



# CURSOR

NEWSLETTER of the COMMODORE COMPUTER USERS GROUP (QLD) INC.

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APRIL 1986

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CLUB ROOMS: Playgr. & Recr. Assn. H.Q. Bldg. Love St. Spring Hill, Brisbane

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## DIARY FOR MAY

Group meeting on Tuesday, 5th May 1986, at 7.30 pm in our Club Rooms in Love St. (near Water St.) Spring Hill.

DON'T MISS THIS ONE!

DEMONSTRATION OF COMMODORE'S AMIGA!

THE MOST INNOVATIVE COMPUTER IN YEARS!

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Workshop meeting on Sunday, 17th May 1986, from 1pm till 5pm in the Guidance Officers Training Centre, Bayswater Street, Milton.  
Bring your programming- or hardware problems, as well as your own computer equipment!

Opportunity to copy the group's Public Domain Disks.

contact Philip Parkin (Ph.378 5383 - a.h.) for further details.

PLEASE NOTE: Workshop Meetings are for MEMBERS ONLY!

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### REGIONAL MEETINGS

Cannon Hill meets on the 4th Saturday of the month (7.30pm) in the Cannon Hill State School.

Contacts: Barry Wilson - Ph.399 6204 a.h. / Aug Norman - Ph.399 2080 a.h.

Pine Rivers meets on the 2nd Sunday of the month (1pm - 5pm) in the Strathpine High School (rear entrance).

Contact: Hugh Gane - Ph.205 1196 a.h.

Redcliffe Peninsula meets on the 1st and 3rd Friday of the month (7pm) in the Redcliffe High School.

Contact: Paul Janek - Ph.283 1663 a.h.

Sherwood meets on the 2nd Friday of the month (7.30pm) in the Graceville State School.

Contact: Leigh Winsor - Ph.379 2405 a.h. / Philip Parkin - Ph.378 5383 a.h.

The Gap meets on the 3rd Wednesday of the month (7.30pm) in The Gap State School.

Contact: Julianne Fallen - Ph.300 2982 a.h.

Wavell Heights meets on the 2nd Tuesday of the month (7.30pm) in the Wavell Heights High School (library), Brae St.

Contact: Robert Adamson - Ph.266 8353 a.h.

Killarney meets on the 2nd Monday of the month in the Killarney State School.

Contact: Roger Frazer - Ph.(076) 64 1370.

Maryborough/Hervey Bay meets on the 4th Monday of the month (7-10pm) in the Sunbury School in Alice St.

Contact: Terry Baade (16 Mouquet Lane, M'borough, 4650) at 21 2271 (w) or 21 5059 a.h.

## SPECIAL INTEREST GROUPS

Primary Education Sub-Group meets on the 3rd Tuesday of the month (7.30pm) in the Aspley State School.  
Contact: Bill Weeks - Ph. 208 8620 (work) or 341 2823, a.h.

Programming Sub-Group meets on the 1st Tuesday of the month, (during main meeting - in our club rooms).  
Contact: Jim Vick - Ph. 282 1377, or Tom Kelly - Ph. 277 9900

Superbase Support Group:

Coordinator: Stan Seymour - Ph. 263 7210, a.h.  
Programming Advisor: Hank Deucker - Ph. (075) 66 1317, a.h.

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## LIBRARIANS'S REPORT

By Maurie Hawkyard - Chief Librarian

It has been decided to incorporate all the Vic-20 material into the appropriate library sections, the books into the Book Library and the programs on cartridge, disk and tape into the Commercial Software Library. Hopefully, this transfer will be completed by the May meeting. I regret having to mention that some club disks have been "lost" at workshops which might well result in inconvenience to members in our having to adopt a stricter system of lending them out. I also have to mention that some software items are being returned in crushed and torn boxes. Borrowers should be aware that the policy of the committee is to seek restitution for items damaged beyond what can reasonably be considered to be fair wear and tear.

Many members who use the libraries will have noticed librarians carefully scrutinising membership cards in order to ensure that library bond details are correctly recorded.

Apart from endeavouring to bring the User Group records up to date and establishing that library users conform to the Group's requirements, which is reason enough itself to pursue the exercise, the main purpose was to compile an accurate list of the people who have paid their \$5 bond before introducing the next major step in the streamlining of the library systems. We appear to have reached the point where we can proceed so this is to explain briefly what we propose to do.

Each bonded member will be given four cards which will have their relevant membership details attached.

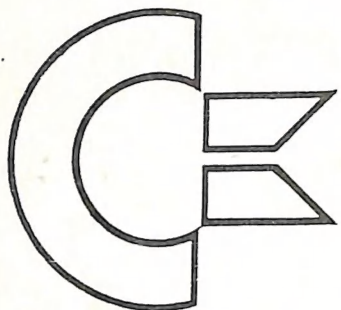
With these cards will be explanatory notes reiterating the rules and conditions of library usage.

The cards are to be used to exchange for library items, books, magazines or software programs and will be returned for re-use when the member returns a borrowed item. This simple exchange will reduce the existing bottleneck of librarians having to record names and check cards at the point of item withdrawal, thus relieving the very considerable pressure on them and substantially speeding up the borrowing process.

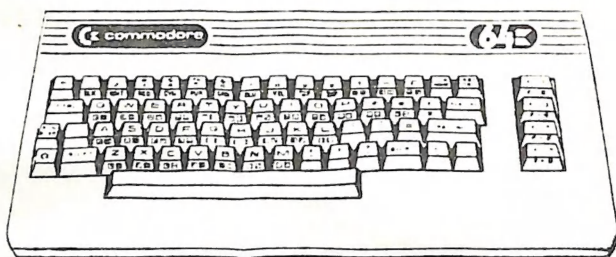
In order to effect a smooth transition, it is most important that ALL items currently on loan are returned at the next meeting, or posted to me at 49 Morialta St., Mansfield, 4122, sufficiently early for them to be checked as having been returned prior to the May meeting. If you are not attending the meeting, please don't leave it to the last minute to post them in.

# CHANDLERS

43 ADELAIDE ST. BRISBANE PH. 221 7822



C-64 SOFTWARE SPECIALS!



CONTACT DREW NOW!

## EDITORIAL

Following on last month's article & editorial on computer magazines I would like to draw your attention to the following:

The current value of the Australian dollar is about the same as the Canadian dollar. (Check the financial columns of your paper for confirmation.)

A recently purchased copy of the special issue of "RUN" magazine is priced as follows: US \$ \$3.95 - CAN \$5.25. Yet the Australian price is \$8.60!!! Even allowing a \$1.00 for freight from overseas (and in bulk it will be considerably less than \$1.00), it means that this magazine should cost no more than \$6.25! Well, who gets the extra \$2.35? We are certain that it is not your local newsagent, so that leaves the importer/distributor.

Makes you think, doesn't it? Of course the same anomaly exists between UK book prices and Australian prices. All this has been documented before, yet nobody seems to care enough to take action. Apart from complaining to your federal parliamentarian the only solution seems to be direct subscriptions from the country of origin. Don't subscribe via Australian distributors such as Gordon & Gotch as you will end up paying considerably more than you have to.

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Looking back over the last six months of "CURSOR" it struck me that very few reviews or articles on games have appeared. To some extent this probably reflects my own taste as I am more interested in application type software than games.

However as a lot of our members (particularly the younger ones) are very keen on games it is only right that more games reviews should appear in this newsletter. The problem arises from the fact that most of your committee members are too busy to play games, let alone review them.

This then is a plea to all the keen game playing members to write us some reviews on recently purchased games. They don't have to be long reviews - if you can sum up a game in 20 lines rather than 200 lines all the better. And you don't have to write 'nice' reviews. If you think that a certain game is second rate, or you get bored with it after playing it once or twice, say so - it might stop others from wasting their money!

