HAFCO METALMASTER

Edition : 1.0
Date: (08/24)

Instruction Manual

MANUAL PANBRAKE
PB-4

Order Code: (S250)

MACHINE DETAILS

MACHINE	PANBRAKE
MODEL NO.	PB-4
SERIAL NO.	
DATE OF MANF.	

IMPORTED BY

AUSTRALIA

HARE&FORBES MACHINERYHOUSE

www.machineryhouse.com.au

NEW ZEALAND

MACHINERYHOUSE

www.machineryhouse.co.nz

NOTE:
This manual is for your reference. At the time of the compiling of this manual every effort to be exact with the instructions, specifications, drawings, and photographs of the machine was taken. Owing to the continuous improvement of the HAFCO METALMASTER machine, changes may be made at any time without obligation or notice. Please ensure the local voltage is the same as listed on the specification plate before operating any electric machine.

SAFETY SYMBOLS

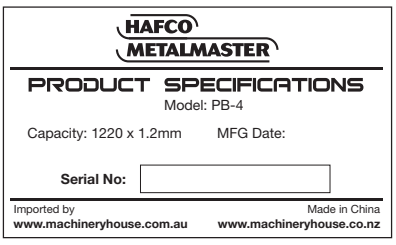
The purpose of safety symbols is to attract your attention to possible hazardous conditions

⚠ **WARNING** ***Indicates a potentially hazardous situation causing injury or death***

⚠ **CAUTION** ***Indicates an alert against unsafe practices.***

Note: ***Used to alert the user to useful information***

NOTE:
In order to see the type and model of the machine, please see the specification plate. Usually found on the back of the machine. See example (Fig.1)


HAFCO METALMASTER

PRODUCT SPECIFICATIONS

Model: PB-4

Capacity: 1220 x 1.2mm MFG Date:

Serial No:

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Made in China www.machineryhouse.co.nz

FIG.1

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1.1 SPECIFICATION

Order Code	S250
MODEL	**PB-4**
(mm) Useful Length	1220
(mm) Capacity - Mild Steel	1.2
(degree) Bending Limitations	0 - 135
(mm) Maximum Reverse Bend	11
(mm) Maximum Side for Pan or Box	60
(No / Yes) Includes Stand	Yes
(cm) Dimensions Width x Depth x Height	163 x 48 x 68
(kg) Nett Weigh	175

WARNING

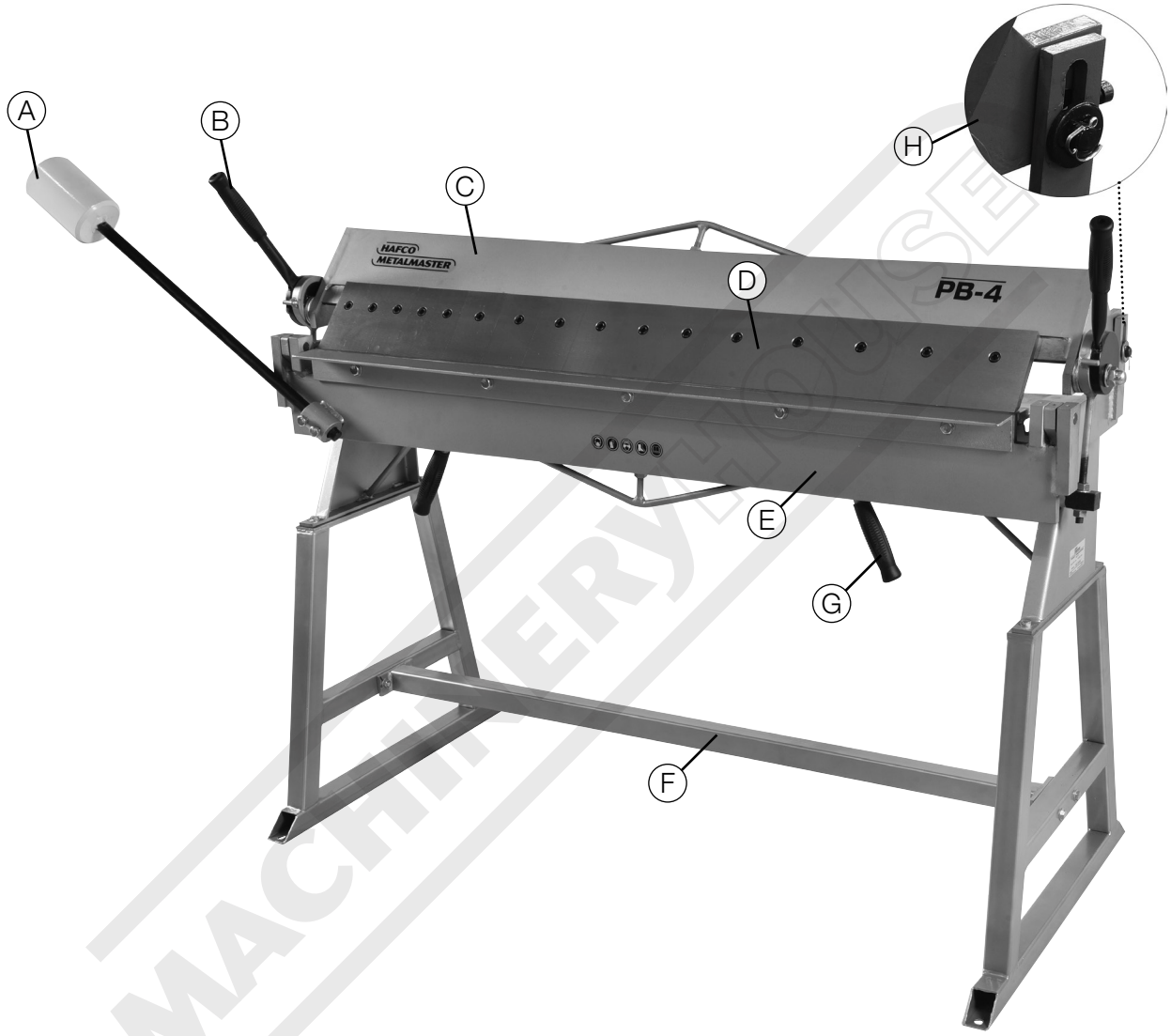
Always check the capacity of the machine. Exceeding the capacity of the machine may result in sudden breakage that ejects dangerous metal debris at the operator or bystanders

