



mini'app'les



Apple Computer user group newsletter

Volume XII No 5 May 1989

Calendar of Meetings and Events

WHO	WHEN	WHERE	WHAT
North Shore Mac Users Group (New Group)	Tues. May 2 7:00 pm	Grand Marais Library Grand Marais, MN	Note 15
Strictly Business Show	May 3rd & 4th	New Minneapolis Convention Center	
Apple II Users	Wed. May 3 7:30 pm	St. Louis Park Sr. High School	Note 11 Intro to Basic and ProDOS
Mac Users	Thur. May 4 (6:30) 7:00 pm	Hennepin County Library, Southdale Branch, 70th & Xerxes, Edina, MN	Paul Augustyniak, "Claris:" MacWrite II, SmartForms, FileMaker, etc. Notes 14 & 4
Mac Computer Art & Design Group	Mon. May 8 6:45 pm	Mpls. College of Art and Design 133 East 25th Street, Room 325	Real-World Applications of HyperCard™ - Greg Daigle, Note 7
Microsoft® Works™ S.I.G.	Tues. May 9 6:30-8:45 pm	Washburn Community Library 5244 Lyndale Ave. S., Mpls.	Note 13
Board Meeting	Thur. May 11 7:00 pm	Brookdale Hennepin Area Library 6125 Shingle Creek Pkwy., Brooklyn Ctr.	Members welcome, Note 1.
Fourth Dimension™ Group	Mon. May 15 7:00 pm	Hennepin County Library, Southdale Branch, 70th & Xerxes, Edina, MN	Note 2 Small Meeting Room, 2nd Floor
Macintosh™ Programmer	Tues. May 16 7:00 pm.	Hennepin County Library, Southdale Branch, 70th & Xerxes, Edina, MN	Note 2 Small Conf. Room, 2nd Floor
MacCAD/E User Group	Tues. May 16 7:00 pm.	Heath/Zenith Computers Shady Oak Road, Hopkins, MN	Note 8
Apple IIGS S.I.G.	Wed. May 17 7:30 pm	First Tech Computer 2640 Hennepin Ave., Minneapolis	Note 12
HyperCard™ Group	Mon. May 22 7:00 pm	Hagen Office Equipment 801 W. 77-1/2 St., Richfield, MN	Note 4
Mac Novice User Group	Mon. May 22 7:00 pm	Highland Branch Library 1974 Ford Parkway, St. Paul, MN	Note 9
Mac Desktop Publishing SIG.	Wed. May 24 7:00 pm	First Tech Computer 2640 Hennepin Ave., Minneapolis	Note 3
AppleWorks® S.I.G.	Thur. May 25 7:00 pm	Murray Junior High School 220 Buford, St. Paul, MN	Using AppleWorks™ Integration Note 1
Northwest Branch	Tues. May 30 7:00 pm.	Rockford Road Library 6401 42nd Av. N., Crystal, MN	Note 6
Mac Users	Thur. June 1	Hennepin County Library, Southdale	Notes 14 & 4
North Shore Mac Users	Tues. June 6	Grand Marais Library, Grand Marais	Note 15
Apple II Users	Wed. June 7	St. Louis Park Sr. High School	Note 11
Board Meeting	Thur. June 8	Brookdale Hennepin Area Library	Members welcome, Note 1
Mac Computer Art & Design	Mon. June 12	Mpls. College of Art & Design	Typography and the Macintosh, Note 7
Microsoft® Works™ S.I.G.	Tues. June 13	Washburn Community Library, Mpls.	Note 13
Fourth Dimension™ Group	Mon. June 19	Hennepin County Library, Southdale	Note 2
Macintosh Programmer	Tues. June 20	Hennepin County Library, Southdale	Note 2
MacCAD/E User Group	Tues. June 20	Heath/Zenith Computers, Hopkins	Note 8
Apple IIGS S.I.G.	Wed. June 21	First Tech Computer, 2640 Hennepin	Note 12
AppleWorks® S.I.G.	Thur. June 22	Murray Jr High, 2200 Buford, St Paul	Printers, Note 1
HyperCard™ Group	Mon. June 26	Hagen Office Equipment	Note 4
Mac Novice User Group	Mon. June 26	Highland Branch Library, St. Paul	Note 9
Northwest Branch	Tues. June 27	Rockford Road Library, Crystal	Note 6
Mac Desktop Publishing SIG	Wed. June 28	First Tech Computer, 2640 Hennepin	Note 3

Notes:

- | | | |
|-----------------------------------|----------------------------------|-------------------------------------|
| 1. Dick Marchiafava572-9305 | 6. Jere Kauffman535-6745 | 11. Tom Ostertag488-9979 |
| 2. Ian Abel824-8602 | 7. Joy Kopp440-5436 | 12. Mark Evans377-9000 |
| 3. Charles Bjorgen633-8850 | 8. Bill Langer937-9240 | 13. Ed Spitzer432-0103 |
| 4. Mike Carlson866-3441 | 9. Tom Lufkin698-6523 | 14. David Stovall474-8015 |
| 5. Wesley Johnson636-1826 | 10. Martin McClure227-9348 | 15. Jim Ringquist218 387-2234 |

Coordinators - Please Call John Hansen (890-3769) by the 1st Friday in order to have your meeting listed correctly!

Board Members:
Officers

President	<i>Dick Marchiafava</i>	572-9305
	7099 N. E. Hickory Drive Fridley, MN 55432	
Past-President	<i>Ann Bell</i>	544-4505
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	14160 Green View Court Eden Prairie, MN 55344	
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	P.O. Box 24476 Apple Valley, MN 55124	
Treasurer	<i>J. Edward Wheeler</i>	881-5928
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Directors

Publications	Dan Buchler	890-5051
Software	Tom Gates	789-1713
Operations & Resource	John Hook	944-8510
SIG: Macs	David Stovall	474-8015
SIG: Apples	Tom Ostertag	488-9979
Membership	Anne S. Charity	935-4845

Coordinators

Beginners' Consultant	Earl Benser	884-2148
Shows & Conventions	<i>(Your Name Here?)</i>	
Northwest Branch	Jere Kauffman	535-6745

🍏 Apple II Users	Tom Ostertag	488-9979
🍏 Apple IIGS	Dick Peterson	473-5846
🍏 AppleWorks	Dick Marchiafava	572-9305
🍏 Beginner's Basic	Tom Alexander	698-8633
🍏 Languages/Tech	Wesley Johnson	636-1826
🍏 Tech. Adviser (hdwre)	Roger Flint	771-2868

📁 Mac Users	David Stovall	474-8015
	Mike Carlson	866-3441
📁 Excel	M. Nightingale	545-9380
📁 Beginning Prog.	Tom Vind	473-0455
📁 HyperCard	Mike Carlson	866-3441
📁 CAD & Engineering	Bill Langer	937-9240
📁 4th Dimension Prog	Ian Able	824-8602
📁 Novice	Tom Lufkin	698-6523
📁 Smalltalk	Martin McClure	227-9348
📁 DeskTop Publishing	Charles Bjorgen	633-8850
📁 MicroSoft Works	Ed Spittler	432-0103

Software Director's Staff

Apple // DOM Editor	Tom Gates	789-1713
MaceDOM Editor/Prod	Joe Carroll	938-4028
CP/M	<i>Open</i>	

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- Genealogy	Jules Goldstein	690-4447
- Medical	Stewart Haight	644-1838
- CP/M	Jim Rosenow	(414) 261-2536

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Questions – Please direct questions to an appropriate board member. Technical questions should be directed to the Technical Director.

Membership – Send applications for membership directly to the Membership Coordinator: Anne S. Charity 935-4845
5116 Ridge Rd
Edina, MN, 55436

Current membership dues are \$20 for the first year and \$15 thereafter. All members receive a subscription to the newsletter and all club benefits. New members receive a special package of member lists and software catalogs.

eDOMs	At Meetings	Mail Order
Members:	5 1/4" eDOMs	\$3.00
	5 1/4" System	\$1.00
	3 1/2" Apple/Mac eDOMs	\$5.00
	3 1/2" System	\$3.00
Non-Members:	5 1/4" eDOMs	\$6.00
	3 1/2" Apple/Mac eDOMs	\$10.00

Send orders to Mini'app'les at PO Box 796, Hopkins, MN 55343, attention eDOM Sales or Mac eDOM Sales.

