

### GB GLASS LIGHTING LIMITED

# RIBBON BULBS DRAWINGS AND SPECIFICATIONS

the use, adaptation or processing of any product described herein. Olass Lighting Limited. Data contained in this publication is accurate ŏ in respect 98 ᢐ the written authority liability whatsoever parties without to third the company rights reserved. This publication may not be reproduced or issued in any form best of the knowledge of GB Glass Lighting Limited, however,

RIBBON MACHINE BULBS IN S96 GLASS

ISSUED - 01.02.93

This brochure contains drawings and specifications for the range of lamp bulbs produced by the Ribbon Machine process at the Company's Factory at Harworth, Near Doncaster.

Basic details of each bulb are given on the individual type drawings, but in addition these are subject to the terms of the Company's Criteria Of Inspection, copies of which will be supplied on request. Data on Composition and Properties of S96 Soda Glass and L94 Lead Glass is included in this brochure.

The Company operates a Glass Advisory Service which is fully equiped to provide comprehensive information facilities and technical advisory assistance on all aspects of the choice and application of glass.

This range of lamp bulbs has been divided into two catagories, which are summerised overleaf.

Lamp Bulbs 1 :- is comprised of bulbs which are currently in regular repeat production.

Lamp Bulbs 2 :- contains bulbs for which mould equipment is available but deliveries can normally only be offered against minimum order quantities of 500,000 pieces (or 250,000 pieces in the case of bulbs over 80mm in diameter). Additions or deletions to either series will be advised by the issue of updated lists and appropriate drawings. Details of lead time and anticipated availability for any particular type will be provided on request to:-

GB GLASS LIGHTING LIMITED HARWORTH DONCASTER SOUTH YORKSHIRE DN11 8NF ENGLAND

Tel :- DONCASTER (0302) 742631

TELEX 547224 GBLHTH G

FAX DONCASTER (0302) 750102

Whilst all the information contained in this publication is accurate to the best knowledge of the Company, no liability can be accepted by the Company in respect of such information and no warranties or conditions are intended in respect of the products described.

All rights reserved. This publication may not be reproduced or issued in any form to third parties without the written authority of GB Glass Lighting Linited, however, the company does not accept any liability whatsoever in respect of the use, adaptation or processing of any product described herein.

RIBBON	MACHINE	BULBS	IN	S96	GLASS	-	STANDARD	LAMP	BULBS 1	
									ISSUED -	10.06.94

			155065	10.00, 74
	NOM	NAL MAJOR DIMEN	SIONS	GB GLASS LIGHTING PRODUCT
BULB TYPE DESCRIPTION	BULB DIAMETER	NECK DIAMETER	BULB LENGTH	TYPE DESIGNATION CODE
ELIPTICAL	70.0	35.0	180.0	E070
ELIPTICAL	75.0	42.0	190.0	E075A
ELIPTICAL	75.0	41.0	194.5	E075B
ELIPTICAL	90.0	50.0	235.0	E090A
HAMMER	60.0	33.0	126.5	ноео
LEMMON SHAPE	35.0	18.4	73.0	LS035
MUSHROOM	45.0	30.0	102.0	MO45
MUSHROOM	50.0	30.0	108.0	MO50
MUSHROOM	55.0	33.0	120.0	MO55
MUSHROOM	60.0	33.0	127.0	M060
MUSHROOM	63.5	30.0	120.0	MO63.5A
MUSHROOM	95.3	34.9	155.0	MO95
MUSHROOM	125.0	40.0	212.0	M125D
OVAL	80.0	33.0	128.0	0080
OLIVE CANDLE	35.0	23.7	109.5	OCO35B
PEAR SHAPED	60.3	28.6	127.0	PS060B
PEAR SHAPED	60.0	33.0	128.0	PS060D
PEAR SHAPED	65.0	35.0	135.0	PS065
PEAR SHAPED	68.0	37.0	143.0	PS068
PEAR SHAPED	70.0	37.0	143.0	PS070
PEAR SHAPED	80.0	39.0	178.0	PS080A
PEAR SHAPED	110.0	50.0	245.0	PS110
PEAR SHAPED	130.0	52.0	311.0	PS130A
ROUND	45.0	24.0	100.0	RO45E
ROUND	95.0	37.0	168.0	R095
ROUND	120.0	40.0	225.0	R120
ROUND	127.0	40.0	230.0	R127
SEMI-TUBULAR	25, 4	15. 2	65.0	ST025.4
SEMI-TUBULAR	28.0	23.0	73.0	ST028
SEMI-TUBULAR	28.0	20.0	75.0	STO28E
SEMI-TUBULAR	28.0	23.0	73.0	STO28K
SEMI-TUBULAR	35.0	16.0	75.5	ST035
TUBULAR	17.0	17.0	63.0	T017
TWISTED CANDLE	35.0	24.2	111.0	ТС035В
TWISTED CANDLE	47.0	28.0	151.0	TC047

the best of the knowledge of 0B Glass Lighting Limited, however, the company does not accept any liability whatsoever in respect of the use, adaptation or processing of any product described herein. All rights reserved. This publication may not be reproduced or issued in any form to third parties without the written authority of GB Glass Lighting Limited. Data contained in this publication is accurate to the best of the knowledge of GB Glass Lighting Limited. However, the company does not account to the best of the knowledge of GB Glass Lighting Limited.

RIBBON MACHINE BULBS IN S96 GLASS - NON-STANDARD LAMP BULBS 2 (page 1 of 2) ISSUED - 10.06.94

иоиз	NAL MAJOR DIME	NSTONS	GB GLASS LIGHTING	
	THE HAVOR DIRE	NO TORS	PRODUCT	
BULB DIAMETER	NECK DIAMETER	BULB LENGTH	TYPE DESIGNATION CODE	
65.0 75.0	33.0 39.0	130.0 151.5	DK065 DK075	
34.0	14.0	76.0	E034 E040	
70.0	35.0	171.0	E070A	
65.0	33.0	140.0	H065	
40.0	28.2	148.5	FB040	
45.0	24.0	100.0	LSO45A	
65.0 33.0 134.0 75.0 37.0 147.0			MO65 MO75A MO85	
95.3	34.9	170.0	M095A	
80.0	33.0	128.0	A0800	
20.5 25.0 30.0 35.0 38.0 45.0	16.6 20.0 21.0 24.0 24.0 28.0	78.0 93.0 110.0 115.0 130.0	0C020.5 0C025A 0C030 0C035A 0C038A 0C045	
38. 0 39. 2 50. 0 55. 0 55. 0 75. 0	19.0 20.0 30.0 31.0 32.0 37.0	76.0 75.0 96.0 110.0 111.0	PS038 PS040 PS050 PS055 PS055A PS075	
40.0 40.0 45.0 50.0 50.0 60.0 68.0 79.4 88.0	24.0 18.0 26.0 23.0 26.0 27.2 30.0 30.1 39.3 35.0	83.0 78.0 88.0 95.0 93.0 105.0 120.0 130.2 203.0	RO40 RO40D RO45 RO50 RO50A RO60 RO68 RO79 RO88 R100A	
	BULB DIAMETER  65.0 75.0  34.0 40.0 70.0  65.0 40.0  45.0  65.0 75.0 85.0 95.3  80.0  20.5 25.0 30.0 35.0 38.0 45.0  38.0 45.0  38.0 45.0  50.0 55.0 55.0 75.0  40.0 40.0 40.0 40.0 40.0 40.0 40.0	BULB DIAMETER         NECK DIAMETER           65.0 33.0 39.0         33.0 39.0           34.0 41.0 40.0 21.0 70.0 35.0         21.0 70.0           65.0 33.0 40.0 28.2 45.0 24.0         24.0           65.0 33.0 75.0 37.0 85.0 35.5 95.3 34.9         33.0 37.0 85.5 95.3 34.9           80.0 33.0 20.0 33.0 33.0 33.0 33.0 33.0 3	DIAMETER         DIAMETER         LENGTH           65.0         33.0         130.0           75.0         39.0         151.5           34.0         14.0         76.0           40.0         21.0         100.0           70.0         35.0         171.0           65.0         33.0         140.0           40.0         28.2         148.5           45.0         24.0         100.0           65.0         33.0         134.0           75.0         37.0         147.0           85.0         35.5         145.0           95.3         34.9         170.0           80.0         33.0         128.0           20.5         16.6         78.0           25.0         20.0         93.0           30.0         21.0         110.0           35.0         24.0         115.0           38.0         24.0         130.0           45.0         28.0         155.0           38.0         19.0         76.0           39.2         20.0         75.0           30.0         96.0         110.0           35.0         31.0         <	

All rights reserved. This publication may not be reproduced or issued in any form to third parties without the written authority of GB Glass Lighting Linited, however, the company does not accept any liability whatsoever in respect of the use, adaptation or processing of any product described herein.

RIBBON MACHINE BULBS IN S96 GLASS - NON-STANDARD LAMP BULBS 2 (page 2 of 2) ISSUED - 01.02.93

	NOMI	NAL MAJOR DIMEN	SIONS	GB GLASS LIGHTING PRODUCT
BULB TYPE DESCRIPTION	BULB DIAMETER	NECK DIAMETER	BULB LENGTH	TYPE DESIGNATION CODE
SEMI-TUBULAR SEMI-TUBULAR SEMI-TUBULAR SEMI-TUBULAR SEMI-TUBULAR SEMI-TUBULAR TUBULAR	19.5 25.0 25.5 28.0 28.0 34.0 44.5 17.5 20.3 23.2 25.0 26.0 28.5 30.0 38.0 38.0	13.5 13.7 22.0 20.0 15.0 18.5 24.0 32.0 17.5 20.3 23.2 22.0 26.0 28.5 30.0 38.0 38.0	57.0 63.0 70.0 76.0 65.2 73.0 100.0 111.8 70.5 88.0 100.7 100.0 76.0 107.0 115.0 134.8 120.0 138.0	ST019.5 ST025E ST025.5 ST028G ST028H ST028L ST034 ST044.5  T017.5 T020.5 T023A T025 T025A T026 T028.5 T030 T038 T038B
				1

### TECHNICAL INFORMATION

Soda Lime Glass Type S96

ISSUE DATE: 26th FEB 94

### Description

S96 glass is a Soda-Lime-Silica composition in which the lime is Dolomitic.
It is formed into bulbs (and similar items) on Ribbon Machines and into tubing by the Danner process.
The glass forms satisfactory seals to our standard lead glass (L94) and to other glasses with suitable expansion characteristics.

### **Applications**

The glass is used extensively for bulb blanks for incandescent lamps and tubes for fluorescent and SOX lamps. It is also used in blanks for vacuum flasks, as bulbs for Christmas tree ornaments and finds applications in glass fibre manufacture.

### Availability

Machine made bulbs in a wide range of shapes and sizes.
Tubing in standard 25mm, 38mm, 50mm, and 65mm, also as "mints" for glass fibre manufacture.

### Typical Physical Properties And Chemical Analysis Are Given Below.

Physical Properties		Chemical (	Composition	Transmission Characte	ristics	
Coefficient of Expansion					Glass Co. 8mm	Thickness 1.0mm
50 - 300 deg C	93.9+10 -7	SiO2	71.3	U V Cut Off	280	Оля
50 - 400 deg C	97.2•10 -7	A1203	1.7	302 nm	8.0 %	4.4 X
Specific Gravity	2.48	Ca0	5.8	400 nm	91.5 X	91.4 %
Strain Point	492 deg C	MgO	3.9	500 nm	91.8 %	91.7 %
Transformation Point	517 deg C	Na20	16.0	600 nm	91.5 X	91.4 %
Annealing Point	530 deg C	K20	0.8	700 nm	90.4 %	90.0 %
Mg Point	541 deg C	Fe203	0.1	2.5 um (4000 cm -1)	89.4 %	88.7 %
Dilatometric Softening Point	<b>5</b> 52 deg C	S03	0.2	2.857 um (3500 cm -1)	61.6 %	55.7 X
Littleton Softening Point	709 deg C					
Approved : Attlege . Date:	26.02.94					
Approved : Mole Date:	26.02.94					

best of the knowledge of GB Glass Lighting Limited, however, the company does not accept any liability whatsoever in respect of the use, adaptation or processing of any product described herein rights reserved. This publication may not be reproduced or issued in any form to third parties without the written authority of GB Glass Lighting Limited. Data contained in this publication is accurate

## Lead Glass Type L94

### ISSUE DATE 14.11.89

### Description

L 94 is a mixed alkalilead silicate composition in the category commonly described as '20% lead glass'. It is formed into tubing and rod by the Danner and Vello process. The glass forms a satisfactory seal to our soda-lime type glasses and to other glasses with suitable expansion characteristics. It has electrical properties approriate to its application and is softer than soda-lime compositions to facilitate sealing.

### **Applications**

The glass is mainly used in those components of incandescent and fluorescent lamp manufacture where a high electrical resistance glass is necessary. It is also used for miniature bulb production.

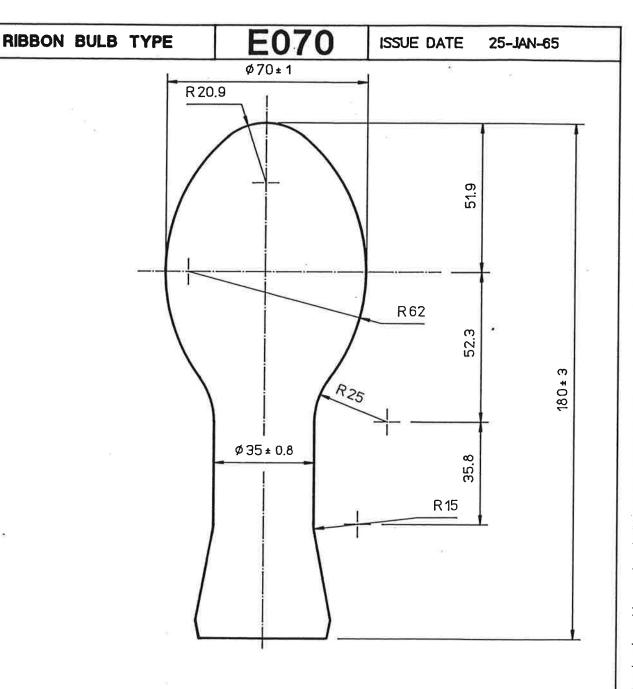
### **Availability**

The glass is available as tubing with diameters between 2mm and 25mm. End finish may be 'as cut' or with a light, medium or heavy glaze as required. Rod is available in diameters between 2.25mm and 5mm. Miniature butb blanks are also supplied.

### Typical physical properties and chemical analysis are given below.

Physical Properties						Chemical C	omposition
Coefficient expansion:	a see a see	J. a		ž 15	8.	9	. 88
	_7					SiO <sub>2</sub>	62.7
50 - 300℃	910 x 10 7					Al <sub>2</sub> O <sub>3</sub>	17
<b>50 - 400℃</b>	93.0 x 10				٠.	PbO ·	20.8
Specific Gravity:	* <b>2.83</b>	65				Na <sub>2</sub> O	6.5
Strain Point	424°C					K <sub>2</sub> 0 <sup>5</sup>	7.5
Transformation Point	436°C	5.00	**		•	CeO <sub>2</sub>	0,3
Annealing Point	440°C		6	•3		Fe <sub>2</sub> 0 <sub>3</sub>	0.08
Mg Point	466℃		3				
Dilatometric Softening Point	476°C					Electrical pr	
Littleton Softening Point	644°C				•	0.8	(64)

PROVED BY WOUNDERN NO. DATE	MODIFICATION	NO.	DATE	MODIFICATION
PROVED BY MIKE				



NECK

(AT 130 FROM BULB TOP)

.41 TO .76

SIDE

(AT MAXIMUM DIAMETER)

.38 MIN

TOP

(AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIAMETER

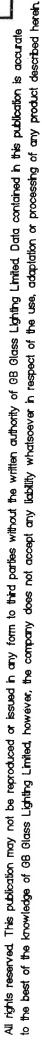
32.6 MIN

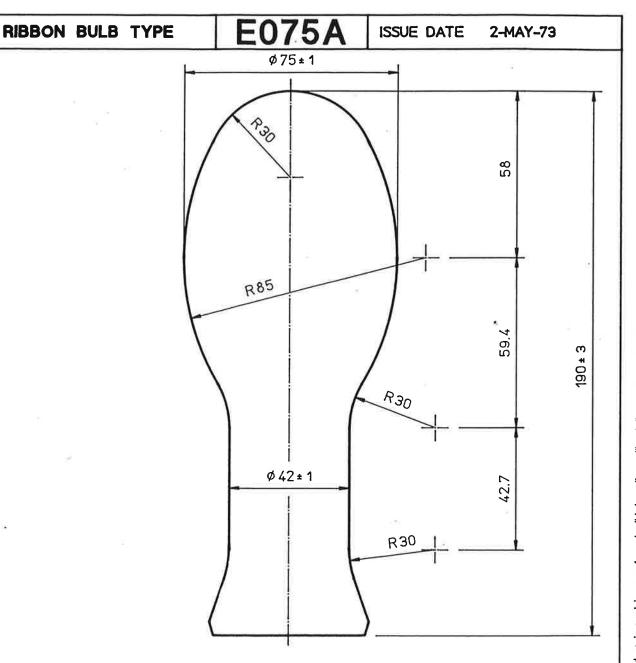
FLARE INSIDE DIAMETER

36.8 MIN

OUTSIDE DIAM, 50.9 MAX.

APPROVED BY	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
		14-1-91	DIMENSIONS REVIEWED			
APPROVED BY C.W L		,				





**NECK** 

(AT150 FROM BULB TOP)

.48 TO .83

SIDE

(AT MAXIMUM DIAMETER)

.38 MIN

TOP

(AT CENTRE TOP)

1.0 TO 2.50

STEM

INSIDE DIAMETER

39.5 MIN

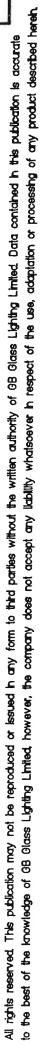
FLARE

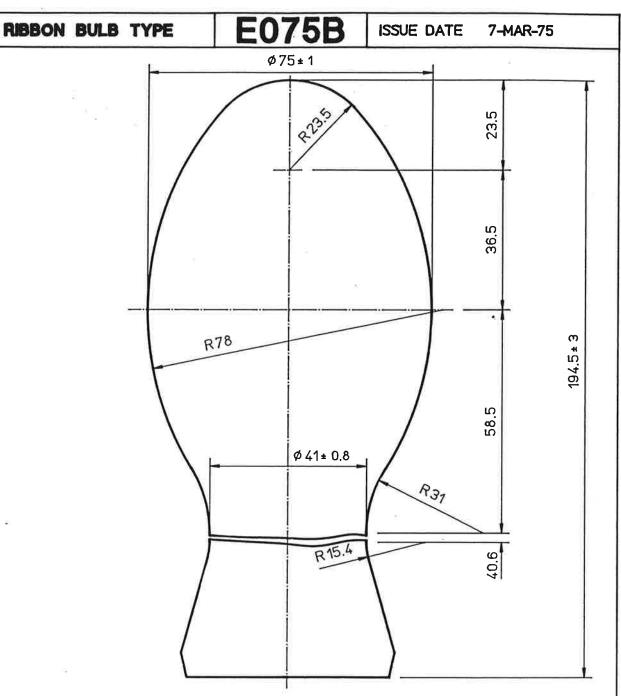
INSIDE DIAMETER

43.7 MIN

OUTSIDE DIAM.57.7 MAX.

APPROVED BY TO TO NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
1	-4-2-91	DIMENSIONS REVIEWED			
APPROVED BY C. WILL					





NECK

(AT 137 FROM BULB TOP)

.50 TO .88

SIDE

(AT MAXIMUM DIAMETER)

min.

TOP

(AT CENTRE TOP)

1.00 TO 2.50

STEM

INSIDE DIAMETER

37.0 MIN

.38

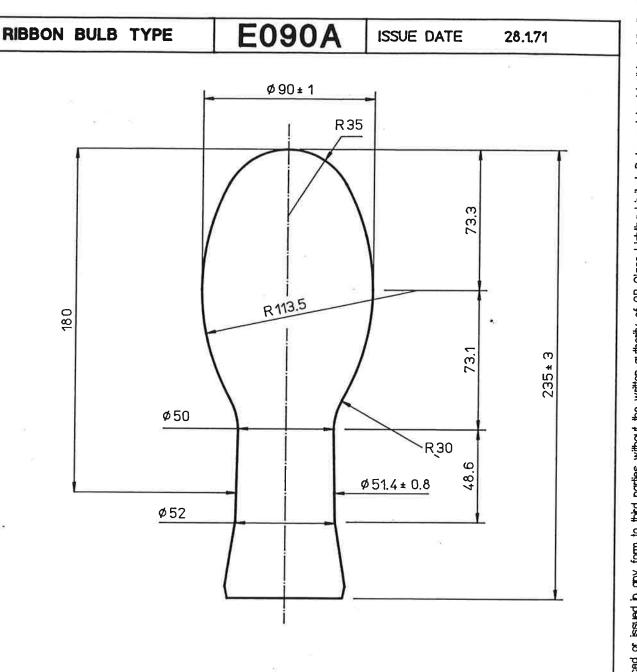
FLARE

INSIDE DIAMETER

43.7 MIN

OUTSIDE DIAM. 57.7 MAX.