1.2 PACKING LIST

1 x Machine
1 x Stand
1 X Manual
1 x Counter weight
1 x Hexagon spanner M4.
1 x Two-head spanner 17× 19mm.

1.3 IDENTIFICATION

Become familiar with the names and locations of the controls and features shown below to better understand the instructions when mentioned later in this manual.



	Description		Description
A	Counter Weight	E	Bending Leaf
B	Clamp Handle	F	Stand
C	Clamping Leaf	G	Bending Handles
D	Clamping Fingers	H	Set Back Screws

2.1 GENERAL METAL WORKING MACHINE SAFETY

DO NOT use this machine unless you have read this manual or have been instructed in the safe use and operation of this machine.

WARNING

This manual provides safety instructions on the proper setup, operation, maintenance, and service of this machine. Save this manual, refer to it often, and use it to instruct other operators.
Failure to read, understand and follow the instructions in this manual may result in fire or serious personal injury—including amputation, electrocution, or death.

The owner of this machine is solely responsible for its safe use. This responsibility includes, but is not limited to proper installation in a safe environment, personnel training and authorization to use, proper inspection and maintenance, manual availability and comprehension of the application of the safety devices, integrity, and the use of personal protective equipment.

The manufacturer will not be held liable for injury or property damage from negligence, improper training, machine modifications or misuse.

- ✓ Always wear safety glasses or goggles.
- ✓ Wear appropriate safety footwear.
- ✓ Wear respiratory protection where required.
- ✓ Gloves should never be worn while operating the machine, and only worn when handling the work-piece.
- ✓ Wear hearing protection in areas > 85 dBA. If you have trouble hearing someone speak from one metre (three feet) away, the noise level from the machine may be hazardous.
- ✓ DISCONNECT THE MACHINE FROM POWER when making adjustments or servicing.
- ✓ Check and adjust all safety devices before each job.
- ✓ Ensure that guards are in position and in good working condition before operating.
- ✓ Ensure that all stationary equipment is anchored securely to the floor.
- ✓ Ensure all machines have a start/stop button within easy reach of the operator.
- ✓ Each machine should have only one operator at a time. However, everyone should know how to stop the machine in an emergency.

2.1 GENERAL METALWORKING MACHINE SAFETY Cont.

- ✓ Ensure that keys and adjusting wrenches have been removed from the machine before turning on the power. Appropriate storage for tooling should be provided.
- ✓ Ensure that all cutting tools and blades are clean and sharp. They should be able to cut freely without being forced.
- ✓ Stop the machine before measuring, cleaning or making any adjustments.
- ✓ Wait until the machine has stopped running to clear cuttings with a vacuum, brush or rake.
- ✓ Keep hands away from the cutting head and all moving parts.
- ✓ Avoid awkward operations and hand positions. A sudden slip could cause the hand to move into the cutting tool or blade.
- ✓ Return all portable tooling to their proper storage place after use.
- ✓ Clean all tools after use.
- ✓ Keep work area clean. Floors should be level and have a non-slip surface.
- ✓ Use good lighting so that the work piece, cutting blades, and machine controls can be seen clearly. Position any shade lighting sources so that they do not cause any glare or reflections.
- ✓ Ensure there is enough room around the machine to do the job safely.
- ✓ Obtain first aid immediately for all injuries.
- ✓ Understand that the health and fire hazards can vary from material to material. Make sure all appropriate precautions are taken.
- ✓ Clean machines and the surrounding area when the operation is finished.
- ✓ Use proper lock out procedures when servicing or cleaning the machines or power tools.

DO NOT!

- × Do not distract an operator. This can lead to injuries and should be strictly prohibited.
- × Do not wear loose clothing, gloves, neckties, rings, bracelets or other jewellery that can become entangled in moving parts. Confine long hair.
- × Do not handle cuttings by hand because they are very sharp. Do not free a stalled cutter without turning the power off first. Do not clean hands with cutting fluids.
- × Do not use rags or wear gloves near moving parts of machines.
- × Do not use compressed air to blow debris from machines or to clean dirt from clothes.
- × Do not force the machine. It will do the job safer and better at the rate for which it was designed.

WARNING.

Before operating any machine, take time to read and understand all safety signs and symbols. If not understood seek explanation from your supervisor.

2.1 GENERAL METALWORKING MACHINE SAFETY Cont.

HAZARDS ASSOCIATED WITH MACHINES include, but are not limited to:

- Being struck by ejected parts of the machinery
- Being struck by material ejected from the machinery
- Contact or entanglement with the machinery
- Contact or entanglement with any material in motion

HEALTH HAZARDS (other than physical injury caused by moving parts)

- Chemicals hazards that can irritate, burn, or pass through the skin
- Airborne items that can be inhaled, such as oil mist, metal fumes, solvents, and dust
- Heat, noise, and vibration
- Ionizing or non-ionizing radiation (X-ray, lasers, etc.)
- Biological contamination and waste
- Soft tissue injuries (for example, to the hands, arms, shoulders, back, or neck) resulting from repetitive motion, awkward posture, extended lifting, and pressure grip.