Dealers – Mini'app'les does not endorse specific dealers. The club promotes distribution of information which may help members identify best buys and service. The club itself does not participate in bulk purchases of media, software, hardware and publications. Members may organize such activities on behalf of other members.

Newsletter Contributions – Please send contributions on Mac 3 1/2" disks, or via telecommunications, directly to the Newsletter Editor. Contributions on 5 1/4" disks should be sent to the club PO Box, and marked: "Newsletter Submission".

Deadline for publication is the **1st day** of the month preceding the month in which the item might be included. An article will be printed when space permits if, in the opinion of the Newsletter Editor, it constitutes suitable material for publication.

Meeting Dates – Please phone calendar announcements to John Hansen 890-3769.

Mini'app'les Mini'Info Exch BBS – Club members may utilize the club's BBS: Telephone No. 831-6235

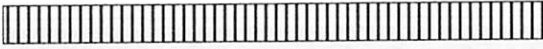
Advertising – Direct all advertising inquiries to the club's Advertising Coordinator: Bob Lowe 612-933-0464
14717 Idylwood Road, Minnetonka, MN 55345









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The Fine Print

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    <p>System Finder HyperCard 1.2.2</p>	<p>HyperCard 1.2.2 is now available!</p>
<p>✓ System Updates for Macintosh ✓ ProDOS and DOS 3.3 systems for Apple II/IIGS</p>	

**Apple II SIG
May 3
St Louis Park High
Intro to Basic and
ProDOS™**

**MacUsers
May 4
Southdale Library
"Claris"
MacWrite II, Smart-
Forms, FileMaker, etc.**

Mini'app'les BBS — 831-6235 (New Software)

May Mini'app'les Newsletter goes to press May 13.
Please observe minimum one week leadtime.

Advertisers 

Hagen	BC
Kronk Financial Services	15
Linhoff	10
MacChuck	13
NSP	4
Ramco	15

**Membership Application
and Renewal Form 5/89**

Name: _____

Address: _____

City: _____

State: _____

ZIP: _____

Home Phone: (_____) _____ - _____

Work Phone: (_____) _____ - _____

New Member () or Renewal ()

Spouse's name: _____

Children's names: _____
(if interested in computers) _____

Sponsored by: _____

I own or use a:

Mac+ () SE /SE30 () MacII/IIx/IIcx ()

Apple //or //+or //e () //GS () //c ()

Other ()

Special Interests - Check all that apply.

Programming () Spreadsheets ()

Business () DT Publishing ()

Education () Novice ()

Make checks payable to Mini'app'les
Mail to: Membership Coord
Anne S. Charity
5116 Ridge Rd
Edina, MN 55436
Allow 3-6 weeks for processing
Club Dues: \$15/yr + \$5 application fee.

Announcements

AppleWorks SIG Announcements And Meeting Schedule by Dick Marchiafava

The February meeting took place on schedule, but we were moved to a different room because of Open House at the school.

Attendance at this meeting was exceptionally good, especially considering the intermediate and advanced AW data base presentation that was the subject of the meeting. Many in the audience were able to teach others, as well as the program presenters, aspects of using the data base. The presentation seemed to be well received and highly regarded.

Location

The AppleWorks SIG meetings are at Murray Jr. High School, 2200 Buford Avenue, St. Paul. Park on Grantham, the street west of the school complex. Meeting room is the computer lab at the center of the hall. This location has been reserved for several months.

Murray Jr. Hi is centrally located a few blocks east of Highway 280, near Como Avenue. This is near the border of Minneapolis and St. Paul. See the map for directions.

Coming Meetings

April 27: Beagle Bros TimeOut SpreadTools.

We will examine this desk accessory program which adds features to the AW spreadsheet.

May 25: Using AppleWorks Integration

June 22: Printers

July 27: Multi-Computer seminar, bring your AppleWorks program (tentative)

August 24: TimeOut UltraMacros, Linking Data Bases

Other meeting dates- September 28: October 26: November 16: December 28:

Any corrections to the meeting calendar will be posted on the Mini'app'les Bulletin Board. (See phone number on index page of this newsletter.)

Meetings are held monthly at 7 PM on the 4th Thursday. Call 572-9305 if you need information about meetings. Dick

Macintosh Art and Design (MCAD) User Group Meeting Topics by Joy Kopp

The Macintosh Art and Design (MCAD) User Group meets on the second Monday of the month at 6:45PM. The location of the meetings is the Minneapolis College of Art & Design, room 325 Computer Lab.

May 8: Real World Applications of HyperCard

Greg Daigle, Principle of Daigle Design (an industrial design firm) and Assistant Professor of Industrial Design at the Minneapolis College of Art and Design will lead the May meeting with a presentation on HyperCard. He will be discussing an industrial designrelated stack he

has developed which was featured recently in the Journal of the Industrial Design Society of America. This piece of work features stunning graphics and sound. He would like others to bring any visually interesting stacks to the meeting and show them. Sound and large display will be available.

June 12: Typography and the Mac

Independent typographer, graphic designer and MCAD instructor Diane Yanovick will lead a discussion about typography: What is it? What has it historically meant? How has computer technology, especially the Mac, changed these definitions? She will discuss how she utilizes the Mac in her work and how it has affected her methods of creative development and design.

Concludes next page

DON'T LET THIS HAPPEN TO YOUR COMPUTER'S POWER SUPPLY.

Even minor electrical disturbances can affect your sensitive computer equipment. NSP's new Ultra Power Service will help you avoid power inconsistencies. We'll analyze your power needs, diagnose any problems, and recommend solutions, including hardware if necessary.

We'll even finance the hardware. Call Ultra Power Service at 347-7383. You'll save on both computer downtime and maintenance costs. And avoid needless frustration.

And now NSP offers Surge Guard, a spike diverter installed at the meter to protect all your home appliances and electronics. Call us for details.



Announcements, concluded

Join the MCAD group for these two informative and entertaining events. For any questions or suggestions for future meeting topics, contact Joy Kopp.. 440-5436

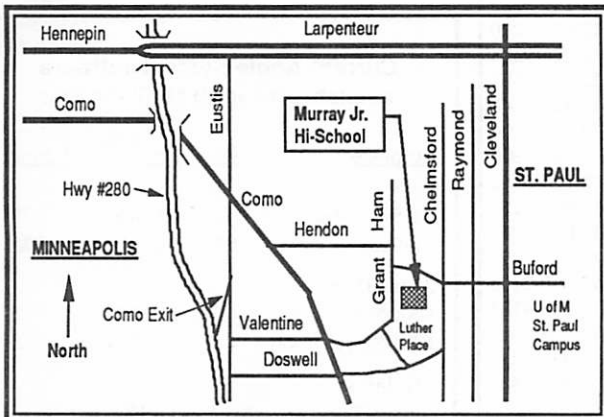
Apple II Users Group, May Meeting

The May meeting will continue on the Newcomer theme, with an introduction to Basic and further ProDOS information. This meeting is scheduled to be led by Fred Evans.

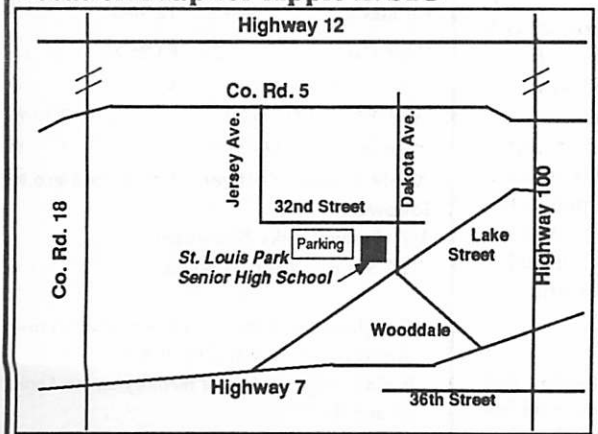
The June meeting is scheduled to be about Telecommunications and will be led by Tom Gates. Also in June, there will be a Summer Swap Meet. Date as yet not firmed up.



Location Map: AppleWorks SIG



Location Map for Apple II SIG



Minutes of the Board Meeting March 9, 1989 at the Hennepin County Library, Brookdale Branch

Board Members in attendance: Dick Marchiafava, Ed Spitler, Tom Gates, Tom Ostertag, Ann Bell, J.E. Wheeler, John Hook, William Langer and Dan Buchler. Also present: Pat Bohn, Steve George, Dave Laden, Tom Lufkin, Dick Peterson and Dick Wiese.

