

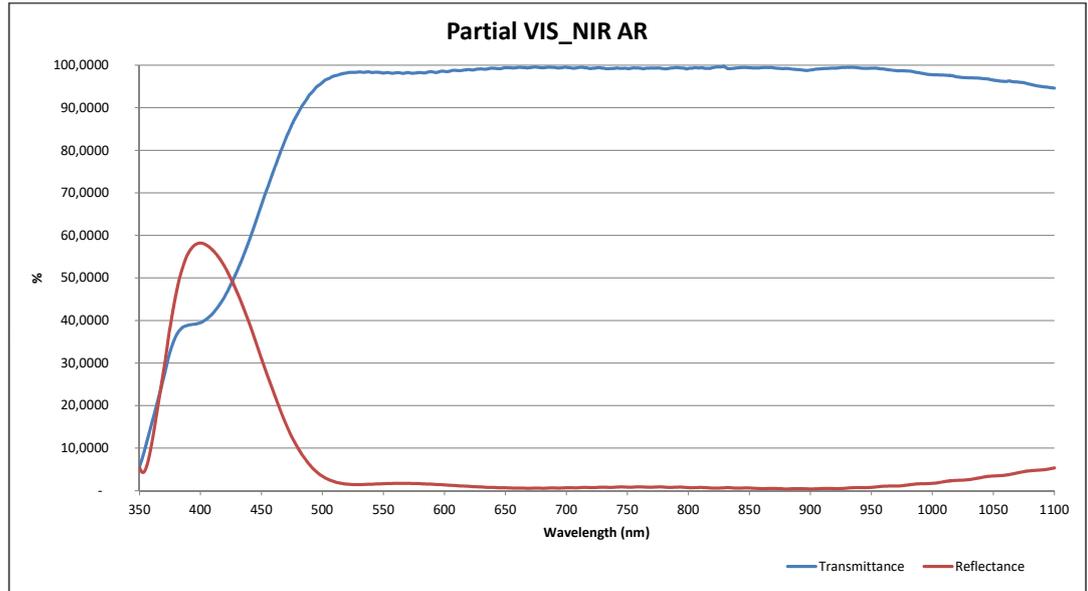
Optimised AR: Partial VIS_NIR AR
High performance AR coating for
VIS cameras, combined with long
range NIR capabilities



PSE

OPTICAL SOLUTIONS REFINED

Product Features



Partial VIS_NIR AR

The partial VIS_NIR anti reflective coating has been developed to perfectly match applications where balanced VIS combined with Extreme NIR performance is critical. The extreme NIR performance allows for perfect signal quality and s/n ratio for camera systems optimized for low light application environments. Compared to VIS_NIR AR, extreme performance in the 850-950nm has been prioritized over deep blue performance.

The topcoat is Hydrophobic and abrasion resistant, and the acrylic base material makes the filter lightweight and much more impact resistant than glass. These properties make partial VIS_NIR AR the perfect filter for protection of sensitive optics and lenses.

The partial VIS_NIR AR solution is sheet to part which enables full design freedom.

The partial VIS_NIR AR is suitable for applications such as long range VIS_NIR licence plate detection systems and inline machine vision systems where

superior NIR performance for long range functionality is required.

Optimized AR

The spectral properties of anti reflective coatings for display applications are optimized for the wavelengths visible to the human eye. However, most machine vision applications only benefit from specific wavelengths within the VIS range (red), or longer wavelengths than those of visible light (NIR).

For these applications PSC has developed a range of unique and very effective AR surface treatments called Optimized AR Coatings. The Optimized AR is applied to our acrylic sheet material.

The Optimized AR Coatings are designed to obtain maximum AR performance in the exact application-specific wavelength range. It reduces reflections to an absolute minimum and increases undisturbed transmission in the desired range. This is highly relevant in certain camera, scanner, and sensor applications.

Technical Data

Double sided AR	Ravg < 1%, Rmax < 2% for 700 - 950 nm Ravg < 2%, Rmax < 5% for 500 - 700 nm
Pencil Hardness	6H typically
Base material	Clartech™
Thicknesses	Upon request. MOQ applies