

# Adelco Product Ranges Orying Solutions

**Innovative Drying Systems** 

We offer a range of versatile textile drying systems, for both conventional and digital ink systems, with different throughput capabilities to suit your business needs.

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15-18: Adelco Drawer Drying Cabinets



### **Screen Printing Systems**

#### **Traditional Ink Machines**

A choice of oval and carousel printing systems with unique features to increase throughput efficiency, accuracy and maximise print quality.

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### **Digital Printers**

#### **Advanced Digital Textile Printers**

Discover the digital printing machine for textiles and fabrics with high production capabilities

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31-32: Adelco AD Hybrid Digital

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### **CTS Solutions**

#### Screen exposure units and CTS Systems

Introducing the Adelco CTS system, high precision, high efficiency and with low running cost.

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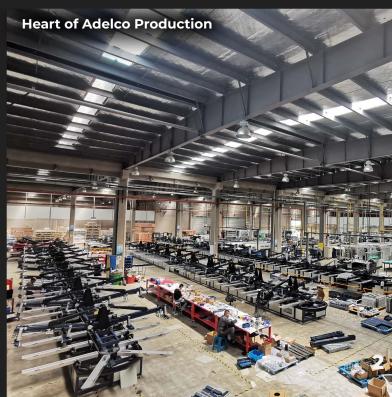
Exposure, Drying & Screen

Washing solutions



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# odelco smart PRO-CURE

An advanced textile conveyor dryer that cures both screen & digitally printed garments with four belt width options to meet your production output requirements.

#### Standard Features

- Integral infeed and outfeed exhausts
- Four belt widths available
- Ovens are fully modular enabling dryer length to be chosen to suit all curing requirements (expansions available)
- Automatic belt speed control
  Just enter the time in minutes
  and seconds to precisely adjust
  the speed of your belt
- Triple insulation with air curtain for the coolest exterior shell available
- Air intake from both sides of oven giving unrivaled heat distribution
- Split belt model available on PCS150 & PCS180

Air curtain cooling maintains a cool outer shell

Integral exhaust adjustment

Integral feed and outfeed exhausts remove chemicals and contaminated air from the workplace



Auto tension, self-tracking rollers

> Highly efficient, direct burner system

#### **New Features** Ground rubber crowned conveyor rollers, ensures reliable belt tracking, prevent slipping & prolongs conveyor life Easy access, removable jet & vacuum plenums enables deep & rapid internal cleaning Ergonomically position & fully adjustable HMI control interface Rapid dual air filter cleaning Rapid infeed and outfeed extraction filter cleaning Integrated infeed/outfeed and main blower exhaust with residue trap Updated UV flame detection system with easy access Built in infeed and outfeed fume extraction system On screen temperature mapping Curing time and temperature history record Gas pressure display Fault finding and service instruction videos Pit stop internal cleaning Quick removable external panels Easy clean exhaust drip tray The strongest jet airflow on the market with an integrated vacuum utilizes new Recycles clean technology in curing and ink penetration filtered air Optional VOC (Volatile Organic Compounds) exhaust filtration system Optional cooling modules and bridges PRO-CURE Small quick release lint filters for simple/fast maintenance, even whilst the dryer is running, no replacement filters required. Rapid dual air filter cleaning Sophisticated adjustable touch screen Easy clean exhaust drip tray The world's easiest maintainable curing system allows for quick and optimized servicing



### Throughput Analysis & Supply Requirements

#### Production Capacities (Based on 3 meter oven length)

Model	PCS100	PCS120	PCS150	PCS180
1 minute (Plastisol Ink)	360/hour	720/hour	720/hour	1080/hour
2 mins (Waterbased/Discharge Ink)	180/hour	360/hour	360/hour	540/hour
3 mins (Kornit Digital no white ink/light coloured fabrics)	120/hour	240/hour	240/hour	360/hour
7 mins (Kornit Digital with white ink/dark coloured fabrics)	52/hour	104/hour	104/hour	156/hour

Based on a 3 M oven length. Production increases 30% for a 4 M oven, 60% for a 5 M oven and 100% for a 6 M oven and decreases by 30% for a 2 M oven. Allowing for one line of garments to be placed every 50cm. One line of products on 75cm and 100cm belts, two lines on 120cm and 150cm and three lines on 180cm. Production rates will alter depending on the product placement and the time/temperature settings chosen for the individual curing requirements. Wash tests should be undertaken to ensure the correct time and temperature combination for specific ink types.

#### **Gas Dryer Specifications**

Description	PCS100G-3	PCS120G-3	PCS150G-3	PCS180G-3
Electrical Supply Voltages confirmed at time of ordering. Other voltages available on request	3Phase, 50/60HZ	3Phase, 50/60HZ	3Phase, 50/60HZ	3Phase, 50/60HZ
	200/220V & 380/415V	200/220V & 380/415V	200/220V & 380/415V	200/220V & 380/415V
Natural Gas Pressure	10" W. G/	10" W. G/	10" W. G/	10" W. G/
	25mbar	25mbar	25mbar	25mbar
Natural Gas Connection	3/4" BSP	3/4" BSP 3/4" BSP		3/4" BSP
Propane Gas Pressure	Line Pressure	Line Pressure	Line Pressure	Line Pressure
	Reduced to 37mb	Reduced to 37mb	Reduced to 37mb	Reduced to 37mb
Propane Gas Connection	1/4" BSP	1/4" BSP	1/4" BSP	1/4" BSP
BTU REQUIRED	150,000	175,000	200,000	225,000
Time From ambient temp to 160°C	Approximately	Approximately	Approximately	Approximately
	8 mins	10 mins	12 mins	15 mins
Maximum Electrical Consumption	4.5Kw	4.5Kw	4.5Kw	4.5Kw
Exhaust Dia	300mm	300mm	300mm	300mm
	(12 Inch)	(12 Inch)	(12 Inch)	(12 Inch)

#### **Electric Dryer Specifications**

Description	PCS100E-2	PCS100E-3	PCS120E-3	PCS150E-3	PCS180E-3
Electrical Supply  Voltages confirmed at time of ordering.  Other voltages available on request	3Phase, 50/60HZ				
	200/220V &				
	380/415V	380/415V	380/415V	380/415V	380/415V
Maximum Electrical Consumption	32Kw/h	40Kw/h 40Kw/h		59Kw/h	59Kw/h
Average Electrical Consumption at 180°C	20Kw/h	28Kw/h	30Kw/h	40Kw/h	40Kw/h
No & KW of Elements	9x3Kw	12x3Kw	12x3Kw	18x3Kw	18x3Kw
	(27Kw)	(36Kw)	(36Kw)	(54Kw)	(54Kw)
Exhaust Dia	300mm	300mm	300mm	300mm	300mm
	(12 Inch)				



The Adelco Pro-cure Industrial dryer is a highly efficient and economical dryer suitable for virtually all types of screen-printing and digital inks including water based, solvent based and enamel inks and in other screen- printing and industrial applications, including mug and ceramic curing.



The new Adelco Pro-Cure Smart conveyor dryer range is available in four belt widths and five oven lengths, so you can customize your dryer to suit your individual curing requirements, for all digital and conventional textile ink systems. The Pro-Cure Smart is modular in design, making it the perfect option to add additional ovens to the dryer as your business grows.

Designed and specified for advanced textile curing, the Pro-Cure Smart tunnel dryer has an efficient airflow and exhaust system, incorporating oven feed and exit extraction hoods to provide a cleaner working environment. As well as incorporating many of the popular features found in the Adelco Dual Dryer and our other drying systems.

The Adelco Pro-Cure Smart is a feature rich conveyor dryer that uses dual lint filters to prevent the build-up of lint in the dryer and helps to reduce cleaning and maintenance dramatically. Filters can be easily cleaned in seconds while the dryer is still running. With many features included as standard, there are also some optional extras available to enhance your Pro-Cure Smart dryer further.

The Pro-Cure Smart is available as a gas or electric conveyor dryer and uses a sophisticated touch-screen control panel so you can easily set, manage and control the automatic belt speed that is precise and repeatable every time.

The Pro-Cure Smart conveyor dryer offers a split-belt model (only available on PCS150 & PCS180) with two burners, two speeds and two directions, enabling the dryer to cure two independent ink systems at the same time. The Adelco Pro-Cure Smart dryer comes with the strongest, toughest and longest lasting conveyor belts on the market.