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Have you recently visited Brisbane's main Commodore dealers? What struck me was the fact that they all carry a range of software, but that range is only a fraction of what is available on the market. Obviously if the software is not selling dealers would be unwilling to expand their range, but if the prospective client cannot find the desired program he/she is likely to walk out without purchasing. Rather a 'Catch 22' situation, isn't it?

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**IMPORTANT:** The deadline for the acceptance of articles, advertisements, and letters for this newsletter has been brought forward to the FIRST TUESDAY OF THE MONTH (the day of our main meeting).

Material received after this date will not be published till the following month.

Ralph De Vries

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## NOTES & GOSSIP

### APRIL MEETING

Our first ever meeting on 'April Fool's Day'. Attendance was slightly less than normal, but this was probably due to school holidays - however the libraries were as well attended as ever. Even our management committee had less to say than usual!

At this meeting we had a C-128D computer on display, as well as the new MPS 1000 printer (see review elsewhere). We first ran a program called "Stealth". This was our April Fool's treat, as the program only comes up with 'strange' replies on entering Basic commands. Not very useful, but funny the first time round.

Greg Perry gave a short demo of a business program that he is currently writing for the 128. As Greg said: "the more you use the 128, the more you realize what a good computer it really is".

This was borne out by the fact that more and more hands go up at each meeting when we ask how many 128 owners are attending. A considerable increase was noted at this meeting.

### INTERSTATE VISITOR

Passing through Brisbane recently was our old friend from Canberra, Paul Blair. Apart from being a faithful public servant to our Federal Government (he has got something to do with bicycle tracks, roundabouts and Russ Hinze we believe), he is of course a devoted Commodore buff and, like our president, fills many pages in computer magazines with great words of wisdom. Fortunately he wears this knowledge quite lightly and never shows off how clever he is.

Paul wrote the series of articles "Starting with Disk Drives" in response to requests of many new 1541 owners who were completely befuddled by Commodore's first users guide for this drive. Many user groups ran these articles in their newsletters, including ourselves. After publishing them in our newsletter we got permission from Paul to issue the articles in booklet form, which has been a steady seller for over a year now.

Now, with the arrival of the C-128, the C-128D, and 1570 and 1571 drives we have acquired Basic 7 with it's own set of disk commands, which are very different from Basic 2. We suggested to Paul that he update his series of articles on disk drives to cater for these new users, but he has beaten us to the punch, as he is already working on them. We very much look forward to this new set of articles.

In the meantime Paul is busy testing and collating data about the new disk drives, which hopefully will give us some badly needed further information on these new units.

We have also just received the March '86 issue of the 'TPUG' magazine from Canada which includes an eight page memory map for the C-128, which is a joint effort of Jim Butterfield and Paul Blair. Well done Paul!

### ATTENTION DPS 1101 PRINTER OWNERS

We have noticed that the ribbon cartridges for this printer tend to shed varying amounts of carbon particles. Recently we used Pelikan ribbons which were particularly bad in this respect. We would suggest to owners of this printer that, on finishing a ribbon and prior to installing a new

cartridge, you use a fine nozzle attachment on your vacuum cleaner to remove this deposit. Failure to do this could eventually lead to extra service calls.

### HALLEY'S COMET

Our astronomer member from The Gap, Peter Anderson, who owns the Taylor Range Observatory, has never been busier than during the last couple of months with our friend Halley in the skies. In association with the local Lions Club, he has even started to raise money for the Kidney Foundation, by allowing members of the public to view Halley's comet and other heavenly bodies. Great work Peter!

### SID EDITOR

In a recent review in the TPUG magazine mention was made of a program called "SID Editor", which was published in Compute!'s book "All about the Commodore 64 - Volume 2", by Craig Chamberlain. It appears that this music program seems to be far better than many commercial music programs currently on the market.

If any of our members has a copy of this program your editor would love to hear from you.

### JOKE OF THE MONTH by RION FALLEN

What do you get when you cross a computer programmer with an olympic athlete? Give up? Why, a floppy discus thrower, of course !

### BAD NEWS

Our friends at Australia Post have advised us that postal tariffs will be going up in the near future - a fact we are all aware of. However in the same communication it was made rather abundantly clear that next year we will see the abolishment of the so-called 'Registered Publication Tariff', which will in fact mean a substantial increase in our monthly postage bill. Who said inflation was dead?

### THE QUEST FOR NEW PREMISES

Very few suggestions for new group premises have come forward. The ones that were suggested were either far too expensive, or lacked regular parking facilities. However, your committee is still investigating several possibilities. We will keep you posted on developments.

### US MAGAZINE SUBSCRIPTIONS

Your editor and several other members aren't the only ones who have problems with subscriptions. Our member Doug MacLurkin had problems with his "RUN" subscription and was ready to post off an 'interesting' letter to the publishers, but they must have got wind of this, as all of a sudden his magazine appeared. This was lucky for all of us, as Doug's letter could have strained Australian-US relations for years to come!

A thought: "Do these US computer magazine publishers really use computers to speed up processing of subscriptions?" So much for so-called American efficiency!

REMEMBER - DEADLINE FOR "CURSOR" ARTICLES AND ADVERTS: 1ST TUESDAY !

## PRICE LIST [Members Only]

PUBLIC DOMAIN DISKS \$. 6.00 ea (Postage Paid)  
PUBLIC DOMAIN TAPES \$ 2.00 ea (+ \$1.00 Postage Per Order)  
BLANK DISKS \$20.00 per box of 10 (+ Postage \$2.00)  
DISK BOXES (hold 90 disks) \$20.00 ea (+ \$5.00 Postage)  
"PUBLIC DOMAIN BOOK" \$5.00 ea (+\$1.00 Postage)  
"STARTING WITH DISK DRIVES" \$2.00 (+\$1.00 Postage)

TURBO-ROM for C-64: Members price - \$40.00

Customised version (your choice of screen start-up colours + your name on the start-up screen): \$45.00

USER PORT PLUG (with Key Way) \$8.00 (+\$1.00 postage)

USER PORT PLUG BACK SHELL \$3.00 (+\$1.00 postage)

COMPUTER DESKS (2 shelves - steel frame) \$60.00

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Address all orders to P.O. Box 274 - Springwood - QLD - 4127  
Cheques to be made out to: C.C.U.G. (Q) Inc.

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UPGRADE CHARACTER EPROM for 801/1525 Printers.  
(Gives Descenders on p,q,g,y, and j. Also requires exchange of a ROM chip)  
Price (supplied & fitted) \$30.00

For further information on the above contact Lester Bennett on 800 1243 before 8 pm on week days.

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AVAILABLE FOR HIRE TO MEMBERS ONLY: 1526 COMMODORE PRINTER

For details contact Roger Haigh on 399 8037 (after hours).

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EQUIPMENT MODIFICATIONS performed by Anthony Thyssen and Terence Arnott during main (Milton) workshop.

If this is not suitable contact Anthony (weekends only) at 075 451 717, or Terence at 369 1390.

### SERVICES OFFERED:

RESET SWITCHES	Serial Port	\$6.00
	Built in	\$6.00
DEVICE NUMBER CHANGE	Printer/Plotter 4-6	\$6.00
	Disk Drive 8-9	\$6.00
TURBO ROM FITTING	Computer w. socket	\$5.00
	Socket required	\$7.00
SERIAL SWITCHING BOX		\$14.00
SERIAL PORT DOUBLER	(with reset)	\$14.00
DRIVE ALIGNMENT	(Works in most cases)	\$6.00
DRIVE CLEAN & OIL		\$6.00



Disk 019. C.C.U.G.Q. , UE

Most of the programmes below are from the book STEP BY STEP PROGRAMMING which should be read in conjunction with these programmes.

