

1. Safe Handling & Installation
2. Safety
3. Operation
4. Maintenance
5. Risk Assessment
6. Troubleshooting

Appendix

1. Bandfacer Exploded View
2. Recommended Spare Parts
3. Footprint
4. Circuit Diagram
5. Extractor Maintenance Log
6. Manufacturers Contact Details

Due to a policy of continuous improvement,
your machine may differ slightly to the
exhibits shown in this manual

1.1 GENERAL DESCRIPTION

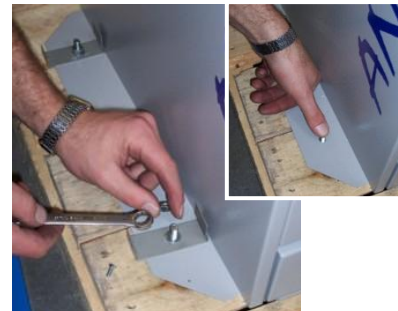
These robust manual flat finishing machines come as standard with integral guarding, an adjustable work table and protractor. They are supplied with an abrasive belt fitted and are therefore ready to use once installation has been completed.

1.2 SAFE OFF-LOADING & POSITIONING

The Antelope is a stable, freestanding unit incorporating a dry extractor that has a sizeable footprint and consequently a good resistance to toppling. The machine is supplied bolted to a pallet so that it can be safely lifted, transported and positioned as described below.



1. Remove the two base covers to expose transit bolts.



2. Release & Remove the transit bolts (see insert).



3. Position Fork Lift extensions in-line with the pallet top.



4. Slide the machine onto the Fork Lift extensions.



5. With the machine sat stable on the Fork Lift extensions – lower to the ground.



6. Slide the machine off the Fork Lift extensions onto the ground.

The Deer pedestal is considerably lighter than the Antelope therefore is easier to manipulate. This is again supplied bolted to a pallet though great care must be exercised when separating the machine from it. The smaller footprint and lighter base increase the danger of toppling, so it is recommended that the procedure below is adopted.

NB! THE POSITION OF THE FORKS, RELATIVE TO THE PEDESTAL IS IMPORTANT AND SHOULD BE EXACTLY AS SHOWN.



1. Position the Fork Lift Extensions underneath the machine bed.
Release & remove transit bolts.



2. Lower the machine onto the ground.

The Deer bench model is the lightest and most stable variant though care should still be exercised when lifting/moving. Again the use of a Fork Lift truck is recommended, the method for positioning would be that as depicted for the Antelope.

PLEASE NOTE!!! For protection during transit, certain components may have been packed separately around the base of the machine or inside the dust tray (dust mounted units only).

GREAT CARE MUST ALWAYS BE TAKEN WHEN MOVING ALL MACHINES, TO PREVENT INJURY AND DAMAGE. ONLY SUITABLY TRAINED PERSONNEL SHOULD LIFT/MANOEUVRE HEAVY MACHINERY TO AVOID INJURY/DAMAGE TO BOTH INDIVIDUALS AND EQUIPMENT. ONCE THE MACHINE HAS BEEN UNPACKED IT SHOULD BE FULLY INSTALLED AS DESCRIBED.

1.3 MACHINE WEIGHTS

MACHINE MODEL	PACKED WEIGHT (Kg)
DUST MOUNTED UNITS	136
PEDESTAL MOUNTED UNITS	120
BENCH MOUNTED UNITS	83

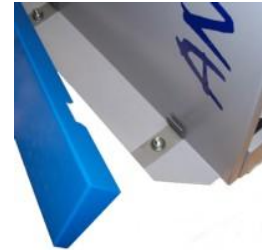
1.4 INSTALLATION

Refer to Appendices 3 for individual machine footprints.

It is recommended that a minimum area of 1m is allowed at the front of the machine for general operation (including dust tray removal) and a further 0.5m to the rear of the machine to allow access for maintenance work.

Non dust unit based machines should be connected to an extraction system before use to conform to local health & safety requirements.

Position the machine so that it does not cause any obstruction in use. Floor mounted machines must be securely bolted, through the holes provided using four proprietary bolts (Para-bolt/Raw-bolt) with a $\varnothing 10\text{mm} \times 60\text{mm}$ length. Access is gained by removing the two base covers as shown. Bench models must be secured to a substantial work bench.



1.5 ELECTRICAL DETAILS

Ensure that the mains electrical supply complies with the supply voltage indicated on the serial number plate and connect the machine to the electrical supply. A neutral connection is not required on three phase units. A qualified electrician **MUST** always carry this out and earth connections must be provided.

THREE PHASE UNITS – should be connected to a fused isolator, 3 phase electrical supply of **400v, 50Hz, 16amp**, extractor based machine or **13/16amp** for pedestal and bench mounted machine. Check that the terminal panel connections correspond to the mains supply. Once the machine has been connected, press the **START** button and check the direction of the abrasive belt is rotating towards you as you face the machine. If not, isolate the machine and switch two phases round. If the machine fails to start check and release all emergency stop buttons including the kick stop on pedestal mounted machines.

SINGLE PHASE UNITS – The machine is supplied with a suitable plug, but can be hard wired to a fused **16amp** or **13amp** electrical supply if required.

