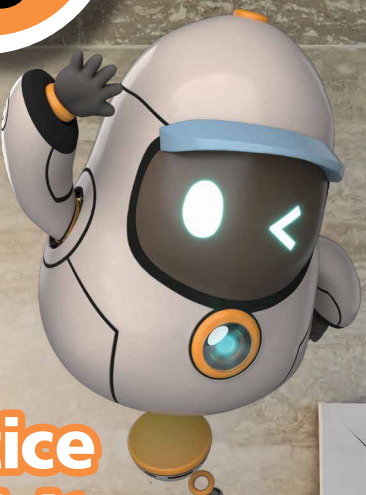



電力快訊

ELECTRICITY NEWS



Code of Practice for the Electricity (Wiring) Regulations (2020 Edition)

Online Appointment Booking Service and Self-service Tag Issuing Kiosk for Counter Services at the Registration and Permit Office

Safety Tips for Supplying Household Electrical Products

Points to Note for Application for Renewal of Approval as Competent Persons





20th Anniversary of the Annual Technical Seminar – “Collaborative Efforts of the Trade for 20 Years – Encouraging Each Other to Create the Future”

Handle Flammable Refrigerants with Care and Stay Vigilant while Conducting Electrical Work

● www.emsd.gov.hk

《電力快訊》的中英文版本可於以上網頁瀏覽。
The English and Chinese versions of the Electricity News
may be viewed on the above website.

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Feature Article 1



Code of Practice for the Electricity (Wiring) Regulations(2020 Edition)

Background of Formulation

Members of the trade should be aware of that electrical work must be carried out by registered electrical contractors (RECs) and registered electrical workers (REWs) in accordance with the technical and safety requirements specified in the Electricity Ordinance (Cap. 406) and its subsidiary regulations (including the Electricity (Wiring) Regulations). The purpose of the Code of Practice for the Electricity (Wiring) Regulations (CoP) is to provide RECs and REWs with technical guidelines on how to meet the requirements of the Electricity (Wiring) Regulations.

The current edition of the CoP, the fifth edition since its first publication in 1992, was published in 2015. To keep pace with the times and keep abreast of the latest development of technological and safety requirements and trade practices, the Electrical and Mechanical Services Department (EMSD) commenced the review of the CoP in May 2019.



Review Process

In order to extensively consult the trade and relevant stakeholders, the EMSD set up in end-2019 the Working Group for Reviewing the Code of Practice for the Electricity (Wiring) Regulations (Working Group), comprising members nominated by various organisations of the electrical trade (e.g. labour unions, trade associations, consultant associations, tertiary institutions, professional institutions, power companies, etc.) and other relevant Government departments. The first meeting of the Working Group was convened on 16 October 2019. Members of the Working Group raised some concern with the EMSD during the review process. The review direction was on the following three major aspects:

- The latest international safety standards(e.g. the 18th Edition of the Institution of Engineering and Technology Wiring Regulations and the relevant standards of the International Electrotechnical Commission);
- Emerging technologies and the latest developments of the electrical and mechanical trade (e.g. renewable energy power system, charging facilities for electric vehicles, Modular Integrated Construction, etc.); and
- Relevant views of the electrical trade on the CoP.

Major Revisions

The major revisions of the CoP (2020 Edition) include:

1 Inclusion of Precautions for Work inside False Ceilings

In response to the electrical incidents involving work inside false ceilings occurred in recent years, the CoP has included precautions for work inside false ceilings to enhance the occupational safety of the relevant work. A task-specific risk assessment should be conducted by a competent person

assigned by a REC or the owner of the fixed electrical installation to identify all potential hazards associated with work inside a false ceiling before the commencement of work. A REC or the owner of the fixed electrical installation should formulate appropriate method statements with safety procedures and safety measures for the work in accordance with the relevant risk assessments, and provide necessary safety information, instructions, training and supervision to the persons performing such work to avoid danger.

The method statements should include but not limited to identifying the scope of work and circuits of energised electrical installation at the place of work and in the vicinity of the work area, and eliminating the risk of inadvertent contact with live conductors/live part of energised electrical installation at the place of work and in the vicinity (within 1.5 metres) of the work area as well as its access path. In addition, suitable personal protective equipment and testing equipment should be provided to and properly used by the persons performing the work. Entering into or working on fragile false ceilings or similar unsafe places should be strictly prohibited. If access to and working in such places are required, suitable means of access/means of support/working platforms should be provided and properly used.

