

# Results of the 1997 CQ WW DX SSB Contest

BY BOB COX\*, K3EST

**W**hether you are a first-time contestor or a veteran, each entrant in the CQ WW will be caught up in the Fall "contest fever." Contest fever can be defined as a single-minded concentration on improving your station, learning about propagation, and spending endless hours talking to friends about strategy and band openings over the phone or over a beer. The fun of catching a few new ones, testing out a new antenna system, and competing on all levels brings into focus what contesting is all about: fun, improvement, competition, and knowledge.

The 1997 WW SSB Contest yielded about 3500 logs when everything was finally tabulated, a number which reflects an 8% increase over 1996. With the Internet playing a big role in the submission process, about 1750 logs were received electronically. With conditions continuing to improve, the 1998 contest season should prove to be fantastic.

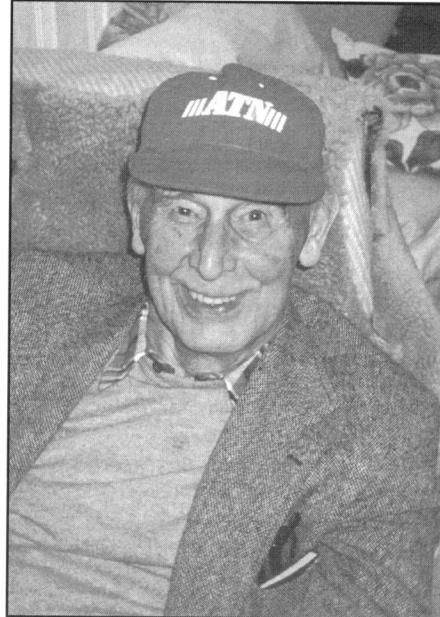
## Single Operator High Power

What can be said about the competition for the world top score? It started off as a battle between many stations and ended up a hard-fought duel between two members of the CQ Contest Hall of Fame! ZD8Z operated by Jim, N6TJ, took the long trip back to ZD8, while Martti, OH2BH, put EA8BH into the race. These two multiple winners of the CQ WW SSB (OH2BH three times, N6TJ four times) brought with them their considerable experience and skill. After all the log checking was finished, both ended up with A+ logs. Out of a total of almost 28 million points between their scores, only 80+K made the difference for ZD8Z, who took the world trophy. Martti finished second, while P40W operated by John, W2GD, armed with a new alarm clock, took third. Africa was well represented in the top ten box, taking five spots.

The top USA position went to Tom, W2SC, operating at K5ZD/1. It was Tom first win. Congratulations! Second place went to Dean, N6BV/1, whose stacked tribanders sure did the job. Dean will soon be N6BV/6. A race took place for the top W9 place between Mike, W9RE, and Jerry, WB9Z. Mike took 7th place USA and Jerry 8th. And a far west zone 4 station broke the top ten barrier. Steve, N2IC/0, talked his way to 9th in the US.

4N9BW(YU7BW) was sure in the right spot. Operating in eastern Yugoslavia, he took the top spot in Europe. The real battle was for second place. Five stations were within 200,000 points of one another. Steve, GW4BLE, emerged to take second place in Europe.

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Kell, SM0ATN, part of the SM0BGM Multi-Single team, is 86 years young.

The top Oceania score was V8EA (JO1RUR). Hajime's callsign keeps getting smaller. Second place went to AI, NH7A. There are quite a few miles between those two.

The top Asia score was Hamad, 9K2HN, whose booming signal put zone 21 in a lot of logs. He was followed by the Bavarian Contest Club station of JY9QJ, while JH4UYB took time off from his dental clinic to take the top honors in Japan.

## Single Operator Low Power

This category of operation continues to be very popular, with big scores distributed worldwide. This year the scoring was dominated by Carlos, TI2CF, piloting his mega-antenna farm at TI1C to a new world record. In smashing the old record, the more southerly location, bigger antenna systems, and thirty years of experience paid off, as Carlos amassed a terrific multiplier to go with his big QSO total. Second-high in the world and North America was VP9ID (AJ2U) from beautiful Bermuda, with a more modest station and notably accurate log. OD5NJ in Asia took third place world with a nice effort from a rare country. LU2NI steered LQ0N to fourth place and top South America, followed by EA7WA and TR8IG with winning efforts from Europe and Africa, respectively. Perhaps surprising-

ly, no Caribbean station was in the upper echelons of scoring, as no entry from there broke one million points.

In the Single Op, All Band, Low Power USA category things really got a good shake-up this year. The final order of finish looks substantially different than the claimed scores. For the first time ever in the CQ WW, a YL has earned the first-place slot in a major category (and, I might mention, the category with the largest number of entrants, too!). A hearty congratulations to Ann, WA1S, for winning the category and for being the only score to stay over the 1 million point mark after the log checkers had finished their work. Her score certainly will be noticed in the Yankee Clipper's final tally. And another big congrats to WD5K for taking second place, from zone 4 no less! This is really exciting and should provide lots of encouragement to everyone else in zone 4 to give it their all; it *can* happen, so give it try! The third place finisher was John, K2AZ, from northern New Jersey. He contributed 974k to the FRC's bottom line. And from the West Coast, in 10th position, was WA7BNM who seems to make the top 10 annually. A great job, indeed.

In Europe, EA7WA outdistanced second-place finisher LY3BA by over half a megapoint. TM6A operated by F5UFX took third place. The difference between 5th and 10th place was only 83k! Congratulations to all for a job well done!

## QRP

QRP is always a fun category (after the contest is over), but requires lots of stamina, hard work, and perseverance during the contest. The top three spots this time were spread out among Europe, Oceania, and North America. Number one in the world for QRP went to YU1KN with an honest 370k score. The battle for second place was very tight, with KH6/N0KE edging out KD2TT by just six tenths of one percent! Their scores were 301k and 299k, respectively. As the sunspots pick up, those QRP scores will again topple the one meg barrier. Two QRP records did fall this time: NC6M (Op. W6REC) for 75 meters North America and KR2Q for 40 meters North America.

## Assisted

The Single-Operator Unlimited class was topped by two European stations this time. TM2V, operated by F6GYT, outdistanced the pack handily with a fantastic QSO total. Roland, DK3GI, at club station DL0WW, was a comfortable second thanks to his excellent multiplier. Third in Europe and fifth overall was Z38G from Macedonia, the first entry in Single-Op Unlimited from that country.

# TROPHY WINNERS AND DONORS

## SINGLE OPERATOR

**World All Band**  
**ZD8Z (Opr. Jim Neiger, N6TJ)**  
 Donor: Dave Rosen, K2GM  
 WA2RAU Memorial

**World Low Power**  
**TI1C (Opr. Carlos M Fonseca, TI2CF)**  
 Donor: Slovenian Contest Club

**World QRP**  
**Sasa Djokic, YU1KN**  
 Donor: Doc Sayre, W7EW

**World Assisted**  
**TM2V (Opr. Andre Gingue, F6GYT)**  
 Donor: Snake River Contest Club

## U.S.A.

**K5ZD (Opr. Thomas Georgens, W2SC)**  
 Donor: Potomac Valley R.C.  
 KC8C Memorial

**U.S.A Low Power**  
**Ann M. Santos, WA1S**  
 Donor: North Coast Contesters

**U.S.A. Zone 3**  
**W7AT (Opr. Lew Sayre, W7EW)**  
 Donor: Bill Fisher, KM9P/4

**U.S.A. Zone 4**  
**Mike Wetzel, W9RE**  
 Donor: Dennis O'Connor, K8DO

## Canada

**VE3EJ (Opr. Jeff Steinman, N5TJ)**  
 Donor: Niagara Frontier Int'l DX Assn.  
 VE3WT Memorial

## Caribbean/C.A.

**FG5BG (Opr. Ryuichi Nakano, JF2DQJ)**  
 Donor: Alex M. Kasevich, VP2MM

## Europe

**4N9BW (Opr. Robert Homolja, YU7BW)**  
 Donor: Potomac Valley R.C.  
 W4BVV Memorial

## Europe Low Power

**Angel Martinez Claus, EA7WA**  
 Donor: Scott Jones, N3RA & Tim Duffy, K3LR

## Africa

**EA8BH (Opr. Martti Laine, OH2BH)**  
 Donor: Gordon Marshall, W6RR

## Asia

**Hamad J Al Nusif, 9K2HN**  
 Donor: 2 AM Dayton Pizza Gang

## Japan

**Masaki Okano, JH4UYB**  
 Donor: Japan Crazy Contesters Club

## Oceania

**V8EA (Opr. Hajime Kato, JO1RUR)**  
 Donor: Northern California DX Club

## South America

**P40W (Opr. John Crovelli, W2GDD)**  
 Donor: Yankee Clipper Contest Club

## South America—Mainland

**HC5C (Opr. Robert Woods, W5AJ)**  
 Donor: Jose L. Bachmann, ZP6CC  
 & Cesar Ivaldi, ZP5K

## SINGLE OPERATOR, SINGLE BAND

### World—28 MHz

**Arturo J Gargarella, LU6ETB**  
 Donor: Joel Chalmers, KG6DX

### World—21 MHz

**ZX5J (Opr. Sergio Lima de Almeida, PP5JR)**  
 Donor: Robert Naumann, N5NJ

## World—14 MHz

**George Beasley, 5B4AGC**  
 Donor: North Jersey DX Assn.  
 K2HLB Memorial

## World—7 MHz

**IG9GSF (Opr. Fabio Grisafi, IT9GSF)**  
 Donor: Fred Laun, K3ZO  
 K7ZZ Memorial

## World—3.7 MHz

**Jerzy Smoczyk, SP3GEM**  
 Donor: Fred Capossela, K6SSS

## World—1.8 MHz

**Yuri Blanarovich, VX3BMV/1**  
 Donor: Robert Wruble, W7GG

## USA—28 MHz

**Chuck Dietz, KZ5MM**  
 Donor: Donald Thomas, N6DT

## USA—21 MHz

**Russell S. Rinn, N5LT**  
 Donor: Bill Gioia, K2EK

## USA—14 MHz

**Scott Detloff, K8DX**  
 Donor: Southern California DX Club

## USA—7 MHz

**Larry Pace, N7DD**  
 Donor: Stanley Cohen, WD8QDQ

## USA—3.7 MHz

**Robert Ferrero, W6RJ**  
 Donor: Arnold Tamchin, W2HCW

## USA—1.8 MHz

**K8MK (Opr. Pat Collins, K8LR)**  
 Donor: CQ Magazine

## Carib./C.A. (21 MHz)

**V47NS (Opr. Michael Treister, W9NY)**  
 Donor: Snake River Contest Club

## Europe—28 MHz

**9H0A (Opr. G. Morris, 9H1EL)**  
 Donor: Chod Harris, VP2ML

## Europe—21 MHz

**4O6A (Opr. Ranko Boca, YT6A)**  
 Donor: Tine Brajnik, S50A

## Europe—14 MHz

**IR4T (Opr. Fabio Errn Schettino, I4UFH)**  
 Donor: A.G. Anderson, GM3BCL

## Europe—7MHz

**Jiri Sanda, OK1RI**  
 Donor: Roger Burt, N4ZC

## Europe—3.8 MHz

**IR4T (Opr. Maurizio Panicara, I4JMY)**  
 Donor: Marconi Contest Club  
 I3MAU Memorial

## Europe—1.8 MHz

**Ceho Dusan, YU1EA**  
 Donor: Robert Kasca, S53R

## Japan—21 MHz

**Ooshika Tarou, JI2UNR**  
 Donor: DX Family Foundation

## Japan—14 MHz

**Tom A. Tatomi, JA5OVU**  
 Donor: Take Yokoyama, JL1BLW

## MULTI-OPERATOR SINGLE TRANSMITTER

**World**  
**ZX0F (Oprs: N6KT, N5FA, ZP5JCY)**  
 Donor: Southern California DX Club  
 W6AM Memorial

## U.S.A.

**W2A (Oprs: W2XX, N2TX, KE2NL, K2UU)**  
 Donor: Carolina DX Association

## Calib./C.A.

**8P9Z (Oprs: K3KG, K3ZR, K4FJ)**  
 Donor: Eric Scace, K3NA

## Asia

**P3A (Oprs: RA9JX, RA9JR, RA0AM, RV0AR,  
 UN7FZ, UA9MA, UA0ANW, UA0AGI,  
 RZ3TX, UA3TT, UA9YAB)**  
 Donor: Edward L. Campbell, AH2BE

## Europe

**IQ4A (Oprs: I4VEQ, I4TJE, I4EAT, I4AVG,  
 I4IKW, I4IND, I4YRW, IK4DCT, IK4MGP,  
 IK4QJH, IK4EWK, IK4XQH, IK4CZF, IK2NCJ,  
 IK2JUB, IK2MRZ, IW4ANU)**  
 Donor: Bob Cox, K3EST

## Oceania

**NH2C (Oprs: JG3RPL, JR3RVO, JI3ERV,  
 JR7OMD, JK3GAD, JH7QXJ)**  
 Donor: Junichi Tanaka, JH4RHF

## South America

**HC8N (Oprs: N5KO, AG9A, HC1OT, VE3EJ)**  
 Donor: Jerry Boyd, K6BZ

## South America—Mainland

**ZW5B (Oprs: PY5EG, PY5CC, PY5GU,  
 PY1KN, PY2BW)**  
 Donor: Tomas Zappini, ZP5AZL,  
 & Renato Bellucci, ZP5XF

## MULTI-OPERATOR MULTI-TRANSMITTER

### World

**PJ9B (Ops: WA3LRO, N3ED, K1DG, K3EST,  
 KB2XZ, N4RV, N3BB, N7ZZ, K2SB, W3UM)**  
 Donor: W6NL and K6BL

## U.S.A.

**N2RM (Ops: N2RM, N2NT, N2AA, N7BG,  
 N2NC, W2RQ, N2NL, KQ2M, K2BM)**  
 Donor: Paul Hellenberg, W9JA

## Europe

**TK5NN (Ops: TK5NN, TK5EP, TK5MH, TK1BI,  
 DL4RDJ, DJ1OJ, DL4GBA, DL4MDO,  
 DK6WL, DK4VW, DK8FD, DL4MCF,  
 DL1MAJ, DL6RAI, DL3MAA)**  
 Donor: Finnish Amateur Radio League

## Japan

**JH5ZJS (Ops: JA5BJC, JA5FDJ, JA5JCC,  
 JA5THU, JH5RXS, JR5JAQ, JR5PDX, JR5VHU)**  
 Donor: Ryozo Goto, JH3JYS

## CONTEST EXPEDITIONS

### World Single Operator

**V8EA (Opr. Hajime Kato, JO1RUR)**  
 Donor: National Capital DX Assn.  
 Stuart Meyer, W2GHK Memorial

### World Multi-Single

**IH9/OL5Y (Oprs: OK1FUA, OK1MM, OK2ZW,  
 OK1JR, OK2TE, IT9HB)**  
 Donor: The German CDXG & SDXG  
 DJ3NG & DJ4EI Memorial

### World Multi-Operator

**P29AS (Ops: P29AS, AB6BH, N6AA,  
 N6TW, N6ZZ, W6XD)**  
 Donor: Tachio Yuasa, JA9VDA

## SPECIAL SINGLE OPERATOR AWARDS

### World—All Band Under 21 Years Old

**RK9CW (Opr. Andy Chepurnoy, RA9CKQ)**  
 Donor: Gene Zimmerman, W3ZZ

### World All Band High YL

**Emily Thiel, P43E**  
 Donor: Yutaka Tanaka, JH3DPB

## TOP SCORES IN VERY ACTIVE ZONES

### ZONE 3

W7AT	1,965,258
K6NA	1,827,118
K6GX	1,518,066
W7VJ	1,456,618
W6NL	1,335,176
N7TT	1,227,096
N6RV	802,256
*WA7BNM/6	655,308
W7OM	654,720
W7SE	579,576

### ZONE 4

VE3EJ	8,240,550
W9RE	2,941,546
WB9Z	2,426,580
N2IC/0	2,418,327
K4AB	2,320,886
VX3AT	1,853,816
K8LN	1,216,626
K9GD	1,138,860
NN5ZZ	1,066,965
K9BGL	1,047,489

### ZONE 5

K5ZD/1	5,494,655
N6BV/1	4,057,986
W4AN	3,492,160
K3ZO	3,466,918
VO1MP	3,456,300
K4ZW	3,205,420
W3BGN	3,130,400
W1WEF	2,415,943
K2DM	2,138,030
VE1JX	2,137,448

### ZONE 14

GW4BLE	3,656,088
DL6FBL	3,630,750
EA3NY	3,503,424
EA4KD	3,255,828
DL2NBU	3,118,432

### ZONE 15

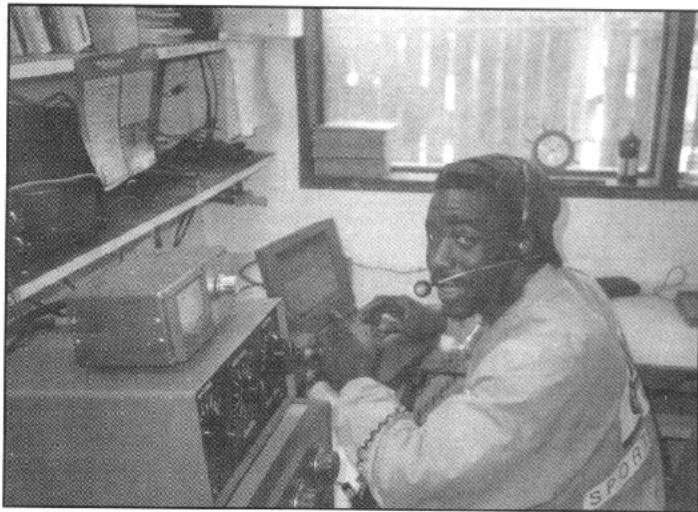
4N9BW	4,985,601
S59ZA	3,529,260
YT1AD	3,466,420
YT1BB	3,402,686
OF1MM	2,221,450
OH0TA	2,142,855
4O6A	1,980,046
HA6NF	1,912,448
IK4ADE	1,560,320
*LY3BA	1,465,440

### ZONE 16

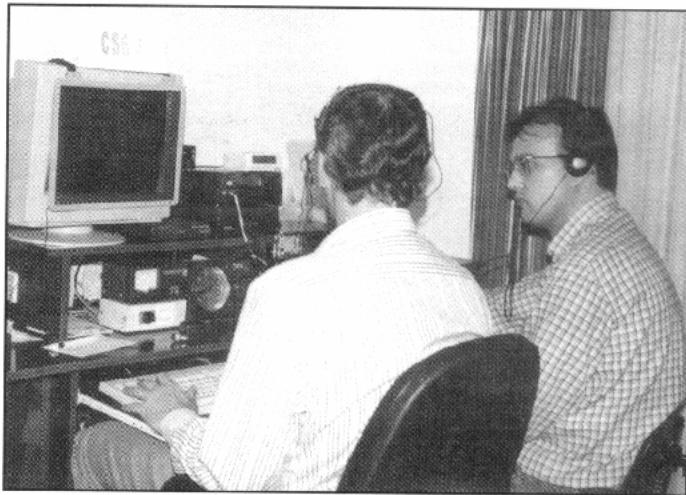
UT4UZ	3,012,455
RN6BY	2,972,270
UT0D	2,472,666
UA6LU	1,448,568
UT3UZ	953,130
*RA3WA	753,543
*ER5DX	733,912
RX3APM	721,544
*UT5UAG	700,344
EO6F	640,003

### ZONE 25

JH4UYB	3,146,862
JA0QNJ	3,044,100
JA8RWU	1,735,536
JS3CTQ	1,361,600
JH7XGN	1,173,496
JA7BEW	1,102,635
JA5OVU	816,860
JA2BNN	797,130
JF1OPL	793,557
JH4ADK	706,318



Anthony, NP2Q, was a Low Power leader.



Part of the CS6S Multi-Single team: CT1ERK (left) and CT1ETE.

In the U.S., KS1 piled up the QSOs to compensate for N3AD's higher multiplier and topped the field. N3AD, in turn, outran fellow FRCer and multiplier leader K3WW. We note that VK5GN entered this category from Down Under, the largest ever VK entry.

Our log-checking found several instances where Single-Op Unlimited stations lost points because QSOs were logged on the wrong band. Apparently, some two-radio users lost track of their band changes at times. Others lost QSOs (and often multipliers) by grabbing packet announcements and logging the announced callsign without listening to verify the call. Some of the packet announcements are not accurate, so it is the operator's responsibility to find out who he is really working!

### Multi-Single

It was the battle of the equator: ZX0F and HC8N. Both were manned by superb operators. Both had visits from Murphy. Between them they worked 17,100+ stations! Not bad for only two run stations. Multipliers made the difference, with ZX0F taking the crown. The third South American score was ZW5B operating from their new QTH.

Using their special event call for all it was

worth, W2A of the YCCC beat out the experienced crew of the FRC, N2NU. I'd bet they had to say "Only W2A" many times! Farther west two zone 4 crews made the top six box. That is quite an accomplishment. W9JA (ex-KS9K) located near the center of the black hole in WI took the #4 slot, while the fine crew of K4ISV made KY proud.

Europe is a very competitive place when it comes to the MS category. Repeating as the number 1 score in Europe, the Monte Capra team of IQ4A used their fabulous location to best advantage. If you ever get a chance to visit Bologna, make sure you visit this fine crew. Second place went to the fine crew at TM2Y located at F6BEE's QTH.

Cyprus is proving to be a very popular destination for contest DXpeditions. A Russian and Kazakstani crew set up shop at P3A and finished third in the world and first in Asia. Second place in Asia went to the famous RZ9AZA, Chelyabinsk station.

Africa had three big Dxpeditions: The winner was EA8ZS, a mostly Spanish crew, followed by CT3BX, a German team operating with CT3BX, and the Czech DXpedition to IH9/OL5Y.

Taking time off from busy work schedules in Japan, a JA team powered NH2C to top hon-

ors in Oceania. Second place went to FO8DX, a SCDXC team who left just before Hurricane Martin destroyed the QTH of FO5IW, where they had operated. We hope that Stan gets going again soon.

### Multi-Multi

After the tower crew (two guys) had drunk 200 beers in 10 days, enough energy was developed to power PJ9B to the world top MM position. PJ9B is located on the beautiful island of Bonaire, about 10 miles from the nearest commercial power. Second place went to the FRC effort of V26B. Each year this group of guys gets together for the "big one." Only 158 QSOs behind PJ9B was the joint BCC and Corsican effort of TK5NN. This crew took top honors in Europe. A joint FRC and YCCC trip to Canada put CI9DH into world fifth place. Rounding out the top six was the crew from the SCCC. They decided to go to P29AS this time. They didn't count on dangerous situations. Walking to the antenna after dark was a risky business.

