

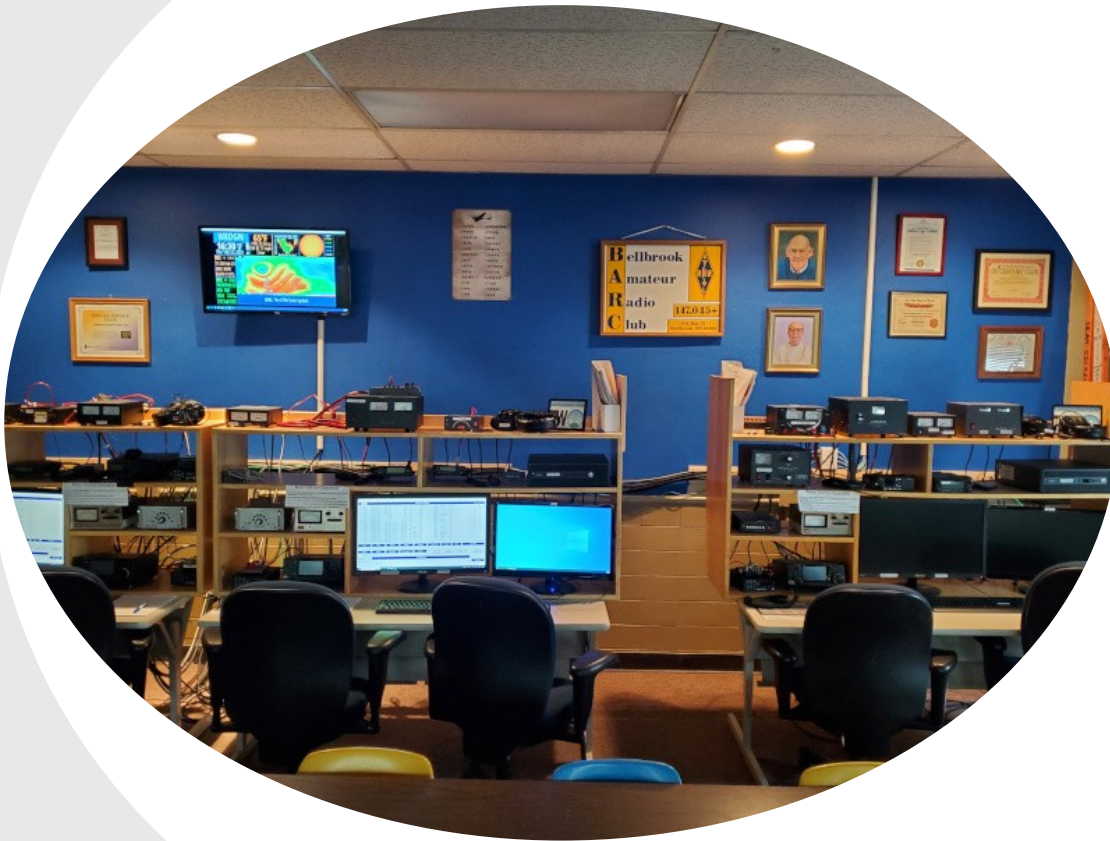


BARC COMMUNICATION CENTER

BARC MEMBERSHIP MEETING

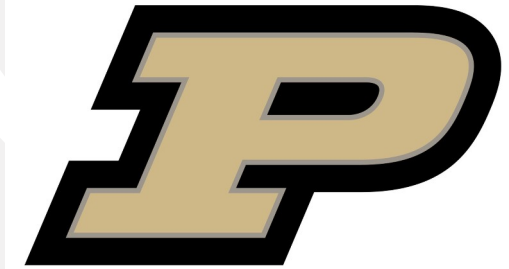
John Westerkamp/W8LRJ
w8lrj@arrl.net

November 21, 2024



JOHN WESTERKAMP, W8LRJ

- Always interested in radio and have always been a SWL
- Amateur Extra and BARC Member since April 2018
- Bachelor of Electrical Engineering from University of Dayton
- Ph.D. in Electrical Engineering from Purdue University
- Specialized in Digital Signal Processing/Communications
- Electrical Engineering Faculty at U.D. for 17 years
- Computers and Networking for 10 years
- Retired and enjoying a great hobby
- **LRJ stands for Lori, Rachel, and Jacob (wife and two kids)**
- Nephew is Jordan Westerkamp, football player University of Nebraska



