



ANSA POLICY 2023

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1. ABBREVIATIONS

ADS-B	: Automatic Dependent Surveillance – Broadcast
AIA	: Aeronautical Information Affairs
AIM	: Aeronautical Information Management
AIO	: Aeronautical Information Officer
AIP	: Aeronautical Information Publication
AIS	: Aeronautical Information Services
AMHS	: Air Traffic Services Message Handling System
ANS	: Air Navigation Services
ANSA	: Air Navigation Services Aruba N.V.
ATC	: Air Traffic Control
ATCO	: Air Traffic Controller
ATFM	: Air Traffic Flow Management
ATIS	: Automatic Terminal Information System
ATM	: Air Traffic Management
ATS	: Air Traffic Services
CEO	: Chief Executive Officer
CGC	: Corporate Governance Code
CNS	: Communication, Navigation, Surveillance
DCAA	: Department of Civil Aviation of Aruba
DC-ANSP	: Dutch Caribbean Air Navigation Service Provider
DME	: Distance Measuring Equipment
EFS	: Electronic Flight Strip
EPL	: English Proficiency Level
ETA	: Estimated Time of Arrival
FIR	: Flight Information Region
HR	: Human Resources
ICAO	: International Civil Aviation Organization
ILS	: Instrument Landing System
IMC	: Instrument Meteorological Conditions
KPA	: Key Performance Area
KPI	: Key Performance Indicator
LOA	: Letter of Agreement
MEVA	: Mejoras a los Enlaces de Voz ATS
OJT	: On-the-Job Training
OPS	: Operations
QMS	: Quality Management System
RTS	: Remote Transmitting Sites
SID	: Standard Instrument Departure Route
SMS	: Safety Management System
SOP	: Standard Operating Procedure
STAR	: Standard Arrival Route
UPS	: Uninterruptible Power Supply
VCS	: Voice Communication System
VOR	: Verry high frequency Omnidirectional Range
VMC	: Visual Meteorological Conditions
VRRS	: Voice Recording & Replay System

2. ACTIVIY REPORT 2022

ANSA (Aruba) experienced declining flights during the years 2018, 2019 and the first months of 2020, which subsequently materialized into a steady declining revenue stream, whereas the operational expenses kept increasing. Slowly but surely, we saw our profit slinking. Since March 2020, our revenues were badly affected by the COVID-19 pandemic, resulting in a huge loss for our company. This was on top of the closing of the borders with Venezuela since February 2019. In 2020 ANSA had to implement an investment stop and was forced to cut in the personnel's and other operational expenses in order to safeguard our cash flow. We succeeded in this and managed to survive the year 2020, although seriously weakened by the pandemic.

ANSA closed the year 2020 with a deep loss of Awg. 2.7 million, however the year 2021 showed a small profit of Awg. 429,250. This improvement of the financial situation of ANSA was mainly due to a significant increase in our revenues. On the one hand our ANSA Charge was increased with 10% as of January 1, 2021, and on the other hand the year 2021 was characterized by a remarkable recovery of commercial flights.

The improvement in private and commercial flights during the second year of recovery after the pandemic, namely 2022, also translated itself in increasing revenues. Total flights in 2022 (13.567) went up with 2202 flights compared to 2021. However, this is still 2131 less flights compared to 2019 (15.698), which was the last pre-pandemic year and certainly not the best year of ANSA. Total revenues in 2022 went up with Awg. 1.3 million compared to 2021 (excluding wage subsidy received in 2021 of Awg. 100,000).

These same figures for 2022 compare themselves to 2019 with 1.80% (recovery of 101.80%) increase in total revenues (Awg. 9.4 million for 2022 versus Awg. 9.2 million for 2019), however, when excluding the increase in ANS charge of 10% as of 2021, this percentage is -7.84% (recovery of 92.16%). The total revenues for 2022 compared 101.85% to our Budget 2022, a positive difference of Awg. 171,000.

As to the total expenses compared to 2021, the figures were Awg. 841,000 higher. Primarily the difference lies in the General Expenses +Awg. 237,000 (Surveillance training & Thales support contract) and in the Personnel Expenses +Awg. 544,000 (revocation of the Governmental wage cuts). Compared to the Budget 2022, the total expenses were Awg. 4,000 less.

The year 2022 closed with a profit of approximately Awg. 772,000 (un-audited). This is an improvement of Awg. 342,000 compared to 2021. Compared to the Budget 2022 the profit is Awg. 175,000 higher. Thus, the year 2022 went better than expected.

Same as for 2021, our aim for 2022 was to reach a cashflow position of at least Awg. 2.6 million (level of cashflow at the end of 2019) at the end of the year. ANSA closed the year 2022 with a liquidity position of Awg. 2.9 million. Due to delays in the execution of our planned investments during 2022, ANSA invested Awg. 570,000 less than budgeted, which had a positive impact on ANSA's liquidity position at the end of 2022.

By December 31, 2022, our overall collection rate (2015-2022) was 98.54% of all revenues from cash basis airlines and 99.61% of all commercial airlines. The collection rate of the cash

basis airlines is a bit lower due to write-offs of, amongst other, Insel Air Aruba (in 2017) and Insel Air International (in 2019).

The new billing software (Aviony) was implemented by the end of 2022. ANSA has now a software, which extracts the flight information from the Electronic Flight Strip (EFS) system and exports the flights data with corresponding ANS charges into our accounting program, ready to bill our airline customers. Prior to this software, ANSA was billing manually.

ANSA incorporated in its planning for 2022 to create its own Corporate Governance Code (CGC) in anticipation of possible regulation by the government in the near future. The Government of Aruba issued and published a report in December 2020 called Corporate Governance in Aruba (“Onderzoek naar de naleving van de basisprincipes van corporate governance in entiteiten in de publieke- en semipublieke sector in Aruba”) based on interviews with stakeholders in the various entities to determine the “Nulmeting”. This first step was highly important for any other comparison or benchmarking in the future. Most of the government entities indicated already to have started the process to create their own CGC.

With the support of Themis Institute, ANSA participated in the pilot project “Corporate Governance Manual” with the aim to centralize and digitalize the information provision and improve availability/accessibility of information and documents necessary to implement corporate governance. ANSA is still in the process of completing this web-based manual. In September and November 2022 ANSA also attended 2 conferences organized by the Government of Aruba to further strengthen the commitment of the government entities to corporate governance and its fundamental principles of accountability, transparency and integrity. The laws regarding CGC will become effective on January 1, 2024.

As to our HR activities, the training plan 2022 was implemented and covered all ANSA units. The training plan was in accordance with the training needs as indicated by the unit managers. Due to the financial situation, ANSA continued to make use of the possibilities of online training and self-study. Furthermore, as part of our efforts to continuously motivate and improve the performance of all the employees, the yearly personnel performance evaluations were carried out. 88% of the employees received a positive evaluation.

The ANSA website was revamped. This included the following: it was made mobile/tablet-friendly, a backup system was implemented, and a new user-friendly editing tool (Elementor) was purchased.

The development of the document management procedures that started in 2020 was finalized in October 2022. These procedures are described clearly and in detail, which ensures consistent and efficient implementation thereof. This was an important step in ANSA’s vision to go paperless.

The ANSA Handbook Employment Regulations includes a clear and detailed description of the rights and obligations of the ANSA employees. This handbook was further developed in 2022 and special attention was given to the description of the relevant procedures. The Collective Labor Agreement (CLA) 2019-2021 was prolonged with one (1) year and expired on December 31, 2022.

The Aruba air traffic state decree (“Landsbesluit luchtverkeer”) paragraph 15.1 requires ANSA, at all times, to have a quality and safety management system in place to achieve an acceptable level of quality and safety with regard to air traffic services.

