1222 FLIGHT International. 21 April 1979

W rid news
Lack of data hinders 727 investigators
ONLY height, speed, heading and
acceleration information is available
from the TWA 727 which was
damaged during a rolling manoeuvre
near Detroit on April 4. The flight-
data recorder (FDR) is a metal-foil, four-channel model and the US National Transportation Safety Board had not finished transcribing the record as we close for press. The board says that the cockpit voice recorder trace "was erased" and that this was not something that happened automatically with the elapsing of 30 minutes. "Why the tape was erased and by whom is part of our continuing investigation," a board spokesman tells Flight.

Evidence is due to be given on oath by the flight crew at a public session in Los Angeles, programmed to take place after our closing deadline. The board stresses that this is not a full public hearing into the accident, but that it will be the first time that the crew has made a full statement to the investigators.
While the crew evidence is an important element in the investigation suspicion is also attached to en-gineering aspects. As we close for press there is a strong suggestion that the autopilot was attempting to cor-rect for another problem that developed as the aircraft was cruising at 39,000ft and Mach 0-8 (approxi-mately 230kt indicated airspeed). The incident occurred on a dark night when there was little natural horizon and it is not certain whether the 727 became fully inverted as at first reported.

Flight's own technical assessment of the 727 design, coupled with the opinions of experienced test pilots, leads to the conclusion that reports that the aircraft exceeded Mach 1 are almost certainly incorrect. The aircraft was taken up to Mach 0-95 during certification trials and this is thought to be the practical limit for an essentially subsonic design.
The limited data available from the FDR will not permit full analysis of

Decca wins

$40 million in court
DECCA LIMITED has been awarded $39,355,715 in the US Court of Claims as compensation for US Government infringements of Decca patents pro-tecting the Delrac navigation system. The patented techniques were used in Omega. Decca will also receive $5,436 per day for each day from April 1, 1979, to the date of payment.

the behaviour of the aircraft and, as the particular unit cannot record an indicated airspeed greater than 450kt, the maximum speed reached in the dive is unlikely to become known. Airspeed indicator readings on the flight deck could be unreliable because of position-error effects at large slip angles and of compressibility error once the speed exceeded maximum permitted Mach (MM0),
As noted in Flight last week, parts of the aircraft separated from the main structure during the flight and one 727 operator understands that the main effort is directed at finding the No 7 leading-edge slat which is missing, together with a portion of its actuator. Investigators want to know at exactly what point in the

sequence of events this component separated from the wing. The aircraft without this slat would be likely to yaw and roll to the right and its loss could also induce a nose-down pitching moment.

• The aircraft, N840TW, was delivered to TWA in 1965 and has since flown about 35,000hr. Items missing from it, as well as the No 7 slat (the second part in from the right wingtip), include the left main under-carriage door, the right main under-carriage inboard door, one spoiler from the right wing and numerous antennae. The aircraft has been parked on a taxiway at Detroit since it landed and has been supported on jacks as a precaution against the undercarriage folding.

Soyuz 33 link-up attempt fails
AN attempted docking between Soyuz
33 and the orbiting laboratory Salyut 6
was abandoned when Soyuz 33's
approach correction power unit mal-
functioned at 2154hr Moscow time on
April 11. Soyuz 33 flight commander Nikolai Rukavishnikov and research engineer Georgi Ivanov are now pre-paring to return to Earth. Ivanov is the first Bulgarian to fly in space. Soyuz 33 was launched at 2034hr Moscow time on April 10.

The attempted docking follows the separation of the supply ship, Progress

5, from Salyut 6 at 1910hr Moscow time on April 3. Progress 5 brought hydrazine fuel for Salyut 6 and con-sumables for its occupants, Soyuz 32 cosmonauts Vladimir Lyakhov and Valery Ryumin. While the two craft were docked with Salyut 6, the cos-monauts attempted to repair one of the orbiting laboratory's fuel tanks (Flight April 7).
Progress 5's engines were also used to raise the orbit of the Salyut 6 com-plex, in burns made on March 30 and April 2.

US engine for
Anglo-Italian
helicopter
WESTLAND is reported to have ordered 11 GE T700 turbines for ground and flight testing of the WG.34A Sea King replacement heli-copter, which is being developed in association with Agusta in Italy. Though this does not confirm the choice of the engine for production aircraft, it does avoid the development delay associated with the second favourite engine, the Rolls-Royce/ Turbomeca 321, which is still a paper project. Other engines considered were the Turbomeca Makila and the Rolls-Royce Gem.

Westland is also reported to have asked GE to develop a power control unit to govern three T700s installed in the WG.34A, so that the helicopter is now virtually certain to have three engines. The T700 has already been selected for Black Hawk, Seahawk (Lamps), AH-64 and, in its civil CT7 version, for the 214ST.

Small world . . .

Boeing is the first foreign company to apply to participate in the Japanese International Aerospace Show (Iruma Air Base; November 18-25). Other organisations intending to take part include: Gifas (France), BDLI (West Germany), Aviaexport (USSR), SBAC (UK) and America's Lockheed, McDon-nell Douglas, Rockwell International, United Technologies and Garrett AiRe-search.

Welsh national airline Air Wales ceased operations on April 6. Its two Bandeirante turboprops were imme-diately leased by Air Ecosse, increas-ing its fleet to six.

Interaviation Expo 79 exhibition (Athens Hilton, November 25-30) will endeavour to give a representative picture of international civil and military aviation in the Greek area, say organisers the Institute of Indus-trial Exhibitions (6 Capstali Str, Athens 138, Greece; telephone 724-533/729-333).