



# HOW TO PAINT A TRITONAL CAMOUFLAGE ON A PANZER IV



## VICTRIX GAMES

### COLOR CHART

#### DUNKELGELB

-  Dark base (A.MIG-901)
-  Base (A.MIG-902)
-  Light base (A.MIG-903)
-  Highlights (A.MIG-904)



### CAMOUFLAGE

-  Olive green (XF-58Tamiya)
-  Chocolate brown (JA 205, LifeColor)

### TRACKS AND ACCESORIES

-  Black Templar (Citadel Contrast)
-  Cygor brown (Citadel Contrast)
-  GREY BROWN (A.MIG-0252)

### WEATHERING

-  Tan for 3 Tone (A.MIG-1510)
-  Dark Brown (A.MIG-1005)



### CHIPPING EFFECTS

-  Chipping (A.MIG-044)
-  Highlights (A.MIG-904)

### STREAKING EFFECTS

-  Sludge oil brush (A.MIG-3532)
-  Rust oil brush (A.MIG-3510)
-  Dusty earth (A.MIG-3523)
-  Earth clay (A.MIG-3524)

### DUST EFFECTS (PIGMENTS)

-  European earth (A.MIG-3004)
-  Dark earth (A.MIG-3007)

### PAINTS

Probably, many of you have never used enamels or oils. Most wargamers only use acrylic paints to paint their models, such as Citadel or Vallejo. These paints dry in seconds and are thinned with water. However, to generate the weathering effects we need to use another type of paint: enamels and oils. These need a specific thinner (White Spirit or turpentine essence) and dry slowly (in hours or even days!). You can see other features of these paints below. In addition, I will use a third type: lacquer paints (Tamiya Color). These paints are very thin and easy to airbrush, and I normally use them to paint small camouflage spots of soft edges. They are like acrylic paints, although alcohol works better as a thinner.



Legend:  
 Acrylic paint  
 Enamel/oil based paint  
 Lacquer

# ACRYLIC AND ENAMEL / OIL PAINTS

## ACRYLIC PAINTS

- Thinned in water
- Brush cleaned with water
- Dry in seconds
- Once it is dry, it is impossible to wipe it away

VS

## ENAMEL / OIL PAINTS

- Thinned in White Spirit or similar
- Brush cleaned with thinner
- Dry in hours
- After hours, it is still possible to wipe it away

## STEP 1 - PRIMER COAT

**W**e start removing the cast flashes with a modelling knife. Next, we can assemble the model using plastic glue. Try to avoid cyanoacrylate (super glue) given that this type of glue is in fact more fragile (it solidifies as crystal), while the plastic glue “melts” the two plastic pieces together. Before starting to paint the model we need to apply a primer. This step is essential, since the primer will facilitate the application of the paint and will make it more durable. Given that these models are meant to play, you can imagine how important it is. In addition, some weathering effects are very aggressive. I normally use a neutral colour for the primer, such as grey, which is covered very nicely by any colour, dark or light. I recommend you to apply the primer either with a spray or with the airbrush, but avoid using the brush. The former creates a homogeneous and thin layer, while the later can create odd textures or cover some details.

Airbrush couple of thin layers of the primer



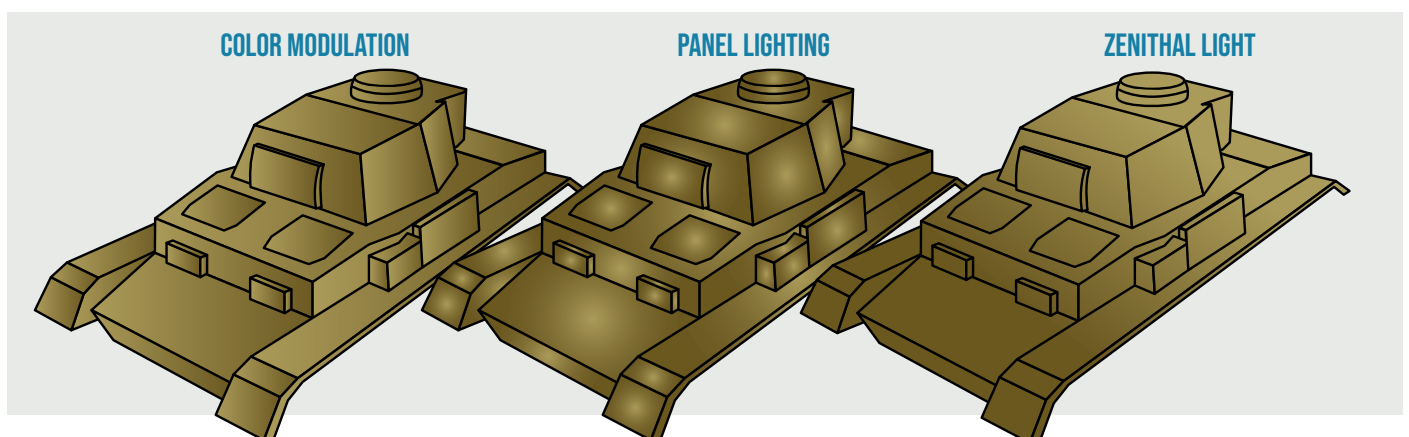
## STEP 2 - DARK YELLOW (DUNKELGELB)

