

LSHC13S 33-256N

iC-LSHC Encoder Disc and Code Description

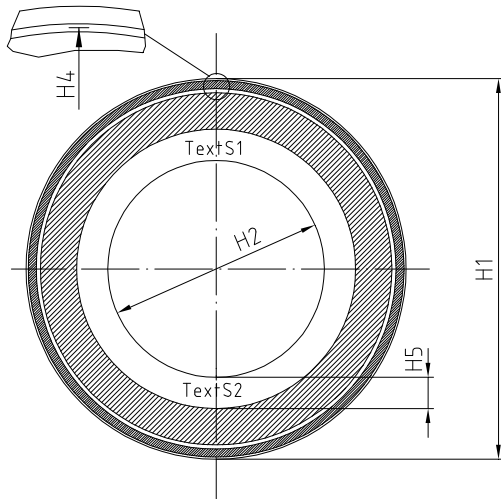


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ORDERING INFORMATION

Type	Order Designation	Description/Options
Encoder Disc	LSHC13S 33-256N	Nonius Code Disc 256 PPR, dia 33 mm

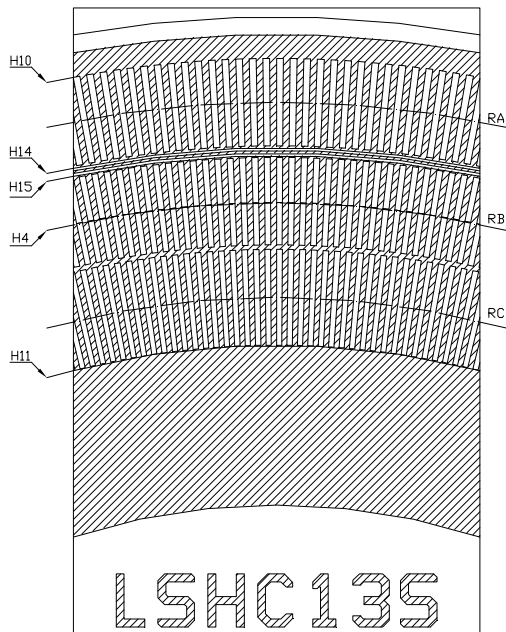
PHYSICAL DIMENSIONS



Design Example

Item	Parameter	Comments	[mm]	Tolerance
H1	Outer Diameter		33.0	$\pm 100 \mu\text{m}$
H2	Inner Diameter		18.0	$+ 200 \mu\text{m}$
H3	Thickness		1.0	$\pm 100 \mu\text{m}$
H4	Radius of Chip Center	referred to origin	14.5	
H5	Distance Pattern to Drill Hole		2.3	
H6	Code Track Eccentricity	referred to center of inner hole	± 0.2	
H7	TextS1	readable on side of pattern	LSHC13S	
H8	TextS2	readable on side of pattern	33-256	

TRACK LAYOUT



Item	Parameter	Comments	[mm]
H4	Radius of Chip Center	referred to origin	14.50
H10	Code Pattern Radius	end	16.125
H11	Code Pattern Radius	begin	12.895
H12	Recommended LED Spot Diameter	LED Spot	> 3.2
H13	Recommended LED Spot Center	radius as center of illumination	14.500
H14	Alignment Circle	end of circle	15.120
H15	Alignment Circle	begin of circle	15.030
RA	Track Radius		15.580
RB	Track Radius		14.500
RC	Track Radius		13.420

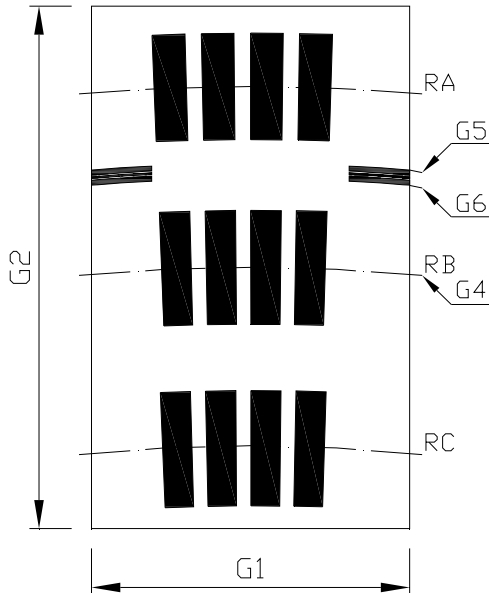
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iC-LSHC Encoder Disc and Code Description



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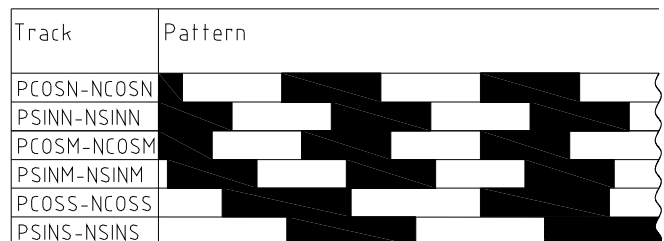
PHYSICAL DIMENSIONS: Photosensor Array



Item	Parameter	Comments	[mm]
G0	Name and Design Release	iC-PN3356	
G1	Window Width		1.90
G2	Window Height		3.24
G4	Radius of Chip Center	referred to origin	14.500
G5	Reflective Alignment Aid	end of circle	15.120
G6	Reflective Alignment Aid	begin of circle	15.030
RA	Track Radius Nonius		15.580
RB	Track Radius Master		14.500
RC	Track Radius Segment		13.420

TRACK ASSIGNMENT: Photosensor Array

Radius	Signal			
	RA	255 PPR NCOSN	255 PPR NSINN	255 PPR NCOSN
RB	256 PPR NCOSM	256 PPR PSINM	256 PPR PCOSM	256 PPR NSINM
RC	240 PPR NCOSS	240 PPR PSINS	240 PPR PCOSS	240 PPR NSINS



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