

Closed Access Provision...

Traditionally in a block of residential apartments: Telephony, Internet, Terrestrial Television, and Satellite Television have all been the responsibility of the tenant and his/her choice of provider. This has necessitated different cables, sometimes multiple cables, being brought through the buildings to each apartment. Not only does the Building Management Company have to provide access, but does not get any income from such provision.

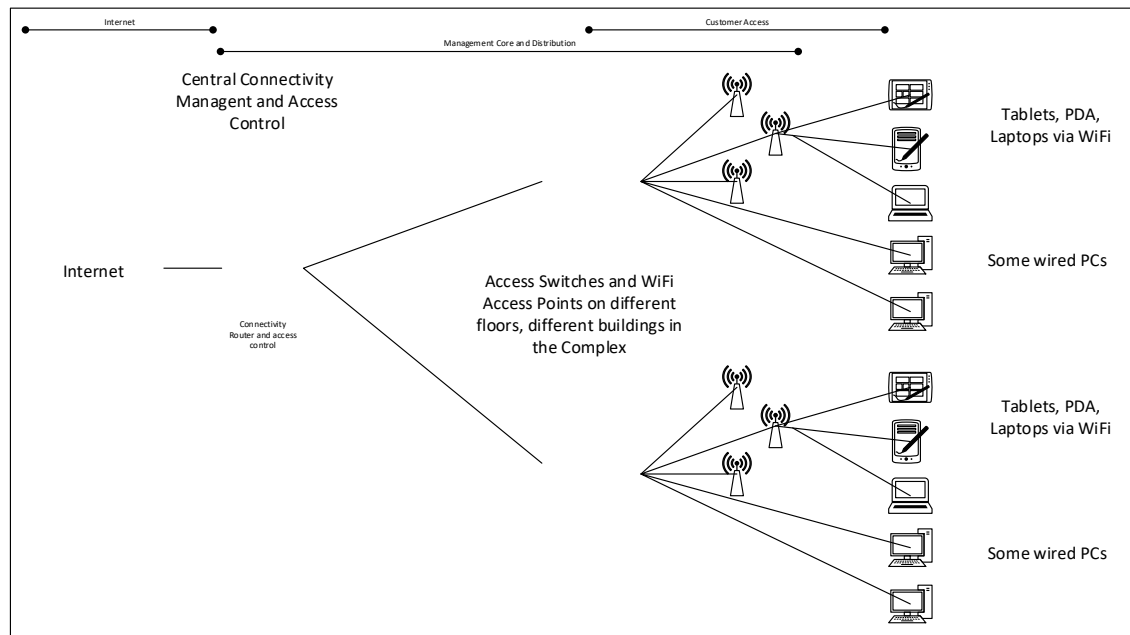
Over time, Centralised Terrestrial Television infrastructure was provisioned to reduce the number of aerials and cabling – and a small increase in Building Management Charge to provide such service. Then came some central Satellite provisions to reduce the number of satellite dishes on the building...

The next step has been to provide Internet to the Apartments as part of the Building Management Charge. This has been in the form of wired (plug in your computer) to Wi-Fi in each apartment, and in the common building/recreational areas. This Internet Access is controlled usually with tiers of access – from guest (slow and not much per day) to premium (very fast and lots of bandwidth per day).

This is what we call a Closed Access Infrastructure.

The Thin Model

This first generation model or thin model for Closed Access Infrastructure simply shares an Internet Provision across the Infrastructure with user access and accounting controls:



Providing Internet connectivity to an Apartment Complex – Thin Model

This Thin Model requires that you need to provision enough Internet such that all your clients have a good user experience.

This has led to continuous ongoing revenue to the Building Management Company in providing the Internet to the End User.

However, as more and more end users change their Television and Radio/Audio habits, from the Terrestrial Television and Radio towards Internet services (iPlayer, 4OD, Netflix, Spotify etc.), the demand on the Internet Connectivity becomes stressed – often to the point of decreasing the user experience.

