

Series: AWM95
Australian Army commanders' diaries

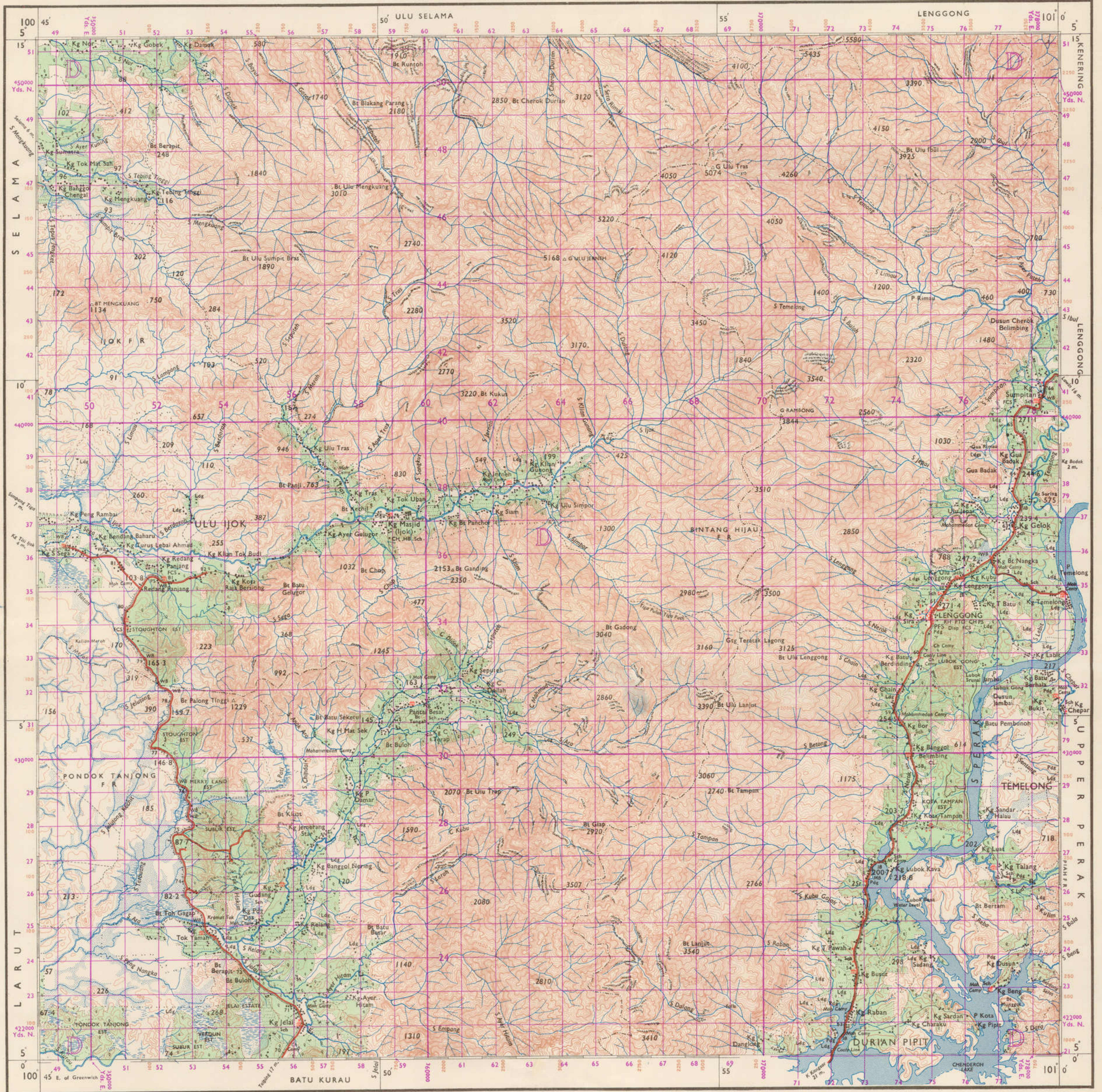
Infantry units

Item number: 7/3/4

**Item: 3 Battalion Royal Australian
Regiment**

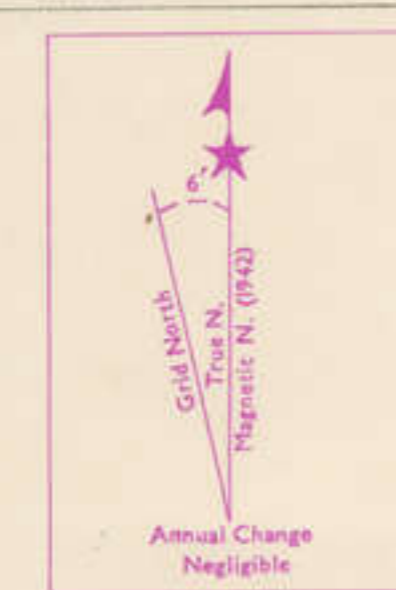
Maps

[1-30 Nov 1957]



Railways: Open with Mile Plate and Railway St. (D) Embankment. (C) Cutting. (E) Double Line. (F) Under Construction. Tunnel.
Bridges: Masonry, Iron, Wooden, Foot and Road, Concrete, Cable-stayed.
Roads: Main, Secondary, Tertiary, Unimproved, Ferret.
Boundaries: External of F.M.S. with Boundary Pillars and Bdy Posts.
Distances: District.
Forest Reserves: Boundary, Limits of Cultivation.
Triangulation Station with Height.
Height: Ordnance, Relative, Theodolite or Level, Barometric, Levelled Bench Mark.
Rivers and Streams: (1) Tidal, (2) Sand Banks, (3) Mud, (4) Rocks, (5) Shallow, (6) Non-tidal, (7) Coral, (8) Thick ground.
Lake and Pond: Tank, Impounding Reservoir, Canal, Filling, Pipe line, Fish-pond.
Water Power and Hydro-Electric Reservoir.
Light Railway, Telegraph and Telephone Line, Electric Transmission Line.

Geographical Section, General Staff, No. 4690
 Published by War Office, 1955.
 Edition 1, G.S.G.S. (FARELF) 1945.



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Scale 1 Inch to a Mile or 1:63,360
 Vertical Interval 50 Ft.
 Surveys up to April 1912 with areas in the west and south east revised in 1933.

MALAY GRID
 Projection Cassini
 Spheroid Everest
 Origin 4° N., 102° E.
 False Co-ordinates of Origin 500,000 yards E., 300,000 yards N.

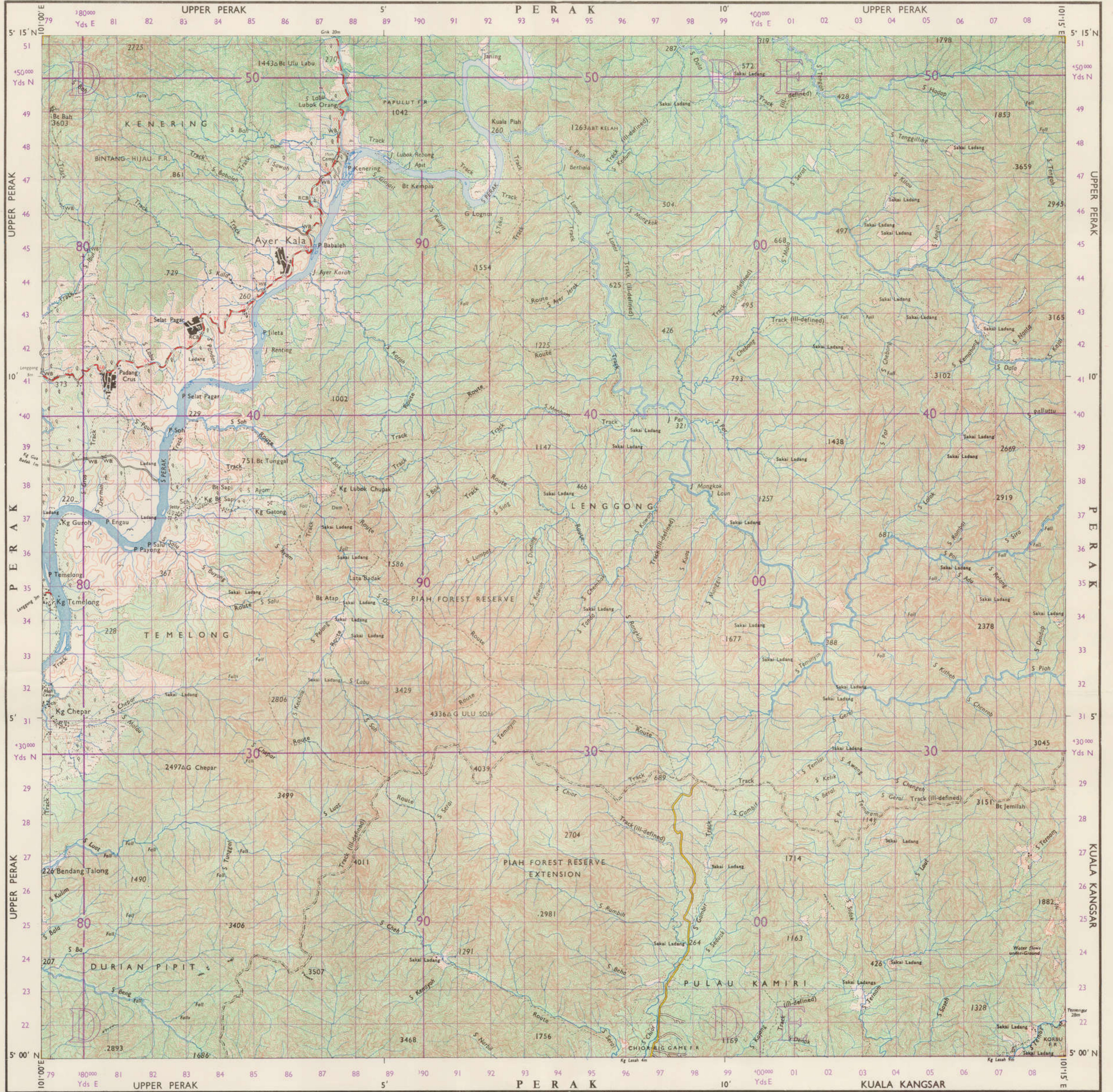
TO GIVE A GRID REFERENCE ON THIS SHEET
 Pay attention to the **smaller** coordinate figures at the corners and in the margins. They are for **finding** full coordinates. viz. 619.