2 Recommendation of Installation of Arc Fault Detection Device (AFDD)

About 20% to 30% of fire incidents are related to electrical installations worldwide each year and arc fault is one of the causes of electrical-installation-related fire. Possible causes of arc faults include improper installation of cables, intermittent connection or damaged cable insulators. The high temperature resulting from arc faults may cause fire. Since existing mainstream protection devices (overload circuit breakers and residual current devices) are unable to detect some types of arc faults, countries across the globe have one after another recommended or mandatorily required the installation of AFDDs in specific venues. In view of the above, the CoP makes reference to the 18th Edition of the Institution of Engineering and Technology Wiring Regulations and recommends that AFDDs complying with IEC 62606 or equivalent should be installed at the following specific premises to further safeguard electricity safety:

- premises with sleeping accommodation (e.g. dwellings, hotels and guesthouses);
- premises for manufacturing or storing of readily combustibles substances, or substance liable to spontaneous combustion (e.g. dangerous goods stores and filling stations);
- premises where combustible materials are used as the main construction materials (e.g. wooden buildings); and
- premises with endangering or irreplaceable goods (e.g. museums).



3 Revision of Current Demand of Lighting Current Using Equipment of Final Circuit

In view of the growing popularity of environmentally friendly lighting fittings (e.g. LED lamps) with much lower electricity consumption compared to traditional lighting fittings, the calculation method of the assumed current demand and the current demand of final circuit in relation to lighting outlets as stipulated in the CoP has been revised. Lighting outlets should be assumed to demand the connected load with 60W per lampholder for incandescent lamps or the actual wattage of the lamp to be installed, whichever is the greater, except if the design of the luminaire associated with the lampholder only permits lamps of less than 60W to be inserted in any lampholder, in which case, the connected load of that lampholder is the wattage of the highest rated lamp that may be accommodated. For fluorescent and other discharge lamps, the demand of the connected load of the lighting outlets should be assumed as the actual wattage of the installed lamps multiplied by a factor which has taken into account control gear losses and harmonic currents. In the absence of more precise information from manufacturer, a factor of not less than 1.8 shall be adopted.



If the circuit design of the lampholder only permits lamps of less than 60W to be used, the connected load of that lampholder is the wattage of the highest rated lamp that may be accommodated.

4 Establishment of Requirements for Final Circuits Using Universal Serial Bus (USB) Outlets



Since electrical products which charge with USB outlets have become increasingly common and there are public demand for USB outlets, the CoP has included the requirements for final circuits using USB outlets to ensure the safety of USB circuits. 13A socket outlets incorporated with USB circuits shall comply with relevant requirements included in Part 2, BS 1363. If the USB circuits are not part of the circuits of the 13A socket outlets, they shall be independent of other circuits, comply with the requirements of IEC 60950-1 and use radial final circuits. Moreover, appropriate overcurrent protection (e.g. a fuse) shall be provided on the primary side of each USB circuit to further enhance the safety of USB circuits.

5 Inclusion of Technical Guidelines on Direct Current (DC) System

To tie in with the increasingly extensive application of DC systems on fixed electrical installations (e.g. renewable energy power systems, charging facilities for electric vehicles, etc.), the CoP has included technical guidelines on DC systems, which stipulate that all conductors of a DC circuit shall be capable of being isolated by a device for isolation (e.g. with a double-pole circuit breaker), and in the case of a DC circuit having one conductor connected either to earth or to a protective earthing conductor, that conductor need not be isolated or switched. The CoP has also included the requirements and colour codes for identification of DC conductors or cable cores. In general, positive conductors should be coloured brown and negative conductors should be coloured grey.

6 Use of Residual Current Devices (RCDs) At Village Premises

In response to the electrical incidents involving electrical installations at village houses occurred in recent years, the CoP has a new requirement that protection by means of residual current devices shall be provided for electrical installations in premises under the List of Recognized Villages under the New Territories Small House Policy, in order to enhance the electrical safety of village premises. Not only limited to electrical installations at village houses, the requirement is applicable to any premises within relevant village environs. According to the CoP, appropriate circuit breaking function for residual current installed at the main switch immediately before the electric meter or the main switch box of the unit is also acceptable.



