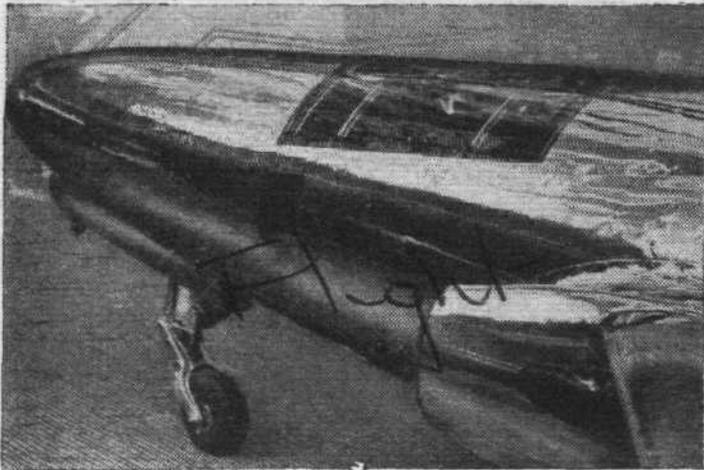
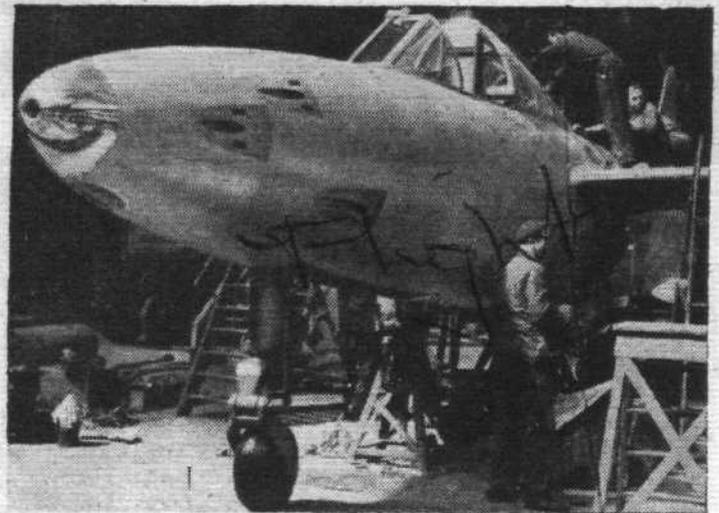


Salon Studies . . . . .



Cockpit of the S.O.M2 research aircraft, showing the retractable windscreen, used for take-off and landing, in the stowed position.



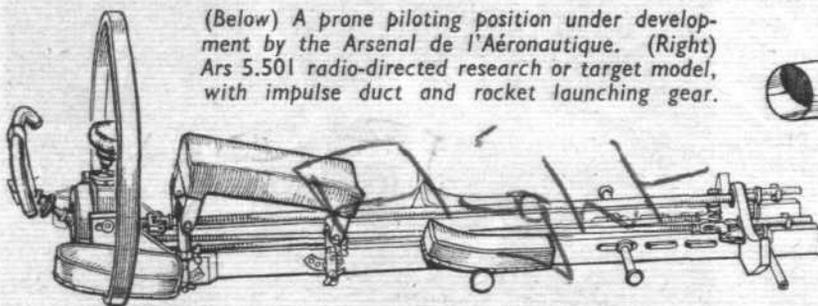
Business end of the S.O.6020 Espadon, showing the six gun-ports, with flash-eliminator slots, and the large cockpit enclosure.

quantities of dirt and occasion appreciable duct losses. The swept-back wing has a single spar, and the fuselage, with a 2 mm skin, has no stringers. Structural design was undertaken with a view to large-scale production in shadow factories. The first prototype has been seen with a greater fin area than that of the show aircraft, and with a dorsal extension.

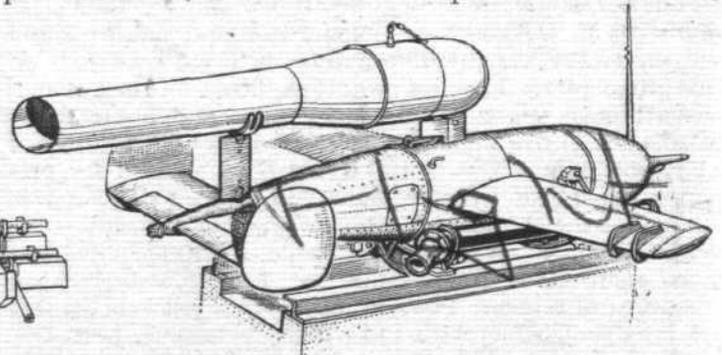
A maker's specification includes the following figures:—Span, 34ft 9in; length, 49ft 3in; wing area, 271 sq ft; gross

and tricycle undercarriage. It first flew on April 1st this year, and is designed for fighting, bombing or attack duties from French aircraft carriers. Characteristics are: span, 35.8ft; length, 40ft; wing area, 280.5 sq ft; gross weight, 15,430 lb; estimated max. speed, 444 m.p.h.; range, 2,800 miles. A photograph shows large flap-guide fairings.

