Mega Pixel

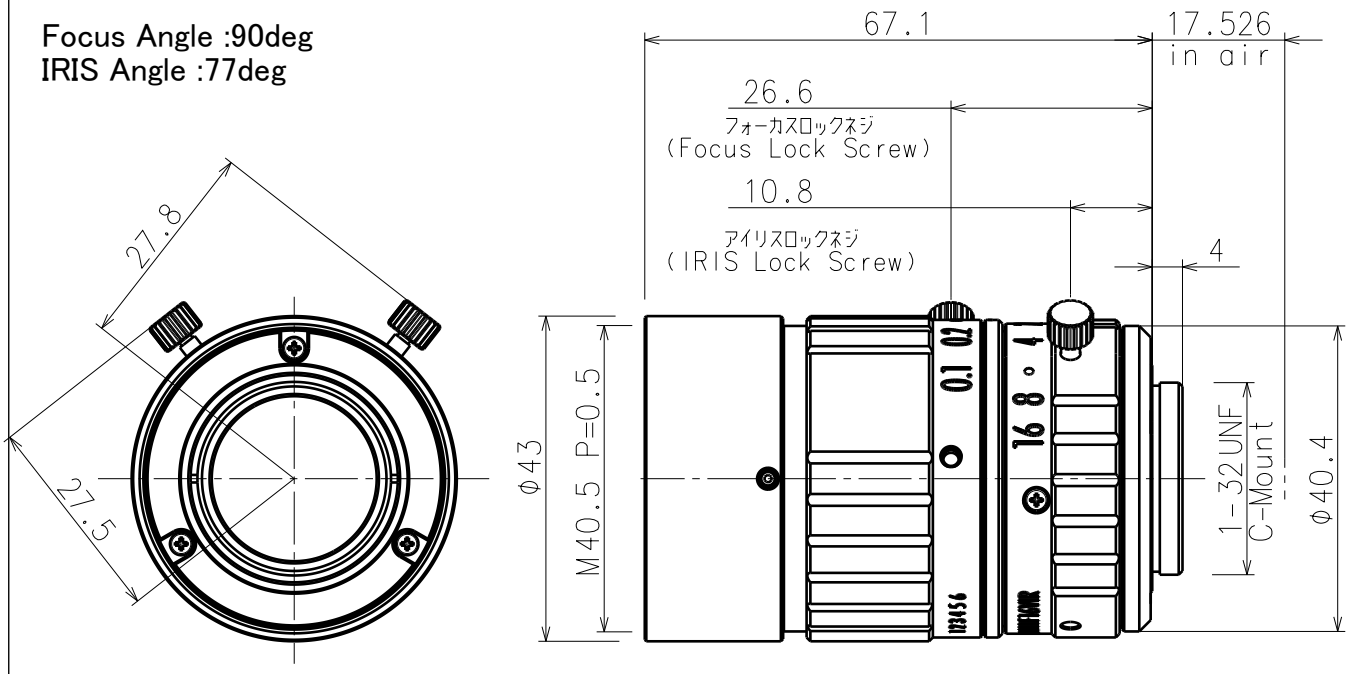
MA111F16VIR

Imager Size	イメージャーサイズ		1.1″
Mount Type	マウント		C
Focal Length	焦点距離		16 mm
Aperture Range	アイリス範囲		F/2.8 ～ F/16
Field of View Angle (Horizontal x Vertical)	画角 (水平x垂直)	1.1″	47.7° x 36.8°
		2/3″	30.8° x 23.3°
		1/2″	22.6° x 17.0°
Focus Range	フォーカス範囲		0.1 m ～ ∞
Operation 操作方法	Focus	フォーカス	Manual w/lock
			手動 ロック付き
	IRIS	アイリス	Manual w/lock
			手動 ロック付き
FilterSize	フィルターネジ径		M40.5 P=0.5
Wave Length	対応波長		可視光域～近赤外域 Visible Light ～Near Infrared
TV Distortion	歪曲		0.2% (*)
Weight	質量		178 g
Operating Temperature	動作温度範囲		-20℃ ～ +60℃

Drawing 外観図面

*設計値/Design Value

Focus Angle :90deg
IRIS Angle :77deg



※仕様及びデザインはお断りなく変更する場合があります.
Specification and design subject to change without any notice.

