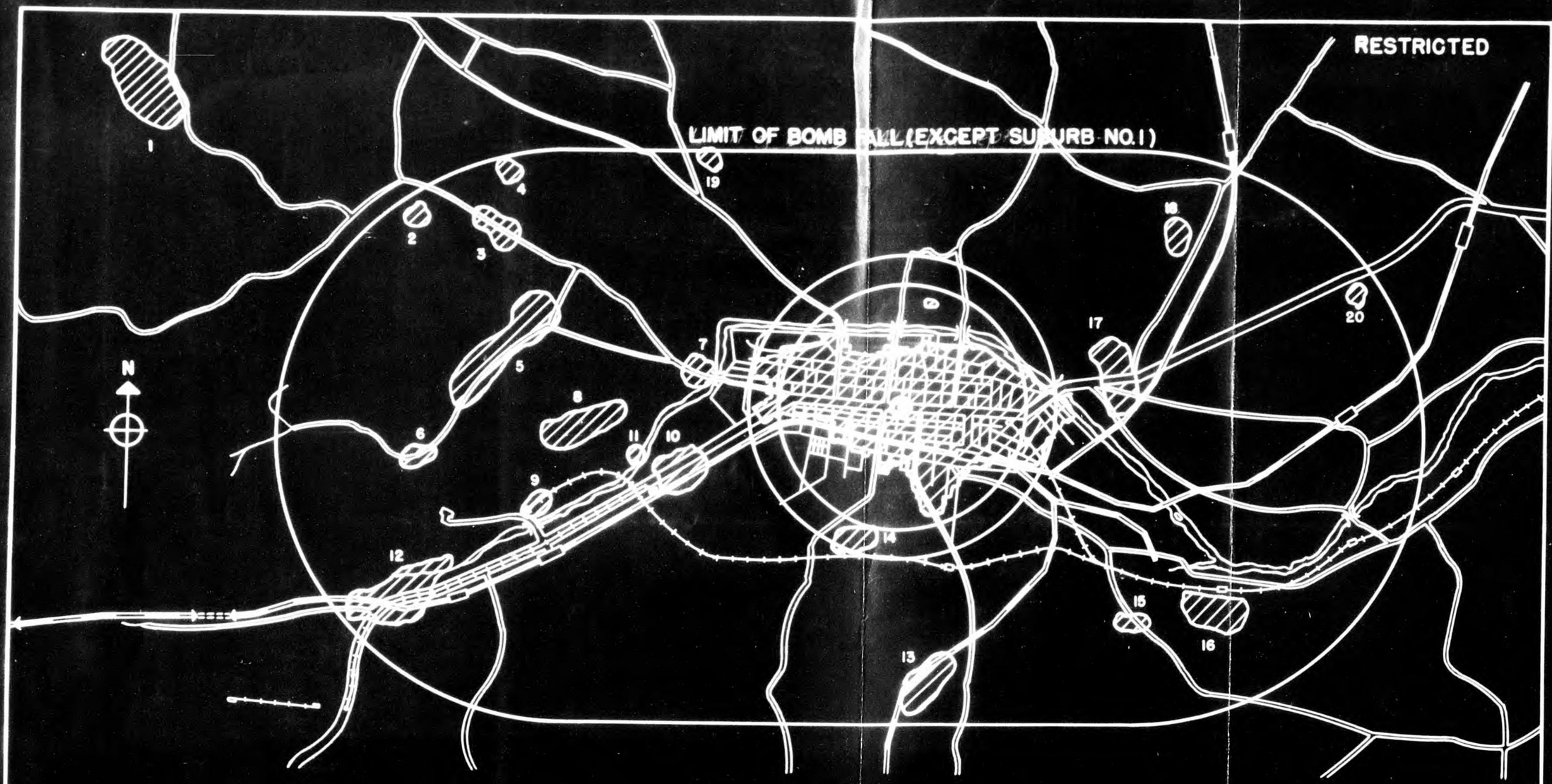
RESTRICTED



LEGEND

1. YAMAIRI, KAWAGUCHI - MURA
2. NIBUGATA, MOTO HACHIOJI - MURA
3. SHIMO - ICHIBUGATA, HACHIOJI - MURA
4. KAMI - ICHIBUGATA, HACHIOJI - MURA
5. MOTO - HACHIOJI, NO. 1 SECTION, HACHIOJI - MURA
6. MOTO - HACHIOJI, NO. 2 SECTION, HACHIOJI - MURA
7. YOKOKAWA, HACHIOJI - MURA
8. FUNEDA, YOKOYAMA - MURA
9. SHIMO - NAGABUSA, YOKOYAMA - MURA
10. SANDA, YOKOYAMA - MURA
11. MILITARY PREPARATORY SCHOOL, YOKOYAMA - MURA
12. KAMI - KUNUGIDA, ASAKAWA
13. KATAKURA, YUI - MURA
14. TAMA - JUVENILE REFORMATORY, YUI - MURA
15. UCHIKOSHI, YUI - MURA
16. KITANO, YUI - MURA
17. OWADA - MACHI, HACHIOJI CITY
18. ISHIKAWA - MACHI, HACHIOJI CITY
19. INUME, KAWAGUCHI - MURA
20. HINO, HINO - MACHI

