

INLINE METAL DETECTOR FOR FLUID AND PASTRY PRODUCTS

Choose the most appropriate rejector for your application :

With the reject valve metal objects are separated out of the stream promptly. Azano has different valve designs available :

Butterfly valves are operationally reliable, easy to maintain and have specially been developed for CIP/SIP applications.

Ball valves are used in a wide variety of high pressure applications. A full unrestricted flow that allows no products restrictions through the valve. The EX-PWC valve is designed even for flowing products with non-fluid components.

Pipeline Metal Detectors : This in-line system serves to detect metal pieces in paste-like or liquid products and is integrated into the conveyor pipes (e.g. with milk pipe fittings). The metal pieces can be transferred out of the system by means of three-way-special-valves.



Throughput pipe under high-pressure

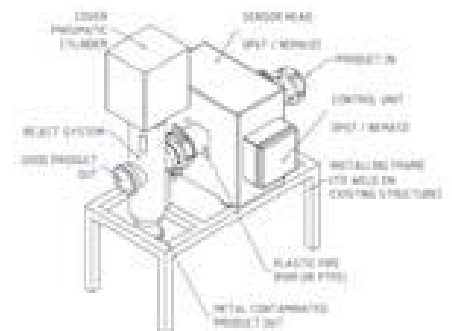
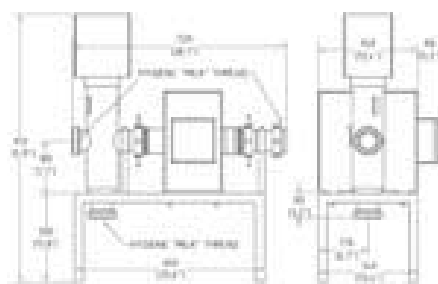
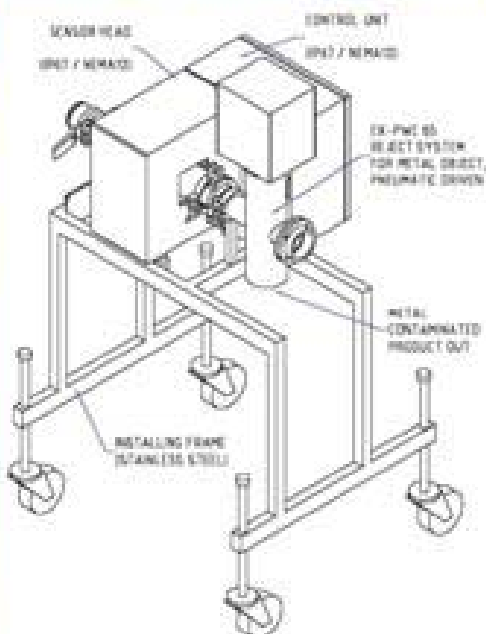
Assembly frame options

Easy handling / Smooth operation

Performance check

High pressure washdown option

Choose the most appropriate rejector for your application



Authorized Distributor:

FOR PHARMACEUTICALS

Specifications :

Pharmaceutical metal detection system featuring: APH sensor head, Infeed and reject system, Movable frame with castors, Stainless steel mirror polished.

Infeed and Reject System :

- * PVDF pipe, inner diameter 44mm (1.73")
- * Throughput max. 5,000 tablets / capsules per minute
- * Solenoid driven reject diverter mechanism
- * Variable infeed / outfeed height
- * Quick demount design for easy cleaning

Support Stand :

- * Stainless steel support stand * Movable through castors and fixed feet * Height can be adjustable

Best metal sensitivity : * FE \varnothing 0.3 / NFe \varnothing 0.4 / SS(316) \varnothing 0.5mm

Controller Features :

Digital signal processor, digital noise filter, digital balance control, digital frequency control with synthesizer, digital temperature shift control, continuous self monitoring, maintenance-free, no need for calibration, self calibration of all circuits, PowerDrive circuit, Product Compensation performed automatically, with auto TEACH key

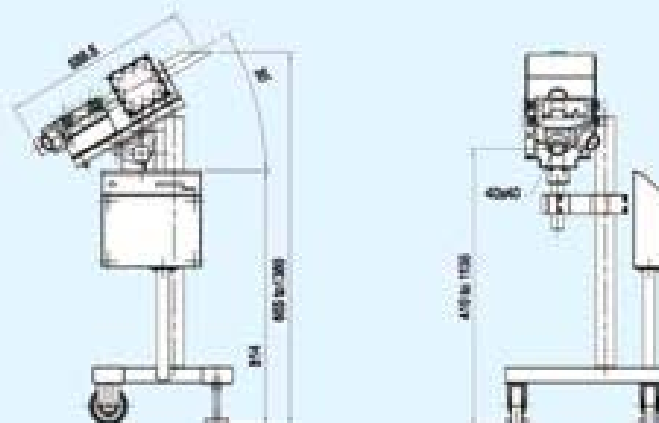
Output Signal metal alarm with maintenance-free changeover contact, metal alarm for 24VDC SPS activation

