

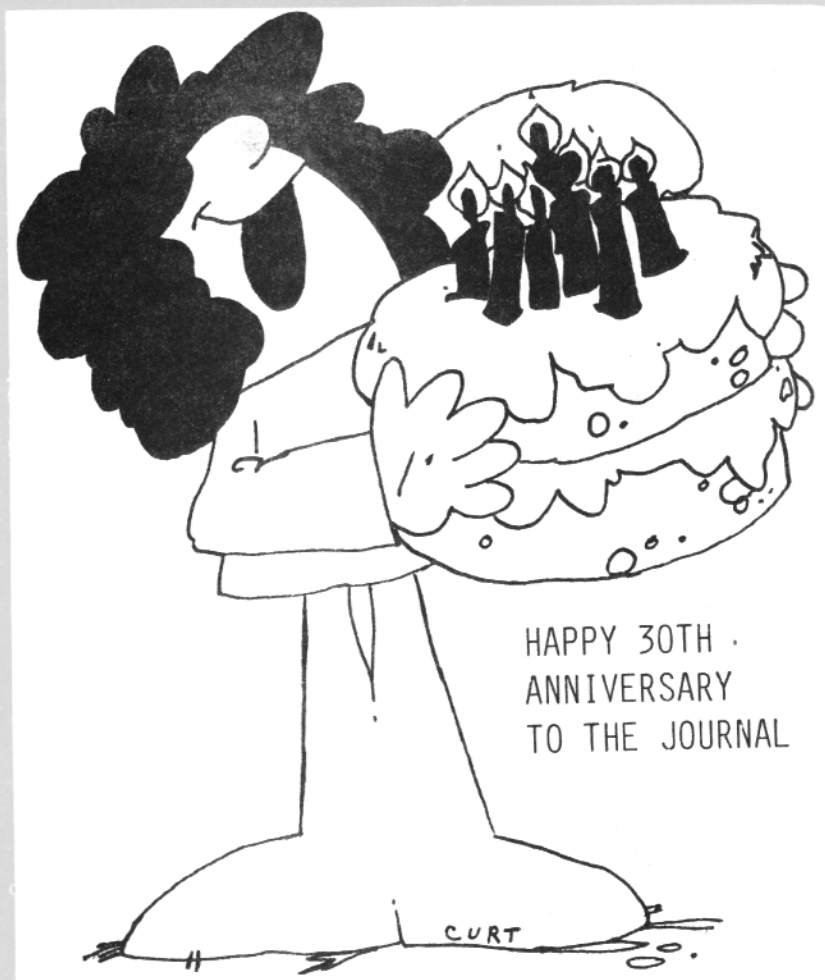
# RTTY

JANUARY 1982  
*Journal*

VOLUME 30 NO.1

85 CENTS

EXCLUSIVELY AMATEUR RADIOTELETYPE



CONTENTS

AUTOCOM MA4

## RTTY JOURNAL

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The RTTY JOURNAL is heading into its thirtieth year of bringing news and views of teleprinting to its readers. During the first fourteen years of publication under Merrill Swan, W6AEE it was called "RTTY". Merrill is still an active Amateur living right here in Southern California. The next eleven years under Dusty Dunn, W8CQ, saw the addition of "JOURNAL" to our name and so it continues to be called. Dusty still lives in Royal Oak, Michigan but is not very well. Cards and letters to him would be appreciated, especially from some of the "ole timers". Mail addressed to Post Office Box 837 Royal Oak, Michigan 48068 should get to him.

During its years of publication the RTTY JOURNAL has usually been the first to announce a new piece of RTTY equipment or innovative additions to existing equipment. Articles by Irv Hoff and Ron Guentzler and the hundreds of authors contributing to the RTTY JOURNAL over the past years have been the backbone of our existence.

The time and energy that DX editors like Skip Prinsen have contributed to contests, awards, Ham Helps etc., is truly phenomenal. The awarding of a plaque for DXCC was originated by the RTTY JOURNAL and another first has been started; that of a plaque for SWLers. This year will see the start of the CW and RTTY World Championships co-sponsored by 73 Magazine and the RTTY JOURNAL. We do regret the loss of the RTTY JOURNAL ART Contest due to lack of communication by the judges but it is still carrying on.

With this new year the RTTY JOURNAL will have more changes. Skip will be putting out to sea, on orders from the United States Navy. Taking his place will be William Snyder, WOLHS who likes to be called "Bill". Bill resides at 1514 S. 12th Street, in Fargo, North Dakota 58103. By landline 701-232-0310 should get to him.

Contest Managers please note this change in editors for if contest results or contest rules do not get to him, they will not be published. As

additional insurance, it might be wise to send another copy to the RTTY JOURNAL office.

Articles...We are looking at the bottom of the barrel right now. Occasionally we save an article because of similarity to current articles. The RTTY JOURNAL can be only as good as the articles and contributions of its readers make it. So keep those articles coming in. If possible, type them on a typewriter with upper and lower case, and double spaced. Content should be, anything that you have to offer in the way of: building new equipment, adding to existing equipment, modifications, praise/complaints about equipment, DX-peditions, new ways to use old equipment etc.

With Gisela back in Germany for six weeks and John KA6NYK in and out of the hospital, again, the staff (me) has been behind in getting this edition out. Today is Christmas Day, and this column is the last to be inserted. Then John and the family here, son Curt and daughter-in-law Melanie will take me out for a Christmas dinner by the sea shore. 73 and 88 DEE.

# DX COLUMN

## by SKIP

SKIP PRINSEN, WB6CYA  
3611 MERRINAC  
SAN DIEGO, CA 92117  
(714) 276-3182

### GREETINGS TO ALL.....

Well the Christmas season has come and gone for another year and we will be seeing more Amateurs getting on with their newly acquired TOYS, so please keep this in mind and take a few minutes to help the newcomers that you run into that are having problems in getting their rig up and running.

I received a card from "Mac" K7BV saying that he has been tied up in the hospital for the past four weeks. So Mac, we hope that all is well and you are back in there giving them heck on the bands again soon.

Look elsewhere in this issue for the Dxpedition to VP2E-land. It promises to be a good one. I am not sure that this is the same one that has been talked about by KØPJ and some of the guys back East or not.

Carl, K6WZ writes that his QTH is Okay between the different call areas of the U.S. for the WAE contest. SO guys, let's get in there and see what kind of score that you can rack up for next years' test. In this letter Carl was also verified by a letter from Klaus DF7FB that the QTH was okay between U.S. stations in different callsign areas.

Jake, K5WTA/6 reports that he has printed RTTY on 6 meters! Now how does that sound for all of the above 50 MHz types that might be reading this! Jake can not, as yet, transmit RTTY on 6 meters, but can copy with his TRS-80 and ST-6. The stations that he printed were KL7NO, AL near Fairbanks who was in QSO with K6RMJ. This was Al's first RTTY contact who by the way had a 599 signal into San Diego using just 35 watts.

I would like to thank the following Amateurs for their inputs to this months article: W4CQI, W2LFL, W0LHS, KØPJ/6, WB2VTD, K5WTA, and K6WZ. Here is a listing of some of the DX that has been seen on the bands this past month.: CE3CEW, CN8DI, EA6HH, EA9FJ,

FK8DD, 14MHZ, 1100CDT, FY7AQ POB 89, Cayenne 97301 French Guiana, FY7YM, POB 267 Cayenne 973000 French Guiana, JA1JDD, KL7HDY, LX2BG 28 MHz 1800CDT, LX2BS POB 2577 Luxembourg, PA0AAS 14 MHz 1800Z, PJ3IPD 14MHZ 0500CST, YB2SV, YJ8TT 14 MHz 1100CST, YU20H, SV1DE 21 MHz 1800 CST, SV4LD, SZ4RT 14 MHz 0500 CST, UK2BAB 28 MHz 1800 CDT, UK3DBG 14 MHz 0100 CDT, VK2APQ, VK3LC,4X4MR, 9Q5HU 14 MHz 1930CST.

