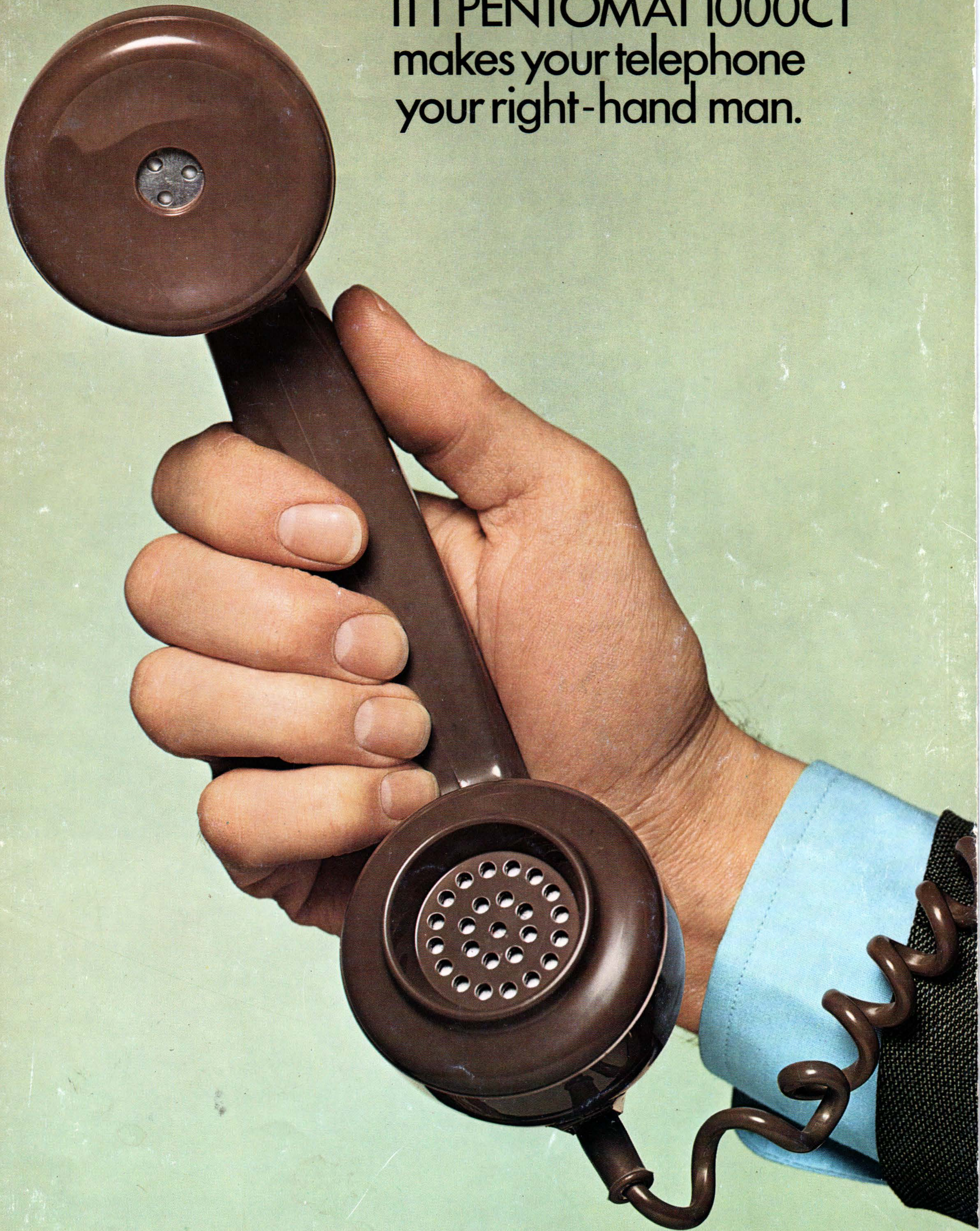


ITT PENTOMAT 1000CT  
makes your telephone  
your right-hand man.



