

**Colenta**<sup>®</sup>  
Labortechnik Austria

**LSH**  
Laser Systems Hannover

ctp-platesetter  
**revolution 4** BASIC  
COMFORT  
PREMIUM



**revolution**  
BASIC

**EASY** *go*

Revolutionary ease of operation.

All functions for the handling and precise positioning of each plate for exposure, are controlled by computerised electronics without the need for additional displays or controls.

**SPACE** *saving*

The revolution 4 BASIC requires only 0,7m<sup>2</sup> of floor space

**COST** *effective*

Ctp-system **revolution 4** BASIC is the most lowcost external drum platesetter of its class worldwide.

So you reduce costs of investment without loss of quality and speed.

## HIGH *speed*

The high speed, fully automated, flexible, high quality **LSH/COLENTA revolution** platesetters from 2-up to 8-up size are designed to produce plates within the wide range of resolutions and screen parameters required by the print industry. The **LSH/COLENTA** proven external drum technology on the exposure unit combined with **COLENTA'S** long term experience in processing equipment is the state of the art solution for all your printing needs!

## EASE OF *operation*

An integrated punching system combined with control electronics ensures that each plate is correctly positioned and fixed to the exposure drum. The system provides an automated plate production facility that does not require expensive and regular operator tuning.

**LSH/COLENTA revolution** – An innovative easy operating system

## DUST *free*

Each plate is mechanically clamped onto the exposure drum - in a similar way as on a press.

This system eliminates the need to use vacuum which is prone to dirt related failures and generates unnecessary noise from vacuum pumps and blowers. **LSH/COLENTA revolution** – Safe & Clean

## SPACE *saving*

The **LSH/COLENTA revolution 4** solutions are designed to operate within the minimum of floor space thereby ensuring that important space remains free for other activities within your business premises.

**LSH/COLENTA revolution** – An innovative compact and functional design.

## COST *effective*

The **LSH/COLENTA revolution 4** Basic has a worldwide reputation as the »best in its class« for external drum exposure systems at an affordable price at all.

Additional feature and benefits including

- A violet laser diode exposure system which offers a reliable low cost and low maintenance light source.
- All systems are fully factory supported by Laser Systems Hannover and their international dealer network

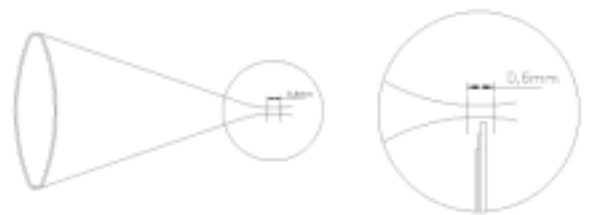
## SMART *operation*

Connection and system controls are designed for modern USB 2.0 interface using data transfer rates up to 480Mbit/s. System regulation and monitoring is under the full control of the main workstation to ensure that the system performs correctly.

**LSH/COLENTA revolution** – An innovative CtP for reliable operation

## LONG *life*

The **revolution** exposure system has been designed with the minimal amount of moving parts - for example - without the use of mirrors which running at 30.000 r.p.m (similar to the systems used on internal drum and flat bed exposure units). The exposure system of the **revolution** incorporates an external drum and a violet laser light source that provides sharp details without requiring focus adjustments.



## INTELLIGENT *exposing*

A clever system to maximize exposure speed and productivity that moves the laserhead faster over area of the plate where no exposure is required.

## CONSISTENT *quality*

When searching for a CtP system that will provide your business with reliable and consistently high quality plates ready for press, then the **LSH/COLENTA revolution** platesetters offer this and more!

**LSH/COLENTA revolution** – An innovative production safe system.

## MODULAR *design*

The **LSH/COLENTA revolution** CtP systems have been exclusively designed and manufactured for the specific requirements of the PrePress CtP market and with the total flexibility to operate within the framework of your business and the variations in your day to day production demands.