APPROVED BY	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
7	<del>~\</del> _	5-3- <del>9</del> 0	NECK MEASURING POSN TO 137		5-3-90	FLARE RAD WAS 15
APPROVED BY C. WW		<b>\5-3-90</b>	STEM LENGTH WAS 46.05	2	16-1-91	DIMENSIONS REVIEWED



NECK

(AT180 FROM BULB TOP)

0.70 TO 1.20

SIDE

(AT MAXIMUM DIAMETER)

0.35 MIN

TOP

(AT CENTRE TOP)

0.50 TO 2.00

STEM

INSIDE DIAMETER

46.5 MIN

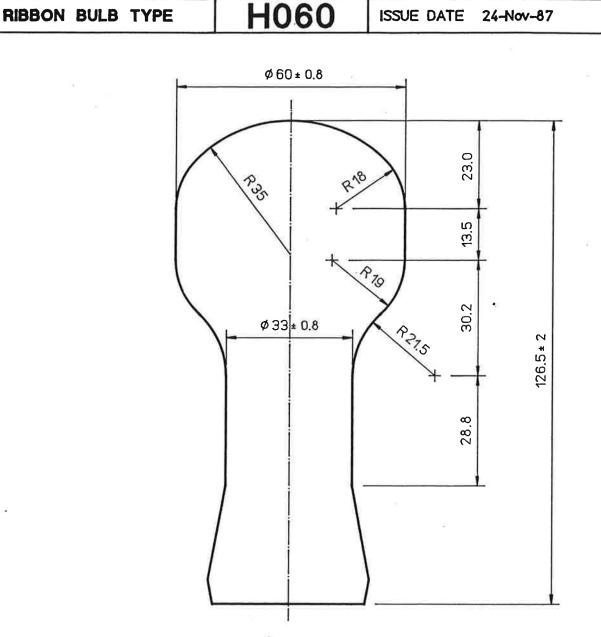
FLARE

INSIDE DIAMETER

49.5 MIN

OUTSIDE DIAM 66.0 MAX

APPROVED BY CONTON	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
	V 2	15.3.89.	NECK MEASURING POSN, WAS 170			
APPROVED BY	31	4-2-91	DIMENSIONS REVIEWED			



NECK

(AT 83 FROM BULB TOP)

0.38 TO 0.72

SIDE

(AT 29 FROM TOP OF BULB)

0.35 MIN

(AT CENTRE TOP)

0.45 TO 1.30

STEM

INSIDE DIAMETER

30.6 MIN

**FLARE** 

INSIDE DIAMETER

32.1 MIN

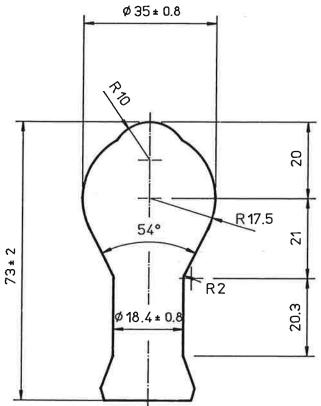
OUTSIDE DIAM.43.3 MAX

APPROVED BY	1[	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
1	W/	1	27-JAN-93	DIMENSIONS REVIEWED			
APPROVED BY C. S.W	$\preceq$	$\neg$			$\neg \neg \neg$		

20-0CT-64

the best of the knowledge of GB Glass Lighting Limited, however, the company does not accept any liability whatsoever in respect of the use, adaptation or processing of any product described herein All rights reserved. This publication may not be reproduced or issued in any form to third parties without the written authority of 0B Glass Lighting Limited. Data contained in this publication is accurate

RIBBON BULB TYPE LS035 ISSUE DATE



WALL THICKNESS LIMITS & MEASURING POSITION

NECK-

(AT 50 FROM BULB TOP)

.45 TO .80

SIDE TOP (AT MAXIMUM DIAMETER)

.30 MIN

100

(AT CENTRE TOP)

.45 TO 1.27

STEM

INSIDE DIAMETER

15.6 MIN

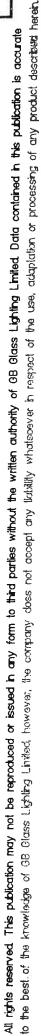
FLARE

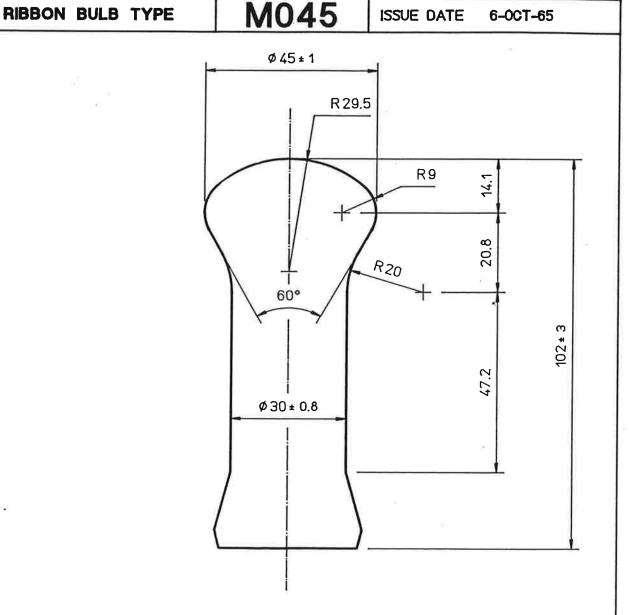
INSIDE DIAMETER

15.4 MIN

OUTSIDE DIAM.26.0 MAX.

APPROVED BY TOOM NO	DATE	MODIFICATION	NO.	DATE	MODIFICATION
Contracting !	5-2-91	DIMENSIONS REVIEWED	7		
APPROVED BY	Α				





NECK

(AT 64 FROM BULB TOP)

.41 TO .76

SIDE

(AT MAXIMUM DIAMETER)

.38 MIN

TOP

(AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIAMETER

27.6 MIN

FLARE

INSIDE DIAMETER

30.3 MIN

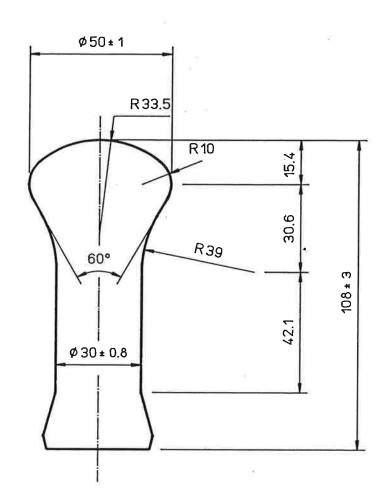
OUTSIDE DIAM.39.6 MAX.

APPROVED BY TO NO. DATE	MODIFICATION	NO.	DATE	MODIFICATION
	FLARE WAS 37.69/40.155	П		
APPROVED BY C. Why 27 5-2-91	DIMENSIONS REVIEWED			

RIBBON BULB TYPE

M050

ISSUE DATE 6-OCT-92



WALL THICKNESS LIMITS & MEASURING POSITION

**NECK** 

(AT 65 FROM BULB TOP)

.41 TO .76

SIDE

(AT MAXIMUM DIAMETER)

NIM 8E.

TOP

(AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIAMETER

27.6 MIN

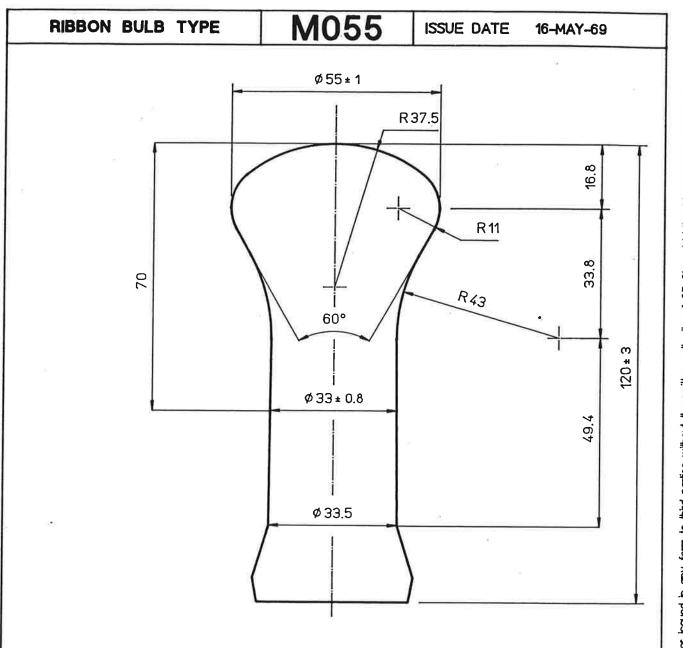
FLARE

INSIDE DIAMETER

30.3 MIN

OUTSIDE DIAM. 39.6 MAX.

ALL DIMENSIONS ARE IN mm



NECK

(AT 70 FROM BULB TOP)

.38 TO .73

SIDE

(AT MAXIMUM DIAMETER)

.38 MIN

TOP

(AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIAMETER

30.6 MIN

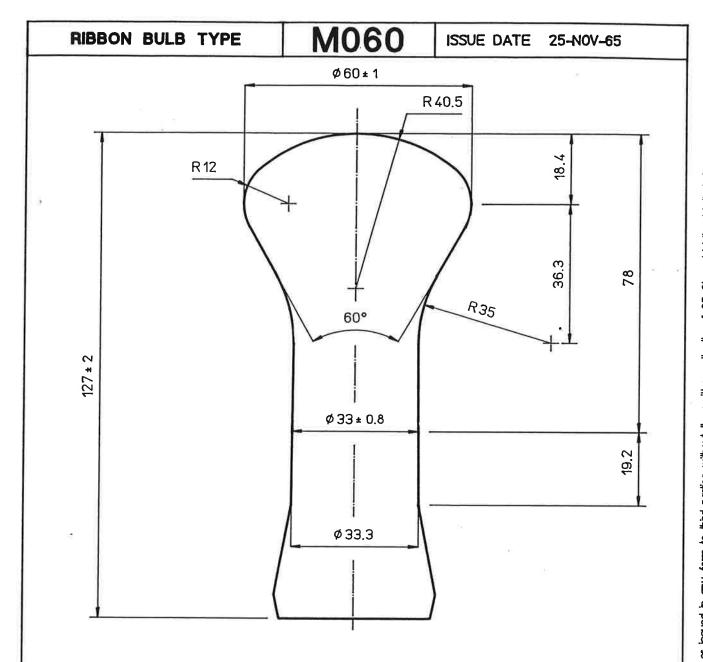
**FLARE** 

INSIDE DIAMETER

32.1 MIN

OUTSIDE DIAM.43.3 MAX.

APPROVED BY MONTHING	DATE	MODIFICATION	NO.	DATE	MODIFICATION
	16-1-91	DIMENSIONS REVIEWED			
APPROVED BY C.WW	1				



NECK

(AT 78 FROM BULB TOP)

.41 TO .76

SIDE

(AT MAXIMUM DIAMETER)

78 MHN 8E.

TOP

(AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIAMETER

30.6 MIN

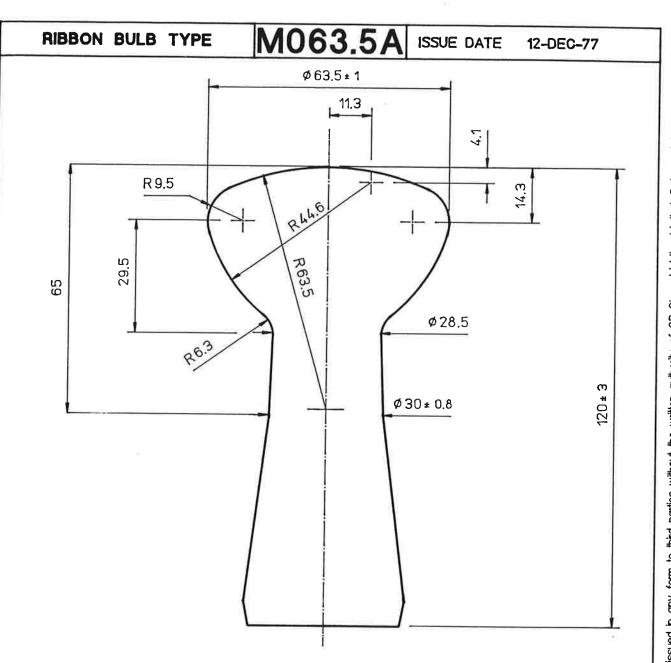
FLARE

INSIDE DIAMETER

32.1 MIN

OUTSIDE DIAM.43.3 MAX.

APPROVED BY	NO.	DATE	MODIFICATION NECK MEAS POS'N 73 INSTEAD OF 78 NECK MEAS POS'N 78 NOT 73	NO,	DATE	MODIFICATION
ADDOCUTE ON O STATE	1	25-7-78	NECK MEAS POS'N 73 INSTEAD OF 78			FLARE TAPER CHANGED
APPROVED BY C. WWW	2	15-3-88	NECK MEAS POS'N 78 NOT 73	3	11-1-91	DIMENSIONS REVIEWED



NECK

(AT 76 FROM BULB TOP)

.40 TO .75

SIDE

(AT MAXIMUM DIAMETER)

.38 MIN

TOP

(AT CENTRE TOP)

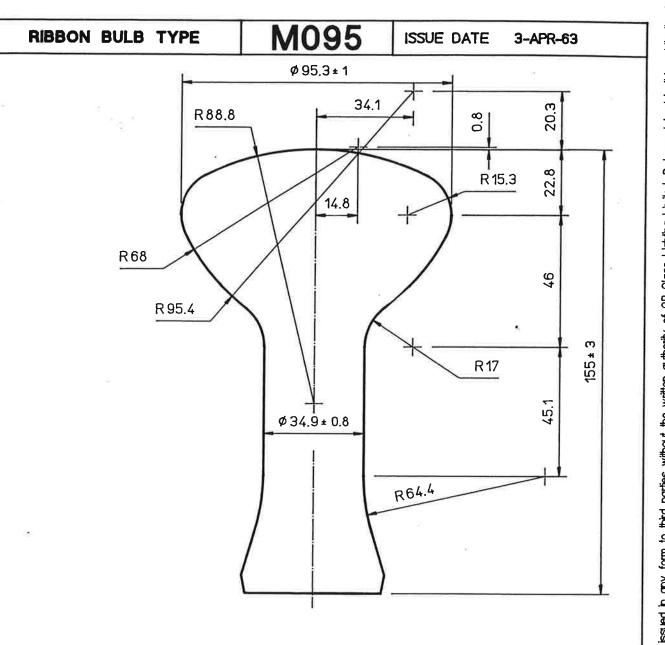
.50 TO 1.30

STEM FLARE

INSIDE DIAMETER
INSIDE DIAMETER

26.0 MIN 32.1 MIN (AT 43.8 FROM TOP)
OUTSIDE DIAM.43.9 MAX.

APPROVED BY Contenden	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
-PA-T	1	16-1-91	DIMENSIONS REVIEWED			
APPROVED BY C. JULY	12	_26-JUL-93	1,30 WAS 1,20 AT TOP	$\neg$		



**NECK** 

(AT100 FROM BULB TOP)

.48 TO 1.09

SIDE

(AT MAXIMUM DIAMETER)

.38 MIN

TOP

(AT CENTRE TOP)

1.00 TO 2.55

STEM

INSIDE DIAMETER

32.5 MIN

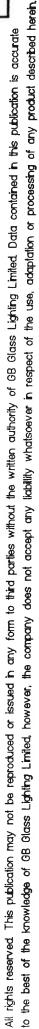
FLARE

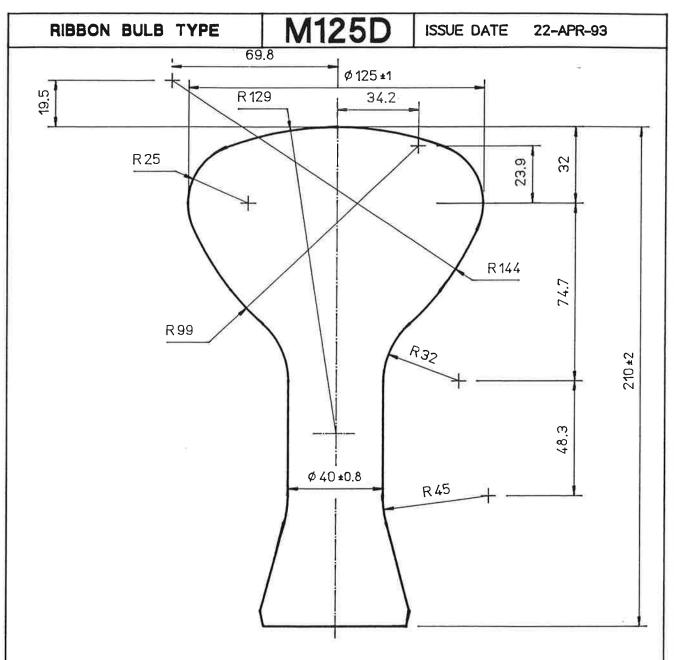
INSIDE DIAMETER

40.0 MIN

OUTSIDE DIAM.52.0 MAX.

APPROVED BY	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
		11-1-91	DIMENSIONS REVIEWED			
APPROVED BY CONT	D		×			





**NECK** 

(AT150 FROM BULB TOP)

.50 TO 1.20

SIDE TOP

(AT MAXIMUM DIAMETER) (AT CENTRE TOP)

.42 MIN

MIN

STEM

1.0 TO 2.75

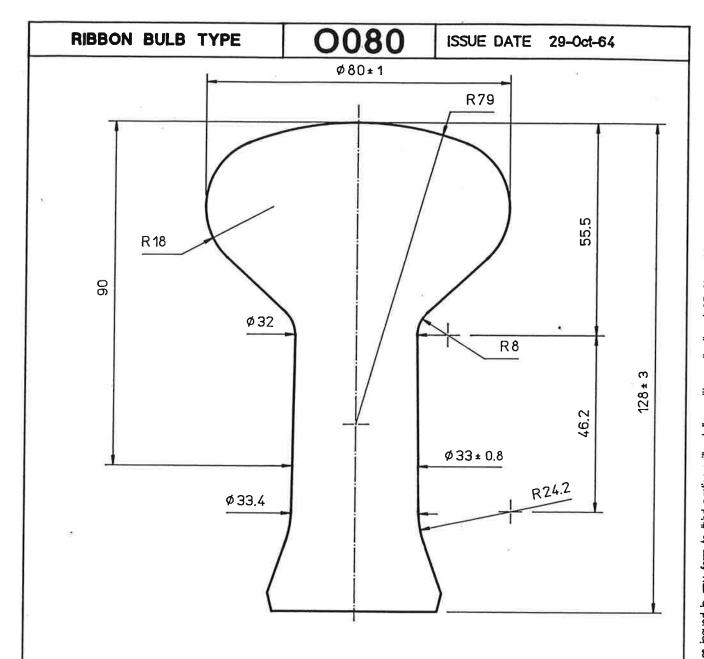
INSIDE DIAMETER

37.3

FLARE INSIDE DIAMETER

49.5 MIN OUTSIDE DIAM.70.0 MAX.

APPROVED BY	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
APPROVED BY & Lad	3					



**NECK** 

(AT 90 FROM BULB TOP)

0.41 TO 0.76

SIDE

(AT MAXIMUM DIAMETER)

0.38 MIN

TOP

(AT CENTRE TOP)

0.60 TO 1.70

STEM

INSIDE DIAMETER

29.6 MIN

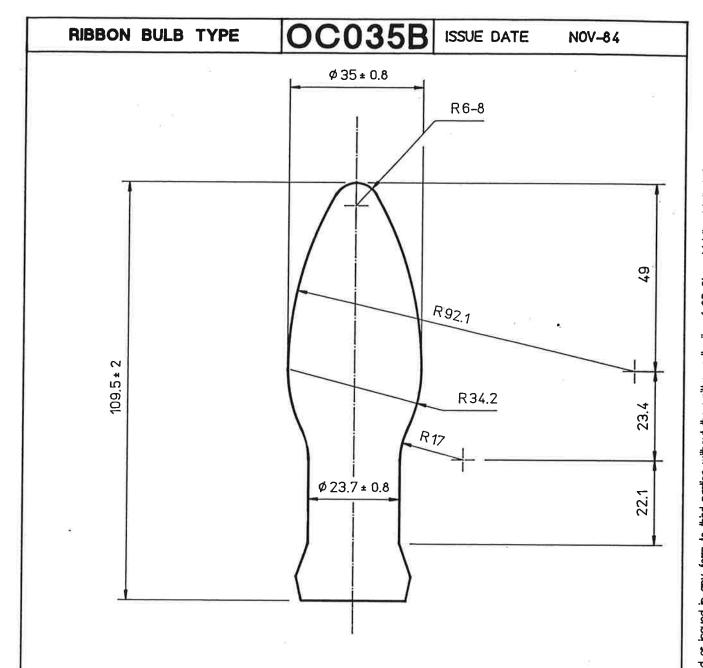
FLARE

INSIDE DIAMETER

35.6 MIN

OUTSIDE DIAM. 47 MAX.

APPROVED BY NO. DATE	MODIFICATION NO.	DATE	MODIFICATION
1 7.8.89. F	LARE MODIFIED		
APPROVED BY C. 512-12-90 DI	MENSIONS REVIEWED		



**NECK** 

(AT 78 FROM BULB TOP)

.40 TO .75

SIDE

(AT MAXIMUM DIAMETER)

.30 MIN

TOP

(AT CENTRE TOP)

.40 TO 1.20

STEM

INSIDE DIAMETER

21.3 MIN

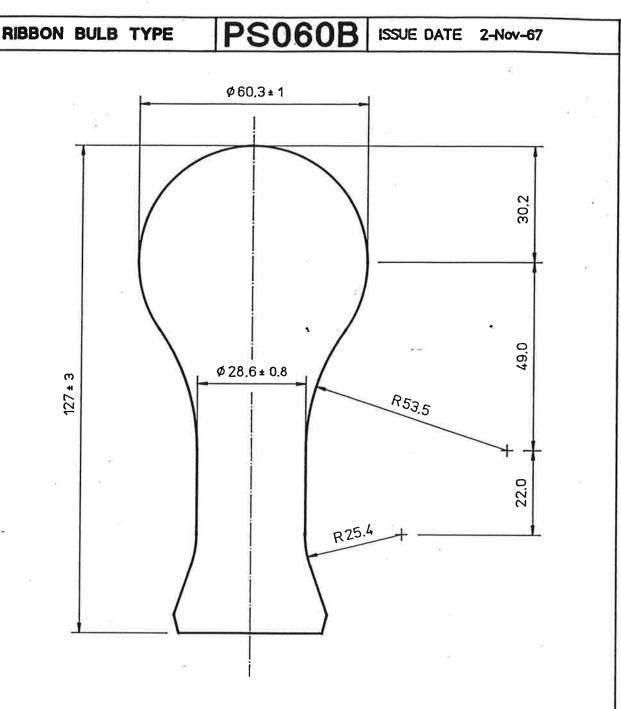
FLARE

INSIDE DIAMETER

22.1 MIN

OUTSIDE DIAM, 31,6 MAX.