7 Charging Facilities for Electric Vehicles

In recent years, the Government and the trade have been strongly advocating the construction of electric vehicle (EV) charging infrastructure to tie in with the Government's policy directions and to meet the increasing demand for EVs. In view of the increasing demand for charging facilities, the Working Group has incorporated more detailed technical guidelines and requirements into Code 26S. The main technical requirements include that each final circuit of the EV charging facility shall be installed as a separate radial circuit, and that diversity may be allowed for a dedicated distribution circuit supplying multiple EV charging points if load control is available. In addition, charging facilities having different charging modes shall comply with individual standards. The socket outlets and connectors for charging modes 1, 2 and 3 shall comply with BS 1363, IEC60309 and IEC62196 respectively. A current breaking device shall also be provided at the upstream of the socket outlet at the charging facility for switching on after plugging and switching off before unplugging the charging cable assembly. As for the EV charging devices for outdoor use and installed in public places and parking lots, appropriate degree of protection shall be provided. As regards fault protection, except for circuits using the protective measure of electrical separation, each charging point shall be protected by its own RCD of at least Type A, having the characteristic specified in Code 11J. As for each charging point incorporating a socket outlet or connector complying with the IEC 62196, protective measures against DC fault current shall be taken, except where provided by the EV charging equipment. These include the use of a RCD of Type B or a RCD of Type A and appropriate equipment that provides disconnection of the supply in case of DC fault current above 6mA. Details of other relevant technical guidelines and requirements are provided in Code 26S.



Mode 1 Charging
BS 1363



Mode 2 Charging
IEC 60309



Mode 3 Charging
IEC 62196

8 Renewable Energy Power System

With the implementation of the Feed-in Tariff Scheme and the increasing maturity of renewable energy technologies, the use of renewable energy power system has become popular. To ensure the electrical safety of renewable energy power system (REPS), the prevailing Code 26P for renewable energy systems has been revised. Since the solar power system uses direct current as the output, the electrical installations on the direct current side (including cables, inverters, protective and switching devices, etc.) shall be suitable for direct current voltage and direct current. Isolation transformers in compliance with IEC 61558 or equivalent should be installed to provide simple separation between the DC side and the AC side. For some REPS installations running in parallel with the system for distribution of electricity to the public, an automatic synchronizing system which considers frequency, phase and voltage is to be preferred. The REPS shall also be equipped with an anti-islanding function. In the event of loss of power supply or deviation of the voltage or frequency at the supply terminals, means of automatic switching to avoid unsynchronized connection and to protect electrical worker working on power system should then be provided. Details of other related technical guidelines and requirements are set out in Code 26P. In addition, checklists for inspection and testing of solar power system installations and typical drawings of the equipment have been included in the CoP for the trade's easy reference.

9 Installation for Modular Integrated Construction

In view of the growing maturity of the technology and application of the Modular Integrated Construction (MiC), the new edition of the CoP has incorporated particular requirements for fixed electrical installations with the use of MiC in design and construction. For details, please refer to Code 26T.

For other amendments to the CoP, please refer to the Summary of Major Revisions to the Code of Practice for Electricity (Wiring) Regulations 2020 Edition at the EMSD website.

Publication Details and Effective Date

The Code of Practice has been published and available for downloading free of charge on the EMSD website (www.emsd.gov.hk). Printed copies are available for sale at the Publications Sales Unit, Information Services Department, Room 626, 6/F, North Point Government Offices, 333 Java Road, North Point. Orders can be placed by calling at 2537 1910, emailing to puborder@isd.gov.hk or via online Government Bookstore (www.bookstore.gov.hk).

The new edition of the CoP will be fully implemented on 31 December 2021 to replace the 2015 edition, after a grace period of one year. In other words, those electrical installations completed and connected to electricity supplies on or after 31 December 2021 shall comply with the guidelines set out in the new edition of the CoP. The new revisions to the CoP shall only be applicable to new electrical installations and existing electrical installations undergoing retrofitting, and shall not retrospectively give effect to existing installations already connected to electricity supplies and in operation.