POINT **BT. GADONG** **NOTES**
 Take east edge of the square in which point lies and read the figures printed opposite this line on the east or west margin. Estimate tenths eastwards. **EAST 65**
 Take south edge of the square in which point lies and read the figures printed opposite this line on the south or north margin. Estimate tenths northwards. **NORTH 338**

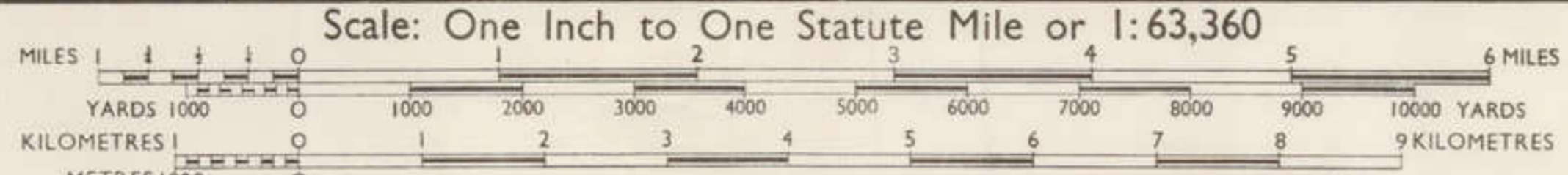
REFERENCE **YO 652338**
 Square.....1,000 yards
 Reference to nearest 100 yards
 Using smaller grid letters, nearest similar reference about 2,500,000 yards or 1,430 miles

Alor (A.)	deep channel of river, hollow, pool	Kampung (K.)	village	Pulau (P.)	island
Ayer (Ay.)	waterfall	Kali (K.)	river mouth	Raman	each of river or of sea coast
Bayan	waterfall	Laluan	exchange	Rambai	fern, brocken
Belat	landing-place, fishing village	Lading (Ldg.)	cultivated clearing	Rimba	virgin jungle
Bekoh	secondary jungle	Lapak	impermanent swamp	Sabit	scarce
Bendang	rice swamp	Lekok (Lk.)	deep pool	Sungei (S.)	river, stream
Bukit (Bt.)	hill	Pondok (Pdg.)	open space, sports field, moorland	Tali ayer (T.A.)	artificial water channel
Changkat (Ch.)	hitack	Pasar	beach	Tanjung (Tg.)	promontory
Cherna (C.)	small stream	Pasar (P.)	dash, drain	Tanak	title
Cheng (Chg.)	pass, cut	Paya	sand	Tanak (T.)	bay, re-entrant bend of river bank
Cheng (C.)	mountain	Pengaluan (Peng.)	permanent swamp	Teluk	channel
Cheng (C.)	road, way		wharf	Teluk	swamp track
Jalan (J.)	road, way				

Reprint of HIND 1035, 3rd. Edition, by Surveyor General, Federation of Malaya, No. 199-1955



Series L707(GSGS 4690)
Published by D. Survey, War Office and Air Ministry, 1957
Edition 2-GSGS



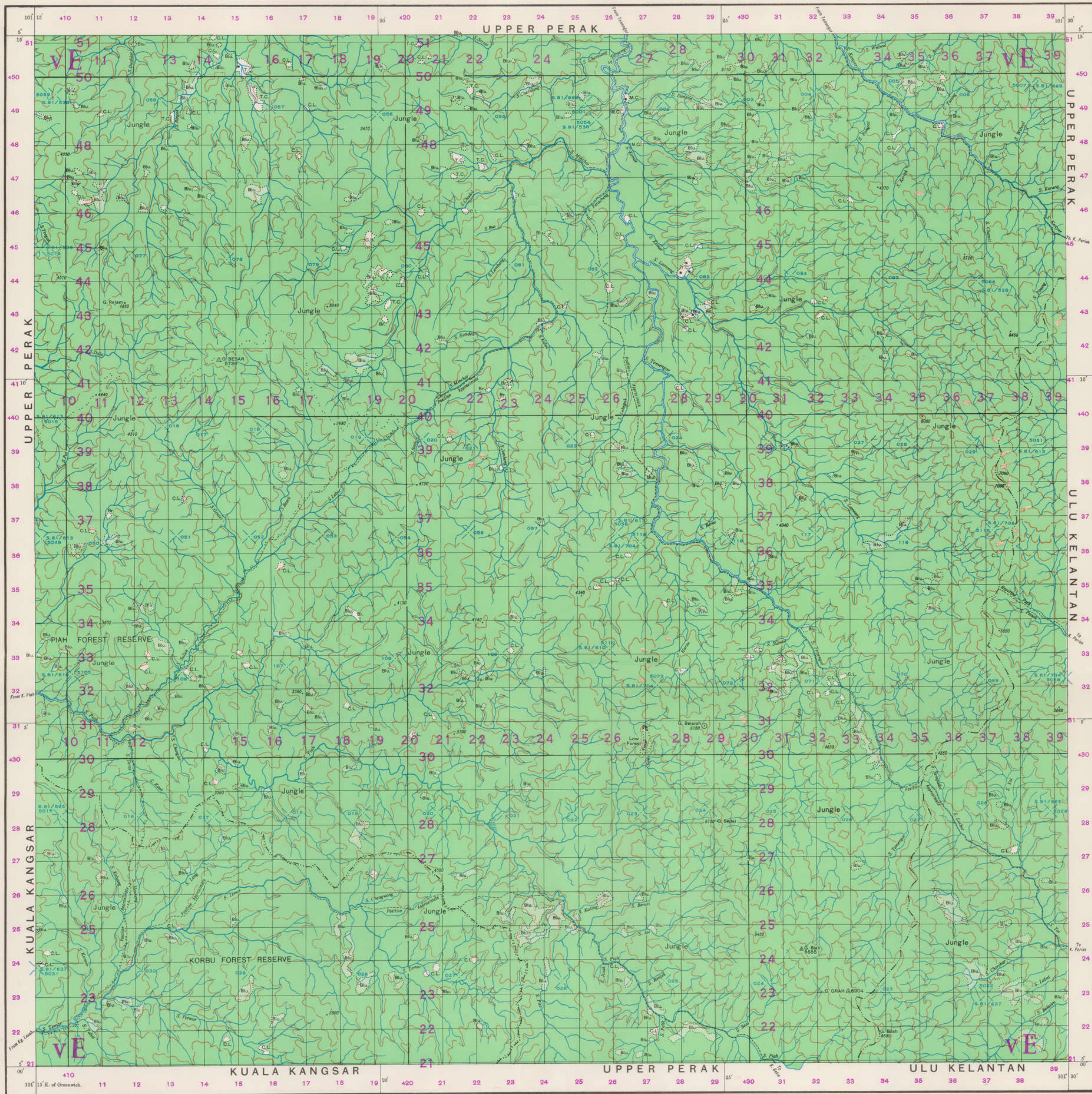
Drawn and Printed by 570 Map Reproduction Troop RE Aug 1957
12000/8/57

