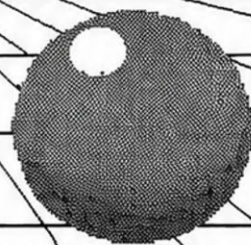
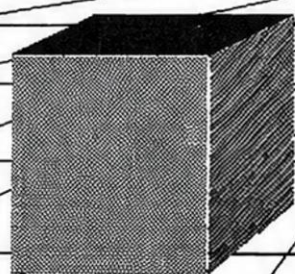


3D CONSTRUCTION KIT USER GROUP

NEWS LETTER
Issue 18 April - May 1994

3D
CONSTRUCTION
KIT



TONY
HARTLEY

CONTENTS

EDITORIAL.....	PAGE 3
LETTERS.....	PAGE 4
THE USER GROUP GAME	PAGE 7
A REAL PROGRAMMER	PAGE 12
PD LIBRARY LIST	PAGE 14
PEN PAL APPEAL	PAGE 17
BEGINNER'S SECTION	PAGE 18
16/32 BIT ROUTINES	PAGE 20
HINTS AND TIPS.....	PAGE 22
TELEPHONE HELPLINES and HALL OF FAME	PAGE 24

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CONTRIBUTIONS: are always welcome from members. Hints, tips, routines or anything else that you think would be of interest to other members are most welcome. It is your club so we want to hear from you.

BACK ISSUES: If you have missed any issues they are all still available at a cost each of £2 (UK), £2,50 (Europe), £3 (R.O.W).

HELPLINES

POSTAL HELP

If you wish to write in for help then please feel free to do so but please don't forget to enclose a stamped, self-addressed envelope or International Reply Paid Coupon if writing from abroad.

TELEPHONE HELPLINE 0492 877305

If you need to telephone for help then I will try to be available during the hours between 2pm and 7pm each weekday. I will be delighted to hear from you. As this helpline is available only to members of the User Group, please have your Registration Number handy and give your name when you call.

Mandy Rodrigues

The 3D Construction Kit User Group

67 Lloyd Street, Llandudno, Gwynedd, LL30 2YP

The 3D Construction Kit User Club is an independently run club but is under license from Incentive Software.

USEFUL 3D BITS AND BOBS OF INTEREST TO MEMBERS - AND FREE OF CHARGE

INDEX TO KIT2 MANUAL: Most useful when programming and trying to find that elusive FCL command. Also includes some commands not listed in the manual or addendum. Please enclose LARGE (A5 size) stamped S.A.E.

INDEX TO SUPPLIED CLIPART by JOHN HAYWARD: Standard S.A.E. please.

SOLUTION TO KITGAME: Please state 8 or 16 bit. Standard S.A.E.

THE CLUBGAME: All the routines listed to date so new members can join in programming our game. Please enclose LARGE (A5 size) stamped S.A.E.

TRANSLATING ROUTINES: List of differences between 8 and 16/32 bit FCL commands so members can utilise ALL routines. (Standard stamped S.A.E)

LIST OF USER GROUP PD TITLES: Latest PD list of Amiga, Atari ST and C64 items sent in by members (if not in current newsletter). Standard size Stamped S.A.E. please.

LIST OF 3D PC PD: Latest PD list for PC's For this item only please send S.A.E to Mark Rose, 39 Balfour Court, Station Rd, Harpenden, Herts, AL5 4XT. Please enclose large stamped S.A.E. or if writing from abroad please enclose two reply paid coupons. All other items please write to normal address above.

EDITORIAL

Welcome to issue 18 of the 3D Construction Kit User Group Newsletter.

Surprised to find another issue in the envelope this time? Not half as surprised as I was myself. What happened was that I actually had the February/March issue ready for posting well on time but decided to wait a while before posting it just in case I had any further news about the latest version of Kit 2 to put in it. While I was hanging about I thought I would get on with some articles etc for the April/May issue and before I knew it I had finished it too! One way, I thought, to offer an apology for issue 17 being late out would be to send issue 18 a bit earlier than expected - a whole two months earlier but what the heck. It just means that I won't be rushing about like a mad thing trying to get it ready during Easter and early spring and you will have more to read! I really have to thank the contributors for the "miracle" though. If it wasn't for the fact that they kindly sent in enough material for two issues instead of one I wouldn't have been able to do it so my sincere thanks to everyone who helped, I really appreciated it.

There have been one or two ominous rumblings recently from new members who cannot understand why their pull down menu's are all in German! Oooops, I think something has gone wrong somewhere along the line again. My apologies to William, I was only joking when I called you Wilhelm when you phoned, I'm glad you saw the funny side of things and didn't think I was being insensitive - it was just my wacky sense of humour coming to the fore. Didn't have any of this trouble with Kit 1 as there was just one version and you could select your own preferred language at the startup stage. If anyone has come across this problem then please do return your disks to Domark for replacement as they will be happy to swap them for you. Anyone who sends them to me will get a swap too but I have run out of my supply of disks so it might be quicker to send direct until I can get another batch. I was hoping to wait before asking for another lot though as I would really prefer to have the latest version rather than another batch of V2.07.

I mentioned my sense of humour, well, when I received the article "A Real Programmer" from John Clarke recently I nearly laughed my socks off! I have published it in this issue and I hope you enjoy it just as much as I did. Wonder if the programmers at Incentive will laugh just as much as I did - hope so anyway. Uni' students have a great penchant for humour and John is no exception. Speaking of students, do you know that being a computer freak can have lots of benefits for your family? My husband is doing his HND in micro electronics and my daughter after getting her HND in the same subject has now gone on to University to get her BEng.

My son, Bobby, seems to be heading in the same direction too - so tell that to your family when they grumble about you spending so much time at the keyboard in future. That's what I point out to my family when they nag me about the time I spend on the computer. Mind you, I do get a bit carried away sometimes and it is only when I hear three thuds and find them lying in a heap outside the kitchen door that I realise that I had better leave off and feed them! One word of advice though - if more than one person uses a computer in your household, don't for goodness sake wire them up to the same socket. I have trained my family to switch off when they have finished work and it is frustrating in the extreme to have three or four pages of text for the newsletter typed up when "click" everything goes blank. They might have finished but I haven't!

Mandy

LETTERS

Dear Mandy,

Please do you have any information on the 3D Flight Simulator Creation Package that you could send me? Such as how much it costs and where I can get it and what it can do? I already have Corncob from Mark Rose which is a good flight sim program.

