



AERODROME VEHICLE OPERATORS MANUAL

Owen Roberts International Airport



Revision 3- Jan 18, 2016

Annex "C" to the Owen Roberts International Airport Aerodrome Manual

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Revision History

1st Edition

6 April 2009

The ORIA Airside Vehicle Operators Manual has been written to provide the users of Owen Roberts International Airports with safe procedures for driving vehicles on the airside areas of the aerodrome. It clearly outlines the procedures for training of drivers and the application process for obtaining the Airside Vehicle Operators Permit. This manual was produced in compliance to the requirements of the OTAR part 139.G.161, and ICAO Annex 14.

2nd Edition

16 February 2012

The Manual is being updated to include regulatory comments to improve the flow of information in the manual and a new format is introduced to the introduction pages leading up to Section 1. The whole document was affected by new numbering system and precluded a revision to the entire manual. A revised vehicle inspection checklist has been adopted as well as a new application for AVOP permit renewal.

3rd Edition

18 Jan 2016

The manual is being revised to maintain conformity of script and style to other CIAA manuals. On this date we have added guidance on driving procedures to be used during movement of Code “D” aircraft on the commercial ramp and a section on Safety Infraction tickets. This program was designed to increase awareness of safety rules while operating on the airside for all drivers as well as operators.

Record of Amendments

Amendment number	Subject

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PREFACE

This Aerodrome Vehicle Operators Manual (AVOM) is intended for persons who drive vehicles or motorized equipment on the movement area of the Owen Roberts International Airport (ORIA). This AVOM is Annex “C” of the Owen Roberts International Airport Aerodrome Manual and as such, any changes in this Manual must be approved by the Civil Aviation Authority of the Cayman Islands (CAACI) before implementation.

The Manual contains mandatory procedures and information related to the safe operation of vehicles and equipment on an airport but may not necessarily include procedures to cover specific conditions which may occur from time to time; some situations are unique. Such situations should be addressed by applying the rules of right of way and best judgment in the interest of safety.

The cooperation of everyone is necessary to prevent potentially serious accidents on airports. The CIAA has compiled this manual to be used in employee training, in order to promote safety by helping to reduce runway incursions, miscommunications with Air Traffic Control and apron mishaps. Employees who operate vehicles or equipment on airports also have key responsibilities in these efforts. **It is ultimately the vehicle operator who is responsible for the safe operation of the vehicle. Employers have the responsibility to ensure that vehicle operators are given appropriate training and briefings before being assigned to any duties in the movement area and that any deficiencies are promptly corrected.**

By its nature, it is necessary for some of the information in this Manual to be generic. In addition to orientation and operational information, the Manual includes other information that a ground vehicle operator will find relevant, such as control of foreign object debris (FOD), security, and reporting accidents/incidents.

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Manual Distribution Policy & Amendment Procedure

The latest version of this manual is available in electronic format on the CIAA’s website - <http://www.caymanairports.ky> and can be viewed by selecting the “at the airports” button at the top of the page, then click the tab for publications. Hard copies are produced for distribution to the companies listed in the tables below. Any hard copies printed by recipients of electronic distribution are not controlled; therefore, care must be taken to ensure paper copies are replaced with the latest amended version.

CIAA/CAACI Personnel

Chief Executive Officer Cayman Islands Airports Authority	Chief Safety Management Officer
Director General of Civil Aviation	Chief Security Officer
Chief Airport Operations Officer	Manager CNS
Airport Manager CKIA	Chief of Commercial Services
Facilities and Projects Manager	ORIA Rescue and Fire Fighting Service
Air Traffic Control Manager	
Chief Financial Officer	
CKIA Rescue and Fire Fighting Service	
CKIA Air Traffic Control Tower	
ORIA Air Traffic Control Tower	

Airlines/Handling Agents

Air Agencies Ltd.	Air Canada
American Airlines	British Airways
Cayman Airways Ltd. / Cayman Express / CAL Engineering	Cayman Islands Helicopters
United Airlines	Delta Airlines
Jet Blue	Island Air Ltd.
FedEx	DHL
Sprint Services	UPS

Ground Services Agents

Airport Professional Services	Goddard Catering Services
Cayman Dispatch Services	Flowers Air Dispatch Services
Flowers Security Services	Reliable Industries Ltd.
Rubis Fuels Ltd.	SOL Petroleum Ltd.

Retail Tenants

Airport Lounge/Hungry Horse	Black Coral Jewelry
Island Companies Ltd.	Jacques Scott/Caymania Duty Free
Kirk Freeport Ltd.	Papillion
Tortuga Duty Free	Bodden Freeport

Government Agencies

Department of Agriculture	H.M. Customs Department
Department of Environment (M.R.C.U.)	Department of Immigration
Postal Department	Royal Cayman Islands Police
Department of Tourism	Cayman Islands Fire Service
Civil Aviation Authority of the Cayman Islands	Office of the Governor

Other Partners

Bodden Funeral Home	Churchills Funeral Home
Fosters	Progressive Distributors Ltd
Jacques Scott	

The Airside Vehicle Operators Manual is Annex C to the Owen Roberts International Airport Aerodrome Manual and any proposed change to this manual will be reviewed to establish impact on the Aerodrome Manual or any of its other Annexes. The CSMO in collaboration with the Chief Airport Operations Officer is responsible for the development and amendment of the ORIA AVOM.

When the manual is to be amended, in most cases a Safety Directive will be issued to all companies who have business on the airside of the airport. The Safety Directive will be read and signed by all persons in each company and a copy of the signed Safety Directive will be sent to the Safety Office indicating they have read and understand the directive and this will be kept on file for seven years. In the case where the manual has to be amended/revised without a Safety Directive issued, the same procedure will be followed and each company will return a copy of the notice of amendment/revision with signatures from all their employees indicating they have read and understand the changes.

When there is a need for a change to the manual, an electronic copy of the amended manual will be emailed to the Civil Aviation Authority of the Cayman Islands (CAACI) along with details of the amendment. Once the amended Manual is approved by the CAACI a copy of the approved manual will be returned to the CSMO. The CSMO will use the procedures stated above to notify appropriate parties of the change and load the approved amended version on internet site <http://www.caymanairports.ky> .

Glossary of Terms

ACCIDENT

An **accident** or a **mishap** is an incidental and unplanned event or circumstance, often with lack of intention or necessity. It usually implies a generally negative outcome which might have been avoided or prevented had circumstances leading up to the accident been recognized, and acted upon, prior to its occurrence.

AIRCRAFT ACCIDENT

An occurrence associated with the operation of an aircraft which, in the case of a manned aircraft, takes place between the time any person boards the aircraft with the intention of flight until such time as all such persons have disembarked, or in the case of an unmanned aircraft, takes place between the time the aircraft is ready to move with the purpose of flight until such time as it comes to rest at the end of the flight and the primary propulsion system is shut down, in which:

- a) a person is fatally or seriously injured as a result of:
 - being in the aircraft, or
 - direct contact with any part of the aircraft, including parts which have become detached from the aircraft, or
 - direct exposure to jet blast, *except* when the injuries are from natural causes, self-inflicted or inflicted by other persons, or when the injuries are to stowaways hiding outside the areas normally available to the passengers and crew; or
- b) the aircraft sustains damage or structural failure which:
 - adversely affects the structural strength, performance or flight characteristics of the aircraft, and
 - would normally require major repair or replacement of the affected component, *except* for engine failure or damage, when the damage is limited to a single engine, (including its cowlings or accessories), to propellers, wing tips, antennas, probes, vanes, tires, brakes, wheels, fairings, panels, landing gear doors, windscreens, the aircraft skin (such as small dents or puncture holes), or for minor damages to main rotor blades, tail rotor blades, landing gear, and those resulting from hail or bird strike (including holes in the radome); or
- c) the aircraft is missing or is completely inaccessible.

AIRCRAFT INCIDENT

An occurrence, other than an accident, associated with the operation of an aircraft, which affects or could affect continued safe operation if not corrected. An incident does not result in serious injury to persons or substantial damage to aircraft.

