

Advisory Circular

CAA-AC-AGA611

September 2022

Guidance for Aerodrome Radio Phraseology for Vehicles under ATC Control

1. Purpose

This advisory circular provides guidance for aerodrome operators of aerodromes where air traffic control is in use for the development of local instructions and training for airside drivers whose function requires that they enter the manoeuvring area taxiways, runways and strips, and therefore who need to communicate with the Tower.

2. Introduction

- 2.1 The safe and efficient movement of vehicles plays an essential supporting role in the operation of an aerodrome. Whenever possible, the areas in which vehicles and aircraft operate are segregated, such as with service roads. However, there are many occasions when vehicles need to move on the manoeuvring area for operational safety or maintenance purposes, or in direct support of aircraft operations.
- 2.2 The following factors need to be taken into account when driving on an aerodrome:
 - In general, aircraft are by no means as manoeuvrable as ground vehicles;
 - b. The visibility from an aircraft cockpit or flight deck for ground movement purposes is often restricted compared with the visibility from a vehicle.
 - c. At any time, emergency vehicles may need to be given priority to attend to an emergency anywhere on or off the aerodrome
 - d. Fuel vehicles must never be obstructed by other vehicles or equipment
- 2.3 Therefore, when vehicles are operating in close proximity to aircraft, drivers should be extremely vigilant and give way to aircraft and emergency vehicles at all times, and, if applicable, ATC instructions.
- 2.4 Correct radio operating technique must be observed by all users. For all vehicles on the manoeuvring area, it is important that a continuous listening watch is maintained, not only in case of further instructions or information from

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the tower, but also so that drivers can be aware of the movements, and intended movements, of other traffic thereby reducing the risk of confliction.

2.5 All communications between the Tower and pilots and vehicles are in English using correct radio terminology.

3. Definitions

The following table lists key definitions to assist drivers to be familiar with aerodrome characteristics and layout.

Word	Meaning
aircraft stand	a designated area on an apron intended to be used for parking an aircraft
aircraft stand taxilane	a portion of an apron designated as a taxiway and intended to provide access to aircraft stands only.
apron	a defined area on a land aerodrome, intended to accommodate aircraft for purposes of loading or unloading of passengers, mail or cargo, fuelling, parking or maintenance, including apron taxiways and aircraft stand taxilanes
ATC	air traffic control, (in general)
GMC	ground movement control
intermediate holding position	a designated position intended for traffic control at which taxiing aircraft and vehicles shall stop and hold until further cleared to proceed when so instructed by the aerodrome control tower
RTF	radiotelephone
manoeuvring area	that part of an aerodrome to be used for the take-off, landing and taxiing of aircraft, excluding aprons
movement area	that part of the aerodrome to be used for the take-off, landing and taxiing of aircraft, consisting of the manoeuvring area and the apron(s)
R/T	radiotelephony or radio communications
runway-holding 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 incursion	any occurrence at an aerodrome involving the incorrect presence of an aircraft, vehicle or person on the protected area of a surface designated for the landing and take-off of aircraft

taxiway	a defined path on a land aerodrome established for the taxiing of aircraft and intended to provide a link between one part of the aerodrome and another, including: a) aircraft stand taxilane. A portion of an apron designated as a taxiway and intended to provide access to aircraft stands only. b) apron taxiway. A portion of a taxiway system located on an apron and intended to provide a through taxi route across the apron. c) rapid exit taxiway. A taxiway connected to a runway at an acute angle and designed to allow landing aeroplanes to turn off at higher speeds than are achieved on other exit taxiways thereby minimizing runway occupancy times.
Tower	The radio callsign for the air traffic controller responsible for the aerodrome manoeuvring area, including vehicles.

4. Terminology

The following words and phrases are used in radiotelephony communications as appropriate and have the meaning given below. Use of correct terminology and procedures can avoid contributing towards aircraft incidents and accidents.