▨ FIRE DAMAGED AREA

DAMAGED SUBURBS OF HACHIOJI JAPAN

SCALE

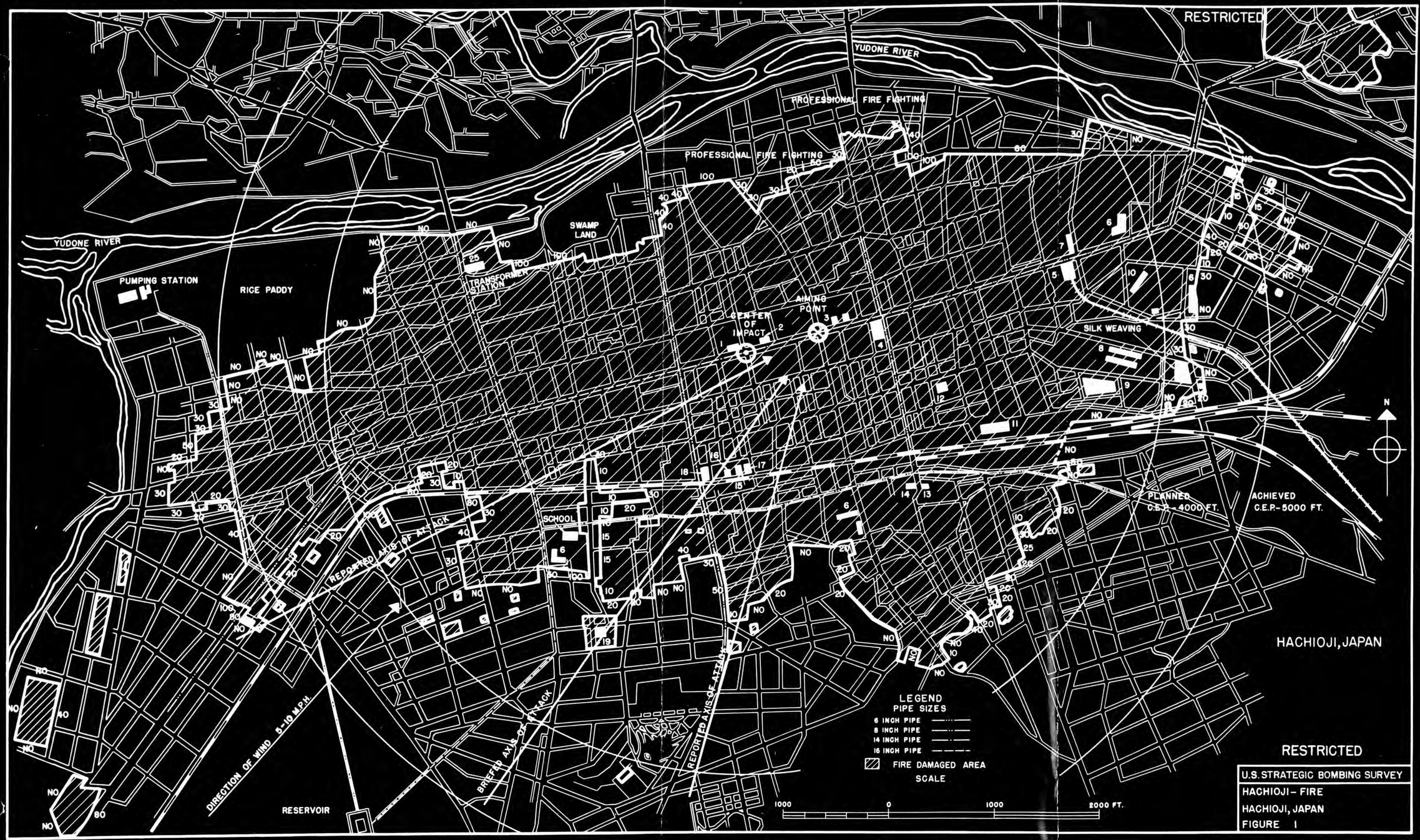
1000 0 1000 2000 FT.

RESTRICTED

U.S. STRATEGIC BOMBING SURVEY

HACHIOJI, FIRE
HACHIOJI, JAPAN
FIGURE 2

RESTRICTED



HACHIOJI, JAPAN

RESTRICTED

U.S. STRATEGIC BOMBING SURVEY
HACHIOJI - FIRE
HACHIOJI, JAPAN
FIGURE 1

JOINT TARGET GROUP, WASHINGTON, D. C.
TARGET LOCATION SHEET

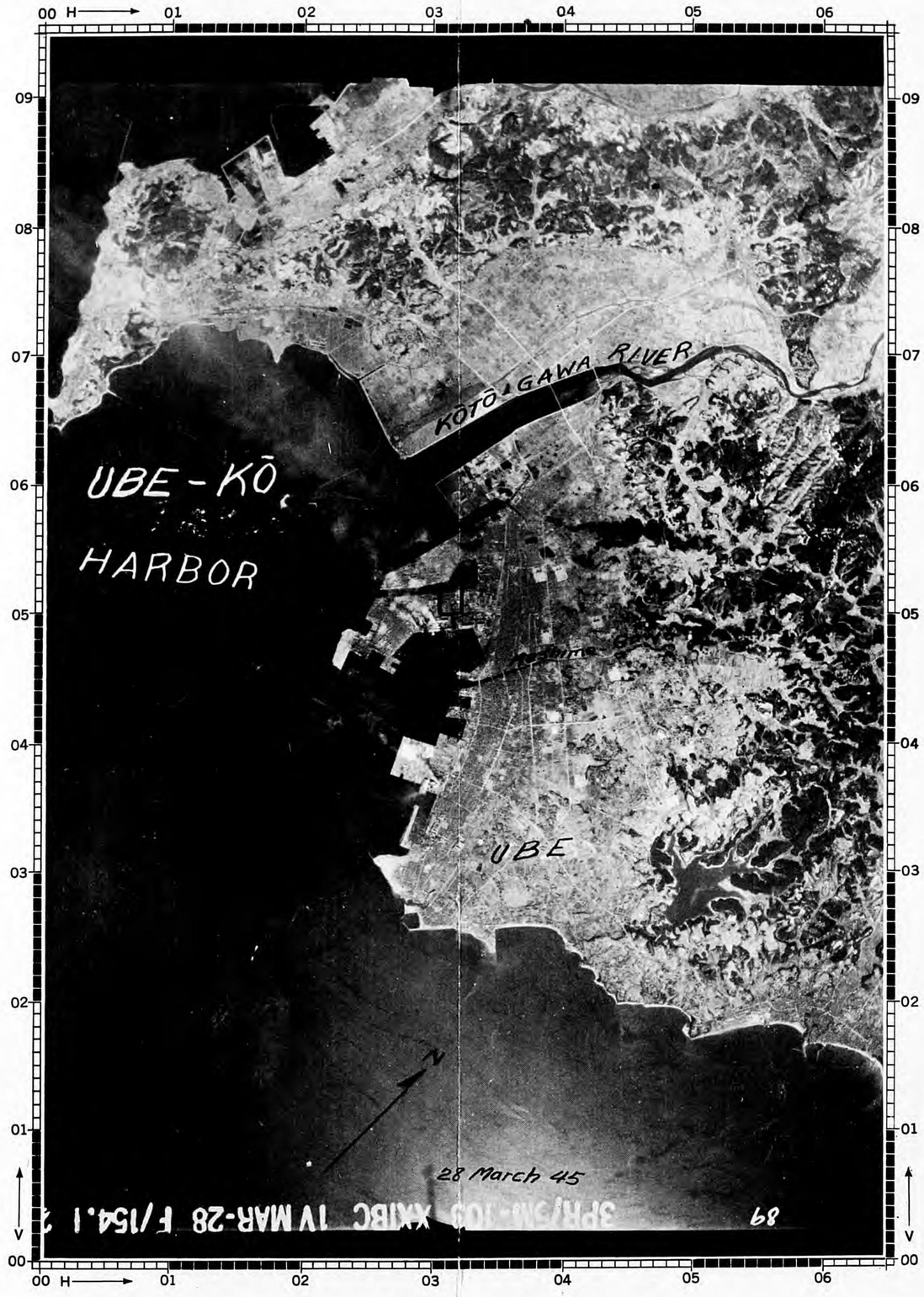
UBE COAL LIQUEFACTION COMPANY
UBE JAPAN

SHEET . . . . . 90:32-1841—TL
DATE . . . . . 10 May 1945
TARGET 90:32-1841
CATEGORY . End Prdt. Ind.—PETROLEUM
COORDINATES . . . . 33°57'N 131°14'E
ALTITUDE . . . . . 10 feet

SIGNIFICANCE:

Reported by ground intelligence to be a synthetic oil plant. Process and capacity have not been identified from available photographs. Appears to be closely integrated with Ube Nitrogen Fertilizer Co. (Target 9032-818).