MODEL	BELT SPEED (m/s)	Kw	ELECTRICS	FLC amps	FUSE RATE amps
AN150V3COB	6.5	2.05	400/3/50	5.7	16
AN150V3B – HEAD ONLY	6.5	1.5	400/3/50	3.8	16
COB-A-2003 DE UNIT ONLY	-	0.55	400/3/50	1.9	6/10
AN150V1COB	6.5	1.3	230/1/50	11.8	13/16
AN150V1B – HEAD ONLY	6.5	0.75	230/1/50	7.0	13/16
COB-A-2001 DE UNIT ONLY	-	0.55	230/1/50	4.8	13/16
AN150V3P & AN150V3B	6.5	1.5	400/3/50	3.8	16
AN150V1P & AN150V1B	6.5	0.75	230/1/50	7.0	13/16

2.1 SAFETY FEATURES

These abrasive flat finishing machines are supplied in accordance with the European Machinery Directive 2006/42/EC and subsequent amendments.

2.2 STANDARD SAFETY FEATURES

- Remote push button control for stop, start and E/stop functions.
- 110 volt control circuit to prevent operator exposure to potentially dangerous high voltage.
- No volt release contactors and overloads stop the machine in event of a power failure, motor overload or E/stop condition. In either of these cases a reset/restart will be required.
- To reduce the likelihood of injury/ accident, a comprehensive guarding system has been fitted to minimise the exposure to the belt and other moving parts.
- A motor cover prevents contact with hot surfaces, rotating parts and provides the housing for the electrical controls.
- On dust extractor models a Knee stop bar can be used instead of the conventional E/stop, when both hands are gripping the work piece.
- A $\varnothing 76\text{mm}$ dust extraction spigot for connection to integral or centralised dust extraction systems.



2.3 PEDESTAL MODELS

- Foot Stop Switch

2.4 DUST EXTRACTION MOUNTED MODELS

- An integral dry Dust Extraction System “designed to meet the requirements of COSHH & PUWER”. The dust extractor includes the following safety features:
 1. Fire retardant Terylene needle felt dust bag.
 2. Safety mesh between the filter and the high pressure backward centrifugal fan.
- A knee stop bar which is the full width of the machine and suitably marked. Activation of this bar will disable the electrical feed to all moving parts of the machine. The machine cannot be re-started until the control circuit is re-energised via the start button.
- An illuminated lamp located at the front of the extraction unit, is provided to indicate when the extractor’s efficiency is reduced/impaired.



2.5 VIBRATION

Hand Arm Vibration is a consideration with all off-hand operations. Idling vibration generated is generally less than the 2.5m/s^2 (A8 target limit), though levels in excess of this may be experienced by the operator.

Depending on the nature of the operation, process, consumable combination and load applied by the operator, accelerations in the $3\text{-}5\text{m/s}^2$ range are possible. In such cases exposure times may need to be reduced to meet the A8 (2.5m/s^2) target typically 5.5 hours for a level of 3m/s^2 and 2 hours for a level of 5m/s^2 maximum. However, due to the nature of these machines exposure times tend to be limited and so it is likely that the A8 target can be achieved in most cases.

In production environments, these values can only be determined by assessment in operation by using hand arm monitoring equipment. The regular checking of mops, wheels etc., is highly recommended to prevent abnormal vibrations being experienced.

2.6 NOISE EMISSIONS

Under normal operating conditions the noise level is below 80dbA and ear protection is not mandatory. However, depending on the abrasive belt being used (grit size, backing material and joint configuration etc.,) the noise level can rise and in some circumstances rise above the 80dbA threshold, in which case ear defenders are **MANDATORY**.

2.7 MANDATORY PPE



SAFETY GLASSES
ARE MANDATORY



DUST MASKS
MUST BE WORN



EAR DEFENDERS
MUST BE WORN

2.8 SAFE WORKING PRACTICES

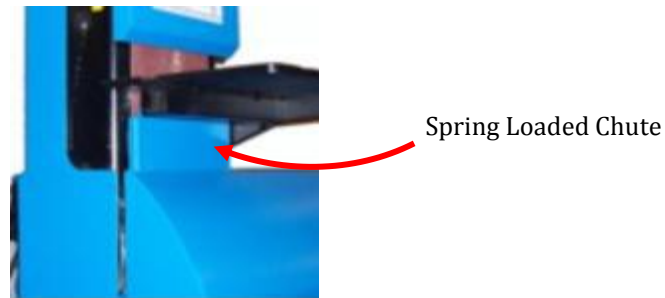
- Antelope and Deer machines have been designed and manufactured to provide many years of reliable service as a Bandfacer. Misuse of the machine may lead to personal injury.
- Persons operating these machines should be thoroughly familiar with the properties and hazards attached to both the machine and any work piece material.
- Rules regarding the wearing of protective clothing should be enforced.
- Don't wear a tie, jewellery or loose clothing whilst operating the machine and ensure long hair is tied back preventing entanglement.
- Adequate machine guarding is provided and should be used at **ALL** times.
- Recommendations regarding the correct belt for a particular application may be obtained by contacting the relevant supplier or from any member of the Coated Abrasives Manufacturers Association.
- Inhalation of dust particles **MUST** be avoided. Suitable dust extraction systems should be provided on all dry grinding operations, as to ensure that the atmospheric dust does not exceed the levels recommended by the Health & Safety Executive. The standard of dust extraction must take into account the volume and toxic nature.
- If necessary provide suitable protection against inhalation of airborne particles produced by the belt grinding process.