Word	Meaning	Note
ACKNOWLEDGE	"Let me know that you have	
	received and understood this	
AFFIDM	message."	
AFFIRM	"Yes."	
APPROVED	"Permission for proposed action granted."	
BREAK	"I hereby indicate the separation between portions of the message."	To be used where there is no clear distinction between the text and other portions of the message.
CANCEL	"Annul the previously transmitted clearance."	must be acknowledged by reading back
CHECK	"Examine a system or procedure." E.g. check obstacle light	Not to be used in any other context. No answer is normally expected.
CONFIRM	"I request verification of: (clearance, instruction, action, information)."	
CONTACT	"Establish communications with"	
CORRECT	"True" or "Accurate".	
CORRECTION	"An error has been made in	
	this transmission (or	
	message indicated). The	
	correct version is"	
DISREGARD	"Ignore."	
HOLD SHORT	"Stop before the location	if instructed to hold short of a
	stated"	runway, DO NOT cross the holding position

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5. Transmission of Letters and Numbers

- 5.1 With the exception of the telephony designator and the type of aircraft, each letter in the aircraft call sign shall be spoken separately using the phonetic spelling.
- 5.2 The words in the table below are used when using the phonetic spelling. The syllables to be emphasised are underlined.

Letter	Word	Pronunciation
Α	Alpha	<u>AL</u> FAH
В	Bravo	<u>BRAH</u> VOH
С	Charlie	<u>CHAR</u> LEE or
		SHAR LEE
D	Delta	<u>DELL</u> TAH
Е	Echo	ECK OH
F	Foxtrot	<u>FOKS</u> TROT
G	Golf	GOLF
Н	Hotel	HO <u>TELL</u>
I	India	<u>IN</u> DEE AH
J	Juliett	<u>JEW</u> LEE <u>ETT</u>
K	Kilo	KEY LOH
L	Lima	<u>LEE</u> MAH
M	Mike	MIKE
N	November	NO <u>VEM</u> BER
0	Oscar	OSS CAH
Р	Papa	PAH <u>PAH</u>
Q	Quebec	KEH <u>BECK</u>
R	Romeo	ROW ME OH
S	Sierra	SEE <u>AIR</u> RAH
Т	Tango	<u>TANG</u> GO
U	Uniform	YOU NEE FORM or
		<u>OO</u> NEE FORM
V	Victor	<u>VIK</u> TAH
W	Whiskey	<u>WISS</u> KEY
X	X-ray	<u>ECKS</u> RAY
Υ	Yankee	YANG KEY
Z	Zulu	<u>ZOO</u> LOO

5.3 Occasionally, drivers may need to transmit numbers. To avoid confusion, numbers are transmitted using the pronunciation in the following table. The syllables printed in capital letters are to be stressed; for example, the two syllables in ZE-RO are given equal emphasis, whereas the first syllable of FOW-er is given primary emphasis.

5.4 Generally, for drivers, are transmitted by pronouncing each digit separately, such as "runway TREE FIFE" for runway 35.

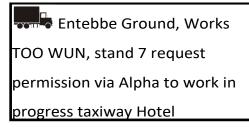
Number	Pronunciation
0	ZE-RO
1	WUN
2	TOO
3	TREE
4	FOW-er
5	FIFE
6	SIX
7	SEV-en
8	AIT
9	NIN-er
Decimal	DAY-SEE-MAL
Hundred	HUN-dred
Thousand	TOU-SAND

6. Movement Instructions

6.1 The following examples illustrate the use of the above terminology.

indicates a transmission by a vehicle driver, and indicates a transmission by the controller, whether the Tower or Ground controller.

6.2 Drivers on first call should state the ground station that they are calling, identify themselves by their vehicle or personal call sign and state their position, requested route (if applicable) and intended destination. Where the planned route includes entering or crossing a runway, this should be included by specifying the word runway AND the runway designator in the initial call. In the examples given "Works TOO WUN" represents the maintenance or engineering vehicle with the call sign Works 21, and "Fire WUN" a fire vehicle callsign Fire 1.



Works TOO WUN, proceed to taxiway Hotel via Alpha

Proceed to taxiway Hotel
via Alpha, Works TOO WUN

Entebbe Tower, Works
TOO WUN, TREE FIFE Hold,
request permission to enter
runway TREE FIFE for lighting
inspection

Works TOO WUN, enter

enter runway TREE FIFE,
Works TOO WUN

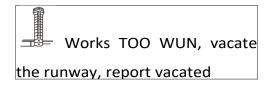
Works TOO WUN, at fire station, request permission, via

Works TOO WUN, hold position

Holding, Works TOO WUN

Works TOO WUN, report

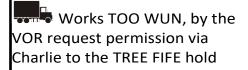
At the TREE FIFE Hold on Charlie, Works TOO WUN

