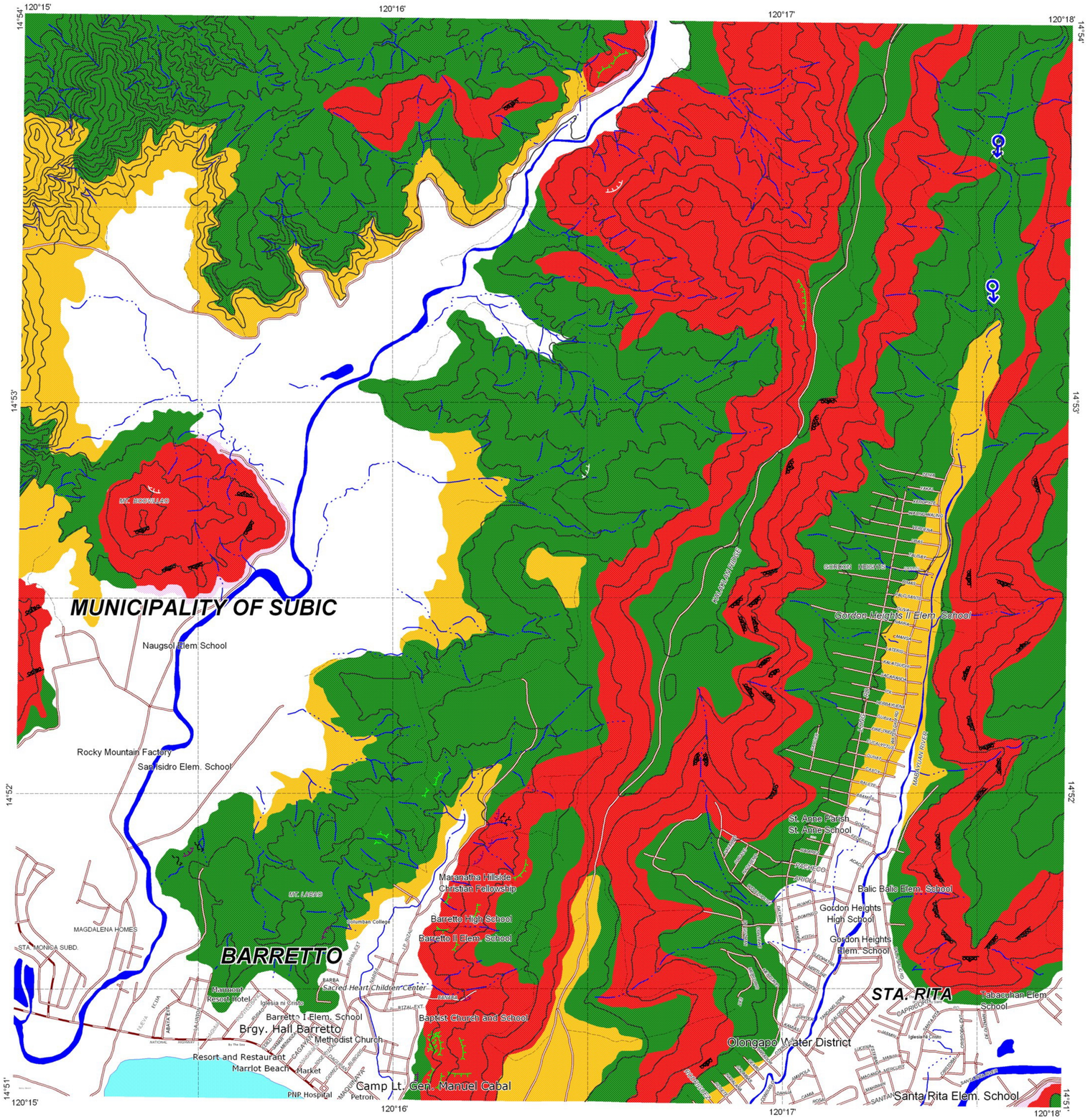
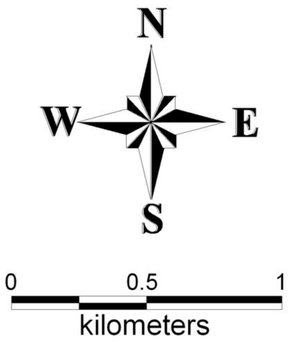
LANDSLIDE SUSCEPTIBILITY MAP OF BARRETTO QUADRANGLE, ZAMBALES PROVINCE, PHILIPPINES





