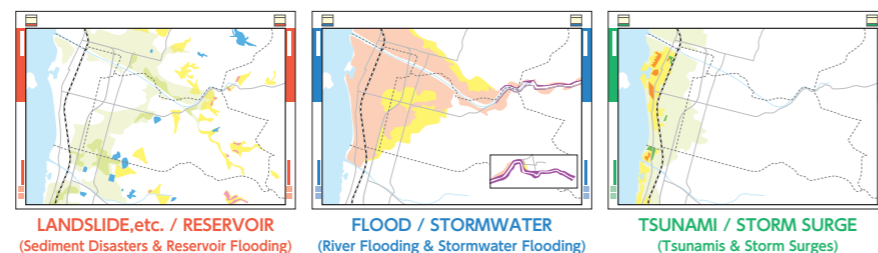


How to Read the Hazard Map

Color Coding by Category

Three types of hazard maps are included: **RED** for Sediment Disasters & Reservoir Flooding, **BLUE** for River Flooding & Stormwater Flooding, and **GREEN** for Tsunamis & Storm Surges. **BLUE/GREEN** maps are not included for zones where river/stormwater flood damage is not expected, or there is no tsunami/storm surge danger.



Projected Scenarios for Each Category

SEDIMENT DISASTER (Landslide, etc.) (Sediment Disaster Hazard Zones / Sediment Disaster Special Hazard Zones)

Boundaries of hazard zones designated by Ehime Prefecture in accordance with the Sediment Disaster Prevention Act are indicated for each category of sediment disaster. Sediment Disaster Hazard Zones (Yellow Zones) indicate areas where the lives and wellbeing of residents, etc. may be at risk in the event of a disaster such as the collapse of steeply sloped ground. Sediment Disaster Special Hazard Zones (Red Zones) indicate considerable risk to the lives and wellbeing of residents, etc. with buildings facing risks of damage or destruction.

RESERVOIR FLOODING (Key Reservoirs for Disaster Management / Expected Reservoir Flooding Inundation Zones)

Expected inundation zones in the event of reservoir collapse during times of flooding are overlaid, indicating zone boundaries and maximum inundation depths for key reservoirs for disaster management in 299 locations.
* To see inundation depths for specific reservoirs, check the Reservoir Hazard Map.

RIVER FLOOD (Expected Flood Inundation Zones / Maximum Inundation Depth)

Expected flood inundation zones in the event of rainfall at maximum expected levels (once-per-1,000-years levels) as announced by river administrators in accordance with the Flood Control Act are overlaid, indicating zone boundaries and maximum inundation depths.

River name	Shigenobu-gawa River	Ishite-gawa River	Ono-gawa River	Tateiwa-gawa River
River administrator	Japan Govt.	Japan Govt. Ehime Pref.	Ehime Pref.	Ehime Pref.
Expected 24-hr rainfall total	626mm	705mm	754mm	769mm

(Expl.) Expected Flood Zone with Destruction of Houses, etc.

Indicates zones where ordinary buildings are at high risk of being destroyed, swept away, etc. in the event embankments in the vicinity collapse due to an occurrence of the maximum expected level of rainfall. These zones fall into two categories: those due to direct risks of flowing flood waters, and those due to the erosion of riverbanks.

- Expected Flood Zone with Destruction of Houses, etc. (Due to Flood Flow) ... Zones where wooden houses are at risk of being swept away/destroyed due to flowing flood water
- Expected Flood Zone with Destruction of Houses, etc. (Due to Riverbank Erosion) ... Zones where houses are at risk of being swept away/destroyed due to flood-induced erosion of riverbanks

* To see detailed inundation depths and durations of inundation for specific rivers, check the Matsuyama Flood Hazard Map.

STORMWATER FLOODING (Expected Stormwater Inundation Zones / Maximum Inundation Depth)

Expected stormwater inundation zones in the event of an occurrence of heavy rain with total rainfall of 299 mm and maximum hourly rainfall of 83.5 mm are shown, indicating zone boundaries and maximum inundation depths.

* To see detailed inundation depths, check the Matsuyama Stormwater Hazard Map.

TSUNAMI DAMAGE (Tsunami Hazard Zones / Maximum Inundation Depth [Standard Water Level])

Tsunami hazard zones designated by Ehime Prefecture in accordance with the Act on Regional Development for Tsunami Disaster Prevention are shown, indicating zone boundaries and standard water levels.

STORM SURGE DAMAGE (Expected Storm Surge Inundation Zones)

Boundaries of expected inundation zones in the event of storm surges of the largest expected potential level as announced by Ehime Prefecture in accordance with the Flood Control Act are indicated.

* To see detailed inundation depths and durations of inundation, check the Matsuyama Storm Surge Hazard Map.

● Projections Based on Largest Recorded Typhoons

- Central pressure 900 hPa (Equiv. to 1934 Muroto Typhoon)
- Radius & velocity Radius of maximum cyclostrophic wind: 75 km* (Equiv. to 1959 Isewan Typhoon/Typhoon Vera)
Velocity: 75 km/h (Equiv. to 1959 Isewan Typhoon/Typhoon Vera)

* Radius of maximum cyclostrophic wind: Distance from the center of a typhoon to the point near the typhoon with the highest wind speed

Check! View the Hazard Map Online

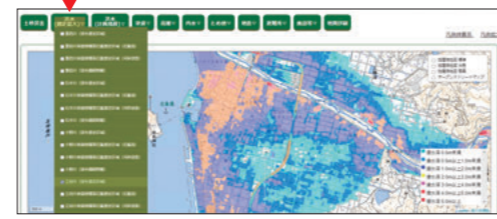
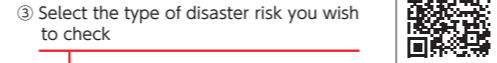
A Web edition of the Hazard Map is available on the Matsuyama City Disaster Management Portal. Use it to find more details on disaster risk.

