## INTRUDERS FROM THE SEA

USN/USMC A-6A, A-6B, & KA-6D Intruders in the Vietnam War

VMA(AW)-224 ~ Bengals
USS Coral Sea 1971-72

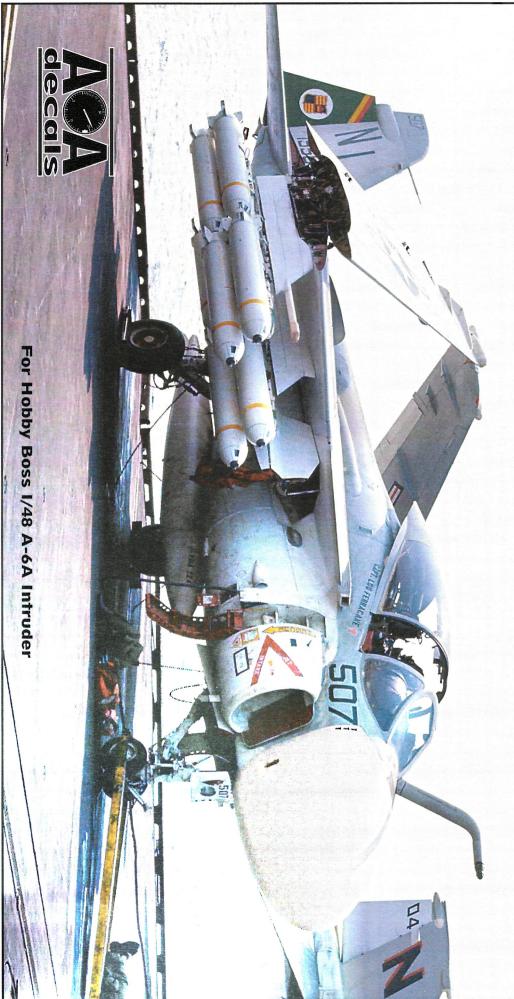
VA-95 ~ Green Lizards
USS Coral Sea 1973

VA-165 ~ Boomers
USS Ranger 1967-68,
USS Ranger 1968-69,

USS America 1970, & USS Constellation 1971-72

USS Constellation 1968-69, USS Ranger 1969-70, USS Enterprise 1971-72, & USS Enterprise 1972-73

VA-196 ~ Main Battery



#### **INTRUDERS FROM THE SEA**

## USN/USMC A-6A, A-6B, & KA-6D Intruders in the Vietnam War

# Thanks to the following Navy and Marine Vietnam veterans who shared their own excellent personal period photographs to assist in making this sheet possible:

Charlie Carr - Jack Diemer - 'Mac' McAvoy - Ben Moody - Bob Newman - Roger Philipps - Larry VinZant - Paul Werner - Charlie (VA-95)

the final squadron covered is VA-95, which supported the naval mine clearing Operation End Sweep in 1973 under the Paris Peace Accords along the North Vietnamese coast. The schemes covered in this sheet: here. Another squadron is the last of the four USMC A-6 squadrons in Vietnam, VMA(AW)-224. The other three USMC squadrons were covered in the first AOA release (48-001) INTRUDERS FROM THE BEACH. And lastly, This extensive 1/48 sheet provides the option for up to 16 schemes covering four squadrons. Two of which, VA-165 and VA-196, were tied at five for the most A-6 Vietnam combat cruises; four of five for each are covered

- VA-95 Green Lizards 2 options: USS Coral Sea 1973 (2x A-6A, including CAG scheme)
- VA-165 Boomers 4 options: USS Ranger 1967-68 (A-6A), USS Ranger 1968-69 (A-6A), USS America 1970 (A-6A), & USS Constellation 1971-72 (A-6A CAG scheme)
- VA-196 Main Battery 5 options: USS Constellation 1968-69 (A-6A), USS Ranger 1969-70 (A-6A), USS Enterprise 1971-72 (1x A-6A & x1 A-6B), USS Enterprise 1972-73 (KA-6D)
- VMA(AW)-224 Bengals 5 options: USS Coral Sea 1971-72 (3x A-6A including CAG scheme, 1x A-6B, & 1x KA-6D)

Mark Morgan and Rick Morgan, and A-6 Intruder Units of the Vietnam War (Osprey Combat Aircraft #93) by Rick Morgan The squadrons' operational histories are beyond the scope of this project; the following books are highly recommend for the USMC and USN A-6 Intruder history: Intruder: The Operational History of Grumman's A-6 by

### Camouflage & General Marking Notes

aircraft covered). Note that the shape and position of the demarcation line on the forward and rear fuselage also varied between aircraft demarcation line below the cockpit/above the engine intakes followed the curved panel line, which was a hard demarcation line (applicable to VA-196's NK-504, NK-512, & NK-522 aircraft; and all VA-95 and VMA(AW)-224 in sheen (FS36440 and FS37925). Even though the scheme illustrations all show a hard demarcation line between the white and grey, in reality this was soft edged, with the exception of only those aircraft where the All aircraft have the official standard Navy camouflage of Light Gull Grey (FS16440) over White (FS17925), however in period photos of these specific aircraft, all appeared to be relatively weathered in appearance and flat

stencils if applicable (refer to stencil placement guide for stencil locations). Note the following for each specific aircraft: For all schemes refer to individual illustrations for applicable markings used, camouflage demarcations, and other associated details for each specific aircraft. All squadron specific markings would have been applied over

