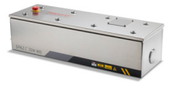
MODEL				SPA2 C-10		SPA2 C-30		SPA2 C-40	
IMAGE									
SYSTEM	Power			10 W		30 W		40 W	
	Technology			CO2 Sealed Tube CW					
				RF Technology					
WAVELENGTH	10,6 microns for BIO materials			Std.					
	10,2 microns for FILM materials			-		Opt.		-	
	9,3 microns for PET bottles			Opt.		Opt.		-	
MAINS POWER SUPPLY				110 / 240 V AC					
				50 / 60 Hz					
				(1 Phase + N) 300 VA		(1 Phase + N) 600 VA		(1 Phase + N) 600 VA	
COOLING	Air/Water			Air (SE/DE), Forced Air (WD)				Forced Air	
	Filtered Blower (200m3/h)			Opt. (DE, WD)				Opt.	
	Filtered Blower (350m3/h)			Opt. (DE, WD)				Opt.	
	Cooling Dryer			Opt. (WD)				Opt.	
	Vortex			Opt. (WD)				Opt.	
	TCU			Opt. (DE, WD)				Opt.	
WARMING	Warming Blower			Opt. (DE, WD)				Opt.	
FOCAL SPECIFICATIONS FOR LENSES without BE for XQS Head	M. Area	WD	FL	BD [µm]	PD [kW/cm²]	BD [µm]	PD [kW/cm²]	BD [µm]	PD [kW/cm²]
	40x40	60 mm	65 mm	301	14,1	421	21,5	421	28,7
	60x60	95 mm	95 mm	441	6,6	617	10,0	617	13,4
	75x75	115 mm	125 mm	583	3,8	816	5,7	816	7,7
	100x100	165 mm	160 mm	743	2,3	1040	3,5	1040	4,7
FOCAL SPECIFICATIONS FOR LENSES with BE for XQS Head	M. Area	WD	FL	BD	PD	BD	PD	BD	PD
	40x40	60 mm	65 mm	150	56,3	168	135	168	180
	60x60	95 mm	95 mm	220	26,2	247	62,8	247	83,7
	75x75	115 mm	125 mm	291	15,0	326	35,9	326	47,9
	100x100	165 mm	160 mm	372	9,2	416	22,1	416	29,4
	150x150	235 mm	240 mm	555	4,1	622	9,9	622	13,2
	200x200	320 mm	320 mm	743	2,3	833	5,5	833	7,3
	250x250	430 mm	410 mm	950	1,4	1064	3,4	1064	4,5
	500x500	700 mm	720 mm	1670	0,5	1871	1,1	1871	1,5
FOCAL SPECIFICATIONS FOR LENSES with BE for HPD Head	M. Area	WD	FL	BD	PD	BD	PD	BD	PD
	40x40	55 mm	65 mm	-	-	105	344	105	458
	60x60	85 mm	95 mm	-	-	154	161	154	215
	100x100	150 mm	150 mm	-	-	242	65,4	242	87,2
	150x150	230 mm	230 mm	-	-	373	27,4	373	36,5
	200x200	310 mm	300 mm	-	-	486	16,1	486	21,5
	250x250	400 mm	400 mm	-	-	651	9,0	651	12,0
	320x320	435 mm	450 mm	-	-	729	7,2	729	9,6
	500x500	700 mm	715 mm	-	-	1160	2,8	1160	3,8
MARKING HEAD	XQS Internal			Std.					
	XQS Split			-		Opt. (SE, DE)		-	
	HPD Split			-		Opt. (SE, DE)		-	
	XQS Split WD (IP65)			Opt. (WD)		Opt.		Opt.	
	HPD Split WD (IP65)					Opt.		Opt.	
ACCESSORIES MARKING HEAD	Beam Exit at 0°			Opt.					
	Beam Exit at 90°			Std.					
	Split Elbow			-		Opt.		Opt.	
	Focal Distance Indicator			Opt.					
	Marking Area Indicator			Opt.					
CONTROL	Touch Screen TSL-V3			Opt. (SE, DE)				-	
	Touch Screen TSL-V3 IP65			Opt. (WD)				Opt.	
	PC with Marca Software			Opt.					
SOFTWARE	ScanLinux			Opt.					
	MarcaTouch OS 2.00			Std.					
	Marca Full Graphics PC Softw.			Std.					
	TCPIP Protocol			Opt.					
	Profinet Protocol			Opt.					
	OPC-UA Protocol			Opt.					
	Internal Barcode Generator			Opt.					
SAFETY	ElectroMechanical Shutter			Opt.					
	Performance Level d Safety Kit			Opt.					
ACCESSORIES				Diode Marking Pointer - Encoder Kit - Mounting Support - Photocell Kit					
ENVIRONMENTAL CONDITIONS	Operating Temperature			5 °C (50 °F) to 40 °C (104 °F)					
	Humidity			< 95 %, non-condensing					
	Vibrations			No vibrations					
	Protection Rate (3 types available)			SE (Standard Environment)				-	
				DE (Dusty Environment)				-	
				WD (Washdown Environment)					
DIMENSIONS (AxBxC)	SE&DE (Standard & Dusty Environment)			146 x 196 x 732 mm		176 x 216 x 750 mm		-	
	WD (Wash-Down Environment)			168 x 220 x 710 mm		189 x 241 x 740 mm			
WEIGHT	Net Weight			17 kg		25 kg			
	Gross Weight			20 kg		28 kg			

Macsa ID Headquarters
Tel: +34 938 738 798
Spain

Macsa ID UK
Tel: +44 (0)1462 816091

Macsa ID Portugal
Tel: +351 229962204

Macsa ID Malaysia
Tel: +60 355251608

Macsa Coding Technology (China) Co, Ltd
Tel: +86 0755-23611591

www.macsa.com

macsa@macsa.com

Macsa id
a code you can trust

SPA2 C

C-10W | C-30W | C-40W

Reliable laser coding in standard, dusty and washdown environments

One platform, multiple substrates

CO2 lasers used in higher speed packaged goods applications including boxes, bottles and blister packs. They provide legible markings of the highest quality, which are permanent and sustainable in all production environments. Available in di erent enclosures in order to mark a wide variety of substrates such as cardboard, glass,ceramics, PET and PVC in the FMCG markets.