① Access the Matsuyama City Disaster Management Portal

the Matsuyama City Disaster Management Portal Search

② Click on Matsuyama Hazard Map Web Edition

③ Select the type of disaster risk you wish to check

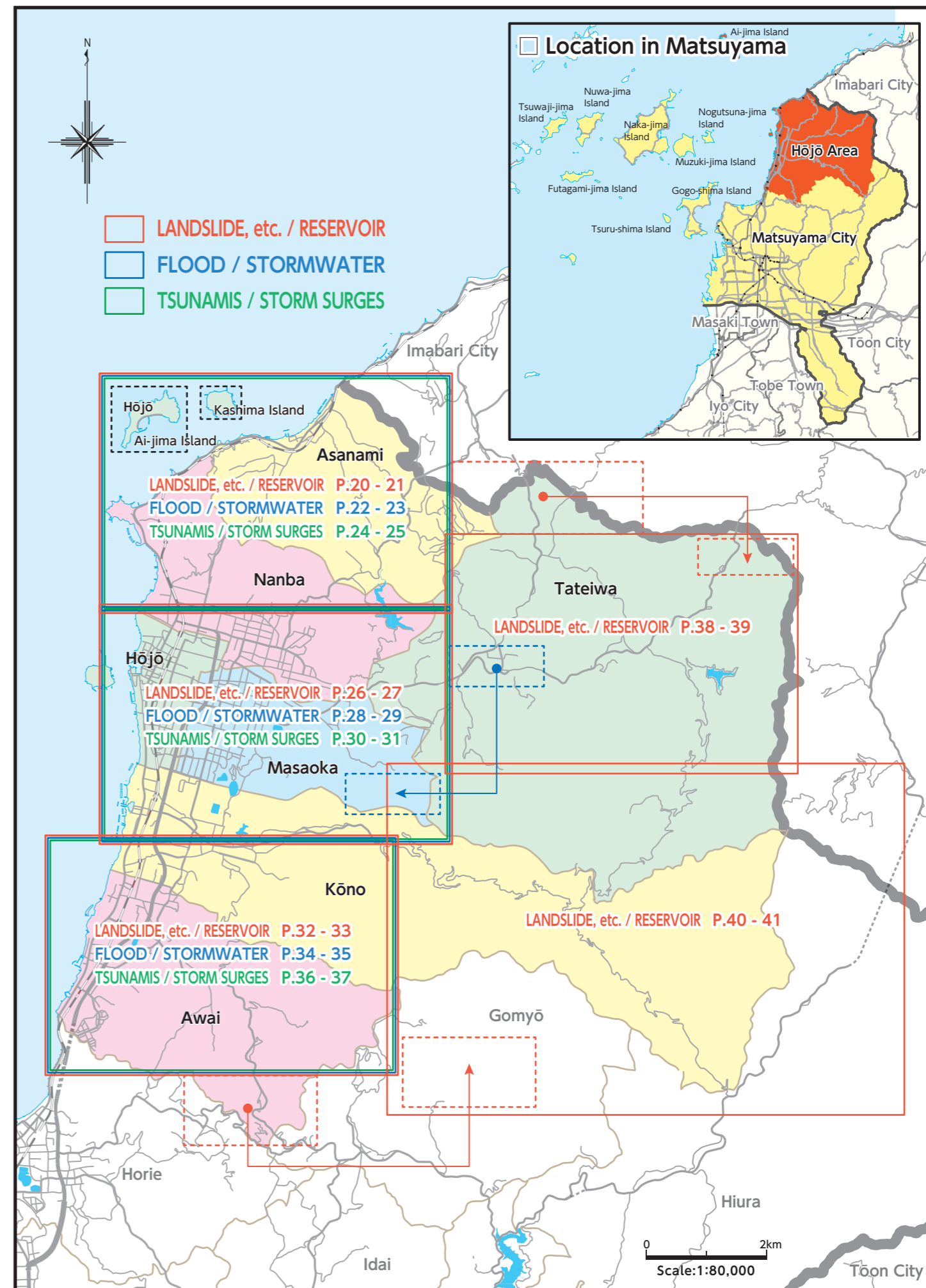


⚠ While all projections are made on the basis of current knowledge, disasters may potentially exceed projected levels.

While this Hazard Map has been created based on the latest digital map data (basic national geospatial data) published by the Geospatial Information Authority of Japan (GSI), please be aware that certain locations may not correspond with actual current conditions due to changes over time. With regard to hazard information for sediment disasters, etc., the map is meant to serve as an approximate general reference only, and is by no means representative of exact or specific limits of the boundary, scope, etc. of hazard zones, etc. Please also note that listed disaster management information, including evacuation shelters, etc. is current as of Jan. 2022, and may be subject to change in the future. Please refrain from reproducing or reprinting this publication's cover, contents, or maps without the consent of Matsuyama City.

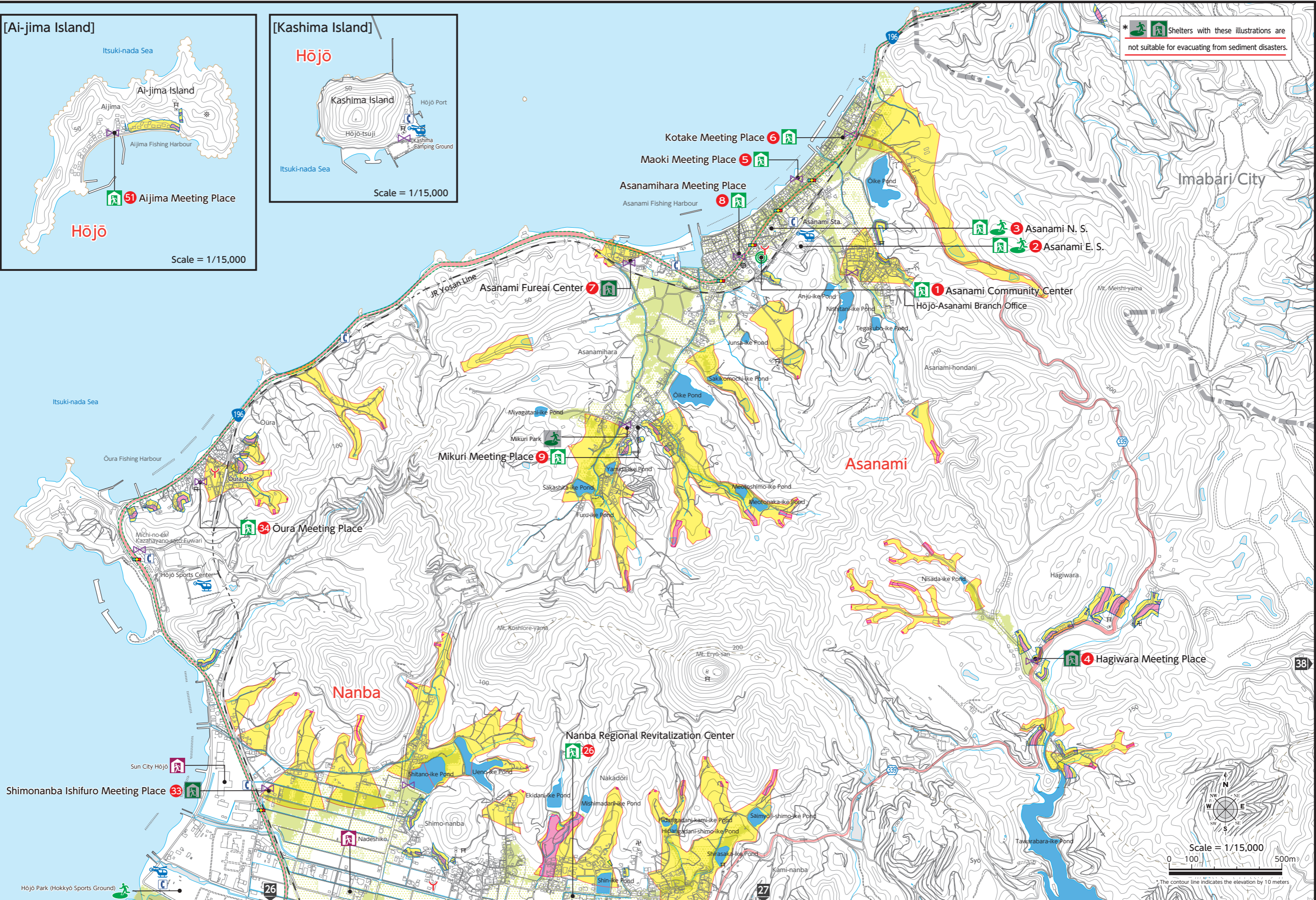
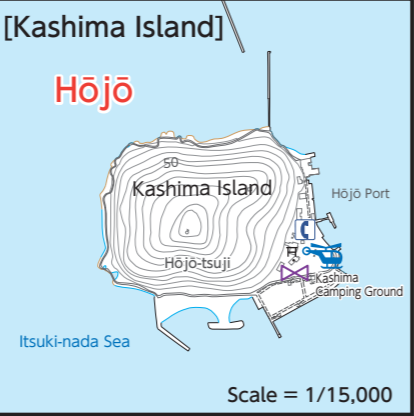
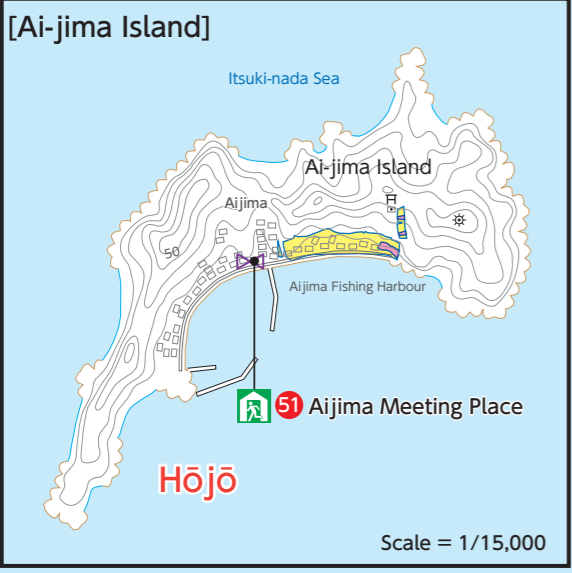
INDEX MAP

[Asanami / Tateiwa / Nanba / Masaoka / Hōjō / Kōno / Awai]

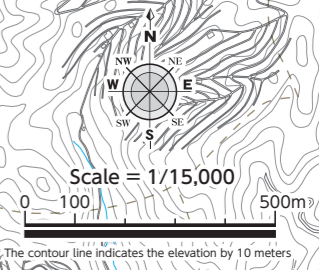


Asanami / Nanba / Hōjō

Asanami / Nanba



* Shelters with these illustrations are not suitable for evacuating from sediment disasters.