Measuring Method inductive, multi-channel operation, balance receiver coil

Product Library 120 storage spaces

Ambience temperature -10 to 50 C, humidity 30 to 85%

Power Supply one phase 85-264VAC, 50/60Hz, 100Watt



Authorized Distributor:



CONVEYOR METAL DETECTOR FOR PACKAGED AND LOOSE PRODUCTS

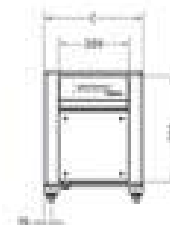
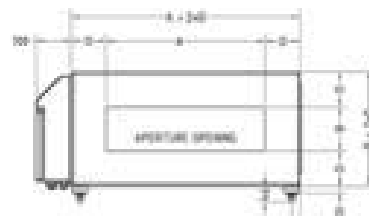
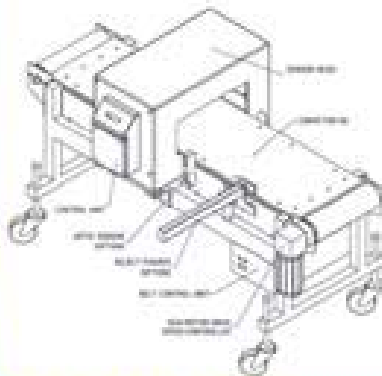
Model : AWH	350x100	350x125	350x150	350x100	350x100	
Pass Height	75mm	100mm	125mm	75mm	100mm	
Max.Pass Width	350mm			350mm		
Conveyor Length	1000mm			1200mm		
Max.Product Weight	10kg			15kg		
Memory Numbers	120			120		
Sensitivity	FE	0.8	0.8	1.0	0.8	0.8
	NON FE	0.9	1.0	1.2	0.9	1.0
	SUS 316	1.1	1.2	1.3	1.0	1.2
Protection Class	Sensor IP-65(Nema 6P, 12) , Control unit IP65(Nema 4x12)					
Belt Speed	17m/min or 34-55 m/min (variable speed, STR option)					
Metal Detection	Stop on detect and buzzer alarm, optional auto reject					
Product Packaging	Standard plastic or carton, metalized film (aluminium evaporated)					
Environment	Temperature -18 to +50 °C , relative humidity 30 to 85%					
Power Supply	Single phase 85-264 V AC, 50/60 Hz, 250 watt					
Exteriors	Stainless steel (SUS 304) , Belt FDA/USDA compliance, Drum motor					

Model : AWH	450x150	450x175	450x200	450x225	450x250	
Pass Height	125mm	150mm	175mm	200mm	225mm	
Max.Pass Width	450mm					
Conveyor Length	1200mm					
Max.Product Weight	15kg					
Memory Numbers	120					
Sensitivity	FE	1.0	1.2	1.4	1.6	1.7
	NON FE	1.2	1.4	1.6	1.8	1.9
	SUS 316	1.3	1.6	1.8	2.0	2.1
Protection Class	Sensor IP-65(Nema 6P, 12) , Control unit IP65(Nema 4x12)					
Belt Speed	17m/min or 34-55 m/min (variable speed, STR option)					
Metal Detection	Stop on detect and buzzer alarm, optional auto reject					
Product Packaging	Standard plastic or carton, metalized film (aluminium evaporated)					
Environment	Temperature -18 to +50 °C , relative humidity 30 to 85%					
Power Supply	Single phase 85-264 V AC, 50/60 Hz, 250 watt					
Exteriors	Stainless steel (SUS 304) , Belt FDA/USDA compliance, Drum motor					



Typically, the AWH types are used in conveyor belts and provide highest performance in detecting magnetic and non-magnetic metals. Different methods are available to reject metal objects (pusher, belt stop, alarm etc).

Conveyors : The metal detector is integrated into a conveyor belt either with the belt passing through the frame search coil or being installed just below the belt as flat search coil. There are several devices available to reject the detected metal pieces (e.g. pusher).



A	B	C	D
8 - 175	240	100	
176 - 250	330	120	
251 - 310	380	140	
311 - 350	380	160	
351 - 410	380	180	
411 - 500	430	210	
> 500			

Authorized Distributor:

High metal sensitivity
Sensing width 200-2000mm (4 in-6.6 ft)

Conveyor installation
Divide-able sensor head
Product effect compensation

Applications :
Plastic recycling
Rubber production
Wood and paper processing
Food related industries



Installation Conveyor, typical horizontal, but each angle is applicable.
Sensor head can be divided :
No belt cut required.