AERODROME	Means the Owen Roberts International Airport or the Charles Kirkconnell International Airport (CKIA).
AIRCRAFT STAND	A designated area on an apron intended to be used for parking aircraft.
AIRPORT SECURITY OFFICER	An Authorized Officer in the employ of the Cayman Island Airports Authority specifically to aviation security and other delegated functions.
AIRSIDE	The movement area of an airport, adjacent terrain and buildings or portions thereof, access to which is controlled.
APRON/RAMP	A defined area in an aerodrome, intended to accommodate aircraft for the purposes of loading or unloading passengers, mail or cargo, fuelling, parking or maintenance.
DRIVER	A person who is in control of a vehicle. In relation to a trailer, includes the driver of a vehicle by which the trailer is drawn and 'drive' shall be construed accordingly
FOREIGN OBJECT DEBRIS (FOD)	Includes any object found in an inappropriate location that, as a result of being in that location, can damage an aircraft or equipment or injure airport personnel. Acronym also used to describe damage caused by such debris.
INCIDENT	An occurrence, other than an accident, associated with the operation or handling of an aircraft' which affects or could affect the safety of operation.
INJURY	An injury is a condition which requires medical assistance, including first aid.
MANEUVERING AREA	That part of a aerodrome used by aircraft for landing, taxiing, and takeoff, excluding aprons.
MOVEMENT AREA	That part of an aerodrome used for the take-off, landing and the taxiing of aircraft, consisting of the maneuvering area and the aprons.
OWNER	In relation to a motor vehicle, includes every person or organization who is the owner or joint owner or part owner of the vehicle; and any person or organization who has the use of the vehicle under a hire-purchase agreement but not the lessor under any such agreement; the person or organization in whose name the vehicle is registered.

PARK	To bring a vehicle to a stationary position and cause it to wait for any purpose other than that of immediately taking up or setting down passengers, goods or luggage.
VEHICULAR ACCESS ROAD	An established surface route on the movement area meant for the exclusive use of vehicles.
ROAD HOLDING POSITION	A designated position at which vehicles will be required to hold.
RUNWAY HOLDING ILS/MLS POSITION	A designated position intended to protect a runway, an obstacle limitation surface, or an ILS/MLS critical/sensitive area at which taxiing aircraft and vehicles shall stop and hold, unless otherwise authorized by the Aerodrome Control Tower.
RUNWAY	A defined rectangular area on a land aerodrome, prepared for the landing and take-off of aircraft along its length.
RUNWAY STRIP	A defined area including the runway and stopway, if provided, intended: a) to reduce the risk of damage to aircraft running off a runway; and b) to protect aircraft flying over it during take-off or landing operations.
SHALL	Used to indicate any instruction, directive or procedure which is mandatory (compulsory).
SHOULD	Used to indicate a process or procedure which is recommended (optional).
TAXIWAY VEHICLE	A defined path on a land aerodrome established for the taxiing of aircraft. Any motorized equipment which is operated by a driver, including tugs and belt loaders.

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Section 1- Objectives and Policy

It is the policy of the Cayman Islands Airports Authority (CIAA) to promote airside safety at Owen Roberts International Airport (ORIA) through the use of the Safety Management System. The Safety Management System Manual is part of the Aerodrome Manual and all personnel that are operating on the aerodrome should make themselves familiar with its contents. A copy of this manual is readily available by request to the Chief Safety Management Officer, at 345-916-5317 or by emailing- Andrew.mclaughlin@caymanairports.com .

Worldwide Aviation statistics indicate the high number of accidents/ incidents such as FOD (or human) ingestion, aircraft/vehicle collisions caused by safety infractions such as runway incursions, poor driving practices, poor communication, poor FOD control and poor knowledge of the airside operating environment. Such accidents/incidents often relate directly to the level of training of airside vehicle operators. It is therefore critical that all airside vehicle operators are trained, tested and certified in accordance with the guidelines set forth in **Appendix A1** before commencing duties on the airside. In addition, periodic refresher training be conducted in accordance with **Appendix 1.4 paragraph 8** and documented. Ultimately it is the responsibility of the Chief Executive Officer of the aerodrome to ensure that such training is made available to all personnel required to operate motorized vehicles or ground support equipment in the course of their duties on the aerodrome.

All persons operating on the airside at ORIA shall comply with the requirements of this Manual. Failure to comply with the requirements of this Manual may result in restriction of an operator's right to operate on the airside.

Albert Anderson
Chief Executive Officer
Cayman Islands Airports Authority

1.1 Management commitment and responsibility

Safety Accountabilities and Responsibilities of CIAA Executives

Chief Executive Officer (CEO)

Safety Accountability: The CEO is accountable to the CIAA Board of Directors for the safe management of Owen Roberts International Airport (ORIA).

Safety Responsibility: In discharging this accountability the CEO is responsible for:

- Authorizing a Safety Policy that indicates the CIAA's commitment to driver safety;
- Ensuring a Safety Management System is implemented to monitor driver safety program effectiveness;
- Assuming the leadership role to ensure proactive safety commitment throughout the CIAA; particularly at senior management level, to driver safety;

Chief Safety Management Officer (CSMO)

Safety Accountability: The Chief Safety Management Officer is accountable to the CEO for:

- Providing advice and assurance relating to driver safety issues and performance; internal, external and international safety initiatives and requirements;
- Establishing driver safety standards;
- Establishing a system for driver safety education and awareness;
- Establishing a driver safety reporting system;
- Effective interface with the CAACI regarding driver safety matters.

Safety Responsibility: In discharging these accountabilities, the Chief Safety Management Officer is responsible for:

- Assisting Chief Airport Operations Officer in establishing driver safety guidelines and publishing them to all ORIA users;
- Conduct driver accident/incident investigations and forward recommendations to the CEO to assist in final determination of any necessary penalties for drivers involved;
- Monitoring driver safety concerns in the aviation industry and their perceived impact on the organization's operations aimed at service delivery;
- The design, development and management of an effective reporting and record keeping program directed towards increasing the driver safety performance level of ORIA;

- Convening on the behalf of the CEO, the CIAA ORIA Safety Committee and reporting all relevant driver safety reports to address issues of concern to all operators;
- Ongoing review of interface between ORIA, CKIA, CAA, and other aviation organizations and ensuring improvements are made where required.

Chief Airport Operations Officer

Safety Accountability: The Chief Airport Operations Officer is accountable to the CEO to ensure all airside drivers are competently trained and certified in the execution of driver safety, so as to ensure regularity and efficiency of airside operations at ORIA.

Safety Responsibilities: In discharging this accountability, the Chief Airport Operations Officer is responsible for:

- Ensuring that employers provide proof of formal training and qualification for each employee on the equipment they intend to operate airside at ORIA in accordance with this manual;
- Ensuring the application of each potential airside driver/operator is properly verified and all prerequisites met before course scheduling;
- Ensuring that driver safety issues are reported in a timely manner to the Chief Safety Management Officer;
- Ensuring that all daily operations managers and staff reporting to him are trained, qualified and competent to discharge their driver safety related obligations;
- Ensuring that all necessary driver safety training, testing, and assessments have been documented in each individual driver qualification record and this record has been accepted and filed by the Chief Safety Management Officer before final issue of any type of driving permit or endorsement.

Chief Security Officer

Safety Accountability: The Chief Security Officer is accountable to the CEO for the effective airside vehicle operators training and management of the security officers who patrol airside areas and are assigned to the security checkpoints which allow access to airside facilities.

Safety Responsibilities: In discharging this accountability the Chief Security Officer is responsible for:

- The control of passenger and vehicle traffic entering and exiting the airside of ORIA;
- Ensuring that in exercising access control to airside all vehicles and drivers are checked for the **proper permits**, and or endorsements for the equipment they wish to operate;
- Ensuring the officers under your control are properly trained and competent in executing their duties in enforcing driver safety requirements at ORIA airside facilities, to include acting as escorts for vehicles with very scarce need to operate on the airside;
- Ensuring effective liaison is conducted between the security section and other ORIA sections, and relevant external organizations to **ensure that requesting vehicles have the appropriate permission to enter airside areas and that driver safety protocol is adhered to by all persons obtaining access to ORIA airside facilities. It is important to give full details of the types of vehicles, amount of vehicles, and their intended purpose when requesting this permission.**

All Airside Drivers/ Operators

All airside drivers/ operators have the following safety responsibilities:

- To comply with the relevant safety requirements and procedures outlined in;
 - the **ORIA Aerodrome Vehicle Operations Manual**;
 - CIAA Safety Management Manual (SMM) and any Supplementary Manuals;
 - Other duly authorised Manuals, Instructions and Notices;
- To apply driver safety measures as required by safety management procedures and instructions;
- To advise the Chief Safety Management Officer of any safety occurrence or system failure and to identify and report any situation of potential risk or concern affecting airside safety via one of the following means:
 - Report directly to their supervisor or the Chief Safety Management Officer;
 - Submitting either an Incident/Accident report or a Confidential Report to the Airport Operations Command Centre by calling **(345) 244-5835 or 1-800-534-AOCC (5835).**

1.2 Components of an airport

The following information explains basic features you might find at any airport:

Map of Owen Roberts International Airport

(Figure 1)



Owen Roberts International Airport has one runway surface consisting of two active runways – designated as 08 (allowing landings and take-offs to the east) and 26 (allowing landings and take-offs to the west); four taxiways designated as A, B, C, & D from west to east; two aprons- one for General Aviation and one for Commercial Aviation; one service roadway connecting the General and Commercial Aviation aprons, one service road across the main apron and two service access roads at either end of the main apron.