Dave Boley - Wivenhoe, Essex
PC

The package I mentioned previously is actually called FLIGHT SIM TOOLKIT and is produced by Domark Ltd and is a very exciting package. It is from the creators of AV-8B Harrier Assault and is the first-ever comprehensive flight modelling software package. It is available for the PC only and Windows is required. The minimum requirement is 386 SX. Full VGA is required and it supports SVGA graphics for very high fidelity outside world graphics on machines with the appropriate display adaptors. The FST tools exploit the task-switching and powerful graphical user interface benefits of Windows to the full. All the tools in FST are Microsoft Windows applications and are run from a master FST Project Manager under Windows so that, for example, users can switch from Terrain design to Shape editing simply by a click of the mouse. Also other Windows applications can be used within FST for image editing and sound effect sampling. Real terrain data from the American Geological survey has been used to generate the ground providing a totally accurate rendering of the world you fly in. It features a highly sophisticated parameterised aerodynamic force model which accurately calculates the linear and rotational forces acting on the aircraft. You can specify the power, type and positioning of the engines and control a wide range of variables which combine to parameterise the model. The result is a simulator which is capable of accurately modelling everything from a Cessna to an F16. Together with the disks the package contains a comprehensive and easy to use manual - OK so I did have a bit of trouble understanding it but my son had his aircraft designed and his terrain created and was flying happily and shooting down enemy aircraft by the end of one afternoon! Which means that I must be thick! For lazy people like me the package includes a comprehensive 3D Clip art catalogue which enable you to load in hundreds of ready made bits and pieces including Aircraft categorised as Historical, Military, and Civil. To enhance your terrain you also have a wide choice of Ships - Civil, Historical, Military. Buildings - Civil, Military, Historical. Vehicles - Historical, Civil, Military. Support vehicles, and Miscellaneous including man with a jetpack, robot, paraseat, helicopter rotor blades, eject seats and parachutes etc. Not only that but you also have the chance to win a Private Pilots Licence package including 40 hours flying lessons, tests, etc by Swallow Aviation Ltd. I am not sure how much the package costs - Domark kindly sent me one for myself along with the one for the competition last issue. It should be in the shops now but if not then contact Domark for details of how to get it. I would really recommend this as it is one of a kind - rather like 3D Kit is one of a kind.....Mandy

Dear Mandy,

Having gone through the back issues I thought I would answer some of the questions that appeared. Someone, a long time ago, asked if there was a way of getting out of a stand-alone game without re-booting. The answer is to press SHIFT+ESC and it works in the 3D Editor too. Also someone said not to write in the border as you can't get rid of the writing! Well, simply write on a place of the border, which has a black background. Once you've written your message write over it, in the same place, with the same words, written in black. For example:

```
TEXTCOL (5.0)
PSTRING ("BONUS POINT",30,85)
DELAY (whatever you want)
TEXTCOL (240,0) - 240 is black on my version
PSTRING ("BONUS POINT",30,85)
```

To find out what number applies to what colour, make a cube, then do what you would normally do to colour it. Choose a colour and on the right you should see what number it is. This is for Kit 2 by the way. Actually I have a problem of my own, if I make a portcullis, and an animator to make it slide upwards when a key is put in the lock it works but if I then reset the portcullis is already up where I last left it. If the key bit is done again, the portcullis does the animation and slides further up. The reset doesn't put it back in its original place.

To do with loading screens, any art file can be made into an executable stand alone picture with GWS (Graphics Work Shop) and a simple batch file could easily make the picture come up as a loading screen to a main 3D stand alone. Such as:

```
@echo off
cls
INTRO
MYWORLD
```

The picture will stay there until a key is pressed. If you want to add options then try and buy a back issue of PC Format that has on the cover disk a file GETKEY.COM. I think it is PD and can be used in a batch file like this:

```
@echo off
cls
echo (V) View intro screens
echo (S) Skip intro screens
echo (Q) Quit to DOS
getkey VSQ
cls
if errorlevel 3 goto end (always start with the last key)
if errorlevel 2 goto skipped
if errorlevel 1 view
:view
INTRO 1
INTRO 2 (etc)
:skipped
MYWORLD (start the game)
:end
```

The other day my 3D Kit developed what it called a fatal error. I did what all good problem finders do and erased the whole thing and reloaded it but to my horror my original disks had some kind of error on the install program and I hadn't any backups - foolish I know. So if anyone else has done this here is how to install 3D Kit to the PC manually. You need to know what directories there are but that part of the install always works anyway. The problem is unzipping the files. For instance the borders are in a file called BORDERS.RNC and to unpack them you need to use the user friendly PPEX.EXE which is on the disks too. It took me ages to work out how to use it and in the end it turns out the same as the LHA compressor used on some PC mags cover-disks. All you need to do is type PPEX E BORDERS.RNC and it extracts them. In issue 10 Mr Nash wanted someone to tell him how to incorporate sound VOC files into the Kit. Sorry, I don't know but I do want to know too so please if anyone knows how please write in. I think I might be able to do it if there is a way of running an EXE file, which has nothing to do with the Kit and has a command line parameter after it, from an object condition in the Kit. Anyone know how? Lastly, and this idea is a bit adventurous, is there any way of giving an object artificial intelligence?

I mean for instance making a cube follow as done in other issues but also making it dodge walls and take short cuts, fly over obstacles etc. Maybe one day someone will work out an answer, but for now I'll just keep trying to work it out for myself. If I succeed then I'll write in and let you know, honestly. Okay, to those of you who haven't committed suicide by now, I'll stop. I hope I've helped someone and I hope someone can help me too with my tangible problems.

Alastair Pack - Old Colwyn
PC Kit 2

Dear Mandy,

I have a question. If 8 bit computers no longer have a future and there was only 1 version of the 3D Kit for 8 bits and there won't be any other ones produced for it, couldn't it be possible to have from the programmers, Domark or Incentive, the complete description of a compiled game (entry points and arguments of functions, addresses of data, of variables, of sprites, free places in the memory etc (with explanations about the data structure)? This means the structure of a datafile and structure code for all types of objects. It would be helpful to develop some useful features such as to copy an area from a datafile to another area (better than creating two areas the same when that occurs during development of a game or we need that area to include in another datafile, to call for instance with CALLMC! At least for CPC (as a CPC owner). It is necessary to know the structure of the disk: where/how is the datafile saved. Do you think that all this information could be supplied by the programmers? I also think that changing the SCC from Spectrum, C64 and CPC to SCC meaning Super Crazy Computers would be a good idea!

Yannick Gour
Amstrad CPC

It is customary policy for software houses and programmers to make a point of not divulging any of the type of information that you asked for, Yannick. I am sorry to disappoint you but even if a product is no longer being produced the information is strictly kept "in house". I am afraid there is nothing I can do to help you on this one....Mandy

Dear Mandy,

I wonder if you can help me please? I have just purchased the 3D Kit and the manual config file refers to a setup program but there is no setup program on my disks. Also I have no idea how to play a video viewpath using FCL as I have been unable to find this in the manual.

Peter Hanson
Atari STE 1040

Don't worry about it, Peter, the setup program is for PC users as the PC version has to be installed on Hard Disk to run whilst other computers load 3D Kit from floppy disks. The command to use the Video sequences is, sadly, missing from the manual - together with quite a few others! These can be obtained from me - see bottom of the contents page for details. Video sequences are stored in memory as they are created and automatically given a number as they are stored from 1 upwards. To use a sequence you should use something like:

```
IF ACTIVATED?  
THEN SEQUENCE (1)  
ENDIF
```

After displaying the video sequence the program should return to the same spot as before the display. By the way, the video sequences are saved along with your datafile when you do save during creation. They are not lost and are loaded into memory together with the file...Mandy

THE USER GROUP GAME

**This issue by Mieke Van Der Poll
(Part 3 of my article about border/clubgame)**

THE USER GROUP GAME. Part 10.

