Product Change Notification: JPZA-12OYQD087

Date:

05-Oct-2026

Product Category:

8-Bit Microcontrollers, Capacitive Touch Sensors

Notification Subject:

CCB 8273 Final Notice: Qualification of OSE as an additional final test site and additional scan and pack site for selected ATmega16, AT42QT1481, ATmega324PB, AT42QT2640, ATmega2561 and ATmega328PB device families available in various packages.

Affected CPNs:

JPZA-12OYQD087_Affected_CPN_10052026.pdf
JPZA-12OYQD087_Affected_CPN_10052026.csv

PCN Status: Final Notification

PCN Type: Manufacturing Change

Microchip Parts Affected: Please open one of the files found in the Affected CPNs section.
Note: For your convenience Microchip includes identical files in two formats (.pdf and .xls)

Description of Change: Qualification of OSE as an additional final test site and additional scan and pack site for selected ATmega16, AT42QT1481, ATmega324PB, AT42QT2640, ATmega2561 and ATmega328PB device families available in various packages.

Pre and Post Summary Changes:

	Pre Change	**Post Change**		**Change (Yes/No)**
Final Test Site	ASE Test (ASE9)	ASE Test (ASE9)	Orient Semiconductor Electronics, Ltd (OSE)	Yes

Scan and Pack Site	ASE Test (ASE9)	ASE Test (ASE9)	Orient Semiconductor Electronics, Ltd (OSE)	Yes
Packing Material/Method	See Pre and Post Change Summary for Comparison			Yes

Impacts to Datasheet: None

Change Impact: None

Reason for Change: To improve manufacturability and on-time delivery performance by qualifying OSE as an additional final test site and additional scan and pack site.

Change Implementation Status: In Progress

Estimated First Ship Date: 04 September 2026 (date code: 2636)

Note Below EFSD: Please be advised that after the estimated first ship date customers may receive pre and post change parts.

Timetable Summary:

	September 2026			
Work Week	36	37	38	39
Qual Report Availability	X			
Final PCN Issue Date	X			
Estimated Implementation Date	X			

Method to Identify Change: Traceability Code

Qualification Report: Please open the attachments included with this PCN labeled as PCN_#_Qual_Report.

Revision History: September 04, 2026: Issued final notification.
October 05, 2026: Re-issued final notification. Updated Pre and Post Change Summary attachment for 64L TQFP package to include Tray Bag.

Note: The change described in this PCN does not alter Microchip's current regulatory compliance regarding the material content of the applicable product.

Attachments:

PCN_JPZA-12OYQD087_Qualification_Report.pdf
PCN-JPZA-12OYQD087-PRE AND POST CHANGE SUMMARY 32L VQFN (5x5x0.9mm).pdf
PCN-JPZA-12OYQD087-PRE AND POST CHANGE SUMMARY 44L TQFP (10x10x1mm).pdf
PCN-JPZA-12OYQD087-PRE AND POST CHANGE SUMMARY 64L TQFP (14x14x1mm).pdf

Please contact your local **Microchip sales office** with questions or concerns regarding this notification.

Terms and Conditions:

If you wish to receive Microchip PCNs via email please register for our PCN email service at our **PCN home page** select register then fill in the required fields. You will find instructions about registering for Microchips PCN email service in the **PCN FAQ** section.

If you wish to change your PCN profile, including opt out, please go to the **PCN home page** select login and sign into your myMicrochip account. Select a profile option from the left navigation bar and make the applicable selections.

JPZA-12OYQD087 - CCB 8273 Final Notice: Qualification of OSE as an additional final test site and additional scan and pack site for selected ATmega16, AT42QT1481, ATmega324PB, AT42QT2640, ATmega2561 and ATmega328PB device families available in various packages.

Affected Catalog Part Numbers (CPN):

ATMEGA324PB-AN

AT42QT1481-AN

AT42QT1481-ANR

ATMEGA324PB-ANR

ATMEGA324PB-AUR

ATMEGA16-16AUR

AT42QT2640-AUR

AT42QT1481-AUR

ATMEGA2561-16AU

ATMEGA2561V-8AU

ATMEGA2561-16AUR

ATMEGA2561V-8AUR

ATMEGA328PB-MU

ATMEGA328PB-MN

ATMEGA328PB-MNR

ATMEGA328PB-MUR

ATMEGA16L-8AU

ATMEGA16L-8AUR

ATMEGA16-16AU

AT42QT1481-AU

ATMEGA324PB-AU

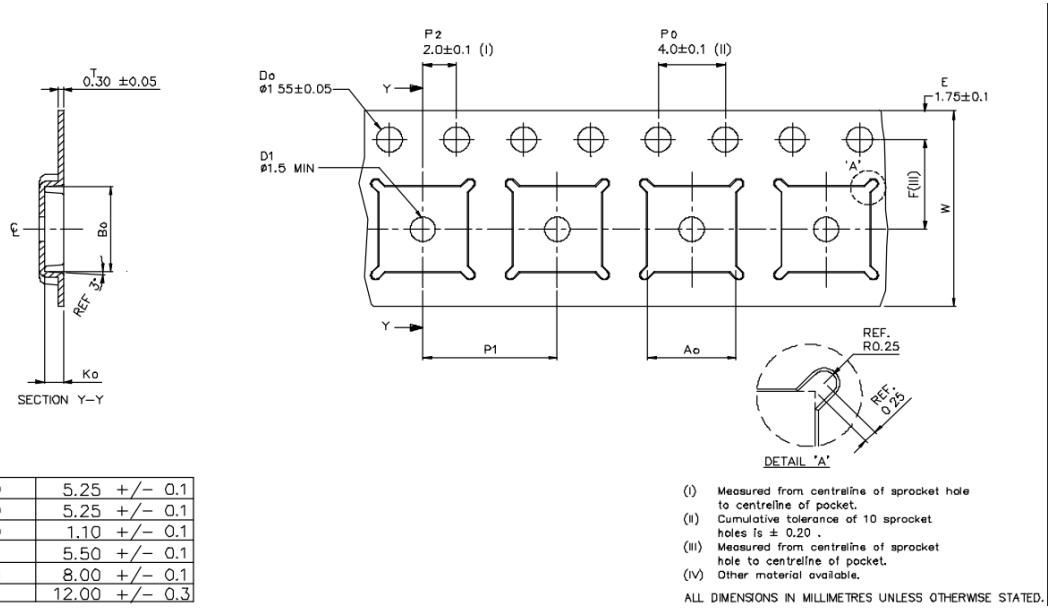
CCB 8273
PCN #: JPZA-12OYQD087
Pre and Post Change Summary



A Leading Provider of Smart, Connected and Secure Embedded Control Solutions

CARRIER TAPE - 32L VQFN 5x5x0.9mm

ASE9

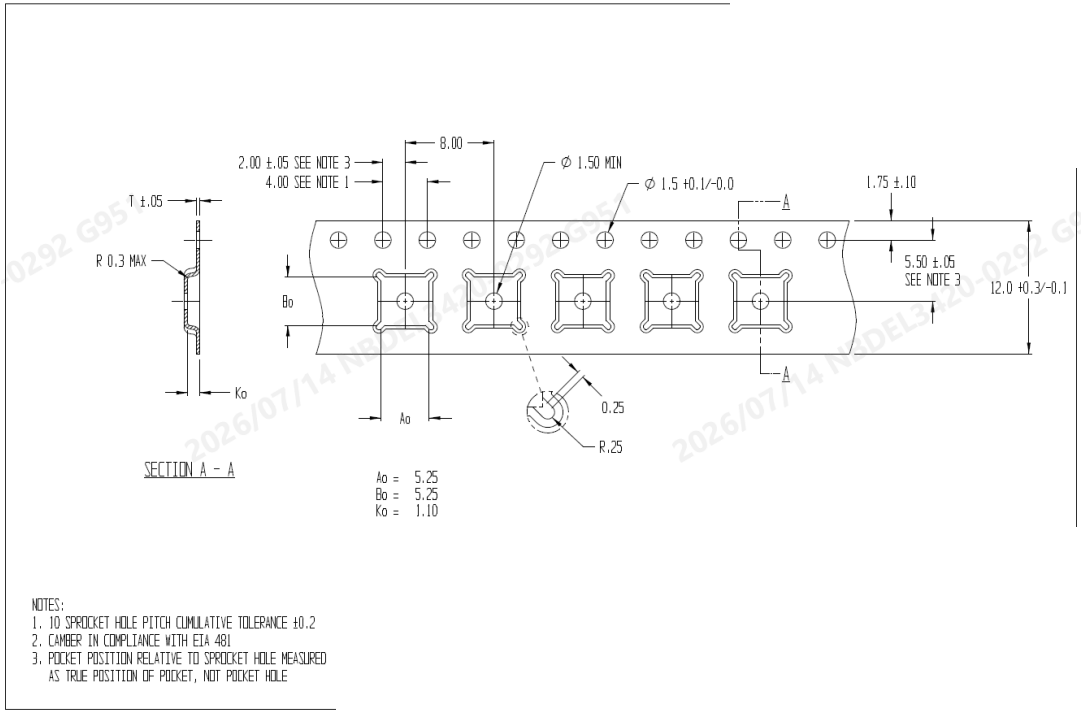


Ao	5.25 +/− 0.1
Bo	5.25 +/− 0.1
Ko	1.10 +/− 0.1
F	5.50 +/− 0.1
P1	8.00 +/− 0.1
W	12.00 +/− 0.3

(I) Measured from centreline of sprocket hole to centreline of pocket.
(II) Cumulative tolerance of 10 sprocket holes is ± 0.20 .
(III) Measured from centreline of sprocket hole to centreline of pocket.
(IV) Other material available.

ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED.

OSE



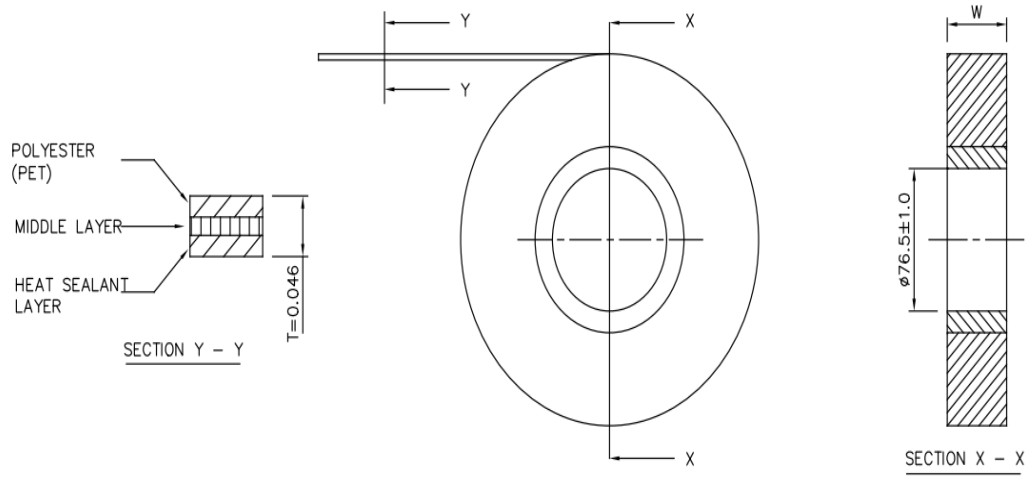
NOTES:
1. 10 SPROCKET HOLE PITCH CUMULATIVE TOLERANCE ±0.2
2. CAMBER IN COMPLIANCE WITH EIA 481
3. POCKET POSITION RELATIVE TO SPROCKET HOLE MEASURED AS TRUE POSITION OF POCKET, NOT POCKET HOLE

Plant	W (mm)	P (mm)	A0 (mm)	B0 (mm)	K0 (mm)	Thickness (mm)
ASE9	12.00±0.3	8.00±0.1	5.25±0.1	5.25±0.1	1.10±0.1	0.30±0.05
OSE	12.00+0.3/-0.1	8.00±0.2	5.25±0.2	5.25±0.2	1.10±0.2	0.30±0.05

