

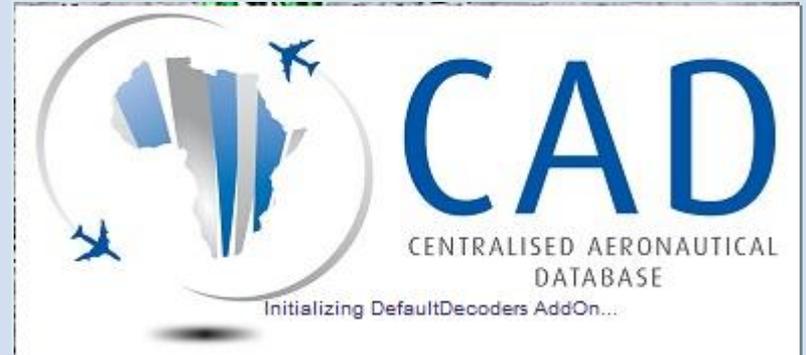


South African AIXM Database Implementation

Presented by Raoul Bester

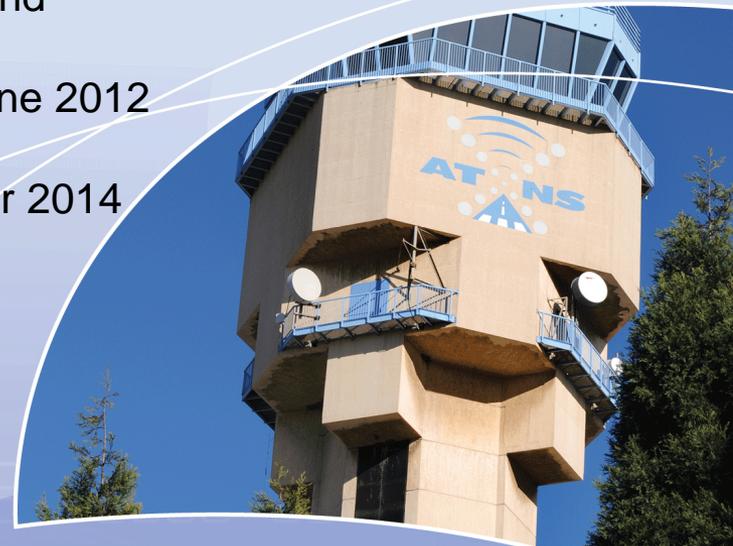
A-CAD Implementation

- Started 2011
- SDO SAT passed 2011
- AIP/Charting SAT Passed 2013
- AIP Services Transferred from SACAA to ATNS in 2014
- ATNS Certified in terms of Part 175
- Current project – Charting Services Transfer from SACAA to ATNS

