YouView: The Future of TV
From concept to consumer, through high performance delivery

High performance. Delivered.

accenture
YouView launched to the British public in the summer of 2012 with the stated goal of bringing ‘extraordinary TV for everyone’. It is set to become the new way to watch TV for millions of people who don’t want to pay a subscription. It is also seen by many as the evolution of existing free-to-air digital TV in the UK. But it’s much more; nothing short, in fact, of the future of television and the beginning of an industry transformation.

What is YouView?

The consumer proposition
How will YouView have such an impact?
The company sums up its own consumer proposition as “the best bits of 21st Century TV, without having to grapple with any complicated technology”.
Put simply, YouView provides consumers with an easy to use set-top box that gives them an internet TV service, combining the UK’s digital free-to-air channels with on-demand content in a seamless experience, delivered without a subscription, via a single consistent and intuitive user interface.

The application platform
While consumer feedback on the user interface has been extremely positive, what really powers the YouView proposition happens behind the screen. YouView delivers an application platform that offers consumers access to a vast range of content options. For example, if the box is connected to a broadband line from a partner ISP, then an application providing that ISP’s IPTV service will appear automatically.

As the number of content sources in the ecosystem grows, YouView’s attractiveness to both consumers and to potential new content, device and service providers will continue to increase. At launch, over 140 content providers had entered the enrolment process to add their content to the YouView platform.
The ecosystem

YouView’s unique blend of a compelling consumer proposition, application platform and content discovery platform positions it at the centre of a new and fast-expanding TV ecosystem. YouView’s disruptive impact on the industry lies in its ability to bring together content providers, broadcasters, ISPs, advertisers, set-top box manufacturers and many other technology enablers in a unified and open ecosystem with YouView at its heart; thus supporting the redefinition of the TV business model.

Content discovery platform

One of the key innovations that really makes YouView such a landmark development in TV is the content discovery platform that sits at the heart of its operations. Crucially, all content from the YouView content providers is referenced in a central consolidated catalogue, rather than siloed within individual partner services and applications. This central catalogue allows YouView to deliver seamless integration of live TV, recorded TV, and OnDemand as well as unique features such as global search, browse by popularity across content providers, and a backwards electronic programme guide (EPG) — allowing users to conveniently catch up on programmes shown in the past seven days. The commercial opportunities that this opens up are even more exciting, facilitating a range of new consumer services such as content promotion, recommendations and targeting.

Figure 3 YouView Guide: YouView integrates broadcast and on-demand to deliver a guide that provides access to catch-up content from the last 7 days.

Figure 4 YouView Search: The content discovery platform enables unique features such as global content search—across the full catalogue of YouView content.
YouView is a vision that’s based on a strong understanding of the consumer’s behaviour today in relation to linear TV; the transition to on-demand, and what that means; the importance of simplicity; the difference between free and pay; and the fundamentally critical aspect of having a tremendous range of content available to consumers. It’s a long journey...with the partners we have, we feel very confident about our ability to deliver.

Richard Halton, CEO, YouView

The business challenges

Where YouView started

In less than four years, YouView has undergone an astonishing transformation in a rapidly changing marketplace, progressing from its roots in research and development to a collaborative multi-partner consortium as ‘Project Canvas’, and then on to a fully-fledged independent company.

YouView’s brand launch in September 2010 fired the starting-gun on a period of headlong expansion and transformation, which has seen the company evolve rapidly while developing a complex and sophisticated delivery ecosystem, a process that has required the precise integration of a wide range of partners and third parties.

There can be few better examples anywhere in the TV and communications industry of leading players collaborating around a ‘big idea’ R&D project in order to deliver a product to the consumer as well as a new set of services into a dynamic and evolving industry.

Organisational complexity

YouView today is an autonomous company formed from a consortium of seven partners, including the UK’s main terrestrial broadcasters (BBC, ITV, Channel 4 and Channel 5), two ISPs (BT and TalkTalk), and a network services provider, Arqiva. YouView has not been created to generate profits in its own right, but rather to be the heart of a commercial ecosystem. To achieve this goal it has established itself as a separate business from its consortium partners.

