5. The system as claimed in claim 1, wherein the controller (5) is selected from atleast one of pulse width modulator, Proportional Integral Differential (PID) controller and ON/OFF switch.

6. The system as claimed in claim 1, wherein the reaction chamber (1a) has a nozzle (1c) on one side to confine a trapped air during filling of the sample.

7. A method of operating a non contact real time micro Polymerase Chain Reaction [PCR] system, said method comprises acts of;

filling sample into a reaction chamber (1a) of a chip (1);

heating the sample using an embedded metal heater (1b), wherein said embedded metal heater (1b) is inductively coupled to an induction heater (2) for receiving the heat energy from the induction heater (2);

measuring a temperature of the metal heater (1b) using an infrared temperature sensor (3); and

regulating a power to the induction heater (2) using a controller (5) based on feedback received from the infrared temperature sensor (3).

8. The method as claimed as claim 7, wherein a trapped air is flushed out from the reaction chamber (1a) through nozzle (1c) provided at one end of the chip (1) before filling the sample.

9. The method as claimed in claim 7, wherein florescence is detected using optical unit (6) comprising associated LED driver and photo detector amplifier (7).

10. The method as claimed in claim 7, wherein monitoring different parameters of polymerases chain reaction using data acquisition and control system (8).

11. The method as claimed in claim 7, wherein supplying heat by electromagnetic induction process from induction heater (2) to the metal heater (1a).