

AIRCRAFT IN DETAIL



THE ISRAELI AIR

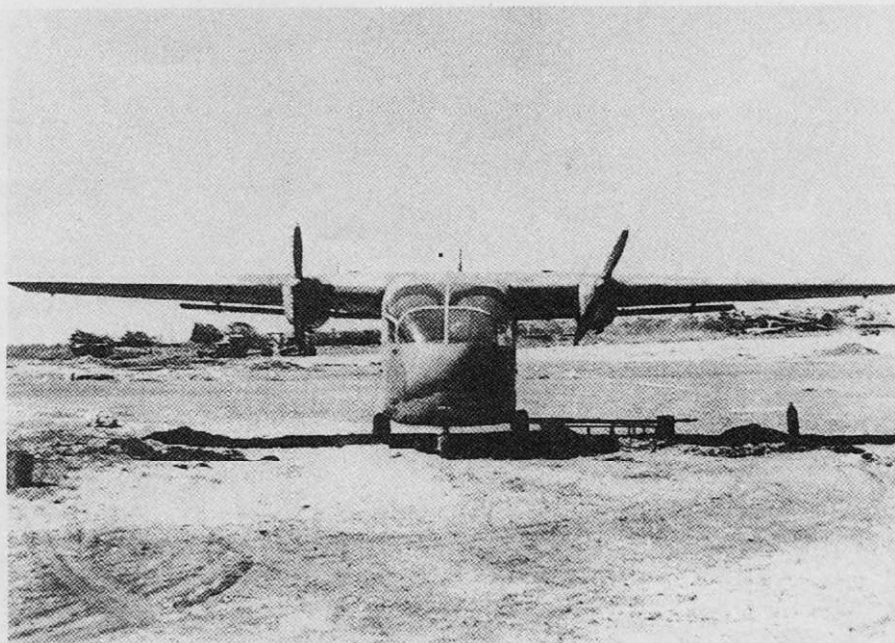
Part 1: 1947 to 1967



In November 1947 the United Nations approved the partition of Palestine into Arab and Jewish states. The British mandate was to expire by May 1948 and while the Jewish community accepted the UN resolution the Arabs did not and the local struggle – to be known as the Israeli War of Independence – began. This was to last until May 1948 when the British withdrawal was immediately followed by an Arab League invasion. It was that atmosphere which witnessed the birth of the Israeli Air Force (IAF).

From left to right: the IAF CO Aharon Remez, the IDF CoS Iga'el Yadin, the Prime Minister and Minister of Defence David Ben-Gurion and the IAF Head of Training Group Daniel Shimshoni inspect a line-up of Stearmans in August 1950. One of the two airworthy IAF Museum Stearmans has been restored as s/n 31 in perfect silver finish. (Government Press Office)

Shortly before this photo was taken in July 1962 the Israeli Super Mysteres received the then standard camouflage scheme following the introduction of the Mirage as the top IAF interceptor. (GPO)



the first fruits of a worldwide procurement campaign which was launched in late 1947.

The influx of aircraft resulted in the formation of No.2 Squadron (The Negev) at Nir-Am and No.3 Squadron (The Galil) at Yavniel, the squadron at Tel-Aviv became No.1 Squadron and was augmented in April by No.4 Squadron. Yet it was clear that while the lightplanes performed well in the struggle with the local Arabs, the anticipated Arab invasion required the introduction of combat aircraft.

Thus in April 1948 ten Avia S.199 fighters – the Czech version of the Messerschmitt Bf 109 – were ordered and these were planned to be flown to Israel by ten C-46s and three C-69 Constellations that were procured in the USA in addition to a pair of chartered C-54 Skymasters. The number of S.199s ordered was soon increased to 25 and the first arrived in Israel within a C-54 on the night of 20-21 May, the month that the AS became the Israeli Air Force.

On 29 May the newly formed 101 Squadron launched its first combat

The Miles Aerovan B-71 (ex-G-AJWI of Mayfair Air Services) was destroyed on 17 July 1948, just a month after it entered IAF service. (IDF Archives)

operation from Tel-Nof but moved to Hertzeliya the next month. In June 103 Squadron was formed at Ramat-David to operate several C-47s and a single DC-5 while Air Transport Command (ATC) was formed at Tel-Nof and assumed responsibility for the operations of the C-46s, C-54s and the single C-69 that arrived from the US.

A heavy bomber element was added in July when 69 Squadron was formed at Ramat-David with three B-17 Flying Fortresses. It was almost exactly that skeleton of units with which the IAF emerged from the War of Independence in early 1949, except for the formation of No.35 Flight at Tel-Nof, at first with C-64 transports and then with Harvard dive bombers, and the retitling of the ATC as 106 Squadron.

However the number of types of aircraft continued to grow. The lightplane squadrons replaced the Auster as their mainstay with the Piper Cub while additional Dragon Rapides, a single short-lived Miles Aerovan, a pair of Nord Norécrins, an additional three

R FORCE

BY SHLOMO ALONI

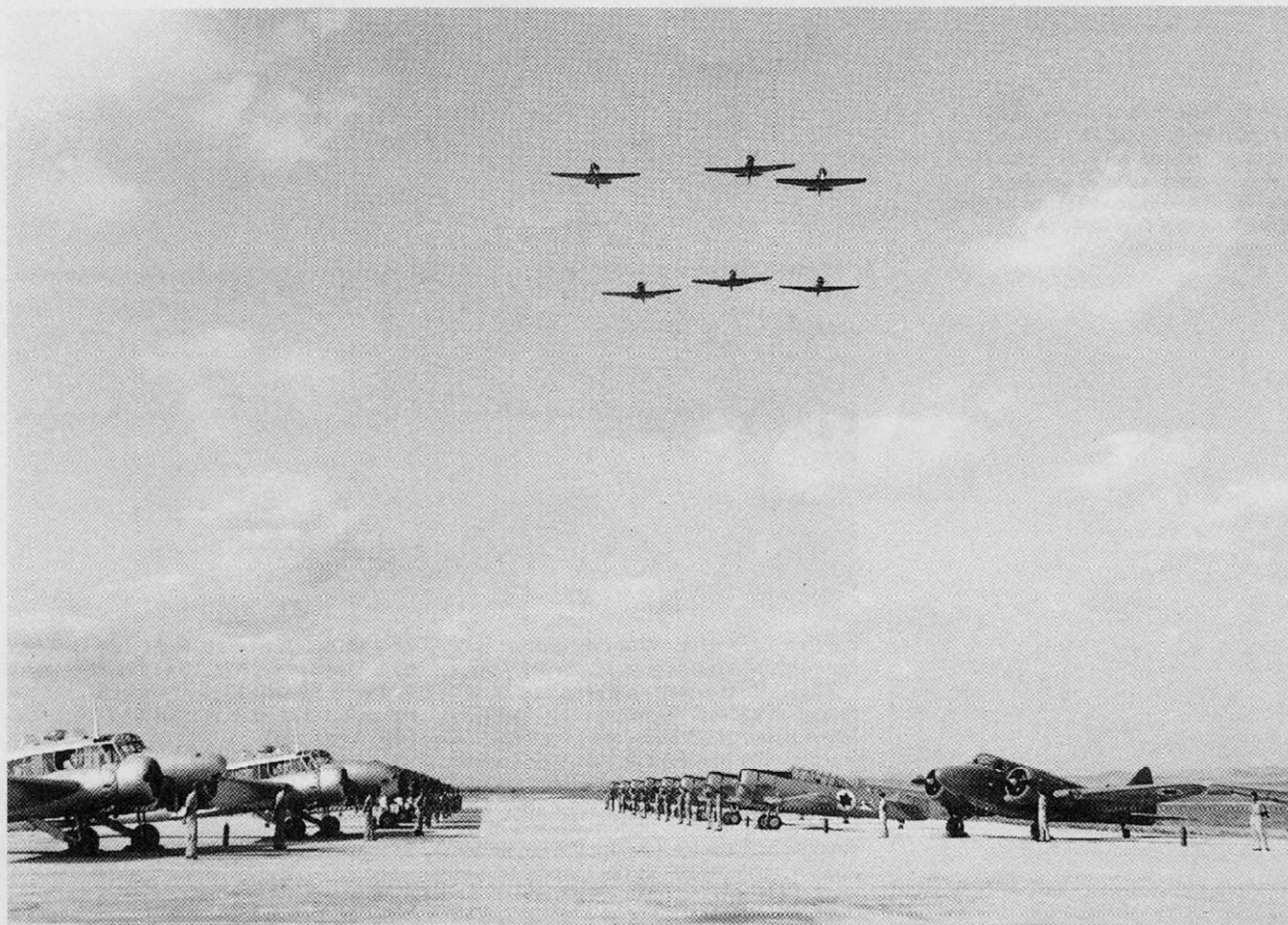
THE WAR OF INDEPENDENCE

In December 1947 the Jewish aviation assets in Palestine were reorganised as the Air Service (AS). This consisted of a single squadron which operated from Sde Dov, to the north of Tel-Aviv, a collection of civil lightplanes on liaison, observation, transport and even close air support and attack missions. The aircraft were three Taylorcrafts, two Tiger Moths, two RWD.13s and a single Auster.

In January 1948 20 Auster AOP.3s and 5s, surplus to RAF requirements, were procured in an auction and these progressively entered service beginning in February. In early 1948 a civil Dragon Rapide and a private Republic Seabee were added while a Fairchild Argus was confiscated in April from its Egyptian pilot who had landed in the Negev on a drug smuggling flight. The same month a C-47 arrived from South Africa and was used for both VIP flights to Europe and internal transport missions. May saw the arrival of two Beechcraft Bonanzas from South Africa plus a single C-46 Commando and a pair of C-64 Norsemans from Europe. These were

The first IAF jet was the Gloster Meteor and s/n 10, an F.8, was photographed flying over the cultivated Izrael Valley in July 1954. (GPO)





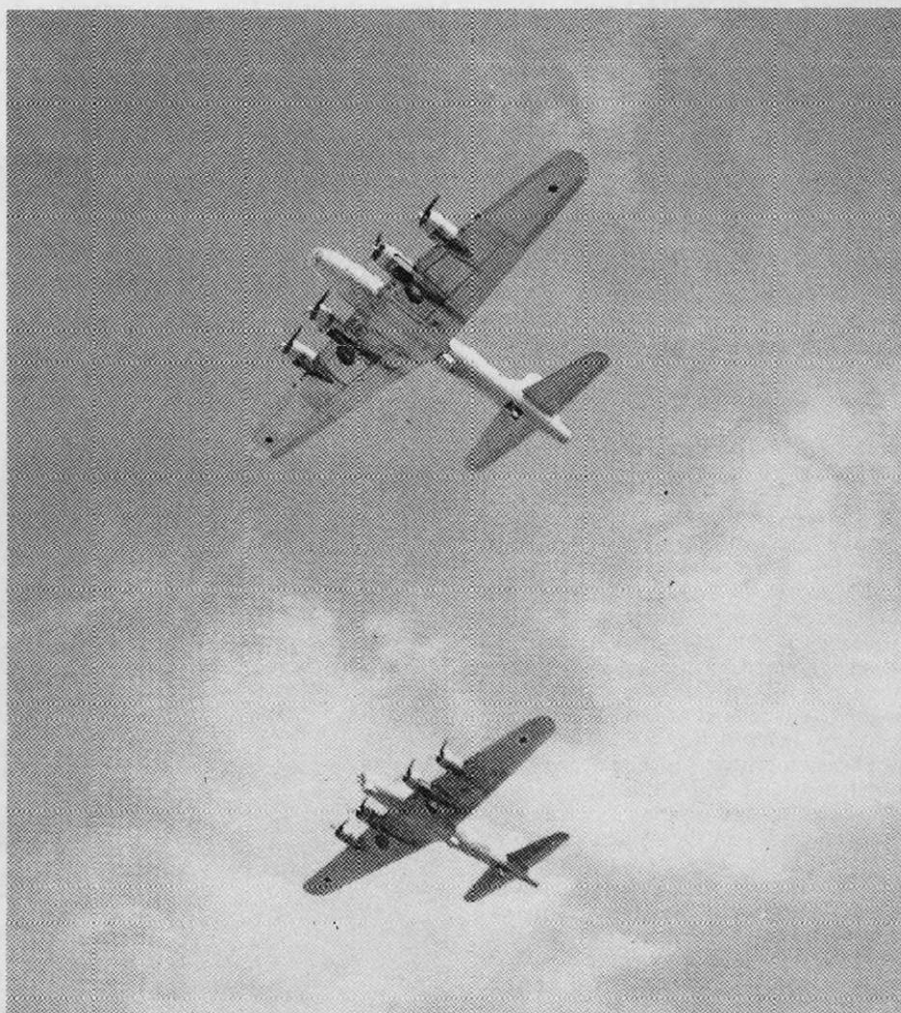
The IAF trainers, August 1950. As six basic/advance Harvard trainers fly in formation overhead the Consul multi-engine trainers, the Anson air crew trainers, the Stearman primary trainers and additional Harvards are on display down below. (GPO)

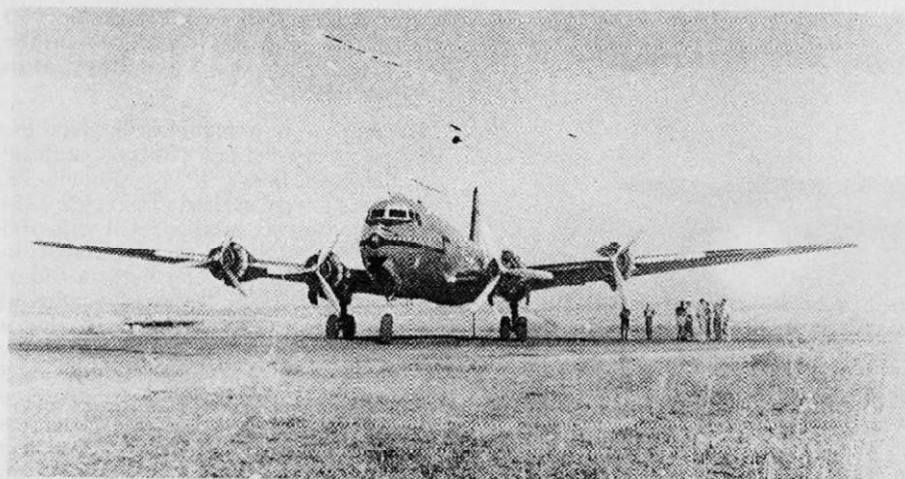
Fairchild and a single Bonanza were added. The fighter squadron at Hertzeliya received Spitfires from Czechoslovakia and P-51 Mustangs from the USA, and in November moved to Hatzor, and then the transport squadron at Ramat-David was divided into two flights: A Flight with the transports and B Flight with a single Mosquito and a quartet of Beaufighters. Other types of lesser importance or longevity were also introduced so that by early 1949 more than 30 types were in the inventory and as the war ended a reorganisation was evidently required.

THE FORMATIVE YEARS

In June 1949 the IAF was reorganised. Ramat-David became the fighter base with 101 Squadron which operated the Spitfires and the Mustangs, the S.199 having been retired. Tel-Nof became the principle IAF air base with 69 Squadron and 103 Squadron which operated the C-47s plus a few remaining C-46s which were progressively passed to El-Al, the new

Only three B-17Gs entered IAF service and of these two were adopted for maritime surveillance in the early 1950s. The two aircraft – photographed in January 1953 – had their under nose gun turrets replaced by radars. (GPO)





Neither C-54s to enter Israeli service ever carried full IAF markings. NC56011 became IAF 1802 but was unserviceable since late October 1948. It eventually became El-Al's 4X-ADN. (IDF Archive)

as the first Mosquito unit in July 1951 at Tel-Nof, the latter became a single unit base for a short while with the local 22 AMU.

In 1952 Hatzor lost one of its squadrons when 103 Squadron returned to Tel-Nof but in 1953 a second Mosquito unit, 101 Squadron, was formed at Hatzor. At Ramat-David a third fighter unit was formed, 107 Squadron with Spitfires, but this was short lived as it was disbanded the next year although a far more significant addition to the fighter force at Ramat-David was the formation of 117 Squadron in June 1953 as the first IAF jet squadron with 11 Meteor F.8s and four Meteor T.7s.