ITT Business Systems **ITT**



# ITT Pentomat\*



\*Pentomat is a trade name of ITT.



Pentomat is more than just a conventional telephone system. By combining internal and external services it provides a link with, first, your office colleagues; second, the world outside; and third, if you wish, with your computer.

It's a system which starts by using the conventional telephone. But, by providing a wide range of special facilities, it goes on to extend its uses in

unconventional—and useful ways.

First and foremost, a phone on the Pentomat system extends your own capability. Right there in front of you, on your desk, is this link with clients, colleagues and computer. Efficient use of it brings immediate rewards in terms of time, trouble and money saved. What's more, the Pentomat system can grow with you. It readily allows you to extend your communication facilities as

they are needed.

The Pentomat exchange is compact, unobtrusive and easily installed and can be quite remote from the office scene.

Pentomat. The crossbar communications system chosen by more people than any other: for its efficiency, its reliability—and because it has the backing of ITT.

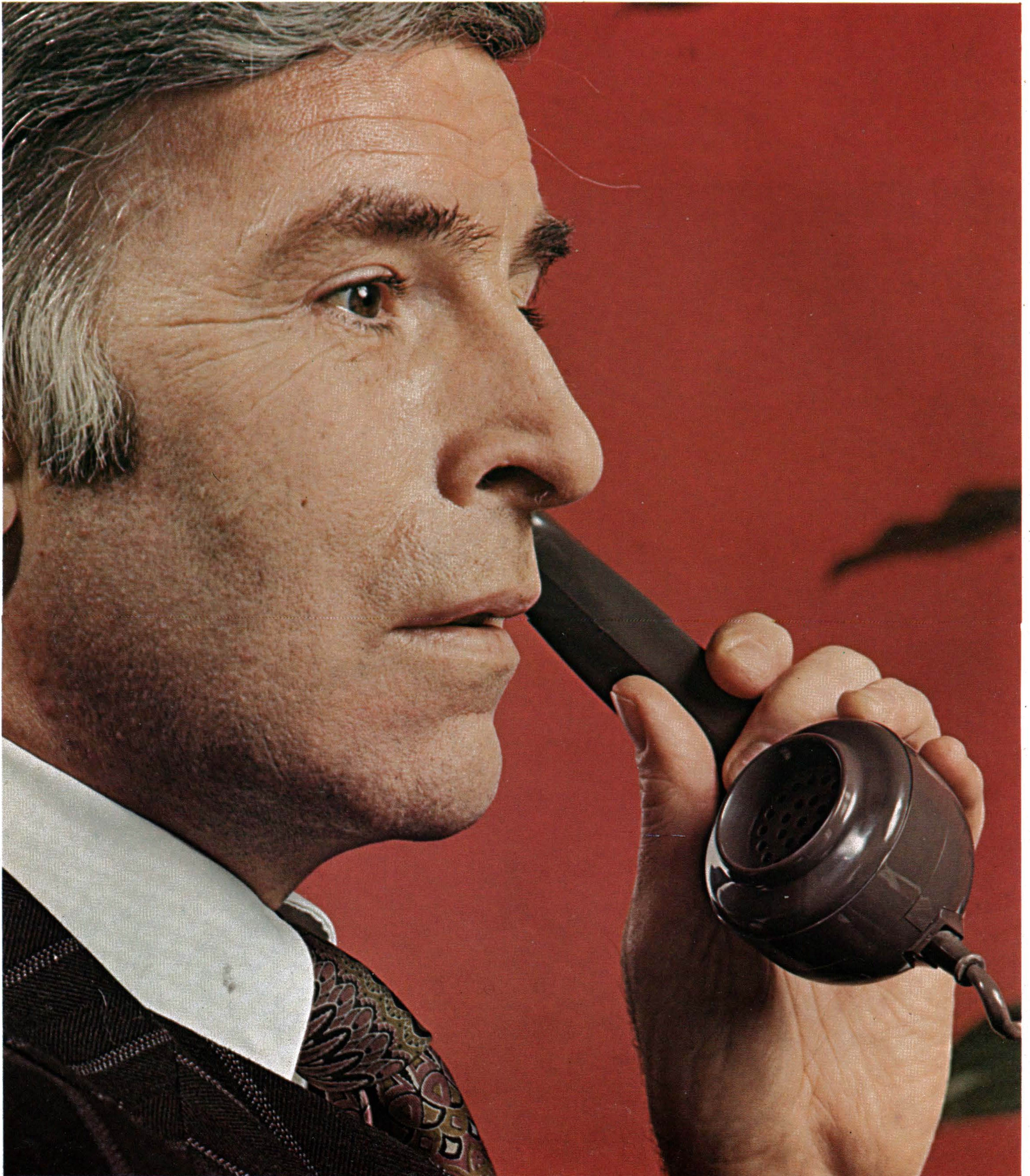




Pentomat 1000CT has  
these standard features  
to save time, money,  
trouble.

The Pentomat system gives you  
the kind of things you've always wished  
were a built-in facility of an ordinary  
telephone system, internal or external.

While on an outside call, you can  
use the same phone still maintaining the  
connection, to make an enquiry inside  
your office. A little button-pressing does





it for you. And you can transfer an outside call (following an enquiry), simply by replacing the handset. And—here's the saver—if you make a mistake in either of the operations, the call will automatically be re-introduced to the operator, making sure that the call is not 'lost'.

Another 'safety' device is the light which shows on the operator's panel when an extension user fails to replace the handset properly. Yet another device swings into action should the operator forget to switch to night lines: the exchange will automatically switch itself to night call.

Big savings can be made by linking up to four little-used extensions, in parallel.

How to tell the difference between an internal and external call with Pentomat? A distinctly different ring for each.





And these optional features save more money, time, trouble.