OTHER HAZARDS

- Slips and falls from and around machinery during maintenance
- Unstable equipment that is not secured against falling over
- Safe access to/from machines (access, egress)
- Fire or explosion
- Pressure injection injuries from the release of fluids and gases under high pressure
- Electrical Hazards, such as electrocution from faulty or ungrounded electrical components
- Environment in which the machine is used (in a machine shop, or in a work site)

WARNING!

Machines are safeguarded to protect the operator from injury or death with the placement of guards. Machines must not be operated with the guards removed or damaged.

2.2 SAFETY SPECIFIC TO PANBRAKES

DO NOT use this machine unless you have been instructed in its safe use and operation or have read and understood this manual.

PERSONAL PROTECTIVE EQUIPMENT


Safety glasses must be worn at all times in work areas


Long and loose hair must be contained.


Gloves must not be worn when using this machine.


Sturdy footwear must be worn at all times in work areas.


Close fitting/protective clothing must be worn


Rings and jewellery must not be worn.

PRE-OPERATIONAL SAFETY CHECKS

- ✓ Locate and ensure you are familiar with all machine operations and controls.
- ✓ Ensure all guards are fitted, secure and functional. Do not operate if guards are missing or faulty.
- ✓ Ensure working parts are well lubricated and the jaws and fingers free of rust and dirt.
- ✓ Check workspaces and walkways to ensure no slip/trip hazards are present
- ✓ Be aware of other people in the area. Ensure the area is clear before using equipment.

OPERATIONAL SAFETY CHECKS

- ✓ Remove the pan brake fingers that are in the way. Use only the pan brake fingers required to make the bend.
- ✓ Ensure the pan brake fingers that are not removed for an operation are securely seated and firmly tightened before the machine is used.
- ✓ Ensure your fingers and limbs are clear before operating the pan brake.
- ✓ Lower finger clamps to work. Do not drop.
- ✓ Check workpiece is secure.
- ✓ Keep clear of moving counterweight (where fitted).

ENDING OPERATIONS AND CLEANING UP

- ✓ Lower finger clamps to a safe position.
- ✓ Return all accessories to storage racks.
- ✓ Leave the work area in a safe, clean and tidy state.

DON'T

- × Do not use faulty equipment. Immediately report suspect machinery.
- × Do not use a pan brake for bending metal that is beyond its capacity for thickness, shape or type.
- × Do not attempt to bend rod, wire, strap or spring steel sheets.

POTENTIAL HAZARDS AND INJURIES

- ✓ Sharp edges and burrs.
- ✓ Squash/crush and pinch points.
- ✓ Impact from counterweight.

3 SET-UP

3.1 UNPACKING

This machine was carefully packaged for safe transport. When unpacking, separate all enclosed items from packaging materials and inspect them for shipping damage. If items are damaged, please contact your distributor.

NOTE: Save all the packaging materials until you are completely satisfied with the machine and have resolved any issues with the distributor, or the shipping agent.

When unpacking, check the packing list to make sure that all parts shown are included. If any parts are missing or broken, please contact your distributor.

3.2 CLEAN - UP

The unpainted surfaces of the machine have been coated with a waxy oil to protect them from corrosion during shipment. Remove the protective coating with a solvent cleaner or a citrus based degreaser.
Optimum performance from your machine will be achieved when you clean all moving parts or sliding contact surfaces that are coated with rust prevented products.
It is advised to avoid chlorine based solvents, such as acetone or brake parts cleaner, as they will damage painted surfaces and strip metal should they come in contact. Always follow the manufacturer's instructions when using any type of cleaning product.

3.3 SITE PREPARATION

When selecting the site for the machine, consider the largest size of workpiece that will be processed through the machine and provide enough space around the machine for operating the machine safely. Consideration should be given to the installation of auxiliary equipment. Leave enough space around the machine to open or remove doors/covers as required for the maintenance and service as described in this manual. It is recommended that the machine is anchored to the floor to prevent tipping or shifting.
It also reduces vibration that may occur during operation.

3.4 LIFTING INSTRUCTIONS

⚠ WARNING ***This machine is very heavy. Serious personal injury may occur if safe moving methods are not followed. To be safe, you will need assistance from another person when moving the shipping crate and removing the machine from the crate.***

ENVIRONMENT PROTECTION

Recycle unwanted materials instead of disposing of them as waste. All tools, accessories and packaging should be sorted, taken to a recycling centre and disposed of in a manner which is compatible with the environment. When the product becomes completely unserviceable and requires disposal, drain any fluids (if applicable) into approved containers and dispose of the product and fluids according to local regulations.

