

# Energy Xchange

Vol.1, Issue 3, June - 2009



Dear Energy Conservationists,



Over the last one year with Tata Power Energy club, you have learned the facts about electricity and discovered useful energy conservation tips that'll help you and your family to use energy wisely.

There are many things we can do to use less energy and use it more wisely. Two main ways to save energy are **energy conservation** and **energy efficiency**. Many people think these terms mean the same thing, but they are different.

**Energy conservation** is any behavior that results in the use of less energy. Turning the lights off when you leave the room and using natural light instead of artificial light are both ways of conserving energy.

Energy efficiency in simple terms is the practice of using less energy to do something as good as before or better. **Energy efficiency** is the use of technology that requires less energy to perform the same function. A compact fluorescent light bulb that uses less energy than an incandescent bulb to produce the same amount of light

is an example of energy efficiency. The decision to replace an incandescent light bulb with a compact fluorescent is an example of energy conservation. Similarly, there are electrical appliances available in the market with star ratings which are energy efficient.

The time has now come that we take our energy brigade to the next higher level and teach you not just energy conservation but also how to be '**energy efficient**'. We have already made a small beginning for our energy champions through our special programme called Megawatt Millionaire-Power Kids league where the first batch of energy champions were trained in energy efficiency in last week of May.

We hope that over the next few months more and more of you will become energy champions and get trained with us to be 'energy efficient' as well!

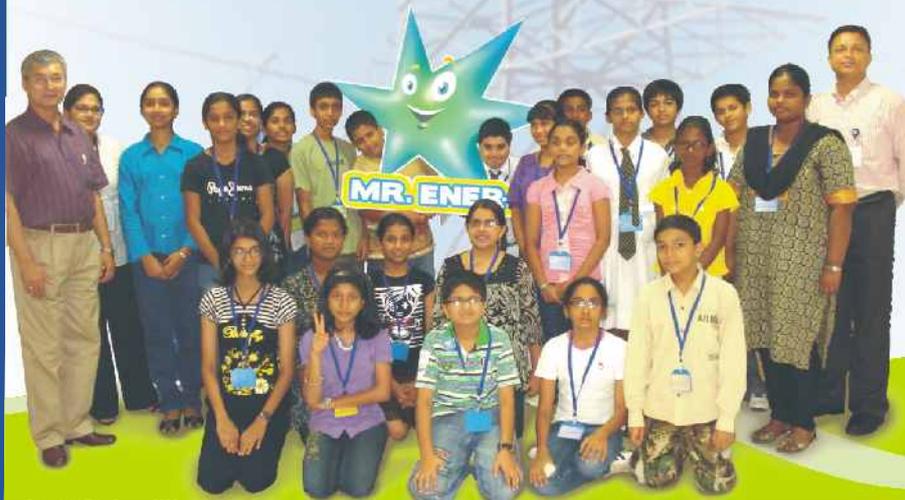
Best Regards

Prasad R Menon



## Content

- High Voltage - Cover Story ..... 2
- Flash Point - Global News ..... 3
- Interface - Students And Mentors Sharing Their Experiences ..... 3
- Tata Power News ..... 4
- Energy Talk - Commandments To Reduce Global Warming ..... 4
- Know Your Energy Quotient! ..... 5
- Make A Difference ..... 5
- Energy Champions Initiatives ..... 6
- Ask And Expert ..... 6



Copyright Tata Power 2008





## Tata Power Energy Club Organises Power Kids League

As the sun shone down brightly on 26th May, 25 young children tumbled out of a bus at Tata Power's Carnac receiving station. The guards looked on with bemused expressions as the children talked excitedly amongst themselves and tried to absorb their immediate surroundings.



The answer lay in the blue and green badge young Porus wore with great pride on his white school uniform. For, these were no ordinary kids – they were Tata

Power Energy Club's Energy Champions – 25 amongst the 338 children who have been making a difference to their environment over the past year.

Tata Power sees children as proponents of change. When a child goes up to an adult and says, "You can save up to four rupees for every unit of power you consume", the adult pauses and listens. The Tata Power Energy Club looks to harness this influencing power children possess in order to save the world from a dark future.