2.8 SAFE WORKING PRACTICES CONT...

DO'S	DONT'S
✓ Always wear suitable eye protection	✗ Operate machine without extraction
✓ Always wear good quality gloves	✗ Use machine without guards
✓ Clean the machine regularly especially when polishing different types of materials	✗ Enter the electrical control panel unless qualified and the electrical supply is isolated
✓ Monitor the vibration levels of the machine and operators	✗ Force sharp knife like objects into belt face this may result in breakage/tearing
✓ Rotate extractor knob and empty tray when indicator is illuminated	✗ Manually lift machine off wooden pallet

3.1 MACHINE OPERATION

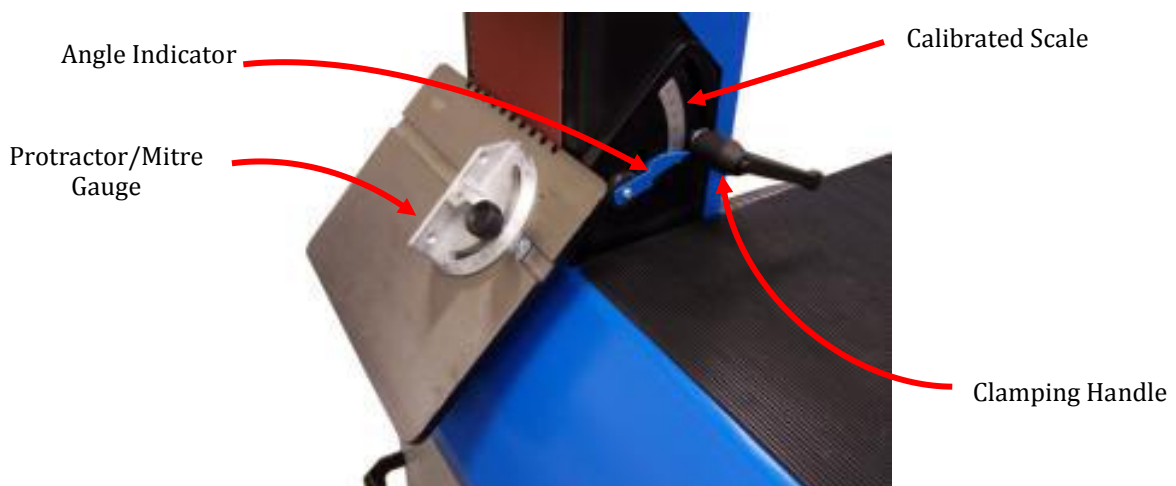
- Ensure that all operators have been instructed in the use of **ALL** machine controls.
- If the machine is mounted on, connected to a dust extraction system it should be used in accordance with dust extraction rules and regulations.
- **DON'T** machine different materials without firstly cleaning out the dust extractor and changing the material warning label located on the machine front.
- Before starting the machine, ensure the spring loaded chute is in contact with tilt table as shown.



- Start the machine by pressing the **START** button. Models with integrated dust unit will be initiated at the same time.
- To stop the machine, press the **STOP**, KNEE STOP BAR or FOOT STOP SWITCH (depending on the machine model). To restart the machine, release the **STOP** button by twisting it anti-clockwise, and then press **START**.
- **DON'T** commence work until the machine has reached full operating speed.
- **DON'T** stop the machine by exerting excessive pressure to the abrasive belt.
- On machines with integral dust extraction, agitate the shaker daily to facilitate collected dust dropping into the lower tray thus maintaining effective extraction. For further details see section 4.3.

3.2 TILT TABLE

To adjust the table angle the following procedure should be followed:



- Stop the machine and ensure that the stop button is latched to prevent the machine from starting.
- Hold the table in your left hand and loosen the clamping handle until it becomes free. Using both hands grip the table and lower to the desired angle using the calibration mark and angle indicator.
- Adjustment between the table and the abrasive belt will not be required, as this gap remains constant. Re-tighten the clamping handle.

3.3 PROTRACTOR

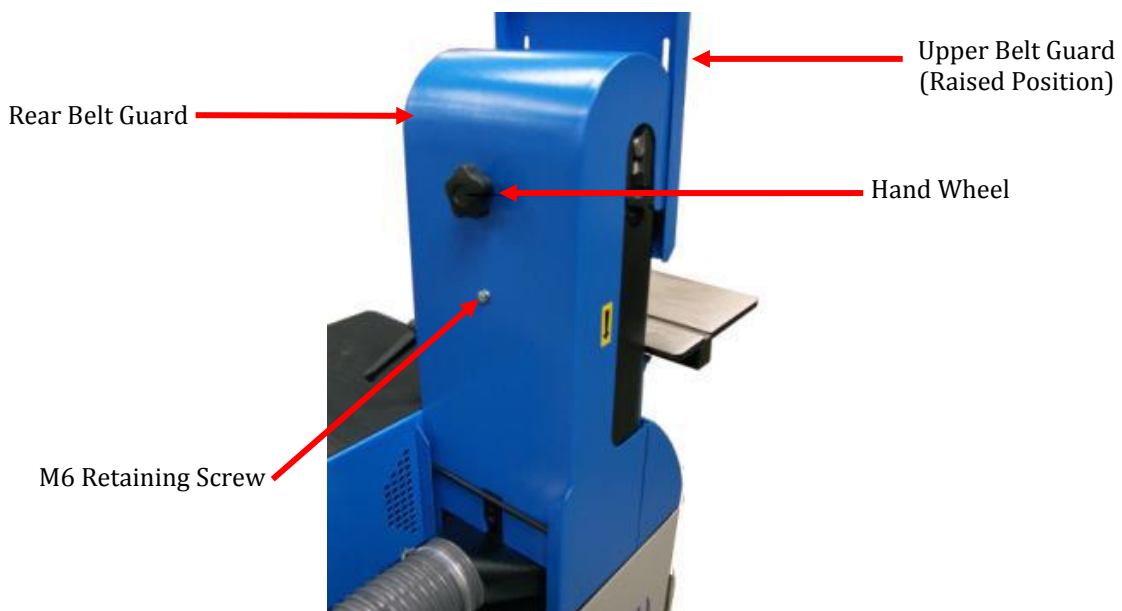
The protractor can be used to create various angles, for example a chamfer. This can be achieved by adjusting the protractor to the desired angle, and sliding the work piece against it. Then, using the protractor to maintain this angle, the material can be machined to create the chamfer.

