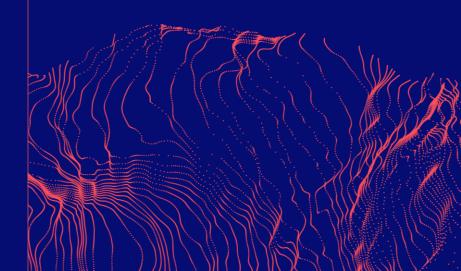


REIMAGINING SATELLITE TV!

THE POWER OF HYBRID WITH DVB-I & HBBTV

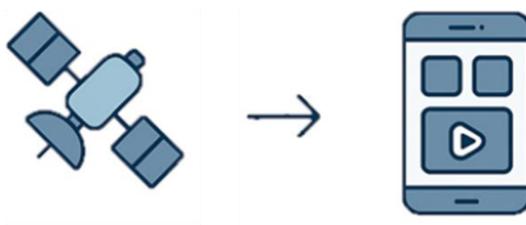
Ralph EDEINE, Eutelsat Video Business Unit HbbTV Symposium, Istanbul, 12th November 2025



REIMAGINING SATELLITE TV!

Facing the evolution of video service consumption

Satellite strengths



- Wide Coverage
- Thousands of TV/Radios channels
- Large audience

New usages



- OTT interface as reference
- Best experience to consume linear services and contents

Our challenge



- Standardise solutions
- Improve service discoverability
- Enhance the user experience



THE POWER OF HYBRID STANDARD SOLUTION

Combining DVB-I & HbbTV



Redefining Service Discovery
Mixing Broadcast and OTT services



Enriching the Viewing Experience Opening new monetization opportunities



DVB-I FOR SATELLITE BROADCASTING NETWORKS

For what purpose?

- Standardise the service discovery
- Simplify the installation (connected & disconnected)
 - Enrich the user experience
- Prepare hybrid and open ecosystem (FTA, Free To View, Pay TV)

Before DVB-I

- DVB-SI: NIT/BAT tables for service lists (bouquet operators)
- No generic functions for standardised LCN, regionalisation, priorisation
- Proprietary solution for managing service lists or providing enriched information based on private descriptors.
- Proprietary implementation on enduser devices (STB, IDTV)
- EIT tables to provide basic program metadata



With DVB-I

- CSR to expose service lists to DVB-I client via internet or over-the-air
- Generic functions to manage LCN, regionalisation, priorisation, hybridation
- Full XML files to generate services lists with extra features to enrich user experience
- Standard implementation on any device, any network
- TV anytime format to provide enriched metadata information



SATELLITE OPERATORS AS ACTIVE CONTRIBUTORS TO DVB-I

DVB-I standard meeting the needs of satellite television use cases



Active contributors to the DVB-I standard

→ "common service layer for various networks"



Satellite use cases part of the DVB-I standard

- → Direct tuning parameters in DVB-I service list no more tuner scan
- → Broadcast DVB-I service list entry point CSR in the sky

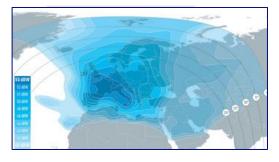


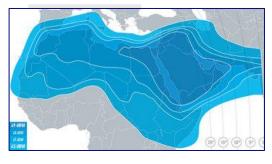
DVB-HB & DVB-NIP reuse DVB-I core (DVB-I Client, service list discovery, TV anytime...)

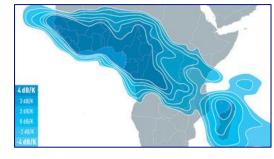


SAT.TV CONNECT: A PRACTICAL APPLICATION

Building a D2C service with the combination of DVB-I & HbbTV







EUTELSAT HOTBIRD 13E

EUTELSAT NILESAT 7/8W

EUTELSAT 16E

1000+ FTA TV channels

100+ M DTH homes



Enhancing the viewing experience of FTA TV channels & programmes



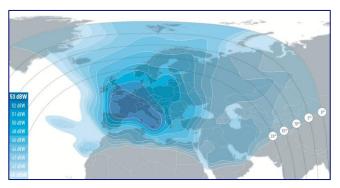
Opening up new monetisation opportunities



SAT.TV FOR NATIONAL & EXPATRIATE AUDIENCES

Vast choice of pre-defined FTA service lists & EPG

EUROPE & BEYOND



EUTELSAT HOTBIRD 13°E

SAT.TV FTA PACKAGES





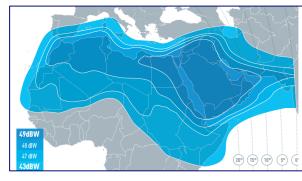








MIDDLE EAST & NORTH AFRICA



EUTELSAT NILESAT 7/8°WEST

SAT.TV FTA PACKAGES

















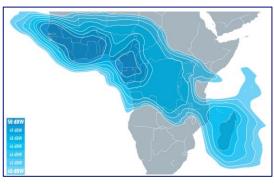








SUB-SAHARAN AFRICA



EUTELSAT 16°EAST

SAT.TV FTA PACKAGES















SERVICE DISCOVERY & OPTIMISED EPG FOR FTA SATELLITE TV

Overcoming the challenge of deploying compatible end-user devices

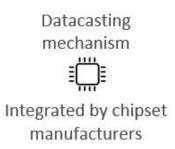
Device type

Technical framework













Smart TV with sat tuner





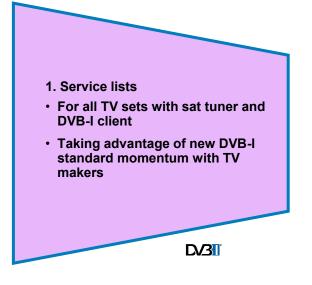


Open standards



SAT.TV CONNECT APP FOR SMART TV

Adding service layers to enrich FTA broadcasting



2. EPG

- For all TV sets with sat tuner and HbbTV browser (from 1.5 version)
- Global EPG portal
- Branded channel EPG

