

KETH MLX









Software-controlled multi-purpose imaging system for versatile applications



SAMPLE TRAY AUTOMATIC IDENTIFICATION

Detect Sample Tray automatically with preset protocols provide the best image capture condition





Reduce the waiting time for your faint signal to appear



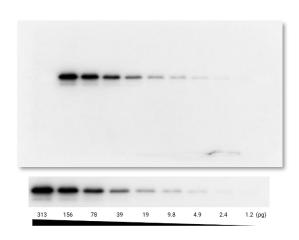


EASY IMAGE EXPORT

Export your images in a batch to your USB drive instantly

KETA MLX is a high-end multi-purpose research grade imaging system, ideal for molecular biology core facility. It consists of a superior 16 bit, 9.1 megapixel Peltier cooled camera element, software-controlled lens, eight-position motorized filter wheel come with a high transparent amber filter. Large visual area, MC 200 LED light set covers the wavelength range from visible to NIR as Epi-light source, low background 302nm/365nm dual wavelength UV transilluminator. Inbuilt 24V power supply for blue/white light sample tray, UV radiation safety interlock darkroom, 67mm WK 201 ~ WK 205 filter emission filter as standard, energy saving mode provides camera turn off automatically while idling over than 15 minutes. Pre-set optimum condition, method create and edit capability.

Code recognizer enables MLX automatically recognize sample tray to drive the system with the specific emission filter, excitation light source, zoom, iris, focus and all preset parameter to get the best image by one click. The system also supports method create and recall for multiple users.



Two-fold dilution series of purified human transferrin from 625 pg to 2.4 pg

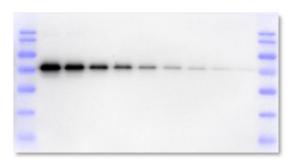


Image blending with the marker image with Auto Coloring

MC 200 is the new LED Epi light source module for fluorescence western blot workflow. It covers wavelength from visible range 460nm to NIR 780nm, coupled with narrow band emission filter delivering excellent result with all kinds of commercial fluorescent dyes.

Magic Chemi Plus software package is dedicated for KETA MLX which integrated with both Magic 1D and Magic Chemi software.

Magic 1D software package with genius capture mode CGM allows user to preset, save and recall capture parameter by one click. Maximum 30 seconds exposure time is available for single capture. The GCM function helps operator to get excellent image anytime.

Built-in darkroom calibration, camera shading correction, distortion correction, flat frame correction, adjustable brightness / contrast /, image profiling / blending, background defining, provides whole visual area imaging at the same level. In addition, four analysis functions, molecular weight and mass determination, colony counting, microtiter plate assay, and spot density calculation are also included.

Magic Chemi software package dedicated for chemiluminescent signal capture, functions include live / preview viewing, auto capture / auto quant capture / professional capture mode. DynaView, Batch Capture and Programming capture are included in Professional mode. DynaView is continuously accumulate signal emitted from the membrane and display with time sequence. Batch Capture function is to simulate the X-ray film exposure protocols to provide continuous image capture with different exposure time. Programming capture detects the signal with 10 sets of exposure time with pause function. Circle select interested region and recapture to get better result. Binning function with 1x1, 2x2, 4x4, and 8x8 augment the sensitivity. Interrupt warning stop and warn the user while capturing been disturbed. Auto-save function allows user to export with most common file formats such as PCX, TGA, DFN, PNG, IMG, TIFF, BMP, JPG, GIF, etc. at once. Molecular Weight and Mass Determination, and Spot Density calculation are included.



Blue/white light sample Tray

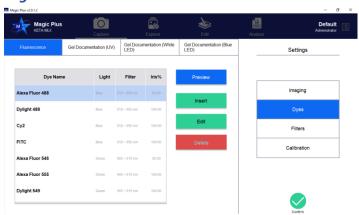


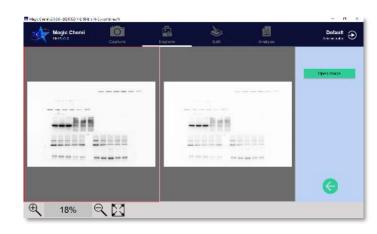
Fluorescence image Alexa Fluor 488



Fluorescent image Alex Fluor 680

Magic Plus software



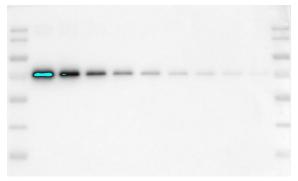


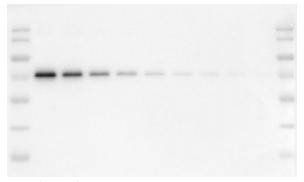
Select specific dye Compare images

Auto capture mode

Select the Auto Capture mode system automatic predict the optimal exposure time get perfect result both save time and never lost