In 2022 SMS training was provided to all ARO personnel. This training had the objective to make everyone aware of their role within the SMS and the many factors affecting safety. This was finalized on February 23, 2022.

During 2022 the ANSA Incident Investigation Team investigated 3 incidents. One serious incident and 2 incidents without any safety affect. All investigations resulted in a report containing recommendations to prevent reoccurrence. The controller who was involved in the serious incident was provided with both theoretical and practical remedial training.

The ANSA fatigue risk management system (FRMS) was updated to comply with ICAO Standards and Recommended Practices (SARPs). In this update ANSA used the scientific principles of fatigue management¹ to establish the following:

- the maximum:
 - a. number of hours in any duty period;
 - b. number of consecutive workdays;
 - c. number of hours worked in a defined period; and
 - d. time-in-position;
- the minimum:
 - a. duration of non-duty periods;
 - b. number of non-duty days required in a defined period; and
 - c. duration of breaks between periods of time-in-position in a duty period.

The FRMS is designed to mitigate the risk of reduced mental or physical performance capability resulting from sleep loss, extended wakefulness, circadian phase, and/or workload (mental and/or physical activity) that can impair a person’s alertness and ability to perform safety-related operational duties. The updated FRMS Manual was finalized on March 25, 2022, and submitted to the DCAA for approval.

The performance of the SMS between 2019-2021 was reviewed and this review was finalized in August 2022. The main conclusion of this review was that, notwithstanding the deficiencies found in the review, the safety performance has improved significantly compared to previous years. Based on the established Safety Performance Objectives (SPOs), 9 of the 12 SPOs were achieved, which gave the ANSA SMS an effectiveness rate of 75%.

The SMS Manual was reviewed and updated based on the feedback received from the DCAA on June 20, 2021. The updated SMS Manual will be finalized in 2023. The investigation procedures were updated to reflect the updated reporting procedures and investigation process. Risk assessment procedures were revised and document control procedures were updated reflecting the AFAS paperless document control process ANSA has in place. Safety promotion procedures were also updated to include yearly safety talks with operational personnel.

A quality management system (QMS) is defined as a formalized system that documents processes, procedures, and responsibilities for achieving quality policies and objectives. The

¹ These basic principles relate to: 1) the need for sleep; 2) sleep loss and recovery; 3) circadian effects on sleep and performance; and 4) the influence of workload.

ANSA QMS helps coordinate and direct ANSA's activities to meet customer and regulatory requirements and improve its effectiveness and efficiency on a continuous basis.

With regard to QMS, it is ANSA's goal that all operational units (ATC unit, AIA unit and CNS/ATM Systems unit) be ISO certified² by the end of 2024. The ANSA QMS Manual describes all steps, projects and activities ANSA is planning to execute to achieve this goal. This manual was developed, finalized and published on the ANSA website on September 28, 2022.

ANSA strongly believes in cooperation with our partners within the Kingdom of the Netherlands and has actively pursued this since we started operations on January 1, 2015. In the context of implementation of the "Landspakket" with respect to the aviation sector, a Collaboration Agreement with DC-ANSP was signed on July 1, 2022, to improve collaboration on the following areas: joint project preparation and equipment acquisition, training, MEVA network node sharing, ATM systems interface and joint missions for flight Inspection of nav aids.

A lot of effort was also put into the development and/or revision of the operating manuals for the operational units. A clean version of the Tower Manual was sent to DCAA on May 21, 2021, and DCAA provided feedback on February 17, 2022. ANSA reviewed the feedback and updated the Tower Manual as suggested. This process is ongoing and will be completed in 2023. Topics reviewed/incorporated in the revised Tower Manual were: emergency phases, NOTAM management in the Tower, FRMS, non-prescribed separation (surveillance), SMS Manual, ANSA house rules, MEVA contingency plan, surveillance expansion hours, separation procedures, new wake turbulence category, JUMP-1 procedure, EFS guide and missing flight plan procedure. The revision of the CNS/ATM Systems Manual started in 2022 and will be finalized in 2023.

To improve the coordination between ANSA and DC-ANSP, special attention was given to the revision of the Letter of Agreement (LOA) between ANSA and DC-ANSP. This process is ongoing and will be finalized in 2023. A trial was implemented and completed in April 2022 regarding inbound releases at 40NM. The main changes in the LOA were contingency procedures for Beatrix CTR (control zone) and Curacao FIR, level restriction for inbound releases (at 40NM) and SSR (Secondary Surveillance Radar) codes allocation.

The EFS project was implemented October 1, 2021, and throughout 2022 various revisions were made to the system. In June 2022 an EFS contingency plan was developed and an EFS ergonomics monitoring was completed. A TopSky EFS guide was also developed and completed in June 2022. An EFS proficiency check was done with each ATCO in August 2022 and all ATCOs passed this check successfully.

Training of ANSA's personnel to maintain and improve their competencies is of the utmost importance. Due to the expiration of the validity of the ICAO English Proficiency Level (EPL), several ATCOs got online EPL refresher training and took the Versant Aviation English exams in April 2022. The training was provided by World Wide Training & Translations. Moreover, various training scenarios were created in the simulator and the surveillance trainees received introduction to surveillance on the simulator in May 2022. Furthermore, surveillance course

² ISO 9001:2015, the international standard specifying requirements for quality management systems, is the most prominent approach to quality management systems.

was provided by the Trinidad and Tobago Civil Aviation Authority - Civil Aviation Training Centre (TTCAA-CATC) to 7 ATCOs and 1 DCAA inspector. The theoretical part was given online in May 2022 and the practical in June 2022 at TTCAA-CATC. 2 ATCOs also followed the online supervisor course provided by TTCAA-CATC, which was required by DCAA, and thereafter they were recommended, together with 1 SATC, to become surveillance OJTIs (On-the-Job Training Instructors). OJT for the surveillance trainees started in July 2022. Additionally, in September 2022 a refresher course for all ATCOs was provided on the simulator. The focus was runway 29 approaches, emergency situations, basic surveillance situations, VFR traffic and separation between IFR and VFR traffic.

VFR procedures for arriving and departure flights were drafted, reviewed and a final version was sent to DCAA in February 2022. Safety assessment was also submitted to DCAA and is pending final approval. In addition, JUMP-1 procedures were drafted, reviewed and a final version was sent to DCAA. Approval was given by DCAA in June 2022 and implemented. The restriction that was implemented by DCAA in 2017 regarding separation of all traffic with JUMP-1 was also cancelled.

The new ATCO regulation (“Regeling bewijzen van bevoegdheid luchtverkeersleiders”) was implemented in October 2022. Before this regulation was implemented, ANSA provided feedback to DCAA. One of the main topics for the ATCOs in the regulation is that each ATCO shall log their hours at Tower and Approach position and submit to DCAA for renewal of their license. To facilitate this process, a form was created for the ATCOs. Also, new reporting procedures (timeframe) were implemented in accordance with the new ATCO regulation.

With regard to ATC related QMS activities, a comparative analysis procedure was developed and implemented in December 2022 in order to compare missing and erroneous flight plans detected by the Tower with the findings of the AIA unit.

The digital logbook project was partially implemented in December 2022 and was finalized in February 2023. It was created in ANSA’s AFAS Insite platform. Digitalization has various advantages, including increased efficiency, transparency, and faster decision-making when required. Intended users (ATC and AIA personnel) have direct access to the logbook information. The scope of this project was broadened to include shift change (“dienstruil”) portal, redesign of the workflow for the various occurrence reports (incidents, emergency and general) and SharePoint link for monthly work schedule.

In order to further mitigate flight plan errors, a data collection and the corresponding root cause analysis of missing, erroneous and duplicate flight plans (TopSky ATC & TopSky AIS systems) were performed by the Manager AIA and the AIS Officer in October and November 2022 for all inbound flights.