#### PRO-CURE Smart gas dryer consumption analysis

Belt Width	Oven Length	Average Gas Consumption kg/hr	Average Gas Consumption kwh	Average Electric Consumption kwh
	3 Meter	2.8	24.5	3.3
	4 Meter	3.3	29	3.5
180cm	5 Meter	3.5	31	3.7
	6 Meter	5.5	48.5	6.5
	3 Meter	2.6	23	3.2
150cm	4 Meter	3	26.5	3.4
130CIII	5 Meter	3.2	28	3.6
	6 Meter	5	44	5.8
	3 Meter	2.4	21	2.8
12000	4 Meter	2.7	24	3
120cm	5 Meter	2.9	25.5	3.2
	6 Meter	4.6	40.5	5.0
	2 Meter	2	18	2
	3 Meter	2.2	19.5	2.2
100cm	4 Meter	2.4	21	2.3
	5 Meter	2.5	22	2.4
	6 Meter	4.2	37	4.0

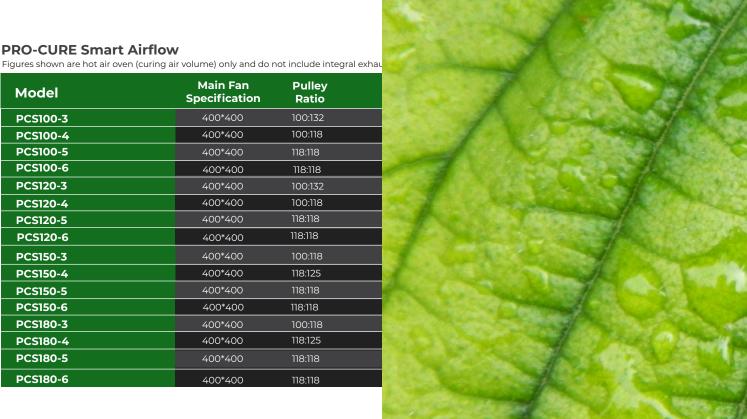
Adelco figures taken from consumption tests, averaged per hour at 160 degrees, with exhaust closed. Consumption figures can change according to local environment, production throughput, ink and product types. Adelco reserve the right to

#### **PRO-CURE Smart Airflow**

PCS180-6

Model	Specification	Ratio
PCS100-3	400*400	100:132
PCS100-4	400*400	100:118
PCS100-5	400*400	118:118
PCS100-6	400*400	118:118
PCS120-3	400*400	100:132
PCS120-4	400*400	100:118
PCS120-5	400*400	118:118
PCS120-6	400*400	118:118
PCS150-3	400*400	100:118
PCS150-4	400*400	118:125
PCS150-5	400*400	118:118
PCS150-6	400*400	118:118
PCS180-3	400*400	100:118
PCS180-4	400*400	118:125
PCS180-5	400*400	118:118

400\*400



## adelco DUAL smart

The world's highest production and most energy efficient dual conveyor dryer for curing screen & digital ink systems.



Two Dryers, One Footprint. The Adelco Dual Smart has a unique built in extraction system on the infeed and outfeed for a cleaner working environment together with independent exhaust extraction from each conveyor to maximize the curing efficiency for heavily water laden prints in both digital and conventional printing requirements.



- The Dual Smart dryer from Adelco takes high production curing to a new level, with independent burners and temperature control for each conveyor
- The Dual Smart is now modular & can be extended with a dual deck drone to 4 metres
- Ergonomically positioned & fully adjustable HMI control interface
- On screen gas pressure display
- New Non Slip Conveyor belts
- Self-tensioning, self-aligning conveyor belts
- Ground rubber crowned conveyor rollers ensure reliable belt tracking, prevents slipping & prolongs conveyor life
- Easy access, removable jet & vacuum plenums enables deep & rapid internal cleaning

- Easy access infeed and outfeed extraction filter cleaning
- Exhaust residue trap
- Independent burners and airflow for each belt
- Updated quick access UV flame detection system
- Built in infeed/outfeed fume extraction system
- Curing time and temperature history report
- On screen temperature mapping (via optional temp
- mapping device)
- On screen fault finding and service instruction videos
- Pit stop internal cleaning
- Easy to remove, tool free external panels



### Throughput Analysis And Supply Requirements

Description	DS-180G-3	DS-180G-4	DS-180E-3 & 4		
Gas Pressure Input Natural	10"W.G/25mbar/each supply	10"W.G/25mbar/each supply	/		
Gas Pressure Input Propane	Line Pressure (reduced to 37mbar)/each	Line Pressure (reduced to 37mbar)/each	/		
Gas Connection Natural	3/4"BSP/each	3/4"BSP/each	/		
Gas Connection Propane	1/4"BSP/each	1/4"BSP/each	/		
Electrical Supply	3 Phase 220V/380V/415V	3 Phase 220V/380V/415V	3 Phase 220V/380V/415V		
Max Electrical Consumption	7KW	7KW	79 KW		
Time from ambient temp to 160°C (320°F)	Approximately 15 minutes	Approximately 20 minutes	/		
Exhaust Diameter	(12"BSP)300m	(12"BSP)300m	(12"BSP)300m		
Maximum BTU Required	250,000 btu / 7 meters cubed per hour (the heat capacity of our burners exceed the maximum supply used to ensure the most efficient and effective utilisation of heat)	250,000 btu / 7 meters cubed per hour (the heat capacity of our burners exceed the maximum supply used to ensure the most efficient and effective utilisation of heat)	Average <b>Electrical</b> Consumption at 180°C: DS180E-3 - 60 KW/H DS180E-4 - 68 KW/H		
Average BTU Consumption	117,000 btu / 3.3 meters cubed per hour (calculated with a full belt of printed shirts, in production)	156,000 btu / 4.4 meters cubed per hour (calculated with a full belt of printed shirts, in production)	No & KW of electric elements: 24 off 3 KW		

Time	Digital Print (Black Shirts)	Screen Print
1 Minute	1	2160 per hour
2 Minutes	1	1080 per hour
5 Minutes	430 per hour	
6 Minutes	360 per hour	
8 Minutes	270 per hour	
10 Minutes	216 per hour	

Based on three lines of adult size garments across each belt width. Allowing for one product placed every 50cm. Production rates will alter depending on product placement and time/temperature settings chosen for individual curing requirements.

#### **Dual Smart Airflow**

	Pulley Ratio Main Fan Upper Level Lower Level RPM						
Model	Specification	50HZ 60HZ	50HZ 60HZ	Upper	Lower	Air Speed	Max Airflow
DS180-3	400*400 x 2	100:118 100:132	100:100 100:118	1180	1400	26 m/s	6,000 CFM
DS180-4	400*400 x 2	100:118 100:132	100:100 100:118	1180	1400	26 m/s	6,000 CFM

Figures shown are hot air oven (curing air volume) only and do not include integral exhaust hoods.

The Adelco Dual Smart dryer gets its name from its unique design. The Dual Smart dryer is a double belt conveyor dryer with separate heat chambers, airflow and exhaust systems for the top and bottom conveyor belts.

Experience the benefits of two dryers in one footprint with the Adelco Dual Smart dryer range. With dual tunnels, the Dual dryer increases the high throughput capabilities in both digital and conventional textile print requirements, without increasing the size of the dryer.

With independent burners, time and temperature controls for each conveyor level, the Dual Smart cures digital and screen-printing inks in high volumes with such a small footprint.

All Adelco drying machines, including the Dual Smart, and the range of Pro-Cure Smart dryers, are fitted with internal exhaust hoods over the feed and exit sections of the oven. This provides a cleaner working environment without having to add optional extraction hoods and exhaust connections.



"Mark and Leigh Smith have been in the industry a long time and are the only owner-owned manufacturer/distributors in the industry. They'll look at what you need and will then create a solution for you, rather than trying to find a product to fit you. That makes a huge difference. We've got six Ecotexes now and three Duals. The Dual is amazing, you can get a huge volume of digital through a very small area. And Steve, who's their main engineer, he's just brilliant, he really knows these machines."

- Andy, T Shirt & Sons. UK

# adelco DIGI-CURE +



### Economical.





## **Supply Requirements**

Model No	DC+80E-3
Electrical Supply	22KW, 3 Phase 220-240V or 380V-415V, 50/60hz
Belt Speed	50 secs > 10 mins
Time from ambient temp to 160°C (320°F)	Approx 30 mins
Exhaust Diameter	200mm (8")
Belt Width	80cm (32")
Infeed/Outfeed	88.5cm (35")
Oven Length	260cm (102")
Oven Dimensions (max)	115cm (45") W x 127cm (50") H x 435cm (171") L

Time	Digital Print (Dark Shirts)	Digital Print (Light Shirts)	Screen Print
1 Minute	/	/	300 per hour
2 Minutes	/	150 per hour	150 per hour
3 Minutes	/	100 per hour	100 per hour
4 Minutes	75 per hour	75 per hour	/
5 Minutes	60 per hour	/	/
6 Minutes	50 per hour	/	/
7 Minutes	45 per hour	/	/
8 Minutes	40 per hour	/	/

Based on a single line of adult size garments, allowing for one product placed every 50cm. Production rates will alter depending on product placement and time/temperature settings chosen for individual curing requirements.







"Adelco keeps up with technology and the temperature keeps constant. Service with Adelco is brilliant, Steve looks after us and is always on hand to help out either on the phone or getting stuck in the machines."

- Pally Hayre, Pally UK

### odelco DRAWER DRYING CABINETS

A compact, space-saving and economical solution for the curing of digital and screen printed textile inks.

ADDIDOS

#### **Automatic Drawer Dryers**

Each cabinet incorporates motor driven drawers, operated & controlled by its own cycle timer. Drawers automatically eject for unloading & reloading after the cycle time has counted down. Each drawer is independently controlled via a membrane touch control panel and automatically opens and closes from pre-programmed timers. A digital display

counts down the preset times of each independent drawer and shows the time remaining.

DDC-3A

1

ADELCO



Easy access cleaning - no replacement filters required



Easy access cleaning - no replacement filters required



Independent drawer controls

DDC-6A



Variable Exhaust

#### **Manual Drawer Dryers**

Manually operated draws each with independent timers that give an audible & visual alarm when preset draw times are complete. These units offer a great entry level, low cost solution.

DDC-3M



DDC-6M

ADEDGE

#### **Standard Features of All Cabinets**

- Digital Temperature Control
- Independent Drawer Timers
- Direct Heated High Velocity Air-Flow
- Permanent Lint Filter (No Replacement Filters Required)
- Variable Exhaust Control
- Hot Air Recirculation
- Easy Load Drawers

Using digitally temperature controlled high velocity air-flow for optimum curing, the DDC balanced air-flow system provides high velocity hot air, directed onto the textile ensuring no loss of heat to the surrounding working area. An efficient and balanced exhaust system ensures removal of all ink and pre-treatment residues in the curing of all digital and screen textile inks.

#### **Three Drawers**

The Adelco 3-Drawer drying cabinet offers a compact textile drying solution where DTG printers can be mounted on top of the machine to save even more floor space. Thanks to the drying cabinet's triple insulated exterior and ability to recycle heat for a cool outer skin, there's no residual heat to affect the mounted digital printer, offering the most compact printing and drying solution on the market.

