ASIAN AIR ARMS Newsletter 38
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Serving Asian Air Arm enthusiasts and modellers in 60 countries

In this edition:

INTERNATIONAL PLASTIC MODELLERS SOCIETY (UK)

INTERNATIONAL PLASTIC MODELERS' SOCIETY U.S.A.

Editorial & Kit News

As I write this short editorial, we are now less than three months away from Scale Model World 2023, the largest model show in the world, hosted by the International Plastic Modellers Society (United Kingdom), which celebrates its 60th Anniversary this year. After the challenges of the past few years, IPMS(UK) are planning a very special event to commemorate this significant milestone in their history and I am very pleased that the Asian Air Arms SIG will be a part of the event again this year. As many of you will know from a recent 'All Points Bulletin' sent via e-mail, we are currently aiming to display representative aircraft models from as many of the nations that are covered by the Asian Air Arms SIG as possible; all being well we hope to cover every single one and we appear to be well on the way towards our target although some 'combat modelling' may be required nearer the time. Rest assured, I will keep everyone appraised of our progress with some e-mail updates on the project, along with further details about the show as we get nearer to the actual event.

This leads me neatly to the second topic I would like to address, which is to clarify the principles under which our Special Interest Group operates, in terms of subject matter, since I note that there has been some further on-line discussion on the issue in recent weeks. Once again, the *primary* aim of the SIG is to bring together enthusiasts with an interest in Post-1945 military aviation in Asia. In geographical terms, this covers the 26 Asian nations, together with the Air Arms of 8 former-Soviet Asian republics and Iran, making thirty-five nations in total. In more recent times, we have taken some tentative steps towards extending coverage to include pre-World War II military aviation for these nations (or their pre-descendants) since some of the membership had expressed an interest in this area of study too. Our coverage does NOT include any of the major protagonists from the Second World War (1939-45), by which we mean the major Allied or Japanese Air Arms but we do reserve the right to cover any of the minor Asian Arms that operated with the Allies (the Nationalist Chinese Air Force, for example) during this time period. Post-War, we are avoiding any coverage of those non-Asian Air Arms that have been involved in the multitude of Post-WWII wars including Korea, Vietnam, Malaya and Indonesia. The vast majority, if not all, of these subjects appear to be adequately covered by other Special Interest Groups and there has to be an absolute limit to our coverage if the SIG is to remain manageable. All that said, we would prefer to focus most of our attention on Post-WWII Asian Air Arms since I believe we have more than enough raw material on this subject to keep the SIG viable and interesting long into the future.

New Kit Releases and News – August 2023

As I have mentioned in previous editions of the newsletter, the new kit programme for 2023 shows no signs of slowing down in spite of the dire forecasts with regard to a worldwide economic downturn and we have had some great announcements and one or two surprises in the last few months. As always, I will start with 1:72 scale where we have already seen the release of the first of the much-anticipated Modelsvit family of Dassault Mirage 2000s. Their first releases will include the single-seat Mirage 2000C/EG/5F and a two-seat Mirage 2000B/D so modellers that favour this scale will finally have a state-of-the art Mirage 2000 with which to build a ROCAF example. As previously reported, ICM of Ukraine have released their 1:72 version of the Rockwell/North American OV-10A Bronco (ICM72185) and a short review of this is featured elsewhere in this newsletter. The eagerly anticipated Heller Grumman E-2C Hawkeye is also nearing its release date with online images of the kit sprues indicating a very promising kit with plenty of options and, of course, a boxing with Asian Air Arms markings.

The 1:48 release programme has picked up pace again after a hiatus and this is where the surprises have come about. As you can imagine, in this age of instant access and the internet, it is very difficult for kit manufacturers to spring genuine news on us, but Airfix did just that earlier in the month with their announcement of a brand-new Westland Sea King in 1:48 scale (AX11006). This announcement did come completely 'out-of-the-blue', and the parent company must have imposeded a military standard of 'operational security' on its employees and supporters. It was, indeed, very welcome news to fans of rotary wing subjects and the Sea King in particular. This will be the first time that we will have a Westland Sea King available from a kit manufacturer, since the Hasegawa kit, which is now over 30 years old, was primarily for the Sikorsky variant, although the manufacturer did, from time to time, re-release the kit with additional parts to replicate the Westland variants, with partial success. Online images of the new Airfix kit are very promising and indicate that this will be the first of several boxings that encompass most, if not all, of the variants that were produced by Westland under licence from Sikorsky. As a bonus for Asian Air Arms fans, Xtradecal have already announced the future release of no less than six new Westland Sea King decal sheets to accompany the kit, two of which (X48-247 & X48-248) include markings for Indian and Pakistan Navy Mk.45/46 variants. AFV Club have announced another re-release of their popular Northrop F-5E Tiger II (AR48S12), which will include the latest ROCAF low-visibility markings and a superb set of new weaponry, which will also be marketed as a separate aftermarket set. The first of the recently announced AMMO Mig Mikoyan MiG-17F Fresco-C Fighter/Fighter Bombers, which have been developed in close cooperation with Kinetic, have now been released and I now have one of these on my workbench so keep an eye out for a review soon. One of the future 'Limited Edition' versions of the kit will have an Asian theme and is scheduled to have five decal options, covering two Vietnamese People's Air Force, two People's Liberation Army Air Force (PRC) and one North Vietnamese aircraft. Great Wall Hobby continue to capitalise of their family of Sukhoi Su-27/30 Flankers and have announced yet another boxing (GWHL4831) which will interest Asian Air Arms fans, since it is scheduled to include new parts and decal markings for a Specially marked Malaysian aircraft and another example operated by Myanmar. Not surprisingly, given their Asian roots, Kinetic are also taking advantage of their highly acclaimed new-mould General Dynamics/Lockheed-Martin F-16 Fighting Falcons/Vipers, which will now include a single-seat F-16V variant (K48-101) with decal markings for ROCAF aircraft and a KF-16A/C (K48-153) with ROKAF markings. The release of the same company's Canadair CT-114 Tutor advanced trainer (K48-082) is imminent and although the first release is likely to only include markings for Canadian examples, I feel sure it will not be long before Kinetic or some enterprising aftermarket decal manufacturer come up with options for the Royal Malaysian Air Force (TUDM) variant of this type, known as the CL-41G *Tebuan* (Wasp). The other big surprise for me (at least) was the announcement, by Meng, of a brand-new Chengdu J-20 Mighty Dragon (LS-002), again in 1:48 scale. This will, without doubt, be a superior product to the Trumpeter kit and once again online images suggest that the new kit will possess a similar level of detail to that which we have seen with the recent McDD F-4 Phantom kits. As many of you know, I am not a particular fan of Chinese manufactured aircraft but I may just be tempted by the menacing yet attractive lines of the J-20.

Moving up to 1:35 scale, and as previously announced, Meng Models have taken a rather curious step and gone head-to-head with Takom in recently releasing their own version of the Boeing AH-64D Longbow Apache (QS-004). It will be interesting to compare the two kits although I cannot help but wonder why they did not opt to look at the AH-1 Cobra/Super Cobra or UH-1 Huey to enter the 1:35 rotary -wing market. The initial kit will not include any markings for Asian variants, but I have little doubt that with so many 1:35 AH-64 Apache kits now on the market, a specialist decal manufacturer will produce a suitable sheet that may cover some of the six Asian Air Arms that currently operate the type.

Mark ATTRILL, August 2023

Cessna U-17A/B Skywagon in VNAF Service

The Cessna 185 (US Military designation U-17) was a single-engine, high-wing, general-purpose light aircraft, developed and manufactured by the Cessna Aircraft Company in the late 1950s. It was primarily designed as a rugged utility aircraft, envisaged for use in bush flying and the commercial transport of passengers and freight to rudimentary, remote airstrips, lakes and snowfields throughout the vast wild regions of Canada and Alaska. As such, the Cessna 185 could be equipped with wheels, skis or floats. The Cessna 185, developed from the earlier Cessna 180, first flew in July 1960, with over 4,400 examples completed before production ceased in 1985.

The aircraft was procured by the USAF for the VNAF under the Military Assistance Programme with the military designation U-17A (Cessna 185E) and U-17B (A185E). Deliveries to South Vietnam began in 1962, and it was envisaged that the aircraft would fulfil variety of roles including flight training, Forward Air Control (FAC), liaison, courier and psychological warfare duties. The aircraft was designed for one-pilot operation and could carry 5 passengers or up to 1500 lbs of general freight. Like the earlier U-6A Beaver, the aircraft's ability to operate in and out of short and rudimentary landing strips made the aircraft ideal for use in remote, underdeveloped regions, and it was inevitable that the U-17A/B would also see service in Vietnam.

The first recorded deliveries of Cessna U-17s to the VNAF took place in 1962/63 with 25 aircraft allocated to the Air Training Centre at Nha Trang, although it is understood that at least one of these aircraft was also allocated to the 83rd Special Operations Group at Tan Son Nhut to operate alongside the C47s and C-123s used by that unit at the time. Prior to this time, the training of VNAF fixed-wing pilots by the USAF had been undertaken in the United States, which had created problems with the throughput of qualified pilots. The US-based intakes could not keep up with the requirements of the rapidly expanding South Vietnamese Air Force, so a solution was found through the 'off the shelf' procurement of the Cessna 185, supported by technical assistance and maintenance training provided by Cessna, in order to re-establish the in-country VNAF Air Training Centre (ATC). The first specially-designed course began at the ATC in September 1963, and after training well over 150 pilots and maintenance personnel during the first year, the US authorities turned the ATC training programmes over to the Vietnamese in totality. The ATC utilised the U-17 Skywagon for well over ten years, operating it alongside the Cessna 172E (Military designation T-41D Mescalero) and the T-37 "Tweety Bird", although there was a brief hiatus in the early 1970s with some of the U-17s released to perform higher priority tasking with the Observation Squadrons.

Concurrent with the re-establishment of the fixed-wing flying training system in South Vietnam, there was a growing need for additional aircraft to fulfil other front-line roles in the VNAF, including Forward Air Control and Observation. The VNAF had already received many of the smaller Cessna O-1A/E (L-19) Bird Dogs, which had been employed in the highly risky FAC role, and losses among this fleet had been alarming. To complicate matters further, the Cessna O-1 had been out of production for some years. The availability and rapid delivery of the slightly larger U-17A/B was advantageous to the US authorities seeking to find a solution to counter the high attrition rates suffered by the O-1 FAC community, and the VNAF eventually procured at least sixty additional U-17A/B Skywagons to fulfil several roles within the VNAF. This included the delivery of forty-five airframes in 1965 alone. The earliest batch of aircraft were initially operated alongside other aircraft types by the 314th Special Mission Squadron and the 716th Composite Reconnaissance Squadron, 33rd Tactical Wing at Tan Son Nhut Air Base, and were used in a wide variety of liaison and utility duties, before the type was identified as a potential platform for a highly specialised role. In the spring of 1964, the VNAF set up a psychological warfare unit within its Command structure at Tan Son Nhut AB. Ten single-engine utility aircraft were delivered to the unit including 4 x U-17 Skywagons, which were modified to carry a tape-recorded public-address system with one or two large speakers mounted on the port side of the fuselage. The U-17s, with their limited range, were primarily used in the environs of Saigon and its outlying districts. Apart from delivering airborne broadcasts, the aircraft were also employed in psychological warfare leaflet dropping, utilising a modified drop chute on the port side and the aircraft's excellent slow speed handling characteristics. A total of sixteen U-17A/Bs were eventually modified to support psychological warfare efforts in South Vietnam.

In the Forward Air Control and Observation role, the procurement of the U-17A/B to augment the surviving Cessna O-1 Bird Dogs allowed the VNAF to expand to operate four Observation Squadrons by 1965, although the larger aircraft, with its side-by-side seating arrangement made it less effective in this role. Notwithstanding these limitations, the VNAF continued to receive additional deliveries of the aircraft, which at its apogee eventually supplemented no less than eight Observation Squadron throughout South Vietnam, together with the surviving O-1 Bird Dogs and O-2 Skymasters. Despite the reinforcement of these Units, the Forward Air Control role continued to be the most challenging to perform in the VNAF, with aircraft having to operate at increasingly high altitudes to avoid the SAM and MANPAD threat over Vietnam which, in turn, reduced their overall effectiveness. A reorganisation of the VNAF flying training organisation in 1972 saw the creation of the 918th Training Squadron as part of the ATC at Nha Trang. A total of 68 U-17A and 26 U-17B Skywagons were ultimately delivered to the VNAF before its demise in April 1975. In the last year of VNAF air operations, the U-17 fleet was further rationalised as the service struggled to

manage its dwindling budget. Some draconian budgetary measures resulted in the grounding and storage of the ATC-operated Cessna T-41Ds, and since VNAF fixed-wing flying training was still taking place, some of the U-17s were returned to service in the training role.

The Cessna U-17 Skywagon continued to operate until the last days of the VNAF with at least fourteen aircraft reported to have fled to Thailand by 1 April 1975. The presence of surviving exhibits in contemporary Vietnamese Aviation and Military museums would also seem to suggest that some examples even served in the VPAF after re-unification, which is entirely plausible given the relative simplicity in design and maintenance of the original aircraft.

VNAF Cessna U-17A/B Skywagon Colours and Markings

The majority of Cessna U-17A/B Skywagons in service with the VNAF wore the same colour scheme throughout, regardless of the diversity of roles that the aircraft undertook. The aircraft were delivered in an overall light grey colour scheme, possibly ADC Grey (FS36373) with a matt black anti-dazzle panel, although the light grey faded quite quickly in the harsh climatic and environmental conditions, taking on an almost off-white appearance on some aircraft. The U-17 Skywagon sported some of the most colourful markings observed on VNAF aircraft, particularly on those machines operated by the numerous Observation Squadrons. High-visibility type-G national insignia, which were almost exclusively the preserve of the VNAF U-17 fleet, were applied in the standard US pattern on the fuselage sides and top/lower surfaces of the wing, together with a small rendition of the national flag on the rudder surfaces. A large number of aircraft also sported a highly colourful and stylised band on the fuselage or on the rudder surfaces denoting their parent Wing or Squadron. As with other aircraft types, and as the VNAF grew in size, the U-17s wore a two-letter Unit/Locator codes in black, along with the aircraft serial number in medium blue, on the fin. Some aircraft also carried a large rendition of the Unit insignia on the port side of the engine cowling. The only major variations in colour scheme or markings relate to those aircraft, perhaps one or two, operated by the 314th Special Mission Squadron. These aircraft were often employed on so-called courier services with the aircraft sporting a colour scheme akin to that which would be seen on a civilian U-17. One aircraft was observed with dark blue fuselage upper surfaces and an extension to the lower surfaces of the cowling. The lower surfaces of the fuselage, together with both the upper and lower surfaces of the wings, were finished in white. This aircraft also featured a blue/white cheatline along the fuselage together with a stylised dark blue flash across the forward section of the fin, but retained smaller variations of the VNAF 'stars and bars' and fin flash. A second aircraft featured the standard light grey colour scheme across the fuselage and tail surfaces with a white upper fuselage and dark blue cheatline. This aircraft also featured a stylised 'arrow' on the fin surfaces, possibly yellow outlined in dark blue, with a unit badge, aircraft serial number and standard red/yellow fin flash superimposed over the top.

VNAF Cessna U-17A/B Skywagon Units/Identification Codes – 1962-75				
Unit	Variant	Air Base	Tail Code	Notes
Air Training Centre	U-17A/B	Nha Trang	W	
83rd Special Operations Group	U-17A/B	Tan Son Nhut	N/K	
110th Observation Squadron	U-17A/B[1]	Da Nang	B (X*)	Detachment at Hue Citadel Airport
112th Observation Squadron	U-17A/B	Bien Hoa	Y (D*)	
114th Observation Squadron	U-17A/B	Nha Trang	Nil	
116th Observation Squadron	U-17A/B	Binh Thuy	E*	
118th Observation Squadron	U-17A/B	Pleiku	Nil	
120th Observation Squadron	U-17A/B	Da Nang	Nil	
122nd Observation Squadron	U-17A/B	Binh Thuy	Nil	
124th Observation Squadron	U-17A/B	Bien Hoa	FD*	
314th Special Mission Squadron	U-17A/B	Tan Son Nhut	C*	
716th Composite Reconnaissance Squadron	U-17A/B	Tan Son Nhut	M*	
918th Training Squadron	U-17A/B	Nha Trang	Nil	Formed 1972

* Tail (Unit Locator) Codes as of March 1975

[1] It is unclear which Units had the U-17B variant on strength. The Air Training Centre operated both variants and it is possible that all, or only some, of the Observation or Special Squadrons operated both variants.