1.2.3 Aprons / Ramps

Aprons are defined areas on an aerodrome established to accommodate aircraft for parking, loading and unloading of passengers, mail or cargo, fueling, and maintenance (see figure 3). Vehicles operating on an apron shall give way to moving aircraft; vehicles on the apron should also maintain a safe distance from parked aircraft. **Engine hazard areas are marked on the commercial apron in the form of red hatchings. Additionally, on an apron, markings denote areas which should be free of objects, vehicles, or equipment while the aircraft engine is running.**

1.2.4 Markings, Signs and Lighting

Marking, Signs and Lighting are provided to guide aircraft and vehicle operations on the airport.

- **Markings-** Runway markings are painted white. Taxiways have yellow markings. The center of the taxiway has a solid yellow stripe. The sides may have one or two solid yellow stripes along the edge. As the taxiway comes to the edge of the runway, you will see what pilots call a "hold" line or "holding point" (see figure 4 below).

(Figure 4)



The holding point or hold line- Is two solid yellow stripes followed by two broken yellow stripes. This is the airport version of a stop sign. Along the side of the taxiway next to the hold line, there will be a runway holding position sign (see figure 5) with the runway number. A clearance from air traffic control is required to pass either of these markers and enter the runway.

When clearing a runway, you must proceed past the hold line marking painted on the taxiway (See figure 4). Operators working in the strip and outside the taxiways will have no markings to indicate where they will require an ATC clearance to operate. The CIAA AVOP course includes detailed map training to recognize the boundaries to remain clear of unless authorized by ATC.

- **Signs-** There are three kinds of signs on an airport:
 - a) Mandatory signs used to display compulsory commands which have a red background with white lettering. This information must be obeyed. An example is a runway hold sign as shown in Figure 5 located next to the appropriate pavement markings and requires all operators to request ATC permission before proceeding past that location.
 - b) Guidance signs used to provide operators with information of where taxiways and aprons are located. These signs have a yellow background with black lettering.
 - c) Location signs tell the operator their exact location. These signs have a black background with yellow lettering, the reverse coloring used on an information sign. You will observe a location sign attached to the mandatory sign in Figure 5 providing the information the operator is holding short of runway 26-08 on taxiway "B".

(Figure 5)



Example: A driver would see these signs and markings when holding short of runway 26 - 08 at taxiway "B"

Other signs include "**distance remaining**" signs on the runway to tell the pilot how much runway length is left (see figure 6 below).

(Figure 6)



3,000 feet remaining on runway

- **Lights-** Runway lights are used to mark the edges of the movement area at night and during periods of low visibility during the day.
 - a) Runway edge lights are white and towards the rollout end of the runway transition to amber;
 - b) Runway threshold lights are green in the approach direction and red from the roll-out direction;
 - c) Taxiway edge lights have blue lenses and their centerlines are sometimes marked with green centerline lights; and
 - d) Apron edge lights also have blue lenses or are flood lighted so that the day markings can provide maneuvering guidance. Such Flood lights must be installed though to prevent glare or distraction can affect an operator's attention.

1.3 **Airside Access Procedures**

Owen Roberts International Airport is a "controlled" airport. This requires operations by aircraft and vehicles in the vicinity of the runway and on taxiways to have authorization from Air Traffic Control (these are known as "maneuvering areas"). Aircraft and vehicle operations on the aprons or ramps are not controlled by ATC but do require compliance with the rules issued by the Airports Authority. When an "apron" is included with a "maneuvering area", the combined area is termed a Movement area. **As an operator of a vehicle, you must get the controller's permission before you go onto a runway or taxiway.** There are at least two ways to get permission, by radio or advanced coordination with ATC. The following phraseology is provided to ensure understanding of Air Traffic Controllers two-way radio terminology:

1.3.1 Basic Aviation Phraseology for Ground Equipment Operators

The following phraseology is provided to ensure understanding of Air Traffic Controllers two-way radio terminology:

Phrase	Meaning
Acknowledge	let me know you have received and understood this message
Advise Intentions	tell me what you plan to do
Affirm	yes
Correction	an error has been made in the transmission and the correct version follows
Hold/ Hold Short	Phrase used to keep a vehicle or Aircraft within a specified area or at a specified point while awaiting further clearance from air traffic control.
Note:	<u>When such instructions are given by ATC, the recipient is expected to acknowledge the restriction by repeating the restriction in the read back.</u>
How do you read me?	Question relating to the quality of the transmission or to determine how well the transmission is being received.
Note:	<u>A perfect transmission would be acknowledged as 5 by 5 for strength "5". A weak and poorly audible communication would likely be rated with a "2" or a "3".</u>
Expedite	Phrase used by ATC when such action compliance is required to avoid an imminent situation.
Pass your Message	Continue with your message only. Do not move.

Proceed	ATC do not use the word “proceed” in their terminology as it could be confused with an instruction to proceed onto a maneuvering area when the intent was only to continue with a communication.
Read Back	repeat my message back to me
Roger	your message was received and understood. It must never be used to mean “yes” or “no”.
Standby	wait, I will get back to you. (“standby” is not an approval or denial; the caller should re-establish contact if the delay is lengthy.
Unable	I can’t do it
Vacate	Means clear the area
Verify	I request confirmation of information
Wilco	I have received your message, understand it, and will comply with it

1.3.2 The Aviation Alphabet

A - Alpha	I - India	Q- Quebec	Y- Yankee
B – Bravo	J - Juliet	R- Romeo	Z - Zulu
C – Charlie	K- Kilo	S- Sierra	
D – Delta	L- Lima	T- Tango	
E – Echo	M- Mike	U -Uniform	
F – Foxtrot	N- November	V- Victor	
G - Golf	O -Oscar	W -Whiskey	
H- Hotel	P- Papa	X- Xray	

1.3.3 Radio Communications Procedures

All persons, before entering the airside maneuvering area, **MUST** make contact with Air Traffic Control (ATC). Persons and/ or vehicles must monitor ATC while operating in the airside maneuvering area. Use the proper sequence in calling the controller. **Before you start talking, make sure that no one else is already talking.** Then you should:

- a) **Say who you are calling and who you are** (e.g., "Air Traffic Control, Vehicle One").
- b) Wait for the controller to respond. Sometimes it takes a while if they are busy. When the controller responds, state where you are and where you want to go. For example "Vehicle One is on the terminal ramp and would like to cross runway 08 at taxiway Alpha and proceed to the south side." Wait for the controller's response.
- c) The controller will either approve or deny your request, or issue special instructions. An example of the instructions would be "Vehicle One, proceed to, hold short of runway 08" Acknowledge that you have heard the controller's instructions. For example, "Vehicle One will hold short of 08." The section titled "Aviation Phraseology" lists air traffic control phrases with definitions. You must know what they mean before going onto any runway or taxiway.

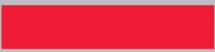
Always read back instructions received from Air Traffic Control for confirmation before acting. During high-traffic periods, it may be necessary to forego a read-back of the entire message, but **always ensure to read-back a "hold short" instruction.** Communication with ATC is not difficult; it can be mastered with a little practice. If an operator is unsure what the controller might have said, or does not understand an instruction from the controller. **ASK THE CONTROLLER TO REPEAT IT USING THE WORDS "SAY AGAIN."** A controller, even one who is extremely busy, would rather repeat and explain something than to have a misunderstanding lead to an accident or runway incursion. **The operator shall not proceed unless the instructions from the controller are absolutely clear.**

1.3.4 Light Signals

Air traffic controllers have a backup system for communicating in the event that they lose communication with a vehicle in the maneuvering area. Located in the ATC tower is a very bright light gun with different colors used to pass instructions to vehicle drivers. If you are ever working on a runway or taxiway and your radio quits, you should turn your vehicle towards the tower, start flashing your headlights and the controller will signal you with the light gun. This may take some time if the controller's

attention is directed towards another part of the airport. Alternatively, try another frequency on your radio or telephone the tower if you have access to a phone. **BE PATIENT! Even a failed radio is not an excuse for proceeding without a proper clearance.** In the event that all means of communication fail- the driver of the affected vehicle must leave the maneuvering area immediately while looking out and giving way to aircraft. The following is an explanation of the light gun signals followed by a handy chart that can be printed and kept by the driver:

- Continuous GREEN Light directed at the vehicle - the driver is authorized to enter and drive on the runway or taxiway;
- Continuous RED Light directed at the vehicle - the driver shall stop the vehicle immediately;
- Intermittent RED Light is directed at the vehicle - the driver must drive the vehicle clear of the runway or taxiway immediately;
- Intermittent GREEN Light is directed at the vehicle the driver whose vehicle has been ordered to stay clear of the runway or taxiway may return to the runway or taxiway; and
- Intermittent WHITE Light is directed at the vehicle' the driver is to return at once to his starting point.
- Alternating Red and Green is a General warning signal. Use extreme caution.

