

AD-A133 785

THE FIRST PEEK AT CHINA'S NEW FIGHTERS FOR THE EIGHTIES
THE JIAN-8 AND JIAN-12(U) FOREIGN TECHNOLOGY DIV
WRIGHT-PATTERSON AFB OH 22 SEP 83 FTD-ID(R5)T-0452-83

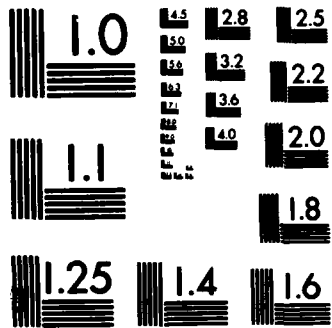
1/1

UNCLASSIFIED

F/G 1/3

NL





MICROCOPY RESOLUTION TEST CHART
NATIONAL BUREAU OF STANDARDS-1963-A

2

AD-A133785

FOREIGN TECHNOLOGY DIVISION



THE FIRST PEEK AT CHINA'S NEW FIGHTERS FOR THE EIGHTIES,
THE "JIAN-8" AND "JIAN-12"



S DTIC ELECTE **D**
OCT 20 1983
B

DTIC FILE COPY

Approved for public release;
distribution unlimited.



EDITED TRANSLATION

FTD-ID(RS)T-0452-83

22 September 1983

MICROFICHE NR: FTD-83-C-001175

THE FIRST PEEK AT CHINA'S NEW FIGHTERS FOR THE
EIGHTIES, THE "JIAN-8" AND "JIAN-12"

English pages: 4

Source: Commilit, Nr. 2, February 1983, pp. 32-33

Country of origin: China

Translated by: Randy Dorsey

Requester: FTD/TQTM

Approved for public release; distribution unlimited.

THIS TRANSLATION IS A RENDITION OF THE ORIGINAL FOREIGN TEXT WITHOUT ANY ANALYTICAL OR EDITORIAL COMMENT. STATEMENTS OR THEORIES ADVOCATED OR IMPLIED ARE THOSE OF THE SOURCE AND DO NOT NECESSARILY REFLECT THE POSITION OR OPINION OF THE FOREIGN TECHNOLOGY DIVISION.

PREPARED BY:

TRANSLATION DIVISION
FOREIGN TECHNOLOGY DIVISION
WP.AFB, OHIO.

GRAPHICS DISCLAIMER

All figures, graphics, tables, equations, etc. merged into this translation were extracted from the best quality copy available.

Accession For	
NTIS GRA&I	<input checked="" type="checkbox"/>
DTIC TAB	<input type="checkbox"/>
Unannounced	<input type="checkbox"/>
Justification	
By _____	
Distribution/	
Availability Codes	
Dist	Avail and/or Special
A	



THE FIRST PEEK AT CHINA'S NEW FIGHTERS FOR THE EIGHTIES, THE
"JIAN-8" AND "JIAN-12"

In the process of carrying out military modernization, China's Shenyang Aeronautical Research Institute has gone through a constant struggle and has mastered the technology of designing new generation fighters and a number of new type fighters are already in the development and flight testing stages. This has aroused the utmost interest among foreign military scholars. However, since China maintains secrecy with regard to military information, the outside world knows little about these new designs. Therefore, military researchers everywhere are limited in their ability to determine detailed technical data or even the correct designations of these new model fighters. On the basis of estimates, China presently has two fighter models being tested, the "Jian-8" and the "Jian-12". A brief description follows:

The "Jian-8", like the "Jian-12", can fly at over Mach two. It is powered by two Chinese-built Soviet Tumansky R-11 jet engines and it is a variable-geometry swing-wing fighter. The "Jian-12" is powered by a single British Roll Royce "Spey" engine and it is a delta-wing fighter. The "Jian-8" was probably developed from the Shenyang F-12A (Note: for further information on the Shenyang F-12, please refer to page 37 of the March 1980, No 40 issue of this publication), however, the nose and the air intakes are completely different from the F-12. The "Jian-8" nose design is very similar to that of the Mig-21 which western military scholars call the "Finback". The "Jian-12" is probably a modification of the Shenyang F-12B with the same delta wing configuration but its nose air intakes are larger. This model

is still undergoing testing and therefore has not been given a name by western military scholars. [TRANSLATOR'S NOTE: i.e., no NATO code name.]