The Cessna 185 (U-17A/B) Skywagon in Miniature

This picture, and the one below, shows a conversion of the Monogram 1/41 scale Cessna 180 by Danny Dinh, representing an aircraft belonging to the 110th Observation Squadron of the South Vietnamese Air Force. (Photos courtesy of **www.aircraftresourcecenter.com**)

Coverage of the Cessna 185 (U-17A/B) Skywagon in miniature has, until recently, been almost non-existent and mostly relied upon the lengthy conversion of a very limited number of Cessna 180 aircraft kits. Monogram first released a kit (PA-26) of the latter way back in 1957, which featured floats but was re-released some eight years later with a wheeled undercarriage (PA-123). This kit was first produced in an age where the manufacturers cared more about fitting the kit to a particular size of package than to a constant scale with the result that this model kit is to 1:41st scale. Monogram have sought to re-release the kit on a regular basis ever since and I have seen some reasonable attempts at converting the kit to represent a VNAF U-17A/B Skywagon. In 1:72, a little-known US kit manufacturer, Khee-Kha Art Products produced a very limited edition vacform/resin kit of the Cessna 180/185 in 2009. Fortunately the long standing and well-known Czech manufacturer, Kovozávody Prostějov has now come to the rescue of fans of this popular aircraft and produced a family of Cessna 185/U-17 Skywagons, which includes one edition (KPM0235) which has a decal option for a U-17B operated by the 110th Observation Squadron of the VNAF. A review of this kit, by our very own Editor, Steve Komor, has previously appeared in a recent issue of the SIG Newsletter (Issue 34 – September/October 2022).

Mark ATTRILL
June 2023

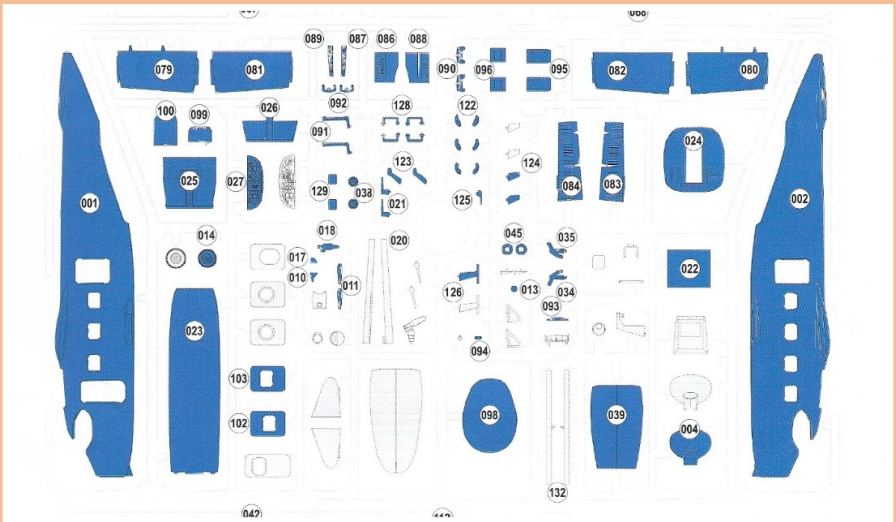
Nepalese PZL M-28 Skytruck

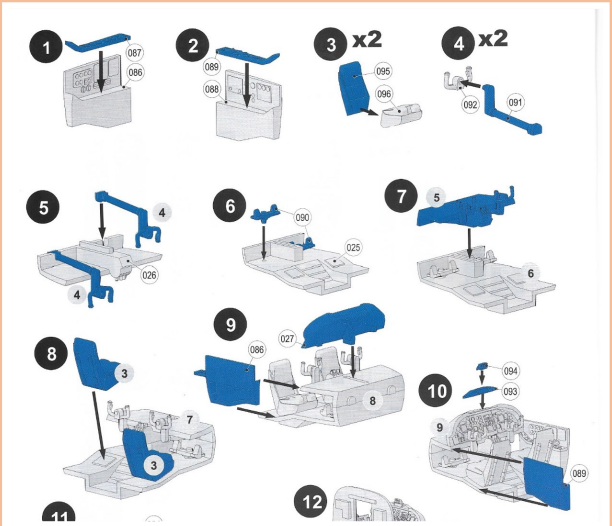
As a newcomer to the SIG, I only had a couple of models that I could contribute to the Scale Model World displays, and none were built before I joined. Mark's idea to have an example covering every Air Arm in the SIG meant I could match stash with options available, and even make a specific purchase. In reviewing the list, I had one I could cover from the stash – the Yak-130 of the Myanmar Air Force, and another one I chose to do as I'd been to the country – a M-28 Skytruck of the Nepalese Army Air Service. It's the Skytruck I will describe in this article.

The Aeroplast kit – 94001 – in 1/72nd scale had the decals for the Nepalese Army Air Service in the box, simplifying the choice as to which kit to go for, particularly as it is not my normal build scale, that being 1/48th. A purchase from eBay, and before I knew it, the kit was in front of me. As it had to be ready by November, and it was now February, I thought I'd get it done to avoid the dreaded "combat building" in late October, early November.

On opening the box you will find sprues in a light grey plastic, a clear parts sprue, a decal sheet and an instruction book in colour on glossy paper – other manufacturers take note what can be done with a relatively cheap, short-run kit. The instructions also include a printed copy of the decal sheet, and the parts required for the build are highlighted on the sprue diagrams (not always correctly). The instructions follow the highlight style – indicating, in blue, the parts to be added to the existing parts which are shown in grey.

You'll need to check your references for your chosen builds as there are various fit options and the instructions do not really help as to which is which, though some clue is given in the paint diagrams.

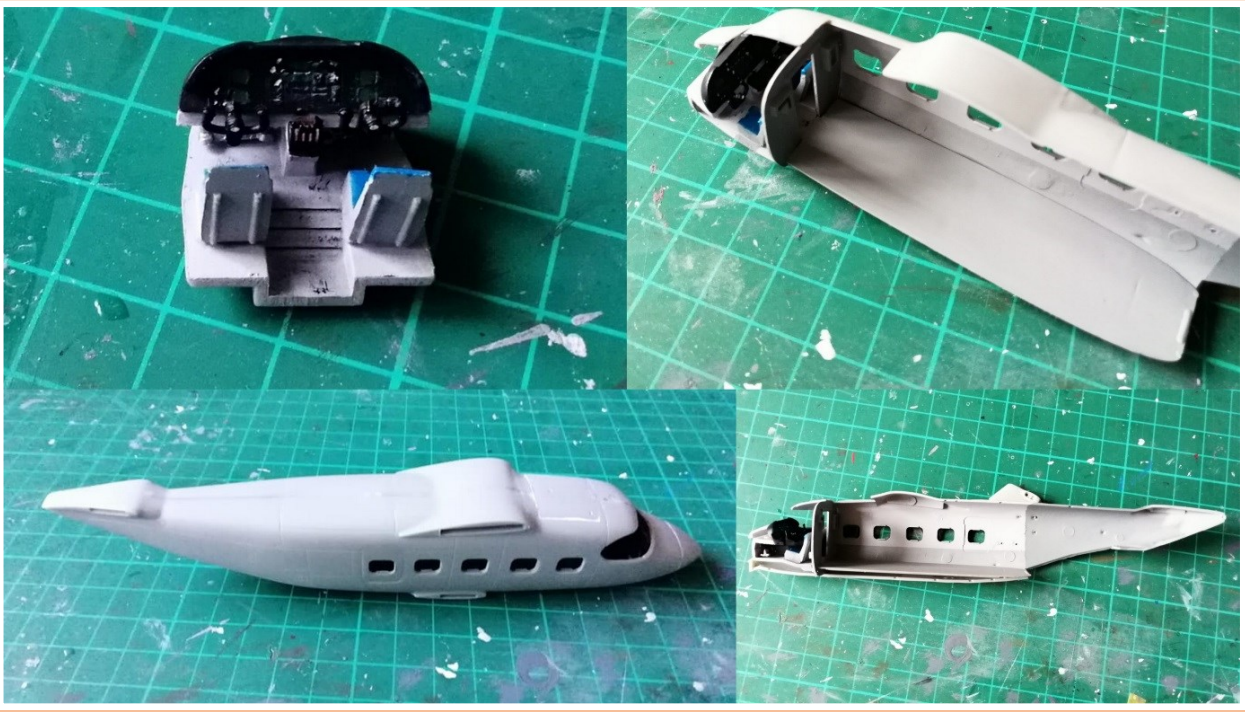




Construction starts with the area with the most detail – the cockpit – and highlights the first issue. Locating the cockpit and instrument panels was something of a nightmare as there aren't really any locating guides that help. I'd not be unduly worried as when you close up the fuselage there's very little that can be seen. Regarding the internals for the remainder of the aircraft – there is nothing but the cockpit bulkhead and a floor. It is an obvious omission for the scratch builder to have a go at, though you're again unlikely to see the end results. There are some large ejector pin marks you'll need to remove, alongside the flash on most of the parts.

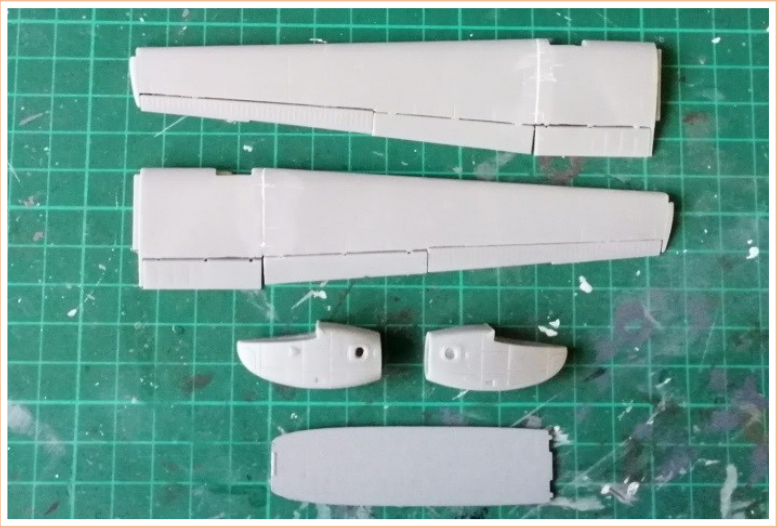
The fuselage halves have no locating pins, so its' best to glue short stretches at a time. I didn't achieve a clean join and lots of sanding was required. When you have completed the construction to your satisfaction and you can get the fuselage to close (!), you'll find there are no clues given to internal paint colours. "No big deal", you say, "there's the Web". You do find images it's true, but I didn't find any for the Nepalese Army Air Service, as you might expect – well not in English language searches. I made up colours based on other versions with other operators, figuring I'd have few people if any who could call it wrong.

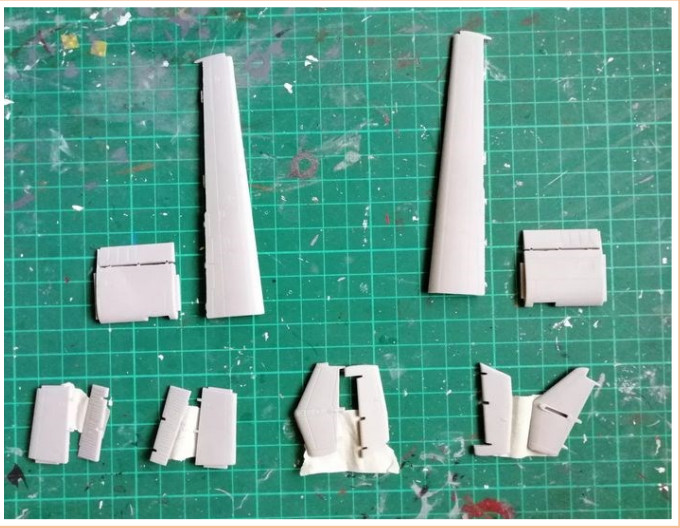
WARNING! You will need **a lot** of weight in the nose to stop the aircraft being a tail-sitter. And I'm not sure there's enough room to add it. I failed, and the aircraft is glued to a base.



Fuselage and cockpit windows can be added after you close the fuselage, which is the option I chose. You'll find the cockpit ones are a pain to fit and don't really match the fuselage aperture.

Next up are the wings and tail. All the control surfaces can be moved – a series of T-shaped tabs allow you to glue top and bottom of the wing or elevators in place whilst trapping the flaps and ailerons. In practice, I wouldn't bother. When you try and clean the flash off them, you're in great danger of breaking them and they're not really necessary. Be sure to keep a note of which parts you are dealing with as it's easy to mix left and right if you don't.





You're now ready to add wings and tail to the fuselage. If you haven't already done so, I'd fit the fuselage windows now, and certainly before putting the wing support struts on. I didn't, and I regretted it later on when trying to fit the windows, which are tight, very tight. You'll also add the engines at this point. There will be various gaps to fill.

Painting is next, and for my chosen version there's a problem – they cut off the recommended paint colour when printing the instructions. As it clearly refers to an FS number which I suspect is only a guide, I didn't worry too much, and mixed a paint based on images I found on the web. I used a mix of Vallejo Flat Green and Luftwaffe Camo Green in roughly equal portions for the main scheme. There are only a few decals and these were added without major problems, although the 'No Walk' wing markings did break up in some places. Finally you can add the undercarriage and the oversize pitot tubes and aerials.

This was far from a Tamiya-type "shake and bake", but then I'd had no illusions on that score. I think it turned out okay, but then I have absolutely no knowledge of the aircraft and my assessment is based on the result and the effort to get there. The good news is, the SIG now has Nepal covered for future displays. I think I can safely say we'll not see another one on a club stand any time soon.

Apologies for the quality of the construction photos, they were for reference as "snaps", taken on an Android tablet. Here's the final model on its display base – glued as I said due to the lack of weight in the nose. Hope you like it.

And here's the real thing ….(and there's another photo on the front cover - Ed.)

Graham James, July 2023

A Member's Observations

In the previous issue of the Newsletter (no. 37), Mark Attrill reviewed DP Casper's 'India-Pakistan War 1971' decal sheet.

Hot on the heels of the Newsletter's circulation, member Vikram Singh sent us this email, detailing observations and corrections which need to be borne in mind when using the decals. He goes on to detail corrections regarding the Special Hobby HAL (Folland) Ajeet kit reviewed in the same issue. Vikram's email is reproduced here in full, along with Mark's reply for completeness.

Re: DP CASPER's 'India-Pakistan 1971 War' Decal Sheet:

A much-needed sheet [which] has finally filled the gap in this hardly-modelled genre of Indo-Pakistan wars. Technically the sheet is good, as I have used several of these decals in my builds. However, there is much to be said about the historical accuracy of the schemes. Let's start from the PAF side:

1. Almost all aircraft have been given squadron markings on the fin. These did not come to be painted till well after the 1971 war.
2. There were **no** Shark mouths painted during the war (refer Schemes 16 and 17).
3. By 1971, all B-57 Canberras had the "Georgia Peach" All-Weather Bombing System embodied, resulting in a longer nose. The B-57 at scheme 21 depicts the stock nose supplied originally. Further, by 1971, all were painted dark green upper with black undersides and serials in grey, not overall black with red serials as shown.
4. The RJAF F-104s were also silver and not camouflaged as shown in scheme 19. The camouflage was applied long after the war and was copied from the RJAF Mirage F-1s received in the late 1970s. It is moot as to whether they flew in PAF or RJAF markings. Also, they were flown in on 13 December, by which time 9 Sqn PAF had moved to Masroor. The scheme states Sargodha.
5. At scheme 19, it is purported that the 5 Sqn Mirage IIIEP operated from Rafiqui. During the war, they only operated from Sargodha and a handful were held in reserve at Mianwali.