**T**o paint the dark yellow or dunkelgelb we will use the airbrush and acrylic paints. If you do not have one, you can always use a brush but forget about shades and lights: use directly the plain base colour (in this case, dunkelgelb base). However, I encourage you to get an airbrush. Nowadays it is rather inexpensive –for 100-200 eur you can get a decent set of airbrush plus air compressor– and it will make your life much easier, as well as it will open a new window of opportunities to paint your models. My bedside airbrush is a Renegade Krome from Badger with a 0.2 mm needle, and I normally use 2 bars of pressure (60 psi). I have a regular air compressor with a tank, which ensures a constant supply of air. Like any other acrylic paint, we always need to thin it with water or with the corresponding thinner. Each acrylic paint suppliers provide a

specific thinner, although these are interchangeable since it is just water with soap and other chemicals to improve the paint flow. Therefore, you only need one bottle. Some acrylic paints are indeed already prepared to be airbrushed, such as Model Air from Vallejo or AMMO paints, and we do not need to thin these any further. In my case, I still thin them with a little bit of thinner given that I like to work with semi-transparent layers. This gives me more room to create soft transitions: the different number of layers will create a more or less intense colour.

Technically, we can directly apply the “real” colour on our tank, such as the dunkelgelb base. However, our tiny models are really small and they reflect a very insignificant amount of light, which means they look very dark to our eyes even though we are using

## LIGHTNING STYLES



the real colour. As a result, it is advisable to apply shades and highlights to create contrast, so that the scale model look more real. There are different methods to apply highlights in scale models, such as zenithal light, panelling and color modulation. The most common one – and the easiest- is the zenithal light. We consider a single light focus (the sun) and apply the lights accordingly. Just fix the airbrush in a diagonal on top of the model and press the trigger. However, I prefer a more elaborated method, the colour modulation. This method creates a huge contrast between panels, resulting in a very interesting effect. Instead of considering a single light source, we consider several of them. For every single panel or surface, we apply a different set of lights and shades. The maximal expression of this method is achieved when we combined the darkest point of one panel with the lightest one of another adjacent panel (see the scheme below). You might think that this method is unreal, and you are right. However, remember that we are painting a tiny plastic tank, which is unreal too. If we want our tiny tank to catch the attention of the audience, we need to create contrast. And this is especially important when the surfaces of our scale model are very small.

For the dunkelgelb we can use a dark yellow colour for the base, and then mix it with a dark brown for the shades and white for the lights. However, I prefer to use ready-made colours because

it saves times and creates consistency among vehicles (they are painted with the same colours). Accordingly, I used here three paints from the colour modulation set for dunkelgelb from AMMO: dark base (A.MIG-901), base (A.MIG-902) and light base (A.MIG-903). There is no need to mix anything, just open the bottle and use it. I started airbrushing the darkest colour and then progressively I applied the base and then the light. It is very important that we do not totally cover the previous colour, or we will lose the transition effect. To create sharp contrasts following the colour modulation method we can use different tools to mask the adjacent panels, such as masking tape, auto-adhesive putty (Blu-Tack) or a simple piece of paper. This is important to work one panel at a time and create the maximal contrast. Do not worry if this is not perfect, since 1:144 scale models are very tiny and therefore challenging. Just try to get nice contrasts in the tiny panels.

Finally, the last highlight is applied with a normal and sharp brush. We use a lighter colour, highlights (A.MIG-904), to paint the small details such as rivets, hatches, etc and other small surfaces. Once again, the goal is to create contrast.



Use masks to create sharp contrasts between panels.



The last highlight is applied with the brush.



