



PASSING BY

Newsletter from RMF Systems

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SYSTEMS FOR SIMULATORS

RMF Systems filters are particularly well suited for use with complex hydraulic systems. It is therefore no surprise that the simulation industry contains many satisfied RMF customers. Many Flight Simulator Centres throughout the world are retrofitting their hydraulic power units with RMF Systems off-line filters.

Flight Simulators are equipped with state of the art servo valves and hydraulic cylinders. The hydraulic system can undoubtedly be considered "High Tech", but is also extremely "dirt sensitive". The hydraulic power units are often



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fitted with expensive full-flow filters to maintain suitable cleanliness levels of the hydraulic fluid, but older simulators often have insufficient filtration. When satisfactory cleanliness results are reached it is at HIGH COST. The full flow filter elements are expensive and must be changed frequently. Applying RMF Systems off-line filters to the hydraulic power units offers

numerous advantages. Firstly, it brings the fluid cleanliness level to a point where there are hardly any solid particles left in the fluid to cause component wear. Secondly, it considerably increases the service life of the full-flow filter elements. This extended component and filter life is a major saving for the simulator operator. RMF filters not only remove solid particles from the oil, but also eliminate water contamination. Additional advantages can be found in the extended hydraulic fluid service life and reduced downtime.

RMF Systems testing

Initially only operators of simulation equipment grasped the benefits of using RMF Systems filters. A leading role was played by Lufthansa AG in Frankfurt, Germany. This training centre for Lufthansa has a large number of Flight Simulators. One of these, a FT 19 for the Boeing 737-300/500 aircraft was equipped with an RMF Systems filter type OL226.



The Flight Simulator's hydraulic power unit was monitored for well over a year, and the

contamination level of the hydraulic fluid reached extreme low levels, which were maintained throughout the year. Usage of full-flow filter elements was dramatically reduced, and incidental servo valve problems were completely eliminated. Currently all Flight Simulators in the Frankfurt Centre have been retrofitted with RMF Systems filters and the Lufthansa Flight Simulator centre in Berlin has started their retrofit program. Since the first success with Lufthansa many other Flight Simulator centres, including British Airways, Monarch Airlines, South-West Airlines, Finnair and others have followed their lead.

Manufacturers

Manufacturers of simulation equipment are gradually also becoming aware of the benefits of RMF Systems filters for their products. A good example is the German manufacturer SIMTEC, short for Simulation Technology GmbH. Simtec manufactures a range of simulators, such as the one for the Dornier DO228 aircraft, and a variety of joy-ride simulators for the entertainment industry. They also tested RMF systems for a well over a year and now fit RMF Systems off-line filters to all their newly built hydraulic power units. For the World Expo 1998 in Lisbon they designed a record-breaking simulator. It has a diameter of 11 meter, weighs 20 Tonnes and



can carry 80 passengers. As a six-axe platform, an entire cinema moves through the underwater world of an ocean. The waiting time for the public for this ride could get up to two hours, and therefore no system failures were permitted. RMF off line filters were fitted to ensure optimal system cleanliness.

At Expo 2000 in Hannover, RMF systems are used on a sensational joy ride with a Vespa scooter set in the year 1950.



RMF Systems users

Flight Simulator operators using RMF Systems filters include:

- ❑ **British Airways Flight Simulator Centre
United Kingdom.**
- ❑ **Monarch Airlines Flight Simulator Unit
United Kingdom**
- ❑ **Simtec GmbH
Germany**
- ❑ **Lufthansa AG Frankfurt
Lufthansa AG Berlin
Germany**
- ❑ **South-West Airlines Flight Operations
Training Centre
U.S.A.**
- ❑ **Asian Air Training Centre
Thailand**
- ❑ **Kuwait Airways Corporation
Kuwait**
- ❑ **Finnair
Finland**

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