

E I 1 A

AGENDA

- Introduction
- 2008 – 2009 1^{er} Contests HF EI/ON4EI 
- 2010 Expéditions Iles EJ8GQB  
- 2011 Période Campervan EI8GQB 
- 2012 Caravane & Energie Verte  
- 2013 EI1A Top Europe station  

INTRODUCTION



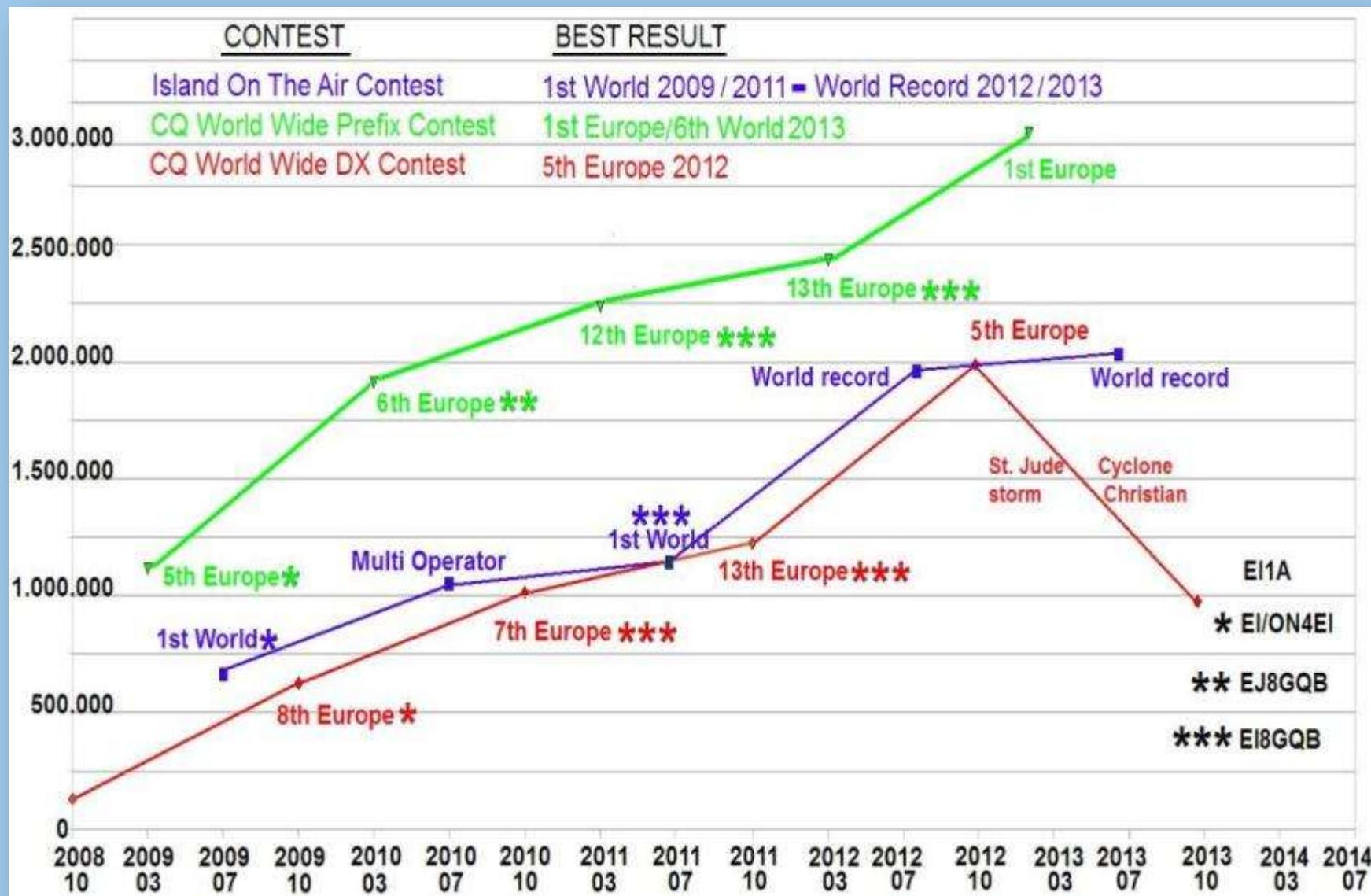
INTRODUCTION

- Olivier V. 46 ans
- 1^{er} récepteur OC à 12 ans
- Ingénieur Télécom
- Licencié en 1986 ON1KOP
- Membre ON7WR Waterloo (contest U-SHF 90's)
- Licence Harex en 2004 ON4EI
- Mariage en 2006 avec une Irlandaise
- 2010 EI8GQB
- 2012 EI1A

INTRODUCTION



INTRODUCTION



1^{er} Contests HF EI/ON4EI 2008-2009



2008 – 2009 1^{er} Contests HF EI/ON4EI

Fethard



Tipperary county

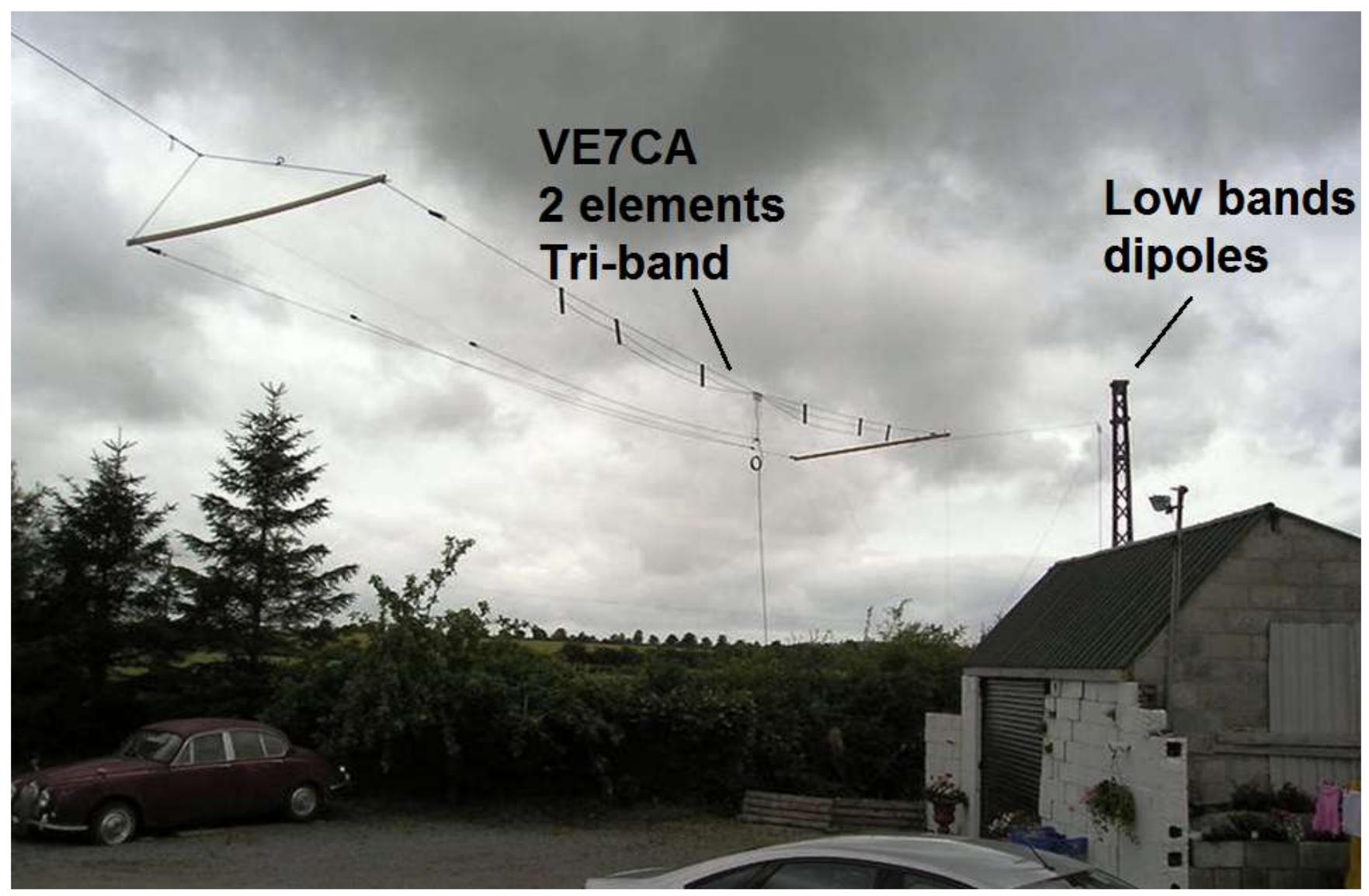


MER CELTIQUE

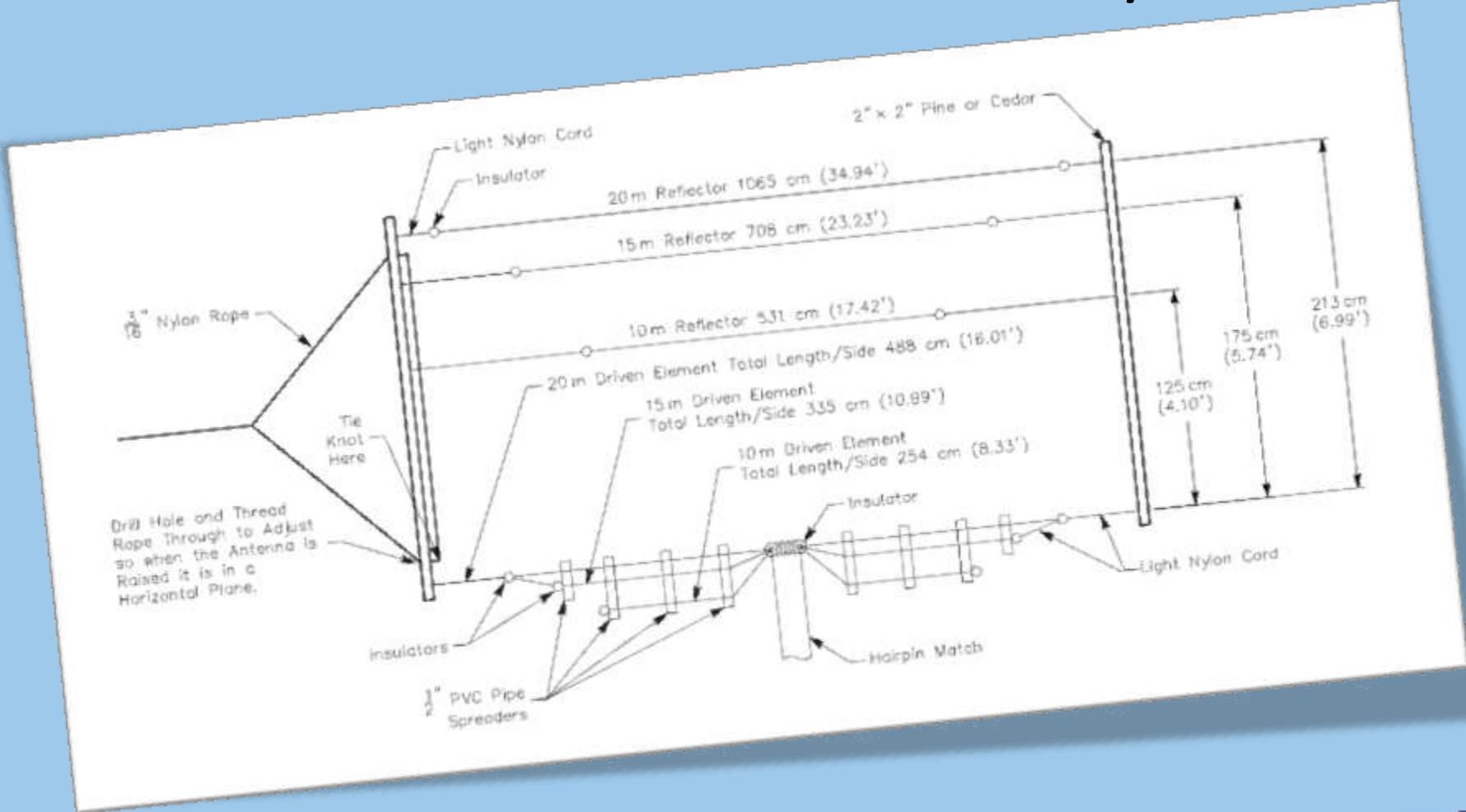
2008 – 2009 1^{er} Contests HF EI/ON4EI



2008 – 2009 1^{er} Contests HF EI/ON4EI

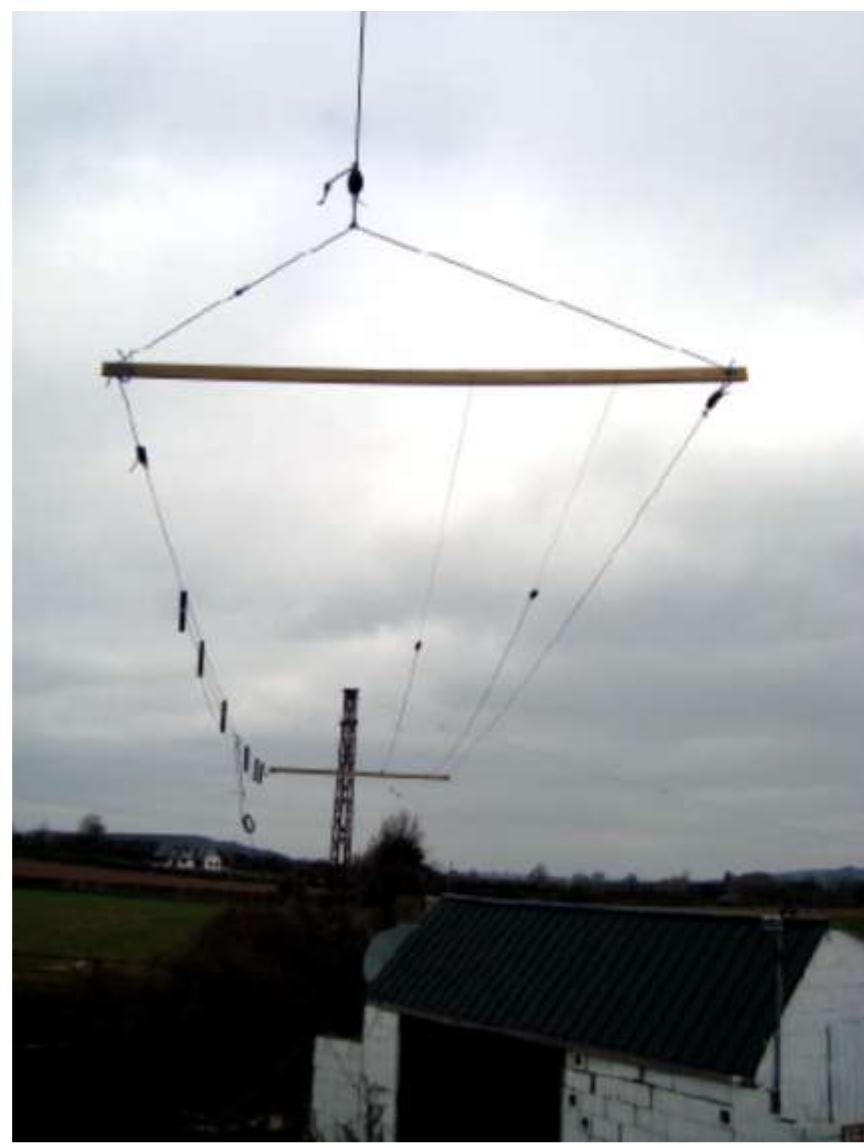


2008 – 2009 1^{er} Contests HF EI/ON4EI



VE7CA 2 éléments tri band beam filaire

2008 – 2009 1^{er} Contests HF EI/ON4EI



2008 – 2009 1^{er} Contests HF EI/ON4EI

10 éléments 20m band

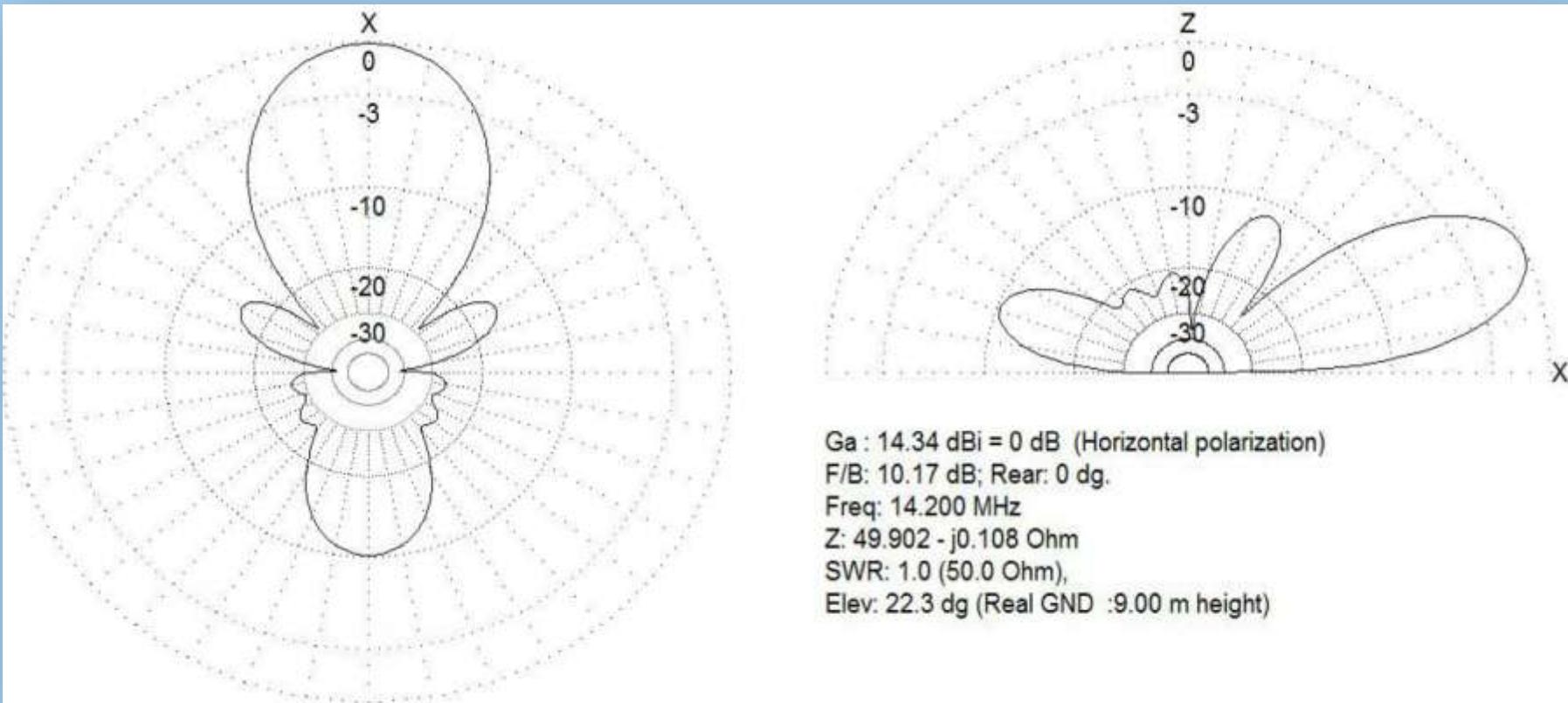


Hauteur : 9m
Longueur : 33.57m
Antenne bidirectionnelle

Période sans activité solaire
Bande 10m fermée
75% trafic 10-15-20m sur bande 20m



