



## A Report on Migration from Analogue to Digital Broadcasting in Ghana

### Broadcasting Policy, Legal & Regulatory Environment

- ❑ Policies
  - ✓ NMC National Media Policy, 2000
  - ✓ National Telecommunications Policy (NTP), 2005
  - ✓ Report of the National Digital Broadcasting Migration Technical Committee, 2010
- ❑ Laws
  - ✓ Television Licensing Decree, 1966, (N.L.C.D. 89)
  - ✓ Television Licensing (Amendment) Law, 1991 (P.N.D.C.L. 257)
  - ✓ Ghana Broadcasting Corporation Decree, 1968, (NLCD 226)
  - ✓ National Media Commission Act, 1993 (Act 449)
  - ✓ National Communications Authority Act, 2008 (Act 769)
  - ✓ Electronic Communications Act, 2008, (Act 775)
- ❑ Regulations & Guidelines
  - ✓ Television Licensing Regulations, 1991 (L.I. 1520)
  - ✓ NMC Broadcasting Standards, 2000
  - ✓ National Communications Regulations, 2003, (L.I. 1719)
  - ✓ NMC Guidelines for Local Language Broadcasting, 2009
  - ✓ Guidelines for the Deployment of Communications Infrastructure, 2010



13 Oct 2011


**digitalghana** 

2





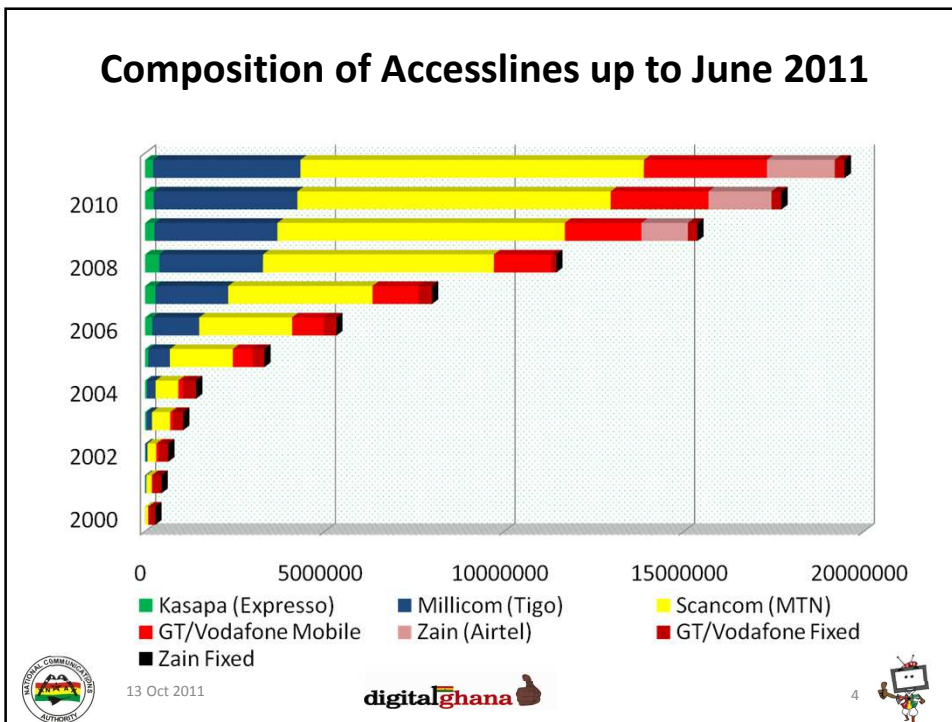
### Composition of Communications Space By Number in operation

Category	2004	2005	2006	2007	2008	2009	2010	2011
Fixed Line	2	2	2	2	2	2	2	2
Cellular	4	4	4	4	4	5	5	5
ISPs	25	29	32	34	35	35	35	35
FM Radio	84	84	127	129	144	171	190	220
TV	8	8	10	11	13	14	14	16

