

# Open-Apple: Vol. 4

**Releasing the power to everyone.**

## Index to Volume 4

by Alan Womack

In the following index, a lowercase letter appears after each page number. This letter points to the column an entry appears in. For example, "47a" refers to the first column on page 47; "56c" to the third column on page 56.

All page numbers in *Open-Apple's* fourth volume begin with a 4, as in "4.33." To save space, the initial "4" was dropped from the page numbers in this index.

& (see ampersand)

### A

**A2-Central** 84b, 90c-91a  
**AUX** 19b  
**A+** (magazine) see (magazines; A+)  
**AC/BASIC** see (languages; BASIC; AC/BASIC)  
accounting software 2b-3a  
**ACOT** 43b  
addresses  
    49164 (\$C00C) 3b 40 columns on 80 columns off  
    49165 (\$C00D) 3b 80 columns on 40 columns off  
    49185 (\$C021) 3a Apple IIGS Monochrome/Color reg  
    49193 (\$C029) 3a, 63a Apple IIGS Video control reg  
    49232 (\$C050) 3b graphics display select on  
    49239 (\$C057) 3b graphics hi-res select on  
    49246 (\$C05E) 3b, 47a, 62c graphics double select on  
    49247 (\$C05F) 3b graphics standard select on  
**Advanced Disk Utilities** 77b, 85a-86c  
**A4** paper 61b  
**Agat** 91c  
**Ampersoft** see (languages)  
**APDA** 3b, 15a, 9a  
    sell out 85a  
    technical notes 59c  
    updates 75a-75b  
**APA Manuscript Manager** 68b-67a  
**APP-Star** 30b  
**Apple Assembly Lines** 38b, 65a  
**Apple Color 64K Extended Memory card** 3a  
**Apple Computer Inc**  
    APDA acquisition 85a  
    child care 27b  
    commitment to Apple II 73a  
        see also (Yocam, Del)  
    consumer relations 57a  
    dealer policy 57a, 62a  
    death threats of II 33a  
    education purchase policy 89a  
    education pursuit 51a-51b  
    clone encroachment 53b  
    faults 52a-52b  
    federal government sales 3b  
    jobs available 79b  
    price cuts 27b, 73a  
    price increases 74a  
    restructuring 51b, 67a  
    sales and marketing 27b-28a  
    technical support 57a  
    trademark policy 3b, 90c-91a  
    virus hunting 57b-58a  
**Apple File Exchange** 87a-87b  
**Apple Human Interface Guidelines** see (books)  
**Apple LaserWriter** see (printers; LaserWriter)  
**Apple ProDOS** see (books)  
**Apple Programmer's Introduction to the Apple IIGS**  
    see (books)  
**Apple Programmer's and Developer's Association**  
    see (APDA)  
**Apple Programmer's Workshop** see (languages)  
**Apple SANE** 9a-9b  
**Apple Technical Support** 57a  
**Apple III Business Basic** 9a  
**Apple 3.5 Drive Owner's Guide** see (books)

