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2013 - 14



TIFAC

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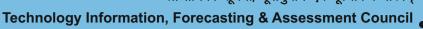
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EXECUTIVE SUMMARY

TIFAC, an autonomous society set up under the Department of Science & Technology in 1988, is mandated to assess the state-of-the-art technology and set directions for future technological development in India in socio-economic sectors important to the country. During the last decade and a half, leveraging its networking strength, TIFAC was able to scale new heights in the technology landscape of the country, that included bringing out the Technology Vision 2020 documents and implementation many useful technology missions and technology development support programs and projects.

The year was directed to consolidate some of the steps taken last couple of years, towards realign TIFAC activities with its core mandate. Many steps were taken to strengthen different aspects of technology areas such as assessment, foresight and information.

A broad based inclusive and consultative approach, rooted in the aspirations of people of India and blended with speculations of the game-changing or disruptive technologies is being followed for the **Technology Vision 2035** exercise. First draft of the main Technology Vision 2035 document is underway with the final one slated for a release by the early part of the year 2015, subsequent to a further consultation process. A detailed technology scenario building exercise was carried out by the in-house scientists, as a precursor to prepare the technology roadmaps in 12 identified sectors under the Vision 2035. A Technology Foresight Training was conducted for the Indian Oil Corporation Limited (IOCL) scientists, covering different aspects of foresight and case studies including tools & methodology, horizon scanning, Delphi method and scenario building exercises.

Under the **Technology Foresight for Automotive Research** (**TFAR**), a detailed project report (DPR) the formulating the R&D plan of the National Mission for Electric Mobility (NMEM) was taken up. The DPR *inter alia* will include a comprehensive global scan of technology status and trends and dwell up on assessing current technology development status and resource capabilities in the country, opportunities and constraints. The DPR will identify technology priorities, thereby designing a R&D Ecosystem, including requirement of Centres of Excellence, develop consortia structures in thrust areas and involve potential partners.

The year also witnessed many new programs being initiated. The MSME Exports Program was launched in order address the issue of access to state-of-the art technologies and infusing appropriate technologies for boosting exports. The MSME Internship Program is designed to tap the latent students' potential in different technology domains and address the technology deficit encountered by the MSME sector. Continued engagement of students and faculty of technical institutions with the MSME industries are ensured under this. The initiative is expected to nurture an innovation ecosystem which could benefit both the MSMEs as well as the technical institutions.

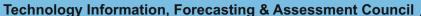
In the pursuit of nurturing innovations, the activities under SIDBI Revolving Fund for Technology Innovation Programme (SRIJAN), the Patent Facilitating Centre (PFC) and the Technology Refinement and Marketing Programme (TREMAP) were continued with more zeal and vigour. Activities under the MSME Cluster Programme, the program on Bio-Products & Bio-processes and other programs were continued.

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As part of the **International Cooperation**, three cluster projects covering climate related aspects of sustainable livelihood, hydrology and water resources development were commissioned during the year under the **TIFAC-IISA Program**. The study on 'Indian Perspectives on Global Energy Scenarios Till 2050' was published. A workshop was conducted on the joint study with Indian Institute of Forest Management (IIFM) for making the TIFAC-IIFM-IISA study on Analyzing Forest Carbon Accounts for Sustainable Policy Options with Special Reference to Livelihood, comprehensive. An India-Canada Round Table on Intelligent Transportation System was organized involving stakeholders from industry, R&D/ academic institutions and government ministries/ departments from both the countries. The workshop was aimed at long term collaboration between two countries in the field of Intelligent Transport System in terms of sharing of information, researcher mobility, joint development programs and studies.

With an array of activities including new programs, capacity building initiatives, technology foresight documents and other studies and the Technology Vision 2035 exercise, TIFAC is poised to contribute to a broad technology perspective for the country. This expertise of carrying out studies and leveraging an ever expanding network of experts, TIFAC is looking forward to evolve as a nodal national centre in technology foresight in the context of planned national development and providing technology information towards defining requirements and prioritization of areas for research and technology development.

Prof Prabhat RanjanExecutive Director





1. Technology Foresight Activities

Technology Foresight is extremely important for any nation to grow, be it developed or developing nation. Role of technology in the economic progress of a nation is always being increasingly recognized and appreciated, efforts are being made globally to develop technology strength and make the industries competitive for well rounded development of the society. The developing countries specially have shown a marked rise in the pace of economic growth in recent years with focus on Science, Technology & Innovations. Technology Foresight is a tool for 'wiring up' the national innovation system and anticipating future market demand and designing development strategies for decision making. It helps to improve quality of life of citizens and contributes to wealth creation.

TIFAC, since its inception has been involved in technology foresight exercise in terms of bringing out technology vision documents, techno market survey reports, sector specific technology foresight reports etc. In this section, details of several technology foresight initiatives being carried out by TIFAC, including Technology Vision 2035, Technology Foresight for Automotive Research (TFAR), etc., are presented.

1.1. Technology Vision 2035

TIFAC carried out a long term technology foresight exercise, the first of its kind in India, named **Technology Vision 2020** (TV 2020) in mid1990's. The explicit aim of TV 2020 was to provide directions for national initiatives in science and technology to make India a developed country by 2020.

A decade and half down the line, it was felt important to repeat such an exercise to take a stock of the progress of different sectors and taking into account new possibilities and challenges that would take the country to the year 2035 and hence **Technology Vision 2035** (TV 2035) exercise was initiated. TV 2035 exercise is aimed at capturing possible technology-society horizons through a comprehensive involvement of different stakeholders.

TV 2035 exercise has taken into account the regional aspirations, priorities & disparities of Indians. A mixed bottom up-top down approach has been adopted to enable a 360° view that captures both the imagination of the youth and expertise of the experienced. The vision, it is hoped, will inspire and prompt the stake-holders across the spectrum to chart technological trajectories through subjective interpretations.

Towards evolving this document, a mammoth consultative exercise has been taken up to envision the technologies that would be required to take on the scenario in 2035. During the initial phases, various regional and brainstorming meetings were organized throughout the country to identify the select sectors of S&T and accordingly 12 areas viz. Education, Medical Sciences and Healthcare, Food and Agriculture, Water, Energy, Environment, Habitat, Transportation, Infrastructure, Manufacturing, Materials, Information and Communication Technology were

identified. The whole exercise is steered by a National Apex Committee chaired by Dr. Anil Kakodkar, Chairman TIFAC.

For each of the sector, several methodologies like Delphi exercise, wider consultation, idea collection, interaction with students, circulation of structured questionnaire/ surveys, horizon scanning and cross impact analysis were adopted in parallel.

In addition, a detailed Scenario building exercise was carried out in-house for each sector involving all TIFAC scientists. The steps involved are as follows:

- Identifying the trends and key drivers as per STEEP category, namely Social, Technological, Economic, Environmental and Political, which have significant influence on the sectors
- Ranking the drivers based on their uncertainty and impact in consultation with TIFAC scientists
- Selection of critical uncertainty drivers and fleshing out scenarios
- Analysing the inference and implications of scenarios

During the period, a Technology Foresight Training Module was administered to the scientists of R&D Centre, Indian Oil Corporation Limited (IOCL) on 02 and 03 August, 2013 at IIPM, Gurgaon in which various sessions were organised on different Foresight studies- tools & methodology, Horizon Scanning, Delphi method, Scenario Building exercise etc. Participants were also given hands-on experience by involving them in Delphi & Scenario Building exercise.

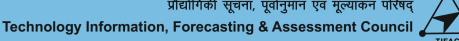
The outcome of the TV 2035 exercise would be the main Technology Vision 2035 document encompassing all sectors backed up by 12 sectoral technology road maps. The first draft of the main document is almost ready which will be further discussed within a larger group of people and finalised.

Broadly, the document begins with retrospection of different sectors covered in the TV 2020 and it has been graded using the metaphor of four horse gaits namely-galloping, cantering, trotting and walking. The document captures the aspiration of young Indians and the role of technology in their fulfilment. This is covered through 12 prerogatives both impacting quality of life and delivery of services. Technological development in various stages including those in mind have been identified which would be needed for this purpose.

Preparation of technology roadmap of each sector is supervised by sectoral advisory committee. During 2013-14, seven meetings of National Apex Committee, twelve meetings of Advisory Committees of various sectors, fourteen sector specific-review meetings & four workshops were conducted. In addition, two review meetings for finalizing the main TV 2035 document were also organized.

The technology road maps are in different stages of preparation. For instance, first draft of Food and Agriculture, Water, Energy, Medical, Habitat, Manufacturing, Transport and ICT sectors are almost ready. For sectors like Materials and Infrastructure, first draft is nearing completion. For Education and Environment sectors, writing of different chapters is in progress. Broadly, the technology

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roadmaps would provide the current scenario, future projections, future technology trends, R&D directives, anticipated challenges and policy imperatives pertaining to each sector.

This technology vision is a modest attempt to galvanise our youth to decide their future path for ensuring a brighter life, energise policy makers to evolve a conducive technology policy; researchers to streamline their future research, industry to look for an innovation agenda, catalyse our technology workers and institutions, and motivate all the stakeholders to participate in the quest for technology leadership.

1.2. Technology Foresight for Automotive Research (TFAR)

1.2.1. Preparation of Detailed Project Report and R&D Scheme for National Mission for Electric Mobility (NMEM)

The National Mission for Electric Mobility (NMEM) was launched by the Hon. Prime Minister of India on January 9, 2013. TIFAC has been associated with the formulation of the NMEM since the time the idea of this Mission came up. Subsequently, the Department of Heavy Industry requested TIFAC to prepare a Detailed Project Report for the R&D Scheme under NMEM. The DPR will include:

- 1. A comprehensive global scan of technology status and trends
- 2. A detailed assessment of the present status of technology development in India and the capability existing in the country, opportunities and constraints
- 3. Identification of technology priorities and phase wise implementation plan of the technology development efforts with respect to Technology Readiness Levels (TRL) for short, medium and long term developments.
- 4. Availability of test facility, R&D equipment along with assessment of additional facilities required for the implementation plan worked out.
- 5. Design of the R&D Ecosystem, including requirement of Centres of Excellences and technology development consortia in each of the thrust areas, potential partners, structure,
- 6. Detailed R&D target setting
- 7. Development of project concepts/ call for proposals.

Major thrust areas covered in the DPR are Vehicle Systems Integration including Lightweight Design and Materials, Rechargeable Energy Storage Systems, Electric Drive and Power Electronics.

As a part of this activity the following brainstorming sessions were held during the year:

Rechargeable Energy Storage: The first brainstorming session on Rechargeable Energy Storage was held on 22-23rd August 2013 at Central Electrochemical Research Institute (CECRI), Karaikudi. Second brainstorming session was held at The Centre for Materials for Electronic Technologies (CMET), Pune on 21st April 2014.

Systems Integration and Lightweighting: A brainstorming session on Systems Integration and Lightweighting was held on 6th and 7th March 2014. About 40 experts form vehicle manufacturers, component manufacturers, R&D and academic institutions participated in this discussion.

1.2.2. Technology Foresight Studies on Electric Mobility

It would be unfair to bracket electric vehicles (EVs) as just another type of vehicles as the EVs development is challenging with possibilities of many paradigm shifts. It makes transportation a part of a different energy ecosystems, and can have a different kind of impact on the ecosystem, requirement of materials and resources, and even the value chain for the industry. There are many possible technology, strategy and policy choices. Vehicles that use electric drives can be of different types e.g. hybrid electric vehicle, plug-in hybrid electric vehicle, range-extended electric vehicle etc. Further each of these categories has various options in terms of architecture and configurations as well as choices of technologies for subsystems. Hence a detailed study on all these aspects will be a valuable input to policy makers, researchers, industry as well as other stakeholders. In view of this,

TIFAC has initiated studies on electric mobility covering the following aspects:

- 1. Impacts of Electric Mobility: impact of various charging technologies, strategy and policies on the distribution grid in terms of shift in peak demand and health of grid assets; utilization of renewable energy; comparative lifecycle impacts of various types of electric drive vehicles (xEVs), and impacts of xEVs in terms of materials and other resource requirements.
- **2. Rechargeable Energy Storage Systems**: On board rechargeable energy storage system is the most critical technology for electric vehicles, as it can play the most significant role in overcoming the limitations of electric vehicles in terms of cost, range and performance.
- 3. Lightweight Materials and Manufacturing: Energy consumption by a vehicle has a strong correlation with its mass. There are various options for replacing the conventional materials in vehicle body as well as various components with lighter materials. Employments of such materials are associated with new design, materials processing and manufacturing technologies. For conventional vehicles, often there is a trade-off between the benefits of lightweighting and additional costs due to such technologies, But for electric vehicles secondary benefit of lightweighting in terms of reducing battery pack size is significant. This study will assess the technology trends and impacts of several of lightweighting technologies on different categories of electric vehicles.

Studies have also been taken up on the following areas:

- 1. Integrated Electric Wheelchair
- 2. Electronic Vehicle Identification technology

1.3 Other Studies & Reports

1.3.1. Completed Studies

TIFAC had published and launched three reports on Indian Perspectives on Global Energy Scenarios Till 2050, Indian Chemical Industry – Technology Imperatives & Business Opportunities for Basic Chemicals and speciality Chemicals on TIFAC foundation day on February 10, 2014.

Technology foresight studies on Biodegradable Polymers & Algal Biomass have been carried out under the topic titled 'Biomass Utilization'.

1.3.2 Ongoing Studies

1.3.2.1 Relationship between GDP growth and technology causes in different districts of select Indian states – Andhra Pradesh

The purpose of the study is to ascertain the coupling between S&T inputs and growth in Gross District Domestic Product (GDDP) of a region. A few select districts of Andhra Pradesh/ Telangana were taken up as case studies.

Various S&T indicators in agriculture, industry and services sector have been identified as S&T inputs. Indices of S&T indicators have been developed and analyzed with respect to the data of GDDP growth in the districts of Adilabad and Guntur. Data analysis for the districts of Visakhapatnam, East Godavari and Srikakulam is underway.

1.3.2.2 Specialized study on Technology Imperatives & Business Opportunities

Keeping in view the importance of Indian chemical sector, TIFAC commissioned a specialized study jointly with Indian Chemical Council (ICC), Mumbai on Indian Chemical Industry – Technology Imperatives & Business Opportunities. The study aims to identify & address the technology gaps in Indian chemical industry to catch up with the global trends for the three segments viz. basic chemicals, speciality chemicals & knowledge chemicals. The report on the speciality and basic chemicals were published and launched on TIFAC Day, February 2014.

1.3.2.3 Technology Foresight Studies in 'Security Technologies'

During this year, technology foresight studies have been initiated in security technologies. These studies are to include current and future threats, vulnerabilities, technology needs, required policy interventions etc. and to generate reports with recommendations. For this purpose, thematic areas of Information & Communication Security, Financial Sector Security, Infrastructure & Physical Security, Individual & Societal Security and Natural Resources/ Environment Security have been identified.



1.3.2.4 Technology Foresight Study on Solar Photovoltaic

A technology foresight study on Solar PV was commissioned with the objective to harness technologies for sustainable production of green energy through solar PV to position India as global leader in generation and utilization of solar energy. This document is expected to facilitate national level planning, prioritize value addition in supply chain, determine investment priority of various stakeholders and timeline for such investments, visualizing likely technologies for future and its market capture in short term, medium term and long term. The detailed scope of the study was finalized in consultation with various stakeholders. Subsequently, an approach paper was prepared and reviewed by an Apex Committee comprising of experts from academia, labs, industries and Govt. departments. The report is under preparation.

2. Nurturing Innovation

TIFAC has been supporting innovations at academic institutions, government R&D institutes, industry and also at individual level under its various innovation support programmes. Mainly this technical and financial support is provided in the form of assisting in assessing and filing patents and other IP applications, extending post patent support for technology refinement and marketing and further to upscale the technologies from pilot scale to industrial production scale under different programmes. These programmes are Patent Facilitating Centre (PFC), Technology Refinement and Marketing Programme (TREMAP) and TIFAC-SIDBI Revolving Fund for Technology Innovation Programme (SRIJAN). Each of these programmes have their own mandate and support system. TIFAC also endeavours to synergise the functioning and output of these programmes.

2.1. Patent Facilitating Centre (PFC)

PFC functions with four fold objectives of creating awareness and deeper understanding of Patents and IPR amongst scientific community in the country, supporting technically and financially in obtaining patents and other IP rights on their innovative and creative work, providing patent information as vital input to the process of R&D and also keep watch on the developments in the area of IPR and make it known to policy makers.

2.1.1 Patent/IP Facilitation: In line of its objective of extending technical and financial support in filing and obtaining patents and other IP Rights, PFC receives request from academic institutes and government R&D institutes for this support. These requests are routed through patent information centre (PICs) in the states and also are being received directly from applicants. PFC evaluates these requests by conducting detailed patent search and patentability assessment. PFC also explores the suitability of protecting the same under other form of IP rights such as registration industrial design, copyrights, plant variety protection etc. In addition to these requests, PFC scouts innovative work of school students, participating in the National Level Exhibition of Projects under DST's INSPIRE programme for patenting.

2.1.1.1 Facilitation to academic institutes and government R&D institutes: During this period, eighty seven (87) new requests were received. After evaluation of 39 old and new requests; eleven (11) cases were recommended for patent filing in India and were referred to attorneys from its panel to draft and file patent applications in India. PFC also received requests to file patent applications in other countries with respect to earlier patent filing in India. Eighteen (18) such cases were recommended for foreign filing and 1 for PCT filing as per following table, and these patent applications have been filed in respective countries.

SI.	Title	Applicant/	Countries where
No.		Inventor	national phase
			filing done
1.	Detection and removal of rain from	IIT Kharagpur/	1. USA
	videos using spatiotemporal properties	Prof Sudipta	2. South Korea
		Mukhopadhyay	3. EU
2.	Removal of fog from the images and	IIT Kharagpur/	1. USA
	video	Prof Sudipta	2. EU
		Mukhopadhyay	3. South Korea
3.	Method or Apparatus to detect the bad	IIT Kharagpur/	South Korea
	pixels in sensor array and to conceal the	Prof Sudipta	2. Israel
	error	Mukhopadhyay	3. Taiwan
4.	An Improved Ultrasound Imaging	IIT Kharagpur/	1. USA
	Method/Technique for Speckle	Prof Sudipta	2. South Korea
	Reduction/Suppression in an Improved	Mukhopadhyay	
	Ultra Sound Imaging System		
5.	Method or Apparatus to detect the	IIT Kharagpur/	1. USA
	microcalcifications in X-ray images using	Prof Sudipta	2. South Korea
	non-linear energy operator	Mukhopadhyay	
6.	Co-immobilization of enzymes on plastic	MD University,	1. USA
	container and brush for their application	Rohtak/	2. South Korea
	in washing	Prof. C S Pundir et al	3. ARIPO
			4. EU
			5. China

One PCT application was also filed as per given details:

SI. No.	Title	Applicant/Inventor
1.	Effect of garcinol a polyisoprenylated benzophenone from Garcinia Indica in delaying the progression of diabetic nephropathy	Delhi Institute of Pharmaceutical Sciences and Research (DIPSAR)/ Dr B P Srinivasan et al

2.1.1.2 Facilitation to school students participated in INSPIRE: In order to seed and experience the joy of innovation, every year two lakh school children in the agegroup of 10 to 15 years i.e., 6th to 10th standards are being identified for the INSPIRE Award by DST. Each INSPIRE Award envisions an investment of Rs.5,000/- per child. Generally in the range of one thousand (1000) students participate in National Level Exhibition of Project of INSPIRE Awardees. Each year PFC sent team of IP experts to INSPIRE exhibition held in New Delhi at Pragati Maidan to scout innovations for patenting. The team includes IP practitioner in other government department agencies, alumnae of women scientists trained by PFC on IPR under WOS-C scheme of DST and PFC officials. Details of cases handled and patent applications filed may be seen in Table below:

SI. No.	INSPIRE Exhibition Year	Total no of projects scouted/evaluated	Number of Patent applications filed during 2013- 14
1.	2011	509 (85 patent application with provisional specification were filed in 2012)	10 with complete specification
2.	2012	1100	33 with provisional specification
3.	2013	950	234 shortlisted for patentability assessment

Details of 10 patent application filed with complete specifications following filing of provisional specification in 2012 are as below:

S No.	Patent application no	Title	INSPIRE Awardee (student) name
4	2342/MUM/2012	Multipurpose fuel saving chulha	Bhangre Subhash Vithobha
2	3324/CHE/2012	Automatic fire extinguisher cum alarm	Ch Mahesh Babu
3	2326/MUM/2012	Sewage clearing device	Devarat Shashikant Kulkarni
4	2322/MUM/2012	Natural fridge	Piyush Agrawal
5	2340/MUM/2012	Petrol from orange peel and plastic	Krishna Kumar saxena
6	910/KOL/2012	Low cost cement type mixture	Prasenjit Dey
7	3334/CHE/2012	Stable construction to withstand earthquake	Chandra Prabha
8	3325/CHE/2012	Air purifier	G Sravani
9	3312/CHE/2012	Telerecording	K Naveen Reddy
10	2330/MUM/2012	Multipurpose crushing device	Falguni Chandu Patel

2.1.1.3. Patents granted: During this period, six (6) Indian patents and one European patent were granted on patent applications filed with facilitation of PFC-TIFAC, as reflected below.

SI. No.	Patent Number	Title	Applicants	Inventor/s
1.	257189	A syphonically operated flushing device	Chandigarh Housing Board, Chandigarh	Vijay Kumar
2.	257820	Electronic module for gamma ray spectroscopy system	Inter-University Accelerator Centre, New Delhi	S Venkatramanan
3.	257942	A biofuel additive for diesel engine	Indian Institute of Technology, Kharagpur	P Das, B B Gosh, R Sen, S Dey and HBD Prasada Rao
4.	258569	Fingerprint developing composition and method thereof	Department of Science & Technology, Government of India, New Delhi	Jasjeet Kaur and G S Sodhi
5.	258833	Method of preparing nanocrystalline MgO and ZnO products and using same for removing fluoride and arsenic from contaminated water	Department of Science & Technology, Government of India, New Delhi	Chandrappa Gujjarahalli and Nagappa Basappa
6.	259668	A process for vapour phase alkylation reaction	Department of Science & Technology, Government of India, New Delhi	G D Yadav, MS Krishnan and A A Pujari

European patent Granted in 2013-14

A European patent no 2222887 was also granted in October 2013 to Anna University, Chennai and University of Hyderabad, Hyderabad on "Non-stoichiometric Titanium nitride films" which was facilitated for filing by PFC-TIFAC in the year 2008. This patent relates to a process for the manufacture of transparent, large band gap, high refractive index and high temperature stable, non-stoichiometric titanium nitride thin film. Such films are used for optical and optoelectronic devices. These films are prepared by magnetron sputtering in a mixture of argon and nitrogen atmosphere. Thin layer on a substrate is selected from stainless steel, amorphous fused silica, magnesium oxide, lanthanum aluminate and sodium borosilicate glass. This layer of

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the substrate being carried out at temperature between ambient and 873 K, the deposition being controlled by varying the nitrogen pressure. These films are useful where one requires enhanced properties of colour reflectance, hardness and resistivity etc.

2.1.2 Workshops and trainings on IPR

PFC conducts workshops and training programmes on IPR in different part of the country in the form of IPR awareness programme as well as advance training on IPR. PFC could only organise following four programmes two workshops on IPR and two IPR congresses during this financial year towards this objective.

2.1.2.1 Workshop on IPR: First workshop was organised in association with Patent Information Centre (PIC) at Kolkata, West Bengal on the occasion of 15 years of establishment of PIC. PIC was initially set-up by PFC-TIFAC. The theme of the workshop was Creativity: The next generation. Programme was attended by 146 participants from different Research Institutions, Universities, Industry Houses, Attorney Firm, Scientists and Grass root innovators. It was organised on September 24, 2013.





Second workshop was organised by Department of Planning and Development, Government of Bihar at Patna on February 21, 2014. PFC TIFAC extended full technical support by arranging faculty for the workshop and also providing reading material.

2.1.2.2. Intellectual Property Congress: First IPR congress was organised in association with PIC, Kolkata inaugurated by Prof. (Dr.) Rabiranjan Chattopadhyay, Hon. Minister of Department of Science & Technology, Government of West Bengal. Programme was attended by 107 Scientists, Research Scholar, Assistant Professor of different Universities of the state. Technical Session covered General Overview on IPR followed by paper presentation in parallel session. 49 papers were received from different Universities, private Engg. College. These paper were divided in three groups. Viz. Engg, Tech, IP. Best papers were selected by the judge and announced in the valedictory session. Second was Children IPR congress on September 26, 2013, the programme was started with a lecture on Overview of IPR and programme outcome by Nodal Officer and Scientists of Patent Information Centre. 20 schools of Kolkata and Suburban area participated in this programme by way of presenting papers, models and posters.

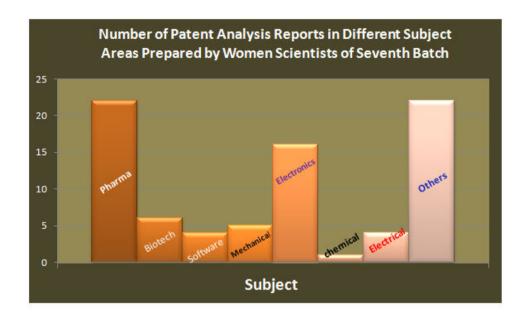
2.1.3 Women Scientist Scheme (WOS-C): Training in IPR related areas

The government is interested in retaining the scientific talent of Indian women seeking scientific pursuits and keen to encourage women to work from their homes, enabling them to draw a good balance between professional and domestic demands. To achieve this, the Department of Science & Technology has initiated a **Women Scientist Scholarship Scheme.** The WOS-C part of the scheme is being operated at TIFAC by DST. The scheme aims to train women towards self employment by providing training in the area of intellectual property rights (IPR) and their management for a period of one year who are having qualifications in science/engineering / medicine or allied areas. Under the scheme 405 women scientists have been joined this training in the seven batches, out of which 136 are registered patent agents. Most of the women trained under this scheme are pursuing their career in the area of IPR. They are gainfully employed in IPR law firms, KPOs, IP departments of govt agencies, pharma companies, MNCs. A few of them have set up their own IPR law firms, IPR consultancy firms and some are practicing as IPR free lancers.