UTM Zone 51 Clarke 1866 Luzon Datum

MAPPING SCALE 1 : 10,000

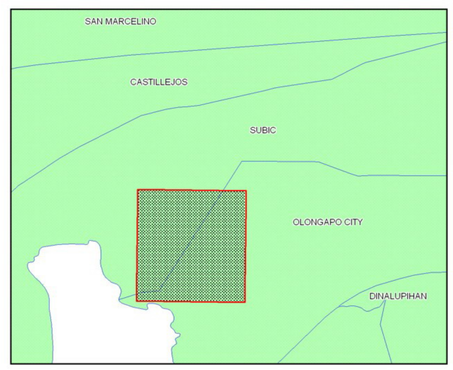
LEGEND :

- **High Landslide Susceptibility**
  Unstable areas. Highly susceptible to mass movements.
- **Moderate Landslide Susceptibility**
  Stable areas with occasional and localized mass movement.
- **Low Landslide Susceptibility**
  Stable areas with no identified landslide scars, either inactive or active.
- **Possible Landslide Debris Accumulation Zone**
  Areas where landslide debris could accumulate.
- Areas susceptible to rockfall
- Recent escarpment
- Old escarpment
- With mitigating measure
- Soil Creep
- Flashflood Exit Point
- River
- Roads

Base Map :

1:10, 000 Topographic Map
"Barretto Quadrangle"

Index Map



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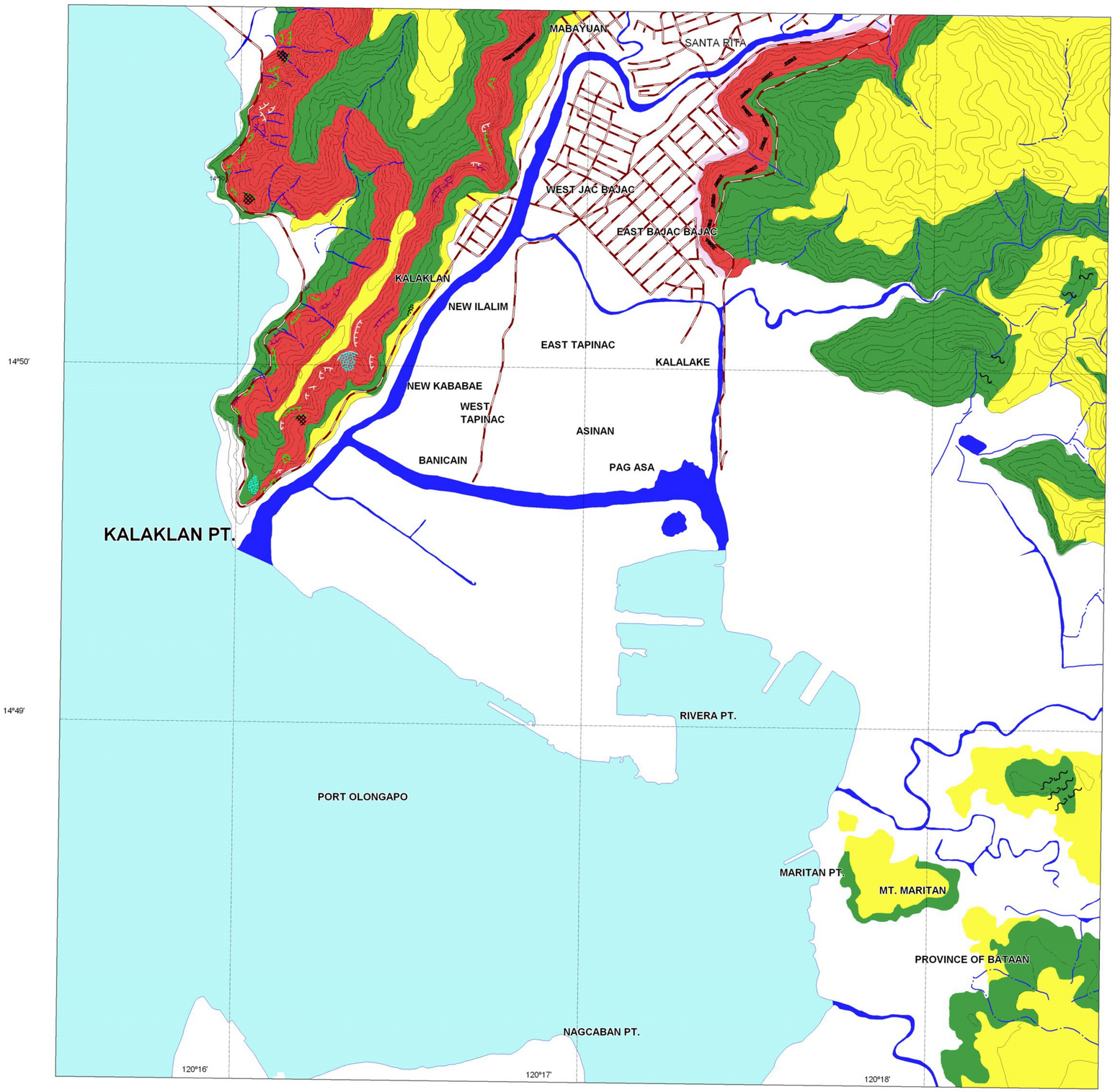
LANDS GEOLOGICAL SURVEY DIVISION