Metal free zone Fix and solid metal = 100mm
Before/after detector Moving / vibrating metal = 1.5x aperture height

Power supply 85-264V / 50-60Hz

Power input 100Watts

Ambient temperature -10...+50 °C / 15...120 °F
-20...+80 °C / 0...180 °F

Degree of protection Control unit IP65 (Nema 4x, 12)
Sensor IP67 (Nema 6P, 12)

Sensor head Stainless steel housing

Control unit **Stainless Housing**, attached to the side of sensor head (Option: prepared for wall mounting, with link cable)
Digital Noise Filters eliminate undesired signals.
Product effect library - the characteristics of 120 different products can be stored and recalled here.
Automatic learning provides simple and quick learning of product characteristics for product effect compensation.

Link cable 2,5m (8.2 feet), with cable protection tube, applies only with wall mounting option for the control unit

Timer For reject device control
Delay and duration adjustable from 0-9990ms

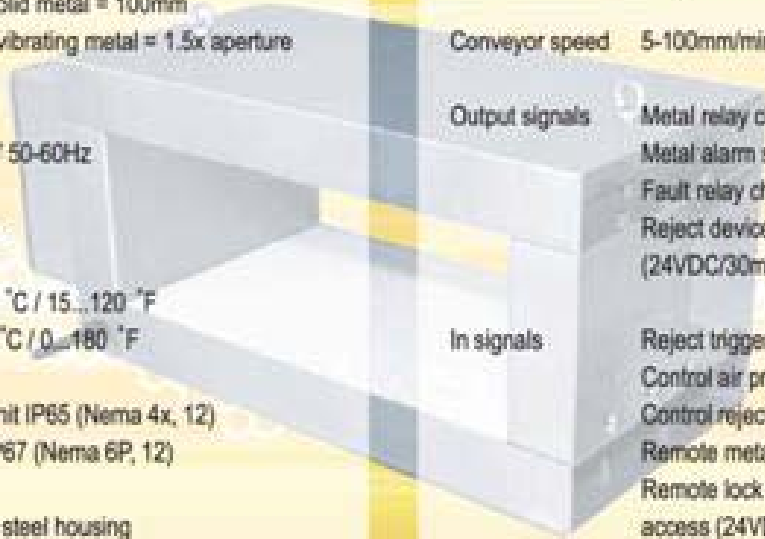
Conveyor speed 5-100mm/min.(variable speed by inverter)

Output signals Metal relay changeover contact (max 250V/1A)
Metal alarm signal for PLC (out 24V/20mA)
Fault relay changeover contact (max 250V/1A)
Reject device drive, e.g.solenoid valve (24VDC/30mA)

In signals Reject trigger, e.g. optical sensor (24VDC)
Control air pressure of reject device (24VDC)
Control reject success (24VDC)
Remote metal reset push button (24VDC)
Remote lock keyboard against unauthorized access (24VDC)

Logging interface RS232-C interface logging

Options *Printer to log process data according HACCP
*Network interface RS485 (option)
*Remote product selector switch
*Customized conveyor design
*Various belt types (chain link, polyurethan etc.)
*Belt control unit Start/Stop/Reset with frequency inverter
*Alarm flash light
*Alarm horn



Authorized Distributor



CONVEYOR INSTALLATION

FOOD PRODUCTION

STAINLESS STEEL DESIGN

Higher Sensitivity of Sensor Base on FE	MODEL TUNNEL (Width x Height)																			
	80x80	100x80	100x100	130x80	130x110	200x70	200x200	250x80	250x130	250x200	300x120	300x200	400x100	400x200	400x400	500x100	500x200	1000x100	2400x100	2500x100
FE	0.4	0.4	0.5	0.4	0.8	0.5	0.9	0.5	0.7	0.9	0.6	1.5	0.8	1.3	2.4	0.7	3.5	0.9	1.3	1.3
NON FE	0.5	0.5	0.6	0.5	1.1	0.7	1.4	0.6	1.1	1.4	1.0	2.0	1.2	1.9	3.0	1.0	4.5	1.3	1.6	1.8
SUS 316	0.6	0.6	0.7	0.6	1.3	0.8	1.9	0.7	1.5	1.9	1.4	2.6	1.7	2.4	3.6	1.3	5.5	1.7	2.0	2.2
REMARK	Depending on the alloy concerned					Depending on the type of metal										MFA (Metal free Area) Distance from sensor housing is 1.5 times to height of passage Example: H400x1.5 = 600 mm each side of tunnel				