2008 – 2009 1^{er} Contests HF EI/ON4EI



Gain Avant : 12.12 dBd

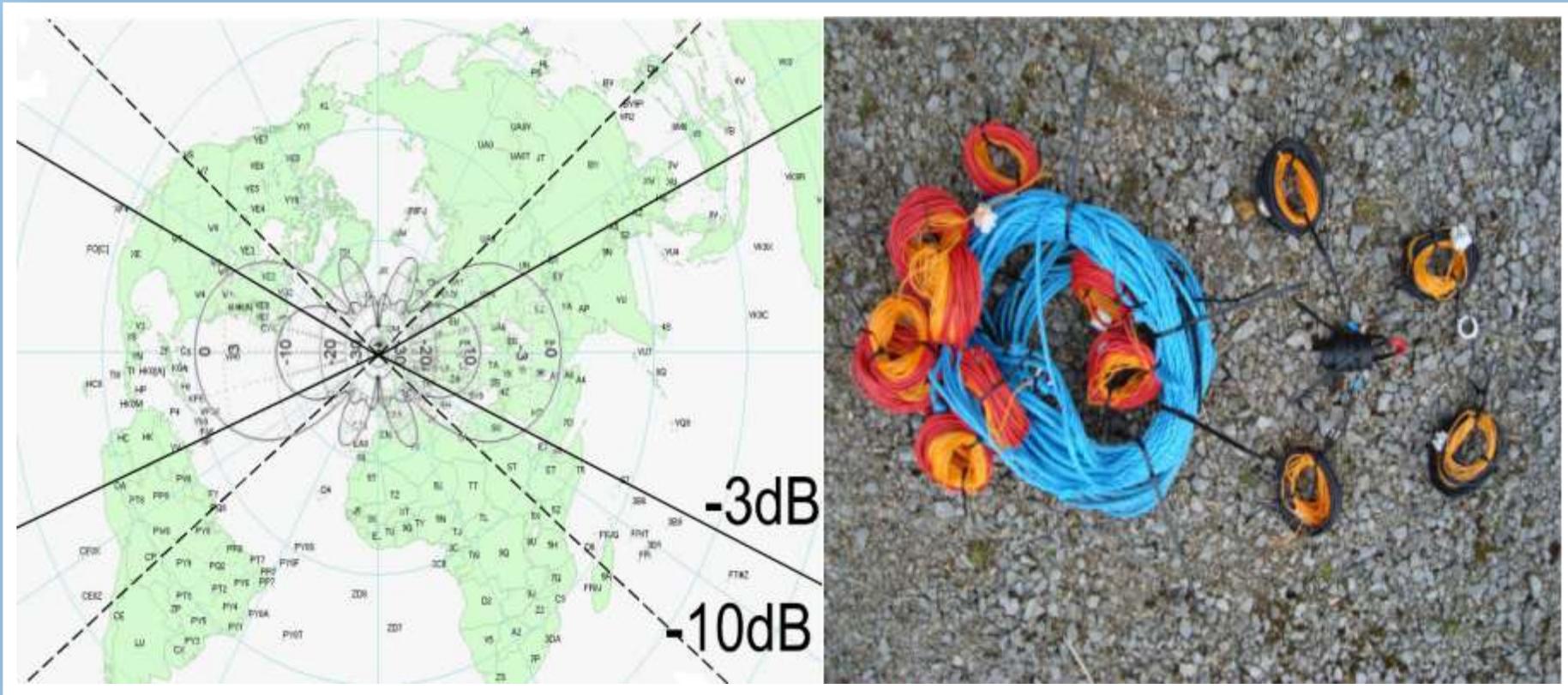
Rapport avant-arrière : 10.17 dBd Conception via MANNA-GAL

Gain Arrière: 1.95 dBd

Mesures via MiniVNA

Ouverture : 40°

2008 – 2009 1^{er} Contests HF EI/ON4EI



Gain Avant : 12.12 dBd

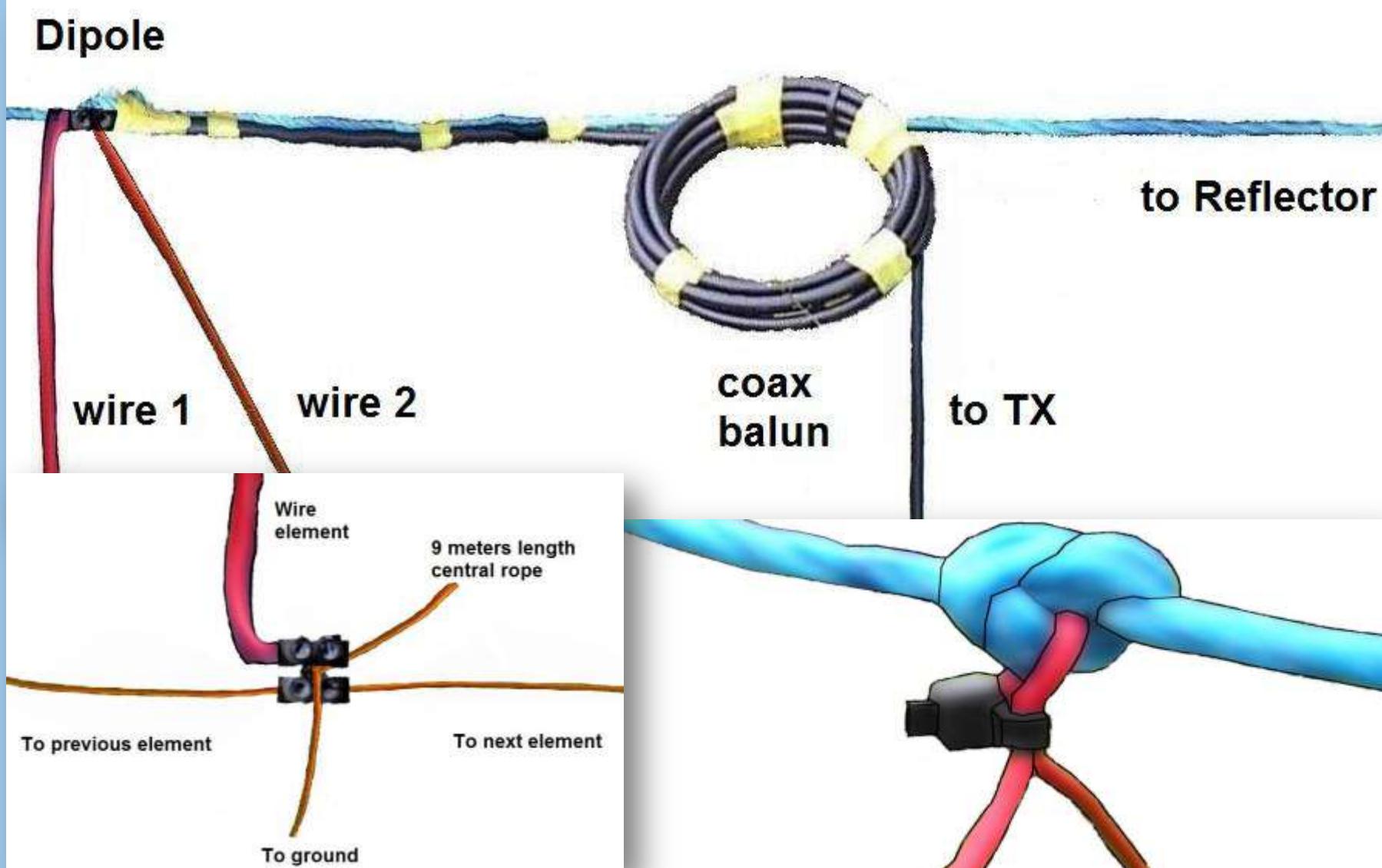
Rapport avant-arrière : 10.17 dBd

Gain Arrière: 1.95 dBd

Ouverture : 40°

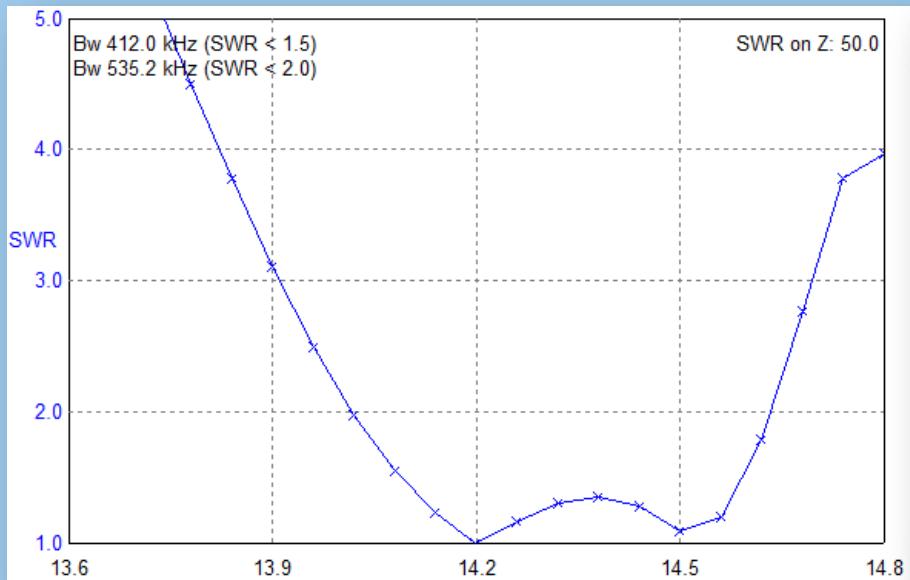
Position Irlande est idéale pour les contests 75% trafic Est-West.

