

# **Refrigeration / Air-conditioning / Ventilation Mechanic (Electrical Control) Intermediate Trade Test Study Material for Written Test**

( Version : IAE-SM-EN-01 )



此文件關於空調製冷設備技工( 電力控制 )中級工藝測試技術知識測試( 筆試 )內容參考資料。  
如需索取此文件的中文版本，請致電 2100 9000 與香港建造業工藝測試中心聯絡。

## Disclaimer

No part of this material may be reproduced or transmitted in any form or by any means without the written permission from the Construction Industry Council (CIC). Whilst reasonable efforts have been made to ensure the accuracy of the information contained in this material, the CIC nevertheless would encourage readers to seek appropriate independent advice from their professional advisers where possible and readers should not treat or rely on this material as a substitute for such professional advice for taking any relevant actions. The CIC will not assume any liability in relation to any loss or damage directly or indirectly resulted from unintended or/and unforeseeable use of this document.

This document is provided as reference for test preparation only. Under all circumstances all content in the official test papers, including but not limited to the terms and conditions therein, prevails.

The CIC reserves the right, at its sole and absolute discretion, to change, update or delete the contents in this document at any time without prior notice.

The CIC reserves all rights of final interpretation for any content in this document.

## Enquiries

Enquiries on this material may be made to Hong Kong Construction Industry Trade Testing Centre at:

Address: 95 Yue Kwong Road, Aberdeen, Hong Kong  
Tel: (852) 2100 9000  
Fax: (852) 2100 9090  
Email: [hkcittc@cic.hk](mailto:hkcittc@cic.hk)  
Website: [www.cic.hk](http://www.cic.hk)

# Refrigeration / Air-conditioning / Ventilation Mechanic (Electrical Control) Intermediate Trade Test Study Material for Written Test

This study material is a reference for candidate to prepare for attending written test in Intermediate Trade Test:

1. To put out electrical fire or fire caused by electrical equipment, it is suitable to use carbon dioxide gas type extinguisher.
2. When live phase conductor directly contacts neutral conductor, it will become short circuit.
3. The neutral wire is coated in blue colour.
4. The measuring unit of voltage is volt (V).
5. Brown coloured wire should connect to the position marked “L” inside the plug.
6. The measuring unit of current is ampere (A).
7. Earth leakage circuit breaker (ELCB) is also called residual current device.
8. The measurement unit of resistance is ohm ( $\Omega$ ).
9. Blue coloured wire should connect to the position marked “N” inside the plug.
10. When a 13A plug connects to a flexible cord, the green and yellow cable is earth wire.
11. The electrical voltage for single phase power in Hong Kong is 220 volts.
12. The power distribution system in Hong Kong is using 3-phases 4-wires.
13. The handheld electrical appliance is not needed to connect to earth when it is made of double insulation.
14. After sawing, sharp bur of the steel conduit should be removed by conical reamer.
15. Fuse breaker can only be installed in live wire.
16. The earth wire is coated in green and yellow colour.
17. When there is a problem with an electrical tool, worker should stop using it and report to the person in charge/supervisor to arrange repairing.
18. When wiring a concealed conduit on the worksite, one should report to supervisors immediately if there already exist other types of electrical wires in the concealed conduit.

19. In case of electrical equipment in use on fire, switch off the power source if condition permit.
20. Working platform which met safety standard is the most important safety precaution if working at height.

**Precautions**

This document is provided as reference for test preparation only. Under all circumstances all content in the official test papers, including but not limited to the terms and conditions therein, prevails. There are different versions of the test paper, content include but not limited to tools, materials, equipment, drawing, construction details or procedures and different simulated site environments. Candidates should refer to the official test documents during testing.

The CIC reserves the right, at its sole and absolute discretion, to change, update or delete the contents in this document at any time without prior notice.