

**JAL-KH2-K4700F****Hynix HI-253 DVP Parallel Schnittstelle Fixer Fokus 2MP Kameramodul**

|                            |                       |
|----------------------------|-----------------------|
| <b>Kameramodul Nr.</b>     | <b>JAL-KH2-K4700F</b> |
| <b>Bildsensor</b>          | HI-253                |
| <b>EFL</b>                 | 2.95 mm               |
| <b>F.NO</b>                | 2.8                   |
| <b>Pixel</b>               | 1600 x 1200 (UXGA)    |
| <b>Blickwinkel</b>         | 60°                   |
| <b>Linsentyp</b>           | 1/5 Zoll              |
| <b>Objektivabmessungen</b> | 6 x 6 x 4 mm          |
| <b>Modulgröße</b>          | 14.3 x 7.59 mm        |
| <b>Modultyp</b>            | Fixer Fokus           |
| <b>Schnittstelle</b>       | DVP Parallel          |

**Gegenstecker Teile-Nr. AXK7L24223G**

Gegenstecker auf der Hauptplatine. Separat erhältlich.

Version 0.0  
Preliminary



**YACD511SBDBS**

**1/5" 2M Pixels CIS  
with Image Signal Processor  
[Hi-253]**

Camera Module Factory  
www.KailapTech.com

# 1. OVERVIEW

## 1.1. Description

YACD511SBDBC is a high quality 2mega-pixel single chip CMOS image sensor for mobile phone camera applications and digital still camera products.

YACD511SBDBC incorporates a 1644 x 1260 pixel array, on-chip 10-bit ADC, and an image signal processor. Unique sensor technology enhances image quality by reducing FPN (Fixed Pattern Noise), horizontal/vertical line noise, and random noise.

## 1.2. Applications

- Mobile Phone Camera / Digital Still Camera
- PC Camera / Video Conference

## 1.3. Key Features

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| <ul style="list-style-type: none"> <li>● Pixel Size: 1.75um X 1.75um</li> <li>● Active Image Size :<br/>2.856mm (H) X 2.156mm(V)</li> <li>● Resolution: 1,600H X 1,200V</li> <li>● Optical Format: 1/5 inch</li> <li>● Frame Rate: 15fps@UXGA, 30fps@SVGA</li> <li>● Power Supply: 2.8V / 1.8V</li> <li>● Power Consumption: TBD @ 15fps, UXGA</li> <li>● ADC: 10bit</li> <li>● PLL: On Chip</li> <li>● Operation Temperature: -20 ~ 60°C</li> <li>● Master Clock: 48MHz(Max)</li> <li>● Host Interface: two-wire serial bus interface</li> <li>● Output Format: YUV4:2:2, RGB5:6:5,<br/>ITU656-like</li> <li>● Edge Data for Auto Focus</li> <li>● Motion Data for Auto Focus</li> <li>● Windowing: Programmable</li> </ul> | <ul style="list-style-type: none"> <li>● Sub-Sample: 1/2, 1/4 (SVGA, QSVGA)</li> <li>● Image Scaling : 1x ~ 1/64x</li> <li>● Image Flip: X/Y Flip</li> <li>● Auto Exposure</li> <li>● Auto White Balance</li> <li>● Anti-Flicker(50Hz / 60Hz): Auto/Manual</li> <li>● Noise Reduction</li> <li>● Black Level Calibration</li> <li>● Strobe Control: Support Xenon / LED Type</li> <li>● On-Chip Dead Pixel Correction</li> <li>● Edge Enhancement</li> <li>● Brightness</li> <li>● Color Saturation</li> <li>● Gamma Correction</li> <li>● Color Correction</li> <li>● Lens Shading Correction</li> <li>● Image Effect: Mono, Sepia, Solarization,<br/>Negative, Sketch, Embossing</li> </ul> |
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<Figure 1. Block Diagram>

