



DEBRIS CLEANA OPERATORS MANUAL

PM-000136-A



CRITICAL - DO NOT CONNECT OR OPERATE YOUR DEBRIS CLEANER WITHOUT FIRST HAVING READ AND UNDERSTOOD THIS STATEMENT

Your Digga Debris Cleaner is a high performance attachment, fitted with a Digga planetary gearbox. To avoid premature wear and failure, and to fulfil your terms of warranty please read this statement.

Your Digga Debris Cleaner gearbox must have a first oil change within the **first 30 hours (extreme use)** or **50 hours (moderate use)** or **3 months (whichever comes first)** of use to ensure the bed in of the gearbox. For more detailed information please read page 24.

If the first oil change is not performed within this period, excessive wear within the gearbox can occur that will cause premature failure. All warranty will be void.

Oil must then be changed thereafter every 300/500hrs and a full service every 12mths must be performed by an authorised service agent to ensure Warranty requirements are met.

In the event of a failure under the warranty period:

- Contact Digga immediately, **DO-NOT DISASSEMBLE YOUR DEBRIS CLEANER** without first obtaining written permission and instructions from Digga.
- Proof of service must be provided in hard copy form of both operational and service history (including serial number of gearbox and hydraulic motor) records. Service must be performed by an **authorised Digga service agent**.

2 TABLE OF CONTENTS

1	CRITICAL INFORMATION - SERVICE INTERVALS.....	3
2	TABLE OF CONTENTS.....	4
3	TO THE PURCHASER.....	5
4	SERVICE & PREPARATION FOR USE.....	6
5	SAFETY PRECAUTIONS-GENERAL INFORMATION.....	9
6	SAFETY-WORKING WITH THE ATTACHMENT.....	15
7	BEFORE USE.....	17
8	INSTALLATION AND OPERATING INSTRUCTIONS.....	18
9	MAINTENANCE.....	21
10	SAFETY - STICKER LOCATION.....	27
11	SPARE PARTS.....	28
12	TROUBLESHOOTING.....	29
13	WARRANTY.....	30

Congratulations on the purchase of your new DIGGA product! This product was carefully designed and manufactured to give you many years of dependable service. Only minor maintenance is required to keep it in top working condition. Be sure to observe all maintenance procedures and safety precautions in this manual and on any safety decals located on the product and on any equipment on which the attachment is mounted.

This manual has been designed to help you do a better, safer job. Read this manual carefully and become familiar with its contents.

WARNING!



Never let anyone operate this unit without reading the “Safety Precautions” and “Operating Instructions” sections of this manual. Always choose hard, level ground to park the vehicle on and set the brake so the unit cannot roll. Unless noted otherwise, right and left sides are determined from the operator’s control position when facing the attachment.

NOTE: The illustrations and data used in this manual were current (according to the information available to us) at the time of printing, however, we reserve the right to redesign and change the attachment as may be necessary without notification.

BEFORE OPERATION

The primary responsibility for safety with this equipment falls to the operator. Make sure the equipment is operated only by trained individuals that have read and understand this manual. If there is any portion of this manual or function you do not understand, contact your local authorized dealer or the manufacturer to obtain further assistance. Keep this manual available for reference.

Provide the manual to any new owners and/or operators.

SAFETY ALERT SYMBOL



This is the “Safety Alert Symbol” used by this industry. This symbol is used to warn of possible injury. Be sure to read all warnings carefully. They are included for your safety and for the safety of others working with you.

SERVICE

Use only manufacturer replacement parts. Substitute parts may not meet the required standards. Record the model and serial number of your unit on page 6. The parts department needs this information to insure that you receive the correct parts.

4 SERVICE & PREPARATION FOR USE

All DIGGA Debris Cleaners are designed and manufactured to give dependable service. To keep it running efficiently read the instructions in this operator's manual. Each section is clearly identified so that you can easily find the information you need - whether it is operation, lubrication or maintenance.

Debris Cleaner equipment options are available to help you do a better job in special conditions. These are noted throughout this manual and can be purchased from your DIGGA dealer eg. Chains, paddle blades, wearparts and spare parts.

To facilitate warranty or service, record the model and serial number of your unit in the space provided on this page. This information may be obtained from the identification plate located on the product.

ALL SERVICE FOR WARRANTY MUST BE PERFORMED BY AN
AUTHORISED DIGGA SERVICE AGENT. CONTACT YOUR
LOCAL DIGGA DEALER FOR DETAILS.

MODEL _____

SERIAL NUMBER _____

DATE PURCHASED _____

IMPORTANT: EXCEPT FOR OIL CHANGES, GENERAL MAINTENANCE OF CHAINS AND BEARINGS, ALL SERVICE AND REPAIR FOR WARRANTY AND ASSESSMENT FOR WARRANTY MUST BE PERFORMED BY AN AUTHORISED DIGGA SERVICE AGENT, ONLY GENUINE DIGGA REPLACEMENT PARTS CAN BE USED. SUBSTITUTE PARTS WILL NOT MEET THE STANDARDS REQUIRED FOR SAFE, DEPENDABLE OPERATION. USE OF NON GENUINE DIGGA PARTS WILL VOID WARRANTY AND DIGGA WILL ACCEPT NO LIABILITY WHAT SO EVER FOR CONSEQUENTIAL OR SPECIAL DAMAGES.

		
www.digga.com		MADE IN AUSTRALIA DE-000168
Model		
Serial No.		
Flow (max)		
Pressure (max)		
Power		
Weight		
☐ Approximate Oil Capacity:		☐

The parts department needs this information to insure accurate parts can be sent to the authorised service agent.