We invite you to now discover our unique modular concepts.

**LSH/COLENTA revolution** – provides total flexibility.

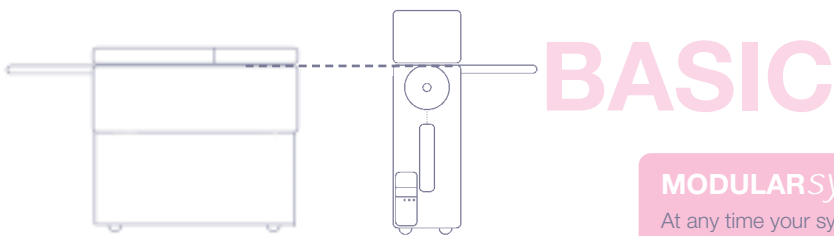


Diagram shows optional Processor - ordered separately

### MODULAR *systems*

At any time your system can be upgraded in keeping with your production requirements and budget. This allows on-site upgrading of a **BASIC** model to either **COMFORT** or **PREMIUM** versions.

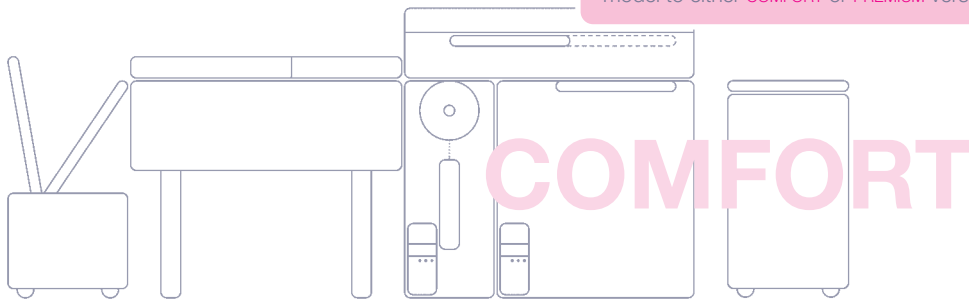


Diagram shows optional Processor & Plate Stacker options - ordered separately

### INTELLIGENT *operation*

All modules within the system i.e. Magazine feed, Autoloader or Exposure unit are interfaced directly via USB to the main computer workstation to provide a totally dependable and intelligent operating system, with the additional feature for the operator to communicate to the RIP via remote control.

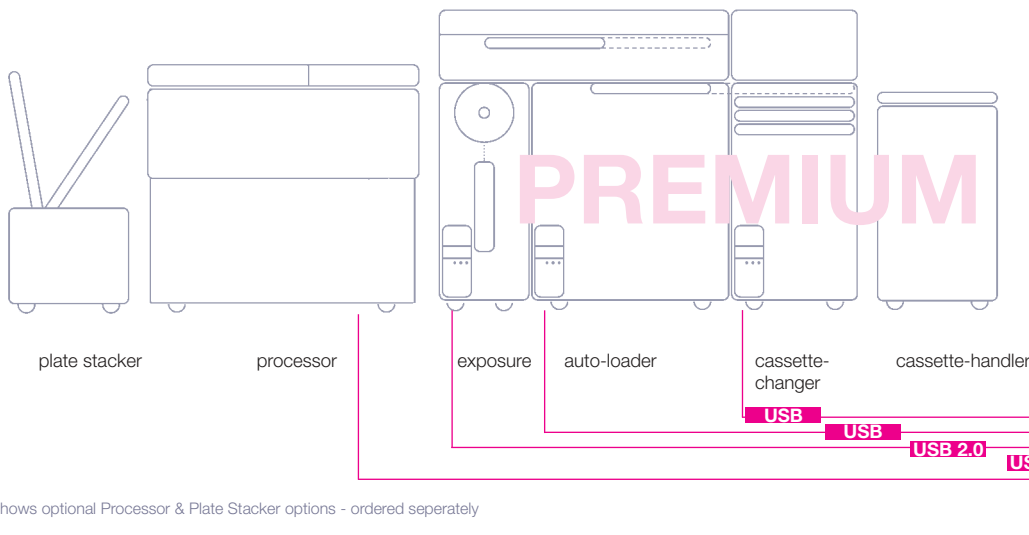
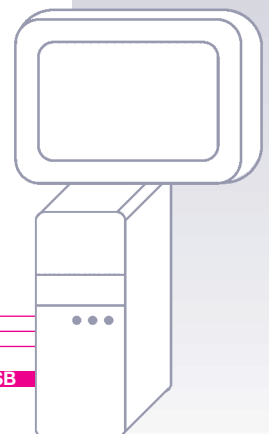