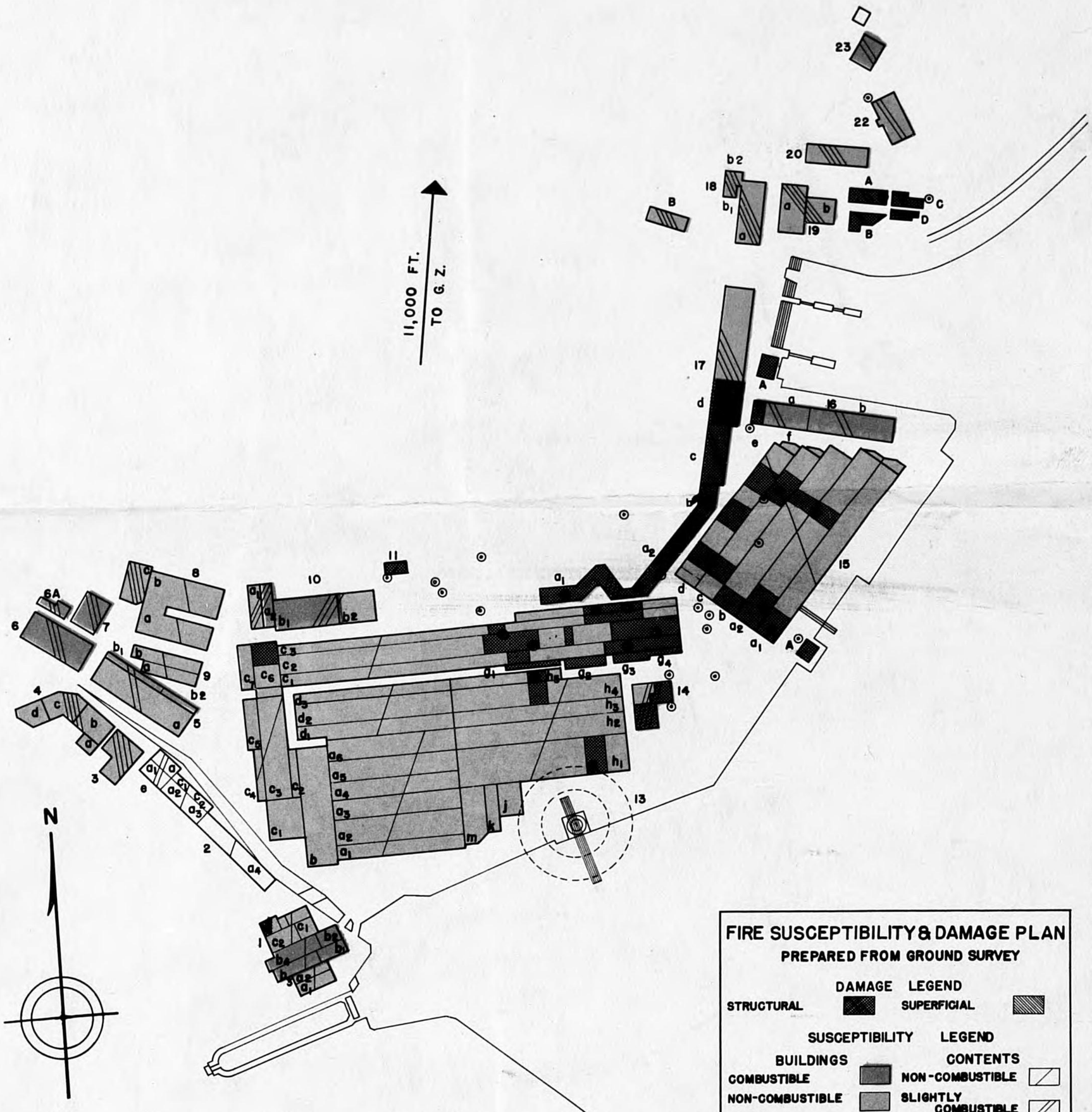
LARGE SCALE ILLUSTRATION—SCALE APPROX.: 1:15,500



SMALL SCALE ILLUSTRATION—SCALE APPROX.: 1:50,000

PUBLISHED IN OFFICE OF AC/AS INTELLIGENCE, A.A.F., BY COMBINED PERSONNEL OF UNITED STATES AND BRITISH SERVICES FOR THE USE OF ALLIED FORCES.

File No. 692,841.1



FIRE SUSCEPTIBILITY & DAMAGE PLAN

PREPARED FROM GROUND SURVEY

DAMAGE LEGEND

STRUCTURAL

SUPERFICIAL

SUSCEPTIBILITY LEGEND

BUILDINGS	CONTENTS
COMBUSTIBLE	NON-COMBUSTIBLE
NON-COMBUSTIBLE	SLIGHTLY COMBUSTIBLE
FIRE RESISTANT	MODERATELY COMBUSTIBLE
	HIGHLY COMBUSTIBLE
	EXTREMELY COMBUSTIBLE
	INTERMEDIATE VALUES