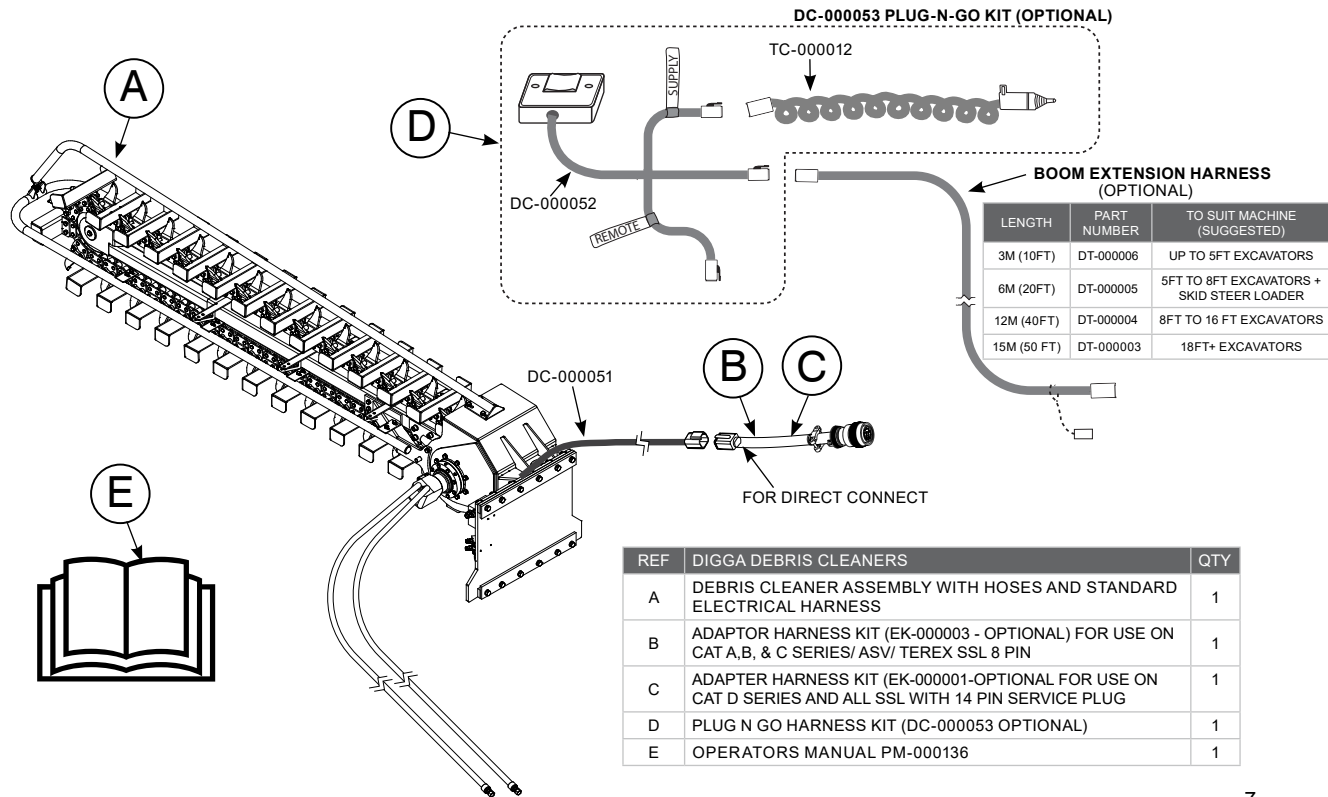
MODELS COVERED IN THIS MANUAL

2.8M REACH

3.3M REACH

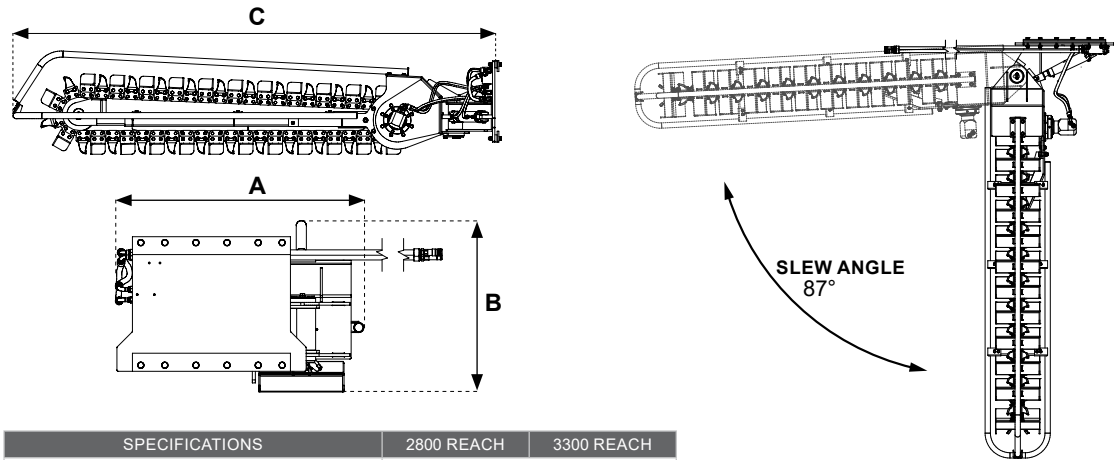
4 SERVICE & PREPARATION FOR USE

To avoid any inconvenience before operation, please check that you have received the following items which you have ordered



4 SERVICE & PREPARATION FOR USE

SPECIFICATIONS



SPECIFICATIONS	2800 REACH	3300 REACH
Width (Overall) A	1031mm	
Height (Overall) B	714.5mm	
Length (Overall) C	3325mm	3820mm
Slew Angle	87°	87°
Number of Paddles Blades	25	30
Paddle Blade Width	350mm	350mm
Hydraulic Pressure (Continuous)	205 bar	
Hydraulic Pressure (Peak)	240 bar	
Hydraulic Flow Requirement (Continuous)	75 lpm	
Hydraulic Flow Requirement (Intermittent)	115 lpm	
Weight	570 Kg	635 Kg

5 SAFETY PRECAUTIONS - GENERAL INFORMATION

TAKE NOTE! THIS SAFETY ALERT SYMBOL FOUND THROUGHOUT THIS MANUAL IS USED TO CALL YOUR ATTENTION TO INSTRUCTIONS INVOLVING YOUR PERSONAL SAFETY OR OTHERS. FAILURE TO FOLLOW THESE INSTRUCTIONS CAN RESULT IN INJURY OR DEATH.

THIS SYMBOL MEANS:



**ATTENTION!
BECOME ALERT!
YOUR SAFETY IS INVOLVED!**

SIGNAL WORDS: Note the use of signal words DANGER, WARNING, and CAUTION with the safety messages. The appropriate signal word for each has been selected using the following guidelines:

DANGER: Indicates an imminently hazardous situation, which if not avoided, will result in death or serious injury. This signal word is to be limited to the most extreme situations, typically for machine components which, for functional purposes, cannot be guarded.

WARNING: Indicates a potentially hazardous situation, which if not avoided, could result in death or serious injury, and includes hazards that are exposed when guards are removed. It may also be used to alert against unsafe practices and indicate potential failure or damage to equipment.

CAUTION: Indicates a potentially hazardous situation, which if not avoided, may result in minor or moderate injury. It may also be used to alert against unsafe practices.

