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INSTRUMENT STANDARD OPERATING PROCEDURE MANUAL

College of Medicine

SAFETY AND LABORATORY COOMMITTEE, C.O.M, K.F.U.

Prepared by

Document Number	Name	Signature	Date
CM 001 **CM/BCH-041**	**GENESYS™ 10 Series Spectrophotometers**		
Revision Number	**Approved by**		
R0 **Write the revision number**	**Dean:** **Department:**		

Document History

Document Section	Details of Amendments	Date	Modified by (Initials)
SOP	First Draft on SOP for the operation of (**GENESYS™ 10 Series Spectrophotometers**)		

1. **OBJECTIVE**

- The document describes the operation of (**GENESYS™ 10 Series Spectrophotometers**)

2. SCOPE

The spectrophotometer, shown in Figure 1, is an easy-to-use, UV-Visible spectrophotometer designed for quantitative measurements in:

- •Industrial quality control and research Laboratories, including food and beverage, Chemical and pharmaceutical applications
- •Academic research and teaching laboratories
- •Environmental laboratories، including water and wastewater applications
- •Life science laboratories، for working on Proteins and nucleic acid research

Your spectrophotometer offers:

- •Unique optical system that ensures accuracy and precision
- •Automatic wavelength calibration on power-up to ensure that the instrument is operating properly
- •Built-in applications software for concentration، standard curve, absorbance ratio, absorbance difference, survey scanning, kinetics, multi-wavelength analysis and three-point net absorbance
- •Built-in procedures that allow you to validate the performance of your instrument.

3. RESPONSIBILITIES

- It is the responsibility of designated personnel in the lab to train staff and students on this procedure and to ensure adherence to this procedure under supervision.
- It is the responsibility of designated personnel (staff or Student) to follow the instructions of this procedure under supervision.

4. REFERENCES

- There is an Operating Manual provided by the Manufacturer.

5. DEFINITIONS

- ☐ Mention the full form of any abbreviations used.
- ☐ Mention the standard definition of any term used.

6. SAFETY PRECAUTIONS

- ☐ **Line voltages**
  100 - 240 VAC ±10%
  50 - 60 Hz
  80 VA max
- ☐ **Operating environment**
  The instrument meets the specifications on the previous page under the following conditions
  After a 30-minute warm-up period.
- ☐ Ambient temperature: 5° to 35° C
  (41 °F to 95° F)
- ☐ Relative humidity: 20% - 80% RH
- ☐ **Storage environment**
  -20 °C to 70° C (-4° F to 158° F) Relative humidity not to exceed 0.040 pounds moisture per pound of dry air. Allow instrument to adjust to room temperature for 24 hours after taking it out of storage.
- ☐ Temperature should be maintained at ±4° F.
  Relative humidity should be maintained to ±5%..

7. PROCEDURE FOR OPERATING (GENESYS™ 10 Series Spectrophotometers)

7.1. Turning on the instrument:

Press the back button, and the device will operate

- ☐ **Software Operation**.

7.2. Steps of the Procedure

Wait for the data to appear on the LCD
Select the job you want to do:
For example: (measuring absorption).

1 -Zero the device by pressing the plank gauge, lift your finger and wait for the zero to appear on the LCD.

2 -Enter the wavelength at which you want to measure the absorption.

3 -Lift the cap and place the sample that you want to measure in the place provided for it on the right side, then close the cover.

4- Wait for the result to appear on the LCD.

7.3. Turning off the Instrument

Press the back button to turn off the device.

7.4. Warning

Write any the warning in BOLD and RED FONT.