In November 2022 a proficiency check was conducted to evaluate if further training is required for the whole AIA team or if individual remedial training is appropriate. The goal thereof was to maintain and improve the competency of the AIA team and the quality of our Aeronautical Information Services. In March 2022 the Manager AIA completed the ICAO safety management course.

To ensure the continuity of service of the WAM/ADS-B, TopSky AMHS and TopSky AIS systems, a support contract with Thales was signed on July 1, 2022.

With respect to investment projects: in 2018 and 2019 ANSA invested Awg. 1.3 million and Awg. 1.2 million respectively in equipment, systems and infrastructure. However, in 2020 most of the planned investments were postponed due to the financial malaise caused by the COVID-19 pandemic. The invested amount was therefore only Awg. 148,000.

Due to the pandemic and the financial impact thereof on ANSA, a reprioritization of our investment projects for 2021 took place. Only the investments considered strictly necessary to guarantee continuity of services were implemented. This explains why the invested amount in 2021 was still relatively low at Awg. 279,000.

For 2022 (the second year of recovery) an amount of Awg. 1,120,000 was budgeted for investments, whereas Awg. 550,000 was realized (see Table 1). The main reasons for not implementing the planned investments during 2022 were the following:

- The project Renewal TopSky ATC hardware which was awarded in March 2022 has been postponed until 2023 due to the fact that the required hardware for this upgrade is not available on the market. This has led to a broadening of the scope of the project where not only the hardware needs to be upgraded but also the TopSky ATC software.
- The Upgrade ILS/DME was also delayed because during its preparation phase it was discovered that the DME of the ILS needed replacement. In addition, due to a long lead time to manufacture parts and new equipment caused by the worldwide supply chain crisis, this project was delayed. It was awarded in October 2022. The implementation will take place in 2023, although the down payment was made in October 2022.

The following investment projects were awarded and/or (partially) implemented in 2022:

- Upgrade Voice Communication System (VCS). The largest invested amount went to this project;
- Renewal TopSky ATC hardware;
- Robust ATS System: one UPS and one UPS Automatic Transfer Switch (UATS) for the IT cabinet at ANSA's Head Office and one UPS for AIA Office to ensure continuity of AIA Services, Internet, Telephones and the Point to Point communication between ANSA's Head Office and ATC Tower. The Robust ATS System is a continuous project since 2018;
- Upgrade BEA VOR/DME: awarded in December 2022, but will be implemented in 2023 and 2024;
- Upgrade ILS/DME;
- Air Conditioners (A/C's): two new A/C's for the RTS shelter;
- Furniture, Fixtures & ICT Assets: a handheld label printer for CNS/ATM Systems unit, new ICT equipment (13 laptops, 1 all-in-one printer for AIA unit, 4 Tablets for the digital logbook for ATC and AIA units, Divos software installation by Frequentis on two new laptops and one new Juniper switch for the IT cabinet at ANSA Head Office);
- Spare Parts: repair of spare WAM/ADSB modules, one new Planet Slot Media fiber optic converter and eleven surge protectors. The latter in connection with the project cable management which was finalized in January 2023;
- Other investments: Point to Point equipment and installation for data communication between ANSA's Head Office and ATC Tower.

	BUDGET	REALISATION	BALANCE
Upgrade Voice Communication System (VCS)	380,000	342,898	37,102
Renewal TopSky ATC hardware	256,500	0	256,500
Robust AT S System	17,851	17,453	398
Upgrade BEA VOR/DME	39,000	0	39,000
Upgrade ILS/DME	230,817	87,887	142,929
TopSky AMHS /AIS upgrade	0	0	0
Upgrade RTS and Glide Path antennas	50,000	0	50,000
Upgrade VRRS (Voice Rec. & Replay System)	22,000	0	22,000
Aeronautical charts update	7,649	0	7,649
A/C's	6,000	2,240	3,760
Furniture, Fixtures & ICT Assets	50,000	54,207	-4,207
Spare Parts	50,000	35,156	14,844
Other investments	10,296	10,296	0
TOTAL INVESTMENTS	1,120,112	550,137	569,975

Table 1: Investments 2022

3. ORGANIZATION

3.1 General

ANSA started the year 2023 with 41 employees because of the resignation of one (1) ATCO in October 2022. In the first quarter of 2023 ANSA will be hiring one (1) AIO as in the third quarter of 2023 one (1) AIO will retire. Due to resignation (3x) or dismissal (1x) of several ATCOs during the last 4 years, considering the fact that 3 ATCO's have reached or are about to reach the age of 60 and taking also into account that it takes approximately 6-7 years to become a surveillance controller, ANSA will hire four (4) ATCOs in the third quarter of 2023.

3.2 Organizational structure and manpower resources

The operational organizational structure is provided in Figure 1 below.

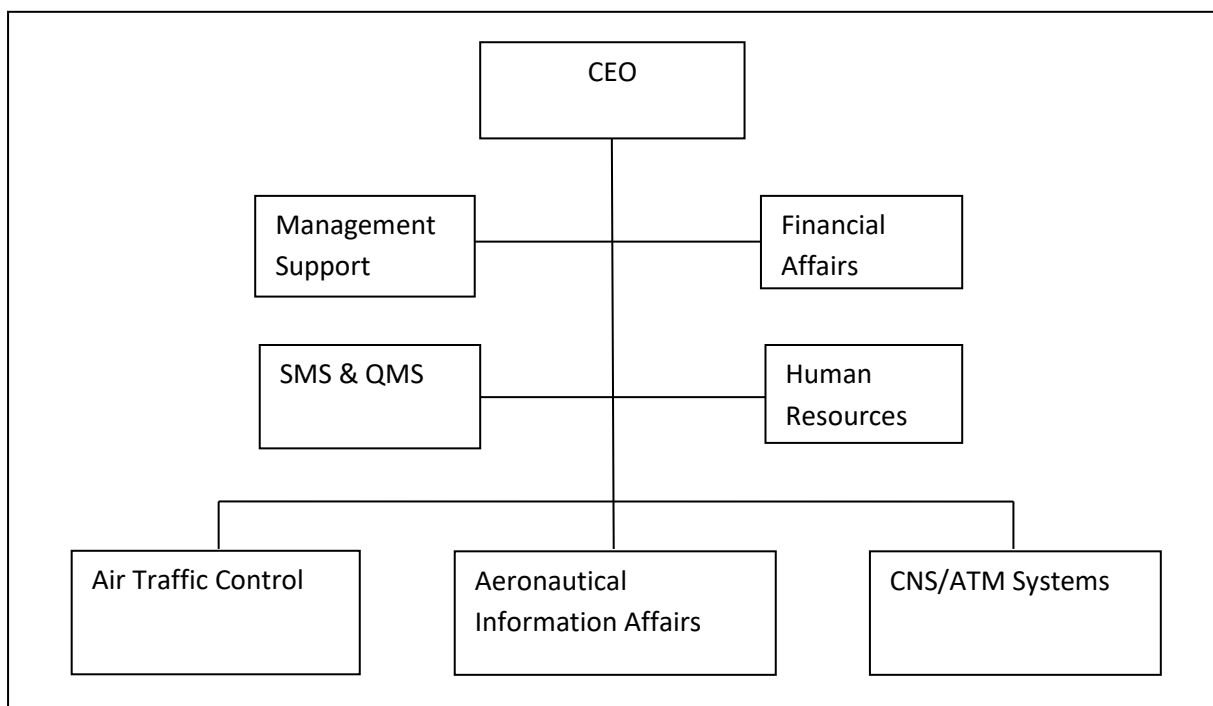


Figure 1: Organizational Structure ANSA

The CEO is the head of the ANSA organization and there is a Management Support consisting of a Management Assistant and an Administrative Assistant (2 staff). Other staff departments are the Financial Affairs (1 staff), Human Resources (1 staff) and SMS & QMS (1 staff). Compared with the previous ATS structure within the DCA, a SMS & QMS unit was added to the staff departments to comply with the requirements for quality and safety management. The staff departments are being kept to a minimum in order to maintain cost-effectiveness. The three operational units are headed by their own managers:

- Air Traffic Control (ATC);
- Aeronautical Information Affairs (AIA);
- CNS/ATM Systems.