This year training was for seventh batch of women scientists: The training for the 85 (out of total 95 initially admitted) candidates of 7th Batch of women scientists have been completed in the four centres at Delhi, Chennai, Pune and Kharagpur during January 21, 2013 to January 20, 2014. These trainees had undergone handson training with various agencies like IP departments of govt. bodies, patent attorney law firms, KPOs, PICs, IITs, R&D Institutes, Pharmaceutical companies, etc. Out of these 85 women 17 women have cleared the Patent Agent Examination held in May 2013 and are now registered Patent Agents with the Indian Patent Office. Cash prize of Rs 10,000/- was given to the women scientists for clearing the Patent Agent Exam during the tenure of the training.

During the on the job training, the women scientists were trained in conducting patent searches using patent databases, patent drafting, gaining familiarity with patent office nuances after filing of patent applications like filing responses to FERs, and other prosecution challenges as well. They were also familiarised with process of handling other IPRs. Women scientists were also trained on preparation of technology scan report using patent analysis in different technology areas.

A total of 82 technology scan cum patent analysis reports were prepared by these Women Scientist trainee during the course of one year training, subject wise break-up may be seen the graph. Topics of these reports were like patent analysis of 3D printing technology, 4G LTE technologies, wearable technologies, software, futuristic display, malaria diagnostic and treatment, pharmaceuticals etc.



As a midterm refresher course between one year on job training a workshop on "Patent Drafting" was conducted for the women trainees Pune Centre in April 2013, Chennai Centre September 2013, Delhi Centre October 2013 and Khargpur Centre in January 2014. A workshop on "Trademarks, Copyright, Industrial Designs and Geographical Indications" was held in November for Chennai centre and in January 2014 for the Delhi, Pune and Kharagpur centres.



2.2 Technology Refinement and Marketing Programme (TREMAP)

India has immense innovation latency with a vast pool of potent individual inventors. However, tapping such potential has been a major challenge. Though there are various schemes for supporting innovations, need had been felt to extend support in the form of assessing the commercial potential of the innovation, provide requisite market linkage and fine tune it accordingly.



In view of above, TIFAC initiated **Technology Refinement and Marketing Programme (TREMAP)**. Under this program, support is extended to innovations by way of hand-holding towards protecting IP, identifying potential market, assessment of business potential including preparing business plan, and facilitating technology transfer / commercialization, etc.

TREMAP is being implemented through a network of Technology Commercialization Facilitators (TCFs) and establishing an enabling ecosystem for the same.

During the period, seven (7) Technology Commercialization Facilitators (TCFs) were supported across the country as below:

- i. MCIIE, Indian Institute of Technology, Varanasi
- ii. M.S. Ramaiah School of Advanced Studies, Bangalore
- iii. Vellore Institute of Technology TBI, Vellore
- iv. Technopark-TBI, Trivandrum
- v. College of Technology & Engg., Udaipur
- vi. Kalinga Institute of Industrial Technology (KIIT) TBI, Bhubaneswar
- vii. Venture Centre, NCL Innovation Park, Pune

2.2.1 Technologies Transferred: Three technologies have been commercialized (technologies transfer / collaboration agreement signed) through TREMAP during the year 2013-14. This brings the no. of technologies commercialized under the programme to nine (9). A brief about the technologies commercialized this year is as given below:

Improved Winnowing Fan

The technology is about a winnowing fan for creating strong forced draft of air for separating grains from the mixture of threshed straw. The advantages of this winnowing fan is that it involves relatively less friction as compared to similar and existing fans in market as also it is modular and portable and as such can be carried easily to the field and assembled there.





A Device for Four Wheeler Driving Mechanism through hand for Persons with Disability

The innovation is a device which can be fitted into four wheeler car for driving by a person with disability. The device is especially designed for those persons whose both legs are affected from paralysis or polio but both hands are functional. In this, the driver uses one hand to control the clutch, brake and accelerator whereas second hand is used for operating and controlling of steering. The device is mounted near the right side of steering on right handed driving vehicle.



SURAKSHA: LPG and Gas Detection Device with SMS Alert Mobile Communication System



The innovation is chemical sensor (SnO₂) based electronic device for LPG gas detection enabled with SMS alert communication. This device detects LPG air mixture level in the air and in case it reaches above a threshold value, automatically sends an SMS to already stored mobile numbers (upto 5) in the data base. This is quite helpful in avoiding accidents and hazards due to leakage of LPG gases in day to day life.



2.2.2 National Award for Commercializable Patents

The Awards have been instituted by TIFAC under the TREMAP programme to recognize the innovative potential of Indian nationals and to encourage the innovator community for making their innovations more practical and relevant to the industrial and societal needs. The objective of the award is to help commercialization of patented technologies. Award carries a sum of Rs. 5.00 lakhs and a certificate. In addition, selected innovations may be provided a commercialization incentive of Rs. 5.00 lakhs on commercialization of the awarded patents. Selected innovations are given opportunity to use TIFAC-TCF network for commercialization / transfer / licensing of patented technologies. The Awards for 2013-14 has been conferred on 8 patents as given below:

SI. No.	Patent Title	Name of Patent Holder
1.	A nanosized electrochemical dispersion for rechargeable alkaline zinc batteries	Sh. Thothathri Sampath Kumar
2.	A muffler and particulate separator for Internal Combustion Engine Exhaust	Sh. Rajandiep. S. Tiwanna / Sh. Adess Singh
3.	A spray formulation for detecting latent Fingerprints on sticky side of adhesive tape	Sh. Gurvinder Singh Sodhi
4.	A Continuous Move Centre Pivot Mobile Irrigator	Sh. Kelkar Padmakar Waman
5.	Topical composition for inhibiting the growth of mammalian Hair	Smt. Mrinmayee Bhushan Kondhalkar
6.	A portable hand operated jacquard Handloom for weaving	Shri. Moharram Ali Alias Hasham Turabi
7.	Remote Controlled System for Power tiller	Sh. Prajwal V. Kumar
8.	Thromobochek Test Kit	Dr. Dilip Shrinivas Velaskar

The highlights of the awarded innovations are as below:

A Nanosized Electrochemical Dispersion for Rechargeable Alkaline Zinc Batteries: Rechargeable alkaline Zinc / MnO batteries have about four times the capacity of Lead acid batteries at lower costs, but these batteries suffer from the problems of zinc dissolving in the electrolyte and precipitating elsewhere. This nanosized electrochemical dispersion suppresses zinc solubility and thus enhances life of the battery. These batteries have wide application for EV, Solar, UPS, and all other applications.

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A Muffler and Particulate Separator for Internal Combustion Engine Exhaust: An effective in line particulate emission separator and entrapment technology for the I.C. Engines. The present innovation separates unburnt and burnt particulates from engine exhaust gases while reducing the work load on the engine by minimizing the resistance to the flow of exhaust.

A Spray Formulation for Detecting Latent Fingerprint on Sticky Side of Adhesive Tape: A novel, spray formulation for detecting latent fingerprints on a broad spectrum of crime scene evidence, in general and on adhesive tapes, in particular, which detects fingerprints on an array of items, absorbent (for example, paper, cardboard), non-absorbent (for example, glass, metallic); white & multicolored; and smooth & rough.

A Continuous Move Centre Pivot Mobile Irrigator: Solar Powered Constant Move Pivot Irrigator is a tool for modern irrigation system which consumes less water & uses renewable source of electricity for better productivity. Machine saves water by 40-60%, with 160-180% yield, covering 250 slope fields, avoids erosion & calcinations of soil. The irrigator is suitable for all normal crops and pulse.

Topical Composition for Inhibiting the Growth of Mammalian Hair: The product is an easy-to-use-in-privacy; safe product that works effectively for body and facial hair and is a cost effective treatment to manage and reduce unwanted hair.

A Portable Hand Operated Jacquard Handloom for Weaving: The innovation is about a portable Jacquard handloom for weaving various fabrics/textile materials including silk material such as Banaras and the like. In this portable Jacquard handloom, pit area operation is removed by setting jacquard on a frame and fixing on to a hook to perform multiple operations and thus reducing human effort significantly.

Remote Controlled Power Tiller: This remote controlled tiller make the work of farming easier, comfortable and safer. It eliminates the chances of injury to the operator and saves farmer's effort and time. It can be used for either wet puddling or dry tilling for the cultivation of the crops like rice, wheat and all different types of cash crops.

Thromobochek Test Kit: Innovation is a unique, simple, accurate and affordable blood test to detect hyperactive platelets packed into a test kit, for use in routine clinical pathology laboratory. This test helps to identify population prone to heart attack and stroke. The Thrombochek test easily and accurately gives the platelet activity percentage by testing the patients' blood sample on a haematology auto analyser.

2.3. TIFAC-SIDBI Revolving Fund for Technology Innovation Programme (SRIJAN)

The TIFAC-SIDBI Technology Innovation Programme (SRIJAN) was launched in November, 2010 aiming at identification, assessment of technology innovations and to facilitate scaling up by industries particularly MSMEs. Technical assessment of innovations for scaling is carried out and recommended by TIFAC while SIDBI carries out the financial appraisal and manages a revolving fund to support innovation based projects.

Broad areas of innovations include environment friendly green technologies, technologies with higher productivity, better energy efficiency, cost reduction, automation etc. developed indigenously. Four technology innovations innovated and licensed by leading national labs like CSIR, ICAR and IIT are being commercialized. Seven innovations from start-up companies are under commercialization.

During the year, the programme implemented a total of eight projects worth a total financial layout of Rs.860 lakhs. The total financial support from SRIJAN, TIFAC was to the tune of Rs. 643 lakhs. The project-wise breakup of the funding is reflected in the following table:

SI. No.	Title	Implementing Industry	Total Project outlay (in lakhs)	Support by SRINJAN, TIFAC
New P	rojects			
1	Low cost high efficiency sensors for application in defence and automotive sectors	M/s. Aeron Systems Pvt. Ltd. Pune, Maharashtra	Rs.97.50	Rs.70.00
2	Energy Efficient Cooling & Heating System (HVAC & R Systems)	A technology developed and licensed by IIT- Bombay and scaled up by M/s. Mechworld Eco Pvt. Ltd. Nasik, Maharashtra	Rs.95.00	Rs.75.00
3	Eco-friendly, energy efficient cotton ginning technology with self- grooving rubber roller for double roller cotton ginning machine	A technology developed jointly by CIRCOT (ICAR), Mumbai and M/s. Millennium Rubber Technologies Pvt. Ltd., Thrissur, Kerala	Rs.116.00	Rs.92.00
4	Label Stock on both sides of release liner by	M/s. Hasslefree Technologies, Greater Noida	Rs.147.60	Rs.100.00

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5	Improvised idlers for conveyer belt systems in steel, cement, mining industries with higher productivity	A technology developed jointly by TATA Steel, Jamshedpur and M/s. Jyoti Cero Rubber, Jamshedpur and scaled up by M/s. Jyoti Cero Rubber	Rs.129.70	Rs.95.00		
Ongoin	g Projects	1		'		
6	Pouchable Grade composite battery separator for flooded lead acid batteries	M/s Raman Fibre Science Pvt. Ltd., Bangalore	Rs.123.73	Rs.95.00		
7	Biodegradable Soluble Cutting / Coolant Oil, technology developed and licensed by CSIR- IIP, Dehradun and scaled up	M/s. Ecocare Biolube India Private Ltd, Coimbatore, Tamil Nadu	Rs.84.60	Rs.64.00		
Project	Project Completed					
8	Identification tags for Solar PV module tracking based on RFID technology by Total Project Cost : Support under SRIJAN : lakhs	M/s IAITO InfoTech Pvt. Ltd., a company incubated at IIT-Kanpur	Rs.66.10 lakhs	Rs.52.00		

2.3.1 New Projects:

Five new projects towards scaling of technology innovations initiated during the year. The brief of the projects are as follows:

(1) Low cost high efficiency sensors for application in defence and automotive sectors by M/s. Aeron Systems Pvt. Ltd. Pune, Maharashtra

The innovation is indigenous design of sensors which comprises of two unique features namely the software algorithm and structural design of orthogonal frame making the product robust even when used in low cost MEMS based sensors. The frame design would give required strength to structure of the navigation sensor. It would help in reducing misalignment errors. Unique algorithm enhances use of Kalman filter in dynamic conditions filtering the unwanted noise by the MEMS sensors. Low cost MEMS based sensors would be used to deliver equivalent performance of high cost sensor using the algorithm making it compact, cheaper and maintenance free. The sensors would find market for defence, automotive and



industrial applications. The Inertial Navigation System with Dual frequency GPS has been approved by R&D (E), DRDO, Pune and ARDE, Pune.





Inertial Navigation system with GPS for UAV application & other defense applications

Digital tilt switch for Industrial

(2) Energy Efficient Cooling & Heating System (HVAC & R Systems), a technology developed and licensed by IIT-Bombay and scaled up by M/s. Mechworld Eco Pvt. Ltd. Nasik, Maharashtra

The innovation is air to water and water to water heat pumps for simultaneous cooling and hot water generation and de-superheater for waste heat recovery from air conditioning systems. The special feature of the developed heat pump includes innovative tube-tube heat exchanger developed by IIT-Bombay for application in HVAC systems. The new design of heat exchanger would achieve better energy efficiency at lower cost in various industrial applications. product has been successfully demonstrated and installed at Vipasana Meditation Centre, McDonalds, Infosys Training Centre.



(3) Eco-friendly, energy efficient cotton ginning technology with self-grooving rubber roller for double roller cotton ginning machine, a technology developed jointly by CIRCOT (ICAR), Mumbai and M/s. Millennium Rubber Technologies Pvt. Ltd., Thrissur, Kerala and scaled up by M/s. Millennium Rubber Technologies Pvt. Ltd.

Cotton ginning is the first process of separation of fibres from cottonseed that acts as a bridge between cotton farmers and textile industry. In conventional ginning machines, the rollers are clad with semi-finished chrome leather washers containing 3-4% chromium which is emitted into the environment during constant dust-producing grinding action. Chromium emitted and adsorbed into the lint causes toxic

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effects such as skin irritation, allergic symptoms, lung cancer, brain damage, perforation of nasal septum in the ginning workers. The innovation of self-grooving rubber roller in double roller cotton ginning machine would eliminate any chances of emission and contamination of chromium during the ginning process providing clean and healthy environment to ginning workers. The rubber roller reduces energy consumption compared to leather roller gins resulting in efficient ginning without any adverse effect on the fibre and seed quality.



(4) Label Stock on both sides of release liner by M/s. Hasslefree Technologies, Greater Noida

Conventionally the label stocks are developed on one side of release liner which is discarded after use and cannot be recycled due to presence of silicone. Industries find it difficult for dumping the waste release liners. The technology innovation is the development of printed label stock on both side of release liner. This would directly reduce generation of liner waste by 50%. It would also reduce consumption of raw material, energy and cost of transportation resulting in cost reduction of label stock by at least 20%. The technology would reduce environmental pollution load.





(5) Improvised idlers for conveyer belt systems in steel, cement, mining industries with higher productivity, technology developed jointly by TATA Steel, Jamshedpur and M/s. Jyoti Cero Rubber, Jamshedpur and scaled up by M/s. Jyoti Cero Rubber

The innovation is development of a process for coating conveyor rollers with special type of polymer comprising a unique blend of high alumina ceramic powder and polymer. The coating provides the hybrid rollers high abrasion resistance properties and very low coefficient of friction. Because of these improved properties, the rollers average life is enhanced resulting in reduced downtime of conveyer belt systems. The low coefficient of friction will reduce power consumption to the extent of approx. 12-15% compared to conventional ones. The cost of hybrid idlers systems is about 15-20% higher than other branded idler systems available in the market. However, hybrid idler system would enhance the life of idlers to about 8-10 times in comparison to conventional idlers for its application in niche areas of conveyer belt systems like abrasion and corrosion.



Hybrid Idlers for conveyer systems

Winners of India small giants awards 2013-14

2.3.2 Ongoing Projects:

Implementation of two projects initiated in financial years 2011-2012 and 2012-13 were reviewed and monitored by TIFAC periodically during the year towards successful completion. Brief of the ongoing projects are as follows:

(1) Pouchable Grade composite battery separator for flooded lead acid batteries by M/s Raman Fibre Science Pvt. Ltd., Bangalore

The innovation is development of improved version of composite battery separator for flooded lead acid batteries. The product would run completely on automatic high speed plate enveloping machine. A variety of fibres, fillers and binders are used in manufacturing process. The novel battery separators with ribs & discrete dot configuration would have improved properties like high resistance to electrochemical oxidation, absence of leachants, very low electrical resistance and exceptionally high resistance to temperature resulting in improved battery shelf life. The indigenously developed separators will be a substitute for imported separators at reduced cost. The product has been tested and certified by leading battery manufacturers.





(2) **Biodegradable Soluble Cutting** / **Coolant Oil,** technology developed and licensed by CSIR-IIP, Dehradun and scaled up by M/s. Ecocare Biolube India Private Ltd, Coimbatore, Tamil Nadu

Conventional metal cutting oil derived from non-degradable mineral oil is discarded after several rounds of recycling resulting in environmental pollution. The innovative biodegradable product of soluble cutting/coolant oil is derived from nonedible vegetable oil through suitable processing under controlled conditions. The product would be a clean and ecofriendly alternative to conventional cutting oil. One of the biggest advantages would be its excellent lubricity to extend tool life. Systematic field trials have been carried out in actual metal cutting industries.



2.3.3 Project Completed

One technology commercialization project was completed during the period. The brief of the project is as follows:

(1) Identification tags for Solar PV module tracking based on RFID technology by M/s IAITO InfoTech Pvt. Ltd., a company incubated at IIT-Kanpur

The innovation is the development of RFID based tags, necessary hardware and algorithm indigenously for traceability and identification of Solar PV Modules as per MNRE guidelines under Jawaharlal Nehru National Solar Mission (JNNSM). Presently, Solar PV cell and module manufacturers use the barcode system for identification of solar PV cells, which have certain limitations. RFID identification

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method relies on storing and retrieving remote data on/from devices called as Transponders or RFID Tags and better alternative to bar codes. Ultra High Frequency (UHF) technology based RFID has been used which has many advantages over the High Frequency (HF) technology. Multiple tags reading through RFID will be faster with good reading range compared to other technologies. Such tags would provide twelve mandatory information sets as listed in JNNSM guidelines.





3. Technology Initiatives with Industry

TIFAC follows a two-pronged need based approach in technology initiatives involving industry. On one hand, for the large industrial sectors, tailor made training programmes on technology foresight exercise and related areas are conducted. While, for the MSME sector, where the intervention design has to be a compressive one with much handholding, a broad-spectrum of activities is carried out. This includes activities ranging from the technology need assessment to providing testing and R&D facilities to technology upsizing demonstrations are carried out. Such technology intervention plans for industries are followed up with imparting of requisite capacity building measures.

The progress under different ongoing technology development program is given below:

3.1 MSME Cluster Program

The MSMEs in India contribute around 8.0% to the Gross Domestic Product (GDP), 45% to the manufacturing output by producing over six thousand (6,000) products, and around 40% share in direct exports. They also employ more than ten (10) crore people in around 4.67 crore MSME Units. However, MSME sector in India is so small in its resource base that it is hardly able to invest into R&D and updating of technologies and machineries used for manufacturing. Low capacities for investment of a large number of individual units in the MSME sector make it difficult for them to acquire technologies through internal resources. The need for Indian MSME sector to gain global competitiveness is imminent both for the enterprises for the financial viability and the nation for its socio economic balance. One of the challenges with bearing on the global competitiveness of the Indian MSME sector is the lack of suitable systems for technology upgradation, acquiring requisite skills and design support.

Towards fostering this, MSME Program of TIFAC has been developing industry – academia interaction platform where the MSME cluster industries and the nearby Technical Institutions interact towards utilizing the technical capabilities and expertise of the academia for providing R&D and technical support to the cluster industries.

TIFAC has so far supported 21 MSME clusters across the country by establishing and leveraging industry-academia / R&D institutes' cooperation for their growth. The approach starts with a comprehensive assessment of technology needs with specific focus on technology status (product & process) in the cluster, identification of gaps (in terms of technology, competition and market requirements), and to design a technology intervention plan for the cluster. The interventions include technology mapping, focused training / capacity building initiatives in the clusters and other handholding support. The programme has been successful in making technology interventions in many clusters including Howrah foundry cluster and Baruipur surgical instruments cluster. Besides, capacity building support has also been provided to a number of other clusters.

Progress during the period is as below:

3.1.1 Studies ongoing:

- Production/Manufacturing Processes as well as Environmental Aspects of Readymade Garments Cluster in Tirupur, Tamil Nadu - PSG College of Technology, Coimbatore, Tamil Nadu
- ii. Plastics Cluster in Delhi Central Institute of Plastic Engineering & Technology (CIPET), Panipat, Haryana
- iii. Auto Component Cluster in Jamshedpur- National Institute of Technology (NIT), Jamshedpur

3.1.2 Capacity Building initiatives:

Rubber Cluster Agartala – NIT Agartala: A workshop focusing Product specific – technology know how and product manufacturing, usage and marketability, etc, & Entrepreneurship development aspects was held on 17th - 18th July, 2013.

Readymade Garment Cluster, Tirupur – NIFT TEA Tirupur: Two (2) trainings conducted as under with the National Institute of Fashion Technology (NIFT), TEA, Tirupur:

- Methodologies and Best Practices for Green Clothing from 9-10 May, 2013
- Fashion Forecasting and Tech Pack A software for fashion designing from 29 July – 5 August, 2013

Hand Made Paper Sanganer -Rajasthan- A workshop on "Geographic Indications was organized at the Kumarappa National Handmade Paper Institute (KNHPI).

Malda Food Processing Cluster – Two workshops organized focusing on Post Harvest management and Quality Management for the food processing cluster Malda.

3.1.3 Undertaking new Clusters in the program:

Clusters Undertaken: Four (4) new MSME Clusters have been taken up under the MSME Program as below:

- 1. Readymade Garment Cluster, Patna City
- 2. Rice Mill Cluster, Lakhisarai
- 3. Rice Mill Machinery Cluster, Sitalpur, Raxual
- 4. Litchi Cluster, Muzaffarpur
- Preliminary visits have been conducted in all the above cluster towards identifying technical issues hindering their competence and competitiveness.
- In view of the geographical significance and awareness workshop in Muzaffarpur, Bihar highlighting importance of Geographical Indicator has been planned.
- In the Rice Mill Cluster of Lakhisarai and Rice Mill Machinery Cluster of Raxual, visits of experts are also being chalked out.

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3.1.4 Further Clusters under consideration

An all India advertisement was released in October, 2013, towards inviting Expression of Interest (EOI) from MSME Cluster Industry Associations for consideration of clusters under TIFAC'S MSME Program. As a result following clusters are under consideration:

- 1. Home Textiles Manufacturing Cluster, Karur
- 2. Printers Cluster, Mysore
- 3. Foundry and Engg. Cluster, Phagwara
- 4. General Engineering Cluster, Coimbatore

Efforts are underway through preliminary visits to these clusters towards initial assessment of the technology status and identify technical problems and challenges.

3.2 MSME Exports Program

In 2013, Government of India had constituted an Inter Ministerial Group (IMG) for addressing compressively the challenges of export oriented MSME Sectors including falling exports. IMG had identified several major issues concerning the MSMEs and one of them was low Technology Level and Lack of access to Modern Technology. As a follow up to the report, a concept note was prepared for discussions with Industry Associations and Export Councils of various Industries. The concept note revealed inadequate resource base of MSME sector in India for either investing in inhouse R&D, innovation or even acquiring state of art technologies. TIFAC has been entrusted with the task of coordinating, nucleating and facilitating follow up actions towards infusion of appropriate new technologies for boosting of exports.

Towards identifying few sectors for taking up and chalking out a strategy, a meeting was held in the office of the Additional Secretary, Department of Commerce in October, 2013 wherein, representatives of Ministry of MSME and Ministry of Finance, besides officials of TIFAC were also present. It was decided to initially prioritize two or three sectors for intervention. The basis of selection of sectors was: potential for higher technology inputs, higher value realization, future potential and sector performance.

Accordingly, sectors like Electronic System Design and Manufacturing (ESDM), Essential Oils (Flavours and Fragrances), Technical Textiles and Gaur Gum were initially identified. It was decided that, to begin with, TIFAC would assess the sectors, possibly in the form of quick short studies.

Subsequently, a meeting was conducted on 30th January, 2014, at TIFAC for chalking out and finalizing the specific roles and responsibilities of stakeholder Ministries, Organizations/Agencies. Progress is reflected below.

3.2.1 Guar Gum: Towards preliminary assessment of the status of Guar production and to assess the technical issues and challenges of the industries with a view to boost Guar Gum exports, visit was organized to Jodhpur - country's major production region of Guar Gum and major Guar Gum industrial processing hub - on 12th-13th March, 2014. As there is a number of experts, Organizations, R&D Institutes

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and other agencies involved with the sector so, it was decided to conduct a Brainstorming Meeting at Jodhpur to bring all stakeholders on one platform towards identifying the needs and requirements of industries and to formulate an R&D roadmap. Visits are also planned to Hisar and Siwani region of Haryana.

3.2.2 Technical Textiles: Efforts have been initiated to get an understanding of the technical issues hindering further growth of technical textile industries in our country. Technical textiles are broadly categorized in twelve (12) different areas i.e. Agro textiles, Protective textiles, Medical textiles, Geo textiles, Industrial textiles, Sports textiles, Home textiles, Packaging textiles, Clothing textiles, Transport textiles, Construction textiles and Oekotech.

