EXCELLENCE RELIABILITY SENSE OF FAIRNESS AND FAIRPLAY

Suruhanjaya Tenaga

BuletinST

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Chairman's Message

Significant milestones were achieved by the Energy Commission in the last six months namely: the successful completion of the international competitive bidding exercise for a new capacity (1,000 MW) at Prai (Track 1) and the restricted tender for the renewal of operating licences for the first generation Independent Power Producers (IPP) and Tenaga Nasional Berhad (TNB) plants (Track 2).

Currently, the Commission is floating yet another open tender for the development of a 1,000 MW coal-fired power plant on a fast track basis and almost concurrently, another tender for a 2,000 MW coal-fired power plant at a new "green-field" site.

These steps are being undertaken by the Commission so as to ensure that there will be adequate generation capacity to meet the increasing national demand expected by 2017 and beyond. The fact that these exercises are being carried out through an open and transparent international competitive bidding process augurs well with the government's efforts to further enhance transparency and efficiency in its deliverables.

I believe that the Energy Commission has made great strides in delivering its mandate and role as the regulator for the electricity and piped gas in the country. Conscious efforts are being made to transform the organisation so as to enable it to meet current challenges. I recognise the contributions from all stakeholders in this process, in particular the staff of the Commission and my fellow Commissioners.

And on that note, I would like to take this opportunity to offer my heartfelt appreciation to members of the Energy Commission who have recently left office, namely YBhg Dato' Sri Dr. Ali bin Hamsa, upon his appointment as Chief Secretary to the Government of Malaysia on 24 June 2012 and YBhg Dato' Ir. Pua Shien Tick who opted not to renew his contract for health reasons. On behalf of the Commission, I offer our sincere gratitude for their invaluable contribution and commitment to the Commission.

At the same time, my heartiest welcome goes to YBhg Datuk Mohd Nasir bin Ahmad President of the Malaysian Institute of Accountants (2011/2013) and YBhg Datuk Dr. Rahamat Bivi binti Yusoff, Director General of the Economic Planning Unit, who have been appointed as Commission Members effective on1 September 2012 and 1 October 2012, respectively. I look forward to their participation and contribution to deliver the work of the Commission, especially during these exciting and challenging times.

Tan Sri Datuk Dr. Ahmad Tajuddin bin Ali
Chairman, Energy Commission

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First Competitive Bidding Completed Successfully

Suruhanjaya Tenaga (ST) has successfully completed the international competitive bidding exercise (Track 1) for a new capacity project in Prai, and also the restricted tender (Track 2) for the renewal of operating licenses of first generation Independent Power Producers (IPP) and Tenaga Nasional Berhad (TNB) plants. This is to meet the requirement of generation capacity in Peninsular Malaysia for 2016/2017 as submitted by ST to the Government.

Both Track 1 and Track 2 evaluations were based on the lowest levelised tariff meeting all the bid requirements.

For Track 1, Tenaga Nasional Berhad with the lowest levelised tariff, has been offered to build, own and operate a combined cycle power plant of 1,071 MW capacity in Prai, Penang to be commissioned by 1st March 2016. The combined cycle power plant will use 2 units of Siemens H-class gas turbines that can achieve plant efficiency of around 60% when commissioned in 2016 compared to the efficiency of F-class combined cycle plant in the system of around 55%.

For Track 2, Genting Sanyen Power, Segari Energy Ventures and TNB Pasir Gudang have been offered a renewal to operate existing plants at capacity and extension period as follows:

Bidder	Capacity
Genting Sanyen Power	675 MW for 10 years
Segari Energy Ventures	1,303 MW for 10 years
TNB Pasir Gudang	275 MW for 5 years

The levelised tariff in both bidding exercises is derived at using projected 2016 market gas price.

The outcome of the bidding also shows that existing combined cycle plants are competitive and are still capable of operating at a high level of reliability.

Through these concurrent bidding exercises, ST has successfully secured generation capacities to meet the growing demand of electricity starting in 2016 at the lowest cost of energy and with minimum completion risks.

Successful Track 1 and Track 2 bidders will be required to sign new Power Purchase Agreements (PPA) with terms that have been standardised by ST.

Following the success of the recently concluded international competitive bidding for the Prai power project, ST will be floating an open tender for the development of a 1000 MW coal fired power plant on a fast track basis and a 2000 MW coal fired power plant at a new site.

The fast track 1000 MW plant will be operational by October 2017 and the second power plant which is to be developed at a Greenfield site will be commissioned by 2018 or 2019.

GARIS PANDUAN METER ELEKTRIK: TELUS DAN BERINTEGRITI

Suruhanjaya Tenaga (ST) banyak menerima aduan orang ramai berkenaan kenaikan bil elektrik, terutamanya selepas penukaran meter bekalan elektrik yang dilaksanakan oleh Tenaga Nasional Berhad (TNB) sejak kebelakangan ini.

Meter lama yang ditukar kebanyakannya merupakan dari jenis elektro mekanikal yang telah berusia melebihi 15 tahun yang mungkin terganggu bacaan ketepatannya disebabkan faktor persekitaran seperti cuaca, suhu dan kelembapan ataupun faktor rekabentuk dan operasi kendalian meter itu sendiri.

