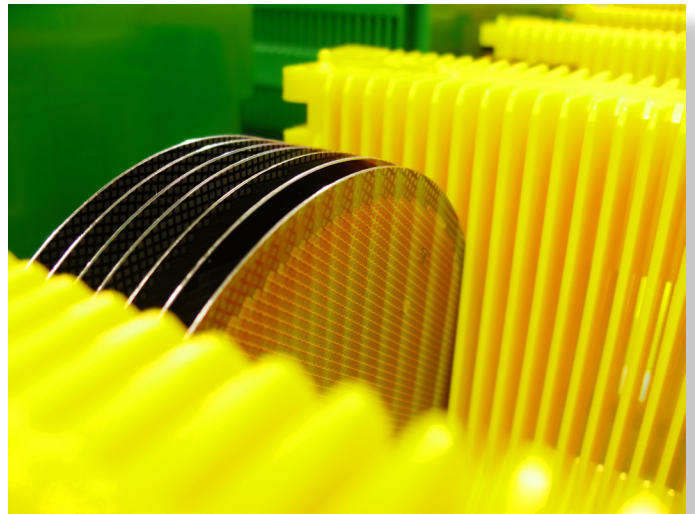
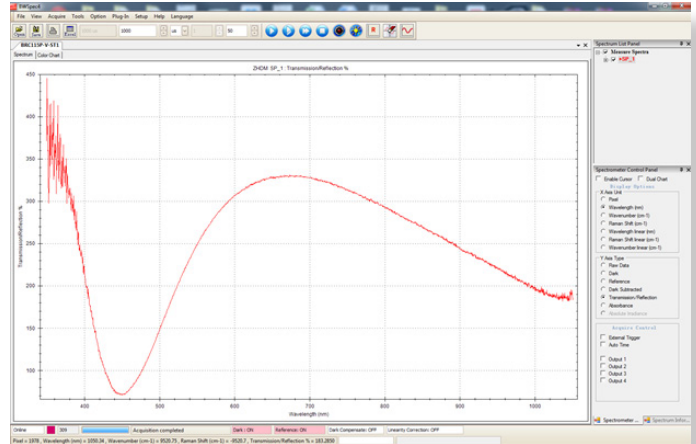


Exemplar® Spectrometers for Thin Film Measurements

UV-VIS-NIR modular spectrometers have been used to measure thin films on surfaces for many years. For example, in measuring the reflectance (and transmittance) off the surface of a Silicon wafer, we can measure the constructive and destructive interference and calculate the thickness of the films down to tens of Angstroms (up to several layers). Modern spectrometer modules are ideal for this application due to their fast scan speeds, repeatability, and flexibility of using fiber optic probes.