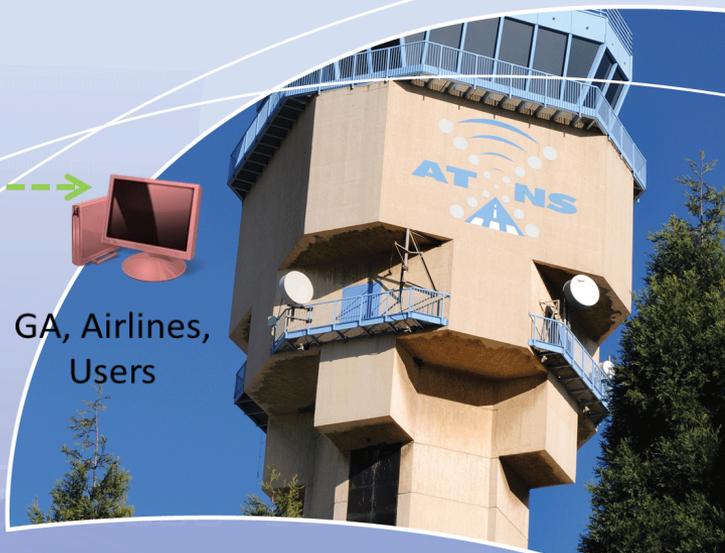
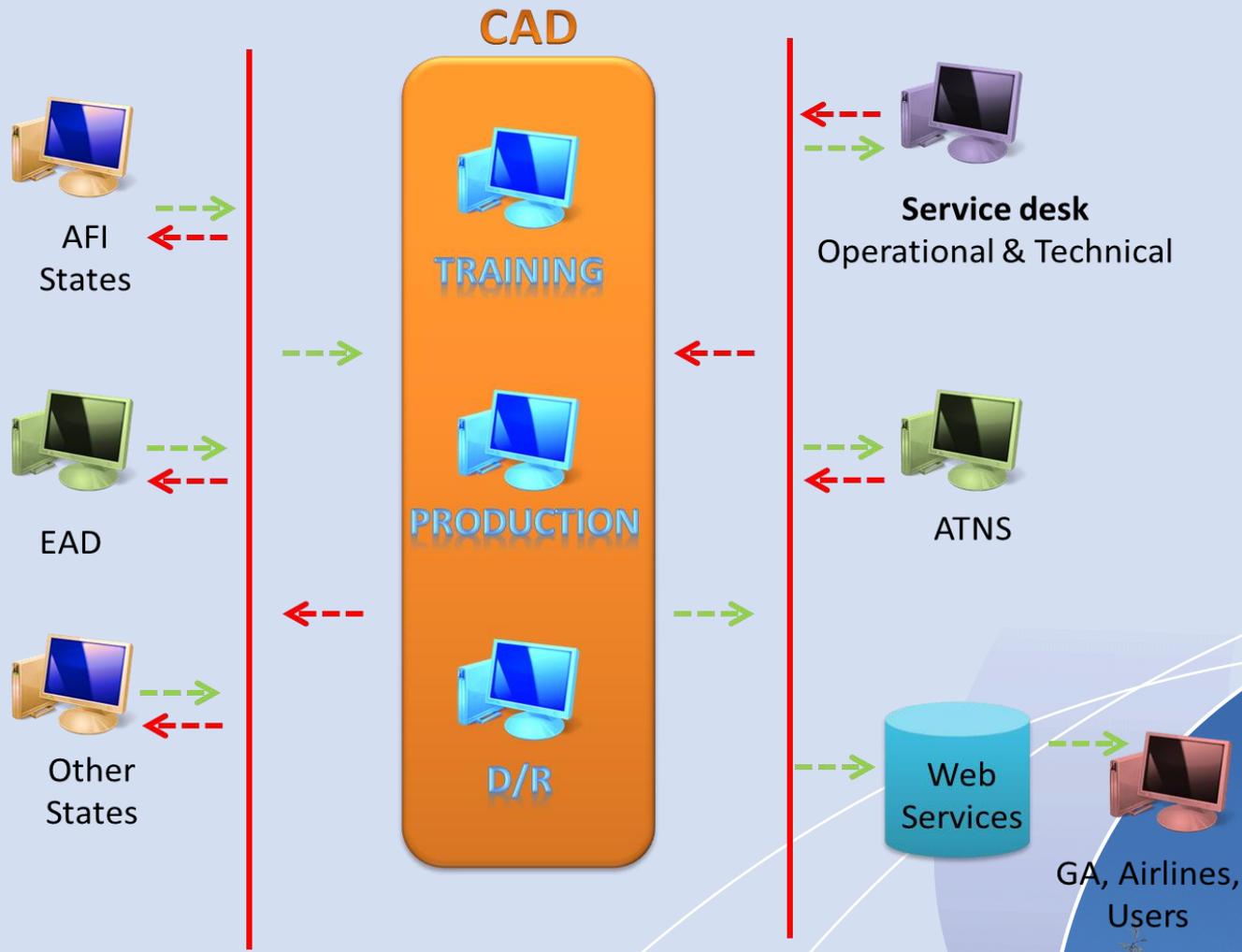


A-CAD Implementation

- Integrated AI database
 - AI repository SAT completed December 2012
 - Internal systems interoperability testing process taking place
- Data quality/integrity monitoring
 - Quality management procedures implemented within ATNS QMS 2014
- Electronic AIP
 - Review and amendment of Regulations and Technical Standards
 - MOA signed between State and ATNS June 2012
 - SmartAIP SAT completed October 2014
 - Certificate of approval signed 3 November 2014
 - eAIP GEN section generated June 2015



A-CAD Connectivity



A-CAD Namibia

The screenshot shows a web browser displaying the CANSO website. The address bar shows the URL: <https://www.canso.org/atns-and-namibian-civil-aviation-take-firm-step-towards-global-aviation-technology-alignment>. The page features a header with the CANSO logo and the tagline "TRANSFORMING GLOBAL ATM PERFORMANCE". Below the header is a navigation menu with links for "Introducing CANSO", "News", "Blog", "Publications", "Events", "Programmes", "Regions", "Products & Services", "Contact", and "Jobs".