- If applicable, the stabilator trim arrow markings (and color used) one arrow applied on the fuselage angled up to the leading edge, and the other on the stabilator leading edge.
- The style of lettering used in the RESCUE and WARNING arrows (either "round" or "square" lettering styles)
- The vertical position of the DANGER JET INTAKE chevron on the engine intake relative to the yellow RESCUE arrow/square (the latter was consistently placed around the rescue panel)
- If applicable, the small DANGER triangle (red or white) under the yellow square rescue panel
- If applicable, anti-slip coating on top of the engine intakes, upper wing, and upper fuselage (varied from very light grey to black) illustrations show approximate appearance
- Style/size of NAVY/MARINES on the rear fuselage were not identical use the version located for that specific scheme on the decal sheets
- Carrier names were not always centered above NAVY/MARINES, therefore some decals are left- and right-handed when carrier names are paired with NAVY/MARINES as a single decal
- The position of lower wing national insignia could vary originally the national insignia was applied at a more outboard location compared to the later and more common more inboard location
- The tip of the fuel dump under the rudder was painted red, as were the wing fuel dumps (located on trailing edge between the wingtip speedbrakes and the outer flap sections)
- All landing gear doors interior edges were red, with the exception of at least NE-507 (152907) of VA-165 which had overall white interior colors

some were painted from a corner point to point, some were curved, some extended onto the radome, some extended up to the bottom of the windscreen glass, and so forth Also note the various cockpit anti-glare shields for each scheme, these varied in both shape/size and color (dark gull grey or black, and faded versions of each). Some were painted following aircraft fuselage panel lines

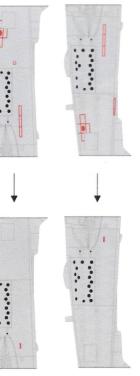
IMPORTANT: The Hobby Boss kit panel lines around the windscreen, canopy, and cockpit are spaced further apart and lower than actual – consider this when painting the anti-glare shield as the aircraft number (modex) decal may not fit or look correct if the kit panel lines are followed exactly

## Hobby Boss 1/48 A-6A Intruder Kit Modifications

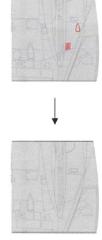
the earlier A-6A schemes covered in this sheet: The Hobby Boss 1/48 kit includes some features that are only applicable to the later A-6E/A-6E TRAM variants; therefore the following modifications can be made to the kit if desired in order to more accurately represent

- lights were installed on the engine bay doors. The kit represents the later A-6E TRAM engine bay door dual light configuration. lower engine bay doors (A10 and A11) in step 23. The light on the nose gear door was later removed on the A-6E TRAM due to the turret obscuring the light; in its place two 1) The red navigation light on the nose gear door is missing (see profiles showing light). Also remove/fill unused light locators forward and outboard of air scoops M15 on the
- 5 inches, or in 1/48 scale: 0.0208 x 0.1042 inches, or 0.529 x 2.646 mm navigation and formation lights - red on left wing, blue-green on right wing, and reddish-dark orange on both left/right fuselage. The actual rectangular fuselage lights were 1 x 2) Remove the low-intensity formation strip lights ("slime lights") on the left/right rear fuselage and on the left/right upper/lower wingtips and replace with original standard





- 3) Remove the outline on the upper left rear fuselage that represents the position of the air scoop applicable to the A-6E TRAM.
- 4) Fill in the vent exhaust holes and their associated panel lines on both sides of the rear fuselage.
- 5) Fill in the arresting gear pressure gauge (the circled recess) on the right rear fuselage only (the gauge was only on the left fuselage)
- 6) Fill in louvered vent and panel line on the right forward fuselage
- part M22 in step 16 and remove its placement outline. 7) At the forward right fuselage location only, do not use small air scoop fuselage location of M22 is correct for all A-6 variants. The rear



8) Replace/modify the GRU-7 ejection seats (shown left) with the GRU-5 (right). Although the GRU-7 was introduced in the A-6 in 1971 and eventually fitted to all Intruders, the original GRU-5 seat appears to have been used on all the aircraft on this sheet. Note that the shape of the yellow/black striped face curtain pull/ejection ring on the GRU-5 was more triangular shaped compared to the later GRU-7 elongated "D" shape

Overhead view of the face curtain pull rings shown below are exaggerated only representative of overall shape



#### A-6A Intruder Configurations

Various airframe changes and improvements were made to the A-6A over the course of the Vietnam War. The following are possible configurations; refer to specific aircraft scheme for applicability. NOTE - All images are provided for general reference and are not scaled

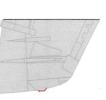
spacing of the lights (shown center). The kit's door (part H9) has the later light configuration, but the blade antenna is not included in the kit; nor is the blade antenna gear door (shown left). A TACAN blade antenna was later added to the forward nose gear door on the same side of the approach lights that led to the compressed TACAN Antenna - Early Intruders had the three small colored approach lights (green, amber, and red) arranged evenly spaced across the height of the forward nose

on the lower rear fuselage. To represent the blade antennas, create using sheet styrene









