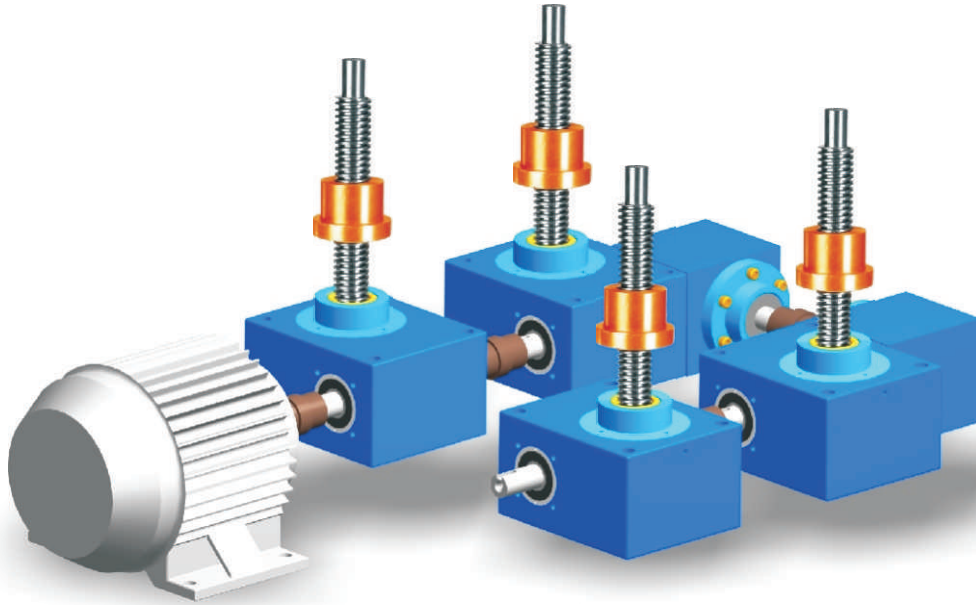




Lifting Systems



Column Lifting Units



Linear Actuation Technology



Gears and Gear Drives (India) Pvt. Ltd.












(ISO 9001 : 2008 Certified)

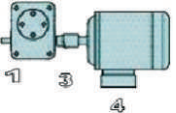

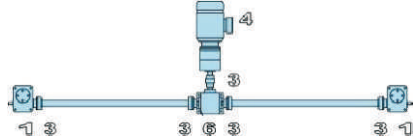
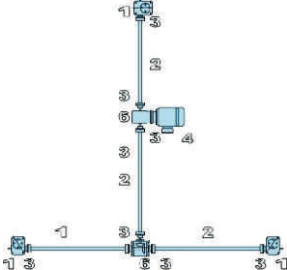
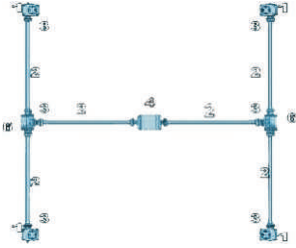
ISO : 9001 - 2008





<p>Lifting Systems:</p> <p>Gears Gear Drives worm gear screw jacks (classic & cubical), quick lifting bevel gear screw jacks, bevel gear boxes can be used as either single drive units or multi lifting systems. Multi lifting systems are generally driven by single motor. This makes the system to lift equal, when driven by two or more motors, sophisticated electrical synchronisation and control is required.</p>	<p>The system is built using worm gear screw jack (classic, cubical), quick lifting bevel gear screw jacks, bevel gear boxes, Electric motors, geared motors, couplings, bearing blocks and connecting shafts. Depending upon configuration, several hundred tons of load can be lifted/lowered with ease.</p>
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<p>Elements of Lifting Systems:</p>							
<p>1. Screw Jacks</p>				<p>2. Connecting Shaft</p>		<p>3. Coupling</p>	
							
<p>4. Electric Motor</p> 		<p>5. Geared Motor</p> 		<p>6. Bevel Gear Box</p> 		<p>7. Motor Flange</p> 	<p>8. Bearing Block</p> 

<p>Schematic Layouts</p>	
  	 



Lifting Systems:

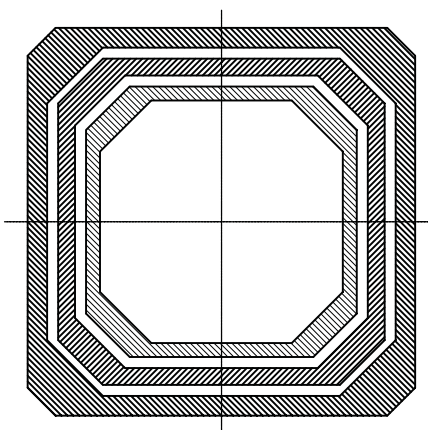
Working Examples



Column Lifting Units

Column Lifting Units are electric telescopic actuators. Telescopic columns are composed of two or three extruded aluminium profiles. The columns are guided through synthetic strips and are actuated by cubical screw jacks with integral motors. Individual unit can lift upto 25 KN with lift upto 1000mm. The lifting speed upto 1500mm/min is possible with trapezoidal screws. With two step telescope, the closed height is less than stroke length for strokes above 700mm. Lifting columns can take higher out of centre. Loads compared single screw jacks.

