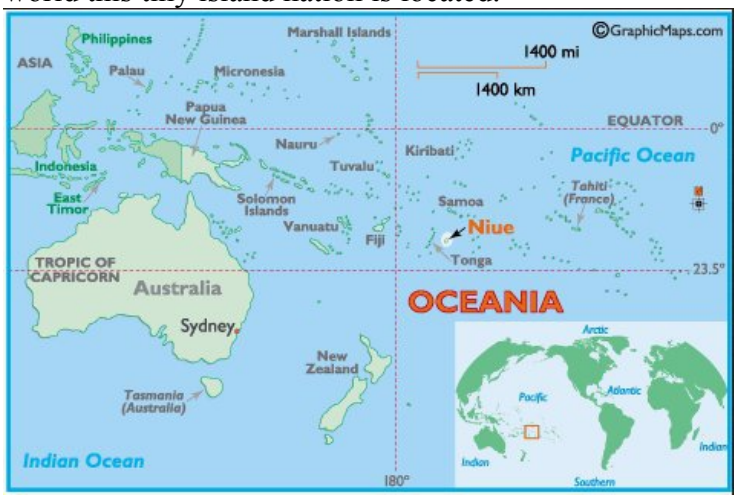
E6M NIUE 2012

One of the popular Limu Pools in Namukulu Village

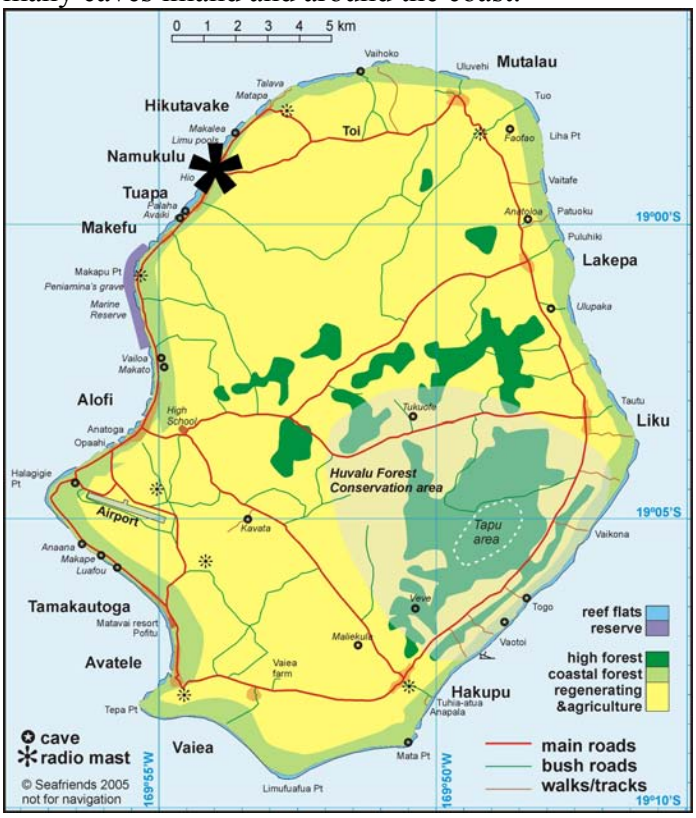
INTRODUCTION

Niue was chosen as a 6m DXpedition destination this year because of the fact that contacts with it on that band are quite rare outside of the Pacific region. In addition, the waters surrounding Niue are among the clearest in the world, which make for great snorkeling! The map below shows where in the world this tiny island nation is located.



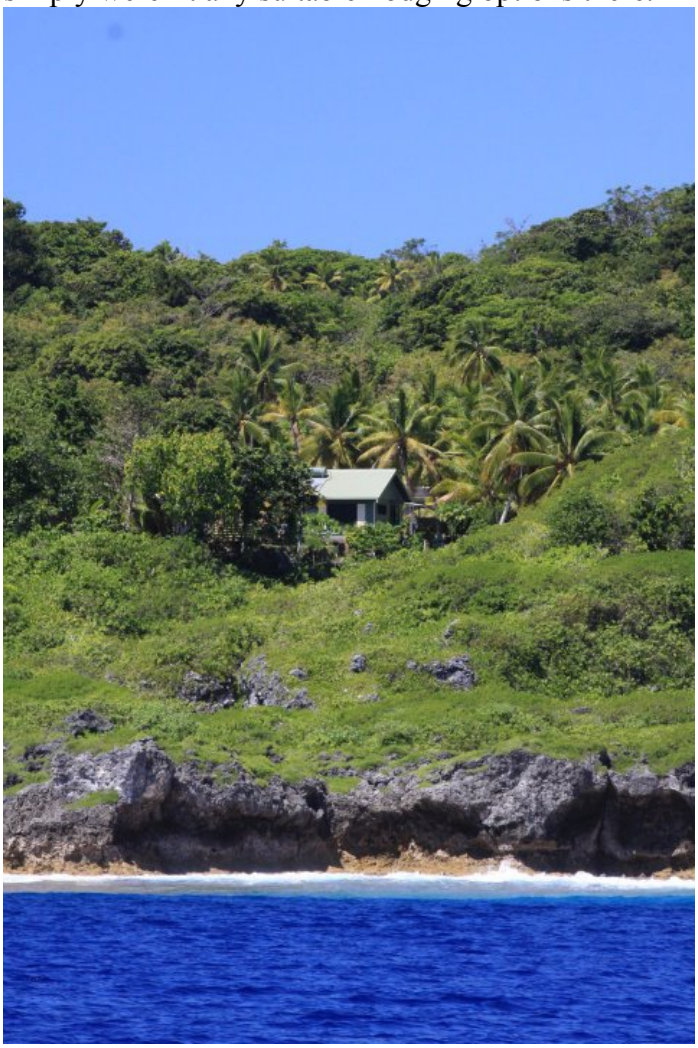
Since the only way stations in Europe were likely to ever contact Niue on 6m was via EME (Earth-Moon-Earth) communication, the timing for the trip was selected to coincide with the best days of the month for moonbounce. In addition, since 6m signals are highly susceptible to geomagnetic disturbances and ionospheric ionization, the time of year was chosen to avoid "shielding" by ionization in either the E or F layers of the ionosphere. An additional consideration was to go there at the end of the dry season and before the start of the monsoon season. This last factor was especially important because Niue had a Dengue Fever outbreak during the unusually high rains this spring, and we were very interested to try to reduce the risk of contracting this disease, which killed a local there this summer. Fortunately, when we arrived in September, the island was quite dry, and it had been about a month since any new cases of Dengue Fever had been reported.