Apple II direction 41a-44  
    see also (Apple Computer Inc)  
    See also (Yocam, Del)  
**Apple II SCSI Card Technical Reference Manual**  
    see (books)  
**Apple IIc**  
    books see (books)  
    bugs see (bugs/ fixes; IIc)  
    entry points 38b, 96a  
    future of 47c-48b  
    memory expansion see (cards; memory)  
    microprocessor of see (chips; 65C02)  
    ROMs 19a  
    slashed 0s 47b-47c  
        see also (printers)  
    update 73a  
**Apple IIc Plus** 73a, 91b, 91c  
**Apple IIc Technical Reference Manual** see (books)  
**Apple IIe**  
    Apple II Workstation card see (cards; Apple II Workstation card)  
    memory expansion see (cards; memory)  
    interrupt handling see (interrupts)  
    microprocessor of see (chips; 6502) see also (chips; 65C02)  
    IIGS upgrade 61c  
**Apple IIGS**  
    Apple II Workstation Software 17a  
    Applesoft see (languages; BASIC)  
    BASIC see (languages; BASIC)  
    books see books  
    coldstart 21a-21b  
    composite monitor of see (monitors; composite)  
    control panel  
    display type 3a  
    options 15c-16a  
    desk accessories 15c, 32b  
        KEY.FR 95c  
        KEYUTIL 95c  
        limits 45b-45c  
        leading 38c, 45a-45b, 72b-72c  
        MECC Key Caps 95c  
    Desk Manager 15c  
    Desktop program 3a, 32b  
    disk drive disappearance see (bugs/ fixes; Apple IIGS)  
    display of 3a  
        see also (display)  
        see also (graphics)  
        see also (monitors)  
        see also (video)  
    dual speed keys 15c  
    fatal errors see (bugs/ fixes; Apple IIGS)  
    finder see Finder  
    freeze up see (bugs/ fixes; Apple IIGS)  
    game port strobe 23a  
    graphics see (graphics; Apple IIGS)  
    GS/OS see (GS/OS)  
    interrupt handling see (interrupts)  
    internal drive 23a-23b  
    memory expansion see (cards; memory expansion; Apple IIGS)  
        see also (chips; memory expansion)  
    monochrome monitor see (monitors; monochrome)  
    mouse woes see (bugs/ fixes; Apple IIGS)  
    networking see (networks)  
    printer drivers 38c-39a, 76b-77a  
    RAM disk see (RAM disks)  
    RAM5 see (RAM disks; RAM5)  
    RGB monitor of see (monitors; RGB)  
    registers  
        Monochrome/Color 3a  
    slots 21c, 62c, 68c-69a  
    system disk 21b-21c  
        3.2 50a-51a  
        see also (GS/OS)  
        see also (ProDOS 8)  
        see also (ProDOS 16)  
system files 21b-21c  
    ProDOS 2b  
    technical notes see (books; technical notes)  
    tools 51a  
    upgrade from IIc 61c  
**Apple IIGS Firmware Reference Manual** see (books)  
**Apple IIGS Hardware Reference** see (books)  
**Apple IIGS Machine Language for Beginners** see (books)  
**Apple IIGS Technical Note #29** see (books)  
**Apple IIGS Tool Box Reference, Volume 2** see (books)  
    Apple University Consortium 53a  
    **Apple User** see (newsletters; Apple User)  
**Apple Writer** 10a  
    Epson underlining 59b, 70b, 80a-80b  
    purchase 85a, 90b  
**Apple Rx** 35a-35b  
**Applefest** 11a, 29b  
    Cambridge Marketing 65a  
    dates 49b  
    pre fest report 65a  
**AppleLink** 42b, 44b  
    see also (Quantum Computer Systems)  
**AppleSC CD** 18a  
**AppleShare** see (networks; AppleShare)  
    AppleWorks 26a  
    Aristotle 17b  
    File Server 2.0 17a  
    Print Server 17b  
    protocols 26a  
    Share-Aware 17a  
**AppleSoft BASIC** see (languages; BASIC; Apple-Soft)  
**AppleTalk** see (networks; AppleTalk)  
**AppleWorks**  
    @LOOKUP 60c  
    ADB READER 7a-7b  
    A4 paper 61b  
    Apple IIGS version see (GSWerks)  
    AppleShare 28a  
    books see (books)  
    bugs see (bugs/ fixes; AppleWorks)  
    Claris support see (Claris; AppleWorks; support)  
    clipboard 20c, 81a-84a  
    clocks with see (bugs/ fixes; AppleWorks)  
        clocks)  
    continuous paper 70a-70b  
    copies expansion 7a  
    date insertion 37c  
    data base  
        conversion to see (data bases; conversion)  
        mail merge 7a  
    desk accessories  
        bugs see (bugs/ fixes; AppleWorks; desk accessories)  
    desktop expansion 68c  
    DIF files 81b-81c  
    disassembly 38b  
    double blank 6a-6b  
    encryption 7b  
    enhancement discussion 6b, 6c  
    file number limit see (bugs/ fixes; AppleWorks)  
    foreign languages 47b, 71c, 80a, 87b-88a, 95a-96a  
    gaps in text files see (patches; AppleWorks)  
    headers 7b  
    interface see (interfaces; AppleWorks)  
    keylock 93c  
    mail merge 20c  
    mouseleft return symbol 60c, 68b  
    network version 20b  
    networks 17a  
    newsletters about see (newsletters)  
    numerical sort 37b  
    open-apple L(layout) 69a  
    open-apple O(options) 60b  
    open-apple Z(zoom) 60b  
page print 38a  
    passwords 7b  
    pathnames 20b, 20c  
    patches see (patches; AppleWorks)  
    power use tips 94c  
    right justification 7b  
    ROMdisk 61a  
    security 7b  
    single sheet paper 70a-70b  
    slashed zeros 20a-20b, 29c  
    slot support 21c, 61a, 68c-69a  
    sort 37b  
    speed differences 6b  
    spreadsheet  
        save bug see (bugs/ fixes; AppleWorks;  
        spreadsheet loose)  
        transferring values 37b  
    see also (Beagle Bros; SpreadTools)  
    subscript printing 30c, 48b-48c  
    superscript printing 30c, 48b-48c  
    support see (Claris; AppleWorks; support)  
    TimeOut see (Beagle Bros)  
    updates 57a  
    upgrades 2a  
    use's groups 12a, 27b  
    word processor  
        right justification 7b  
**AppleWorks GS** 49a, 95c-96a  
**AppleWorks Tips and Techniques** see (books)  
**AppleWorks User Group** The 12a  
**Applied Engineering** 3b  
    see also (cards; Applied Engineering)  
    updates see (upgrades)  
**App-Sys** 30a-30b  
**APW C** 3b  
**Aristotle** 17b  
**ASCII** 12b-13a, 31b-31c  
**ASCII Express** 13a  
auto answer see (modems; auto answer)

### B

**Backup II** 11a, 19a, 29b  
    see also (bugs/ fixes; Backup II)  
**Bag of Tricks** 2 50a  
**Bank Street Writer Plus** 31b  
**BASIC\_LAUNCHER** 4c  
**Basic.system** see (ProDOS 08; Basic.system)  
**baud** see (modems)  
**Beagle Bros** 2b  
    *Beagle Compiler* 40c, 45b, 55c-56a, 72c  
        Roger Wagner Toolbox routines 78a-78b  
**Desktop Tools**  
    Case Converter 83b  
    File Encryptor 7b, 83a  
    Page Preview 60a, 83a  
    Word Count 83b  
**Desktop II**  
    DirCTree 83b  
    File Search 83b  
    FileMaster 83b  
    MacroTools 84a  
    MacroTools II 84a  
    MacroWorks 31c-32a  
    MiniPaint 84a  
    MiniPix 59c  
    PowerPack 83a-83b  
        ASCII Values 83b  
        AWP to TXT 83b  
        Category Search 83b  
        Desktop Sorter 83a-83b  
        File Librarian 83b  
        Help Screens 83b  
        Line Sorter 83b  
        Program Selector 83b  
        Triple Clipboard 83a  
        Triple Desktop 83a  
        Quickspell 2b, 81a-82a  
        SideSpread 82b

