

# PT. OPTO PERSADA NUSANTARA

No. 017/SPD-OPEN/XII/2023  
Jakarta, 28 Desember 2023

Kepada Yth,  
**dr. Sahata Napitupulu, SpM**  
**Direktur RS Mata Undaan Surabaya**  
Jl. Undaan kulon No.19, Peneleh kec. Genteng  
Surabaya - Jawa Timur 60274

Hal : Permohonan Demo Alat

Dengan hormat,

Sehubungan dengan surat ini, kami dari PT. Opto Persada Nusantara ingin mengajukan permohonan demo unit Slit Lamp Portable S150, Fundus Automatic FC162 dengan merk MediWorks di RS Mata Undaan Surabaya. Untuk Jadwal nya kami Sesuaikan dengan Dokter Spesialis Poli Mata.

Demikian surat permohonan demo ini kami sampaikan. Besar harapan kami agar permohonan demo alat kami dapat disetujui.

Atas perhatian dan kerjasamanya kami sampaikan terima kasih.

Hormat kami,  
**PT Opto Persada Nusantara**



**Hilman Hakim**  
Sales & Product Specialist  
085810158750

# PT. OPTO PERSADA NUSANTARA



No. 098/OPEN/XII/2023  
 Jakarta, 28 Desember 2023

Kepada Yth,  
**dr. Sahata Napitupulu, SpM**  
 Direktur RS Mata Undaan Surabaya  
 Jl. Undaan kulon No.19, Peneleh kec. Genteng  
 Surabaya - Jawa Timur 60274

Hal : Penawaran Harga

Dengan hormat,

Berikut kami ajukan penawaran harga untuk pengadaan barang di RS Mata Undaan Surabaya :

NO	NAMA BARANG	SPEKIFIKASI	HARGA
1	<b>MediWorks Automatic Fundus Camera FC162</b>   Capture binocular retina images under voice interaction	Type Non-mydiatic Field of View 50° Camera Resolution 15 mega pixels Fixation Internal fixation Minimum Pupil Size 3mm Illumination LED Focusing Auto focusing Diopter Adjustment Range -20D~+20D Display 5" LCD touch screen Image Format JPEG,DICOM Type of image Color Storage 16G Data WIFI Battery 47.52Wh	250,000,000
2	<b>MediWorks Portable Slit Lamp S150</b>  	Four brightness Settings Using the cobalt blue filter, to fit the Ortho-K lens. Magnification : 6x Slit width : 0-12mm continuously adjustable (maximum slit width ≥ 12mm) Slit length : ≥12mm Inspection Distance : 31.2mm Power: rechargeable li-ion battery 3.7V/3400mAh Light source : Led light bulb Battery life: more than 6h (continuous work) Charging time : 3.5h Net weight : 240	34,000,000