*S.O. 6000 Triton Jet Trainer.*—The latest version of the S.O. 6000, the first example of which was on view in the previous Salon, is fitted with a Hispano-Suiza Nene 100,



(Below) A prone piloting position under development by the Arsenal de l'Aéronautique. (Right) Ars 5.501 radio-directed research or target model, with impulse duct and rocket launching gear.



weight, 17,637-18,298 lb; max. speed at sea level, 624 m.p.h.; max. speed at 33,000ft, 609 m.p.h.; rate of climb at sea level, 5,900ft/min; rate of climb at 32,800ft, 1,570 ft/min; time to 33,000ft, 10 min; ceiling, 39,370ft; take-off speed with full load, 136 m.p.h.; take-off run, 2,790ft; landing speed, 118 m.p.h.; duration, 1½ hours.

*S.O. 4000 Jet Bomber.*—The S.O. M1 and M2 research aircraft are providing data for construction of the S.O. 4000 twin-jet bomber which will closely resemble in layout these diminutive forerunners. In the extreme nose will be a flush-roofed, pressurized cockpit for a pilot and navigator. Lateral intakes will feed two Nenes, housed in the fuselage behind the tanks, and ejecting at the tail. Two remotely-controlled guns will be mounted in each of two wing-tip barbettes. The undercarriage—unlike that of the S.O. M2—will be of tricycle type, with a steerable nose-wheel.

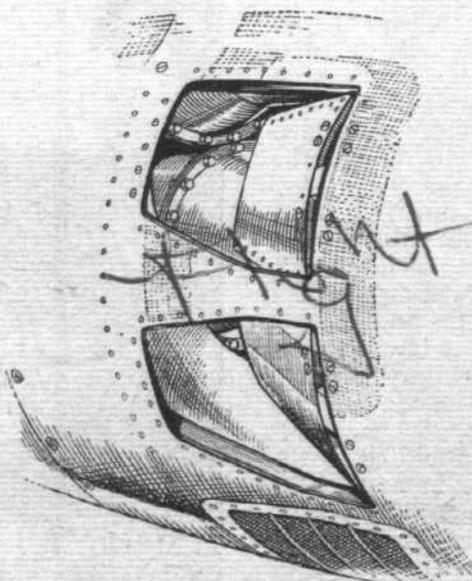
Span, length and wing area are respectively 58.3ft, 64.6ft and 807 sq ft, and the designed all-up weight, 19,700 lb.

*S.O. 8000 Narval Carrier-borne Fighter.*—Powered by an Arsenal 12HO2 piston engine (Jumo 213 type) with water methanol injection and driving a contra-rotating Chauvière pusher propeller, the Narval is of twin-boom layout, with high-set tailplane

with supplementary intakes on the fuselage sides. The two occupants have ejector seats. A maximum speed of 590 m.p.h. is claimed and the full-load take-off speed and landing speed are given as 130 m.p.h. and 112 m.p.h. The wing area is 161 sq ft and the all-up weight 10,050 lb, so that the wing loading (which might appear excessive, due to the relative sizes of wing and fuselage) is about 62 lb/sq ft.

*S.O. M2 High-speed Research Aircraft.*—This little swept-back monoplane is generally similar in design to the S.O. M1 air-launched research glider shown at the Salon in 1946 and is likewise a means of acquiring data for the construction of the S.O. 4000 jet bomber. It is, in fact, a piloted, half-scale model of the bomber. The first flight (with a temporarily raised cockpit roof) was made last month.

A single Rolls-Royce Derwent 5 turbo-jet is fed by laterally disposed intakes, standing proud of the fuselage sides, but whereas the S.O. 4000 will have two outlets—one for each Nene—the M2 has a central efflux, flanked by two small outlets for turbine-cooling air. The main undercarriage embodies three tandem retractable wheels, stowed in the central fuselage, and a relatively large nose-wheel. Small jettisonable wheels are attached to the retractable wing-tip skids for take-off. Skin of 3 mm thick-



Spring-loaded plenum-chamber doors on the S.O.M2 (Rolls-Royce Derwent).