3.4 ABRASIVE BELT CHANGE & TENSIONING

When new the belt will cut freely and only modest pressure on the work piece will be needed for significant stock removal. As the belt wears, increased pressure will be required to produce the same removal rate. Excessive force can result in damage to the platen. The continued use of a worn or heavy lap-jointed abrasive belt **MUST** be avoided at all times.

To change the belt it is recommended that the following procedure be adopted.

- Standard belt configuration for both Antelope & Deer units is 150mm x 1090mm.
- Stop the machine and isolate/disconnect from the mains electrical supply.
- To remove the rear belt guard, first release the two securing knobs which secure the upper belt guard in position. Lift the guard to its highest position before re-tightening.
- Remove the M6 retaining screw found at the rear of the belt guard.



- To gain access to the abrasive belt, the rear belt guard has been designed to hinge backwards. Using the hand wheel to raise the guard until the tee bar is fully engaged in the slot before hinging backwards (Fig 1). Bench models have been designed so that the guard can be completely removed.
- To avoid damage to the guard it is important that a vertical force is applied and contact with the tee bar is maintained at all times.
- To remove the belt tension as viewed from the machine front. Locate the left hand jacking screw adjuster and loosen the knurled thumb wheel by means of a 4mm allen key as shown in Fig 2.
- Once free rotate the knurled thumb wheel three complete rotations anti-clockwise, this should lower the top roller. If difficulty is encountered rotating the thumb wheel, additional leverage can be gained by engaging the 4mm allen key into the holes provided.
- The abrasive belt can now be removed from the left hand side of the machine (Fig 3). In the unlikely event that this is difficult, lower the right hand side adjuster by one complete turn as previously described.
- Refit the new belt over the top and bottom roller, taking care to observe any directional arrows marked on the inside of the belt.
- Ensure that the belt is centrally aligned over the top and bottom rollers.
- Tension to the abrasive belt is applied via the tracking adjuster screws. Rotating the two knurled thumb wheels simultaneously until the required tension is achieved (Fig 4).
- Re-assemble the belt guard ensuring to keep the tee bar in contact with the bottom of the slots. Secure in position using M6 screw.

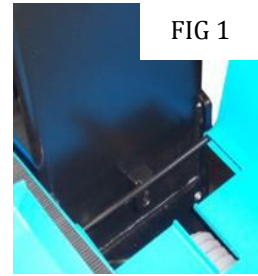


FIG 1



FIG 2



FIG 3



FIG 4



CAUTION DO NOT OVER TENSION

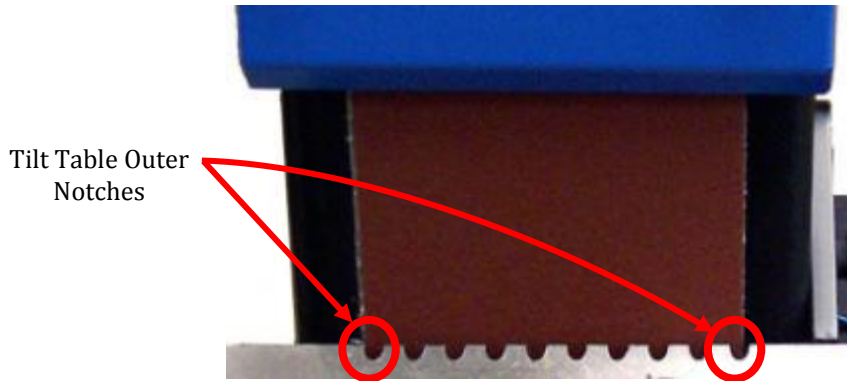


3.5 ABRASIVE BELT TRACKING

Tracking is achieved by using the knurled thumb wheels as depicted in Fig 4. To maintain the position of these knurled thumb wheels, two retaining socket set screws restrict involuntary movement.

To track the belt, release the two setscrews on either side of the machine. Press **START** followed immediately by the **STOP** button. Whilst the belt is slowing down, carefully

adjust the tracking screw until the belt runs centrally between the outer notches on the tilt table. If the belt shows a tendency to move towards the left, additional tension should be applied to the left hand tracking screw, this will affect a belt movement to the right and vice versa.



Once the belt is running centrally, re-tighten the setscrews to maintain the belt position. Re-adjust the upper belt guard exposing minimum belt for the required working conditions.

4.1 GENERAL

- Machines in this family are relatively simple and need little attention by way of maintenance.
- **DON'T** make any adjustments while the machine is running. Isolate/disconnect the machine prior to carrying out any maintenance procedures which **MUST** be carried out by qualified personnel.
- The machine is fitted with sealed for life bearings and will therefore require no further lubrication.
- Check the machine after each use for damage or broken parts and repair/replace parts immediately.
- Clean out accumulated dust daily.