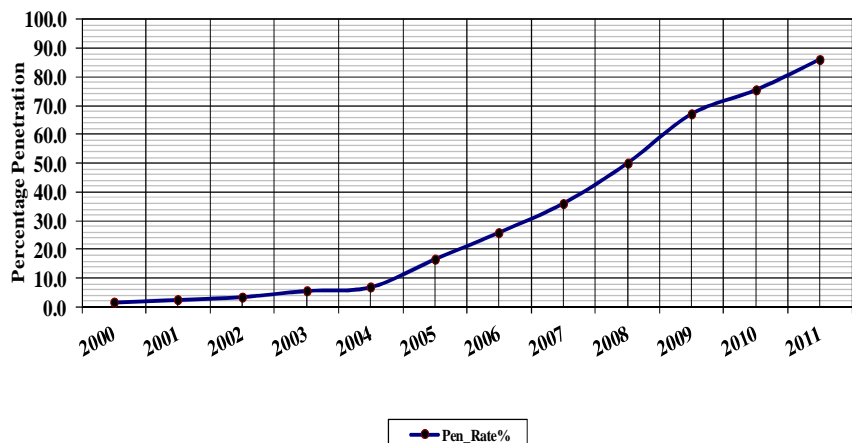


13 Oct 2011



### Mobile Telephony Penetration Rates 2000 – 2011

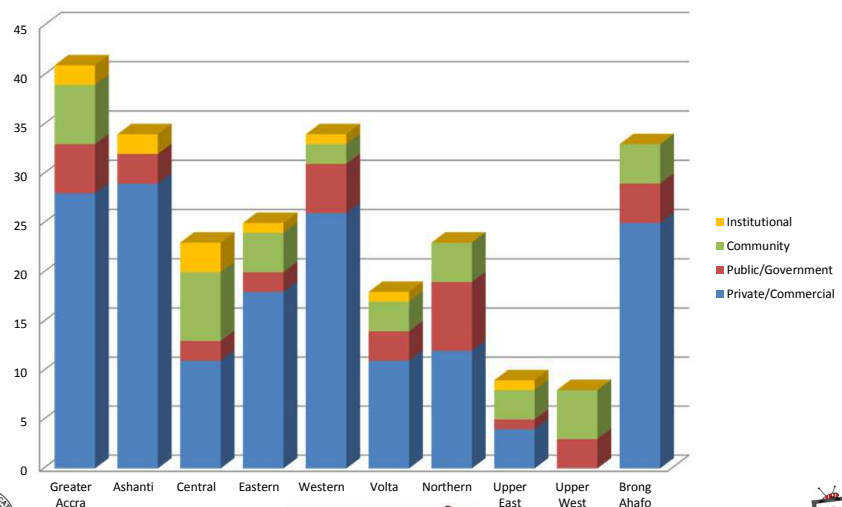


13 Oct 2011



5

### Distribution of FM Stations in Ghana as of 2011

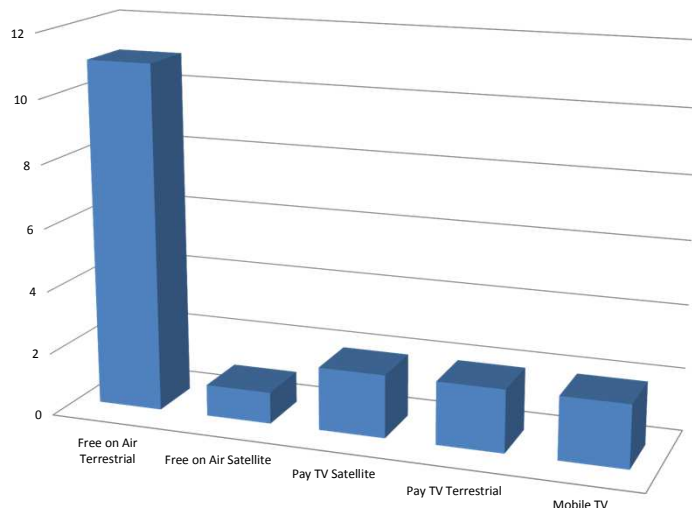


13 Oct 2011



6

## Distribution of Types of TV Stations in Ghana as of 2010



13 Oct 2011



## Overview of Existing Analogue Terrestrial TV Signal Distribution

- ❑ GTV has
  - ✓ 30 transmitters operating in VHF Band III
  - ✓ 9 repeater stations operating in UHF Bands IV & V
- ❑ Private broadcasters
  - ✓ TV3, Metro TV, TV Africa operate in Band III
  - ✓ Net2 TV, Viasat 1, e-TV Ghana, Crystal TV, Coastal TV operate UHF transmitters



13 Oct 2011



## Challenges of Existing Analogue Regime

- Poor Infrastructure sharing/Co-location
  - ✓ Each broadcaster carries own signals
  - ✓ Combined Network management costs for the industry are high
  - ✓ Transmitters are located in varied directions for the same coverage target resulting in:
- Poor reception conditions
  - ✓ Use of a single directional antenna presents serious reception challenges:
    - Ghosting
    - Blurr images
    - Lines across images
    - Poor sound, etc
  - ✓ Environmental aesthetics are badly affected by the sight of long bamboo poles hoisting antennas



