WHAT IS CLAIMED IS:

1. An aircraft (1) of a modular type including:

· at least one rotor (2) suitable for providing in full or in part propulsion and/or lift for the aircraft (1);

· at least one power plant (3, 13) of the combustion engine type or of the electric motor type;

· a main gearbox (4), for mechanically transmitting drive torque generated by the at least one power plant (3, 13) to the at least one rotor (2); and

· an avionics system (5) for assisting in piloting the aircraft (1);

wherein the aircraft (1) further includes:

· at least two electrical connection interfaces (6, 7) that are continuously electrically connected to the avionics system (5), a first electrical connection interface (6) electrically connecting the avionics system (5) to a first power plant (3) of the at least one power plant (3, 13) and a second electrical connection interface (7) either being left free or electrically connecting the avionics system to a second power plant (13) of the at least one power plant (3, 13); and

· at least two mechanical connection interfaces (8, 9) continuously mechanically connected to the main gearbox (4), a first mechanical connection interface (8) mechanically connecting the main gearbox (4) to the first power plant (3) and a second mechanical connection interface (9) either being left free or mechanically connecting the main gearbox (4) to the second power plant (13); and

· wherein the avionics system (5) is configured for automatically providing the assistance in piloting the aircraft (1) firstly when only the first power plant (3) is electrically connected to the first electrical connection interface (6) and secondly when both the first power plant (3) is electrically connected to the first electrical connection interface (6) and the second power

plant (13) is electrically connected to the second electrical connection interface (7); and

wherein the first power plant (3) is arranged in such a manner as to be retractable relative to a structure (10) of the aircraft (1) and is configured to be replaced with another power plant of the combustion engine type or of the electric motor type that is distinct from the first power plant (3).

2. The aircraft according to claim 1, wherein the second power plant (13) is arranged in such a manner as to be retractable relative to a structure (10) of the aircraft (1) and is configured to be replaced with another power plant of the combustion engine type or of the electric motor type that is distinct from the second power plant (13).

3. The aircraft according to claim 1, wherein the first power plant (3) includes a first group (30) of at least two engines (31 and 32) of the combustion type or a first group (30') of at least two motors (31' and 32') of the electric type.

4. The aircraft according to claim 3, wherein the aircraft (1) includes a first accessory gearbox (20), the first accessory gearbox (20) comprising at least two inlet shafts (21 and 22) mechanically connected to respective ones of outlets shafts (33' and 34') of the at least two motors or engines (31' and 32') of the first group (30, 30'), the first accessory gearbox (20) comprising an outlet shaft (23) mechanically connected to the first mechanical connection interface (8).

5. The aircraft according to claim 4, wherein the first accessory gearbox (20) comprises a speed reducer for adapting and reducing a speed of rotation of the outlet

shafts (33' and 34') of the at least two motors (31' and 32') of the electric type of the first group (30').

6. The aircraft according to claim 1, wherein the second power plant (13) includes a second group (40) of at least two engines (41 and 42) of the combustion type or a second group (40') of at least two motors (41' and 42') of the electric type.

7. The aircraft according to claim 6, wherein the aircraft (1) includes a second accessory gearbox (24), the second accessory gearbox (24) comprising at least two inlet shafts (25 and 26) mechanically connected to respective ones of outlets shafts (43' and 44') of the at least two motors or engines (41 and 42, 41' and 42') of the second group (40, 40'), the second accessory gearbox (24) comprising an outlet shaft (27) mechanically connected to the second mechanical connection interface (9).

8. The aircraft according to claim 7, wherein the second accessory gearbox (24) comprises a speed reducer for adapting and reducing a speed of rotation of the outlet shafts (43' and 44') of the at least two motors (41' and 42') of the electric type of the second group (40').

9. The aircraft according to claim 1, wherein the aircraft (1) includes a first storage compartment (50) to store a fuel energy first energy source, the first storage compartment (50) being hydraulically connected to the at least one power plant (3, 13) for the purpose of feeding the at least one power plant (3, 13) with the fuel energy first energy source, the first storage compartment (50) being fully or partially retractable relative to a structure (10) of the aircraft (1) and configured to be replaced with a second storage compartment (51) for storing an electrical energy second

energy source distinct from the fuel energy first energy source.

10. The aircraft according to claim 1, wherein the aircraft (1') includes a first storage compartment (50') to store an electrical energy first energy source, the first storage compartment (50') being electrically connected to the at least one power plant (3, 13) for the purpose of powering the at least one power plant (3, 13) with the electrical energy first energy source, the first storage compartment (50') being fully or partially retractable relative to a structure (10') of the aircraft (1') and configured to be replaced with a second storage compartment (51') for storing a fuel energy second energy source distinct from the electrical energy first energy source.

11. A method (60, 70) of preparing the aircraft (1) of a modular type according to claim 1 for a specific mission, wherein the method (60, 70) comprises firstly at least one preliminary step chosen from among the group comprising the following preliminary steps:

· determining (61) the needs in terms of range of the aircraft (1) for flying the mission;

· determining (61') the needs in terms of performance of the aircraft (1) for flying the mission;

· determining (62) the constraints related to a safety level for the mission; and

· determining (63) the constraints related to a maximum noise level allowable for the mission; and

secondly the following steps:

· generating (64) a list of at least two power plants of the combustion engine type and/or of the electric motor type, the list being conditioned by the at least one preliminary step, and being adapted specifically to the mission of the aircraft (1);

· selecting (65) the at least one power plant (3, 13) of the combustion engine type or of the electric motor type from among the list of at least two power plants of the combustion engine type and/or of the electric motor type; and

· fitting (66) the at least one power plant (3, 13) that is selected to a structure (10) of the aircraft (1);

· electrically connecting (67) the at least one power plant (3, 13) that is selected to the avionics system (5) for assisting in piloting the aircraft (1); and

· mechanically connecting (68) the at least one power plant (3, 13) that is selected to the main gearbox (4).

12. The method according to claim 11, wherein the method (70) further comprises a securing step (71) for securing to the structure (10) of the aircraft (1) a storage compartment (51) for storing a fuel or electrical energy source adapted to the at least one power plant (3, 13) that is selected, and a hydraulic or electrical connection step (72) for connecting the storage compartment (51) to the at least one power plant (3, 13) that is selected.