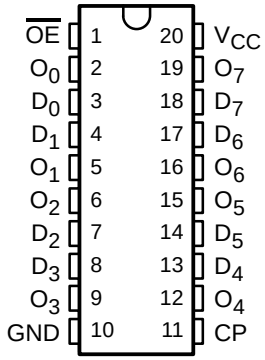
- **Function and Pinout Compatible With FCT and F Logic**
- **25-Ω Output Series Resistors to Reduce Transmission-Line Reflection Noise**
- **Reduced V_{OH} (Typically = 3.3 V) Version of Equivalent FCT Functions**
- **Edge-Rate Control Circuitry for Significantly Improved Noise Characteristics**
- **I_{off} Supports Partial-Power-Down Mode Operation**
- **Matched Rise and Fall Times**
- **Fully Compatible With TTL Input and Output Logic Levels**
- **ESD Protection Exceeds JESD 22**
  - **2000-V Human-Body Model (A114-A)**
  - **200-V Machine Model (A115-A)**
  - **1000-V Charged-Device Model (C101)**
- **3-State Outputs**
- **12-mA Output Sink Current**
  15-mA Output Source Current
- **Edge-Triggered D-Type Inputs**
- **250-MHz Typical Switching Rate**

SN74FCT2374T . . . Q OR SO PACKAGE
(TOP VIEW)



description

The CY74FCT2374T is a high-speed, low-power, octal D-type flip-flop featuring separate D-type inputs for each flip-flop. On-chip termination resistors at the outputs reduce system noise caused by reflections. The CY74FCT2374T can replace the CY74FCT374T to reduce noise in an existing design. The device has 3-state outputs for bus-oriented applications. A buffered clock (CP) and output-enable ($\overline{OE}$) inputs are common to all flip-flops. The flip-flops in the CY74FCT2374T store the state of their individual data (D) inputs that meet the setup-time and hold-time requirements on the low-to-high CP transition. When $\overline{OE}$ is low, the contents of the flip-flops are available at the outputs. When $\overline{OE}$ is high, the outputs are in the high-impedance state. The state of $\overline{OE}$ does not affect the state of the flip-flops.

This device is fully specified for partial-power-down applications using I_{off}. The I_{off} circuitry disables the outputs, preventing damaging current backflow through the device when it is powered down.

ORDERING INFORMATION

T_A	PACKAGE†		SPEED (ns)	ORDERABLE PART NUMBER	TOP-SIDE MARKING
–40°C to 85°C	QSOP – Q	Tape and reel	5.2	CY74FCT2374CTQCT	FCT2374C
	SOIC – SO	Tube	5.2	CY74FCT2374CTSOC	FCT2374C
		Tape and reel	5.2	CY74FCT2374CTSOCT	
	QSOP – Q	Tape and reel	6.5	CY74FCT2374ATQCT	FCT2374A
	SOIC – SO	Tube	6.5	CY74FCT2374ATSOC	FCT2374A
		Tape and reel	6.5	CY74FCT2374ATSOCT	
	SOIC – SO	Tube	10	CY74FCT2374TSOC	FCT2374
		Tape and reel	10	CY74FCT2374TSOCT	

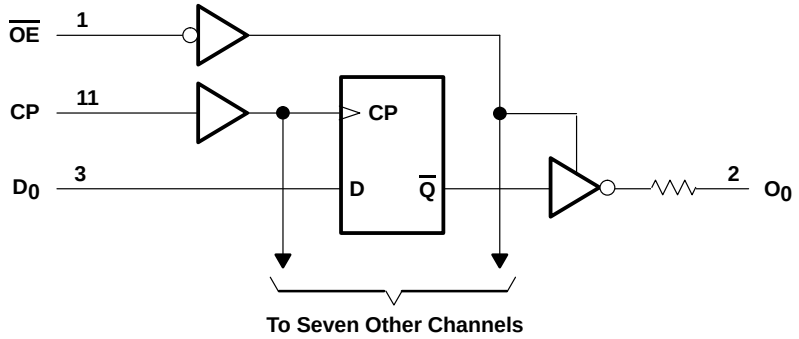
† Package drawings, standard packing quantities, thermal data, symbolization, and PCB design guidelines are available at www.ti.com/sc/package.

FUNCTION TABLE

INPUTS			OUTPUT
D	CP	$\overline{OE}$	O
H	↑	L	H
L	↑	L	L
X	X	H	Z

H = High logic level, L = Low logic level, X = Don't care, Z = High-impedance state, ↑ = Low-to-high clock transition

logic diagram (positive logic)



absolute maximum rating over operating free-air temperature range (unless otherwise noted)†

Supply voltage range to ground potential . . . . . –0.5 V to 7 V
DC input voltage range . . . . . –0.5 V to 7 V
DC output voltage range . . . . . –0.5 V to 7 V
DC output current (maximum sink current/pin) . . . . . 120 mA
Package thermal impedance, θ_{JA} (see Note 1): Q package . . . . . 68°C/W
SO package . . . . . 58°C/W
Ambient temperature range with power applied, T_A . . . . . –65°C to 135°C
Storage temperature range, T_{stg} . . . . . –65°C to 150°C

† Stresses beyond those listed under “absolute maximum ratings” may cause permanent damage to the device. These are stress ratings only, and functional operation of the device at these or any other conditions beyond those indicated under “recommended operating conditions” is not implied. Exposure to absolute-maximum-rated conditions for extended periods may affect device reliability.