Feature Article 2

Online Appointment Booking Service and Self-service Tag Issuing Kiosk for Counter Services at the Registration and Permit Office

In order to reduce the risk of the spread of COVID-19, the Registration and Permit Office of the EMSD implemented measures to control the flow of people, and longer waiting times may be required for counter services. In view of this, the EMSD has introduced an Online Appointment Booking Service System and a Self-service Tag Issuing Kiosk on 26 January and 29 March 2021 respectively to facilitate the use of counter services by members of the public and the trade.

To save waiting time, members of the public and the trade are advised to make an appointment through the Online Appointment Booking Service System in advance and obtain a tag number at the Kiosk by scanning the QR code on the appointment letter for counter services on the material day. Convenient and time-saving, the Online Appointment Booking Service System allows users to make appointments with only a few simple steps. To make an appointment, scan the QR code on the right, or go to the EMSD website (www.emsd.gov.hk > Menu > Appointment Booking Service – RPO) to register for the required services.



Arriving at the office, a counter services user should obtain a number tag from the Self-service Tag Issuing Kiosk. Those who have made an appointment online could obtain a number tag at the kiosk by scanning the QR code on the appointment acknowledgement, while those who have not done so could make an appointment at the kiosk and obtain a number tag.

號碼 (Tag Number)	樓層 (Floor)
A016	2
B001	2
C137	6
D022	2

Video for Electrical Workers - Electrical Works Safety

If it has been five tag numbers past your number tag, please obtain a new number tag at the Self-service Tag Issuing Kiosk.

Those who have not made an appointment should select "Walk-in" and then "Service" to obtain a number tag for services in relation to registered electrical workers, registered electrical contractors, endorsement of Periodic Test Certificates (Form WR2), registration for generating facilities, application for approval as competent persons under the Electricity Supply Lines (Protection) Regulation, etc. For making payment only, please select "Payment Only" to obtain a number tag.



號碼 (Tag Number)	樓層 (Floor)
A016	2
B001	2
C137	6
D022	2

Video for Electrical Workers - Electrical Works Safety

If it has been five tag numbers past your number tag, please obtain a new number tag at the Self-service Tag Issuing Kiosk.

After obtaining a tag number, the user should follow the instruction for the tag number shown on the display panel in the office to proceed to a designated counter for services.

If the required documents are found to be incomplete or missing at the counter and further preparation is needed, the user could, after the required documents are ready, scan the QR code on the number tag at the kiosk shown on the right, and follow the instruction for the tag number shown on the display panel in the office to proceed to a designated counter for services again. Upon the counter staff's confirmation that all required documents are submitted and the payment of the application fee, the entire application process is complete.



News-in-brief 1

Points to Note for Application for Renewal of Approval as Competent Persons

For competent persons engaged for the detection of electricity supply lines with a certificate of approval that will soon expire, please take note of the following points to note for application for renewal of approval and submit your application as early as possible.

Enacted under the Electricity Ordinance (Cap. 406), the Electricity Supply Lines (Protection) Regulation stipulates that within the period of three years immediately preceding the application for renewal, the competent persons shall have not less than three months' practical experience in locating underground electricity cables. The application for renewal shall also be made at least one month before, but not earlier than four months before, the expiry of the current approval. Competent persons are hereby reminded to submit the application for renewal within the specified period to avoid early or late submission, neither of which will be accepted.

To apply for renewal of approval as competent person, please submit an application form CPA1, a certificate of services or employment and three underground electricity cable detecting reports. The application procedures are shown on the right:

1. Obtain an application form CPA1 (EMSD/EL/CPA1 (10/2020)) at the following venues or download the form online:
 - (i) Registration and Permit Office, EMSD, G/F, 3 Kai Shing Street, Kowloon, Hong Kong
 - (ii) District Offices; or
 - (iii) EMSD website (https://www.emsd.gov.hk/filemanager/en/share/electricity_safety/public/forms/cpa1pdf)
2. Complete the application form in accordance with the requirements stipulated in the "Notes to Form CPA1" attached to the form.
3. Submit the completed application form together with the application fee and supporting documents to the Registration and Permit Office of the EMSD.



Enquiries:

For enquiries, please contact the Registration and Permit Office of the EMSD at G/F, 3 Kai Shing Street, Kowloon, Hong Kong from 9:00 am to 5:15 pm, Mondays to Fridays (closed on Saturdays, Sundays and Public Holidays). Telephone hotline: 1823.