Ministry of Textile has set up Centre of Excellence (COE) in seven (7) such areas. TIFAC is interacting with these COEs, primarily to understand their technical requirements in view of the emerging market needs, towards chalking out TIFAC's role.

3.3 MSME Internship Scheme

Our Academia/technical institutes of India have vast pool of human resource and knowledge base in the form of students and faculty. These students are not sufficiently oriented towards reaching out to the MSME Sector. The enormous student and faculty resource of engineering and higher technical institutes could be of immense benefit to the cluster industries towards addressing their technical problems besides facilitating adoption of relevant technologies. Greater involvement of students and faculty with industries may also help in developing an innovation culture into the MSMEs by way of access to human resource to transform their innovative ideas into reality.

Such an approach will also facilitate greater opportunities for students for hands on practical experience of working in the industries and developing closer linkages with industries which may prove beneficial for them in terms of honing their skills and knowledge and make it more industry relevant.

Thus, a new scheme under the TIFAC MSME Program for Providing Technical Support to the MSMEs by Leveraging the Capabilities of Students and Faculty of Engineering & Technical Institutions" called the MSME Internship Scheme has been conceptualized towards encouraging and enhancing continued involvement of students and faculty of technical institutions with industries and providing technical support to the otherwise technologically deficient MSMEs. More importantly, this process is expected to nurture an innovation ecosystem which could benefit both the MSMEs as well as the technical institutions. Specific objectives of the scheme are as follows:

- Creation of a platform for establishing interaction between academia and MSME industries on a mutually win-win basis.
- Establishing a platform for the MSME cluster industries to access R&D and technical support leveraging the knowledge base of faculty and knowledgeable human resource in the form of students of technical institutions.



Providing hands-on engagement and practical experience to the students and faculty on existing technical challenges in the industry and nurturing an innovation ecosystem that benefits both the industry as well as the technical institution.

The draft scheme document has been placed on TIFAC website for wider consultation and feedback before finalization.

3.4. Bioprocess & Bioproducts Programme

The programme aims to address critical technology needs for biotransformation & enzymatic processes towards development of active pharmaceutical ingredients, nutraceuticals, phyto-chemicals, value-added bio-products, bio-energy & bio-fuels, setting up national facilities etc. Commissioning of specialized studies in the aforesaid areas are also undertaken under the programme. Eleven projects were launched and specialized technology assessment/foresight studies were commissioned under the programme in the aforesaid areas. The status of ongoing and completed projects during the period is given hereunder:

3.4.1 Ongoing Projects:

Development of novel process in isolating standardized extract of Aloe Vera and its application for diabetes control was launched in partnership with Centre for Bioseparation Technology (CBST), VIT University, Vellore and M/s. Laila Pharmaceuticals Pvt. Ltd., Vijayawada, aimed to develop and standardize a novel process for aloe vera extract to control diabetes in human. Aloe vera extract was thoroughly evaluated in the animal models before human trials under defined regulatory and ethical conditions. Extracts were prepared in lab and pilot scale from three different sources of Aloe Vera with an average yield of about 0.78%. Phytochemical analysis of the important parameters of extract was carried out. Acute toxicity studies with the extract as per OECD guidelines on animals were also carried out. A clinical trial of the developed product is being carried out by the company.

Technology foresight study: Considering the importance of the area a detailed technology foresight study on 'Biomass Utilization' was proposed focused on biofuels and other allied areas and byproducts (biopolymers/materials etc.) for their value addition potential and improving the economics of biofuels. Accordingly, the first brainstorming meeting for 'biomass utilization - biofuels & biochemicals' was convened on November 06, 2013. Around 20 experts from R & D institute, academia & industry, etc. across the country participated. Further, an initial level of secondary research (patent search & available literature survey) on the algal biomass, biopolymers were carried out. Technical papers were also published on the aforesaid topics. Primary survey on the selected topics would now be initiated.

3.4.2 Projects Completed:

Process development for production of L-arginine by fermentation was launched in collaboration with Jawaharlal Nehru Technological University (JNTU) & M/s Celestial Labs Ltd., Hyderabad, aimed to develop a process for L-arginine from the selected microorganisms. The strain had been improved by conventional mutagenesis and recombinant approaches at JNTU. L-arginine, an amino acid considered as the most potent nutraceutical, has numerous functions in the body. It is needed to create urea, a waste product that is necessary for toxic ammonia to be removed from the body. Arginine is considered a semi-essential amino acid because even though the body normally makes enough of it, supplementation is sometimes needed. The scale up studies at 150 litres were carried out by Celestial Labs Ltd., Hyderabad at BIT-Mesra. Media composition and process parameters were optimized based on the data obtained by JNTU for arginine production. Three batches of trial runs on L-arginine with average yield of 16 gms/litres were reported. The project was completed successfully with achieving its objectives in July 2013.

Development of biotechnology based process for waste reduction in potato processing was launched in collaboration with IIT-Kharagpur and Basukinath Food Processor Ltd., Kharagpur, aimed to develop low cost alternative biological process for peeling of potatoes, standardization of process for easy removal of peel, comparison of the process efficiency with the commercial and indigenously produced enzymes and evaluation of the treated potato. Suitable enzyme (amylase with titre value about 40000 IU/ml) was identified and the desired quantity of enzymes was produced which were suitable for potato peel removal. Estimation of % weight loss (2.53%) in peeled potato which met the quality requirement of the industry for making chips, texture analysis of enzyme treated, water soaked potato & industrially processed potato was carried out. Recycling studies of enzyme confirmed that no toxic organisms were present. Potato waste was used for bio-manure production by using seven different organisms and all showed NPK enrichment. The project was declared completed successfully after meeting its stipulated objectives on January 16, 2014.

Projects/Activities in Pipeline:

3.4.3 Centre for Biofuels (Phase-II): The project on 'Centre for Biofuels'- Phase II with CSIR-NIIST, Trivandrum, recommended for commissioning by the Apex Committee, aimed at developing the laboratory scale processes into workable technologies at the pilot plant. Several experiments earlier carried out on pretreatment and hydrolysis in the laboratory scale to be validated in the pilot plant under more realistic conditions. Thus, it was essential to establish viable technology steps for ligno-cellulosic ethanol at the pilot plant with a processing capacity of 80 kg. of biomass per day. Phase-II of the project would consolidate the efforts directed in phase-I for detailed laboratory investigations. Two biomass types namely *sugarcane tops* and *cotton stalks* were selected for conducting pilot plant trials. The project objectives also include evaluation of energy requirements and cost for various process steps and to identify the areas/ parameters contributing to low efficiencies calling for their optimization.

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3.5. Collaborative Automotive R&D (CAR)

The project titled "Competence development in Electromagnetic Manufacturing for manufacture of automotive components" was supported under the CAR Programme with AMPRI Bhopal, IIT Bombay, IIT Delhi, IPR Gandhinagar and CMTI Bangalore as the consortia partners. TIFAC also involved BARC for providing technical leadership to this project. BARC also pursued indigenous development of the EMF machine in coherence with the consortium project plan using its internal funds. BARC developed a fully functional 40 kJ machine. Technical Knowhow of the EMF machine was provided to ECIL.

During 2013-14, ECIL completed fabrication of two commercial EMF machines and tested them in house. Further, TIFAC was in the process of nucleating a proposal for the next phase of the project, in which a number of EMF machines developed indigenously will be installed at public funded institutions for conducting research towards application of this technology for component development across various sectors

4. International Linkages

4.1. India-IIASA Programme

India-IIASA Programme focuses on undertaking collaborative research projects among scientists from Indian S&T organizations/academic institutions with IIASA researchers in the areas on mutual interests and organizing training workshops.

Under the programme, a workshop on TIFAC-IIFM-IIASA study on Analyzing Forest Carbon Accounts for Sustainable Policy Options with Special Reference to Livelihood Issues was organized jointly by Indian Institute of Forest Management (IIFM), Bhopal and TIFAC in May 2013 in New Delhi.

In addition, TIFAC has commissioned a cluster project with three partners viz. Institute of Rural Management Anand (IRMA), Gujarat for the study on 'Climate Change Adaptation Approaches for Sustainable Livelihoods, National institute of Hydrology (NIH), Roorkee for the study on Integrating hydrology, climate change and IWRM with Livelihood Issues: Development of Methodology and a DSS for Water-Scarce Bundelkhand Region in India and Centre for Water Resources Development and Management (CWRDM), Kozhikode for the study on Evaluation of Soil Nutrient Budgets at Field, Farm and Regional Level in Humid Tropics of Kerala and Development of a Model For Management of Soil Health.

A study on 'Indian Perspectives on Global Energy Scenarios Till 2050' launched in partnership with Integrated Research and Action for Development (IRADe) earlier, New Delhi, was published during the year. One more study on Development and Application of GAINS-City Model for Indian Cities was launched in August 2013 in partnership with CSIR-National Environmental Engineering Research Institute (NEERI), Mumbai Ronal Laboratory.

Capacity Building: An Indian researcher had participated in the Young Scientist Summer Program (YSSP) during June-August 2013 at IIASA, Austria. In addition, One researcher underwent training under the Southern African Young Scientists Summer Program (SA-YSSP), conducted at the University of the Free State in Bloemfontein, South Africa during December 2013 to February 2014.

4.2. Indo-UK TF Initiative with the UK Foresight Group

As a follow up to the 'India – U.K. Bilateral Technology Foresight Workshop' held in Delhi last year, Dr. Sandy Thomas, Head of the UK Foresight Group visited TIFAC in February, 2014 to discuss about future collaborative efforts in the area of Technology Foresight.

4.3 Government Foresight Organizations Network (GFN)

TIFAC has started participating in GFN activity by attending its 4th meet in Brussels in November, 2013 and is planning to host its 2015 meet. GFN activity was initiated in 2009 by UK Foresight Programme by bringing together government foresight experts from several countries. This platform would allow TIFAC to share and exchange experiences with global organizations in areas including Horizon Scanning and Foresight activities and identify global emerging issues by working in a collaborative mode, as well.

4.4 India-Canada Round Table Discussion on Intelligent Transportation System

As a follow up of the agreement between Ministry of Road Transport and Highways and Transport Canada, the Department of Science of Technology requested TIFAC to organize India-Canada Round Table Discussion on Intelligent Transportation System. This Roundtable was held with support from International Division of Department of Science and Technology on February 4, 2014 at TIFAC. About 40 representatives from industry, R&D/ academic institutions and government ministries/ departments participated in the deliberations. This included 8 member delegates from Canada lead by Dr. Scott Streiner, Assistant Deputy Minister, Transport, Canada.

The workshop was aimed at long term collaboration between two countries in the field of Intelligent Transport System in terms of sharing of information, researcher mobility, joint development programmes and studies.

5. Human Resources Development

5.1 TIFAC Internship Scheme

For strengthening technology foresight activities of TIFAC, linkages with academia and sensitizing the students about future technology priorities, TIFAC started the internship scheme in August 2013. During the year 22 students went through internship under various TIFAC scientists. Specific technology domains covered by the interns are listed below:

SI. No.	Topic
1.	Network Security
2.	Impacts of Electric Vehicles
3.	Integrated Electric Wheelchair
4.	Rechargeable Energy Storage Systems
5.	Foresight Study on Solar Photovoltaic
6.	Patent in Biotechnology
7	Education Technologies
8.	Bioreactors
9.	Network Security
10.	Microvial Fuel Cells
11.	Biomass Utilization
12.	Biomass Utilisation
13.	Technology Foresight Study on Solar Photovoltaic
14.	Technology Commercialization and Innovation Management
15.	Technology Commercialization and Innovation Management
16.	Conversion of Cast Iron Foundries to Ductile Iron Foundries
17.	Integrated Electric Wheelchair
18.	Electric Vehicle(Light weight design and materials)
19.	Rechargeable Energy Storage Systems
	Study on the potential impact of biofortification in India with focus on Iron Biofortification
21.	Medical Science and Healthcare
22.	3D printer

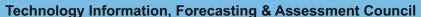
5.2 Participation in National Conferences

- Dr. Gautam Goswami, Head, TV 2035 and Ms. Jancy.A, Scientist-E attended the National Conference & Annual Session of CII was held during 3-4 April, 2013.
- Shri. Manish Kumar, Scientist-B attended the National Validation workshop on "Promoting Business Models for increasing penetration & scaling up of solar energy in India" jointly organized by UNIDO and MNRE, New Delhi at the Hotel Le-Meridien, New Delhi on 9th May 2013
- Ms. Swati Sharma, Scientist-B participated in the 4th International Conference on "Transforming Healthcare with IT 2013", organized by 'The Cyberabad Digital Health Resolution" held on 6-7th September, 2013 at Hyderabad.
- Shri. Manish Kumar, Scientist-B attended the International Conference on "India-Japan Energy Forum – Expanding technology corporation in energy efficiency, renewable and smart community" jointly organized by TERI, New Delhi & NEDO, Japan at Hotel Le Meridien from September 10-11, 2013.
- Dr. Gautam Goswami, Head, TV 2035 attended the 18th Annual Convention and National Symposium of Clay Mineral Society of India was held during September 27-28, 2013
- 6. Dr. Gautam Goswami, Head, TV 2035 attended the Global Summit of MSME on October 9, 2013 at EROS Hotel, Delhi
- 7. Dr. T. Chakradhar, Scientist-C and Shri. Manish Kumar, Scientist-B participated in the International Conference on Promoting Water Use Efficiency Across Urban Sector to Address Climate Change" jointly organized by USAID, India, CII & CII Triveni Water Institute at Hotel Hayat, New Delhi October 9, 2013.
- Dr. T. Chakradhar, Scientist-C participated in the Cloud Summit Developing Cloud Strategy on October 29, 2013, organized by CII, New Delhi
- Dr. T. Chakradhar, Scientist-C and Ms. Swati Sharma, Scientist-B participated in the National Conference on "Bioactive Compounds and Functional Foods in Health and Disease Management (BFHDM-2013)" held during November 15-16, 2013 at National Institute of Food Technology Entrepreneurship and Management (NIFTEM), Sonepat.

- 10. Ms. Mukti Prasad, Scientist'C', participated in a one day National Seminar on "India Battery Conclave" held on November 15, 2013 at New Delhi, organized by Auto Tech Review.
- 11.Ms. Mukti Prasad, Scientist'C', participated in a Broadband summit 2013 titled "Financial inclusion and m-commerce" held on November 25, 2013 at New Delhi, organized by Confederation of Indian Industry (CII) in collaboration with Department of Telecommunications, Ministry of Communications & IT.
- 12. Shri P.R. Basak, Scientist-E participated in National Conference on "India's Industrialization: How to Overcome the Strategies?" organized by Institute for Studies in Industrial Development (ISID), New Delhi on December 19, 2013.
- 13.Ms. Mukti Prasad, Scientist'C', participated in a Indo-German Science and Technology Centre (IGSTC) workshop on "Strategies and Concepts for Advanced Manufacturing for Big Data" organized by Indian National Academy of Engineering (INAE), India and National Academy of Science & Engineering, Germany during January 23-24, 2014 at India International Centre, New Delhi.
- 14. Shri P.R. Basak, Scientist-E participated in "Bihar Innovation Forum II', organized by JEEVIKA and Bihar State Innovation Council in Patna during January 30-31, 2014
- 15. Ms. Mukti Prasad Scientist C and Dr. T. Chakradhar, Scientist C participated in a National conference on M2M, India 2014, held during February 5-6, 2014 at JNU, New Delhi
- 16. Shri Suresh Babu Muttana, Scientist C attended a workshop on 'Automatic Transmissions' organized by SAEINDIA held during March 28-30, at Chennai

5.3 Participation in International Conferences, Trainings Programmes and Seminars

- Prof. Prabhat Ranjan, Executive Director, TIFAC, along with Sangeeta Baksi, Scientist E, participated in the two Governing Council meets of IISA, both held in the year at Vienna, Austria, the first one during June 2-7, 2013 and the second one during November 11-4, 2013
- 2. Dr Aruna, IPR Scientist participated in two weeks training programme under the prestigious Khorana Program Technological Transfer Course 2013 at University of Wisconsin Madison (US) from July 2 to August 3, 2013. This program was funded by the Department of Biotechnology, Govt. of India, and was conducted by the University of Wisconsin-Madison (UW) in partnership with the Indo-U.S. Science and Technology Forum (IUSSTF)





5.4 Participation in National Trainings Programmes

- Sh. Suresh Kumar K, Scientist E, attended Results Framework Management Software (RFMS) for Responsibility Centres (RCs), organised by Performance Management Division, Government of India, in Vigyan Bhavan, New Delhi on June 21, 2013
- 2. Dr. Debabrata Majumder, Scientist E, attended Ethics and Values, at Lal Bhahdur Shastri National Academy of Administration (LBSNAA), Mussoorie conducted during June 24- 28, 2013
- 3. Dr. T. Chakradhar, Scientist C, attended a Seminar on Performance Appraisal Certification Scheme (PACS) of BMTPC held on August 23, 2013 at New Delhi.
- 4. Sh. Sanjay Singh, Scientist G participated in the 77th Annual Session of Indian Ceramic Society held from December 19 to 20, 2013 at Tatanagar
- Ms. Nirmala Kaushik Participated Workshop on the 'Sexual harassment of women at workplace' (Prevention, Prohibition and Redressal) Act 2013 on March 14, 2014, conduct by Institute of Socio Economic Research & Action (ISERA) at Hotel Bharat Continental, New Delhi

5.5 Publications

- 1. Arghya Sardar, Suresh Babu Muttana 'Ultra-capacitors for Electric Vehicles: Future Perspectives' Auto Tech Review (Springer India), Volume 2, Issue 4, April, 2013.
- Sangeeta Baksi, Leena Modi, Subhash Chandra Lakkad, Soumitra Biswas and Jayrah Shah, Technology Triumph for Indian Industry', Modern Plastics & Polymers, Mumbai, April 2013
- 3. Arghya Sardar, Suresh Babu Muttana, 'Importance of Drive-by-Wire Technology for providing green, accessible transmission'. Auto Tech Review (Springer India), Volume 2, Issue 6, April, 2013
- Arghya Sardar, Suresh Babu Muttana 'Evolution of Transmission for EVs, HEVs: Potential for Magnetic Transmission' Auto Tech Review (Springer India), Volume 2, Issue 5, May 2013
- Sangeeta Baksi and Soumira Biswas, Composites Pipes in Oil & Gas Sector-Indian Scenario, FRP Today, Chennai, May 2013
- Suresh Babu Muttana, Arghya Sardar, 'Future Prospects of Carbon Fibre for Automotive Applications'. Auto Tech Review (Springer India), Volume 2, Issue 7, June, 2013

- 7. Neeraj Saxena & Manish Kumar "Learning to live with lesser", BIO-YOU, Vol 1, Issue 1, Aug 2013.
- 8. Suresh Kumar K, jointly edited and co-authored two chapters along with K Maredia, C Rakhmatov, S Mysore 'Technology Transfer and Commercialization: Experiences in India and USA', Michigan State University, USA, 2013
- K. Munshi, S. Biswas, Sangeeta Baksi, Ramachandran K, Design with Composites with special reference to applications in Indian Railways, the 2nd Annual International Composites CIS Conference, Sevastopol, Ukraine, September 26-28, 2013.
- 10. Sangeeta Baksi and Soumira Biswas, Composites in Chemical Industry An Insight, proceedings of the 29th. National Convention of Chemical Engineers (NCCE-2013) and National Seminar on 'New Composites: The Materials for Chemical and Allied Industries' organized by the Institution of Engineers (India), Udaipur, October 4-5, 2013
- 11. Soumira Biswas, Nirmala Kaushik, Sangeeta Baksi and Y S Rajan, Technology Commercialization as Driver for Economic & Social Development – Indian Experience, the VIII Annual Conference of the Forum for Global Knowledge Sharing on 'Emerging Technologies and Development', IIT Bombay, October 25-27, 2013.
- 12.N Kaushik & S Biswas, 'Indian Biomass Resources An Assessment from the Grassroots', Yojana, Volume 57, December 2013
- 13. Suresh Babu Muttana, Arghya Sardar, 'Lightweighting of Battery Electric Cars: An Impact Analysis Using Indian Driving Cycle' SAE Technical Paper No: 2013-01- 2831, doi: 10.4271/2013-01-2831. 8Th SAEINDIA International Mobility Conference & Commercial Vehicle Engineering Congress held during 4-7, December, 2013 at Chennai.
- 14.J Singh, N Kaushik, S Biswas, Biodegrdable Polymers Technology & Business Opportunities, Popular Plastics & Packaging, Vol.LIX, No.3, March 2014
- 15.A Agrawal, N Kaushik, S Biswas, Algal Biomass –A Wonder Feedstock for Biofuels, Chemical Business, March, 2014
- 16. Swati S, Information Based Medicine: An Approach Towards Individualized Healthcare; pharmatutor 2013 (may be cited at www.pharmatutor.org).
- 17. Swati Sharma, et al. Stem Cells Niche- A Complex Molecular Milieu; International Journal of Pharmaceutical and Biological Science Archive 1 (3) p. 6-8, 2013

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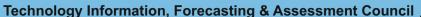


5.6 Invited Lectures

- Sangeeta Baksi presented a paper on Composites for Oil & Gas Sector-Indian Scenario in the International Conference & Exhibition on Reinforced Plastics (ICERP 2013), organized by FRP Institute in Mumbai, April 04-06, 2013
- 2. Dr. Gautam Goswami delivered a lecture on "Amelioratiion of Submerged Soil under Biodrainage Vegetation" on May 21, .2013, in the training programme organized by Directorate of Water Management, ICAR, Bhubaneswar
- 3. Prof. Prabhat Ranjan, Executive Director, delivered a lecture on "Impact of Brain-Computer Interface Technology" at Pan IIT Meet, Gujarat Chapter, Ahmedabad on May 5, 2013
- Prof. Prabhat Ranjan delivered a lecture on "Embedded Systems and Sensor Network for Nation and Society" during the Silver Jubilee Celebration of CDAC. Mohali, on May 10, 2013
- Prof. Prabhat Ranjan delivered a lecture on "Combining ancient knowledge with modern science to solve real problems" at the Central University of Bihar
 Research, Development and Innovation meet, Patna, on May 12, 2013
- Prof. Prabhat Ranjan delivered a lecture on "Touch and Brainwave Sensor based Assistive Technology for Severely Disabled" at Media Lab Asia, Delhi, on May 24, 2013
- Shri Yashawant Dev Panwar, Scientist-E delivered a lecture on "Determining novelty and nonobviousness by carrying out prior art search" in a workshop organised by DRDO at ITM, Mussoorie organised on June 18, 2013
- 8. Prof. Prabhat Ranjan delivered a lecture on "Role of Food, Body and Mind in learning process" at in at two-day workshop on Holistic Approach to learning, held in Patna, on June 30, 3013
- 9. Prof. Prabhat Ranjan delivered a lecture on "Role of MSME in innovation" at FICCI Global R&D summit, Delhi, on July 26, 2013
- 10. Sangeeta Baksi made presentation on Development of Filament Wound Pipes for Oil & Gas Sector in the IIChE (NRC) lecture series, organized by Indian Institute for Chemical Engineers, Delhi Chapter, July 27, 2013
- 11. Shri. Manish Kumar, Scientist-B delivered a lecture on "An Introduction to Scenario Planning" during training workshop on 'Technology Foresight' for Indian Oil Corporation Ltd (IOCL) officers held on 2-3rd August 2013
- 12. Dr. Neeraj.Saxena, Scientist-E delivered lectures on Delphi (the Forecasting technique) and conducted a hand-on experience session, during the

- Technology Foresight Training for Indian Oil Corporation Limited (IOCL) during 2nd 3rd August, 2013
- 13. Dr. T. Chakradhar, Scientist-C delivered a lecture on "Introduction to Technology Foresight" in the Technology Foresight Training for Indian Oil Corporation Limited (IOCL) during 2nd – 3rd August, 2013
- 14. Dr. Gautam Goswami, Head, TV 2035, Dr. Neeraj Saxena, Scientist-E, Ms. Jancy.A, Scientist-E, Dr. T. Chakradhar, Scientist-C, Ms. Mukti Prasad, Scientist 'C, Shri. Manish Kumar, Scientist-B and Ms. Swati Sharma, Scientist-B conducted the hands-on training on Scenario Building Exercise during the "Technology Foresight Training Module" for employees of R&D Centre, at Indian Oil Corporation Limited (IOCL) held during 2-3rd August, 2013 at IIPM, Gurgaon
- 15. A presentation was made on the topic 'Lightweighting of Passenger Cars: A Comparative Lifecycle Analysis of Energy Consumption and CO2 Emissions, at a Seminar on 'Light-weighting of Automobiles through Aluminium' held on 7th August at New Delhi
- 16. Shri Yashawant Dev Panwar, Scientist-E delivered a lecture on "Patent Specification Drafting and other documents, Interpretation" in 3rd refresher course on update on IPR for SC/ST faculty members organised by PIC, at Gujarat Council on Science and Technology, Gandhinagar on August 21-23, 2013
- 17. Prof. Prabhat Ranjan delivered a lecture on "MSME related activities at TIFAC" at CII-MSME Linkages 2013, held in Ahmedabad, on Aug 30, 2013
- 18. Shri Yashawant Dev Panwar, Scientist-E delivered a lecture on "Intellectual Property Rights and some case studies" in workshop on IPR organised at Government Degree College, Lansdowne, Pauri, UK by PIC at Uttrakhand State Council for Science & Technology (UCOST) August 31, 2013
- 19. Prof. Prabhat Ranjan delivered a lecture on "Real life problems and innovation linkage" and "Role of TIFAC in promoting Innovation in India" at the National Seminar on "Unleashing Innovation", State Innovation Council Workshop, held in Patna, on September 20, 2013
- 20. Shri PR Basak, Scientist-E presented on the topic "Scaling of Technology Innovation – TIFAC Experience" in the National Seminar on "Unleashing Innovation" organized by Bihar State Innovation Council at Patna during September 20-21, 2013
- 21. Prof. Prabhat Ranjan delivered a lecture as chief guest on "Innovations for Society" at "Workshop on IPR" to Celebrate 15 years of PIC,, Kolkata, on September 24, 2013

