



28MM SCALE STAR TREK MOVIE ERA STARFLEET FIGURES.

(Version 3)

Despite the popularity of the Star Trek franchise and the number of role-playing games there have been over the years there are few options for anyone wanting figures to go with them, whether officially licensed or designed to be compatible.

This document describes how to create 28mm scale figures of Starfleet personnel during the era from Star Trek II: The Wrath of Kahn to Star Trek VI: The Undiscovered Country.



Copyright notices:

Star Trek is the intellectual property of CBS/Paramount Pictures. These models are unofficial conversions and the copyright holders have not approved them.

Parts used are the copyright of their respective makers. They have not approved their use in this project.

OFFICER (MALE).

Parts list:

Legs taken from Games Workshop Cadian infantry.

Torso taken from Games Workshop tank accessory sprue.

Arms taken from Games Workshop Cadian infantry and tank accessory sprues.

Head taken from West Wind Games Berlin or Bust helmet less American Separate Head System set.



Modifying the torso.

There is an aquila and button on the front of the torso that need removing carefully. In addition to this the collar must also be cut away to leave the torso as shown.



Modifying the legs.

The legs also require excess details removing. These are the pockets on the thighs and the gaiters around the boots.



Modifying the arms.

Many of the arms from tank accessory sprues require less modification than the Cadian infantry arms do due to the lack of built in shoulder armour. If using arms from infantry kits this armour must be removed. There is also braiding present on one of the tank commander arms that needs removing. The only other modification needed is if the arm is gripping a weapon, in which case the weapon should be cut away to leave the hand free for a phaser made of plasticard. The hand may be removed and swapped or repositioned if desired.



Assembly.

The legs are now glued to the torso. The over the shoulder strap is made from a length of 1mm wide 0.25mm thick plasticard cut to a suitable length and glued in place. The Starfleet badge is made from a 1mm tall triangle of 0.5mm thick plasticard on a 3x1mm base of 0.25mm thick plasticard and is glued where the aquila was removed from. To better support the metal head, a 1mm hole is drilled into the torso so that it may be pinned in place.



The head is then glued in place and a collar made from green stuff. Any other equipment wanted on the figure is made from plasticard and added at this stage also. In the pictured example a medical probe has been placed in one hand and a medical kit slung over the shoulder. The completed figure is glued to a suitable base and is ready for painting.



OFFICER (FEMALE - METAL).

When the first revision of this document was written no multi-part figures suitable for converting to Starfleet figures were known to be available. Therefore, it was necessary to convert metal figures instead. In each case the figures were prepared by removing the unnecessary parts of the model using clippers, blade or a file before details were added using plasticard.

The process for converting these is unique to each figure so only general guidance is given.

EM-4 Miniatures Future Skirmish Female Cop with SMG.

This figure requires removal of belt equipment, jacket collar rear and weapon. A plasticard phaser was added as was the rear part of the shoulder strap.



Crooked Dice Game Design Studio Daredevil Pilot Katrina.

The shoulder strap and Starfleet badge are added in the same way as for the male plastic figures.

The pocket is removed from the leg and green stuff used to make the tunic look as if it opens at the right rather than centrally.



OFFICER (FEMALE -RESIN)

Parts list:

Legs taken from Victoria Miniatures Female Victorian legs

Torso taken from Victoria Miniatures Female dress uniform torsos.

Arms taken from Victoria Miniatures Dress uniform arms (female) and Tannenburg officer sprue (female).

Head taken from Victoria Miniatures Guthrie female heads.



Modifying the torso.

The collar, shoulder bars, chest badge and buttons are removed with a scalpel.



Modifying the legs.

The boots have gaiters that need removing so that the boots can be given a smooth appearance.



Modifying the arms.

Most of the Victoria Miniatures female arms are sculpted holding weapons that must be removed. The cuff and shoulder details will require trimming with a scalpel or filing down.



Assembly.

The assembly of the resin female officer matches the process for assembling the plastic male officer figures.

First the legs are glued to the torso then the over the shoulder strap is made from a length of 1mm wide 0.25mm thick plasticard cut to a suitable length and glued in place. The Starfleet badge is made from a 1mm tall triangle of 0.5mm thick plasticard on a 3x1mm base of 0.25mm thick plasticard and is glued where the chest badge was removed from.



The head is then glued in place and a collar made from green stuff. Any other equipment wanted on the figure is made from plasticard and added at this stage also. In the pictured example the figure has been given an assault phaser and communicator.

The completed figure is glued to a suitable base and is ready for painting.



ENLISTED CREWMAN.

Parts list:

Legs taken from Games Workshop tank accessory sprue.