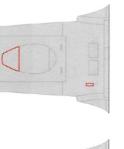


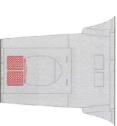
do not install part F51 in step 14 or part F19 in step 15 and fill locating holes. The AN/ALR-15 would appear as a small flat plate on the tip of the wing between the pod-like looking warning receivers were introduced in 1968 and were gradually retrofitted to the fleet. To represent the earlier AN/ALR-15 configuration (shown left), AN/ALR-15 or AN/APR-25 Warning Receivers - The kit provides the later AN/APR-25 type radar homing and warning system on the underside of the wingtips. These

AN/ALQ-100 ECM Antenna - The kit provides the AN/ALQ-100 antennas mounted on the outboard wing pylons (although the kit antennas are undersized overall).

from the pylons and smooth the leading edge. These antennas were introduced in late 1960's and were gradually retrofitted to the fleet. To represent earlier aircraft without the antenna, simply remove the antenna







create an opening or scribe a rectangle to represent the outlet, fill and smooth the contours where parts H10 and H11 would be installed into part D13 in step 23, the earlier ALE-18 chaff system (shown left). This chaff system consisted of a small rectangular outlet located below the left engine exhaust. To represent this, and extend the radar antenna rearward to taper down to match the fuselage contours. bulged dome on part D13). This chaff system was introduced in 1970 and was gradually retrofitted to the fleet. Therefore, the majority of Vietnam Intruders had ALE-18 or AN/ALE-29A Chaff System - The kit provides the later AN/ALE-29A dual bucket chaff system that was mounted aft of the Doppler radar antenna (the

create using sheet styrene over the "V" section of the arresting gear (parts D2 and E1) and form to match fuselage contours of part E21 Arresting Gear Panel - Originally a fuselage panel was installed over part of the arresting gear, this panel was flush with the exterior fuselage. To represent this,







during the refueling. To represent this, do not install the light (part F8 in step 22) and remove locator mark and associated panel lines. Refueling Probe Light - Early Intruders lacked the small red light mounted beside the inflight refueling probe that provided probe illumination

Fuselage Speed Brakes - The original functioning fuselage mounted perforated brakes were eventually discontinued during A-6A production and simple solid corresponding fuselage camouflage (examples of this could still be seen into the 1990's on A-6E TRAM Intruders), the holes. Note that some aircraft retained the earlier perforated speed brakes but were no longer operational; these were simply painted over with the (also do not use actuator parts F37); and modify the perforated speed brakes supplied (parts H3 and H4) by removing the "hinge" tabs and completely filling in schemes covered on this sheet). To represent the later solid panels, do not cut/remove the two openings on the fuselage per the instructions in steps 7 and 8 panels were fitted in place of the panels (some had each of the individual holes covered with circular plates, although this style was not used on any of the









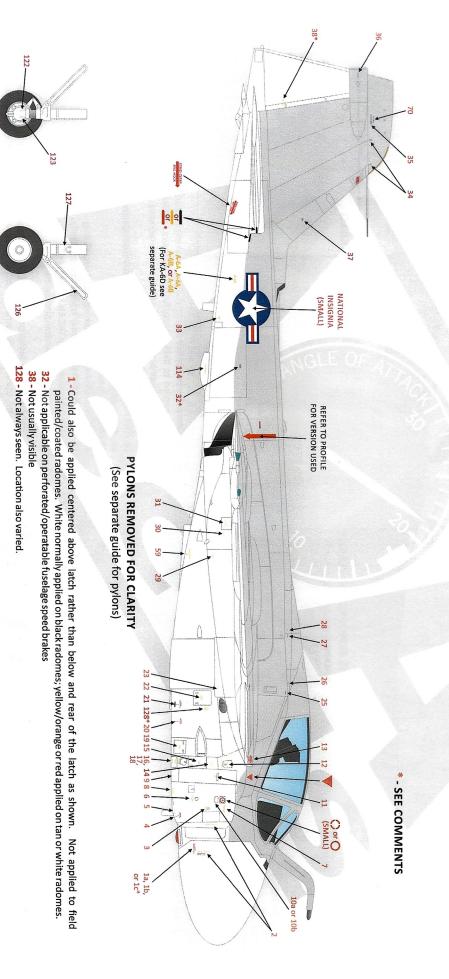
canopy frame and the aft support structure of the canopy (part D27). front along the rod and resembled a heavy quilted blanket. To represent the rod, use styrene or metal tube/rod between the forward sliding an armored curtain could be drawn up to provide the crew with side protection. The curtains were a dark grey in color and zippered from rear to Flak/Armored Curtains - Some Intruders had flak/armored curtains installed in the cockpit. A rod was installed on the inside of the canopy where



various reasons. Additionally, while in service some stencils would also eventually become heavily worn/faded to the point of non-existence. could be reapplied locally which could be in a different format, text, or style (such as basic open stencil font from spraying). Some stencils also were not seen on all aircraft for course of the Intruder's life. Any corrosion control (painting) that was performed in the field could cover the existing stencils and they would not always be reapplied, or they These stencils represent the standard generally applied airframe stencils. It would be near impossible to cover every stencil and variation as they changed throughout the

If applicable, squadron specific markings would have been applied over the small airframe stencils

It is recommended to check references for exact placement for a particular aircraft as exact locations of stencils could vary from aircraft to aircraft.

