

# SHARING TOOTHBRUSHES ON STAGE!!!



## Church Sound Systems

### & Church Acoustics

Articles Series

Website: [www.jdbsound.com](http://www.jdbsound.com):

Email: [jdb@jdbsound.com](mailto:jdb@jdbsound.com)

August 2006

By Joseph De Buglio

Do you share toothbrushes at home?

Singing on stage is a great experience. It is uplifting and spiritual. Being on stage makes us all performers. This is also true for ministers and laypeople. The instrument of choice to project your voice to a large room of people is a microphone that is connected to a sound system.

Microphones come in all kinds of shapes and sizes. They are used in one of several common ways. Microphones are either static, handheld, or worn on the body. There are also other types of microphones used as pickups for guitars and pianos. A microphone is nothing more than speakers in reverse.

In general, microphones used for singing or talking are mounted in a barrel or rod. Depending on the size of the microphone capsule between the output of the mic and the output of the barrel, there are circuits that are either passive or active to boost the output and created the desired frequency response. Some mics are so small that they go from mic to barrel and out to a pair of wires right away. Then within 10ft or so, a balancing circuit is placed into the barrel of the mic connector before the signal is sent to a mixer or recording device.

The three most common microphones used are handheld and static microphones on lecterns or microphone stands and body mics. Many of these microphones have foam windscreens that are replaceable. Did you know that every microphone has a personality?

Some mics are ideal for bass singers. Some microphones are great for people who scream out their music. Every professional-quality microphone model has unique characteristics, and within each model, there are subtle differences. Just as when you play three pianos that look the same, one of them will be better for that performer. It is the same with Guitars, Violins and so on. It is also true with microphones.



(Try sitting in on a recording session at a high-end recording studio. Some studios have every type and model of microphone that has ever been made to meet the artist's needs.)

Sadly, there are only a few performers who travel around with personalized microphones. Performers like Crystal Gale or Wayne Newton have personal mics, and they also have custom finished colored sleeves and windscreens to match the clothing they wear. Many people who see these custom microphones, they frequently think the performer as having a big ego. What's wrong? Isn't the microphone the sound company supplies not good enough?

But wait, microphones are musical instruments. They are an extension of the singer or minister. People don't say much when musician customize their guitars and drum sets. In fact, people try all the time to get copies of such instruments. So what is so wrong with people doing the same with microphones? Singers should have personalized microphone they bring from show to show. Here is the reason why.



How often do you hear of concerts that are canceled because the leading performer had a bad flu, cold, or throat problem? I am sure we all have heard of such events. Did you ever wonder how they might be getting sick? Do you ever wonder how ministers who travel from church to church gets sick or why they get sick so often?

All microphones are used in front of our mouths. People spit on them, sneeze on them and handle the microphone from the top down. If the person before you is sick, all of those germs and viruses can be passed on, even up to 48 hours after it was last used. It can be longer, too – depending on how wet the windscreen gets or how old the windscreen is. Did you know that there is no way to clean a microphone for germs properly except to replace the windscreen?

At my church, there has been a number of times where everyone on the praise team would get sick. This most often happens where there are worship services back to back. It seems that one week one person has strep throat. The next week, three members of the team are sick with the same problem. This cycle continues until everyone gets sick. For some churches, it seems like there is someone always getting sick in the worship team.

Here is some info about viruses and bacteria and how there are transmitted. These are excerpts from the Mayo Clinic.

*“The length of time that cold and flu viruses can survive outside the body on an environmental surface varies greatly. But the suspected range is from a few seconds up to 48 hours, depending on the specific virus and the type of surface.*

*Flu viruses tend to live longer on surfaces than cold viruses. Also, it is generally believed that cold and flu viruses survive for longer periods on nonporous surfaces — such as plastic, metal or wood — than they do on porous surfaces — such as fabric or paper.*

*Although cold and flu viruses primarily spread from person-to-person contact, they can also spread from contact with contaminated objects or surfaces. The best way to avoid becoming infected with the cold or flu virus is to wash your hands frequently with soap and water or alcohol-based hand sanitizer.*



*Other tips for staying healthy during cold and flu season includes:*

*Get a flu shot. This is one of the most effective ways to prevent influenza.*

*Regularly clean your desk, phone, and computer keyboard and mouse — at home and at the office — with disinfectant sprays or wipes.*

*Stay home if you're sick. Don't expose others to your germs by dragging yourself to the office, theater or Church meeting.*

