INTRODUCTION

In Jaguar aircraft, gaseous oxygen is delivered to the aircrew on demand through each crew member’s mask. This oxygen supply in normal conditions is from the main oxygen converter system of aircraft. In emergency conditions, gaseous oxygen is supplied from a seat mounted emergency oxygen cylinder, operation of which is initiated by a manual control or automatically during ejection. Anti ‘G’ suit supply is from the main oxygen supply only.

Personal Equipment Connector (PEC) Assembly

The Personal Equipment Connector (PEC) Assembly, fitted on the port side of the ejection seat pan, enables the main oxygen, emergency oxygen, communication services and the anti ‘G’ suit supply to be connected or disconnected in one action. The assembly comprises of PEC Aircraft Portion, PEC Seat Portion and PEC Man Portion– which is a part of flying clothing of the aircrew and is connected to the top surface of the seat portion when the aircrew straps in.

Figure 1. Jaguar PEC (Man Portion)

The man portion of the PEC (Figure 1) is part of the aircrew flying equipment and is only connected before flight. The man portion has an operating handle fitted to the rear. Below the handle, fitted to the body, is a roller to reduce friction during pull-off. The handle is fitted with a lanyard, the free end of which is attached to the flying clothing of the aircrew. During pilot-seat separation in an ejection sequence, the lanyard gets pulled thus releasing the man portion from the seat portion. The front of the PEC man portion is tapered to allow correct fitment under the top clamp plate of the seat portion and the locating pin positioned at the front engages in the corresponding slot in the seat portion.

Function of Jaguar PEC (Man Portion)

The Jaguar PEC (Man Portion), fitted on the port side of the ejection seat pan, enables the main oxygen, emergency oxygen, communication services and the anti ‘G’ suit supply to be connected or disconnected in one action during routine usage and in emergency.