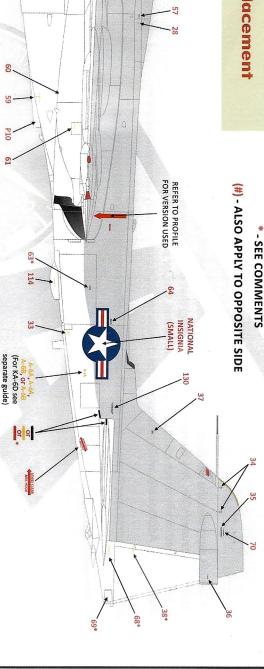


\_\_\_\_ Stabilator angle indicator markings do not appear to be present in very early aircraft. If applied, use same color arrowheads. \_\_\_\_ NOTE: One arrowhead is applied on the leading edge of the stabilator (pointing in towards fuselage), while the other

arrowhead is applied on the fuse lage pointing to the stabilator leading edge.

RIGHT MAIN LANDING GEAR (Inner and Outer View)

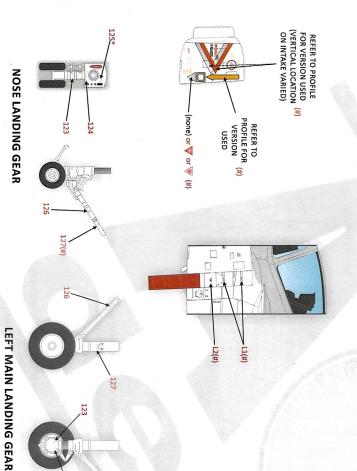




#### **PYLONS REMOVED FOR CLARITY**

KA-6D

(See separate guide for pylons)



f 1 - Could also be applied centered above latch rather than below and rear of the latch as shown. yellow/orange or red applied on tan or white radomes. Not applied to field painted/coated radomes. White normally applied on black radomes;

- 38 Not usually visible
- 63 Not applicable on perforated/operatable fuselage speed brakes
- 68 Not usually visible
- 69 Not usually visible
- 115 AN/ALE-18 chaff dispenser equipped aircraft only
- 116 AN/ALE-18 chaff dispenser equipped aircraft only
- 125 Aircraft equipped with TACAN antenna only
- 128 Not always seen. Location also varied.
- applied, use same color arrowheads. NOTE: One arrowhead is applied on the leading edge of the stabilator (pointing in towards fuselage), while the other arrowhead is applied on the Stabilator angle indicator markings do not appear to be present in very early aircraft. If

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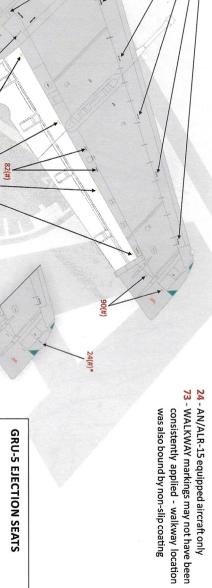
"" Only applicable to early aircraft equipped with functioning (perforated) fuselage speed brakes.

fuselage pointing to the stabilator leading edge.

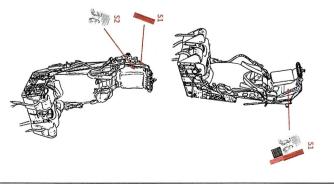
(Inner and Outer View)

## (#) - ALSO APPLY TO OPPOSITE WING

#### \* - SEE COMMENTS



#### **GRU-5 EJECTION SEATS**



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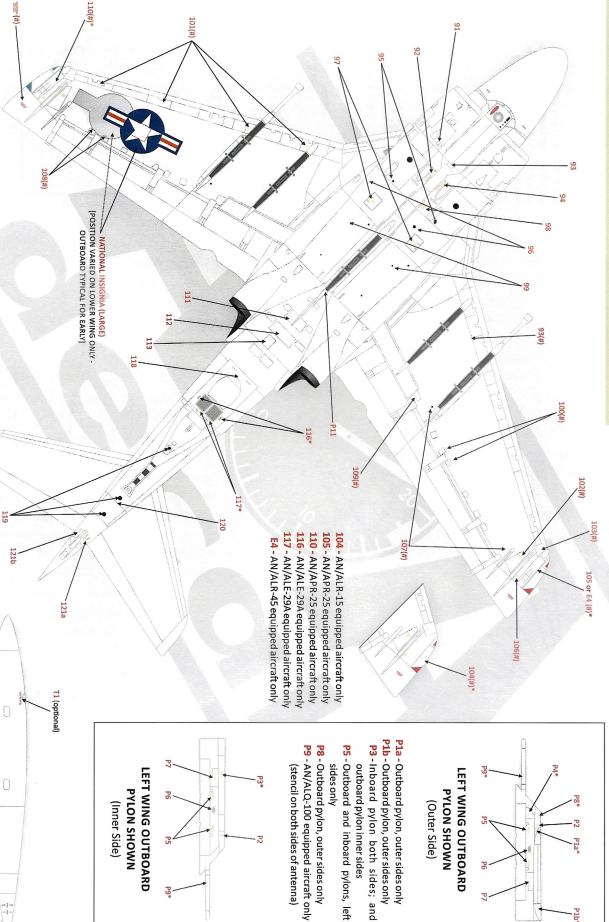
WHITE TEXT VERSION)
(WHITE TEXT VERSION)
INSIDE OF UPPER SPEED BRAKE ONLY