Bermula awal tahun 2012, proses kawal selia ke atas meter-meter elektrik telah mula dipergiatkan. Berdasarkan pemantauan terhadap pengilang-pengilang meter elektrik, ST mendapati bahawa semua meter berkenaan mematuhi standard yang ditetapkan oleh Malaysia Standard (MS) dan International Electrotechnical Commission (IEC).

Proses pengujian dan kalibrasi meter dijalankan oleh makmal pengujian meter elektrik yang mematuhi Skim Akreditasi Makmal Malaysia (SAMM) yang dikawal selia oleh Jabatan Standard Malaysia di bawah Kementerian Sains, Teknologi dan Inovasi. Selain pemantauan konsisten serta mengarahkan TNB untuk mengkaji semula amalan pembacaan meter dan pegebilan elektrik pengguna, ST sebagai badan kawal selia sedang membangunkan Garis Panduan Pemeteran bagi mempertingkatkan mekanisme kawalan industri meter bekalan elektrik.

Garis panduan ini akan menambah baik proses sedia ada dengan pengenalan tiga proses baharu iaitu kelulusan bentuk (pattern approval) oleh National Metrology Laboratory dan SIRIM, pensijilan produk (product certification) oleh SIRIM QAS International dan permohonan perakuan kelulusan (certificate of approval) oleh ST. Stiker ST-SIRIM juga akan dilekatkan pada setiap meter bekalan elektrik yang baharu, yang dijangka akan bermula pada April 2013.

Dengan garis panduan ini, semua meter elektrik akan dipantau dan diaudit oleh ST bersama SIRIM QAS selaku pihak ketiga yang berkecuali dengan telus dan berintegriti.

Kajian Semula Amalan Pembacaan Meter dan Pengebilan Elektrik Pengguna

Selain membangunkan Garis Panduan baharu ini, ST juga telah mengarahkan TNB untuk melaksanakan dengan kadar segera langkah-langkah berikut:

- Melaksanakan pembacaan meter di premis pengguna pada setiap bulan dan disusuli dengan pengeluaran bil elektrik pada setiap bulan.

- Apabila timbul apa-apa keadaan di bawah Sub peraturan 4(4) (a) hingga (h) Peraturan-Peraturan Bekalan Pemegang Lesen 1990 yang menyebabkan meter tidak dapat dibaca pada sesuatu bulan, TNB perlu:
  - Mengeluarkan satu bil bagi bulan tersebut sahaja berdasarkan rekod dan sejarah penggunaan pengguna berkenaan selama 3 bulan berturut-turut sebelumnya

  - Memberitahu secara bertulis kepada pengguna mengenai keadaan yang menyebabkan meter tidak dapat dibaca. Ini adalah supaya pengguna dapat membetulkan keadaan itu untuk membolehkan meter dibaca pada tarikh yang ditetapkan bagi bulan yang akan datang; dan

  - Melaraskan akaun pengguna yang terbabit apabila meter dapat dibaca pada bulan berikutnya dan memberi penerangan bertulis akan pelarasan tersebut kepada pengguna berkenaan.

Bagi kes-kes di mana pengguna telah ingkar untuk membayar bil bulanan dalam masa yang ditetapkan, TNB hendaklah memastikan pengguna tersebut menerima satu notis bertulis mengenai pemotongan elektrik, sama ada secara pos berdaftar atau dihantar dengan tangan kepada alamat berdaftar pengguna berkenaan. Surat itu hendaklah menyatakan sebab dan tarikh pemotongan sekurang-kurangnya 7 hari bekerja sebelum pemotongan dilakukan.

TNB juga harus memaklumkan kepada pengguna berkenaan jadual pembacaan meter mengikut tarikh dan masa yang ditetapkan untuk setiap bulan di samping mengingatkan pengguna agar memastikan meter elektrik di premis mereka tidak terhalang dari dibaca dengan jelas oleh TNB.

Selain itu, TNB perlu memastikan bahawa bil elektrik bulanan hanya mengandungi perkara yang dibenarkan untuk disebut selaras dengan peraturan-peraturan berkaitan dan mengikut arahan ST yang dikeluarkan dari semasa ke semasa.

Perkara-perkara lain seperti caj terkurang yang dibilkan dengan kaedah 'backbilling' atau tuntutan kerugian hasil dan perbelanjaan dalam kes kecurian elektrik hanya boleh dilakukan melalui nota tuntutan yang berasingan dan tidak boleh dimasukkan dalam bil bulanan.

Pengguna juga hendaklah diberi maklumat secukupnya mengenai kandungan bil bulanan dan apa-apa perkara baharu yang dimasukkan dalam bil berkenaan.

ENERGY SECURITY:
CHALLENGES TO MALAYSIAN POWER INDUSTRY

Over the last few years, the global energy sector has been facing several major challenges, such as limitations in fuel resources, depleting fossil fuel reserves, volatile energy prices and effects of global warming. For developing countries like Malaysia, high levels of growth in energy demand are common. In fact, the country's final energy demand grew more than four-fold over the last 20-year period, and it is expected to increase yearly by over 7% in the foreseeable future.

