Operating Instructions and Parts Manual

Metal Bead Roller

Model BR-18E-24 and BR-18E-36

Baileigh Industrial
P.O. Box 531
Manitowoc, WI 54221-0531
Ph.: 920-684-4990
Fax: 920-684-3944
Baileigh-Sales@jpwindustries.com

BA9-1000923
BA9-1000924
Edition 3 08/2025

1.0 Table of Contents

2.0 Safety Instructions

⚠WARNING **Failure to follow these rules may result in serious personal injury**

1. FOR YOUR OWN SAFETY, READ INSTRUCTION MANUAL BEFORE OPERATING THE MACHINE. Learn the machine's application and limitations as well as the specific hazards.
2. Only trained and qualified personnel can operate this machine.
3. Make sure guards are in place and in proper working order before operating machinery.
4. Remove any adjusting tools. Before operating the machine, make sure any adjusting tools have been removed.
5. Keep work area clean. Cluttered areas invite injuries.
6. Overloading machine. By overloading the machine, you may cause injury from flying parts. DO NOT exceed the specified machine capacities.
7. Dressing material edges. Always chamfer and deburr all sharp edges.
8. Do not force tool. Your machine will do a better and safer job if used as intended. DO NOT use inappropriate attachments in an attempt to exceed the machine's rated capacity.
9. Use the right tool for the job. DO NOT attempt to force a small tool or attachment to do the work of a large industrial tool. DO NOT use a tool for a purpose for which it was not intended.
10. Dress appropriately. DO NOT wear loose fitting clothing or jewelry as they can be caught in moving machine parts. Protective clothing and steel toe shoes are recommended when using machinery. Wear a restrictive hair covering to contain long hair.
11. Use eye protection. Always wear ISO approved protective eye wear when operating machinery. Wear a full-face shield if you are producing metal filings. Eye wear shall be impact resistant, protective safety glasses with side shields which comply with ANSI Z87.1 specification. Use of eye wear which does not comply with ANSI Z87.1 specification could result in severe injury from breakage of eye protection.
12. Do not overreach. Maintain proper footing and balance at all times. DO NOT reach over or across a running machine.
13. Stay alert. Watch what you are doing and use common sense. DO NOT operate any tool or machine when you are tired.
14. Check for damaged parts. Before using any tool or machine, carefully check any part that appears damaged. Check for alignment and binding of moving parts that may affect proper machine operation.
15. Observe work area conditions. DO NOT use machines or power tools in damp or wet locations. Do not expose to rain. Keep work area well lighted. DO NOT use electrically powered tools in the presence of flammable gases or liquids.
16. Keep children away. Children must never be allowed in the work area. DO NOT let them handle machines, tools, or extension cords.
17. Keep visitors a safe distance from the work area.
18. Store idle equipment. When not in use, tools must be stored in a dry location to inhibit rust. Always lock up tools and keep them out of reach of children.
19. DO NOT operate machine if under the influence of alcohol or drugs. Read warning labels on prescriptions. If there is any doubt, DO NOT operate the machine.
20. Turn off power before checking, cleaning, or replacing any parts.
21. Be sure all equipment is properly installed and grounded according to national, state, and local codes.
22. Keep all cords dry, free from grease and oil, and protected from sparks and hot metal.
23. Inspect power and control cables periodically. Replace if damaged or bare wires are exposed. Bare wiring can kill! DO NOT touch live electrical components or parts.
24. DO NOT bypass or defeat any safety interlock systems.

Familiarize yourself with the following safety notices used in this manual:

⚠CAUTION This means that if precautions are not heeded, it may result in minor injury and/or machine damage.

⚠WARNING This means that if precautions are not heeded, it may result in serious injury or death.

⚠DANGER This means that if precautions are not heeded, it will result in serious or fatal, injury.

Save the Instructions

3.0 About This Manual

This manual is provided by Baileigh Industrial, covering the safe operation and maintenance procedures for a Baileigh Model BR-18E-24 and BR-18E-36 Metal Bead Roller. This manual contains instructions on installation, safety precautions, general operating procedures, maintenance instructions and parts breakdown. Your machine has been designed and constructed to provide consistent, long-term operation if used in accordance with the instructions as set forth in this document.

Technical Support handles questions on setup, operation, schematics, warranty issues, and individual parts needed. Our Technical Support department can be reached at 920-684-4990.

If there are questions or comments, please contact your local supplier or Baileigh Industrial. We can also be reached at our web site: www.baileigh.com.

Retain this manual for future reference. If the machine transfers ownership, the manual should accompany it.

⚠WARNING **Read and understand the entire contents of this manual before attempting assembly or operation! Failure to comply may cause serious injury!**

Register your product online -

https://baileigh.com/product-registration

4.0 Specifications

This bead roller is power driven and will form sheet metal up to 16 Gauge thickness mild steel (or equivalent). The Rotary machine is constructed of cast iron and steel ensuring minimum deflection of the workpiece during forming operations. Available die sets allow for the following operations to be performed: wiring, edging, ogee bead, single bead, and elbow edging.

