

THE UNITED REPUBLIC OF TANZANIA
TANZANIA COMMUNICATIONS REGULATORY AUTHORITY



**TANZANIA SHORT REPORT ON MIGRATION FROM ANALOGUE TO DIGITAL
TERRESTRIAL BROADCASTING**

The Government of Tanzania started preparations for the migration from terrestrial analogue to digital terrestrial broadcasting immediately after ITU initiative. Below is a brief on the country's initiatives to migrate.

I. CONSULTATION

A powerful and success aspect of regulating a competitive industry. TCRA processes for a successful policy driven migration :-

- 1) 2004/6 Participated in the GE04 & GE06 processes;
- 2) 2005: Started consultation with stakeholders;
- 3) Issued two Public Consultation Documents (PCDs):-
 - (i) 2005: First PCD highlighted DTT and its benefits;
 - (ii) 2006: Second PCD established licensing framework for DTT, separation of content and transmission; establishment of Multiplex Operators (MUX) inline with the Converged Licensing Framework adopted by TCRA in 2005;
- 4) 2007: Formation of the National Technical Committee on DTT Broadcasting (NTC-DB);
- 5) 2008: Inter-Ministerial National Steering Committee (NSC) as a Government Organ to oversee migration. NTC-DB provides technical advise to the NSC;
- 6) 2007: Consultation on Regulatory Framework was put in place (Network Facilities Licence for signal distributor and Content Services licence for Content Service provider);

7) 2010/11: Legal Framework was put in place:-

- a. Enacting of the Electronic & Postal Communications Act, 2010 (EPOCA) by the Parliament of Tanzania and its ascension by the President. EPOCA provides for DTT migration;
- b. Electronic & Postal Communications (Digital and other Broadcasting Networks) Regulations of 2011 which provide for Analogue Switch Off (ASO) on 31st December, 2012. The Government through the NSC gave a directive to carry ASO in phases to address challenges in a specific service area while the 31st December, 2012 provision holds;

8) 2010: Licensing of signal distributors (Multiplex Operators) through open tender.

II. COMMUTATION STRATEGY

One of the key success factors was to identify and categorize the audience/ profiling for effective outreach:-

- (i) In 2010 TCRA formulated a Communications Strategy (CS) and submitted it to the Government for approval. The Government approved it. The CS provided for all communications outlets including print and electronic media (newspapers, TV/radio, social media networks), roadshows, talkshows, meetings/seminars, jingles and songs (audio and visual) from ward to national level, tailor made for various age groups, various social spheres, government to private sector;
- (ii) In 2011 the President of the United Republic of Tanzania launched the Public Awareness Campaign and the digital logo on 24th August, 2011 as shown below:



III. COST

NSC considered recommendations from the NTC-DB on how to finance DTT networks:

- (a) Public Private Partnership (PPP) for the public carrier, the Public Service Broadcaster entered into a joint venture with a foreign company to build DTT infrastructure,
- (b) Private participation: Two additional carriers were also granted the National Network Facilities Licence;
- (c) Government exempted import duty on STBs, rendering affordability.

IV. CONSUMERS

Consumers are integral part of the digital migration. Addressing consumer issues depicts successful transition. Key factors are:

- (a) STBs affordability through tax exemption;
- (b) Customer care including toll free telephone lines by service providers for technical support;
- (c) Availability of STBs distribution centres;
- (d) Active mobilization by the Consumer Consultative Council to get feedback from consumers;
- (e) Quality of Service (QoS) and Quality of Experience (QoE) assurance by the Regulator;

- (f) Consumers' willingness to voluntarily uptake digital services.