### HAM HELPS

H.P. Weber, Stierenweid CH6102, Blatten-Malters, Swiss. Writes that he is looking for RTTY pictures on tape. Can anyone help him out?

Leonard P. Gardner, 749 Golf Course Rd, Thatcher, AZ 85552 writes that he needs help to get on RTTY. He needs information on converting a Hallicrafters HT-37 transmitter to RTTY. Any info would be of help to Leonard.

"Lew" Hindert, Westhaven, RT 4, Box 290, New Braunfels, TX 78130 writes that he has gotten interested in RTTY again and has a model 28 printer and is looking for a CV89TU or whatever someone might have that is available.

### KONTEST KORNER

GIANT FLASH	27-28 Mar	JAN 82
B.A.R.T.G.	March 1982	coming
VK/ZL/Oceania	June 1982	coming
S.A.R.T.G.	Aug. 1982	coming
C.A.R.T.G.	Oct. 1982	coming
W.A.E.D.C.	Nov. 1982	coming

### CW and RTTY WORLD CHAMPIONSHIPS

3-4 April Jan 82

### DXCC HONOR ROLL - January 1982

1. ON4BX	200/200	10. W2LFL	174/172
2. ON4CK	194/194	11. W4CQI	162/156
3. W3KV	194/192	12. F8XT	161/154
4. K7BV	195/191	13. I5KG	163/153
5. ON4CK	186/181	14. JA8ADG	158/151
6. I5WT	184/180	15. W5EUN	156/151
7. I8AA	176/176	16. W1GJK	148/145
8. W3DJZ	179/173	17. G6JF	140/140
9. DK3CU	176/173	18. W8JIN	136/133

19. W3EKT	136/130	47. WØHAH	105/98
20. I5FLN	131/130	48. K4VDM	109/97
21. JA1DSI	138/126	49. WA6CQW	105/89
22. F5JA	132/125	50. ON5WG	103/85
23. IØADF	145/120	51. WB2VTD	93/82
24. W2IUC	128/120	52. SM6ASD	94/81
25. K6WZ	127/120	53. W5HEZ	93/80
26. W3FV	136/118	54. KØPJ/6	107/79
27. K3SWZ	121/117	55. WØMT	82/78
28. W3FV	130/115	56. ON4PL	97/76
29. VK2SG	127/115	57. WØMT	79/76
30. W2PSU	122/113	58. ABØY	85/75
31. KØBJ	121/113	59. K1NVY	86/71
32. DK5WJ	115/109	60. K1LPS	84/68
33. DJ8BT	111/106	61. W8CAT	66/59
34. W2PSU	106/106	62. WØLHS	73/54
35. DN5WG	118/104	63. DF7FB	65/53
36. DJ3OE	103/103	64. ON7AZ	62/51
37. DJ1IJ	103/103	65. WA9AKT	63/48
38. SM7CLZ	113/102	66. K9MD	50/47
39. VK2SG	119/101	67. WA3ZKZ	66/42
40. WA6WGL	112/101	68. WB5QBV	55/42
41. W6JOX	111/101	69. ON6HF	43/28
42. W7MI	110/101	70. WA4JYY	45/25
43. SM6AEN	107/100	71. WB4YSJ	33/23
44. JA1JDD	100/100	72. OR4PL	64/22
45. GI4AHP	100/100	73. W9VY	60/18
46. WB6CYA	107/100	74. KD4OM	40/17

### SWL'ERS

1. G8CDW - 102/102

Latest entry is November 16, 1981.

Editors note: Skip, WB6CYA received his 100th QSL confirmation the day I picked up this article. Congratulations Skip.

### CONTESTS\*CONTESTS\*CONTESTS\*CONTESTS\*

14th Giant RTTY FLASH Contest.... I.A.T.G. Radiocommunications announces its 14th annual Giant Flash RTTY Contest as a promotional program for RTTY.

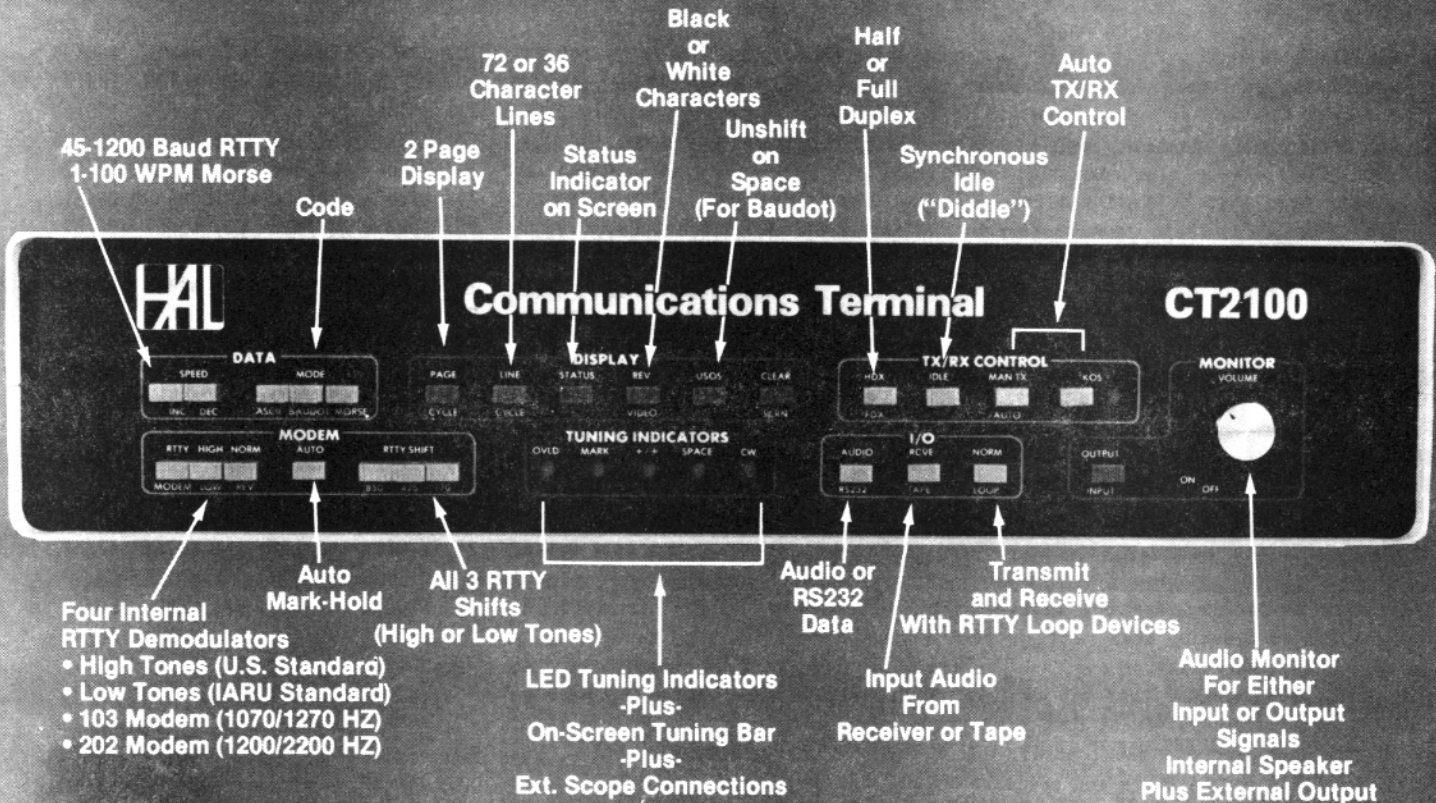
The basic purpose of this contest is to increase interest in RTTY but even more to increase in intercontinental contacts via RTTY.