Last issue we completed the General Conditions for our border instruments. Now we are going to set our moving controls.

3DKit 1.

Click under General on Controls and you will be presented with all the movement possibilities. Click with left mousebutton on Move Forward, let go of left button and click with the right one. That brings you to the border screen. Now position the pointer in the upper left corner of the forward arrow, click on the left mousebutton and drag it in a square over the arrow, let go of the left button and move the square until it covers the whole arrow. Then click on left button again and you can select which mousebuttons you want to define. Click with left mousebutton on either and you will be back in the movement control text. We have chosen either because it gives the player the choice to "walk (left button) or to "run" (right button) through the environment. On a slower computer "running" is sometimes limited to "walking", so that's why. You can of course change this if you want to.

In the way described above we can set the movement backwards, left, right, up, down, rotate left and rotate right. Only there is one strange contradiction in Kit 1 (at least on the PC): when you define the movement left and try it out in Test Mode, it seems you are going right. So if you have the same feeling, then define the right arrow to go left and the left one to go right. All the "x"-signs will change in a tick sign. When you have defined the necessary keys, click on the upper left tick icon to confirm and leave the controls. You can always change the controls as described above. When you click on the upper left tick icon, your last change(s) will be confirmed.

3DKit2.

Click on General, then on Controls and you will be presented with an edit controls window. First you can define which buttons you want to use. Click on left only until either appears. Use the default functions, i.e. control nr. 1: move forwards, control nr 2: move backwards, etc. Click on set and you will see a little yellow square in the upper left part of the screen. By clicking in the lowest right part and holding the left mousebutton down you can enlarge the square (box). By clicking elsewhere in the box and holding down the left mousebutton you can move it across the screen. But first call the border by clicking in the coordinates square. Then move the yellow box over the arrow forwards and enlarge it until it is over the whole arrow. Click on right mousebutton and you are back in the edit controls window. Click on next to go to control nr. 2 and define this one and your other movement keys as described above. Here the left and right arrow will move you in the correct direction.

We are now going to adapt the Clubgame to the Border.

First, under General, click on Defaults. Fill in the number 10 under Startarea. Fill in the number 001 under Initial Condition.

Edit General Condition nr. 1: (3DK2:Initial Condition). Right beneath updatei (5) type:

```
updatei (6)
setvar (0,v50)
setvar (1,v60)
```

click on the tick icon to confirm.

Startarea (Area 10)

3DKit1.

We are going to create a separate text Instrument for the message in our Startarea.

Under General, click on Create Instrument, then click on Edit Instrument. This will be Instrument 6.

Under Type: click in the box until Text Window appears
Under X-pos.: click on the number and fill in: 056 +Enter
Under Length: click on the number and fill in: 215 +Enter
Under Y-pos.: click on the number and fill in: 029 +Enter
Under Height: click on the number and fill in: 079 +Enter

Click on View Box and you will see the surroundings of your Text Instrument in the middle of the View Window. Click on the left mousebutton again.

Under variable: fill in the nr. 000 + Enter
Under FGcolour: fill in the nr. 133 + Enter
Under BGcolour: fill in the nr. 240 + Enter

Then click on ok. Then goto Area 10 and edit (change) Area Condition 1 as follows:

```
if var=? (v60,1)
then
Print ("\N Welcome to the Clubgame....",6)
Print ("\N\N Can you find the treasure",6)
Print ("\N\N\N and make your Escape? ",6)
Print ("\N\N\N\N          Good Luck!      ",6)
delay (500)
Print ("\N                                ",6)
Print ("\N\N                                ",6)
Print ("\N\N\N                                ",6)
Print ("\N\N\N\N                                ",6)
setvar (0,v60)
goto (1,11)
endif
```

You will see your introduction text approx. in the middle of your View Window and after a little while you are transported to the first play Area (this being Area 11).

3DKit2.

You can also use the above method but in Kit 2 we have another choice: we can create a title screen in our paint program and use the Loadscreen command. The extension of the picture should be: PC: .lbm or .pcx; Amiga: .iff or Neo or Degas.

To overcome problems with colours I would advise to use the same colour palette that you used for the border.

You have to change your Initial Condition as follows:

```
Loadscreen ("title.ext",0)
delay (500)
clearscreen
updatei (1)
updatei (2)
updatei (3)
updatei (4)
updatei (5)
setvar (0,v50)
goto (1,11)
border (1)
```

So far our Introscreen.

The next thing we have to do is pick two more variables for two more objects i.e.:

```
for the stone V40  
for the ingots V41
```

This also means that we have to adapt General Condition nr. 6 (3DK2:gen.cond.5) in the way I explained in last issue. We have two more objects to add, so V34 increases 2 numbers and the last statement begins with if var=? (v34,6) etc.

If we want the objects to be visible in the various instruments in our border when they have been picked up, we have to change the different object conditions. We will start with the

stone in area 11:

```
if activated?  
then sound (12)  
print ("You pick up a stone.....",5)  
delay (150)  
print ("",5)  
invis (11)          - make stone invisible  
syncsnd (13)        - bonus1 snd PC  
setvar (1,v40)       - stone has been taken  
addvar (1,v32)       - add 1 object to found instrument  
addvar (100,v33)     - add 100 points to score instrument  
endif
```

If you want to check if everything works correctly then pick up the stone in the Test Mode with the border present. When you have taken the stone, click on Inventory to see if the correct message appears.

The condition for the button can also be changed using the stone variable:

```
if shot?  
then if var=? (v40,1) - if stone has been picked up  
then invis (14)  
vis (13)  
sound (2)  
setvar (2,v40)       - stone has been thrown  
subvar (1,v32)       - stone is not in possession anymore  
addvar (100,v33)     - add 100 points to score instrument  
else                 - if stone has not been picked up  
sound (16)           - anti-bonus snd PC  
endif  
endif
```

The next change is made in the Great Hall (area2).

Edit the condition for the closed trapdoor as follows:

```
if activated?  
then if var=? (v37,1) - if key is taken  
then invis (8)       - make closed trapdoor invisible  
vis (9)              - make open trapdoor visible  
syncsnd (12)         - activate snd PC  
else                 - if the key is not taken  
sound (16)  
endif  
endif
```

In this Hall we also placed a torch against the wall.