There are three challenges in supplying electricity in Malaysia. First is in establishing an overall and sustainable structure for transitioning towards market pricing. Second is the impact of rising gas prices and uncertainties of gas supplies. Third is in considering the long term impact on generation planning towards greenhouse gas emissions.

Analysts and industry players have emphasise the need for a clear pricing policy and definition for market price of gas. This will ensure security of supply as the energy mix and planting up policies for the utility are currently dependent on the gas price.

The depleting gas resources, uncertainties in gas and coal supplies and increasing costs necessitate the need for forward planning on the best available options in determining the right, sustainable and balanced energy mix for the country.

If Malaysia were to reduce reliance on imported fuel, it may need to pursue development of alternatives such as nuclear power, large-scale hydro, renewable energy, demand side management and energy efficiency initiatives.

In short, the industry expects greater transparency, efficiency and reformation in the country's electricity supply industry – taking into account the affordability of users, risks to the economy and society's acceptance.

Malaysians need to accept the fact that the country's gas resources are limited and gas shortage in the near future would be inevitable. With the depleting fossil fuel and Malaysia becoming a net importer of energy by 2019, nuclear energy may be considered as an option for 2020 and beyond.

Following the Fukushima nuclear incident after the tragic calamities in Japan in March 2011, nuclear policies in both Organisation for Economic Co-operation and Development (OECD) and non-OECD countries have been altered, impacting on new power generation capacities worldwide.

To support the country's growing economy, the Malaysian government has taken several initiatives in the reformation of the electricity market industry. The main objectives are to increase the efficiency of electricity supply industry through unbundling of TNB's structure to enhance transparency, create a level playing field and reduce overall energy cost.

Energy security for the 21st century no longer centers on the petroleum supply security. Rather, it now encompasses on the security of a comprehensive and stable electricity supply under the conditions of sustainability. Moving forward, the Energy Commission will holistically review the National Energy Policy (eg: nuclear, renewable energy, co-generation) to support conventional power generation.

Source: Proceedings of the National Energy Security Conference held on 28 February 2012 in Kuala Lumpur.

MINIMUM ENERGY PERFORMANCE STANDARD (MEPS):
Further Promoting Energy Efficiency

Minimum Energy Performance Standard (MEPS) is a specification of several performance requirements for an energy-using device that effectively limits the maximum amount of energy that may be consumed by a product to perform a specific task. Products covered by MEPS must meet or exceed these set levels of energy performance before it can be sold to consumers in Malaysia.

How It Began

The development for MEPS began with the establishment of Energy Efficiency Criteria for Home Appliances in 2008. Initially, the criteria was developed to enable all local manufacturers for electrical appliances such as refrigerators, air-conditioners, televisions, domestic fans and lamps to apply for sales tax exemption and import duty incentives as stated in the 2008 Budget. This incentive is given to all local manufacturers producing electrical appliances and importers of electrical appliances that meet the energy efficiency standard based upon the said criteria.

The incentive seeks to encourage local manufacturers and importers to manufacture and import energy efficient appliances before MEPS becomes mandatory.

The Electricity Supply Regulations 1994 is to be amended to enable the implementation of MEPS. The amendment has been approved by ST and has been presented to the Minister of Energy, Green Technology and Water to be gazetted.

Benefits You Can Expect

MEPS is already practiced in various countries to ensure that electical appliances sold in the market are compliant with energy efficiency standards. In Malaysia's case, MEPS prevents the country from becoming a "dumping site" of electrical appliances that do not comply with energy efficiency standards of countries with established MEPS standards such as Japan, Korea, Australia, USA and Europe.

With this ruling, Malaysia will be following the footsteps of our neighbours: Thailand, Singapore, Philippines and Vietnam in implementing and enforcing the application of MEPS for electrical appliances.

ST and MEPS Enforcement

Apart from vetting and Certificates of Approval (COAs), ST will be conducting consistent market surveillance and enforcement activities to ensure manufacturers and importers comply to the said regulations. Failure to comply to MEPS may cause the respective appliances to be removed from the market.

Energy Label

Along with the implementation of MEPS, it would also be mandatory to affix the energy label to electrical appliances. This label helps the consumer in making their purchasing decision by including data of the product such as annual energy consumption and a star rating to evaluate its energy consumption compared to an average product in the market.

The Way Forward

Since the commencement of Energy Efficiency Criteria, ST has certified 4,398 models of appliances as energy efficient. The figure signifies the readiness of Malaysian market and the growing public awareness for MEPS compliance products. Tax exemption initiatives have enabled manufacturers and importers to produce and market energy efficient appliances at affordable prices. ST will continue to educate the public on the importance and benefits of embracing energy efficiency as 'a way of life' via seminars, workshops and media campaigns.

KENALI LABEL CEKAP TENAGA

Elektrik merupakan sumber tenaga utama yang digunakan di rumah. Dengan ertikata lain, pengguna seharusnya boleh terus menikmati manfaat dari peralatan elektrik yang tidak menggunakan tenaga lebih dari yang sepatutnya.

Kecekapan tenaga elektrik merujuk kepada penggunaan tenaga elektrik yang minima untuk menyempurnakan kerja di rumah atau di pejabat. Selain mengurangkan perbelanjaan kos elektrik, pengguna masih boleh memanfaatkan kualiti dan ciri kemudahan perkakas yang serupa.