Table 4-1

Model	BR18E-24
Stock Number	BA9-1000923
Motor and Electrical	
Power	110VAC
Motor HP	1/8hp (.09kw)
General Specifications	
Capacity	16ga.(1.52mm) mild steel
Throat Depth	24” (609mm)
Weights and Dimensions	
Shipping Dimensions (L x W x H)	61.8”” x 22.5” x 21.6” (1570 x 570 x 550mm)
Weight (Net/Gross)	172lbs. (78kg) / 227lbs. (103kg)
Based on a material tensile strength of *60000 PSI – mild steel	

Table 4-2

Model	BE18E-36
Stock Number	BA9-1000924
Motor and Electrical	
Power	110VAC
Motor HP	1/8hp (.09kw)
General Specifications	
Capacity	16ga.(1.52mm) mild steel
Throat Depth	36” (914mm)
Weights and Dimensions	
Shipping Dimensions (L x W x H)	61.8”” x 22.5” x 21.6” (1570 x 570 x 550mm)
Weight (Net/Gross)	172lbs. (78kg) / 227lbs. (103kg)
Based on a material tensile strength of *60000 PSI – mild steel	

⚠WARNING

Read and understand the entire contents of this manual before attempting assembly or operation. Failure to comply may cause serious injury.

5.0 Setup and Assembly

5.1 Unpacking and Checking Contents

Your Baileigh machine is shipped complete. Separate all parts from the packing material and check each item carefully. Make certain all items are accounted for before discarding any packing material.

⚠WARNING

SUFFOCATION HAZARD! Immediately discard any plastic bags and packing materials to eliminate choking and suffocation hazards to children and animals.

⚠WARNING

If any parts are missing, DO NOT place the machine into service until the missing parts are obtained and installed correctly.

5.2 Cleaning

⚠WARNING

DO NOT USE gasoline or other petroleum products to clean the machine. They have low flash points and can explode or cause fire.

⚠CAUTION

When using cleaning solvents work in a well-ventilated area. Many cleaning solvents are toxic if inhaled.

Your machine may be shipped with a rustproof waxy coating and/or grease on the exposed unpainted metal surfaces. Fully and completely remove this protective coating using a degreaser or solvent cleaner. Moving items will need to be moved along their travel path to allow for cleaning the entire surface. For a more thorough cleaning, some parts will occasionally have to be removed. **DO NOT USE** acetone or brake cleaner as they may damage painted surfaces.

Follow manufacturer's label instructions when using any type of cleaning product. After cleaning, wipe unpainted metal surfaces with a light coating of quality oil or grease for protection.

IMPORTANT: This waxy coating is NOT a lubricant and will cause the machine to stick and lose performance as the coating continues to dry.

5.3 Installation

IMPORTANT:

Consider the following when looking for a suitable location to place the machine:

- Overall weight of the machine.
- Weight of material being processed.
- Sizes of material to be processed through the machine.
- Space needed for auxiliary stands, worktables, or other machinery.
- Clearance from walls and other obstacles.
- Maintain an adequate working area around the machine for safety.
- Have the work area well illuminated with proper lighting.
- Keep the floor free of oil and make sure it is not slippery.
- Remove scrap and waste materials regularly, and make sure the work area is free from obstructing objects.
- If long lengths of material are to be fed into the machine, make sure that they will not extend into any aisles.
- **LEVELING:** The machine should be sited on a level, concrete floor. Provisions for securing it should be in position prior to placing the machine. The accuracy of any machine depends on the precise placement of it to the mounting surface.
- **FLOOR:** This machine distributes a large amount of weight over a small area. Make certain that the floor is capable of supporting the weight of the machine, work stock, and the operator. The floor should also be a level surface. If the unit wobbles or rocks once in place, be sure to eliminate by using shims.
- **WORKING CLEARANCES:** Take into consideration the size of the material to be processed. Make sure that you allow enough space for you to operate the machine freely.
- **POWER SUPPLY PLACEMENT:** The power supply should be located close enough to the machine so that the power cord is not in an area where it would cause a tripping hazard. Be sure to observe all electrical codes if installing new circuits and/or outlets.

5.3.1 Anchoring the Machine

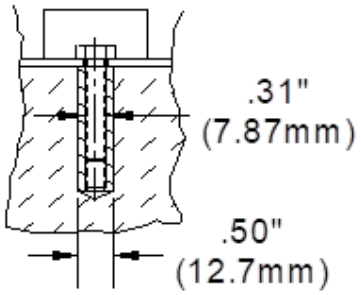


Figure 5-1

- Once positioned, anchor the machine to the floor, as shown in the diagram. Use bolts and expansion plugs or sunken tie rods that connect through and are sized for the holes in the base of the stand.
- This machine requires a solid floor such as concrete at a minimum of 4" (102mm) thick. 6" (153mm) minimum is preferred.

5.4 Assembly

⚠WARNING

For your own safety, DO NOT connect the machine to the power source until the machine is completely assembled and you read and understand the entire instruction manual.

Note: While one person using proper lifting techniques can assemble and lift the roller as needed, it is advisable to have and use an assistant.

1. Unpack the components from the shipping crate and place the stand in an open and solid location to allow for the assembly to be completed.
2. Place the bead roller head onto the stand into the mounting channel with the roll shafts over the tapered side of the base.
3. Gently press down on the roller shafts to rock the back of the roll head upward to align the bolt holes.

Figure 5-2

4. Insert a M12 x 70 hex head bolt (A) with M12 washer (B) into the channel hole placing the spacer washer (C) between the channel and the head body.
5. Lift up on the roll head to insert M12 x 70 hex head bolt (A), M12 washer (B) and spacer (C) into the front mounting hole.
6. ON the opposite side, install a spacer washer (C) between the channel and the head and then install the M12 washer (B) and M12 nut (D).
7. Tighten securely.