3.5 ANCHORING TO THE FLOOR

The machine is best mounted on a concrete slab.
Masonry anchors with bolts are the best way to anchor machinery, because the anchors sit flush with the floor surface, making it easy to unbolt and move the machine later, if needed. (Fig. 3.1)

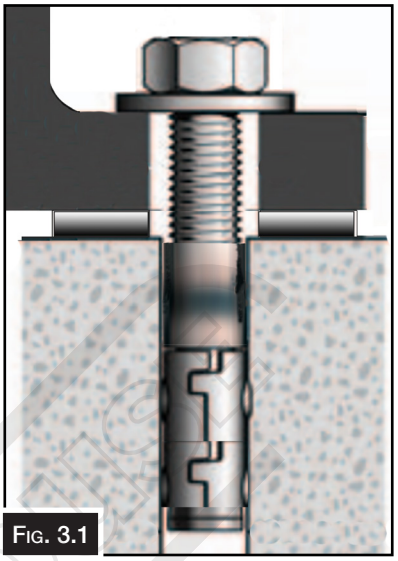


Fig. 3.1

MACHINE MOUNTING OPTIONS

Although it is not required Hafco recommends that you secure your machine to the floor. Masonry anchors with bolts are the best way to anchor machinery, because the anchors sit flush with the floor surface, making it easy to unbolt and move the machine later, if needed. (Fig. 3.3) Other methods of mounting is the use of machine mounts which also help with the levelling of the machine and isolating vibration. (Fig. 3.2)


Fig. 3.2


Fig. 3.3

3.6 ASSEMBLY

The machine must be fully assembled before it can be operated. First clean any parts that are coated in rust preventative to ensure the assembly process can proceed smoothly.

Assembling The Stand:

1. Remove the box cover and carefully lift the main frame with webbed slings off the pallet.

2. Attach the cross support to the two side support legs with bolts and nuts supplied (Fig. 3.4)

3. Using the webbed slings, lift the main body up and while holding it up with the slings attach the stand to the machine.

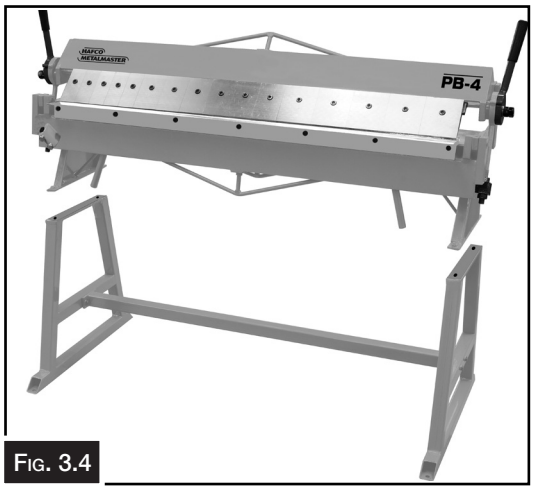


Fig. 3.4

Counter Weight:

1. With the help of another person lift the counter weight up and insert it into the location hole. (Fig. 3.5)

2. Clamp the counter weight wth the two bolts provided in the location hole.

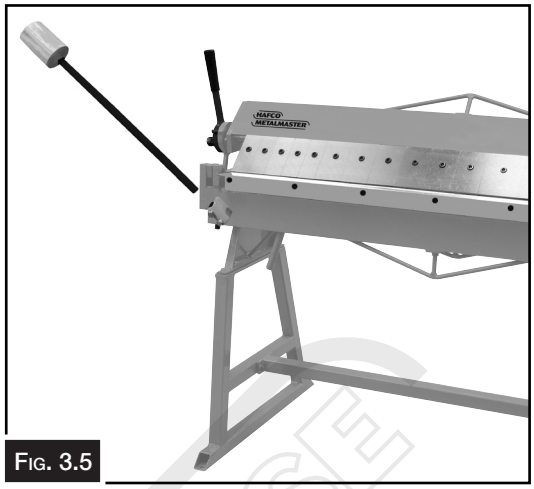


Fig. 3.5

WARNING

Before operating any machine, take time to read and understand all safety signs and symbols. If not understood seek explanation from your supervisor or an experienced operator.

4. OPERATION

4.1 OPERATION OVERVIEW

The purpose of a operation overview is to provide a novice machine operator with a basic understanding of how operate the machine and the proces, so the machine controls and its components if discussed later in this manual will be understood.
This overview, is not intended to be an instructional guide. If specific instructions in the operation is required, then read this entire manual, seek additional training from an experienced operator, and do additional research by looking at websites or reading “how-to” books.

To complete a typical operation:

1. Put on safety glasses, leather boots, and leather gloves.

2. Examine the workpiece to make sure it is suitable for bending.

3. If required for the operation, adjust the clamping finger spacing.
4. Adjust the clamping pressure for the workpiece thickness.

5. Adjust the setback.

6. Properly position the workpiece underneath clamping fingers and lower the clamping leaf to secure workpiece.

7. With body square to brake and using both hands, raise the bending leaf to form the correct bend angle.

WARNING

Injuries can result from using this machine. Always wear safety glasses, leather work boots, and heavy duty leather work gloves when operating this machine or whenever handling sheet metal.

4.2 ALIGNING FINGERS

The bend needs to be even along its entire length, so the clamping fingers must be parallel with the clamping surface and the bending leaf.

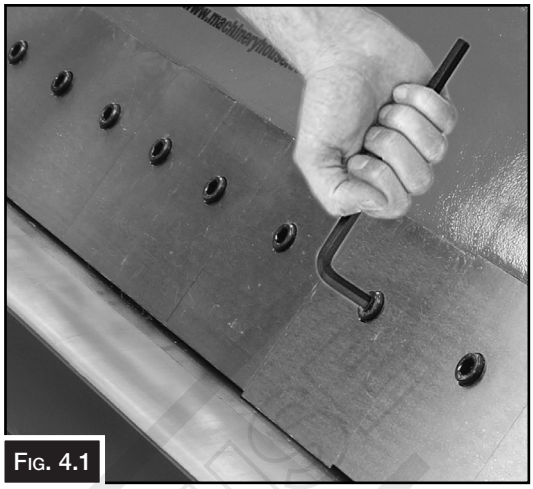


Fig. 4.1

To align the clamping fingers:

1. Lower the clamping leaf until the fingers just touch clamping surface.
2. View the bottom edge of each finger to determine if any are out of alignment.
3. If a finger is misaligned, then loosen the cap screw just enough to move it up or down. (Fig. 4.1)
4. Align finger parallel with clamping surface and bending block, and then tighten cap screw.