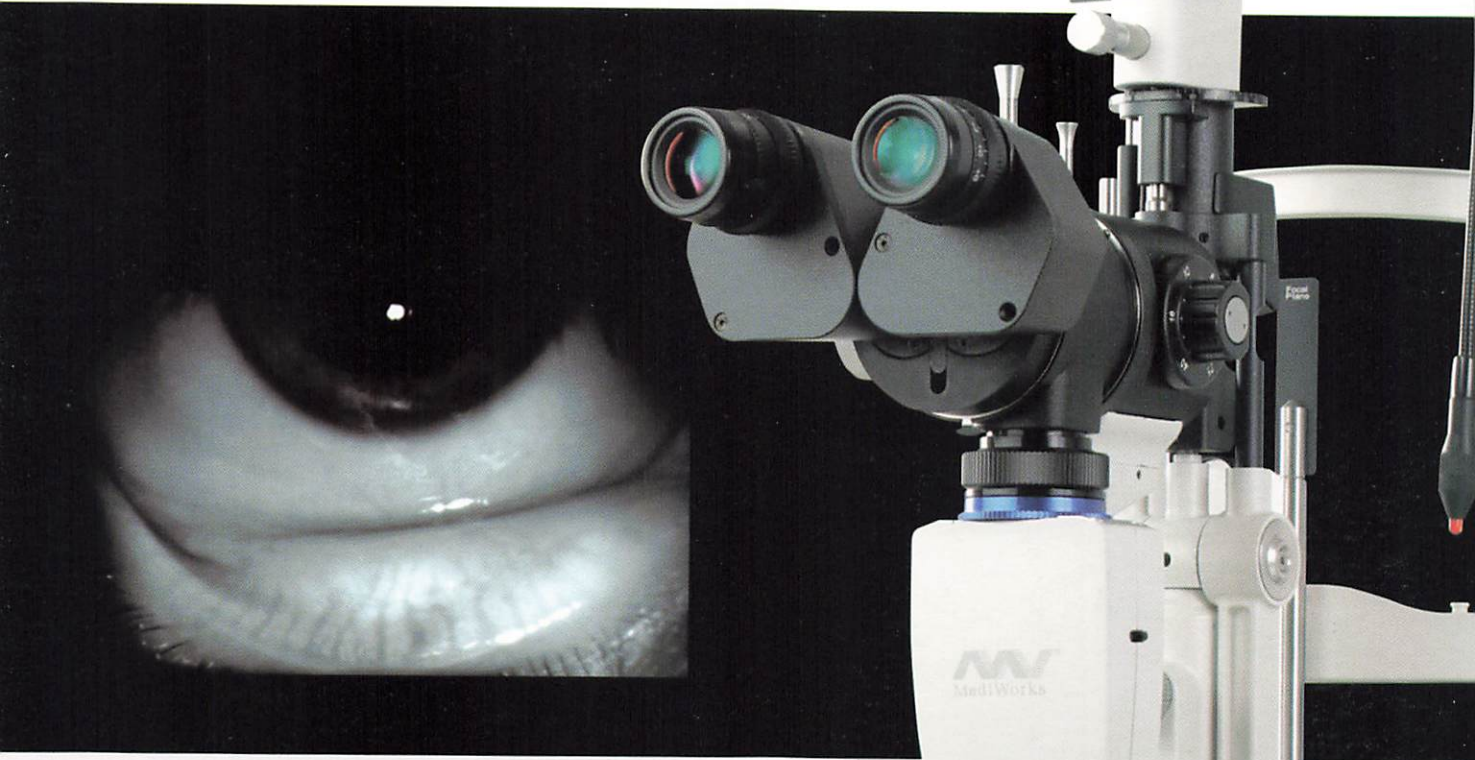
**Keterangan :**

- Harga penawaran nett belum termasuk PPN 11%
- Harga penawaran nett adalah franco Jakarta
- Cara pembayaran DP 30% pada saat PO diterima, pelunasan 70% - 30 hari setelah uji pakai alat
- diluar ready stock, delivery ±60 hari dari PO diterima
- Garansi spareparts & service 1 tahun
- Penawaran in berlaku 14 hari terhitung dari tanggal surat penawaran

Demikian penawaran kami, atas perhatiannya kami sampaikan terima kasih.