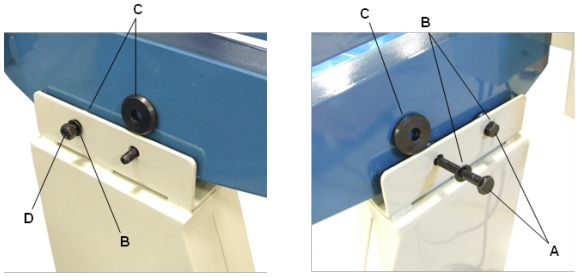


Figure 5-3

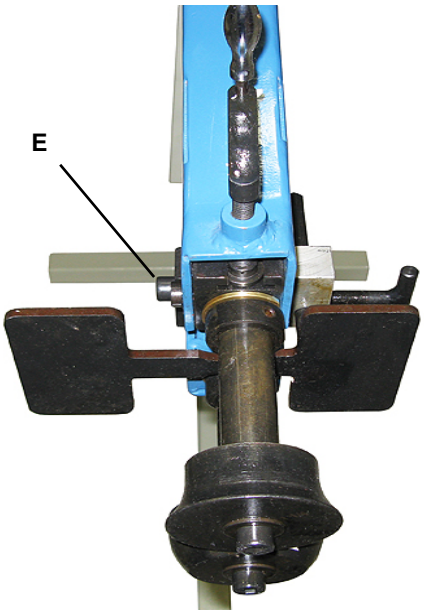


Figure 5-4

8. Remove the M10 x 40 socket head bolt (E) and clamping block from the material back stop and insert the back stop into the throat of the roller head.
9. Position the material stop where desired and snug the M10 x 40 socket head bolt (E) to hold the stop in position. Fine tune the material stop by loosening the T-handle bolt, positioning the material stop, and tightening the T-handle bolt.
10. Plug into the 110V volt power and test the operation.

6.0 Electrical Connections

⚠CAUTION

HAVE ELECTRICAL UTILITIES CONNECTED TO MACHINE BY A CERTIFIED ELECTRICIAN!

Check if the available power supply is the same as listed on the machine nameplate.

⚠WARNING

Make sure the grounding wire (green) is properly connected to avoid electric shock. DO NOT switch the position of the green grounding wire if any electrical plug wires are switched during hookup.

6.1 Power Specifications

Your machine is wired for 110 volts, 60hz alternating current. Before connecting the machine to the power source, make sure the power source is OFF.

Before switching on the power, you must check the voltage and frequency of the power to see if they meet with the requirement, the allowed range for the voltage is ±5%, and for the frequency is ±1%.

6.2 Considerations

- Observe local electrical codes when connecting the machine.
- The circuit should be protected with a time delay fuse or circuit breaker with an amperage rating slightly higher than the full load current of machine.
- A separate electrical circuit should be used for your machines. Before connecting the motor to the power line, make sure the switch is in the “OFF” position and be sure that the electric current is of the same characteristics as indicated on the machine.
- All line connections should make good contact. Running on low voltage will damage the motor.
- In the event of a malfunction or breakdown, grounding provides a path of least resistance for electric current to reduce the risk of electric shock. This machine is equipped with an electric cord having an equipment-grounding conductor and a grounding plug. The plug must be plugged into a matching outlet that is properly installed and grounded in accordance with all local codes and ordinances.

⚠WARNING

In all cases, make certain the receptacle in question is properly grounded. If you are not sure, have a qualified electrician check the receptacle.

- Improper connection of the equipment-grounding conductor can result in risk of electric shock. The conductor with insulation having an outer surface that is green with or without yellow stripes is the equipment-grounding conductor. If repair or replacement of the electric cord or plug is necessary, do not connect the equipment-grounding conductor to a live terminal.
- Check with qualified electrician or service personnel if the grounding instructions are not completely understood, or if in doubt as to whether the machine is properly grounded.
- Repair or replace damaged or worn cord immediately.

6.3 Extension Cord Safety

Extension cord should be in good condition and meet the minimum wire gauge requirements listed below:

Table 6-1

	Length		
Amp Rating	25ft	50ft	100ft
1-12	16	16	14
13-16	14	12	12
17-20	12	12	10
21-30	10	10	No
	Wire Gauge		

An undersized cord decreases line voltage, causing loss of power and overheating. All cords should use a ground wire and plug pin. Replace any damaged cords immediately.

6.4 Power Cord Connection

1. Turn the main disconnect switch on the control panel to the OFF position.
2. Unwrap the power cord and route the cord away from the machine toward the power supply.
   a. Route the power cord so that it will NOT become entangled in the machine in any way.
   b. Route the cord to the power supply in a way that does NOT create a trip hazard.
3. Connect the power cord to the power supply and check that the power cord has not been damaged during installation.
4. When the machine is clear of any obstruction. The main power switch may be turn ON to test the operation. Turn the switch OFF when the machine is not in operation.

7.0 General Bead Rolling

Bead rolling is both functional and artistic. The functional portion of this operation will add strength and rigidity to sheet material. The artistic portion will add aesthetic appeal to the design. Both operations require practice and experience to perfect.

When safety and machine capacity are considered, the remaining is open to the imagination and creativity of the metal worker.

- Never exceed the machine's capacity. Keeping in mind items like seams and hems increase the material thickness which may exceed the machine's capacity.
- Never handle material larger than you are able to comfortably control. Keep in mind that when the material is being rolled, the force of the roll will cause the material to move and twist. Use additional equipment such as back gauges, tables, and additional persons to support and secure materials as needed.
- Take several passes. Most beads will require several passes to obtain the desired depth. Planning and practice will assist with this. Practice on similar material to become familiar with how the material will react and to predict the number of passes and the depth of each pass.