[Now for] the IAF Decals:

1. Again, the squadron markings shown on the MiGs are incorrect. No squadron markings had as yet appeared on IAF MiGs. Only the Hunter's leaping Panther is correct (Scheme 3).
2. No MiG-21s operated from Poona (Schemes 5&6), and certainly no air combat training markings like the green tail were evident until the middle 1980s.
3. No Gnats operated from Jamnagar (Scheme 1). 9 Sqn operated from Halwara.

Lastly, the green in both the PAF and IAF national markings is too light, they should be almost RAF dark green.

Re: Special Hobby 1:72 HAL(Folland) Ajeet Mk I Indian Light Fighter.

Referring to the paint schemes;

Camo scheme B - Refers to Ajeet IE1083 dated 1965. The first Ajeet flew in 1978. This incidentally was the first prototype labelled the Gnat Mk II.

Camo scheme C - states that E257 was from the Operational Conversion Unit. No Gnat/Ajeet ever flew in the Operational Conversion Unit.

Camo scheme D - No Ajeet carried the DME antenna shown under the intake lips. Only the Gnats had these. Also, the 'Winged Arrow' symbol was on a white disc and not directly painted onto the NMF as shown.

I attach a few pics for your viewing. (SEE NEXT PAGE)

With regards,

Line Scriber

Vikram,

An excellent response, and just what this Special Interest Group should be about. An informed exchange of information from a knowledgeable source. Having been in the decal production business myself in the past, and following the developments of other manufacturers, I am well aware of the inaccuracies that often creep in, so your e-mail came as no surprise. The content (including the photos) will make a nice little addition to the next edition of the newsletter so, if you do not mind, I will ask Steve to include the information for more general publication.

Thanks again for your input - I wish others would follow your lead !
Kind regards

Mark A

Building the Indian Navy Harrier using the Kinetic kit

The Indian Navy flew two variants of the British Aerospace Harrier - the Harrier T.60 and the Harrier T.4(I). I would refer you back to previous newsletter articles by Dave Fleming for the history of these aircraft and their use by the Indian Navy.

Following the release of the Sea Harrier FRS.1 and Sea Harrier FA.2 kits, Kinetic released the "Harrier T2 /T2A /T2N /T4 /T4N / T8 Two Seat Trainer" kit (K48040). For the record there wasn't a T2N, and you can do a T4A with the contents of the kit. There you go, that's the Harrier nerd coming out and I'll try and refrain from further utterances for the rest of the article.

You'll notice that the T.60 and T.4(I) are not in the title – no problem, you have the parts to build the kit, it is only the decals that you will need to source from elsewhere for the Indian-specific items (e.g. roundels, badges and serial) of which more later.

Although the two T.4(I) aircraft delivered to the Indian Navy differ in appearance externally from the original T.60, they were upgraded to the same standard in terms of avionics, etc. The T.4(I) retained the LRMTS nose that was fitted when they were

T.4 variants operated by the Royal Air Force.

In newsletter #33 I covered some of the aspects of the building of this kit in covering the Thai Navy TAV-8A. You may wish to refer back to that, but I will cover the salient points again as you may not have this material to hand.

My first action with any kit is to identify the parts I need and set up a spreadsheet for this purpose. With any Harrier kit from Kinetic it is necessary to identify and remove the parts that are specific to other variants that have been included in the kit, in this instance for the Sea Harriers, but which are definitely not to be used. The next action is to remove items not appropriate to the way I will display the kit – typically this means weapons, but in this case also including undercarriage and intake types for the T.4(I). That achieved, it's then a check for the items specific to the variant.

The table shows the part options for both variants:

		T4(I)	T60
Ejection Seats		L3, L5, L17, L18, L22, K26, PE9, PE10, PE11	
Nose		K9, K10 (Laser nose)	K11, K29, K30 (Pointy nose)
Tail Fin		L24, L25, L26, K31 (RWR Fin)	
Tail Cone		K15, K20 (RWR)	
Airbrake		E34	
Wing Light		Not fitted	E14
Doppler / Dummy Panel		K27	K34
Inter-nozzle strengthening Photo-Etch		Not known	
Outrigger Tie-Rings		Not Fitted	Fitted
Engine Bay Cooling Exhaust		Fitted	
Aerials	**E18**	Side dependent on serial and time	Right Side
	K07	n/a	n/a
	K16	Fitted - Serial and time dependent	n/a
	K17	n/a	n/a
	K22 (Nose Topside)	Fitted	Fitted
	K22 (Nose Underside)	Fwd of nose wheel bay	Fwd of nose wheel bay
	K22 (Tail Boom)	Fitted	Fitted
	K23	Both Fitted	Both Fitted
	PE6	n/a	n/a

The end result for these aircraft is a pile of parts almost as big as the ones you will use! Not ideal for the environment, but it's due toa lack of knowledge on Kinetic's part over the parts commonality across all first-generation Harriers. Never mind, they can be used for stock, test painting or in some instances other kits, so don't throw them away too quickly, and certainly not until you have finished the build. Some instructions don't correctly identify the part numbers.

Construction of the model is fairly straightforward, though you will see varying approaches as to how model makers include the cockpit, undercarriage bays and intake internals in the model. Whichever route you take, a little bit of dexterity, some tape and some bending will allow you to fit all the parts and close up the fuselage to ensure a tight fit. You certainly don't need to cut part K8 (intake mouth) as indicated in section 6. I tend not to bother with the section 5 parts to allow simultaneous rotating nozzles, but they are helpful in keeping the spacing of the fuselage. Some of the mating grooves for the undercarriage bays need deepening to allow a flush fit.

This is my sequence for getting the fuselage closed up with the various components inside.

C03 Front fan

K01 Left fuselage half

K04 Right fuselage half

K08 Bell-mouth intake

L21 Rear cockpit bulkhead (L24 on instructions)

L27 Right intake / undercarriage bay internal

L28 Left intake / undercarriage bay internal

S1&2 Cockpit assembly

S3 Front nose wheel forward bay (L2, L4, L8, L9)

S4 Airbrake / Main gear bay assembly

S9L Left intake assembly (K38, K39 + L13/L15)

S9R Right intake assembly (K40, K41 + L14/L16)

Fix undercarriage/ airbrake S4 assembly into K1

Fix L27 into K04 - use S9R to ensure it sits correctly by temporarily holding in place

Fix L28 into K01 - use S9L to ensure it sits correctly by temporarily holding in place

Check positioning of L27 and L28 - place S3 on L27 and then hold fuselage halves together and ensuring the parts close with no gaps and intakes align with fuselage by the intake splitter panels

Fix S1&2 into K01

Fix L21 bulkhead in place behind S1&2 cockpit tub

Put S3 in place on L28 - no glue required

Bring fuselage halves together, check alignments and when done, tape nose together forward of cockpit

Fit K08 onto rear of L27 and L28 by wiggling in from back – it will require you to widen the fuselage by bending in order to get the tab slots located in place.

Glue fuselage halves together at front

Glue L27 to L28

Add C03 to rear of K08

Close-up remainder of fuselage.

You may find that adding a spacer bar just below the engine doors on the wing section will help those doors into their groove in the fuselage and prevent a ridge, by widening the fuselage. After fitting L27 / L28 into the fuselage, you may want to try fitting the intakes before fitting K8 as it gives you more flex to ensure the fuselage and intakes follow the same curve.

Once the fuselage is joined, your next task is to sand the rears of I1 and I3 – the wing undersides - to reduce the rear thickness so that when the flaps and ailerons are added, there is no step on the underside. Some work is also required near the wingtips to allow the wings to sit together without a ridge.

All of the above will appear more obvious when you have the kit instructions and parts in front of you. I've no photographs to help as I don't usually have a need for them!

The rest of the build is pretty straightforward for the T.60, but the T.4(I) required some effort on the outriggers to get them to sit in the closed position. I think a lot of model manufacturers don't expect model makers to put their aircraft in flight mode, so items like this are often overlooked. The main gear doors also have a gap when closed, though you will need to fix this when the aircraft is parked, as they are usually closed and only the nose doors are open.

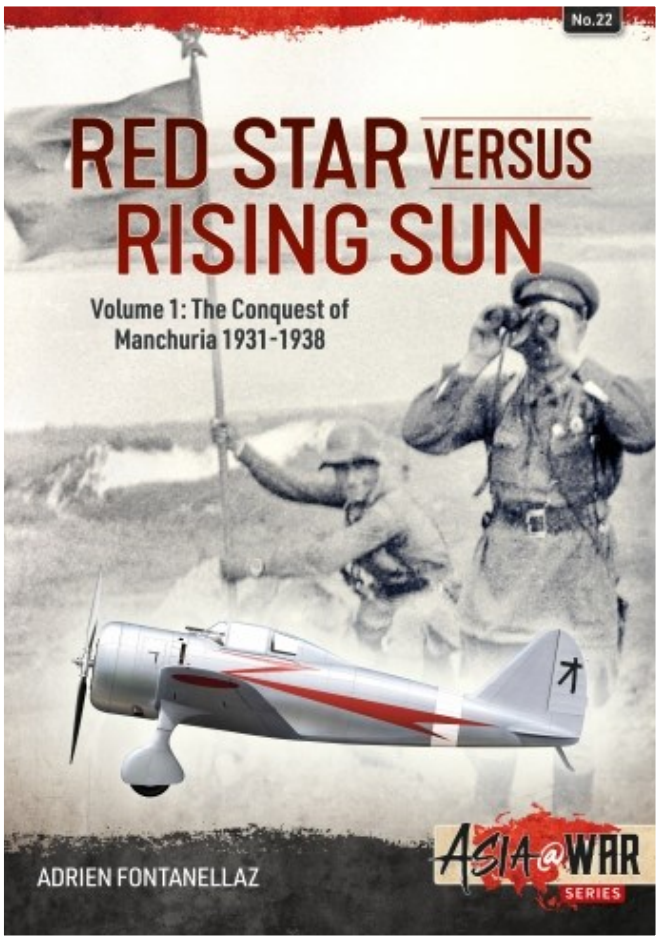
Both aircraft were brush painted with acrylics. You have a choice of schemes for the T.60 – the original gloss Extra Dark Sea Grey and gloss White or the later matt Dark Sea Grey and matt Light Aircraft Grey option. For the T.4(I) I have only seen photos of the two aircraft in Dark Sea Grey and Light Aircraft Grey, though IN655 has been painted in an all-over Dark Sea Grey (or near equivalent) in its museum incarnation. Both models are in the same scheme, but I used different paints on each, hence the colour differences. Best not open the can of worms as to which is the more accurate!

I used the Indian Navy decals from the Kinetic Sea Harrier FRS.1 kit together with some home-made ones printed on an inkjet. Model Alliance, Aeromaster and Cut-Then-Add have all done FRS.51 decals – the latter included decals for a T.4(I), IN655.

Harrier T.60 IN654 / 54

Harrier T.4(I) IN656 / 56

Book Review - Red Star versus Rising Sun Volumes 1 & 2

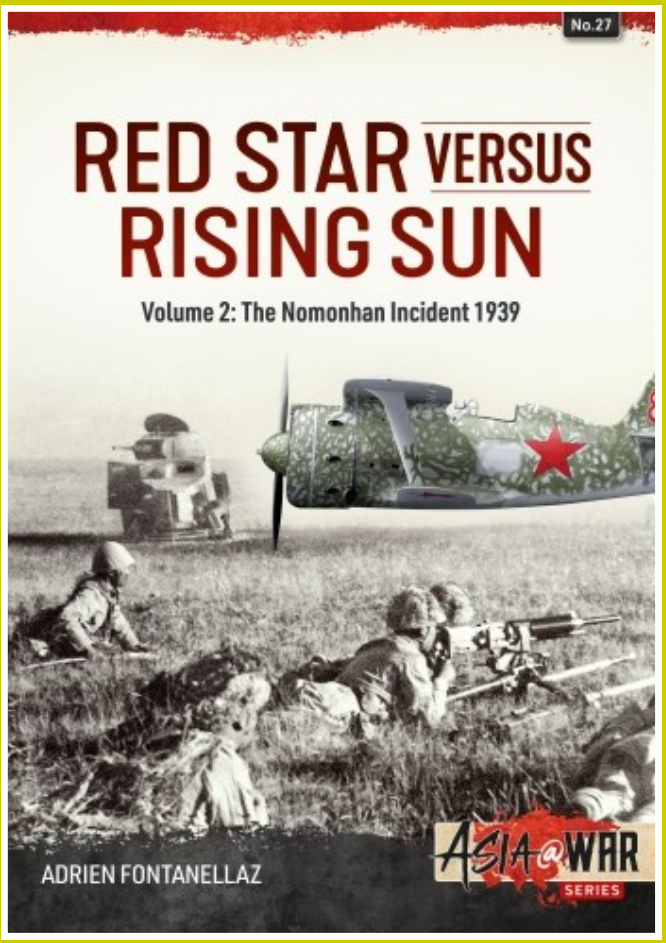


These 2 volumes (#22 and #27), from Helion's Asia@War series, and written by Swiss historian Adrien Fontanellaz, combine to tell the story of the Japanese conquest of Manchuria in 1931, and the many subsequent clashes with Soviet forces throughout the 1930s, leading up to the 'Nomonhan Incident' as it is known in Japan - or the Battle of Khalkhin Gol in the Soviet Union. Until the Battle of Kursk in 1943, this battle between the Soviet Union and Japan was the largest tank battle the world had ever seen.

Volume 1, subtitled 'The Conquest of Manchuria 1931-1938', begins by detailing how, by the second half of the 19th Century, Japan had begun to establish itself as an increasingly aggressive imperialist power, with the aim of expanding into neighbouring mainland Asia. Conflict in Korea, Formosa, the Boxer Rebellion and the Russo-Japanese War of 1904-1905 are all covered in the first chapter. This enables the reader to understand why it was not all that surprising that the Soviet Union and Japan, two expansionist powers who just happened to be close neighbours, butted heads in the Mongolian borderlands.

As already mentioned, Japan had clearly had an edge over Russia during the early part of the 20th century – it had decisively defeated Tsarist Russia in the Russo-Japanese war of 1905 (a conflict most memorable, perhaps, for the Russian Navy's folly of sailing its entire Baltic fleet around the globe only to be promptly sunk by the Japanese Navy within days of its arrival), and had occupied Vladivostock for several years during the Russian civil war.

We read how, by the 1930s, the Soviet Union under Stalin was a resurgent power, and had become a major regional rival to the Japanese. The Japanese High Command were particularly concerned about the threat Soviet submarines posed to Japanese shipping, and the ease with which Soviet bombers, operating out of Vladivostok, would be able to reach Tokyo. The assassination of the 'Old Marshal' Chang Tso-Lin in 1928 then leads into the so called 'Manchurian Incident' of 1931, which is the beginning of the main thrust of this volume. In this first book, there is very little of interest to the aviation enthusiast, as the majority of actions were conducted solely by land forces, although the colour plates include side profiles of three aircraft, one Japanese and two Russian, used during this period. The book is nevertheless a very worthwhile, if not essential, read in itself, especially if one wishes to understand the background and the context of the events which are dealt with in volume 2, titled 'The Nomonhan Incident 1939'.



This second Volume is, purely from an aviation viewpoint, the more interesting of the two books. We learn that, by the late 1930s, both Mongolia and bordering Manchuria (Manchukuo) were Soviet and Japanese puppet states.

The border between the two was hotly disputed. Japanese-backed Manchuria claimed that the border ran along the Khalkhin-Gol river, whereas the Soviet-backed Mongolians argued that the border actually ran just east of Nomonhan village, some 10 miles east of the river.