ATC Light Gun Signals		
COLOR	ON THE GROUND	IN THE AIR
	Cleared For Takeoff	Cleared To Land
	Cleared For Taxi	Return For Landing (to be followed by steady green)
	Stop	Give Way To Other Aircraft and Continue Circling
	Taxi Clear Of The Runway	Airport Unsafe, Do Not Land
	Return To Starting Point	Not Applicable
	Exercise Extreme Caution	

1.4 Driver Safety Guidelines

1.4.1 Authorization

Drivers operating within the airside must possess a valid Airside Vehicle Operator Driving Permit (AVOP), issued by the Cayman Islands Airports Authority. This permit shall be produced to authorized officers upon request.

(See **Appendix A1: Qualification Process**, and **Appendix A2 for Form**).

1.4.2 Speed Limits

Drivers shall obey all regulatory signs in the airside and adhere to the speed limits of:

- a) 5 mph per hour within 30 feet of an aircraft;
- b) 10 mph per hour on apron roadway or access roadways;
- c) 10 mph on the General Aviation Apron

The speed limit signs painted on the surface of airside roadways indicate the speed permissible in mph. The speed of **10 mph** is the maximum speed for ideal conditions for that particular stretch of road and must be reduced when surface and visibility conditions deteriorate.

1.4.3 Speed Limit Exemptions

Exemption to the posted speed limits are authorized only For Emergency vehicles responding to an incident, and through special ATC instructions.

1.4.4 Right of Way

Emergency vehicles such as fire vehicles, ambulance and police vehicles responding to an active emergency shall have priority over aircraft being towed. Emergency vehicles in response to an active emergency must be given priority to move ahead quickly and safely. Any indication of their approach, such as sirens or flashing “blue” lights should prompt the driver to give way by moving to the left, slowing down or stopping if necessary. The following standard rule of right of way shall be applied while operating on all airside areas:

- a) **All aircraft, including those being towed, have right of way over all vehicles and pedestrians;**
- b) **Passengers and Pedestrians have right of way over vehicles.**
- c) **Vehicles traveling on airside roadways have right of way over vehicles entering /crossing roadways;**

1.5 General Apron Safety Rules for Drivers/ Operators

The following guidelines should be followed by all personnel operating on the airside;

- a) Drivers and airside personnel must be aware of the dangerous effects of contact injuries that could be caused by rotating propellers and potential jet blast or ingestion when in close proximity to a jet aircraft with its engines running;
- b) Drivers must make sure their vehicles are roadworthy before driving. Any abnormality discovered that would compromise safety to themselves and others, must be reported to their management immediately and corrected as soon as possible;
- c) Drivers transporting cargo across long distances, such as transfer between the Commercial and General Aviation aprons must check that loads and trailers are properly secured either by using:
 - 1) **Covered carts which will also protect cargo from rain and weather; or**
 - 2) **Open carts with a protective net tied down to secure load; or**
 - 3) **A second operator to shadow the same cargo transfer in order to detect any fallen items.**
- d) All drivers and cargo handlers shall use proper stacking techniques to ensure an open cart is not overloaded or unbalanced;
- e) Drivers / operators shall not operate in the movement area at any time while under the influence or residual effect of alcohol or drugs. This applies to medicine or prescribed drugs which may impair the ability of the driver;
- f) Drivers will not operate any vehicle while talking on a cell phone unless vehicle is equipped with appropriate "hands-free" device designed specifically for the vehicle. Drivers will come to a complete stop to talk on cell phones or radios;
- g) **Do not walk or drive a vehicle towards an aircraft or behind an aircraft while the aircraft engine is running. An aircraft with its engine running will display a flashing red light signal known as an anti-collision light;**
- h) Do not drive or park under aircraft or aircraft wings unless the vehicles are used for servicing the aircraft;
- i) **Approach stationary aircraft at an angle and keep the aircraft on the driver's side; try to stay in view of pilot;**
- j) **Always use a Marshall or guide man when reversing towards aircraft;**
- k) Do not leave any motorized vehicle unattended with the engine running on the movement area; engage the handbrake whenever the vehicle is stationary;
- l) Keep the Passenger Boarding safety zone free of any obstruction. Do not drive, stop or park in the Passenger Boarding safety zone;
- m) Deposit all Foreign Object Debris (FOD) in bins provided after handling of each flight;

- n) Report all fuel, oil and other chemical spillages;
- o) **Drivers of vehicles shall keep clear of the aircraft engines and shall not pass within 10 ft (3 m) radius around the aircraft fuel tank vents;**
- p) Drivers of vehicles shall not drive over any hose or bonding cable laid during aircraft refueling;
- q) Refueling tankers are not permitted to park unattended within 50 feet (15m) of a terminal building.

1.6 **Personal Protective Equipment**

All personnel shall wear **hearing protection, closed shoes**, and a high visibility (hi-vis) **safety vest** (or during daytime operations a similar hi-vis shirt) at all times while in the movement area. The specifications for the safety vest to be used at ORIA are as follows:

- a) The basic color of the background material of the safety vest shall be **yellow, red or lime green** (see figure 7 below);
- b) The airport security pass should be visible when wearing the safety vest;
- c) The safety vest should be imprinted with the respective organization's logo for easy identification.

During inclement weather, all personnel entering/performing work at all movement areas are required to wear the high visibility (hi-vis) raincoat / rain suit at all times. The airport pass should be visible when wearing the raincoat / rain suit. The high visibility (hi-vis) raincoat / rain suit should be imprinted with the respective organization's logo for easy identification.

Note: It is also permissible for the safety vest to be worn over a non high visibility (hi-vis) raincoat / rain suit.

(figure 7)



1.7 Foreign Object Debris (F.O.D.)



Trash or rocks sucked into a jet engine can destroy or do significant damage to the engine in seconds. A rock caught by a propeller can damage the propeller, as well as become a deadly projectile. Make your airport a safer place by putting all trash in a covered container that won't be blown over. Get in the habit of picking up any trash and rocks near aircraft movement areas. Also pick up nails, bolts, or pieces of metal that could cause FOD or puncture tires. Avoid tracking mud and rocks onto the pavement surfaces. **Operators and users are encouraged to take appropriate measures to contain the risk of FOD. The following rules shall be followed on ORIA:**

- a) No persons shall place, discharge, or deposit any refuse or litter on the aprons except into the "Trash" bins provided at various locations.
- b) **All ground handling agents engaged in the servicing or handling of aircraft shall inspect the aircraft stands to ensure that no foreign objects or materials are left on the parking stand before every arrival and after every departure.** Items that are potential safety risks are those that may be ingested by aircraft engines or can cause damage to aircraft tires. Examples of such items are bolts and nuts from ground equipment plastic bags or sheeting and **shall be placed in Foreign Object Debris (FOD) containers** located near each parking stand/area.
- c) **The Aircraft Ground Handler shall ensure that the aircraft path to the stop line is clear of debris before the arrival and pushback of the aircraft.**

NOTE: The F.O.D. receptacles are not to be used as "garbage bins" Standard garbage like lunch containers should be disposed of using regular trash bins in locations throughout the aerodrome.

1.8. Driving in the operating areas

1.8.1 General operating rules

All drivers shall switch on the flashing light beacon on top of their vehicles at all times when operating on the movement area. **The size of this beacon must be appropriate for the size of vehicle it is being used on to provide ample visibility.** Emergency vehicles shall have “blue” lights while maintenance vehicles have “yellow” lights.

1.8.2 Rules for operating a vehicle in the Maneuvering Area

The maneuvering area is reserved for flight operations, e.g. take-off, landing and taxiing of aircraft. It is comprised of the runway and taxiway but excludes the apron. The following rules apply for driving on or across these areas;

- a) Drivers shall not cross a runway under any circumstances unless positive permission has been given and acknowledged by the ORIA ATC Tower.
- b) Drivers proceeding to any part of the maneuvering area shall obtain prior approval from ATC over the assigned radio frequency before proceeding to their destinations.
- c) Drivers wishing to enter the maneuvering area shall stop at the holding point until permission to enter the maneuvering area is received from ATC.
- d) Where there are no hold signs or position markings, drivers are to remain **at least 210 feet back** from the maneuvering edges unless permission to enter is received from ATC.
- e) No vehicle is allowed to stop without authorization in any part of the maneuvering area. In the event of a vehicle breakdown the driver must ensure it is reported to Air Traffic Control immediately. The vehicle shall not be left unattended.