3. Analytics

- Upon request of the channel
- Underlying tracking script, embedded into the Sat.tv Connect app
- · Enabling real time TV usage data



- · Fast Channels referencing
- L / O banners deployment
- Ad insertion

HbbTV



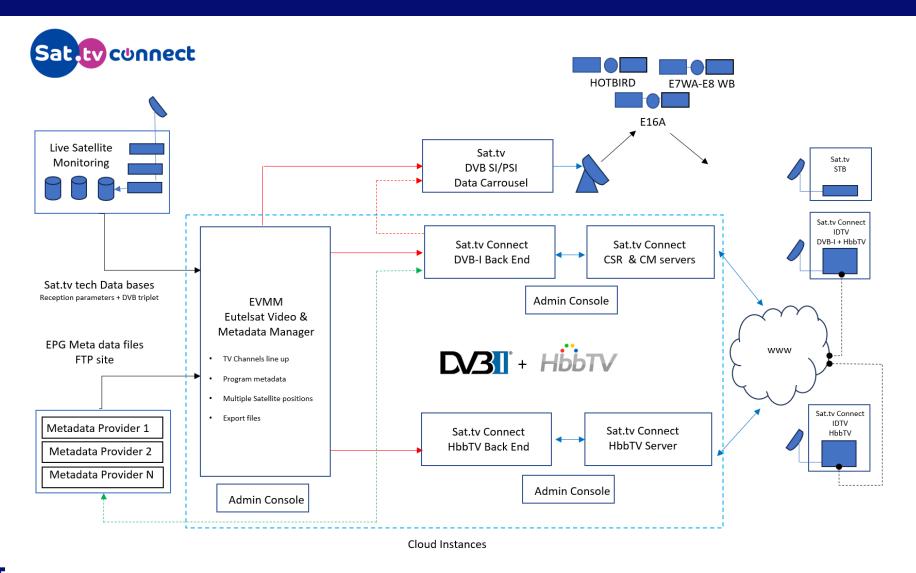


HbbTV



HYBRID ARCHITECTURE

Mixing Broadcast and Broadband infrastructures



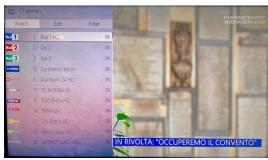


SAT.TV CONNECT POWERED BY DVB-I

30 pre-defined FTA service lists, instantly installed

- Seamlessly integrated with the native TV interface
- Entry point in the TV installation menu ("operator offers"), triggering the use of the DVB-I client
- Simplified service list installation via "Instant Tuning" function
- Enhanced UI/UX with channel logos, thumbnails, detailed programme info, zapping banner and programme schedule
- First implementation by **VESTEL**, more brands to come









- Two service list installation modes:
 - To date: the native TV DVB-I client is connected via internet with the Sat.tv server ("CSR")
 - Coming soon: via broadcast signaling for non-connected devices





SAT.TV CONNECT APP FOR SMART TV

Designed for connected TV sets with satellite tuner

EPG app with 2 interfaces powered by

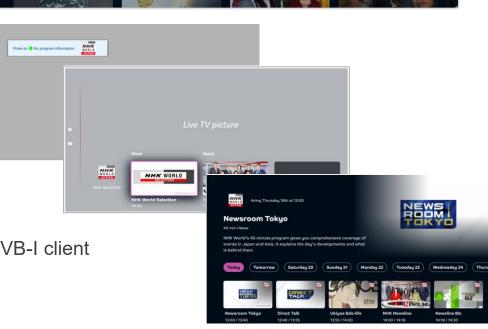


Sat.tv global EPG portal on Sat.tv information channel

Branded channel guide via AIT table inserted into the TV channel

- Deployed at Eutelsat-Nilesat 7/8W & HOTBIRD 13E (coming soon to 16E for SSA)
- 6 languages: Arabic, English, Farsi, French, Italian, Slav
- Compatible with majority of HbbTV TV sets (from HbbTV v1.5) and new TVs with DVB-I client





NEW TV USAGE MEASUREMENT SERVICE

Statistical analysis of TV channel usage over time

Analytic agent embedded into the Sat.tv EPG branded channel app

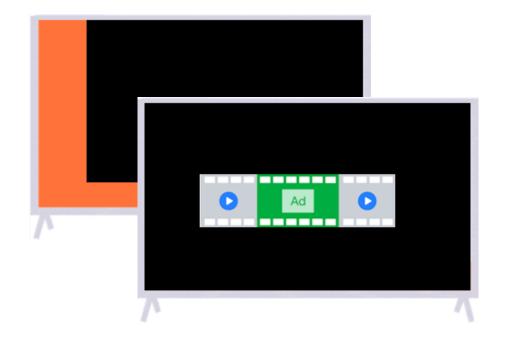




NEW CONTENT & MONETISATION OPPORTUNITIES

Advertising ecosystem to generate additional revenue





Referencing FAST channels within Sat.tv line-up & EPG

L Banner / O banner / Pop-up
Ad insertion

Under evaluation



HYBRIDISATION: THE REBIRTH OF BROADCAST

To conclude

- With DVB-I and HbbTV, Eutelsat bridges the universes of broadcast and OTT
- Broadcast reliability meets broadband intelligence
- Preparing the migration phase to full IP distribution over satellite with Native IP as DTH2.0 solution