RUN ME FIRST	Explanation of most of the programs below.
INITIALIZE	BLOCK A
BLOCK AB	BLOCK B
POINT STAR	BLOCK A-C
BLOCKS A-D	BLOCK D
RADIATING PATTERN	RANDOM LINES
BLOCK E	LINE LANDSCAPE
RECURSIVE CIRCLE	TELEPHONE
BLOCKS A-F	BLOCK F
BLOCK G	ROTATING SQUARES
JUNGLE	SEASCAPE
FLIGHT SIMULATOR	BLOCKS A-H
COLOR CHART	BLOCKS A-I
PATTERN FILL	BLOCKS A-J
WALL & GATE	PATTERN FILL BOX
DIAMOND COPIER	BLOCKS A-K
	GRAPHICS EDITOR

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DIRECTORY PRINT	Hank Deucker modification of previously issued program.
ONE TOUCH KEY	One touch keywords. Programmers aid.
SPEEDSCRIPT 3.2	Latest version of speedscript.
DISK DISASSEMBLE	Disassemble from disk or RAM
TRACE	For debugging programs. Instructions in REM STATEMENTS
TRACE/STEP/WALK LIST	Part of above program.
lines	Indents loops and lists multistatements on separate lines
PROGRAM LISTER	Autoboot for LISTER
LISTER	Booted by PROGRAM LISTER. SYS 49152 to activate.

Disk 020 C.C.U.G.(QLD) INC. , UF

COMWARE	Commercial Software Catalogue (Speedscript file)
MAGWARE FEB 86	Magazine Catalogue (Speedscript file)
BOOKWARE FEB 86	Book Catalogue (Speedscript file)
ASSEMBLER.BOOT	Machine Language Assembler for C-64, from Compute's Gazette January 1986.
MLX II	Latest Version M/L editor for Compute's Gazette programs
ASSEMBLER	Loaded by Assembler.boot
ASSEMBLER.SOURCE	Used in above
DISASSEMBLER	Disassemble M/L programs from disk or memory from Compute's Gazette January 1986
SPRINT.BOOT	Basic Compiler for C-64 programs. Compute's Gazette, January 1986
SPRINT	Loaded by boot above
SPRINT.DEMO	Used in above
SPACE ARENA.BOOT	Space Game
SPACE ARENA	Loaded by boot
LABYRINTH	Find your way through a maze. Game.
WHAT'S UP DOC	Disk error diagnostic utility
WESTWARD HO	Join the Gold Rush. Game
WAREHOUSE	Organise the business of a warehouse
ATOMIC HANDBALL	Game
BASIC WINDOWS	Subroutine to create windows in basic programs
CUSTOM LABELS	Design your own labels
OFF SCREEN TRACE	Debugging utility
STAR DUEL	Game
FREEZE FACTORY	Game
POWER POKER	Poker Game from Compute's Gazette Nov.1985
PREVIEW 80.BOOT	View Speedscript files in 80 column mode
PREVIEW 80	Loaded by boot above

## C-64 REVIEWS

### GAMES ON DISK

Reviewed by Julianne Fallen

#### ACTIVISION'S LITTLE COMPUTER PEOPLE

This program is not so much a game as an observation of one of the little gremlins that live in your computer. As we all know, there has to be one in there to cause all the silly little things that happen from time to time with our computers.

When the program starts, it asks for a time. Depending on the time of day you pick, he starts out with his everyday activities. He also has a little pink dog living in there with him (no wonder we have problems). One thing you must remember to do is feed him and his little four legged friend. This is done by ringing the doorbell which he answers to see what goodies you have sent him. These he takes into the kitchen, opens the can of dog food and feeds his little pet (a play on words there), and puts anything else in the fridge for his meal later. At the appropriate time he enters the kitchen, busies himself at the bench, puts his food on the stove to cook, then goes into the living room to read his paper until it's ready. He gets a glass of water, dishes up his meal and sits at the table to eat it. When he is finished, he does his washing up straight away, goes up to the bathroom, cleans his teeth, has a wash and sometimes goes to the toilet!

If you want him to do specific things for you, you must pat him. To do this, he sits in his chair in the living room and when you hit CTRL P, a hand appears at the back of him and proceeds to caress his head (I knew there was a secret to getting my computer to work when I have problems). The look on his face and the way he moves when you do this are quite amusing. You then communicate with him via a message board. He can play the computer (clever fellow), play the piano, play his records, watch television, type you a letter, answer the phone, and do his calisthenics (he needs this, it gets cramped living in small spaces). I have been told that he can also build a fire, play cards with you, have a shower, and go to bed when he gets sick - this happens when you forget to feed him - but as yet I have not witnessed these. He also likes to hide in the cupboard upstairs. Well, I suppose we all have to have a little privacy sometimes. If you have a few hours to spare one day and you're not likely to have anything important to use your computer for, try loading up this program and amuse yourself with this little fellow's antics. It will be well worth it, although you must be patient with him for sometimes he is a little slow to respond. But then you already are aren't you? You must be if you own a computer!

#### HAUNTED HOUSE - MYSTERY AT PINECREST MANOR

This is an excellent program by Wizware, the company that put out some great educational software. The game takes the form of a story similar to the Choose Your Own Adventure Books which are so popular now with kids. There are graphics included in the story and some funny sound effects to keep their interest. It helps to improve their reading without being too painful and teaches them to make decisions for themselves and also makes them aware of the consequences as the story progresses.

Haunted House as the story implies revolves around the activities inside a so called deserted house. Some decisions have to be made before you even set out for the place. Try the ghost who lives there for some of the

latest lines in ghoulish jokes. The end comes according to the different ways you choose to go, and is not always the same.

Mystery at Pinecrest Manor on the other side is a "Whodunnit" story in which you must find out who stole the Egyptian relic from the house on a deserted island. You must pick up the clues as you go along, piece them together and decide for yourself who was the culprit.

Age groups up to about 12 years will enjoy these.

#### KING'S RULE

Another educational game which really gets you thinking. Basically, the idea of the game is to answer mathematical questions set to a rule. If you succeed in answering three correctly, you are presented with a key, but you need three keys to gain entrance to the next part of the castle. And so it goes on. The rule is set at the beginning of each section and is easy to start with, but becomes progressively harder as you get deeper into the castle. I gave up after about the third level as I just couldn't see the connection between the numbers, e.g. First Level Numbers might be 2, 4, 6 - thus the rule is add two. But by the third level the numbers might be much more obscure, eg multiply by 3 and add 17 or some such pattern which is probably easy once you pick it.

A good game for all ages to make you scratch your head.

#### MASK OF THE SUN

This is a new adventure game that I came across recently. My son seems to enjoy playing it although he hasn't progressed a great deal as yet. He tells me this is because of the graphics in it, namely when you are in the jeep the screen moves to give the effect that you are driving along the road.

You play the part of MacSteele searching for the legendary mask to cure your mysterious illness, controlled only by pills which you must carry with you always. To drop them means your demise. You spend much time on the road in a bouncing jeep and searching in tunnels. You must also cross a lava pit and complete one out of three riddles correctly to get through two of the locations. This game offers several challenges not often found in adventures. The most difficult is unravelling the mystery of the maze. Good adventure with good graphics and some sound.

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"REVS" - by Firebird Software - On disk: R.R.P. \$49.95  
Our Review Copy by courtesy of CW Electronics, Stones Corner

Review by Ralph De Vries

Do you like Flight Simulator, Solo Flight and similar aerial simulations? Well, I don't! The reason is not far to seek; I know nothing about flying aeroplanes, I am slow at 'catching on', and I usually crash the darned things before take-off!