Bagi peralatan elektrik cekap tenaga, penjimatan kos semasa hayat penggunaannya adalah melebihi penjimatan kos pembeliannya. Apabila membeli peralatan elektrik, cara mudah untuk mengenal pasti peralatan cekap tenaga ialah dengan melihat label tenaganya yang memaparkan kadar prestasi penggunaan tenaga peralatan berkenaan.

Mercu Tanda ST

9 Oktober 2012: Sidang media mengumumkan keputusan bidaan antarabangsa bagi pembangunan loji kitar padu di Prai dan bidaan terhad bagi perlanjutan tempoh operasi loji-loji penjana bebas (IPP) generasi pertama dan TNB.

5 Jun 2012: Lapan pembida (terdiri daripada 14 syarikat) telah menandatangani dokumen *Integrity Pact* dengan ST untuk membina loji penjanaan baharu dan enam syarikat telah menandatangani *Integrity Pact* dengan ST untuk bidaan terhad oleh IPP generasi pertama dan TNB, bagi pembaharuan lesen operasi loji jana kuasa di bawah *Power Purchase Agreement* (PPA) generasi pertama.

30 Ogos 2012: Kementerian Tenaga, Teknologi Hijau dan Air (KeTTHA) mengadakan majlis perjumpaan YB Menteri bersama warga KeTTHA dan Agensi di bawahnya, sekaligus meraikan sambutan Aidilfitri 1434 H bersama ST, Suruhanjaya Perkhidmatan Air Negara (SPAN) dan SEDA-MGTC.

8 Disember2012: Hari Keluarga ST dianjurkan di Zoo Negara, Kuala Lumpur untuk meningkatkan tahap setiakawan antara warga kerja ST dengan pihak pengurusan dan keluarga masing-masing.

Program Kesedaran Masyarakat Dan Industri

10 - 11 September 2012: Pegawai-pegawai ST didedahkan dengan aspek-aspek pengawalseliaan sektor tenaga secara lebih efektif, berkesan dan *best practices* di dalam bidang ini dalam program latihan ST mengenai *Supply Regulation* .

14 Disember 2012: Mesyuarat Panel Perunding Tenaga (PPT) diadakan dua kali setahun untuk membincangkan perkara-perkara berbangkit dan mencari jalan penyelesaian terbaik kepada kemantapan sektor tenaga khususnya industri elektrik dan gas berpaip di Malaysia.

2 Jun 2012: ST menyertai Pameran sempena Kem Sains di Kuan Cheng High School. Penyertaan ST bertujuan meningkatkan pengetahuan pelajar-pelajar dan pelawat mengenai keselamatan elektrik dan gas berpaip.

25 September 2012: ST sebagai badan kawal selia sektor tenaga terus mengadakan dialog dengan pihak utiliti, Tenaga Nasional Berhad (TNB) untuk membincangkan mutu dan tahap perkhidmatan perbekalan elektrik oleh TNB kepada pengguna-pengguna elektrik di Malaysia.

10 Oktober 2012: ST menyertai pameran *The 3rd International Greentech & Eco Product Exhibition & Conference Malaysia* (IGEM 2012) pada 10 hingga 13 Oktober 2012 bertempat di Kuala Lumpur Convention Centre. Penganjuran IGEM 2012 dengan tema *"Greentech For Growth"* bertujuan untuk mempromosikan lebih banyak produk, perkhidmatan dan penyelesaian teknologi hijau untuk pembangunan mapan hari esok.

ST telah menganjurkan Program Sehari Bersama Pelanggan sepanjang tahun 2012 di Gopeng, Perak, Kluang, Johor, Tawau, Sabah dan yang terakhir di Kuantan, Pahang. Ia bertujuan memberi peluang kepada orang ramai menyuarakan aduan berkaitan perbekalan elektrik dan gas, membuat permohonan lesen secara langsung kepada pegawai yang bertugas di pameran, memberi pendedahan secara langsung mengenai keperluan Orang Kompeten seterusnya mendedahkan secara khusus mengenai fungsi ST dan peranannya.

Merapatkan Hubungan Dengan Komuniti Global

21 Oktober 2012: Kunjungan Penasihat Kanan Polisi Jabatan Perdana Menteri Bahamas ke ibu pejabat ST untuk mengetahui dengan lebih mendalam fungsi Bangunan Berlian ST.

5 Julai 2012: Delegasi daripada Republik Czech diketuai TYT Thomas Chalupa, Menteri Alam Sekitar telah membuat lawatan ke Bangunan Berlian ST untuk meneroka peluang kerjasama yang boleh diadakan antara kedua-dua negara dalam bidang tenaga, teknologi hijau dan air.

2 Oktober 2012: ST menerima kunjungan hormat daripada TYT Viktor Sigi, Menteri Ekonomi, Kerajaan Negeri Upper Austria bersama 39 pegawai. Lawatan bertujuan mengetahui dengan lebih lanjut mengenai dasar dan strategi Kerajaan dalam mempromosi teknologi hijau, kecekapan tenaga dan tenaga boleh baharu di samping mengeratkan lagi perhubungan dua hala yang sedia terjalin.