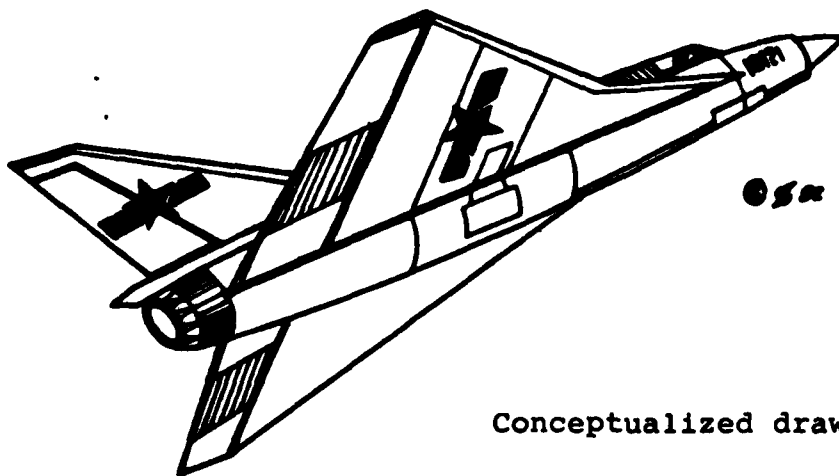
In the area of aviation design there have been two technological breakthroughs since 1975. The first was when relations soured between Egypt and the Soviet Union and all the Soviet technicians were withdrawn from Egypt, causing the Egyptian Air Force to find itself in difficult circumstances, its supplies interrupted. China then supplied Egypt with Shenyang "Jian-6" spare parts and technology, whereupon the Egyptian Air Force reciprocated by providing to China, for research purposes, one (two, according to a certain account) Mig-23 which had been supplied to Egypt by the Soviet Union. This aircraft was subsequently disassembled and analyzed at the Shenyang Aeronautical Institute. The information obtained from studying it was used to design the "Jian-8" fighter. In order to be more adaptable to combat conditions in China, China's aeronautical engineers modified the aircraft's nose, installed a Chinese-designed all-weather radar and high-speed canon. It has now been put into production and has gone into service. According to Taiwan sources, China can produce ten "Jian-8" aircraft per month. They began putting them into service several years ago and now there are several hundred formations soaring over North China and South China. Whether or not this is true is impossible to say.

The second breakthrough in Chinese aviation engine technology was the signing in 1975 of a technical exchange contract and an agreement for the Chinese domestic manufacturing of "Spey" engines in cooperation with the Rolls Royce Company of Great Britain, thus enabling China to enter a new domain in engine technology. From 1975 to 1976 Great Britain supplied China with twenty-five "Spey" engines with afterburners. Also certain other spare parts continued to be imported including four test engines shipped to the Xian test facility along with parts kits for the trial assembly of one complete engine. It is reported that when it was tested in 1979, the engine achieved excellent results which gave the Chinese technicians a lot of inspiration. During this engine testing period, China sent more than fifty technicians to Great Britain for training which represented a major planting of seedlings for the subsequent development of Chinese

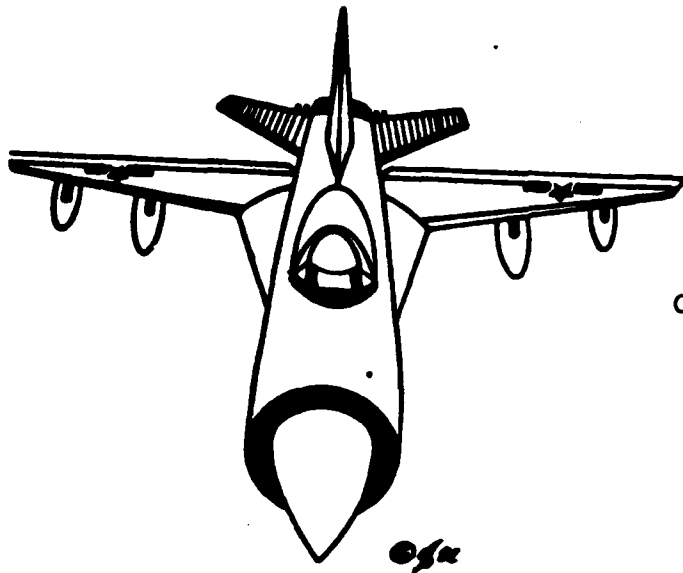
designed engines. Foreign observers feel that China's acceptance of foreign technological importation is only a transitional period and are convinced that before long China will have sufficient technology to design and manufacture their own engines. As a result of the importation of the "Spey" engines, China's aviation authorities will use them for the newest aircraft designs. The "Jian-12" perhaps was designed under these conditions.