Sediment Disasters / Reservoir Flooding

Sediment Disasters / Reservoir Flooding

Designated Evacuation Shelter*	City Hall / Branch Office	Police Station Kōban / Chūzai-sho	Emergency Helicopter Landing-pad	Major Evacuation Route	National Road	Prefectural Road
Welfare Evacuation Shelter	Fire Station / Branch	Emergency Medical Facility	Underground Shopping Center / Underpass	Intersection Name	Bank / Shinkin Bank	Post Office
Please refer to pages 20.21, 24.25 for the emergency transportation routes						
Civilian Firefighters' Pump Storage	Emergency Broadcast System (Announcement / Siren)	Payphone (outdoors)	Shrine	Temple		

(Expected Flood Inundation Zones / Maximum Inundation Depth)
*Shigenobu-gawa River / Ishite-gawa River

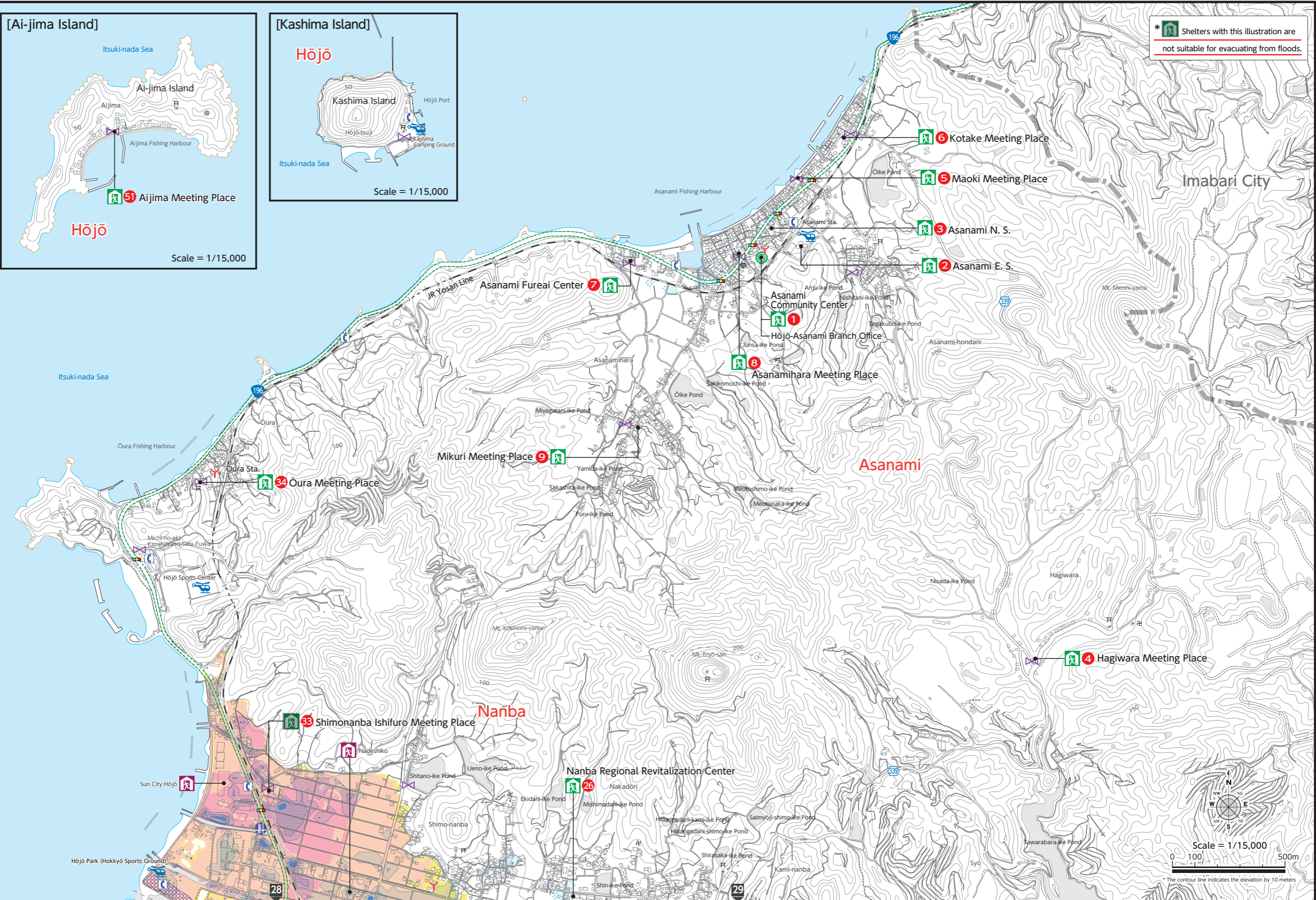
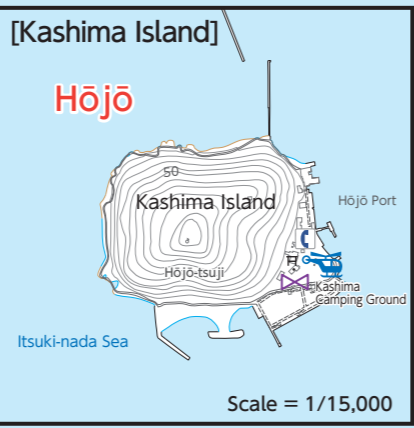
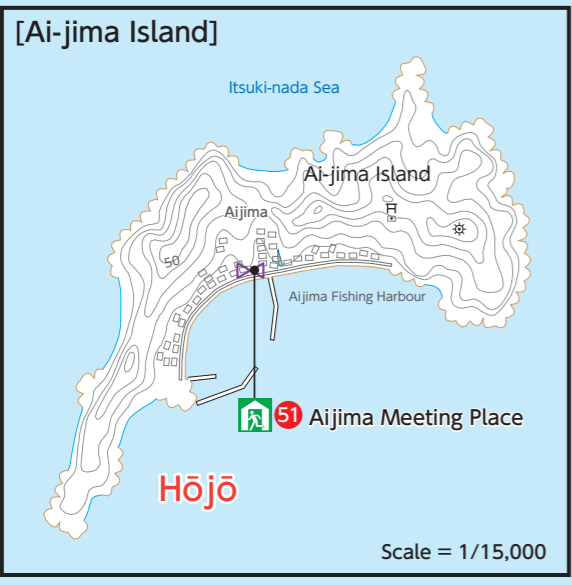
5.0m and over	0.5-3.0m	Flooding zone with the risk of structures collapsing, etc. (flood flow) (Not applicable)
3.0-5.0m	Under 0.5m	Flooding zone with the risk of structures collapsing, etc. (bank erosion)

(Expected Stormwater Inundation Zones / Maximum Inundation Depth)

Normal Water Level Gauge	0.5m and over
3L Water Level Gauge	0.3-0.5m
Live Camera	Under 0.3m

Asanami / Nanba / Hōjō

Asanami / Nanba



* Shelters with this illustration are not suitable for evacuating from floods.

