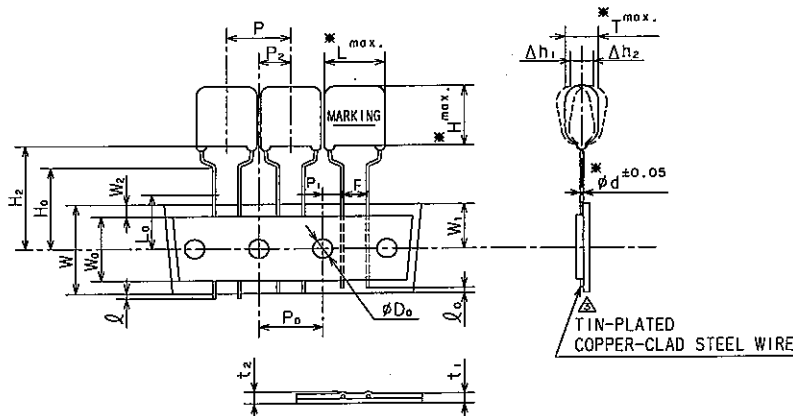


THIRD ANGLE PROJECTION

ITEM CODE	RATED VOLTAGE	CAP. ( $\mu$ F)	DIMENSIONS			
			*L	*T	*H	*d
ECQE2A103()F6	250VAC	0.01	12.5	5.5	10.8	0.6
// 2A123()F6	//	0.012	//	6.0	11.5	//
// 2A153()F6	//	0.015	//	6.3	9.9	//
// 2A183()F6	//	0.018	//	6.0	11.9	//
// 2A223()F6	//	0.022	//	//	11.5	//
// 2A273()F6	//	0.027	//	5.5	10.9	//
// 2A333()F6	//	0.033	//	6.0	11.9	//

TOL. SYMBOL (J,K or M)



**CONSTRUCTION**

The capacitor is of non-inductive construction, wound with metallized polyester film dielectric.  
The capacitor is enclosed in non-combustible epoxy resin and has two leads.

**MARKING**

Marking comprises capacitance, capacitance tolerance, rated voltage and date code.

**PROPERTIES**

Capacitance : See table at 1kHz  
 Capacitance tolerance :  $\pm 5\%$ (J),  $\pm 10\%$ (K),  $\pm 20\%$ (M) at 1kHz  
 Rated voltage : 250VAC  
 Withstand voltage (terminal-terminal) : 250VAC x 230% for 60s  
 (terminal-enclosure) : 150VAC for 60s  
 Insulation resistance :  $\geq 2000\text{M}\Omega$  at 500VDC, 20°C for 60s  
 Dissipation factor :  $\leq 1.0\%$  at 1kHz, 20°C  
 Category temperature range : From -40°C to +85°C  
 (including temperature rise on unit surface)

DO NOT SCALE DRAWING REVISIONS INDICATED BY  $\Delta$  ALL DIMENSIONS ARE IN MILLIMETERS

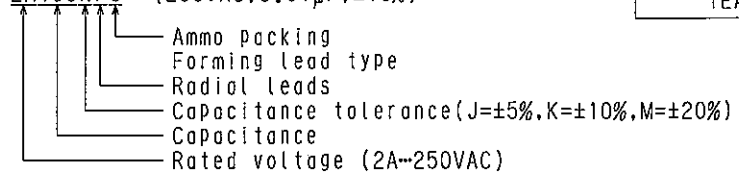
ALTERATION

ISSUE	DESCRIPTION	DATE
$\Delta$	Overall rewriting	Nov. 7 1998
$\Delta$	Correction	Sep. 25 2000
$\Delta$	Modification	Jun. 20 2002
$\Delta$	Company name changed	Oct. 1 2004
$\Delta$	Company name changed	Apr. 1 2005

SPECIFICATIONS No. TEA7976H

ITEM CODE NUMBER STRUCTURE

ECQE 2A103KF6 (250VAC, 0.01 $\mu$ F,  $\pm 10\%$ )