We have tried our best to organize the contest along these lines. We have retained the "FLASH" format of

continued on PAGE 9....

# CT2100

## HAL Puts MORE Behind The Buttons



### CT2100 System:

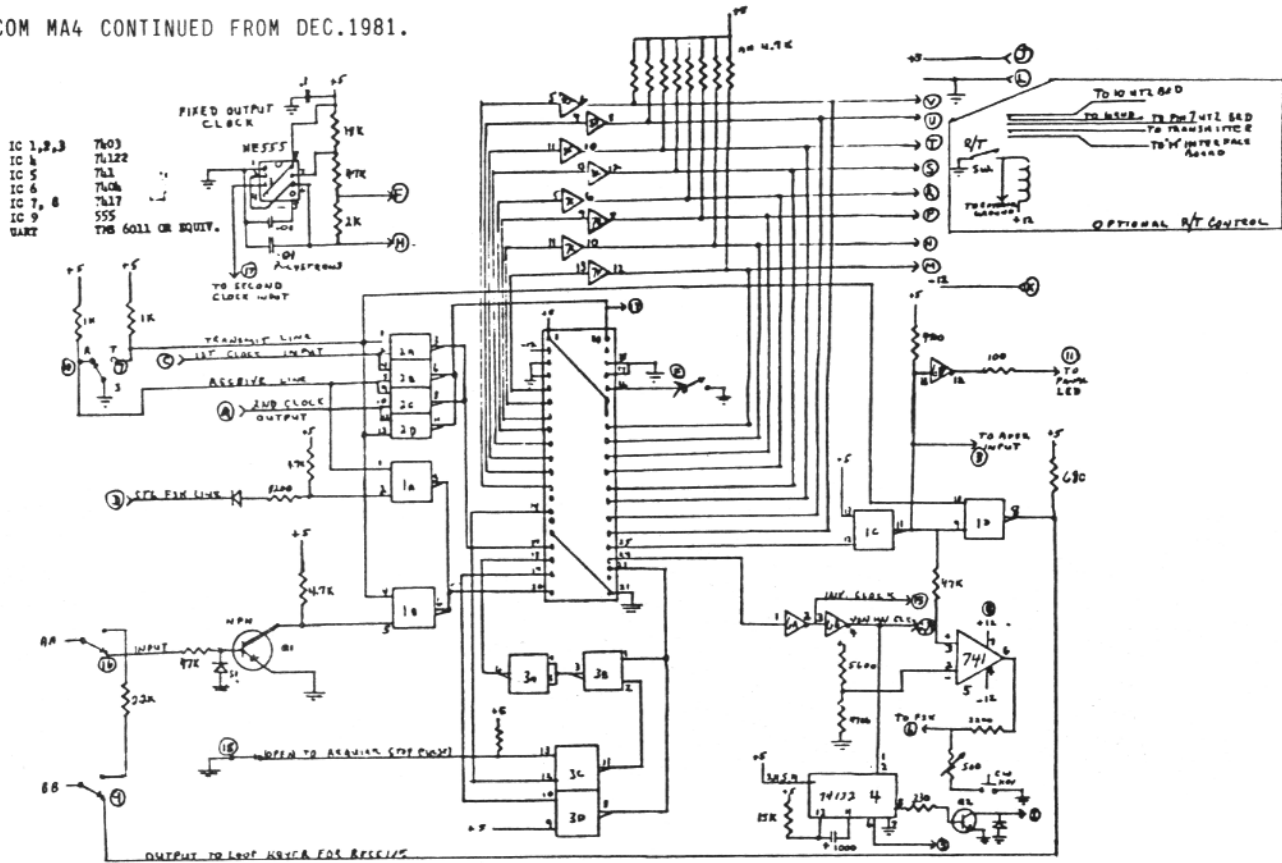
- CT2100 Communications Terminal
- KB2100 Keyboard
- Video Monitor
- Printer (300Bd Serial ASCII-MPI-88G)
- RM2100 Rack Adapter
- MSG2100 2000 Character "Brag Tape" ROM

- 24 Line Display
- 2 Pages of 72 Character Lines -or- 4 Pages of 36 Character Lines
- Split Screen (with KB2100)

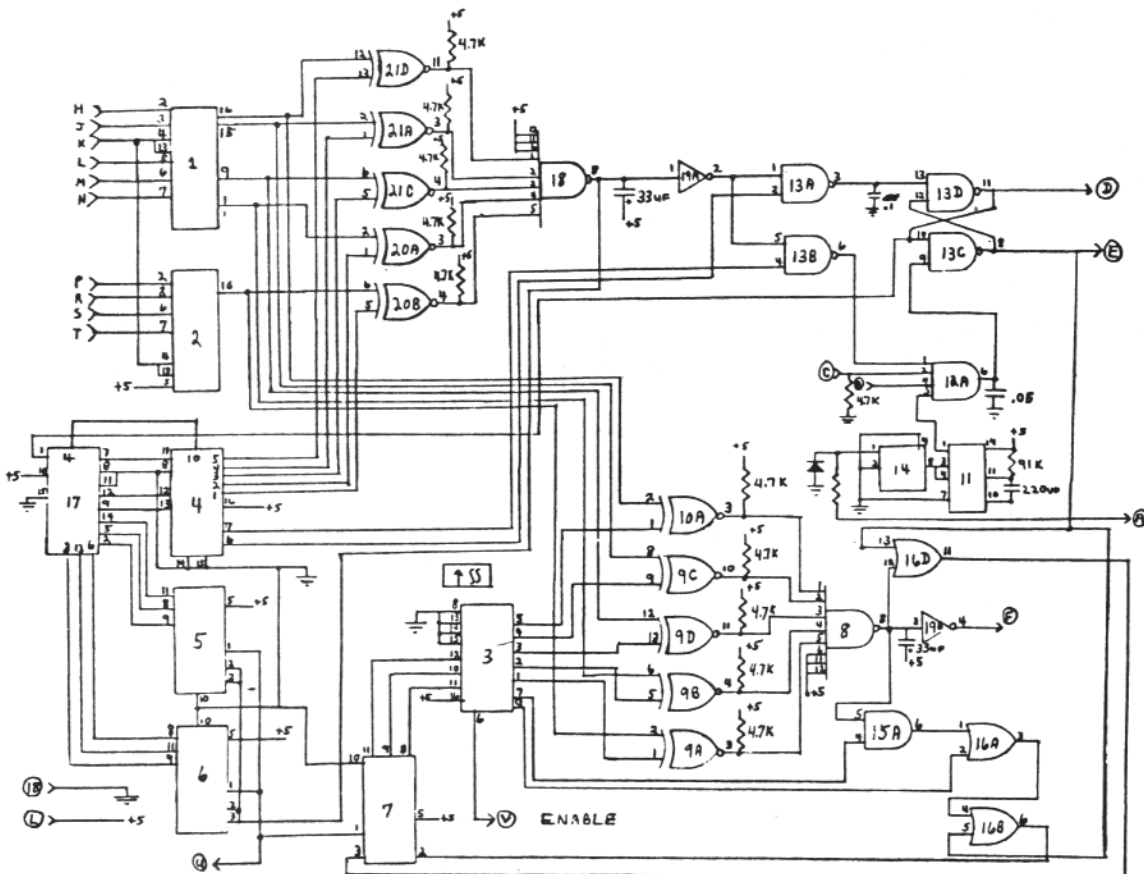


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Dealers.**



UT2 / PARALLEL GENERATOR BOARD MA 4



- IC 1, 2 7475
- IC 3, 4 82S123
- IC 5, 6, 7 7493
- IC 8, 18 7430
- IC 9, 10, 20
- 21 74LS266
- IC 11 74121
- IC 12 7421
- IC 13 7400
- IC 14 4M37
- IC 15 7408
- IC 16 7432
- IC 17 74157
- IC 19 7404