### Push-buttons

New, super-fast push-button telephones can be used instead of the conventional dial telephones. The system we use is the one which will eventually be used by the Post Office on their main exchanges.



### Automatic Call-Back

When there's an important call to be made to an engaged extension, the 'automatic call back' feature can be used. The calling extension will be rung immediately the line is clear.







### Intrusion

Certain executives, night watchman or fire officers can 'intrude' on an engaged extension, using a special warning tone. This will not apply if the called person is on an outside call or if he also has this facility. When the wanted extension replaces his receiver, the urgent call is automatically rung through.

### Group Hunting

A group hunting facility enables a pre-determined number to be dialled. If the line is engaged, the exchange will automatically connect the call to the first free extension in the group. All the extensions (except the one engaged) can make and receive normal calls.



### Automatic Message Registering

This is a facility which can be attached to any Pentomat system. AMR automatically monitors all outgoing and incoming calls. It records the originating extension number, the number called, the time, the date and the duration of the call. The data obtained facilitates the planning of communication systems. It makes for cost-effectiveness and reveals costly wastage.

### Rapid Call

The user can contact any one of 15 pre-selected extensions by pressing a single button.

### Short Code Dialling

If there are frequent calls to certain external telephone numbers, short code dialling is a useful time-saver. A three digit code prompts the exchange to pulse out the longer code.

### "Hullo - I'm somewhere else"

If you leave your office, your callers can be automatically switched to a pre-determined number. Paging systems (with personal beepers) can also be used with Pentomat.

### Centralised Dictation

Any Post Office approved dictation system can be used with the Pentomat.

### Emergency Facility

This allows up to four simultaneous calls to be made on a single circuit. Calls can be connected to the operator, emergency telephone or by direct line to a fire station - or to a combination of all three. The call can also be answered by the operator and then put through to the fire station.

### Misuse of Telephones

Another facility prevents the use of the system for private purposes - on external public network calls.