HEIGHTS IN FEET

CONTOUR INTERVAL 50 FEET

<p>RAILWAYS</p> <ul style="list-style-type: none"> Double track Single track Light railway (mostly disused) <p>ROADS</p> <ul style="list-style-type: none"> All weather Limited all weather Fair weather only Tracks (generally motorable) Other tracks and routes <p>BRIDGES</p> <ul style="list-style-type: none"> Reinforced concrete Masonry Wooden Level Crossing <p>BOUNDARIES</p> <ul style="list-style-type: none"> International State District 	<p>BUILDINGS (Abbreviations denote functions of certain buildings)</p> <ul style="list-style-type: none"> Church Other religious buildings Cemetery (Abbreviation denotes religion) Deserted Village Fort Rifle Range Mining Area Mining Holes Telephone line (Cross country) Electric transmission line Wall, fence or hedge Impounding reservoir Trigonometrical Station Spot Height <p>WATER FEATURES</p> <ul style="list-style-type: none"> Contours at 50 feet (accentuated at 250 feet intervals) 	<p>VEGETATION</p> <ul style="list-style-type: none"> Jungle Tree cultivation Rubber Coconut Scrub Oil Palm Orchard Other cultivation and vegetation: Padi, Pineapple, Resam Swamp: Tree covered, Mangrove, Nipah Palm Swamp: Open, Tidal, Fresh Water Limit of type of cultivation Forest Reserve boundary 	<p>INDEX TO SHEETS</p> <p>Grid North at the centre of this sheet is 04°15' West of True North</p> <p>Magnetic Declination about 15' East of True North (1953) Annual Change negligible</p>	<table border="1"> <tr> <td>A. A. A. A. A. A.</td> <td>Alto</td> <td>River Channel, hollow, pool</td> <td>G. P. O.</td> <td>General Post Office</td> <td>P.</td> <td>P. A.</td> <td>Island</td> </tr> <tr> <td>A. A. A. A. A. A.</td> <td>Am. App.</td> <td>Water stream</td> <td>H. S. S.</td> <td>Habitat</td> <td>P. A.</td> <td>P. A.</td> <td>Pass</td> </tr> <tr> <td>A. A. A. A. A. A.</td> <td>Am. App.</td> <td>Sand stream</td> <td>H. S. S.</td> <td>Higher reaches of river</td> <td>P. A.</td> <td>P. A.</td> <td>Pass</td> </tr> <tr> <td>A. A. A. A. A. A.</td> <td>Am. App.</td> <td>Small stream</td> <td>H. S. S.</td> <td>Lower reaches of river</td> <td>P. A.</td> <td>P. A.</td> <td>Pass</td> </tr> <tr> <td>A. A. A. A. A. A.</td> <td>Am. App.</td> <td>Small stream or small inlet</td> <td>H. S. S.</td> <td>Water hole</td> <td>P. A.</td> <td>P. A.</td> <td>Pass</td> </tr> <tr> <td>A. A. A. A. A. A.</td> <td>Am. App.</td> <td>Small stream or small inlet</td> <td>H. S. S.</td> <td>Water hole</td> <td>P. A.</td> <td>P. A.</td> <td>Pass</td> </tr> <tr> <td>A. A. A. A. A. A.</td> <td>Am. App.</td> <td>Small stream or small inlet</td> <td>H. S. S.</td> <td>Water hole</td> <td>P. A.</td> <td>P. A.</td> <td>Pass</td> </tr> <tr> <td>A. A. A. A. A. A.</td> <td>Am. App.</td> <td>Small stream or small inlet</td> <td>H. S. S.</td> <td>Water hole</td> <td>P. A.</td> <td>P. A.</td> <td>Pass</td> </tr> <tr> <td>A. A. A. A. A. A.</td> <td>Am. App.</td> <td>Small stream or small inlet</td> <td>H. S. S.</td> <td>Water hole</td> <td>P. A.</td> <td>P. A.</td> <td>Pass</td> </tr> <tr> <td>A. A. A. A. A. A.</td> <td>Am. App.</td> <td>Small stream or small inlet</td> <td>H. S. S.</td> <td>Water hole</td> <td>P. A.</td> <td>P. A.</td> <td>Pass</td> </tr> </table>	A. A. A. A. A. A.	Alto	River Channel, hollow, pool	G. P. O.	General Post Office	P.	P. A.	Island	A. A. A. A. A. A.	Am. App.	Water stream	H. S. S.	Habitat	P. A.	P. A.	Pass	A. A. A. A. A. A.	Am. App.	Sand stream	H. S. S.	Higher reaches of river	P. A.	P. A.	Pass	A. A. A. A. A. A.	Am. App.	Small stream	H. S. S.	Lower reaches of river	P. A.	P. A.	Pass	A. A. A. A. A. A.	Am. App.	Small stream or small inlet	H. S. S.	Water hole	P. A.	P. A.	Pass	A. A. A. A. A. A.	Am. App.	Small stream or small inlet	H. S. S.	Water hole	P. A.	P. A.	Pass	A. A. A. A. A. A.	Am. App.	Small stream or small inlet	H. S. S.	Water hole	P. A.	P. A.	Pass	A. A. A. A. A. A.	Am. App.	Small stream or small inlet	H. S. S.	Water hole	P. A.	P. A.	Pass	A. A. A. A. A. A.	Am. App.	Small stream or small inlet	H. S. S.	Water hole	P. A.	P. A.	Pass	A. A. A. A. A. A.	Am. App.	Small stream or small inlet	H. S. S.	Water hole	P. A.	P. A.	Pass
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NOTE: The existence of a route through the jungle is indicated by the description "Route" applied to a track symbol, the symbol defining the general line.



REFERENCE

Railways.	with Mile plate and Railway Station
Bridges.	(1) Road under. (2) Road over. (3) Level Crossing. (4) Tunnel. Iron, Masonry, Reinforced Concrete, Wooden, Foot.
Roads.	1st Class metalled (unrestricted) with mile stone. 2nd Class metalled or gravel but with possible restrictions as to load and/or width and surface generally inferior to 1st class. Indifferent may be used by motor vehicles but with difficulty and with restrictions as to width/load/weather. Cart or Jeep track. Footpath.
Boundaries.	(1) International. (2) State. (3) District. Forest Reserve with path. Without path. Limit of Cultivation. Wall or Fence. Light railway. Electric transmission line. Cemetery. Buildings. Lighthouse. Trigonometrical station with height. Bench mark. Threshold or level height. Other heights. (1) Sand. (2) Rocks. (3) Tidal river. Rivers of streams. Lake and pond. Service reservoir. Impounding reservoir. Canal. Part. (Drain). Pipe line. Hill features. (1) Rocky outcrop. (2) Cliff. Precipice. (3) Quarry. (4) Landslide. Mines. (1) Fresh water. (2) Mine hole with water. (3) Mine hole without water. Swamps. (1) Tidal. (2) Non-tidal. (3) Cliff outcrop. (4) Lagoon. Court House. Rest House. Halting Bungalan. Hospital. Customs Station. Radio Station. Meteorological Station. Forest Reserve. Forest Checking Station. Dispensary. Padang. Post or Telegraph Office. Post Office. Police Station. Petrol Filling Station. School. Co-ordinated Control Point. Rifle Range.

Projection: Modified Polyconic
Scale 1 Inch to a Mile or 1:63,360

Relief Lines. Give local indication of rising ground but do not maintain constant height and are not contours.

Heights in Feet

Vegetation

Jungle, Gelam Forest.	By limit and name or abbreviation in black	Rubber	By name
Belukar Light Forest.	By name	Coconut	By name
Grass Casuarina Forest.	By name	Old Palm	By name
Brush	By name	Other Classified	By name
Grass and Brush	By name	Unclassified and Mixed	T.C.
Grass and Belukar	By name	Misc. Cultivation	By name
Mangrove	By name	Way Rice Fields	By name
Other Classified	By name	Other Classified	By name
Clearings	By name	Unclassified	M.C.

TO GIVE A GRID REFERENCE ON THIS SHEET
Pay attention to the graphic coordinate figures at the corners and in the margins. They are for finding full coordinates. **BE CAREFUL!**

EAST
Take west edge of the square in which point lies and read the figures printed opposite this line on the north or south margin.

NORTH
Take south edge of the square in which point lies and read the figures printed opposite this line on the east or west margin.

Estimate tenths eastwards. EAST 147
Estimate tenths northwards. NORTH 417

Reference: U.T. 14817
2,000 yards (1/250,000 scale) 1,420 miles

MAGNETIC DECLINATION ABOUT
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PROJECTION: GUNONG GRAH
SPHEROID: EVEREST
ORIGIN: 4° N, 107° E
FALSE COORDINATES OF ORIGIN
500,000 YARDS E, 500,000 YARDS N.

