

Session 4 - Business Models for OTT

2019

Delhi, India

Dr AMAL Punchihewa

Distinguished Lecturer of IEEE Broadcast Technology Society



Business Models for OTT

Dr Amal Punchihewa

PhD, MEEng, BSC(Eng)Hons, CEng, FIET, FEngNZ, SMIEEE, MSLAAS, MCS
Postgraduate Studies in Business Administration

Distinguished Lecturer of IEEE Broadcast Technology Society

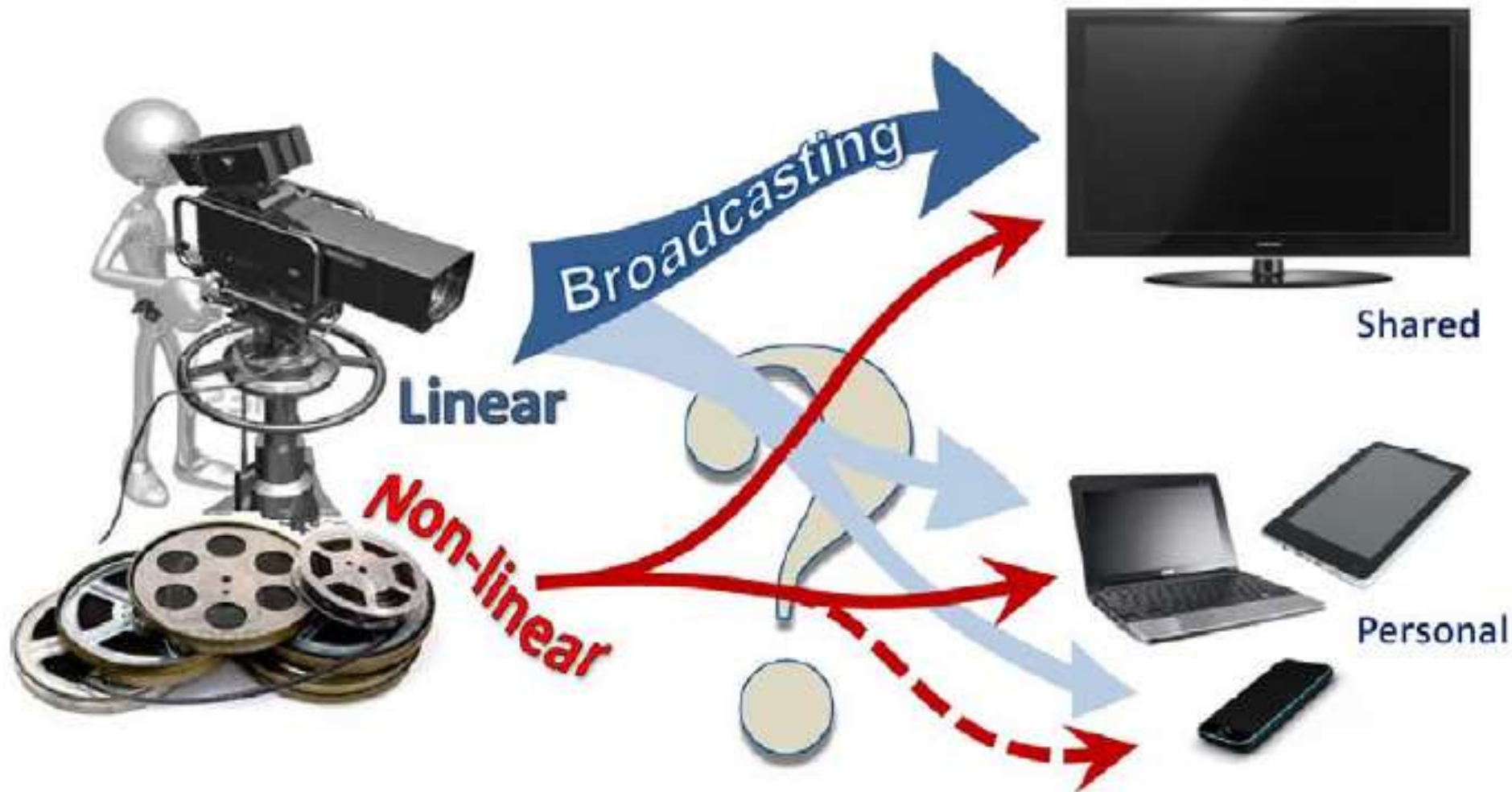
Outline

- Where are you?
- What is IPTV?
- What is OTT?
- What is IBB?
- Why they are important today?
- How to navigate?