# Open-Apple: Vol. 4

SpreadTools 82b-83a  
SuperFonts 46a, 82a-82b  
fonts 64c  
foreign language printing 95b  
Print Shop graphics 22b, 59c  
Thesaurus 46a, 82a  
TimeOut 2b, 81a-84a  
installing 81a  
TimeOut Graph 22b, 46a, 82a, 93b  
TimeOut Paint 82a  
Ultramacros 2b, 6b, 37c, 83b  
keylock 93c  
task file 67b  
updates see (upgrades)

Beagle Compiler see (Beagle Bros)

binary 31b-31c

binary II 1b, 13a

Binary II Library Utility 24c

Block Warden see (ProSEL; Block Warden)

BLU see (Binary II Library Utility)

books

Apple Human Interface Guidelines 2b

Apple ProDOS 90a

Apple Programmer's Introduction to the Apple IIgs 29b

Apple 3.5 Drive Owner's Guide 11a

Apple II SCSI Card Technical Reference Manual 2c

Apple IIc Technical Reference Manual 38b

Apple IIgs Firmware Reference Manual 68b

Apple IIgs Hardware Reference 23a

Apple IIgs Machine Language for Beginners 51a

Apple IIgs Tool Box Reference, Volume 2 64c

AppleWorks Tips and Techniques 6b, 37b

Compact Numerical Methods for Computers:

Linear Algebra and Function Minimization 56c

Commodore 64 Programmer's Reference 91c

CP/M Bible 55a

CP/M Handbook 55c

Curriculum Software Guides 85a

Exploring Apple GS/OS and ProDOS 8 90a

Microcomputer Displays, Graphics, and Animation 92a

Osborne/McGraw-Hill CP/M User's Guide 55c

ProDOS Technical Reference Manual 19a

Programmer's Handbook of Computer Printer Commands 70c

Programmer's Introduction to the Apple IIgs 71c

RS-232 Solution 39c

Sybex Computer Blue Book 79b

Technical Introduction to the Apple IIgs 23a

technical notes

Apple IIgs Technical Note #27 24c

Apple IIgs Technical Note #29 3b

Misc. Technical Note #10 96b

obtaining 59c

Technology Planning Guide 85b

Understanding the Apple IIe 69b

UniDisk 3.5 Owner's Manual 11a

booting 78b-78c

Bredon, Glen 15b

see also (ProSel)

buffers

printer 22a-22b

see also (cards; Orange Micro)

see also (cards; printer)

bugs/ fixes

ADB.READER 7a-7b

apple keys 37a-37b

Apple II ROMS 19a

Apple IIgs

freeze up 46c-47a

fatal errors 47a, 61c-62a

disk drive disappearance 49b

game port strobe 23a

graphic upset 32a-32b, 93b

mouse 61c

RAM card 49b

Unclaimed Sound Interrupt 61c-62a

Apple Writer 59b, 70b, 80a-80b

AppleWorks

ADB.READER 7a-7b

clipboard 37b

clocks 16a, 21c

control-@ 29c

database

report formats 7a, 16b-16c, 36c

loose 7a, 16b-16c, 36c

desk accessories 21c

file number limit 6c-7a, 32c

graphic upset on IIgs 32a-32b

mail merge 20c

margins 60a-60c

pathnames 20b

75-file bug 6c-7a, 32c

64-file bug 32c

slashed zeros 20a-20b

slot woes 21c, 61a, 68c-69a

spreadsheet loose 36c

standard values 37a

Basic System

Chain 16c, 24c, 29b

control-s pause 51a

directory entries 51a

directory length 65a-66a

Store 16c, 24c, 29b

Backup II 11a, 19a

C.M.S.

hard disks 3b

SCSI card 23b-23c, 29b

display Igs 21c

FID 19a

Finder 51a

GS/OS

delete 89b-90a

modems

auto answer 19b

printers

paper slipping 16c, 20b, 31a

spurious character 59a-59b

TYMAC printer card 92a

ProDOS 8

capacity 51a

crash track zero 2b

date stopping 2a-2b

delete 89b-90a

interrupts 51a

time stopping 2a-2b

track zero crash 2b

RamFactor 21c

SCSI card 18a-18b

partitioning software see (partitioning)

System Utilities 40b

TYMAC printer card 92a

video commands 38b-38c

virus cure

CyberAIDS 50a, 57b-58a

Festering Hate 57b-58a

bulletin boards

general discussion 25a

GBBS Pro 29a

GENIE 1a-2a, 12a, 19b

use of 25a-27b

soe also (roundtables)

Prime 29a

ProLine 24c, 29a

ProTree 24c, 29a

Let's Talk 29a

## C

C (APW) 3b

cables

AppleTalk see (AppleTalk)

modem see (modems)

printer see (printer)

RGB see (monitors; RGB)

SCSI see (SCSI)

cad/cam software 30b-30c, 47c

CADRAW 30c

CADDRAW 30c, 47c

Call A.P.P.L.E. see (magazines, Call A.P.P.L.E.)