NATIONAL INSIGNIA (LARGE)

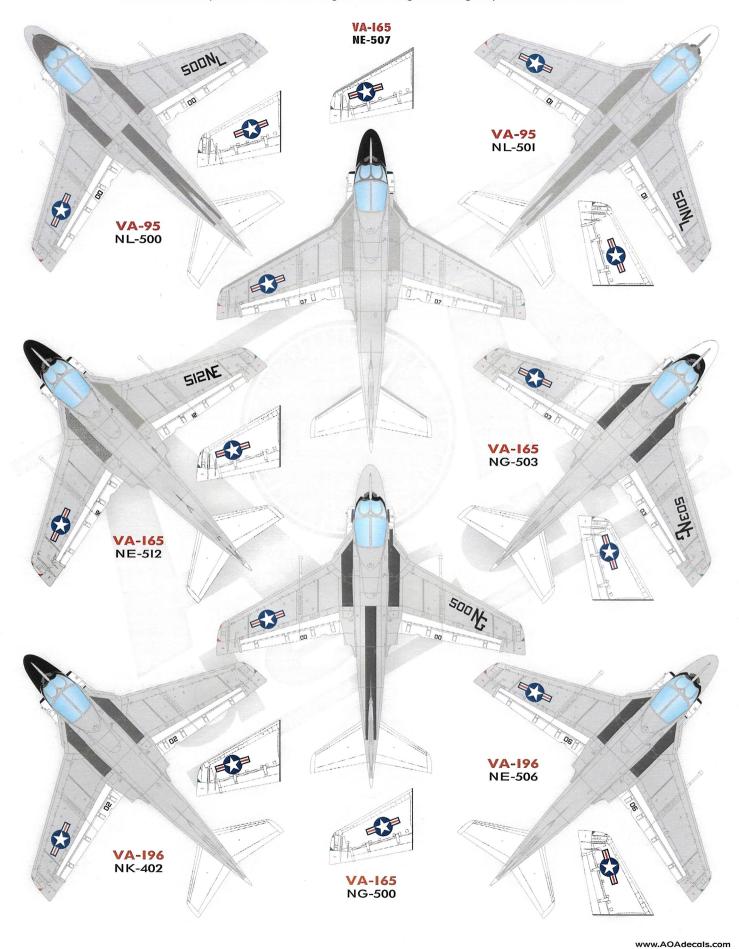


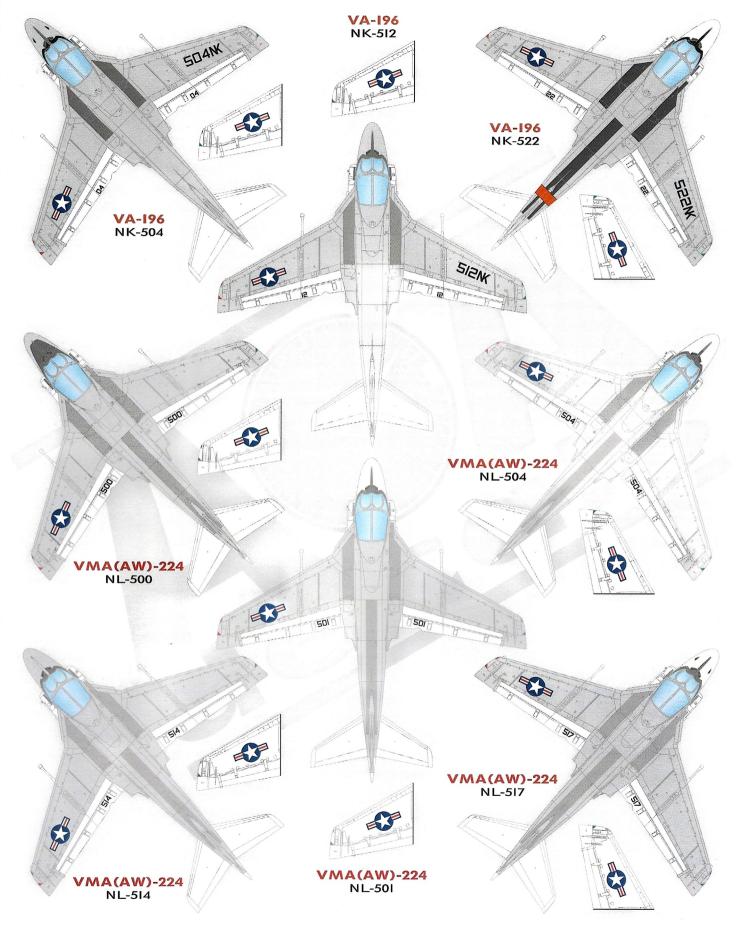
## (#) - ALSO APPLY TO OPPOSITE WING

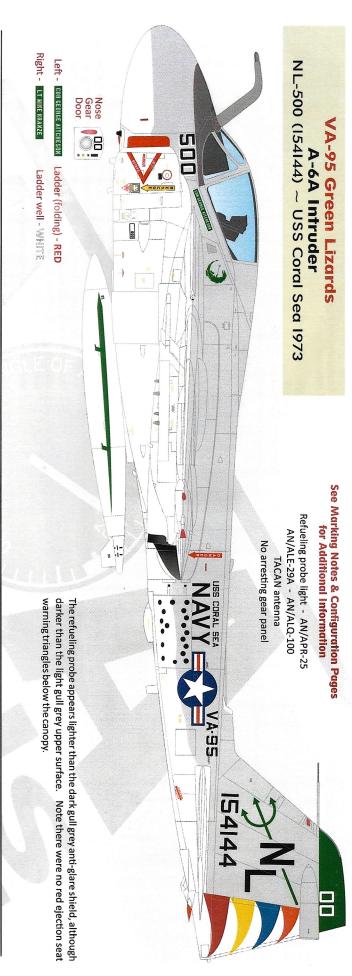
#### \*-SEE COMMENTS

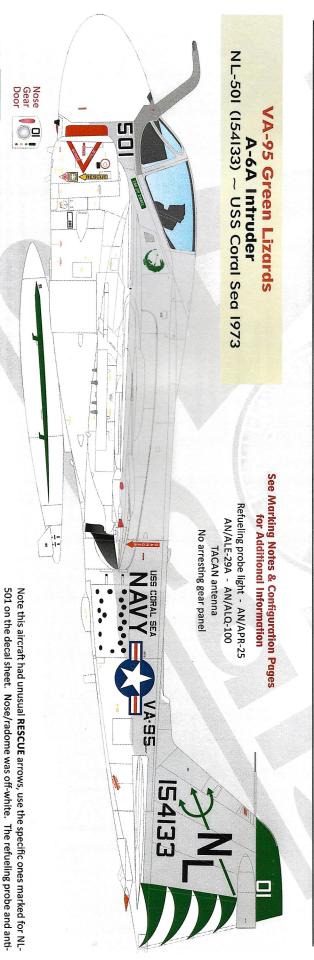


Note the standard position of the lower wing's national insignia was originally located further outboard.









glare shield appear to be a faded dark gull grey. Note there were no red ejection seat

warning triangles below the canopy.

Left - COR ZIP ZIRBEL Right - LT MINE ANDERSON

Ladder (folding) - RED
Ladder well - WHITE



## See Marking Notes & Configuration Pages for Additional Information

No refueling probe light - AN/ALR-15 Early nose gear door (no TACAN) Arresting gear panel (unknown)





AAAA

color not known (shown here as dark grey). It is uncertain if this color was only the landing gear doors were overall white, they did NOT have red edging. temporary, such as during windscreen repair/maintenance. The interior surfaces of specifically this aircraft was unusually dark in black/white photos, with the actual exhaust fairing panels (both sides of fuselage). The windscreen framing on aircraft bureau number (BuNo) 152907 stenciled onto the forward engine bay and Corogard (matt aluminum) leading edges, including pylons. Note the two small



Right - 2M GALVIN

RED or WHITE

Left - GALVIN 2M

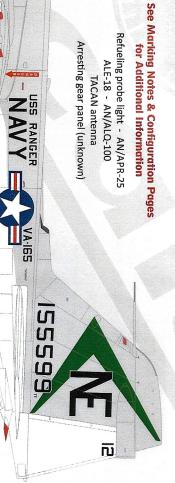
Ladder (folding) -

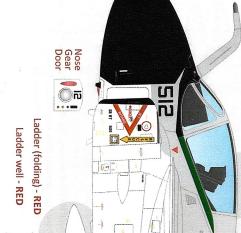
RED or WHITE Ladder well -

Nose Gear Door

**VA-165 Boomers** 

NE-512 (155599) ~ USS Ranger 1968-69 A-6A Intruder





In the vast majority of photos, the VA-165 upper fuselage insignia on their Vietnam Intruders appear with the yellow star and white knight chess piece detailed black outlined version of their insignia is provided as an option. represented as silhouettes as shown in the profile here. However, a more