#### **Six Drawers**

For increased production requirements, the Adelco Drawer Drying Cabinet also comes available in a six-drawer option. It's ergonomically designed for ease of loading the drawers and each drawer has its own independent digital drawer timer for precise drying times. It has a unique built-in lint filter than can be easily raised above the dryer by a single person, ensuring no further space is required around the dryer and no need for replacement filters.



## Throughput Analysis & Supply Requirements

DDC-3 & DDC-6 Specifications								
Description DDC-3A DDC-3M DDC-6A DDC-6A								
Drawer operation	Auto	Manual	Auto	Manual				
Electrical Requirements	3Phase, 50/60HZ, 200/220V & 380/415V, 13KW Single Phase option available with optional Inverter	3Phase, 50/60HZ, 200/220V & 380/415V, 13KW Single Phase option available with optional Inverter	3Phase, 50/60HZ, 200/220V & 380/415V, 19KW	3Phase, 50/60HZ, 200/220V & 380/415V, 19KW				
Dimensions	151cm(L) x143cm(W) x79cm(H)	158cm(L) x110cm(W) x81cm(H)	153cm(L) x120cm(W) x134cm(H)	158cm(L) x112cm(W) x133cm(H)				

Description	DDC-3A		DDC	C-3M	DDC	C-6A	DDC	C-6A
Kornit Digital Inks Based on 160 degrees celcius, 3 mins for light shirts and 6.05 mins for dark shirts. Note - Increased pre-treatment levels will require longer curing times	60 Light	27 Dark	60 Light	27 Dark	120 Light	54 Dark	120 Light	54 Dark
Epson/Brother/Anajet/Polyprint /Dupont Inks at 2 mins	90 Light	90 Dark	90 Light	90 Dark	180 Light	180 Dark	180 Light	180 Dark

**DDC-3 & DDC-6 Production (Per Hour)** 

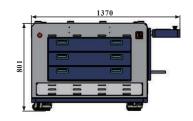
Manual drawer versions are available for a more cost conscious solution, however the automatic drawer models are most popular as they enable the operator to concentrate on the print workflow whilst the curing cycle takes care of itself, automatically.

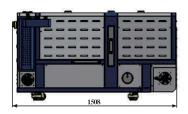


#### **DDC-3 Dimensions**









#### **DDC-6 Dimensions**









"Adelco dryers have improved the quality of our prints, due to the dryers versatility. The service

and technical support that I have receive Adelco over the years have been excellent helpful and available on the phone or on occasion the dryer has needed a servi dryer is pretty faultless, other than generand tear. I would recommend Adele definitely would buy from them in the fut

- Liam Stewart, Vortex Clothing Company

# odelco CYCLONE

The automatic carousel screen printing press that offers incredible value for money, with pinpoint precision. Available in three standard print sizes.

AC servo motors drive the print head for high torque fast smooth print strokes even at the slowest speed.

Pin Point registration of <+ 0.02mm, designed for the most challenging screen and digital printing.

Optional built in LED lights integrated into the print heads provide unmatched visibility of screens during set up and production.



Three-way front and rear micro screen adjustment for easy set up.

Standard high-grade lightweight aluminium pallets with unique tool free quick release system and CNC print arms with unmatched pallet level tolerances.



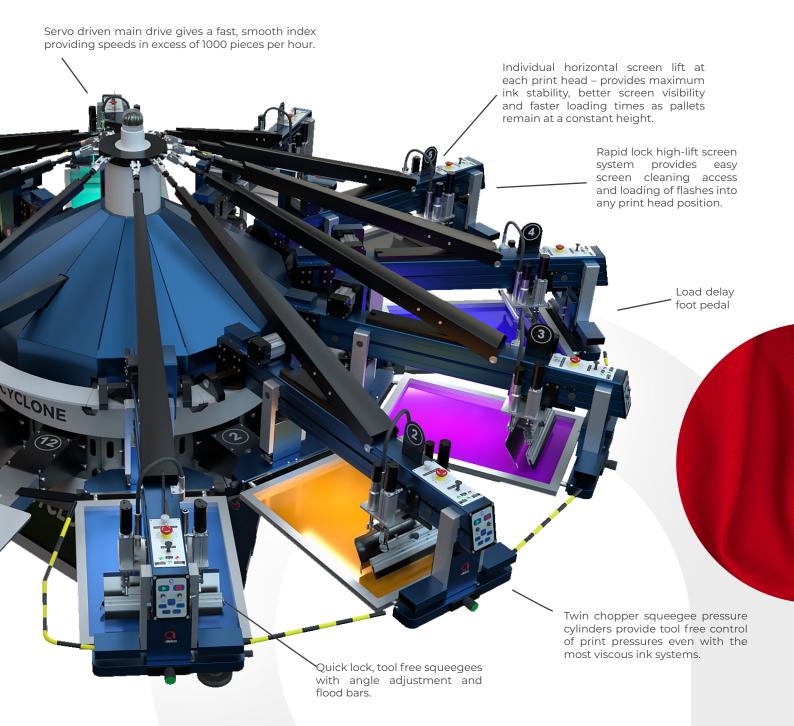
PLC controlled with HD touchscreen incorporating advanced features, simple set up and full machine self-diagnosis.

Auto start, stop, sample and rotovate flash programmes.

Strong and light custom extruded aluminium print heads and pallet arms gives the perfect strength to weight ratio.

The Adelco Cyclone is an automatic carousel textile screen printing press that offers high-speed printing. The Cyclone is based upon robust, heavy-duty foundations with bespoke lightweight aluminium extrusions and precision CNC parts are fitted with meticulous attention to detail. With its advanced control system, the Cyclone runs pinpoint accuracy at extreme speeds while still offering incredible value for money.

Using the latest advanced technology in textile screen printing, the Cyclone is designed for the most challenging screen printing, with pinpoint registration of <+-0.2mm. Optional built in LED lights integrate into the print heads to provide unmatched visibility of the screens during set-up and production. The Cyclone uses a rapid lock auto high-lift screen system that provides easy screen cleaning access and loading of flashes into any print head position.



The Adelco Cyclone is available in three sizes - small, medium and large. Each comes with different options for the number of colours and print stations so that you can select the best model for your production requirements.

With its servo driven main drive, the Cyclone screen press gives a fast, smooth index that provides print speeds in excess of 1,000 pieces per hour. Even when operating at the lowest speeds, print quality is uncompromised thanks to its AC servo-motors that drive the print head for smooth print strokes. It also comes with strong and light custom extruded aluminium print heads and pallet arms, providing the perfect strength to weight ratio.



### **Specifications**

#### **Carousel - S Models**

Model	No of Colours	No of Stations	Max Print Area	Max Screen Size	Diameter	Diameter Standard Pallet Size		Air Supply 8bar (115psi)	Electrical Supply	
CYA-6/8-4550	6	8	45x50cm (18"x20")	58.5x78.8cm (23"x31")	343cm (135")	47x72cmm (18.5"x28")	47cm	23.6m³/h (13.9cfm)	1P220V/6.8KW	
CYA-8/10-4550	8	10	45x50cm (18"x20")	58.5x78.8cm (23"x31")	389cm (153")	47x72cmm (18.5"x28")	47cm	31m³/h (18.3cfm)	1P220V/8.3KW	
CYA-10/12-4550	10	12	45x50cm (18"x20")	58.5x78.8cm (23"x31")	430cm (169")	47x72cmm (18.5"x28")	47cm	38.6m³/h (22.72cfm)	1P220V/9.8KW	
CYA-12/14-4550	12	14	45x50cm (18"x20")	58.5x78.8cm (23"x31")	472cm (186")	47x72cmm (18.5"x28")	47cm	46m³/h (27.1cfm)	1P220V/11.3KW	
CYA-14/16-4550	14	16	45x50cm (18"x20")	58.5x78.8cm (23"x31")	513cm (202")	47x72cmm (18.5"x28")	47cm	53.5m³/h (31.5cfm)	1P220V/12.8KW	

#### **Carousel - M Models**

Model	No of Colours	No of Stations	Max Print Area	Max Screen Size	Diameter	Standard Pallet Size	Standard Sq/FI Size	Air Supply 8bar (115psi)	Electrical Supply
CYA-8/10-5070	8	10	50x70cm (20"x28")	63.5x99.2cm (25"x39")	446cm (175")	52x92cmm (20"x36")	52cm	31m <sup>3</sup> /h (18.3cfm)	1P220V/8.3KW
CYA-10/12-5070	10	12	50x70cm (20"x28")	63.5x99.2cm (25"x39")	490cm (193")	52x92cmm (20"x36")	52cm	38.6m³/h (22.72cfm)	1P220V/9.8KW
CYA-12/14-5070	12	14	50x70cm (20"x28")	63.5x99.2cm (25"x39")	535cm (210")	52x92cmm (20"x36")	52cm	46m³/h (27.1cfm)	1P220V/11.3KW
CYA-14/16-5070	14	16	50x70cm (20"x28")	63.5x99.2cm (25"x39")	579cm (228")	52x92cmm (20"x36")	52cm	53.5m <sup>3</sup> /h (31.5cfm)	1P220V/12.8KW