READY
CSCAND
UNDP
OCD
NDCC
NAMRIA
PAGASA
PHIVOLCS

LANDSLIDE SUSCEPTIBILITY MAP OF OLONGAPO CITY QUADRANGLE, ZAMBALES PROVINCE, PHILIPPINES



N
W E
S

0 0.5 1
kilometers

UTM Zone 51 Clarke 1866 Luzon Datum
MAPPING SCALE 1 : 10,000

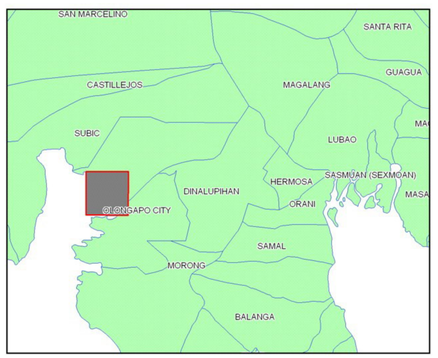
LEGEND :

- **High Landslide Susceptibility**
  Unstable areas. Highly susceptible to mass movements.
- **Moderate Landslide Susceptibility**
  Stable areas with occasional and localized mass movement.
- **Low Landslide Susceptibility**
  Stable areas with no identified landslide scars, either inactive or active.
- **Possible Landslide Debris Accumulation Zone**
  Areas where landslide debris could accumulate.
- Areas susceptible to rockfall
- Recent landslide deposit
- Old landslide deposit
- With mitigating measures
- Old escarpment
- Recent Escarpment
- Soil Creep
- River
- Roads

Base Map :

1:10, 000 Topographic Map
"Olongapo City Quadrangle"

