fibre to the home
Superfast Broadband
DIGITAL TV NETWORKS
CCTV
IPTV
DOOR ENTRY
ACCESS CONTROL
GATES & BARRIERS
FIRE PROTECTION
WARDEN CALL & RESPONSE
PERSONAL ATTACK
VOICE EVACUATION
PAGING
introduction

SCCI Alphatrack have been delivering TV and Satellite over fibre for a number of years with systems as large as the Barbican Estate in London (2000+ homes) using this method of distribution.

This method of TV system delivery is becoming more and more popular for both new build and replacements systems.

Another example of FTTH (Fibre To The Home) delivery is the Trellick Tower in Notting Hill. This is a FTTH refurbishment scheme for the Royal Borough of Kensington and Chelsea, serving some 220 homes with TV and multiple satellite services. The system is FTTH broadband enabled.

Nash Mills Wharf, Hemel Hempstead is an example of new build FTTH. Phase 1 is a new build development of over 150 apartments and houses which has utilised Fibre to the Home distribution to deliver TV and Satellite services from a single set of TV and Satellite antennas.

We have further developed the offering to include Fibre to the Home Broadband which can be delivered alongside the TV and Satellite utilising the same infrastructure.

The delivery and control of Door Entry, Access Control, Security, CCTV and Energy Control could also be incorporated onto a fibre network (thereby reducing cabling significantly both inside apartments and throughout a development).

This brochure concentrates on Fibre Broadband and specifically the benefits to house builders and developers, these benefits also stretch to the affordable housing sector where access to broadband is becoming a hot topic.
fibre optic broadband and it’s benefits

Fibre optic broadband is the future of high-speed internet. Just as ADSL broadband internet was an enormous step forward compared to the original 56k dial-up connections, fibre optic broadband has been a massive leap in the evolution of how we get online.

Standard ADSL broadband is limited to 24Mbps but fibre connections in the UK can provide users with lightning-fast speeds of up to 100Mbps.

Faster speeds and faster downloads mean that we can consume and share more information online than ever before.

As fibre optic broadband works by sending information as pulses of light through individual optical fibres, compared to ADSL which transmits down copper wires, fibre optics have less interference, keep the signal strength over much greater distances and operate at a higher frequency range. Higher frequency means greater bandwidth and greater bandwidth means faster connection speeds.

different types of fibre optic broadband

FTTC - Fibre to the Cabinet

In many cases in the UK, fibre optic cables only extend as far as the street (to large cabinets that sit on the pavement, linking your house to the exchange). Connections to the actual building are then standard copper wires. This is referred to as FTTC (Fibre-To-The-Cabinet).

FTTP - Fibre to the Premises

If there is a further fibre connection to the building itself, it is known as FTTP (Fibre-To-The-Premises), but in a shared building, internal wiring may mean that individual apartments still rely on copper wires to deliver that signal up to their home.

FTTH - Fibre to the Home

Fibre-To-The-Home means that there is a fast fibre connection all the way from the exchange to the customer’s front door/living room.

As you might expect, the ‘pure fibre’ FTTH and the ‘almost pure fibre’ FTTP are the fastest types of connection, but also the least supported.

The slower ‘hybrid fibre’ connection of FTTC makes up around 90 percent of all current fibre delivery, the future is FTTH.

making use of fibre delivery

- Delivery of TV and Satellite Service
- Delivery of Broadband Services
- Delivery and control of Door Entry/Access Control Services
- CCTV
- Web based energy monitoring
31% of people would accept 10Mbps as the minimum REAL speed in a new home.
80% of people said broadband is important to their home life

**superfast broadband**

Broadband speeds differ across the UK. ADSL services are quoted as up to 24mbps and newer FTTH services are up to 100mbps.

SCCI Alphatrack’s offer would be up to 100mbps symmetrical (both down and up load). All services would be under a fair use policy.
voice
An optional VoIP service can be provided along with the broadband. The service will be accessible by plugging a standard telephone into the RJ11 phone socket on the Optical Network Terminal (ONT).

Hosted Telephony from SCCI Alphatrack provides a business grade voice solution, giving full automation of all elements via our OSS/BSS layer, accessed via our multi hierarchical portal. Key functions of which are:

- Service creation
- Order management
- Provisioning
- Billing
- Asset management
- Trouble ticketing
- Reporting

Standard User Pack
A collection of features and functionality designed to address the needs of the majority of users and including all of the commonly requested features for a standard IP feature phone user. This card includes the following features:

- Call Forwarding Always
- Call Forwarding Busy
- Call Forwarding No Answer
- Call Forwarding Not Reachable
- Do Not Disturb
- Last Number Redial
- Three-Way Call

Additional Items at Cost

- Call Line Identification
- Voicemail
- Bundled minutes

Typical Business/Operational Support System
57% of people said they would pay more for a house with superfast broadband.
Every home built today should have data cabling (Cat 6 recommended) installed. The amount of hardwired phones and faxes in the home is dropping dramatically. Even more dramatic is the increase of network devices being released in the market and appearing in the home.

A home once had one desktop PC. Now it is common for a home to have multiple PCs and or laptops, Smart TVs, TV on demand devices, network enabled gaming consoles, internet enabled phones (VOIP), network printers and more. Media streaming devices and media centre PCs are designed to plug into your TV/Theatre and give you access to your digitally stored movies, music and photos.

To utilise these types of products you require a high speed data network integrated with high grade television cabling to industry-recognised standards. Conventional phone cabling or wireless networks cannot effectively deal with the amount of high speed applications that are now required in the home.

The home now needs significantly more internet speed than the office. Entertainment requires speed and integrity of signal. Wireless is not sufficient, especially when multiple applications are occurring simultaneously. High definition video, surround sound and gaming applications in particular require more speed.

VOIP (Voice over internet) style phones and services are quickly taking over from conventional phones. A Smart Wiring network is the most effective way to have VOIP services in the home, allowing multiple calls simultaneously.

CAT 6 Data cable can be used for conventional phones as well as networking/VOIP. Conventional phone cabling cannot be used for networking as it is severely limited.
the future of fibre optic broadband

Thanks to fibre optic broadband, the future of the internet is both bright and speedy.

Fibre optic wires are minuscule strands made of plastic or glass which are designed to carry virtual information at very high speeds. In fact, a fibre wire is thinner than a single human hair.

There are three fibre optic broadband types available in the UK: FTTC - which stands for fibre to the cabinet, FTTP - fibre to the premises & FTTH - fibre to the home.

- The future of Fibre Broadband lies with Fibre to the Home (FTTH) - fibre all the way to the user.
- Available speeds will continue to rise and become more cost effectively available.
- Fibre to the home (FTTH) is the only delivery method that will be able to cope with the increased speed.
- FTTC offers between 25Mbps to 75Mbps.
- FTTH offers speeds of 100Mbps+ as and when this speed becomes available.

The future of fibre optic broadband is available now!

conclusion

If you need to provide the most up to date satellite and broadband delivery to your clients, look no further as SCCI Alphatrack has the capability and expertise to plan, install and deliver a future proof system with the ability to expand when required.