



This investigation has been conducted in accordance with
Annex 13 to the ICAO Convention on International Civil Aviation,
EU Regulation No 996/2010, and
The Civil Aviation (Investigation of Air Accidents and Incidents) Regulation; Legal Notice 16 of 2013.

Under these Regulations, the sole objective of the investigation of an accident or incident is the prevention of accidents and incidents in the future.
It is not the purpose of this investigation to assign fault or blame, and the reporting process should not be used to determine liability.

Basic Report

**B737-800 instructed by ATC to perform a go-around RWY 13
due to Tecnam P2002 Sierra JF departed RWY 05 without authorisation,
on Wednesday 1 June 2022**

Classification: Incident

OCCURRENCE FILING INFORMATION

- File number BAAI/01062022
- Responsible entity BAAI [Bureau of Air Accident Investigation]
- Occurrence status Incident - Runway Incursion
Aircraft took off without Air Traffic Control [ATC] take-off clearance

WHEN

- Date 1 June 2022
- Local time 15:29 LT
- UTC 13:29 UTC

STATE OF OCCURRENCE: MALTA

- Location RWY 05, Luqa Airport, Malta
- Latitude 35°51'27.4"N
- Longitude 14°28'39.2"E

SEVERITY

- Highest damage to aircraft Nil
- Injury total Nil
- Third party damage Nil

INJURY

- Fatalities Nil
- Serious Nil
- Minor Nil

REPORTS

- Investigation entity BAAI
- Investigation type ICAO Annex 13 investigation
- Investigation delegated Nil
- Final report date This report will be the final report

LIST OF ORGANISATIONS/ENTITIES/PEOPLE INVOLVED

1. Malta School of Flying
2. Malta Air Traffic Services [MATS]
3. Transport Malta - Civil Aviation Directorate [TM-CAD]
4. Malta International Airport [MIA]

AIRCRAFT DESCRIPTION

- Registration F-HUBK
- State of Registry France
- Flight Number F-HUBK
- Manufacturer Tecnam
- Model Tecnam P2002 Sierra JF
- Year built N/A
- Serial number N/A
- Aircraft category Single engine, Category "A"
- Propulsion type Propeller driven aircraft
- Engine manufacturer N/A
- Number of engines One
- Maximum take-off mass N/A
- Maximum landing mass N/A

AIRCRAFT OPERATOR

- Operator Malta School of Flying
- State of operator Malta
- State of registration Malta
- Type of operation Instruction/Private

ITENERARY

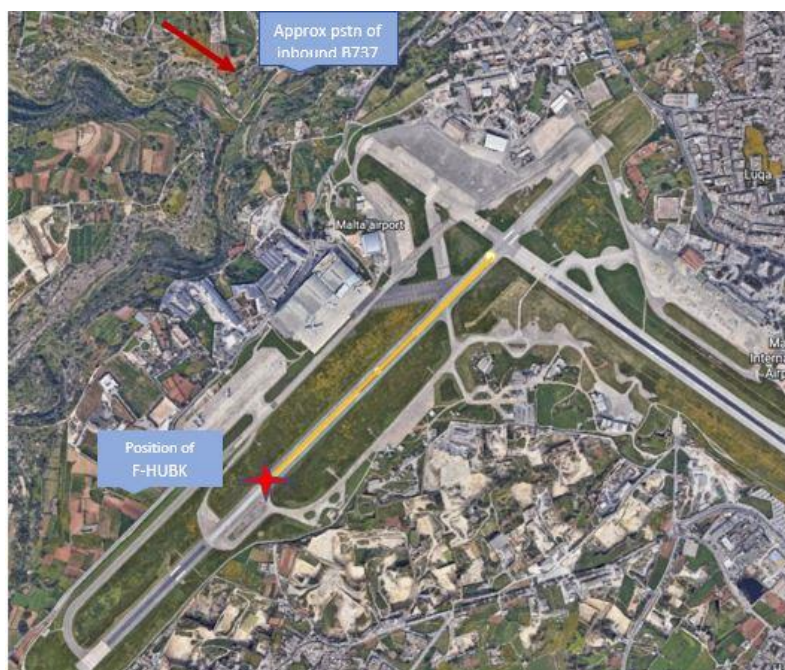
- Last departure Luqa Airport, Malta [LMML]
- Planned destination Luqa Airport, Malta [LMML]
- Actual landing airport Luqa Airport, Malta [LMML]
- Flight phase of occurrence Departing