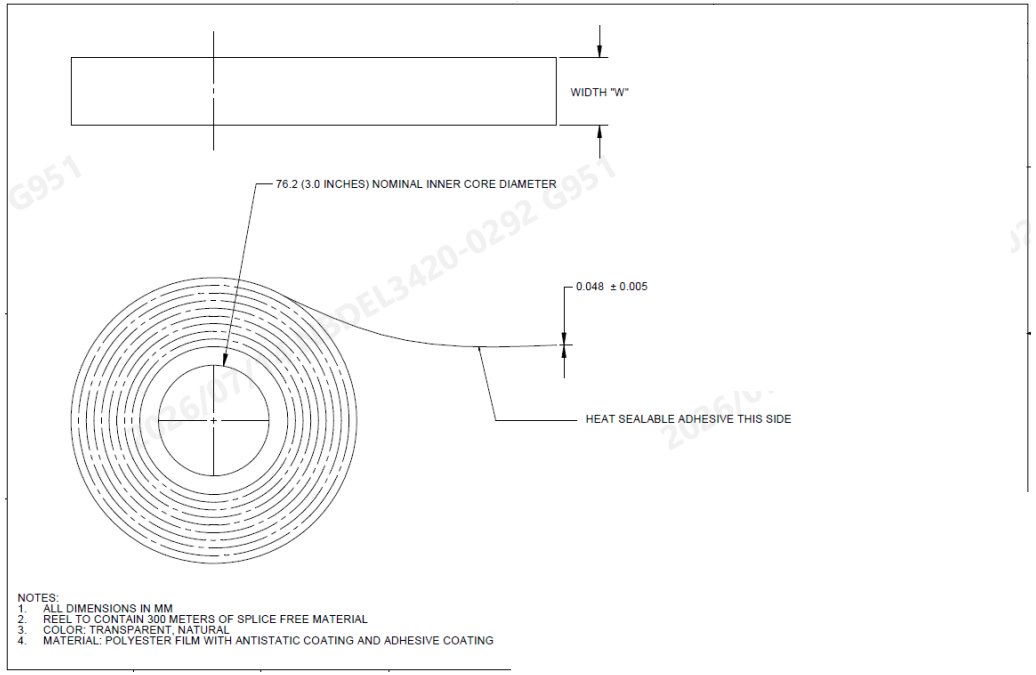
MICROCHIP

COVER TAPE - 32L VQFN 5x5x0.9mm

ASE9



OSE

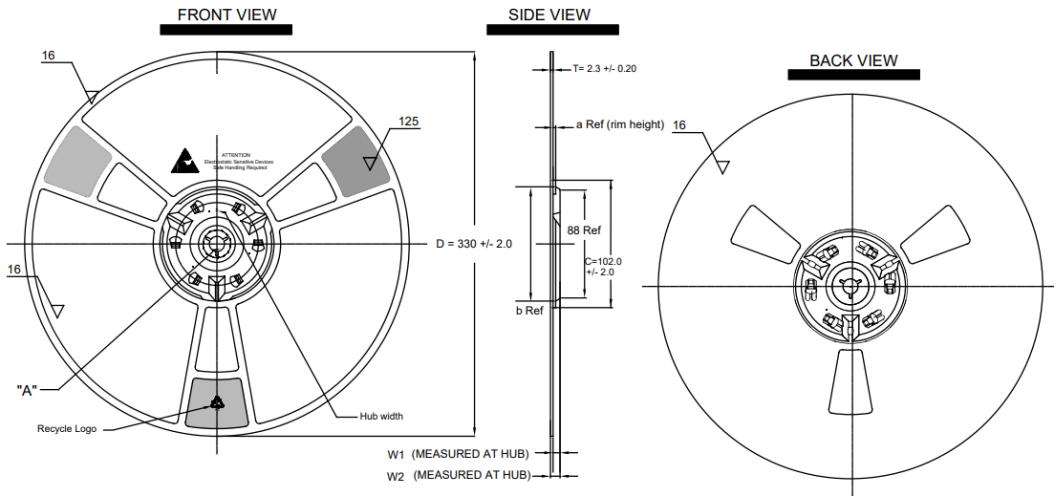


Plant	Width W (mm)	Thickness T (mm)	Color	Sealing Methodology
ASE9	9.2 +0.1/-0.1	0.046 ± 0.005	Clear	Heat sealing
OSE	9.2 +0.1/-0.1	0.048 ± 0.005	Clear	Heat sealing

MICROCHIP

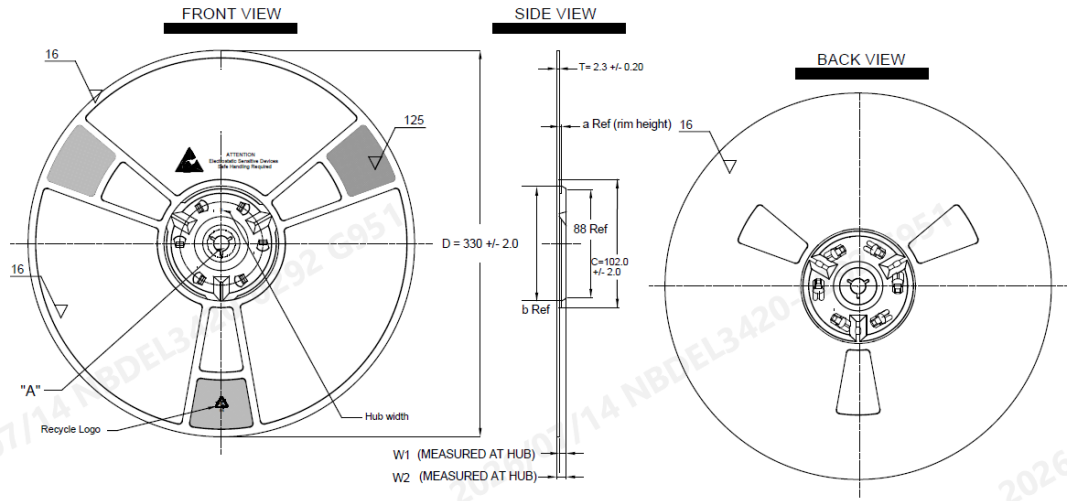
PLASTIC REEL - 32L VQFN 5x5x0.9mm

ASE9





OSE



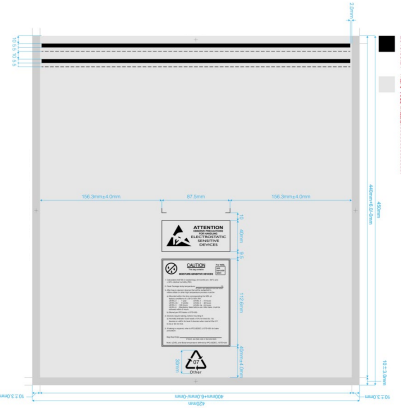
RD33004SW-BL	4mm	4.4mm	7.1mm	1.5	96.5
RD33008SW-BL	8mm	8.4mm	11.1mm	1.5	96.5



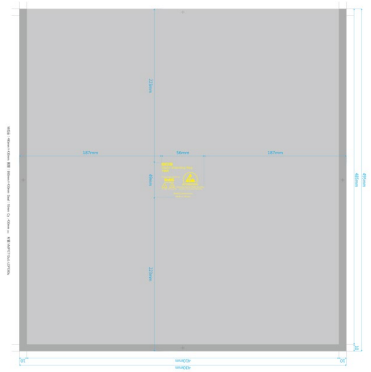
Plant	Reel Diameter (mm)	Reel Hub Size (mm)	Reel Width Max (mm)	Color
ASE9	330 ±2	102 ±2	18.2	White
OSE	330 ±2	102 ±2	18.2	Blue

Bag - 32L VQFN 5x5x0.9mm

ASE9



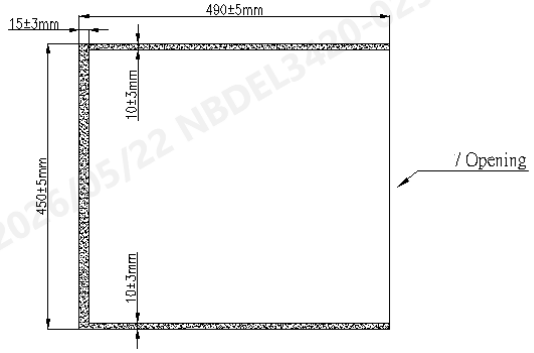
Moisture Barrier Bag



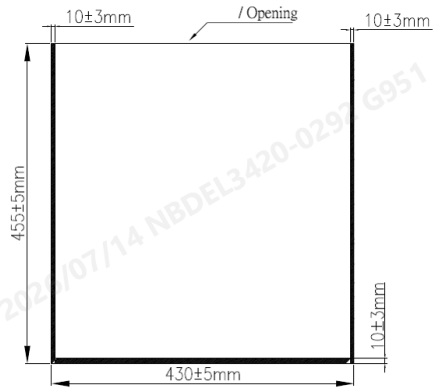


Static Shielding Bag

OSE



Moisture Barrier Bag

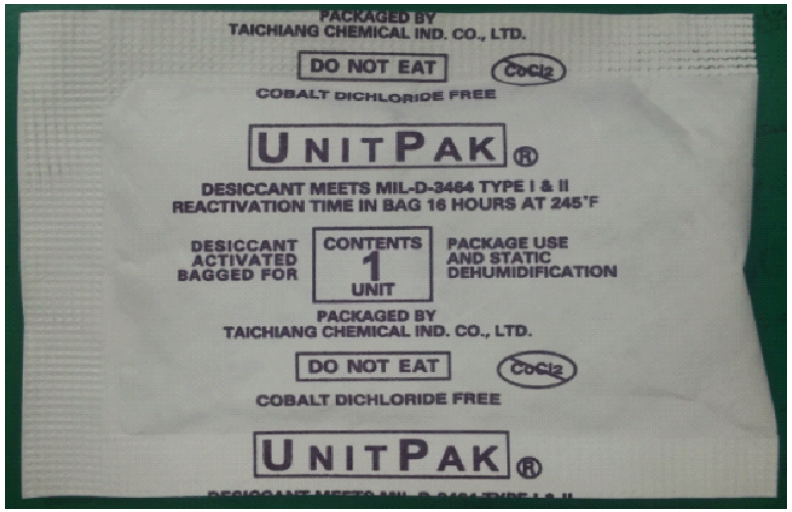


Static Shielding Bag

Plant	Bag type	Bag type	Length (mm)	Width (mm)	Thickness (mm)
ASE9	MSL- 1	Static Shielding Bag	495 +5/-5	430 +5/-5	0.07
	MSL- 3	Moisture Barrier Bag	450 +6/-0	420 +6/-0	0.18
OSE	MSL-1	Static Shielding Bag	455 +5/-5	430 +5/-5	0.11+0.01/-0.01
	MSL-3	Moisture Barrier Bag	490 +5/-5	450 +5/-5	0.15

MICROCHIP

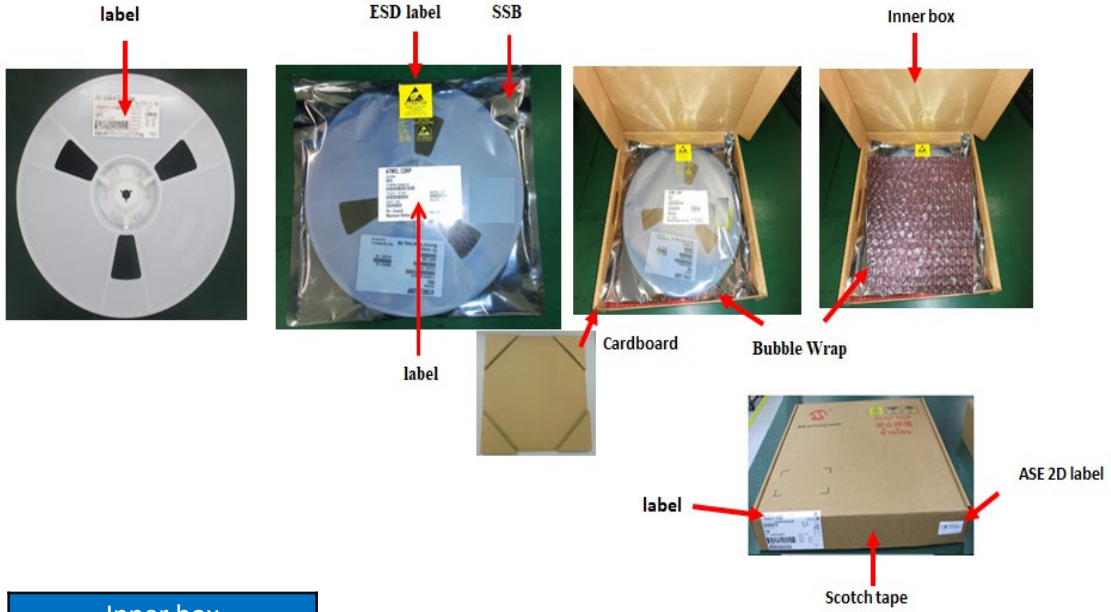
Desiccant - 32L VQFN 5x5x0.9mm

ASE9	OSE
 Desiccant each unit is 66 g	 Desiccant each unit is 33 g

MICROCHIP

Tape and Reel Packing Method Non-Dry Pack (MSL-1) - 32L VQFN 5x5x0.9mm

ASE9



Inner box
Dimension W x L x H (cm)
37x35.1x5.3

OSE

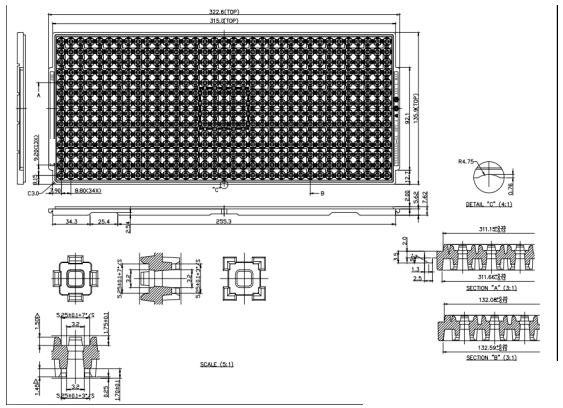


Inner box
Dimension W x L x H (cm)
35.6x34x5

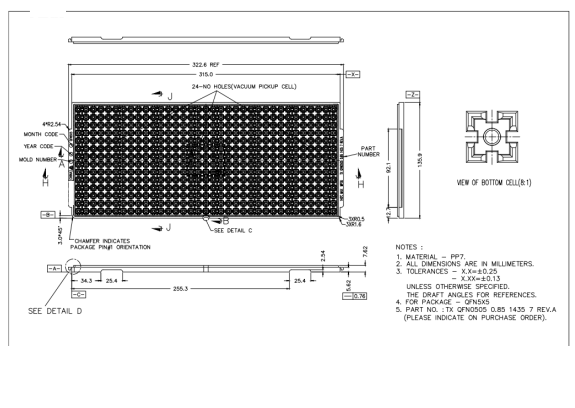
Plant	MSL Level	Desiccant	Humidity Indicator Card
ASE9	MSL-1	Not Required	Not Required
OSE	MSL-1	Not Required	Not Required

