

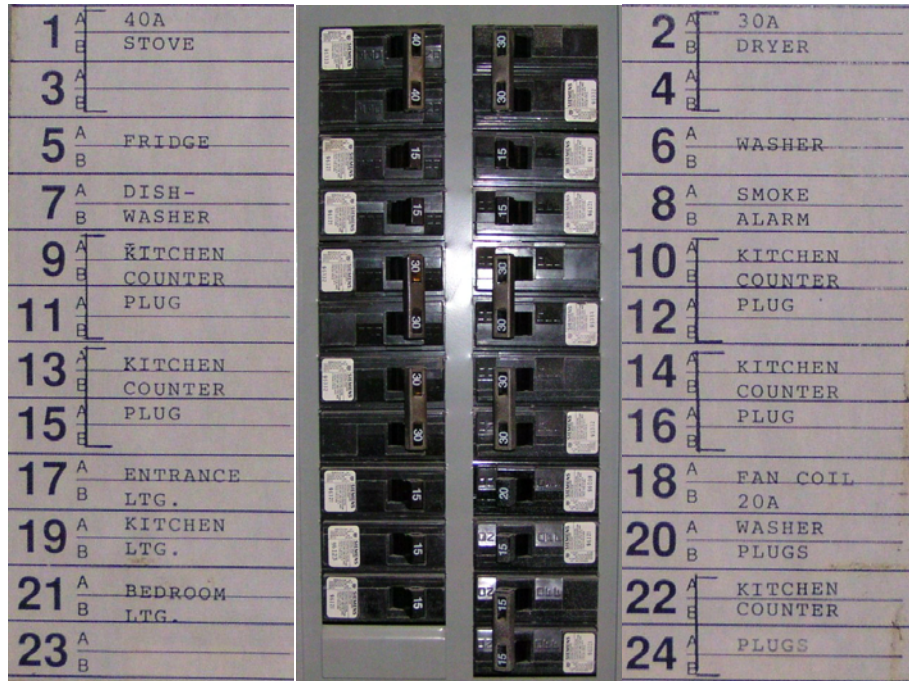


## THE METROPOLE

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### What is in your unit's breaker-box? What does it all mean?

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Each unit has a breaker-box. Often, it will be in the entrance hallway. When you open a breaker-box's door, you will see a breaker-panel. Except for having fewer and/or more circuits, it will look like the one in the centre picture. You will also see a breaker-schematic similar to the left and right pictures. The breaker-schematic shows each breaker's circuit(s).

What are breakers' functions? Their primary function is to prevent fires in electrical wiring. If an appliance fails and causes a short-circuit, or if wiring is faulty, a circuit-overload will occur. The flow of current will rise sharply and exceed the circuit's capacity. Wires will become very hot. Before a fire can occur, though, the breaker will open (*aka* "trip"). This cuts off the flow of electricity. Without electricity, wires will cool, and a fire should not occur. What other safety-features do these pictures illustrate?

First, we notice that breakers #1 & #3 have a metal bridge. The same is true of breakers #2 & #4, #9 & #11, #10 & #12, #13 & #15, #14 & #16, and #22 & #24. The metal bridge is a safety feature. If one "paired" breaker trips, during an overload or short-circuit, its "partner" will also trip. Also, during maintenance procedures, a technician will prevent electrocution by opening the appropriate breaker. For example, during biennial dryer-vent cleaning, a technician will open breaker #2. With the bridge connecting it to #2, #4 will also open. The technician can then work safely on the clothes-dryer.

Second, with the exception of #22 & #24, we see that the bridged breakers are all 30 or 40 amperes. High amperage circuits are for appliances that use more electricity, such as stoves, clothes dryers, vacuum cleaners, and other heat-producing and/or motorised appliances. These circuits need heavier wiring than the 15 ampere circuits do.