Cambridge Marketing 85a

Cat Doctor see (ProSel, Cat Doctor)

cards

accelerator 47c

Apple Color 64K Extended Memory card 3a

Apple Parallel 39b

Apple II Workstation card 17a

AppleTalk 11a-12a, 17a

Applied Engineering

PC Transporter 3b

RamFactor 68c

RamKeeper 94a-94c

RamWorks 68c

ZRAM 54c, 68c

Checkmate Technologies

RamKeeper 94a-94c

MultiRam 68c

Cirtech Limited 94a-94c

GS-2 21b, 94a

GS-8 21b, 94a

PR-1 93c

StatDisk 93c, 94a-94b

CP/AM 55a

CP/M 55a-55c

interface

AppleTalk 11a-12a

modem 14b

printer

Apple Parallel card 24b, 92a

AppleTalk 11a-12a

Grappler C/Mac/GS 10b-11a, 22c, 48b-48c

PrintMax 24b

Orange Micro see (cards; Orange Micro)

TYMAC 92a

MCT Speed Demon 47c

memory expansion, Apple

Apple Color 64K Extended Memory card 3a

Apple Memory Expansion 68c,

Apple IIc 68c

Apple IIc-Plus 68c, 85a

Apple Igs 21a-21b

MIDI 11a

Orange Micro

buffers 22a-22b, 58c

upgrade 68b

C/Mac/Gs 30c-31a, 48b-48c

ImageWriter 22a-22b

RamPack 11a

PC Transporter 3b

printer see (cards; interface; printer)

RAM

Apple 49b, 68a

RamPack 11a

SCSI

bugs/ fixes see (bugs/ fixes; SCSI)

interfacing 46b-46c, 85a-86c

manufacturers 86a

partitioning see (partitioning)

revision C 18a-18b, 29b, 85a-86c

serial 14b

resetting 59a

video 35b-36a

work station see (cards; Apple II Workstation )

CD-Rom 11a, 17a-18b

Central Point Software 79b

see also (Copy II Plus)

Chameleon 40b-40c

Checkmate Technologies

updates see (upgrades)

Chinook Technologies 36a, 46c

chips

accelerator

Rocket 47c

Zip 47c

Mega II 41a

microprocessors

6502 15a, 41a

6510 91c

6502 15a, 33a, 48b

65c265 33a-34a

65c802 23c, 33a, 48b

65c816 15a-15c, 23c, 33a, 42a

65c832 33a-34a

68000 41b

RAM 18b-19a, 45c-46c

CAS 49b-50a

compatibility 49b-50a

dynamic 94b

4-meg 87a

NEC 49b

RAS 49b-50a

static 94b

RISC 33b, 53a

Rocket 47c

video

Apple IIgs 46c-47a

character set 69b-69c

Zip 47c

rebooting with 62b

Chooser.II 11b

Claris

Apple II commitment 74b

AppleWorks see also (AppleWorks)

acknowledgement of 18a

phone numbers 10a

support 2a, 10a, 18a

technical support 10a

upgrades 2a, 74b

AppleWorks GS see (AppleWorks GS)

Styleware buy out 49a

formats 18a-18b

High Sierra 18a, 76a, 76b

composite monitor see (monitors; composite)

ComputerServe 12b

Computer Friends 94a

ComputerFacts 40b

Computist 23a

communications see (bulletin boards)

communications software see (modems)

CommWorks 13a

copy protection 4b, 23a

Copy II Plus 7a

archive ability 31b, 36a

compatibility 22b

duplicate pathname 8b

Corvus 28a

CP/AM 55a

CP/M 31b, 55c

cards see (cards; CP/M)

languages 54c, 55a-55c

operating system 55a-55c

Epic Technologies 64a  
Epson 11a, 22c  
*EuroWorks* 80a, 88a-89b, 95a-96a  
evangelism groups 18b  
exec 4c-5a  
*Exploring Apple GS/OS and ProDOS 8* see (books)  
exponents 23b, 56b

**F**

*Fastdata Pro* 28b, 58b-58c  
*Festering Hate* 57b-58a  
FID 19a  
see also (bugs/ fixes; FID)  
file system translators see (GS/OS; FST)  
file server 17a  
files  
binary 31b-31c  
conversion 39c-40b  
service for 87a  
System Utilities bug see (bugs/ fixes; System Utilities)  
DIF 61b-61c  
I/O ERROR 69c  
record length 64b  
recovering 70a  
see also (diskettes; recovery)  
disk limit 93a-93b  
*Finder* 4a-5a, 91a-91b  
cluttered opening 24a  
crash fix 51a  
enhancements 79a  
file type 21a  
GS/OS 77a  
icons 4b, 93a  
launching applications 4c-5a  
preferences 24a  
RAM 5a  
Special Menu 24a  
update see (upgrades)  
Fitzgerald, 15b  
Floating Point Engine The 44b-45b  
foreign languages 47b, 71c, 80a, 87b-88a, 95a-96a  
folders 17a  
see also (ProDOS; subdirectories)  
fents 64c, 76b