AUTOCOM MA4 PART 2

Neil Petlock, K9WRL  
3029 N. Wilshire Lane  
Arlington Heights, Illinois 60004

DECODE BOARD EDGE CONNECTOR CONNECTIONS

FOIL SIDE

- A. TO UT BOARD "V"
- B. TO UT 2 BOARD "U"
- C. TO UT 2 BOARD "T"
- D. TO UT 2 BOARD "S"
- E. TO UT 2 BOARD "R"
- F. NOT USED
- H. NOT USED
- J. NOT USED
- K. TO MEMORY BOARD "V"
- L. TO INTERFACE BOARD "7"
- M. TO INTERFACE BOARD "8"
- N. NOT USED
- P. TO INTERFACE BOARD "17"
- R. NOT USED
- S. TO INTERFACE BOARD "V"
- T. TO CLEAR SWITCH
- U. +5VOLT DC
- V. NOT USED

COMPONENT SIDE

- 1. GROUND
- 2. TO UT 2 BOARD "14"
- 3. NOT USED
- 4. NOT USED
- 5. NOT USED
- 6. NOT USED
- 7. +5 VOLTS DC
- 8. NOT USED
- 9. NOT USED
- 10. NOT USED
- 11. NOT USED
- 12. NOT USED
- 13. NOT USED
- 14. NOT USED
- 15. NOT USED
- 16. TO INTERFACE BOARD "2"
- 17. TO INTERFACE BOARD "N"
- 18. TO INTERFACE BOARD "K"

INTERFACE BOARD EDGE CONNECTOR CONNECTIONS

FOIL SIDE

- A. TO UT 2 "14"
- B. NOT USED
- C. TO MSG IN INDICATOR ON FRONT PANEL (LED)
- D. +5 VOLTS DC
- E. TO MEMORY BOARD "E"
- F. TO FORCE ON SWITCH S1
- H. TO RELAY FOR PRINTER AND CWID CONTROL

- J. GROUND
- K. TO DECODE BOARD "18"
- L. TO ANSWERBACK TEST SWITCH
- M. TO TRANSMITTER TO RUN ON SWITCH OR TO R/T CONTROL RELAY
- N. TO DECODE BOARD "17"
- P. TO TD ON RELAY
- R. ACTIVE HIGH OUTPUT FOR ANSWERBACK CONTROL
- S. ACTIVE LOW OUTPUT FOR ANSWERBACK CONTROL
- T. TO PERF CONTROL RELAY
- U. ACTIVE HIGH CLR.
- V. TO "12" THIS CONNECTOR TO INTERFACE "S" TO MEMORY BOARD "B"

COMPONENT SIDE

- 1. NOT USED
- 2. TO DECODE "16"
- 3. TO "7" THIS CONNECTOR (2 CONN)
- 4. TO "8" THIS CONNECTOR (2 CONN)
- 5. TO "F" THIS CONNECTOR (2CONN)
- 6. TO MSG INDICATOR CLR SWITCH
- 7. TO DECODE BOARD "L"
- 8. TO DECODE BOARD "M"
- 9. TO CWID START (HIGH FOR START)
- 10. TO RF TRANSMITTER TURN ON
- 11. NOT USED
- 12. TO "V" THIS CONNECTOR
- 13. NOT USED
- 14. FOR TU STAND BY AND AUTOSTART FORCE ON
- 15. TO ANSWERBACK RELAY DRIVEN ANSWERBACK CONTROL
- 16. TO TD FORCE ON SWITCH S4
- 17. TO DECODE BOARD "P"
- 18. TO PERF FORCE ON SWITCH S6

ALMOST OVERLOOKED THIS ONE-- insert after "MEMORY ELECTRONICS BOARD EDGE CONNECTORS CONNECTIONS-FOIL SIDE"

COMPONENT SIDE

- 1 THRU 17 NOT USED
- 18. GROUND

UT2/PARALLEL GENERATOR EDGE CONNECTOR CONNECTIONS

FOIL SIDE

- A. SECOND CLOCK (PRINTER)
- B. TO AFSK INPUT
- C. FIRST CLOCK (LINE)
- D. TO ST6 FSK LINE
- E. TO SWITCH FOR ONE OR TWO STOP BITS (SHORT TO GROUND FOR TWO)
- F. TO ONE SIDE EXTERNAL TIMING\* RESISTOR FOR PRINTER CLOCK
- H. TO OTHER SIDE OF EXTERNAL TIMING RESISTOR SELECTION SWITCH
- J. +5 VOLT DC
- K. -12 VOLT DC

- L. GROUND
- M. DATA LINE "8" (NOT USED)
- N. DATA LINE "7" (NOT USED)
- P. DATA LINE "6" (NOT USED)
- R. DATA LINE "5"
- S. DATA LINE "4"
- T. DATA LINE "3"
- U. DATA LINE "2"
- V. DATA LINE "1"

COMPONENT SIDE

- 1. TO AUTOSTART RELAY
- 2. NOT USED
- 3. NOT USED
- 4. NOT USED
- 5. NOT USED
- 6. TO FSK IN TRANSMITTER
- 7. TO TRANSMIT SIDE OF RT SWITCH OR RT RELAY
- 8. +12 VOLTS DC
- 9. TO OUTPUT LOOP KEYS FOR REC.
- 10. TO REC. SIDE OF RT SWITCH OR RT RELAY
- 11. TO SIGNAL LED ON FRONT PANEL
- 12. NOT USED
- 13. NOT USED
- 14. SYSTEM CLOCK TO PINS "K", "U" MEMORY BOARD, TO "2" DECODE BOARD TO "A" OF INTERFACE BOARD
- 15. INVERTED CLOCK OUTPUT (NOT USED)
- 16. TO UART INPUT-REC.
- 17. TO SECOND CLOCK INPUT\*\*
- 18. TO SWITCH FOR REQUIRED STOP PULSE OPTION

\* The timing resistors may be changed via a switch to vary the input of the printer clock.

\*\* Use for REC only system. Foil should be broken away from pin 40 of UART and a strap added from pins 17 to A. A strap is also added under the UART from pin 4 of the UART to pins 6 and 11 of IC2. A provision for this has been added to the board just under pin 20 of the UART.

POWER SUPPLY PARTS LIST

Basic supply +5 & -12 @ 1 amp each +12 @ 350 MA

RESISTORS	W	QUANTITY
RL	8 10	1
R1, R2	33K 1/2	2
R5	20 1	1
R6	330 1/4	1
R	360 1/4	1
CAPACITORS	VAL	V
C1,C2	EL 4700uf	35 2
C3c4,7,8	EL 1uf	25 4
C6	EL 1000uf	25 1
C5	Mylar .33	100 1
C	Disc .01	50 1

DIODES		QUANTITY
D1,2,3,4	1N5404	4
D5	1N4742A	1
D6	1N4735A	1
D7	1N4001G	1
D8	1N4743A	1

REGULATORS AND SCR'S		
MC7805		1
MC7912		1
C106		1

MISCELLANEOUS		
HEAT SINKS		2
FUSES 1A PIGTAIL		2
SCREWS 4-40 1/4		4
NUTS 4-40		4
BOARD (PC)		1
18 PIN EDGE CONNECTOR		1
WIRE		X
TRANSFORMER 25.2 VCT 2A		1
PANEL MOUNT FUSE HOLDER		1

NOTE: R5 AND RL MAY VARY WITH SUPPLY LOAD AND TRANSFORMER.