This is the final result of color modulation. Although unreal, it creates interesting contrasts.

## STEP 3 – CAMOUFLAGE

**F**or these tanks, I decided to apply a tritonal camouflage (dark yellow, olive green and chocolate brown) using soft-edges spots. If you remember, for the Panther tank we used Blu-Tack to mask the camouflage so that we could generate hard-edged spots. Here, we are not going to use any mask. Instead, we will directly apply the camouflage paint with the airbrush, which will create blurred edges spots. For this purpose, I like to use lacquer paints such as Tamiya or LifeColor. These paints have a very thin pigment so that they are easily airbrushed creating very soft layers. To have more control, I normally thin the paints 50% with their corresponding thinner or just water. For the olive green I used XF-58 (Tamiya), whereas for the chocolate brown I used UA 205 (LifeColor).

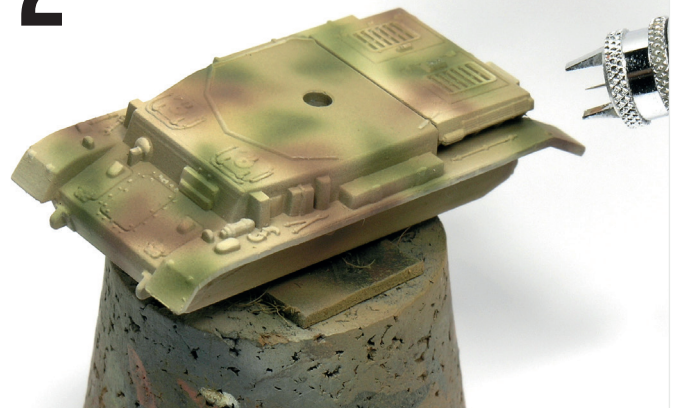
Carefully the airbrush, we start painting the camouflage spots. It is extremely important that before applying the paint on the tank, we first try the airbrush on a piece of paper. If you are happy with the dilution, then move to the tank. Never start applying the paint directly on the model. First paint the spots with one color, and then with the second. Work with thin layers and try not to apply too much paint on the surface. The semi-transparent layers of the camouflage colors will allow you to exploit the lights and shades we created for the dunkelgelb, so that the camouflage spots will also show slight colour transitions. If you apply too much paint, you will cover these.

1



Paint green spots with ameboid shapes.

2



Then, brown spots adjacent to the green ones.



Here you can see a comparison between two versions of the tritonal camouflage. On the left, the Panzer IV shows a soft-edges camouflage; whereas on the right, the Panther shows a hard-edges camouflage. Can you spot the differences? Right, the camouflage on the Panther looks sharper, with more interesting contrasts. This is due to two reasons: 1) the Panther has larger surfaces than the Panzer IV, so that the panels reflect more light and we have more space to create a contrast between shades and lights; and 2) we painted hard-edge camo spots with its own lights and shades. In contrast, we only applied a single tone for each camouflage colour on the Panzer IV. In addition, the blurry effect of the soft-edge camouflage contributes to erase the contrasts we created with the colour modulation on the dark yellow. However, both versions are interesting and you can even combine them in different platoons of your army.

## STEP 4 – TRANSFERS, TRACKS AND VARNISH

**O**nce we are happy with the base colour and camouflage, we can put the transfers and paint other parts with acrylic paints, such as the tracks and tools. To avoid the icing effect of the transfers is very important to remove as much as possible the transparent part of the transfer and use specific products to fix and conform the decal, such as the Ultra Decal fixer from AMMO. In addition, a correct order of varnishes will help: 1) cover the surface with glossy varnish, 2) apply the decal using the decal fixer and 3) apply a layer of satin or matt varnish. On the other hand, we can

paint with a beige or grey colour the tracks, and with a red brown we paint the exhaust and fire extinguisher. And finally, with black we paint the rubber of the track wheels. For this I found very useful the new Contrast paints from Citadel given its fluidity.

Finally, before starting with the weathering effects done with enamels is extremely important to protect what we have done so far: apply couple of layers of satin varnish with the airbrush covering every part of the vehicle.



Remember to apply satin varnish before continuing with the next steps

## STEP 5 – FILTER

**T**he first weathering effect after painting the camouflage is a filter, and it is an enamel. Therefore, prepare an old brush and the White Spirit. A filter consists in a very thinned paint whose goal is to slightly change the colour of a surface. This is very useful for example when we force too much the highlights of the dunkelgelb with white, so that the surface it does not look dark yellow anymore, but cream. By using a dark yellow / orange filter we can recover the original dark yellow colour. We can also use a filter to create different weathering effects, such as dust if we use the appropriate colour.