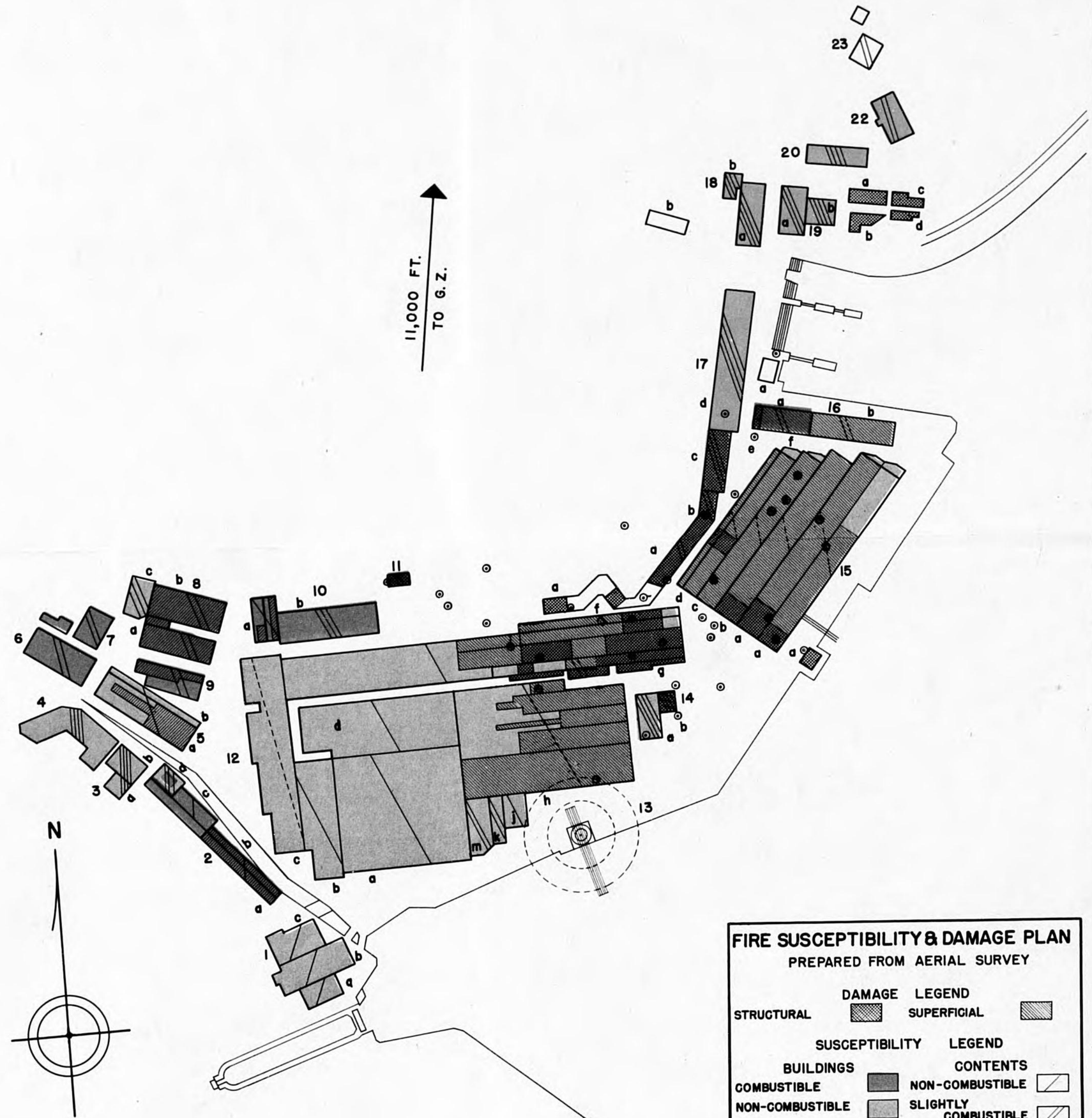
U.S. STRATEGIC BOMBING SURVEY

AKUNOURA ENGINE WORKS

NAGASAKI JAPAN

FIGURE

4-3932-FT. BELVOIR, VA., MAR 46-10



FIRE SUSCEPTIBILITY & DAMAGE PLAN

PREPARED FROM AERIAL SURVEY

DAMAGE LEGEND

STRUCTURAL

SUPERFICIAL

SUSCEPTIBILITY LEGEND

BUILDINGS	CONTENTS
COMBUSTIBLE	NON-COMBUSTIBLE
NON-COMBUSTIBLE	SLIGHTLY COMBUSTIBLE
FIRE RESISTANT	MODERATELY COMBUSTIBLE
COMBINATION	HIGHLY COMBUSTIBLE
I.E. COMBUSTIBLE ROOF RESISTANT FLOORS	EXTREMELY COMBUSTIBLE
	INTERMEDIATE VALUES

