and parking charges payable by Airlines in respect of aircrafts are not for the 'use of land' *per se* but the charges are in respect of number of facilities provided by the Airport Authority of India. Thus, landing and parking charges payable by Airlines would attract TDS under section 194C and not under section 194-I - *Japan Airlines Co. Ltd. v. CIT* [2015] 60 taxmann.com 71 (SC)
- **Grant of minority status to educational institution doesn't lead to denial of trust's registration** - An educational institution could not be said to be established for benefit of the minority community, solely on the basis of it being granted the status of minority educational institution by 'National Commission for Minority Educational Institutions'. Therefore, its application for registration as charitable institution could not be denied solely on the ground that minority status was accorded to it - *CIT v. International School of Human Resources & Social Welfare Society* [2015] 60 taxmann.com 188 (Patna-Trib.)
- **TDS default made by relying upon opinion of CA was bona fide mistake; not liable to penalty** - Where assessee-company made payment to a foreign company without deduction of tax at source on basis of certificate issued by Chartered Accountant, same was a *bona fide* mistake and hence, assessee was not liable to penalty for concealment of income - *CIT v. Filtrix Technologies (P.) Ltd.* [2015] 59 taxmann.com 371 (Karnataka)

Statutes

- **CBDT notifies Rules for the purpose of FATCA entered into between India and USA** - Last month the Indian Government has signed Foreign Account Tax Compliance Act (FATCA) with USA to promote transparency between the two nations on tax matters. The agreement underscores growing international co-operation to end tax evasion everywhere.

FATCA is a very important step for the Government of India, to tackle offshore tax evasion. It reaffirms the Government of India's commitment to fight the menace of black money. It is hoped that the exchange of information on automatic basis, regarding offshore accounts under FATCA would deter tax offenders, would enhance tax transparency and eventually bring in higher equity in to the direct tax regime which is necessary for a healthy economy.

Now the CBDT has notified rules for the purpose of FATCA - NOTIFICATION NO.62/2015 [142/21/2015-TPLJ/2155(E), DATED 7-8-2015

- **CBDT inks APAs with two MNCs which includes first APA with rollback provision** - As a part of a major initiative to usher in certainty in taxation, the CBDT has entered into two unilateral Advance Pricing Agreements (APAs) on August 3, 2015 with two Multi-National Companies (MNCs) which includes the first APA with a "Rollback" provision. With this, the CBDT has so far signed 14 APAs of which 13 are unilateral APAs and one is a bilateral APA.

Unilateral APAs are agreed between Indian taxpayers and the CBDT, without involvement of the tax authorities of the country where the associated enterprise is based. Bilateral APAs include agreements between the tax authorities of the two countries. An APA with the "Rollback" provision extends tax certainty for nine financial years as against five years in APAs without "Rollback" - PIB PRESS RELEASE, DATED AUGUST 6, 2015

INDIRECT TAXES

Case Laws

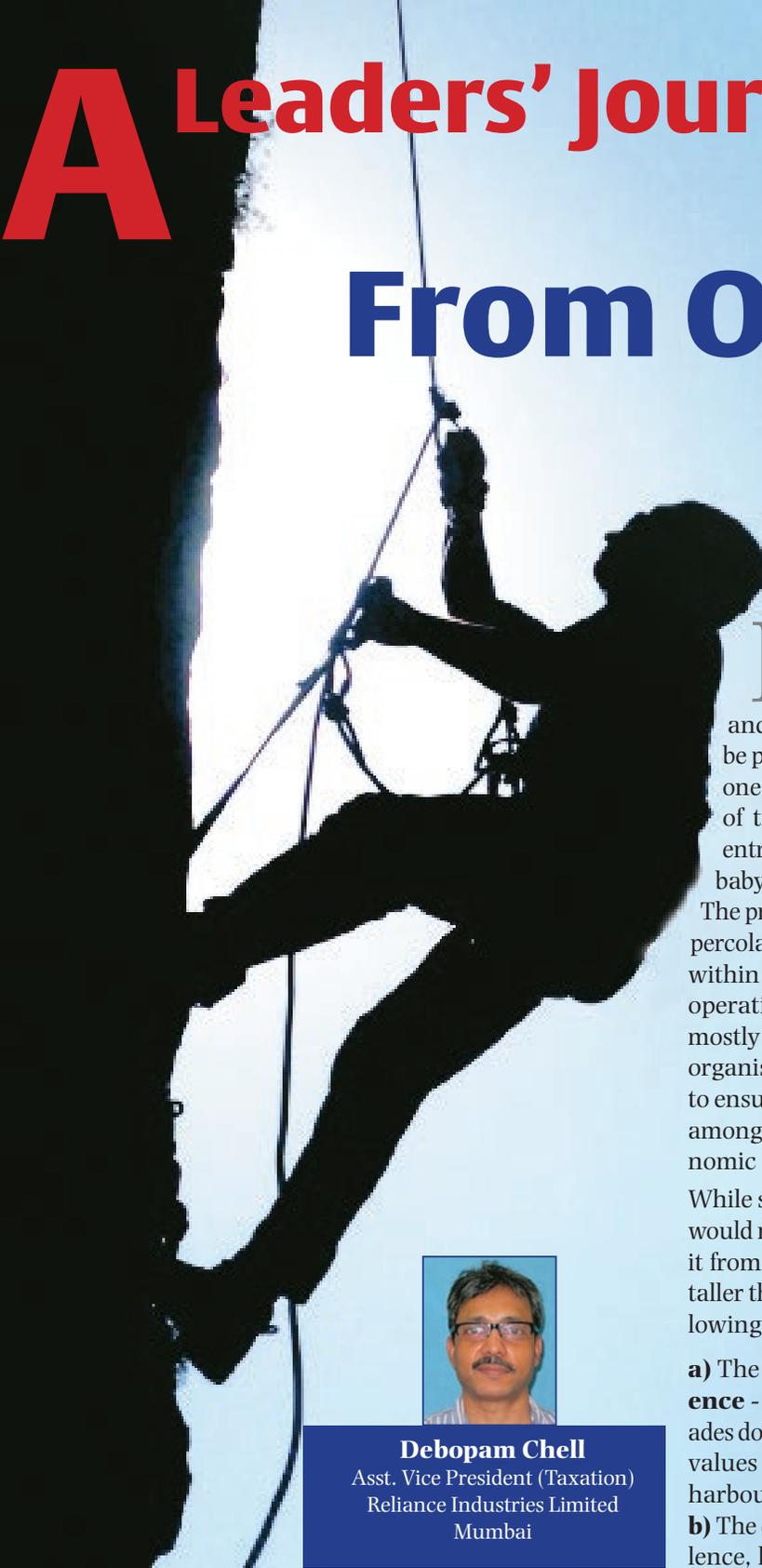
- **Delay in passing review order may be condoned by Tribunal** - Power of Tribunal to condone delay in filing appeals preferred by revenue on review extends to delay caused in passing review order; hence, delay in passing review order may be condoned by Tribunal - *CCE v. KAP Cones* [2015] 60 taxmann.com 5 (SC)
- **High Court strikes down DVAT provision as it sought to levy VAT on deemed sale price of petrol** - Where VAT had been levied on oil products sold by oil marketing companies to dealers and value for such transaction has been taken to be sale price at which dealers sell such oil products to ultimate consumers; since value represents sale price of a future event, levy of tax on such value is constitutionally invalid - *Veer Service Station v. GNCT of Delhi* [2015] 60 taxmann.com 105 (Delhi)
- **Value of captive consumption shall be marked up by 10% even in case of loss** - In valuing captive consumption of intermediate products, notional profits at 10 per cent of cost are to be added to value even if assessee is incurring losses from production of intermediate products - *Chackolas Spinning & Weaving Mills Ltd. v. CCE, Cochin* [2015] 59 taxmann.com 439 (SC)
- **Orders passed under Service Tax Amnesty Scheme are appealable** - 'Designated authorities' under Service Tax Voluntary Compliance Encouragement Scheme amount to 'adjudicating authorities', as they pass order/decision; hence, orders passed by them are appealable as per Finance Act, 1994 - *Narasimha Mills (P.) Ltd. v. CCE (Appeals)* [2015] 59 taxmann.com 219 (Madras)
- **Voluntary disclosure of 'suppression' can't avoid 'extended period or penalty'** - Non-payment of duty despite after crossing exemption limit amounts to 'suppression', which takes place at time of clearance of goods; when suppression has already taken place, subsequent voluntary disclosure by assessee to Department cannot justify a plea of no suppression - *Kripa Fabs (P.) Ltd. v. CESTAT* [2015] 59 taxmann.com 157 (Madras)

Statutes

- **Now cost of land shall be excluded for valuation of works contract under Haryana VAT** - Haryana Value Added Tax (Amendment) Rules, 2015 - Amendment in rule 25 - NOTIFICATION NO.19/ST-1/H.A.6/2003/S.60/2015, DATED 23-7-2015
- **CBEC issues instructions for conducting detailed scrutiny of excise returns** - CIRCULAR NO.1004/11/2015-CX, DATED 21-7-2015
- **Govt. explains reasons for amending exemption notification with non-Cenvat conditions** - Clarification relating to Notifications No.30/2004-C.E., dated 9-7-2004; No.1/2011-C.E., dated 1-3-2011 and No.12/2012-C.E., dated 17-3-2012, as amended from time to time - CIRCULAR NO.1005/12/2015-CX, DATED 21-7-2015
- **CESTAT, Delhi calls for list of pending cases from Advocate involving duty/penalty below 50 lakhs** - CIRCULAR [F.No.01/04/CIRCULAR/CESTAT/2014], DATED 29-6-2015

A Leaders' Journey

From Ordinary



Every business start-ups begin with a **'Dream'** - the dream to make it large - to exhibit its importance and get acknowledged in the society – to be profitable yet get appreciated by everyone in this global village. With the passage of time and gritty determination of the entrepreneur, the business graduates from baby steps and starts taking giant strides. The primary excitement of the entrepreneur percolates down to each and every individual within the organisation. The business starts operating in a more professional manner, mostly by managers who wishes to take the organisation to greater heights. They wish to ensure that their organisation ranks high among its competitors - both in terms of economic and other social parameters.

While studying any great organisation, one would notice a host of factors which separate it from the average, or to say, why it stands taller than several others. To summarize, following differentiators can be outlined:

a) The purpose of organisation's existence - where it wishes to see itself, say decades down the line, its financial growth, social values and responsibilities that it wishes to harbour,

b) The core philosophy of striving for excellence, learning from mistakes, efficiency at



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to Extraordinary

which it adapts and responds to ever changing environment,

c) The value that the business creates to its stakeholders – its ability to surge ahead through fair and ethical means,

d) The happiness quotient of the employees – the zeal, the passion, the attitude of the workforce,

e) The leadership style – resourceful, result oriented, yet promoting healthy competition and nurturing cohesiveness among rank and file

f) The courage of accepting success and failures gracefully - the wish to create superior brand value and image outside.

Journey from being simply good to something very great and noteworthy is extremely difficult – but definitely not impossible. Here lies the real test of any leader. A leader needs to continuously churn new ideas, realign his thoughts, be fearless yet promote a culture of sharing and caring, restructure organisational resources and reinvent himself at each and every step of his being - be it ideation, choice of alternatives or implementation of plans. He has to wear different hats at different points of time or may be a number of hats at the same time.

Journey from being simply good to something very great and noteworthy is extremely difficult but definitely not impossible. Here lies the real test of any leader.

A healthy mixture of process driven automated methods, meritocratic outlook along with people-focus orientation of the organisation, is the need of the hour. Making learning a habit, promoting excellence among employees and also dealing with shortcomings firmly but compassionately, calls for immense mental strength. A leader needs to be gifted with sufficient intellectual acumen. It is these leaders who can then motivate the employees for superior performance and take the organisation to its pinnacle. On the other hand, a not so balanced headed leader may succeed in shorter spans but in the long run, would not be so effective.

An inspiring and thought leadership will always encourage employees to take independent decisions. At times, say, during execution of projects, they may even allow employees to deviate from following standard operating processes, pre-defined guidelines and established practices, may be just to encourage the so-called 'rule breakers' and support them in thinking out of box solutions. These startling leaders are convinced that innovation is a path which is out of reach of common masses - the ordinary rule followers. Having shown this leniency to the subordinates, these leaders then have a greater responsibility of aligning seemingly tangential actions of the subordinates, to the overall purpose - the vision and mission of the organisation. He has to continuously toggle between accelerators and breaks - maintain effective checks and balances. In such scenarios, he is expected to operate in tandem,

i.e. applying centripetal force to the centrifugal and centrifugal force to the centripetal. The leader has to be far-sighted, rightfully gifted to appreciate and evaluate, as to how much is too much. Risky propositions, either too little or too much would ultimately impact the fate of the organisation and eventually rewrite the magnitude of the leader's greatness.

A leader needs to be honest while facing unkind reality. He has to accept mistakes and speak up when things are not going right. He needs to desist from being hesitant in suggesting righteous policies and superior frameworks. Being dutiful, he needs to convey to the Top management or the Board, what according to him, is not so good option for the organisation. For doing that, he requires extra nerve. He needs to abstain from thinking of personal gains and losses and put himself in the firing squad. In nutshell, be prepared to sacrifice for a noble cause.

It reminds me of one of the most tragic characters in **Mahabharata** – the **Karana**. By virtue of his honesty, bravery, resolute character and kindness, he was no lesser hero than the **Pandavas**. But the irony is, history will never remember him as an idol. His deeds will never be taken in the same reverence of that of Pandavas. One feels really sorry for this unsung hero. Let's sympathise on his destiny, his karma.

Remember, he was **abandoned** by his mother and thereby **deprived off** the ancestral **royal lineage**. He was **brought up** by foster parents, who were **charioteer** by profession. **Parasuram**, the great guru, **stopped coaching** him in archery and other martial arts, reason being the **endurance** shown by Karana, while the Guru was asleep, convinced him that Karana was a **Kshatriya** and not a **Brahmin**. Being raised by charioteer parents, he was **not allowed to participate in Draupadi's Sayambhara** and show case his skills and abilities. He always found himself on the wrong side of the road. Interestingly, by virtue of one seemingly selfless act of **Duryodhana**, Karana became the **King of Angad**. But in the long run, history would prove that it was a master stroke by Duryodhana to win over the support of Karana, a great warrior, a friend for life time, who would do anything and everything to reciprocate for this gift.

Tell me, do you call Karana's resolve to payback Duryodhana, for the kindness shown on him, a mistake? No way. However, one will have no second opinion in

deciphering that a very important piece was missing in Karana's character. It was his blindness towards Duryodhana's actions. He was held prisoner to the friendship and completely withdrew to respond to his inner conscience. When it came to Duryodhana's actions, differentiating between good and ghastly, was never considered to be an option. He was shackled in his own thoughts - may be his gratitude towards Duryodhana in general and his vengeance towards **Arjuna**, in particular, held him back. Ultimately this very essential deficiency, proved to be the primary reason of his downfall. His attitude was questionable and hence the aroma of his greatness was never valued. In spite of having all the ingredients, all the potential, of a hero, he turned into a villain.

Let's come back to the organisation and the leadership style. We need to seriously introspect. Have the leaders chained themselves up to the top down directives, mandates and dictums from Top Management? Have they drifted away from their virtue of righteousness? Are they exercising their option of speaking up for a cause? Do they have the courage to represent their independent thoughts objectively, without fearing for momentary losses or gains? In nutshell, have they become Karana themselves?

The correct approach of the leaders would be to evaluate themselves through the mirror of their actions. It's time for them to act wisely and prove their definitive worth. Transforming from ordinary to greatness is a question of choice and no one but only the individual leaders have the ability to choose their path. It is only through their belief and thereby their actions, through which they lay the foundation stone - the road to their greatness. They are the architect of their own destiny. Thus, **Lord Krishna** emphasized, "Hey Parth, Gandiv Uthao Aur Yudh Karo. You are not merely fighting against known people, your brothers, your close relatives. You symbolise Dharma and your primary duty is to denounce Adharma. **You are fighting the war for a much superior cause.**"

So knowledge, skills and abilities can definitely take a leader to a certain height, but if his attitude is found wanting, his appreciation or recognition shall be limited to a specific period and he will live a mortal life. His ascend from good to greatness shall remain elusive.

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Textile Printing Engraving Cost

In Textile Rotary Printing, Engraving Process(EP) cost, of late, has become a part of "Printing Cost". Of different costs included in the EP, the cost of "screens" has a major share and therefore, the type and number of screens used in a design should be considered in arriving at proper EP cost of a design.



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Introduction

In earlier days, printing engraving cost is taken as over head and absorbed into final products like any other OH cost. In recent times, due to increase in competition, when it has become necessary to identify and control even small costs, ABC(Activity Based Costing) is applied to engraving cost also.

Basics of Textile Printing & Engraving

i. In a Textile Rotary Screen Printing Machine, a fabric is printed by passing fabric in contact with a few rotating- engraved "screens". Using pumps, the required colours of dyes are passed from inside to out of the engraved – screens, on to the fabric. The dye comes out only at the engraved part of the screen and thus a design gets

printed on fabric.

- ii. The engraved screens are made usually of nickel and are of different mesh sizes. The screens are made off- line. Engraving(E) precludes some other processes like Paper Design making (PD), "Tracing"(T) and "Stripping"(S) (in some cases).The cost of all these activities viz. PD,T,E,S and rolls, is termed as "Engraving Process(EP)cost".
- iii. Before, a new design is printed, an estimate on the total EP cost is required to give a quote for the design to be printed on a fabric. For this purpose, *estimate on metres of fabric to be printed for the design is required and this estimate forms the basis of all the calculations.* To even out variations, the expenses incurred in

the EP for a period of (moving) twelve months and the corresponding estimated metres for ALL the designs involved are considered in arriving at the average cost/m for PD, T, E and S. Thus, this average cost/m is taken for any design. However, in case of rolls, as they take more than one design, the cost becomes design specific. These details are elaborated in the later part of this article.

Later, after the design is discarded, the actual metres is substituted in place of the estimated metres to arrive at the actual cost.

- iv. Traditionally, the variable cost of printing includes only the cost of “Colours & Chemicals” used. Later, cost of utilities (power, steam, water) used for the entire printing processes is also taken as variable cost. In recent years, the cost of engraving process (EP) is also taken to be of variable nature.
- v. At present, many textile units include only the “average cost of EP per metre printed” in the Printing- Cost where the Avg. cost of EP = Various Expenses of EP in a 12 month-period / Metres printed in the same 12 month period. But the differences in cost of EP for different designs are to be considered to arrive at proper printing cost/metre for a design. Thus a design with three colours will take the cost of three tracings & three engravings as well the cost of three screens, and, a design with five colours will take the cost of five tracings, five engravings and the cost of five screens and so on. Further adjustments, for different types of screens like, “fine mesh”, “ordinary”, “stripped (once, twice, thrice)” etc and the quality of printing for stripped screens are also to be considered for finer costing of EP.

(In Textile-Printing parlance, the word “Rolls” are also used for “Screens”)

Cost Details of EP

Cost of all Materials – Design-Paper, Tracing sheets, Bare Rolls, Chemicals (lacquer), Direct Labour, Power cost of A/C and Heaters used for curing, applied at various stages, are taken to be of variable nature in the EP cost calculations.

There are cost differences between:

- i. Engraving done in-house & Engraving done outside on job work basis.
- ii. Tracing done in house & Tracing done outside.

- iii. Paper design made in house & Paper designs purchased.

Although, cost differences due to the above three items remain, but they are small to be tracked separately for each design and therefore merged for all designs. However, the cost differences arising due to “rolls” are significant and hence accounted separately for each design in the E.P. costing. The details of the various costs are described below.

Paper Designs (PD)

- i. Preparation of Paper designs is the first step. The PDs are drawn in-house and shown to the Sales dept for approval. If approved, **a design number is given** and the PD goes for Tracing. Alternatively, a PD can also be purchased when approved by Sales-dept. Both, the in-house and purchased designs go for tracing. This design number is given in the corresponding tracings, engravings and in some cases even on the printed fabric at its selvedge. As per design number, all costs are arrived at and it is the common thread that links the corresponding PD, tracing, engraving, stripping and the rolls.

The average cost (per metre printed) of the PD = [The total cost of all the paper designs (in-house and purchased)] / [The total estimated or standard metres to be printed using those PDS].

Thus, this cost is based on estimated or standard metres of fabric to be printed for the PDs of ALL the designs made in a given period.

The price-figs taken in the examples given below do not reflect the actual price situation and are given for illustration only.

Example: 1

Ending Dec 12, total cumulative cost [material + artist (DL) + A/C power cost] of in-house PD for the year was Rs 5,00,000, the sales dept. approved only 1,250 out of 1,500 designs made in the same period. (The rejection% is normal). Therefore, the cost of PD (in house) is = $500,000 / 1,250 = 400$ per design.

In the same year, 450 designs were bought (after Sales-approval) at Rs 350 per PD. The average cost of PD (in-house & Purchase) is =

$$[(500,000) + (450 \times 350)] / (1250 + 450) = 657,500 / 1,700 = \text{Rs } 387 \text{ per design}$$

If the estimated metres to be printed from all the 1,700 PDs are 4,25,00,000 mtr, then, $657,500 / 4,25,00,000 = \text{the average cost of PD} = \text{Re } 0.015 \text{ per mtr. (Item A).}$

[The information on PD cost/Design (in-house) and PD Cost/Design (Purchased) is useful just to compare these two costs. This explanation is also applicable for tracing and engravings done in-house and outside.]

Being small, this average cost, is taken as the PD cost for ALL the designs and the association of the specific design cost to the corresponding design is not followed.

- ii. Exclusive design: If a design is exclusivity of one customer, i.e. not to be used for other customers, it is called an exclusive design. Special occasion designs like that needed for political parties (Leader's Birth Day, Election etc), Church events- like arrival of "Pope" and so on are examples of exclusive designs. The metres of the exclusive designs are usually small and also the requirements are irregular and therefore, such designs and the associated metres and the corresponding costs are not considered (if the details for the exclusive designs alone are available), in arriving at the normal PD cost/mtr to be printed. This argument is valid for tracing and engravings also. For exclusive design, the estimated costs of PD etc, are associated to the actual metres to be printed as per the purchase order.
- iii. Once a paper-design is finalised, the number of rolls, the type of rolls (in terms of "new" or "old", as well as "ordinary" or "fine" mesh) to be used, are also decided.

Tracing (T)

- i. The next stage in EP, is colour-separation of design, where the design of a particular colour in the PD is traced separately on a tracing sheet. This process is called "Tracing". For instance, if a PD contains horizontal lines, vertical lines and flower designs of different colours, if all horizontal lines are in red colour, all vertical lines are in Blue colour and all Flowers are in Green colour, then one tracing sheet (meant for Red Colour) will

contain only all the horizontal lines and another tracing sheet (meant for blue colour) will contain only all vertical lines and the third tracing sheet (meant for green colour) will contain only the-design of the flowers. Each tracing sheet will have the design number of the PD. Thus a design with three colours will have three tracing sheets. All the tracings of a design are kept in one bundle with a design number marked on the bundle.

- ii. The tracings can be made in house or done outside, depending on the facility/skill available and like PD the average cost of tracing is taken for costing.
- iii. The cost of tracing is absorbed based on the same estimated metres to be printed- as taken for the PD.

Example 2

(Ending Dec12,) Tracing cost is for: tracing film, ink, tracer (D/L) + A/C power

The cumulative total cost of in-house tracing (for the last 12 months) was Rs, 50,00,000.

The cumulative number of tracings made in-house = 5,000. Avg. cost (inhouse-T) = $50,00,000 / 5,000 = \text{Rs } 1,000 / \text{tracing}$

Cumulative total cost of tracing done outside = Rs 25,00,000, number of "Tracing" done outside = 2,000, Average cost (outside-Tracing) = $25,00,000 / 2,000 = \text{Rs } 1,250 / \text{tracing}$.

Overall (In-house & Outside) average cost/ tracing = $75,00,000 / 7,000 = \text{Rs } 1,071$.

Cumulative average number of tracing/ design = $\text{Cumulative \# of tracings made} / \text{corresponding cumulative \# of design} = 7,000 / 1,750 = 4$ (i.e. average colours/ design = 4), the total mtrs to be printed, pertaining to all the 1,750 designs are 4,50,00,000m, and avg mtr/ design = $45,000,000 / 1,750 = 25,714$. As each roll in a design is used simultaneously the avg. mtr applicable for each tracing (and the roll) is 25,714, and so the avg. cost per tracing/mtr = $1071 / 25714 = \text{Re } 0.042$ - item B.

It is to be noted that the above cost can be arrived at directly also without calculating the cost/tracing and mtrs/tracing. But the step followed gives an idea of No:of tracing/design and mtrs/design.

- iv. Being small for a metre printed, this average cost, is taken as the cost/tracing for all the designs and association of the specific tracing cost to the cor-

COSTING

responding design is not followed.

- v. It is to be noted that the number of designs for the tracings made and the no:of designs for the PDs made in the same cumulative period need not match due to work in process.

Engraving

i. The next stage is “Engraving”. Using the traced designs on tracing sheets, engraving is done on rolls, by exposing the photo sensitive chemically coated rolls to lights (like in photography). Corresponding to each colour of the design, using the corresponding tracing sheet, one roll is engraved. Thus one tracing sheet has its corresponding one engraved-roll.

ii. While engraving, the design number on the tracing sheet get engraved at one end of the roll so that, at the time of searching for the rolls of a particular design number, the design number on the roll itself will help in tracing the rolls fast. Like tracing, engraving can be done in house or outside.

