# **Revolution**







**Gravity-Feed Single-Action Airbrush** 

### **NEED ASSISTANCE?**

If you have any issues with this product, **call Iwata-Medea**before returning to your place of purchase.

503-253-7308

M-F 8am-4pm Pacific Time

Congratulations on your purchase of an Iwata *Revolution*™ **M SERIES** airbrush, a versatile, reliable and dependable airbrush. The Revolution was designed for the new airbrush user or hobbyist seeking Iwata's famous superior spray quality combined with multi-purpose versatility.

# VALUE, QUALITY & PERFORMANCE

distinguish these airbrushes as Revolution!



#### ONLY FROM IWATA-MEDEA

Iwata airbrushes are designed for demanding professionals. Modern precision machining and carefully selected materials used in the manufacturing process ensure consistent high performance and long life. Each Iwata airbrush is spray-tested before shipment to assure maximum performance and adherence to Iwata's strict quality standards. To maintain your Revolution at its peak performance, proper care and attention must be observed.

#### **IWATA REVOLUTION M SERIES MI AND M2**

The Iwata Revolution M Series features a single-action style trigger for simple operation. It's gravity-fed with internal-mix for superior spray results. The M Series airbrushes are perfect for airbrush cosmetics, body art, hobbies, models and other general applications.





#### Iwata Revolution HP-MI

- Single-action
- .3-mm needle/nozzle
- 1.5ml cup
- Designed for low pressure applications

#### Iwata Revolution HP-M2

- Single-action
- •.4-mm needle/nozzle
- 7ml cup
- Designed for low pressure applications

#### **GETTING STARTED**

#### Compressor

Choose an appropriate compressor for your Revolution M Series airbrush. The Iwata Sprint Jet and Smart Jet compressors are good beginner's choices and will provide approximately 20-30 psi of air pressure to the M Series.

#### **Assembly**

- 1. Screw the airhose onto the compressor.
- 2. Screw the airhose onto the airbrush.
- If using a Power Jet, Power Jet Lite or Power Jet Pro compressor, adjust the pressure to between 30 and 45 psi.
- 4. Check for any air leaks in the compressor or air hoses.
- 5. Place a few drops of cleaner into the gravity cup.
- 6. Point the airbrush away from you.
- 7. Turn the fluid adjustment knob counterclockwise for more paint and clockwise for less and press down on trigger.
- 8. Spray cleaning solution through the airbrush to rinse out any residual pre-testing pigment.

NOTE: When done spraying, close the fluid adjustment knob or paint may leak.

#### **GENERAL OPERATION**

#### Fine-Line Spray

- I. Depress the main lever to start air flow.
- 2. Position the airbrush close to the surface, between 1/16 and 1/2 inch is common.
- Twist the fluid adjustment valve slightly to start the flow of paint.

Line thickness can be controlled by adjusting the distance between the airbrush and the surface and also by varying the paint flow by manipulating the adjustment valve position.

An extremely narrow line can be obtained by carefully removing the needle cap (#1) and positioning the airbrush closer to the surface.

CAUTION: The needle and nozzle are very delicate. Even a slight bend on the tip of the needle can adversely effect the spray pattern.

#### Wide-Line and Background Spraying

- Depress the main lever.
   Position the airbrush further away from the surface, from 1/2 to 6 inches is common.
- 3. Twist the fluid adjustment valve back farther releasing more paint to cover the bigger area.

Increase the distance between the airbrush and painted surface to control the line's width. Increasing the air pressure will also effect the spray width. The Revolution's maximum usable line width is approximately 2-1/2 inches.

#### **GENERAL OPERATION**

#### Stippling

lwata airbrushes are designed to produce a wide range of stippling textures.

- I. Unscrew the needle cap.
- 2. Unscrew the nozzle cap.3. Adjust the air pressure between 5 and 50 psi.

Lower air pressure will give you coarse stipple whereas higher pressure will provide a fine stipple effect. Paint viscosity will also effect the stippling texture.

#### Air Pressure

For the Revolution, working pressures generally vary between 20 and 60 psi, depending on what type of work is being done and what textures are desired. A good working pressure may average around 25 psi. The viscosity of the paint and your

desired spray characteristics will also effect your ideal pressure. As a general rule, larger amounts of paint or thicker paints, will be sprayed with higher pressures.

WARNING: Do not exceed 100psi.

#### **Paint Preparation**

For non-specific airbrush paints proper preparation, including filtering the paint through a nylon mesh, is recommended for best performance. Paint should be thinned with its proper solvent. It is best to prepare paint relatively thin and make repeated passes across the work to achieve the desired shade. This will also improve the quality of your work and decrease the cleaning time of your airbrush.