13 Oct 2011

9



## Why Migrate?

- To comply with and adopt the tenets of the GE-06 Agreement.
- To rapidly adopt spectrum efficient methods in the management of the scarce RF spectrum
  - ✓ to broaden its utility as a resource in the interest and benefit of stakeholders.
- To prevent dumping of obsolete analogue TV equipment into the country
- To enhance the quality and experience of TV viewers in Ghana



13 Oct 2011

10



# STRATEGY FOR THE TRANSITION FROM ANALOGUE TO DIGITAL BROADCASTING IN GHANA

13 Oct 2011

11

## Governance/Leadership

- ❑ Overall Leadership provided by the Government of Ghana:
  - ✓ All policy decisions approved by Cabinet
  - ✓ All Legal instruments to be approved by Parliament
- ❑ Digital Broadcasting Migration Committee:
  - ✓ Chaired by Honourable Minister of Communications
  - ✓ Membership of 13 from all stakeholder institutions
    - Ministries, Parliament, Regulators, State Broadcaster, Private Broadcasters
  - ✓ Responsible for:
 

<ul style="list-style-type: none"> <li>▪ policy implementation</li> <li>▪ integrated planning</li> <li>▪ budgeting</li> </ul>	<ul style="list-style-type: none"> <li>▪ communication with the public</li> <li>▪ performance monitoring</li> </ul>
---	---



13 Oct 2011

**digitalghana** 

12



## Free-to-Air TV Strategy

- Independent DTT Transmission Entity
  - ✓ Being established through Public Private Partnership
  - ✓ Ghana Broadcasting Corporation (GBC) and Ghana Independent Broadcasters Association (GIBA)
  - ✓ Preliminary discussions pointing to 50%:50% risk & reward
  - ✓ Discussions led by Public Investment Unit of MoFEP
  - ✓ RFP for DVB-T2 network under development in lieu of PPP



13 Oct 2011

13



## Standards

- Transmission standard - **DVB-T2 (EN 302 755)**
- Television presentation formats:
  - ✓ **standard definition (SDTV)** until analogue switch off (ASO)
  - ✓ **high definition after ASO**
- Compression technology:
  - H.264/AVC/MPEG-4 (part 10) and**
  - Advanced Audio Coding (AAC)**
- Application Programming Interface (API) for additional and interactive services - **MHEG-5**



13 Oct 2011

14



## Conformance Strategy

- Appointment of test lab for STB Compliance testing
- Licensing of compliant STBs to use certification logo



- Logo would confirm to consumers that the receiver is Ghana DTT compliant.
- Publication of STB Manufacturers 'White' list.



13 Oct 2011

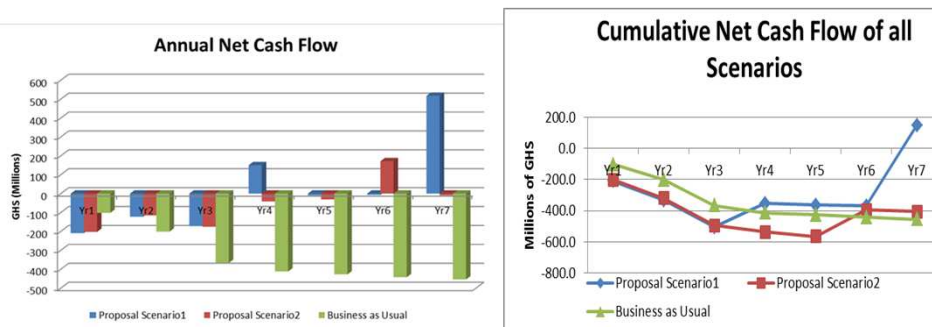


15



## Analogue Switch-off Date

- 31<sup>st</sup> December, 2014 (3 yr double illumination)