### Private lines: an extra saving in time and money

With your own line 'installed' between different branches of your organisation, you avoid using the public exchange. It can save you time - and a great deal of money. Your own lines are easily arranged through the Post Office on a rental basis.

At the same time, when it's desirable to link three or more separate locations by your own line, savings can be made by arranging for one PABX to connect through-calls between the other PABX's (either automatically or by the operator).

### STD Monitoring


An important cost saving facility - STD monitoring. All public exchange calls can be monitored to record the number of STD charging units involved during a call.



How your  
operator benefits.







First and foremost, Pentomat means ease of operation. Instead of the typical, bulky switchboard, there is a console no bigger than an office desk. With the Pentomat system, buttons take the place of switches, speed takes the place of delay - in fact, real efficiency takes the place of taken-for-granted efficiency.

In human terms, your operator will be glad to have the burden of her job eased and happy to be given the responsibility of operating smart, modern equipment.

Then again, the efficiency of the operator is greatly increased by the various standard facilities offered by Pentomat and even more so if you install these additional facilities.

## Confidential Calling

The operator can offer a call to an extension without the incoming caller overhearing, and may also offer an urgent call to an engaged extension by politely interrupting. She can also arrange for an engaged extension to ring automatically when it becomes free.

## Call Offering

When she is unable to answer immediately the operator is given a visual warning that a call is waiting. She can also monitor a call to see that it is correctly connected (warning pulses sound when she does this), and she can set up incoming calls in sequence so that they are automatically passed on when the line becomes free.



# Your operator has optional facilities, too.

## Push-button switching

For speedier service, the operator just presses buttons to cancel or release calls or to recall the public exchange operator.

## Exchange line busy

When the exchange line is busy the operator is warned by a supervision lamp. When more than one switchboard is employed, calls can be transferred from one to the other.

## Extension and city line identification

With this facility, the number of the extension calling or called by the operator automatically appears on an illuminated display board. In the same way, the operator can monitor the number she is dialling on an outgoing call.

# How to talk to a computer, as well as a colleague.

By incorporation of data interface equipment and use of a MF push-button telephone, Pentomat telephone extensions can become low-cost terminals for your own or a shared computer. This will communicate data directly to a computer, or it can be stored for later processing. Thus the benefits of a computer can be gradually extended throughout your organisation,

using telephones as input terminals.

A simple, effective and very economic system which makes the telephone handset an instrument of almost unlimited capability – and a system which can expand to meet increasing demands on your own computer usage or external computer services.