TRAY (MSL-1) - 32L VQFN 5x5x0.9mm

ASE9

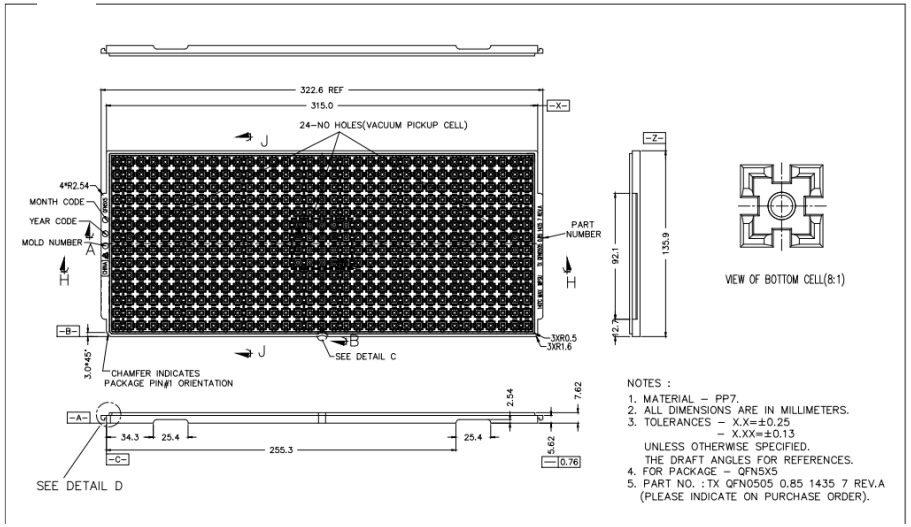


Supplier A



Supplier B

OSE

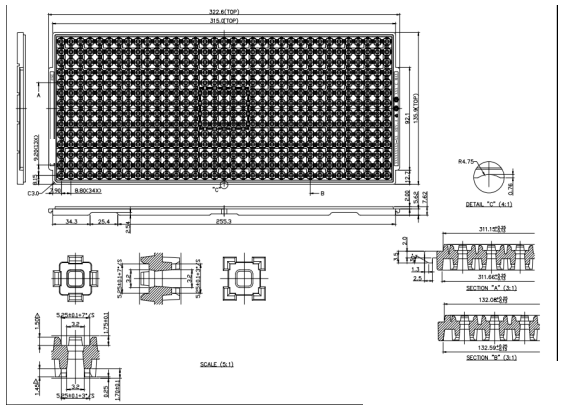


Supplier B

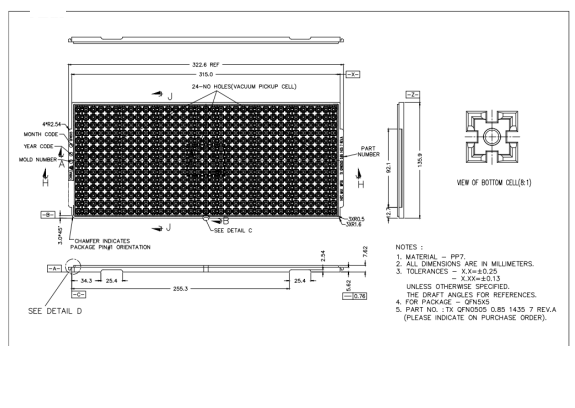
Plant	Supplier Part	Bakeable (Temp C)	Row	Col	Unit per Tray	Color	Tray Stack
ASE9	Supplier A	150 °C MAX	14	35	490	Black	10+1
	Supplier B	140 °C MAX	14	35	490	Black	10+1
OSE	Supplier B	140 °C MAX	14	35	490	Black	10+1

TRAY (MSL-3) - 32L VQFN 5x5x0.9mm

ASE9

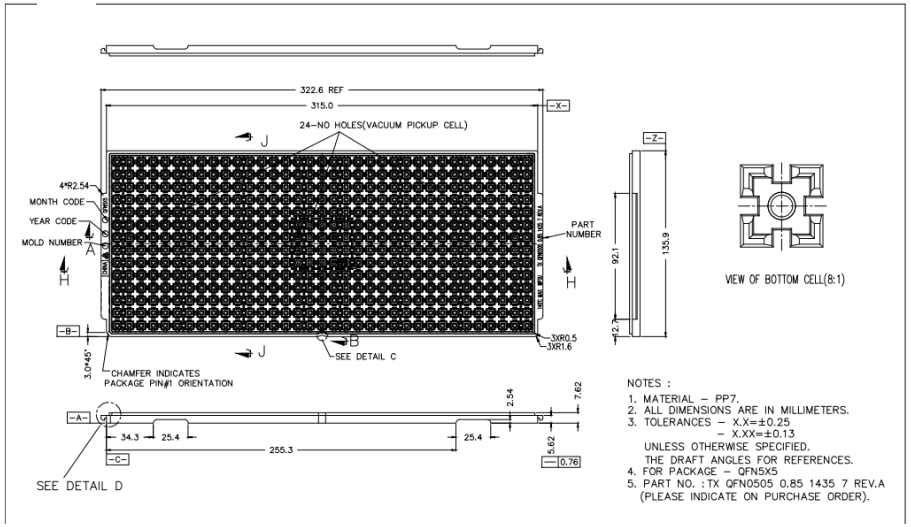


Supplier A



Supplier B

OSE

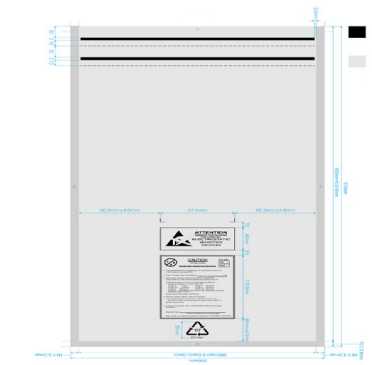


Supplier B

Plant	Supplier Part	Bakeable (Temp C)	Row	Col	Unit per Tray	Color	Tray Stack
ASE9	Supplier A	150 °C MAX	14	35	490	Black	10+1
	Supplier B	140 °C MAX	14	35	490	Black	10+1
OSE	Supplier B	140 °C MAX	14	35	490	Black	10+1

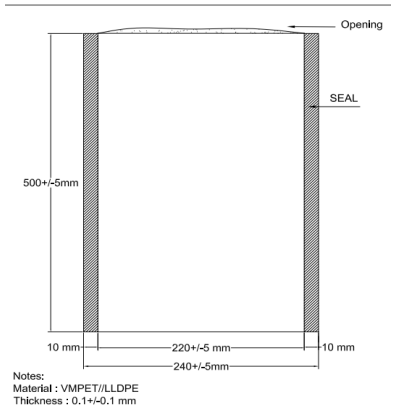
TRAY Bag - 32L VQFN 5x5x0.9mm

ASE9





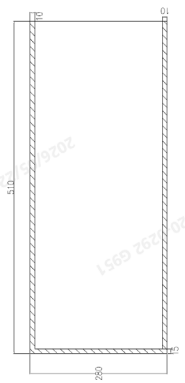
Moisture Barrier Bag





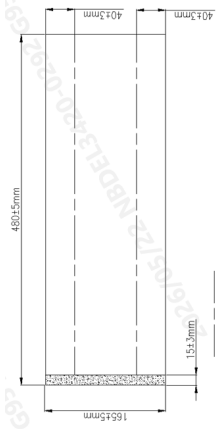
Static Shielding Bag

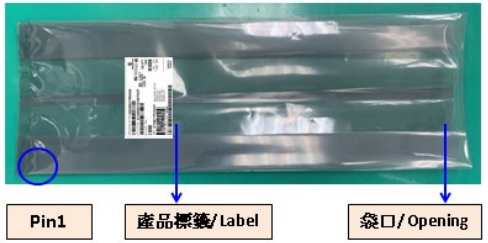
OSE





Moisture Barrier Bag

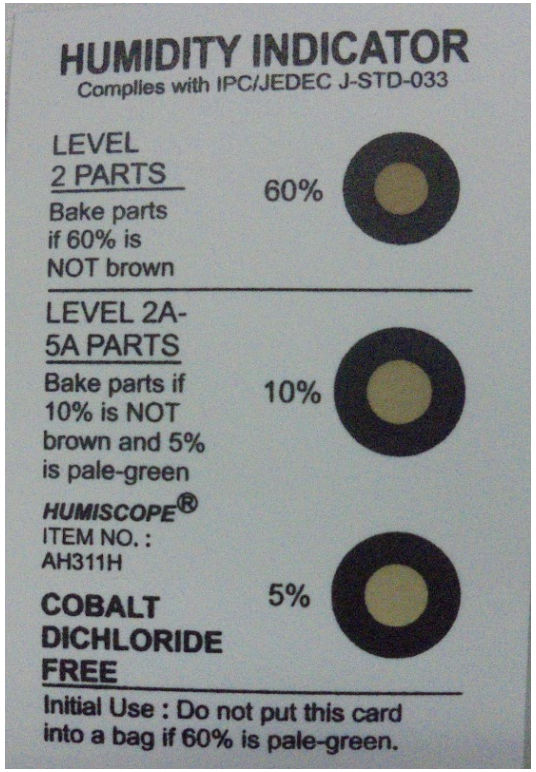
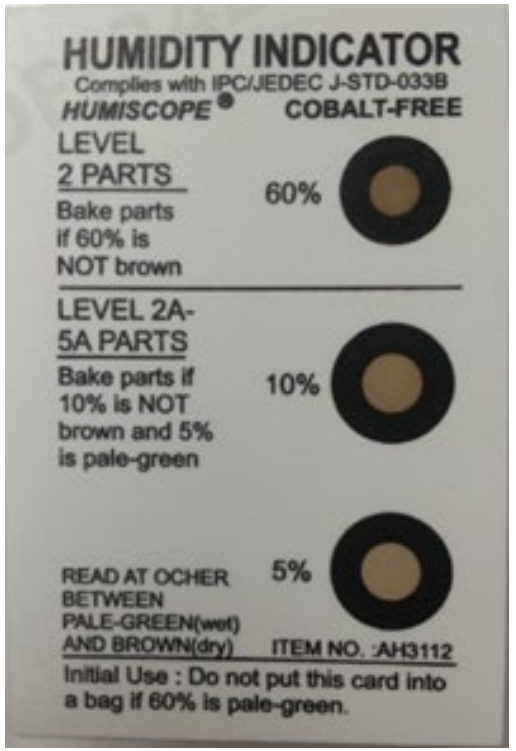




Static Shielding Bag

Plant	Moisture Sensitivity Level	Bag type	Length (mm)	Width (mm)	Thickness (mm)
ASE9	MSL- 1	Static Shielding Bag	500+5/-5	240+5/-5	0.1
	MSL- 3	Moisture Barrier Bag	570 +6/-0	300 +6/-0	0.18
OSE	MSL- 1	Static Shielding Bag	480+5/-5	165+5/-5	0.11
	MSL- 3	Moisture Barrier Bag	510+3/-3	280+3/-3	0.16

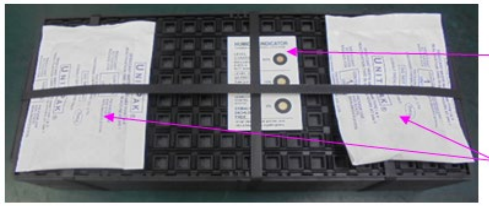
TRAY Humidity Indicator Card (HIC) - 32L VQFN 5x5x0.9mm

ASE9	OSE
	
▪ 3 Dots (5%, 10%, 60%) ▪ Cobalt Free	▪ 3 Dots (5%, 10%, 60%) ▪ Cobalt Free

TRAY Packing Method for Dry Pack (MSL-3) - 32L VQFN 5x5x0.9mm

ASE9





MBB Label







Use Cardboard to fill space for partial box

Inner box Bubble Wrap

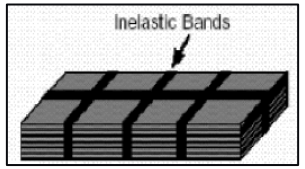
MSID sticker Scotch tape



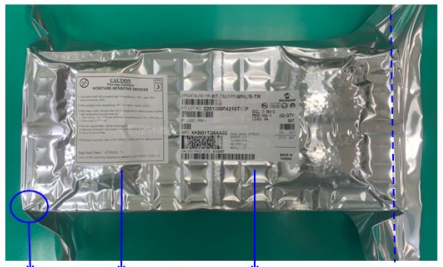
ASE 2D label Label

Inner box
Dimension W x L x H (cm)
16.2x37.1x8.8

OSE











Inner box
Dimension W x L x H (cm)
16.2x37.1x8.8



Plant	MSL Level	Desiccant	Humidity Indicator Card	Baking Condition		
				Bake Time at 125C +10/-0 C (Hours)	Exposure Time from Bake (Hours)	Customer Floor Life (Hours)
ASE9	MSL-3	2 units	1 pc	4 Hours	6 hours	168 hours
OSE	MSL-3	2 units	1 pc	4 Hours	8 hours	168 hours

MICROCHIP

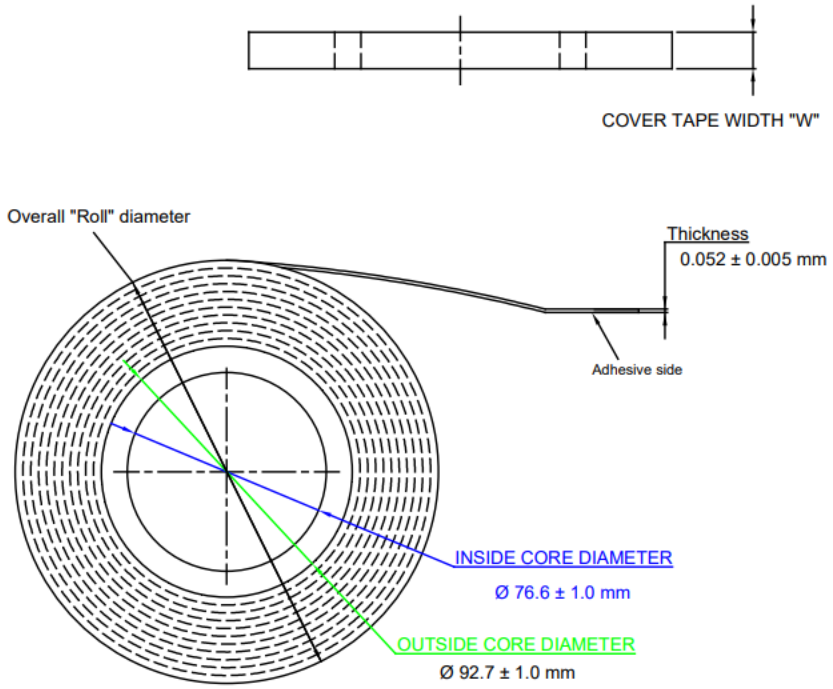
CCB 8273
PCN ID: JPZA-12OYQD087
Pre and Post Change Summary