NARRATIVE

Narrative language: English

Aircraft, Tecnam P2002 Sierra JF, piloted by a Flight Instructor [FI] and a student, taxied to holding point PAPA for runway [RWY] 05 with ATC clearance, *“after departure RWY 05, proceed VFR, initially to Grand Harbour, not above 1500 feet”*. Aircraft requested to hold at holding point PAPA for two minutes. An inbound B737-800 was established on the ILS for RWY 13.

At 13:27:24 UTC, the crew of the Tecnam informed Aerodrome Control [ADC] *“ready for departure”*. ATC instructed the Tecnam to *“line up RWY 05, intersection PAPA, and wait”*, and the crew acknowledged, *“line up 05, intersection PAPA, and wait”*. ATC cleared the inbound B737 to land on RWY 13, and crew acknowledged landing clearance.



At 13:29, the Tecnam commenced take-off roll without having received a take-off clearance, and took off from RWY 05. ATC attempted to stop the Tecnam by giving the instruction to “*hold position, hold position*”, but, during the subsequent interview, the aircraft crew reported that they did not hear the instruction. ATC immediately instructed the inbound aircraft to perform a go-around, “*go around, go around*”.

The crew of the Tecnam continued with the take-off and, when airborne, levelled off at 300’ until the end of the runway so as not to infringe the path of the B737 going around, and continued climb when past the threshold of RWY 23. Crew apologised and requested to return for landing.

No injuries or damage to third party property were noted.

Weather conditions at the airport were CAVOK [Ceiling and Visibility OK], and wind was 140/06.

PROBABLE CAUSE

Narrative language: English

The BAAI obtained Incident Report and transcript from Malta Air Traffic Services [MATS], and conducted an interview with both the Flight Instructor [FI], who was the Pilot in Command [PIC], and the student. A separate interview was held with the Aerodrome Control [ADC] Air Traffic Control Officer [ATCO] on duty.

At the time of the incident, the student had about four [4] hours flying experience over four [4] flights. Student had not yet sat for a Radio Telephony [RT] test. It was the student’s first time with this FI, and the student had already had another two FIs. Student was flying this particular type of aircraft for the first time.

The FI had been instructing since the summer of 2021 and had some 60 hours instructing, and 950 flying hours experience. The FI has logged 550 flying hours on Bombardier Challenger aircraft and possesses a frozen Airline Transport Pilot License [ATPL].

This was the Instructor’s only flight on 1 July, which was a very hot day, with temperature reported at 35°C.

The FI made pre-flight preparations by going over the student’s flight records, then proceeded with briefing the weather, NOTAMs, and the lesson for the session [medium level turns]. During taxiing, the student confirmed willingness to perform the RT under the FI’s supervision. The FI took note and guided the student through the correct procedure.

The crew recall that when the checklist was completed, they started the take-off roll and became airborne. During the subsequent interview, the crew said they did not hear ADC’s instruction to “*hold position, hold position*”, and only realised that something was amiss when they heard the instruction to the inbound aircraft to go around. The transcript shows that the crew listened to ATC’s call and, in fact, replied “*Say again, F-BK*”. The B737 overflew the airborne Tecnam.

The FI took the decision to discontinue the training session and return for landing.

The incident is classified as a Runway Incursion since the Tecnam made use of a portion of an operational RWY without ATC authorisation.

The Tecnam Operator provided a copy of the Tecnam P2002-JF checklist for aircraft I-EAAB, which the School makes available for this aircraft as well. The list for Pre-Take Off Checks has the following item:
ATC Clearance – Obtained.