APPROVED BY TOOL TOOL	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
	1	17-12-90	DIMENSIONS REVIEWED	$\neg \neg$		
APPROVED BY		7				A STATE OF THE STA



NECK

(AT 90 FROM BULB TOP)

0.35 TO 0.69

SIDE TOP (AT MAXIMUM DIAMETER)

0.35 MIN

(AT CENTRE TOP)

0.48 TO 1.48

STEM

INSIDE DIAMETER

26.2 MIN

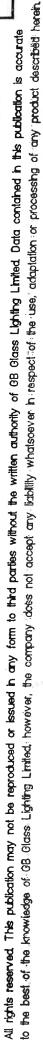
FLARE

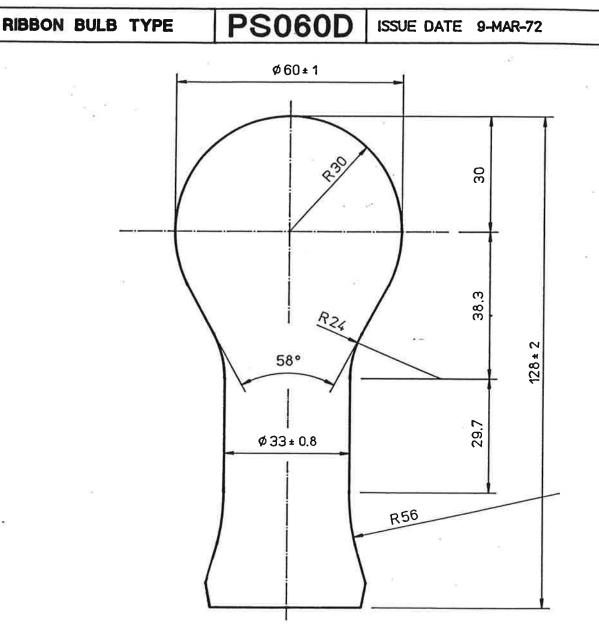
INSIDE DIAMETER

32.0 MIN

OUTSIDE DIAM. 42.3 MAX.

APPROVED BY	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
100	<b>11</b>		DIMENSIONS REVIEWED			
APPROVED BYCLUM	4না		To .			





NECK

(AT 85 FROM BULB TOP)

.41 TO .76

SIDE TOP

(AT MAXIMUM DIAMETER)
(AT CENTRE TOP)

.38 MIN .51 TO 1.52

STEM

INSIDE DIAMETER 3

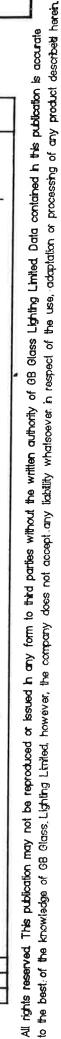
30.6 MIN

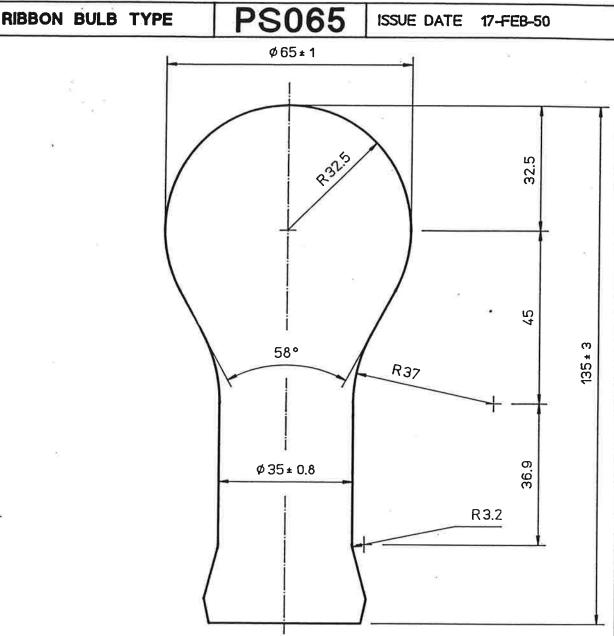
FLARE INSIDE DIAMETER

32.1 MIN

OUTSIDE DIAM 43.3 MAX

APPROVED BY	NO.	DATE	MODIFICATION SEALING IN LINES REMOVED DIMENSIONS REVIEWED	NO.	DATE	MODIFICATION
100001150	$\forall$ 1	8-1-73	SEALING IN LINES REMOVED	3	6-8-92	NECK MEAS POS WAS 78
WHYOVED BY COM	127	17-12-90	DIMENSIONS REVIEWED			PLATE DIM DELETED





NECK

(AT 96 FROM BULB TOP)

.41 <sub>...</sub> TO .76

SIDE

(AT MAXIMUM DIAMETER)

.38 MIN

TOP

(AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIAMETER

32.6 MIN

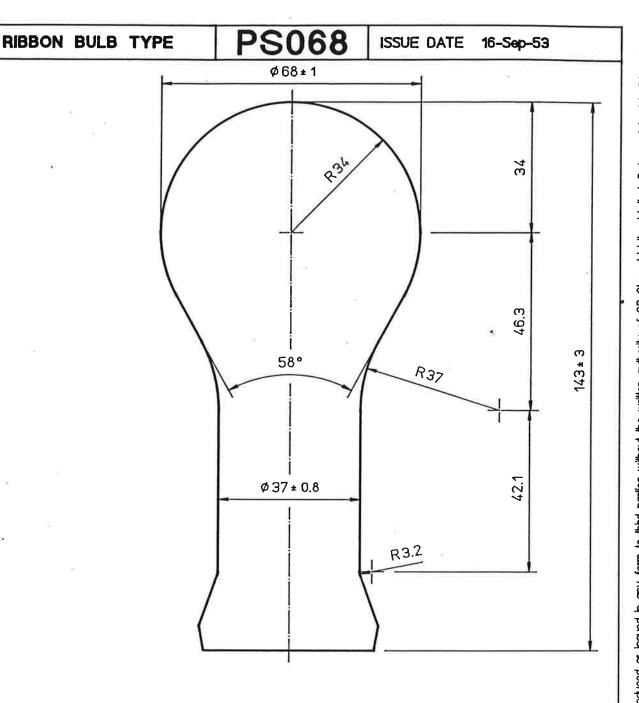
**FLARE** 

INSIDE DIAMETER

32.6 MIN

OUTSIDE DIAM.43.3 MAX.

APPROVED BY TOO NO	DATE	MODIFICATION	NO.	DATE	MODIFICATION
E C	5-2-91	DIMENSIONS REVIEWED			
APPROVED BY C. WIND	3	14	$\Box$		



NECK

(AT104 FROM BULB TOP)

.41 TO .76

SIDE

(AT MAXIMUM DIAMETER)

NIM 8E.

TOP

(AT CENTRE TOP)

51 TO 1.52

STEM

INSIDE DIAMETER

34.6 MIN

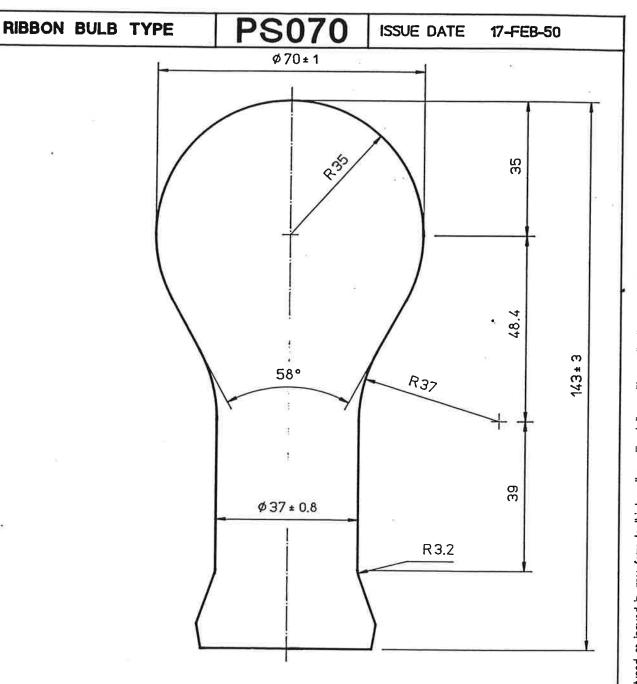
FLARE

INSIDE DIAMETER

36.8 MIN

OUTSIDE DIAM.48.2 MAX.

APPROVED BY	O. DATE	MODIFICATION	NO.	DATE	MODIFICATION
17.42	11-1-91	DIMENSIONS REVIEWED			
APPROVED BY COUNTY	1				



**NECK** 

(AT 104 FROM BULB TOP)

.41 TO .76

SIDE

(AT MAXIMUM DIAMETER)

.38 MIN

TOP

(AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIÀMETER

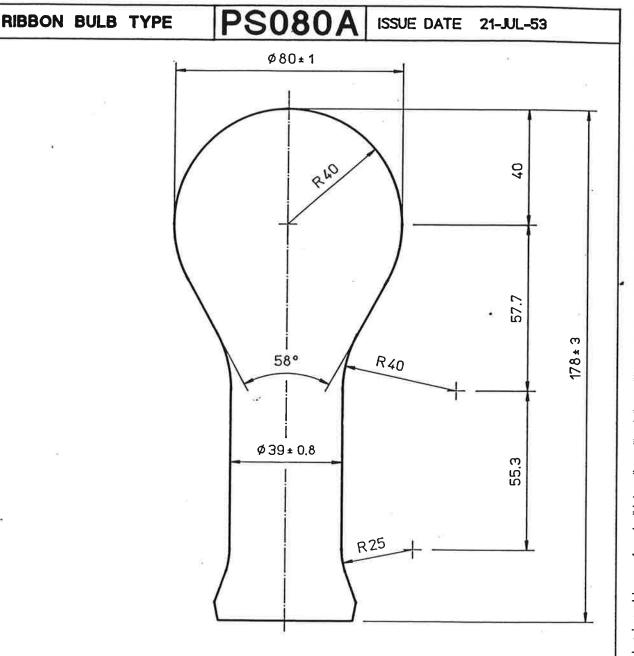
34.6 MIN

FLARE INSIDE DIAMETER

36.8 MIN

OUTSIDE DIAM.48.2 MAX.

APPROVED BY	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
13:1	MA	5-2-91	DIMENSIONS REVIEWED.	$\neg \neg$		
APPROVED BY COLUM	Y N	20		$\neg \neg$		



**NECK** 

(AT129 FROM BULB TOP)

.41 TO .76

SIDE

(AT MAXIMUM DIAMETER)

.38 MIN

TOP

(AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIAMETER

36.6 MIN

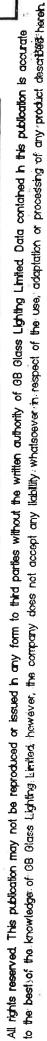
FLARE

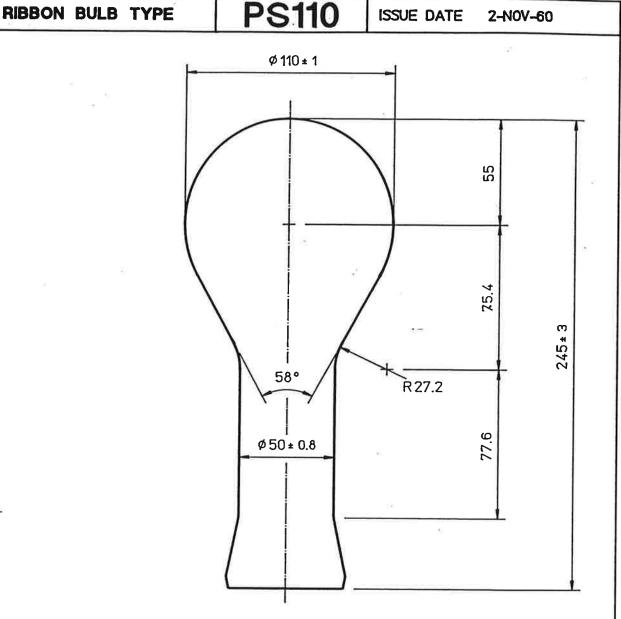
INSIDE DIAMETER

36.8 MIN

OUTSIDE DIAM.50.9 MAX.

APPROVED BY	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
		17-4-68	NECK MEASURE WAS 139	$\neg \neg$		
APPROVED BY COUNTY	2	\ 11-1-91	DIMENSIONS REVIEWED	$\top$		





NECK

(AT170 FROM BULB TOP)

.46 TO .91

SIDE

(AT MAXIMUM DIAMETER)

.38 MIN

TOP

(AT CENTRE TOP)

.89 TO 2.41

STEM

INSIDE DIAMETER

47.5 MIN

FLARE

INSIDE DIAMETER

49.5 MIN

OUTSIDE DIAM.66.0 MAX

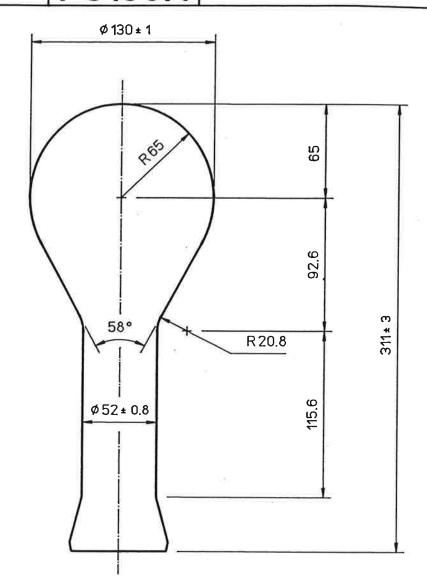
APPROVED BY	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
	VI	5-2-91	DIMENSIONS REVIEWED	$\top$		
APPROVED BY CUTTO	*~			$\neg \neg$		

to the bestrof the knowledge of GB Class Lighting Linklad, however, the company does not accept any liability whatsoever in mapped of the use, adaptation or processing of any product described therein. All rights reserved. This publication may not be reproduced or issued in any form to third parties without the written authority of 0B Glass Lighting Limited. Data contained in this publication is accurate

RIBBON BULB TYPE

**PS130A** 

ISSUE DATE 18-OCT-71



WALL THICKNESS LIMITS & MEASURING POSITION

NECK

(AT197 FROM BULB TOP)

.56 TO 1.14

SIDE

(AT MAXIMUM DIAMETER)

.38 MIN

TOP

(AT CENTRE TOP)

.89 TO 2.41

STEM

INSIDE DIAMETER

47.5 MIN

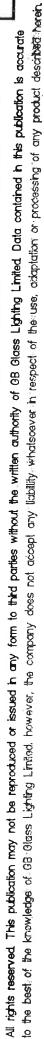
FLARE

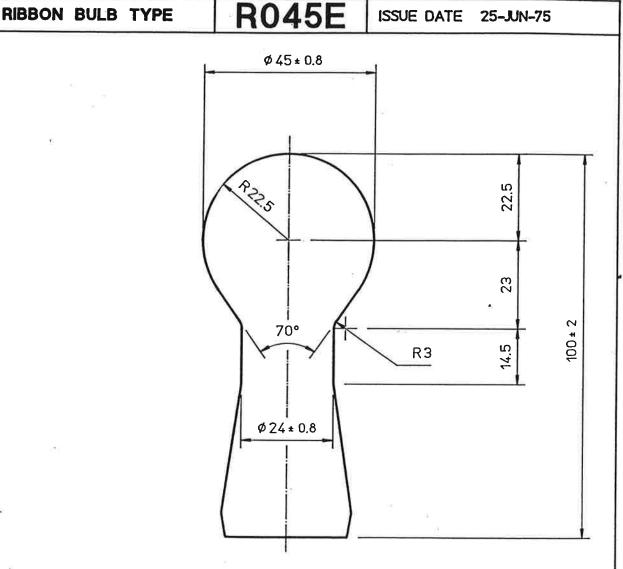
INSIDE DIAMETER

52.7 MIN

OUTSIDE DIAM.71.3 MAX

APPROVED BY WOOD NOW	O. DATE	MODIFICATION	NO.	DATE	MODIFICATION
TO MONOTON	1 11-6-74	FLARE 0/D WAS 70.00	$\neg \neg$		
APPROVED BY COLOR	2 5-2-91	DIMENSIONS REVIEWED	$\Box$		





NECK

(AT 53 FROM BULB TOP)

.41 TO .75

SIDE

(AT MAXIMUM DIAMETER)

.30 MIN

TOP

(AT CENTRE TOP)

.40 TO 1.20

STEM

INSIDE DIAMETER

21.6 MIN

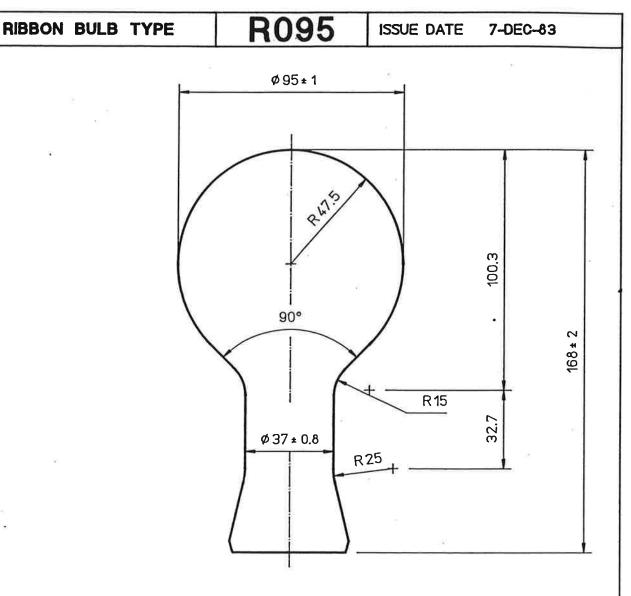
FLARE

INSIDE DIAMETER

25.8 MIN

OUTSIDE DIAM, 36.2 MAX.

APPROVED BY	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
111		17-12-90	DIMENSIONS REVIEWED			
APPROVED BY C-500		~	**	$\neg \neg$		



NECK

(AT110 FROM BULB TOP)

.50 TO 1.00

SIDE

(AT MAXIMUM DIAMETER)

.38 MIN

TOP

(AT CENTRE TOP)

.60 TO 1.80

STEM

INSIDE DIAMETER

34.6 MIN

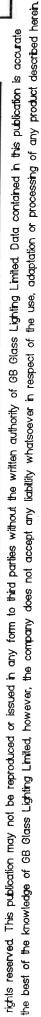
**FLARE** 

INSIDE DIAMETER

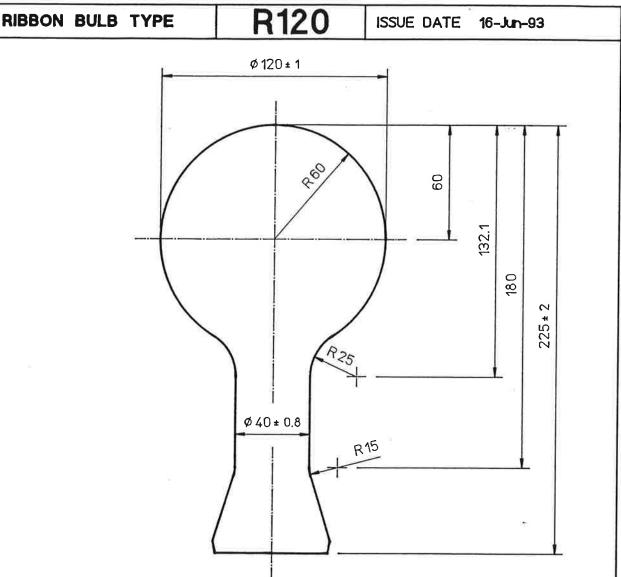
38.5 MIN

OUTSIDE DIAM.52.0 MAX.

APPROVED BY Control	10.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
11	1	15-1-85	NECK MEASURING POSITION	2	16-1-91	DIMENSIONS REVIEWED
APPROVED BY	$\overline{}$		WAS 120	П		



¥



WALL THICKNESS LIMITS & MEASURING POSITION

NECK

(AT 150 FROM BULB TOP)

.50 TO 1.10

SIDE .

(AT MAXIMUM DIAMETER)
(AT CENTRE TOP)

.38 **mi**n .80 TO 2.50

STEM FLARE INSIDE DIAMETER 37.

INSIDE DIAMETER

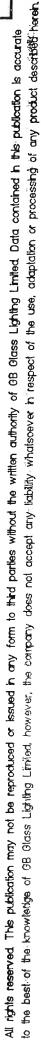
37.3 MIN

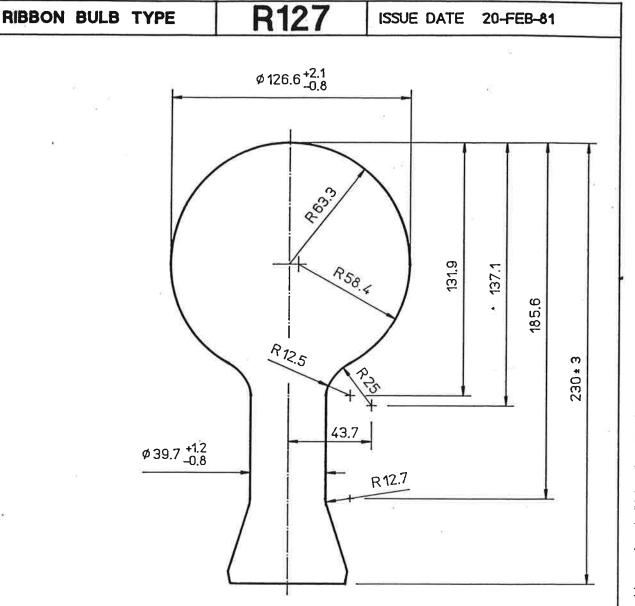
MIN

50.0

OUTSIDE DIAM, 65.5 MAX.

APPROVED BY BUILDING	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
APPROVED BY C. What	4			$\dashv \downarrow$		





NECK

(AT 149 FROM BULB TOP)

0.53 TO 1.14

SIDE

(AT MAXIMUM DIAMETER)

0.45 MIN

TOP

(AT CENTRE TOP)

0.89 TO 2.54

STEM

INSIDE DIAMETER

36.3 MIN

FLARE

INSIDE DIAMETER

50.2 MIN

OUTSIDE DIAM. 65.5 MAX.

APPROVED BY	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
1,000,000	4/1	11-1-91	DIMENSIONS REVIEWED			
APPROVED BYC WIND	37					

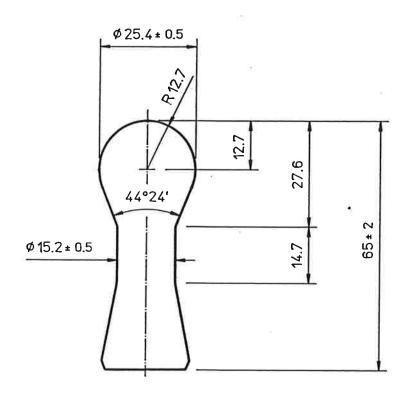
the best of the knowledge of GB Glass Lighting Limited, however, the company does not accept any liability whatsoever in respect of the use; adaptation or processing of any product described herein rights reserved. This publication may not be reproduced or issued in any form to third parties without the written authority of GB Glass Lighting Limited. Data contained in this publication is accurate.