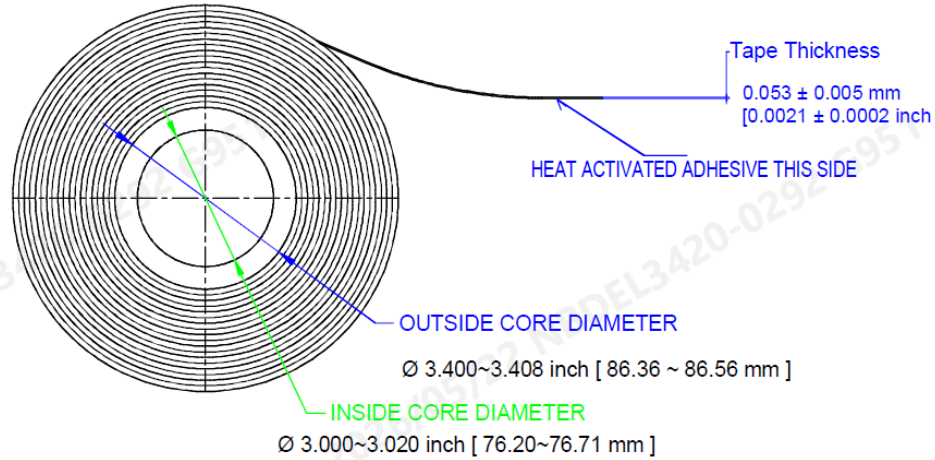
A Leading Provider of Smart, Connected and Secure Embedded Control Solutions

COVER TAPE - 44L TQFP (10x10x1mm)

ASE9



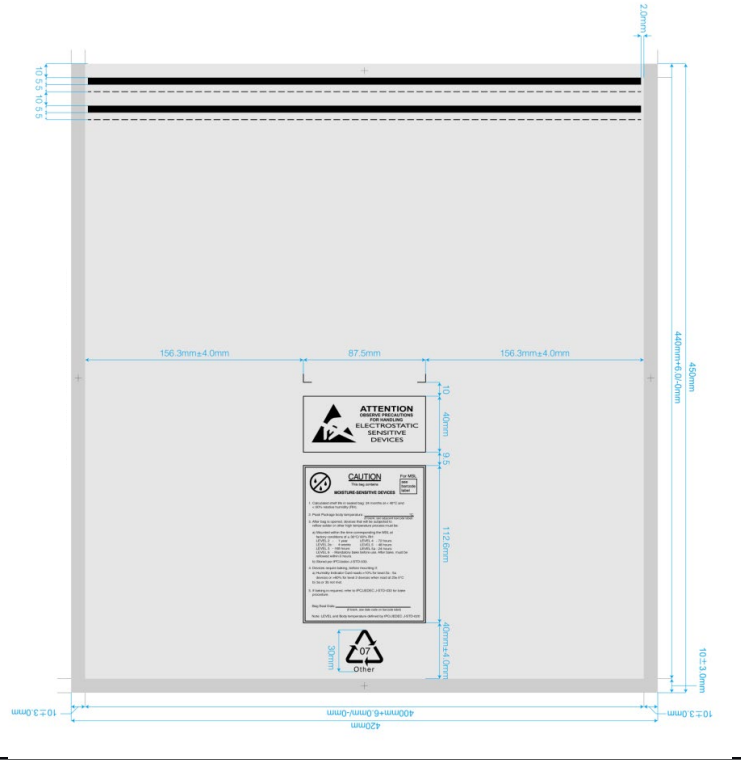
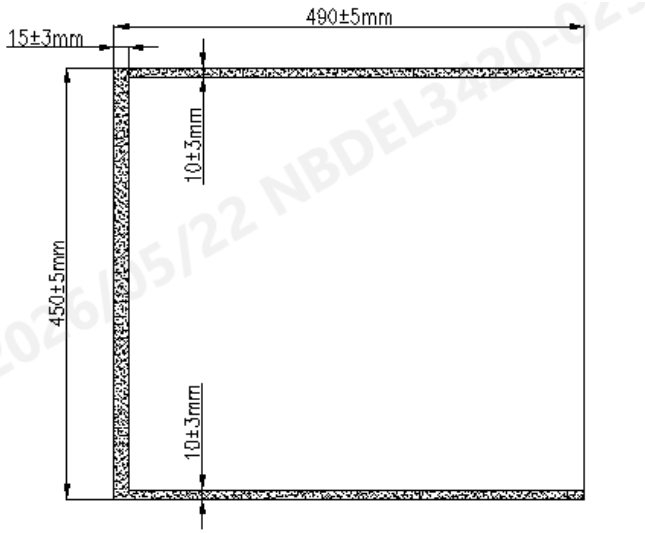
OSE



Plant	Width W (mm)	Thickness T (mm)	Color	Sealing Methodology
ASE9	21.3 ± 0.1	0.052 ± 0.005	Clear	Heat sealing
OSE	21.0 ± 0.1	0.053 ± 0.005	Clear	Heat sealing

MICROCHIP

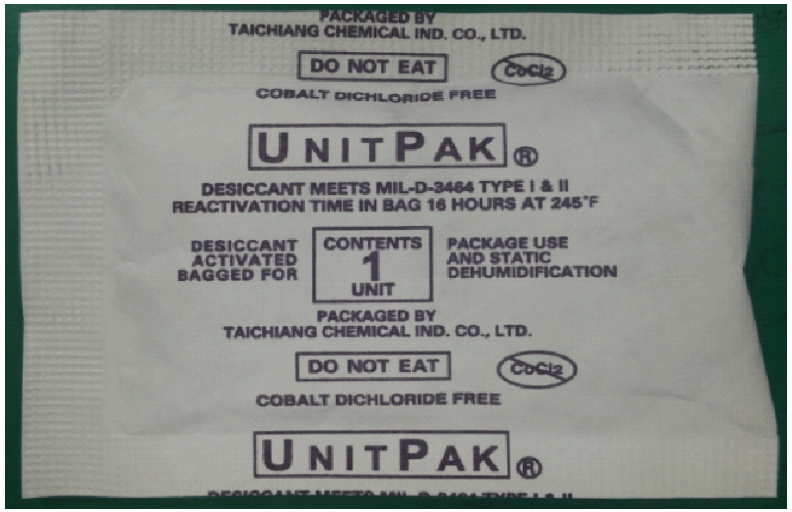
Moisture Barrier Bag - 44L TQFP (10x10x1mm)

ASE9	OSE
	

Plant	Bag type	Bag type	Length (mm)	Width (mm)	Thickness (mm)
ASE9	MSL- 1	Moisture Barrier Bag	450 +6/-0	420 +6/-0	0.18
	MSL- 3	Moisture Barrier Bag	450 +6/-0	420 +6/-0	0.18
OSE	MSL-1	Moisture Barrier Bag	490 +5/-5	450 +5/-5	0.15
	MSL-3	Moisture Barrier Bag	490 +5/-5	450 +5/-5	0.15

MICROCHIP

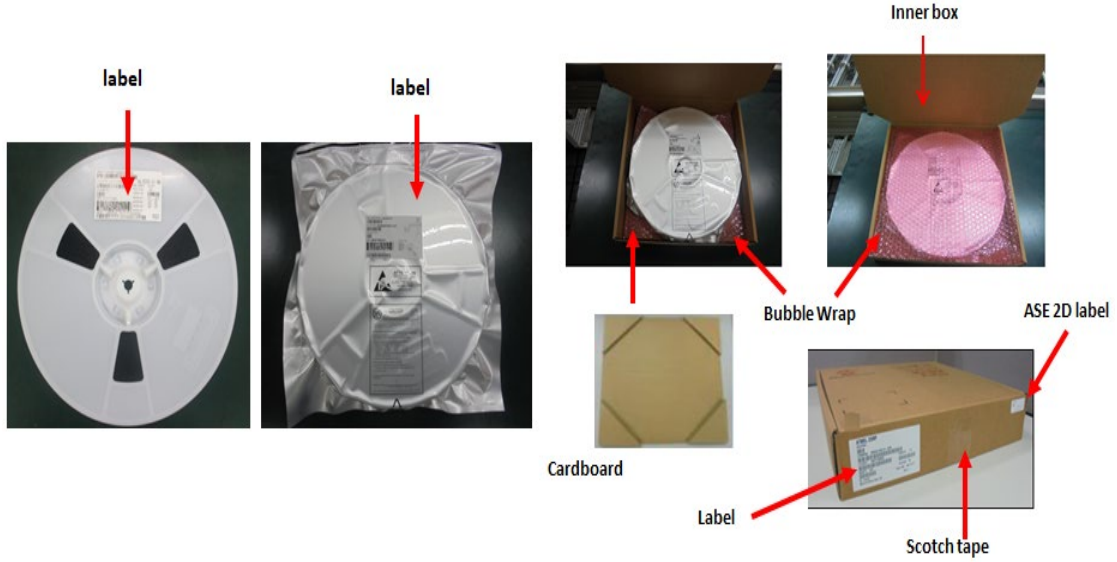
Desiccant - 44L TQFP (10x10x1mm)

ASE9	OSE
 Desiccant each unit is 66 g	 Desiccant each unit is 33 g

MICROCHIP

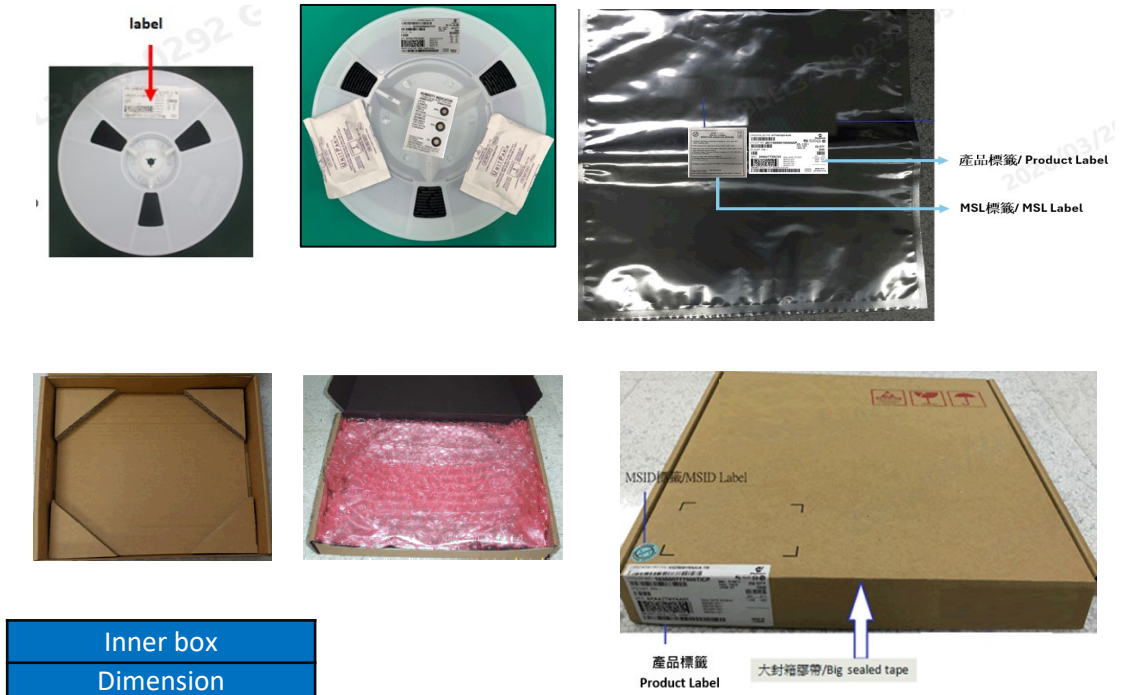
Tape and Reel Packing Method for 44L TQFP (10x10x1mm) (MSL-1)

ASE9



Inner box
Dimension W x L x H (cm)
37x35.3x7.8

OSE



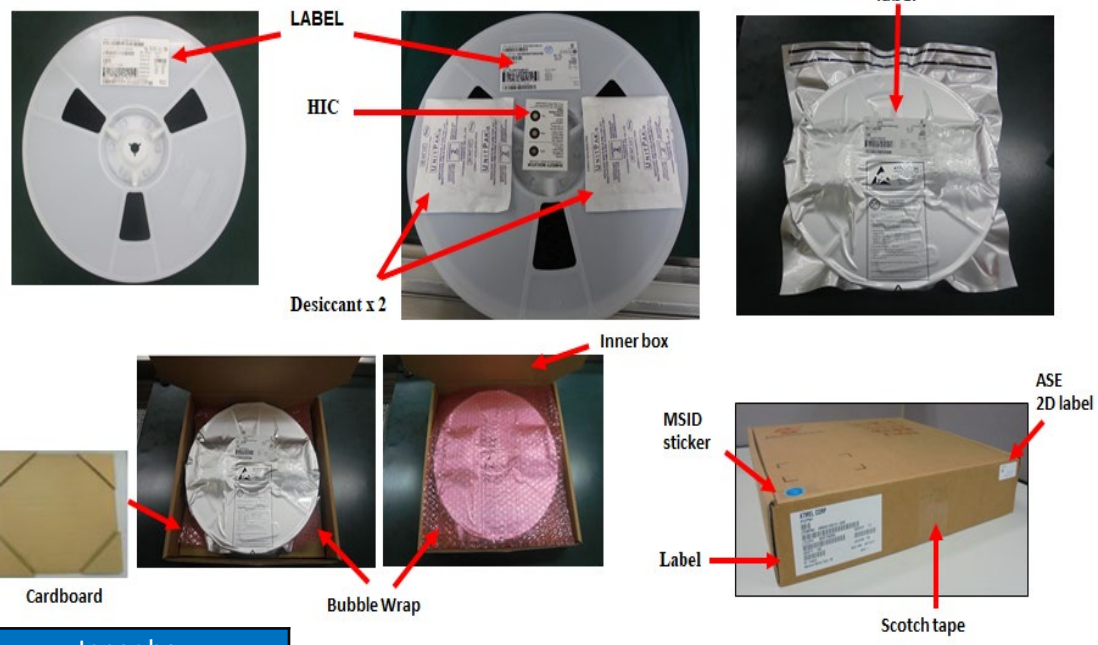
Inner box
Dimension W x L x H (cm)
37x35.3x7.8

Plant	MSL Level	Desiccant	Humidity Indicator Card
ASE9	MSL-1	Not Required	Not Required
OSE	MSL-1	Required	Required

MICROCHIP

Tape and Reel Packing Method for 44L TQFP (10x10x1mm) (MSL-3)