Change the pickup condition as follows:

```
if activated?
then sound (12)
print ("You pick up a torch.....",5)
delay (150)
print ("
invis (16)      = group nr. Torch: 13,14,15
syncsnd (14)    -bonus2 snd PC
setvar (1,v38)
addvar (1,v32)
addvar (100,v33)
endif
```

In the Alchemists Chamber (area 4),

change the condition for the door behind the bookcase as follows:

```
if collided?
then if var=? (v38,1) - if torch is taken
then goto (2,5)
else goto (2,7)      - if torch is not taken
endif
endif
```

In the Solar (area5),

change the condition for the key as follows:

```
if activated?
then sound (12)
print ("you pick up a key.....",5)
delay (150)
print ("
invis (6)      = key object or group
syncsnd (13)
setvar (1,v37)
addvar (1,v32)
addvar (150,v33)
endif
```

In the Dungeon (area 6),

change the condition for the crystal as follows:

```
if activated?
then sound (12)
print ("you pick up a crystal.....",5)
delay (150)
print ("
invis (15)      - make crystal invisible
syncsnd (15)    - bonus3 snd PC
setvar (1,v39)
addvar (1,v32)
addvar (150,v33)
endif
```

Change the condition for the plynth as follows:

```
if activated?
then if vis? (15)      - if crystal is visible
then sound (1)        - beep snd PC
else                  - but
if invis? (15)        - if it isn't there
then vis (15)         - then make crystal appear
sound (1)
setvar (0,v39)        - crystal has been put back
subvar (1,v32)        - crystal is not in possession anymore
subvar (150,v33)      - no points have been scored
endif
endif
```

In the Cell area (8),

change the plynth condition as follows:

```
if activated?      - I put both options in because of the animation
or shot?          You have to be very quick to activate the plynth
then if var=? (v39,0)
then sound (16)
else
if var=? (v39,1)
then vis (23)      - let crystal appear
sound (15)
stopanim (1)
setvar (0,v30)
subvar (1,v32)
addvar (250,v33)
endif
endif
endif
```

The condition for the gold ingots can be adapted as follows:

Make the condition for both ingots.

```
if activated?
then sound (12)
print ("you pick up some gold!!.....",5)
delay (150)
print ("",5)
invis (24)      - ingot 1 disappears
invis (25)      - ingot 2 disappears
syncsnd (13)
setvar (1,v41)
addvar (2,v32)
addvar (200,v33)
setvar (2,v50) - and this is for the endmessage
endif
```

To give an endsequence to our game we can end with a message, just as we began with one and we can place the message in the same area where the startmessage appears. Therefore we will use variable V50. It is also possible to use variable V60 for this. We have set it to 2, because the nr. 1 has already been used.

In order to be transported to area 10 we are going to adapt the condition for the door in the cell area a bit:

```
if collided?
then goto (3,6)
if var=? (v41,1) - if the ingots are taken
then goto (1,10) - transport the player to area 10
endif
endif
```

And in the Startarea 10 you can create Area Condition (3DK2: Local Condition) nr. 2 and edit it as follows:

```
if var=? (v50,2)
then sound (13)
print ("\N      Congratulations! ",6)
print ("\N\N  You found the treasure!",6)
print ("\N\N\N   T H E   E N D ",6)
delay (500)
print ("\N ",6)
print ("\N\N ",6)
print (" \N\N\N ",6)
setvar (0,v50)
endgame
endif
```

When all the abovementioned changes have been made and you have duly saved everything, we can now go into Test Mode to test the game as if it was already standalone. This means that all the possibilities have to be tested, so you have to play the game a couple of times. The best thing to do is leave it for a couple of days and then, refreshed, start testing it.

If everything is to your liking, then you can use the MAKE command.

For the PC: just follow the instructions in your Manual.

For the Amiga: consult your Manual and page 19 of Newsletter 10.

We haven't used the Energy bar in the game yet.

Do you have any ideas?... then please send them in at the usual address.

Mieke van der Poll

REAL PROGRAMMERS!

By John Clarke

When I was looking in one of my University bulletin boards I discovered this. I thought I would send it in because I found it quite amusing.

- Real programmers disdain structured programming.
Structured programming is for compulsive neurotics who were prematurely toilet trained.
They wear neckties and carefully line up sharp pencils on an otherwise clear desk.
- Real programmers don't believe in schedules.
Planners make schedules. Managers firm up schedules.
Frightened coders strive to meet schedules.
Real programmers ignore schedules.
- Real programmers don't bring brown-bag lunches.
If the vending machine sells it, they eat it.
If the vending machine doesn't sell it, they don't eat it. Vending machines don't sell quiche.
- Real programmers don't comment their code.
If it was hard to write it should be hard to understand.
- Real programmers don't document.
Documentation is for simps who can't read the listings or object deck.
- Real programmers don't draw flowcharts.
Cavemen drew flowcharts and look how much good it did them.

- Real programmers don't eat quiche.
In fact, real programmers don't know how to spell quiche.
They eat twinkles and szechuan food.
- Real programmers don't play tennis or any other sport that requires you to change clothes.
Mountain climbing is OK, and real programmers wear their mountain climbing boots to work in case a mountain should suddenly spring up in the middle of the machine room.
- Real programmers don't write applications programs.
They program right down to the bare metal.
Application programming is for feebs who can't do systems programming.
- Real programmers don't write in APL, unless the whole program can be written on one line.
- Real programmers don't write in BASIC.
Actually, no programmers write in BASIC, after the age of 12.
- Real programmers don't write in COBOL.
COBOL is for wimpy applications programmers.
- Real programmers don't write in FORTRAN.
FORTRAN is for pipe-stress freaks and crystallography weenies.
- Real programmers don't write in LISP.
Only faggot programs contain more parenthesis than actual code.
- Real programmers don't write in PASCAL, or BLISS or ADA, or any of those pinko computer science languages.
Strong typing is for people with weak memories.
- Real programmers don't write in PL/1.
PL/1 is for programmers who can't decide whether to write in COBOL or FORTRAN.
- Real programmers don't write in "C".
There has to be something wrong with a language who's next generation gets a low grade than its prior.
- Real programmers write in the machines native binary code, ASM macros are for those who can't divide HEX numbers in their head.
- Real programmers don't write specs - users should consider themselves lucky to get any programs at all and take what they get.
- Real programmers like vending machine popcorn.
Coders pop it in the microwave oven, Real programmers use the heat from the CPU. They can tell which jobs are running from the rate of the popping.
- Real programmers never work from 9 to 5.
If any real programmers are around at 9am it is because they were up all night.
- Real programmers scorn floating point arithmetic.
The decimal point was invented for pansy bed wetters who are unable to think big.
- Real programmers' programs never work right the first time.
But if you throw them on the machine they can be patched into working in "only a few" 30 hour debugging sessions.

.....Cheers,

PROGRAMMER DEFINED: Programmer n.

1. One who claims or appears to be engaged in the perpetration of programs.
2. The systems analyst's diplomatic attache at the alien court of the CPU.
3. One engaged in a practical, nonsystematic study of the halting problem.
4. "A harmless drudge." - Lord Bowden, 1953.

That ought to clear things up.....