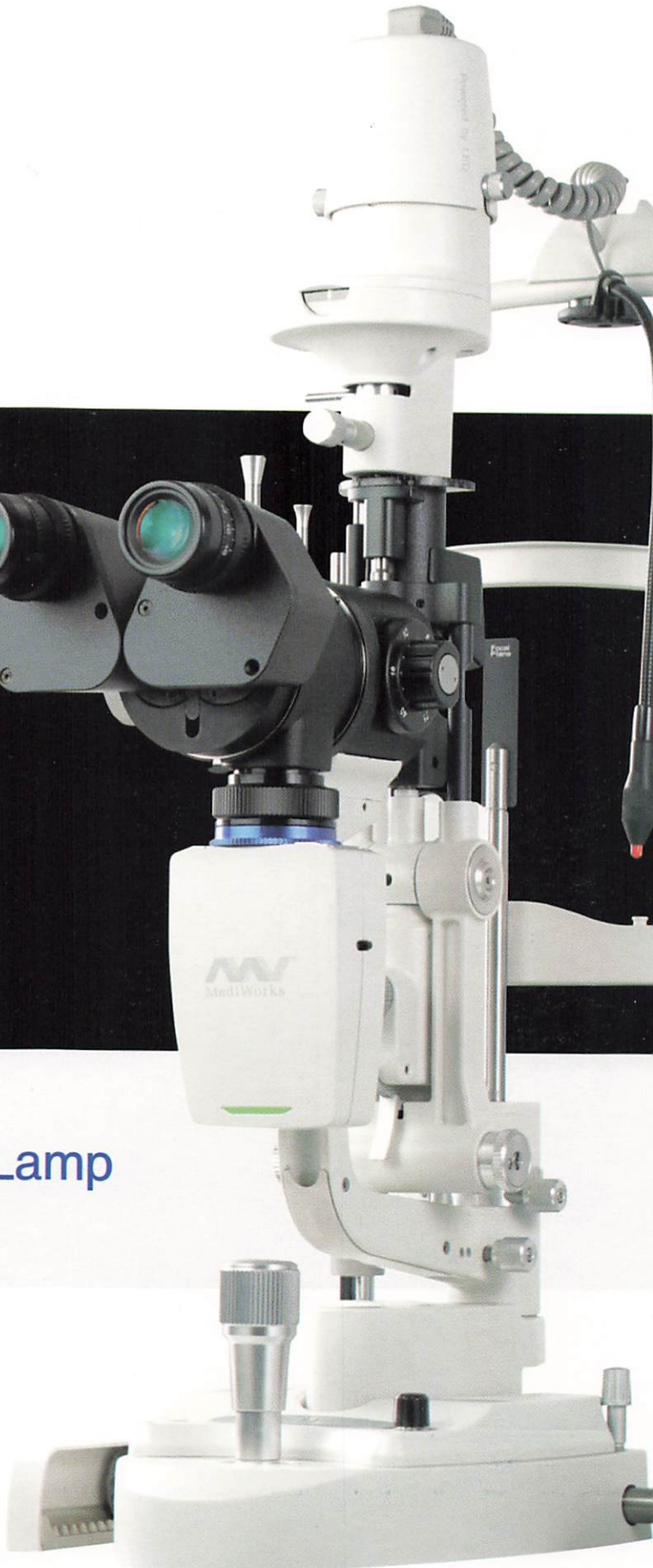
Hormat kami,  
**PT Opto Persada Nusantara**