Niue is a rocky island built from uplifted coral. The uplifted island is essentially a flat limestone butte 80' to 160' above the ocean, surrounded by cliffs, with many caves inland and around the coast.



Asterisk shows location of Kaliki Lodge in Namukulu Village

The location chosen for our operation was Kaliki Lodge in Namukulu Village on the northwestern coast. Kaliki is just south of the main village area and the popular Limu Pools. I should mention that there are only eleven full time residents in Namukulu, and all the power lines are underground, so the RF noise is very minimal there. I had tried diligently to locate a place on the northeast corner of the island with a clear moonrise over the ocean, but there simply weren't any suitable lodging options there.



Kaliki Lodge as viewed from the sea to the west

As you can see, the building is 80' above the ocean and is surrounded by trees and shrubery, and I was quite worried about being able to squeeze my large 6m EME antenna in among all the obstacles. But I am getting ahead of myself – we had to get there first!

THE ADVENTURE BEGINS

As always, to insure operating as scheduled, we carry all the radio equipment, antenna and mast with us; there have been too many problems with DXpeditions which tried to ship equipment separately. I had hoped to bring my new KX3 to reduce weight and space in my carry-on luggage, but it was not deemed to be stable enough on 6m for JT65A operation on 6m yet, so I brought the tried and true (albeit considerably larger and heavier) K3 again. Our flight route took us from Missoula to Denver, to San Francisco. We arrived in San Francisco well ahead of the scheduled Air New Zealand flight to Auckland, to allow for delays in our two previous flights and ensure that our checked baggage arrived in plenty of time to connect to the overseas flight. So, we snuck in a few hours to visit Chinatown in San Francisco before our next flight!

Cable car in San Francisco's Chinatown

Transamerica Pyramid, the tallest building in San Francisco

We flew out of San Francisco on time Friday evening September 7 and arrived at dawn in Auckland, New Zealand on Sunday morning their time. Since the only way to get to Niue was a weekly flight leaving from Auckland on Saturday mornings, we had 6 days of buffer so the gear could catch up with us – if required - before it had to go with us to Niue. Fortunately, though, all our gear arrived safely in Auckland! We stayed at a friend's house in a southern suburb for the week and explored the area around cold and rainy Auckland.

All 4 checked bags and 4 carry-ons safely in-hand in Auckland

Auckland and the southern hemisphere's tallest building

Driving around Auckland certainly provided good practice driving on the left side of the road, although the traffic in a city of millions is quite a bit different than in Niue, which only has 1700 inhabitants!

We also explored the great museums as well as the nearby islands that are serviced by ferries from downtown Auckland. On one such ferry outing, we

Auckland wharf as viewed from a ferry

Takahe bird at Tiritiri Matangi Island sanctuary

visited the bird sanctuary of Tiritiri Matangi Island, where we saw about 10% of the country's remaining

beautiful flightless Takahe birds, as well as many other interesting birds and plants.

Kayaking down the seemingly docile upper Puhoi River

We ventured north of the city on the motorway one day to the old village of Puhoi, where we kayaked down through the countryside on the Puhoi River from its headwaters to the sea (where the winds and currents become quite strong). Having worked up an appetite, we stopped by the historic Puhoi Tavern for lunch, and then visited their famous village creamery for some ice cream dessert.

Sign in the historic Puhoi Tavern

Despite the weather, we very much enjoyed our "layover' in Auckland, but by the end of the week we were anxious to get to the warmth of Niue and get on with the moonbouncing and snorkeling.

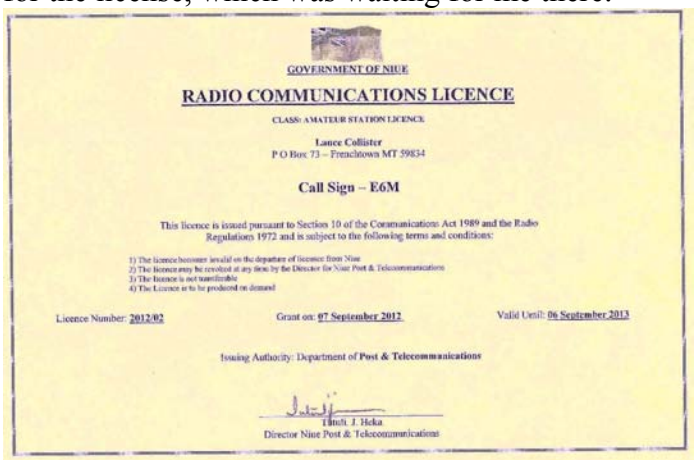
ARRIVAL AND SETUP

We left on time Saturday morning and arrived in Niue several hours later at 1400 local time on Friday September 7. We were again back on the same day as in Montana! Bob, ZL1RS, and his wife Barbara had been planning to join us on this weekly flight, but they had both been quite ill, so they had to wait until the following week's flight to join us in Namukulu.

Niuean flag by the police station in Alofi, the capital village

Telecom Office was in the shopping mall in downtown Alofi

Our first stop after arrival was Telecommunications for the license, which was waiting for me there.



GOVERNMENT OF NIUE

RADIO COMMUNICATIONS LICENCE

CLASS: AMATEUR STATION LICENCE

Lance Collister
P O Box 73 – Frenchtown MT 59834

Call Sign – E6M

This licence is issued pursuant to Section 10 of the Communications Act 1989 and the Radio Regulations 1972 and is subject to the following terms and conditions:

1) The licence becomes invalid on the departure of licensee from Niue
2) The licence may be revoked at any time by the Director for Niue Post & Telecommunications
3) The licence is not transferable
4) The Licence is to be produced on demand

Licence Number: 2012/02 Grant on: 07 September 2012 Valid Until: 06 September 2013