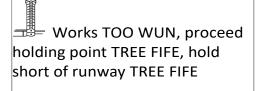




runway TREE FIFE vacated at Bravo, Works TOO WUN

- 6.3 If the controller is too busy he will reply 'standby'. This means that the driver should wait until the controller calls back. The driver shall **not** proceed until permission is given.
- 6.4 When there is conflicting traffic the controller may reply 'hold position'. This means that the driver shall not proceed until the controller calls back with permission. All other replies should contain a clearly defined point to which the driver may proceed; this may or may not be the intended destination. If it is not the intended destination, drivers must stop at this point and further permission shall be requested.
- 6.5 The controller may include the instruction 'hold short' to reinforce the point beyond which the vehicle may not proceed.





proceed holding point
TREE FIFE, hold short of runway
TREE FIFE, Works TOO WUN

6.6 When requesting or receiving permission involving the runway, drivers should note carefully the position to which they may proceed, particularly where the intended route involves entering or crossing a runway. Normally, vehicles will obtain initial permission to proceed to a runway holding position initially, and then request permission to enter or cross the runway, possibly on a

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different frequency (TOWER instead of GROUND). Under no circumstances shall a driver enter or cross a runway unless **positive permission has been given and read back to the tower by the driver.** A runway vacated report should not be made until the vehicle (and towed aircraft if applicable) is outside of the designated runway area as indicated by the runway holding position markings and signs.

6.7 In order to prevent runway incursions, when ATC issues an instruction to cross a runway, the appropriate holding point designator shall be included in the instruction. A vehicle driver should query any instruction that identifies a holding point designator inconsistent with the vehicle location, or the driver's request, before proceeding onto the runway.

Fire WUN, at the fire station, request permission via runway WUN SEV-en to fire gate 1

Fire WUN, proceed holding point <u>FOKS</u> TROT via Alpha, hold short of runway WUN SEV-en

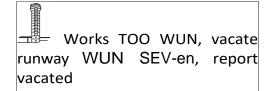
proceed holding point
FOKS TROT via Alpha, hold short
of runway WUN SEV-en, Fire
WUN

Fire WUN, via <u>FOKS</u> TROT cross runway WUN SEV-en, report vacated

via <u>FOKS</u> TROT cross runway WUN SEV-en, wilco, Fire WUN

Tower, runway WUN
SEV-en vacated on the perimeter
road, Fire WUN

6.8 If a vehicle is operating on the runway, it will be instructed to vacate the runway when it is expected that an aircraft will be landing or taking off.





Tower, runway WUN
SEV-en vacated at <u>FOKS</u> TROT,
Works TOO WUN

6.9 When a vehicle is moving on the movement area it may be necessary to inform the vehicle of a potentially dangerous situation and to tell it to stop.



Stopping, Works 21, Works TOO WUN

- 6.10 Drivers of vehicles required to tow aircraft should not assume that the receiving station is aware that an aircraft is to be towed. The performance and manoeuvrability of ground vehicles is obviously considerably reduced when towing aircraft and this is taken into account when instructions to such vehicles are issued. Therefore, in order to avoid any confusion, and as an aid to identification, drivers should state the type, and where applicable the operator, of the aircraft to be towed in the first call.
- 6.11 Where it is necessary for the tug to push an aircraft back from a parking standing before towing, this should be included.
- 6.12 If a driver is lost or unsure of the vehicle's location he should inform the controller immediately and follow instructions.
- 6.13 The driver of a broken-down vehicle should inform the controller immediately, including precise information regarding the vehicle's location and contact the driver's office for support.
- 6.14 In the event of a radio failure, drivers should vacate the runway, preferably onto the perimeter road, and comply with any light signals by the controller.

- 6.15 As part of a vehicles daily inspection, or if any problem with the radio is suspected, it may be necessary to carry out a radio check with either the operator's base or with the Tower. Such test transmissions should take the following form:
 - a the callsign of the station being called;
 - b the caller's callsign;
 - c the words "RADIO CHECK"; and
 - d the frequency being used.
- 6.16 Replies to test transmissions should be as follows:
 - a the callsign of the station calling;
 - b the callsign of the station replying; and
 - c information regarding the readability of the transmission, classified in accordance with the following readability scale:

1	Unreadable
2	Readable now and then
3	Readable but with difficulty
4	Readable
5	Perfectly readable

7. Enquiries

7.1 Any enquiries should be addressed to:

Director of Safety Security and Economic Regulation Uganda Civil Aviation Authority PO Box 5536 Kampala Uganda



Director Safety, Security and Economic Regulation