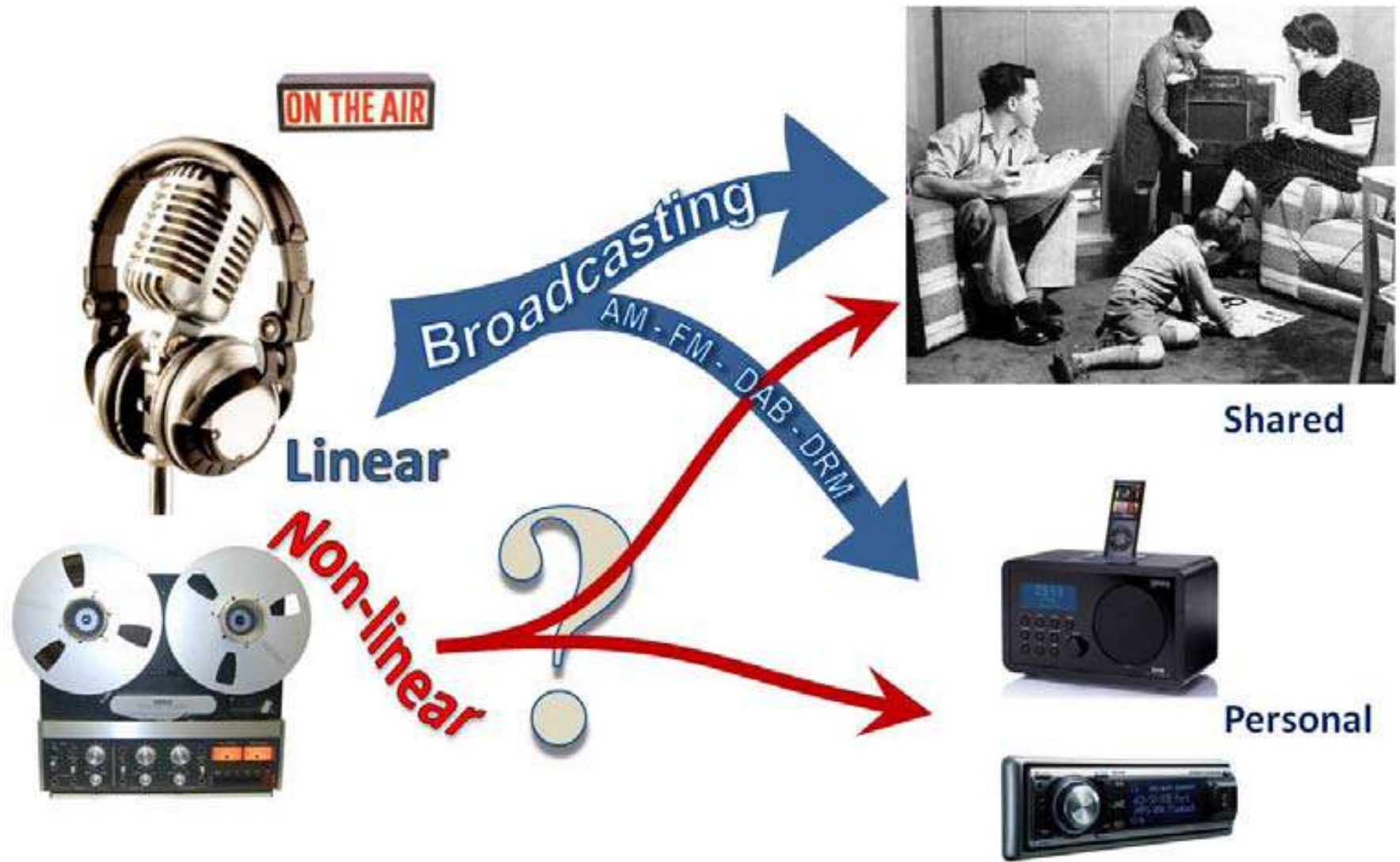
What are you? and Where are you?