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GLOSSARY OF MALAY TOPOGRAPHICAL TERMS WITH ABBREVIATIONS USED

Alor (A.)	Deep channel of river, hollow, pool	Labok (Lbk.)	Deep Pool
Ayer	Water	Nipah (Nip.)	Palm wood for thatching
Ayer Terjun	Waterfall	Padang (Pdg.)	Open space, sports field, moorland
Bagan	Landing-place, fishing village	Pantai	Beach
Batu	Stone, rock	Parti (Pt)	Ditch, drain
Belukar (Blu.)	Secondary jungle	Pluar	Sand
Bendang	Rice mummy	Pematang (Pmg.)	Ferrous swamp
Bukit (Bk.)	Hill	Pinghulan (Png.)	Wharf
Changkat (Ckt.)	Hilltop	Permatang (Pmg.)	Rising ground in flat country
Charak (Ck.)	Small stream	Pulau (Pl.)	Island
Dusun	Fruit grove	Rantau	Reach of river or of sea coast
Geating (Gtg.)	Pass, col	Resam	Fern, bracken
Gumong (Gg.)	Mountain	Rimba	Virgin jungle
Hilir, Hilir	Downstream region	Rumbeh	Palm wood for thatching
Intana	Palace	Sakai Ladang (S. Ldg.)	Cultivated clearing of aborigines
Jalan	Road, way	Selat	Strait
Jeram (Jj.)	Rapids	Simpang	Cross-roads
Kampung (Kk.)	Village	Sira	Salt-lick
Kota	Fort	Sungai (Sg.)	River, stream
Kuala (K.)	River mouth	Tali Ayer (T.A.)	Artificial water channel
Kuhang	Wallow	Tanjung (Tj.)	Promontory
Labuhan	Anchorage	Tanak	Lake
Ladang (Ldg.)	Cultivated clearing	Tekah (Tt.)	Bay, recessed bend of river bank
Lalang (Ll.)	Long wild grass	Terusan	Channel
Last	Saw	Tuban	Swan rock
Lopak	Impervious swamp	Ulu, Hulu	Upstream region

The following features are omitted:
Castles and Embankments
Telegraph or Telephone Lines
Places of Worship
Maiden Names and Boundaries

Reliability:
Compiled 1951 from Air photographs with limited existing ground survey.

EMERGENCY ISSUE
Survey Dept. Federation of Malaya No. 79-51



Scale: One Inch to One Statute Mile or 1:63,360
Drawn and Printed by 570 Map Reproduction Troop RE Oct 1957
120001037

Scale: One Inch to One Statute Mile or 1:63,360
HEIGHTS IN FEET: 0 1000 2000 3000 4000 5000 6000 7000 8000 9000 10000
YARDS: 0 1000 2000 3000 4000 5000 6000 7000 8000 9000 10000
KILOMETRES: 0 1 2 3 4 5 6 7 8 9
METRES: 0 1000 2000 3000 4000 5000 6000 7000 8000 9000 10000
CONTOUR INTERVAL 50 FEET

<p>RAILWAYS</p> <ul style="list-style-type: none"> Double track Single track Light railway (mostly disused) <p>ROADS</p> <ul style="list-style-type: none"> All weather Limited all weather Foot weather only Tracks (generally motorable) Other tracks and routes <p>BRIDGES</p> <ul style="list-style-type: none"> Rainbow concrete Masonry Wooden Level crossing <p>BOUNDARIES</p> <ul style="list-style-type: none"> International State District 	<p>BUILDINGS (Abbreviations denote functions of certain buildings)</p> <ul style="list-style-type: none"> Church Other religious buildings Mining Areas Fort Mining Holes Telephone Line (Cross country) Electric transmission line Wall, fence or hedge Impounding reservoir Trigonometrical Station Spot Height <p>WATER FEATURES</p> <ul style="list-style-type: none"> Light Bay Light House Light Beacon Canal Underground Well Spring Swamp Swampy ground Rocky Outcrop Limstone Hill <p>RELIEF</p> <ul style="list-style-type: none"> Contours at 50 feet (accentuated at 250 feet intervals) Broken ground Quarry 	<p>VEGETATION</p> <ul style="list-style-type: none"> Jungle Tree Cultivation Rubber Oil Palm Other cultivation and vegetation Padi Lalang Swamp Maugrove Tidal Fresh Water Coconut Orchard Pineapple Resam Nipah Palm 	<p>INDEX TO SHEETS</p> <p>Grid North at the centre of this sheet is 04° 00' West of True North</p> <p>Magnetic Declination about 09' East of True North (1955) Annual Change negligible</p>	<p>Malay Grid</p> <p>PROJECTION: SPHEROID ORIGIN: 04°N & 102°E FALSE CO-ORDINATES OF ORIGIN: 100,000 YDS E, 100,000 YDS N</p> <p>CASSINI EVEREST 04°N & 102°E FALSE CO-ORDINATES OF ORIGIN: 100,000 YDS E, 100,000 YDS N</p>	<p>RAILWAYS</p> <ul style="list-style-type: none"> Double track Single track Light railway (mostly disused) <p>ROADS</p> <ul style="list-style-type: none"> All weather Limited all weather Foot weather only Tracks (generally motorable) Other tracks and routes <p>BRIDGES</p> <ul style="list-style-type: none"> Rainbow concrete Masonry Wooden Level crossing <p>BOUNDARIES</p> <ul style="list-style-type: none"> International State District 	<p>BUILDINGS (Abbreviations denote functions of certain buildings)</p> <ul style="list-style-type: none"> Church Other religious buildings Mining Areas Fort Mining Holes Telephone Line (Cross country) Electric transmission line Wall, fence or hedge Impounding reservoir Trigonometrical Station Spot Height <p>WATER FEATURES</p> <ul style="list-style-type: none"> Light Bay Light House Light Beacon Canal Underground Well Spring Swamp Swampy ground Rocky Outcrop Limstone Hill <p>RELIEF</p> <ul style="list-style-type: none"> Contours at 50 feet (accentuated at 250 feet intervals) Broken ground Quarry 	<p>VEGETATION</p> <ul style="list-style-type: none"> Jungle Tree Cultivation Rubber Oil Palm Other cultivation and vegetation Padi Lalang Swamp Maugrove Tidal Fresh Water Coconut Orchard Pineapple Resam Nipah Palm 	<p>INDEX TO SHEETS</p> <p>Grid North at the centre of this sheet is 04° 00' West of True North</p> <p>Magnetic Declination about 09' East of True North (1955) Annual Change negligible</p>	<p>Malay Grid</p> <p>PROJECTION: SPHEROID ORIGIN: 04°N & 102°E FALSE CO-ORDINATES OF ORIGIN: 100,000 YDS E, 100,000 YDS N</p> <p>CASSINI EVEREST 04°N & 102°E FALSE CO-ORDINATES OF ORIGIN: 100,000 YDS E, 100,000 YDS N</p>	<p>RAILWAYS</p> <ul style="list-style-type: none"> Double track Single track Light railway (mostly disused) <p>ROADS</p> <ul style="list-style-type: none"> All weather Limited all weather Foot weather only Tracks (generally motorable) Other tracks and routes <p>BRIDGES</p> <ul style="list-style-type: none"> Rainbow concrete Masonry Wooden Level crossing <p>BOUNDARIES</p> <ul style="list-style-type: none"> International State District 	<p>BUILDINGS (Abbreviations denote functions of certain buildings)</p> <ul style="list-style-type: none"> Church Other religious buildings Mining Areas Fort Mining Holes Telephone Line (Cross country) Electric transmission line Wall, fence or hedge Impounding reservoir Trigonometrical Station Spot Height <p>WATER FEATURES</p> <ul style="list-style-type: none"> Light Bay Light House Light Beacon Canal Underground Well Spring Swamp Swampy ground Rocky Outcrop Limstone Hill <p>RELIEF</p> <ul style="list-style-type: none"> Contours at 50 feet (accentuated at 250 feet intervals) Broken ground Quarry 	<p>VEGETATION</p> <ul style="list-style-type: none"> Jungle Tree Cultivation Rubber Oil Palm Other cultivation and vegetation Padi Lalang Swamp Maugrove Tidal Fresh Water Coconut Orchard Pineapple Resam Nipah Palm 	<p>INDEX TO SHEETS</p> <p>Grid North at the centre of this sheet is 04° 00' West of True North</p> <p>Magnetic Declination about 09' East of True North (1955) Annual Change negligible</p>	<p>Malay Grid</p> <p>PROJECTION: SPHEROID ORIGIN: 04°N & 102°E FALSE CO-ORDINATES OF ORIGIN: 100,000 YDS E, 100,000 YDS N</p> <p>CASSINI EVEREST 04°N & 102°E FALSE CO-ORDINATES OF ORIGIN: 100,000 YDS E, 100,000 YDS N</p>
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THIS MAP MUST NOT BE CONSIDERED AN AUTHORITY ON THE DELIMITATION OF INTERNATIONAL BOUNDARIES

Prepared under the direction of AD Survey, Far East Land Forces.
Revised by the Survey Department of Malaya and 84 Field Survey Squadron RE from the following source materials:
(i) RAF Air Survey photography dated February to May 1956 supplemented by ground survey revision up to October 1957.
(ii) GSGS 4690 Edition 1, which was based on F.M.S. Topo Surveys dated 1912 with revision to 1930.



