

ABSTRACT

Number of cases of accidents that occurred in the operation of a device or a vehicle when someone in a drunken state of course would endanger the safety of others. Many innocent people involved become victims. Even the government's effort to reduce the number of cases the accident could not offset the number of cases of accidents is increasing lately. Moreover police's methods used in checking a person in a state of drunkenness or driving a vehicle while it is still very conventional by taking urine and blood. The way it felt very ineffective and spent much time and cost. Therefore, there is an idea to create an alcohol-detection devices contained in the human body. This tool is certainly more effective than existing conventional manner.

This tool has been created using a gas sensor TGS2620 as sensors. This is a working tool when a change in resistance between the two sensors that would be modified by an astable circuit to wide pulse. Furthermore, a large pulse that will be counted and processed by the Combination the microcontroller (AVR ATMEGA 8535) to be the ASCII codes that can be displayed on the LCD (Liquid Crystal Display).

Output is displayed in the form of category-level BAC (Blood Alcohol Concentration) is contained in a person's body. With a BAC level of allowed values USA that is 0.08%. The tests to be taken as a reference is by taking samples of breath blowing some people who have a number of drinks consumed, and different sexes. It is known how much alcohol is contained in their bodies.

Keywords: gas alcohol, detector, breath blowing