sisis

World-class turf maintenance equipment

OPERATING INSTRUCTIONS

VARISEEDER 1300

MACHINE REFERENCE	VSE/1300
SERIAL NUMBER	.....
CN CODE	8432 30 11

SISIS, Ashbourne Road, Kirk Langley, Derbyshire, DE6 4NJ, England.
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A division of Howardson Ltd. - a proudly British company
Company reg no 641526 - Vat No GB 345 9918 12

EC DECLARATION OF CONFORMITY

We the undersigned

SISIS EQUIPMENT (Macclesfield) LIMITED

Certify that the	Seeder
Make	SISIS
Type	VariSeeder
Series	1300
Conforms to EC Directives and amendments	2006/42/EC
Standard	BS7370

This certificate applies only to NEW equipment supplied by SISIS or our authorised dealer

J.W. Hargreaves
Director

Certificate Number
CEFSVSE1300

SISIS

PARTS LIST & DRAWINGS

VARISEEDER 1300

MACHINE REFERENCE	VSE/1300
SERIAL NUMBER	.....
CN CODE	8432 30 11

SALES/SPARES 01625 503030
Website www.sisis.com

ASSEMBLY

item	part	description	qty
1	1/1061	spring washer	7
2	1/1062	spring washer	8
3	1/1065	spring washer	8
5	1/1070	washer	2
6	1/1071	washer	4
7	1/1072	washer	13
8	1/1094	setscrew	3
9	1/1095	setscrew	22
10	1/1096	setscrew	4
11	1/1104	setscrew	9
12	1/1105	setscrew	3
13	1/1152	setscrew	8
14	1/1154	setscrew	7
15	1/1155	setscrew	1
17	1/1217	nyloc nut	2
18	1/1218	nyloc nut	45
19	1/1220	nyloc nut	15
20	1/1221	lock nut	8
22	1/1228	nyloc nut	12
23	1423	mudguard washer	22
24	153	tine wheel	37
25	1871	pop rivet	2
26	1938	grub screw	8
27	20327	lower link pin	2
28	20491	handle	1
29	22016	zero max drive	1
30	22026	button head screw	19
31	22031	chain	1
32	31291	seed wheel standard	37
33	31293	spacer	2
34	3171	rubber strip	4.5m
35	36850	collar	4
36	33741	side seal	2
37	33745	tine scraper	7
38	33803	spacer	36
39	35905	clamp plate	2
40	35909	sealing plate	2
41	36000	name plate	1
42	36800	main frame	1
43	36801	hopper	1
44	36802	inside brush	1
45	36803	outside brush	1
46	36804	lid	1
47	36805	gearbox mount	1
48	36806	shaft cover	1
49	36807	rear guard	1
50	36808	tine scraper	2
51	36809	hinge drilling	1
52	36810	chain guard	1
53	37192	drive sprocket	1
54	36812	driven sprocket	1
55	37190	tine shaft	1
56	36814	guard stud	4
57	36815	seed wheel shaft	1
58	36816	seed deflector	1
59	36817	tensioner block	1
60	36818	seeder decal	2
61	4112	SISIS decal	3
62	7373	square washer	2
63	8068	grub screw	4
64	8123	mudguard washer	4
65	8153	grub screw	2
66	8228	chease head screw	2
67	8298	bearing	4
68	8326	linch pin	3
69	8617	top link pin	1
70	8638	dome nut	4
71	20279	csk head screw	4
72	9159	chain connecting link	1
74	21552	mudguard washer	13
75	31875	seed wheel fine	37
76	35678	seed wheel ultra fine	37
77	35769	spacer for ultra fine	36
78	1/1118	setscrew	2
79	1/1223	nyloc nut	2
80	22094	latch	2
81	22095	striker	2
82	22096	dome head screw	4
83	22097	dome head screw	4
84	20431	nyloc nut	8
85	36935	packing strip	2
86	36959	calibration label	1
87	37020	label plate	1
88	37193	angle	2
89	1/1153	setscrew	4
90	1/1076	washer	8
91	3210	roller clutch bearing	1
92	37191	shaft end washer	1

~~item part description qty~~

We want you to obtain the best performance from this machine. If you have any difficulty in carrying out the following instructions please contact us or your local SISIS Territory Manager or SISIS Dealer.

SAFETY

ALWAYS
read the operating instructions carefully and understand the controls before commencing work.

before starting work always visually check machine for damage or wear to working parts.

look behind before starting to reverse and watch out for children or pedestrians.

switch off the power before making adjustments or repairs and never lift or carry a machine whilst any parts are moving.

