

Ms. Pac-Man, Food Fight, Quantum, and the rest: Arcade Game Design at GCC

Steve Golson

RetroWorld Expo
September 28, 2019

Introduction

Who am I

What was General Computer (GCC)

When did it happen

Why it matters

MIT 1978

Doug Macrae

Kevin Curran



Pinball and video games at MIT dorms

Pioneer

Star Castle

Playboy

Rip Off

Paragon

Battlezone

Fire One

Missile Command

...and more

Speedup Kits

Asteroids

Galaxian

Pac-Man

Missile Command ?



**NEW IMPROVED
DESIGN**

Asteroid Operators - DON'T LET THIS HAPPEN TO YOU! Our modification Kit II is adaptable to all asteroid games allowing you to vary any of 3 speeds, virtually eliminating machine turnover, even with your best players! **TESTED and PROVEN.** Games with this modification kit take in more money and faster than any other game on the street. **Kit II** installs in minutes without changing chips. **Kit II** was designed to improve play and increase profits and is operator adjustable. **INCREASE PROFITS IMMEDIATELY** send \$19.95 +\$2.00 shpg. (includes all parts necessary to modify 1 game)

To: **Design Wizardry, Ltd.**
P.O. Box 519, Brooklandville, Md. 21022



**Increase Profits With
Super Galaxian Kit**

Renew Excitement With
**ASTEROIDS
SPEED UP KIT**

KIT FEATURES:

Galaxian

- Increases number of diving creatures
- Adds new variations to creatures flight path

ASTEROIDS

- Up to 6 speed increments
- 4 different time delay settings
- Easy installation, only one IC to remove

March 1981

General Computer Corp.

Super Missile Attack

enhancement kit for Atari Missile Command

developed March–May 1981, first sale May

total sales ~1,000 units for profit ~\$250,000

July: Atari sues GCC for \$15M

October: Atari drops lawsuit

GCC signs Atari development agreement

Developers of Super Missile Attack

Doug Macrae

Kevin Curran

John Tylko

Chris Rode

Larry Dennison

Steve Golson

Crazy Otto

enhancement kit for Midway Pac-Man

developed June–October 1981
(while the Atari lawsuit was ongoing)

October: give demo to Midway
sign Midway license agreement

Name Changes!

Crazy Otto

Super Pac-Man

Miss Pac-Man

Pac-Woman

Ms. Pac-Man

Developers of Crazy Otto / Ms. Pac-Man

Doug Macrae

Kevin Curran

John Tylko

Mike Horowitz

Chris Rode

Steve Golson

Phil Kaaret



Classic Game Postmortem: Ms. Pac-Man

Steve Golson
Trilobyte Systems



February 1982

Projects being worked on include:

Fireman	music driver for TI sound chip
Food Fight	character development system
Molecular Magic (Quantum)	

All are coin-op projects...

February 3-4

Ray Kassir
and Manny Gerard
visit GCC

March 4

Manny Gerard
and Skip Paul
visit GCC

Fireman

Fireman

Mike Horowitz, Chris Rode, Larry Dennison

Maze-like game, putting out a building fire

Early prototype on Donkey Kong hardware

Resurrected in 1984 by Mike H, Brad Parker



Atari coin-op

6502 8-bit processor
Assembler code

GCC coin-op

M68000 16/32-bit processor
C language

Quantum

Quantum

Betty Ryan

Color vector hardware by Art Ng

Early name: Molecular Magic



* * *

HI SCORE 48400

GCC PRESENTS QUANTUM

..



© GCC 1982

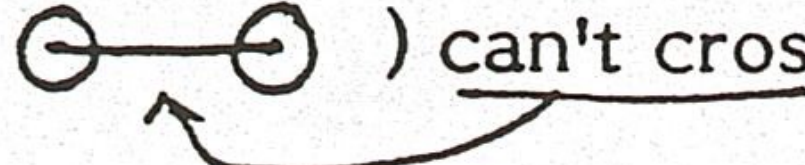
12100

38



The following comments appeared on paper taped to the sides of the Food Fight and Quantum cabinets. I have transcribed them so that they will be easily accessible and so that they will be on permanent record.

QUANTUM

- add a "get small" button
- stay small much longer than large
- need an indication of when the star will get small, e.g. a dial indicator or sound (high pitched = small).
- start everything in a random position and make a preliminary check to see that the star doesn't touch anything.
- don't stop anything when tail gets clipped unless something was captured.
- use a longer tail.
- use a wider tail, like a comet.
- when the star is "killed," reset to number of nuclei left rather than to the original number.
- wrap star around a show where the starfield limits are.
- make nucleus, electron, and star border coterminus. (sp?)
- pairs of photons shoot onto the screen from opposite sides and collide to form a new electron. The photons are a danger to the star. Further: photons strike electrons and bump them into a higher orbit. Electrons decay and emit photons.
- diatomic molecules for later racks ? (you mean with a link between nuclei? () can't cross.)

Food Fight

Food Fight

Jonathan Hurd

Raster graphics stamps + fixed playfield

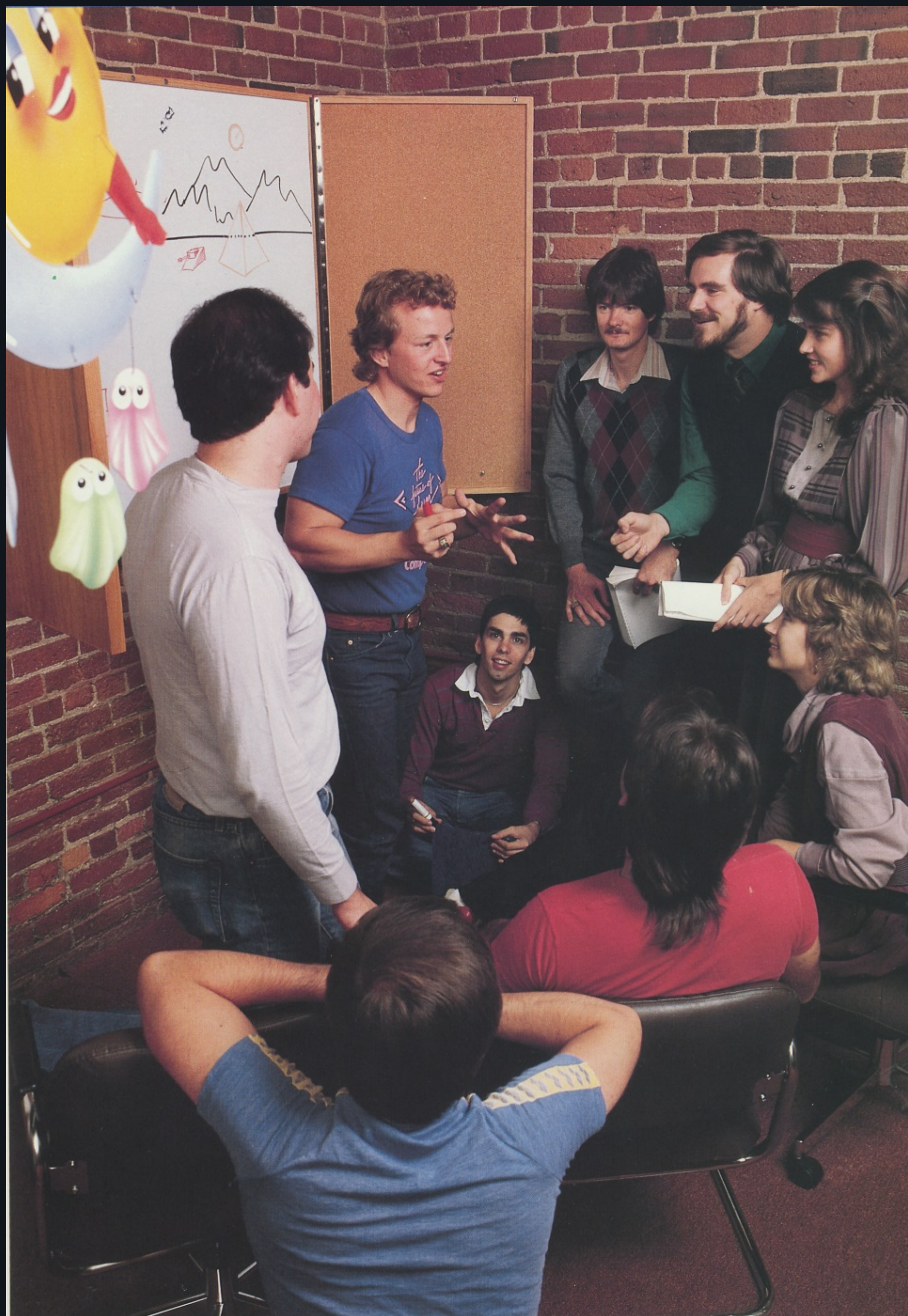
Banana joystick didn't last long...

Some software by Roland Janbergs

Instant replay

Music by Patty Goodson

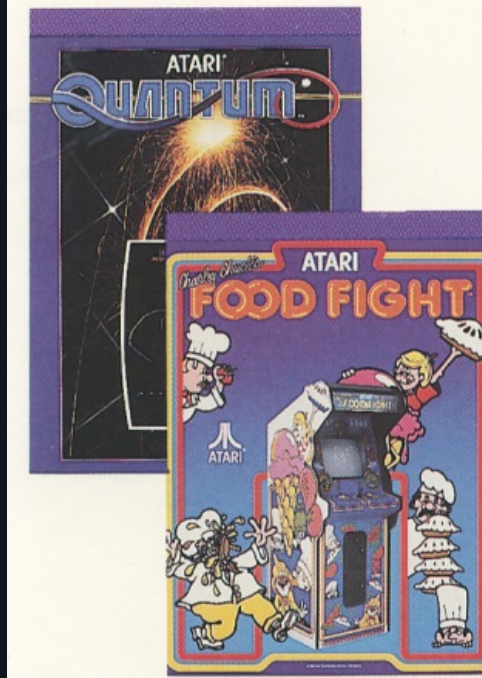




“The graphics are superb... *Ms. Pac-Man* is a great piece of work, with all the appeal gamers could want.”

—*Electronic Games* July, 1983

“What I’m building today could be in homes all over the country in a year. My family and friends can point to it and say, ‘I know the person who made that game!’”



Food Fight Game Proposal

J. Alfurd
1/4/82

Object

Capture and devour an ice cream cone before it melts away, using food to defend ~~yourself~~ against attacking enemy.

Setting

Using a four-way joystick, ~~you~~ ^{the player} controls the movement of the "hero" on the screen. Along the right edge of the screen are four tables, each with a different kind of food. At the ~~middle~~ left edge of the screen, in the middle, is an ice cream cone, and across the top of the screen is the crowd. The hero can move anywhere ~~between~~ below the crowd, between the tables and the ice cream cone.

In addition to the joystick, the control panel has ~~the~~ one- and two-player buttons, and a ~~the~~ throw button.