In the heavyweight class, the crew at N2RM showed up at Bob's summer cottage to return to their winning ways. There must be something about their QTH. Being on sandy soil and close to the ocean doesn't hurt. Getting closer

# TOP SCORES

## WORLD

### SINGLE OPERATOR HIGH POWER All Band

ZD8Z ..... 13,971,308  
EA8BH ..... 13,885,330  
P40W ..... 12,894,570  
3V8BB ..... 8,314,695  
VE3EJ ..... 8,240,550  
FG5BG ..... 7,195,161  
V8EA ..... 6,941,985  
P40E ..... 6,673,944  
5N0T ..... 6,216,212  
FR5DX ..... 5,876,154

### 28 MHz

LU6ETB ..... 1,340,880  
AY7D ..... 1,307,576  
9X0A ..... 1,290,753  
5X4F ..... 1,164,728  
PP5UB ..... 929,183  
5B4MF ..... 801,261

### 21 MHz

ZX5J ..... 3,181,696  
4O6A ..... 1,980,046  
5X1T ..... 1,780,200  
P43A ..... 1,534,995  
ZP5XF ..... 1,492,452  
II3T ..... 1,375,429

### 14 MHz

5B4AGC ..... 2,140,790  
8R1K ..... 1,844,468  
9M8R ..... 1,339,743  
IR4T ..... 1,272,200  
M7Z ..... 1,225,810  
YW1A ..... 1,168,252

### 7 MHz

IG9GSF ..... 1,249,236  
OK1RI ..... 769,602  
9Y4VU ..... 583,737  
HA3O ..... 580,620  
HA9RE ..... 391,926  
IR1A ..... 373,293

### 3.7 MHz

SP3GEM ..... 244,325  
IG9EQ ..... 228,047  
IR4T ..... 213,576  
VX3BY ..... 208,872  
OM2TW ..... 156,456  
G3WGN ..... 143,840

### 1.8 MHz

VX3BMV/1 ..... 132,890  
YU1FA ..... 68,886  
SV8CS ..... 63,140  
UA2FJ ..... 62,352  
SM6DOI ..... 55,420  
S50C ..... 52,487

### LOW POWER All Band

TI1C ..... 7,379,253  
HC5C ..... 4,401,621  
VP9ID ..... 3,201,342  
OD5NJ ..... 2,851,836  
LQ0N ..... 2,453,047  
EA7WA ..... 2,118,914  
TR8IG ..... 1,960,452  
LY3BA ..... 1,465,440  
4M5E ..... 1,354,314  
TM6A ..... 1,276,290

### 28 MHz

LU3HYS ..... 665,611  
LU3MDO ..... 621,034  
PU2RUX ..... 608,328  
LU4DX ..... 602,924  
AZ9W ..... 564,696  
LU7HTJ ..... 492,026

## 21 MHz

UA4LCQ ..... 573,363  
CN8NK ..... 590,070  
9G1BJ ..... 504,575  
UA4POL ..... 463,298  
LU7FJD ..... 443,065  
UN5PR ..... 415,982

## 14 MHz

IT9STX ..... 659,175  
HA5BSW ..... 577,643  
ES2RJ ..... 466,830  
Y04GAO ..... 465,408  
LS9F ..... 449,352  
IQ7A ..... 431,346

## 7 MHz

XM7A ..... 289,556  
CT1AOZ ..... 176,001  
YY5OHI ..... 154,117  
U5WF ..... 79,123  
UR7TZ ..... 63,452  
S54A ..... 62,318

## 3.7 MHz

4L5O ..... 79,205  
Z39Z ..... 67,451  
S51TA ..... 62,926  
9A4RU ..... 54,666  
S50Q ..... 46,512  
IQ5Q ..... 37,268

## 1.8 MHz

HA8BE ..... 27,128  
S54E ..... 28,458  
ES6MO ..... 18,288  
UU4JMG ..... 17,785  
PA2SWL ..... 14,158  
YU1RA ..... 8,379

## QRP All Band

YU1KN ..... 370,590  
KH6/N0KE ..... 301,266  
KD2TT ..... 299,460  
YU1LM ..... 178,401  
S59D ..... 154,365  
N7VY ..... 126,198  
W6YJ ..... 102,340  
N9SXT ..... 96,425  
N8XA ..... 95,025  
SM3CCT ..... 91,674

## ASSISTED All Band

TM2V ..... 4,389,455  
DL0WW ..... 3,150,340  
KS1L ..... 3,024,912  
N3AD ..... 2,717,220  
Z38G ..... 2,553,040  
K3WW ..... 2,530,380  
K3NZ ..... 2,351,050  
IK0HBN ..... 2,026,296  
N2MM ..... 2,005,640  
AA3B ..... 1,973,412

## 3.7 MHz

W6RJ ..... 121,068  
N2KK/6 ..... 96,253  
W4DC ..... 32,532  
N6AR/4 ..... 27,887  
W8UVZ ..... 19,544  
W2LU ..... 17,181

## USA

### SINGLE OPERATOR HIGH POWER All Band

K5ZD/1 ..... 5,494,655  
N6BV/1 ..... 4,057,986  
W4AN ..... 3,492,160  
K3ZO ..... 3,466,918  
K4ZW ..... 3,205,420  
W3BGN ..... 3,130,400  
W9RE ..... 2,941,546  
WB9Z ..... 2,426,580  
N2IC/0 ..... 2,418,327  
W1WEF ..... 2,415,943

## 28 MHz

KC3PZ ..... 90,735  
AI2C/4 ..... 73,872  
WB2BZR/3 ..... 49,484  
WB4HFL ..... 35,250  
K7CK ..... 35,108  
W3EP/1 ..... 35,062

## 21 MHz

K4SN ..... 143,112  
KB8IBS ..... 108,585  
WA1FCN ..... 99,015  
KF8K ..... 96,158  
K6RO ..... 95,849  
K1VSJ ..... 84,700

## 28 MHz

KZ5MM ..... 208,102  
W6AX ..... 111,161  
N4BP ..... 106,288  
W6YA ..... 98,900  
K4VUD ..... 70,224  
KF6JFG ..... 44,616

## 21 MHz

N5LT ..... 741,597  
N4UK ..... 582,552  
WC4E ..... 552,670  
W5WMU ..... 471,580  
KC2X/4 ..... 469,560  
K3ZJ/8 ..... 462,880

## 7 MHz

KW4T ..... 42,016  
W0AH ..... 26,640  
WA4QDM ..... 10,790

## 3.7 MHz

W1MK ..... 3,485  
KD5BXQ ..... 1,860

## 28 MHz

4N9BW ..... 4,985,601  
GW4BLE ..... 3,656,088  
DL6FBL ..... 3,630,750  
S59ZA ..... 3,529,260  
EA3NY ..... 3,503,424  
YT1AD ..... 3,466,420  
Y1BB ..... 3,402,686  
EA4KD ..... 3,255,828  
DL2NBU ..... 3,118,432  
DJ4PT ..... 3,023,258

## 21 MHz

9H0A ..... 713,258  
CT4NH ..... 363,987  
IO4LCK ..... 323,736  
YT1R ..... 314,704  
S53X ..... 272,745  
I8KPV ..... 268,736

## 7 MHz

9O6A ..... 1,980,046  
II3T ..... 1,375,429  
EA2BP ..... 1,111,1592  
S53R ..... 1,042,665  
9A4D ..... 992,413  
YU9A ..... 815,774

## 21 MHz

IR4T ..... 1,272,200  
M7Z ..... 1,225,810  
S50K ..... 1,117,123  
OM5DX ..... 1,107,351  
HA3UU ..... 986,522  
OM5M ..... 983,992

## 14 MHz

HA8BE ..... 27,128  
S54E ..... 28,458  
ES6MO ..... 18,288  
UU4JMG ..... 17,785  
PA2SWL ..... 14,158  
YU1RA ..... 8,379

## 3.7 MHz

OK1RI ..... 769,602  
HA3O ..... 580,620  
HA9RE ..... 391,926  
IR1A ..... 373,293  
N9SXT ..... 96,425  
N8XA ..... 95,025  
WA8AGH ..... 45,188  
W3ECU ..... 18,252

## 7 MHz

SP3GEM ..... 244,325  
IR4T ..... 213,576  
OM2TW ..... 156,456  
G3WGN ..... 143,840  
S50Y ..... 134,472  
ON5LL ..... 118,772

## 1.8 MHz

YU1EA ..... 68,886  
SV8CS ..... 63,140  
UA2FJ ..... 62,352  
SM6DOI ..... 55,420  
S50C ..... 52,487  
S54DL ..... 50,832

## LOW POWER

EATWA ..... 2,118,914  
LY3BA ..... 1,465,440  
TM6A ..... 1,276,290  
S57DX ..... 1,137,600  
LX1KC ..... 1,025,838  
OE2S ..... 979,615  
S52ZW ..... 955,040  
HA1CW ..... 949,970  
S59AA ..... 949,630  
EA3BKI ..... 943,493

## 28 MHz

SP9W ..... 169,164  
EA7HBP ..... 153,270  
YU1CV ..... 144,251  
EA7FUN ..... 139,464  
EA7GTF ..... 130,350  
IS0NHT ..... 122,200

## 21 MHz

UA4LCQ ..... 573,363

## EUROPE

### SINGLE OPERATOR HIGH POWER All Band

IT9STX ..... 659,175  
HA5BSW ..... 577,643  
ES2RJ ..... 466,830  
Y04GAO ..... 465,408  
LS9F ..... 449,352  
IQ7A ..... 431,346

## 14 MHz

CT1AOZ ..... 176,001  
UW5F ..... 79,123  
UR7TZ ..... 63,452  
S54A ..... 62,318  
UR6EA ..... 54,845  
T95A ..... 41,949

## 7 MHz

CT1AOZ ..... 176,001  
UW5F ..... 79,123  
UR7TZ ..... 63,452  
S54A ..... 62,318  
UR6EA ..... 54,845  
T95A ..... 41,949

## 3.7 MHz

Z39Z ..... 67,451  
S51TA ..... 62,926  
9A4RU ..... 54,666  
S50Q ..... 46,512  
IQ5Q ..... 37,268  
OM5KM ..... 36,035

## 1.8 MHz

HA8BE ..... 27,128  
S54E ..... 28,458  
ES6MO ..... 18,288  
UU4JMG ..... 17,785  
PA2SWL ..... 14,158  
YU1RA ..... 8,379

## QRP All Band

YU1KN ..... 370,590  
YU1LM ..... 178,401  
S59D ..... 154,365  
SM3CCT ..... 91,674  
EA1GT ..... 89,012  
I0KHP ..... 84,667  
OK1DKS ..... 80,013  
RW3AI ..... 74,872  
CT1ETT ..... 74,202  
EA7AQV ..... 41,448

## ASSISTED All Band

TM2V ..... 4,389,455  
DL0WW ..... 3,150,340  
Z38G ..... 2,553,040  
IK0HBN ..... 2,026,296  
S54Z ..... 1,937,320  
RA3AUU ..... 1,926,205  
IN3ZNR ..... 1,790,305  
IO4A ..... 1,625,334  
LY5W ..... 1,624,645  
DJ2YA ..... 1,596,048

## MULTI-OPERATOR SINGLE TRANSMITTER

IQ4A ..... 11,664,525  
TM2Y ..... 9,469,847  
HG1S ..... 8,692,072  
OT7T ..... 7,695,592  
TM1C ..... 6,796,752  
SN2B ..... 6,576,956

## MULTI-OPERATOR MULTI-TRANSMITTER

TK5NN ..... 22,787,820  
9A1A ..... 18,156,595  
EA7FUN ..... 12,724,446  
OH2HE ..... 9,537,615  
GM7V ..... 8,372,049  
PI4COM ..... 7,537,196

# BAND-BY BAND BREAKDOWN—TOP ALL BAND SCORES

Number groups indicate: QSOs/Zones/Countries on each band

## WORLD TOP SINGLE OPERATOR, ALL BAND

Station	160	80	40	20	15	10
ZD8Z	33/9/11	96/19/49	394/30/80	1631/34/133	1956/34/140	2602/31/146
EABH	138/14/42	521/22/76	486/23/75	1372/37/133	2462/37/123	1539/32/116
P40W	139/11/27	416/19/73	684/22/79	1065/31/110	2303/33/115	2469/25/96
3VBBB	143/6/45	412/15/60	570/26/87	982/35/112	1563/33/103	1041/29/94
VE3EJ	211/12/20	649/20/75	835/26/106	1260/35/137	1661/34/135	232/20/65
FG5BG	111/11/26	381/16/62	1084/26/94	1467/32/88	1602/30/97	844/23/68
V8EA	3/3/3	216/22/48	909/30/66	999/33/77	1961/30/79	1021/23/51
P40E	56/10/22	348/19/59	645/23/74	1472/32/95	1492/28/89	480/18/47
5N0T	1/1/1	25/10/18	617/23/68	1593/33/125	1110/30/106	862/24/85
FR5DX	3/3/3	89/14/15	172/25/39	1153/35/121	1237/30/96	1334/30/111

## WORLD MULTI-OPERATOR SINGLE TRANSMITTER

ZX0F	47/14/35	264/21/75	850/31/109	2440/39/151	3013/36/158	1540/30/130
HCBN	19/9/17	287/21/65	1342/28/100	1647/37/145	3334/33/145	1885/29/117
P3A	125/9/55	359/23/79	1260/31/115	2063/38/145	2372/35/138	1195/30/115
EA8ZS	65/11/40	499/17/76	1175/36/124	1130/37/155	2229/32/141	587/27/123
8P9Z	81/11/25	233/16/68	1375/29/107	1695/34/131	3194/33/135	1274/28/126
FS5PL	60/8/22	479/18/69	699/23/100	2114/37/152	2649/36/135	1947/28/108

## WORLD MULTI-OPERATOR MULTI-TRANSMITTER

PJ9B	360/15/38	1397/24/108	2034/32/124	4265/38/171	4697/37/159	2173/29/113
V26B	471/17/52	890/20/87	2384/30/118	4319/39/165	3843/35/157	1941/26/127
TK5NN	794/10/67	1691/24/104	3268/34/138	3947/39/160	3024/37/165	2044/31/126
9A1A	783/11/64	1235/22/94	2331/37/139	3367/39/166	2494/36/166	1423/32/135
C10DH	516/12/35	903/20/80	1262/27/105	3211/40/163	2889/33/146	895/21/99
P29AS	1/1/1	179/18/27	1358/35/87	2162/38/118	4044/36/118	1342/33/94

and closer was Tim, K3LR's team. The flagship station of the North Coast Contesters turns a lot of heads on Interstate 80. Third place went to the ever-growing station of Matt, KC1XX. They say you can see EI on a clear day from his highest tower (Hi!).

## Team Contesting

Each year sees increasing interest in this fun category. This year 22 teams competed for top honors. A long supporter of this category, N6TJ went on the contest reflector and signed up enough members to form five teams! Neiger's Tigers #4 took top honors, averaging 11.1 million points each. This team really took the ball and ran to the goal. Once again the real battle was for second place. When all the scores were tabulated, Neiger's Tigers #2 edged out Team Nippon.

If this category gets much bigger, there could be various categories of teams: All Band, Single Band, Low Power. There are already such teams in this year's listings. All teams are to be congratulated.

## New Records, Special Mention

**World:** 7 MHz IG9GSF (IT9GSF), LA TI1C (TI2CF), Q14 RW9AB, A7 DL4NAC, A3.7 DL8OH; **Africa:** 7 IG9GSF (IT9GSF); **Asia:** 14 5B4AGC, L3.7 4L5O, Q14 RW9AB, MS P3A; **Europe:** 21 4O6A (YT6A); **N. America:** 1.8 VX3BMV/1, LA TI1C(TI2CF), Q7 KR2Q, Q3.7 NC6M (W6REC), A1.8 W4DR; **USA:** Q7 KR2Q, Q3.7 NC6M (W6REC), A1.8 W4DR; **Oceania:** 14 9M8R (W7EJ), L7 YC8UYB, QA KH6/N0KE, Q7 KH6/W8QZA; **S. America:** 21 ZX5J (PP5JR), LA HC5C (W5AJ), L28 LU3HYS, A21 LW1ECO.



Sh. Gankhuyag (left) watches JT1BV dig out a weak one.

Take a look at the entries from Aruba. It looks like these enthusiastic contestants are making a name for themselves. One of their group, Emily, P43E, was the world high YL score. The entry of 5A1A is a welcome sign. The CQ WW hopes for his and other 5As entries in the future. When was the last time you worked three 5X stations in a single weekend? The UN crew of SM7PKK (5X1Z) and ON6TT (5X1T) were joined by Paul, 5X4F, to make zone 37 a lot easier to work.

## Comments

**A. Big Numbers:** The 1997 CQ WW Contests were big ones in every sense. Over 6700 total

logs were received! That number is the largest in CQ WW history, setting submission records on both modes. About 3400 entrants submitted logs electronic in nature. Electronic submissions are what we want and they make the post-contest process easier for you. The easiest way for you to submit a log is via e-mail. Please send SSB logs to <ssb@cqww.com>. You will receive a robotic response and a personalized access code. Keep a record of your code so that you can view your log and its analysis. For complete details on how to submit your log electronically, look at the rules in this issue or our WWW site at <cqww.com>.

**B. Log Analysis:** Besides the number of

## TEAM CONTESTING

1. **Neiger's Tigers #4:** 55,665,702. By EA8BH (OH2BH), P40E (CT1BOH), P40W (W2GD), VE3EJ (N5TJ), ZD8Z (N6TJ).
2. **Neiger's Tigers #2:** 19,502,270. By GW4BLE, HC5C (W5AJ), YB1AQS, 5X1Z (SM7PKK), UT4UZ.
3. **Team Nippon:** 19,234,163. By 3DA5A (JM1CAX), 6Y6A (JE3MAS), FG5BG (JF2DQJ), JA0QNJ, V8EA (JO1RUR).
4. **Yugoslavian Team #1:** 15,777,018. By YT1AD, YT1BB, 3V8BB, V29NR (YU1NR).
5. **Team Aruba:** 9,749,256. By P43W, P43A, P43T, P43E, P40E (CT1BOH)
6. **Neiger's Tigers #1:** 8,683,774. By W7WHY, N6BV/1, K6NA, N7NG, W6XR/2.
7. **Neiger's Tigers #5:** 7,501,732. By W6RJ, 8R1K (N5ZO), WB9Z, V47KP (W2OX)
8. **Team Canada #1:** 4,931,978. By VE5MX, VE3FU, VE2QRZ (WB2K).
9. **Contest Club Finland:** 4,757,935. By BY1QH (OH2PM), CP6AA (OH0XX), OF1MM, OH0TA (OH2TA).
10. **Neiger's Tigers #3:** 4,743,222. By W1WEF, CT1ELP, 8P6CV, 5X1T (ON6TT).
11. **Yugoslavian "Single Band" Team:** 2,419,654. By 4N7B, YU1ZZ, YZ1AU, YU1JW.
12. **Great White North DX eh?**: 1,494,336. By VE2ZP, VX5FX, VE6BMX, VD3MG.
13. **Hanging Judge Contest Team:** 1,156,417. By AB5SE, K5OY, K5YRZ, KG5NE, KK5NO.
14. **Team Tennessee LP:** 1,071,686. By AE4ZZ, KE4KMG, KE4YBS, NY4T, WO4O.
15. **West Island DX Group:** 874,037. By VE2OL, VE2AYU, VE2TBH.
16. **Tupy DX Group #1:** 851,376. By PU2MHB, PY2NY, PY2XW.
17. **Team No. 13:** 698,329. By EA1FAK, EA1BLI, EA1OT, EA1JE, EA1MK.
18. **Tupy DX Group #2:** 586,349. By PY2APQ, PY2DUN, PU2VJJ, PY2IQ, PT2AW.
19. **Team Canada Single Banders:** 575,437. By VX6JY, VX3BMV/1, VE1JF, VE4VV
20. **Team Tennessee HP:** 508,454. By K4AMC, N4ZZ, W4PA, WD4K, W9WI.
21. **Yugoslavian "Low Band" Team**: 77,265. By YU1EA, YU1RA.
22. **Catalonian Team:** 59,521. By EA3AML, EA3AVP.

logs received, the 1997 tests brought a long-time CQ WW Committee dream to fruition. The WWW allowed us to archive all the electronic logs and their analyses. Using an access code, each entrant could privately view their log and "UBN" report. Although the report shows more than UBN (acronym for "Unique, Bad, Not in log"), it serves as a simple way for each entrant to locate areas for contesting improvement. The report is especially useful to multi-operator stations. If they keep track of when their operators log on, they can help inexperienced operators improve. Fun and improvement is what it is all about.

The UBNs were devised years ago to help the CQ WW get a handle on the reliability of top-scoring logs. If a top log had a UBN% much higher than the average for its category, it acted as a flag for further research on that log. The research required laborious human intervention. The log-checking process has progressed remarkably since those early days. Now a computer can rescore all electronic logs using the same .CTY file. Following strict rules of what can be removed from a log, the computer provides a conservative analysis that you see in your WWW file.

In 1997 it became feasible for the first time to incorporate all electronic scored logs into the final results. What this means is about 50% of the results that you see on these pages were evaluated, a process considered impossible just a few years ago.

Many of the top scorers in the CQ WW Contests have long known about the UBN report, and their reports have been supplied to them on request since the early 1990s. This process is now very visible to all levels of contestants. So what should you make of the report that you receive? In a rough sense, you can view your score retention as a "grade," just like when you were in school. That 90–100 was an "A," 80–89 was a "B," etc. You can use the data provided to see if there are any patterns. I found that at PJ9B I would make copying errors on SSB with K and KA stations. So now I always say the prefix phonetically to avoid an error.

The strong words we have received from contestants everywhere are "Thanks for this service. I can see how to improve." And that, after all, is the whole idea—to improve your skill.

**C. Packet:** The use of packet is perfectly okay for those who claim Assisted or Multi-Operator. Any use of packet in any other category is wrong. If you are going to enter the HP, LP, or QRP categories, you cannot receive any packet help. If you want to try to work some new DX countries, packet is an easy way to do it. Just claim Assisted. A serious problem occurs when nine of the top scores in a category play by the rules and one decides to cheat. It is not fair or right that the entrant be entered into the same category as the others.

**D. QTH Rule:** It has come to the attention of the CQ WW Committee that several MS and MM stations are violating rule III, which states, "Transmitters and receivers must be located within a 500 meter diameter circle or within the station licensee's address, whichever is greater." This means that you cannot run 20 meters 30 km away from 40 meters. The whole station must be within the limits of rule III. Of course, it is easier to avoid interference by placing 30 km between your stations. You might even be tempted to run two signals on the same band. Interference is a technical problem everyone must try to solve. Many stations have figured out QRM reduction methods within the rules.

## Thanks

Thanks to the CQ WW log checkers who validated the winners and provided insight into many contesting topics. The 1998 crew includes: K1DG, K3UA, K3ZO, K6NA, KR2Q, N2AA, N2NC, N3ED, N3RA, N5NJ, N5TJ, N6ZZ, N8BJQ, N9RV, W2RQ, W3ZZ, and W7EJ. Our DX advisors were very helpful in offering advice, providing information, and sorting out potential problems. They are CT1BOH, DL6RAI, EA3DU, F6BEE, G3SXW, HS0/G4UAV, I2UIY, JE1CKA, OH2KI, OH2MM, OK2FD, ON6TT, PY5EG, S50A, SM3SGP, UA9BA, and VE3EJ.

