the leading electrical & electronics monthly

# ieema journal

Volume 7 Issue No. 5 January 2016 CIN U99999MH970GAP014629
Official Organ of Indian Electrical & Electronics Manufacturers' Association
Member: Audit Bureau of Circulation & The Indian Newspaper Society

8

From the President's Desk

9

Samvaad

30

# Special Report

# Role of metering in addressing the revenue challenge faced by distribution utilities in India

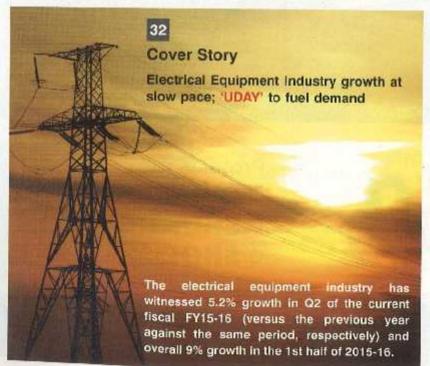
IEEMA was invited by the MoP, where Mr. Babu Babel, President, IEEMA made a presentation on providing technological solutions to mitigate losses and enhance revenue of the state discoms. IEEMA will continue to provide inputs on various technological interventions.

37

# Special Report 9th IEEMA T&D Conclave



The 9th IEEMA T&D conclave held on December 11, 2015 at New Delhi was attended by more than 250 people. The Conclave saw renowned technologists and Indian manufacturing companies with T&D operations sharing their views on strengthening of T&D infrastructure in the Country. The one day event witnessed the presence of eminent personalities like Dr. Katsutoshi Toda, Chairman, Toshiba T&D Systems India, Mr. Anand Kumar, Super 30 under Ramanujan School of Mathematics, Mr. Anil Bokil, Arthakranti Pratishthan and Mr. Kul Bhushan, Editor, Lord Krishna in the Boardroom:



42

# Curtain Raiser

... And the Countdown begins for



# ELECRAMA-2016

ELECRAMA has now turned into a movement, beyond just an exhibition. It is a premier show of Ind an Electrical Sector and is the World's largest confluence of the power transmission and distribution community.

Held biennially since 1990 in India, the eleventh edition ELECHAMA-2014 hosted 970 exhibitors from India and across the world and also attracted 100,000+ footfalls into the exhibition.

# 48

# **Guest article**

# The golden age of control

Dr. Peter Martin, Vice President, Business Value Solutions, Schneider Electric



# 50

# Special Feature

SWICON 2015



SWICON 2015, the 9th International Conference on Switchgear and Control gear was held on 26th and 27th November 2015 at Hotel The Lalit, Mumbai.

The theme for SWICON 2015 "Switching ON the future" has been selected to align it with the evolving trends in the energy technology and associated switchgear industry across the world

# IN Focus

Power Sector Reforms in India
India is the world's eixth-largest consumer of energy and fourth in power production. The power sector reforms in India were started in the mid-1990s era and many State Electricity Boards (SEBs) were restructured during this time. In the reforms process the structure of the SEBs was completely changed with the financial and governance support from international financial institutions like World Bank.

Mr Ashok Upadhyay, Dy. Director (Generation), M.P. Electricity tory Commission Bhopal, MP



# 66

# Tech Space

Development of Small Scale Impulse Current Generator for Testing of MO Block

G Radhika, Dr M Suryakalavathi and G Venu Gopal

# 74

# Tech Space

A study on Optimization of surge arresters in GIS

> M Mohana Rao BHEL Corporate R&D

# 80

# SME Talk

We believe in investing in the future to remain one-up on our competitors

> Mr Hartek Singh Hartek Power Pvt Ltd

# 82

# MUST know of Gratuity Act

# 83

One day Seminar on "Labour Laws & Statutory Compliance"

# 86

# **IEEMA Events**



# 90

# **IEEMA Activities**

# 94

# Power Scenario

Global Scenario Indian Scenario

# 96

# **IEEMA Database**

Basic Prices & Indices Production Statistics

# 98

# **ERDA News**

# 100

**CPRI News** 

# 102

# International News

- Indo-Japan N-deal to boost India's renewable energy plans: IEA
- Fujairah 1 completes US\$200 mn expans on

# 106

# National News

- Chhattisgarh not keen to set up 4,000 MW Suruja UMPP
- KREDL striving to meet solar. power target of 1,000 MW

# 110

# Corporate News

- ADB to lend \$1 bn to PowerGrid transmission for capacity expans on
- Tata Power, Gamesa tie up for 100-mw wind power plant in Andhra Pradesh

# Seminars & Fairs

# 116

# Product Showcase



This new space in the IEEMA Journal will incorporate recent important appointments in the power and related sectors.