Now 'REVS' is not an aircraft simulator, but a racing car simulator - or, to be more precise, a Formula 3 racing car simulator. There are many racing games on the market, such as 'Pit Stop' and others. Some of these are very good, but 'REVS' is in some respects the most realistic one of them all. It comes with heaps of documentation (that's probably the reason for the \$49.95 price tag), although there are lots of references to Acorn computers - the program was originally written for Acorn. Included is a

large map of the Silverstone racing circuit and a smaller one of Brand's Hatch.

The main manual first tells you all about the normal controls in a Formula 3 racing car, but fortunately the car on your computer screen has only a rev counter, a gear indicator (5 forward and reverse), a steering position indicator, and wing mirrors, so that you can see if another car is on your tail.

My main gripe is with the way you control your car. One is given several options, but I was only able to try one of these out. The options are:

With computer keys

Computer keys and steering paddle.

Switched (i.e. a 'normal') joystick with steering paddle.

Analogue joystick.

As I don't possess either a steering paddle or an analogue joy stick (paddles won't do) I was forced to use the keyboard, and I hate it, as I always keep on pressing the wrong keys!

[Our member Barry Wilson constructed an analogue type joystick to emulate a Koalapad - with some minor modifications it will probably work fine. The Coleco Game Computer steering wheel could possibly be modified to work with this game as well.]

The keys to use are the 'T' (for Starting), the 'S' (for throttle), the 'A' (for braking), the 'CTRL' (for gears down), the 'Q' (for gears up), and the '[' and ']' keys (for steering). With an analogue type joystick one would only need to use the starting key on the keyboard (make sure car is in neutral) and all other controls via the joystick - obviously a lot easier. Well, when you are ready to start you are given the options of the two race tracks, a practice session or a racing session, as well as specifying the angle at which you wish to set the front and rear wings of your car (these affect speed and road holding etc.)

Well, all you city slickers in your automatic sedans, hold on to your hats, because driving a Formula 3 racing car isn't a piece of cake! After struggling valiantly for several hours in the practice mode (and repeatedly crashing in the corners) I was ready to hand the thing over to my son. He did some hair raising things as well, but at least he managed to complete the circuit several times.

Once he reaches a respectable speed we may even let him try his hand at the racing mode, in which there are three categories: Novice - Amateur - Professional. Anybody can partake in the Novice section, but you have to achieve a minimum qualifying time to partake in either the Amateur or Professional division!

Without going into all further details of the game, I hope that I have given you some idea of it's features. In the accompanying literature a lot of information is given on cornering, overtaking, which gears & what speeds to choose for a given bend or corner etc. The English Formula 3 driver David Hunt gives additional advice on how to tackle the two racing circuits, all very technical, but obviously great fun to the racing car enthusiasts.

Of it's type this is probably one of the best car racing simulators currently on the market, and as such can be very much recommended to racing enthusiasts. However I would still advise the potential purchaser to try to obtain an analogue type joystick from Barry Wilson for ease of use.

--ooOoo--

## FIRST IMPRESSIONS: MPS 1000 PRINTER

by Ralph De Vries

For some reason I have acquired the reputation as a printer expert, which I hasten to add I am not. I can safely say however that I have owned a variety of printers, but that has not made me an expert, only more critical!

In succession I have owned a 1526 printer, an 801 printer, a Gemini 10-X with Card?/+G interface, and currently I am using the DPS 1101 daisy wheel for producing the news letter.

I could say plenty about Commodore's 1526 (=802) and 801 printer, but I'll limit myself by saying that they were built down to a price, lacked many features, and were badly documented. For this and other reasons I decided to upgrade to the Gemini printer which, being a Centronics type printer, needed an interface to make it work with Commodore computers. Well, after sorting out all the hassles with interfacing, dipswitches etc. I ended up with a dot matrix printer which was capable of doing all sorts of good things that were impossible to do with the Commodore printers, however I always hated the extra connections which were required in using separate interfaces - as it is there are enough bits of wires floating around. For newsletter production however a daisy wheel printer became a necessity to guarantee a reasonable standard of reproduction, hence the Commodore DPS 1101 - a good printer, but again with dreadful documentation.

Our president has been fortunate enough to get hold of the new Commodore MPS 1000 dot matrix printer, even before it was seen by Commodore in Brisbane!

I was there when he unpacked it, installed it and got it working. Well, fellow members, I am rather enthused about Commodore's latest effort. I really feel that Commodore has turned over a new leaf lately. No longer the Tramiel dogma of cheap rubbish at a low price. The 1571 drive is a good example that Commodore can produce decent disk drive, and now they have proved that they are capable of producing an equally decent dot-matrix printer. In the previous issue of "Cursor" I gave a brief outline of this printer's features. With the exception of the printing speed in the NLQ mode (20 cps instead of 40 cps) all other features are correctly detailed there. The printer, which is manufactured by Epson, is very similar to the Epson GX-80, but offers quite a few extra features (no italics however, but this is offset by the Near Letter Quality mode which I consider far more useful). It interfaces to a Commodore with the standard serial cable, but also has a Centronics port, which means that Commodore's CP-10/20 and the Amiga can be connected to this printer, as well as any other computer which utilizes a Centronics port.

The instruction book seems to be first rate (hurray Commodore!). The first section tells us all about connecting the printer in the so-called Commodore mode. To all intents and purposes the printer than acts in a similar fashion to a Commodore 1526/802 (same features), but does offer Near Letter Quality mode.

We used the printer (in Commodore mode) with the Superscript wordprocessor. The printer file used was Commodore dot-matrix which gave us normal (10 char per inch), enhanced, or reversed printing. Then we changed a couple of dipswitches which put the printer in the so-called IBM mode, used the Epson printer file, and now we had all the different print pitches, underlining, sub- and superscripts etc. This IBM mode is very well documented in the book, also giving many examples in Basic on how to access the many features.

I have not yet seen how the printer deals with the different graphics packages such as Doodle, Koala, and Printshop, but I cannot foresee any problems.

Although a bit more expensive than previous Commodore printers I feel that the extra cost is certainly offset by the extra features and this will now obviously become the standard Commodore dot matrix printer. Considering that now we can have all the extra features which previously were only available in non-Commodore printers, plus the fact that no extra interface has to be purchased, must surely make this the logical choice for all prospective printer purchasers.

-----

This is DRAFT mode:

ABCDEFGHIJKLMN<sup>o</sup>PQRSTU<sup>v</sup>W  
abcde<sup>f</sup>ghi<sup>j</sup>klm<sup>n</sup>opq<sup>r</sup>stuv<sup>w</sup>

This is EMPHASISED mode:

ABCDEFGHIJKLMN<sup>o</sup>PQRSTU<sup>v</sup>W  
abcde<sup>f</sup>ghi<sup>j</sup>klm<sup>n</sup>opq<sup>r</sup>stuv<sup>w</sup>

This is DOUBLE-STRIKE mode:

ABCDEFGHIJKLMN<sup>o</sup>PQRSTU<sup>v</sup>W  
abcde<sup>f</sup>ghi<sup>j</sup>klm<sup>n</sup>opq<sup>r</sup>stuv<sup>w</sup>

This is NEAR LETTER QUALITY mode:

ABCDEFGHIJKLMN<sup>o</sup>PQRSTU<sup>v</sup>W  
abcde<sup>f</sup>ghi<sup>j</sup>klm<sup>n</sup>opq<sup>r</sup>stuv<sup>w</sup>

This is ELITE mode (12 cpi):

ABCDEFGHIJKLMN<sup>o</sup>PQRSTU<sup>v</sup>W  
abcde<sup>f</sup>ghi<sup>j</sup>klm<sup>n</sup>opq<sup>r</sup>stuv<sup>w</sup>

This is CONDENSED mode:

ABCDEFGHIJKLMN<sup>o</sup>PQRSTU<sup>v</sup>W  
abcde<sup>f</sup>ghi<sup>j</sup>klm<sup>n</sup>opq<sup>r</sup>stuv<sup>w</sup>

