RAINBOW
The Color Computer Monthly Magazine
ON DISK

December 1989

RAINBOW ON DISK contains the programs featured in the pages of THE RAINBOW, The Color Computer Monthly Magazine. It is intended as a companion to the magazine, not as a separate entity. The articles accompanying the programs in THE RAINBOW may include important information and system requirements necessary to the operation of the programs.

The disk is specially formatted and contains both BASIC and OS-9 operating system programs.

This edition of RAINBOW ON DISK includes:

Winter Magic - Let *Magic* turn your CoCo 3 display into a winter wonderland.
Snowman Blues - Enjoy the heart-melting story of Frosty the Snowman.
Peg Me - Test your I-Q with this peg positioning game.
Education Notes - Tis the season for rhyme and reason with *Poetry*.
The Quest - Search for the wonderous energy star in this a-mazing adventure.
Basic Training - Stretch your programming muscles with CoCo.
Personal Secretary - Write your personal CoCo Yellow Pages.
Wishing Well - Here's a tutorial for teaching your child to identify upper- and lowercase letters.
Turn of the Screw - RAM Disk, Part III. The final steps for testing and using your new RAM Disk.
Barden's Buffer - Study the innerworkings of gambling programs: random and pseudo-random numbers.

The "flip" side of this month's RAINBOW ON DISK includes:

Multi-Vue Applications - An icon editor to expedite getting those applications up and running in the *Multi-Vue* environment.
BreakPoint - Greg Law presents Steve Goldberg's su, a utility providing a much easier and faster method logging in under a different user ID.
Flipper09 - Capture your opponents pieces in this strategic board game.
Printing the Unprintable - Using arguments to keep it clean while listing binary files to the screen.

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Instructions for Use

This disk is a "flippy," formatted under Disk Extended BASIC on the front side and under the Microware OS-9 operating system on the back. To access the OS-9 programs on the back, you must remove the disk from your drive, boot your OS-9 system, turn the disk over and reinsert it.

Before you run any of the programs on RAINBOW ON DISK, you should first use the Disk BASIC BACKUP command to make a backup of both sides of the disk, giving you a working copy. For the protection of the RAINBOW ON DISK master, the disk does not have write-protects notches, so you cannot accidentally write to it.

The Disk BASIC portions of the disk are menu-driven. To begin, type RUN"MENU" and press ENTER. A menu of the files appears, from which you may run any of the BASIC programs by pressing its corresponding letter key. The machine language programs, indicated by an asterisk, *will not* run properly from the menu. These machine language files must be loaded and executed with the LOADM and EXEC commands.

When a file is run from the RAINBOW ON DISK menu, part of the menu itself remains in memory. Because of this, you may encounter an OM? Error on some of the programs, indicating that the file is too large for memory. If this occurs, you will have to remove the disk and turn off your CoCo for a few seconds, then LOAD and RUN the program as you normally would from Disk BASIC, bypassing the menu.

How Do I Get to the OS-9 Programs?

The OS-9 side of RAINBOW ON DISK contains two directories: CMDS and SOURCE. It also contains a file, read.me.first, which explains the division of the two directories. The CMDS directory contains executable programs and the SOURCE directory contains the ASCII source code for these programs. BASIC09 programs will only be offered in source form so they will only be found in the SOURCE directory.

OS-9 is a very powerful operating system. Because of this, it is not easy to learn at first. However, while we can give specific instructions for using the OS-9 programs, you will find that the OS-9 programs will be of little use unless you are familiar with the operating system. For this reason, if you haven't "learned" OS-9 or are not comfortable with it, we suggest you read *The Complete Rainbow Guide to OS-9* by Dale Puckett and Peter Dibble.

The following is not intended as a course in OS-9. It merely states how to get the OS-9 programs from RAINBOW ON DISK to your OS-9 system disk. Use the procedures appropriate for your system. Before doing so, however, boot the OS-9 operating system according to the documentation from Radio Shack.

1) Type load dir list copy and press ENTER.
2) If you have only one disk drive, remove the OS-9 system disk from Drive 0 and replace it with the OS-9 side of RAINBOW ON DISK. Then type chd/d0 and press ENTER. If you have two disk drives, leave the system master in Drive 0 and put the RAINBOW ON DISK in Drive 1. Then type chd/d1 and press ENTER.
3) List the read.me.first file to the screen by typing list read.me.first and pressing ENTER.
4) Entering dir will give you a directory of the OS-9 side of RAINBOW ON DISK. To see what programs are in the CMDS directory, enter dir cmds. Follow a similar method to see what source files are in the SOURCE directory.
5) When you find a program you want to use, copy it to the CMDS directory on your system disk with one of the following commands:

One-drive system: copy/d0/cmds/*filename*/d0/cmds/*filename-s*

The system will prompt you to alternately place the source disk (RAINBOW ON DISK) or the destination disk (system disk) in Drive 0.
Two-drive system: copy/d1/cmds/*filename*/d0/cmds/*filename*

Once you have copied the program, you execute it from your system master by placing that disk in Drive 0 and entering the name of the file.

Many of these programs require special loading instructions and other information necessary to the proper functioning of the program. For complete instructions regarding each of the following files on RAINBOW ON DISK, refer to the December 1989 edition of RAINBOW magazine. (The corresponding page number is noted for your convenience.)

Front Side Disk BASIC Files		Back Side OS-9 Files
Page	**Filename**	read.me.first
DECEMBER	MENU	**CMDS Directory**
Ø14	*SNOW	**Page** / **Filename**
Ø14	*BACKGRND	Ø40 / edic
Ø14	MAGIC	Ø89 / su
Ø20	FROSTY	1Ø6 / FlipperØ9
Ø28	COCO-Q	121 / read.b
Ø32	POETRY	122 / read.c
Ø47	THEQUEST	
Ø54	FLASHES	**SOURCE Directory**
Ø54	DRILL1	**Page** / **Filename**
Ø55	DRILL2	Ø40 / edic
Ø56	COCOMEMO	Ø89 / su.c
Ø61	UPLOCASE	1Ø6 / FlipperØ9
Ø64	GENTEST	121 / read.b
Ø66	GENDRIVE	122 / read.c
12Ø	RANDOM	
12Ø	SLOTS	

* Indicates a machine language program.

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