> of fuselage). Non-slip surface applied on top of intakes. 155599 sstenciled onto the forward engine bay and exhaust fairing panels (both sides completely up to the glass. Note the two small aircraft bureau numbers (BuNo) Position the green canopy rail marking on the lower edge - it did not extend

#### NG-503 (155677) ~ USS America 1970 **VA-165 Boomers** A-6A Intruder

See Marking Notes & Configuration Pages for Additional Information

Refueling probe light - AN/APR-25 ALE-18 - AN/ALQ-100 TACAN antenna

Arresting gear panel (seen with and without)



Left - LCDR JOHN GRIMES

Nose Gear Door

**5**03

∨A·I65

Right - COR BILL FARTRY

Ladder (folding) - RED Ladder well - WHITE

represented as silhouettes as shown in the profile here. However, a more In the vast majority of photos, the VA-165 upper fuselage insignia on their Vietnam Intruders appear with the yellow star and white knight chess piece detailed black outlined version of their insignia is provided as an option.

side was slightly angled. Other photos of this aircraft also show it with smaller VAthe canopy. WEIGHT markings and also did not have red ejection seat warning triangles below off-white. Non-slip surface applied on top of intakes. The NG tail code on the left DANGER - JET INTAKE warnings, use the specific ones identified as NG-503 on the completely up to the glass. Note this aircraft had an atypical RESCUE arrows and Position the green canopy rail marking on the lower edge - it did not extend **165** and **USS AMERICA**, these are included as an option. 503 did not have GROSS decal sheet. Engine intake splitter plate had a thin red outline. Nose/radome was