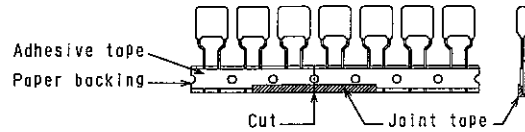
SYMBOL	ITEM	DIMENSION	REMARKS
P	Pitch of component	12.7 $\pm$ 1.0	Tilt of component and curvature of leads shall be included.
P <sub>0</sub>	Feed hole pitch	12.7 $\pm$ 0.2	
P <sub>1</sub>	Feed hole center to lead	3.85 $\pm$ 0.5	
P <sub>2</sub>	Hole center to comp. center	6.35 $\pm$ 1.3	Tilt of component due to curvature of leads shall be included.
F	Lead-to-lead distance	5.0 $\pm$ 0.5	
$\Delta$ h <sub>1,2</sub>	Component alignment	0-2.0	Tilt of component due to curvature of leads shall be included.
W	Paper backing width	18.0 $\pm$ 0.5	
W <sub>0</sub>	Adhesive tape width	9.5min.	The hold down tape shall not protrude beyond the carrier tape.
W <sub>1</sub>	Hole position	9.0 $\pm$ 0.5	
W <sub>2</sub>	Hold-down tape position	0-3.0	
H <sub>2</sub>	Component height	22.0 $\pm$ 0.75	
H <sub>0</sub>	Lead-wire clinch height	16.0 $\pm$ 0.5	
l	Lead-wire protrusion	0max.	
l <sub>0</sub>	Lead-wire depression	7.0max.	
$\phi$ D <sub>0</sub>	Feed hole diameter	4.0 $\pm$ 0.2	
t <sub>1</sub>	Total tape thickness	0.7 $\pm$ 0.2	Total thickness including the hold down tape.
t <sub>2</sub>	Total thickness	1.5max.	
L <sub>0</sub>	Length of snapped lead	11.0max.	

Reference

DESIGN	S. Uosugi
CHECKED	M. Nishikawa
APPROVAL	M. Nagasaka
ESTABLISHMENT	Jun. 17, 1994
TYPE NAME	ECQE2A***()F6
NAME	Metallized Polyester Film Capacitor
DRAWING NAME	PRODUCT DRAWING
DRAWING No.	CT-H-420E (1/2)

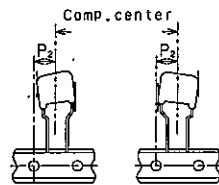
**Panasonic** Electronic Circuit Capacitor Business Unit, Panasonic Electronic Devices Co., Ltd.

Note 1. No more than 3 consecutive missing is permitted.  
 Note 2. A tape conjunction and a tape discrepancy specify as follows.



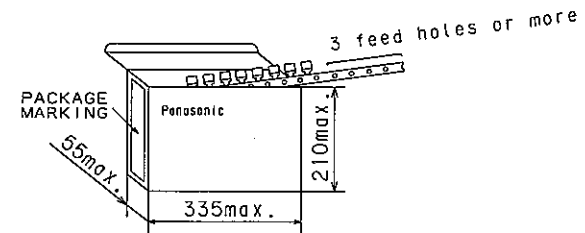
A tape sliding shall not exceed in an allowance of "P<sub>0</sub>" dimension.  
 A joint tape put on the back side of paper backing, and turn up the lower part to the front.

Note 3. Marking on components may not be the same side.  
 Note 4. The tape adhesion is more than 3.92N(400gf)/25mm.  
 Note 5. A tape trailer having at least 3 feed holes is required at the end of the tape.  
 Note 6. 1)The P<sub>1</sub> and P<sub>2</sub> dimension shall be measured as shown in the figure after the adhesive tape placing upward.  
 (measuring from the center of sprocket hole to the right.)  
 2)The P<sub>2</sub> dimension shall be measured between center of a vertical projection plane for tape plane and center of sprocket hole.



Packing specification

1. Case size  
Ammo pack



2. Packing quantity

Capacitance range	Packing quantity
△ 0.01~0.033μF	500

3. Handling notes

- 1)One package must be packed one product only.
- 2)The storage must be stacked 5 boxes or less (surface printed placing upward). (For prevention from displacement of capacitors and damage of lead crimping.)
- 3)The packing box must be handled with care and never thrown out.

**Reference**

TYPE NAME	ECQE2A***()F6
DRAWING No.	CT-H-420E (2/2)

**Panasonic** Electronic Circuit Capacitor Business Unit,  
 Panasonic Electronic Devices Co.,Ltd.