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XYRCOS® & XYRCOS DTS Lasers V6.3

The XYROCS® includes laser objective combination, 3 turret adapters, video camera, c-mount adapter, proprietary laser drilling software, desktop or laptop computer and accessories. Microscope is not included.

Dimensions	H in. (mm)	W in. (mm)	D in. (mm)	lb. (kg)
XYRCOS.:	1.65 (42)	1.26 (32)	1.26 (32)	0.28 (0.13)
XYRCOS DTS:	1.65 (42)	1.34 (34)	1.34 (34)	0.30 (0.14)
Controller:	3.8 (95)	2.5 (63.5)	1.8 (46)	1.0 (0.45)
DTS Contr.:	3.89 (99)	3.82 (97)	1.44 (37)	1.21 (0.55)
MiniTower:	11.5 (292)	3.7 (92.6)	11.4 (290)	11.57 (5.26)
Monitor: (with stand)	20.2 (513.5)	21.9 (556)	7.1 (180.3)	10.1 (4.6)
Laptop:	0.9 (23.45)	14.8 (376.9)	10.1 (255.2)	4.71 (2.14)

Electrical	Desktop	Monitor	Laptop
Input Voltage:	100/240 VAC	110-240 VAC	100-240 VAC
Power:	300 W	72 W (max)	90W
Line Frequency:	50/60 Hz	50/60 Hz	50/60 Hz

Laser
Type:	1460 nm, Infrared Solid-State Diode
Maximum Power:	@ Focus = 300 mW (Class I)
Laser Modes:	Single, Double, Staccato
Single:	Laser produces single laser shots
	Adjustable Laser Power (%) and Pulse Length (µs)
	Fire laser by mouse or footswitch
Double:	Provides access to two independent Single Laser panels
	Each panel has its own power and pulse setting and laser fire button
	Fire laser by mouse or footswitch
Staccato:	*Optional:* Pulse length: 1 - 3000 µs
	Power: 1 - 100%
	Repetition rate per sec: 1 - 1000
	Mean power maximum: 90 mW
CW:	*Optional:* Continuous Wave Mode. Allows non-pulsed laser application over a long duration of time.
	Maximum Laser Power**:** 30%
	Maximum Total Duration**:** 60 seconds
Firing:	By mouse (Optional: Foot switch firing)
Target Marker:	Circle or arrow, adjustable "Blink Time" after firing.
	Isotherm Rings, showing peak temps and hole size. Select which rings to display.
Crosshairs:	Activation, size and color set by user (used for positioning embryo)
Laser Alignment:	Aligned and locked at factory. No on-site physical laser alignment required
Target:	Adjust target alignment on-screen

Dynamic Targeting System (XYRCOS DTS only)
Modes:	Single; Double
Laser Paths:	Single Shot
	Line/Curve
	Freehand
	Multipoint
	Rectangle
Quality Control:	Automated Initialization and Validation routines
	Built-in Reporting

RED-i Target Locator
Source:	Red LED built into laser module
Alignment:	X-Y mechanical adjustment to center of laser beam using Isotherm Rings as guide
Intensity:	On-screen intensity adjustment

Objective
Standard:	40x 0.60 N.A. (High transmission in the UV [>350 nm], visible and near-infrared, long working distance)
Correction:	Infinity corrected for 1 mm thick polystyrene Petri Dish, on 500 µm glass heater plate
	A nose cap corrector is available if use without the glass heater plate is required.
Working Distance:	1.7 mm to glass heater plate
Parfocality:	< 40 µm
Scale Calibration:	Performed interactively on-screen
	Calibrate and save multiple objectives
Scale Bar:	Scale bar graphic overlay automatically adjusts based on calibrated objective. May be saved with images/video.
Compatibility:	3 RMS thread adapters permit installation on all major microscope models

Video
Camera:	Standard: High resolution digital color
	Optional: Analog black & white
Image Area:	Digital: 1360 x 1024 pixels
	Optional NTSC: 640 x 480 pixels
Zoom:	2x, 4x, and 8x with user defined image panning
Illumination:	Microscope, image on screen

Laser Safety
EN IEC 60825-1:2014: Class 1
21 CFR 1040:10: Class I

Images and Videos
Images:	Save unlimited images to disk
	Manual and automatic naming options
	Automatically save images on laser fire
	Unlimited automatic image labels may be stored and enabled
	Add freehand text, circles, rectangles, lines, and image measures be to captured images
	Open and view saved images within program.
Videos:	Capture and store real time and time lapse video in .mp4 format
	Ability to set maximum recording length
	Manual and automatic naming options
	Open and play saved videos within program

Computer (subject to change)
Type:	Dell MiniTower / SFF	Dell Laptop
OS:	Windows 10 Pro (64-bit)	Windows 10 Pro (64-bit)
CPU:	Intel Core i7	Intel Core i7
Memory:	8 GB	8 GB DDR3
Drives:	1 TB GB HD	500 GB HD
	8x DVD+/-RW SATA	External 8x DVD +/-RW
Display:	24" Flat Panel Widescreen (16:10)	15.6" HD Anti-glare
Ports:	6 USB 3.0 (2 on front)	3 USB 3.0
	4 USB 2.0 (2 on front)	(one with PowerShare)
	1 Serial	1 HDMI
	2 Display Port	1 Display Port
	2 PS/2	SD Memory card reader
	1 Line-in (stereo/microphone)	Combo Stereo headphone &
	1 Line-out (headphone/speaker)	Microphone jack
Network:	10/100/1000 Ethernet	10/100/1000 Ethernet
	1 RJ45 port	1 RJ45 port (used by camera)
		Wireless LAN
Mouse:	Wired	Wired
Keyboard:	Wired	Integrated