#### Carousel - L Models

Model	No of Colours	No of Stations	Max Print Area	Max Screen Size	Screen Size Diameter		Standard Sq/FI Size	Air Supply 8bar (115psi)	Electrical Supply	
CYA-8/10-6080	8	10	60x80cm (23.5"x31.5")	74x109cm (29"x43")	498cm (196")	62x102cmm (24"x40")	62cm	31m³/h (18.3cfm)	1P220V/8.3KW	
CYA-10/12-6080	10	12	60x80cm (23.5"x31.5")	74x109cm (29"x43")	550cm (217")	62x102cmm (24"x40")	62cm	38.6m <sup>3</sup> /h(22.72cfm)	1P220V/9.8KW	
CYA-12/14-6080	12	14	60x80cm (23.5"x31.5")	74x109cm (29"x43")	601cm (237")	62x102cmm (24"x40")	62cm	46m³/h (27.1cfm)	1P220V/11.3KW	
CYA-14/16-6080	14	16	60x80cm (23.5"x31.5")	74x109cm (29"x43")	652cm (257")	62x102cmm (24"x40")	62cm	53.5m³/h (31.5cfm)	1P220V/12.8KW	





Easily position Flash Cures into any print head

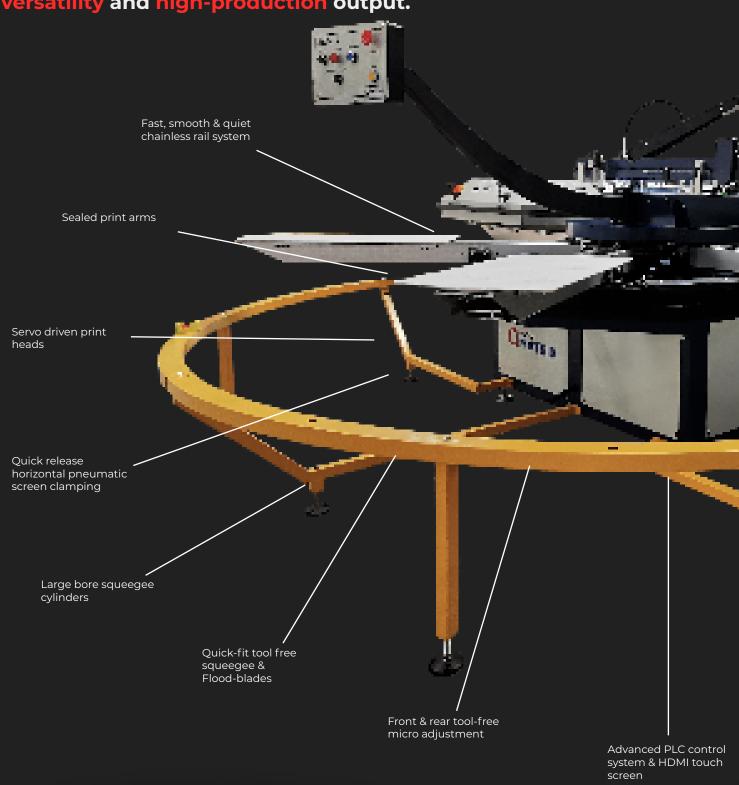


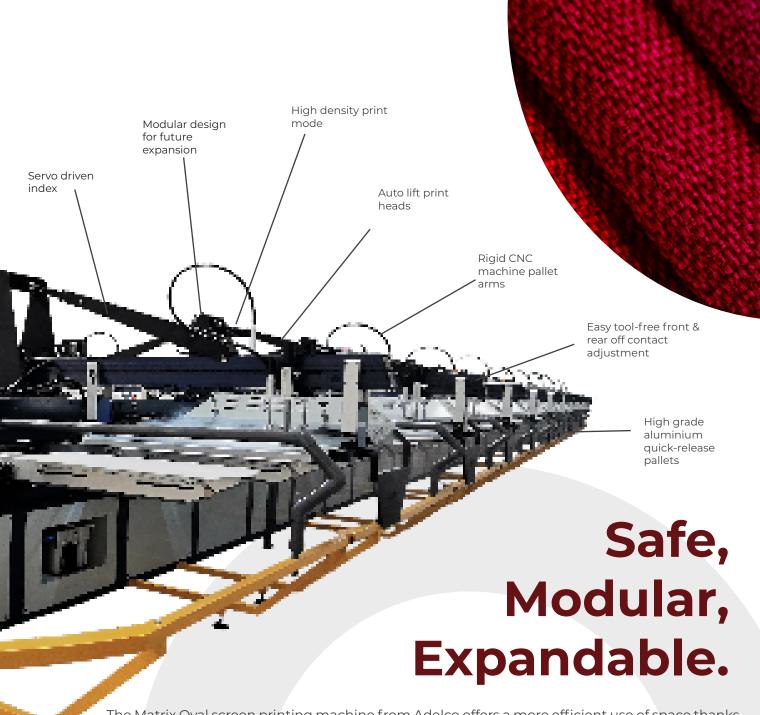
"My experience with Adelco has been fantastic and I would recommend Adelco and their products to anyone. I have known Mark a long time and would consider him a friend more than just a business contact. He is someone we can trust, honest to his word, and if he says he is going to do something he does.

- Jon Lunt, T Shirt & Sons. UK

## adelco MATRIX

A modular oval screen printer that provides more versatility and high-production output.





The Matrix Oval screen printing machine from Adelco offers a more efficient use of space thanks to its oval-shaped design. It offers greater stability with larger print formats than comparable carousel based machines. The Matrix Oval provides more versatility with multiple flashes, cooling and speciality print stations, providing the highest print quality and accuracy.

Available in three standard print size formats, the Matrix can be configured for almost any production requirement with an infinite number of pallets and print stations. Its servo driven print heads enable cycle times in excess of 900 prints per hour.

It has a unique rail and drive system that ensures almost silent operation, creating a quiet print-shop environment.

Pallets are securely locked with hardened locators. Indexing to an accuracy of +/- 0.02mm.

Safety barriers, proximity sensors, and safety lasers run the full length of the machine that immediately stops the machine if activated. The Matrix Oval is designed with safety as a priority, with worldwide renowned certification.

The Matrix Oval offers unparalleled support of print heads & pallet arms during print cycle for exceptional print quality and repeatability.



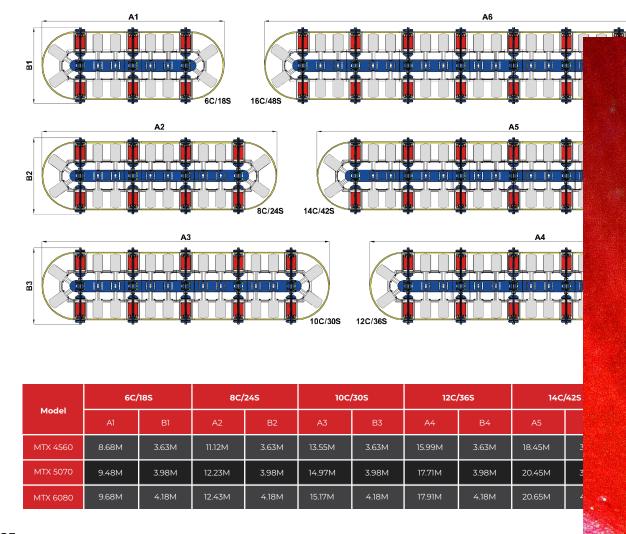
### **Specifications**

Electrical Re	equirements
<28 stations	>28 stations
1 phase 220V 2KW + 750W per print head	1 phase 220V 4KW + 750W per print head

Air Supply										
Pressure	CFM (per print head)									
100PSI/7bar	3 CFM									

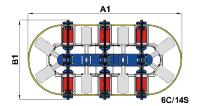
Standard Image Area	Max Frame Size	Max Machine Width	Length
45x60cm (18"x24")	64x100cm (27"x43")	363cm (143")	Depends on format
50x70(20"x28")	69x110cm (27"x43")	398cm (157")	Depends on format
60x80cm (23.5"x31.5")	79x120cm (31"x47")	418cm (165")	Depends on format

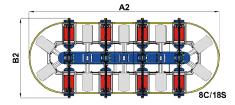
#### **Print-Flash-Cool Format**

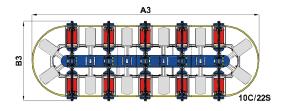


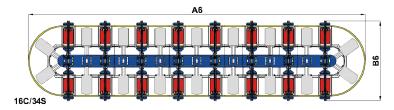
#### **Print-Flash Format**

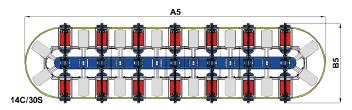


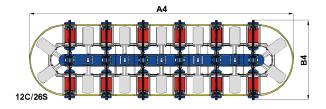












	6C/14S		8C/18S		10C/22S		12C/26S		14C/30S		16C/34S	
Model	Αì	В1	A2	B2	A3	В3	A4	В4	A5	B5	A6	В6
MTX 4560	7.05M	3.63M	8.68M	3.63M	10.30M	3.63M	11.93M	3.63M	13.55M	3.63M	15.18M	3.63M
MTX 5070	7.66M	3.98M	9.48M	3.98M	11.31M	3.98M	13.14M	3.98M	14.97M	3.98M	16.80M	3.98M
MTX 6080	7.86M	4.18M	9.68M	4.18M	11.51M	4.18M	13.34M	4.18M	15.17M	4.18M	17.00M	4.18M