**G**

Gassee, Jean-Louis 51a, 52b, 67a  
General Electric 1a  
GENie see (bulletin boards; GENie)  
GET\_FILE\_INFO 88b  
GraphMerge 22c  
Graphic Edge 22c  
graphics  
Apple Igs 24c, 32a-32b, 93b  
AppleWorks 22b-22c  
cards see (cards; video)  
composite 3a  
file formats 24c  
genlock 55c  
graphing 93a-93b  
hi-res  
double 3a-3b  
information 91c-92a  
monochrome 3a  
paint formats 24c  
RGB 3a  
software 22b-22c  
video cards see (cards; video)  
video tape labeling 56c  
Grappler C/Mac/GS see (cards; interface; printer;  
Grappler C/Mac/GS)  
GS Basic 8c  
GS/OS  
Advanced Disk Utilities 77b  
FST 76a-76b  
Installer 77b  
scripts 77a-79b  
introduction 73a, 74b, 75b-78b  
RESET 86c, 90a-90b  
system disk concept 76b  
thermometer 93b  
versions screen 85c, 93b  
GS16Forth see (languages; Forth)  
GSWorks 46b  
government sales of Apples to 3b  
Gutenberg 59a

**H**

Hal Labs 15b, 54c  
hard disks  
Apple SC40 11a  
Apple IIC 48b, 54a  
see also (hard disks; Chinook Technologies)  
backing up 11a  
Bernoulli 54a  
building 86b  
Chinook Technologies 36a, 85a-85b

IIC 73b, 86c-87a  
C M.S. 3b, 11a, 23b-23c, 85b  
formatting 85a-86c, 90a-90b  
partitioning see (partitioning)  
pricing 53b-53c, 71a-71b  
ProApp 48b, 54a  
SCSI 3b, 48b-46c  
see also (cards; SCSI)  
Sider 20a  
*Hardcore Computist* see (Computist)  
Hayes 13b  
Hayward, Lee 12a  
Henson, Keith 34a  
High Sierra see (compact disks; High Sierra)  
HodgePodge 71c  
Human Systems Dynamics 21a  
HyperFORMAT 12a  
HyperCard 10b, 18a  
Igs 51a, 75a  
HyperStudio 75a

**I**

I/O ERROR 69c  
IBM  
education pursuit 51a-51b  
PC 3b, 5b  
peripheral pricing 53b-53c, 71a-71b  
icons 4c, 93a  
Icon Editor 4c, 93a  
Iconix 64b  
icons 4b-4c  
editor 4c  
see also (finder)  
*Information Exchange The* 53b  
InfoWorld 1a  
INSTALLDA 38c  
interface cards  
see (cards; interface)  
interfaces  
Apple Human Interface Guidelines 2b  
AppleWorks 2b  
cursor point-and-select 2b  
desktop 2b  
Macintosh 2b  
interference 64a  
ImageWriter II see (printers; ImageWriter II)

**J**

Jameco Electronics 23c  
Jem Software 29c, 84a  
Johnson Associates 28a

**K**

Kay, Alan 79a  
Kelly, Steve 4a  
Kermit 30c  
Kinko's Academic Courseware Exchange 21a  
Kula Software 36a-36b

**L**

languages  
AC/BASIC see (languages; BASIC; AC/BASIC)  
Ampersoft 56c  
assembly 54b-54c  
Apple Programmer's Workshop 54b-54c  
LISA 54b-54c  
LISA816 15b, 54c  
Merlin Pro 54b-54c  
ORCA/M 54b-54c  
S-C Assembler 15b, 54b-54c  
BASIC  
AC/BASIC 9a-9b  
Applesoft 23b  
assembly run 69c-70a  
Beagle Compiler see (Beagle Bros)  
disk free space 88b  
entry of programs 78c  
floating point math 44b-45b, 55c-56a  
formatting under 56c  
graphics Igs 64b  
initializing 56b  
sounds Igs 64b  
space saving 56b  
BASIC (Pecan) 72a  
GS BASIC 8c, 91b  
Microl Advanced BASIC 74b-75a  
Microl Basic 9a  
Nevada Basic 55a  
ORCA Basic 9a, 54b-54c  
TML Basic 9a, 54c  
ZBasic 8b-8c, 9a, 32b-32c

**C**

Apprentice C 54c  
APW 3b  
Aztech C65-c 68a-68b  
Aztech C65-d 54c  
CPrime 54c

Mix Software C 55b-55c  
COBOL  
Microsoft COBOL 54c  
Nevada 54c, 55a-55b  
CP/M 54c, 55a-55c  
Forth  
GS16FORTH 54a-54b  
Fortran

Fortran 77 (Pecan) 72a  
Nevada Fortran 55a-55b  
GS Basic see (languages; BASIC; GS BASIC)  
GS16FORTH see (languages; Forth;  
GS16FORTH)

Logo 92b-92c

Life 92b

Phantom Fish Tank 92b

Macintosh Programmer's Workshop 54b-54c

Modula-2 72a

Pascal

Apple Pascal 54b-54c, 58a

Nevada Pascal 55a

ORCA/Pascal 54b-54c

TML Pascal 54c

Turbo 55b

USCD 55b, 72a

Pilot

Nevada Pilot 55a

ZBasic see (languages; BASIC; ZBasic)

Lambert, Ross 28b

Laser 128EX 48a

LaserWriter see (printers; LaserWriter)

Late Nite Patches 57b, 84a

LAUNCHER.SYSTEM 65a

LCSI 92b-92c

Legos 92c

Life 92b

LISA (assembler) see (languages; assembly)

Lisa (computer) 41b

Lisa816 see (languages; assembly)

Little, Gary 1b, 28a

Living Legends 12a

Logo see (languages; Logo)

LogoWriter 92b-92c

Loren, Allan Z. 51b

Lotus Inc. 59a

Lotus, Paul 10b

**M**

MacInker 94a

Macintosh

BASIC for 9a

beginnings of 41b

file serving 17a

HyperCard 10b, 18a, 75a

interface 2b see also (interfaces)