#### NG-500 (155644) ~ USS Constellation 1971-72 VA-165 Boomers A-6A Intruder

See Marking Notes & Configuration Pages for Additional Information

Refueling probe light - AN/APR-25 AN/ALE-29A - AN/ALQ-100 TACAN antenna



represented as silhouettes as shown in the profile here. However, a more detailed black outlined version of their insignia is provided as an option. Vietnam Intruders appear with the yellow star and white knight chess piece In the vast majority of photos, the VA-165 upper fuselage insignia on their

\_**₹** VA·I65 ○

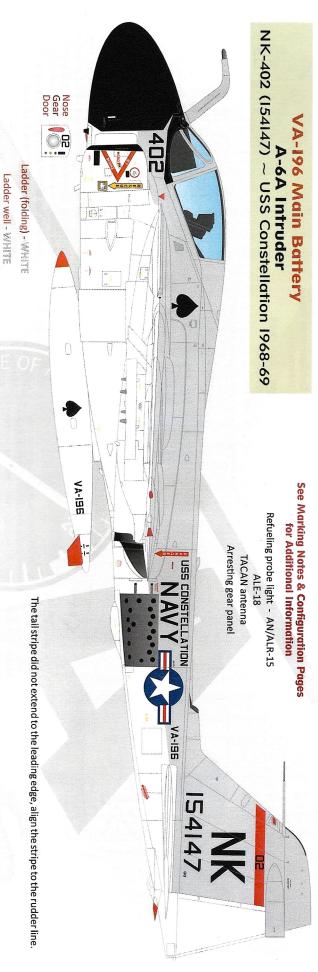
Right - / LTLARBY WHITAKER Left - \u00e4bb aus eggent cvw9

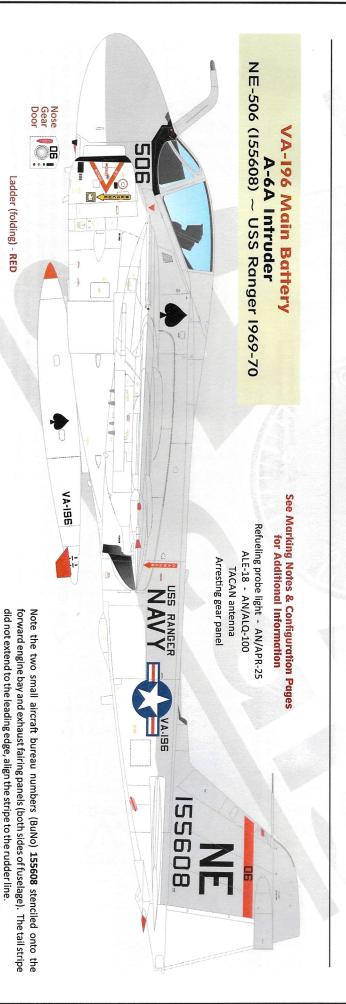
Ladder (folding) - RED Ladder well - WHITE

Nose Gear Door

and CAG chevrons on the left and right sides were not identical. Also note the crew oversized in order to maintain the light as the "eye" of the bee. Note that the bees completely up to the glass. Non-slip surface applied on top of intakes. Apply the Position the green canopy rail marking on the lower edge - it did not extend names were applied over the red ejection seat warning triangles about double the actual size, which subsequently requires the bee's head to be red navigation light. The size of the light and light fairing on the kit is unfortunately large tail decal first, then apply the separate bee decal. The "eye" of the bee was the

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Ladder well - RED



See Marking Notes & Configuration Pages for Additional Information Refueling probe light - ALE-18(?)

TACAN antenna AN/ALQ-100

Arresting gear panel (unknown)



this A-6B due to the antenna on the engine intake above the rescue panel. NOTE The one piece rescue arrow/square panel decal will need to be separated for

VA-196

Nose Gear Door

Ladder (folding) - ?

Ladder well - ?

2

anti-glare shield. The tail stripe did not extend to the leading edge, align the stripe to Non-slip surface applied on top of intakes. Dark gull grey refueling probe and black the rudder line. There was no modex **04** (aircraft number) on the tail.

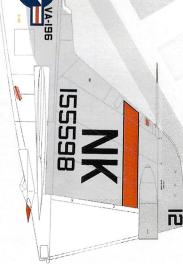
#### A-6A Intruder ("BUBBLES") **VA-196 Main Battery**

NK-512 (155598) ~ USS Enterprise 1971-72

Refueling probe light - AN/APR-25 No(?) arresting gear panel ALE-18 - AN/ALQ-100 TACAN antenna

See Marking Notes & Configuration Pages for Additional Information





Non-slip surface applied on top of intakes. Dark gull grey refueling probe and anti-glare shield. The tail stripe did not extend to the leading edge, align the stripe to the rudder line. Note BUBBLES at the bottom of the nose gear door.

Ladder (folding) - RED Ladder well - WHITE

Nose Gear Door

VA-196

B





AN/APR-25 - AN/ALQ-100
TACAN antenna
Arresting gear panel (unknown)





0

Non-slip surface applied on top of intakes. Apply **VA-196** on the rear fuselage before adding the large fuselage band decals. The tail stripe did not extend to the leading edge, align the stripe to the rudder line.

