

TECHSPEC® 8.5mm f/8, 75mm-∞ Primary WD, HRi Series Fixed Focal Length Lens



8.5mm f/8, 2/3" HPI Series Fixed Focal Length Lens, #36-752



Stock **#36-752** 4 In Stock

-

1

+

£500<sup>.00</sup>

ADD TO CART

| Volume Pricing |                               |
|----------------|-------------------------------|
| Qty 1+         | £500.00 each                  |
| Need More?     | <a href="#">Request Quote</a> |

Prices shown are exclusive of VAT/local taxes

Product Downloads

General

HRi Series

Series:

Fixed Focal Length Lens

Type:

Physical & Mechanical Properties

Iris Option:

|       |                               |
|-------|-------------------------------|
| Fixed |                               |
| 44.57 | Length (mm):                  |
| 40    | Maximum Diameter (mm):        |
| 40    | Outer Diameter (mm):          |
| 84    | Weight (g):                   |
| 1.31  | Maximum Rear Protrusion (mm): |

Optical Properties

|                                                                                      |                                               |
|--------------------------------------------------------------------------------------|-----------------------------------------------|
| 101.4mm - 56.8°                                                                      | Horizontal Field of View @ Max Sensor Format: |
| Horizontal: 101.4mm - 56.8°<br>Vertical: 74.2mm - 43.5°<br>Diagonal: 130.4mm - 68.9° | Field of View at Max Sensor Format:           |
| 101.4mm - 56.8°                                                                      | Horizontal Field of View, 2/3" Sensor:        |
| 81.5mm - 47.2°                                                                       | Horizontal Field of View, 1/1.8" Sensor:      |
| 71.9mm - 42.2°                                                                       | Horizontal Field of View, 1/2" Sensor:        |
| 64.8mm - 38.4°                                                                       | Horizontal Field of View, 1/2.5" Sensor:      |
| 53.2mm - 32.0°                                                                       | Horizontal Field of View, 1/3" Sensor:        |
| 39.6mm - 24.1°                                                                       | Horizontal Field of View, 1/4" Sensor:        |
| 11.00                                                                                | Maximum Image Circle (mm):                    |
| 0.0056                                                                               | Numerical Aperture NA, Object Side:           |
| 9 (8)                                                                                | Number of Elements (Groups):                  |
| 8.50                                                                                 | Focal Length FL (mm):                         |
| 75 - ∞                                                                               | Working Distance (mm):                        |
| f/8                                                                                  | Aperture (f/#):                               |
| 425 - 675nm BBAR                                                                     | Coating:                                      |
| 425 - 675nm BBAR                                                                     | Coating Specification:                        |
| 18.85                                                                                | Entrance Pupil Position (mm):                 |
| 25.03                                                                                | Object Space Principal Plane (mm):            |
| 4.70                                                                                 | Image Space Principal Plane (mm):             |
| -5.6                                                                                 | Maximum Distortion (%):                       |
| -17.93                                                                               | Exit Pupil Position (mm):                     |
| 75 - ∞                                                                               | Optimized Working Distance (mm):              |
| VIS                                                                                  | Lens Wavelength Range:                        |

Sensor

|      |                        |
|------|------------------------|
| 2/3" | Maximum Sensor Format: |
| 1.85 | Pixel Size (µm):       |

Threading & Mounting

|                    |                        |
|--------------------|------------------------|
| M58 x0.75 (Male)   | Filter Thread:         |
| #87-425 (Required) | Filter Thread Adapter: |

|                 |               |
|-----------------|---------------|
| M40 x0.5 (Male) | Front Thread: |
|-----------------|---------------|

C-Mount

Mount:

Environmental & Durability Factors

-20 to +60

Storage Temperature (°C):

Type of Ruggedization:

Industrial (Fixed Aperture with Simplified Mechanics)

Regulatory Compliance

View

Certificate of Conformance:

## Product Details

- 2/3", C-Mount Lens
- Up to 10 MegaPixels, 1.85µm Pixel Size Sensors
- Instrumentation (HRi) Versions of our HR Series Lenses with Streamlined Mechanical Designs and Fixed Apertures
- 8.5mm to 12mm Focal Length
- **Ruggedized (HRr) Designs** Also Available

TECHSPEC® HRi Series Fixed Focal Length Lenses are a streamlined version of our HR Series Lenses. There are multiple options available for each focal length to accommodate a variety of optimized working distance ranges. Designed for high volume imaging applications, HPi series lenses feature simplified focus mechanics and a fixed aperture. TECHSPEC HRi Series Fixed Focal Length Lenses are available in a variety of f/# options, making them ideal for applications that require reduced size, cost, and lockable focus imaging solutions. Call for OEM Quantity Pricing.

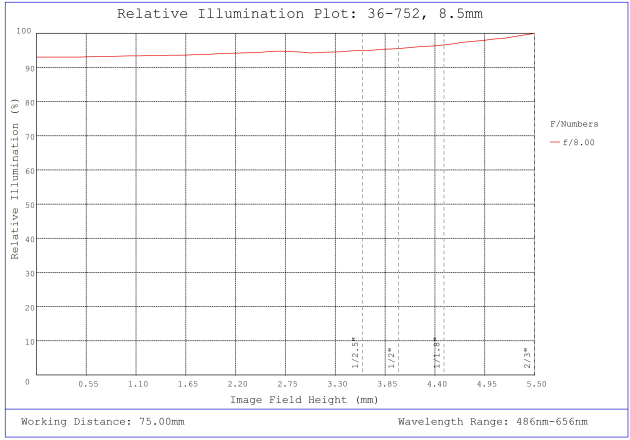
Edmund Optics has created a family of high performance optical designs (the HR Series family) and developed three customized optomechanical solutions targeted for specific applications. These lens sub-families utilize the same optics as the HR Series Lenses, providing the same optical performance in a variety of optomechanical solutions to meet your application requirements:

- **HR Series:** Features locking cam focus and iris adjustment. This is the most adjustable version of these optical designs and is the typical high quality machine vision lens.
- **HRi Series:** Simplified mechanics featuring fixed apertures with compact housing. **Industrial Ruggedization** for reduced size, cost, and locked focus.
- **HRr Series:** All optics glued in place and a locking C-clamp focus ring. **Stabilized Ruggedization** for reduced pixel shift and improved focus stability.

