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**NOTE:** This kit consists of resin castings and must be assembled with an ACC cement (not provided) – both the thicker types as well as the thin. Solvent cements will <u>NOT</u> bond the parts together! Resin parts are more fragile than common styrene plastic used in injection molded models. Use reasonable care in handling.

## GE DEPRESSED CENTER FLAT GEX 80003

# **GEX 80003 PARTS**

.0	Part		
n N	No.	RADE DESCRIPTION	Y.
Iter		PART DESCRIPTION	QT
1	7021-1	Center Beam - Flat Bed	1
2	7021-2	Beam Ends	2
3	7021-3	Upper Span Bolster	2
4	7021-4	Bolster Deck	2
5	7021-5	Hyd. Cover	2
6	7021-6	Fulcrum	2
7	7021-7	Pivot Cradle	2
8	6507-9	Center Truck Bolster	2
9	7021-9	End Truck Bolster Top	2
10	6507-8	End Truck Bolster Bottom	2
11	7021-11	Control Cabin (set)	1
12	7021-12	Diesel Motor	1
13	7021-13	Storage Box	1
14	7021-14	Control Panel	1
15	7021-15	Tank Assembly	2
16	7021-16	End Deck	2
17	7021-17	Upper Bolster Deck	4
		Extension	
18	7021-18	Pivot Guides	4
19	1012	Coupler Cover	2
20		1/8" - 1/4" Long Tube	2
21	1013	1/8" 2-56 Screws	2
22	1016	3/8" 2-56 Screws	16
23	1017	1/2" 2-56 Screws (Changed)	0
24	1010	Brake Wheel	2
25	1021	Brake Stand	2
25	1020	Brake Reservoir	2
26	1018	Brake Valve	2
27	1019	Brake Cylinder	4
28		Control Cabin Roof	1
		6'x6'x.020	
29		Washers, 1/8" I.D.	8
30		.125"x.188" styrene spacer	2
31	1011	Small Pins for Brake Wheels	2
32	7021-0	Decals	1
33	7021-0	Instructions	1

## <u>Gluing with ACC</u> <u>Cements – USE WITH</u> <u>CARE</u>

ACC cements allow the modeler to work very quickly. A general rule is to use the thin cements to glue long joints taking advantage of capillary action that makes the cement run the length of the seam. The thicker cement is suited to applying large area parts to each other. An accelerator can be applied sparingly. One technique is to apply the glue to one part and the accelerator to the other part to be joined. I also use a Q-tip to apply a minute amount of accelerator to the glue after the parts have been joined. The accelerator triggers the ACC cement to set very quickly. It is only slightly slower with the thicker cement. Work very carefully when positioning the parts for gluing. ACC cements adhere very quickly and permanently

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# **Tools Required**

All basic model workers tools – files, motor-tool with burrs, hobby knife, 1/8" drill, Wood blocks for holding parts square, metal square, etc.



A gluing fixture is a great aid to assembly. It helps hold parts square while gluing.

**PREPARATION** Wash the parts before assembling with a dish washing detergent such as "Dawn". Rub lightly with a soft sponge.

# END TRUCK BOLSTERS Make 2

1 Glue the End Truck Bolster Top (9) to the End Truck Bolster Bottom (10). Use a #44 drill or similar to guide the parts together. Alignment is important since the part pivots.

2 Glue the End Deck (16) in the remaining space above the coupler pocket..





**3** Install the Tank Assembly (15) in the space on the left as shown



4 Install the Brake Reservoir (25) and the Brake Valve (26) on each End Deck as shown.



5 Trial fit the bolsters to the trucks using 3/8" 2-56 screws. Use two 1/8" I.D. washers to shim up the 4-wheel trucks.

## **UPPER BOLSTERS**

1 Cement the Upper Bolster Deck (4) to the Upper Span Bolster (3). Use screws to align the parts as shown, if desired. Fill the top deck holes but not the screw hole underneath. Trim all of the supports on the sides to be flush with the deck and lower flange.