2008 – 2009 1^{er} Contests HF EI/ON4EI

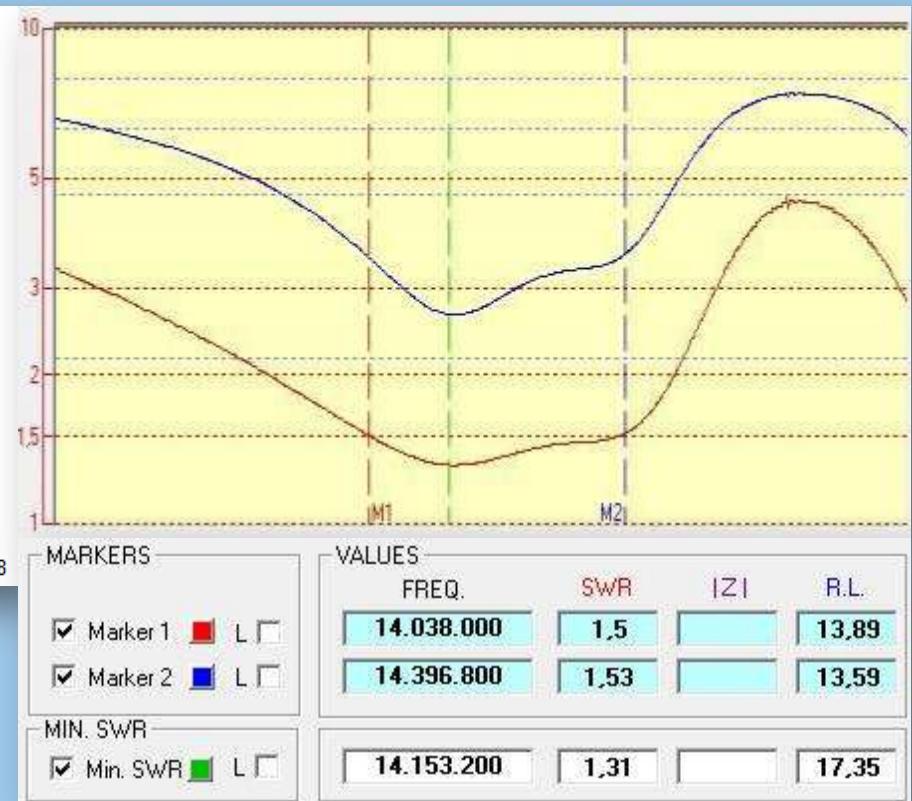


Construction simple

2008 – 2009 1^{er} Contests HF EI/ON4EI



Simulation via MANNA-GAL



Mesures via MiniVNA

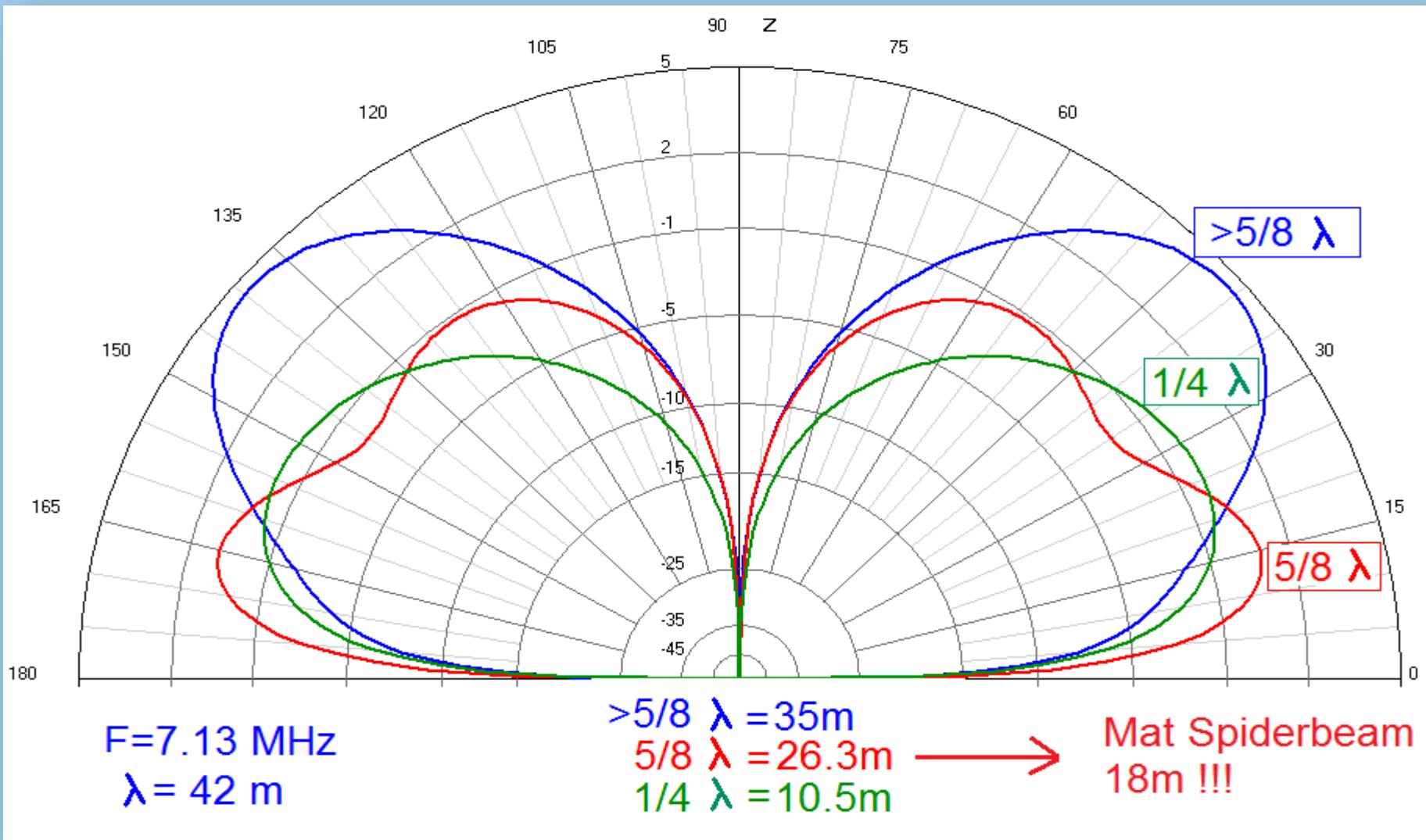
Résultats sans optimisation

2008 – 2009 1^{er} Contests HF EI/ON4EI



Design sur <http://www.qrz.com/db/EI8GQB>

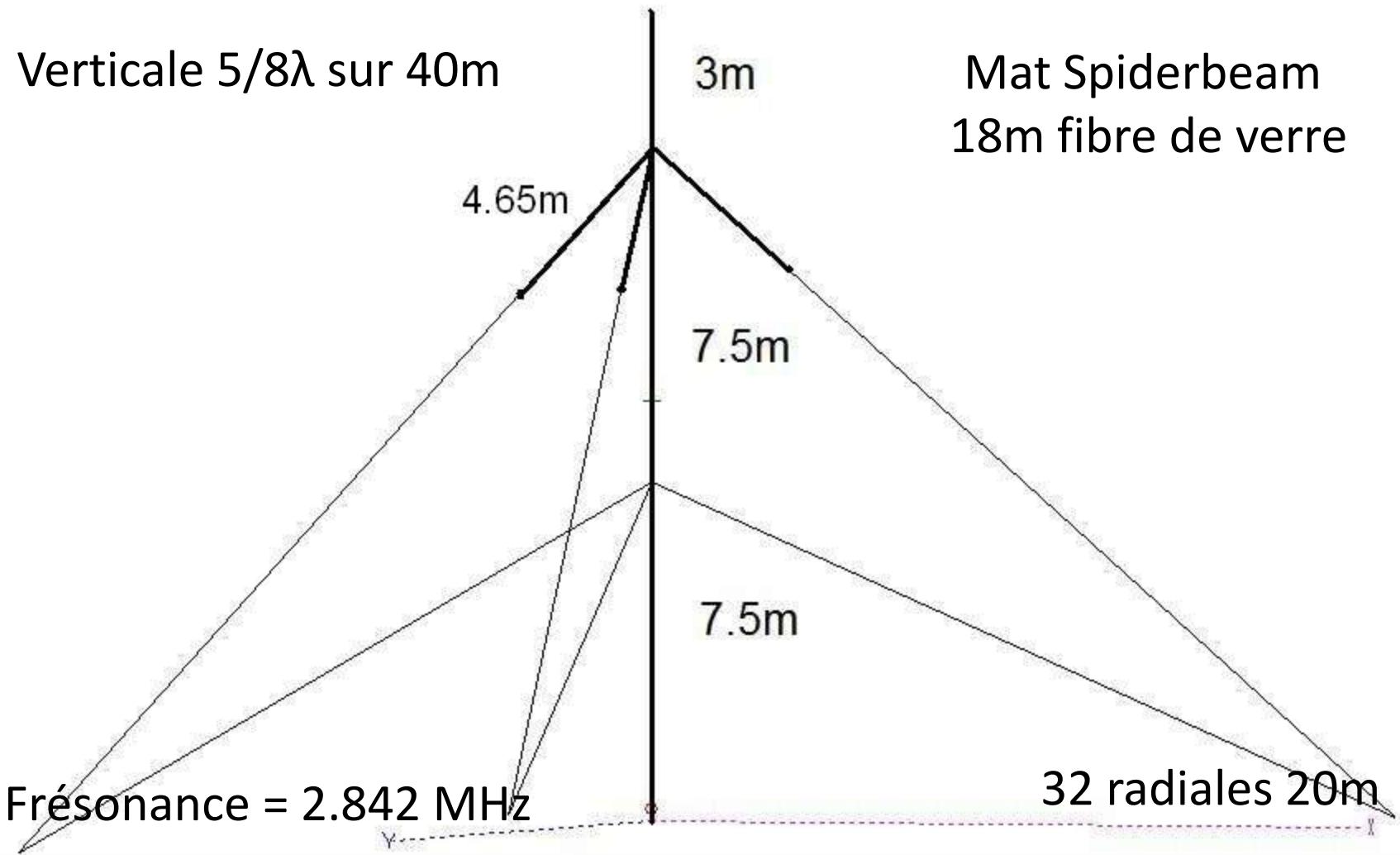
2008 – 2009 1^{er} Contests HF EI/ON4EI



Verticale 160m-80m-40m

2008 – 2009 1^{er} Contests HF EI/ON4EI

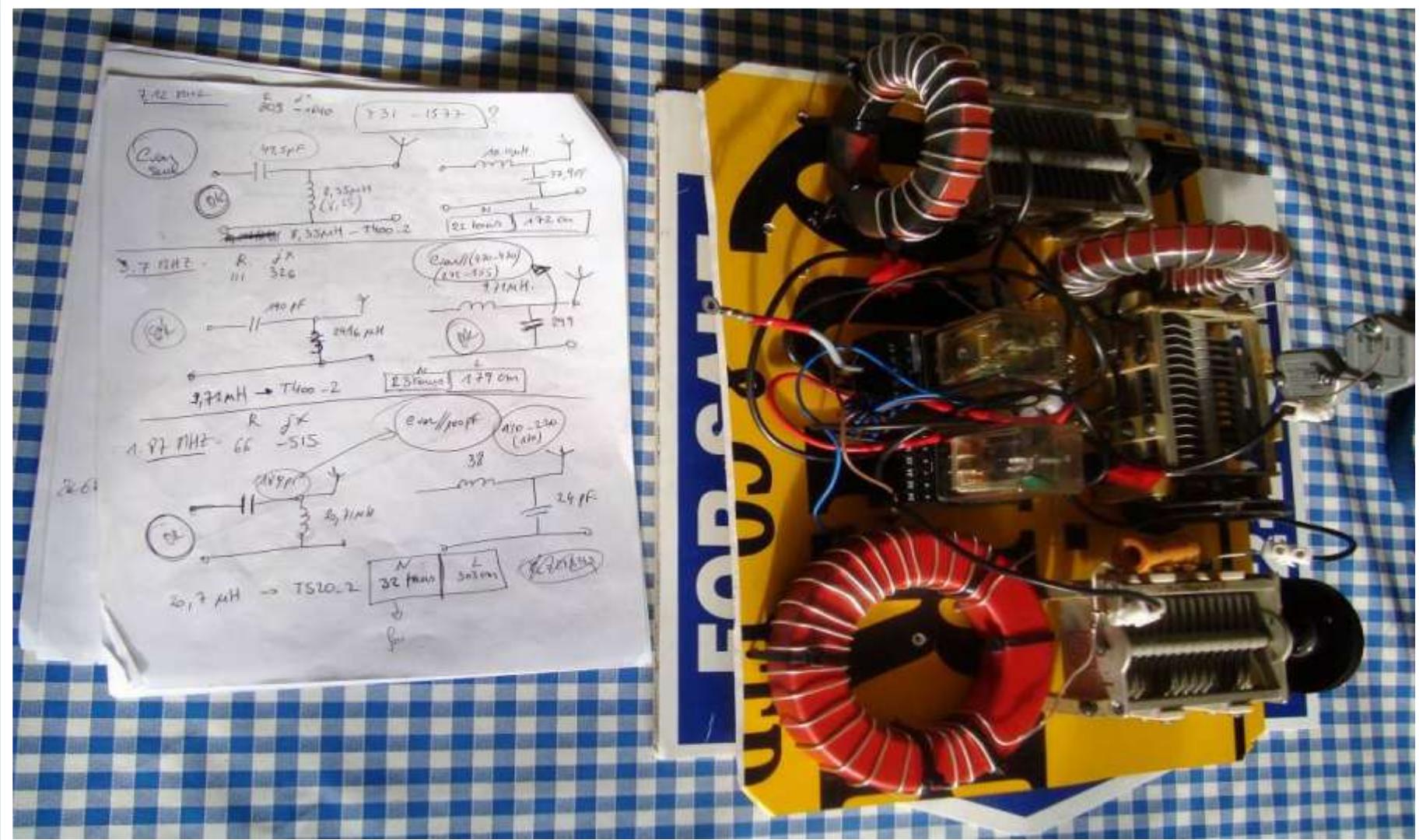
Verticale 5/8λ sur 40m



Chapeau capacitif (Top Loading)

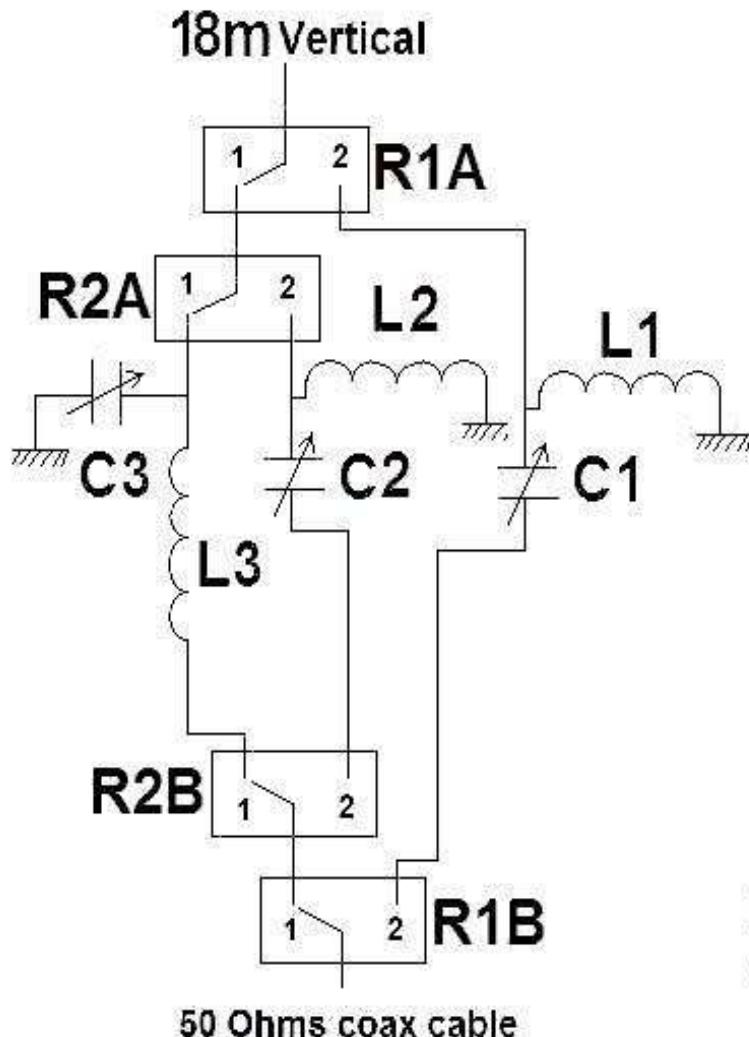


2008 – 2009 1^{er} Contests HF EI/ON4EI



Boite d'accord (Tuning box)

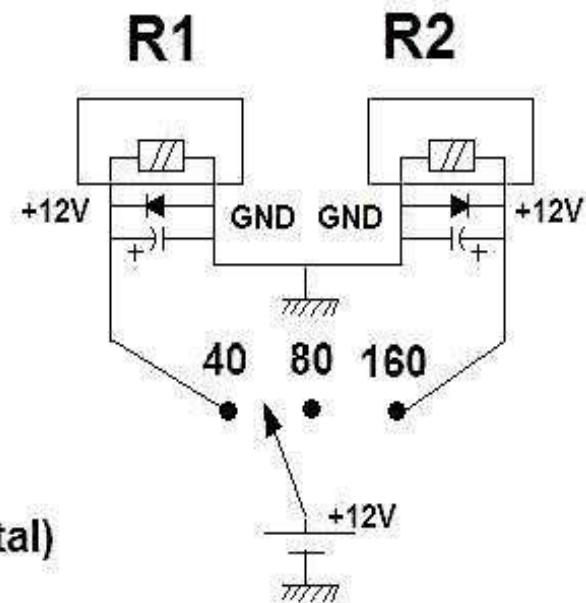
2008 – 2009 1^{er} Contests HF EI/ON4EI



		L	C
40	1	8µH	50pF
80	3	10µH	300pF
160	2	21µH	190pF

	R1	R2
40	2	-
80	1	1
160	1	2

D = 1N4002
 C = 0,1 µF 35V (Tantal)



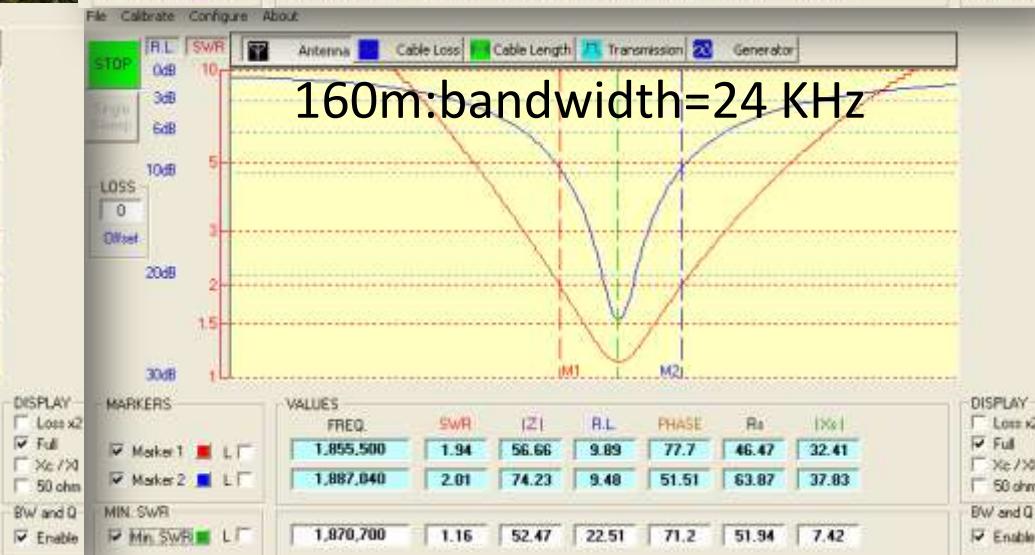
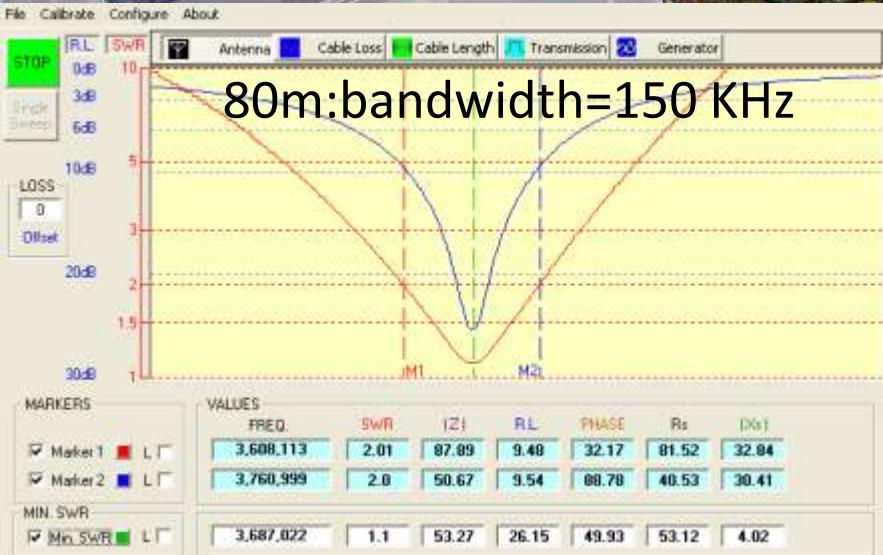
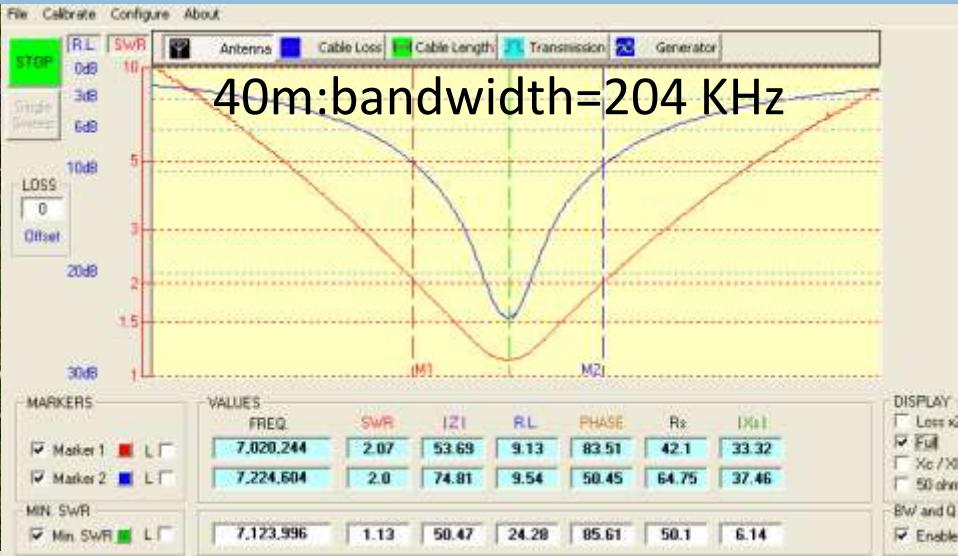
Boite d'accord (Schéma)