NOTE 1: The package thermal impedance is calculated in accordance with JESD 51-7.

recommended operating conditions (see Note 2)

		MIN	NOM	MAX	UNIT
V_{CC}	Supply voltage	4.75	5	5.25	V
V_{IH}	High-level input voltage	2			V
V_{IL}	Low-level input voltage			0.8	V
I_{OH}	High-level output current			–15	mA
I_{OL}	Low-level output current			12	mA
T_A	Operating free-air temperature	–40		85	°C

NOTE 2: All unused inputs of the device must be held at V_{CC} or GND to ensure proper device operation.

electrical characteristics over recommended operating free-air temperature range (unless otherwise noted)

PARAMETER	TEST CONDITIONS			MIN	TYP†	MAX	UNIT
V_{IK}	V_{CC} = 4.75 V,	I_{IN} = –18 mA			–0.7	–1.2	V
V_{OH}	V_{CC} = 4.75 V,	I_{OH} = –15 mA		2.4	3.3		V
V_{OL}	V_{CC} = 4.75 V,	I_{OL} = 12 mA			0.3	0.55	V
R_{OUT}	V_{CC} = 4.75 V,	I_{OL} = 12 mA		20	25	40	Ω
V_{hys}	All inputs				0.2		V
I_I	V_{CC} = 5.25 V,	V_{IN} = V_{CC}				5	µA
I_{IH}	V_{CC} = 5.25 V,	V_{IN} = 2.7 V				±1	µA
I_{IL}	V_{CC} = 5.25 V,	V_{IN} = 0.5 V				±1	µA
I_{OZH}	V_{CC} = 5.25 V,	V_{OUT} = 2.7 V				10	µA
I_{OZL}	V_{CC} = 5.25 V,	V_{OUT} = 0.5 V				–10	µA
I_{OS}‡	V_{CC} = 5.25 V,	V_{OUT} = 0 V		–60	–120	–225	mA
I_{off}	V_{CC} = 0 V,	V_{OUT} = 4.5 V				±1	µA
I_{CC}	V_{CC} = 5.25 V,	V_{IN} ≤ 0.2 V,	V_{IN} ≥ V_{CC} – 0.2 V		0.1	0.2	mA
ΔI_{CC}	V_{CC} = 5.25 V, V_{IN} = 3.4 V§, f_1 = 0, Outputs open				0.5	2	mA
I_{CCD}¶	V_{CC} = 5.25 V, Outputs open, One input switching at 50% duty cycle, $\overline{OE}$ = GND, V_{IN} ≤ 0.2 V or V_{IN} ≥ V_{CC} – 0.2 V				0.06	0.12	mA/ MHz
I_C#	V_{CC} = 5.25 V, Outputs open, f_0 = 10 MHz, $\overline{OE}$ = GND	One bit switching at f_1 = 5 MHz at 50% duty cycle	V_{IN} ≤ 0.2 V or V_{IN} ≥ V_{CC} – 0.2V		0.7	1.4	mA
			V_{IN} = 3.4 V or GND		1.2	3.4	
		Eight bits switching at f_1 = 2.5 MHz at 50% duty cycle	V_{IN} ≤ 0.2 V or V_{IN} ≥ V_{CC} – 0.2 V		1.6	3.2‖	
			V_{IN} = 3.4 V or GND		3.9	12.2‖	
C_i					5	10	pF
C_o					9	12	pF

† Typical values are at V_{CC} = 5 V, T_A = 25°C.

‡ Not more than one output should be shorted at a time. Duration of short should not exceed one second. The use of high-speed test apparatus and/or sample-and-hold techniques are preferable to minimize internal chip heating and more accurately reflect operational values. Otherwise, prolonged shorting of a high output can raise the chip temperature well above normal and cause invalid readings in other parametric tests. In any sequence of parameter tests, I_{OS} tests should be performed last.

§ Per TTL-driven input (V_{IN} = 3.4 V); all other inputs at V_{CC} or GND

¶ This parameter is derived for use in total power-supply calculations.

$I_C = I_{CC} + \Delta I_{CC} \times D_H \times N_T + I_{CCD} (f_0/2 + f_1 \times N_1)$

Where:

I_C = Total supply current
I_{CC} = Power-supply current with CMOS input levels
ΔI_{CC} = Power-supply current for a TTL high input (V_{IN} = 3.4 V)
D_H = Duty cycle for TTL inputs high
N_T = Number of TTL inputs at D_H
I_{CCD} = Dynamic current caused by an input transition pair (HLH or LHL)
f_0 = Clock frequency for registered devices, otherwise zero
f_1 = Input signal frequency
N_1 = Number of inputs changing at f_1

All currents are in milliamperes and all frequencies are in megahertz.