Index Map



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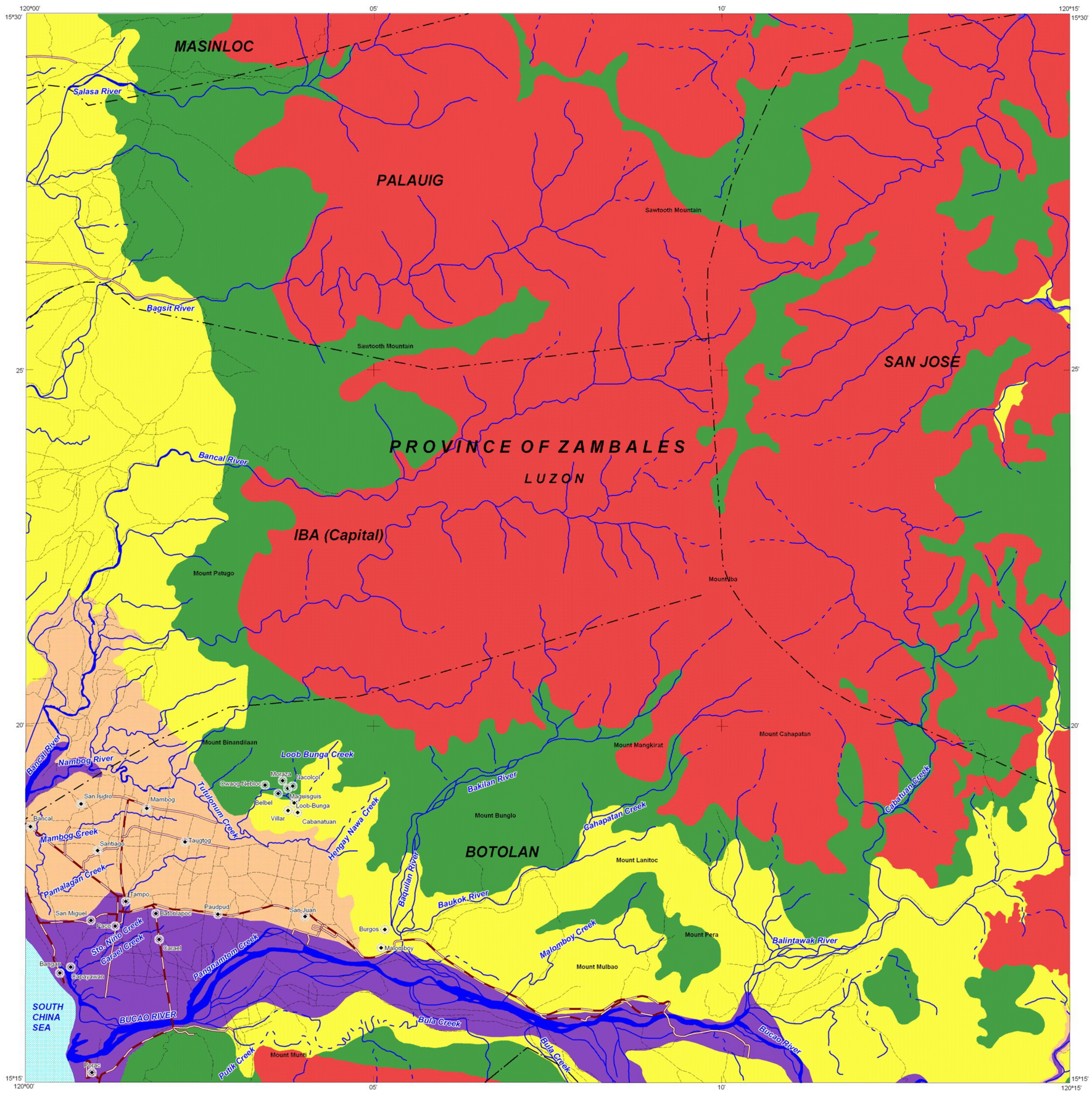
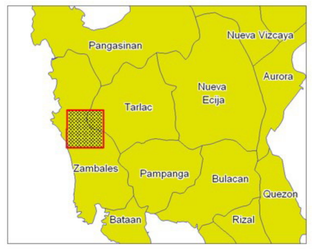
OCD NDCC NAMRIA PAGASA PHIVOLCS

LANDSLIDE AND FLOOD SUSCEPTIBILITY MAP OF BOTOLAN QUADRANGLE, ZAMBALES AND TARLAC PROVINCE, PHILIPPINES



INDEX MAP



LEGEND :

High susceptibility to landslide

Areas with high landslide susceptibility rating have active/recent landslides and tension cracks that could directly affect the community. Those with steep slopes and drainages that are prone to landslide damming are also highly susceptible to landslides.

Moderate susceptibility to landslide

Areas with moderate landslide susceptibility rating have inactive/old landslides and tension cracks which are located away from the community. These areas usually have moderate slopes.

Low susceptibility to landslide

Areas with low to gentle slopes and lacking tension cracks have low landslide susceptibility rating.