A special thanks to Dick, N6AA, who again spent countless hours to make the CQ WW database the best in contesting. The CQ WW uses the software developed by Tree, N6TR, to create the database. John, K2MM, created the entire WWW log entry information. His robot worked smoothly in acknowledging receipt of a log. He also created the search engines utilized by Committee members to aid in log checking. Tack, JE1CKA, has created the appearance and non-log data on <cqww.com>. Translations of the rules into Spanish, Japanese, German, and French were done by EA3DU, JE1CKA, DL6RAI, and F6BEE. Larry, N6TW, was invaluable in retrieving and processing data from e-mail submissions. Thanks to John, VE3EJ, and his wife, Hazel, for proofreading the tables shown in these results. John, W0UN's help has allowed the CQ WW to modernize its certificate program. Thanks to John, K1AR, for his advice and hard work to make the CQ WW so successful.

Congratulations to all the winners! Try to get a fellow competitor on for a local, friendly competition. To participate is what contesting is all about! CU in '98!

73, Bob, K3EST

## DX QRM

I operated from the top of a mountain which was about 950 meters above the sea!! ... JH6RFT/1. Zat Zat two Zat QRZat ... I really need a DVP ... ZZZZ (PY2YP). My first international DX contest. Will be back next year ... YC2ERL. I operated from my driving seat 1 mile from house in a disused airfield to avoid QRM and TVI ... G3TVU/m. I developed my own contest software and it works great! I'm very happy to enter the contest. It was cool! ... XE1NAD. My 49th CQWW and still enjoying it! ... GM3BCL. My first CQWW was in 1956. We worked from the club station UA1KBB using AM! Old timers remember the 1958–59 years with SF# up to 200! I was UW1BM for 30 years ... U1BA. My second child was born during the contest—a boy! ... YB2BRW. I'm glad to listen in the contest. I'm glad to read CQ Contest magazine! ... RV3BR.

First day 3316 QSOs. The record was in my hands. Second day bad propagation and the record returns to ZD8Z's hands ... ZX5J (PP5JR). Was out of country on business. Only 7 hours operating time ... S50A. The CQ WW is still the most exciting operating activity to work the world. After 32 years as a radio amateur, I'm still thrilled by the enthusiasm it brings to me personally and to thousands of others, too ... VX3XN. Great fun after many years of QRT ... IT9WPO. It was exiting for me that I could contact more than 60 stations with my bare-foot radio system ... JA9SCB. First time to operate from two DXCC countries in a contest (3DA5A and ZS6) ... ZS6CAX (JM1CAX). Conditions unacceptable! No way to get 12 hrs operating time with no sags ... KH6CC. I am a beginner at WWDX Contest. I specialize in domestic contests only ... JF2FIU. This was my first time to be shown "300/hr" on the last 10 min rate of CT ... JR4PMX/1. After a short 10m opening into the US and SA nearly all was dead by 9AM Sat ... YB1AQS.

Nice to hear bands start to open. Even 28 was boiling from time to time ... SM0AJV. Almost as good as a full course meal with high power! Condx much better on the high bands. The EU crowd has gotten mighty unruly and many times the "last two" syndrome was overwhelming ... VP9ID (AJ2U). First time in any HF contest. Next will be on top. Hi ... S53AJL. We had a lot of fun during the time in the contest. Our plane left about 7 hours before the end. Too bad. But after all, what matters is that we enjoyed our stay in Cozumel Island ... XF3/EABT. It was my first SSB on 40m. It was very hard work. I had a lot of fun! ... SP4EEZ. First time low power. Quite a different job! Great contest ... S53ZO. Very good propagation the first night on 160. Very bad the next day—only 9 stations all night ... YV2IF. Wow! Great experience, bad antenna, big fun! ... IT9ZYT. Last time I did this contest was 1962 as 5B4AB. What a difference! ... G3LOJ.

Nevezukha (Russian equivalent of Mr. Murphy) came again. There was an electric power failure the first 4 hours of the contest, then after 1.5 hours my new

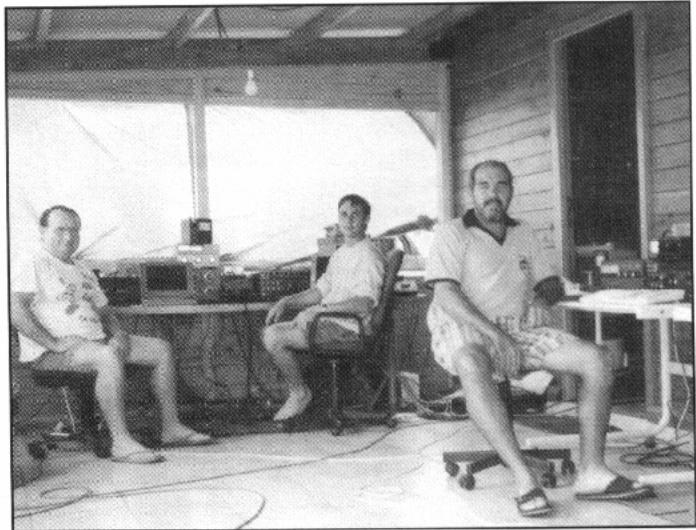
## ZONE LEADERS SINGLE OPERATOR

Zone	Call	Score	Zone	Call	Score
1	KL7AC	339,850	21	9K2HN	4,459,463
2	VE2QRZ	3,180,810	22	AT0MB	1,085,352
3	W7AT	1,961,874	23	JT1CO	333,108
4	VE3EJ	8,240,550	24	BD4DW	153,450
5	K5ZD/1	5,494,655	25	JH4UYB	3,146,862
6	XE1NAD	561,484	26	HS0GBI	17,091
7	TI1C	7,379,253	27	WH0AAV	906,660
8	FG5BG	7,195,161	28	V8EA	6,941,985
9	P40W	12,894,570	29	VK6WJH	49,217
10	HC5C	4,401,621	30	VK2ARJ	969,465
11	ZX5J	3,181,696	31	NH7A	4,477,494
12	CE8T	5,653,488	32	ZL4AS	462,000
13	LQ0N	2,453,047	33	EA8BH	13,885,330
14	GW4BLE	3,656,088	34	5A1A	253,162
15	4N9BW	4,985,601	35	5N0T	6,216,212
16	UT4UZ	3,012,455	36	ZD8Z	13,971,308
17	RK9CWW	1,997,504	37	5X1Z	4,900,518
18	UA0WY	936,180	38	ZS6BXN	1,067,566
19	RA0FW	2,237,634	39	FR5DX	5,876,154
20	JY9QJ	3,147,376	40	TF/OZ5IPA	39,786

PA blew up. So I lost about 12 hours... UA1OMS. Our first challenge for the CQ WW using our old callsign. We enjoyed so much and will be back next year with many friendship... JA6ZPR. We lost the best DX band—21 MHz—due to failure of our transceiver... SP9KRT. Due to an important meeting on Monday I had to QRT at 14Z Sunday. But sure enjoyed the new sunspot beginnings... JA8RWU. Not a single JA or North American station worked. Incredible!... 9G1YR. No, my call is not VE2; it's VE2QRZ! And yes, it's snowing... VE2QRZ(WB2K). It was a real big fun! "Serious" contesting is fun. Even though you ain't gonna be the winner (Willy Umanets, UA9BA)... TA2KB. Unbelievable what you can work with only 100w... OE2S(OE2GEN). My ant does work for EU but not for DX... OE9MON. Best contest ever for these new kids on the block... V26B. The worst propagation in Finland in years. It was painful to see other comments about FB condx... OF1AF. When the VK2 told me after 2 hours they had 170 Qs on 10m, I felt really bad. However, when the going gets tough, the tough get going, and I just kept plugging away. I pulled back their lead with good runs on 15m... VK5GN.

Was nice having PJ9B call me for a change!... VR97BG. First time MM in CQ WW. Thanks to our special guest star Dan, LY1DS... OH2HE. First time on 40m SSB single band... OK1RI. Gee, I wish I had checked my amp before the test. If I had known I had one dead tube, I would have officially declared low power... VE2ZP. Very nice to compete again! A perfect contest... P43A. After a few of our antennas were stolen, we had to improvise a bit. The best contest we had for years in terms of contest spirit... PI4COM. The CQ WW provides two days with plenty of emotion where I could work new countries... PY2DJ. This was my 439th contest!... VK2APK. It was very difficult to get zones 8 and 9... JE2LUN. Ban all Europeans... except GM... GM4CUX. Last time I submitted an entry was as ZC4AK in 1960. That was a Royal Air Force Cluo Station operated by myself, ZC4AB, and Steve, G3MBS. Next time I tried was as ZC4AB in 1962. However, I was also getting ready to return to England and the logs were accidentally stowed in my deep-sea baggage. My next attempt was from Ghana as 9G1FB in 1964. The result was so pitiful I just did not have the heart to submit the logs. All the rigs were "Home Brew" then, and, in Ghana, I was a little restricted! I was crystal controlled and only had two crystals to shift frequency if I thought I was getting popular. Ah! Halcyon Days. This attempt comes after being 20 yrs QRT!... G3LOJ. 10m finally came alive!... VA3SK.

Once again the air was alive with the sound of heavenly music—wall to wall propagation! A Great Contest!... VK2ARJ. Nice to operate from FP during the contest. Would like to thank the local ham radio group from FP with our travels concerning our DXpedition... FP/KG8CO. Condex on 10 and 15 were FBI! First time in CQ WW was in 1972—25 years!... OZ6PI. We had big problems with the coax cables. This contest was the first one for most of the operators... TX8KAB. I was working the contest from the mountain, Rogla (1550m ASL) on the lonely TV tower... S51TA.



FK8GM (left to right): Alain, FK8FI, Franck, FK8HQ, and Eric, FK8GM.

To work a Hanoi station in the SWedish embassy... KH6BZF. The combination of difficult band conditions, meager antennas, and being in old Eng and instead of New England made this contest a real slog! I still had a great time... G0UHK. This was my first CQWW and I worked some difficult zones and new countries. The conditions were very good to JA... PY3RK. Mni new band countries for me; it is a very long month to the CQWW CW. Hi!... OK1DWC. The CQ WW is the biggest contest in the amateur radio world... PY1ZT. My first contest entry. I hope for better results in the next contest... Z31RB.

We had a lot of fun but were tired at the end. Need more operators next time... VK4DZ. I would like to express my thanks to the 13 North American stations who showed great patience in making a QSO with my low power station on 80 meters. As a show of thanks I have now bought an amplifier and will use it in the next contest... OZ2ZZZ. Sometimes we have to resign ourselves to fate, QRP... Let's have some fun!... JA5GPJ. It was my second CQWW. I enjoyed it very much... 7K4XVK. Very good conditions to the south on 10... UA0SR. I had more dupes than multipliers! But I enjoyed the contest; aloha & mahalo to all... KH6FKG. 5A1A called me on 20!... ZF2AH. Was a wonderful contest. I worked 33 zones with my 4-el... RZ6HX. It was a pleasure to take part in this contest for the first time... TA2IJ. JA2RL/2 is the JARL HQ station that was briefly on the air at Mie prefectural local meeting demonstrating the CQ WW Contest to beginners... JA2RL/2. My first participation in the CQ WW with my new 40m 3-el beam. Much fun!... OE3WMW. This was my first contest (my license is brand new) and I enjoyed it very much... XE2AUB. This is my first DX contest. I felt that the world was small, speaking with various countries and operators... 7M1QYH.

High bands is vy FB. Low power and whip makes a good job!... JA1SKY. It was a thrill to have someone answer a CQ on 40m QRP, but that's what can happen with a better prefix... KH6/W8QZA. Great competition as always. Thanks to the new sunspot cycle I beat my personal best score... IK4QJM. My target was to try to win the CQWW on 10 meters by working from the central part of a 7 million inhabitant city. Tks to LU8AQE for the use of his fine station... AY7D (LU7DW). After many years we finally started and finished the contest with the runner station on 20m instead of 40m... IQ4A. Our first DX contest MS class outside of Japan... YN6WW. We are all high school students no more than 17 years old. We are the first time to take part in the CQWW contest... BY5QN. They don't call it the big one for nothing—it is the best contest of all... CT1ELP. While having power shortages we had to switch off all not needed devices to continue operating. We have to thank our host CT3BX, Hern... CT3BX. Quite a difference between 708!1960 and DL in 1997, so CU in 1998 from OE or... DJ0FX(OE2VEL). I like contests... JH0FWV. Excellent contest. Many new countries for me. Wish HC8. S50 turned their antennas south!... VK4MOJ. This was my first international DX contest ever! Very pleasant... CX9BAG.

It was great to work several YL operators—refresh-

ing to see their increased participation... VE3HX. Due to a QRP alarm clock I gained some extra hours of sleep... DL2NBU. We calling in, all Ws only give their callsign, nobody calls like "DL6FBL this K1XXX." That technique would be very useful on 40m split... DL6FBL. A lot of fun, many QSOs, low multipliers with our minimal two cp DXpedition... EA8/DL6MHW. This was my first serious attempt and I chose 10 meters. Sat was great condx but Sun was a washout as the wind blew nad the QRN reached S5... 3DA0CA. Power supply blown by thunder storm just before the contest. Worked only JH7PKU with a car battery... 3DA5A (JM1CAX). Always a thrill to work DX on 10 meters. Thanks for giving a chance to compete against the best... 4Z5JA. My first CQWW since 3 years surely reminded me how much it brings out the best on the bands... 5X1T (ON6TT). Wow! What an activity on all bands... DL8ZAW. I managed 25 new band countries!... G0KRL. The CQ WW SSB contest is the only time the microphone is taken out its box... G3TXF.

First CQ WW from home QTH for nine years... G4BUO. Our first attempt at an international contest... GM0NTL. We will continue without a break our 3\$\$ year participation... HB9H. This was the third attempt to beat the world 40m record. I needed the 3-el to break it... IG9GSF (IT9GSF). First experience on African Ita'y. I need abetter antenna for 20. I broke my leg taking down antennas... IG9STG (IT9STG). My first DX contest DXpedition alone! Many thanks to LU8ERR and his family for their support... LW8EXF (YL). Condex far better than last year. we set fire to the shack on Sunday morning!... M7P. Used KH6SQ for QRP. Never worked one European!... KH6/N0KE. Never recovered from the main generator and amp going out of service at the beginning of the contest... NH7A. Conditions on 10 and 15 were good. JAs were scarce this go around... KH7R. Big thanks to the Z30M team for the possibility to use their contest station... Z38G (OH3MIG). Never worked so many stations on 10m in one single weekend. Thank you CQ WW!... YO3JF. I enjoyed the best and biggest contest with a tiny antenna... 7N2UETO.

## USA QRM

The CQ Contest Gods did it again. Great propagation. What is it going to be like at the solar flux maximum?... KS1L. Ten was open! N. Pole aurora stopped me from working Europeans on 20... KM7TM. First time entry! Indicator stopped, had to look where I was pointed... N4MXT. Ten minutes before the contest my G5RV blew down. It's a tradition!... KM6XX. Ten inches of rain, 5 times I had to completely disconnect everything, and 95% of the weekend was spent on the low antenna of the stacks due to rain static. This was not my weekend... W4AN. I am a quadriplegic. I use a VOX and computer logging with a Macintosh and Headmaster Plus "mouse"... K17LS. First CQ WW. Used this experience as a training ground... NT4L.

Would have done much better had it not been for problems with the rig that forced us to run most of the contest with 20W out! We were delighted to have ET3AA and FP5AC call us and answer our 20W signal

... KV4T. Put a 80m 4-square up the month before the test. Elevated radials. It didn't work as well as I had hoped ... KQ3V. What a nice surprise—10m had early openings both mornings, just great, even though every QSO was S&P ... Al2C/4. 10 meter mobilizing in down-state Illinois with 25 watts I worked into FO and 9X (a new one) ... KB9CRY. Midwest snow storm forced us to use beverages on 20m due to precip noise. Also forced to battery power and still could not operate the last hour due to power outage ... N0MA. Biggest thrill was working ZD8Z 1st call on top band ... K6SE. The blizzard came. The main coax went. Reduced to a single band. But STILL fun! ... K0ZA. Only my second CQ WW SSB. I doubled my QSOs and tripled my points from last year ... N4BTO.

Fastest voice exchange ever heard award goes to HH2PK. Wow! ... N4CW. It's great to still feel the rush generated by the contest weekend ... N4KW. The European opening on 10 was a great surprise. It was the first time I had worked Europeans till 5PM! ... KC3PZ. Best outing ever! Nice to see 10m back ... K2CS. I was operating mobile using an ICOM 706 and Perth Outbacker. I feel pretty good about the results ... AE7C/5. First contest by myself since 1983 when I was CN8CO. It sure was a lot easier being DX ... W3EMH/4. Nice to see such wonderful condx. It has been a long time! ... WA2ASQ. Are the bands back or what?? QRP works! ... N7VY. This contest broke my 1995 record by 100 QSOs. We ended the contest with 148 QSOs which may not seem like much, but it was a big deal for me. I like to improve in contests and I achieved my goal ... N9YXA at WG9L.

Very enjoyable contest. My first serious contest in many years. CQ WW is my favorite ... WBRL. Played around a few hours. Nice to see the bands getting back in shape ... AE2T. Lots of fun. The first time I made a real effort to get on. Now is the time for improvements ... AJ4Y. This is my second CQWW and it could not have been greater ... KS4YX. The best DX contest there is ... K2FR. Operated from a 40 acre spread 30 miles from my home QTH. I've been licensed 5 years and until this weekend never heard a ZS. Not only worked two but one called me! ... K5OY. Nothing broke. Working IH9/OL5Y on 15m! ... K6GT. First time DX contest effort for most of the crew. It was great fun to have JR1HAA and JJ1BMB visit for the weekend ... K8CC. Interesting that almost all the top scoring stations ID themselves after every QSO ... KA2CDJ. This was my second time working the contest and it was an absolute blast! ... KB4OGM. There was a huge pile-up for 5X1T that I couldn't crack so I went up the band and heard 5X1Z begging and I got him first call ... KC6X. I qualified for the worked all Argentina award ... K9JC. Congrats to the "Old" Gang at K6IDX. Now we know who was beating us in pileups. We're not exactly spring chickens either except for KX7M! ... KO6N (N6RO). My first CQ WW. I loved it! ... WB8STO.

All in all, this was a most excellent journey around the world in a weekend ... WO4O. I thought that nobody would hear my little station. Although I didn't make a huge score, I was very pleased at the contacts that I made ... KQ6QW. First time low power in 17 years of contesting! ... N1TM. My first contest as a General after 29 years as a Tech. Heard 52 countries that I could not work. Will be back with bigger ants and higher class ticket ... N3GPU. Multiplier operator fell off the chair when KG4QD refused to work us and then announced "Full calls only" to the pile-up! Had great fun with the call ... W2A. 15m was astounding! ... W4NC. It was very nice to work 5N0T on 40m without a gain antenna ... W6RCL. The highlight was when I worked a station in the Caribbean and he signed by saying "good luck on w/ the swap meet today" ... W6TRW. Am I the only one using a Macintosh for contest logging? ... W7BX. First contest I've done in 35 years of hamming. 95 countries on a dipole! ... W2SSB.

Ignoring T2SI. And then realizing I needed him for a new country! ... W4UW. This was the first time I tried single band. It turned out to be as hard as I've ever worked in any contest. Tks! ... KQ6ES. Propagation was good on the first day. 21 MHz was fantastic! ... WB6NFO. The bands were much better this year. 15 and 10 were virtual pipelines to South America and the Caribbean from my QTH ... KN7T. A great contest but a vertical and 100 watts makes for lots of calls and few returns ... W4ZYV. I enjoyed the contest from a portable location this year with only a couple hours operating time ... AA8UP. Good 15m opening to JA land the last hour of the contest! 3A/LX2AA and 9U5CW called—Txn for the surprise! ... N4CT. Great contest in spite of the early winter storm that dumped 4 inches of wet snow on leaf laden trees causing numerous power outages. Low bands were quite noisy, but 10m was looking good ... NR0X. It was really great to make so many phone QSOs in a couple of hours. Glad 15m is back

... KE9EX. QRP makes one humble ... NC6M (W6REC). My big thrill was working ZL1AA longpath on 15m and then 40 minutes later working him shortpath on 10m ... KR4QI. First time out in DX test with new call ... K3CV (ex-NX9T). Lost the amp about 2/3 of the way through the contest. I had lots of fun: hope to find time to do it again next year ... KA1EKR. Mother Nature shut down 80 and 160m again this year, but 10 and 15m came to life ... W5CWQ. What a joy to find 15m wide open ... N4UH. In the past, I've made a contest QSO here and there, but after 29 years as a ham, this was the first time I've actually spent the better part of a weekend on a contest. I had a blast. Worked a couple of new ones and look forward to doing it again. How do I get the callsigns to quit playing in my head? ... K5IQ.

## Station Operators Multi-Op Single Transmitter

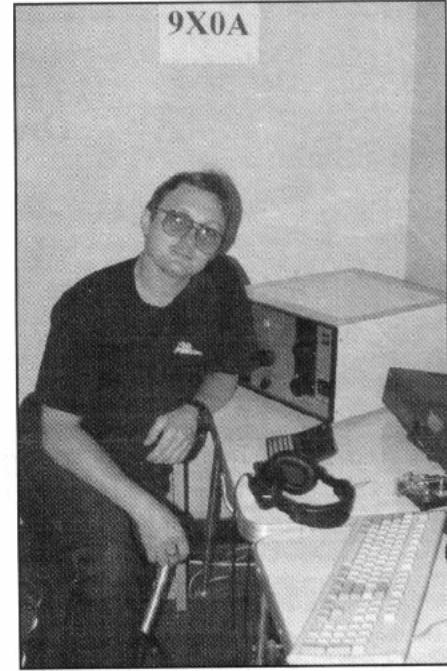
**4G2X:** 4F2IR, DU2BFG, 4F2MD, DU2BRL, DY2PTO, DU2RK. **6D2X:** K5TSO, W5VX, N5RZ, N5NYK, K5TR, XE2YME, XE2XDX, XE2YNS. **7J1YAA/1:** 7J1ABD/WA6URY, JJ1JY0, JF1NIW, JA1TCF, 7J1AKH. **B9PZ:** K3KG, K3ZR, K4JF. **9A5D:** 9A2FK, 9A3GA, 9A3NY, 9A3VM, 9A4KS, 9A4NC, 9A4SG, 9A4VN, 9A5AQ, 9A5DU, 9A6KKB. **9A7A:** 9A7V, 9A8A, 9A2ME, 9A3OS, 9A3TR, 9A4FA, 9A4RX. **9A9D:** 9A4HH, 9A4DD, 9A4JL, 9A2QO, 9A5YA, 9A6KOS, 9A7GH. **9K9K:** 9K2RR, 9K2SS, 9K2RO, 9K2SD, 9K2OA, 9K2OK, 9K2HR. **A47RS:** A41MC, A41LI, A41KW, A45ZN, GOMRF, GOONA. **A41ON & W1RH:** **A55NT & N00T:** KC5ENG, AD4PU, KE4RHU, KB8LUTR. **AC6LK & N7FF:** **BY1BY:** BZ1LL, BZ1DG, BZ1HD, BZ1WY, BZ1CY. **BY4RSA:** BA4RC, BD4RX, BD4RF, BD4RD, BD4RE, BG4RAD. **BY5QN:** Heng, San, Chen Xiang, Suming, Yanfang, Jipeng.