₹

RIBBON BULB TYPE

ST025.4

ISSUE DATE 18-NOV-76



WALL THICKNESS LIMITS & MEASURING POSITION

NECK

(AT 33 FROM BULB TOP)

0.35 TO 0.66

SIDE

(AT MAXIMUM DIAMETER)

0.25 MIN

TOP

(AT CENTRE TOP)

0.33 TO 1.14

STEM

INSIDE DIAMETER

13.1 MIN

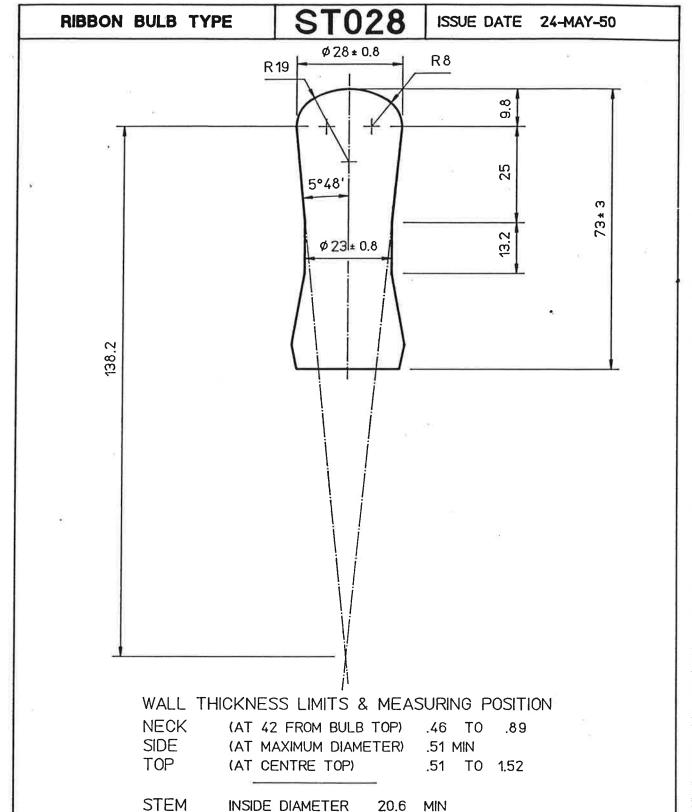
**FLARE** 

INSIDE DIAMETER

16.4 MIN

OUTSIDE DIAM. 23.6 MAX

APPROVED BY	NO. DATE	MODIFICATION	NO.	DATE	MODIFICATION
	110-4-/9	REVISED	3	11-1-91	DIMENSIONS REVIEWED
APPROVED BY C. WILL	2 19-7-79	FLARE 0/D WAS 24.23	$\neg \neg$		*



DATE MODIFICATION APPROVED 14-1-91 DIMENSIONS REVIEWED APPROVED BY C. WW

INSIDE DIAMETER

ALL DIMENSIONS ARE IN mm

22.1

MIN

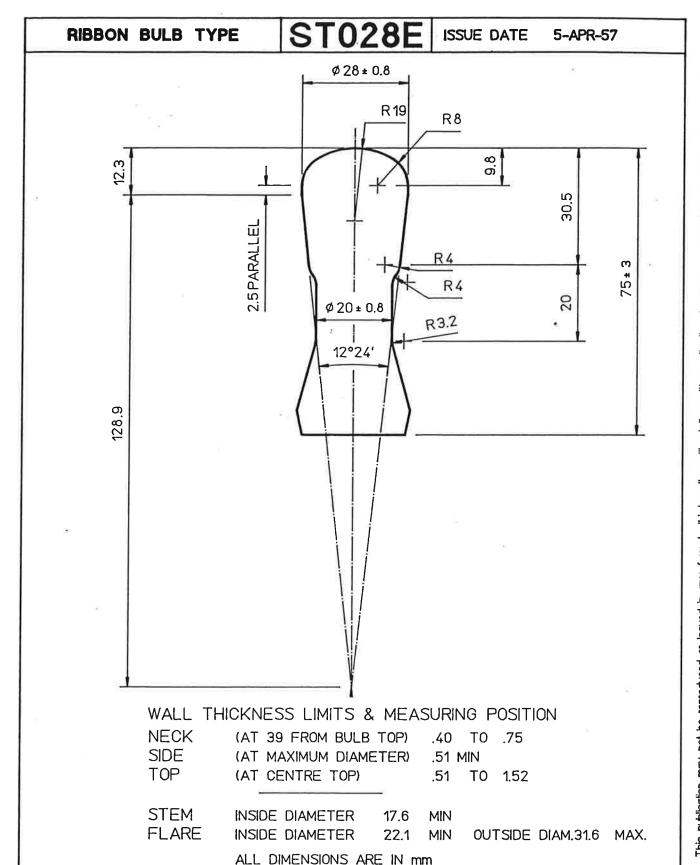
NO.

DATE

OUTSIDE DIAM.31.6 MAX.

MODIFICATION

**FLARE** 



MODIFICATION

FLARE O/D WAS 30.51 MAX

DIMENSIONS REVIEWED

DATE

NO.

MODIFICATION

3 17-11-92 NECK WALL THICKNESS

REDUCED.

DATE

19-1-83

14-1-91

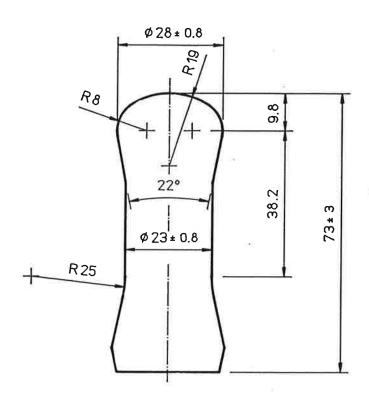
APPROVED BY

APPROVED BY C. WI

RIBBON BULB TYPE

**ST028K** 

ISSUE DATE 20-DEC-77



WALL THICKNESS LIMITS & MEASURING POSITION

NECK

(AT 42 FROM BULB TOP)

.46 TO .89

SIDE TOP

(AT MAXIMUM DIAMETER)
(AT CENTRE TOP)

.51 TO 1.52

.51 MIN

STEM

INSIDE DIAMETER

20.6 MIN

FLARE

INSIDE DIAMETER

22.1 MIN

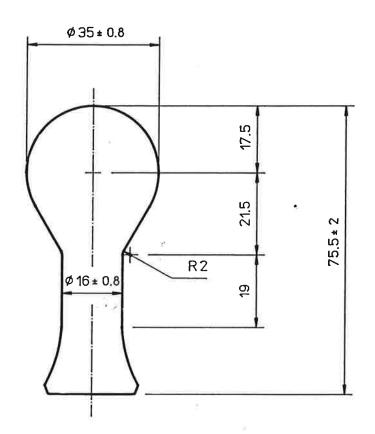
OUTSIDE DIAM.30.5 MAX.

APPROVED BY	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
ADDROVED ON C. P.	1	31-1-80	ANGLE WAS 20°			
APPROVED BY C. Whit	2	15-1-91	DIMENSIONS REVIEWED			

RIBBON BULB TYPE

ST035

ISSUE DATE 11-JUN-70



WALL THICKNESS LIMITS & MEASURING POSITION

**NECK** 

(AT 48 FROM BULB TOP)

.38 TO .76

SIDE

(AT MAXIMUM DIAMETER)

.30 MIN

TOP

(AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIAMETER

13.6 MIN

**FLARE** 

INSIDE DIAMETER

15.4 MIN

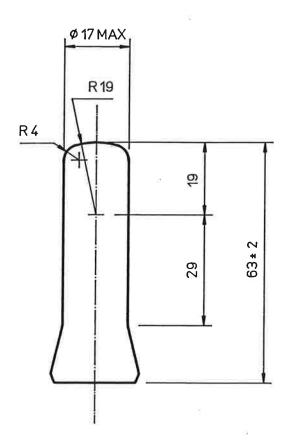
OUTSIDE DIAM.26.0 MAX.

APPROVED BY	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
17.1	JWW I	5-2-91	DIMENSIONS REVIEWED			
APPROVED BY C. WIN						

RIBBON BULB TYPE

T017

ISSUE DATE 14-0CT-52



WALL THICKNESS LIMITS & MEASURING POSITION

NECK

SIDE

(AT 40 FROM TOP)

.40 TO .80

TOP

(AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIAMETER

14.6 MIN

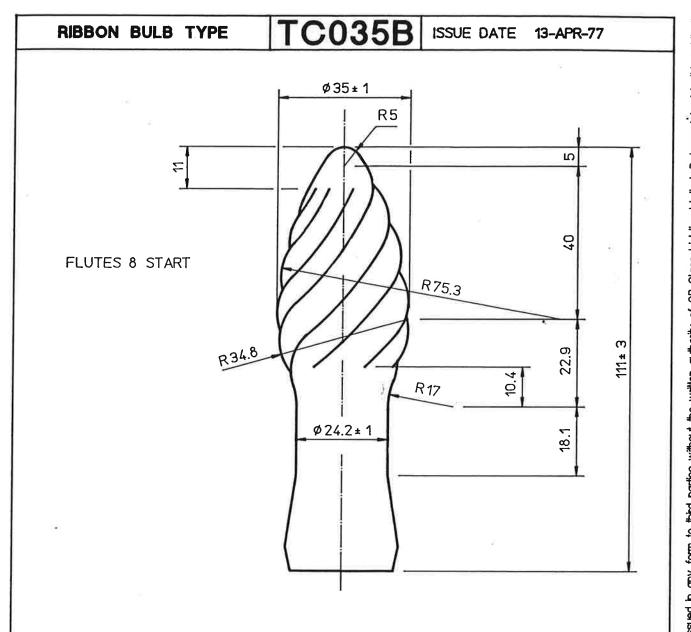
FLARE

INSIDE DIAMETER

15.4 MIN

OUTSIDE DIAM.24.2 MAX.

APPROVED BY	DATE	MODIFICATION	NO.	DATE	MODIFICATION
D.L. W.	5-2-91	DIMENSIONS REVIEWED			
APPROVED BY C. WWW.					



**NECK** 

(AT 76 FROM BULB TOP)

.38 TO .76

SIDE

N/A

TOP

(AT CENTRE TOP)

.40 MIN

STEM

INSIDE DIAMETER

20.6 MIN

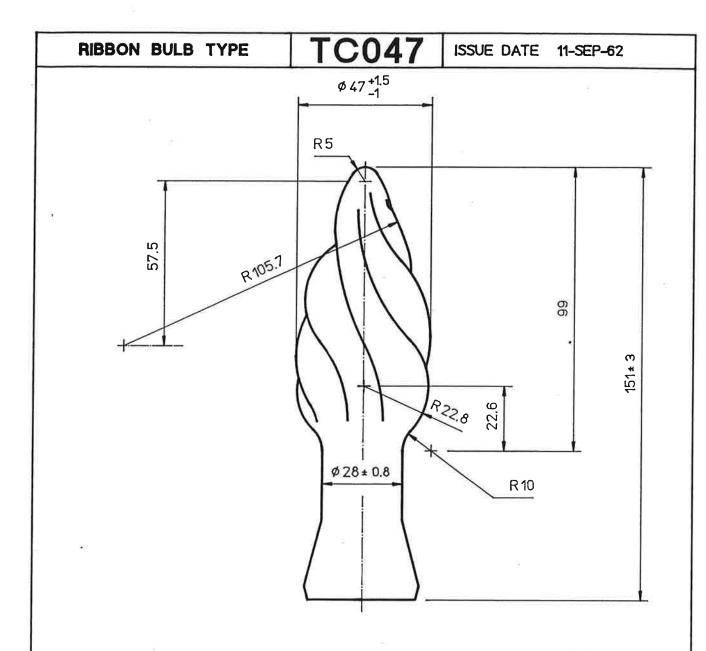
FLARE

INSIDE DIAMETER

22.1 MIN

OUTSIDE DIAM.32.2 MAX.

APPROVED BY MANTE AND.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
1 and Mariat	31-5-77	2nd PROPOSAL	2	17-1-91	DIMENSIONS REVIEWED
APPROVED BY C. S. SCOTT		(PLAIN TOP)	3	27-3-91	DIMENSIONS REVIEWED



NECK

(AT104 FROM BULB TOP)

.38 TO .76

SIDE

(AT MAXIMUM DIAMETER)

TOP

(AT CENTRE TOP)

STEM

INSIDE DIAMETER

25.6 MIN

FLARE

INSIDE DIAMETER

32.0 MIN

OUTSIDE DIAM.41.4 MAX.

APPROVED BY TO A NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
10000000001	12-12-72	RAD DIM ADDED			
APPROVED BY	25-2-88	FLARE TAPER CHANGED			



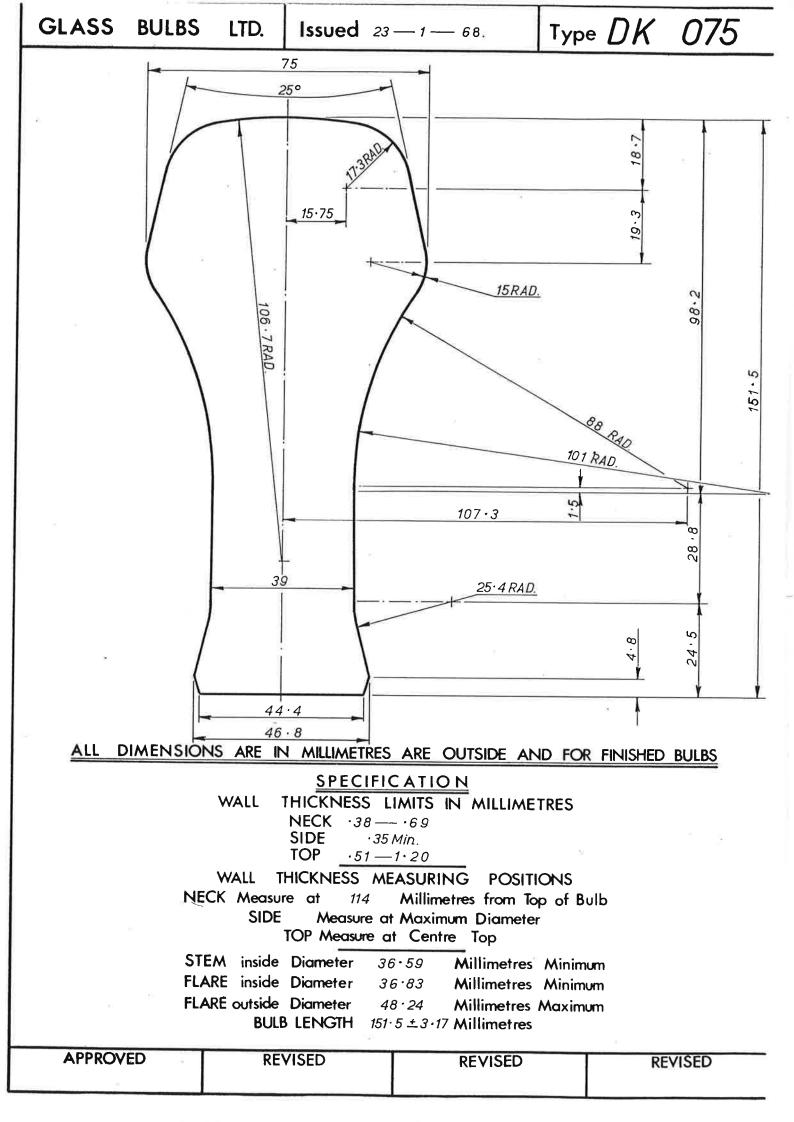
any product described herein.

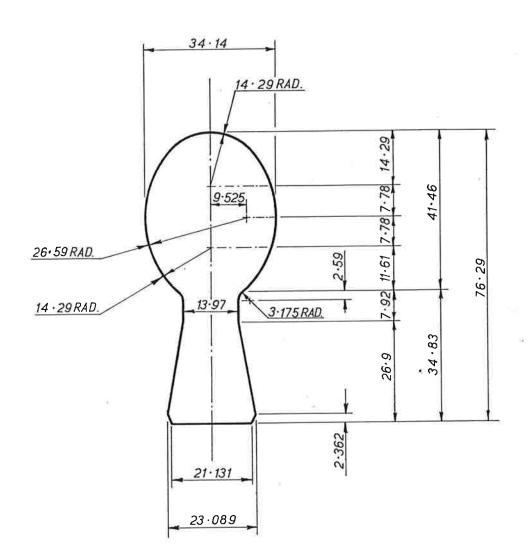
#### GLASS BULBS LIMITED TECHNICAL INFORMATION Ribbon Bulb Type DK 065 Issued 2-9-82 65 25° 16.2 13.52 8-9 92.2 90.88 102.1 58 ည် 130 48.4 88 33 25.4 39.7 42.1 WALL THICKNESS LIMITS & MEASURING POSITION -**NECK** (at 92 from bulb top ) 0.38 - 0.69SIDE (at maximum diameter) 0.35 min. TOP (at centre top) 0.51 - 1.20Inside diameter 30.59 min. STEM Outside diameter max. Inside diameter 32.05 min. **FLARE** Outside diameter 43.28 max. Outside diameter Length overall 130 3.17 **BULB** Calculated weight gms.

- All dimensions are in millimeters -Revised

Revised

Revised





#### DIMENSIONS ARE IN MILLIMETRES ARE OUTSIDE AND FOR FINISHED BULBS ALL

#### SPECIFIC ATION

THICKNESS LIMITS IN MILLIMETRES WALL

> **NECK** ·406 · 838 .305 · 813 SIDE · 381 1.270 TOP

THICKNESS MEASURING **POSITIONS** WALL

Millimetres from Top of Bulb NECK Measure at 48

Measure at Maximum Diameter SIDE

TOP Measure at Centre Top

11.807 Millimetres Minimum STEM inside Diameter Millimetres Minimum FLARE inside Diameter 15.418 Millimetres Maximum 26.000 FLARÉ outside Diameter

BULB LENGTH 76. 29 ± 3·17 Millimetres
THICKNESS IS CRITICAL EFFORTS SHOULD BE MADE TO KEEP THIS AS LOW AS
POSSIBLE—BELOW ·7 MILLIMETRES

REVISED REVISED 26.000 WAS 24.232

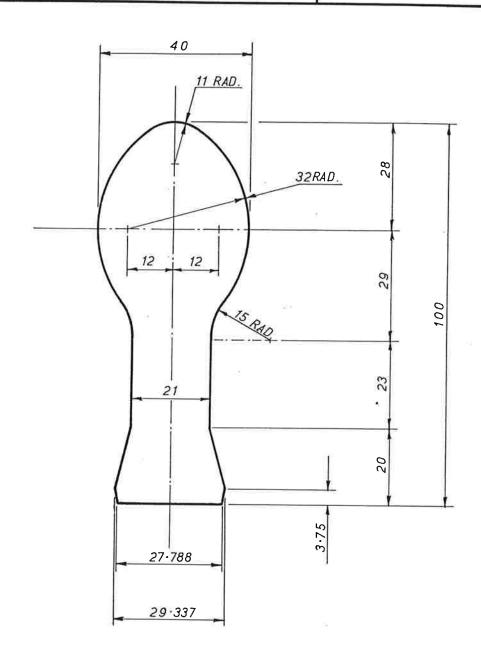
APPROVED

REVISED

GLASS BULBS LTD.

Issued 3-7-66.

Type *E* 040



# ALL DIMENSIONS ARE IN MILLIMETRES ARE OUTSIDE AND FOR FINISHED BULBS

#### **SPECIFIC ATION**

WALL THICKNESS LIMITS IN MILLIMETRES

**NECK** · 30 · 65

SIDE

·30 Min.

TOP

.4 1.4

WALL THICKNESS MEASURING POSITIONS

NECK Measure at 67 Millimetres from Top of Bulb

SIDE Measure at Maximum Diameter

TOP Measure at Centre Top

STEM inside Diameter 18 · 59

Millimetres Minimum

FLARE inside Diameter 22 · 07

Millimetres Minimum

FLARÉ outside Diameter

30 · 51

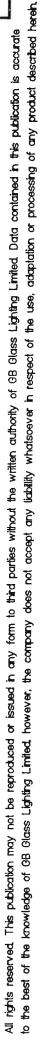
Millimetres Maximum

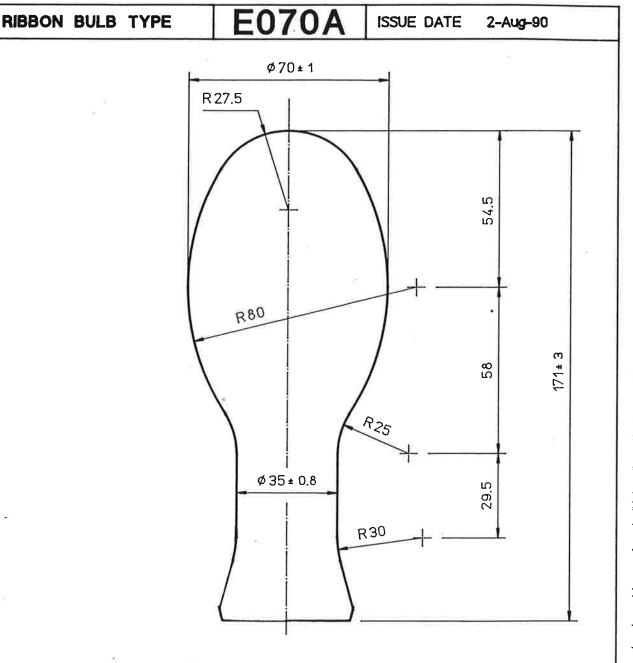
BULB LENGTH 100 ± 3·17 Millimetres 40 mm. ±1 m m.

BULB O.D. **REVISED** 

**REVISED** 

REVISED





**NECK** 

(AT130 FROM BULB TOP)

.41 TO .76

SIDE

(AT MAXIMUM DIAMETER)

.38

TOP (AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIAMETER

32.6 MIN

FLARE INSIDE DIAMETER

36.8 MIN

OUTSIDE DIAM.50.9 MAX.

