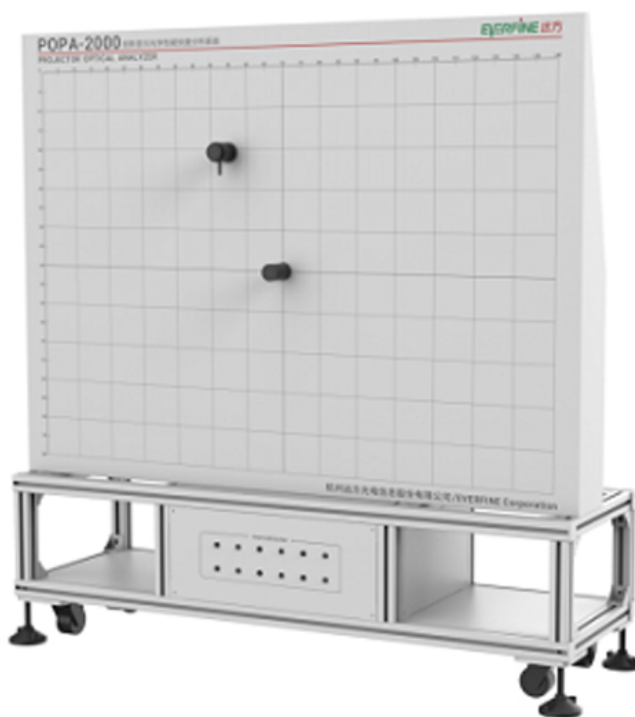


POPA-2000 投影机光学性能分析系统 Optical Performance Analysis System of POPA-2000 Projector

- POPA-2000投影机光学性能分析系统，主要用于分析投影机投射在特定平面内9个测试点的照度、色坐标，色温，显色指数，光谱功率分布等光度及色度均匀性参数。通过软件反馈整个平面的亮度及色度均匀性情况，用以评价投影机的相关光学特性，参照SJ/T11346、SJ/T11298等投影机及投影电视产品的相关国际及国内标准要求。

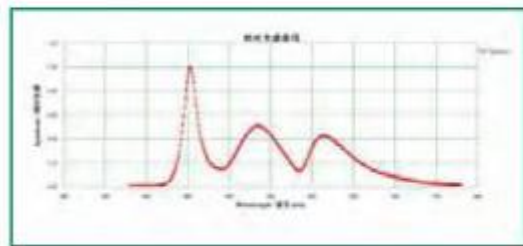
The POPA-2000 projector optical performance analysis system is mainly used to analyze the illuminance, color coordinates, color temperature, color rendering index, spectral power distribution and other photometric and chromaticity uniformity parameters of 9 test points projected by the projector in a specific plane. The brightness and chromaticity uniformity of the whole plane are fed back through software to evaluate the relevant optical characteristics of the projector, referring to the relevant international and domestic standards and requirements of SJ/T11346, SJ/T11298 and other projectors and projection television products.



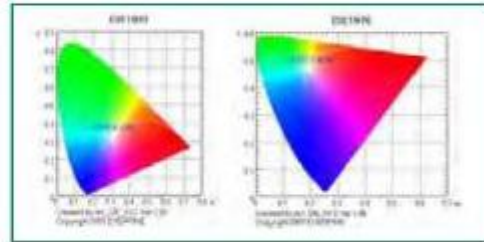
特点与优势 Characteristics and advantage

- 1) 采用远方多项专利技术，用光谱法实现照度及色度参数测量，不存在光谱失匹配误差，测量精度极高，性能大大优于传统照度探头和滤色片型色度计。
1) It adopts a number of remote patented technologies and realizes the measurement of illuminance and chromaticity parameters by spectral method. There is no spectral mismatch error, and the measurement accuracy is extremely high. Its performance is greatly superior to that of traditional illuminance probes and color filter colorimeters.

相对光谱曲线图



CIE 色品图



- 2) 具有极强的数据处理能力，同时对9个通道的照度、色度及光谱数据进行分析处理。
2) It has strong data processing ability, and can analyze and process the illuminance, chromaticity and spectral data of 9 channels.
- 3) 通过光谱测量，还可以评价色温、显色指数等颜色参数，更好地评价投影仪的色彩还原效果。
3) Through spectral measurement, color temperature, color rendering index and other color parameters can also be evaluated to better evaluate the color restoration effect of the projector.
- 4) 针对长焦投影机、短焦投影机，配套有测试图像畸变的测试系统。
4) For long focus projectors and short focus projectors, a test system for measuring image distortion is provided.
- 5) 软件可设置不同要求投影机的判限标准，也可随意调用不同的判限标准。
5) The software can set up different criteria for projectors with different requirements, or call different criteria at will.

技术参数 Specifications**● 光谱测量**

Spectral measurement

- 1)光谱波长范围：380-780nm;
1) Spectral wavelength range: 380-780nm;
- 2)波长准确度：0.3nm;
2) Wavelength accuracy: 0.3nm;
- 3)波长分辨率：0.5nm;
3) Wavelength resolution: 0.5nm;
- 4)杂散光:< 0.3%;
4) Stray light:<0.3%;
- 5)色品坐标准确度:±0.001 (相对于稳定度优于±0.0001标准光源和NIM传值) ;
5) Chromaticity standard accuracy: ± 0.001 (better than ± 0.0001 standard light source and NIM value transfer relative to stability);
- 6)显色指数：Ra: Ri (i=1~14) (特殊可计算R15)。
6) Color rendering index: Ra: Ri (i=1-14) (R15 can be calculated for special cases).
- 7)色温范围：1000K~100000K
7) Color temperature range: 1000K~100000K

● 光度参数

Photometric parameters

- 1)照度精度：3%读数+1个字;
1) Illuminance accuracy: 3% reading+1 word;
- 2)照度范围：0.01 lx~5000 lx;
2) Illuminance range: 0.01 lx ~ 5000 lx;

● 软件功能

software function

- 1)系统集成投影屏、高精度组网探头以及智能化分析软件，可实现9个测试点的照度、色坐标，显色指数，照度及色度均匀性的评判；
1) The system integrates projection screen, high-precision networking probe and intelligent analysis software, which can realize the evaluation of illuminance, color coordinates, color rendering index, illuminance and chromaticity uniformity of 9 test points;
- 2)ANSI光通量、对比度、照度均匀性、色域等参数，软件可设置判限范围；
2) ANSI luminous flux, contrast, illuminance uniformity, color gamut and other parameters, and the software can set the judgment range;
- 3)软件可设置不同要求投影机的判限标准，也可随意调用不同的判限标准；
3) The software can set up the judgment standards for projectors with different requirements, or call different judgment standards at will;
- 4)探测器固定面板的尺寸100寸，屏上装有刻度标尺。
4) The size of the fixed panel of the detector is 100 inches, and the screen is equipped with a scale.