

## LS4 Motors Specification Parameters:

### Performance:

Maximum Allowable Velocity:	20 [mm/sec]
Dynamic Stall Force:	4 to 6 [N]
Static Holding Force	4 [N] (reference value)
Non-Energized Stiffness	2.3 to 2.8 [N/ $\mu$ ]
Nominal Preload on Stage	36 [N]
Kf	1.6 to 2.4 [N/Volt command] – driver & command dependant
Kfv	30 to 40 [N • sec/m]
Offset	1 to 2 [V] – Driver dependant
Attainable Resolution	Better than 100 nm – see application notes.
Nominal Lifetime	20,000 hours under nominal operating conditions

### Electrical:

Maximal Voltage:	125 Vrms, 39.6KHz, sine wave
Maximal Current consumption :	130 mA rms
Maximal Power Consumption :	3.0 W

### Environmental:

Ambient Temperature:	0 - 50°C
Storage:	-20°C - +70°C
Humidity:	0 - 80% non condensing

### Motor + Brush Physical Dimensions:

Length:	42 mm
Width:	60 mm
Height:	19 mm
Weight:	80 gr

Instead of

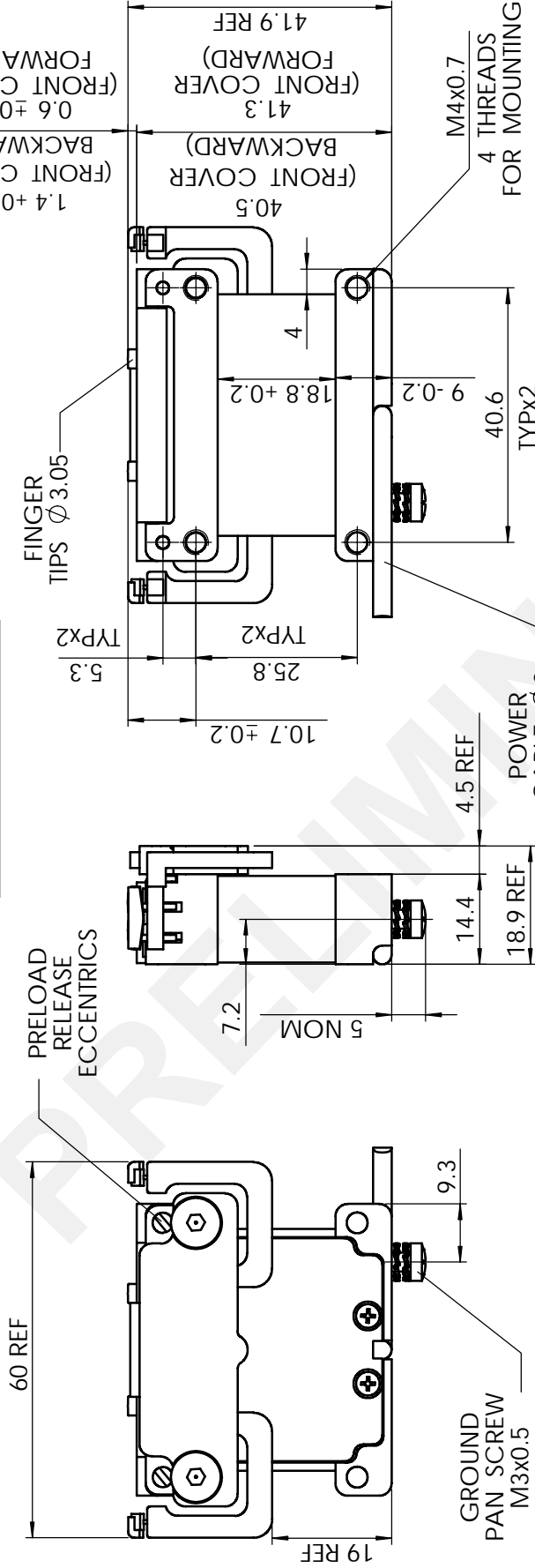
DESCRIPTION

DATE VER/REV ECO #

DIRECTION OF MOTION

**PRELIMINARY**

1.4 +0.1 (FRONT COVER BACKWARD)  
0.6 +0.2 (FRONT COVER FORWARD)



**NOTES**

1. PRELOAD RELEASE ECCENTRICS SHOULD REMAIN ACCESSIBLE AFTER MOUNTING.
2. ALL DIMENSIONS REFER TO A MOTOR CORRECTLY MOUNTED AGAINST ALUMINA STRIP.

Copyright by NANOMOTION Ltd. ALL RIGHTS RESERVED! This drawing contains confidential & proprietary information which the authorised recipient agrees & not to disclose.

FINISH:

MATERIAL:

ALL DIMENSIONS ARE IN: mm

TOLERANCES UNLESS OTHERWISE SPECIFIED:  
LINEAR -  $\pm 0.1$ ; ANGULAR -  $\pm 1^\circ$

DESIGNED	NAME	SIGNATURE	DATE
Gil S.	Gil S.		26.10.99
Gr. Z.	Gr. Z.		
Alon A.	Alon A.		
Lior Sh.	Lior Sh.		