The manpower resources available to ANSA are provided in Table 2 below. The information includes a comparison between January 1st of 2019, 2020, 2021, 2022 and 2023.

Department/position	FTEs 1-1-19	FTEs 1-1-20	FTEs 1-1-21	FTEs 1-1-22	FTEs 1-1-23
Chief Executive Officer (CEO)	1	1	1	1	1
Management Support	2	2	2	2	2
Financial Affairs	1	1	1	1	1
SMS & QMS	1	1	1	1	1
Human Resources	1	1	1	1	1
Air Traffic Control	21	24	23	22	21
Aeronautical Information Affairs	11	10	10	10	10
CNS/ATM Systems	4	4	4	4	4
Air Traffic Controller trainee	4	0	0	0	0
Total	46	44	43	42	41

Table 2: Manpower Resources ANSA

3.3 Mission, Vision and Core Values

Mission of ANSA

To make the best possible contribution to the economic development of Aruba by providing safe, efficient, and reliable Air Navigation Services to the aviation industry within the Beatrix Control Zone.

Vision of ANSA

To become one of the best providers of Air Navigation Services with the highest standards of safety and quality.

Core values of ANSA

- **Safety first:** ANSA promotes a strong safety culture and pursues the highest safety standards.
- **Service excellence:** Works to satisfy its customers and partners by delivering on commitments and always looking for the best possible outcome.
- **Involvement and motivation:** Fosters a welcoming, diverse and stable working environment where everyone has the opportunity to contribute in an open and transparent way to the decisions that affect them and is willing to go the extra mile to achieve excellence.
- **Courage and innovation:** Fosters innovation; we challenge ourselves, others, and the status quo.
- **Excellent professionals:** Continuously invests in upgrading and development of its personnel.
- **Pioneering technology:** Keeps track of technological developments and invests in new/state-of-the-art equipment.
- **Partnership:** Fosters networks and/or joint efforts on national, regional, and international level.

3.4 KPAs, Objectives and KPIs

In the coming years the operation of ANSA will focus on four Key Performance Areas (KPAs). These KPA's, together with the associated strategic objectives, Key Performance Indicators (KPIs) and strategic means to achieve those objectives are described in Table 3 below.

KPAs	Strategic objectives	KPIs	Strategic means to achieve goals
Safety	Reduction of incidents and prevention of accidents.	<ol style="list-style-type: none"> 1. Number of safety related reports per year. 2. Percentage of incidents that have been investigated within 30 days. 3. Percentage of safety recommendations implemented or in the process of being implemented. 4. Percentage of safety assessments performed with respect to planned implementation of airspace reorganizations, the introduction of new equipment systems or facilities, and new or changed ATS procedures. 5. Number of airproxes between IFR and VFR flights. 6. Number of incidents involving the coordination between CUR/ACC³ and Beatrix approach. 7. Number of reported Pilot noncompliance. 8. Number of runway incursions or excursions. 9. Number of ATM incidents⁴. 10. Number of MAC incidents⁵. 11. Number of B (hazardous) and C (major) severity level incidents. 	<ul style="list-style-type: none"> - Promote a strong safety and quality culture. - Promote and enforce compliance with the mandatory reporting program. - Continually evaluate and improve the safety management system. - Continuously review and update the coordination procedures with CUR/ACC. - Include standard clearances and standard releases in those procedures to reduce verbal coordination. - Expand the hours of ATC surveillance service when deemed necessary. - Continuously review and update the tower manual. - Review the performance of all ATCOs on a yearly basis through proficiency checks and voice recording reviews. - Provide competency-based refresher and safety training on a yearly basis. - Promote the modernization of national aviation regulation through DCAA. - Maintain a high level of equipment availability and reliability. - Develop and implement QMS in accordance with ISO 9001 requirements. - Implement investment program to ensure safe and efficient ATS. - Perform safety assessments and reviews with respect to planned or implemented airspace reorganizations, the introduction of new CNS/ATM systems or facilities, and new or changed ATS procedures. - Implement Team Resource Management (TRM).

³ Curacao Area Control Center.

⁴ Occurrences involving ATM or communications, navigation, or surveillance (CNS) service issues.

⁵ Airprox, TCAS (Traffic Alert and Collision Avoidance System) alerts, loss of separation as well as near collisions or collisions between aircraft in flight.

<p>Efficiency and quality of service</p>	<p>ANSA's final quality objective is to provide the highest degree of quality of service at the lowest possible cost to its customers and other interested parties.</p> <p>Quality objectives ATC unit:</p> <ul style="list-style-type: none"> - Facilitate efficient operations by aircraft operators; - Maintain and enhance level of competency for ATC; - Improve collaboration with DCAA; - Improve coordination with Cur/ACC; - Improve collaboration with DC-ANSP. <p>AIA unit:</p> <ul style="list-style-type: none"> - Maintain and enhance level of competency for AIA unit; - mitigate flight plan errors 	<p>ATC unit:</p> <ol style="list-style-type: none"> 1. Percentage of flights that have experienced a gate departure delay. A flight is considered to experience a gate departure delay if the time difference between start-up clearance request and start-up clearance exceeds 5 minutes. 2. Percentage of flights that have experienced an enroute clearance delay. A flight is considered to experience an enroute clearance delay when the time difference between the enroute clearance request and the receipt of this enroute clearance exceeds 5 minutes. 3. Percentage of taxi-out delays. A flight is considered to experience a taxi-out delay when the time difference between start taxi and take-off exceeds 10 minutes. 4. Percentage of arrival delays. A flight is considered to experience an arrival delay when the time difference between first contact and actual time of arrival (ATA) exceeds 14 or 15 minutes⁷. 5. Percentage of ATC personnel that perform satisfactorily on all subjects, tasks and responsibilities. 6. Percentage of the number of times that ANSA is involved by the DCAA when making decisions affecting ANSA. 7. Amount of coordination related reports submitted. 8. Percentage of the number of times that ANSA is involved by the DC-ANSP when making decisions affecting ANSA. <p>AIA unit:</p> <ol style="list-style-type: none"> 1. Percentage of AIA personnel that perform satisfactorily on all subjects, tasks and responsibilities. 	<p>All operational units:</p> <ul style="list-style-type: none"> - Develop and implement QMS in accordance with ISO 9001 requirements. <p>ATC unit:</p> <ul style="list-style-type: none"> - Improve coordination with Cur/ACC. - Proficiency checks and refresher training on a yearly basis. - Implement ATFM. - Expand the hours of ATC surveillance service when deemed necessary. - Continuously review and update SIDs and STARs and promote the use thereof. - Improve the data quality of Aruba in the Dutch Caribbean AIP. - Maintain a high level of equipment availability and reliability. - Implement competency-based training by providing refresher training on a yearly basis, as well as remedial training and training regarding new equipment and procedures when required. - Implement competency-based assessment through yearly reviews of voice recordings, proficiency checks and performance evaluations. - Implement a collaboration agreement with DC-ANSP. - Minimize verbal coordination between DC-ANSP and ANSA by including standard clearance and standard releases in the LoA and implementing the interface of the Flight Data Processing Systems (FDPS). - Mitigate non-compliance of the LoA between DC-ANSP and ANSA by both parties. - Conduct a survey amongst the ATCOs of human errors in the Tower which can affect the coordination with DC-ANSP. Negotiate, sign and implement a collaboration agreement with DCAA. <p>AIA unit:</p> <ul style="list-style-type: none"> - Implement competency-based training by providing refresher training on a yearly basis as well as
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⁷ Depending on arrival route.