The Energy Club has already sensitized more than 39,000 people and plans to reach out to 1 million people nationwide over the coming year. Keeping this in mind, the '**Megawatt Millionaire**' programme was launched at the first Power Kids League workshop on 26 May 2009.

**Power Kids League** is a series of day long, activity filled workshops. Small groups of Energy Champions are imparted intensive training on conducting energy audits, understanding their electricity bills, checking lighting efficiency, using star-rated equipment to conserve electricity.

The opening address by Dr. Avinash Patkar, Chief Sustainability Officer, Tata Power set the tone for the day's proceedings.



Dr. Patkar, in his own inimitable manner, encouraged the Champions to be multi-skilled and to be proud of their achievements and of their country.

The session on technical training was conducted by Mr. Shekhar Khadiilkar from Tata Power's Demand Side Management team and was enjoyed immensely by the children. They were fascinated by the equipment on display which demonstrated the efficacy of energy efficient lighting. Mr. Khadiilkar really drove home the message when he said

8000 tonnes of coal are used to light up Mumbai city every single day!

Ms. Shalini Singh conducted the session on the 'Megawatt Millionaire' programme which had all the Champions sitting up and making copious notes. Each Champion has the stiff target of sensitising minimum 40 families in his/her neighbourhood and showing maximum possible savings. The Energy Champion who succeeds in reaching out to the maximum number of households will be crowned the 'Megawatt Millionaire'.

The second half of the day saw an Energy Quiz which went into six rounds of tie-breaker, a workshop on communication and



leadership skills by Ms. Saloni Kishinchandani and the Energy Ad Mad Show. The sessions were interspersed with short films on energy

conservation which included a fun rap song to which the children sang along.

The day ended with the distribution of the Energy kits which had enough material for the Champions to distribute in their neighbourhoods and the Graffiti wall. The Champions' enthusiasm and excitement assures me that the future of Mumbai is in safe hands!



Your Guide and Friend in Energy Conservation.





### Is China really going green?

New green edicts being issued from Beijing, China on an almost weekly basis. In April 2009, officials pledged to generate 100 gigawatts of electricity from wind power by 2020. Nuclear, solar and hydroelectricity are also being lined up for massive new investment through China's £400bn stimulus package, with 2020 targets for nuclear power raised from 40 gigawatts to 60 gigawatts, with some officials even talking of aiming for 70GW. Investment is also being poured into China's electricity grid to enable more renewable sources to be connected, while planners say they want to reduce carbon dioxide emissions per unit of GDP by 50 per cent by 2020. Elsewhere in Beijing the government has installed solar panels to power street lights and, along the rooftops of the city's remaining courtyard houses can be seen the winding pipes of solar water heaters, yet further evidence of change.

It's not an overstatement to say that the fate of the world

depends on which path China chooses. Emissions of atmospheric carbon dioxide have surged 370 percent in China since 1980; energy consumption has grown faster than the country's economy as a whole; China just surpassed the United States as the world's largest greenhouse gas polluter; and in twenty-five years it will emit more carbon dioxide than the rest of the industrialized world combined. If that happens, atmospheric concentrations of carbon dioxide will permanently overshoot the threshold of 350 parts per million, a level that climate scientists say we must return to if we are to avoid catastrophic, self-reinforcing, runaway climate change. (Current concentrations are 388 ppm.)



## Interface - Students And Mentors Sharing Their Experiences



### Sound Bytes From Energy Champs On Power Kids League Workshop

"The workshop was very informative and has enhanced my knowledge about the conservation of energy. It has created awareness in me which I was ignorant about. I will put in my best efforts to create awareness in maximum number of people I come across. The slide shows in the form of movie and the rap songs regarding the conservation of energy has virtually enthralled me. I am thankful to Tata Power for selecting me in this wonderful program. I am proud to be an Energy Champion and would further like to be a 'Megawatt Millionaire'. This small effort of energy saving on everyone's part will be a small step for mankind in conservation of energy."