The complexity of creating this new type of business was reflected by the rapid growth in its internal headcount and external partnerships. Having started with a workforce consisting of a handful of talented BBC broadcast engineers, YouView now has a global pool of specialists, together with its own values, management structures and governance, all housed under one roof. The seven consortium members are now both shareholders in the new business and service providers on the platform.

Additionally, relationships with a multiplicity of third parties have had to be negotiated and formalised, for example, working closely with a range of device and chip manufacturers, technology enablers, content partners and ISPs.

Technical complexity

Alongside moulding and shaping an organisation that has multiple partners and contributing third parties, developing the technical platform for YouView presented a need to manage, align and integrate a series of highly complex and interdependent initiatives and technologies. To deliver its vision, YouView must work on a multitude of different technology devices, and integrate and operate with platforms from content providers and ISPs. That’s in addition to being able to accommodate new content and technology partners as the service evolves. All this has involved ensuring that many different parallel strands of activity are progressing effectively together throughout development, into delivery and beyond in operations.

Designing and delivering a technology platform in a multi-partner, multi-technology ecosystem with so many different ‘moving parts’ was a formidable task. The drive to make things as simple as possible for consumers has thrown up countless new and complex problems to solve along the way. Overcoming these problems has demanded a wide range of industry, technical and operational capabilities that Accenture has been able to provide.
As the YouView programme has progressed, Accenture has played an increasingly key and extensive role as a partner on our journey. They've brought exceptional technology and industry insights, with the right blend of skills to transform and augment our delivery capabilities—essential to what we've achieved: a successful launch of an innovative service.

Greg McCall, Launch Director, YouView

How Accenture helped

The opportunity to facilitate the creation of a whole new business, especially one that will redefine an entire industry, is an exciting challenge. That is precisely what Accenture was able to do with YouView, working as a key partner to drive the product through from concept to launch, delivering an operating model, and helping to create a capability to evolve the platform post-launch.

As YouView transformed from an R&D focused organisation to a fully-fledged delivery organisation, Accenture was asked to play an increasingly central role in the realisation of YouView’s delivery vision. While YouView developed its own specialist and skilled team, it turned to Accenture to help shape and drive forward the programme to launch. Accenture’s responsibilities grew to overall technology delivery management, delivery of the content discovery platform, platform and ecosystem testing, content partner integration, and device manufacturer engagement. Accenture’s experience of taking a concept from innovation to reality was tested to the limit in effectively driving this entire ecosystem to a successful delivery outcome under immense market pressures.
Integrating an industry

Delivering YouView involved turning an R&D initiative among a consortium of partners into an integration machine for an entire industry made up of diverse, complementary and sometimes competing companies. This raised the challenge of driving large-scale technology and operational integration in a complex, multi-company environment.

One of the first issues that Accenture addressed in the early stages of the engagement was the need to align multiple strands of technical activity and accommodate a broad range of views and interests. By putting in place common delivery practices, governance, controls and organisational structures, the Accenture team supported the creation of a new type of delivery engine: an engine to power this new and autonomous business and a new TV ecosystem for the UK.

A further challenge in a pioneering environment like YouView is that nothing can be taken for granted. In other words, if it hasn’t been tested, it doesn’t work. Industrial strength end-to-end testing played a crucial role in the process of bringing together all of the different contributions to YouView. Accenture combined deep technical and industry knowledge with many years of testing experience to deliver processes and methodologies that enable consistent, reliable and measurable product delivery (see information panel overleaf).

Accenture’s ability to simulate each of the components of the YouView ecosystem enabled early integration, proactive identification of issues and, crucially, allowed every player to drive delivery forward without being constrained by other parts of the ecosystem. The result? Reduced dependencies, better quality and improved speed to market.

