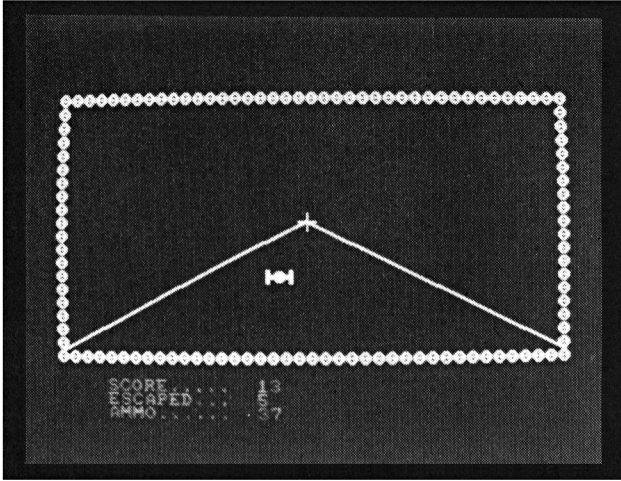


SPACE WARS



CLASSIFICATION: Shoot-up Game

Slaughter the aliens as they appear within your field of vision, steady on the cross-hair before you fire. Your ammo is limited as are the number of aliens.

Use 'A' to move up, 'Z' to move down, 'comma' to move left, 'period' to move right, and 'space' to fire.

PROGRAMMING SUGGESTIONS

To make the game harder place some obstacles on the screen and alter the alien's movements.

PROGRAM

Variables

ALIENX, ALIENY	Alien's Co-ordinates
SCORE	Player's score
AMMO	Number of shots remaining
ESCAPED	Number of times an alien escaped
ALIEN\$	Characters for printing alien
OLDX, OLDY	Save alien's old coordinates
XDIR, YDIR	Adjustments to alien's coordinates

Program Structure

Lines	Function/Activity
60 — 140	Initialisation
160 — 320	Main loop
360 — 460	Firing routine
470 — 540	Alien hit
580 — 640	Alien escaped
680 — 780	Game over
820	Break routine
860 — 980	Instructions

Initialise game

```

60  GOSUB 860
70  SPEED KEY 1 , 1 : ON BREAK GOSUB 820
80  INK 0 , 0 : INK 1 , 24 : INK 2 , 20 : INK 3 , 6 : PAPER 0
    : BORDER 0 : MODE 1
85  SYMBOL AFTER 238 : SYMBOL 238 , 0 , 16 , 0 , 0 , 0 , 132 , 0 ,
    0 : SYMBOL 239 , 32 , 0 , 0 , 0 , 8 , 0 , 0 : SYMBOL 240 , 16
    , 0 , 0 , 130 , 0 , 0 , 16 , 0
87  SYMBOL 241 , 0 , 0 , 4 , 128 , 0 , 0 , 0 : SYMBOL 242 , 136 ,
    0 , 0 , 4 , 64 , 0 , 0 , 128 : SYMBOL 243 , 129 , 0 , 8 , 0 , 129 ,
    0 , 0 , 64
90  SYMBOL 244 , 192 , 195 , 199 , 255 , 255 , 199 , 195 ,
    192 : SYMBOL 245 , 3 , 195 , 227 , 255 , 255 , 227 , 195
    , 3
95  SYMBOL 246 , 33 , 68 , 37 , 40 , 157 , 34 , 34 , 17 : SYMBOL 24
    7 , 161 , 178 , 65 , 41 , 159 , 138 , 113 , 81 : SYMBOL 248 , 2 ,
    128 , 144 , 0 , 130 , 16 , 64 , 144 : SYMBOL 249 , 49 , 0 , 144 ,
    1 , 1 , 68 , 2 , 136 : SYMBOL 250 , 194 , 36 , 1 , 145 , 0 , 132 ,
    128 , 66
97  SYMBOL 251 , 1 , 69 , 17 , 64 , 152 , 1 , 129 , 100
100 ALIENX = 30 : ALIENY = 10 : SCORE = 0 : ESCAPED = 0 : A
    MMO = 100
110 PEN 1 : LOCATE 1 , 1 : PRINT STRING$( 40 , CHR$( 181 ) )
    : LOCATE 1 , 20 : PRINT STRING$( 40 , CHR$( 181 ) ) : FO
    R T = 2 TO 19 : LOCATE 1 , T : PRINT CHR$( 181 ) : LOCATE
    40 , T : PRINT CHR$( 181 ) : NEXT T
120 PEN 3 : LOCATE 5 , 22 : PRINT "SCORE....." : LOCATE 5 ,
    23 : PRINT "ESCAPED..." : LOCATE 5 , 24 : PRINT "AMMO..
    ...."
130 ALIEN$ = CHR$( 244 ) + CHR$( 245 )
135 E$(1)=CHR$(246)+CHR$(247) : E$(2)=CHR$(250)+CHR$(11)+CH
    R$(8)+CHR$(248)+CHR$(249)+CHR$(8)+CHR$(10)+CHR$(251)
140 E$(3)=CHR$(8)+CHR$(11)+CHR$(238)+CHR$(239)+CHR$(240)+CH
    R$(10)+STRING$(3,8)+CHR$(241)+CHR$(242)+CHR$(243) : E$(4
    )="  _ _ _" +CHR$(10)+STRING$(3,8)+"  _ _ _"

```

Main program loop

```

160  :
170  LOCATE ALIENX , ALIENY
180  PEN 2 : PRINT ALIEN$
190  MOVE 320 , 238 : DRAW 320 , 258 , 1 : MOVE 321 , 238 : DRAW
    321 , 258 , 1 : MOVE 310 , 248 : DRAW 330 , 248 , 1
200  OLDX = ALIENX : OLDY = ALIENY
210  XDIR = (INKEY (31) > -1) - (INKEY (39) > -1)
220  ALIENX = ALIENX + XDIR
230  YDIR = (INKEY (71) > -1) - (INKEY (69) > -1)
240  ALIENY = ALIENY + YDIR
250  ALIENX = ALIENX + ( ( (ALIENX < 21) - (ALIENX > 20) ) /
    4)
260  ALIENY = ALIENY + ( ( (ALIENY < 12) - (ALIENY > 10) ) /
    4)
270  ALIENX = ALIENX + (CINT (RND (1) ) / 2) : ALIENY = ALIE
    NY + (CINT (RND (1) ) / 2)
280  IF ALIENX < 2 OR ALIENX > 37 OR ALIENY < 2 OR ALIENY >

```

```

19 THEN GOSUB 580
300 IF INKEY (47) > -1 THEN GOSUB 360
310 LOCATE OLDX , OLDY : PRINT "▲▲"
320 GOTO 170

```

Firing routine

```

330 :
360 PLOT 8, 96 : DRAW 320, 248, 2 : PLOT 632, 96 : DRAW 320,
    248, 2
370 SOUND 1, 0, 30, 15, 1, 1, 1
380 AMMO = AMMO - 1
390 LOCATE 16, 24
400 PEN 3 : PRINT AMMO : "▲▲"
410 IF AMMO = 0 THEN GOTO 680
420 PEN 0
430 PLOT 8, 96 : DRAW 320, 248, 0
440 PLOT 632, 96 : DRAW 320, 248, 0
460 IF CINT (OLDX) = 20 AND CINT (OLDY) = 10 THEN GOTO 470
    ELSE RETURN

```

Alien hit

```

465 :
470 MOVE 320, 238 : DRAW 320, 258, 0 : MOVE 321, 238 : DRAW
    321, 258, 0 : MOVE 310, 248 : DRAW 330, 248, 0 : ENV 2,
    7, -1, 10, 8, -1, 40
473 SOUND 1, 200, 200, 15, 2, 2, 2
475 FOR T1=1 TO 3 : LOCATE 20, 10 : PEN 2 : INK 2, 26 : PRI
    NT E$(T1) : FOR T2=1 TO 300 : NEXT : LOCATE 19, 9 : PRIN
    T E$(4) : NEXT
477 INK 2, 20
490 SCORE = SCORE + 1
500 LOCATE 16, 22
510 PEN 3 : PRINT SCORE
520 ALIENY = CINT (RND (1) * 10) +5
530 ALIENY = CINT (RND (1) * 10) +5
540 RETURN

```

Alien Escaped

```

550 :
580 ESCAPED = ESCAPED + 1
590 SOUND 2, 100, 25, 1, 1, 1
600 ALIENX = CINT (RND (1) * 20) +10
610 ALIENY = CINT (RND (1) * 10) +5
620 LOCATE 16, 23
630 PEN 3 : PRINT ESCAPED
640 IF ESCAPED < 10 THEN RETURN

```

Game over

```

650 :
680 MODE 0
690 LOCATE 5, 11
700 PRINT "GAME OVER!"

```

```

710 PRINT "SCORE...." ; SCORE
720 FOR I = 1 TO 10
730 FOR N =1000 TO 0 STEP -100
740 SOUND 1, N, 3, 15, 0, 0, 0
750 NEXT N
760 NEXT I
770 FOR T = 26 TO 0 STEP -1 : INK 1, T : FOR N = 1 TO 50 :
NEXT N : NEXT T : CLS : INK 1, 24
780 A$ = INKEY$ : IF A$ = "" THEN GOTO 780 ELSE RUN

```

Break routine

```

790 :
820 SPEED KEY 35 , 1 : STOP

```

Instructions

```

830 :
860 MODE 0
870 LOCATE 1, 5
880 PRINT "▲'A'.....▲UP"
890 PRINT "▲'Z'.....▲DOWN"
900 PRINT "▲'←'.....▲LEFT"
910 PRINT "▲'→'.....▲RIGHT"
920 PRINT "▲SPACE.....▲FIRE"
930 INK 3, 8, 22
940 PEN 3
950 PRINT
960 PRINT
970 PRINT "▲▲▲▲▲Space Wars"
980 A$ = INKEY$ : IF A$ = "" THEN GOTO 980 ELSE PEN 1 : MOD
E 2 : RETURN

```

ChexSum Tables

60 =	316	360 =	2239	690 =	332
70 =	1059	370 =	669	700 =	954
80 =	1840	380 =	1377	710 =	1499
85 =	4014	390 =	335	720 =	1004
87 =	3783	400 =	1154	730 =	1855
90 =	5622	410 =	1576	740 =	865
95 =	8355	420 =	233	750 =	427
97 =	1578	430 =	1054	760 =	433
100 =	4225	440 =	1180	770 =	4363
110 =	7787	460 =	3835	780 =	2376
120 =	3970	465 =	0	790 =	0
130 =	2256	470 =	4409	820 =	791
135 =	8170	473 =	1085	830 =	0
140 =	10527	475 =	4963	860 =	219
160 =	0	477 =	331	870 =	279
170 =	1458	490 =	1540	880 =	971
180 =	951	500 =	333	890 =	1143
190 =	3282	510 =	981	900 =	1084
200 =	2565	520 =	2198	910 =	1169
210 =	2970	530 =	2198	920 =	1243
220 =	2115	540 =	201	930 =	368
230 =	3041	550 =	0	940 =	236
240 =	2118	580 =	1814	950 =	191
250 =	4247	590 =	692	960 =	191
260 =	4232	600 =	2223	970 =	1388
270 =	5665	610 =	2198	980 =	3032
280 =	5189	620 =	398		
300 =	1766	630 =	1102		
310 =	1538	640 =	1611		
320 =	392	650 =	0		
330 =	0	680 =	219		
				TOTAL =	173592