K3KLC Echolink Guide

147.420 MHz

K3KLC-L is a two meter simplex station that is interfaced to the internet using the Echolink software. The common term for this kind of set up is "link station", hence the (-L).

CTCSS (sub-audible tone) is NOT required to access the link radio. It cannot be 'ka-chunked', it can however be interrogated. To determine what stations are connected, dial in 147.42 MHz simplex and send touch tone 08. The link station will report its connections. If there are no connections (a rare state), you can hit star and, if the link is hearing you, it will identify (k3KLC EL at 20 wpm); always try 08 first.

The link does not identify when idle (it can, but I feel like that is misuse of a simplex channel).

There are a number of touch tone commands and there are no "secret codes". Anywhere I could leave anything at the default, I did. All users are welcome to experiment with the link. With that in mind, my only request is that you not connect to a busy repeater and leave it connected (you need to think about this before connecting, since the carrier may not drop for a very long time, and since we are simplex, the link station has to be receiving before you can command a disconnect (#). Also, with decent propagation, the link transmitter can reach to Southern Pennsylvania. Filling the frequency with repeater traffic isn't a nice thing to do to those who may want to use .42 for local chatter.

Why does the link exist: I use echolink to loosely network with several friends. The K3KLC node (another name you will hear used to describe a link station) is almost always connected to KB4RA-L, in Greenwood SC. Allan runs his link on 147.42, as well. Why do we connect? He is an old Navy friend and we talk on our way to work, on those days that our schedules overlap. Allan is a budding VHF enthusiast. Another regular is K3JYD. Fletcher is typically connected from his computer in Points WV. Fletcher and I share many interests and use Echolink to coordinate all manner of VHF experimentation (and yes, we just shoot the bull too). KJ4WAS is another regular. Jim keeps watch over local mobiles that might show up on .42 looking for a QSO. Jim probably spends more time actually monitoring the link than anyone.

So what can you do with the K3KLC-L? To start with, you can test your equipment or your mobile installation (including doing a maximum range test as you drive away from Leonardtown). To execute a one time test, or a longer "maximum range run", use DTMF ## to disconnect all stations (nobody cares if you do this, unless of course, there is a QSO in progress). Then transmit DTMF 9999 and you will be connected to the "Echo Server". Every subsequent transmission you make will be played back to you via the link transmitter. To end your test, just hit # (you may have to try # several times, if you're out near maximum range). Note that because this is not a repeater, not all other mobiles or fixed stations that might be monitoring will be able to hear everyone else who is on board. Someone may come along, find the link connected to the echo server and "fix it" by disconnecting and reconnecting some distant node. Don't feel bad if this happens. No one is intentionally trying to interrupt your test, they simply may find the link in a state that doesn't make sense to them and set up a more conventional state.

You may want to use the link to access distant link and repeater stations and keep schedules with friends who are traveling. The latter is great fun, but takes some coordination. I have worked Fletcher on 147.42 simplex (locally); on the AA3RG repeater (east central Pennsylvania); and on a Binghamton, NY area repeater, all on the same afternoon. To reach distant link or repeater stations, you can use their node number (mine is 385805), or I can create touch tone short cuts, so you can easily connect while operating mobile in the local area (301-994-9732). Active node numbers can be found on the internet.

Here are the common DTMF commands that are implemented in K3KLC-L:

FUNCTION	CODE	NOTES:
Disconnect	#	Disconnects last connection
Disconnect all	##	Disconnects everything
Disable Link	C0	Where 0 = zero
Enable link	C1	
Identify	*	When there is no connection
List connections / link status	08	
Connect to a random Link station	01	These can be fun (or not)
Connect to a random Repeater	00	These can be fun (or not)
Connect to a random computer station	03	These can be fun (or not)
Standing DTMF shortcuts:		
AA3RG-R	A12	146.04 / 64 repeater in Pine Grove PA
K3JYD	B2	
KB4JNK-R	C22	This connects you to the two 220 MHz
		repeaters run by KG4HOT in
		Charlottesville. The link station is often
		noisy and the audio is suboptimal
KB4RA-L	A2	
KJ4WAS	B1	
N3RO-L	A35	This is a link station in Frederick (run by
		Richard Ogdena nice guy, should
		you work him)
W3ICF-R	A33	This is the 146.16 / 76 repeater in
		Frederick. Phil W3ICF monitors
		faithfully
WB3GXW-R	A31	147.225 repeater in Silver Spring. John
		(owner) is a strong Echolink proponent
K3YYG-R	A32	NIH repeater

NOTE: I will add a shortcut to any repeater, link or computer station that you'd like to use.

Hams world-wide can use their Internet connection to link inbound to the 147.42 link node and work a local simplex station. For that reason, I'd like to encourage everyone to monitor .42. Put it in your scan rotation. You will work foreign hams, old timers and often you will work folks who have passed their exam, but not yet obtained any radio hardware. Echolink is a tremendous way to introduce these folks to on the air procedures and give them some 'Elmer' guidance.

Also, download the Echolink software and get it working in your laptop or smart phone. Then, should you find yourself TAD and wishing to contact the troops back home, connect to the node and you're on .42, right here in St. Mary's. Heck...you'll be able to sit in your hotel room and work through a repeater in Abu Dhabi...

Questions: Call me...

Sam K3KLC

17 January 2012