not corrected, could result in the loss of function of the hydraulic system.

The service bulletin describes procedures for modification of the main hydraulic power system. The modification involves replacing the hipressure switches on the hydraulic case drain on engine numbers 1, 2, and 3 with plugs; removing one relay and one receptacle on the aft relay panel of the equipment rack; replacing the existing legend in position 8 on the flight engineer's annunciator panel with a blank legend; and revising the wiring for indicating the aircraft hydraulic temperature and pressure. Accomplishment of this modification will minimize the possibility of loss of hydraulic fluid.-

Three of the 12 service bulletins describe procedures for modifications of the landing gear:–

10. McDonnell Douglas DC–10 Service Bulletin 32–134, dated March 22, 1977, was issued in response to reports of damage to the electrical and hydraulic installations of the aft antiskid manifold on the main landing gear. The damage resulted from blown tire fragments and debris, which rendered the antiskid system inoperative and, in one case, ruptured a hydraulic pipe. Failure of the pipe, if not corrected, could cause hydraulic system numbers 1 or 3 to become inoperative due to the loss of hydraulic fluid.–

The service bulletin describes procedures for modification of the aft antiskid manifold on the left and right main landing gear. The modification entails installing a protective shield and associated brackets on the aft antiskid manifold. Accomplishment of this modification will minimize the possibility of damage to the aft antiskid manifold.–

11. McDonnell Douglas DC-10 Service Bulletin 32–143, dated August 8, 1978, was issued in response to reports of damage to the brake piping that is routed between the antiskid manifolds and the swivel glands of the main landing gear. This damage occurred as a result of the impact of debris following failure of a tire on the main landing gear. A ruptured antiskid return pipe could result in loss of fluid from the affected antiskid system during application of the brakes. A single failure of a pressure pipe will limit brake performance on a single system. Failure of brake pressure pipes in both systems, if not corrected, could result in complete loss of braking capability.-

The service bulletin describes procedures for installation of protective shields over the brake and the antiskid piping located on the aft side of the left and right main landing gear. Accomplishment of this modification will minimize the possibility of brake pressure and damage to the antiskid return piping caused by failure of a tire on the main landing gear.–

12. McDonnell Douglas DC-10 Service Bulletin 32–157, Revision 1, dated October 29, 1980, was issued in response to a report of damage to a support bracket on the aileron trim cable and to a flight control mixer in the wheel well of the centerline landing gear. Investigation revealed that the damage was caused by the impact of a tire tread that was thrown into the open area created by the aft doors on the centerline landing gear when the landing gear is in the down position. This condition, if not corrected, could result in damage to components located in the wheel well of that landing gear.-

The service bulletin describes procedures for installing a doubler on the web assembly between the wheel wells of the center landing gear and the right main landing gear; installing a fiberglass deflector assembly on the shock strut of the centerline landing gear; replacing the pressure gage manifold of the shock strut; and installing an instruction plate and adding precaution instruction markings in the wheel well of the right main landing gear and on the forward door of the center landing gear. Accomplishment of this modification will minimize the possibility of damage to components in the wheel well of the centerline landing gear caused by a thrown tire tread or other debris.

Explanation of the Proposed Rule-

Since an unsafe condition has been identified that is likely to exist or develop on other products of this same type design, the proposed AD would require various modifications of the flight controls, hydraulic power systems, and landing gear. The actions would be required to be accomplished in accordance with the McDonnell Douglas service bulletins described previously.–

The FAA is continuing to review the recommendations of the SRTF working group for these airplanes and may consider further rulemaking based on those recommendations.–

As a result of recent communications with the Air Transport Association (ATA) of America, the FAA has learned that, in general, some operators may misunderstand the legal effect of AD's on airplanes that are identified in the applicability provision of the AD, but that have been altered or repaired in the area addressed by the AD. The FAA points out that all airplanes identified in the applicability provision of an AD are legally subject to the AD. If an airplane has been altered or repaired in the affected area in such a way as to affect compliance with the AD, the owner or operator is required to obtain FAA approval for an alternative method of compliance with the AD, in accordance with the paragraph of each AD that provides for such approvals. A note has been included in this notice to clarify this requirement.

Cost Impact-

There are approximately 427 Model DC–10 series airplanes and Model KC–10A (military) airplanes of the affected design in the worldwide fleet. The FAA estimates that 254 airplanes of U.S. registry would be affected by this proposed AD.–

Approximate work hours to accomplish the proposed actions and costs for required parts are listed in the following table. The average labor rate is \$60 per work hour.

Service bulletin No.–	Esti- mated work hours–	Parts cost per air- plane	Total cost per air- plane
27–71	5	(1)	\$300.00
27–120	3	\$68.00	248.00
27–152	1	278.00	338.00
27–181	5	431.00	731.00
27–201	10	7,943.00	8,543.00
27–208	5	3,704.00	4,004.00
27–209	9	N/A	540.00
29–109	101	713.00	6,773.00
29–125	4	498.00	738.00
32–134	3	2,034.00	2,214.00
32–143	3	649.00	829.00
32–157	6	46,463.00	46,823.00

¹Required parts would be supplied by the manufacturer at no cost to operators.-

Based on these figures, the total cost impact of the proposed AD on U.S. operators is estimated to be \$18,308,574, or \$72,081 per airplane.–

The total cost impact figure discussed above is based on assumptions that no operator has yet accomplished any of the proposed requirements of this AD action, and that no operator would accomplish those actions in the future if this AD were not adopted.–

The number of required work hours, as indicated above, is presented as if the accomplishment of the actions proposed in this AD were to be conducted as "stand alone" actions. However, the 24month compliance time specified in paragraph (a) of this proposed AD should allow ample time for the actions to be accomplished coincidentally with scheduled major airplane inspection and maintenance activities, thereby minimizing the costs associated with special airplane scheduling.–