Scale: One Inch to One Statute Mile or 1:63,360
Drawn and Printed by 570 Map Reproduction Troop RE Apr 1958
12000 / 4 / 58

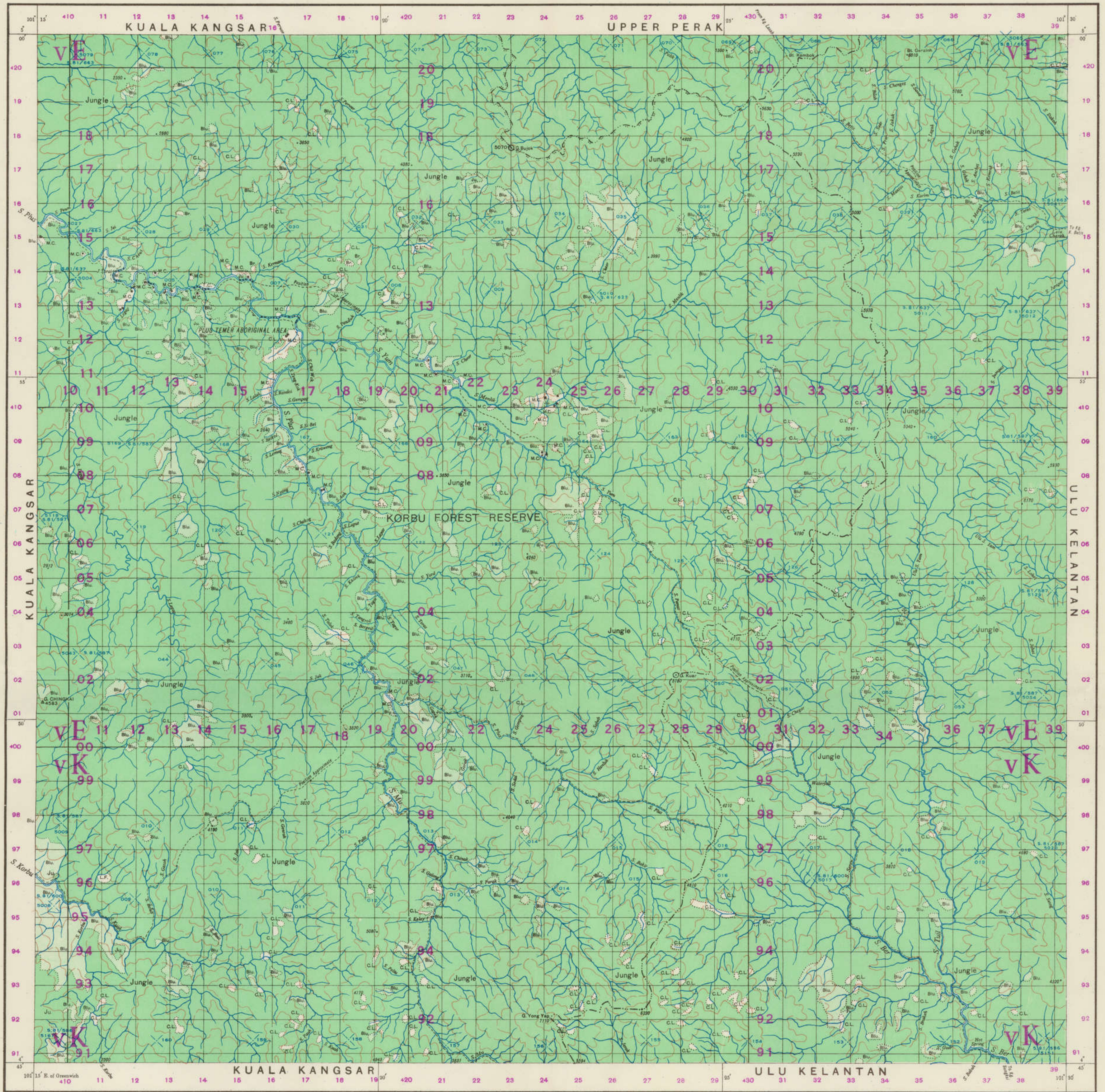
Series L 707 (GSGS 4690)
Published by D. Survey, War Office and Air Ministry, 1958
Edition 2-GSGS

<p>RAILWAYS</p> <ul style="list-style-type: none"> Double track Single track Light railway (mostly decoupled) <p>ROADS</p> <ul style="list-style-type: none"> All weather Limited all weather Fair weather only Tracks (generally motorable) Other tracks and routes <p>BRIDGES</p> <ul style="list-style-type: none"> Reinforced concrete Timber Wooden Level Crossing Unimproved <p>BOUNDARIES</p> <ul style="list-style-type: none"> International State District 	<p>BUILDINGS (Abbreviations denote functions of certain buildings)</p> <ul style="list-style-type: none"> Church Other religious buildings Rifle Range Cemetery Mining Area Fort Mining Holes Telephone Line (Cross country) Electric transmission line Wall, fence or hedge Impounding reservoir Service reservoir Trigonometrical Station Spot Height <p>WATER FEATURES</p> <ul style="list-style-type: none"> Light Bury Underground Light House Light Beacon Canal Quarry <p>RELIEF</p> <ul style="list-style-type: none"> Contours at 50 feet (accentuated at 250 feet interval) Break ground 	<p>VEGETATION</p> <ul style="list-style-type: none"> Jungle Tree Cultivation Trees: Rubber, Coconut, Oil Palm, Orchard, Pineapple, Resam, Nipah Palm Other cultivation and vegetation: Padi, Scrub, Mangrove Swamp Tidal Limit of type of cultivation Forest Reserve boundary 	<p>INDEX TO SHEETS</p> <p>Grid North at the centre of this sheet is 04° 18' West of True North</p> <p>Magnetic Declination about 12' East of True North (1955) Annual Change negligible</p>	<p>Reliability</p> <table border="1"> <tr> <td>Revised</td> <td>Resurveyed</td> </tr> <tr> <td>Dec 1957</td> <td>Mar 1958</td> </tr> </table>	Revised	Resurveyed	Dec 1957	Mar 1958	<p>MALAY GRID</p> <p>PROJECTION: SPHEROID ORIGIN: 84° 10' E FALSE CO-ORDINATES OF ORIGIN: 500,000 YDS E CASSINI EVEREST 84° 10' E FALSE CO-ORDINATES OF ORIGIN: 300,000 YDS N</p>
Revised	Resurveyed								
Dec 1957	Mar 1958								

NOTE: The existence of a route through the jungle is indicated by the description "Route" applied to a track symbol, the symbol defining the general line.