4.2 ELECTRICAL

- Electrical control circuits must be checked by authorised personnel only.
- The electrical control panel can be accessed via the rear of the machine. Remove the four Phillips pan head screws and raise the cover to expose the controls.

4.3 DUST EXTRACTION – INTEGRAL UNITS ONLY

As the filter becomes clogged, it improves as a filter but the increased resistance results in a drop in the carrying velocity and consequently the effectiveness. The extractor unit is provided with a shaker knob which when agitated causes the cleaning ring to make contact with the Terylene filter and dislodge much of the dust. The freed dust falls into the collection tray situated below and can now be easily removed.

The collection tray **MUST** be emptied regularly and it is recommended that this happens at least once a fortnight or sooner if the duty cycle dictates.

Most units are currently fitted with a warning lamp which indicates when the filter is in need of attention. If the indicator lamp is illuminated then **DO NOT USE** the machine until the reason has been investigated and rectified. The cause is likely to be a heavily soiled filter which is usually resolved by agitating the shaker handle and emptying the collection tray.

Empty the collection tray outside the working environment into a suitable container and dispose in accordance with all associated regulations. Care should be exercised to avoid inhaling or dispersing the dust into the atmosphere. Replace the dust collection tray ensuring that it is seated properly and restart the machine.

4.4 RECOMMENDED SCHEDULE

In order to maintain effectiveness and control the hazard to design levels, it's important that the unit performance is monitored and recorded. The suggested scheme and log (Appendix 5) should help in this regard. We would recommend four levels ranging from daily operator checks to the thorough examination completed by a competent person as follows:

A-DAILY OPERATOR CHECKS

1. That the extractor is drawing air through successfully, test by holding a piece of paper firmly in front of the inlet duct to see if it is drawn towards the unit.
2. That the indicator light is **NOT** illuminated.
3. That the capture hood is properly positioned.
4. The collection tray doesn't need emptying.

Call the supervisor if attention is required otherwise take appropriate remedial action and sign log.

B-WEEKLY SUPERVISOR CHECKS

1. That the extractor is drawing effectively.
2. That the indicator light is **NOT** illuminated.
3. The capture hood is properly positioned.
4. The collection tray doesn't need emptying and is seated properly.
5. There are no partial blockages in the capture hood.
6. All ducting is securely connected and intact.
7. No visible emissions from the exhaust outlet.

Call maintenance if attention is required otherwise take appropriate remedial action and sign log.

C-QUARTERLY MAINTENANCE CHECKS

1. The extractor is working effectively by means of a smoke test.
2. Capture hood is positioned properly.
3. Collection tray doesn't need emptying.
4. There are no blockages in the capture hood.
5. Remove the inlet ducting from the extractor and check for blockages. Clean and remove as necessary, replace and secure duct.
6. Ensure all ducting is securely connected and serviceable.
7. Remove front panel and inspect filter bag. If it is damaged or 2 years old replace with new. If dust is present on the outside of the bag then either a hole(s) are present or it has come adrift from the band clamp ring at the bottom.
8. Check the integrity of the unit i.e. for penetrative corrosion or leaking seals.

Take appropriate remedial action as required and sign/complete log.

D-ANNUAL THOROUGH EXAMINATION FOR COSHH

This must be conducted by a competent person as defined by the HSE. This will often be a suitably qualified and experienced contractor who will conduct a detailed assessment of the unit and its effectiveness at controlling the hazard. This will involve taking

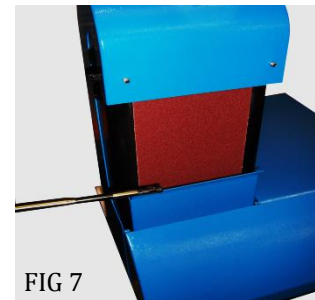
appropriate airflow measurements and producing a detailed report of the findings and any identified corrective actions.

We would anticipate that airflow readings would be in line with the following table.

STATIC FAN PRESSURE (hpa)	DUCT VELOCITY (m/s)	AVERAGE FACE VELOCITY (m/s)
16.5 (± 1)	>20.0	>1.0

Where:

1. Static fan pressure is measured with a digital manometer at the test point provided on the front of the machine as shown in Fig 5.
2. Duct velocity is measured using a digital anemometer with a $\varnothing 45$ mm fan. Remove duct from guard spigot as shown in Fig 6.
3. Guard face velocity is assessed by averaging a matrix of readings, taken using a hot wire anemometer as shown in Fig 7.



4.5 DUST BAG REPLACEMENT

The extractor bag should be examined periodically, and if found to be heavily soiled or torn it must be replaced. Alternatively it is recommended that the extractor bag is replaced every two years. An illustrated process is shown below.