High susceptibility to flooding

Areas with greater than 1 meter flood height. These areas are usually flooded for several hours during heavy rains; include landforms of topographic lows such as active river channels, abandoned river channels and areas along river banks; also prone to flashfloods.

Low to moderate susceptibility to flooding

Areas with less than 1 meter flood height. These are usually inundated during prolonged and extensive heavy rainfall or extreme weather condition.

Roads

River

Municipal boundary

Barangay center location

N
W E
S

0 1.5 3
kilometers

TRANSVERSE MERCATOR PROJECTION
MAPPING SCALE 1:50, 000

GIS Processing :
Lands Geological Survey Division

Data Sources:
MGB Geohazard Assessment Team
Geological Database and Information Systems Section
Lands Geological Survey Division
Geosciences Division MGB RO III

Base Map :
Sheet No. 7073 IV "Botolan Quadrangle"

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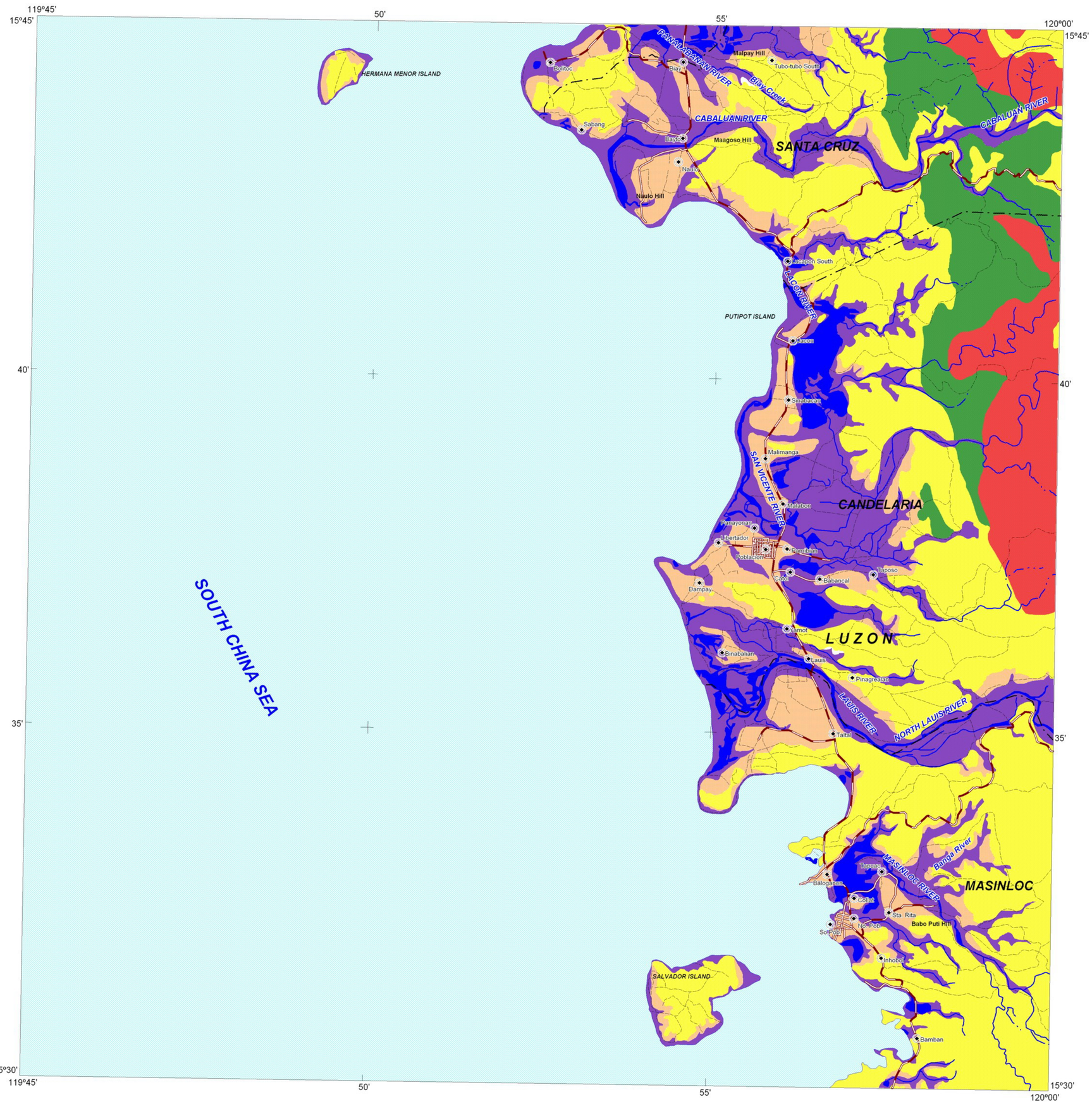
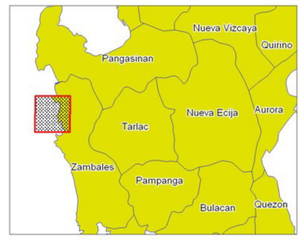
LANDSLIDE AND FLOOD SUSCEPTIBILITY MAP OF MASINLOC QUADRANGLE, ZAMBALES PROVINCE, PHILIPPINES