## Abbreviated dialling

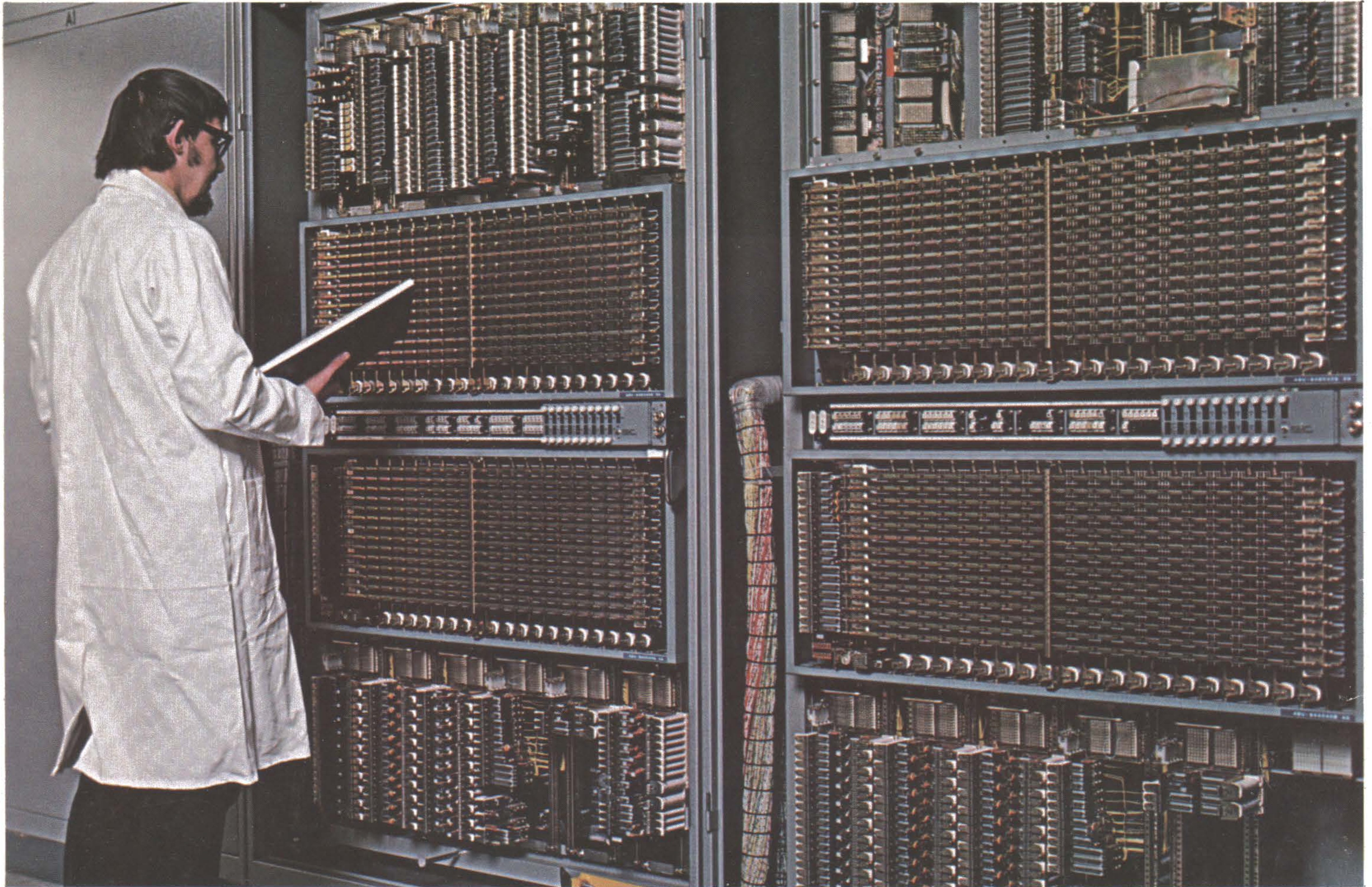
Equipment can be supplied, which enables the operator to key only three digits instead of up to seventeen, on particular often-used numbers.

## STD metering

This is a special facility for metering out-going public exchange calls, a light indicating when the call is completed.

## Operator-controlled conference

Up to 6 extensions can be connected to a conference circuit. The operator tells each person in turn when they are going to be put into the conference circuit.



## Technical Data.

### Ringling and tones

in line with normal Post Office practice.

### Power supply

provided by a battery and charger.

These are operated from 200-250V AC mains supply.

### Operational limits

50V DC variable 44-56V. Extension line loop resistance including telephone 1000 ohms.

Line leakage resistance 50,000 ohms.

### Cabinet sizes

Height	1965mm
Width	1200mm
Depth	400mm
Cable trough	250mm

Plinth	100mm
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Overall height of complete cabinet	2315mm
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Weight fully equipped	540kg
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Wall mounted ring, tone and alarm panel

Height	640mm
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Width	680mm
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Depth	320mm
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Operators floor standing console

Height	750mm (front)
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	795mm (back)
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Width	1320mm
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Depth	610mm
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**TELEPHONE, TELEPRINTER AND DATA COMMUNICATIONS SYSTEMS BY ITT**  
Internal and external telephone systems, teleprinters, data printers, data entry equipment,  
vdu's, controllers, modems, message switching equipment and control systems -  
for better business communications.

**ITT Business Systems** 