DO NOT
allow any unauthorised person to handle machines in any way at any time.

DESIGN

The SISIS VariSeeder is designed for use on golf greens, tees and approaches; soccer goal mouths and centres; tennis base lines; cricket run-ups and ends etc.

The VariSeeder has a working width of 1300mm.

The studded roller, specially manufactured and spiralled to SISIS design creates thousands of little "plant pots" to receive the grass seed which is metered simultaneously. The framework has provision for additional weights if required for extra depth in hard conditions.

CONNECTION TO THE TRACTOR

Connect the VariSeeder to the tractor 3 point link arms, ensuring that stabilisers are fitted. Adjust the top link so that the top frame is parallel to the ground.

Extra weight may be required to assist penetration in hard conditions. Maximum weight 81 kilos.

Always fit weights when machine is attached to the tractor, to maintain machine stability.

Always remove weights before disconnecting

machine from tractor. Additional tractor weights are available from SISIS. Part Number 33150, maximum 6 off. 13.5 kilos each (30 lbs).

PRINCIPLE

The VariSeeder tine shaft is driven by the forward motion of the machine when the studded roller is in contact with the ground.

The tine shaft in turn drives the seeder shaft at a given rate through the variable speed gearbox.

The tine shaft creates thousands of little "plant pots". The seed is then broadcast into the plant

pots by the calibrated seeder.

SEEDING RATES

To alter the seed rate, unlock the control lever on the gearbox by turning the red knob as indicated on the top of the control lever. Move the lever to the correct position and lock the lever firmly.

The rates given on page 3 are a guide. Different lower rates can be achieved by moving the lever from A towards the B.C.D. marks. A being the highest rate and D being the low rate. Lower rates are available past D down to Zero.

For very low rates the seeder wheels (item 25) may be changed. Remove the seeder shaft by removing

the 2 bearings on either end of the shaft. Once the shaft is removed the spacers and seeder wheels are removed from the shaft and the alternative seeder wheels are replaced (SISIS part 31875). The shaft is then refitted.

Complete Ultra Fine Shaft	FS1059	
Standard Seeder Gears	F35678	37 off

When using Pure Bent Seed the Ultra Fine seeder reel must be fitted (SISIS No FS1059. See rates given on page 4.

MAINTENANCE AND LUBRICATION

Oil chain frequently and ensure cleanliness of the chain and within the guard.

Ensure hopper brushes and end plates are adjusted to prevent seed spillage.

Do not adjust end plates tightly to the seeder shaft as damage may occur to the gearbox. The gearbox is fitted with an overload device to reduce the advent of damage.

If the seeder roller fails to turn when in work investigate and release the restriction.

Scrapers (item 50) may need adjustment to prevent contact with the tine wheels (item 24).

STORAGE

Always remove seed from hopper before storage. Always keep seed dry and free of vermin.

Do not place items on the hopper lid as damage may occur.

SPECIFICATION

Overall width	1.56m	
Working width	1.3m	
Length	0.6m	
Height	0.8m	
Weight	162kg	
Hopper capacity	$0.14m^2$	
Seed spacing	seed is broadcast into holes at 3.5cm x 5cm	$1^1/_2$in x 2in
Coverage rates	$8450m^2$/hr	10.106 yds^2/hr
Recommended tractor	10kw	14hp

SEEDING RATES GUIDES

FITTED WITH STANDARD REEL

PERENNIAL RYE GRASS

	gms/m²	oz/yd²
A	30	0.88
B	20	0.58
C	8.8	0.25
D	5	0.14

FESCUE

	gms/m²	oz/yd²
A	18	0.52
B	12.8	0.37
C	6.2	0.18
D	3	0.08

FITTED WITH ULTRA FINE REEL

BENT SEED ONLY

	gms/m²	oz/yd²
A	7.8	0.22
B	5.0	0.14
C	2.0	0.05
D	1.0	0.02

All seed rates are approximate. Seed grain size and ground conditions will affect the rate of application.

Accurate seed rates can only be obtained by on site calibration

The above rates were obtained using Rigby Taylor Seed mixtures.