Diagram shows optional Processor & Plate Stacker options - ordered separately



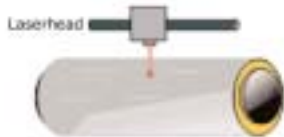
# Technical data/specifications of ctp-system **revolution 4**

general specifications	BASIC	COMFORT	PREMIUM
width	1.240 mm	1.240 mm	1.240 mm
depth	520 mm	1.350 mm	2.150 mm
height	1.120 mm	1.300 mm	1.300 mm
dimensions of cassette handler	-	850 x 770 mm	850 x 770 mm
weight	150 kg	270 kg	400 kg
exposure specifications	BASIC	COMFORT	PREMIUM
laser source	60 mW violet laserdiode, 405 nm		
exposing technology	external drum		
minimum plate size	340 x 200 mm		
maximum plate size	760 x 678 mm		
plate material	violet sensitive aluminium printing plates with photopolymer or silver layer		
technical specifications	BASIC	COMFORT	PREMIUM
plate exposure time	2540dpi	12 plates	
	2032dpi	15 plates	
	1800dpi	18 plates	
point-to-point precision		5 µm	
resolution		2.540 dpi, opt. others	
RIP connection	1-bit-tiff from any data source (all RIPs, CTP Workflows)		
online-processing	optional	yes	yes
punch	plate is always aligned according to punch, plate punch can be specified by customer		
plate handling	manual	automatic	automatic
plates per cassette	0 plates	50 plates	200 plates
number of cassette	0	1	4
slipsheet removal	no	yes	yes
working temperature		18 .. 25 °C	
humidity		20 .. 80 %	
remarks	the <b>BASIC</b> systems are upgradeable to <b>COMFORT</b> or <b>PREMIUM</b>		

All technical data and specifications are correct at the time of publishing. It remains the right of LSH Laser Systems Hannover GmbH to change the specifications at any time in line with our policy of continuous product development. All rights reserved. 04/2007

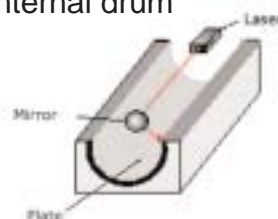
## Benefits: LSH External Drum Technology over Internal Drum systems

### external drum



- A short distance between light source and the plate surface ensures precise and sharp exposure quality without focus adjustment when handling 0.15 - 0.2 and 0.3mm plates
- No moving parts in the laser head - Low Maintenance Requirements - Long Working Life!
- On the models COMFORT and Premium, an integrated punch ( set to specific customer requirements) provides very precise and reliable plate handling when Punching, Positioning and Clamping each plate onto the exposure drum
- in the same way as the plate is later mounted onto the press cylinder.
- No vacuum pumps are in operation which ensures trouble free operation
- ease of automation in synergy with the printing press automatic plate handling

### internal drum



- long path laser distances - introduces potential mechanical vibration interference during exposure
- high speed rotating mirrors generate unwanted vibrations and require regular cleaning
- vacuum pumps generate unnecessary noise within the working environment
- Heavy and bulky design requiring special installation needs
- Very limited automation potential
- Airborne dust and dirt entering the vacuum system can be deposited on a plate during exposure