The main content area displays a news article titled "ATNS and Namibian Civil Aviation take firm step towards global aviation technology alignment". The article is dated 26 FEBRUARY 2016 and is categorized under "NEWS". The article text states: "Air Traffic and Navigation Services (SOC) Ltd has signed an important Air Traffic Management (ATM) contract with the Namibian Directorate of Civil Aviation (NDCA). In terms of the agreement, ATNS will provide the necessary expertise and knowledge - to assist NDCA to migrate from the traditional manual Aeronautical Information System (AIS) to an International Civil Aviation Organization (ICAO) compliant automated Aeronautical Information Management (AIM) Service. ATNS CEO Thabani Mthiyane says future technologies in air navigation require the availability of and timely exchange of accurate and quality assured digital Aeronautical Information - within Air Traffic Systems. "One of ICAO's requirements as defined in the ICAO AIS/AIM Transition Roadmap - is the creation of a centralised repository for Aeronautical Information. Sharing of this information will be expanded to other aviation entities in Africa, using the appropriate exchange model." concludes Mthiyane. The Agreement will commence at the beginning of April 2016 and ensue for a period of 7 (seven) years - ending in 2023."

The sidebar on the left contains a "SUBMENU" with links for "ATM News", "Articles", "Press releases", "Speeches", "Media contacts", and "Subscribe". Below this is a "RELATED CONTENT" section with the text "Read more about Operations on:" and buttons for "NEWS", "BLOG", "PUBLICATIONS", and "EVENTS".

The sidebar on the right features the ATNS logo and a "LATEST NEWS" section. The latest news items are: "COMSOFT Solutions' SDDS-NG put into operation for Deutsche Flugsicherung, DFS" (dated 21 SEPTEMBER 2016) and "The European Commission recommends Hungarian ATM development projects for funding" (dated 21 SEPTEMBER 2016). Below these is another news item: "NAVIAR continues surveillance project with COMSOFT Solutions" (dated 15 SEPTEMBER 2016).

A-CAD Namibia

- Contract Signed with Namibia in February 2016
- Automated AIS solution
- Dynamic and Static AIM functions
- Agreement commenced at the beginning of April 2016
- 7 years implementation plan - ending in 2023.
- Phased approach



A-CAD Namibia

http://vead03:8888/eadexplorer/startDPApp.jsp?newWindow=http://vead03:8888/PAMSEcitServer/servlet/com.ead.pams.ui.commonservices.dataProvider?UserName=PAMS_fa_RBester&Signature=PS4m8bqILTV2sBV7OMqAxpD0oyageJkSkB0sBy1IDPLtp1a4KfzQL6hBeUFQdlsfneU9Rb7yh

PAMS Application View

Convert Select

Page Safety Tools

PAMS - Search

Search Create Report

Authority: Namibia (FY) Type: C Language: EN

Responsible:

Valid on: 22-Sep-2016

Start Effectiveness: 22-Sep-2016 22-Sep-2016

Modified: 22-Sep-2016 22-Sep-2016

Heading:

Filename:

Search Text:

AIP Type: All

Original File Name	eAIS	Effective Date	Heading	Section	Remark	Part	Series	Number/Year	AIRAC Flag	Effective End Date
Namibia (FY) CIVIL EN (95)										
AIP (85)										
GEN (27)										
ENR (35)										
AD (23)										
AMDT (2)										
AIRAC (2)										
FY_AMDT_A_2015_003_EN.		12-Nov-2015	AIRAC 03-2015			AD,GEN,ENR		003/2015	Yes	
FY_AMDT_A_2016_001_EN.		26-May-2016	AIRAC 01-2016			AD,GEN,ENR		001/2016	Yes	
Non-AIRAC (0)										
SUP (8)										
AIRAC (8)										
Non-AIRAC (0)										
AIC (0)										
Charts (0)										
eAIS Package (0)										



St Helena Project

http://www.atns.com/atm.php#subnav

ATNS - Air Traffic Navigati...

Page Safety Tools

Sustainability

Tenders

Bursaries

Careers

Air Traffic Management

Search



St Helena Project

The St Helena Airport is situated in a British Overseas Territory, a remote island in the South Atlantic Ocean. The St Helena Airport design, build, operate and transfer project was awarded by SHG to South African construction group, Basil Read.

