Ramp simplification concept
Objectives – Applicable to IGOM chapter 3 & 4

- Review the entire ramp process as currently documented
- Identify current ramp processes or procedures that can be simplified
- Identify and include any missing ramp processes or procedures
- Inclusion of ramp digital, environmental and automation procedures where applicable
- Restructure IGOM chapters 3 and 4 as per “new” proposed chronological layout
- Ensure the “new” defined ramp processes and procedures drive ground operations auditing standards in lieu of ISAGO HDL and AGM disciplines
# IGOM Chapter 3 and 4 - SWOT Analysis

<table>
<thead>
<tr>
<th><strong>Helpful</strong></th>
<th><strong>Harmful</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>STRENGTHS</strong></td>
<td><strong>WEAKNESSES</strong></td>
</tr>
<tr>
<td>- Structure and content consistency</td>
<td>- Not all ramp process fit to the new structure (e.g. ad-hoc situation or process which are not chronological to the Pre-arrival, arrival, departure and post departure process)</td>
</tr>
<tr>
<td>- Review and identify process steps that are missing, repeated or conflicting with other procedures</td>
<td></td>
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<tr>
<td>- Credibility of process</td>
<td></td>
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<tr>
<td>- Easier linkage with oversight programs (i.e., Chapter 6, AHM 1100-recurrent assessment)</td>
<td></td>
</tr>
<tr>
<td>- Consistency for process interpretation between different stakeholders (i.e., operational personnel and auditors)</td>
<td></td>
</tr>
<tr>
<td><strong>OPPORTUNITIES</strong></td>
<td><strong>THREATS</strong></td>
</tr>
<tr>
<td>- Alignment with ground handling auditing standards that reflect the revised agreed mapped process</td>
<td>- Big scope of work</td>
</tr>
<tr>
<td>- Engage with the industry to identify major areas of concern</td>
<td>- Additional work for companies who have already aligned with IGOM</td>
</tr>
<tr>
<td>- Simplification of terminology (language)</td>
<td>- Confusions between old and new structure during implementation</td>
</tr>
<tr>
<td>- Extend the same structure for above the wing processes (Chapter 1 and 2)</td>
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<tr>
<td>- Drive implementation of IGOM</td>
<td></td>
</tr>
</tbody>
</table>
Proposed new structure - Layout

Overview of IGOM Chapter 3 & 4
Chapter 3: Aircraft General Safety / Servicing Operations

3.1 Ramp Safety in Aircraft Handling

3.1.1 Introduction
3.1.2 General Ramp Safety
  3.1.2.1 Engine Danger Areas
  3.1.2.2 Engine Danger Area Diagrams
  3.1.2.3 ERA & ERL
  3.1.2.4 F.O.D
3.1.3 Safety Instructions for Operating GSE
  3.1.3.1 General Safety Instructions
  3.1.3.2 Basic Operating Requirements for GSE
  3.1.3.3 Non-Motorized GSE
  3.1.3.4 GSE Safety Driving & Parking Inside ERA
  3.1.3.5 PBB
  3.1.3.6 Passenger Stairs
  3.1.3.7 Belt Loader
  3.1.3.8 ULD Loader
  3.1.3.9 Elevating Equipment
  3.1.3.10 Tractor / EBT
  3.1.3.11 ULD Transporter
3.1.4 Walkaround damage check (new)
3.1.5 The ground crew (new)

3.2 Safety During Fueling / Defueling

3.2.1 Fuel Safety Zone
3.2.2 Fuel Spillage
3.2.3 Fueling / Defueling With Pax on Board

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3.3.2 Wintry or Slippery Conditions
3.3.3 Storms / Lightning
  3.3.3.1 Storms / Lightning Work Instructions
  3.3.3.2 Lightning Alert Callout
  3.3.3.3 Counting Method
3.3.4 High Winds Conditions
3.3.5 High Winds Activity Table
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3.3.7 Intense Heat