Play

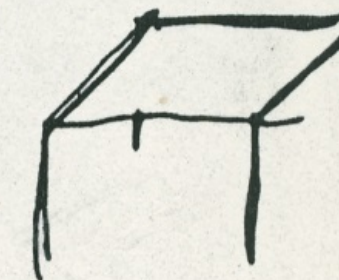
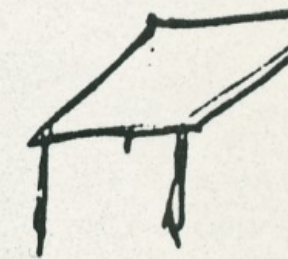
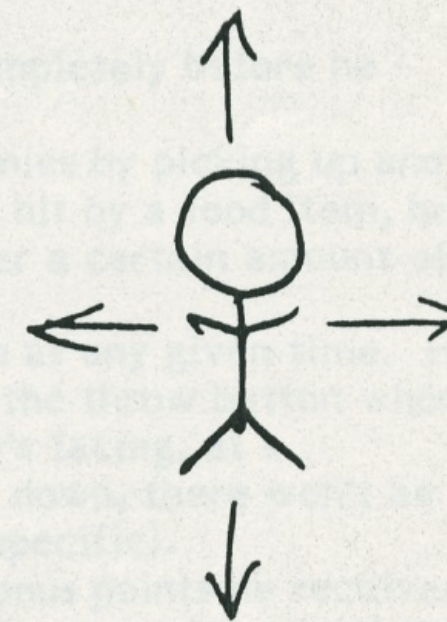
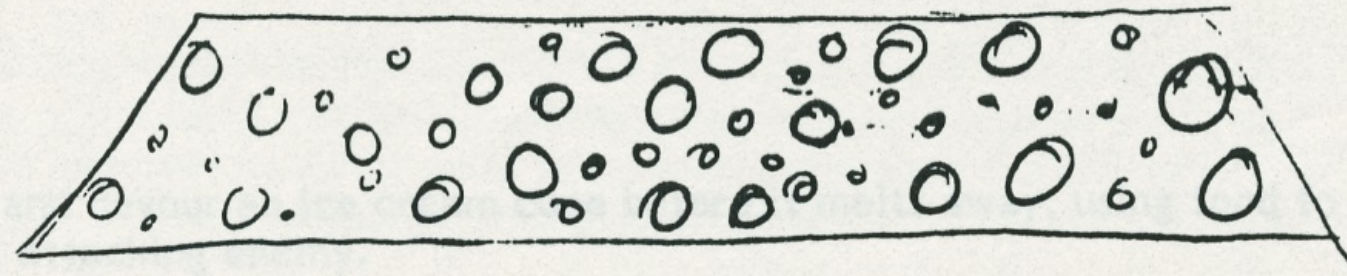
At the start of the round, enemies appear at the left of the screen and begin moving ~~toward the right at various speeds. Enemies move~~ somewhat randomly, but in general toward the hero. The enemies are armed with whipped cream guns — when ~~they~~ ^{one} catches the hero, ~~they~~ ^{he} is engulfed ~~him~~ in a pile ~~of~~ whipped cream, and (effectively) dies.

The other way the hero can die is if the cone melts ~~before~~ ^{completely} he ~~captures~~ captures it.

Score

Score

Score



2/16/82

Things that will get tougher as rack goes higher:

→ 1. # Holes increases

→ 2. # Piles increases

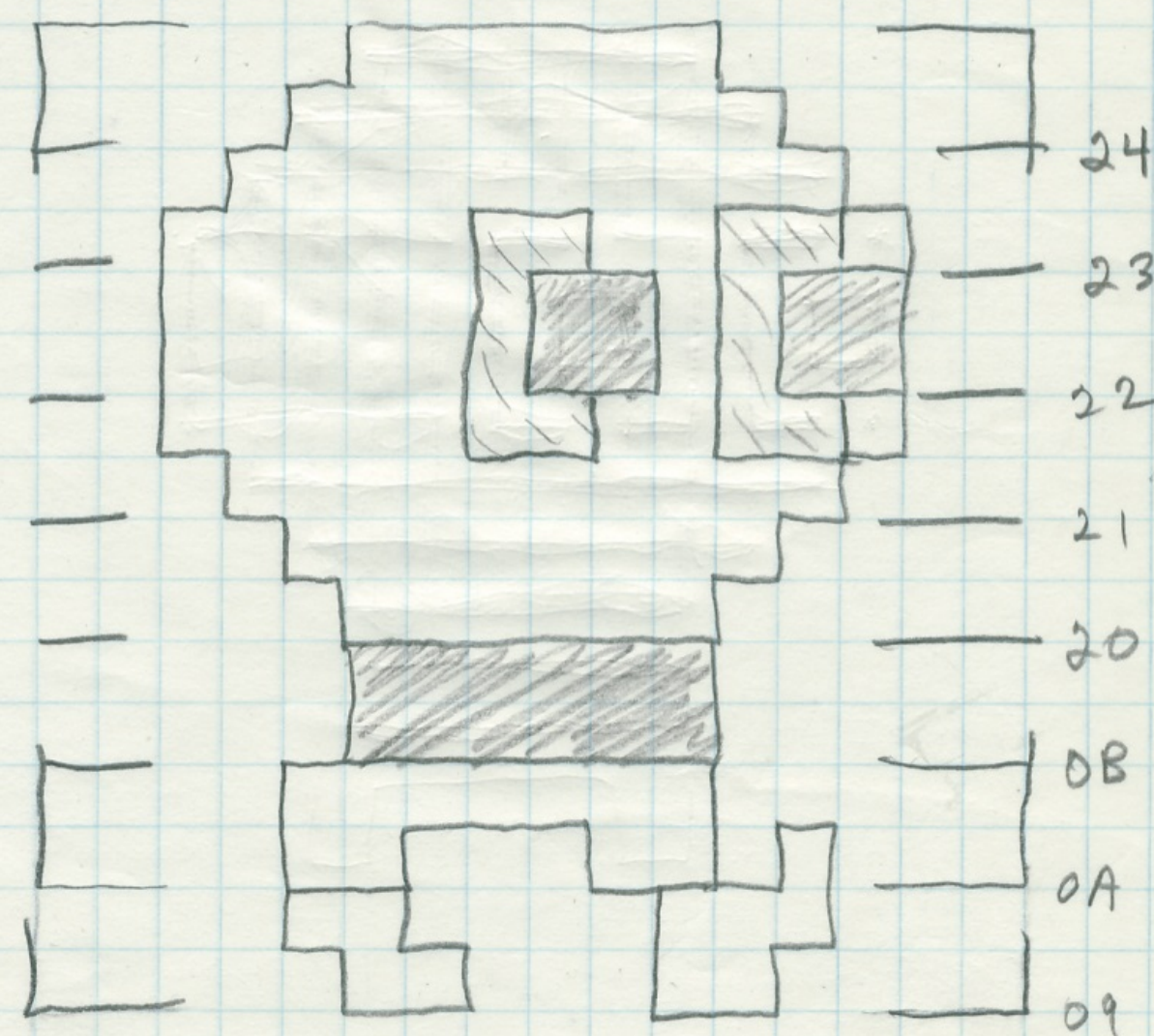
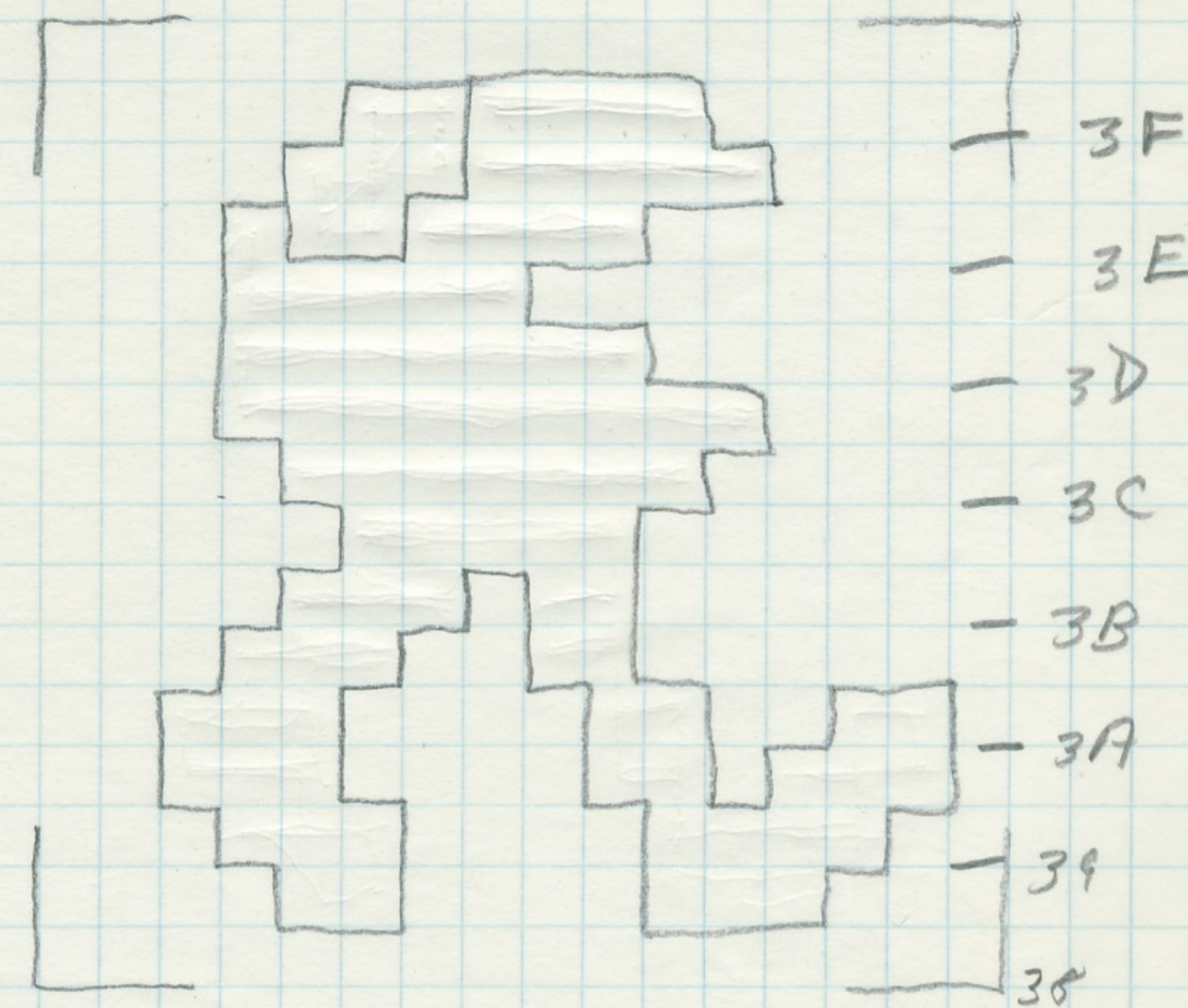
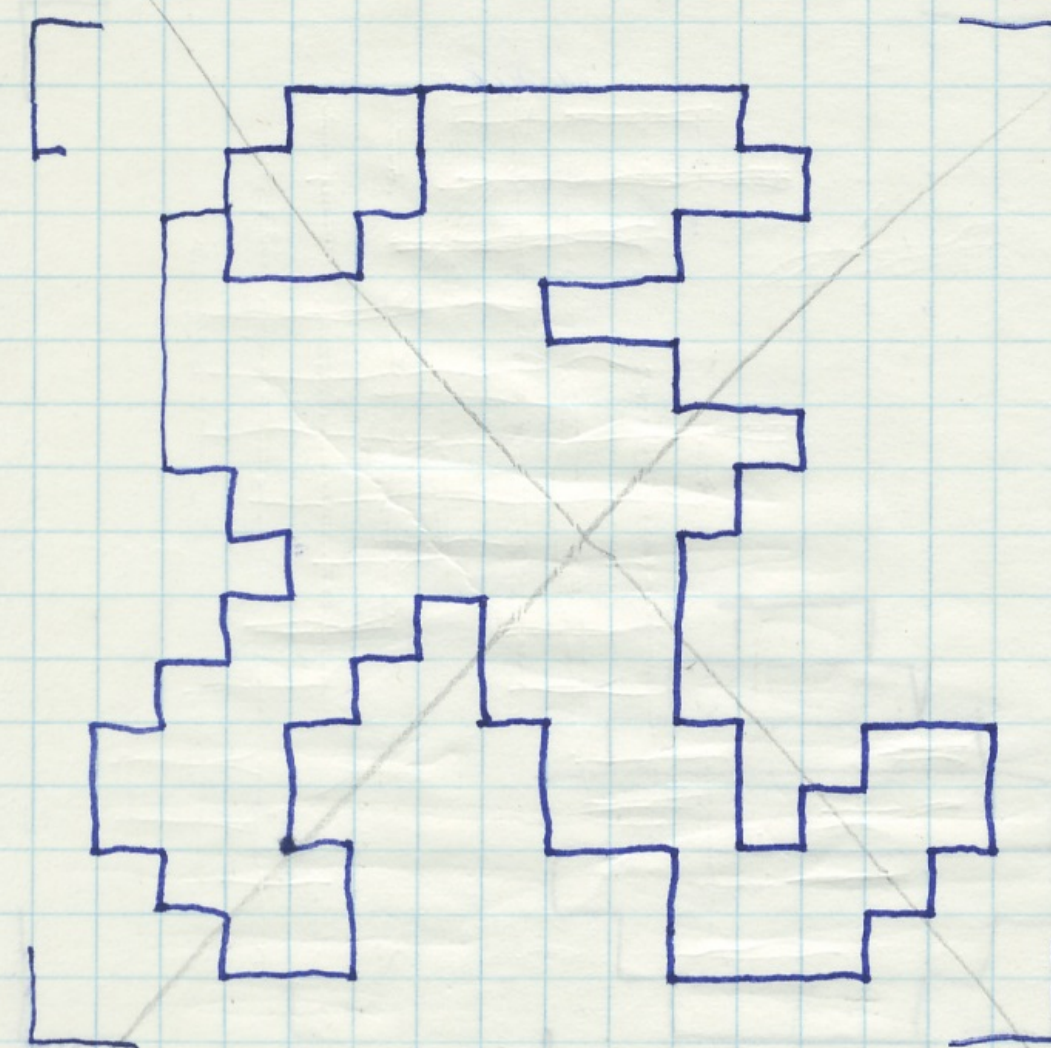
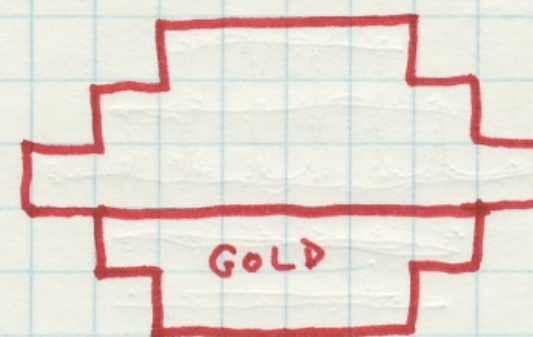
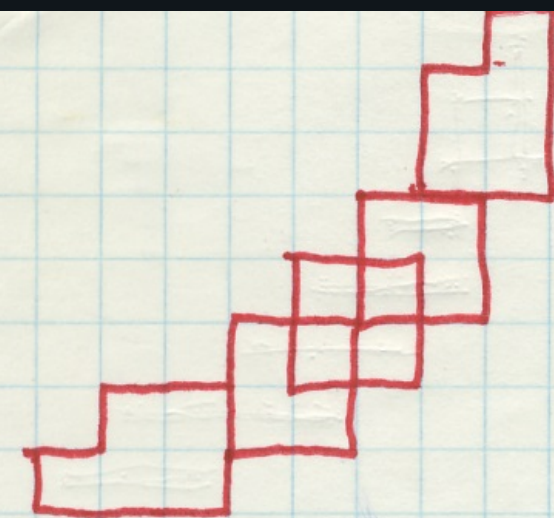
3. Maximum food per pile decreases