OVERVIEW

- Upcoming radio events
- Clubhouse access protocol
- Steps for using the radio stations
 - Antenna (and rotor) setup
 - Power supply
 - Using the Icom IC-7300*
- Using the N3FJP logger and rig control
- Cleaning up

* Taken from Ken Moak, KM8AM





UPCOMING RADIO EVENTS

- ARRL 10 Meter Contest
 - at clubhouse on Saturday, December 14, 2024 from 1:00 pm until 5:00 pm
- W8W Special Event Station Wright Brothers Anniversary of First Flight
 - at clubhouse on Tuesday, December 17, 2024 from 9:00 am until 7:00 pm
- North American QSO Party (just FYI to work at home)
 - Saturday, January 18, and Sunday, January 19, 2025
- Winter Field Day
 - at Twin Oaks Shelter, Hills and Dales, 2655 S Patterson Blvd. on Saturday, January 25, 2025, from 10:00 am until 4:00 pm.
- Rookie Roundup in April



CLUBHOUSE ACCESS PROTOCOL

- Key is in lock box on the outside door (**Ask for key code**)
- Unlock outside door, enter building, and immediately lock outside door
- Unlock clubhouse door
- Return key to lock box (leave outside door locked)
- Close clubhouse door after entering (and lock for safety)
- Play radio!
- When done, return clubhouse to how you found it!
- Be sure both clubhouse doors are locked
- Be extra sure outside door is locked

ROOFTOP ANTENNAS

Tower 1

Multi-Band Beam 10-12-15-17-20 meters
Tri-band 6-2 meter 70 cm VHF/UHF vertical
6 meter SSB Yagi

Tower 2

Three-Element Beam 12-17 meters
2 meter 70 cm SSB 10-element Yagi
Dual band 2 meter 70 cm vertical on tower

Others

R9 Multiband Vertical 80-10 meters
160 meter inverted-L (on Tower 1)
Two 80-60-40 meter fan dipoles (on towers)
Multiple magnetic mount 2 meter 70 cm VHF/UHF antennas



