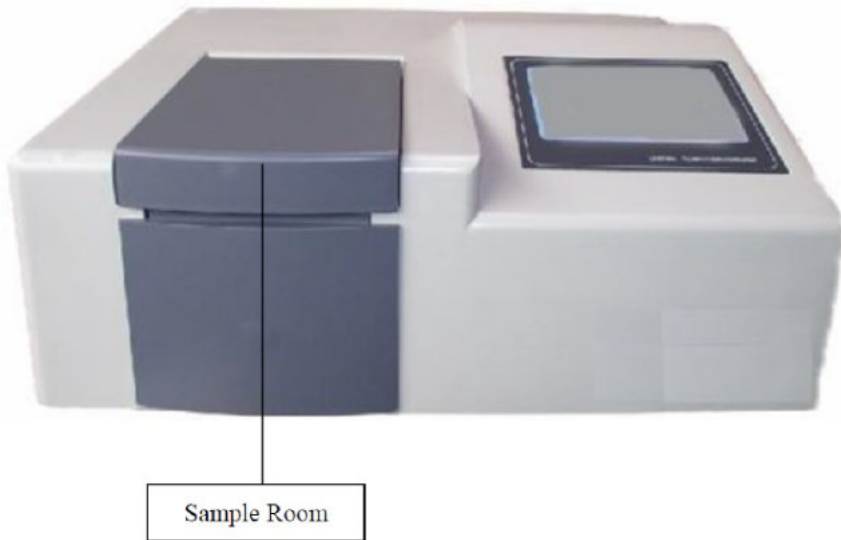


UV Visible Spectrophotometer



Introduction

The principle of spectrophotometric analysis is making use of substances with different molecular structures for light showed the phenomenon of selective absorption of the substance on carrying out qualitative and quantitative analysis. through the analysis of absorption spectra to determine the physical structure and chemical composition. According to the relative measuring principle, firstly set the reference sample's (solvent, distilled water, air, etc.) transmissivity is 100%, and then measuring the under test sample's transmissivity for achieving the aim of analysis. The relationship of between measured transmissivity and under test sample's concentration, to a certain extent, it is complying with the Lambert Beer's law.

$$T=I/I_0$$

$$A=KCL=\log I/I_0$$

Of which:

T transmissivity

A absorbance

C solution concentration

K absorption coefficient of solution

L optical path length of solution

I transmitted light intensity

I₀ incident light intensity

UV-visible spectrophotometer from ZHIYI Technology is basis of above principle, combined with the latest modern precision optics and microelectronic and other high-tech, research and development of the new generation of high-class-type double-beam UV-visible spectrophotometer.

Application

It's available for physics, chemistry, medicine, biology, edicine, geology and other disciplines to conduct scientific research. It is widely used in chemical, pharmaceutical, biochemical, metallurgical, light industry, material, environment protection, medical test and so on, as well as it is the one of most important quality control instrument in the analysis industry. Also, it is essential equipment in conventional laboratory.

Features

UV-visible spectrophotometer have following features:

With proportional dual-beam optical structure, and deploy high performance "sparkling holographic grating" of low resolution monochromator stray light, with superior optical precision and accuracy of measurement, reproducibility and good stability, A smaller spectral bandwidth can meet the requirements of routine analysis test item.

Using the most advanced microprocessor technology, fully automated system operation, test control and data processing, with automatic transfer "0%T" and the tune "100% T/OA", eight joint linkage and the cell micro-step light reflector switching technology.

Using the most advanced microprocessor technology, the instrument has photometric, spectrum scanning, quantitative, PC Mode, dynamic, multi-wavelength and other functions.

LCD touch screen display convenient and flexible. Instruments used in steps (man-machine dialogue type) and measurement results (data and various spectral curve) are displayed on the screen, the user can very easily perform various operations and processing.

Instruments used high-energy, in order to locate the import flange deuterium lamp, greatly extended service life. When the instrument deuterium lamp must be replaced, just uninstall three flange located screws, you can in the best position to ensure light source, optical path without cumbersome adjustments.

Scientific design, new technologies application, organic combined optical, mechanical, electrical with micro-computer technology, make the instrument stability index approach senior level of UV-Visible spectrophotometer.

Technical Data

Wavelength Range(nm)	190-1100nm
Wavelength MPE(nm)	±0.3nm
Wavelength Repeatability(nm)	≤0.1nm
Luminosity Range	0~200% -0.4~4.000A 0.000~99999C
Transmissivity MPE (%)	±0.3
Transmissivity Repeatability (%)	≤ 0.1
Stray light (%)	0.05(220nm、 360nm)
Noise (%)	100 noise≤0.15 0 noise≤0.1
Drift (A)	±0.0005A/h
Baseline Flatness (A)	±0.0003A
Light source	long-life air lamp / tungsten lamp
Accessories	Printer
Dimensions	70x52x62cm
Weight	40kg
HS code	9027300090