1.8.3 Rules for operating a vehicle outside the Maneuvering area

ATC does not have the responsibility to control movements on airside outside the maneuvering area. Access to this area is controlled by Airport Security and permission to enter is governed by proof the vehicle operator has knowledge of the rules created by the airport authority - Specifically, the Apron Vehicle Permit and the Airport Vehicle Operator’s Permit. Rules specific to this area address:

Vehicular Service Roadways

The service roadway located behind all aircraft parking stands is meant for movement of vehicles and equipment to and from the aircraft.

- a) At no time should aircraft be approached from the front **unless under direct supervision of airport apron personnel.**
- b) The speed limit is **10mph while driving on this roadway!**

Note: Drivers shall not use the aircraft parking stands as short cuts to get to their intended destination!!!

Access Roadways

Speed limits for the access roadways at Owen Roberts International Airport are as follows:

- a) **10 mph for the roadway connecting the main apron to the General Aviation apron;**
- b) **5 mph for the roadway connecting the west gate and baggage loading area to the main apron;**
- c) **5 mph for the roadway connecting the east gate and baggage unloading area to the main apron; and**
- d) **5 mph for the roadway connecting the General Aviation apron to the main road.**

1.8.4 Special Apron Access Lanes

The Apron Access Lanes (one leading from the HBS Baggage Makeup area and the other leading from the Arrivals Conveyor Belt area) used only for expeditious access to and from the commercial apron, will remain chained at all times, secured using a retractable clip on either end of the chain. When it is determined that no passengers are present in the passenger lane in these areas drivers may use the following two-man method for accessing this lane:

- 1) The Driver of the vehicle must request assistance from another person before entering this area;
- 2) The assisting person will proceed to either side of the chain and while ensuring there are no passengers in either direction in the passenger lane- he or she will remove the chain from the post and draw it completely to the other side;
- 3) At this point the assistant will signal to the driver that it is OK to pass;
- 4) The driver of the vehicle will pass through the access lane also remaining vigilant and looking out for any passengers that may be approaching;

After the driver has completely cleared the passenger lane the assistant will replace the chain to its original position on the opposite post.

1.8.5 Special Procedures for the Movement of Code “D” Aircraft on Commercial Apron

When approaching the painted “STOP” signs that are on the ground at the entryways to the Commercial Apron vehicular service lane (Area 2 on map below), or attempting to enter this lane from any other location on the Apron, all drivers will come to a full stop and look for signs of aircraft movement in any direction. In the event that an aircraft, wing walkers, or other personnel directing traffic are present in the apron driving lane, do not proceed into the lane but rather wait until the aircraft or personnel have exited the driving lane before continuing on your journey. If you are already in this driving lane please give way to aircraft and vacate lane as soon as possible to avoid incident or injury.



1.9 **Enforcement and Penalties**

It is expected that ALL users of the Movement Area will comply with the requirements of this Manual. Safety Office personnel, CIAA Security Officers and Airport Duty Officers will be assisting in the enforcement of the rules outlined in this manual. They will be administering **Safety Infraction Tickets** when appropriate for violating said rules. In rare instances members of CIAA management may witness an infraction and verbal notice will be given to the offender on the spot followed by a formal ticket within 24 hours. **Once a ticket has been issued the offender will call the Safety Office at (345) 244-5869 or (345) 916-5317 and accept responsibility for the ticket or schedule an appointment to discuss the circumstances behind the ticket.** The Chief Safety Management Officer will receive these tickets, advise the Chief Airport Operations Officer and forward a copy of infraction to the management of the offenders company.

1.9.2 **Safety Infraction Tickets**

A driver who:

- a) Accumulates 12 demerit points or more within a period of 12 months from the date of the first offence;
- b) Is involved in an accident causing injury to personnel or damage to CIAA property and /or aircraft;
- c) Is involved in 2 minor accidents within a period of 12 month.

Will be suspended from driving on the airside! The driver will then be required to attend the CIAA mandated training and pass both theory and airside performance, under supervision, before the permit can be reinstated.

1.9.1 **Cancellation of Permits**

The validity of a airside vehicle operators permit is based on the drivers Cayman Islands Driver License, therefore **anytime the C.I. Drivers license is expired, suspended or revoked for any reason- it is the Drivers responsibility to notify Airport Operations and/or the Safety Office and surrender their AVOP permit.** Notwithstanding any enforcement or penalty process described herein, the CIAA, through the Chief Executive Officer, reserves the right to withdraw permission to enter and drive on the airside, at any time. When an airside vehicle operator's permit has been cancelled, the holder of the permit shall, upon being notified by the CEO of the cancellation, surrender the permit to the CIAA.

Table 1- Safety Infraction Tickets

<u>INFRACTION</u>	<u>DEMERITS DEDUCTED</u>
1) Failure to wear proper PPE ()	4
2) Failure to load baggage cart properly	4
3) Failure to properly chock ground equipment	6
4) Riding or walking on moving conveyor belt loader	6
5) Failure to use proper wands for directing aircraft	5
6) Failure to place, or improper placement of safety cones	6
7) Failure to have or turn on a vehicle safety beacon light	3
8) Driving in an unsafe manner around an aircraft	8
9) Parking or driving under a aircraft wing	8
10) Failure to turn off all ground service equipment when not in use	5
11) Driving over a fueling or GSE hose and/or cable	8
12) Use of cell phones around aircraft while being fueled	8
13) Failure to hand guide vehicles to aircraft (where appropriate)	6
14) Failure to remove all GSE equipment from ramp 15 mins after departure	4
15) Failure to drive in proper appointed vehicle lanes	6
16) Driving beyond the speed limit of 10 mph on the airport	5
17) Driving beyond the speed limit of 5 mph within 30ft of parked aircraft	8
18) Driving a vehicle without due care on the aerodrome	8
19) Failing to conform to traffic signs regulating the movement of traffic or indicating the route to be followed by traffic in the aerodrome	3
20) Failing to comply with the directions or verbal instructions given by an authorized officer regulating traffic in the movement area	5
21) Failing to give way or failing to give maximum clearance to aircraft in the movement area	8
22) Failing to comply with requirements, procedures and instructions relating to airport security	8
23) Throwing garbage into F.O.D containers	6
24) Smoking anywhere on the airside	8

1.10 Vehicles / Towed Equipment Airside Permit

All vehicles accessing or resident on the airside must have a valid Airside Vehicle Permit decal (see fig. 1) which must be clearly displayed at all times. To be eligible for this permit each vehicle will pass an inspection by the CIAA Maintenance Officer using criteria listed on the form in **Appendix A7**. By accepting this permit each organization agrees that in accordance with Manufacturer specifications, each vehicle operating on the airside will be inspected daily prior to use, and throughout the day as required. Proof of inspection will be provided upon request. All vehicles are subject to random audits for serviceability by CIAA Officers. Please contact the **CIAA Maintenance Officer** at **(345) 939-1136 or 943-7070** to book an appointment for vehicle inspection(s). Once vehicle passes inspection, each company will present the following documents to the Airport Safety Office to receive a decal:

- 1) Proof of Liability Insurance for Airside Operations;
- 2) Completed Vehicle Inspection Form (App A7);
- 3) Completed Vehicle Registration Form (App A4); and
- 4) Check for payment to “The Cayman Islands Airports Authority” in the agreed amount.

The Airport Safety Office is located on the second floor of the Owen Roberts International Airport. For appointment to turn in paperwork and collect decals please call **(345) 244-5869 or 926-5202**. The deadline to renew your Airside permit decal each year is January 31, and any vehicles with invalid decals after that date will be denied access to the airside or removed at owners’ expense.

Fig. 1 Sample Airside Vehicle Permit Decal



The annual apron vehicle charges are as follows:

- | | |
|-----------------------------------|----------------------------|
| 1. Baggage Carts | \$10.00 per vehicle, p.a. |
| 2. Motorized vehicles up to 1 ton | \$100.00 per vehicle, p.a. |
| 3. Motorized vehicles over 1 ton | \$200.00 per vehicle, p.a. |

Note: Specialized ground handling equipment (i.e. Aircraft Stairs, Boarding Ramps, GPU/AC Carts, Lavatory Carts) fees are determined by tonnage.