This section is composed of various warnings and safety tips. **Read and learn all the information in this section before you attempt to use your attachment.** Also read your machines owner's manual before using your equipment. This knowledge will help you operate your unit safely. **Do not take this information lightly, it is presented for your benefit and for the benefit of others working around you.**

The "Safety Alert Symbol"  will be used throughout this manual. It will appear with the word **DANGER, WARNING, or CAUTION**, and a safety message pertaining to the specific topic being covered. Take the time to read these messages as you come across them.

5 SAFETY PRECAUTIONS - GENERAL INFORMATION

WARNING KNOW WHERE UTILITIES ARE



Observe overhead electrical and other utility lines. Be sure equipment will clear them. When digging, call DIAL BEFORE YOU DIG ON 1100 (in Australia), or your local UTILITIES location service provider for location of buried utility lines, gas, water, and sewer, as well as any other hazard you may encounter.

WARNING EXPOSURE TO RESPIRABLE CRYSTALLINE SILICA DUST ALONG WITH OTHER HAZARDOUS DUSTS MAY CAUSE SERIOUS OR FATAL RESPIRATORY DISEASE.



It is recommended to use dust suppression, dust collection and if necessary personal protective equipment during the operation of any attachment that may cause high levels of dust.

WARNING REMOVE PAINT BEFORE WELDING OR HEATING



Hazardous fumes/dust can be generated when paint is heated by welding, soldering or using a torch. Do all work outside or in a well ventilated area and dispose of paint and solvent properly. Remove paint before welding or heating. When sanding or grinding paint, avoid breathing the dust. Wear an approved respirator. If you use solvent or paint stripper, remove stripper with soap and water before welding. Remove solvent or paint stripper containers and other flammable material from area. Allow fumes to disperse at least 15 minutes before welding or heating.

WARNING END OF LIFE DISPOSAL



At the completion of the useful life of the unit, drain all fluids and dismantle by separating the different materials (rubber, steel, plastic, etc.). Follow all federal, state and local regulations for recycling and disposal of the fluid and components.

5 SAFETY PRECAUTIONS - GENERAL INFORMATION

WARNING



OPERATING THE DEBRIS CLEANA

- An operator must not use drugs or alcohol, which can change his or her alertness or coordination. An operator taking prescription or over-the-counter drugs should seek medical advice on whether or not he or she can safely operate equipment.
- All bystanders should be kept a minimum of 20 feet (6 meters) away from the working area of the conveyor chain.
- Do not allow Site workers to climb or ride on Debris Cleaner at any time, including while stationary, in operation or being moved.
- Operate only from the operator's station.
- Avoid steep hillside operation which could cause the machine to overturn. Consult your machines operator's and safety manuals for maximum incline allowable.

WARNING



- Reduce speed when driving over rough terrain, on a slope, or turning, to avoid overturning the vehicle.
- Travel only with the Debris Cleana in a safe transport position to prevent uncontrolled movement. Drive slowly over rough ground and on slopes.
- Do not drive close to ditches, excavations, etc., cave in could result.
- Before exiting the machine, lower the attachment to the ground, apply the parking brakes, turn off the prime mover's engine, and remove the key.
- Flow and pressure gauges, fittings, and hoses must have a continuous operating pressure rating of at least 25% higher than highest pressures of the system.
- Do not smoke when refueling the prime mover. Allow room in the fuel tank for expansion. Wipe up any spilled fuel. Secure cap tightly when done.
- Remove the Debris Cleana from the prime mover before transporting to and from the job site.

WARNING



- Debris Cleanas shall be used only for their designed intent and shall not be loaded beyond their rated capacity. Over-loading or exceeding the manufacturers specifications will void all warranty.

5 SAFETY PRECAUTIONS - GENERAL INFORMATION

WARNING



OPERATING THE DEBRIS CLEANA CONT....

- The Debris Cleana must be stopped before making adjustments to the attachment.
- Materials heavier than 10kgs must be moved mechanically or by using at least two people.
- Debris cleaning operations must be stopped in the event of local thunderstorm, or lightning activity. During operation, weather conditions shall be monitored: operations shall cease during electrical storms or when electrical storms are imminent.

STORAGE OF THE DEBRIS CLEANA

WARNING



- Seal hydraulic couplers from contaminants and secure all hydraulic hoses off the ground to help prevent damage.
- Clean the unit thoroughly, removing all mud, dirt, and grease.
- Inspect for visible signs of wear, breakage, or damage. Order any parts required and make the necessary repairs to avoid delays upon removal from storage.
- Check that Debris Cleana motor and hoses are full of clean oil and planetary is full.
- Coat liberally with grease the output shaft and collar, extension shaft and collar, and all connecting pins to prevent rust and reduce wear.
- Tighten loose nuts, cap screws and hydraulic connections.
- Replace safety decals that are damaged or in unreadable condition.
- Store unit in a dry and protected place. Leaving the unit outside will materially shorten its life

5 SAFETY PRECAUTIONS - GENERAL INFORMATION

WARNING



GROUND PERSONNEL AND BYSTANDERS

- Be alert to others in the work area. Be sure others know when and where you will be working. Make sure no one is behind equipment or within 6 metres of it operating.
- Loose fitting clothing, long hair, jewellery and equipment which might become entangled in moving equipment are prohibited while working near the Debris Cleana.
- Operators, helpers, and other personnel working near Debris Cleana must wear steel-toe safety shoes, safety glasses, and hard hats as a minimum. Hearing protection, respirators, and personnel protective clothing will be specified in the site-specific Health and Safety Plan.

WARNING



MAINTAINING THE DEBRIS CLEANA

- Before performing maintenance, lower the attachment to the ground, apply the parking brakes, turn off the engine, and remove the key.
- Never adjust a relief valve for pressure higher than recommended by the machine's manufacturer.

WARNING



TRANSPORTING

Follow all local government regulations that may apply along with recommended tie down points and any equipment safety precautions at the front of this handbook when transporting your attachment.

WARNING



TIE DOWN POINTS

- Secure the attachment around the guard with tension straps in 4 opposing directions to ensure that attachment is firm and secure.
- Do not attach tie down accessories around cylinders or in any way that may damage hoses or hydraulic components.
- Attach tie down accessories to unit as recommended.
- Check unit stability before transporting.

Verify that all tie down accessories (chains, slings, ropes, shackles and etc.) are capable of maintaining attachment stability during transporting and are attached in such a way to prevent unintended disengagement or shifting of the unit. Failure to do so could result in serious personal injury or death.

