

ABSTRACT**System for supplying electrical energy to an on-board network of a submarine**

This system, including energy storage means (1) based on lithium batteries and means (5, 10, 12) for distributing this energy to user loads, comprising means (9, 11, 14) for cutting off and isolating branches (13) for connection of the user loads in particular in the event of a short circuit, is characterized in that it includes means (17) for monitoring the evolution of the output current of the energy storage means in order to detect the occurrence of a short circuit in the network, means (6, 7, 8) for disconnecting the energy storage means from the rest of the network in the event of such a detection, means (16) for connection to the network, means (15) for generating a controlled short-circuit current, in order to trigger the operation of the cutoff and isolation means (14) associated with the short-circuited branch (13), so as to isolate the latter from the rest of the network, means (16) for disconnecting the short-circuit current generator (15) from the network, and means (6, 7, 8) for reconnecting the electrical energy storage means to the rest of the network.

Figure 1.