Here, I used a brown filter for tritonal camouflages (A.MIG-1510), which not only will help to recover a little bit the dark yellow, but it will also harmonize the three colours used for the camo. To apply a filter, we need a flat brush (a rounded one will also work). After loading the brush with the filter, we discharge the most part of it on a piece of paper, and then we move to the tank. Applying the brush strokes in the same direction we cover the whole vehicle. Remember that to clean the brush you cannot use water, but you should use White Spirit instead. I normally let it cure overnight, since otherwise we can accidentally remove this layer in the following steps.



Apply the brush strokes in the same direction.

## STEP 6 - WASH

**T**he second weathering effect is a wash, which is also done with an enamel. Like the shades from Citadel or any acrylic wash or ink, a wash is a diluted paint whose idea is to highpoint the recesses with a dark color, defining each element of the tank. This serves to create even more contrast. Note that acrylic washes once are dry, we cannot touch them. Instead, Enamel washes cure in hours so that we can easily remove the excess or even remove completely if we do not like it, as you will see. An acrylic wash does not allow this.

I used a ready-made enamel wash from AMMO, the wash Brown for German Dark Yellow (A.MIG-1000). Note that you can always prepare your own wash by thinning a dark brown oil or enamel colour with White Spirit, but once again these ready-to-use products are handy and save time. After shaking the bot-

tle properly, with a thin brush we apply the wash only on the recesses (pin-wash). WE DO NOT APPLY the wash over the whole tank. No. Remember: exclusively on the recesses. Do not worry much if you accidentally put too much paint or if it is in the wrong place. Wait one hour or so until the enamel is partially dry (it does not look wet or does not reflect light anymore). Then, using a cotton swab or a brush moistened with White Spirit or turpentine we carefully remove the excess of the wash. The idea is to keep the wash only on the recesses.

Sometimes we remove too much enamel from the recesses, or in fact some recesses are not deep enough. In such cases, I normally use a thin brush and a dark brown acrylic paint (such as Dark oxide 302, Vallejo) to manually paint the recess.



Apply the wash exclusively in the recesses.



After 1h, remove the excess.

## STEP 7 - CHIPPING EFFECTS

**P**ut aside the enamels and White Spirit for this step. Next, we will apply the chipping effects and scratches, and we are going to use acrylic paints for this. The idea of this step is to show exposed metal areas where the original paint wore off. I normally do this effect in two steps. First, I use a lighter colour than the base (in our case, the lightest dunkelgelb color we used: highlights, A.MIG-904) which serves to create superficial scratches and chipping effects. That is, scratches that did not reach the metal. Second, I use a dark brown colour such as Chipping (A.MIG-044) to paint deeper effects, which expose the bare metal. We should paint the dark spots inside or close to the light ones, since the light colour around the dark one will create volume. However, do not paint all the light chipping effects with the dark colour! Only a few. Combine both types: superficial and deep chipping effects. To paint these effects I use a thin and sharp brush, and carefully paint the chipping effects on the edges of panels and exposed areas. For the scratches, I apply a quick brush stroke using tip. It is very easy to overdo this effect, and therefore remember that when weathering tanks, "sometimes less is more". Try not to fill the tank with chipping effects, and always follow the logic: chipping effects should be in the most exposed or utilized areas, such as hatches and edges.

In addition, we can paint now with different brown colours and metal the tools, boxes and other stowage, so that they will be weathered at the same time as the tank.



To simulate rust on the exhaust you can use different tones of red brown and orange, and simulate chipping effects with each one, layer after layer.