	<p>(missing, erroneous and duplicate flight plans); - Ensure a high degree of aeronautical information and data quality in compliance with ICAO Annex 15, through the aeronautical information products being provided⁶.</p> <p>CNS/ATM Systems unit: - Maintain a high level of availability of CNS/ATM Systems as recommended by ICAO.</p>	<p>2. Amount of flight plan errors detected and/or reported. 3. Amount of noncompliant data submitted for publication by data originators. 4. Number of errors introduced by DC-ANSP in published aeronautical information products.</p> <p>CNS/ATM Systems unit: 1. Percentage of availability of equipment. Availability is the maximum facility service hours minus outage time divided by the maximum facility service hours.</p>	<p>remedial and training regarding new equipment and procedures when required. - Implement competency-based assessment through quarterly data reviews (flight plans and system database) and yearly proficiency checks and performance evaluations. - Make an analysis to determine the cause and severity of flight plan errors per airline/aircraft operators (root cause analysis). - Develop and implement an action plan to mitigate the flight plan errors. - Develop and implement procedures for the monitoring of flight plan errors. - Conduct a survey amongst AIOs of human errors which might contribute to flight plan errors. - Reroute outbound flight-plan messages in TopSky ATC. - Develop and implement procedures to compare missing and erroneous flight-plans information with mandatory reports that are filed by ATC personnel. - Develop and implement Multilateral Service Level Agreement (MSLA) to establish the responsibilities of each aeronautical data originator in accordance with ICAO regulation. - Develop and implement quality control procedures regarding aeronautical information products.</p> <p>CNS/ATM Systems unit: - Ensure that maintenance of CNS/ATM Systems are performed conform the procedures set forth in the CNS/ATM Systems Manual and the CNS/ATM Facility Technical Instruction Books (TIBs). - Finalize the CNS/ATM Systems Manual. - Develop Facility TIBs. - Develop CNS/ATM Systems Training Manual. - Determine which CNS/ATM Systems require a maintenance support agreement. - Determine the type of support required.</p>
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⁶These include: Aeronautical Information Publication (AIP), including Amendments and Supplements; Aeronautical Information Circulars (AIC); aeronautical charts; NOTAM; and digital data sets.

			<ul style="list-style-type: none"> - Negotiate the required type of support with vendors/suppliers. - Determine which spare parts are critical and for which systems. - Procure critical spare parts. - Perform Technical assessment of VOR/DME. - Develop investment program to ensure safe and efficient ATS.
Productivity and capacity	Increase productivity and aircraft handling capacity of ATC.	<ol style="list-style-type: none"> 1. Number of days on sick leave. 2. Number of aircraft movement per ATCO in operations. 3. Maximum number of aircraft handled per hour in VMC conditions. 4. Maximum number of aircraft handled per hour in IMC conditions. 	<ul style="list-style-type: none"> - Enhance working environment. - Implement program of organizational culture change. - Continuously review and update the employee performance evaluation system. - Proficiency checks and refresher training on a yearly basis. - Continuously review and update coordination. procedures with CUR/ACC. - Implement ATFM. - Expand hours of ATC surveillance service when deemed necessary. - Continuously review and update SIDs and STARS and promote the use thereof. - Implement Team Resource Management (TRM).
Cost-effectiveness	Keep total costs as low as possible in order to comply with ICAO's cost-based principle related to the ANS charge.	<ol style="list-style-type: none"> 1. Cost per aircraft movement. 2. Operational costs as percentage of revenues. 	<ul style="list-style-type: none"> - Implement cost control program. - Effective billing and collection policy.

Table 3: KPAs, Objectives and KPIs ANSA

4. INVESTMENTS

4.1 Investment policy principles

ANSA features different Communication, Navigation, Surveillance (CNS) and Air Traffic Management (ATM) equipment that are essential for the provision of ATS. This equipment is critical for the aviation industry and need to be maintained, upgraded and/or replaced in order to guarantee continuous operation of the equipment. With properly functioning CNS/ATM equipment, ANSA is able to provide ATS at an optimum level within the Beatrix Control Zone.

Adequate air transport can only be assured when the airlines can rely on a safe, efficient, and expeditious flow of air traffic, supported by well-functioning equipment and installations. As in previous years, ANSA's investment policy of 2023 will be primarily based on the following principles:

- Investment backlog that ANSA inherited from the DCAA will be eliminated as soon as possible.
- Focus will be on safety, efficiency, and quality of service.
- Needs and interests of airlines will be factored-in as much as possible.
- All investments will be funded with ANSA's own cash flow.

4.2 Investment Plan 2023-2025

The investment plan 2023-2025 is provided in Table 4 below and was developed in accordance with the principles mentioned in paragraph 4.1.

Our investments in 2023 will return to normal levels after two years (2020 and 2021) of almost no investments due to the pandemic and investment delays in 2022. In 2023 ANSA will invest Awg. 1.9 million. The most important investments that will be implemented in 2023 are the following:

- Renewal TopSky ATC Hardware;
- Robust ATS System;
- Upgrade BEA VOR/DME;
- Upgrade ILS/DME;
- Upgrade RTS and Glide Path Antennas;
- Aeronautical Charts Update;
- the start (i.e. preparation phase) of the New ATC Tower Annex ANSA Office Building.

	2023	2024	2025	TOTAL 2023 - 2025
Upgrade Voice Communication System (VCS)	13,355			13,355
Renewal TopSky ATC hardware	389,000	10,000		399,000
Robust ATS System	178,400	62,500	6,600	247,500
Upgrade BEA VOR/DME	97,575	200,000		297,575
Upgrade ILS/DME	275,600			275,600
ATC simulator upgrade		25,000		25,000
TopSky AMHS/AIS upgrade	10,000	223,000		233,000
Upgrade RTS and Glide Path antennas	75,000			75,000
Aeronautical charts update	200,000			200,000
A/C's	10,000	10,000	10,000	30,000
Furniture, Fixtures & ICT Assets	10,000	10,000	10,000	30,000
Spare Parts	75,000	75,000	75,000	225,000
New ATC tower Annex Ansa Office Building	500,000	500,000	2,000,000	3,000,000
Other investments	25,000	25,000	105,000	155,000
TOTAL INVESTMENTS	1,858,930	1,140,500	2,206,600	5,206,030

Table 4: Investment Plan 2023-2025

4.3 Description of Investment Projects 2023

A. Upgrade Voice Communication System (VCS)

The SolaCom Voice Communication System (VCS) was installed and put into operation in 2008. The main function of the VCS is to switch/interface telephone and radio communications between ATC and aircrafts and vice versa. The project for upgrading the SolaCom VCS started in the last quarter of 2021 and was planned to be completed in the fourth quarter of 2022. Due to the worldwide supply chain crisis, it has been delayed until June 2023.

This project entails:

- new hardware and software for the VCS;
- an upgrade of the Voice Recording and Replay System (VRRS);
- the “switch over” from analogue to IP technology;
- technical maintenance training on the system.

B. Renewal TopSky ATC Hardware

The TopSky ATC system was acquired in 2012, at that time to be used for flight planning. Since completion of the AMHS/AIS project in July 2017 flight planning is done on the AMHS/AIS system, whereas the TopSky ATC system is used for processing and displaying of surveillance data. With the aim to guarantee service continuity on the TopSky ATC system, at first it was planned to only renew all the computer hardware of the system and the network switches. However, due to the unavailability of new hardware that is compatible with the current ANSA’s version of the TopSky ATC software, it became necessary to upgrade the TopSky ATC software as well. Thus, the scope of this project was broadened. This project will be implemented in June 2023 and consists of:

- renewal of the computer PC's (servers PC's, working positions PC's);
- renewal of the TopSky ATC network switches;
- upgrade of the TopSky ATC software to a newer version to match the new equipment.