Issuing Authority: Department of Post & Telecommunications

Thelli J. Heka
Director Niue Post & Telecommunications

E6M was the first new prefix license issued

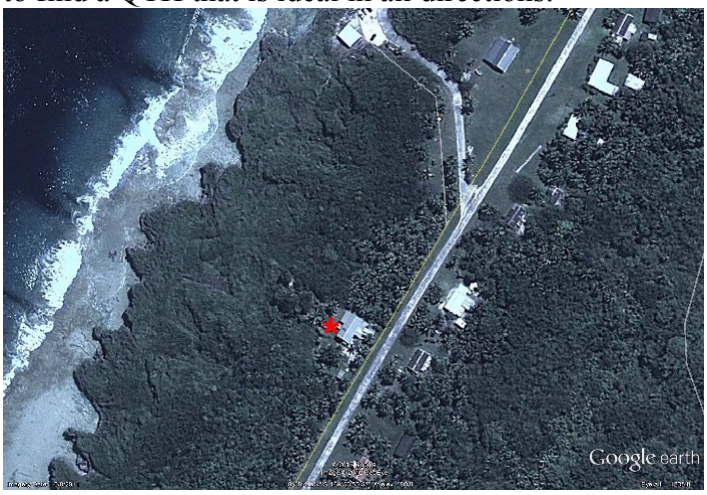
I then registered my computer with the local internet office and paid for my two weeks of access (which turned out to be two days). We stopped by the "supermarket" for supplies on our way out of Alofi. The "monthly" supply ship was already well overdue, so the shelves were picked pretty bare, but we bought a few essentials and were on our way.

The supermarket in Alofi

Locating the mast at the antenna's only possible site at Kaliki

The next stop was Kaliki Lodge to figure out where I might be able to set up the antenna, and to begin to get things unpacked. As it turned out, there was only one spot where the antenna would fit – and only then after a few protruding palm fronds were removed from a tree north of the antenna. That spot was on the edge of a terrace just west of house. I assembled the mast that Friday afternoon, and rigged up the guy lines so they would work with the uneven terrain at that site. The nagging siting question was solved!

Although it looked like the antenna would clear the metal house roof to the east by a few feet, I knew there wouldn't be any ground gain on moonrise. This was disappointing because it further limited the window with western Europe, but it was what I had to deal with. Unfortunately, it isn't always possible to find a QTH that is ideal in all directions.



Final location of the 6m antenna at Kaliki Lodge

On the positive side, however, when raised, the antenna would be 100' above the ocean to the west, so there would be good ground gain on moonset when the moon was near the horizon. Higher ground gain lobes were prevented by the very uneven and craggy terrain down to the ocean.

The ham shack set up in a spare bunkroom

Friday evening was spent setting up the station in a spare bunkroom at the house, in order to be ready when the antenna was assembled and set up the next morning. The equipment was essentially the same as I had used on previous 6m EME DXpeditions: Elecraft K3 transceiver with PR6 preamp; M^2 6M8GJ 12.2 dBD yagi, Portable Mast, and 6M-1000 amplifier; Powerwerx SS-30DV 12 VDC 30A & Meanwell 3kw 48 VDC switching 230 VAC power supplies; 25' Times Microwave LMR600 and 50' LMR600UF low loss coax; Daiwa CN101-L wattmeter; W7GJ manual elevation mount; and HP Pavilion dv6 Windows 7 laptop computer. I also rigged up a very small microphone and headset as well as a footswitch for the K3. I did not have room for a CW paddle, but planned to use the

laptop keyboard for CW if needed. Next time I promise I will learn how to use the keyboard for CW while filling out the logbook at the same time!

I almost reached the station with my 50' piece of LMR600UF feedline, but it was 6' too short, so I had to add on my other 25' piece of LMR600. This resulted in 0.4 dB feedline loss to the 6M8GJ yagi.

I already had installed ferrite RFI chokes on all the power supply leads as well as the USB cables. However, I when I started operating the station, I noticed that the cooling fans in the 6M-1000 were generating a couple dB of noise. Adding some ferrite chokes to the DC power leads where they left the 6M-1000 solved that problem. However, I still had a couple of dB from strange "birdies". I found that this noise was created from some interaction between my two switching power supplies. I moved them apart and oriented them back to back, and the noise disappeared.

Saturday morning, September 8, the antenna was assembled and the mast propped up to receive it. I also had to remove a few protruding palm fronds from the tree just north of the antenna.

The mast propped up and ready to accept assembled yagi

Because of the house and trees, the antenna had to be mounted on the mast at an elevated angle, and raised that way to clear the obstructions. In addition, the guy lines had to be tightened as it was raised because of the uneven terrain. Fortunately, it was only lightly raining at antenna raising time. It was a challenging task for two people, but after the second attempt, my wife Karen and I were relieved by mid day to get it up in the air so she could go off snorkeling at Limu Pools and I could see how things were working.

The assembled 6M8GJ yagi ready for raising

The antenna as it was raised off the prop support post

Karen enjoying snorkeling in the clear Limu Pool waters

Unfortunately, we didn't get the antenna raised in time for my moonset Saturday, but I was quite satisfied to have things set up by lunch time, before the advertised time of my moonrise Saturday evening (Sunday September 9 GMT). The view from the

street east of the house was not terribly encouraging, but the antenna did have a clear view of the northern sky when elevated.

View from the street the east of the house

The 6M8GJ elevated and pointing north above the jungle

The W7GJ aiming circle and paper clip pointer installed

E6M ON THE AIR!

When I went inside and connected the feedline to the station, I found there was some late season Es taking place! And, unlike Es up in the northern latitudes, it seemed to be in all directions at once! I first worked FK8CP, followed by E51WL and then ZL3NW.

Rod suggested that I turn the antenna down his way, and he would try to raise some more stations down there for me to work. Turning an antenna that is aimed and kept horizontal by ropes is not a quick matter, but after I managed to get the antenna pointed around toward New Zealand, Rod was pounding in at 59. I quickly worked 7 other strong New Zealand stations, and heard a JA calling off the side of the antenna, but by the time I was able to turn the antenna toward Japan, the propagation was gone.

The 6M8GJ in the air and aimed at Hawaii

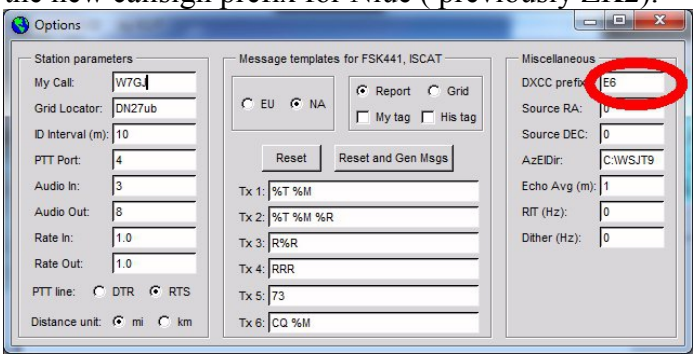
KH7Y still needed Niue and was just barely audible from time to time. We tried on CW, but were not successful making the 4660 km contact. However, we switched to the much more sensitive JT65A mode and very easily completed my first JT65A contact from Niue that afternoon.