Example-3:

Items for engraving cost: lacquer, heater power, a/c power, engraver)

*For 12 months, till end of Dec 12, the total cost of engraving (in house & outside) = Rs 2,50,00,000
No: of rolls engraved = 1650. The avg. cost of engraving per roll = $25,00,000/1650 = 1515$ - and if the mtrs to be printed from these engravings from say 415 designs are 95,87,330, the avg. mtr/dsn = $95,87,330/415 = 23,102$. If 1650 engravings are for 415 designs, the rolls/design = 3.98. So, $1515/23,102 =$ avg engraving cost per roll/mtr = Re. 0.0656 -- item C.*

As the engraving cost do not vary much with the design, this average cost, is taken as the engraving cost/roll/mtr for ALL the designs.

Types of New Rolls

The new rolls (NR) may be of open or fine mesh or extra fine mesh type. For fine line designs, extra fine mesh rolls are used. Fine mesh rolls are more expensive than ordinary rolls. *The cost differences in the various types of rolls used are significant, as per activity based costing principles, the corresponding costs are traced separately for each design, in the EP cost calculations.*

Stripped Rolls (OR)

The engraved (new) rolls are printed for certain metres of fabric (as per the sales order for the design). Then, the NR is “Stripped” of the design (i.e. made bare) and chemically coated again to engrave a new design. The stripped rolls are called ‘Old Rolls (OR)’. To indicate whether a roll was stripped once, twice or thrice, a mark like OR1 or OR2 or OR3 (as the case may be) is engraved at the time of engraving a stripped roll. Usually three “stripping” are done before discarding a roll.

Example-4:

(Items: D/L stripper, stripping chemicals, electrical power)

For the 12 month ending Dec 12, the number of stripped rolls was 2,000 and the total cost of stripping was Rs4,00,000.

The average cost of stripping = $4,00,000/2,000 =$ Rs2,00 per roll and the metres applicable per design is 23,000 and so, $200/23,000$ is the stripping cost per roll/mtr = Re. 0.0087 -- item D.

As the stripping cost do not vary with the design, this average cost, is taken as the stripping cost/roll/mtr for ALL the designs.

The cost of “Stripping” is taken for the stripped (OR) rolls **only**.

It is important to note that, the designs are printed one after the other, while rolls of the same design are used/printed simultaneously.

A roll for more than one design

- i. A new roll (NR) is used for say design 1, after printing some metres of design 1, the roll is stripped and a second design is engraved (in rare cases, the same design-1 is engraved if some defects were found in the design-1 engraved earlier on the roll), after printing some metres of design 2, it is stripped (second time) to engrave say design 3 on it and after printing some metres of design 3, stripped (third time) to engrave say design 4 on it and after printing some metres of design 4, the roll is discarded. The first stripped roll is called OR₁, the second stripped roll is called OR₂, the third one as OR₃.
- ii. The quality of printing is better for a NR, slightly less for OR₁, still more less for OR₂ and the least

for OR₃. Considering this quality parameter, it is appropriate to assign higher cost for a NR, slightly lower cost for OR₁, still more lower cost for OR₂ and the least cost for OR₃. If the quality index (QI) of NR is taken as 1, the QI of OR₁ may be taken as 0.75, OR₂ as 0.5 and OR₃ as 0.25.

[QI will vary from one mill to the other- based on their experience].

- iii. As said earlier, the PD, T and E are associated to a design, while rolls take different design numbers on the same roll-one after the other. This means, if designwise, the actual cumulative metres printed are known, the same metres are applicable to PD, T and E of the same design number. But, the same point is not applicable to the rolls. Therefore, each new roll is given a number (called roll number) and when the information on designwise metre printed are recorded, the roll(numbers) with prefixes for the type of roll (NR, OR etc) are also
- iv. Recorded from which actual cumulative metres printed for each roll can be arrived at.
- v. Suppose, the standard life of a roll is 200,000m, a roll will be used as NR for 100,000m (i.e. 50% of the time), as OR1 for 50,000m (i.e. 25% time), OR2 for 30,000m (i.e. 15% time) and as OR3 for 20,000m (i.e. 10% time), then if the cumulative average cost per roll is Rs30,000, the NR will take a cost of Rs15K, OR1=Rs.7.5K, OR2=Rs4.5K and OR3=Rs3K. The QI is applied to these costs to arrive at the cost per mtr.

Example5:

If costs are: (1) NR(Ord)=Rs30,000/roll, (2) NR(fine mesh-FM) =Rs32,500/roll, (3) NR(extra fine-EF)=Rs35,000/roll, if the total life of the rolls are respectively, 200K, 175K and 150K mtr, then, the roll cost per roll per mtr of some type of (randomly selected) rolls (in Rs) are (given share in tot. cost for NR=50%, OR1=25%, OR2=15%, OR3=10%):
 $NR(Ord) = (QI \text{ of NR}) \times (\text{share of NR} \times \text{tot. cost of NR} / \text{mtr used as NR}) = (1) \times [(0.5 \times 30K) / (0.5 \times 200K)] = \text{Rs. } 0.15 / \text{m} / \text{roll}$
 $NR(FM) = (1) \times [(0.5 \times 33K) / (0.5 \times 175K)] = 0.189 / \text{m} / \text{roll}$
 $OR_2(FM) = (0.5) \times [(0.15 \times 33K) / (0.15 \times 175K)] = 0.094 / \text{m} / \text{roll}$

$NR(EF) = (1) \times [(0.5 \times 35K) / (0.5 \times 150K)] = 0.233 / \text{m} / \text{roll}$, $OR_3(EF) = (0.25) \times [(0.1 \times 35K) / (0.1 \times 150K)] = 0.0583 / \text{m} / \text{roll}$ and so on.

The cost for say NR(ord) is arrived at as: (Total cost of NR(Ord) rolls bought in last 12 months) / (tot.# of NR-Ord rolls bought in last 12 months). Similarly for other NR rolls.

Having arrived at the exact cost of these 12 types of rolls, the next task is to identify which exact roll is used for printing a particular design on fabrics, in a month, so that appropriate cost can be associated with it.

Data collection at the time of Printing:

When a fabric is printed, the printing dept. should note (i) the design number, (ii) the exact type of rolls used (like NR(Ord), OR2(FM), etc), the roll number and (iii) the total mtrs printed (vide Table- A for an illustration). Details on the type of roll are engraved on the roll itself and hence can be noted with ease by the printing dept.

Table-A

Design #	Metres ptd (Dec12)	Cumu mtrs for the 12 months	Roll Type	Mesh Type	Roll No:
4001	20,000	45000	OR1 NR, OR1	Ord FM FM	OR1-201 NR-323 OR1-345
5001	25,000	52,000	NR, OR2, NR	Ord FM EF	NR-545 OR2-233 NR-267
5201	13,500	48000	OR2, OR2, OR3, OR1	EF, Ord, Ord, FM	OR2-467, OR2-455, OR3-496 OR1-437

NB(1): The deleted figs are shown just for information.
 NB(2): The cumulative mtrs can be obtained from computer and the Printing dept. need not record them.
 The summary of the various costs are repeated below

for easy application in the calculation that follows.

PD cost/m= **Re.0.015 per mtr. -Item A**

Tracing cost/tracing/mtr= **Re0.042-item B**

Engraving cost/roll/mtr=**Re0.0656-itemC**

Stripping Cost/roll/mtr=**Re0.0087--itemD**

Cost per metre printed of a design.

(Period: Last 12 months ending Dec12)

i. Calculation of std.EP cost/metre (Rs) for Design# 5001

a) Paper design cost/m = 0.015 --- applicable to all designs.

b) Tracing cost/tracing/mtr = 0.042 -- applicable to all designs

c) No: of rolls = 3 and therefore the no: of tracings in the design# 5001 = 3

[NR(Ord) = 1, NR(EF) = 1, OR1(FM) = 1]

Therefore, Total Tracing cost.mtr = $3 \times 0.042 = 0.126$ -- applicable to design# 5001

c) Engraving cost/roll/mtr = 0.0656 -- applicable to all designs

No: of rolls engraved = 3

Total Engraving Cost/mtr = $3 \times 0.0656 = 0.1968$ --- applicable to design# 5001

d) **Roll cost** (vide Example-5)

Rolls used: For NR(Ord) = 1 roll, 0.15/m + NR(EF) = 1 roll = 0.233/m + OR2(FM) = 1 roll = 0.094/m. Total roll cost = 0.477/m --- applicable to design# 5001

e) **Stripping Cost** (for old rolls only)

No: of old rolls used (out of 3 rolls in the design) = 1 [i.e. OR1(FM)]

Stripping cost/roll/mtr = 0.0087 --- applicable to all designs

The total EP cost for Design 5001 (last 12 months avg) is = 0.015(PD) + 0.126(T) + 0.197(E) + 0.477(Ro

ll) + 0.008(S) = Rs 0.823/mtr

The above cost for a design, is based on **actual costs of items and utilities** used but based on **standard metre applicable** for the **actual type and number of rolls** used in design # 5001. The actual cost for a design is arrived at after the design is discarded. The actual cost is calculated for the rolls only. For all other costs viz. PD, T, E and S, as the costs are small and so the difference between the std and actual may not be worth calculating.

ii. In a similar manner, the EP cost/metre printed for other designs can be worked out. Thus, the EP cost for each design will vary depending on the composition of the different types of rolls used, the number of rolls applicable for the design.

iii. In case, a roll breaks before its life, there will unabsorbed cost and the amount of unabsorbed cost will depend on at what stage it breaks - i.e. as NR or OR1 or OR2 or OR3 and that too after printing how many metres of fabric etc.

iv. The variance analysis and calculations on under/over absorption will be as per the standard procedures adopted for them and therefore not described here.

Conclusion

EP-cost applicable to specific designs for P, E, T, E is also possible - if finer Activity Based Costing is applied. Use of computer to record various details and to calculate the appropriate cost is necessary to compute the EP cost. The manual calculations will be tedious and hence will be subject to error. A closer interaction with the technical experts is required for understanding the various cost drivers to arrive at such a finer and more appropriate cost of EP. **MA**

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Corporate Governance and Inner Consciousness

*The corporate world is adopting the mechanism of legislation and guidelines to establish a framework of least corruptive practices.
But how far this will lead to achieving the coveted goal still needs to be seen.*



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“To be able to do the right thing in the right way, in each case and at every moment, one must be in the right consciousness” – Sri Aurobindo

Ethics has taken a central place in the parlance of governance. In the same spirit, its rampant pseudonymous usage has gained ground in the realm of corporate governance. Ethics, literally, means a branch of philosophy which seeks to determine the correct application of moral notions.

Ethics is traditionally sub-divided into normative ethics, meta-ethics and applied ethics. Normative ethics seeks to establish norms or a standard of conduct. A crucial question in this regard is whether actions are to be judged right or wrong based on their consequences or on their conformity to some moral rules. Meta-ethics is concerned with the nature of ethical judgements and theories. Meta-ethical theories are based on naturalism, intuitionism, emotionalism, and prescriptivism.

Applied ethics, as the name implies, stands for application of normative ethical theories to practical moral

problems. Applied ethics, adjudged with normative ethics, is the goal to be perceived and attained. Normative ethics, in other words, is the final point, whereas, applied ethics has to operate and endeavour to move towards normative ethics to adjudge its conformity with it. It should be a continuous process. Applied ethics is an operative mode of behaviour and action, whereas normative ethics is the guideline to be used as an adjudging tool. The former is the ethical action interfaced with real life issues and the latter is the prescription to be applied to make the ethical values pervasive.

Applied ethics is an operative mode of behaviour and action, whereas normative ethics is the guideline to be used as an adjudging tool. The former is the ethical action interfaced with real life issues and the latter is the prescription to be applied to make the ethical values pervasive.

Now, the question arises as to how the science of ethics should find a self-regulatory place in the corporate sector. It is a clear fact that where a mind with cleansed character is the key tool to decide the mode of operations, the legal guidelines, policies and compliances play a satisfying role in regulating human actions. Self-manifestation finds no substitute and it is the

truest fact. Sooner the human race accepts it, easier it will be to cleanse the society. Had the prescriptive rules, guidelines and legal strictures been enough, the face of corporate governance would have been cleansed long back. It does not mean that guidelines, policies and rules have not worked at all. These have provided a direction to the management, although in a shape of an enforcing apparatus, as self-manifestation and introspection are found to be non-existent.

Inner-consciousness has to play a formative role to build the character of the person and the society. There is no substitute of inner purity and values. It must have a predominant place in the life of people, if a society with a practical shape of coexistence has to pervade.

Self-manifestation and introspection are to be defined. They should find a place singularly whenever something manifests in the human mind. It leads to introspection, which in turn leads to look into inner-consciousness to adjudge all actions on the nucleus of moral spirit. It tries to create a world away from the vicious circle of greed, corrupt practices, immoral behaviour, and many other ill activities. It leads to ignite the sleeping sense of inner-consciousness.

Inner-consciousness has to play a formative role to build the character of the person and the society. There is no substitute of inner purity and values. It must have a predominant place in the life of people, if a society with a practical shape of coexistence has to pervade. Absence of inner-purity has worsened the situation and its ill effects are today widespread.

The question arises as to why and how such a situation has emerged. It appears that the creation has ceased to give birth to good people. But, it is totally improper to put blame on the nature, which has always been subservient to moral and ethical values and playing of a nourishing and cleansing role even when we are sleeping. The nature is universe-shaped or guided dynamics and possesses a curative weapon in its armoury. It is always engaged in cleansing distorted or ill-faced behavioural or unaccommodating off-springs of the mankind. Hence, nature is always full of creative processes, although on surface it appears to be causing devastation or destruction which may probably be a continuous process of purification of godly behaviour.

The issue rests with corporate governance with inner consciousness. There are numerous issues to be addressed or discussed. Rules are to be predominant in regulating corporate governance or the guidelines with ethical spirit are to be interwoven for its natural flow. Rigorous prescriptive adherence will provide a sense of disciplined and timely action with no leeway. But, in the absence of inner consciousness, it may be just a mechanistic way of regulating or governing the state of affairs. It may probably be tainted with some unscrupulous operations in the inner flow of actions, all the while appearing sacrosanct on the surface. On the other hand, if ethics is pervasive or has become a way of life, good governance is bound to prevail like the wind. In this case, no guideline or rule is necessary to be referred. Clarity of the spirit will guide and lead the activities to the correct direction. The soul and core of corporate governance is not the conduct or behaviour that we see outwardly. These are internalised values which an organisation and the top management follow. Our consciousness has two parts. First is the lower physical-vital being driven predominantly by self-interest, material needs, and sensuous desires, often degenerating into greed; the second is the higher mental, moral, and spiritual being, seeking truth, beauty, goodness, harmony, and unity. Corporate governance, to be truly effective and enduring, has to be based on the latter part of human conscience. An important quality of this part is self-governance. The higher self in us does not need the threat of external legal prescription or the lure of external reward to remain good or ethical. It has an intrinsic motivation for ethics and self-regulation. A self-governing individual in a self-governing community must be the best example of corporate governance. We are, individually and collectively, far removed from this ideal. We still need laws because we are far away from the capacity to shoulder the ideal for self-governance. But, we must keep this ideal as the Pole Star and gradually progress or evolve towards it, through a combination of enlightened regulation of the external environment, and inner transformation through education and inner-discipline.

So, the inner-consciousness is the sole guiding principle for corporate governance.

But rekindling the dying spirit of inner-consciousness in every walk of human life is the biggest problem of the society. Ethics, morals and other human charac-

teristics are waning with the pace of economic race. But, in the corporate parlance, resuscitating the whole canvas appears to be a big task. First, it is to be reasoned as to how the uninterrupted race of actions, away from the spirit of inner-consciousness, has taken root in the corporate management. Reasons are not exhaustive. But some of them are as under.

Materialistic way of life: People, today, are more engaged in pursuing the numerous ways of wealth accumulation. The society, too, views such people as an epitome of success. This has led the whole society to be in hurry to grab the opportunity somehow. In fact, it is largely like a herd-like behaviour. This is rampant and widespread is almost an 'infection' now. This has triggered an unstoppable journey of activities for amassing wealth and power.

Educational scenario: The country's educational scenario is also responsible for the erosion of morals and good practices from the society. Earlier, the pursuit for education was for the sake of enhancement of knowledge, and creating a world away from the hurly-burly of the mainstream. But with the pace of industrialisation and urbanisation of the economy, education ceased to remain in the form of enlightenment. There started a quid pro quo concept in the whole branch of study. Enlightenment has been relegated to the backseat. A pseudo-education syndrome has started to reign over the entire educational system. Both givers and takers are now found to be in pursuit of commerce and self-interest. The education scenario has ushered in a process of unethical race in every walk of life. And, if the education is subjected to a concept, and exposed to only economic and physical well-being, then we can never build a society based on values. The corporate managers coming out of this distorted dynamics of education are no more capable of treading on the path of inner-consciousness, as the string of emotion, compassion and ethical reasoning has been weakened by gradual process of self-interest and self-realisation. Some of them try hard not to be swayed by the flow of wealth and too much commercial and practical stream, but when the blow of practicality gets accentuated, they finally succumb to the demand by creating a mask of excuses around themselves. So, inner-consciousness has fallen prey to our educational system which needs to be revamped and re-designed. The issue of GDP must be kept far away and uncorrelated with the system of enlight-

ment. It is not to be taken as a mistaken mission, and the curriculum should be redesigned to make art, culture, civilisation, literature and philosophy of morals and human values more emphatic so that the prevalent imbalances in the education system could be arrested.

As corporate governance is entirely a human goal oriented issue, germination of seeds of inner-consciousness will bring into process a selfless action for corporate management. In that case, government prescriptive theories and legal directives will automatically be followed. But it is not that easy. It, in fact, is the toughest task for the society. But it is to be done, if value-based development is to be cherished. It is emphatically needed, especially in the arena of corporate management of both the government and private sectors. Nation building is the prime and core issue and in no case, we can lose our sight. In our daily life, workshops and seminars for ethical ways of life with proper presentation showing benefits there from, should be organised regularly for each and every level of personnel in the organisation. It may reverse the wind of greed and unethical practices. Short-term gains out of petty self-interests are not to be pursued because these lead to loss of peace, tranquillity, and also the vitality of life.

But, there lies an axiom that in the business world, pragmatism is at the core and inner-consciousness may not be the criterion for decision-making. But, it is still a flawed thought. With all firmness and clarity, it should be emphatically outlined that to be pragmatic without being morally conscious for decision making is not going to bear an enduring fruit either for the organisation, the society, or the individual himself. This is because when we are fully tuned with the laws of nature, we conform to the creative energies and rhythm of the earth, which is bound to bring concrete and ever-lasting positive results.

Every organisation should strive for generating an environment where self-interest should not come in the way of creation of morals and ethics. Ideally, corporate governance should endeavour to create corporate consciousness and an environment in which those who are charged with governance and those who are governed, display genuine ethical, social and ecological responsibilities. **MA**

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Recent Developments



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Almost all countries in the world are looking up to tourism as an important contributing factor to growth and prosperity. The ever-growing size of the tourist market all over the world promises immense possibilities and expectations. With the expanding global affluence, increasing facilities of air transport, and considerable leisure time at people's disposal, the tourist traffic has been rapidly heading northwards over the past several years.

In 2012, international tourist arrivals grew by four percent to surpass the one billion (1,035 million) mark for the first-time. Tourism has already been recognised as a powerful instrument for socio-economic development. The Los Cabos G20 summit of 2012, included tourism for the first time in its declaration, which said: "We recognise the role of travel and tourism as a vehicle for job creation, economic growth and development; while recognizing sovereign right of the state of control the entry of foreign nationals. We will

work towards developing travel facilities initiatives in support of job creation, quality work, poverty reduction and global growth."

Tourism has been an integral part of Indian tradition and culture. In the past, travel was largely for pilgrimage. People also travelled to visit fairs and festivals in different parts of the country. It led to a cultural tradition where *Atithi Devo Bhaba* (let the guest be god) and *Vasudhaiva Kutumbakam* (the whole world is one family) became bywords of Indian social behaviour. It encouraged promoting modern tourism in our country. The organisation for tourism started taking a definite shape after the Sargent Committee report on the potential of tourist traffic in India was published in 1946. Promotion and development of modern tourism at the government level started by setting up of the Tourist Traffic Office with two regional offices in Mumbai (then Bombay) and Delhi in 1949.

The tourism ministry has taken the initiative of iden-

in India Tourism

Tourism is often dubbed as the sunrise sector of the Indian economy. While international tourist inflow to the country has increased, it's still far from satisfactory. A concentrated effort of the Centre and state governments is necessary in this regard.

tifying, diversifying, promoting and developing niche products of the tourism industry, to overcome the aspect of 'seasonality', and promote India as a 365-day tourist destination, attract tourists with specific interest and to ensure repeat visits for the products in which India has competitive advantage. Following are some of the niche components that were identified to promote tourism.

Cruise tourism

Cruise shipping is one of the most dynamic and fastest growing components of the global travel industry. India, with its vast and beautiful coastline, virgin forests and undistributed idyllic islands and rich historical and cultural heritage, can emerge as an attractive tourist destination for cruise tourists. In fact, it is emerging as a fast marketable product. The government sanctioned 22.43 crore and 17.25 crore for the development of the Cochin and Chennai ports

respectively. Besides, 47.62 crore was sanctioned in March 2013, for developing the Alappuzha backwater circuit in Kerala. Financial assistance was provided to construct jetties, cruise vessels, boats, and others as a part of river cruise development.

Adventure tourism

Adventure tourism involves travel to remote, exotic areas, to explore and undertake activities that test human endurance. It is rapidly growing in popularity as tourists seek different kinds of vacations. The Centre is extending financial assistance to state governments and union territories to develop tourism infrastructure. The tourism ministry has also formulated a set of safety and quality guidelines to ensure the basic minimum standard for adventure tourism. It also provides funds to the Indian Institute of Skiing and Mountaineering (IISM), Gulmarg to conduct adventure courses. In 2013-14 149.10 lakh was sanctioned to IISM

Table 1: Amount sanctioned to IISM by the Centre

Courses	No of courses	No of trainees	Total expenditure (₹ lakh)
Snow skiing	6	480	42.10
Water skiing	5	150	43.50
Trekking	5	100	15.65
Parasailing	6	96	15.60
Hot air balloon	4	40	32.25
Total	26	866	149.10

The tourism ministry has taken the initiative of identifying, diversifying, promoting and developing niche products of the tourism industry, to overcome the aspect of 'seasonality', and promote India as a 365-day tourist destination

Medical tourism

Also known as medical travel, health tourism or global



healthcare, medical tourism is used to describe the rapidly growing practice of international travel for healthcare. Services typically sought by the travellers include cardiac, dental and cosmetic

surgeries, joint replacement, and others. Besides India, several Asian countries like Singapore, Malaysia and Thailand are offering healthcare and promoting medical tourism. India excels among its peers because of state of the art medical facilities, reputed healthcare professionals, quality nursing facilities, less waiting time for availing services and the country's traditional healthcare therapies like ayurveda and yoga.

Golf Tourism

Sports tourism is increasingly gaining popularity in India. Golf, for one, is attracting growing interest. India hosts several international golf competitions that attract foreign tourists. The tourism ministry has formed the India Golf Tourism Committee (IGTC),



which is the nodal body for golf tourism in the country. The IGTC approved 23 golf events in 2012-13 and disbursed ₹ 431.16 lakh in this regard.

Polo tourism

Polo originated in India and it is one of the few countries where this game is still preserved and practiced. The game has been granted a heritage sport status by the government. The tourism ministry plans to encourage the game in collaboration with the Indian Polo Association and has formulated guidelines.



Eco-tourism

Eco-Tourism in India is still at a very nascent stage, but there are conscious efforts to save the fragile Himalayan eco-system and the culture and heritage of indigenous people, which is probably the largest concentration in the world. Eco-tourism broadly includes the following points:

- Involvement of the local community, leading to overall economic development of the destination area



- Identifying the likely conflicts between the use of resources for eco-tourism and the livelihood of the local inhabitants
- Compatibility with the environment and socio-cultural characteristics

Film tourism

The tourism ministry has recognised films as a powerful tool for the development and promotion of destinations. It has taken the following initiatives:



- Signing of memorandum of understanding with the ministry of information and broadcasting in 2012.
- Joint participation with Cannes Film Festival, International Film Festival of India (IFFI) and the European Film Market, Berlin.
- Encouraging state governments and union territories to facilitate filming in their region.
- Formulation of guidelines for extending financial support to state governments and union territories for promotion of film tourism.

Sustainable tourism

The tourism ministry has constituted a steering committee with representatives from all the 14 sectors of the tourism and hospitality industry of India. The

committee has finalised the sustainable tourism criteria and indicators for the accommodation and tour operator sector.

The Hunar se Rozgar Programme

This was a special initiative launched in 2009-10 to create employable skills among the economically weaker sections of the society in the age group of 18-25 years, to reduce the skill gap affecting the hospitality and tourism and to ensure the spread of economic benefit of tourism to the poor. Short duration courses offered under this programme include food and beverage services and food production courses in housekeeping, utility and bakery. Patisserie was added later. With the growing acceptability of the initiative, more trade/training areas were added.

Visa on Arrival (VoA)

The five-year tourist visa with a 90-day stipulation for each visit, has been introduced on a pilot basis for tourists from 18 countries. A tourism ministry study has revealed that the system has created a great impact on tourists to visit India. In the 2013 calendar year, 20,294 VoAs were issued compared with 16,084 in 2012, indicating a 26.20 percent growth.

Performance appraisal

Despite immense possibilities, India is yet to find its rightful place in the world tourism map. Although the sector has been growing in terms of tourist arrival with a growth rate of around 4.5 percent between 2000 and 2013 at international level, India's performance in the last decade has been much better with an overall growth rate of over 12 percent. India's rank with respect to foreign tourist arrivals was 50 and 41 in 2000 and 2013 respectively.