**C6AJT:** W4WX, KN4WE, W4USN, K4GZ, W4CJL. **CEBT:** CE8ABF, CE8SFG, CE8CDV, CE8PSG, CE8GLD. **CS6S:** CT-ERK, CT1TE. **CT2FUR & CT1DSJ, CT1EGF:** **CT3BX & K1BR:** DK7YY, DL20BF, DL30DX, DL7BY. **DF0AT:** Club. **DF0DX:** DK5QN, DL1YAW, DF8AF, DL1YD, DF8XJ. **DF0HTE:** DF7ATW, DK1SWS, DL3SBI, DZ7TL, DL5NAH. **DF3AG/P & D2IAK:** DF4AO, **DK0ANO:** DL3WV, DL2FPD. **DK0ER:** DL4NT, DL4NN. **DK4QT & DK1OH:** DJ7YP, DL1YFF, DL4YAJ, DL4YCF, DF8VJ. **DL0CA:** Club. **DL0GM:** Club. **DL0TD:** DG2FEF, DH5IAE, DK1BN, DK5FJ, DK7WY, DL1FDT, DL1FDV, DL2FDK, DL2FZN, DL2SEK, DL2ZBN, DL3NEK, DL4VBP, DL8AUAA. **DL0TU0:** DL6DVJ, DL1DQY, DH5FS. **DL0UM:** DF5BM, DK7ZT, DL1EFD, DL1FFO, DL4FD, DL4MF, DL6C8, DL1MFL & D3C8, DJ5JK, DL3NED, DL4MEH. **DL100 & D15KUT:** DK2OY, DL5NAM & DL3NCI. **DX1E:** 4F1EJD, DU1KQG, DY1RAN, DY1FDD, DY1RSM, DY1FYU, DY1TOJ, DU1MQA, DU1OOP, Richie, Eric. **DX1CW:** Club. **DX1S:** DU1KT, DU1GWQ. **E1A1OI & E1ACB:** EA1BXY, EA1C0Z & EA1EAG, EA1AS, EA1EEY & EA1CJB, EA1CS, EA1BXW, EC1/diplomado n'a/ba 63514. **E1A1EF & EA1ACP:** EA1BFZ, EA1CMN, EA1EFL. **EA1RCT:** EA4AZU, EA1AOD, EA1BAY. **EA3GW & Others:** EA3KA & EC3AJU, EC3ALS, EA3SD. **EA3RK:** EA3BOW, EA3BOX, EA3DQJ, EA3EI. **E45BY & E45XT:** EA5DGF, EA5UE, EA5FD, EA5GRV, EA5E, KA5WK, EA5RS, EA5KB & EA5CY. **E7ABJV & EA7ESH:** EC7AJL, EA8/DL6MHW & DL3ABL. **EAB2S & EA1AK:** EA3KU, EA4DX, EA4KR, EA5GRV, EA5AJE, K2SS, Alexia. **E01II:** Others. **ED2WW:** EA1HO, EA3MQ, EA2ATU, EA2CCG. **ED3TR:** EA3BW, EA3CT, EA3KG, EA3WC, EA3AJW, EA3GP, EA3GG, EC3TR, FC3CVD, Julio, Santi. **ED5WWC:** EA5KQ, EA5CIO, EA5XN. **ES5O:** ES5MC, ES5MG, ES5OX, ES5RN, ES5RP, ES5RW, ES5RY.

**EW4XA:** EU4EU, EU4AE, EL4004. **EX9A:** EX2M, EX0M, EX3W, EX8M, EX8F, EX8MIN. **F5KDC:** FB1NAN, F5OKD, F5PAL, FBBGV, F5SSU & F5OGG. **F6KWP:** F5RKL, F-11734. **F6KDZ:** F5HN, F6FYX, F6EPN, F6ITD, F8AD, F6IHY, F2NH, F5JU. **F6KFC:** F6BNH, F6BGC, F51QA, F5DQL, F6IYF, FA8VK, FB1CMF, F5UAM, FA1ITF, F1ADG, F5BML. **F6KOH:** F5UTN, F6, SP, F1GJ. **F6K2PF & KU9C:** F08WD, W6WK, N6RT, N6VO, N7CQO. **W8AEF:** FP5AC/P & FP5BU, FP5BZ, FP5CJ. **FR1K2RV & FR5DN:** **G3TBK & G0GDU:** 2E1F0Q, 2E1OR, **GU4JS & G4XJM:** G3VAD, G4VUO, G6ABU, G0FYA. **G7B:** G4-00, G0BVW, GBATD, G1GSN, G4VXT, M0BHK, M1ACI, G4YRF, G3EOS, G4XQD, G7NBI, G6RHL, GOWIZ, M0AJF, G4LWA. **GM0NLT & MM1BG1:** GM0BCN, GMUYZ, GM4KU, MM1BJO, MM1AV4A. **GW8GT:** GW3NWS, GW3KYA, GW4JBQ, GW5NF, GW8OMAW, W0AIH. **HB9H:** HB9CIP, HB9BLQ, HB9CQAT, HB9CXZ, HB9FB, HB9FBQ, HB9FBG, HB9AUS, HB9YC, HB9FAP.

**H9QAF:** HB9QAF, HB9QFB, HB9FB5, HB9OB, HB9QBL, HB9QD, HB9QDD. **HC8N:** N5KO, AG9A, HC1OT, VE3EJ. **HG1S:** HA1J, HA1DAE, HA1AH, HA1DC, HA1BN, HG1DAI. **HG5C:** HA5LZ, HA5LV, HA5MA, HA5WE, dj David. **HL00:** Kyungpook National University Students. **HS2YM & HS2PF:** HS2JFW. **IC8JAH & IC8BNK:** IC8SDL, IC8FAX, IC8CFQ, 1801S, 15WTF, IC8WIB, IC8WIC, IC8HWN. **IH9OLSY:** OK1FJA, OK1MM, OK2ZW, OK1JR, OK2XTE, IT9HBT. **IH2Y:** IK20WX, IK2PTR, IK2WBN, IK2PIH, I2ZZZ, IK2DUU, I2PHN, I2MWZ. **IK2UCK & IK2BU2:** IK2XVU, IK2XPM, IK2SGF. **IK2WBC:** IK4NPC, IK4RQE, IK4HLP, IK4NDN. **IK2A:** IK2RZF, IK2HKT, IK2CIO, IK2ANI, I2FT, IK2XRW. **IK2L:** I2OKW, I2ZACZ, I2ZAAJ, IK2PFL, IK2XYP, IK2YY, IK2HJ, IK2FSG, IK2HPI. **IK2X:** IK2GZU, IK2GSN, IK2WAD, I2CZQ, IK2SAU, IK2PUZ, IK2ZQJ, IW2PL. **IK4QA:** 14VEQ, 14TJE, 14EAT, 14AVG, 14IKW, 14IND, 14YR, IK4DCT, IK4MGP, IK4QJH, IK4EWK, IK4XQH, IK4CZ, IK2NQJ, IK2JUB, IK2MRZ, IW4ANU. **IK2W:** I2ECW, I2VXJ, IK2DGH, IK2PZC, IK2QEI, IK4MTP. **IR3PN:** IV3JJU, IV3XNF, IV3SCR, IV3NV, IV3NR, IV3OR, IV3BTY, IV3THL. **IR7S:** IK7YUA, IK7XUW. **IT9KWF & IT9EWG:** **IU2M:** IK2SGC, IK2SFZ. **I2ZB:** IK8HCG, IK8BUND. **J41DKL:** SV1DKL, SV1COT, JI7TDR, JI0TAG, JI7UPJ, Tanako. **J41ELY & JA1IDY:** **J41YKX:** JQ1VNM, JH40WG, JQ1VVT, JH9JFH, JQ1PCT, JK1QHK, Sugimoto. **J42RL/2:** J2VAX, JS2J, J2ZTK, JK2RKE, JK2TWD, JK2VOC, JQ2AXB, JP2XYT. **J46ZL:** JG6POJ, JJEWYS, Toyo. **J47YAA:** 7M1JAS, JG7PSJ, JH0NAN, JF1SX, Nakagawa. **J49YAA:** JH9JAH, JG2KKG, JN2QCV, JM2FCJ, JE0AVO, J06OLV, JR9KZR, L72CEG, JJJ0BLW. **J49YBA:** JR9EUV, JR0BAK, Nada. JR0ELG, JR9QNJ, JF0EGG.

... KE9EX. QRP makes one humble ... NC6M (W6REC). My big thrill was working ZL1AA longpath on 15m and then 40 minutes later working him shortpath on 10m ... KR4QI. First time out in DX test with new call ... K3CV (ex-NX9T). Lost the amp about 2/3 of the way through the contest. I had lots of fun: hope to find time to do it again next year ... KA1EKR. Mother Nature shut down 80 and 160m again this year, but 10 and 15m came to life ... W5CWQ. What a joy to find 15m wide open ... N4UH. In the past, I've made a contest QSO here and there, but after 29 years as a ham, this was the first time I've actually spent the better part of a weekend on a contest. I had a blast. Worked a couple of new ones and look forward to doing it again. How do I get the callsigns to quit playing in my head? ... K5IQ.



Andy, 9X0A, got into a lot of logs.

**JE6ZH:** JR6GKT, JH6QFJ, JL6MPR, JI6RRB. **JH7AFR & JA7WME:** 7J7ABV. **JH7PKU & JA9SSY:** JH7FQK, JH7DXZ, JI1BMV. **JI2ZEY:** JA2BIY, JA2BHJ, JA2BL, JQ2BC. **JN12DF:** JE8RKF1, JE8KKV1. **JR1ZTT:** JK1JHU, 7L1XCM, JK2FGD, JF4JYE, JM4HHH, 7M4AZB, JR8OF, JI70HM, JE0UZ, JR0UUU, Megumi, Furuta, Furukawa. **JT1T:** JT1BL, JT1BV, JW5E: JW5NM, JW7FD, JY8XY & JY5SK. **K0RF & WOUA:** W1XE, NOAH, WB0GAZ, K1EU & W1DEO, K1NG & K1IG, K1SD, AA1AA, WB1F, K2TR & K2ONP, NJ1F, NA2NA, KE1EO, K3IE & W4AE, K4WG, K4FCC, EA4SW, K4LQ, W4JAM, W0MAN, K4ISV & K4CN, NN4T, K4CM, K4CMS. **K4N:** N8PR, W4SD, N4QV, K4VP, K4WCW, Y5D7A/4. **K4RC:** W3MGL, KA4VG, KU4FP, K4MU. **K5DM:** WB0NSA, K5CKDM, K5KG/C & WB8TR, N7UN.

**K5RA:** Club. **K6A:** K6BEW, K6FHIN, K6PUL, K6IDX & K6F6FSM, AI6Y, W7TO, K6RK, K7BV, W6OAT, K6KR. **K6KM & N8BT:** K2KWM, K6MDX: AC1D, K6BG, K6BQKX, K6FDK, K6JYJ, K6JYQ, K6ZNB, K6D1WA, K6BVIU, K6DVIW, K6E1KNA, K6E1KX, K6E1BL, K6N6B, K6GKX, NMVY, N6VZV, NWVVO, W6PMV, WA6LGS, WJ1P, WW6CP, K6SG & KV3H. **K6ZM:** K6WG, WB6MZD, K6DRMN, K2KWM, K6F6NIA, K6BZ & K3BL, K6BZ, N8TR, NW7Q, W1MD, W8KIC, W7TC. **K8CC & JJ1BMB:** JR1HAA, K8GT, K8OW, WB8HJ, WD8S. **K9MK5 & NSHRG:** K1A1DWX & W10HM. **K81SU & K7R:** K83A & K83B, KC7V & K7P, N7MB, N7ZE (JR6EZE). **KG4QD & KG4VN:** KG4W, KG4WB, KG4AB, KG8ZD & W6AXW, KC8ABF. **KH0A:** JA1WSX, JE2PCY, JP1JFC, JF1MIA, KH8/N5LS & NSJA. **KJ3V4 & Others:** KLB/NO7 & WL7CQZ. **KP2/K3MD & N3PVR:** N3NWM.

**L20H:** LU1SHIP, LU9HS, LU1HM, LU3HWE, LU5HF, LU5HD. **L40H:** LU7YS, LU8VC, LU7VCH, LU1TEXU, LU1HOO, LU3HU, LU4HMF, LU9HOA, LU3HNE, LU2HAM, LU3HAK, LU4HTW, LU6HBK, LU9-PN, LU9HQ, LU1HBV, LU5HBR, LU9HBU. **L50V:** LU1VK, LU9VET, LU5VC, **L8W:** LA4DCA, LA5SDA, LA9EEA, LA9SEA. **L1T1:** LU5FHM, LU3FZW, LU1FKR, **L1T5V:** LU3VMS, LU3VED, LU9VI, LU1HPW. Club. **L1UFN:** LU1ND, LU1NAU, LF4NAD, Eduardo, Otto. **LUFGB1 & L1HF:** LU2FFD, LU6FZ, LU6FUQ. **LUD0ZE:** LU6DH, LW1DBA, LW4DYU, LW6DWQ, LW7EIC, LW9EWT. **LY3AV:** LY1CX, LY1CO, LY38P, LY1DA. **L2Z5:** LZ1KD, LZ1JY, LZ1HST, LZ3FR, LZ3DJ, LZ3FM, LZ3FN, LZ4AX. **L29A:** LZ1UK, LZ2LC, LZ2DF, LZ2HE, LZ2J, LZ2PQ, LZ2TX, LZ2UU, Goshu. **M7C:** G3K3K, G3NTM. **M7G:** GOUCS, G0UZF, G0WTD, G0WTR, C1AHM, G3ZRE, G4TZR, G4WJL, G7S1R, G7V00, M1ADC, M7P: 3G6AF, G3UHU, G4PWA, G4TNB. **NOMA:** NOLNO, KOHWE, WA0YFL, KOVM, RD9KQ, KA9IES, N6WLW, KOVAR, WEOF. **N0ZA & K0CL:** K0JK, K0DU, K0A1ZT & K1Z, KA1ZNM, K2AUJ & K2WY, K1P. **N1MD & K2IM:** N1TLN, K1BM, K1ZE, KA1ZNM, K2AUJ & K2WY, K1P. **N2LR & WA1KKM:** N2NU & W2REH, WW7Y, K2W1, N2SS & N2MT. **N3DL & A43JT:** **N4USA:** K1GG, US7CQ, UC7CW. **N5HV & K0EJ:** N6ED & NO6X, W6UGL, K6SYI, K6REX. **N6K:** G0UCL & K6WEQ, W6MD, W6MSB, W6BSY, K6JXO. **N7MO:** WM7R, NY7T, W57V, KH6CJJ, NTSG & K7FD. **N7TX & K7J5:** N8NR & N8BQJ, N9AG, N9LYE & N1ZRD, N9QX & K9E1, W6DGGV. **NE3F & K3AT0:** K3SF, NT3V, K3FP. **NF4J & K4JTE:** K4JTE, K4UB, WA4B, K4CWF. **NH2C:** JG3RPL, JR3RV, JI3ERV, JR70MD, JK3GAD, JH7QJX. **NJ5S & K4TGLA:** N1UCO, NK7U & K770. **K7MK, W7ZRC, N7BZ:** **NM3K & Others:**

**NQ4 & A4ALR:** K4EAI, K4AJN, K4JNY, N4CM, N9HZQ, W1MR, NT4L: K1KY, W4HK, KC40FR, KO6ID. **NX01 & KM0L:** N0BIV, KOVBV, KBOU, KBOVVT, KGOUS, KGOU7, OEST: 0E3GEA, 0E5VWL, 0E5JBL, 0E5KON, 0E5MKM, 0E5CMN, 0E5BN, 0E5ERN, 0E5HO. **OF1AF:** OH1EB, OH1MUR, OH1NOA, OH1HS, OH1XT, OH1HEV. **OH5BM & OH5UO:** OH4JLW, OH5LY. **OH6AW:** OH6EME, OH6UV, OH6MSZ, OH6MW, OH6KSP, **OH6NIO & OH6CS:** OH6KZP, OH6RX, OH7AAC, OH4LYX, OH6LN, OH7LTK, OH7MHL, OH7KD, OH7WV. **OK1KCF:** Club. **OK1KU0:** OK1UG, OK1FPC, OK1HUO. **OK2KJU:** Club. **OK2KOD:** OK2BDI, OK2WAZ, OK2BNX, OK2BZ. **OK5W:** OK1AEZ, OK1CF, OK1WF, OK1WT, OK1JKT, OK1TN, OK1TA, OK1FD, OK1DDO. **OL2A:** OK2PDK, OK2HBY.

(Continued on page 94)

## Results (from page 22)

OK2PEM, OK2JPR. **OL5Q:** OK1HRA, OK1FLC. **DL5T:** OK1KT, OK1VD, OK1NR, OK1TC, OK1DNR, OK1FH, OK1HSK, OK1MUJ.  
**OM3A:** OM3DX, OM7RU, OM7ZZ, OM8AM, OM8AW, OM0WR. **OT7C:** UN4ACA, UN4AJZ, UN4ALT, UN4AMI, UN6MR, UN7UN. **OT7P:** ON4GO, CN4LM, DN4LCW, ONSPV, ON5DC, ON6AH, ON5QR, ON6MH, ON7PC. **OT7T:** DJ4AX, DL2OC, ON4WW, ON4AF2, ON4MA, ON5UK, ON4UN, ON4JO. **OT2EDR:** OZ1VA, OZ5LH, OZ7AAQ. **OZ5W:** OZ1KRF, OZ1FTE, OZ1FTU. **OZ7HAM:** OZ1ETA, OZ1BIZ, OZ1JO. **OZ9KY:** OZ9AR, OZ1FEZ. **P3A:** RA9JX, RA9JR, RA9AM, RVØAR, UN7FZ, UA9MA, UA0ANW, UAØAGI, RZ3TX, UA3TT, UA9YAB. **PA/DLOPPP:** DL8AAE, DL8OBF, DL8OBH. **PA3DWD:** PA3AAV, PA3COR, PA3JHM, PE1LAU. **P14CC:** PB0AIU, PA3BAG, PA3BSQ. **P14TEU:** PA3HCW, PA3GFE, PE1PRG, PE1PER. **P14WAL:** PA0ABM, PE1RNT, PE1PTQ, PD1AEB, PA-985. **P14ZLD:** PA3ECB, PA3GCC, NL8884. **PJ9Q:** W9QG, W7DLQ. **FX2U:** FT2QX, PT2UP, PT2BAT, PT2ADM, PT2RY, PU2CAG, PU2ASF.

**RK10WZ:** RA1OJ, RW1ON. **RK3EWA:** RZ3EM, RZ3EC, RA3EK. **RK4HYT:** Bakhaev, Tararinceva. **RK4WWA:** UA4WA, RW4WA, UA4WAN. **RK9SWF:** RA9ST, UA9FSR. **RN3R:** UA3RAR, UA3SAQ, RA3SI, RIJ3SD, UA3RJ, RA3RFA. **RU4WJ & RW4WR:** RU6LWZ, UA6L0, UA6LV, UR8MA, LT2IW, RV6LNA, RV6LOB, RV6LRLT, UT6Z. **RZ3O:** RW3OC, RW3DNZ, UA3QDX, UA4WIN/3, UA9XFY/3, RN3QO, RN3QY, RU3QW, RX3QP. **RZ4PZL:** Dmitrov, Tischenko, Kulinov. **RZ9AZA:** UA9BA, RA9AB, RA9AQ, RU9AN, RZ9AR, RZ9AZ. **S52FO & S54AA:** S57MKE, S57VMA. **S97A:** S92AT, CT1EAT. **SK6NP:** SM6BUV, SM6GKF, SM6GUD, SM6VUL, SM6VVF, SH6AD, SH6ADG. **SL3ZV:** SM3JLA, SM3QJR. **SM0BGM** & **SM0AIN**, SM8MC. **SM5FQ0 & SM3OSM:** SM3SGP, SM5ACQ, SM5CSS, SM5FUG, SM5IMO, SM5ING, SM5LNE. **SN2B:** PA3EYZ, SP2FAX, SP2UKB, SP2WKB, SP3RBI, SP3RBR, SP8NH, US5WDX. **SN60:** SP6NVK, SP6OPE.