‖ Values for these conditions are examples of the I_{CC} formula.

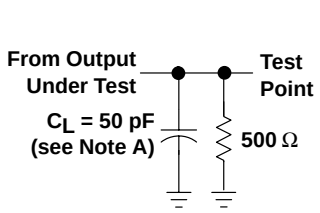
timing requirements over recommended operating free-air temperature range (unless otherwise noted) (see Figure 1)

		CY74FCT2374T		CY74FCT2374AT		CY74FCT2374CT		UNIT
		MIN	MAX	MIN	MAX	MIN	MAX	
t_w	Pulse duration, CP	7		5		4		ns
t_{su}	Setup time, data before CP↑	2		2		1.5		ns
t_h	Hold time, data after CP↑	1.5		1.5		1		ns

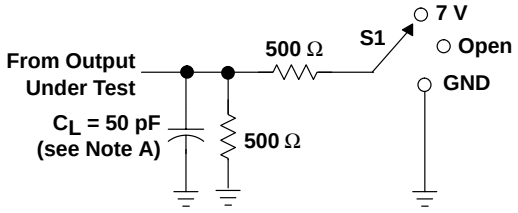
switching characteristics over operating free-air temperature range (see Figure 1)

PARAMETER	FROM (INPUT)	TO (OUTPUT)	CY74FCT2374T		CY74FCT2374AT		CY74FCT2374CT		UNIT
			MIN	MAX	MIN	MAX	MIN	MAX	
t_{PLH}	CP	O	2	10	2	6.5	2	5.2	ns
t_{PHL}			2	10	2	6.5	2	5.2	
t_{PZH}	$\overline{OE}$	O	1.5	12.5	1.5	6.5	1.5	6.2	ns
t_{PZL}			1.5	12.5	1.5	6.5	1.5	6.2	
t_{PHZ}	$\overline{OE}$	O	1.5	8	1.5	5.5	1.5	5	ns
t_{PLZ}			1.5	8	1.5	5.5	1.5	5	

PARAMETER MEASUREMENT INFORMATION

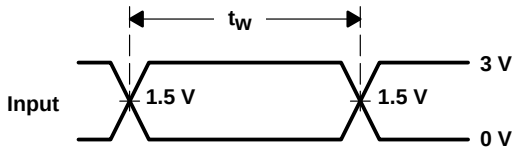


LOAD CIRCUIT FOR TOTEM-POLE OUTPUTS

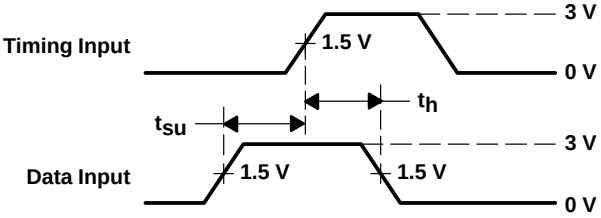


LOAD CIRCUIT FOR 3-STATE OUTPUTS

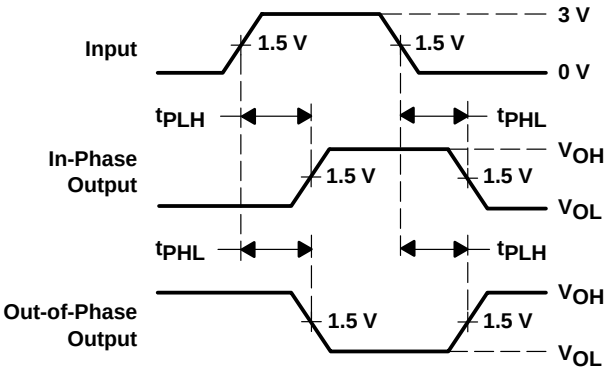
TEST	S1
t_{PLH}/t_{PHL}	Open
t_{PLZ}/t_{PZL}	7 V
t_{PHZ}/t_{PZH}	Open



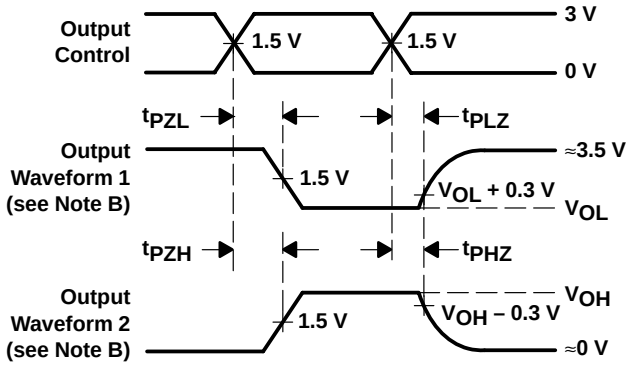
VOLTAGE WAVEFORMS PULSE DURATION



VOLTAGE WAVEFORMS SETUP AND HOLD TIMES



VOLTAGE WAVEFORMS PROPAGATION DELAY TIMES INVERTING AND NONINVERTING OUTPUTS



VOLTAGE WAVEFORMS ENABLE AND DISABLE TIMES LOW- AND HIGH-LEVEL ENABLING

NOTES: A. C_L includes probe and jig capacitance.
B. Waveform 1 is for an output with internal conditions such that the output is low except when disabled by the output control. Waveform 2 is for an output with internal conditions such that the output is high except when disabled by the output control.
C. The outputs are measured one at a time with one input transition per measurement.

