Loss of Control (LOC)
Safety Enhancement Initiatives
Conclusion of APRAST/2

Kim Trethewey

Facilitator

23 August 2012

LOC Sub-group

- Update on LOC SEIs
- Identification of Champions
- Recommendations

APRAST 1 - LOC

- Reviewed 6 proposed SEIs
- Identified 7 additional SEIs
- Preliminary priority ranking by Impact / Changeability index

APRAST 2 - LOC

- Reviewed 13 APRAST/1 SEI
- Identified redundancy and overlap
- Refined to 7 SEI
  - 4 priority
  - 1 non-priority
  - 1 no further action
  - 1 refer back to plenary
- ranking by Impact / Changeability index

Status of SEIs

LOC 1 -- Use of SOPS (Standard Operating Procedures)

The establishment, maintenance and appropriate use of flight crew SOP's to reduce the risk of LOC events.

Statement of Work:

Airline operators publish, maintain and enforce clear, concise, and accurate flight crew standard operating procedures (SOP) to reduce the risk of LOC events.

Champion: CAA Singapore

DIP developed

Status of SEIs

LOC 2 -- Hazard Identification and Risk Management

Implementation of safety management practices (hazard identification and risk management) into operational processes & decision making.

***Statement of Work*:**

develop guidance materials to support safety management practices, including the use of FDA, reporting systems, etc. as elements of hazard analysis to identify the precursors to loss of control events.

Champion: Association of Asia Pacific Airlines

DIP developed

Status of SEIs

LOC 3 -- Safety Information (Flight Safety Documents System)

Conclusion: Flight Safety Documents System, in general, apply broadly to all safety areas, not only loss of control. SOPs are part of a flight safety documents system and being addressed under LOC 1

Recommendation: No further action required on LOC 3

Status of SEIs

LOC 4 -- Flight Crew Proficiency

Use of information from SMS in the training and qualification processes to mitigate risk that could lead to a LOC event.

Statement of Work

Identify need, sources and distribute guidance to operators on need information from FDM, line operational observations, lessons learned and non-punitive reporting programs for continuous training program enhancements to reduce the risk of LOC events.

Champion: DCA Malaysia

DIP developed

Status of SEIs

LOC 5 -- Human Factors and Automation

Increase flight crew Inflight Awareness of aircraft Mode, configuration, attitude and Energy State Management (Human Factors and Automation)

Statement of Work

Implementation of policies and procedures relating to mode awareness and energy state management

Guidance material will be identified and shared with regulators and operators.

***Champion*:** Nepal Airlines

DIP developed

Status of SEIs

LOC 6 -- Loss of Control Training

Establish and implement flight crew training to improve knowledge, understanding and ability to prevent, recognize and recover from flight conditions outside of the normal flight envelope.

Statement of Work

Identify information and practices for flight crew training to improve knowledge, understanding and ability to prevent, recognize and recover from flight conditions outside of the normal flight envelope. Includes Advanced Manoeuvres Training (AMT)

Champion: not identified

DIP developed (draft)

Status of SEIs

LOC 13 -- Loss of Control: Information Sharing

Improve the sharing of flight safety information – Regulator to Regulator, Operator to Operator with support of industry Associations

Includes information derived from mandatory and other reporting systems, as well more sophisticated systems (e.g., ASAIS)

Sharing would likely increase with experience and mutual confidence.

Comment: Applies broadly to all safety areas, not only loss of control.

Recommendation: The Safety Data Sharing proposed SEI is referred back to plenary for further consideration.

Next Steps

- Work on priority SEIs to continue under Champions
- Champion to be identified for non-priority DIP

Thank you

LOC Sub-group

Number	Action	Impact	Changeability	IC #	Selected Priority
LOC 7	Implementation of safety management practices into operational processes & decision making	High	Moderate	P2	1
LOC 8	Loss of control training (AMT: recognition & prevention)	High	Moderate	P2	
LOC 11	Mode Awareness / Energy management (Human factors: Communications of mode & energy state)	high	moderate	P2	
LOC 2	Risk assessment & management (Development, guidance, promotion – original)	High	moderate	P2	
LOC 6	Loss of Control training (AMT: Original)	High	Moderate	P2	

LOC Sub-group

LOC 13	Loss of Control: Data Sharing (BASIS / ASAIS-like collection, analysis & sharing)	High	Difficult	P3	
LOC 12	Mode Awareness / Energy management (Design)	High	Difficult	P3	
LOC 3	Safety Information	High	Medium	P4	
LOC 4	Flight Crew Proficiency	Medium	moderate	P5	
LOC 10	Mode Awareness / Energy management (Knowledge, Recognition & Awareness)	medium	moderate	P5	
LOC 9	Loss of control training (AMT: Recognition & recovery)	Medium	Difficult	P6	
LOC 1	Hazard Identification, and risk assessment and management	Medium	Easy / (potentially more complex across a system)	P7	
LOC 5	Human Factors and Automation	Low	Easy	P7	