#### **Safety Tips**

- · Always spray in a well-ventilated area.
- $\bullet$  Do not spray solvent-based (flammable) paints around open flames.
- Use the appropriate respirator to safely filter out the paint vapors particular to the kind of paint you are using.
- Wear eye protection to prevent paint contact with eyes.
- $\bullet$  Never use air pressure that exceeds the airbrush's limit. (98 psi)

#### **MAINTENANCE**

- I. Dump out the color cup's excess paint.
- 2. Rinse the cup with the appropriate cleaning solution.
- 3. Use a paper towel to wipe out any left-over paint.
- 4. Fill the bottom of the cup with cleaner.5. Spray cleaner until the spray is clear.
- 6.Add the next color to the color cup.
- 7. Repeat cleaning procedure when finished.

- I. Unscrew the adjuster valve from the airbrush body.
- Gently pull the needle straight out by twisting the needle counter-clockwise.
- 3. Fold a soft cloth damp with cleaner over the needle.
- 4. Rotate the needle to gently wipe the residual paint off.
- 5. Screw the fluid adjustment knob fully into the airbrush body.
  - Carefully insert the needle into the airbrush until it seats fully against the nozzle.
  - If the needle stops abruptly, retract and examine the trigger mechanism for proper assembly and re-insert the needle.
  - 7. Screw the adjuster valve back onto the airbrush body.

#### **MAINTENANCE**

#### **Before Each Session**

Spray water or the appropriate paint solvent through the airbrush to make sure the airbrush is working properly.

#### **After Each Session**

Or any time the airbrush becomes clogged:

- I. Increase the air pressure.
- 2. Spray cleaning solution for a short time.
- Clean the needle if necessaryCleaning the airbrush this way helps clean the paint passage, the nozzle and the needle thoroughly.

#### **Periodically**

To ensure smooth main lever action lubricate the needle and the main lever mechanism when necessary.

2. Remove the needle and adjuster valve.

I. Unscrew the adjuster valve.

- Coat the needle lightly with a high-quality lubricant, like Medea SuperLube by putting a small dab of SuperLube on the needle where the taper starts.
- 5. Re-insert the needle gently into the airbrush.
- 6. Screw the needle and adjuster until it stops.

Drip one drop of lube into the slot directly behind the main lever and as close to the main lever as possible. If trigger feels sticky going down, put a small amount of SuperLube on the shaft of the trigger.

**DO NOT** over-lube the needle or the main lever mechanism, since it is possible to transfer excess lube into the nozzle causing severe paint flow problems.

**DO NOT** use light machine oil or WD-40 for lubrication. These will cause the needle to stick as it moves through the needle packing o-ring.

**CAUTION:** If it becomes absolutely necessary to dismantle the airbrush remember that in most situations tools are not needed.

TROUBLESHOOTING PROCEDURES						
Symptom	Problem	Solution				
•Bubbles in color cup or bottle	•Loose nozzle cap	•Tighten finger tight				
	<ul> <li>Improper nozzle to body connection</li> </ul>	<ul> <li>See nozzle to reseat the nozzle</li> </ul>				
	•Cracked or damaged nozzle	•See nozzle to replace the nozzle				
•Double Line	•Dried paint on needle tip (Tip-Dry)	•See cleaning the needle				
	•Dirty airbrush	•See cleaning the airbrush between colors •See cleaning the needle				
	•Debris on nozzle tip	•See nozzle and clean nozzle with toothpick				
	•Bent needle	<ul> <li>See needle to replace needle</li> </ul>				
	•Cracked or damaged nozzle	•See nozzle to replace the nozzle				
•Not Spraying	•Reset needle	•See cleaning the needle				
	•Improper air pressure	•See specific compressor instructions to raise or lower the air pressure				
	•Paint too thick	•See paint preparation				
	<ul> <li>Clogged nozzle</li> </ul>	<ul> <li>See nozzle and clean nozzle with toothpick</li> </ul>				
	•Cracked or damaged nozzle	•See nozzle to replace the nozzle				

TROUBLESHOOTING PROCEDURES

TROUBLESHOOTING PROCEDURES					
Symptom	Problem	Solution			
•Skipping	<ul><li>Dried paint on needle tip (Tip-Dry)</li></ul>	<ul> <li>Clean with cotton swab dipped in cleaner</li> </ul>			
	<ul><li>Pigment too thick</li></ul>	•See paint preparation			
	•Air pressure too high	<ul> <li>See specific compressor instructions to lower the air pressure</li> </ul>			
	<ul> <li>Improper nozzle to body connection</li> </ul>	<ul> <li>See nozzle to reseat the nozzle</li> </ul>			
	•Dirty airbrush	<ul><li>See cleaning the airbrush between colors</li><li>See cleaning the needle</li></ul>			
	<ul> <li>Cracked or damaged nozzle</li> </ul>	•See nozzle to replace the nozzle			
•Spattering	<ul><li>Dried paint on needle tip (Tip-Dry)</li></ul>	•Clean with cotton swab dipped in cleaner			
	<ul> <li>Pigment build-up in needle cap</li> </ul>	<ul> <li>Unscrew and clean with cotton swab</li> </ul>			
	•Air pressure too low	<ul> <li>See specific compressor instructions to raise the air pressure</li> </ul>			
	<ul><li>Pigment too thick</li></ul>	•See paint preparation			
	•Dirty airbrush	•See cleaning the airbrush between colors •See cleaning the needle			
•Trigger sticks (up and down)	<ul> <li>Dried out air valve packing o-ring</li> </ul>	•Lube trigger shaft			
		5.5			

#### **REPLACEMENT PARTS AND ACCESSORIES**

#### Nozzle

In time, the nozzle may wear or be damaged and may need to be replaced.