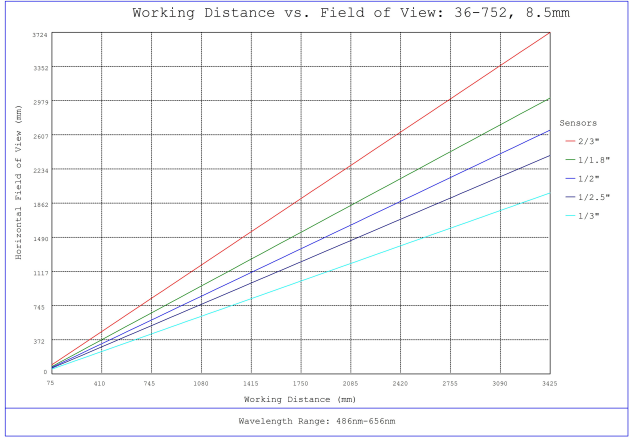
## Technical Information



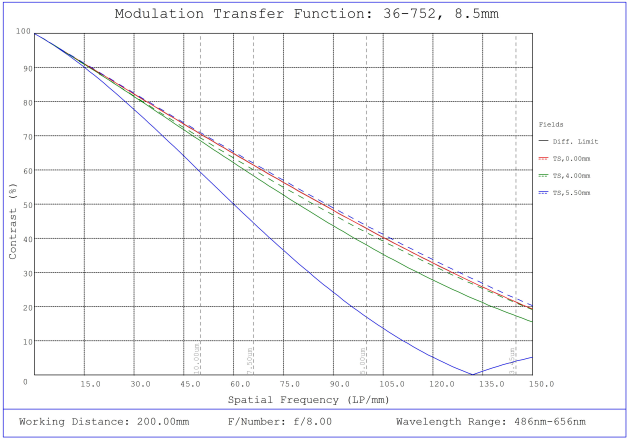
#36-752, 8.5mm f/8, 75mm-∞ Primary WD, HRi Series Fixed Focal Length Lens, Distortion Plot



#36-752, 8.5mm f/8, 75mm-∞ Primary WD, HRi Series Fixed Focal Length Lens, Relative Illumination Plot



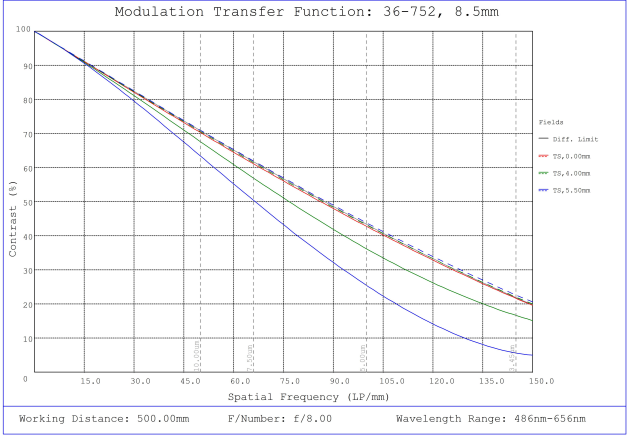
#36-752, 8.5mm f/8, 75mm-∞ Primary WD, HRi Series Fixed Focal Length Lens, Working Distance versus Field of View Plot



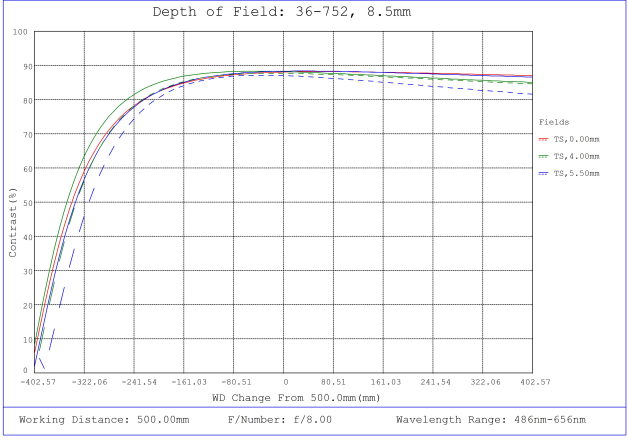
#36-752, 8.5mm f/8, 75mm-∞ Primary WD, HRi Series Fixed Focal Length Lens, Modulated Transfer Function (MTF) Plot, 200mm Working Distance, f8



#36-752, 8.5mm f/8, 75mm-∞ Primary WD, HRi Series Fixed Focal Length Lens, Depth of Field Plot, 200mm Working Distance, f8



#36-752, 8.5mm f/8, 75mm-∞ Primary WD, HRi Series Fixed Focal Length Lens, Modulated Transfer Function (MTF) Plot, 500mm Working Distance, f8



#36-752, 8.5mm f/8, 75mm-∞ Primary WD, HRi Series Fixed Focal Length Lens, Depth of Field Plot, 500mm Working Distance, f8

## Compatible Cameras