Fortunately, I had internet service for the first two days (the microwave link went out for the remainder of the trip), and I was able to let everyone know that I was setup and would be operating as planned. I planned to be active for every European moonset (to the extent I was able to see the moon), and for all my moonsets. I would start looking for the North American horizon-only stations on their moonsets beginning September 12.

For new users, I had already published the step-by-step **JT65 SETUP CHECKLIST** to ensure that anyone interested in a contact with E6 could easily get going on JT65A.

I also had already well publicized the **E6M EME QSO procedure** that I was going to use, which would help me take full advantage of limited window times by concentrating on answering stations who

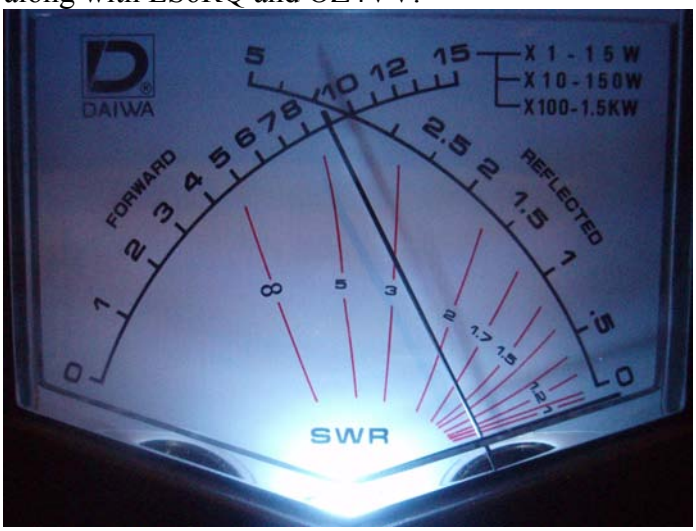
were copying me at that time. And all stations had been instructed on how to add E6 to the DXCC PREFIX box in the upper right corner of the WSJT SETUP/OPTIONS screen so JT65 would recognize the new callsign prefix for Niue (previously ZK2).



Users added E6 prefix to the WSJT SETUP/OPTIONS screen

Therefore, the fact that I didn't have a continual internet connection really made little difference, since all the information about the operation was already freely available for anyone seriously interested in contacting me.

As it turned out, I didn't acquire the moon until it rose above 8 degrees that night or any other moonrise. The first station I copied was IW5DHN when the moon was at 8.3 degrees for me. I tried replying to him for 8 minutes, but then moved on to ON4IQ, who also had been calling. I kept calling ON4IQ for 20 minutes, until G8BCG called and indicated he was copying me. So I quickly worked Peter and G8BCG became my first 6m EME contact. That was quickly followed by contacts by ON4IQ, ON4GG and K2ZD. It was not until my moonset the next morning that I would complete with IW5DHN, along with ES6RQ and OZ4VV.



The amp continually put out between 900 and 1000w on JT65A

Each moonrise and moonset produced more contacts with European stations, as you can see by the list of stations in the SUMMARY section.

Monday night (Tuesday September 11 GMT) before going to bed, I was copying the KH6 beacons on TEP and decided to try calling CQ toward Japan to see if anybody might be around. I immediately heard many strong callers and was able to work 15 JA stations before I decided to go QRT for some sleep. I already was very tired from being up since moonrise, had to get up in the middle of the night again to start another full day at moonrise, and I assumed there would be other chances to hand out E6 to Japan. I did check that direction again in the evenings when I had TEP to KH6, but that night unfortunately was the only opening to JA during my trip. In retrospect, if I had known how unusual such an opening was at that time of year, I would have stayed up and worked the hundreds of callers and sacrificed my rest.

That having been said, the primary goal of this trip was making 6m EME contacts with stations who had no other way to contact Niue. I knew there had been other low power 6m operations recently from Niue, and it was quite likely that many 6m operators in the Pacific had already contacted Niue by ionospheric propagation modes common in the TEP Zone. So, it was important not to lose sight of the main objective, and the many eager operators in Europe and North America who were expecting me to be alert on EME!

EME conditions continued to improve every day, and more and more stations were contacted. I regretted not having internet so I could post photos and lists of the stations whom I had contacted each day. Some screen shots of the exciting EME activity during these days are shown at the end of this article.

On September 14 GMT (Thursday morning local time), we had the only large downpour during the trip, and unfortunately I was unable to get on that morning for the last European moonset. The heavy rain had changed the resonance of my antenna, and my amp kept automatically shutting down because the SWR was over 1.5:1.

Each contact was a thrill, and many were hard fought. Especially during the North American moonsets, I often called CQ for hours without seeing any trace of callers. The elevation of the antenna had to be quite high to match the moonsets for the horizon-only stations and it was a difficult job trying to aim the fully elevated antenna in the strong, gusty winds.

At maximum elevation, a lot of antenna was sticking up in the air without much leverage to hold it at the proper azimuth

At maximum elevation, the guy ropes had to be interlaced between the elements as the azimuth was changed

Of course, one of the positive aspects of elevating the antenna so high when you are in down in the low latitudes of the TEP Zone – with such high electron content in the ionosphere – is that the ionosphere becomes more transparent to your moon-bound signal the farther from the horizon you aim the antenna!

Friday September 14, Bob and Barbara arrived to join us. Bob didn't bring any antennas, but did get on the air from time to time. Although most of the 6m EME activity was over by the time Bob arrived, we both looked forward to moonsets.

ZL1RS/E6RS entering the Niue Telecom Office

Perhaps one of the most exciting moments each day was when the moon sank below 3 degrees elevation out over the ocean. Signals would suddenly appear on my SpecJT waterfall screen as the ground gain effect kicked in, and even smaller stations were very good copy as the moon dropped down to about negative 1.3 degrees. Obviously, these lobes are very sharp and there is only time to make a quick contact with someone who is also copying you at the same time. So on some days, there were no contacts made – only stations copied. However, as you can see in screenshots in the APPENDIX, when the polarity was reciprocal, there were fast contacts.