Scale = 1/15,000
0 100 500m
* The contour line indicates the elevation by 10 meters

River Flooding / Stormwater Flooding

River Flooding / Stormwater Flooding

Designated Emergency Evacuation Site	City Hall / Branch Office	Police Station Koban / Chūza-shō	Emergency Helicopter Landing-pad	Emergency Transportation Route	National Road	Prefectural Road
Designated Evacuation Shelter	Fire Station / Branch	Emergency Medical Facility	Underground Shopping Center / Underpass	Major Evacuation Route	Bank / Shinkin Bank	Post Office
Welfare Evacuation Shelter	Civilian Firefighters' Pump Storage	Emergency Broadcast System (Announcement / Siren)	Payphone (outdoors)	Intersection Name	Shrine	Temple

(Tsunami Hazard Zones / Maximum Inundation Depth [Standard Water Level])

5.0m~ (Not applicable)	3.0~4.0m (Not applicable)	1.0~2.0m	0.3m
4.0~5.0m (Not applicable)	2.0~3.0m	0.3~1.0m	

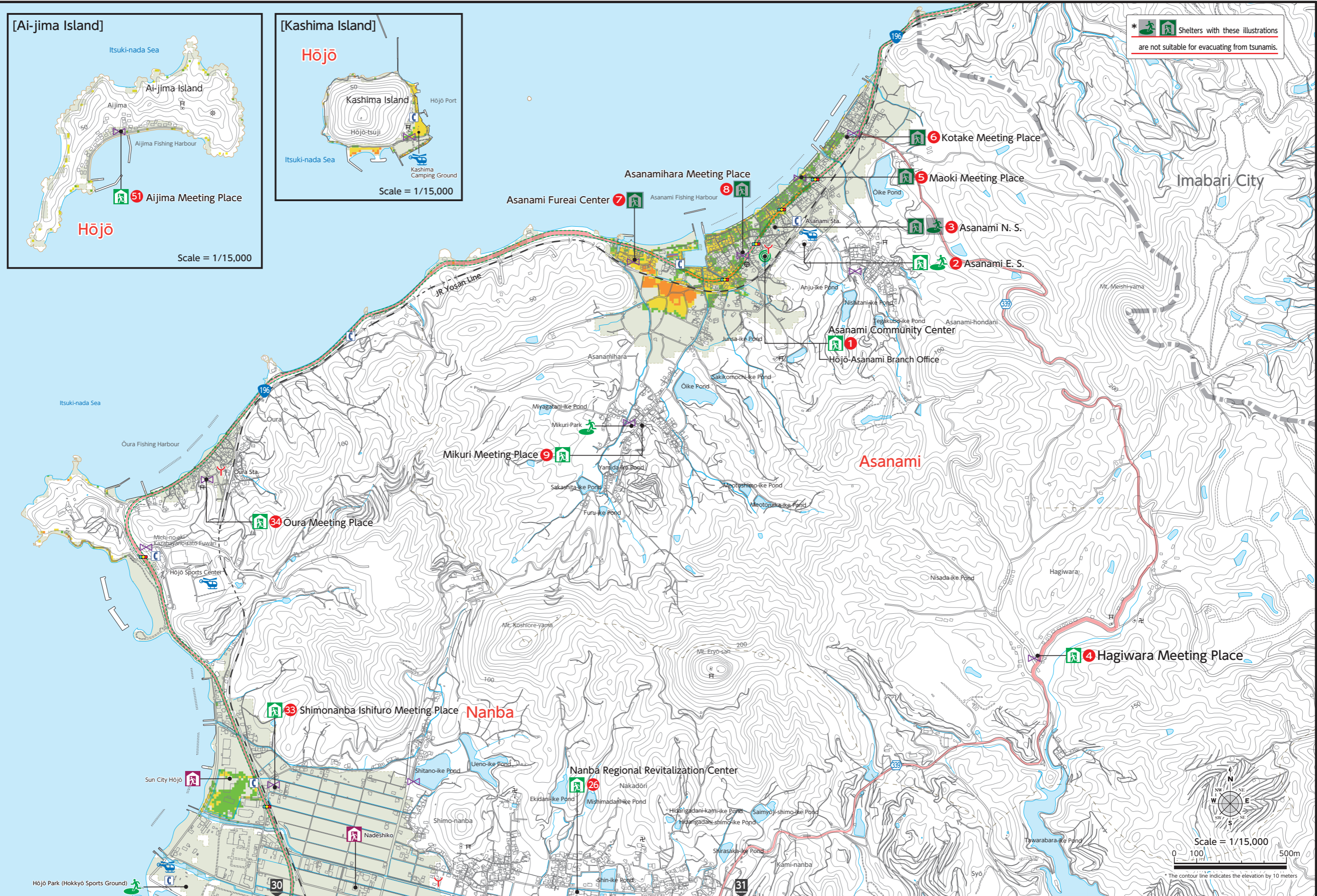
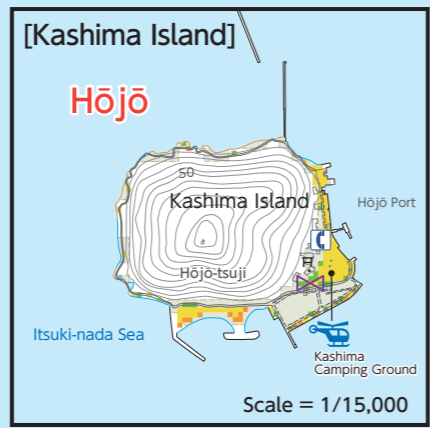
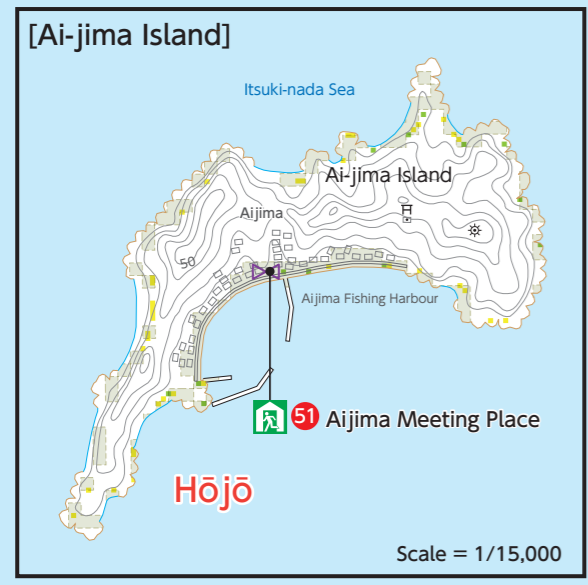
(Expected Storm Surge Inundation Zones)

To see details on expected storm surge inundation zones, etc., check the Matsuyama Storm Surge Hazard Map.



Asanami / Nanba / Hōjō

Asanami / Nanba



* Shelters with these illustrations are not suitable for evacuating from tsunamis.