AGENDA ITEMS

MINUTES OF THE PREVIOUS MEETING (February, 1989) Submitted by secretary and approved.

TREASURER'S REPORT
submitted by J.E. Wheeler.

TREASURER'S report was approved. (See Report on page 6.)

MEMBERSHIP report submitted by Anne Charity was reviewed and approved.

COMMITTEE REPORTS

Nominations: Tom Gates updated us on proposed nominations to the various board positions.

OLD BUSINESS

IRS Appeal: Dick Marchiafava advised us that checks in the amount of \$6851.90 were sent to us by IRS as a return of impounded funds and penalties originally assessed to us. A letter from IRS, a reply in response to the filing of Form 8734, a Support Schedule for Advance Ruling Period filed 12/30/88, a letter extending our 501 (c) (3) organization and a letter stating that we are now a 509 (a) (2) organization, were also attached. Our attorney has been asked to interpret these materials.

A motion was made by Jim Wheeler to have Dick Marchiafava request our attorney to contact IRS and get a letter stating that we don't owe them any money and to request that the remainder of the money they levied, be returned. Approved.

A motion was made by William Langer that the checks from IRS of \$6851.90 be deposited in our accounts. Approved.

A motion was made by Ann Bell to purchase a portable Elmo Overhead Projector at a cost not to exceed \$500.00. Approved.

A motion was made by Dick Marchiafava to approve purchase of a clock card for our BBS computer. Approved.

Ed Spitler was asked to remove the club database from the club Macintosh computer. He agreed to do so, noting that it was there as part of the effort to convert it to ProDOS format.

NEWSLETTER:

Jim Wheeler raised the issue of front page newsletter paper stock, indicating that he has had heated discussions with the Burnsville Printer regarding cost of the current stock being used. Dan Buchler was asked to provide the board with information regarding the status of our agreement with them at our next meeting.

Dan Buchler noted the Strictly Business show in May might give our members free tickets in exchange for an ad in our newsletter. (*Editor's note: Champion Expositions did not come through as promised!*)

A motion was made, seconded and carried to adjourn.

Respectfully submitted by Ed Spitler,
April 13, 1989



MacUsers
May 4
Southdale Library
"Claris"
MacWrite II, Smart-Forms, FileMaker, etc.

APDA

**Apple Programmers and
Developers Association**
Extracted from *AppleLink*
Edited by Dan Buchler

Your editor is reproducing some of this press release because your Editor has used the services of APDA on several occasions and thoroughly recommends it. Prices are excellent and service is generally pretty good..

Apple Computer, Inc. announced that APDA™, formerly the Apple Programmers and Developers Association, will now be directly managed by Apple from its Cupertino headquarters as part of the company's new strategy to provide Apple development customers with improved and integrated support services. APDA is the sole distribution channel for Apple@-labeled and select third party development tools, languages and technical documentation essential for developing hardware and software solutions on Macintosh® and Apple II computer systems.

All Apple computer users worldwide are eligible to participate in APDA and participation has grown to more than 20,000 in the past two years since its introduction. APDA now provides services to a range of development-oriented customers, including in-house corporate developers, university professors and students, VARs and hobbyists as well as commercial developers. Reflecting a growing trend and interest in the development of customized Apple-compatible hardware and software, there has been a significant increase in end users and professional programmers writing in-house applications for business, education and government.

"APDA has two objectives: First, to provide high-quality service to anyone interested in programming; and secondly, to carry a broad selection of tools and technical documentation," stated Randall A. Battat, vice president, product Marketing. "We hope to reach a range of programmers from commercial software developers to children learning about programming."

APDA carries more than 300 Apple and third-party titles, comprised of software development tools and a large library of technical documentation, including the Addison-Wesley Apple Technical Library. Apple development products available through APDA include MPW™ (Macintosh Programmer's Workshop) and APW™ (Apple IIGS® Programmer's Workshop); MacApp®, Apple's object-oriented development environment; MacWorkStation™; and

New Members February and March 1989

Sponsoring Members this month

Joy Kopp	Steve—hcl
NSP	First Tech
Dan Buchler	Pace Center, Inc
Dick Marchiafava	Microsoft

Name	ZIP	Phone
Marek Behr	55414	612-626-0763
Daniel Berks	55417	
James Bjustrom	55117	612-778-1241
Monica Blanco	55435	612-944-1045
George Bucks	55337	612-435-5988
Wesley Bue	55416	612-922-5404
Randy Byrne	55435	612-944-8254
Jane Frymire	55417	612-824-0456
Ann Gunn-smith	55316	612-421-1828
Greg Hansen	55444	612-566-2050
Tom Hendrickson	55424	612-926-7951
Barbara Homce	55406	612-724-1772
Leann Hrncir	55430	612-561-1354
Michael Jarvis	55438	612-941-4069
Wayne Jennings	55117	612-489-8937
Keith Maloneyhuss	55108	612-649-0208
William Mc Farlane	55438	612-829-7210
Becky Mc Manus	55413	612-224-9384
Lynn Molline	55403	612-347-7383
Marianne Nahrting	55303	612-427-3248
Linda Owen	55113	612-483-5094
Paul Pashibin	55437	612-780-9896
Dennis Paulson	55409	612-825-6358
Richard Phillips	55108	612-646-0253
Robert Reul	55426	612-544-2943
John Sanford	55110	612-429-7297
Leonard Schloff	55116	612-690-2113
Steven Sears	55105	612-291-9105
Diana Steele	55344	612-553-0183
Steve Tucker	55042	612-436-8230
Kent Woodgate	55420	612-888-3846

HyperCard® development tools. An extensive selection of third-party development tools complement Apple's product line, offering such languages as Fortran and LISP as well as alternate versions of C and Pascal.

To better serve its APDA customers, Apple has established a separate facility in Santa Clara. The quarterly APDAlog publication has been completely redesigned for easier-to-read product descriptions and will include a range of developer-oriented articles written by Apple and industry experts.

"Apple has committed its resources to support improved production quality, disk duplication and customer service," said Sue Espinosa, director, developer channels. "Bringing APDA in-house will allow Apple to

Continues on 9

Minutes, concluded from 5

TREASURER'S REPORT

January 1 to 31, 1989

INCOME

Membership dues	702.00	
Savings Acct Interest	5.47	
e-DOM Sales	533.00	
Newsletter Advertising	41.95	1282.42

EXPENSES

e-Dom Cost of Goods	61.19	
Postage & Shipping	69.00	
Printing, publications	703.00	
Bank Serv Chgs	.70	833.89
Month Profit		448.53

Savings Account	1244.86
Checking Account	2637.30



Current Apple System software available through Mini'app'les:

Software	Ver	Date	Format
II, II+, //c, //e			
DOS 3.3 Master	n/a	09/10/85	5.25"
ProDOS 8	1.7	06/13/88	5.25"
Apple IIGS			
GS/OS Syst. Disk	4.0	08/18/88	3.5"
GS/OS Syst. Tools	4.0	08/18/88	3.5"
Macintosh			
System Tools	6.0.3	12/9/88	3.5"
Print Tools	6.0.3	12/9/88	3.5"
Utilities 1	6.0.3	12/9/88	3.5"
Utilities 2	6.0.3	12/9/88	3.5"
HyperCard	1.2	04/25/88	3.5"
H. C. Update	1.2.2	05/25/88	3.5"

ImageWriter LQ Disk 1	2.0	7/18/88
ImageWriter II/LQ AppleTalk	2.0	7/18/88

Apple System Software disk prices are as follows:

3.5" Systems disks \$3.00 each.
5.25" Systems disks \$1.00 each.

Notes:

- The Macintosh System Tools and Utilities disks are available only as a set of 4 disks.
- ProDOS requires 64K of memory on the Apple II and II+
- GS/OS System Disk and System Tools are available only as a set of 2 disks.

Evolution of the Apple II

(Part 4, the third generation: The IIGS and ProDOS/16 ver.1—continued)

by Stephen Brown, L.O.G.I.C.