4.3 SPACING FINGERS

For folding box sections, the clamping fingers can be spaced apart for clearance. This requires removing one or more of the fingers, so the others can be spaced to match the inside width of the workpiece.

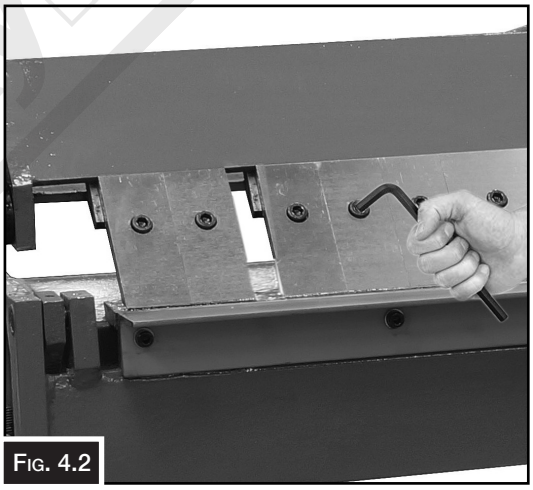


Fig. 4.2

To space the clamping fingers:

1. On the fingers that need to be removed, loosen the cap screw
2. Remove the fingers from the clamping leaf.

Note: A mix and match of the finger widths may be required to appropriately match the inside width of the workpiece

3. Align remaining fingers and tighten cap screws

WARNING

The machine is the sole responsibility of the owner for its safe use. This responsibility includes but is not limited to proper installation in a safe environment, personnel training, proper inspection and maintenance, manual availability and comprehension. The manufacturer will not be held liable for injury or property damage from negligence, improper training, machine modifications or misuse.

4.4 ADJUSTING THE SETBACK

Before begining the bending operation, consideration must be given to the thickness of the material and whether sharp or rounded bends are required.
To achieve this, the setback needs to be set. Setback is the distance from the forward edge of the fingers to the edge of the bending leaf. The setback distance is determined by the thickness of the workpiece material and the desired radius of the bend.
Setback is normally set at 1½ times the thickness of the workpieces under 22 guage, and two times the thickness of workpieces when thicker than 22 gauge.

To adjust setback:

1. Caculate the setback required for the bend.
2. Raise the clamping leaf about 10mm off the clamping surface.
3. Loosen cap screws securing setback wheels. (Fig. 4.4).
4. Insert a hex wrench into the holes on the edges of the cams. Adjust both setback cams until the desired set back is achieved.

Note: Setback wheels are eccentric. Turning them one full turn will bring clamping leaf back to its original position.

5. Lower the clamping fingers onto the clamping surface and check setback distance.
6. If necessary, repeat Steps 2–4 until desired setback is achieved.
7. Check finger alignment (refer to Aligning Fingers on Page 13).

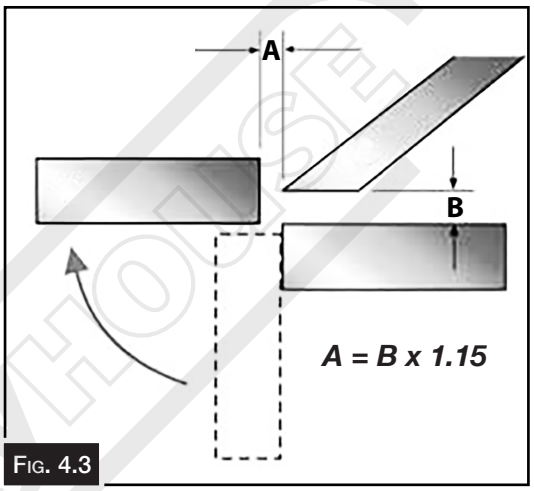


Fig. 4.3

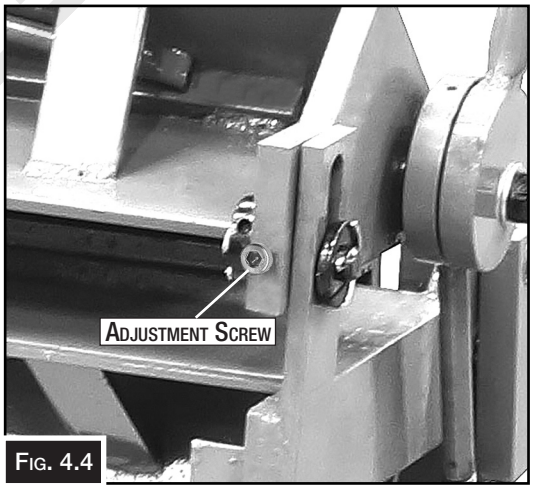


Fig. 4.4

4.5 ADJUSTING CLAMP PRESSURE

Clamping pressure needs to be adjusted for different workpiece thicknesses. The ideal pressure will have a medium resistance at the clamping handles.

To adjust the pressure:

1. Lower the clamping leaf so the fingers just touch the workpiece. If clamping handles are at 10 o'clock, viewed from right end of panbrake, and 2 o'clock viewed from left end of panbrake, the clamping pressure is suitable for workpiece.
2. If not, then loosen adjustment nuts and turn both sets up or down until clamping handles are in the right position, then tighten the nuts.