Tools required: 1 x Pozidrive screwdriver and 1 x Pliers



1. Remove front cover



2. Remove split pin



3. Remove shaker



4. Remove shaker frame from rear support



5. Remove rear retaining clip



6. Remove shaker frame from extractor



7. Remove front retaining clip



8. Remove shaker frame from dust bag



9. Remove shaker frame from extractor



10. Release snap over retaining clip



11. Remove retaining clip from extractor



12. Remove dust bag

DUST BAG PREPARATION BEFORE RE-FIT



1. Fully extend new dust bag



2. Fold dust bag inwards



3. Ensure textile hanger & retaining clip are inline



4. Fit dust bag over bottom seal



5. Reassemble shaker frame & orientate textile hanger front to back of extractor

ASSEMBLY OF THE DUST BAG INTO THE EXTRACTOR IS A REVERSAL OF THIS PROCEDURE

4.6 ABRASIVE BELTS

- It is recommended that all coated abrasive products be stored at a constant temperature and humidity within 18~22⁰C, 50~60% RH. They should be kept away from damp or cold walls, windows and floors to avoid moisture absorption. Equally, storage close to a heat source should be avoided.
- All abrasive belts should be retained in their original packing prior to use.
- Abrasive rolls should be stored on their side in a single layer (not stacked) to avoid edge damage and to prevent distortion of the centre hole.
- Belts should be checked prior to use for tears/holes. This is particularly important in the case of partly used belts or belts that have been left on a machine for any length of time.
- Care should be taken to ensure lap jointed belts are run in the correct direction as indicated.
- Belts should **NOT** be torn or cut down to a narrower size as this may impair the joint and render them unsafe for use.
- Whilst starting, adjusting or running the belt should be adequately guarded.
- **NO** attempt should be made to remove a belt before the machine is stationary.
- Belt support devices e.g. platens, idler pulleys etc., should be kept in good condition and **NO** attempt should be made to run a belt on a damaged or faulty device.
- Belts other than those specifically designed for wet grinding should be used dry or with a recommended non-water lubricant.

5.1 RISK ASSESSMENT

Antelope and Deer machines have been developed from machines which RJH Finishing Systems have supplied into the market place for many years and have an excellent safety pedigree. However, like all machines of this type they can be dangerous if used carelessly or incorrectly.

It is therefore essential that all **HAZARDS** are identified and **SAFE WORKING PRACTICES** are adhered to. What follows is an assessment of the **RISKS**.

5.2 HAZARDS

FIRE & EXPLOSION generally the risk is considered to be low except in certain circumstances. It is important that the risk of fire and explosion is assessed in each particular situation. There is a potential source of ignition in the spark stream that is generated during the stock removal process. Filter bags used within dry collectors have been known to catch fire after prolonged heavy use and the risk is increased when working with certain materials notably aluminium, magnesium and titanium. Special regulations exist for these materials and expert advice should be sought.

TO BE ASSESSED

LIMB ABRASION probably the most common hazard since the process of manual grinding involves contact with the abrasive belt, which can lead to skin abrasion. Belt guarding is included to reduce the likelihood of contact with the belt. Good quality gloves (Chrome or Leather) are strongly recommended.

LOW-MEDIUM RISK

ENTANGLEMENT potentially the most serious risk since the front of the abrasive belt is exposed, but provided the guards are used **CORRECTLY** the risk is considered to be low.

LOW RISK

BURNING as with all heavy stock removal processes, considerable heat can be generated in the work piece and burning of the skin can result if handled carelessly. Good quality gloves (Chrome or Leather) are strongly recommended along with a quenching aid such as water etc...

LOW RISK

ELECTROCUTION all electrically powered appliances have the potential to kill. Even though the machine has simple electrical controls with isolation, overloads, emergency stops, no volt release and low volt safety circuit there remains a danger. Only qualified personnel **MUST** access the control panel.

LOW RISK

EYE DAMAGE as with any off hand process there is the possibility of dust/debris entering the eye(s). The wearing of safety glasses **IS MANDATORY** and when used with a suitable extraction system will constitute a low risk.

LOW RISK

EJECTION OF PARTS/COMPONENTS is present with all off-hand processes. Avoid applying excessive pressure or pressing sharp objects into the belt as this will increase the risk of ejection and even belt breakage.

LOW RISK

VIBRATION caused by the operation will be transmitted to the operators arm(s) and in extreme cases can lead to Hand Arm Vibration Syndrome. The idling vibration without abrasive belt fitted is generally less than 0.2m/s^2 for single phase machines and less than 0.1m/s^2 for three phase machines. However, the problem is more operation related than simply a function of the machine, consumables and process techniques require evaluation and close monitoring.