TAMRON

ECB16E0000-00

TAMRON
Focus on the Future

FA and Machine Vision Lenses News from TAMRON

NEW RELEASE

Four Compact ϕ43mm Machine-Vision Lenses Compatible with 1.1" Imagers and Full 24-Mega Pixel Resolution

- 1.1" 16mm F/2.8 (Model: MA111F16VIR)
- 1.1" 25mm F/2.8 (Model: MA111F25VIR)
- 1.1" 35mm F/2.8 (Model: MA111F35VIR)
- 1.1" 50mm F/2.8 (Model: MA111F50VIR)

NEW

Model: MA111F16VIR Model: MA111F25VIR Model: MA111F35VIR Model: MA111F50VIR

For

- IMX253 1.1" 12-Mega
- IMX304 1.1" 12-Mega
- IMX532 1.1" 16-Mega
- IMX542 1.1" 16-Mega
- IMX531 1.1" 20-Mega
- IMX541 1.1" 20-Mega

2.5 μm

※24-Mega(max)pixel resolution

Main Features

High Resolution and Contrast Unrivaled in the Industry

- Compatible with 1.1" imagers, supporting 2.5μm pixel-pitch and 24-mega* (max) pixel resolution.
- Offer resolution and contrast outperforming other 24-mega pixel lenses.
  (* resolution at the center)

Industry-Leading Low Distortion (TV Distortion)

- Significantly reduce TV Distortion compared with previous models.
  (* MA111F16VIR: 0.2%, MA111F25VIR: -0.3%, MA111F35VIR: 0.3%, MA111F50VIR: 0.1%)

High-Quality Performance from Close-up to Infinity

- A new comprehensive lens design covering both close-up and infinity shooting distances assures high contrast and resolution throughout the whole focal length range.

New Robust Mechanism for Anti-Vibration and Anti-Shock

- A newly designed mechanism improves anti-vibration and anti-shock performance compared with previous models, limiting the optical (image) deflection to less than 10μm even for the severe impact of vibrations and shocks of max 10G of magnitude.
  * Vibration frequency 10-150Hz (acceleration 50m/s^2), and the number of cycles: 20 cycles.

Reduction of Focus-Shift in between the Visible-Light and the NIR Bands

- Focus-shift associated with the wide spectrum of 400nm to 850nm is reduced to an absolute minimum, which makes the new lenses an optimum choice for cameras compatible with the visible-light and the NIR band.

TAMRON
Focus on the Future

■Specifications

Model		MA111F16VIR	MA111F25VIR	MA111F35VIR	MA111F50VIR
Imager Size		1.1"			
Mount Type		C			
Focal Length		16mm	25mm	35mm	50mm
Aperture Range		F/2.8 ～ F/16			
Field of View Angle (Horizontal × Vertical)	**1.1"**	47.7°×36.8°	31.7°×23.9°	22.8°×17.2°	16.0°×12.0°
	2/3"	30.8°×23.3°	20.0°×15.0°	14.4°×10.8°	10.1°×7.5°
Focusing Range		0.1m ～ ∞		0.2m ～ ∞	
Operation	**Focus**	Manual w/lock			
	Iris	Manual w/lock			
Filter Size		M40.5 P=0.5mm			
Wave Length		Visible Light～NIR			
TV Distortion		0.2% ✻	−0.3% ✻	0.3% ✻	0.1% ✻
Weight		178g	196g	179g	181g
Operating Temperature		−20℃ ～ +60℃			

✻ Design Value

TAMRON CO., LTD. http://www.tamron.biz/en/
1385, Hasunuma, Minuma-ku, Saitama-shi, Saitama 337-8556 JAPAN
Tel: +81-48-684-9129 Fax: +81-48-683-8594

TAMRON USA, INC. http://www.tamron-usa.com
10 Austin Boulevard, Commack, NY 11725, USA Tel: +1-631-858-8400 Fax: +1-631-543-3963

TAMRON Europe GmbH. http://www.tamron.de
Robert Bosch-Str. 9, 50769 Cologne, GERMANY Tel: +49-221-669544-0 Fax: +49-221-669544-404

TAMRON INDUSTRIES (HONG KONG) LIMITED http:// www.tamron.com.hk
Unit 908, 9/F, Elite Centre, 22 Hung To Road, Kwun Tong, Kowloon, Hong Kong Tel: +852-2721-7797 Fax: +852-2620-1631

TAMRON (Russia) LLC. http://www.tamron.ru
Unikon Business Center 5F No. 9, Plekhanova Street 4a, Moscow, 111123, Russian Federation
Tel: +7-495-970-0112 Fax: +7-495-970-0112

TAMRON OPTICAL (SHANGHAI) CO., LTD. http://www.tamron.com.cn
Room 1707, Ruijin Building, No.205, Maoming South Road, Shanghai, 200020, CHINA
Tel: +86-21-5102-8880

TAMRON INDIA PRIVATE LIMITED http://www.tamron.in
805, 806 & 807 8th floor, Vatika City Point, MG Road, Gurgaon-122001, Hayana, India
Tel: +91-124-41-168-12 Fax: +91-124-40-822-72

Management on Quality and Environment :
Tamron is certified with international standards: ISO 9001 for quality and ISO 14001 for environmental management at its Head Office, domestic sales offices, China plant as well as production facilities in Aomori Factory, Japan, and is fully committed to striving for continued and sustainable improvement at all levels and facets of its business operations.

● Specifications subject to change without notice