These charges apply to vehicles that are frequently active on the apron, whether permanent or temporary. All vehicles and towed equipment being operated on the airside shall be maintained to meet all operational, mechanical and safety requirements for their purpose. In any event, vehicles operated airside shall:

- a) Have a working safety beacon mounted in a location which allows 360° visibility;
- b) Have no defects to control or braking systems;
- c) Have no leaks of lubricants, coolants or contents;
- d) Have proper seating, working lights, safe tires and sound bodywork;

Towed equipment shall have:

- a) Effective parking brakes;
- b) Positive-lock couplings on trailer and/or vehicle;
- c) Functioning locks (where applicable);

Note: Vehicles which do not comply will not be allowed to enter or operate on the Movement Area

1.11 Ground Handling Equipment

In addition to displaying a current G.H.E. vehicle Apron permit any equipment motorized or not motorized that is used in support of aircraft operations on the airside and is not licensed as a passenger vehicle is considered to be Ground Handling Equipment and must be used and maintained in a serviceable and safe condition at all times. Only adequately trained, qualified and authorized personnel should be permitted to operate equipment. **Ultimately it is the responsibility of the owner, and /or operator of this equipment to ensure this equipment meets the manufacturer specifications for minimum operational, mechanical and safety requirements for the purpose for which it was intended and all operators are sufficiently trained on its proper use.** In any event, all G.H.E. operated airside shall:

- a) Have a working safety beacon mounted in a location which allows 360° visibility;
- b) Have no defects to control or braking systems;
- c) Have no leaks of lubricants, coolants or contents;
- d) Have proper seating, working lights, safe tires and sound bodywork;
- e) Have all manufacturer installed safeguards and bumpers in serviceable condition in the event it must come in contact with aircraft for proper operation;
- f) Present a clean and professional appearance as to paint (void of visible surface rust), markings and state of the equipment.
- g) Never move across the path of taxiing aircraft or embarking and disembarking passengers;
- h) Not be driven faster than walking speed when approaching or leaving an aircraft; and
- i) Not move towards an aircraft until- the aircraft has come to a complete stop, chocks are positioned, engines shut down, anti-collision beacons switched off, and if applicable, ground/ flight deck contact established.

Note: Vehicles which do not comply will not be allowed to enter or operate on the movement Area!

1.12 Reporting of Airside Incidents/Accidents

If you are involved in an accident, report it immediately to your supervisor. The Chief Safety Management Officer must be notified of all accidents or incidents within 24 hours. **If a collision occurred between a vehicle and an aircraft, it's critical that the aircraft not be flown until the damage can be inspected and repaired.** (Use the form in **Appendix A6** for reporting incidents).

1.12.1 Mandatory Reporting

Mandatory reporting is required for:

- Any accident or event that results in a fatality, injury or illness to person or damage to property or the environment;
- An event which if not corrected would likely endanger people, property or the environment, or an incident involving circumstances indicating that an accident nearly occurred.

The following are examples of these types of incidents:

- Failure or significant malfunction of airfield lighting.
- Runways or aircraft maneuvering areas obstructed by aircraft, vehicles or foreign objects, resulting in a hazardous or potentially hazardous situation.
- Runway incursions.
- Errors or inadequacies in marking of obstructions or hazards on runway or aircraft maneuvering areas.
- Collision between a moving aircraft and any other aircraft, vehicle or other ground object.
- Jet or prop blast incidents that could have resulted in significant damage or serious injury.
- Significant spillage of fuel on airfield ramps or runways.
- FOD and wildlife on the runway that strikes an aircraft.
- When an aircraft was, or could have been, endangered by the impairment of any member of ground staff.

1.12.2 Voluntary Reporting

Any person working at the airport may and is encouraged to report what they see as a potential safety hazard or concern which could lead to an accident, damage or injury. Examples include a driver not stopping for passengers, inadequate escorts for arriving or departing passengers, airside personnel potentially exposed to jet blast, FOD receptacles not emptied, vehicles left unattended on the apron, confusing signs, poor lighting, etc. The person who wants to make a report may do so by verbally telling the Airport Safety Officer about his or her concern. This could take place while the Airport Safety Officer is conducting routine safety observations, or by phone to the Airport Safety Officer or by visiting the Airport Safety Officer in his office. The person may also decide to prepare and submit a written report to the Airport Safety Officer with a copy to the Safety Committee submit through the office of the Airport Manager. The person making the report can further elect whether to provide his or her name on the written report.

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Section 2- RISK MANAGEMENT

The purpose of identifying the hazards and assessing the airside risks is to determine whether enough has been done to prevent an incident or accident that may lead to fatalities, injuries and ill health, and/or damage to aircraft. A thorough explanation of the process can be found in the CIAA Safety Management Systems Manual along with the necessary forms and registers for proper documentation.

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Section 3- Driver Safety Assurance

In any program, it is necessary to set and measure performance outcomes in order to determine whether the system is operating in accordance with expectations, and to identify where action may be required to enhance performance levels to meet these expectations. The acceptable level of safety expresses the safety goals of an organization and sets a baseline for future reduction.

SMS and Human Factors training tells us that accidents will occur despite our best efforts to avoid them. So in order to ensure the highest levels of safety are guaranteed at all times while operating vehicles on the airside, each and every driver by accepting the Airside Vehicle Operators Permit submits to an immediate test (at employers expense) to determine whether or not Drugs/Alcohol are a factor whenever:

- 1) Their driving is suspect or erratic;**
- 2) They are involved in an incident or near miss that jeopardizes the safety of passengers or other airside employees;**
- 3) They are involved in an accident causing injury to personnel or damage to property and/ or aircraft;**

Another less extreme method of ensuring the highest levels of safety on the airside is through the use of Safety Infraction Tickets. Safety Infraction tickets are being used to monitor compliance with the rules and regulations in this manual. Progress at ORIA with this effort has been slow. With a dedicated Airside Duty Officer in place daily in 2016, the issuance of Safety Infraction Tickets will be used to develop driver trends and performance indicators to enable us to set proper goals for the AVOP Program at CKIA.

Currently as an average over the past five years, we are experiencing less than one accident or incident per year and will strive to continue to lower these occurrences. We will continue to monitor driver trends and strive for zero incidents in the coming year

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Section 4- Driver Safety Training and Education

An organizations safety culture is linked to the success of its safety training program. All personnel must understand the organization's safety philosophy, policies, procedures and practices, and they should understand their roles and responsibilities within that safety management framework. Driver Safety training should begin with the initial familiarization of employees and continue with the scheduling and completion of the CKIA AVOP course. This training will be provided for personnel who occupy positions that will require them to drive on the airside areas as outlined in **Appendix A1**. The training program will ensure that the safety policy and objectives of the organization are understood and adhered to by all staff, and that all staff is aware of the safety responsibilities of their positions.

4.1 To qualify for an Airside Vehicle Operators Permit each applicant will:

- 1) Complete the form In **Appendix A2** and Attend and pass the 4 hour long CKIA Driver Orientation Course taught by CIAA designated personnel;
- 2) Take and pass a written test (requests for verbal testing will be considered in appropriate circumstances). Pass mark is 80%, with remediation provided by the instructor;
- 3) Receive an interim driving pass which will allow them to drive only when accompanied by an authorized driver in the same vehicle. After a two week probationary period, the driver may **contact the Airport Safety Response Centre Officer at 345-244-5869** to schedule an airside driving skills test. This practical application test will be administered by CIAA authorized personnel. The test will include vehicle pre-operational inspection procedures, knowledge of radio communication procedures, and physical demonstration of airside driving skills. Upon successful completion of this test the driver will receive his/her AVOP permit.

Note- In the event a driver fails a test one (1) immediate opportunity for a re-test will be allowed. If the re-test is failed, the Applicant will be required to undergo re-training. An applicant requiring re-training cannot sit a re-test within fourteen (14) days of the original test.

4.2 Drivers with a Revoked Driving Permit

A driver / operator will be required to undergo complete re-training and re-testing as a result of temporary revocation of AVOP.

4.3 Recurrence of Driver Training

Refresher training shall be conducted **every two years** as a minimum, or more frequently at the discretion of the CIAA. A holder will be subjected to a 2 hour AVOP Renewal Course (**Application in Appendix A5**) and re-test upon application for the renewal of a Permit.

4.4 Validity of Permit/Endorsement

An Aerodrome Vehicle Operator Permit will be valid for two (2) years after being issued. **It is the responsibility of the driver / operator to have the permit renewed.**

A Ground Support Equipment Endorsement (**Appendix A3**) will remain valid as long as the Cayman Islands Driver's license is valid and the AVOP is renewed, or until notice of removal submitted to CIAA by employer.

A Permit and subsequent endorsement(s) shall cease to be valid immediately upon termination of employment of the holder.

4.5 Lost Permit

A driver/operator who loses a Permit shall immediately, or at the soonest opportunity, report this to the Chief Safety Management Officer at 345-916-5317. Until a replacement Permit is issued, the driver/operator shall operate the Vehicle/GHE only under supervision of his/her employer.

4.6 Safety Communications

Safety communication is an essential foundation for the development and maintenance of an adequate safety culture. There are three basic elements used in safety communication- **communication, consultation and reporting**. This is essential to making sure that any changes in policy are disseminated to all drivers, and the proper review of all accidents and incidents provide useful lessons learned for all.