  
**Hilman Hakim**  
 Sales & Product Specialist



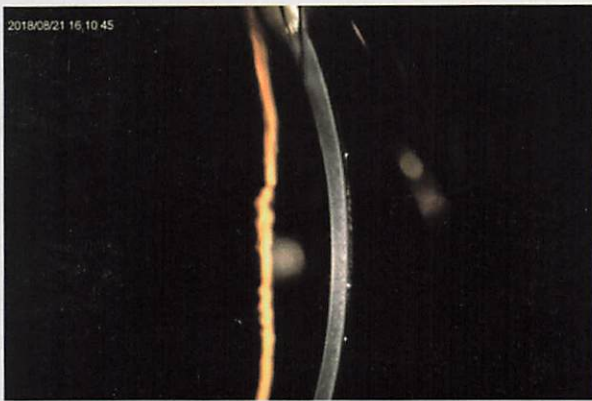
## Brand New Digital Slit Lamp

**NEW** ★ **UPGRADE**

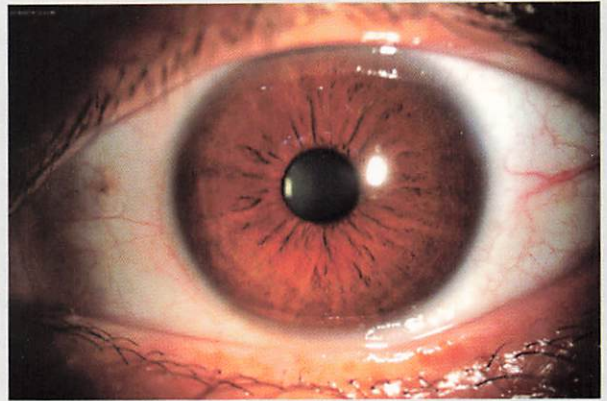


# Mediview Software

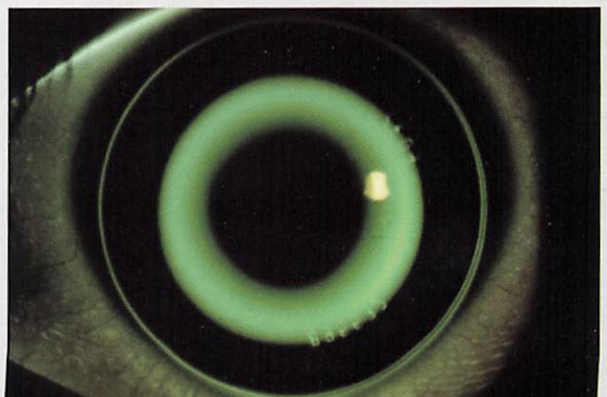
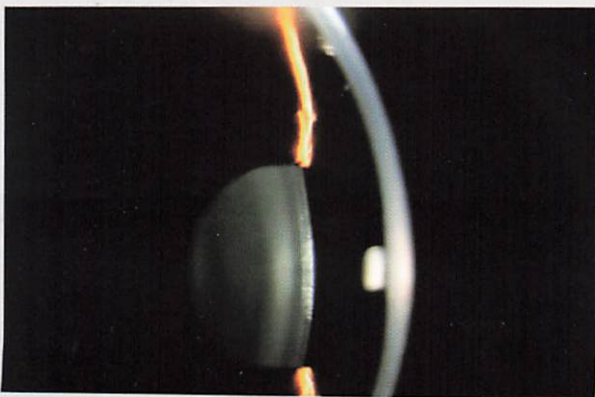
## Cloud based image system and telemedicine



High sensitivity. The slit is still clear and sharp under weak light.



Wide dynamic range. Iris and sclera images are simultaneously clearly presented with more realistic and evenly distributed color



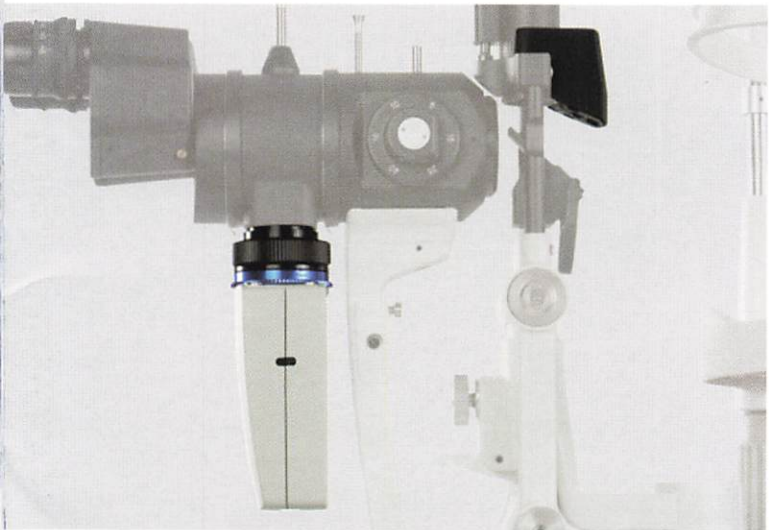
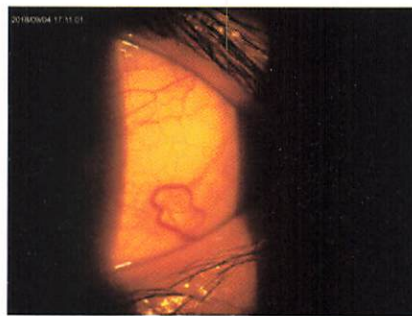


## Optical resolution increased by 40%

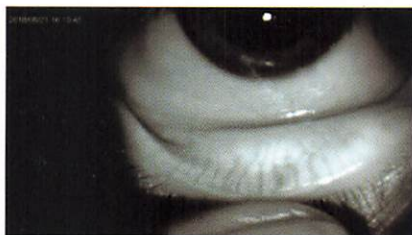
High-quality optical microscope with extraordinary resolution to meet doctors' higher optical quality requirements for better accuracy and safe diagnostic results



## Built-in yellow filter



## The Meibomian glands examination



1/1.8" Sensor



1/4" Sensor

2592 x 1944



1280 x 960

25fps



12fps

# Specifications

## Microscope

Microscope Type	Galilean Type
Magnification Change	Revolving Drum 5 steps
Total Magnification	6.3X, 10X, 16X, 25X, 40X
Eyepieces	12.5X
Angle between Eyepieces	13°
Pupillary Adjustment	52mm-80mm
Diopter Adjustment	± 8D
Field of View	Ø36.2mm, Ø22.3mm, Ø14mm, Ø8.9mm, Ø5.6mm

