

AFIX-TF

TECHNICAL WORKSHOP REPORT (SENEGAL)

I. Introduction

The African Internet Exchange Task Force (AFIX-TF) held a one-day EN-ISPA workshop and a two-day technical training workshop in Dakar Senegal, at “UCAD” (Universite Cheick Anta Diop) from Friday 21 July to Saturday 22 July 2006. Trainers: Brian Longwe (from Kenya), Mme Fatou Diang Sarr (from Senegal), Mme Berthe Hawa, Alex Corenthin (from Senegal), Diakite (from Mali) & Didier Kasole (from DRC). This report is written by Didier Kasole, Workshop Team Leader.

II. Planned Outcome and Benefit

Participants at the Workshop will be able to establish an ISPA, establish and maintain an Internet Exchange Point. The implicit benefit of the workshop will be to establish technical cooperation between ISPs.

III. Workshop Structure

Day 1

Session 0: Opening Session (EnISPA & AFIX) 09:00-10:10

Introduced by the Directeur de l’informatique of Univesity Cheick Anta Diop, the Director of Cabinet of the Minister of ICT and new technologies did the official opening of the workshop. Didier Kasole (Afix workshop coordinator Manager) presented AfrISPA’s perspectives. After the opening, Alex Corenthin who is also President of Isoc Senegal did a quick presentation of local context; the representative of the Regulator (ART) close the opening in giving his full support for the initiative. Then we split in two groups, one for Ispa training and the other for IXP training.

Session 1: High-level overview 10:30-11:40

During this session, Fatou Sarr presented the history and current status of the internet and its architecture, including the role of ISPs and the relationships between them. She introduced (or refresh) key concepts including those of transit and peering, as well as considering various options for peering architectures.

Session 2: Cost-savings exercise 11:40-13:20

During this session, Didier Kasole presented the exercise of how participating on IXP can reduce cost of operation for an ISP and the dynamics for the overall ISP market. Using a dynamic model, where key variables can be set and a range of scenarios can be explorer to interrogate and understand what the broad financial implications are likely to be for a specific ISP.

Session 7: Business Aspects of Internet Exchanges 16:15-17:00

During this session, presented by Didier Kasole, we explored the business models applicable to an Internet Exchange, and associated financial and business implications. We tried to answer the question: “What makes a successful IXP?”

Day 2: AFIX

Session t3: Technical refresher 09:30-11:30

During this session, Fatou Diang Sarr and Hawa Diakite refreshed the concepts of static and dynamic routing. Participants deal with router basic configuration as well as static routing exercises.

Session t3: Technical refresher (dynamic routing) 11:40-12:10

Presented by Hawa Diakite, Fatou Sarr and Didier Kasole, this session refreshed the concepts of dynamic routing, participants did OSPF exercises.

Session 4: Technical aspects of peering 13:30-15:00

Presented by Didier Kasole, this session focuses more closely on how to set up peering, giving more detail on BGP parameters and configuration. At the end of these sessions, participants setup a virtual IXP.

Session XX: Business aspects of Internet Exchanges 15:00-18:00

Presented by Brian Lomgwe, assisted by Alex Corenthin, this session go back to basics definitions of ISP, ISPA, as well of advantages to have ISPA, IXP and how to manage relationships not only between ISP but with all partners including regulators and government.

IV. Participants attendees

	<u>Firstname</u>	<u>Name</u>	<u>Organisation</u>	<u>Email</u>
1	Abdou Aziz	Gueye	ADIE	aziz.gueye@adie.sn
2	Ahmed BSB	Seye	HomeviewSenegal	aseye@homeview.sn
3	Alex	Corenthin	Afrisps/Trainer	
4	Arona	Diallo	Blaise-Electronics	aronas2202@yahoo.fr
5	Batou	Sarr	MPTNTIC	bgs.sarr@caramail.com
6	Baye Samba	Diop	ARTP	bayediose@yahoo.fr
7	Cheik	Dia	Blaise-Electronics	chmdia@gmail.com
8	Dame	Gaye	DC-MPTNTIC	
9	Demba	Sall	CCIAD	hellods2001@yahoo.fr
10	Didier	Kasole	Afrispa/Trainer	didier@afrispa.org
11	Djibril	Ndaw	ADIE	djiby@adie.sn
12	Eric	Osiakwan	Afrispa	eric@afrispa.org
13	Fatou Fatoumata	Sarr	Afrispa/Trainer	fdsarr@ucand.sn
14	Bineta	Khouma	ARTP	mamzo2003@yahoo.fr
15	Hawa Diakite	Berthe	Afrispa/Trainer	
16	Lamine Mahmoud	Amadou	DI	amadoulamine1@gmail.com
17	Ibrahima	Bah	Blaise-Electronics	bewa10@hotmail.com
18	Malick	Cisse	MPTNTIC Homeview	asmalick2003@yahoo.fr
19	Medoune	Mbow	Senegal	mmbow@homview.sn
20	Mohamed	Bah	UCAD2	batobade@yahoo.fr
21	Moussa More	Sarre	ADIE	moussa@adie.sn
22	Pascal	Segle	ADIE	pascal@adie.sn
23	Pierre	Youm	MPTNTIC	pyoum@caramail.com
24	Samba	Ndiaye	ARTP	samba.ndiaye@artp.sn

V. Workshop Evaluation

In general, the assessments were favorable, 100% of responding participants were very satisfied by the workshop. 69.23% meet their expectations and 30.77% find their expectation exceeded.