- ATV
- DTV
- OTT
- IPTV

How to deliver linear & non-linear TV content



How to deliver linear & non-linear Radio content



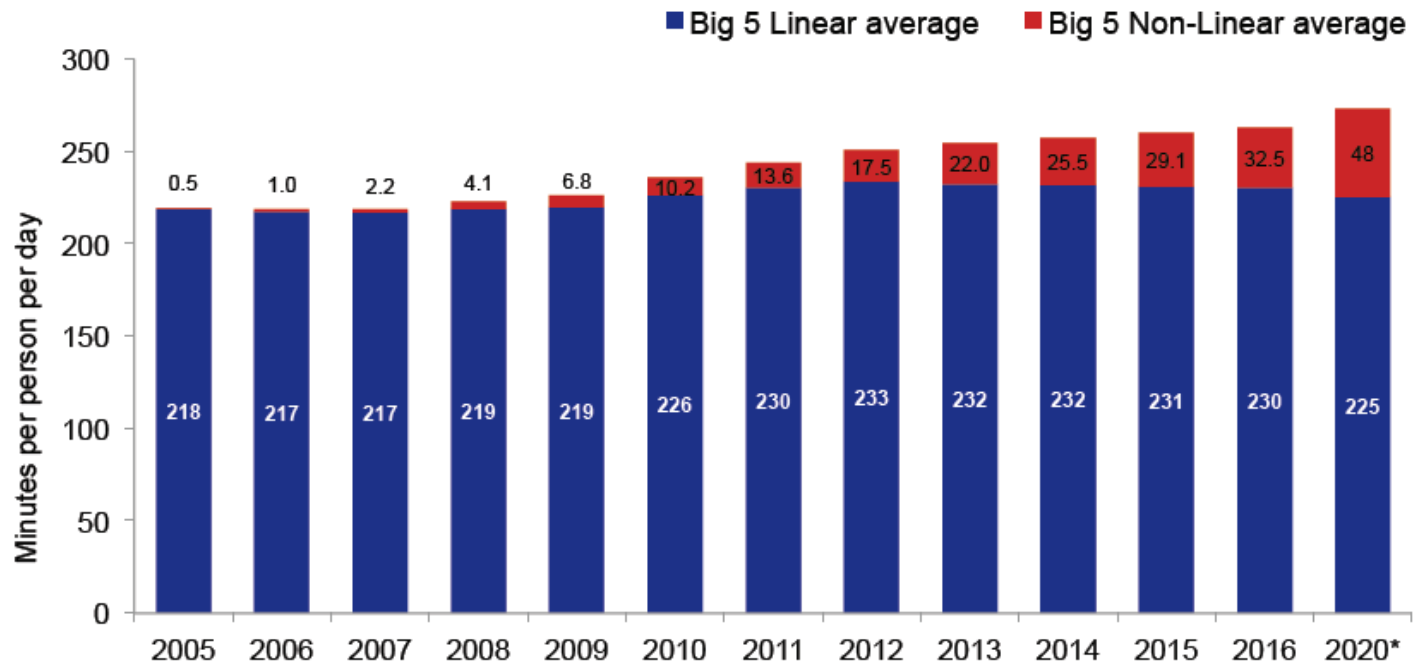
Linear TV audience

- Linear TV audience is growing all around the world

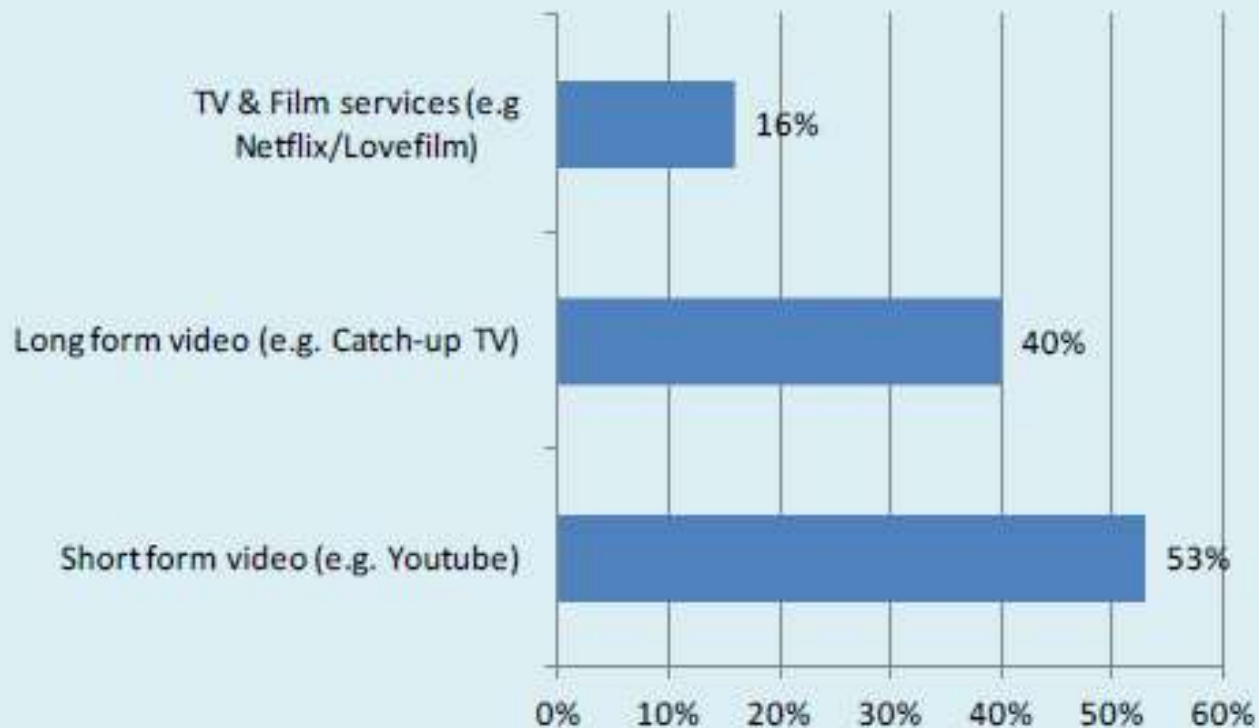
[Source: IHS – ScreenDigest]

- Cross-platform Television Viewing Time FY 2012

Note: Forecast from 2012 // * 2020 forecast by EBU. Non-Linear includes DVR



Type of VOD Services Consumed



Source: Ofcom, 2013 (adapted)

IPTV

- Multimedia services such as television, video, audio, text, graphics, and other data delivered over IP based networks managed to provide the required level of Quality of Service/Quality of Experience (QoS/QoE), security, interactivity and reliability [ITU]

Classification

	Video service with managed QoS	Video service with unmanaged QoS
(Semi interactive) traditional broadcast networks	Traditional 1 	
(Interactive) integrated networks	Wired IBB 2 	OTT
	Wireless IBB 3 	OTT - wireless
(Fully interactive) duplex networks	4 IPTV	5 OTT 6 Wireless OTT
	7 Internet TV	

Copyright Reserved
 Adapted from ITU
 © Amal

What is OTT?

- Over the Top are the audio-visual services delivered over **broadband and the Internet**
- OTT are over unmanaged networks
- As there is a return channel, full interaction is possible.



What is Over the Top?

- OTT is delivered directly from provider to viewer using an open internet/broadband connection, independently of the viewer's ISP, without the need for carriage negotiations and without any infrastructure investment on the part of the provider
- It is a '**best effort**', unmanaged method of content delivery via **the Internet** that suits providers who are primarily broadcasters rather than ISPs

Business Models for OTT

- Subscription
- Transaction - PPV
- Advertising

- OTT can be either/both Live and On-demand

- sVoD
- TVoD
- AVOD

- Future will be Target advertising

IBB Integrated Broadcast Broadband

- With the availability of **devices connected to broadband** gives viewers option to access additional content
- Almost all the traditional broadcasters are currently offering their viewers to access some selected content as **catch up** or **additional contents** related to the lined up programmes via broadband networks
- There are number of systems that can operate in **hybrid** configuration
- The most of these systems have explored ICT- Information and Communication technologies to build such system