MicroSoft BASIC 9a

Multifinder 18a

MacroMate 75a

macros 13a-13b

MacroMate 75a

see also (Beagle Bros; MacroWorks)

magazines

A+ 10a-10b, 28a

Apple User 32c, 65a, 93c

Call A.PPL E. 30b, 47c, 56a

Computer Shopper 55b, 86b

Consumer Reports 72c

InCider 92a

indexes 36a-36b

InfoWorld 1a

Nibble, 4a

Pom's 96a

Sky and Telescope 36a

Softalk 92a

Wall Street Journal 2a

magnets 3b

Manx 54c-55a

Master CDA 45c

MATC-CAD 30c

math

Applesoft see (languages; basic; Applesoft)

coprocessors see (chips; math coprocessors)

Manzanita Software 2b

MCT Speeddemon 47c

MECC Calendar Crafter 95c

MECC Key Caps 95c

Mega II see (chips; Mega II)

MegaBoard 53b, 71a-71b

megahertz 33a

memes 33a-34b

memory expansion see (cards; memory expansion)

Mensch, William 15b, 33a-34a, 42a

Merlin assembler 15b, 15c

8/15 48b

updates 51a

MGA MicroSystems 36b

Microl Advanced BASIC see (languages; BASIC)

Microl Basic see (languages; BASIC)

Microl Systems 9a, 74b-75a

Microcomputer Displays, Graphics, and Animation  
see (books)

MicroModem II 13b

MicroProcessors Unlimited 18b

MicroSoft Basic 9a

MicroSoft Works 49a

MicroSparc 56c

MIDI

cards (see cards; MIDI)

Diversi-Tune 45b-46a

Ilgs tools 51a

MinPaint see (Beagle Bros)

Mix Software 55b

MLI see (Prodos 8; MLI)

modem 12a-14b

AT command set 14a, 19b

auto answer 19b

baud 14a

bulletin boards see (bulletin boards)

cables 39c, 58b, 70c-71a

connection to 14b

CP/M 39c

external 14a

GENie see (GENie)

Hayes compatible 13b-14a

internal 14a

international use 63c-64a

ProCom 5b

serial interface 14a

software 12a-14b, 28a, 30c

telecommunications see (telecommunications)

monitors

composite 3a

Apple Igs 3a

monochrome 3a

Apple Igs 3a

RCA jacks 3a

RGB 3a

Apple IIC 31a

Apple Igs 3a, 31a

cables 79b

color warping 3b

composite 31c

protocols see (protocols and standards; RGB)

monochrome monitor see (monitors; monochrome)

MouseTalk 13a

MouseWrite 22a

MS-DOS 5b

MultiFinder 18a

MultiScribe see (Styleware; Multiscribe)

**N**

NEC 49b

networks see also (AppleShare)

AppleShare 17a-18a

AppleWorks 28a

Anristle 17b

File Server 2.0, 17a

Print Server 17b

ProDOS 8 compatibility 80b

protocols 26a

Share-Aware 17a

AppleTalk 11a-12a, 17a-18a, 28a

connectors 28a

Igs workstation 52b-53a

Omninet 28a

Sider hard disks 28a

Usenet 63c

newsletters

Apple Direct 89a

Apple Viewpoint 67a

Desktop Publishing Newsletter 3b

Reboot 28b

Works The 28b

ZBasic 32c

NH Analytical Software 21a

Nibble see (magazines; Nibble)

Nifty List 45b

NTSC see (video)

Nuclear Decisions 28b

Nuclear Decisions II: 1980-1988 28b

**O**

object module format 15c

on-line networks 1a-2a

Open-Apple

A2-Central 84b, 90c-91a

changes 3b-4a, 84b

corrections 4a, 29a, 45a-45b, 64b, 68a, 85a

country designations 80c

GENie 48c

expansion of 4a, 84b

personnel of 4a

subscription increase 4a

Orange Micro see (cards; Orange Micro)

ORCA 15a-15c

ORCA Basic see (languages; BASIC; Orca BASIC)