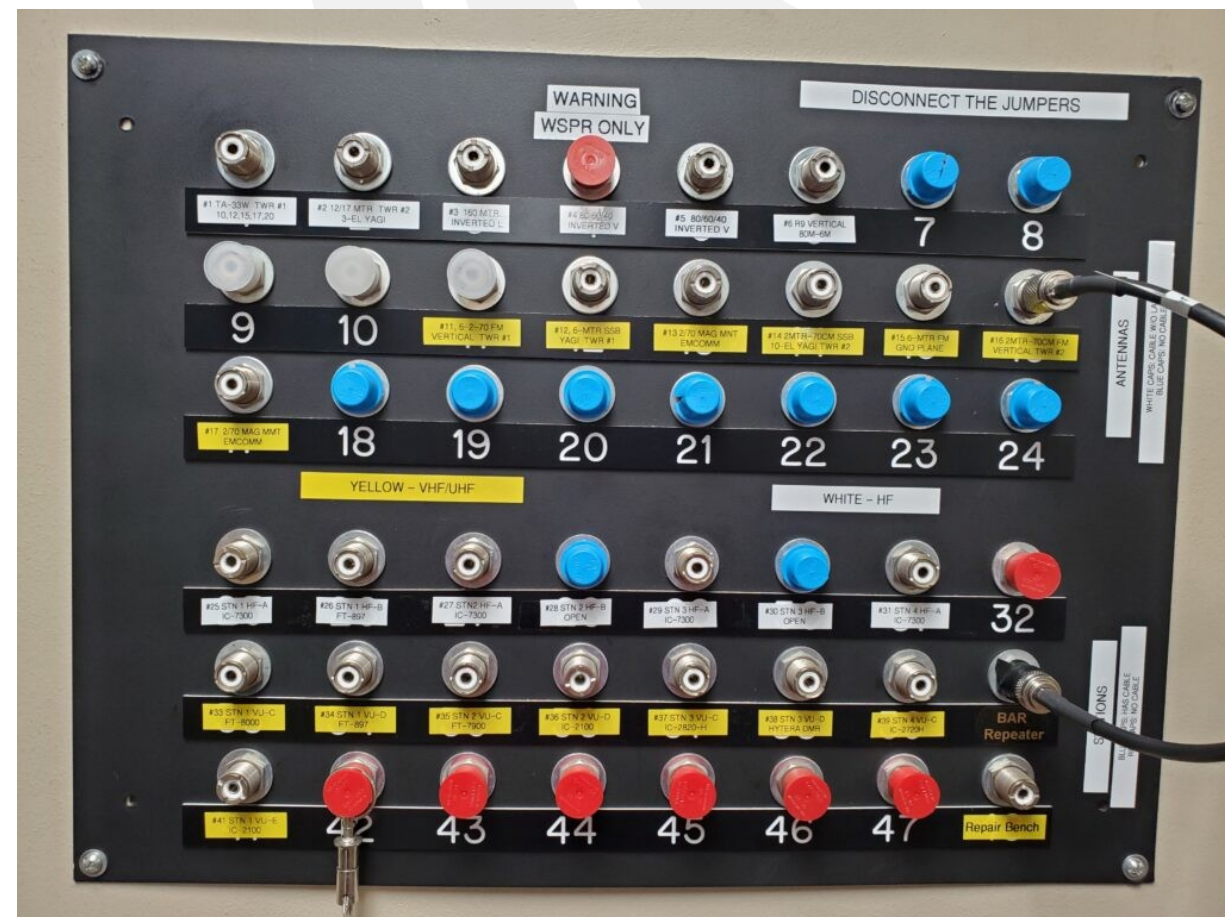
R9 80-10m Vertical



Tower 1 (left) and Tower 2 (right)

ANTENNAS

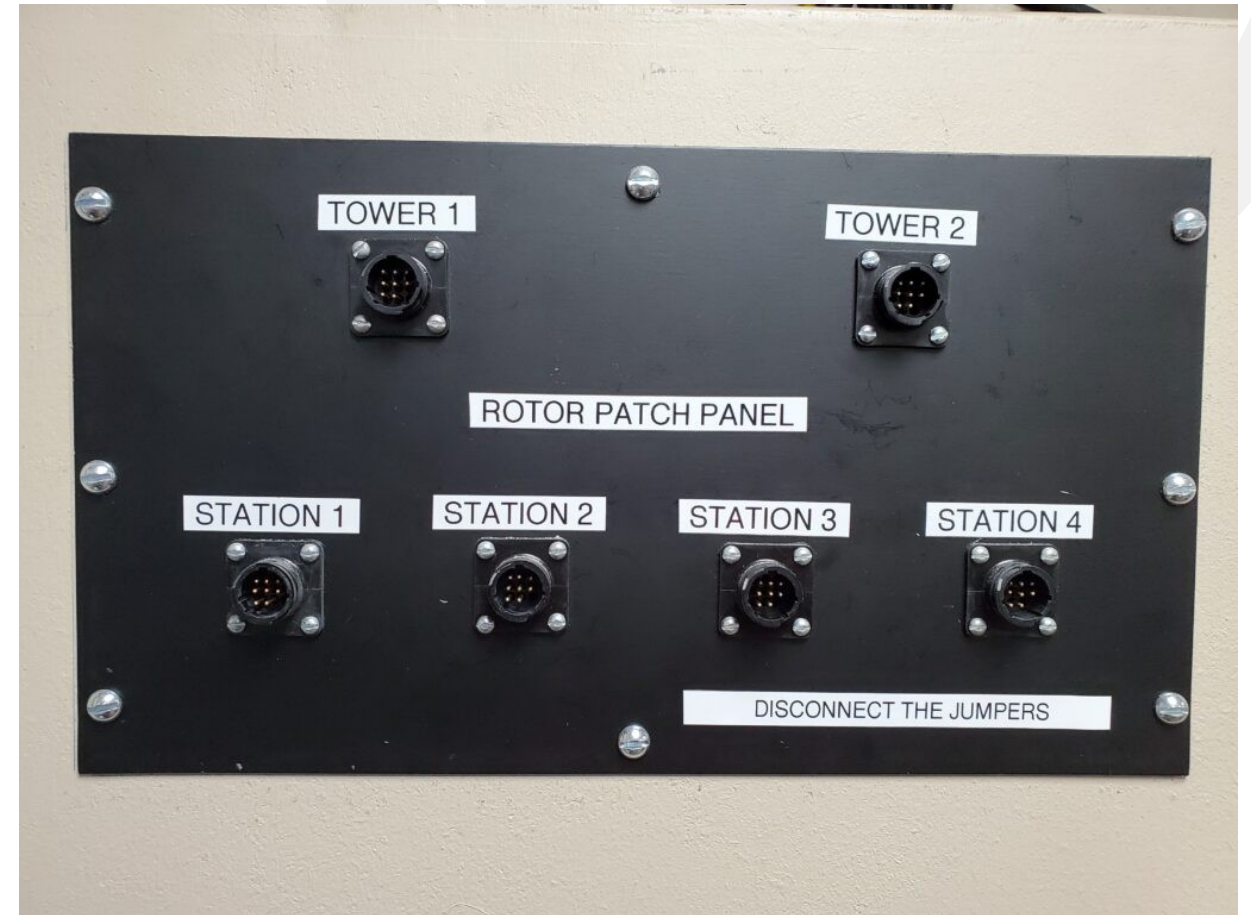
- Top three rows are antennas
- Bottom three rows are radios
- Not available if covered with cap
- White label is HF
- Yellow label is VHF/UHF
- Choose antenna to match band
- Choose radio to match band
- Choose station
- Connect a coax jumper between the antenna and the station/radio
- Remember to disconnect when finished