Scale = 1/15,000
0 100 500m
* The contour line indicates the elevation by 10 meters

Tsunamis / Storm Surges

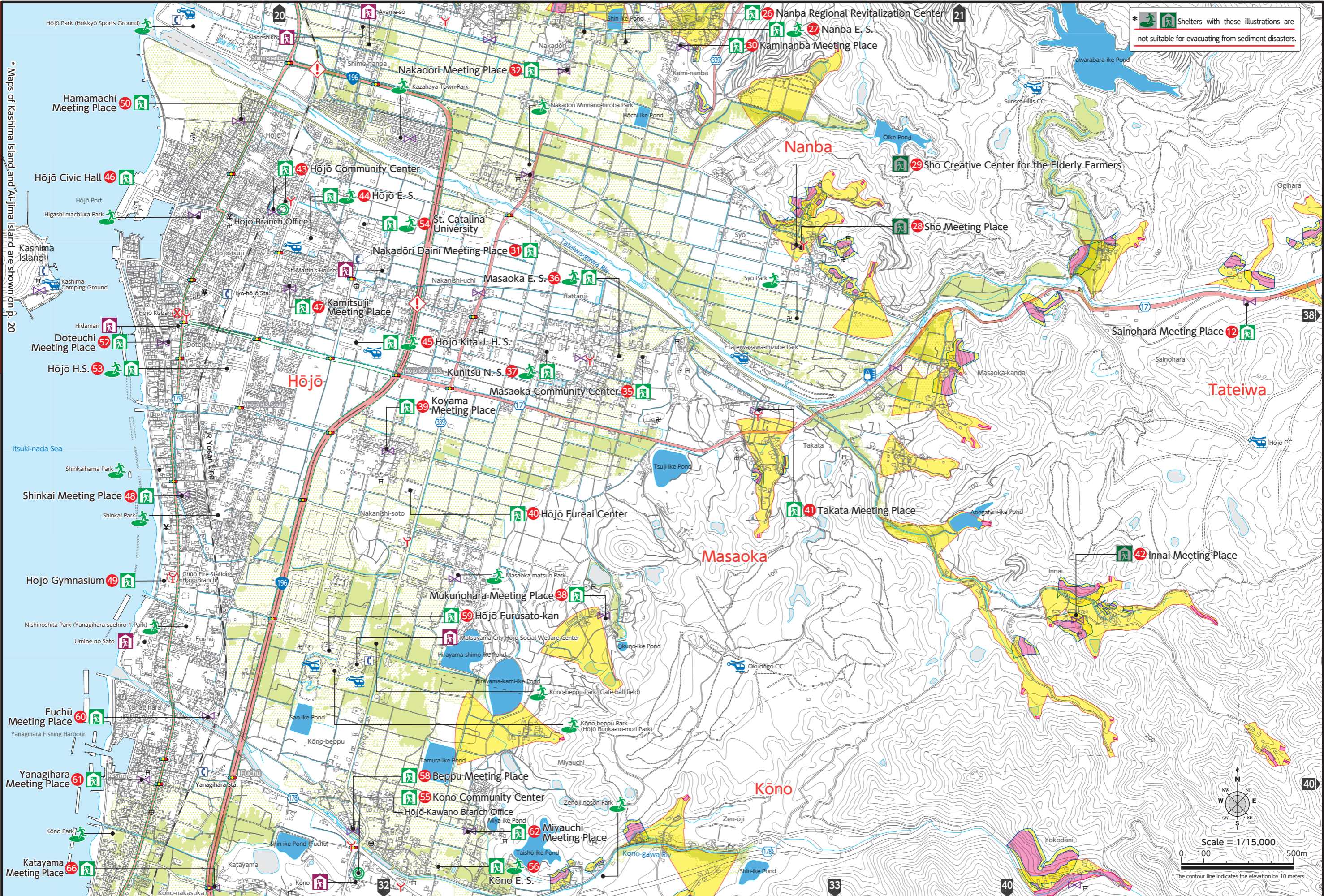
Tsunamis / Storm Surges

- Designated Emergency Evacuation Site
- Designated Evacuation Shelter
- Welfare Evacuation Shelter
- City Hall / Branch Office
- Fire Station / Branch
- Civilian Firefighters' Pump Storage
- Police Station Koban / Chuzai-sho
- Emergency Medical Facility
- Emergency Broadcast System (Announcement / Siren)
- Emergency Helicopter Landing-pad
- Underground Shopping Center / Underpass
- Payphone (outdoors)
- Emergency Transportation Route
- Major Evacuation Route
- Intersection Name
- National Road
- Bank / Shinkin Bank
- Post Office
- Prefectural Road

- (Sediment Disaster Hazard Zones / Sediment Disaster Special Hazard Zones)
- Hazard zone (steep slope)
 - Hazard zone (debris flow)
 - Hazard zone (landslide) (Not applicable)
 - Extreme hazard zone (steep slope)
 - Extreme hazard zone (debris flow)

- (Caution Required Reservoirs / Expected Reservoir Flooding Inundation Zones)
- Rain Gauge
 - Caution Required Reservoir (Reservoir that could flood homes, etc. in case of a breach)
 - 0.5m and over
 - Under 0.5m

* Shelters with these illustrations are not suitable for evacuating from sediment disasters.



Nanba / Masaoka / Hōjō / Kōno

Tateiwa / Nanba / Masaoka / Kōno

Sediment Disasters / Reservoir Flooding

Sediment Disasters / Reservoir Flooding

Designated Evacuation Shelter*	City Hall / Branch Office	Police Station Koban / Chūzai-sho	Emergency Helicopter Landing-pad	Major Evacuation Route	National Road	Prefectural Road
Welfare Evacuation Shelter	Fire Station / Branch	Emergency Medical Facility	Underground Shopping Center / Underpass	Intersection Name	Bank / Shinkin Bank	Post Office
Please refer to pages 26, 27, 30, 31 for the designated emergency evacuation sites						
Civilian Firefighters' Pump Storage	Emergency Broadcast System (Announcement / Siren)	Payphone (outdoors)	Shrine	Temple		

(Expected Flood Inundation Zones / Maximum Inundation Depth) *Tatewaga-gawa River

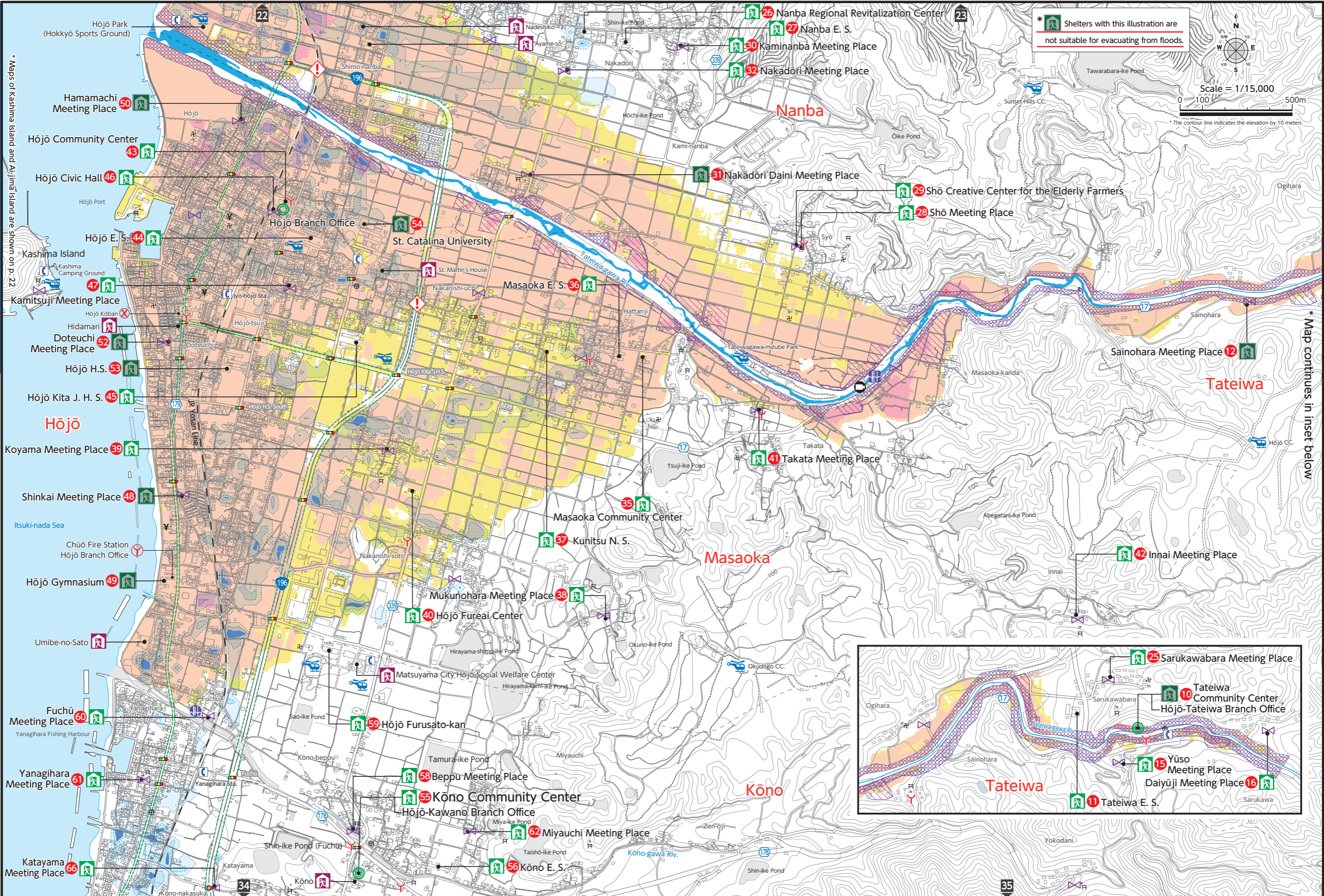
5.0m and over	0.5-3.0m	Flooding zone with the risk of structures collapsing, etc. (flood flow)
3.0-5.0m	Under 0.5m	Flooding zone with the risk of structures collapsing, etc. (bank erosion)