21 November 2012: Kementerian Tenaga Republik Kenya telah mengadakan lawatan kerja ke ST bertujuan untuk meneliti pentadbiran dan pengurusan industri tenaga di Malaysia dan berkongsi ilmu tadbir urus regulatori yang dijalankan ST.

PEKELILING SURUHANJAYA TENAGA BIL. 03/2012
Penggunaan Kabel Kuasa Bersaiz 1.5MM² Kuprum Bagi Tujuan Pendawaian Litar Lampu

Pekeliling ini bertujuan untuk menjelaskan kepada semua konsultan, kontraktor elektrik, Orang Kompeten, pengilang dan pengimport kabel, dan semua pihak lain yang terlibat dalam mereka bentuk dan memasang sistem pendawaian pepasangan elektrik, mengenai keperluan penggunaan kabel kuasa bersaiz sekurang-kurangnya 1.5 mm^2 jenis kuprum (copper) bagi sistem pendawaian litar lampu di bangunan.

Kaedah pemasangan sistem pendawaian bagi litar lampu bersaiz 1.5 mm^2 jenis kuprum telah ditetapkan dalam Garis Panduan Pendawaian Elektrik di Bangunan Kediaman yang telah dikeluarkan oleh Suruhanjaya Tenaga (ST). Garis panduan tersebut telah dibangunkan selaras dengan kehendak-kehendak Standard Malaysia:

- MS IEC 60364 - Electrical Installations of Buildings
- MS 1936:2006 - Electrical Installations of Buildings- Guide to MS IEC 60364, dan
- MS 1979:2007 - Electrical Installations of Buildings- Code of Practice.

Garis panduan ini juga telah pun dimandatorikan melalui pekeliling ST Bil. 2/2008 bertarikh 1 Julai 2008.

Bagaimanapun ST mendapati bahawa masih wujud penggunaan kabel kuasa bersaiz kurang dari 1.5 mm^2 bagi tujuan pendawaian litar lampu di bangunan-bangunan. ST juga mendapati terdapat pengilang kabel tempatan yang masih mengeluarkan kabel-kabel bersaiz 1.25 mm^2 jenis kuprum bagi tujuan pendawaian tetap.

Tindakan Yang Perlu Diambil

Konsultan, kontraktor elektrik, Orang Kompeten dan semua pihak lain yang terlibat hendaklah memastikan kabel pendawaian bersaiz sekurang-kurangnya 1.5 mm^2 jenis kuprum sahaja digunakan bagi pendawaian tetap litar lampu.

Sumber maklumat dan pengenalan berikut boleh digunakan untuk mengenal pasti sama ada kabel yang digunakan adalah mematuhi standard ditetapkan, iaitu:

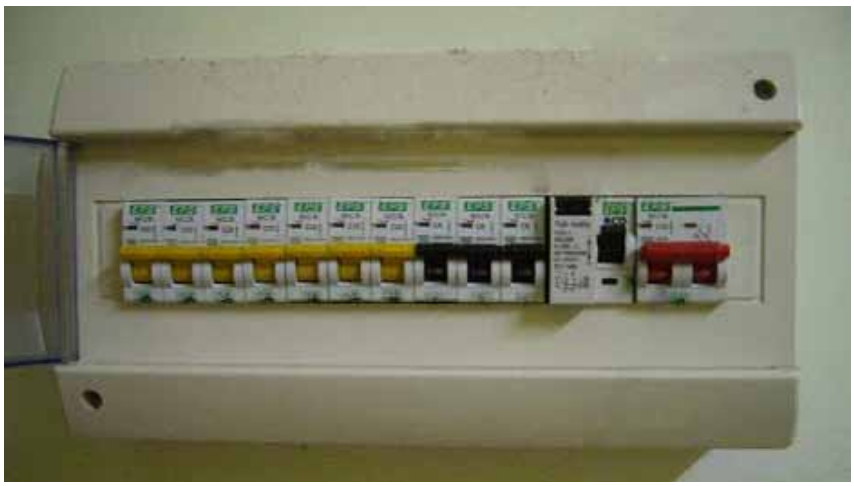
- Maklumat mengenai kabel di label pada bungkusan kabel;
- Tanda emboss pada kabel yang mencatitkan saiz, standard dan makmal ujian kabel berkenaan yang diiktiraf;
- Pemeriksaan fizikal secara terus ke atas keratan rentas kabel yang menunjukkan bilangan lembar pengalir (cable strands), jenis pengalir dan penebatnya.; dan
- Standard bagi kabel yang digunakan untuk tujuan pendawaian tetap ialah MS 2112:2009.

Penggunaan kabel kuasa bersaiz sekurang-kurangnya 1.5 mm^2 jenis kuprum bagi tujuan pendawaian litar lampu adalah bagi mengelak daripada berlakunya kepanasan lampau, susutan voltan atau kecacatan pada penebat kabel.

Sistem pendawaian litar lampu menggunakan kabel bersaiz sekurang-kurangnya 1.5 mm^2 jenis kuprum tersebut perlu dipasang secara berterusan (dari komponen fius (MCB) di papan agihan hinggalah ke poin lampu) tanpa sebarang sambungan.