Osborne/McGraw-Hill CP/M User's Guide see

# Open-Apple: Vol. 4

(books)  
Owl International 10b  
Oz DOS 38b

## P

P8CDA 38c, 45a  
Paintworks 24c  
PAL see (video)  
parallel processing 33a, 42a  
parity 14b  
partitioning 11a, 18a-18b  
  Advanced Disk Utility 77b, 85a-86c  
  SCSI 23b-23c, 29a  
Pascal 13b  
speed loading 31b  
patches see also (bugs; fixes)  
  Apple Writer 80b  
  AppleWorks  
    bypass startup 68c  
    control-@ 29c  
    cursor image 68b  
    copy machine 7a, 79b, 85a  
    cosmetics 61b  
    desktop left 95a  
    file changes 95a  
    file number limit 32c, 45a  
    gap patch 60c-61a, 87b  
    mouse/text return find 60c, 68b  
    overset starup 15c, 19a  
ROM disk 79b-79c  
slashed zero 29c  
slot support 61a, 68c-69a  
Swedish patch 69b  
type control disable disabler 19a, 29a, 37a  
vertical lines 69b  
Basic.system see also (bugs; fixes)  
display auxtyp 93a  
DOS 3.3 CAT command 69c  
80 column boot 56a-56b  
RANA drives 63b  
SuperCalc IIgs 63c  
*PatchMania* 29c, 84b  
updates see (upgrades)  
*PathFinder* 30a, 84a  
  updates see (upgrades)  
PC Transporter see (cards; PC Transporter)  
*Phantom Fish Tank* 92b  
phones see (telecommunications)  
pick/store 96a-96c  
Pinpoint  
  GraphMerge 22c  
  Graphic Edge 22c  
Point-to-Point 13a  
Pom's 96a  
Power of Nation States 28b  
PostScript 9b-10a  
Prairie Power battery pack 5b  
printers  
  Apple Dot Matrix 39b  
  battery powered 5b  
  buffers 22a-22b  
  care of 16c, 20b, 31a, 70a-70b  
  cables 70c-71a  
  color 8a  
  drivers see (drivers; printer)  
  Diconix 5b  
  Epson 11a  
    Apple Writer 59b, 70b, 80a-80b  
    Apple IIgs support 38c-39a  
    LO series 22c, 38c-39a  
  foreign language wheels 69b-69c  
  interfaces  
    see (cards; interface; printer)  
ImageWriter II  
  A4 paper 61b  
  Apple IIgs support 38c-39a  
  AppleTalk connection 11a-11b  
  control-@ 16a, 29c  
  driver 51a  
  foreign languages see (AppleWorks; foreign languages)  
  paper-sensor 31a  
  pastel colors 8a  
  print width 71a  
  zero slaching 16a, 29c  
ImageWriter LQ  
  color printing 93c-94a  
  driver 51a  
LaserWriter 9b-10a  
  driver IIgs 51a  
on-line? 24a-24b  
paper slipping 16c, 20b, 31a  
platen cleaning 16c, 20b, 31a  
scanning device 59c  
*Printrix* see (desktop publishing; programs; Printrix)  
ProApp 48b  
ProCMD 56c  
ProDOS 8 see also (ProDOS 16)  
  AppleTalk support 11b  
Basic system

80 column boot 38a, 56a-56b  
formatting disks 56c  
version 1.2 65a-66a  
binary II support 1b, 13a  
Bird's Better Bye 8a-8b  
booting 78b-78c  
BYE 8a  
CHAIN see also (bugs/ fixes; Basic System)  
crashes of see (bugs/ fixes; ProDOS 8)  
date stopping 2a-2b  
FLUSH 23b  
formatting 56c  
MLI 64c, 80b  
partitioning see partitioning  
RANA drives 63b  
record length 64b  
STORE see also (bugs/ fixes; Basic System)  
subdirectories 17a, 31c  
time stopping 2a-2b  
quit routine 8a-8b, 79c-80a  
zero page use 70a  
ProDOS 16 see also (ProDOS 8)  
  AppleTalk support 39b  
  AppleTalk support 11b  
  binary II support 1b, 13a  
  booting 78b-78c  
  executing files 39b  
  partitioning see (partitioning)  
  QUIT code 79c-80a  
  subdirectories 17a, 31c  
*ProDOS Technical Reference Manual* 19a  
*Programmer's Handbook of Computer Printer Commands* see (books)  
*Programmer's Introduction to the Apple IIgs programs* see (books)  
  Get\_Time call 7c-8a, 23b  
IIgs Color Killer 63a  
ProLine Bulletin Board System see (bulletin boards)  
ProPacker 40a-40b  
ProTerm 32b  
ProTree Bulletin Board System see (bulletin boards)  
ProSEL  
  Back up utility 29b  
Block\_Warden 7a  
Cat\_Doctor 24c, 29a, 69a  
Find\_File 29a  
Mr.Fixit 50a  
Scavenge 69a  
ProScript 30a  
ProTerm 13a  
protocols and standards  
  AppleTalk 11b  
  AT command set 14a  
  character set 71c  
  character tables 69b  
  RGB 3a  
  Hayes 14a  
  slots 11b, 62c  
  telecommunications 13a  
  xmodem 13a  
Publish It! see (desktop publishing; programs;  
  Publish It!)  
publishing programs see (desktop publishing; programs)  
PypeLine 92a

## Q

Quantum Computer Systems 1a, 42b, 44b  
Quark Technologies 48b  
Quickspell 2b

## R

RAM chips see (chips; RAM)  
RAM disks  
  copying to/ from 31b, 36a, 40b  
  RAM5 5a, 21a-21b  
  rescue of 40c  
  sizing 47a-47b, 62a-62b  
RAM5 see (RAM disks; RAM5)  
Rana drives see (disk drives; Rana)  
RAW\_APPLE 12a  
RCA jacks  
  video 3a  
Reboot (newsletter) see (newsletters; Reboot)  
reboot (computer) 62  
Redshift Limited 35b-35a  
registers  
  Apple IIgs  
    Monochrome/Color register 3a  
    Video control register 3a  
RESET 88c, 90a-90b  
RESUME 69c  
RGB monitors see (monitors; RGB)  
RISC see (chips; RISC)  
Rocket chip see (chips; Rocket)  
Roger, Coats 5b  
Roger Wagner Publishing 45b, 51a, 54c

*Beagle Compiler* tool box routines 78a-78b  
ROM  
  disks 61a  
roundtables 1a-1b, 19b  
  A2 26a  
  A2Pro 26a  
  use 25b-27b  
RS-232 Solution see (books)

## S

Sander-Cederlef, Bob 15b  
Sandys, Peter 51b-52b  
SANE 9a-9b  
SC Assembler see (languages; assembly)  
SC Software 15b, 54b-54c  
screen holes 40c  
SCSI

  card see (cards; SCSI)  
  commands 86c  
  compact disks 18a-18b  
  device limit 71a  
  formatting 85a-86c, 90a-90b  
  hard disks see (hard disks; SCSI)  
  partitioning see (partitioning)  
  security 7b, 7c