8.0 Roller Installation and Removal

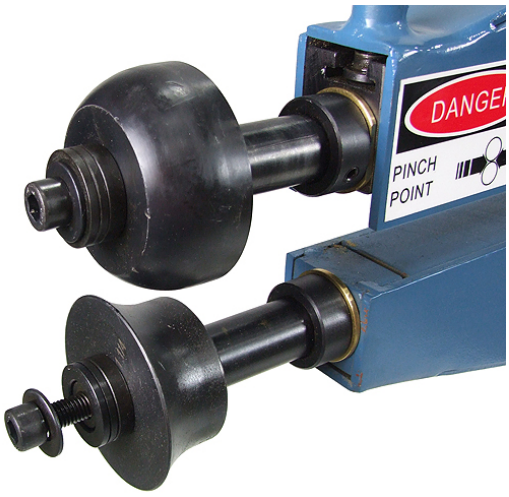


Figure 8-1

Note: Spoiler rolls (included with machine) shown. All other roll design installation is similar.

1. Use the handwheel to open the roll gap enough for the rolls to clear each other.
2. Remove the retaining bolt and washer.
3. Remove the spacer(s) and rolls.
4. Select and install the die set required for the desired bead type.
5. Place spacers, roll dies, and retaining bolts onto the driving and driven shafts.

Note: Conventional roll installation and spacer placement is shown above.

- Either roller can be top or bottom depending on your application.

Figure8-2

- Spacers may be placed in front of, in back of, or on either side of the roll die.
- The roll dies may be spaced exactly the same or in any variation of positions based upon the spacer thickness combinations.

6. Verify that the spacer and roll combination is thick enough to extend just longer than the shaft. This will allow for the bolt and washer to secure the roll.
7. Tighten the retaining bolts so that the washer secures the spacer and roll preventing the roll from spinning on the shaft.

9.0 Operation

⚠CAUTION

Always wear proper eye protection with side shields, safety footwear, and leather gloves to protect from burrs and sharp edges.

⚠CAUTION

Keep hands and fingers clear of the rolling dies. Be aware of how the material moves as it is being formed. Normally the operator should stand in front of the bead roller to avoid getting hit with the material as it is being formed. When handling large heavy materials make sure they are properly supported.

1. Unplug the power cord whenever changing dies.
2. Select and install the die set required for the desired bead type.
3. Use the handwheel to open the gap between the roll dies large enough to insert the material. Do not start with the rolls completely closed as you may find that the rolls are too close together and find it difficult to feed the material.
4. Set the depth gauge as desired to assist in positioning the material between the dies. This also assists in repeatability.

Figure 9-1

5. Place the Forward/Reverse switch in the desired position based upon direction of feed. Forward will feed material from right to left. Reverse will feed material from left to right.
6. When the material is positioned as desired, closed the gap between the rolls to start to impress the rolls into the material. This step may require some experimentation to get the proper depth, so it is recommended that you use a scrap piece of the same material you want to bead roll.

Note: Most beading operations will need to be done in several steps, increasing the depth on each pass. Trying to bead too deep will flex the machine, so take your time with multiple passes.

7. Lightly step down on the foot pedal while feeding the workpiece through the die set. Check the workpiece. It may be necessary to fine tune the adjustment to the depth of the bead to reach the desired bead depth.

Figure 9-2

8. When the material has been fed through the rolls for one pass, release the foot pedal and then, either remove the material if the bead is complete, or toggle the switch to the opposite directions and feed the material back in the opposite direction increasing the pressure on the rolls.
9. This may be repeated until the desired bead is achieved.

10.0 Material Selection

⚠CAUTION

It must be determined by the customer that materials being processed through the machine are NOT potentially hazardous to operator or personnel working nearby.

When selecting materials keep these instructions in mind:

- Material must be clean and dry (without oil).
- Material should have a smooth surface, so it processes easily.
- Dimensional properties of material must be consistent and not exceed the machine capacity values.
- Chemical structure of material must be consistent.
- Buy certificated steel from the same vendor when possible.

11.0 Understanding Springback

Springback, also known as elastic recovery, is the result of the metal wanting to return to its original shape after undergoing compression and stretch. After the bending leaf is removed from the metal and the load is released, the piece part relaxes, forcing the bent portion of the metal to return slightly to its original shape. The key to obtaining the correct bend angle is to over bend the metal a little and allow it to spring back to the desired angle. All metals exhibit a certain amount of spring back.

12.0 Maintenance

⚠WARNING

Make sure the electrical disconnect is OFF before working on the machine.

⚠WARNING

Maintenance should be performed on a regular basis by qualified personnel.