Although additional Meteors and

A rare photo of a Bonanza in IAF service with a Dragon Rapide visible in the background. Bonanza 02 was most likely ex-B-42 of South African origin and the locally improvised underfuselage external bomb racks are clearly visible. (IDF Archive)

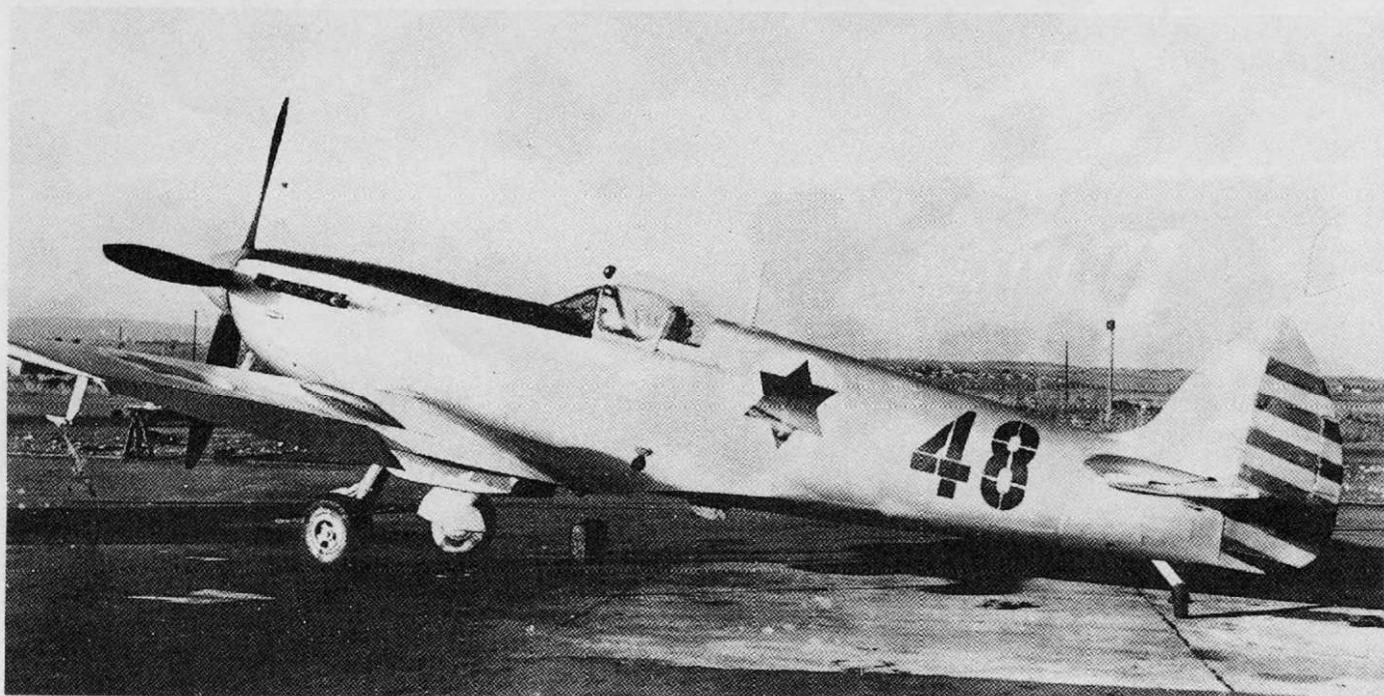
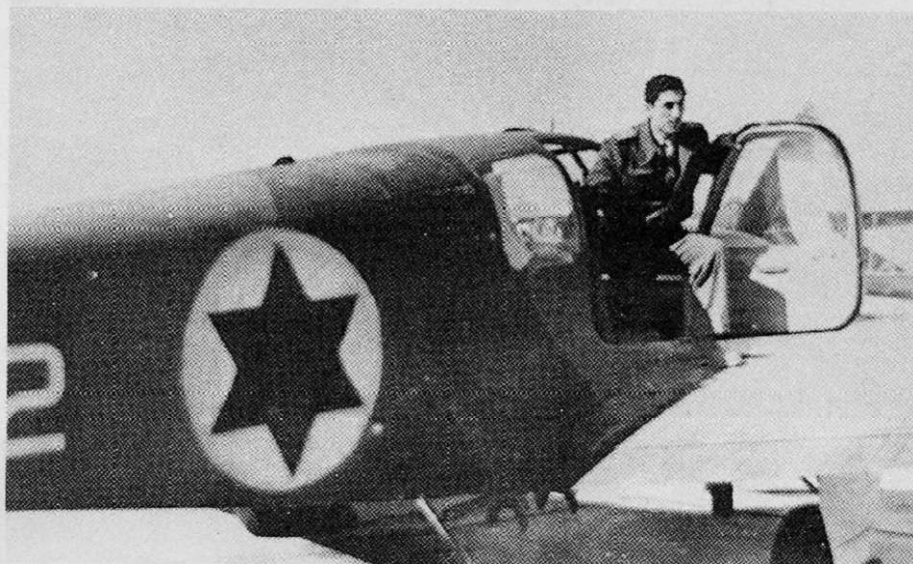
national airline, while 106 Squadron and 35 Flight were both disbanded. The lightplane squadrons were united as 100 Squadron at Tel-Nof which operated a dwindling variety of lightplanes, the exotic types were progressively disposed of and the unit mainstay became the Piper Cub. Sirkin air base became the home of the new Flying School which operated Stearmans and Harvards as primary and advanced trainers respectively, plus Ansons and Consuls for the training of multi-engine pilots and other air crew ratings.

The importance attached to training resulted in the procurement of the Fokker S.11 primary trainer but this type was soon recognised as a failure and it never completely replaced the Stearman which soldiered on with the Flying School while the Fokkers were transferred to 100 Squadron.

In 1950 a second fighter unit was formed at Ramat-David, 105 Squadron with Spitfires, which was primarily an OTU for the Flying School graduates while 101 Squadron progressively became a Mustang squadron. Then came several years of ex

Spitfire IXe (s/n 48) in bare metal finish with the markings of No.105 Squadron. Other IAF Spitfires were camouflaged in either brown and green or brown and blue upper surfaces and light sky under surfaces. (IDF Archive)

World War 2 combat aircraft procurement: Mosquitos from France, Spitfires from Italy and Mustangs from Sweden. With this equipment new units were formed and Hatzor air base was reactivated in 1951 to allow for the expansion of the IAF. In that year the IAF AHQ moved to Ramle and was joined there by 100 Squadron while 69 Squadron and 103 Squadron vacated Tel-Nof and became resident at Hatzor alongside 109 Squadron which was formed

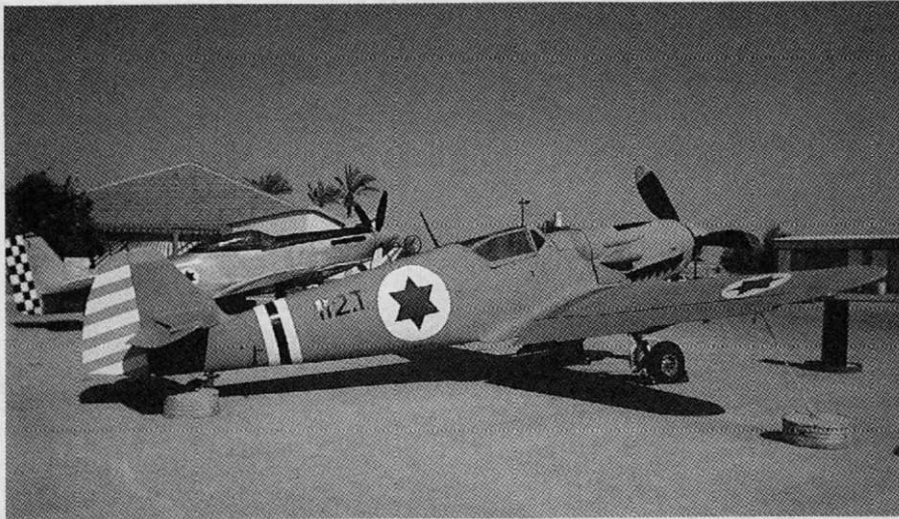


Piper Super Cub (s/n 51) of No.100 Squadron in Sinai on 2 November 1956 carrying the Sinai Campaign stripes. (GPO)



Mosquitos were procured in England the next two years did not witness significant force changes. In July 1954 a Mosquito PR Flight was formed at Hatzor and in late 1954 69 Squadron was amalgamated with 103 Squadron which by then operated in addition to the C-47s and B-17s a trio of Catalinas. Then came the massive influx of French equipment that turned the IAF into a modern air force.

The first French-equipped unit, 113 Squadron at Hatzor, was formed in October 1955 while one of the Mosquito units was disbanded. The transport squadron also benefited from the French connection when the Nord Noratlas joined its ranks in late 1955. Earlier that year the Flying School was transferred to Tel-Nof and Sirkin was closed. At the new Flying School base 116 Squadron was formed with Mustangs and staffed by the Flying School QFIs as an emergency unit. The next year the Spitfire was finally retired when the OTU, 105 Squadron, was converted to Mustangs while 101 Squadron became a Mystere unit at Hatzor which became the first IAF all jet air base as the remaining Mosquito squadron



Left: The unpopular Avia S 199 was operated by No.101 Squadron for just one year. The exact identity of the last surviving Messerschmitt in Israel is not known but it was restored for display at the IAF Museum as D-112, the aircraft in which Modi Alon, the first CO of No.101 Squadron, claimed two Egyptian Dakotas on 3 June 1948. (Shlomo Aloni) Below: Ouragan (s/n 29) was a Sinai Campaign veteran when photographed in March 1957. It was one of quite a number of Ouragans that sported the sharkmouth decoration. (GPO)





The Sikorsky S-58 was the first true assault helicopter to enter IAF service, it was also used for SAR, CASEVAC, air crew retrieval missions and special operations. (GPO)

an Anglo-French aspiration to regain the Suez Canal and get rid of President Nasser coupled with the Israeli aspiration to put an end to the Egyptian inspired terrorist actions on its borders. Thus Israel was to launch a 'retaliation operation' which would endanger the shipping on the Suez Canal with the result that both England and France would issue an ultimatum to both sides to evacuate the Suez Canal Zone.

The Israeli provocation was the capture of the Mitla Pass in Sinai by the 890th Parachute Regiment that were parachuted there on 29 October by the C-47s of 103 Squadron escorted by the Meteors of 117 Squadron and the Ouragans of 113 Squadron while the Mysteres of 101 Squadron flew CAPs over the Egyptian air bases. In the next two days the Israelis and Egyptians clashed with each other but on the evening of 31 October the RAF launched nocturnal air strikes on the Egyptian air bases, effectively resulting in the withdrawal of the Egyptian Air Force (EAF) from the Sinai scene.

The IAF used its Mysteres for both air-to-air and air-to-ground missions while the Ouragans and Meteors were relegated to the latter although both types were involved in air combats versus EAF MiG-15s. The Mustangs were the principle ground attack aircraft while the Mosquitos and B-17s, were reactivated specifically for the conflict with 100 Squadron and 69 Squadron respectively, but were little used. Even the Harvards were committed to combat as 140 Squadron. Supporting the combat elements were the C-47s and Noratlas of 103 Squadron, the Piper Cubs of 100 Squadron and the Stearmans of 147 Squadron.

The IAF claimed in air-to-air combat eight victories: a single Il-14 was shot down at night by a Meteor NF.13 while the Mysteres claimed four Vampires and three MiG-15s. A single aircraft was lost in air combat when a 100 Squadron Piper Cub

The first of 15 Alouettes to enter IAF service was s/n 03 which carried the legend 'Good will see' when translated. (GPO)



was disbanded and its aircraft placed in storage while the PR Flight was transferred to Tel-Nof where it became 115 Squadron. Also at Tel-Nof a night-fighter unit, 119 Squadron, was formed with the Meteor NF.13.

THE SINAI CAMPAIGN

The Sinai Campaign of October 1956 was the first test of Israel's war doctrine: to push the battlefield into the enemy's territory and to reduce the duration of the struggle to the minimum. The IAF was not yet the cornerstone of that doctrine but following its successes in the Sinai Campaign it was to become such.

The Sinai Campaign was the outcome of

Deliveries of the Vautour fighter-bombers commenced in August 1957 and exactly a year later, when this photo was taken, s/n 26 was still unpainted. Vautour IIA s/n 26 still exists in Israel and it is on display at the IAF Technical School collection. (GPO)





was shot down by a MiG-15, another Cub was destroyed on the ground at the Mitle Pass by a strafing MiG-15 but all the other losses were the result of heavy Egyptian ground fire which accounted for nine Mustangs, two Harvards and a single Mystere.

Both the Ouragan and the Meteor proved to be sturdy aircraft and although many of these absorbed a lot of battle damage none were lost. The number of sorties flown by the IAF was 1,846 of which 751 were combat aircraft sorties representing a loss ratio of one combat aircraft per 63 combat sorties.

The Sinai Campaign was the graduation of the IAF. It achieved its goals and proved to the IDF GHQ that it was a trusty force with which the numerical inferiority of Israel could best be translated into a technological superiority.

AN ALL JET FORCE

Immediately after the Sinai Campaign the B-17s and the Mosquito fighter-bombers were retired and the Mustang OTU, the Scorpion Squadron, was disbanded. A new Flying Course (FC) syllabus was adopted with the Stearman and Harvard primary and basic training stages being followed by an advanced training phase on Meteors at Ramat-David. The graduates then attended an OTU on Ouragans with the Wasp Squadron at Hatzor.

In late 1956 a second Mystere unit, the Valley Squadron at Ramat-David, was

formed while the place of the B-17s and the Mosquitos was more than fulfilled by the introduction of the Vautour in 1957. At Ramat-David 110 Squadron was reactivated to operate the fighter-bomber and recce versions while the Bat Squadron at Tel-Nof was divided into two flights, one with Meteor NF.13s and the other with Vautour IINs.

In 1958 another veteran unit was reactivated when the Scorpion Squadron at Hatzor became the only IAF unit to ever operate the Super Mystere, the IAF's first level-flight supersonic fighter.

The support elements saw the formation of the first IAF helicopter unit, the Rotor and Sword Squadron, in 1958 at Tel-Nof with a single Alouette, a lone Hiller and a pair of S-55s although additional S-58s were soon to follow. Additional Noratlases augmented the Elefans Squadron but the Ansons and Consuls were retired.