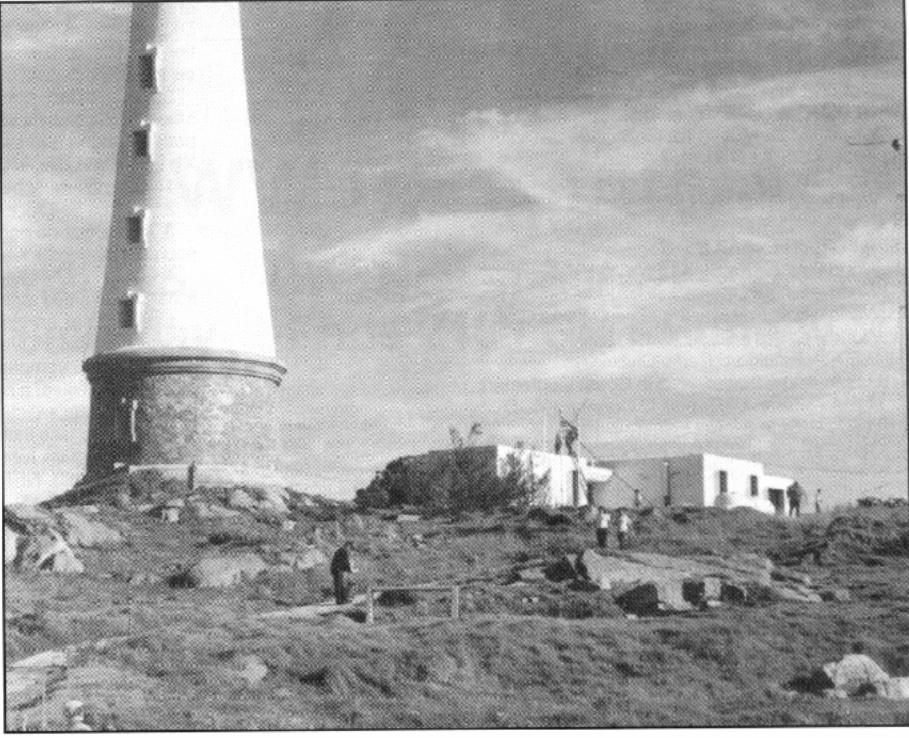
**SP3PLD:** SP3HBF, SP3IBM, SP6HTQ & SP6CT. **SP6KFA:** SP6MLG, SP6-1012WR, SP6-1011WR. **SP9KJU:** SP9MDY, Michal, Damian, Kamil, Kukasz. **SP9KRT:** SP9ADU, SP9ZW, SP9QW, SP9UXL. **SP9PRO:** SP9LJD, SP9PT, DJ0MCZ. **SV1AFA:** SV1CIB, SV1CIF, SV1DPJ, SV1COG, SV1SN, SV3YY, SV1DPF, SV1DPP. **SX2T:** SV2AEI, SV2CWY, SV2BN, SV7CLL. **T70A:** DF6OC, DL2MEH, DL4OCL, DL80BC, IK4TPV, T77WI. **T2AKB:** TA2BB, TA2YA, TA2BW, TA2NC, TA2FC. **TF/AE4FY & KE4HTS. TM1C:** F6PY, F8AKS, F5ITK, F6GWV, F6HMQ, F6CTT, TM2T, F5NOD, F5SHI, F5PPF, F5ROP, F5JJ, F5RHT, F5JUJ, F1AEY. **TM2Y:** F6BEE, H6ARC, F6FGZ, F5SNJ, F5NL, G4BHF, F5MUX. **TM5V:** F5RDX, F5MLJ, F5KEB, F5MFL. **TM8A:** F5RXL, F2VX, F5QZ, F5SSG. **UA2AA & UA2FB:** UA2FC, UA2FC, UA2FX, UA2Z, RA2FA, RN2FA. **UN8LW:** JN9LW, UN7LAN, UN9LFW. **UP0F:** Others. **UR4MWU:** UR5MB, UR5MT, UR5MF, UR-M-56. **UR4PWC:** US-P-272, US-P-273, UT4PZ. **UR4OWW:** UR4OFE, UR5ON. **US3I:** US2IES, US2IMA, US2IMB, JU5IM, UR3IUS. **UT4UWC:** US-U-036, US-U-021, US-U-007. **UT4UWT:** UT5UPN, UT5UDG, US-U-093, US-U-094, US-U-095. **UT7L:** UR4LSB, UR4TLX, UR4LUG, US4LGW. **UO5J:** UT5LGR, DU1JA, UU2JO, UU2JZ, UU3JO, UU4JOX, UU5QX. **UX9Z:** UR5ZOS, UR7ZZ, UT1ZZ. **V31DX:** W2NA, K16IM, KM6K. **VA3CRC:** VE3XL, VA3KA. **VA3SK & VA3MV:** VA3PC, VA3JAK, VA3WTO, VA3RWT, VA3BCR, VE3XKB. **VE2UMS:** VE2FAB, VA2FRU. **VE3HG:** Others. **VE3RM & VE3WB:** VE5SF & VE5CPU, VE5IP. **VE6SV & VE6WQ:** VE6VV, VE6NAP, VE7GAS, P01CY. **VE7UBC:** VE7MJI, VE7LTD, VF7ZCE, VE7TTO, VE7WNA, VE7MDL, VE7CDL. **VK4DZ & VK4CEJ:** VK4KTS. **VP5DX:** AB4IJ, N4KE, NU4Y, W1LR, W3KT. **VK4MZ & VK4MM:** VK4EXA, VK4UW, VK4XQ. **VG7KZC & VF7QK:** W2A2X, N2TX, KE2NL, K2UO. **W2AY/4 & W4YD:** W2XT & W2RD, KE2HG, KB5U, N2UVU, WA2PU, N2OP, KB2VRO. **W2YC & KG2M:** W3GNQ & WR3Z, K3LP, W2T, K3KE. **W3MF & K3PH:** W4NC & N4VKH, N0KTY, W84KCN, K5PK, K4TES, WA4IAM, WB4MSG, K4DRG, KF4ILN, KU4BP. **W4SM & K1E1:** K4DRX, KE4ART, K04JN, N4XFT, WA4FOT, NW6S. **W4ZR & W4FDA:** WR4K, KE4XA, WB4KSP, N4JBK, WA4USA. **W5ROK:** K1GD, K3NT, WA2ZBT, N5TIP, KCSMVE, KK5PK. **W6TRW:** KS4IS, AB6DU, W66K, K6N0W, KDB5WQ, KK6ZQ, K0DI. **W7IG & K7CQ:** N7LT, W7SIR. **W7UB & KC7MXD:** W8Z2 & N8L1, WB3DA. **W9FX & WB9RAS:** W9JA & K9JY, K9PW, KA9FOX, W9QA, W9RM, WEBV. **WA1R:** K1JN, N1RJF, NHRA, KB1LN, KA1RL, KA1VMG, K1GOX. **WB2KHO & N2LDW:** WB4PHW & K04LIF. **WN9Q & K9DAL:** W01N & K1WD. **W3Y & N3JR:** XE2DV & K7LKC, K7AR, K7CR, K6QPS. **XF3/EA3BT & XF3/EA3AOK:** YM3VS, TA3YJ, TA3J. **YN6WW:** JA6WTV, JM6EBU, JM6UAA.

**YTOX:** Ivan, Goran. **YU1AAC:** Club, YU1V. **YU1AV:** Club Operators. **ZL1AA:** ZL1ANJ, YU1UN. **ZPBR:** ZP5AZL, ZP5CGL, CX6VM, ZP5XHM, ZP5WBM, ZP5RPO. **ZW5B:** PY5EG, PY5CC, PY5GU, PY1KN, PY2BW. **ZX0F:** N6KT, N5FA, ZP5JCY. **ZY2HT:** PY2KC, PY2KJ, Tankian.

## Station Operators Multi-Op Multi-Transmitter

**9A1A:** S56A, S5500, S51R, S51D, S57NW, 9A5W, 9A2DQ, 9A2B, 9A2EU, 9A2HW, 9A2R, 9A2TS, 9A3GW, 9A3NR, 9A3SC, 9A3ZA, 9A40M, 9A6W, 9A7DLA, 9A7R, 9A9A. **BPO8:** BV2AD, BV2CI, BV2KI, BV2JH3GCN, BV2P1RVR. **C19DH:** K2NJ, NR2H, VE1AS, VE9BM, VE9D, VE9CX, VE9GJ, VE9JE, VE9WJ, VE9MY, VE9WH, W1VE, W2CG, W2EN, WA2VUY. **C50RCL:** CT1ASU, CT2GK, CT5GFJ. **CW5R:** CX6BW, CX6BX. **DK5EZ & DG1E8L:** DG3EX, DH4EAQ, DK1WJ, DK4TP, DK8EY, DL1EH, DL1EJ, DL3EBX, DL4EB4, DL6EAQ, DL8EBW, DL9JT. **E22AAA:** HS1CBB, HS1CKC, E20HHK, E20ACU, HS0ZCQ, HS0UJR3XMB, E21IC, HS9HQD/1. **EA3AJY & EA3CCN:** EA3CKX, EA3EJ, EA3ESJ, EA3EZD. **EA4AHW & EA4ABW:** EB4HAO. **EA4RCT:** Julian, Eduardo, Manolo, Luis, Esther, Jacobo, Paco, Isidro, Pilar, Jose, Angel.

**EA4URE:** EA4DFF, EA4AEB, EA4AJB, EA4BT, EA4RPJ, FA4CT, EA4ECF, EA4KA, EA5DY, EA5GRC, EA7JB, EA4EKR, EA4AWF, EB4EFJ, EB4AKI. **EA5EZM & EA5BM:** EA5ANL. **ED7VG:** EA7HY, EA7ATX, EC7ADS, EC7AHH. **FK0GN & FK0HC:** FK0FJ. **FK0GBCN:** K8AE, KG8CNO, N8CC, W8MC. **GM7V:** GM3WQJ, GM4FD, GM4XY, VE7NS, JA6IDJ, GWØGEI, GM4BAP, GM4CXM, G4FAM, GM4TXX, GM2NAI, GM4AFF. **GW7K:** GWØANA, GWØCP, GWØBVJ, GW4GS, GW4MAD, GW4MDG, GW4LFV. **H80/HB9AOA:** DF4J, DL2DAW, DL8EAQ, HB9CRV, DJ2YE. **HR3/DL7DF:** DJ6T, DL2RUM, DL7BO.



The oceanside QTH of CW5R.

DL7DF, DL8FR. **J3A:** N6LL, W6SR, NOAT, W8KKF, KC5AK, KC5DJ, NH7C. **J4Z2H:** JH3PRR, JH3KIV, JI3OPA, JM3XKG, JH4IFF, JH4NMT, J41SF, JF4FUF, JG4CLV. **J46ZPR:** JH6JSR, JH6SQI, JR6CKX, JR6BSC, JE6LHM, JH6ETS. **J47YRR:** JA7FDY, JA7JUD, JA7LB, JA7MOM, JA7MSQ, JA7OZW, JH7VHZ, JR7LVA, JJ1XGF, J01NBV, JE8KKM. **JH57JS:** JA5BJC, JA5FDJ, JA5JCC, JA5THU, JH5RXS, JR5JQ, JR5PDZ, JR5VHU.

**JN1YUU:** Keiko Yamada, Moe Iwakura, Tomoko Ouchi, Keiko Ogawara, Saeko Kawase, Saki Yokoyama, Minako Tabuse, Yumi Onoaka, Saon Shizu. **J01YA0:** JA1ATK, JA1PEJ, JA1QJN, JM1NKT, JF1FKK. **K0UE & K0MF:** KB0NUY. **K1GW & K1ART:** K1KI & K1CC, K1PI, K1RM, KM1P, K2QK, WA2GO. **K1KP & N1RDO:** K1OA, K1EP, K1NU & K1T1, KB1WV, NT2X, AB2EC, KE1FO, NO2T, WA1ZAM, WR2I. **K1RO & K1ZZ:** KB1GW. **K1RX & KF1V:** KIEPJ, K1OZ, WA1T, AIA1LN. **K2KV & WM2V:** N2GA, K2D0, N2JX. **K2NG & K2WK:** N2BIM, KU2M. **K2WB & K2DKS:** K2WS & K2B2U. **K3ANS & WF3H:** N3TU, N2KJIM, K3YD, W3LR, W0RSJ3, N3VJA, N3IYX. **K3BSA:** K3JLK, K3ALEK, N3NMP, K3LR & N3RA, K3UA, K3GL, K3CX, N3RV, KB3AFT, N3BJ, KA3JWY, ND8L, W3VJ, K3JT. **K7FR & Others:** K8WT & N8VCF, KVRS, N8UBH, N8YVS, K7CI, K8AJH, K98FHW, N8FMD, N8OKV, KC8BH, KB0WY & N0NSV. **KC1XX & K1C1:** AC1C, N1R, K1EA, K1LZ, K1BAWE, K1ZM, T93M, KM3T, K5ZD. **KB1H & A41CE:** K1EBY, N1BU, NB1U. **KH7R & W6HL:** AH7R, KH6U, KH7U, WH6H, WI1G, KHL7, KL2A, KH6ND, KH6TO, NH6XO, AH6LY, AH6OY, AH6OZ, KH6HK, WH6XH, KH7M. **K06N:** N5RO, K6AW, KX7M, NI6S, W6RGG, AE0M. **KV1W & N6RFM:** W1C5M, K1MB0. **L70FM (LU4FM):** LU1FA, LU1FAC, LU1FQJ, LU1FWU, LU1FZ, LU2BRG, LU2FYU, LU4FIP, LU4FGV, LU4FPZ, LU5FVY, LU6FEC, LU6FUQ, LU8FPT, LU9AUJ, LU9FQC, LU9FDG, LU9FQT. **LY7A:** LY3NIT, LY20Z, LY4AA, LY2UF, LY2ZK, LYR-728. **N2RM & N2NT:** N2AA, N7BG, N2NC, W2R0, N2L, KQ2M, K2BM. **N3BN8 & W3EE:** W3CTR. **N3NS & K3IPK:** N3RU & N3ISH, KA3J01. **N4ZC & A4AZZ:** K4HA, K4MA, K4ZA, KU4V, W4WN, W4WNT, WA4UNZ, N5ZC, WD4BTF, 5B4AFM.

**N6AW & W6BA:** W6KP, W6UL, AB6DD, KHM8, KF6H, N6R. **OH2HE & OH1J:** OH2BTI, OH2BV1, OH2BZY, OH2IW, OH2J, OH2JTE, OH2XX, OH6CT, OH6DD, OH7BX, OH7JR, OH8XX, LY1DS. **OK10KE:** OK1DUT, OK1FUT, OK1VBA, OK1UTS, OK1FHL. **OT7A:** DL3EBM, DL3KOD, DL4XS, ON1AEI, ON1AFF, ON1AWB, ON1CIM, ON1DAL, ON1DAK, ON1DEL, ON1DUJ, ON1DLA, ON1DLH, ON1GL, ON2BDD, ON4AID, ON4AIL, ON4AWJ, ON4AIZ, ON4ALW, ON4AML, ON4ASB, ON4AII, ON4AVO, ON4AWH, ON4AWU, ON4AWV, ON4BAG, ON4BWW, ON4B1, ON4C4S, ON4CAT, ON4CBP, ON4CCL, ON4CDC, ON4CDE, ON4CFQ, ON4DB, ON4F4, ON4VT, ON5CD, ON5CH, ON5G, ON5OT, ON5RW, ON5UM, ON5AA, ON6DN, ON6HZ, ON6PU, ON6RW, ON7AW, ON7DR, ON7GB, ON7HU, ON7NQ, ON7VU, ONL6661, PA3EBT, PA3EZL. **PZ9AS & AB6B:** N6AA, N6TW, N6Z, W6XD.

**P14COM:** PA3B3P, PA3BWD, PA3CAL, PA3ERC, PA3EW, PA3GBQ, DF8MQ/PA, DL5NEJ, DL2LSO, ON4BDS, PA3DMH. **PJ9B:** K1DG, K2SB, KB2XZ, N3BB, N3ED, K3EST, WA3LRO, W3UW, N4RV, N7ZZ. **RK9AZZ:** Club. **RW6AWT:** R6BNB, U6LPL, R6NMM, R46AX, R6VY, RAGGY, UA6AAY, RV6VY, RX6BA, RW6Y, RU6AB, R26AU, UA6ADC, RW6ADA. **SP5ZCC:** SP5UAF, SP5STAT, SP5MBO, SO5BPT, SO5BPM, SO5EBL, SO5EJB, SO5HAB, 3Z5AAN, SWL-Arthur, SWL-Bob. **SP5ZK:** SP5UAF, SP5VNN, SP5VY. **TK5NN & TK5EP:** TK5MH, TK1BL, DL4RJ, DJ1OJ, DL4GBA, DL4MDO, DK6WQ, DK4VW, DK8DF, DL4MCF, DL1MAJ, DL6RAI, DL3MAA. **TM5S:** F5ABL, F5OKL, F5CWU, F6CVM, F1RIQ, F1SXW, F-16675. Sylvain, Christophe. **TX8KAB:**



KP2/K3MD (left to right): Becky, N3NWM, N3PUR, and K3MD.

FK8HG, FK8AH, FK8FS, FK8FK, FK8GY, FK8VHM, FK8FU, FK1TV, FK1UL, FK1US, FK1UT, FK1UZ. **V26B:** AB2E, KA2AEV, N2TK, W2UDT, N2SR, W3FV, N5NJ, WT3Q, K3MM, N3OC, WX8B.

**VE5R:** VE5FD, VE5FN, VE5WI, VE6BBP, VE6EZ, VE6FW, VE6FI, VE6LB, VE6AQ, VE6PY, VE6BIC, VE6NA, VE6AQ. **VP5:** N2VW, W2OF, W2OP. **WB1AH9 & NE9U:** NOKK, AA0D, AA0Z, K0HB, K0BVR, K0TG, N9THC, KT0R, **WB0GJ & W800:** K0ZV, K0CZC, N0YPC, KB0NLC. **W1FJ & N1BB:** K1XM, K1CK, W1K, NB1B, W1T, W1A1GOC. **W1OK & Others:** **W2AX & K2LE:** VE1XT, VE1AL, K2SX, N2UN, N2FF, W2UD. **W2UB & A2FK:** N2HXK. **W3EA & W3FZ:** K2MMW, WU3M, N3IDP, K2T, K1RZ, K1RZ, WM2, ND3A, ND3F, N3GB, A13M, K3NA, K3RA, K4W, K5G0, N5OKR, G4PQ, OH2MM, ON7ZV. **W3PP & N3X3:** N3WY, KW3Z, KE3Z, N3WDL. **W4MYA & AD4TS:** WA4DAI, K4DJKY, N4EHJ, AD4TS, WU4G, K4CAF, K54R, AC4OB, N4ZJ, KF4QQY, KF4SPT, Louise. **W6GEN & K6XC:** W6AQ, W6ORD, K17YX. **W7MMO & WT9U:** K17YX.

**WP2:** W3CF, K3MOH, Murphy. **WS2U & NK2H:** N2HR, AA2E0, AA2MU, N2BC, N3YKF, N2FU, WE2K. **WS4F & AE6E:** K3TD, YB3ZBZ: YD3LY, YC3LWN, YD3LJN, YD3LJN, YD3WYM, YB3LEM, YB3KD. **YD9BFV:** YO9IF. **ZM2K:** ZL2DX, ZL2AF, ZL1CN, ZL2AMI, ZL1AZE, ZL1AXG, ZL2MF, ZL2IC, ZL2IR, ZL2BPL, ZL2BSJ. **ZM7A:** ZL2AL, ZL2ST, ZL2HU, ZL2TT, ZL2RR, ZL2GI, ZL2LF.

Number groups after call letters denote following: Band (A = all), Final Score, Number of QSOs, Zones, and Countries. An asterisk (\*) before a call indicates low power. Certificate winners are listed in boldface. (All country terminology reflects the DXCC list at the time of the contest.)

## SSB RESULTS SINGLE OPERATOR NORTH AMERICA

### UNITED STATES

K5ZD/1 A 5,494,655 3137 134 501

(Opr. W2SC)