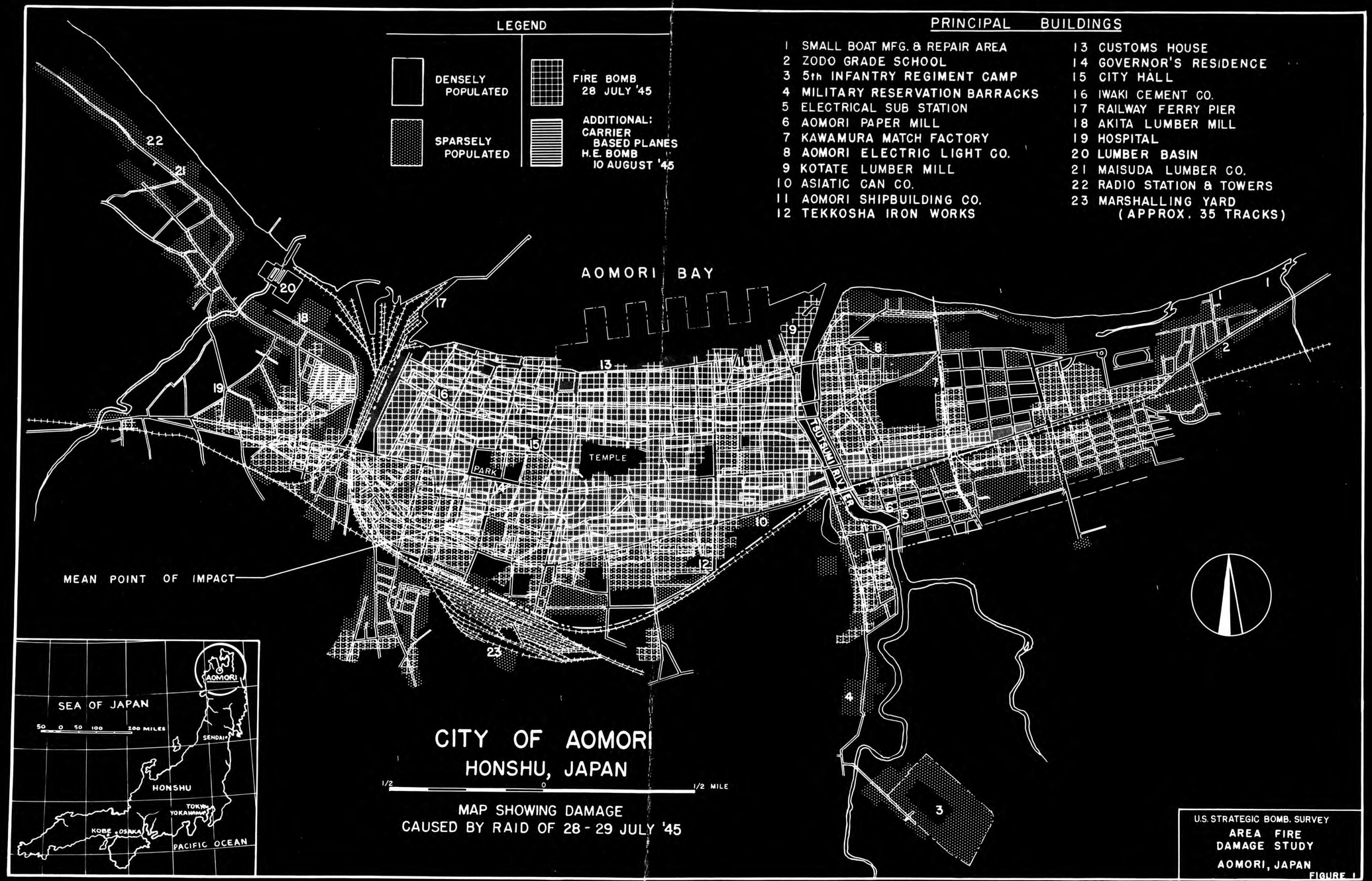
U.S. STRATEGIC BOMBING SURVEY

AKUNOURA ENGINE WORKS

NAGASAKI JAPAN

FIGURE

4 - 3933 - FT. BELVOIR, VA., MAR 46 - 10



CITY OF AOMORI
HONSHU, JAPAN

1/2 0 1/2 MILE

MAP SHOWING DAMAGE
CAUSED BY RAID OF 28 - 29 JULY '45

U.S. STRATEGIC BOMB. SURVEY
AREA FIRE
DAMAGE STUDY
AOMORI, JAPAN
FIGURE 1

By HR-A NARA, Date 5/13/11

LEGEND

- DENSELY POPULATED
- SPARSELY POPULATED
- FIRE BOMB 28 JULY '45
- ADDITIONAL: CARRIER BASED PLANES H.E. BOMB 10 AUGUST '45

PRINCIPAL BUILDINGS

1 SMALL BOAT MFG. & REPAIR AREA
2 ZODO GRADE SCHOOL
3 5th INFANTRY REGIMENT CAMP
4 MILITARY RESERVATION BARRACKS
5 ELECTRICAL SUB STATION
6 AOMORI PAPER MILL
7 KAWAMURA MATCH FACTORY
8 AOMORI ELECTRIC LIGHT CO.
9 KOTATE LUMBER MILL
10 ASIATIC CAN CO.
11 AOMORI SHIPBUILDING CO.
12 TEKKOSHA IRON WORKS
13 CUSTOMS HOUSE
14 GOVERNOR'S RESIDENCE
15 CITY HALL
16 IWAKI CEMENT CO.
17 RAILWAY FERRY PIER
18 AKITA LUMBER MILL
19 HOSPITAL
20 LUMBER BASIN
21 MAISUDA LUMBER CO.
22 RADIO STATION & TOWERS
23 MARSHALLING YARD (APPROX. 35 TRACKS)

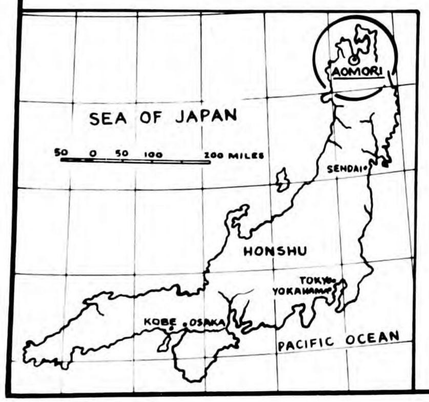
AOMORI BAY

TEMPLE

PARK

TSUTSUMI RIVER

MEAN POINT OF IMPACT



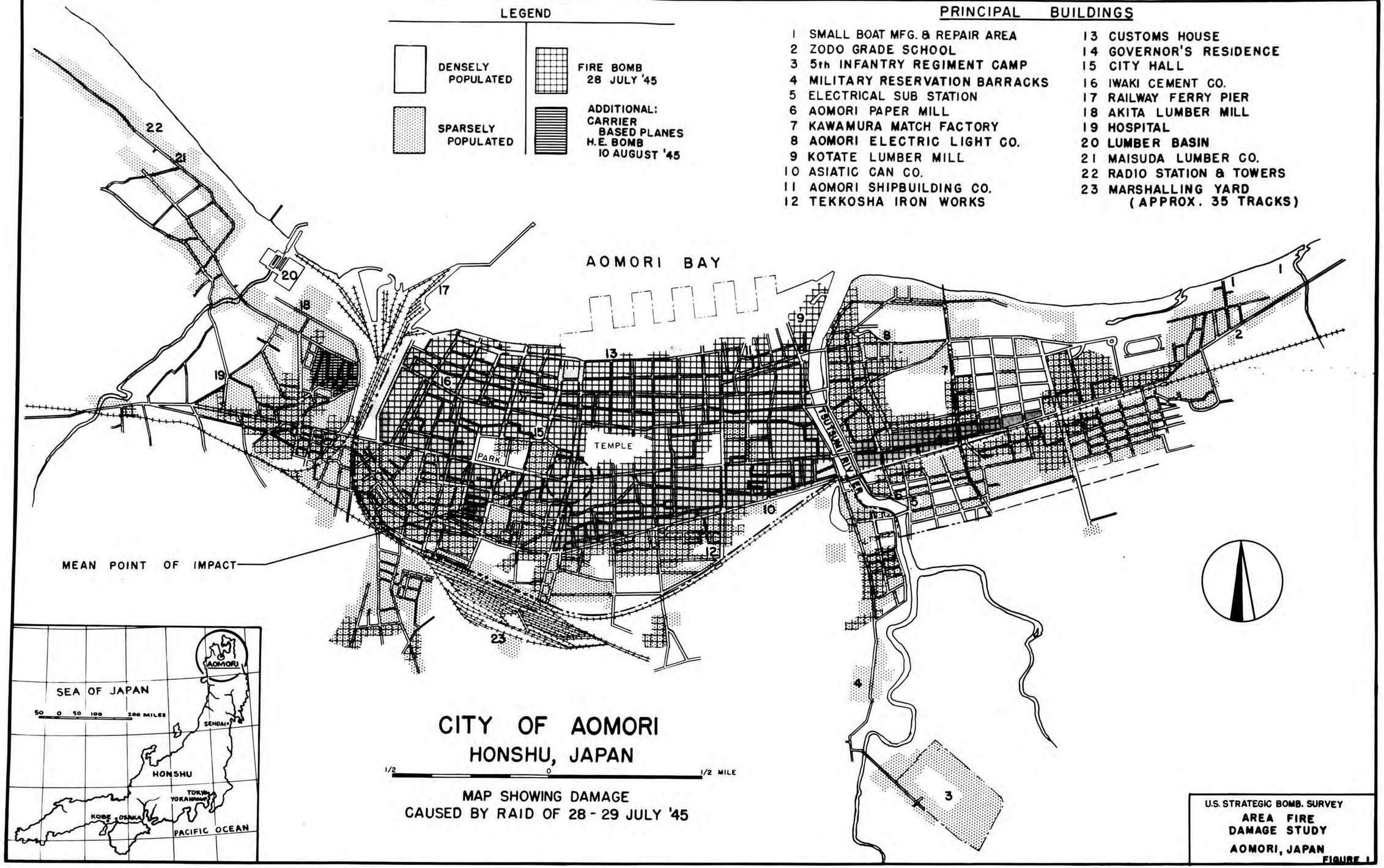
CITY OF AOMORI
HONSHU, JAPAN

1/2 0 1/2 MILE

MAP SHOWING DAMAGE
CAUSED BY RAID OF 28 - 29 JULY '45

U.S. STRATEGIC BOMB. SURVEY
AREA FIRE
DAMAGE STUDY
AOMORI, JAPAN
FIGURE 1

By ... NARA, Date ...