4.6.1 The communications element

This captures the processes used to ensure the open exchange of safety-related information both externally and internally to the company. This element plays a critical role in ensuring that all the risks present in the air navigation system are recognized, registered and mitigated and the information gained, plus improvement measures, are disseminated across the whole company.

4.6.2 Consultation

Consultation with all sections of CIAA and our customers and suppliers on all aspects of safety is an important aspect of safety management as it formalizes links of communication among the respective stakeholders of aviation safety.

4.6.3 Reporting

Reporting the results of safety investigations, safety reviews, safety audits and overall safety activities and performance to the appropriate audience has many benefits. It promotes transparency, commitment, ownership of safety issues. The most benefit of reporting safety issues and information is that it allows similar problems to be reported but most of all it allows for potential problems or issues to be eliminated before they happen. Prevention is always best. The CIAA is committed to ensuring that all personnel working airside are informed about the safety policies and objectives, how well the airport is meeting safety objectives, results of accident and incident investigations, new safety practices, and other matters dealing with safety.

4.1.4 Safety Meetings

At least once per year, the SMS will hold safety meetings with airport staff and other personnel working at the airport to review the effectiveness of the AVOP Program.

- Report on safety performance;
- Summarize the initiatives and action taken, or planned, to address safety concerns and potential hazards for Drivers;
- Report on lessons learned and action taken as a result of any driving incidents and accidents, and;
- Discuss in an open forum the safety concerns that any of the AVOP licensed Drivers might have.

Conclusion

This manual has covered the basics of how to safely operate vehicles on the airside areas. Remember also to be courteous to your fellow drivers, pay attention, do not get distracted, follow the rules and regulations, and set a good example. Eventually you will attain a comfortable and safe working knowledge. If there is something you don't understand, always ask before proceeding. As your knowledge and experience grows, share it with new employees or counsel drivers that you see doing something that is questionable or unsafe.

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Appendix A1

Driver/Operator Qualification Procedure

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Driver / Operator Qualification Procedure

Every person driving/operating a vehicle or ground support equipment on the movement area shall be in possession of a current Aerodrome Vehicle Operators Permit (AVOP) and if applicable the appropriate GSE endorsement to this permit issued by the Cayman Islands Airports Authority. For purposes of this section, the Applicant will be deemed to be the intended driver/operator on whose behalf an application is submitted.

A1.1 Responsibilities

Employer-It is the responsibility of every employer who conducts operational functions on airside areas of ORIA to:

- a) Ensure that a current copy of this Manual and the ORIA Apron Management Manual is made available to every employee whose function requires their activity on airside areas;
- b) Ensure all employees who operate Vehicles/ GSE airside are trained per the requirements and comply with the directives of these Manuals;
- c) Ensure all vehicles are suitably designed and maintained for use on airside areas;
- d) Encourage a safety culture among its employees to meet the requirements of these Manuals.

Employee-It is the responsibility of every employee who operates Vehicles/ Ground Support Equipment on airside areas of ORIA to:

- a) Comply with all requirements of the AVOM and Apron Management Manual;

A1.2 Requirements for Application

Every person requesting an Aerodrome Vehicle Operating Permit (AVOP) shall:

- a) Be in possession of a current Cayman Islands Driving License for the category of vehicle being operated **or have demonstrated equivalent competency;**
- b) Be trained by the vehicle owner to operate the Vehicle/ GSE in the proper manner required for its use on the movement area. **Verification of this must be provided upon application;**

A1.3 Application Process

1. The Applicant's employer shall submit an application for an AVOP or Ground Support Equipment Endorsement on the Applicant's behalf, using the Application Form at Appendix A2, A3 to the attention of the Chief Safety Management Officer (see address in Foreward) or deliver the application to the administrative offices of the CIAA. The application shall confirm that all conditions in A1.2 above have been met, in addition to any other pertinent requirements;
2. The Applicant shall not be allowed to drive/operate any vehicle or ground support equipment on the movement area without the supervision of a trained, licensed vehicle operator while an application is being processed;
3. The Applicant will be tested as expeditiously as possible (in accordance with published CIAA testing schedules).

A1.4 Testing

1. Each applicant will attend and pass the 4 hour long ORIA Driver Orientation Course taught by CIAA designated personnel.
2. Each applicant will take and pass a written test (requests for verbal testing will be considered in appropriate circumstances).
3. Pass mark is 80%, with remediation provided by the instructor.
4. Having passed the classroom course and written test, the driver will receive an interim driving pass which will allow them to drive only when accompanied by an authorized driver in the same vehicle. After a two week probationary period, with written endorsement from the perspective employer, the driver may contact the Airport Safety Response Centre Officer at 345-244-5869 to schedule an airside driving skills test. This practical application test will be administered by CIAA authorized personnel. The test will include vehicle pre-operational inspection procedures, knowledge of radio communication procedures, and physical demonstration of airside driving skills. Upon successful completion of this test the driver will receive his/ her AVOP permit.

5. If an Applicant fails a test, one (1) immediate opportunity for a re-test will be allowed. If the re-test is failed, the Applicant will be required to undergo re-training;
6. An applicant requiring re-training cannot sit a re-test within fourteen (14) days of the original test.
7. A driver / operator will be required to undergo complete re-training and re-testing as a result of temporary revocation of AVOP.
8. Refresher training shall be conducted **every two years** as a minimum, or more frequently at the discretion of the CIAA. A holder will be subjected to a re-test upon application for the renewal of a Permit.

A1.5 Validity of Permit

An Aerodrome Vehicle Operator Permit will be valid for two (2) years after being issued. **It is the responsibility of the driver / operator to have the permit renewed.**

A Ground Support Equipment Endorsement will remain valid as long as the Cayman Islands Drivers license is valid and the AVOP is renewed, or until notice of removal submitted to CIAA by employer.

A Permit and subsequent endorsement(s) shall cease to be valid immediately upon termination of employment of the holder.

A1.6 Lost Permit

A driver/operator who loses a Permit shall immediately, or at the soonest opportunity, report this to the CIAA Chief Airport Operations Officer, Tel: 943 7070. Until a replacement Permit is issued, the driver/operator shall operate the Vehicle/GHE only under supervision of his/her employer.

A1.7 Record Keeping

All records relating to the issue of an AVOP will be maintained by the Safety office for no less than seven years after the initial issue.

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Appendix A2

CIAA AERODROME VEHICLE OPERATOR PERMIT APPLICATION FORM

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CIAA AERODROME VEHICLE OPERATOR PERMIT
APPLICATION FORM

SURNAME: _____

FIRST: _____ MIDDLE: _____

STREET ADDRESS: _____ DISTRICT: _____

P.O. BOX: _____

EMPLOYER: _____ POSITION HELD: _____

NUMBER OF YEARS WITH CURRENT EMPLOYER: _____

DATE OF BIRTH: DAY _____ MONTH _____ YEAR _____

TELEPHONE #: _____

THE FOLLOWING REQUIREMENTS HAVE BEEN MET:

- 1) COPY VALID CAYMAN ISLANDS DRIVERS LICENSE
Expiry date- _____
- 2) COPY OF CURRENT COMPANY VEHICLE TRAINING RECORDS
Submitted- _____
- 3) COPY OF CIAA AVOP TRAINING COURSE
Completed- _____
- 4) COMPLETION OF DRIVER ORIENTATION COURSE
Completed- _____

I DECLARE THAT THE INFORMATION PROVIDED IS CORRECT AND TRUE. I ALSO UNDERSTAND THAT IF THIS APPLICATION IS APPROVED, THE PERMIT IS ISSUED SUBJECT TO THE FOLLOWING CONDITIONS:

1. THE PERMIT ENTITLES THE APPLICANT TO OPERATE THE VEHICLE TYPE SPECIFIED ON THE MOVEMENT AREA OF **OWEN ROBERTS INTERNATIONAL AIRPORT**, IN ACCORDANCE WITH ESTABLISHED SAFETY PRACTICES.
2. ENTRANCE TO A RESTRICTED AREA WILL BE ALLOWED ONLY IF THE APPLICANT HOLDS AND DISPLAYS A VALID ORIA SECURITY ACCESS PASS.
3. USE OF THE PERMIT IS SUBJECT TO THE ENFORCEMENT AND PENALTIES PROCESS DETAILED IN THIS MANUAL.
4. UPON SUSPENSION OR REVOCATION OF MY CAYMAN ISLANDS DRIVERS LICENSE OR TERMINATION OF EMPLOYMENT THE PERMIT SHALL CEASE TO BE VALID MUST BE RETURNED TO THE CAYMAN ISLANDS AIRPORTS AUTHORITY.