(Expected Stormwater Inundation Zones / Maximum Inundation Depth)

Normal Water Level Gauge	0.5m and over
3L Water Level Gauge	0.3-0.5m
Live Camera	Under 0.3m

Nanba / Masaoka / Hōjō / Kōno

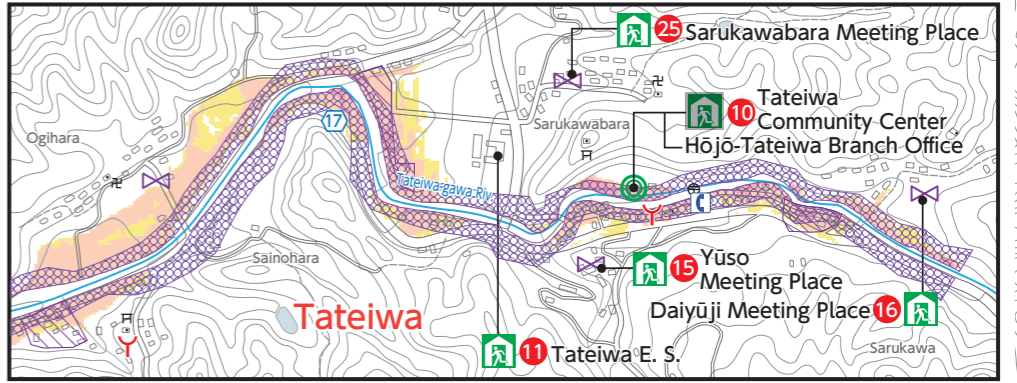
Tatewaga / Nanba / Masaoka / Kōno



* Shelters with this illustration are not suitable for evacuating from floods.