This is ENLARGED mode:

ABCDEFGHI<sup>JK</sup>LMN<sup>OP</sup>QRSTU<sup>V</sup>W  
abcde<sup>f</sup>ghi<sup>jk</sup>lmn<sup>op</sup>qrstuv<sup>w</sup>

This is UNDERLINED:

ABCDEFGHI<sup>JK</sup>LMN<sup>OP</sup>QRSTU<sup>V</sup>W  
abcde<sup>f</sup>ghi<sup>jk</sup>lmn<sup>op</sup>qrstuv<sup>w</sup>

This is SUPERSCRIPED:

ABCDEFGHI<sup>JK</sup>LMN<sup>OP</sup>QRSTU<sup>V</sup>W  
abcde<sup>f</sup>ghi<sup>jk</sup>lmn<sup>op</sup>qrstuv<sup>w</sup>

This is SUBSCRIPED:

ABCDEFGHI<sup>JK</sup>LMN<sup>OP</sup>QRSTU<sup>V</sup>W  
abcde<sup>f</sup>ghi<sup>jk</sup>lmn<sup>op</sup>qrstuv<sup>w</sup>

SAMPLES OF PRINT STYLES AND FEATURES OF THE MPS 1000 PRINTER

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## COMMODORE'S AMIGA

by Ralph De Vries

By the time you read this some demonstration models of the Amiga may have arrived in the showrooms of selected dealers. Some of our members were lucky enough to have a good look at this machine during the Computer Expo last November.

It is obvious that this is a computer which will initially only be owned by a relatively small section of our current members, as it is unlikely that you will get much change out of \$3000.00. Add-ons and software for this type of computer tends to be a lot more pricey as well. My guess is that the average software package for this machine will be around \$200.00 or more.

And yet, this type of machine or it's successors, seem to point to the future of computing at home. In the latest issue of "Transactor" magazine there is a very good overview of the Amiga and some of it's software.

I would have liked to copy the whole article, but as that is illegal, I'll restrict myself to plagiarizing some of the good bits!

When you first switch the Amiga on nothing really happens, as everything is loaded in from disk (3,5 inch micro floppies, each holding 880K). The first thing you boot up is "The Workbench", a Macintosh/Gem like interface that let's you control the computer by means of the ubiquitous "mouse". The first thing you see is a little picture of a disk with it's name underneath. Point to the disk with the mouse-controlled arrow, click the left mouse button twice, and ZAP, a window appears on the screen with the contents of the disk displayed. The disk programs (called tools) are displayed as icons - little descriptive pictures - which can be double clicked like the disk icon to run the program. A window may contain 'drawers', which are sub-directories containing several tools, projects (files used by tools), or more drawers. Opening a drawer brings up another window somewhere on the screen, showing the contents of this drawer.

Does that sound messy with all those windows, icons, drawers etc.? Well, it is not really - because you have several 'gadgets' available on the screen to control these windows. Thus you can change the size and shape of the window, reposition it anywhere on the screen, and even put it in front or behind other windows. There are numerous other ways to handle these windows on the Amiga.

You may well ask: "What is the use of all these windows?" Apart from the obvious advantage of having a lot of information at your finger tips, the answer must surely lie in the word "Multi-Tasking". Consider the following:- You have just finished writing a huge document on your wordprocessor and have instructed it to do a spelling check, which will take quite some time. So, instead of waiting, you pull down the window with your spreadsheet program to work on that in the meantime. While working on that you notice on a small window in the corner of your screen that somebody is trying to access your bulletin board system. You just enlarge your BBS window and go into chat mode with your caller for a while. When you have finished with him, you decide that prior to going back to either your spreadsheet or word processor, you may as well check your disk directory to see how much storage space is left. Of course, if after all this activity you feel rather exhausted, there's nothing to stop you from playing with your adventure game that is also visible in a small window in another corner of the screen. You can rest assured that your letter's spelling has been checked in the mean time! Does all this sound a bit



fanciful? Well maybe it is, but I can recall lots of occasions on which I have been wanting to access some information while performing a specific task at the computer, and was unable to do it without removing program 1 and reloading program 2. Incidentally this multi-tasking facility is not available on either the Atari 520 ST or the Apple Macintosh.

So, now you are an expert in handling your mouse, windows, and icons. The next step is getting some software. The range is still rather limited, but is starting to expand fairly rapidly. The "Textcraft" word processor from Commodore is a fairly good example of what the new machine is all about. Imagine, you users of Easy Script, Speed Script etc, a word processor without control characters on the screen! Thus italics, underlining, and bold-face appear exactly on the screen as on the final printout. Yes, this even includes margins, indentations, headers and footers etc.!

You think that the C-64 SID chip is pretty good? Wait till you hear the Amiga synthesizer and you will change your opinion. "Musicraft" from Commodore allows quite magical things to be done with the four-voice stereo sound chip. Connecting the chip to a good stereo amplifier and speakers will make you sit up in wonder.

For the graphic artist there is "Deluxe Paint" by Electronic Arts. You can pick up to 32 colours (out of the total of 4096 shades available) to have on your screen at a time. The possibilities of this type of program make your old Koala Pad seem rather old fashioned. However, no matter how good the music and graphics packages are, a reasonable amount of artistic talent helps a lot!

So much for some of the applications software. Yes, I know games are available as well, but I doubt if many people would buy the Amiga just to play games.

And what about the user who wants to see what makes the thing tick - your programmers etc. Well they have not been forgotten. For a start they can get directly to the Amiga DOS via the Workbench, and rather than working with the icons and windows etc can issue direct commands to the computer. These commands have nothing much in common with existing Commodore DOS commands. You have to be prepared to learn an entire new instruction set.

Amiga's are now shipped with AmigaBasic from Microsoft. The Amiga we saw in Brisbane was supplied with ABasic from Metacomco. I had a quick look through the ABasic manual and found it remarkably similar with Basic V.7 of Commodore, despite quite a few new commands. However Microsoft's Amiga Basic is an entirely different kettle of fish. It is a fully structured version of Basic, which no longer requires line numbers. In fact it probably is more like COMAL than CBM Basic.

Apart from the new Basic you have the choice of the "C" language and Pascal, and others are on the way - and we have not even touched upon machine language, which will have to be re-learned by the 8-bit m.l. experts.

From the above it must be clear that programmers who are experts in 16 or 32 bit computers, such as IBM and Apple's Macintosh will probably have far fewer problems in coming to terms with the Amiga. All the same, those Commodore programmers who feel that they have just about exhausted the possibilities of the 6502 series processors, can now start afresh and they should be well and truly occupied for the next five years or so!

And what does it mean to our users group? Initially not very much I think.

No doubt some of our more well-heeled members will buy an Amiga when they become available - others will probably sit tight for a while to see how things will develop. Given that some good (and I mean really good) business and applications software will appear on the market, quite a few may change because of inherent limitations of the current range of 8-bit computers; limitations of speed of access and of storage space. One thing is quite obvious: the Amiga is potentially a far better computer than the IBM PC or its clones (including Commodore's PC10 and PC20). It is also far superior to Apple's Macintosh in the area of speed, multi-tasking, colour and sound, and it is cheaper! Its nearest rival would be the Atari 520ST, in many respects as good as the Amiga, although it lacks the multi-tasking facility - but the Atari is a lot cheaper than the Amiga.

#### AVAILABILITY

My spies tell me that the Amiga's now on display in certain retail outlets are configured for the American NTSC standard, which means you cannot connect the Amiga to our locally available (PAL standard) monitors. Hopefully the PAL versions will be ready for release in about three months.

--oo0oo--

#### C-128 VIEWS AND REVIEWS

by Ralph De Vries

What a nice computer the 128 is. The longer I own it the more I like it! And yet I have those lingering doubts that it will never be as popular as the C-64.