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- 22. Prof. Prabhat Ranjan delivered a lecture on "Role of Nutrition in Leaning Process" at AICTE Seminar on "Present Scenario and Future prospects of Herbal Drugs in Pharmaceutical Formulation and Development", in Indore, on October 19, 2013
- 23. Shri Yashawant Dev Panwar, Scientist-E delivered a lecture on "Patent Searches" in the DRDO scientist training programme titled "Patent, TOT, Documentation, Regulatory Clauses & Treatise" organized by DIPAS, DRDO, New Delhi on October 22, 2013
- 24. Shri PR Basak, Scientist-E delivered a lecture on "Scaling of Technology Innovation and Transfer of Technology" in the DRDO scientist training programme titled "Patent, TOT, Documentation, Regulatory Clauses & Treatise" organized by DIPAS, DRDO, New Delhi on October 22, 2013
- 25. Ms N Kaushik presented a paper titled 'Technology Commercialization as Driver for Economic & Social Development Indian Experience' authored by S Biswas, N Kaushik, S Baksi & Y S Rajan, was published in the VIII Annual Conference of the Forum for Global Knowledge Sharing on 'Emerging Technologies and Development', IIT- Bombay, October 25 27, 2013
- 26. Prof. Prabhat Ranjan delivered a lecture on "Technological Innovation in India Creating Environment of Creativity" at the Engineering Council of India meet, on October 28, 2013, New Delhi.
- 27. Shri PR Basak, Scientist-E participated as a Jury in the panel of India Innovation Initiative (I3) Awards organized by CII, DST and Agilent Technologies, held in October, 2013.
- 28. Shri Yashawant Dev Panwar, Scientist-E delivered a lecture on "Patent information & determining novelty, inventiveness and utility of invention" in workshop on IPR organised at Sam Higginbottom Institute of Agriculture Technology & Science, Allahabad by NRDC, New Delhi on November 7, 2013
- 29. Shri Yashawant Dev Panwar, Scientist-E delivered a lecture on "Intellectual Property Rights and some case studies" in workshop on IPR organised at Government Degree College, Dakpathar, Vikasnagar, UK by Uttrakhand State Council for Science & Technology (UCOST) December 7, 2013
- 30. Shri Yashawant Dev Panwar, Scientist-E delivered a lecture on "Evaluation and management of intellectual property rights in institutions and industries" in refresher course on update on IPR organised by PIC at Council of Science & Technology, Uttar Pradesh on December 17-18, 2013
- 31. Sh. Arghya Sardar made a presentation on National Mission for Electric Mobility at India Energy at the first International Conference and Exhibition on Energy Storage and Microgrids in India on 6th December 2013 at Mumbai

- 32. Dr. Gautam Goswami, Head, TV 2035 conducted a mini session on TV 2035 Glass & Ceramics section was conducted in the 77th Annual Session of Indian Ceramic Society held on 19th & 20th December, 2013 at Jamshedpur
- 33. Prof Prabhat Ranjan delivered a lecture on "Sensor Network Applications to Wildlife Tracking and Assistive Technology" at M2M India 2014 on Feb 5, 2014
- 34. Shri Yashawant Dev Panwar, Scientist-E delivered a lecture on "Management of IPR in academic and R&D institutions and the role of TIFAC" in a sensitization workshop on IPR organised by MNNIT, Allahabad on February 6-7, 2014
- 35. Prof Prabhat Ranjan delivered a lecture on "The m2m and IOT Challenges, Solution, and Technology Advancements- Enabling the mass deployment of M2M services" at India M2M Forum 2014 on Feb 14, 2014
- 36. Dr. Neeraj Saxena, Scientist-E delivered a guest lecture on "Industry-Academia linkages for improving quality of higher technical education" at the National Workshop organized by the Indian Society for Technical Education (ISTE) on 20th February 2014
- 37. Prof Prabhat Ranjan delivered a special lecture on "My Journey to Brain" at Amity International Centre on March 7, 2014

6 Infrastructure and Resources

6.1 National Knowledge Network

During the year, TIFAC continued to make use of the connectivity to the National Knowledge Network (NKN). The connectivity provides TIFAC a 100 mbps line for internet connectivity and other services offered by NKN. Interactions were continued with National Informatics Centre (NIC) for making use of other provisions in the NKN.

6.2 E-Resources

TIFAC continued subscribing to E-resources, including IEEE, Oxford University Press, Cambridge University Press, Emerald Extra and Web of Knowledge, during the year and online desktop computer access were made available to the scientists. The e-resources are subscribed through the National Knowledge Network Consortium (NKRC), a DST-CSIR joint consortium. TIFAC requested the NKRC additional subscription of Springer Link and Science Direct. Inputs were given to the consortium for access to a wider range of E-resources through the NKRC.

6.3 Implementation of Official Language Policy

The implementation of official language policy under the guidance of Official Language Implementation Committee (OLIC) was continued. Six (6) Hindi workshops were organised for the benefit of employees. The Hindi Fortnight (pakhwada) was organised in September 2013., TIFAC employees, who participated in nine different competitions, received certificates and cash prizes.

6.4 Library

TIFAC Library, a knowledge Centre, facilitates and fosters the flow of the Scientific/ Technical information. During the year 2013-14, TIFAC Library continued to strengthen its holdings by procuring scientific books/reports and journals/serials as per the requirement of TIFAC.

6.5 TIFAC Information Interfaces

The Information Management Cell (IMC) continued maintaining the following websites:

- TIFAC Website (http://www.tifac.org.in)
- Mission REACH (http://www.missionreach.org.in)

The websites served as interfaces for servicing queries received by some users. The TIFAC site was visited by more than 8 lakh users. About 250 queries pertaining to various schemes of TIFAC and technology areas were received and serviced through the web-mail.

TIFAC is now active on social media through Facebook and twitter with the following IDs:

- https://www.facebook.com/tifac.dst.india
- https://twitter.com/TIFAC India

These are being used to reach out to people by sharing TIFAC events, activities, advertisements, schemes and opportunities. TIFAC is actively scouting latest technologies reported at various sources across the globe. Such scouted technology information having very important role in future technoscape, appear on Facebook page of TIFAC and has been liked, commented and discussed by many. This activity in turn helps us and others in foreseeing future technologies.

Our Facebook page showcases technology foresight along with futuristic with insights from eminent scientists and technocrats.

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ANIL BHATLA & COMPANY CHARTERED ACCOUNTANTS OFFICE: S-16, SECOND FLOOR, ASHOK DEEP BUILDING 4/24, EAST PATEL NAGAR NEW DELHI – 110008 Tel: 11-25732569, Fax: 11-45058330

AUDITORS' REPORT

The Members,
Governing Body,
Technology Information, Forecasting & Assessment Council,
New Delhi.

We have audited the attached Balance Sheet of TECHNOLOGY INFORMATION, FORECASTING AND ASSESSMENT COUNCIL (TIFAC), NEW DELHI as at 31st March, 2014 and the statement of Income & Expenditure Account for the year ended on that date annexed thereto.

These financial statements are the responsibility of the management of the TECHNOLOGY INFORMATION, FORECASTING AND ASSESSMENT COUNCIL (TIFAC). Our responsibility is to express an opinion on these financial statements based on our audit.

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

Subject to our Audit objections as per **Annexure AR-1** and comments given on significant accounting policies, contingent liabilities and notes on accounts as per schedules 32 & 33, we report that:-

- 1) We have obtained all the information and explanations which to the best of our knowledge and belief were necessary for the purposes of our Audit;
- In our opinion proper books of account as required by law have been kept by TECHNOLOGY INFORMATION, FORECASTING AND ASSESSMENT COUNCIL (TIFAC), so far as appears from our examination of those books;
- The Balance Sheet and statement of Income and Expenditure Account dealt with by this report are in agreement with the books of account;

- 4) In our opinion and to the best of our information and according to the explanations given to us, the said accounts read with the schedules and notes thereto give the information required and give a true and fair view:-
 - a) In case of Balance Sheet, of the state of affairs of the TECHNOLOGY INFORMATION, FORECASTING AND ASSESSMENT COUNCIL (TIFAC) as at 31st March, 2014; and
 - b) In case of Income & Expenditure Account, excess of expenditure over income for the accounting year ended on that date.

For Anil Bhatla & Company Chartered Accountants FRN: 012686N

Sd/-Ch. Chandra Sekhar Patro (Partner) MRN: 091529

Date: 22-09-2014 Place: New Delhi

TECHNOLOGY INFORMATION, FORECASTING AND ASSESSMENT COUNCIL STATUTORY AUDIT FOR F/Y 2013-2014

AUDIT OBJECTIONS- AR 1

1. TIFAC has given financial assistance in the form of Technology Development Assistance (TDA) to various Companies, Partnership firms and other concerns for technology advancement and related objects. As per the TDA sanction document and agreement entered between TIFAC and the beneficiaries, the TDA amount will be repaid by the beneficiaries in installments at specified intervals and according to the terms of the agreement. We have observed that there are many cases where the TDA has not been repaid by the beneficiaries. The project-wise details of the overdue amount are as under:-

Project-wise overdue statement as on 31st March 2014

S. No.	Name of the projects	Overdue up	Overdue from more than six	Overdue more	Total
No.		to six months	more than six	than 3 years	
		0.0000000000000000000000000000000000000	years		
1	Home Grown Technology	360,000.00	1,350,000.00	174,424,920.00	176,134,920.00
2	Advanced Composite	1,200,000.00	49,815,340.00	92,842,575.00	143,857,915.00
	Programme Project				
3	Sugar Technology Unit	-	-	45,990,018.00	45,990,018.00
4	Fly Ash Utilization	-	10,000.00	13,034,000.00	13,044,000.00
5	Agriculture and Agro Food	-	-	10,625,000.00	10,625,000.00
	Sector				
6	Health Care Equipment	-	1	1	-
7	Targeted Programme in other	23,274,000.00	21,600,000.00	5,100,000.00	49,974,000.00
	important Sectors				
8	Textile Machinery	-	į	1	-1
9	Road Construction and	-			-
	Transportation				
	Total	24,834,000.00	72,775,340.00	342,016,513.00	439,625,853.00

It may also be noted that the above information has been extracted from the memoranda records only as these are not reflected in the accounts owing to the accounting policy being followed of treating the amounts disbursed as expenditure and amounts refunded as incomes. The total outstanding amounts of such repayments that have accumulated over the years have not been reflected in the financial statement of accounts.

2. As per Income Tax Act, 1961 tax is to be deducted either at the time of credit of such sum to the account of the payee, or at the time of payment thereof in cash or by issue of

cheque or by any other mode, whichever is earlier. It was observed that TDS has been deducted on payment basis only i.e. at the time when payment has been made to parties.

- 3. TIFAC owns six floors in Viswakarma Bhawan, a building constructed on the IIT land. For the cleanliness of the building, TIFAC has given a contract for housekeeping of the six floors to M/s Pink Housekeeping. Out of the six floors one floor is occupied by NMBA and another by MGA, both of which are being treated as separate accounting entities. It is observed that out of the expenditure incurred on housekeeping which has been borne entirely by TIFAC no allocation has been made to NMBA or MGA for the purposes of arriving at the appropriate utilization of funds in view of their distinct and separate funding. To this extent, the utilization of funds have been overstated in the case of TIFAC and understated in the cases of NMBA and MGA.
- 4. Similarly the expenses on account of electricity, security services, water and horticulture which has been reimbursed by TIFAC to IIT has not been allocated to NMBA and MGA and, therefore, to this extent, the utilization of funds have been overstated in the case of TIFAC and understated in the cases of NMBA and MGA.
- 5. TIFAC has granted TDA to various companies incorporated under the Companies Act in the *past*. But we have observed that the particular of the security which has been provided to TIFAC against the TDA given to various such companies has not been registered with Registrar of Companies in most of the cases. In the absence of registration of charge, the security furnished by the company would have no value.

6. Observation related to TREMAP TCF, College of Technology & Engineering, Udaipur

- (a) No quarterly progress report submitted by Grantee after June 2013.
- (b) As per the agreed terms Utilisation Certificate/ Statement of Expenditure (UC/SE) should be submitted by grantee on half yearly basis, but TIFAC has received annual UC/SE for FY 2012-13.
- (c) No documented evidence found in records in respect of following, but mentioned in the terms of agreement:
 - Six TREMAP plans per year
 - Two innovator's meet (p. a.)
 - Two exhibitions with advance intimation to TIFAC

7. Observation related to residential accommodation of Executive Director, TIFAC

During the FY 2013-14 TIFAC hired a residential accommodation for Executive Director, TIFAC and paid monthly rent of Rs. 50,000/- from June 2013 onwards & one time brokerage to the property dealer of Rs. 25,000/- on the basis of recommendation of Chairman TEC/Secretary DST. (File No.45/13/Reg/TIFAC noting page no.6 dated 28.05.2013)

प्रौद्योगिकी सूचना, पूर्वानुमान एवं मूल्यांकन परिषद





As per the letter dated 14.10.2013 of Ministry of Science and Technology, DST to TIFAC:

"These payments made by TIFAC were not as per the limits prescribed by the Ministry of Finance, Department of Expenditure O.M. No. 1(16)/E. II(A)/2008 dated May 08, 2009 and payments made above the specified limits are beyond the power of TEC/Secretary, DST.

They have directed TIFAC to hire the accommodation for the ED as per the financial limits and maximum area prescribed vide the aforesaid O. M. of the Department of Expenditure, according to which the maximum area including the servant quarter, garage, room for office work, to which ED, TIFAC is entitled will not exceed 1700 sq. ft. with maximum rent payable at Rs. 26,500/- per month. As per the direction TIFAC has to hire another accommodation for Executive Director as per these limits immediately. In case the ED, TIFAC chooses to reside in as house having larger area and higher rental, he should meet the excess expenditure over and above the limit, from his own resources."

As per the letter dated 12.03.2014 of Ministry of Science and Technology, DST to TIFAC:

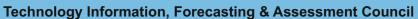
"Ministry of Science & Technology officials directed TIFAC to take necessary action as per the above mentioned letter dated 14.10.2013 and further the brokerage of Rs. 25,000/paid to the agent for hiring the private accommodation may also be recovered from the ED, TIFAC as there is no provision for payment of any brokerage to hire the private accommodation by the Government."

We have observed that during FY 2013-14 TIFAC has retained the same accommodation for ED, TIFAC even after the direction of Ministry of Science & Technology conveyed through letter dated 14.10.2013 and they have not recovered the excess amount of (Rs. 50,000/- less Rs. 26,500/-)*8 = Rs. 1,88,000/- paid as rent & Rs. 25,000/- as brokerage from ED, TIFAC and the same is pending for recovery.

- 8. A sum of Rs. 6,92,693/- has been paid and booked as expense during the current year while these expenses relates to previous financial years for which no provision had been made in those previous years. Hence the surplus for the current financial year has been reduced to the extent of Rs. 6,92,693/- on account of expenditure pertaining to the previous years.
- 9. TIFAC earmarked Rs. 3 crore separately from its Current Year income to be released to SIDBI with an opening balance of Rs. 14 crore, for giving TDA out of the funds so received to organizations identified by SIDBI. Rs. 3 crore earmarked for SIDBI is shown as expenditure during the current year and added to the Corpus of TIFAC. As and when

this amount is released it will be deducted from Corpus and paid through Bank. Since this earmarked fund of Rs. 3 crore has not been actually released during the current year to SIDBI the expenditure of the current year stands overstated to the extent of Rs. 3 crore. Such practice also needs to be examined from the point of view of its treatment under the Income-tax Act. The treatment under the Income-tax Act need also to be examined in the case of unspent amount of grants received during the year which is transferred to Corpus/Capital Fund as at the end of the year.

10. As per the information provided to us TIFAC deducts certain amounts at the rate prescribed under the Central Government Health Scheme from the salary of its employees as monthly contribution towards health insurance policy to be taken out by TIFAC from an insurance company. The accumulated amount has to be utilized for the post retirement medical benefits of TIFAC employees. As on 31st March 2014 this accumulated amount stands under the head Current Liabilities at Rs.14,23,467/- (under TIFAC A/c) and Rs. 31,450/- (under PFC new A/c) against which no policy has been taken so far from any Insurance Company. Hence, there may be a contingent liability for TIFAC which is unascertained over and above the accumulated amount.





TECHNOLOGY INFORMATION, FORECASTING & ASSESSMENT COUNCIL

REPLIES TO AUDIT QUERIES "ANNEXURE AR 1"

- 1. The cases of non-recovery of Technology Development Assistance are being vigorously monitored and pursued with the Companies. Legal action as per provisions of Agreements has been initiated in a number of cases.
- 2. TDS is deducted from the parties bill at the time of payment and the tax is deposited within 7 days.
- 3 & 4 As all six floors are owned by TIFAC and cleanliness of the building is the responsibility of TIFAC and housekeeping contract is called for the maintenance of the building by TIFAC and Electricity, Security Services, Water and Horticulture are also the responsibility of TIFAC and as NMBA and MGA are part of TIFAC there is no need for allocation of expenditure even though their accounting is separately maintained.
- 5. This point will be looked into and concerned divisions will be notified for taking necessary action in the future.
- 6. The progress of the TCF up to August 2013 has been recorded in the form of Progress Report/ Minutes of the meeting. The SE/UC has also been received up to 30th June 2013. As all the TCF under TREMAP has been closed on 31st March, 2014, their final consolidated Progress Report/ Closure Report along with final SE / UC is under finalization.
- 7. The request for regularization of expenditure of rent paid by TIFAC for ED's, TIFAC accommodation is under process at Department of Science and Technology.
- 8. The point has been noted for future compliance.
- 9. The TIFAC-SIDBI Fund set up in Dec 2010 with Core of Rs.30 Crores is to be recouped by releases to SIDBI by TIFAC towards technology development /commercialization projects and through recoveries from Technology Development Assistance funded by TIFAC. Repayments received in this financial year to the extent of Rs.3 crores is earmarked and taken as expenditure. Disbursement of funds by SIDBI would be done on the recommendations of Project Approval Committee as per the agreement.
- 10. Medical Scheme is extended to TIFAC staff / officers on the basis of CGHS Scheme of Central Government like in other organizations for which a nominal amount is deducted from employees salary. This amount of Rs.14,54,917/-(i.e Rs.14,23,467/- + 31,450/-) will be treated as income to TIFAC. A proper approval from the competent authority will be taken to transfer the amount of Rs.14,54,917/- from Current Liabilities to Other Income from (Schedule 18).

Technology Information Forecasting And Assessment Council, (TIFAC, Schedules Forming Part of Balance Sheet as at 31.03.2014

Schedule 1 - Corpus / Capital Fund	TIFAC Main	IFAC Main Account and Schemes under TFAC	under TIFAC	Tra	ansfering to their res	Transfering to their respective New Accounts	ts
	TIFAC	Current Year	Previous Year	Patent Facilitating Center (New Account)	g Center (New mt)	Scholarship for Women Scientists (New Account)	nen Scientists (New unt)
				Current Year	Previous Year	Current Year	Previous Year
Opening Balance	2076,06,259.99	2076,06,259.99	1403,34,304.64	95,61,245.84	Ü	10,25,599.00	U
Opening Balance related to SIDBI Earmarked for Release (Revolving Fund)	1400,00,000.00	1400,000,000.00	950,00,000.00	ī	ī	Ĭ	•
Earmarked for Release to SIDBI (Revolvig Fund)	300,000,000.00	300,000,000.00	450,00,000.00	T	٠	t	20
Amount Transferred from TIFAC account to PFC & SFWS New Account	C	C	ŭ.		38,493.32		48,79,744.00
Excess of Income over Expenditure	t.	t	776,84,549.67	26,05,797.00	95,22,752.52	74,61,483.00	υ
Year Adjustments	ų.	ij.	ï	•		Ü	U
	3776,06,259.99	3776,06,259.99	3580,18,854.31	121,67,042.84	95,61,245.84	84,87,082.00	48,79,744.00
Excess of Expenditure over Income	89.617,80,059		54,94,357.00	*			38,54,145.00
Amount transferred to PFC & SFWS New Account	Y		49,18,237.32		×	,	4
	650,08,719.68	650,08,719.68	104,12,594.32	-			38,54,145.00
Closing Balance	3125,97,540.31	3125,97,540.31	3476,06,259.99	121,67,042.84	95,61,245.84	84,87,082.00	10,25,599.00

Technology Information Forecasting And Assessment Council, (TIFAC) Schedules Forming Part of Balance Sheet as at 31.03.2014

Schedule 2 - Reserve and Surplus

Previous Year		ı	1	h		ì	1	ì		ì	1.	ì		ı	1	1	1	
Current Year				1								1				•	-	
Cur		2	ţ.			.1	I,	1		1	Ļ	3		,	I,			
Particulars	1. Capital Reserves:	As Per Last Account	Addition during the year	Less : Deductions during the year	2. Revaluation Reserves :	As Per Last Account	Addition during the year	Less: Deductions during the year	3. Special Reserve:	As Per Last Account	Addition during the year		4. General Reserve:	As Per Last Account	Addition during the year	Less: Deductions during the year	Total	

Technology Information Forecasting And Assessment Council, (TIFAC) Schedules Forming Part of Balance Sheet as at 31.03.2014

Schedule 3 - Earmarked/Endowment Funds

	Current Year	Previous Year
a) Opeing Balance of the Funds	•	-
b) Additions to the funds		r
i) Donations / Grants	1	1
ii) Income from Investments	1	r
iii) Other Additions (Specify)	1	ì
Total (a+b)	-	(iii
c) Utilization / Expenditure towards		
i) Capital Expenditure		ī
Fixed Assets	a.	T
Other Additions (Specify)	1	ī
ii) Revenue Expenditure		
Salary, Wages and allowance etc	•	1
Rent		r
Other Administrative Expenditure		-
Total c)		
Net Balance as at the year end (a+b-c)	-	-

Note: 1) Disclosures shall be made under relevant heads based on conditions attached to the Grants

Note: 2) Plan Funds received from Central / State Governments are to be shown as separate Funds and not to be mixed up with any other funds

Technology Information Forecasting And Assessment Council, (TIFAC) (Regular)

	Previous Year				T	î		ñ	ī	1	ī					
Schedules Forming Part of Balance Sheet as at 31.03.2014 wings	Current Year	1	1		•	1		,	•	1	•	1	,	1	1	
Schedule 4 - Secured Loans and Borrowings	Particulars	1. Central Government	2. State Government (Specify)	3. Financial Institutions	a) Term Loans	b) Interest accrued and dues	4. Banks :	a) Term Loans	Interest accrued and due	b) Other Loans (Specify)	Interest accrued and due	5. Other Institutions and Agencies	6. Debentures and Bonds	7. Others (Specify)	Total	

Note: Amounts due within one year

Technology Information Forecasting And Assessment Council, (TIFAC) (Regular) Schedules Forming Part of Balance Sheet as at 31.03.2014

Schedule 5 - Unsecured Loans and Borrowings

•				
Particulars	Current Year	r	Prev	Previous Year
1. Central Government		1		ĩ
2. State Government (Specify)		1		ñ
3. Financial Institutions				
4. Banks :				
a) Term Loans	ı		ì	
b) Other Loans (Specify)	ji.	ì	j	î
5. Other Institutions and Agencies		ř.		i
6. Debentures and Bonds		ì		ì
7. Fixed Deposites		1		ī
8. Others (Specify)		1		ì
Total		-		1

Note: Amounts due within one year

Schedule 6 - Deferred Credit Liabilites

and the second s		***************************************
Particulars	Current Year	Previous Year
a) Acceptances secured by Hypothecation of	1,	1
b) Others		1
Total		,

Note: Amounts due within one year

Technology Information Forecasting And Assessment Council, (TIFAC) (Regular) Schedules Forming Part of Balance Sheet as at 31.03.2014

Particulars	Current Year	Previous Year
A) Current Liabilities		
1. Acceptances	r	ī
2. Sundry Creditors : a) For Goods		
b) Others- M/s Daikin Airconditioning		200
India Pvt. Ltd	1	00.726,26,1
M/s Blue Star Ltd	1,69,274.00	1,65,956.00
CGHS (Sh.Rajani Kanth Gupta) Ex. Registrar	2,550.00	ī
Patent Facilitating Centre	r	6,000.00
M/s Unique Interiors, New Delhi	l:	1,91,075.00
India International Centre	P.	3,25,854.00
3. Advances Received	1	î
4. Interest accrued but not due on:		
a) Secured Loans / Borrowings	1	ī
b) UnSecured Loans / Borrowings	1	Ī
5. Statutory Liabilities		
a) Over Due	1	Ī
b) Others: TDS Payable (Sub Total (B)	4,84,751.00	3,06,097.00
TDS Payable (Sub Total (B) (Under PFC	1,33,722.00	1,07,231.00
TDS Payable (Sub Total (B)	r	4,718.00
6. Uther Current Liabilities	1 000 00	00 008 1
State Chemie	23.65.446.06	00.008,T 00.008,T
IIT-TIFAC Maintenance (Provisions)	131,40,000.00	131,62,041.00
Expenses Payable (Sub Total (A)	51,74,396.00	59,55,719.00
Expenses Payable (Sub Total (A)	11,67,936.00	13,61,189.00
Expenses Payable (Sub Total (A)	3,72,629.00	11,49,744.00
Project ICOSER	132,02,152.00	132,02,152.00
Indian Myanmar S&T Friendship	9,59,659.00	6,59,659.00
MSEB-Ash Utilization / Management	6,00,094.00	6,00,094.00
FAM Large Scale Stowing of HWP Pond Ash into the	82,94,830.00	82,94,830.00
Earth Quake Serving Nature's Fury	1,65,157.00	1,65,157.00
Total (i)	462,34,396.06	483,90,722.06