C. Robust ATS System

The main objective of the project Robust ATS System is to implement the recommendations set forth in the Report Robust ATS System, dated November 2018, to ensure a reliable ATS system that is less prone to unserviceability. Said recommendations are updated yearly.

The recommendations cover the following facilities, equipment and parts:

- the WAM/ADSB system;
- the TopSky ATC system;
- UPSs, batteries and communication equipment for the different facilities.

For the year 2023 the project Robust ATS System includes the purchase of:

- spares for the WAM/ADS-B system to ensure its continuity of service (to be purchased in March 2023);
- two new UPSs and one automatic transfer switch for the RTS shelter to ensure continuity of service of the VHF transmitter radios in case of power failure (to be purchased in June and installed in August 2023);
- one new UPS for the MEVA equipment to ensure flight plan data communication between the AIA unit and Atlanta National Enterprise Management Center (purchased and installed in January 2023);
- one new redundant UPS System for ATC Tower Equipment (purchased in February 2023 and to be installed in March 2023).

D. Upgrade VOR/DME

The VOR/DME system was installed and put into operation in 2005. The VOR allows the pilots to measure the aircraft bearing to or from the VOR/DME station. The DME provides the pilot with the slant distance between the aircraft receiver and the VOR/DME station. The goal of the project Upgrade VOR/DME is to guarantee its continuous and reliable operation and to extend its lifespan for another 5 to 10 years. The project started in December 2022 and will be implemented in 2023 and 2024.

This project entails:

- a technical support to repair the VOR antenna and transmitter modules (execution in May 2023);
- a technical site survey to determine the health of the VOR/DME system and the necessary upgrade to extend its life for another 5 to 10 years (execution in May 2023);
- a microwave radio link for the remote control and status monitor of the VOR/DME system, as required by ICAO Annex 10, Volume 1 (execution in May 2023);
- the final upgrade (phase 2), based on the recommendations of the health check (execution in the 2nd quarter of 2024).

E. Upgrade ILS/DME

The ILS/DME system was installed in 2004 and put in operation in 2005. An ILS provides pilots with both vertical and horizontal guidance during an approach to land. The DME provides the pilot with the slant distance between the aircraft receiver and the touch down zone to land. The objective of the project Upgrade ILS/DME is to guarantee its continuous and reliable operation and to extend its lifespan for another 5 to 10 years. The project started in January 2022 with a system health check from its manufacturer Selex. The actual upgrading following Selex's recommendations will be executed in May 2023.

The project Upgrade ILS/DME consists of:

- upgrading of the Localizer equipment;
- the purchase and installation of a new DME;
- OJT on the DME;
- spare parts for the DME;
- assistance during the flight check of the DME.

F. Upgrade RTS and Glide Path Antennas

There are three antenna masts at the RTS site. The antennas for ANSA's ATC transmitter radios are installed on these masts. The transmitter radios are used for ground-to-ground and ground-to-air communications. The antennas for the Glide Path (GP) and the DME (both part of the ILS System) are installed on the GP antenna mast. The last time these antenna masts were refurbished was in 2018.

The project Upgrade RTS and Glide Path Antennas will be implemented in June-August 2023 and includes the following.

- paint work (including rust removal and surface preparation);
- where necessary replace rusted bolts, nuts and washers;
- any additional upgrade still to be identified.

G. New ATC Tower Annex ANSA Office Building

The objective of the project New ATC Tower Annex ANSA Office Building is to centralize all ANSA operations at one location in order to improve efficiency and quality of service. This project consists of two phases, namely: the preparation phase and the construction phase.

The preparation phase will be implemented in 2023 and 2024 and includes:

- acquisition of a terrain from the Government of Aruba;
- hiring of an external company to design the building, prepare the specifications document, construction drawings as well as any other documentation necessary for the invitation to tender, and manage the tendering process;
- award the construction project to a contractor;
- hiring of an external company that will be responsible for the construction supervision;

The construction phase will be implemented in 2025 and 2026 and includes:

- construction of the new ATC Tower annex ANSA office building, including electrical installation, plumbing, data communication installation and other works still to be identified.

5. OTHER PROJECTS

In this chapter the projects that are not considered investments will be described separately for each organizational unit of ANSA. These projects are mentioned in the Roadmap of ANSA for 2023.

5.1 Air Traffic Control

A. Revision Tower Manual

ANSA will submit the revised Tower Manual to DCAA by April 2023. The updates which are pending revision in the Tower Manual are: digital logbook guide, updated reporting program, ATCO hours log, VFR procedures, ship crossing approach area and wake turbulence separation.

B. Tower Training Manual

ANSA submitted the updated Training Manual on October 24, 2018, and is awaiting DCAA's feedback or approval.

C. Surveillance Training Program

Certification for the 7 surveillance trainees is expected to be done in April 2023 by TTCAA-CATC. If all 7 trainees are not certified by TTCAA-CATC, ANSA's examiner will complete the certification.

D. English proficiency training and exam

All ATCOs EPL are up to date for 2023. During the hiring process the new "ATCO candidates" will receive an English Proficiency training and complete the exam in April 2023.

E. Proficiency checks and refresher course for ATCOs

The proficiency checks will be implemented in August 2023. To refresh/guide all ATCOs to understand and apply all work-related procedures correctly/uniformly and meet the required proficiency standards, a simulator-based refresher training is scheduled for May-June 2023. This refresher simulator training will focus on the following topics: VFR traffic, phraseology, approaches for runway 29, emergency situations and speed control separation. In addition, a general one-on-one classroom refresher training is planned for September-October 2023. The topics will be determined based on the outcome of the proficiency checks and a survey that is planned for August 2023.

F. Revision of LOA between ANSA and DC-ANSP

In the 3rd quarter of 2023, ANSA and DC-ANSP will complete the revision of the present LOA. Topic which is pending to be incorporated in the LOA is standard departure clearances. A trial will be done in April 2023 to evaluate the effectiveness of the standard departure procedures.

G. VFR procedures

VFR procedures to hold VFR traffic were sent to DCAA and are pending approval. These procedures are for when there are arriving VFR flights which are subject to hold due to multiple IFR/VFR arriving flights and are also meant to sequence the VFR traffic in an orderly flow.

H. QMS ATC unit

With regard to the ATC unit related QMS, the following projects will be implemented:

- Development of process flow charts (March 2023)
- Yearly assessment of documented information (Q1 2023)
- ATFM (soon after opening of Aruba's airspace for Venezuela)
- Possibility to expand ATC surveillance hours (May 2023)
- Continuously review and update SIDs and STARs (April 2023)
- Voice recording review (April 2023)
- Proficiency check (August 2023)
- Refresher training (May-June and September-October 2023)
- Performance evaluations (October 2023)
- Comparative analysis procedures (March and June 2023)
- Analysis and evaluation of unit related QMS activities (February-April 2023)
- Revision of LOA between ANSA and DC-ANSP (January-August 2023)
- Compliance monitoring of LOA between ANSA and DC-ANSP (September 2023)
- ATC Human Errors Survey (April 2023)
- A collaboration agreement with DCAA will be drafted and internally reviewed in April 2023, sent to DCAA in June 2023 and expected to be implemented in Q3 2023.

I. Digital logbook

All ATCOs received training in January 2023 on the AFAS platform for digital logbook. The digital logbook was implemented as per February 17, 2023. A soft launch took place on February 1, 2023.

5.2 CNS/ATM Systems

A. Training activities

To enhance their knowledge on the various CNS/ATM systems, the CNS/ATM Manager and Technicians will take the following training courses in 2023:

- ATSEP (Air Traffic Safety Electronics Personnel) Communication - Data Qualification (Q3 2023);
- ATSEP Communication - Voice Qualification (Q3 2023);
- OJT for the new DME (May 2023);
- maintenance training on the upgraded VCS (June 2023);
- the manager CNS/ATM Systems will do the online IATA training "Quality Management Systems (QMS) for Civil Aviation Authorities (CAA) and Air Navigation Service (ANS) Providers" (March 2023).