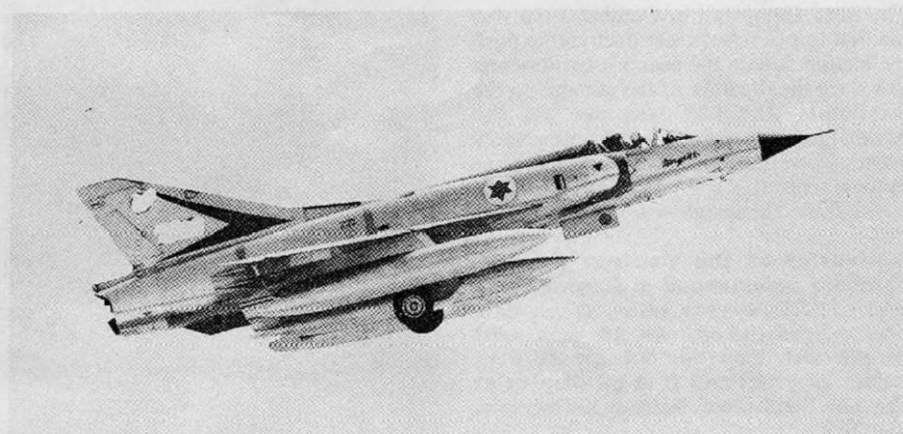
By the end of the 1950s the IAF composed of six jet fighter squadrons, a single emergency Mustang squadron, a

A quartet of No.101 Squadron Mirage IIICJs in flight during March 1967. The sleek unpainted delta jets carried the famous red and white striped rudder of the unit and strangely enough the Israeli censor of the day elected to erase the s/n of only the nearest aircraft to the camera, which was s/n 52, while the other three s/ns - 409, 942 and 951, remained intact. (GPO)

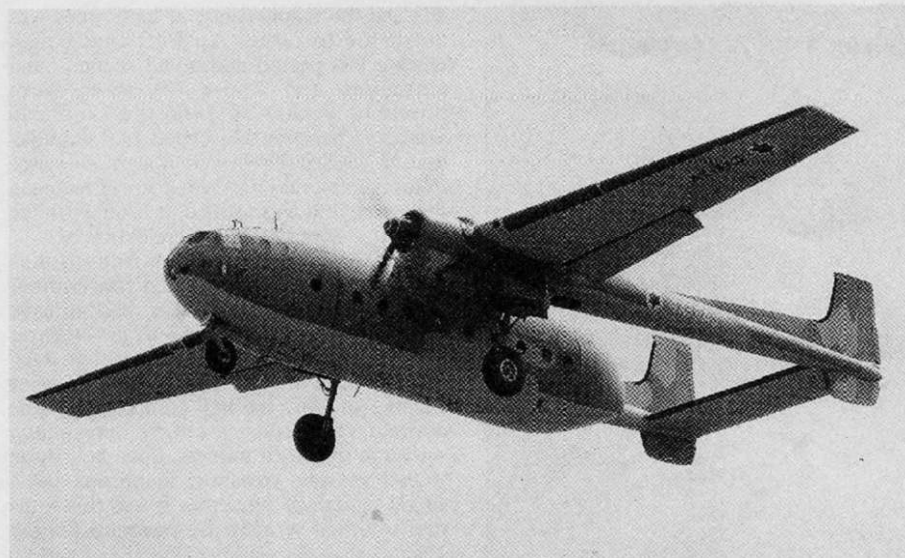
transport squadron, a helicopter squadron, a lightplane squadron and a Flying School based at four air bases.

In 1959 the IAF AHQ moved to Tel-Aviv and Ramle was closed following the transfer of the Lightplane Squadron to Sde-Dov on the outskirts of Tel-Aviv.

The early 1960s witnessed more changes. In 1960 the Fouga Magister was introduced as the new all-jet trainer and by 1962 all the Stearmans and Harvards were retired while in 1961 the Mustang squadron converted to the Mystere. The IAF had finally become an



During the 1960s it was the Israeli censor's practice to erase unit badges and aircraft s/ns as exemplified by a Bat Squadron Mirage IIICJ taking-off. (IAF via Shlomo Aloni)



The Noratlas transports of 103 Squadron make frequent trips to various parts of Europe. Having civil registrations 4X-FAJ was seen landing at Birmingham. (W. H. Blunt)

introduction into service of the Dornier Do 27.

The heavy lift capacity was improved by the procurement of five ex-Pan American Boeing 377 airliners which were converted into military transports and were based at Lod International Airport alongside the C-

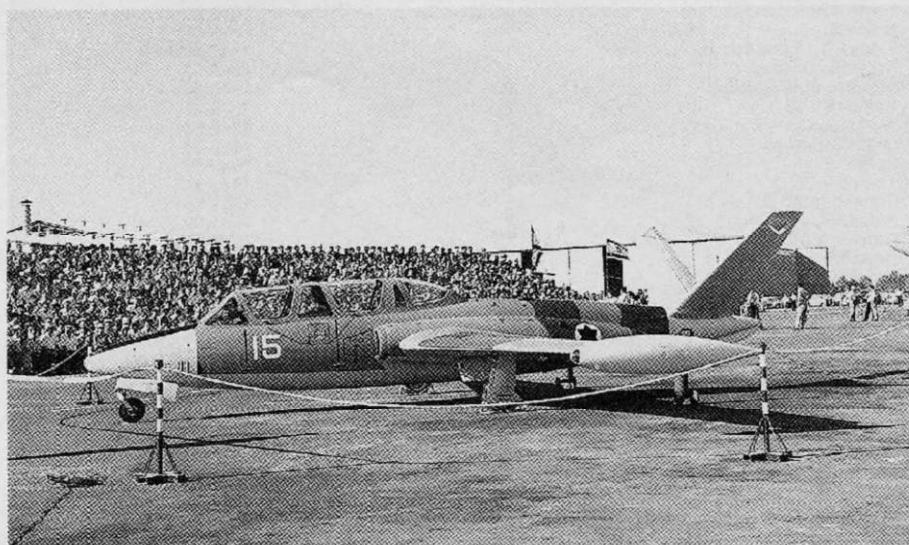
The first Magister to roll-out of the IAF assembly line was s/n 15 which was handed-over to the IAF on 6 July 1960. To the standard combat aircraft camouflage scheme yellow areas were added to the tail, wingtips and nose but these were replaced shortly afterwards by red stripes (GPO)

all jet combat force.

To allow for the new all jet FC syllabus Piper Super Cubs were introduced for screening while the Meteors were no longer needed and were passed to the Lionhead Squadron for emergency use. Another new emergency unit was a single squadron of armed Magister trainers staffed by QFLs and reserve pilots.

The new spearhead of the IAF was the Mirage IIICJ which was introduced in 1962 with the First Fighter Squadron and with the First Jet Squadron and the next year with the Bat Squadron. A major arms deal with West Germany resulted in the influx of additional S-58s, Noratlases and Magisters and the

SA.321Kb (s/n 118) is in the post-June 1967 camouflage scheme as photographed in July 1970. Some of the IAF Super Frelons were of the amphibious SA.321Ka model. (GPO)



Israeli Air Force aircraft 1947-1967

Type	Number	Period of Operation
Auster J/1, AOP.3 and AOP.5	21	1947-52
DH Tiger Moth	2	1947-48
RWD.13	2	1947-51/51
Taylorcraft	3	1947-49
Avia S.199	25	1948-49
Avro Anson	9	1948-56
Beechcraft Bonanza	3	1948-53
Boeing B-17 Flying Fortress	3	1948-56
Boeing Stearman PT-17	60+	1948-61
Bristol Beaufighter	4	1948-50
Curtiss C-46 Commando	10+	1948-52
DH Dragon Rapide	10+	1948-56
DH Mosquito	80+	1948-56/57
Douglas C-47	40+	1948-present
Douglas C-54 Skymaster	2	1948-49
Douglas DC-5	1	1948-49
Fairchild Argus	4	1948-49
Grumman Widgeon	2	1948-49
Lockheed C-69 Constellation	1	1948
Lockheed Hudson	3	1948-54
Lockheed Lodestar	1	1948
Miles Aerovan	1	1948
Miles Gemini	2	1948
Noorduyn C-64 Norseman	10+	1948-54
Nord Norécrin	2	1948-49
North American Harvard	circa 80-90	1948-63
North American P-51 Mustang	70+	1948-61
Piper PA-11 and PA-18	100+	1948-present
Republic Seabee	1	1948-53
Supermarine Spitfire	90+	1948-56
Vultee BT-13	2	1948-49
Airspeed Consul	15	1949-56
DHC Chipmunk	1	1949-54
Fokker S.11	41	1949-56
Temco T-35	1	1949-54
Consolidated Catalina	3	1951-56
Hiller 360 and UH-12	2	1951-59
Gloster Meteor	35	1953-1970
Nord Noratlas	24	1955-78
Dassault Ouragan	75	1955-73
Dassault Mystere	61	1956-70/71
Sikorsky S-55	2	1956-63
Sud Aviation Alouette II	15	1957-75 and 77-82
Sud Aviation Vautour	29	1957-70/71
Dassault Super Mystere	427	1958-74/75
Sikorski S-58	31	1958-68/69
Beechcraft 18	2	1960-63
Fouga Magister	120+	1960-present
Dassault Mirage III	76	1962-82
Pilatus PC-6 Turbo Porter	1 or 2	1963-late 1960s
Boeing 377 and KC-97	14	1964-78
Dornier Do 27	12+	1964-1980s
Bell 47	13	1965-68
SOCATA Rallye	1	1965-1973/74
Sud Aviation Super Frelon	12	1966-91

47s and the maintenance of both types was entrusted to Israel Aircraft Industries. During this period additional second-hand Ouragans and Super Mysteres were procured so that by 1966 the Lionhead Squadron became the second IAF Ouragan unit. In 1965 Bell 47s were bought in France to form a second rotary wing squadron and a third such unit was formed in 1966 when the first of 12 Super Frelons were delivered.

Also in 1966 the Flying School was relocated at the newly opened Hatzetim air base in the Negev, the first air base to have been constructed by the IAF as the other air bases in use at the time were either RAF heritage or civil airports. Thus by the early summer of 1967 the IAF composed of nine combat squadrons, a single emergency squadron of armed trainers, three helicopter squadrons, two transport squadrons and a single lightplane squadron. It was this force that claimed worldwide fame on 5 June 1967.

THE SIX DAY WAR

Since the end of the Sinai Campaign the tension along the Israeli borders resulted in occasional skirmishes between the opposing sides. The IAF had its share of combat and between 1958 and 1967 claimed a single Hunter, two MiG-17s, two MiG-19s and eight MiG-21s in air combats. By May 1967 the tension reached its peak when, following skirmishes along the Syrian border, the Egyptian President Nasser expelled from Sinai the UN force of observers and filled the empty space with its own forces as a solidarity act with the

The Dornier Do 27 entered IAF service in the mid-1960s but the sensitivity in Israel to the operation of German equipment was such that it was only publicly unveiled in IAF colours in 1972. Do 27 (s/n 019) is in the lighter post-June 1967 camouflage scheme. (GPO)

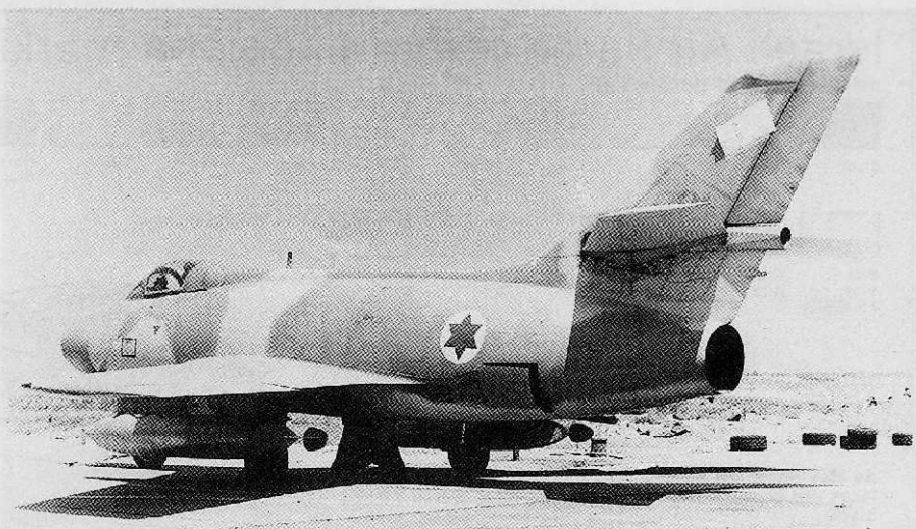


Another example of the censor's work though this time the squadron's badge on this Mystere has been covered up before the picture was taken. Note that the aircraft is camouflaged in comparison to the formation of all silver Mysteres below. (MAP)

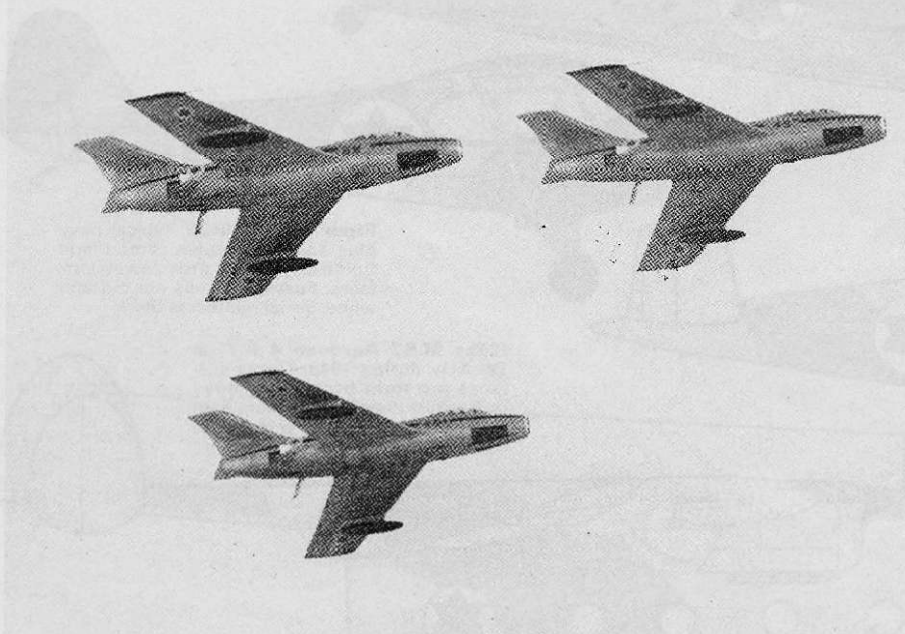
frustrated Syrians.

Following a similar incident in 1960 which caught the Israelis unaware, this time, the Israeli reserve forces were mobilised and a deterioration seemed inevitable. By early June it became clear that the actual clash was indeed inevitable and Israel decided to launch a pre-emptive strike. The IAF had practiced for such a scenario for a long time and at 0745 local time on 5 June the first wave commenced its attack on EAF air bases.

By the early noon hours the second wave



Three 101 Squadron Mysteres in flight in August 1958. Shortly afterwards all the IAF Mysteres received the standard pre-June 1967 camouflage scheme. (GPO)



completed its mission and the EAF was almost wiped-out. Attention was then turned to the Royal Jordanian Air Force as well as repeat attacks on EAF bases while during the fourth wave of the day, the Syrian Air Force met a similar fate. Although the IAF losses were more than 10 per cent of the force – four Magisters, four Mirages, four Mysteres, five Ouragans, four Super Mysteres and two Vautours plus a Noratlas which was set on fire at Sirkin by a missile fired by a strafing RJAF Hunter – its success to contain a threat more than twice its size within several hours was a remarkable achievement and, although the remains of the Arab air forces continued to operate, the IAF achieved total air supremacy and allowed the IDF to capture Sinai, the West Bank and the Golan Heights – an area larger than Israel itself – within just six days of fighting.

By the end of the war the number of IAF losses amounted to a total of 46, about 25 per cent of the force, which included nine Mirages, ten Super Mysteres, five Vautours, six Mysteres, nine Ouragans, six Magisters and a single Noratlas. As the total number of combat aircraft sorties was 3,279 the IAF loss ratio was one per 73 sorties. In air-to-air combat the IAF claimed 60 kills in the course of 66 air combats while 391 enemy aircraft were claimed to have been destroyed on the ground.

THE END OF AN ERA

The Six Day War was the end of the IAF French age. The arms embargo which was announced by France in June 1967 affected a 1966 order for 50 Mirage 5MJs and by late 1967 the first A-4H Skyhawk attack aircraft and August Bell AB205 utility helicopters arrived in Israel to herald the Americanisation of the IAF, the story of which will be covered by the second part of this article.

AUTHOR'S NOTE:

This article is merely an overview of the Israeli Air Force between 1947 and 1967. A more in depth history for the years 1947-1949 can be found in the book Spitfires over Israel by Brian Cull, Shlomo Aloni and David Nicolle (Grubb Street of London, 1993). Any additional information and photos will be most welcome and should be forwarded via the editor. The second part of this article will cover from 1967 to the present day.