Foreign tourist traffic to India

The number foreign tourists visiting India vis-à-vis the rest of the world, between 2000 and 2013, is revealed in table 2. Foreign tourist arrivals in India in 2000 were 2.65 million, which significantly increased to 6.97 million in 2013. The foreign tourist arrival numbers was only 0.39 percent of world tourism as recorded in 2000. It increased a mere 0.64 percent in 2013. A less than impressive performance indeed.

Table 2: International tourist arrival in India vis-à-vis the world

Year	International tourist arrivals (in millions)		% change over the previous year	% share of India in world tourism [2/1x100]	India's rank in world tourism
	World [1]	FTA in India [2]			
2000	683.3	2.65	-	0.39	50
2001	683.4	2.54	-4.2	0.39	51
2002	703.2	2.38	-6.0	0.37	54
2003	691.0	2.73	14.3	0.34	51
2004	762.0	3.46	26.8	0.39	44
2005	803.4	3.92	13.3	0.45	43
2006	846.0	4.45	13.5	0.49	44
2007	894.0	5.08	14.3	0.53	41
2008	917.0	5.28	4.0	0.54	41
2009	883.0	5.17	-2.2	0.58	41
2010	948.0	5.78	11.8	0.59	42
2011	995.0	6.31	9.2	0.61	38
2012	1035.0	6.58	4.3	0.64	41
2013	1087.0 (P)	6.97	5.9	0.64	41

Source: India Tourism Statistics at a Glance, 2014

Forex earnings

One of the major economic benefits of promoting international tourism is the scope of earning valuable foreign exchange by serving international guests. The tourism sector of India earned \$3,460 million forex in 2000 which rose considerably to \$18,445 million in 2013, representing a 533 percent increase (table 3). India's share of international tourism receipts was a meagre 0.73 percent in 2000 which more than doubled to 1.59 percent in 2013.

Table 3: International tourism receipts in India and its share in world (2000-2013)

Year	International tourism receipts		% change over the previous year	% share of India in world tourism [2/1x100]	India's rank in world tourism
	World (in \$ billion) [1]	FTA in India (in \$ millions) [2]			
2000	475.3	3460	-	0.73	36
2001	463.8	3198	-7.6	0.79	36
2002	481.9	3103	-3.0	0.64	37
2003	529.3	4463	43.8	0.84	37
2004	633.2	6170	38.2	0.97	26
2005	679.6	7493	21.4	1.10	22
2006	744.0	8634	15.2	1.16	22
2007	857.0	10729	24.3	1.35	22
2008	939.0	11832	10.3	1.26	22
2009	853.0	11136	-5.9	1.31	20
2010	931.0	14193	27.5	1.52	17
2011	1042.0	16564	16.7	1.59	17
2012	1078.0	17737	7.1	1.65	16
2013	1159.0 (P)	18445	4.0	1.59	16

Source: India Tourism Statistics at a Glance, 2014

Domestic tourism

Domestic tourism, for the most part, remained a neglected area and relatively less-developed. While domestic tourists may not bring forex, they are nonetheless responsible for employment generation in the peripheral region, and also sustaining the industry during lean period and fostering peace, national integration and mutual understanding. Pie-chart 1 reveals domestic tourism trends in 2013.

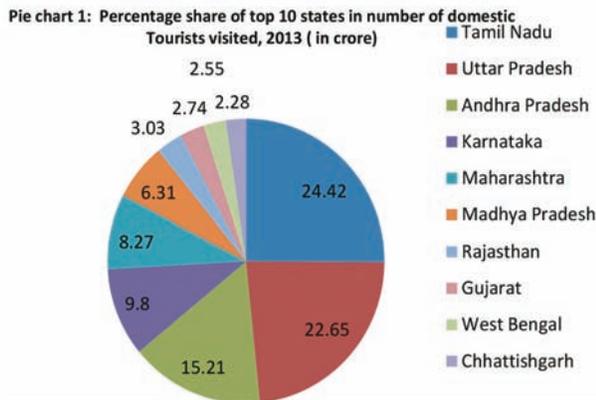


Table 4: Number of domestic tourist visits to all states and UTs in India (2000-2013)

Year	Domestic tourists (in millions)	% change over the previous year
2000	220.11	-
2001	236.47	7.4
2002	269.60	14.0
2003	309.04	14.6
2004	366.27	18.5
2005	392.01	7.0
2006	462.32	17.9
2007	526.56	13.9
2008	563.03	6.9
2009	668.80	18.8
2010	747.70	11.8
2011	864.53	15.6
2012	1045.05	20.9
2013	1145.28	9.6

Source: India Tourism Statistics at a Glance, 2014

Position of the accommodation sector

With the passage of time, the accommodation sector has developed a lot with the pace of increase in tourism sector of India. According to latest available statistics (table 4), there are 1,242 approved hotels with 76,858 number of hotel rooms in India as on 31 December, 2013. This includes different categories of star hotels, apartment hotels, time share resorts, heritage hotels and unclassified hotels. A ministry of tourism study has estimated that India will have 6.6 million hotel rooms in 2020.

Eco-Tourism in India is still at a very nascent stage, but there are conscious efforts to save the fragile Himalayan eco-system and the culture and heritage of indigenous people, which is probably the largest concentration in the world

Table 5: Number of approved hotels and availability of rooms as on 31.12.2013

Category	Numbers (P)	No. of rooms (P)
One star	86 (6.92)	2253 (2.93)
Two star	122 (9.82)	3160 (4.11)
Three star	634 (51.05)	26463 (34.43)
Four star	114 (9.18)	8250 (10.73)
Five star	86 (6.92)	10033 (13.05)
Five star deluxe	108 (8.70)	22173 (28.85)
Apartment hotel	03 (0.02)	249 (0.03)
Time share resort	01(0)	31 (0)
Heritage hotel	49 (3.98)	139(1.82)
Silver bed and breakfast apartment	06 (0.04)	23 (0)
Unclassified	33 (2.66)	2829 (3.68)
Total	1242 (100)	76858 (100)

Source: India Tourism Statistics at a Glance, 2014

Figures in the parenthesis represent percentage and 'P' denotes provisional data

Tourism and employment generation

Tourism is one of the biggest sectors that provide employment to various categories of manpower. The return of investment in tourism, from the point of view of employment generation, is much higher compared to agriculture, manufacturing and even the trans-

port sector. According to Tourism Satellite Account, 2009-10, total employment in terms of jobs in tourism industries was estimated at 23.42 million. Out of the total estimated employment, 10.28 million was direct employment equivalent to 1.9 percent in the total employment. This low share of direct employment in tourism was because of the large share of agriculture 55 percent in the employment, in which tourism had no direct share.

Conclusion

Despite having huge prospects, tourism in India remained a neglected subject over a long period. The Sixth Five Year Plan (1980-85), for the first time, highlighted the importance of the sector.

The three basic components of a tourism system in a destination area are attractions, facilities and accessibility. Attractions are those elements that ultimately determine the choice of a particular tourist to visit it rather than others. India is enriched with various attractive tourism resources spread all over the coun-

try. It has natural attractions like flora and fauna, a beach resort, scenic beauty of a mountain area, historical attractions like old monuments, palaces, buildings with architectural excellence, or even the cultural elements like fairs, festivals, games and sports, music, dance, cuisine, folk items. But it is a fact that adequate investment is needed to make such beauties presentable and attractive as per the perception of tourists. **MA**

References

1. *Annual Report, Department of Tourism, Govt of India (2002-03)*.
2. UNWTO (2013): *Annual Report, 2012, Madrid*
Dr Anand MM (1976): *Tourism and Hotel Industry in India, Study in Management, Prentice Hall of India, New Delhi*
3. *Bezbaruah, MP (1999): Tourism—Current Scenario and Future Prospects, Yojna, no 8, vol 46, August*

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A CRITICAL REVIEW OF

‘INDRADHANUSH’

PLAN TO REVAMP PSBs IN INDIA



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Abstract

‘Indradhanush’ means rainbow which is an array of seven-rayed light that symbolizes the prospect of sunny days ahead after the rainy season. The Government uses this metaphor to convey a message that the troubled days are over for PSBs and through the implementation of the seven-pronged strategies of Indradhanush, the health and operational atmosphere of PSBs will be improved to a great extent. The reform agenda, however, generate mixed response from the analysts, bankers, markets and public. In this paper a humble attempt is made to critically introspect the various elements of the ‘Indradhanush’ plan with a view to highlight the additional measures needed to make the plan successful.

1. Introduction

The distress of the PSBs has aggravated significantly over the last couple of years but the inherent competitiveness of PSBs has been a cause for concern for long, even when the PSBs were relatively healthier in 2008. In the recent past, legacy issues including delay caused in various approvals as well as land acquisition and low global and domestic demand, many large projects have stalled. PSBs which have significant exposure to

infrastructure financing have been adversely affected. It has resulted in lower profitability for PSBs, mainly due to provisioning for the restructured projects as well as for gross NPAs. Apart from this, adoption of BASEL – III demands higher capital cushion both in terms of quantity and quality. Therefore, PSBs are faced with a challenge in procuring the capital required for migration to BASEL- III (Bhowmik, 2014 and Jaydev, 2013). In view of these problems, the Government of India (GOI) has come forward to mitigate the current challenges faced by the PSBs. On 14th August 2015, it launched a seven pronged plan – Indradhanush – to revamp functioning of public sector banks. According to the sources, an all round efforts will be made through this plan to enable banks to function on professional line. Apart from capital infusion over four years, the plan elements include appointments of MD, formation of Bank Board Bureau, de-stressing asset portfolio, empowerment of bank, framework of accountability and governance reforms.

2. Components of Reform Agenda of ‘Indradhanush’

2.1 Separation of the Post of Chairman and Managing Director (MD)

According to the plan the posts of Chairman and Man-

aging Director are separated by prescribing that in the subsequent vacancies to be filled up, the CEO will get the designation of MD & CEO and there would be another person who would be appointed as Non-Executive Chairman of PSBs. This approach is based on global best practices and as per the guidelines in the Companies Act to ensure appropriate checks and balances. The selection process for both these positions will be transparent and meritocratic. The entire process of selection for MD & CEO will revamped. Private sector candidates were also allowed to apply for the position of MD & CEO of the five top banks i.e. Punjab National Bank, Bank of Baroda, Bank of India, IDBI Bank and Canara Bank. Three stage screening will be done for the MD's position culminating into final interview by three different panels. The process of selection of Non-official / Independent Directors has also been revamped and made transparent.

2.2 Establishment of Bank Board Bureau (BBB)

The creation of BBB was made in the Budget Speech for the year 2015-16. The BBB will be a body of eminent professionals and officials, which will replace the Appointments Board for appointment of Whole-time Directors as well as non-Executive Chairman of PSBs. They will also constantly engage with the Board of Directors of all the PSBs to formulate appropriate strategies for their growth and development. The BBB will comprise of a Chairman and six more members of whom three will be officials and three experts (of which two would necessarily be from the banking sector). The Search Committee for members of the BBB would comprise of the Governor, RBI and Secretary (FS) and Secretary (DoPT) as members. The BBB would broadly follow the selection methodology as approved in relevant ACC guidelines. The members will be selected in the next six months and the BBB will start functioning from the 1st April, 2016.

2.3 Capital Infusion Plan for PSBs over the Next Four Years

In order to adequately capitalize all PSBs over and above the minimum norms of Basel III, the Government estimated capital requirement this year and in the next three years till FY 2019. According to the estimate, the PSBs would require extra capital of about Rs.1, 80,000 crore for the next four years up to FY 2019. This estimate is based on credit growth rate of 12% for the current year and 12 to 15% for the next

three years depending on the size of the bank and their growth ability. It is also presumed that the emphasis on PSBs financing will reduce over the years by development of vibrant corporate debt market and by greater participation of Private Sector Banks. Out of the total requirement, the Government of India proposes to make available Rs.70,000 Crores out of budgetary allocations for four years as per Table 1 given below:

Table 1: Budgetary Allocation for Capital Infusion to PSBs

Financial year	Budgetary Allocation for Capital
Financial Year 2015 - 2016	Rs. 25000 Crore
Financial Year 2016 - 2017	Rs. 25000 Crore
Financial Year 2017 - 2018	Rs. 10000 Crore
Financial Year 2018 - 2019	Rs. 10000 Crore
Total	Rs. 70000 Crore

Source: Press Note of Department of Financial Services, August 14, 2015

The manner of allotting Rs.25,000 crore capital this year, as announced, is as follows:

Tranche 1:

About 40% of this amount will be given to those banks which require support, and every single PSB will be brought to the level of at least 7.5% CRAR by Financial Year 2016.

Tranche 2:

40% capital will be allocated to the top six big banks viz. SBI, BOB, BOI, PNB, Canara Bank, and IDBI Bank in order to strengthen them to play a vital role in the economy.

Tranche 3:

The remaining portion of 20% will be allocated to the banks based on their performance during the three quarters in the current year judged on the basis of certain performance. This will incentivize them to improve their performance in the current year. Table 2 summarizes the amount of capital infusion that 13 PSBs will get in this financial year.

Table 2: Extent of Capital Infusion in 13 PSBs in the current fiscal

S.No	Name of Bank	Capital Allocation	
		(Rs. in Crore)	Current CRAR (in %)
1	State Bank of India	5531	12
2	Bank of India	2455	11.2
3	IDBI	2229	11.9
4	Bank of Baroda	1786	13.1
5	Punjab National Bank	1,732	12.9
6	Canara Bank	947	10.7
7	Indian Overseas Bank	2,009	10.1
8	Union Bank of India	1,080	10.2
9	Corporation Bank	857	11.1
10	Andhra Bank	378	10.7
11	Bank of Maharashtra	394	11.9
12	Allahabad Bank	283	10.4
13	Dena Bank	407	10.9
Total		20,088	

Source: Business Standard, 16th August, 2015

The remaining Rs.5,000 crore of the budgetary allocation will be decided only in the fourth quarter of FY-2016 after looking at the performance of various banks in the first nine months of FY-2016. It is expected that eight Banks which did not get any capital in first two tranche will get preference in third tranche.

2.4 Restoring the Health of the PSBs Loan Book

2.4.1 De-stressing Infrastructure Finance

It has been observed that the infrastructure space is not only the major recipient of PSBs' funding but also a major contributor to the stressed assets that PSBs are holding as of now. Following factors causing stress in the power, steel and road sectors are responsible for generation of huge stressed assets:

- ❑ Delay in obtaining permits / approvals from various governmental and regulatory agencies
- ❑ Delay in land acquisition and Commercial Operation Date (COD)
- ❑ Lack of availability of fuel, both coal and gas
- ❑ Cancellation of coal blocks and closure of Iron

Ore mines affecting project viability

- ❑ Lack of transmission capacity and limited off-take of power by Discoms given their reducing purchasing capacity
- ❑ Funding gap faced by limited capacity of promoters to raise additional equity and reluctance on part of banks to increase their exposure given the high leverage ratio
- ❑ Inability of banks to restructure viable projects due to regulatory constraints

In order to mitigate these problems some measures have been proposed to be undertaken in the days to come. These include:

- Issue of pending approval or permits along with policy decisions to facilitate project implementation will be handled by the Project Monitoring Group / Respective Ministries.
- Ministry of Coal/PNG will evolve policies to address long-term availability of fuel for these projects.
- Respective Discoms will be provided hand-holding towards enabling early reforms.
- Promoters will be asked to bring in additional equity in an attempt to address the worsening leverage ratio of these projects. Wherever the promoters are unable to meet this requirement, the Banks would consider viable options for substitution or taking over management control.
- Changing the extant duty regime without adversely impacting the downstream user industry.
- RBI to consider granting further flexibility to banks in restructuring of existing viable loans.

2.4.2 Strengthening Risk Control Measures and NPA Resolution Mechanism

Besides the recovery efforts under the DRT (six new DRTs will be set up at Chandigarh, Bengaluru, Ernakulam, Dehradun, Siliguri, Hyderabad) and SAREASI Act mechanism the following additional steps have been taken to address the crucial issue of NPAs:

- Issuance of guidelines for "Early Recognition of Financial Distress, Prompt Steps for Resolution and Fair Recovery for Lenders: Framework for Revitalizing Distressed Assets in the Economy" suggesting various steps for quicker recognition and resolution of stressed assets.
- Creation of a Central Repository of Information on Large Credits (CRILC).

- Formation of Joint Lenders Forum (JLF), Corrective Action Plan (CAP), and sale of assets.
- Flexible Structuring of Loan Term for loans to Infrastructure and Core sectors.
- A new category of defaulting borrower is formed with the name of Non-Cooperative borrower. A non-cooperative borrower is a borrower who does not provide information on its finances to the banks. Banks will have to do higher provisioning if they give fresh loan to such a borrower.
- Operation of Asset Reconstruction Companies (ARCs) is strengthened with the increase in minimum investment in Security Receipts to 15% from 5%. This step will increase the cash stake of ARCs in the assets purchased by them.

2.5 Empowering the Banks for Independent Decision Making

In order to encourage banks to take their decision independently keeping the commercial interest of the organisation in mind, the interference of Government is proposed to be removed. Banks have been asked to build robust Grievances Redressed Mechanism for customers as well as staff so that concerns of the affected are addressed effectively in time bound manner. Banks are to provide greater flexibility in hiring manpower to Banks. The Government is committed to provide required professionals as Non Executive Directors to the Board so that well-informed and well-discussed decisions are taken.

2.6 Framework of Accountability

The present system for the measurement of bank's

performance (through Statement of Intent or SOI) will undergo a significant change and a new framework of performance measurement will take care of both quantitative and qualitative performance measurement. Quantitative performance measurement will be done through Key Performance Indicators (KPIs). It is divided into four sections totaling up to 80 marks, whereas, the qualitative performance measurement allotted 20 marks. The qualitative performance would be assessed based on a presentation to be made by banks to a committee chaired by Secretary, Department of Financial Services. The new measurement policy is presented in the Table 3 below:

2.7. Governance Reforms

Reforms in the banking space have been there but the plan Indrashanush envisages an environment where Government interference would be nil but the governance of banks improved. The Government has been constantly engaging with the Banks through review meeting and sessions for strategic reviews etc. The focus is on improving HR management practices and removing barriers so that the Banks can share and work together on common resources. Various steps have been taken to empower Bank's Boards, removing interference and roadblocks.

3. Critical Evaluation of the Indradhanush Plan

The term 'Indradhanush' means 'Rainbow' in English which is an array of seven-rayed light that symbolizes the prospect of sunny days ahead after the rainy season. The Government uses this metaphor to convey a

Table 3: New Performance Measurement System for PSBs

Performance Measurement Technique	Marks Allotted	Total Marks
Quantitative Performance Measurement through KPIs		
Efficiency of capital use	25	
Diversification of business/processes	25	
NPA Management	15	
Financial Inclusion	15	
		80
Qualitative Performance Measurement		
Strategic initiatives to improve asset quality		
Conservation of Capital	05	
Human Resource initiatives	05	
Improvement in external credit rating	05	20
Total Marks		100

message that the troubled days are over for PSBs and through the implementation of the seven-pronged strategies, the health and operational atmosphere of PSBs will be improved to a great extent. Indradhanush tries to address the critical problems impacting the performance of PSBs including governance reforms, especially accountability, and capitalization. Its focus on capital efficiency rather than business growth marks a paradigm shift from the previous recapitalization schemes. Theoretically, 'Indradhanush' takes cognizance of both internal and external factors that influence the performance of public sector banks. The internal factors are better governance, greater efficiency and a performance evaluation framework that incentivizes management focus on capital conservation and credit rating. The external factors are linked to legal, recovery and dispute resolutions such as coercing promoters to sell non-core assets, setting up fraud resolution processes and six new DRTs, and strengthening the role of ARCs. The plan has the following promising aspects:

- ❑ The plan can result in structural changes in the public sector banking. If the changes are implemented in letter and spirit, it will offer substantial growth prospects along with improvement in operational atmosphere of PSBs.
- ❑ The more freedom in hiring middle level managers along with a transparent and merit based appointment of non-executive chairman, MDs and CEOs will help banks to orient their operations on professional lines.
- ❑ The replacement of Appointments Board that presently engages non-executive chairman and full time directors of PSBs by Bank Board Bureau (BBB) is expected to promote efficiency in recruitment and performance monitoring. The proposal of hiring MD from the private sector will be a booster for PSBs. BBB will certainly have better speed and judicious decisions in terms of appointments.
- ❑ The framework of accountability along with transparent performance measurement criterion will facilitate growth of PSBs. It comes as a booster for the top management. The Government is also looking at introducing Employee Stock Ownership Plan (ESOPs) for the PSU bank managements, which is a very positive initiative in itself.

- ❑ Greater capital infusion will help NPA burdened PSU banks to meet their regulatory capital requirements arising out of the migration to Basel – III and facilitate growth.

The reform agenda of 'Indradhanush', however, generate mixed response from the analysts, bankers, markets and public. While some analysts and bankers have termed the plan as promising, the other groups are not impressed by the move. According to Amit Pandey, Standard & Poor's Credit Analyst, "The central government's planned capital infusions come at a good time for public sector banks. But they don't go far enough." In a report titled 'India's Capital Infusions For Public Sector Banks Are Just A Breather', S&P said the stand-alone credit profiles and ratings on some PSU banks remain sensitive to any further deterioration in asset quality, capital, and earnings. S&P further opined that the step won't fully resolve their looming capital shortfall. It estimates that Basel III implementation required banks fresh capitalisation of Rs 1.4 lakh crore for fiscal 2016-2019. Banks are likely to require an additional Rs 80,000 crore to make provisions for NPAs and slippages from standard restructured loans. The banks will therefore have to look for alternate sources to increase their capitalisation or moderate their growth expectations.

On the other side, CRISIL is of the opinion that Indradhanush is no rainbow chase, but can be a game-changer. It emphasizes on its effective implementation. According to CRISIL, "Success will depend on relentless implementation, and staying the course no matter the obstacles. What's encouraging is that the government has hit the ground running". CRISIL believed that a clear timeline given for the setting up of a BBB and the announcement of inducting professionals as non-executive chairmen will eventually drive qualitative changes in governance, strategy formulation, capital efficiency, and human resource practices. And allowing bonus and stock options for senior management will make public sector banks competitive and go a long way in attracting right talent.

It is true that any policy decision like Indradhanush will have some concern areas which need to be addressed from time to time on continuous basis. The major concern areas can be identified as under:

- ❑ First, capital infusion is not a panacea for PSBs. If drainage of funds in the name of loan waiver

scheme is allowed to take place through Government intervention, then no amount of capital infusion is sufficient enough to restore the health of PSBs. This is clear from the fact that in the last 15 years, the GOI has infused more than Rs. 81000 crore as capital to the PSBs but this capital was eroding due to rising NPAs in these banks (Live Mint Newsletter, 10th August, 2015). This kind of capital infusion may provide temporary relief to the PSBs but not lead to rerating of their stock in the market.

- It is true that Indradhanush makes a realistic assessment of the capital needs of public sector banks, but it left the banks highly dependent on the market for raising the remaining amount of fund needed for migration to Basel III regime. This means banks will have to gain the market's confidence by materially improving performance, which, in turn, will be a difficult, slow and multi-year process given the track record of the performance of PSBs. This is also evident from the market response – the stock price of PSBs initially rose but eventually falls significantly.
- 'No Government interference' policy is easier claimed than achieved. The experience suggests that such policy would be very difficult to be trickled down to the ground operational level mainly because of the fact that PSBs are seen more as a vehicle to achieve social causes. Similarly, with the majority shareholding remain in the hands of the Government; Bank Board Bureau can always be filled with yes men. As a result, there will be less hope on removing the Government interference.
- There was no time bound programme as far as resolution of NPAs is concerned. There was just a general statement that reforms will be responsive and quick. As long as the management of NPAs is not properly addressed, the health of PSBs will remain as it is.

4. Concluding Observations

It is needless to say that Indradhanush plan provides a clear roadmap on capital infusion and maintaining a capital buffer beyond the regulatory minimum. It also recognized the challenging external environment and showing determination to identify the causes behind

problems in sectors such as steel, power distribution and power generation. Apart from these, the plan has introduced several positive steps to curb Government interference, promoting efficiency through objective performance measurement, etc.

Still, the experts at the operational level are not confident if it will work. Moreover, expecting public sector banks to match the performance of private sector banks is not justified on the ground that PSBs are not enjoying level playing field and are supposed to take many decisions for social causes which adversely affect their profitability. The steps under the plan are promising but they can only be fruitful when the 'No Government Interference' policy will be implemented in letter and spirit.

The plan falls short in respect of some confidence building measures as rightly identified by CRISIL Rating Agency. There must be more vigorous measures to deal with the challenge of NPAs. This could be done by creating a 'Bad Bank' or more legal enforcement right to the banks. Government can also give a strong signal of its determination to change the game through a disproportionately higher upfront capital infusion, and, addressing emerging human resources challenges at the mid-to-senior level in public sector banks. **MA**

References

1. Bandyopadhyay, T. (2015), "Capital Infusion in Public Sector Banks: A Band-Aid Solution", *Live Mint Newsletter*, August 10.
2. Bhowmik, G. (2014), "Adoption of Basel III Accord: Impact on the Indian Banking System", *Management Accountant*, October.
3. *Business Standard* (2015), "Government Launches Mission Indradhanush to Revamp Public Sector Banks", August 16.
3. *Crisil Rating* (2015), "Indradhanush No Rainbow Chase, Can be a Game Changer", *Press Release*, August 16.
- Jaydev, M. (2013), "Basel III Implementation: Issues and Challenges for Indian Banks", *IIMB Management Review*, Bangalore.
4. *Ministry of Financial Services* (2015), "Indradhanush: Plan for Revamp of Public Sector Banks", *Press Note*, August 14.
5. *Standard & Poor* (2015), "India's Capital Infusion for Public Sector Banks are just a Breather", *S&P Report*, August 19.