Use the light color to create superficial scratches



Then, use the dark color to simulate exposed metal



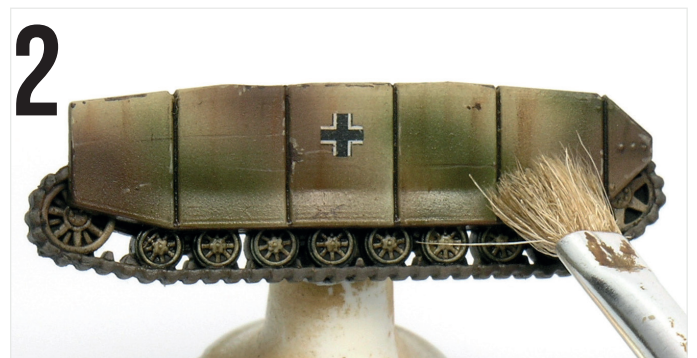
## STEP 8 - STREAKING EFFECTS

**F**or the next step we again will use enamels and oils. We are going to create streaking effects (rust, sludge, dust, etc) on vertical surfaces. The great advantage of enamels/oils is that we can easily paint a vertical line and then blend it to create an interesting blurred streaking effect. This cannot be done in the same way with acrylic paints. We can use the ready-to-use products from AMMO for streaking effects, although in this case I will directly use oils. I normally use two or three different colours for the streaking effects. The colour choice depends on the effect we want to create (i.e. light brown for dust) and the colour of the surface (i.e. a green streaking effect will be barely visible on a green surface). Here, I picked two: a very dark brown (A.MIG-3532) and a red brown (A.MIG-3510). The former serves to create general dirt while the second will give a nice rust tone.

Streaking effects are applied in two steps: first, we paint thin lines of the different oil colours in each vertical or inclined panel. Second, after waiting a few minutes, using a flat brush moistened with White Spirit we blend the oils applying vertical brush strokes, from the top to the bottom. Do not worry if you remove the most part of the oil. We can repeat the same process several time to build several layers of streaking effects. However, note that these effects should be subtle. Perhaps here and there we can paint a more notorious streaking effect. But once again, do not overdo this effect. You can also work more carefully a single streaking effect using a thin rounded brush rather than a flat brush to blend the line little by little.



Paint vertical lines with oils.



Blend the lines with White Spirit.

## STEP 9 - WEATHERING EFFECTS ON HORIZONTAL PANELS

**W**e cannot paint streaking effects on flat or horizontal surfaces (we do not have the gravity effect!). Instead, in these panels we can create accumulations of dirt or rust.

For this step I used the same two oils we used for the streaking effects: dark brown and red brown. First, we apply a little bit of oil in the desired area, and then we blend it with White

spirit. In this case we do not want to remove the excess as we did with the streaking effects. Instead, we want to distribute it over the horizontal surface. Using this technique, we can create points of interest by applying the oil only on some areas or part of these areas, rather than all over the whole surface.



Apply oils on close to different details and then blend them.



You can also create some points of interest in some parts.

## STEP 10 - DUST EFFECTS

**W**e can also use oils to create a minor dust effect on the lower part of the tank and schürzen. Here, I used another two oil brushes from AMMO: dusty earth (A.MIG-3523) and earth clay (A.MIG-3524). I applied a little bit of oil around the lower part of the tank, and then I blend it using White spirit. Once again, we do not remove the oil here like when doing streaking effects, but we blend and extend it around the lower part of the tank. Note that I mostly use the light dusty earth oil, but I added a little bit of earth clay to create a subtle different tone in some parts. You can play around with different oil colours depending on what you want to simulate.

Next, we will use a different product: pigments. Pigments are normally sold as powder, and they can be utilized in different ways. For example, we can use them directly from the jar to create subtle dust effects, or we can mix them with White Spirit to

create a short of wash. In this case, I used the second option. I picked couple of pigments: Europe earth (A.MIG-3004) and dark earth (A.MIG-3007) and mixed them 50% with White Spirit. Note that these two colours are indeed very similar to the oil colours we used previously. This is for the sake of consistency. Then, using a brush we apply the “wash” on the tracks and again on the lower parts of the tank, the same areas we previously worked with oils. Remember that weathering effects are created by the combination of several layers of effects, using different products and methods. We need to wait until the White Spirit is fully evaporated. This can take the whole night, although we can speed it up using the airbrush. Once is totally dry we can use a cotton swab or an old brush to extend and remove the excess of pigment. Finally, we can use a graphite pencil (or a regular soft pencil) to mark the metal parts of the tracks.



Apply a little bit of oil on the lower part.



Then, blend the dots with white spirit.





Apply the mixture of pigments and thinner on the tracks.



Let it dry and/or use the hairdryer.



Remove the excess of pigment.



Mark the metal parts with a pencil.

## STEP 11 - FINAL TOUCHES

In addition, using acrylic paints we can paint the crew and some other details of the stowage if we wish. Additionally, I painted some jerry cans separately and I now glued them on top of the tank using cyanoacrylate. I

applied the same weathering effects on them. However, this is not strictly necessary, since the crew could have added some fresh stuff on the tank. Play with this to tell a story!



# GALLERY