Israeli Air Force s/n system 1947-1967

Between late 1947 and the early summer of 1948 the SA aircraft carried their civil registrations. This posed a problem with newly procured aircraft for which no civil registration was available. Hence a system of duplicate registrations was adopted, the Auster AOPs received the civil registration of RWD.13 VQ-PAM. To each such duplicate registration was added an identifying serial number, for example VQ-PAS/1 or VQ-PAI/11. In May a new system was introduced, a hebrew letter was followed by a two or three digit serial number and these were allocated in batches, for example the Dragon Rapides were "71-D" (S-71) to "76-D" (S-76), the Bonanzas were "41-I" (B-41) to "45-I" (B-43), the Auster AOPs were allocated "1-N" (A-1) to "20-N" (A-20), the Spitfires were "130-7" (D-130) to "134-7" (D-134) etc. By November 1948 yet a new system was introduced. Each aircraft was given a five digit serial: the first digit identified its role, the second and third the type and the fourth and fifth the specific aircraft. Thus 51603 was a heavy bomber (5) and the third (03) B-17 (16). The complete list included:

Type Code:	1 Amphibian	4 Medium Bomber	7 Transport
	2 Fighter	5 Heavy Bomber	8 Liaison
	3 Fighter-Bomber	6 Cargo Bomber	9 Trainer
Aircraft Code:	01 Auster (Type Code 8)	10 BT-13 (9)	19 S 199 (2)
	02 Taylorcraft (TC 8)	11 AT-6 (9)	20 Spitfire (2)
	03 RWD.13 (8)	12 Widgeon (1)	21 Mosquito (3)
	04 Piper Cub (9)	13 Dragon Rapide (7)	22 Beaufighter (3)
	05 Argus (7)	14 C-47 (6)	23 P-51 (2)
	06 Bonanza (7)	15 DC-5 (6)	24 C-69 (7)
	07 Norecrin (8)	16 B-17 (5)	25 Lodestar (7)
	08 C-64 (6)	17 C-46 (6)	26 Hudson (4)
	09 Seabee (1)	18 C-54 (7)	

Soon afterwards the first digit was dropped but the whole system was just too simple for the tight security of the IAF and between 1952 and 1955 aircraft that were ferried from abroad to Israel was given fictitious serials. This confused foreign observers while gradually the aircraft were given a two digit serial although four digit serial number batches were still employed. Then the habit to add a first 'floating' digit was introduced. This digit was usually associated with the aircraft's configuration, a change of configuration resulted in a change of the first digit.

Israeli Air Force camouflage and markings

ISRAELI AIR FORCE COLOUR KEY

Black	White	Light brown FS.31433*	Navy blue FS.35052*	Light grey FS.37722*	Bronze/ burnt metal	Insignia blue	Red	Yellow	Dark blue	Natural metal/ silver	Tan FS.33531	Brown FS.30219	Green FS.34227
						*Approximate colour							
Pale blue FS.35622	Olive drab	Grey- green	Olive green	Dark grey	Neutral grey								

Taylorcraft Model C serial number unknown in June 1948. Standard upper surface colours of light brown and navy blue. Lower surfaces are light grey.

de Havilland DH.89 Dominie No.03 during 1948. Upper surfaces are brown, lower surfaces light grey. Serial number is black.

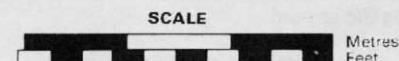
**DRAWINGS BY
MIKE KEEP**

Piper Cub No.0409. Typical navy blue and light brown camouflage finish with light grey lower surfaces. Fuselage bands are red and white. Serial number is black.

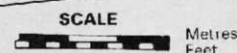
Miles M.57 Aerovan 4 B-71 at Tel Aviv during 1948. Upper surfaces are light brown and navy blue whilst lower surfaces are light grey. Insignia is blue and white, serial number black.

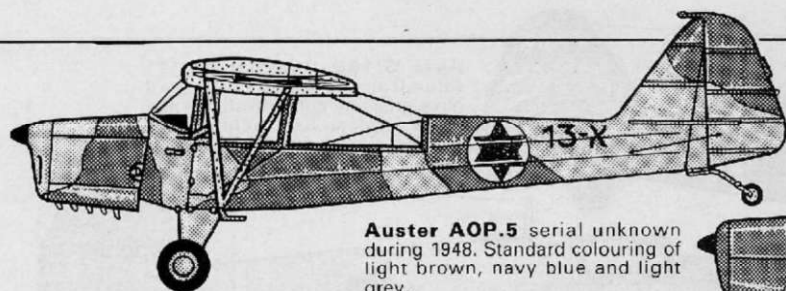
Beechcraft Model 35 Bonanza B-41 during June 1948. Upper surfaces are navy blue and light brown whilst lower surfaces are light grey. Insignia is blue and white, serial number black.

Grumman G-44 Widgeon B-73 in December 1948. All upper surfaces are light brown and navy blue. Lower wings and tailplane are light grey. Lower fuselage appears to be black. Serial number is white.



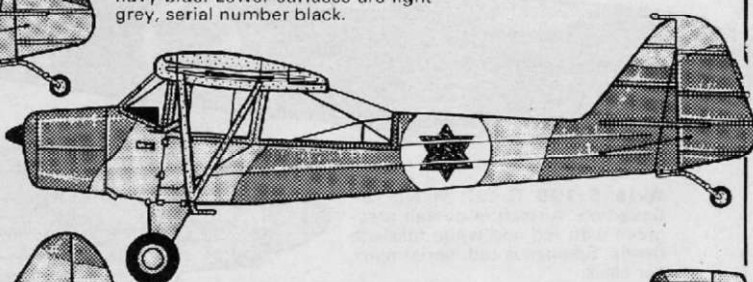
Douglas C-54 Skymaster 4X-ACA in use as a VIP transport. Natural metal finish with cheat-lines, trim and all markings in dark blue. 'El Al' titles appear on a white panel. Israeli flag is blue and white. Leading edges are black.



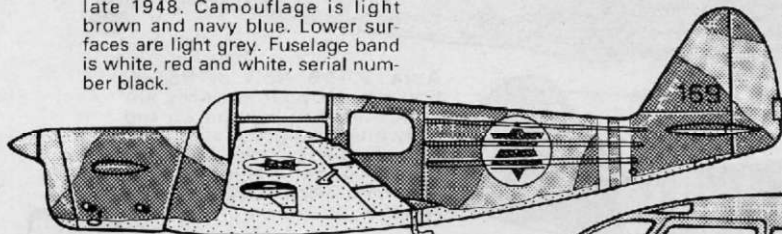


Auster AOP.3 A-13 in June 1948. Camouflage is light brown and navy blue. Lower surfaces are light grey, serial number black.

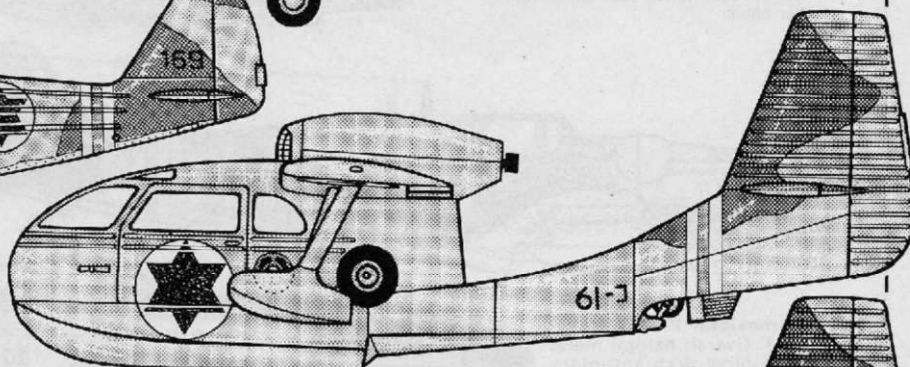
Auster AOP.5 serial unknown during 1948. Standard colouring of light brown, navy blue and light grey.



Nord N.1023 Norecrin No.169 in late 1948. Camouflage is light brown and navy blue. Lower surfaces are light grey. Fuselage band is white, red and white, serial number black.

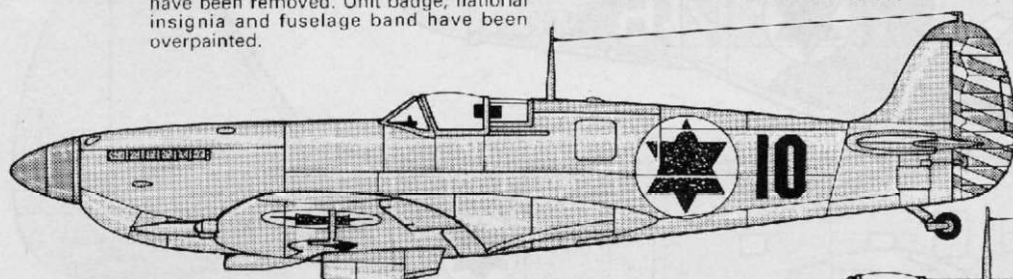
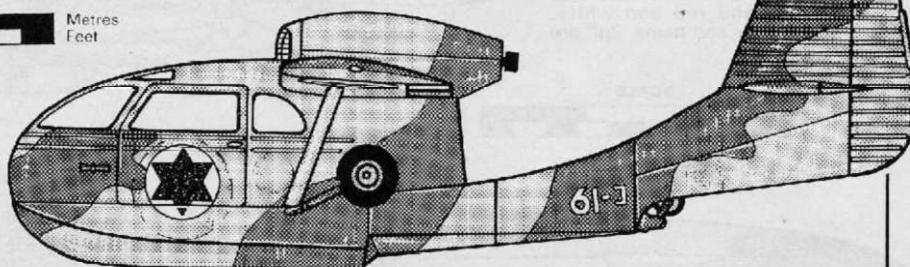


Republic RC-3 Seabee B-61 of No.101 Squadron, early 1948. Overall light brown finish with navy blue camouflage on tail unit. Fuselage band is white, red and white, serial number black. Note No.101 Squadron badge aft of national insignia.



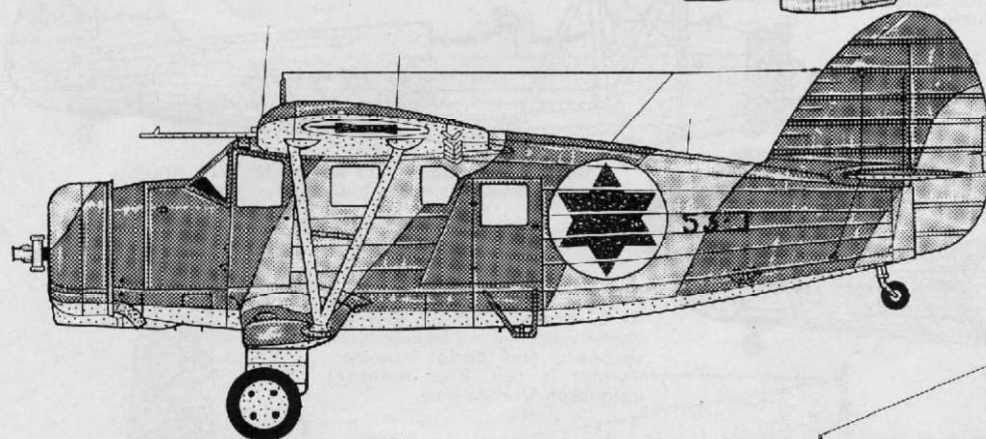
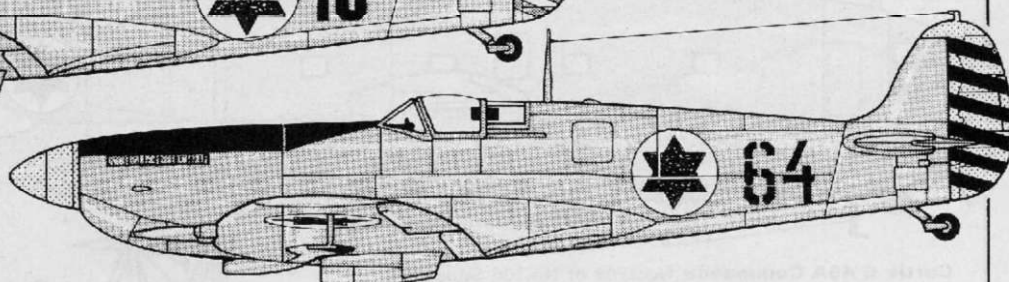
National insignia is dark blue and white.

Republic RC-3 Seabee B-61 during May 1948. Light brown overall colouring with navy blue camouflage on upper surfaces and planing bottom. Serial number is white. Note that floats and water rudder have been removed. Unit badge, national insignia and fuselage band have been overpainted.



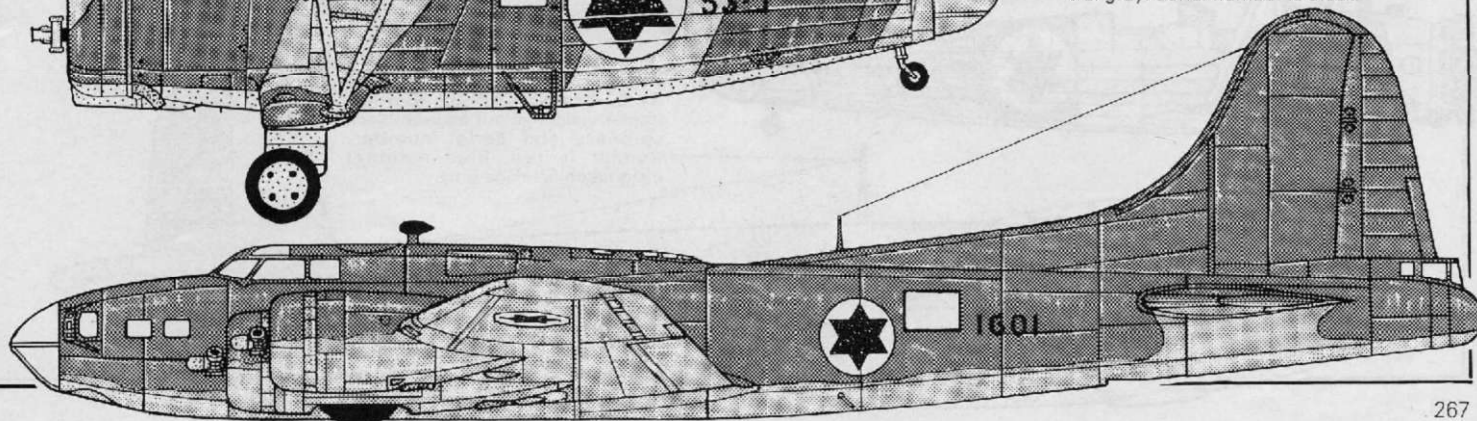
Supermarine Spitfire IX No.10 of No.101 Squadron. Natural metal overall with red spinner. Rudder stripes are red and white, serial number black.

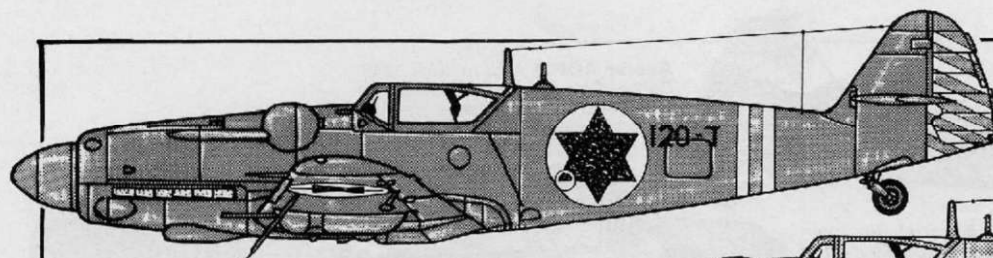
Supermarine Spitfire IX No.64. Overall painted silver finish with black anti-glare panel and serial number. Spinner is yellow, rudder yellow and black.



Noorduyn C-64A Norseman B-53 operating in 1948. Camouflage is navy blue and light brown, lower surfaces are light grey. Propeller hub is natural metal, serial number black.

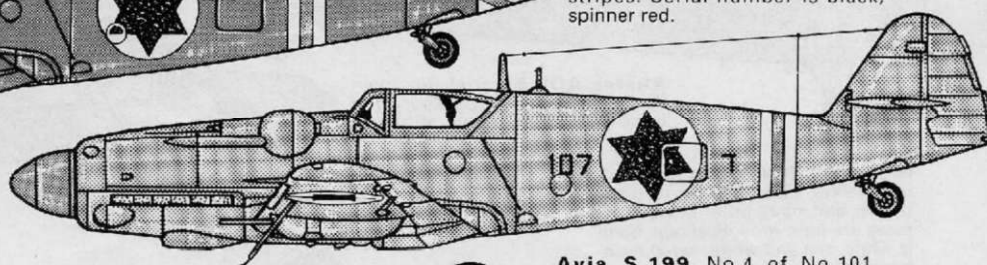
Boeing B-17G Flying Fortress No.1601 of No.69 Squadron in 1948. Upper surfaces are olive drab, lower surfaces neutral gray. Serial number is black.