Therefore IBB

- IBB – Integrated Broadcast-Broadband
- Recent advancement of broadband technologies enable
 - High speed delivery
 - Server side processing
 - Inter-device communication

tonton

The screenshot shows the tonton.com.my website interface. At the top, there are navigation links for 'Login' and 'Register', a search bar, and a 'By Title' dropdown menu. The main header features the 'tonton' logo and a sidebar menu with categories: Channels, Shows, Movies, Schedule, Premium, Live TV, News, and tonton Music. The featured content is the show 'Kerana Terpaksa Aku Relakan', displayed with a large title and a background image of a woman in a pink hijab and a man in a suit. A 'VIEW SHOW' button is visible. Below the main header, there are tabs for 'Most Popular', 'Latest Videos', and 'Featured Playlist'. The 'Most Popular' tab is active, showing a grid of video thumbnails. The first thumbnail is for 'Kerana Terpaksa Aku Relakan Episode 22'. Other thumbnails include 'Derhaka Seorang Madu Episode 8', 'Ramadan Jangan Pergi Episode 4', 'Cerita Cinta Kita Episode 9', and 'Azam Ramadan Su Episode 8'. Each thumbnail has a play button icon and a heart icon. The page number 'Page 1 of 13' is visible at the bottom left of the video grid.

Toggle from MediaCorp Singapore

The screenshot shows the Toggle website interface. At the top, there is a navigation menu with links for Channels, Catch-Up TV, Series, Movies, KidsZone, and Celebs. To the right of the menu are links for Sign In and Sign Up. Below the navigation is a search bar with the text "Look for shows, channels and cast" and a magnifying glass icon. The main content area features a large banner for "Project Superstar 2014" with the text "TOGGLE LIVE, 1 SEP 8.00PM" and a promotional message: "Are you ready for the battle of the girls tonight? Be sure to watch the Live simulcast from Channel U on Toggle Live!". Below the banner is a "Most Popular" section displaying five show thumbnails: "Blessings (Catch-Up)" with a 4.5 rating, "Here Comes Mr Oh ..." with a 4.5 rating, "The First Myth ..." with a 4.5 rating, "The Voice of China ..." with a 4.6 rating, and "Spice Up (Catch-Up)" with a 4.3 rating.

Classification

	Video service with managed QoS	Video service with unmanaged QoS
(Semi interactive) traditional broadcast networks	<p>Traditional 1</p>	
(Interactive) integrated networks	<p>Wired IBB 2</p>	OTT
	<p>Wireless IBB 3</p>	OTT - wireless
(Fully interactive) duplex networks	<p>4</p> <p>IPTV</p>	<p>5</p> <p>Internet TV</p> <p>6</p> <p>OTT</p> <p>Wireless OTT</p>

