Definition of Memristor

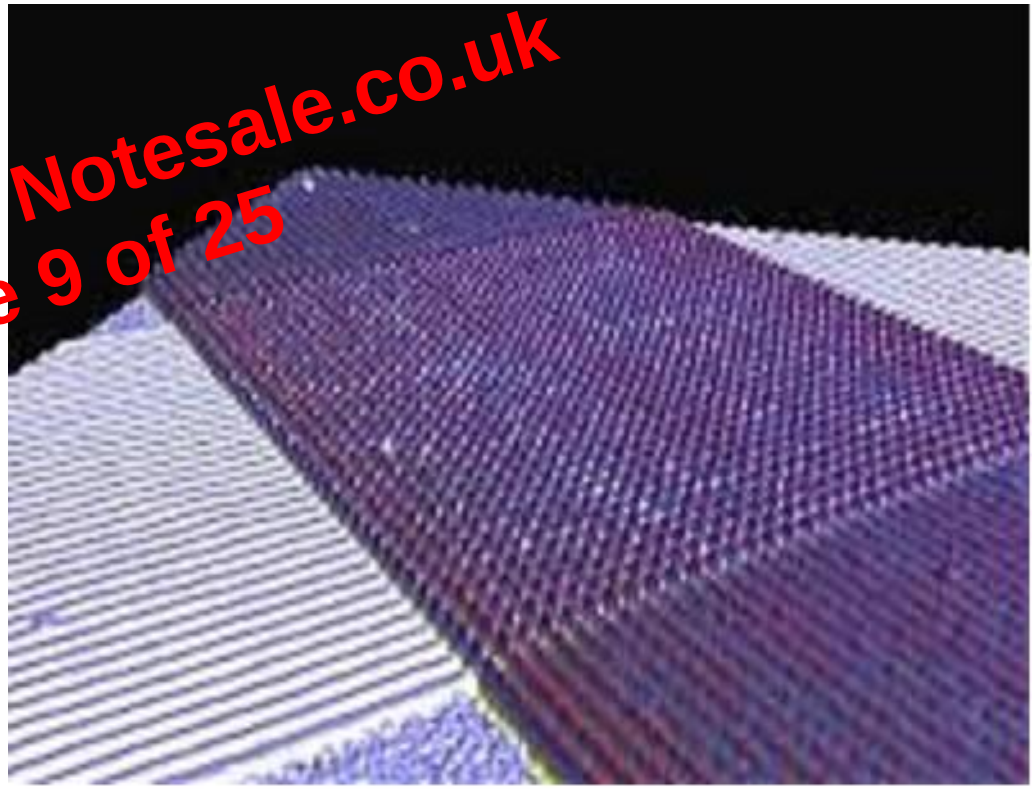
- **A Memristor is a semiconductor whose resistance varies as a function of flux and charge. This allows it to "remember" what has passed through the circuit.**

- Characterized by **Memristance**

$$M(q) = \frac{\mathrm{d}\Phi_m}{\mathrm{d}q}$$

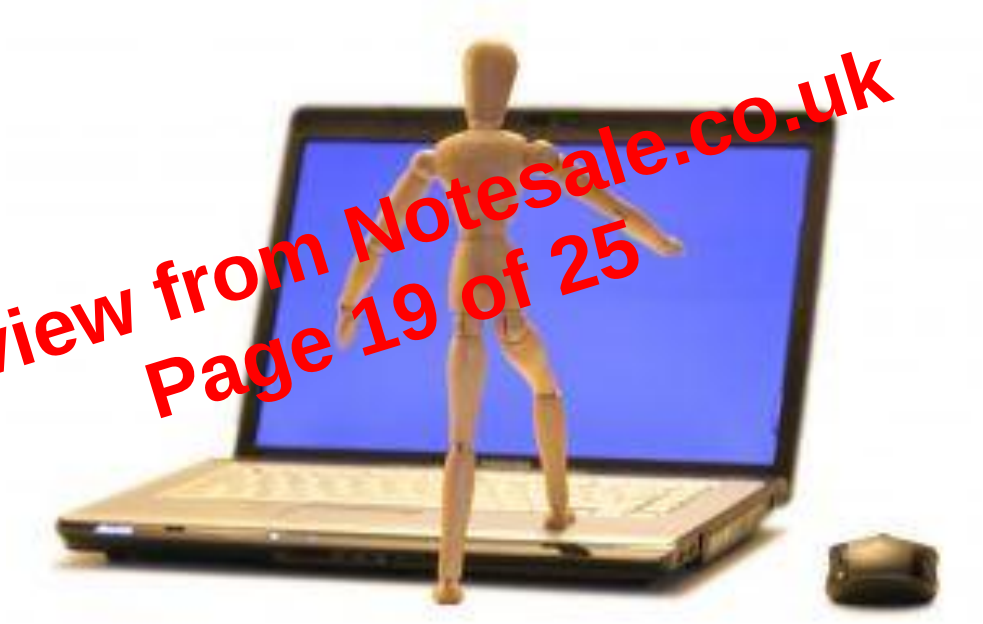
- Unit - ohm (Ω).

40×40 crossbar →



- It's a concentration of Memory resistors where Switching lines are perpendicular with the Memristor cells at the crossings.

Future of Memristor



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- Software will not need to load each time

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