5 SAFETY PRECAUTIONS - GENERAL INFORMATION

TO THE OPERATOR

The primary responsibility for safety with this equipment falls to the operator. Make sure that the equipment is operated only by trained individuals that have read and understand this manual. Don't hurry the learning process or take the unit for granted.

It is the skill, care, common sense, and good judgement of the operator that will determine how efficiently and safely the job is performed. Know your equipment before you start. Know its capabilities and how to operate all the controls.

Visually inspect your equipment before you start, ensure correct assembly and installation of the attachment and never operate equipment that is not in proper working order.

Practice the operation of your new attachment and become familiar with the controls and the way it handles on your machine. If there is any portion of this manual or function you do not understand, contact your local authorized dealer or the manufacturer.

1. Never operate the Attachment without first reading and understanding the entire operator's manual.
2. Do not paint over, remove or deface any safety signs or warning decals on your equipment.
3. Follow all safety decals. Keep them clean and replace them if they become worn, damaged or illegible.
4. Know your equipment inside and out. Know how to operate all controls and know emergency shut down procedures.
5. Keep all stepping surfaces, pedals, and controls free from dirt, grease and oil. Keep equipment clean to help avoid injury from slipping or a fall when getting on or off equipment.
6. Operate the attachment only in daylight or with sufficient artificial light.
7. Always carry loads close to the ground. Do not step off machine platform with load raised.
8. Turn off engine before performing maintenance. All maintenance can be performed with the machine arms lowered. If lift arms must be left raised for any reason, use a positive lift arm lock to secure the arms in place. Serious damage or personal injury could result from lift arms accidentally lowering.
9. Do not exceed rated operating capacity of the host machine, as machine may become unstable resulting in loss of control.
10. Always lower the loader arms or machine boom to the ground, shut off the engine and remove the key before getting off the unit.
11. Never use the Debris Cleaner on a machine that is not equipped with a cab or ROPS, FOPS and operator restraints (seat belts or equivalent devices).

TAKE EXTREME CARE WHEN DEALING WITH HYDRAULICS, WHILST ASSEMBLING, OPERATING, MAINTAINING OR PERFORMING ANY WORK ON OR NEAR THIS PRODUCT.

- Hydraulic fluid under pressure can penetrate the skin and cause serious injury or death. Hydraulic leaks under pressure may not be visible!
- If any fluid penetrates the skin, GET IMMEDIATE MEDICAL ATTENTION!!
- Wear safety glasses, protective clothing, and use a sound piece of cardboard or wood when searching for hydraulic leaks. DO NOT USE YOUR HANDS!
- Before connecting or disconnecting hydraulic hoses, read your machine or power unit's operator's manual for detailed instructions on connecting and disconnecting hydraulic attachments.
- Make certain that all parts meet the specifications for this product when installing or replacing hydraulic hoses or fittings.
- After connecting hydraulic lines:
 - Slowly and carefully raise the loader's arm/s and cycle the rollback / dump cylinders to check hose clearances and to check for any interference.
 - Operate the hydraulics on this product to ascertain forward and reverse.
 - Make certain that the hoses cannot interfere with or actuate the quick-attach mechanism.
 - Make certain that hoses will not be pinched, or get tangled, in any equipment.
- Do not lock the auxiliary hydraulics of your power unit in the "ON" position.
- Refer to Machine's operator manual and this manual for procedures and intervals, then inspect and maintain the entire hydraulic system to insure that the fluid remains clean, that all devices function properly, and that there are no fluid leaks.

6 SAFETY - WORKING WITH THE ATTACHMENT

WHEN MOUNTING THIS PRODUCT TO YOUR MACHINE

- Refer to the operator's manuals of your machine, and your quick-attach for special or detailed mounting instructions.
- This product should fit onto the quick-attach Frame or Hitch (Machine Mount) or slide frame mount.
- If this product does not fit properly, contact your Digga Dealer before operating.
- Never place any part of your body into the mounting plate, frame, hitch or loader holes. A slight movement of the power unit and this product could cause serious injury.

WHEN ADJUSTING, SERVICING OR REPAIRING THIS PRODUCT

- Make no modifications to your Debris Cleana.
- When making repairs use only authorised Digga service agents, and genuine Digga parts. For fasteners, hydraulic hoses, or hydraulic fittings, use only properly rated parts.
- Replacement parts must also have safety signs attached.



SAFETY FIRST!! READ AND UNDERSTAND THE SAFETY INSTRUCTIONS BEFORE BEGINNING ANY DEBRIS CLEANA MAINTENANCE.

BEFORE FIRST USE

- Inspect the attachment for shipping damage. If damage does exist, do not operate until the damaged parts have been replaced or repaired.

BEFORE EACH USE

- Make sure that all nuts and bolts are in place and properly tightened.
- Make sure that all other fasteners are in place and are performing their specified function.
- Make sure that all hydraulic fittings are tightened and that there are no leaks in any fittings or hoses.
- Make sure that all safety signs are in place, are clean, and are legible. (SEE THE SAFETY SIGN SECTION)
- Check for any oil leaks.
- Wear and tear on pins, linkages, clips, bushes and hood.
- Ensure any damage or excessively worn parts are replaced.
- Always wear safety goggles or glasses when inspecting equipment.

EVERY 10 HOURS OF USE

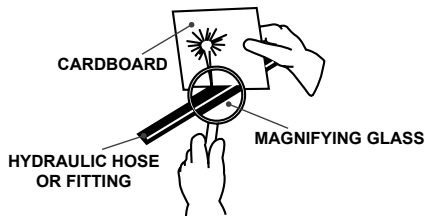
- Check the Hydraulic Oil level of the motor.

Always wear safety goggles or glasses when inspecting equipment



WARNING!

If injured by injected fluid, see a doctor at once. If your doctor is not familiar with this type of injury, ask him to research it immediately to determine proper treatment.



Escaping fluid under pressure can have sufficient force to penetrate the skin causing serious personal injury. Fluid escaping from a very small hole can be almost invisible. Use a piece of cardboard or wood, rather than hands to search for suspected leaks. Keep unprotected body parts, such as face, eyes, and arms as far away as possible from a suspected leak. Flesh injected with hydraulic fluid may develop gangrene or other permanent disabilities.

