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#### U. S. STRATEGIC BOMBING SURVEY

APO 234, c/o Postmaster San Francisco, California

MISCELLANEOUS NOTES ON TARGET NO. 1547

### Kawasaki Aircraft Factory.

Akashi

By.Mr.C.K.Parker. Oct.30th.1945

the following notes on Target #1547 were supplied by Mr.Shujiro Ito-Technical Director of the plant under study. Mr Ito held the rank of Lt.General at the time of his retirement from the Japanese army in 1937.

(2.) Target 1547 consists of the Akashi Aircraft Engine Plant (Akashi Hatsudoki Kojo) and the Akashi Fuselage Plant (Akashi Kitai Kojo). Both of these plants belong to the Kawasaki Aircraft Co. (Kawasaki Kokuki Kabushiki, Kaisha) a joint stock company with a nominal capital of 300,000,000 yen, and a paid up capital of 150,000,000 yen. The company was incorporated in Nov.1937

(3.) The aircraft engine plant was moved from Kobe to Akashi in Sept.1940. The fuselage plant was moved from Gifie City to Akashi in Nov. 1940. Both plants were in production at the end of 1940

(4.) The following raids were reported.

19. Jan .1945 Bombing Raid

22. June " "

USSBS

File

7 July "Incendiary raid.

Unexploded Bombs
19 Jan raid 30
28t

28th.July only 4 dropped of which

22 June " None 2 did not explode None 30th.July raid None.

26 June None Informant said it required three weeks to explode the

30 unexploded bombs of the 19 Jan.raid.

Estimated Damage to Buildings etc.

including both Engine and Fuselage Plant

Actual Repair % Damaged 'Possible Repair ' Raids 15 30 40 19 Jan none 22 June none 26 June none very slight 28 July none very slight' 30 July

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# page 2 MISC. NOTES ON TARGET NO. 1547

	Damage to Raids	MO • ET	STUES	% Damage	ed N	o.Fuselage	1 01	
		in P	lant	,	1	in Plant		aged
	19 Jan	15	109	15	•	662	1 7	h
	22 & 26 Jun	e ,	96	50	1	228		000
	June July	The state of the s	1		1	228	C.	2
	28% 30 Jul		ne	None			MATERIAL PROPERTY OF THE PARTY AND ADDRESS.	
		1	1	2,0110	1		i	
					1			
9 (	(8)	Disne	ngal of mo	07c cud D			7	1º Marco
	Feb 1945	(a) Lead	rsal of To d and bron known.	ze parts	arts moved	to Sakai.	Number	Hul Kun
	11	(b) Lead	and bron	ze parts	moved	to Nissher	Ainono	
	11	11000	are compan	y in Kobe	- Numb	er moved 1	3.	13
		(c) Mail	n connecti	ng engine	rods	moved to	laska	**
		DETE	sa company	at Fuku	(near	Osaka). Nu	mber	144
	11	MOAE	a 144.					The state of the s
	11	(d) Rock	cer arms m	oved to He	oto Br	anch. Numb	er move	d 62.
		(c) case	-mar dened	small par	rts mo	ved to Hok	uban	1
	11	DI 0.1.	ren. Mambel	r not know	m.			Met kno
		(f) Pist	ons moved	to Showa	Seiki	Company.	Mumban	1 4
		move	a 20.					Zes
	Feb-Apr	(a) Cran	k shafts.	rods and	cam g	hafts of 1	4 ~ 4 2	
		cool	ed engines	moved to	Than	agi Plant	rquia-	160
1		Osak	a Seisa Co	Number	morred	agr rrant	01	174
	March	(a) Cutt	ers moved	to Otsu F	moved	. Number m	7 00	90
		(b) Inle	t valves n	v ot bevor	ranch	a Valve Co	oved 90	• 17
		move	d 45.	roved to 1	asnim	a varve co	<ul> <li>Number</li> </ul>	C AC
	April	(a) Tria	1 nante 4	Seco post	A 4			43
		Nish	inomina De	ings, and	ilxtu	res moved	to	222
	11	(h) Jigg	inomiya Br	anch. Num	ber m	oved 222.		100
		Mamp	and lixtu	res moved	to Ya	ashiro Bran	nch.	1/5/1
		Mamo	er moved 1	41.				
(9)	Engine Produ	1044						
(),	The bear	uction						
	The night	est mont	aly produc	tion of e	ngines	was 480 1	in Oct	J. J.
					- 6	uninterrur	oted pro	-T-T-0
			CULTUD DESC					
	THE LADE	or engir	and mumba	n as a		nd planes		
	each type fo	or Oct 19	)44 are as	follows.	,	The branes	using	
	Type	N	Number					
	HA-115		210	/- \Y	he bra	ne in which	n used.	
				(a)	11-48	light bom Nakajima	ber	
	HA-40		200	(p)		Nakajima	fighter	
	HA-140		200		<b>x1-61</b>	fighter.		
	1772-7-40		70		(1-61	modified	+	

Ki-61 modified type, fighter. The total engine output of all Kawasaki plants, including target 1547, represented 25% of all the engines used in Japanese Army planes.