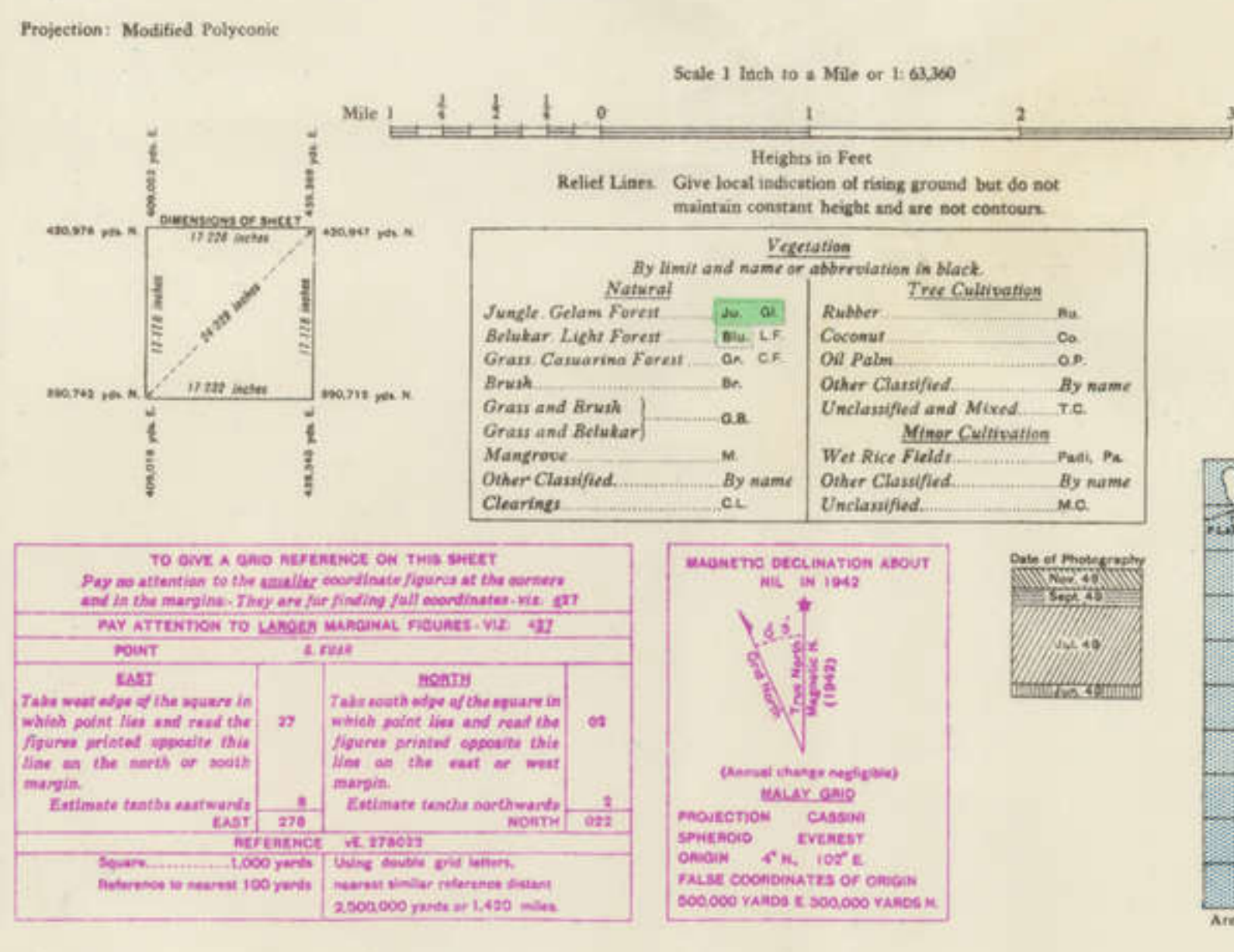
THIS MAP MUST NOT BE CONSIDERED AN INTERNATIONAL BOUNDARIES

Prepared under the direction of AD Survey, Far East Land Forces. Resurveyed and revised by 84 Field Survey Squadron RE from the following source materials:
(i) RAF Air Survey photography dated January 1956 and February 1958, supplemented by ground survey revision in December 1957
(ii) GSGS 4690 Edition 1, which was based on F.M.S. Topo Surveys up to 1914 with partial revision in 1940



REFERENCE

Railways.	with Mile plate and Railway Station (1) Road under. (2) Road over.
Bridges.	(3) Level Crossing. (4) Tunnel. Iron. Masonry. Reinforced Concrete. Wooden. Post. 1 st Class metalled (unrestricted), with mile stone. 2 nd Class metalled or gravel but with possible restrictions as to load and/or width and surface generally inferior to 1 st class. Indiferent, may be used by motor vehicles but with difficulty and with restrictions as to width/load/weight. Curt or Jeep track. Footpath.
Roads.	
Boundaries.	(1) International. (2) State. (3) District. Forest Reserve with path. Without path. Lines of Cultivation. Wall or Fence. Light railway. Electric transmission line. Cemetery. Buildings. Light house. Triangulation station with height. Bench mark. Theodolite or level height. Other heights. 4583 A. G. CHINDAI +305.5 (1) 5070 (2) 4280 (4)
Coastal features.	(1) Sand. (2) Rocks. (3) Tidal river.
Rivers and streams.	(4) Mud. (5) Ferry. (6) Waterfall. (7) Unsurveyed or Sketched Stream. Lake and pond. Service reservoir. Impounding reservoir. Canal. Piers. (1) Gravel. (2) Pipe line. (1) Rocks. (2) Cliff. Precipice. (3) Quarry. (4) Landslide. Hill features. (1) Mining land. (2) Mine hole with water. (3) Mine hole without water. Swamps. (1) Fresh water. (2) Salt water. (3) Mangrove.
Courthouse. Rest House. Halting Bengalon. Hospital.	C.S. B.S. B.R. Hosp.
Cinema Station. Radio Station. Meteorological Station.	C.S. B.S. B.R. Met.
Forest Reserve. Forest Checking Station. Dispensary. Padang.	F.R. T.C.S. Disp. Pad.
Post & Telegraph Office. Post Office.	P.T.O. P.O.
Police Station. Patrol Picketing Station. School.	P.S. P.P.S. Sch.
Co-ordinated Control Point. Rifle Range.	C.C.P. R.R.



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GLOSSARY OF MALAY TOPOGRAPHICAL TERMS WITH ABBREVIATIONS USED

Alor (A.)	Deep channel of river, hollow, pool	Lubok (Lb.)	Deep Pool
Ayer	Water	Nipah (Nip.)	Palm used for thatching
Ayer Terjun	Waterfall	Padang (Pdg)	Open space, sports field, moorland
Bagan	Landing-place, fishing village	Pantai	Beach
Batu	Stone, rock	Pasar (Ps)	Ditch, drain
Bukhar (Bh.)	Secondary jungle	Pasar	Sand
Bunding	Rice swamp	Pasar	Permanant swamp
Bukit (Bt.)	Hill	Penghalan (Peng)	Wharf
Changkat (Ch.)	Hillock	Permatang (Permg)	Rising ground in flat country
Charak (Ck.)	Small stream	Pulau (Pl.)	Island
Dusun	Fruit grove	Rantau	Reach of river or of sea coast
Gering (Gg.)	Pass, cut	Resam	Fern, bracken
Gumpang (Gg.)	Mountain	Rimba	Virgin jungle
Ilir, Hilir	Downstream region	Rumai	Palm used for thatching
Itana	Palace	Sakai Ladang (S.Ldg)	Cultivated clearing of aborigines
Jalan	Road, way	Selat	Strait
Jerang	Salt-lick	Simpang	Cross-roads
Jeram (J.)	Rapids	Sino	Salt-lick
Kampung (Kg.)	Village	Sungai (Sg.)	River, stream
Kota	Fort	Tali Ater (T.A.)	Artificial water channel
Kubang	Water	Tanjong (Tg.)	Promontory
Lubahan	Anchorage	Tanak	Lake
Ladang (Ldg.)	Cultivated clearing	Teluk (Tl.)	Bay, re-entrant head of river bank
Lalang (La.)	Long wild grass	Teluk	Channel
Lina	Sia	Tuban	Shaken rock
Lopak	Impermanent swamp	Ulu, Hulu	Upstream region

The following features are omitted:
Cuttings and Embankments
Telegraph or Telephone Lines
Places of Worship
Main Names and Boundaries

Photo centre shows that: S. 81/683/8027

EMERGENCY ISSUE

Compiled 1951 from Air photographs with limited existing ground survey.

Survey Dept. Federation of Malaya No. 95-54
Reprinted in 1954 without revision.



Scale: One Inch to One Statute Mile or 1:63,360
MILES 1 2 3 4 5 6
YARDS 1000 2000 3000 4000 5000 6000 7000 8000 9000 10000
KILOMETRES 1 2 3 4 5 6 7 8 9
METRES 1000
CONTOUR INTERVAL 50 FEET