Figure 1. Load Circuit and Voltage Waveforms

PACKAGING INFORMATION

Orderable Device	Status (1)	Package Type	Package Drawing	Pins	Package Qty	Eco Plan (2)	Lead/Ball Finish	MSL Peak Temp (3)
74FCT2374ATSOCTE4	ACTIVE	SOIC	DW	20	2000	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
74FCT2374ATSOCTG4	ACTIVE	SOIC	DW	20	2000	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
74FCT2374CTSOCTE4	ACTIVE	SOIC	DW	20	2000	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
74FCT2374CTSOCTG4	ACTIVE	SOIC	DW	20	2000	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
74FCT2574ATQCTE4	ACTIVE	SSOP/ QSOP	DBQ	20	2500	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-2-260C-1 YEAR
74FCT2574ATSOCTE4	ACTIVE	SOIC	DW	20	2000	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
74FCT2574ATSOCTG4	ACTIVE	SOIC	DW	20	2000	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
74FCT2574CTSOCTE4	ACTIVE	SOIC	DW	20	2000	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
74FCT2574CTSOCTG4	ACTIVE	SOIC	DW	20	2000	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2374ATQCT	ACTIVE	SSOP/ QSOP	DBQ	20	2500	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-2-260C-1 YEAR
CY74FCT2374ATQCTE4	ACTIVE	SSOP/ QSOP	DBQ	20	2500	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-2-260C-1 YEAR
CY74FCT2374ATQCTG4	ACTIVE	SSOP/ QSOP	DBQ	20	2500	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-2-260C-1 YEAR
CY74FCT2374ATSOC	ACTIVE	SOIC	DW	20	25	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2374ATSOCE4	ACTIVE	SOIC	DW	20	25	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2374ATSOCG4	ACTIVE	SOIC	DW	20	25	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2374ATSOCT	ACTIVE	SOIC	DW	20	2000	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2374CTQCT	ACTIVE	SSOP/ QSOP	DBQ	20	2500	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-2-260C-1 YEAR
CY74FCT2374CTQCTE4	ACTIVE	SSOP/ QSOP	DBQ	20	2500	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-2-260C-1 YEAR
CY74FCT2374CTQCTG4	ACTIVE	SSOP/ QSOP	DBQ	20	2500	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-2-260C-1 YEAR
CY74FCT2374CTSOC	ACTIVE	SOIC	DW	20	25	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2374CTSOCE4	ACTIVE	SOIC	DW	20	25	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2374CTSOCG4	ACTIVE	SOIC	DW	20	25	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2374CTSOCT	ACTIVE	SOIC	DW	20	2000	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2374TSOC	ACTIVE	SOIC	DW	20	25	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2374TSOCE4	ACTIVE	SOIC	DW	20	25	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM

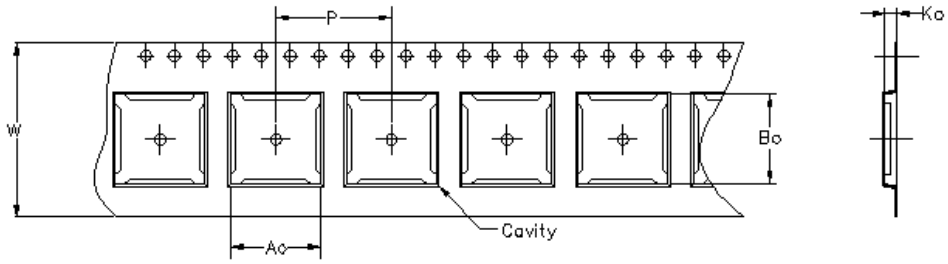
Orderable Device	Status (1)	Package Type	Package Drawing	Pins	Package Qty	Eco Plan (2)	Lead/Ball Finish	MSL Peak Temp (3)
CY74FCT2374TSOCG4	ACTIVE	SOIC	DW	20	25	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2374TSOCT	ACTIVE	SOIC	DW	20	2000	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2374TSOCTE4	ACTIVE	SOIC	DW	20	2000	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2374TSOCTG4	ACTIVE	SOIC	DW	20	2000	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2574ATQCT	ACTIVE	SSOP/ QSOP	DBQ	20	2500	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-2-260C-1 YEAR
CY74FCT2574ATQCTG4	ACTIVE	SSOP/ QSOP	DBQ	20	2500	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-2-260C-1 YEAR
CY74FCT2574ATSOC	ACTIVE	SOIC	DW	20	25	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2574ATSOCE4	ACTIVE	SOIC	DW	20	25	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2574ATSOCG4	ACTIVE	SOIC	DW	20	25	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2574ATSOCT	ACTIVE	SOIC	DW	20	2000	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2574CTQCT	ACTIVE	SSOP/ QSOP	DBQ	20	2500	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-2-260C-1 YEAR
CY74FCT2574CTQCTE4	ACTIVE	SSOP/ QSOP	DBQ	20	2500	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-2-260C-1 YEAR
CY74FCT2574CTQCTG4	ACTIVE	SSOP/ QSOP	DBQ	20	2500	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-2-260C-1 YEAR
CY74FCT2574CTSOC	ACTIVE	SOIC	DW	20	25	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2574CTSOCE4	ACTIVE	SOIC	DW	20	25	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2574CTSOCG4	ACTIVE	SOIC	DW	20	25	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2574CTSOCT	ACTIVE	SOIC	DW	20	2000	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2574TSOC	ACTIVE	SOIC	DW	20	25	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2574TSOCE4	ACTIVE	SOIC	DW	20	25	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2574TSOCG4	ACTIVE	SOIC	DW	20	25	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2574TSOCT	ACTIVE	SOIC	DW	20	2000	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2574TSOCTE4	ACTIVE	SOIC	DW	20	2000	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM
CY74FCT2574TSOCTG4	ACTIVE	SOIC	DW	20	2000	Green (RoHS & no Sb/Br)	CU NIPDAU	Level-1-260C-UNLIM

(1) The marketing status values are defined as follows:
ACTIVE: Product device recommended for new designs.
LIFEBUY: TI has announced that the device will be discontinued, and a lifetime-buy period is in effect.
NRND: Not recommended for new designs. Device is in production to support existing customers, but TI does not recommend using this part in a new design.
PREVIEW: Device has been announced but is not in production. Samples may or may not be available.

OBSOLETE: TI has discontinued the production of the device.

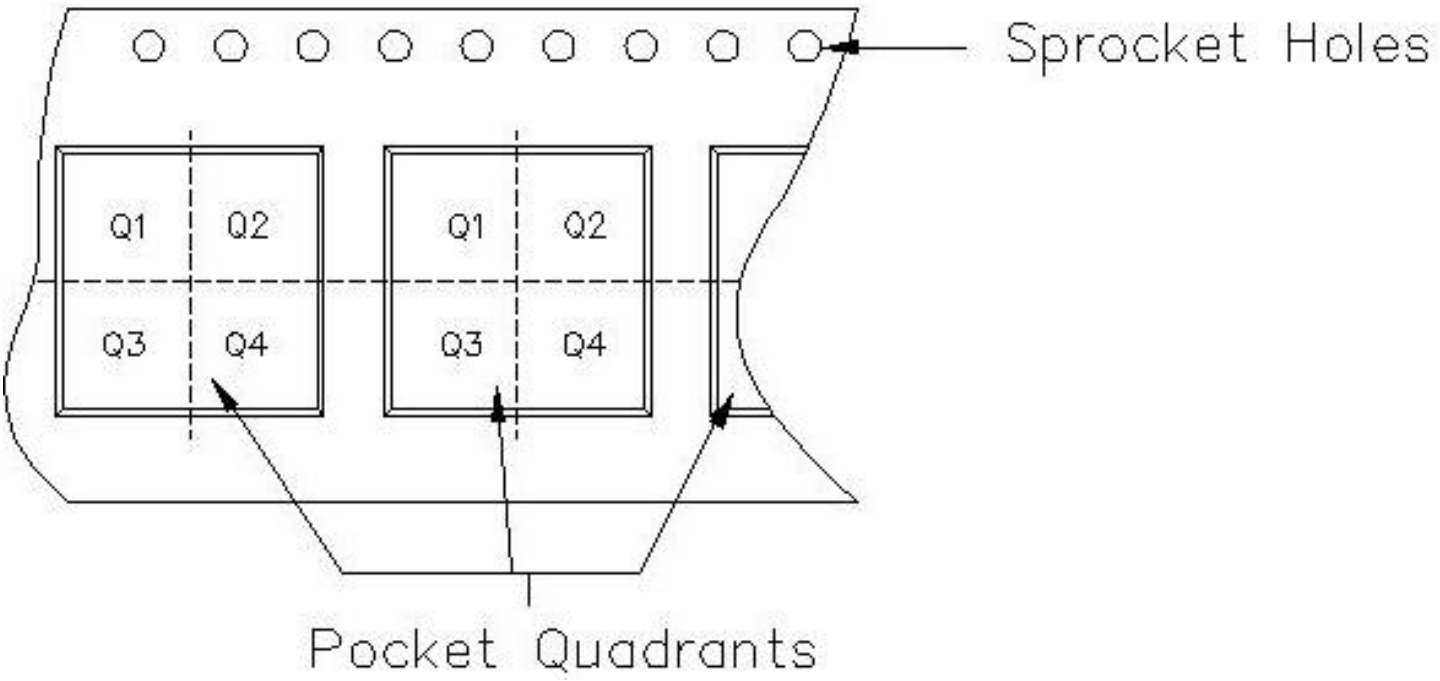
(2) Eco Plan - The planned eco-friendly classification: Pb-Free (RoHS), Pb-Free (RoHS Exempt), or Green (RoHS & no Sb/Br) - please check http://www.ti.com/productcontent for the latest availability information and additional product content details.
TBD: The Pb-Free/Green conversion plan has not been defined.
Pb-Free (RoHS): TI's terms "Lead-Free" or "Pb-Free" mean semiconductor products that are compatible with the current RoHS requirements for all 6 substances, including the requirement that lead not exceed 0.1% by weight in homogeneous materials. Where designed to be soldered at high temperatures, TI Pb-Free products are suitable for use in specified lead-free processes.
Pb-Free (RoHS Exempt): This component has a RoHS exemption for either 1) lead-based flip-chip solder bumps used between the die and package, or 2) lead-based die adhesive used between the die and leadframe. The component is otherwise considered Pb-Free (RoHS compatible) as defined above.
Green (RoHS & no Sb/Br): TI defines "Green" to mean Pb-Free (RoHS compatible), and free of Bromine (Br) and Antimony (Sb) based flame retardants (Br or Sb do not exceed 0.1% by weight in homogeneous material)