INDEX MAP



LEGEND :

High Susceptibility to Landslide

Areas with high landslide susceptibility rating have active/recent landslides and tension cracks that could directly affect the community. Those with steep slopes and drainages that are prone to landslide damming are also highly susceptible to landslides.

Moderate Susceptibility to Landslide

Areas with moderate landslide susceptibility rating have inactive/old landslides and tension cracks which are located away from the community. These areas usually have moderate slopes.

Low Susceptibility to Landslide

Areas with low to gentle slopes and lacking tension cracks have low landslide susceptibility rating.

High susceptibility to flooding

Areas with greater than 1 meter flood height. These areas are usually flooded for several hours during heavy rains; include landforms of topographic lows such as active river channels, abandoned river channels and areas along river banks; also prone to flashfloods.

Low to moderate susceptibility to flooding

Areas with less than 1 meter flood height. These are usually inundated during prolonged and extensive heavy rainfall or extreme weather condition.

Roads

River

Municipal boundary

Barangay center location

N
W E
S

0 1.5 3
kilometers

TRANSVERSE MERCATOR PROJECTION
MAPPING SCALE 1:50, 000

GIS Processing :
Lands Geological Survey Division

Data Sources:
MGB Geohazard Assessment Team
Geological Database and Information Systems Section
Lands Geological Survey Division
Geosciences Division MGB RO III

Base Map :
Sheet No.6974 I "Masinloc Quadrangle"