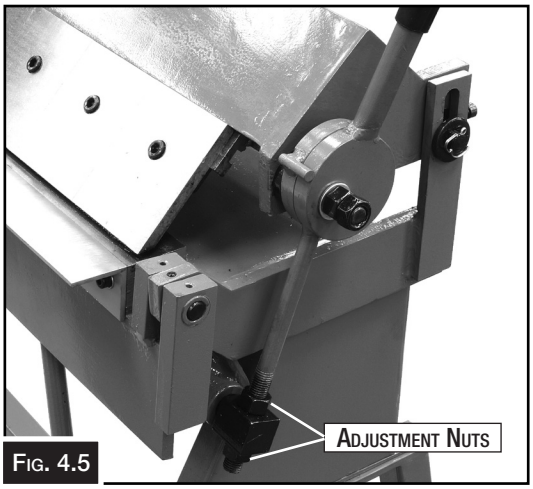


Fig. 4.5

4.6 BENDING SPRINGBACK

Springback occurs when the material angle tries to return to its original shape after being bent. When working on the panbrake, the operator will overbend to the bending angle, which is an angle past the required bent angle, compensating for the springback. Overbending to the bending angle allows the desired bent angle to be achieve when the workpiece is released from the pressure applied.

Variables in springback are normal. The stronger (higher tensile) a material is, the greater the springback will be. The sharper the radius is, the less springback there will be (up to a point). And the greater the bend radius is in relationship to the material thickness, the greater the spring-back.

The following ranges for the springback are approximate, if there is a 1-to-1 relationship between the material thickness and inside radius:

304 stainless steel: 2 to 3 degrees
Mild aluminium: 1.5 to 2 degrees
Cold-rolled steel: 0.75 to 1.0 degrees
Hot-rolled steel: 0.5 to 1.0 degrees
Copper and brass: 0.00 to 0.5 degrees

4.7 BENDING BASICS

Bending operations require the clamping fingers to be parallel with the edge of the clamping surface and bending leaf, and the setback and clamping pressure must be correctly adjusted for the thickness of the workpiece.

1. Caculate the required setback for the bend and make the adjustment to the machine if needed (refer to Adjusting Setback on Page 14).

2. Lift the clamping leaf.

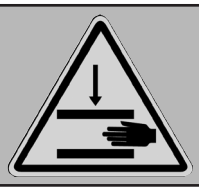
3. Place the workpiece between the clamping fingers and clamping surface.

4. Line up the bending marks on the workpiece with the fingers, then clamp it in place using clamping handles.

Note: Ensure the clamping handles lock down. If not the clamping pressure may need to be adjusted (refer to Adjusting Clamping Pressure on Page 14).

5. With the operators body square to the machine and using both hands, lift the bending leaf until the workpiece reaches desired bend angle.

6. Raise clamping leaf and remove workpiece.



WARNING.

Take care when operating this machine. Crush Points can occur between the Ram and the workpiece or between the workpiece and the table.

5. MAINTENANCE

It is very important that regular maintenance of the equipment is carried out. The operators needs to follow the daily maintenance procedures.
For optimum performance from this machine, the maintenance schedule listed below and in this section must be followed.

5.1 SCHEDULE

Daily Check

- ❑ Loose mounting bolts or fasteners.
- ❑ Cracked or damaged casting, and fingers.
- ❑ Any other condition that could hamper the safe operation of this machine

Weekly Check

- ❑ Clean machine
- ❑ Lubricate gears
- ❑ Lubricate hinge bushings

5.2 LUBRICATION

Clamping Leaf:
Use an oil can to lubricate the oil hole shown in Fig. 5.1 making sure to lubricate both sides of the clamping leaf then raise and lower the clamping leaf several times to distribute the lubricant.
Apply a thin coat of grease to the guide pin slots shown in Fig. 5.1.

Bending Leaf:
Use an oil can to lubricate the oil hole shown in Fig. 5.1 making sure to lubricate both sides of the bending leaf then raise and lower the bending leaf several times to distribute the lubricant. (Fig. 5.1)