USER GROUP PUBLIC DOMAIN LIBRARY

DARKNESS CALLS by James H Yusuf - AMIGA KIT 1

Stand alone game written with 3D Kit 1. Sci-fi game with eerie sound effects and excellent atmosphere.

MOUNTAIN ADVENTURE by Mieke Van Der Poll - AMIGA KIT 1 (1 meg)

Either stand alone or datafile format. Please state which. Game written with 3D Kit 1. Adventure within a mountain maze. So much to do it will keep you very busy for ages!

PLANET OF THE DALEKS by Steve Hilder - AMIGA KIT 1

Datafile and border format. Written with 3D Kit 1. This is a game for all Doctor Who fans. Those dastardly daleks are everywhere.

ATLANTIS by Mieke Van Der Poll - AMIGA (1 meg required)

Either stand alone or datafile format. Please state which. Game written with 3D Kit 1. Eerie and enjoyable underwater adventure. Excellent music and sound effects.

MAGICAL MAZE by Mieke Van Der Poll - AMIGA KIT 2

Stand alone or datafile format. Please state which. Beautifully structured maze adventure which utilizes most of the Kit 2 facilities beautifully.

FAST TOWN by Tony Hartley - AMIGA KIT 1

Converted to Amiga by Mieke Van Der Poll. Hundreds of objects, beautifully drawn to enable you to create your own realistic town. This is in datafile and border format with ready made towns too.

FAST TOWN by Tony Hartley - AMIGA KIT 2

Converted by Mieke Van Der Poll. Hundreds of objects beautifully drawn to enable you to create your own realistic town. Datafile and border format - ready to add your own Kit 2 special effects.

E.F.T.P.O.T.C.M. by Andrew Herbert - AMIGA KIT 1 & KIT 2

Stand alone game included called ESCAPE FROM THE PLANET OF THE CARDBOARD MONSTERS. More interesting is the whole suite of utilities on the disk to help you create stand alone games. Added bonus here is a virus checker and killer to deal with the dreaded SADDAM virus.

MESSAGE DEMO ROUTINES by J Hayes - AMIGA KIT 1

Datafile and border format. Routines showing how to scroll descriptive messages. Also includes small demo game.

LANDSCAPE DEMONSTRATION DISK by J Hayes - AMIGA KIT 1

Datafile and border format. Routines showing how to program an impressive "neverending" landscape.

TUNES AND SCREENS by Dominique Watson - AMIGA KIT 1 & KIT 2

Octamed player and thirteen or so original music pieces for you to use in your games or intro sequences. Also plenty of sci-fi type loading screens for you to use.

UTILITIES DISK by Stephen Moore - AMIGA KIT 1 & KIT 2

A useful suite of programs which will enable you to create loading screens etc for your stand alone games. Useful utility for reading different machine formats on your machine too.

FLIGHT SIMULATOR DEMO by Thomas Stufe - AMIGA KIT 1

Datafile format showing how you can program a flight simulator type program with 3D Kit.

BUILDINGS by Allan Hearn - AMIGA KIT 1

Datafile format showing various buildings ranging from Stone Henge to Salisbury Cathedral.

SOUND SAMPLES by Mieke Van Der Poll - AMIGA KIT 1

Contains the new MakeSampleBnk program together with no less than 26 different sound samples ready compiled into the file "various.bnk".

INVENTORY ROUTINE by J Hayes - AMIGA KIT 1

Datafile format. This suite of routines show you how to organise the players inventory and print what they are currently carrying.

EXAMPLES by Juergen Hunke - AMIGA KIT 1

Datafile and border format. Lots of different and interesting objects for you to use in your datafiles if you wish.

BORDERS by A J Bevan - AMIGA KIT 1 & KIT 2

Selection of borders for you to use if you feel that your artistic talents are not up to scratch.

WAR OF THE WORLDS by Tony Hartley - ATARI ST KIT 2

Datafile and border but works like a stand alone game. Contains so many features, wonderful sound effects, eerie atmosphere. Excellent game should keep you busy for weeks. One of the best I've seen so far.

ENDURANCE by Ozzie O'Mara - ATARI ST KIT 1

Stand alone game. Extremely well designed. Will keep you busy for a very long time. I thoroughly enjoyed it. It is addictive and frustrating too.

INFILTRATION by Robin Ball - ATARI ST KIT 1

Excellent shareware stand alone game. Has that certain something that just keeps you going back for more.

SPEILRAUM by Peter Ward - ATARI ST KIT 1

Stand alone game. First of a trilogy of 3D Kit games by Peter. I got lost in a bewildering maze of passages the first time I played. Most enjoyable.

KAKRIVS by Peter Ward - ATARI ST KIT 1

Stand alone game. Second in the trilogy, I enjoyed this one better than the first. Take your Tardis and explore. You won't regret it.

HYSULA by Peter Ward - ATARI ST KIT 1

Stand alone game. Third in the trilogy. If you enjoyed the other two games then go on and give yourself a treat.

THE MAZE by David Sambrook - ATARI ST KIT 1

Stand alone format. This is the most addictive and infuriating maze type game that you will ever come across! I was enthralled for ages.

WEST ONE by Frank Carr - ATARI ST KIT 1

Stand alone game. Take on the role of Harris Tweed, secret agent extraordinaire. Great border, sound effects and nice loading sequence. Beautifully designed game.

FAST TOWN by Tony Hartley - ATARI ST KIT 1

For details see Fast Town Amiga Version.

FAST CITY by Tony Hartley - ATARI ST KIT 2

Datafile and border format. Hundreds of beautifully designed buildings and objects to help you instantly design your own city. Should be seen to be believed! A real favourite.

RANDOM BOXES CITY SKYLINE by Ronald Conell - ATARI ST KIT 1 & KIT 2

A paint package that allows you to generate a random city skyline. Menu driven and full instructions on the disk.

SOUND UTILITIES by Juergen Hunke - ATARI ST KIT 1 & KIT 2

Two excellent programs to use with your sound samples. Full instructions enclosed on the disk.

EXAMPLES by Juergen Hunke - ATARI ST KIT 1

For details see Examples Amiga version.

BORDERS by Robin Ball - ATARI ST KIT 1 & KIT 2

Excellent suite of borders for people who would like a ready made border for their games.

LIGHTING EFFECTS by Robin Ball - ATARI ST KIT 1

Datafiles showing just what can be done with careful planning to create lighting effects in your games.

All disks cost £1.50 each (overseas readers please add £1) and are available from Mandy Rodrigues at the usual user group address.

If you are interested in PC public domain then see the contents page of this issue for the address of Mark Rose who handles PC PD for us.

A VIEW FROM THE BRIDGE

by John Clarke

Before I sat down to write this I decided to clear my work area and I discovered that I had a desk buried underneath all of my rubbish. So the myth is true!

When my letter about pen pals was published in the August\September edition of the newsletter Mandy received a lot of letters saying that it was a good idea. However, to my knowledge, none of these letters said that the writer wanted his\her details to be placed in the pen pals section of the newsletter.