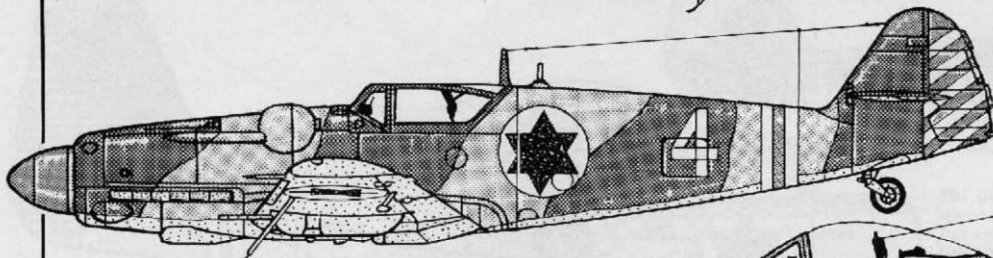


Avia S.199 D-120 of No.101 Squadron during 1948. Overall olive green colouring with red and white fuselage bands and rudder stripes. Serial number is black, spinner red.

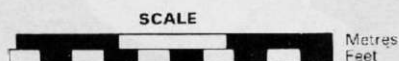
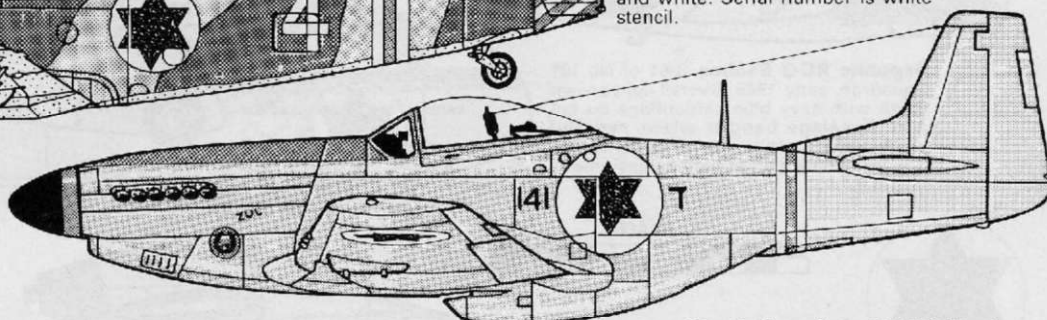
Avia S.199 D-107 of No.101 Squadron. Aircraft is overall grey-green with red and white fuselage bands. Spinner is red, serial number black.



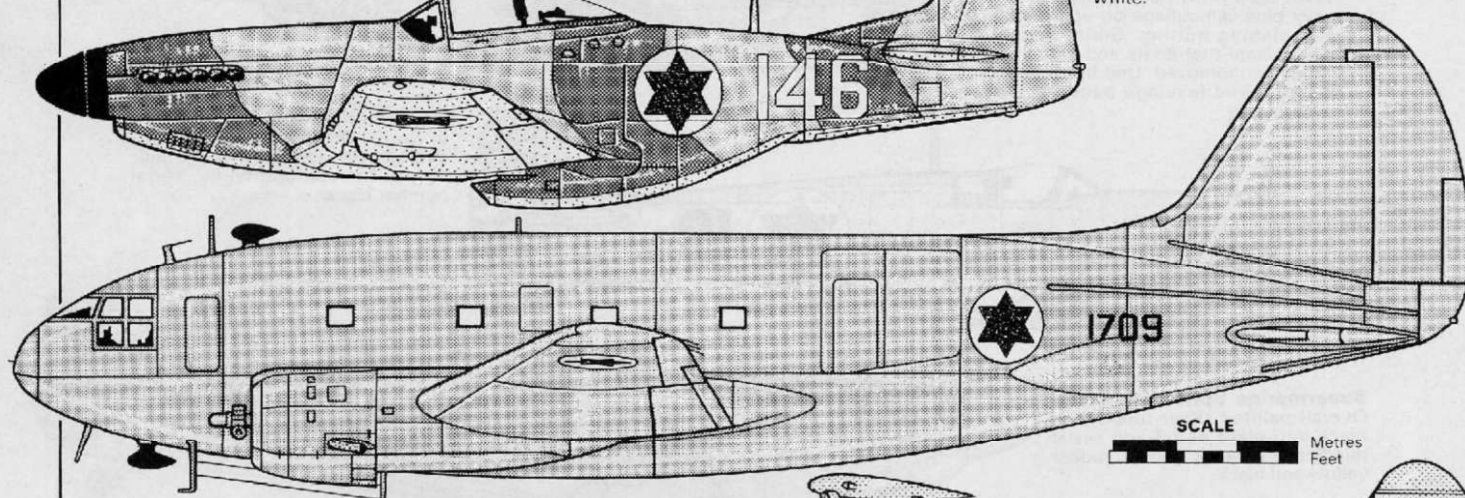
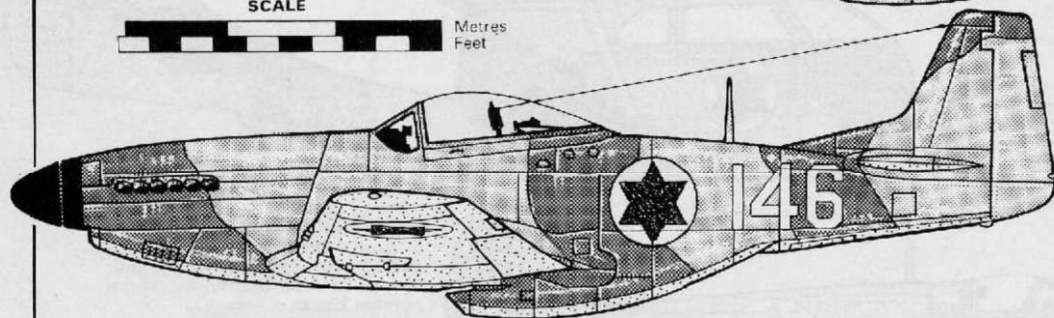
Avia S.199 No.4 of No.101 Squadron. Upper surfaces are camouflaged in light brown and navy blue, lower surfaces light grey. Spinner is red. Fuselage bands and rudder stripes are red and white. Serial number is white stencil.



North American P-51D Mustang D-141. Overall natural metal finish with olive drab anti-glare panel. Spinner is black and red, fuselage band red and white. Serial number and name 'Zul' are black.

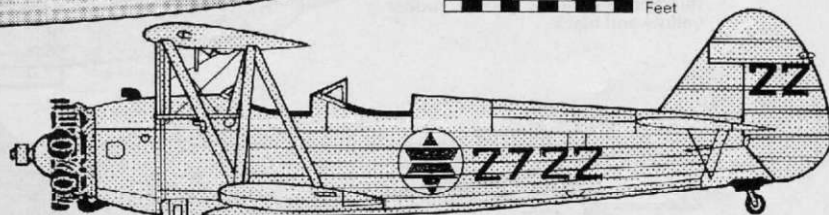


North American P-51D Mustang No.146. Navy blue and light brown upper surface camouflage with light grey lower surfaces. Spinner is black, serial number white.

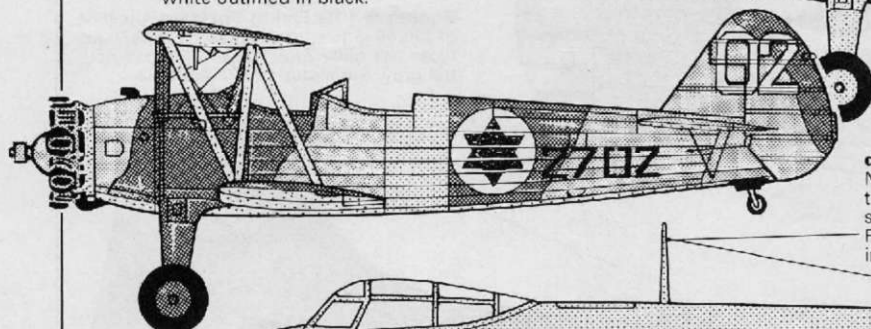


Curtiss C-46A Commando No.1709 of No.106 Squadron. Finish is overall natural metal with black serial numbers.

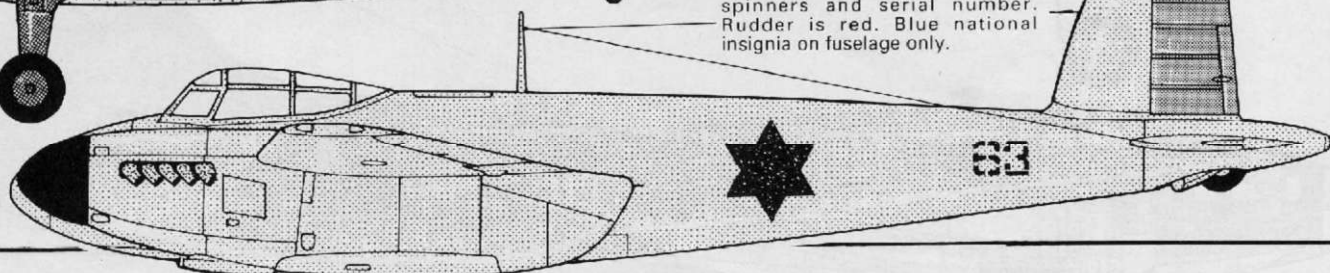
Boeing-Stearman PT-17 Kaydet No.2702. Upper surfaces are camouflaged in navy blue and light brown. Lower surfaces are light grey. Training band is yellow, fuselage serial number black. '02' on tail is white outlined in black.



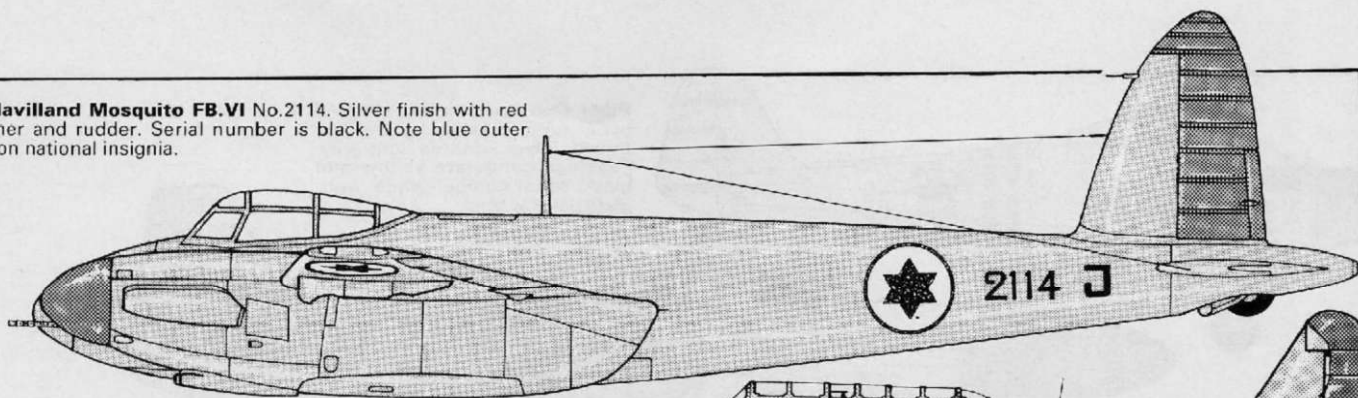
Boeing-Stearman PT-17 Kaydet No.2722. Finish is overall trainer yellow with all serial numbers in black.



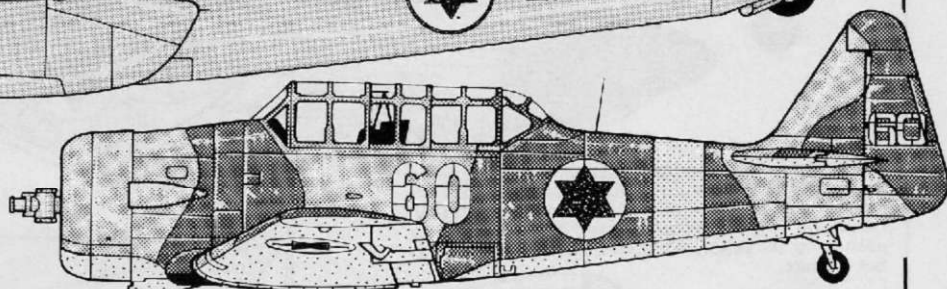
de Havilland Mosquito T.III No.63 during 1951-52. Overall trainer yellow colouring with black spinners and serial number. Rudder is red. Blue national insignia on fuselage only.



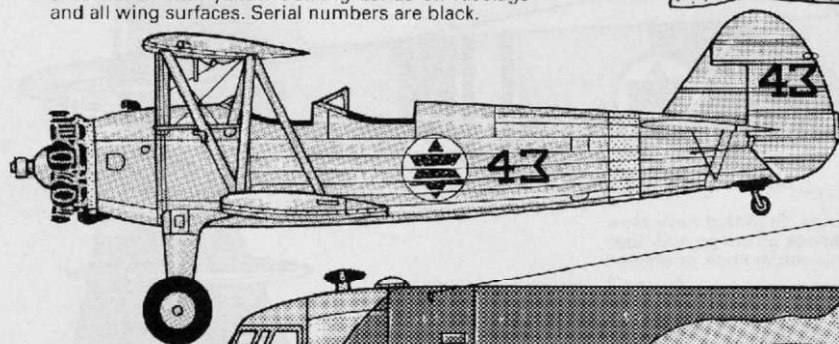
de Havilland Mosquito FB.VI No.2114. Silver finish with red spinner and rudder. Serial number is black. Note blue outer ring on national insignia.



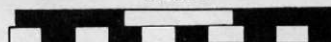
North American AT-6 Harvard No.60 in the early 1950s. Navy blue and light brown camouflage with light grey lower surfaces. Fuselage band is yellow, serial numbers white. Propeller hub is natural metal.



Boeing-Stearman PT-17 Kaydet No.43. Overall silver finish with yellow training bands on fuselage and all wing surfaces. Serial numbers are black.

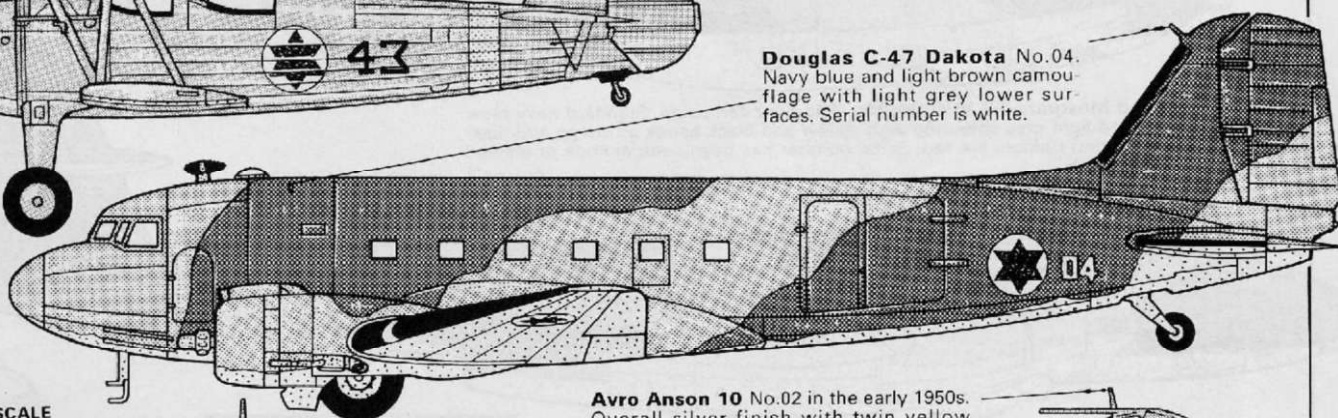


SCALE



Metres
Feet

Douglas C-47 Dakota No.04. Navy blue and light brown camouflage with light grey lower surfaces. Serial number is white.