N6BV/1 " 4,057,986 2584 125 448

W1WEF " 2,415,943 1753 122 407

K5MA/1 " 1,492,164 1238 107 351

W1TE " 1,012,239 917 94 329

KD1YN " 985,214 865 109 337

K2TE/1 " 840,867 872 91 290

K1DWQ " 815,022 797 91 296

W1KRS " 810,661 775 90 289

AK1N " 649,971 651 90 301

W1RY " 643,264 642 88 279

K1CN " 567,084 638 72 242

K1YT " 544,806 571 96 258

W1OP " 465,443 525 90 233

K1LD " 463,143 623 67 196

K1BV " 343,125 544 53 172

N1API " 338,599 510 55 196

KT1M " 319,176 494 67 181

N1HQU " 289,278 399 73 218

K1KNO " 247,020 458 57 173

KK1DX " 182,608 340 59 143

KA1EKR " 134,532 256 60 162

N1DD " 110,982 254 49 110

K1LU " 92,796 282 42 106

W1FV " 25,009 109 28 61

K1DX " 7,072 64 25 43

WR1P " 375 10 7 8

WA1MKS " 39,168 186 26 70

K1VV " 7,497 120 13 36

WA1S A 1,017,978 889 101 320

WS1A " 696,850 739 86 276

K1HT " 526,400 594 81 239

N1TM " 445,424 595 72 215

AA1EY " 329,896 440 80 221

W1EQ " 299,200 436 67 205

WF1L " 262,422 417 66 173

W1ZZ " 205,920 308 76 184

W1XF " 195,264 371 50 142

K1TW " 125,479 260 50 129

N1SNB " 94,484 242 43 115

AA1QD " 67,639 194 39 104

N3KCJ/1 " 59,292 178 34 88

KQ1F " 52,038 146 38 88

N1XF " 28,809 150 30 67

KD1O " 14,193 99 15 42

K1MV " 1,886 30 17 24

W3EP/1 " 35,062 181 22 72

WA1FC/1 " 99,015 330 28 95

K1VSJ " 84,700 270 29 92

K1VUT " 14,161,280 458 26 102

WB2QVA/1 " 85,470 306 23 88

K1VR " 60,282 211 23 79

AB1U " 16,744 107 13 43

\*W1MK 3.7 3,485 45 13 28

K2DM A 2,138,030 1677 105 365

W6XR/2 " 1,756,664 1440 128 380

KE2VB " 1,056,780 1008 99 313

N2MR " 977,976 886 94 314

N2LT " 901,250 945 89 261

N2ED " 889,326 846 88 295

WA2NHA " 766,363 876 84 269

KG2BN " 554,166 666 83 223

WB2YQH " 545,580 627 75 240

K2FR " 439,992 584 78 213

W2BE " 379,472 565 73 223

W2HCA " 377,300 531 68 207

K2CS " 364,620 520 81 214

W2YK " 270,072 419 69 195

N2PKN " 245,765 466 55 192

K2MP " 222,548 353 66 170

W2GDJ " 221,216 395 62 161

WR2V " 149,292 312 51 147

K2JLA " 120,744 262 46 126

W2TZ " 109,641 248 50 111

W2OMV " 106,110 248 41 121

K2JF " 74,430 229 55 135

N2CK " 31,428 134 32 76

K2MGA " 28,080 122 19 61

K2FF " 26,728 99 32 72

K2BLIF " 19,110 90 26 52

WA2CNV " 17,370 74 32 58

K27P " 15,840 102 34 62

K2DX " 12,782 79 29 48

W2OP " 10,608 61 26 52

W2EZ " 9,576 60 28 44

N2LE3 " 5,757 42 24 33

W2VU " 1,215 19 12 15

NA2X 21 128,271 322 31 112

WB2OSM 14 121,920 461 25 95	AF4RG " 319,308 495 58 188	*KF4AXT " 11,070 86 19 35	W6ZQ " 24,570 130 25 45
KC2Q " 55,358 206 24 77	N4CW " 293,229 405 50 99	*KE4HXU " 10,716 90 10 38	<b>N6WR</b> 14 66,528 253 26 70
N2PT " 16,445 114 16 49	N4GN " 262,508 356 84 208	*KB4NPJ " 7,476 85 13 29	W6OK " 60,900 251 27 60
KB2FWP " 5,175 42 13 32	W4NY " 254,774 419 63 176	*K4SN 21 143,112 403 29 105	<b>W7CB/6</b> 7 40,400 185 27 53
<b>K2WE</b> 7 64,698 200 28 95	W2YE/4 " 241,664 351 68 188	*K4WW " 73,736 271 23 81	W6BCQ " 36,135 137 29 70
N2PP " 62,928 249 25 89	A4E4R0 " 217,621 238 80 189	*K4PC " 61,040 231 25 76	N5HY " 13,260 95 20 40
K2WJ " 45,100 178 22 78	W3KCSX/4 " 189,036 316 64 172	*W84UBD " 57,267 200 25 76	<b>W6RJ</b> 3.7 121,068 556 31 77
WQ2M " 27,090 330 27 102	K4CDWT " 183,407 339 52 145	*K3ES/4 " 13,482 84 20 43	<b>N2KK/6</b> " 96,253 375 30 71
<b>W2LU</b> 3.7 17,181 143 19 50	W4YV " 181,968 584 26 110	*W4JIK " 2,336 30 13 19	N6BU " 4,608 100 57 31
<b>W2VO</b> 1.8 6,783 85 14 37	W2D4K " 157,586 344 60 149	*N4MO 14 187,172 482 31 115	K6ZZ 1.8 945 25 9 12
<b>KN21</b> " 3,772 95 11 30	KN4FG " 154,479 328 64 149	*W4DCNZ " 88,058 311 25 98	<b>W7ABNM/5</b> A 655,308 755 107 220
<b>K2AZ</b> A 976,740 855 99 347	K4LQ " 141,226 238 75 166	*N3TG/4 " 10,790 81 17 44	*WN6K " 435,011 715 83 150
<b>K2CDJ</b> " 446,462 499 100 279	N4Z " 132,132 325 43 113	<b>KW4T</b> 7 42,016 164 23 78	*K6UM " 209,253 361 80 145
WB2ZTH " 394,368 467 83 229	W4UEA " 94,514 240 51 106	*W4QDM " 10,790 80 17 48	*NGJM " 159,767 321 74 123
N4AQ " 348,132 525 74 " 94	K4FZ " 84,177 225 44 97	*K6GQW " 40,544 148 45 67	*WB6NFO " 134,134 311 58 96
N4BS " 391,068 312 50 179	W4UW " 82,472 182 53 116	*K6EP " 99,144 233 67 95	K6BUM " 122,282 340 81 143
N4RMZ " 169,926 292 66 157	N2BT/4 " 79,032 175 54 124	<b>A5ET</b> " 894,456 923 103 266	N6NF " 103,635 270 53 88
K2T2 " 166,057 284 53 158	W4NR " 76,889 166 63 155	<b>K5DX</b> " 833,382 824 110 304	K6BZ " 1,066,965 1111 108 307
K2S2 " 166,057 284 53 158	N4XR " 71,000 181 44 98	*W6PLJ " 81,224 217 60 82	(opr. N5LZ)
K1PY/2 " 114,589 278 44 119	N4EK " 35,814 381 35 59	*W6ZL " 71,919 207 48 83	
KB2NOW " 109,620 223 53 136	K4ATEU " 48,396 162 25 70	*K6TV " 65,688 188 53 85	
W2SSB " 54,460 142 45 95	W2VY/4 " 44,460 138 37 93	*K6EF0 " 51,306 202 43 59	
W2MKW " 41,268 137 39 75	W4IF " 43,290 138 30 81	*K6EFO " 338,720 449 86 206	
K2DE " 39,984 130 40 96	K4VSG " 42,408 117 40 84	*K6GP " 48,614 166 49 60	
N2LQO " 36,960 135 36 74	W4L " 41,724 127 38 94	*K6GW " 328,799 475 85 192	
W3FH/2 " 30,690 109 33 77	W4LZ " 21,004 85 35 61	*K5YAA " 302,512 482 75 184	
A2E2 " 29,400 115 31 69	W4AMU " 20,774 79 35 59	*K5Q " 538,076 688 82 226	
KC2TA " 23,067 88 32 67	W4OG " 31,753 110 39 74	*K5K " 419,752 568 85 199	
K2FYX " 22,816 93 27 65	W4PA " 31,552 112 41 75	*K5KNO " 112,541 376 42 101	
K2DL " 10,877 64 24 44	K4NR " 29,952 122 29 67	*W5AAH " 103,448 236 67 126	
N2T2W " 6,270 42 19 38	N4K " 27,650 100 42 80	*K5KMM " 105,348 232 55 105	
W4UL " 5,559 45 20 31	N4KRN " 23,210 105 40 70	*K5L " 88,452 223 57 105	
W4LFO " 21,504 85 35 61	W4MS " 21,040 105 35 75	*K5M " 77,872 251 38 86	
W4AMSU " 20,774 79 35 59	N4K " 20,774 79 35 59	*K5N " 68,376 195 39 93	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K5O " 55,783 174 37 120	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K5P " 112,541 376 42 101	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K5Q " 39,152 140 39 59	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K5R " 101,352 233 54 100	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K5S " 88,452 223 57 105	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K5T " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K5U " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K5V " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K5W " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K5X " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K5Y " 77,872 251 38 86	
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N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K6E " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K6F " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K6G " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K6H " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K6I " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K6J " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K6K " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K6L " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K6M " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K6N " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K6O " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K6P " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K6Q " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K6R " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K6S " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K6T " 77,872 251 38 86	
N4AA " 15,431 38 55 54	W4P " 20,774 79 35 59	*K6U " 77,872 251 38 86	
N4AA			

*K7ED	"	43,582	220	23	54	*W9JOO	"	31,025	139	22	63	VE3OTL	"	131,112	566	23	85	V44NK	3.7	26,352	353	11	25	5X4F	28	1,164,728	2455	33	131											
*KJ7WY	"	16,443	105	23	40	(opr. WA6RJY)	"	WD9FEN	"	9,360	117	21	59	VX3BY	3.7	208,872	1121	26	82	5X1T	21	1,780,200	3389	35	145															
*AA7UN	14	119,125	361	28	97	"	W9IXX	"	4,816	44	14	29	*VE3FU	A	966,026	1093	94	277	U.S. VIRGIN ISLANDS						ZAMBIA															
*W7FP	"	113,152	331	29	98	KG0ZI	A	2,418,327	1766	134	367	"	641,067	1068	80	187	*VA3NR	"	222,667	462	64	163	*NP2Q	A	913,344	2387	69	132	ZIMBABWE											
*KG7ZR	"	36,100	186	28	48	W0TM	"	526,854	662	95	221	"	153,220	417	49	139	*VE3BUC	"	134,334	339	48	105	ST. CHRISTOPHER & NEVIS						AFRICA											
*KC5AC/7	"	3,198	59	13	13	K0MX	"	458,337	562	91	232	"	27,500	388	23	27	*VE3TDG	"	(opr. VA3SYL)				V47KP	A	3,109,616	3466	111	313	AFRICAN ITALY											
K8LN	A	1,216,626	1098	100	322	W0GG	"	446,072	622	92	204	(opr. VA3SYL)					IG9STG	14	1,104,204	2300	36	131	IG9GSF	7	1,249,236	2517	35	137	IG9EQO	3.7	228,047	850	20	77	ASIAN ARMENIA					
W9LT/8	"	1,189,850	1033	108	341	W0ID	"	346,804	461	83	91	*VA3IX	"	24,072	151	16	52	(*pr. VA3JY)						9V4NK	3.7	26,352	353	11	25	EK8WW	A	169,000	448	40	90	ZAMBIA				
W8KX	"	509,400	508	90	270	K0MP	"	219,123	362	86	162	*VD3JFF	"	15,200	93	29	51	(*pr. VA3JY)						9J2FR	A	1,941,457	1963	88	249	ZIMBABWE										
KE8GG	"	469,456	605	70	226	K9WIE/Ø	"	200,385	356	62	157	*VE3OIL	"	4,588	85	14	17	(*pr. VA3JY)						Z2/DF3XZ	A	436,254	634	70	168	ASIA										
K2UOP/3	"	467,025	542	84	241	K0GAS	"	191,490	375	77	138	*VE3ST	"	2,960	28	15	25	(*pr. VA3JY)						5X4F	28	1,164,728	2455	33	131	ASIA										
W6JY	"	334,554	518	74	200	W0TT	"	103,878	212	69	130	*VE3XN	28	24,698	187	15	38	(*pr. VA3JY)						5X1T	21	1,780,200	3389	35	145	ZAMBIA										
W6UHP	"	256,360	439	55	166	W0MW	"	100,085	220	56	129	*VE3HX	"	17,289	131	13	38	(*pr. VA3JY)						5X1T	21	1,780,200	3389	35	145	ZIMBABWE										
N8CN	"	215,550	389	61	164	W0PPF	"	90,610	202	49	121	*VE3ZJ	14	84,376	321	21	85	(*pr. VA3JY)						5X1T	21	1,780,200	3389	35	145	ASIA										
AA8RK	"	144,695	278	64	151	W0BD	"	67,048	188	39	97	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ASIA																	
W8BD	"	143,584	281	66	158	W0YA	"	62,100	198	44	91	(*pr. VA3JY)					5X1T	21	1,780,200	3389	35	145	ZAMBIA																	
N8NX	"	123,832	250	58	126	W0BIEL	"	58,520	161	43	97	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZIMBABWE																	
WB8STO	"	85,800	243	39	111	K0NL	"	30,488	114	42	61	(*pr. VA3JY)					5X1T	21	1,780,200	3389	35	145	ASIA																	
KC8KE	"	84,373	220	41	98	K0KSS	28	43,055	244	20	59	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
WD8SDL	"	75,317	195	50	117	N0NR	21	21,708	151	16	38	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZIMBABWE																	
WT8P	"	69,930	238	31	101	N0RQ	21	287,573	765	31	112	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ASIA																	
W8ILC/M	"	51,051	136	48	95	K0KE	"	250,756	670	33	106	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
N8TC	"	7,554	55	19	43	W0OSK	"	27,920	135	23	57	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZIMBABWE																	
WA8RSA	"	4,187	78	25	54	K0KX	14	43,760	916	33	140	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ASIA																	
W8CO	28	14,322	101	19	43	W0UN	"	315,392	905	35	119	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
K3ZJ/B	21	462,880	1053	33	127	KV0Q	7	136,686	450	30	84	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZIMBABWE																	
W8JGU	"	146,228	374	29	110	K0ZA	1.8	780	16	8	12	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ASIA																	
N8EXS	"	41,968	191	21	65	W0RXL	"	240	12	6	6	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
K8UC	"	18,800	141	22	58	K0KDX	"	41,000	128	46	88	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZIMBABWE																	
K8DX	14	698,828	1546	37	141	K0C8W	A	560,058	677	93	254	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
W8TWA	"	218,080	548	33	112	K0A9WWT	"	186,065	388	60	127	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
W8UD	"	170,553	465	31	108	K0EUI	"	150,981	317	50	127	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
W8SJU	"	74,865	258	26	79	K0ZOC	"	113,240	259	62	128	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
W8UVZ	3.7	19,544	182	13	43	K0KOF	"	102,850	239	53	134	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
K8MK	1.8	20,605	378	17	48	W0RDW/Ø	"	75,047	193	55	96	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
*KB8FLY	A	171,784	363	54	143	W0ADCB	"	55,554	159	45	96	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
K8FC	"	53,392	153	44	98	K0A9ZPP	"	30,411	127	33	60	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
AF8C	"	58,817	175	39	84	K0WAA	"	16,799	103	44	63	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
*N8AA	"	48,514	146	48	79	K0E0ID	"	7,100	70	16	34	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
*K8VUS	"	21,600	96	33	57	K0AMO	28	20,126	137	17	41	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
W8IDM	"	5,100	40	18	32	K0AH	7	26,640	135	26	64	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
*N8FWA	28	21,762	164	14	40	K0VH	"	10,000	120	20	124	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
*KE8NH	"	17,864	114	19	39	K0VH	"	30,411	127	33	60	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
*K0C8ENM	"	3,955	51	12	23	K0VH	"	186,065	388	60	127	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
*KB8IBS	21	108,585	320	27	99	K0K7F	"	15,275	137	22	25	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
*KB8KMM	21	96,158	282	30	103	K0K7F	"	3,937	54	16	15	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
*KB9KMM	"	48,747	220	23	78	K0K7F	14	1,638	35	10	11	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
*KB9KMM	"	31,574	213	22	55	K0K7F	"	2,14,360	369	67	183	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
*K8ME	"	4,536	51	10	26	K0K7F	"	2,14,360	369	67	183	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
*AA8UP	14	3,478	37	9	25	K0K7F	"	2,14,360	369	67	183	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
ALASKA						K0VH	"	104,246	629	23	71	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
BARBADOS						K0VH	"	104,246	629	23	71	(*pr. VA3JY)					5X4F	28	1,164,728	2455	33	131	ZAMBIA																	
BELIZE																																								

JM1XCW	"	486,152	639	93	175	JJA2BLJ	"	31,654	140	44	75	JJA2GAL	"	22,420	113	31	45	JJA2HOK	"	27,962	142	28	54	
JR1LEV	"	144,632	288	64	115	JJA2HOK	"	22,420	113	31	45	JJA2HOK	"	3,604	43	18	16	JL7GPQ	"	3,604	43	18	16	
JA1AQW	"	134,640	313	56	109	JH2JJC	"	7,645	61	23	32	JH2JJC	"	2,124	25	16	20	JB2TKX	"	36,750	191	27	48	
JH1CTV	"	88,440	250	54	80	JH2TKX	"	2,124	25	16	20	JH2TKX	"	3,116	35	18	23	JR2TRC	"	408	10	8	9	
JJ1VEZ	"	22,595	110	15	27	JJA2YBZ	"	28	36,750	191	27	48	JJA2YBZ	"	326,886	937	35	94	JF2WXS	"	209	7	5	6
JJ1JRH	"	21,840	86	37	54	JF2WXS	"	209	7	5	6	JF2WXS	"	7,602	80	16	26	JF2PKB	"	7,602	80	16	26	
JS1KQQ	28	3,315	38	18	21	JF2PKB	"	7,602	80	16	26	JF2PKB	"	2,236	42	14	12	JF2PKB	"	2,236	42	14	12	
J71ABD	21	1,204	23	11	17	JF2PKB	"	2,236	42	14	12	JF2PKB	"	2,200	35	10	8	JF2PKB	"	2,200	35	10	8	
(Opr. WA6URY)						JJA2ZIA	"	6,908	71	18	26	JJA2ZIA	"	7,602	80	16	26	JK8HOS	"	21	714	15	10	11
JH1RFM	7	50,388	248	31	71	JK8HOS	"	7,602	80	16	26	JK8HOS	"	100	6	5	5	JK8FRL	"	100	6	5	5	
JH1AEP	3.7	22,101	199	20	33	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JH2WHS	"	1,120	24	7	13	
*JE1LFX	A	603,450	807	95	175	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	
*JJ1VYN	"	501,500	654	105	190	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
*JS1YON	"	333,074	567	93	166	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
JQ1BVI	"	332,952	557	84	177	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
JF1SOC	"	272,699	455	87	152	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
*JL4IOU	"	228,620	406	89	141	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
JH1UUT	"	192,236	379	66	121	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
*JA1GYO	"	169,422	338	63	124	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
*JE1UFF	"	127,673	314	56	105	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
JL7PVR/1	"	119,460	254	74	107	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
JG1TVK	"	110,815	229	64	121	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
JK1ASO	"	98,778	236	69	94	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
JR1MRG	"	97,674	277	55	91	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
*JM1NOQ	"	88,480	200	63	95	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
J1H1FY	"	86,112	219	64	92	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
*JF1RMM	"	58,650	165	57	81	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
JH5CZY/1	"	57,031	223	41	66	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
*JP1SRG	"	46,224	158	46	61	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
*JE1HZX	"	44,712	148	39	69	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
JH1RMH	"	17,301	96	28	45	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
*JA1AB	"	15,911	159	41	53	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
*JA1XPU	"	15,394	89	35	51	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
*JA1MQS	"	15,326	72	33	46	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
*JA1ANA	"	11,844	55	30	64	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
*JA1STY	"	11,256	55	30	37	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
JG3NKP/1	"	11,036	58	22	40	JM2BHI	"	1,120	24	7	13	JM2BHI	"	667	14	10	13	JM2BHI	"	1,120	24	7	13	
*JP1PQD	"	9,882	60	31	30	JH4UYB	A	3,146,862	2279	141	357	JH4UYB	A	3,146,862	2279	141	357	JH4UYB	"	10,300	60	31	30	
JJA1XUY	"	9,027	59	25	34	JH4ADK	"	706,318	860	106	236	JH4ADK	"	706,318	860	106	236	JH4ADK	"	706,318	860	106	236	
*T7K4XV	"	7,696	60	23	29	JH4ESR	"	149,328	313	69	114	JH4ESR	"	149,328	313	69	114	JH4ESR	"	149,328	313	69	114	
*JR3PZW/1	"	7,316	47	23	39	JH4DHN	"	14,833	63	33	58	JH4DHN	"	14,833	63	33	58	JH4DHN	"	14,833	63	33	58	
*7M1QYH	"	5,000	50	18	22	JH4AKR	"	9,600	83	18	30	JH4AKR	"	9,600	83	18	30	JH4AKR	"	9,600	83	18	30	
*JJ1NUJ	"	4,346	48	16	25	JH4FEU	A	674,895	1622	38	122	JH4FEU	A	674,895	1622	38	122	JH4FEU	"	16,240	89	16	25	
JH1SWD	"	2,035	21	16	21	JH4JNG	"	3,074	38	34	22	JH4JNG	"	3,074	38	34	22	JH4JNG	"	3,074	38	34	22	
*7N2FU	"	1,904	42	10	17	JH4CVG	B	70,686	276	33	69	JH4CVG	B	70,686	276	33	69	JH4CVG	"	10,240	89	16	25	
*7K2VPT	"	1,425	24	13	12	JH4JTP	"	20,894	147	22	40	JH4JTP	"	20,894	147	22	40	JH4JTP	"	20,894	147	22	40	
*J1AEIS	"	1,368	15	9	8	JH4CXX	"	2,730	41	13	17	JH4CXX	"	2,730	41	13	17	JH4CXX	"	2,730	41	13	17	
JAT1MYW	28	25,674	158	25	41	JH4AQR	"	2,448	28	13	21	JH4AQR	"	2,448	28	13	21	JH4AQR	"	2,448	28	13	21	
*JH1CML	"	24,254	154	26	41	JH4E4TH	"	1,647	21	11	16	JH4E4TH	"	1,647	21	11	16	JH4E4TH	"	1,647	21	11	16	
*JA1JCD	"	19,941	134	26	43	JH4VSP	B	51,982	205	28	66	JH4VSP	B	51,982	205	28	66	JH4VSP	"	16,240	89	16	25	
*JA1AQZ	"	18,150	106	26	40	JH4VPA	"	11,523	63	25	44	JH4VPA	"	11,523	63	25	44	JH4VPA	"	11,523	63	25	44	
*JA1AAAT	"	16,298	111	22	36	JH4DBT	"	30,408	148	27	57	JH4DBT	"	30,408	148	27	57	JH4DBT	"	30,408	148	27	57	
*JS1UMQ	"	9,016	72	22	34	JH4JJI	"	10,584	88	16	33	JH4JJI	"	10,584	88	16	33	JH4JJI	"	10,584	88	16	33	
*JL1MWI	"	22,470	281	30	60	JH5CXF	"	136,864	330	67	115	JH5CXF	"	136,864	330	67	115	JH5CXF	"	136,864	330	67	115	
*7K2GNK	"	15,447	111	19	38	JH5PO	B	897	19	9	14	JH5PO	B	897	19	9	14	JH5PO	"	10,240	89	16	25	
*7K2GMU	"	8,370	82	16	29	JH5FCY	"	5,474	46	19	27	JH5FCY	"	5,474	46	19	27	JH5FCY	"	5,474	46	19	27	
*7K1E0G	"	7,824	71	18	30	JH5TXA	A	6,174	65	16	26	JH5TXA	A	6,174	65	16	26	JH5TXA	"	16,240	89	16	25	
*JN12HJ	"	4,823	21	7	13	JH6EDD	"	8,250	64	20	35	JH6EDD	"	8,250	64	20	35	JH6EDD	"	8,250	64	20	35	
(*Op. JJ1JHI)						JH6TYG	"	20,740	147	22	39	JH6TYG	"	20,740	147	22	39	JH6TYG	"	20,740	147	22	39	
*JH6RTF/121	275,719	822	36	102	JH5VWT	"	1,398	214	32	71	JH5VWT	"	1,398	214	32	71	JH5VWT	"	1,398	214	32	71		
*JF1LLT	21	165,211	62	31	78	JH5VWT	"	18,400	99	22	38	JH5VWT	"	18,400	99	22	38	JH5VWT	"	18,400				