(3) MSL, Peak Temp. -- The Moisture Sensitivity Level rating according to the JEDEC industry standard classifications, and peak solder temperature.



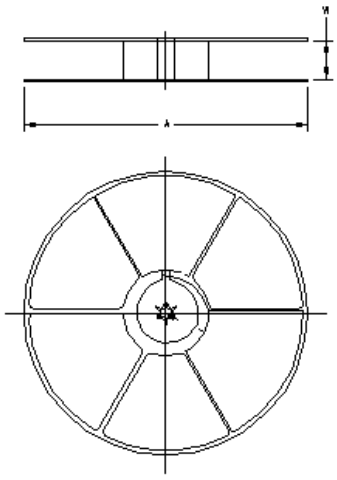
Carrier tape design is defined largely by the component lentgh, width, and thickness.

Ao = Dimension designed to accommodate the component width.
Bo = Dimension designed to accommodate the component length.
Ko = Dimension designed to accommodate the component thickness.
W = Overall width of the carrier tape.
P = Pitch between successive cavity centers.



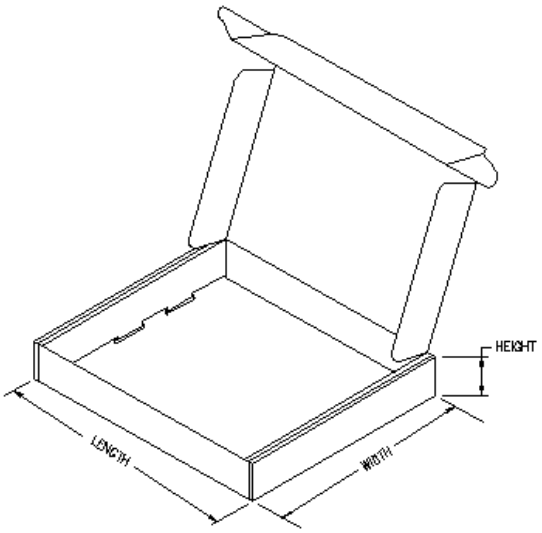
TAPE AND REEL INFORMATION

Device	Package	Pins	Site	Reel Diameter (mm)	Reel Width (mm)	A0 (mm)	B0 (mm)	K0 (mm)	P1 (mm)	W (mm)	Pin1 Quadrant
CY74FCT2374ATQCT	DBQ	20	MLA	330	16	6.5	9.0	2.1	8	16	Q1
CY74FCT2374ATSOCT	DW	20	MLA	330	24	10.8	13.0	2.7	12	24	Q1
CY74FCT2374CTQCT	DBQ	20	MLA	330	16	6.5	9.0	2.1	8	16	Q1
CY74FCT2374CTSOCT	DW	20	MLA	330	24	10.8	13.0	2.7	12	24	Q1
CY74FCT2374TSOCT	DW	20	MLA	330	24	10.8	13.0	2.7	12	24	Q1
CY74FCT2574ATQCT	DBQ	20	MLA	330	16	6.5	9.0	2.1	8	16	Q1
CY74FCT2574ATSOCT	DW	20	MLA	330	24	10.8	13.0	2.7	12	24	Q1
CY74FCT2574CTQCT	DBQ	20	MLA	330	16	6.5	9.0	2.1	8	16	Q1
CY74FCT2574CTSOCT	DW	20	MLA	330	24	10.8	13.0	2.7	12	24	Q1
CY74FCT2574TSOCT	DW	20	MLA	330	24	10.8	13.0	2.7	12	24	Q1