As Sef Tuma, Accenture’s Engagement Senior Executive and Overall Technical Delivery Lead for YouView, comments: “YouView is upping the whole industry’s game. Our work with YouView and its various partners is creating a springboard for the future of television, opening up an ecosystem that will drive additional innovation and create new types of products that consumers are going to want.”

Figure 5
A schematic of the YouView TV ecosystem
Driving delivery

Another impact of the project’s multi-organisation nature was the need for decoupled yet aligned delivery, encompassing a wide array of resources, delivery methodologies and partners from across the industry. It was particularly critical for the YouView programme to collaborate closely with content providers, which Accenture enabled by listening, understanding and responding to their views and requirements. Experience and understanding of industry dynamics and technology concepts enabled the Accenture team to work with such stakeholders to manage their integration and to guide their developers.

To drive the successful delivery of YouView, Accenture drew on a deep pool of technology skills; bringing over 100 global subject matter specialists together by leveraging technology and local industry knowledge from the UK, video and IPTV skills from the US and Italy, embedded software engineering and testing capabilities from Latvia, and infrastructure and application support and development from India.

Technology innovation

Delivering simplicity to the consumer is a complicated business, especially when it requires the integration of many independent platforms and diverse technologies. YouView brings together IP and broadcast television technologies in an open, standards-based consumer device in a way that has never been attempted before anywhere in the world; in doing so creating wholly new technological challenges and opportunities.

These challenges included the need to support the development of a new type of set-top box. To do this, Accenture worked closely with several of YouView’s partner manufacturers, including close collaboration with Humax on the development and integration of the first YouView device.

Accenture also worked with YouView to develop a new way of delivering software on consumer devices, integrating third-party apps and content with the content discovery platform. Accenture’s digital, video and IPTV skills and expertise were critical to the development and delivery of this platform that acts as the ‘brain’ at the centre of the YouView ecosystem. This involved organising and delivering the metadata and business intelligence services that enable on-demand, EPG, search, and reporting capabilities.

Accenture was able to apply unrivalled expertise in web, digital media and content management systems, as well as cloud capabilities, to create and run the engine that makes YouView such a compelling consumer proposition.

And because YouView is an ecosystem that must easily expand to accommodate new content and technology partners, Accenture had to create a new, open platform built on a set of published industry standards and specifications—underpinned by a strong service culture to help progress partner development as the launch platform matured. In many ways the opposite of the ‘walled garden’ or manufacturer-specific approaches that are common in many other digital TV initiatives.

Accenture brought to bear world-class knowledge of embedded software development, digital media delivery systems, content management and aggregation and business intelligence concepts applied to this evolving and convergent space.

Testing: a key driver of quality and integration

Throughout the technology design and development process, testing has been crucial in meeting YouView’s commitment to a quality product and a well-functioning integrated ecosystem. Accenture’s testing activities included:

- A test suite of over 8,000 test cases—to validate the platform end to end.
- The deployment of test automation to reduce effort and improve efficiency.
- Approximately one man-year of effort for each test run.
- 40 end-to-end runs of the full suite
...resulting in almost a quarter of a million test cases executed
At a glance:
Accenture's roles at YouView

How Accenture helped
- Overall technology delivery management
- Delivery of the content discovery platform
- End-to-end testing of the YouView platform and ecosystem
- Content partner onboarding and integration
- Content developer support
- Device manufacturer engagement and integration

A global team of industry specialists
- **UK**: Technology and local industry knowledge
- **Italy & US**: Video and IPTV skills
- **Latvia**: Embedded software engineering and testing
- **India**: Infrastructure and application support and development

Bringing the best of Accenture to the best of TV
- Systems integration and delivery management best practice
- Cutting edge innovation in online video and IPTV
- Deep understanding of the digital ecosystem
- Ability to work with multiple partners to deliver highly complex system integration
- Cloud-based technologies
- World-class knowledge of metadata integration and media measurement
Today, YouView is on retail sale and has been trialled in over 2,000 homes and the feedback is encouraging. YouView is committed to providing the very best content and we've had over 140 potential content providers already enter the enrollment process. It confirms that YouView is easy to set up and use and different from what has gone before...YouView is set to evolve quickly and we look forward to working with new content partners and developing more functionality as boxes roll out into UK homes.