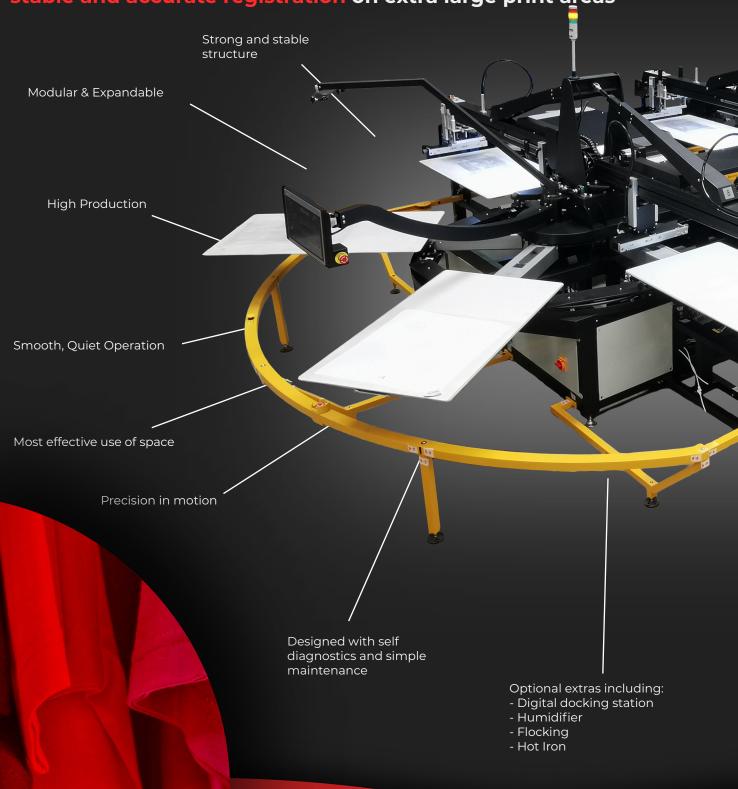
Works with the Adelco high speed digital Hybrid Digital printer option





# adelco ELLIPSE

Unique in the market place having front and rear registration locators and pallet support providing the most stable and accurate registration on extra large print areas



The Adelco Ellipse Oval can be configured for almost any screen-printing production requirement with an infinite number of stations and print heads. With its' modular make-up, this screen printer can be easily scaled up as your business and print requirements grow. The best solution for print areas of 70x100cm and above with a high power servo index, allowing for cycle times of 700 or more prints per hour.

Precision printing is achieved using the Ellipse Oval, as pallets are locked front and back, offering accuracy of +/- 0.02mm. The Ellipse Oval also features a unique floating pallet design, which is chainless for extreme longevity and smooth pallet index.

The Ellipse Oval features an advanced PLC control system with human interface for all operator functions including auto start and auto finish.



Every printer head is fitted with a touch panel control for all main printing functions. Rigid pallet arms optimising servo index, supported front and back during the print cycle provide zero pallet deflection, while at Adelco we also offer a wide range of easily removable pallet style and sizes.

#### **Features**

- Chainless pallet drive system for extreme longevity and smooth pallet index.
- Guaranteed lifetime registration. Our unique lock system which is located on every pallet arm, disengages the pallet from the drive mechanism ensuring consistent pin-point lifetime registration.
- Servo driven printheads delivering exceptional speed and control torque, even at lower speeds our printheads feature adjustable screen chase, three-way responsive micro-registration, quick release squeegee/flood blades, front and rear off-contact and levelling adjustment, a quick release high lift facility for rapid screen cleaning or flash cure docking. Every head is fitted with a touch panel control for all main printing functions.
- Rigid pallet arms optimizing servo index, supported front and back during the print cycle providing zero pallet deflection. We offer a wide range of easily removable pallet styles and sizes.
- Superior build quality, heavy duty construction for both print head and pallet arms delivering exceptional print quality.
- 2 year limited warranty The Ellipse Oval is covered by a 2 limited year warranty and supported by our global network of service agents and distributors



### **Specifications**

Electrical Re	equirements
<28 stations	>28 stations
1 phase 220V 1.5KW + 700W per print head	1 phase 220V 2.5KW + 700W per print head

Air S	upply
Pressure	CFM (per print head)
100PSI/7bar	3 СҒМ

Standard Image Area	Max Frame Size	Max Machine Width	Length							
70x100cm (28"x39")	89x140cm (35"x55")	440cm (173")	Depends on format							
80x120cm (31.5"x47.2")	99x160cm (39"x63")	480cm (189")	Depends on format							
	Larger print sizes guoted on request									

#### **Print-Flash Format**

Model	6C/14S		8C/18S		10C/22S		12C/26S		14C/30S		16C/34S	
	Αl	В1	A2	B2	A3	В3	A4	В4	A5	B5	A6	В6
OVAL70100	8.92M	4.4M	11.05M	4.4M	13.18M	4.4M	15.32M	4.4M	17.45M	4.4M	19.59M	4.4M
OVAL80120	10.01M	4.8M	12.29M	4.8M	14.58M	4.8M	16.87M	4.8M	19.15M	4.8M	21.44M	4.8M

Larger print sizes quoted on request

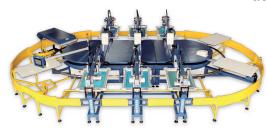
#### **Print-Flash-Cool Format**

Model	6C/20S		8C/26S		10C/32S		12C/38S		14C/44S		16C/50S	
	Al	B1	A2	B2	A3	B3	A4	B4	A5	B5	A6	B6
OVAL70100	11.05M	4.4M	14.25M	4.4M	17.45M	4.4M	20.65M	4.4M	23.85M	4.4M	27.06M	4.4M
OVAL80120	12.09M	4.8M	15.75M	4.8M	19.15M	4.8M	22.58M	5.35M	26.01M	5.35M	29.44M	5.35M





Model No: OPP-8C36S-80120 8 colour - 36 Station 80x120cm Printing Area



Model No: OPP-6C10S-70100 6 colour - 10 Station 70x100cm Printing Area



Bespoke oval design auto sock printer illustrated



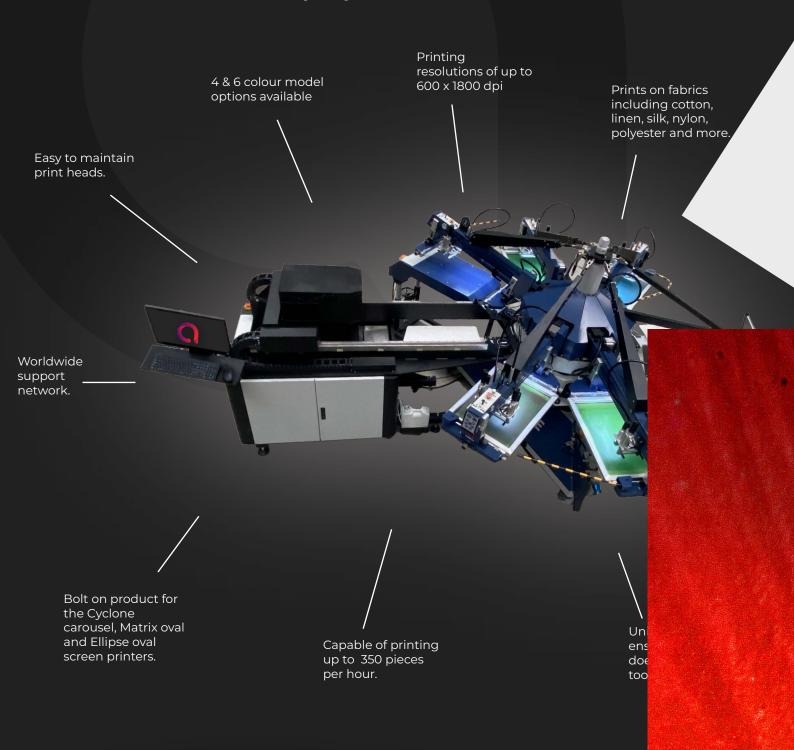
All Over Oval Printing Press Prints on every part of the shirt.

"I would recommend any of the Adelco products to anyone, not only for the quality, but definitely for the support offered after the sale."

- Rob Dubow, Dubow Textile Inc. USA



A high-speed digital textile printer that works seamlessly with our automatic screen printing presses with the lowest ink cost per print.



## A digital add-on for the Cyclone, Matrix and Ellipse.



Adelco's Hybrid Digital system is an add-on High Speed Digital Station designed to work in conjunction with the Adelco Automatic Screen Printing Presses, the Cyclone carousel, Matrix Oval and Ellipse Oval. This Hybrid digital system combines the advantages of both screen and digital printing to create even the most innovative garment decoration.

Utilising environmentally friendly inks, Adelco's AD Hybrid Digital can produce A3 format printed substrates in excess of 350 units per hour, and when used in conjunction with a screen printed base providing the lowest ink cost per print.

Using industrial grade Ricoh print heads for maximum stability, durability and reliability, Adelco's AD Hybrid Digital solution can achieve complex designs. The system is quick to set up and prints quickly without the need for costly separations or screen manufacture.

Combine digital print, spot colour, high build, glitter, puff, flock, foil and other special effect prints all on one print machine. The Adelco AD Hybrid has a built in humidifier and ink recirculation system.

Offering superb accuracy of 0.05kps, and with an ink sensor alarm, auto and manual ink supply the AD Hybrid covers all the bases.