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Computation of Base Rate in Banks



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Introduction

The banks are primarily the Financial Institutions performing the function of financial intermediation. The financial intermediation involves accepting deposits from those who save and lending to those who need the funds. Those who save and invest their savings in banks in the form of deposits expect adequate compensation in the form of interest so as to protect the purchasing power of their savings after factoring for the inflation. It would be their normal expectation to earn some premium over the inflation rate as an incentive for savings. The banks have three broad categories of deposit accounts as under:

1. Current/Call deposits which are payable by the banks without any notice and banks do not pay any interest on such deposits.
2. Savings deposits which are payable by the banks on demand and banks pay a moderate interest which is currently 4 per cent per annum with exception of some private sector and co-operative sector banks which pay rate of interest on their savings deposits.
3. Term deposits which are considered as time liabilities of the banks with varying maturities. The banks pay different rates of interest depending on the quantum and tenor of the deposits.

Other sources of funding for the banks are in the form of borrowings in the call money market, from RBI under Liquidity Adjustment Facility (LAF), refinance against specified categories of loans and advances, debentures, bonds etc. The banks incur interest liability on these sources of funding too.

The interest paid on different types of deposits by the banks constitutes major part of their expenditure. The weighted interest cost of deposits divided by total deposits would give average cost of deposits. Similarly the interest paid on other borrowings divided by the aggregate borrowings would give average cost of such borrowings. Integrating the cost of deposits and cost of borrowings provides average cost of funds. The cost of deposits/funds constitutes the basis for calculating interest rates for different categories of loans and advances. Determination of interest rates for loans and advances is a complex process and from regulated regime to de-regulated regime has travelled a long distance to reach where it stands today.

Globalisation

Globalisation is defined as the closer integration of the countries and people of the world brought about by the enormous reduction of cost and transportation and the breaking down of the artificial barriers to the flows of goods, services, capital, knowledge and human resources across borders. Globalisation as an effective instrument of international exchange of goods and services has to have a human face based on ethical consideration rather than on cut throat competition. It should play a positive role in reducing economic and social disparities within and among the nations. It should also be effective tool for improving sustainable development. The banks world-over play an important role in economic development. In the era of globalisation, with the increase in competition, banks must become more adaptable, resilient and

agile to succeed.

Before the advent of globalisation and introduction of Prudential Accounting Norms, the lending activities by banks in India were largely restricted to the productive purposes. It was difficult to get loan from a bank for non-productive purposes except consumer loans and housing finance. The interest rates to be charged on loans to different sectors of the economy were regulated in the pre-globalisation regime. With the opening up of the economy, the regulator embarked on the path of de-regulation of interest rates too. Such de-regulation included limited freedom to the banks to determine rates both on liabilities and assets. It took quite a time for many banks to get adjusted and oriented to such liberalization of the policy of fixing interest rates. The growing de-regulation of interest rate mechanism in the banking sector led to growing competition amongst the industry players. Such a competition at times assumed the form of unhealthy competition. The fact that about 76 per cent of the business of banking in India is controlled by Public Sector Banks (PSBs) is of greater significance from the stand point of the competition. The unethical practices of under-cutting the competitors have resulted in the banks becoming the ultimate sufferers to the advantage of the clever and dishonest borrowers.

Bench-mark Prime Lending Rate (BPLR)

Reserve Bank of India (RBI) on its part as a Regulator has been conscious of the ill effects of de-regulation and hence has attempted to check the misuse of de-regulation by issuing guidelines to the banks prescribing the methodology of computing the reference rate to which the interest rates to be charged to the borrowal accounts should be bench-marked. With this objective in view, RBI introduced a system of Bench-mark Prime Lending Rate (BPLR) in 2003 whereby it permitted lending even at sub-BPLR rates. RBI prescribed a cap on the spread above BPLR but did not prescribe any threshold below BPLR. Such a system fell short of the expectations of RBI in bringing about transparency in fixing the lending rates for different categories of borrowers. Another objective of introduction of BPLR was to assess the efficacy of the transmission of policy rate of RBI to lending rates of the banks. Since the freedom of spread over BPLR and lending below BPLR provided lot of scope to manipulate the ultimate lending rates, RBI failed

in assessing the extent of transmission of RBI's policy rates. Under such a system, there were instances of fixing lending rates to select borrowers even as low as 6 to 7 per cent when the BPLR was fixed at 14 to 15 per cent. It was so done on the pretext of decorating the Balance Sheet of the banks with the name of Multinational or Blue-Chip companies. The mighty thus succeeded in getting public funds at throw away price. It led to the not-so-rich rather poor who were charged above BPLR ending up cross subsidizing the rich. This fallacy of the system of BPLR introduced by RBI took seven long years to be realized by RBI who is credited to be one of the best regulators in the world.

Introduction of Base Rate

RBI made an announcement in its annual policy statement for the year 2009-10 about constituting a working group on Bench-mark Prime Lending Rate (BPLR) for reviewing the present system of BPLR. The working group submitted its report in October 2009 and the same was placed on RBI's website for public comments. After considering the recommendations of the working group and the suggestions from various stake holders, RBI issued draft guidelines on Base Rate and also placed it on RBI website in February 2010 for public comments.

The recommendations of the working group and the suggestions/comments of the public brought to the fore the system of Base Rate that replaced BPLR with effect from 1st July 2010. The Base Rate (BR) included all those elements of the lending rate that were common across all categories of borrowers. These elements included –

- i) Cost of Deposits/Funds,
- ii) Negative carry on CRR & SLR,
- iii) Unallocable overhead costs and
- iv) Average return on net worth.

The banks were allowed freedom to choose any benchmark to arrive at the BR for a specific tenor to be disclosed transparently. The freedom so afforded to the banks was considered appropriate as long as it was consistent and made available for the review and scrutiny of RBI as and when required. The banks were expected to determine the actual lending rates on loans and advances with reference to the BR and by including such other customer-specific charges as considered appropriate by the banks.

Methodology for computing Base Rate

RBI prescribed an illustrative methodology for the computation of BR as an aggregate of the following:

(a) Cost of deposits/funds = D_{cost} (Bench-mark)

$$(b) \text{ Negative carry on CRR \& SLR} = \left[\frac{\{D_{\text{cost}} - (SLR * T_r)\}}{\{1 - (CRR + SLR)\}} \right] * 100 - D_{\text{cost}}$$

$$(c) \text{ Unallocable overhead cost} = \left(\frac{U_c}{D_{\text{ply}}} \right) * 100$$

$$(d) \text{ Average return on net worth} = \left[\left(\frac{NP}{NW} \right) * \left(\frac{NW}{D_{\text{ply}}} \right) \right] * 100$$

Base Rate = a+b+c+d

where,

D_{cost} : Cost of deposits/funds
 D : Total deposits = Time Deposits + Current Deposits + Savings Deposits
 D_{ply} : Deployable deposits = Total deposits Less share of deposits locked as CRR & SLR balances = $D * [1 - (CRR + SLR)]$

CRR : Cash Reserve Ratio
 SLR : Statutory Liquidity Ratio

T_r : 364 day T-Bill Rate
 U_c : Unallocable Overhead Cost
 NP : Net Profit
 NW : Net Worth = Capital + Free Reserves

Negative carry on CRR & SLR

$$\text{Negative carry on CRR \& SLR} = \left[\frac{\{D_{\text{cost}} - (SLR * T_r)\}}{\{1 - (CRR + SLR)\}} \right] * 100 - D_{\text{cost}}$$

Negative carry on CRR and SLR balances arises because the return on CRR balances is NIL while the return on SLR balances (proxied using 364-day T-Bill rate) is lower than the cost of deposits. Negative carry on CRR and SLR is arrived at in 3 steps:

First Step:

Return on SLR investment was calculated using 364 day T-Bills.

Second Step:

Effective cost was calculated by taking the ratio (expressed as a percentage) of Cost of Deposits (adjusted for return on SLR investment) and deployable deposits (total deposits Less the deposits locked as CRR & SLR balances).

Third Step:

Negative carry cost on SLR & CRR was arrived at by taking the difference between the effective cost and the cost of deposits.

Unallocable Overhead Cost

$$\text{Unallocable Overhead Costs} = \left(\frac{U_c}{D_{\text{ply}}} \right) * 100$$

Unallocable overhead costs is calculated by taking the ratio (expressed as a percentage) of unallocable overhead costs and deployable deposits.

Average Return on Net Worth

$$\text{Average Return on Net Worth} = \left[\left(\frac{NP}{NW} \right) * \left(\frac{NW}{D_{\text{ply}}} \right) \right] * 100$$

Average Return on Net Worth is computed as the product of Net Profit to Net Worth Ratio and Net Worth to Deployable Deposits ratio expressed as a percentage. The implementation of BR entailed that the borrowers to be charged not below the BR with the exception of loans to specified sectors of priority, loans to staff, loans against banks' own deposits, DRI advance and export credit. The floating interest rates based on external bench-mark were prescribed as equal to or above the BR at the time of sanction or renewal. The hall-mark of concept of BR is that it is transparent and non-discriminatory in nature. The banks are required to review the BR atleast once in a quarter with the approval of the Board or the Asset Liability Management Committee (ALCO). The spread over BR charged to an existing borrower cannot be increased except on account of deterioration in the credit risk profile of the borrower or change in the tenor premium.

RBI has now placed the draft guidelines on transmission of monetary policy rates to banks' lending rates in public domain for comments/suggestions. RBI is

of the view that monetary transmission to occur, the lending rates have to be sensitive to the policy rates (repo). Currently the banks compute their BR by using the average cost of funds method or marginal cost of funds method or blended cost of funds method. The choice of methodology to be used is left to the discretion of the individual bank.

Revised methodology for computation of BR

In the experience of RBI, the BR calculated by using marginal cost of funds method is found to be more sensitive to changes in the policy rates. On the basis of supervisory findings and discussions RBI had with the banks, the extant guidelines on computation of BR as well as methodology for determining lending rates have been reviewed. The banks will now be required to compute their BR as under:

(a) Components of Base Rate:

The components of BR will continue to be the same as earlier viz.,

- i. Cost of Funds
- ii. Negative carry on CRR/SLR

- iii. Un-allocable overhead costs
- iv. Average return on Net Worth

These costs will be calculated as follows:

(i) Cost of Funds:

The marginal cost of funds should be used for computing the cost of funds. Such a change would seek to withdraw the discretion given to banks to use average cost of funds or blended cost of funds. The marginal cost should be arrived at by taking into consideration all sources of funds other than equity. The sources of funds would include Savings, Current and Term Deposits, borrowings from RBI, inter-bank borrowings, debentures and bonds, refinance facilities etc. Cost of deposits should be calculated using the latest interest rate/card rate payable on Current and Savings deposits and the Term Deposits of various maturities. Cost of borrowings should be arrived at using the average rate at which funds were raised in the last one month preceding the date of review. Each of these rates should be weighted by the proportionate balance outstanding on the date of review.

Sl. No.	Source of Funds (excluding equity)	Rates offered on the date of review/ rates at which funds raised(%) (1)	Balance outstanding in the books of the bank on the date of review as a % of total funds (excluding equity) (2)	Marginal Cost (1) x (2)
1	Deposits			
	a) Current Deposits	0.00	7.00	0.00
	b) Savings Deposits	4.00	21.00	0.84
	c) Term Deposits *			
	- upto one month	4.50	2.00	0.09
	- 1 month to 6 months	7.00	10.00	0.70
	- 6 months to 1 year	7.50	26.00	1.95
	- More than 1 year	8.00	22.00	1.76
2	Borrowings			
	- RBI	7.25	2.00	0.15
	- Other banks/institutions	7.20	2.00	0.14
	- Debentures & Bonds	9.00	8.00	0.72
	Marginal Cost of Funds			6.35

* Maturity buckets should be the same as the buckets included in the schedule of interest rates on deposits. The interest rates (2) are assumed and do not indicate exact rates of any bank.

The cost of deposits should be calculated using the latest interest rates/card rates payable on all types of demand and term deposits of various maturities. Similarly, cost of borrowings should be arrived at using the average rate at which funds are raised in last one month preceding the date of review. Each of these rates should be weighted by the proportionate balance outstanding on the dates of review.

(ii) Negative Carry on CRR & SLR

Section 42 of RBI Act provides that the scheduled banks should maintain cash balances with RBI at prescribed rates from time to time. The current rate of CRR is 4 per cent of Net Demand and Time Liabilities (NDTL). Section 24 of Banking Regulations Act provides that Scheduled Banks should maintain Statutory Liquidity Ratio (SLR) at the rates prescribed by RBI from time to time. The current rate of SLR is 22 per cent of NDTL. Negative Carry on mandatory CRR arises because RBI does not pay any interest to the banks on CRR balances. This component therefore provides NIL return to the banks on the balances held with RBI as CRR. Negative Carry on SLR balances would arise only if the actual return thereon is less than the Cost of Funds. The draft guidelines of RBI provide that Negative Carry on the mandatory levels of CRR & SLR balances should be calculated using the following formula:

Negative carry on CRR & SLR =

$$\left[\frac{\{D_{\text{cost}} - (SLR * T_r)\}}{\{1 - (CRR + SLR)\}} \right] * 100 - D_{\text{cost}}$$

where,

- D_{cost} : Marginal cost of funds calculated (a)(i) above.
- SLR : Mandatory level of Statutory Liquidity Ratio
- T_r : 364 day T-Bill Rate
- CRR : Mandatory level of Cash Reserve Ratio

(iii) Un-allocable overhead cost

The un-allocable overhead cost should comprise solely of costs incurred for the bank as a whole and hence not allocable to any particular business activity/ unit. These components would be fixed for three years subject to review thereafter.

(iv) Average return on Net Worth

Average return on Net Worth is the hurdle rate of return on equity determined by the Board or manage-

ment of the bank. It is expected that the component representing return on Net Worth will remain fairly constant and any change would be made only in case of a major shift in the business strategy of the bank.

(b) Spread

RBI has advised banks to delineate the components of spread with the approval of their Boards. RBI has further advised that for the sake of uniformity in these components, broad components of spread as advised by Indian Banks' Association (IBA) should be adopted by all banks.

(c) Interest rates on loans

The actual lending rates on loans will be determined by adding the components of spread to the base rates in all cases.

Guidelines on implementation of BR

The guidelines issued by the RBI at the time of implementation of BR with effect from July 1, 2010 shall continue to be in force. Those guidelines provided that BR shall include all those elements of lending rates that are common across all categories of borrowers. The bench-mark chosen by the bank to arrive at the base rate for a specific tenor may be disclosed transparently. The banks are free to determine their actual lending rates on loans and advances with reference to the BR and by including such other customer specific charges as are considered appropriate. RBI has exempted certain types of loans viz., DRI advances, loans to banks' own employees and loans to bank's depositors against their own deposits from applicability of BR. The floating interest rates are to be fixed with reference to BR as a benchmark and if the floating interest rates are based on external benchmarks, such interest rates must be equal to or above the base rate at the time of sanction/renewal of the loan. Whenever there is any change in base rate, it will be applicable to all existing loans linked to base rate in a transparent and non-discriminatory manner.

Time frame for implementation

The time frame for implementation of new methodology of computing the BR by using Marginal Cost of Funds Method is sought to be effective from 1st April 2016. RBI expects the banks to submit a road map clearly indicating the time frame for adopting the new methodology within a period of two months after RBI issues its final circular in this regard.

RBI expects that new methodology of computing BR would also help the banks in the medium term goal of pricing their floating rate loans linked to an external bench-mark. The bench-marking agency viz., Financial Bench Mark India Pvt. Ltd. (FBIL), shall publish various indices of market interest rates and banks will be encouraged to price their deposits and advances with reference to the external bench-marks published by FBIL. **MA**

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Income Tax

● Procedure for registration and submission of report as per clause (k) of sub-section (1) of section 285BA of Income-tax Act, 1961 read with sub-rule (7) of rule 114G of income-tax Rules, 1962

Central Board of Direct Taxes ('Board') under sub rule (9)(a) and 9(b) of Rule 114G of the Income tax Rules 1962, the Principal Director General of Income-tax (Systems) hereby lays down the procedures, data structure and standards for ensuring secure capture and transmission of data, evolving and implementing appropriate security, archival and retrieval policies as under:

a) Registration of the reporting financial institution:

The reporting financial institution is required to get registered with the Income Tax Department by logging in to the e-filing website with the log in 10 used for the purpose of filing the Income Tax Return of the reporting financial institution. A link to register reporting financial institution has been provided under "My Account". The reporting financial institution is required to submit registration details on the screen. A reporting financial institution may submit different registration information under different reporting financial institution categories. Once registered, the reporting entity will have an option to deregister.

b) Submission of Form 61 B:

Once the reporting financial institution gets registered successfully, it is required to submit the Form 61 B or Nil statement. The designated director is then required to login to the e-filing website with the log in 10 used for the purpose of filing his/her own Income Tax Return. The prescribed schema for the report under form 61 B can be downloaded from the e-filing website. Under "e File" menu, an option "Submit 61B nil statement" will be available to the designated director. The designated director will be required to submit the PAN of the reporting financial institution, calendar year for which report is to be submitted and the reporting entity category for which the report is to be submitted. The designated director will then be provided the options to upload the Form 61B nil statement. If the designated director chooses the option "Form 61 B"

then form shall be submitted using a Digital Signature Certificate of the designated director.

c) Submission of Nil statement:

In case nil statement is to be submitted, the option to submit nil statement is required to be selected. The designated director will then be required to submit a declaration with respect to pre-existing accounts (As defined in Rule 114H (2) (h) of Income Tax Rules, 1962) and new accounts (As defined in Rule 114H (2) (d) of Income Tax Rules, 1962). The declaration is required to be submitted using a Digital Signature Certificate.

In view of the changes mentioned above, the procedures prescribed in Notification 3 dated 25th August, 2015 stands withdrawn forthwith. The registration and submission of nil statement already completed under the procedures prescribed in Notification 3 dated 25th August, 2015 shall continue to be valid.

Source: Notification No 4/2015 dated: 4th September, 2015

● Clarifications on Tax Compliance for Undisclosed Foreign Income and Assets vide Circular No. 15/2015 dated: 3rd September, 2015.

Read more at: http://www.incometaxindia.gov.in/communications/circular/circular15_2015.pdf

Customs

- CBEC seeks to levy provisional safeguard duty on Hot-rolled flat products of non-alloy and other alloy Steel in coils of a width of 600 mm or more [heading 7208 or tariff item 7225 30 90] at the rate of 20% for a period of 200 days vide Notification No. 02/2015 Cus. (SG), dt. 14-09-2015.
- CBEC levied definitive anti-dumping duty on imports of Acrylonitrile Butadiene Rubber (NBR), originating in or exported from Korea RP for a period of five years vide Notification No. 46/2015- Cus (ADD), dt. 04-09-2015.
- CBEC levied definitive anti-dumping duty on imports of Float Glass of thickness 2 mm to 12 mm (both inclusive) of clear as well as tinted variety (other than green glass) but not including reflective glass, processed glass meant for decorative, industrial or automotive purposes falling under

chapter heading 7005 of the First Schedule to the Customs Tariff Act, originating in or exported from the Peoples' Republic of China for a period of five years vide Notification No. 47/2015-Cus (ADD), dt. 08-09-2015.

Central Excise

● **Issue of Central Excise notification (Non-Tariff) to notify conditions, safeguards and procedure for supply of tags, labels, printed bags, stickers, belts, buttons and hangers produced or manufactured in an EOU and cleared without payment of duty to DTA for exports in terms of Para 6.09 (g) of FTP 2015-2020 for the purpose of their exportation out of India namely:**

1. Conditions:-

- (i) the EOU shall furnish a general bond in the Form specified in Annexure-I to the Ministry of Finance (Department of Revenue) notification no. 42/2001-Central Excise (N.T.), dated the 26th June, 2001, as amended from time to time, to the jurisdictional Deputy or Assistant Commissioner of Central Excise in a sum equal to the duty chargeable on the specified goods, with 5% Bank Guarantee or as cash security;
- (ii) the specified goods after being used for the specified purpose shall be exported within six months from the date on which such goods cleared from EOU or within such extended period as the Deputy or Assistant Commissioner of Central Excise may in any particular case allow;
- (iii) the shipping bill filed by the DTA exporter shall contain the name and I.E. Code of the DTA exporter along with the name and I.E. Code of the EOU as supporting manufacturer;
- (iv) the DTA exporter shall apply for export incentives based on the Freight on Board (FOB) value of the consignment exported minus the value of specified goods.

2. Procedure to be followed by EOU manufacturing the specified goods:-

- (i) after furnishing a bond along with Bank Guarantee or cash security, as the case may be, EOU is permitted to clear goods without payment of duty to

DTA manufacturer or as the case may be, processor;

- (ii) the EOU shall ensure that the debit in bond account does not exceed the credit available therein at any point of time;

3. Export of goods:-

- (i) the DTA exporter shall export specified goods as part of export goods. The shipping bill filed by DTA exporter for export shall also contain name and address of the EOU as supporting manufacturer, details of the specified goods, like their description, quantity, value, etc., and reference of invoice number under which the said specified goods were received from the EOU. The value of the specified goods should not be less than the value of these goods removed by EOU;

Provided that in case of shipping bill filed claiming the benefits under any export promotion scheme, the FOB value of consignment exported shall exclude the value of specified goods procured from EOU for the purpose of claiming such benefits;

- (ii) the EOU will submit attested photocopy of the shipping bill (EP copy), Customs attested copy of invoice and self-attested photocopy of bill of lading or air way bill to the jurisdictional Central Excise and Customs Superintendent for verification of export of the specified goods. The said Superintendent of Central Excise having jurisdiction over EOU shall verify the details of export of the specified goods with reference to the document submitted by exporter;
- (iii) the proof of export should be submitted by the EOU to the jurisdictional Central Excise office within a period of six months from the date of clearance of goods from the EOU;
- (iv) on submitting certification of export of specified goods and proof of payment received for the exported goods in which the said specified goods were contained such supplies of specified goods shall be taken into account for counting towards discharge of export obligation of the EOU by the Development Commissioner.

4. Recovery of duty in certain cases:-

Where the specified goods are not received by the DTA Unit or are not exported by the DTA exporter within the specified period or the extended period as permitted by the Assistant or Deputy Commissioner In charge of EOU, the EOU shall be liable to pay the duty leviable on

such specified goods along with interest and penalty, if any, in accordance with the provisions of the Central Excise Act, 1944 (1 of 1944).

Explanation: For the removal of doubts, it is hereby clarified that the specified goods shall be deemed not to have been used for the specified purpose even if any of the quantity of the subject goods is lost or destroyed by natural causes or by unavoidable accidents or for any other reasons during transport from the place of procurement to the DTA exporter and no wastage of the specified goods shall be allowed and duty on such goods lost or destroyed shall be payable by the EOU, along with interest and penalty, if any, in accordance with provisions of Central Excise Act, 1944 (1 of 1944).

Source: Notification No. 20/2015 -Central Excise (N.T.) dated: 24th September, 2015

Company Law

● Companies (Accounts) Second Amendment Rules, 2015

In exercise of the powers conferred by sections 73 and 76 read with subsection (1) of section 469 of the Companies Act, 2013 (18 of 2013), the Central Government rules to further amend the Companies (Acceptance of Deposits) Rules, 2014, namely Companies (Acceptance of Deposits) Second Amendment Rules, 2015.

For details visit: http://www.mca.gov.in/Ministry/pdf/Amendment_Rules_15092015.pdf

● Notification regarding sub-section (6) of section 129 of the Companies Act, 2013 (18 of 2013)

In exercise of the powers conferred by the sub-section (6) of section 129 of the Companies Act, 2013 (18 of 2013), of the Central Government directs that paras 5 (ii) (a) (1), 5 (ii) (a) (2), 5 (ii) (e), 5 (iii), 5 (viii) (a), 5 (viii) (b), 5 (viii) (c) and 5 (viii) (e) relating to Additional Information of the General Instructions for preparation of Statement of Profit and Loss in Schedule III of the Companies Act, 2013 shall not apply to government companies producing Defence Equipment including the Space Research subject to fulfillment of following conditions:

A) The Board of Directors of the Company has given consent with regard to non-disclosure of information relating to paras 5(ii) (a) (1), 5(ii) (a) (2), 5 (ii) (e), 5 (iii), 5(viii) (a), 5(viii) (b), 5(viii) (c), and 5(viii) (e), as may be applicable;

B) The company shall disclose in the Notes forming part of the balance sheet and profit and loss account, the fact of grant of exemption under this notification;

C) The company shall comply with the prescribed Accounting Standard;

D) The company shall ensure that its financial statements represent a true a fair state of affairs of its finances; and

E) The company shall maintain and file such information as may be prescribed or called for or required by the government or the Reserve Bank of India or any other regulator.

This notification shall be applicable in respect of financial statement prepared in respect of the financial years ending on or after the 31st March, 2016.

Read more at: http://www.mca.gov.in/Ministry/pdf/Notification_07092015_1.pdf

SEBI

● Reporting requirement under Foreign Account Tax Compliance Act (FATCA) and Common Reporting Standards (CRS)-Guidance Note

In continuation of SEBI circular CIR/MIRSD/2/2015 dated August 26, 2015, a “Guidance Note on implementation of Reporting Requirements under Rules 114F to 114H of the Income Tax Rules” as issued by the Department of Revenue, Ministry of Finance vide E.No.500/137/2011 FTTR-III dated August 31, 2015 is available at: http://www.incometaxindia.gov.in/communications/notification/guidance_notes_on_implementation_31_08_2015.pdf

Source: Circular CIR/MIRSD/3/2015 dated: September 10, 2015

● SEBI enhances disclosure requirement for NBFCs on issuance of debt securities

Disclosures to be made by NBFCs in the Offer Documents for public issue of Debt Securities under the SEBI (Issue and Listing of Debt Securities) Regulations, 2008. SEBI, vide circular no. CIR/ IMD/DF/12/2014 dated June 17, 2014, interalia, prescribed additional disclosures to be provided for public issue of debt securities by NBFCs. Based on the feedback from market participants on disclosures in offer document by NBFCs, after due deliberations, it has been decided to align the disclosures made in the offer documents to be in line with the stipulations as required by the

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Reserve Bank of India (RBI) vide Circular CIR/IMD/DF/6/2015 dated: September 15, 2015.