*E4SG 3.7	11,350	214	7	43	F5BBB	607,257	1080	74	283	DF0EE	263,264	884	34	118	*HA8XX	331,230	741	73	232	*IK5WKG	26,427	194	16	53		
*ES6MO 1.8	18,288	352	46	400	F5RAB	368,244	739	71	247	(Opr. DL20BO)	237,510	554	62	211	*HA0HW	237,510	554	62	211	*IK4YNR	5,428	84	10	36		
EUROPEAN RUSSIA	<b>RU6BY A 2,972,720 3280 139 527</b>				F2NH	207,378	352	68	178	DL3BYE	68,256	98	12	36	*HA3FT	28	17,460	162	16	44	*IK3FZ	577,643	1860	39	132	
UA6GLU *	<b>1,448,556 1546 122 436</b>				F2AR	157,586	465	55	192	DL3BWF	65,780	324	28	82	*HA5BSW	14	129,480	700	26	118	*IK4FB	1,440	162	16	44	
RX3APM *	<b>721,544 1567 91 313</b>				F5HWB	41,474	135	43	135	DK0NK	754	28	5	12	(Opr. DJ21A)	*HA8BE	1.8	27,128	510	9	55	*IK4FZ	1,440	162	16	44
RZ6CFK *	<b>465,451 759 93 250</b>				F5IHD	408	15	6	11	DL3MHS	3.7	78,528	668	20	76	(Opr. DJ21A)	*IV3RAV	84,680	453	27	89					
UA1OMS *	<b>439,824 813</b> 82 254				F5TDK	28	129,408	516	25	103	DL8DBW	52,129	589	17	60	*I4CSP	92,195	200	54	143						
UA10MX *	<b>284,817 473</b> 85 242				F6EZV	21	787,033	2021	33	136	DL7ALM	38,000	468	14	66	*I4FPZ	64,400	267	28	87						
UA6JY *	<b>269,690 400</b> 86 212				F5NBX	"	689,885	1926	34	127	DL7VMM	19,026	275	10	53	*IK8AFN	21,056	326	12	52						
UA4LY *	<b>180,194 457</b> 58 153				F2EE	200,361	715	31	116	*D7FRX	A	583,311	980	78	303	*IK2XSQ	63	8	2	7						
RU3FF *	<b>180,063 495</b> 57 190				F2SI	97,970	492	27	74	*DJ4JF	"	434,313	590	83	286	*IK8AF	63	8	2	7						
RA1AA *	<b>164,256 415</b> 66 170				F5B0Y	18,942	114	25	52	*DL2HX	"	398,670	665	88	323	*IK2XSQ	63	8	2	7						
RU6LC *	<b>176,716 437</b> 64 189				F5PFG	14	717,162	2048	39	139	*DK7ZK	"	396,670	741	62	249	*IK2XSQ	63	8	2	7					
UA1DJ *	<b>91,584 430</b> 37 122				F8AMV	14,476	84	23	54	*DF3QG	"	392,424	609	82	250	*IK2XSQ	63	8	2	7						
RV6LOB *	<b>7,920 55</b> 29 43				*TM6GA	A	1,276,290	1414	111	378	*DL7ANR	371,954	750	58	251	*I4GP	37,268	475	11	66						
RK6BZ *	<b>7,200 181</b> 13 62				(Opr. F5UFUX)	"	177,656	103	00	339	*DL2DBH	246,960	520	68	226	(Opr. V15VGX)	37,268	475	11	66						
RU6MM 28	<b>20,520 131</b> 20 70				*F5NZD	"	717,765	1036	100	339	*DK5DS	177,656	468	51	161	(Opr. I1HJT)	37,268	475	11	66						
UA3LPF *	<b>368 26</b> 5 11				*F5HNQ	"	663,184	1013	83	279	*DL1TS	168,872	459	47	162	Y1ZKO	A	316,395	727	62	205					
UA3AB 21	<b>124,410 409</b> 33 110				*F5AMH	"	456,875	921	75	268	*DL6MDT	163,944	495	53	163	YL2AZ	A	335,522	1449	33	118					
RA3QUA *	<b>91,200 391</b> 27 93				*F5POJ	"	220,472	559	53	195	*DK5MV	136,750	290	50	200	YL2FJ	UA2FJ	1.8	62,352	826	11	61				
UA6LQJ 14	<b>394,065 1435</b> 38 151				*F5AXP	"	182,708	486	50	172	*D4J0O	"	119,988	360	46	152	YL2IP	"	8,066	63	27	47				
RU3AG *	<b>4,601 62</b> 13 30				*F6FNA	"	176,046	495	54	168	*D9LUS	"	115,987	405	45	161	*YL2GN	14	155,477	818	31	102				
UA3XRB *	<b>1,170 23</b> 7 19				*F6JUG	"	173,420	550	45	185	*DF5AN	"	97,098	290	40	174	LATVIA	"	316,395	727	62	205				
RW4AA 7	<b>309,863 1252</b> 37 126				*F50IH	"	91,936	307	40	129	*DF8SCC	"	94,336	352	39	137	YL2ZK	A	316,395	727	62	205				
RU4AA *	<b>248,301 963</b> 30 111				*F6HNX	"	88,480	301	41	117	*DL8UDL	"	86,275	410	38	137	YL2ZK	A	316,395	727	62	205				
UA6EE *	<b>81,918 393</b> 20 91				*F6FTB	"	87,262	352	35	126	*DL3ARK	"	85,975	309	39	142	YL2ZK	A	316,395	727	62	205				
UA10MZ *	<b>33,128 303</b> 18 64				*F5JBR	"	65,764	265	37	127	*DL1LSZ	"	84,456	396	38	146	YL2ZK	A	316,395	727	62	205				
UA10Z 3.7	<b>25,842 260</b> 14 59				*F5PRB	"	64,380	210	45	100	*DF2WF	"	83,790	418	41	169	YL2ZK	A	316,395	727	62	205				
RA3VW *	<b>14,649 235</b> 8 49				*F5PVJ	"	52,938	259	34	119	*DL1DCJ	"	82,668	276	43	123	YL2ZK	A	316,395	727	62	205				
RZ3OU 1.8	<b>33,666 488</b> 10 62				*F5EGE	"	42,081	217	36	133	*DL2KK	"	78,581	317	41	138	YL2ZK	A	316,395	727	62	205				
RA4CC *	<b>9,384 168</b> 6 40				*F6ZDZ	"	35,332	206	28	93	*DL2YAK	"	78,581	317	38	128	YL2ZK	A	316,395	727	62	205				
*RA3WA A	<b>753,543 1144</b> 99 344				*F5JBF	"	28,560	182	27	93	*DL3HWW	"	64,320	245	50	142	YL2ZK	A	316,395	727	62	205				
*RV3BR "	<b>475,167 1121</b> 94 269				*F5JIW	"	13,200	60	27	57	*DL5ZV	"	64,116	266	37	100	YL2ZK	A	316,395	727	62	205				
UA3BL *	<b>377,325 771</b> 78 247				*F8IN	"	10,584	105	19	53	*DL6ZC	"	63,705	290	35	120	YL2ZK	A	316,395	727	62	205				
*RA3AF *	<b>316,344 701</b> 71 223				*F5JDG	"	9,934	134	13	48	*DL8UVG	"	63,674	281	48	110	YL2ZK	A	316,395	727	62	205				
UA4LLU *	<b>145,642 316</b> 68 138				*F5OHG	"	8,494	107	15	47	*DL6NU	"	61,902	305	43	128	YL2ZK	A	316,395	727	62	205				
*RX3ARI *	<b>139,258 471</b> 51 152				*F5DXN	"	5,208	73	16	40	*DL0MFL	"	61,533	270	38	121	YL2ZK	A	316,395	727	62	205				
*RU4WE *	<b>124,017 440</b> 50 151				*F5PFA	"	3,074	60	8	21	(Opr. DL2JRM)	"	56,550	297	31	143	YL2ZK	A	316,395	727	62	205				
*RV3AH *	<b>118,524 396</b> 52 151				*F6CIV	"	2,548	48	19	30	*DL3YEI	"	52,245	53	35	100	YL2ZK	A	316,395	727	62	205				
*RV3AH *	<b>65,954 285</b> 43 128				*F5TMI	"	2,028	158	46	110	*DK3GE	"	46,632	247	28	96	YL2ZK	A	316,395	727	62	205				
*RA3CQC *	<b>50,688 260</b> 30 102				*F5RMY	28	62,856	283	21	87	*DL2HD	"	44,088	267	31	101	YL2ZK	A	316,395	727	62	205				
*UA1CP/C 1/	<b>49,141 236</b> 36 121				*F5FAD	"	22,968	166	17	55	*DL7UXG	"	40,098	184	38	125	YL2ZK	A	316,395	727	62	205				
*RA4POL *	<b>463,298 1498</b> 35 123				*F5BKH	14	56,058	284	21	75	*DL5ST	"	39,368	182	37	96	YL2ZK	A	316,395	727	62	205				
*RZ6HX *	<b>33,165 1234</b> 33 120				*F6FUN	"	50,880	250	24	72	*DL5WS	"	19,065	105	29	64	YL2ZK	A	316,395	727	62	205				
*RA6LW *	<b>251,688 993</b> 33 114				*F9DK	"	32,047	306	13	60	*DL7EA	"	14,700	144	20	78	YL2ZK	A	316,395	727	62	205				
*RA3DX *	<b>163,082 510</b> 35 111				*F5AJG	"	1,365,548	1528	120	370	*DL7MAT	"	2,331	378	29	96	YL2ZK	A	316,395	727	62	205				
*RA3RCL *	<b>124,744 533</b> 30 94				*F6JSZ	7	616	24	6	16	*DL7VPO	"	2,178	96	10	12	YL2ZK	A	316,395	727	62	205				
*RA3DNC *	<b>95,520 460</b> 26 22				*F6YQY	3.7	1,173	35	5	18	*DL2KWA	"	1,848	55	7	25	YL2ZK	A	316,395	727	62	205				
*RA3ATE *	<b>21,760 310</b> 13 51				*F6ZDZ	"	77,4978	1031	97	357	*DL9CQ	"	1,768	26	13	21	YL2ZK	A	316,395	727	62	205				
*RA3QNL *	<b>10,920 86</b> 20 58				*F6K2X	"	515,790	675	99	310	*DL1TAD	28	67,830	384	18	77	YL2ZK	A	316,395	727	62	205				
*RA1QX *	<b>6,579 108</b> 10 41				*F6JCR	"	40,310	907	73	273	*DL1LAD	28	67,528	343	18	76	YL2ZK	A	316,395	727	62	205				
*RA6LVT 7	<b>5,310 70</b> 11 34				*D1J3H	"	40,131	789	13	51	*DL1AN	21	77,013	378	28	101	YL2ZK	A	316,395	727	62	205				
FINLAND	<b>OF1MM A 2,221,452 2322 128 449</b>				*D1L1AO	"	166,242	589	54	152	*DL1NE	28	77,013	378	28	101	YL2ZK	A	316,395	727	62	205				
OH2BR *	<b>911,478 1459 102 336</b>				*D1QHES	"																				

*ES43G	3.7	11,350	214	7	43	F5BBD	607,257	1080	74	283	DF0EE	"	263,264	884	34	118	*HA8XX	331,230	741	73	232	*IK5WGK	"	26,427	194	16	53		
*ES6MO	1.8	18,288	352	46	400	F5RAB	368,244	739	71	247	(Opn. DL20B)	"	237,510	554	62	21*	*HA0HW	237,510	554	62	21*	*IK4YNR	"	5,428	84	10	36		
<b>EUROPEAN RUSSIA</b>					F2NH	207,378	352	68	178	DL3BYE	"	68,256	98	12	36	*HA3FT	28	17,460	162	16	44	*IK7A	14	431,346	1645	37	137		
UA6LU	A	2,972,720	3280	139	527	F2AR	157,586	465	55	192	DL3BWF	"	65,780	324	28	82	*HA5BSW	14	577,643	1860	39	132	(Opn. IK7XIV)						
RX3APM	"	1,448,568	1546	92	12	436	F2RO	134,054	559	55	133	DK0NK	"	754	28	5	12	*HA4FB	129,480	703	26	118	*IR2R	"	394,558	1373	38	138	
RZ6ACF	"	465,451	759	93	250	F5TDK	28	129,408	516	25	103	(Opn. DJ21A)	"	408	15	6	11	*HA8BE	1.8	27,128	510	9	55	(Opn. IK2UZN)					
UA1OMS	"	439,824	813	82	254	F6EZV	21	787,033	2021	33	136	DL1HD	"	52,129	589	17	60	Iceland		V3RAV	"	84,680	453	27	69				
UA1OMX	"	284,817	473	85	242	F5NBX	"	589,885	1926	34	127	DL7ALM	"	38,000	468	14	66	*TF/0Z5IPA	A	39,786	274	27	87	*I4CSP	"	92,196	200	54	143
UA6JY	"	269,690	400	86	212	F5FLN	"	520,536	1721	36	128	DL7VMM	"	19,026	275	10	53	IRELAND		I4PZP	"	64,400	267	28	87				
UA4LY	"	180,194	457	58	153	F2EE	"	200,361	715	31	116	*DF7RX	A	583,311	980	78	303	*IK8AFN	"	21,056	326	12	52						
RU3FF	"	180,063	495	57	190	F2SI	"	97,970	492	27	74	*DJ4JF	"	434,313	590	83	286	*IK2XSQ	"	63	8	2	7						
RA1AA	"	144,256	415	66	170	F5BOY	"	18,942	114	25	52	*DZ7ZH	"	398,670	741	62	249	*IQ5Q	3.7	37,268	475	11	66						
RU6LC	"	144,716	437	64	189	F5PGP	14	717,162	2048	39	139	*F30G	"	392,424	609	82	250	(Opn. I5VXG)											
UA1AA	"	91,584	430	37	122	F8AMV	"	14,476	84	23	54	*DL7ANR	"	371,954	750	68	251	ITALY											
RV6LOB	"	7,920	55	29	43	*TM6A	A	1,276,290	1414	111	378	*DL2DBH	"	246,960	520	68	226	KALININGRAD											
RK6BZ	"	7,200	181	13	62	RU6MM	28	20,520	131	20	70	*DL8NBJ	"	193,440	567	61	161	IK4ADE	A	1,560,320	2128	94	330	RA2FZ	14	335,522	1449	33	118
UA3LPF	"	368	26	5	11	*F5NZO	"	717,765	1036	100	339	*DK5DS	"	177,656	468	51	161	IK8NWK	"	912,516	1913	80	261	UA2FJ	1.8	62,352	826	11	61
UA3AB	21	124,410	409	33	111	*F5HNO	"	663,184	1013	83	279	*DL1TS	"	168,872	459	47	162	Iceland		V3RAV	"	84,680	453	27	69				
RA3QUA	"	91,200	391	27	93	*F5POJ	"	456,878	921	75	268	*DL6MDT	"	163,944	495	53	163	*TF/0Z5IPA	A	39,786	274	27	87	*I4CSP	"	92,196	200	54	143
UA6LQ	14	394,065	1435	38	151	*F5AXP	"	220,472	559	53	195	*DK5MV	"	136,750	290	50	200	IRELAND		I4PZP	"	64,400	267	28	87				
RU3AG	"	4,601	62	13	30	*F6FNA	"	182,705	486	50	172	*DJ4QO	"	119,988	360	46	152	*IK8AFN	"	21,056	326	12	52						
UA3XB8	"	1,170	23	7	19	*F6JUG	"	173,420	550	45	185	*DL9JS	"	115,987	405	45	161	*IK2XSQ	"	63	8	2	7						
RW4AA	7	309,863	1252	37	127	*F5OIH	"	91,936	307	40	129	*DL5SDC	"	94,336	352	39	137	ITALY											
RU4AA	"	248,301	963	30	111	*F6HNX	"	88,480	301	41	117	*DL2KK	"	86,275	410	38	137	IK4ADE	A	1,560,320	2128	94	330	RA2FZ	14	335,522	1449	33	118
UA6EE	"	81,918	393	20	91	*F6FTB	"	87,262	352	35	126	*DL3ARK	"	85,975	309	35	142	IK8NWK	"	912,516	1913	80	261	UA2FJ	1.8	62,352	826	11	61
UA10MZ	"	33,128	303	18	64	*F5JBR	"	65,764	325	37	127	*DL1LSZ	"	84,456	396	38	146	Iceland		V3RAV	"	84,680	453	27	69				
UA10Z	3.7	25,842	260	14	59	*F5RPB	"	64,380	210	45	100	*DF2WF	"	83,790	418	41	169	*TF/0Z5IPA	A	39,786	274	27	87	*I4CSP	"	92,196	200	54	143
RA3VV	"	14,649	235	8	49	*F5PVJ	"	52,938	259	34	119	*DL1DCJ	"	82,668	276	43	123	IRELAND		I4PZP	"	64,400	267	28	87				
RZ3OU	1.8	33,666	488	10	62	*F5GEG	"	42,081	217	36	133	*DL2KK	"	78,581	317	41	138	*IK8AFN	"	21,056	326	12	52	LATVIA					
RA4CC	"	9,384	168	6	40	*F6ZDZ	"	35,532	206	28	93	*DL2YAK	"	78,581	317	38	128	*IK2XSQ	"	63	8	2	7						
*RA3WA	A	753,543	1144	99	34	*F5JBF	"	28,560	232	27	93	*DL3HHW	"	64,320	245	50	142	ITALY											
RZ3BR	"	475,167	1121	94	269	*F5JW	"	13,200	50	27	57	*DL5ZV	"	64,116	266	37	100	KALININGRAD											
UA3BLB	"	377,325	771	78	247	*F8IN	"	10,584	105	19	53	*DL6JC	"	63,705	290	35	125	IK4ADE	A	1,560,320	2128	94	330	RA2FZ	14	335,522	1449	33	118
*RA3AF	"	316,344	701	71	223	*F5JDG	"	9,394	134	13	48	*DL8UVG	"	63,674	281	48	110	IK8NWK	"	912,516	1913	80	261	UA2FJ	1.8	62,352	826	11	61
*UA4LU	"	145,642	316	68	138	*F50HH	"	8,494	107	15	47	*DL8NFU	"	61,902	305	43	128	Iceland		V3RAV	"	84,680	453	27	69				
RX3ARI	"	139,258	471	51	152	*F5DXN	"	5,028	73	16	40	*DL0MFL	"	61,533	270	38	121	*TF/0Z5IPA	A	39,786	274	27	87	*I4CSP	"	92,196	200	54	143
RU4WE	"	124,071	440	50	151	*F5PFA	"	3,074	60	8	21	*DL3YEI	"	56,550	297	31	143	IRELAND											
*RV3AH	"	118,524	396	53	151	*F5CAV	"	2,548	48	19	30	*DL2HD	"	52,245	353	39	155	*IK8AFN	"	21,056	326	12	52	LITHUANIA					
*RV1CC	"	63,954	285	43	128	*F5TN	"	2,028	156	46	110	*DL3GE	"	2,080	43	16	38	*I4LCT	28	233,736	1234	34	130	A	274,120	707	66	242	
*RA3QC	"	50,688	260	30	102	*F5RMY	28	62,856	283	21	87	*DL7UXG/P	"	44,088	267	31	101	*I4LCT		229,944	743	56	212	*LY2X	"	23,600	140	38	80
*UA4LCQ	21	573,363	1610	40	146	*F6AXD	"	22,968	166	17	55	*DL7UXG/P	"	40,098	184	38	125	*I4LCT		168,276	507	54	158	LATVIA					
*UA4POL	"	463,298	1498	35	123	*F5BMK	14	65,088	484	21	75	*DL2KG	"	39,366	182	37	96	*I4LCT		104,040	1804	30	102	*LY2X	"	23,600	140	38	80
*RZ6HX	"	332,165	1234	33	120	*F6FUN	"	50,880	250	24	72	*DL5WS	"	19,065	105	29	64	*I4LCT		104,040	1804	30	102	*LY2X	"	23,600	140	38	80
R6GLW	"	251,688	999	33	114	*F9DK	"	32,047	306	13	60	*DL7FEA	"	14,700	144	20	78	*I4LCT		104,040	1804	30	102	*LY2X	"	23,600	140	38	80
RU3DX	"	163,082	510	35	111	*F5AJG	"	15,529	195	12	41	*DL6AG	"	14,700	123	24	48	*I4LCT		104,040	1804	30	102	*LY2X	"	23,600	140	38	80
RU3DQ	"	124,744	533	30	94	*F6JSZ	7	616	24	6	16	*DL2MH	"	11,481	292	30	60	*I4LCT		104,040	1804	30	102	*LY2X	"	23,600	140	38	80
RU6LVT	7	5,310	70	11	34	*F6YOU	3.7	1,173	35	5	18	*DL1JPL	"	7,140	57	21	47	*I4LCT		104,040	1804	30	102	*LY2X	"	23,600	140	38	80
<b>EUROPEAN TURKEY</b>					FINLAND	DL6FBL	A	3,630,750	3118	124	494	DL2NBH	"	19,005	1100	114	375	GERMANY						MALTA					
0Y3JE	7	321,198	2113	31	110	DJ4PT	"	3,118,423	2625	126	482	DL1IAO	"	20,942	158	19	55	*I4LCT		229,944	743	56	212	MONDOVA					
*0Y1A	7	380	20	3	16	DJ6QH	"	3,023,258	2455	128	446	DL9NCR	"	19,048	125	39	121	*I4LCT		229,944	743	56	212	NETHERLANDS					
0Y1A	"					DJ6QH	"	1,515,220	1546	115	433	DL7MAE	"	1,048,905	1100	114	375	*I4LCT		229,944	743	56	212	NETHERLANDS					
0Y1A	"					DJ6QH	"	774,978	1031	97	357	DL7MAT	"																