2008 – 2009 1^{er} Contests HF EI/ON4EI



Boite d'accord + 32 radiales

2008 – 2009 1^{er} Contests HF EI/ON4EI

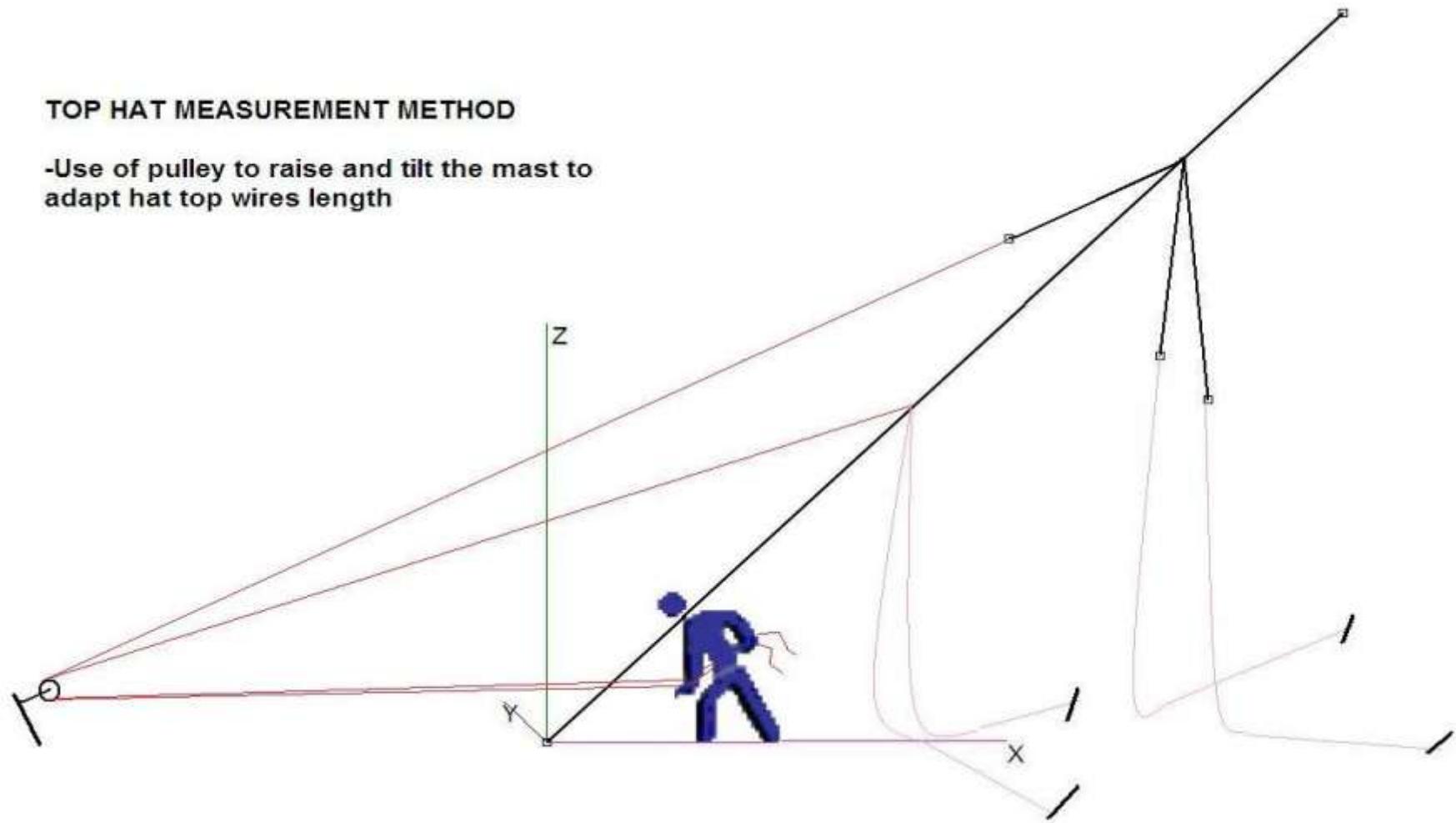


Mesures SWR MiniVNA (Bandwidth pour SWR2/1)

2008 – 2009 1^{er} Contests HF EI/ON4EI

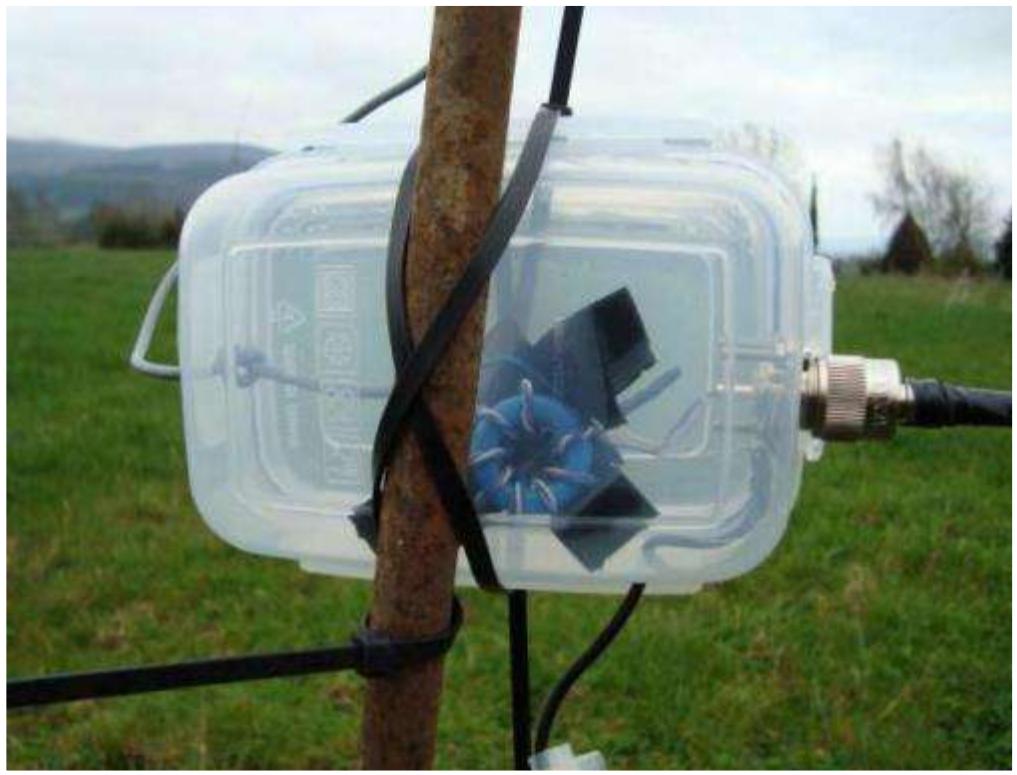
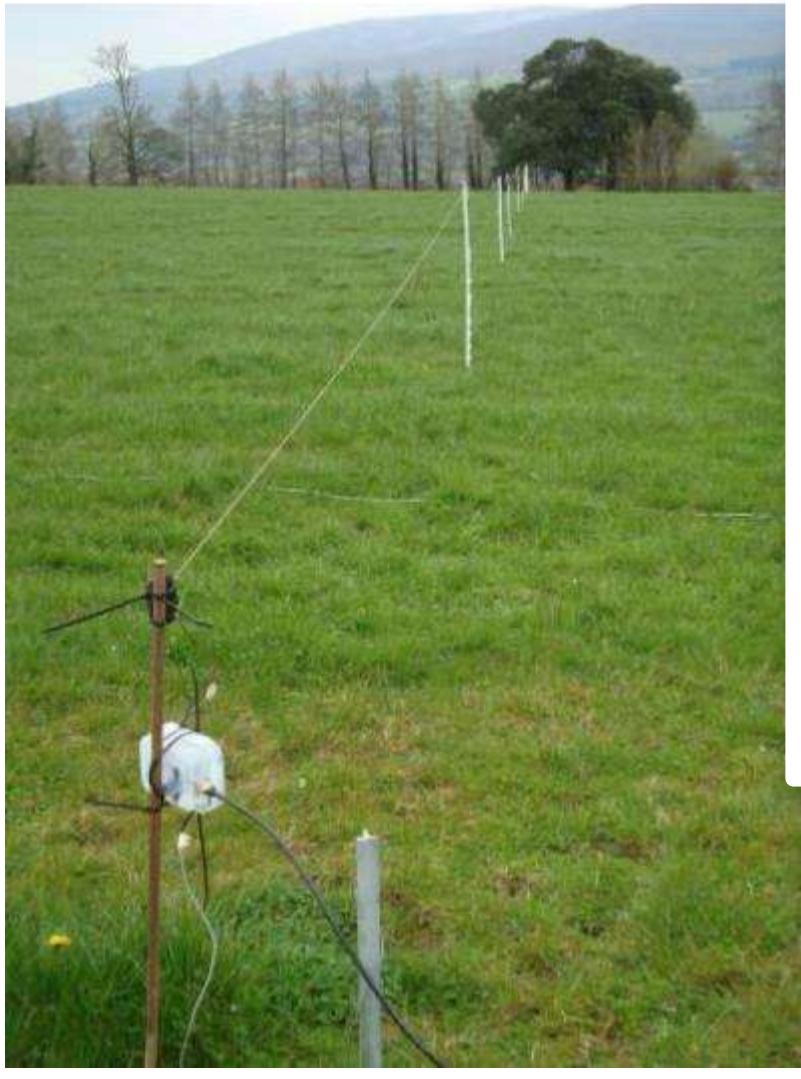
TOP HAT MEASUREMENT METHOD

-Use of pulley to raise and tilt the mast to adapt hat top wires length



Méthode d'installation

2008 – 2009 1^{er} Contests HF EI/ON4EI



Longueur : 160m
Hauteur : 1.5m
Balun 9:1

Antenne beverage (Réception)



2008 – 2009 1^{er} Contests HF EI/ON4EI



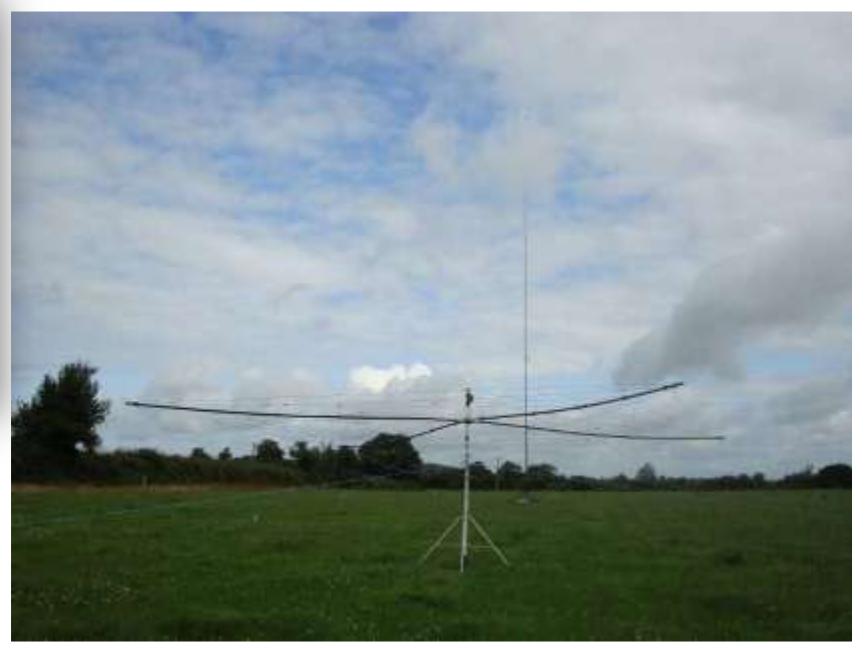
K3 Elecraft

(Améliorer les conditions de réception % TS2000)



EI8GQB

(obtention d'une licence Irlandaise)



Beam Spiderbeam

(se préparer à l'augmentation de l'activité solaire pour 15m et 10m)

3 Améliorations 2009

2008 – 2009 1^{er} Contests HF EI/ON4EI



Le shack des premiers contests

Expéditions Iles EJ8GQB 2010

Bere Island
EU121 (Solo)
Mars 2010



Saltees Islands
EU103 (+ EI4II)
Juillet 2010



2010 Expéditions Iles EJ8GQB



Bere island CQWW DX SSB Mars 2010

2010 Expéditions Iles EJ8GQB



2010 Expéditions Iles EJ8GQB



2010 Expéditions Iles EJ8GQB



2010 Expéditions Iles EJ8GQB



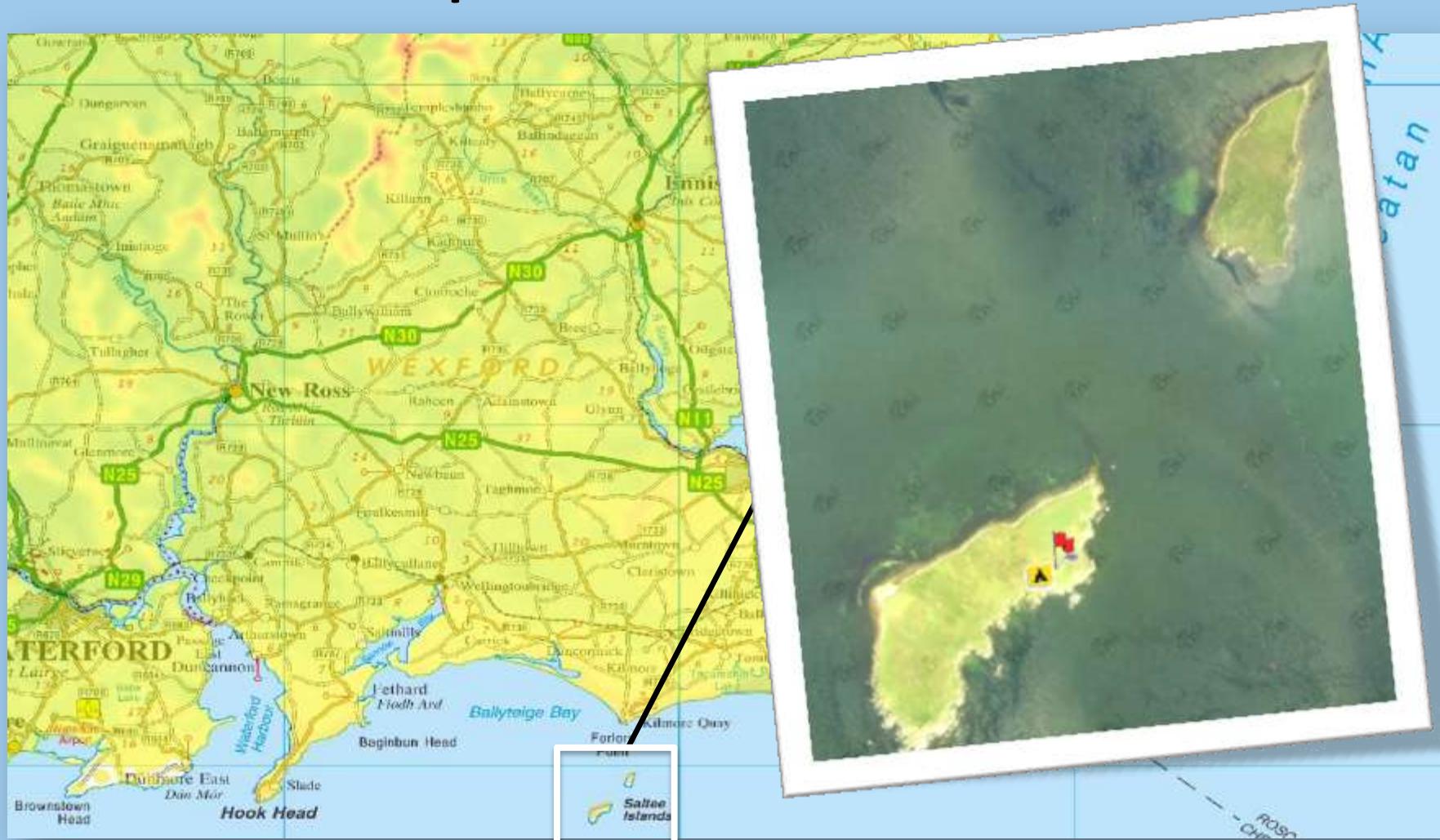
Bere Island

2010 Expéditions Iles EJ8GQB



Plus d'info sur <http://www.qrz.com/db/EJ8GQB>

2010 Expéditions Iles EJ8GQB



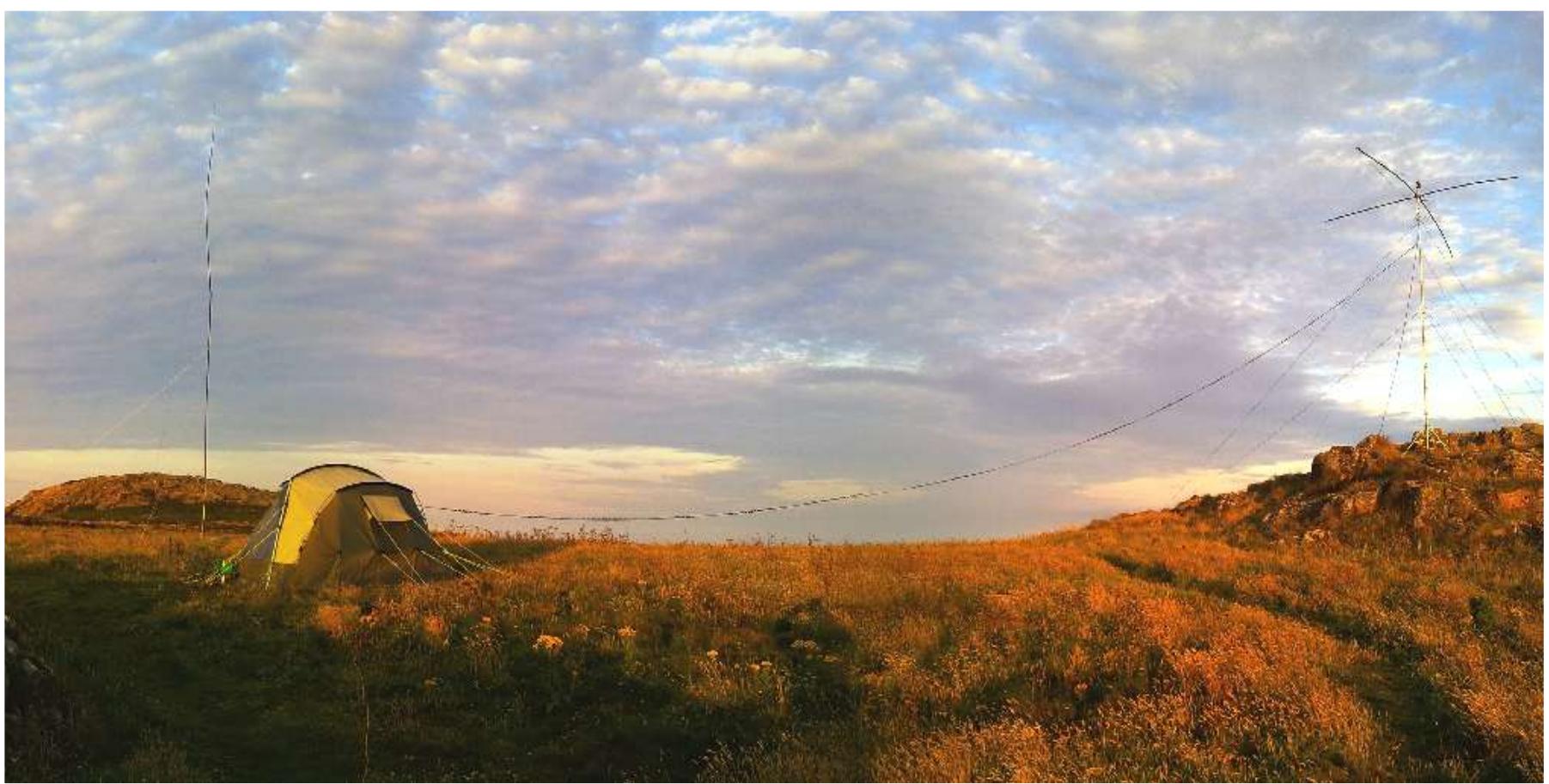
Saltee islands IOTA July 2010 EJ4II-EJ8GQB