ROTORS

- Only needed if using a beam (Yagi)
- Choose Tower that matches antenna
- Choose Station where radio is
- Connect rotor jumper between the Tower and the Station
- Be sure to screw all the way down
- **Note: Rotor jumper is keyed**
- Disconnect the jumper when finished

- Note: The rotor controller will not respond if jumper is not connected correctly



STATION OVERVIEW

- Power supplies on top (labelled)
 - Headsets and splitter on top
 - Manuals on top
 - Mobile radios on 2nd row
 - Amplifier on 1st and 2nd rows (Station #3 only)
 - Dual monitors on bottom
 - Rotor control and BPF 3rd row
 - IC-7300 and tuner on bottom
-
- ARRL band plan
 - Grid square map
 - Pad and pens



IC-7300 FRONT PANEL

Note: This is a touch screen for most settings.

Power

Mode

Band/Frequency

RF Power Out

Tuner



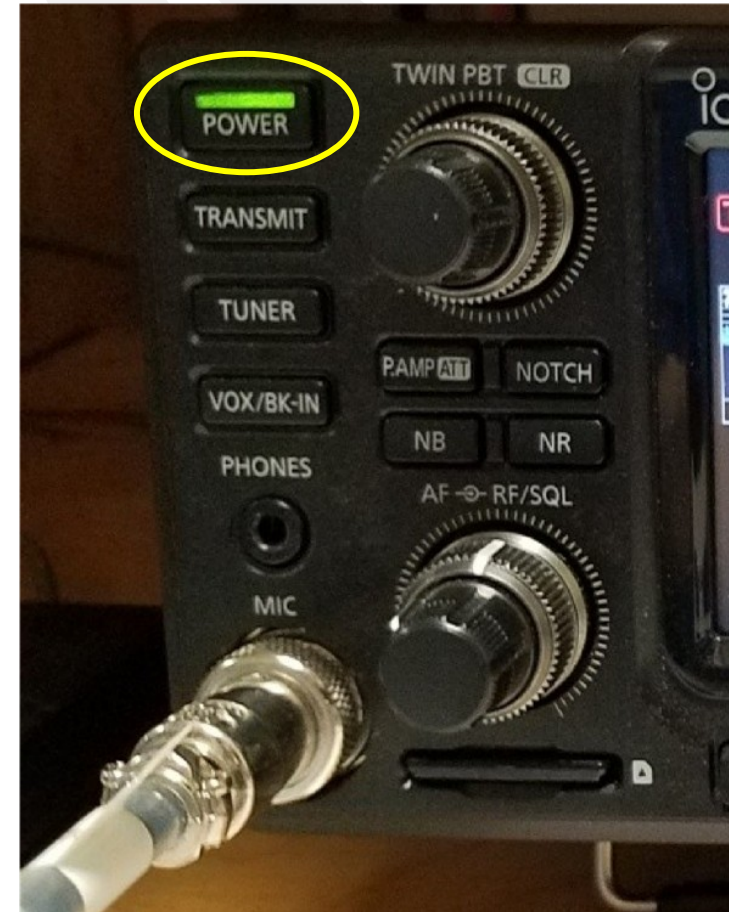
Volume

Frequency Fine Tuning

YouTube Video at <https://bellbrookarc.org/wp/communication-center/>

POWER ON

- Don't forget to attach antenna jumper!
- There are several power buttons
- First, turn on the power supply labelled for the IC-7300
- Then press the power button on the IC-7300
- Do the reverse when you are finished
- Don't forget to turn off the power supply and disconnect the jumper!