Technology Information Forecasting And Assessment Council, (TIFAC) (Regular) Schedules Forming Part of Balance Sheet as at 31.03.2014

Schedule 7 - Current Liabilities And Provisions

Particulars	Current Year	Previous Year
DRDO-PFC	3,95,745.00	3,95,745.00
CPF (Under TIFAC Account)		2,94,991.00
CPF (Under PFC New Account)	35,000.00	24,700.00
GSLIS (Under PFC New Account)	346.00	346.00
MPSEB use of Fly Ash in Agriculture Development	3,56,825.00	3,56,825.00
Medical Scheme (Under TIFAC Account)	14,23,467.00	11,92,550.00
Medical Scheme (Under PFC New Account)	31,450.00	9,250.00
Leave Travel Expenses Payable	2,720.00	•
Training Proramme on IPR and WTO Issues for	2,02,549.00	2,02,549.00
Sh.Shambhu Kumar (House Building Advance) (PFC	8,000.00	ī
G.M.W Workshop (SRF)	2,16,578.00	1
Prepration of Detailed Project Report & Design of	5,47,907.00	ī
TIFAC-World Bank Project	13,39,747.93	13,39,747.93
7. Security Deposit		
Earnest Money: M/s Nimbus Harbour Pvt Ltd	20,000.00	20,000.00
Earnest Money: M/s Pink House Keeping	18,784.00	18,784.00
Earnest Money from Sugar Factories (Annex 13)	35,00,000.00	36,00,000.00
Earnest Money: M/s Sansanwal Travels		50,000.00
Earnest Money : M/s Yatrika Travels	1	50,000.00
Earnest Money: M/s Dogra Enterprises	5,000.00	Ī
Earnest Money: M/s Bagga Tours and Travels	50,000.00	ì
Earnest Money: M/s Dip Technologies Pvt. Ltd	5,000.00	ī
Earnest Money : M/s Perfect Traders	5,000.00	ì
Security Deposite: M/s Pink House Keeping	71,604.00	71,604.00
Total (ii)	82,35,722.93	76,27,091.93
Total (i)+ (ii) = (A)	544,70,118.99	560,17,813.99

Technology Information Forecasting And Assessment Council, (TIFAC) (Regular) Schedules Forming Part of Balance Sheet as at 31.03.2014

)	
Schedule 7 - Current Liabilities And Provisions		
Particulars	Current Year	Previous Year
3. Superannuation / Pension	•	h
4. Accumulated Leave Encashment	•	Ī
5. Trade Warranties / Claims	1	1
6. Others (Specify)		Ī
Total (B)		ì
Total (A+B)	544,70,118.99	560,17,813.99

Technology Information Forecasting And Assessment Council, (TIFAC) (Regular) Schedules Forming Part of Balance Sheet as at 31.03.2014

nent Funds	
narked/Endowment	
ents from Earma	
e 9 - Investme	
Schedule	

Particulars	Current Year	Previous Year
1. In Government Securities		ī
2. Other approved Securities	1	1
3. Shares	•	î
4. Debentures and Bonds	r	ï
5. Subsidiaries and Joint Ventures	1	ı
6. Others (to be Specified)	1	1
Total	-	

Schedule 10 - Investments - Others		
Particulars	Current Year	Current Year
1. In Government Securities		ī
2. Other approved Securities	r	i
3. Shares		1
4. Debentures and Bonds	r	ir.
5. Subsidiaries and Joint Ventures		ī
6. Others (to be Specified)	r	ir.
Total	-	-

प्रौद्योगिकी सूचना, पूर्वानुमान एवं मूल्यांकन परिषद् Technology Information, Forecasting & Assessment Council

Technology Information Forecasting And Assessment Council, (TIFAC) (Regular) Schedules Forming Part of Balance Sheet as at 31.03.2014 Schedule 11 - Current Assets, Loans, Advances Etc

Double over 1 and	Vocation Vocation	+ Voor	Dans	Duning Voss
i aitic ulais	Cullen	ı redi	LIEVI	ous ieai
A) Current Assets				
1.Inventories:				
a) Stores and Spares		ı		ï
b) Loose Tools		Pi-		ň
c) Stock-in-Trade				
Finished Goods		B)		ř
Work-in-Progress		•		ī
Raw Material		•		ř
2. Sundry Debtors:				
a) Debts outstanding for a period exceeding		ľ:		ń
b) ofhers		ı		•
3. Cash Balances in Hand (including Cheques / Drafts		6,195.00		3,677.00
Cash Balances in Hand (including Cheques /		520.00		439.00
Cash Balances in Hand (including Cheques / Drafts		2,020.00		5,839.00
4. Bank Balances:				
a) With Scheduled Banks : (Union Bank of India)				
On Current Accounts	1		ì	
On Deposite Accounts (Short Term Deposites)	1555,00,000.00		1305,00,000.00	
Accrued Interest (Accrued Interest)	272,24,214.00		135,88,555.00	
On Savings Accounts (Under TIFAC Account)	1053,75,926.31		1717,66,782.83	
On Savings Accounts (Under PFC New Account)	134,06,683.84		108,87,788.32	
On Savings Accounts	88,36,067.00	3103,42,891.15	21,48,598.00	3288,91,724.15
b) With non-Scheduled Banks:				
On Current Accounts			ı	
On Deposite Accounts			ā	
On Savings Accounts			ï	ï
5. Post Office - Savings Accounts				ò
Total (A)		3103,51,626.15		3289,01,679.15

Technology Information Forecasting And Assessment Council, (TIFAC) (Regular)
Schedule 11 - Current Assets, Loans, Advances Etc

Schedule 11 - Cultelli Assets, Evalls, Advances Ele				
Particulars	Currer	Current Year	Prev	Previous Year
B) Loans, Advances and Other Assets:-				
1. Loans:				
a) Staff Loan (Under TIFAC Account) (Annex-1)		23,24,364.00		21,65,708.00
Staff Loan (Under PFC New Account) (Annex-1)		61,125.00		87,125.00
Staff Loan (Under SFWS New Account)		12		4,000.00
b) Other entities engaged in activities/				
objectives similar to that		F.		ĭ
c) Others		I.		ř
2. Advances and other amounts recoverable in cash or				
a) On Capital Account		•		î
o) r repayments Advance : Frankino Machine	00'229		1 108 00	
Advance : Sardar Patel Institute of Economic			22224	
and Social Research, Ahmadabad			ų	
Advance: DAVP	43,179.00		41,554.00	
Advance : India Habitat Centre			2,018.65	
Advance : Acharya Vinaba Bhave	1 50 000 00		1 50 000 00	
Rural Hospital, Sawangi	מתיממימכיד	0 0 0 0 0	T,00,000.00	
Advance : 111-Delhi		1,93,856.00	1	1,94,680.65
c) Others				
SAIL NMPP	19,736.55		19,736.55	
Sundry Debtor: DST (IITF)	2,70,000.00		2,70,000.00	
Security Deposit Lease Accommodation	9,500.00		9,500.00	
Security Deposit MTNL	25,937.00		31,937.00	
Secruity Deposite Tata Teleservices Ltd	16,000.00		16,000.00	
Security Deposite: Sh.Kapil Aggarwal	1,00,000.00		1	
Security Deposit: DST (IITF)	74,520.00		74,520.00	
Security Deposite : UBI Locker Rent	8,403.00		1	
TIFAC/DST ITS Canada Workshop	88,732.00		1	
TDS (Indian Oil Corporation Limited)	61,346.00		ì	
Leave Encashment Receivable		77 74 74 77	40 101	C C C C C C C C C C C C C C C C C C C
(Shambhu Kumar) (Under PFC New Account)		0,/4,1/4.55	10,721.00	4,32,414.33
Total (i)		32,53,519.55		28,83,928.20

3,41,317.00 4,40,829.52

33,24,757.72

3322,26,436.87

Technology Information Forecasting And Assessment Council, (TIFAC) (Regular)	orecasting And Ass	essment Council, (TFAC) (Regular)	
Schedules For	ming Part of Balan	Schedules Forming Part of Balance Sheet as at 31.03.2014	2014	
Schedule 11 - Current Assets, Loans, Advances Etc				
	Curre	Current Year	Prev	Previous Year
3. Income Accrued:				
a) On Investments from Earmarked/		F:		
b) On Investment – Others		,		
c) On Loans and Advances		₽ R		
d) Others		•		
Interest Accrued from Union Bank of India		00 999 77		
(Under PFC New Account)		00.000,11		
Interest Accrued from Union Bank of India		00 100 10		
(Under SFWS New Account)		21,024.00		
4. Claim Receivable				
TDS :CPF (FDR) UBL,SDA	1		3,21,591.00	
TDS (FDR) Sarita Vihar, New Delhi	ř.		19,726.00	
Income Tax for the F.Y 2004-2005	1	•	ï	
Total (ii)		99,512.00		
Total (i) $+$ (ii) $=$ (B)		33,53,031.55		
Total $(A) + (B)$		3137,04,657.70		

77,888.52

21,624.00

Technology Information Forecasting And Assessment Council, (TIFAC) (Regular) Schedules Forming Part of Income & Expenditure for the year ended 31.03.2014

	Previous Year								1		•		
	Current Year		1	1				1				·•	
Schedule 12 - Income From Sales / Services	Particulars	1. Income from Sales	a) Sale of finished Goods	b) Sale of Raw Material	c) Sale of Scraps	2. Income from Services	a) Labour and Processing Charges	b) Professional / Consultancy Services	c) Agency Commissions and Brokerages	d) Maintenance Services (Equipment/Property)	e) Others (Specify)	Total	

Scheudel 13 - Grants / Subsidies (11FAC Kegular)		
Particulars	Current Year	Previous Year
1. From Central Government		
TIFAC Grant		
a) Grants in Aid (Plan)	501,55,000.00	1500,00,000.00
b) Grant in Aid (Non-Plan)	3,75,000.00	4,50,000.00
c) Grant in Aid (Plan) Capital Assets	6,07,000.00	35,00,000.00
d) Grant in Aid (Salary)	262,14,000.00	445,00,000.00
e) Grant in Aid (Salary) Scheduled Castes	42,71,000.00	73,00,000.00
2. State Government(s)		•
3. Government Agencies	1	i i
4. Institutions Organisations		
5. International Organisations 6. Other (Specify)		1 1
Total	816,22,000.00	2057,50,000.00

Technology Information Forecasting And Assessment Council, (TIFAC) (Regular) Schedules Forming Part of Income & Expenditure for the year ended 31.03.2014

iptions	
/Subscr	
14 - Fees	
Schedule	

Particulars	Current Year	Previous Year
1. Entrance Fees	•	ī
2. Annual Fees / Subscriptions		ī
3. Seminar / Program Fees	1	ī
4. Consultancy Fee	•	ī
5. Others (Specify)		Ī
RTIA Questions	3,024.00	1,528.00
Tender for Car Hiring	2,000.00	ī
Tender for Laptops	5,000.00	ī
Tender for Supply of Drinking Water	1,500.00	ī
Tender for Digitalization of TIFAC Reports	6,500.00	ī
Tender for Printing of Various Stationery Items	•	2,500.00
Tender for Empanelment of Caterer	•	1,250.00
Tender for Empanelment of Advertisement		4,500.00
Total	18,024.00	9,778.00

Schedule 15 - Income From Investments (Income on Invest. From Earmarked/Endowment Funds transferred to Funds)

13				
Particulars	Investment from Earmarked Funds	narked Funds	Investment fro	Investment from Earmarked Funds
	Current Year	ar	Prev	Previous Year
1. Interest				
a) On Govt. Securities	1		i	
b) Other Bonds/Debentures	•	5	1	
2. Dividends				
a) On shares	,		ì	
b) On Mutual Fund Securities	,	à	1	00
3. Rents				î
4. Others (Specify)				iii
Total		-		ī

Technology Information Forecasting And Assessment Council, (TIFAC) (Regular) Schedules Forming Part of Income & Expenditure for the year ended 31.03.2014

Schedule 16 - Income from Royalty,		
Publication Etc.		
Particulars	Current Year	Previous Year
1) Income from Royalty		
2) Income from Publications	77,634.00	1,05,778.00
3) Other (Specify)		
Total	77,634.00	1,05,778.00

Schedule 17 - Interest Earned (Regular)

Schedule 1/ - Interest Eather (Negaral)		
Particulars	Current Year	Current Year
1. On Term Deposits		
a) With Scheduled Banks	136,35,659.00	92,29,837.00
b)With Non-Scheduled Banks		
c) With Institutions		
d) Others		
2. On Savings Accounts		
a) With Scheduled Banks	52,30,404.00	55,27,535.00
b)With Non-Scheduled Banks		
c) Post Office Savings Accounts		
d) Others (Project Interest)		
3. On Loans:		
a) Employees / Staff (LTA, Scooter,	00 244 60	29 810 00
Car, tour and LTC)	00.744,04	00:010//0
b) Others (Interest from Income Tax)	13,143.00	8,75,000.00
House Building Advance		
4. Interest on Debtors and Other Receivables		
Total	189,22,653.00	156,92,182.00

Note: Tax deducted at source to be indicated

Technology Information Forecasting And Assessment Council, (TIFAC) (Regular) Schedules Forming Part of Income & Expenditure for the year ended 31.03.2014

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Particulars	Current Year	Previous Year
1. Profit on sale / disposal of Assets		
a) Owned assets	•	i
b) Assets acquired out of grants,	•	ī
2. Export Incentives realized	1	ī
3. Fees for Miscellaneous Services	1	ī
4.Miscellaneous Income		
Other Receipts (Computers)	1	ī
Bank Charges	1	Ī
Other Receipts	1,700.00	3,655.00
Other Receipts : Refund of unspent balance	1	90,044.00
Other Receipts : Refund of Unspent balance		20,000.00
Other Receipt: TREMAP Unspent Balance Refunded:	1,90,307.00	ī
Other Receipt: Indian Oil Corporation Ltd	1,02,244.00	ī
Leave Salary & Pension Contribution	26,700.00	Ī
Total	3,20,951.00	1,43,699.00

gress	Previous Year		•	•		•	-	-	
hed Goods & Work in Pro	Current Year								
Schedule 19 - Increase / (Decrease) in stock of Finished Goods & Work in Progress	Particulars	a) Closing Stock	Finished Goods	Work-in-Progress	b) Less: Opening Stock	Finished Goods	Work-in-Progress	Total	

Technology Information Forecasting And Assessment Council, (TIFAC) (Regular) Schedules Forming Part of Income & Expenditure for the year ended 31.03.2014

ccount)	
AC Regular A	
Projects, (TII	
Refund from	
Schedule 20	

Particulars	Current Year	Current Year
Home Grown Technology (Annex-2)	102,94,000.00	25,71,000.00
Advanced Composites Programme (Annex-2)	130,17,020.00	206,79,723.00
Sugar Technology Mission (Annex-2)		83,00,000.00
TePP Project (Annex-2)	49,185.00	ř
Fly Ash Utilisation Programme (Annex-2)	10,000.00	30,000.00
Refund from Projects (Vision 2020) (Annex 2)	76,65,879.24	143,52,726.24
Total	310,36,084.24	459,33,449.24

Schedule 21 - Establisment & Other Administrative Expenses

CHICAGIC TI PRINCIPLIC CONCI COMMUNICATION PARAMETERS	ייייייייייייייייייייייייייייייייייייייי	
Particulars	Current Year	Previous Year
Establishment Expenditure (TIFAC Regular) (Annex 3)	530,68,553.00	426,90,254.00
Administrative Expenses (TIFAC Regular) (Annex 4)	262,25,617.76	244,01,985.71
Establishment & Administrative Expenditure	410 00 000	000 000
(Vision 2020)(Annex-6)	00.752,06,661	126,13,963.00
Total	932,52,407.76	799,08,224.71

Schedule 22 - Expenditure on Grants, Subsidies Etc

ocileunie 22 - Expellutiule vii Giailis, Judstules Etc		
Particulars	Current Year	Previous Year
Grants given to Institutions/Organisations		
Project Expenditure (TIFAC Regular) (Annex - 5)	837,29,495.65	880,41,093.00
Project Expenditure (Vision 2020)(Annex-6A)	71,82,495.00	124,83,904.00
Project Expenditure (Vision 2035) (Annex-7)	40,44,291.00	60,77,011.00
Total	949,56,281.65	1066,02,008.00

Technology Information Forecasting And Assessment Council, (TIFAC) (Regular) Schedules Forming Part of Income & Expenditure for the year ended 31.03.2014

Schedule 23 - Interest		
Particulars	Current Year	Previous Year
a) On Fixed Loans (Including Bank Charges)		ì
b) On Other Loans (Including Bank Charges)		1
c) Others (Specify)		à
Total		•

Technology Information Forecasting And Assessment Council, (TIFAC) Patent Facilitating Centre

Schedules Forming Part of Income & Expenditure for the year ended 31.03.2014

Schedule 24 - Grants / Subsidies (Patent Facilitating Centre) (Irrevocable Grants & Subsidies Received)	Centre) (Irrevocable Grants & Subsidi	ies Received)
Particulars	Current Year	Previous Year
Grant Received under TIFAC Account		
1. From Central Government		
2. Patent Facilitating Centre Grants		
a) Grants in Aid (Plan)	1	1
b) Grant in Aid (Non-Plan)	1	1
3. State Government(s)	1	1
4. Government Agencies	1	1
5. Institutions Organisations		1
6.International Organisations	1	1
7.Other (Specify)	-	•
Total		
Particulars	Current Year	Previous Year
Grant Received under PFC New Account		
1. From Central Government		
2. Patent Facilitating Centre Grants		
a) Grants in Aid (Plan)	150,00,000.00	150,00,000.00
b) Grant in Aid (Non-Plan)		1
3. State Government(s)	1	1
4. Government Agencies		
5. Institutions Organisatins	1	ř
6.International Organisations		ï
7.Other (Specify)		
Total	150,00,000.00	150,00,000.00

Technology Information Forecasting And Assessment Council, (TIFAC) Patent Facilitating Centre Schedules Forming Part of Income & Expenditure for the year ended 31.03.20

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diture for the year e	
of Income & Expen	<u>_</u>
Schedules Forming Part	ed (Patent Facilitating C
	Jule 25 - Interest Farns

Schedule 25 - Interest Earned (Patent Facilitating Ce		
Particulars	Current Year	Previous Year
Interest Earned under TIFAC Account		
1.On Term Deposits		
a) With Scheduled Banks	•	1
b) With Non-Scheduled Banks	1	1
c) With Institutions	•	1
d) Others (Interest: Scooter, LTA & Car)		308.00
Total		308.00
Particulars	Current Year	Previous Year
Interest Earned under PFC New Account		
1.On Term Deposits		
a) With Scheduled Banks	3,87,908.00	1,74,290.52
b) With Non-Scheduled Banks	•	h
c) With Institutions	•	ì
d) Others (Interest : Scooter, LTA, LTC & Car)	3,385.00	220.00
Total	3,91,293.00	1,74,510.52
Schedule 26- Other Income		
Particulars	Current Year	Previous Year
Other Income under TIFAC Account		
Other Income (Annex-8)	,	7,500.00
Total	-	7,500.00
Particulars	Current Year	Previous Year
Other Income under PFC New Account		
Other Income (Annex-8)	14,000.00	8,500.00
Total	14,000.00	8,500.00

Technology Information Forecasting And Assessment Council, (TIFAC) Patent Facilitating Centre Schedules Forming Part of Income & Expenditure for the year ended 31.03.2014

Schedule 27 - Establishment & Administrative

Particulars	Current Year	Previous Year
Establishment & Administrative Expenditure Establishment & Administrative Expenditure		53,31,339.00
Total		53,31,339.00
Particulars	Current Year	Previous Year
Establishment & Administrative Expenditure Establishment & Administrative Expenditure	122,53,098.00	53,16,389.00
Total	122,53,098.00	53,16,389.00

Schedule 28- Project Expenditure (PFC)

Particulars	Current Year	Previous Year
Project Expenditure Under TIFAC Account		
Project Expenditure (Annex-10)	•	1,70,826.00
Total	-	1,70,826.00
Particulars	Current Year	Previous Year
Project Expenditure under PFC New Account		
Project Expenditure (Annex-10)	5,46,398.00	3,43,869.00
Total	5,46,398.00	3,43,869.00

Technology Information Forecasting And Assessment Council, (TIFAC) Scholarship for Women Scientists

Schedules Forming Part of Income & Expenditure for the year ended 31.03.2014

Schedule 29 - Grants / Subsidies (Scholarship for Women Scientists) (Irrevocable Grants & Subsidies Received)	omen Scientists) (Irrevocable Grants &	& Subsidies Received)
Particulars	Current Year	Previous Year
Grant Received under TIFAC Account		
1. From Central Government		
2. Scholarship for Women Scientists Grants		
a) Grants in Aid (Plan)	ı	100,00,000.00
b) Grant in Aid (Non-Plan)	1	1
3. State Government(s)	ı	ı
4. Government Agencies	1	1
5. Institutions Organisatins	1	1
6. International Organisations	1	1
7. Other (Specify)	•	1
Total	·-	100,00,000.00
Particulars	Current Year	Previous Year
Grant Received under SFWS New Account		
1. From Central Government	•	ı
2. Scholarship for Women Scientists Grants		
a) Grants in Aid (Plan)	220,00,000.00	ī
b) Grant in Aid (Non-Plan)		ī
3. State Government(s)	ä	r
4. Government Agencies	•	,
	ì	T
6. International Organisations	ř	1
7. Other (Specify)		1
Total	220,00,000.00	•

Schedules Forming Part of Income & Expenditure for the year ended 31.03.2014 Technology Information Forecasting And Assessment Council, (TIFAC) Scholarship for Women Scientists

Schedule 30- Other Income (SWS)		
Particulars	Current Year	Previous Year
Other Income under TIFAC Account		
Other Income	1	
Total		i
Particulars	Current Year	Previous Year
Other Income under SFWS New Account		
Interest on Savings Account	1,21,480.00	70,007.00
Interest (Staff Advance)	184.00	230.00
Total	1,21,664.00	70,007.00

Technology Information Forecasting And Assessment Council, (TIFAC) Scholarship for Women Scientists

Schedules Forming Part of Income & Expenditure for the year ended 31.03.2014 Schedule 31 - Expenditure (SWS)

Particulars	Current Year	Previous Year
Expenditure under TIFAC Account		
Scholorship for Women Scientist	ì	5,71,592.00
Advertisement, Written Examination	i.	27,36,453.00
Salary for Training Assistant	ă.	80,580.00
Salary for Training Coordinator	î.	4,66,900.00
Contingencies		T
Faculty Honorarium and Travel for	i.	T.
TA/DA for Aftending Orientation	i.	T.
Workshops and Training	i,	ì
Ad-Hoc Bonus	Section 1985	T .
Total		38,55,525.00
Particulars	Current Year	Previous Year
Project Expenditure under SWS New Account		
Scholorship for Women Scientist	123,88,939.00	17,99,034.00
Advertisement, Written Examiation	i.	5,66,162.00
TA/DA for Attending Orientation	1,231.00	50,249.00
Computers	5,00,000.00	
Orientation Programme		8,71,808.00
Faculty Honorarium and Travel for Orentation &	36,523.00	2,91,771.00
Workshop and Training	6,89,449.00	ī
Overheads	2,80,027.00	5,218.00
Salary of Accounts Assistant	1,80,000.00	89,032.00
Salary of Data Entery Operator	1,47,934.00	00:000:99
Salary for Training Assistant	1,48,356.00	69,454.00
Salary for Training Coordinator	2,77,360.00	1,15,654.00
Ad-Hoc Bonus	10,362.00	r
Total	146,60,181.00	39,24,382.00



Technology Information Forecasting And Assessment Council, (TIFAC)

Balance Sheet as at 31.03.2014

	Schedule	Current Year	Previous Year
CORPUS / CAPITAL FUND AND LIABILITIES			
Corpus / Capital Fund (Under TIFAC Main Account)	Schedule I	3125,97,540.31	3476,06,259.99
Corpus/Capital Fund (Under PFC New Account)	Schedule 1	121,67,042.84	95,61,245.84
Corpus/Capital Fund (Under SFWS New Account)	Schedule I	84,87,082.00	10,25,599.00
Reserves and Surplus	Schedule 2	-	F
Earmarked / Endowment Funds	Schedule 3	-	-
Secured Loans and Borrowings	Schedule 4	-	-
Unsecurred Loans and Borrowings	Schedule 5	-	-
Deferred Credit Liabilites	Schedule 6	~	-
Current Liabilites and Provisions	Schedule 7	544,70,118.99	560,17,813.99
Total		3877,21,784.14	4142,10,918.82
Assets			
Fixed Assets (Net)	Schedule 8	740,17,126.44	819,84,481.95
Investments-From Earmarked / Endowment Funds	Schedule 9	~	=
Investments-Others	Schedule 10	-	æ
Current Assets, Loans, Advances etc.	Schedule 11	3137,04,657.70	3322,26,436.87
Miscellaneous Expenditure			
(to the extent not written off or adjusted)			
Total		3877,21,784.14	4142,10,918.82
Significant Accounting Policies and Notes on Accounts	Schedule 32		
Contingent Liabilities	Schedule 33		

As per our report of even date Annexed herewith

For Anil Bhatla & Company

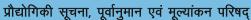
Chartered Accountants

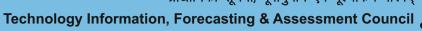
FRN: 012686N

Sd/-Sd/-Sd/-Sd/-Ch.Chandra Sekhar PatroAccounts OfficerRegistrarExecutive DirectorPartnerTIFACTIFACTIFAC

Membership No.091529

Date : 22.09.2014 Flace : New Delhí







Technology Information Forecasting And Assessment Council, (TIFAC)

