# ALCOVISOR MODEL BAC-100

# **Instructions Manual**



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OPERATOR NEEDS TO READ OPERATORS MANUAL AND BECOME FAMILIAR WITH THE ABOVE FEATURES BEFORE USING AND RETAIN THE MANUAL FOR FUTURE REFERENCE.

#### INSTRUMENT FEATURES

# PLEASE REFER TO DIAGRAMS ON PAGE 2

# **1. DISPOSABLE MOUTHPIECE**

For sanitary reasons each mouthpiece is individually packed and sealed. New mouthpiece should be attached to sample port for each test to prevent any contamination from the previous sample. Attach mouthpiece to the sample port.

# 2. LCD DISPLAY

A highlighted LCD display that will display corresponding instructions and alcohol concentration of the subject being tested. Ability to change the contrast of the display for easy readout for the operator depending on lighting conditions.

# 3. ENTER BUTTON

Use the **ENTER** button to manually take a sample if subject is unable to provide a valid sample when "MANUAL TEST" is highlighted on the display. The **ENTER** button is also used by supervisors to access various commands in the menu screen.

# 4. ON/OFF BUTTON

Press the ON/OFF button to turn on or off.

# 5. EXTERNAL POWER CONNECTOR

Connector for 12v car (cigarette) adapter or optional 12v AC power transformer.

# 6. RS-232 CONNECTOR

Use an RS-232 cable to upload subject tests stored in the memory and access supervisory menu functions.

# 7. Key Board

Use keyboard to input the character .

# 8. Cancel Button

Use the **CANCEL** button to delete the character you inputted or cancel the action you did.

#### INTRODUCTION

It is a state of the art instrument used to detect Ethyl Alochol from a valid breath sample. It uses an electrochemical fuel cell to measure the concentreation of alcohol from the sample of expired breath from a human subject. If alcohol is present, a corresponding voltage is generated from the fuel cell, which is proportional to the alcohol content of the sample provided by a human subject. This voltage is then sent to the CPU and converted to a subject's BAC which is then displayed.

#### Instrument Features:

- 1. Test record storage can be as high as 2000 entries depending on version of software being used. Capability of uploading subject tests for record keeping.
- 2. Use of the disposable mouthpiece to prevent foreign matter from entering.
- 3. A hard metal case is included for storage and accessories for easy transport. When not in use, it should be stored in its metal case to prevent damage from occurring.
- 4. Ability to run as often as needed. Recovery time between tests on average is 30 seconds between positive tests.

Powered by 4 AA rechargeable batteries. Batteries are located behind sliding cover on the back of the unit. It will indicate battery power by displaying a picture of the battery and level of power left in battery. A cigar plug adapter is also included for use by the operator.

## **PRE-TEST CONDITIONS**

Operating temperature range is -5°C to 45°C. Use within this temperature range will limit condensation from a subjects breath to insure an accurate reading from a breath sample.

It is recommended that the operator to observe the subject for about 20 minutes before administering the breath test to insure that nothing is consumed or expelled from the mouth of the subject. Following this procedure will eliminate readings from mouth alcohol.



If testee did not blow, user can select "Repeat" and test again.



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TURN OFF

#### **KEYBOARD**



To activate "Keyboard" see P. 9.

When "Keyboard" has been activated, user should see the following screen after turn on.



To input letter and number:

"A" = press number 2 two times
"L" = press number 5 four times
" = press number 1 two times
"1" = press number 1 one time

To cencel input letter or number, just press CANCEL button.

## **OTHER MENU FUNCTIONS**

To access supervisory functions, the BAC-100 must be turned off. Press and hold the **RIGHT ROLLING** button while turning the BAC-100 on. After several seconds, the menu screen will appear on the display. To access a menu option, simply press the **FUNCTION** button until the function you want to perform is highlighted and press the **ENTER** button. A description of the menu functions is provided below.



#### RECORD

BAC-100 will display all data from all subject tests. Use **LEFT** or **RIGHT ROLLING** button on keypad to display previous or later test records. When finished reviewing records, press **CANCEL** to return to main menu.



#### OTHER MENU FUNCTIONS

#### SAVE

Using the RS-232 cable you can upload subject tests from the BAC-100 using available software to a spreadsheet on your computer.



To update the time, press the **ENTER** button. Highlight "update" and press the **ENTER** button. Press the **FUNCTION** button to move the highlighted cursor to the number you want to change. Using the keypad displayed on your computer, change the date and time. When you are finished, press the **ENTER** button and display will show "Update OK".

#### SETUP

There are 4 options under the "SETUP" menu and can be selected by using the "FUNCTION" button to highlight the desired option.

- 1. ALERT CONC change the tone depending on the concentration level detected by the BAC-100.
- 2. PRINT COPIES Does not apply to the WAT unit as no printer is used.
- 3. CONTRAST use this option to change the contrast of the display.
- 4. KEYBOARD use or not use keyboard.

To use SETUP functions, please see "Master User Manual" or contact your local agent .

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#### PRINTER

Build-in pinter is a patent technologic patent by Well Company.



CAUTION! Please use 4 pieces of rechargeable batteries. Batteries capacity no less than 2100 mAh. Customer can buy a high quality rechargeable battery on www.well-co.com. The rechargeable batteries that power the Alcovisor or printer must be disposed properly and may need to be recycled. Refer to your battery's label for battery type. Contact your local recycling centre for proper disposal methods. Never dispose of batteries in a fire because they may explode.

#### **CHANGE PAPER**

To change paper, pull the handle. When insert a new roll of paper, make sure glossy side of paper is keep close to dentation.

## **BATTERY LIFE**

Four full charged 1800mAh rechargeable batteries can print around 30 meters paper. When battery power is under the standard output power, the printer indicating lamp signal three flash a train.