SET BAND AND MODE

- Set band and mode using the touchscreen
- Touch LSB to set mode and select (although normally done automatically)
- Touch left most digit to set bands, use touchscreen to change
- Touch other digits to change rate of movement using the fine adjustment knob (the big one)



SET RF POWER LEVEL

- Press Multi button to access RF Power menu
- Turn Multi knob to adjust RF Power Out
- Use touch screen to move to other settings
- Note: 100% is 100 watts
- You can also adjust the Mic Gain, Compression, and Monitor Level (listen to yourself)
- Press Multi button again to close menu or arrow at bottom



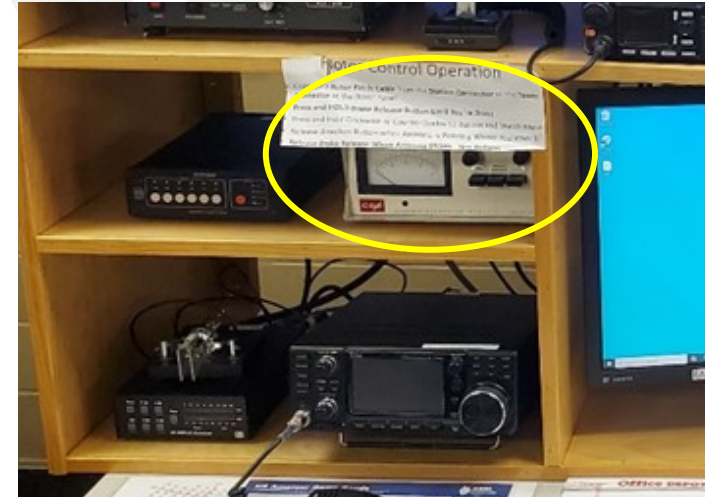
TUNING

- Tuning is handled automatically by the attached external tuner
- Press the Tuner button and the tuner will begin a tuning cycle (lots of noise)
- The IC-7300 can tune up to about 3:1 SWR by itself, but the external tuner can go to 10:1



ROTOR CONTROLLER

- Optional: Only necessary if using a beam antenna
- Don't forget to connect the rotor jumper at the rotor patch panel
- Turn on rotor controller power button on front
- **Most Important: Always press the brake release first (middle button) and let it go only after you release the other button and the beam has stopped moving**
- Hold brake release button down, then press left or right button depending on which way you want to move
- Release left or right button (keep brake release down!)
- When beam stops moving (arrow halts), let go of the brake release button





N3FJP LOGGER

- If not running, double-click the desktop icon for Amateur Control Log
- Radio may automatically connect to N3FJP (Band, Mode, and Frequency should match radio)
- If not, click on Settings and then Rig Control and load the Icom2 file and click Done
- Again, N3FJP should reflect radio settings
- Set your Operator info by clicking on Settings and then Setup and filling in the Optional information at the bottom
- **Do Not Change the W8DGN Callsign!**

Recent Contacts (4,630 Listed QSOs)

Rec#	Call	Date	Freq	Band	Mode	Power	Snt	Rec	Off	Country	S C...	Name	O...	Comm
4630	W9WLE	2024/11/12...	20	CW	200	559	579	19:54		USA	F. P...	GERALD	U...	GERA
4629	W2TEF	2024/11/12...	20	CW	200	599	559	19:51		USA	N G...	Todd	U...	Todd
4628	N4TTU	2024/11/12...	20	CW	200	599	599	19:47		USA	G C...	Tom	U...	Tom I
4627	9M6BOB	2024/11/11...	10	FT4	200	-01	-03	23:54		East Malaysia		Bob latip		
4626	W9AJF	2024/11/11...	20	CW	200	599	599	20:36		USA	I. B...	Greg	U...	Greg
4625	W1ZRD	2024/11/11...	20	CW	200	599	559	19:58		USA	V M...	Joseph	U...	Josep
4624	N9QF	2024/11/11...	20	CW	200	599	599	19:52		USA	I. C...	JAMES	U...	JAME
4623	KZ4DZ	2024/11/11...	20	CW	200	599	589	19:30		USA	S S...	Joseph	U...	Josep
4622	N0YY	2024/11/10...	20	R...	100	599	599	19:40		USA	V C...			
4621	NY3B	2024/11/10...	20	R...	100	599	599	19:38		USA	P L...			
4620	VE7BC	2024/11/10...	15	R...	100	599	599	19:20		Canada				
4619	NGAR	2024/11/10...	15	R...	100	599	599	18:13		USA	F. O...			
4618	KH6ZM	2024/11/10...	15	R...	100	599	599	18:09		Hawaii	H			
4617	TM3Z	2024/11/10...	15	R...	100	599	599	18:07		France				
4616	NX3Z	2024/11/10...	15	R...	100	599	599	17:55		France				
4615	DQ2C	2024/11/10...	15	R...	100	599	599	17:48		Federal Republic of G...				
4614	EA2DLX	2024/11/10...	15	R...	100	599	599	17:41		Spain				
4613	VE2BVV	2024/11/10...	15	R...	100	599	599	17:38		Canada				
4612	ON5GQ	2024/11/10...	15	R...	100	599	599	17:32		Belgium	C			
4611	N4MCC	2024/11/10...	40	R...	100	599	599	05:26		USA				
4610	DP7D	2024/11/10...	40	R...	100	599	599	04:59		Federal Republic of G...				
4609	EA4AOC	2024/11/10...	40	R...	100	599	599	04:31		Spain				
4608	AA2MA	2024/11/10...	40	R...	100	599	599	04:25		USA	A M...			
4607	DR4A	2024/11/10...	40	R...	100	599	599	04:13		Federal Republic of G...				