Read more at: http://www.sebi.gov.in/cms/sebi_data/attach-docs/1442310923565.pdf

● Format for compliance report on Corporate Governance to be submitted to Stock Exchange (s) by Listed Entities

Regulation 27(2) of Securities and Exchange Board of India (Listing Obligations and Disclosure Requirements) Regulations, 2015 ("Listing Regulations"), specifies that the listed entity shall submit quarterly compliance report on corporate governance in the format specified by the Board from time to time to recognized Stock Exchange(s) within fifteen days from close of the quarter vide Circular CIR/CFD/CMD/5/2015 dated: September 24, 2015.

Read more at: http://www.sebi.gov.in/cms/sebi_data/attach-docs/1443091241915.pdf

Foreign Trade

● Applicability of Para 5.10 (d) of Handbook of Procedure, 2015-20 relating to third party exports under EPCG Scheme

References have been received in this Directorate regarding the applicability of provisions of Para 5.10(d) of HBP 2015-20 relating to third party exports. It is clarified that the provisions of Para 5.10(d) of HBP 2015-20 shall be applicable to third party exports made on or after 01.04.2015 (even in respect of exports made under EPCG authorizations issued prior to 01.04.2015). Third party exports which have been made prior to 01.04.2015 will be governed by the provisions of relevant policy/procedure vide Policy Circular No. 3/2015-20 dated: 2-9-2015.

Read more at: http://dgft.gov.in/Exim/2000/CIR/CIR15/PC_3_EPCG_1.pdf

Banking

● Prudential Norms on Change in Ownership of Borrowing Entities (Outside Strategic Debt Restructuring Scheme)

In reference to circular DBR.BP.BC.No.101/21.04.132/2014-15 dated June 8, 2015 on "Strategic Debt Restructuring Scheme (SDR)", in terms of which certain exemptions from extant asset classification norms of the Reserve Bank of India were provided to banks while effecting change in ownership of borrowing entities which are under stress primarily due to operational/ managerial inefficiencies of the

existing promoters. The SDR also contained exemptions from certain clauses of Securities and Exchange Board of India (SEBI) (Issue of Capital and Disclosure Requirements) Regulations, 2009 with regard to equity conversion price, and, Securities and Exchange Board of India (Substantial Acquisition of Shares and Takeovers) Regulations, 2011, when conversion of debt into equity of borrowing entities is carried out under the conditions specified in SDR guidelines.

In order to further enhance banks' ability to bring in a change in ownership of borrowing entities which are under stress primarily due to operational/ managerial inefficiencies despite substantial sacrifices made by the lending banks, it has been decided to allow banks to upgrade the credit facilities extended to borrowing entities whose ownership has been changed outside SDR, to 'Standard' category upon such change in ownership, subject to the following guidelines:

(i) Change in ownership may be by way of sale by the lenders, to a new promoter, of shares acquired by invocation of pledge or by conversion of debt of the borrower into equity outside SDR, or bringing in a new promoter by issue of fresh shares by the borrowing entity or acquisition of the borrowing entity by another entity. However, the exemptions from SEBI regulations permitted under SDR guidelines as detailed in paragraph 1 of this circular will not be available;

(ii) On such change in ownership of the borrowing entities, credit facilities of the concerned borrowing entities may be upgraded as 'Standard'. However, the quantum of provision held by the bank against the said account as on the date of change in ownership of the borrowing entities shall not be reversed except as permitted at (v) below;

(iii) The upgrade in the asset classification is subject to the following conditions:

a) The 'new promoter' should not be a person/entity/subsidiary/associate etc. (domestic as well as overseas), from/belonging to the existing promoter/promoter group. Banks should clearly establish that the acquirer does not belong to the existing promoter group; and

b) The new promoter should have acquired at least 51 per cent of the paid up equity capital of the borrower company. If the new promoter is a non-resident, and in sectors where the ceiling on foreign investment is less than 51 per cent, the new promoter should own at least 26 per cent of the paid up equity capital or

up to applicable foreign investment limit, whichever is higher, provided banks are satisfied that with this equity stake the new non-resident promoter controls the management of the company.

(iv) At the time of takeover of the borrowing entity by a 'new promoter', banks may refinance the existing debt of the borrowing entities, considering the changed risk profile, without treating the exercise as 'restructuring' subject to banks making provisions for any diminution in fair value of the existing debt on account of the refinance;

Source: Notification No. RBI/2015-16/187 [DBR.BP.BC.No.41/21.04.048/2015-16] dated: September 24, 2015

● **Partial Credit Enhancement to Corporate Bonds**

In reference to the draft guidelines proposing to allow banks to offer partial credit enhancement (PCE) to corporate bonds, issued on May 20, 2014 for comments/feedback. Taking into account the feedback received, and with a view to encouraging corporates to avail of bond financing, it has been decided to allow banks to provide PCE to bonds issued by corporates / special purpose vehicles (SPVs) for funding all types of projects. While the draft guidelines included provisions for allowing PCE as a funded loan facility also, it has been decided that, to begin with, banks will be allowed to offer PCE only in the form of a non-funded irrevocable contingent line of credit. A view on allowing the PCE as a funded loan facility will be taken in due course after reviewing the implementation and performance of the contingent PCE offered by banks

Source: Notification No. RBI/2015-16/183 [DBR.BP.BC.No.40/21.04.142/2015-16] dated: September 24, 2015

● **Trade Credit Policy - Rupee (INR) denominated trade credit**

With a view to providing greater flexibility for structuring of trade credit arrangements, it has been decided that the resident importer can raise trade credit in Rupees (INR) within the following framework after entering into a loan agreement with the overseas lender:

✳ Trade credit can be raised for import of all items (except gold) permissible under the extant Foreign Trade Policy

✳ Trade credit period for import of non-capital goods can be up to one year from the date of shipment or up

to the operating cycle whichever is lower

✳ Trade credit period for import of capital goods can be up to five years from the date of shipment

✳ No roll-over / extension can be permitted by the AD Category - I bank beyond the permissible period

✳ AD Category - I banks can permit trade credit up to USD 20 mn equivalent per import transaction

✳ AD Category - I banks are permitted to give guarantee, Letter of Undertaking or Letter of Comfort in respect of trade credit for a maximum period of three years from the date of shipment

✳ The all-in-cost of such Rupee (INR) denominated trade credit should be commensurate with prevailing market conditions

✳ All other guidelines for trade credit will be applicable for such Rupee (INR) denominated trade credits

Source: RBI/2015-16/175 [A.P. (DIR Series) Circular No.13 dated: September 10, 2015]

● **Opening of foreign currency accounts in India by ship-manning / crew-management agencies**

With a view to ensuring strict compliance, guidelines on the operations in such foreign currency accounts opened with AD Category-I banks by foreign shipping or airline companies or their agents in India are reproduced below:

a) Credits to such foreign currency accounts would be only by way of freight or passage fare collections in India or inward remittances through normal banking channels from the overseas principal. Debits will be towards various local expenses in connection with the management of the ships / crew in the ordinary course of business.

b) No credit facility (fund based or non-fund based) should be granted against security of funds held in such accounts.

c) The bank should meet the prescribed 'reserve requirements' in respect of balances in such accounts.

d) No EEFC facility should be allowed in respect of the remittances received in these accounts.

e) These foreign currency accounts will be maintained only during the validity period of the agreement.

Source: Notification No. RBI/2015-16/184 [A.P. (DIR Series) Circular No.15] dated: September 24, 2015

Eastern India Regional Council

Hazaribag Chapter of Cost Accountants



The Chapter signed MoU with K.B Womens College, Hazaribag on August 26, 2015 where the college will provide various facilities to the girl students undergoing the course of cost accountancy. Chairman of the Chapter, CMA Raj Kamal Prasad Singh on behalf of the chapter and Principal of the college, Dr. Rekha Rani on behalf of the college signed the MoU and Secretary of the chapter CMA Radhey Shyam Sinha and Professor Dr. Surendra Sinha and others were present at the occasion. Dr. Rekha Rani stated that the college entered into MoU for the development of a sound environment among girl students for the professional courses and also adequate facilities are to be provided to them.

Bhubaneswar Chapter of Cost Accountants

The Chapter organized an evening talk on 'Income Computation & Disclosure Standards' at its conference hall on August 23, 2015. CA A.K Sabat, was the guest speaker on the occasion and Shri Sarat Kumar Dash, IRS, Commissioner of Income Tax, (Admin & CO), Bhubaneswar graced the function as Chief Guest. Both the guests discussed in details on Income Computation and Disclosure Standards. The students of the chapter celebrated the Teachers' day on September 5, 2015 at its conference hall. On September 6, 2015 the chapter organized the students' felicitation function to felicitate the



successful students of the chapter at all India level Examination conducted by the Institute in June 2015. Shri Hara Prasad Nayak, IRAS, Director (Finance), OPTCL, GRIDCO & OPGC Ltd, Bhubaneswar and Lt. Cdr Biswajit Nayak, Regional Manager (Facilities), Infosys Ltd, were the Chief Guest and Guest of Honour respectively on the occasion. CMA Niranjan Mishra, Council Member of the Institute was the special guest on the occasion. CMA Bibhuti Bhusan Nayak, chairman of





Northern India Regional Council Jodhpur Chapter of Cost Accountants

The Chapter celebrated the 69th Independence Day on August 15, 2015 at CMA Bhawan.



the chapter congratulated the successful students of the chapter for their excellent performance and CMA Jagatjyoti Biswaranjan Nayak, secretary of the chapter extended his vote of thanks. CMA Shiba Prasad Padhi, Chairman, EIRC and CMA Niranjn Mishra, Council Member of the Institute had been felicitated by the chapter. An evening talk had been arranged on September 12, 2015 for the practicing members of the chapter on the theme 'Revised CAS-2 (Capacity Determination) & Draft CAS on Over Burden Removal'. CMA Niranjn Mishra, Council Member and CMA S.S Sonthalia, Past Chairman, EIRC were the resource persons on the occasion.

Durgapur Chapter of Cost Accountants



On August 23, 2015 the Chapter organised a half day programme on 'Business Valuation'. CMA Gautam Mitra was the speaker of the programme attended by large number of CMAs.

Southern India Regional Council

Visakhapatnam Chapter of Cost Accountants

The Chapter organized a professional development programme on 'Service Tax and New Regime of Indirect Taxation' on August 22, 2015 at its premises. CMA Krishna Kishore CH.VS.N achieved the Young Achiever's Award 2014 received from honourable Minister



INSTITUTE NEWS



of State for Development of North Eastern Region (Independent Charge), Sri Jitandar Singh. Speaker CA S. Ramakrishna explained the Service Tax, Excise,



Customs and Vat keeping in view of the new concept of GST. CMA CH. V.S.N. Krishna Kishore, CMA C.S. Sundara Murthy, CMA S. Ram Prasad, CMA V.J. Gupta and other members participated in the program. The



Chapter celebrated its Golden Jubilee on August 29, 2015 and as a mark of its journey a Logo and Brochure had been launched by Dr K. Hari Babu, Hon'ble Member of Parliament (Lok Sabha). CMA S. Papa Rao, Council Member of the Institute, CMA K. Sanyasi Rao, Chairman, SIRC were guests of honor of the program. CMA T. Harinarayana Vice Chairman, CMA S. Ramprasad Treasurer, CMA S. Satyananda Rao, CMA U. Prakash, CMA CH.V.S.N. Krishna Kishore, CMA V.J. Gupta and other members participated in the program.

Hyderabad Chapter of Cost Accountants

On August 1, 2015 a one day program on interaction between the industry and the Osmania University in



the University premises been held by the chapter and CMA Vijay Kiran Agastya, Chairman of the chapter had been invited as the Guest of Honor for the valedictory function. Other guests for the session include





CS V. Ahalada Rao, Central Council Member, ICSI and CA Devaraja Reddy, Vice-President, ICAI. On the same day a career counselling programme had



been organized by the chapter where CMA Dr. R. Chandra Sekhar, Member & Chairman- Students Service Subcommittee addressed the students pursuing graduation in commerce. On August 8, 2015 the



chapter organized a special meeting to discuss the opportunities for fresh CMAs and planning to provide a practical orientation for them. On August 9, 2015 a blood donation camp was conducted at CMA Bhavan. On August 12, 2015, the chapter, Indian Institute of Management & Commerce and Indian Accounting Association held a programme on 'Awareness of CMA Career and Behavioural Accounting' at IIMC, Khairat-abad. This joint program witnessed the contemporary issues in Behavioural Accounting by senior member of the Institute CMA Arunagiri Viswanathan following the introduction to Behavioural accounting by Prof. Prashanta Athma, Vice Principal, O.U college for women.

On August 14, a Practitioners Meet had been held at CMA Bhavan where Co-ordinator CMA D. Zitendra Rao, Chairman-SC for Members in Practice of SIRC



explained the concept of 'Look at CMA' and sought the suggestions of various members with respect to the design, content and launch of the program. On August 15, 2015 CMA Vijay Kiran Agastya, Chairman of the chapter hoisted the National Flag at its premises and on the same day the chapter held 'IGNITE – Your inner creativity and passion' where Chief Guest Prof. K. Nageshwar, Ex MLC & Professor Dept. of Communication & Journalism motivated the students and Guest of Honor was Dr. Narendranath Menon, Senior Faculty Member, Institute of Public Enterprise.

The Chapter organized 'Credit Monitoring Assessments' on August 16, 2015 at CMA Bhavan where chief guest Sri N. Murali Krishna, Executive Vice President, Kotak Mahindra Bank detailed the evolution



of Credit Monitoring Agreements (CMA). CA Bhagawandas Tiwari, AGM, ICICI Bank, the speaker covered all aspects starting with the limits for applicability of sanction, the 6 forms involved and the need of understanding the financial statements of clients including the tax audit report, MD&A, director's report, notes to accounts and segmental reporting. On August 17, 2015, ITC Company conducted campus interviews at CMA Bhavan for CMA qualified students. On August 22, a Faculty Meet held at CMA Bhawan where CMA B. Satyalatha, Chairman, Coaching Administration Sub-committee, and CMA Dr. R. Chandra Sekhar, Chairman, Students Services interacted with the faculty and learnt their suggestions and issues with regard to course completion, study material and other infrastructure.

On August 27, 2015 a career counseling programme had been organized by the chapter where CMA Dr. R. Chandra Sekhar, Member & Chairman - Students Service subcommittee addressed the commerce students. On August 29, 2015 a session on 'PowerPoint



in Reporting Financial Information' held at CMA Bhavan where Sri Geetesh Bajaj, Microsoft Powerpoint MVP, M/S Indezine, the speaker facilitated an interactive session and many doubts from the audience were answered, demonstrating the same in power point. On August 31, 2015, 'XBRL Filing of Cost Audit Report' held at CMA Bhavan where speaker CMA C. Vajralingam, Practising Cost Accountant demonstrated the XBRL filing of Cost Audit report using the latest version of Microvista's 'Convert2 XBRL' excel-based software. CMA D. Zitendra Rao, Member, SIRC also shared his views in the areas of Cost accounting policy, Related party transactions, Abridged cost statement etc. On September 5, 2015, the chapter organized Teacher's day celebrations at CMA Bhavan. The Chief Guest for the event, the IIT guru, Dr. Chukka Ramaiah highlighted the mission of Dr. Sarvepally Radhakrishnan in whose honour this day is celebrated.

The event initiated with CMA Vijay Kiran Agastya, chairman of the chapter who emphasized the importance of the day. CMA Zitender Rao, Member, SIRC addressed an important point that learning is a continuous process and knowledge and skill must be acquired on a daily basis. CMA Dr. PVS Jagan Mohan Rao, Council Member, addressed the gathering by sharing his school memories and encouraged students to be daring enough to look in a different approach.

Trivandrum Chapter of Cost Accountants

On July 26, 2015 the chapter conducted a professional development programme on 'IFRS – A Conceptual Analysis'. CMA B.V Subramaniam, practicing



cost accountant and fellow member of the Institute was the speaker of the programme. He discussed in details about the requirements of comprehending the principles of convergence and need for the same in the era of globalization of business transactions. The Chapter celebrated the 69th Independence Day on August 15, 2015. CMA R Sudhakaran, chairman of the chapter hoisted the National Flag followed by National Anthem.

Western India Regional Council

Pune Chapter of Cost Accountants

The Chapter celebrated the Independence day hoisted by CMA Anant Dhavale, Chairman of the chapter.



past president CMA D. V. Joshi expressed his views and narrated the duties and responsibilities as a citizen of an Independent nation. The chapter organised a CEP on August 22, 2015 on 'GST Overview'. CMA V. S. Datey, a well known Indirect Tax Consultant and author of many related books was the speaker and he gave an overview of GST and discussed the salient features, benefits and shortcomings of GST.

The programme concluded with vote of thanks by managing committee member of the chapter, CMA Amit Shahane. The Chapter organised a CEP on September 5, 2015 on 'Virtual CFO - Case Study Perspective' and CMA Sham Wagh, a well known practising Cost Accountant from Pune was the speaker of the event who discussed the scope and functions of Virtual CFO in today's business scenarios for small and

medium firms. The programme concluded with the vote of thanks by CMA Anant Dhavale, chairman of the chapter. Again on September 12, 2015 the chapter organised a CEP on 'Transfer Pricing - Practical Approach' where CA Sunil Vaidya conducted the session discussing the critical role played by transfer price as far as Cost Audit report is concerned. CMA Amit Shahane, Secretary of the chapter proposed the vote of thanks.

Bhilai Chapter of Cost Accountants

On September 13, 2015 the Chapter conducted a



programme on tree plantation as a part of Go-Green initiative and in its endeavor to maintain the ecological balance. The programme was attended by a cross section of students and members.

North American Overseas Centers

Professional Development : CMA Global Connect

American and Toronto Centres of ICAI together with **Creighton University, USA** organized their first-of-its-kind webinar as a part of “**CMA Global ConnectSeries**” of Professional Development Activities on September 12, 2015. Dr. Vasant Raval, fellow member of the ICAI and currently, the Professor of Accounting, Heider College of Business, Creighton University, Nebraska, USA, hosted a Webinar on “**Why Some Top Executives Commit Fraud and What Can We Do About It?**”

Dr. Vasant spoke at length about “Corporate Fraud” with apt examples of Enron, Satyam, WorldCom and Toshiba in Financial Reporting. Dr. Vasant Raval articulated very well with easy-to-understand case studies to drive home the concepts.

Dr. Kavasseri V Ramannathan, a fellow member of ICAI and the Professor, Emeritus of Accounting, Foster School of Business Washington (Seattle), in his inaugural speech, called upon the members of the Institute to contribute values to the profession and the society. There were inaugural recorded video messages from CMA Pramod Kumar Bhattad, the President of ICAI, CMA Nitin Kotak, (Chairman, ACCAI, USA) and CMA Srikanth Sankaranarayanan (Chairman, TOCCAI, Canada), with vote of thanks from CMA Sanjay Gupta (Chairman, International Affairs, ICAI). The webinar was well attended by members around the world and it was a great success. Keeping up the momentum generated through this successful webinar, the American and Toronto Centers are planning for a series of Global Connect webinars in future for the benefit of its members, in particular and other professionals, in general.

We are thankful to the Institute for sending the e-mail blasts about the event to the members of the Institute at such a short notice which greatly helped achieve an unprecedented publicity to the program.

Toronto Overseas Centre

The Toronto Overseas Centre is working to organize couple of value-added seminars to our members: one on “**Advanced Excel Part I: Financial Modelling and Excel Tips**” to be held on November 7th 2015 and the other, on “**Advanced Excel Part II: Building Dashboards and Charts**” to be held on January 16th 2016. In order for these seminars to reach our members globally, the Toronto and American Centers are exploring ways and means to web-cast these seminars provided the right resources and support are available. Stay tuned for more information on these initiatives!

In the recently concluded AGM of the Toronto Overseas Centre, there were 4 new directors added to the Board for the year 2015-16. The Centre extends its warm welcome and best wishes to CMA Neeraj Goel, CMA Joginder Singh, CMA Malini Krishnamurthy and CMA Sonal Sharma.

CMA Srikanth Sankaranarayanan has been unanimously elected to a consecutive term as Chairman, as also, CMA Anu Jain, elected as the Vice-Chairman. Shri Pulkit Arora will continue as the Director - IT and Special projects and CMA Awtar Parmar will be the Director - Professional Development and Public Relations. CMA Sonal Sharma will be the new Treasurer, CMA Malini Krishnamurthy will be the new Secretary. CMA Joginder Singh will be the Director - Social Media - LinkedIn, a newly created position to step up our presence in the Social Media circles, especially, LinkedIn. On the same lines, CMA Rahul Dutta will be the Director - Social Media - Facebook. CMA Neeraj Goel will be the Director (Membership), a newly created position to drive efforts to bring in new members to the Centre.

CMA Amit Goyal and CMA R.K. Choudhary have been appointed to the Advisory Council of the Centre.

CMA's at Toronto Overseas Centre of Cost Accountants on September 19, 2015



From left to right (Seated) CMA Sonal Sharma, Treasurer, CMA Surinder Kaur, CMA Srikanth Sankaranarayanan, Chairman, CMA Anu Jain, Vice-Chairman, CMA Malini Krishnamurthy, Secretary, Mrs R K Choudhary. From left to right (Standing) Mr Venkatesh, CMA Awtar Parmar, Director PR and PD, CMA Sukhvinderjit Singh, Director IT Pulkit Arora, CMA R K Choudhary, Past Chairman, and Director Advisory Board, CMA Amit Goyal, Director Advisory Board, CMA Neeraj Goel, Director Membership, CMA Joginder Singh Director Social Media - LinkedIn.



Group Photo with CMA Dr. Durga Prasad, Chairman, Directorate of Advanced Studies and former President on his visit to Toronto Overseas Centre of Cost Accountants at our Fifth Annual Conference and Seminar June 14th 2015.

A directory of some research papers on 'Digital Revolution' that appeared in various
ence of readers. The articles are available at the link provided next to them.