GOLF COURSE/FINE TURF SEED MIXTURES

	Sowing Rate > more than	Cutting Height < less than	
Browntop Bent/Fescue	> 35 gms/m2	< 5mm	
Browntop Bent/Fescue	> 35 gms/m2	< 4mm	< 8mm
Browntop Bent/Fescue	> 35 gms/m2	< 5mm	
Browntop Bent	6-12 gms/m2	< 4mm	< 8mm
Perennial Ryegrass	25-35 gms/m2	< 5mm	
Browntop Bent	6-12 gms/m2	< 4mm	< 8mm
Creeping Bent	4-6 gms/m2	< 3.5mm	< 8mm
Creeping & Browntop Bents	4-6 gms/m2	< 4mm	< 8mm
P. Ryegrass/Fescue/Bents	30 gms/m2	< 4mm	< 8mm
P. Ryegrass/Fescue/Bent	30 gms/m2	< 7mm	
Fescues/Browntop Bent	20 gms/m2	< 4mm	
Fescues/Browntop Bent	30 gms/m2	< 10mm	
Fescues/Bent/S.S.M	30 gms/m2	< 12mm	
Fescues/Bent	30-35 gms/m2	< 12mm	
P. Rygrass/Fescue/Bent	25-35 gms/m2	< 15mm	

CRICKET MIXTURES

	Sewing Rate > more than	Cutting Height < less than
P. Ryegrass/Fescue/Bent	30 gms/m2	5-35mm
Perennial Ryegrass	25-35 gms/m2	< 5mm
P. Ryegrass/Fescues	35 gms/m2	< 10mm
P. Ryegrass/Fescue/Bent	30 gms/m2	< 7mm

SPORTSFIELD MIXTURES

	Sowing Rate > more than	Cutting Height < less than
Perennial Ryegrass	35 gms/m2	< 25mm
P. Ryegrass/Fescues	35 gms/m2	< 25mm
P. Ryegrass/Fescues	35 gms/m2	< 30mm
Perennial Ryegrass	35 gms/m2	< 25mm

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9	1/1095	setscrew	22
10	1/1096	setscrew	4
11	1/1104	setscrew	9
12	1/1105	setscrew	3
13	1/1152	setscrew	8
14	1/1154	setscrew	7
15	1/1155	setscrew	1
17	1/1217	nyloc nut	2
18	1/1218	nyloc nut	45
19	1/1220	nyloc nut	15
20	1/1221	lock nut	8
22	1/1228	nyloc nut	12
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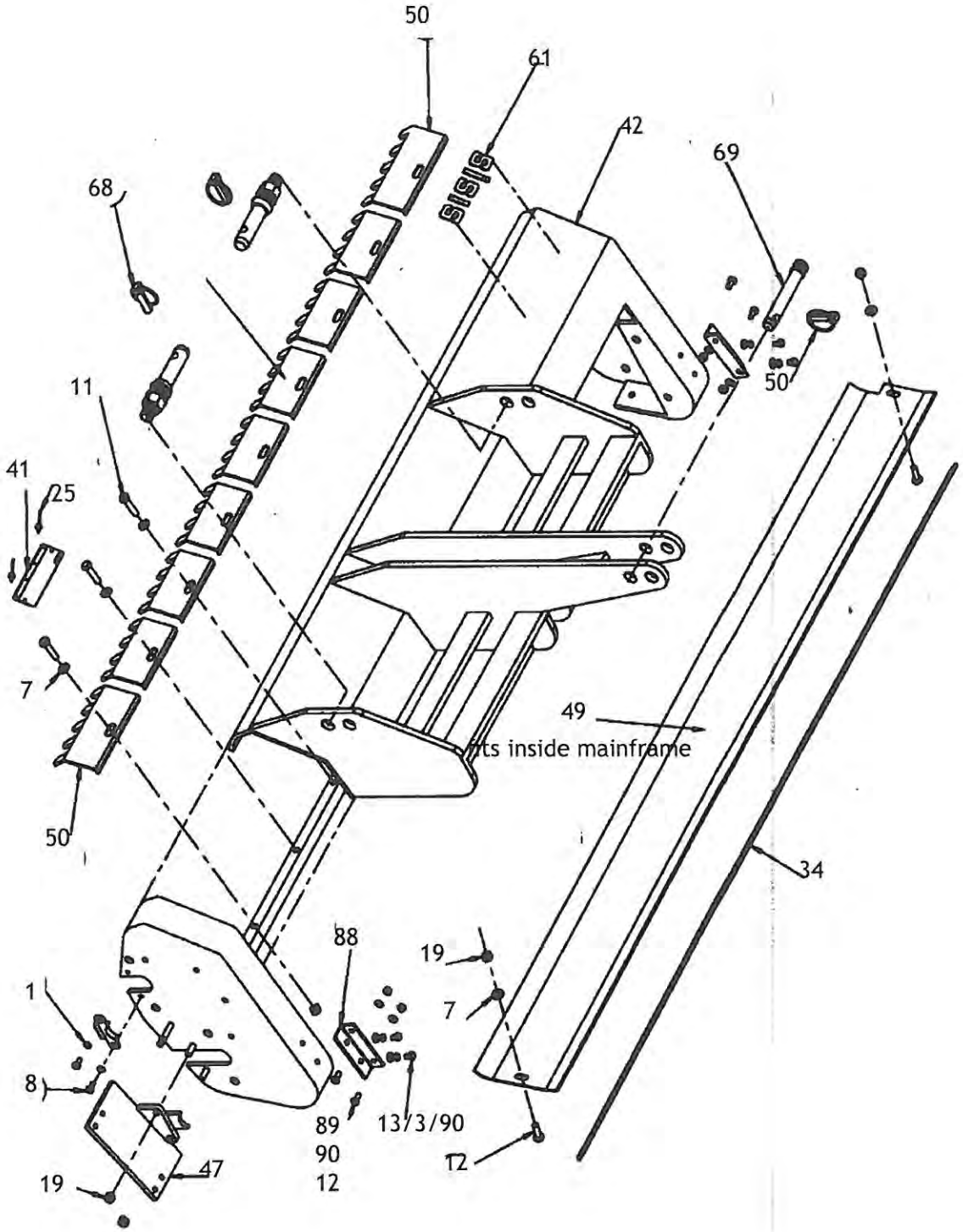
item part description qty