# 121

# Index to Advertisers

# 122

# Shocks & Sparks

# 11th Review, Planning and Monitoring Meeting



Mr Babu Babel, President, IEEMA making presentation at the 11th RPM meeting at New Delhi

# **Editorial Board**

## **Advisory Committee**

Founder Chairman Mr R G Keswani

Chairman Mr Babu Babel

Mx Scnil Mista Mr Naveen Kurnin Mr Mustafa Wajic Mr Vikram Gandon

Suh Edillor Ms Shalini Singh

Advertisementa Incharge Na Vidya Chikhale

Circulation Incharge Ms Chitra Tambankar

Stulistics & Data Incharge Mr Ninad Renade

Reflections Processed at Endler Printing Work

Regd Office - Mumbal

501, Kakad Chambers, 132, Dr A Besani Road, Worl., Murroal 400 018.

+81(0) 22 24960532 ; 6628 Fax: +91(0) 22 2493 2705 Ernail: mumbai@icema.org

# Corporate Office - New Delhi

Rishyamook Building, First floor, 85 A. Parichkuran Boad, New Dalhi 110001. Phones: +91 (0) 11-23353013, 14, 18 Fax: ±91 (0) 11-23363015 Email: celhi@igema.org

# Branch Office - Bengaluru

204, Swiss Complex, 03 Flace Course Fload, Bengaluru 560 001

Phones: +91 (0) 80 2220 1316 / 1318 Fex: +91 (0) 80 220 1317

Email: bangalore@ieema.org

Branch Office - Kolkata 503 A, Oswal Chambers, 2, Church Lane, Kolkata 700 031. Phones: +81 (0) 33 2213 1326 Fax: +91 (0) 33 2213 1326 Email: kolkala@ieema.org

Articles: Technical data presented and views expressed by authors of articles are their own and IEEMA does not assume any responsibility for the same. IEEMA Journa, owns copyright for original articles published in EEVA Journal.

# Representatives:

Guwahati (Assam) - Nilankha Chaliha Email: nilankha,chaliha@ieema.org Mobile: 191 9706389965

Ralpur (Chhaltisgarh) - Rakesh Ojfia. Brial: rakesh.ojra@leera.org Mobile:+91 9926855666

Lucknow (U.P. and Uttarakhand) -Auf Kurner Cheturvedi Emai::anuj.chaturvedi@leema.org Mobile: +91 9339803195

## Chandigarn (Punjab & Haryana) Briatti Bishi Brrail: thorti.biohl@icemo.org

Mobile: +91 9369209690 Jelpur (Rajasthan)

Devesh Vyas Email: cevesh.vyes@ieema.org Mobile: +91 8955093654

Bhubaneshwar (Odisha) Smruli Renjan Samentaray

Email: smrutiranjan.samsniaray@ieems.org Mobile: +91 9437189920 Hyderabad (Andhra Pradesh)

Jassa A Inaparthi Email: jesse.inaperthi@leema.org Mobile: +91 9949236153

Srinagar (Jammu & Kashmir) Mohammad Irlan Partay Email: irfan.pa ray@leema.org Mobile: +91 9858455509

> IEEMA Members Helpline No. 022-66605754

Edited Printed and published by Mr Sunti Kumar Mis a on behalf of Indian Electrical and Electronics Manufacturers' Association, and Printed at India Printing Works, India Frinting House, 42, C. D. Ambeker Roed, Wadals, Mumbel 400 C31 and Published at 501, Kakad Chamberr, 132, Dr. Annie Besent Road, Worli, Mumbel 400 C18