2010 Expéditions Iles EJ8GQB



Répétition IARU HF Juillet 2010 EI4II QTH

2010 Expéditions Iles EJ8GQB



Ile privée – Réserve naturelle
Accès limité et difficile

2010 Expéditions Iles EJ8GQB



2010 Expéditions Iles EJ8GQB



Saltee Islands

2010 Expéditions Iles EJ8GQB

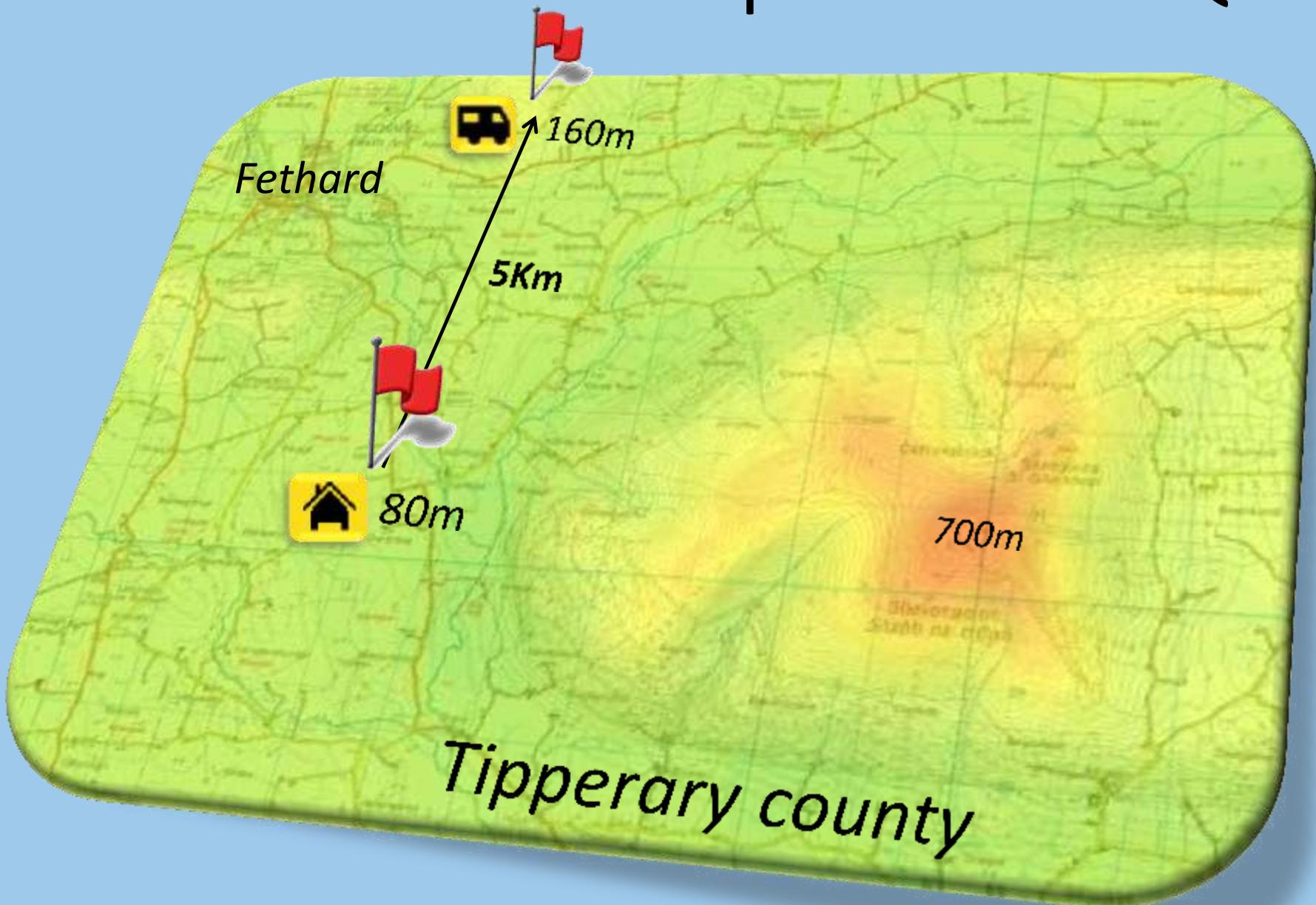


Plus d'info sur <http://www.qrz.com/db/EJ4II>

Période Campervan EI8GQB 2011



2011 Période Campervan EI8GQB



2011 Période Campervan EI8GQB



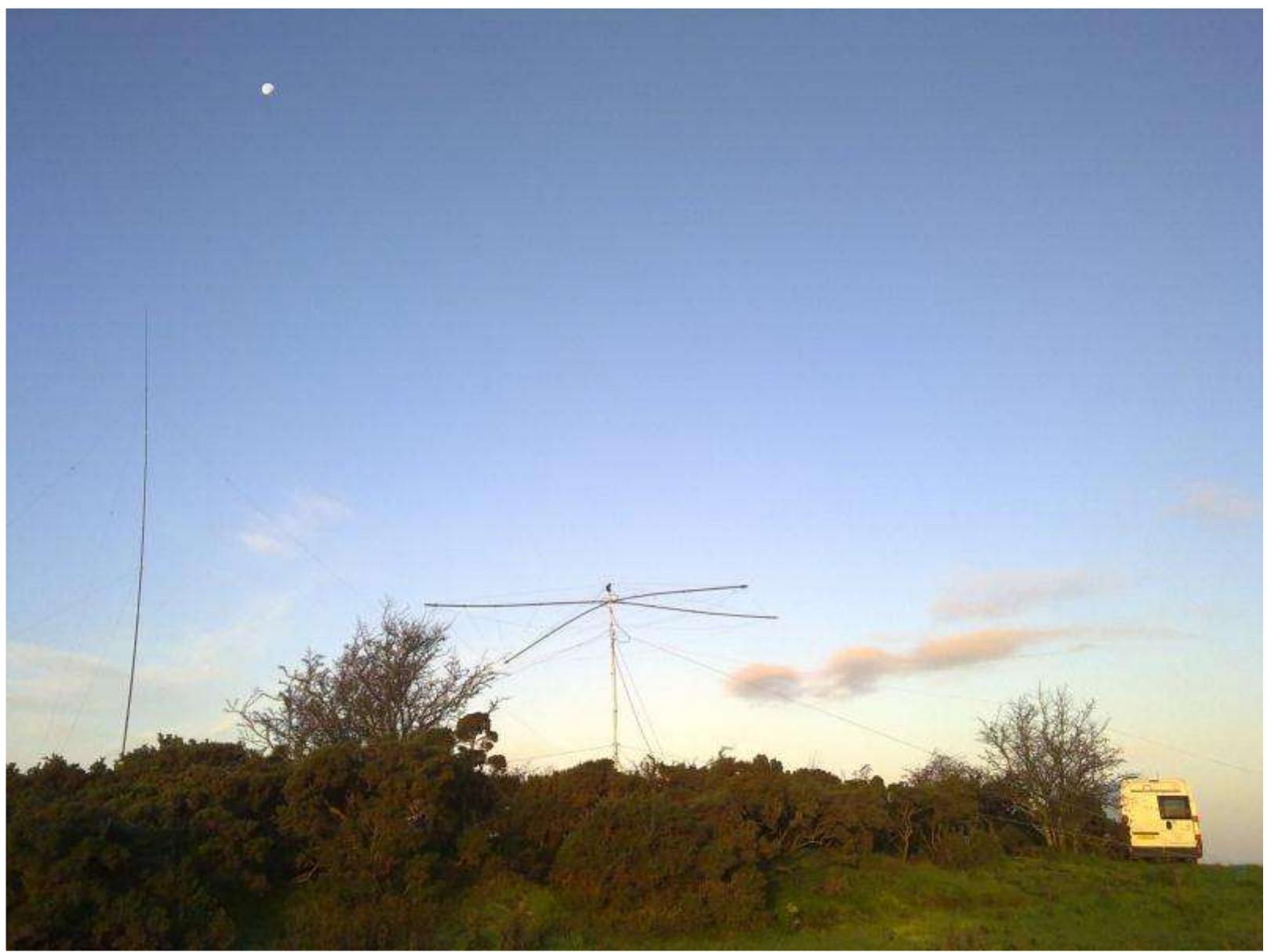
EI8GQB
NEW QTH



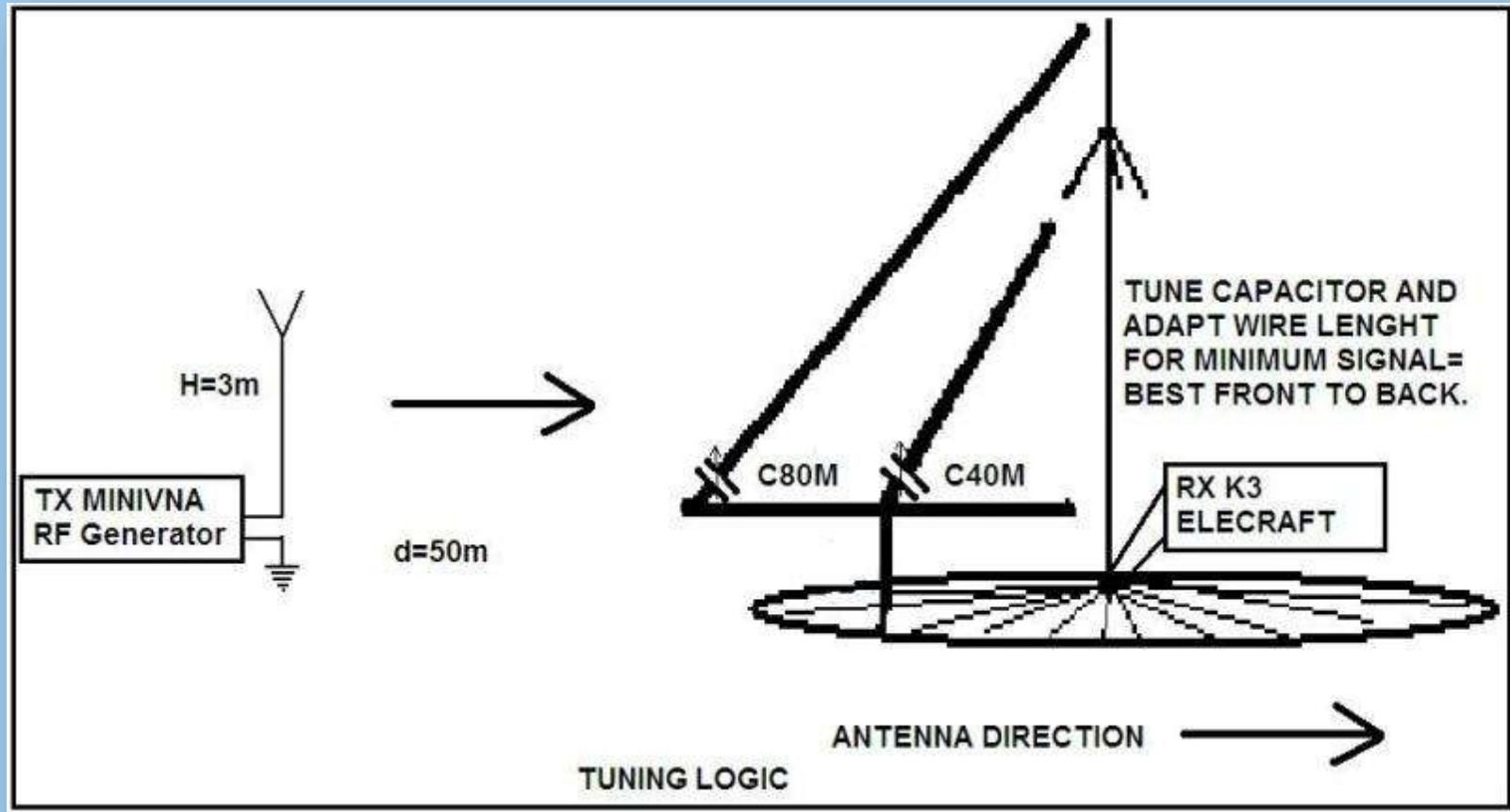
2011 Période Campervan EI8GQB



2011 Période Campervan EI8GQB



2011 Période Campervan EI8GQB



Expérimentation : concept Spitfire



2011 Période Campervan EI8GQB



CQ WW DX SSB (Octobre 2010) 

2011 Période Campervan EI8GQB



Nouveau QTH sur la colline

2011 Période Campervan EI8GQB



Nouveau QTH sur la colline

Accès plus facile – premières habitations à 500m – Low noise
Pas de végétation - Point d'eau disponible à 50m

2011 Période Campervan EI8GQB

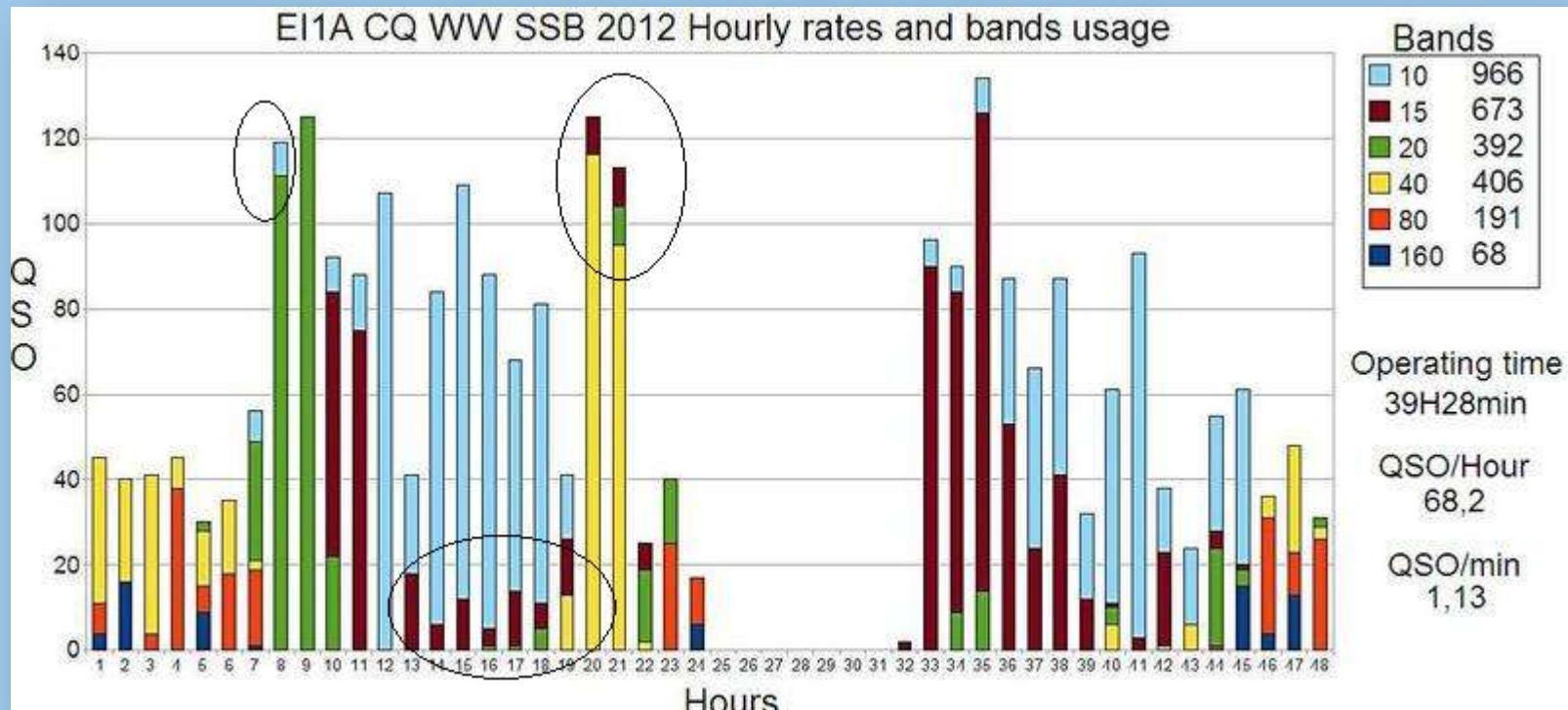


2011 Période Campervan EI8GQB

Débuts SO2R (Single Operator 2 radios)
RUN & SEARCH



-> Permet d'augmenter le nombre de QSO (10%)

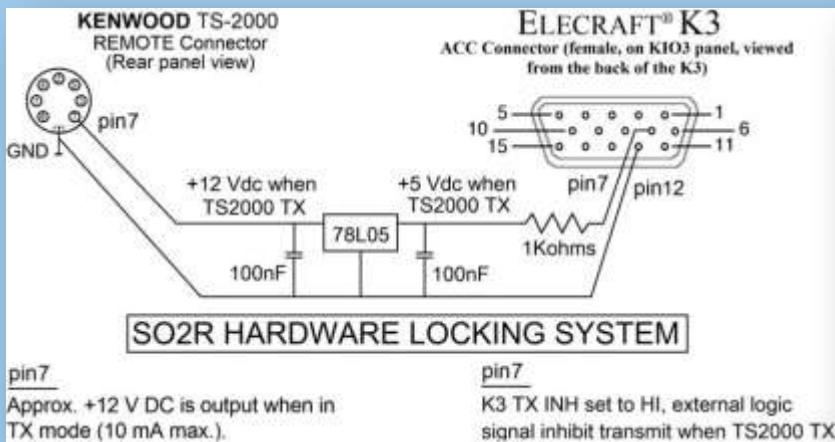


2011 Période Campervan EI8GQB

Débuts SO2R (Single Operator 2 radios) RUN & SEARCH



- > Durant :
 - Lorsque CQ sur la radio RUN.
 - Période de faible activité (nuit).
 - Trouver des QSO mutluplicateurs ou point.
 - Vérifier si les bandes s'ouvrent.
- > Contraintes : Plusieurs antennes.
 - TX Locking system (pas 2 signaux TX en même temps).