3.4 Hand Signals

3.4.1 Introduction
3.4.2 General Conditions for Using Hand Signals
3.4.3 Specific Requirements for Using Marshalling Hand Signals
3.4.4 Guide Persons Hand Signals for GSE
3.4.5 A/C Movement Hand Signals - HSO to Tug Driver
3.4.6 A/C Movement Hand Signals - Wing Walker to HSO / Tractor Driver
3.4.7 Marshalling Hand Signals for Aircraft
3.4.8 Technical / Servicing Hand Signals - Ground staff to Flight Crew
3.4.9 Technical / Servicing Hand Signals - Flight Crew to Ground Staff
Chapter 3: Aircraft General Safety / Servicing Operations

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3.5.2 Hygiene Precautions
3.5.3 Toilet Servicing Procedure
  3.5.3.1 General
  3.5.3.2 Draining
  3.5.3.3 Servicing During Freezing Conditions
  3.5.3.4 Inoperative Toilet Systems

Potable Water Servicing
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  3.6.2.1 Filling A/C Water Tanks
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3.6.3 Potable Water Hygiene Requirements
  3.6.3.1 Fill Points & Water Cabinets
  3.6.3.2 Water Service Vehicles & Towed Carts
  3.6.3.3 Water Servicing Staff
  3.6.3.4 Water Treatment Chemicals (Sanitiser)
  3.6.3.5 Water Service Vehicle Cleaning & Disinfection
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3.7.3 Cleaning & Disinfection Products
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  3.7.3.2 Product Selection
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  3.7.4.4 Cabin Crew Seats & Service / Entry Door Lining Panels
  3.7.4.5 Lavatories
  3.7.4.6 Passenger Seating Area
  3.7.4.7 Crew Rest Compartments
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3.8 Safety During De-Icing / Anti-Icing Operations
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   4.1.2.1 Introduction
   4.1.2.2 Communication
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4.3.1 Wheel Chock Placement
4.3.2 Chock Placement Diagrams
4.3.3 Regional A/C Chocking

4.4 Aircraft Coning
4.4.1 Safety Cone Placement & Removal
4.4.2 Cones for Wing Mounted Twin Engine A/C
4.4.3 Cones for Fuselage Mounted Twin Engine A/C
4.4.4 Cones for Wing Mounted Twin Prop A/C
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4.5 GSE Positioning & Operation
4.5.1 Positioning & Operating GSE
   4.5.1.1 Basic Operating Requirements for GSE
   4.5.1.2 GPU & FPU
4.5.2 Cooling/ Heating Units/ PCA
   4.5.2.1 PBB
   4.5.2.5 Passenger Stairs
   4.5.2.6 Belt Loader
   4.5.2.7 ULD Loader
   4.5.2.8 ULD Transporter
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4.6 Aircraft Doors
4.6.1 General Safety Requirements
4.6.2 Cabin Access Doors
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Chapter 4: Aircraft Turnaround

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4.5.1.3 Main Deck Loading of Freighter A/C
4.5.1.4 Bulk Loading
4.5.1.5 Identifying Shipments Requiring Special Handling
4.5.2 Aircraft Ground Stability
4.5.3 Scaling Process
4.5.4 Safety Precautions For an Unload
4.5.6 Unloading Procedures
4.5.7 Cargo Hold Inspection
4.5.7.1 General
4.5.7.2 Cargo Hold Damage
4.5.7.3 Spills in Cargo Holds

ADD INFORMATION BOX CROSS REFERENCING LOAD HANDOVER
ADD INFORMATION BOX CROSS REFERENCING AIRCRAFT SERVICING

4.6 Aircraft Loading
4.6.1 Loading
4.6.1.1 Load Handover
4.6.1.2 Load Transportation
4.6.1.3 Load Delivery for Departure
4.6.1.4 Loading Procedures

ADD INFORMATION BOX CROSS REFERENCING 4.5.1 / 4.5.2

4.6.2 Securing of Load
4.6.2.1 General Rules
4.6.2.2 Bulk Compartments
4.6.2.3 Securing of ULD’s
4.6.2.4 Tie Down
4.6.2.5 Use of Tie-Down Material
4.6.2.6 Standard Lashing
4.6.2.7 Securing DG