Moonset over the ocean was quite an exciting experience!

By the second week, the moonrise window with Europe was gone and the only caller I was copying

on my moonset was SV1DH. The moon was getting quite high for me during the North American moonsets, and I was worried that I might not be able to complete with W1JJ, whom I had not heard at all yet. So, I asked KH7Y in Hawaii (who was our only reliable communications link with the outside world - via nightly TEP) to pass along to W1JJ that I would still be on during his moonset looking for him.

Mick had taken down his large 6m EME array to move it to his home location, and had not rebuilt it yet. However, he temporarily raised an M^2 6M7JHV up on on a 15' pole using a pulley (in the manner of K7BV) and fed 700w into it from a single 3CX800 amplifier.

W1JJ's makeshift EME setup of an M^2 6M7JHV, manually elevated to 12° and pointed at the moon, with 700 watts

Mick copied me at -24 dB and I was copied him answering my CQ at -25 dB while we were both elevated (without any ground gain on either end). The was certainly one of the most remarkable contacts that I made during the trip. It vividly demonstrates what is possible if someone is really serious about trying to work a new DXCC on 6m – and what a "Magic Band" it really can be!

With the extra help from Bob and Barbara, the antenna came down quickly and safely Thursday afternoon September 20. I spent the rest of the afternoon and evening taking everything apart and packing it all up. I had to be careful to make sure to distribute the weight carefully so our checked luggage (as well as carry-ons) would not be rejected at the airline counter.

We shuttled ourselves and our checked luggage to the airport Friday morning in two trips, since our little car was barely large enough to carry Karen and I all the 6m EME gear. After a final farewell lunch at the "Crazy Uga" cafe by the wharf in downtown Alofi, we headed back to the airport to clear security and wait for the weekly flight back to Auckland, New Zealand (and for Karen and I, to eventually arrive home in Montana two days later).

Each checked bag could not exceed 23 kg, and the airport scale was proof that we were right at the limit with our luggage!

The gang waiting at the airport for the weekly flight to leave Niue (L to R): Lance E6M, Karen, Barbara and Bob E6RS

SUMMARY

I had realized that this trip probably would not be as successful as my 6m EME DXpeditions to 3D2 and 5W, due to the fact that the common moon window with Europe was quite limited and was taking place during a time of month with high Degradation. Furthermore, the days of low Degradation would involve limited windows with the horizon-only stations in North America because the low moon Declination meant very high moon elevation at E6M during their moonsets. My elevation mount will go up to 65 degrees elevation, and with the broad free space beamwidth of my single yagi, I could probably work stations even when the moon is at 75 degrees

elevation. However, when my moon is directly overhead at 90° elevation during North American moonsets (as it was toward the end of the trip), there was no chance of making contacts. For that reason, I had recommended that all North American stations tried to call me before the second weekend of the trip. I called CQ from moonrise to moonset throughout that second weekend, but it did seem that most of the stations who were seriously interested in trying to contact me had already been on before that time.

The award for the smallest antenna worked again goes to N3CXV with his single M^2 6M5X! This is the fourth straight 6m EME DXpedition that I have done in which Bill has worked me, and I am thrilled to be able to give him yet another new DXCC on 6m! This just goes to show how important a factor ground gain is in determining overall antenna performance!

The QSL features the amazingly clear water from one of the nearby Limu Pools

There were a number of the larger 6m stations who were conspicuous by their absence, and I regret that they were not on the air for me to contact. However, all things considered, I think 46 EME contacts under the adverse conditions previously described has to be considered a success. I know those people receiving QSL cards from E6M for a contact with a new DXCC certainly consider it a success!

In the end, I completed 6m EME contacts with the following stations, a number of which also only had single yagi antennas:

DATE	TIME UTC	STATION	# WRKD	SIG DB
09/09/12	1340	G8BCG	1	-26
09/09/12	1354	ON4IQ	2	-18
09/09/12	1410	ON4GG	3	-23
09/09/12	1418	K2ZD	4	-27
09/09/12	2118	ES6RQ	5	-25
09/09/12	2332	IW5DHN	6	-18
09/09/12	2342	OZ4VV	7	-28
09/10/12	2308	LY2BAW	8	-27
09/10/12	2324	SM7FJE	9	-25
09/10/12	2331	SM7AED	10	-20
09/11/12	0036	OH6MIK	11	-22
09/11/12	1628	N7NW	12	-30
09/11/12	1718	WA4NJP	13	-27
09/11/12	1758	NN7J	14	-25
09/11/12	1916	VE3KH	15	-26
09/11/12	1945	N3CXV	16	-27
09/11/12	2314	W7IUV	17	-27
09/11/12	2318	OH2BC	18	-26
09/12/12	1545	G8VR	19	-22
09/12/12	1623	W7GJ	20	-24
09/12/12	1700	AJ7LL/7	21	-23
09/12/12	1716	WA7U/7	22	-22
09/12/12	1730	KE7X/7	23	-27
09/12/12	1742	KB7Q/7	24	-22
09/12/12	1920	OA4TT	25	-28
09/12/12	2158	W5UWB	26	-28
09/13/12	0214	ZL1RS	27	-25
09/13/12	0220	PA3HP	28	-19
09/13/12	1944	VE1JF	29	-24
09/13/12	2010	W8PAT	30	-28
09/13/12	2128	K2AXX	31	-24
09/13/12	2150	N8JX	32	-18
09/13/12	2208	W9RM	33	-26
09/14/12	0140	UT7QF	34	-19
09/14/12	0324	LZ2WO	35	-23
09/14/12	2012	VE1ZJ	36	-27
09/14/12	2034	VE5UF	37	-27
09/14/12	2334	K7XQ	38	-25
09/15/12	0406	HA8CE	39	-29
09/15/12	1934	K7CW	40	-21
09/15/12	2151	K1SIX	41	-21
09/15/12	2222	K4RX	42	-22
09/16/12	0512	S59A	43	-17
09/16/12	2242	KJ9I	44	-28
09/18/12	2116	K6MYC	45	-22
09/18/12	2218	W1JJ	46	-25

When not on the moon, I also did make ionospheric 6m contacts with the following stations:

E51WL	JH7XRZ	KH7Y
FK8CP	JM1ZY	NH6P
JA1BK	JN1GTG	NH8S
JA2CXH	JR2HCB	ZL2OK
JA2DDN	JR6EXN	ZL2WHO
JA2FJP	K6MIO/KH6	ZL3AAU
JA3APL	KH6HI	ZL3ADC
JA8EKC	KH6RH	ZL3ADT
JE1BMJ	KH6RZ	ZL3GS
JE2PUC	KH6U	ZL3JT
JG1TSG	KH7T	ZL3NW

Unfortunately, I did not record the signal strengths of every station with whom I did not complete on EME. Thanks to all those who called – I really appreciate your time and effort! Believe me, I was trying just as hard as you were! In many cases I replied for extended periods of time, but we just were not lucky enough with the signal polarization. In many cases, I would keep replying until the station's moonset or until I saw someone else calling me with OOO to indicate that they were copying me at that moment, indicating that a quick two-way contact was possible. I copied the following stations on 6m EME at least once:

DATE	STATION	# HRD	SIG DB
09/11/12	G3WOS	1	-21
09/11/12	G4HBA	2	
09/11/12	G4IGO	3	
09/09/12	G5WQ	4	
09/11/12	GM4WJA	5	-29
09/11/12	GU8FBO	6	
09/11/12	GW4WND	7	-28
09/14/12	HA0DU	8	
09/11/12	JR6EXN	9	
09/13/12	K0JY	10	-25
09/12/12	LA8AJA	11	-24
09/15/12	N5DG	12	-21
09/09/12	OK1RD	13	-24
09/11/12	ON9CC	14	-23
09/14/12	S51DI	15	-24
09/16/12	SV1DH	16	-26
09/11/12	VA3NCD	17	-26
09/14/12	W3XO/5	18	-24
09/15/12	W7CE	19	-24
09/15/12	W7MEM	20	-26
09/13/12	W7UT	21	-21
09/19/12	W9GA	22	-26

CONCLUSION

We certainly enjoyed our visit to the very unique island of Niue, and activating it for the first time ever on 6m EME. It was quite an effort making many of the contacts, but it also was a very rewarding accomplishment when we were able to complete each half million mile contact to the moon and back!

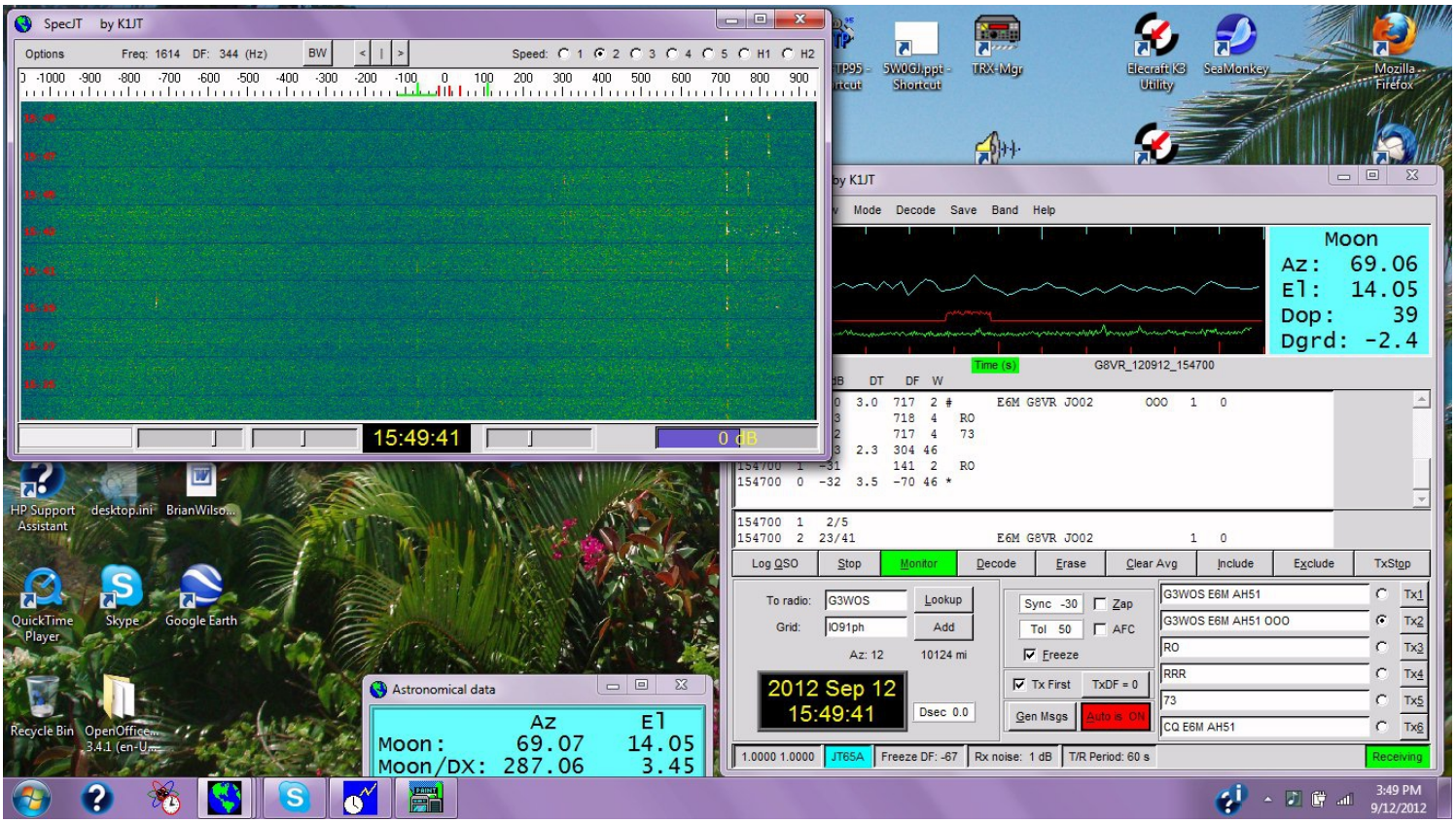
Niue is a very long way from Montana, and the trip turned out to be quite expensive. I am extremely grateful for the financial support toward the expense of this operation. Thanks very much for the contributions from: **SM7FJE, G8VR, K7CW, K2ZD, G8BCG, ON4IQ, VE1JF, KB7Q, N3CXV, G3WOS, KJ9I, ZL3NW, SM7AED, IW5DHN, FO4BM, N8JX, K0JY, OZ4VV, VE5UF, S51DI, VA3NCD, N7NW, K1SIX, VE3KH, W8PAT, W9RM** and **OH2BC**.