Editor's Note: The first two parts of this article appeared in the September and October, 1988, editions and the third in March, 1989 of the Mini'app'les newsletter. Stephen Brown published this originally in the Maple Orchard, the journal of the Toronto, Canada, Apple User group. The article was transcribed by Steve George. The installments are summarized below.

In the first and second parts of this article, I detailed some of the stages of development and maturation of Apple II computers from their birth. My focus has been two-fold: on one hand, I have traced changes in the software and hardware itself, which makes up, or works with, the Apple II system. On the other, I have looked at some of the other factors which have influenced the design of the Apple II. Initially, I described the original Apple II, the II Plus and DOS 3.3, whose straightforward design and open architecture gave users a moderate amount of computing power and tremendous potential for expansion for what was (in their time) a very reasonable cost. I followed this with an explanation of the pressures and realities that led Apple to radically modify the design of Apple II hardware and software, as exemplified in the IIc, IIe and ProDOS. The IIe and IIc have marked the end (so far at least) of Apple II-s based on a 8-bit microprocessor. This article will be concerned with Apple's newest II-series offerings, the Apple IIGS and ProDOS/16 version 1, and how they are the next logical steps in the evolution of the Apple II family line.

The IIGS is considered an 8- and 16-bit computer, that is, the microprocessor has 8- and 16-bit modes. In 9-bit mode, the IIGS operates much like a fast IIe or IIc. However, there is a limit to how efficient an 8-bit microprocessor, albeit a fast one, can be. The microprocessor is that device which actually does the work of a computer. You can think of "work" in this case in terms of following and carrying out a list of instructions, called a program. In this case, the purpose of a program is to manipulate data to perform a useful task. All information (program and data) that the microprocessor manipulates is at one point contained by, or affects the contents of, one or more of the registers. Since many of the instructions that a microprocessor understands operates directly on one or more registers, the amount of data that the microprocessor registers can handle determines to a large extent how efficient the microprocessor can be. Registers

in an 8-bit microprocessor, such as the Apple II/II-Plus' 6502 or IIc/IIe's 65C02, can hold a number between binary 00000000 (0 in decimal) and binary 11111111 (255 in decimal). This means that if a number is larger than 255, then the 6502/ 65C02 can only manipulate it if it is broken into several 8 bit sized pieces. Contrast this with a 16-bit microprocessor, whose Accumulator can hold a number between binary 0000000000000000 (0 in decimal) and binary 1111111111111111 (65535 in decimal)! Obviously, a machine with "wider" registers can potentially carry much more information at once and do much more work in a single instruction, even with the speed kept constant.

The microprocessor had much to do with one of the most important aims of the IIGS' design team: to maintain a large degree of software compatibility with older Apple II-s. It was necessary to select a microprocessor which was similar in architecture to the 6502/ C02 of the II/II+, IIe, and IIc. Unfortunately, there weren't very many choices, only the Western Design Centre 65802 and 65816. Both these devices have 8- or 16-bit registers, but only the 65816 can produce both a 16-bit address and a 8-bit bank number. With this, it is much easier to generate 24-bit addresses, which provides an addressable space of 16 megabytes and still retain compatibility.

To make most effective use of the IIGS' 16-bit architecture, the disk operating system (DOS) for the IIGS will ultimately be written to execute in native (ie. 16 bit accumulator and registers) mode. The officially sanctioned DOS for Apple II's since January 1984 has been ProDOS, short for "Professional Disk Operating System". ProDOS, for the II, II Plus, IIe, and IIc has been renamed "ProDOS/ 8" when the IIGS was introduced to distinguish this DOS for 8-bit Apple II's from the DOS for the IIGS, which will be called ProDOS/16. The ProDOS/16 which exists at the time of this article (version 1.6) is still in development, and is written mostly with 8 bit opcodes. This partially explains ProDOS/16's snail-like speed.

The IIGS' ProDOS is similar to the older ProDOS on the outside, but thoroughly different on the inside. Though both ProDOS' are file and format compatible with one another, ProDOS/16 is completely different in how it works and how it loads in. ProDOS/16 must load itself in, and run an application, but it also must load in "patches" (software fixes) to ROM, and load in Tools, Drivers, and Desktop Accessories if needed. Instead of making all

these things part of ProDOS itself, they are separate files. This means that, unlike ProDOS/ 8, individual files can be added and updated individually as needed, or used to customize the operating system for a particular application.

Other than the Tools, another idea borrowed from Macintosh, and incorporated into the IIGS was the idea of Desktop Accessories, including the "Control Panel". Desktop Accessories are small utility programs which are useful to have on hand. For example, a calculator is not part of common programs such as AppleWorks or ProTerm, but sometimes it would be useful to use a calculator without having to leave these programs. Enter Desktop Accessories. By pressing Open-Apple/Control/Esc, you get access to a menu of available Desktop Accessories, called Classic Desktop Accessories (CDA's).

One Desktop Accessory which is always available from the menu is the Alternate Display Mode CDA. It was included to improve compatibility with older II-series programs. The other CDA is the Control Panel. With this, everything from the default border, background and text colours, to serial port parameters, can be set and stored in battery backed-up RAM.

In addition to the emphasis on software compatibility with older Apple II's, Apple had to maximize hardware compatibility. The older Apple II's (other than the IIc) have 8 expansion slots, thus the IIGS had to have 8 slots too. But in the IIGS, the slots have been subtly changed. There are 7 general purpose expansion ports available to the user; each expansion port is associated with an internal input/output device, or an expansion plug called a "card slot" (or just "slot"). Each expansion port already contains a peripheral which can be selected or de-selected by the Control Panel. In the case that an internal peripheral for a port is de-selected, that port becomes connected to a slot, into which an expansion card can be inserted. In theory, a IIGS owner (like a IIc owner) would never need to buy any expansion cards, because all ports already have a I/O device connected to them.

Having peripheral devices already installed in the IIGS effectively makes the machine much less expensive in the long run. The IIGS has two serial ports (associated with slots 1 and 2) similar to the Macintosh serial ports. Since most people never need more than two serial ports, incorporating them was a very good idea. If desired, one of these can be turned into a special serial port for an AppleTalk Local

Continues on 8

Evolution, concluded from 7

Area Network (LAN), at which time it becomes associated with slot 7. ("Networking" is a new computer buzz-word for a way to connect together many devices, usually mostly computers). Since AppleTalk (Apple's networking protocol) can be used to connect together 30 to 50 Macintoshes, IIGS's, and IIE's (with an AppleTalk Workstation card) to communal mass storage devices and printers, networking makes good sense in offices and classrooms that use large numbers of IIGS's.

Where the IIGS excels compared to other Apple II's is in its ability to work at higher speed. One of the major complaints about Apple II's, especially recently, was the leisurely to lethargic pace at which an Apple II executes its programs (as usually compared to 16- and 32-bit machines). Thus, an important selling feature of the IIGS is its higher speed. All the standard Apple II's run with a clock speed of around 1.02 Mhz. The IIGS' speed is usually selected from the Control Panel. At the "normal" speed, the IIGS runs at 1.024 Mhz, and at the "fast" speed it runs at 2.8 Mhz. I say 2.8 Mhz guardedly, because only programs running from ROM run at 2.8 Mhz, while programs running from RAM run at 2.5 Mhz, due to the time needed to refresh the RAM chips. Mention should be made that clock-speed value comparisons are ONLY useful when making comparisons between microprocessors of similar architecture (like the 6502, 65C02, 65802 or 65816). Comparing clock-speeds across different families of microprocessors (eg. the 4.77 Mhz 8088 in the PC/XT to the 2.8 Mhz 65816 in the IIGS) to assess the relative "processing speed" is like comparing grapes to walnuts. In practice, most programs run about 2-1/2 times faster on a IIGS than they do on a II/II-Plus/IIE/IIc.

As mentioned before, the goal of IIGS' designers was to improve the graphics and sound capabilities to make the IIGS an attractive tool for schools. Apple managed to incorporate all the older graphics display modes (Low-Resolution (40x48 pixels), High-Resolution (280x192), Double Low-Resolution (80x48), Double High-Resolution (560x192)) with two "Super High Resolution" modes, which display either 320x200 pixels or 640x200 pixels, with up to 4096 possible colours. Normally, only 256 colours per screen (16/scan-line) are allowed in 320 mode, or 16 colours per screen (4/line) are possible in 640 mode. However, by using sneaky methods, it is possible to create screens which contain more colours. Just as importantly, the Super HiRes screens are linearly mapped, and are supported by the QuickDraw II Tools for ease of manipulation by programmers.