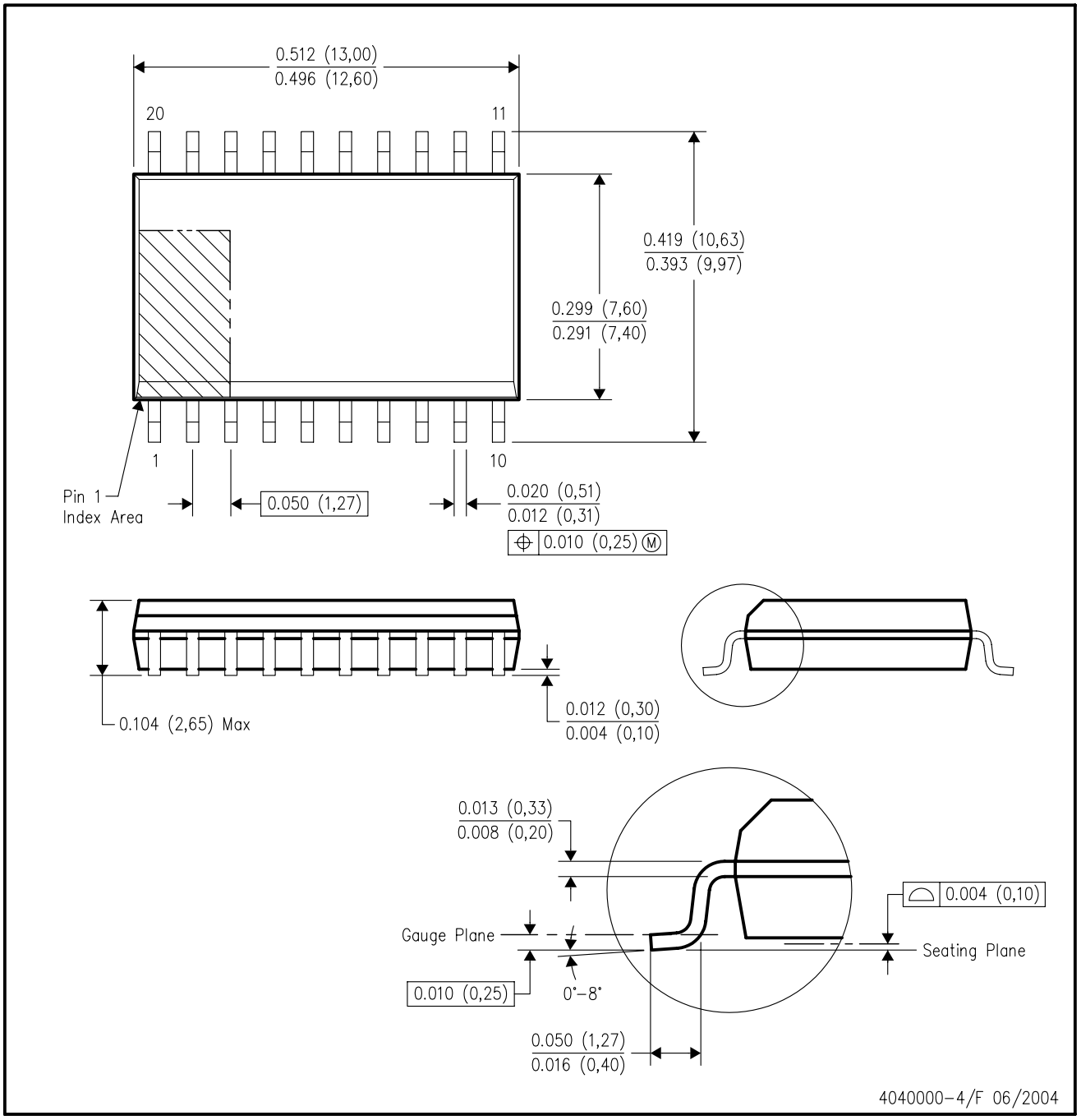


TAPE AND REEL BOX INFORMATION

Device	Package	Pins	Site	Length (mm)	Width (mm)	Height (mm)
CY74FCT2374ATQCT	DBQ	20	MLA	0.0	0.0	0.0
CY74FCT2374ATSOCT	DW	20	MLA	333.2	333.2	31.75
CY74FCT2374CTQCT	DBQ	20	MLA	0.0	0.0	0.0
CY74FCT2374CTSOCT	DW	20	MLA	333.2	333.2	31.75
CY74FCT2374TSOCT	DW	20	MLA	333.2	333.2	31.75
CY74FCT2574ATQCT	DBQ	20	MLA	0.0	0.0	0.0
CY74FCT2574ATSOCT	DW	20	MLA	333.2	333.2	31.75
CY74FCT2574CTQCT	DBQ	20	MLA	0.0	0.0	0.0
CY74FCT2574CTSOCT	DW	20	MLA	333.2	333.2	31.75
CY74FCT2574TSOCT	DW	20	MLA	333.2	333.2	31.75