ASE9



Inner box
Dimension W x L x H (cm)
37x35.3x7.8

OSE



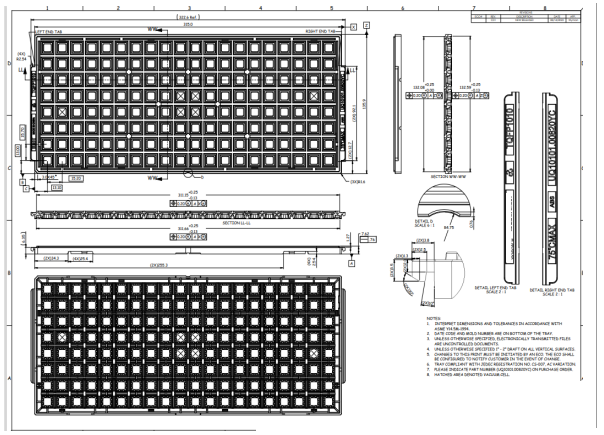
Inner box
Dimension W x L x H (cm)
37x35.3x7.8

Plant	MSL Level	Desiccant	Humidity Indicator Card	Baking Condition		
				Bake Time at 125C +10/-0 C (Hours)	Exposure Time from Bake (Hours)	Customer Floor Life (Hours)
ASE9	MSL-3	2 units	1 pc	4 Hours	6 hours	168 hours
OSE	MSL-3	2 units	1 pc	4 Hours	8 Hours	168 hours

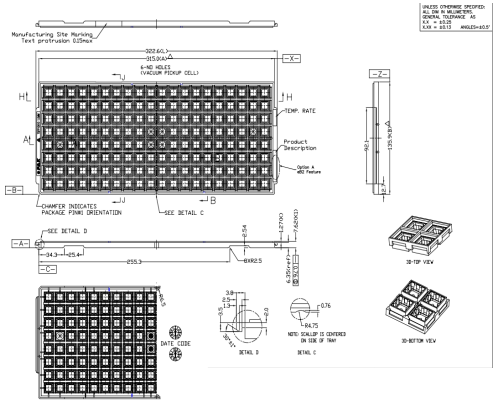
MICROCHIP

TRAY (MSL-1) - 44L TQFP (10x10x1mm)

ASE9

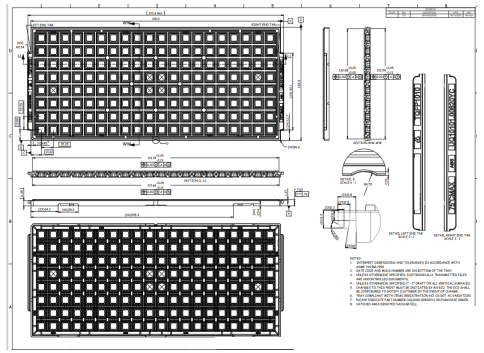


Supplier A

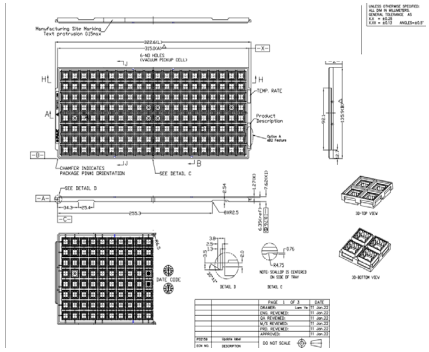


Supplier B

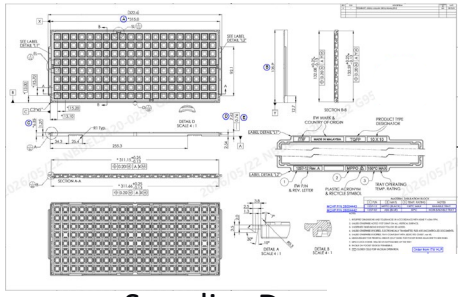
OSE



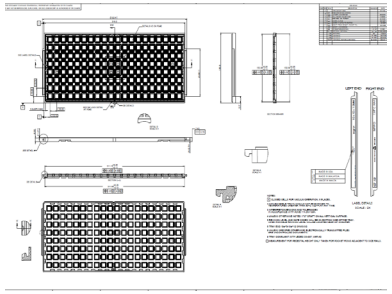
Supplier A



Supplier B



Supplier D



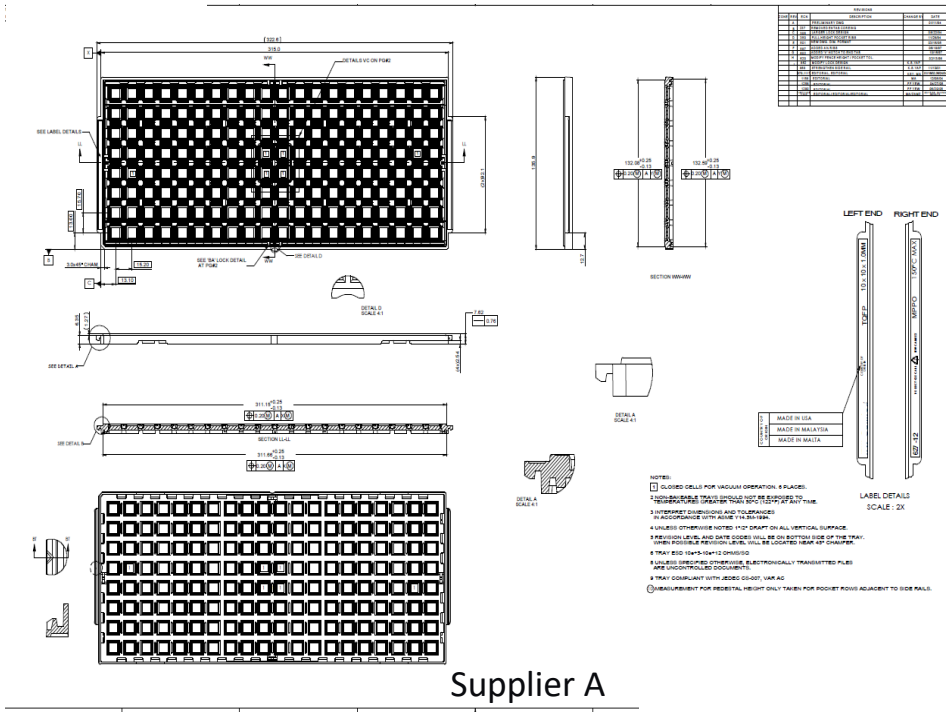
Supplier C

Plant	Supplier Part	Bakeable (Temp C)	Row	Col	Unit per Tray	Color	Tray Stack
ASE9	Supplier A Supplier B	75 °C MAX 75 °C MAX	8	20	160	Blue	10+1
OSE	Supplier A	75 °C MAX	8	20	160	Blue	10+1
	Supplier B	75 °C MAX	8	20	160	Blue	10+1
	Supplier C	150 °C MAX	8	20	160	Black	10+1
	Supplier D	50 °C MAX	8	20	160	Blue	10+1

MICROCHIP

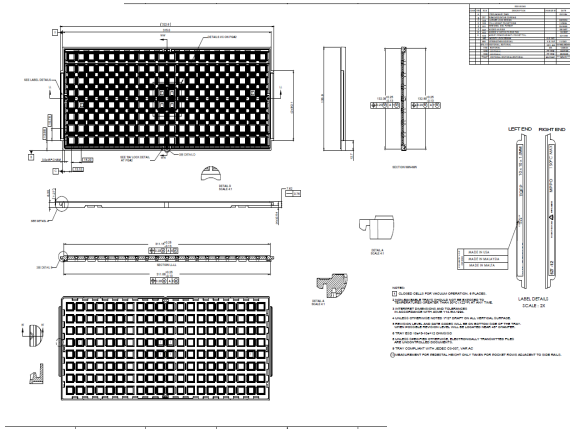
TRAY (MSL-3) - 44L TQFP (10x10x1mm)

ASE9

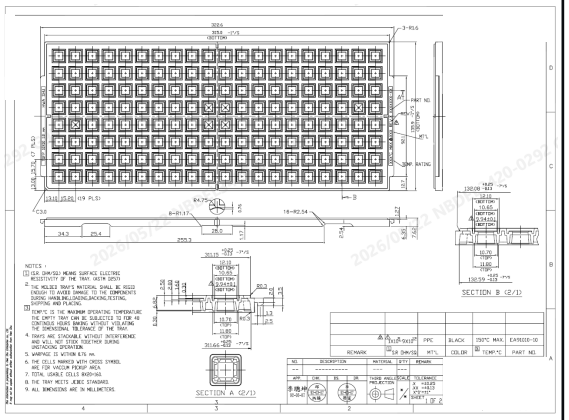


Supplier A

OSE



Supplier B



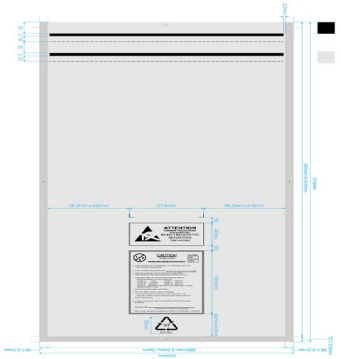
Supplier C

Plant	Supplier Part	Bakeable (Temp C)	Row	Col	Unit per Tray	Color	Tray Stack
ASE9	Supplier A	150 °C MAX	8	20	160	Black	10+1
OSE	Supplier B	150 °C MAX	8	20	160	Black	10+1
	Supplier C	150 °C MAX	8	20	160	Black	10+1

MICROCHIP

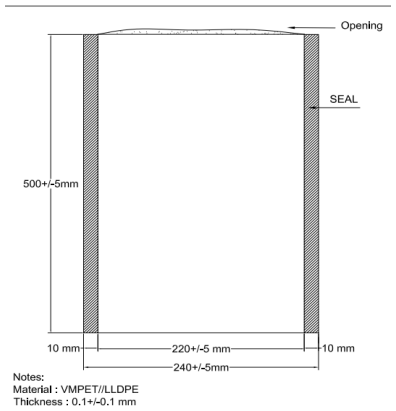
TRAY Bag - 44L TQFP (10x10x1mm)

ASE9





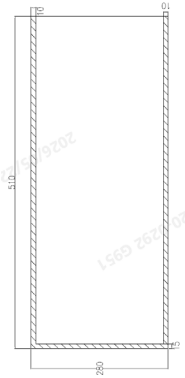
Moisture Barrier Bag





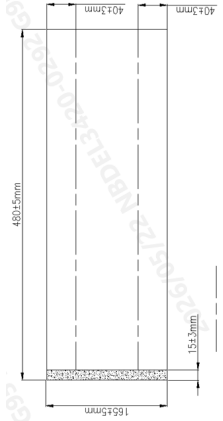
Static Shielding Bag

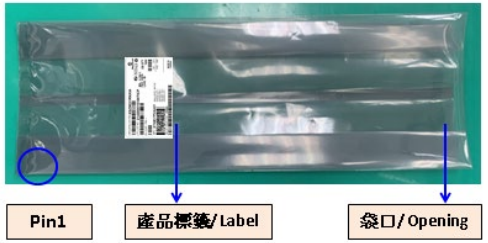
OSE





Moisture Barrier Bag



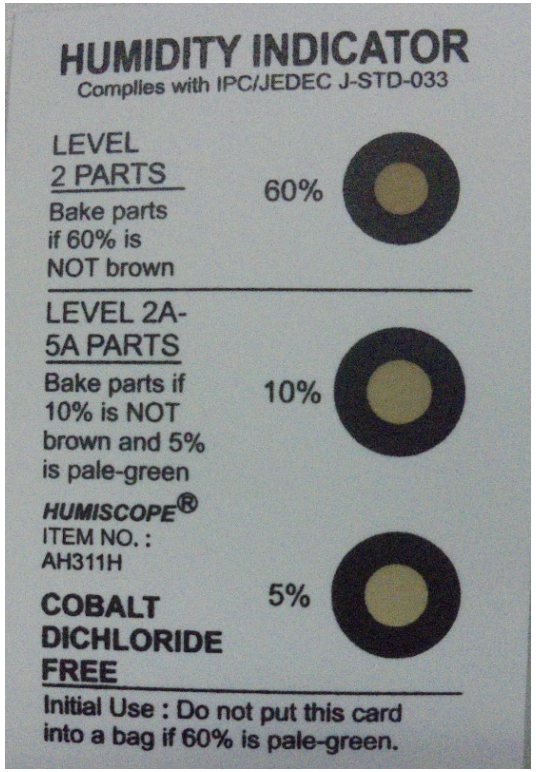
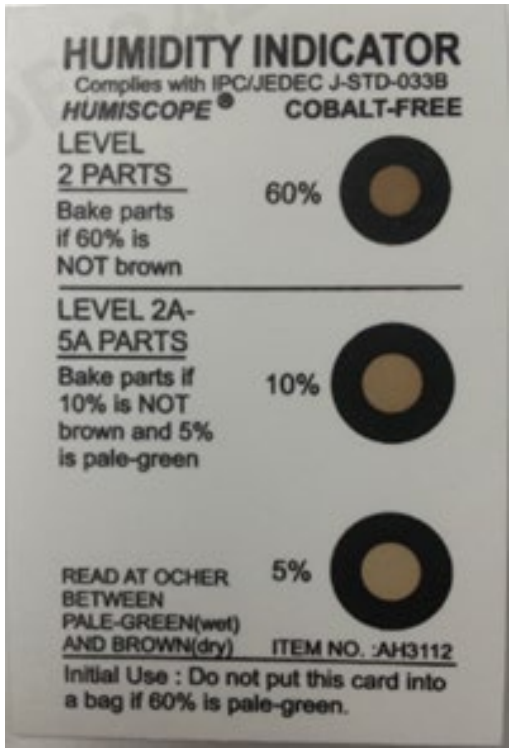


Static Shielding Bag

Plant	Moisture Sensitivity Level	Bag type	Length (mm)	Width (mm)	Thickness (mm)
ASE9	MSL- 1	Static Shielding Bag	500+5/-5	240+5/-5	0.1
	MSL- 3	Moisture Barrier Bag	570 +6/-0	300 +6/-0	0.18
OSE	MSL- 1	Static Shielding Bag	480+5/-5	165+5/-5	0.11
	MSL- 3	Moisture Barrier Bag	510+3/-3	280+3/-3	0.16

