

RFI 152

PROCEDURETitle : Class 108 Engine Mounting Check

All Safety precautions must be observed at all times before and during the following procedure.

PROCEDURE FOR FRONT ENGINE MOUNTING

1. Ensure that all engines to be examined are stopped and isolated (SAFETY CONDITION 1).
2. Examine the mounting for "type" 680/1 Solid Casting or 680/13 "Metzler" if "Meltzer" type proceed as follows.

EXAMINATION OF METZLER MOUNTING

1. Examine the mounting for any signs of loose or missing bolts.
2. Examine the bump stop clearance. This should be no less than 5 m/m.
3. Examine the bump stop and the top two cross bolts ferrules for signs of contact.
4. If the mounting does not satisfy the proceeding checks, remove the mounting from the engine and underframe for attention before re-fitting. See Metzler Mounting Attention

REMOVAL OF BOTH TYPES OF MOUNTING

1. Using a re-railing bridge (MPD) and "Hydralite" jack or some other safe means support the front end of the engine using a suitable packing between jack and engine to prevent damage, raise the engine sufficiently to relieve the weight from the mounting.
2. Disengage the engine from the mounting bracket and lower the engine sufficiently to allow access to the underframe mounting.
3. Remove the underframe mounting, either the "Metzler" or the solid costing from the vehicle.
4. Re-clean the underframe mounting area, using a dye penetrant NDT method check the frame for fractures particularly around the bolt holes (Report any fractures to the supervisor).
5. Should the area be free of any fractures re-assemble the mounting and resecure the engine.

METZLER MOUNTING ATTENTION

1. If the mounting does not meet the criteria previously described, dismantle the mounting and rebuild with the following new components from the material list below.

MATERIAL

DESCRIPTION	NO REQUIRED	BR CAT No
Metalastik Bobbin	2	15/11290
Ferrules	4	15/4133
Bolts	4	3/100635

After re-assembly to the engine and with engine weight re-applied measure the clearance between the casting bump stop and the top ferrule this should be no less than 5 m/m

## REAR ENGINE MOUNTING

1. Examine the area supporting the rear mounting castings if this support beam is steel no further checks are required. Should this beam be aluminium proceed as follows.
2. Using a re-railing bridge (MFD) and a "Hydralite" jack support the rear of the engine, use a suitable piece of packing between the jack and the engine to prevent damage/raise the engine sufficiently to release the weight from the mounting.
3. Disengage the engine from the mountings, release the torque reaction shock absorber and reaction links and lower the engine sufficiently to allow removal of the mounting castings.
4. Remove the mounting castings from the support beam.
5. Re-clean the mounting support beam and using dye penetrant NDT method check the mounting faces and holes for fractures (Report any fractures to the supervisor).
6. Should the area be free of fractures re-assemble the mountings to the underframe and re-secure the engine.

NOTE: To lower the engine rear sufficiently to access the mountings it may be necessary to disconnect the free wheel shaft from the fluid coupling.

Should any fractures be discovered, they must be reported to the supervisor who must arrange for the Maintenance Engineer, Express and Heritage, Room 226 Trent House, RTC, Derby to be informed immediately, also if any difficulty is experienced with this procedure Telephone 0332 42442 Ext 2929 or 3413.