Richard Halton, CEO, YouView

High Performance Delivered

At the time of launch, Accenture's successful delivery for YouView was exemplified through three early indicators of success.

The first: overwhelmingly positive feedback from 2,500 consumers during the Beta testing phase.

The second: building momentum and confidence from the media and industry analysts. Leading industry analysts hailed YouView as the transformational vehicle that IPTV in the UK has been waiting for, helping to drive the industry rapidly forward.1 The consumer electronics press has been equally enthusiastic, with many awarding the product five-star reviews describing YouView as “Simply the best EPG of any Freeview HD PVR, a responsive box and neatly integrated on-demand TV”2 and “a breath of fresh air in the PVR market. The user interface is smart in every sense, and overall performance is high. This is 21st century TV done right.”3

And the third, and most important, was the initial reaction from customers, and a surge of retail demand. In the first weekend after YouView launched it was already available in all of the major retailers and many independent stores.

Major national department store John Lewis led the charge. With the prime-time launch and product reveal taking place in its flagship London store, John Lewis put YouView at the centre of the retail limelight in Summer 2012.

With the product successfully launched, Accenture continues to work closely with YouView to drive forward development and rollout of the new service. That includes running the content discovery platform through to 2014 and supporting YouView with development and testing services to deliver exciting and innovative new features of a product roadmap designed to keep pushing YouView forward at pace, securing its industry lead at the forefront of connected TV in the UK.

What next for YouView?

YouView’s exciting impact will continue to ripple through the industry, as it creates a new model for television with more scale, more choice, and more ways for all of the participants to generate value. It’s equally exciting for consumers, who will see more and more providers competing for their attention within the same ecosystem, driving new devices, services and delivery models.

Key to YouView’s success will be how attractive it is to future content partners and here the signs are extremely encouraging, with over 140 potential content providers already having entered the enrolment process. At the same time, growing numbers of ISPs are seeking to offer bundled services with YouView.

Their initiatives will create more choice by offering a variety of price points that will help to drive consumer engagement and ultimately product take-up.

In addition, the YouView platform has been designed to be easily updated so that it provides consumers with new, enticing features over time — features that Accenture is excited to continue to help YouView deliver.

All of these indicators point to the successful creation of what the founders envisioned: an open, accessible ecosystem for any content provider to reach its customers via any ISP and using any manufacturer’s consumer device. Amid an increasingly competitive landscape for internet services on TV — an area being targeted by large parts of the consumer electronics and ISP communities — YouView, now widely perceived as a high performance television delivery organisation, is uniquely positioned to provide the unifying ecosystem to trigger critical mass take-up. Accenture is proud to have played an instrumental role in making this happen.

1 Source: Enders Analysis report 2012-069.
2 http://www.expertreviews.co.uk/pvrs/1293643/humax-youview-dtr-t1000
3 http://www.techradar.com/reviews/audio-visual/digital-tv-recorders/humax-dtr-t1000-1090466/review
About Accenture Digital Services

Accenture Digital Services is designed to deliver value from digital content in a complex environment. It engages digital consumers with unique, personalized interactive experiences—on a massive scale. It supports a mix of business models to drive new revenue streams and find new ways to monetize content. It distributes digital content in any format, across all platforms, to any device. And it optimizes operating models, delivering next-generation solutions on a pay-as-you-grow basis—all to help clients thrive in a changing digital ecosystem.

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About Accenture

We are one of the world’s leading organizations providing management consulting, technology and outsourcing services, with more than 323,000 employees; offices and operations in more than 200 cities in 56 countries; and net revenues of $30.0 billion for fiscal 2014.

Our four growth platforms—Accenture Strategy, Accenture Digital, Accenture Technology, Accenture Operations—are the innovation engines through which we build world-class skills and capabilities; develop knowledge capital; and create, acquire and manage key assets central to the development of integrated services and solutions for our clients.