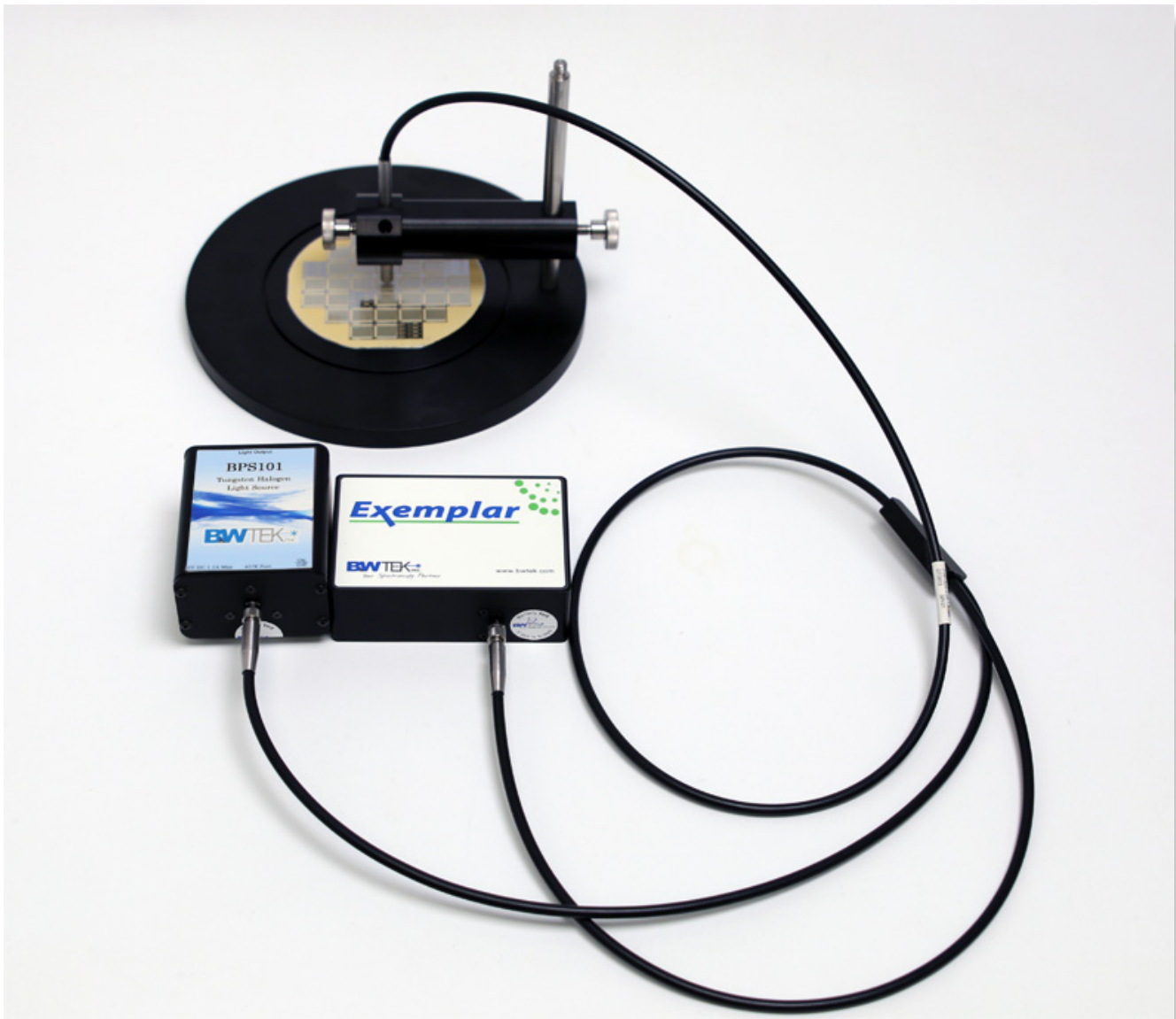
Our Exemplar series spectrometers include features to make thin film measurements fast, easy, and accurate. They feature a low trigger delay of less than 95ns (± 20 jitter) and an integration time as low as 1ms. For OEM modules, the Exemplar spectrometers are fast, repeatable, and easy to implement using our software development kit (SDK).



Key Advantages of the Exemplar Series:

- External trigger delay as low as 35ns \pm 5ns jitter
- Low integration time of 1ms (BRC115P)
- USB 3.0 communication for high-speed data transfer
- Built in microprocessor to handle on-board spectral processing
- Multi-channel capabilities support up to 32 spectrometers with no additional hardware needed
- Software development kit offering complete control of spectrometer's capabilities

Exemplar® Spectrometer Set-Up for Thin Film Measurements



To perform high quality measurements within seconds, you will need:

- Exemplar Series Spectrometer (UV-VIS-NIR) (BRC115P/BTC655N)
- Tungsten Deuterium/Tungsten Halogen Source (BDS100/BPS101)
- Fiber Reflectance Probe or Bifurcated Fiber Assembly (FRP/BRS)
- Fiber Reflectance Probe Holder (FRPH)
- Software Development Kit (SDK-S)

Contact your local B&W Tek representative today or visit us at bwtek.com