**Aditi Maheshwari,**

Bhakti Vedanta Swami Mission School

"The workshop was good and quite knowledgeable. In fact, the sessions were so good that there was no room for doubt left. It was very amazing and inspiring. I plan to organize a 'batti bandh' campaign with my friends in my neighbourhood with the slogan, 'Lets Conserve Electricity for a Better Tomorrow'. A few families have also consented for a candle lit walk."

**Aishwarya Shetty**

Bombay Scottish School

"I love Tata Power Energy Club Power Kids League. I am happy to be a Power Kid and an Energy Champion. Tata Power rocks!!"

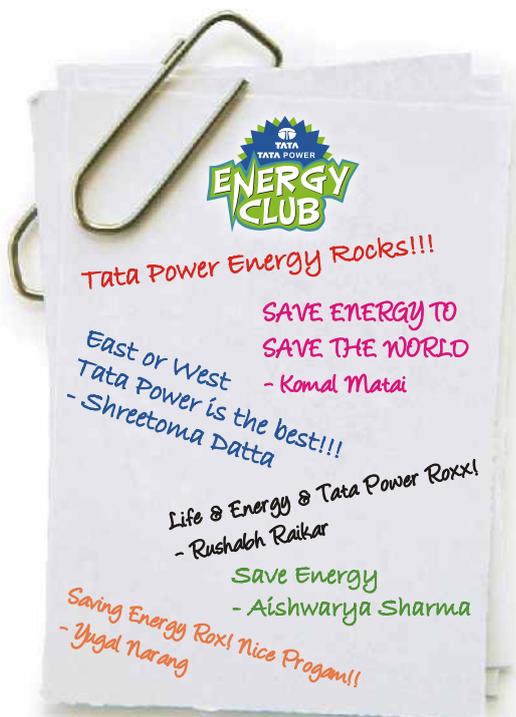
**Vaishnavi Brahmania**

Lady Engineer High School

"I am proud to be an energy champ. After TATA POWER representatives came to our school I became more energy conscious. I have been checking whether the lights are off of my classroom and the classes nearby. I also spoke to my friends about this, and they too started taking interest and spread awareness among their family members. Recently there was a workshop arranged for some of the energy champs on 26 may 09. In that workshop I learnt more about energy conservation e.g. use T5 tube lights, switch to gas geysers, try to get motion defector lights, etc. I am now organising some events in my complex to spread energy awareness. It is going to be very exciting to show people how much they are conserving and how they can reduce their electricity consumption. If all the people understand the importance of electricity then we can make this world a better and a brighter place to live!!!!"

**Esha D. Shetty**

Lokhandwala School





## Employees' Children Sensitisation



An unusual sight greeted us as our car drove in through the gates of Tata Power's Trombay colony. Five young boys, wearing a solemn air, walked in single file behind an older boy who looked like a commander of the troops. We wondered if our destinations were the same.

We had a surprise in store for us as we entered the Community Hall. We were greeted by smiling faces who had reached the venue long before the time mentioned on their invites! Half an hour into the session, we, the organising team realised that these were no ordinary children. They knew a lot more about energy and energy conservation than any of the children we had interacted with. And why

shouldn't they? They were after all children of Tata Power employees.

In the days preceding the event, we had wondered if we would be met with as enthusiastic a response as in other schools. The children warmed up to Ms. Shalini Singh as she kept them entertained before the event began. The session on Tata Power Energy Club was well received – the children were visibly excited by the thought of being part of a larger group, a movement much bigger than themselves.

The technical session by Mr. Shekhar Khadilkar was very well received and his 'magic box of electrifying tricks' was a hit, as always. Mr. Khadilkar was very impressed by the audience which had an answer for almost every question posed by him. Most impressive of all was young Chaitanya whose hand was up in the air almost throughout the session.

The two hour session wrapped up with the Energy Champion pledge which was taken in loud and rousing tones. As the children trooped towards the refreshment desk, one felt that the early morning sight of the five boys marching behind their young leader was a sign of things to come.