Although the two countries had previously fought some minor skirmishes (most notably at Changkufeng/Lake Khasan in 1938, a battle which resulted in more than 2,500 casualties on both sides - covered in Volume 1), the battle of Khalkin Gol was sparked when, on 11 May 1938, a small Mongolian cavalry united entered the disputed area in search of grazing for their horses. They were quickly given a bloody nose and expelled by a larger Manchurian unit but, within days, the Mongolians returned with greater support and forced the Manchurian forces to retreat.

The conflict slowly but gradually escalated until Soviet and Japanese forces were drawn into direct conflict. On 28 May Soviet forces surrounded and destroyed a Japanese reconnaissance unit. The Japanese unit, led by Lt Colonel Yaozo Azuma suffered 63% casualties

in total, losing 8 officers and 97 men, plus suffering 34 wounded.

A month of relative quiet followed this battle. But, instead of using the time to consider a peace deal, both sides redoubled their efforts to build up their forces in the region.

The quiet was shattered on 27 June by a daring Japanese air-raid on the Soviet air base at Tamsak-Bulak in Mongolia. The unprepared Soviets lost many planes on the ground, although once they got airborne they gave a good account of themselves. Their skill, however, could not prevent the Japanese pilots returning gloriously home, having destroyed twice as many Soviet planes as they had lost themselves.

Lt. Gen. Michitaro Komatsubara, a well-schooled officer, planned a devastating two-pronged assault that would encircle and destroy the Soviet armies and bring him a glorious victory. His Northern task force launched its first assault on 1st July. After easily crossing the Khalkhin Gol river, Japanese soldiers drove the Soviet forces from Baintsagan Hill and quickly began to advance southwards. The following day his Southern task force followed them with another massive assault. However, Komatsubara's soldiers were ill-prepared, and not able to take advantage of their early success. Poor logistical planning meant that their supply line across the river consisted of just one pontoon bridge.

Seizing their opportunity, the Soviets under General Zhukov quickly rallied 450 tanks for a daring counter-attack. Despite being entirely without infantry support, they attacked the Japanese task force on three sides, and very nearly encircled them.

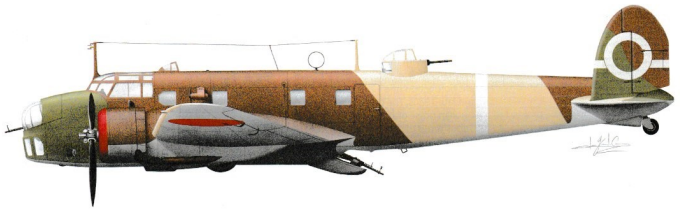
By 5 July, the battered Japanese Northern Taskforce had been forced back across the river. Following the failure of their first attack, the Japanese withdrew and planned their next move. Defeat was not an option for Komatsubara. After giving his soldiers a fortnight to recover, and restock their supplies, he conceived another assault plan – this one relying on brute force.

On 23 July, backed by a massive artillery bombardment, the Japanese threw two divisions of troops at the Soviet forces that had, by now, crossed the river and were defending the Kawatama bridge. Two days of fierce fighting resulted in some minor Japanese advances, but they were unable to break Soviet lines and reach the bridge. Despite thousands of casualties, the battle was effectively a stalemate.

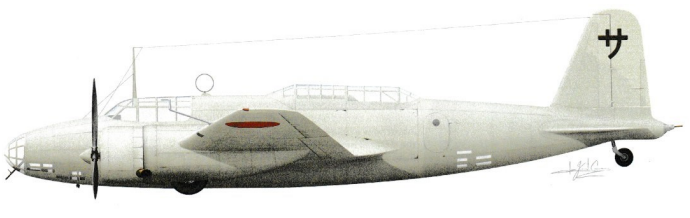
Unable to progress further, and rapidly running out of artillery supplies, the Japanese decided that discretion was the better part of valour, and disengaged to plan a third assault. Planning for this third Japanese assault went well, but the Soviets under Zhukov beat Lt Gen Komatsubara to the punch.

By August 20th, Zhukov had amassed a force of more than 50,000 men, 498 tanks and 250 planes. Matched against him was a similarly sized, but not well-armoured Japanese force, that had no idea the Soviet counter-attack was coming. A classic combined arms assault followed, as thousands of Soviet infantry attacked the Japanese centre, Soviet armour encircled the Japanese flanks, and the Soviet air-force and artillery pounded the Japanese from long-range.

By August 31st, the encircled Japanese force had been decimated and surrounded. A few Japanese units managed to break out of the encirclement, but those who remained followed Japanese martial tradition and refused to surrender.



A Fiat BR.20 of the 12th Hiko Sentai, 7th Hiko Dan at Nomonhan. Japan bought 72 of these bombers from Italy to make up for the delayed induction of the Mitsubishi Ki-21. None were shot down during the war with the USSR, but one was damaged beyond economic repair. (Artwork by Luca Canossa)



A Mitsubishi Ki-21 of the 61st Hiko Sentai, 9th Hiko Dan, at Nomonhan. These domestically produced bombers suited Japanese military philosophies of the time and came to be preferred over the Fiat. They were fast and could evade interception. The Japanese claimed no losses, but there are Soviet photos of a shot down Ki-21. (Artwork by Luca Canossa)

A Kawasaki Ki-32 light bomber of the 16th Hiko Sentai, 9th Hiko Dan. Due to their light handling, the Ki-32 was preferred by pilots over the similar Mitsubishi Ki-30. However, the inline engine frequently overheated and – due to its liquid cooling – was vulnerable to combat damage. (Artwork by Luca Canossa)

Poised to finish off the remnants of the Japanese forces, Zhukov's armies were ordered not to push home their tactical advantage. Instead, they were ordered to dig in and hold their position at Khalkhin Gol – the border they had previously claimed as theirs. A ceasefire was quickly agreed (talks are pictured above). Implemented on 16 September, it held until the Soviet Union invaded Japan at the end of the Second World War.

The battle of Khalkhin-Gol decisively showed the expansionist Japanese military that it was not a match for the Soviets – particularly while Japanese forces were still bogged down throughout China. The Soviets under Zhukov combined their forces to stunning effect, while Japanese tactics remained stuck in a pre-modern mindset that valued honour and personal bravery more highly on the battlefield than massed forces and armour.

When Hitler finally invaded the Soviet Union in 1941 the Japanese, although tempted to join the attack, remembered the lessons of Khalkhin Gol and decided to remain on the sidelines, ensuring that the stretched Soviet military could focus its forces on just one front. This, in turn, meant that Nazi Germany was forced to fight a four year war on two fronts – against the Soviets in the East, and the British and Americans in the West.

Chapters 4 and 5 of this second volume deal almost exclusively with the gradual build-up of air power by both sides in the region, with plenty of black and white photographs of many of the aircraft used in the conflict. These are supplemented by 4 pages of colour side profiles of Japanese and Soviet aircraft , which will be invaluable to modellers wishing to portray this period.

I can highly recommend this two-volume set to anyone interested in learning more about this largely-forgotten prelude to World War 2.

Steve Komor, August 2023

Airfix 1:72 DHC-2 Beaver – Vintage Classic (AX03017V)

I have not previously been attracted to taking on one of the kits in the Airfix Vintage Classic range, even though many of the models released so far do bring back happy memories of my childhood. I guess this is mainly due to my move into 1:48 scale but the recent release of the DHC-2 Beaver made me have a re-think. The reason for this was two-fold. Firstly, I remember the kit being a significant step up for Airfix in terms of detail when it was first released in 1971 and that it went together reasonably well. More importantly, I still clearly remember my late Father building one, to replicate an aircraft that he used to regularly fly in to service radio transmitters deep in the Malaysian jungle in the early 1970s. I still have his original model in storage as a reminder of the happy times we spent building models together at the dining room table.

So, I have departed from my normal 1:48 scale for this build article and have elected to build another Beaver, some 50 years after the first !. I want this to be a relatively quick build so I will not be doing much in the way of super detailing etc but I do want to make a reasonable job of it so will make some improvements along the way. In overall terms, this 52 year-old kit has stood the test of time pretty well. There is some flash present on some of the kit parts, which is not surprising given its vintage and it is, of course, festooned with rivets. The transparent parts are very thick when compared with present day kits but this is to be expected. The decals are replicas of the original schemes offered (one British AAC and a US Army example with floats) but, of course, are to modern day printing standards. I plan to do several DHC-2s over the next year or so, primarily in Asian Air Arm markings, including at least one VNAF example although for this article I am going to focus on the ROCAF example that is offered on the recently released Xtradecal Sheet, which was reviewed in the July 2023 (Issue 37) edition of our newsletter. This aircraft sports a rather sinister overall Black colour scheme with full colour National and Unit markings.

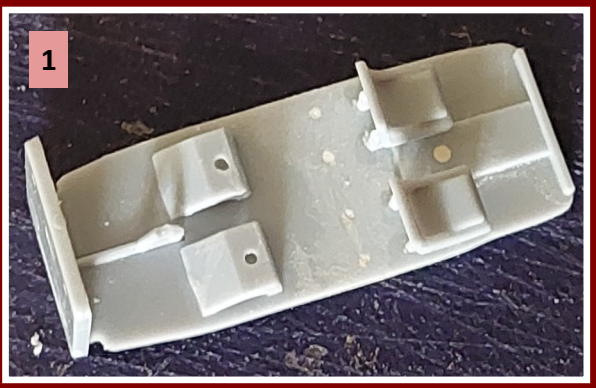
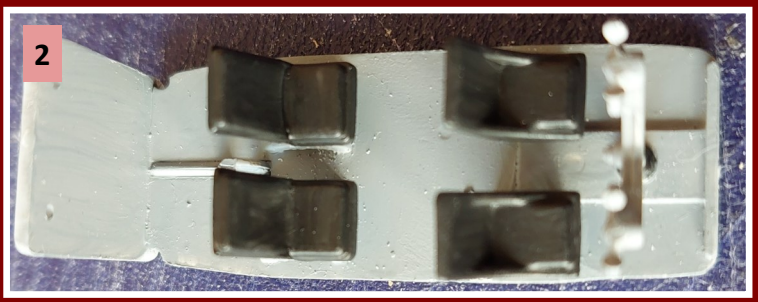


PHOTO 1 (unpainted cabin)

Typically, Stage 1 construction started with the cockpit and passenger/freight cabin. I had previously read on Britmodeller that, for some reason, the crew seats were mounted too far back in the cabin. Some suggested this was to accommodate the pilot figure that is included in the kit but it is clearly wrong. Having made further reference to photos of the cockpit on the internet, I have relocated the pilots seats and, of course, the final location for the control column, so that they are more in line with the cockpit doors and the instrument panel.

PHOTO 2 (Painted cabin)



Now mid-way through building up the cabin and cockpit interior. I have also moved the front row of passenger seats further forward. I have yet to add the rear set (which sits against the rear bulkhead) and will then add some masking tape seat belts and do a bit of weathering to finish off this particular section of the build. The instrument panel does include some reasonable detail, which I have picked up with a light dry-brushing of silver across the Matt Black background. This should be sufficient since little will be seen through the rather thick glazing.

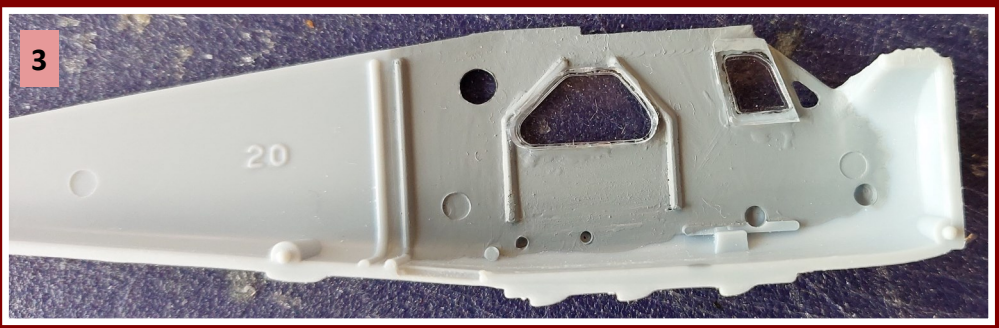


PHOTO 3 (Port fuselage – internal)

One of the cabin doors fitted very well while the other did not, so I have had to use a little filler. I also read a neat trick on Britmodeller about painting the window surrounds black before installing. I have also decided that I will use 'Glue 'n' Glaze for the smaller windows. This enabled me to remove the 'quarterlight' from the cockpit door window assembly, which allows the larger window to sit flush in the aperture. I will also use the glazing product for the 'porthole' on each fuselage half. The holes for the cabin access steps are also flashed over so make sure you check your references to see if your particular model features these. I did not bother to fill in the ejector marks on this occasion since very little will be seen once the cabin is buttoned up.

PHOTO 4 (Port fuselage – external)

External view showing some of the filling that has been necessary around the cabin door frame. The port fuselage does not suffer from the same issue. Note the drilled holes for the cabin footsteps.

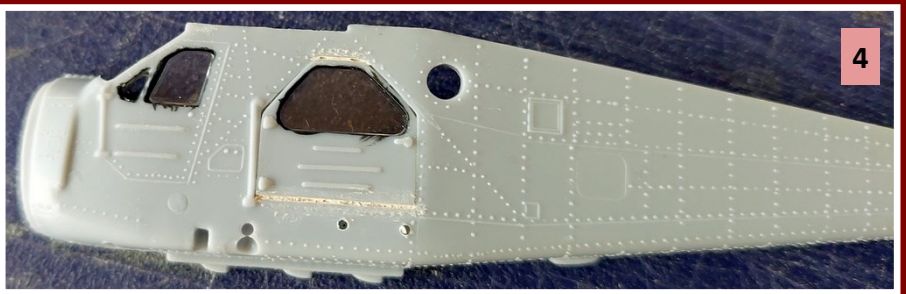
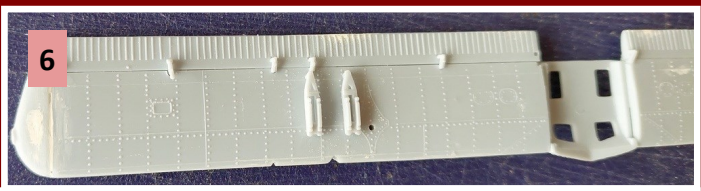
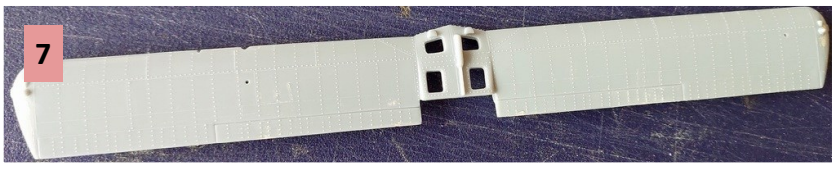


PHOTO 5 (Fin)

Some work needs to be done on the fin for the ROCAF variant of the DHC-2. The prominent round 'detail' is actually a sprue ejector mark so that will have to go. The pitot probe on the leading edge is only applicable to certain sub-variants and is not found on the ROCAF aircraft so will need to be removed.

PHOTO 6/7 (Main Wings)





While I waited for the cockpit/cabin to dry, I made a start on the wings. These definitely show their age, with some tricky sink marks to deal with on both the upper and lower wing tip surfaces and some equally difficult 'nicks' to tidy up on the trailing edges too. These are particularly difficult given the existing surface detail. I will be making at least one more of these kits and I think I will resort to removing all of the existing surface detail down to a minimum. It's not so critical for this model with the overall Black colour scheme.