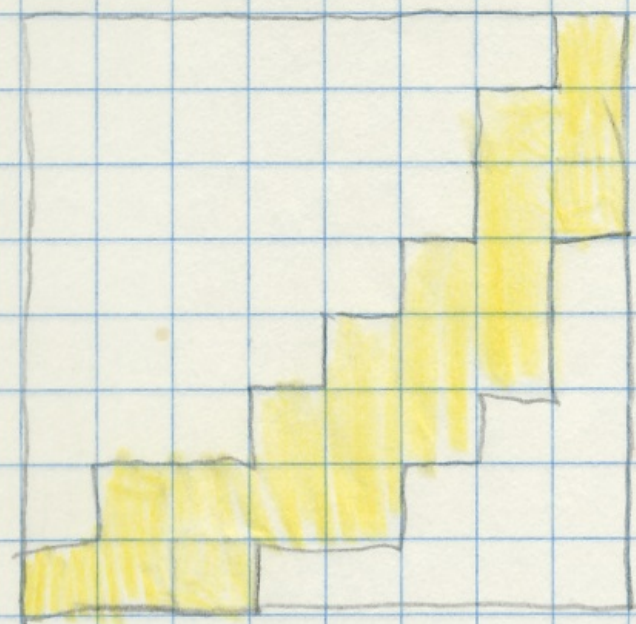
→ 4. Enemies throw food (starting in rack 3)

5. Enemies get smarter

→ 6. Enemies reappear faster

→ 7. Enemies get faster (Later)





Banana

00
16

Get rid
of white

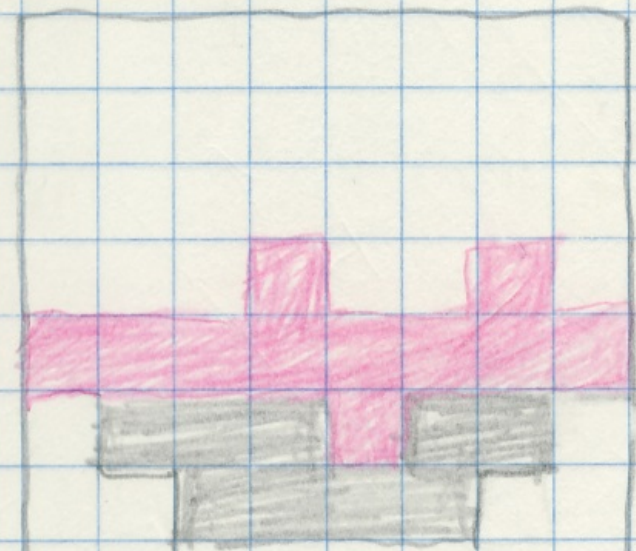
Hero

Banana/Arm

09 (arm
different!)

Body:

1D



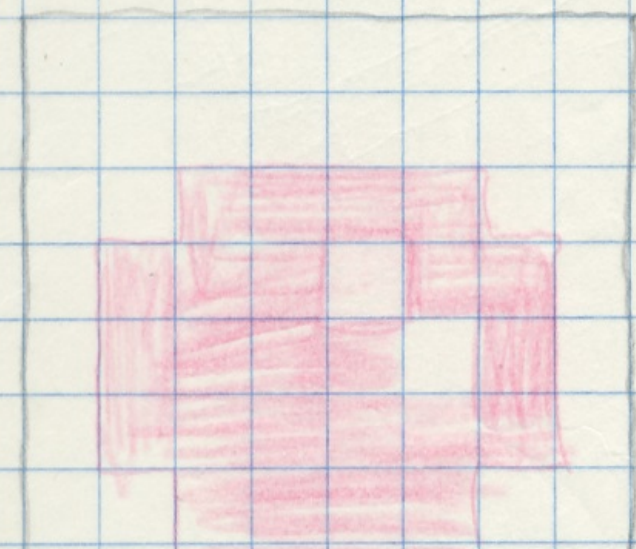
Pie

01
14 07

Redo w/ 07

Pie/Arm

07 ??



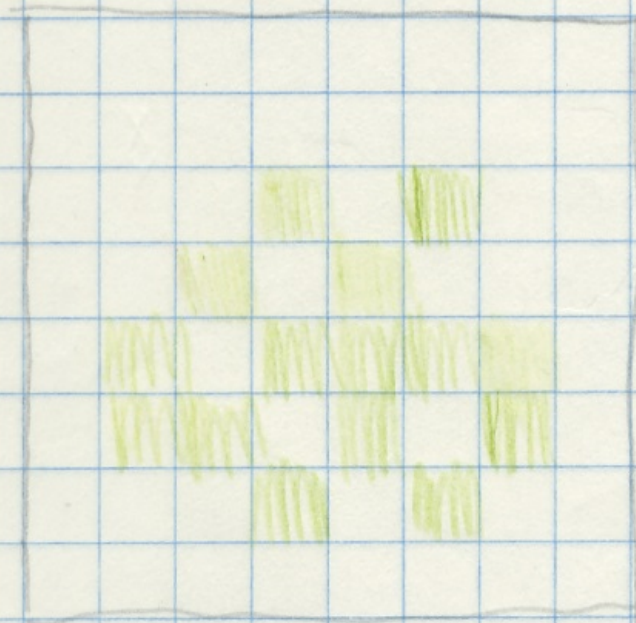
?

Tomato

Color 03 04 (different)
0F

Tomato/Arm

Color 01



Peas

02 05
17 06
07

Peas/Arm

Color 11

19
36
55

0011
1011



700

CAS 74300



LEVEL 4



FOODFIGHT FOCUS GROUP TESTING

(August 17, 1982)

Overview

Group I:

Ages: 15-18

Area From: West Roxbury, Dedham

Number: 8 (all male)

Preferred games and why:

Omegarace: not too complicated; have a choice on how to play
Dig Dug: like blowing up things
Galaga: double fire power; blowing up everything
Zaxxon: 3d; good control; blowing things up
Defender: different things to do; fast; have to concentrate on different things
Defender: somewhat complicated, but not so much that it isn't fun
Centipede: like trackball control and freedom of movement
Pac-Man: like gobbling things and the graphics

Initial reaction (moderator explained that the game was new and not completely polished; they were told not to touch the game, but just look at it and then were asked about their initial reactions to the game):

- o Looked flimsy and easily beat upon
- o Not sure how control worked
- o Graphics look simple like the comics, but not sure that they understand what is going on.
- o Majority said that they learn by watching, and are not experts on new games

After playing:

Negatives:

- o Didn't understand watermelon
- o Did not like instant replay (surprised initially, bored after)
- o Screen is too busy, too much going on in a small area
- o Should speed up the guy; not enough control on the speed
- o Walk and throw should be different controls - NO!
- HOLD o More variation in the screens (different foods, creatures)
- o Not clear how ~~man~~holes work (what are ~~man~~holes doing in a kitchen?)
- o Need variation on background; not just black; maybe more scenery
- o Peas unclear (parsley, mold, spinach?)

Positives:

- o Liked the fact it was a different idea, funny
- o More realistic
- o Non-violent
- o Takes thinking to play the game
- o Liked the way food went into score
- o Liked the beginning; gave a chance to figure out what was going on

do it at level where exciting

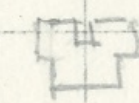
make it bigger

1) Try two joysticks.