## Energy Talk - Commandments To Reduce Global Warming



### Steps to be followed for cut-out

- 1) Cut out the mask on perforated line
- 2) Tie an elastic band on either side of the mask
- 3) Transform yourself into Mr. Ener-ji

**2** Use CFL lamps

**3** Use stairs instead of elevators

**1** Use natural light, heat and cooling

**4** Switch off all appliances when in use

**5** Keep AC's at 24 degrees celsius



**MR. ENER-JI**





1. From \_\_\_AM to \_\_\_PM is Mumbai's maximum peak load period. **Fill in the blanks.**
2. Name the state that has the most number of wind farms.
3. How long does it take for carbon dioxide in the atmosphere to disperse?
4. A device is fitted to motor vehicles to chemically reduce some gases produced by internal combustion engines like NO<sub>2</sub>, CO, and HC into less harmful products. Name this device.
5. I am India's first electric car. **Who am I?**

*Energy*  
**SCRAMBLE**

Unscramble these five word puzzles, one letter each square, to make five regular words to you solve the answer.



What Einstein would say if he were alive today.

Answer Here:

**ENERGY**  
**MATTERS**

**THAM**  
**MATH**

**GLICO**  
**LOGIC**

**MATOS**  
**ATOMS**

**CELERY**  
**RECYCLE**

**RENUCLA**  
**NUCLEAR**

**\*Solution to the last issue's scramble**

## Make a difference

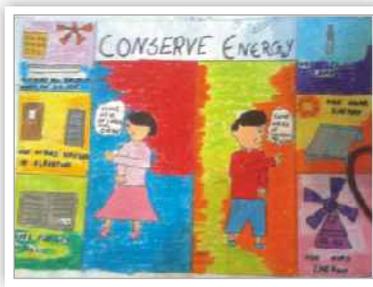


Register yourself on [www.tatapowerenergyclub.com](http://www.tatapowerenergyclub.com) and start making the change you've always wanted to see around you. Refer two or more of your friends to register online with [www.tatapowerenergyclub.com](http://www.tatapowerenergyclub.com) and **win a prize** for the most number of referrals!! Here is a face of Mr. Ener-ji for you, cut it out and start a movement of conserving energy!





## Society Sensitization by Energy Champion - Esha Shetty



An Energy Conservation sensitization programme was held in Spring Leaf Co-operative Housing Society, Kandivli East, made possible by the efforts of Energy Champion Ms. Esha Shetty from Lokhandwala High School, Kandivli East. Spring Leaf is a cluster of seven storey buildings which includes a 14 floor tower. All the buildings function as individual societies. Posters regarding the event and the cause were seen on the notice boards of all

the buildings. The meeting was attended by the respective Chairmen, Secretaries and Cultural Club Members of the different buildings.

The competition began with a short talk addressed to the members of the society about the need for energy conservation and some useful tips to reduce the electricity bills. This was followed by the drawing competition which had 54 participants showing their support for the cause in a creative way. The topic for the competition was "Energy conservation and related environmental issues".

The winners selected were from 4 different age groups:

- 0 – 4 years • 4 – 7 years • 7 – 11 years • 11 – 16 years

The two winners selected from each age group were given prizes from the society and from Tata Power respectively.



Overall, the Drawing Competition proved to be 3-4 hours of good fun mixed with the message of Energy Conservation conveyed by children - the future of the country.

The society also organised a Batti Bandh from evening 8pm – 8.30pm. The four wings of the building, immediately surrounding the swimming pool were plunged into darkness sharp at 8pm. The members of the society switched off all the lights and appliances and gathered in the swimming pool area for an evening of songs and house.

The event was a success due to the support and co-operation of the society members. The session ended with all the participants pledging to be a part of the energy conservation programme initiated by Tata Power.

## Ask An Expert!



**"When in doubt, Ask An Expert"**

**How do I reduce my electricity bill?**

**Why are my utility bills so much higher than my neighbour's?**

Questions like these are bound to cross your mind. You may also have a bright idea you would like to share. Please send your feedback, queries & suggestions to me at:

[energyclub@tatapower.com](mailto:energyclub@tatapower.com)

OR

**MR.ENER-JI**

**Corporate Communications Department, The Tata Power Company Limited,**

**Bombay House, 3rd Floor, 24 Homi Mody Street, Mumbai – 400 001**

Visit [www.tatapowerenergyclub.com](http://www.tatapowerenergyclub.com)