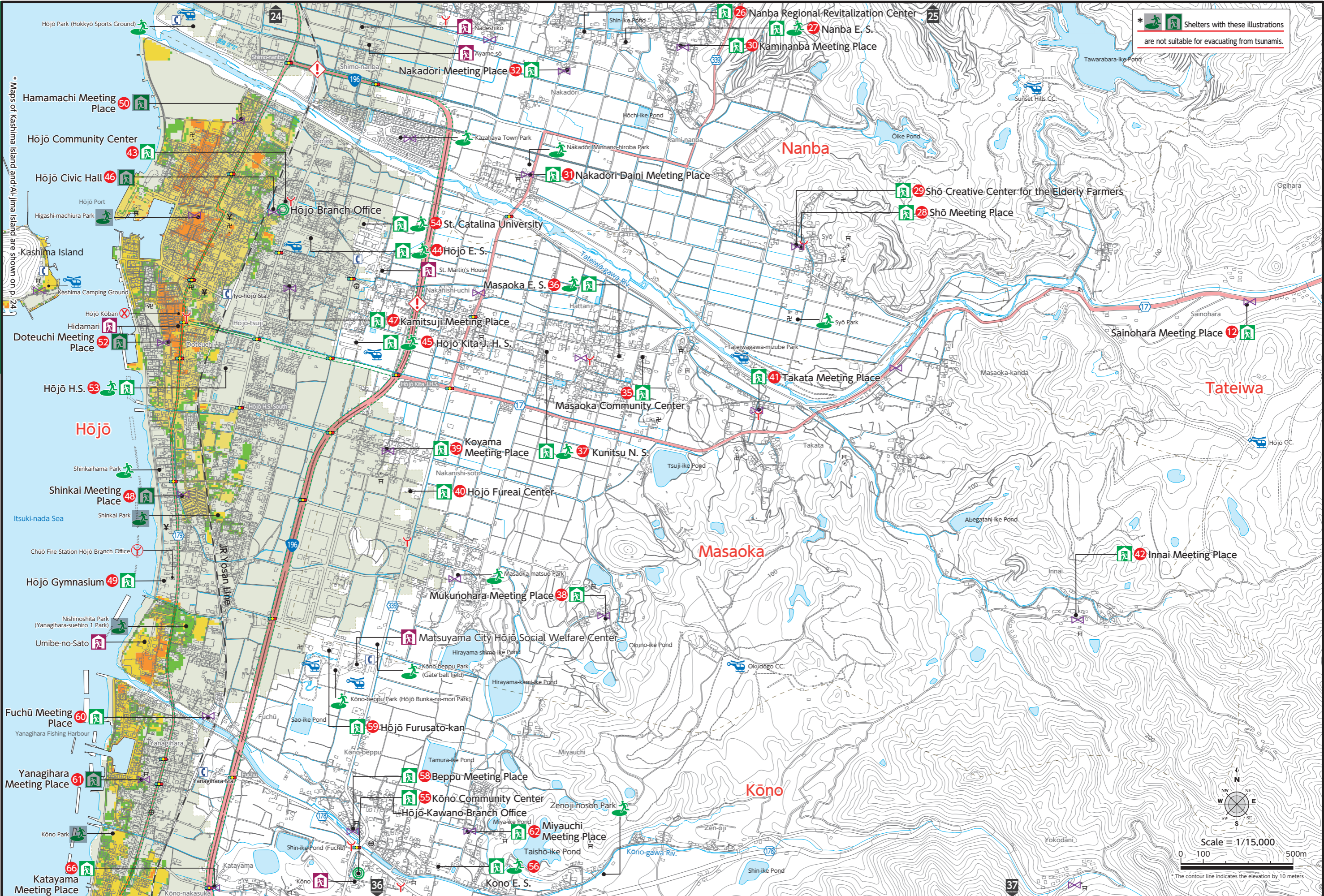
Scale = 1/15,000
0 100 500m

The contour line indicates the elevation by 10 meters



River Flooding / Stormwater Flooding

River Flooding / Stormwater Flooding

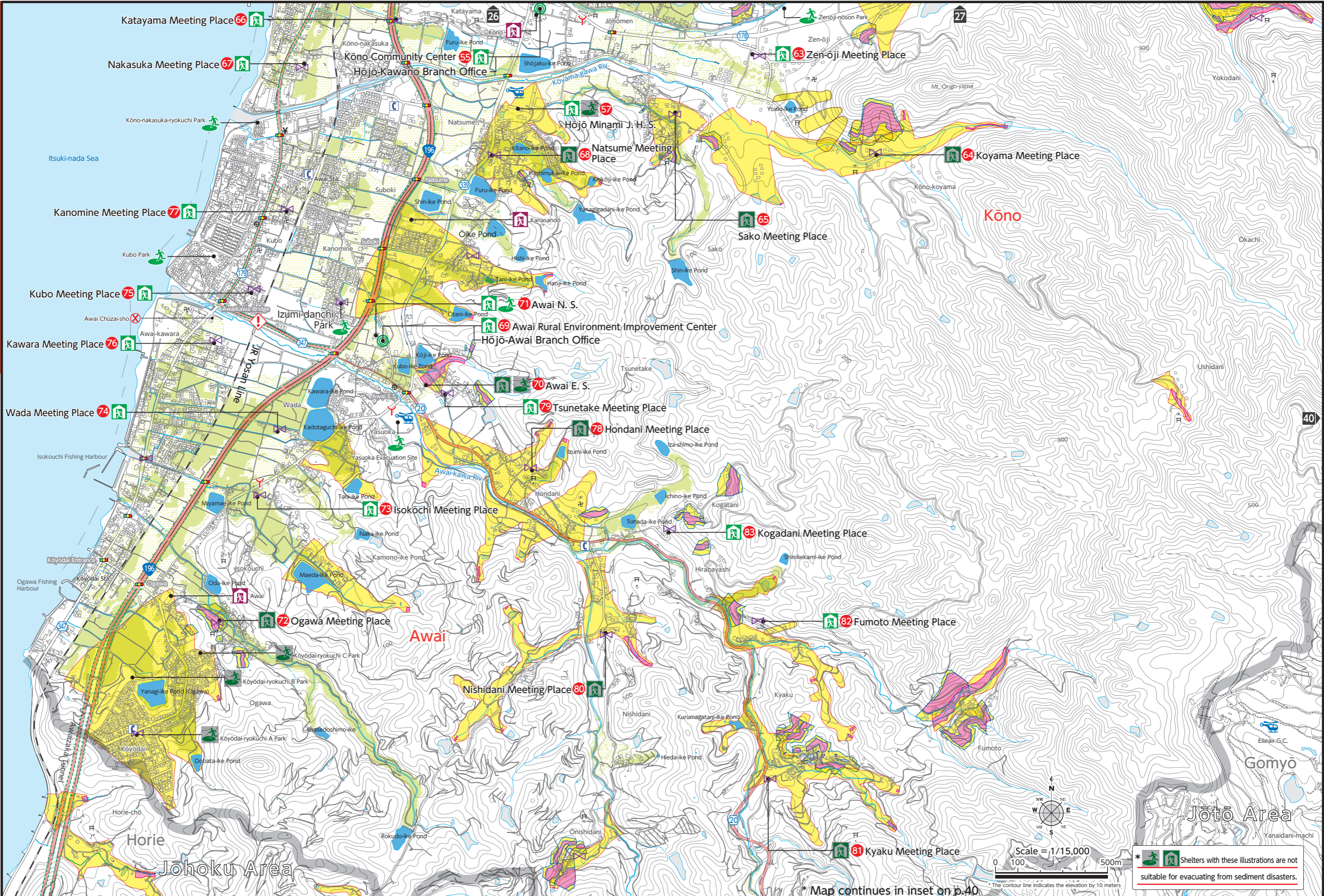


Nanba / Masaoka / Hōjō / Kōno

Tateiwa / Nanba / Masaoka / Kōno

Tsunamis / Storm Surges

Tsunamis / Storm Surges

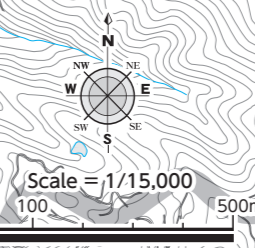


Kōno / Awai

Kōno / Awai

Sediment Disasters / Reservoir Flooding

Sediment Disasters / Reservoir Flooding



* Shelters with these illustrations are not suitable for evacuating from sediment disasters.

* Map continues in inset on p.40

- Designated Evacuation Shelter*
- Welfare Evacuation Shelter
- City Hall / Branch Office
- Fire Station / Branch
- Civilian Firefighters' Pump Storage
- Police Station / Chūzai-sho
- Emergency Medical Facility
- Emergency Broadcast System (Announcement / Siren)
- Emergency Helicopter Landing-pad
- Underground Shopping Center / Underpass
- Payphone (outdoors)
- Major Evacuation Route
- Intersection Name
- National Road
- Prefectural Road
- Bank / Shinkin Bank
- Post Office
- Shrine
- Temple

Please refer to pages 32,33, 36,37 for the designated emergency evacuation sites

Please refer to pages 32,33, 36,37 for the emergency transportation routes

(Expected Flood Inundation Zones / Maximum Inundation Depth)

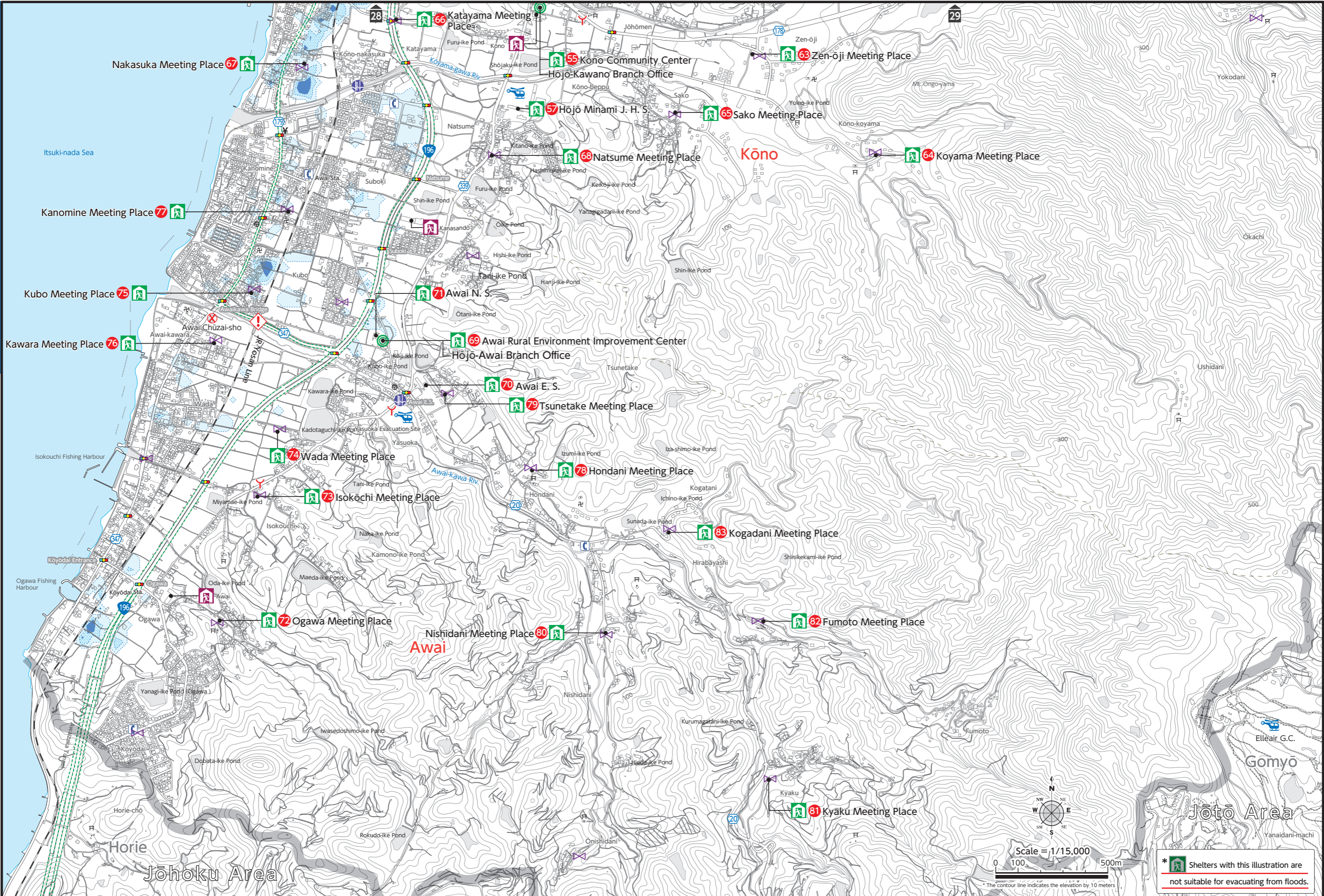
- 5.0m and over (Not applicable)
- 3.0~5.0m (Not applicable)
- 0.5~3.0m (Not applicable)
- Under 0.5m (Not applicable)
- Flooding zone with the risk of structures collapsing, etc. (flood flow) (Not applicable)
- Flooding zone with the risk of structures collapsing, etc. (bank erosion) (Not applicable)