8 INSTALLATION AND OPERATING INSTRUCTIONS

Digga Debris Cleanas are designed to clear away debris from areas that are awkward to access or pose a risk due to falling objects from overhead conveyors. The DIGGA Debris Cleana attaches to the tool bar/quick-attach mechanism of your Machine. Due to this arrangement, thorough knowledge of the machinery controls is necessary for machine operation. Read and understand your machine operator's manual for information regarding machine operation before attempting to use the Debris Cleana. When a Digga Debris Cleana is purchased from Digga or a DIGGA Dealer/Distributor the mounting frame & attachment is matched for suitability and compatibility to the flow, pressures & load ratings of the original machine it was purchased for. For fitment of the Digga Debris Cleana to other machines you must first contact your DIGGA dealer and receive written confirmation to ensure you do not incorrectly fit the Digga Debris Cleana to a machine with higher, pressure or rated load capacities than what the Digga Debris Cleana was designed for. Warranty will be void if the Digga Debris Cleana is fitted to an alternative machine without first receiving written confirmation from your DIGGA dealer. Exceeding the recommended max flow, pressure, or rated load capacity of the Digga Debris Cleana as stated on the serial tag will void all warranty.

Check the work site and identify the extent of the work to be carried out and note any possible hazards or constraints, overhead cables, services etc.



NOTE: THE DEBRIS CLEANA MUST NOT BE USED FOR ANY OTHER USE BUT WHAT IT HAS BEEN DESIGNED FOR.



SAFETY FIRST!! READ AND UNDERSTAND THE SAFETY INSTRUCTIONS BEFORE BEGINNING ANY DEBRIS CLEANA MOUNTING.

1. Remove the shipping banding from around the Debris Cleana and Frame/Hitch.
2. Remove any attachments from the front of the Parent Machine.
3. Check that all nuts and bolts are tightened on the frame or hitch and that the frame/hitch is correctly mounted on the Debris Cleana.
4. Following all standard safety practices and the instructions for installing an attachment in your machine operator's manual, install the Debris Cleana onto your machine.



NOTE: IT IS IMPORTANT TO MAKE SURE THE LOCKING MECHANISM ON YOUR QUICKATTACH IS ENGAGED, THEREFORE LOCKING THE ATTACHMENT ONTO THE MACHINE.

5. Once the Debris Cleana is connected via the frame/hitch, lower the unit to the ground and remove the key from the parent machine.
6. Relieve any pressure from the auxiliary hydraulic system and after making sure that there is not any foreign matter on the hydraulic couplers, connect the supply and return couplers to the auxiliary hydraulic system of your machine.

8 INSTALLATION AND OPERATING INSTRUCTIONS

8. Make sure the couplers are fully connected and locked.
9. Route the hoses in such a fashion as to avoid pinching or chafing.
10. Check the Chain teeth and buckets are not worn. Ensure all worn parts are replaced. Worn parts will become ineffective and severely diminish the overall performance of the Debris Cleana.
11. The machine is now ready for use.



DONOTLOCKTHEAUXILIARYHYDRAULICS OF YOUR MACHINE IN THE "ON" POSITION. FAILURE TO OBEY THIS WARNING COULD RESULT IN DEATH OR SERIOUS INJURY.



SAFETY FIRST!! READ & UNDERSTAND THE SAFETY INSTRUCTIONS BEFORE BEGINNING ANY CLEANING WORK.



FAILURE TO OBEY THE FOLLOWING PROCEDURES COULD RESULT IN DEATH OR SERIOUS INJURY.

Never lift this product above the operator's eye level OR to a height where visibility is obstructed, which ever is lower.



WHILE CHAIN IS MOVING ALL BYSTANDERS MUST BE A MINIMUM OF 6M/20FT AWAY. IT IS THE RESPONSIBILITY OF THE OPERATOR TO ENSURE ALL SAFETY PROCEDURES ARE FOLLOWED

8 INSTALLATION AND OPERATING INSTRUCTIONS

OPERATING PROCEDURE

- The Debris Cleana is designed and manufactured to remove debris from areas which are difficult to access or dangerous to work under or both.
- The slewing of the boom does not appear to work when the boom is suspended in free space. It requires load to be able to slew (in other words resting or contacting the ground).
- Small chain speed reduction will be noticed whilst the chain is rotating and the boom is slewed, simultaneously.



NOTE: THE MAXIMUM FLOW THAT THIS ATTACHMENT UNIT CAN HANDLE IS 130LPM. THE MAXIMUM PRESSURE OF THIS ATTACHMENT IS 240BAR



CAUTION: DO NOT RAPIDLY ENGAGE FORWARD AND REVERSE OR ON/OFF ROTATIONAL MOVEMENT TO CLEAR THE DEBRIS CLEANER. THIS ACTION CAN CAUSE CAVITATION OF THE MOTOR AND VOID MOTOR WARRANTY.

REMOVAL AND STORAGE

1. Set the attachment on the ground and follow the standard shut down procedure in your loader operators manual.
2. With the loader OFF, disengage the attachment lock pins, release hydraulic pressure from the auxiliary hydraulic system and disconnect the hydraulic couplers from the loader.
3. The two quick couplers can be connected to each other in storage, as it will prevent unwanted debris entering the hydraulic lines.
4. Start the machines engine and make sure that the lift arm is lowered and in contact with the loader frame.
5. Roll the attachment mechanism forward and slowly back up until the attachment is free from the machine.
6. Remove and store the attachment in a dry and protected place. Leaving the Digga Debris Cleana outside will materially shorten its life.

TRANSPORTING THE ATTACHMENT

1. Follow all federal, state and local regulations when transporting the unit on public roads.
2. Use extra care when loading or unloading the attachment onto a trailer or truck. Disconnect hydraulic couplers during transportation.



SAFETY FIRST!! READ AND UNDERSTAND THE SAFETY INSTRUCTIONS BEFORE BEGINNING ANY DEBRIS CLEANA MAINTENANCE.



ALWAYS ENSURE THAT THE HYDRAULIC MOTOR IS PRIMED WITH HYDRAULIC FLUID PRIOR TO USE FOLLOWING ANY REPAIRS TO THE DEBRIS CLEANA, OR THE PARENT MACHINE. DO NOT ALLOW THE DEBRIS CLEANA TO RUN WITHOUT OIL AT ANY TIME.