## Slit Illumination

Slit Width	0~14mm continuous (slit becomes a circle at 14mm)
Slit Length	1~14mm continuous
Aperture Diameters	Ø14mm, Ø10mm, Ø5mm, Ø3mm, Ø2mm, Ø1mm, Ø0.2mm
Slit Angle	0°~180°
Slit Inclination	5°, 10°, 15°, 20°
Filters	Heat-absorbing filter, ND filter, Red-free filter, Cobalt Blue filter, Yellow filter built-in
Lamp	3V LED Module
Luminance	≥ 150KLX

## Power Supply

Input Voltage	110V~220V
Input Frequency	50Hz/60Hz
Power Consumption	20VA
Output Voltage	3V LED, Fixation 5V

## Packaging

Dimension	770mm x 470mm x 570mm(L/W/H)
Gross weight	24kg
Net weight	20kg

## System Specifications

Image Sensor	5.0M Pixels
Photo Resolution	2592 x 1944
Format	JPEG
Video Resolution	2592 x 1944
Frame of Video	25fps
Video Formats	MP4 H.264
Exposure Mode	Automatic exposure
Transmission Interface	USB 3.0 TYPE-C

## Shanghai MediWorks Precision Instruments Co.,Ltd.

Add: Zone A, 2nd Floor, No. 69, Lane 1985, Chunshen Road, Minhang District, Shanghai, 200237, China

Tel: +86-21-54260421 54260423 Fax: +86-21-54260425

Email: international@mediworks.biz

Follow Us on



[www.mediworks.biz](http://www.mediworks.biz)

201710B \*Subject to change in design or specification without advance notification

**Details Make the Difference**



# FC161 Hand-held Fundus Camera

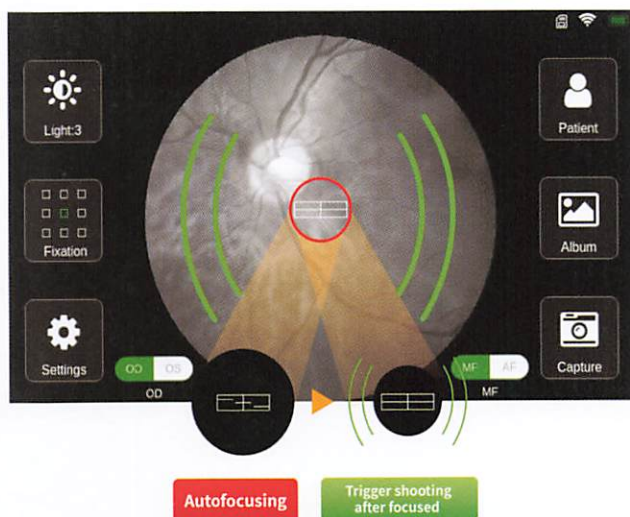
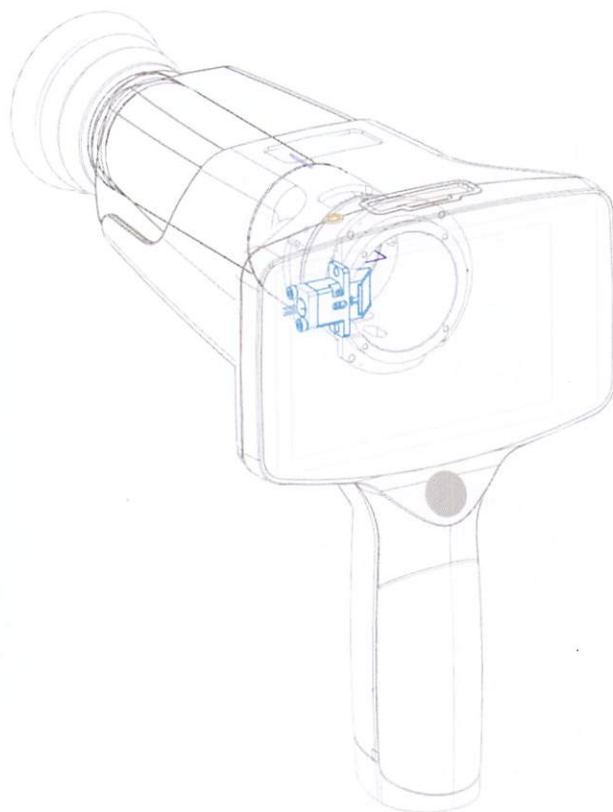