Szetela, David 18b  
share-aware see (AppleShare; share-aware)  
shareware 13b  
*Shem the Penman's Guide to Creative Writing, Reasoning, and Programming* 66a-66b  
Sider see (hard disks; Sider)  
Sideways 22c  
*Sky and Telescope* see (magazines; Sky and Telescope)

## slets

  Apple IIgs see (Apple IIgs; slots)  
  AppleWorks support see (bugs/ fixes; AppleWorks)  
SmartPort 49b, 62c, 86b-86c  
So What Software 64b  
SoftDisk 23b  
SoftSpoken Ce, 87b  
SoftSwitch 75a, 94c  
softswitches 3a, 24b, 47a, 62c-63a  
  see also (addresses)  
Softterm 2 13a

Software Arts 55a  
Software Publishers Association 12a  
software virus 34a-35b  
  *CyberAIDS* 50a  
    *Festerate* 57b-58a  
  *Sonix* 64b  
  *Soviet Union* 91c  
  *SPA* see (Software Publisher's Association)  
  *Spite Software* 58a  
standards, see (protocols and standards)  
Stat Talk 21a  
Stat Talk Computer Products 21a  
StatCalc 21a  
Statistical Processing System 21a  
statistical software 20c-21a, 30a-30b, 40c, 56c  
Statistix 21a  
Stats Plus 21a  
StatSoft 21a  
stereo/pick 96a-96c  
Styleware 21c, 46b, 49a  
  *Multiscribe* 22a, 49a, 71c, 95a  
  *TopDraw* 71c-72a  
subdirectories  
  deleting 70a  
  recovery 50a  
  see also (diskettes; recovery)  
subscription 4a  
Sun Remarketing 85a, 90b  
SuperCalc 3A 63c  
SuperFonts see (Beagle Bros; SuperFonts)  
*Sybex Computer Blue Book* see (books)  
system files  
  see (GS/OS)  
  see (ProDOS 8)  
  see (ProDOS 16)

## T

*Talk is Cheap* 13b, 79b  
TAWUG see (AppleWorks User Group The)  
*Technical Introduction to the Apple IIgs* see (books)  
technical notes see (books; technical notes)  
*Technology Planning Guide* see (books)  
Techware Inc 10b  
telecommunications 12a-14b  
  CP/M downloading 39c-40a  
  see also (bulletin boards)  
  see also (modems)  
Telenet 12b  
terminal 12b  
  dumb 12b  
  emulation 13a  
  intelligent 12b  
  smart 12b

Terrian 92b-92c  
text files 4c-5a  
Texwipe 31a  
time getting 7c-8a, 23b  
*Time Is Money* 2b  
*TimeOut* see (Beagle Bros; Ultramacros)  
Timeworks 9b  
*TML Basic* see (languages; BASIC; TML Basic)  
*TML Pascal* see (languages; BASIC; TML Pascal)  
TM Systems 9a, 54c  
TOTENT 66a, 88b  
TTY 12b  
Turning Point Software 2b  
Tutor-Tech 10b  
Two Apples 45c  
Tymnet 12b

## U

*Ultramacros* see (Beagle Bros; Ultramacros)  
*Understanding the Apple IIe* see (books)  
UniDisk 3.5" see (disk drives; UniDisk 3.5")  
*UniDisk 3.5 Owner's Manual* 11a  
Unix 19b  
updates see (upgrades)  
upgrades

  APDA 75a-75b  
  AppleWorks 2a, 57a  
  Applied Engineering  
    AW 2 Expander 57b, 68a  
  Beagle Bros 57b, 68a  
  Checkmate Technologies  
    MultiRam 57b, 68a  
  CMS 3b  
  Finder 76a, 77a  
  Jem Software 68a  
    *Late Nite Patches* 57b  
    *PatchMania* 57b  
    *PathFinder* 57b  
    *Merlin* 51b  
    *Pinpoint* 57b, 68a  
  Usenet see (networks; Usenet)

## V

Vanderpoel, Tom 4a  
video  
  bleed 47a-47b, 62c-63a  
  cards see (cards; video)  
  chip see (chips; video)  
  commands 38b-38c  
  NTSC 80c  
  PAL 80c, 88c  
  ROM 69b-69c  
  tape labeling 58c  
viruses 34a-35b  
  *CyberAIDS* 50a  
    *Festerate* 57b-58a  
  *VIRUS SCANNER* 58a  
*VisiFile* 61b-61c  
*Visicalc Advanced Version* 54c-55a, 61c

## W

Wagner, Roger 15b  
*Wall Street Journal* 2a  
*Wall Disney Card and Party Shop* 12a  
warranty 53c  
Washington Apple Pi 85a  
Westerfield, Mike 15b  
Western Design Center 15b, 23c, 33a-34a  
White, Dr. Steve 21a  
*Word Perfect* 22a  
*Wordbench* 66b-67a  
*WordStar* 55b, 55c  
*Works The* see (newsletters; Works The)  
write protect 11a

## X

xmodem 13a

## Y

Yocam, Del 41a-44a, 51b, 67a  
  resignation notice 73a

## Z

*ZBasic* see (languages; BASIC; ZBasic)  
Zedcor 9a  
Zephyr Services 21a  
zero page 70a  
Zip chip see (chips; Zip)  
ZStar 21a