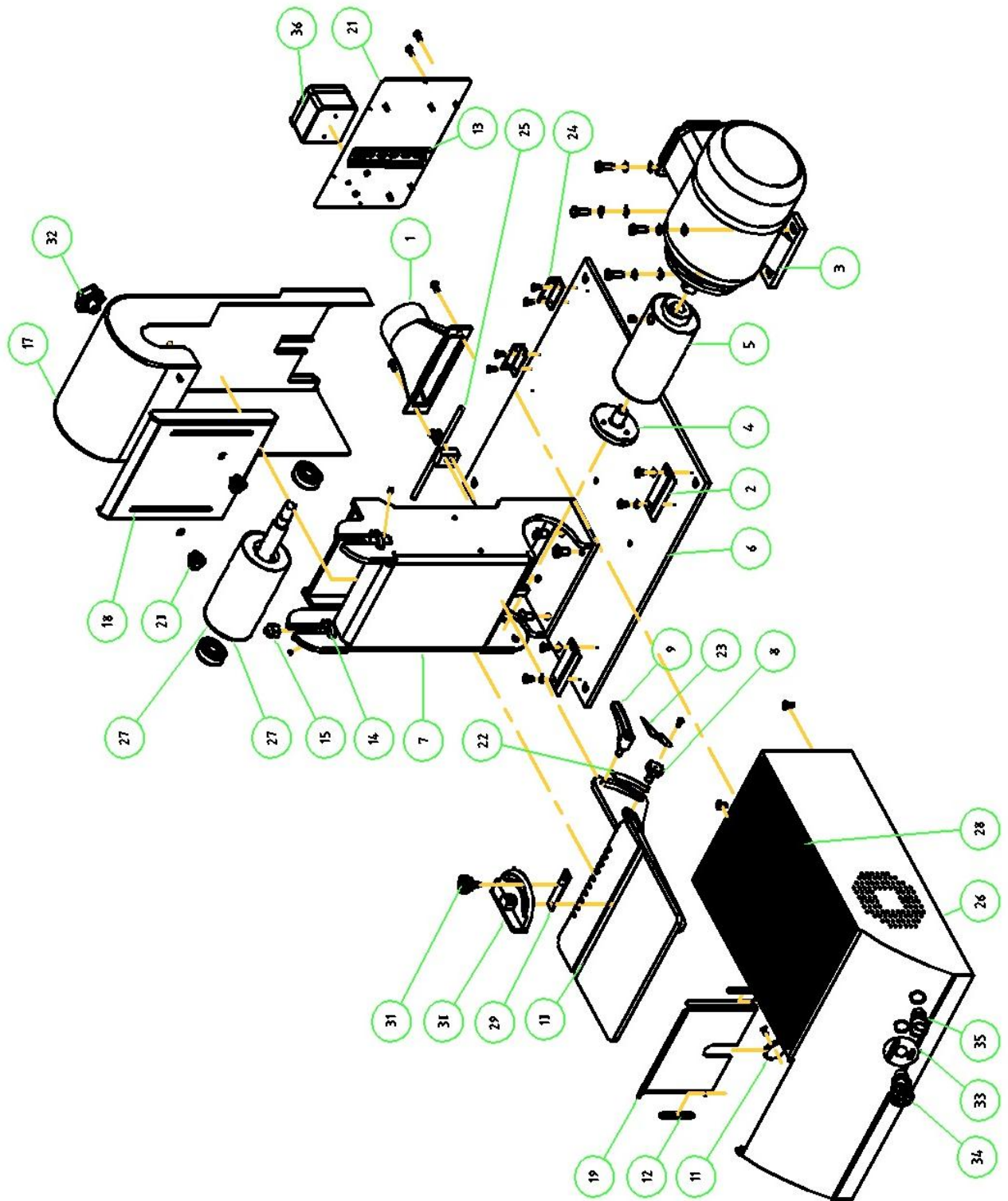
TO BE ASSESSED

NOISE depends on the consumables used during operation. Platen machines such as this will usually be below 80dbA though it is still highly recommended that ear defenders are worn.

LOW-MEDIUM RISK

This type of manual equipment has been available for decades and the various processes, with their associated operating hazards are well known, largely chronicled and manageable. It is our belief that with good operator training and adherence to the safe working practices this family of machines can be considered to have an overall **LOW RISK** for the purposes of the Provision and Use of Work Equipment Regulations (PUWER).

SYMPTOM	CHECK	ACTION
Machine will not start	Mains On Emergency Stop Control Overloads Control Fuses	Switch on Isolator Release 'E' Stop Requires Electrician Requires Electrician
Belt difficult to track	Crown of tracking/tensioning pulley Low belt tension Balance of wheel Belt joint & direction arrows	Re-crown/cover Check belt tensioner & adjust accordingly Use knife edges Remove belt & examine
Poor Extraction	Dust tray Hoses Filter bag Dust extractor motor Control overloads Light Indicator	Actuate shaker handle & empty collection tray Clear blockages Replace if necessary Requires Electrician Requires Electrician See section 4.3
Poor Linishing Performance	Belt selection Belt condition	Replace with more appropriate belt for the job. Seek advice if needed. Replace if necessary