Tindakan Penguatkuasaan

Semua konsultan, kontraktor elektrik, orang kompeten, pengilang dan pengimport kabel dan semua pihak yang terlibat dalam mereka bentuk dan memasang sistem pendawaian pepasangan elektrik adalah diingatkan supaya sentiasa mematuhi Pekeliling ST Bil. 2/2008 dan pekeliling ini. Tindakan tegas boleh diambil terhadap mana-mana pihak yang gagal mematuhinya.



KNOW YOUR ELECTRICAL WIRING SYSTEM

Wiring systems in Malaysia are designed in accordance to MS/IEC 60364 – Electrical Installations of Building, where by the cable size for lighting circuits is 1.5 sq.mm, 4 sq.mm for water heaters and air conditioners and 2.5 sq.mm for socket outlets. In addition they must be connected from the distribution board (DB) to the lighting point or power point without any joints in between.

Apart from emphasising on the correct sizes for cables used for lighting and socket outlets, Suruhanjaya Tenaga (ST) has outlined the following safety requirements to be adhered to in construction works:

- Wiring works to be carried out only by Electrical Contractors registered with ST
- Appointed Electrical Contractors must engage Competent Persons with certificates of competency issued by ST,
- Electrical appliances to be used must be of those approved by ST and affixed with ST-SIRIM label
- All protective devices installed must be of the correct rating capacity
- Residual Current Circuit Breakers (RCCB) should be tested regularly (once a month) to ensure it is in good wiring order

The Residual Current Circuit Breaker (RCCB) sensitivity to be installed must be in accordance with Regulation 36, Electricity Regulations 1994 as follows:

Type of Installation	Sensitivity of RCD	Need
Damp area (toilet, wet kitchen or water heater circuit)	10 mA (0.01A)	Compulsory
Final sub-circuit for power (socket outlet 13A)	30 mA (0.03A)	Compulsory
Full wiring (single and three phase)	100 mA (0.1A)	Compulsory

WHAT YOU SHOULD KNOW ABOUT GAS SAFETY

Although the gas distribution system in Malaysia is designed in accordance with all applicable safety regulations and internationally worldwide accepted codes, Suruhanjaya Tenaga (ST) wishes to emphasize the importance of familiarizing oneself with safety procedures when using gas appliances.

The basic safety handling procedures for gas appliances are as follows:

- Do not place inflammable items near gas appliances
- Open windows and doors to ensure good ventilation
- Oily surface may cause fire. Ensure your stove surface is always clean
- Frequently check gas piping and hose for possible leakages
- Ensure all gas valves are turned off before leaving your home or business premises

In the event of possible gas leak:

What You Should Do
Keep your doors and windows open for proper ventilation while cooking
Immediately turn-off gas supply by switching off all gas valves located on the stove
Turn off valves located at the gas meter
Call your gas supplier or dealer for assistance

Also
Keep away from all sources of ignition
Never light a fire
Refrain from smoking
Do not toggle any electrical switches by turning them on or off

If fire breaks out, immediately call the Fire Emergency Services (999 or 112 from mobile phones) and inform them about the existence of LPG cylinders in the premises.

Attempt the following only if it is practical and safe to do so:

- Turn off the gas supply
- Remove LPG cylinders from the vicinity of the fire.
- Try to identify the source of leakage and stop it. If the leakage cannot be stopped, wait until the fire subsides before the source can be isolated
- Do not turn on the gas supply until it has been declared safe to do so by a Competent Person registered with ST

For emergencies or queries, for premises receiving supply from Gas Malaysia Berhad, call 1-800-88-9119 (Emergency) or 1-300-88-GASM (Customer Service). For premises receiving supply from another supplier, please contact the supplier concerned.

MELINDUNGI KEPENTINGAN DAN KESELAMATAN PENGGUNA SECARA KONSISTEN

Demi melindungi kepentingan pengguna dan pembekal elektrik, ST sentiasa melaksanakan aktiviti penguatkuasaan secara konsisten dalam mengenal pasti orang, premis, pengarah-pengarah serta syarikat yang gagal mematuhi peruntukan Akta Bekalan Elektrik 1990 dan Akta Bekalan Gas 1993.

Sepanjang Julai hingga September 2012, ST telah memeriksa 155 premis seperti berikut:

Pada 3 Julai 2012, Mahkamah Majistret Selayang menjatuhkan hukuman denda RM60,000 atau 24 bulan penjara ke atas syarikat Bright Rims Manufacturing Sdn Bhd kerana kesalahan mengusik meter elektrik Tenaga Nasional Berhad (TNB) dan menghalang meter tersebut dari mencatat bacaan yang betul.

Pertuduhan adalah mengikut Akta Bekalan Elektrik 1990 [Akta 447] di bawah sub-seksyen 37(3)(e) di mana sabit kesalahan, pesalah boleh dikenakan denda tidak melebihi RM100,000.00 atau penjara tidak melebihi 3 tahun atau kedua-duanya sekali.