No, I have no factual evidence for this, but still feel that this machine arrived twelve months too late. Timing in this new field of computers is so important. Scattered along the wayside are so many computers that never made the grade, simply because their time of arrival on the market place was all wrong - think of the Peach by Hitachi, the Sirius, Commodore's own Plus/4 etc.

Yet the 128 deserves to succeed, simply because it is such a great machine. Market acceptance will mean more commercial software specially written for the 128 - not just C-64 software to run on the 128. If the recent increase in adverts of people wanting to sell C-64's is anything to go by, it could mean that quite a few of these 64 owners are contemplating changing over to the 128.

For small business use the 128 is so much better than the C-64 with it's 80 columns, faster disk drive, more memory, and better Basic. However, even in a non-business situation I can see advantages. A 128 adventure game can now be at least twice as large, thus allowing for more options, a larger vocabulary, and more and better graphics. One could imagine a program such as "Print Shop" in an 80-column version (yes, high resolution graphics are possible in 80 columns!) complete with 500 or 1000 pictures on the same disk. In fact, given sufficient demand, lots of outstanding 64 software packages could be upgraded to make use of the many new features of the 128. If my doubts will prove to be unfounded, and the 128 really takes off like the proverbial rocket, then I'll be all the happier, because it means better programs for everybody.

(more on the next page)

## SuperScript 128: A Warning!

This newsletter is written using the SuperScript 128 word processor. It is the 80 column version of SuperScript 64 (with several extra features), which in turn is an upgrade of EasyScript.

It was very favourably reviewed in the Jan. 86 issue of this newsletter by Cliff Pottinger, but subsequently Cliff, myself and several other members have discovered a few bugs in this program. When typing away merrily it is not unusual to have a numeric character appear from nowhere in the middle of a word. Since I have also noticed that if one deletes some characters with the space bar an occasional numeric character is left in it's wake - strange, but not a major disaster as it does not happen all that often. Also, for no apparent reason, every so often the 'Help Screen' appears without giving specific instructions for it to appear! Again, not all that important, but it should not happen. However, the following bug is potentially far more lethal. It has only surfaced on three occasions, but as I cannot detect a pattern I am not sure if it is caused by the program or by my computer. What happens is that all of a sudden the 80 column screen is filled up with '@' characters. It is possible to clear them with the Run/Stop - Restore keys or even with the reset key, and you will find that your text on the screen is unaffected. However (!), if this should happen to you, don't under any circumstances try to save your file to disk as it will not work. I am in the habit of re-saving my files by overwriting the existing file (save & replace), and this always works without a hitch. However after the appearance of the screenful of "@" characters file saving functions no longer work. As a result my son recently lost a study assignment on disk, as the original file was also corrupted.

As mentioned previously, at this stage I am not sure if this fault is caused by the program or my computer, but if other 128 users who also use SuperScript 128 have similar experiences we would love to hear from them, so that, if necessary, a case can be presented to the distributors or authors. My version of SuperScript 128 is the Sept.85 version No.08.

STOP PRESS: If you are in the market for Superscript 128 insist on the Nov.85 version which has removed several (all?) of the bugs from the earlier versions. We know that this version is on sale in Brisbane now.

### Some hints and tips for 128 users

DLOAD versus RUN command. The other day I was talking to a new 128 user who thought that you could only load a 128 program with the DLOAD command. Not true! You can also use the LOAD,"\*\*\*\*\*",8 command (which is a bit silly isn't it?), but as most programs are loaded and then run it is faster to use the RUN command. Well, here is a neat little trick. Assuming that you get your directory on the screen with the F3 key, and now you want to run program "X". What you do next is to bring the cursor up to the line with prgm "X", type R, shifted U, and follow this by tapping the TAB key three times. The cursor is now on the word PRG. Either press ESCAPE followed by the letter Q, or just erase the letters PRG with the Space Bar. Does all this sound complicated? Believe you me it is not - in fact it is both fast and simple.

-----  
When typing in DLOAD or RUN it is not necessary to use the closing quotation (") mark.

Assuming you are in the 80 column mode with the 40/80 DISPLAY key in the down position, there is another way to go to the 40 column mode. Just return the 40/80 DISPLAY key to the up position (40 col) and press RUN/STOP & RESTORE! This also works in reverse of course!

-----  
Are you typing in a program with lots of DATA statements? If the data is only numeric just re-define the F1 function key with the the word "DATA", F3 and F5 with a comma, and F7 with CHR\$(13), which stands for RETURN. Now you can type in your DATA statements by only using the numeric keys and the function keys.

However if you are typing in DATA statements which contain Hexadecimal data, and thus make use of the letters A - G, it is a simple matter to re-define the Function keys as follows:

```
10 FOR A = 1 to 8: READ A$: KEY A,A$: NEXT  
20 DATA A,E,B,F,C,$,D,#
```

and presto you can still type in all lines using the same keys as above!

-----  
PRINT @ in disguise: The keyword CHAR is used to print text on the graphics screens, but can be utilized to position the cursor in Text mode. By making the first parameter 0 you have now the equivalent to a PRINT @ statement.

Try: 10 CHAR 0,8,15,"THIS IS POSITION 8,15" .

-----  
RENUMBER command: This command works fine, taking care of GOSUB's and GOTO's, but it does NOT take care of a LIST command with line numbers after it, when used from within a program. If you have this command within a program and you renumber the program, you will have to renumber the LIST command manually.

-----  
IMPORTANT: If you have a 128 disk with an auto-boot program on it, or alternatively have added an auto-boot routine to an existing 128 program disk, Don't under any circumstances use the Validate (Basic 2) or Collect (Basic 7) command, as these commands may cause the boot sector to be overwritten, and will in any case cause it to become deallocated.

-----  
CP/M USERS AND THE C-128: From information gleaned from overseas magazines it appears that CP/M programs written for the Osborne 1 work quite well on the 128, but there are problems with some CP/M programs written for the Kaypro.

Some of the Osborne programs that work well include: Wordstar (Micropro) - Supercalc (Sorcim) - Spellguard (Sorcim) - Electric Webster (Cornucopia) - The Word Plus (Oasis) - Punctuation & Style (Oasis) - Grammatik (Aspen) - MBASIC (Microsoft).

--oo0oo--

# FORMATTING MFM DISKS ON THE 1571 DISK DRIVE

by M. Garamszeghy

Copyright © 1986 M. Garamszeghy

The 1571 disk drive is capable of reading and writing a number of standard CP/M disk formats when used with a C-128 in CP/M mode, including (among others):

- IBM CP/M-86 single-sided
- IBM CP/M-86 double-sided
- Kaypro II single-sided
- Kaypro IV double-sided
- Osborne single-sided
- Epson QX-10 double-sided
- Slicer 9

These are all referred to as MFM (maximum frequency modulation) formats, based on the technique used to record the data on the disk. Normal Commodore DOS (used by the 1541, for example) uses a method called GCR (group coded recording), which is totally different from MFM. There are several other differences between MFM and GCR disks. MFM disks generally have the same number of sectors on each track, while Commodore GCR disks usually have different numbers of sectors for different ranges of track numbers. MFM tracks are numbered from zero, while the sectors on each track are numbered from one. This is the opposite of Commodore GCR disks, where tracks are numbered from one and sectors start at zero.

Although Commodore CP/M can read and write in MFM formats with a 1571 drive, the current version of the `format.com` program supplied on the CP/M system disk cannot create or format new disks in these extended disk formats. It is, however, quite simple to format disks in these or any other format you wish with a 1571 drive.

In addition to the standard Commodore DOS commands, the 1571 has a few new ones. These commands, collectively defined as 'burst mode' in the 1571 manual, allow you to read, write and format disks in virtually any format you choose. Most of the commands, such as those for reading from and writing to the disk, need fairly sophisticated machine language programming to access, because the required high-speed data transfer is under totally manual control. The extended `format` command is the simplest to use. It can be quite easily invoked from BASIC because high-speed data transmission is not required.