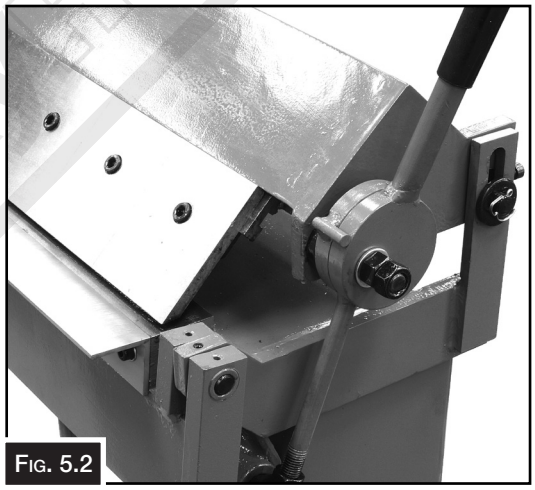


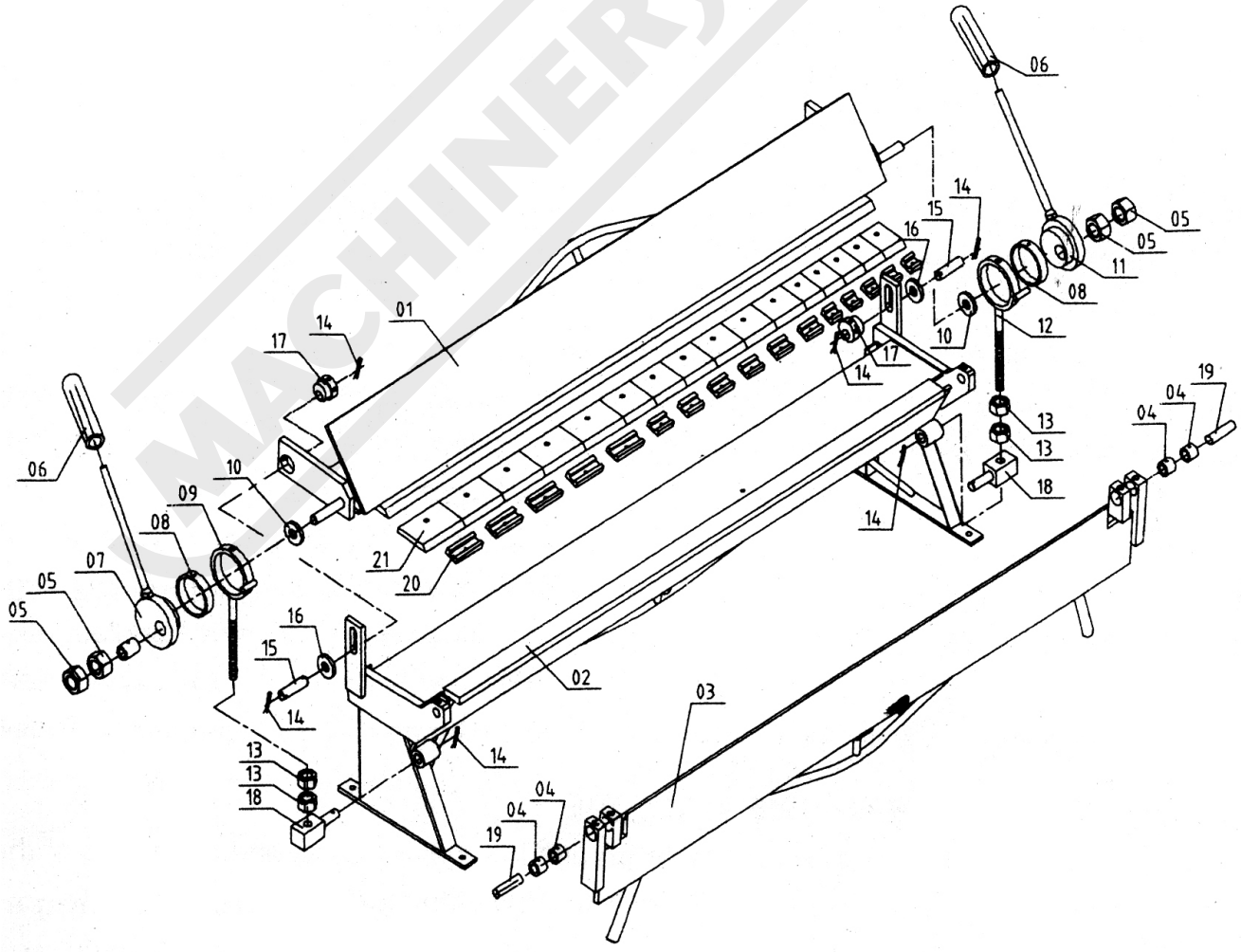
Fig. 5.2

WARNING

The machine is the sole responsibility of the owner for its safe use. This responsibility includes but is not limited to proper installation in a safe environment, personnel training, proper inspection and maintenance, manual availability and comprehension. The manufacturer will not be held liable for injury or property damage from negligence, improper training, machine modifications or misuse.

PARTS LIST

NO	Name	NO	Name
1	Upper die framework	12	Right eccentric rod
2	Frame	13	Nut
3	Mobile pattern	14	Clevis
4	Case	15	Pin
5	Nut	16	Washer
6	Handle case	17	Eccentric case
7	Left eccentric handle	18	Position-fixing shaft
8	Case	19	Shaft
9	Left connecting rod	20	Clamp plate
10	Washer	21	Brake dies
11	Right eccentric handle		



SPARE PARTS SECTION

PB-4

Manual Panbrake

Owners Manual

Order Code S250
08/2024

The following section covers the spare parts diagrams and lists that were current at the time this manual was originally printed. Due to continuous improvements of the machine, changes may be made at any time without notification.

HOW TO ORDER SPARE PARTS

1. Have your machines **model number, serial number & date of manufacture** on hand, these can be found on the specification plate mounted on the machine
2. A scanned copy of your parts list/diagram with required spare part/s identified.

NOTE: SOME PARTS MAY ONLY BE AVAILABLE AS AN ASSEMBLY

3. Go to **www.machineryhouse.com.au/contactus** and fill out the inquiry form attaching a copy of scanned parts list.

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⚠WARNING

General Machinery Safety Instructions

Machinery House
requires you to read this entire Manual before using this machine.