The new Super HiRes modes do not come

without a price. From an old style AppleSoft BASIC programmer's point of view, it is frustrating that there are no AppleSoft commands to help manipulate the Super HiRes screen, as there are for the Lo- and HiRes screens. Another matter is the size (in terms of disk space) that Super HiRes pictures occupy. A raw Super HiRes picture image (file type \$C1) takes up 65 ProDOS blocks (32K), so that only 4 such images could fit onto a 5-1/4" floppy disk!

Along with an updated graphics section, Apple redesigned the Sound Generator. The new Sound Generator is nothing like any of its predecessors. Up until the IIGS, tones and speech were created by "popping" the speaker many times per second by accessing the speaker's "softswitch", a specific location in memory. Though some programs use this method to its greatest potential, it is inherently inefficient because the microprocessor cannot be doing much else while it is occupied with the task of controlling the speaker. Also, it is only possible to create low to moderate sound quality this way. While the IIGS supports sound generation of this type, it was only included so that older programs would continue to work on the IIGS. Instead, Apple included in the IIGS a special "Ensoniq" chip. This chip (made by Ensoniq) reads digital information out its own 64K of memory ("Sound Memory"), and converts the numbers to up to 256 analogue values which are fed to the speaker. Since the Ensoniq chip (and its associated logic circuitry) takes care of reading memory, incrementing the memory address counter, and converting digital to analogue, the microprocessor is quickly freed up to handle other tasks. Initially, all the controlling program must do is move the appropriate data into Sound Memory, tell the Ensoniq chip where to start, how fast to go, and by what increment, and then the Ensoniq chip makes the sound. To make this task easier to program, Apple has provided several RAM-based Tool Sets (the Note Synthesizer and Note Sequencer).

The newest II has the flexibility of older II's, but only some of the power of newer machines. In spite of Apple, the Apple IIGS is an attractive but expensive choice for almost anyone who needs a moderately powerful home or small business computer, but does not need IBM-compatibility. Even with the apparent lack of advertising and attention from the higher echelons at Apple, II-series sales still makes up almost half of Apple's income. The Apple II's allure has stubbornly defied so-called "computer experts" who ignore the Apple II, or periodically report that it is "officially" dead. I suppose it's hard to kill a computer which has almost 5,000,000 (including about 1,000,000 IIGS's) units installed worldwide, and has a software base

larger than most other computers (more than 12,000 pieces of software for the Apple II-line).

While the Apple II has changed in form, appearance, and power over its long life of 11 years (an unspeakably long time in the computer industry), it is a system that Apple has assured us will still be around, and being improved, right into the 1990's. What the immediate future holds is anybody's guess, though rumours abound. Undoubtedly a faster GS is in the works, as is a REAL ProDOS/16 version 2, "OS/GS", or something analogous.

At the time of this writing, the IIGS is almost two years old (on 15 Sept 88), and it is expected that Apple will be announcing the IIGS' successor. Though history will judge my guesses to be right, wrong, or far-fetched, I am expecting a smarter disk drive "Smartport" (for example, able to handle 1.6 megabytes 3.5" drives), more dedicated Sound Memory (128K?), more onboard memory (512K?), a higher capacity power-supply, and additional ROM-based Tools. I would be pleasantly surprised by battery backup for onboard memory, a built-in SCSI port, or finer resolution graphics modes. For present IIGS owners, I expect an upgrade path from the IIGS to the IIGS-Plus (or whatever it will be called), just as there is an upgrade path from the IIE to the IIGS.

There are also rumours of an enhanced Apple IIc, possibly called an Apple IIc-Plus. Hopefully, II-world will not have to wait too much longer for the next quantum leaps in the evolution of the Apple II.

In 11 years, Apple II's have been put in the hands of millions of people in all walks of life. For them, it has been a tool, a teacher, or an entertainer. In return, Apple II owners have done something that had never been done before: they created almost a cult following over... a machine. Undoubtedly, it was because this machine both did the job it was intended for, and could also (by virtue of its design) be made to do tricks it was never designed to do. I have met a large number of Apple II devotees, and surprisingly, most have two things in common with me: they enjoy their machine, and would rather fight than switch. Apple II Forever!!!

Suggested Reading:

- Apple Computer Inc., 1987. Apple IIGS Hardware Reference, Addison-Wesley Publishing Co.
- Bond, Gary, 1987. Inside the Apple IIGS. Sybex, Alameda, CA.
- Little, Gary B., 1987. Exploring the Apple IIGS. Addison-Wesley Publishing Co.



eDOM 50

AppleWorks SuperPatch



Review by Tom Gates

John Link gets my vote for humanitarian of the year. I have AppleWorks patches from magazines all over the place. Some I'm not sure what they do anymore, others I can't remember if I've applied them. John solves those problems with a menu driven application for tracking AppleWorks patches.

A "New computerese" award may be in order also with his coining of the phrase "BeggarWare". He has created a new class of software products somewhere between Public Domain and ShareWare. There is no fee required for this program and is basically Public Domain. However, his wife has become somewhat upset at his "giving" away software to the masses and feels that he should be getting more than just satisfaction out of the deal. So in keeping with the spirit of things (not to mention his marriage) he says that if you feel for his plight, you may "...send \$5 or less". You will just have to read his documentation file for yourself!!!

The following is an excerpt from John Link's documentation to give you some more insight into the abilities of his program.

Information about patches for AppleWorks and programs which install them abound. SuperPatch is an effort to collect those which seem most useful and proven into a single program. Such a program could not be undertaken without the sense of community which occurs with such intensity between the hundreds of thousands of Apple// owners. No other computer seems to inspire so many "casual" users to delve so deeply into the inner secrets of their machines, and freely offer the fruits of their investigations for others to use and enjoy. Eight-bit AppleWorks is the focus of many of these activities because it is the standard against which every other piece of Apple // software is measured, and consequently, it is the program most of us use everyday, as the leading productivity software for the //. Tom Weishaar, Randy Brandt, and Alan Bird come to mind immediately as leaders in this information sharing. But many others are making equally valuable contributions: Mark Munz, Garth Shultz, Stephen Weyhrich, Joe Bradley, Wally Bradford, Rick Oshlo, and many, many others...including Claris itself,

which had provided good information about patches which fix bugs.

SuperPatch patches only areas it "understands" well enough to proceed confidently with making changes, and refuses to alter those which it reads as "unknown." Depending upon how likely I thought problems might occur, SuperPatch checks from one to six bytes before it decides whether it knows what it is doing. If you are using a 1.x version of AppleWorks, SuperPatch will refuse to run. If your version of AW has areas patched differently than the patches SuperPatch installs, it is likely that those areas will be regarded as "unknown," and SuperPatch will not respond to the toggle which would normally change such an area. The solution, in such a case, is to start over with a fresh copy of AppleWorks, or to continue to use whatever method you have been using to manage those changes.

The examination of AppleWorks SuperPatch performs is useful in itself, since many of us forget exactly which patches are installed on this or that copy of our favorite program. SuperPatch will quickly inform you what has been done, and whether the file belongs to AW 2.0 or 2.1. "Factory fresh" code is returned as "normal," and patched code as "installed." You will be notified of the version number the first time that SuperPatch looks at APLWORKS.SYSTEM, and it appears at the top of each menu. SuperPatch, of course, installs 29 patches to 8-bit AppleWorks, but more important, de-installs them too. This is accomplished by a software toggle. Pressing the letter corresponding to the patch described on the menu alters the file so that "normal" code is replaced by the patch code, and patched ("installed") code is replaced by factory fresh ("normal") code.