Any signal, Auto Quant mode same as above the image capture will stop at anyone pixel saturated help operator fast for quantification of protein.





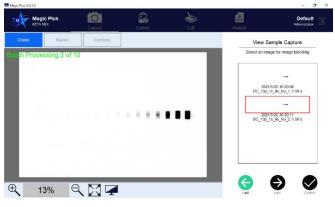
Auto Capture

Auto Quant Capture

Professional mode

DynaView and Batch capture for signal cumulate and X-ray film simulation



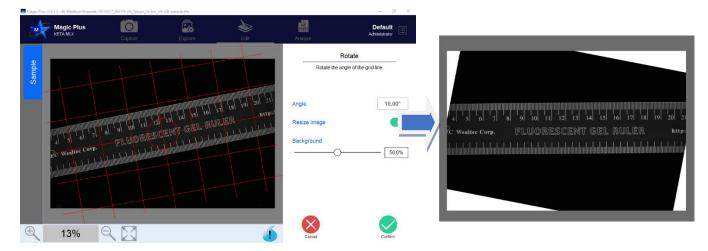


DynaView

Batch Capture

Image rotation

Non-mechanical image rotation capability 0-360 degree enables user to optimize the image with the desired position for professional report export



MC 200 supports versatile fluorescent western blot

MC 200 Epi light set includes eight pieces of Hi- power LED covering wavelength from 460nm to NIR (780nm) for all fluorescent dye excitation on western blot application. Operator choose either the dye or the excitation wavelength, the MLX will automatically turn on the LED and drive the Emission filter to correct position by preset program without additional steps.

Motorized Filter Wheel

Software controlled eight 67mm filter position motorized filter wheel remains flexibility for chemiluminescent Imaging and adapted various emission filters for fluorescent western blot Imaging



MC 200 blue light for Alexa Fluor 488 dye



Eight position filter wheel

Image Analysis Function

Magic Plus software provides powerful tool for user easily compare their images with previous images, enhance the images with the editing tools, and select the best images for quantification analysis



Image Edit and Display

Magic plus possess the traceable image enhancement functions which include: color/ brightness/ contrast adjustment, image profiling or blending, background defining, annotations on the image or masked layer, 3D color display, X-axis comparison, smiling gels correction, conversion, interpolate, Deconvolution, Super Resolution, flipping, rotation and distance measurement.

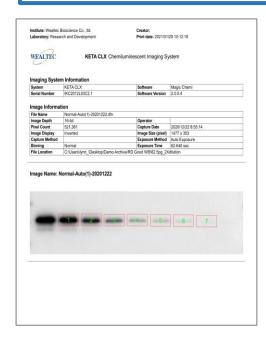


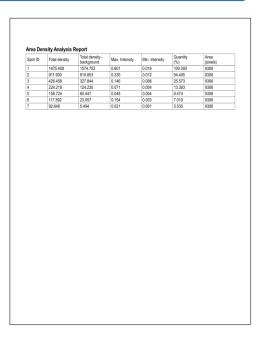
Professional Reporting

Institute: Wealtec Bioscience co., ltd.