Income & Expenditure Account for the Year Ended 31.03.2014

	Schedule	Current Year	Previous Year
Income			
Income from Sales / Services	Schedule 12	~	=
Grants / Subsidies	Schedule 13	816,22,000.00	2057,50,000.00
Fees / Subscriptions	Schedule 14	18,024.00	9,778.00
Income from Investments	Schedule 15	-	=
Income from Royalty, Publication etc	Schedule 16	77,634.00	1,05,778.00
Interest Earned	Scheduel 17	189,22,653.00	156,92,182.00
Other Income	Schedule 18	3,20,951.00	1,43,699.00
Increased/(Decrease) in stock of Finished Goods and Works-in-Progress	Schedule 19	-	=
Refund from Projects	Schedule 20	310,36,084.24	459,33,449.24
Total (A)		1319,97,346.24	2676,34,886.24
Expenditure			
Establishment & Other Administrative Expenses	Schedule 21	932,52,407.76	799,08,224.71
Expenditure on Grant, Subsidies etc	Schedule 22	949,56,281.65	1066,02,008.00
Interest	Schedule 23	-	=
Depreciation (Net Total at the Year end)	Schedule 8	87,97,376.51	95,84,578.86
Total (B)		1970,06,065.92	1960,94,811.57
Balance being excess of Income over Expenditure (A-B)			715,40,074.67
Balance being excess of Expenditure over Income (A-B)		650,08,719.68	
Transfer to Special Reserve (Specify each)			
Transfer to / from General Reserve			
Balance Being Surplus (Deficit) carried to Corpus/Capital Fund		650,08,719.68	715,40,074.67
Significant Accounting Policies & Notes on Accounts	Schedule 32		
Contingent Liabilities	Schedule 33		

As per our report of even date Annexed herewith

For Anil Bhatla & Company

Chartered Accountants

FRN: 012686N

Sd/- Sd/- Sd/- Sd/-

Ch.Chandra Sekhar Patro Accounts Officer Registrar Executive Director
Partner TIFAC TIFAC TIFAC TIFAC

Membership No.091529

Date : 22.09.2014 Flace : New Delhi



Technology Information Forecasting And Assessment Council, (TIFAC)

Patent Facilitating Centre (Under TIFAC Main Account)

Income & Expenditure Account for the Year Ended 31.03.2014

	Schedule	Current Year	Previous Year
Income			
Grants / Subsidies	Schedule 24	~	=
Interest Earned	Schedule 25	~	308.00
Other Income	Schedule 26	~	7,500.00
Refund from Projects			
Total (A)		2	7,808.00
Expenditure			
Establishment Expenditure / Administrative Expenditure	Schedule 27	~	53,31,339.00
Project Expenditure	Schedule 28	~	1,70,826.00
Total (B)		٧	55,02,165.00
Balance being excess of Income over Expenditure (A-B) Balance being excess of Expenditure over Income (A-B)			(54,94,357.00)
Balance being Surplus/Deficit transferred to Corpus / Capital Fund			(54,94,357.00)

As per our report of even date Annexed herewith

For Anil Bhatla & Company

Chartered Accountants

FRN: 012686N

 Sd/ Sd/ Sd/ Sd/

 Ch.Chandra Sekhar Patro
 Accounts Officer
 Registrar
 Executive Director

 Partner
 TIFAC
 TIFAC
 TIFAC

Membership No.091529

Date: 22.09.2014 Flace: New Delhi

Technology Information Forecasting And Assessment Council, (TIFAC) Patent Facilitating Centre (Under PFC New Account)

Income & Expenditure Account for the Year Ended 31.03.2014

	Schedule	Current Year	Previous Year
Income			
Grants / Subsidies	Schedule 24	150,00,000.00	150,00,000.00
Interest Earned	Schedule 25	3,91,293.00	1,74,510.52
Other Income	Schedule 26	14,000.00	8,500.00
Refund from Projects			
Total (A)		154,05,293.00	151,83,010.52
Expenditure			
Establishment Expenditure / Administrative Expenditure	Schedule 27	122,53,098.00	53,16,389.00
Project Expenditure	Schedule 28	5,46,398.00	3,43,869.00
Total (B)		127,99,496.00	56,60,258.00
Balance being excess of Income over Expenditure (A-B)		26,05,797.00	95,22,752.52
Balance being excess of Expenditure over Income (A-B)			
Balance being Surplus/Deficit transferred to Corpus / Capital Fund		26,05,797.00	95,22,752.52

As per our report of even date Annexed herewith

For Anil Bhatla & Company

Chartered Accountants

FRN: 012686N

 Sd/ Sd/ Sd/ Sd/

 Ch.Chandra Sekhar Patro
 Accounts Officer
 Registrar
 Executive Director

 Partner
 TIFAC
 TIFAC
 TIFAC

Membership No.091529

Date : 22.09.2014 Flace : New Delhí

Technology Information Forecasting And Assessment Council, (TIFAC) Scholarship for Women Scientists (Under TIFAC Main Account)

Income & Expenditure Account for the Year Ended 31.03.2014

	Schedule	Current Year	Previous Year
Income			
Grants / Subsidies	Schedule 29	÷	100,00,000.00
Other Income	Schedule 30	-	~
Refund from Projects			
Total (A)		2	100,00,000.00
Expenditure			
Expenditure	Schedule 31	-	38,55,525.00
Total (B)		3	38,55,525.00
Balance being excess of Income over Expenditure (A-B) Balance being excess of Expenditure over Income (A-B)			61,44,4 75.00 -
Balance being Surplus/Deficit transferred to Corpus / Capital Fund			61,44,475.00

As per our report of even date Annexed herewith

For Anil Bhatla & Company

Chartered Accountants

FRN: 012686N

Sd/-Sd/-Sd/-Sd/-Ch.Chandra Sekhar PatroAccounts OfficerRegistrarExecutive DirectorPartnerTIFACTIFACTIFAC

Membership No.091529

Date : 22.09.2014 Flace : New Delhí

Technology Information Forecasting And Assessment Council, (TIFAC) Scholarship for Women Scientists (Under Scholarship for Women Scientist New Account)

Income & Expenditure Account for the Year Ended 31.03.2014

	Schedule	Current Year	Previous Year
Income			
Grants / Subsidies	Schedule 29	220,00,000.00	-
Other Income (Interest Earned)	Schedule 30	1,21,664.00	70,237.00
Refund from Projects			
Total (A)		221,21,664.00	70,237.00
Expenditure			
Expenditure	Schedule 31	146,60,181.00	39,24,382.00
Total (B)		146,60,181.00	39,24,382.00
Balance being excess of Income over Expenditure (A-B)		74,61,483.00	
Balance being excess of Expenditure over Income (A-B)			38,54,145.00
Balance being Surplus/Deficit transferred to Corpus / Capital Fund		74,61,483.00	38,54,145.00

As per our report of even date Annexed herewith

For Anil Bhatla & Company

Chartered Accountants

FRN: 012686N

Sd/-Sd/-Sd/-Sd/-Ch.Chandra Sekhar PatroAccounts OfficerRegistrarExecutive DirectorPartnerTIFACTIFACTIFAC

Membership No.091529

Date : 22.09.2014 Flace : New Delhi

TECHNOLOGY INFROMATION FORECASTING AND ASSESSMENT COUNCIL (TIFAC) (REGULAR) SCHEDULES FORMING PART OF BALANCE SHEET AS AT 31.03.2014

SCHEDULE S-ENED ASSETS.	Rate of Depreciati on	Rate of Cost / v aluation As Depreciati at beginning of the on year	Additions during the year	Deductions during the year	Cost /valuation at the As at the beginning year end of the year	As at the beginning of the year	On during the year	Total upto the year end	As at the current year end	As at the previous year end
A. FIXED ASSETS			*	٠	•	•		9		3
1. LAND			ť	٠	٠	٠	ŧ	٠	÷	ť
a) Freehold		•	ŧ.	•	·.	•	•	· C	•	6
b) Leasehold		3	11	•	•			9		
2. BUILDING			r	•	*	٠		÷	*	C
a) On Freehold Land		380	Ж		*		•	ě		1
b) On Leasehold Land		9.	ť	·	i	•	•	i		•
c) Ownership Flats/Premises		. 100	. *		199				F	
d) Superstructures on Land not belonging to the entity	10.00	00'000'05'8211	¥	*	1178,50,000.00	721,92,495.38	45,65,750.46	767,58,245.84	410,91,754.16	456,57,504.62
e) Interior work of TIFAC Building	10.00	524,42,121.00	34,786.00	*	524,76,907.00	209,45,190.29	31,51,533.47	240,96,723.76	283,80,183.24	314,96,930.71
3. PLANTMACHINERY & EQUIPMENT: Fire Alarm System at TIFAC Building & Fire Extinguishers	15.00	10,50,258.00	13,440.00	U)	10,63,698.00	4,72,268.52	88,714.43	5,60,982.95	5,02,715.05	5,77,989.48
4. VEHICLES			x		*	ı	,	¥	t	•
5. FURNITURE & FIXTURES	10.00	17,92,852.60	5,000.00	t	17,97,852.60	13,96,490.09	39,886.25	14,36,376.34	3,61,476.26	3,96,362.51
6. OFFICE EQUIPMENT	15.00	227,41,376.58	73,270.00	14,900.00	227,99,746.58	191,44,152.17	5,48,209.60	196,92,361.77	31,07,384.81	35,97,224.41
7. COMPUTER/PERIPHERALS	00'09	82'029'92'09	6,66,866.00	•	67,02,486.28	57,78,682.06	3,72,925.30	61,51,607.36	5,50,878.92	2,56,938.22
8. ELECTRIC INSTALLATIONS			*			•	•			•
9. LIBRARY BOOKS	100.00	55,13,775,55	51,559.00		55,65,334.55	55,12,243.55	30,357.00	55,42,600.55	22,734.00	1,532.00
10. TUBEWELL & W.SUPPLY							÷	-	-	•
11. OTHER EIXED ASSETS		(5)	. *		175			·*		•
TOTAL OF CURRENT YEAR		2074,26,004.01	8,44,921.00	14,900.00	2082,56,025.01	1254,41,522.06	87,97,376.51	1342,38,898.57	740,17,126.44	819,84,481.95
PREVIOUS YEAR		2067,84,755.01	6,41,249.00		2074,26,004.01	1158,56,943.20	95,84,578.86	1254,41,522.05	819,84,481.95	909,27,811.81
B. CAPITAL WORK IN PROGRESS										

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Annexure - 1

Staff Advances

PARTICULARS	Current Year	Previous Year
Staff Advances under TIFAC Account		
A) Staff Advances		
Sh. Bipin Kumar	c .	500.00
Anil Kumar Rai	5,000.00	10,000.00
Sh.Surender Prasad	500.00	6,500.00
Sh.Sushil Kumar Jha	10,000.00	5,500.00
Ms. Mercy Kutty	2,500.00	8,500.00
Sh.Arghya Sardar	5,000.00	-
Sh.Surender Kumar	9,000.00	3,000.00
Ms. Geeta Nair	500.00	6,500.00
Dr. Gautam Goswami		7,000.00
Dr. P.K.Anil Kumar	5.	9,000.00
Ms.Uma Daral	6,000.00	4,000.00
Sh. Bishram Bhakta	9,500.00	5,000.00
Sh.Ravinder Kumar (Manager)	2,000.00	3,000.00
Sh.Sanjay Sundriyal	4,000.00	10,000.00
Sh.Pankaj Sundriyal	7,000.00	13,000.00
Ms. Asha Kumari	11,000.00	
Ms. Sujatha R	a a	8,000.00
Ms.Padma Manral	4,500.00	10,000.00
Sh.Dilip Kumar	8,000.00	552
Sh.Ravinder Kumar Sundriyal	5,000.00	500.00
B) HBA Advance		
Ms. Sangeeta Baksi	5,44,200.00	5,94,600.00
Dr.Debabrata Majumdar	5,30,000.00	5,90,000.00
Sh.P.R.Basak	2,13,000.00	2,85,000.00
C) Car Advance		
Dr.Gautam Goswami	30,000.00	48,000.00
Dr.S.K.Goel	•	3,600.00
Sh.T.Chandrasekhar	1,26,000.00	1,36,800.00
Ms. Achla Khanna	1,80,000.00	2 3
Ms.Sangeeta Baksi	64,000.00	88,000.00
Total (i)	17,76,700.00	18,56,000.00

Annexure - 1

Staff Advances

PARTICULARS	Current Year	Previous Year
Staff Advances under TIFAC Account		
D) Leave Travel Concessation		
Sh.Shushil Kumar Jha		8,100.00
Sh.P.R.Basak	1,14,400.00	w)
Sh.S.Basu	8,500.00	Œ
Sh.M. Suresh Babu	53,600.00	-DX
E) Tour Advance		
Sh.Sajid Mubashir	81,042.00	81,042.00
Dr. Gautam Goswami	822.00	=
Sh.T.Chandrasekhar	e e	45,000.00
Sh.Anil Kumar Rai	•	566.00
F) Scooter Advance		
Sh.T.Adarsh Mayya	*	1,000.00
Sh.Aneesh S	4,500.00	10,500.00
Sh.Bishram Bhakta	10,000.00	16,000.00
Ms. Geeta Nair	25,000.00	Θ.
Sh.Sushil Kumar Jha	18,800.00	140
Sh.Ravindra Kumar (Assistant Manager)	22,500.00	70
Sh.Sanjay Sundriyal	16,500.00	22,500.00
G)Computer Advance		
Sh.Mahipal Singh Rawat	22,000.00	28,000.00
Sh.Suresh Somanchi	15,000.00	27,000.00
Sh.Aneesh S	21,000.00	=0
Sh.Anil Kumar Rai	23,000.00	50
Sh.Sushil Kumar Jha	27,500.00	₩
Sh. Ravi Dutt	30,000.00	Ψ)
Sh Deep Prakash	53,500.00	70,000.00
Total (ii)	5,47,664.00	3,09,708.00
Total (i) + (ii)	23,24,364.00	21,65,708.00

Annexure - 1

PARTICULARS	Current Year	Previous Year
Staff Advances under PFC New Account		
a) Staff Advance		
Sh.Ranbir Singh		500.00
b) Car Advance		
Sh.Suresh Kumar K	a a	18,000.00
c) Scooter Advance		
Sh.Ranbir Singh	18,000.00	E
d) Computer Advance		
Sh.Yashwand Dev Panver	43,125.00	50,625.00
e) Leave Trave Concession Advance		
Sh.Shambhu Kumar	i a	18,000.00
Total	61,125.00	87,125.00

Annexure - 1

PARTICULARS	Current Year	Previous Year
Staff Advances under SFWS New Account		
a) Staff Advance		
Sh.Seepak Taneja	-	4,000.00
Total	5.	4,000.00

Annexure –2

REFUND FROM PROJECTS (TIFAC REGULAR ACCOUNT)

PARTICULARS	Current Year	Previous Year
(A) Home Grown Technology :		
Pilot Plant for Production of Silicon Iron Casting	5.	1,75,000.00
Manufacturing Plant for Heat Pipe Based Heat Sinks	4	6,20,000.00
Manufacturing of Briquetted Coal from Agriculture Waste	-	56,000.00
Commercialisation of Bio Technology in India	5.	2,50,000.00
Commercialisation of Pelletisation Technology for Biomass & Combustible Waste	2,24,000.00	Ε.
Manufacture of Red Mud/Fly Ash Polymer Door Shutters	1,00,000.00	2,20,000.00
Flexible Machining Centre	7,20,000.00	52
Manufacture of Unsturated Polyster Resin	2,50,000.00	Ε.
Manufacturing of Jute Coir Gromaterials	90,00,000.00	Ψ)
Estraction of Flacouring compounds from Hops using Lequid CO2 under High Pressure	5.	12,50,000.00
Sub Total (A)	102,94,000.00	25,71,000.00
(B) Advanced Composites Programme		
Composite Interiors for Drivers Cabin in Diesel Locomotive	-	6,87,120.00
Development of Energy Efficient Azial Flow FRP Fans	28,73,004.00	26,33,587.00
Development of Composite Sky Bus Coaches	5,00,000.00	27,75,000.00
High Speed Planing Type Composite Boats	18,04,800.00	18,04,800.00
Development of Composite Artificial Limbs	2	2,00,000.00
Development of Composite Optical Fiber Cable	15,00,000.00	10,00,000.00
Composites Interiors for Railways Passenger Coaches	.	21,48,000.00
Development of Filament Wound Pipes & Pipe Fitting for oil & Gas Sector	30,72,000.00	35,84,000.00
FRP Bracket Assembly for Railways Electric Traction	19,77,216.00	19,77,216.00
Development of Filament Wound Venturi Scrubber along with the Accessories	12,90,000.00	38,70,000.00
Sub Total (B)	130,17,020.00	206,79,723.00

Annexure –2

REFUND FROM PROJECTS (TIFAC REGULAR ACCOUNT)

PARTICULARS	Current Year	Previous Year
(C) Sugar Technology Mission		
Ethyl Lactate Project	.	83,00,000.00
Sub Total (C)	0-	83,00,000.00
(D) Tepp Project		
Reconfigurable Autonomous Air Vihicle	49,185.00	- EX
Sub Total (D)	49,185.00	-
(E) Fly Ash Utilization Programme		
Bulk Production of Fly Ash Bricks	10,000.00	30,000.00
Sub Total (E)	10,000.00	30,000.00
(F)REFUND FROM PROJECT TECHNOLOGY VISION 2020		
Processing & Export of Loin & Steak of Yellow Fin Tuna	6,66,192.24	6,66,192.24
Environmental Geomatics	2	75,835.00
Standardization of Bacopa Monnieri Extract for its Cogniting		27,60,000.00
Bio Transformation of Meso Cyclopents 14 Diacetate to 4-Rhydrozycyclopent -ENE-1-(S) Acetate	9,24,000.00	9,24,000.00
Use of Straight Vegetable Oils in IC Engins	2	42,24,935.00
CAR: Hydro Forming and Tailor elding Blanks Technology For Weight Reduction Using Hing Strenght		15,01,764.00
Process Development Semi Solid Forming & Spueeze Casting Aluminium Alloy Components for Automobile	18,75,687.00	
Enzymatic Conversion of Reemic Molecules to Obtain stercopecific Active Pheamaculical	42,00,000.00	42,00,000.00
Sub Total (F)	76,65,879.24	143,52,726.24
Total (A) + (B) + (C) + (D)+ (E) + (F)	310,36,084.24	459,33,449.24

Annexure 3

Establishment Expenditure (TIFAC Regular)

PARTICULARS	Current Year	Previous Year
a) Salaries	388,39,823.00	335,45,274.00
Salary - Consolidated	40,68,960.00	25,98,201.00
Ad-hoc Bonus	1,13,982.00	1,19,168.00
b) TIFAC Contribution to New Pension Scheme	2,38,407.00	1,21,155.00
c) TIFAC Contribution to Provident Fund	16,15,910.00	20,30,136.00
d) Others (Specify)		
Hospitalsation Expenses	26,96,130.00	3,87,191.00
Consultancy Fee	.	5,000.00
Honorarium	92,000.00	32,000.00
Medical Expenses	14,27,700.00	13,02,926.00
Leave Travel Concession	8,50,449.00	11,37,645.00
Gratuity	9,47,683.00	2,18,560.00
Leave Encashment	14,03,605.00	4,37,160.00
Tution Fee	7,73,904.00	7,55,838.00
Total	530,68,553.00	426,90,254.00

Annexure 4

Administrative Expenses (TIFAC Regular)

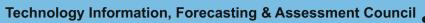
PARTICULARS	Current Year	Previous Year
Repair and Maintenance	8,79,403.00	12,96,421.00
Rent, Rates and Taxes	4,90,100.00	5
Car hire Charges	18,36,217.00	20,98,965.00
Postage, Telephone and Communication Charges	16,45,377.00	20,09,681.00
Printing, Stationary & Printing of Publications	11,74,925.00	14,18,121.00
Travelling and Conveyance Expenses	3,55,838.00	2,82,593.00
Subscription Expenses	1,68,497.00	1,44,123.26
Auditors Remuneration	70,598.00	58,922.00
Manpower Assessment Study of TIFAC	2,50,000.00	ω.
Advertisement and Publicity	21,41,591.00	4,34,234.00
Others (Specify)		
Bank Charges	10,461.76	2,821.45
Misc. Office Expenses	23,27,961.00	8,60,598.00
Membership Fee	84,417.00	45,115.00
Maintenance of Vishwakarma Bhavan	122,89,329.00	131,62,041.00
Legal Charges	13,45,899.00	14,75,946.00
WAITRO Membership	52,682.00	22,770.00
Rajabhasha Commíttee Meeting	1,23,020.00	2,62,484.00
Court Fee	87,500.00	=
Housekeeping of TIFAC Building	8,91,802.00	8,27,150.00
Total	262,25,617.76	244,01,985.71

Annexure-5

PROJECT EXPENSES (TIFAC Regular Account)

PARTICULARS	Current Year	Previous Year
(a) Follow-Up Action/Special Initiatives		
Determinants and Impact of FDI in R&D in creation & Deffusion of Knowlegge in Automobile Industires	-	4,00,000.00
Initiating Technology Road Map Exercise for Indian Aluminium Sector	3,00,000.00	
Study : Relationship Between GDP Growth and Technology Causes in Different Districts of Select Indian	10,50,000.00	-0
Study on Technology Foresight on Solar PV	18,98,600.00	(-)
Study on Teaninongy Foreign ton Solar F* Study on Indian Chemical Industry Technology Imperatives & Business Opportunities covering Knowledge	-	8,65,322.00
Sub-Total (a)	32,48,600.00	12,65,322.00
(b) IIASA - TIFAC Projects/Study/Membership Fee		
IIASA - TIFAC joint Workshop (TIFAC)	14,42,256.00	5,22,071.00
India - IIASA MemberShip Fee	247,95,399.00	232,58,899.00
TIFAC-IIASA Study on Indian Perspectives on Global Energy Scenarios till 2050	-	1,93,000.00
TIFAC-IIASA on chaning land use & Environmental Implicatins under the emerging economic climatic seenario	1,30,407.00	2,15,000.00
IIASA-TIFAC : Climate Change Adaptation Approachs for Sustainable Livelihood With IRMA.	20,00,000.00	-
India-IIASA Study on Evaluation of Soil Nutrient Budgets at Field Farm and Regional Leel in Humid Tropics	15,00,000.00	-
TIFAC-IIASA Study on Integrated Hydrology Climate Change and Integrated Water Resources Management	15,00,000.00	*
TIFAC-IIASA Study on Development & Application of Gains-City Model for Indian Cities with Neeri Mumbai	20,00,000.00	-
TIFAC - IIASA Study : Analyzing Forest Carbon Accounts for Sustainable Policy Opt. Special Ref. Livelihood	5,36,191.00	e
IIASA - TIFAC Support for Indian YSSP Participation for 2011 at IIASA. Lazenburg	-	3,80,269.00
Sub-Total (b)	339,04,253.00	245,69,239.00
(c) HOME GROWN TECHNOLOGIES		
Project related expenses	61,905.00	74,607.00
Sub-Total (c)	61,905.00	74,607.00
(d) TePP PROJECTS		
TePP Expenditure	31,345.00	
Sub-Total (d)	31,345.00	-

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Annexure-5

PROJECT EXPENSES (TIFAC Regular Account)

PARTICULARS	Current Year	Previous Year
(e) Technology Refinment Marketing Programme (TREMAP)		
TREMAP Expenditure	2,84,082.00	2,61,913.00
TREMAP TCFA at VIT-TBI, Vellore	7,50,000.00	11,00,000.00
TREMAP: System for Accurate Guide Wire Positioning		2,50,000.00
TREMAP TCFA at MSRSAS, Bangalore	10,96,784.00	6,00,000.00
TREMAP: National Awards to Commercializable Patents	40,00,000.00	-
TREMAP : Surgical Limb Positioner	₹.	46,602.00
TREMAP at Π-BHU, Varanasi	12,33,374.00	6,00,000.00
TREMAP: Low Energy Dental / Medical Aspirator		79,000.00
TREMAP: Non Electric Water Level Indicator	-	90,000.00
TREMAP: TCFA at Techno Park - Technology Business Incubator, Trivandrum	3,34,821.00	4,86,018.00
TREMAP: Study at TCFA at CTE Udaípur, Rajasthan	4,97,593.00	4,86,445.00
TREMAP: TCFA at KIIT - BI, Bhubaneswar		16,83,525.00
TREMAP : Sound Wave Airway Sensor	-	65,967.00
TREMAP: TCFA at EDC, NCL Innovation Park, Pune	7,45,070.00	11,95,241.00
TREMAP : Plasma Expressor Manually operated Top & Bottom	72,000.00	
TREMAP : Peeling Device (Machine) for Banana Stem	-	60,000.00
TREMAP: Mini Concrete Mixing Machine	ž	1,65,000.00
TREMAP : Automated Scan Lock	•	5,00,000.00
TREMAP : Sun Directohot Water System (Heater)		3,00,000.00
TREMAP : Bicycle Parts Cluster in Ludhiana, Panjab	•	4,90,192.00
TREMAP : Jet Nozzle Regulator and Accelerator Control Kit	ž	3,18,500.00
TREMAP : Passive Hybride Harmonic Filter	•	13,997.00
TREMAP : Suraksha : LPG and Gas Detection Device wigh SMS Alert		2,40,000.00
TREMAP : Nimble Carpet Shearign Machine	•	2,10,000.00
TREMAP : Supraglottic Airway Device for Airway Management	ž	2,00,000.00
TREMAP: FAUCETS (with Independent Control for Flow And Temperature)	c .	1,50,000.00
TREMAP: A Device for Four Wheeler Driving Machinism though Hand for Physically Challenged Person	-	1,80,000.00
TREMAP: Biomass Cook Stove Using Natural Draft: BCS-ND	•	24,000.00
TREMAP: Improved Wonnowing Fan	ž.	40,000.00
TREMAP : Door Bolt System	₹.	1,50,000.00
TREMAP : Segmental Interlocking Bolt a New Implant System for Fracture Neck of Femur	•	1,97,500.00
TREMAP : Cashewnut Fine Peeler Machine		90,000.00
TREMAP : Pen/Pencil for Filing OMR Sheet		1,20,000.00
Side view mirror adjustment and protection system	2	60,000.00
Sub-Total (e)	90,13,724.00	104,53,900.00