DEPARTMENT OF ENVIRONMENT AND NATURAL RESOURCES
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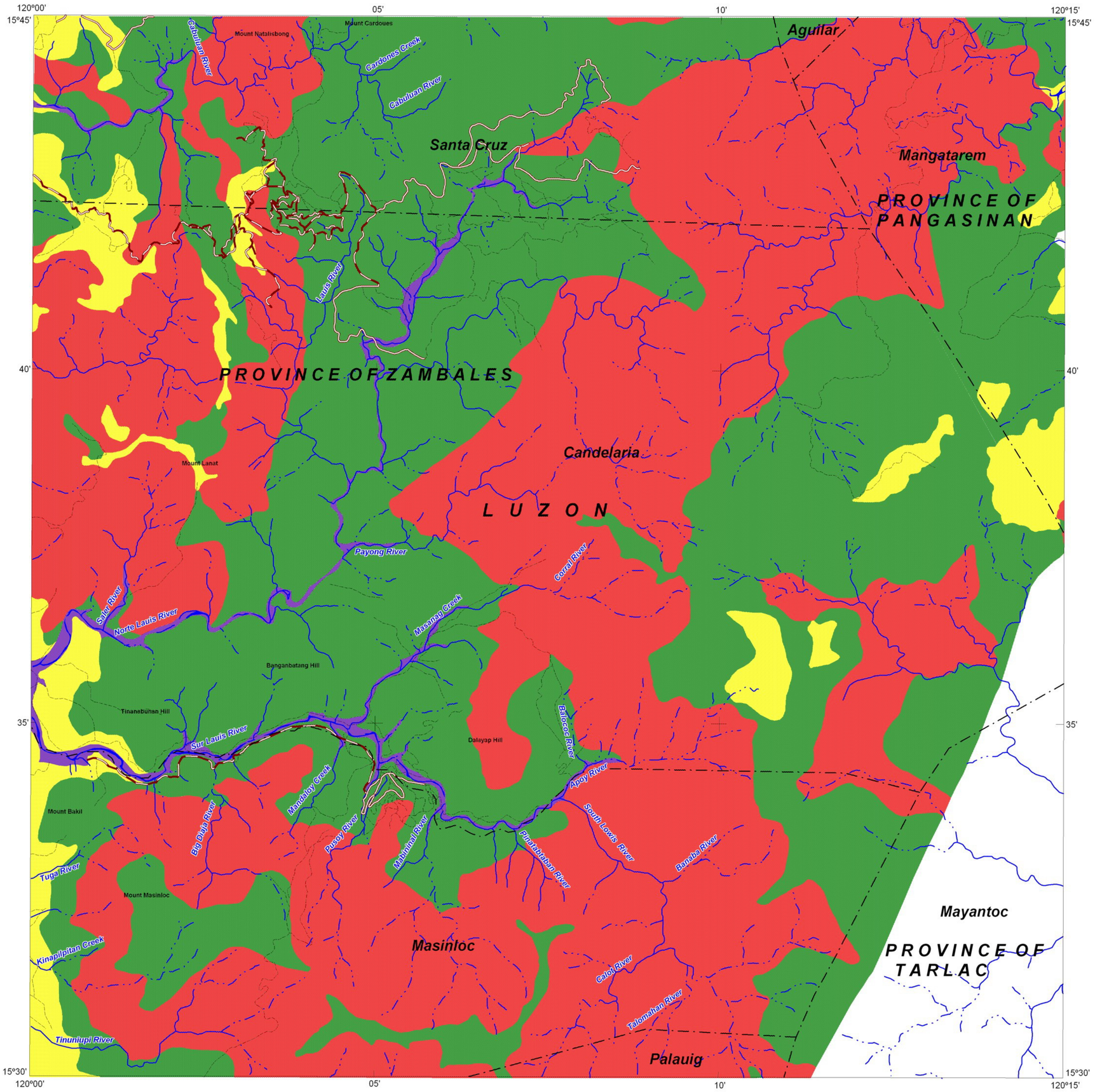
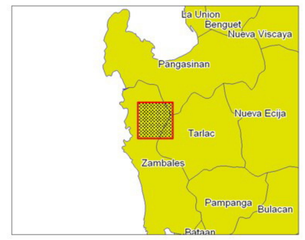
LANDS GEOLOGICAL SURVEY DIVISION

LANDSLIDE AND FLOOD SUSCEPTIBILITY MAP OF MOUNT LANAT QUADRANGLE PANGASINAN AND ZAMBALES PROVINCE, PHILIPPINES



INDEX MAP



LEGEND :

High susceptibility to landslide

Areas with high landslide susceptibility rating have active/recent landslides and tension cracks that would directly affect the community. Those with steep slopes and drainages that are prone to landslide damming are also highly susceptible to landslides.

Moderate susceptibility to landslide

Areas with moderate landslide susceptibility rating have inactive/old landslides and tension cracks which are located away from the community. These areas usually have moderate slopes.

Low susceptibility to landslide

Areas with low to gentle slopes and lacking tension cracks have low landslide susceptibility rating.

High susceptibility to flooding

Areas with greater than 1 meter flood height. These areas are usually flooded for several hours during heavy rains; include landforms of topographic lows such as active river channels, abandoned river channels and areas along river banks; also prone to flashfloods.

Roads

River

Municipal boundary

N
W E
S

0 1.5 3
kilometers

TRANSVERSE MERCATOR PROJECTION
MAPPING SCALE 1:50, 000

GIS Processing :
Lands Geological Survey Division

Data Sources:
MGB Geohazard Assessment Team
Geological Database and Information Systems Section
Lands Geological Survey Division
Geosciences Division MGB RO I

Base Map :
Sheet No. 7074 III "Mount Lanat Quadrangle"

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