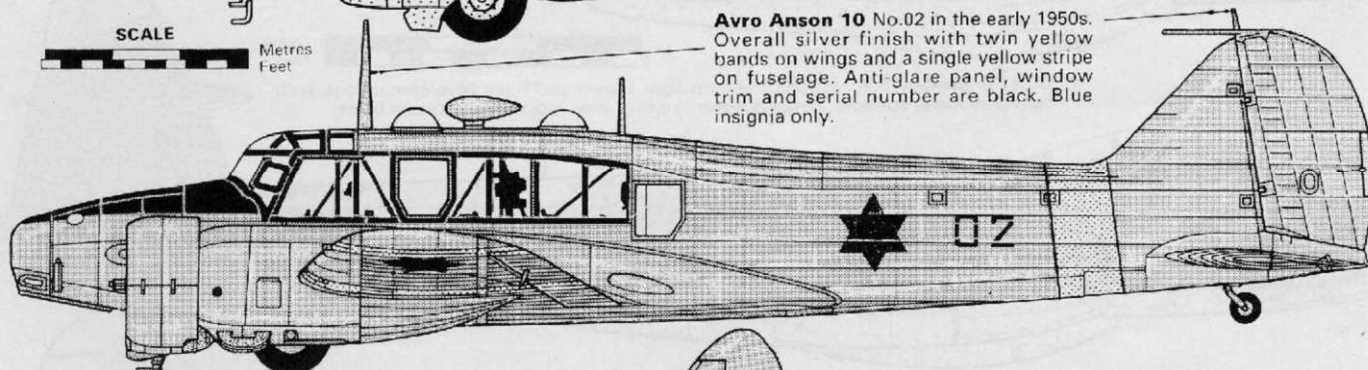


SCALE

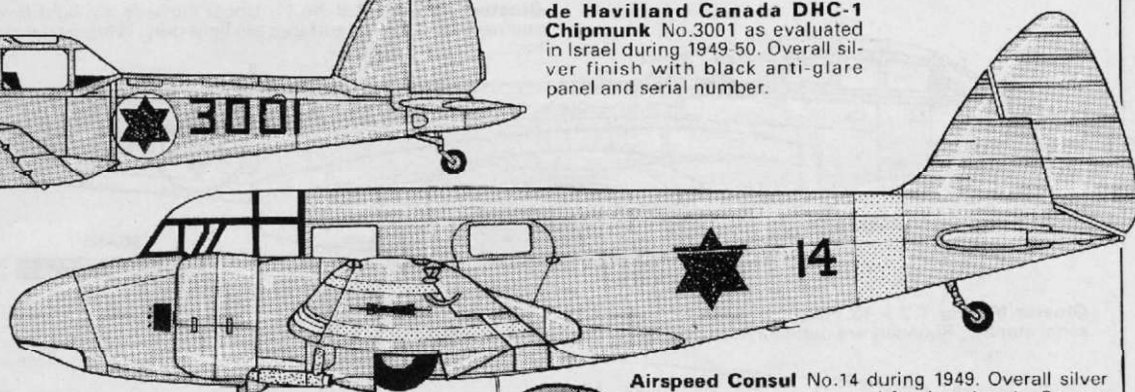
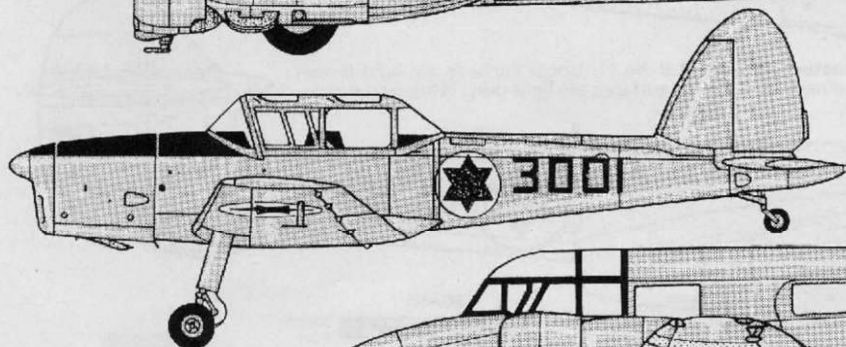


Metres
Feet

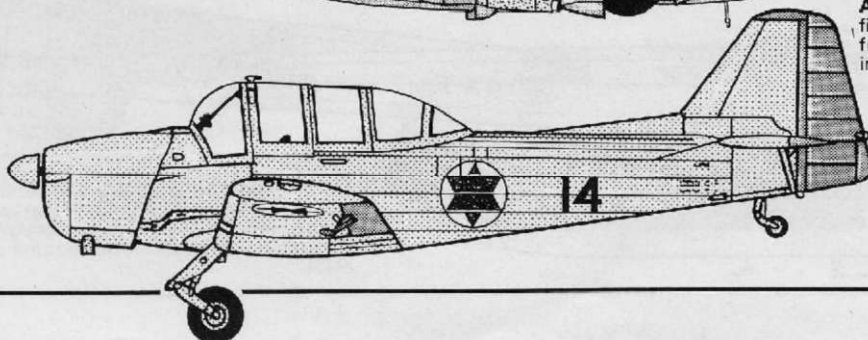
Avro Anson 10 No.02 in the early 1950s. Overall silver finish with twin yellow bands on wings and a single yellow stripe on fuselage. Anti-glare panel, window trim and serial number are black. Blue insignia only.



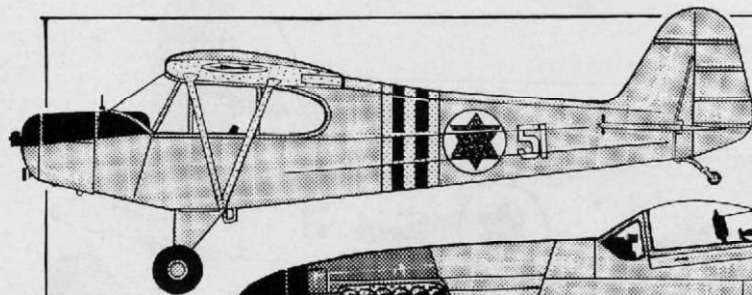
de Havilland Canada DHC-1 Chipmunk No.3001 as evaluated in Israel during 1949-50. Overall silver finish with black anti-glare panel and serial number.



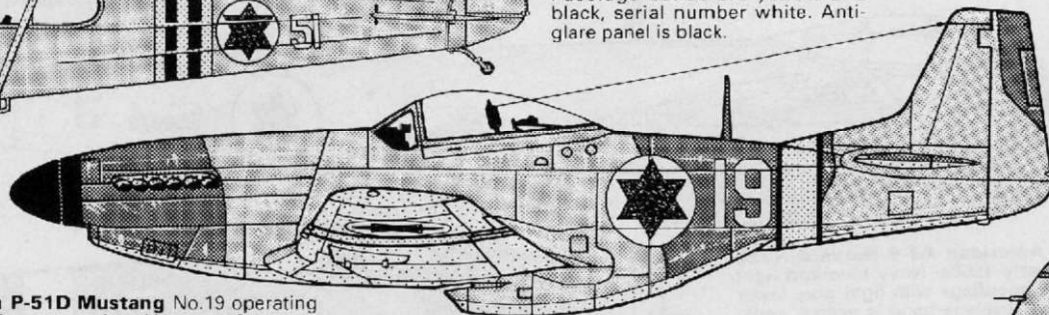
Airspeed Consul No.14 during 1949. Overall silver finish with yellow wing and fuselage bands. Canopy framing and serial number are black. Note that insignia does not have a white background.



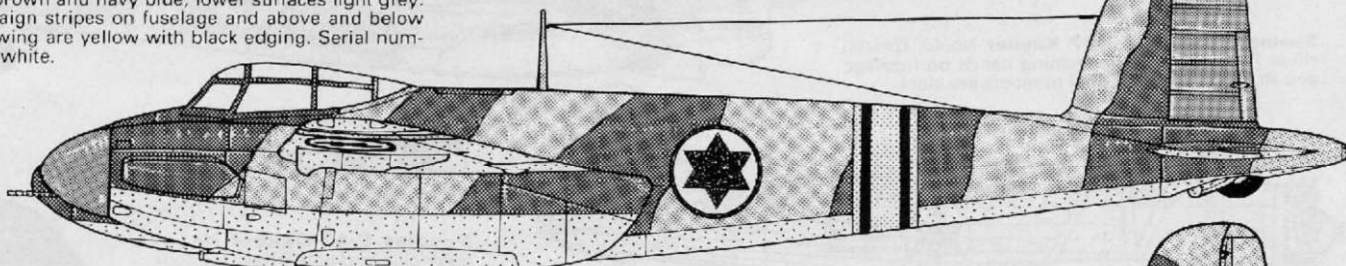
Fokker S.11 Instructor No.14 during 1951-53. Overall gloss yellow finish with red flying control surfaces. Serial number and stencilling are black.



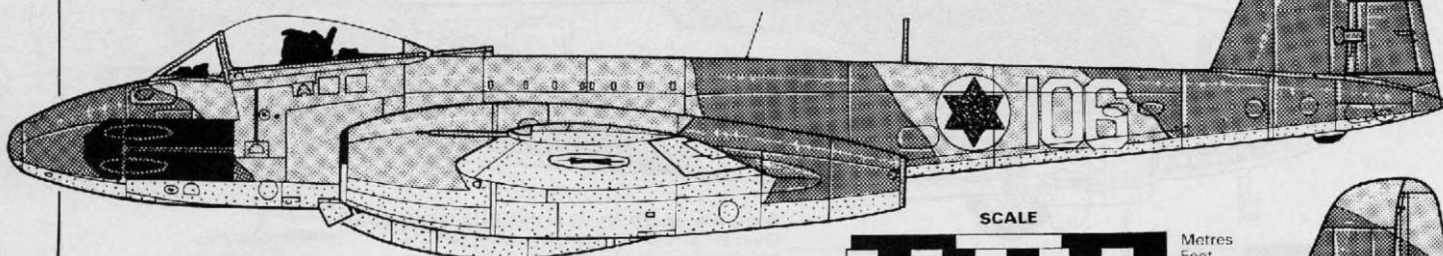
Piper Cub No.51 during 1956. All upper surfaces and sides are light brown, lower surfaces light grey. Fuselage bands are yellow and black, serial number white. Anti-glare panel is black.



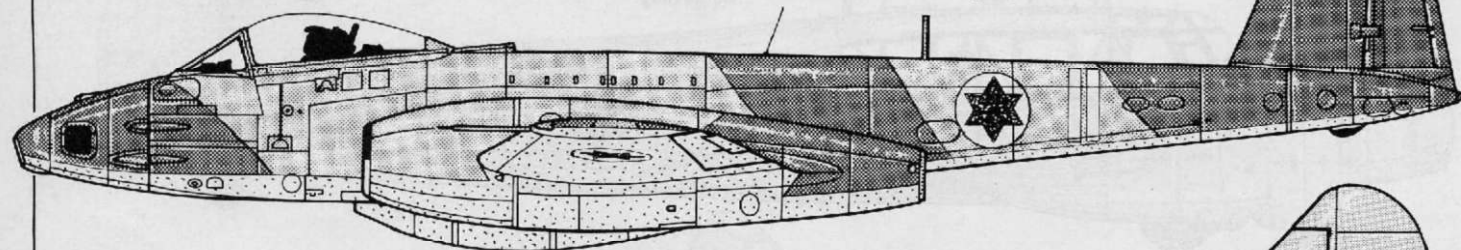
North American P-51D Mustang No.19 operating during the 1956 Suez campaign. Upper surfaces are light brown and navy blue, lower surfaces light grey. Campaign stripes on fuselage and above and below each wing are yellow with black edging. Serial number is white.



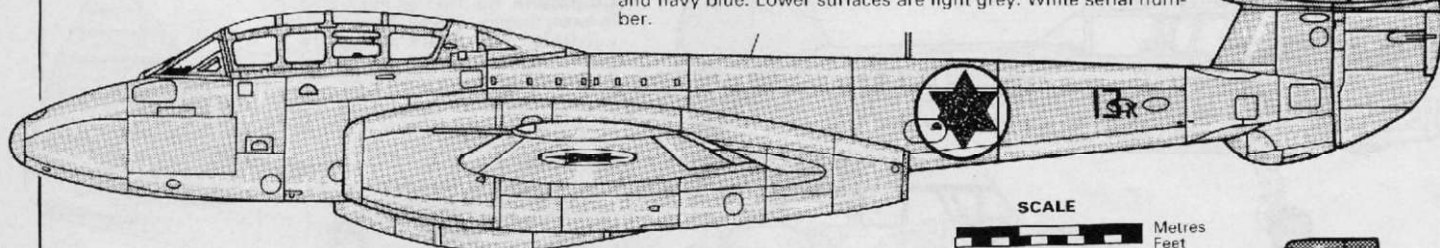
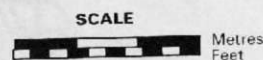
de Havilland Mosquito FB.VI during the 1956 Suez campaign. Standard navy blue, light brown and light grey colouring with yellow and black bands on wings and fuselage. Spinners and rudders are red. Serial number has been overpainted or deleted by the Israeli sensor.



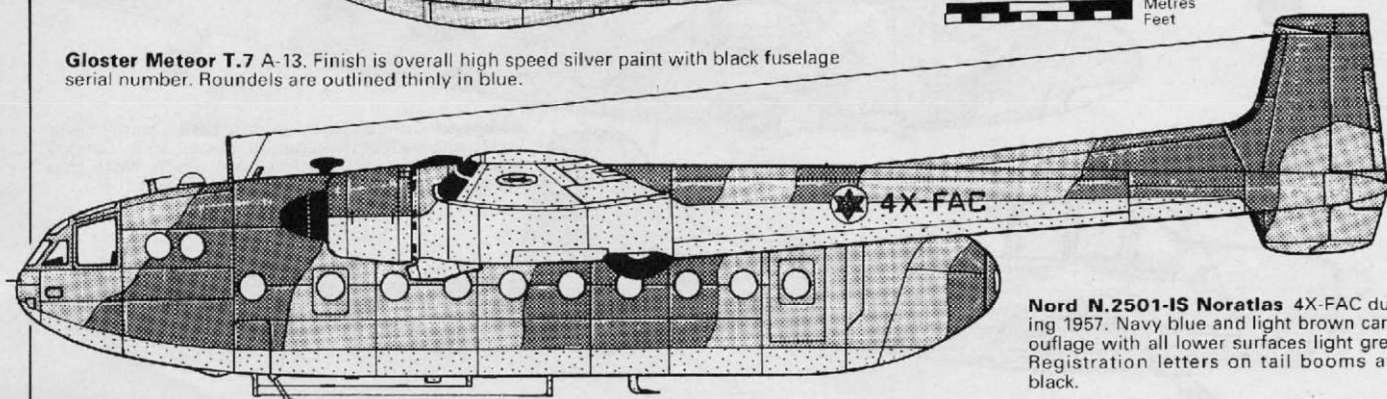
Gloster Meteor F.8 No.106. Standard light brown and navy blue camouflage with light grey lower surfaces. Serial number is white, area around gun ports is black.



Gloster Meteor FR.9 No.11. Upper surfaces are light brown and navy blue. Lower surfaces are light grey. White serial number.