MICROCHIP

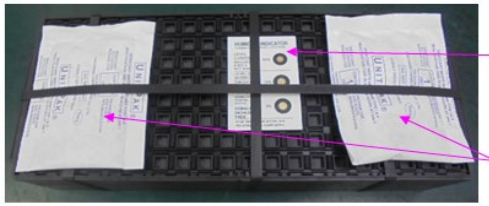
TRAY Humidity Indicator Card (HIC) - 44L TQFP (10x10x1mm)

ASE9	MTAI
	
▪ 3 Dots (5%, 10%, 60%) ▪ Cobalt Free	▪ 3 Dots (5%, 10%, 60%) ▪ Cobalt Free

TRAY Packing Method for Dry Pack (MSL-3) - 44L TQFP (10x10x1mm)

ASE9





MBB Label







Use Cardboard to fill space for partial box

Inner box Bubble Wrap

MSID sticker Scotch tape

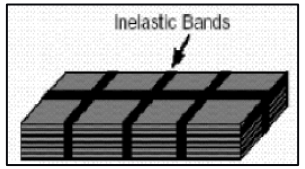


ASE 2D label

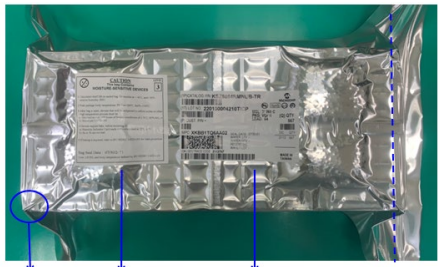
Label

Inner box
Dimension W x L x H (cm)
16.2x37.1x8.8

OSE













Inner box
Dimension W x L x H (cm)
16.2x37.1x8.8

Plant	MSL Level	Desiccant	Humidity Indicator Card	Baking Condition		
				Bake Time at 125C +10/-0 C (Hours)	Exposure Time from Bake (Hours)	Customer Floor Life (Hours)
ASE9	MSL-3	2 units	1 pc	4 Hours	6 hours	168 hours
OSE	MSL-3	2 units	1 pc	4 Hours	8 hours	168 hours

MICROCHIP

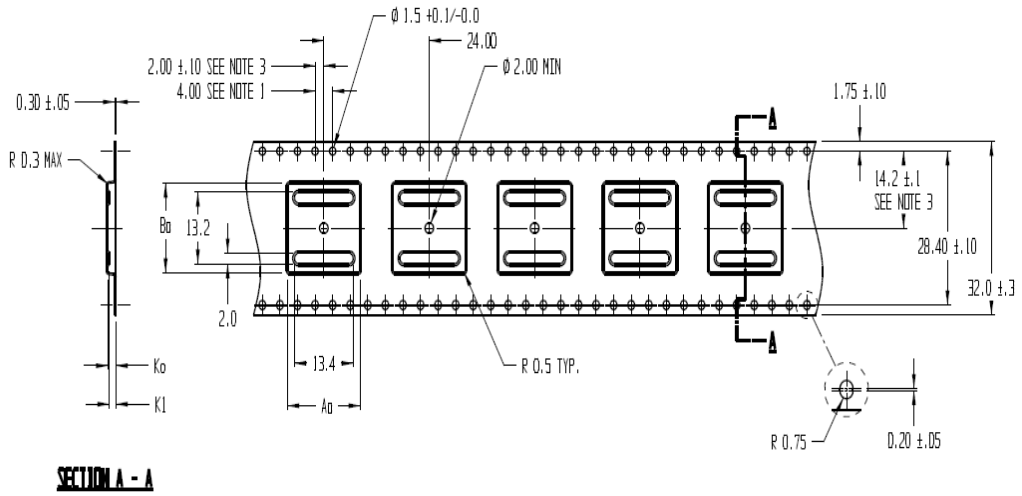
CCB 8273
PCN ID: JPZA-12OYQD087
Pre and Post Change Summary



A Leading Provider of Smart, Connected and Secure Embedded Control Solutions

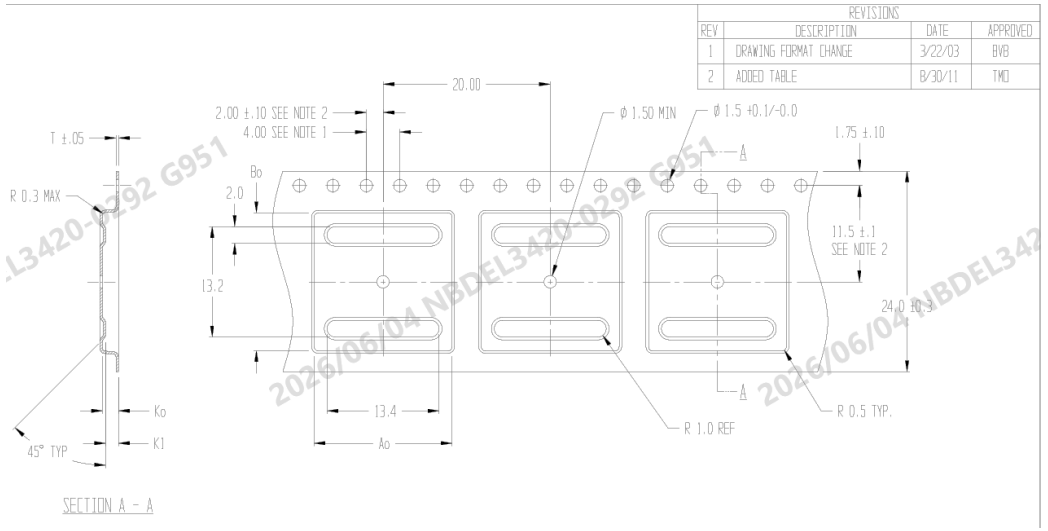
CARRIER TAPE - 64L TQFP (14x14x1mm)

ASE9



SECTION A - A

OSE



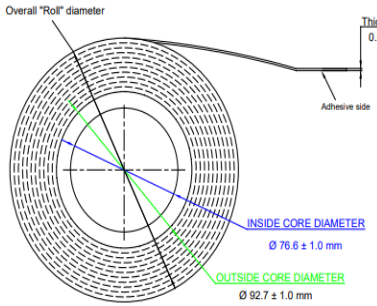
SECTION A - A

Plant	W (mm)	P (mm)	A0 (mm)	B0 (mm)	K0 (mm)	K1 (mm)	Thickness (mm)
ASE9	32.00±0.3	24.00±0.1	16.50±0.1	16.50±0.1	1.90±0.1	1.55±0.1	0.30±0.05
OSE	24.00±0.3	20.00±0.1	16.50±0.10	16.50±0.10	1.90±0.10	1.55±0.10	0.30±0.05

MICROCHIP

COVER TAPE - 64L TQFP (14x14x1mm)

ASE9

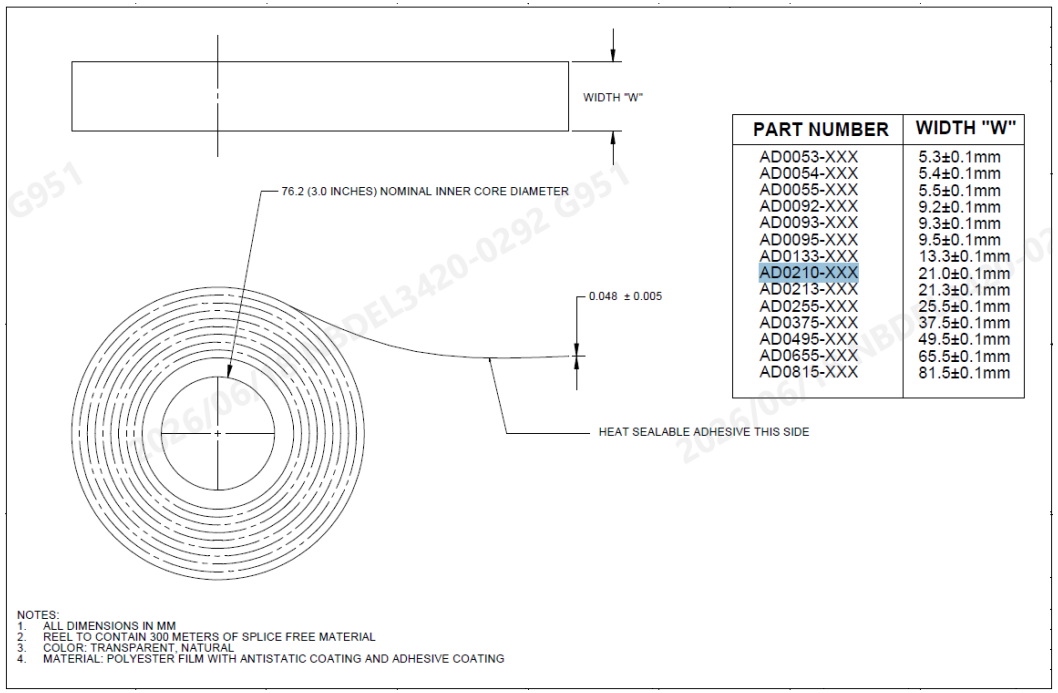


Part Number	Width (mm) (± 0.1 mm)	Length (M)
HUZ0053(-yyy(-yyyy)	5.3	300, 500, 600...etc.
HUZ0054(-yyy(-yyyy)	5.4	
HUZ0055(-yyy(-yyyy)	5.5	
HUZ0093(-yyy(-yyyy)	9.3	
HUZ0133(-yyy(-yyyy)	13.3	
HUZ0213(-yyy(-yyyy)	21.3	
HUZ0255(-yyy(-yyyy)	25.5	
HUZ0375(-yyy(-yyyy)	37.5	
HUZ0495(-yyy(-yyyy)	49.5	
HUZ0655(-yyy(-yyyy)	65.5	
HUZ0815(-yyy(-yyyy)	81.5	

PART NO.	WIDTH "W"
HUZxxxx-yyy or HUZxxxx-yyyy -yyy=Length (i.e. -300=300 M; -1000=1000 M)	xxxx=width type (i.e. 0093=9.30 mm, 0655=65.5 mm)

NOTE:
1. Length (M): -yyy(y) +3/-0 M,where yyy(y)=Length
2. Overall (Roll) Diameter:
   - For 300 meter length roll = 168 ± 10 mm
   - For 500 meter length roll = 203 ± 10 mm
   - For 600 meter length roll = 218 ± 10 mm
3. Core width dimension refer to below table
4. Please refer to tech bulletins for related properties of HUZ cover tape

OSE



PART NUMBER	WIDTH "W"
AD0053-XXX	5.3±0.1mm
AD0054-XXX	5.4±0.1mm
AD0055-XXX	5.5±0.1mm
AD0092-XXX	9.2±0.1mm
AD0093-XXX	9.3±0.1mm
AD0095-XXX	9.5±0.1mm
AD0133-XXX	13.3±0.1mm
AD0210-XXX	21.0±0.1mm
AD0213-XXX	21.3±0.1mm
AD0255-XXX	25.5±0.1mm
AD0375-XXX	37.5±0.1mm
AD0495-XXX	49.5±0.1mm
AD0655-XXX	65.5±0.1mm
AD0815-XXX	81.5±0.1mm

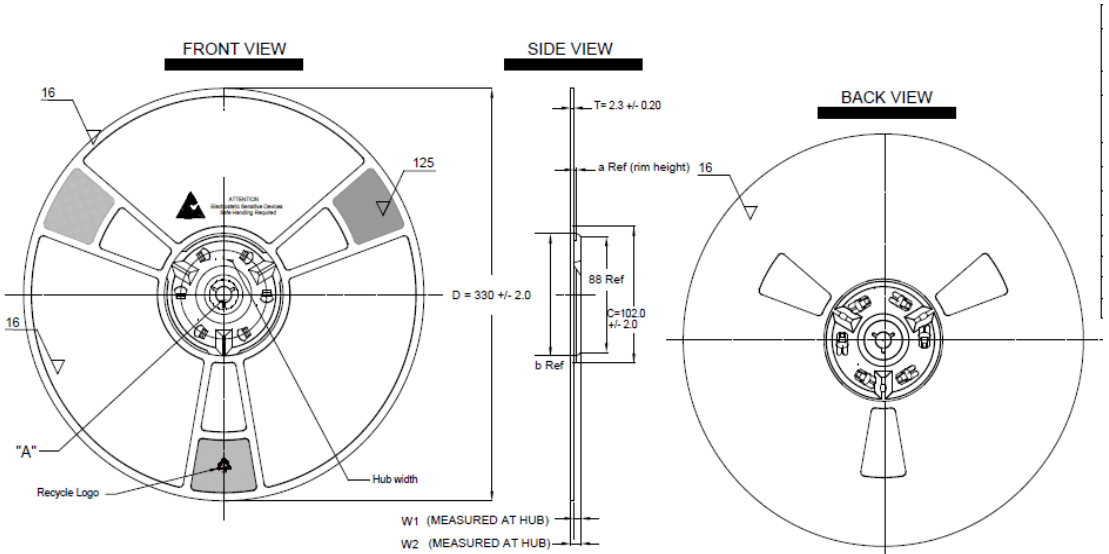
NOTES:
1. ALL DIMENSIONS IN MM
2. REEL TO CONTAIN 300 METERS OF SPLICE FREE MATERIAL
3. COLOR: TRANSPARENT, NATURAL
4. MATERIAL: POLYESTER FILM WITH ANTISTATIC COATING AND ADHESIVE COATING

Plant	Width W (mm)	Thickness T (mm)	Color	Sealing Methodology
ASE9	25.5 ± 0.1	0.052 ± 0.005	Clear	Heat sealing
OSE	21.0 ± 0.1	0.048 ± 0.005	Clear	Heat sealing