The Air Traffic Control contract (sub-contracted by Basil Read) has been awarded to ATNS, who will provide Air Traffic Services (a Procedural Approach and Aerodrome Control service) and Aeronautical Information Management (AIM) services on behalf of the St Helena government.

More information for St Helena can be obtained at the following links:

- Air Safety Support International (ASSI) website: <http://www.airsafety.aero/About-ASSI/Overseas-Territories/St-Helena-and-Dependencies.aspx>
- St Helena Government website: <http://www.sainthelena.gov.sh/>

Charts related to the Aerodrome

Combined Aerodrome Chart and Parking Chart	FHSH 2-11
Aircraft Parking / Docking Chart	FHSH 2-12
Aerodrome Obstacle Chart - ICAO Type A	FHSH 2-13
- Intentionally Left Blank -	FHSH 2-14
RNAV LOC/DME RWY20	FHSH 2-15
RNAV LOC/DME RWY20 Tabulation	FHSH 2-16
DVOR LOC/DME RWY20 (Intentionally Left Blank)	FHSH 2-17

Aeronautical Information ▾

Airspace Design

Chart Design

Flight Procedure Design

Simulation Services

Traffic Forecasts

Obstacle Evaluation

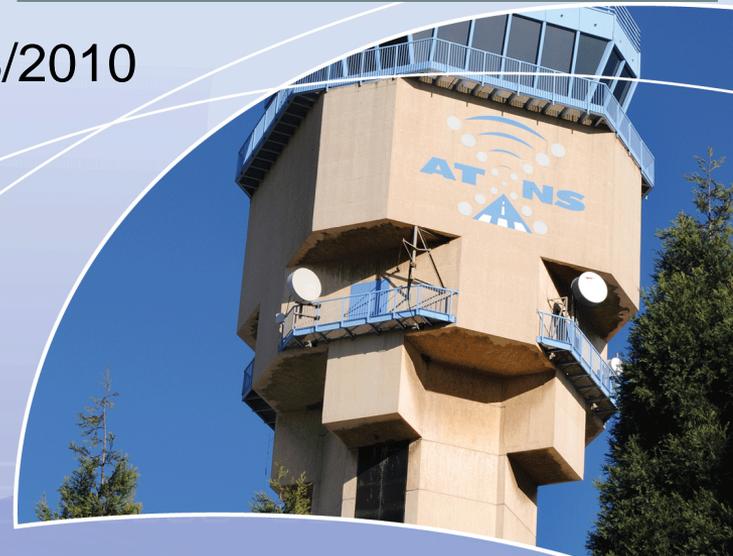
Safety Management System

Projects

Archives

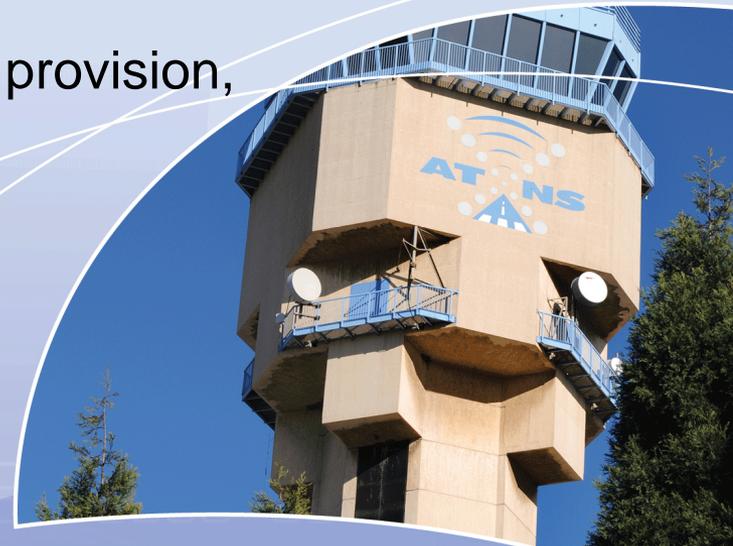
Service Level Agreements

- SLA Implementation
- Pre-requisites
 - Agreements with data originators
 - Regulations to support ADQ
 - ISO Standards/Certification (QMS)
- Cost of Certification
- COMMISSION REGULATION (EU) No 73/2010



Possible Implementation Challenges

- Data Quality Standards
- Data Migration – Meta data not available
- Amount of data to be loaded and the maintenance thereof – coding of IFP, SID/STAR, etc
- QMS processes and Procedures
- Regulations to support AIM (ADQ, Service provision, SLA's)
- Training/Qualifications of AIS
- ISO Certification of organisations