ALL DIMENSIONS ARE IN mm

APPROX. WT - gms

APPROVED BY TO TO NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
APPROVED BY		19)			

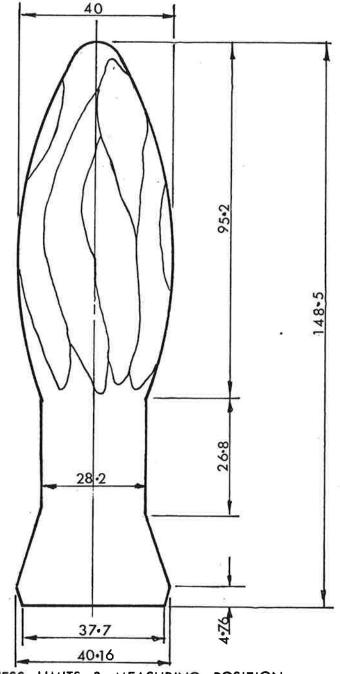


TECHNICAL INFORMATION

Ribbon Bulb Type FB 040

Issued

16-1-89



### WALL THICKNESS LIMITS & MEASURING POSITION -

NECK+38-+76 ( at 1	110 from bulb top	
SIDE — (at	t maximum diameter)	
TOP —	(at centre top)	
STEM	Inside diameter 25.59 Outside diameter —	min. max.
FLARE	Inside diameter 31.97 Outside diameter 41.36	min. max.
BULB	Outside diameter — Length overall 148.5	± ± 3

All dimensions are in millimeters —

Calculated weight

gms.

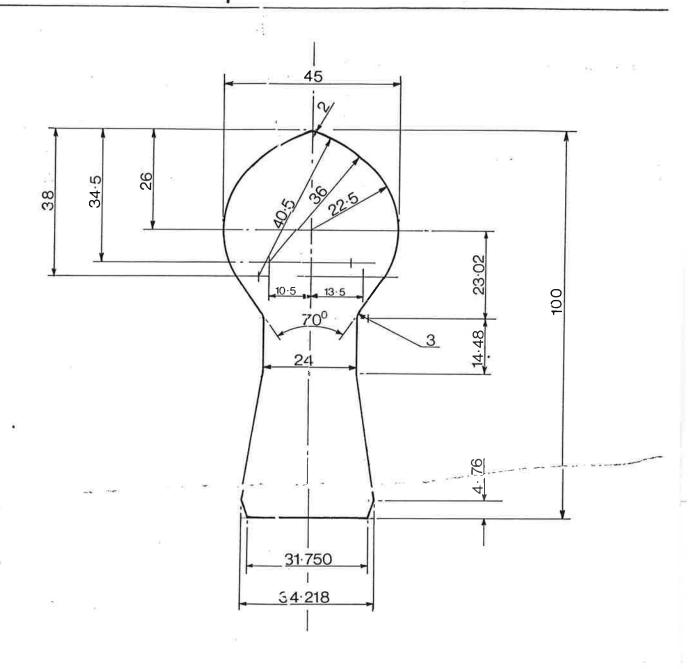
Revised

Approved Revised Revised

the knowledge of Glass Bulbs Limited, however the company does not accept any liability whatsoever in respect of the use, adaption or processing of any product described herein.

ō

Issued 17.9.79



### -WALL THICKNESS LIMITS & MEASURING POSITION-

NECK	(at from bulb top)·41 —	⋅84
SIDE	(at maximum diameter) ·30 -	·81
TOP	(at centre top) ·38 —	1.27
STEM	Inside diame ter 21.59	min.
STEIN	Outside diamet'er	max.
FLADE	Inside diameter 25.817	min.
FLARE	Outside diameter 36.20	max.
	Outside diameter 45	± 1·0
BULB	Length overall 100	± 3·17
	Calculated weight	gms.

- All dimensions are in millinneters -

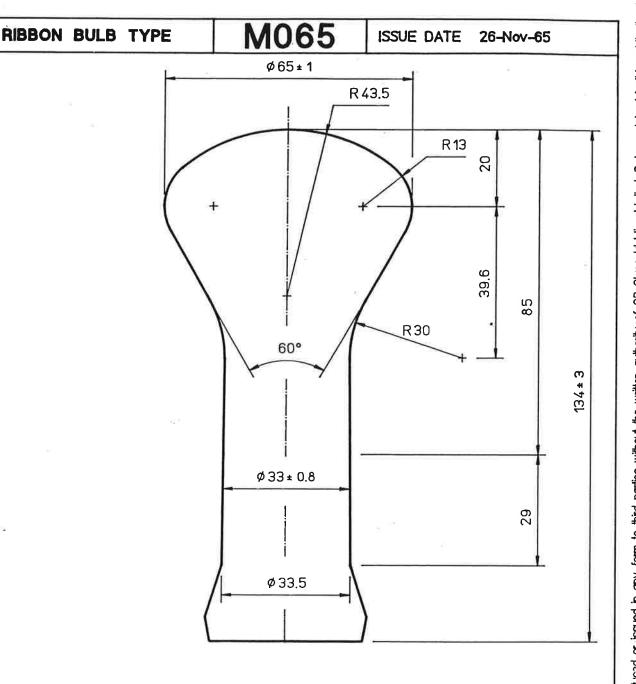
Approved

of the knowledge of Glass Bulbs. Limited, however the company does not accept any liability whatspeer of the use adaption or processing of any product described herein

Revised

R'evised

Revised



**NECK** 

(AT 85 FROM BULB TOP)

.41 TO .76

SIDE

(AT MAXIMUM DIAMETER)

.38 MIN

TOP

(AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIAMETER

30.6 MIN

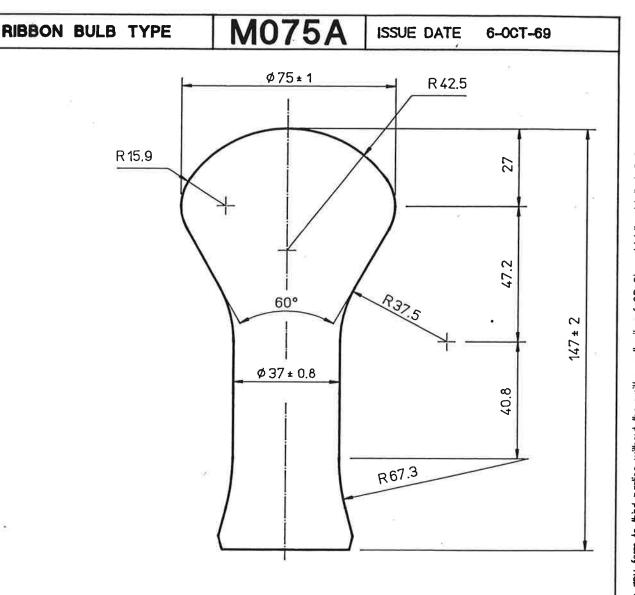
**FLARE** 

INSIDE DIAMETER

32.1 MIN

OUTSIDE DIAM, 43.3 MAX.

APPROVED BY	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
	W\	26,2,91	DIMENSIONS REVIEWED			
APPROVED BY C. WW		1				



NECK

(AT 90 FROM BULB TOP)

.38 TO .76

SIDE

(AT MAXIMUM DIAMETER)

.38 MIN

TOP

(AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIAMETER

34.6 MIN

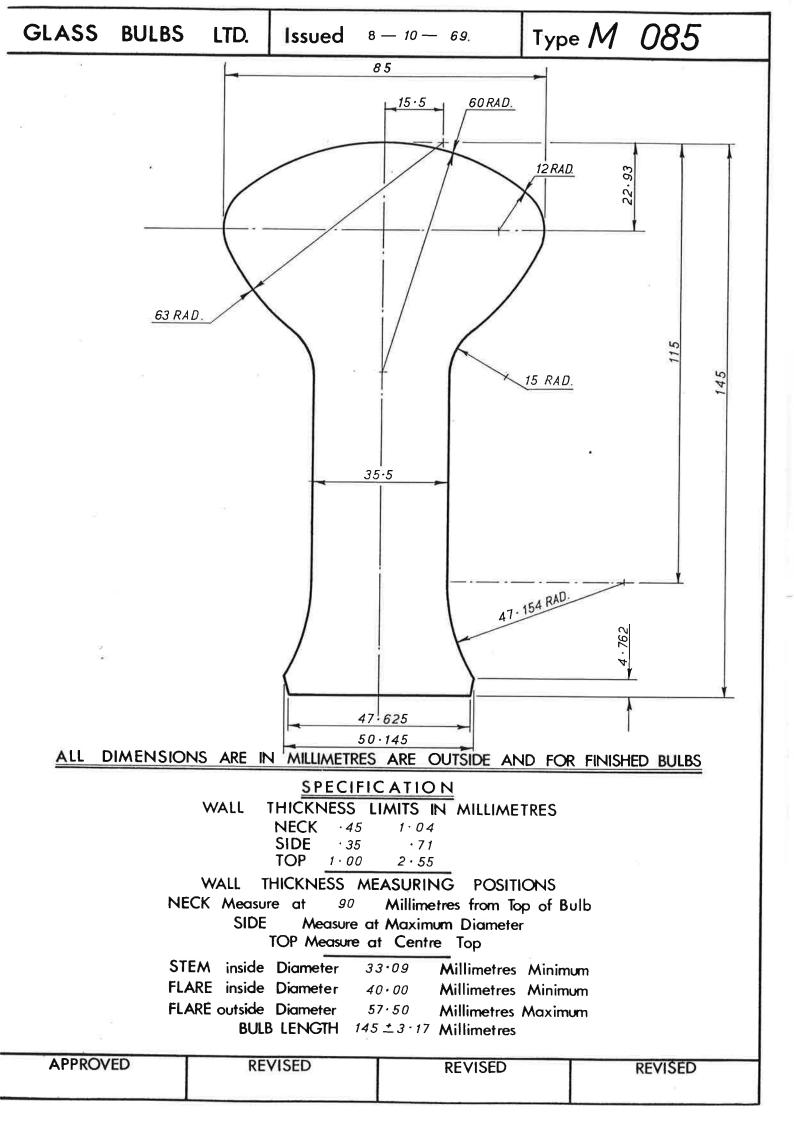
FLARE

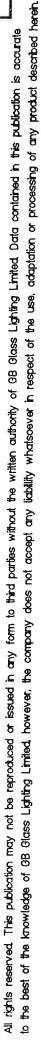
INSIDE DIAMETER

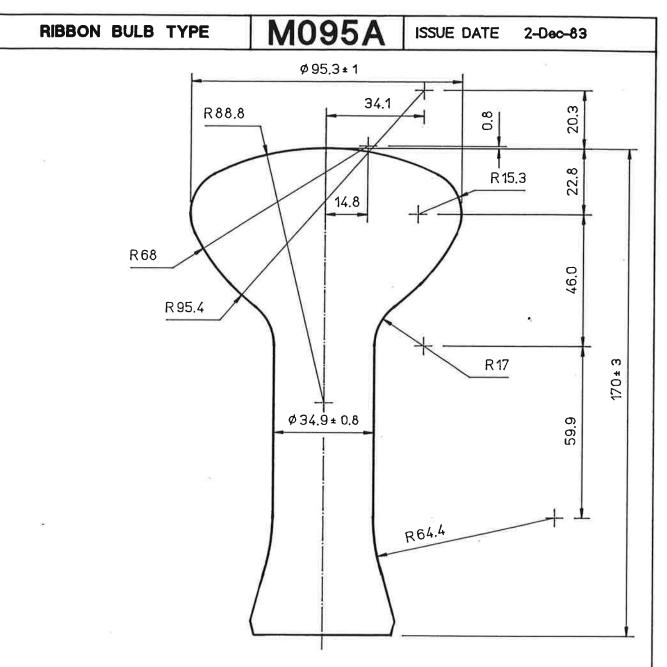
36.8 MIN

OUTSIDE DIAM.48.2 MAX.

APPROVED BY Control	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
	1	16-1-91	DIMENSIONS REVIEWED			
APPROVED BY	,					







NECK

(AT115 FROM BULB TOP)

.48 TO 1.09

SIDE

(AT MAXIMUM DIAMETER)

.38

TOP

(AT CENTRE TOP)

1.00 TO 2.55

STEM

INSIDE DIAMETER

32.5 MIN

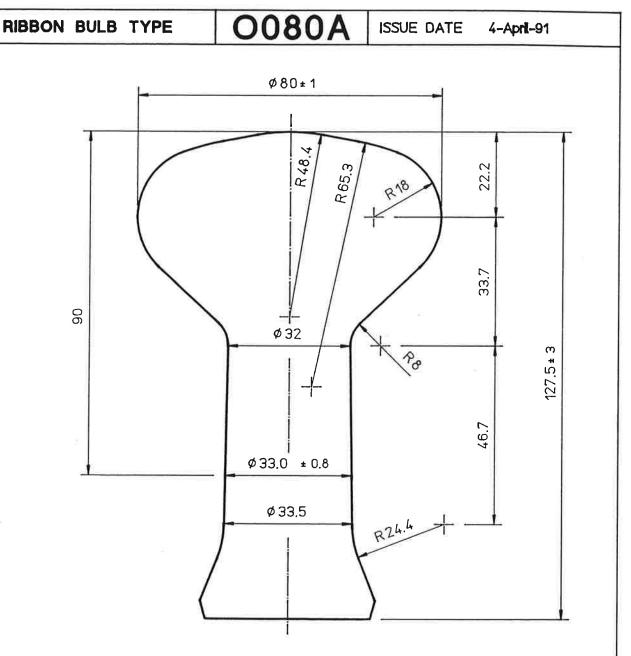
FLARE

INSIDE DIAMETER

40.0 MIN

OUTSIDE DIAM. 52.0 MAX.

APPROVED BY TO NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
APPROVED BY			$\dashv$		



NECK

(AT 90 FROM BULB TOP)

0.41 TO 0.76

SIDE

(AT MAXIMUM DIAMETER)

0.38 MIN

TOP

(AT CENTRE TOP)

0.60 TO 1.70

STEM

INSIDE DIAMETER

29.6 MIN

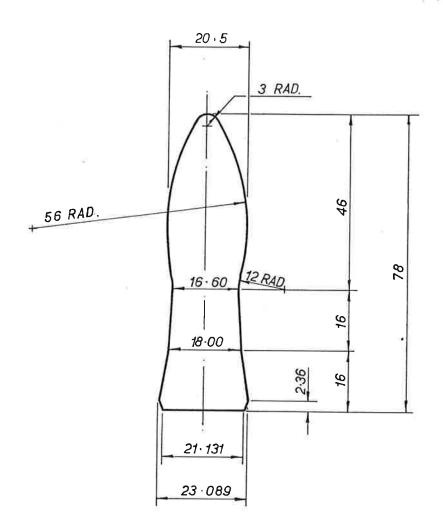
FLARE

INSIDE DIAMETER

35.6 MIN

OUTSIDE DIAM. 47 MAX.

APPROVED BY	MO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
APPROVED BY	7		<del></del>			



## ALL DIMENSIONS ARE IN MILLIMETRES ARE OUTSIDE AND FOR FINISHED BULBS

### SPECIFICATION

LIMITS IN MILLIMETRES WALL **THICKNESS** 

**NECK** .30 . 75 SIDE .30 · 75 TOP .40 1 · 40

WALL THICKNESS MEASURING **POSITIONS** 

NECK Measure at 54 Millimetres from Top of Bulb

SIDE Measure at Maximum Diameter TOP Measure at Centre Top

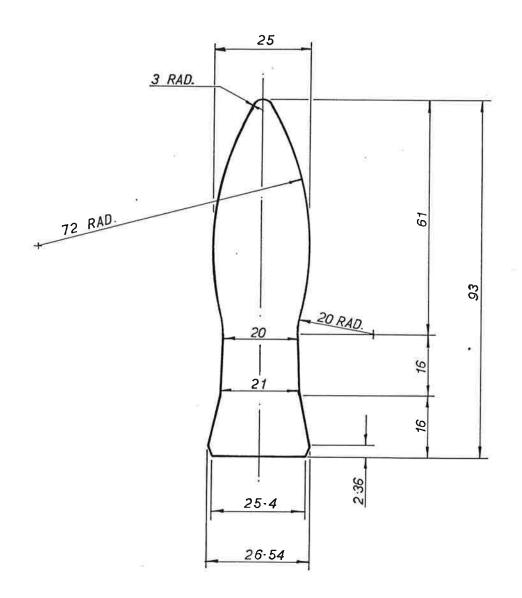
14 - 19 STEM inside Diameter Millimetres - Minimum FLARE inside Diameter 15 . 42 Millimetres Minimum FLARE outside Diameter 26 · 00 Millimetres Maximum

BULB LENGTH 78 ±3.17 Millimetres

REVISED STEM I.D. WAS **REVISED** 

**REVISED** 

GLASS BULBS LTD. Issued 16-7-63 Type OC 025 A



### ALL DIMENSIONS ARE IN MILLIMETRES ARE OUTSIDE AND FOR FINISHED BULBS

#### SPECIFICATION

WALL THICKNESS LIMITS IN MILLIMETRES

NECK '30 ·75 SIDE ·30 ·75

TOP ·40 1·40

WALL THICKNESS MEASURING POSITIONS

NECK Measure at 69 Millimetres from Top of Bulb

SIDE Measure at Maximum Diameter

TOP Measure at Centre Top

STEM inside Diameter 17-59 Millimetres Minimum FLARE inside Diameter 19-68 Millimetres Minimum

FLARÉ\_outside Diameter 28.04 Millimetres Maximum

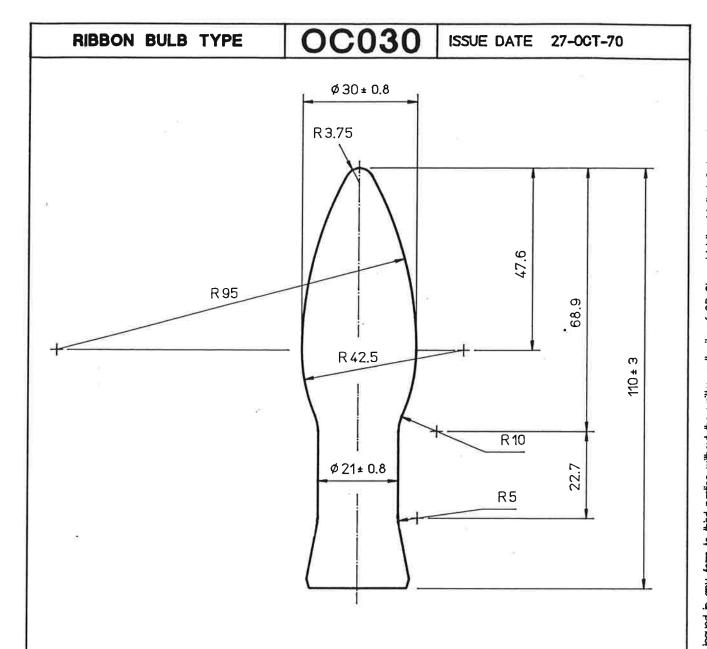
BULB LENGTH 93 ± 3 · 17 Millimetres

APPROVED Company

REVISED

REVISED

REVISED



**NECK** 

(AT 75 FROM BULB TOP)

.30 TO .75

SIDE

(AT MAXIMUM DIAMETER)

.30 MIN

TOP

(AT CENTRE TOP)

.40 TO 1.40

STEM

INSIDE DIAMETER

18.5 MIN

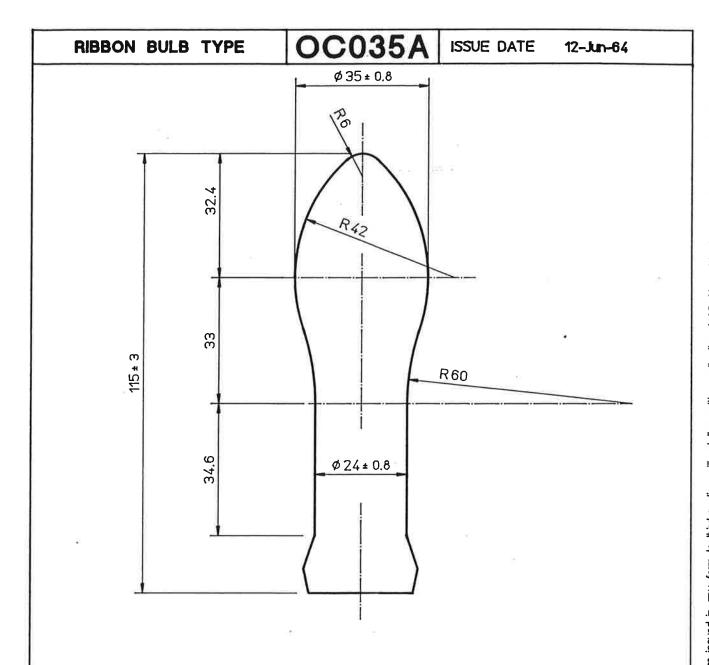
FLARE

INSIDE DIAMETER

19.7 MIN

OUTSIDE DIAM. 28.0 MAX.

APPROVED BY AMAN, NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
Kenton M	20-3-91	DIMENSIONS REVIEWED			
APPROVED BY C. WHO	Ki				



**NECK** 

(AT 76 FROM BULB TOP)

.38 TO .76

SIDE

(AT MAXIMUM DIAMETER)

.30 MIN.

TOP

(AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIAMETER

21.6 MIN

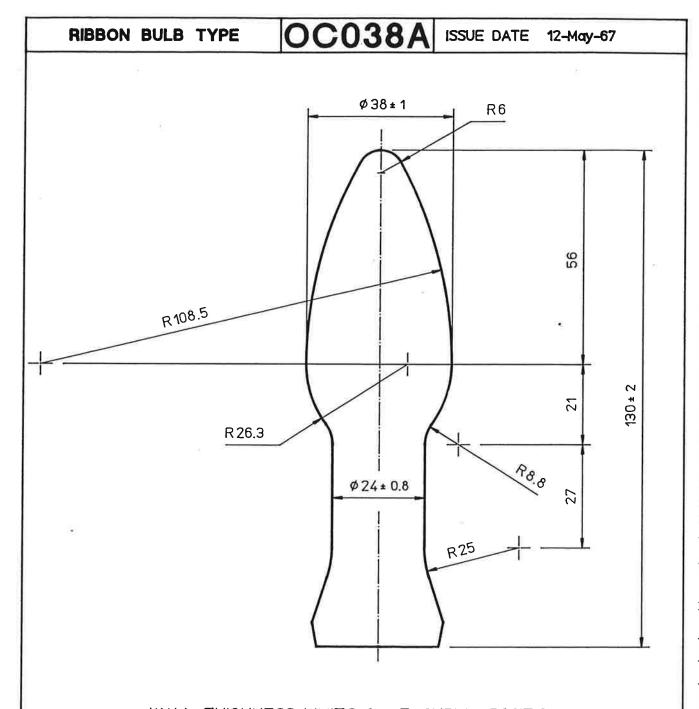
FLARE

INSIDE DIAMETER

22.1 MIN

OUTSIDE DIA 31.6 MAX

APPROVED BY	IO. DATE	MODIFICATION	NO.	DATE	MODIFICATION
TOLOGOVA	1 8-5-89	FLARE 0.D.WAS 30.51			
APPROVED BY	2 27.2.91	DIMENSIONS REVIEWED			



NECK

(AT 95 FROM BULB TOP)

.38 TO .76

SIDE

(AT MAXIMUM DIAMETER)

.30 MIN.

