

Traces of aluminum alloy development that advanced Japanese aircraft

Registration No.	Number 00363		
Registration Date	September 12, 2023	Registration Category	Category 2

Name (Model, etc.)	Documents and materials in the early stages of aircraft aluminum alloys development in Japan (1) Research reports on Extra Super Duralumin and other aluminum alloy developments (2) Forging dies for propeller blades for aircraft (3) Part of a Zero Carrier-Based Fighter (Type 52) salvaged from the sea
Location	Nagoya-shi, Aichi UACJ Corporation
Owner (Custodian)	UACJ Corporation
Manufacturer (Company)	(1) Sumitomo Copper Works, Sumitomo Goshi Kaisya Copper Works, Sumitomo Steel Tube & Copper Works, Ltd., Sumitomo Metal Industries, Ltd. (2) Sumitomo Metal Industries, Ltd. (3) Mitsubishi Heavy Industries, Ltd., Nakajima Aircraft Co., Ltd.
Year Manufactured	(1) Around 1920-1945 (2) 1940-Around 1945 (3) 1943-1945
Year first appeared	(1) Around 1920 (2) Unknown (3) 1943 (Type 52)
Reason For Selection	(1) In 1913, Sumitomo Copper Works invited an engineer from the Ministry of Agriculture and Commerce, Shigezo Sugiura, to establish a research division at the company. The vast number of research reports on the development of aluminum alloys contain detailed records of the development process and experimental results, including on Extra Super Duralumin, which was the world's strongest aluminum alloy. (2) These are hot forging dies for propeller blades for aircraft such as the Zero Fighter. (3) This is part of a Zero Carrier-Based Fighter (Type 52) salvaged from the sea after the war. Analysis revealed extra super duralumin in the wing girders. They are significant as items that show the history of technology.
Registration Standard	1-A (Show an important aspect or stage of the development of science and technology.) 1-B (Show a uniquely Japanese scientific or technological development from an international perspective.)

Open/Closed to Public	(2) Open to Public (1) (3) Closed to Public
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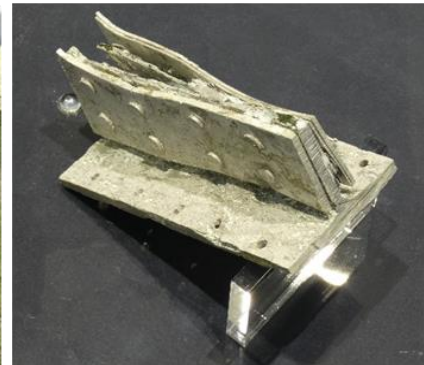
Photo



(1)



(2)



(3)

Other useful
information