

WEEKLY MAIL REPORTER

THEY had just finished listening to a Russian opera when things started to go wrong.

Suddenly, as the pilot of Samora Machel's presidential jet started to tell how he'd argued with the authorities in Maputo about fuel, the plane veered to the right.

He was already worried about their fuel supply — the Tupolev TU134A-3's fuel warning light had just come on — and the 40-degree turn raised more than a flicker of concern.

They had been on auto-pilot, but the co-pilot was probably in control as the plane started its descent at one minute after seven o'clock. The captain was apparently monitoring the flight as he prepared to take over for the landing.

There was enough fuel to complete the descent, but not nearly enough to safely reach the only alternative runway available for night-landing — at the port of Beira. But it was a presidential flight, the weather report was good — visibility 10 kilometres — and it was unlikely they would be turned away by Maputo air control.

Unless there was an emergency.

At two minutes after seven, the auto-pilot's pitch control had just disengaged, but the roll and yaw channels remained on. The navigator reported they were 120 kilometres from Maputo.

Eight minutes later, the Tupolev began its mysterious 37-degree turn. The navigator's decision to turn was apparently taken without the captain's knowledge.

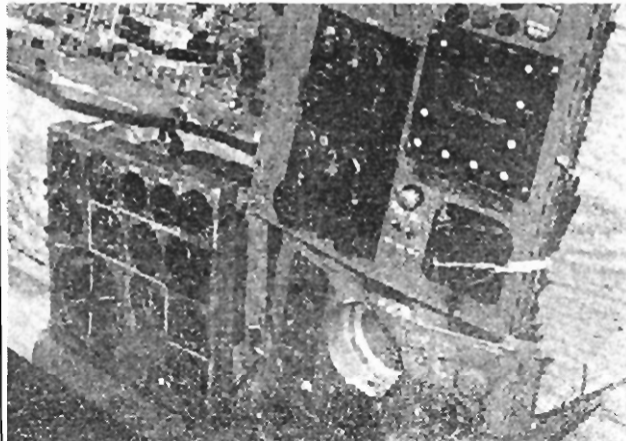
The captain swore strongly and snapped: "Making some turns — couldn't it be straight?" But he seemed satisfied by the navigator's explanation that "VOR indicates that way" — the VOR being a radio direction beacon on the ground, supposedly guiding them into Maputo airport.

Seconds later the Russian crew was dividing up beer and cokes — apparently in anticipation of the landing. At 12 minutes past seven the reserve fuel warning light on the instrument panel lit up for 25 seconds: 2 400 kgs of fuel left. No-one commented — it was expected.

At 12 minutes and 51 seconds past the hour the co-pilot asked: "And why those two are lit and these two are not?" He was apparently referring to four lights on the panel indicating which radio direction systems were

# As the music fades, the trouble begins

*Last moments in the life of the Machel plane*



Instrument panel of the ill-fated Tupolev was displayed at hearing.

working. The sequence seemed wrong. They discussed it briefly, then dropped the issue; the captain seemed more concerned about the time of touch-down — anxious to arrive at 7.20.

At 15 minutes and 24 seconds past seven he asked: "How many is it left?" The navigator replied: "60 kms." "Five minutes," estimated the captain. They began talking about the division of the beers and coke again.

Sixteen minutes and 58 seconds past the hour he told the flight engineer: "It is necessary to tell them about the RV." He could have been thinking that the radio altimeter — which would sound the alarm if they were too close to ground level — was malfunctioning. "Say it, say, it is not for the first time," replied the radio operator.

At 17 minutes and 21 seconds came the first hint that something was wrong with their position. The captain cursed and said: "There is no

Maputo?" "What?" asked the co-pilot. "Electrical power is off, chaps," said the captain — apparently thinking there was a power failure at the airport.

"There to the right, it is lit," said the co-pilot. "There is something I don't understand ahh ..." said the navigator. "No there is something ..." was the captain's response.

"ILS switched off and DME (ground landing systems)," exclaimed the navigator. "And NDBs (non-directional beacons) do not work!" he added.

There was a gabble of voices: "There to the left ... what kind of light is there ... something strange?"

"Three thousand feet," said the co-pilot — the height at which they had to tell Maputo airport they were about to land.

It was 18 minutes and 11 seconds past seven.

The radio operator called ground control: "Maputo Charlie Nine

Charlie Alpha Alpha." Maputo's Aerodrome Flight Information Service (Afis) cut in: "Charlie Niner Charlie Alpha Alpha Roger. Confirm you have ... ah ... field in sight?"

"Not yet."

"And ... runway lights negative yet?"

"Not, negative," said the radio operator. There was more confusion as the captain interjected, to say nothing was working on the ground.

"Something is wrong," said the captain. Another gabble of voices as the crew seemingly strained their eyes, trying to spot the crucial lights. They were still descending.

The minimum safe altitude for visual approach is 1 673 feet.

"I understand nothing," says the captain. "Don't you see the runway yet?" asks the radio operator. "... And what runway, what are you talking about?"

"We are going to do straight-in approach?"

"We are doing straight-in approach."

"No, well, can you see the runway?"

"No, there's nothing, there's neither city nor runway."

"Some 18-20 kilometres left," intoned the navigator. "Maputo Charlie Nine Charlie Alpha Alpha, check again runway lights," came the plea from the radio operator. Twenty-one minutes and two seconds past the hour, an alarm started sounding — the terrain proximity warning.

"Roger, you are cleared for visual approach," came the response from Maputo. "Damn it," said the captain.

"Charlie Nine Charlie Alpha Alpha runway lights out of service?" repeated the radio operator. "No, it's cloudy, cloudy, cloudy," said the captain despairingly.

"... 'firm, runway lights out of service?" asked Maputo. "Affirmative, lights not in sight."

"Affirmative and join right down wind runway five," said Maputo.

Twenty one minutes and 32 seconds. The alarm stopped ringing.

Navigator: "No, no, there's nowhere to go, no NDBs, there's nothing."

Captain: "Neither NDBs nor ILS." Twenty-one minutes and 39 seconds past seven o'clock, the flight recorders registered half a second of silence.

The president was dead.