TOP

(AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIAMETER

21.6 MIN

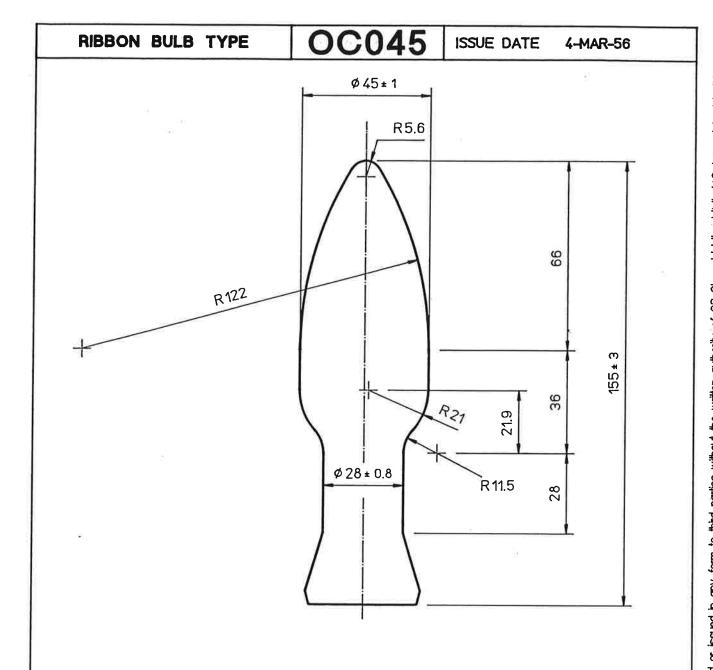
FLARE

INSIDE DIAMETER

25.8 MIN

OUTSIDE DIAM. 36.2 MAX.

APPROVED BY NO. DATE	MODIFICATION	NO.	DATE	MODIFICATION
1 1 3.3.90	FLARE I.D. WAS 26.92			
APPROVED BY 1, 9.3.90	FLARE 0.D. WAS 35.56			



NECK

(AT114 FROM BULB TOP)

.38 TO .76

SIDE

(AT MAXIMUM DIAMETER)

.30 MIN

TOP

(AT CENTRE TOP)

.51 TO 1.32

STEM

INSIDE DIAMETER

25.6 MIN

FLARE

INSIDE DIAMETER

32.0 MIN

OUTSIDE DIAM. 41.4 MAX.

APPROVED BY TO TO NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
10000001	20-3-91	DIMENSIONS REVIEWED			
APPROVED BY C. WILL					

**PS038** RIBBON BULB TYPE ISSUE DATE 24-may-50 Ø38±1 R 19.5 R15 17.4 40°56' 2.1 ₩. 27.5 Ø 19 ± 0.8 R5 10.3 R3.2

WALL THICKNESS LIMITS & MEASURING POSITION

NECK

(AT 41 FROM BULB TOP)

.41 TO .84

SIDE

(AT MAXIMUM DIAMETER)

.30 MIN

TOP

(AT CENTRE TOP)

.38 TO 1.27

STEM

INSIDE DIAMETER

16.6 MIN

FLARE

INSIDE DIAMETER

22.1 MIN

OUTSIDE DIAM.30.5 MAX

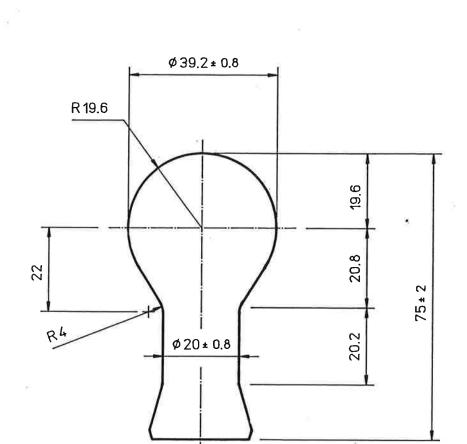
APPROVED BY	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
D. V.	1	16-1-91	DIMENSIONS REVIEWED			
APPROVED BY C, White	YF.	7				

5-JAN-67

ISSUE DATE

RIBBON BULB TYPE

to the best of the knowledge of OB Glass Lighting Limited, however, the company does not accept any liability whatsoever in respect of the use, adaptation or processing of any product described herein All rights reserved. This publication may not be reproduced or issued in any form to third parties without the written authority of GB Glass Lighting Limited. Data contained in this publication is accurate



**PS040** 

WALL THICKNESS LIMITS & MEASURING POSITION

**NECK** 

(AT 50 FROM BULB TOP)

.41 TO .84

SIDE

(AT MAXIMUM DIAMETER)

NIM 0E.

TOP

(AT CENTRE TOP)

.38 TO 1.27

STEM

INSIDE DIAMETER

17.6 MIN

**FLARE** 

INSIDE DIAMETER

19.7 MIN

OUTSIDE DIAM. 28.0 MAX.

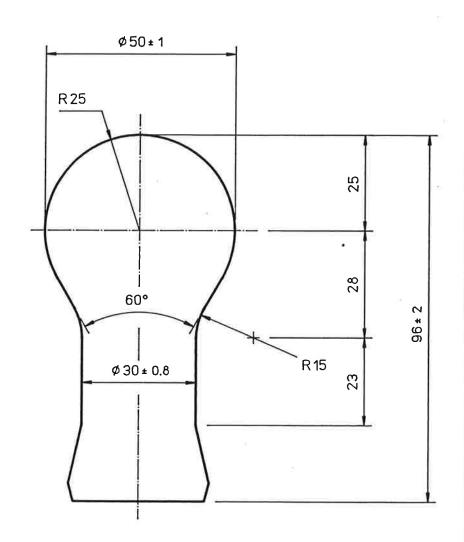
APPROVED BY TO A NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
	20-3-91	DIMENSIONS REVIEWED			
APPROVED BY					

to the best of the knowledge of GB Glass Lighting Limited, however, the company does not accept any liability whatsoever in respect of the use, adaptation or processing of any product described herein All rights reserved. This publication may not be reproduced or issued in any form to third parties without the written authority of GB Glass Lighting Limited. Data contained in this publication is accurate

RIBBON BULB TYPE

**PS050** 

ISSUE DATE 6-NOV-52



WALL THICKNESS LIMITS & MEASURING POSITION

**NECK** 

(AT 60 FROM BULB TOP)

.41 TO .76

SIDE

(AT MAXIMUM DIAMETER)

NIM 8E.

TOP

(AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIAMETER

27.6 MIN

FLARE

INSIDE DIAMETER

28.8 MIN

OUTSIDE DIAM. 38.1 MAX.

APPROVED BY W Solling N	O. DATE	MODIFICATION	NO.	DATE	MODIFICATION
10000000000	20-3-91	DIMENSIONS REVIEWED			
APPROVED BY	7	2			

GLASS BULBS LIMITED

**TECHNICAL** 

INFORMATION

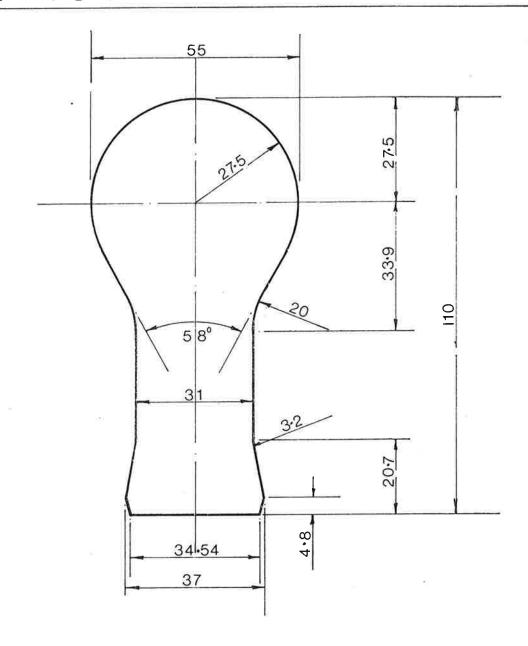
Ribbon

**Bulb** Type

**PS 055** 

Issued

2 - 3 - 50.

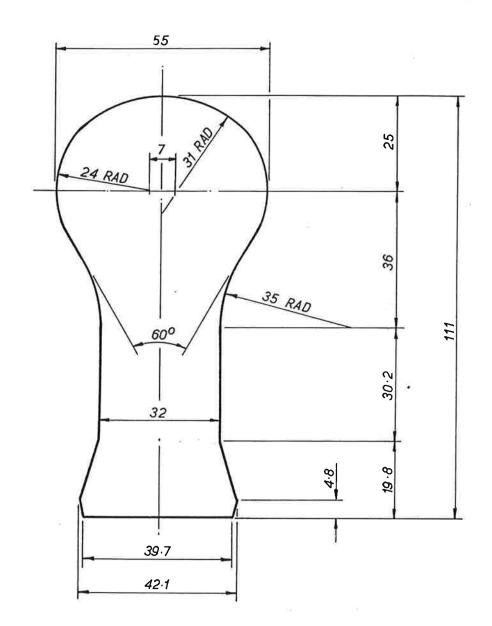


### - WALL THICKNESS LIMITS & MEASURING POSITIONS -

NECK	(at 71 from bulb top)	41	<b>·</b> 76
SIDE	(at maximum diameter)	·38 <b>–</b>	•76
TOP	(at centre top)	51 —	1.52
	Inside diameter 28	<b>·</b> 59	min.
STEM	Outside <u>diameter</u> 31	- 8	max.
	Inside diameter 28	82	min.
FLARE	Outside <u>d</u> iameter 38	·14	max.
	Outside diameter 55	5 ±	1 0
BULB	Length overall 110	± C	3-17
	Calculated weight	23	gms.

- All dimensions are in millimetres -

GLASS BULBS LTD. Issued 6-11-52 Type PS 055A



### ALL DIMENSIONS ARE IN MILLIMETRES ARE OUTSIDE AND FOR FINISHED BULBS

#### **SPECIFIC ATION**

WALL THICKNESS LIMITS IN MILLIMETRES

NECK .41 .76 SIDE .38 .76 TOP .51 1.52

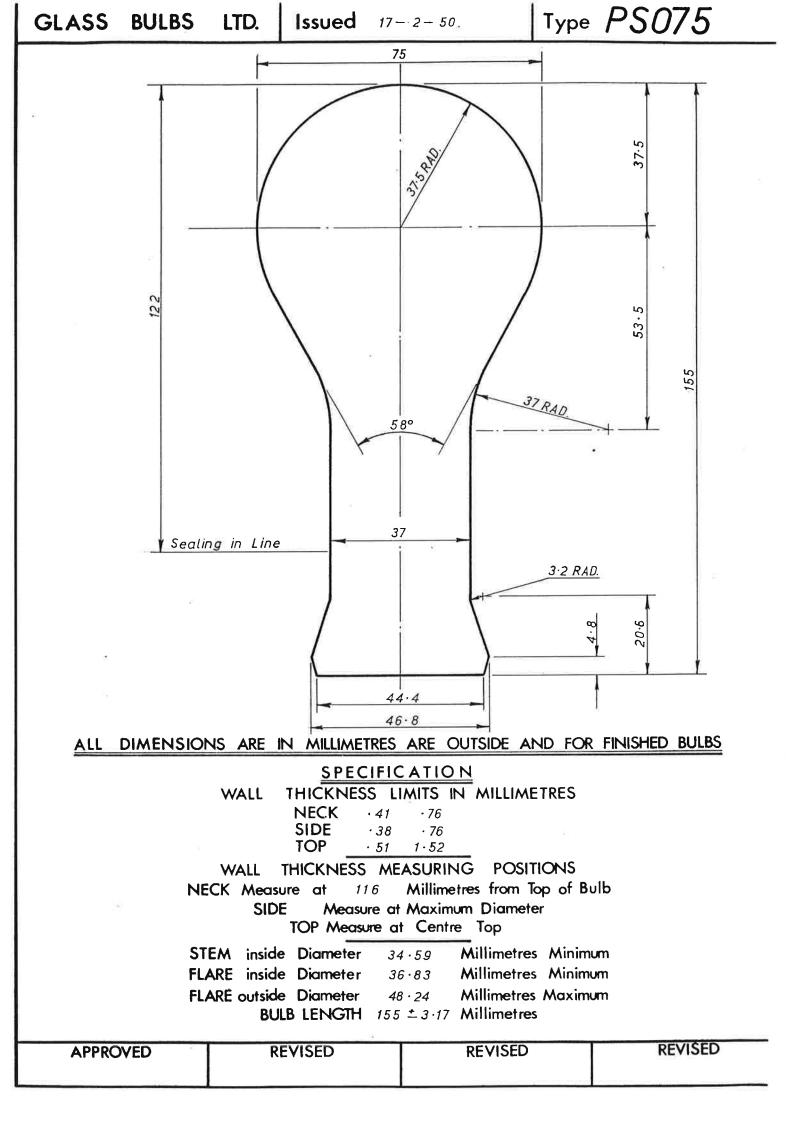
WALL THICKNESS MEASURING POSITIONS

NECK Measure at 71 Millimetres from Top of Bulb SIDE Measure at Maximum Diameter

TOP Measure at Centre Top

STEM inside Diameter 29:59 Millimetres Minimum FLARE inside Diameter 32:05 Millimetres Minimum

FLARÉ outside Diameter 43.28 Millimetres Maximum
BULB LENGTH 111 ± 3.17 Millimetres



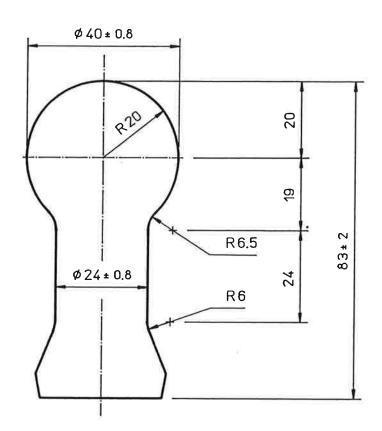
the best of the knowledge of GB Glass Lighting Limited, however, the company does not accept any liability whatsoever in respect of the use, adaptation or processing of any product described herein. All rights reserved. This publication may not be reproduced or issued in any form to third parties without the written authority of GB Glass Lighting Limited. Data contained in this publication is accurate

RIBBON BULB TYPE

**R040** 

ISSUE DATE

4-DEC-57



WALL THICKNESS LIMITS & MEASURING POSITION

NECK

(AT 51 FROM BULB TOP)

.41 TO .84

SIDE

(AT MAXIMUM DIAMETER)

.30 MIN

TOP

(AT CENTRE TOP)

.38 TO 1.27

STEM

INSIDE DIAMETER

21.6 MIN

26.9

FLARE

INSIDE DIAMETER

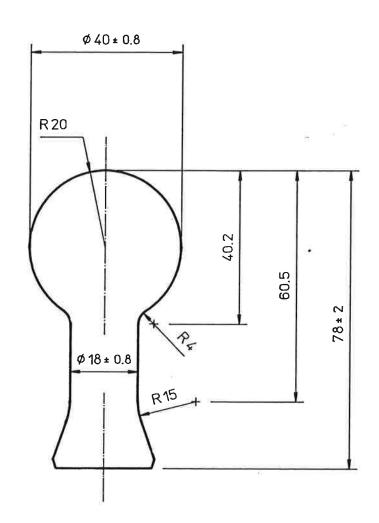
MIN OU

OUTSIDE DIAM, 35.6 MAX.

APPROVED BY	D. DATE	MODIFICATION	NO.	DATE	MODIFICATION
1) 1 V	19-3-91	DIMENSIONS REVIEWED			
APPROVED BYC. ISW	V I				

the best of the knowledge of OB Glass Lighting Limited, however, the company does not accept any liability whatsoever in respect of the use, adaptation or processing of any product described herein. All rights reserved. This publication may not be reproduced or issued in any form to third parties without the written authority of 08 Glass Lighting Limited. Data contained in this publication is accurate

RIBBON BULB TYPE RO40D ISSUE DATE 10-Mor-71



WALL THICKNESS LIMITS & MEASURING POSITION

NECK

(AT 50 FROM BULB TOP)

.41 TO .84

SIDE

(AT MAXIMUM DIAMETER)

.30 MIN

TOP

(AT CENTRE TOP)

.51 TO 1.53

STEM

INSIDE DIAMETER

15.9 MIN

FLARE

INSIDE DIAMETER

19.7 MIN

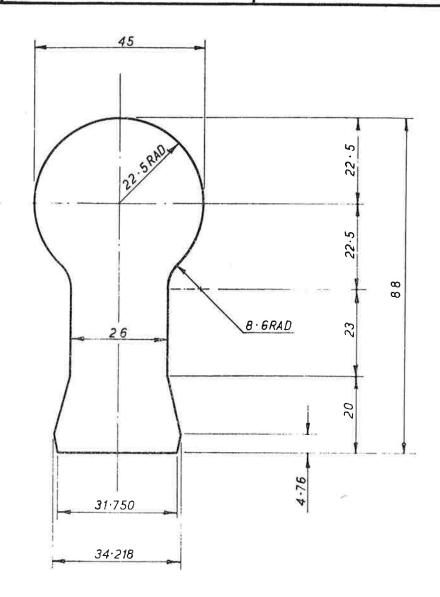
OUTSIDE DIAM. 28.3 MAX.

APPROVED BY	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
APPROVED BY	7			Н		

GLASS BULBS LTD.

Issued 6 - 11 - 52.

Type *R* 045



## ALL DIMENSIONS ARE IN MILLIMETRES ARE OUTSIDE AND FOR FINISHED BULBS

#### SPECIFIC ATION

WALL THICKNESS LIMITS IN MILLIMETRES

NECK ·41 ·84 SIDE ·30 ·81 TOP ·38 1·27

WALL THICKNESS MEASURING POSITIONS

NECK Measure at 56 Millimetres from Top of Bulb

SIDE Measure at Maximum Diameter TOP Measure at Centre Top

STEM inside Diameter 23 587 Millimetres Minimum
FLARE inside Diameter 26 92 Millimetres Minimum
FLARE outside Diameter 35 56 Millimetres Maximum

BULB LENGTH 88 ± 2 Millimetres

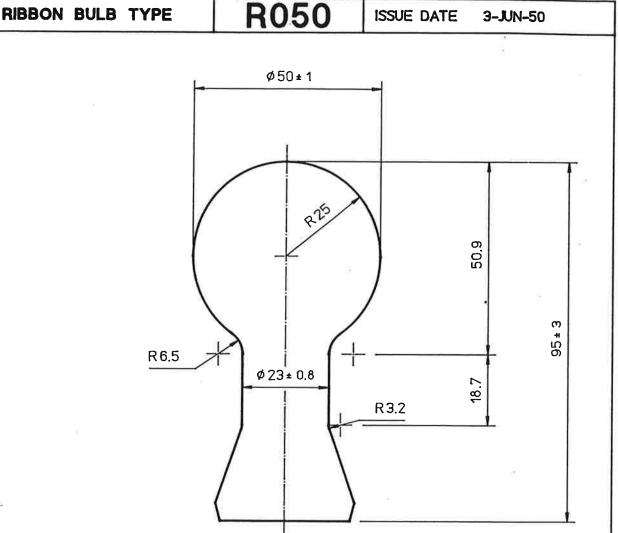
APPROVED

REVISED

REVISED

REVISED

the best of the knowledge of 08 Glass Lighting Limited, however, the company does not accept any liability whatsoever in respect of the use, adaptation or processing of any product described herein All rights reserved. This publication may not be reproduced or issued in any form to third parties without the written authority of GB Glass Lighting Limited however, the company does not account any lightlifty whatspeaker in respect of the knowledge of GB Glass Lighting Limited, however, the company does not account any lightlifty whatspeaker in respect of the knowledge of GB Glass Lighting Limited, however, the company does not account any lightlifty whatspeaker in respect of the knowledge of GB Glass Lighting Limited, however, the company does not account any lightlifty whatspeaker in respect of the knowledge of GB Glass Lighting Limited.



WALL THICKNESS LIMITS & MEASURING POSITION

NECK

(AT 56 FROM BULB TOP)

.41 TO .76

SIDE TOP

(AT MAXIMUM DIAMETER)
(AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIAMETER

20.6 MIN

FLARE

INSIDE DIAMETER

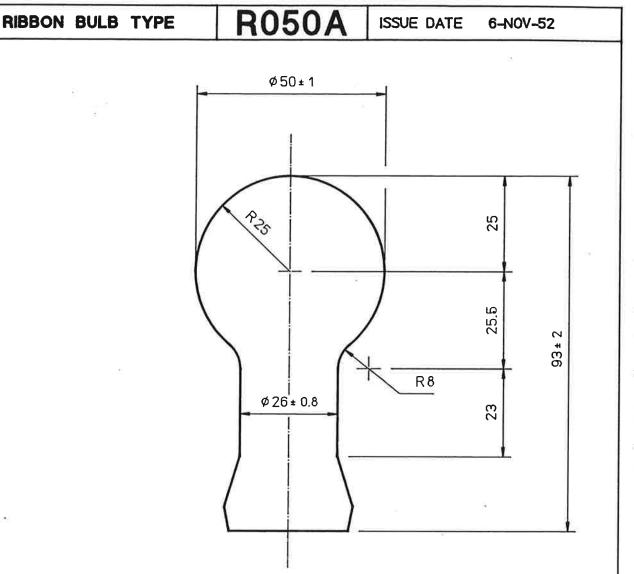
28.8 MIN

...

OUTSIDE DIAM.38.1 MAX.