RAILWAYS Double track Single track Light railway (mostly decapulle)	ROADS All weather Limited all weather Fair weather only Tracks (generally motorable) Other tracks and routes	BRIDGES Reinforced concrete Plancher Wooden Level crossing Underpass Footbridge	BOUNDARIES International State District	BUILDINGS (Abbreviations denote functions of certain buildings) Church Rifle Range Mining Area Telephone Line (Cross country) Electric transmission line Wall, fence or hedge Impounding reservoir Trigonometrical Station WATER FEATURES Light River Light House Light Beacon Canal Light House Light Beacon Canal	VEGETATION Jungle Tree Cultivation Trees: Rubber Oil Palm Other cultivation and vegetation Padi Lalang Mangrove Tidal Limit of type of cultivation Forest Reserve boundary	INDEX TO SHEETS A grid diagram showing the arrangement of sheets around the central sheet.	MAP SYMBOLS A, A.A., B, B.H., B.L., B.M., B.P., C, C.C., C.D., C.G., C.H., C.I., C.L., C.M., C.N., C.O., C.P., C.R., C.S., C.T., C.U., C.V., C.W., C.X., C.Y., C.Z., D, D.A., D.B., D.C., D.D., D.E., D.F., D.G., D.H., D.I., D.J., D.K., D.L., D.M., D.N., D.O., D.P., D.Q., D.R., D.S., D.T., D.U., D.V., D.W., D.X., D.Y., D.Z., E, F, G, H, I, J, K, L, M, N, O, P, Q, R, S, T, U, V, W, X, Y, Z, AA, AB, AC, AD, AE, AF, AG, AH, AI, AJ, AK, AL, AM, AN, AO, AP, AQ, AR, AS, AT, AU, AV, AW, AX, AY, AZ, BA, BB, BC, BD, BE, BF, BG, BH, BI, BJ, BK, BL, BM, BN, BO, BP, BQ, BR, BS, BT, BU, BV, BW, BX, BY, BZ, CA, CB, CC, CD, CE, CF, CG, CH, CI, CJ, CK, CL, CM, CN, CO, CP, CQ, CR, CS, CT, CU, CV, CW, CX, CY, CZ, DA, DB, DC, DD, DE, DF, DG, DH, DI, DJ, DK, DL, DM, DN, DO, DP, DQ, DR, DS, DT, DU, DV, DW, DX, DY, DZ, EA, EB, EC, ED, EE, EF, EG, EH, EI, EJ, EK, EL, EM, EN, EO, EP, EQ, ER, ES, ET, EU, EV, EW, EX, EY, EZ, FA, FB, FC, FD, FE, FF, FG, FH, FI, FJ, FK, FL, FM, FN, FO, FP, FQ, FR, FS, FT, FU, FV, FW, FX, FY, FZ, GA, GB, GC, GD, GE, GF, GG, GH, GI, GJ, GK, GL, GM, GN, GO, GP, GQ, GR, GS, GT, GU, GV, GW, GX, GY, GZ, HA, HB, HC, HD, HE, HF, HG, HH, HI, HJ, HK, HL, HM, HN, HO, HP, HQ, HR, HS, HT, HU, HV, HW, HX, HY, HZ, IA, IB, IC, ID, IE, IF, IG, IH, II, IJ, IK, IL, IM, IN, IO, IP, IQ, IR, IS, IT, IU, IV, IW, IX, IY, IZ, JA, JB, JC, JD, JE, JF, JG, JH, JI, JJ, JK, JL, JM, JN, JO, JP, JQ, JR, JS, JT, JU, JV, JW, JX, JY, JZ, KA, KB, KC, KD, KE, KF, KG, KH, KI, KJ, KK, KL, KM, KN, KO, KP, KQ, KR, KS, KT, KU, KV, KW, KX, KY, KZ, LA, LB, LC, LD, LE, LF, LG, LH, LI, LJ, LK, LM, LN, LO, LP, LQ, LR, LS, LT, LU, LV, LW, LX, LY, LZ, MA, MB, MC, MD, ME, MF, MG, MH, MI, MJ, MK, ML, MN, MO, MP, MQ, MR, MS, MT, MU, MV, MW, MX, MY, MZ, NA, NB, NC, ND, NE, NF, NG, NH, NI, NJ, NK, NL, NM, NO, NP, NQ, NR, NS, NT, NU, NV, NW, NX, NY, NZ, OA, OB, OC, OD, OE, OF, OG, OH, OI, OJ, OK, OL, OM, ON, OO, OP, OQ, OR, OS, OT, OU, OV, OW, OX, OY, OZ, PA, PB, PC, PD, PE, PF, PG, PH, PI, PJ, PK, PL, PM, PN, PO, PP, PQ, PR, PS, PT, PU, PV, PW, PX, PY, PZ, QA, QB, QC, QD, QE, QF, QG, QH, QI, QJ, QK, QL, QM, QN, QO, QP, QQ, QR, QS, QT, QU, QV, QW, QX, QY, QZ, RA, RB, RC, RD, RE, RF, RG, RH, RI, RJ, RK, RL, RM, RN, RO, RP, RQ, RR, RS, RT, RU, RV, RW, RX, RY, RZ, SA, SB, SC, SD, SE, SF, SG, SH, SI, SJ, SK, SL, SM, SN, SO, SP, SQ, SR, SS, ST, SU, SV, SW, SX, SY, SZ, TA, TB, TC, TD, TE, TF, TG, TH, TI, TJ, TK, TL, TM, TN, TO, TP, TQ, TR, TS, TT, TU, TV, TW, TX, TY, TZ, UA, UB, UC, UD, UE, UF, UG, UH, UI, UJ, UK, UL, UM, UN, UO, UP, UQ, UR, US, UT, UY, UZ, VA, VB, VC, VD, VE, VF, VG, VH, VI, VJ, VK, VL, VM, VN, VO, VP, VQ, VR, VS, VT, VU, VV, VW, VX, VY, VZ, WA, WB, WC, WD, WE, WF, WG, WH, WI, WJ, WK, WL, WM, WN, WO, WP, WQ, WR, WS, WT, WU, WV, WW, WX, WY, WZ, XA, XB, XC, XD, XE, XF, XG, XH, XI, XJ, XK, XL, XM, XN, XO, XP, XQ, XR, XS, XT, XU, XV, XW, XX, XY, XZ, YA, YB, YC, YD, YE, YF, YG, YH, YI, YJ, YK, YL, YM, YN, YO, YP, YQ, YR, YS, YT, YU, YV, YW, YX, YY, YZ, ZA, ZB, ZC, ZD, ZE, ZF, ZG, ZH, ZI, ZJ, ZK, ZL, ZM, ZN, ZO, ZP, ZQ, ZR, ZS, ZT, ZU, ZV, ZW, ZX, ZY, ZZ
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NOTE: The existence of a route through the jungle is indicated by the description "Route" applied to a track symbol, the symbol defining the general line.

SERIES L707 (GSGS 4690)
SHEET 2M18
EDITION 2-GSGS

THIS MAP MUST NOT BE CONSIDERED AN AUTHORITY ON THE DELIMITATION OF INTERNATIONAL BOUNDARIES

MALAY GRID
PROJECTION: UTM
ORIGIN: 6°N & 102°E
FA: 100,000 YDS E
CASSINI EVEREST
1:63,360
100,000 YDS N

Grid North at the centre of this sheet is 05°27' West of True North
Magnetic Declination about 11' East of True North (1955)
Annual Change negligible

Prepared under the direction of AD Survey, Far East Land Forces, Revised by 84 Field Survey Squadron RE from the following source materials:
(i) RAF Air Survey photography dated Nov 55 to May 56, supplemented by ground survey revision in October 1957.
(ii) GSGS 4690 Edition 1, which was based on surveys up to December 1912 with revision in 1914 and 1929