*The cause of strep throat is bacteria known as *Streptococcus pyogenes*, or group A beta-hemolytic streptococcus. Streptococcal bacteria are highly contagious. They can spread through airborne droplets when someone with the infection coughs or sneezes. You can also pick up the bacteria from a doorknob or other surface and transfer them to your nose or mouth. Kitchen utensils and bathroom objects are other common sources of infection transmission.*

#### *Prevention*

*Proper hand cleaning is the best way to prevent all kinds of infections. That's why it's important to clean your own hands regularly using soap and water or an alcohol-based hand sanitizer. In addition, don't share drinking glasses or eating utensils. Wash those items carefully in hot, soapy water or in a dishwasher."*

This means that items like microphones should be cleaned after every worship service. Better yet, don't share your microphones. If you do, it is like share your toothbrush. I think it is high time that singer take their craft more seriously and consider their health when performing. I myself have been bringing my own microphone from lectures to seminars for years. Every few months I change the windscreen, which costs about as much as a toothbrush and wipe the barrel down after each use with alcohol hand wipes. But I have not been doing that for sanitary reasons, I just like the way I sound on that microphone, and I take care of it the same way a musician takes care of their instrument.

I think it is high time to re-think the way we use microphones in general. If you are concerned about your health, don't feel embarrassed to use a piece of plastic over a public telephone mouthpiece or cell phone. If you want to cut down on the number of colds you get, you should change the way you use microphones – especially if you a minister or performer.

Ministers and singers should be making the same investment as musicians do and personalize the microphone. They don't cost much. A Shure SM58 costs around \$100.00, and a high-end microphone like an AKG 451 costs about \$600.00. Yes, I know these are older mic models, but I still like the way they sound. A professional mic used by one person can last 20 years or longer.

Whether you are a singer in a praise team, singing to tracks from church to church, or do Church concerts, you should be bringing your own microphone with a 25 ft cord. You should have a case for the mic, replacement windscreens, and mini wipes to clean your mic after each performance. You should also

have your name etched into the barrel or even have the barrel custom finished. You could also use colored tape. I know of one person who uses an embossed silver coated wallpaper for the barrel of the mic with a custom mic clip.

This also goes for lapel mics and headset mics too. If anything, there is a greater need to personalize them as the mic is so close to the mouth that the capsule can remain moist for days. A light alcohol spray should do the trick.

In writing this article, I did not check with any of the mic companies to ask them about cleaning their mics. However, I did check with a number of churches and have a number of personal experiences of people getting serious colds, flu's and streptococcal infections that never seemed to go away or passed on too quickly within a worship team, gospel group or ministers at a seminar. I can ever recall at a Church Convention of 2000 minister where after a week, all of the main guest speakers came down with colds after the first guest speaker sneezed onto the lectern microphone 10 minutes into his sermon. At the end of the week, all 9 ministers went home with serious cold.

If you perform in public and use your voice as an instrument, you should be doing whatever you can to take care of it. You should seriously look at getting yourself a personal microphone – if for nothing else, do it for your health. This is a great way to get out of sharing toothbrushes. Microphone etiquette should include personalized microphones.

#### Foot Note: Contributions

1: I've been told by a couple mic manf. That every week you should wash the windscreens in mild soapy water – squeeze them out, then give them a quick bath in Listerine, squeeze out – and “hang” to dry until they're used again. The soap cleans off the gunk, the Listerine sanitizes just like it does in your mouth.

2: There was a story about Elvis when recording – all morning they did take after take, none sounded right. During lunch, someone pulled the windscreen off his special mic, rinsed it in the sink – to find a bunch of black junk coming out of it. Did that a few times, put it on a low-heat hair dryer, put it back on the mic. After lunch, Elvis “hit it” with just one take.

From Blake Engel, All Church Sound

3: Can you imagine how dirty and contaminated all those microphones are at a fast-food drive-through? I wonder how often people are missing work because they pass on their colds and flu's back and forth week after week after week? Windscreens should be changed as often people change rubber gloves in a hospital. I wonder how often those people with the headsets at the fast food places pass on colds to people picking up their food from that small window that is blowing air out all the time.

4: In case you are wondering, the inspiration for this article came from a worship leader last Sunday. Before even starting to lead the worship service, he announced to everyone that he was diagnosed with strep throat the day before, and he was concerned that his voice would not be up to par because of it. Three different people sang from the same microphone before the worship service was over. One of them already have strep throat. How many times has this happened, and then we wonder how some people get sick at church all the time.