John Link
Dept. of Art, Western Michigan U.
Kalamazoo, Michigan 49008



APDA concluded from 6

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SuperPatch:

Specific APLWORKS.SYS patches

- [A] No spacebar on boot-up (2.0 & 2.1)
- [B] No return after date (2.0 & 2.1)
- [C] "Overstrike" cursor on boot-up (2.0 & 2.1)
- [D] Enter control-@ in printer codes (2.0 only)
- [E] Change cursor to flashing solid apple (2.0 & 2.1)
- [F] Eliminate NDA loading bug (2.0 only)
- [G] Eliminate exp'n card preloading (2.0 & 2.1)
- [H] Change error tone to beep (2.0 & 2.1)
- [I] Cursor blink rate (2.0 & 2.1)
- [J] Always show desktop space (2.0 & 2.1)
- [K] "Checkmark" selected menu items (2.0 & 2.1)
- [L] "No return" after menu number selected (2.0 & 2.1)
- [M] Limit Desktop expansion into slinky-type RAMcards (2.0 & 2.1)

Specific SEG.M1 patches

- [A] Print up to 255 copies (2.0 & 2.1)
- [B, C, D, E] Various printer patches (2.0 & 2.1)
- [F] Allow 116 files in a subdirectory (2.0 only)
- [G] Change <cr> character to bent arrow in WP (2.0 & 2.1)
- [H] Retain cursor location when WP file is loaded (2.0 & 2.1)
- [I] Prevent extra <cr> printing when printing ASCII files (2.0 & 2.1)
- [J] Eliminate extra space in TXT files greater than 61 characters (2.0 & 2.1)
- [K] Change arrows to checkmarks in file selection menus (2.0 & 2.1)
- [L] Double underline column titles in DB reports (2.0 & 2.1)
- [M] Change column overflow in SS to '#' or 'l' (2.0 & 2.1)
- [N] Blank cells instead of 'NA' in SS (2.0 & 2.1)
- [O] Change 'Carefully' to 'Carelessly' (2.0 & 2.1)
- [P] Don't mark file changed if it has been merely printed (2.0 & 2.1)

SEG.PR patch

- [A] Print half-height characters w/o custom printer (2.0 & 2.1)

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Another Word

Mac Users Meeting of April

by Tom Edwards

Goodness! Can you believe it? About a hundred folks trained 200 eyeballs on the projection screen to see it for themselves. Word 4.0 lives, at least in the beta world. Waiting for Godot was a snap compared to waiting for Word 4.0... and the wait isn't over yet. Release and delivery is STILL not firm as this is written.

But what the hey! This had been promised for so long that there was almost a feeling of anti-climax. Microsoft seems to have learned that it doesn't pay to release buggy software, and this is one wrung-out version. Beta tester extraordinaire, *Dan Buchler*, Apple and Mac guru for Mini'app'les, has watched copies come and go for the last six months. It's taken some 30 or so releases to the beta group, but what the Mac Users saw at the April 6th meeting appears to be it. Dan said that Microsoft was going to lock the copy and send it for repro the next morning. Do you believe it? (Ed. Note: Microsoft management queried all beta testers during the week ending April 15 as to whether the beta testers felt Word 4.0 was ready to ship.)

A rundown of what's new...

Kathy Swope, Microsoft's Area Corporate Account Sales Rep, took us through the new features of the program. After a show of hands, it was evident that most attending the

meeting had a pretty fair idea of what the current Word 3.0x has to offer. So the concentration was on the new goodies.

What's new... and what's old... is a lot like the comedian's "good news, bad news" routine. Some (well, more like all) of the new features were greeted by "oooo's" and "ahhhhh's" from the audience. And of course the un- (or little-) changed features got some groans. It's hard for me to write during the presentations with lights out, so let's see what I can recall...

- **Page View.** Y'all clamored for it, and here it is. This is a "toggle" kind of thing. When this feature is turned on, you pretty well can see what you will get, including columns. But in this mode, it's going to run slower, and that may get you speedy typists a bit edgy.
- **Tables!** Really a mini-spreadsheet right in the program. More than the "boxes" that you could fashion with 3.0x, these will do the simple math and formatting that you need. Define the number of rows and columns and start typing. Word wrap and cell depth are automatic as you type. Tab to the next box, just like the big boys do in Excel. Expect a few formatting glitches if you exceed a page, but it sure beats the old method. And for the REALLY dedicated spreadsheet junkie, you can do a limited link to an Excel document.
- **Menus.** Don't see what you want? Then just add it. ANY function that the program offers can be selected from a scroll box and tacked on to the menu of your choice. The process is easier than the tricked-up "+" and "-" operation of 3.0x. Want to hog out? There is a master "Add All" selection, or if you've already done that, a "Revert to Default" to put all back in order.
- **Mail.** Send and receive mail without leaving the program. A nice touch for the 9 to 5 networkers. I don't think that I'll have much call for this at home.
- **Outline.** Well, that's what Microsoft calls it. Not many changes here. It does offer a good way to move chunks of text... or make deletes... without having to scroll through the text and highlight it. A few polishes in this mode.
- **Limitations.** The "power user" writers will still lament some internal limits. I'm not hip to all of the whys and wherefores, but a 28K number kept popping up. Seems that if you are trying to index, do a table of contents or

work on massive documents, this is going to be a sticking point. (And I don't think that anyone asked if the "dot commands" are gone from the index/toc operations. That is probably still in, just so Microsoft lets us Mac Users know that the Mac isn't the only system that they write for.)

After Kathy covered most of the main grain, there were a lot of questions from the user bunch. Word has been a love-it, hate-it program over the years and this new release may soothe a few brows, but you can bet there will be a few frowns too!


Back to the front...

Preceding Kathy's presentation, *David Stovall* and *Mike Carlson*, co-chairs for the Mac User group, took us through the intros and announcements. There were a lot of fresh faces, as new members took in their first meeting. Mike has made contact with a newly formed group on the North Shore (of Superior!) that will anchor the Arctic Circle side for the club. In another direction... east, that is... we can look forward to a New Richmond branch forming in the near future. Welcome to you all, and may more join your ranks!

During the Q/A session, we had a few of the typical types of questions, like how to do a hide cursor in HyperCard and what's a good database to store digitized photos. One of the more unusual and interesting discussions... for me, at least... was on insurance. I had one of the Chubb Group policies, back when that was about the only thing around. I felt that the company failed to show any interest and fortunately I never had the need to place a claim.

As systems come and grow, it sounds like some of the more traditional homeowner's carriers are coming up to speed, and some specific specialties are offering more, too. You might want to check with your current insurer to see if some things may already be covered, or can be for a small added premium. More extensive policies may be more to your liking by checking with Data Security Insurance (a St. Paul Company division) or some similar insurer. Coverage of programs, and even data, may be obtainable, if you need it.

More bytes later...

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BOARDROOM QUALITY

Is HyperCard Growing Up?

March HyperCard Meeting

by Tom Edwards

Have you wondered when HyperCard would find something to tackle with a vengeance? Something that smacked of "business" so we all could say "See? I can do all of these 'serious' things as well as have fun with my HyperCard" and make it all OK? Like a kiss on a bruised elbow.

Just may be here soon. We've seen Focal Point, Business Class and Presentation Passport. Now it looks like some real heavyweights are in the wings. If you catch the Mac mags, you must know that major accounting firms are using HyperCard, that supercharged sorting routines can be linked into HC and that the CDROM link is expanding access to big caches of information.

At the March HyperCard meeting, Jim Kaufmann demoed a program that is HC based. The program is MacClass Ads II, and it may set the classified advertising industry up straight for a hard look at lil' ol' Mac. This wouldn't be the first venture into the publishing industry for the Mac, but it does break from the graphic path.

Say again?

Classifieds. You know, the estate sales, cars, houses and assorted junk that we all try to sell off every once in a while. This is an integrated set of stacks that is designed to use at the phone to take down the information from a customer. Buttons, scrolling fields and clicks help enter the mundane information necessary to set up an ad, track its placement, compute and send the billing and follow up on repeat placements.

The meatless part is that all of this is then sorted, formatted and sent out to a text file for PageMaker or other page makeup program. If you want, the file can be "tagged" so that styles are set as the file is placed. This is a great customizer and work saver for the makeup department.

Jim's been around the newspaper business long enough to know that this brings a lot of utility to the classified business. This thing is no slouch in the price tag category, for it comes to market for \$1,500 or \$2,500, depending on how many bells and whistles you want. But compared to other entries in this field, MacClass Ads II will be thousands of dollars less investment and offer equal or better return. Future versions of the program may handle the ability to place display ads, as well as the

classifieds.

No question, HyperCard is showing some stirrings as a power player.

Keeping up to date...

Mike Carlson, coordinator for the HyperCard group, gave the folks a mini-tour of the newly expanded digs at Hagen's, the meeting spot for the group. The new classroom provides a lot more room and offers all of the large screen, chalkboards and presentation needs. A real class place to meet.