I was a bit disappointed in the fact that only 2 people (and that includes me) had their details in the pen pals section. The idea behind this was that members of the group could communicate with each other.

I have included a form on the end of this that you can cut out and send to Mandy if you want your details to be included in this section! Hopefully the next pen pals section will be bigger than the last one.

For those of you who have access to e-mail you can contact me at my e-mail address which is :

JC1ATY1@GREENWICH.AC.UK

Apparently our e-mail addresses might be changing but nobody seems to know when this will occur. I will inform you all of my new e-mail address when it changes.

===== < CUT HERE > =====

P E N P A L L S S E C T I O N

MEMBERSHIP NUMBER : _____

NAME : _____

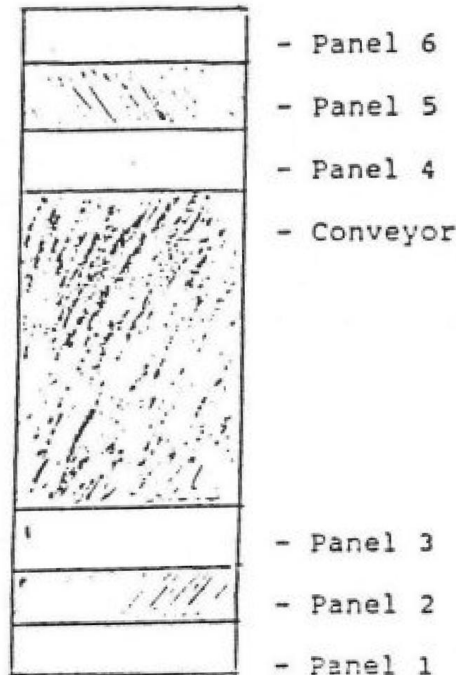
ADDRESS : _____

HOBBIES : _____

2 WAY CONVEYOR BELT (BEGINNERS SECTION)

by Alastair Pack - KIT 2 - PC.

Here is a way of making a conveyor belt that works in two directions. First of all make three small panels, which are flattened cubes, stretched on the ground. Now make a long conveyor belt in the same way. At the opposite end of the conveyor belt make three more small panels. It should look something like this :



Now this is done, I think its time to explain to you what you're doing. The way this works is that you walk on one end of the conveyor belt, and it takes you to the other.

After being taken to one end of the conveyor walk off the end and turn around and walk back, and you'll find yourself being taken back to the other side.

The way this is done is to attach conditions to the panels, and in these conditions, have some variables which decide which way you're going.

The variable that is going to be used is Variable 50.

If you want to know how to animate the player moving along the conveyor, then you'll need to read 'ANIMATING THE PLAYER' by R. Spreadborough in issue 4 page 25.

These are the conditions :

```
PANEL 1 :
  If collided?
  then setvar(0,V50)
  endif

PANEL 3 :
  If collided?
  and if vareq? (1,V50)
  then "animate player"
  endif

PANEL 5 :
  If collided?
  then setvar (2,V50)
  endif
```

```
PANEL 2 :
  If collided?
  then setvar(1,V50)
  endif

PANEL 4 :
  If collided?
  and if vareq? (2,V50)
  then "animate player"
  endif

PANEL 6 :
  If collided?
  then setvar(0,V50)
  endif
```

The reason this works is; if the player walks on one end of the conveyor then V50 is set to 0, next panel and its set to 1 then on the next panel (panel 3) it asks itself if V50 = 1, and if it does then start animation. You're now at the end of the conveyor and panel 4 asks if V50 = 2, it doesn't so nothing happens. Next panel sets V50 to 2 and the next (panel 6) sets V50 back to 0.

Now turn around and walk back. Panel 6 sets V50 to 0 then panel 5 makes it equal 2, then panel 4 asks if V50 = 2 which it now does, it sends you to the other end of the conveyor. You then step on panel 3 which asks if itself if V50 = 1 which it doesn't so nothing happens. Panel 2 sets V50 to 1 then the last (or first) panel 1 sets V50 back to 0. EASY !

You may notice that the panels 1 and 6 aren't REALLY needed, but if whoever is playing your stand-alone game decides to walk on in the middle of the belt and then walks to the end, just after using the belt properly, and V50 isn't set to 0 then he/she could find themselves being moved around all over the place

It is a good idea to set the panels to an invisible state. So the player doesn't see how it works straight away, and a rail or barrier to stop him going off the edge is useful too.

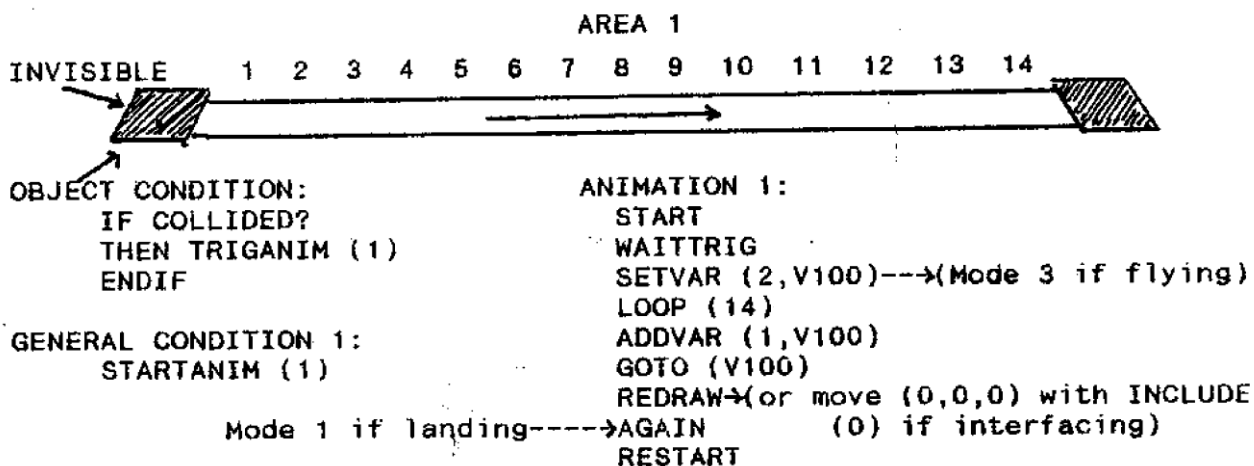
If you don't have a copy of the "Animate Player" routine then you'd better order the issue from Mandy. But if (like me) your skint, then here's a clue to help you invent it yourself : Entrances and Animations with GOTO in them.

Hope someone finds this routine useful, or it helps someone understand variables better, because its not much use for anything else. Bye!!!

