

KLA Surfscan SP3 Defect and Surface Quality Inspection Systems – UDL/UDK

KLA SP3 Main Components -

- Integrated Console
- Bare Wafer Inspection Station
- Equipment Front End Module (EFEM)
- 3 Port Wafer Loading Unit

Description of Inspection System -

- Un-patterned wafer inspection platform to incorporate deep-ultraviolet (DUV) illumination. Deep Ultraviolet (DUV) source
- DUV-specific apertures to enable defect capture on un-patterned thin films
- High speed stage and advanced imaging computer for enhanced productivity
- Full-wafer high-resolution haze maps

Defect Detection and Classification Capabilities

- Designed to capture a broad range of challenging defects for 32nm/22nm process nodes
- High-productivity rapid automated defect classification
- Coordinate accuracy to enable rapid defect re-detection and review
- Integrated, high resolution (~100 mega-pixel), full-wafer SURFmonitorTM haze maps, providing automated capture of ultra-fine slip lines and scratches or maps of surface roughness, grain size and other process parameters
- Surfscan SP3 system feature dramatic advances in sensitivity and throughput over their industry-benchmark predecessor, the Surfscan SP2XP
- Inspection Module for the back side of wafers for defects that might deform the wafer shape.