APPROVED BY	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
TO A CONTRACTOR OF THE PARTY OF	1	12-9-73	NECK WALL THICKNESS WAS .46,89	П		
APPROVED BY C. WILL	>2	11-1-91	DIMENSIONS REVIEWED	П		*

to the best of the knowledge of GB Olass Lighting Limited, however, the company does not accept any liability whatsoever in respect of the use, adoptation or processing of any product described herein All rights reserved. This publication may not be reproduced on issued in any form to third parties without the written authority of GB Glass Lighting Limited. Data contained in this publication is accurate



WALL THICKNESS LIMITS & MEASURING POSITION

NECK

(AT 60 FROM BULB TOP)

.41 TO .76

SIDE

(AT MAXIMUM DIAMETER)

.38 MIN

TOP

(AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIAMETER

23.6 MIN

FLARE INSIDE DIAMETER

26.9 MIN

OUTSIDE DIAM.35.6 MAX

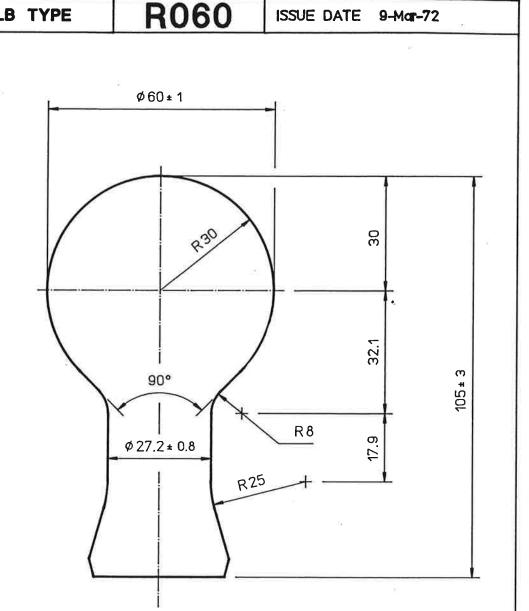
APPROVED BY TOWN	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
100	1	19-3-91	DIMENSIONS REVIEWED			
APPROVED BY WITH						

9-Mar-72

ISSUE DATE

RIBBON BULB TYPE

the best of the knowledge of GB Glass Lighting Limited, however, the company does not accept any liability whatsoever in respect of the use, adaptation or processing of any product described herein All rights reserved. This publication may not be reproduced or issued in any form to third parties without the written authority of OB Glass Lighting Limited Data contained in this publication is accurate



WALL THICKNESS LIMITS & MEASURING POSITION

**NECK** 

(AT 70 FROM BULB TOP)

.38 TO .76

SIDE

(AT MAXIMUM DIAMETER)

.35 MIN

TOP

(AT CENTRE TOP)

.51 TO 1.52

**STEM** 

INSIDE DIAMETER

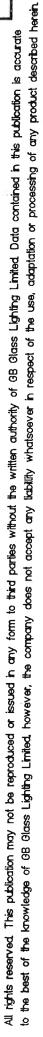
24.8 MIN

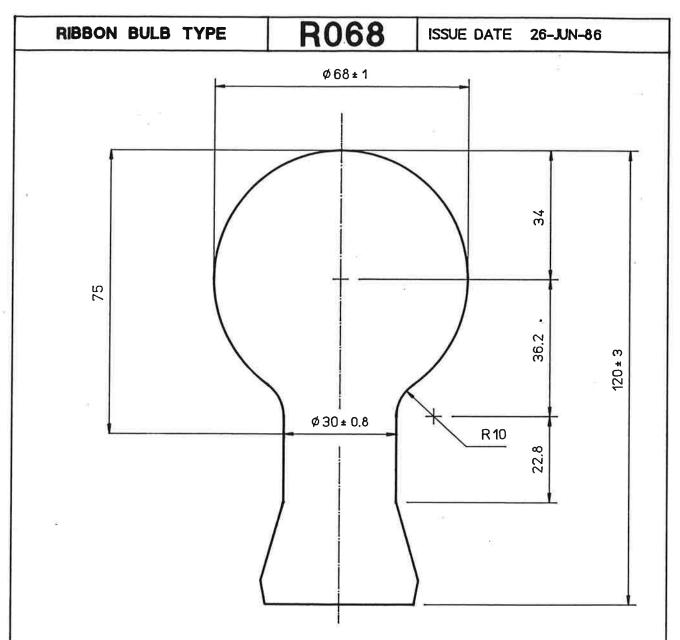
FLARE

INSIDE DIAMETER

28.8 MIN OUTSIDE DIAM. 38.2 MAX.

APPROVED BY NO. DAT	MODIFICATION	NO.	DATE	MODIFICATION
1 19-3-	1 DIMENSIONS REVIEWED			
APPROVED BYC WWW	150			





**NECK** 

(AT 75 FROM BULB TOP)

.41 TO .76

SIDE

(AT MAXIMUM DIAMETER)

.38 MIN

TOP

(AT CENTRE TOP)

.51 TO 1.52

**STEM** 

INSIDE DIAMETER

27.6 MIN

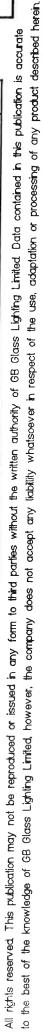
INSIDE DIAMETER

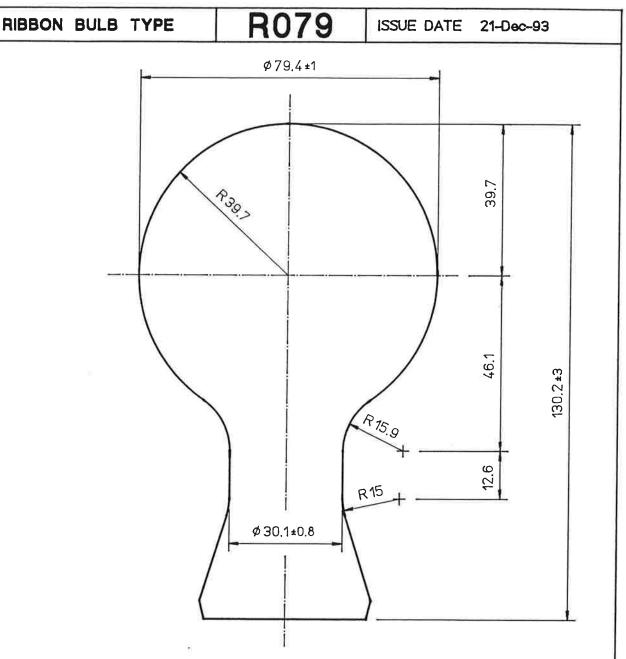
32.1

**FLARE** 

MIN OUTSIDE DIAM.43.3 MAX.

APPROVED BY 100 11	DATE	MODIFICATION	NO.	DATE	MODIFICATION
	7-Jan-91	DIMENSIONS REVIEWED			
APPROVED BY C. WILL	6	(54)			8.





**NECK** 

(AT 92 FROM BULB TOP)

.51 TO 1.02

SIDE TOP

(AT MAXIMUM DIAMETER)

.38 MIN

(AT CENTRE TOP)

.76 TO 2.03

STEM **FLARE**  INSIDE DIAMETER

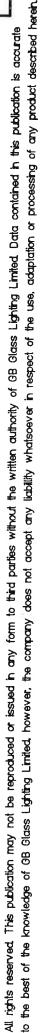
27.7 MIN

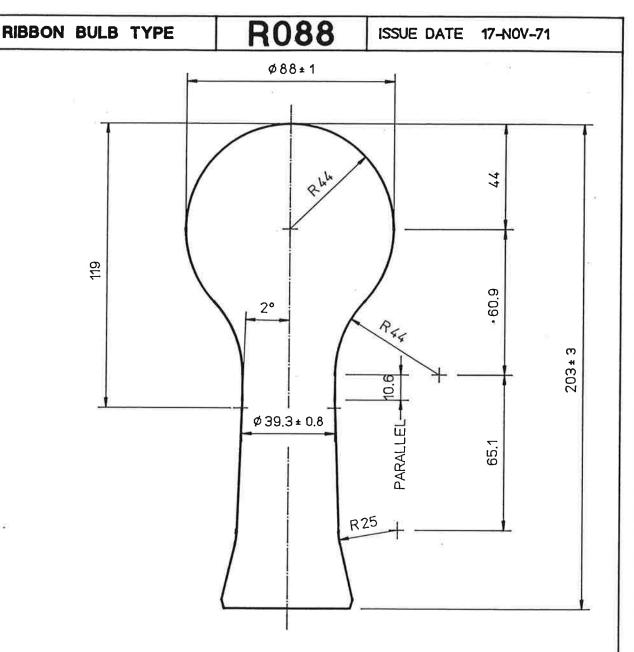
INSIDE DIAMETER

35,6 MIN

OUTSIDE DIAM.47.0 MAX.

APPROVED BY TO THE APPROVED BY	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
APPROVED BY & Early	$\vdash$					





**NECK** 

(AT119 FROM BULB TOP)

.51 TO .86

SIDE

(AT MAXIMUM DIAMETER)

.41 MIN

TOP

(AT CENTRE TOP)

.51 TO 1.90

STEM

INSIDE DIAMETER

36.6 MIN

FLARE

INSIDE DIAMETER

43.7 MIN

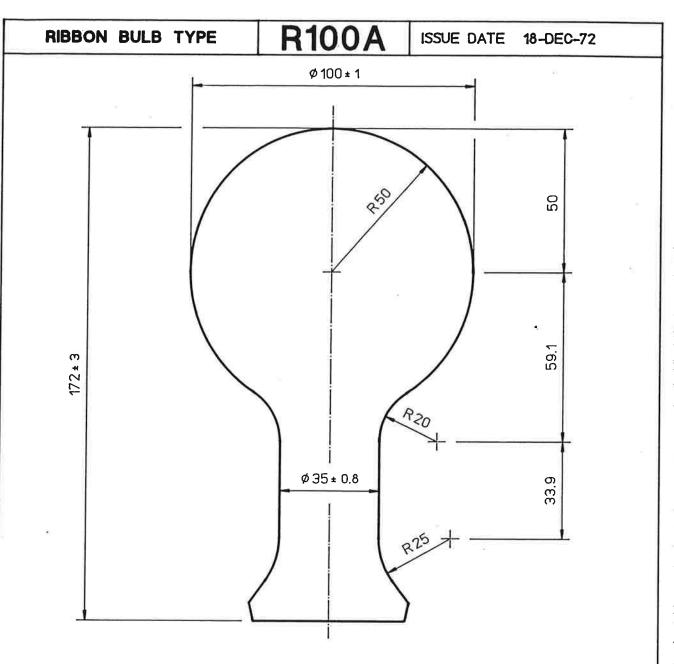
OUTSIDE DIAM.57.7 MAX.

ALL DIMENSIONS ARE IN mm

APPROX. WT - gms

APPROVED BY Walley	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
	91	29-DEC-92	REVISED			
APPROVED BY		<b>\</b>	· · · · · · · · · · · · · · · · · · ·			





NECK

(AT127 FROM BULB TOP)

.56 TO 1.07

SIDE

(AT MAXIMUM DIAMETER)

.38 MIN .83 TO 2.00

TOP

(AT CENTRE TOP)

STEM FLARE

INSIDE DIAMETER

31.6 MIN

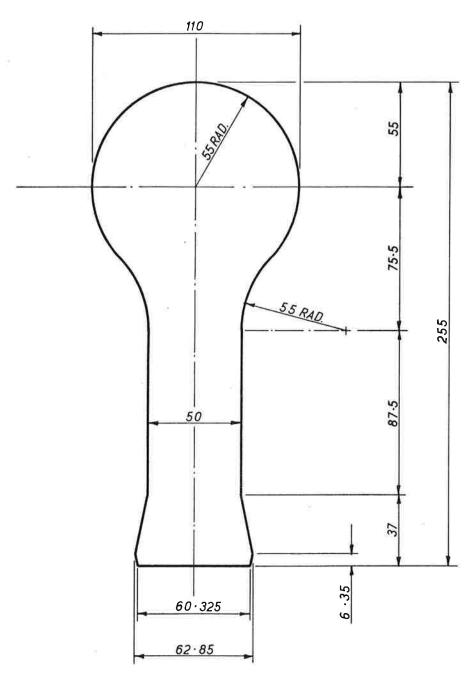
INSIDE DIAMETER

46.4 MIN

OUTSIDE DIAM. 62.0 MAX.

APPROVED BY MONTH AND	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
De De	41	20-3-91	DIMENSIONS REVIEWED			
APPROVED BY C. STATE	Y.					

GLASS BULBS LTD. Issued 6-5-63. Type R 110



### ALL DIMENSIONS ARE IN MILLIMETRES ARE OUTSIDE AND FOR FINISHED BULBS

### SPECIFIC ATION

WALL THICKNESS LIMITS IN MILLIMETRES

NECK ⋅56 1⋅07 SIDE ⋅38 Min. TOP ⋅89 2⋅41

Scale:  $\frac{1}{2}$ 

WALL THICKNESS MEASURING POSITIONS
NECK Measure at 197 Millimetres from Top of Bulb
SIDE Measure at Maximum Diameter

TOP Measure at Centre Top

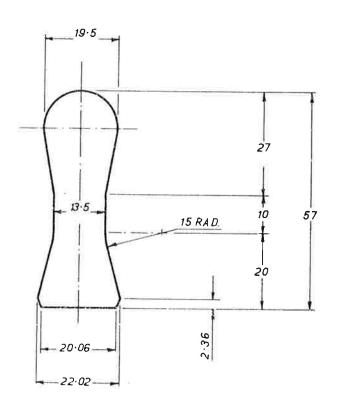
STEM inside Diameter  $47 \cdot 50$  Millimetres Minimum FLARE inside Diameter  $49 \cdot 50$  Millimetres Minimum FLARE outside Diameter  $66 \cdot 00$  Millimetres Maximum BULB LENGTH  $255 \pm 3 \cdot 17$  Millimetres

APPROVED REVISED REVISED REVISED

GLASS BULBS LTD.

Issued 22 - 6 - 71.

Type *ST* 019·5



# ALL DIMENSIONS ARE IN MILLIMETRES ARE OUTSIDE AND FOR FINISHED BULBS

### SPECIFICATION

WALL THICKNESS LIMITS IN MILLIMETRES

NECK 41 — 76 SIDE 35 MIN. TOP 51 — 1 51

WALL THICKNESS MEASURING POSITIONS

NECK Measure at 32 Millimetres from Top of Bulb

SIDE Measure at Maximum Diameter TOP Measure at Centre Top

STEM inside Diameter 11 Millimetres Minimum FLARE inside Diameter 14 35 Millimetres Minimum FLARE outside Diameter 22 377 Millimetres Maximum

BULB LENGTH 57 ± 3.17 Millimetres

A PROVED

REVISED

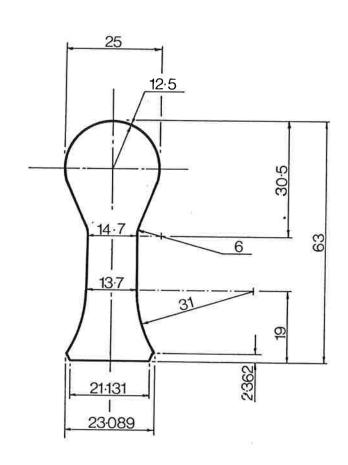
REVISED

REVISED

Ribbon Bulb Type

ST 025 E

Issued 22.5.70



### -WALL THICKNESS LIMITS & MEASURING POSITION-

NECK	(at 37 from bulb top)	·40 ·80							
SIDE	(at maximum diameter) ·30								
TOP	(at centre top) 33 —— 1.1								
CTEM	Inside diameter	12·00 min.							
STEM	Outside diameter	max.							
EL ADE	Inside diameter	16·39 min.							
FLARE	Outside diameter	23·50 max.							
	Outside diameter	25·00 ±1·00							
BULB	Length overall	63·00 ±3·17							
	Calculated weight	10·50 gms.							

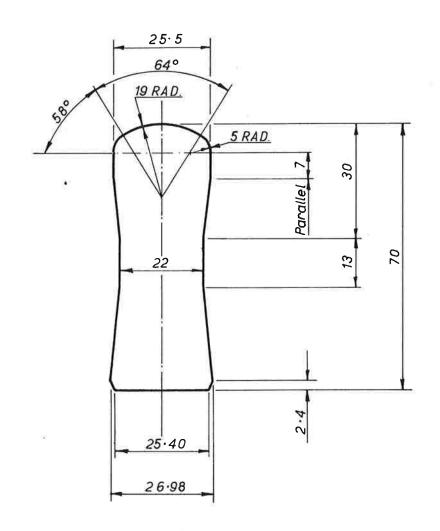
-All dimensions are in millimeters -

Month Approved

Revised

Revised

Revised



### ALL DIMENSIONS ARE IN MILLIMETRES ARE OUTSIDE AND FOR FINISHED BULBS

#### **SPECIFIC ATION**

WALL THICKNESS LIMITS IN MILLIMETRES

NECK ·38 · 84 SIDE ·25 . 76 TOP • 40 1.51

THICKNESS MEASURING POSITIONS WALL

NECK Measure at Millimetres from Top of Bulb 37

> SIDE Measure at Maximum Diameter TOP Measure at Centre Top

STEM inside Diameter 19:59 Millimetres Minimum FLARE inside Diameter Millimetres Minimum 21 FLARÉ outside Diameter Millimetres Maximum 28 · 04

BULB LENGTH 70 ± 3.17 Millimetres

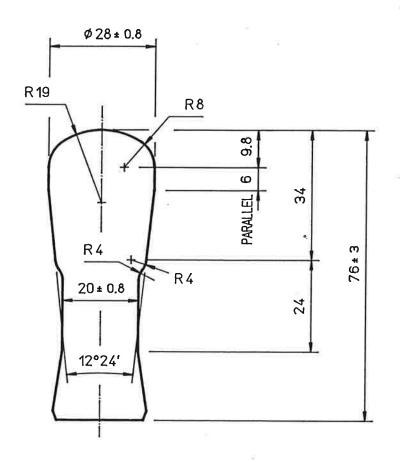
25·5 ± ·8 BULB O. DIA Mm s REVISED REVISED APPROVED

to the best of the knowledge of 0B class Lighting Limited, however, the company does not accept any liability whatsoever in respect of the use, adaptation or processing of any product described herein. All rights reserved. This publication may not be reproduced or issued in any form to third parties without the written authority of GB Glass Lighting Limited. Data contained in this publication is accurate

RIBBON BULB TYPE

**ST028G** 

ISSUE DATE 23-Mar-81



WALL THICKNESS LIMITS & MEASURING POSITION

NECK

(AT 45 FROM BULB TOP)

0.38 TO .89

SIDE

(AT MAXIMUM DIAMETER)

.38 MIN.

TOP

(AT CENTRE TOP)

.51 TO 1.51

STEM

INSIDE DIAMETER

17.6 MIN

FLARE

INSIDE DIAMETER

17.6 MIN C

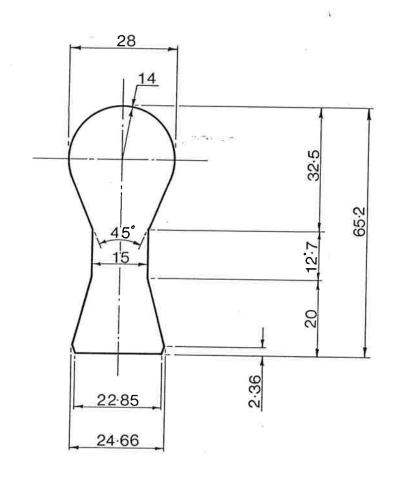
OUTSIDE DIAM. 26.9 MAX.

APPROVED BY	L., E	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
A STATE OF THE STA	M	1	26.2.91	DIMENSIONS REVIEWED			
APPROVED BYC'M MY	$\vee$	2 17	-NOV-92	NECK MEAS POS CHANGED			

Ribbon Bulb Type\_

ST 028H

Issued 19 · 7 · 65



### -WALL THICKNESS LIMITS & MEASURING POSITION-

NECK	(at 38 from bulb top):41	·76
SIDE	(at maximum diameter) ·38	min.
TOP	(at centre top) ·51	1.52
STEM	Inside diameter 12-59	min.
O I E IVI	Outside_diameter	max.
FLARE	Inside diameter 17.32	min.
TEARL	Outside diameter 26	max.
	Outside diameter 28	±1·0
BULB	Length overall 65.2	±3:17
	Calculated weight 9	gms.

- All dimensions are in millimeters -

Approved

of the knowledge of Glass Bulbs. Limited, however the company does not accept any liability whatşoever in respect of the use adaption or processing of any product described herein

Revised

Revised

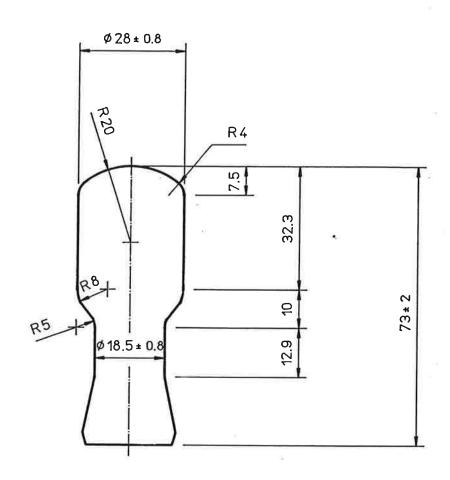
Revised

the best of the knowledge of GB Glass Lighting Limited, however, the company does not accept any liability whatsoever in respect of the use, adaptation or processing of any product described herein All rights reserved. This publication may not be reproduced or issued in any form to third parties without the written authority of GB Glass Lighting Limited. Data contained in this publication is accordate

RIBBON BULB TYPE

ST028L

ISSUE DATE 12-AUG-80



WALL THICKNESS LIMITS & MEASURING POSITION

NECK

(AT 47 FROM BULB TOP)

.38 TO .89

SIDE

(31 FROM BULB TOP)

.38 MIN

TOP

(AT CENTRE TOP)

.51 TO 1.51

STEM

INSIDE DIAMETER

16.0 MIN

FLARE

INSIDE DIAMETER

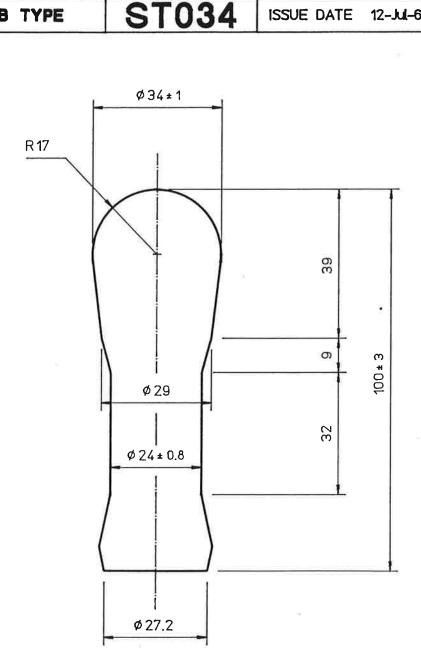
17.6 MIN OUTSIDE DIAM, 25.4 MAX.