Millisecond Focusing

# Auto Split Focusing Technology

## Millisecond Focusing Speed

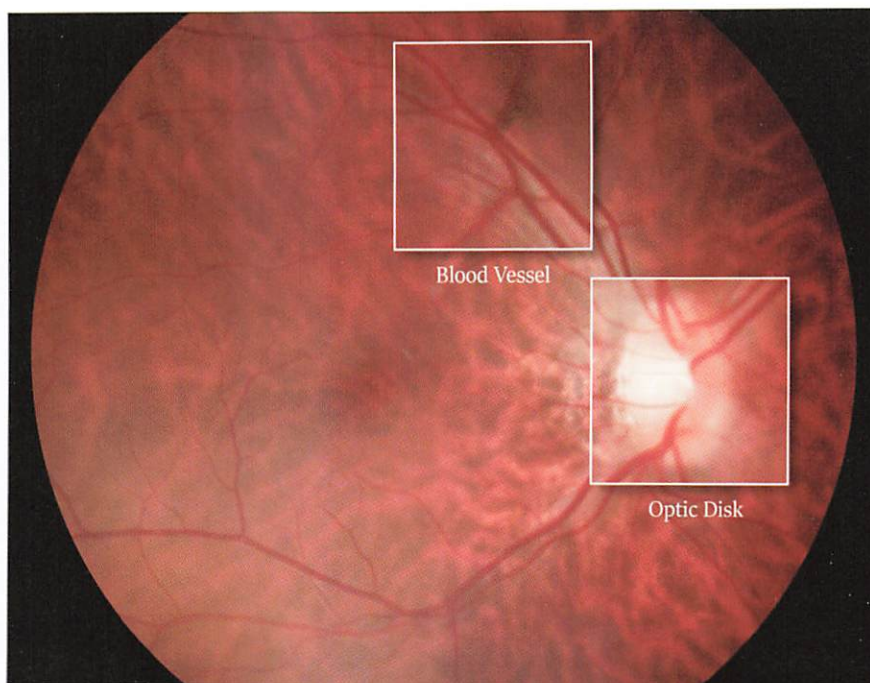
FC161 adopts Auto Split Focusing technology, focusing speed reaches milliseconds. It avoids the out-of-focus of the fundus image caused by the patient's movement during shooting, effectively improve the image quality and reduce the requirements for cooperation between operators and patients.



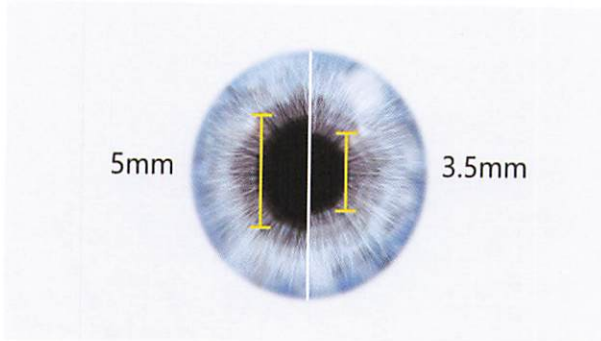
## Advantages

### High Resolution

FC161 provides high resolution fundus images, image resolution is up to 12 Mega Pixels. It makes the diagnosis of early lesions more accurate and also essential for diagnosing retina disease, such as diabetic retinopathy, glaucoma and macular degeneration.







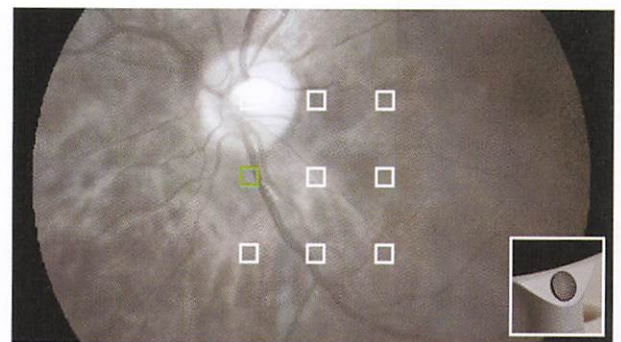
## Non-Mydriatic

The minimum pupil diameter of FC161 is  $\phi 3.5\text{mm}$ . 20 minutes of mydriatic waiting time is saved, and the risk of mydriasis to the patient is avoided.