	Nine participants completed the evaluation forms	
On the Question: How useful did you find the workshop?	Very useful	13 (100%)
	Somewhat useful	
	Not useful	
On the Question: How did it match your expectations? (Were the aims communicated in advance?)	Exceeded	4 (30.77%)
	As expected	9 (69.23%)
	Below	

Individual session evaluations and trainers evaluations

Session 0: General Introduction

Trainer's name: Didier KAsole

Please rate the following on a scale of 1 to 5:

	5 = Excellent, 4 = Good, 3 = Average, 2 = Poor, 1 = Very poor
Presentation skills	4.33
Presentation content	4.25
Handouts	4.08
Overall	4.17

Comment: encourage to continue this mobilization to have IXP in all countries in Africa

Session T1: Internet Overview

Trainer's name: Fatou Sarr

Please rate the following on a scale of 1 to 5:

	5 = Excellent, 4 = Good, 3 = Average, 2 = Poor, 1 = Very poor
Presentation skills	4.25
Presentation content	4.08
Handouts	4.08
Overall	3.91

Comment:

Session T2: Cost-saving exercise

Trainer's name: ___ Didier Kasole ___

Please rate the following on a scale of 1 to 5:

	5 = Excellent, 4 = Good, 3 = Average, 2 = Poor, 1 = Very poor
Presentation skills	4.00
Presentation content	4.09
Handouts	3.80
Overall	3.91

Comment: The model was very interesting and easy to use

Session T3: Technical Refresh

Trainer's name: ___ Hawa Diakite, Didier Kasole ___

Please rate the following on a scale of 1 to 5:

	5 = Excellent, 4 = Good, 3 = Average, 2 = Poor, 1 = Very poor
Presentation skills	4.18
Presentation content	4.27
Handouts	4.27
Overall	4.20

Comment: Manipulation is always the best way to learn during workshop. I suggest to do more exercises.

Session T3(b): Technical Refresh (continue)

Trainer's name: ___ Hawa Diakite, Fatou Sarr ___

Please rate the following on a scale of 1 to 5:

	5 = Excellent, 4 = Good, 3 = Average, 2 = Poor, 1 = Very poor
Presentation skills	4.08
Presentation content	3.29
Handouts	4.25
Overall	4.10

Comment:

Session XX: Milestone for ISPs

Trainer's name: ___ Brian Longwe, Alex Corenthin ___

Please rate the following on a scale of 1 to 5:

	5 = Excellent, 4 = Good, 3 = Average, 2 = Poor, 1 = Very poor
Presentation skills	4.33
Presentation content	4.25
Handouts	4.17
Overall	4.27

Comment:

Session T7: Business Aspects of an IXP

Trainer's name: ___ Didier Kasole ___

Please rate the following on a scale of 1 to 5:

	5 = Excellent, 4 = Good, 3 = Average, 2 = Poor, 1 = Very poor
Presentation skills	4.27
Presentation content	4.45
Handouts	4.18
Overall	4.20

Comment: Interesting to facilitate decision to start an IXP

Session 8: Technical aspects of Peering (Simulation IXP)

Trainer's name: ___ Fatou Sarr, Hawa Diakite ___

Please rate the following on a scale of 1 to 5:

	5 = Excellent, 4 = Good, 3 = Average, 2 = Poor, 1 = Very poor
Presentation skills	4.00
Presentation content	4.27
Handouts	4.18
Overall	4.00

Comment:

-Afrispa is doing well for capacity building in ICT and development of Information Society in Africa

- Handout for all exercises, and provide step by step commands

Overall Workshop Evaluation

How did you find the length of the workshop?	Too short	27%
	About right	73%
	Too long	0%
How did you find the pace of the workshop?	Too slow	9%
	About right	91%
	Too fast	0%
How satisfied were you with the organisation of the workshop?	Not satisfied	0%
	Somewhat satisfied	0%
	Very satisfied	100%
Any other comments? <ul style="list-style-type: none">• More time for technical• In general workshop goes fine. Personnaly it allow me to understand how easy is an IXP. Setup of an IXP is now simple for me.		

VI. Conclusion & follow up

100% of participants are very satisfied. The length of the workshop can be seen as a problem as for this workshop only 73% find it right (for the last one, 88% find it right). It is because of electricity outage during the workshop. 91% found the pace right. As many of ISPs are reselling services from Sonatel, they was thinking that there is no need of an IXP, but after the workshop discussion is engaged to study which model of IXP to setup in Dakar.