Special thanks to **W7ALW** for printing the QSL cards, **K1JT** for developing the JT65A weak signal digital mode to make 6m EME contacts possible, **ZL1RS** in sharing the Niue QTH, and my **XYL Karen** for her invaluable help transporting all the radio equipment and helping me with the 6m EME antenna.

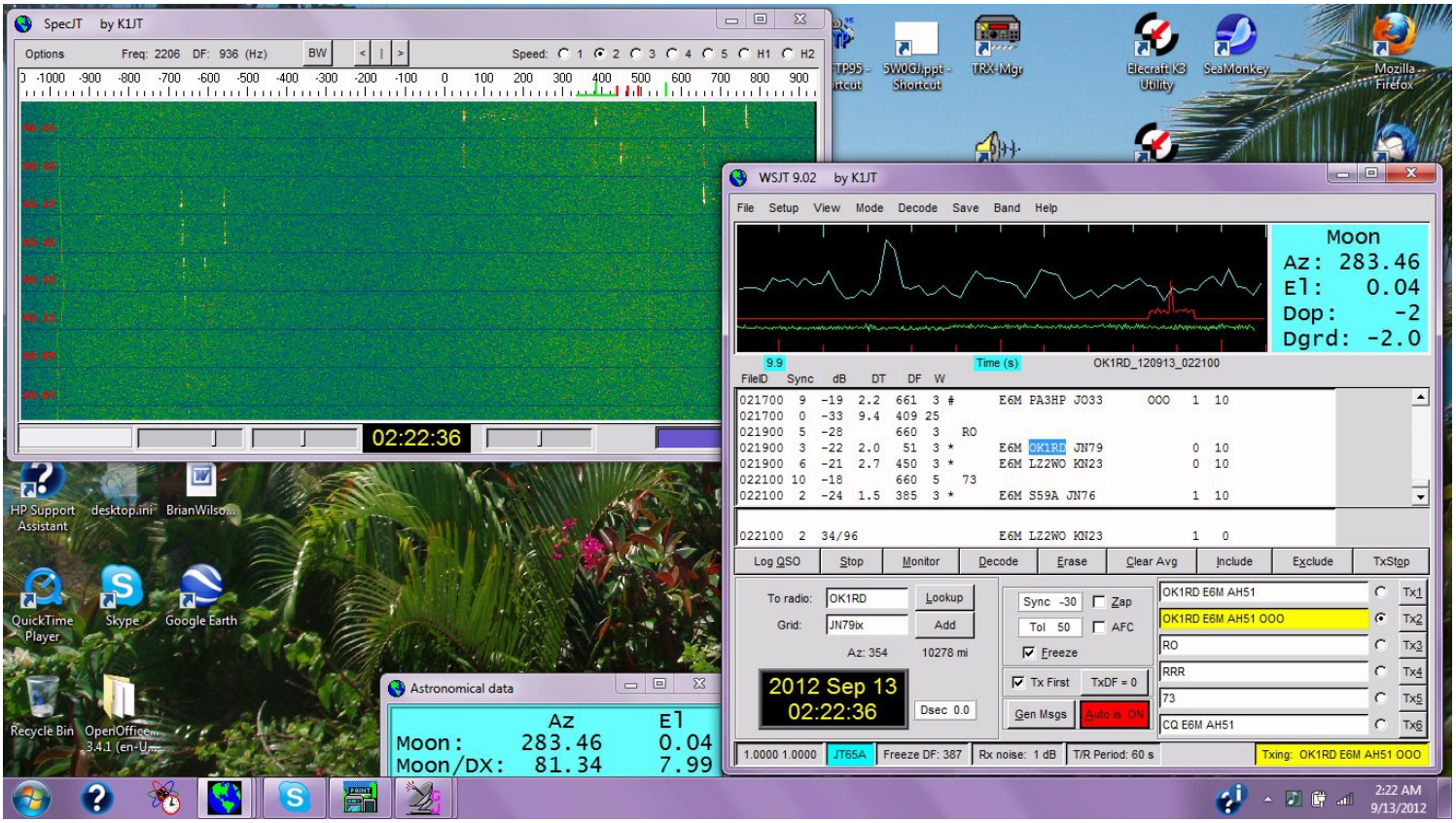
I hope to be in a financial position to be able to activate another "rare one" for many of you next year! Good luck to you all and best wishes for continued success and Magic on 6m EME!

Farewell to Niue, a very special place!