The description of the burst mode commands in the 1571 manual is cryptic at best. The syntax for the MFM `format` command can be simplified to:

```
open 15,8,15,"u0"+chr$(b1)+chr$(129)+chr$(0)+chr$(b4)+chr$(39)+chr$(b6):dclose
```

In this instruction, `b1` must be set to 70 for a single-sided disk, or 102 for a double-sided disk; `b4` is a number from 0 to 3, representing 128, 256, 512 and 1024 bytes per sector respectively; and `b6` is the number of sectors per track.

The actual bit patterns in the characters sent after the `U0` (which selects the burst mode) are explained in detail in the 1571 manual. I have simplified them here to make the command easier to use. There are other optional parameters that allow you to partially format a disk, format different areas of the disk in a

different manner, change the sector slew rate, change the fill byte, and so on. These can be the basis of, for example, a simple yet very effective copy protection scheme that you can use on your own disks and programs. Try reformatting track 35 on a standard 1541 DOS disk with the instruction:

```
open 15,8,15,"u0"+chr$(198)+chr$(129)+chr$(0)+chr$(0)+chr$(35)+chr$(18)+chr$(34)+chr$(34):dclose
```

Now see what happens when you try to copy the disk, even with a whole-disk nibble-type copier for protected disks. If the program you wish to protect tries a random access block-read or block-write to the reformatted track, an error will result. If the drive (either a 1541 or 1571) does not return an appropriate read error code, the disk has been formatted in GCR and is obviously not an original. The reformatting of track 35 should be done before you copy your program to the disk, in order to ensure that no program data are lost by wiping out the track. In addition, you should use the DOS `block-allocate` command to allocate all sectors on the track, to prevent DOS from accidentally trying to write there.

The following short BASIC 7.0 program, `MFMFormat`, is for use in the C-128 native mode. It allows you to effortlessly format disks in a number of different MFM formats on the 1571 drive. The `DATA` statements at the end of the program contain the required parameters (sectors per track, bytes per sector and number of sides) for each type of disk. These parameters can all be changed to create custom disk formats if you wish. However, most of the possible formats will not be supported by CP/M on the C-128. In addition, the line numbers for the `DATA` statements should not be changed, due to the use of a calculated line number reference in line 30 for reading the selected data.

```
10 print "          mfm disk formatter":print "          by m. garamszeghy"
20 print "options: ":fori=1to5:reada,a,a,a$:printi": ":a$:next
30 input "select a format";f:restore(f*10+100):read b6,bs,sd,f$
40 print "format >> ";f$:print "press <return> to continue"
50 print "or press any other key to abort":getkeya$:ifa$<>chr$(13)thenrun
60 b5=39:s(0)=128:s(1)=256:s(2)=512:s(3)=1024:si=0:ifsd=2thensi=32
70 b1=70ors:fori=0to3:ifbs=s(i)thenb4=i:elsenext
80 open15,8,15,"u0"+chr$(b1)+chr$(129)+chr$(0)+chr$(b4)+chr$(39)+chr$(b6)
90 input//15,a:dclose:input "format another <y/n>":fa$:iffa$="y"then40
100 data0,512,1,"ibm cp/m-86 single-sided
110 data0,512,2,"ibm cp/m-86 double-sided
120 data10,512,2,"kaypro iv double-sided
130 data10,512,1,"kaypro ii single-sided
140 data5,1024,1,"osborne single-sided
```

The above article from the March '86 issue of the TPUG Newsletter

## A SECRET IN A DRAW COMMAND

by Elizabeth Deal

There is an undocumented polar-coordinate drawing command in the BASICs for the newer Commodore machines, the Plus/4, the C-16 and the C-128. If you disassemble Plus/4 ROMs, you will see that the **DRAW** command begins at \$C4D9. It uses several subroutines, of which one — at \$C3F7 — is of interest; it fans out to do various kinds of jobs depending on which of many permitted syntaxes are in the program. The system tries to get X and Y coordinates but, if it finds them separated by a semicolon (the test for this is at \$C400-C405), what would be X is taken to mean radius length, and what would be Y is taken to mean an angle (North is 0 degrees, East is 90, and so on. Notice I said 'degrees' — not 'radians!'). A value over 360 degrees wraps around back to zero, but there is a two-byte limit on its size.

The variety of permitted syntaxes seems almost unlimited. The following two programs will allow you to study this useful variant of the **DRAW** command in more detail.

In the **Rays** program, line 150 just plots a point 25 pixels away from the center, placed at  $x = y = 100$ , at an angle varying with J, which in this case is 12 points on a circle, every 30 degrees (like the hour markers on the clock). If you add, one by one, the remaining lines (listed here with **REM** in front of the code) you should be able to see how **DRAW** behaves.

Pressing any key cancels the graphic mode, so you can play with the program.

In the **Tiny Turtle** program, the drawing angle is a sum of previously used angles, so that you can draw in the same fashion as in the LOGO language. 'Distance' is LOGO's **forward** command, and 'angle' is LOGO's **turn** command. A bunch of

60-degree turns with the same distance value will close up a hexagon.

I am not testing **DA** for a 360-degree limit; you may wish to do that. To get out of the input loop, just enter negative values. **SCALE 1** allows fairly large values to be used — see your manual for details.

```
100 rem rays
120 scale 0:graphic 1,1
130 n = 12:a = 360/n
140 for j = 0 to n:da = j*a
150 draw 1,100,100,25;da
160 rem draw 1 to 35;da
170 rem draw 0 to 4;da
180 rem draw 1 to 10;da
190 next j
200 get key is:graphic 0
```

```
100 rem tiny turtle path
110 scale 1:graphic 2,1
120 locate 100,100:da = 0
130 input "distance, angle";d,a
140 if d < 0 or a < 0 then graphic 0:end
150 da = data
160 draw 1 to d;da
170 goto 130
```

A project: A spiral is a straight line in the polar coordinate system. Try writing a tiny routine to draw at least five swings of a spiral. □

-----  
The above article from the March '86 issue of the TPUG Newsletter

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### MEMBERS' ADVERTS

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## LETTERS TO THE EDITOR

From the Maryborough/Hervey Bay Sub-Group

This Sub-Group now meets at the Sunbury School in Alice Street on every 4th Monday of the month from 7 to 10 pm. Special thanks to Stan Tappenden, the School Principal for the use of this excellent venue.

The school has nine C-64's, of which eight are being networked through a Vic Switch and one used as an independent unit.

If anyone can assist with the loan or sale of ICEPIC can they please contact the writer. This utility has special advantages in loading programs through the Vic Switch, as some write protection control codes tend to hang up in the Vic Switch which is not transparent. ICEPIC would assist in standardising loading procedures and improve sequential loading times to each computer from a single disk drive. Benson Computers from Victoria are no longer able to obtain it.

Our special thanks to Terry Horton for the use of his house for the 1985 meetings - much appreciated by all.

The aim of the sub-group is to share and expand knowledge and assist members. Being a sub-group, the workshop meetings are informal. An organizer is appointed who simply sets the time and place for meetings. it is necessary to discuss topics, define objectives and list activities without becoming too regimented.

As the group increased it was necessary to have a C-64 set up for the younger and older groups.

The sub-group coordinator, Terry Steer, would assist anyone thinking of starting up a country sub-group.

Special thanks to Norm Chambers for his assistance and guidance in forming this sub-group, to Roger Haigh for modem demo's and Ken Charters for the Turbo-Rom reset switch- and Paperclip demo's.

Terry Baade

It is good to hear from you Terry, and even better to hear that things are going quite well in the M'borough/Hervey Bay area. I'm glad that you have found a good meeting place - wish that we could say the same thing about our main Brisbane meeting rooms!