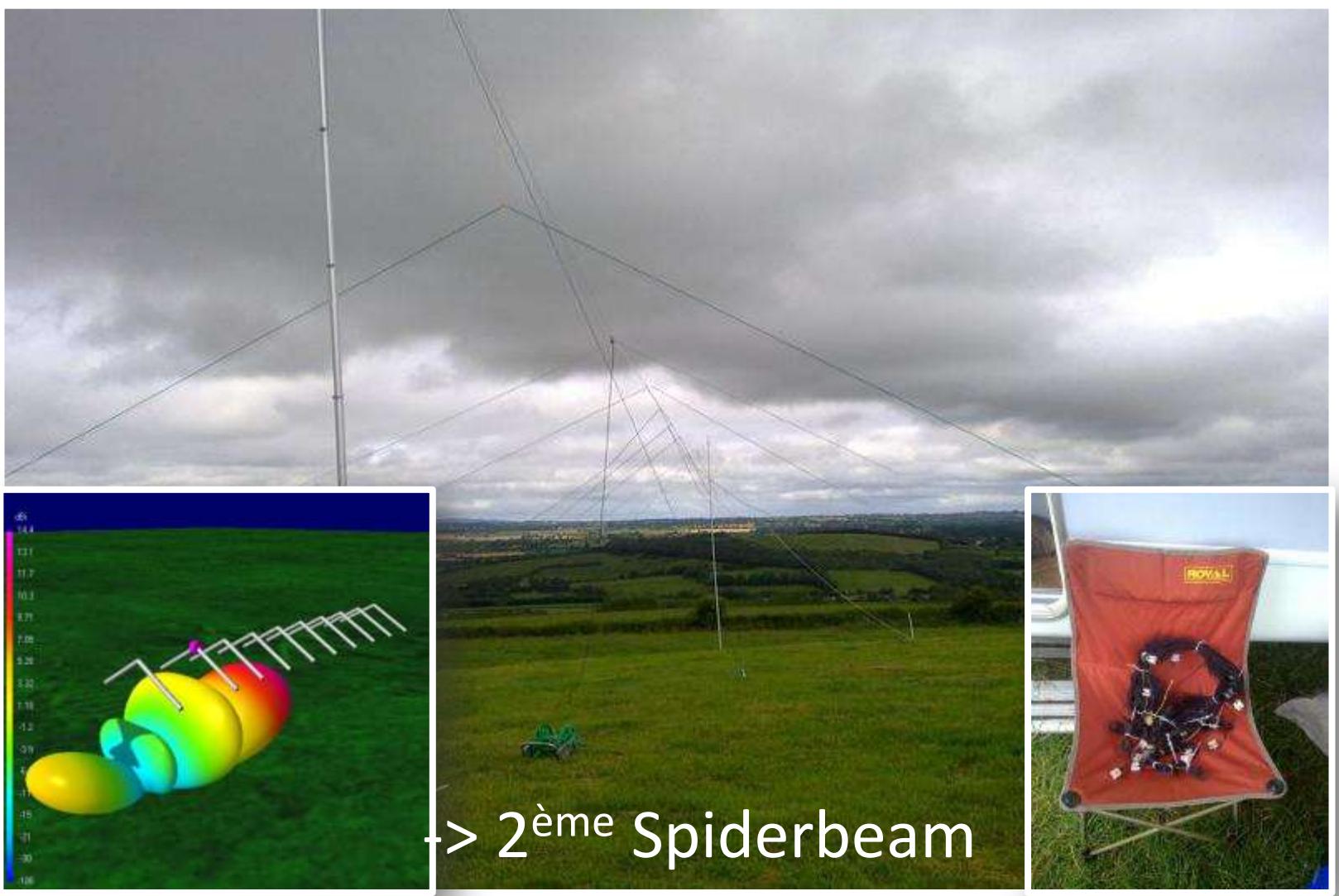


2011 Période Campervan EI8GQB

Débuts SO2R (Single Operator 2 radios)



2011 Période Campervan EI8GQB



> 2^{ème} Spiderbeam

Expérimentation : antenne 10 éléments 20m

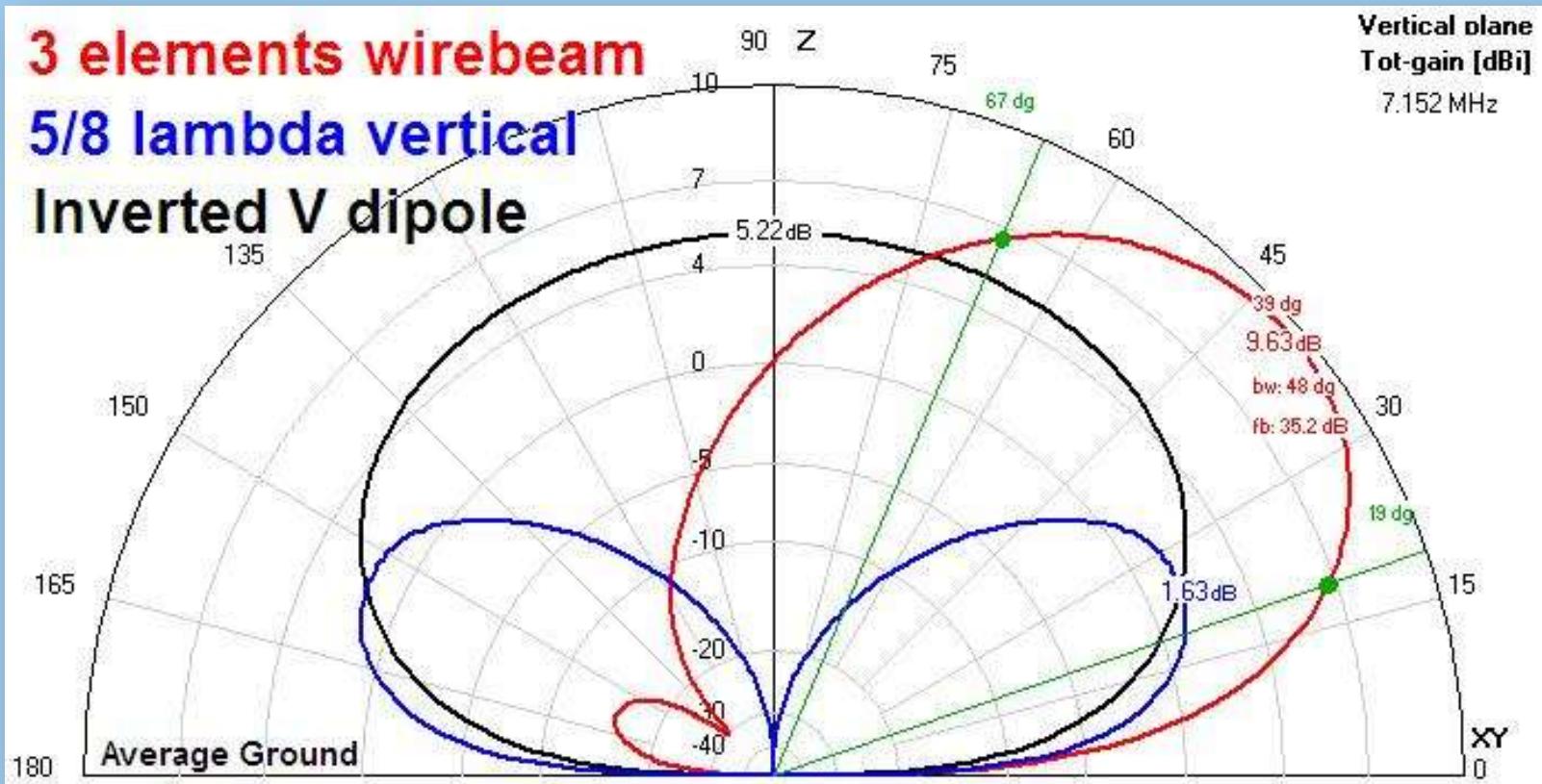


2011 Période Campervan EI8GQB



Expérimentation : 3 éléments verticale 40m 

2011 Période Campervan EI8GQB

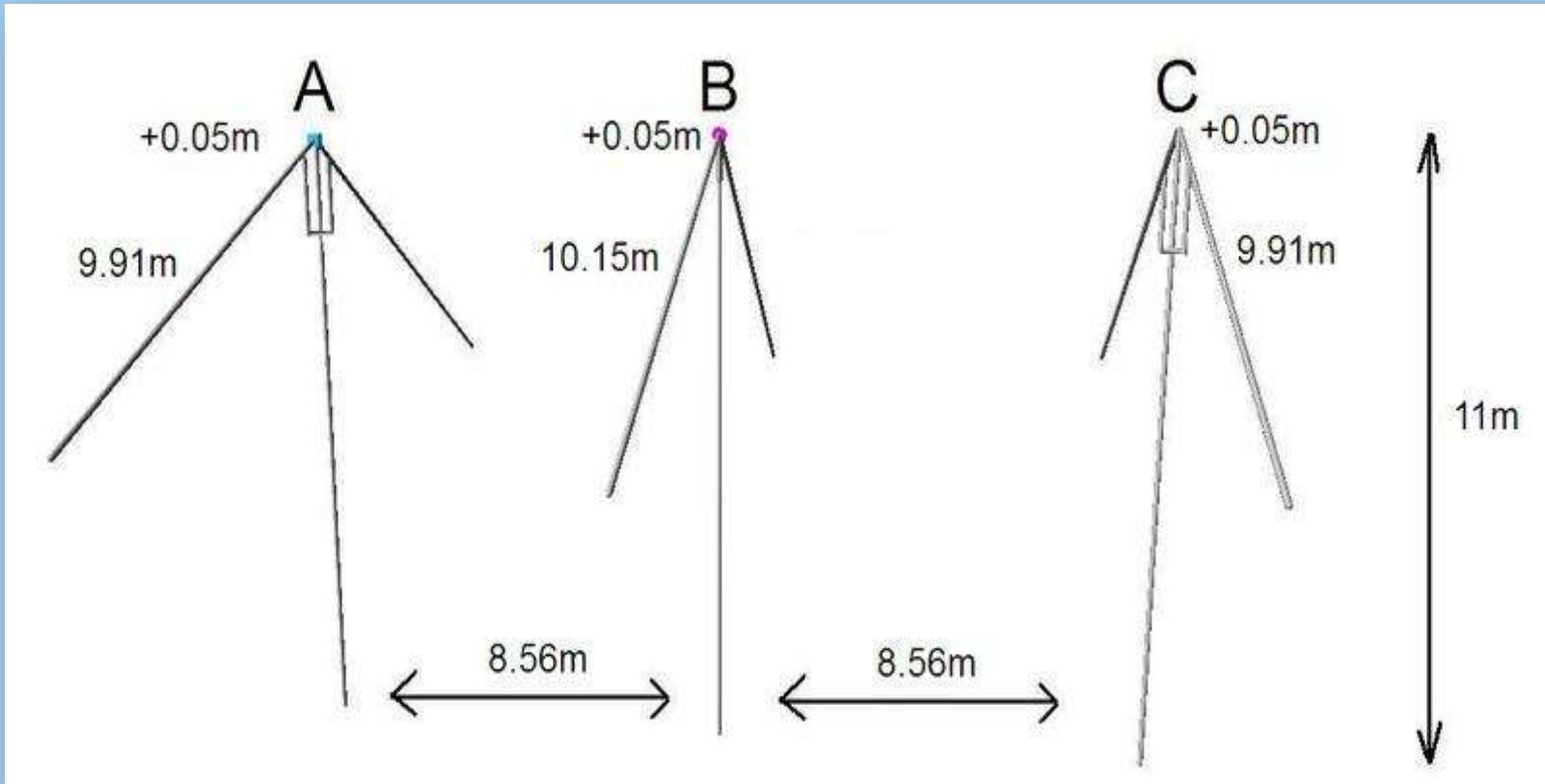


Verticale OK en DX mais pas bon sur Europe (IOTA contest)

Expérimentation : 3 éléments wirebeam 40m



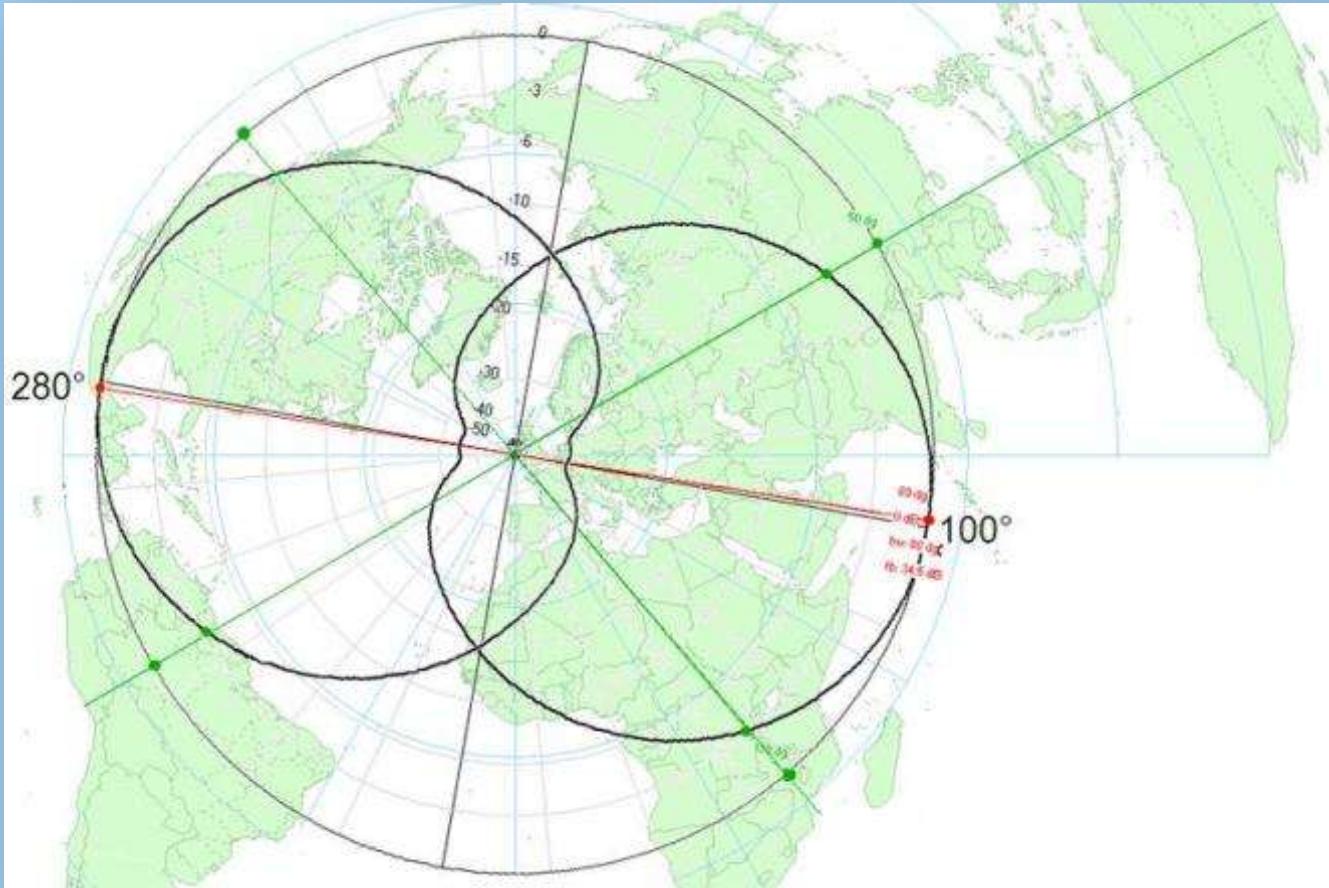
2011 Période Campervan EI8GQB



Distance constante entre éléments permet bidirectionnalité
Hauteur de 11m permet d'accéder aux extrémité des éléments

Expérimentation : 3 éléments wirebeam 40m

2011 Période Campervan EI8GQB



Orientation Est –West (100°)

Ouverture à 3db : 90°

Expérimentation : 3 éléments wirebeam 40m



2011 Période Campervan EI8GQB



CQ WW DX SSB (Octobre 2011)



Caravane & Energie Verte EI1A 2012

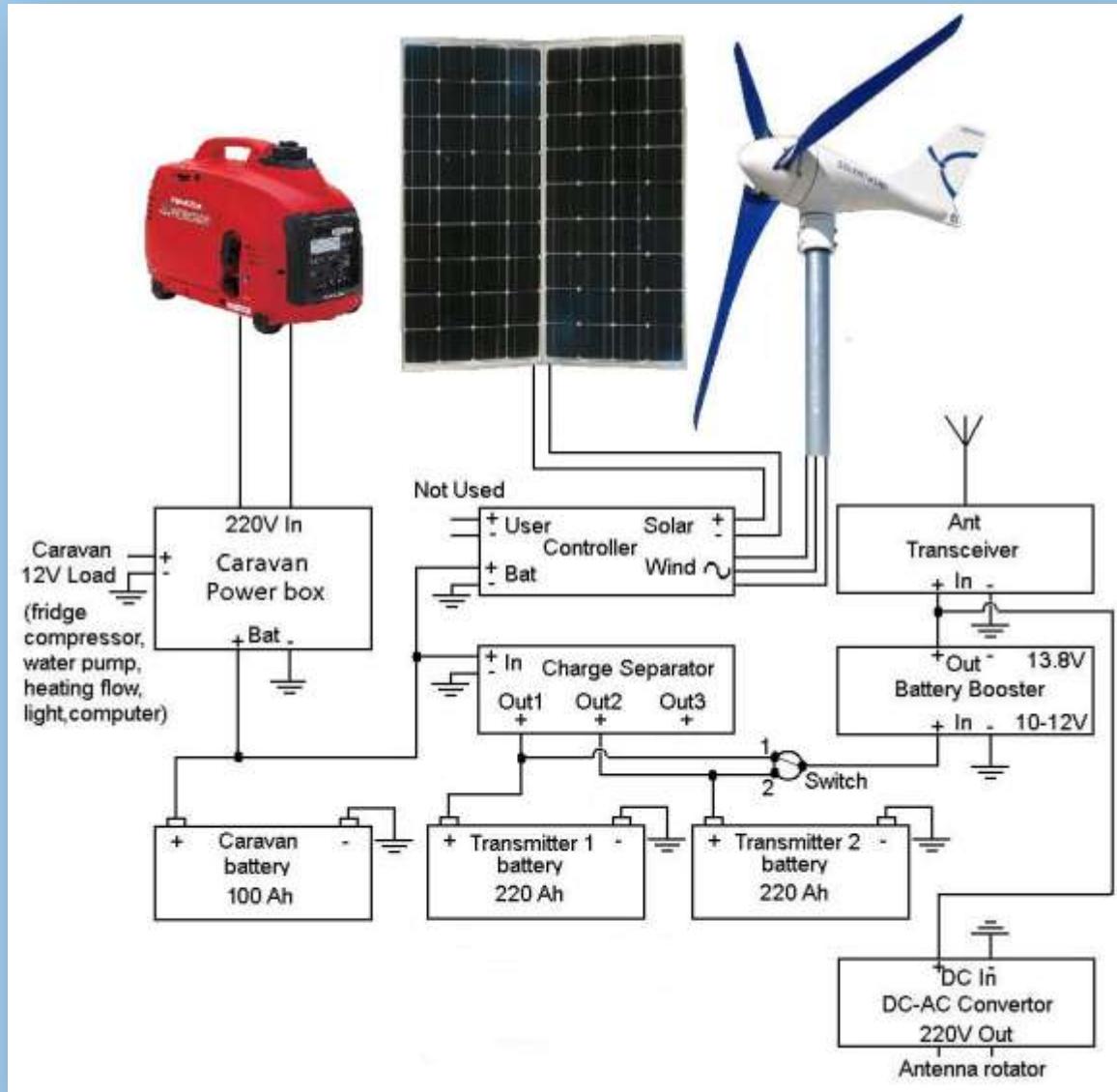


2012 Caravane & Energie Verte EI1A



Caravane d'occasion et système hybride SUN + WIND

2012 Caravane & Energie Verte EI1A



- Schéma de l'installation
- Modification du circuit électrique de la caravane.
- Remplacement de toutes les lampes 12V par LED.
- PC avec log alimenté en 12V.
- Seuls les moteurs d'antennes en 220V.