CITY OF AOMORI
HONSHU, JAPAN

1/2 0 1/2 MILE

MAP SHOWING DAMAGE
CAUSED BY RAID OF 28 - 29 JULY '45

U.S. STRATEGIC BOMB. SURVEY
AREA FIRE DAMAGE STUDY
AOMORI, JAPAN
FIGURE 1

By HR-A NARA, Date 5/3/11

LEGEND

DENSELY POPULATED

SPARSELY POPULATED

FIRE BOMB 28 JULY '45

ADDITIONAL: CARRIER BASED PLANES H.E. BOMB 10 AUGUST '45

PRINCIPAL BUILDINGS

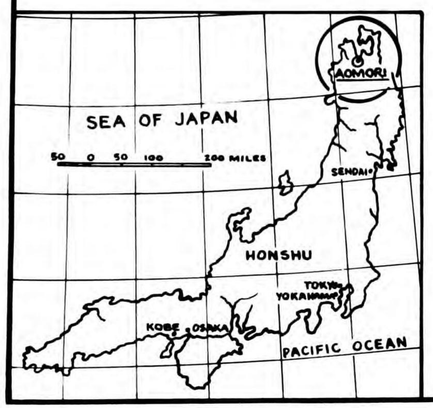
1 SMALL BOAT MFG. & REPAIR AREA
2 ZODO GRADE SCHOOL
3 5th INFANTRY REGIMENT CAMP
4 MILITARY RESERVATION BARRACKS
5 ELECTRICAL SUB STATION
6 AOMORI PAPER MILL
7 KAWAMURA MATCH FACTORY
8 AOMORI ELECTRIC LIGHT CO.
9 KOTATE LUMBER MILL
10 ASIATIC CAN CO.
11 AOMORI SHIPBUILDING CO.
12 TEKKOSHA IRON WORKS
13 CUSTOMS HOUSE
14 GOVERNOR'S RESIDENCE
15 CITY HALL
16 IWAKI CEMENT CO.
17 RAILWAY FERRY PIER
18 AKITA LUMBER MILL
19 HOSPITAL
20 LUMBER BASIN
21 MAISUDA LUMBER CO.
22 RADIO STATION & TOWERS
23 MARSHALLING YARD (APPROX. 35 TRACKS)

AOMORI BAY

TEMPLE

PARK

MEAN POINT OF IMPACT



CITY OF AOMORI
HONSHU, JAPAN

1/2 0 1/2 MILE

MAP SHOWING DAMAGE
CAUSED BY RAID OF 28 - 29 JULY '45

U.S. STRATEGIC BOMB. SURVEY
AREA FIRE DAMAGE STUDY
AOMORI, JAPAN
FIGURE 1

By HR-A NARA, Date 5/5/11

全部五等地

By HR-A NARA, Date 5/5/11

out

Mukaijima distric Hiroshima

SECRET

HE ATTACKS ON HIROSHIMA

LEGEND

- ATTACK 19 MARCH 1945
- ATTACK 30 APRIL 1945

NOTE: NUMBERS NOT REFERRED TO THESE SYMBOLS IDENTIFY BUILDINGS COVERED IN SECTION X OF REPORT 129

OTA GAWA

OLD CASTLE

FUKUHIMA GAWA

MOTOYASU GAWA

TEMMA GAWA

HIROSHIMA AIRPORT

HIROSHIMA WAN (BAY)

HIROSHIMA-KO (HARBOR)

ENKO GAWA

TOMO MOUNTAINS (HILL)

JAPAN STEEL CO.

KAITA WAN (BAY)