APPROVED BY TOWN	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
		5-2-81	REDRAWN	2	4-12-90	SIDE MEASURING
APPROVED BY C. JUNE	13	11-1-91	DIMENSIONS REVIEWED			POSITION AMENDED

RIBBON BULB TYPE

12-Jul-66

ISSUE DATE



WALL THICKNESS LIMITS & MEASURING POSITION

**NECK** 

(AT 64 FROM BULB TOP)

.38 TO .76

SIDE TOP

(AT MAXIMUM DIAMETER)

.38 MIN.

(AT CENTRE TOP)

TO .45 1.27

STEM

INSIDE DIAMETER

21.0 MIN

FLARE

INSIDE DIAMETER

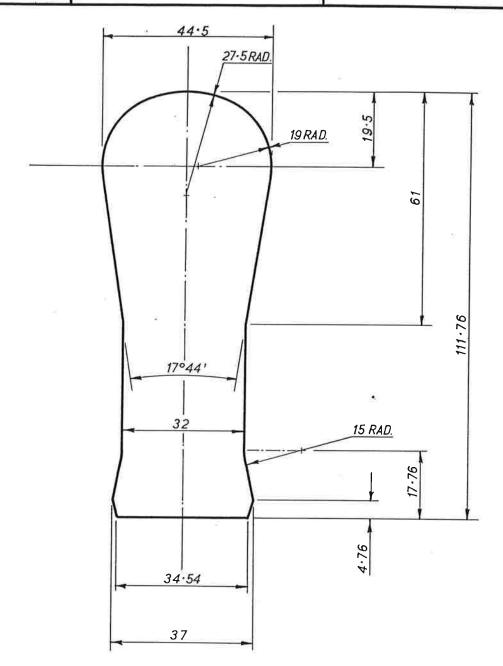
21.0 MIN OUTSIDE DIAM. 30.5 MAX.

APPROVED BY NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
	26.2.91	DIMENSIONS REVIEWED			
APPROVED BY C - WWW	ľ				12

GLASS BULBS LTD.

Issued 14 — 11 — 56.

Type ST  $044 \cdot 5$ 



# ALL DIMENSIONS ARE IN MILLIMETRES ARE OUTSIDE AND FOR FINISHED BULBS

### **SPECIFIC ATION**

WALL THICKNESS LIMITS IN MILLIMETRES

NECK ·41 ·89 SIDE ·41 1·02 TOP ·51 1·51

WALL THICKNESS MEASURING POSITIONS

NECK Measure at 81 Millimetres from Top of Bulb

SIDE Measure at Maximum Diameter TOP Measure at Centre Top

STEM inside Diameter 29 59 Millimetres Minimum FLARE inside Diameter 28 82 Millimetres Minimum FLARE outside Diameter 38 14 Millimetres Maximum

BULB LENGTH 112 ± 3.17 Millimetres

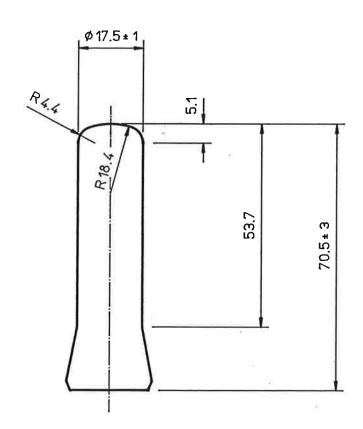
APPROVED REVISED REVISED REVISED

the best of the knowledge of 08 Glass Lighting Limited, however, the company does not accept any liability whatsoever in respect of the use, adaptation or processing of any product described herein All rights reserved. This publication may not be reproduced or issued in any form to third parties without the written authority of GB Glass Lighting Limited. Data contained in this publication is accurate to the best of the knowledge of GB Glass Lighting Limited, however, the company does not accept any inhality, whateverer in personal of the knowledge of GB Glass Lighting Limited, however, the company does not accept any inhality, whateverer in personal of the knowledge of GB Glass Lighting Limited, however, the company does not accept any inhality, whateverer in personal of the knowledge of GB Glass Lighting Limited.

RIBBON BULB TYPE TO

T017.5

ISSUE DATE 18-Nov-57



WALL THICKNESS LIMITS & MEASURING POSITION

NECK

SIDE

(AT 42 FROM BULB TOP)

.40 TO .80

TOP (AT CENTRE TOP)

.51 TO 1.52

STEM

INSIDE DIAMETER

15.0 MIN

MIN

FLARE INSIDE DIAMETER

15.4

OUTSIDE DIAM.24.2 MAX.

- Auto-A						
APPROVED BY	NO.	DATE	MODIFICATION	NO.	DATE	MODIFICATION
- Introduction	2	17-NOV-92	DIMENSIONS REVIEWED			
APPROVED BY C. WILL	37					

Ribbon Bulb Type

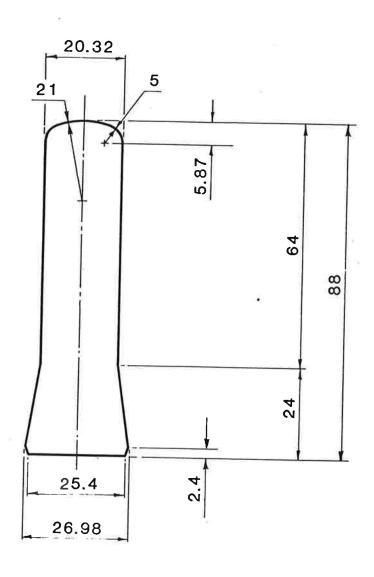
in this publication is accurate to

Wilten

of the knowledge of Glass Burbs, Limited however the company does not accept any liability whatsuever

T020-5

18-11-57 Issued



# -WALL THICKNESS LIMITS & MEASURING POSITION-

SIDE

(at 38 from bulb top).51 - .89

TOP

(at centre top)

-63 - 1.14

STEM

Inside diameter 17.91 min (from 7 from top)

Outside diameter

diameter Inside

max.

FLARE

Outside diameter

min. max.

Outside diameter

21.26  $\pm$ 

BULB

Length overall 88 ± 3.17

Calculated weight

gms.

All dimensions are in millimeters —

Approved

16.2.76 Reissuedas bulb type. STEM LD. WAS 18.42

Revised

# GLASS BULBS LIMITED

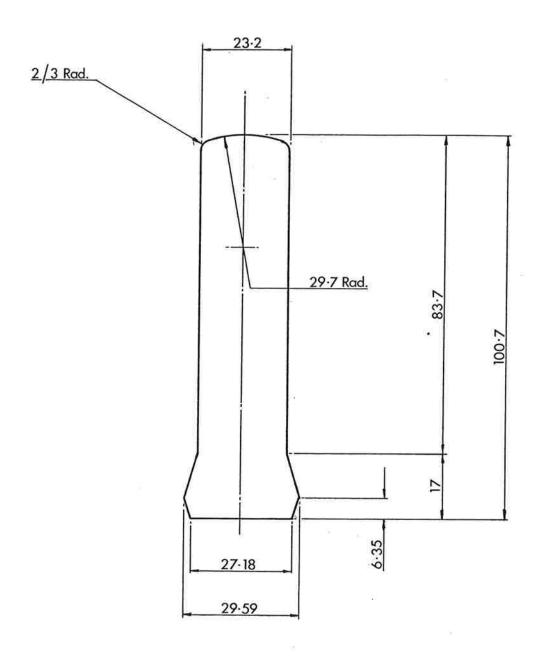
#### TECHNICAL INFORMATION

Ribbon Bulb Type

T 023 A

Issued

7-2-85



## - WALL THICKNESS LIMITS & MEASURING POSITION -

NECK	(at 70 from bulb top )		.3876
SIDE	(at maximum diameter)		·38 min.
TOP	(at centre top)		·51-1·52
STEM	Inside diameter	min.	20.59
	Outside_diameter	max.	
	Inside diameter	min.	22.07
FLARE	Outside diameter	max.	31-59
	Outside diameter	±	
BULB	Length overall 100.7	± 3·17	•
	Calculated weight	gms.	11

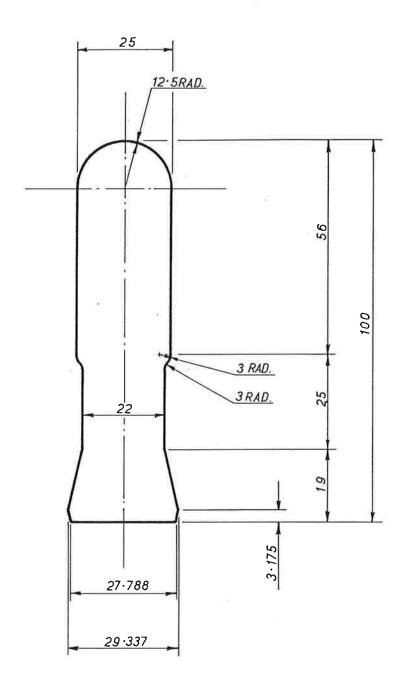
- All dimensions are in millimeters -

Approved / White

Revised

Revised

Revised



### ALL DIMENSIONS ARE IN MILLIMETRES ARE OUTSIDE AND FOR FINISHED BULBS

#### **SPECIFICATION**

WALL THICKNESS LIMITS IN MILLIMETRES

NECK ·38 · 76 SIDE .35 · 76 TOP •51 1 . 52

THICKNESS MEASURING POSITIONS WALL

NECK Measure at 68 Millimetres from Top of Bulb SIDE Measure at 28 " " " " " " " "

TOP Measure at Centre Top

STEM inside Diameter 19.59 Millimetres Minimum FLARE inside Diameter 22 · 07 Millimetres Minimum

FLARE outside Diameter 30 · 51 Millimetres Maximum

BULB LENGTH  $100 \pm 3.17$  Millimetres

APPROVED

**REVISED** 

**REVISED** 

REVISED

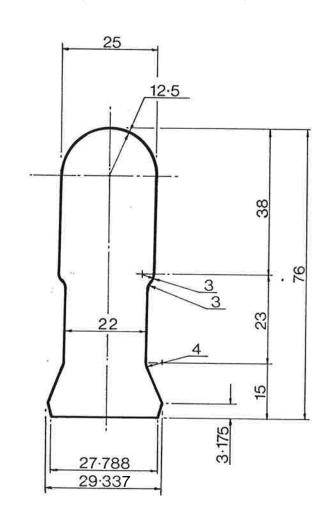
GLASS BULBS LIMITED

TECHNICAL INFORMATION

Ribbon Bulb Type

T 025 A

Issued 15 · 1 · 64



### -WALL THICKNESS LIMITS & MEASURING POSITION-

NECK	(at 51 from bulb top)	38 <i>- •</i> 76
SIDE	(at maximum diameter)	35 - 76
TOP	(at centre top)	51-152
STEM	Inside diameter	19·59 min.
012141	Outside_diameter	max.
FLARE	Inside diameter	19.68 min.
ILARE	Outside diameter	30·51 max.
	Outside diameter	25 · 0 ±1 · 0
BULB	Length overall	76·0 ±317
	Calculated weight	13·00 gms.

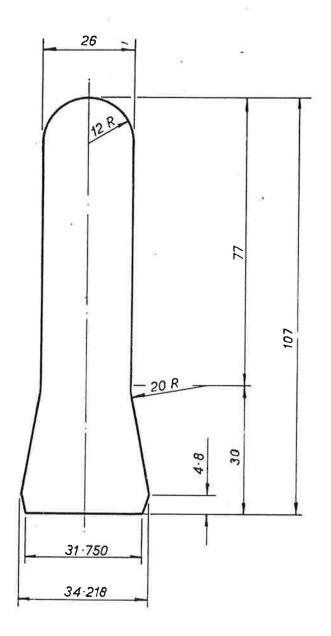
- All dimensions are in millimeters -

Approved

Revised

Revised

Revised



# ALL DIMENSIONS ARE IN MILLIMETRES ARE OUTSIDE AND FOR FINISHED BULBS

#### SPECIFICATION

WALL THICKNESS LIMITS IN MILLIMETRES

NECK 38 - 76

SIDE

TOP .51 - 1.51

WALL THICKNESS MEASURING POSITIONS

**NECK** Measure at 60 Millimetres from Top of Bulb

> SIDE Measure at Maximum Diameter

TOP Measure at Centre Top

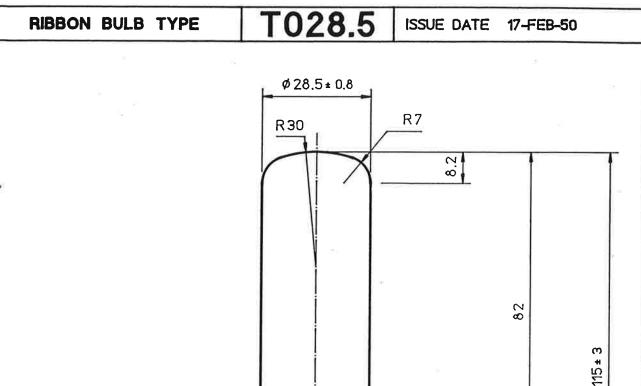
STEM inside Diameter 23 Millimetres Minimum FLARE inside Diameter 26.92 Millimetres Minimum

FLARE outside Diameter 35 - 56 Millimetres Maximum

BULB LENGTH 107 ± 2 Millimetres BULB O.D. 26 ± ·8 Millimetres

**APPROVED** REVISED REVISED REVISED WAS 110 12 - 7 - 66

All rights reserved. This publication may not be reproduced or issued in any form to third parties without the written authority of GB Glass Lighting Limited. In this publication is accurate to the best of the knowledge of GB Glass Lighting Limited, however, the company does not accept any liability whatsoever in respect of the use, adaptation or processing of any product described herein.



WALL THICKNESS LIMITS & MEASURING POSITION

**NECK** 

(AT 77 FROM BULB TOP) (AT 40 FROM BULB TOP)

.43 TO 1.02

SIDE TOP

(AT CENTRE TOP)

.71 TO 1.40

**STEM** 

TAT OLIVING TOP

25.7 MIN

**FLARE** 

INSIDE DIAMETER
INSIDE DIAMETER

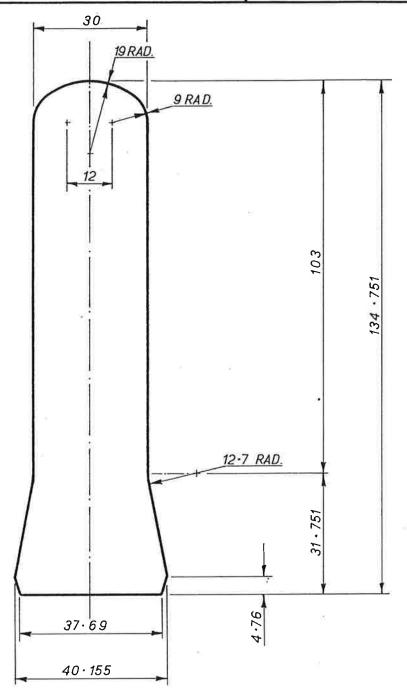
26.9 MIN (

.43

OUTSIDE DIAM.35.6 MAX.

	APPROVED BY C. CAND	NO.	DATE		M	DIFICATIO	M	NO.	DATE	MODIFICAT	TION
1	ADDROVED BY T	11	24-5-50	REV	ISE	)		3	29-DEC-92	REVISED	
	ALLKOAFD BA C COM	2	27-4-84	OUT	OF	ROUND	ADDED	4	22-JAN-93	OUT OF ROUND D	EL

туре 7 030



### ALL DIMENSIONS ARE IN MILLIMETRES ARE OUTSIDE AND FOR FINISHED BULBS

#### SPECIFICATION

WALL THICKNESS LIMITS IN MILLIMETRES

NECK ·43

.71

1 · 14

SIDE

TOP

1 · 40

WALL THICKNESS MEASURING POSITIONS

NECK Measure at 93 Millimetres from Top of Bulb

SIDE Measure at Maximum Diameter

TOP Measure at Centre Top

STEM inside Diameter 27-10

Millimetres Minimum

FLARE inside Diameter 30.07

· 07 Millimetres Minimum

FLARÉ outside Diameter 41 · 298

Millimetres Maximum

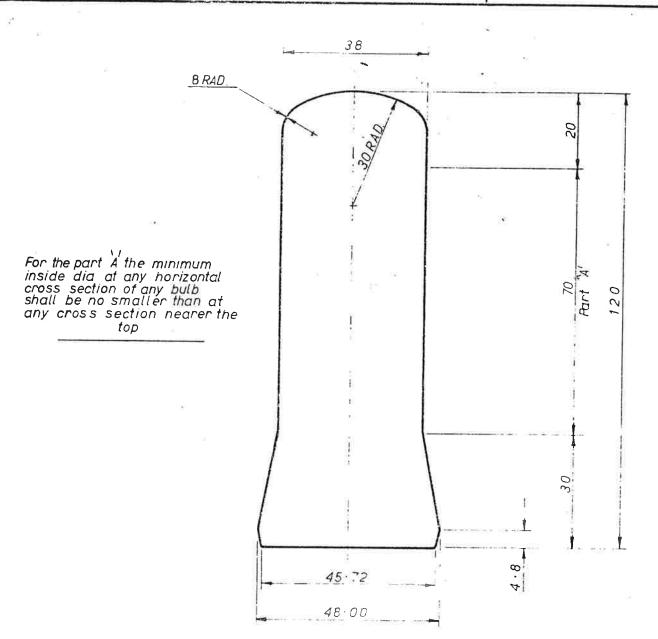
BULB LENGTH 134 · 751 ± 3 · 17 Millimetres

APPROVED .

REVISED 28 · 8 · 69 FLARE WAS 44·45

REVISED

REVISED



# ALL DIMENSIONS ARE IN MILLIMETRES ARE OUTSIDE AND FOR FINISHED BULBS

#### SPECIFICATION

WALL THICKNESS LIMITS IN MILLIMETRES

NECK 0 75 ± 0 25

SIDE 1 00 + 05 - 03

TOP 1.00 + 0.5 - 0.3 - MAX SPREAD 0.5 -

WALL THICKNESS MEASURING POSITIONS

NECK Measure at 77 Millimetres from Top of Bulb

SIDE Measure 20

TOP Measure at Centre Top

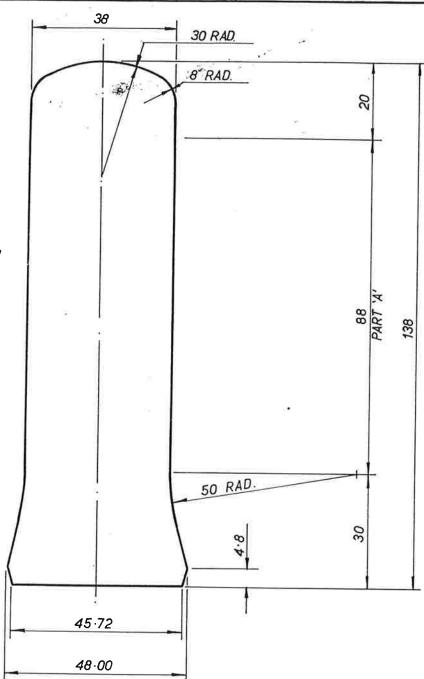
STEM inside Diameter 35.5±1.5 Millimetres Minimum

FLARE inside Diameter 38 Millimetres Minimum

FLARÉ outside Diameter 50 Millimetres Maximum

BULB LENGTH 120 ± 2 · 0 Millimetres
OUTSIDE DIA 38 · 6 MAX INCLUSIVE OF · 75 M/M MAX. OVALITY

FOR THE PART A' THE MINIMUM INSIDE DIA AT ANY HORIZONTAL CROSS SECTION OF ANY BULB SHALL BE NO SMALLER THAN AT ANY CROSS SECTION NEARER THE TOP



# ALL DIMENSIONS ARE IN MILLIMETRES ARE OUTSIDE AND FOR FINISHED BULBS

### SPECIFICATION

THICKNESS LIMITS IN MILLIMETRES WALL

NECK 0 - 75 ± 0 · 25

SIDE  $1 \cdot 00 + 0 \cdot 5 - 0.3$ 

1 - 00 + 0 · 5 - 0.3 MAX SPREAD 0 · 5

WALL THICKNESS MEASURING POSITIONS

**NECK** Measure at 77 Millimetres from Top of Bulb

SIDE 20 Measure at Maximum Diameter

TOP Measure at Centre Top

STEM inside Diameter 35.5 ± 1.5 Millimetres Minimum

FLARE inside Diameter *3*8 Millimetres Minimum

FLARÉ outside Diameter 50 Millimetres Maximum

**BULB LENGTH** 138 ± 2.0 **Millimetres** 

OUTSIDE DIA 38.6 MAX INCLUSIVE OF .75 MM MAX OVALITY

**APPROVED** 

**REVISED** 

**REVISED** 

REVISED

#### RIBBON BULB DRAWINGS AND SPECIFICATIONS

#### REVISION AMENDMENT RECORD

DATE	DETAILS OF CHANGE	Approve
		APPROVE
	Series 1 bulb specifications re-drawn and recorded on CAD system. Some Series 2	A L CAVI
ıı	Drawings also re-drawn on CAD, identified by GB GLASS LIGHTING LIMITED title.	
lii	Other drawings will be amended accordingly once reviewed and approved.	
26.07.93	M063.5A top thickness changed from 1.20mm max to 1.30mm max.	A L CAVE
10.06.94	S96 Glass Composition, Data Sheet, Revised and Re-issued.	M J Rose
10.06.94	R120 Bulb Drawing Added	A L Cave
10.06.94	RO79 Bulb Drawing Added	A L Cave
01.07.94	M125D:-Length shortened from 212mm to 210mm and flare to neck angle changed.	A L Cave
		_
Ì		
		-
+		-
-+		-

filename :- RBCATAMD