ANIMATING THE PLAYER

By R. Spreadborough ATARI ST

Here is a way of animating the players position within an area. It has a great number of advantages over the INCLUDE (o) method, and the SETVAR (X,Y,Z) method. It works rather like a film camera in your area that you can maneuver and click one shot after the other. If you wish to animate a journey on a conveyor belt you would use the following:



Now go and stand on the trigger pad and create an entrance from the menu. Take a few steps forward and create another. Repeat as many times as you wish making the animation smoother or faster, and just change the loop value. If REDRAW is used the player becomes locked into the animation and cannot use movement controls. However, if you use a MOVE command to move any object nowhere (MOVE (0,0,0)) then the controls are read each frame so it is possible to have some interaction during transit. If you wish to fly then board your craft and use Mode (3) to disable gravity. Make your craft invisible and create a take off sequence. It is possible, by selecting CAM 1-5 and Mode 2 or 3 to set yourself miles outside an area and fly in a circle around and land. Don't forget to set Mode 1 (walk) when you land!

HAPPY LANDINGS!

16/32 BIT ROUTINES

POETRY IN MOTION

By David Willmore - ATARI ST

Here is a small routine to make a cube appear out of the floor and back in again. First of all this routine can be done using false floors passing up through them, but to give it the professional look you should do it like this. First create a group by clicking on the group icon. Now create a cube and lower it to the floor. Copy this cube so it appears above the first one. Now INVIS the first cube and lower the second one down to the floor. Click on edit and shrink it down by 10. Now copy the cube so that a third one appears above. INVIS the second cube and lower the third cube down to the floor. Click on edit and shrink this down by 10. Copy the third cube so the fourth cube appears above. INVIS the third cube and lower the fourth cube to the floor. Click on edit and shrink down by 10. Repeat this process until the last cube looks like a rectangle on the floor. When finished make the last cube invisible and the first one you created visible (which should be No 3 if you started with nothing in your area except the floor). Now select OBJECT CONDITIONS and enter the following on the cube that you created first (No3) and enter the following:

```
IF SHOT?  
THEN STARTANIM (1)  
ENDIF
```

Now create an animation and edit it as follows:

START	INVIS (10)	VIS (15)	INVIS (8)
INVIS (3)	VIS (11)	END	VIS (7)
VIS (4)	END	INVIS (5)	END
END	INVIS (11)	VIS (14)	INVIS (7)
INVIS (4)	VIS (12)	END	VIS (6)
VIS (5)	END	INVIS (14)	END
END	INVIS (12)	VIS (13)	INVIS (6)
INVIS (5)	VIS (13)	END	VIS (5)
VIS (6)	END	INVIS (13)	END
END	INVIS (13)	VIS (12)	INVIS (5)
INVIS (6)	END	END	VIS (4)
VIS (7)	INVIS (13)	INVIS (12)	END
END	VIS (14)	VIS (11)	INVIS (4)
INVIS (7)	END	END	VIS (3)
VIS (8)	INVIS (14)	INVIS (11)	END
END	VIS (15)	VIS (10)	INVIS (3)
INVIS (8)	END	END	END
VIS (9)	INVIS (15)	INVIS (10)	DELAY (20)
END	VIS (16)	VIS (9)	RESTART
INVIS (9)	END	END	
VIS (10)	DELAY (50)	INVIS (9)	
END	INVIS (16)	VIS (8)	
		END	

When you have finished typing save all your data to disc before trying it out, otherwise it is quite possible it could crash if you haven't done things right. Hopefully you have. Now, after all that, shoot the cube. It should be going up and down perfectly - poetry in motion - the professional look!

FROM LITTLE ACORNS...

By David Willmore - ATARI ST KIT 2

In the television series Dr Who, he walked inside a police telephone box and when inside it looked like Wembley stadium. Well here is how to create this effect for yourself in your games.

To make things a bit simpler click on group and make a square using six cubes flattened and stretched to make four walls, a floor and a ceiling - just like the exploding cube but much larger. When you have done this shrink one of the side cubes so it is half the size of the others. This is so you can move in and out of your cube that you have created.

Next walk inside and turn round so that you are facing outwards. Now create an entrance by the normal methods. When you have done this move towards the opening but don't move out of the cube. Now create another cube and edit it so it fits the doorway so effectively you have shut yourself inside.

All being well you should be inside a cube with one side of it containing two walls. Now make the cube that you have just shut yourself in with INVISIBLE by using the colour invisible method - not the attribute method. When you have done this click on OBJECT CONDITIONS and select the cube you have just made invisible and enter the following:

```
IF COLLIDED?
THEN
INVIS (2) - this is group 2 (your cube)
ENDIF
```

Now here comes the tricky bit. Turn around and put your back to the opening in the cube and back out of it slowly until the whole cube vanishes. As soon as it vanishes stop moving.

Now let us create a Tardis. First create a group, the Tardis is going to be very basic so create a cube and stretch it up so it looks something like a telephone box. The old red ones. Be sure not to move when doing this operation. Now move the tardis towards you until it hits you in the face. Now go to the attributes and make the object invisible.

The way to do this is once the attributes screen is up click on INVIS then click on defaults then fadeval. Then click on INVIS. If you just try to click on INVIS the attribute defaults it will not highlight so do it the way I have described. When you have done this click on Object Condition and select the group number for the Tardis and enter:

```
IF COLLIDED?
THEN INVIS (10) tardis group
VIS (2) group 2 our cube
ENDIF
```

Now reset the screen and goto entrance 2. All being well you should be inside the cube facing out. Now walk out of the doorway sideways and if you positioned the tardis just right you should see the side of it appear when you step out.

PERSONAL COLUMN

To Mandy...

The newsletter is very handy
With hints and tips edited by Mandy,
Routines and letters are all inside,
Plus a user group game which I have tried!

.... From Tony Hartley

To Mieke Van Der Poll... I would like to give you a very big "Thank You" for all your efforts in converting Fast Town for the Amiga and PC. I would be delighted if you can do the same for War of the Worlds. Thanks very much.....From Tony Hartley

HINTS AND TIPS

By Tony Hartley - ATARI ST

Make sure that all the loading screens have the same colour as your Borders to prevent colour corruption of your borders when loading screens have been presented.

Make all of your objects which are facing the light source e.g. lamp, sun etc, lighter in colour than those not facing it to give a more realistic effect.

Don't try to copy objects which are touching the edge walls of your areas as strange things sometimes happen. Move them in a bit nearer to the centre a little and then copy them.

For ease of reference name your objects in all your areas that have a condition, or are used as doors etc. This will make entering conditions and debugging them a lot easier.

To make things easier place your borders in a folder called Borders and loading screens in the route directory - NOT in a folder - on your disk.

Don't forget to make good use of sound effects in your games. They can add a lot of realism. If you have an animation of a dripping tap then why not have the accompanying sound effect also. By using the SYNCSD command within your animations you can time the sound effects perfectly. Doors opening and closing with a loud thudding sound are also excellent ways of creating atmosphere. If you are in a spooky castle then why not have a horrible creaking sound when a door closes or opens.

In Kit 1 you cannot copy an area unless you do it by hand. This means that you should make sure that all the objects, walls etc of your area are formed into a group and saved as one object. Then you create another area and load in your saved object - there you have an identical area - most useful for creating mazes or for hotel bedrooms etc. The colours can then be edited and furnishings changed around if you wish. Do make sure though, that you do NOT include the GROUND when you are saving your area objects as a group - when you try to re-load in your "object" into the new area you will get an error message as there will already be a "ground cube" and you are asking the system to place one object on top of an existing one.