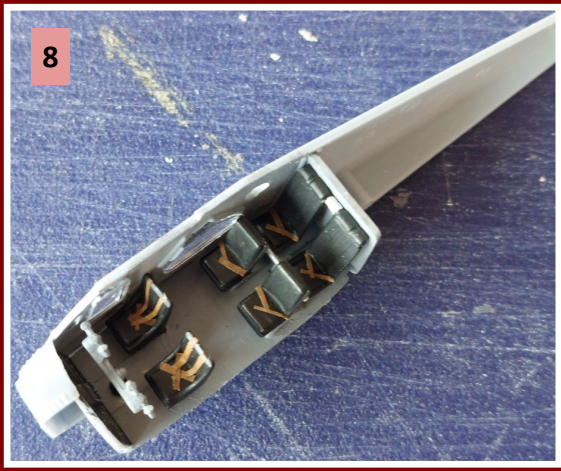
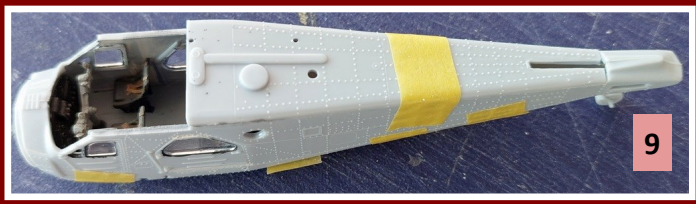


PHOTO 8 (Cockpit/Cabin – completed)

After leaving the cockpit/cabin to cure for a day, I then fashioned some rudimentary seat belts from Tamiya tape to dress up the cabin, sealing them with clear varnish. They are enough to give an impression through the rather thick transparencies. A very light wash will unify the area and provide some highlights, especially on the control column which actually has some quite nice detail taking into consideration its age.

PHOTO 9 (Completed fuselage section)



The fuselage is now starting to come together. At this stage, I was quite impressed at how little filler was needed on a kit that is 50+ years old. I will be deviating from the kit instructions with the next stage, and fitting the main undercarriage legs before offering up the main wing.

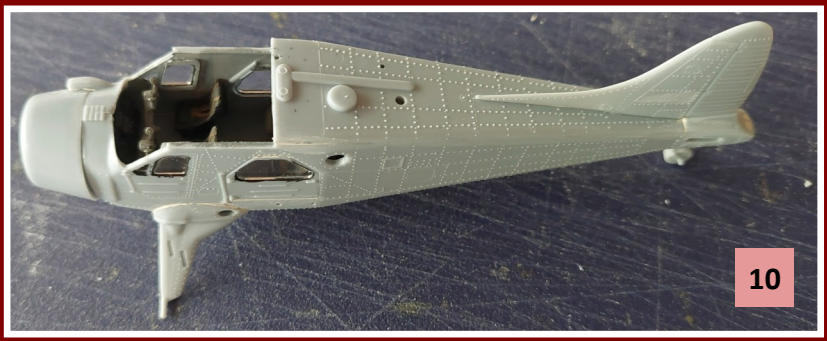


PHOTO 10 (Completed fuselage/cowling/undercarriage) (Upper view)

After another day of curing, construction is moving along quite nicely now. I have now thinned out the rear portion of the engine cowling before mounting it and also managed to fit the main undercarriage legs and complete the first stage of filling and sanding. I continue to be impressed with how little filler I have had to use on this kit. Anyone contemplating this kit should note that I have detected a few errors in the instruction sheet for this particular issue (2023 version). Stage 5 suggests fitting Part 57 to the rear surfaces of the engine cowling; fortunately there is no location for this on the lower portion of the cowling. The fairing is actually fitted to the lower forward fuselage and there is a locating groove to facilitate this. I have jumped a little bit ahead and also tidied up the cabin footsteps (Parts 89/90), which contained a lot of flash. When I dry-fitted one it did not look right. I believe Airfix have transposed the part numbers at Stage 7...something to watch out for. I will highlight this again later in the build when I have actually fitted them. As previously noted, and as can be seen from the accompanying photographs, the kit has a lot of rivet detail. This included a row of rivets that ran down the centre of the upper fuselage and fouled the fin fillet so I removed these with a micro chisel. The fit of the fin is now much improved but will still need a bit of filler.

PHOTO 11 (Completed airframe – Wings/tailplanes/fin)

I dry fitted the main wing structure to check fit. Two small issues; the windscreen does not sit flush with the fuselage frame and benefits from the addition of two plasticard shims to the leading edge of the cockpit sides, which helped to close up the gap. I will be able to fill the remainder of the gap with 'glue n' glaze' to seal up the cockpit. The main wing assembly fits pretty well but also benefits from the addition of a couple of plasticard shims where it connects with the upper fuselage, which removes the small 'step' behind the cabin roof windows. I also managed to fit the steps to the main undercarriage without losing any of them to the carpet monster too.

As I put this assembly aside to dry and cure overnight, I was able to turn my attention to cleaning up some of the remaining parts. The mainwheels in my particular kit suffered from a considerable amount of flash and some seam lines, which also feature on the main wing struts (Parts 84/85). I also tidied up the tailplanes in preparation for their fitment. There were some prominent seams to deal with on the leading edges and one of the parts needed a plasticard shim added to the locating tab to help secure it to the fuselage.

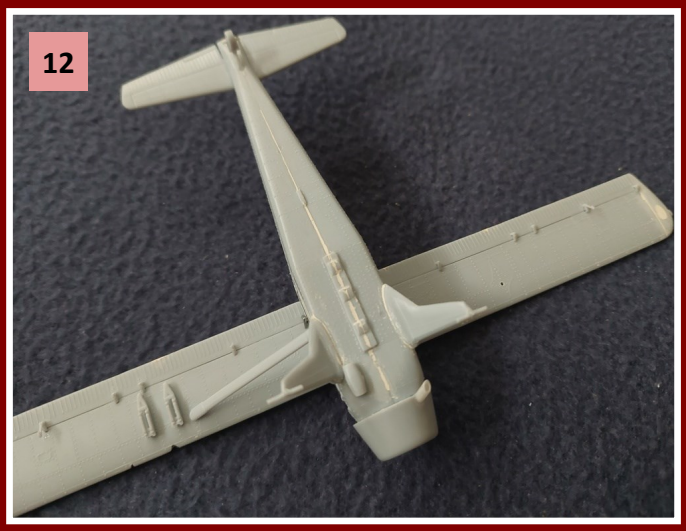


PHOTO 12 (Completed airframe – underside view)

This has been a trouble-free kit in terms of overall construction so far, with very few vices. The wing struts are, however, one area where additional care is required to obtain a good fit. The bottom end of the strut is meant to plug into an aperture in the main undercarriage fairing but I was reluctant to open this up too much for fear of damaging the parts. As a result the wing strut is a fraction too long and fitting it will result in some unsightly bowing. I tackled this by carefully cutting away a very small amount of plastic and test fitting the part on a regular basis, taking care not to cut away too much of the reinforcement sleeve on the strut that is a prominent feature of the prototype. Note too the position of the fairing under the nose and the revised exhaust, which is a feature of ROCAF DHC-2 Beavers, and has been fashioned from stock plastic tube. This image also shows how little filler I needed for the lower fuselage, wing/fuselage join and main undercarriage legs.

PHOTOS 13-14 (Painting Stage)

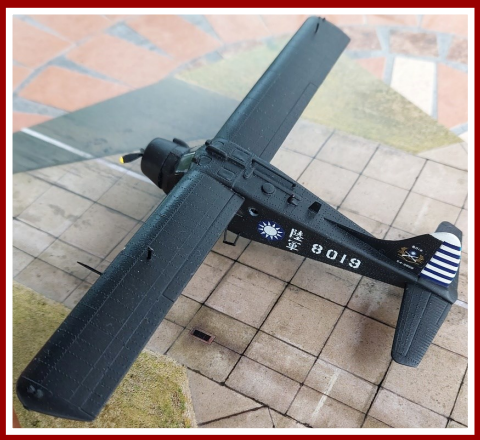
The model was now ready for painting. I sourced a canopy/window mask set from Peewit Models (Ref No. PEE72316) which was very easy to apply and then began with painting the rudder surfaces, which were finished in Gloss White. After masking off the rudder with standard Tamiya tape, I applied several light coats of Vallejo Model Color Glossy Black (Ref No. 70.861) through my trusty Harder-Steenbeck Evolution Silverline Airbrush until I had built up a nice deep gloss finish to aid with the application of the decals. I left the paint to harden for a day or so before tackling the decal application process, which proved to be relatively simple. The ROCAF DHC-2 Beavers appeared to operate with a minimum of stencilling and maintenance markings, which normally take time to apply. As a result, I managed to apply the Xtradecal markings over a couple of hours. This is the first time in a while that I have used Xtradecal decals, and they do appear to have become much thinner, so care will need to be taken with their application since they also appear to be quite fragile. I tend to use the Microsol/set system for decal application but on this occasion I used these products warily for fear of damage to the actual decals. The colour density of these decals is quite impressive; my concerns that the black colour scheme would 'bleed' through the white codes/characters were unfounded. The only issue, which is quite common with rudder striping/markings is that the dark blue stripes did not meet up over the trailing edges of the rudder and required the application of colour to blend them in. Vallejo Model Air (Ref No. 71.090 Deep Sky) is a good match for the Xtradecal blue colour.

PHOTOS 15-16

Final stages, with the light application of a matt varnish. Despite the use of the MicroSol/Set system on the decals, I discovered that the prominent riveting had created some minor silvering with one or two decals. Fortunately, this appeared to be limited mainly to the large '8019' numerals and the roundels on the fuselage, which I was able to touch up with gloss black and a very fine brush, before applying another short burst of varnish. As previously noted, I had omitted some of the clear parts from the initial construction, so now was the time to use canopy glue to fill in the small quarterlights on the cockpit doors and the two 'portholes' on the mid-fuselage section. Final assembly added the smaller airframe parts including the cabin access steps, pitot

probe, wheels, and propeller. I must say that the fit of parts on this 50+ year old kit is remarkable; one of the only exceptions being the small landing light that does not seat well in the wing leading edge. This project took me approximately 6 weeks with intervals to complete which is a bit of a record for me. Will I build another one?. The answer is an unequivocal 'Yes'….at least three more, including Laotian and South Vietnamese examples together with a more accurate version of the British Army Air Corps machine that instigated my affection for this most charming of Vintage Classics from Airfix.

These three views show the completed model



Mark Attrill,
August 2023

This Beaver, now on display in the China Revolutionary and Military Museum, Beijing, was flown by Major Li Dawei when he defected from Taiwan on April 22nd 1983.

Hi-Decal Line Model Decals – McDD F-4 Phantom II re-releases (HDL48-025/72-055 – McDD F-4D Phantom II & HDL48-027/72-057)

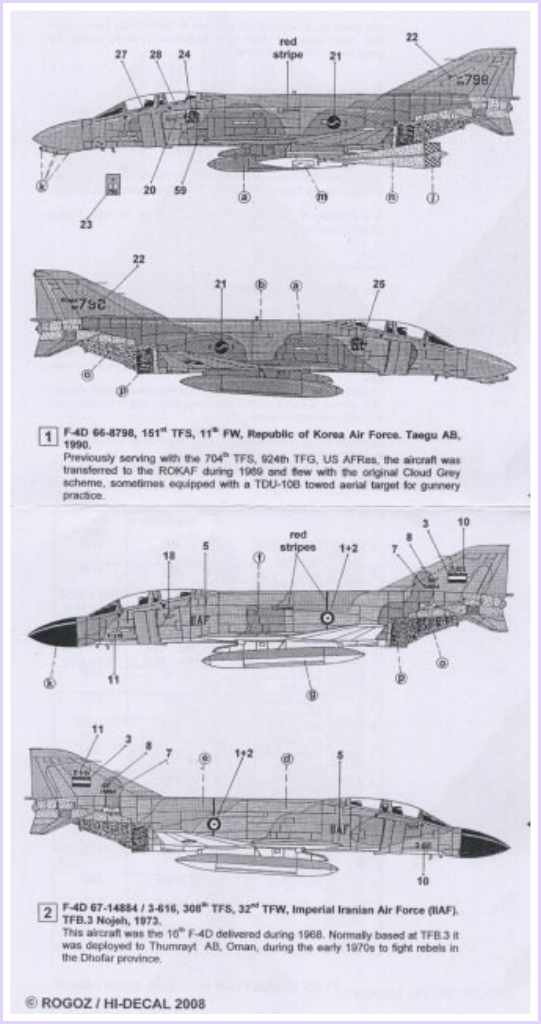
Diego Rogoz, a key supporter and member of the Asian Air Arms SIG and the proprietor of Hi-Decal Line Decals, has recently passed a couple of new decal sheets to me, which may be of interest to modellers of the McDonnell-Douglas F-4 Phantom in Asian Air Arm Service. The two sheets are, in actual fact, re-issues of long out-of-print sheets but are very timely, given the raft of new Phantom kits from the likes of Finemolds, Meng and Zoukei-Mura in recent times. The first sheet covers the earlier McDD F-4D Phantom and includes seven examples, representing three different air arms. Not surprisingly there are four options for aircraft operated by the USAF Reserve and Air National Guard, which operated the aircraft extensively throughout the USA, Europe and the Far East in the 1970s-80s. The three 'export' options offered on this sheet cover those aircraft operated by Iran and the Republic of Korea (South). Iran became one of the earliest export customers for the F-4, with the Imperial Iranian Air Force (IIAF) accepting its first examples in the late 1960s with its successor, the Islamic Republic of Iran Air Force (IRIAF) still operating the type in 2023 !. The IIAF F-4D featured in this sheet was the 16th such aircraft delivered in 1968 but portrayed while operating in support of Oman in the early 1970s. The IRIAF example is for one of the four F-4Ds that were equipped with a RHAW system in the nose radome. Both Iranian examples sport the so-called 'Asia Minor' three-colour camouflage scheme over light grey, with all of the appropriate national markings and special-to-type stencilling included ion the decal sheet. The third Asian example is for an ex-USAF Reserve (AFRes) aircraft that was transferred to the ROKAF in the late 1980s, and as operated by the 151st Tactical Fighter Squadron. As an ex-AFRes aircraft, this example sports the original and attractive 'Cloud Grey' colour scheme.