Type	Conveyor	Conveyor speed	25-2000 mm/sec. (1" - 6.6 feet/sec.)
Aperture width	50-1000 mm / 2-40 inch	Out signals	Metal relay changeover contact (max 250V / 1A) Metal alarm signal for PLC (out 24V / 20mA) Fault relay changeover contact (max 250V / 1A) Reject device drive, e.g. solenoid valve (24VDC / 30mA)
Aperture height	50-500 mm / 2-20 inch	In signals	Reject trigger, e.g. optical sensor (24VDC) Control air pressure of reject device (24VDC) Control reject success (24VDC) Remote metal reset push button (24VDC) Remote lock keyboard against unauthorized access (24VDC)
Sensor type	Non divide able	Logging interface	RS232-C interface logging
Installation	typical horizontal, but each angle is applicable	Network interface	RS485 (as option)
Metal free zone Before/after detector	Fix metal = 1.0 x aperture height Moving metal = 1.5 x aperture height	Options	*Pneumatic transversal pusher *Belt revers with metal alarm *Air pressure control signal *Reject confirmation signal *Customized conveyor design *Logging/printer *Test cubes with metal spheres *Various belt types (Chain link, Polyurethan etc.) *Belt control unit Start/Stop/Reset with frequency inverter *Switching reject flap at belt end *Various reject devices *Belt revers with metal alarm *Remote product selector switch *Alarm flashlight *Alarmhorn *Ethernet interface 10MB/s
Power supply	85-264 V / 50-60Hz		
Power Input	100 Watts		
Ambient temperature	-10...+50 °C / 15...120 °F		
Product (food) temperature	-20...+80 °C / 0...180 °F		
Degree of protection	Control unit IP65 (Nema 4x, 12) Sensor IP67 (Nema 6P, 12)		
Sensor head	Stainless steel housing		
Control unit	Stainless housing, attached to the side of sensor head (option: prepared for wall mounting, with link cable)		
Link cable	2.5 m(8.2 feet), with cable protection tube, applies only with wall mounting option for the control unit		
Timer	yes, for reject device control Delay and duration adjustable from 0-9990 ms		



DCW-H-05

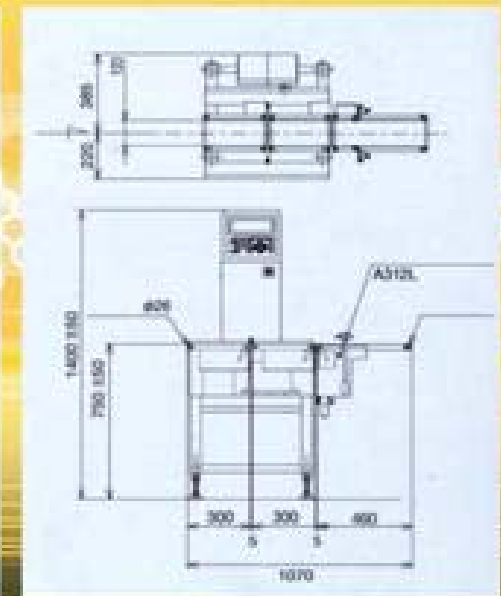
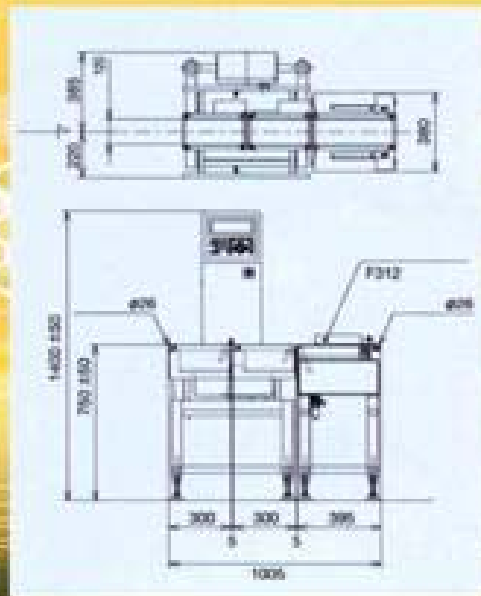
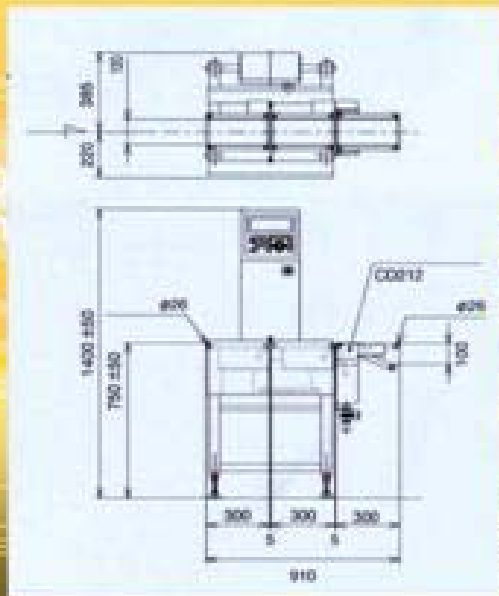
Azano

For small sized product package

The machine is more suitable for small package (Medical products, Food etc.) needed with precise measurement.