HIROSHIMA

HIROSHIMA PREFECTURE, HONSHU, JAPAN

1/2 0 1/2 MILE

500 0 500 METERS

500 0 500 YARDS

CONTOUR INTERVAL 20 METERS

GRID SYSTEM BASED ON 1000 YARD WORLD POLYCONIC GRID

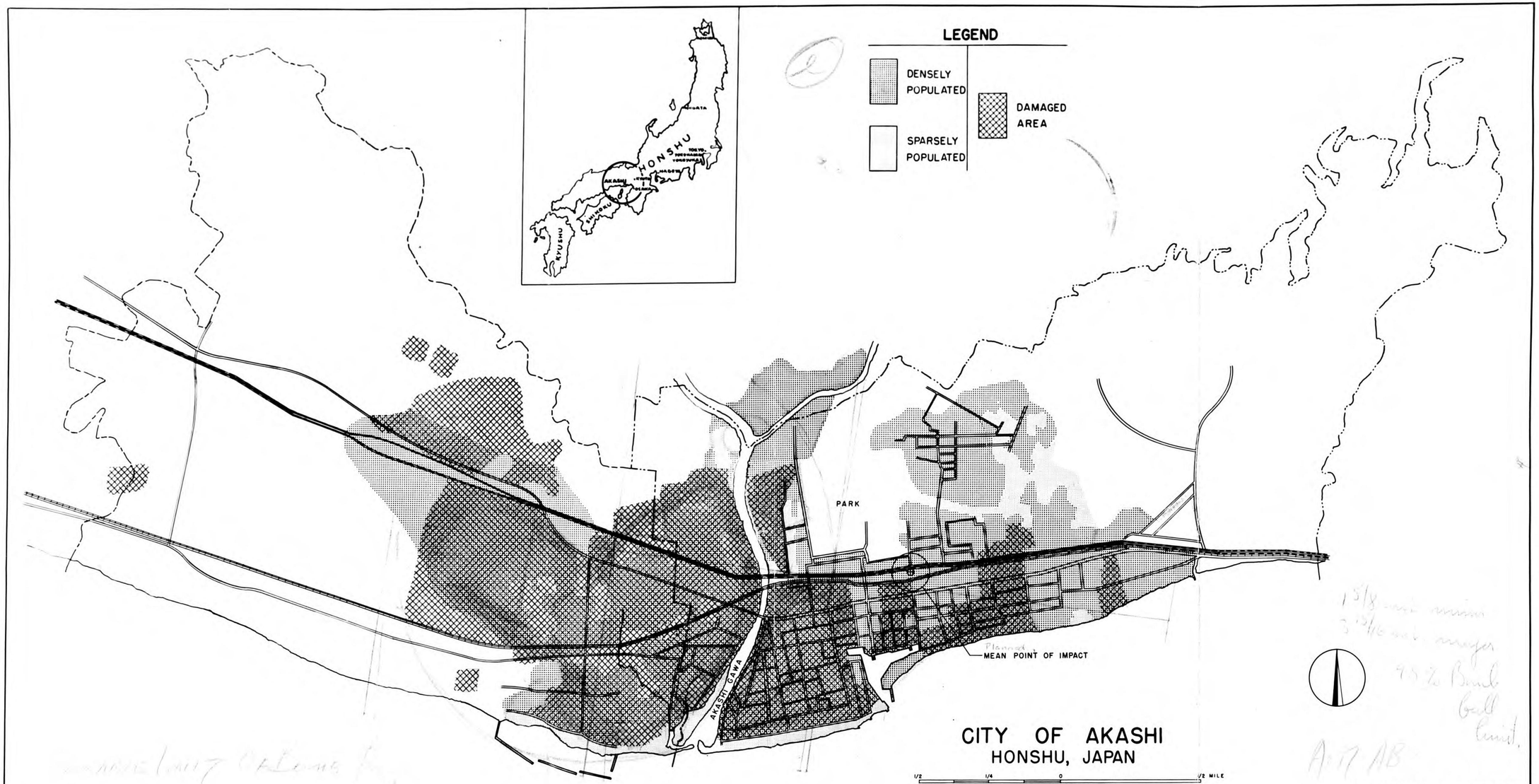
SECRET

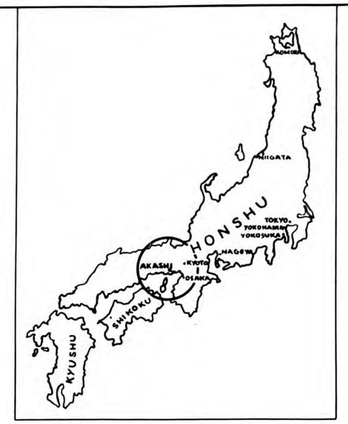
U.S. STRATEGIC BOMBING SURVEY

HE ATTACKS

HIROSHIMA, JAPAN

FIGURE I-V


LEGEND
DENSELY POPULATED
SPARSELY POPULATED
DAMAGED AREA
HONSHU
NIIGATA
AKASHI
KYUSHU
SHIKOKU
PARK
AKASHI GAWA
Planned
MEAN POINT OF IMPACT
CITY OF AKASHI
HONSHU, JAPAN
1/2
1/4
0
1/2 MILE
MAP SHOWING DAMAGE
CAUSED BY RAID OF 7 JULY 1945
CITY OF AKASHI
SUBURBAN AKASHI
U.S. STRATEGIC BOMB. SURVEY
AREA FIRE
DAMAGE STUDY
AKASHI, JAPAN
FIGURE I