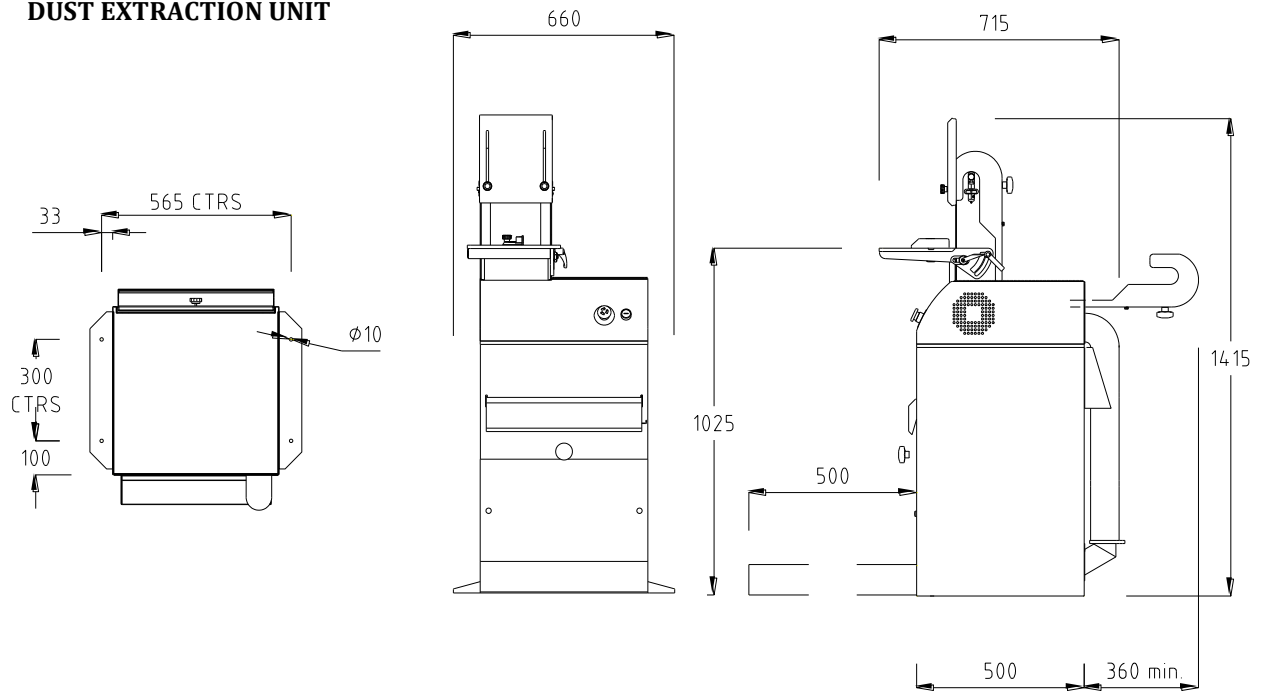


EXPLODED VIEW PARTS LIST

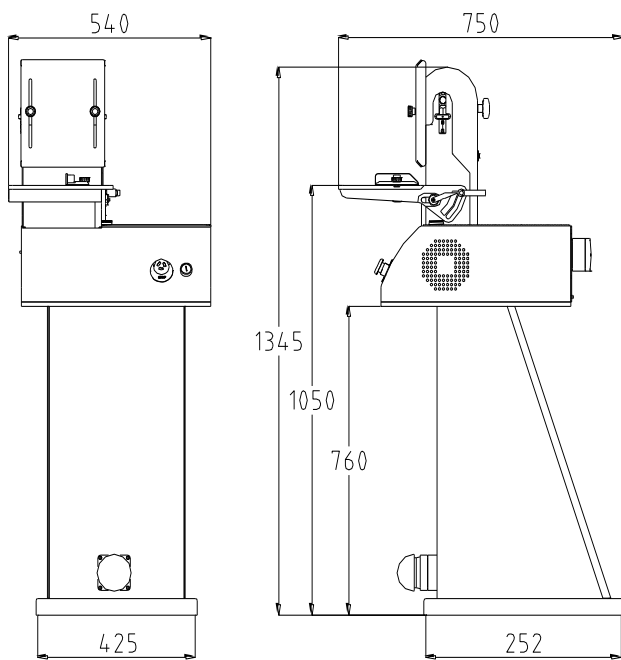
36	JUNCTION BOX 8[X 8] 5[1
35	START P/B	1
34	E/STOP LACTHING P/B	1
33	E/STOP LEGEND	1
32	S LOBE HAND WHEEL	1
31	KNOBS	1
31	PROTRACTOR GUIDE	1
29	PROTRACTOR GUIDE RAIL	1
28	MOTOR HOUSING MAT	1
27	IDLER PULLEY ASSEMBLY	1
26	MOTOR COVER	1
25	T-BAR	1
24	HINGE	2
23	ANGLE INDICATOR	1
22	TEE BAR ROD	1
21	STARTER COVER	1
21	THUMB SCREW	2
19	KHUTE	1
18	UPPER BELT COVER	1
17	UPPER REAR BELT COVER	1
16	WELDED BOSS	2
15	TENSIONER	2
14	THUMB SCREW	2
13	DIN RAIL 151MM	1
12	EXTENTION SPRING	2
11	ROLLER	1
11	TILT TABEL FABRICATION	1
9	CLAMP LEVER M11	1
8	PIVOT SHOULDER SCREW	1
7	WORKHEAD ASSEMBLY	1
6	EXTRACTOR TOP PLATE	1
5	DRIVE WHEEL	1
4	DRIVE SUPPORT SHAFT	1
3	MOTOR	1
2	CATCH PLATE	2
1	EXTRACTION DUCT	1
Item	Description	Qty

PART N°	DESCRIPTION	QTY
AN150V-0030	IDLER ROLLER ASSEMBLY	1
AN150V-0047	DRIVE ROLLER ASSEMBLY	1
7111-220	DRIVE ROLLER BEARING	1
7242-002	E-STOP BUTTON	1
7242-001	START BUTTON	1
P CBMFB	FILTER BAG	1
COB-STRAPASSY	FILTER BAG STRAP ASSEMBLY	1
AN150V-0007	UPPER REAR BELT GUARD	1
AN150V-0009	ADJUSTABLE UPPER FRONT BELT GUARD	1
N 100257	BELT GUARD KNOB	1
AN150V-0022	TABLE SHOULDER SCREW	1
AN150V-0013	TILT TABLE ASSEMBLY	1
L FIG110	PROTRACTOR GUIDE	1
7653-204	TILT TABLE CLAMP HANDLE	1
F 100160	3 PHASE MOTOR	1
F 100371	1 PHASE MOTOR	1
AN2-E-0001	CONTACTOR OVERLOAD ASSEMBLY – 3 PHASE ANTELOPE	1
AN2-E-0002	CONTACTOR OVERLOAD ASSEMBLY – 1 PHASE ANTELOPE	1
AN2-E-0003	CONTACTOR OVERLOAD ASSEMBLY – 3 PHASE DEER	1
AN2-E-0004	CONTACTOR OVERLOAD ASSEMBLY – 1 PHASE DEER	1

DUST EXTRACTION UNIT



PEDESTAL MOUNTED UNIT



BENCH MOUNTED UNIT