MAINFRAME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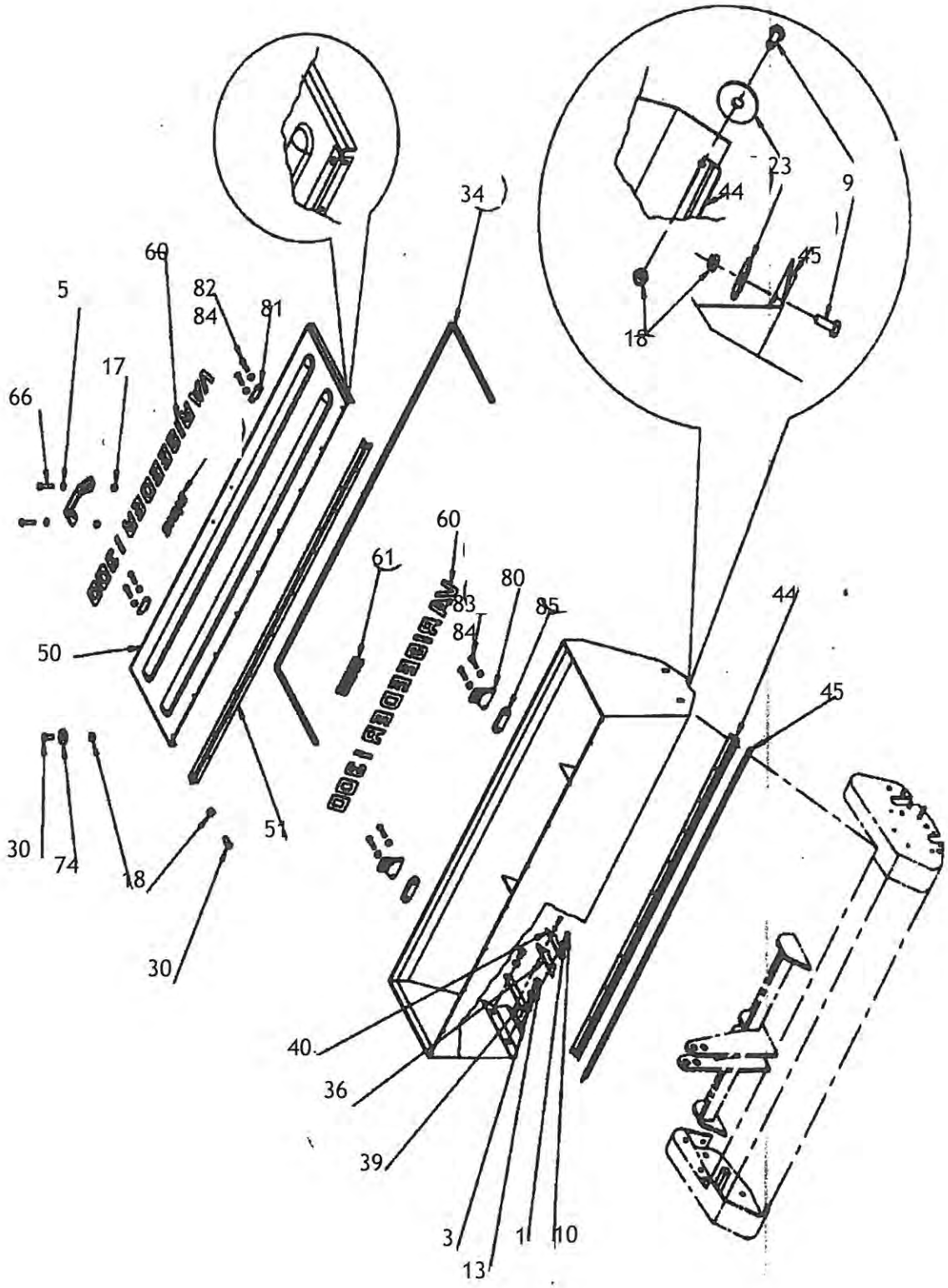