4.6.3 Load Spreading
4.6.4 Aircraft Unit Load Devices
4.5.9.1 General
4.5.9.2 Identification / Labelling of ULD
4.5.9.3 Checking ULD on The Ramp

4.6.5 Transport of Cargo & Mail in Passenger Cabin

ADD IN INFORMATION BOX CROSS REFERENCING FINAL LOADING PROCEDURES AND
Chapter 4: Aircraft Turnaround

4.7 Aircraft Departure
4.7.1 Introduction
4.7.2 Ground Staff Member Responsibilities
4.7.2.1 Responsible Ground Staff Member for Departure
4.7.2.2 Tractor Driver
4.7.2.3 Wing Walker
4.7.3 Pre-Departure Activities
4.7.3.1 PD Walkaround Check
4.7.3.2 PD Table
4.7.3.3 PD Communications
4.7.4 Connecting the Pushback Vehicle
4.7.4.1 General
4.7.4.2 Nose Gear Steering
4.7.4.3 Connecting PBT & Towbar
4.7.4.4 Connecting TLW
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4.7.4.6 Connecting RC Tractor to Main Gear
4.7.5 Safety Cones & Wheel Chock Removal
4.7.6 Departure Communications
4.7.6.1 General
4.7.6.2 Departure Comms Dialogue
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4.7.6.4 Departure Dialogue Using a Power Push Unit
4.7.6.5 Departure Comms Without Interphone
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4.7.7 Pushback Maneuver
4.6.7.1 Anti-Collision Lights
4.6.7.2 Pushback Requirements
4.6.7.3 Staff Safety During Pushback Maneuver
4.6.7.4 Pushback & Pull Forward
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4.6.7.7 Maneuvering During Low-Viz Conditions
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4.6.8.1 Comms During Engine Start
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4.6.9 Incidents During Pushback
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4.6.9.2 Incidents Involving PPU
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4.6.11 Pushback Process Completion
4.6.11.1 Re-Establishing Comms After Departure
4.6.11.2 Initiated From Flight Deck
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4.6.12 Incidents During Pushback
4.6.12.1 Incidents Involving TBW or TLW
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4.7 Open Ramp Departure
4.8 Aircraft Powerback Operations
4.9 Post Departure
Chapter 4: Aircraft Turnaround

4.9 Aircraft Towing

4.9.1 Introduction

4.9.2 Ground Staff Member Responsibilities
   4.9.2.1 Responsible Ground Staff Member
   4.9.2.2 Tractor Driver
   4.9.2.3 Brake Operator
   4.9.2.4 Wing Walker
   4.9.2.5 Headset Operator
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4.9.3 Pre-Towing Activities
   4.9.3.1 General
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4.9.4 Towing Maneuver
   4.9.4.1 Towing Speeds
   4.9.4.2 Towing Limits
   4.9.4.3 Towing Onto Parking Stand
   4.9.4.4 Movement into/out of Hangars

4.9.5 Incidents During Towing

4.9.6 Towing Completion

4.10 Long Term Parking of Aircraft

4.10.1 Introduction

4.10.2 Aircraft Movement
Color code in the layout

- **Black text**: Content maintains same sequence in numbering
- **Greyed out text**: Content removed from current section
- **Orange text**: Content moved to correct sequence section
- **Green text**: Proposed new content

Key task; Review each section and ensure it addresses process adequately
Road Map 2021 - 2024

Initiation phase
- Work from April 2021

Collaboration phase
- Work from April 2022

Execution phase
- Work from April 2023

Launch
- APRIL 2024
- IGOM Ed. 13 published with new structure

Mapping of all ramp services chronologically
Gaps identification
New structure and layout for Ch.3/4
Implementation road map

Commence Process Content Review & Development
Alignment of ISAGO standards with IGOM

Gather Industry Input
Finalization of structure

Publish a new structure within Ch.3/4
Freeze structure for a period of time

New structure in IGOM 12TH - FOR INFO
Enhancement of portal
Industry feedback

For feedback Kindly write to IATA Ground Operations  IGOM@iata.org