Copyright Reserved
Adapted from ITU
© Amal

Interactivity

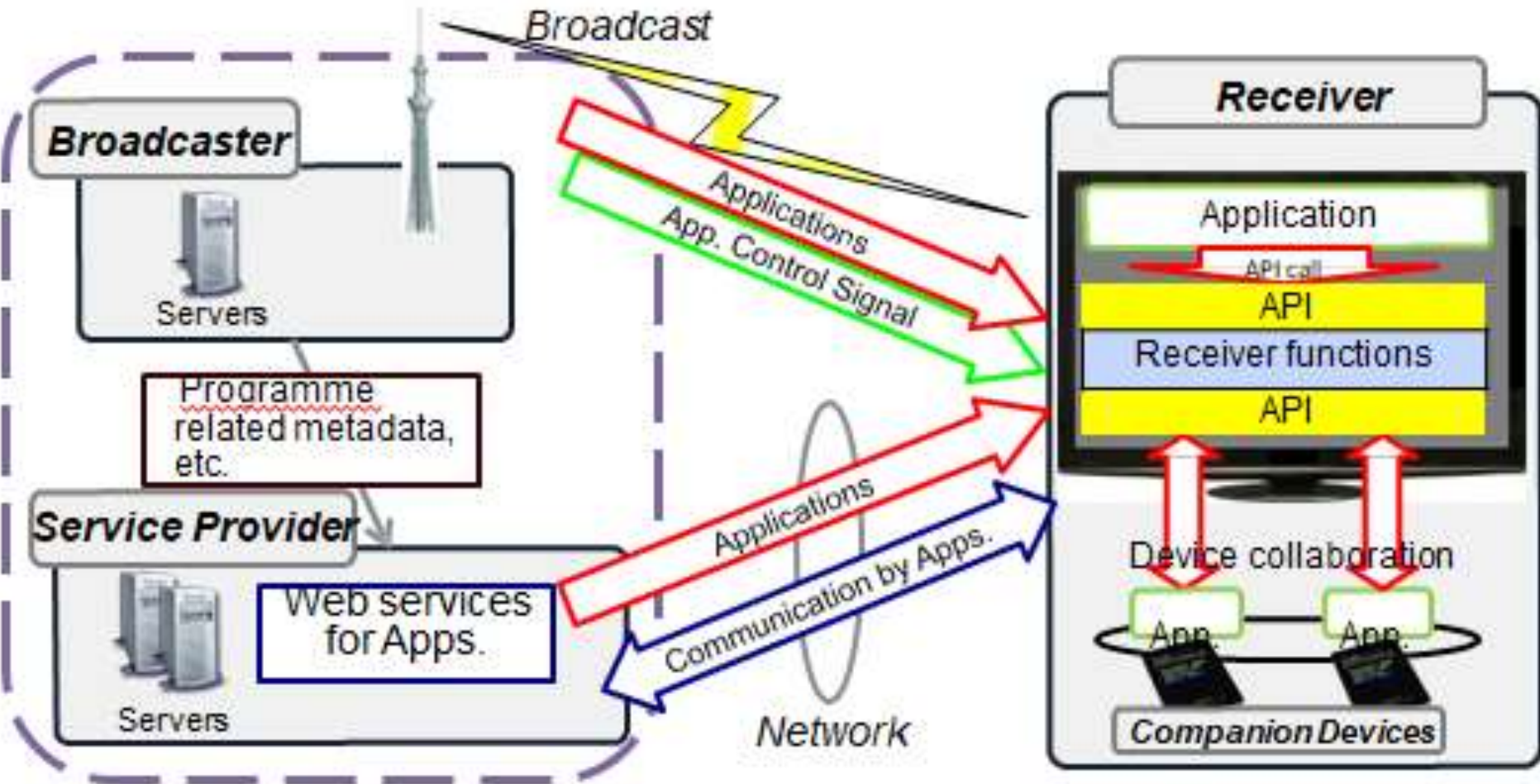
- Robust App Runtime Environment with HTML5 support
- Based on HbbTV 2.0 with restrictions and extensions
 - HbbTV 2.0 was published 2018
 - 20+ extensions being documented, several based on ATSC: A/105 (aka “ATSC 2.0”), now in Candidate Standard phase
 - Changes being documented due to ATSC 3.0 IP delivery solution (HbbTV is based on MPEG-2 TS)

IBB DTV service

A service that simultaneously provides an integrated experience of broadcasting and interactivity relating to media content, data and applications from multiple sources, where the interactivity is sometimes associated with broadcasting programmes.

[Source: Definition in Recommendation ITU-T 1205]