I don't know if by now you have been able to obtain your Icepic utility, but are you aware that in the USA there is a similar cartridge program called Snapshot 64? Produced by a company called CSM Software Inc., you may be able to obtain a copy through Chambers Computer Supplies in Melbourne.

I am pleased to hear that some of our 'roving ambassadors' have been able to assist you. I know from speaking to them that they thoroughly enjoy doing it.

Anyhow it is good to be in touch with our members up in M'boro, and don't hesitate to yell when you need help or advice; that's what we are here for!

Now we would love to hear as well what's going on in Killarney. How about it Roger Frazer? You have been far too quiet for far too long!

Editor

--ooOoo--

## OUR EVOLUTION (?) WITH THE MICRO-CHIP.

by Lex Hinckley

This article is written especially for the more recent members of our group because, if you had been associated with computers for the last seven plus years from the time of the introduction of the original "PET" to the recently released C-128D, then you would understand what brings tears to the eyes of some of our original club members.

Once upon a time, long ago in January 1979, I took delivery of my first PET with its rather quaint "Calculator Keyboard" and built-in cassette. On arriving home it was quickly removed from its packaging and put in the pride of place on my desk. As I had spent a little time prior to purchase using the tried and proven method of self teaching a little of the fundamentals of "BASIC" I started straight into programming. With only 7167 bytes available, (ample I thought at the time), I set to work to produce a program which used the tape for storage of data files and along with the addition of a second cassette, enabled the updating of data from one cassette to the other. I will add at this time that all programmers were able to survive quite happily(?) with the bugs that were both within our rudimentary programs and the early ROMS.

My next excursion was via the "Weekend Shopper" to the location of a small screen CBM 4016 (new PET) which was immediately modified to a 4032 by past member John Aylmer giving 31743 bytes available. My! to what great purposes could I apply all this newly acquired memory. I still only had a single cassette as a data and program storage device.

When the 2031 disk drive eventuated I had the potential for the writing of a 31K program and the capability of saving and loading very quickly (speed of this device was 6-7 times faster than the 1541) and use up to three Relative Files or five Sequential Files simultaneously or combinations of these to handle data.

With the addition of an EPSON printer I at last had a collection of equipment which I could apply to the management of the accounting of my business. This was achieved by the writing of several overlay programs which left sufficient memory available to handle in excess of 2000 accounts and the capability to be able to recover which ever one I wanted within one second of the entry of the appropriate code.

Over this period of time the introduction of the VIC did little to excite me (apologies to that dedicated fast growing band of enthusiasts which led to the club having to find larger rooms at Milton) with its 5K memory and a special memory map depending on how large an expander was employed.

It was the introduction of the C-64 which led to another computer finding its way into my study but the limitations of the 1541 led me to exchange it for a "Fat-40" which I later upgraded with an 80 column option, ie. a 4032/8032.

I then re-wrote "Friend" (word processor for the PET) to an 80 column version which gave me an adequate word-processor residing on a chip. This allowed over 30K available for text which was more than adequate for my needs.

In conversation with our dedicated CURSOR editor, it transpired that he found the increased memory capacity of the recently released C-128 has helped him cut down on the number of files that he requires for each edition.



The BASIC 7 of this new machine has certainly allowed the dedicated few to write with the new commands, the programs which did take a lot of code for the C-64. Also the existence of the improved disk commands will certainly make it a much more attractive machine for my type of programming.

My present equipment consists of the 4032/8032 unit upon which this article has been written, a 4040 dual drive, and an Epson RX-80 printer. The small screen 4032 that I had has been given to the local Primary School along with several hundred programs on tape and a big collection of past magazines and several programming books. It is my hope that the upcoming generation of computerists will obtain inspiration from their exploits with the keyboard of my old "PET/4032".

A strange thing did happen the day after I wrote this - my present machine went on the "blink" for the first time since I had it and it certainly goes to show that PETs certainly need each other for company!

It may not be long before I graduate to an update to avoid being overtaken by technology as I have been with my Super 8 movie camera and the advent of 8mm Video. Some members probably have not yet realised that the days of Beta and VHS are definitely numbered as probably are the days of 8 bit machines. This will be brought about by the increased availability and probable fall in price of 32 bit machines (I feel that 16 bit machines are best left to the confines of the office which dictated their direction of development).

I would never downgrade the usefulness of the machines in members possession as my PET certainly is giving me a degree of satisfaction comparable to that being obtained by the owners of Vintage cars (and Super 8 movie cameras).

To sum up, computing is indeed a source of recreational activity which we all need to give us a balanced outlook on this rapidly evolving world of the micro-chip!

--oo0oo--

#### CAPALABA EXPO

By Maurie Hawkyard - Chief Librarian, Consultancy Coordinator,  
Expo Organiser & General Dogsbody

During the week following Easter, the Capalaba branch of Chandler's held a computer exhibition featuring Commodore, Amstrad and Epson equipment.

The User Group was requested to participate so we arranged to have members in attendance for most of the time to run demonstration programs on the several 64s and 128s.

I made it my business to look in a couple of times and was pleased to see the interest our people was generating, both in Commodore computers and our User Group.

Our thanks go to all those who participated, Roger Haig for assembling a most interesting display board, Simon Haig and Barry Wilson for getting things started, Stan Seymour (who travelled from Aspley to assist), Graham Barlow, Rob & Scott Adamson, Steiner Johansen, Barry Ellis and Clarence Stock, all of whom gave generously of their time and expertise to help make the project a success.

--oo0oo--



*Just like they said, my computer really liberated me . . .*

From "Computer Crazy" by Daniel Le Noury - A Sybex Publication

COMMODORE COMPUTER USERS GROUP (QLD) INC.

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Please Note: The above phone numbers are private numbers, and most of our committee members can only be contacted after hours!  
Greg Perry can be reached only between 10 am and 4 pm, and Maurice Hawkyard can be contacted between 9 am and 5 pm.

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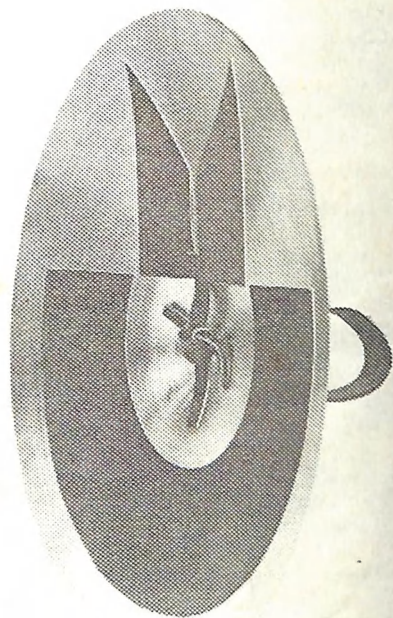
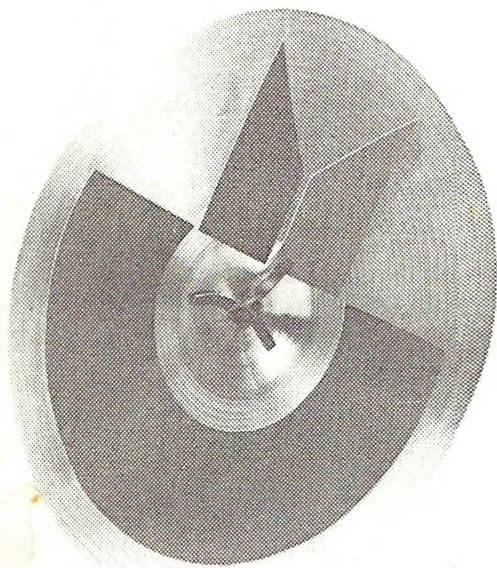
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