V. CHALLENGES

- a. High costs of simulcast period (parallel running of DTT and analogue networks), satellite capacity cost, utilities and human resources;
- b. Coordination with neighbours who have not yet switched-on;
- c. Inability by MUX to roll out countrywide;
- d. Signal coverage black spots due to un-even terrain;
- e. Lack of consumer understanding of STB/antenna installation and use of remote control functionalities;
- f. The cost of STBs is still high (USD 50 to USD 75);
- g. MUX complications on Service Level Agreement (SLA) with Content Service Providers (CSPs);
- h. High transmission fees imposed by MUX to CSPs prior to ASO. TCRA intervened and established Cost Based Fee (CBF) charged my MUX to CSPs based on satellite:- (http://www.tcra.go.tz/images/Consultative_docs/pcd_mux_cbf_2012.pdf) whose annual review has been completed. Further study is in progress to establish a model for the use of fibre optic National ICT backbone and retail last-mile connectivity;
- i. Few CSPs were not prepared for analogue switch off and therefore not on the digital platform;
- j. Attained only 23% population digital terrestrial penetration vs 24% analogue penetration;
- k. Over compression by MUX compromising QoS and QoE;
- l. Regional and rural insertion to MUX's network;
- m. STBs inter-operability;
- n. Escalating piracy and copyright issues due to increased capacity and innovation within the DTT making it easy to copy, edit and manipulate content;
- o. STBs backward compatibility, presence of DVB-T and DVB-T2 transmissions in Tanzania;
- p. Whether or not to liberalize STBs importation viz QoS and Control;
- q. Insufficient Local content.

VI.SUCCESS

Success of digital migration based on practical experience in Tanzania depends on the following factors;

- (a) Political will;
- (b) Roadmap (SMART-Specific, Manageable, Attainable, Realistic and Time-bound);
- (c) Legal and Regulatory instruments;
- (d) Concerted Public Awareness Campaign;
- (e) Regular consultations with stakeholders;
- (f) Resources (Financial muscle);
- (g) DSO team (skills);
- (h) Champions (Head of State, Minister, Artists);
- (i) Operators goodwill;
- (j) Consumer willingness;

VII. ANALOGUE SWITCH OFF (ASO)

The analogue switch off was done in phase. The first phase involved 7 transmitter sites and was executed from December 31st, 2012 and ended on 30th April 2013. The second phase of ASO started on 31st March 2014, and it involves 10 transmitter sites and is expected to end on 31st of October 2014. The target is to have fully digital switch-over by end of 2014.

VIII. ROLL-OUT BY MULTIPLEX OPERATORS

a) Star Media (T) Limited:

Currently Digital: Dar Es Salaam, Dodoma, Tanga, Arusha, Moshi, Mwanza, Mbeya, Morogoro, Singida, Musoma, Tabora:

Plan by end of 2014: Lindi, Mtwara, Songea, Sumbawanga, Iringa, Kigoma and Shinyanga.

b) Agape Associates Limited:

Currently Digital: Dar Es Salaam, Arusha, Mwanza, Mbeya, and Kigoma.

Plan by end of 2014: Lindi, Mtwara, Sumbawanga and Tanga.

c) Basic Transmission Limited:

Currently Digital: Dar Es Salaam, Arusha, Mwanza and Dodoma.

Plan by end of 2014: Shinyanga, Tabora, Musoma, Mbeya, Moshi and Tanga.

IX. STATISTICS

- a) Transmitters for each signal distributor:- Star Media (T) Limited (13), Basic Transmission Limited (4), Agape Associates Limited (7);
- b) STBs unit cost is about US\$50 to US\$75;
- c) Content Service Providers on the digital network (16); new sites directly onto DTT (3);
- d) Total terrestrial analogue sites 19;
- e) Analogue Sites switched off 11;
- f) Ratio of analogue to digital channels 17/51;
- g) Strategies for ITU deadline (31st October, 2014);
 - Government subsidy to signal distributors to enable them build network in the remaining five (5) service areas;
 - VAT exemption in progress to enable digital uptake;
- h) Number of TV stations in digital platform sixteen (16);
- i) Number of TV stations not in digital platform, five (5);
- j) Digital terrestrial television network roll-out as of May, 2014:
 - Dar Es Salaam;
 - Dodoma;
 - Tanga;
 - Arusha;
 - Moshi;
 - Mbeya;
 - Singida;
 - Tabora;
 - Musoma;
 - Bukoba;
 - Kahama;