SIGNATURE OF EMPLOYER

SIGNATURE OF APPLICANT

THE COMPLETED APPLICATION FORM AND FEE OF CI\$100.00 SHOULD BE SUBMITTED TO THE CAYMAN ISLANDS AIRPORTS AUTHORITY, P.O. BOX 10098 APO, GRAND CAYMAN.

FOR OFFICIAL USE ONLY

APPROVED/NOT APPROVED PERMIT #: _____

VEHICLE TYPE (S): _____

AREA: _____

AUTHORIZED SIGNATURE: _____

Appendix A3

CIAA GROUND HANDLING EQUIPMENT OPERATOR ENDORSEMENT FORM

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CIAA GROUND HANDLING EQUIPMENT OPERATOR
ENDORSEMENT FORM

SURNAME: _____

FIRST: _____

MIDDLE: _____

STREET ADDRESS: _____ DISTRICT: _____

P.O. BOX: _____

EMPLOYER: _____

POSITION HELD: _____

A.V.O.P. # _____

THE FOLLOWING REQUIREMENTS HAVE BEEN PROVIDED / MET:

COPY VALID CIAA AIRSIDE VEHICLE OPERATING PERMIT: _____

**COPY OF CURRENT COMPANY GROUND HANDLING EQUIPMENT TRAINING
RECORD: _____**

I DECLARE THAT THE INFORMATION PROVIDED IS CORRECT AND TRUE. I ALSO UNDERSTAND THAT ONCE THIS APPLICATION IS APPROVED, THE ENDORSEMENT IS ENTERED ON MY AVOP LICENSE SUBJECT TO THE FOLLOWING CONDITIONS:

1. THE ENDORSEMENT ENTITLES THE APPLICANT TO OPERATE THE **G.H.E.** TYPE SPECIFIED ON THE MOVEMENT AREA OF OWEN ROBERTS INTERNATIONAL AIRPORT, IN ACCORDANCE WITH ESTABLISHED SAFETY PRACTICES.
2. ENTRANCE TO A RESTRICTED AREA WILL BE ALLOWED ONLY IF THE APPLICANT HOLDS AND DISPLAYS A VALID ORIA SECURITY ACCESS PASS.

3. USE OF THE EQUIPMENT IS SUBJECT TO THE ENFORCEMENT AND PENALTIES PROCESS DETAILED IN THIS MANUAL.
4. UPON SUSPENSION OR REVOCATION OF MY CAYMAN ISLANDS DRIVERS LICENSE OR TERMINATION OF EMPLOYMENT OR DISQUALIFICATION BY EMPLOYER, THE ENDORSEMENT SHALL CEASE TO BE VALID. IN EITHER CASE IT IS THE EMPLOYERS/ EMPLOYEES RESPONSIBILITY TO NOTIFY CIAA OF SUCH ACTION.

SIGNATURE OF EMPLOYER

SIGNATURE OF APPLICANT

THE COMPLETED APPLICATION FORM AND ENDORSEMENT FORM
SHOULD BE SUBMITTED TO:
THE CAYMAN ISLANDS AIRPORTS AUTHORITY,
P.O. BOX 10098 APO,
GRAND CAYMAN.

FOR OFFICIAL USE ONLY

APPROVED/NOT APPROVED

ENDORSEMENT ENTERED DATE: _____

GROUND HANDLING EQUIPMENT ENDORSEMENT(S):

1. _____
2. _____
3. _____
4. _____
5. _____

AUTHORIZED SIGNATURE: _____

Appendix A4

APRON VEHICLE REGISTRATION FORM

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APPENDIX A5

Airside Vehicle Operators Permit Renewal Application

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CIAA AERODROME VEHICLE OPERATOR PERMIT
RENEWAL APPLICATION FORM

SURNAME: _____

FIRST: _____ MIDDLE: _____

STREET ADDRESS: _____ P.O. BOX: _____

EMPLOYER: _____

POSITION HELD: _____

DATE OF BIRTH: DAY _____ MONTH _____ YEAR _____

NATIONALITY: _____ TELEPHONE #: W _____

HOW LONG HAVE YOU WORKED WITH CURRENT EMPLOYER?

HOW LONG HAVE YOU HELD A CIAA AVOP LICENSE?

THE FOLLOWING REQUIREMENTS HAVE BEEN MET:

- COPY VALID CAYMAN ISLANDS DRIVERS LICENSE

- LETTER FROM EMPLOYER LISTING QUALIFICATIONS ON GROUND HANDLING EQUIPMENT

THIS COMPLETED RENEWAL FORM AND FEE OF CI\$100.00 SHOULD BE SUBMITTED TO:

THE CAYMAN ISLANDS AIRPORTS AUTHORITY
P.O. BOX 10098
GRAND CAYMAN KY1-1001
CAYMAN ISLANDS

5. THE PERMIT ENTITLES THE APPLICANT TO OPERATE THE VEHICLE TYPES SPECIFIED ON THE MOVEMENT AREA OF **OWEN ROBERTS INTERNATIONAL AIRPORT**, IN ACCORDANCE WITH ESTABLISHED SAFETY PRACTICES DETAILED IN **ORIA AVOP MANUAL**.
6. ENTRANCE TO A RESTRICTED AREA WILL BE ALLOWED ONLY IF THE APPLICANT HOLDS AND DISPLAYS A VALID ORIA SECURITY ACCESS PASS.
7. USE OF THE PERMIT IS SUBJECT TO THE ENFORCEMENT AND PENALTIES PROCESS DETAILED IN CIAA AVOP MANUAL.
8. UPON SUSPENSION OR REVOCATION OF MY CAYMAN ISLANDS DRIVERS LICENSE OR TERMINATION OF EMPLOYMENT THE PERMIT SHALL CEASE TO BE VALID AND MUST BE RETURNED TO THE CAYMAN ISLANDS AIRPORTS AUTHORITY.

I DECLARE THAT THE INFORMATION PROVIDED IS CORRECT AND TRUE. I ALSO UNDERSTAND THAT IF THIS APPLICATION IS RENEWED, THE PERMIT IS ISSUED SUBJECT TO THE ABOVE LISTED CONDITIONS.

SIGNATURE OF EMPLOYER

SIGNATURE OF APPLICANT

FOR OFFICIAL USE ONLY

PERMIT #: _____

VEHICLE TYPE (S): _____

AREA: _____

AUTHORIZED SIGNATURE: _____

APPENDIX A6

INCIDENT/ ACCIDENT REPORT FORM

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**ORIA
Aerodrome Hazard Reporting Form**

This form should be used to report any aerodrome hazard that has caused or could cause an accident or incident. Send to the Safety Office as soon as possible after the hazard is identified. You can submit the form anonymously (if required) by omitting relevant details.

Your name.....

Your employer/position held.....

Location the hazard was observed

Time and date the hazard was observed.....

What were you doing at the time?

.....

Details of the hazard (attach additional pages if insufficient room)

.....

.....

.....

.....

Your recommendations (if any) to deal with this hazard (attach additional pages if insufficient room)

.....

.....

.....

Signature Date

Safety Manager to complete the following sections including risk assessment

Date this report was received Level of risk assessed as..... .

Referred to Aerodrome Safety Committee: Y / N

Actions required: (attach additional pages if insufficient room)

.....

.....

Person(s) responsible

Completion date(s) due

Person making the report (if known) advised of outcome: Y / N date

Aerodrome Risk Register updated (date)

Signed

Name..... (Aerodrome Manager)

D a t e

APPENDIX A7

CIAA VEHICLE INSPECTION FORM

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CIAA Vehicle Inspection Form

Company Name: _____ Fleet ID #: _____
 Vehicle Type: _____ Manufacturer: _____
 Year: _____ Model: _____ Colour: _____
 VIN #: _____

Inspection Checklist

Stationary Checks	Satisfactory	Needs Attention	Unsatisfactory
Steering free of play:			
Hand Brake: Service Brake:			
Tires: L/F L/R R/F R/R			
Lights: Headlamps Tail Lamps Indicators Safety Beacon			
Horn:			
Wipers:			
Fluid Leaks:			
Drivers Seating:			
Bumpers:			
Bodywork:			
Undercarriage Checks			
Chassis Integrity:			
Exhaust System:			
Suspension:			
Mobile Checks			
Speedometer:			
Brakes:			
Gears (smooth changes):			
Wheel Bearings:			
Other Items Checked:			
Equipment Status:	Fail	Pass	New GSE Permit #
Remarks:			
Re-Inspection Comments:			
Inspectors Name & Signature:		Inspection Date:	
Notes:			
a). If NEEDS ATTENTION is recorded for ANY item on the checklist, corrective action must be taken regarding the item within 5 days in order to bring it to SATISFACTORY condition. b). If UNSATISFACTORY condition is recorded for ANY item on the checklist, the equipment shall not be used on the Airside until the corrective action has been completed and repair confirmed by a designated CIAA inspector after re-inspection.			