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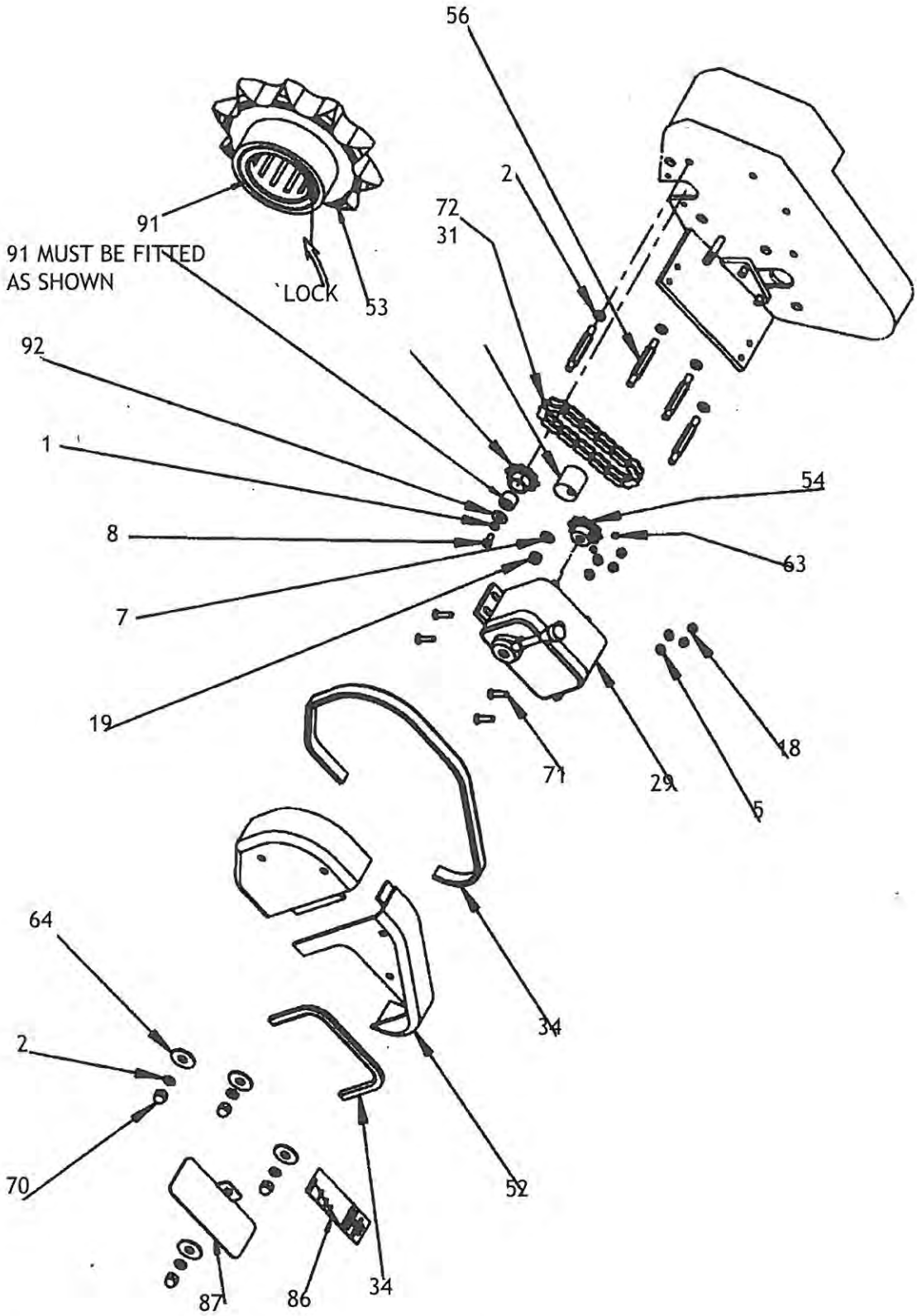
DRIVE TRAIN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