Annexure-5

PROJECT EXPENSES (TIFAC Regular Account)

PARTICULARS	Current Year	Previous Year
(f) Revolving Fund (SIDBI)		
Earmarked fund to be released to SIDBI	300,00,000.00	450,00,000.00
Sub-Total (f)	300,00,000.00	450,00,000.00
(g) Project Related Expenditure		
Exhibition/Workshop International	45,000.00	
Meeting Expenditure (Project Related)	18,15,354.00	8,15,822.00
Meeting Expenditure	5,98,354.00	4,91,494.00
Travel Abroad	2,87,910.00	2,30,502.00
Travel Expenditure (Project Expediture	33,31,280.00	39,96,187.00
Travel Expenditure	2	1,09,678.00
Workshop Expenditure	13,91,770.65	9,47,802.00
Travel on Workshop and Others etc	•	14,804.00
Indo Israeli Workshop	2	71,736.00
Sub-Total (g)	74,69,668.65	66,78,025.00
Total (a) to (g)	837,29,495.65	880,41,093.00

Annexure -6

EXPENDITURE OF VISION 2020

PARTICULARS	Current Year	Previous Year
Establihment & Administrative Expenditure		
Misc Office Expenses	9,698.00	36,657.00
Periodical & Magazine Charges	387.00	÷
Hospitalisation Expenses	3,25,645.00	24,601.00
Printing Charges	27,400.00	11,600.00
Repair and Maintenance	23,846.00	28,459.00
Ad-hoc Bonus	34,540.00	31,086.00
Employers Contribution CPF	4,94,230.00	1
Medical Reimbursement	4,71,530.00	2,70,213.00
Salary	119,53,251.00	119,09,147.00
Leave Travel Concession	3,37,944.00	2,73,492.00
Honorarium	-	7,500.00
Tution Fee	2,38,623.00	1,71,738.00
Leave Encashment	17,809.00	51,492.00
Legal Charges	23,334.00	á
Total	139,58,237.00	128,15,985.00

Annexure – 6A

PROJECT EXPENDITURE OF VISION 2020

PARTICULARS	Current Year	Previous Year
(a) Agriculture Sector		
Promotion of Medicinal and Aromatic Plants in Paliganj Area, Patna	₹.	26,960.00
Demonstration of Agriculture Diversification through Aromatic Plant Cultivatio at Deoria	-	37,979.00
Demonstration of system Approach in selected low Productivity Regions of Deoria, District	-	17,489.00
On Farm Demonstration, Popularizaion, Commerciatization & Processing of Mentha Cultivation in Barabanki District of U.P	-	3,85,755.00
Enhancment of Farm Income of Farmers of Eastern Uttar Pradesh from Added Scented Rice (Kalanamak)	-	3,13,591.00
Improved seed Production and Multiplication at Paliganj, Patna	•	60,380.00
On Farm Demonstration, Commercial Cultivation of Trichoderma as bio pesticide & growth Promoter	•	1,07,993.00
Sub-Total (a)	×-	9,50,147.00

Annexure – 6A

PROJECT EXPENDITURE OF VISION 2020

PARTICULARS	Current Year	Previous Year
(b) Targeted Programme in Other Important Area		
Setting up an Aseptic Pulp processing cum packaging plant at malda	•	38,874.00
Fashion Design Technology Gap analysis study of readymade garments cluster in Tirupar, Tamilnadu	-	1,65,000.00
Technology Gap Analysis Study in readymade garments industries cluster in Delh/NCR Region		2,75,000.00
Technology Gap Analysis Study in Textile Cluster, Panipat		4,75,000.00
Technology Gap Analysis study for the Mini Gas Cylinder Cluster in Meerut	-	70,000.00
Technology Gap Analysis Study for the sewing machine cluster in Ludhiana	4	4,66,556.00
Technology Gap Analysis Study for the voltage stabilizer cluster in Meerut	-	70,000.00
Technology Gap Analysis Study for the Plastics cluster in Mumbai	•	4,75,000.00
Technology Gap Analysis Study of Handmade Industry Cluster, Jaipur	ž	21,120.00
Technology Gap Analysis study for the Electronics Cluster in Mohali		70,000.00
Development for Novel Processing in isolating standardized extract of Aloc Vera and its applications Diabetes	-	6,58,000.00
CAR: Demonstration of the Competence	3,24,000.00	-
R&D Centre for Howrah	33,45,766.00	-
Development of Enzymatic Process for producing Slevioside from Stevia Leaves & Lycopena from Tometoo	4,75,000.00	_
Technology Gap Analysis Study in Pr	2,70,000.00	-
Technology Status Gap Analysis Study	1,50,000.00	-
Technology Gap Analysis Study for Surgical Instruments Manufacturing Unit Cluster for Baruípar	-	48,000.00
E-Court Room : Document Cum Evidence Management System (DEMS)	-	32,71,000.00
E-Court Room Digital Recording & Retrieval System (E-DRRS)		22,66,000.00
Development of Enzymatic Process for waste reduction in Potato Processing		9,73,800.00
Sub-Total (b)	45,64,766.00	93,43,350.00

Annexure – 6A

PROJECT EXPENDITURE OF VISION 2020

PARTICULARS	Current Year	Previous Year
(d) Project Related Expenditure		
Meeting Expenditure (Project Related)	23,537.00	4,215.00
Travelling Expediture (Project Related)	18,55,305.00	21,66,662.00
Workshop Expenditure	4,69,000.00	12,000.00
Traveling on Workshop and Others etc	1,93,894.00	7,530.00
Meeting Expenditure	75,993.00	=
Sub-Total (d)	26,17,729.00	21,90,407.00
TOTAL (a) to (d)	71,82,495.00	124,83,904.00

Annexure -7

Technology Vision 2035

PARTICULARS	Current Year	Previous Year
Expenditure:		
Brainstroming Meeting Vision 2035	13,10,207.00	30,63,904.00
Misc Office Expenses	5,072.00	-
Printing Charges	3,077.00	
Honorarium	3,53,500.00	=
Project Related Expenditure		
Meeting Expediture (Project Expenditure)	5,20,112.00	3,05,065.00
Meeting Expenditure	3,00,354.00	1,56,946.00
Travelling (Project Expenditure)	15,37,969.00	21,35,218.00
Workshop Expenditure	14,000.00	4,13,898.00
Travelling Expenditure	-	1,980.00
Total	40,44,291.00	60,77,011.00



Annexure - 8

Patent Facilitating Centre

PARTICULARS	Current Year	Previous Year
Income Under TIFAC Account		
Other Income		
CD ROM Ekaswa A & B	-	7,500.00
Total	-	7,500.00
PARTICULARS	Current Year	Previous Year
Income Under PFC New Account		
Other Income		
Ekaswa CD ROM A B & C	14,000.00	8,000.00
Publications	-	500.00
	14,000.00	8,500.00

Annexure - 9

Patent Facilitating Centre

PARTICULARS	Current Year	Previous Year
Expenditure under TIFAC Account		
Establishment Expenditure		
Salary	-	21,92,944.00
Salary Consolidated	-	5,95,000.00
Medical Reimbursment		13,968.00
Honorarium	-	12,000.00
Tution Fee		19,610.00
Leave Encashment		25,355.00
Sub Total (A)	-	28,58,877.00
Administrative Expenditure		
Advertisement Expenses	-	
Bank Charges	-	-
Miscellaneous Office Expenses	=	25,018.00
Conveyance		6,704.00
Telephone & Telex	-	
Filing of Patent	.	24,25,364.00
Car Hire Charges, Annual Subscription, Periodicals & Magazines Stationery, Meeting Expenses, Traveling Expenses, Membership Etc	-	565.01
Repair & Maintenance	2	14,811.00
Sub Total (B)		24,72,462.00
TOTAL A +B		53,31,339.00

Annexure - 9

Patent Facilitating Centre

PARTICULARS	Current Year	Previous Year
Expenditure under PFC New Account		
Establishment Expenditure		
Salary	49,23,333.00	21,85,315.00
Salary Consolidated	18,47,159.00	5,11,760.00
Adhoc Bonus	10,362.00	-
Leave Encashment	39,864.00	26,431.00
Leave Travel Concession	90,668.00	79,026.00
Hospitalization Expenses	28,279.00	-
Medical Reimbursment	86,022.00	32,113.00
PFC Contribution to Provident Fund	1,90,475.00	1,68,231.00
Tution Fee	86,035.00	54,150.00
Sub Total (A)	73,02,197.00	30,57,026.00
Administrative Expenditure		
Advertisement Expenses	5,27,455.00	er e
Bank Charges	347.00	26.00
Filing Of Patent	42,25,298.00	21,80,642.00
Misc. Office Expenses	51,699.00	33,428.00
Periodical & Magazines	1,466.00	1,809.00
Repair & Maintenance	32,725.00	15,461.00
Telephone & Telex	72,424.00	24,590.00
Stationary	504.00	-
Car Hire Charges	26,672.00	≅ 2
Conveyance	12,311.00	3,407.00
Sub Total (B)	49,50,901.00	22,59,363.00
TOTAL A +B	122,53,098.00	53,16,389.00

Annexure - 10

PARTICULARS	Current Year	Previous Year
Expenditure under TIFAC Account		
Project Expenditure		
Workshop Expenditure	•	62,480.00
Traveling on Workshops & Others etc.	5 .	1,08,346.00
Total	a	1,70,826.00
PARTICULARS	Current Year	Previous Year
Expenditure under PFC New Account		
Travelling Expenses	2,07,816.00	2,17,413.00
Honorarium for Experts	36,000.00	*1
Meeting Expenses	4,970.00	=
Workshop Expenditure	2,97,612.00	1,26,456.00

Annexure-11

SHORT TERM DEPOSITS WITH BANKS

PARTICULARS	Current Year	Previous Year
Short Term Deposits		
TIFAC	1555,00,000.00	1305,00,000.00
Accrued Interest	272,24,214.00	135,88,555.00
Total	1827,24,214.00	1440,88,555.00

Annexure – 12

EXPENSES PAYABLE

PARTICULARS	Current Year	Previous Year
Expenses Payables Under TIFAC		
Salary Payable	40,15,692.00	37,91,212.00
Sh.S.S.L.Gupta	2	55,870.00
Ms. Manju Bagai	•	28,780.00
M/s DHL International	3,310.00	-
M/s. Sansanwal Travels	2	3,35,202.00
M/s. MTNL	27,241.00	55,040.00
M/s R.R.Associates	5 .	
M/s Anil Bhatla & Company	70,598.00	58,922.00
M/s Pink House Keeping	73,818.00	73,818.00
M/s Iceberg Foods Ltd, Delhi	5.	29,023.00
M/s Yatrika Travels	-	39,596.00
M/s Secular House Students & Staff Canteen	•	30,316.00
M/s K.S.Gupta And Company	.	30,337.00
M/s Balmer Lawrie & Co. Ltd., New Delhi	6,19,808.00	12,75,083.00
M/s Achievers India Solutions	-	19,428.00
M/s Mittal File Manufacturing Company, New Delhi	14,175.00	35,235.00
M/s Kendriya Bhandar, New Delhi	74,616.00	77,943.00
M/s Dogra Enterprises,New Delhi	12,835.00	-
M/s Gurusons Communications Private Limited	16,175.00	<u>-</u>
M/s Bagga Tours & Travels	2,46,128.00	-
M/s Cuisine 2000	-	19,914.00
SubTotal (A)	51,74,396.00	59,55,719.00
Expenses Payables Under TIFAC Account		
Education Cess	606.00	
Income Tax	4,84,145.00	3,06,097.00
Sub Total (B)	4,84,751.00	3,06,097.00
Total (A) + (B)	56,59,147.00	62,61,816.00

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Technology Information, Forecasting & Assessment Council



Annexure – 12

EXPENSES PAYABLE

PARTICULARS	Current Year	Previous Year
Expenses Payables Under PFC New Account		
M/s L.S.Davar & Co.		23,513.00
M/s Subramanium Natraj & Associates	45,625.00	5,715.00
M/s Lakshmi Kumaran & Sridharan	2,54,878.00	76,437.00
M/s R.K.Dewan & Co.	14,700.00	-
M/s Fox Mandal & Associates	-	29,570.00
M/s Anjan Sen & Associates		3,24,614.00
M/s Mohan Associates	21,378.00	6,950.00
M/s S.Majumdar & Co.	2,82,507.00	2,04,474.00
M/s Lall Lahiri & Salhotra	-	2,03,520.00
M/s Balmer & Lawrie	10,084.00	92,221.00
M/s Dogra Enterprises	2,310.00	50
M/s Gurusons Communications Pvt Ltd	3,666.00	=0
MTNL	1,124.00	H1
M/s World Wide News India		8,800.00
Salary Payable	5,31,664.00	3,85,375.00
Sub Total (A)	11,67,936.00	13,61,189.00
PARTICULARS	Current Year	Previous Year
Expenses Payables Under PFC New Account		
Income Tax (Salary)	55,566.00	33,800.00
Income Tax	76,489.00	72,335.00
Education Cess (Salary)	1,667.00	
	100000000000000000000000000000000000000	1,014.00
Education Cess	-	1,014.00 82.00
Education Cess Sub Total (B)	1,33,722.00	82.00
	-	82.00 1,07,231.00
Sub Total (B)	1,33,722.00	82.00 1,07,231.00
Sub Total (B) Total A+B	1,33,722.00 13,01,658.00	82.00 1,07,231.00 14,68,420.00
Sub Total (B) Total A+B PARTICULARS	1,33,722.00 13,01,658.00	82.00 1,07,231.00 14,68,420.00 Previous Year
Sub Total (B) Total A+B PARTICULARS Expenses Payables Under SFWS New Account	1,33,722.00 13,01,658.00	82.00 1,07,231.00 14,68,420.00 Previous Year
Sub Total (B) Total A+B PARTICULARS Expenses Payables Under SFWS New Account M/s Sarathi Enterprises	1,33,722.00 13,01,658.00	82.00 1,07,231.00 14,68,420.00 Previous Year 31,375.00 37,201.00
Sub Total (B) Total A+B PARTICULARS Expenses Payables Under SFWS New Account M/s Sarathi Enterprises M/s Sansanwal Travels	1,33,722.00 13,01,658.00	82.00 1,07,231.00 14,68,420.00
Sub Total (B) Total A+B PARTICULARS Expenses Payables Under SFWS New Account M/s Sarathi Enterprises M/s Chopra Audio Visual Pvt. Ltd	- 1,33,722.00 13,01,658.00 Current Year	82.00 1,07,231.00 14,68,420.00 Previous Year 31,375.00 37,201.00 3,304.00
Sub Total (B) Total A+B PARTICULARS Expenses Payables Under SFWS New Account M/s Sarathi Enterprises M/s Sansanwal Travels M/s Chopra Audio Visual Pvt. Ltd Salary Payable	1,33,722.00 13,01,658.00 Current Year	82.00 1,07,231.00 14,68,420.00 Previous Year 31,375.00 37,201.00 3,304.00 54,574.00
Sub Total (B) Total A+B PARTICULARS Expenses Payables Under SFWS New Account M/s Sarathi Enterprises M/s Chopra Audio Visual Pvt. Ltd Salary Payable Scholarship for Women	- 1,33,722.00 13,01,658.00 Current Year 66,272.00 2,02,293.00	82.00 1,07,231.00 14,68,420.00 Previous Year 31,375.00 37,201.00 3,304.00 54,574.00
Sub Total (B) Total A+B PARTICULARS Expenses Payables Under SFWS New Account M/s Sarathi Enterprises M/s Sansanwal Travels M/s Chopra Audio Visual Pvt. Ltd Salary Payable Scholarship for Women Overheads Payable	- 1,33,722.00 13,01,658.00 Current Year 66,272.00 2,02,293.00	82.00 1,07,231.00 14,68,420.00 Previous Year 31,375.00 37,201.00 3,304.00 54,574.00 9,46,130.00 - 65,975.00
Sub Total (B) Total A+B PARTICULARS Expenses Payables Under SFWS New Account. M/s Sarathi Enterprises M/s Sansanwal Travels M/s Chopra Audio Visual Pvt. Ltd Salary Payable Scholarship for Women Overheads Payable Adverisement, Written Exam and Interview	- 1,33,722.00 13,01,658.00 Current Year	82.00 1,07,231.00 14,68,420.00 Previous Year 31,375.00 37,201.00 3,304.00 54,574.00 9,46,130.00 65,975.00 11,185.00
Sub Total (B) Total A+B PARTICULARS Expenses Payables Under SFWS New Account M/s Sarathi Enterprises M/s Chopra Audio Visual Pvt. Ltd Salary Payable Scholarship for Women Overheads Payable Adverisement, Written Exam and Interview Orientation Programme	- 1,33,722.00 13,01,658.00 Current Year	82.00 1,07,231.00 14,68,420.00 Previous Year 31,375.00 37,201.00 3,304.00 54,574.00 9,46,130.00
Sub Total (B) Total A+B PARTICULARS Expenses Payables Under SFWS New Account M/s Sarathi Enterprises M/s Sansanwal Travels M/s Chopra Audio Visual Pvt. Ltd Salary Payable Scholarship for Women Overheads Payable Adverisement, Written Exam and Interview Orientation Programme Sub Total (A)	1,33,722.00 13,01,658.00 Current Year	82.00 1,07,231.00 14,68,420.00 Previous Year 31,375.00 37,201.00 3,304.00 54,574.00 9,46,130.00 - 65,975.00 11,185.00 11,49,744.00

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Earnest Money from Sugar Factories	n Sugar Factories	2
PARTICULARS	Current Year	Previous Year
Earnest Money: Sakthi Sugars Ltd	1,00,000.00	1,00,000.00
Earnest Money : Pratappur Sugar Industry Ltd	1,00,000.00	1,00,000.00
Earnest Money: RBN Sugar Mills	1,00,000.00	1,00,000.00
Earnest Money : L.H.Sugar	1,00,000.00	1,00,000.00
Earnest Money : Riga Sugar	a	1,00,000.00
Earnest Money : Jind Coop-Sugar	1,00,000.00	1,00,000.00
Earnest Money : Vishnu Sugar	1,00,000.00	1,00,000.00
Earnest Money : DSM Sugar	1,00,000.00	1,00,000.00
Earnest Money : Valsad Sugar	1,00,000.00	1,00,000.00
Earnest Money : Budhewal Co	1,00,000.00	1,00,000.00
Earnest Money : Palwal Sugar Ltd	1,00,000.00	1,00,000.00
Earnest Money : Godawari Sugar Mill	1,00,000.00	1,00,000.00
Earnest Money: Padamashri Dr. Vithalrao Vikho Patil SSK Ltd	1,00,000.00	1,00,000.00
Earnest Money : Mawana Sugar	1,00,000.00	1,00,000.00
Earnest Money: EID Parry, Pugalur	1,00,000.00	1,00,000.00
Earnest Money : Vishwas Rau Naik SSK Ltd	1,00,000.00	1,00,000.00
Earnest Money: M/s Terna SSK Ltd	1,00,000.00	1,00,000.00
Earnest Money : Shakumbani Sugar Ltd	1,00,000.00	1,00,000.00
Earnest Money : Shri Talabu Taluka SKM	1,00,000.00	1,00,000.00
Earnest Money : Bileshwar Khurd Udyog Khedut Sahakari Mandal Ltd	1,00,000.00	1,00,000.00
Earnest Money : Sanjavani SSK Ltd	1,00,000.00	1,00,000.00
Earnest Money: Rahuri S.S.K Ltd	1,00,000.00	1,00,000.00
Earnest Money: Ashok SSK Ltd	1,00,000.00	1,00,000.00
Earnest Money : Simbhaoli Sugar	3,00,000.00	3,00,000.00
Earnes Money : Jagadamba SSK	1,00,000.00	1,00,000.00
Earnest Money : Rana Sugar Ltd	1,00,000.00	1,00,000.00
Earnest Money : Dharani Sugar & Chemical Ltd	1,00,000.00	1,00,000.00
Earnest Money: Triveni Engg. Industries Ltd	2,00,000.00	2,00,000.00
Earnest Money : Uttam Sugar Ltd	1,00,000.00	1,00,000.00
Earnest Money : Chamundeswari Sugar Mills	2,00,000.00	2,00,000.00
Earnest Money : Mansurpur Sugar Mills	1,00,000.00	1,00,000.00
Earnest Money : Bharat Sugar Ltd	1,00,000.00	1,00,000.00
Total	35,00,000.00	36,00,000.00

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Technology Information, Forecasting & Assessment Council

Technology Information Forecasting & Assessment Cuncil Receipts & Payments for the Period the Year Ended 31.03.2014

	Receipts & Payments for the Period the Year <u>Receipts</u>	Current Year	Previous Year
1.00	Opening Balances	Current rear	Tievious Teat
1.00	Cash in hand	3,677.00	3,681.00
	Cash in Hand (Under PFC New Account)	439.00	5,001.00
	Cash in Hand (Under WSS New Account)	5,839.00	
	Bank balances	3,039.00	
	In Current Accounts		
	In Depost Accounts	1440,88,555.00	698,58,718.00
		The Control of the Co	
	Savings Accounts	1717,66,782.83	1027,86,894.27
	Savings Accounts (Under PFC New Account)	108,87,788.32	=0
	Savings Accounts (Under WSSS New Account)	21,48,598.00	- ((01 00
2.00	Advance for Franking Machine	1,108.00	6,691.00
2.00	Grants Received	010 45 000 00	2012 00 000 00
	From Government of India - Plan (TIFAC)	812,47,000.00	2053,00,000.00
	From Government of India - Non Plan (TIFAC)	3,75,000.00	4,50,000.00
2.00	Scholorship for Womet Scientist	-	100,00,000.00
3.00	Interest Received	45C 5E CEO 00	00 00 007 00
	On Bank Deposits (TIFAC)	136,35,659.00	92,29,837.00
	On Bank Savings (TIFAC)	52,30,404.00	55,27,535.00
	Loans Advances etc. (Staff advances)	43,447.00	59,810.00
	Interest from Income Tax	13,143.00	8,75,000.00
4.00	Loan Advance (HBA)		
4.00	Other Income (Specify)	405 04 000 00	67 7 4 000 00
	Refund from HGT Project	102,94,000.00	25,71,000.00
	Refund from Advance Composite Programme	130,17,020.00	206,79,723.00
	Refund from Vision 2020	76,65,879.24	143,52,726.24
	Other Income (Annexure 18)	3,20,951.00	1,43,699.00
	Refund from Sugar Technology Mission	40 40 5 00	83,00,000.00
	Refund from TePP Project	49,185.00	-
- 00	Refund from Fly Ash Utilization Programme	10,000.00	30,000.00
5.00	Receipts fro Patent Facilitating Centre		
	Grant in Aid (II. des PEC New Account)	450.00.000.00	150 00 000 00
	Grant in Aid (Under PFC New Account)	150,00,000.00	150,00,000.00
	Amount Trasnfered from TIFAC Main Account	-	38,493.32
	Ekaswa A&B CD RoM	44,000,00	7,500.00
	Ekaswa A&B CD RoM	14,000.00	8,000.00
	Nominal Charges for Dissemination of TIFAC Reports	2 97 669 66	500.00
	Interest from Bank (Savings)	3,87,908.00	1,74,290.52 220.00
	Interest from Advances etc. (Staff Advane)	3,385.00	
6.00	Interst Scooter Advance Receipts for Women Scientist Scholourship Scheme	•	308.00
6.00	Grant in Aid		
	Grant in Aid (Under WSSS New Account)	220,00,000.00	EN SIN
	Amount Transfered from TIFAC Main Account	220,00,000.00	48,79,744.00
		1 21 490 00	70,007.00
	Interest from Bank (Savings)	1,21,480.00	
	Interest from Advances etc. (Staff Advane)	184.00	230.00
6.00	Other Receits (Give Details)		
	Nominal Charges for Dissemination of TIFAC Reports	77,634.00	1,05,778.00
	Tender for Car Hiring Accounts	-	
	RTIA Questions	3,024.00	1,528.00
	Total (i)	4984,12,090.39	4704,61,913.35

Technology Information Forecasting & Assessment Cuncil Receipts & Payments for the Period the Year Ended 31.03.2014

Receipts	Current Year	Previous Year
Tender for Car Hiring	2,000.00	=0
Tender for Laptops	5,000.00	91
Tender for Supply of Dringking Water	1,500.00	-1
Tender for Digitalization of TIFAC Reports	6,500.00	-
Tender for Printing of Various Stationary Items	<u></u>	2,500.00
Tender for Empanelment of Caterer	-	1,250.00
Tender for Empanelment of Advertisement Agencies	-	4,500.00
Staff Advance	<u></u>	2,73,159.00
Stale Cheque Received	86,567.00	72,089.00
DRDO - PFC	-	=
Advance : DAVP	41,554.00	91
Earnest Money : M/s Pink House Keeping	-	18,784.00
Sundry Creditor : M/s Daikin Airconditioning India Pvt Ltd	-	1,52,527.00
Sundry Creditor : M/s Blue Star Ltd	1,69,274.00	1,65,956.00
Sundry Creditor : Patent Facilitating Centre	-	6,000.00
Sundry Creditor : M/s Unique Interiors, New Delhi	-	1,91,075.00
Sundry Creditor : India International Centre	<u></u>	3,25,854.00
TrainingProgramme on IPR & WTO Issues for		FF 00 F 00
Scientific/Technologies workign in Government Sectors.	-	55,097.00
G.M.W Workshop (SRF)	2,16,578.00	-
Prepration of Detailed Project Report & Desing of R&D	E 45 005 00	
Schedul for Launch of National Mission Electric Mobility	5,47,907.00	-
Earnest Money : M/s Dogra Enterprises	5,000.00	1-
Earnest Money : M/s Bagga Tours and Travels	50,000.00	-
Earnest Money : M/s Dip Technologies Pvt. Ltd	5,000.00	2
Earnest Money : M/s Perfect Traders	5,000.00	1-
Office Equipment (Deductions during the year)	14,900.00	1.7
Advance : Indian Habitat Center	2,018.65	98
Security Deposit : MTNL	6,000.00	-1
Earmarked for Release to SIDBI (Revolving Fund) Capital F	300,00,000.00	450,00,000.00
Security Deposite : M/s Pink House Keeping	<u></u>	11,398.00
Security Deposite : MTNL	-	12,000.00
Income Tax for he F.Y 2004-2005	=	50,00,000.00
TDS :CPF (FDR) UBI, SDA	3,21,591.00	23
TDS (FDR) Sarita Vihar, New Delhi	19,726.00	-1
GSLIS (Under PFC New Account)	-	346.00
Total (ii)	315,06,115.65	512,92,535.00