MICROCHIP

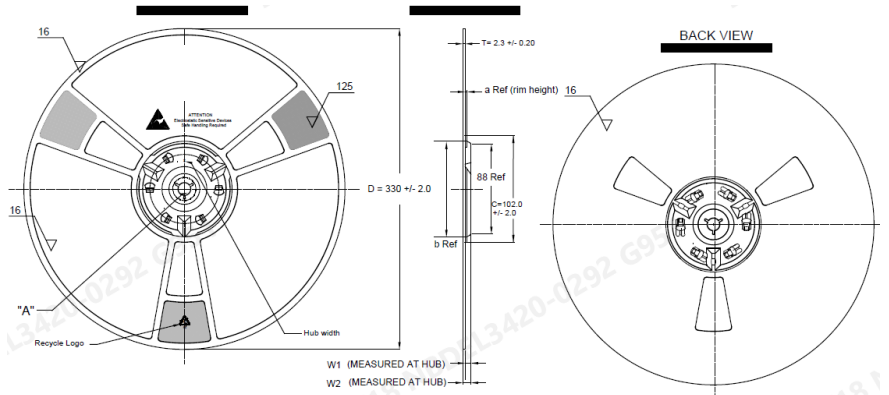
PLASTIC REEL - 64L TQFP (14x14x1mm)

ASE9





OSE



Part Number	Nominal Hub Width	W1 +0.3mm -0.2mm	W2 MAX	a	b
RD33004SW	4mm	4.4mm	7.1mm	1.5	96.5
RD33008SW	8mm	8.4mm	11.1mm	1.5	96.5
RD33016SW	16mm	16.4mm	19.1mm	4.5	98.0
RD33028SW	28mm	28.4mm	31.1mm	4.5	98.0
RD33004SW-BL	4mm	4.4mm	7.1mm	1.5	96.5
RD33008SW-BL	8mm	8.4mm	11.1mm	1.5	96.5
RD33016SW-BL	16mm	16.4mm	19.1mm	4.5	98.0
RD33028SW-BL	28mm	28.4mm	31.1mm	4.5	98.0
RD33004RB	4mm	4.4mm	7.1mm	1.5	96.5
RD33008RB	8mm	8.4mm	11.1mm	1.5	96.5
RD33016RB	16mm	16.4mm	19.1mm	4.5	98.0
RD33028RB	28mm	28.4mm	31.1mm	4.5	98.0
RD33004RBK	4mm	4.4mm	7.1mm	1.5	96.5
RD33008RBK	8mm	8.4mm	11.1mm	1.5	96.5
RD33016RBK	16mm	16.4mm	19.1mm	4.5	98.0
RD33028RBK	28mm	28.4mm	31.1mm	4.5	98.0
RC33004SW	4mm	4.4mm	7.1mm	1.5	96.5
RC33008SW	8mm	8.4mm	11.1mm	1.5	96.5
RC33016SW	16mm	16.4mm	19.1mm	4.5	98.0
RC33028SW	28mm	28.4mm	31.1mm	4.5	98.0
RD33004DBK	4mm	4.4mm	7.1mm	1.5	96.5
RD33008DBK	8mm	8.4mm	11.1mm	1.5	96.5
RD33016DBK	16mm	16.4mm	19.1mm	4.5	98.0
RD33028DBK	28mm	28.4mm	31.1mm	4.5	98.0

NOTE:
1.RB: Regrind Blue Lokreel
2.RBK: Regrind Black Lokreel
3.RC: Black Conductive Lokreel
4.SW: White Lokreel
5.SW-BL: Blue Lokreel
5.1 Suffix "DBK" : Black Reel ;
SR (Surface Resistivity) : ≥1.0E+5, <1.0E+10 Ohms/sq. (23 ± 2°C, 50 ± 5 % RH)
SR (Surface Resistance) : ≥1.0E+4, <1.0E+9 Ohms (23 ± 2°C, 50 ± 5 % RH)
6.RD Series Lokreel:
SR (Surface Resistivity): ≥1.0E+5, < 1.0E+12 ohms/sq. (23 ± 2°C, 50 ± 5 % RH)
SR (Surface Resistance): ≥1.0E+4, < 1.0E+11ohms(23 ± 2°C, 50 ± 5 % RH)
7.RC Series Lokreel:
SR (Surface Resistivity): < 1.0E+5 ohms/sq. (23 ± 2°C, 50 ± 5 % RH)
SR (Surface Resistance): < 1.0E+4 ohms (23 ± 2°C, 50 ± 5 % RH)
8. Dimensions labeled Ref are reference dimensions only. (a, b, etc..)
9. For 28MM hub width, protruding rib is required.
This additional mechanism is added for manufacturing reasons, but will not and must not affect the functionality of the reel
10. Textured surface (shaded area): 125
Remaining surface (unshaded - front and back) : 16
Reference: E-9 E.D.M MicroFinish Comparator Scale
11. The font of hub width is Arial, height is 4, and thickness is 0.15mm.

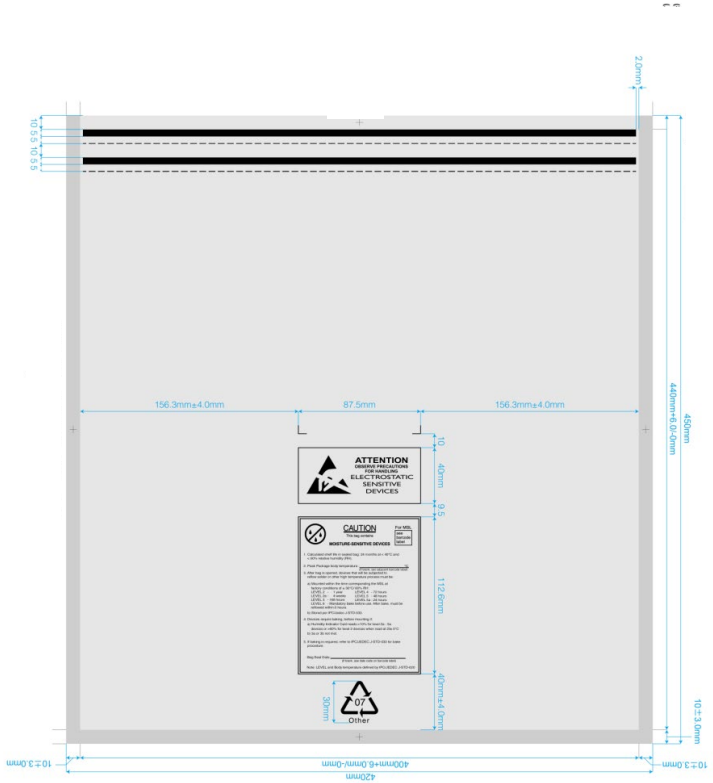


Plant	Reel Diameter (mm)	Reel Hub Size (mm)	Reel Width Max (mm)	Color
ASE9	330 ±2	102 ±2	38.2	White
OSE	330 ±2	102 ±2	30.2	White

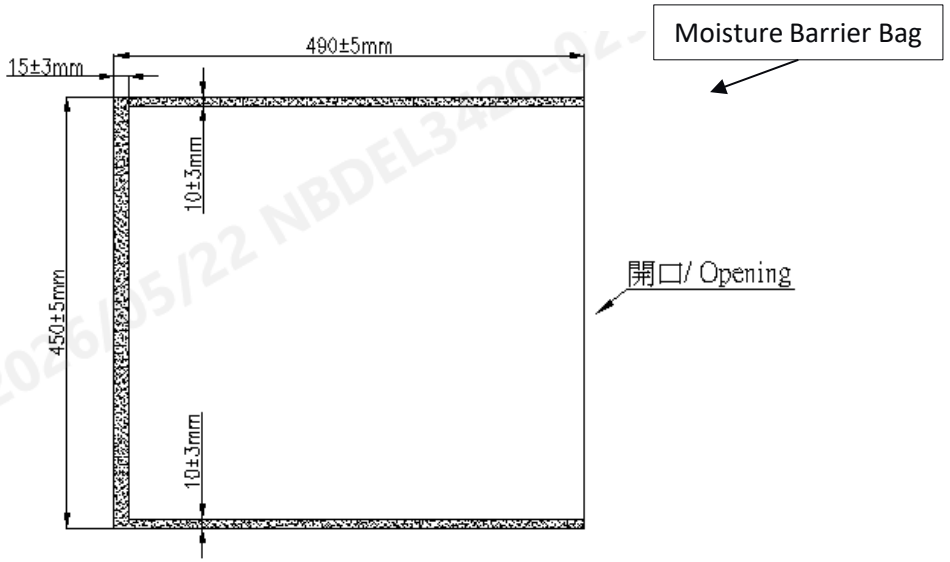
MICROCHIP

Bag - 64L TQFP (14x14x1mm)

ASE9



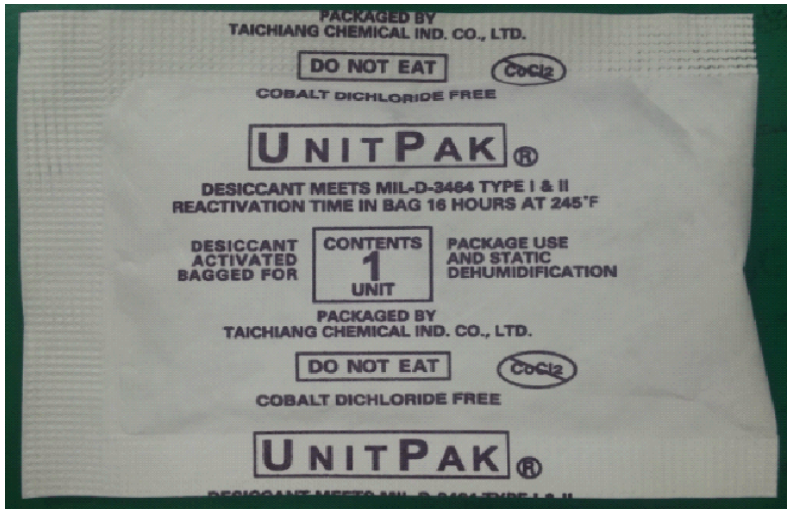
OSE



Plant	Bag type	Bag type	Length (mm)	Width (mm)	Thickness (mm)
ASE9	MSL- 1	Moisture Barrier Bag	450 +6/-0	420 +6/-0	0.18
	MSL- 3	Moisture Barrier Bag	450 +6/-0	420 +6/-0	0.18
OSE	MSL-1	Moisture Barrier Bag	490 +5/-5	450 +5/-5	0.15
	MSL-3	Moisture Barrier Bag	490 +5/-5	450 +5/-5	0.15

MICROCHIP

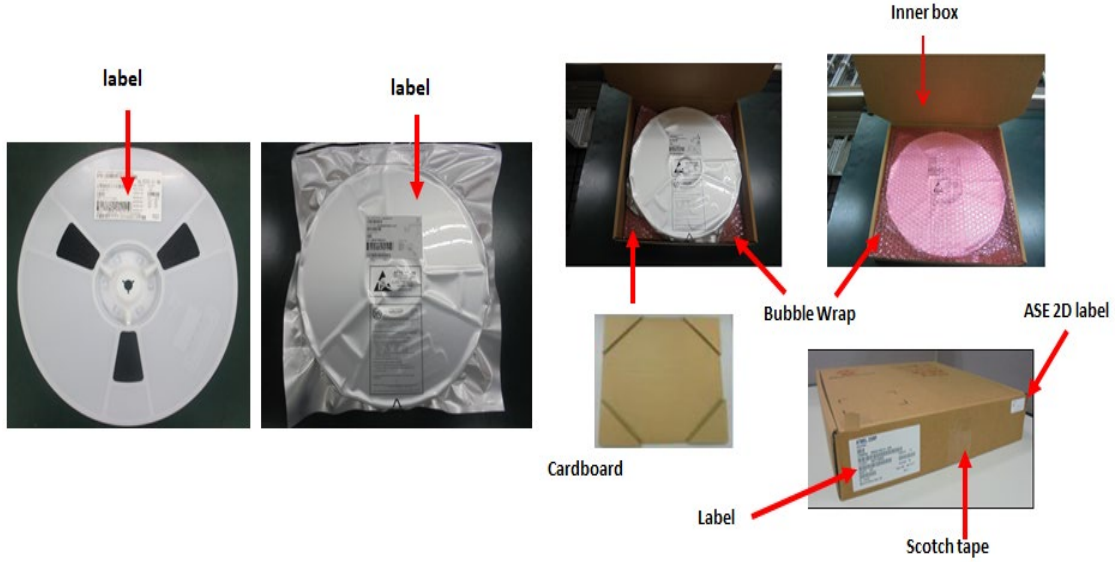
Desiccant - 64L TQFP (14x14x1mm)

ASE9	OSE
 Desiccant each unit is 66 g	 Desiccant each unit is 33 g

MICROCHIP

Tape and Reel Packing Method for 64L TQFP (14x14x1mm) (MSL-1)

ASE9



Inner box
Dimension W x L x H (cm)
37x35.3x7.8

OSE



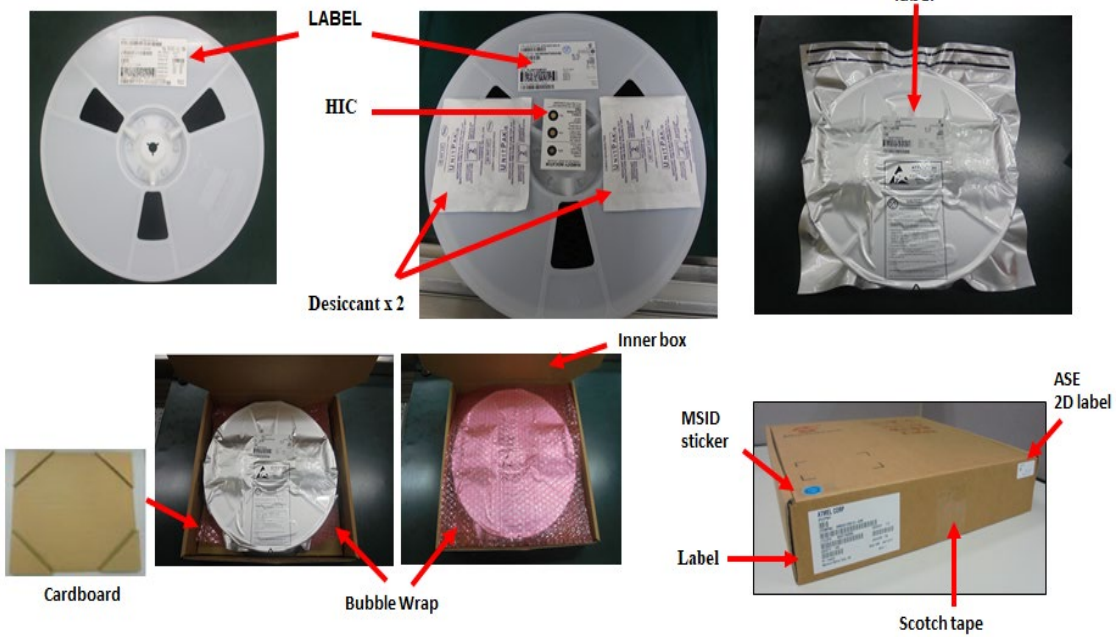
Inner box
Dimension W x L x H (cm)
37x35.3x7.8