AKTIVITI PENGUATKUASAAN	PREMIS YANG DIPERIKSA	CATATAN	NOTA
Curi elektrik	17	7 Kertas siasatan dibuka	Aktiviti penguatkuasaan ke atas premis-premis yang disyaki menggunakan elektrik secara curang di bawah peruntukan Subseksyen 37(3) dan/atau Subseksyen 37(14) ABE 1994.
Kelengkapan	10	10 notis arahan pematuhan dikeluarkan	Pemantauan kelengkapan untuk memastikan setiap kelengkapan mematuhi keperluan Perakuan Kelulusan dan pelabelan/penandaan SIRIM seperti mengikut Peraturan 97 dan Peraturan 98, Peraturan-Peraturan Elektrik 1994.
Pepasangan	16	6 pepasangan telah didaftarkan	Pemantauan pepasangan elektrik untuk memastikan setiap pepasangan yang berkenaan adalah mempunyai suatu Perakuan Pendaftaran yang sah selaras dengan Seksyen 21 ABE 1994.
Pemantauan gas	2	Notis arahan pematuhan telah dikeluarkan kepada 'outlet' yang melanggar peraturan	Pemantauan gas adalah untuk memastikan pepasangan gas diselenggara dalam keadaan baik mengikut Akta Bekalan Gas 1993 dan Peraturan-Peraturan Bekalan Gas 1997
Pemeriksaan meter	93		Pengujian meter di tapak adalah bertujuan untuk memastikan meter-meter TNB adalah mematuhi Sub Peraturan-Peraturan Bekalan Pemegang Lesen 1990 (12)(2).
Rentis	4		Aktiviti bawah talian penghantaran TNB yang tidak mendapat kelulusan pemegang lesen.
Orang kompeten	6		Pemantauan orang kompeten adalah untuk memastikan pepasangan atau loji atau kelengkapan elektrik dikendalikan orang yang mempunyai Perakuan selaras dengan kehendak Seksyen 23 Akta Bekalan Elektrik 1990 dan Peraturan 60-70, Peraturan-Peraturan Elektrik 1994.

Pegawai ST memeriksa meter di salah sebuah premis kediaman

GUIDELINES FOR THE REGISTRATION OF ENERGY SERVICE COMPANIES (ESCO)

The Performance Management And Delivery Unit (PEMANDU) has held various discussions with the Ministry of Energy, Green Technology and Water (KeTTHA) in relation to the initiatives as a result of the Oil, Gas And Energy (OGE) laboratory sessions. In building a sustainable energy platform for economic growth, two (2) Entry Point Projects - (EPPs) under the National Key Economic Areas (NKEAs) for the Oil, Gas and Energy (OGE) sector, has been entrusted to the Ministry of Energy, Green Technology and Water (KeTTHA) to support efforts to improve supply security and efficiency in energy consumption. One of the identified EPP is the EPP9: Improve Energy Efficiency.

To ensure the success of the EPP9 implementation, five (5) initiatives have been identified to meet the objectives:

i. Government will lead by example in the practice and philosophy of energy efficiency;
ii. Stimulate the sales of energy-efficient equipment;
iii. The Government will work in partnership with TNB in establishing cogeneration that is viable economically (promoting cogeneration);
iv. Ensuring that buildings are better insulated; and;
v. Stimulate the sales of energy-efficient vehicles.

In implementing the above initiatives, KeTTHA has suggested to PEMANDU to seek direct involvement of the private sector to implement projects to improve energy efficiency in government buildings through Energy Performance Contracting (EPC). To ensure successful implementation of energy efficiency improvement projects based on the EPC concept for government buildings, ESCOs are required to register with the Ministry of Finance to enable them to carry out the EPC activity involving government buildings under the Green Technology Services Code.

The Ministry of Finance requires that ESCOs applying for registration under this Green Technology Services Code be registered with the Energy Commission as an Energy Service Company.

Scope of work of an EPC that requires registration includes supply of energy efficient devices and equipment, consultation services, contract works, energy audit, design engineering, project financing, management of EPC, commissioning and services, operation and maintenance of equipment of energy-efficient installation and inspection of energy efficiency improvement projects.

Applicants shall fulfil the following requirements and criteria:

- Has registered his business with either the Registrar of Business or the Registrar of Companies as the case may be;
- Has employed, on a full time basis, a Registered Electrical Energy Manager as prescribed under the Efficient Management of Electrical Energy Regulations 2008;
- Has access to suitable monitoring and testing equipment and instruments required for energy efficiency management works; and
- Has satisfactorily furnished all the information as stipulated in the application form.

The Letter of Registration issued under this guideline is only valid for a period of one year from the date of issuance of the said Letter of Registration.

The renewal of the Letter of Registration as an Energy Service Company must be made not less than 1 month before the date of expiry of the registration. ST may cancel the Letter of Registration as an Energy Service Company if:

- The holder of the Letter ceases to carry on the business in respect of which he is registered;
- The holder of the Letter has been adjudicated a bankrupt;
- The company goes into liquidation.

Notes:

• The Letter of Registration as an Energy Service Company cannot be transferred without prior written approval from ST.

• Any change of name, address and other details of the business or company stated in the Letter of Registration must be informed in writing to ST within 14 days of such change.

