

“ It’s gotta work- now! ”

Maintenance of instruments for the Hectic BAND ROOM

What you **can** do for your Band Instruments-
Repairs, Maintenance, and Care

Woodwinds and Brass



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NOTE:

For our sessions in Chicago we presented a Power Point and explained that our handout was not the content of the slides, it was for them to use when they returned home. Our PPT will be available on our website www.redwingmusicrepair.org click on Band Instrument Repair and go to the resources link, then look for Chicago Midwest information.

Our handout consists of a grid that outlines common problems/issues, the tool(s) to utilize and the solutions for each. There is an additional page of tools and equipment that we recommend. We intend for you to laminate it, put it on cardstock and/or post it in a central location in the bandroom or in your office. Then you will have a quick reference, a straightforward approach for each issue, and a chart to help you solve it.

Our intent and focus is to remove the students' barrier to success. We hope these tips and approaches will help keep them playing- rehearsal, lesson, or concert.

Be sure to visit our website often. We will have videos, and more content ongoing to help you in your task of keeping them playing.

Here- to serve you!

Greg, John, Lucas

Problem	Actions Recommended	Actions to avoid
Amado waterkey stuck closed	Oil all access points, wait 1 hour, manipulate by hand	<i>Mallets or hammers</i>
Amado waterkey stuck open	Oil all access points, wait 1 hour, push/tap piston closed with pen/mallet	<i>Direct hits with mallets + screwdriver</i>
Bell or part is buckled over	Nothing	<i>Bending it back (creates tears)</i>
Instrument doesn't play	Inspection: <ul style="list-style-type: none"> Valves in the wrong order? Valve(s) in backwards? Valve guide(s) installed backwards? Yamaha large brass: Valve guide installed correctly on the piston (<i>vent hole vs. valve guide pin hole</i>)? Obstruction? 	
Mouthpiece shank dented	Mouthpiece truing tool	<ul style="list-style-type: none"> <i>Pliers and mallets</i> <i>Flaring the shank end</i>
Mouthpiece shank flared	Take to repair shop	<i>Pliers and vises</i>
Mouthpiece shank split	Nothing	<i>Shortening the shank by filing, grinding, or sanding</i>
Mouthpiece is stuck	Use quality mouthpiece puller	<i>Any twisting motion using:</i> <ul style="list-style-type: none"> <i>Door jams</i> <i>Pliers</i> <i>Vise</i>
Piston valve is stuck	<ul style="list-style-type: none"> Oil valve through the valve slide Wait one hour Attempt to release by hand 	<i>Driving the piston out from the underside with any tool</i>
Piston valve spins in casing	Inspection: <ul style="list-style-type: none"> Valve guide broken? Valve guide upside down? 	
Rotor bumper missing	<ul style="list-style-type: none"> With masking tape, roll a new bumper of approximate diameter Pencil eraser Waterkey cork/pad cut to fit 	
Rotor is stuck	<ul style="list-style-type: none"> Oil rotor Wait one hour Release by hand 	<ul style="list-style-type: none"> <i>Mallets alone</i> <i>Mallets w/screwdrivers, drum sticks, etc.</i>
Solder joint broken	Secure with a zip (cable) tie	<i>Super glue, epoxy, duct tape, masking tape, packing tape</i>
Trombone slide stuck	Attempt pulling apart by hand	<i>Pulling with braced feet</i>
Tuning slide stuck	Flex by hand	<ul style="list-style-type: none"> <i>Jerk pulling with a rag</i> <i>Hitting the crook with a mallet or hammer</i> <i>Pushing the slide with your feet</i> <i>Hitting the tubes with a mallet or hammer</i> <i>Grasping the crook with pliers</i>
Valve cap stuck	Tap lightly around the cap perimeter	<i>Grabbing with pliers, vise</i>
Valve cap stuck	<ul style="list-style-type: none"> 20 light mallet taps around the cap perimeter Leave the adjoining caps on 	<ul style="list-style-type: none"> <i>Pliers and vises</i> <i>Hard hits with mallets or hammers</i>
Waterkey cork/pad is missing	Self adhering synthetic pad, band-aid, masking tape pad	
Waterkey is bent/instrument is leaking	With smooth jaw pliers, return to position/replace cork if necessary	<i>Serrated jaw pliers, mallets</i>
Waterkey spring broken or missing	Secure with scrunchie or bread twist tie	<i>Rubber bands, masking tape</i>
Waterkey spring is weak	Bend back loop of spring	<i>Rubber bands, masking tape</i>