PAOMIR 3.7	18,300	289	9	51	*SP3SLA	21	252,844	807	32	136	SICILY	EA2GC	8,176	75	22	36	*EA7FUN	"	139,464	628	25	92		
*PA2SWL 1.8	14,158	252	7	53	*SP6OJJ	"	194,388	517	35	132	IT9WPO	A	894,704	1446	96	302	EA4FW	"	130,350	803	27	83		
<b>NORTHERN IRELAND</b>					*SP5KLK	"	118,990	485	33	113	IT9BLB	3.7	104,034	764	20	86	EA1EXY	"	106,090	649	21	82		
G10JUM A	32,482	202	25	84	*SP9JCN	"	23,250	178	17	58	IT9JOF	A	228,921	385	72	159	EA4MZ	"	44,640	279	20	76		
*GI4MWA	8,250	80	20	35	*SP9HQC	"	20,944	117	21	67	*IT9ORA	"	13,144	100	32	74	EA7BR	28	150,192	611	25	99		
<b>NORWAY</b>					*SP6PCB	"	18,870	85	25	77	*IT9ZYT	21	69,324	404	26	80	EA3AML	"	43,741	396	18	65		
LA4BN	A	40,300	200	35	95	"	375	15	9	12	*IT9STX	14	659,175	2232	39	95	EA2BP	21	211,115,92	502	28	81		
LA4EU	"	17,028	151	24	75	(Opn. SQ3ANH)	"	(Opn. SQ3ANH)					EA5GMB	"	46,812	298	22	72	EA7ALN	"	27,797	188	17	60
LA6VDA	"	10,191	103	20	59	*SP2GNB	"	33,453	256	20	61	EA3ATM	14	401,636	1350	36	123	EA2CAR	"	13,496	184	16	40	
LA2QJA	"	8,065	123	17	57	*SP6PRT/P	"	15,176	194	10	46	EA3BHB	"	306,634	1384	33	106	FA4EJR	"	10,586	115	16	51	
LA2MLA	21	18,013	115	19	58	*SP6IXU	"	12,006	72	19	50	EA1D100	3.7	26,994	340	9	57	EA3DNC	"	10,560	114	14	50	
LA2R	14	62,370	301	20	79	*SP1EO	"	10,070	144	11	42	EA2CLU	"	22,610	298	12	58	EA7GGP	"	6,667	54	16	43	
LA7AK	1.8	7,380	182	5	56	*SP3GHK/P*	"	7,175	140	9	32	EA1CON	"	17,051	182	10	49	EA5YJ	"	513	22	5	14	
LA5JX	"	240	17	2	14	*SP2BH1	"	5,628	74	8	34	EA3AVP	"	15,780	270	9	51	EA2CJC	21	201,460	1010	23	80	
*LA7CL	A	68,892	260	39	128	*SP9YOK	"	37,392	303	18	64	EA3OP	"	81,320	753	26	81	EA3QP	"	156,520	821	31	99	
LA2EIA	"	67,080	340	31	125	*SP04CTM	"	4,992	87	9	39	(Opn. OM52WZ)					EA7DPU	"	134,504	599	26	108		
*LA2HFA	"	19,030	146	31	79	*SP6AU	"	4,032	82	10	26	OM7M	21	667,776	1822	38	150	EC5GPL	"	130,921	1077	15	93	
*LA1KQ	"	12,834	136	23	79	*SP9ABU	7	17,710	188	13	57	OM5DX	14	1,107,351	3000	39	151	EA7ANM	"	63,890	480	18	48	
LA9IHA	"	10,624	104	23	60	*SP7MUZ	"	8,850	159	15	35	OM5M	"	983,992	2662	39	149	EA3BIM	"	57,783	429	21	82	
LA8ZJA	"	9,380	70	27	40	*SP3GTS	"	6,480	131	7	47	(Opn. OM38H)					EA3TMR	"	11,159,2	1155	12	381		
*LA8LA	"	5,162	57	20	38	*SP2EXN	1.8	7,250	50	5	29	OM6KW	"	293,388	1218	32	106	EA3ELZ	"	943,493	1534	84	263	
*LA9CJA	"	3,120	54	13	33	*SP2QCH	"	5,904	143	6	35	OM2TW	3.7	156,456	1341	19	87	EA3ELZ	"	625,894	994	79	294	
*LA2XIA	"	195	13	4	9	*SP4WNG	"	24,056	231	21	51	*OM3AG	A	218,842	703	65	182	EA3EG	"	621,765	1035	74	263	
*LA7SI	1.8	25,056	231	21	51	*SP7SI	"	10,070	144	11	42	*OM7AG	"	202,335	607	65	170	EA7RU	"	568,834	849	71	216	
<b>PORTUGAL</b>					*SP2JHY	"	5,628	74	8	34	*OM6TX	"	137,360	492	41	161	EA5ARC	"	478,081	855	63	306		
SP2FHK	A	601,783	1150	85	304	*SP1BN	"	4,992	87	9	39	*OM7MX	"	137,730	492	41	161	EC3CJN	"	35,496	450	17	55	
SP2JMR	"	323,016	600	83	261	*SP5HAR	"	5,628	74	8	34	*OM7AG	"	137,730	492	41	161	EA3BJM	"	22,325	172	23	72	
SP6FB	"	267,810	600	53	184	*SP2QD	"	3,120	54	13	33	*OM7ARC	"	64,532	352	30	116	EA1FAD	"	287,670	662	61	197	
SP2AQP	"	170,352	479	59	193	*SP6CXB	"	18,870	203	18	64	*OM3CKZ	"	23,925	340	45	100	EA3BHK	"	253,332	355	94	278	
SP3JHY	"	140,377	350	54	175	*SP5HAR	"	18,870	203	18	64	*OM5FA	28	114,384	620	27	98	EA5WCX	"	13,396	104	18	50	
SC5HAR	"	97,595	410	34	115	*SP6CXB	"	18,870	203	18	64	*OM4KK	21	58,298	273	25	78	EA5AGD	"	9,180	65	19	48	
SP3BNC	"	90,090	335	37	117	*SP6CXB	"	18,870	203	18	64	*OM4WAM	"	5,848	78	13	30	EA4DXP	"	6,912	68	17	47	
SP3CCT	"	75,582	224	51	120	*SP6CXB	"	18,870	203	18	64	*OM4WV	14	26,475	222	17	58	EA7FTR	"	210,406	774	28	105	
SP6CXH	"	39,899	255	27	94	*SP6CXB	"	18,870	203	18	64	*OM5KM	3.7	36,035	487	13	57	EA5EOR	"	194,555	556	48	187	
SP9KJM	"	35,941	244	28	98	*SP6CXB	"	18,870	203	18	64	OM7AB	"	27,848	451	7	52	EA5ASF	"	190,226	468	58	169	
SP8PLDI	"	32,630	228	32	98	*SP6CXB	"	18,870	203	18	64	(Opn. OM38H)					EA3ASX	"	182,728	361	66	185		
SP5CEQ	"	25,312	151	30	82	*SP6CXB	"	18,870	203	18	64	EA1ANZ	"	182,042	245	16	66	EA5AIL	"	3,330	38	11	26	
SP9HQJ	"	24,684	173	28	74	*SP1FNT	28	21,899	157	13	48	*SP6CXB	"	180,974	1397	37	148	EA5FW	"	169,694	494	48	169	
SP9VRY	"	12,788	115	23	69	*SP1FNT	"	18,150	141	17	49	*SP6CXB	"	180,974	1397	37	148	EA1BLU	"	165,270	576	52	158	
SP3FZN	"	9,125	71	15	59	*SP1FNT	"	7,748	100	12	40	*SP6CXB	"	180,974	1397	37	148	EA1JE	"	152,880	389	55	155	
SP5FNA	"	3,78	17	6	12	*SP1FNT	"	5,772	52	13	25	*SP6CXB	"	180,974	1397	37	148	EA7AKK	"	11,156	551	23	84	
SP9W	28	231,132	1091	26	106	*SP1FNT	"	5,970	141	11	42	*SP6CXB	"	180,974	1397	37	148	EA1ANH	"	11,156	551	23	84	
(Opn. SP9HWN)					*SP6CXB	"	5,970	141	11	42	*SP6CXB	"	180,974	1397	37	148	EA4AGJ	"	6,890	71	16	37		
SP2QVI	"	53,802	374	21	77	*SP4NC	14	256	16	3	13	*SP6CXB	"	180,974	1397	37	148	EA1AJV	"	11,156	551	23	84	
SP5DDJ	"	39,676	327	21	70	*SP1AOZ	7	176,001	755	23	96	*SP6CXB	"	180,974	1397	37	148	EA4EOI	"	60,701	352	22	79	
SP5GRM	21	322,414	1237	34	129	*SP2GLT	"	4,264	73	7	45	*SP6CXB	"	180,974	1397	37	148	EA3DVM	"	25,275	193	15	60	
SP4HKB	"	221,852	856	30	118	*SP2FZZ	"	1,850	70	4	21	*SP6CXB	"	180,974	1397	37	148	EA5TCB	"	6,136	92	10	42	
SP8NCJ	"	29,900	518	20	39	*CT2GPT	"	984	40	6	18	*SP6CXB	"	180,974	1397	37	148	EA5JGH	"	12,934	213	23	81	
SP4EZ	7	212,214	988	31	120	*Y03APJ	A	1,230,528	1900	100	364	*SP6CXB	"	180,974	1397	37	148	EA5ZC	"	124,000	572	28	96	
SP9MQH	"	8,318	516	50	20	39	*Y03FF	14	60,208	353	25	81	*SP6CXB	"	180,974	1397	37	148	EA5ZC	"	1,091,800	1418	99	325
SP3GEM	3.7	244,325	1448	33	112	*Y04CF	"	12,400	141	15	47	*SP6CXB	"	180,974	1397	37	148	SM3PZG	A	1,098,072	1739	83	321	
SP5QAH/9'	"	48,077	280	34	97	*Y02LII	7	4,116	137	12	20	*SP6CXB	"	180,974	1397	37	148	SM5AOE	"	1,091,800	1418	99	325	
SP5QAA/9'	"	48,077	280	34	97	*Y02BS	"	16,576	108	20	26	*SP6CXB	"	180,974	1397	37	148	SM3CEU	"	658,298	968	100	343	
SP5QAA/9"	"	46,171	320	59	99	*Y08R00	"	11,628	126	25	51	*SP6CXB	"	180,974	1397	37	148	SM3BZV	"	300,124	642	81	278	
SP1A1U	"	36,716	250	34	100	*Y08GF	"	4,380	123	30	30	*SP6CXB	"	180,974	1397	37	148	SM4AWF	"	20,805	617	47	188	
SP2QEB	"	35,244	214	32	100	*Y03JF	28	75,388	653	21	73	*SP6CXB	"	180,974	1397	37	148	SM2DMU	7	145,431	833	29	84	
SP1QEX	"	30,100	163	35	105	*YR7C	"	14,809	203	16	43	*SP6CXB	"	180,974	1397	37	148	SM6D01	1.8	55,420	691	16	69	
SP5DRE	"	29,900	197	24	68	*Y04ATW	"	24,180	200	18	60	*SP6CXB	"	180,974	1397	37	148	SM6HVI	A	442,552	214	22	72	
SP5SEK	"	25,296	185	26	93	*Y03AIL	21	53,707	195	31	88	*SP6CXB	"	180,974	1397	37	148	SM0BDS	"	101,871	333	47	142	
SP4MPH	"	32,126	105	27	69	*Y05PAP	"	22,684	422	7	46	*SP6CXB	"	180,974	1397	37	148	SM2KAL	"	95,744	318	44	143	
SP6FJ	"	11,544	60	30	48	*Y09IBA	"	9,648	181	8	40	*SP6CXB	"	180,974	1397	37	148	SM6NJK	"	93,854	463	37	130	
SP9IKN	"	10																						

QRP																	
YU1KN	A	370,590	872	70	260	KH6/N0KE	301,266	638	74	115	S95XT	99,460	476	72	204		
KD2TT	"	299,460	476	72	204	YU1LM	"	178,401	686	47	196	S59D	154,365	443	57	194	
NT7VY	"	126,198	316	64	107	W6YJ	"	102,340	254	65	105	YU1LW	"	96,425	262	52	123
N8XA	"	95,025	208	56	125	SM3CCT	"	91,674	370	43	155	YU1LS	"	89,012	391	32	122
EA1G1T	"	89,012	391	32	122	OKHP	"	84,657	300	43	136	OK1DKS	"	80,013	424	37	142
RW3AI	"	74,872	281	51	145	C1TEET	"	74,202	317	34	115	LUBHSO	"	66,720	201	50	70
JH1HRJ	"	65,286	202	49	68	UA9SG	"	63,114	196	51	106	UR5ZOS	"	19,647	132	28	83
W3ECU	"	18,252	112	43	65	W3ECU	"	18,252	112	43	65	JN2FSE	"	15,890	104	24	46
DN7CC	"	28,600	226	22	88	WB6FZH	"	15,635	105	25	28	CHILE					
YR5ZOS	"	19,647	132	28	83	KH6						CE6ABC	28	479,160	1682	24	75
W3ECU	"	18,252	112	43	65	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
JN2FSE	"	15,890	104	24	46	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
DN7CC	"	28,600	226	22	88	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
W3ECU	"	18,252	112	43	65	CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42
JN2FSE	"	15,890	104	24	46	CE4ETZ	"	32,429	121	22	79	CE6DFY	14	49,760	443	24	57
DN7CC	"	28,600	226	22	88	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
W3ECU	"	18,252	112	43	65	YR5ZOS	"	132,046	542	25	78	CE6ABC	28	479,160	1682	24	75
JN2FSE	"	15,890	104	24	46	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
DN7CC	"	28,600	226	22	88	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
W3ECU	"	18,252	112	43	65	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78	(Op. PYRKM)					
CE6ABC	28	479,160	1682	24	75	CE6NES	21	65,038	373	20	42	CE4ETZ	"	32,429	121	22	79
CE6NES	21	65,038	373	20	42	CE6DFY	14	49,760	443	24	57	YR5ZOS	"	132,046	542	25	78
CE6DFY	14	49,760	4														

W1RZF		1,182,864 1043 99 357	W4JVN		632,341 653 88 279	EUROPE		SICILY		NF4L 340,470 421 88 263
K1MO	"	1,040,968 853 101 350	N4PQX		588,438 488 110 349	BELGIUM		IT9LTA 14 11,650 142 11 39	K4RC 181,305 370 65 190	
AA1V	"	922,560 715 107 358	W4UJM		359,640 439 83 213	ON4CAS A 65,728 298 37 121		SLOVENIA		KV4T 142,146 652 41 108
NQ1K	"	835,668 637 117 384	K2SD/4		103,740 208 62 133	CROATIA		A 1,937,320 2310 86 321		KJ3W/4 141,020 281 67 153
K1SM	"	801,000 772 93 282	N4ZR		97,524 210 53 119	9A4KA A 106,403 492 57 130		S54ZZ		WB4PHW 13,275 72 27 48
W1NG	"	776,625 650 117 358	W4WNT		71,272 177 53 117	9A4KA A 106,403 492 57 130		S53G		N5HV 1,469,279 1326 123 364
AA1BU	"	588,430 615 97 318	N14D		54,683 148 48 101	9A4KA A 106,403 492 57 130		S53B		K9MK/5 1,174,789 901 132 379
N1DG	"	566,354 569 97 301	N3QEY/4		32,592 128 40 72	9A4KA A 106,403 492 57 130		217,474 957 47 147		AA5NT 361,120 629 82 223
N1SP	"	547,884 603 72 252	N4XM		25,092 95 40 62	9A4KA A 106,403 492 57 130		127,738 443 47 174		W5ROK 320,100 585 87 213
W1ZI	"	534,699 597 88 277	W4DR		31,920 133 24 71	9A4KA A 106,403 492 57 130		17,738 443 47 174		NJ5S 166,762 313 58 141
W1BIH	"	519,515 535 93 297	W4DR		7,10,788 73 17 45	9A4KA A 106,403 492 57 130		127,738 443 47 174		K5RC 151,158 312 57 126
WV1M	"	493,290 526 93 285	K1GE		478,188 530 91 242	9A4KA A 106,403 492 57 130		127,738 443 47 174		K5DM 147,936 336 55 129
W11G	"	462,870 704 84 249	K1LOM		411,502 519 80 243	K5NA A 1,242,720 1024 128 352		NF4L 340,470 421 88 263		N5HV 1,469,279 1326 123 364
K1LOM	"	406,354 569 97 301	N5JR		515P " 1,116,691 859 119 368	K5NA A 1,242,720 1024 128 352		K4RC 181,305 370 65 190		K9MK/5 1,174,789 901 132 379
N1EZC	"	394,719 501 90 259	K5LP		421,038 506 103 236	K5NA A 1,242,720 1024 128 352		AA5NT 361,120 629 82 223		AA5NT 361,120 629 82 223
NZ1Q	"	381,193 548 75 218	W5TN		330,174 416 90 216	K5NA A 1,242,720 1024 128 352		W5ROK 320,100 585 87 213		W5ROK 320,100 585 87 213
W1NR	"	377,365 395 85 270	W5ASO		130,678 251 61 162	K5NA A 1,242,720 1024 128 352		NJS5 166,762 313 58 141		NJS5 166,762 313 58 141
N1AU	"	329,085 426 76 233	NA4M/5		79,636 178 65 107	K5NA A 1,242,720 1024 128 352		K5RC 151,158 312 57 126		K5RC 151,158 312 57 126
K1TH	"	297,024 417 68 205	W5ISQ		25,920 133 24 71	K5NA A 1,242,720 1024 128 352		K5DM 147,936 336 55 129		K5DM 147,936 336 55 129
K1AR	"	250,652 352 68 213	W5ZQ		59,514 269 25 66	K5NA A 1,242,720 1024 128 352		N5HV 1,469,279 1326 123 364		N5HV 1,469,279 1326 123 364
W1ZS	"	247,506 390 67 182	W6TKF		8,10,788 73 17 45	K5NA A 1,242,720 1024 128 352		K4RC 181,305 370 65 190		K4RC 181,305 370 65 190
K1VV	"	246,807 362 68 209	N6CCL		435,445 450 107 258	K5NA A 1,242,720 1024 128 352		W5ROK 320,100 585 87 213		W5ROK 320,100 585 87 213
N1MM	"	232,784 375 64 175	K6EWQ		264,041 475 83 175	K5NA A 1,242,720 1024 128 352		NJS5 166,762 313 58 141		NJS5 166,762 313 58 141
KD1K1	"	225,786 392 62 180	K6CLX		21,650 326 76 172	K5NA A 1,242,720 1024 128 352		K5RC 151,158 312 57 126		K5RC 151,158 312 57 126
KV1J	"	149,640 284 54 154	K6GU		84,750 225 54 96	K5NA A 1,242,720 1024 128 352		K5DM 147,936 336 55 129		K5DM 147,936 336 55 129
WW1E	"	130,200 312 44 131	N6DA		69,915 161 70 107	K5NA A 1,242,720 1024 128 352		N5HV 1,469,279 1326 123 364		N5HV 1,469,279 1326 123 364
KA10	"	124,934 238 52 146	N6DT		41,072 115 49 87	K5NA A 1,242,720 1024 128 352		K4RC 181,305 370 65 190		K4RC 181,305 370 65 190
K1RV	"	106,168 225 61 132	N6TNW		25,920 92 41 67	K5NA A 1,242,720 1024 128 352		W5ROK 320,100 585 87 213		W5ROK 320,100 585 87 213
K4XR/1	"	104,647 176 64 163	W6ISQ		16,450 71 39 55	K5NA A 1,242,720 1024 128 352		NJS5 166,762 313 58 141		NJS5 166,762 313 58 141
KD1NE	"	77,400 205 35 115	KAG6IM		20,024 164 71 42	K5NA A 1,242,720 1024 128 352		K5RC 151,158 312 57 126		K5RC 151,158 312 57 126
W1/KL7DN	"	30,532 158 45 90	W6ISQ		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		K5DM 147,936 336 55 129		K5DM 147,936 336 55 129
N2MM		A 2,005,640 1278 128 452	W6TKF		812,175 957 105 223	N6CCB		K5NA A 1,242,720 1024 128 352		NF4L 340,470 421 88 263
W2RE	"	1,915,461 1262 123 426	K6CMB		435,445 450 107 258	K5NA A 1,242,720 1024 128 352		K4RC 181,305 370 65 190		K4RC 181,305 370 65 190
K2TW	"	1,375,526 992 119 420	K6CMB		598,438 488 110 349	K5NA A 1,242,720 1024 128 352		W5ROK 320,100 585 87 213		W5ROK 320,100 585 87 213
W2TV	"	1,118,376 852 109 395	K6CMB		359,640 439 83 213	K5NA A 1,242,720 1024 128 352		NJS5 166,762 313 58 141		NJS5 166,762 313 58 141
W2NO	"	968,342 959 92 326	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		K5RC 151,158 312 57 126		K5RC 151,158 312 57 126
K2FU	"	610,490 547 99 311	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		K5DM 147,936 336 55 129		K5DM 147,936 336 55 129
W2YR	"	510,105 459 108 328	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		NJS5 166,762 313 58 141		NJS5 166,762 313 58 141
N2QLT	"	480,638 622 77 229	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		K5RC 151,158 312 57 126		K5RC 151,158 312 57 126
NG2P	"	269,433 417 66 194	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		K5DM 147,936 336 55 129		K5DM 147,936 336 55 129
K20WE	"	269,056 455 82 205	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		NJS5 166,762 313 58 141		NJS5 166,762 313 58 141
K2QMF	"	263,344 411 65 195	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		K5RC 151,158 312 57 126		K5RC 151,158 312 57 126
K20MF	"	249,525 341 65 195	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		K5DM 147,936 336 55 129		K5DM 147,936 336 55 129
K20NM	"	191,774 316 75 178	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		NJS5 166,762 313 58 141		NJS5 166,762 313 58 141
W2K2	"	182,965 394 47 138	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		K5RC 151,158 312 57 126		K5RC 151,158 312 57 126
A4AB	"	1,973,412 1258 124 449	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		K5DM 147,936 336 55 129		K5DM 147,936 336 55 129
K3ND	"	1,730,746 1202 120 418	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		NJS5 166,762 313 58 141		NJS5 166,762 313 58 141
N3MZK	"	1,542,803 1085 123 437	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		K5RC 151,158 312 57 126		K5RC 151,158 312 57 126
K300	"	1,490,197 1163 111 356	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		K5DM 147,936 336 55 129		K5DM 147,936 336 55 129
AA3JU	"	1,353,696 1123 108 370	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		NJS5 166,762 313 58 141		NJS5 166,762 313 58 141
W3MM	"	1,348,355 921 125 422	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		K5RC 151,158 312 57 126		K5RC 151,158 312 57 126
N3II	"	1,226,420 872 117 413	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		K5DM 147,936 336 55 129		K5DM 147,936 336 55 129
N3NQ	"	1,177,605 917 111 384	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		NJS5 166,762 313 58 141		NJS5 166,762 313 58 141
K3AR	"	1,109,591 763 125 416	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		K5RC 151,158 312 57 126		K5RC 151,158 312 57 126
K3KY	"	1,073,616 822 107 367	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		K5DM 147,936 336 55 129		K5DM 147,936 336 55 129
K3DI	"	1,019,504 854 100 358	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		NJS5 166,762 313 58 141		NJS5 166,762 313 58 141
W2G/G/3	"	966,380 812 108 352	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		K5RC 151,158 312 57 126		K5RC 151,158 312 57 126
WB3CWV	"	910,006 896 81 283	K6CMB		10,788 73 17 45	K5NA A 1,242,720 1024 128 352		K5DM 147,936 336 55 129		K5DM 147,936 336 55 12

CANARY ISLANDS									
EA8ZS	13,864,862	6124	161	653	UN8LW	KAZAKHSTAN	OK1KUA	122,220	404
EA8/	3,937,682	3362	88	334	UP0F	4,620,231	3410	130	401
DL6MHW									
CT3BX	11,414,125	5733	144	575	EX9A	KHIGRIZIA	OK1KUO	55,874	403
REUNION									
FR/IK2RXV	636,620	1061	61	168	HL00	KOREA	OK1KCF	37,638	177
SAO TOME & PRINCIPE									
S97A	1,027,065	1542	57	172	9K9K	KUWAIT	OL5Q	33,573	633
ASIA									
ASIATIC RUSSIA									
RZ9AZA	6,335,166	3776	154	513	A47RS	MONGOLIA	OZ5W	4,256,845	3449
RK9SWF	760,095	1000	81	234	HS2YM	OMAN	OZ9KY	2,100,136	136
ASIATIC TURKEY							OZ7HAM	394,940	519
YM3SV	931,270	1476	43	187	OT7T	THAILAND	OZ5EDR	146,118	447
TA2KB	525,192	872	51	186	OT7P	JT1T	M7P	3,986,820	3162
CHINA							G4UJS	3,415,707	3092
BY4RSA	1,339,056	2208	106	200	OT7C	ESTONIA	309	110	459
BY1BY	61,478	362	42	76	OT7E	EUROPE	G3TBK	978,892	1304
BY5QN	44,166	331	36	66	EW4XA	AUSTRIA	G7B	654,480	92
CYPRUS							M7G	579,282	312
P3A	16,143,795	8315	164	635	LZ9A	BELARUS	M7C	10,385	60
JAPAN							HS2YM	2,216,907	2241
JH7PKU	3,734,740	2718	157	372	LZ5Z	BULGARIA	THAILAND	254,800	112
JATELY	3,068,432	2267	156	337	OT7T	CROATIA	250	329	329
JAY1KK	2,264,068	1969	135	317	OT7P	FRANCE	254	76	132
JEG2IH	2,242,209	2086	137	306	OT7C	BELGIUM	OT7E	2,356,992	95
JR1ZTT	2,022,543	1894	136	297	OT7E	FINLAND	301	301	301
JAT7YAA	1,980,341	2045	144	307	OT7E	AUSTRIA	OH7AAC	3,373,458	139
JAY9YAA	1,417,665	1253	135	300	OT7C	GERMANY	OF1AF	3,300,347	508
JH7AFR	946,475	1771	104	185	OT7C	ESTONIA	OH6AW	2,350,136	128
JAY9YAK	912,152	1035	104	219	OT7C	EUROPE	OH5BM	1,336,632	519
JAY9YBA	706,515	916	107	228	OT7C	AUSTRIA	OHENIO	1,697,952	403
JAGZLJ	608,832	799	96	192	OT7C	BULGARIA	OHENIO	1,500,954	303
JIZZEY	577,225	940	94	181	OT7C	CZECH REPUBLIC	TM2Y	9,469,847	159
JN1ZDF	298,556	553	76	126	OT7C	CROATIA	TM1C	6,796,752	658
JY1YAA-1	102,527	231	66	97	OT7C	FRANCE	TM2T	4,542,390	548
JA2RL/2	5,280	64	21	27	OT7C	GERMANY	TM8A	2,688,196	548
JORDAN							F8KCF	2,584,296	548
JY8XY	481,839	981	47	136	OT7C	ESTONIA	F6KZD	1,340,775	548
JORDAN							F5KDC	260,576	548
KAZAKHSTAN							F5KDP	219	548
KOREA							F5KDP	211	548
KUWAIT							F5KDP	211	548
LITHUANIA							F5KDP	211	548
MADEIRA ISLANDS							F5KDP	211	548
MONGOLIA							F5KDP	211	548
NORWAY							F5KDP	211	548
OMAN							F5KDP	211	548
PALESTINE							F5KDP	211	548
REUNION							F5KDP	211	548
SAO TOME & PRINCIPE							F5KDP	211	548
SLOVAK REPUBLIC							F5KDP	211	548
SOUTH AFRICA							F5KDP	211	548
SWEDEN							F5KDP	211	548
SWITZERLAND							F5KDP	211	548
SYRIA							F5KDP	211	548
TURKEY							F5KDP	211	548
UZBEKISTAN							F5KDP	211	548
YEMEN							F5KDP	211	548
YUGOSLAVIA							F5KDP	211	548
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