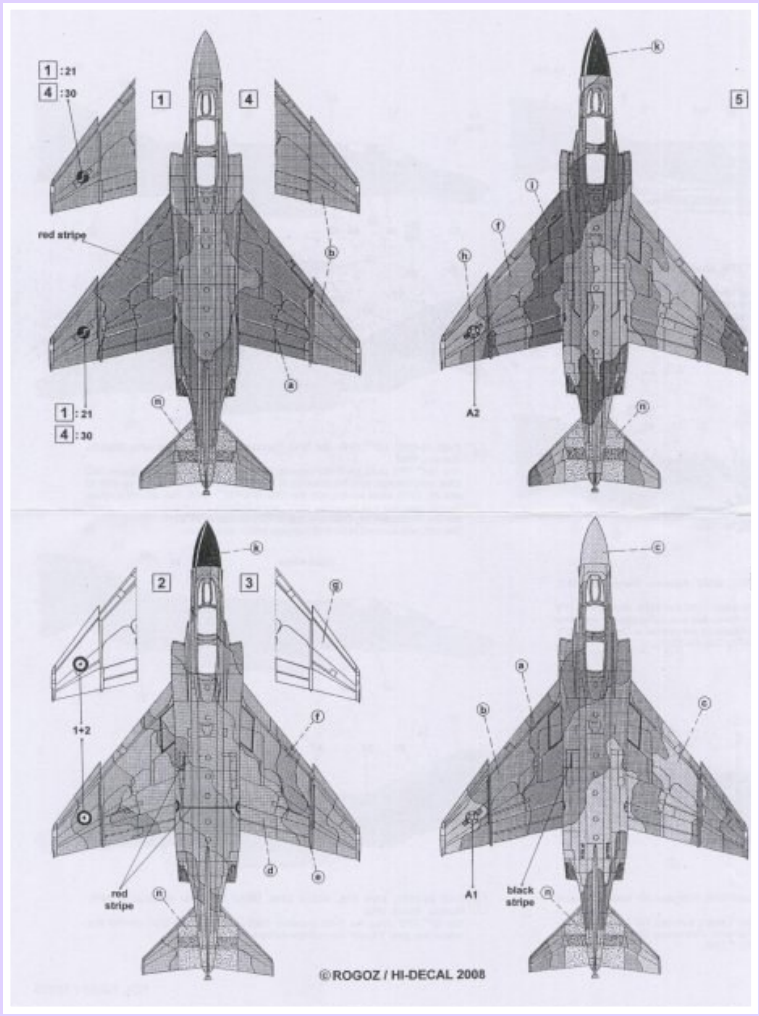
Reference No	Subject	Scale
HDL48-025	McDonnell-Douglas F-4D Phantom II	1:48
HDL72-055	McDonnell-Douglas F-4D Phantom II	1:72
HDL48-027	McDonnell-Douglas F-4E/RF-4 Phantom II	1:48
HDL72-057	McDonnell-Douglas F-4E/RF-4 Phantom II	1:72

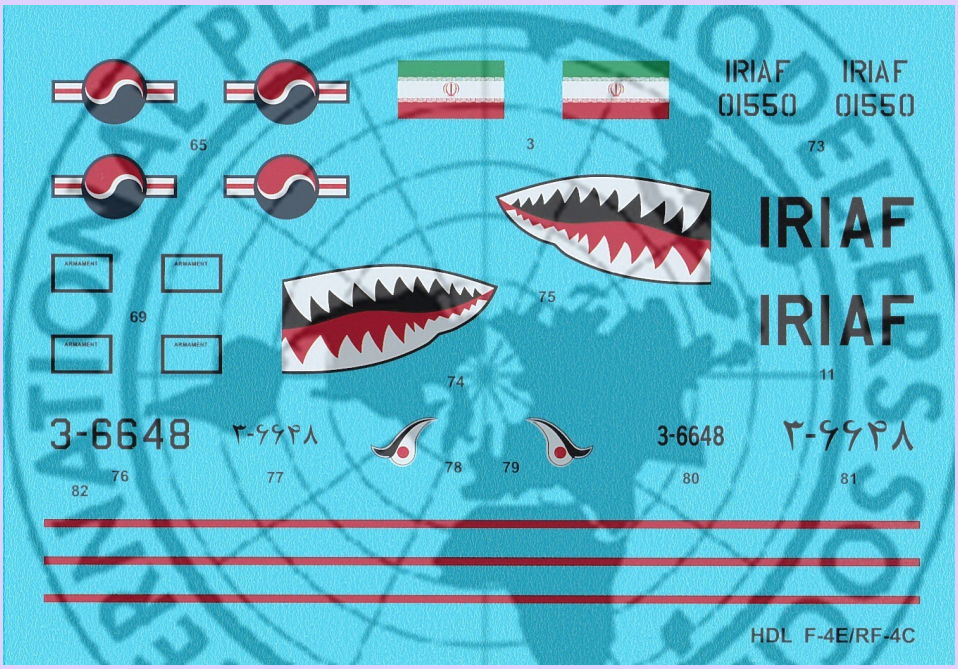
The second decal sheet covers the later McDonnell-Douglas F-4E Phantom and reconnaissance optimised RF-4C variant, with eight options again covering three air arms. This second sheet is more heavily weighted towards the Asian Air Arms with only one AFRes scheme provided. There are no less than four different Iranian F-4Es, including an early IIAF example and three sporting IRIAF markings. All of the options are veterans of the extended Iran-Iraq War of the 1980s, including three 'MiG Killers' and/or TISEO equipped aircraft involved in maritime attack operations. All of the Iranian options are for aircraft in the traditional 'Asia-Minor' camouflage scheme applied to Iranian aircraft in the 1970-80s with one aircraft also sporting some highly attractive and relatively rare 'sharkmouth' markings. The three Korean aircraft cover two different variants and three different colour schemes. The first is a TISEO equipped new-build F-4E, operated by the 152nd TFS from Daugu AB in 1980. The second option is for another F-4E, which was previously operated by the USAF from Osan AB but was subsequently transferred to the ROKAF in the late 1990s. As a result this aircraft sports an unusual USAF two-tone grey camouflage scheme, as operated by the 156th Tactical Fighter Squadron from Suwon AB. Last but not least is a relatively rare McDD RF-4C reconnaissance variant that had been previously operated by the USAF prior to transfer to the 131st TRS at Suwon AB in 2003. This particular aircraft is presented in the standard USAF 'Hill Grey' two-tone grey camouflage scheme with high visibility national and unit markings.

As previously stated, the Hi-Decal Line packaging is not the most sophisticated on offer among aftermarket decal manufacturers, but this approach is reflected in the very reasonable price of these decals, and the most important element, the actual decals, are of a very high quality with excellent colour density and register. The decals are thin and extremely sharp so that under magnification even the small text is distinct. All of the sheets featured here include very comprehensive sets of national markings, serial and codes and the majority of special-to-type maintenance and stencilling markings found on each individual aircraft. Each set of decals includes a very comprehensive set of decal placement Instructions (DPIs), which are very well laid out and, in most cases, include port/starboard and top/bottom views for each subject featured. There is an extremely useful paint cross reference chart included, which provides Humbrol and Model Master paint references along with the inclusion of FS numbers (where applicable), which should aid those modellers unable to source the aforementioned paints or who have a preference for another brand or type of paint. The DPIs also provide a list of recommended kits for each subject, in each scale, although I suspect the majority of modellers will want to use the more modern kits now available on the market. There are also

lists of some book/periodical references to aid with the completion of a chosen project. This latter point is particularly important, and leads me to the one minor reservation I have with the Hi-Decal Line range, namely the lack of colour found in the DPIs. The majority of decal options are for highly colourful and interesting subjects, and it does seem a pity that they cannot be visualised in full colour through the medium of the instructions, although it is appreciated that this would ultimately add to the overall cost of the decal sheets.







Notwithstanding this minor reservation, I would highly recommend this decal range to those with an interest in Asian Arm Arms. Diego is passionate about the accuracy of his decal sheets and this is reflected in both the frequency with which he produces new sheets and his periodic re-releases of older issues when new information comes to light, as is the case with these re-released McDonnell-Douglas DD F-4 Phantom sheets.

Mark ATTRILL – August 2023

Shenyang J-8/ F-8 II "Finback"

Development of the J-8 started way back in 1964. The first prototype resembled a larger MiG-21 / J-7 with a large nose intake and two engines. However there were many development problems and it did not meet requirements. Only about 100 first generation J -8 "Finback A" were manufactured up to 1987. In 1980 there was a big redesign with two intakes and large radar nose, this being the J-8 II. It featured area ruling on the fuselage and was in fact a new design. A large new Type 208 radar was fitted in the nose. One 23 mm Type 23-3 twin-barrel cannon in an under-fuselage pack was fitted immediately aft of the nosewheel doors. Pylons are fitted below the delta wing, capable of carrying various stores and fuel tanks. First flight was June 1984 and NATO calls it "Finback-B" with the J-8B being an all weather interceptor. Max speed is claimed to be about MACH 2.2 but this seems a bit a too high...

The J-8D was an interceptor which could be refuelled in the air. It carried PL-8 air-to-air missiles and, in a ground attack role, low drag bombs. The most recent version was the J-8F with bWp-13B engines, a new Type 1492 radar. It could fire the PL-12 (SD-10) active homing air-to-air missile. First flight of the J-8F was in 2000. The JZ-8F is a reconnaissance version. The J-8H/ J-8G is a modernized version from 2002, with unknown radar, capable of firing PL-11 AAM missiles, laser bombs and YJ-91 anti-radar missiles.

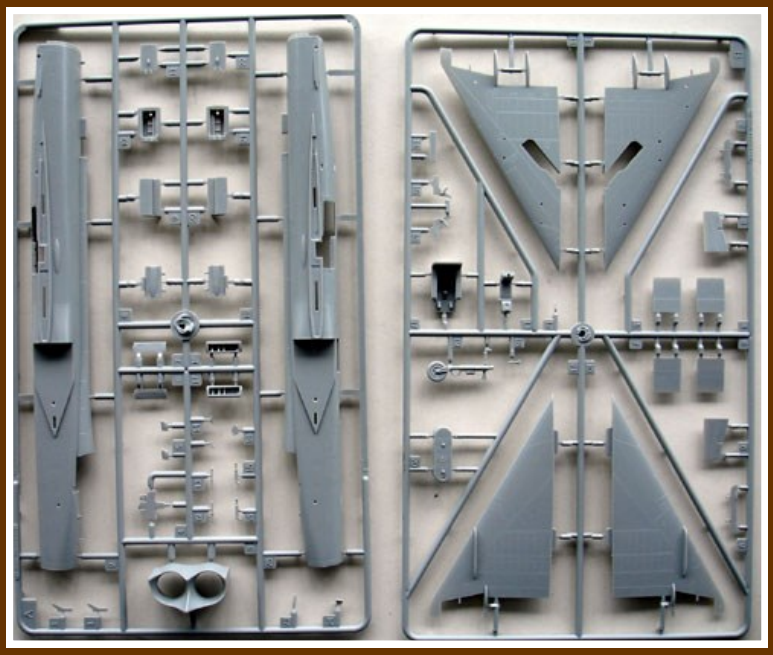
It appears that in 1995 some 100 "Finbacks" were operational and in 2010 still some 300 modern J-8 are active in the PLAAF. It is also operated by the Chinese naval aviation (PLAN).

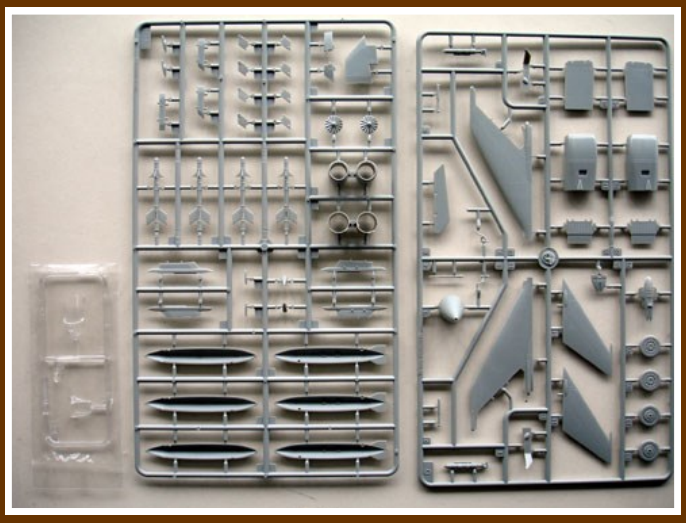
The **Trumpeter 1/72 kit #01610** has about 120 parts which are crisp, with fine recessed panel lines. It represents the F-8 II type. Decals are provided for Chinese planes with options for several red nose numbers. Instructions are clear but with some "vague" colours, the overall plane being white.

At 1/72 Scale the length is 295mm and wingspan 130mm, and the Trumpeter kit matches with these figures.

Accuracy seems OK, which indicates Trumpeter had access to a real plane. Detailing is as can be expected for a kit at this scale, not exceptional but with good undercarriage, panels and exhaust pipes which are of enough depth. You may add some extra details in the cockpit area. Stores are fuel tanks and Chinese type PL-8? missiles, indicating this to be a model of the J-8D. The plane is rather "clean".

The kit was made straight out of the box. Only limited amounts of putty filler were needed, but nothing uncommon for the average modeller.





The model was assembled and sprayed light grey overall to check for any surface imperfections. After some minor correction with putty, it was given a matt white and than a gloss white coat with my Badger 150 airbrush. The exhaust area was given a coat of metallic. The nose, fin leading edge and gear wheel hubs were painted green. The nose wheel leg has some blue areas.

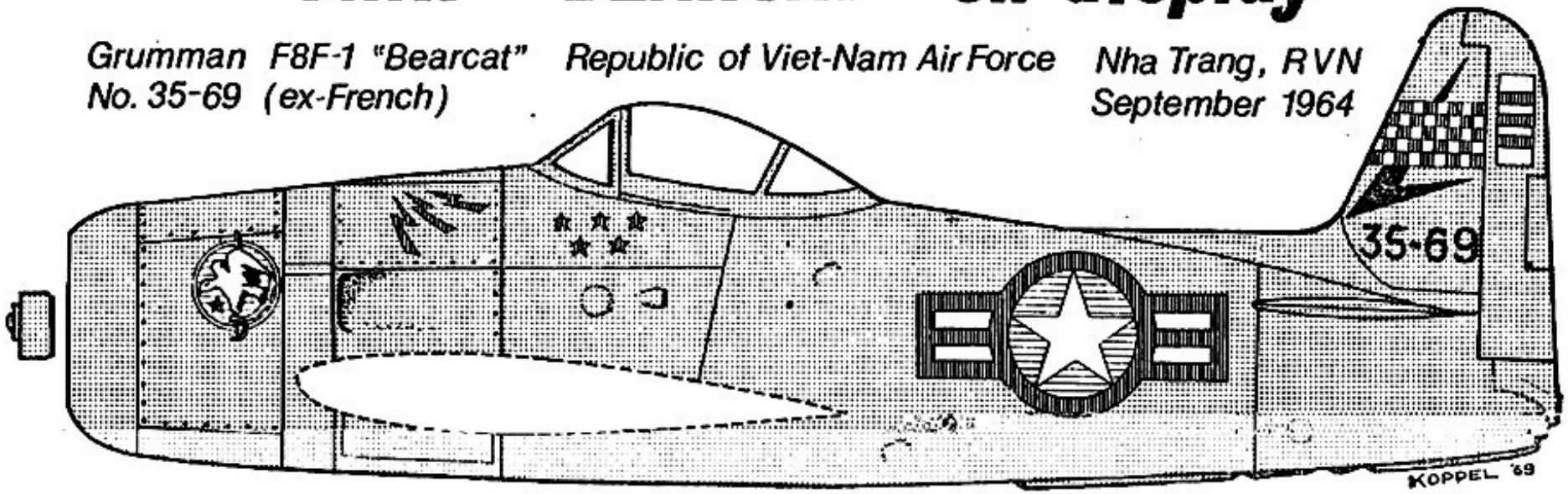
Decals are very nice, although I feel they may be a bit oversize, especially the special markings. Application of the decals went OK. The cockpit hood was set open and the model was ready.

Meindert de Vreeze

VNAF "BEARCAT" on display

Small Air Forces Observer Sept. 1975

Grumman F8F-1 "Bearcat" Republic of Viet-Nam Air Force Nha Trang, RVN
No. 35-69 (ex-French) September 1964



Cowl Design:

Yellow eagle with black/dark brown(!) detail and shadows, on light blue disc with white surround. Sword in white and yellow (black & white handle). Yellow star with black/dark brown (!) shadow.

National Insignia:

Note disproportionately large surround and bars [see additional note on 2nd page]; Light Blue field for star.

Natural metal overall, no anti-glare panel;
'35-69' in black on fin;
Red and white checkerboard superimposed on black 'arrow' motif;
Five red stars under cockpit canopy;
Three red lightning flashes forward of cockpit;
Standard VNAF fin flash on rudder [additional colours on 3/4 perspective view].

LIGHT BLUE
YELLOW
WHITE
RED
NATURAL METAL
BLACK (exc. emblem?)