Other news discussed was how to obtain HyperLink magazine, what's in store with Silicon Beach's SuperCard, and mini-lessons in animation and button control.

Oh, yes. One other thing that was a stitch. Did you know that the New York IBM User Group uses a Mac for their newsletter production? May the best machine win!

More bytes later...

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Lining Up the Linotronic

March DTP Meeting

by Tom Edwards

Gettin' down to the facts, folks. Say you got a page to print out on a Linotronic? Worried that what you see (the first time) may not be what you want when it comes out of the soup? Tips, tips and more tips were the order of the day (evening?) at the DeskTop Publishing S.I.G. for March, with the focus being on how to avoid that unhappy situation.

Chuck Bjorgen, coordinator of the group, lined up Barbara Flipson (Picas & Points) and Pat Cannon (Alpha Graphics One) to tell it from the service bureau side. They had a lot of good suggestions on how to get what you want the FIRST time, along with information about the services that their companies offer to the desktop publisher.

At Picas & Points...

They have had an active Linotronic imaging center up and running for 3 years. This is supported by most of the available Adobe fonts. Processing is done with RIP (Raster Image Processor) with additional RAM... a real help to the speed in getting most images shifted from the Mac to the Lino.

And at Alpha Graphics One...

The RIP has been on-line since September. Though this isn't long on its own, AG1 has been in the typesetting business for some 14 years. They have a Linotronic 300, a pretty pricy item, and soon will add film output. The Linotronic 300 is capable of a higher dot-per-inch count than the Lino 100... not that you will know, or need, it for a lot of the general applications turned out on the Mac. This was important for their existing customer base, which features a lot of agency-type buyers.

Money in the bank...

How to squeeze the most from your Mac DTP efforts? Here's a few tips from the service folks, and probably one or two from the DTP'ers as well;


- Get screen fonts! Adobe (and others) offer fonts to use with your System File. These give closer match, on screen, to what the Lino or LaserWriter will lay on the finished page. This helps to avoid the line-length changes that are one of the biggest problems with coordination between what you see and what you get. Your service dealer will usually be able to offer these to you at a

nominal charge per font... in the \$5 range. You might also find some on BBS's, and can go directly to the type publisher, too.

- Use caution with new system releases and fonts... now called "nFnt" because of a new numbering scheme. **Suitcase II** or **Font Juggler Plus** (or whatever is the latest version of these programs) are virtually essential tools to take care of the numbering and renumbering of fonts. The old system had a limit of about 255 fonts. This now is something like 32,000 (you DO have them all committed to memory now, don't you?). These DA managers usually straighten it all out for you. Yet you still can have conflicts with the program that you use. Some access fonts by number and some by name. Nothin's ever simple, is it?
- Use caution when incorporating a large TIFF file into a page. Programs leave the actual file on the disk, using a "screen picture" with a lower resolution in the document (keeps the document size down). If you move the TIFF file to another folder (some programs want it in the SAME folder that they are in) or rename it (Gasp!), disaster is close at hand. Depending on the program that you are using, you may get no warning of the missing piece (and no chance to find it) before the file is ported off to the printer.
- The experience of these folks is that CrickDraw and CricketGraph are not very friendly with the Linotronic printers. Use at your own risk of experimentation in order to get a good print.
- Also be prepared to experiment with four color screens. This is new technology and all of the edges are not yet smoothed out.

Oh, yes. Don't forget to set your printer of choice with the Chooser DA. That also means that you need to have the proper driver in your System File. This is the way that what you see is most likely to be close to what you want... to paraphrase a popular acronym.

More bytes later...

TWE 

MacUsers
May 4
"Clariss"

ArcheTyper™ 1.0 Now Shipping

Eugene, Oregon (February 27, 1988) - Laser Digital Corp. began shipping ArcheTyper™ 1.0 today. The new database development system and application shell uses Acius Inc.'s 4th Dimension programmable database and solves a number of perplexing problems present and as yet unsolved in 4th Dimension's programming language. ArcheTyper provides 4th Dimension programmers and users with a tested, full featured, application shell that is both easy to use and easy to understand and modify. ArcheTyper will save months of development time for first time users of 4th Dimension and drastically reduces the learning curve associated with 4th Dimension for both novice and experienced programmers.

The designer of 4th Dimension applications can now quickly and easily implement and manage custom menus while still retaining maximum control over the look and feel of their application. ArcheTyper also provides the designer with a full set of menu commands, buttons and features as well as a library of modular "control loops", pre-sized windows and modular custom window procedures, assorted dialogs and message boxes, plus a number of development tools and aids. In addition, the WindowEditor feature permits the designer to rapidly specify and preview windows and layouts and paste the code from the desired result into their own procedures.

ArcheTyper also contains a full featured Online Help system containing complete documentation for all of ArcheTyper's end-user features permitting the designer to effortlessly include their own help information to the existing topics. End user documentation is also provided on disk to allow the designer to quickly and easily produce end user manuals.

ArcheTyper simplifies the importing and exporting of records with 4th Dimension by providing the end user with "layout independent" dialogs that make importing and exporting as simple as point and click. You can skip fields in a document so that you only import the data you need and you can add blank "spacer" fields to an exported document so it matches the structure required by the destination program. With the simple click of a check box the end user can effortlessly import and export records in the quote and comma delimited format common to most MS-DOS databases and/or save import and export specs to disk for later recall and use.

GOTO Page 14

Puttin' It To Work!

A soap opera from your newsletter staff
by Tom Edwards

Would the Colonel actually pig out on Kentucky Fried? Did Henry drive a Ford? Does Liz use Passion between those, those... you know what? Is the Mini'app'les newsletter REALLY done on a Mac with DeskTop Publishing tools?

I'm sure that you all have stayed awake until the wee hours of the morning worrying over the answers to those questions. Probably holding your breath until you get inquiring minds to come up with provocative responses. Then again, you are more likely to be wondering why you pay dues for this silly newsletter... you could use the fee to buy a bucket of original recipe, take your pick of the Thunderbirds from the Toys-R-Us Matchbox collection, get the current issue of The Police Gazette from Shinder's, and settle in for a evening of thrilling who-dunits.

How to win at Trivia...

Even if you didn't want to know, I'm going to tell. I can't answer for the Colonel, Henry or Liz, but yes, your newsletter staff really does use the Mac like a DeskTop Publisher should. And it's working pretty dang well, thank you!

Dan Buchler, Communications Director, began this tradition back in the days when the Mac wasn't even a gleam in Steve Jobs' eye. We're talking Apple II, folks. When the "in" crowd knew that "Bunker Ramo" was a kludged printer and not pig Latin for "run the Buick into the bunkhouse." Like 10 years ago.

Even into AD times (After DaMac), the routine consisted of "galleys" of printout from Word, cut into appropriate sized chunks and pasted down on card stock as "flats" for the printer to shoot. Not very elegant, but that was the way that it had been done for ages, and it did work. Joan Kistner has aided with the makeup for some time, and can tell you about the paper and X-Acto cuts that were like sacrifices to the paste-up gods.

Once PageMaker came on the scene, things got better... and worse! The "paste-up" could now be done on-screen until everyone was satisfied. The bad news was the lockups and crashes. However, Aldus has worked hard to smooth out the program, and version 3.x is pretty stable. Not only that, but Word 3.0x also has settled down, and works well with PageMaker.

Files pass through several stages. The author

of an article can now send text or Word files by modem to John Hansen (calendar manager) or Kent Edwards (announcements manager). Eventually, most of this ends up as Word files, formatted, then transferred again by modem to Dan. All of this comes together on a Saturday in the middle of the month, when we network 2 or 3 Macs together with Tops. We then paste articles, ads, graphics and other Mac files into PageMaker templates customized for the Mini'app'les newsletter and print it out on the club's LaserWriter. (The only exception to the electronic pasteup might be a screened photo, or an ad from an advertiser, that may still see the gluepot.)

Have we learned anything?

Well, one thing we've learned is where the Reset button is on the Mac! Each System change and every new version of Word, Tops, or PageMaker has brought its own "gift" of new surprises. As we try new features... trying to get it all to work smoother and quicker... we've made, and solved, some of our own problems.

Your money's worth...