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Technology Information, Forecasting & Assessment Council

Technology Information Forecasting & Assessment Cuncil Receipts & Payments for the Period the Year Ended 31.03.2014

Receipts	Current Year	Previous Year
CGHS (Sh.Rajani Kanth Gupta) Ex. Registrar	2,550.00	=
Income Tax	<u>*</u>	16,995.00
Education Cess	-	179.00
Interest Accrued from Unin Bank of India (Under PFC New	77,888.52	===
Interest Accrued from Unin Bank of India (Under WSSS New	21,624.00	
Medical Scheme	2,30,917.00	2,47,600.00
Medical Scheme (Under PFC New Account)	22,200.00	9,250.00
Leave Travel Expenses Payable (Sh.Shambhu Kumar)	2,720.00	<u>e</u> s
Sh.Shambhu Kumar (HBA) (PFC New Account)	8,000.00	H)
Staff Advance (PFC New Account)	26,000.00	==
Staff Advance (WSSS Account)	4,000.00	25
CPF	<u>=</u>	180.00
CPF (Under PFC New Account)	35,000.00	24,700.00
Leave Encashment Receivable Sh.Shambhu Kumar (Under I	10,721.00	
Total (iii)	4,41,620.52	2,98,904.00
Total (i) + (ii) + (iii) = (A)	5303,59,826.56	5220,53,352.35

Technology Information Forecasting & Assessment Cuncil Receipts & Payments for the Period the Year Ended 31.03.2014

	Payments		Current Year	Previous Year
1.00	Expenses			
a a	Establishment Expenses (Schedule 21)	530,68,553.00		
	Add: Opening Expenses Payable	31,11,193.00		
	Less: Expenses Payable	33,11,041.00	528,68,705.00	419,89,913.00
b	Administrative Expenses (Schedule 21)	262,25,617.76	320,00,703.00	413,03,313.00
ь	Add: Opening Expenses Payable	21,74,996.00		
	Add: Loss of sale of Fixed Assets	21,74,990.00		
		12,08,382.00	271,92,231.76	04 14 420 71
	Less: Payables	12,05,552.00	2/1,92,231./6	94,14,428.71
	Less: Loss on Sale of Fixed Assets	_		
c	(Previous year figure does not include obsolescence Expenses in it.) Expensditure on Grants, Subsidies etc. (As per Schedule 2.		837,29,495.65	880,41,093.00
2.00				
	Grant Utilisation - Patent Facilitating Centre			
	Add : Opening Expenses Payable			
	Less: Expenses Payable			57,43,824.00
	Establishment Expenses (Under PFC New Account	73,02,197.00		
	Add : Opening Expenses Payable	4,20,189.00		
	Less: Expenses Payable	5,88,897.00	71,33,489.00	26,36,837.00
	Administravtive Expenses (Under PFC New Account	54,97,299.00		
	Add: Opening Expenses Payable	10,48,231.00		
	Less: Expenses Payable	7,12,761.00	58,32,769.00	15,55,001.00
	Barmonte made against funds for various projects			
	Payments made against funds for various projects Grant Utilisation - Women Scientist Scholorship Scheme			
	Add : Opening Expenses Payable			
	Less: Expenses Payable			38,55,525.00
	Establishment Expenses (Under WSSS New Account	131,52,951.00		
	Add : Opening Expenses Payable	10,00,704.00		
	Less: Expenses Payable	2,68,565.00	138,85,090.00	11,38,470.00
	Administravtive Expenses (Under WSSS New Account)	15,07,230.00		
	Add : Opening Expenses Payable	1,53,758.00		
	Less: Expenses Payable	1,04,064.00	15,56,924.00	16,31,450.00
	Grant Utilisation - Vision 2020	211,40,732.00		
	Add : Opening Expenses Payable	9,75,627.00		
	Less: Expenses Payable	11,39,724.00	209,76,635.00	250,66,071.00
	Grant Utilisation - Technology Vision 2035		40,44,291.00	60,77,011.00
	Adddition in Fixed Assets			
	Office Equipment		73,270.00	1-
	Library Book		51,559.00	12,762.00
	Furniture & Fixtures		5,000.00	
	Computer & Peripherals		6,66,866.00	2,11,923.00
3.00	Other Payments (Specify)			
	CPF		2,94,991.00	(=
	CPF (Under PFC Account)		24,700.00	34
	Sundry Creditor: M/s Daikin Airconditioning India Pvt. Ltd		1,52,527.00	1,57,294.00
	Sundry Creditor : M/s Blue Star Ltd.		1,65,956.00	100
	Patent Facilitating Centre		6,000.00	-
	Sundry Creditor : Unique Interiors, New Delhi		1,91,075.00	12
	Sundry Creditor : India International Centre		3,25,854.00	70
	Earnest Money from Sugra Factories (Annex 13) (M/s Riga Sugar)		1,00,000.00	10
	Earnest Money: M/s Sansanwal Travels		50,000.00	12
	Earnest Money : M/s Yartika Travels		50,000.00	
	ž (2)		30,000.00	
	M/s Sonu Printing Press			60,784.
	Earnest Money : M/s Sansanwal Travels		-	10,000.
	Earnest Money : M/s Yatrika Travels			10,000.1
	Leave Encashment Receivable (Shambhu Kumar) (Under PFC New Account)			10,721.00
	Staff Advance (Under TIFAC)		1,58,656.00	10,7 21.00
	Total (i)		2195,36,084.41	1876,23,107.71
	Louis (a)	1	2430,30,004.41	10/0,43,107.71

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Technology Information, Forecasting & Assessment Council

Technology Information Forecasting & Assessment Cuncil Receipts & Payments for the Period the Year Ended 31.03.2014

Payments	Current Year	Previous Year
Staff Advance (Under PFC New Account)	(#)	87,125
Staff Advance (Under WSSS New Account)		4,000
Interest Accrued (Under PFC New Account)	77,888.00	77,888
Interest Accrued (Under WSSS New Account)	21,624.00	21,624
IIT-TIFAC Maintenance (Provisions)	22,041.00	
Interior Work of TIFAC Building	34,786.00	4,16,564
Fire Alarm System at TIFAC Building & Fire Extinguishers	13,440.00	
Advance DAVP	43,179.00	
Security Deposite : Sh.Kapil Aggarwal	1,00,000.00	
Security Deposite: UBI Locker Rent	8,403.00	
TIFAC/DST ITS Canada Workshop	88,732.00	
TDS (Indian Oil Corporation Limited)	61,346.00	
Advance : India Habitat Centre	een .	2,01
Amount Transferred to PFC	(=)	38,49
Amount Transferred to SFWS	-	48,79,74
Closing Balance		
Cash in Hand	6,195.00	3,67
Cash in Hand(Under PFC New Account)	520.00	43
Cash in Hand(Under WSSS New Account)	2,020.00	5,83
Cash at Bank	1053,75,926.31	1717,66,78
Cash in Hand (Under PFC New Account)	134,06,683.84	108,87,78
Cash in Hand (Under WSSS New Account)	88,36,067.00	21,48,59
Short Term Deposite	1827,24,214.00	1440,88,555
Franking Machine	677.00	1,10
Total (ii)	3108,23,742.15	3344,30,24
Total(i) + (ii) = (B)	5303,59,826.56	5220,53,352

As per our report of even date Annexed herewith For Anil Bhatla & Company

Chartered Accountants

Sd/-Ch.Chandra Sekhar Patro Partner

Membership No.091529 Date: 22.09.2014 Place: New Delhi Sd/-Registrar TIFAC

Sd/-Executive Director TIFAC



TECHNOLOGY INFORMATION, FORECASTING & ASSESSMENT COUNCIL

SCHEDULE FORMING PART OF THE ACCOUNTS FOR THE YEAR ENDED 31.03.2014

SCHEDULE 32

SIGNIFICANT ACCOUNTING POLICIES

- 1. The council has adopted the Hybrid System of accounting i.e. combination of Cash Basis and Accrual Basis accounting.
- 2. Fixed assets are stated at cost less accumulated depreciation. Cost comprises the purchase price and any attributable cost of bringing the asset to its working condition for its intended use.
- 3. Depreciation on fixed assets is computed on the written down value (WDV) method at the rates and in the manner prescribed under the provisions of Income Tax Act.
- Prior period expenditure, extra-ordinary items and changes in accounting policies having material impact on the financial statements of the council are required to be disclosed.
- 5. (a) Amounts released under various projects are accounted for as expenditure for the year in which the same are released, irrespective of the fact that the amounts so released may not have been fully utilized towards the projects during the year.
 - (b) Amounts earmarked for disbursement by SIDBI are accounted for as expenditure for the year in which the same are earmarked, irrespective of the fact that the amounts so earmarked may not have been fully released to SIDBI during the year. Any funds so earmarked but not released are carried over to the Corpus Fund as at the end of the financial year.
- 6. Unspent amount of grant received during the year has been transferred to Corpus/Capital Fund.
- 7. The repayment of grant/assistance to TIFAC by the beneficiaries as per the conditions stated in the agreement is accounted for on receipt basis.
- 8. All disbursements (irrespective of its utilization) for projects are treated as expenditure during the Financial Year and assets if any created/purchased by the beneficiaries, out of the said disbursements to the project, are not accounted for as assets in the books of accounts.
- 9. Stale Cheques issued by TIFAC amounting to Rs. 23,65,446.06 have been outstanding under the head Current Liabilities as on 31st March 2014 and the last year balance for the same is Rs. 22,78,879.06
- 10. During the Financial Year 2013-2014 a provision of Rs.131,40,000/- has been made by the management for maintenance expenses of Vishwakarma Bhavan including electricity, water bill, security, Horticulture and Housekeeping expenses on the basis of average of last two financial years.

प्रौद्योगिकी सूचना, पूर्वानुमान एवं मूल्यांकन परिषद् Technology Information, Forecasting & Assessment Council

- 11. Contingent liabilities in respect of on-going projects/studies etc. are neither provided for nor determined.
- 12. Total expenditure is not bifurcated into plan and non-plan expenditure in the financial statements.

As per our report of even date annexed herewith

For Anil Bhatla & Company Chartered Accountants FRN: 012686N

Sd/- Sd/- Sd/- Sd/Ch. Chandra Sekhar Patro Accounts Officer Registrar Executive Director (Partner) TIFAC TIFAC TIFAC

MRN: 091529

Date: 22-09-2014 Place: New Delhi

TECHNOLOGY INFORMATION, FORECASTING & ASSESSMENT COUNCIL SCHEDULE FORMING PART OF THE ACCOUNTS FOR THE YEAR ENDED 31.03.2014

SHCEDULE- 33 CONTINGENT LIABILITIES AND NOTES TO ACCOUNTS

1. CONTINGENT LIABILITIES

- 1.1 Claims against the Entity not acknowledge as debts Rs. NIL (Previous year Rs. NIL)
- 1.2 In respect of
- Bank Guarantees given by/on behalf of the Entity Rs. NIL (Previous year Rs. NIL)
- Letters of Credit opened by Bank on behalf of the Entity <u>Rs. NIL</u> (Previous year <u>Rs. NIL</u>)
- Bills discounted with banks Rs. NIL (Previous year Rs. NIL)
- 1.3 Disputed demands in respect of:
- Income tax Rs. Rs. NIL (Previous year Rs. NIL)
- Sales Tax Rs. NIL (Previous year Rs. NIL)
- Municipal Taxes **Rs. NIL** (Previous year **Rs. NIL**)
- In respect of claims from parties for non-execution of orders, but contested by the Entity Rs. NIL (Previous year Rs. NIL)

2. CAPITAL COMMITMENTS

- Estimated value of contracts remaining to be executed on capital account and not provided for (net of advances) **Rs. NIL** (Previous year **Rs. NIL**)

3. LEASE OBLIGATIONS

- Future obligations for rentals under finance lease arrangements for plant and machinery amount to **Rs. NIL** (Previous year **Rs. NIL**)

4. CURRENT ASSETS, LOANS AND ADVANCES

- In the opinion of the Management, the current assets, loans and advances have a value on realization in the ordinary course of business, at least equal to the amount at which they are stated in the Balance Sheet.

5. **TAXATION**

- In view of there being no taxable income under Income tax Act, 1961 no provision for Income Tax has been considered necessary.

6. FOREIGN CURRENCY TRANSACTIONS

(Amount Rs.)

6.1 Value of Imports Calculated on C.I.F. Basis:	Current Year	Previous Year
Purchase of finished Goods Raw Materials & Components (Including in transit) Capital Goods Stores, Spares & Consumables 6.2 Expenditure in foreign currency:	Nil Nil Nil Nil	Nil Nil Nil Nil
 a) Travel b) Remittances and Interest Payment to Financial Institutions/ Banks in Foreign Currency c) Other expenditure: Commission on Sale Legal and Professional Expenses Miscellaneous Expenses 	Rs. 2,87,910/- Nil Nil Nil Nil	Rs. 2,30,502/- Nil Nil Nil Nil
6.3 Earning:Value of Exports on FOB basis6.2 Remuneration to Auditors:	Nil	Nil
 Auditors Fee (inclusive of Service Tax) Taxation matters For management services For certificate Others 	Rs.70,598.00 Nil Nil Nil Nil	Rs. 58,922.00 Nil Nil Nil Nil

7. The details of Liabilities outstanding for a period more than 5 years which is shown under Current Liabilities (Schedule 7).

S. No.	Particulars - Current Liabilities (Schedule 7)	Amount (Rs.)
1.	Salary Payable (Prof. Ganpathy)	1,800.00
2.	Project (ICOSER)	1,32,02,152.00
3.	Indian-Mayanmar S & T Friendship Library in Yangoon	9,59,659.00
4.	MSEB-Ash Utilisation/ Management	6,00,094.00
5.	FAM Large Scale Stowing of HWP Pond Ash into the	82,94,830.00
	Underground Mines of SCCL (M) Manugure	
6.	Earth Quake Serving Nature's Fury	1,65,157.00
7.	MPSEB use of Fly Ash in Agriculture Development	3,56,825.00
	Thermal Power Plants, Sarni	
8.	TIFAC-World Bank Project	13,39,747.93
9.	DRDO-PRF	3,95,745.00
	Total	2,53,16,009.93

8. On the analysis of the schedules forming part of the Balance Sheet of TIFAC and as per the information provided to us the following amounts are outstanding under the head Current Assets, Loans & Advances (schedule 11) since long time which have not been settled so far:-

S.	Particulars	Amount (Rs.)
No.		
1.	Sail NMPP	19,736.55
2.	Security Deposit : Lease Accommodation	9,500.00
3.	Security Deposit M/s Tata Tele Service Ltd.	16,000.00
4.	Advance: Acharya Vinaba Bhave Rural Hospital,	1,50,000.00
	Sawangi	
5.	Sundry Debtor: DST (IITF)	2,70,000.00
6.	Security Deposit: DST (IITF)	74,520.00
·	Total	5,39,756.55

- 9. Audited financial statements/utilization statements duly certified by Chartered Accountants in respect of grant utilized/released during the year, has been received in the cases observed by us on test check basis.
- 10. Stock of Publications and Studies, which are published and printed by the Council and distributed at a cost are not accounted for as Stock in hand at the end of the year.
- 11. Liability towards gratuity payable on death/retirement of employees is not provided for.

Technology Information, Forecasting & Assessment Council



- 12. Provision for accumulated leave encashment benefit to employees is not being made since it shall be accounted for on cash basis.
- 13. A sum of Rs.14,23,467/- (under TIFAC A/c) and Rs. 31,450/- (under PFC new A/c) has been accumulated towards post retirement medical benefits of TIFAC employees, pending framing of the necessary scheme and taking out of group insurance policy to cover the liability.
- 14. Grant from DST is received for TIFAC activities and no separate grant is received for Vision activities so all the receipts and expenditure incurred for the purpose of Vision activities have been merged with TIFAC regular Income and Expenditure.
- 15. A sum of Rs. 6,92,693/- has been paid and booked as expense during the current year while these expenses relates to previous financial years for which no provision had been made in those previous years.
- 16. Previous year's figures have been regrouped/rearranged wherever found necessary, to make them comparable with current year figures.
- 17. Schedules 1 to 33 are annexed to and form an integral part of the Balance Sheet as at 31.03.2014 and the Income and Expenditure Account for the year ended on that date.

For Anil Bhatla & Company Chartered Accountants FRN: 012686N

Sd/- Sd/- Sd/- Sd/Ch. Chandra Sekhar Patro Accounts Officer Registrar Executive Director (Partner) TIFAC TIFAC TIFAC TIFAC MRN: 091529

Date: 22-09-2014 Place: New Delhi

ANIL BHATLA & COMPANY CHARTERED ACCOUNTANTS OFFICE: S-16, SECOND FLOOR, ASHOK DEEP BUILDING 4/24, EAST PATEL NAGAR NEW DELHI – 110008

Tel: 11-25732569, Fax: 11-45058330

AUDITORS' REPORT

The Trustees, TIFAC Contributory Provident Fund Trust, New Delhi.

We have audited the attached Statement of Affairs of TIFAC Contributory Provident Fund Trust as at 31st March 2014 with the books of accounts, maintained at New Delhi.

These financial statements are the responsibility of the management of the TIFAC Contributory Provident Fund Trust. Our responsibility is to express an opinion on these financial statements based on our audit.

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

- 1. The Statement of Affairs dealt with by this report are in agreement with the books of accounts of the Trust.
- 2. In our opinion and to the best of our information and according to explanation given to us, the said accounts give the information required and give a true and fair view, in the case of Statement of Affairs, the state of the affairs of the Trust as at 31st March 2014.

For Anil Bhatla & Company Chartered Accountants FRN: 012686N

Ch. Chandra Sekhar Patro (Partner) M. No. – 091529

Date: 22-09-2014 Place: New Delhi

प्रौद्योगिकी सूचना, पूर्वानुमान एवं मूल्यांकन परिषद् **Technology Information, Forecasting & Assessment Council**

Contributory Provident Fund - TIFAC

Statement of Affairs as on 31st March, 2014

Previous Year as			Current Year as	Previous Year as	Dout on land	Current Year as
on 31.03.2013	Particulars		on 31.03.2014	on 31.03.2013	Faritulars	on 31.03.2014
П	Interest Accrued			103,23,979.63	103,23,979.63 Balance with UBI Deposits	52,43,900.93
197,40,304.70 Last Balance	ast Balance	241,77,590.70		5,20,330.00	5,20,330.00 Special depsoit with RBI	5,20,330.00
45,19,554.00 A	45,19,554.00 Add: Received/ Accrued during the year	56,24,654.00		506,30,779.00	506,30,779.00 Short Term deposit with UBI	639,23,723.00
242,59,858.70		298,02,244.70		4,51,316.00	4,51,316.00 Flexi Deposit- UBI	4,97,784.00
	Less: Paid during the year	83,888.00		3,21,591.00	3,21,591.00 TIFAC TDS A/c	Ī
	Less: Bank Charges (Intrest)	1				
241,77,590.70			297,18,356.70		Loan/ Advances to staff members	
				45,050.00	45,050.00 Shri Anil Kumar Rai	3,350.00
<u> </u>	Employees Contribution			5,550.00	5,550.00 Shri Arghya Sardar	62,200.00
166,17,514.93 L	Last Balance	186,00,117.93		I	Ms. Sangeeta Nagar	45,000.00
58,17,023.00 A	Add: Received during the year	63,90,636.00		ì	Sh. Somanath Nath	15,000.00
224,34,537.93		249,90,753.93		12,900.00	12,900.00 Ms. Uma Daral	Ü
38,34,420.00 L	Less: Paid during the year	57,16,406.00		2,000.00	2,000.00 Ms. Geeta Tomer	j
186,00,117.93	2		192,74,347.93	î	Sh. Sundender Prasad	2,98,200.00
				32,800.00	32,800.00 Smt. Kavita Tyagi	Ī
L	TIFAC Contribution			91,600.00	91,600.00 Sh. S.K. Muneshwar	41,200.00
173,40,028.00 L	Last Balance	200,78,024.00		Ü	Sh. Surinder Kumar	65,000.00
30,22,549.00 A	30,22,549.00 Add: Received during the year	30,90,938.00		i	Sh. Deep Prakash	58,000.00
203,62,577.00	X	231,68,962.00		21,120.00	21,120.00 Sh. Ravinder Kumar	43,880.00
2,84,553.00 L	Less: Paid during the year	11,41,449.00		17,800.00	17,800.00 Ms. Mercy James	1,000.00
200,78,024.00			220,27,513.00	50,000.00	50,000.00 Sh. Suresh Somanchi	Ī
				1,77,600.00	,77,600.00 Sh. T.Chakradhar	1,10,400.00
				30,000.00	30,000.00 Sh. Sumit kumar	15,000.00
				90,000.00	90,000.00 Mr. T. Adarsh	60,000.00
				31,250.00	31,250.00 Sh. Bishram Bhakta	16,250.00
				67.00	67.00 Bank Charges	E)
628,55,732.63	Total		710,20,217.63	628,55,732.63	Total	710,20,217.93

For Anil Bhatla & Company

Chartered Accountants

Ch.Chandra Sekhar Patro

Membership No.091529 Date: 22.09.2014 Place: New Delhi

Partner

Executive Director TIFAC

Sd/-Registrar TIFAC

Accounts Officer TIFAC

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Contributory Provident Fund - TIFAC Trial Balance as on 31st March, 2014

(Amount Rs.)

S NO	PARTICULARS	DEBIT	CREDIT
0.110.	TAKTICOLARO	AMOUNT	AMOUNT
1	EMPLOYEES SUBSCRIPTION A/C		192,74,347.93
2	EMPLOYER'S CONTRIBUTION A/C		220,27,513.00
3	INTEREST A/C		297,18,356.70
4	CPF ADV: SHRI ANIL KUMAR RAI	3,350.00	
5	CPF ADV: SHRI ARGHYA SARDAR	62,200.00	
6	CPF ADV: Ms. MERCY JAMES	1,000.00	
7	CPF ADV: MS. SANGEETA NAGAR	45,000.00	
8	CPF ADV: SHRI RAVINDER KUMAR	43,880.00	
9	CPF ADV:SH. SURENDER PRASAD	2,98,200.00	
10	CPF ADV: SH. DEEP PRAKASH	58,000.00	
11	CPF ADV: SHRI S.K. MUNESHWAR	41,200.00	
12	CPF ADV.: SH. SURINDER KUMAR	65,000.00	
13	CPF ADV. SH. T. CHAKRADHAR	1,10,400.00	
14	CPF ADV. MR. SUMIT KUMAR	15,000.00	
15	CPF. ADV. MR. T. ADARSH	60,000.00	
16	CPF ADV. SH. BISHRAM BHAKTA	16,250.00	
17	CPF ADV. SH. SOMANATH NATH	15,000.00	
18	FLEXI DEPOSIT-UBI	4,97,784.00	
19	SHORT TERM DEPOSIT (UBI)	639,23,723.00	
20	SPECIAL DEPOSIT (RBI) A/C	5,20,330.00	
21	CASH AT BANK	52,43,900.63	
	Total	710,20,217.63	710,20,217.63

For Anil Bhatla & Company Chartered Accountants

Sd/-

Ch.Chandra Sekhar Patro

Partner

Membership No.091529

Date: 22.09.2014 Place: New Delhi

Contributory Provident Fund - TIFAC Statement of Affairs as on 31st March, 2014

(Amount Rs.)

Pervious Year as on 31.03.2013	PARTICULARS	Current Year as on 31.03.2014
103,23,979.63	Balance with UBI Deposit	52,43,900.63
5,20,330.00	Special deposit with RBI	5,20,330.00
506,30,779.00	Short Term deposit with (UBI)	639,23,723.00
4,51,316.00	Flexi Deposit -UBI	4,97,784.00
3,21,591.00	TIFAC TDS A/C	-
	Loan/ Advances to staff members	
45,050.00	Shri Anil Kumar Rai	3,350.00
5,550.00	Shri Arghya Sardar	62,200.00
17,800.00	Ms. Mercy James	1,000.00
1,77,600.00	Sh.T. Chakradhar	1,10,400.00
90,000.00	Sh. T. Adarsh	60,000.00
30,000.00	Sh. Sumit kumar	15,000.00
2,000.00	Ms. Geeta Tomer	-
	Sh. Surender Prasad	2,98,200.00
32,800.00	Ms. Kavita Tyagi	-
91,600.00	Sh. S.K. Muneshwar	41,200.00
50,000.00	Sh.Suresh Somanchi	-
21,120.00	Sh. Ravinder Kumar	43,880.00
	Smt.Sangeeta Nagar	45,000.00
	Sh. Surinder Kumar	65,000.00
31,250.00	Sh. Bishram Bhakta	16,250.00
12,900.00	Ms. Uma Daral	-
	Sh. Deep Prakash	58,000.00
	Sh. Somanath Nath	15,000.00
67.00	Bank Charges	-
628,55,732.63	Total	710,20,217.63

For Anil Bhatla & Company Chartered Accountants

Sd/-

Ch.Chandra Sekhar Patro Partner

Membership No.091529

Date: 22.09.2014 Place: New Delhi