B. Flight Inspection of Nav aids

To assure signal accuracy in the air and to comply with the ICAO recommendations set forth in ICAO Annex 10 Volume 1 and ICAO Doc. 8071, the BEA VOR/DME and the IBE ILS/DME (Nav aids) should be calibrated, and flight inspected annually. The last calibration and flight inspection of these Nav aids⁸ was performed in March 2021 by “Radiola Aerospace” and the results were up to standard. Due to the unavailability of the ILS and the VOR, the Flight Inspection of 2022 was postponed until 2023. The next flight inspection mission is scheduled for May 2023 after completion of the project Upgrade ILS/DME and the first phase of the project Upgrade VOR/DME.

C. CNS/ATM Systems Manual

A revised version of the manual will be finalized in March 2023. This manual contains a detailed description of all the processes, procedures and instructions that are essential for the maintenance of CNS/ATM systems for the provision of safe and efficient ATS in the Aruban airspace. As part of the CNS/ATM Systems Manual, ANSA will develop Technical Instruction Books (TIBs) for all its facilities. This process started in July 2022 and will be finalized in November 2023. The TIBs that will be developed are:

- TIB VCS/VRRS (July-August 2023)
- TIB ILS/DME (May-June 2023)
- TIB VOR/DME (May-June 2023)
- TIB WAM/ADSB (September-October 2023)
- TIB TOPSKY ATC (September-October 2023)
- TIB VHF TX/RX (March-April 2023)
- TIB AMHS/AIS (March-April 2023)
- TIB ATIS (September 2023)
- TIB Supporting facilities (October 2023)

D. Calibration Test Equipment

To ensure that all test equipment used for maintenance of CNS/ATM Systems are accurate and available for the continuity of measurement capability, this test equipment need to be calibrated against the standards on a yearly interval. The process to send all the test equipment to a certified laboratory in Miami to be calibrated takes place in the 2nd quarter of each year.

E. Collaboration Agreement ANSA and DC-ANSP

The Working Group that was established to coordinate implementation of the collaboration agreement agreed to prioritize and pursue the following areas of collaboration:

- joint project preparation and equipment acquisition;
- joint training for ATC, CNS/ATM Systems and AIA;
- interface between the Air Traffic Management Systems of both entities;
- joint missions for flight Inspection of nav aids.

⁸ Nav aid (navigational aid) is a device or facility that provides position data or guidance to aircraft.

F. QMS CNS/ATM Systems unit

With respect to QMS of the CNS/ATM Systems unit, the following projects will be implemented:

- development of process flow charts (February-December 23);
- yearly assessment of documented information (Q1 2023);
- develop CNS/ATM training manual (February-July 2023);
- analysis and evaluation of unit related QMS activities (March 2023);
- finalize revision CNS/ATM Manual (see paragraph 5.2 section C);
- development of TIBs (see paragraph 5.2 section C);
- determine which spare parts are critical, for which systems and procurement thereof (June 2023);
- technical assessment VOR/DME (see paragraph 4.3 section D);
- develop/update ANSA's investment plan as part of the yearly budgeting process (Q4 2023).

5.3 Aeronautical Information Affairs

A. Training activities

The Air Traffic Services Reporting Office (ARO) is responsible for the provision of services associated with the submission of flight plans and the distribution and reception of messages of air traffic services. In addition, it distributes NOTAMs & Pre-flight Information Bulletin (PIB) based on the requirements of the aircraft crew or the representatives of aircraft operators, in accordance with the track data in the flight plan.

In order to refresh and upgrade all AIOs to understand and execute all procedures uniformly and meet the required proficiency standards, a refresher course will be given to all AIOs in April-May 2023. If deemed necessary, as part of the refresher course, a follow-up self-training program will take place from September till November 2023. The Manager AIA, along with the managers ATC and CNS/ATM Systems, and the SQ Officer, will participate in IATA's virtual quality management system course which will be held in March 2023. The Manager AIA will also attend the TTCAA Aeronautical Information Management (AIM) Certificate (Virtual) Course which will start in August 2023 with a duration of 14 weeks.

B. Transition from AIS to AIM

The main objective of the AIS to AIM transition is to enhance the process of data distribution in terms of quality and timeliness. This will contribute to improved safety, increased efficiency, and greater cost-effectiveness of the air navigation system. Derived objectives can be structured per step as defined in the ICAO Roadmap document.

In 2016 ANSA complied with the ICAO Port-of-Spain Declaration including the transition from AIS to AIM phase 1.

Phase 2 started after completion of phase 1. During Phase 2 of the transition to AIM (see table 4), the main focus is on the establishment of data-driven processes for the production of AIS products by using computer technology or digital communications and introducing structured

digital data from databases into the production processes (“going digital”).

In accordance with the letter of agreement with DC-ANSP AIS, in recent years the following phase 2 steps were completed:

- AIXM: the establishment and maintenance of a database where digital aeronautical data from a State are integrated and used to produce current and future AIM products and services is the main step in Phase 2 of the transition to AIM;
- unique identifiers: improvements to the existing mechanisms for the unique identification of aeronautical features are required to increase the effectiveness of information exchange without the need for human intervention;
- aeronautical information conceptual model: defining the semantics of the aeronautical information to be managed in terms of digital data structures is essential for introducing interoperability;
- eAIP: the electronic version of the AIP is defined in two forms: a printable document and one that can be viewed by web browsers.

In 2023 the main focus for phase 2 will be:

- data quality monitoring: an ongoing challenge for organizations producing information is to ensure that the quality of the information suits its intended uses and that data users are provided with the appropriate information about data quality;
- data integrity monitoring: data integrity requirements introduced by safety objectives must be measurable and adequate;
- terrain: the compilation and provision of terrain data sets is an integral part of the transition to AIM;
- obstacles: the compilation and provision of obstacle data sets is an integral part of the transition to AIM;
- aerodrome mapping: traditional aerodrome charts need to be complemented by structured aerodrome mapping data that can be imported into electronic displays.

Phase/Step Description	AIS to AIM Step No.	Timeline						Remarks
		2022	2023	2024	2025	2026	2027	
Phase II								
Data Quality Monitoring	P-01							SEMI-COMPLETED PLX module
Data Integrity Monitoring	P-02							SEMI-COMPLETED PLX module
AIXM	P-06							COMPLETED
Unique identifiers	P-07							COMPLETED
Aeronautical information conceptual model	P-08							COMPLETED
eAIP	P-11							COMPLETED
Terrain Areas 1, 2, 3, 4	P-13							SEMI-COMPLETED
Obstacle Areas 1, 2, 3, 4	P-14							SEMI-COMPLETED
Aerodrome Mapping	P-15							

Table 4: Timeline Phase 2 AIS to AIM Transition

C. AIA Manual

To comply with ICAO and national regulations, and to guarantee a standardized workflow for the AIA unit, an AIA Manual was developed. The manual was submitted on January 18, 2018 to the DCAA for approval and it was approved on May 28, 2019. A review/update will take place in the last quarter of 2023.

D. Data/Info of Aruba in the Dutch Caribbean AIP

To ensure the Aruba data quality, accuracy and integrity in the AIP, a complete review will be performed in 2023 by the AIS Officer under the supervision of the Manager AIA. All the data originators will be involved in this process.

