

Mechanic



Complete either (A) or (B):

(A)

1. Know the operation principles of an internal combustion engine and understand the functions of the clutch, gearbox and rear axis differential of a motor car.
2. Remove and clean a spark plug, check if the gap of the plug is appropriate, and demonstrate that it can still be used after cleaning.
3. Clean and install the distributors, know the distribution procedures and reconnect the spark plugs accurately.
4. Identify the circuit for each fuse in the car and charge a car battery.
5. Check and top up a suitable amount of engine oil in the car.
6. Remove and change a tire and know the necessary precautionary measures.

(B)

1. Install a transmitter radio that has at least two semiconductors. Use of kits is not permitted and the radio can be used with headphones. Draw the circuit map for the radio and explain to the assessor the use of main parts.
2. Demonstrate the correct use of small soldering equipment and understand the special points to note for soldering transistors and printed circuits.
3. Understand the special points to note for installation of radio using alternating current as the source of electricity, especially radios that use both alternating current and direct current.
4. Fix simple problems of a family-used radio, such as repairing a damaged on/off switch and tuning channels.
5. Briefly explain the requirements for issuing licenses for wireless control models, amateur radio broadcasts and family-used wireless radio.



Completion of this Badge, including a total of six months or above in lecture or practicum, would be counted as an equivalent of relevant item under Skills Section of the Hong Kong Award for Young People Bronze Award.