What we've learned from the school of hard knocks might save you some time, or better yet, avoid a crash or two for you. For you seasoned users who do this day in and day out, this might be old hat. But as we worked through these solutions (often coming as hints from some of you seasoned players, thank you!), we know how frustrating it can all seem until that magic moment when, CLICK!, it all comes together. Try these on for size:

- Styles. This is a must-do for anyone who repeatedly has to format documents for uniform appearance. A "style" in DTP lingo is the format for a paragraph. It sets the specs for font, size, leading, tabs... all of the type "look" of that paragraph, yet still allows you to override if you need to boldface a word or such. I found this almost incomprehensible trying to learn it from the manuals. After watching a pro set up and use it a bit... CLICK! Find someone to coach you a bit. You will wonder why you waited so long!
- Word 3.0x and PageMaker 3.x work well together with styles, but not perfectly, and this probably is true for most of the other popular programs, too. Experiment, but do it with trial documents when you have the

time to fool around, not when that deadline is going tick, tick, tick.

- If you use Word, Cmd-T (also selectable from the Format menu) will bring up the Define Styles menu. Name your style, using only a letter or two if you can (like "h" for headline style) or something more descriptive like "headline.". Then select things from the menu bar until you have what you want. (The menu bar being active while the dialog box is on-screen is NOT typical Mac. Once I learned that, the rest was easy... almost.) Click Define when you have it as you want, and exit the Define Styles dialog by clicking Cancel or the Close Box... not OK as you might expect from a Mac program.
- You can access a Style scroll box in Word with Cmd-B (also selectable from the Format menu) when you want to apply a style. But it is faster and easier to use Cmd-Shift-S, which will activate the lower-left box in the Word window with the word "Style." Type your style name... "h" or "headline" if you are following the above example... and a Return keypress. The paragraph where the cursor is sitting will be transformed, as if magically, to the format that you defined! Confirmation will be in the box to the right of where the word "Style" appeared (the style name "Normal" usually shows here). It will now show "h" or "headline", whichever is appropriate.
- You can "import" a group of styles from one Word document to another very quickly. Open Define Styles with Cmd-T. Go to the File menu bar and drag down to Open. From the dialog box that appears, "open" the document that has the styles that you want to copy. This will move the styles to the new document without actually "opening" the document that they are coming from. You will see the style list flow into the Define Styles scroll box.
- To get rid of a style, type Cmd-T, click on the style that you want to remove, and do a Cut from the Edit menu.
- "Tags" are coded paragraph leaders that can be placed at the start of each paragraph of TEXT (ASCII) files. They can be "read" by PageMaker so that existing PageMaker styles of the same name will format the paragraphs as the file is placed. If you have a PageMaker style named "fine print", put

Continued on next page

Puttin' It To Work concl.

this name in angled brackets at the start of the paragraph in the TEXT file to be imported, like this... <fine print>. Just continue typing (without a space character after the ">") whatever you want. When placing the file in PageMaker, click the "Read Tags" box in the Place Dialog box. Saves a lot of work for files that are coming from programs that PageMaker can't place as formatted files but can read as ASCII TEXT.

- If you use Word for text preparation, and PageMaker for makeup, be sure to use the Save As... process as the final save of the formatted Word document. Uncheck the Fast Save box or save the document under a different name. PageMaker and Word's Fast Save feature do not get along well. If you Place a Word document that seems to have all of the Styles messed up... the size is wrong, it's bold, etc.... this is the first thing to suspect. There's also a possibility that you have a type style selected in PageMaker as you try to do the Place... but I'm still foggy on that one, so will leave it for another lesson!

(Boy, I sound like an expert! But this is really hard-won stuff from the old School of Hard Knocks.) Word's styles can even be "programmed" so that as you leave one, you get to the next automatically. After you have Defined a bunch of styles... let's say "headline", "byline" and "first paragraph"... go back to the Define Styles dialog and highlight "headline." In the Next Style box, type "byline" and then click Define. Do similar with the "byline" style, typing "first paragraph" in the Next Style box. Again, exit with Cancel or the Close Box.

Back at the typing window in your document, set the Style as "headline." Type a word or two, a Return keypress, another word or two, another Return keypress and some more text. Your typing should show headline formatting for the first line, byline formatting on the second line and first paragraph formatting for the rest... all from setting just the first style in the chain!

One caution. Word allows a shortname, longname (no space after the comma) naming convention for each style. It understands either name as reference to that style. This means a style named "h,headline" can be entered as "h", "headline" or probably even "h,headline" from the keyboard after triggering the Style box with Option-Shift-S. This is a great way to "remember" what a style name stands for.

Although the style will import into PageMaker, PageMaker names it "h,headline" and only understands it in that manner... as one name, including the comma!

You get a real pretty lockup of the PageMaker document when this leads to a conflict. That usually happens after you have Placed your Word document with the shortname, longname style identities, then try to place a tagged file that only is tagged with a shortname or longname identity. This results in trying to place a file with a non-existent style, and that causes brain death with PageMaker.

A new adventure...

This month we will try to use a dropped cap system to simplify the build-up operation that we have been doing up to now. (A drop cap is the lead-in letter reversed out of a shaded box, as at the start of this article.) The old method involves Placing the headline and credit line, the box, the reversed letter, the 4 or 5 lines to the right of the box, and the rest of the article... that's a lot of individual things to monkey around with.

This month, I predefined a shaded box, placed a cap letter on it (reversed style, so it's white) and set the "Text Wrap" to 0.0" at the top, left and bottom edges and .08" on the right. The box was sized to snap to a vertical custom ruler set to 11 point graduations. (This helps us to align things horizontally to the 11 point leading that we use.) A key part of this arrangement was setting the leading of the cap to a small value with the 55 point type size. This keeps the "window shade" for the letter small enough so that it fits inside the graphic (shaded box). If the "window shade" hangs outside of the graphic, the letter jumps out and messes things up. There is a box/letter combination made for each letter of the alphabet, and they sit off to the side of the page on the "pasteboard."

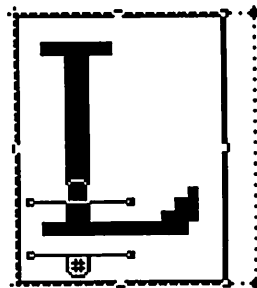


Illustration shows the text wrap offset on the right side of the box and even with the left, top and bottom edges. Note that the window shade for the letter is contained within the border of the graphic.

The hope is that the article can be placed as a single chunk, then the appropriate box/letter copied from the preset stuff at the side and moved into position on the chunk of text. With the Snap To Ruler set, it should kind of jump into place. The Text Wrap should "flow" the text around the graphic, with the fifth line and down sliding under the box to the left column guide. A quick delete of the first letter from the text of the article and it's all done.

If this works, your newsletter team may make it home in time for a hot dinner for the first time in years of pasteup operations!

More bytes later...

TWE



ArcheTyper™ concl.

ArcheTyper requires 4th Dimension, a Mac Plus with a minimum of 1MB of RAM and a hard disk to operate. Large or very complex applications will require more RAM and/or a faster processor for satisfactory performance.

ArcheTyper 1.0 is priced at \$195, complete with documentation, development and examples. A working demo and detailed product literature are also available for \$10. Order line answered 24 hours, 7 days a week. Dealer inquiries welcomed. Visa/MasterCard orders accepted.

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Each Mini'app'les member may run one free non-commercial classified ad per month in the newsletter. Submit ads to Bob Lowe by phone (voice) at 933-0464. Ads received by the second Wednesday of the month will appear in the next month's newsletter. Ads may be edited for length and to fit our usual format. There is a charge for commercial ads, contact Bob Lowe for details.

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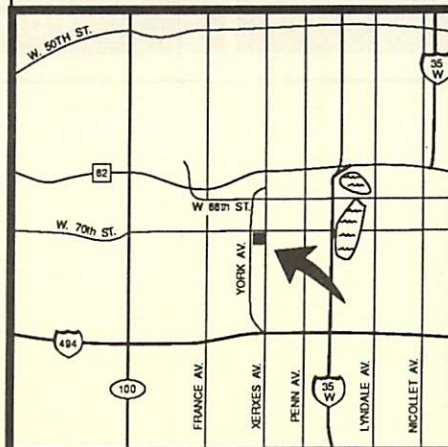
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Apple II SIG

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