E. ICAO Task Force for the implementation of AIM 2023-2025

During the first meeting of the Air Navigation Implementation Working Group (ANI/WG), it was agreed to activate a group (AIM/TF) working for the AIM implementation to support and make more efficient the implementation activities of AIM in accordance with the roadmap for the transition from AIS to AIM. This task group will have to improve processes and coordination among States, Territories, and international organizations, as well as offer to the regional planning groups and States practical guidance and advice for the development of implementation strategies of AIM. The AIM/TF will also propose the tasks that have to be done and corresponding implementation schedule, as well as update and report its progress to the ANI/WG based on the plan of action for these tasks. Approval from the DCAA was granted to manager AIA to form part of the AIM/TF. The Taskforce is pending ICAO for the activities and timeline for 2023-2025.

F. Compliance check of LOA with airlines representatives

An LOA was signed between ANSA and the ground handlers' operations in September 2021 to establish procedures for the coordination and validation of flight plans and associated ATS messages to achieve an orderly and expeditious process. The LOA also contains procedures aimed to safeguard the required competency level of the ground handlers' operations officers. A compliance check will be carried out in March-April 2023. If deemed necessary, ANSA will provide training to the ground handlers' operations officers (June-August 2023).

G. Terrain and obstacle survey 2023

In April 2023 ANSA, in cooperation with the Aruba Airport Authority (AAA), will start a project for the execution of the terrain and obstacle survey, which includes a verification of the geometric data and the processing of the data to update all the associated aeronautical procedures, charts and (coding) tables in the AIP. This is necessary to comply with the national regulations and ICAO standards. MovingDot has prepared a proposal for the execution of this project. Considering MovingDot's planning as well as the approval and publication procedures, the effective date of this AIP amendment will be November 30, 2023.

H. QMS AIA unit

With regard to the AIA unit related QMS, the following projects will be implemented:

- development of process flow charts (February-March 2023);
- yearly assessment of documented information (Q1 2023);
- AIA training manual (Q2 2023);
- analysis and evaluation of unit related QMS activities (February-April 2023);
- proficiency check (Q2 2023);
- refresher training (April-May 2023) see paragraph 5.3 section A;
- Performance evaluations (October 2023);
- develop and implement procedures for the monitoring of flight plan errors (March-April 2023);
- analysis of missing, erroneous and duplicate flight plans and development of an action plan to mitigate the errors (Q3 2023). The main goal of this project is to avoid flight plan errors which could lead to unnecessary delays;
- conduct a survey amongst AIOs of human errors that might contribute to flight plan errors (March 2023);
- develop a request for proposal to avoid duplicate outbound flight-plan messages in TopSky ATC via the AMHS switch routing and implementation thereof (March-June 2023);
- develop, sign and implement an AIM Multilateral Service Level Agreement (MSLA) to establish the responsibilities of each data originator in accordance with ICAO Annex 15 (January-August 2023);
- development of quality control procedure for AIS products (February-March 2023);

5.4 Financial Affairs

The Financial Controller provides monthly the Financial Statements, which include the Balance Sheet, Profit & Loss, Budget Comparison figures, Cash Flow Report, investment progress report, the Accounts Receivable statuses (debtor list with collection percentages for Commercial Credit and Commercial Cash Basis airlines) and the notes with an explanation of the aforementioned figures including illustrative charts. Once a year the Annual Budget is prepared, and this budget is then divided in appropriate monthly figures to be used in the comparison analyses with the actual monthly figures.

To date ANSA has closed 7 years, successfully audited and duly presented to the Supervisory Board and the Minister concerned. By the end of May 2023, the Financial Report for the closed 2022 fiscal year should be ready. Plus Accountants has been hired to audit ANSA's figures (revenues, expenses, accruals, balances etc.) and procedures, which process will start on April 6, 2023. The necessary confirmations will be requested from the different parties and the reconciliations will be provided to facilitate the verification of the final figures.

During the year 2023 (June-September) ANSA will work on the implementation of the CGC in its procedures, in anticipation of the introduction of legislation.

5.5 Human Resources

The training plan 2023 was approved on November 30, 2022, and will be implemented in 2023. In 2023 ANSA will continue to take advantage of online training opportunities. The yearly personnel performance evaluations will take place in 2023 as well. ANSA will also update its performance management system in the first quarter of 2023 in order to make it more effective. The Handbook Employment Regulations will be completed with the detailed description of all HR procedures in the first quarter of 2023. It is important for a healthy employer-employee relationship that clarity and transparency exist regarding the rights and obligations of the employee.

ANSA's website will be updated with new information (e.g. new policy paper, organizational chart and monthly ANSA Statistics). It is expected that the negotiations for a new CLA (2023-2025) will commence in the first quarter of 2023 or soon thereafter. The process of hiring one (1) AIO will be finalized in March 2023, whereas the hiring process of four (4) ATCOs will start in March 2023.

5.6 SMS & QMS

To comply with article 15 of the "Landsbesluit luchtverkeer" ANSA has developed and implemented an SMS. The ANSA SMS manual was submitted to the DCAA for approval on November 23, 2018. The DCAA has performed its review of the above-mentioned manual and shared its findings with ANSA on June 15, 2021. The ANSA SMS manual is currently being revised and updated to conform with the DCAA feedback. The revised SMS manual is expected to be submitted to the DCA by the end of March 2023.

In 2023 ANSA will continue its efforts to identify hazards through e.g., the investigation of incidents, analysis of hazard reports, safety reviews and the management of risks involved with changes in procedures and equipment. The EFS safety review is planned for April 2023. Safety talks will be held with operational personnel for the purpose of safety promotion and hazard identification (June-July 2023).

A QMS manual has been developed and ANSA is in the process of implementing a QMS. The SQ will coordinate the following QMS activities that are programmed to take place in 2023:

- Develop and implement QMS Training and awareness program (March 2023);
- Develop and implement QMS communication plan (March 2023);
- Development of document control procedures (April 2023);
- Performance evaluation of the external providers (March-June 2023);
- Develop and implement procedures to monitor and measure customer's satisfaction (April 2023);
- Develop the internal audit program and implement these procedures (July 2023);
- Top management review of QMS (July 2023).

6. CONCLUDING REMARKS

2022 was the second year of post pandemic recovery and our financials show that ANSA performed better than expected, in terms of revenues, profit and cash flow position. But, we should take into account that air traffic volume has yet to reach the pre pandemic levels. Moreover, our cash flow was positively impacted by delays in the implementation of several investments. Nevertheless, based on all the accomplishments, projects and activities of 2022, it is safe to say that 2022 was a successful year.

However, ANSA is still being confronted with huge challenges and risks. Firstly, we need to keep in mind the global uncertainties and challenges: high inflation in combination with looming recession and the war in Ukraine. It is not clear how and to what extent this will impact international tourism. Secondly, the Venezuelan border is already closed for four years and there is no clarity as to when it will be opened for air traffic. Thirdly, imported inflation in combination with recent government policy changes, such as the increase of the minimum wage and BBO, have prompted our local suppliers of goods and services to increase their prices significantly. This development will put an upward pressure on our expenses.

So far, we closed January 2023 with a negative result, while the revenues of January and February are less than budgeted. Yet, we are hopeful that with the support and cooperation of all employees, our Supervisory Board and stakeholders, we will overcome these challenges and that 2023 and beyond will be positive years for ANSA.

From the contents of this paper, it can be concluded that ANSA's projects and activities for 2023 are primarily aimed at enhancing safety, improving quality, accountability and transparency, and complying with or exceeding international standards. To achieve this, ANSA will invest in CNS/ATM equipment necessary to safeguard continuity of service. Moreover, ANSA will focus on training as well as employees' development and performance. Furthermore, special attention will be given to ways to improve coordination with DC-ANSP, strengthening of the cooperation with stakeholders, updating of operational manuals and implementation of SMS, QMS and corporate governance.

Attached is the Roadmap of ANSA, which contains a general overview and timetable for the projects of ANSA for 2023.

Annex: ANSA Roadmap 2023

