## MAKING CONNECTIONS

The Prism VTX5000 modem is one of the most ingenious add-ons in the world of home computing. By linking the most successful home computer, the Sinclair Spectrum, to Prestel's Micronet and similar databases, it has opened the way for thousands of micro owners to step into the exciting new field of communications.

The Prestel database struggled to find users from the day it first went 'on-line'. Prestel 'sets' were expensive, and the amount of information available on the database was too limited to offer much of an advantage over an ordinary newspaper. However, with a suitable modem and software, most home micros can access Prestel. And so, in order to exploit this possibility, Prism formed Micronet, a separate area within Prestel dedicated to news and information about micros. Modems and software that enabled access to Micronet and Prestel were soon made available by Prism, and the project proved immensely successful. The number of users and the range of information services available continues to grow.

In producing an add-on to connect the Sinclair Spectrum to Micronet, Prism came up against a big challenge, as the machine is unsuitable for this application. It has no RS232 or serial interface, which means that ordinary modems cannot be connected. It has a screen display of 32 columns by 24 lines, and Prestel requires a 40 by 24 display, as well as the complicated 'teletext' graphics system. The company produced an all-in-one unit designed specifically for this single task: the Prism VTX5000 modem.

The unit contains all the interfacing needed to connect with the Spectrum, a direct-connect 1,200/75 baud modem and software to access Prestel. This not only provides the standard functions for logging into the system, but also uses the Spectrum's graphics screen to imitate a true 40 by 24 teletext display. As a result, for £100, Spectrum users can buy all the hardware necessary to join Micronet.

The VTX5000 sits underneath the Spectrum and connects to its expansion connector. The ribbon cable between the two has a third socket so that other Spectrum peripherals, such as a printer or Microdrives, can be connected. This unit plugs directly into the phone system rather than using an acoustic coupler (in which the telephone handset is pushed into two rubber cups on the modem). This provides much more reliable communication.

To install the unit, you must have one of the 'new-style' phone jacks. All recently fitted phones



When you switch on the Spectrum, it automatically runs the Micronet software. This is stored in ROM inside the modem so it doesn't need to be loaded before use. The Micronet package is very similar to those provided on other micros, so once you've used it, you will have no trouble using it on a different machine. The software is controlled by a series of menus and is simple to learn and use.

The first option on the menu is to 'log-on', which means keying in the 10-digit identity number given to each Prestel user. This number will be remembered by the computer as long as its power is on and so has only to be entered once