2012 Caravane & Energie Verte EI1A



Système SPRECO/SILENTWIND Eolienne 420W 12V ($\phi = 1.15m$)



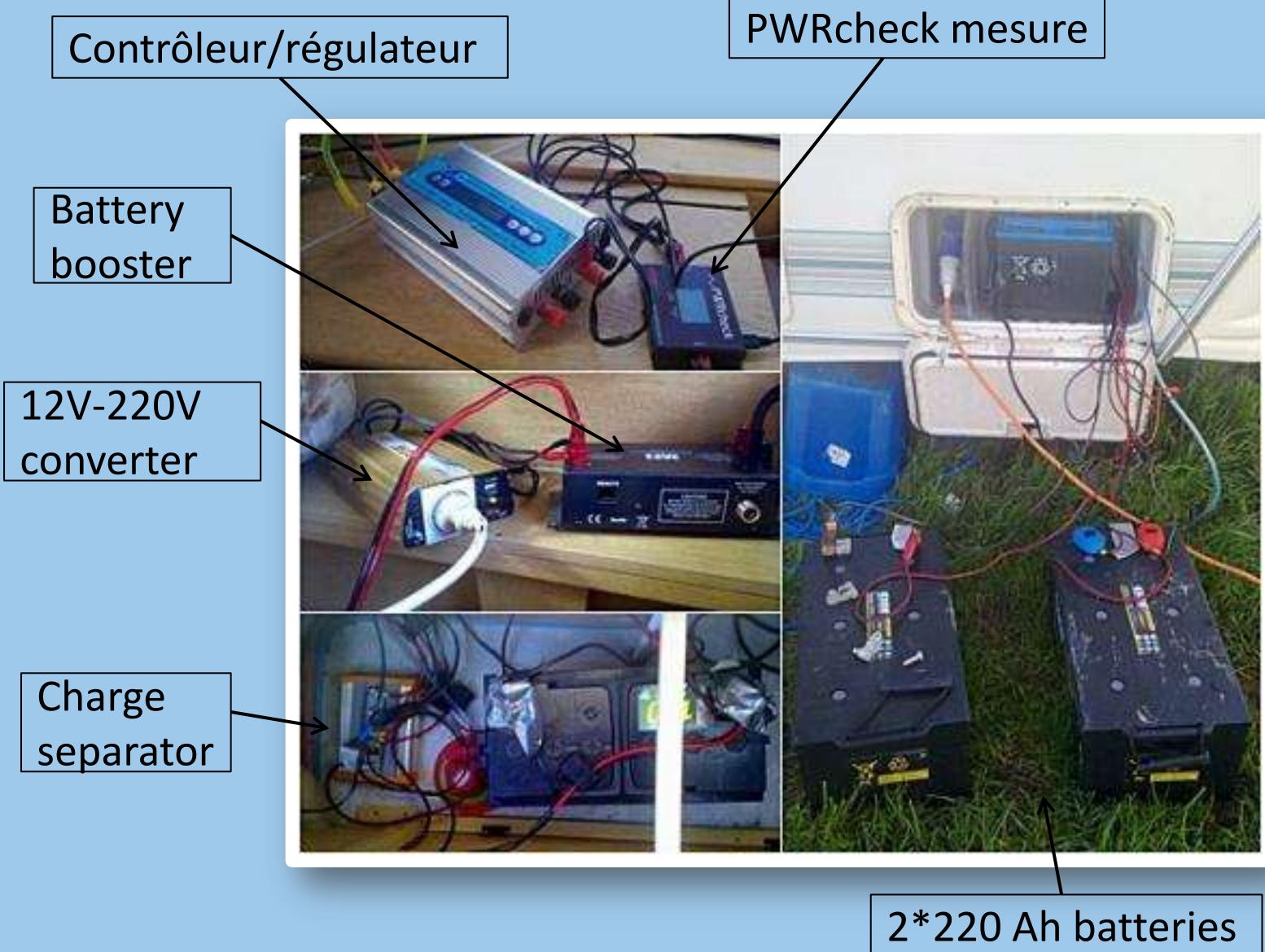
2012 Caravane & Energie Verte EI1A



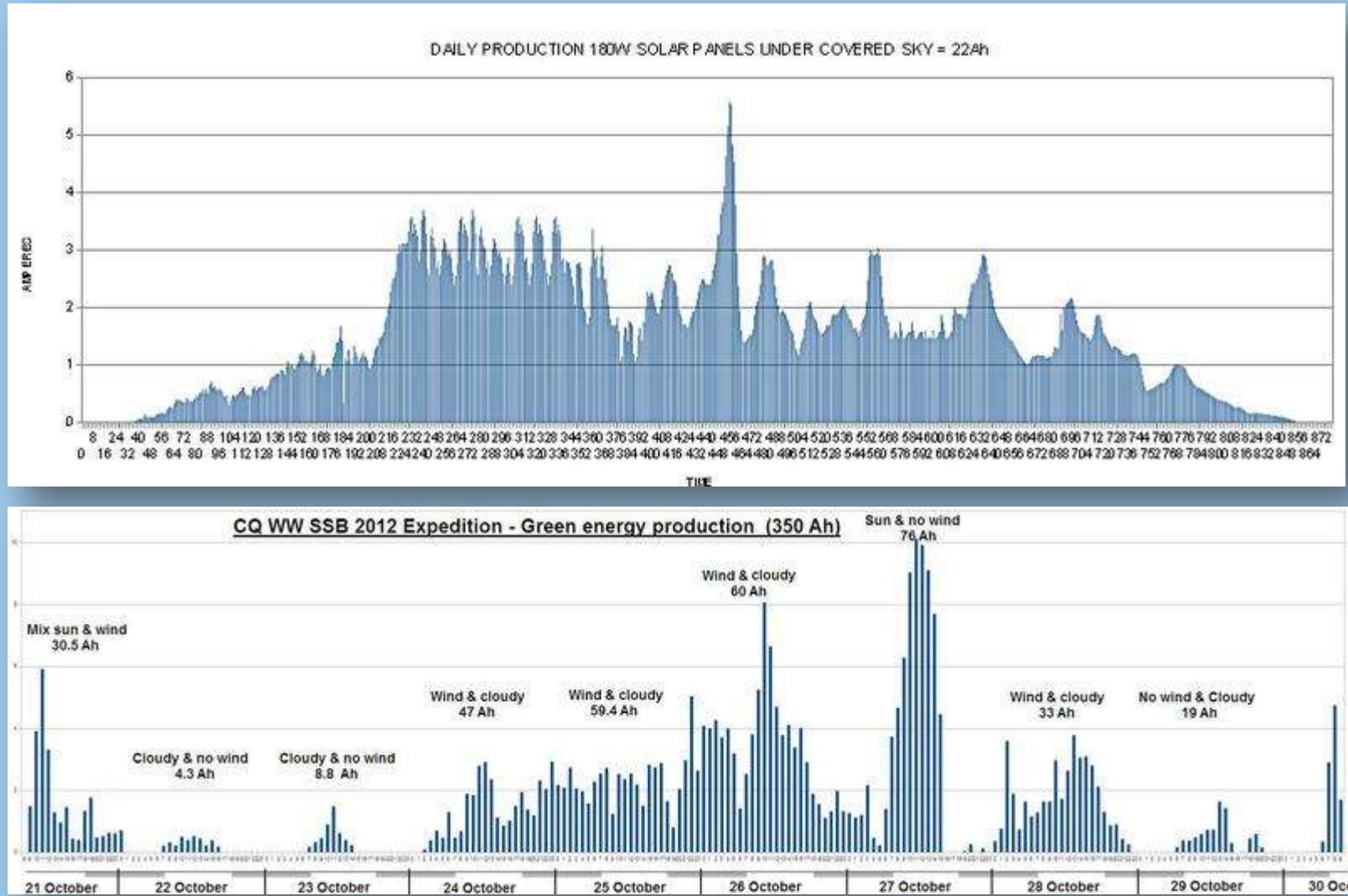
2 panneaux solaires de 90W -> 10Ah (Dimensions :1.2m*0.54m)



2012 Caravane & Energie Verte EI1A

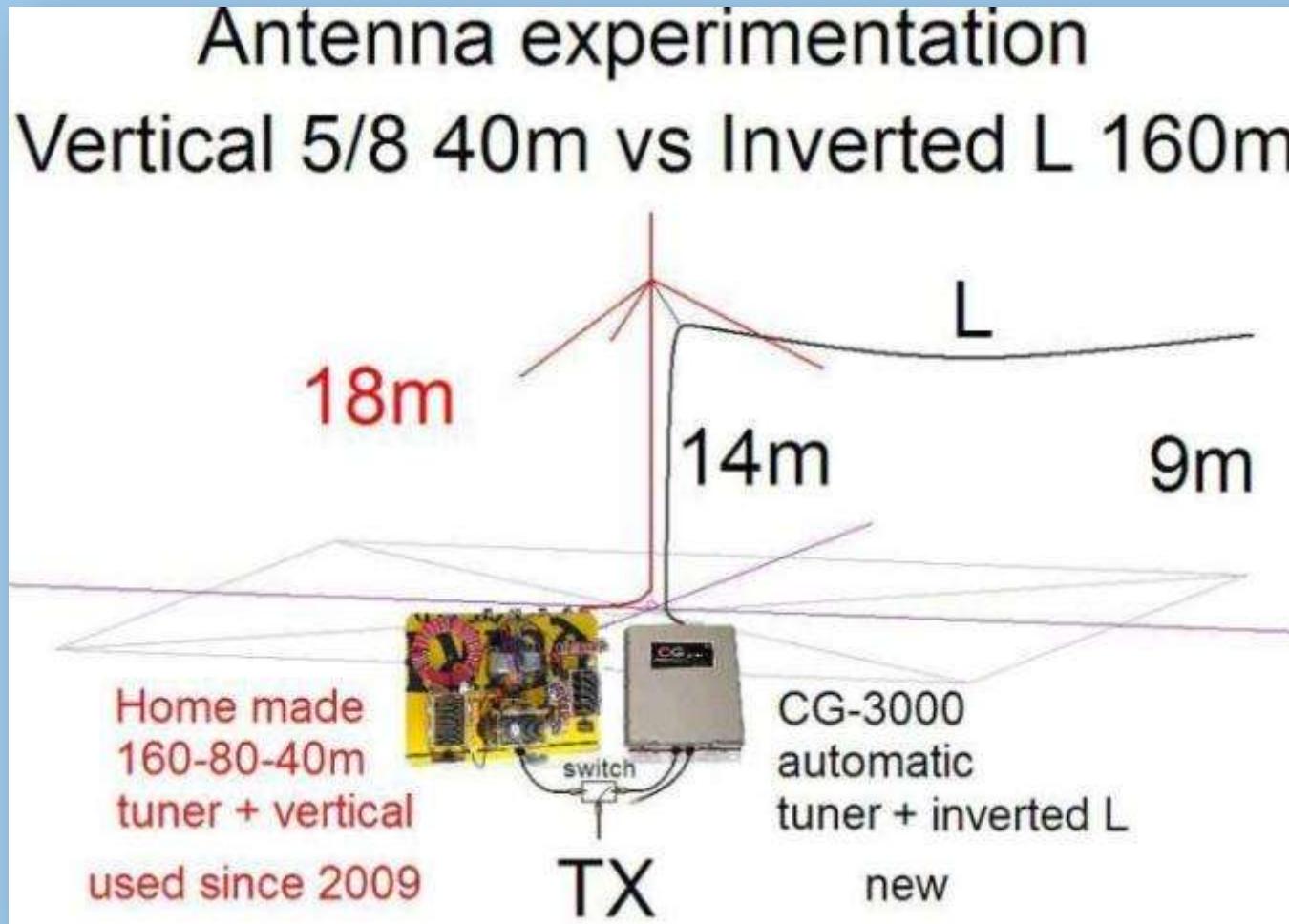


2012 Caravane & Energie Verte EI1A



Mesures de production d'énergie (minutes ou heures)

2012 Caravane & Energie Verte EI1A



Expérimentation : Inverted L 160m



2012 Caravane & Energie Verte EI1A



Green Energy

2012 Caravane & Energie Verte EI1A



Antenna trailer 16m

EI1A Top Europe station 2013



2013 EI1A Top Europe station

220m câble coaxial

700m de radiales

2 antennes Beam Spiderbeam

2 moteurs d'antennes

3 mats en fibre de verre (2*12m et 1*18m)

3 mats en aluminium (2*12m et 1*15m)

1 mat sur remorque (16m)

1 groupe électrogène

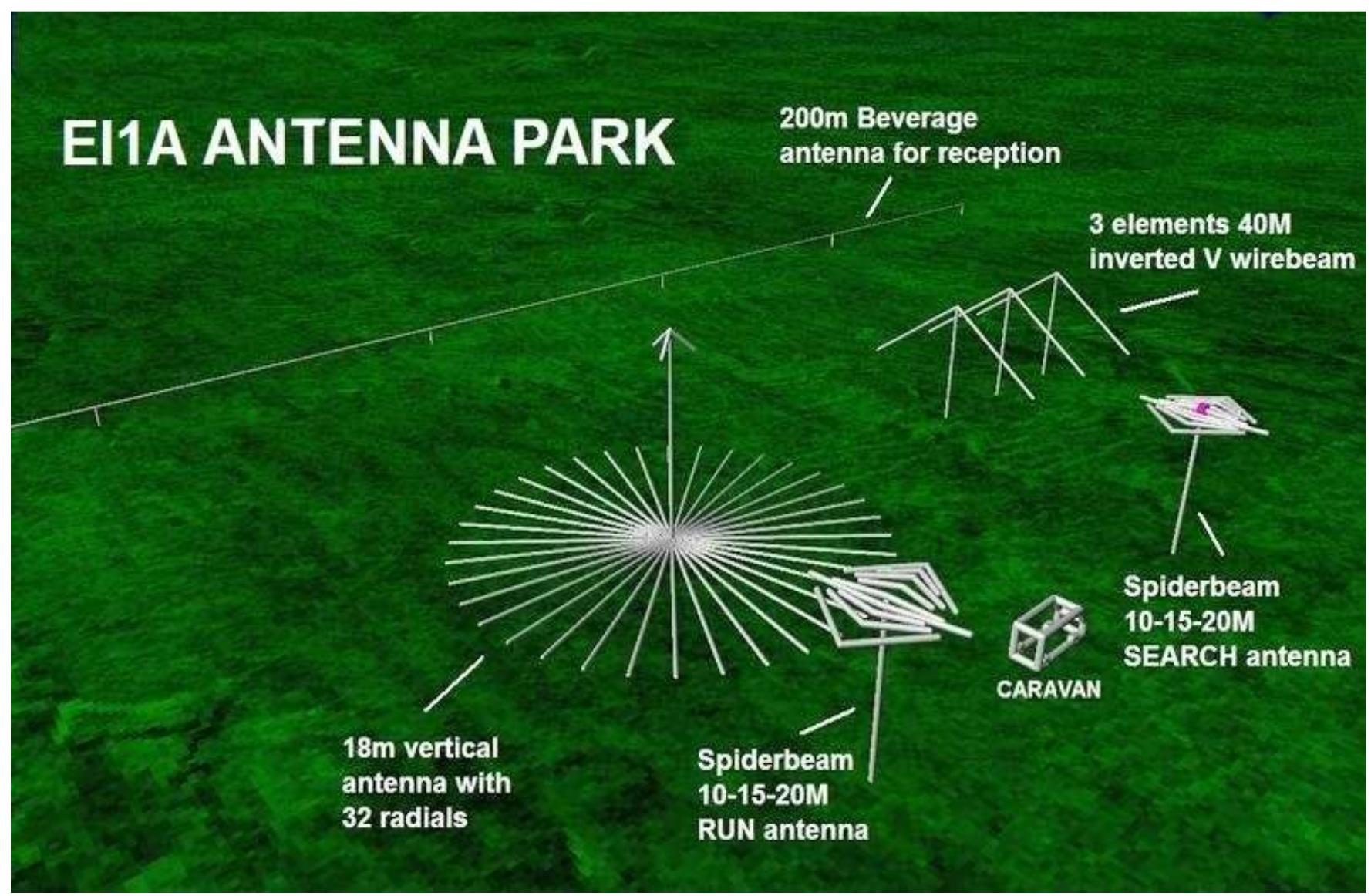
1 éolienne 420W

2 panneaux solaires 2*90W

3 batteries (2*220 Ah et 1* 100Ah)