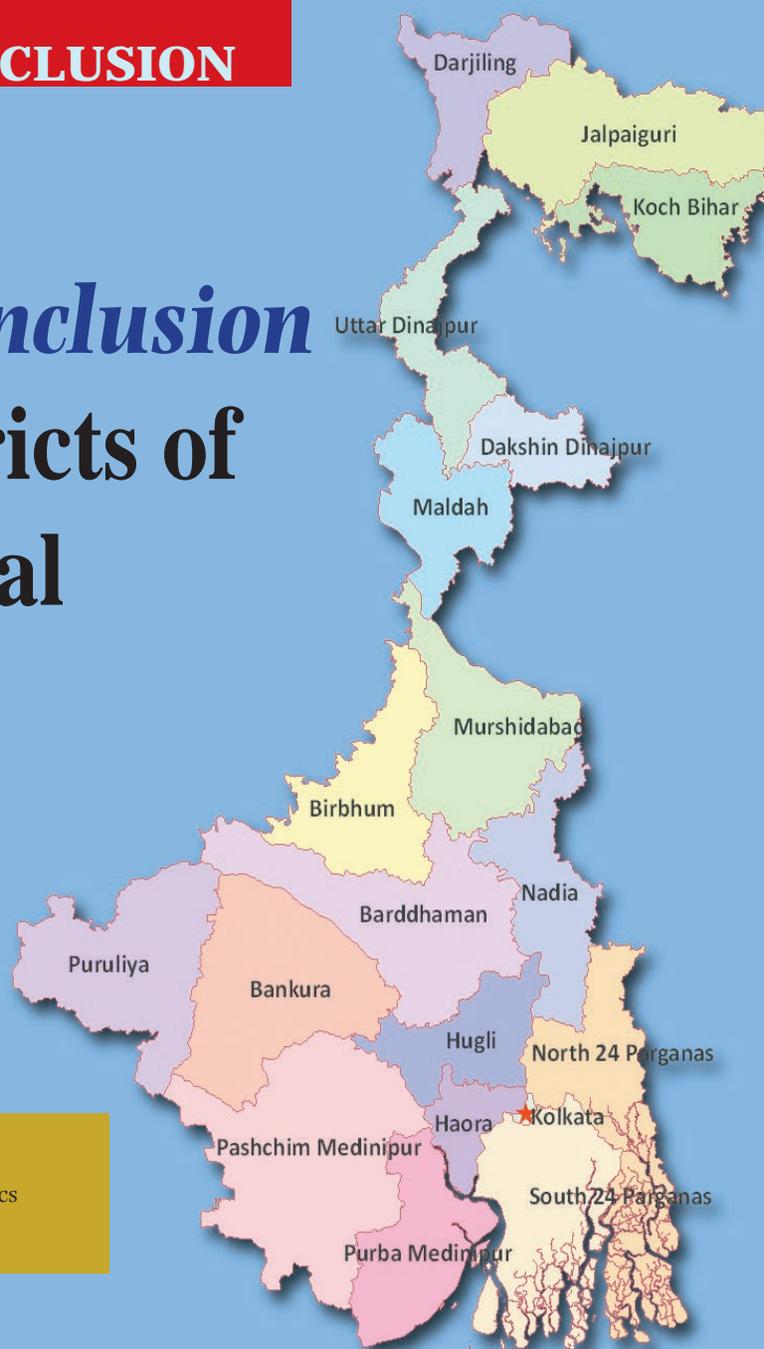
Name of the topic	Author	Reference with date	Link
Societal, Economic, Ethical and Legal Challenges of the Digital Revolution: From Big Data to Deep Learning, Artificial Intelligence, and Manipulative Technologies	Dirk Helbing	ETH Zürich; ETH Zürich - Department of Humanities, Social and Political Sciences (GESS) April 14, 2015	http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2594352
Digital Revolution: Informatics for Oral Healthcare Profession	Kadanakuppe S. Bhat, P.K. Umesh Nayak S.S	Volume IV, Issue I, January 2015 IJLTEMAS	http://www.researchgate.net/profile/Sushi_Kadanakuppe2/publication/271829155_Digital_Revolution_Informatics_for_Oral_Healthcare_Profession/links/54d26ae00cf25017917e01c6.pdf
The Brave New World of (Swiss) Law: Contours of a Framework and Call for a Strategy to Shape Law's Digital Revolution	Urs Gasser Jens Drolshammer	Harvard University - Berkman Center for Internet & Society May 5, 2015	http://papers.ssrn.com/sol3/papers.cfm?abstract_id=2602789
WA47 Tweets, hashtags and palliative care: a workshop for social media newbies looking to join the digital revolution	Kerrie Noonan	Volume 5, Issue Suppl 1 2015	http://spcare.bmj.com/content/5/Suppl_1/A15.1.short
Digital delivery of infrastructure projects; impact and management issues within a project-based engineering firm	Amna Shibeika	ResearchGate 2015	http://www.researchgate.net/profile/Amna_Shibeika/publication/279879437_Digital_delivery_of_infrastructure_projects_impact_and_management_issues_within_a_project-based_engineering_firm/links/559d07a808aeafbd3f273553.pdf
New Digital Infrastructure for Field Crew and Onshore Expert Collaboration in Deepwater Operations	Chuanqing James Lu Arturo Altamirano Troy Rothell Leonardo Toco	SPE Digital Energy Conference and Exhibition-2015	https://www.onepetro.org/conference-paper/SPE-173418-MS
Hello, World: The Exploration of a Component-Based, Systemic Approach to the Physicality of Digital Infrastructure	Powell, Elizabeth Ellen	2015	http://dalspace.library.dal.ca/handle/10222/60625
Digital Asset Management System Assessment: Use Cases for Digital Infrastructure Re-design	Zhang, Hui; Van Tuyl, Steve; Whitmire, Amanda L.	2015	http://ir.library.oregonstate.edu/xmlui/bitstream/handle/1957/55267/SVAWHZ-OnlineNW15.pdf?sequence=1
How Digital Infrastructure Can Substitute For Physical Infrastructure	Hugh Bradlow Arjun Jayachandra	United States Studies Centre 2015	http://ussc.edu.au/ussc/assets/media/docs/publications/1507_Digital_Infrastructure_Report.pdf
Appraising a Portfolio of Interdependent Physical and Digital Urban Infrastructure Investments: A Real Options Approach	Sebastian Maier John W. Polak David M. Ganne	2015	http://www.realoptions.org/openconf2015/data/papers/65.pdf
E-Commerce and E-Governance: Technology for Tomorrow on India Reforms- 2020	S. Nibedita Arshad Usmani, Binod Kumar P.P. Satpathy, Jawed Kumar	Vol 6, No 2 (2015)	http://iiste.org/Journals/index.php/CEIS/article/view/19619/20056
e-Readiness of India with Reference to National e-Governance Plan	Mishra, Unnati Fatmi, S N	International Journal of Computer Applications 123.8 (2015).	http://search.proquest.com/openview/5dd130aa026f99461c2b743c4c4195cd/1?pq-origsite=gscholar

journals/periodicals/magazines across the world is presented below for the refer-

Name of the topic	Author	Reference with date	Link
E-Governance and Public Service Delivery at the Grassroots: A Study of ICT Use in Health and Nutrition Programs in India	Amit Prakash	Information Technology for Development 2015	http://www.tandfonline.com/doi/abs/10.1080/02681102.2015.1034639
Knowledge Society and Digital India Program as a Venture to Demolish the Wall of Digital Divide	Sumita Santra	International Journal of Interdisciplinary and Multi-disciplinary Studies (IJMS), 2015, Vol 2, No.10,46-52.	http://www.ijms.com/uploads/432c-767927c7007382b88A.pdf
Satire, Elections, and Democratic Politics in Digital India	Aswin Punathambekar	Sage Journals 2015	http://tvn.sagepub.com/content/early/2015/03/13/1527476415573953.abstract
Digital India: A Study of New Age e-Entrepreneurship in India	Sahu Arjuna Kumar Mahapatra Durga Madhab Mohanty Ashok Patajoshi Arundhati	A Journal of Decision Making 2015	http://www.indianjournals.com/ijor.aspx?target=ijor:sjdm&volume=15&issue=2&article=002
Connecting Rural India Through Digital Highways	Dr. Bhavleen Kaur Rekhi	Pezzottaite Journals 2015	http://pezzottaitejournals.net/pezzottaite/images/ISSUES/V4N1/IJRRB-PV4N113.pdf
Library And Knowledge Advocacy In India: In The Wake Of Digital Environment And Recent Initiative By Government Of India.	Shiba Bhue Nabakumar Bhoi Karan Singh	Knowledge Librarian"- An International Peer Reviewed Bilingual E-Journal Of Library And Information Science Volume: 02, Issue: 02, March –April 2015	http://www.klibjlis.com/2.2.7.pdf
Digital Empowerment of Citizens in Rural India: Issues and Challenges	Avninder Singh Cheema	Asian Journal of Multidisciplinary Studies 2015	http://www.ajms.co.in/sites/ajms/index.php/ajms/article/view/1343/981
Information Society, Right to Information, and the Challenge of Digital Preservation in India	Alok Prasad	International Conference on Information Technology & Society 8-9 June 2015, Kuala Lumpur, Malaysia	http://fstm.kuis.edu.my/icits/proceeding/fullpapers/IC-ITS%202015%20-%20IT%20039.pdf
Digital innovations in poetry: Practices of creative writing faculty in online literary publishing	Rachel A. Fleming-May Harriett Green	Journal of the Association for Information Science and Technology 2015	http://onlinelibrary.wiley.com/doi/10.1002/asi.23428/abstract;jsessionid=602B426F-901C57434C8F850B1B04195B.f02t02?userIsAuthenticated=false&deniedAccessCustomisedMessage=
Sustainable Innovations: Bringing Digital Media and Emerging Technologies to the Classroom	Danielle Herro	Theory Into Practice Volume 54, Issue 2, 2015 Special Issue: Digital Media and Learning	http://www.tandfonline.com/doi/abs/10.1080/00405841.2015.1010834
Institutions And Technological Innovations: The Case Of The Adoption And Diffusion Of Digital Projectors In France	Kim-Marlene Le	The 2015 Annual Conference of the EU-SPRI Forum Innovation policies for economic and social transitions: Developing strategies for knowledge, practices and organizations 2015	http://euspri-helsinki2015.org/abstracts/pdf/6C2_EU-SPRI_Helsinki_2015_Innovation_System_Framework_Le.pdf

FINANCIAL INCLUSION

Impact of *financial inclusion* in the districts of West Bengal



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INTRODUCTION

Access to financial services plays a critical role in the development process through the facilitation of economic growth and reduction in income inequality. Inclusive financial systems allow the poor to smooth their consumption and insure themselves against the much economic vulnerability they face, from illness and accidents, to theft, to unemployment. It enables poor people to save and borrow to build their assets and to make educational and entrepreneurial investments to improve their livelihood. Inclusive finance is particularly important to disadvantaged groups: the poor, women, youth, and rural communities. For these reasons, financial inclusion has gained prominence in recent years as a policy objective to improve the lives of the poor. The Government of India's 'Committee on Financial Inclusion in India' defines financial inclusion 'as the process ensuring access to financial services and timely adequate credit where needed by vulnerable groups such as the weaker sections and low income groups at an affordable cost'

"Social Development is the promotion of a sustainable society that is worthy of human dignity by empowering marginalized groups, women and men, to undertake their own development, to improve their social and economic position and to acquire their rightful place in society....." - Bilance, 1997. The definition clearly points out the impact of financial independence of the less privileged and the marginalized citizens of the country on the overall development of the society. It is noteworthy that social indicators like literacy and employment are also the major determinants of financial inclusion.

In this paper we try to derive two separate indicators, one for Financial Inclusion and another for Social Development for the 19 districts of West Bengal separately. Both the indices are multidimensional. Index of Financial inclusion is consisting of 12 indicators in three dimensions: Usage, Access and Barriers, while the Social development index is consisting of 21 indicators in six dimensions: Demography, Health, Education, Basic Amenities, Economic Deprivation and Social Deprivation. Both the indices are derived on the basis of UNDP method of indexing but with a major difference in selecting weights for the different dimensions. We applied the PCA approach in determining the respective weights.

METHODOLOGY

1. For Constructing IFI

Indicators and dimension:

We postulate that the degree of financial inclusion is determined by three dimensions: **usage, barriers and access**. These dimensions are, at the same time, determined by several demand-side individual level indicators for the cases of usage and barrier, and supply-side country level indicators for access. We also include information from the unbanked side to assess the barriers to financial inclusion through the obstacles perceived by people prevented from using formal financial services.

Usage:

To assess the extent of usage of the formal financial service by individuals, we consider the utility of these services in three different indicators: holding at least one financial product, keeping savings and having a loan in a formal financial institution.

Barriers:

The barriers to financial inclusion, perceived by unbanked individuals, provide information about the obstacles that prevent them from using formal financial services. We take into account only the information about barriers that represent involuntary exclusion such as distance, lack of the necessary documentation, affordability and lack of trust in the formal financial system.

Access:

Access to formal financial services represents the possibility for individuals to use them. We construct the access dimension with supply side data at country level from four basic indicators: automated teller machines (ATMs) (per 100,000 adults), commercial bank branches (per 100,000 adults), ATMs (per 1,000Km²) and commercial bank branches (per 1,000Km²). They account for the physical point of services offered by commercial banks and other financial institutions.

In three dimensions we have total 11 indicators. Data source: RBI data, CTISIL hand book, WB Development reports, Financial Reports of the Govt. of West Bengal., Banks websites of different commercial banks. The dimension index D_i , as computed by the formula (1), measures the country's achievement in the i th

FINANCIAL INCLUSION

dimension of financial inclusion. A weight w_i such that $0 < w_i < 1$ is attached to the dimension i , indicating the relative importance of the dimension i in quantifying the inclusiveness of a financial system.

$$D_i = w_i(A_{i_{\text{min}}} - m_{i_{\text{min}}}) / (M_{i_{\text{min}}} - m_{i_{\text{min}}}) \dots\dots\dots 1$$

w_i = weight attached to the dimension i , $0 < w_i < 1$ (derived from PCA)

A_i = actual value of dimension i

m_i = lower limit on the value of dimension i , (fixed by some pre-specified rule.)

M_i = upper limit on the value of dimension i , (fixed by some pre-specified rule)

Formula (1) ensures that $0 \leq d_i \leq w_i$. The higher the value of d_i , the higher the country's achievement in dimension i . If n dimensions of financial inclusion are considered, then, a country's achievements in these dimensions will be represented by a point $X = (d_1, d_2, d_3, \dots, d_n)$ on the n -dimensional space. In the n -dimensional space, the point $O = (0, 0, 0, \dots, 0)$ represents the point indicating the worst situation while the point $W = (w_1, w_2, \dots, w_n)$ represents an ideal situation indicating the highest achievement in all dimensions.

Larger distance between X and O would indicate higher financial inclusion. And, smaller distance between X and W would indicate higher financial inclusion. level of financial inclusion indicates higher value of the index. Thus, to compute IFI, first we compute X_1 (distance between X and O) and X_2 (inverse distance between X and W) and then take a simple average of X_1 and X_2 to compute IFI, the final index.

The IFI_k for the District k is measured by the simple average of normalized Euclidean distance of the point (p_k, a_k, u_k) from the point $(0,0,0)$ and its normalized inverse Euclidean distance the ideal point $(0.5, 0.5, 0.5)$. Algebraically:

$$IFI = \frac{1}{2} \left[\frac{\sqrt{d_1^2 + d_2^2 + d_3^2}}{\sqrt{w_1^2 + w_2^2 + w_3^2}} + \left(1 - \frac{\sqrt{(1-d_1)^2 + (0.5-d_2)^2 + (0.5-d_3)^2}}{\sqrt{1.5}} \right) \right]$$

2. Measuring Social Development Index:

SDI is a composite index which takes into account six important dimensions: These are: demographic parameters, health indicators, education attainment, basic amenities, economic deprivation and social deprivation. These dimensions are treated as six different parameters. In the calculation of SDI the Principal

Component Analysis (PCA) is applied for determining the weights of the basic indicators. Here the SDI is derived for all the 19 districts of West Bengal on an aggregate basis. The six dimensions are broken into different indicators (21 in all) for all the districts. The indicators and the dimensions of SDI are given below

TABLE1: Indicators for SDI Calculation:

Indicators for SDI calculation	Dimension -2: Health
Dimension -1: Demography	% Institutional Delivery
CPR(contraception prevalence rate)	% Undernourished Children
TFR (Total fertility Rate)	Dimension- 4:Basic amenities
IMR(Infant Mortality Rate)	% HH living in Pucca Houses
Dimension- 3: Education	% HH having access to drinking water
Literacy Rate	% HH having access to toilet facility
Student -Teacher Ratio	% HH having electricity connection
School Attendance Rate	Dimension-6: Social
Dimension- 5: Economic deprivation	Literacy Disparity between SC & Gen.
% living below poverty line	Literacy Disparity between ST & Gen.
Unemployment Rate CDS	Literacy Disparity between Female & Male
Monthly Per Capita Expenditure	Disparity Between Female & total Unemployment rate
	Disparity between Muslim & total pop.
	Child Sex Ratio

In order to show how far each district is behind or ahead of the others, the formula X_{ij}/X_{max} is used where X_{ij} = the district's value of any particular indicator, X_{max} = the value of the district that has maximum score on that indicator. We used the ratio for each index separately. Then we compute the variance and the SD. Then we check the confidence interval $(Xwb+2\sigma)$ and $(Xwb-2\sigma)$ i.e 5% significance level and $(Xwb+3\sigma)$ and $(Xwb-3\sigma)$ i.e at 1% significance level. Finally we check for index dispersion. For each

dimension we calculate the index as:

$$Y_{ri} = \frac{\sum (X_{rji} - X_{rjmin})}{(X_{rjmax} - X_{rjmin})}, \text{-----} 5$$

where, $i= 1,2,\dots, 19$, the number of districts, j is the indicator, r is the category or dimension, $r=1,2\dots 6$. Then we add up the scale free values for each dimension to get the six different indices for 6 dimensions. To assign the weight for each dimension the i^{th} Eigen Value is multiplied with the i^{th} extracted component column and only the positive value is considered. The final SDI is calculated as:

$$SDI = \frac{\sum X_i (\sum W_{ij} E_j)}{\sum (\sum W_{ij} E_j)} \text{-----} 6$$

where, X_i is the i^{th} indicator, W_{ij} is the factor loading weight of the i^{th} variable on the j^{th} factor.

And E_j is the Eigenvalue of the J^{th} factor.

Result and discussion:

The primary result of the IFI is given in the Table 1, which shows the ranking of the districts of WEST Bengal according to the IFI score. Only Kolkata has the most inclusive financial system and all the other districts are in low financial inclusion category with IFI below 0.3. Murshidabad has the least financial inclu-

sion score (0.08) and in all the three dimensions it is in the lowest position. Most of the northern districts, except Darjeeling, have IFI less than 0.2. In analyzing the dimension wise score, it indicates that the Access and Barriers dimension all the districts are poor performers. In Usage category some of the southern districts, Hugli, Haora, Birbhum, Bardhaman, S. 24 Parganas, Nadia have better performance than the other two dimensions. It is clear that most if the adult population in WB may have at least either loan or account or savings, but the in other indicators like number of ATMs or Bank Branches or the concentration of these two and the distance of the branches, hassles of documentation in opening branches and the lack of trust on the banks mostly due to illiteracy are the primary issues in low score in overall IFI for the districts. The primary cause of low IFI in WB is tagged in several social development indicators like Illiteracy, Unemployment, Low per capita income, poverty etc. If we compare the IFI with these developmental indicators for the districts then it will produce a clearer picture regarding the explanation of the low value of the IFI.

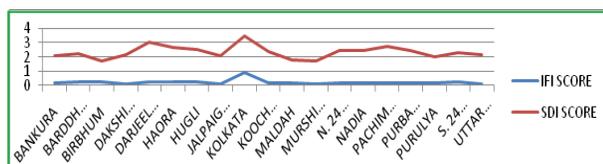
TABLE 2: IFI & SDI Score of the Districts of West Bengal (Based of Last Census-2011)

IFI RANK	DISTRICTS	D1 USAGE	D2 ACCESS	D3 BARRIERS	IFI SCORE	WEIGHTED SDI	SDI RANK
11	BANKURA	0.17	0.08	0.09	0.170039	2.072890784	15
3	BARDDHAMAN	0.22	0.11	0.12	0.223378	2.202467355	12
4	BIRBHUM	0.23	0.11	0.1	0.223431	1.683364378	20
17	DAKSHIN DINAJPUR	0.12	0.05	0.04	0.110462	2.145827481	13
2	DARJEELING	0.28	0.14	0.11	0.270291	3.008156536	2
6	HAORA	0.22	0.14	0.12	0.233697	2.652173556	4
5	HUGLI	0.24	0.14	0.11	0.243557	2.500707964	5
16	JALPAIGURI	0.12	0.07	0.04	0.117262	2.031055483	16
1	KOLKATA	1	1	1	0.918432	3.445338681	1
10	KOOCH BIHAR	0.18	0.11	0.09	0.186896	2.338442701	10
14	MALDAH	0.13	0.07	0.06	0.130054	1.753301229	18
19	MURSHIDABAD	0.09	0.03	0.03	0.080566	1.688240691	19
7	N. 24 PARGANAS	0.18	0.11	0.09	0.186896	2.429397617	8
9	NADIA	0.19	0.09	0.11	0.193486	2.439620699	6
13	PACHIM MEDNIPUR	0.16	0.07	0.08	0.156739	2.694471533	3
12	PURBA MEDNIPUR	0.15	0.08	0.09	0.156825	2.435288039	7
15	PURULYA	0.12	0.06	0.062	0.120671	1.980837578	17
8	S. 24 PARGANAS	0.21	0.11	0.09	0.206806	2.245241212	11
18	UTTAR DINAJPUR	0.11	0.04	0.04	0.100442	2.11173928	14

FINANCIAL INCLUSION

Table 1 also shows the SDI of the districts of WB calculated on the basis of the 21 indicators in 6 dimensions (Table 1). In present discussion we will consider the Weighted SDI for the districts. It also shows that the Southern districts have a better score than the northern districts, except Darjeeling. As per expectation Kolkata is the 1st position then comes Darjeeling, Paschim Mednipur, Haora, Hugli, Nadia, Purba Mednipur and N. 24 Parganas. All these 8 districts lie above the state average in different social development dimensions. Most of the western and the northern districts are the below performers in different social development indicators.

FIG. 1: IFI and SDI Score of the Districts of West Bengal



In comparing the SDI with IFI a clear picture emerged regarding the poor condition of the financial inclusion in West Bengal. The basic factors for the success of financial inclusion is underlying in overall social development of the people. Table 5 produces a comparison between the IFI and SDI of the Districts of West Bengal. Kolkata and Darjeeling remain in the first two positions in both the indices. In cases of Purba Mednipur and Paschim Mednipur the IFI rank position are 12 and 13 while the SDI ranks are 7 and 3 respectively. Conversely, in cases of Bardhaman and Birbhum there are lower IFI ranks, 11 and 19 while they have better ranks in SDI, 5 and 6 respectively. For all the other districts there is parity that lower IFI is associated with lower SDI and vice versa. The correlation coefficient between IFI and SDI is calculated as 0.732.

2a. Descriptive Statistics of IFI and SDI.

	Mean	Std. Deviation	N
SDI SCORE	2.3083	.44339	19
IFISCORE	.2121	.17915	19

2b. Correlation between SDI&IFI

CORRELATION	SDI	IFI
Pearson Correlation	1	.732(**)
Sig. (2-tailed)	.	0
Pearson Correlation	.732(**)	1
Sig. (2-tailed)	0	.
N	19	19

Among the 21 indicators of social development the Economic Deprivation Dimension and the Education dimensions are taken as basic influencing factors for low financial inclusion. We consider Poverty level, Rate of Unemployment, Monthly Per capita Income and Literacy rate as the most influencing factors for determining financial inclusion position (derived from FA). Then correlation coefficient of the Poverty Ratio, Unemployment rate, Monthly per capita income and literacy rate with the IFI score is given in the Table 3. Poverty and unemployment have a negative impact on IFI while monthly per capita income and literacy rate has a high positive influence on IFI score which is quite significant.

TABLE 3: Correlations Coefficients of the Factors Relating to IFI Score

IFI SCORE	POVRATIO	UNEMRATE	MPCINC	LITRATE
1				
-0.47374	1			
-0.23066	0.158335	1		
0.57947	-0.86709	-0.19442	1	
0.50388	-0.72686	-0.34082	0.591863	1

* Correlation is significant at the 0.05 level (2-tailed).

** Correlation is significant at the 0.01 level (2-tailed).

Now we consider the regression result of the above mentioned four variables on IFI score according to the regression equation:

$$IFISCORE = \beta_0 + \beta_1 POVRATIO + \beta_2 UNEMRATE + \beta_3 MPCINC + \beta_4 LITRATE + e$$

The calculation result is given in the following Table 4. The values of the coefficients are also significant statistically. The relation among IFI score of the districts of West Bengal and the corresponding variables influencing the financial inclusion in these districts indicates that poverty and monthly per capita income of the people are the primary determinants of the

financial inclusion position of the districts. It is clear from the discussion so far that social development has an important influence on the functioning of the financial inclusion process for the districts of West Bengal.

TABLE 4: Table for Coefficients of the Regression

	Unstandardized Coefficients		Standardized Coefficients	T	Sig.
	B	Std. Error	Beta		
(Constant)	-0.01924	0.113353		-0.16977	0.003
POVRATIO	0.118613	0.232348	0.166836	0.510497	0.0012
UNEMRATE	0.051509	0.14553	0.078785	0.353943	0.001
MPCINC	0.242823	0.207846	0.35369	1.168286	0.0000
LITRATE	0.096258	0.184191	0.155942	0.522597	0.0003

Conclusion

Financial inclusion is an essential ingredient of economic development and poverty reduction and it can also be a way of preventing social exclusion. A person's right to use formal financial services, as a way of preventing social exclusion, must be a priority. This study has shown a strong, positive relationship between financial inclusion and development. The process of social development is linked with financial inclusion and vice versa. We have shown that poverty level, monthly per capita income, levels of unemployment and literacy rate are the primary determinants of low financial inclusion from the social development point of view.

West Bengal lies among lower category states of India in the process of financial inclusion. District-wise variation of the extent of financial inclusion is not so pronounced

as most of all districts belong to low financial inclusion category. As shown by our estimates, access is the most important dimension for measuring the level of financial inclusion. This result suggests that supply of formal financial services is more important than number of users in explaining our index. Access represents a necessary but not sufficient condition for using formal financial services. We find that the degree of financial inclusion is highly correlated with some important social development indicators. The creation of such an index is useful to shed some light on the determinants of financial inclusion as well as its contribution to economic growth and development. Without proper social development the dream of complete financial inclusion will remain elusive. **MA**

Reference

1. Chattopadhyay, S. (2011) *Financial Inclusion in India: A case-study of West Bengal*.
2. Dr. Vighneswara Swamy and Dr. Vijayalakshmi, *Role of Financial Inclusion for Inclusive Growth in India- Issues & Challenges*, 2010.
3. "Financial Inclusion and Banks: Issues and Perspectives", RBI Monthly Bulletin, November 2011.
4. "Financial Literacy and Consumer Protection – Necessary Foundation for Financial Inclusion", RBI Bulletin, May 2012.
5. Kuldeep Singh and Singh Kondan (2012) "Financial Inclusion, Development and Its Determinants: An Empirical Evidence of Indian States" *The Asian Economic Review* Vol. 53 (1) 115-134.
6. Levine, R. (1997). *Financial Development and Economic growth: views and agenda*. *Journal of Economic Literature*, 688-726.
7. "Measuring Financial Inclusion", Policy Research Working Paper, 6025, World Bank.
8. Pais, J. (2010). *Financial Inclusion and Development*. *Journal of International Development*.
9. Pravat Kumar Kuri & Arindam Laha (2011) "Determinants of Financial Inclusion: A Study of Some Selected Districts of West Bengal, India" ICSSR Major Research Project, University of Burdwan.
10. Rangarajan Committee. (2008). *Report for the Committee on Financial Inclusion*. Government of India. 121. Sarma, M (2008): *Index of Financial Inclusion*, Working paper no. 215, Indian Council for Research on International Economic Relations, June 2008.
12. Sarma, M and Pais, J (2008): "Financial Inclusion and Development: A Cross Country Analysis", accessed from www.icrier.org/pdf/6nov08/Mandira%20Sarma-Paper.pdf.