- A3 print up to 350 per hour
- Softest hand feel on the market
- Worldwide support network
- Environmentally friendly inks
- Industrial grade Ricoh print heads

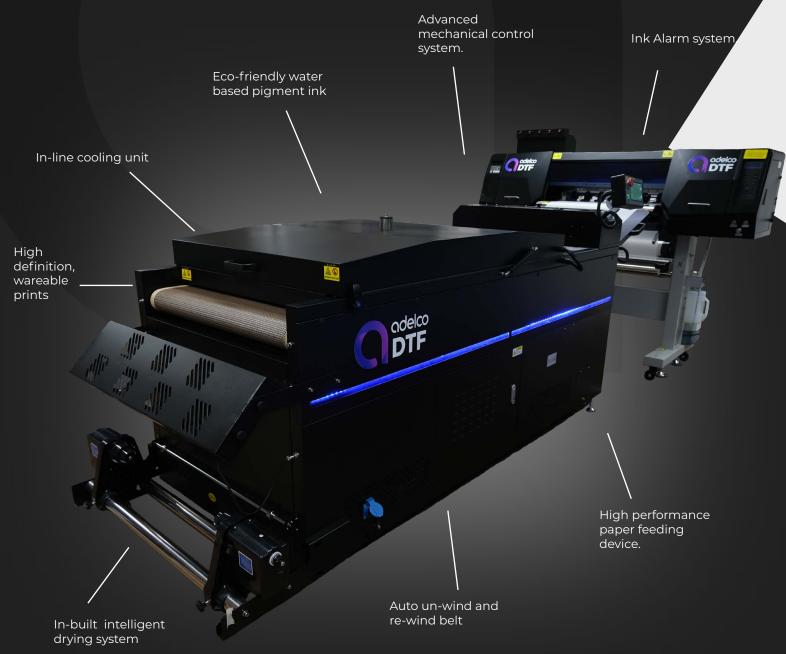
Digital Printer sizes	400 x 500 - CMYK	
(mm)	400 x 500 - CMYK, Red and Green	
	500 x 700 - CMYK	
	500 x 700 - CMYK, Red and Green	
	600 x 800 - CMYK	
	600 x 800 - CMYK, Red and Green	
Printing Resolution	600x1200dpi, 600x1800dpi	
Printing Fabric	Cotton, linen, silk, nylon, polyester, viscose, etc.	
Max Printing Area	600x800mm	
Max Speed	350pcs/h	
Ink Type	Pigment Ink	
Max Media Thickness	25mm	
Ink Supply System	Auto negative pressure ink supply system	
Ink Capacity	5L/colour	
RIP Software	Caldera	
Printhead Maintenance	Self-Cleaning	
	Auto Ink Wiping System	
	Built in Humidifier	
	Built in Ink Recirculation System	
Power Supply	220vAC, single phase, 50/60hz	
Work Environment	Temperature 25-28°C, Humidity, 55%-65%	
Print Heads	400 x 500 4 Colour -8 x 512 nozzle Ricoh print head modules	
	400 x 500 6 Colour - 12 x 512 nozzle Ricoh print head modules	
	500 x 700 4 Colour - 10 x 512 nozzle Ricoh print head modules	
	500 x 700 6 Colour - 15 x 512 nozzle Ricoh print head modules	
	600 x 800 4 Colour -12 x 512 nozzle Ricoh print head modules	
	600 x 800 6 Colour -18 x 512 nozzle Ricoh print head modules	





# Printer Re-Circulation Powder & Dryer System

Introducing a fully intelligent HD four headed DTF printer and automatic re-circulation powder system. The fastest and highest spec printer in the market. The built-in dryer supplements the DTF making it the most complete solution in the market.



# A powerful and efficient DTF system complete with an automatic re-circulation powder and dryer solution



Adelco's Direct to Film printer has a high aluminum milling frame ensuring a stable output with four print heads. This system comes with an advanced mechanical control system that ensures more stable printing. With a thoughtful and easy touch screen operating system the printer is easy to use. Features of the printer includes:

- A precision paper pinch roller Ensures accuracy and stability of the paper.
- Advanced capping station Keeps ink flow fluent.
- Intelligent system with suction panels Simple and responsive.
- Ink alarm system allows ink to be added in advance, avoiding printing abnormalites caused by ink shortage.
- Anti-collision decice of print heads. avoid collision between print head and trolly.
- Industrial motor drive High spec, improved printing efficiency.

Adelco's DTF comes complete with automatic re-circulating powder unit, making the process efficent and seamless. Features include:

- Drying system ensuring immediate drying when printing at speed.
- One meter heating tunnel Progressive heating with long service life, even and economical heating.
- Built-in cooling unit Automatically controls and adjusts the temperature.
- Touch screen control system Intelligent digital control simple and effective.
- High performance paper feeding device. suitable for a variety of materials.

	4 Head DTF Printer	2 Head DTF Printer
Printing heads	4 x Epson 13200 - A1	2 x Epson 13200 - A1
Print Width	600mm	600mm
Resolution	3200dpi	3200dpi
Colour	CMYK & White	CMYK & White
Ink Type	Pigment Ink	Pigment Ink
Power Supply	220V - 50HZ/60HZ (110V Option) 1 500W	220V - 50HZ/60HZ (110V Option) 1400W
Speed	4 pass: 27m2/h 6 pass: 17m2/h 8 pass: 13m2/h	4 pass: 14m2/h 6 pass: 11m2/h 8 pass: 8m2/h
Operation Enviroment	Temperature 18 - 35°C, Humidity: 40RH - 70RH	Temperature 18 - 35°C, Humidity: 40RH - 70RH
Machine Size	1925 x 800 x 1667mm	1680 x 820 x 1430mm
Package Size	2300 x 760 x 860 mm	2370 x 750 x 650 mm
Weight	216Kg	160Kg
Re-Circulation Powder System	Yes	No
Applicable Film Width	600mm	600mm
Applicable Speed	18m2/h	18m2/h
Platform Temperature	75°C	75°C
Drying Temperature	110°C	110°C
Media Type	PET transfer film	PET transfer film
Media Transport	Belt guide system and dual powered take-up	Belt guide system and dual powered take-up
Power Supply	220V 50HZ/60HZ 6500W	220V 50HZ/60HZ 5000W
Operation Environment	Temperature 18-30°C Humidity 40Rh-60RH	Temperature 18-30°C Humidity 40Rh-60RH
Heating	Intelligent 10 heating tubes infared heating	Intelligent 5 heating tubes infared heating
Machine Size	3122 x 1130 x 1105mm	1920 x 1000 x 1210mm
Package size	2360 x 1150 x 1280 mm	1850 x 1150 x 1280 mm
Weight	297Kg	270Kg



# Digital Cutter

Introducing an intelligent accessory for our DTF printer. The DTF Cutter, the perfect companion for the DTF.



# A highly intelligent CNC Digital Cutter unit. A perfect pair for our DTF solution for a seamless DTF solution



Adelco's computerized numerical control Digital Cutter comes equipped with an advanced high-precision cutting unit that ensures the highest detail in small designs. Paired with a safety motor tool that will pause operations whenever the carriage is jammed. Features of the cutter includes:

- A fast cutting unit A variety of speeds for any volume of productions.
- Multi-layer cutting Capaple to cut through multiple layers at one and apply different strengths across the different layers.
- High-speed CCD camera Extremely efficient in detecting printing issues and accurate recognition of problems.
- High-precision cutting unit Remarkably accurate, able to do consistent cuts as small as 0.8mm.
- Adjustable cutting levels 8 different cutting strengths perfect for any job.
- Half-cut & Perf Cut Versatile for any type of need.
- Adjustment algorithm Able to detect and discard distorted, rounded or lifted corner designs
- Accurate cutting paths No longer need to overcut, the start and end nodes line up with eachother accurately.
- Segment cutting operation Capable for a more precise alignment using different types of axis around the designs. Perfect for tracking long rolls, laminated designs and heavier materials.
- Cutting along the dotted lines Available feature when cutting 2 layers and capable of performing with different types of paper

Size	350 x 450mm or 610 x 900mm
Applicable Media Thickness	0.03 - 1mm
Applicable Media	Balanced pliability for soft and rigid materials
Method	Vacuum pump and/or adhesive mat
Cutting Speed	600mm/s
Cutting Force	600g / 5.8N in 8th level
Cutting Set-up	Adjustable in every 1g
Blade Diameters	0.9mm, 1.5mm, 2.0mm
Blade Angles	30°, 45°, 60°
Dotted Lines Cutting	Included
Drive	AC Servo
Mechanical Resolution	0.0125mm
Compatible OS	Win 10/8/7/XP
Memory Buffer	2 MB
Software	Windows Driver, SignWorkPro & CADtoPlotpro
LCD	English
File Format	HP-GL, PLT
Port in Standard	USB, RS-232
Registration Marks Recognition	Temperature 18-30°C Humidity 40Rh-60RH
Power Input	110 - 220V AC, 50 - 60Hz
Power Consumption	620w or 900w
Cutter Holder / Pen Holder	1 for each
Types of Pen	Water based fiber-tip pen & oil based ball pen
Package Size L - W - H	1050 x 760 x 600mm or 1350 x 1220 x 1220mm
Gross / Net Weight	67 / 52kg or 160 / 90kg



# adelco CTS Systems

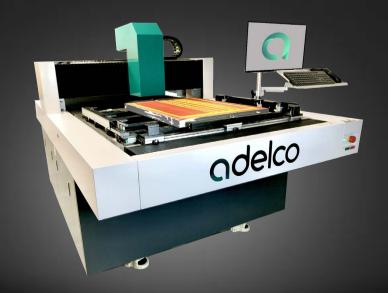
# InkPro - InkJet System



The Adelco InkPro industrial Computer to Screen solution. has a higher resolution than any other inkjet system on the market. With superior image integrity, richer details and smoother halftone transitions. All at a low price point, ensuring the best value on the market.

## Laser Pro - Laser System

An advanced Computer to Screen solution. High precision, High productivity, a truly simple process. This direct screen laser exposure system produces perfect screen plates.



### InkPro - InkJet System

Adelco's **InkPro** CTS system, is a high speed, high resolution industrial computer to screen imaging system based on **inkjet printing technology**, that directly generates and exposes opaque images on emulsion - coated screens with UV-blockiing ink so that users can reduce the time and effort required for screen preparation.

### High Resolution

Utilising the advantages of higher resolution inkjet technology, Adelco **InkPro** has the ability to print computer-to-screen images with richer details and smoother halftone transitions, which are superior to traditional film positives.

#### Optional on board exposure lamp available

The specially formulated UV-blocking ink also works well on ALL emulsions on the market.

#### Easy to integrate

The screens produced by the **InkPro** are compatiable with exisiting standalone exposure equipment for subsequent exposure. Easy to integrate into current screen printing production lines.

#### High Efficiency

Exposes screens in less than 60 seconds.

#### Low Cost

Elimination of film positives. Litho film is becoming inceasingly expensive, and the suppliers on the market are decreasing. One procedure of CTS digital screen making, **replaces five procedures of the conventional process**.

- Professional ColorPRINT server RIP Software for an efficent workflow.
- Adjutable frame fixture provides fast setup for screen frames upto 635mm x 914.4 mm (25" x 36")
- Print head maintenance module allows automatic purging, wiping and capping.

### **Specifications**

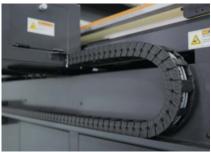
Specification	Adelco InkPro		
Application	Textile, decals, labels, decrations, etc.		
Max Screen Frame Size	635 x 914.4 mm (25" x 36")		
Max Image Size (mm)	508 x 660.4mm (20" x 26")		
Machine dimensions	1520 x 1700 x 1350 mm (W x D x H)		
Screen profile	250.8 mm (2")		
Print Technology	DOD piezoeletric inkjet print technology		
Print Head	600 DPI Ricoh gen 6 piezo print head		
Print Head Control	Auto voltage & temp control, auto print head maintenance, variable droplet size control for grayscale printing.		
Exposure time	Under 60 seconds		
Resolution	1440 x 1200 dpi		
Ink	Black, UV blocking, Ink tank : 1 litre		
File Format	Includes PDF, EPS,PS, TIFF, PSD, etc.		
Color mode	Monochrome		
Connections	15W/20W/25W (optional)		
Machine size mm	1600 x 1350 x 1550 2700 x 1550 x 1600		
Power requirements	Single Phase 220V,±10% 50/60HZ AC 10 amps max 1000W		
Equipment Conditions	Yellow/dark room - Altitude up to 1000m Temperature 16 - 28°C. (61b - 82°F) 40 - 60% relative humidity (recommended)		
Software	ColorPRINT server RIP software, Print production software (PPS) Print control software (PCS)		



Adjustable Frame Fixture



**Locating blocks** 



**Shuttle Gantry Design** 



Print Head Maintenance Module

### Laser Pro - Laser System



Adelco's **LaserPro** machine, is a direct screen laser exposure machine to produce perfect screen plates. Data files are directly read by the computer to screen (CTS) and then converted into images which will be transmitted through **laser beams** onto screens by DMD and lens.

With **no added consumables**, and using Digital Imaging Technology, images are produced by DMD (digital micro-mirror device) which has over **800 thousand or 2 million micrometer** micro-mirrors, enabling clear and sharp square dots. This latest digital exposure system has now become the new standard for the screen printing industry.

### High Precision and Resolution

Easy and fast to achieve raster 133LPI and high quality screen dots by the optical 1270dpi, while with the optical 2540dpi, **high definition curved lines** and **perfect FM screen dots** can be realised.

#### High Efficiency

Three minutes to finish the exposure on screen size 1000mm x 1000mm. **Stencil making efficiency** has been greatly improved due to a lot of time saved by the **acurate exposure alignment** and labour reduction.

#### Low Cost

Elimination of film positives. Litho film is becoming inceasingly expensive, and the suppliers on the market are decreasing. One procedure of the **LaserPro** digital screen making, **replaces five procedures of using the conventional process**.

### Excellent laser piercing power

**15W**, **20W** and **25W** three laser powers are optional, and the thickness EOM  $\mu$ m with solvent resistant emulsions and EOM 220 $\mu$ m with water resistant emulsion can be achieved for some special screen making such as carbon oil and capillary.

### Compatible processes with the conventional process

Data files are directly read by the LaserPro and then converted into images which will be transmitted through laser beams onto screens by DMD and lens.

Specification	Adelco LaserPro		
Application	Textile, decals, labels, decrations, etc.		
Max Screen Size (mm)	900 x 1100mm 1080 x 1200mm		
Min Screen Size (mm)	400 x 400mm	400 x 400mm	
Max exposure Size (mm)	850 x 950mm	900 x 1000mm	
Screen frame thickness	25 - 45 mm	25 - 45 mm	
Imaging System	DMD DLP Technology		
Emulsion thickness (EOM)	Solvent resistant emulsion	3µm - 150µm	
Emaision emokness (Eom,	Water resistant emulsion	3µm - 350µm	
Exposure time	120 - 240s /M², 350 mesh yellow screen		
Resolution	1270dpi 1270dpi		
Raster	120LPI 133LPI		
File Format	1_ bit tiff	1_ bit tiff	
Focus system	UVLD laser, wavelength 405	55±nm	
Laser Power	20W/25W 15W/20W/25W		
Machine size mm	1740 x 1500 x 1480 2700 x 1550 x 160		
Equipment net weight	1200 KG	2200KG	
Equipment Conditions	Yellow light room with cleanliness class 10000, temperature 22±2°C. 40 - 70% relative humidity (no condensation)		
Connections	Single Phase 220V, 50/60HZ, 4KW, Gas 1L/min		

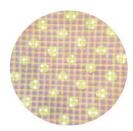
### **High Resolution**



2540dpi



50-micron positve line on 120pw34(300/in)



5% halftone dots at 120lpi on 150pw31(380/in)



**Four-colour picture** 

### Laser System



Introducing **Adelco's Laser System**, a revolutionary direct screen laser exposure system designed to create **flawless screen plates**. This advanced technology seamlessly translates data files through Computer-to-Screen, transforming them into **high-resolution images**. These images are then transmitted onto screens with precision using **cutting-edge DMD** and lens technology. Witness a new era of perfection in screen plate production.

Experience a consumable-free process powered by state-of-the-art Digital Imaging Technology. Our system employs a Digital Micro-Mirror Device (DMD) boasting an impressive array of over **800 thousand to 2 million micrometer-sized mirrors,** ensuring the creation of impeccably defined square dots with **unparalleled clarity.** This cutting-edge digital exposure technology has firmly established itself as the gold standard within the industry.

### • High Precision and Resolution

Easy and fast to achieve raster 120LPI and high quality screen dots by the optical 1270dpi, while with the optical 2540dpi, **high definition curved lines** and **perfect FM screen dots** can be realised.

### High Efficiency

Three minutes to finish the exposure on screen size 900mm x 1000mm. **Stencil making efficiency** has been greatly improved due to a lot of time saved by the **acurate exposure alignment** and labour reduction.

#### Low Cost

Elimination of film positives. Litho film is becoming inceasingly expensive, and the suppliers on the market are decreasing. One procedure of the **Adelco Laser** digital screen making, **replaces five procedures of using the conventional process**.

### Excellent laser piercing power

**20W** and **25W** twolaser powers are optional, and the thickness EOM  $\mu$ m with solvent resistant emulsions and EOM 150 $\mu$ m with water resistant emulsion can be achieved for some special screen making such as carbon oil and capillary.

#### Compatible processes with the conventional process

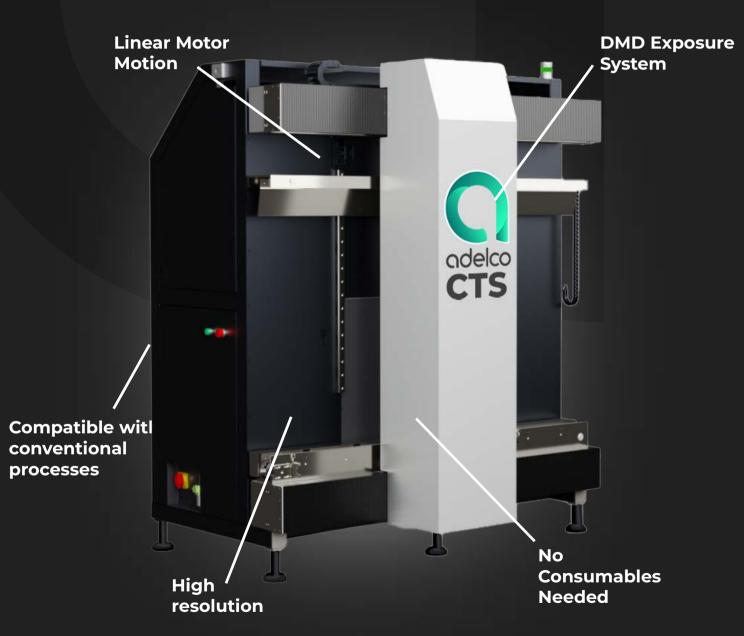
Data files are directly read by the Adelco Laser and then converted into images which will be transmitted through laser beams onto screens by DMD and lens.

### **Specifications**

	Adelco Laser	Adelco Laser Plus	
Application	Textile, decals, labels, decrations, etc.	Textile, decals, labels, decrations, etc.	
Max Screen Size (mm)	900 x 1100	1200 x 1300	
Min Screen Size (mm)	400 x 400	400 x 400	
Max exposure Size (mm)	850 x 950	1100 x 1250	
Screen frame thickness	25 - 45mm	25 - 45mm	
Imaging System	DMD DLP Technology	DMD DLP Technology	
Emulsion thickness (EOM)	Solvent resistant emulsion 3µm - 150µm	Solvent resistant emulsion 3µm - 150µm	
Emulsion thickness (EOM)	Water resistant emulsion 3µm - 350µm	Water resistant emulsion 3µm - 350µm	
Exposure time	120 - 240s /m², #350 mesh yellow screen	120 - 240s /m², #350 mesh yellow screen	
Resolution 1270dpi		1270dpi	
Raster	120LPI	120LPI	
File Format 1_ bit tiff 1_ bit tiff		1_ bit tiff	
Focus system	Wavelength 405 5±nm Auto Wavelength 405 5±nm Auto		
Laser Power	20W/25W (optional)	20W/25W (optional)	
Machine size mm	1740 × 1500 × 1480 (68.5" × 59.1" × 58.3")	1960 x 1800 x 1500 (77.2" x 70.9" x 59.1")	
Equipment net weight	1200 KG	1500 KG	
Equipment Conditions	Yellow light room with cleanliness class 10000, temperature 22±2°C. 40 - 70% relative humidity (no condensation)	Yellow light room with cleanliness class 10000, temperature 22±2°C. 40 - 70% relative humidity (no condensation)	
Connections	Single Phase 110/220v, 50/60HZ, 3KW	Single Phase 110/220v, 50/60HZ, 3KW	

## adelco Laser V

A cutting-edge solution that enables direct computer-to-screen processing, offering exceptional precision and productivity. The straightforward procedure of this advanced laser exposure system guarantees flawless screen plates.