Torso taken from Games Workshop sentinel kit.

Arms taken from Games Workshop Cadian infantry and tank accessory sprues.

Head taken from West Wind Games Berlin or Bust helmetless American Separate Head System set



Modifying the torso:

The torso is cut from the driver of a sentinel kit. This is sawed off just below the belt and the small box feature on the chest removed.



Modifying the legs:

In addition to removing the pockets and gaiters from the legs, there are two pouches that must be removed from the waist.



Modifying the arms:

The arms are modified in the same way as the officer's arms.



Assembly:

The parts are now stuck together and a hole drilled so that the head can be properly pinned. The head is glued in place and the collar made from green stuff. Equipment is added and the figure glued to a base for painting.



ARMoured SECURITY GUARD.

Parts list:

Legs taken from Games Workshop Cadian infantry.

Torso taken from Games Workshop sentinel kit.

Arms taken from Games Workshop Cadian infantry and tank accessory sprues.

Head taken from Games Workshop Cadian infantry.



Modifying the torso:

The torso is made in the same way as the enlisted man's torso.



Modifying the legs:

The legs are modified in the same way as the officer's legs. In this example kneeling legs from a heavy weapons team have been used.



Modifying the arms:

The arms are modified in the same way as the officer's arms. Since this is a security guard it is best to use one arm that has a hand firing a weapon so that a phaser can be added. A hand that is to hold a phaser must be able to have the magazine protruding beneath it so the bottom of the hand needs cutting flat as well as the top.



Modifying the head:

The Cadian helmet requires smoothing off. The aquila is removed from the front and the boxes from the side and rear. A 1mm tall triangle of 0.5mm thick plasticard is glued where the aquila was as the Starfleet symbol.

**Assembly:**

First the legs and torso are glued together. Then the armoured vest is fitted. To do this first glue on the main vest itself so that both front and back sit level with the belt. The thicker belt sections are then glued directly beneath this and the lower portions of the armour below these.

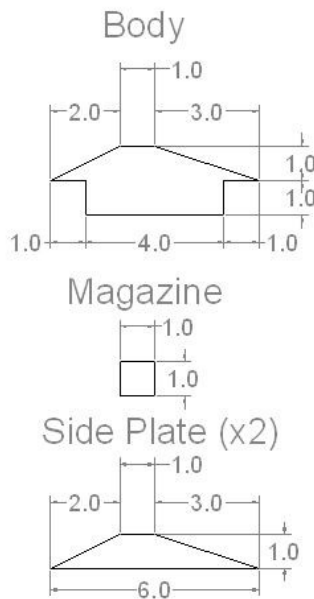


The arms and head are now glued in place. Because the head is plastic it does not require pinning to hold it in place. Equipment made from plasticard can now be applied and the model is mounted on a base.



MAKING THE EQUIPMENT

Assault Phaser



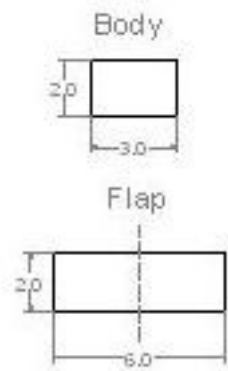
The assault phaser is made from five parts. The main body and magazine are cut from 1mm thick plasticard while the two side plates use 0.5mm thick plasticard. After cutting these pieces glue the side plates to either side of the main body so that the upper contours align.

The muzzle of the phaser is made from a narrow (about 1mm diameter) plastic rod that is cut to a length of 1mm and glued under the front of the weapon (the 2mm slope is at the front).

This assembly can now be glued to the hand of the model. The magazine is then glued beneath the hand to give it the appearance of protruding out of the bottom of the hand grip.



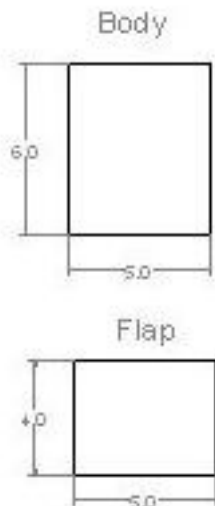
Communicator



The communicator requires a body made from 1mm thick plasticard and a front flap made from 0.5mm thick plasticard. The body is glued at one end of the flap and then the excess flap length is folded away from it slightly to give the impression of an open cover.



Medical Kit

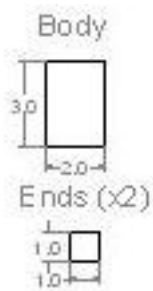


The body of the medical kit is cut from 2mm thick plasticard and a flap made from 0.5mm thick plasticard is then glued to the top of one face. A small (1mm tall, 1mm base) triangle of 0.5mm thick plasticard is glued to the centre of the flap as a Starfleet badge.