- I. Unscrew the adjuster and needle.
- Screw the fluid adjustment knob fully out of the airbrush body.
- 3. Unscrew the nozzle cap.
- Unscrew the nozzle counter-clockwise with the provided wrench.
- 5. Screw the new nozzle into the airbrush body with your fingers. Put soft wax on threads of nozzle.
- 6. Slightly tighten the nozzle with the provided wrench.DO NOT OVER TIGHTEN!
- 7. Screw the nozzle cap onto the airbrush body.
- 8. Screw in the needle and adjuster all the way forward until it seats with the new nozzle.

**TIP:** Keep a spare nozzle on hand for unforeseen accidents.

#### Needle

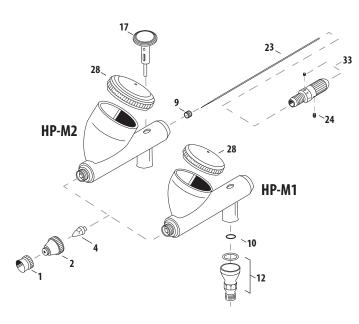
Iwata needles are made of precision ground and hardened stainless steel that will withstand prolonged usage. They are, however, subject to easy physical damage because of the long tapered, extremely fine tip. If the needle point becomes severely bent, it must be straightened before pulling it back through the nozzle. If not, the bent needle might damage the nozzle as it's pulled through.

TIP: Keep a spare needle on hand for unforeseen accidents.

#### **Quick Disconnect (Optional Accessory)**

A quick disconnect joint is screwed onto the airhose and a quick connect adapter is screwed onto each airbrush. When using multiple airbrushes the quick disconnect joint facilitates changing airbrushes on the same airhose quickly.

NOTE: Use jeweler's screwdriver to take apart.



## — IWATA REVOLUTION M SERIES AIRBRUSHES — MASTER PARTS LIST

#	ITEM DESCRIPTION		PRICE	ITEM	HP-M1	HP-M2	#	ITEM DESCRIPTION			
#	TIEM DESCRIPTION		CODE	#	HP-MI	HP-MZ	#	TIEM DESCRIPTION			
1	Needle Cap HP-M1	.3mm	A	I 701 4		x	17	Main Lever			
	Needle Cap HP-M2	.4mm	Α	I 701 5	х		23	Needle HP-M1	.3 mm		
2	Nozzle Cap HP-M1	.3mm	C	17024		х		Needle HP-M2	.4 mm		
	Nozzle Cap HP-M2	.4mm	C	17025	х		24	Needle Chucking Nut			
4	Nozzle HP-M1	.3mm	E	17044		х	28	Lid HP-M1			
	Nozzle HP-M2	.4mm	E	17045		х		Lid HP-M2			
9	Needle Packing Screw		В	I 725 4			33	Fluid Adjustment Valve			
10	Piston O-Ring		Α	I 145 1			32	Spanner		Spanner	
12	Air Valve Set		F	I 712 2							

			PRICE	ITEM		
#	ITEM DESCRIPTION		CODE	#	HP-M1	HP-M2
17	Main Lever		C	I 714 3		
23	Needle HP-M1	.3 mm	E	I 717 6		х
	Needle HP-M2	.4 mm	E	I 717 7	х	
24	Needle Chucking Nut		Α	I 715 3		
28	Lid HP-M1		C	I 718 3		х
	Lid HP-M2		C	I 718 4		х
33	Fluid Adjustment Valve		F	I 722 2		
32	Spanner		Α	I 765 1		

 $\blacksquare$  = yes x = no opt = optional

All Iwata airbrushes are *Warrauted* against all manufacturing defects of material and manufacture or workmanship for a period of FIVE years from the date of purchase. This warranty does not cover fluid needles or fluid nozzles since these parts need to be replaced occasionally due to normal wear. Any other part or material that is or becomes defective so as not to be usable within this period will be repaired or replaced. This warranty does not cover damage caused by negligence or airbrushes that have been altered or abused in any way. Call or email Iwata-Medea before returning an airbrush for the appropriate procedure for warranty repairs.



Genuine Iwata

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ANEST IWATA-MEDEA, Inc. • 1336 N. Mason St., Portland, OR 97217

tel: 503-253-7308 • fax: 503-253-0721 • info@iwata-medea.com