DOTS BY CAPACITOR MOUNTING HOLES IN DICATE POSITIVE LEAD POSITION.

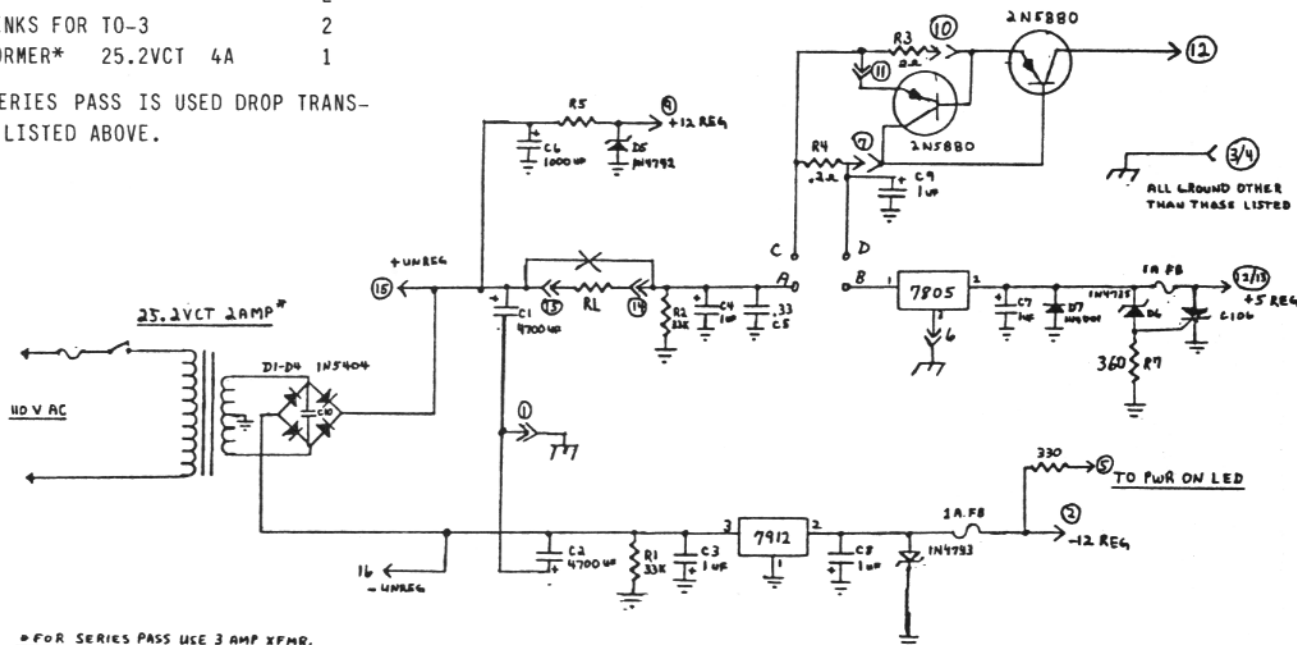
SERIES PASS TRANSISTORS ARE INTENDED TO BE MOUNTED ON THE BOARD ON THE CHASSIS. RL MAY ALSO BE MOUNTED ON THE BOARD.

SERIES PASS OPTION FOR 3 AMP PLUS 5 VOLT SUPPLY.

ADD TO PARTS ABOVE

ITEM	VALUE	QUANTITY
R3	2 OHM	2
R4	.2 OHM	5
C9	1 uf	25v
2N5880		2
HEAT SINKS FOR T0-3		2
TRANSFORMER* 25.2VCT 4A		1

\* IF SERIES PASS IS USED DROP TRANSFORMER LISTED ABOVE.



FOR SERIES PASS USE 3 AMP XFMR.

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**MEMORY EXPANSION BOARD** (contains mailbox systems)  
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For use by amateur radio operators in the transmission and reception of RTTY (ASCII & Baudot) and Morse code. Microprocessor controlled with 20K of memory (8K ROM, 8K RAM, 4K video RAM).

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**Microprocessor-Controlled**  
**Communications**  
**Terminal**



Model 7000 Drake Theta 7000E Terminal  
Model 7009 Drake TR-930 Video Monitor

The perfect addition to any amateur radio installation! Complete, automatic send/receive of Morse code (cw) Baudot code (RTTY) and ASCII code (RTTY). Works with any video monitor.

**7-Channel Battery Back-Up Memory**, the Theta 7000E has seven keyboard-selectable, non-volatile, random access memory channels each of which can hold 64 characters. Data in these memories is alterable at any time and is retained when power is removed. Messages in these memory channels can be repeated 1 to 9 times via keyboard command. All channels may be daisy-chained for continuous read-out. Channel number in use is indicated on display.

**Wide Range of Transmitting and Receiving Speeds**, 5 to 50 wpm in Cw with autotrack on receive. Standard RTTY speeds of 60, 67, 75, and 100 wpm Baudot code and 110, 150, 200, and 300 Baud ASCII code.

**Self Contained Demodulator**, three-step shift selects either 170 Hz, 425 Hz or 850 Hz shift with manual fine tune control of space channel for odd shifts. High/low tone pair select. Mark only or space only copy capability for selective fading.

**CONVENIENT KEYBOARD FEATURES**, automatic keyboard-operated transmit, (KOX) or manual keyboard transmit. Unshift on space, reverts to LETTERS case after reception of each space character in Baudot code. CR/LF is automatically inserted every 60, 72 or 80 characters while transmitting. Cw identification, in RTTY mode. Echo function, prerecorded cassette tapes can be read and transmitted. Test messages, "RY" and "QBF". Transmit word mode, characters can be transmitted in word groupings.

**Crystal Controlled AFSK Modulator:**

	Shift	170 Hz	425 Hz	850 Hz
High Tone Pairs	Mark	2125	2125	2125
	Space	2295	2550	2975
Low Tone Pairs	Shift	170 Hz	425 Hz	850 Hz
	Mark	1275	1275	1275
	Space	1445	1700	2125

- **Printer Interface for Hard Copy**, all modes for parallel ASCII printers. Loop keyer for conventional teleprinters.
- **Composite Video Output**, for any standard video monitor.
- **Kansas City Standard AFSK Output**, KCS tone pair for ASCII.
- **Large Capacity Display Memory**, two page display memory contains 32 X 16 lines per page.
- **Split-Screen**, with a keyboard command, the display can be divided in two; the upper half for transmit and the lower half for receive. Messages can be composed while receiving.
- **Buffer Memory**, 53 character type-ahead keyboard buffer.
- **Word Wrap-Around**, in receive mode, word wrap-around prevents the last word on a line from becoming split in two. Moves whole word to next line.
- **Automatic Letters Code Insertion**, if desired, LETTERS (diddle) code can be transmitted continuously in a pause of transmitting from the keyboard.
- **Audio Monitor**, a built-in audio monitor circuit with automatic transmit/receive switching enables checking of the transmit/receive tones.
- **Transmitter Keying Circuitry**, keys either grid block, cathode keyed, or solid-state transmitters.
- **Power Requirement**, The Theta 7000E requires only 13.6 Vdc @ 1 amp. Plugs into 13.6 Vdc accessory jack on PS7 or PS75 power supplies.
- **Effective Packaging for RFI Protection**, well designed metal cabinet and protective circuits prevent RFI.
- **Terminal Size**: 15.8" W x 11.8" D x 4.7" H (40 x 30 x 12 cm)
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Line output, input levels as low as 15 mV rms (47 kilohm) will result in an output of 1 mW nominal into a 600 ohm balanced line. Output level adjustable by internal pre-set level control. Interfaces low level audio to RTTY

terminal unit or phone line that requires a 600 ohm balanced/unbalanced input. One 36" phono to phono cable supplied. • **Size**: 4.5" L x 1.3" H x 2.5" W (11.4 x 3.3 x 6.4 cm). • **Weight**: .3 lbs. (.14 kg).