The shoulder strap is just a suitable length of 0.25mm thick, 1mm wide plasticard glued to either side of the kit.



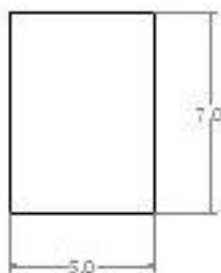
Medical Probe



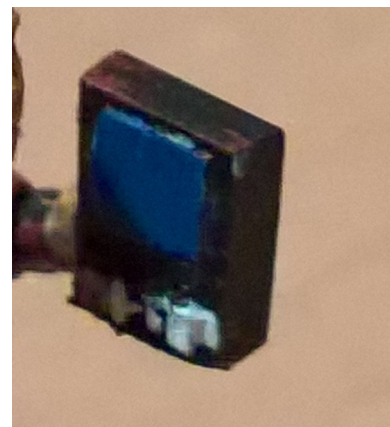
The body of the medical probe is made from a short length of 2mm thick plasticard while identical end segments made of 1mm thick plasticard are glued centrally at each end.



PADD

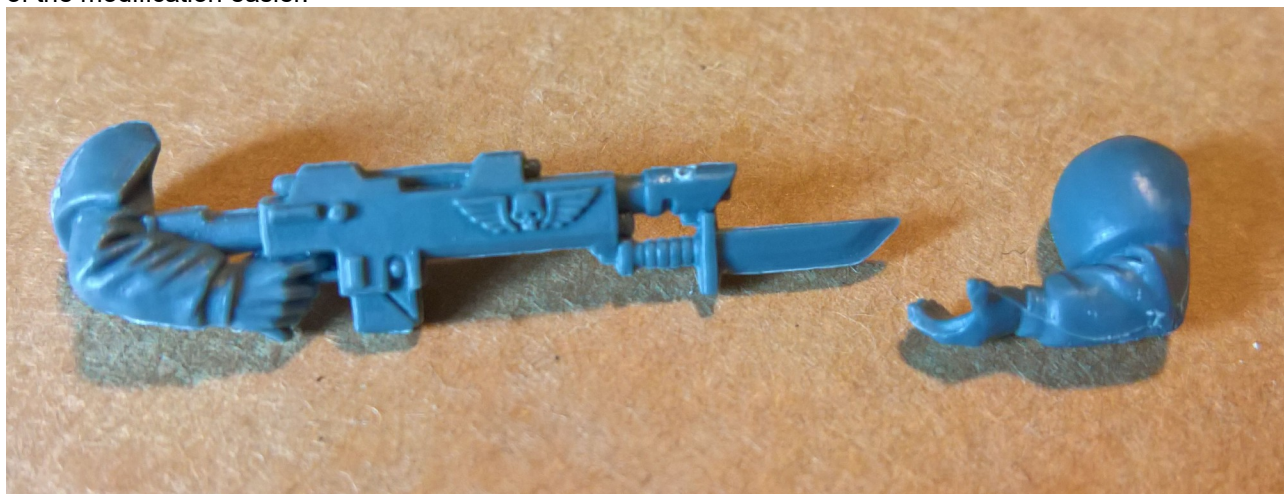


The PADD is a simple rectangle of 2mm thick plasticard. This is decorated with small pieces of 0.25mm/0.5mm thick plasticard to give the appearance of a screen and controls. I used a single screen (4mm square) and three buttons (1mm square) underneath.



Phaser Rifle

No Starfleet phaser rifle appeared in any of the original movies so this is just a hypothetical example of what is possible, converted from the lasgun of an Imperial Guard cadian trooper. This example uses the lasgun that does not have the left hand as part of the weapon itself. This makes some of the modification easier.



First the unneeded parts of the lasgun are removed. These are the magazine, bayonet and mount, the small protrusions from the upper section of the weapon and beneath the barrel and the muzzle to leave just the short plain length of barrel exposed.