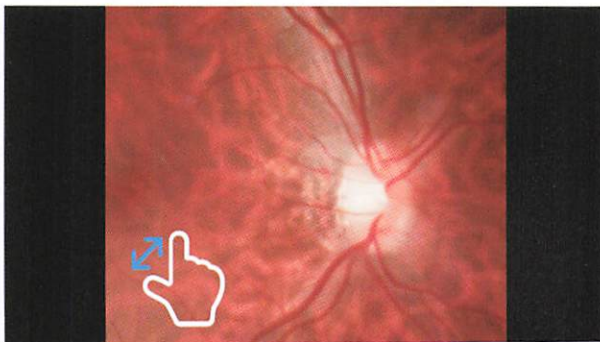
## 9 Fixation Targets

With 9 fixation targets, FC161 covers  $85^\circ$  field of view of the fundus and supports the examination of early peripheral lesions of the fundus.

With  $45^\circ$  field of view, a single central fundus image can be taken to meet the needs of fundus disease screening.



Easily select different fixation target by rotating direction key.



## Smart Touch Operation

4.3" full-touch LED screen brings a smarter operating experience. Doctors can zoom the image at any time to check the details of the fundus, and can also easily slide the screen to edit and view the case.

## Real-time Uploading

FC161 supports real-time synchronization between fundus images and Medview Patient Management software through WIFI connection.



# Specification

	FC161
Type	Non-mydrriatic
Filed of View	45degrees
Camera Sensor Resolution	12M Pixels
Fixation Targets	9×LED,Internal
Minimum Pupil Size	3.5mm
Illumination	White LED & IR LED
Focusing	Manual/Automatic
Focus Range	-20D ~ +20D
Display	4.3" Touch Screen
Image Format	JPEG
Type of Image	Color
Memory	Micro SD card. Maximum 32G
Data Connectivity	WIFI/USB
Power Supply	Rechargeable battery 3.7V/3400mAh x 2
Working Time	3 hours of continuous work
Charging Station	100-240V ~, 0.5A, 50/60Hz
Power Supply	5V DC,2A
Dimensions	28cm×13cm×15cm
Weight	800g
languages	Chinese, English

## Standard Accessories



Carrying Case



Hand-held Fundus Camera



Recharging Station



Protection Cover



Power Adaptor



USB Cable



SD Card



Mediview Patient Management Software

## Optional Accessories



Slit Lamp Attachment



CE FDA NMPA

Shanghai MediWorks Precision Instruments Co.,Ltd.

Add:Building 7, Ming Pu Plaza, No. 3279, San Lu Rd, Min Hang District,Shanghai, 201100,China

Tel: +86-21-54260421 54260423 Fax:+86-21-54260425

Email: Marketing@mediworks.biz

International@mediworks.biz

Follow Us on



www.mediworks.biz



Portable Slit Lamps  
**S150**

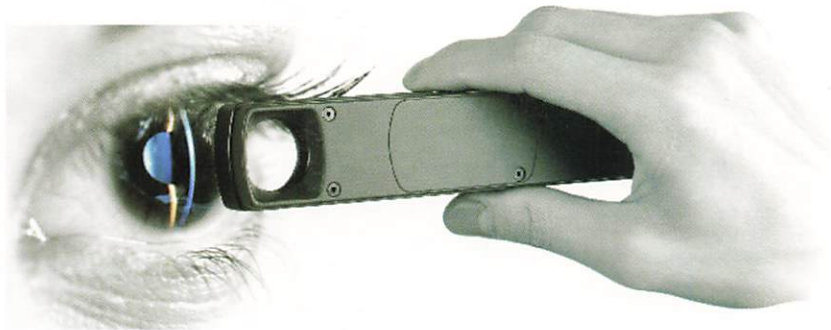
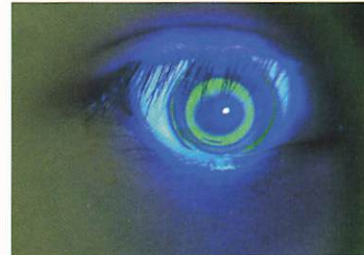
All in one, All in hand



# Specification

Model No.	S150
Magnification	6X
Illumination	● ● ●
Slit Length	≥ 12mm
Slit Width (min)	0~12mm continuously adjustable
Filter	Colt blue filter
Power	Li-ion battery 3.7V/3400mAh
Illumination	LED bulb 3V/1W
Working Time	More than 6 hours
Recharging Time	3.5 hours
Net Weigh	240 g (including battery)

Image Gallery:



**CE** FDA Approval

Shanghai MediWorks Precision Instruments Co.,Ltd.