The three basic drawings and copy were sent to IPMS USA Quarterly in 1969 (supplemented by later info.) - but not used by Editors Kelly, Beaman, Fink or Maas. Therefore, SAFCH regained use of the material, and it is being used here for the first time.
– Ted Koppel (4/75)

–sato

53

VNAF "Bearcat"

(CONTINUED)

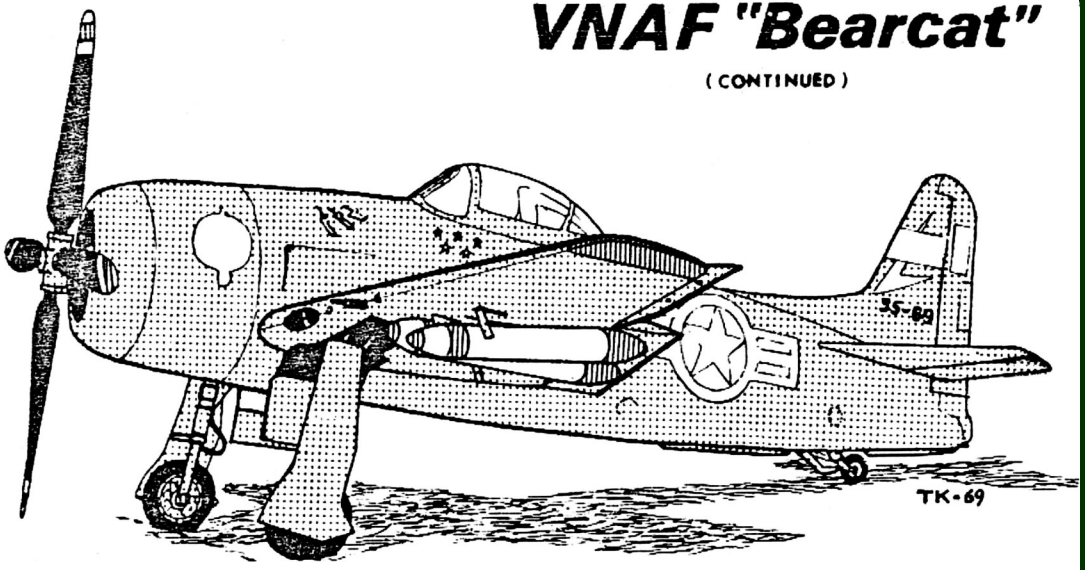
Flat black prop, with white-red-white tips, and natural metal hub;

Red wingtip (colour does NOT extend to flaps);

No underwing insignia on port side;

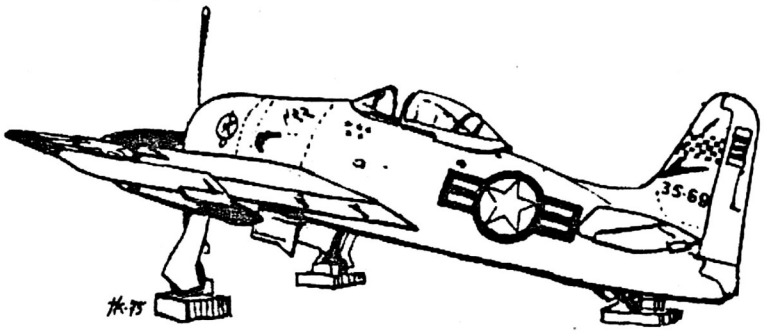
Underwing stores are white, with red tips and band;

NOTE - yellow area on landing gear door, and red wheel hub.



(subsequent information)

In 1971, Volume 4, No.1 issue of 'Air Combat 1939-1945' featured a photo of this aircraft, taken by George E. Poling in August 1966, on page 26. He gave the location as Long-Van Air Base (in Nha Trang), and the view - roughly sketched below - gave indications about further markings:



A. The national insignia on the wings, apparently the same size as on the fuselage, is on the upper port wing and seems to be touching the red tip.

B. The rear surface of the prop blades has yellow tips, perhaps ½ the size of the front stripes.

C. A better view of the fuselage insignia shows the bars to be slightly longer, which would extend the entire marking a bit further forward.

In a future series, it is hoped to show more accurate proportions to this and other national insignia worldwide, as well as variations that have appeared in print over the years, and some that haven't.

Secondly, some uniform insignia publications and actual samples of cloth emblems located later showed the cowling design to belong to the VNAF Training Centre. As can be seen from the *greatly* simplified sketches at right, several variations have existed through the years, although the basic colours have remained the same. This includes **only BROWN** tones for the shadows and details (various shield borders and letters are in white).

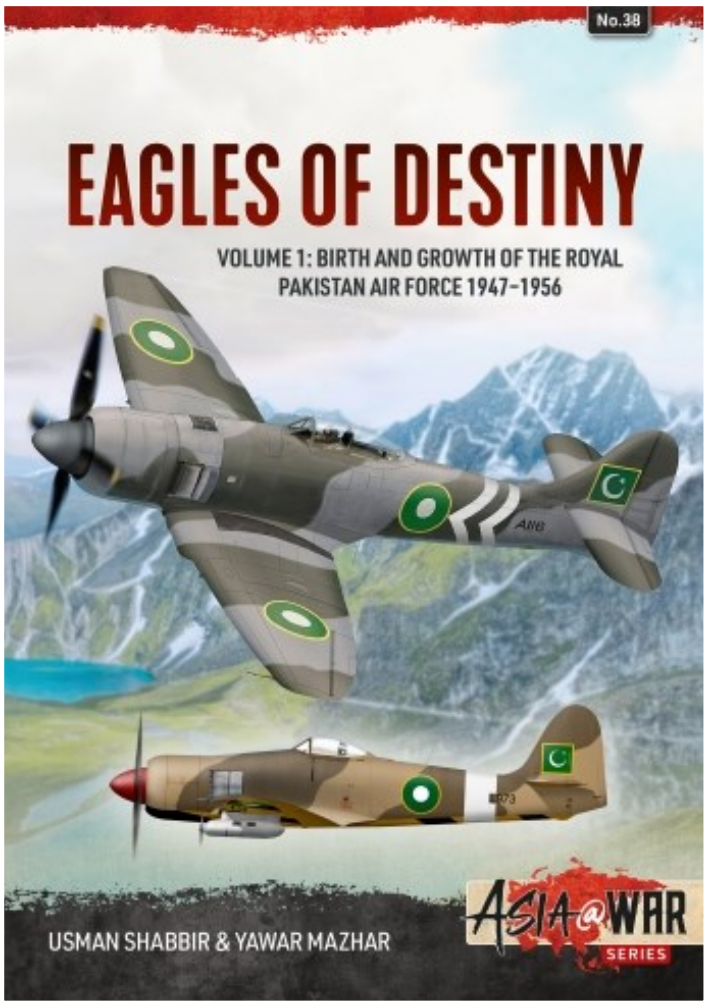
(The initials TT HL KQ stand for TRUNG-TAM HUAN-LUYEN KHONG-QUAN, or Air Force Training Centre.)

Postscript

Nha Trang, on the central coast, was taken over by North Vietnamese forces at the start of April 1975. By the end of the month, most of the rest of South Vietnam had capitulated, with only a few stubborn pockets of resistance. [It is interesting to note that close to 150 VNAF aircraft managed to escape to other countries.]

"LA GUERRE EST FINI".

Ted Koppel, **SAFO**

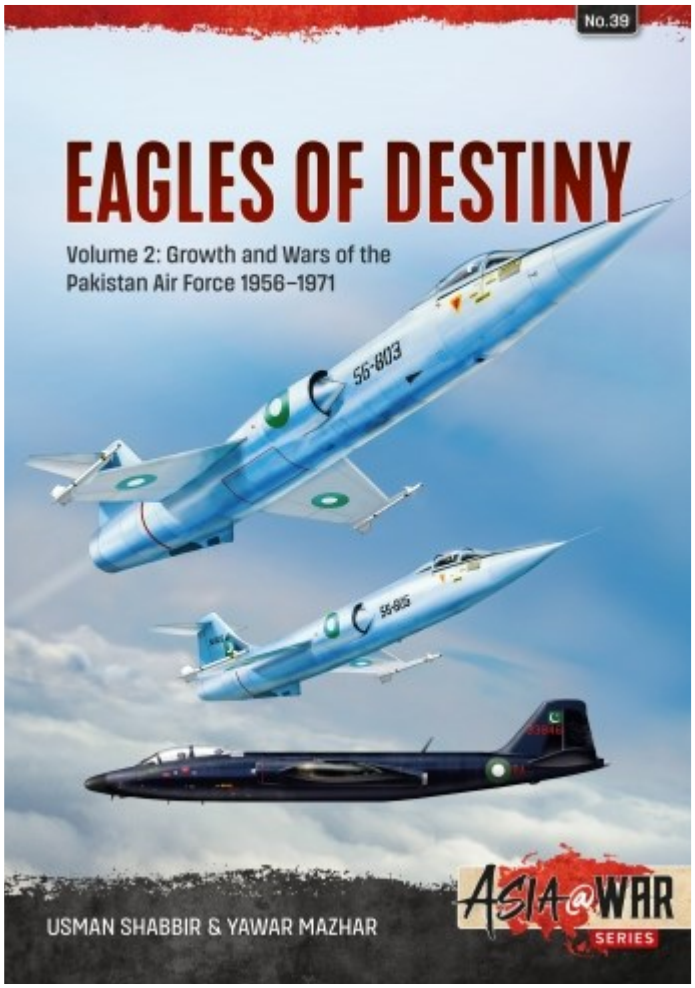


The recent holiday season here in Europe allowed me the opportunity to catch up on some reading, which included these two volumes in the Asia@War series which had been kindly supplied by long term AAA SIG member Tom Cooper of Helion Books. As many of you will recall, the Commonwealth Air Forces are a particular interest of mine, and coincidentally I have been focusing quite a bit on the Pakistan Air Force this year, so I was delighted to receive these two titles outlining the birth, early expansion, and combat history of this Air Arm during its first twenty-four years of existence. It is a subject that has been reasonably well covered in the past, but it was immediately clear to me that these two books would provide a wealth of new and interesting information, and I was not to be disappointed.

In keeping with the editorial style adopted by Helion for the **@War** series, the authors initially provide a very useful 'scene setter' with an overview of the geo-political situation leading up to the creation

of Pakistan in the late 1940s, together with a brief history of the activities of the Indian Air Force during the Second World War, and describing the challenges associated with organising and equipping two new Air Arms following the partition, establishment and independence of India and Pakistan in the immediate Post-WWII era. Since during the World War II era, the Indian Air Force had operated under the auspices of the Royal Air Force, it was quite understandable that the embryonic Royal Pakistan Air Force, as it was initially known, would be largely equipped with ex-RAF aircraft types, and that the senior leadership would originate from that service too. The early chapters in Volume 1 deal with the challenges that the new air arm faced in setting itself up against a complicated political and security related backdrop fuelled by hostility with its neighbour, India. The text is enriched with some lengthy and interesting testimonials from veterans and many previously unpublished photographs. In time the Hawker Tempests [which had initially equipped the RPAF] gave way to the more capable Hawker Sea Fury before the RPAF entered the jet age in 1951 with the controversial acquisition of the Supermarine Attacker FB.2, which did not enjoy much success in Pakistan and proved to be unpopular with pilots.

Throughout the early 1950s, the British Government and Royal Air Force continued to heavily influence the development of the RPAF , using the embryonic Air Arm as a vehicle for promoting sales, with the British aviation industry still wrestling with the Post-War effects of aircraft design and production. This included the sale of well over seventy examples of the Bristol 170 Superfreighter to the RPAF, which largely outnumbered the front-line combat aircraft strength at the time. Nevertheless, the RPAF sought out some ingenious uses for their large fleet of transport aircraft, arming some of them for bombing operations and converting others for a whole range of training missions. There are some fascinating insights into these early operations, again highlighted with some evocative anecdotal evidence, and I note that another of our SIG members, Franek Grabowski, a well-known researcher of the RPAF, has also contributed to this volume.



Volume 2 offers a neat segue into the transformation of the Royal Pakistan Air Force into a more modern Air Arm that dropped the 'Royal' prefix and enjoyed new leadership with the appointment of its first Pakistani Commander-in-Chief. These events occurred in early 1956, by which time Pakistan had also signed a Mutual Defence Assistance Program (MDAP) with the United States of America, which was now showing renewed interest in the region to contain the threats of communism. This new relationship heavily influenced the further growth and transformation of the PAF over the next ten years, and prepared it for the challenges that lay ahead during two wars with India in 1965 and 1971. The Lockheed T-33A Shooting Star, North American F-86 Sabre and F-104 Starfighter were all key elements of the PAF's growth in capability, and the book features an in-depth look at their introduction to service and early use, leading up to their employment in the war of 1965. Once again, a considerable amount of anecdotal evidence from veterans of this first air war for Pakistan lend colour to the narrative. The Dassault Mirage III and Martin B-57 derivative of the EE/BAC Canberra also feature along with several of the important transport and training types that provided support to the PAF and the other branches of the Armed Forces. The PAF's efforts to diversify its procurement programmes is also amply illustrated with detailed references to its acquisition of the Chinese-licence built Shengyang F-6 (Mikoyan MiG-19), which saw much success during the subsequent war with India in 1971, with which this volume closes.

These two volumes provide a liberal and extremely helpful number of maps and tables to assist the reader with referencing the complexity of the subject, with numerous references to bases and equipment. The authors have done an admirable job with sourcing and including many previously unpublished photographic material, all of which really helps the reader to understand the challenges faced not only by the aircrew, but also by the groundcrew and maintenance staff that operated in difficult climatic and often hostile environments. It should come as no surprise to learn that where these books really score heavily for this reviewer is in the presentation of its illustrations. For the modeller and aviation researcher in particular, the highlight of the two volumes is the inclusion of an excellent selection of aircraft Colour Side Profiles (CSP) by Tom Cooper, Luca Canossa, Peter Penev and Goran Sudar which cover no less than 18 pages across the two volumes. Each profile quickly dispels the impression that most aircraft types in the RPAF/PAF sported very similar colour schemes or markings. My particular favourites are the Hawker Tempest Mk.IIs and Sea Furies that adorn volume I, in a variety of colour schemes and markings, and the F-86 Sabres, Lockheed T-33A Shooting Stars and C-130 Hercules in Volume II. I, for one, was totally unaware of the individual unit markings in the form of checkers that were applied to the different PAF Squadrons operating the types, or the twelve Ilyushin Il-28 'Beagle' bombers that were supplied to Pakistan by the Peoples' Republic of China as an important 'stop-gap' capability in 1966-67 and which feature in both CSP and photographic content within the book. All of these profiles provide a great deal of inspiration for modellers since they also highlight the plethora of individual insignia worn by the various aircraft. We are also blessed with the fact that the vast majority, if not all, of the types featured as profiles are readily available as high-quality kits in almost all of the most popular scales.

These two volumes were, without doubt, two of my favourite titles in the Helion and Company Asia@War series where, once again, the Series Editors' have combined the written talents of well-informed and connected authors with a host of previously unpublished imagery sourced from personal collections and archives and a superb selection of colour side profiles, maps and tables to produce two high quality reference books on this enigmatic Asian Air Arm. Two more extremely valuable jewels in the Helion Crown!

Thoroughly recommended to anyone with an interest in the early development and growth of the Pakistan Air Force during its first two-plus decades of existence or the Indo-Pakistan conflicts of 1965 & 1971.