Laboratory: Research and Development

Creator:
Print date: 2020/12/23 14:39:12





Specification

Thermal printer

Laser printer

Model	KETA MLX
Camera depth	16bit
Dynamic Range	>4.0
Operation temperature	0-60° <i>C</i>
Chip size	1"
Resolution	9.1M pixels
communication	Wi-Fi, Ethernet, USB
Binning	1X1,2X2, 4X4, 8X8
Pixel Size	2.4um x 2.4um
Cooling	Peltier, 40°C below ambient
Motorized Lens	F2.0, 24-65mm focal length
Filter Wheel	67mm, eight-position
Internal light source	MC 200 / 460 nm to NIR 780nm
UV-transilluminator	MD-25DK 302nm/365nm
Tans-light Sample Tray	ST-BW20 Blue & White light, 20 x20cm
Sample Tray	White / Black, 25 x 25cm
Magic plus software	Standard
OS system	MS Windows 10
Physical dimensions	425 x 480 x 865 mm (WxDxH)
Weight	30kg
Power	100 – 240V, 50 – 60Hz, 300W
	Optional
External Touch Screen	20" LCD Screen with touch panel

Digital

Color Laser Printer

Filter Selection Guide

Filter Type	Em (nm)	Commercial fluorescence dye
WK 201	540-630	Coomassie Blue, EtBr, SYBR Green, SYBR Gold, SYPRO Ruby, SYPRO Orange
WK 202	515-531	Alexa Fluor 488, Alexa Fluor Plus 488
WK 203	564-618	Alexa Fluor 546, Alexa Fluor Plus 555
WK 204	675-719	Alexa Fluor 647, Alexa Fluor Plus 647
WK 205	706-727	Alexa Fluor 680, Alexa Fluor Plus 680
WK 206	800-850	Alexa Fluor 790, Alexa Fluor Plus 800
WK 207	810-850	Alexa Fluor Plus 800 for near IR-excitable fluorophores and stains

Ordering Information

Ordering initial	mation
Catalog Number	Description
1150041	KETA MLX complete include main body with 12.1" LED touch screen, SBC with 1TB SSD, Wi-Fi, 5 USB port,
	Ethernet, Win 10, WK 201~205 filter one each, one each white and black sample tray for membrane, coded
	blue ST-BW20 blue/white light sample tray, 302nm/365nm dual-wavelength UV transilluminator, built in 24V
	power for coded trans-light sample tray, a set of keyboard and mouse, 100-240V, 50/60Hz
1153008	Magic PLUS for KETA M series, single user only
1151306	ST-BW20 Coded White light / Blue light 495nm sample tray 20 x 20 cm
1151307	ST-BB20 Coded Green light / Blue light 495/470 nm sample tray 20 x 20 cm
1151308	ST-RW Coded Red light sample tray 20 x 20 cm
1151304	Coded Black sample tray, 25 x 25cm
1151305	Coded White sample tray, 25 x 25cm
1151211	WK 201 540-630 nm H-T Filter perform protein and DNA gel and blot imaging ,67mm
1151212	WK 202 515-531 nm Filter for Alexa Fluor 488, Alexa Fluor Plus 488, 67mm
1151213	WK 203 564-618nm Filter for Alexa Fluor 546, Alexa Fluor Plus 555, 67mm
1151214	WK 204 675-719nm Filter for Alexa Fluor 647, Alexa Fluor Plus 647, ,67mm
1151215	WK 205 706-727nm Filter for Alexa Fluor 680, Alexa Fluor Plus 680, 67mm
1151216	WK 206 800-850nm Filter for Alexa Fluor 790, Alexa Fluor Plus 800, 67mm
1151217	WK 207 810-850nm Filter for Alexa Fluor Plus 800 ,67mm
1146002	UV radiation block cover for gel excision
1151251	MD-25K UV transilluminator, 120V, 60 Hz, 302 nm, 25 x 25cm filter size
1151252	MD-25K UV transilluminator, 230V, 50 Hz, 302 nm, 25 x 25cm filter size
1151259	MD-25DK Dual wavelength UV transilluminator, 100-240V/ 50-60 Hz, 302 /365nm, 25 x 25cm filter size
1155032	External 20" LCD with touch panel
Option	
1146003	Digital thermal printer
1147007	Thermal paper 5 rolls/pack
1147008	Color laser printer

Wealtec Corp.

1885 Meadowvale Way, Sparks, NV 89431, USA

Tel: +1-775-351-2066 Fax: +1-775-351-2077

E-Mail: sales@wealtec.com

Wealtec Bioscience Co., Ltd.

Web-site: http://www.wealtec.com

27F., No.29-1, Sec. 2, Zhongzheng E. Rd., Danshui Dist., New Taipei City 251, Taiwan Tel: +886-2-8809-8587 Fax: +886-2-8809-8589