1. **Read the entire Manual before starting machinery.** Machinery may cause serious injury if not correctly used.
2. **Always use correct hearing protection when operating machinery.** Machinery noise may cause permanent hearing damage.
3. **Machinery must never be used when tired, or under the influence of drugs or alcohol.** When running machinery you must be alert at all times.
4. **Wear correct Clothing.** At all times remove all loose clothing, necklaces, rings, jewelry, etc. Long hair must be contained in a hair net. Non-slip protective footwear must be worn.
5. **Always wear correct respirators around fumes or dust when operating machinery.** Machinery fumes & dust can cause serious respiratory illness. Dust extractors must be used where applicable.
6. **Always wear correct safety glasses.** When machining you must use the correct eye protection to prevent injuring your eyes.
7. **Keep work clean and make sure you have good lighting.** Cluttered and dark shadows may cause accidents.
8. **Personnel must be properly trained or well supervised when operating machinery.** Make sure you have clear and safe understanding of the machine you are operating.
9. **Keep children and visitors away.** Make sure children and visitors are at a safe distance for you work area.
10. **Keep your workshop childproof.** Use padlocks, Turn off master power switches and remove start switch keys.
11. **Never leave machine unattended.** Turn power off and wait till machine has come to a complete stop before leaving the machine unattended.
12. **Make a safe working environment.** Do not use machine in a damp, wet area, or where flammable or noxious fumes may exist.
13. **Disconnect main power before service machine.** Make sure power switch is in the off position before re-connecting.
14. **Use correct amperage extension cords.** Undersized extension cords overheat and lose power. Replace extension cords if they become damaged.
15. **Keep machine well maintained.** Keep blades sharp and clean for best and safest performance. Follow instructions when lubricating and changing accessories.
16. **Keep machine well guarded.** Make sure guards on machine are in place and are all working correctly.
17. **Do not overreach.** Keep proper footing and balance at all times.
18. **Secure workpiece.** Use clamps or a vice to hold the workpiece where practical. Keeping the workpiece secure will free up your hand to operate the machine and will protect hand from injury.
19. **Check machine over before operating.** Check machine for damaged parts, loose bolts, Keys and wrenches left on machine and any other conditions that may effect the machines operation. Repair and replace damaged parts.
20. **Use recommended accessories.** Refer to instruction manual or ask correct service officer when using accessories. The use of improper accessories may cause the risk of injury.
21. **Do not force machinery.** Work at the speed and capacity at which the machine or accessory was designed.
22. **Use correct lifting practice.** Always use the correct lifting methods when using machinery. Incorrect lifting methods can cause serious injury.
23. **Lock mobile bases.** Make sure any mobile bases are locked before using machine.
24. **Allergic reactions.** Certain metal shavings and cutting fluids may cause an ellergic reaction in people and animals, especially when cutting as the fumes can be inhaled. Make sure you know what type of metal and cutting fluid you will be exposed to and how to avoid contamination.
25. **Call for help.** If at any time you experience difficulties, stop the machine and call you nearest branch service department for help.

⚠WARNING

Manual Panbrake Safety Instructions

Machinery House
requires you to read this entire Manual before using this machine.

1. **Maintenance.** Make sure all moving parts are locked down before any inspection, adjustment or maintenance is carried out. Place a block of timber between the Top Tooling and bed to help save hand or fingers from being crushed.

2. **Panbrake Condition.** Panbrake must be maintained for a proper working condition. Never operate a Panbrake that has damaged or worn parts. Scheduled routine maintenance should performed on a scheduled basis.

3. **Tooling Condition.** Never operate a Panbrake with damaged or badly worn tooling. Replace if required.

4. **Hand Hazard.** Do not insert or extend your hands in between bending tools, under any circumstances, while the machine is in operation mode. Serious injury can occur.

5. **Gloves & Glasses.** Always wear leather gloves and approved safety glasses when using this machine.

6. **Work area hazards.** Keep the area around the Panbrake clean from oil, tools, objects & chips. Pay attention to other persons in the area and know what is going on around the area to ensure unintended accidents.

7. **Guards.** Operate machine only with all protective devices and guarding.

8. **Material.** Do not over load the machines capacity by using material which is too thick or hard.

9. **Warning Labels.** Take note of any warning labels on the machine and do not remove them.

10. **Support arms.** Do not use support arms for intermediate storage of workpieces.

11. **Operation.** During the bending process, the workpiece may leap up. Therefore, the material must be handled carefully.

12. **Secure Panbrake.** Make sure you bolt and the machine down so it is secure when in operation.

13. **Heating Material.** Heating metal with a torch while the metal is in the panbrake will weaken the fingers.

14. **Pinching.** Prevent pinching by lowering the panbrake fingers when not in use.

15. **Call for help.** If at any time you experience difficulties, stop the machine and call you nearest branch service department for help.

PLANT SAFETY PROGRAM

NEW MACHINERY HAZARD IDENTIFICATION, ASSESSMENT & CONTROL

Manual Panbrake

Developed in Co-operation Between A.W.I.S.A and Australia Chamber of Manufactures
This program is based upon the Safe Work Australia, Code of Practice - Managing Risks of Plant in the Workplace (WHSA 2011 No10)

Item No.	Hazard Identification	Hazard Assessment	Risk Control Strategies (Recommended for Purchase / Buyer / User)
B	CRUSHING	LOW	Secure & support work material on table etc. Lower Panbrake fingers when not in use. Keep fingers clear during clamping. Ensure machine is bolted down.
C	CUTTING, STABBING, PUNCTURING	MEDIUM	Wear gloves to prevent cuts from sharp material offcuts.
F	STRIKING	MEDIUM	Ensure the area around the counter weight is kept clear.
Plant Safety Program to be read in conjunction with manufactures instructions			

HARE&FORBES MACHINERYHOUSE

www.machineryhouse.com.au

MACHINERYHOUSE

www.machineryhouse.co.nz

Authorised and signed by:
Safety officer: .....
Manager: .....

Revised Date: 12th March 2012

ENVIRONMENT PROTECTION

Recycle unwanted materials instead of disposing of them as waste. All tools, accessories and packaging should be sorted, taken to a recycling centre and disposed of in a manner which is compatible with the environment. When the product becomes completely unserviceable and requires disposal, drain any fluids (if applicable) into approved containers and dispose of the product and fluids according to local regulations.

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