⚠WARNING

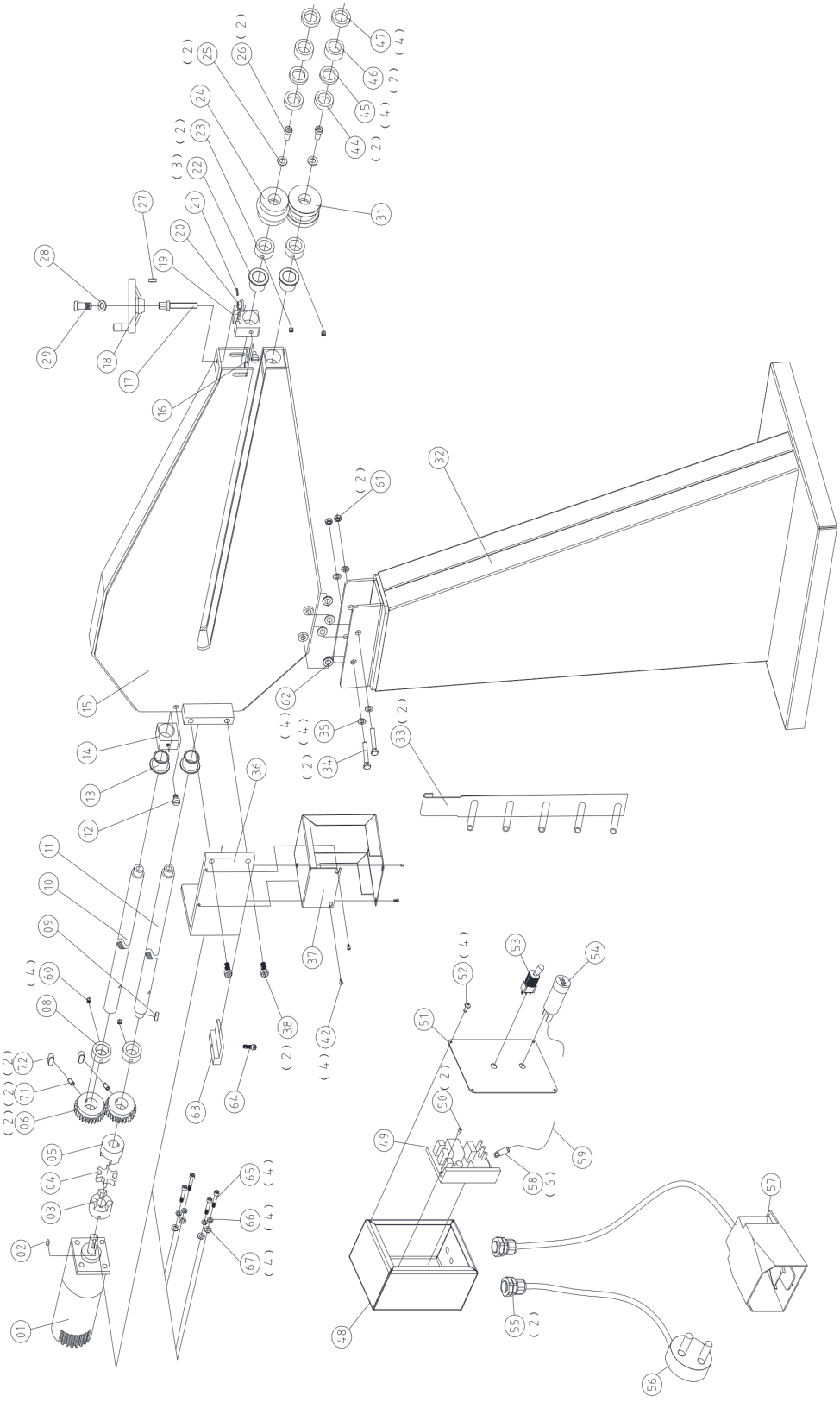
Always follow proper safety precautions when working on or around any machinery.

- Check daily for any unsafe conditions and fix immediately.
- Check that all nuts and bolts are properly tightened.
- On a weekly basis clean the machine and the area around it.
- Lubricate threaded components and sliding devices.
- Apply rust inhibitive lubricant to all non-painted surfaces.
- The adjusting block should be greased.
- Oil the driving shaft bronze bushings monthly with a drop or two of 30W or 40W oil.

Note: Proper maintenance can increase the life expectancy of your machine.