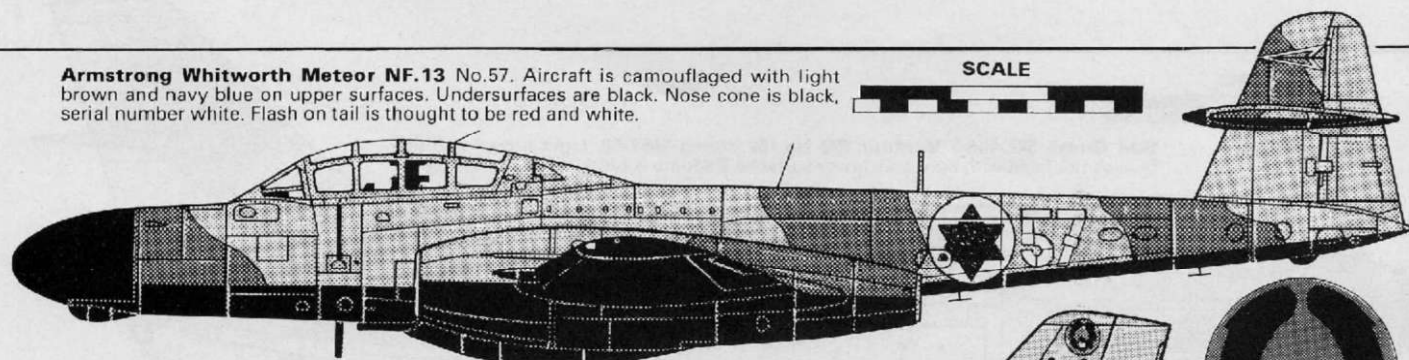
Gloster Meteor T.7 A-13. Finish is overall high speed silver paint with black fuselage serial number. Roundels are outlined thinly in blue.



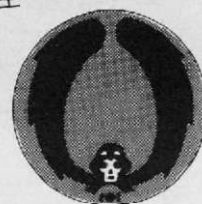
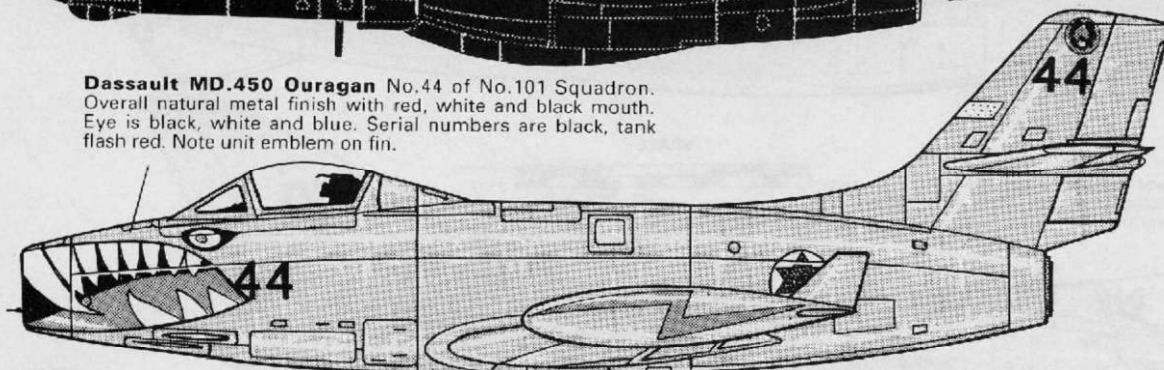
Nord N.2501-IS Noratlas 4X-FAC during 1957. Navy blue and light brown camouflage with all lower surfaces light grey. Registration letters on tail booms are black.

Armstrong Whitworth Meteor NF.13 No.57. Aircraft is camouflaged with light brown and navy blue on upper surfaces. Undersurfaces are black. Nose cone is black, serial number white. Flash on tail is thought to be red and white.

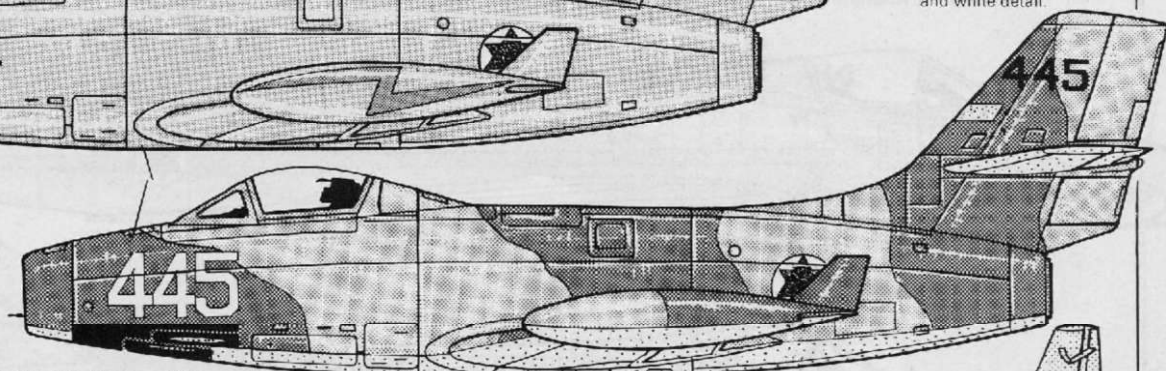
SCALE



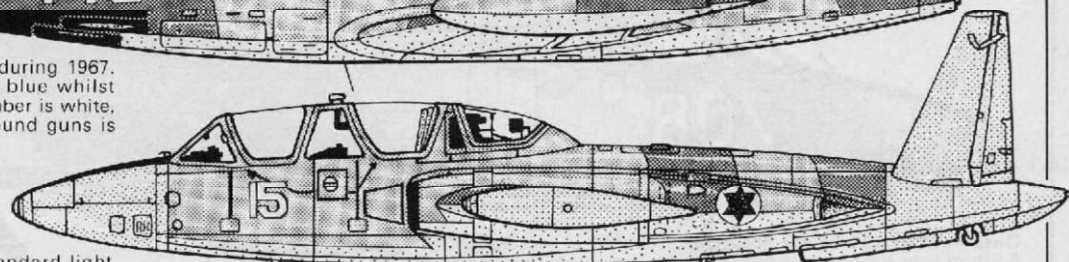
Dassault MD.450 Ouragan No.44 of No.101 Squadron. Overall natural metal finish with red, white and black mouth. Eye is black, white and blue. Serial numbers are black, tank flash red. Note unit emblem on fin.



No.101 Squadron emblem is red with black and white detail.



Dassault MD.450 Ouragan No.445 during 1967. Camouflage is light brown and navy blue whilst lower surfaces are light grey. Nose number is white, repeated on the fin in black. Area around guns is black.

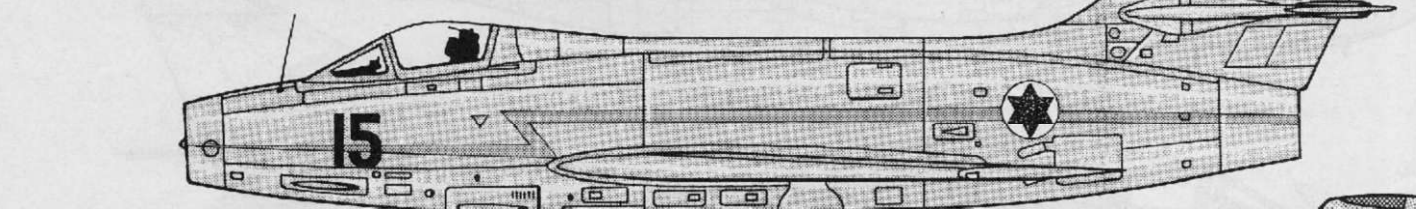
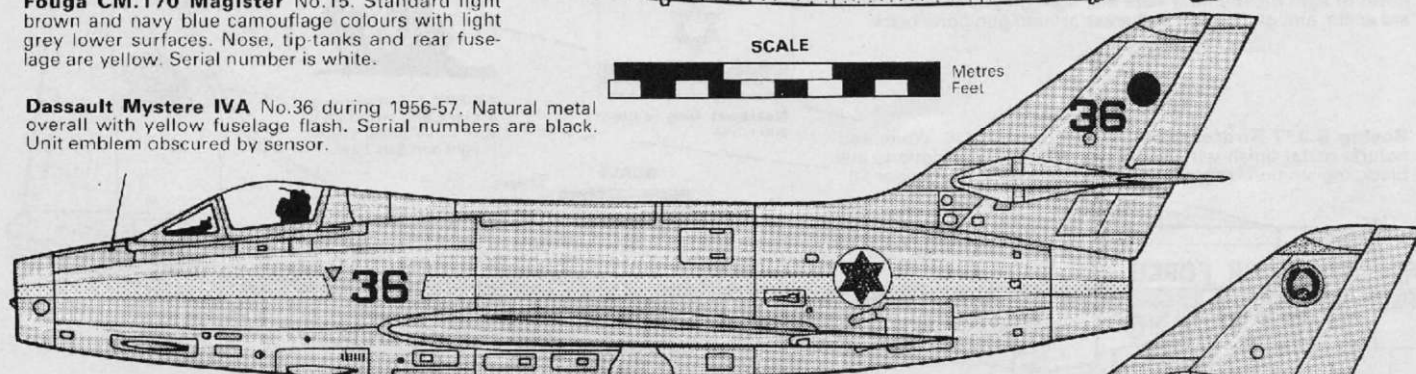


Fouga CM.170 Magister No.15. Standard light brown and navy blue camouflage colours with light grey lower surfaces. Nose, tip-tanks and rear fuselage are yellow. Serial number is white.

SCALE

Metres
Feet

Dassault Mystere IVA No.36 during 1956-57. Natural metal overall with yellow fuselage flash. Serial numbers are black. Unit emblem obscured by sensor.



Dassault Mystere IVA No.15 as used by No.101 Squadron in the late 1950s. Overall natural metal finish with red fuselage flash. Serial number is black. Note unit emblem on fin.

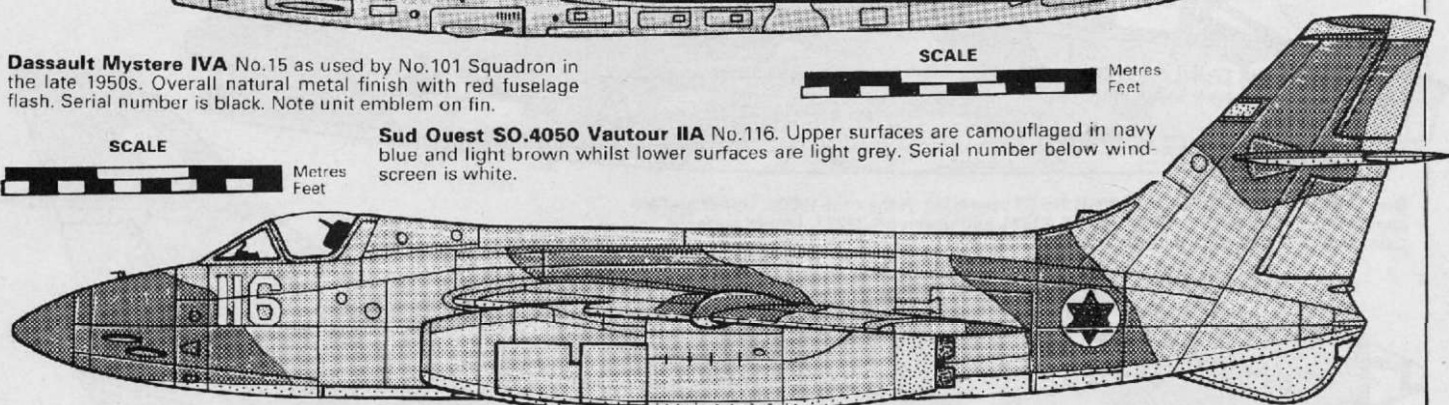
SCALE

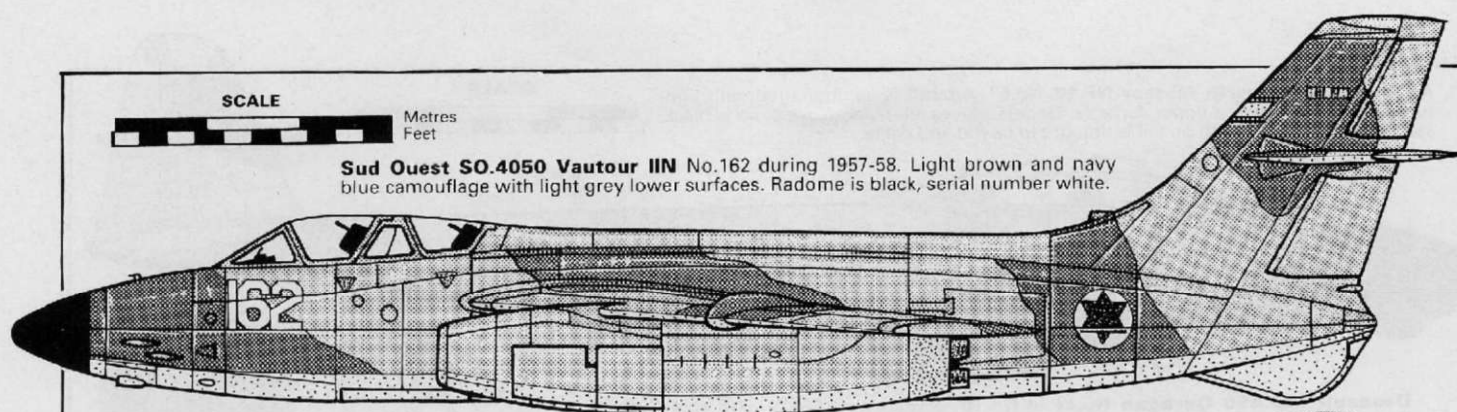
Metres
Feet

SCALE

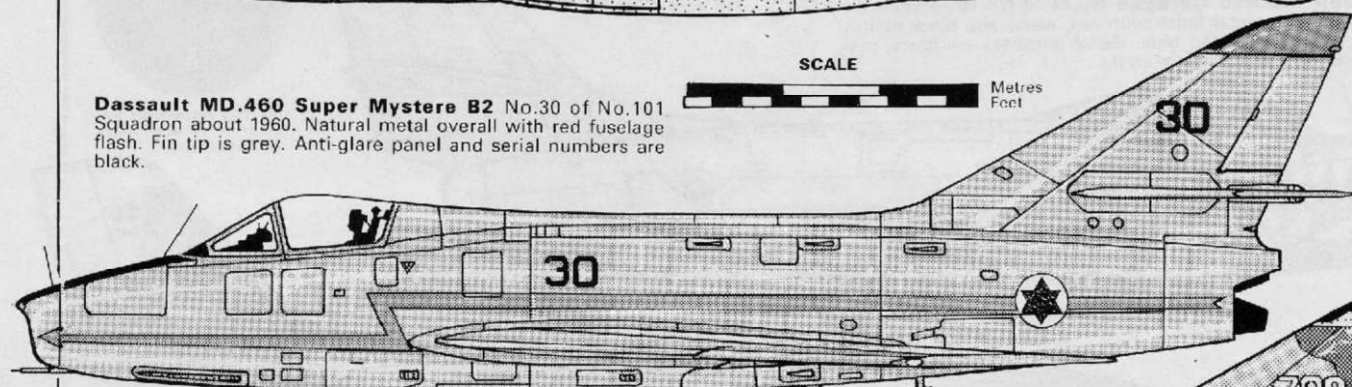
Metres
Feet

Sud Ouest SO.4050 Vautour IIA No.116. Upper surfaces are camouflaged in navy blue and light brown whilst lower surfaces are light grey. Serial number below windscreen is white.

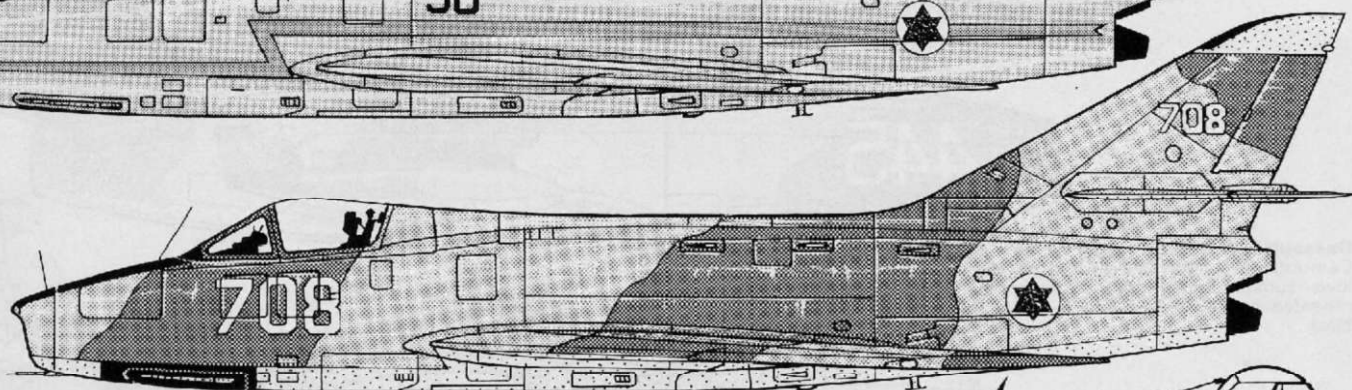




Sud Oest SO.4050 Vautour IIN No.162 during 1957-58. Light brown and navy blue camouflage with light grey lower surfaces. Radome is black, serial number white.