TS2000 Kenwood & K3 Elecraft

2013 EI1A Top Europe station



2013 EI1A Top Europe station

Antennes pour SO2R

	160 m	80 m	40 m	20 m	15 m	10 m
Spiderbeam 1						
Dipole Λ						
Spiderbeam 2						
Verticale 18m						
3 éléments Λ						
Beverage RX						

Boite de sélection d'antenne

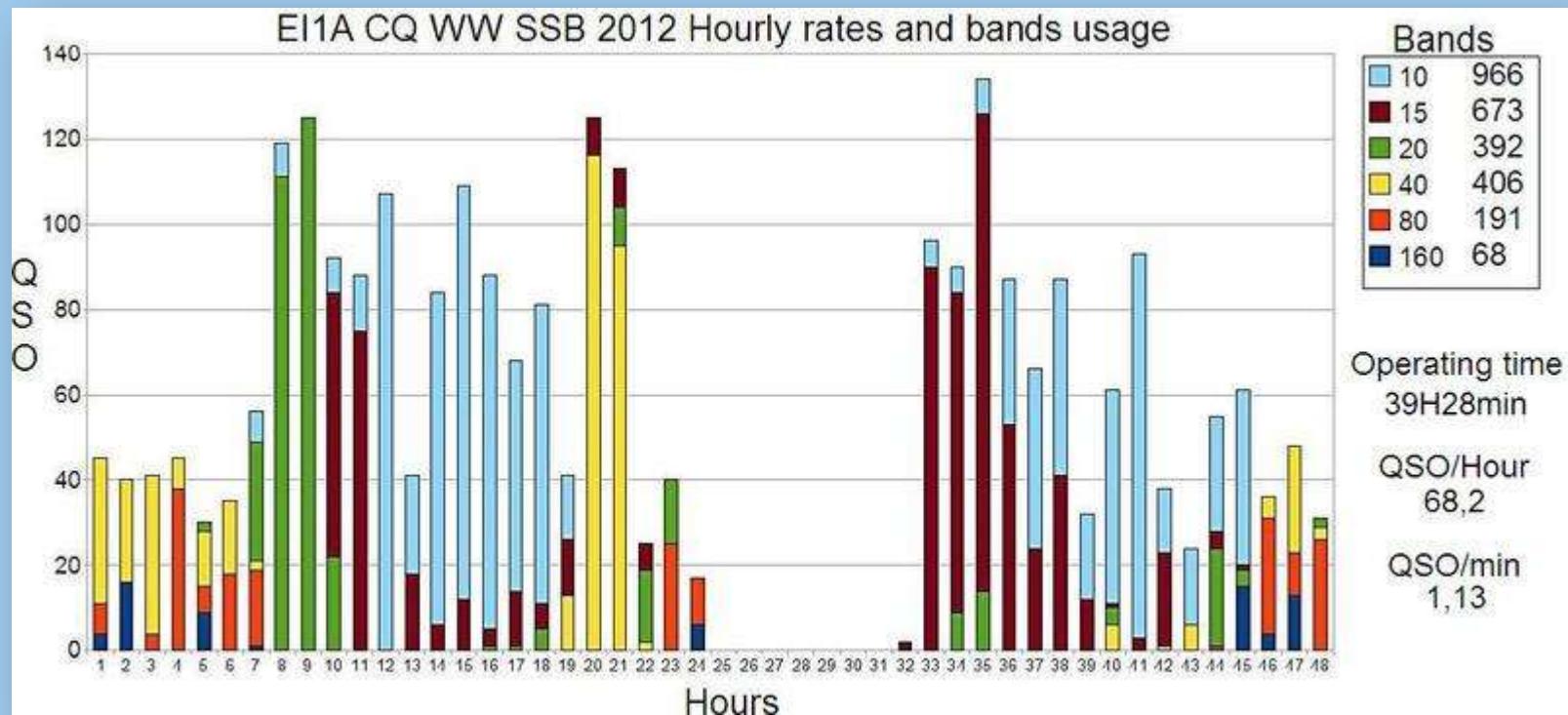


2013 EI1A Top Europe station



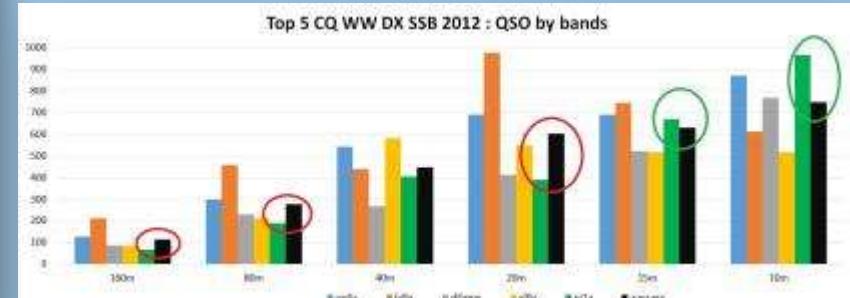
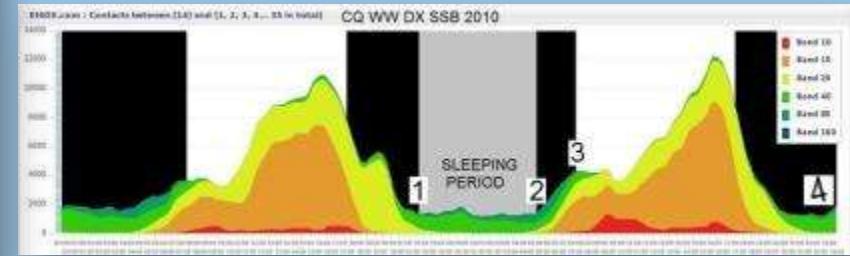
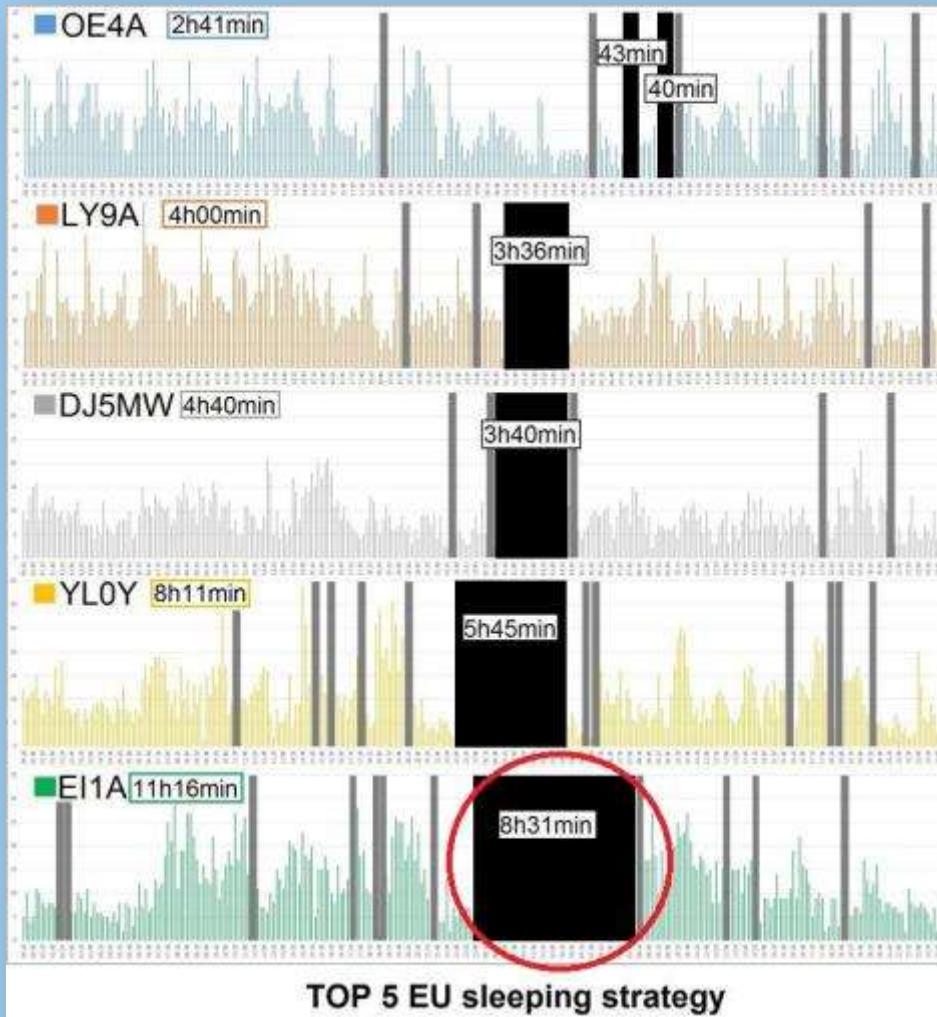
SO2R contest schack

2013 EI1A Top Europe station



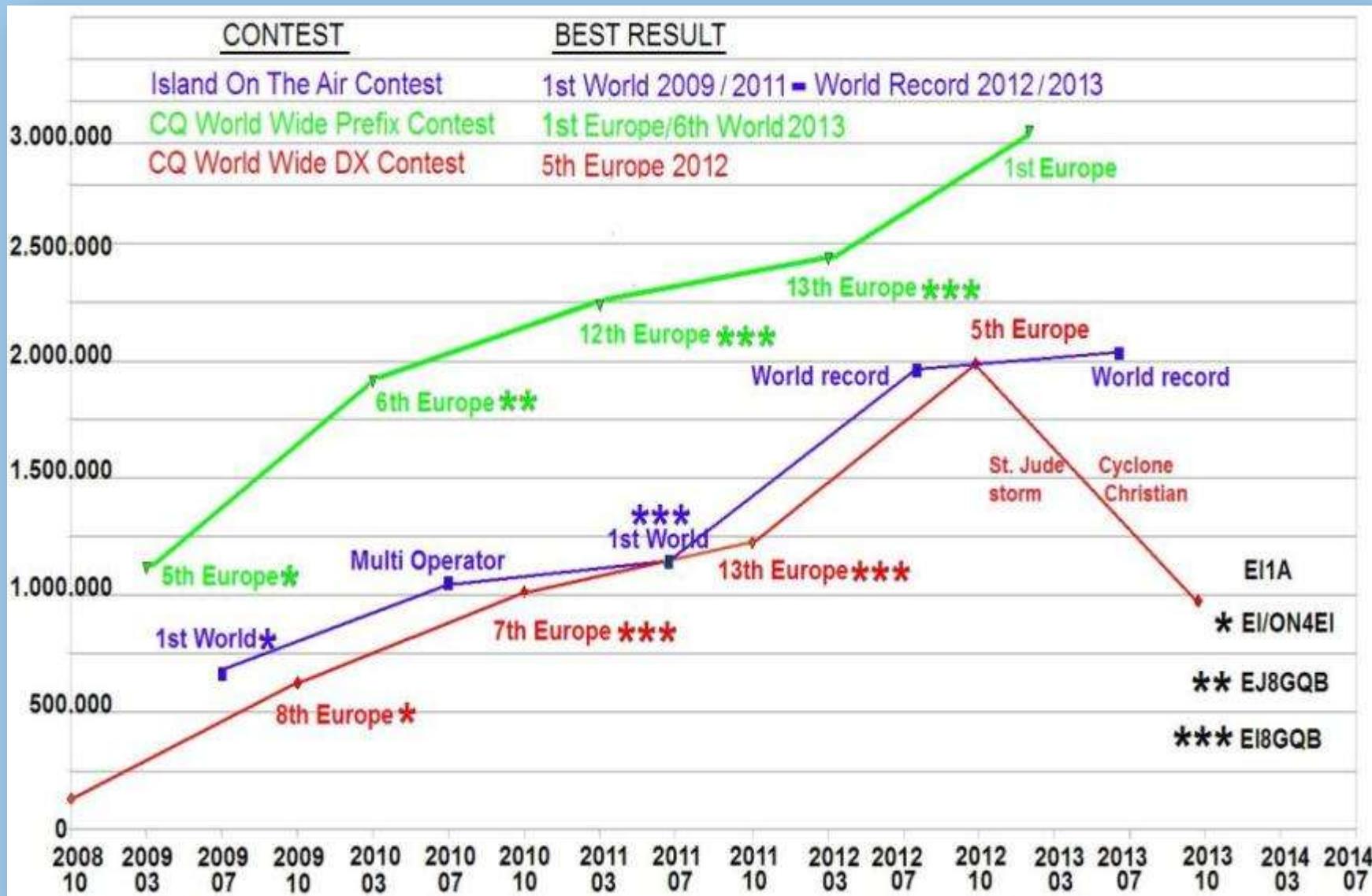
Analyse de mes performances passées
Recherche continue d'amélioration

2013 EI1A Top Europe station



Analyses stratégiques des autres participants

2013 EI1A Top Europe station



2013 EI1A Top Europe station

More results: IOTA FIXED ▾ Single-Op Unassisted ▾ SSB ▾ 24H ▾ Low Power ▾ Filter

Search by Call GO

Toggle Map ON/OFF
Map Help: Place the mouse over the red dots on the left to see information about the station, click dot or icon below to zoom in on the right!

Place	Callsign	IOTA Ref	Island	Photo	Video	Map	Soapbox	Category	QSOs	Mults	Final Score
1	EI1A	EU115	Main Island of Ireland					IOTA FIX SOU SSB 24H LP	1302	198	2079000
2	EASMT	AF004	Gran Canaria					IOTA FIX SOU SSB 24H LP	1079	151	1264025
3	SP1QXK	EU132	Wolin					IOTA FIX SOU SSB 24H LP	492	120	528000
4	M0MCV	EU005	Great Britain					IOTA FIX SOU SSB 24H LP	430	119	448630
5	CS8ABA	EU175	Faial					IOTA FIX SOU SSB 24H LP	354	96	299520

1^{ère} position mondiale depuis 2009

Record du monde consécutif depuis 2012

Résultats contest IOTA

2013 EI1A Top Europe station

Filter Results

Continent: Europe Country: ---

Category: Single-Op Low All Bands Overlay Category: ---

Call: Also search call in operators

Show breakdowns | Show club name | Show all operators | Sort by Score

Page 1 of 8 [\[Next\]](#) [\[Last Page\]](#)

Rank	Call	Category	Score	QSOs	WPX	Hours	Operator(s)	Cert
1	EI1A	SO LP ALL	2,984,805	1,943	855	35.3	ON4EI	[Cert]
2	ED7R	SO LP ALL (T)	1,678,320	1,551	720	33.6	EA7IZJ	[Cert]
3	RA7T	SO LP ALL	1,490,055	1,157	617	28.1		[Cert]
4	UR4U	SO LP ALL (T)	1,489,530	1,139	615	34.2	UR4UDI	[Cert]
5	EA2LMI	SO LP ALL	1,458,108	1,212	621	36.0		[Cert]

6^{ème} positon mondiale

1^{ère} positon européenne

Résultats contest WPX SSB

2013 EI1A Top Europe station



2013 EI1A Top Europe station



EI1A

2013 EI1A Top Europe station



EI1A Fan Club 

2013 EI1A Top Europe station

QRZ.COM
1993 20 years 2013

Search Database News Forums Swapmeet Resources Contact Subscribe Edit ON4EI
by Callsign 13:44:24 UTC 5 Dec 2013

EI8GQB 
Olivier Vandebroek
Fethard
Co Tipperary
Ireland
[+] Mailing label

Lookup: 28MTU
OSL: OSL MANAGER PA3249 DIRECT ON BAND

Biography Detail Logbook [248](#) Log a NEW contact with EI8GQB...

Time left to next Expedition
106:10:14:46
Day hr Min Sec

Live earth geomagnetic activity : QUIET Live solar activity : ACTIVE

Information banner update - October 30 > 18:05 UTC
Off Air until March 2014 > Thank you for following EI8GQB/EI1A > Conference at ON5UB Brussels radio club, 5th december 2013.

Hello and welcome to my blog.
I operated EI8GQB between 20th to 30th October 2013 from a caravan using green energy.
I am now operating Single Operator 2 Radios (SO2R) with 5 different antennas in portable conditions like disaster/emergency situation. It represents 40 hours of work in order to be fully operational on 5 bands.
With my contest callsign EI1A, I made part to the CQ World Wide DX SSB contest during October 26-27th 2013 weekend and broken antennas during the storm.
My objective was to run this 48 hours competition using green energy only.
Also check my new experience with live video streaming from the caravan on <http://www.ustream.tv/channel/ei8gqb>
Stay tuned and see below my stories.
73 from Olivier EI8GQB/EI1A/ON4EI
QSL MANAGER: PA3249 via BURU or via DIRECT to Harry de Jong, Broekdijk 59, 7695 TC Bruchterveld, The Netherlands.



EI1A - EI8GQB CQ WW DX SSB CONTEST

0:00 / 4:40 YouTube

EI1A - EI8GQB
Single Operator All Band Low Power Unassisted category
CONTEST RESULTS

2013 EI1A Top Europe station



Adhérez à la chaîne ON4EI YOUTUBE !!!

18 Vidéos

29 adhérents

9800 vues

QSL Manager

PA3249



<u>EI8GQB</u>	37.000 vues
<u>EI1A</u>	11.000 vues
<u>EJ8GQB</u>	17.300 vues
<u>EJ4II</u>	13.000 vues
<u>ON4EI</u>	7.600 vues
<hr/>	
Total	85.900 vues

Remplissez votre Email et recevez les annonces des activités (3x/an)

2013 EI1A Top Europe station



Plus d'info sur <http://www.qrz.com/db/EI8GQB>

E I 1 A