Model	DCW-H-01	DCW-H-05	DCW-H-05L
Measuring Range	2-100g	2-500g	2-500g
Selection Level*1	±0.05-0.1g	±0.1g	±0.2g
Maximum Selection Speed*2	100 pcs/min.	180 pcs/min.	120 pcs/min.
Minimum Indication	0.01g	0.1g	0.1g
Width of Conveyor Belt	120mm	120mm	120mm
Length of Measuring conveyor	300mm	300mm	400mm
Product Size	Width	120mm or less	120mm or less
	Length	30-150mm	30-220mm
Belt Speed	18-63m/min.	18-63m/min.	18-63m/min.
Weight of The Body	60kg		
Painted Color	Stainless or maker standard color		

*1: The selection level is variable by products or environment of setting place.
*2: It depends on the length of products.



FUNCTIONAL DESCRIPTIONS



AC 110V
AC 220V



Flow direction
changeable



PSU (Stainless steel)



Changeable the height design



Changeable belt speed
(Auto speed control function)



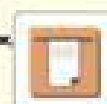
Able to design customized
conveyors



Easy cleaning,
attachable function
on conveyor



Data collection function 2,
Possible to indicate lot number,
Overweight, below weight,
normal graph, Histogram



Printer (Option),
Collective data printing
function with attached printer



Selectable coating color

Authorized Distributor:

DCW-L-10K

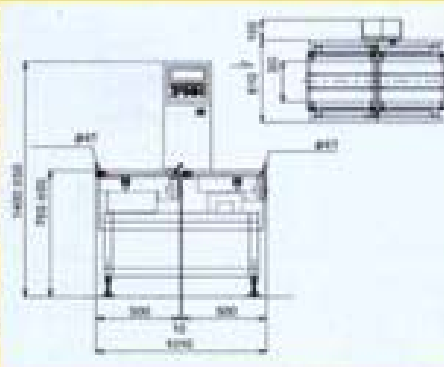
AZANO

For medium and large sized product package. Suitable for missing product measuring in the box package.

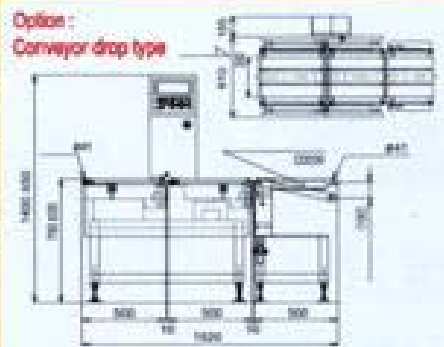
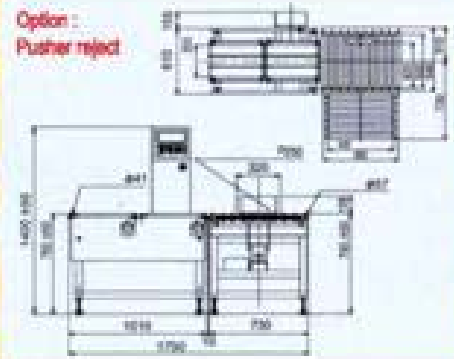
Model	DCW-L-10K	
Measuring Range	200g-10kg	
Selection Accuracy	+5g-10g	
Maximum Selection Speed*1	60 pcs/min.	
Minimum Indication	2g	
Width of Conveyor Belt	300mm	
Length of Measuring conveyor	500mm	
Product Size	Width	50-300mm or less
	Length	80-350mm
Belt Speed	20-40m/min.	
Weight of The Body	95kg	
Painted Color	Stainless or maker standard color	

*1: The selection level is variable by products or environment of setting place.

*2: it depends on the length of products.



Option :
Pusher reject



Option :
Conveyor drop type



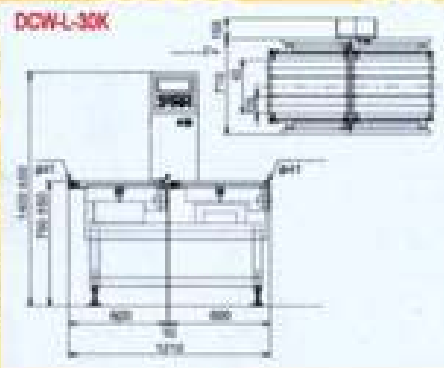
DCW-L-30K

It is suitable for measuring big sized box or sack package.