Make sure that when you are programming your games you keep a separate written list of which variables you are using and what each variable is for. It might seem quite straightforward but some people do tend to forget. Then, of course, when they are trying to discover why something will not work they have no reference to the variables they have used and it makes life extremely difficult.

The Global area in Kit 1 isn't entirely to everyone's satisfaction and there isn't a global area in Kit 2. So the first thing that you should do is to create your very own global area. In this you can have your walls, floor and ceiling all created to a size to suit you and you can even include doors, doorways, windows and whatever else you would like. It doesn't mean that you have to have all your doors and windows at once in your new area. Just save out what you want as an object from your globals and load them into your new area or make a complete copy. It does take a bit of time to get everything just as you want it to be but it is extremely time saving later on.

GETTING THE MOST OUT OF BORDERS

By Tony Hartley - ATARI ST

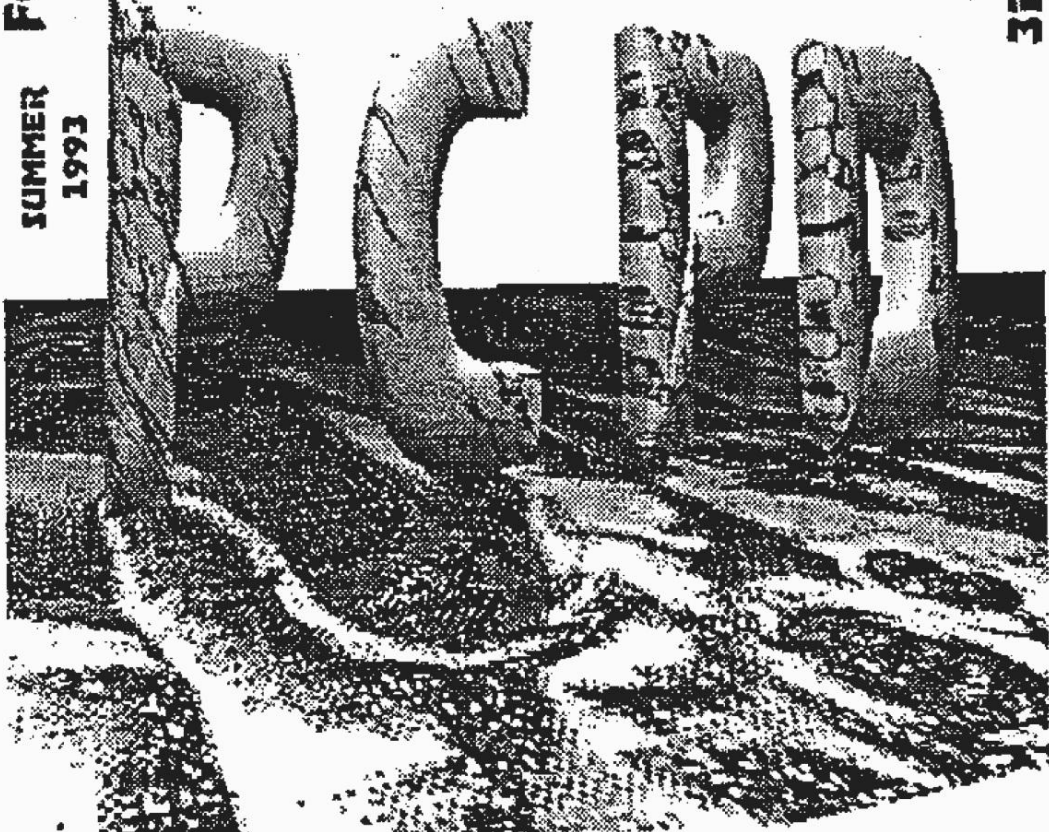
The first thing to remember about the Atari ST version is that it uses a split screen effect whereby the Freescape view window colour palette is different to the border palette. The easy way to get around this is to design borders that only fill the bottom half of the screen and use a top strip of border with the view window filling the space between. Just take into account that colours to the left and right of the view window usually change.

If you are using two borders in an area then make sure that border 2's controls and instruments are drawn in EXACTLY the same place as border 1's are. The easy way to do this is when you have drawn border 1 on your art package simply copy it again for border 2 then edit the copied one to how you want it but leave the controls instruments where they are. The view window size can be altered between the different borders by using the VIEWWINDOW (P1,P2,P3,P4) command on the object or whatever that changes the border. P1 etc refers to the window coordinates.

To simplify things it is best to make the loading screens and end screens in your 3D worlds with the same colour palette as the borders to stop colour corruption.

Don't forget that you can have text windows in your borders as well as in the view window.

Borders should never be overpowering and garishly coloured so that they detract from your game. They can be as simple as you wish or you could try to add a timer, a brushanimation and an inventory window etc for better effect.



**SUMMER
1993**

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ROAD, HARPENDEN, HERTS.
AL5 4XT.**

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USER GROUP**

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HYPERTEXT, DEMOS
RAYTRACING, MORPHING,
3D KIT, 3D MODELLING, SOUND,**

MEMBERS HOTLINES

The following User Group members have kindly offered their help as telephone helplineers. You may also write to them for postal help if you prefer but please do not forget to enclose a stamped, self addressed envelope for their reply. No SAE - No help.

GEORGE DIXON (AMSTRAD CPC)

7pm to 10pm weekdays and any reasonable time during weekends.

STEVEN FLANAGAN (AMIGA & COMMODORE 64 KIT 1 & 2)

ANDREW HERBERT (AMIGA)

BRIAN WOODLEY (ATARI ST)

(WILL ALSO PLAYTEST)

MARCO GRUBERT (PC)

STUART SHELTON (SPECTRUM)

TONY HARTLEY (ATARI STE KIT 1 & 2)

PLAYTESTERS

If you need someone to test your games/environments for bugs etc, the following members have kindly offered their services:

JOHN BIDMEAD (ARCHIMEDES A3000)

ROBERT BACK (AMIGA)

SIMON BUTT (AMIGA)

MICK JOLLEY (ATARI ST KIT 2)

MARK ROSE (PC KIT 1 AND KIT 2)

ROBIN BALL (ATARI ST KIT 1 AND KIT 2)

ALASTAIR PACK KIT 2 PC

DANIEL FOSTER (PC)

STEPHEN MOORE (AMIGA)

GIORGIO OLIVERI (PC)

HALL OF FAME

My sincere thanks to the following members who kindly took the time and trouble to send in contributions for the newsletters:

TONY HARTLEY, LES WINSTANLEY, MIEKE VAN DER POLL, NIGEL ALEFOUNDER, JOHN CLARKE, ALASTAIR PACK and DAVID WILLMORE.

Addresses removed intentionally.

www.3dconstructionkit.co.uk

3D CONSTRUCTION KIT USERS GROUP