NOSE ROLLER BEARING REPLACEMENT

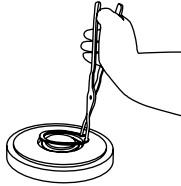


FIG 1

1. To replace the nose roller bearing, firstly remove circlip using a pair of straight circlip pliers Fig 1.

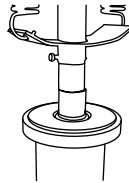


FIG 2

2. Use a press to push the bearing out ensuring the pipe underneath is larger than the bearing Fig 2.

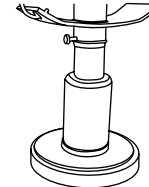


FIG 3

3. When pressing the new bearing in ensure the drift used is the correct size. ie; The drift must sit against the outside shell of the bearing being careful not to damage the ring that holds the bearing together, make sure the bearing is sitting against the lip on the opposite side of the nose roller and replace circlip.



NOTE: A HAMMER IS NOT RECOMMENDED FOR THIS PROCEDURE AS IT CAN DAMAGE THE NEW BEARING.



IMPORTANT: SHUT DOWN DEBRIS CLEANER & MACHINE BEFORE ANY ADJUSTMENTS ARE MADE

SPROCKET REPLACEMENT

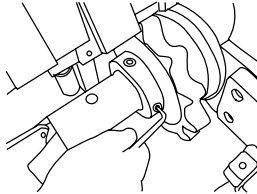


FIG 1

Using a 3/16" Allen key loosen the 2 grub screws in the retaining collar and slide the collar off the shaft. (shown in Fig 1).

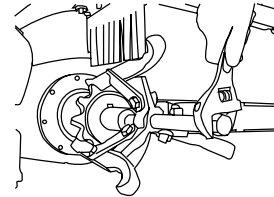


FIG 2

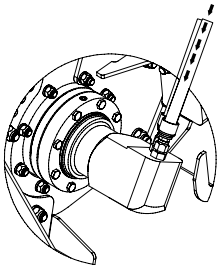
Slide the sprocket off the shaft with the aid of a puller and replace with new sprocket. It is recommended Anti-seize be applied to the shaft before replacement of the sprocket (Shown in Fig 2)



NOTE: IF THE SPROCKET CANNOT BE REMOVED BY TAPPING WITH A HAMMER THEN A PULLER MAY HAVE TO BE USED.

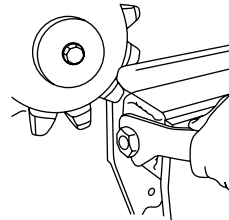
HYDRAULIC HOSE CONNECTION

SUPPLY FROM MACHINE

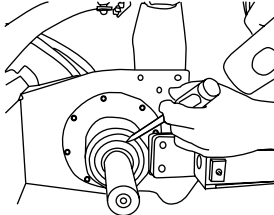


1. The Debris Cleana chain must rotate in an anti-clockwise direction (when viewed from the Motor side of the Debris Cleana). The Supply Line from the Parent machine must be connected to the 'A' port on the Debris Cleana Motor.

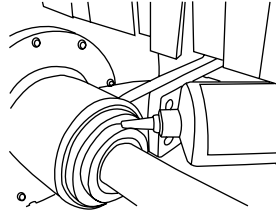
BOOM ADJUSTMENT



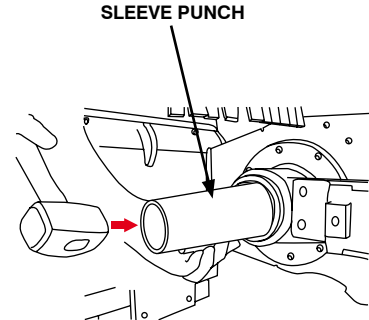
1. Use spanner supplied to wind adjuster nut clockwise for loosening, anti-clockwise for tightening of the chain.

SEAL REPLACEMENT**FIG 1**

Before the seal can be replaced remove retaining collar and sprocket as shown in sprocket replacement. Then remove the key and seal protector. Use a pin-punch or round pointed awl and tap gently to pierce through the seal face and then lever out the seal. Fig 1. Inspect the inside of the housing for damage and if damaged or burred, clean up with emery cloth.

**FIG 2**

Before the seal can be replaced run some grease around the inside lip of the seal for lubrication to the shaft. Ensure there are no burrs on the shaft between the end of the shaft and the end of the housing. File if necessary. Using loctite 243 (or equivalent) run a small bead around the outside of the seal see Fig 2.

**FIG 3**

Proceed to fit the seal by using a large punch/sleeve/collar and gently tap the seal into place ensuring the seal is punched in evenly (see Fig 3). This is very important as any misalignment could cause damage to the seal and promote a leak. The seal must be flush with the end of the housing. Replace seal protector, key, sprocket and retaining collar. Refill the planetary with gear oil (See Maintenance on pg 24 & 25 for correct amount, grade of gear oil, and oil filling procedures).

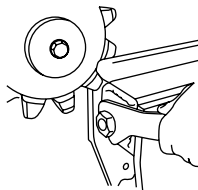


NOTE: MAKE SURE ALL GEAR OIL IS DRAINED AT THIS POINT.

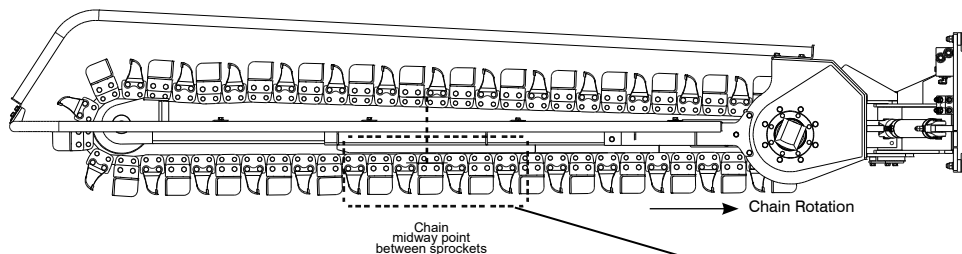
9 MAINTENANCE

CHAIN ADJUSTMENT

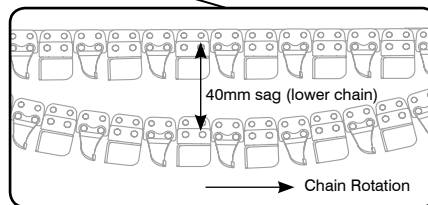
1. To either adjust chain or remove chain – remove two ½" bolts holding spanner to outer boom.



2. Use spanner supplied to wind adjuster nut clockwise for loosening, anti clockwise for tightening of the chain conveyor



3. To achieve the correct chain tension: Adjust the tension on the lower chain section at the midway point between the sprockets to allow 40mm of vertical movement.