Safety Tips for Supplying Household Electrical Products

Household electrical products supplied in Hong Kong and operating at a voltage exceeding 50V a.c. or 120V d.c. are regulated by the Electrical Products (Safety) Regulation (the Regulation). Under the Regulation, suppliers of household electrical products supplied for use in Hong Kong shall ensure that the products have been issued with valid certificates of safety compliance (CSC) beforehand. Suppliers shall obtain relevant documentary proof from their supplying sources to confirm that the products have indeed been issued with CSC. It is important that suppliers shall also keep the relevant documentary proof for record purpose and for inspection by the EMSD. The categories of persons who may be regarded as suppliers and regulated by the Regulation are varied, covering manufacturers, importers, wholesalers, retailers and any persons supplying household electrical products. The Guidance Notes for the Electrical Products (Safety) Regulation (Guidance Notes) have been published and uploaded to the EMSD website for public reference.



Section B.7 and B.8 of the Guidance Notes specify the detailed requirements for valid CSC. Besides, electrical products shall comply with the applicable safety requirements. The international standards applicable to some of the more common household electrical products are cited in Section C.1 of the Guidance Notes. Given the rapid development of household electrical products, please refer to the webpage of the International Electrotechnical Commission for any information not covered in Section C.1 of the Guidance Notes.



Handle Flammable Refrigerants with Care and Stay Vigilant while conducting Electrical Work

In 2017, the EMSD, Fire Services Department and Labour Department issued a joint departmental circular on the safety of flammable refrigerants to remind the air-conditioning and refrigeration trade to take public safety as the primary consideration when choosing refrigeration equipment and its refrigerants. In view of the crowded and densely populated environment with congested high-rise buildings in Hong Kong, it is not suitable to install refrigeration equipment using flammable refrigerants (please refer to Table 1 for examples) in industrial and commercial buildings as well as buildings with a large number of users such as schools and residential care homes, from the perspectives of safety and risk management. As for existing equipment, it is advised to adopt the prescribed refrigerants according to the manuals provided by the manufacturers, instead of switching to flammable refrigerants for the avoidance of accidents. For details of the circular, please visit the following website or scan the QR code shown on the right.

https://www.emsd.gov.hk/filemanager/en/content_2/EMSDnFSDnLD_Joint_Notice.pdf



Refrigerant Number	Composition	Flammability Classification of ISO 817
R290	Propane	Class 3 (Highly Flammable)
R600a	Isobutane	Class 3 (Highly Flammable)
R32	Difluoromethane	Class 2L (Mildly Flammable)
R1234ze(E)	1,3,3,3-Tetrafluoropropene	Class 2L (Mildly Flammable)
R1234yf	1,3,3,3-Tetrafluoropropene	Class 2L (Mildly Flammable)

Table 1

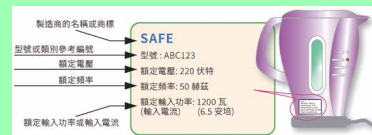
To provide a quick and easy reference for readers to grasp the important contents of the Guidance Notes, its first chapter, titled "Quick Summary", offers a simplified overview of the major requirements of the Regulation, e.g. a brief description of the persons that may be regarded as suppliers of electrical products, the ways to check for ensuring the availability of CSC, samples of CSC for reference;



illustrations to explain the safety requirements of plugs and the markings of electrical products, etc. In addition, concise checklists have been included in this chapter to facilitate suppliers in conducting a preliminary check on whether their electrical products comply with the requirements of the Regulation.



Plugs of Electrical Products



Sample of Product Markings

For detailed contents of the Guidance Notes, please download them from the EMSD website (www.emsd.gov.hk) for free or purchase from the Publications Sales Unit of the Information Services Department at Room 626, 6/F, North Point Government Offices, 333 Java Road, North Point.

Since flammable gas can be ignited by small electric sparks, practitioners of the electrical trade should check if the refrigeration equipment nearby uses flammable refrigerants before carrying out installation, inspection, testing or maintenance work of electrical installations. If yes, the practitioners should coordinate with the relevant maintenance staff of the refrigeration equipment to ensure that there is no refrigerant leakage and the refrigeration equipment is operating normally. If you find the concerned refrigeration equipment in faulty condition or have enquiries on flammable refrigerants, please contact the EMSD at 3912 0625.