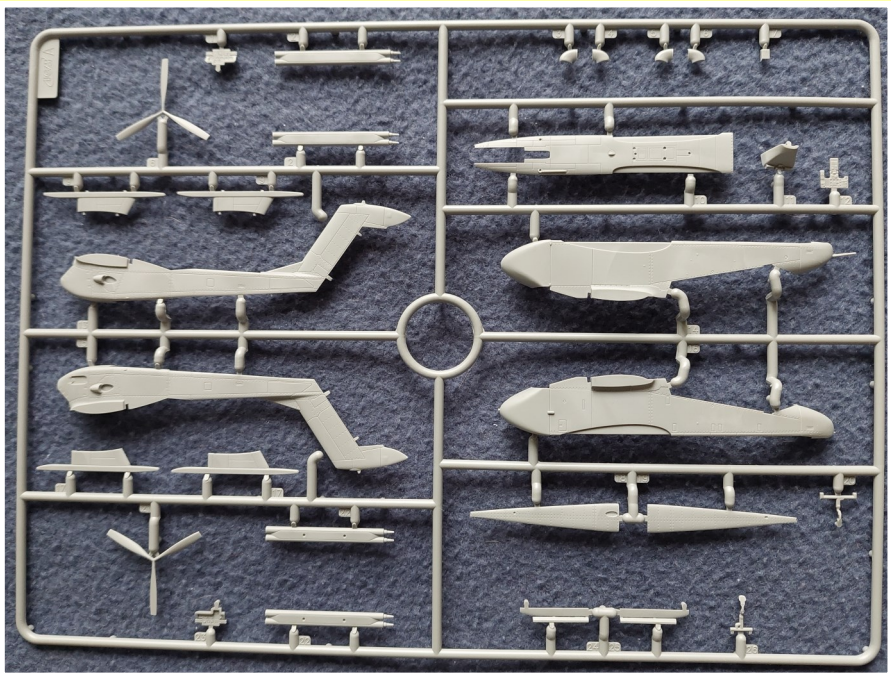
Mark Attrill, August 2023

ICM 72815– 1:72 Scale North-American Rockwell OV-10A Bronco

As I have previously mentioned, one of my childhood modelling memories was of my late father's enthusiasm for the rather unconventional twin-boomed North-American/Rockwell OV-10A Bronco, and his model of the newly released Airfix 1:72 scale kit, which first appeared in 1969. Hasegawa and Revell also released kits of the OV-10A Bronco within the same timeframe, and all of these are typical products of the period. Academy eventually followed suit with their own kit in 1999, which featured reasonable detail and engraved panel lines, but all of the kits suffered from accuracy issues. The announcement by ICM in 2021 that they would release a 1:48 scale kit was met with great enthusiasm, since it retained the overall accuracy, level of detail and quality of parts found in other recent ICM kits, and was seen as a good candidate for downscaling to 1:72 scale. It therefore came as no surprise that ICM followed through and have recently released the first kit in a new series of 1:72 scale kits of this enigmatic Observation- and COIN-configured aircraft.

The kit is presented in one of ICM's trademark sturdy boxes featuring a Vietnam-era United States Air Force example, in an overall light grey colour scheme, flying low over the thick jungle canopy that is a major terrain feature in South-East Asia. Inside the rather full box, the modeller will find four sprues in ICM's familiar medium grey plastic containing 181 parts, together with a clear sprue of 6 parts. The surface detail on the main airframe parts is a mixture of fine recessed panel lines and rivets together with raised rivet detail where appropriate and in line with the original aircraft. The kit includes a very comprehensive set of external weapons and stores with which to adorn the model, including LAU-10A, LAU-33'Zuni', LAU-68 & LAU-69 rocket pods together with several versions of Mk.81 and Mk.82 bombs, Mk.77 Napalm bombs and a single 150-gallon centreline mounted drop tank. ICM also provide decal markings for four Vietnam-era OV-10As including USN & USMC examples in the dark green and light grey camouflage scheme, and one each from the USAF and US Navy that sported an overall light grey colour scheme. Last, but not least, is the comprehensive instruction booklet, which is nicely presented with a very useful parts map, very clear assembly instructions and some nice colour profiles outlining the four schemes and decal options included in the kit, complete with detailed decal placement instructions. Other highlights include a very useful cross-reference table for ICM, Revell and Tamiya paints, an external stores/ordnance configuration diagram and templates to help the modeller produce their own masks for the cockpit canopy.

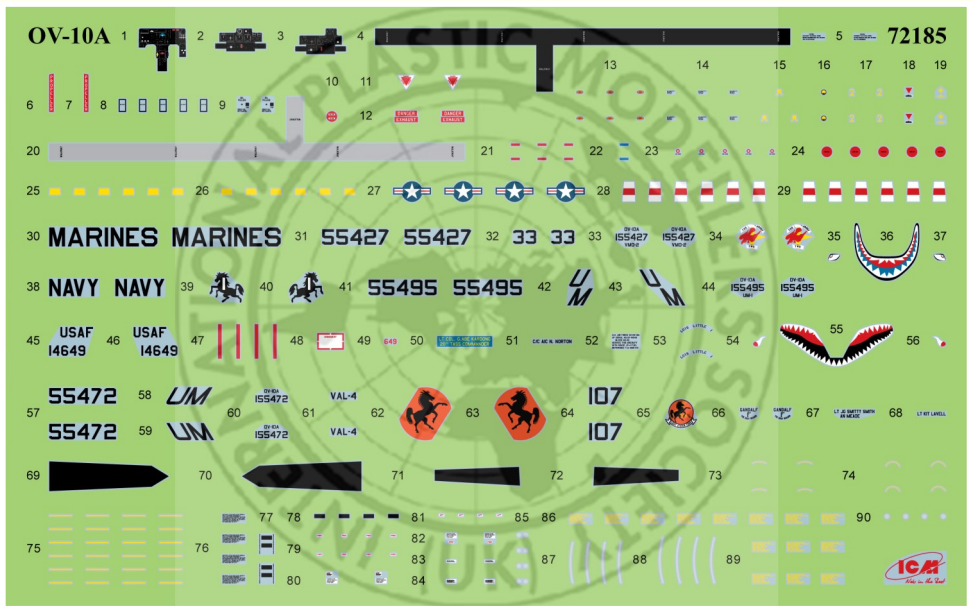
Typically, assembly starts with the nicely detailed cockpit tub, the major element of the fuselage nacelle design feature of the Bronco, that sits underneath the huge 'glasshouse' cockpit canopy. The parts count, design and assembly sequence rapidly indicate that this kit is not merely a downsizing of the original ICM kit, with much thought having been put into simplifying some of the major elements of assembly. For example, the one-piece instrument panels and consoles all feature raised detail yet also provide the option to use a decal to replicate the instruments, rather than relying on the latter applied to simplified flat panels. The seats are also very nicely moulded, lacking only seatbelts, which will need to be sourced separately. The assembled cockpit tub, together with the forward undercarriage bay, are neatly sandwiched together between the three-part main fuselage nacelle. Assembly of the distinctive fuselage-mounted stub wings or 'sponsons', which house 4 x 7.62mm machine guns and provide 4 x stores pylons, is then followed by the mainplane, which includes separate flying control surfaces, although it should be noted that the latter will need to be adjusted if the modeler wishes to display them in a deployed position. The next stages of construction focus on the nicely detailed main undercarriage bays that are housed in the twin -boom engine nacelles Once again the main flying control surfaces are provided as separate parts but will need to be adjusted accordingly. As with the larger version, ICM appear to have designed the kit parts to fit together neatly with a logical break point between the mainplane and the twin boom assemblies, which should aid considerably with the



rather complex final alignment of the latter and the horizontal tail surfaces. Final airframe assembly is concentrated on the twin turboprop propellers, air brakes, airframe and undercarriage details. Once the main airframe assembly is complete, attention can then turn to the assembly and application of external stores from the list of impressive options provided with the kit.

As previously mentioned, the kit provides decal markings for four different Vietnam-era US aircraft;

Option	Type/Unit	Notes
1	OV-10A 155427, Marine Observation Squadron 2 (VMO-2), USMC	Dark Green/Light Grey Scheme
2	OV-10A 155495, Light Attack Squadron 4 (VAL-4) 'Black Ponies', US Navy	Dark Green/Light Grey Scheme
3	OV-10A, 67-14649, 20th Tactical Air Support Squadron, USAF	Overall Light Grey Scheme
4	OV-10A, 155472, Light Attack Squadron 4 (VAL-4) 'Black Ponies', US Navy	Overall Light Grey Scheme



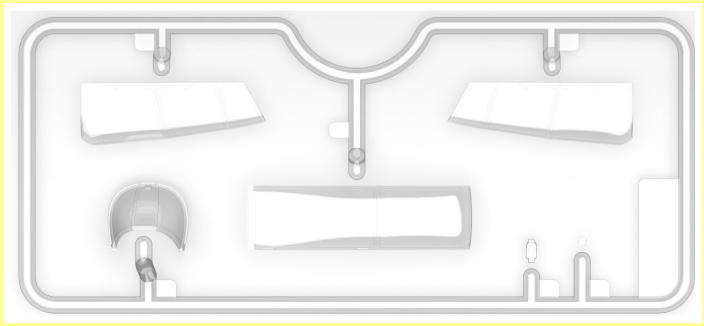
This new ICM kit will delight those modellers looking to build a definitive model of the North-American Rockwell OV-10A Bronco in the smaller scale. The overall appearance of the kit parts, with finely recessed panel lines and excellent detail, should offer the modeller a pleasant build experience, although care may need to be taken with some of the assembly, most notably the joining of the fuselage with the mainplane and twin booms. The nicely detailed cockpit will satisfy the needs of most modellers, although I have little doubt some aftermarket companies will wish to capitalise on providing additional detailing for this rather prominent feature of the original design. The selection of stores provided is excellent and very much in line with the variety of ordnance carried by US OV-10As during the long Vietnam War, and the modeller will have plenty left over for other projects, given ICM's generous provision.

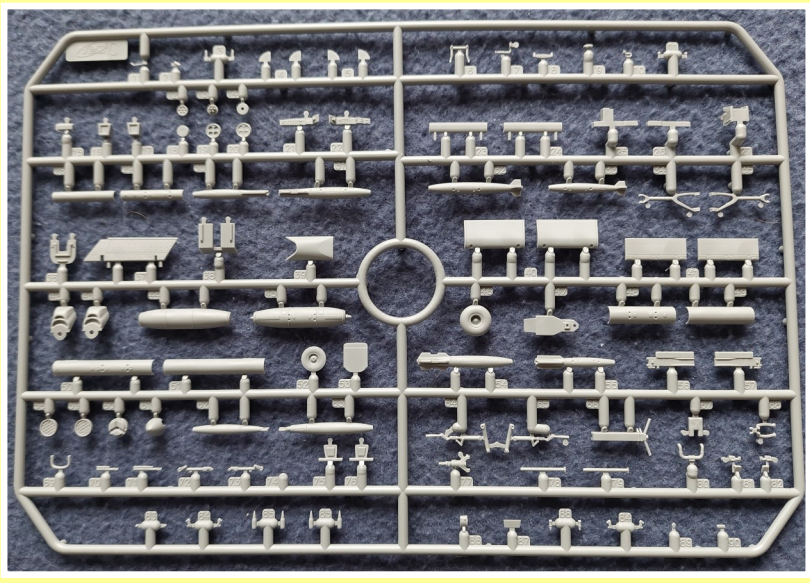
From an Asian Air Arm perspective, the only disappointment is the current lack of any decal options for Asian subjects, although several aftermarket decal sheets are available, and I suspect Xtradecal may produce an OV-10 Bronco sheet in their extensive range in due course.

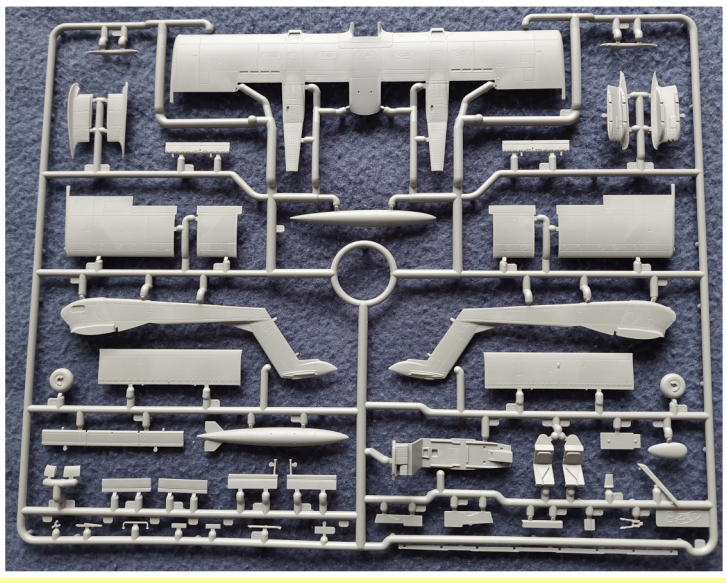
Review sample courtesy of my wallet and Hannants of Lowestoft.

Mark Attrill

August 2023







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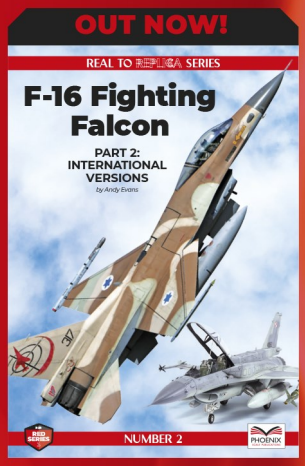

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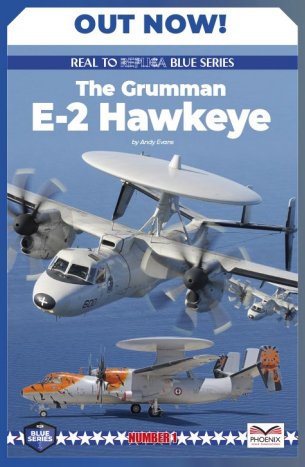

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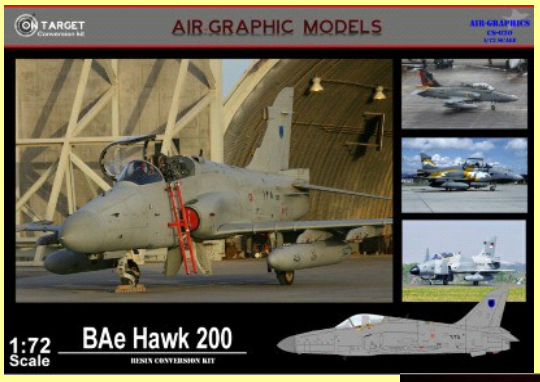

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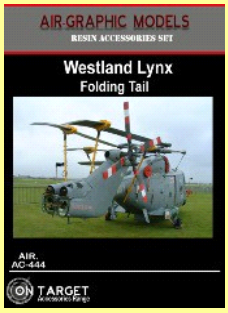

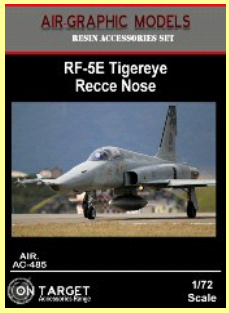

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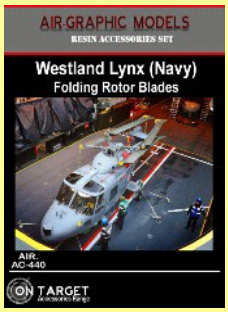

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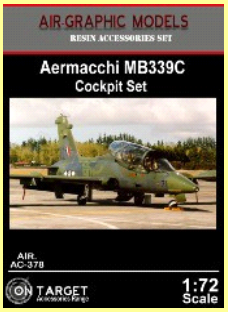

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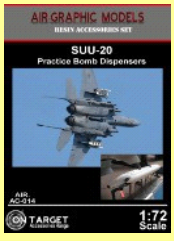

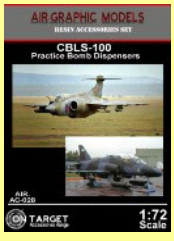

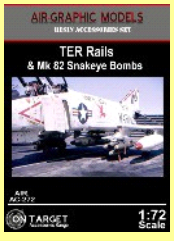

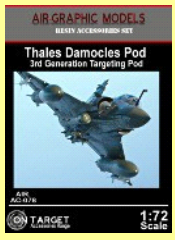

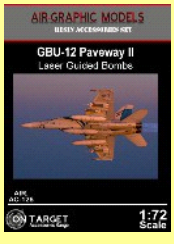

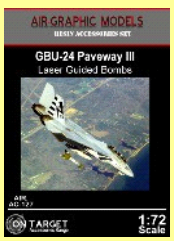

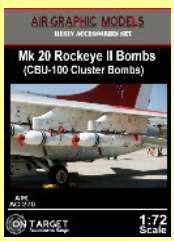

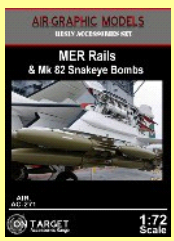

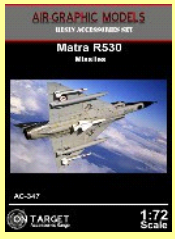

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