IBB Basic System Architecture



Difference between IBB and TV+Web

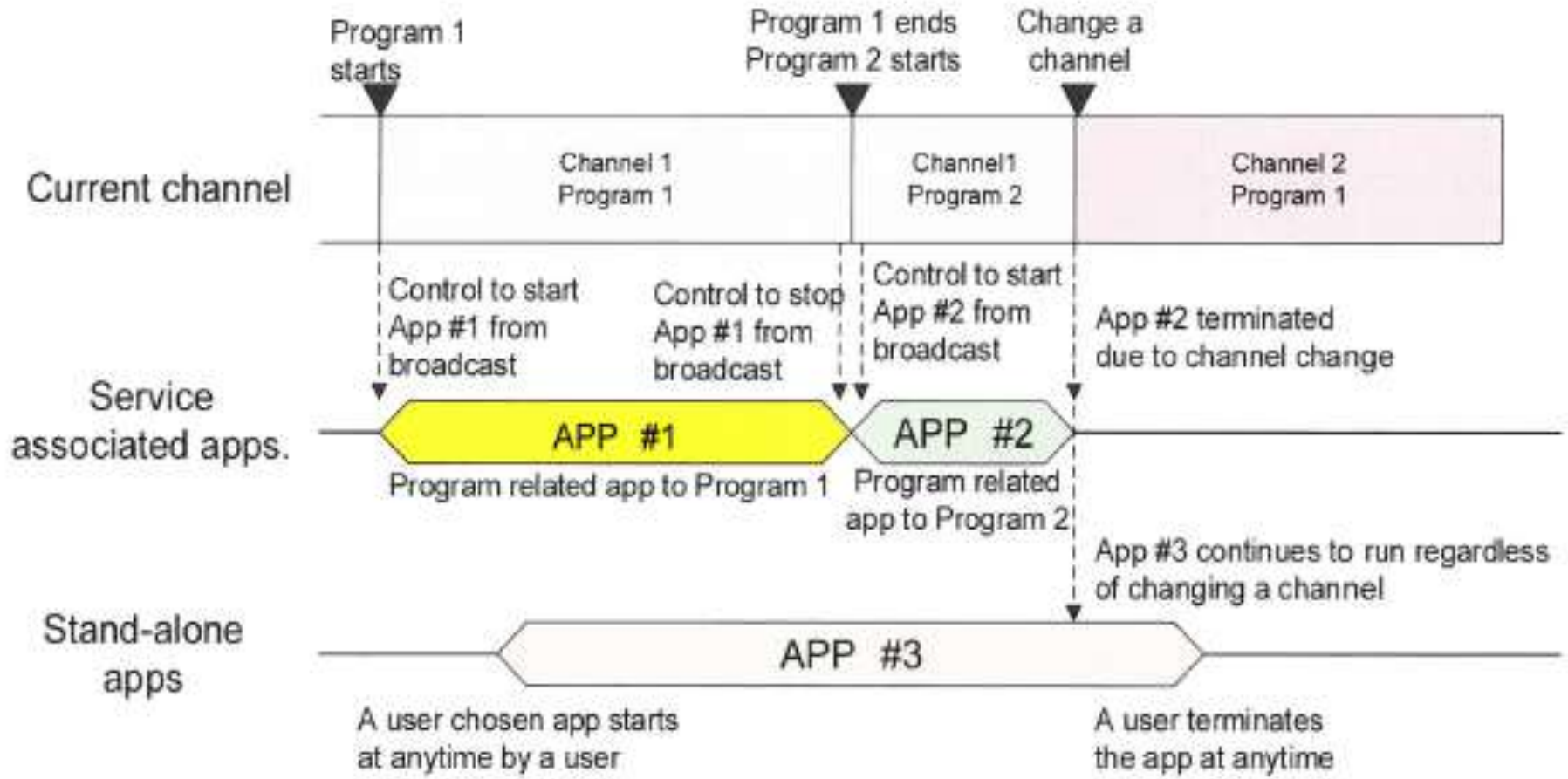
- Application life cycle
 - Some apps. start and stop automatically
 - The quiz app. launches automatically when the quiz programme starts
 - It is terminated automatically at the end of the programme
- Synchronization with progress of a TV programme
 - Presentation changes in accordance with progress of a TV programme
 - The app. receives and processes trigger signals over broadcast
 - Accurate cross-stream synchronization with broadcast signal
- Integrated user experience
 - Totally designed presentation with a TV programme

Service Associated IBB application

An application that is part of the integrated broadcast and broadband (IBB) DTV service tuned to by the user at a given time.

[Source: Definition in Recommendation ITU-T J.205]

Life cycle and types of applications



ITU Recommendations related to IBB systems

	ITU-R	ITU-T
Requirements	Rec. BT.2037 Rec. BT.2053	Rec. J.205
Reference Architecture		Rec. J.206
System	Rec. BT.2075	DNR J.acf-spec
Information Doc.	Rep. BT.2267	

IBB systems in ITU Recommendations

ITU Text	Systems
Rec. BT.2075	<ul style="list-style-type: none">• HbbTV 1.5 & 2.0• Hybridcast 2.0 (+ARIB STD-B62)• HTML5 based smart TV platform
Rep. BT.2267	<ul style="list-style-type: none">• HbbTV 1.5 & 2.0• Hybridcast 2.0 (+ARIB STD-B62)• Enhanced BML for simple IBB• HTML5 based smart TV platform• Ginga

Countries Adopting HbbTV

- In Asia-Pacific Australia, New Zealand, FreeviewPlus
- Singapore
- Malaysia

- Vietnam
- Indonesia
- Myanmar
- Thailand
- ...

Thank you for listening and for patience

Thank you for
listening
and
for your patience