PRODUCT BROCHURE

SPA2 is much more than a laser system

The SPA2 range of laser coders is the next generation of Macsa's successful SPA, Smart Packaging Application, laser platform.
The SPA2 range adds more power options including pulsed CO2 lasers.

SPA2
SMART PACKAGING APPLICATIONS

SPA2 C ideal for packaged goods

SMART | RELIABLE | VERSATILE

SPA2 C 10W, 30W and 40W CO2 lasers are widely used in packaged goods applications including labels, boxes, bottles and blister packs. They are typically used to code paper and board, glass and ceramics, coated materials, PET and PVC.

- 10.6, 10.2 and 9.3 wavelength lasers are available to meet the coding needs of specific substrates such as film and PET.
- DUO dual processor technology enables high-speed and high-quality printing with variable data.
- Minimises power consumption choosing the most appropriate flow rate.
- 10.1-inch touch screen controller with context sensitive HELP and on-line instruction videos including Marca Touch OS.
- Extra protection enclosures are available for dusty (IP54) and washdown (IP65) environments.

SE Standard Environment IP31
C-10W / C-30W

DE Dusty Environment IP54
C-10W / C-30W

WD Washdown IP65
C-10W / C-30W / C-40W

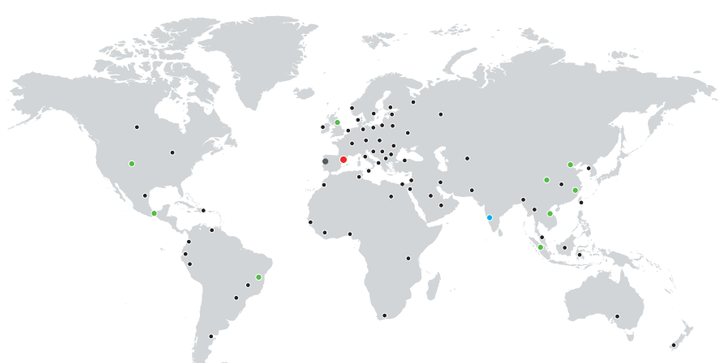
Why Macsa id?

Macsa id is one of the 4 leading companies in the world in coding and marking lasers. It offers the widest range of lasers to code and mark both in the productive sectors (food, beverages, pharmaceutical, healthcare, cosmetics ...) as well as in the industrial ones (industry, automotive, aeronautics, defense, construction materials ...).

Macsa id is recognized as a world leader in technological innovation in lasers for marking and coding. The company invests more than 10% of its turnover in R&D every year.

Macsa id
in more than
80 countries

- MACSA Headquaters
- MACSA Branch Offices
- MACSA Distributors
- MACSA JV



The most complete range of CO2, Fiber and DPSS lasers on the market

CO2
Available from 10 to 450W

Fiber
From 20W to 200W

Fiber Film
From 20W to 100W

DPSS
From 6 to 20W
(also Green & UV available)

PRECISION
Several features including Macsa's propietary VCS to ensure high print quality even on high-speed production lines.

VCS® Vibration Compensation System

VERSATILITY
Integrated into any production line, it can encode over a wide range of materials using 3D printing options.

3D printing

RELIABILITY
Production environments can test the reliability of laser systems. SPA2 lasers are designed to operate reliably in dusty or damp environments even when subject to extreme temperatures.

RAF® Reverse Air Flow

ADAPTABILITY
Wide range of essential and extra accessories to optimise the laser's performance.

Macsa Accesories

SIMPLICITY
Videos and support material to facilitate its installation and integration.

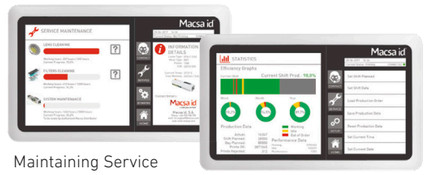
MARCA software®

CONNECTIVITY
The lasers include the TCP/IP protocol in order to have complete control of the system from most standard communications.
The new SPA2 platform includes the integration of the most widely used industrial communication protocols such as Profinet and OPC-UA. These are both available in all models upon request.

PROFINET® OPC UA

SOFTWARE AND SERVICES

integranet 4.0



Maintaining Service

Equipment performance

MONITORING AND PREDICTIVE MAINTENANCE
From any place and at any time, data is provided in real time to increase productivity, improve e ciency and reduce downtime. It allows monitoring of the status of the equipment from any remote device which can allow the reception of alerts. IntegraNET allows our service engineers to receive Diagnostics in real time to detect problems before they occur and prevent expensive downtimes.

REMOTE ASSISTENCE
IntegraNET allows field technicians and Macsa id engineers to interconnect and exchange information through video calls.

INCREASED EFFICIENCY
The collected data is integrated with the different software of Macsa id modules for production management, traceability and effciency of the production lines.

ecoding
Driven by Nature

NO CONSUMABLES
A clean technology that does not produce waste.

ENVIRONMENT FRIENDLY
No harmful emissions are generated, thus benefitting the work environment and the planet.

CLEAN
For a cleaner and healthier workspace.

ENERGY EFFICIENT
Maximum quality and coding speed with just the right amount of energy.