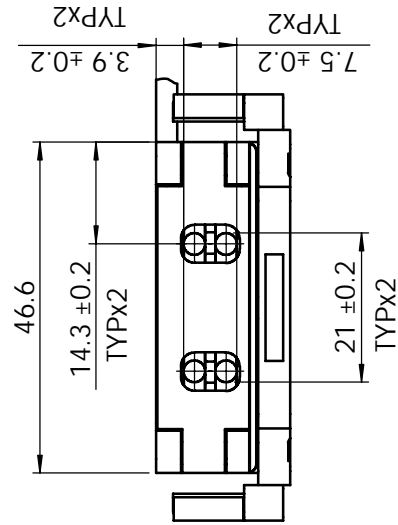


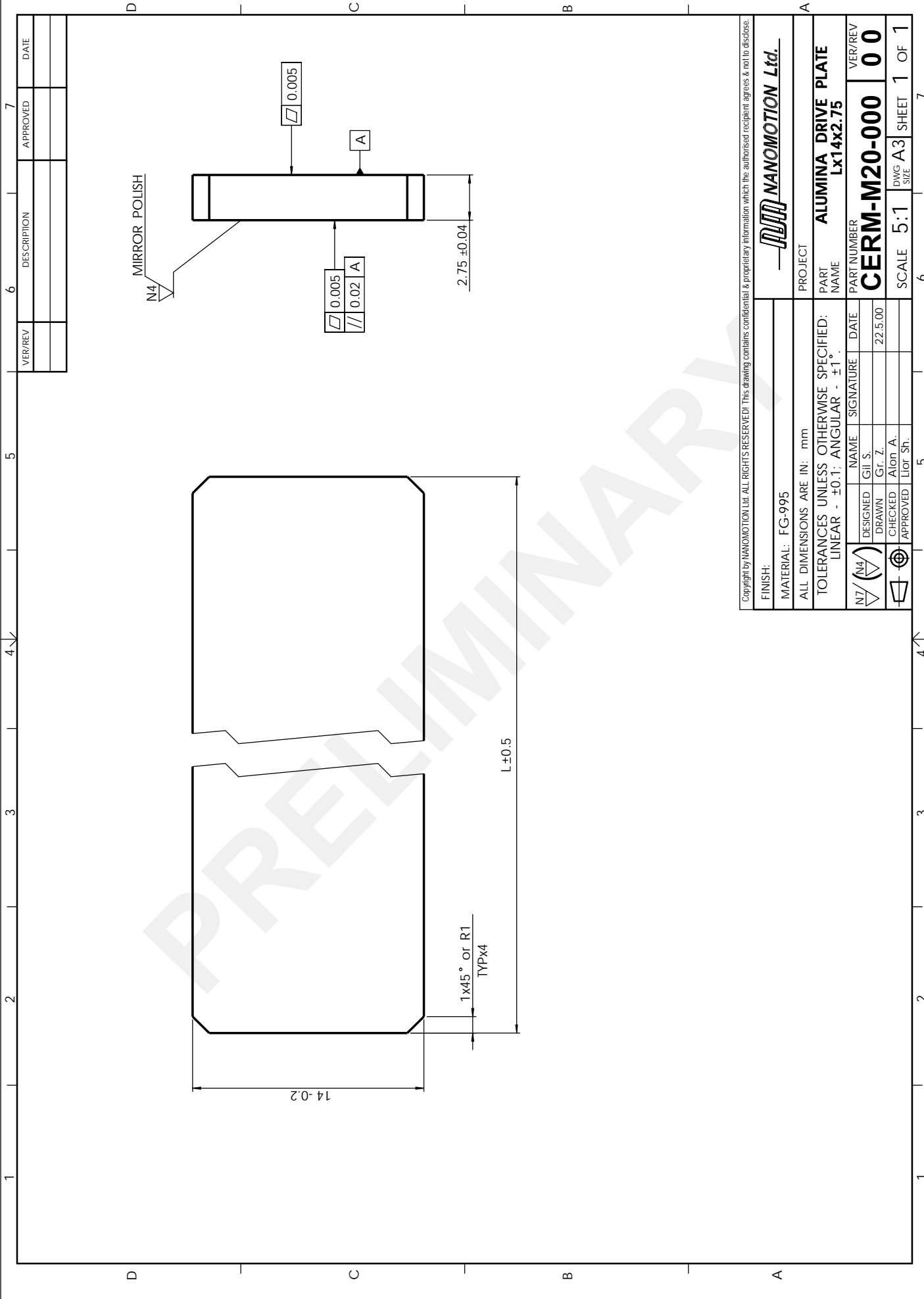
PART NAME **LS4S MOTOR LAYOUT**

PART NUMBER

**LS4S-M10-L00-00**

SCALE 1:1 DWG A4 SIZE SHEET 1 OF 1





VER/REV	DESCRIPTION	APPROVED	DATE

FINISH:		NANOMOTION Ltd. ALL RIGHTS RESERVED! This drawing contains confidential & proprietary information which the authorised recipient agrees & not to disclose.	
MATERIAL: FG-995		PROJECT: NANOMOTION Ltd.	
ALL DIMENSIONS ARE IN: mm			
TOLERANCES UNLESS OTHERWISE SPECIFIED: LINEAR - ±0.1; ANGULAR - ±1°			
N7/N4	DESIGNED	NAME	SIGNATURE
▽	DRAWN	Gil S.	
	CHECKED	Gr. Z.	
	APPROVED	Alon A.	
		Lior Sh.	
PROJECT: ALUMINA DRIVE PLATE		PART NAME: Lx14x2.75	
PART NUMBER: CERM-M20-000		VER/REV: 0 0	
SCALE: 5:1		DWG SIZE: A3	
SHEET: 1		OF: 1	