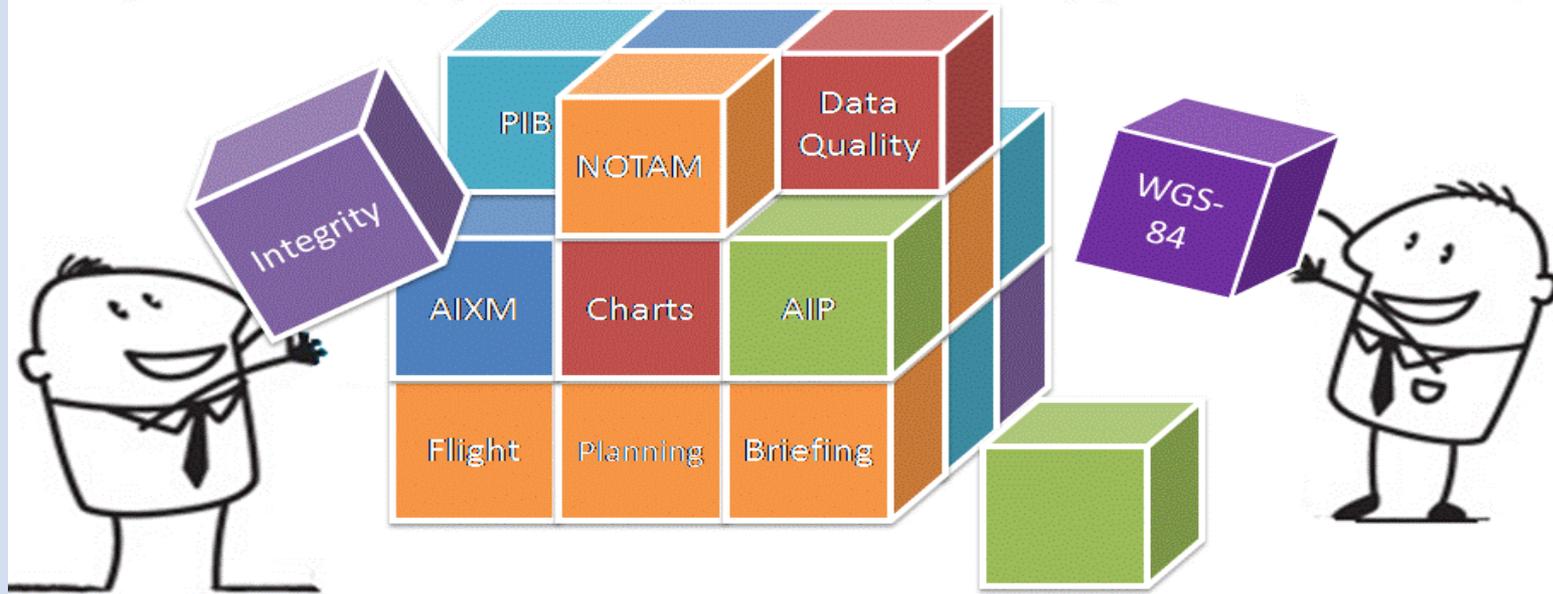
Conclusion

- Successful implementation of A-CAD requires:
- Standardised exchange mechanisms
 - Although the system languages are the same (AIXM) communication between systems is still not guaranteed. (AIXM 4.5 – AIXM 5.1)
- Connection setup
 - Infrastructure must ensure Network connectivity (SLA KPI's)
- ADQ
 - Data quality requirements supported by regulations
- Certification of Organisation providing services on behalf of another state
- Differences in Standards and State requirements
 - Differences require product changes which in turn cause delays



Thank You.

Aeronautical Information Management



The Building Blocks of the ATM Community



Contact us

ATNS HEAD OFFICE

Postal address

Private Bag X15
Kempton Park
1620

Street address

Block C, Eastgate Office Park
South Boulevard Road
Bruma 2198
Gauteng
Republic of South Africa

Contact details

Tel: +27 11 607 1000

Fax: +27 11 607 1570

Website: www.atns.com

Email: marketing@atns.co.za

THE AVIATION TRAINING ACADEMY

Postal address

Private Bag X1
Bonaero Park
1622

Contact details

Tel: +27 11 570 0400

Fax: +27 11 395 3347

Thank you