BRASS

WOODWINDS	Problem	Actions Recommended	Actions to avoid
	Clarinet Tenon Cork is Missing	<ul style="list-style-type: none"> Wrap tenon with masking tape and apply cork grease Wrap tenon with Valentino emergency tenon cork and apply cork grease 	<i>Using super glue, epoxy, or any other type of glue to reattach cork</i>
	Clarinet Pads are Sticky	Wipe tone hole and pad by inserting Yamaha pad paper between and pressing lightly, pull paper out	<i>Using chemical cleaners not designed specifically for pads</i>
	Clarinet Socket Rings are Loose	Take to repair shop	<i>Putting joints together, this may lead to a cracked socket</i>
	Clarinet Tenon Cork is Loose	Wrap with one layer of masking tape, apply cork grease	<i>Using super glue, epoxy, or any other type of glue to reattach loose cork</i>
	Clarinet Tenon is Stuck	Take to repair shop	<i>Putting in refrigerator Wiggling joints apart, this can lead to broken parts</i>
	Clarinet Tenon is Too Big for Socket	Make sure parts are from the same instrument	<i>Forcing together may cause serious damage</i>
	Clarinet Won't Play	<ul style="list-style-type: none"> Adjust A to Ab to have slight play when A is pressed Check for broken/chipped mouthpiece 	
	Damaged Tenon of Any Kind	Nothing	<i>Forcing together causing more damage</i>
	Flute Head Cork is Loose	Wrap with masking tape and apply a small amount of cork grease	
	Flute Pads are Sticky	Wipe tone hole and pad by inserting Yamaha pad paper between and pressing lightly, pull paper out	<i>Using chemical cleaners not designed specifically for pads</i>
	Flute Won't Play	Check to see that trill key springs are in place	
	Key Guard Screws are Missing	<ul style="list-style-type: none"> Replace with small pipe cleaner Replace with bread wire tie 	<i>Using wrong guard screw; many manufactures use proprietary screws</i>
	Metal Tenon is Sticky	<ul style="list-style-type: none"> Clean with alcohol and a clean rag <ol style="list-style-type: none"> Rubbing alcohol may be used Alcohol based mouthpiece sanitizer may be used 	<i>Using any abrasives (sandpaper) to remove gunk</i>
	Sax Neck Cork is Missing	<ul style="list-style-type: none"> Wrap neck with masking tape and apply cork grease Wrap neck with Valentino emergency neck cork and apply cork grease 	<i>Using super glue, epoxy, or any other type of glue to reattach cork</i>
	Sax Neck Won't Tighten	Check to see if neck screw is in <i>properly</i>	<i>Over tightening neck screw, this could cause it to break</i>
	Sax Only Plays High	<ul style="list-style-type: none"> Check to see if octave mechanism is adjusted properly Neck key should be closed when at rest Make sure springs on upper keys are hooked. Check High E or High F# 	
	Sax Pads are Sticky	Wipe tone hole and pad by inserting business card between and pressing lightly, pull card out	<i>Using sandpaper to clean tone hole</i>

Recommended Tool/Supply List		
Tool/Item	Supplier(s)	Part # (when applicable)
Screw Drivers	Music Medic	By size: A-F
	Ferrees Tools Inc.	F66, F67, F68, F72
Round Nose Pliers	Music Medic	Smooth Round Nose Pliers
	Ferrees Tools Inc.	J20SS
Flat Nose Pliers	Music Medic	Light Flat Nose Pliers
	Ferrees Tools Inc.	Sm Duck Bill Pliers – J22SS
Spring Hook	Music Medic	Double Sided Spring Hook
	Ferrees Tools Inc.	D1A, D1B
Screw Driver and Pad Prick Set	Music Medic	(order by description)
Mouthpiece Brush-Brass	Ferrees Tools Inc.	022
	Woodwind Brasswind	Multiple makes available
	Musicians Friend	Multiple makes available
	Your Local Music Store	Multiple makes available
Mouthpiece Brush- WW	Ferrees Tools Inc.	021
	Woodwind Brasswind	Multiple makes available
	Musicians Friend	Multiple makes available
	Your Local Music Store	Multiple makes available
Flexible Cleaning Brushes- Brass	Ferrees Tools Inc.	07A-French Horn 09A-Trombone 09B-Tpt/Cornet
	Woodwind Brasswind	Multiple makes available
	Musicians Friend	Multiple makes available
	Your Local Music store	Multiple makes available
Woodwind- emergency replacement pads, neck and tenon corks Brass- waterkey cork replacements	Woodwind Brasswind	Valentino Teachers Repair kit #97343
	Musicians Friend	Valentino Teachers Repair Kit
Piston Brass Top Cap and Stem Felts	Local repair shop	Ask for most common sampling
Brass Mouthpiece Puller	Woodwind Brasswind	Bobcat or similar operational
	Musicians Friend	
	Your Local Music Store	
Brass Mouthpiece Truing tool	Woodwind Brasswind	#126328
“Spit” Balls	Woodwind Brasswind	Herco® Brand Spit Balls
	Musicians Friend	
	Your Local Music Store	
Yamaha Flute Pad Paper	Your Local Music Store	Yamaha product
Brass Instruments Valve Oils- Piston, Rotor	Woodwind Brasswind	Various Types and Brands
	Musicians Friend	
	Your Local Music Store	
Brass Instruments Tuning Slide Grease	Woodwind Brasswind	Selmer Brand
	Musicians Friend	
	Your Local Music Store	
Rotor Valve String	Ferrees Tools Inc.	French Horn Cord D40A
	Woodwind Brasswind	Yamaha yellow string 114317
Pipe Cleaners/Wire Swabs	Grocery- Drug Store – Craft Store	Various Brands
Clean Rags - non shedding	Hardware/Home Center	
Plastic Bag twist/Wire Ties	From your “kitchen”	You pick! bread, veggies, etc.
Hair “scrunchies” or “binders”	Dept Store, Drug Store	Various Brands/Types
Zip/Cable Ties	Hardware store etc.	Various Brands/Types
Masking Tape	Hardware/Grocery/Home Center	Painters Type (easy release)
Cotton Swabs		
Band Aids		
“Matte” Finish Business Cards		
Paper Clip		