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MISC. NOTES ON TARGET NO. 1547

(10)

Fuselage Production

Two types of fuselage were produced:

(a) KI-45, a two seater fighter

(b) KI-102, A night fighter

The engines used in these planes came from Mitsubishi Jukogy in Nagoya.

Total monthly production figures follow for both

type of fuselage for the year 1944

Jan76May62Sept.169Feb.78June70Oct.97March86July111Nov.51April88August119Dec.50

The figure for Dec. 1944 represents 14 of KI-45 type

and 36 of KI-102 type

Total production for Jan. 1945 was 14 of the night fighters KI-102, improved type.

(11) Financial Loss

The financial loss resulting from the 19thJan.
raid on Target #1547 was extimated at 130,000,000 Yen.
The total loss to all five of the Kawasaki plants
(Akashi, Gifu, Miyakonoje, Kobe Metals, and Sakai) engaged
in aircraft production, as a result of all raids, was estimated to be 450,000,000 Yen.

(12) Number of Workers.

Just prior to the raid of Jan. 19, 1945, about 25,000 workers were employed at target 1547. Subsequent to this raid the workers were gradually dispersed, and at the time of the raid on 22 June only 15,000 workers remained.

(13)	Number of Dead and	Injured	
	Raid Dea		đ
	19 Jan. 1945 26	8 99	
	9 June " 10		
	(outside plant premi		
	22 June 1945 6	7	
	26 June " 5	19	
	7 July " no	the second secon	
	28 July "no	ne none	
	30 July " no	ne none	

U. S. STRATEGIC BOMBING SURVEY Page No.4 USSBS APO 234, c/o Postmaster File San Francisco, California Notes by C.K.Parker Miscellaneous Notes on Target 1547 (14)Dispersal of Machinery As of 1 Jan 1945, the number of machines (presses, machine tools etc.) at Target was 2171 By 22 June 1945 the number of machines etc left at the plant was 324. Of the 324 there were 228(mostly tools)in the Engine Plant and 96(mostly presses) in the Fuselage plant. 15 Damage to Machines etc in 19 Jan Raid. The number of machines and machine tools damaged in this raid was 250 16 Damage for 22 June and 26 June Raids 50% of Fuselage in Fuselage Plant 42% of Machine Tools in Engine Plant 17 Production Cut after 22 and 26 June Raids Fuselage assembly was reduced to 20% 18 Financial Loss of 19th. Jan Raid Buildings 43,268,000 Machinery, Tools etc. 9,904,000 Stock 9,847,000 Semi-finished products 62,895,000 Miscellaneous 4,148,000 TOTAL 130,062,000 Yen The above total was recognized by the insurance Co andxpad and paid. K£ 19 Financial Loss of June and July Raids The aggreagate loss for the four raids in June and July on Target 1547 was 70 million yen. This sum was presented to the insurance companies but had not been paid as of 10th.Nov.1945 20 Total Loss to Kawasaki Aircraft Co. The total ixe loss to this company as a results of the raids on its plants and establishments in 9 cities was estimated as 415,309,600 Yen 21 Pro (a) Production Figures for Target 1945 MonthxXxxxxxxxxxy45' Jan'Feb 'March'April'May June July'August Engine Assembly 158 69 292 285 50 & for Tests' 195 128' None Fuselage 14 34 24 44 Thexfixulaxxforxbeex1944 18 8 14' The figures for Dec. 1944 were Engines 410, Fuselage 50 22 Assembly and Testing at Target An idea of the function of the Akaski plant may be gained from the following figures for July 1945 (a)2/3 of the 128 engines turned out at Akashi (Target1547) were air cooled and assembled at the Futami plant of the Kawasaki Aircraft Co.

### MISCRILANEOUS NOTES ON TARGET NO. 1547

### Rawasaki Aircraft Factory. Akashi.

By.Mr.C.K.Parker. Oct.30th.1945

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by Mr. Shujiro Ito-Technical Director of the plant under study. Mr Ito held the rank of Lt.General at the time of his retirement from the Japanese army in 1937.

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30. July

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30 unexploded bombs of the 19 Jan.raid.