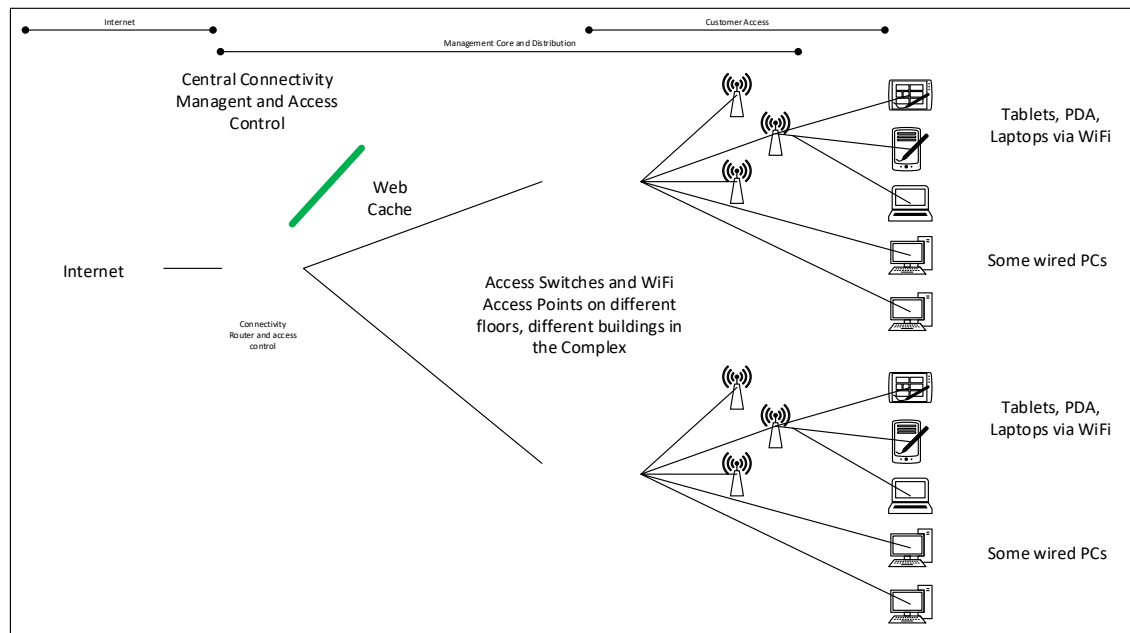
frequently visited web content to be seen once and delivered multiple times. However, some services like Netflix require their own caching servers.

Caching can be expensive, and is only of real cost benefit when there is a very large customer base.

Caching Model

The Introduction of Cache Servers – allows non live Television and Audio, as well as other

Caching does not work well with live content.



Providing Internet connectivity to an Apartment Complex – Cache Model

The Local Media Injection

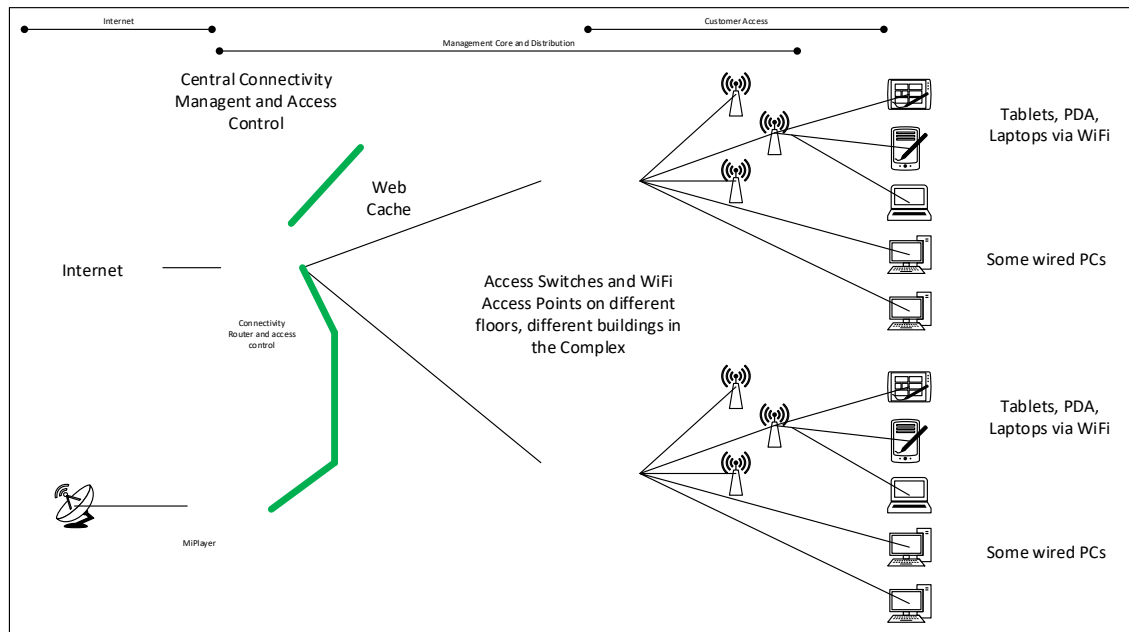
BFBS Media Innovation have solved this problem with the MiPlayer – this scalable solution takes satellite and or terrestrial Television and Radio and delivers this locally on the Closed Access Network. This immediately relieves the stress of watching Live Television and Radio over the Internet Provision.

Combine this with the catch up feature on the MiPlayer, and end users can watch or listen to

any programme in the last seven days without using any Internet bandwidth.

Additional MiPlayer Local Media Servers can provide local media to the Closed Access Audience – delivering local news, training, health and safety briefings, as well as CCTV/Web Cam footage.

Local Media Server delivery also improves the End User Experience as the media is close and can be delivered quickly and with very low latency.



Providing Internet connectivity to an Apartment Complex – Cache with MiPlayer Model

Summary

The BFBS Media Innovation MiPlayer can deliver ongoing Internet Bandwidth Cost savings as well as an improved User Experience.

This delivers better revenue growth potential whilst lowering the increased demands on the Internet Connectivity.

This product is available now for installation.

Notes

There may be local licensing or rights acquisitions required to deliver live and or catch up.

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