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Crop Insurance in India: A brief overview



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Introduction

Agriculture production and farm incomes in India are frequently affected by natural disasters such as droughts, floods, cyclones, storms, landslides and earthquakes. Susceptibility of agriculture to these disasters is compounded by the outbreak of epidemics and man-made disasters such as fire, sale of spurious seeds, fertilizers and pesticides, price crashes etc. All these events severely affect farmers through loss in production and farm income and they are beyond the control of the farmers (Raju & Chand, 2008). The

need to protect farmers from agricultural variability has been a continuing concern of agriculture policy. According to National Agriculture Policy (NAP) 2000, "Despite technological and economic advancement, the condition of farmers continues to be unstable due to natural calamities and price fluctuations". (Sinha, 2004) In order to save farmers from the above mentioned perils crop insurance can be used as an answer. Crop insurance is a means of protecting the agriculturist against financial losses due to uncertainties that may arise from crop failure/losses arising from named

or all unforeseen perils beyond their control (AIC). Here let us take an example and understand why crop insurance schemes are helpful for the farmers. Let us suppose there are two possible outcomes- 100 and 25. We can identify the outcome 100 with a good crop and 25 with that of a crop failure. A risk averse farmer will buy insurance coverage of the amount $(100-25) = 75$ at a premium of 15 (say). Thus, if the farmer buys the insurance he gets $(100-15) = 85$ as return if the crop is good. The value of the crop is 100 and the premium that has been paid is 15. If the crop fails, the value is only 25. He has also paid a premium of 15 for the coverage of 75. So, his net payoff in the bad state is $(25-15+75) = 85$ (Gangopadhyay, 2004). So, it is evident from the above example that if a farmer buys crop insurance scheme he can insulate himself completely from all the risks and gets the same return (i.e. 85) regardless of whether the outcome is good or bad. Crop insurance is a financial mechanism to minimize the impact of loss in farm income by factoring in a large number of uncertainties which affect the crop yields. As such it is a risk management alternative where production risk is transferred to another party at a cost called premium (Singh, 2010). If the crop damage is due to the insured cause, the farmer receives an indemnity compensation to partially compensate for the loss. The premium charged and the indemnity paid depend upon the estimation procedure used (Rustagi, 1988).

In the present paper, the author will give a brief account of the various crop insurance schemes that had been introduced in our country over the years and their advantages and disadvantages. At the end of the paper, the best crop insurance scheme in the opinion of the author will be highlighted. The data available from the secondary sources were used in the course of writing this paper.

The Genesis of Crop Insurance in India

Credit for pioneering work on crop insurance in India goes to S Chakravarti, who in 1920, proposed an agricultural insurance scheme based mainly on the rainfall approach. The data on which the scheme was based pertained to the then Mysore state, though the scheme had an all India perspective. This scheme consisted of a package that included insurance of buildings, granaries and agricultural implements; cattle insurance

and; insurance of crops (Vyas & Singh, 2006).

The subject of crop insurance was under consideration of the Government of India since independence. Accordingly in the context of resolution, Dr. Rajendra Prasad, the then Minister of Food and Agriculture assured that the Government would look into the scope of introducing a crop and cattle insurance scheme in the country. In pursuance of this assurance, an Officer on Special Duty was appointed in August 1948 to study the problems and to formulate experimental schemes of crop and cattle insurance for operation in selected areas. The two pilot schemes prepared by him were circulated to the states for adoption. However, none of the states agreed to implement the schemes, mainly due to paucity of funds (Dandekar, 1976). The question of crop insurance was again revived during Third Five Year Plan and the first concrete step was taken in October 1965. The Government of India decided to have a Crop Insurance bill and a model crop insurance scheme so that the states interested in introducing the same could do so. The draft bill and model crop insurance scheme when circulated among the states were not accepted, so the bill and model scheme was referred to a committee, chaired by Dharam Narain, for further examination. The Committee came to the conclusion that, in the conditions obtaining in the country, it was not advisable to introduce crop insurance in the near future even on a pilot or an experimental basis (Dandekar, 1976).

In spite of the recommendations of the Committee the first ever crop insurance scheme was introduced in Gujarat during 1972-78. It covered the H-4 cotton variety initially, though subsequently other crops were also brought under its ambit. In Gujarat, an individual based approach scheme covered about 3,110 farmers who paid a premium of Rs 4.54 lakh and claimed compensation worth Rs. 37.88 lakh leading to a high premium claim ratio of 8.34 (Vyas & Singh, 2006).

Different Approaches of Crop Insurance in India

In 1976, an expert committee headed by V M Dandekar looked into issues and modalities of crop insurance in India (Dandekar, 1976) and revisited the Dharam Narain Committee's views (Vyas & Singh, 2006). In the report, the committee was of the view that individual approach (see Box 1) was the ideal approach.

Box 1: Individual Approach

Advantages of Individual Approach

- 1) The farmers can get indemnity based on their normal output for the last few years.
- 2) In case of area approach if there is bad crop all the farmers in the particular area are to be paid the amount of indemnity but here only the farmers who have output less than normal output are paid by the indemnity.

Disadvantages of Individual Approach

- 1) It is a more costly approach as normal output, amount of premium and indemnity of each farmer has to be assessed separately.
- 2) Large amount of statistical data for each farmer is required for actuarial calculations, which may not be available.

On the basis of the recommendations of the Dandekar Committee Report the Pilot Crop Insurance Scheme (PCIS) was put in place in 1979-80 which was based on homogeneous Area Approach (see Box 2). From the actuarial standpoint, a crop insurance scheme based on the Area Approach is a fair betting system based on an independent chance-system (Dandekar, 1976).

Box 2: Area Approach

Advantages of Area Approach

- 1) In area approach the crop-outputs of individual farmers need not be ascertained.
- 2) All farmers are paid indemnity at uniform rate.

Disadvantages of Area Approach

- 1) The payments are made after properly planned crop-cutting experiments, which may delay the process of payment.
- 2) Since all the farmers get indemnity at uniform rate, individual losses suffered by the farmers may not be always answered.

In 2013 another scheme namely Weather based Crop Insurance Scheme (WBCIS) was introduced. Weather Based Crop Insurance aims to mitigate the hardship of the insured farmers against the likelihood of financial loss on account of anticipated crop loss resulting from incidence of adverse conditions of weather parameters

like rainfall, temperature, frost, humidity etc. While Crop Insurance specifically indemnifies the cultivator against shortfall in crop yield, Weather based Crop Insurance is based on the fact that weather conditions affect crop production even when a cultivator has taken all the care to ensure good harvest (AIC). It too operates on the concept of 'Area approach'.

Box 3: Weather based insurance

Advantages of Weather based insurance

- (i) Since in India agricultural output is heavily dependent on rainfall, this scheme is better than others.
- (ii) The settlements of indemnities are done within a fortnight.
- (iii) Here the indemnity is not dependent on crop cutting experiments so a parity is maintained in all the fields.
- (iv) The sum insured is kept between cost of production and value of production.

Disadvantages of Weather based insurance

- (i) It will be an expensive scheme to implement as many weather stations are to be set up so that accurate weather data is available.
- (ii) Cultivators participating in this type of insurance cannot participate in any other insurance schemes, so if loss is occurring due to any factor other than weather conditions it will not be covered under this insurance.

Performance of Crop Insurance Schemes in India

In collaboration with the state governments General Insurance Corporation had introduced Pilot Crop Insurance Scheme (PCIS) in 26 areas of Gujarat, 23 areas of West Bengal and 17 areas of Tamil Nadu, though it was later on extended to other states also. The scheme covered cereals, millets, oilseeds, cotton, potato, gram and barley. This scheme was only for loanee farmers on voluntary basis. The scheme covered 6.27 lakh farmers who paid premium worth Rs. 195.01 lakhs. The claims paid amounted to Rs. 155.68 lakhs with claim premium ratio of 0.80 (Evolution of Crop Insurance Schemes in India). A few details of the scheme are shown in the table on next page:

Table 1: Table showing Performance of Pilot Crop Insurance Scheme during 1979 – 85

Particulars	1979-1980	1980-1981	1981-1982	1982-1983	1983-1984	1984-1985	Total
No. of States	3	3	8	9	11	12	-
Area Covered (He)	13181	18703	24467	70729	87347	477333	661760
Farmers Covered	16265	23442	24625	50855	60349	447086	622622
Sum Insured*	130.30	165.77	202.82	468.26	653.64	4446.49	6067.28
Premium Collected	5.53	6.93	7.55	15.65	21.15	138.20	195.01
Total Claim Paid	5.29	3.27	9.64	37.32	8.37	91.80	155.68
Claim Ratio (%)	95.71	47.10	127.67	238.46	39.56	66.42	79.83

*Sum Insured, Premium Collected and Claim Paid are in lakh rupees

Source: www.shodhganga.inflibnet.ac.in/bitstream/10603/9367/9/09_chapter%204.pdf (date of retrieval:12.5.15)

From the above table it is clear that the scheme's acceptance had increased over the years as initially in 1979-80 the scheme covered 3 states but in 1984-85 the scheme covered 12 states. Over the years the area covered had also increased and also the number of farmers under the purview of the scheme. The scheme covered 6.27 lakh farmers who paid premium worth Rs. 195.01 lakhs. The claims paid amounted to Rs. 155.68 lakhs with claim premium ratio of 0.80.

In 1985 Comprehensive Crop Insurance Scheme (CCIS) was introduced, it was actually an extension of Pilot Crop Insurance Scheme (PCIS). This scheme was implemented by GIC. Unlike PCIS this scheme was made compulsory for loanee farmers. The participation of the states was on voluntary basis. This scheme too was on the basis of area approach. The premium rates were 2 percent of the sum insured for cereals and millets, and 1 percent for pulses and oilseeds. The union government and the state government shared premium and claims in the ratio of 2:1. The small and marginal farmers received premium subsidy of 50% (Evolution of Crop Insurance Schemes in India).

Table 2: Table showing Results of CCIS for all INDIA from 1985 through 1999

Year	Farmers	Area	Sum Insured	Premium Collected	Total Claim	Claim/ Premium Ratio	Claims Paid
1985	3.85	7.69	7.811	138.97	872.63	6.28	872.63
1986	5.08	9.84	10.986	195.05	1739.58	8.92	1739.58
1987	6.76	11.65	16.161	279.47	2894.73	10.36	2894.73
1988	3.85	6.25	7.148	120.00	330.57	2.75	330.57
1989	4.89	7.60	10.255	172.50	372.86	42.16	372.86
1990	2.74	4.48	7.114	111.62	855.97	7.67	855.97
1991	4.56	7.98	11.383	180.88	2013.04	11.13	2013.04
1992	5.02	8.43	14.206	229.17	509.55	2.22	509.55
1993	5.05	8.08	15.872	255.48	1886.11	7.38	1885.30
1994	5.19	8.24	18.769	297.09	580.23	1.95	579.34
1995	5.66	9.07	21.638	343.30	1489.65	4.34	1486.74
1996	5.85	9.46	24.666	393.52	1722.14	4.38	1717.31
1997	6.00	9.69	26.298	414.76	1870.24	4.51	1713.04
1998	6.20	10.13	29.110	463.53	1284.39	2.77	685.57
1999	5.58	8.97	28.331	440.25	4616.87	10.49	4613.89
Total	76.27	127.57	249.749	4035.59	23038.54	5.71	22270.11

Source: www.shodhganga.inflibnet.ac.in/bitstream/10603/9367/9/09_chapter%204.pdf (date of retrieval:12.5.15)

AGRICULTURE

From the above table we see that the number of farmers covered under the scheme rises to 6.76 in 1987 but it drops to 3.85 in the very next year. In 1990 it was lowest at 2.74, then it showed an increasing trend and finally in 1998 it reaches 6.20 but again it dropped to 5.58 in the next year. The area covered under the scheme also shows a similar behaviour like the farmers covered in the scheme. It can be also noticed a sharp increase in the claim premium ratio in 1989 and thereafter a sharp decline in the same.

Experimental Crop Insurance Scheme (ECIS) was introduced on experimental basis in 5 states during Rabi 1997-98. The five states where it was introduced are: Assam, Andhra Pradesh, Orissa, Tamil Nadu and Karnataka. The main feature of this scheme was that it covered non-loanee small/marginal farmers of the earlier mentioned 5 states. But this scheme was discontinued after one season due to its financial and administrative difficulties.

The National Agricultural Insurance Scheme (NAIS) was introduced from Rabi season 1999-2000. The Agricultural Insurance Company (AIC) has overall responsibility to implement the scheme. There are three policy goals implied in the scheme: (a) social response – providing support to the poor farmers who stand to lose the most during severe crop failures; (b) risk management – improving rural financial services' ability to manage commercial risk, which is important for improving access to finance by the farmers; and (c) fiscal exposure –controlling the fiscal exposure of the government, in terms of the average exposure as well as the peak exposure during disaster years (Vyas & Singh, 2006). All food grains, oilseeds and annual horticultural/commercial crops were covered for which past yield data are available for an adequate number of years. Among the annual commercial and horticultural crops, sugarcane, potato, cotton, ginger, onion, turmeric, chillies, coriander, cumin, jute, tapioca, banana and pineapple, are covered under the scheme. The above crops were subject to i) the past yield data based on Crop Cutting Experiments (CCEs) is available for adequate number of years, and ii) requisite number of CCEs are conducted for estimating the yield during the proposed season. The scheme covers on a compulsory basis all farmers growing notified crops and availing Seasonal Agricultural Operations (SAO) loans from Financial Institutions

i.e. Loanee Farmers and on voluntary basis all other farmers growing notified crops (i.e., Non-Loanee farmers) who opt for the Scheme. All farmers including sharecroppers and tenant farmers who were growing the notified crops in the notified areas were eligible for the scheme. The Scheme operated on the basis of 'Area Approach' i.e., Defined Areas for each notified crop for widespread calamities and on an individual basis for localised calamities such as hailstorm, landslide, cyclone and flood. Till Rabi 2004-05, a total of 624.38 lakh farmers have been provided insurance cover during the 11 seasons of NAIS. Of the total number of the farmers covered, 79.51 per cent were loanee farmers (i.e., those who have taken a loan from commercial or a cooperative bank) and the rest non-loanee farmers. In the case of loanee farmers, after the abrupt increase in rabi 2000-01, the coverage in terms of farmers insured had averaged around 19 lakh for three subsequent rabi seasons. However, during the next two rabi seasons (2003-04 and 2004-05), there was a significant improvement in coverage. While in case of non-loanee farmers, the coverage has widely fluctuated. The coverage in the kharif season has been far larger than in the rabi season. In five kharif seasons, since kharif 2000, a total of 475.31 lakh farmers have been covered, as against 149.07 lakh farmers in the rabi season (Vyas & Singh, 2006).

From 1st November, 2013 NAIS has been withdrawn and National Crop Insurance Programme (NCIP) has been introduced. NCIP includes Modified National Agricultural Insurance Scheme (MNAIS), Weather-based Crop Insurance Scheme (WBCIS) and Coconut Palm Insurance Scheme (CPIS). Weather based Crop Insurance Scheme (WBCIS) is a unique Weather based Insurance Product designed to provide insurance protection against losses in crop yield resulting from adverse weather incidences. Weather based Crop Insurance Scheme (WBCIS) operates on the concept of "Area Approach" i.e., for the purposes of compensation, a 'Reference Unit Area (RUA)' shall be deemed to be a homogeneous unit of Insurance. This RUA shall be notified before the commencement of the season by the State Government and all the insured cultivators of a particular insured crop in that Area will be deemed to be on par in the assessment of claims. Each RUA is linked to a Reference Weather Station (RWS), on the basis of which current weather data and the claims would be processed. Adverse Weather

Incidences, if any during the current season would entitle the insured a payout, subject to the weather triggers defined in the 'Payout Structure' and the terms & conditions of the Scheme. The "Area Approach" is as opposed to "Individual Approach", where claim assessment is made for every individual insured farmer who has suffered a loss (AIC).

Conclusion

In the light of the above it may be said that Weather based Crop Insurance scheme is better way of providing insurance. Since it is based on area approach it is a less costly approach as the amount of premium and indemnity of each farmer does not have to be assessed separately. Though the weather data relating to the area is required for which statistical data is needed but it is a more transparent way of providing insurance. Though the underlying concept of Weather based Crop Insurance scheme is area approach but here the settlement of claims are not dependant on crop-cutting experiments. So it is faster way of settling the claims of the farmers and parity is maintained in all the fields. In India since monsoon season is like a gamble, if the farmers can be protected from the perils caused due to weather related factors, the farmers will be in an advantageous position. It might be argued that all the farms may not be close to the weather station, the answer to this problem is that the RWS at block/tehsil level by and large reflects the weather experience of individual cultivators within a RUA and though weather experience on a particular day could be different even in smaller geographical area but in a span of fortnight, month or season it evens out. In case of malfunctioning of RWS for long periods the data measured at back up weather stations would be used. So it is evident that though weather based crop insurance scheme is a relatively new concept but it is the best method of providing crop insurance to farmers. Thus, crop insurance is a very important tool which can be used to protect the farmers from the various perils that they have to suffer. Though crop insurance has been in vogue in India for a few years now but even today most of the farmers are not taking the advantage of crop insurance schemes. The government should play a more active role so that more and more farmers can be brought under the umbrella of crop insurance. **MA**

References

Books & Journals

1. Dandekar, V M (1976): 'Crop Insurance in India', *Economic and Political Weekly*, June 26
2. Gangopadhyay S (2004): "An alternative to Crop Insurance", *Economic and Political Weekly* pp 4763-64
3. Raju S.S, Chand Ramesh (2008): "Agricultural Insurance in India: Problems and Prospects", *National Centre for Agricultural Economics and Policy Research*
4. Rustagi N.K (1988): 'Crop Insurance in India- An Analysis', B.R. Publishing Corporation
5. Singh Gurdev (2010): "Crop Insurance in India", IIM, Ahmedabad
6. Sinha Sidharth (2004): "Agriculture Insurance in India: Scope for participation of Private Insurers", *Economic and Political Weekly*
7. Vyas V.S. and Singh S. (2006): "Crop Insurance in India: Scope for Improvement", *Economic and Political Weekly* pp 4585-94

Websites

1. www.aicofindia.com/AICEng/General_Documents/.../WBCIS_FAQ.pdf (date of retrieval 8.5.15)
Evolution of Crop Insurance Schemes in India
2. www.shodhganga.inflibnet.ac.in/bitstream/10603/9367/9/09_chapter%204.pdf (date of retrieval 12.5.15)
3. *Performance of National Agricultural Insurance Scheme (NAIS):* www.ncap.res.in/Agricultural-risk&insurance/_private/.../4.3.../4.3.2.pdf (date of retrieval 9.5.15)

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Artificial Neural Network

Applications for predicting volatility in stock markets: a review



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1. Introduction

With global advancements in trade and finances coupled up with liberalization of economy led the evolution of complex and interdependent financial systems. Such economic progressions has brought in trade of various financial assets and also established mutual dependency on various macroeconomic and behavioral factors. Such dependencies causes volatility in the price of assets, and gauging the magnitude and direction of such movements in the stock prices has been one of the preferred areas of investigation by the scholars in the sphere of financial economics as it entails considerable implications on wealth creation of investors.

However, the process of volatility prediction is countered with several methodological issues. Traditionally, the statistical forecasting techniques were employed holding the linearity assumptions. But in reality the time-series being non-linear and presence of noise might tend to make the forecasted results inaccurate and hence it can be completely relied upon (Thenmozhi, 2006). Further, other studies [(shaikh and Padhi, 2014), (Chandra and Thenmozhi, 2015)] also confirmed the asymmetric relationship between the Indian Volatility Index (IVIX) and Nifty index, and the magnitude of asymmetry were also not identical. Similarly, there are many such studies internationally that provides evidences of such nonlinearities (e.g. Whaley, 2008, Sarwar, 2012 etc.). Thus, this required to introduce the application of non-linear methods for a more accurate approximation. Artificial Neural

Network (ANN) is one of such techniques of analysis where time-series of financial data is influenced by non-linear dynamics. Hence, this article endeavors to touch upon the applicability of ANNs for predicting market volatility with reasonable accuracy by way of citing instances from the previous literatures in the concerned domain. The rest of the article is composed as follows: the next section provides a brief outline related to IVIX, the underlying reason of asymmetry in the stock and volatility index, using a behavioral approach is described in the subsequent section followed by a section related to an introduction of ANN, the fourth section reviews the scholarly contributions on interface of ANN and stock market volatility predictions. The end segment synthesizes the study as a whole.

2. Understanding IVIX

A typical measure of market's expectations of volatility over the near term is known as volatility index. In a market situation, where the indices steeply rise or fall (i.e. market is highly volatile) the volatility index tend to rise. In a case where the market is relatively stable the volatility index tends to fall. The computation of the price index is done using the price movements of the underlying stocks.¹ This index is first introduced by Chicago Board of Options Exchange (CBOE) in the year 1993 known as CBOE VIX® (Registered trademark of CBOE). It was originally designed to measure market's expectation of 30 day volatility implied by at-the-money S&P 100® index (OEX® Index) option prices. In

2003, CBOE together with Goldman Sachs updated the index and it was based on S&P 500® Index (SPXSM).² The index is widely used by traders, financial theorists and risk managers as standard benchmark of volatility however, there are studies that reports asymmetric behavior as discussed above. Asymmetry is meant in the sense that, IVIX is more sensitive to negative shock (fall in market prices) as compared to positive shock (rise in market prices) [(Shaikh and Padhi, 2014), (Sarwar, 2012)]. As rightly put forth by Whaley, 2008 that “VIX spikes during periods of market turmoil are why it has become known as the ‘investor fear gauge’”. And probably for this reason only, VIX® was regularly featured in the Wall Street Journal, Barron’s and other leading financial publications, as well as business news on CNBC, Bloomberg TV and CNN/Money as the “Fear Index”.³

The computation methodology (IVIX) is expressed as below:

$$\sigma^2 = \frac{2}{T} \sum \frac{\Delta K_i}{K_i^2} e^{RT} Q(K_i) - \frac{1}{T} \left[\frac{F}{K_0} - 1 \right]^2 \quad (\text{Eq. 1})$$

Where,

σ = IVIX/100

T = Time to expiration

K_i = Strike price of i^{th} out-of-the-money option; a call if $K_i > F$ and a put if $K_i < F$

K_i = Interval between strike prices

R = Risk-free rate to expiration

$Q(K_i)$ = Midpoint of the bid ask quote for each option contract with strike K_i

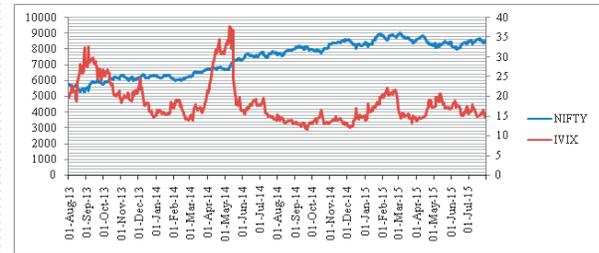
F = Forward index taken as the latest available price of NIFTY future contract of corresponding expiry

K_1 = First strike below the forward index level, F.

To verify the phenomena using a simple plausible framework, visual inspection of graphical analysis, plotting a financial time-series for both the two sets of data (NIFTY-IVIX and SPXSM-VIX®) for a period of two years (i.e. from 01/08/2013 to 31/07/2015) extracting data from the respective websites [CBOE and National Stock Exchange (NSE)]. The figure 1 and 2 below show similar dynamics and complies with what the previous literature has laid down. Thus, it is clearly evident that forecasting of volatility with close approximation has to be done using a mechanism that

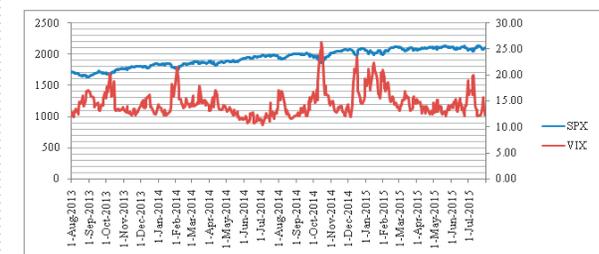
can learn the trend and generate an output which is essentially a nonlinear function of input.

Figure 1: Time-Series of IVIX and NIFTY Index



Source: Data from NSE and Graphical Representation by Authors

Figure 2: Time-Series of VIX and SPX Index



Source: Data from NSE and Graphical Representation by Authors

3. Causes of Non-Linearity:

A Behavioral Perspective

To understand and reason out one of the probable causes of asymmetry, we need to look back to the scholarly contributions of Nobel laureate Daniel Kahneman and Amos Tversky, (1979) and Barberis et al, (2001), which fundamentally advocates that investors derive direct utility not only from consumption but also from fluctuations in the value of their financial wealth, and investors are more sensitive towards losses as compared to gains. Hence, the value functions of investors, hypothetically concave for gains and convex for losses. However, the magnitude of convexity would be greater as compared to concavity for same amount of losses or gains.

The work of Barberis on the similar note formulated a value function given as below:

for (Eq. 2)

$$v(X_{t+1}, S_t, z_t) = \begin{cases} X_{t+1} & \text{for } X_{t+1} \geq 0 \\ \lambda X_{t+1} & \text{for } X_{t+1} < 0 \end{cases}$$

STOCK MARKET

Where,

X_{t+1} = Investor's Gain if $X_{t+1} > 0$, Indifferent if $X_{t+1} = 0$ and Loss if $X_{t+1} < 0$

S_t = Value of stockholding today

$Z_t = Z_t / S_t$, where Z_t = Price that the investors remember or the reference point

The additional sensitivity for losses is represented by a (λ) factor. The same phenomena can be observed in practice to explain the asymmetry and non-linearity in IVIX. The real life scenario of stock and volatility index movements conforms to the accepted and established axioms as propounded by the theoretical framework. The steeper movement of volatility indices in the event of negative market returns can be assumed to be compensated using as discounting factor. However, since λ is a cognitive and behavioral impact exact approximation incorporates a high degree of complexity and ambiguity. Further the traditional statistical models might not be robust enough to understand and predict stock markets in an environment of uneven magnitude of volatility under different market situations. The behavioral/cognitive impact is difficult to capture by traditional models and hence to address the issue ANNs were found to be useful as it modulates the output understanding the data patterns. Further it also derives from the biological neural systems. The following section would brief about the utility of ANNs.