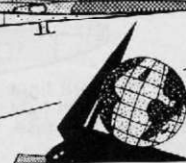
Dassault MD.460 Super Mystere B2 No.30 of No.101 Squadron about 1960. Natural metal overall with red fuselage flash. Fin tip is grey. Anti-glare panel and serial numbers are black.



Dassault MD.460 Super Mystere B2 No.708 in camouflage finish of light brown, navy blue and light grey. Serial numbers are white, anti-glare panel and areas around gun ports black.

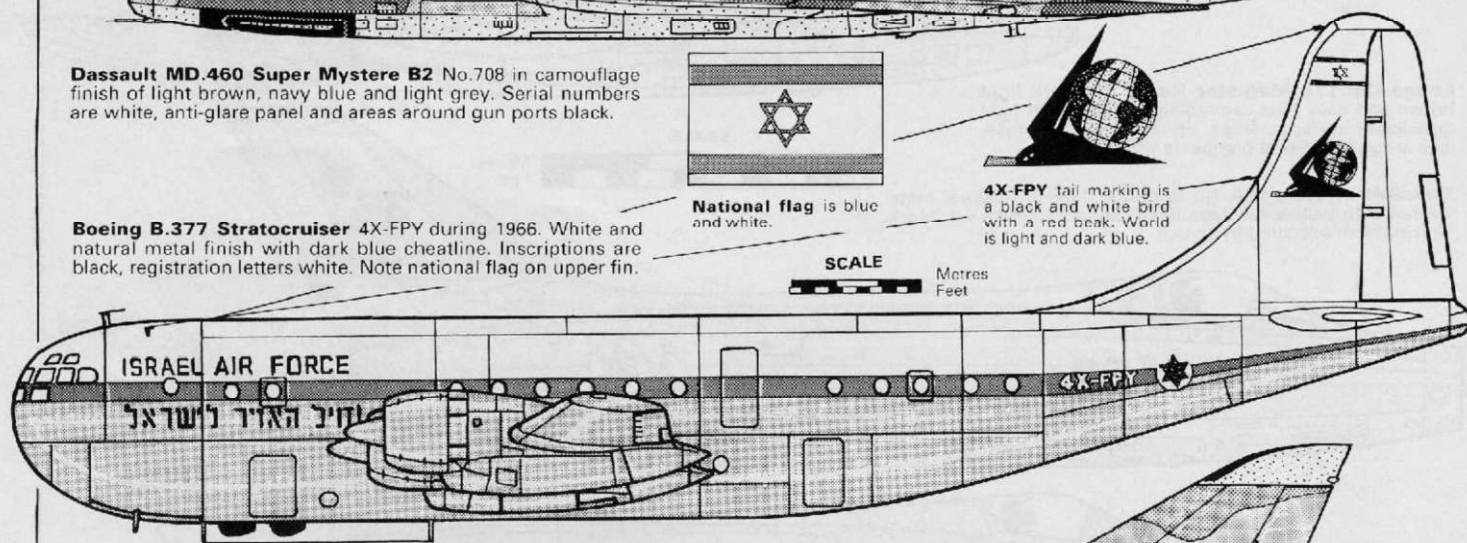


National flag is blue and white.

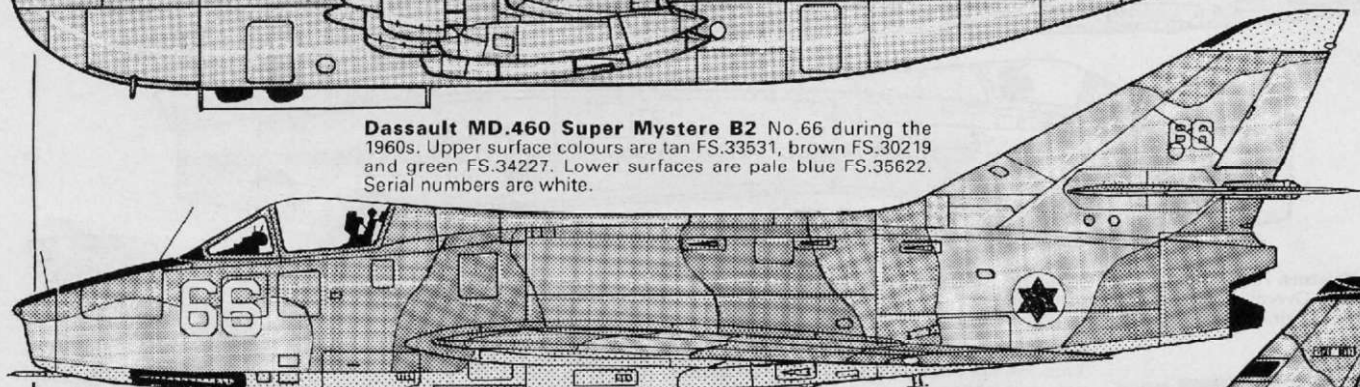


4X-FPY tail marking is a black and white bird with a red beak. World is light and dark blue.

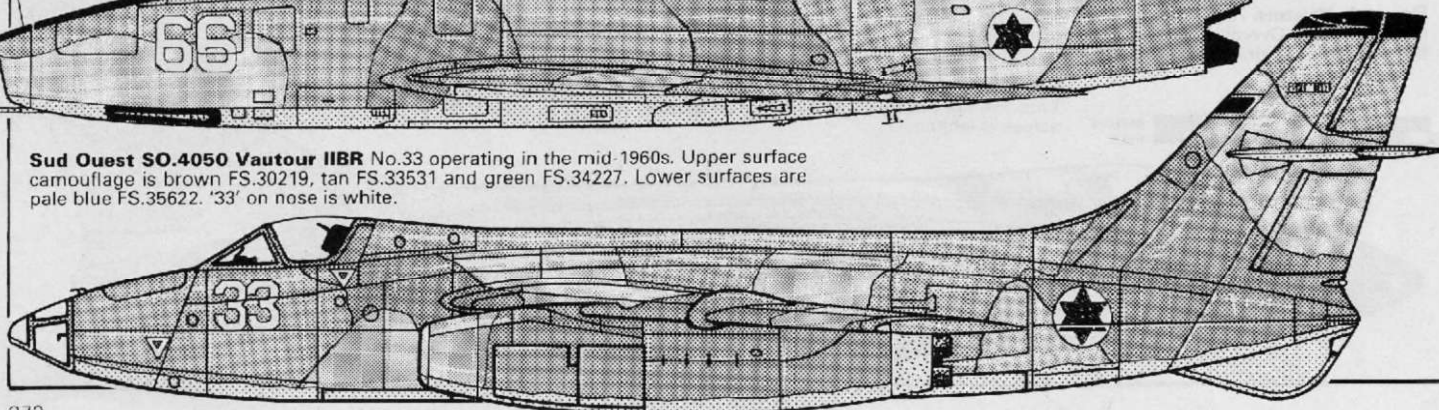
Boeing B.377 Stratocruiser 4X-FPY during 1966. White and natural metal finish with dark blue cheatline. Inscriptions are black, registration letters white. Note national flag on upper fin.



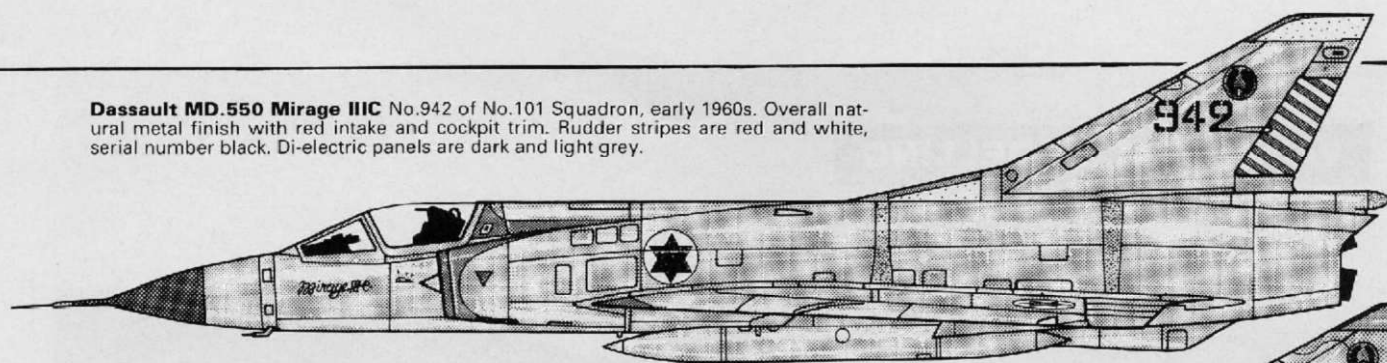
Dassault MD.460 Super Mystere B2 No.66 during the 1960s. Upper surface colours are tan FS.33531, brown FS.30219 and green FS.34227. Lower surfaces are pale blue FS.35622. Serial numbers are white.



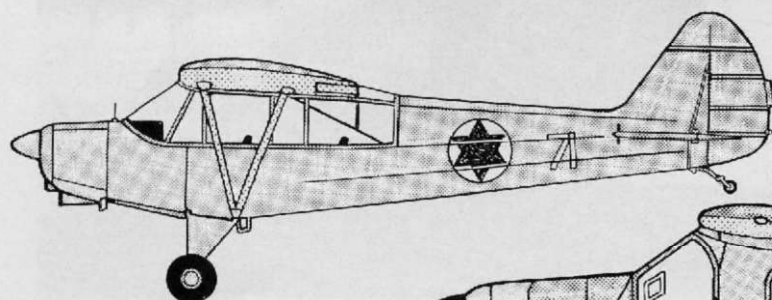
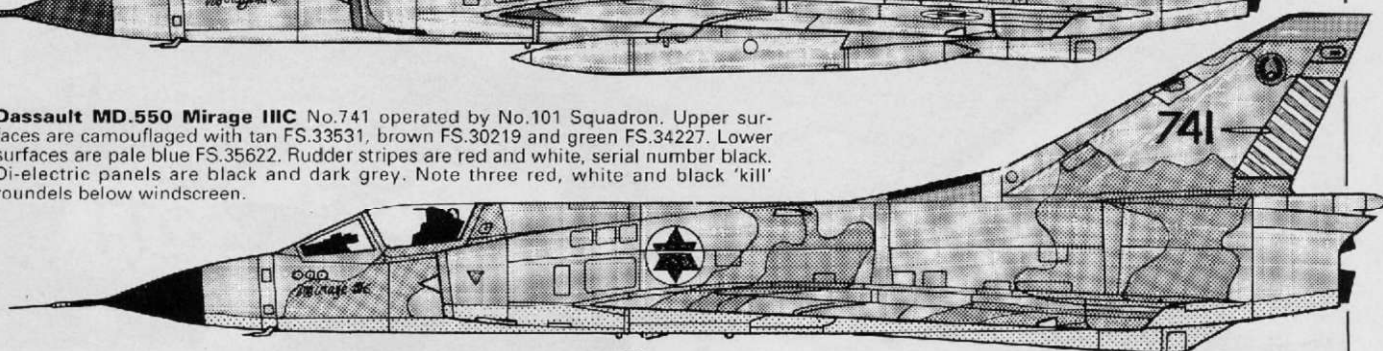
Sud Oest SO.4050 Vautour IIBR No.33 operating in the mid-1960s. Upper surface camouflage is brown FS.30219, tan FS.33531 and green FS.34227. Lower surfaces are pale blue FS.35622. '33' on nose is white.



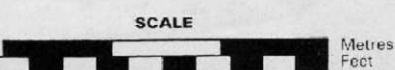
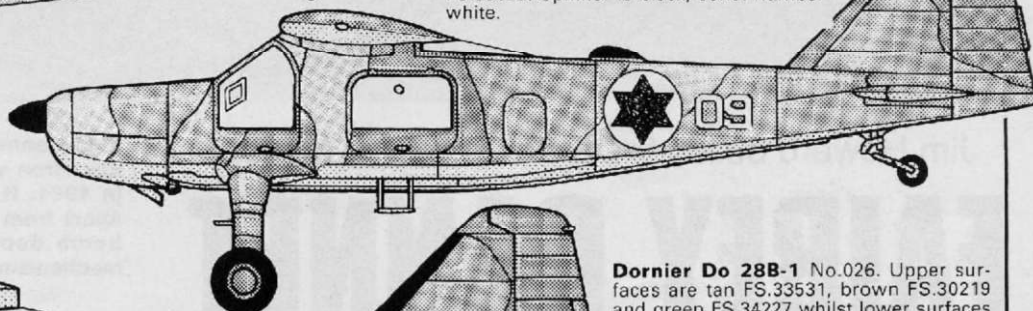
Dassault MD.550 Mirage IIIC No.942 of No.101 Squadron, early 1960s. Overall natural metal finish with red intake and cockpit trim. Rudder stripes are red and white, serial number black. Di-electric panels are dark and light grey.



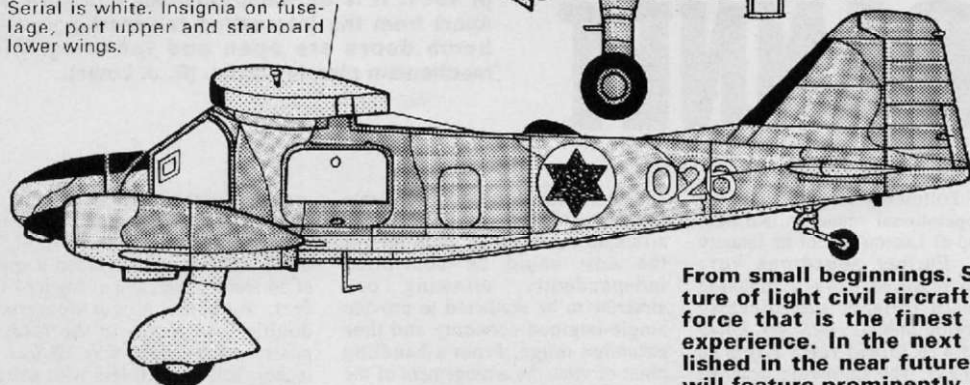
Dassault MD.550 Mirage IIIC No.741 operated by No.101 Squadron. Upper surfaces are camouflaged with tan FS.33531, brown FS.30219 and green FS.34227. Lower surfaces are pale blue FS.35622. Rudder stripes are red and white, serial number black. Di-electric panels are black and dark grey. Note three red, white and black 'kill' roundels below windscreen.



Piper Super Cub No.71 during the 1960s. Upper surfaces and sides are thought to be tan FS.33531, lower surfaces pale blue. Serial is white. Insignia on fuselage, port upper and starboard lower wings.



Dornier Do 27 No.09. Camouflage is tan FS.33531, brown FS.30219 and green FS.34227. Lower surfaces are pale blue FS.35622. Spinner is black, serial number white.



Dornier Do 28B-1 No.026. Upper surfaces are tan FS.33531, brown FS.30219 and green FS.34227 whilst lower surfaces are pale blue FS.35622. Anti-glare panel, spinners and leading edges are black. '026' is white.

From small beginnings. Starting with a ramshackle mixture of light civil aircraft the Israelis have built up an air force that is the finest in operational equipment and experience. In the next part of this article to be published in the near future, aircraft like this F-4 Phantom will feature prominently. (McDonnell Douglas)