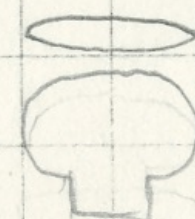
2) Encoder wheel +
(right) analog joystick
(on left)

INTRODUCING...

INTRODUCING...



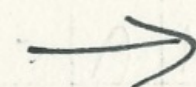
ANGELO



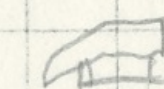
OSCAR



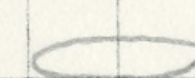
PIERRE



JACQUES



ZORBA, RBA, THE GREEK



THE GREEK PASTRY CHEF

<smiling face on each as name comes up?>

AND STARRING...



~~CHARLEY CHUCK~~



<letters appear as he walks across?>

Inter Office Memo

CONFIDENTIAL



Coin Operated Games Division

To: Distribution

From: Market Research *JB*

Subject: FOOD FIGHT - TOPLINE

Date: 3-14-83

Collection reports on three prototypes and a summary matrix of the pre-prod FOOD FIGHT games are attached. The Albany Bowl FOOD FIGHT game was returned to Atari on 3/9 after eight weeks of testing.

Captain Mike's Pizza: After ten weeks on test, the FOOD FIGHT in this location remains as the top-earning game. The operator is very pleased with FOOD FIGHT'S performance in this location.

7/11 Store, Salt Lake City: Remains as the number two of the three games in this location (below POLE POSITION and above Ms. Pac Man) for the past four weeks. FOOD FIGHT was relocated to another 7/11 store on 3/9.

Festival Game Palace, Fresno: FOOD FIGHT ranked as the 19th game in this arcade location for this, its first full week without technical problems. Due to previous technical difficulties, players may be avoiding this test game. Earnings will be monitored in the coming weeks to assess players acceptance of the game.

Pre-Production Distributor Samples: The attached matrix shows several of the FOOD FIGHT samples displaying exceptional performance; in particular, games testing with New Orleans Novelty, Betson and Rowe are earning very well. These distributors are very pleased with FOOD FIGHT'S earnings. In contrast, C.A. Robinson is very disappointed with their FOOD FIGHT game.



Charley Chuck's

ATARI

FOOD FIGHT™



THE ATARI EDGE: NEW PROFITS.



The Atari Edge means new ways to make money. New CHARLEY CHUCK'S FOOD FIGHT is a fantastic example of how to do just that. There are great space and driving games, cute character games, but Food Fight is unique! It's pie-in-the-face funny. It's frantic, fast, far-out fun for kids from 5-150. Best of all, it's from Atari so you know it's a game with high return on investment potential. Food Fight is a video feast. Charley Chuck's objective is to reach and eat an ice cream cone before it melts. All he has to do is get by Oscar, Angelo,

FOOD FIGHT.™



Jacques, and Zorba. They're four pesky chefs who throw all kinds of fruit and veggies at him to keep him from his goal. Not to worry! Charley has a fat supply of ammo himself—pie, tomatoes, peas, bananas, watermelons—for fighting them off. New features like Instant Replay, up to 125 operator-selectable game levels and more let you clean up big profits. Step into the Next Decade. Get the facts from your Atari Distributor now! Or contact us for referral at Atari, Inc., 790 Sycamore Drive, P.O. Box 906 Milpitas, CA 95035.

The Atari Edge. You need it now more than ever.



A Warner Communications Company

Pac-Baby
Jr. Pac-Man

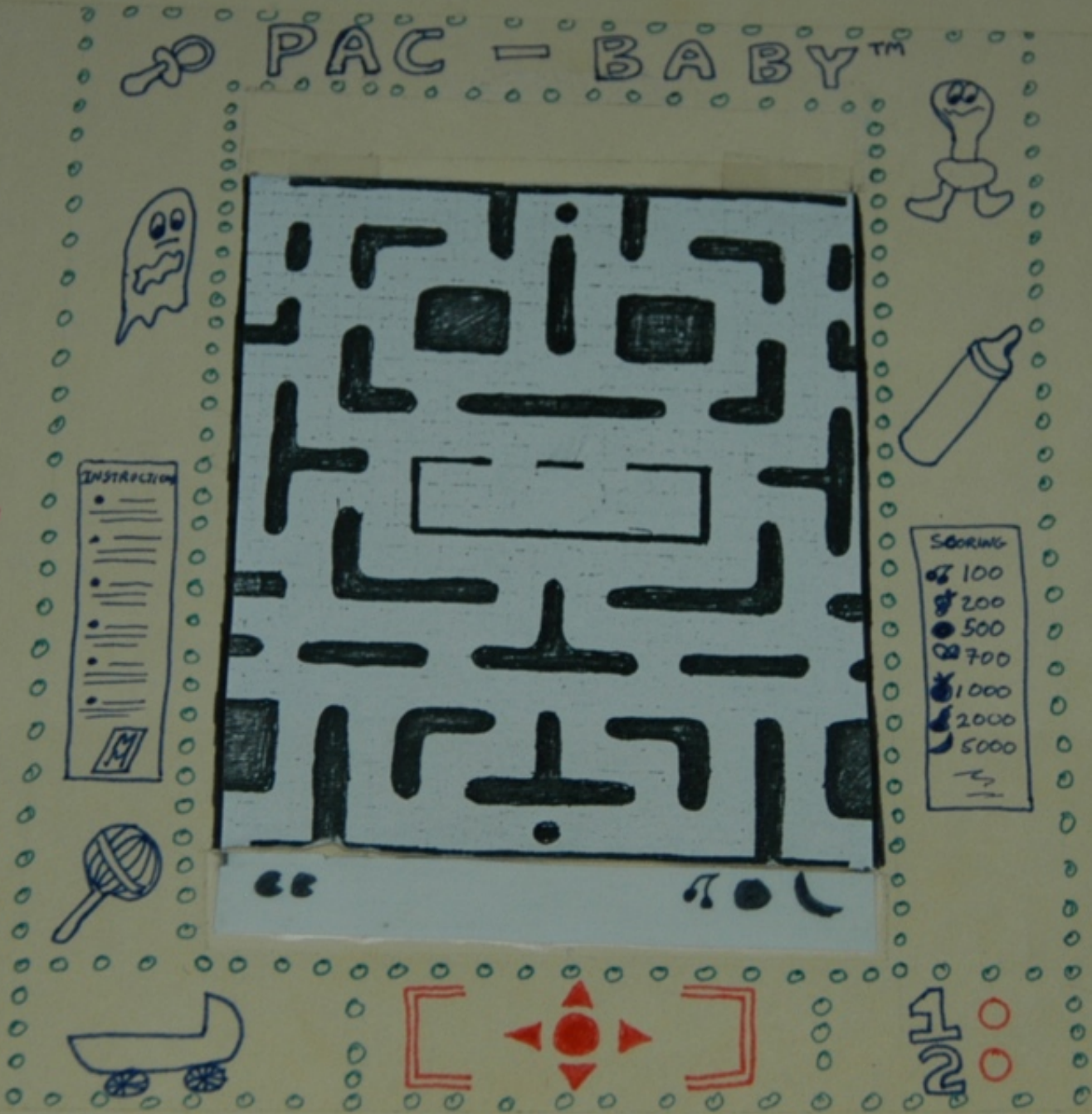
Pac-Baby

Tim Hoskins

Bruce Burns



CONFIDENTIAL



CONFIDENTIAL

The
Annotated
PAC-MAN

PLAINTIFF'S
EXHIBIT
50 1a
2-13-84 AHS

SHIFT REGISTER HACKS.

```

4257=001E32 2A804D LD HL,(4D80)
4258=001E35 29 ADD HL,HL
4259=001E36 22804D LD (4D80),HL
4260=001E39 2A7E4D LD HL,(4D7E)
4261=001E3C ED6A ADC HL,HL
4262=001E3E 227E4D LD (4D7E),HL
4263=001E41 D0 RET NC
4264=001E42 21804D LD HL,4D80
4265=001E45 34 INC (HL)
4266=001E46 C35D1E JP 1E5D
4267=001E49 2A7C4D LD HL,(4D7C)
4268=001E4C 29 ADD HL,HL
4269=001E4D 227C4D LD (4D7C),HL
4270=001E50 2A7A4D LD HL,(4D7A)
4271=001E53 ED6A ADC HL,HL
4272=001E55 227A4D LD (4D7A),HL
4273=

```

```

4274=LOC INST MNEM OPER
4275=001E58 D0 RET NC
4276=001E59 217C4D LD HL,4D7C
4277=001E5C 34 INC (HL)

```

```

4278=001E5D 211A4D LD HL,4D1A
4279=001E60 7E LD A,(HL)
4280=001E61 A7 AND A
4281=001E62 CA721E JP Z,1E72
4282=001E65 3A064D LD A,(4D06)
4283=001E68 E607 AND 07
4284=001E6A FE04 CP 04
4285=001E6C CA7C1E JP Z,1E7C

```

```

4286=001E6F C3BB1E JP 1EBB
4287=001E72 3A074D LD A,(4D07)
4288=001E75 E607 AND 07
4289=001E77 FE04 CP 04
4290=001E79 C2BB1E JP NZ,1EBB

```

```

4291=001E7C 3E04 LD A,04
4292=001E7E CDD01E CALL 1ED0
4293=001E81 381B JR C,1D
4294=001E83 3AAA4D LD A,(4DAA)
4295=001E86 A7 AND A
4296=001E87 CA901E JP Z,1E90
4297=

```

```

4298=LOC INST MNEM OPER
4299=001E8A EF PUT OF,00 RST 5
4300=001E8B OF in ring of things to do RRCA

```

NORMAL MODE

advance gold monster 1 pixel.

advance gold monster 1 pixel.

MOVING IN Y-direction.

MOVING in X-direction

gets here
if $\text{result} \equiv 4 \text{ mod } 8$
predicate, returning result in carry flag.
↑ predicate for on-screen-ness.

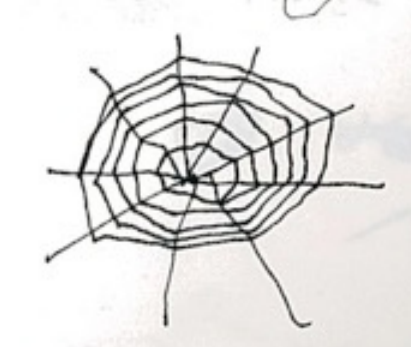
schedule blue-mode select direction

4D37&8 Fixedly & 2 for gold.

4D80.