Specifications, availability and prices subject to change without notice or obligation.

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ID-07k/LA-681



# HITS & MISSES

by **GEORGE**

GEORGE HAMMON, WA6CQW  
14215 Pecan Park Lane Space 73  
El Cajon, CA 92021

## SAROC

The annual Las Vegas, Nevada prestige convention, SAROC, will be held April 1, 2, 3 and 4, 1982. Advance registration is \$17.00 per person, after March 1, 1982 the price will be \$19.00. A full program of activities are planned. I hope to meet all of you for an in person chat.

## HOME BANKING

Radio Shack will be involved in a home banking pilot program. First Interstate Bank of California. Customers will use TRS-80 VideoTex terminals and videotex equipped TRS-80 color computers on free loan from the bank. Customers can access the bank by telephone from anywhere in the country. Selected customers in the San Fernando Valley (California) are now participating.

## READER RESPONSE

I received a nice card from Bruce Frahm, KOBJ. Bruce writes, "ref. page 4 of the December RTTY JOURNAL, I agree with most of W4NZY's comments about the diddle feature. However, they aren't devoid of purpose in some instances. For one, a slow typist's carrier will not be mistaken for an AØ carrier when using one. Also, it may just be an illusion but, I'd almost swear that under marginal conditions a signal modulated full speed (with no lengthy stop pulses) tends to keep a printer (or crt) in sync better than one where there are occasional or frequent gaps between characters. Is there any basis to this impression? Notwithstanding the above, I agree that the diddle feature can be wasteful of punch paper and can get on one's nerves at times, I have one available and very rarely use it." Yes, Bruce I agree with you that it does have its place. The vox is also a useful tool when set correctly it really gets the job done. Communications reliability may be improved when the transmitting station

maintains a constant signal output (continuous character stream) to help maintain synchronization between transmitting and receiving equipment. I think both gentlemen expressed excellent points. I think that it is like your automobile, it may be able to do 100 MPH, but you don't have to go that fast. Still, when you need it, it sure is nice to have.

## COMPUTERS

During 1981, I have tried to include information on computers. 1981 really exploded on the scene with more and more software for RTTY. 1982 will continue this growth.

1981

This year was a fantastic year for RTTY. Every major Amateur publication devoted some space to RTTY. I will close out my column this month hoping that each of you had the happiest of holidays. The echo's and images of this year are slowly fading away. I pause to think a moment, but quickly turn my thoughts to the New Year. Everything I read gives me the impression that RTTY will again show unparalleled growth.

So long for now.....George WA6CQW

## CONTESTS CONTINUED

the previous contests, which we developed and has been adopted by many other clubs, since it has proved to be effective.

We are open to and welcome suggestions which might improve future contests.

- 1) CONTEST DATE: 1st 14.00-24.00 GMT, 27 March 1982  
2nd 08.00-18.00 GMT 28 March 1982
- 2) BANDS: 3.5, 7, 14, 21, 28 MHz.
- 3) COUNTRY STATUS: The DXCC list to be used except that VE/VO, W/K, VK, PY, LU, JA, UAO/9 call areas will be considered as separate countries.

4) MESSAGES: Will consist of:

- a) RST
- b) Number of QSO
- c) One's continent (example: I4XXX 599 45 Europe).

5) CLASSES: Single or multioperator, single TX, SWLs

6) EXCHANGE POINTS: QSO on 3.5, 7 = 2 points. QSO on 14 MHz = 3 points QSO on 21 MHz = 6 points, QSO on 28 MHz = 8 points.

NO points or multipliers for contacts with one's own country. Only 2 x RTTY QSOs are valid.

7) LOGS AND SCORE SHEETS: Use one log for each band.

Logs must contain: date, time (GMT) call sign, RST-number of the QSO-continents sent and received, country and continent multipliers, points and final score.

Each station may be contacted only once on any band, additional contacts may be made with same station if a different band is used. In order to qualify, all logs must be received not later than 30, April, 1982.

Send to: Prof. Franco Fanti  
Via A. Dall'olio n 19  
40139 Bologna, Italy

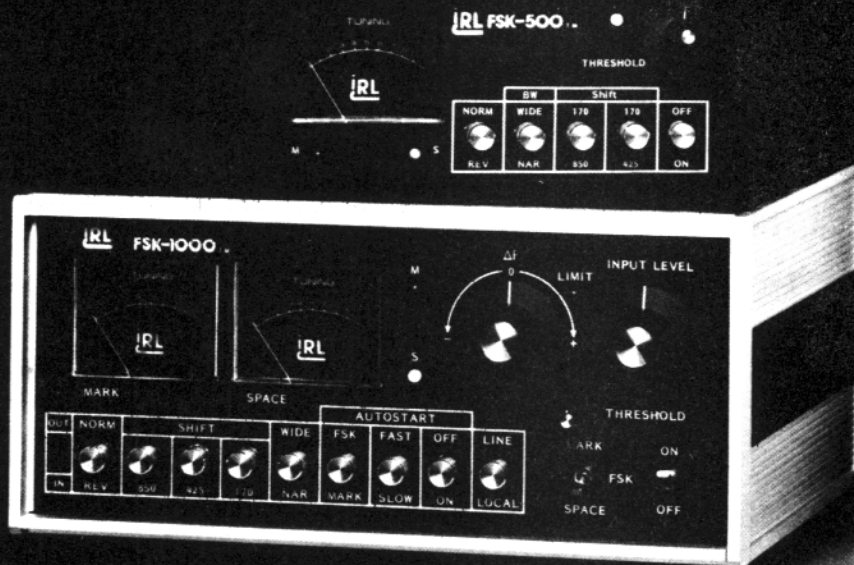
8) MULTIPLIERS: are given for countries and continents. A multiplier is given for each country worked on 14, 21, 28 MHz bands. NO MULTIPLIERS for 3.5, 7 MHz for ONE'S CONTINENT, but are multipliers if they are from a different continent. One's own country is NOT valid as a multiplier as a multiplier. The continents, valid as a multiplier, receive 100 points for each continent worked.

9) SCORING: TOTAL POINTS X TOTAL NUMBER OF COUNTRIES X TOTAL CONTINENTS POINTS =

EXAMPLE: 600 points for total x 10 countries worked x 100 continents points (max 600)=great total

10) BEGINNER PRIZE: RTTYers entering logs in the GIANT contest who continued on PAGE 11

# A RTTY DXers' Dream



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Both the FSK-1000 and FSK-500 are easily interfaced to your APPLE, TRS and HEATH computer.

Call for further details.

# VHF COLUMN

## by JOHN

JOHN CUNNINGHAM, WA9WJD  
POST OFFICE BOX 87  
PERRYVILLE, IN 47974

Where did 1981 go? What happened to all the things you were going to get done during the year? well, better luck to you in 1982.

I have heard from several of the local boys recently who were getting ready to get on RTTY. I always advise them, as I'm sure you do, "Don't skimp on the T.U." Most of the guys who ask me about RTTY seem to think they can get by with just "any ol' thing" T.U. I had a guy drop by the other day to ask some questions, he was getting ready to put an old width coil, 850 shift unit on the air. I was glad the guy had foresight enough to investigate before he went too far with the project.

Many of the operators who are on now, like myself, learned the T.U. lesson the hard way. I try to save the aspiring RTTYer from making this same mistake. One thing I tell them is put your money in a T.U. and then if you find yourself short of revenue buy an old machine, the 15's and 19's are still good.