4. ANN and its Applicability in Financial Research

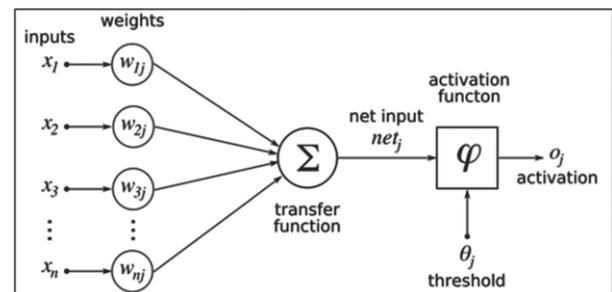
Application of ANN in contemporary financial research has emerged as of prime importance because of their learning and predictive ability in problems with nonlinearity. Though the ANNs are somewhat comparable to non-linear regression models however it is superior to the sense of being capable to adapt itself by understanding the nature and trend of input data to optimize the output. As the name suggests, it borrows from neurophysiologic knowledge of biological neurons and of networks of such biological neurons, thus it differs from conventional computing machines (Graupe, 2007). It is a typical statistical learning model that is inspired from the biological neural networks. In general ANN consists of three main layers input layer, hidden layer and output layer which are interconnected with dense nodes. Neurons are the basic com-

puting elements, and network architecture describes the connection between the neurons. In order to find the values of network parameters, training algorithm is used to perform a particular task. Thus the characteristic feature of ANNs essentially means:

- (i) Application of a numerical parameter that are attuned by a learning algorithm function.
- (ii) Understanding the non-linear data pattern and logical approximation of outputs.

The primary element of a neural network is known as perceptron, which was first proposed by Frank Rosenblatt in 1958 at Cornell University. The working mechanism of which is presented by the diagram as below:

Diagram 1 : A Simple Perceptron



Source: Rosenblatt, E. (1958).

A technical interpretation of a simple perceptron implies it has an input vector of N dimension. The input vector of x_j is combined with the intermediate vector W of N dimension. The input is processed at the transfer function represented by the summation node with product j . Then the outcome is processed through an activation function, which compares the value of j to the threshold value which is predefined (Thenmozhi, 2006). A multilayer perceptron neural network, recurrent neural network and radial basis network are all collection of artificial intelligence models. The each model has its own unique structural algorithm. A proper understanding of each model is essential for its application with pertinence.

There are several studies which validate the utility of ANNs as a tool for more accurate prediction. ANN was applied to predict the bankruptcy problem and the outcome was fairly better than statistical discriminant analysis technique (Pendharkar, 2005). In another study (Adya and Collopy, 1998) it was attempted to understand how effective the use of ANN for forecast-

ing and prediction is. For the purpose 48 studies on the related theme was located from 1988 to 1994. Out of their 22 final samples 18 confirmed potential use of ANN for deriving results with reasonable approximations.

Thus, the dominance of this technique for predictive purposes have been widely recognized and accepted. The researchers in finance and economics have also employed ANN for financial forecasting to hedge against market volatility. The following section provides a review of such efforts.

5. Observations from Previous Researches in the Domain

This segment provides a review of some previous researches that signifies the importance of ANN in financial forecasting for designing investment strategies in advance. The snapshot follows as below:

(Refenes et al, 1997) developed a model using backpropagation algorithm to predict a 30-day stock returns in Paris stock exchange. The work concludes by emphasizing the fact that backpropagation methods are more effective for prediction purposes where the data is nonlinear. (Al-Hasan, 2002) in his study the financial time-series data of 7 firms from Saudi Arabia across industry and confirmed the superior predictive ability of ANNs with a neural network of 2-5-1 structure. (Kim, 2006) exercised genetic algorithm (used primarily for selection of instance in ANN) based ANN for stock market analysis of Korean stock price index. This approach was opted to deter the disruptions in results caused by noisy data. (Mohan et al, 2005) assessed the performance of ANNs by attempting to predict for Bombay Stock Exchange (BSE) and concludes that ANN models can predict the security prices with higher levels of accuracy. (Thenmozhi, 2006) in her scholarly work concluded that ANN has the capability to forecast the financial markets given it is properly trained. The individual and institutional investors can be benefitted largely by application of this technique. The study attempted to explore use of ANN on BSE daily data, a multi layer perceptron network was used to build the daily return model and error backpropagation algorithm was employed for network training. (Dixit et al, 2013) concludes in their work taking daily data from 2010 to 2013 that ANN models can be real handy in forecasting the downwards movement in IVIX.

Hence, the overview of some prominent studies above provides evidences of pertinence of ANN application for prediction of dynamics of stock markets.

6. Synthesis and Conclusive Ideas

Our discussion on utility of ANN for volatility prediction touched upon the multi faceted aspects. The study highlighted the nature of IVIX being asymmetric and nonlinearity of financial time-series data. Thus the use of traditional statistical techniques for forecasting may not be appropriate. The underlying reasons being biases in cognition and behavioral aspects, the reaction of investors are not constant over any period of observation. Hence the use of ANN gained due importance over the period of gradual development in the field of financial research. ANN also found to be superior to the nonlinear statistical techniques on the ground of its learning capabilities from the data patterns.

However, there are some contradicting studies as well for reference (Kwong, 2001) in his study on 7 Australian firms found that naïve prediction methods outperformed ANN. On similar lines, (Thenmozhi, 2006) argues better network architecture could be obtained by varying the parameters of the training algorithm, if properly trained ANN are capable of forecasting financial markets with due cogency. Thus, a degree of diligence on the part of the researcher to run the technique is also a matter of consideration for close approximation.

But since the behavioral implications as highlighted by the present study by definition itself is non-consistent and hence the magnitude of volatility is varying in all respect, a neural network properly seasoned can be really useful to observe the pattern and predict with reasonable reliability with required curing. Hence to some extent based on the output of ANNs informed decisions can betaken and investment strategies can be framed accordingly with due approximation. **MA**

References

1. Adya, M., & Collopy, F. (1998). *How effective are neural networks at forecasting and prediction? A review and evaluation. Journal of Forecasting, 17, 481-495.*
2. Al-Hindi, H. A., & Al-Hasan, Z. F. (2002). *Forecasting Stock Returns with the Neural Network Models. Journal of King Saud University, 14(1), 65-81.*
3. Bagchi, D. (2012). *Cross-sectional analysis of emerg-*

- ing market volatility index (India VIX) with portfolio returns. *International Journal of Emerging Markets*, 7(4), 383-396.
4. Barberis, N., Huang, M., and Santos, T., (2001). *Prospect Theory and Asset Prices*. *Quarterly Journal of Economics*, XCIV(May), 437-452.
 5. Chandra, A., & Thenmozhi, M. (2014). *On asymmetric relationship of India volatility index (India VIX) with stock market return and risk management*. *Decision*, 42(1), 33-55.
 6. Dixit, G., Roy, D., & Uppal, N. (2013). *Predicting India Volatility Index: An Application of Artificial Neural Network*. *International Journal of Computer Applications*, 70(4), 22-30.
 7. Dowling, S., & Muthuswamy, J. (2005). *The implied volatility of Australian index options*. Available at SSRN 500165.
 8. Dumas, B., Fleming, J., & Whaley, R. E. (1998). *Implied volatility functions: Empirical tests*. *The Journal of Finance*, 53(6), 2059-2106.
 9. Fleming, J., Ostdiek, B., & Whaley, R. E. (1995). *Predicting stock market volatility: a new measure*. *Journal of Futures Markets*, 15(3), 265-302.
 10. French, K. R., & Roll, R. (1986). *Stock return variances: The arrival of information and the reaction of traders*. *Journal of financial economics*, 17(1), 5-26.

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At the helm



Our heartiest congratulations to CMA K. Narasimha Murthy, for taking over the charge of Chairman of the High Level Committee on Financial Ponzi Schemes by Government of Andhra Pradesh.

He was associated as Director with many associations like IDBI Bank Ltd, LIC Housing Finance Ltd., AP State Finance Corporation, Bombay Stock Exchange etc. He has been involved with high level Committees as Chairman / Member both at National & State Level, which include Audit Reforms Implementation Committee on Public Sector Banks etc. At present he is closely involved with several National level Institutions, presently on the Boards of Oil and Natural Gas Corporation Ltd., STCI Finance Ltd. etc. In addition, he is associated as Member Tirumala Tirupathi Devasthanams Internal Audit & Investment Committees.

He is also associated with the development of Cost Accounting Record Rules for many Industries as member of Informal Advisory Committee, Dept. of Corporate Affairs, Govt. of India. His efforts in the furtherance of Costing & Management Accounting Profession in India were recognised by the Institute and honoured him by giving citation in October 2007.

We wish CMA K. Narasimha Murthy the very best in all his future endeavours.



Our hearty congratulations to CMA Asim Kumar Mukhopadhyay, Vice president, Business planning, Corporate Finance, Tata Motors ltd for receiving the Bharat Jyoti Award at India International Centre, New Delhi due to his immense contribution in his respective field of endeavours and achieving excellence. The award has been conferred by India International Friendship Society (IIFS) during a conference on 'Economic Growth and National integration' and presented by Mr. G.V.G Krishnamurthy, Ex Election commissioner and other dignitaries. CMA Mukhopadhyay was the lone person in the area of specialisation of Finance and profession of Management Accountants. He has also been the member of Cost Accounting Standard Board (CASB) of the Institute as Industry representation for last few years which is worth mentioning.

Past recipients of the award include many eminent personalities like Mother Teresa, Former Vice-President, B.D. Jatti, Governors like Justice M. Fathima Beevi, Gen G.V. Krishna Rao, Justice P.N. Bhagwati, Heart specialists like Dr. Naresh Trehan, Cricketers, Sunil Gavaskar, Syed Kirmani and many others. We wish CMA Asim Kumar Mukhopadhyay the very best in all his future endeavours.



Our hearty congratulations to CMA Dr. Swagata Sen, a member of the Institute, for taking over the charge of Pro-Vice Chancellor (Academic affairs) of Calcutta University. He is the first person from the Commerce faculty to assume the position of Pro Vice Chancellor (Academic Affairs) in Calcutta University. He is also in the Editorial Board of the International Journal 'Issues in Social and Environmental Accounting'. He had assumed the position of Dean of Faculty of Commerce, Social Welfare and Business Management in Calcutta University in 2013. He is also the convener of the Ph. D. Committee on Commerce of Calcutta University.

We wish CMA Dr. Swagata Sen the very best in all his future endeavours.

Role of CMAs in Digital Revolution in India

Fund Management

The Digital India program aspires to transform the country into a digitally empowered society and knowledge economy. With this initiative, the Government aims to empower citizens with the power of internet. It will form a digital interface to provide a number of e-governance services including health care, education and banking. This will fetch transparency in the system and facilitate inclusive growth. Well-timed implementation of schemes and satisfactory funding are indispensable. Investment in Information and Communication Technology (ICT) is a prerequisite, as it positively affects jobs, productivity, GDP growth misappropriation of fund as well as suggest strategies for effective investments.

Public Private Partnerships

Public Private Partnerships would be preferred wherever feasible to implement e-Governance projects with adequate management and strategic control. All levels of government require innovation, new technologies, better efficiency, and improved services for citizens and customers. However, upgradation and modernization required are not only capital intensive and expensive, but are also complex to manage and outside of the scope and skill-set of most government agencies. With the financial assistance from the private sector, the government is in a better position to “ensure” effective delivery of the quality service and customer satisfaction. CMAs can initiate suitable strategies to balance the public-private interest, Benchmark governance methodologies, technology, check allocation and apportionment of funds, carry out Risk Mapping and proper designing of the projects.

Sustainable Competitive Advantage

Business Process Reengineering involves the radical redesign of core business processes to achieve dramatic improvements in productivity, cycle times and quality. Business Process Re-engineering (BPR) studies often leads to overhaul value chain partly. By resource mapping and analyzing processes within the context of its competitive environment, it can be clearly identified where profits come from. The value chain concept is the essence of “sustainable competitive advantage”. Information Technology (IT) is also a potent source of competitive advantage. In this context, the CMAs can apply BPR technique for re-designing and improvising IT. Successful implementation will make India Digitally empowered and the leader in usage of IT in delivery of services related to various domains such as health, education, agriculture, banking, etc.

e-Governance

It has been felt that a lot more thrust is required to ensure e-Governance in the country promote inclusive growth that covers electronic services, products, devices and job opportunities. Moreover, electronic manufacturing in the country needs to be strengthened. In order to transform the entire ecosystem of public services through the use of information technology, the Government of India has launched the **flagship programme - Digital India**. In many ways, India should be poised for an effective governance program, where CMAs can facilitate the Government by suggesting appropriate governance mechanisms.

Auditing ERP Applications

ERP software offers some degree of synchronized reporting and automation. Instead of forcing employees to maintain separate databases and spreadsheets that have to be manually merged to generate reports, some ERP solutions allow staff to pull reports from one system. Other common ERP features include a portal or dashboard to enable employees to quickly understand the business performance on key metrics. As a consequence, initiates successful implementation of “Digital India” concept. To make it more effective CMAs can carry out audit of ERP environment to ensure security and privacy in an ERP system. In this context, it is necessary to carry out the audit of all aspects of an ERP comprehensively at a post-implementation review.

PD Publications

Sl.No.	Name of the Publication	Edition	Abstract	Cost of Publication
1.	Guidance Note on Maintenance of Cost Records & Cost Audit of Construction Industry	First Edition: July 2015	A comprehensive Guidance Note that provides guidance not only for maintenance of cost records and cost audit operations of construction industry but also includes how to recognize its revenues and expenses. It also provides audit checks for each and every element of Costs included in Abridged Cost Statement as given in Companies (Cost Records & Audit) Rules, 2014.	Rs. 250/- per copy. To get book by courier Rs. 350/- (Rs.250/-Cost of publication + Rs. 100/- towards courier charges)
2.	Guidance Note on Internal Audit of Telecommunication Industry	First Edition: July 2015	A comprehensive and concise reference book for the professionals preparing the Internal Audit Report of a Telecom Company. It Provides internal audit guidance specific to telecom sector regulated by TRAI established under the provisions of Telecom Regulatory Authority of India Act 1997. It Also provides insight of general framework of the internal audit mechanism vis-à-vis sector specific issues which are peculiar to telecommunication industry, Audit of Operational Activities, Audit of Functional Areas etc.	Rs. 250/- per copy. To get book by courier Rs. 325/- (Rs.250/-Cost of publication + Rs. 75/- towards courier charges)
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Day & Date	Foundation Course Examination	
	Syllabus-2012	
Saturday, 19 th December, 2015.	Paper – 1 & 2 (100 Marks) Time : 10 A.M. to 12.00 Noon	Paper – 3 & 4 (100 Marks) Time : 2 P.M. to 4.00 P.M.
	Paper 1 : Fundamentals of Economics and Management (50 Marks) Paper 2 : Fundamentals of Accounting (50 Marks)	Paper 3 : Fundamentals of Laws & Ethics (50 Marks) Paper 4 : Fundamentals of Business Mathematics and Statistics (50 Marks)

Examination Fees

Foundation Course Examination	Inland Centres	₹ 1200/-
	Overseas Centres	US \$ 60

- The Foundation Examination under syllabus-2012 will be conducted in M. C. Q. Mode through Online only.
- Total Questions: 100 (Multiple Choice Questions) in each session, Maximum Marks: 100 (Each Question will carry 1 Mark) in each session. There will be no negative marking for wrong answers.
- Foundation Examination will be conducted under 2012 syllabus only.
- Application Forms for Foundation Examination has to be filled up through online only and fees will be accepted through online mode only (including Payfee Module of IDBI Bank). No Offline form and DD payment will be accepted for domestic candidate.
- STUDENTS OPTING FOR OVERSEAS CENTRES HAVE TO APPLY OFFLINE AND SEND DD ALONGWITH THE FORM.
- (a) Students can login to the website www.icmai.in and apply online through payment gateway by using Credit/Debit card.
(b) Students can also pay their requisite fee through payfee module of IDBI Bank.
- Last date for applying for Foundation Examination of December 2015 term is 3rd November, 2015.
- Examination Centres:** Agartala, Ahmedabad, Akurdi, Allahabad, Asansol, Aurangabad, Bangalore, Baroda, Berhampur(Ganjam), Bhilai, Bhilwara, Bhopal, Bewar City(Rajasthan), Bhubaneswar, Bilaspur, Bokaro, Calicut, Chandigarh, Chennai, Coimbatore, Dehradun, Delhi, Dhanbad, Durgapur, Ernakulam, Erode, Faridabad, Gandhidham, Ghaziabad, Guwahati, Hardwar, Hazaribagh, Howrah, Hyderabad, Indore, Jaipur, Jabbalpur, Jalandhar, Jammu, Jamshedpur, Jodhpur, Kalyan, Kannur, Kanpur, Kolhapur, Kolkata, Kota, Kottayam, Lucknow, Ludhiana, Madurai, Mangalore, Mumbai, Mysore, Nagpur, Nasik, Nellore, Noida, Panaji (Goa), Patiala, Patna, Pondicherry, Port Blair, Pune, Rajahmundry, Ranchi, Rourkela, Salem, Sambalpur, Shillong, Siliguri, Solapur, Srinagar, Surat, Thrissur, Tiruchirapalli, Tirunelveli, Trivandrum, Udaipur, Valsad, Vashi, Vellore, Vijayawada, Vindhyanager, Waltair and Overseas Centres at Bahrain, Dubai and Muscat. (If no examination centre is available at a particular location, examinees will be accommodated at the nearest Centre available)
- A candidate who is completing all conditions for appearing the examination as per Regulation will only be allowed to appear for examination.
- Probable date of publication of result : 9th January, 2016.

A. Das
Director (Examination)

* For any examination related query, please contact exam.helpdesk@icmai.in

THE INSTITUTE OF COST ACCOUNTANTS OF INDIA
(STATUTORY BODY UNDER AN ACT OF PARLIAMENT)

EXAMINATION TIME TABLE & PROGRAMME – DECEMBER 2015

PROGRAMME FOR SYLLABUS 2012		
Day, Date & Time	Intermediate	Final
Thursday, 10th December, 2015	9.30 A.M. to 12.30 P.M. Financial Accounting	2.00 P.M. to 5.00 P.M. Corporate Laws and Compliance
Friday, 11th December, 2015	Laws, Ethics and Governance	Advanced Financial Management
Saturday, 12th December, 2015	Direct Taxation	Business Strategy & Strategic Cost Management
Sunday, 13th December, 2015	Cost Accounting & Financial Management	Tax Management & Practice
Monday, 14th December, 2015	Operation Management and Information Systems	Strategic Performance Management
Tuesday, 15th December, 2015	Cost & Management Accountancy	Corporate Financial Reporting
Wednesday, 16th December, 2015	Indirect Taxation	Cost & Management Audit
Thursday, 17th December, 2015	Company Accounts and Audit	Financial Analysis & Business Valuation

EXAMINATION FEES

Group (s)	Final Examination	Intermediate Examination
One Group (Inland Centres) (Overseas Centres)	₹1400/- US \$ 100	₹1200/- US \$ 90
Two Groups (Inland Centres) (Overseas Centres)	₹2800/- US \$ 100	₹2400/- US \$ 90

- Application Forms for Intermediate and Final Examination has to be filled up through online only and fees will be accepted through online mode only (Including Payfee Module of IDBI Bank). No Offline form and DD payment will be accepted for domestic candidate.
- STUDENTS OPTING FOR OVERSEAS CENTRES HAVE TO APPLY OFFLINE AND SEND DD ALONGWITH THE FORM.
- (a) Students can login to the website www.icmai.in and apply online through payment gateway by using Credit/Debit card.
(b) Students can also pay their requisite fee through payfee module of IDBI Bank.
- Last date for applying for December 2015 Examination is 25th October, 2015.
- Finance Act 2014, Involving Assessment Year 2015-2016 will be applicable for P7 - Direct Taxation, P11- Indirect Taxation and P16 - Tax Management & Practice for the purpose of December 2015 term of Examination. Refer clarification issued for December 2015, BoS(Academics)/08/02/2015-16 dated 25/8/2015.
- The provisions of the Companies Act 2013 and The Companies (Cost Records & Audit) Rules 2014 - are applicable in December 2015 Examinations. Supplementary reading materials for both Intermediate & Final is uploaded in the website of the Institute. Refer clarification issued for December 2015, BoS(Academics)/08/02/2015-16 dated 25/8/2015.
If a student obtains at least 60 per cent marks in any paper, the benefit of carry forward/exemption is allowed for the immediately successive three terms of Examination only.
- Examination Centres: Adipur-Kachchi(Gujarat), Agartala, Ahmedabad, Akurdi, Allahabad, Asansol, Aurangabad, Bangalore, Baroda, Berhampur(Ganjam), Bhillai, Bhubaneswar, Bhopal, Bikaner, Bongaich, Calicut, Chandigarh, Chennai, Coimbatore, Cutback, Dehradun, Delhi, Dhanbad, Durgapur, Ernakulam, Erode, Faridabad, Ghaziabad, Guwahati, Haridwar-Hazratnagar, Howrah, Hyderabad, Indore, Jaipur, Jabalpur, Jalandhar, Jammu, Jamshepur, Jodhpur, Kalyan, Kannur, Kanpur, Kohat, Kolkata, Kota, Kottayam, Lucknow, Ludhiana, Madurai, Mangalore, Mumbai, Mysore, Nagpur, Nashik, Nasik, Nellore, Neyveli, Noida, Paraji (Goa), Patiala, Patna, Pondicherry, Port Blair, Pune, Rajahmundry, Ranchi, Rourkela, Salem, Sambalpur, Shillong, Siliguri, Solapur, Srirangar, Surat, Thrissur, Trichrapalli, Trunelveli, Tiruvandrum, Udaipur, Vapi, Vashi, Vellore, Vijayawada, Vinchyanagar, Walailak and Overseas Centres at Bahrain, Dubai and Muscat.
- A candidate who is fulfilling all conditions specified for appearing in examination will only be allowed to appear for examination.
- Probable date of publication of result : Inter & Final – 21st February 2016.

* For any examination related query, please contact exam.helpdesk@icmai.in

A. Das
Director (Examination)

THE INSTITUTE OF COST ACCOUNTANTS OF INDIA
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MANAGEMENT ACCOUNTANCY

EXAMINATION TIME TABLE & PROGRAMME – DECEMBER 2015

Thursday	Thursday	Friday	Friday	Saturday
10th December, 2015	10th December, 2015	11th December, 2015	11th December, 2015	12th December, 2015
09.30 A.M to 12.30 P.M	02.00 P.M to 05.00 P.M	09.30 A.M to 12.30 P.M	02.00 P.M to 05.00 P.M	09.30 A.M to 12.30 P.M
Management Accountancy	Advanced Management Techniques	Industrial Relations & Personnel Management	Marketing Organisation & Methods	Economic Planning & Development

EXAMINATION FEE

Per Group	Rs 2500/-
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- (a) Application Form for Management Accountancy Examination is available from Directorate of Advanced Studies, The Institute of Cost Accountants of India, Hyderabad Centre of Excellence, Plot No. 35, Financial District, Nanakramguda Village, Serilingampally Mandal, Gachibowli, Ranga Reddy District, Hyderabad on payment of Rs 50/- per form.

(b) Students can also download the Examination Form from ICAI Website at www.icmai.in.
- Last date for receipt of Examination Application Form without late fees is 10th October, 2015 and with late fees of Rs 300/- is 20th October, 2015.
- Examination fees to be paid through Demand Draft of requisite amount drawn in favour of "The Institute of Cost Accountants of India" and payable at Kolkata.
- Students may submit their Examination Application Form along with the requisite amount at the Directorate of Advanced Studies, The Institute of Cost Accountants of India, Hyderabad Centre of Excellence, Plot No. 35, Financial District, Nanakramguda Village, Serilingampally Mandal, Gachibowli, Ranga Reddy District, Hyderabad. Any query in this regard may be addressed to Directorate of Advanced Studies, Plot No. 35, Financial District, Nanakramguda Village, Serilingampally Mandal, Gachibowli, Ranga Reddy District, Hyderabad.
- Examination Centres: Adipur-Kachchh(Gujarat), Agartala, Ahmedabad, Akurdi, Allahabad, Asansol, Aurangabad, Bangalore, Baroda, Berhampur(Ganjam), Bhilai, Bhillwara, Bhopal, Bewar City(Rajasthan), Bhubaneswar, Bilaspur, Bokaro, Calicut, Chandigarh, Chennai, Coimbatore, Cuttack, Dehradun, Delhi, Dhanbad, Durgapur, Ernakulam, Erode, Faridabad, Ghaziabad, Guwahati, Hardwar, Hazaribagh, Howrah, Hyderabad, Indore, Jaipur, Jabbalpur, Jalandhar, Jammu, Jamshedpur, Jodhpur, Kalyan, Kannur, Kolhapur, Kolkata, Kota, Kottayam, Lucknow, Ludhiana, Madurai, Mangalore, Mumbai, Mysore, Nagpur, Naihati, Nasik, Nellore, Neyveli, Noida, Panaji (Goa), Patiala, Patna, Pondicherry, Port Blair, Pune, Rajahmundry, Ranchi, Rourkela, Salem, Sambalpur, Shillong, Siliguri, Solapur, Srinagar, Surat, Thrissur, Tiruchirappalli, Tirunelveli, Trivandrum, Udaipur, Vapi, Vashi, Vellore, Vijayawada, Vindhyanager, Waltair and Overseas Centres at Bahrain, Dubai and Muscat.
- A candidate who is fulfilling all the conditions only will be allowed to appear for the examination.

CMA Rajendra Bose

Jt. Director (Advanced Studies)

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