ARCHIVED REPORT

For data and forecasts on current programs please visit

www.forecastinternational.com or call +1 203.426.0800

Basilisk - Archived 8/98

Outlook

- In service with the French Air Force
- Domestic production completed
- Export orders look increasingly unlikely as time passes

15	Unit	s								
10 5			N		Pro ore			on		
0	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006
	0	0	0	0	0	0	0	0	0	0

Orientation

Description. Jamming pod tasked with defense suppression in support of penetrating attack aircraft, particularly nuclear strike.

Sponsor

Delegation Generale pour l'Armement (DGA) 10/14 Rue Saint Dominique F-75997 Paris Armees France

Contractors

Thomson CSF Division Equipments Avioniques 178 boulevard Gabriel Peri F-92240 Malakoff France Tel: +33 1 46554422 Telex: 204780 Dassault Electronique 55 quai Carnot F-92214 Saint Cloud France Tel: +33 1 46025000 Telex:250787

Licensee. No production licenses have been granted.

Status. In service

Total Produced. Analysis indicates that less than 20 Basilisk pods were built for the Jaguar program, with a few additional systems for other applications.

Application. Various French Air Force platforms, but mainly intended for Jaguar defense suppression aircraft.

Price Range. Based on the known unit costs of similar systems, Basilisk can be expected to cost approximately US\$500,000.



Technical Data

Dimensions	Metric	US
Pod length:	5.98 m	19.8 ft
Pod diameter:	0.41 m	1.4 ft
Pod weight:	550 kg	1,100 lb
Frequencies covered:	D to J-bands	
Capacity:	20 simultaneous threats	
Output:	500 Watts (max)	

Design Features. Basilisk is designed to provide ECM against surveillance radars including battlefield and air defense types. The pod-mounted system can also provide jamming against airborne surveillance systems. The system can cover two octaves of hostile frequencies and simultaneously jam at least 20 individual threat emissions. The pod is self-contained, having its own cooling and power supplies, in addition to containing a receiver and jamming transmitters. Antennas are mounted on the fuselage of the plane or under-wing. The Basilisk has modular software, similar to that deployed in the Barem pod, and can be reprogrammed to counter any threats

experienced in operations. The system has an effective radiated power output reportedly in excess of 500 watts. Though the system has a fully automatic operational mode, the pod can also be slaved to a manual controller unit operated by the weapons operator or pilot.

Operational Characteristics. The Basilisk pod mounted system is designed especially for attack jamming against long/medium range surveillance radars (including Soviet IL-76 Mainstay airborne systems). It is optimized to provide defensive screening for formations of aircraft rather than for individual platforms.

Variants/Upgrades

No known upgrades or variants exist.

Program Review

Background. Basilisk was designed to equip the dedicated Jaguar ECM aircraft intended for the French Air Force. These aircraft were originally envisaged as having Wild Weasel capability. When the scale, cost and complexity of the reconstruction became obvious, this requirement was scaled back. The outcome of this was the Jaguar defense suppression aircraft intended to create a path through enemy defenses for exploitation by Mirage IV and Mirage 2000 aircraft. These Jaguars received only minimal modifications for this particular operational profile, and the Basilisk pod was developed to provide these aircraft with jamming capability against search radars.

Basilisk is derived from Thomson-CSF's earlier Caiman noise/deception jamming pod. Caiman has been sold to the French Air Force for deployment aboard Dassault-Breguet Mirage F-1 aircraft. Caiman has also been procured by a number of other countries including Iraq, and has been exported to India for its SEPECAT Jaguar aircraft. It is possible that a very small number (possibly only two or three) Basilisk pods were supplied to India as equipment for the Indian Jaguar fleet. If that is the case, the pods were probably surplus French Air Force equipment included to sweeten the pot on a different French contract with the Indian Air Force.

In French service, the Basilisk jamming system equips a single squadron of Jaguar A aircraft tasked with defense suppression. Details of its likely potential remain unclear, but it is believed to have a greater frequency coverage and operating potential than an older system such as Remora or Caiman. Basilisk is being offered for export.

In November 1992, Dassault Aviation was awarded a Taiwanese order, worth US\$3.8 billion, for 60 Mirage 2000-5 aircraft together with 1,000 Magic-2 and MICA air-to-air missiles. The first of the new aircraft was delivered in late 1995. These aircraft carry the standard internal EW fit for the Mirage 2000 family but are reported to be provided with both the Barem and Basilisk EW pods.

Funding

Development was funded under French Government contract.

Recent Contracts

No contractual information has been made publicly available.

Timetable

1991

Entered service on Jaguar A

Worldwide Distribution

France (20 on 18 Jaguar As) India (2 or 3 systems on Jaguar) Taiwan (4 to 6 systems ordered for Mirage 2000-5)

Forecast Rationale

Basilisk appears to be a classic French design in that it is optimized for a specific, limited-production requirement. Once that requirement has been fulfilled, it is likely to be held as being available and produced in small batches to specific customer requirements at irregular intervals.

All the available evidence points to Basilisk being the result of attempts to utilize residual technology from a canceled program. The concept of using the Jaguar in a Wild Weasel role was always questionable. The load lifting ability of the aircraft is simply insufficient to carry the necessary electronic warfare equipment and a suitable anti-radar weapons system.

Packaging the jamming equipment into a pod, albeit a large and unwieldy one, is a useful compromise. The resulting pod is an effective broad-band jamming system. About 20 are thought to have been procured to equip the 18 Jaguars tasked with defense suppression, two of which were subsequently supplied to India.

An internally mounted derivative of this jammer was to be under development for the Rafale. It is unlikely, however, that the Rafale will be equipped with Basilisk pods. While Thomson-CSF and Dassault (along with Matra) are working on the EW suite for the aircraft, it's jammers will be more advanced than the Basilisk, and will likely carry a different designation.

The initial production run of Basilisk, intended to meet domestic requirements, was short and has already reached its conclusion. Most Jaguar aircraft intended to carry the pod have now received their systems.

Since all of Basilisk's known orders have been filled, it is likely that no more Basilisk pods will be produced. As replacements become necessary, customers will no doubt be drawn to the more advanced jammer pods which are now available.

Ten-Year Outlook

No further production is forecast.

DROP THIS REPORT

* * * * *