ATC Clearance can be understood either as the clearance, and instructions, for the session [which was given by ATC]; or the take-off clearance [which was not]; or both.

ATC instructed the Tecnam to “*line up RWY 05 intersection PAPA and wait*” to allow the inbound B737 to land on RWY 13. The lined up aircraft was visible to ATC at all times.

One of the ATC team noticed that the lined up Tecnam was moving, and in his opinion it was not evident whether the aircraft was rolling for take-off, or only moving forward to reposition on the RWY.

ATC recognised immediately that an unsafe situation might be developing, and acted to resolve the problem.

ICAO Document 4444, Chapter 12, Phraseologies:

... to cancel a take-off clearance

HOLD POSITION, CANCEL TAKE-OFF I SAY AGAIN CANCEL TAKE-OFF (*reasons*).

... to stop a take-off after an aircraft has commenced take-off roll

STOP IMMEDIATELY [(*repeat aircraft call sign*) STOP IMMEDIATELY].

Extract from ATC transcript:

13:29:23

ADC F-BK, hold position, hold position.

ADC F-BK. Ryanair go around, go around.

F-HUBK Say again, F-BK.

ATC explains that “*hold position, hold position*”, rather than the more appropriate phraseology “*Stop immediately*”, was used since no take-off clearance had been issued. However, an instruction to “*Stop immediately*” is the appropriate call to stop a take-off.

Had the Tecnam moved forward to simply reposition on the runway, it would not have been a gross infringement as it was still quite some distance [*approximately 1 km*] from the runway intersection and the path of the inbound B737. ATC’s drastic reaction must stem from the realisation that the Tecnam was, in fact, rolling for take-off.

ATC explained that the full proper callsign was not used when addressing the inbound B737 due to the pressure of attempting to resolve the situation.

ATC also said that required traffic information regarding the Runway Incursion to the inbound B737 was overlooked.

The BAAI finds that:

- a) The actions of the crew of the Tecnam resulted in the aircraft taking off without receiving an ATC take-off clearance.
- b) The departing Tecnam came in potential conflict with the landing B737.
- c) ATC acted immediately to resolve a potentially unsafe situation, but the phraseology employed to stop the rolling aircraft was not appropriate for the situation.
- d) The ATC instruction for the departing aircraft to “*Hold position*” did not resolve the situation.
- e) ATC instructed the landing B737 to go around but did not use the full callsign.
- f) No essential traffic information was passed to the B737 regarding the runway incursion and the conflicting Tecnam.

RECOMMENDATIONS

Narrative language: English

1. To Approved Training Organisations [ATOs]:
To avoid unnecessary distraction, instruction that can be given on the ground, or in the classroom, is to be avoided while handling an active aircraft [during taxiing and flying].
2. To Approved Training Organisations [ATOs]:
To consider including a separate checklist item, "Take-off clearance – Obtained" in the Line Up checks.
3. To Malta Air Traffic Services [MATS]:
To put more emphasis on the use of correct phraseology and procedures during ATCOs' periodic refresher training when dealing with normal traffic, unexpected Runway Incursion situations and other contingencies.

GLOSSARY OF ABBREVIATIONS

ADC	Aerodrome Control
ATC	Air Traffic Control
ATCO	Air Traffic Control Officer
ATO	Approved Training Organisation
ATPL	Airline Transport Pilot Licence
BAAI	Bureau of Air Accident Investigation
CAVOK	Ceiling And Visibility OK [visibility, 10 km or more; no cloud of operational significance; no weather of significance to aviation]
EU	European Union
FI	Flight Instructor
ICAO	International Civil Aviation Organisation
ILS	Instrument Landing System
LMML	Luqa Airport, Malta
LT	Local Time
MATS	Malta Air Traffic Services
NOTAM	Notice to Airmen
PIC	Pilot in Command
RT	Radio Telephony
RWY	Runway
TM-CAD	Transport Malta - Civil Aviation Directorate
UTC	Universal Coordinated Time