MALAYA: 1 INCH TO 1 MILE

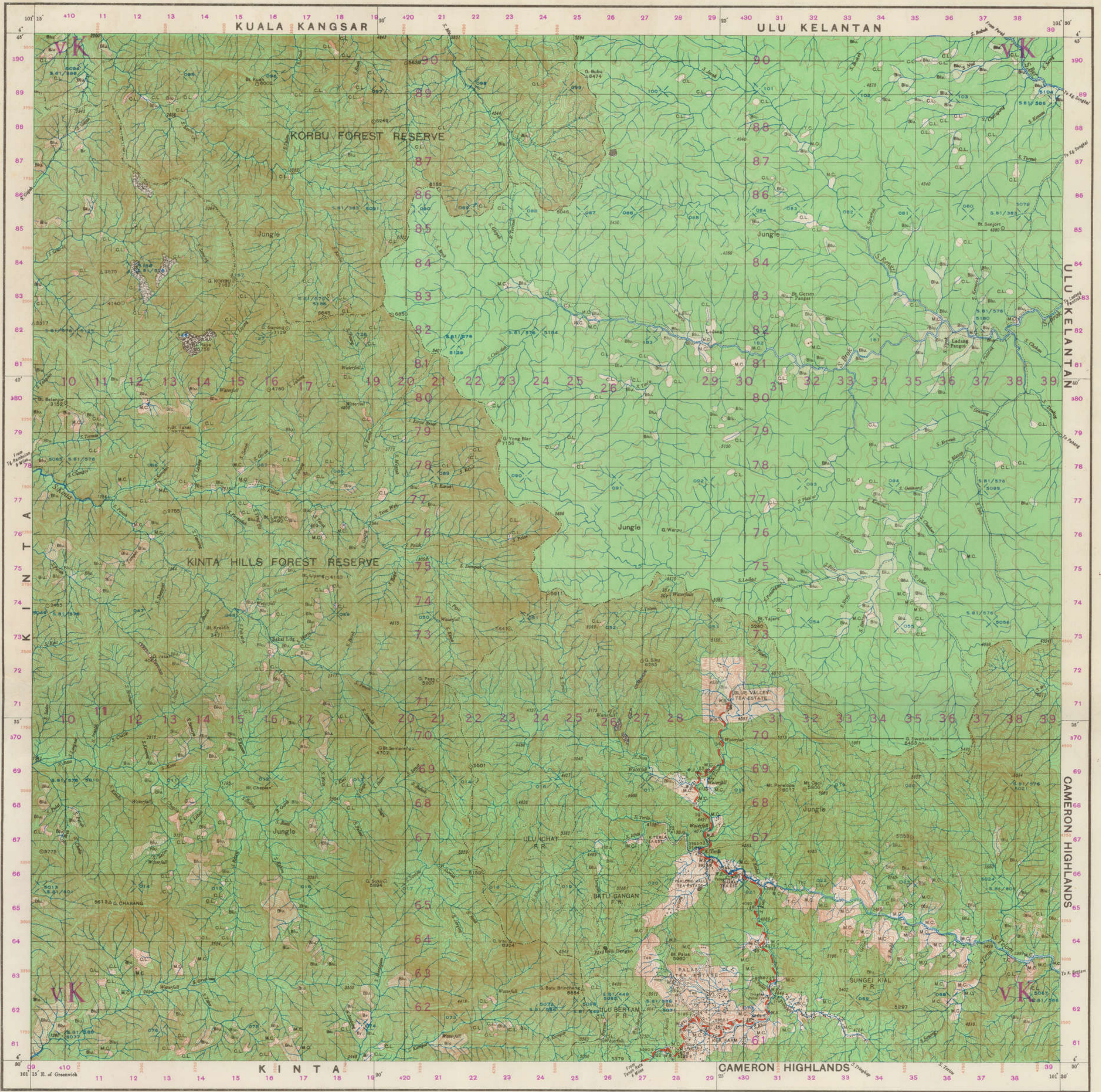
PART OF DISTRICTS KINTA, KUALA KANGSAR (PERAK), ULU KELANTAN (KELANTAN) & CAMERON HIGHLANDS (PAHANG)

PERAK, KELANTAN & PAHANG

EDITION I. - G.S.G.S. (FAREL)

Refer to this sheet as G.S.G.S. 4690 Sheet 2 N/6 Edition 1.

SHEET 2 N/6



REFERENCE

Railways	with Mile plate and Railway Station (1) Road under, (2) Road over, (3) Level Crossing, (4) Tunnel.
Bridges	Iron, Masonry, Reinforced Concrete, Wooden, Foot, 2 nd Class metal (unrestricted), with mile stone, 3 rd Class metal (restricted), with mile stone, 4 th Class metal (restricted), with mile stone, 5 th Class metal (restricted), with mile stone, 6 th Class metal (restricted), with mile stone, 7 th Class metal (restricted), with mile stone, 8 th Class metal (restricted), with mile stone, 9 th Class metal (restricted), with mile stone, 10 th Class metal (restricted), with mile stone.
Roads	Indifferent, may be used by motor vehicles but with difficulty and with restrictions as to width/load/weight. Cart or Jeep track, Footpath.
Boundaries	(1) International, (2) State, (3) District, (4) Forest Reserve with path, Without path, Limit of Cultivation, Wall or Fence, Light railway, Electric transmission line, Canal, Paris, (Drain), Pipe line, (7) Trigonometrical station with height, Bench mark, (8) Tidal gauge or level, Relative, Other heights, (9) Tidal river, (10) Sand, (11) Rocks, (12) Tidal river, (13) Mud, (14) Ferry, (15) Waterfall, (16) Unsurveyed or Sketched Stream, Lake and pond, Service reservoir, Impounding reservoir, Canal, Paris, (Drain), Pipe line, (17) Rocky outcrop, (18) Cliff, Precipice, (19) Quarry, (20) Landslide, (21) Mining land, (22) Mine hole with water, (23) Mine hole without water, (24) Fresh water, (25) Tidal, (26) Cliff outcrop, (27) Leap.
Hill features	Court House, Rest House, Halting Bangalore, Hospital, Customs Station, Radio Station, Meteorological Station, Forest Reserve, Forest Checking Station, Dispensary, Padang, Post or Telegraph Office, Post Office, Police Station, Patrol Picking Station, School, Co-ordinated Control Point, Rifle Range.

Projection: Modified Polyconic
Scale: 1 Inch to 1 Mile or 1:63,360

Heights in Feet

Vegetation

Jungle, Gelam Forest	By limits and name or abbreviation in black	Rubber	By name
Belukar Light Forest	Natural	Coconut	By name
Grass, Cameroons Forest	By name	Oil Palm	By name
Brush	By name	Other Classified	By name
Grass and Brush	By name	Unclassified and Mixed	By name
Grass and Belukar	By name	Wet Rice Fields	By name
Mangrove	By name	Other Classified	By name
Other Classified	By name	Unclassified	By name
Clearings	By name		

TO GIVE A GRID REFERENCE ON THIS SHEET
Pay attention to the small coordinate figures at the corners
and in the margins. They are for finding full coordinates on 1:50,000
PAY ATTENTION TO LARGE MARGINAL FIGURES-VIS-432

MAGNETIC DECLINATION ABOUT
MIL. IN 1942

RELIABILITY
(SEE NOTE)

DATE OF PHOTOGRAPHY
APR 1952

PROJECTION: CASSINI
SPHEROID: EVEREST
ORIGIN: 4° N, 102° E
FALSE COORDINATES OF ORIGIN
500,000 YARDS E, 500,000 YARDS N

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GLOSSARY OF MALAY TOPOGRAPHICAL TERMS WITH ABBREVIATIONS USED

Alor (A.)	Deep channel of river, hollow, pool	Lakoh (Lak.)	Deep Pool
Ayer	Water	Nipah (Nip.)	Palm used for thatching
Ayer Terjun	Waterfall	Padang (Pad.)	Open space, sports field, moorland
Agan	Landing place, fishing village	Parit	Ditch, drain
Batu	Stone, rock	Pasar	Market
Belukar (Bel.)	Secondary jungle	Pemangasan (Pem.)	Wetland
Bendang	Rice swamp	Permatang (Per.)	Rising ground in flat country
Bukit (Bk.)	Hill	Pulau (Pul.)	Island
Changkat (Chk.)	Small stream	Rantau	Reach of river or of sea coast
Charak (Ck.)	Small stream	Resam	Fern, bracken
Dusun	Fruit grove	Rimba	Virgin jungle
Geting (Gg.)	Past, col	Rumoh	Palm used for thatching
Genang (Gn.)	Mountain	Sakul Ladang (S. Lad.)	Cultivated clearing of aborigines
Hilir, Hillir	Downstream region	Selat	Strait
Intena	Palace	Sempang	Stream
Jalan	Road, way	Sira	Salt-lick
Jeram (J.)	Rapids	Sungai (S.)	River, stream
Kampung (Kng.)	Village	Tali Ayer (T. A.)	Artificial water channel
Kau	Fort	Tanjung (Tj.)	Promontory
Kuala (K.)	River mouth	Tasek	Lake
Kubang	Wallow	Tekah (Tj.)	Riv. confluence bend of river bank
Lakoh	Swamp	Tiruan	Chawan
Ladang (Ldg.)	Cultivated clearing	Tabun	Sunken rock
Lalang (La.)	Long wild grass	Ulu Hala	Upstream region
Laut	Sea		
Lopak	Impervious swamp		

The following features are omitted:
Cuttings and Embankments
Telegraph or Telephone Lines
Places of Worship
Makim Names and Boundaries

Photo centre shown thus: 61/574 4095

Reprint of AIR RECONNAISSANCE Map by Survey Dept. Federation of Malaya No. 180-1954

Geographical Section, General Staff, No. 4690
Published by War Offices, 1954.
Edition 1, G.S.G.S. (FAREL) 1953.

Refer to this sheet as G.S.G.S. 4690
Sheet 2 N/6
Edition 1.

AREA 1 & 2 CONTOURS: VERTICAL INTERVAL 50 FEET. RELIEF IN THIS AREA IS EMPHASIZED OWING TO THE CLOSE 50 FEET CONTOUR INTERVAL.

AREA 3 RELIEF LINES: GIVE LOCAL INDICATION OF RISING GROUND, BUT DO NOT MAINTAIN CONSTANT HEIGHT AND ARE NOT CONTOURS.

(1) Rigid Survey 1930, Revised from air photographs 1952.
(2) Rigid Survey 1931, Revised from air photographs 1952.
(3) Compiled 1952 from air photographs with limited existing ground survey.

EMERGENCY ISSUE