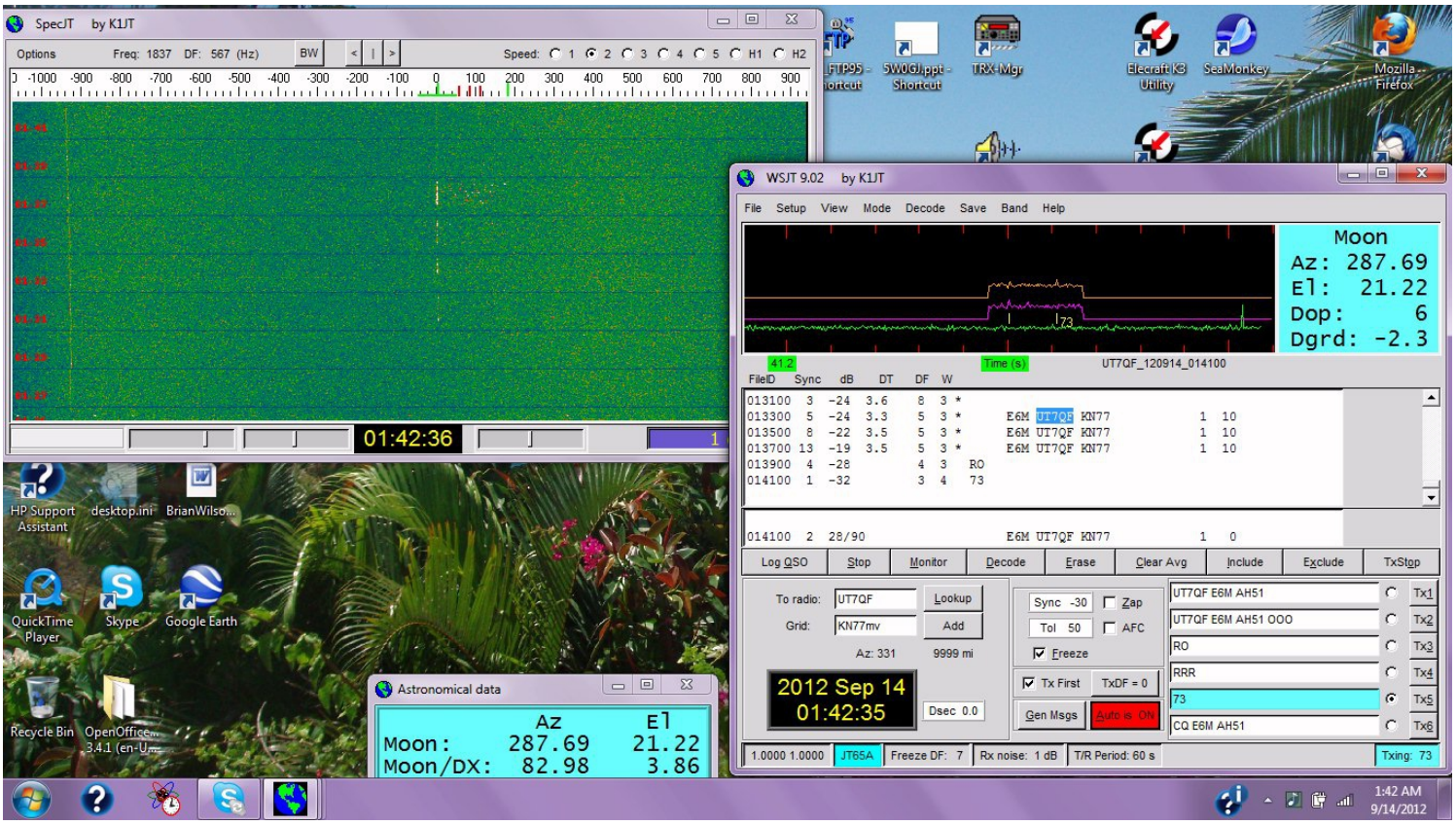
APPENDIX – SCREEN SHOTS



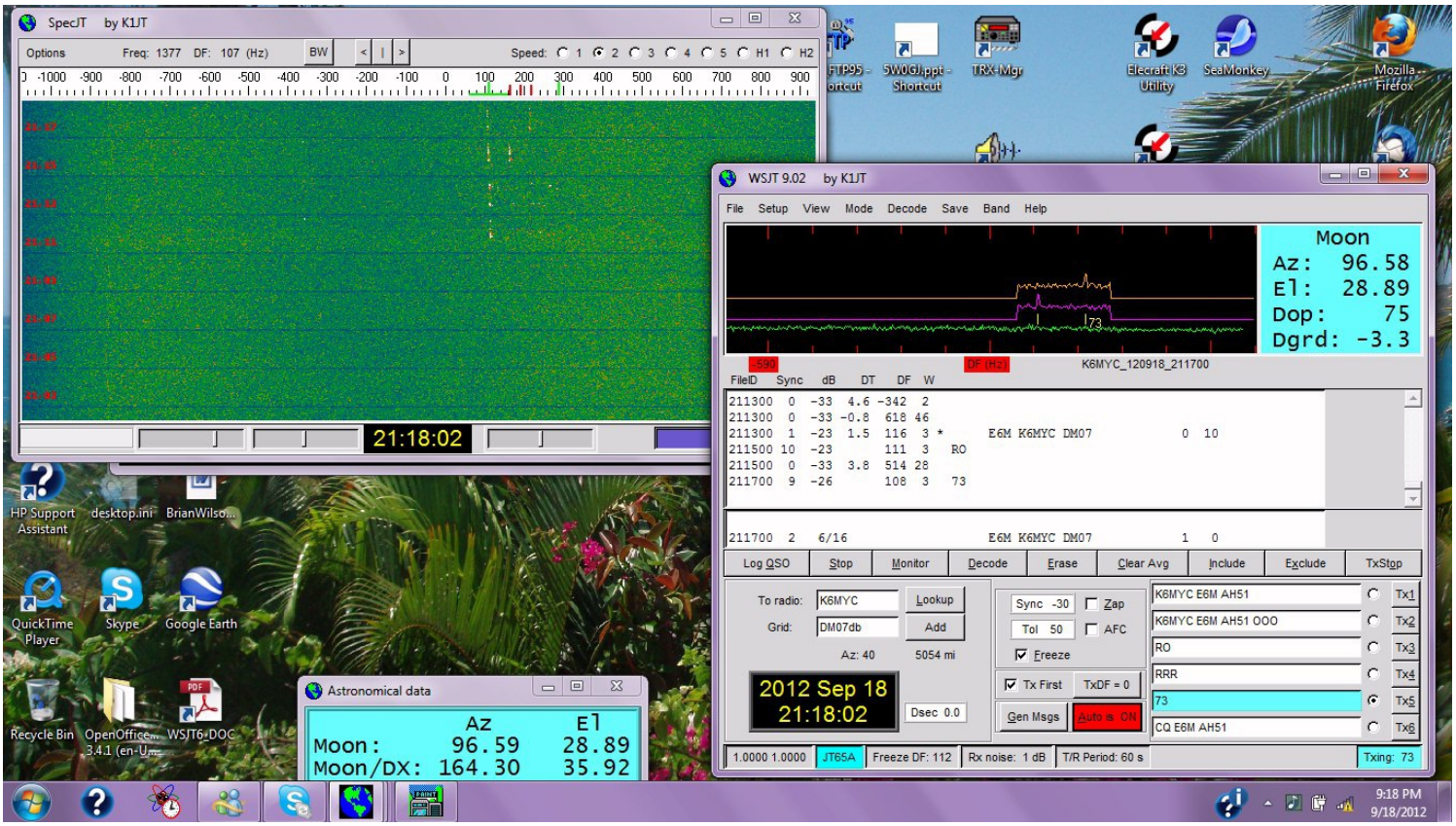
After this quick contact with G8VR (after my moonrise on September 12), I went back to calling G3WOS again, hoping he might copy me.



On September 13, I completed with PA3HP and copied OK1RD, LZ2WO and S59A as my moon set



On September 14, UT7QF had a good signal on his moonrise, even though I was still elevated



On September 18, it was good to finally catch up with Mike, K6MYC