4D1A → B gold monster
velocity direction.

not zero → move in y-direction



8 4 0 4 4 0 4 0 4


```

6217=
6218=LOC      INST      MNEM OPER
6219=002C3E   EB         EX    DE,HL
6220=002C3F   0607        LD    B,07
6221=002C41   C3FD2B       JP    2BED
6222=002C44   47          LD    B,A
6223=002C45   E60F        AND    OF
6224=002C47   C600        ADD    A,00
6225=002C49   27          DAA
6226=002C4A   4F          LD    C,A
6227=002C4B   78          LD    A,B
6228=002C4C   E6F0        AND    F0
6229=002C4E   280B        JR    Z,0D
6230=002C50   0F          RRCA
6231=002C51   0F          RRCA
6232=002C52   0F          RRCA
6233=002C53   0F          RRCA
6234=002C54   47          LD    B,A
6235=002C55   AF          XOR    A
6236=002C56   C616        ADD    A,16
6237=002C58   27          DAA
6238=002C59   10FB        DJNZ  FD
6239=002C5B   81          ADD    A,C
6240=002C5C   27          DAA
6241=
6242=LOC      INST      MNEM OPER
6243=002C5D   C9          RET
6244=002C5E   21A536      LD    HL,36A5
6245=002C61   DF          RST    3 HL ← (2*B + 36A5)
6246=002C62   5E          LD    E,(HL)
6247=002C63   23          INC    HL
6248=002C64   56          LD    D,(HL)
6249=002C65   DD210044   LD    IX,4400
6250=002C69   DD19        ADD    IX,DE
6251=002C6B   DDE5        PUSH  IX
6252=002C6D   1100FC      LD    DE,FC00
6253=002C70   DD19        ADD    IX,DE
6254=002C72   11FFFF      LD    DE,FFFF
6255=002C75   CB7E        BIT    7,(HL)
6256=002C77   2003        JR    NZ,05
6257=002C79   11E0FF      LD    DE,FFE0
6258=002C7C   23          INC    HL
6259=002C7D   78          LD    A,B
6260=002C7E   010000      LD    BC,0000
6261=002C81   87          ADD    A,A

```

Put a prompt on the screen: prompt # passed in B register. Starting at 3713,* table of prompts of form: ADDRESS ON SCREEN, CHAR, CHAR, CHAR,..., 2F hex.

CALLED FROM MANY PLACES - PROMPT DISPLAY ROUTINE ???

$DE \leftarrow ((2*B + 36A5))$

$IX \leftarrow 4400 + ((2*B + 36A5))$

IX ← color map location for text.

IX ← char map location for text.

if this text is in middle, use increment of -20;
if in text area, use increment of -1. Address of text is

HL ← m B of 3713, 3723, 3732, 3741,
375A, 376A, 377A, 3786,
379D, 37B1, 3D21, 3D00,
37FD, 3D67, 3DE3, 3D86,
3E02, 384C, 385A, 303C,
3D57, 3DD3, 3D76, 3DF2.

color map location for off-screen

83D4	803B	8038	028C
47D4	443B	443B	028C
028C	0292	0292	028C
02AF	02AF	025A	0396

Basically, increment

operand

if high-order bit of operand is set,


```

6329=002D02 3AEC4E LD A,(4EEC)
6330=002D05 A7 AND A
6331=002D06 C8 RET Z
6332=002D07 78 LD A,B
6333=002D08 329B4E LD (4E9B),A
6334=002D0B C9 RET

```

```

6335=002D0C 21303B LD HL,3B30
6336=002D0F DD219C4E LD IX,4E9C
6337=

```

```

6338=LOC INST MNEM OPER
6339=002D13 FD218C4E LD IY,4E8C
6340=002D17 CDEE2D CALL 2DEE

```

```

6341=002D1A 32914E LD (4E91),A
6342=002D1D 21403B LD HL,3B40

```

```

6343=002D20 DD21AC4E LD IX,4EAC
6344=002D24 FD21924E LD IY,4E92

```

```

6345=002D28 CDEE2D CALL 2DEE
6346=002D2B 32964E LD (4E96),A

```

```

6347=002D2E 21803B LD HL,3B80
6348=002D31 DD21BC4E LD IX,4EBC

```

```

6349=002D35 FD21974E LD IY,4E97
6350=002D39 CDEE2D CALL 2DEE

```

```

6351=002D3C 329B4E LD (4E9B),A
6352=002D3F AF XOR A

```

```

6353=002D40 32904E LD (4E90),A
6354=002D43 C9 RET

```

```

6355=002D44 DD7E00 LD A,(IX+00)
6356=002D47 A7 AND A

```

```

6357=002D48 CAF42D JP Z,2DF4
6358=002D4B 4F LD C,A

```

```

6359=002D4C 0608 LD B,08
6360=002D4E 1E80 LD E,80

```

```

6361=
6362=LOC INST MNEM OPER

```

```

6363=002D50 7B LD A,E
6364=002D51 A1 AND C

```

```

6365=002D52 2005 JR NZ,07
6366=002D54 CB3B SRL E

```

```

6367=002D56 10F8 DJNZ FA
6368=002D58 C9 RET

```

```

6369=002D59 DD7E02 LD A,(IX+02)
6370=002D5C A3 AND E

```

```

6371=002D5D 2007 JR NZ,09
6372=002D5F DD7302 LD (IX+02),E

```

```

6373=002D62 C34E36 JP 384E

```

Beginning of Sound Table for Voice 1.
make a sound, called from IBC
Voice A 3B30 *sets up sound using 2DEE as described at beginning of 2DEE*
load volume 1, returned by 2DEE

Voice B
load volume 2
what about voice A?

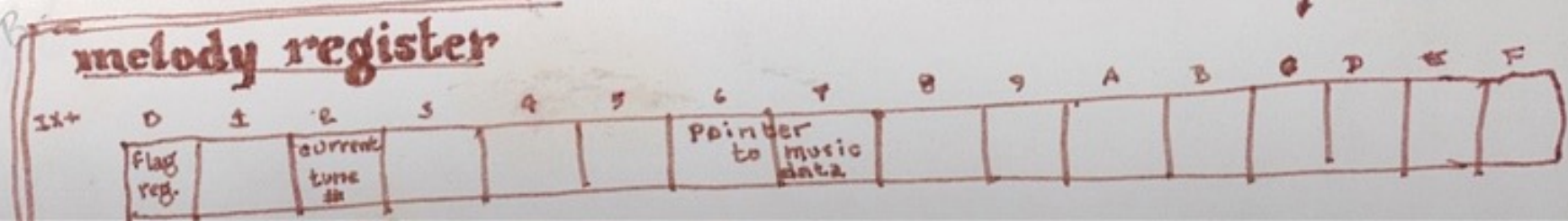
Voice C
load volume 3
IX ← 4EBC

stuff a zero in the ~~high-order~~ high-order pitch nybble of voice #1
(voice #1 has 5 nybbles of pitch code, but 2DEE will set up only 4 of them)
play a tune

set up a sound. [See description of 2DEE, also]

IX → A sound register
HL → A ^{table of} sound descriptors } → pointer to pointers to melodies.
IY → An output port for a specific voice as a ~~set~~ in the sound output buffer.

if no sound bits set, punt
if this ~~sound~~ tune already in progress?
if so, → 2D66.
DEC B
RST 3 → HL ← HL + 2



Rockslide

Roland Janbergs

Hero is climbing a mountain
Volcano spews rocks and lava
Trolls emerge from tunnels
Throwing rocks at trolls
Hero pushes boulders
Nessie

Clone

Bill Hofmann

Cells, DNA, flagellum

Track ball + encoder wheel

Crystal Castle

Wat Hughes

Randomly-generated maze game

Color vector hardware

Two joysticks?

Pseudo-3D game? Actual 3D viewer?

Emanuel “E” Washington helped

Eventually morphed into...

Crystal Castle → Starship Raider

No 3D (didn't help in focus test)

Player is on one of several decks of large spaceship

Goal: destroy central control before your oxygen runs out

Beware defending robots!

Paul Moody art, Wat Hughes programming

Cancelled due to lack of suitable controls

Neon

Keith Sawyer

Larry Dennison

Magician

Keith Sawyer

Riding on dragons, steer them, breath fire

Then morphed into...

Magician → Arena → Dune →
“Game without a name” →
Lagoon

Eventually incorporated Neon

Possible themes: sandworm, sea serpent, flying dragons

Worms became light beams

Killed due to “lack of enthusiasm”

White Rabbit / Rabbitron

Dan Nussbaum

Tom Westberg

Multi-Tasking Kernel by Dan Nussbaum

Rabbitron

Enemy grey hares

Flying rabbits

Eating a carrot makes you a flying attack rabbit!

Control earspeed by spinning controller wheel

Interface

Darrell Myers

some initial help from Wat Hughes

“dots change color as player’s wand sweeps over them”

Roland Janbergs joins after Rockslide cancelled

Then morphed into...

Interface → Netherworld → Orbis

Darrell and Roland

Skulls, analog joystick

Then morphed into...

Orbis → Nightmare

Better plot!

Darrell Myers lead, with Roland Janbergs

also John Mracek? Lars Jensen?

“Dr John Roldar”

Two units on test at Atari...





NIGHTMARE



PSYCHO-PHYSICIST
DR. JOHN ROLDARR
SEEKS TO CONTROL
THE POWER OF THE
MIND.

Motocross

Dan Nussbaum

Possible themes: Road Warrior? skateboarders? Rt 128?

Brad Parker, Matt “Smatt” BenDaniel join

Realistic handlebars, gears, throttle

Gameplay: cross-country race? track race?

Use optical laserdisc?

Laserail

Paul Moody proposal

Laserdisc game

Real-time graphics + computer-generated backgrounds

Talked to many movie effects houses, selected Magi

Much work by Darrell, Randall, Paul, Marshall

Laserail

What do people like that is fun?