The "Jian-12" is estimated to weigh about 44,000 lb (20,000kg), maximum speed is approximately Mach 2.4 and this has been confirmed by the Rolls Royce Company. An F-4K "Phantom" equipped with a British "Spey" engine has a maximum speed of Mach 2. If it weren't for the Chinese having been able to make technological improvements in the "Spey" engine compressor component alloys, achieving a performance of Mach 2 would have been impossible. Perhaps China's achievements in metallurgy are greater than what the outside world thinks.

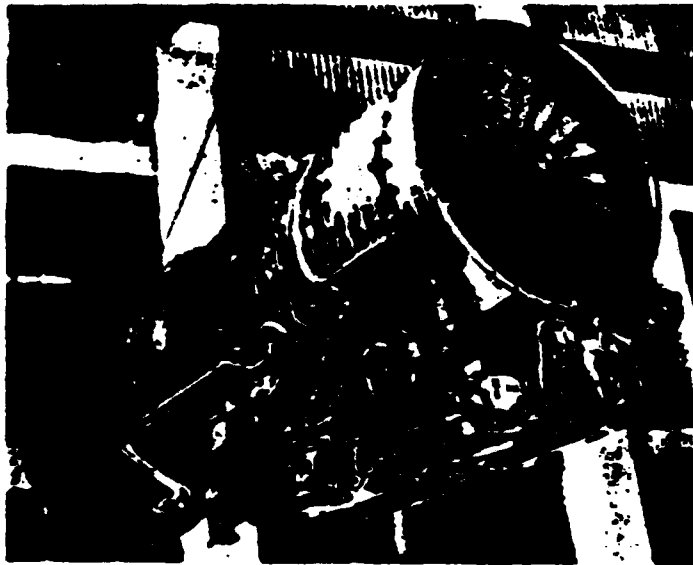
Both the "Jian-8" and the "Jian-12" can carry Chinese-built AA-2 "Atoll" air-to-air missiles, and according to U. S. sources, the "Jian-12" can carry the Chinese designed electronic fire control system as well as radar-guided missiles (equivalent to the Smart guided missiles of the U. S. - i.e., an automatic target seeking, radar-controlled missile). Whether this is true or not, time will tell.



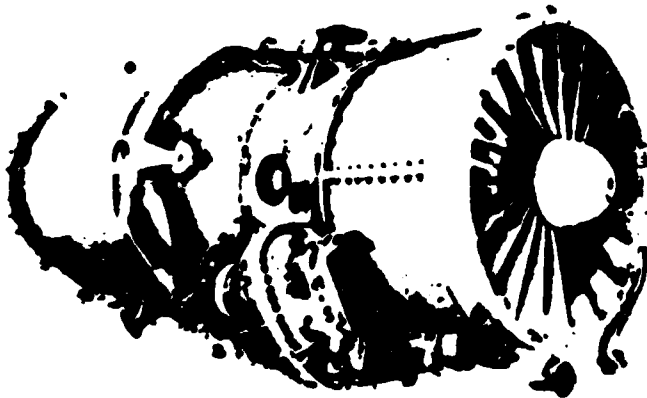
Conceptualized drawing of "Jian-12" fighter



Conceptualized drawing of "Jian-8"
fighter



A Soviet-made Tumansky R-11
engine



A "Spey" turbofan engine of
the Rolls Royce Company of
Great Britain

END

FILMED

10-83

DTIC