Add:Zone A,2nd Floor,No.69,Lane 1985,Chunshen Road,Minhang District,  
Shanghai,200237,China

Tel: +86-21-54260421 54260423 Fax:+86-21-54260425

Email: international@mediworks.biz

Follow Us on



[www.mediworks.biz](http://www.mediworks.biz)

201608B \*Subject to change in design or specification without advance notification

**Details Make the Difference**



Retina Lens

90D 78D 20D

Deeper Observation, Better Diagnosis

# Specifications

90D

78D

20D



Magnification ratio	0.76X	0.93X	3.13X
Field Of View(°)	74.2°-89°	81.4°-97°	46°
PrismWorking Distance (mm)	7.0	8.0	50.0
Clear Aperture(mm)	Ø21	Ø26	Ø48
Dimension(mm)	Ø27 x 13	Ø33 x 15	Ø56 x 20

## NMPA

Shanghai MediWorks Precision Instruments Co.,Ltd.

Add:Building 7, Ming Pu Plaza, No. 3279, San Lu Rd, Min Hang District, Shanghai, 201100, China

Tel: +86-21-54260421 54260423 Fax: +86-21-54260425

Email: [marketing@mediworks.biz](mailto:marketing@mediworks.biz)  
[international@mediworks.biz](mailto:international@mediworks.biz)

Follow us



[www.mediworks.biz](http://www.mediworks.biz)



## **FC162 Automatic Fundus Camera**

Guard Your Health Easily

## Get to know the retina

Eyes are the windows of soul and also the only non-invasive way to inspect retina, choroid, blood vessels, nerves and so on.

FC162 captures binocular fundus images in a fully automatic way( auto alignment, auto focus, auto voice interaction). Generate AI diagnosis report(supported by 3rd party case screening system) to analyze multiple retinal diseases, diabetes, cardiovascular and neurological diseases (such as brain tumors, anemia, etc.). Only 2 mins needed to capture images and get report, super smart solution for early detection and intervention for various diseases.

## 30 Seconds Obtaining Binocular Retina Images



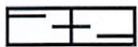
Scan the QR code,  
system will align pupil and start capture



Capture binocular retina  
images under voice  
interaction



Automatically get the retinal  
images and generate AI Diagnosis  
Report (supported by 3rd  
party)



Split Focusing Technology



15 Mega Pixels



50° Field of View



Smart Diagnosis



# Wide-field fundus imaging

**9 Fixation Targets** - 90° field of view enables early detection of peripheral retinal pathology.

## Specifications

Type	Non-mydratic
Field of View	50°
Camera Resolution	15 mega pixels
Fixation	Internal fixation
Minimum Pupil Size	3mm
Illumination	LED
Focusing	Auto focusing
Diopter Adjustment Range	-20D~+20D
Display	5" LCD touch screen
Image Format	JPEG,DICOM
Type of image	Color
Storage	16G
Data	WIFI
Battery	47.52Wh
Power Supply	~100V-240V, 50-60Hz 1.2A-0.5A
Battery Life	4 hours(Differs under variable environment and circumstances)
Dimension	32cm × 21.5cm × 12.5cm
Weight	2.7kg
Language	Chinese, English

## Standard Accessories

- Automatic Fundus Camera ×1
- Eye Mask ×1 pack
- Power Adapter ×1
- Battery ×1
- Portable Case ×1

**CE NMPA FDA**

**Shanghai MediWorks Precision Instruments Co.,Ltd.**

Add: Building 7, Ming Pu Plaza, No. 3279, San Lu Rd, Min Hang District, Shanghai, 201100, China

Tel: +86-21-54260421 54260423 Fax: +86-21-54260425

Email: [marketing@mediworks.biz](mailto:marketing@mediworks.biz)  
[international@mediworks.biz](mailto:international@mediworks.biz)

**Follow us**



[www.mediworks.biz](http://www.mediworks.biz)

202204 \*Subject to change in design or specification without advance notification

**Details Make the Difference**