Measured mid way between sprockets on lower chain

PLANETARY GEAR OIL

The Debris Cleaner Planetary Unit is a sealed unit. If there is any sign of oil leaks please contact your nearest DIGGA dealer before carrying out any repairs, as there can be other causes for seal leaks.

OPERATING IN ASIA PACIFIC AND EUROPE

The Planetary Drive Unit in the Debris Cleana when operating in Asia Pacific and Europe uses extreme pressure (EP) gear oil ISO320 viscosity (mineral oil) for lubrication of gears and bearings. **Minimum and maximum gear oil operating temperatures** for these regions is **-9°C (16°F) to 120°C (248°F)**. Please contact your Digga specialist for the recommended Gear Oil if operating outside this range.

OPERATING IN NORTH AMERICA

The Planetary Drive Unit on the Debris Cleana when operating in North America uses the Gear Oil **CHEVRON MEROPA ISO 320** (mineral oil) for lubrication of gears and bearings. Minimum and maximum gear oil operating temperatures for this region is **-18°C (-0.4°F) to 107°C (225°F)**. Please contact your Digga specialist for the recommended Gear Oil if operating outside this range.

- Continuous operating temperature must not exceed 80°C.
- During extended stationary periods (one month or more), the unit should be run monthly to immerse all internals in oil, thereby preventing corrosion.
- Oil should be changed when hot, to prevent a build up of sludge deposits. Flush interior of unit with fluid recommended by oil companies.
- Check for leaks regularly and if an oil leak is detected contact your nearest DIGGA Dealer for remedy instructions.
- Use only extreme pressure gear oil (EP) ISO320 viscosity (mineral oil)
- DO NOT mix oil of different viscosity, NOT even those of the same brand.
- DO NOT mix mineral and synthetic oils.
- Cleanliness is necessary when changing oil.

OIL CHANGED SCHEDULE



IMPORTANT

- First oil change MUST be carried out within the first 30 hours of use under EXTREME OPERATING CONDITIONS **OR** the first 50 hours of use under MODERATE OPERATING CONDITIONS. **OR 3 MONTHS** Which ever comes first. Thereafter, every 300/500 hours.
- Change the gear oil after the first 30 hours of SEVERE OPERATING CONDITIONS*. (i.e. severe ambient temperature conditions of +40°C or below 0°C or operating for extended periods.) Thereafter, every 300 hours.
- Contact your nearest DIGGA Dealer for Gear Oil change procedure.

THE GEARBOX OIL CAPACITY IS ENGRAVED ONTO THE SERIAL TAG LOCATED ON THE DEBRIS CLEANA

9 MAINTENANCE

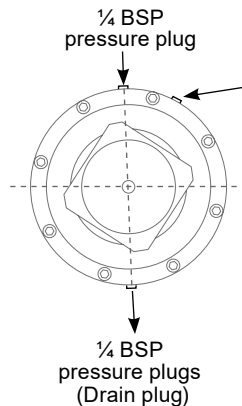
PROCEDURE FOR CHANGING OR RE-FILLING GEARBOX OIL LEVEL

Use correct oil. See page 24.

GEARBOX OIL QUANTITY = 0.72 L

1. Ensure that Debris Cleaner boom is horizontal as well as the motor and gearbox being horizontal (not leaning to the right or left), before commencing to drain and replace the gearbox oil.

2. For filling the gearbox (from empty) ensure that a maximum qty of 0.72 litres is applied. Remove the plug adjacent to the top plug to allow a vent point to assist the decanting process.



DO NOT use this plug to determine if the gearbox is full as this plug is too high and overfilling the gearbox will result in costly repairs and void warranty.



NOTE: IF YOUR UNIT IS LEAKING OIL AFTER YOU HAVE PERFORMED THE DAILY CHECKS CONSULT YOUR LOCAL AUTHORISED SERVICE AGENT.

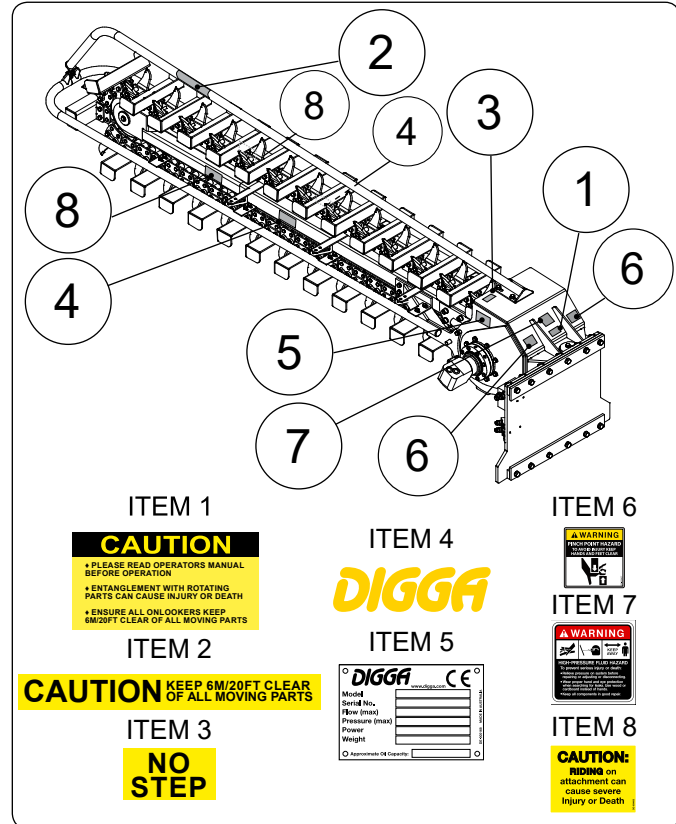
PLACEMENT / REPLACEMENT OF SAFETY SIGNS

1. Clean the area of application with non-flammable solvent, then wash same area with soap and water.
2. Allow the surface to fully dry.
3. Remove the backing from the safety sign, exposing the adhesive surface.
4. Apply the safety sign to the position shown in the diagram above and smooth out any bubbles.

INSTRUCTIONS

- Keep all safety signs clean and legible.
- Replace all missing, illegible, or damaged safety signs.
- Replacement parts for parts with safety signs attached must also have safety signs attached.
- Safety signs are available from your dealer or from Digga Australia.