With the dx as bad as it is you will find that guys who have a little interest in RTTY can be stirred into action now. One thing I have found which has helped get guys started is to keep track of where the old machines are. This way, when someone expresses interest you can steer him to some of the items he will need. If you can get the guy to spend a few bucks you have got him hooked, he will have to go the rest of the route to protect his initial investment. Neat way to hook them, huh?

THE RTTY JOURNAL IS OUT OF BEGINNERS HANDBOOKS AT THE MOMENT. THEY SHOULD BE AVAILABLE SHORTLY AFTER THE FIRST OF THE YEAR. WE WILL ADVISE YOU JUST WHEN.

Once a guy gets into this RTTYing real deep it seems that the word gets around and you get the inquires. It helps to keep up with all the new items on the market. You will find that you will get questions about what is available and where it can be found.

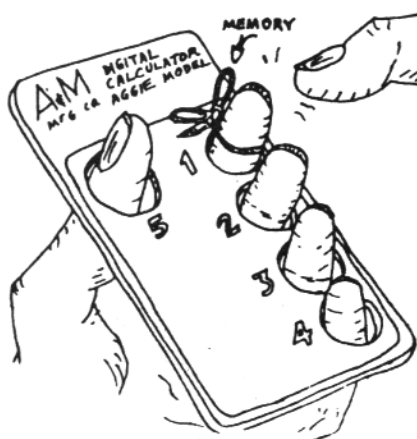
The RTTY operator seems to be hard pressed to stay up with it all so he can have the answers that he is expected to have. I do think it is important to keep myself informed since to me helping newcomers is one of the best things about our hobby.

Why not make a New Years resolution to find someone you can help to get started in RTTY.

The best to you and yours in the New Year.  
CUL on RTTY de John, WA9WJG.

---

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### CONTESTS CONTINUED

have not participated in either previous RTTY contests will receive an additional bonus of 5% of their final score.

11) HANDICAP: 21 10% of the final score of the winner of a previous RTTY championship or one RTTY contest.

12) SWLs: This contest is open to RTTY SWLs. The same scoring rules are valid.

A separate result table will be made for these entries. The logs for SWLers must contain: date, time (GMT), call sign of station heard, RST # of the QSO-continent of the station heard, country and continents multiplier, points and final score.

The same station is valid ONLY ONE TIME ON ALL BANDS.

13) PRIZES: are reserved for first place winners of each score list, consolation prizes will also be awarded.

14) RULES OF BEHAVIOUR: Logs must be compiled in accordance with the mentioned rules. The contacts must be made by means of the RTTY mode ONLY. That is other modes of transmission are not permitted before, during or after the exchange of the message by radioteletype. During the contest, it is expected that Amateurs will observe the fundamental rules of courtesy and good operating.

Failure to observe ANY of the above mentioned rules will result in the exclusion of the log from competition but the log may be used for a check-log.

All logs become the property of the IATG and will not be returned.

Decision of the IATG committee will be final and any subsequent controversy not be referred to Civil Court. (Above from the IATG rules).

CONTESTS\* CONTINUED  
 B.A.R.T.G. SPRING RTTY CONTEST 1982

There are two minor changes in the Rules for this contest compared with the Rules used in previous years, and these changes are:

1. Short Wave Listeners are now only required to log the message from the station heard, and not the messages from both stations involved in the contact.

2. Holders of existing QCA Awards are requested to list any new additions in the way of countries to be added to their records. In the past this has been done by the Contest Manager automatically, but the revised system will enable the up-dating process to be carried out more rapidly.

SEE DECEMBER 1980 ISSUE OF THE RTTY JOURNAL FOR COMPLETE RULES AND ADD THE ABOVE CHANGES.

RTTY DXers will have an opportunity to add Anguilla (VP2E) to their DXCC totals between February 23 and March 3, 1982.

A group of contesters will travel to Anguilla to participate in the ARRL CW and SSB DX Contests between February 15 and March 10, 1982. HAL Communications (ONE OF THE RTTY JOURNALS DISTINGUISHED ADVERTISERS) has agreed to loan two complete RTTY stations to enable the group to put Anguilla on, for what we believe to be, the first RTTY operation ever.

The RTTY equipment will be in use between contest weekends, from 23 February to 3 March. Calls to look for are: VP2EV (QSL to K8ND), VP2EJ (QSL to WA8CZS), and VP2ED (QSL to WB8VPA). Other call may appear on RTTY; QSL as directed by the operator.

While on Anguilla, we may choose to make a one day 'mini-DXpedition'

to French St. Martin (FS7) and Dutch St. Maarten (PJ7). This would likely involve a Saturday February 27 or Sunday February 28 single day visit, spending one half of the day as FGO-AMR/FS7 and the other half of the day as K8ND/PJ7. QSL both calls to K8ND. We will plan to do this only if there appears to be significant interest in having these two countries appear on RTTY, so please express your interest by dropping a note to K8ND as soon as possible.

We hope that an increasing number of DXpeditions choose to add RTTY to their operations, and we thank HAL Corporation for making the RTTY plans possible.

Above letter from Jeff Maass, K8ND/VP2EV 4410 Norwell Drive, Columbus Ohio 43220. U.S.A.

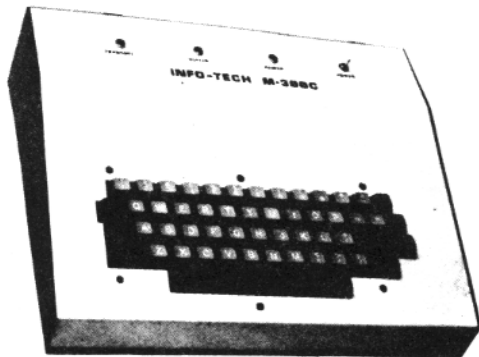
73's de SKIP WB6CYA.



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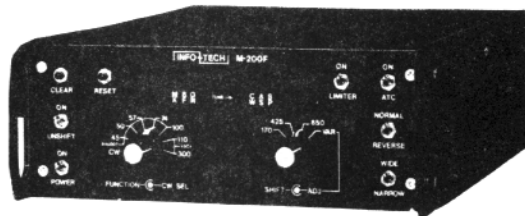
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TELETYPE EQUIPMENT & SUPPLIES. Model 28 ASR \$150; Model 28 RO \$125; Model 28 stand alone TD (LXD) \$75; Model 28 R-T (2 units & cabinet) \$250; Model 28 3-speed compact RO \$200. Roll paper (case of 12) \$25; fanfold \$14/box; ribbons \$7.50/doz; reperf tape 11/16 x 8 \$18/40 rolls. Wanted for collection: MXD 7.42 UC on 60; 28 Mark I KSR and ROTR manuals. New equipment list (1982) now available with many reduced prices. Please include SASE. Will consider trade for postage stamp collections or accumulations--send brief description. Write now! Poul Andersen, 115 Boyken Rd., Rochester, MI 48063. 313-652-3060.

FOR SALE, MODEL I TRS-80 16K with CTR 80 recorder like new in original carton \$550. M80 and M800 \$125. ST5 with meters and autostart \$65. Floyd Timmons, R2, Fredonia KS 66736. Phone 316-378-3379.

MODEL 32 ASR COMPLETE WITH 3 manuals \$100. Needs adjustments. Pick up only Mills, 26760 Shadowwood, Rancho Palos Verdes, CA 90274. 213-375-2758.

TYPE-BALL QSLs PRINTED 3 1/2 x 2"; white and colored stock; 500/\$8. 250/\$5; Can overprint your photo or anything else for extra cost of \$6 to produce cut (to print to size above) one time charge; Order now at these prices; Add approx. postage; D. Testa, 390 Lincoln Ave., (RJ) Nwk, NJ 07104.

