

Installation Instructions for NPATR51A (D) <u>Nissan Pathfinder R51 Diesel</u> <u>120L Auxiliary Tank</u>

This Auxiliary tank fits under the rear of the vehicle and takes the place of the spare wheel. Fuel is transferred via an electric pump that will pump fuel from the auxiliary tank into the OEM tank. A combination switch/gauge will be located into a suitable position in the dash. When the switch is in operation an ORANGE light will be ON, indicating that the transfer pump is in operation. A series of lights will also indicate fuel level. All GREEN lights on showing FULL, one RED flashing light showing EMPTY.

(DO NOT OPERATE TRANSFER PUMP WITH NO FUEL IN AUXILIARY TANK OR PUMP FAILURE WILL OCCUR).

- 1. Select a suitable location in the dash to mount the switch/gauge unit. We suggest 24mm to the left of the mirror control from the LH edge. A 12V ignition source can be found at the back of the ignition barrel (red wire). Complete the wiring as per diagram and run the twin core sheathed cable to the rear of the vehicle.
- 2. Remove the spare wheel and unbolt the wheel winch. Unbolt the front tyre support bracket. Unclip the wiring from the top of the rear suspension crossmember. Place the new front secondary tank mounting bracket and locate with 1 x M6 Bolt previously removed from the tyre support bracket. Clamp bracket in position and drill the two outside holes on the top of the crossmember. You need a short right angle drill for this or drill a small hole to mark the position and then drill up from the underside with a long drill. Bolt in place with M10 x 30mm bolts with strap attached M10 x 25mm washers' spring washers and plain nuts. Ensure that the strap on the bolt does not foul on the suspension arm! Reclip the wiring in position.
- 3. Unbolt the two rear towbar mounting bolts and refit with the two new rear crossmember mounting stumps. **Note:** If the vehicle has the <u>KAYMAR</u> bar and the two cross member mounting stumps are not required, bolt angle crossmember in position with M10 x 30mm bolts, washers and Nyloc nuts. (Use the 2 x 30mm large washers on the LHS).

- 4. Remove LH rear splash shield. Disconnect the fast fill and filler hoses from the filler neck. Blank off the tank end of these pipes and cut the original filler neck and fast fill pipes 30mm above the mounting bracket. (Note: It is virtually impossible to get the filler neck assembly out in one piece). Ensure to file any sharp edges/bars from filler pipe and refit tank end section to vehicle.
- 5. Screw brass fittings into the new filler neck; 2 x P6 5/8 x 3/8 elbows into the top of the neck pointing in the same direction as the fill pipes. 1 x P6 5/16 x 1/8 elbow into the short (main tank) leg of the filler. This becomes the port for the transfer pump to pump into the main tank. Fit the new twin filler in position with 38mm & 35mm hoses and original mounting rubber. You will need to drill a new mounting hole for the original fill pipe mount, forward of the original. Secure with original bolt and new M6 Nyloc nut and washer.
- 6. Screw the two remaining brass fittings into the tank. P3  $5/8 \times 3/8$  straight rear to the filler and P6  $5/16 \times 1/4$  elbow into the pick-up in the front of the tank. Pointing out to left hand side. Connect sender unit and earth wire and lift tank into position. Secure with Nyloc nuts and washers.
- 7. Mount the fuel transfer pump. We suggest mounting it to the inner panel below and to the rear of the filler. Complete connection of all remaining hoses and fuel transfer line. Neatly cable tie all hoses and wiring. Replace splash shield. Fill with fuel and check operation.



## FITTING KIT CONTENTS NPATR51A(D)

Brass:	Electrical:
○ 1 x P6 5/16 x 1/4 Elbow	○ 1 x LRA-PG210 switch/gauge unit
o 2 x P6 5/8 x 3/8 Elbow	○ 1 x 3mm two core @ 7m
○ 1 x P6 5/16 x 1/8 Elbow	○ 1 x 4mm Single Core Blue Wire @300mm
<ul> <li>1 x P3 5/8 x 3/8 Straight</li> </ul>	o 1 x 5AMP Fuse
	○ 1 x Fuse Holder
	<ul> <li>2 x Fuse Holder Terminals</li> </ul>
	<ul> <li>1 x Red Plain Terminal</li> </ul>
	<ul> <li>1 x 5mm Red Eye Terminal</li> </ul>
	<ul> <li>1 x 6mm Blue Eye Terminal</li> </ul>
	o 3 x Heat Shrink Tube @ 25mm
Bolts / Nuts:	Misc Parts:
<ul> <li>4 x M10 x 30 bolts</li> </ul>	○ 1 x Twin Filler Neck
<ul> <li>16 x M10 x 25 flat washers</li> </ul>	○ 1 x 50 x 50 x 5 angle @ 937mm long with
<ul> <li>2 x M10 spring washers</li> </ul>	M10 x 30 welded
<ul> <li>10 x M10 Nyloc nuts</li> </ul>	<ul> <li>1 x front secondary bracket with 2 x M10</li> </ul>
<ul> <li>2 x M10 plain nuts</li> </ul>	x 30 welded
o 1 x M6 Nyloc	$\circ$ 1 x 38mm 90° with 40mm straight pipe
<ul> <li>1 x M6 x 20 washer</li> </ul>	both ends
○ 1 x TEK screw	<ul> <li>2 x rear crossmember stumps – L &amp; R</li> </ul>
<ul> <li>2 x M14 x 5mm Washer @30mm</li> </ul>	
(Profile Cut)	<ul> <li>2 x M10 x 30mm bolts with 250mm straps</li> </ul>
Hose Clamps:	Hose:
o 6 x 1/4" hose clamps	○ 1 x 8mm hose @ 650mm
<ul> <li>4 x 5/8" hose clamps</li> </ul>	○ 1 x 8mm hose @ 900mm
<ul> <li>6 x 1 ¼" hose clamps</li> </ul>	○ 1 x 6mm Conduflex @ 500mm
	○ 2 x 38mm hose @ 90mm
	○ 1 x 16mm NTP hose @ 230mm
	○ 1 x 16mm NTP hose @ 600mm
	o 1 x 35mm fuel hose @ 80mm
Pumps & Filters:	Cable Ties:
o 1 x Fuel Pump & Filter	o 25 x 7" cable ties
<ul> <li>1 x Fuel Pump Mounting Plate</li> </ul>	

Sender:	5 Pages of Fitting Instructions Consisting of:
o 1 x 0-90 OHM Fuel Sender Unit	<ul> <li>2 x page fitting instructions</li> </ul>
C/W 500mm earth, Installed Using:	<ul> <li>2 x pages fitting kit contents</li> </ul>
- 5 x M5 x 10 Pan Heads	<ul> <li>1 x drawing #WDSPG210</li> </ul>
- 5 x M5 Spring Washers	

Kit Packed By\_\_\_\_\_

Checked By \_\_\_\_\_