ITEM	ORDER CODE	DESCRIPTION	QTY
1	DE-000039	CAUTION - PLEASE READ	1
2	DE-000034	CAUTION - 6M/20FT CLEAR	2
3	DE-000054	DECAL - NO STEP	1
4	DE-000047	DIGGA DECAL	2
5	DE-000168	DIGGA SERIAL TAG	1
6	DE-000437	PINCH POINT HAZARD	2
7	DE-000089	WARNING HIGH PRESSURE FLUID HAZARD	1
8	DE-000083	CAUTION- NO RIDING ON ATTACHMENT	2



11 SPARE PARTS

For further information on spare parts please contact one of the Digga sales office below your closest authorised Digga Dealer.

DIGGA INTERNATIONAL SALES OFFICES

ASIAPACIFIC

DIGGA HEAD OFFICE - BRISBANE

4 Octal St, Yatala QLD 4207

PH: (07) 3807 3330

FAX: (07) 3807 1499

EMAIL: info@digga.com

DIGGA NEW SOUTH WALES

Unit 2, 36 Bluett Drive,
Smeaton Grange NSW 2567

PH: (02) 4647 1400

FAX: (02) 4647 1433

EMAIL: nsw@digga.com

DIGGA VICTORIA

27 Metcalf Street
Dandenong, VIC 3175

PH: (03) 9706 6171

FAX: (03) 9706 6164

EMAIL: vic@digga.com

WEB: www.digga.com

NORTH AMERICA

DIGGA NORTH AMERICA

2325 Industrial Parkway SW
Dyersville IA 52040

PH: + 1 563 875 7915

WEB: www.diggausa.com

EMAIL: info@diggausa.com

EUROPE

DIGGA EUROPE

Unit 6, Smitham Bridge Road
Hungerford Trading Estate,
Hungerford, Berkshire RG17 0QU
England, United Kingdom

PH: +44 (0) 1488 688 550

WEB: www.diggaeurope.com

EMAIL: info@diggaeurope.com

CHAIN

TROUBLE	POSSIBLE CAUSE	REMEDY
Chain does not turn	Quick Coupler not completely engaged	Check and complete engagement
	Quick Coupler failure	Replace faulty coupler
	An obstruction in one of the hoses	Remove obstruction
	Hydraulic Motor failure	Repair or replace. Contact DIGGA dealer
	Chain drive failure	Check & repair. Contact DIGGA dealer
	Nose roller bearing failed	Replace bearing
	Conveyor chain too tight	Loosen chain tension
	Sand or spoil material build up in tooth root of sprocket	Raise, reverse chain & run to clear build up OR Loosen chain tension

CLEANING

TROUBLE	POSSIBLE CAUSE	REMEDY
Does not Clear Debris fast enough	Worn Teeth	Replace teeth if necessary
	Relief valve set below specifications	Test and reset if necessary
	Quick coupler or Hose restriction	Inspect and repair as needed
	Hydraulic system too hot	Shut down and cool
	Conveyor Chain too tight	Adjust to Proper Tension

HYDRAULIC OIL

TROUBLE	POSSIBLE CAUSE	REMEDY
Hydraulic oil overheating	Relief valve set too low on Parent Machine.	Test & set as needed.
	Restriction in Quick Release Coupler or hose.	Inspect and repair as needed
	Hydraulic Motor or hoses not size balanced to Parent Machine	Check flows and recommendations and change if necessary. (see DIGGA Dealer)
	Parent Machine not equipped with oil cooler or sufficient sump capacity	Stop and allow to cool naturally when it gets hot.

SLEWING OF DEBRIS CLEANER

TROUBLE	POSSIBLE CAUSE	REMEDY
Debris Cleaner does not slew	Faulty electrical harness OR Faulty Electrical Switch	Contact Digga
	Faulty electrical switch (If optional Plug 'n Go kit is in use)	Contact Digga
	Incorrect pinouts selected when using adaptor harness to 8-pin or to 14-pin plug (This could be the result if end user fitted the plug).	Contact an auto electrician to assist
	Solenoids on hydraulic valve faulty	Contact Digga
	No power on switch box (If optional Plug 'n Go kit is in use)	Check the 10A fuse on spiral power lead cigarette lighter plug is operational

WARRANTY

All new Digga products are warranted to be free from defects in materials or workmanship, for a period of twelve (12) months from date of original purchase, which may cause failure under normal usage and service when used for the purpose intended.

In the event of failure (excluding cable, ground engaging parts such as sprockets, digging chain, bearings, teeth, tamping and demolition heads, blade cutting edges, pilot bits, auger teeth, auger heads), if after examination, Digga determines failure was due to defective material and/or workmanship, parts only will be repaired or replaced. Digga may request defective product or products be returned prepaid to them for inspection at their place of business or to a location specified by Digga. The warranty will be considered void if the product or any part of the product is modified or repaired in any way not expressly authorised by Digga, or if closed components are disassembled prior to return. Closed components include, but are not limited to: gearboxes, hydraulic pumps, motors, cylinders and actuators. Any goods returned to Digga by the customer under warranty or repair must have all freight charges prepaid for on the customers account.

Any claims under this warranty must be made within fifteen (15) days after the Buyer learns of the facts upon which such claim is based. All claims not made in writing and received by Digga outside the time period specified above shall be deemed waived.

DAMAGE OR FAILURE THROUGH OPERATOR ABUSE OR NEGLIGENCE VOIDS WARRANTY

THIS WARRANTY IS IN LIEU OF ALL OTHER WARRANTIES EXPRESSED OR IMPLIED AND THERE ARE NO WARRANTIES OF MERCHANTABILITY OR OF FITNESS FOR A PARTICULAR PURPOSE. IN NO EVENT SHALL DIGGA BE LIABLE FOR CONSEQUENTIAL OR SPECIAL DAMAGE. DIGGA'S LIABILITY FOR ANY AND ALL LOSSES AND DAMAGES TO BUYER, RESULTING FROM ANY CAUSE WHATSOEVER, INCLUDING DIGGA'S NEGLIGENCE, IRRESPECTIVE OF WHETHER SUCH DEFECTS ARE DISCOVERABLE OR LATENT, SHALL IN NO EVENT EXCEED THE PURCHASE PRICE OF THE PARTICULAR PRODUCTS WITH RESPECT TO WHICH LOSSES OR DAMAGES ARE CLAIMED, OR, AT THE ELECTION OF DIGGA, THE REPAIR OR REPLACEMENT OF DEFECTIVE OR DAMAGED PRODUCTS.



Australian Designed and Manufactured