VIDEO RTTY--TRANSMIT & RECEIVE MORSE, Baudot & ASCII. Xitex ABM-200 board and GTX video terminal (commercial grade). Add a TU and you are ready to go. \$400. W1FYR, Box 11, Fitzwilliam, NH 03447. 603-585-2253.

RTTY FOR SALE: 35KSR (2) \$295 each; 28 RO compact/gearshift (2) \$275 each; 28 keyboard typing reperf (3) \$195 each; 34ASR (28ASR in 35ASR cabinet) (2) \$495 each; 28 LXD stand-alone TD (10) 100 WPM \$95 each, 60 WPM \$117 each. Prices less packing & shipping. Send SASE for 5-page list & prices. Lawrence R. Pfleger, K9WJB, 2600 S. 14th St., St. Cloud, MN 56301. Phone 612-255-9794.

FOR SALE: 7TH edition of the LIST OF RTTY STATIONS IN FREQUENCY ORDER, now contains 2067 frequencies monitored in 1980-81 of commercial stations like press, aeronautical, weather, telex, military, diplo, maritime etc. on shortwave. Schedules of 88 news agencies on 741 frequencies are included, plus an alphabetical index to these press service stations. This offset printed list is airmailed to you for \$17 (check or cash) from: Joerg Klingenfuss, Panoramastrasse 81, D-7400 Tuebingen, West Germany.

TELETYPE PARTS WANTED. Any quantity, any models, highest prices paid. 201-464-5310 Van W2DLT, Box 217, Berkeley Heights, NJ 07922.

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1982 SAROC Annual Prestige Convention April 1-2-3-4. Aladdin Hotel. If you did not advance register for 80-81 SAROC send QSL card with SASE for details. POB 14217, Las Vegas, NV 89114

SALE! SALE! SALE! SALE! SALE! SALE! Heavily inked UPI ribbons, fits all Teletype machines \$6.50/dozen; perforator tape 11/16" wide by 8" diameter, case of 40 rolls \$19.50; strip printer tape 3/8" wide, white, ungummed, box of 25 rolls \$12; roll paper white or canary 5" diameter, case of 12 rolls \$29.00 or \$4.00 per roll; Model 28 TD self contained, stand alone \$99; Model 28 stand alone typing reperf with 3 speed gearshift \$120; single speed \$99; Model 28 TD self contained, stand alone with 3 speed gearshift \$225; Model 28 auxillary reperf type LARP, complete w/motor, base & mounting studs to fit inside model 28 ASR cabinet above TD E65; gears: Model 28 ASR 100 WPM printer \$9.50, TD \$10.50. Also available everything you need from Model 14 to Model 35 machines and parts. All prices are FOB Brooklyn, NY. Call for price. Atlantic Surplus Sales, 3730 Nautilus Ave., Brooklyn, NY 11224. (212)-372-0349.

**WANT ADS CONTINUED**

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**FOR SALE: THE RTTY JOURNAL** 2, 3, and 4 year libraries (limited time only). 2 year (20 copies) 1980 and 1981 \$31.00; 3 year (30 copies) 1979 thru 1981 \$41.00, 4 year (40 copies) 1978 thru 1981 \$51.00. All Libraries come with a handsome Hard Plastic book cover. Comes in three colors, black, white, and blue. Hard white cover alone \$10.00. Curtis Dahn, 2514-5 S. Sante Fe, Vista, CA 92083. Please allow 4-6 weeks for shipping.

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CW and RTTY WORLD CHAMPIONSHIPS

- Sponsored By:** 73 Magazine and The RTTY Journal
- Contest Period:** 10 - 80 Meter CW Event - 0000Z to 2400Z April 3, 1982  
10 - 80 Meter RTTY Event - 0000Z to 2400Z April 4, 1982
- Misc. Rules:** The same station may be worked ONCE per mode. Crossmode contacts do not count. Single operator stations may work 18 hours maximum per mode while multi-operator stations may operate the entire 24 hour period. Off times are no less than 30 minutes each and must be noted in your log(s).
- Operator Classes:** (A) Single Operator, Single Transmitter, Non-Computerized  
(B) Single Operator, Single Transmitter, Computerized  
(C) Multi- Operator, Single Transmitter, Non-Computerized  
(D) Multi- Operator, Single Transmitter, Computerized
- Computerized Stations:** To be eligible for the "computerized" class, your station must be interfaced with a microprocessor controlled RTTY and/or CW operating system such as the TRS-80, Heath/Zenith, Apple, Pet, OSI, Hal, Info-Tech, etc. Utilizing a memory keyer for CW does not constitute a computerized station.
- Entry Categories:** (1) CW Only (2) RTTY Only (3) CW and RTTY
- Exchange:** Stations within the 48 contiguous US States and Canada must transmit RST, State, Province or Territory. All others will transmit RST and consecutive contact number. If your station is computerized, add the letter "C" to the end of your exchange. (i.e. 599 WA C, 589 BC C or 579 001 C, 589 002 C etc)
- QSO Points:** One (1) QSO Point is earned for each valid contact. An additional BONUS point is earned if the station worked is "computerized" and sent a "C" at the end of his exchange.
- Multiplier Points:** One (1) Multiplier Point is awarded for each of the 48 contiguous US States, Canadian Provinces or Territories and DX Countries (outside the contiguous States and Canada) worked on each mode.
- Final Score:** Total QSO Points time Total Multipliers Equals CLAIMED SCORE.
- Contest Entries:** Entries must include a SEPARATE log for each event entered, a dupe sheet, summary sheet, multiplier check list and a list of equipment used for each mode of operation. Contestants are asked to send an SASE to the Contest address for OFFICIAL FORMS.
- Entry Deadline:** All entries must be postmarked NO LATER THAN May 10, 1982.
- Disqualifications:** Omission of the required entry forms, operating in excess of legal power, manipulating scores or times to achieve a score advantage or failure to omit duplicate contacts which would reduce the overall entry score more than 2% are all grounds for immediate disqualification.
- Awards:** Contest Awards will be issued in each entry category and operator class in each of the US Call Districts, Canadian Provinces and Territories as well as in each DX Country represented. Other awards may be issued at the discretion of the awards committee. A minimum of 5 hours and 50 QSOs must be worked on a mode to be eligible for awards.
- Contest Address:** Enclose an SASE to: CW and RTTY Championships  
% The RTTY Journal  
PO Box RY  
Cardiff CA 92007

# MPC-1000R BY DOVETRON

MULTIPATH CORRECTION, IN-BAND DIVERSITY, SIGNAL REGENERATION,  
UP-DOWN SPEED CONVERSION, 200 CHARACTER FIFO MEMORY,  
KEYBOARD-CONTROLLED WORD CORRECTION & DIGITAL AUTOSTART



THE MPC-1000R REGENERATIVE RTTY TERMINAL UNIT

The DOVETRON MPC-1000R is a complete Transmit-Receive modem designed for optimum radio teleprinter communications on land, sea and in the air.

Standard features include a high level loop supply and keyer (neutral or polar), EIA and MIL FSK outputs, a phase-continuous AFSK Tone Keyer with three selectable Mark - Space - Shift tone pairs, Mark, FSK & Digital Autostart, Automatic Markhold, an internal RY Generator for terminal unit Self-Test and circuit adjustment, and a Signal Loss Alarm circuit.

The MPC Series is available in six different models to meet your exact requirements.

**Complete specifications are  
available on your request,  
or call 213-682-3705.**



**627 Fremont Avenue  
South Pasadena,  
California 91030, U.S.A.**

**RTTY Journal**

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