Plant	MSL Level	Desiccant	Humidity Indicator Card
ASE9	MSL-1	Not required	Not required
OSE	MSL-1	Required (2 units)	Required (1pc)

MICROCHIP

Tape and Reel Packing Method for 64L TQFP (14x14x1mm) (MSL-3)

ASE9



Inner box
Dimension W x L x H (cm)
37x35.3x7.8

OSE



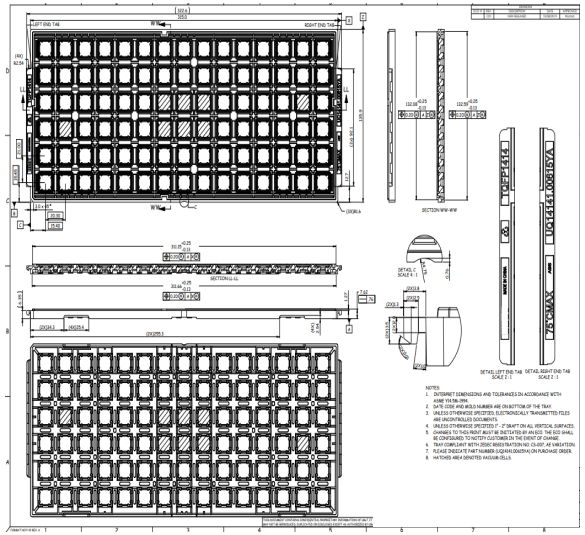
Inner box
Dimension W x L x H (cm)
37x35.3x7.8

Plant	MSL Level	Desiccant	Humidity Indicator Card	Baking Condition		
				Bake Time at 125C +10/-0 C (Hours)	Exposure Time from Bake (Hours)	Customer Floor Life (Hours)
ASE9	MSL-3	2 units	1 pc	4 Hours	6 hours	168 hours
OSE	MSL-3	2 units	1 pc	4 Hours	8 Hours	168 hours

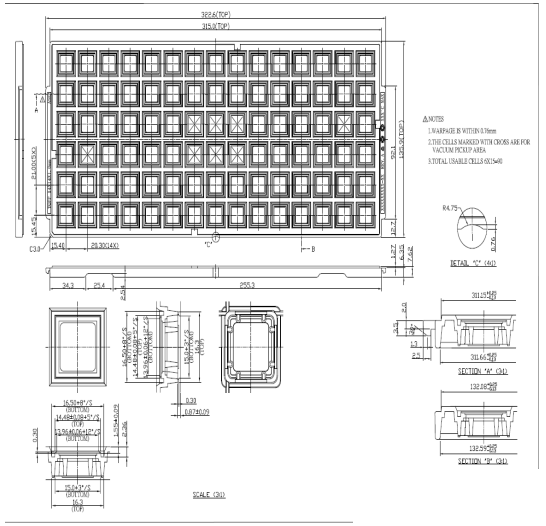
MICROCHIP

TRAY - 64L TQFP (14x14x1mm)

ASE9

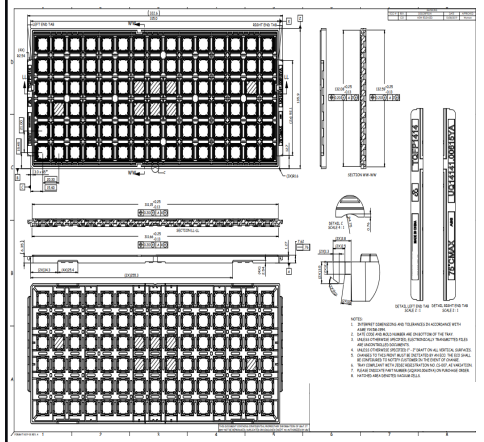


Supplier A

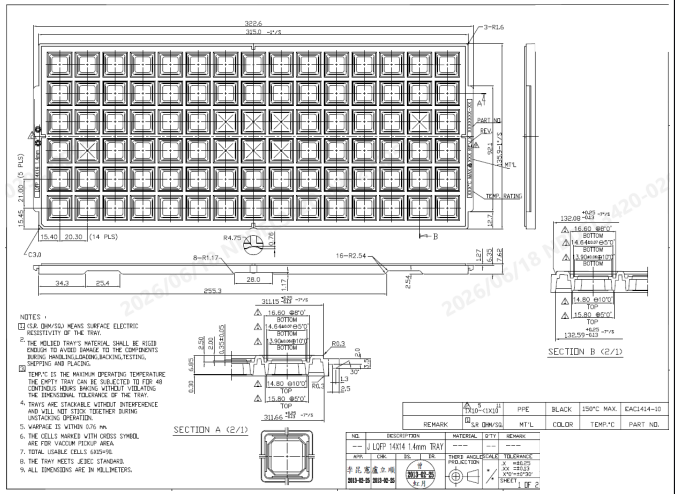


Supplier B

OSE



Supplier A



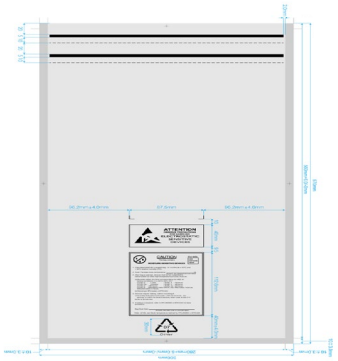
Supplier C

Plant	Supplier Part	Bakeable (Temp C)	Row	Col	Unit per Tray	Color	Tray Stack
ASE9	Supplier A	75 °C MAX	6	15	90	Blue	10+1
	Supplier B	150 °C MAX	6	15	90	Black	10+1
OSE	Supplier A	75 °C MAX	6	15	90	Blue	10+1
	Supplier C	150 °C MAX	6	15	90	Black	10+1

MICROCHIP

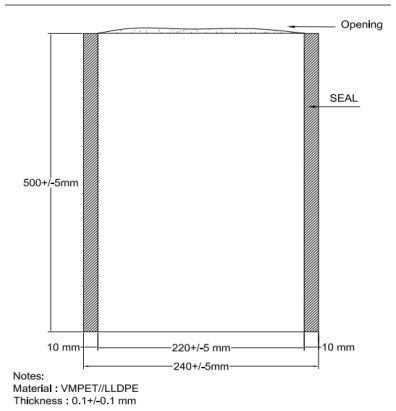
TRAY Bag - 64L TQFP (14x14x1mm)

ASE9





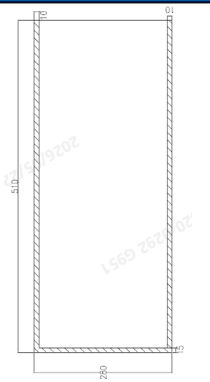
Moisture Barrier Bag





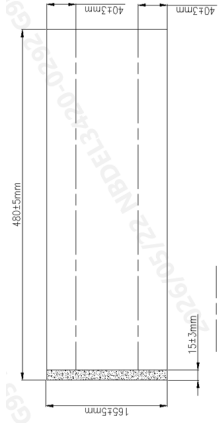
Static Shielding Bag

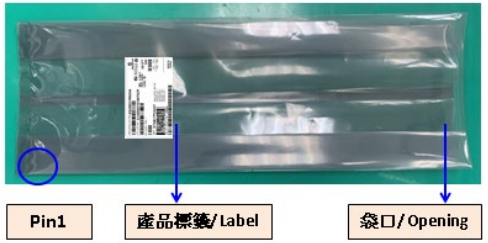
OSE





Moisture Barrier Bag

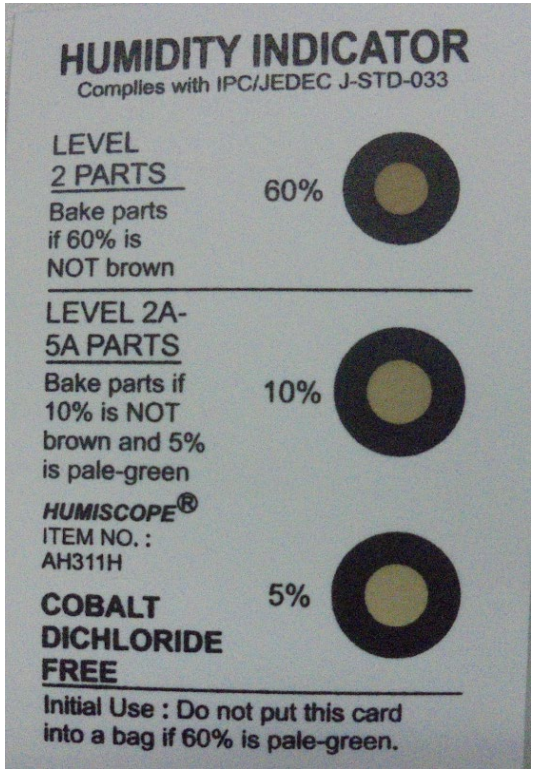
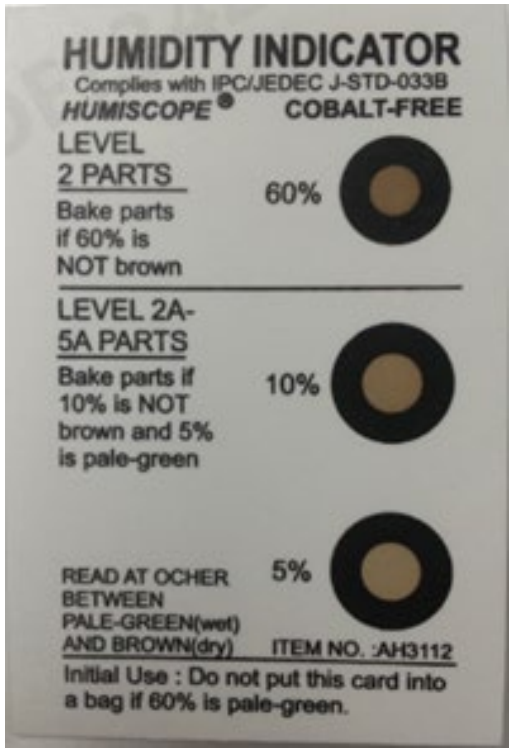




Static Shielding Bag

Plant	Moisture Sensitivity Level	Bag type	Length (mm)	Width (mm)	Thickness (mm)
ASE9	MSL- 1	Static Shielding Bag	500+5/-5	240+5/-5	0.1
	MSL- 3	Moisture Barrier Bag	570 +6/-0	300 +6/-0	0.18
OSE	MSL- 1	Static Shielding Bag	480+5/-5	165+5/-5	0.11
	MSL- 3	Moisture Barrier Bag	510+3/-3	280+3/-3	0.16

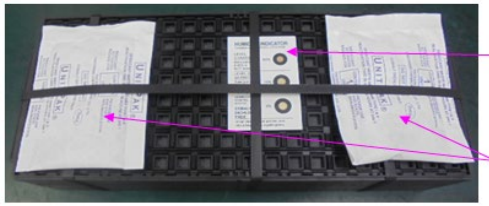
TRAY Humidity Indicator Card (HIC) - 64L TQFP (14x14x1mm)

ASE9	OSE
	
▪ 3 Dots (5%, 10%, 60%) ▪ Cobalt Free	▪ 3 Dots (5%, 10%, 60%) ▪ Cobalt Free

TRAY Packing Method for Dry Pack (MSL-3) - 64L TQFP (14x14x1mm)

ASE9





MBB Label







Use Cardboard to fill space for partial box

Inner box Bubble Wrap

MSID sticker Scotch tape

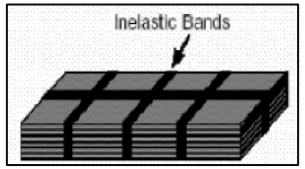


ASE 2D label

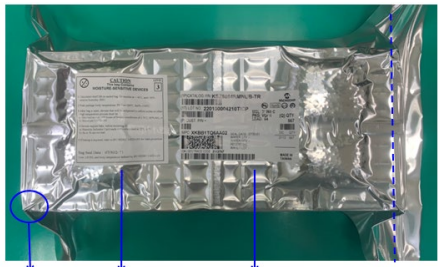
Label

Inner box
Dimension W x L x H (cm)
16.2x37.1x8.8

OSE













Inner box
Dimension W x L x H (cm)
16.2x37.1x8.8

Plant	MSL Level	Desiccant	Humidity Indicator Card	Baking Condition		
				Bake Time at 125C +10/-0 C (Hours)	Exposure Time from Bake (Hours)	Customer Floor Life (Hours)
ASE9	MSL-3	2 units	1 pc	4 Hours	6 hours	168 hours
OSE	MSL-3	2 units	1 pc	4 Hours	8 hours	168 hours

MICROCHIP

QUALIFICATION REPORT SUMMARY

PCN #: JPZA-12OYQD087

Date:
August 20, 2026

Qualification of OSE as an additional final test site and additional scan and pack site for selected ATmega16, AT42QT1481, ATmega324PB, AT42QT2640, ATmega2561 and ATmega328PB device families available in various packages.

Purpose: Qualification of OSE as an additional final test site and additional scan and pack site for selected ATmega16, AT42QT1481, ATmega324PB, AT42QT2640, ATmega2561 and ATmega328PB device families available in various packages.

CCB No.: 8273

Test Name	Test Conditions	Sample Size	Qty of Lots	Result
Yield to yield comparison	Compared against the normal yield distribution trend	2500	1	PASSED