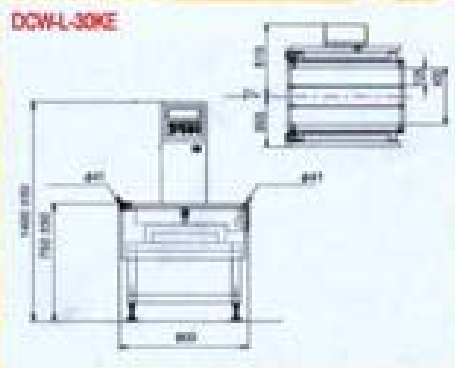
Model	DCW-L-30K	DCW-L-30KE
Measuring Range	20g-25kg	
Selection Accuracy	±10g-20g	
Maximum Selection Speed*1	50 pcs/min.	40 pcs/min.
Minimum Indication	5g	
Width of Conveyor Belt	400mm	
Length of Measuring conveyor	600mm	800mm
Product Size	Width	50-400mm or less
	Length	50-400mm / 50-500mm
Belt Speed	20-50m/min.	
Weight of The Body	120kg	130kg
Painted Color	Stainless or maker standard color*2	

*1: The selection level is variable by products or environment of setting place.

*2: it depends on the length of products.



DCW-L-30K



DCW-L-30KE



Option :
Pusher reject



Authorized Distributor:



DCW-L-50K

Azano

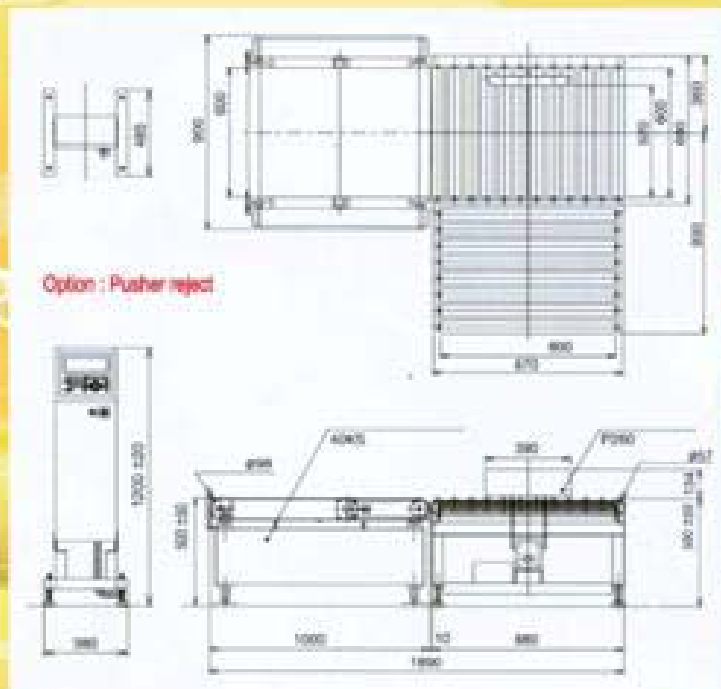
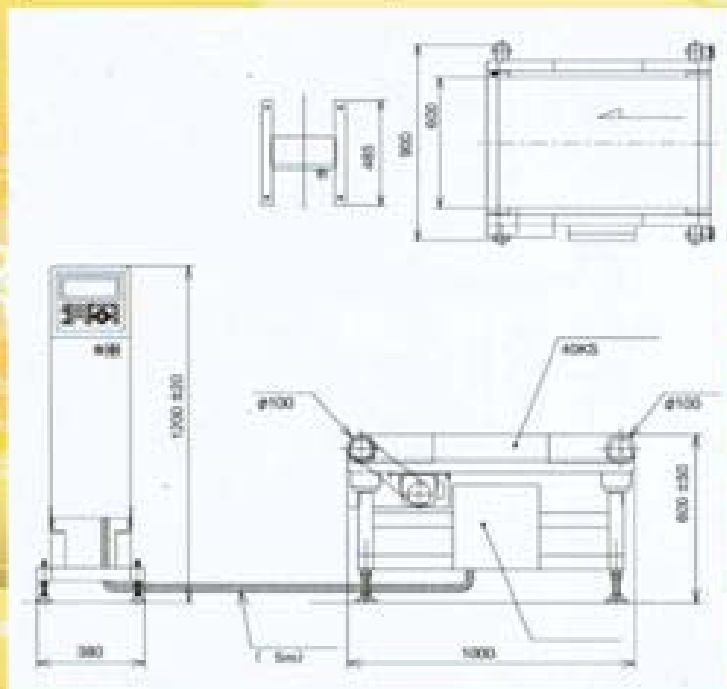
Suitable for measuring and selection of big sized sack package.