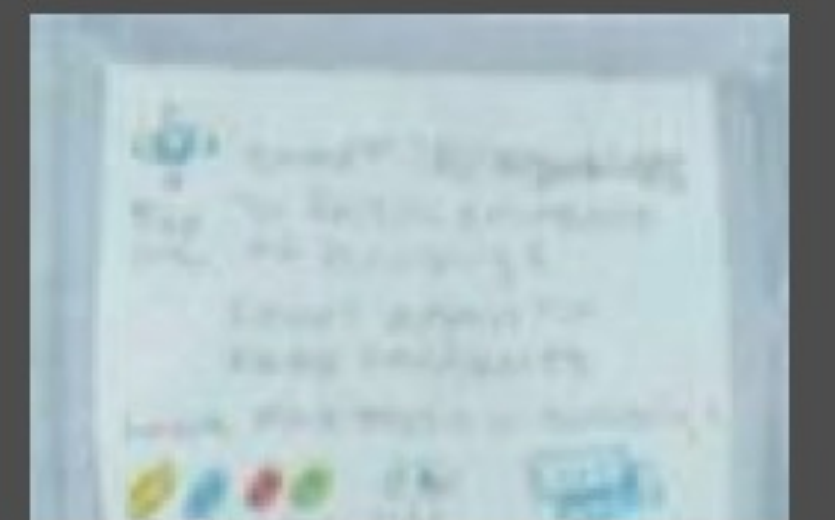
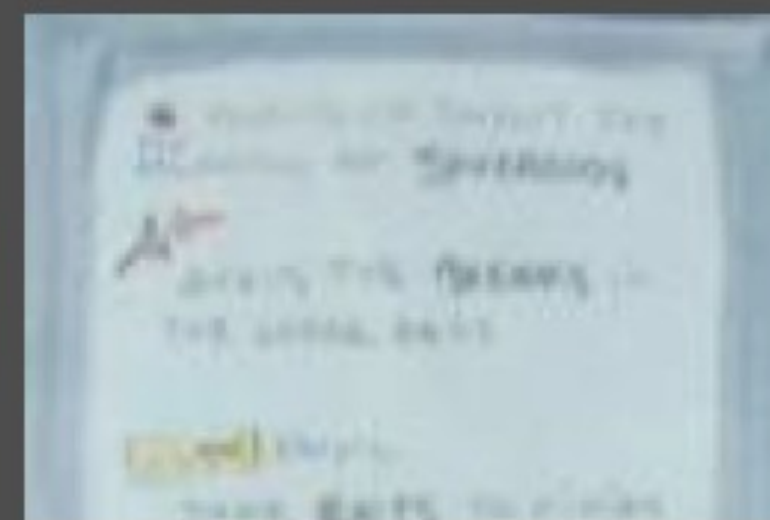
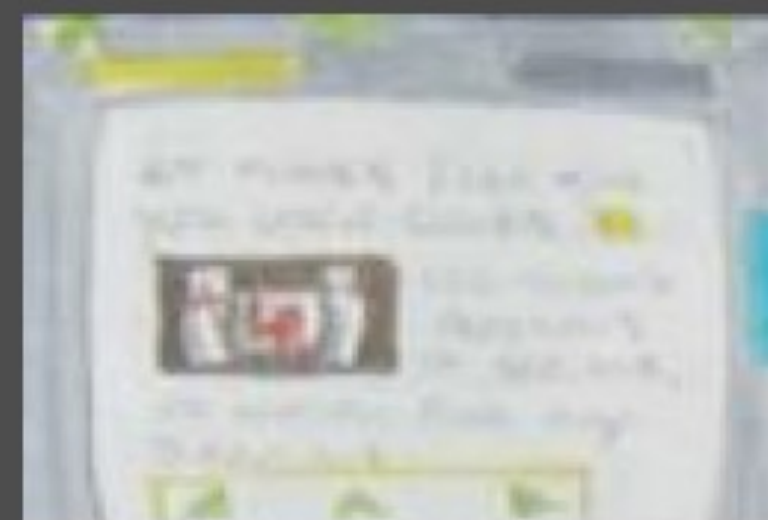
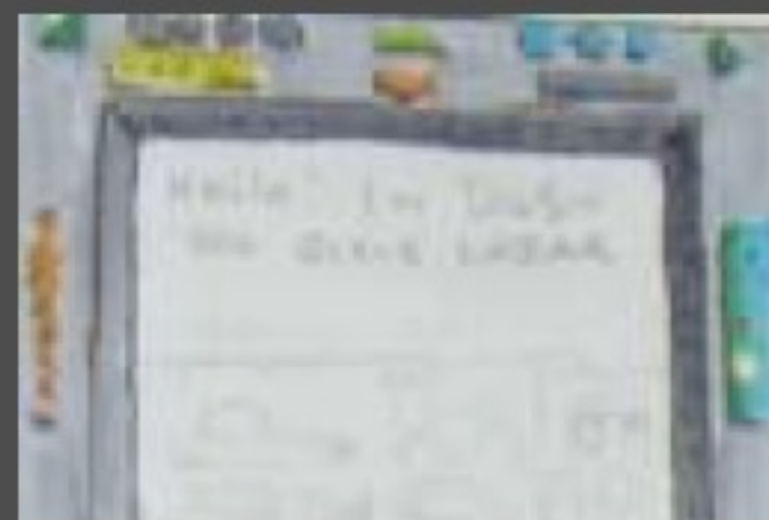
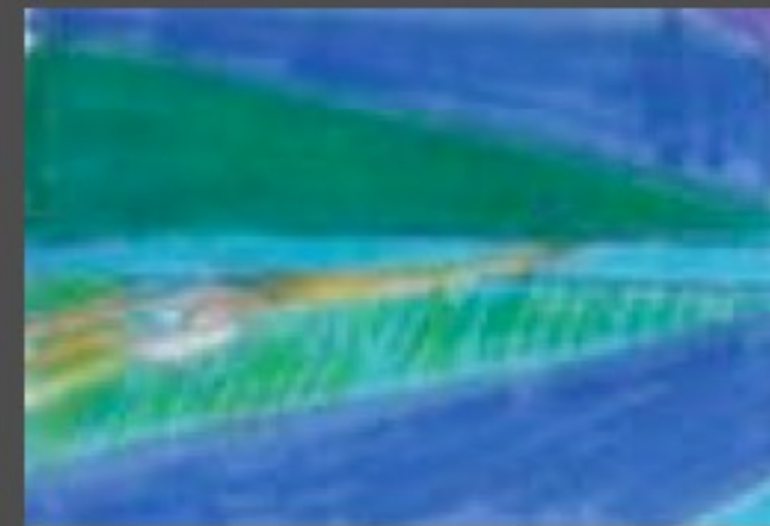
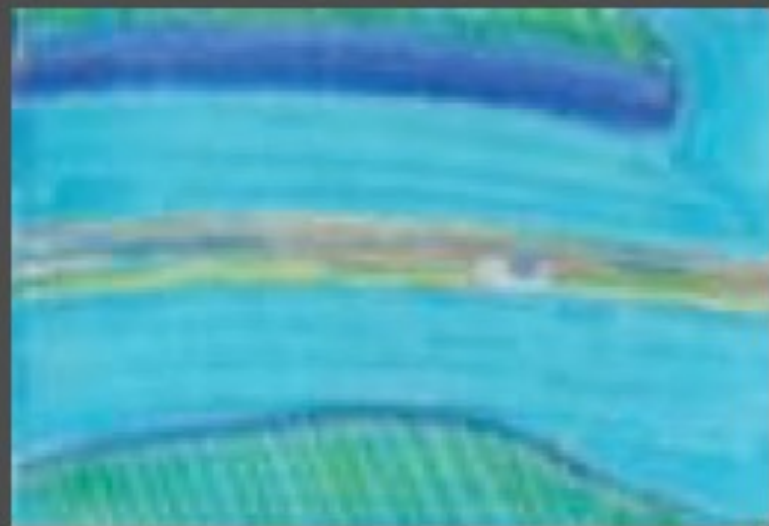
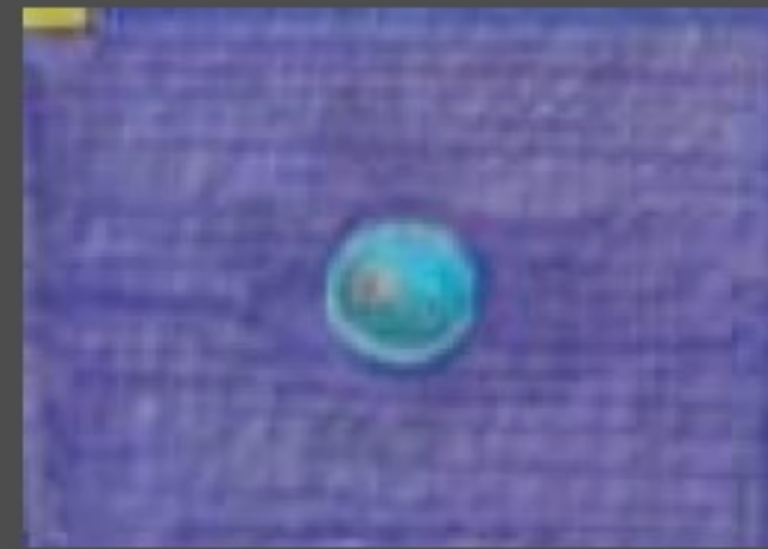
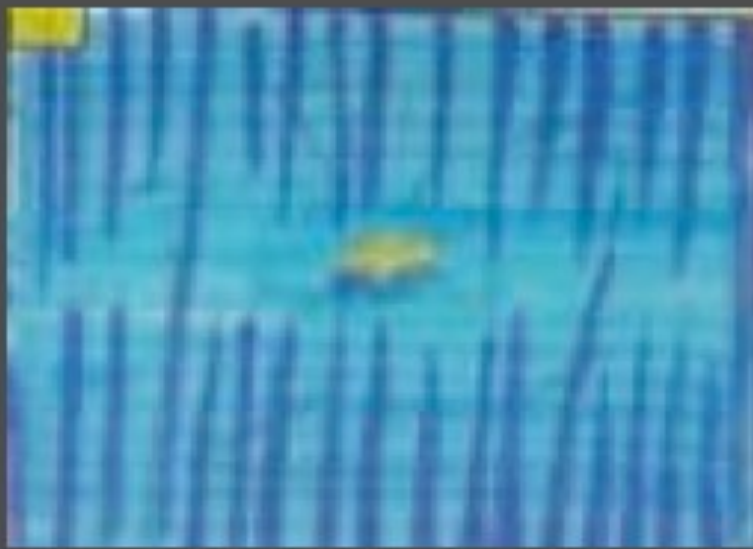
- Roller coaster
- Collecting
- Shoot-'em up

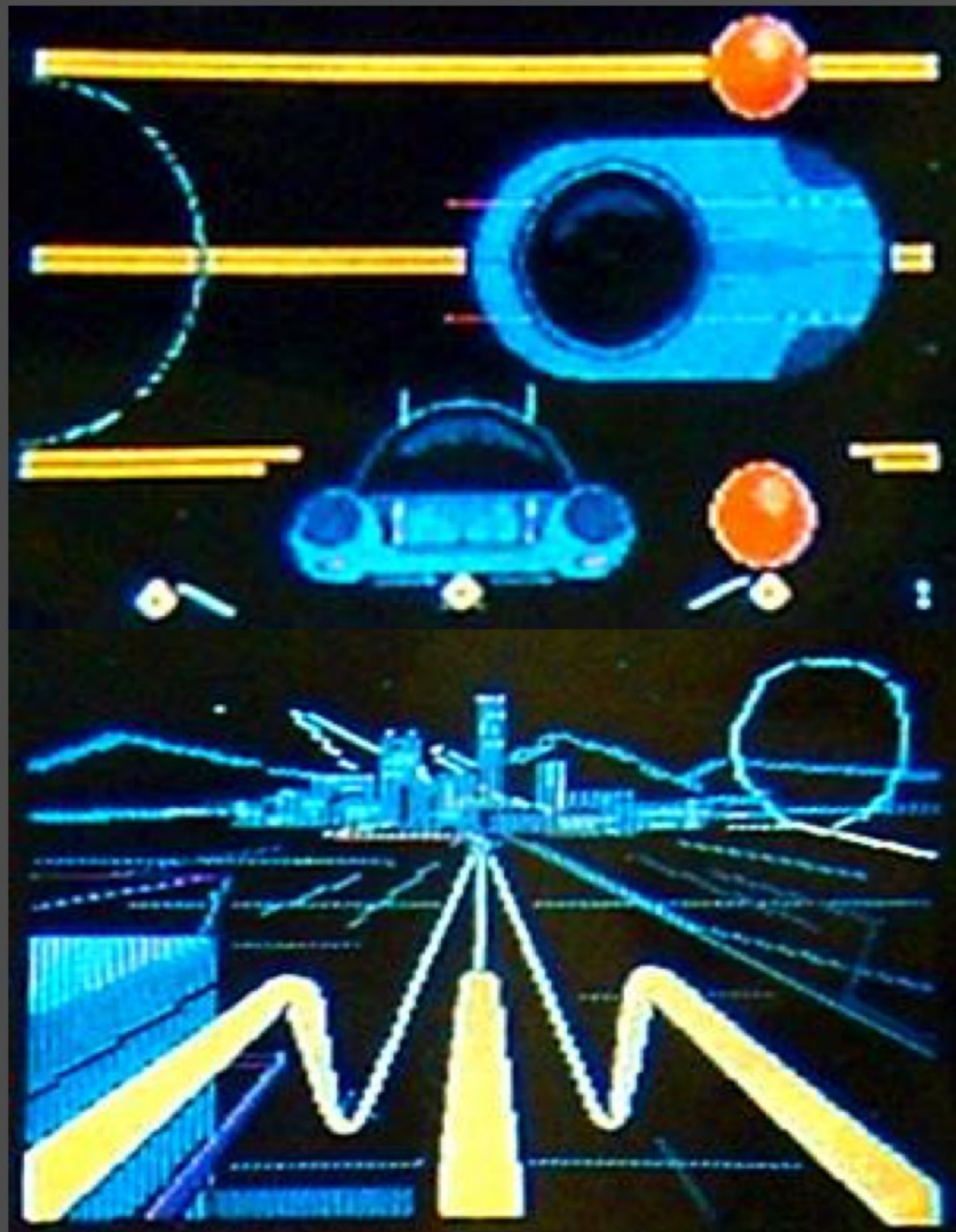
Passive player: dodge everything

Active player: shoot everything



1984 LaserRail: Original arcade game – concept illustrations, concept gameplay, concept theme





1984 LaserRail: game artifact specifications, back-story, models, sketches, time-warp feature overview



1984 LaserRail: Original arcade game – concept illustrations, concept gameplay, concept theme

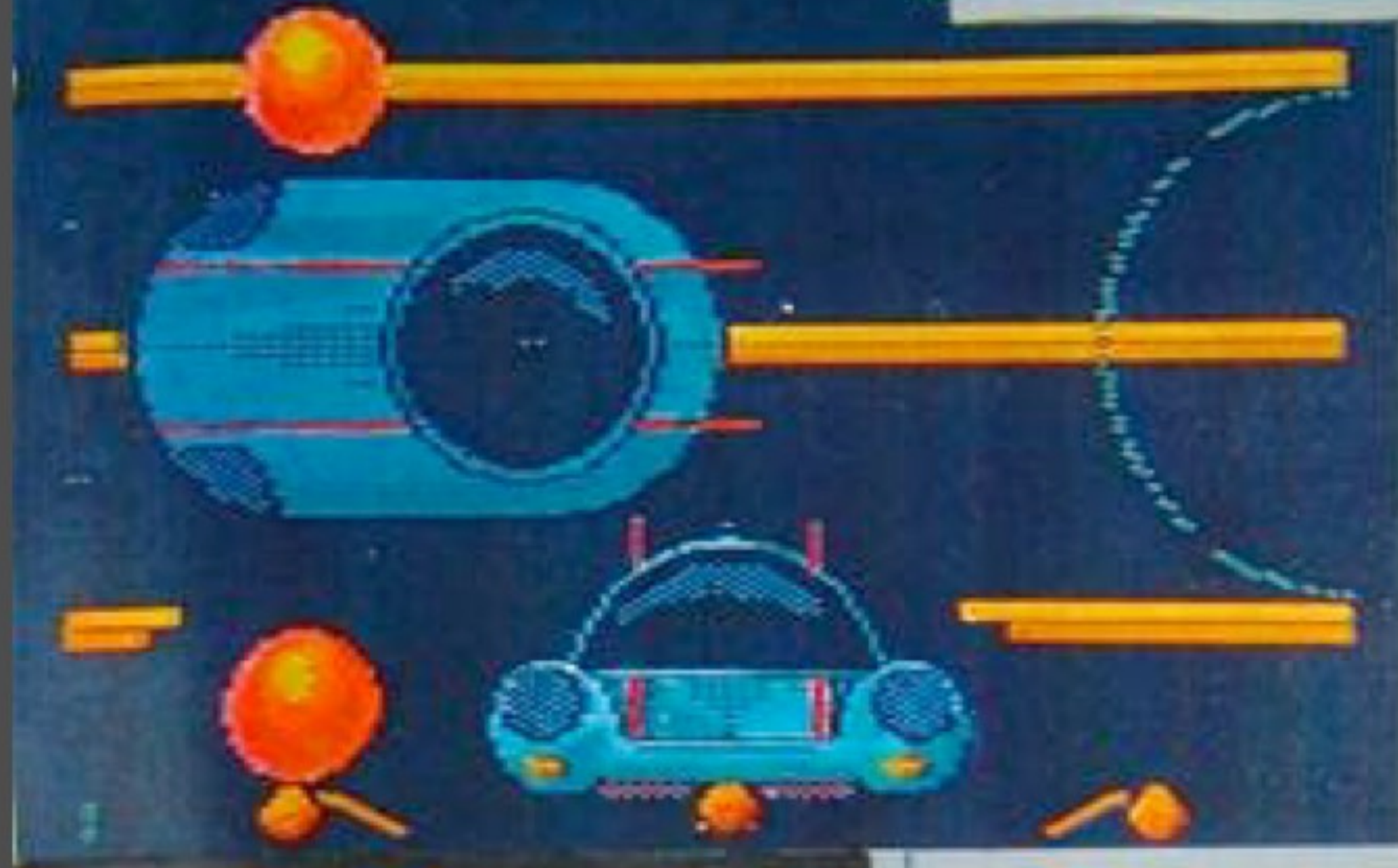




1984 LaserRail: Original arcade game – concept illustrations, concept gameplay, concept theme





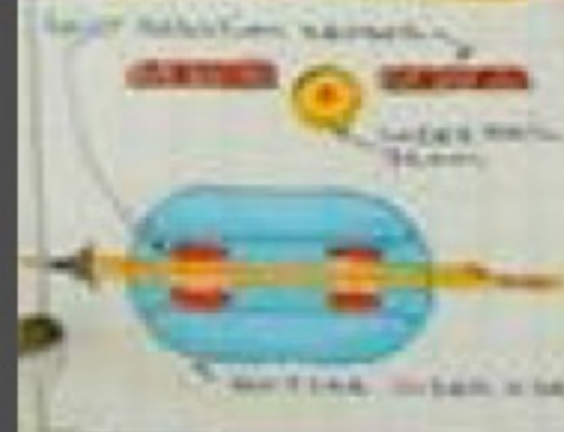


THE LASER RAIL GX-5 COASTER CAR

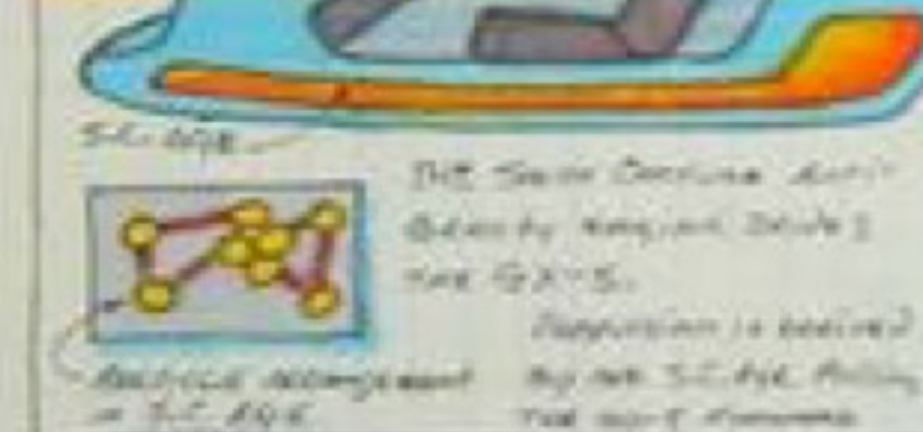
SPECS

TOP SPEED: 112 MPH
ACCELERATION: 0-100 MPH IN 1.5 SEC
LENGTH: 60.5' HEIGHT: 39.0'
DROPT: 45.0' LAUNCH: 97.5'
MAX. LAUNCH TIME: 8.0'

ENTRANCE SYSTEM



ANTI-WAVER PROVISION SYSTEM





Artists

Darrell Myers

Marshall Peck

Randall McLamb

Paul Moody

Musicians

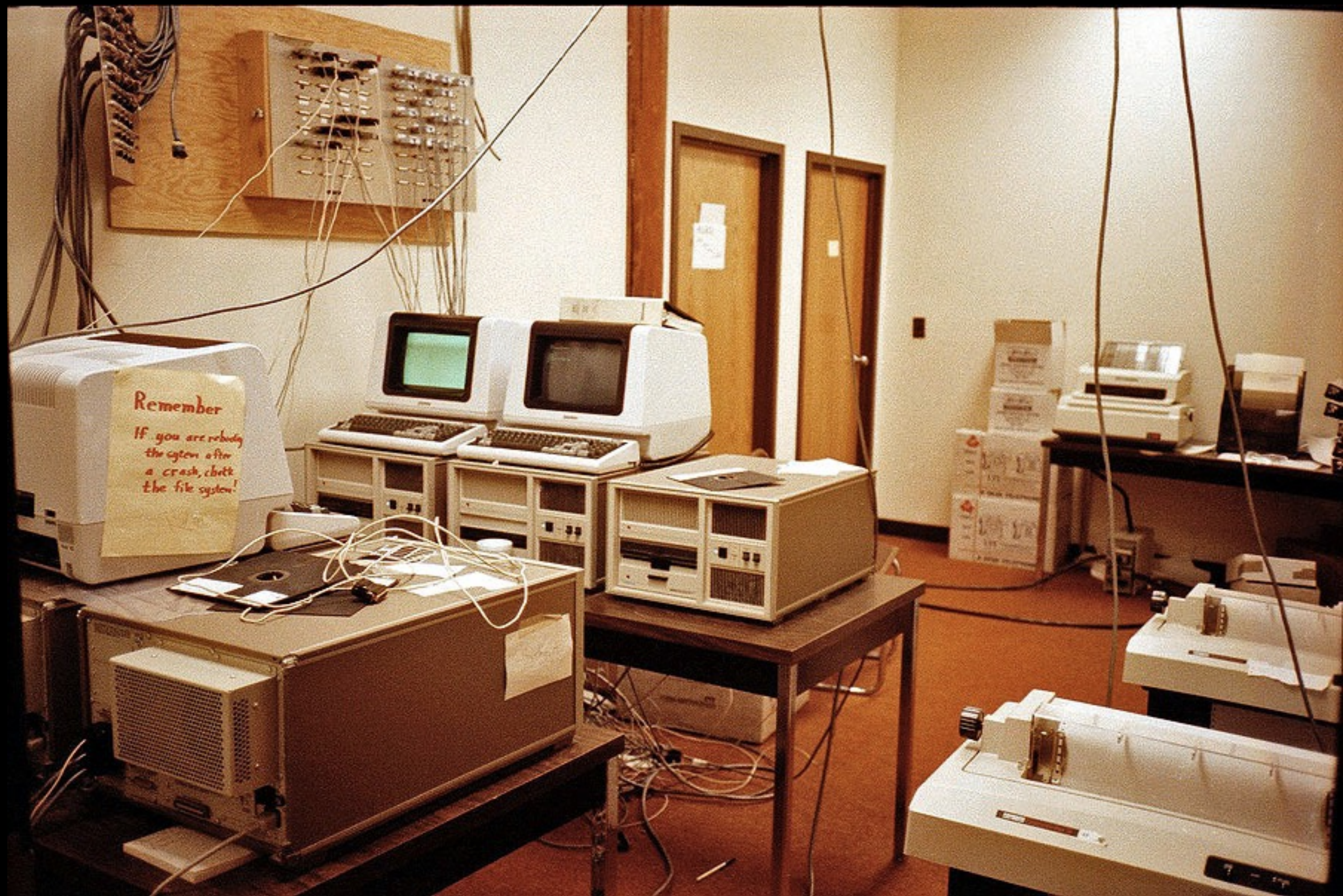
Patty Goodson

Coin-op game design













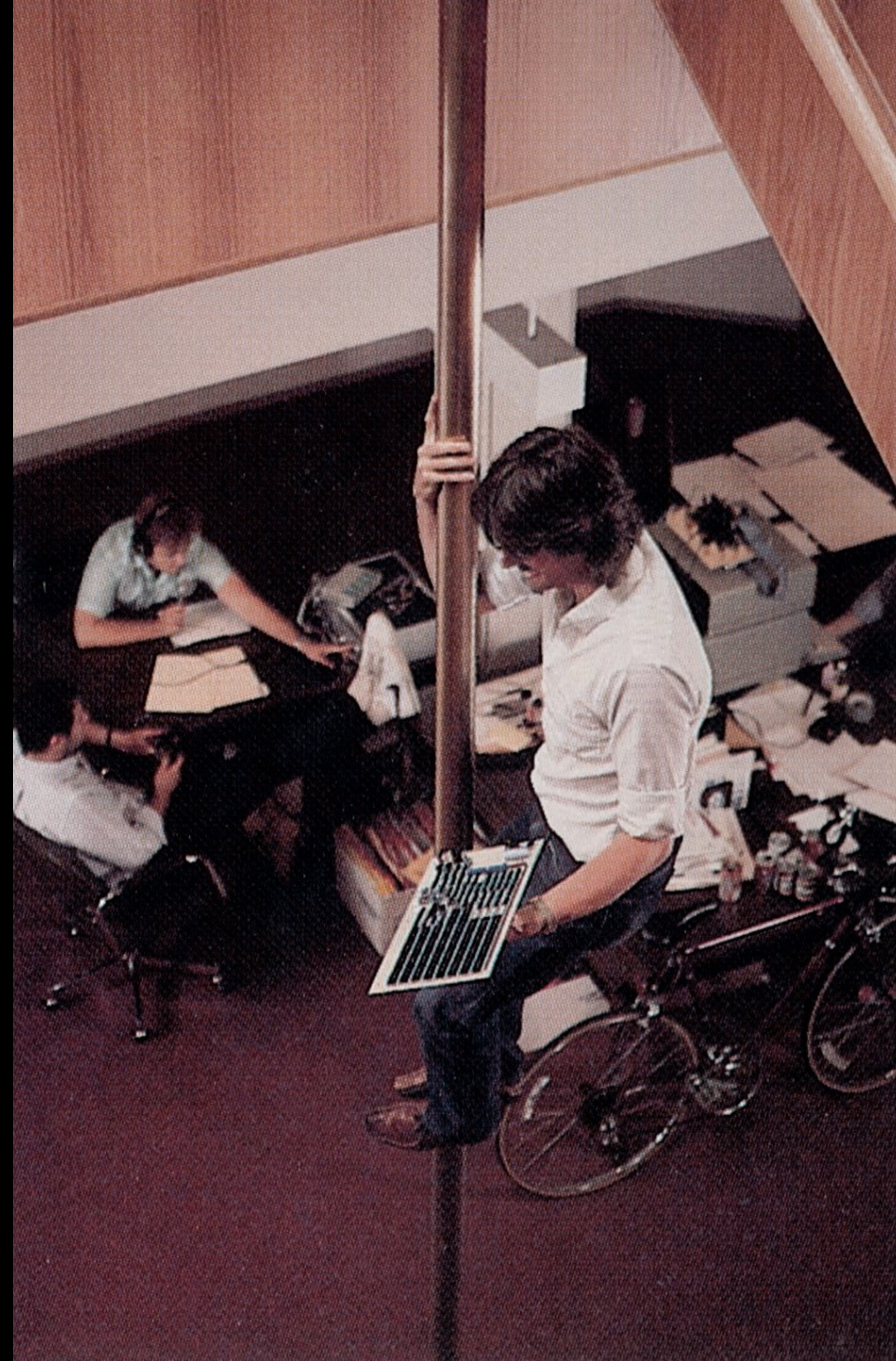


Life at GCC











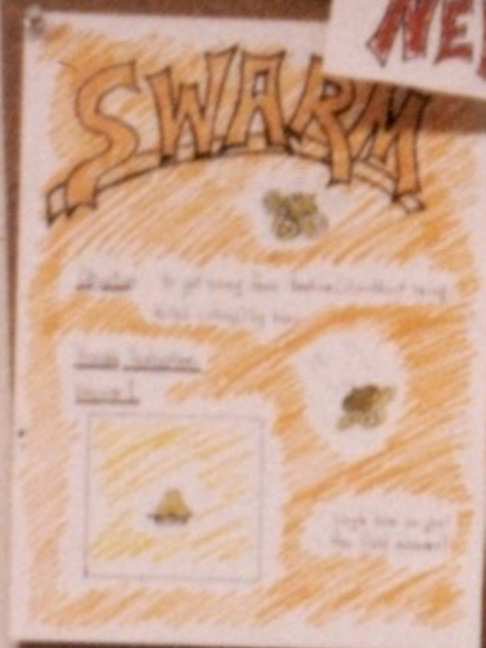




NOTICE
Game ideas new and old are now in the file cabinet in my office. Please come check them out -and- give comments and suggestions!



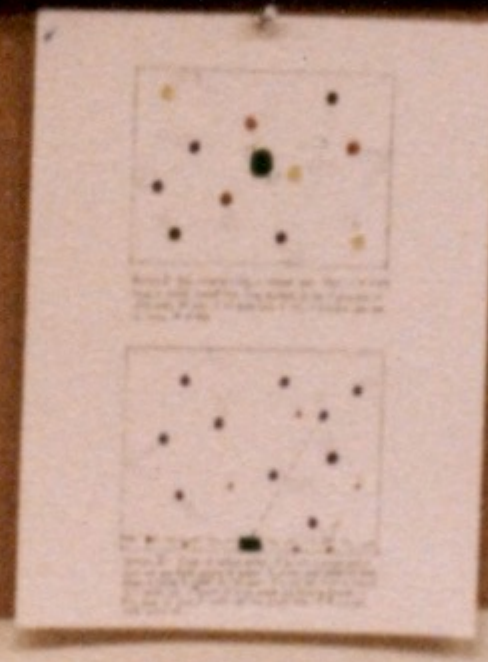
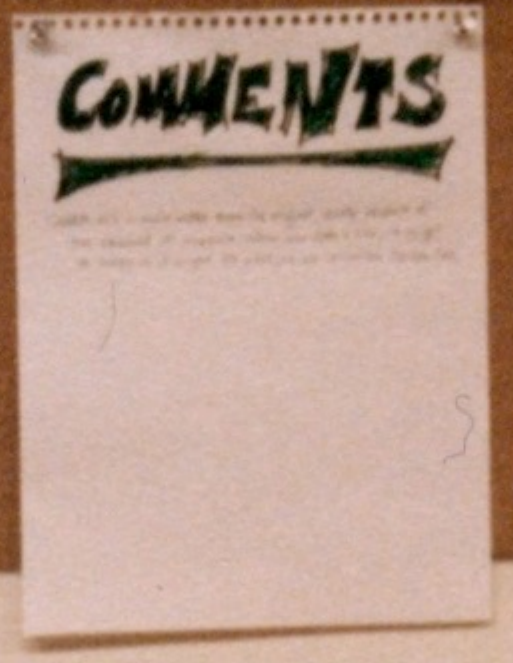
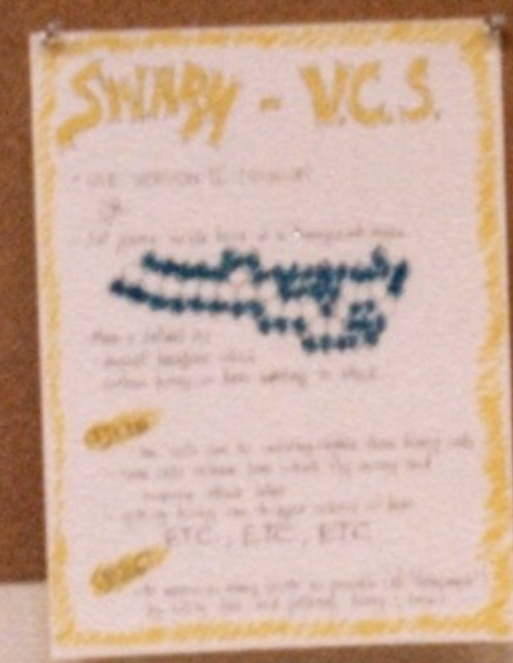
NEW GAME



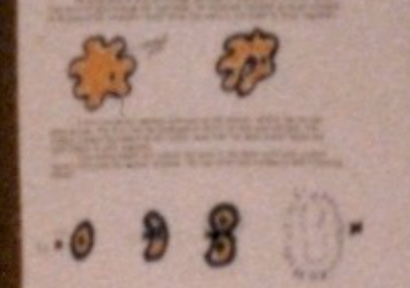
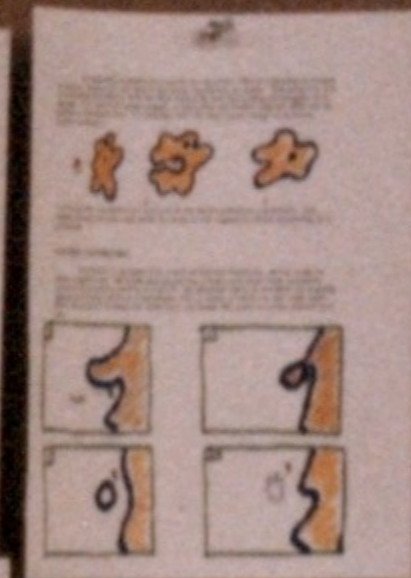
Attention! We need a name for our new white/cork board.
Please write any ideas below:

1. Center for Enlightenment and Personal Development (CEPD)
2. Multi-Media Idea Center (MIMIC) *hey - we don't mimic! we enhance! you realize they rip off*
3. Nathan
4. The Oracle (Otto's)
5. Brown Bomb (The)
6. Rosebud
7. The Gameplan
8. The Circus (board and open floor area)
9. General Computer Printouts
10. Visioneering Window of Vulnerability
11. Mr. Otto's Neighborhood *Yay (can you say "Nathan")*
12. The Voice of Otto *(Bring me Forbin...)*
13. The Horror *PORTWORTH*
14. The (Mental) Mirror
15. All the vicious Hubs fit to print *[one rule is: add English script to text]*
16. Super Message Attack *(Defend Ideas)*

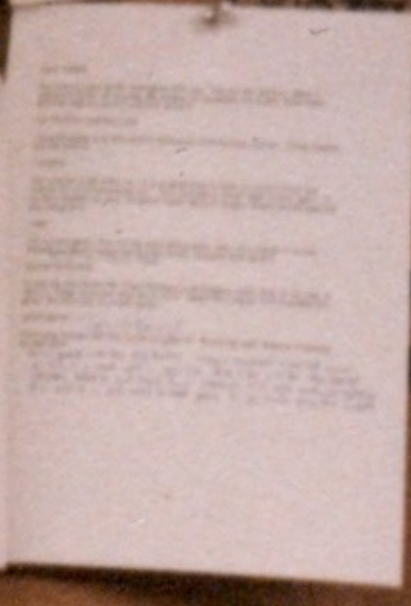
party
next Sat
(May 15)
at Dave's
in Somerville



Comments sought!



COMMENTS



UNO

“It was fun while it lasted”

– Brad Parker

Q & A