Estimated Damage to Buildings etc. including both Engine and Fuselage Plant Raids . % Damaged Possible Repair . Actual Repair 19 Jan ' 40 30 15 22 June ' none 26 June 10 none 28 July 'very slight' none 30 July very alight' none

MISC. NOTES ON TARGET NO. 1547

22 Ju:	lds 19 Jan & 26 June ne & July 88 30 July	No.Engines % Damaged No.Fuseiage in Flant Damaged 15 662 14 96 50 228 42 None None
		I THE
101	,	Dispersal of Tools and Parts
101	Feb 1945	(a) Lead and bronze parts moved to cakal. Number
		not known.
	11	(b) Lead and bronze parts moved to Misshen Aircraft
	**	Metals Company in Robe. Number moved 13. (c) Main connecting engine rods moved to Osaka
		Colsa Company at Fuku (near Osaka). Number
4		marrad 7hh.
	**	(d) Rocker arms moved to Hoto Branch. Number moved 6
	17	(e) Case-hardened small parts moved to Hokuban
		Dennish Timber not known.
	. 11	(f) Pistons moved to Shows Seiki Company. Mumber
		morrod 20.
	Feb-Apr	(a) Crank shafts, rods and cam shafts of liquid-
		cooled engines moved to Ibaragi Plant of Osaka Seisa Co. Number moved 194.
	No 1-	(a) Outters moved to Otsu Branch. Number moved 90.
	March	(b) Inlet valves moved to Yashima Valve Co. Number
		morrod LG.
	April	(a) Trial parts. iigs. and fixtures moved to
	Same of the last	Mighinomiva Branch. Number moved dad.
	51	(b) Jigs and fixtures moved to Yashiro Branch.
		Number moved 141.

(9) Ingine Production The highest monthly production of engines was 480 in Oct. 44. Production for Dec. 1944, the last month of uninterrupted production before our raids began, was 410.

The type of engines, number of engines, and planes using each type for Oct 1944 are as follows:

The second secon

The state of the s

Type HA-115	704	Number 210		Type plan (a) Ki-48	ne in which	h used.
in the same with the same		Acid alle New	1	(b)	Nakajima	
HA-40		200	+	K1-61	fighter.	
HA-140		70	1.	K1-61	modified	type,
S. William Alle and Print		• "			fighter.	

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page 3 MISO. NOTES ON TARGET NO. 1547

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The financial loss resulting from the 19thJan. raid on Target #1547 was estimated at 130,000,000 Yen. The total loss to all five of the Hawasaki plants (Akashi, Gifu, Miyakonoje, Kobe Metals, and Sakai) engaged in aircraft production, as a result of all raids, was estimated to be 450,000,000 Yen.

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(13)	Number of Dead	d and Injured	
•	Rald	Dead	Injured
	19 Jan. 1945	268	99
	9 June "	104	53
	(outside plant	premises)	
	22 June 1945	6	7
	26 June "	5	19
	7 July "	none	1
	28 July "	none	none.
	30 July "	none	none

C.K.Parker

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Notes by C.K.Parker

### Miscellaneous Notes

The engines were only tested at Akashi
(b) One third of the 128 Engines turned out at Akashi were watercooled. 60% of the assembly work on these engines was done at the Takatsuki plant of the Kawasaki Aircraft Co. and only the final 40% of the assembly work and the testing were done at Akashi.

### MISSELLANDOUS NOTES ON TARGET HO. 1547

# Kawasaki Airoraft Pactory.

Akashi

By.Mr.C.K.Parker. Oct.30th.1945

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Estimated Damage to Buildings etc. including both Engine and Fuselage Plant A Damaged ' Possible Repair ' Actual Repair Raids 19 Jan 40 none 15 22 June none 26 June nono very slight 28 July none very slight' 30 July

	Raids 19 Jan 22 & 26 Jun	No Angines S Damaged No Fuselage in Plant in Plant Damaged 1509	maged 14
	June & July	* 228 * * * * * * * * * * * * * * * * *	42
	28a 30 Jul	None	
	- The same of the same place and the same an	NE AND THE RESIDENCE OF THE PROPERTY OF THE PR	tal, empressia atmini derentan
1	8)	Dispersal of Tools and Parts	
,	Feb 1945	a) Lead and bronze parts moved to Bakai. Number	33"
		not known.	and the state of t
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	Amr11	a) Trial parts, jigs, and fixtures moved to	
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		。	

(9) Engine Production

HA-115

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The type of engines, number of engines, and planes using

each type for Oct 1944 are as follows: Number Type 510

Type plane in which used. (a) K1-48 light bomber

Nakajima fighter E1-61 fighter.

MA-40 500 MA-140

K1-61 modified type, fighter.

The total engine output of all Nawasaki plants, including target 1547, represented 25% of all the engines used in Japanese Army planes.

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