13.0 Replacement Parts

13.1.1 BR-18E-24 and BR-18E-36 Assembly – Exploded View



13.1.2 BR-18E-24 and BR-18E-36 Assembly – Parts List

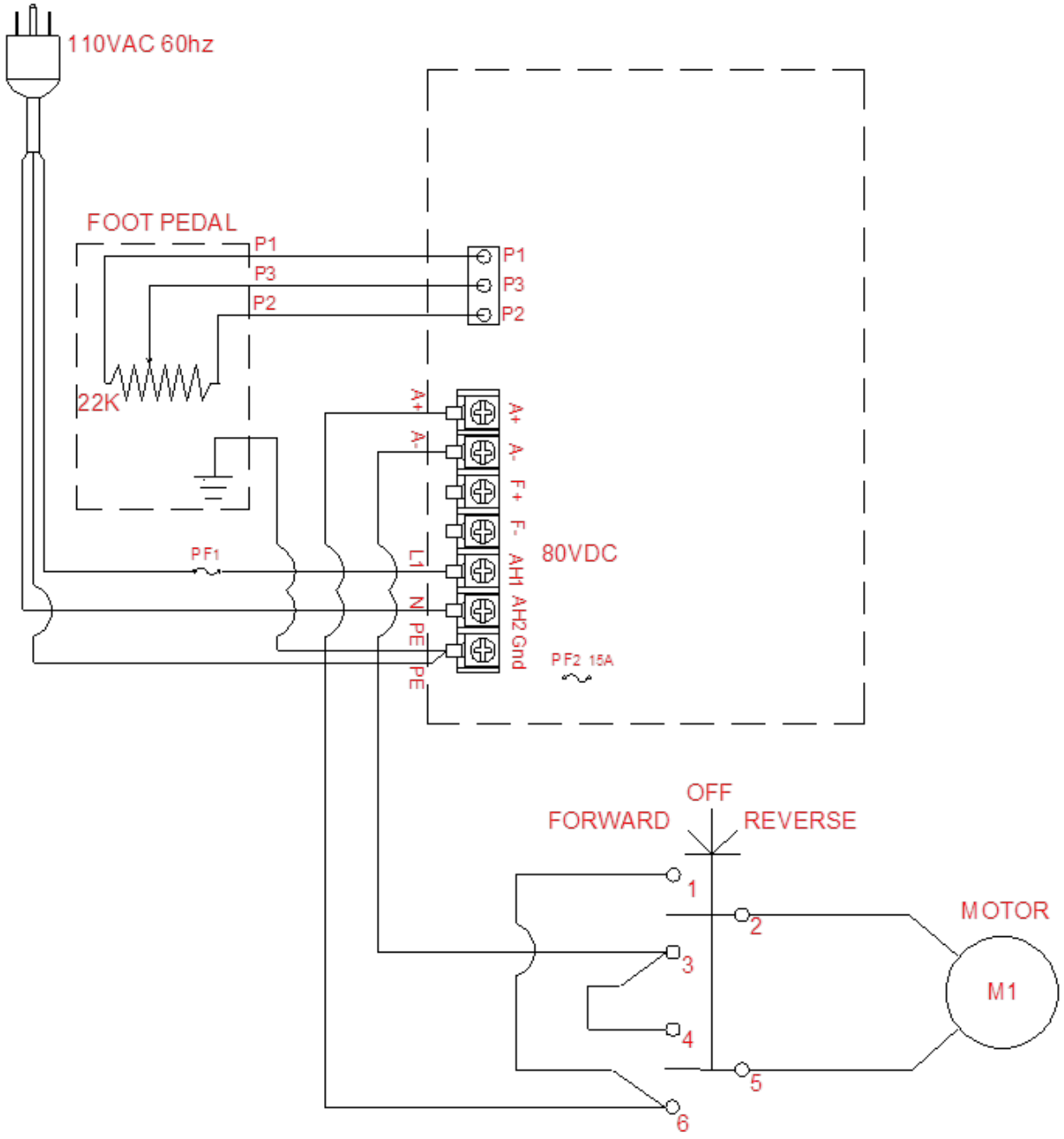
Index No.	Part No.	Description	Size	Qty.
01	BA9-1000933	Motor and Gearbox		1
	BA9-1015383	DC Motor Brush Cap (Black Plastic) 1pc		
	BA9-1014601	DC Motor Brush		
	BA9-1018551	DC Motor Brush Holder with Cap		
02	**	Flat Key	5X5X16	1
03	BA9-1019646	Coupler Hub		1
04	BA9-1000926	Coupler Cushioning Insert		1
05	BA9-1019646	Coupler Hub		1
	BA9-1019646	Coupler Hub and Cushion Assembly		
06	BA9-1000927	Gear		2
7.1	**	Socket Set Screw, Flat Point	M6X12	4
7.2	**	Flat Key	8X7X18	4
08	BA9-1022234	Check ring	26	2
09	**	Flat Key	6X6X20	1
10（24）	BA9-1010013	Top shaft		1
11（24）	BA9-1010014	Bottom shaft		1
10（36）	BA9-1010011	Top shaft		1
11（36）	BA9-1010012	Bottom shaft		1
12	BA9-1000914	Bolt	M8X7X9.9x5.5	1
13	BA9-1000915	Copper collar (B)		2
14	BA9-1000916	Upper shaft back block		1
15（24）	**	Roller Head Frame		1
15（36）	BA9-1021523	Roller Head Frame		1
16	BA9-1017426	Bolt	M8X7X9.9x5.5	1
17	BA9-1000917	Lead screw		1
18	BA9-1000918	Handle	Φ12X100	1
19	BA9-1000919	Upper shaft front block		1
20	BA9-1000920	Nut		1
21	BA9-1000921	Spring Pin	3X14	1
22	BA9-1000922	Cooper collar (A)		3
23	BA1-4421	Check ring	26	2
24	BA9-1000888	Top Bead Roll		1
25	JT9-5051911	Flat Washer	M10	2
26	JT9-TS-1505031	Socket Head Cap Screw	M10X25	2
27	**	Flat Key	4X4X12	1
28	**	Fender Washer	M6	1
29	CM9-TS-1503031	Socket Head Cap Screw	M6X12	1
31	BA9-1000888	Bottom Bead Roll		1
32	**	Stand		1
33	BA9-1013777	Roll hold		1
34	JT9-TS-1505031	Socket Head Cap Screw	M10X25	2
35	**	Flat Washer	M10	2
36	BA9-1224807	Motor Mount Plate		1
37	BA9-1017499	Shield		1
38	JT9-TS-1505031	Socket Head Cap Screw	M10X25	2
42	**	Socket Head Button Screw	M5X6	4
44	**	Bush 2		2
45	**	Bush 4		4
46	**	Bush 1		2
47	**	Bush 3		4
48	BA9-1000929	Electrical box		1
49	BA9-1000928	Control Board		1
50	BA1-4428	Socket Head Cap Screw	M4X12	2
51	BA9-1010846	Front sheet metal panel for switch and fuse		1
52	**	Pan Head MACH Screw	M4X12	6
53	BA9-1009648	Selector switch HY29D		1

Index No.	Part No.	Description	Size	Qty.
54	BA9-1010845	Fuse+holder		1
55	BA1-4430	Set screw	M16X1.5	2
56	BA1-4431	Plug		1
57	BA9-1000931	Foot Pedal		1
58	BA1-4432	Insulation terminal		1
59	BA1-4433	Core Wire		4m
60	**	Socket Set Screw, Cup Point	M8X6	4
61	BA1-4401	Hex Nut	M10P1.5	2
62	BA1-4436	Pad		4
63	BA1-4437	Block		1
64	JT9-TS-1502051	Socket Head Cap Screw	M5X20	1
65	JT9-TS-1503051	Socket Head Cap Screw	M6X20	4
66	JT9-TS-2361062	Lock Washer	M6	4
67	**	Flat Washer	M6	4