News-in-brief 4 **The 20th Anniversary of the Annual Technical Seminar - "Collaborative Efforts of the Trade for 20 Years - Encouraging Each Other to Create the Future"**

Since 2001, the EMSD has organised the Annual Technical Seminar jointly with the Hong Kong & Kowloon Electrical Engineering & Appliances Trade Workers Union (the Union) and the Hong Kong Electrical Contractors' Association (the Association). This year, we have the 20th Seminar.

The Seminar this year was originally scheduled to be held in the form of on-site seminar at Tsuen Wan Town Hall. Having regard to the development of the COVID-19 epidemic and the Government's epidemic prevention guidelines, the Seminar was held for the first time in the form of video conference on 26 January 2021 and was concluded successfully.

At the Seminar, Mr. Lok Kwei-sang, Chairman of the Hong Kong & Kowloon Electrical Engineering & Appliances Trade Workers Union; Mr. Wai Yip-kin, Chairman of the Hong Kong Electrical Contractors' Association; and Mr. Poon Kwok-ying, Acting Deputy Director of Electrical and Mechanical Services delivered the opening speeches. Mr. Poon thanked the Union and the Association for their unfailing support for the Seminar over the years. They maintained solidarity among members of the electrical trade to explore together and exchange views on electrical safety as well as the challenges and opportunities regarding the development of the electrical trade, contributing to a continuous reduction in the number of electrical accidents with a view to achieving the long-term goal of zero accident. Besides, Mr. Poon and Mr. Chu Kei-ming, Acting Assistant Director of Electrical and Mechanical Services presented souvenirs to the two officiating guests and the speakers.

The 2020 edition of the Code of Practice for the Electricity (Wiring) Regulations (CoP) was published in December last year. Mr. Sze Chung-tak, Electrical and Mechanical Engineer of the EMSD, briefed the trade on the main revisions of the new edition of the CoP, including the arrangement of the USB final circuits and the latest safety requirements for provision of residual current protection in electrical installations of village houses. Besides, Mr. C. K. Wong, Engineer of the Association also shared his experience on Electrical Safe Systems of Work. In the second half of the Seminar, Mr. W. K. Chan, Chief Inspection and Technical Support Engineer of the Hong Kong Electric Co. Ltd.; and Mr. C. S. Cheung, Engineer I of the CLP Power Hong Kong Limited explained the "EV-charging at Home Subsidy Scheme" for electric vehicles, and the update on the technical requirements on grid connection of renewable energy power systems respectively.



The Seminar was well received, attracting nearly 1 000 participants from the electrical trade. The Seminar aims at continuously enhancing the safety work culture and professional standards of the electrical trade, and creating opportunities for more diversified development in their work of the professionals of the trade. For details of the Seminar, please visit <https://www.youtube.com/watch?v=66a94LgOrpY>.

In the future, the EMSD will continue to organise the Seminar with the Union and the Association. The registration details will be announced later. We hope that the trade will participate actively and share their valuable experience together.



Mr. Poon Kwok-ying, Acting Deputy Director of Electrical and Mechanical Services delivered the opening speech for the Seminar.



Mr. Poon Kwok-ying, Acting Deputy Director of Electrical and Mechanical Services presented a souvenir to Mr. Wai Yip-kin, Chairman of the Hong Kong Electrical Contractors' Association.



Mr. Poon Kwok-ying, Acting Deputy Director of Electrical and Mechanical Services presented a souvenir to Mr. Lok Kwei-sang, Chairman of the Hong Kong & Kowloon Electrical Engineering & Appliances Trade Workers Union.



A group photo taken featuring Mr. Poon Kwok-ying, Acting Deputy Director of Electrical and Mechanical Services; Mr. Wai Yip-kin, Chairman of the Hong Kong Electrical Contractors' Association; Mr. Lok Kwei-sang, Chairman of the Hong Kong & Kowloon Electrical Engineering & Appliances Trade Workers Union; and other guests.

News-in-brief 5 **Electricity News Goes Paperless**

In support of environmental protection, Electricity News will only be sent to the registered e-mail addresses of all registered electrical workers (REWs) and registered electrical contractors (RECs).