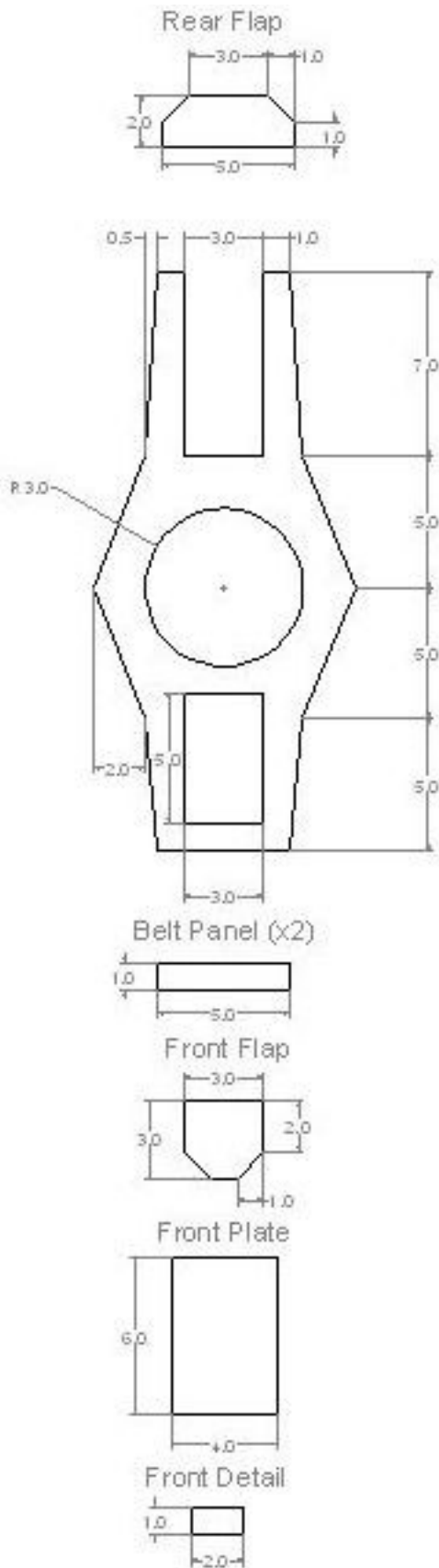
A piece of 2mm thick plasticard that is equal in width to the body of the weapon is then glued to the top it so that it extends from the front of the upper section to the end of what remains of the barrel. The sides and top of this are filed down to match the lasgun's upper section and the front is also given a slope back as far as the start of the barrel.



An optical sight is made from the detached muzzle section glued to the top of the lasgun. It is then ready to be fitted to a figure.



Security Armour



The security armour is the most complicated item of equipment for the figures.

The front and rear flaps, main body and front plate are all made from 0.25mm thick plasticard while the belt panels and front detail are made from 0.5mm thick plasticard. Also needed are two 3x1mm rectangles of 0.25mm thick plasticard for shoulder guards (not shown in plan or photo).

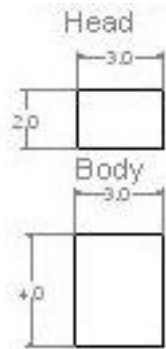
Firstly the front plate is glued behind the hole in the front of the main body so that it blocks it entirely. Then the front detail is glued to the exposed panel close to the bottom of the visible area.

The main body is then glued over the torso of the model so that the ends line up with the figure's belt. Both belt panels are then glued below the main body and the front and rear flaps glued below these.

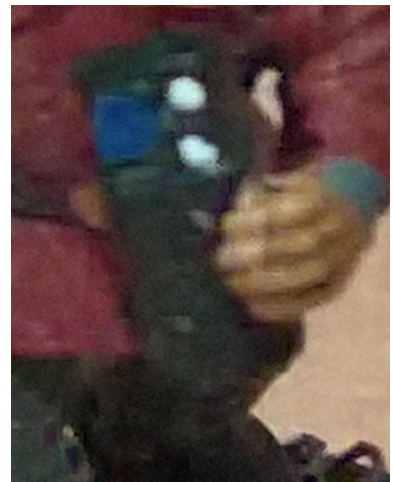
As a final touch the shoulder guards are glued to the shoulders of the main body.



Tricorder



The tricorder is made from a body of 2mm thick plasticard with a head section of 1mm thick plasticard glued to the top. The head is then decorated in the same way as the PAD. I used a 1.5mm square screen and two 0.5mm square buttons beside it.



NOTES REGARDING AVAILABILITY OF PARTS

The Cadian Imperial Guard parts used in this document other than those on the tank accessory sprue have been discontinued by Games Workshop, though they may be available second hand.

The following suppliers and parts may also be suitable instead:

Anvil Industries – Dress uniform legs

Victoria Miniatures – Male equivalent parts to those used for the resin female officer.

REVISION HISTORY

Version 1

Original document including plastic male officers, enlisted crewmen, security guards and metal female officers.

Equipment section contains assault phaser, communicator, medical kit, medical probe, PADD, tricorder.

Version 2 – September 2017

Added section for multi-part resin female officer figures.

Corrected thickness of plasticard used for medical kit.

Added phaser rifle to equipment section.

Version 3 – January 2024

Added section about availability of parts.