13 Oct 2011

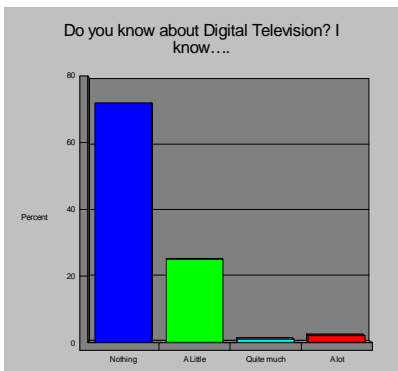


16

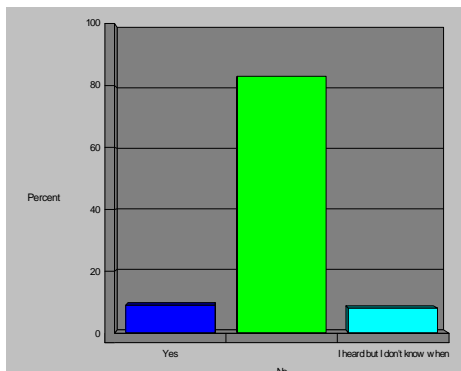




## Public Awareness



Awareness about Digital TV

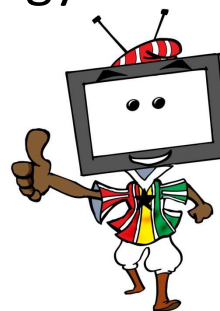
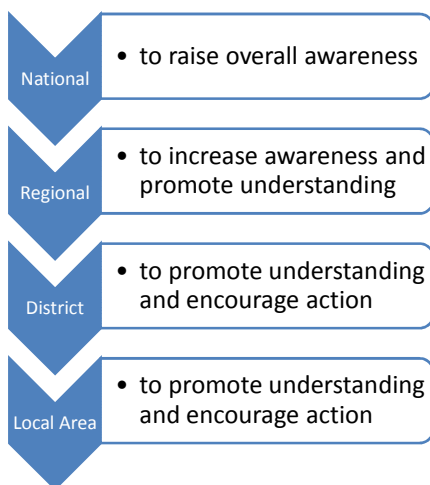


Awareness about 2014 analogue switch-off

13 Oct 2011

17

## Public Education Strategy



message should be *simple* and *straight forward*

materials should be transmitted in at least the languages identified to be widely spoken in Ghana

all media platforms should be used

Outreach events to schools, churches, mosques, etc

13 Oct 2011

18

## Sample promos



13 Oct 2011

19

## Sample Promo III



13 Oct 2011

20

## Digital Migration Poster

13 Oct 2011

21

## Switchover Timetable

Activity	Start Date	End Date
NDBMTC Final Report to Govt	13 <sup>th</sup> Jan 2010	30 <sup>th</sup> Aug 2010
Development of Legal Framework (Amendment of Electronic Communications Act)	Sept 2010	December 2010
Public Awareness Campaign	September 2010	December 2014
Establishment of National Digital Migration Implementation Body	January 2011	
Licences for Digital TV	3Q 2011	
Nationwide Roll-out of Digital TV (Simulcast Period)	2012	2013
Coverage of all Regional Capitals & environs	By December 2012	
Phased Analogue Switch-off	To be determined according to locations and conditions	
Completion of Switchover	31 <sup>st</sup> December 2014	
Appraisal Report of Switchover Process	6 months after completion of switchover	

13 Oct 2011

22

## Identified Risks

- Low public awareness:
  - could lead to a slow uptake of the service or conversely, panic when the 2014 analogue switch-off date is announced.
- Uncertainty about funding sources which could stifle implementation of the project.
  - Funding for consumer incentives e.g. help scheme for economically vulnerable, etc.
- Absence of a legal framework for ASO:
  - to avert any risks of legal suits from civil society organisations and/or pressure groups.



13 Oct 2011

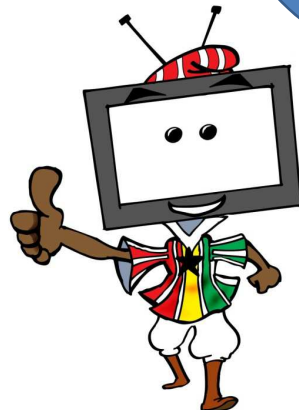
digitalghana 

23



It's Digitime in  
Ghana!

Thank You!



13 Oct 2011

24

## Contact Info

*Digital Broadcasting Migration Committee (DBMC)*

Email: [edmund.fianko@nca.org.gh](mailto:edmund.fianko@nca.org.gh)  
[secretariat.dbmc@nca.org.gh](mailto:secretariat.dbmc@nca.org.gh)

Tel: +233 (0)302 776621

Fax: +233 (0)302 743669

Websites: [www.koodigi.org](http://www.koodigi.org)  
[www.nca.org.gh](http://www.nca.org.gh)



13 Oct 2011



25