LEGEND

DENSELY POPULATED

SPARSELY POPULATED

DAMAGED AREA

PARK

Planned
MEAN POINT OF IMPACT

AKASHI GAWA

CITY OF AKASHI
HONSHU, JAPAN

1/2 1/4 0 1/2 MILE

MAP SHOWING DAMAGE
CAUSED BY RAID OF 7 JULY 1945

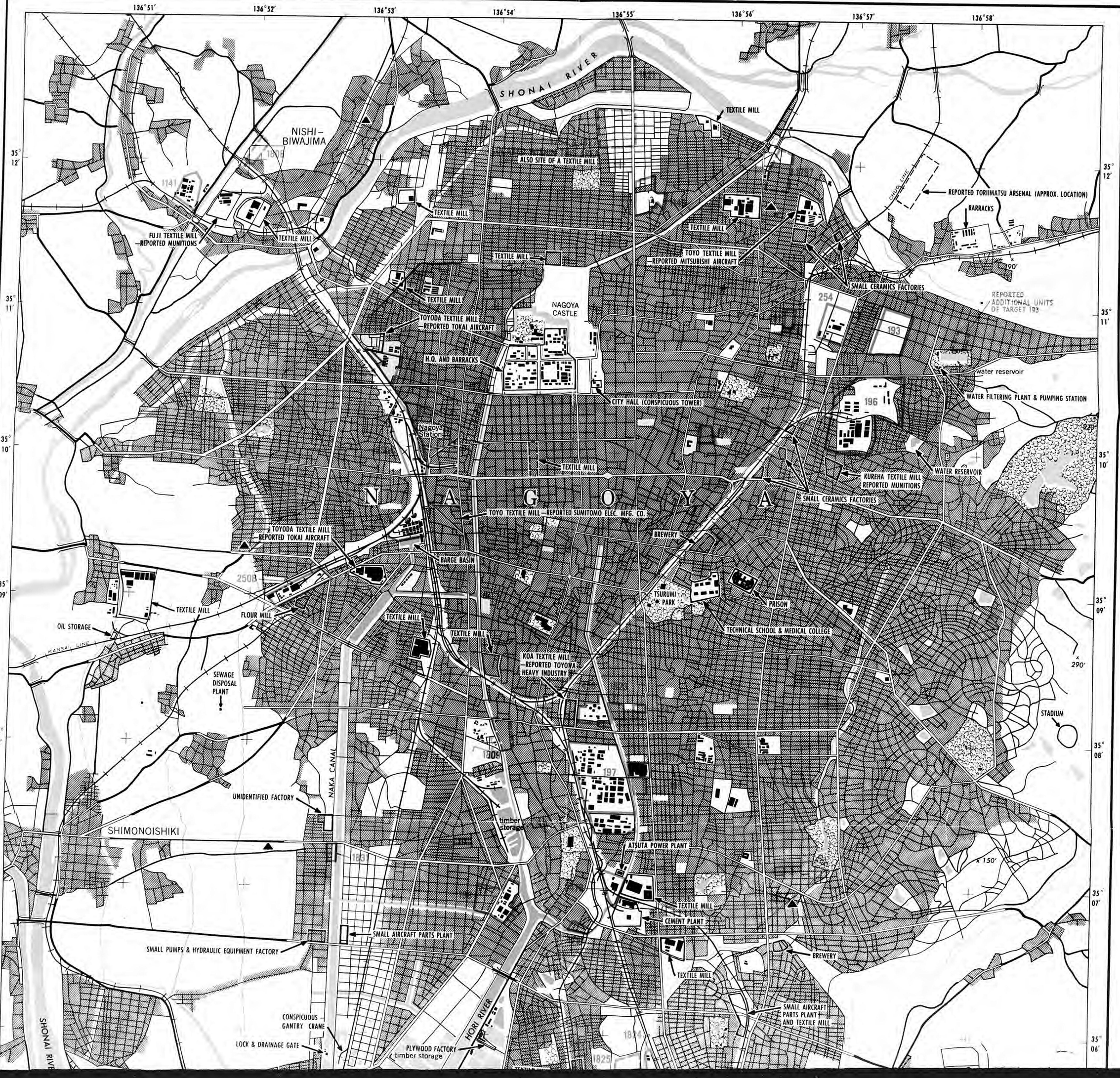
—·—·— CITY OF AKASHI

— — — SUBURBAN AKASHI

U.S. STRATEGIC BOMB. SURVEY

AREA FIRE DAMAGE STUDY
AKASHI, JAPAN
FIGURE 1

By AR-A NARA, Date 5/5/11



By HR-M NARA, Date 3/5/91

INCENDIARY ZONE MAP

NAGOYA

BUILT-UP DISTRICTS

ZONE 1

ZONE 2

DOUBLE-TRACK RAILROADS

SINGLE-TRACK RAILROADS

STREETS AND ROADS

▲ . . . MAIN POWER SUBSTATIONS

ELEVATIONS IN FEET

DATE OF ANALYSIS— MAY 1944

ADAPTED FROM JAPANESE IMPERIAL LAND SURVEY 1934, NAGOYA CITY PLAN 1941, AND CERTAIN OBLIQUE PHOTOGRAPHS.

193 . . MITSUBISHI AIRCRAFT ENGINE WORKS
194 . . MITSUBISHI AIRCRAFT WORKS
195 . . NAGOYA #1 STEAM POWER PLANT
196 . . CHIGUSA FACTORY OF NAGOYA ARSENAL
197 . . ATSUTA FACTORY OF NAGOYA ARSENAL
198 . . AICHI AIRCRAFT WORKS, ATSUTA PLANT
199 . . AICHI AIRCRAFT WKS, MIZUHO BRANCH
241 . . NIPPON VEHICLE MFG CO
242 . . OKAMOTO AIRCRAFT WKS, SHOWA PLANT
247A . . DAIDO ELECTRIC STEEL, OE PLANT
247B . . DAIDO ELECTRIC STEEL, ATSUTA PLANT
247C . . DAIDO ELECTRIC STEEL, TSUKIJI PLANT
247D . . DAIDO ELECTRIC STEEL, MINAMI PLANT
250A . . NAGOYA FREIGHT YARDS
250B . . NAGOYA REPAIR SHOPS
250C . . NAGOYA STATION
251 . . NAGOYA HARBOR
253 . . NISSAN CHEMICAL PLANT
254 . . MITSUBISHI ELECTRIC MFG CO
255 . . YAHAGI ELECTRO-CHEMICAL PLANT
430 . . TOYODA MACHINERY MFG CO
456 . . TOHO GAS WORKS SYNTHETIC OIL PLANT
461 . . OKUMA IRON WORKS, OZONE PLANT
467 . . SHOWA SODA PLANT
1129 . . OKAMOTO AIRCRAFT WKS, KASADERA PLANT
1141 . . TOYOWA HEAVY INDUSTRY CO, SHINKAWA PLANT
1146 . . OKUMA IRON WORKS, HAGINO PLANT
1147 . . OKUMA IRON WORKS, NUNOIKE PLANT
1153 . . JAPAN PORCELAIN CO
1171 . . NIPPON INSULATOR CO
1598 . . NAGOYA #2 STEAM POWER PLANT, MEIKO PLANT
1729 . . AICHI AIRCRAFT WKS, EITOKU PLANT
1735 . . TOYOWA HEAVY INDUSTRY CO, NISHI PLANT
1753 . . KOBE STEEL WORKS, NAGOYA PLANT
1797 . . OKUMA IRON WKS, KAMI IIDA CHO PLANT
1798 . . OSAKA MACHINERY WORKS
1799 . . HOKOKU MACHINERY CO, KASADERA PLANT
1800 . . DAIDO MACHINERY PLANT, SHOWA PLANT
1808 . . MEIDENSHA ELECTRIC MFG CO, NISHI BIWAJIMA PLANT
1809 . . HOKOKU MACHINERY CO, ATSUTA PLANT
1818 . . TOKUSHU LIGHT METALS CO, ATSUTA PLANT
1821 . . RIKEN ALUNITE PLANT
1823 . . TOKAI ELECTRODE CO, NAGOYA #1 PLANT
1824 . . TOKAI ELECTRODE CO, NAGOYA #2 PLANT
1825 . . TOKAI ELECTRODE CO, NAGOYA #3 PLANT
1827 . . DAI NIPPON CELLOPHANE PLANT
1828 . . AICHI AIRCRAFT WORKS, TSUKIJI PLANT
1829 . . YAHAGI STEEL PLANT
1831 . . HIRANO LOOM WORKS, NAKAGAWA PLANT

STATUTE MILES

SCALE 1:25,000 — 1 inch = 31620

COMPILED FOR THE U. S. ARMY AIR FORCES BY THE U. S. COAST AND GEODETIC SURVEY, WASHINGTON, D. C.

CONFIDENTIAL equals British Confidential

3639—Nagoya—M-5—First Proof

By HR-M NARA, Date 3/5/91

CONFIDENTIAL equals British Confidential

136°37'49"

136°45'01"

35° 5'

YATOMI

TO NAGOYA

TEXTILE MILL

TO OGAKI

REPORTED ARMY RICE STORAGE

REPORTED NEW INDUSTRIAL AREAS

1639 AND 1815 REPORTED IN THIS AREA

1779 AND 1816 SOMEWHERE IN KUWANA

KUWANA

TEXTILE MILL

NET AND ROPE FACTORY

1802 (APPROX. LOCATION)

REPORTED NEW INDUSTRIAL AREAS

OBUKE

REPORTED NEW INDUSTRIAL AREA

KISO RIVER

By HR-M NARA, Date 3/5/91

NOTE: HIRATA TEXTILE MILL—REPORTED NAKAJIMA AIRCRAFT. ½ MILE NORTH OF . . . . SHORELINE AT TOMITA BREAKWATERS.

KUWANA and VICINITY

1639 . . SUMITOMO DURALUMIN MILL, KUWANA PLANT
1779 . . YAMAMOTO HEAVY INDUSTRY
1802 . . HITACHI WORKS
1813 . . KOA MACHINERY COMPANY
1814 . . TOKYO SHIBAURA ELECTRIC MFG. COMPANY
1815 . . TOYO BEARING COMPANY, DOJIMA PLANT
1816 . . TOYO BEARING COMPANY, UCHIBORI PLANT

ELEVATIONS IN METERS

DOUBLE TRACK RAILROADS
SINGLE TRACK RAILROADS
FEEDER RAILROADS
PRINCIPAL ROADS
POWER LINES

ADAPTED FROM JAPANESE IMPERIAL LAND SURVEY, 1935
DATE OF ANALYSIS—MAY, 1944

CONFIDENTIAL equals British Confidential

3687—Nagoya—M-6—1st Prod