Model	DCW-L-50KE	
Measuring Range	100g-50kg	
Selection Accuracy	± 10g-20g	
Maximum Selection Speed*1	30 pcs/min.	
Minimum Indication	10g	
Width of Conveyor Belt	600mm	
Length of Measuring conveyor	1000mm	
Product Size	Width	600mm or less
	Length	150-800mm
Belt Speed	10-40m/min.	
Weight of The Body	150kg	
Painted Color	Stainless or maker standard color	

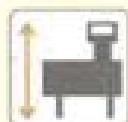


REMARK : Special made to order consult manufacturer.

*1: It depends on the length of products.



FUNCTIONAL DESCRIPTIONS



Changeable line height design



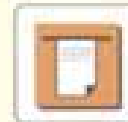
Changeable function for direction design



Conveyor special design function



Collection function 2



Printer (option)



Selectable coating color

Authorized Distributor

DCW-M-2K

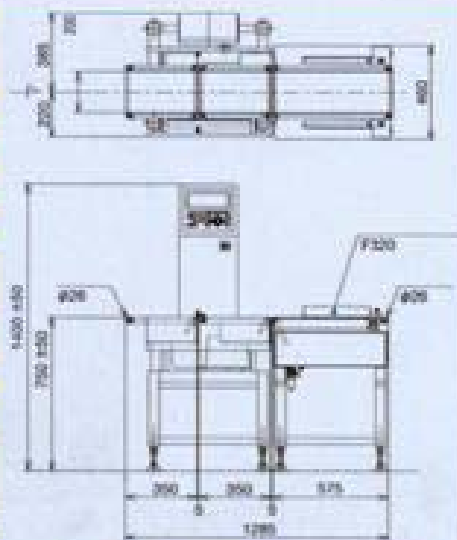
Azono

For small and medium sized product package
Can be customized by product line parameters.

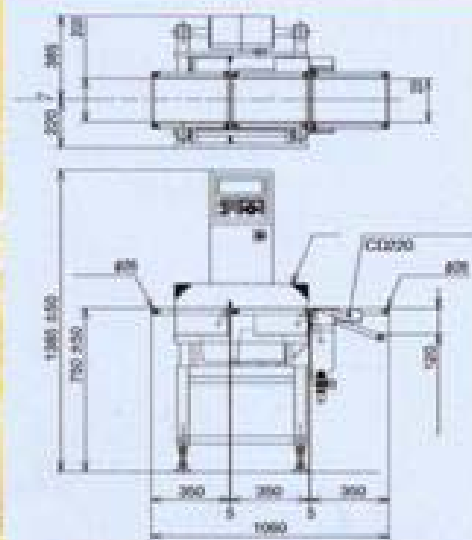
Model	DCW-M-2K	DCW-M-2KL
Measuring Range	2-2000g	2-2000g
Selection Level*1	± 0.2g	± 0.3g
Maximum Selection Speed*2	150 pcs/min.	120 pcs/min.
Minimum Indication	0.1g	0.1g
Width of Conveyor Belt	200mm	200mm
Length of Measuring conveyor	350mm	460mm
Product Size	Width	200mm or less
	Length	30-300mm
Belt Speed	15-59m/min.	15-55m/min.
Weight of The Body	70kg	
Painted Color	Stainless or maker standard color	



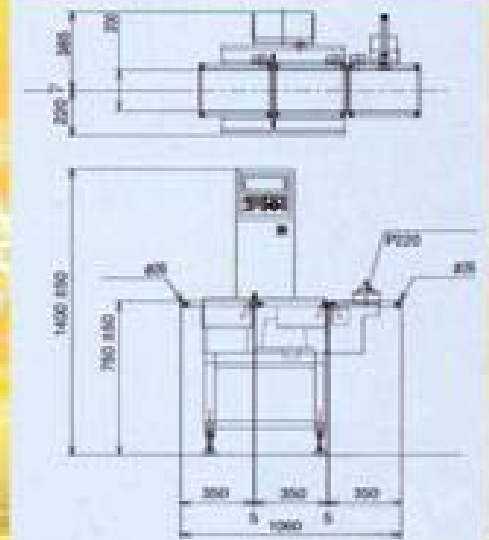
*1: The selection level is variable by products or environment of setting place.
*2: It depends on the length of products.



