

ABSTRACT

The world's demand for energy, especially electrical energy today is very important and to use the strength of the magnetic field as a source of electrical energy today is still rarely realized. Namely utilizing the magnetic flux that comes from a source of the magnetic field which is still lacking or is wasted.

In this final project design and realize a solenoid as the magnetic flux tapper wasted magnetic fields from sources such as electric motors on pumps water to produce electrical voltage. The tapping process is based on magnetic induction voltage process by solenoids.

For the realization of the expected voltage solenoid having required of solenoid coil 5000 widings and iron core diameter of 3 cm and the distance of the solenoid with the magnetic field so with these factors is expected to be optimally tapped solenoid magnetic induction in the magnetic field sources so the solenoid can turn on the LED lights.

Keywords: magnetic flux, magnetic field, solenoid, magnetic induction.