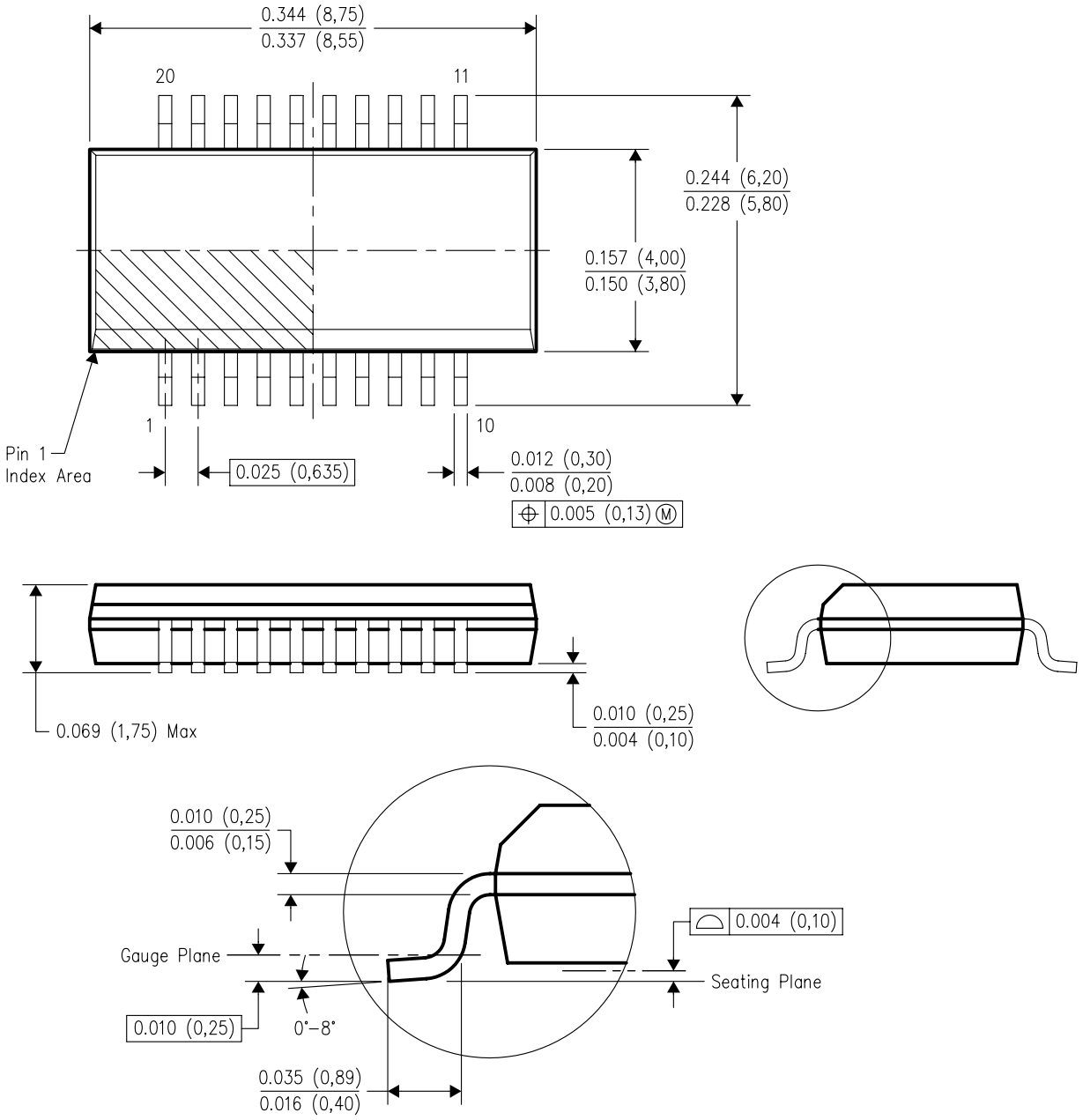

HEIGHT
LENGTH
WIDTH

DW (R–PDSO–G20) PLASTIC SMALL–OUTLINE PACKAGE



NOTES:
A. All linear dimensions are in inches (millimeters).
B. This drawing is subject to change without notice.
C. Body dimensions do not include mold flash or protrusion not to exceed 0.006 (0,15).
D. Falls within JEDEC MS–013 variation AC.

DBQ (R–PDSO–G20) PLASTIC SMALL–OUTLINE PACKAGE



NOTES:
A. All linear dimensions are in inches (millimeters).
B. This drawing is subject to change without notice.
C. Body dimensions do not include mold flash or protrusion not to exceed 0.006 (0,15) per side.
D. Falls within JEDEC MO–137 variation AD.

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