Option : Flipper arm reject



Conveyor drop type



Pusher type (Belt type)

FUNCTIONAL DESCRIPTIONS



AC 110V
AC 220V



Flap direction
changeable



SUS (Stainless steel)



Changeable line height design



Changeable belt speed
(Auto speed control function)



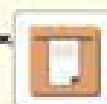
Able to design customized
conveyors



Easy cleaning,
attachable function
on conveyor



Data selection function 2.
Possible to indicate lot number,
Overweight, below weight,
normal graph, Histogram



Printer (Optional).
Collective data printing
function with attached printer



Selectable coating color

Authorized Distributor:

DCW-M-3K

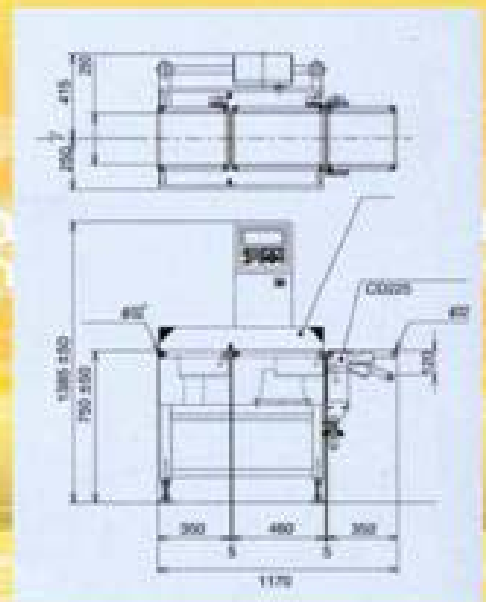
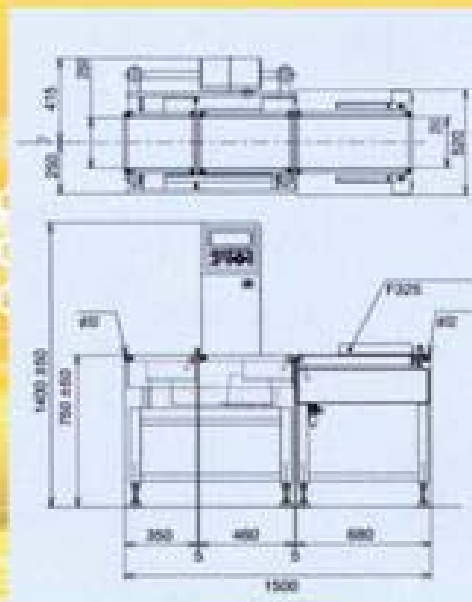
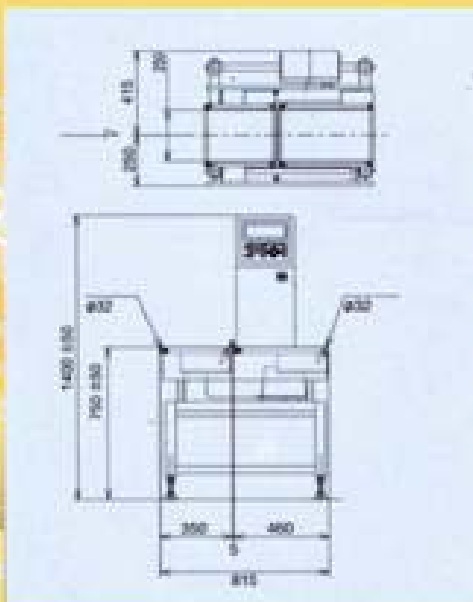
AZANO

For medium sized product package
Ideal for medium sized carton, box type product, etc.

Model	DCW-M-3K	
Measuring Range	2-3000g	
Selection Level*1	± 0.3g	
Maximum Selection Speed*2	120 pcs/min.	
Minimum Indication	0.1g	
Width of Conveyor Belt	250mm	
Length of Measuring conveyor	460mm	
Product Size	Width	250mm or less
	Length	30-400mm
Belt Speed	15-55m/min.	
Weight of The Body	70kg	
Painted Color	Stainless or maker standard color	



*1: The selection level is variable by products or environment of setting place.
*2: It depends on the length of products.



FUNCTIONAL DESCRIPTIONS



AC 110V
AC 220V



Flow direction
changeable



SUS (Stainless steel)



Changeable the height design



Changeable belt speed
(Auto speed control function)



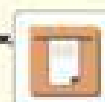
Able to design customized
conveyors



Easy cleaning,
effective function
on conveyor



Data selection function 2,
Possible to indicate lot number,
Overweight, below weight,
normal graph, Histogram



Printer (Optional),
Collective data printing
function with attached printer



Selectable weighing cone

Authorized Distributor: