

# REVIEW

# COLOUR

Made in Hong Kong it may be but Bill Bennett found that Eaca's Colour Genie was far from being just a toy.

THE COLOUR GENIE has a pleasing resemblance to the Commodore Vic-20. It is a little larger, and a fair bit heavier. It has a casing between plastic case, moulded in two halves, and a column of Function keys down the right-hand side of the keyboard.

The main alphanumeric keyboard is of typical quality and is laid out in the time-honoured QWERTY fashion, with the variations in a row above the alphanumeric keys.

## Keyboard features

The alphabet keys have pairs of graphics characters printed on their fronts. These are accessible via the keyboard and include lines, squiggles and crosses, as well as six dot-matrix characters and the symbols of the four playing-card suits.

The touch keys, labelled EXT, are at the intersection of the numeric row and must be operated as a pair. The first eight numeric

keys can be used to change the low-resolution colour by hitting Control followed by the desired colour key.

The Control key can access colours and graphics characters. The Mod SEL key on the bottom row can change the display into the high-resolution mode, when used in conjunction with the Control key.

There are several ports around the side and rear of the Genie. The first port on the right-hand side is the parallel port. This is normally used to connect the Genie to a dot printer; however it could be used to interface with a Breville-type unit. There is a DIN-type socket for a light-pen, and another DIN-type socket so as to fit the serial port. It could not lock much less like an RS-232 socket, and the way in which it settles is not assisted by the previous manual.

The cassette input/output port is on the rear of the Genie, next to a cartridge port similar to

the cartridge ports on the Dragon-32 and Vic-20. Whether or not there are any cart-ridges to fit is another matter. Flashes along the back are two sockets: one audio and one a video-monitor socket.

The Genie costs £199.50 including VAT, plus postage itself is the most competitive sector of the home-computer market. Its real keyboard will attract the kind of user who would settle for a ZX Spectrum, and the machine is undoubtedly more powerful than the Vic-20. There are a number of other machines under £200 including the Dragon-32, the Atari and the Texas 994.

## A competitive micro

The Atari, with its touch-sensitive keyboard, will appeal to a totally different type of user, and so cannot be considered as a rival. The Texas has only a small memory and so would appeal to yet a different kind of user, which

leaves us tentatively with the Dragon, ironic because the Dragon uses an almost identical version of Basic, and has some similar characteristics in its colour.

The Dragon, moreover, has more memory and better graphics, but the Genie beats the Dragon hand-over as far as its unusual generation facilities are concerned.

If you are a budding writer or animator the Dragon will be far more relevant if you think that sounding like Dwayne Dunes or Koolhaas is your idea of fun then it has to be the Genie.

The Genie's processor is the ubiquitous Z-80, running at a steady 2.1MHz. This makes it relatively slow, especially when compared to other Z-80-based micros that have colour. It would appear that the colour chips are the same as the Dragon and the Tandy Colour computers, but that is not definite.

The Colour Genie features an extended

version of the Basic language. It is a very powerful implementation. Although there is only 18K of ROM, all the usual Basic commands are included as well as a number of extra commands which handle the graphics and sound capabilities of the Genie. There are also a number of more exotic commands — not really part of Basic — which make the programmer's life easier.

## Language differences

However, there are inconsistencies contained within the Interpreter. For example, in the low-resolution mode, the command for defining the colour of a character to be printed is Colour, the English spelling. This is interesting because in the high-resolution mode, the command to set the colour of a point is Fcolor. On the whole, the Basic resembled me of Tandy Level II; hardly surprising, since the original Video Genie uses that dialect. The

difference between the two languages are mainly in the extra graphics and sound commands. Tandy commands Set, Reset and Point are not included, since their function is made redundant by the high-resolution commands. Although a user can remove any software written in the Tandy Basic, and run it, it is not possible to load Tandy programs. This is because signals are stored differently on the different machines.

The command to load a program from cassette is CLoad, or to load a specific program CLoad "program name". This is far less than appear in the top right-hand corner of the screen. One of the stars remains constant, the other flashes. These flashes indicate that the computer has read in a particular character — most likely carriage return. If the row on the right does not flicker, then the cassette is not being read, and you know you have to start again.

The Edit facility is certainly useful, though difficult to use at first. The real advantage comes when debugging.

The Auto command means that the programmer does not have to keep entering line numbers. Programmers used to many repetitive machines with Marconi's Basic will love the Genie.

## Special commands

Commands available on the Genie which may be unfamiliar are Char, which enables a special user-defined character set; Verfil, which compacts a program on tape with that in memory; System, which takes the user into the monitor program; Trim and Trfil, a trace facility which prints out line numbers as lines are executed.

DEFILE defines an double-precision arithmetic beginning with a certain letter; window commands define longer variables, single precision, strings and arrays. Two useful features include Error which simulates an error and the Error Genie, which means the program does not necessarily crash if something is wrong. A number of unorthodox functions, mainly dealing with double-precision variables, are also available.

A special command is included to cope with a joystick. It returns a number giving a coordinate of its position. Maybe the most interesting command included in the Genie is Screen, which prints out the screen as it is. The user-defined documentation only lists that "the Screen command lists the main graphics" which combination of users to play."

The main point is that the Genie is a reasonably good, more to the point, software maker it goes to see. The Play command is followed by four parameters, character, start, area and application. My only criticism is that the user cannot specify the direction. ■

## CONCLUSIONS

■ The implementation of Basic and the musical facilities on the Colour Genie are as powerful as any to be found in this price range.

■ The colour is a bit of a disappointment, but no worse than many competing machines. The resolution is not as high as it might be.

■ As first, but serviceable machine.