REWs or RECs who have not yet registered their e-mail addresses, or who need to update us on their new e-mail addresses are kindly requested to supply the information by completing "Personal Particulars" in "Readers' Feedback and Update" on the last page of the Electricity News, and sending it to the Electricity Legislation Division of the EMSD by fax (28954929) or e-mail (eld@emsd.gov.hk).

Electrical Safety Quiz

1. Before the commencement of work inside a false ceiling, a task-specific risk assessment should be conducted to identify all potential hazards associated with the work. Who should conduct the relevant task-specific risk assessment?

- (i). A registered electrical contractor
 (ii). The manufacturer of the electrical installation
 (iii). A competent person assigned by the owner of the fixed electrical installation
 a) (i) b) (ii) and (iii) c) (i) and (iii) d) (i) (ii) and (iii)

2. Which of the following description(s) of the anti-islanding function of a renewable energy power system (REPS) is/are correct?

- a) The REPS will automatically disconnect with the grid when tripping occurs in the power supply of the power company.
 b) When power supply from the grid is interrupted, the REPS will not continue to supply power to the electrical distribution system
 c) It protects the safety of electrical workers working on the grid or the electrical distribution system.
 d) All of the above

3. Which of the following Government departments have issued a joint departmental circular to remind the trade to take public safety as the primary consideration when choosing refrigerants?

- a) Electrical and Mechanical Services Department, Buildings Department and Housing Department
 b) Electrical and Mechanical Services Department, Fire Services Department and Architectural Services Department
 c) Electrical and Mechanical Services Department, Labour Department and Housing Department
 d) Electrical and Mechanical Services Department, Fire Services Department and Labour Department

4. Which of the following description in relation to the renewal of approval as a competent person engaged for the detection of electricity supply lines is correct?

- a) Within the period of five years immediately preceding the application for renewal, the competent persons shall have not less than six months' practical experience in locating underground electricity cables.
 b) Within the period of three years immediately preceding the application for renewal, the competent persons shall have not less than six months' practical experience in locating underground electricity cables.
 c) Within the period of three years immediately preceding the application for renewal, the competent persons shall have not less than three months' practical experience in locating underground electricity cables.
 d) None of the above

5. According to the Electrical Products (Safety) Regulation, suppliers of household electrical products supplied for use in Hong Kong shall ensure that the products have been issued with valid certificates of safety compliance beforehand. Which of the following category/categories of persons may be regarded as suppliers of electrical products?

- a) Manufacturers
 b) Retailers
 c) Any persons supplying household electrical products
 d) All of the above

6. Which of the following refrigerant is flammable?

- a) R290 b) R134a
 c) R407C d) R410A

Answers: 1c,2d,3d,4c,5d,6a

Readers' Feedback and Update

We look forward to receiving your valuable feedback for continuous improvement so that the contents of Electricity News and the services of the EMSD can better meet your needs. Please complete the form below and return it to the Electricity Legislation Division of the EMSD by post, fax or e-mail (please see the contact details at the bottom of this page) on or before 21 December 2021. Thank you.

To: Electricity Legislation Division, EMSD

Overall, I have the following comments on Issue 34 of Electricity News (please put a "√" in the appropriate boxes):

	Strongly agree	Agree	Average	Disagree	Strongly disagree
▪ Interesting	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
▪ Beneficial to my present or future to work	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
▪ At an appropriate level of complexity	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
▪ Enriches my knowledge	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

I hope the following subjects will be included in the next issue: _____

	Strongly agree	Agree	Average	Disagree	Strongly disagree
▪ Satisfied with the services of the EMSD's Electricity Legislation Division	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Other comments^[1] _____

In support of environmental protection, Electricity News will only be sent to the registered e-mail addresses^[2] of all registered electrical workers and registered electrical contractors.

Personal Particulars^[3]:

Name: Mr/Ms _____ Registration No.: _____
 Address: _____
 Tel. No.: _____ E-mail Address: _____ (New)



Note:

[1] Please use a separate sheet if the space provided is insufficient. [2] If your e-mail address is changed in the future, please notify us by post, fax or e-mail. [3] The personal particulars provided in this form will only be used for opinion surveys of Electricity News and the updating of registration information. All data will be kept confidential and dealt with by authorised persons. You have the right to apply in writing for access to and correction of your personal information.