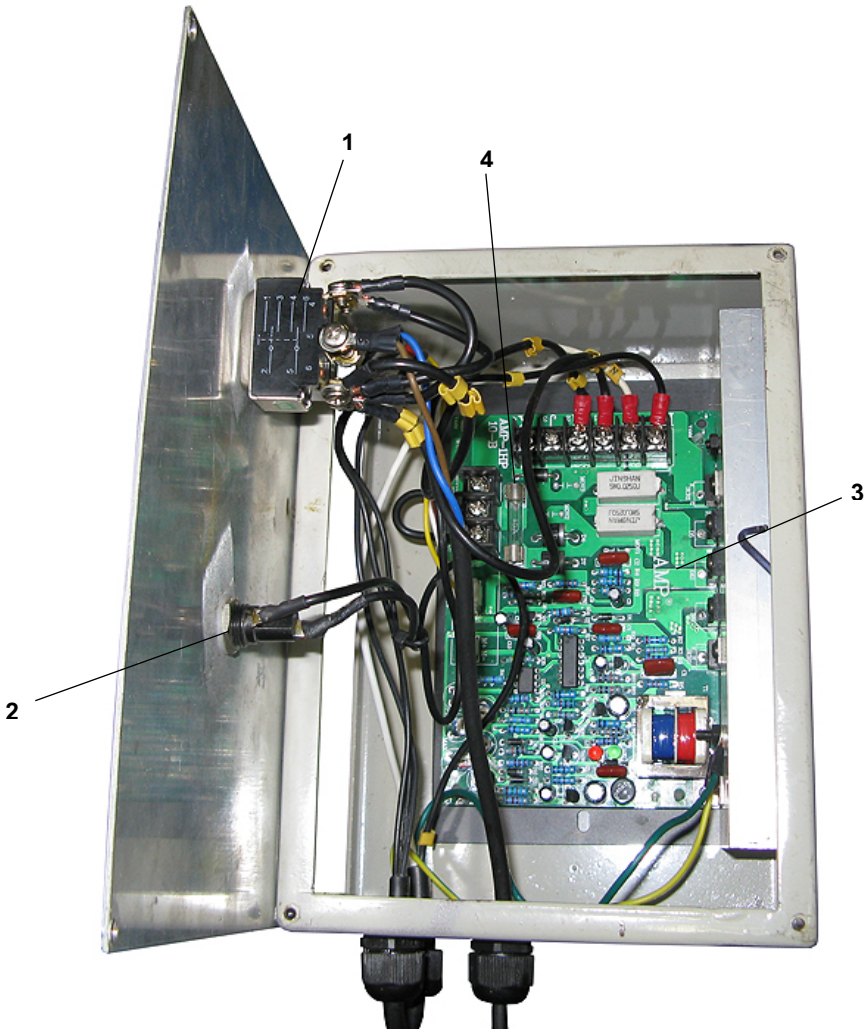
** These parts are shown for reference only and are not available for order individually. Non-proprietary parts, such as fasteners, can usually be found at local hardware stores.

14.0 Wiring Diagram

14.1 Electrical Schematic



14.2 Electrical Components



14.3 Electrical Components – Parts List

Index No.	Part No.	Description	Size	Qty.
1	BR18E-Switch	Selector Switch	HY29D	
2	BR18E-Fuse Holder	Main Power Fuse Holder	F15A 250V	
3	BR18E-Control Board	Motor Controller Board	AMP-1hp, 10-B	
4	4	Controller Fuse	F15AL 250V	
	BR18E-Foot Pedal Pot	Potentiometer (Foot Pedal)	22KΩ 2W	
	BR18E-Motor and Gearbox	Motor	1/8 hp (.09 kw) 90 VDC 1.8A	

15.0 Warranty and Service

Thank you for your purchase of a machine from Baileigh Industrial. We hope that you find it productive and useful to you for a long time to come.

Inspection & Acceptance. Buyer shall inspect all Goods within ten (10) days after receipt thereof. Buyer's payment shall constitute final acceptance of the Goods and shall act as a waiver of the Buyer's rights to inspect or reject the Goods unless otherwise agreed. If Buyer rejects any merchandise, Buyer must first obtain a Returned Goods Authorization ("RGA") number before returning any Goods to Seller. Goods returned without an RGA will be refused. Seller will not be responsible for any freight costs, damages to Goods, or any other costs or liabilities pertaining to Goods returned without an RGA. Seller shall have the right to substitute a conforming tender. Buyer will be responsible for all freight costs to and from Buyer and repackaging costs, if any, if Buyer refuses to accept shipment. If Goods are returned in unsalable condition, Buyer shall be responsible for full value of the Goods. Buyer may not return any special-order Goods. Any Goods returned hereunder shall be subject to a restocking fee equal to 30% of the invoice price.

Specifications. Seller may, at its option, make changes in the designs, **specifications**, or components of the Goods to improve the safety of such Goods, or if in Seller's judgment, such changes will be beneficial to their operation or use. Buyer may not make any changes in the specifications for the Goods unless Seller approves of such changes in writing, in which event Seller may impose additional charges to implement such changes.

Limited Warranty. Seller warrants to the original end-user that the Goods manufactured or provided by Seller under this Agreement shall be free of defects in material or workmanship for a period of twelve (12) months from the date of purchase, provided that the Goods are installed, used, and maintained in accordance with any instruction manual or technical guidelines provided by the Seller or supplied with the Goods, if applicable. The original end-user must give written notice to Seller of any suspected defect in the Goods prior to the expiration of the warranty period. The original end-user must also obtain an RGA from Seller prior to returning any Goods to Seller for warranty service under this paragraph. Seller will not accept any responsibility for Goods returned without an RGA. The original end-user shall be responsible for all costs and expenses associated with returning the Goods to Seller for warranty service. In the event of a defect, Seller, at its sole option, shall repair or replace the defective Goods or refund to the original end-user the purchase price for such defective Goods. Goods are not eligible for replacement or return after a period of 10 days from date of receipt. The foregoing warranty is Seller's sole obligation, and the original end-user's exclusive remedy, with regard to any defective Goods. This limited warranty does not apply to: (a) die sets, tooling, and saw blades; (b) periodic or routine maintenance and setup, (c) repair or replacement of the Goods due to normal wear and tear, (d) defects or damage to the Goods resulting from misuse, abuse, neglect, or accidents, (f) defects or damage to the Goods resulting from improper or unauthorized alterations, modifications, or changes; and (f) any Goods that has not been installed and/or maintained in accordance with the instruction manual or technical guidelines provided by Seller.