LogData.mdb

Call **Date** **Band** **Mode** **Power** **Time** **Sent** **Rec** **Country**

Name **State** **County** **Freque** **Other**

QSL Sent Spot Last 10:08:29 AM QSL Rcvd 15:08:29 UTC

Bearing: **Comments**

Miles:

Cont:

Call	Frequency	QTH	B...	Mode	Status	Comments	Pfx	Time	Cor
MD0RLA	28.4150	Isle of Man	10	SSB	Confirmed	de: K3LU:	MD	1508Z	EU
IN3IVF	14.3300	Italy	20	SSB	Confirmed	de: F4LHR: POTA IT-1358	I	1507Z	EU
IR5RVER	18.1550	Italy	17	SSB	Confirmed	de: IW5DAX: 15:07 100th Italia...	I	1507Z	EU
PJ2IW4IPC	28.0320	Curacao	10	CW	Confirmed	de: OP4F: CW	PJ2	1507Z	SA



N3FJP LOGGER

- When you find a contact, first enter the callsign into the Call box and hit Tab
- Contact info should appear
- You will also be warned if the contact is a duplicate
- Now call the contact
- Fill in the Exchange Info in Sent and Rec and hit Enter
- Contact should appear in the log
- **This is for General Contact Logging**
- Every contest has a different logger, but works the same way

Recent Contacts

Rec#	Call	Date / Ti...	B...	M...	Power	Snt	Rec	Off	Country	S C...	Name	O...	Comm...
	W8LRJ	2024/11/15	20		SSB	200	15:04	59	59	US			

Call: W8LRJ

Name: John

State: OH

County: Greene

Frequency: [blank]

Other: [blank]

QSL Sent: [checkbox]

QSL Rcv: [checkbox]

Spot: 10:06:27 AM

Last: 10:06:22 UTC

Log Contact

Bearing: 151

Miles: 2

Cont: NA

Comments: John J Westerkamp - 116 Bramblebush Trail - Beavercreek, OH 45440

Time Off: [button]

Call	Frequency	QTH	B...	Mode	Status	Comments	Pfx	Time	Cor
R6LMV	10.1380	European Russia	30	FT8	Confirmed	de: UA1ZQN: TNX FOR QSO 73!	R	1506Z	EU
PJZ/W4IPC	28.0321	Curacao	10	CW	Confirmed	de: VE1ANF:	PJZ	1506Z	SA
KY4KK	14.2280	USA	20	SSB	Confirmed	de: K4CAE: US-2905	K...	1505Z	NA
FJ/EA8DBM	28.0950	Saint Barthelemy	10	RTTY	Unconfirm...	de: IS0OZK: FT8	FJ	1505Z	NA



CLEANING UP

- When finished, be sure to
 - ✓ Turn off rotor controller
 - ✓ Turn off the IC-7300 power button
 - ✓ Turn off the IC-7300 power supply
 - ✓ Disconnect the coax antenna/radio and rotor controller jumpers
 - ✓ Return clubhouse to its original condition (see posted sign)
 - ✓ Turn off lights and A/C
 - ✓ Make sure both clubhouse doors are locked
 - ✓ Make sure outside door is locked and key is in the lockbox