### Laser V - Laser System



Adelco's **Laser V** system utilizes direct screen laser exposure technology to achieve **impeccable screen plate production.** It operates by directly reading data files through the computer to screen (CTS) system, converting them into images, and transmitting them onto screens using laser beams facilitated by the DMD and lens components.

By employing Digital Imaging Technology and without the need for additional consumables, this innovative system generates images utilizing the DMD (digital micro-mirror device), which boasts an impressive array of over 800 thousand or 2 million micrometer micro-mirrors. This advanced configuration ensures the production of **crisp and well-defined square dots.** As a result, this cutting-edge digital exposure system has swiftly emerged as the prevailing benchmark within the screen printing industry.

#### • High Precision and Resolution

Effortlessly and swiftly achieve a raster of 133LPI and obtain **high-quality screen dots** through the utilization of an optical resolution of 1270dpi. Alternatively, with an optical resolution of 2540dpi, attain impeccable FM screen dots and high-definition curved lines.

#### High Efficiency

The exposure process for a screen size of 1000mm x 1000mm can now be completed in just **three minutes.** This remarkable reduction in time, coupled with precise exposure alignment and decreased labor requirements, has significantly enhanced the efficiency of stencil making.

#### Low Cost

**Elimination of film positives.** Litho film is becoming inceasingly expensive, and the suppliers on the market are decreasing. One procedure of CTS digital screen making, replaces five procedures of using the conventional process.

#### • Excellent laser piercing power

Two laser powers are optional: **20W** and **25W**, the thickness EOM (emulsion over mesh) pf 120µm with solvent resistant emulsions and an EOM of 220µm with water resistant emulsion can be achieved for special screen making such as carbon oil and capillary.

### Compatible processes with the conventional process

**The CTS directly reads data files** and subsequently converts them into images. These images are then transmitted onto screens using **laser beams**, facilitated by the DMD and lens components.

### **Specifications**

	Adelco Laser V	Adelco Laser V- XL	
Application	Textile, Decals, Labels, Decorations, etc.	Textile, Decals, Labels, Decorations, etc.	
Max Screen Size (mm)	1000 x 1000 mm	1200 x 1300 mm	
Min Screen Size (mm)	400 x 250 mm	400 x 250 mm	
Max exposure Size (mm)	1100 x 1200 mm	1100 x 1200 mm	
Screen frame thickness	20 - 50 mm	20 - 50 mm	
Imaging System	DMD DLP Technology	DMD DLP Technology	
Emulsion thickness (EOM)	Solvent resistant emulsion 3µm - 150µm	Solvent resistant emulsion 3µm - 150µm	
	Water resistant emulsion 3µm - 350µm	Water resistant emulsion 3µm - 350µm	
Exposure time	120 - 240s / m², 350 mesh yellow screen	120 - 240s / m², 350 mesh yellow screen	
Resolution	1270dpi / 2540dpi (Optional)	1270dpi / 2540dpi (Optional)	
Raster	133LPI	133LPI	
File Format	1_ bit tiff	1_ bit tiff	
Focus system	UVLD laser, wavelength 405 5±nm	UVLD laser, wavelength 405 5±nm	
Laser Power	20W/25W (Optional)	20W/25W (Optional)	
Machine size mm	1900 x 1417 x 2300 mm / 74.8 x 55.9 x 90.6"	1900 x 1417 x 2300 mm / 74.8 x 55.9 x 90.6"	
Equipment net weight	1400 KG	1400 KG	
Equipment Conditions	Yellow light room with cleanliness class, temperature 22±2°C. 40 - 70% relative humidity (no condensation)	Yellow light room with cleanliness class, temperature 22±2°C. 40 - 70% relative humidity (no condensation)	
Connections	Single Phase 110V/220V, 50/60HZ 4KW, Compressor air 0.5 mpa	Single Phase 110V/ 220V, 50/60HZ 4KW, Compressor air 0.5 mpa	

# odelco FLASH CURE

High-spec flash cure units that use cutting edge quartz infra-red lamps, unique hot air modules and more for all your screen and digital printing requirements.

### MTX-5070



- Rapid cure, medium wave quartz lamps
  - Variable power output •
  - Variable process time •
  - Three and nine independent zones •

Adelco produce a wide range of high specification Flash Cures and Table Drying Units to suit every application. Utilizing leading edge quartz infra-red lamps and unique hot air modules, we have a flash cure solution for all your screen printing and digital requirements.



# Flash cure units for your screen printers.

# OFLASH CURE Specifications

### **Oval Flash Cures**

Model		Compatible Machines	Curing Area	KW (380V)	Stand Mounted
OFC-4560	)	Stand mounted, thee zones, automatic, quartz	45x60cm (18x23")	13.5	Yes
OFC-5070	)	Stand mounted, thee zones, automatic, quartz	50x70cm (21x27")	18	Yes
OFC-6080	)	Stand mounted, thee zones, automatic, quartz	60x80cm (23x31")	18	Yes
OFC-70100	)	Stand mounted, thee zones, automatic, quartz	70x100cm (27x40")	22.5	Yes
MTX-4560	-3 -9	M&R, TAS, Schenk etc.	45x60cm (18x23")	13.5	Yes
MTX-5070	-3 -9	M&R, TAS, Schenk etc.	50x70cm (21x27")	18	Yes
MTX-6080	-3 -9	M&R, TAS, Schenk etc.	60x80cm (23x31")	18	Yes
MTX-70100	-3 -9	M&R, TAS, Schenk etc.	70x100cm (27x40")	22.5	Yes

### **Automatic Quartz Flash Cure**

Model	Compatible Machines	Curing Area	KW (380V)	Stand Mounted
AFC-4050	МНМ Е-Туре	40x50cm (15x19")	9	-
AFQ-4560	MHM S-Type, Schenk, Hebbeker	45x60cm (18x23")	13.5	-
AFQ-5070	MHM 3000/4000 Schenk, Hebbeker	50x70cm (21x27")	18	-
AFQ-70100	Jumbo MHM Hebbeker 3000/4000 Shenk, Hebbeker	70x100cm (27x40")	22.5	-
AFQ-80110	Super Jumbo MHM	80x110cm (31x43")	22.5	-
AMR-4560	M&R, TAS, Shenk etc.	45x55cm (18x21")	13.5	Yes
AMR-5070	M&R, TAS, Shenk etc.	50x70cm (21x27")	18	Yes
AMR-70100	M&R, TAS, Shenk etc.	70x100cm (27x40")	22.5	Yes





### **Manual Flash Cures, Stand Mounted**

Model	Curing Type	Compatible Machines	Curing Area
AMF-4560	Long Wave Infra Red	Manual Carousels	45x60cm
AMF-5070	Long Wave Infra Red	Manual Carousels	50x70cm
AMR-4560	Automatic, Quartz	Manual Carousels	40x60cm
AMR-5070	Automatic, Quartz	Manual Carousels	50x70cm

#### **Jet Air Flash Cures**

Maximises intermediate drying of water based inks and reduces dye sublimation on polyester and other acrylic materials

Model	Compatible Machines	Curing Area
JFC-4555	Mounted in print head, driven by squeegee head & interfaces with printer controls	45x55cm (18x27")
JFC-5070	Mounted in print head, driven by squeegee head & interfaces with printer controls	50x70cm (21x27")
JFC-4555SD	Stand mounted with independent hot air module drive & pallet sensor	45x55cm (18x21")
JFC-5070SD	Stand mounted with independent hot air module drive & pallet sensor	50x70cm (21x27")

"We have been working with Adelco for the past 7 years and have found them to be the most reliable and efficient solution to all of our dryer requirements. The products are all superbly constructed and perform optimally in even the most testing environments. We have installed their products all over South Africa and the Indian Ocean and can honestly say that their reliability is exceptional! When we have on odd occasions, had small issues, the support and after-sales service of the Adelco Team is fast and efficient. We would have no hesitation in recommending and selling any of their products to any of our valued clients."

- Steve Harcourt-Wood, Rexx Screen & Digital Supplies



CYCLONE SEMI-AUTO































OHOT IRON







# ANCILLARIES ANCILLARIES

### **Stretching Solutions**

Auto High Precision Stretching solution -HT-1020EA-WZ

Electrical High Precision Stretching solution -HT-1020EM

Manual Stretching solution - HT-1515MS







### **Coating Systems**



Auto Screen Coating System HC-1010AD/ HC-1313AD

Auto Double Screen Coating System HC-6510ADD



### **Exposure Units**



Horizontal self containted exposure units. Comes in 3.5KW (Hg 3w lamp) & 480KW (LG LED Lamp)

### **Drying Equipment**



**Vertical Screen drying** cabinet - HD-1010FV



Horizontal Screen drying cabinet - HD-1010FL

### **Screen Washing Systems**



Auto Screen Washing & Developing Systems - HW-1010AL



Manual Screen Wash-out booth - HW-1010M



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