Aluminium Extrusions

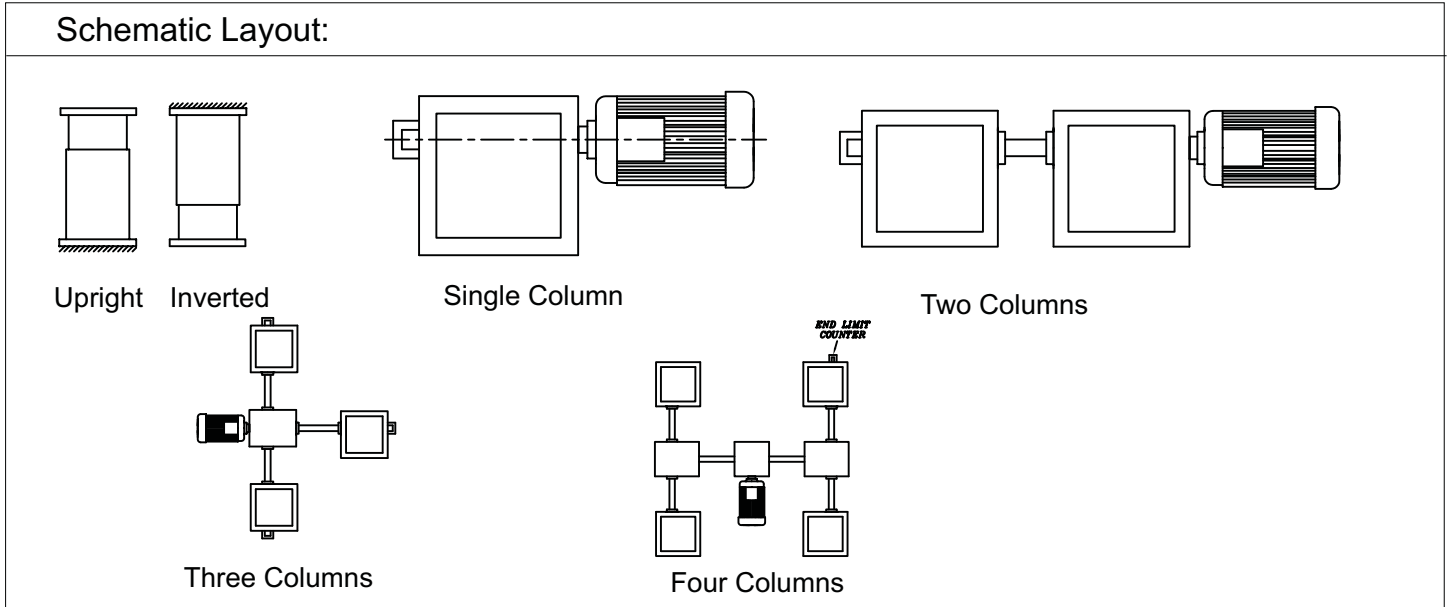


Profile	1	2	3	4
D	117	139	161	183
d	110	125	147	169
D1	145	176	208	240
d1	127	148	180	212
A	96	114	136	158
d3	M6	M10	M10	M10
R	67.88	80.61	96.17	111.72



Column Lifting Units:

Schematic Layout:



Technical Data

Telescopic Column	TC21	TC32	TC43	TC432
Profile A	139x139	161x161	183x183	183x183
B	-	-	-	161x161
C	117x117	139x139	161x161	139x139
D	125	140	160	140
L1	260+45	300+45	350+45	350+45
L2	80	95	110	100
L4	465	550	580	580
L5	200	240	240	240
L6	300	300/400	300/400	300/400
PKN	4	5/4	7/5	5/3

Telescopic Column	One Step				Two Step		
	TC 21		TC 32		TC 43		TC 432
Max stroke mm	600		1000		1000		1000
Screw jack ratio	16:1		16:1	8:1	24:1		32:1
Trapezoidal Screw pitch mm	5	10	6		6	12	16 32
Lifting Speed, mm/min	450	900	500	1000	350	700	750 1500
Max Central load, F, KN	5		10	5	25	15	10 5
Motor Power KW	0.25	0.37	0.75	0.75	1.1	1.1	0.75 0.75



Worm Gear Screw Jacks CLASSIC



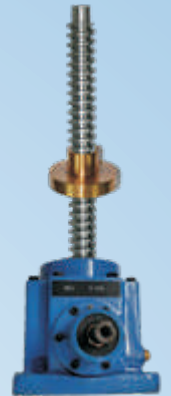
Worm Gear Screw Jacks CUBICAL



Ball Screw Jack



Electric Cylinder



Bevel Gear Screw Jacks



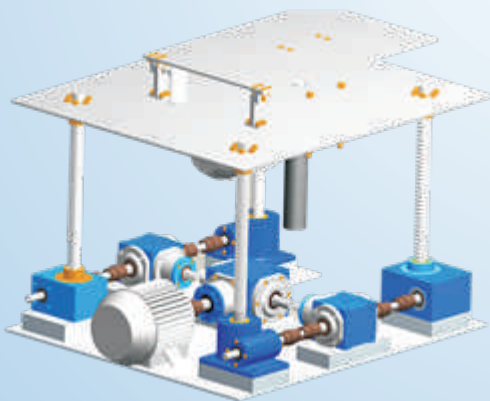
Bevel Gear Box, FG



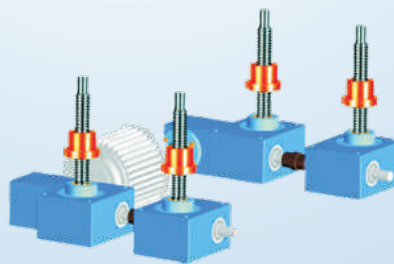
Bevel Gear Box, L Drive



UV Joints



Lifting Systems



Worm Reducer



Gears and Gear Drives (India) Pvt. Ltd.

(ISO 9001 : 2008 Certified)

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