2 Drill 1/8" hole to a depth of approximately 3/16". Do not drill all the way through.

**3** This is an optional step to install an alternate pivot hole for ease of operation. Locate the Pivot Cradle (7) and use a 1/8" drill ream out the holes at each end. Install a 1/8" rod through the narrow end of the Pivot Cradle and into the hole drilled in the previous step.







**4** Install the Upper Bolster Deck Extension (17) and the Pivot Guides (18) as shown in the photo. The deck extension must not conflict with the Pivot Cradle(7).

5 Fit the Fulcrum (6) to the Pivot Cradle (7). File to fit so that the Fulcrum can be allowed to pivot to allow what will be in line





6 Attach the Fulcrum to the .125"x .188" spacer (30). Set aside. The spacer can be increased or decreased when fitting the main beam assembly to the car ends.



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Assemble the Control Cabin (11) as shown. Note that the sides overlap the ends. Curve the .020" styrene roof and cement to the curve ends using ACC cement.

Assemble the truck bolsters to the Upper Span Bolster assemblies with 1/2" 2-56 screws. The end with the Pivot Cradle points to the center of the car. Attach the Control Cabin (11) assembly and the Tool Box (13) to one of the Upper Span Bolster as shown. The Tool Box is right up against the end. Install the Diesel Motor (12) and the Control Panel (14) as shown on the other Upper Span Bolster. Install the Brake Stand (25) and Brake Wheel (24) on the end deck with the brake wheel facing the center of the car. Use the 1/8"x 2-56 screws to attach the coupler pockets.







# MAIN BEAM ASSEMBLY

1 Read all of this page before attempting assembly. You will have to work quickly with the ACC cement.

The smooth side of the Center Beam should face up when the model is finished. Check the alignment of the screw holes of the Beam Ends and the Center Beam. They only align in one direction. Attach the Beam Ends (2) loosely the Center Beam (1) using 2 - 1/2"x2-56 screws.

2 Apply ACC cement to the joint between the Beam End and the Center Beam and snug up the screws but not too tight.





**3** Flip the assembly over and adjust to Beam End to measure 6 scale feet (approx. 53/64") from the flat. (Center Beam sitting on the flat. Allow the cement to set. Apply Squadron's Green putty to any gaps and sand smooth.



4 Place the assembled car ends on the track and fit the assembled main beam to the with the fulcrum pieces riding in the cradles. The gel ACC cement should be used here since it sets slower. After making sure that the main beam is straight and centered, cement the end beams assembly to the fulcrum/spacer assembly.



5 Cement the Hydraulic Cover (5) to the end of the car as shown.

**b** If you haven't already, attach the trucks. Note that the 4-wheel trucks reside in the center under each Upper Span Bolster.

Test the car for rolling characteristics. Shave away the bolster areas to give wheel clearance for the radius of track. Make sure that the ends of the Upper Span Bolsters are the same height from the rail.

The Main Beam assembly is heavy enough that the fulcrums should stay in the pivot sockets. If necessary, build up the sides of the pivot socket that the fulcrum rests in the small pieces of styrene.



# PAINTING

The separated section of the car should be painted with a gray primer and allowed to dry thoroughly - like overnight.

The Main Beam section is painted Yellow. The best results with yellow or light colors is to always pain the car white after the primer coat. This ensures the best coloration. I like CNW Yellow by Floquil since it is a gloss and accommodates decaling.

The Upper Span Bolster is painted a light blue similar to Conrail Blue by Floquil. Precoating with white is a good idea for all light colors.

The End Truck Bolster is painted entirely white including the top deck and all attached parts. The Center Truck Bolster may also painted white. Available photos indicate a weathered dirty white on the truck bolsters except for the end decks. Another photo shows the Upper Span Bolsters painted black. No date data on the color schemes is available at this writing.

Overcoat the entire car with Testor's Glosscote prior to decaling.

# DECALING

The decals must be cut out with a sharp knife or sissors. Wet the decal and slide the backing onto the model. DO NOT SOAK IN WATER AND ALLOW THE DECAL TO FREE ITSELF FROM THE BACKING. The decal film is very thin and almost impossible to handle without the backing. Use a decal setting solution such as Champ's Decalset to set the decal. After the decals are dry, overcoat with Testor's Dullcote.



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