EXCLUSION OF OTHER WARRANTIES. THE FOREGOING LIMITED WARRANTY IS IN LIEU OF ALL OTHER WARRANTIES, EXPRESS OR IMPLIED. ANY AND ALL OTHER EXPRESS, STATUTORY, OR IMPLIED WARRANTIES, INCLUDING BUT NOT LIMITED TO, ANY WARRANTY OF MERCHANTABILITY OR FITNESS FOR ANY PARTICULAR PURPOSE ARE EXPRESSLY DISCLAIMED. NO WARRANTY IS MADE WHICH EXTENDS BEYOND THAT WHICH IS EXPRESSLY CONTAINED HEREIN.

Limitation of Liability. IN NO EVENT SHALL SELLER BE LIABLE TO BUYER OR ANY OTHER PARTY FOR ANY INCIDENTIAL, CONSEQUENTIAL OR SPECIAL DAMAGES (INCLUDING, WITHOUT LIMITATION, LOST PROFITS OR DOWN TIME) ARISING FROM OR IN MANNER CONNECTED WITH THE GOODS, ANY BREACH BY SELLER OR ITS AGENTS OF THIS AGREEMENT, OR ANY OTHER CAUSE WHATSOEVER, WHETHER BASED ON CONTRACT, TORT OR ANY OTHER THEORY OF LIABILITY. BUYER'S REMEDY WITH RESPECT TO ANY CLAIM ARISING UNDER THIS AGREEMENT IS STRICTLY LIMITED TO NO MORE THAN THE AMOUNT PAID BY THE BUYER FOR THE GOODS.

Force Majeure. Seller shall not be responsible for any delay in the delivery of, or failure to deliver, Goods due to causes beyond Seller's reasonable control including, without limitation, acts of God, acts of war or terrorism, enemy actions, hostilities, strikes, labor difficulties, embargoes, non-delivery or late delivery of materials, parts and equipment or transportation delays not caused by the fault of Seller, delays caused by civil authorities, governmental regulations or orders, fire, lightning, natural disasters or any other cause beyond Seller's reasonable control. In the event of any such delay, performance will be postponed by such length of time as may be reasonably necessary to compensate for the delay.

Installation. If Buyer purchases any Goods that require installation, Buyer shall, at its expense, make all arrangements and connections necessary to install and operate the Goods. Buyer shall install the Goods in accordance with any Seller instructions and shall indemnify Seller against any and all damages, demands, suits, causes of action, claims and expenses (including actual attorneys' fees and costs) arising directly or indirectly out of Buyer's failure to properly install the Goods.

Work By Others; Safety Devices. Unless agreed to in writing by Seller, Seller has no responsibility for labor or work performed by Buyer or others, of any nature, relating to design, manufacture, fabrication, use, installation, or provision of Goods. Buyer is solely responsible for furnishing and requiring its employees and customers to use all safety devices, guards and safe operating procedures required by law and/or as set forth in manuals and instruction sheets furnished

by Seller. Buyer is responsible for consulting all operator manuals, ANSI or comparable safety standards, OSHA regulations and other sources of safety standards and regulations applicable to the use and operation of the Goods.

Remedies. Each of the rights and remedies of Seller under this Agreement is cumulative and in addition to any other or further remedies provided under this Agreement or at law or equity.
Attorney's Fees. In the event legal action is necessary to recover monies due from Buyer or to enforce any provision of this Agreement, Buyer shall be liable to Seller for all costs and expenses associated therewith, including Seller's actual attorney fees and costs.

Governing Law/Venue. This Agreement shall be construed and governed under the laws of the State of Wisconsin, without application of conflict of law principles. Each party agrees that all actions or proceedings arising out of or in connection with this Agreement shall be commenced, tried, and litigated only in the state courts sitting in Manitowoc County, Wisconsin or the U.S. Federal Court for the Eastern District of Wisconsin. Each party waives any right it may have to assert the doctrine of "forum non conveniens" or to object to venue to the extent that any proceeding is brought in accordance with this section. Each party consents to and waives any objection to the exercise of personal jurisdiction over it by courts described in this section. Each party waives to the fullest extent permitted by applicable law the right to a trial by jury.

Summary of Return Policy:
• 10 Day acceptance period from date of delivery. Damage claims and order discrepancies will not be accepted after this time.
• You must obtain a Baileigh Industrial issued RGA number PRIOR to returning any materials.
• Returned materials must be received at Baileigh Industrial in new condition and in original packaging.
• Altered items are not eligible for return.
• Buyer is responsible for all shipping charges.
• A 30% re-stocking fee applies to all returns.
Baileigh Industrial makes every effort to ensure that our posted specifications, images, pricing, and product availability are as correct and timely as possible. We apologize for any discrepancies that may occur. Baileigh Industrial reserves the right to make any and all changes deemed necessary in the course of business including but not limited to pricing, product specifications, quantities, and product availability.

For Customer Service & Technical Support:
Please contact one of our knowledgeable Sales and Service team members at:
(920) 684-4990 or e-mail us at Baileigh-Service@jpwindustries.com

16.0 Notes

BAILEIGH INDUSTRIAL
1625 DUFEKDRIVEMANITOWOC, WI 54220
PHONE: 920.684.4990 FAX: 920.684.3944
www.baileigh.com