• In the event of any change or replacement of an appointed Registered Electrical Energy Manager, the Energy Service Company shall ensure that a new Registered Electrical Energy Manager be appointed and the Energy Service Company to notify ST in writing within 14 days of such change or replacement.

• All electrical works in relation to the Energy Services provided by the Registered Energy Service Company must be performed by Competent Persons in accordance with the Electricity Supply Act 1990 and the Electricity Supply Regulations 1994.

The completed application form together with all the supporting documents and an application letter must be submitted to the Director of Energy Management and Industry Development, Energy Commission at the following address:

DIRECTOR,
Energy Management and Industry Development,
Energy Commission,
No. 12, Jalan Tun Hussein,
Presint 2, 62100,
PUTRAJAYA.

For enquiries and clarification, kindly contact ST at 03-8870 8564 or visit www.st.gov.my

SUMBANGAN DAN JASA YANG SENTIASA DIKENANG

Sebagai menghargai jasa dan sumbangan mantan dua orang anggota Suruhanjaya Tenaga (ST), YBhg. Dato' Sri Dr. Ali bin Hamsa dan YBhg. Dato' Ir. Pua Shien Tick telah diraikan pada suatu majlis makan malam yang dilangsungkan pada 20 November 2012.

YBhg. Dato' Sri Dr. Ali bin Hamsa telah bersama ST selama empat tahun sejak 1 Disember 2008. Manakala YBhg. Dato' Ir. Pua Shien Tick, selama dua tahun bermula dari 1 September 2010.

Antara inisiatif yang berjaya dilaksanakan sepanjang tempoh keanggotaan dua mantan anggota ST tersebut adalah penguatkuasaan Kanun Grid dan Kanun Pengagihan, pelaksanaan standard perkhidmatan untuk TNB *(Minimum Service Level dan Guaranteed Service Level)*, pengenalan *Incentive-Based Regulations,* pelaksanaan proses bidaan kompetitif terhad dan antarabangsa untuk kapasiti penjanaan tenaga elektrik serta pewujudan pangkalan data tenaga Malaysian Energy Information Hub (MEIH).

Ilmu dan pengalaman serta kemahiran mereka jelas membantu ST memberikan input dan pandangan kepada Kerajaan yang diterima baik dan diguna pakai, dalam menambah baik sektor tenaga di malaysia.

Majlis tersebut juga meraikan pelantikan anggota ST yang baharu iaitu YBhg. Datuk Mohd Nasir bin Ahmad, Presiden Malaysian Institute of Accountants (2011/2013) dan YBhg. Datuk Dr. Rahamat Bivi binti Yusoff,Ketua Pengarah Unit Perancang Ekonomi . Ianya diserikan lagi dengan kehadiran YB Dato' Sri Peter Chin Fah Kui, Menteri Tenaga, Teknologi Hijau dan Air.

HUMAN CAPITAL DEVELOPMENT:
ARE WE ADDRESSING THE REAL PROBLEMS?

When faced with situations that necessitate appropriate responses, there is a general tendency for organisations to overlook the real issues, resulting in many of the actions taken to lose the desired impact and solutions.

More often than not, when an organisation tries to change its work processes or systems, many of the changes are unsustainable or fall short of expectations. Before long, the old problems resurface.

What could then be the real problem, considering most of the employees are qualified and well experienced? In retrospect, the faults may lie with the implemented measures that were doomed from the beginning. The problem was not the system's but rather the employees'.

Absenteeism was soaring. Sick leaves were unnaturally frequent. Overtime claims were phenomenal. Staff bickering was common. Staff turnover, not surprisingly, was high. These are signals pointing towards major attitude problem of employees.

Under these circumstances, any transformation programme would be meaningless since the people responsible for carrying out the plan itself lacked the substance and qualities necessary for an effective implementation.

"Verily never will Allah change the condition of people until they change it themselves (with their own souls)" (Holy Quran, Sura Ar-Rad, verse 11)

Perhaps prior to any undertaking of company 'transformation' programmes, the transformation of these 'troubled' employees must be carried out first.

"We have indeed created man in the best of moulds. Then do We abase him (to be) the lowest of the low. Except such as believe and do righteous deeds. For they shall have a reward unfailing" (Holy Quran, Sura At-Tin, verses 4-6)

Indeed, as illustrated in the above verses, organisation transformation programmes must begin with the transformation of an employee. Attempts at improvements may not achieve the desired results if they are introduced during the phase of one's 'lowest of the low' or until said employee is ready to change.

A summary for the article written by Encik Abdul Mutalib Ismail, Founder and Executive Director of MMS Business Solutions. Encik Abdul Mutalib have conducted P.E.T.A (People Turnaround) course for staff of the Energy Commission since 2009.

A big change begins with one small step.

Imagine life without energy. Imagine its complexities in running your daily activities due to energy shortage. Imagine the loss of hundreds, thousands and millions of ringgit when energy is wasted today without considering its detrimental impact on future generations.

A big change would be difficult to achieve unless a small step is being made. The change begins with you. Do it. Today.

Switch off electricity when not in use. The more we waste, the more we pay.

Conserve energy.

KeTTHA
KEMENTERIAN TENAGA, TEKNOLOGI HIJAU DAN AIR

Suruhanjaya Tenaga