



Agenda Item 1: ANS context (ATM/CNS) Global and Regional level

**COORDINATION BETWEEN GREPECAS AND THE REGIONAL GROUP ON AVIATION
SAFETY-PAN AMERICA (RASG-PA)**

(Presented by the Secretariat)

Summary

This working study presents the metrics of improvement on the implementation of PBN in visual flight runway in Guapi, Colombia, according to what was presented at the RASG-PA meeting, and also proposes to analyze the strengthening of cooperation with the Safety implementation groups.

References:

- GREPECAS/19 report
- IP03 of meeting ESC37 - RASG PA

1. Background

1.1 The GREPECAS/19 Meeting was held virtually from October 27 to 29, 2021. The final report of the Meeting is available at the following link:

<https://www.icao.int/NACC/Pages/meetings-2021-grp19.aspx>

1.2 As part of the GREPECAS/19 agenda, the agreements and coordination for the Implementation of GREPECAS/RASG-PA Operational Safety Objectives were addressed, including GREPECAS and RASG-PA Working Arrangements.

1.3 Regarding the Coordination Meeting between the Technical Teams of GREPECAS and RASG-PA, it was commented that it was held on March 25, 2021 and aimed to begin preparing a coordinated and participatory work between both regional groups. Representatives of the GREPECAS technical teams and the Operational Safety Monitoring and Reporting Team (SMRT) attended; concluding that the result of this meeting was to achieve greater cooperation between GREPECAS and RASG-PA in order to encourage communication and contact of their respective technical teams, opening the possibility for more meetings of this type to continue to be scheduled.

2. Analysis

2.1 Between 25 and 26 May 2022, the 37th meeting of the RASG-PA Executive Committee (ESC/37) was held. This event presented the status of RASG-PA projects, including the "PBN to Visual" project that is coordinated through the Secretariat with respect to the GESEA/SG2 initiative "PBN Approach to visual flight runway".

2.2 It was reported that, in June 2021 the implementation of PBN procedures in Guapi, Colombia, was executed, with the participation of Aerocivil and SATENA. Since its implementation, flight data was collected to allow comparison with data corresponding to a period prior to implementation, so that conclusions can be drawn about the potential benefits. The following tables were available to obtain the results of the metrics:

2.2.1 Safety metrics

Unstable Approaches and Continued landing after Unstable Approach are precursors to at least 24% of all fatal Runway Excursions.

Table 1

	Year before	Year after	Change
Unstabilized approaches	12/year (2.5 % of all approaches)	0/year (0% of all approaches)	-100%
Hard landings	2/year (0.42% of all landings)	0/year (0% of all landing)	-100%

Additionally, a survey was sent to all (29) pilots from the only operator serving Scheduled operations to SKGP asking if:

- 1) They consider the PBN procedure increased the overall safety level of SKGP operations;
 - 2) They consider that the PBN favors Stable Approaches as compared with the visual procedure;
 - 3) They consider that the PBN procedure favors crew situational and terrain awareness during approaches to SKGP; and
 - 4) They consider that the PBN procedure reduces crew workload during approaches to SKGP.
- 100% of responses were positive.**

2.2.2 Other metrics

Table 2

	Year before	Year after	Change
Cancelations by weather	28/year (5.83% of all operations)	14/year (2.92% of all operations)	-50%
Fuel consumption	241 Tn/year	204 Tn/year	-15.3%
CO2 Emissions	747 Tn CO2/year	642.6 Tn/year	-15%
Time savings	24 flight hours/year		

2.3 Consequently, SAMIG and its contributor GESEA group, cooperates with the GASP implementation bodies in terms of operational safety initiatives, in the particular case, the implementation of PBN on visual flight runways. Obtaining the metrics in Guapi is of great interest for the analysis of the aforementioned Groups.

3. Suggested actions

3.1 The meeting is invited to;

- a) Take note of the information provided in this document; and
- b) discuss relevant matters to strengthen cooperation with safety implementation bodies, as appropriate.