Nose Gear Door

Ladder (folding) - RED
Ladder well - WHITE

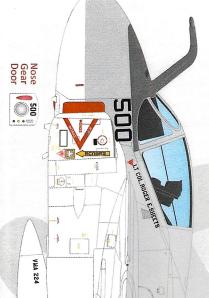
## VMA(AW)-224 Bengals A-6A Intruder NL-500 (155708) ~ USS Coral Sea 1972

See Marking Notes & Configuration Pages for Additional Information

Refueling probe light - AN/APR-25 AN/ALE-29A - AN/ALQ-100 TACAN antenna - Arresting gear panel

Flak curtain rod

MARINES

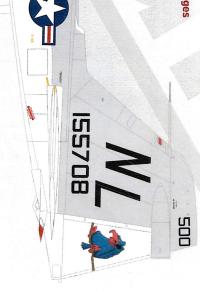


Left - LT COL.ROGER E.SHEETS
Right - CAPT.W.D.CARR

Ladder (folding) - RED

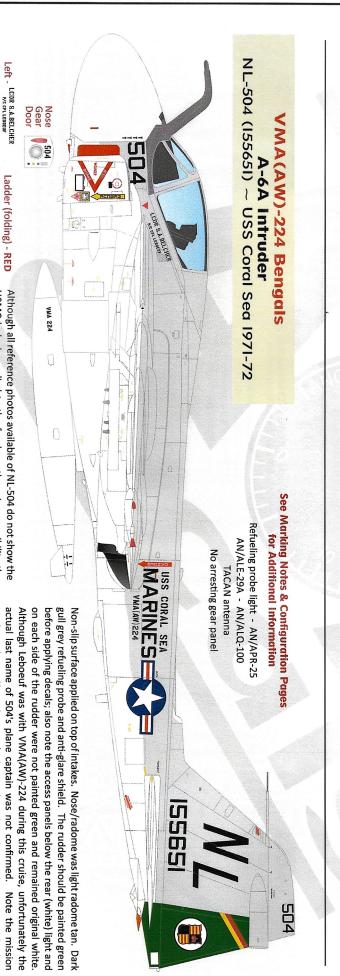
Ladder well - WHTE

Although all reference photos available of NL-500 do not show the USMC insignia applied to the fuselage, there is a possibility the sticker was applied at some point, particularly earlier in the cruise.



Non-slip surface applied on top of intakes. Dark gull grey refueling probe and extended anti-glare shield. On the right side, the "patience my ass" vulture marking was centered horizontally on the rudder, while the left side the branch extended to the rear of the rudder. Note that the various styles of letters E and R used in "Lt.Col." Sheets stenciled name on the aircraft is correct and is not a decal error. (CAG Sheets was actually a Navy commander but given honorary equivalent Marine rank of Lieutenant Colonel.)





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markings (mines?) on the nose/radome. (For this scheme, the gross weight data

block decals for the sides of the engine intakes are located on the color decal sheet.)

Right - IST LT MIKE BENTON

Ladder well - WHITE

USMC insignia applied to the fuselage, there is a possibility the sticker was applied at some point, particularly earlier in the cruise.



See Marking Notes & Configuration Pages for Additional Information Refueling probe light

AN/APR-25 - AN/ALQ-100

Early nose gear door? (antenna not apparent) Arresting gear panel (seen with and without)





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VMA 224

VNA AU 224

Lt. Martinsen's last name was incorrectly spelled as "Martinson" on the actual aircraft - the decal accurately represents the misspelled name as it appeared on the and remained original white. Note the "gas pump" markings on the nose. Also note, Non-slip surface applied on top of intakes. Dark gull grey anti-glare shield. The aircraft. below the rear (white) light and on each side of the rudder were not painted green rudder should be painted green before applying decals; also note the access panels

#### A-6B Mod 0 Intruder ("SAM SLAM") NL-517 (151562) ~ USS Coral Sea 1972 VMA(AW)-224 Bengals

Right - LT. LARRY MARTINSON

Ladder well - WHITE Ladder (folding) - RED

Left - ILT. JOE MCDONALD

Nose Gear Door

AN/ALE-29A (?) - AN/ALQ-100 for Additional Information Refueling probe light

See Marking Notes & Configuration Pages

517

Arresting gear panel TACAN antenna



TILT BO MILTON (MITTON)

markings, there is a possibility at least the rudder markings were eventually applied; less likely the USMC insignia which was believed to USMC insignia applied to the fuselage or the usual squadron rudder Although all reference photos available of NL-517 do not show the be applied earlier in the cruise before the A-6B's were received

a noticeable forward rotation/angle on the tail. 2) The one piece rescue arrow/square letters unusually closer together than standard; also note that the letters were applied at NOTES 1) The N and L of the NL tail code decals should be separated, NL-517 had the intake above the rescue panel. panel decal will need to be separated for this A-6B due to the antenna on the engine

applied on top of intakes. Nose/radome was light radome tan. Dark gull grey refueling One of the three A-6B's received by the squadron in March 1972. Non-slip surface probe and anti-glare shield. There was also a 1" tall text below the crew names on both sides that was unfortunately illegible in all available photos. www.AOAdecals.com

Left & Right - SamSlam Right - ILT NoJo WILLIS

Left - ILT B D MILTON (MUTTON)

Nose Gear Door

VMA 224

Ladder well - WHITE

Ladder (folding) - RED