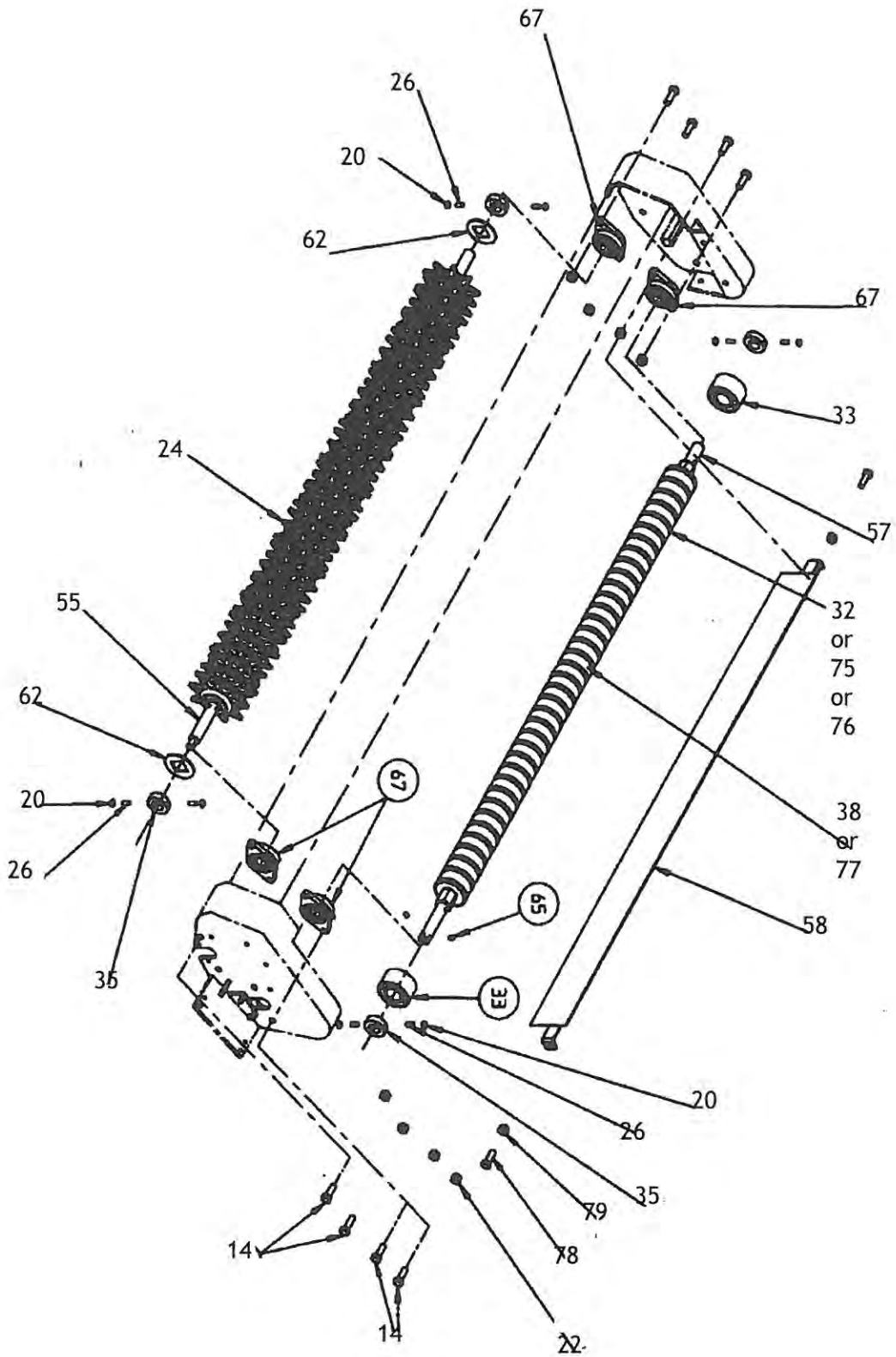
DRIVE TRAIN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