(Expected Stormwater Inundation Zones / Maximum Inundation Depth)

- Normal Water Level Gauge
- 3L Water Level Gauge
- Live Camera
- 0.5m and over
- 0.3~0.5m
- Under 0.3m

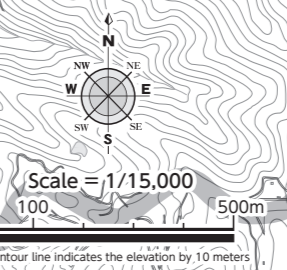
Kōno / Awai

Kōno / Awai



River Flooding / Stormwater Flooding

River Flooding / Stormwater Flooding



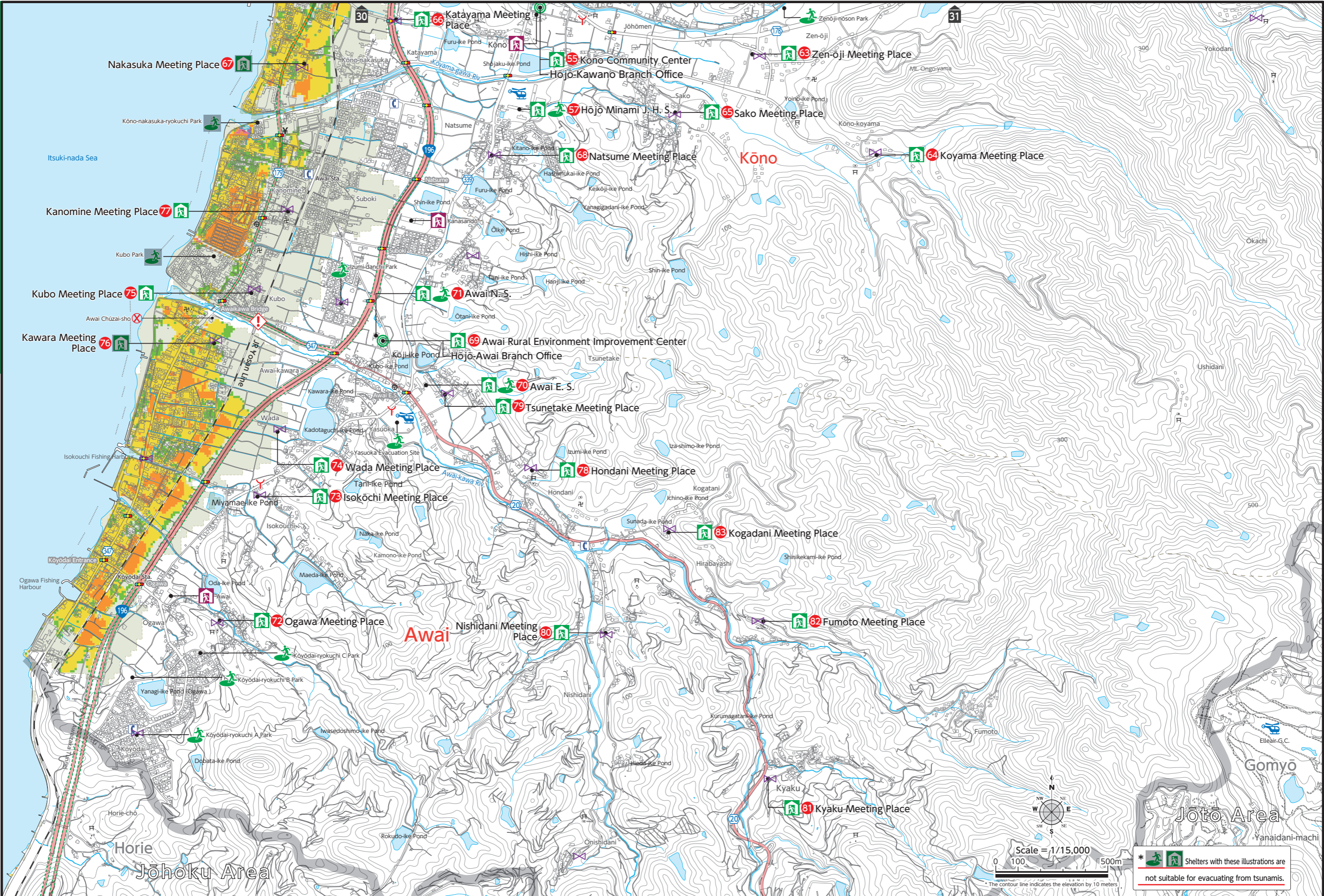
* Shelters with this illustration are not suitable for evacuating from floods.

- Designated Emergency Evacuation Site*
- Designated Evacuation Shelter
- Welfare Evacuation Shelter
- City Hall / Branch Office
- Fire Station / Branch
- Civilian Firefighters' Pump Storage
- Police Station Kōban / Chūzai-sho
- Emergency Medical Facility
- Emergency Broadcast System (Announcement / Siren)
- Emergency Helicopter Landing-pad
- Underground Shopping Center / Underpass
- Payphone (outdoors)
- Emergency Transportation Route
- Major Evacuation Route
- Intersection Name
- National Road
- Bank / Shinkin Bank
- Shrine
- Prefectural Road
- Post Office
- Temple

- (Tsunami Hazard Zones / Maximum Inundation Depth [Standard Water Level])
- 5.0m~ (Not applicable)
 - 4.0~5.0m (Not applicable)
 - 3.0~4.0m (Not applicable)
 - 2.0~3.0m
 - 1.0~2.0m
 - 0.3~1.0m
 - 0.3m

(Expected Storm Surge Inundation Zones)

To see details on expected storm surge inundation zones, etc., check the Matsuyama Storm Surge Hazard Map.

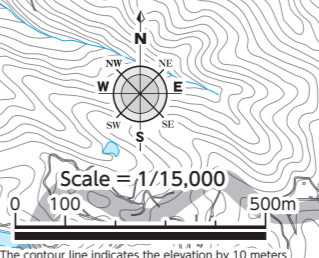


Kōno / Awai

Kōno / Awai

Tsunamis / Storm Surges

Tsunamis / Storm Surges



* Shelters with these illustrations are not suitable for evacuating from tsunamis.

- Designated Emergency Evacuation Site
- City Hall / Branch Office
- Police Station Koban / Chūzai-sho
- Emergency Helicopter Landing-pad
- Emergency Transportation Route
- National Road
- Prefectural Road
- Designated Evacuation Shelter
- Fire Station / Branch
- Emergency Medical Facility
- Underground Shopping Center / Underpass
- Major Evacuation Route
- Bank / Shinkin Bank
- Post Office
- Welfare Evacuation Shelter
- Civilian Firefighters' Pump Storage
- Emergency Broadcast System (Announcement / Siren)
- Payphone (outdoors)
- Intersection Name
- Shrine
- Temple

(Sediment Disaster Hazard Zones / Sediment Disaster Special Hazard Zones)

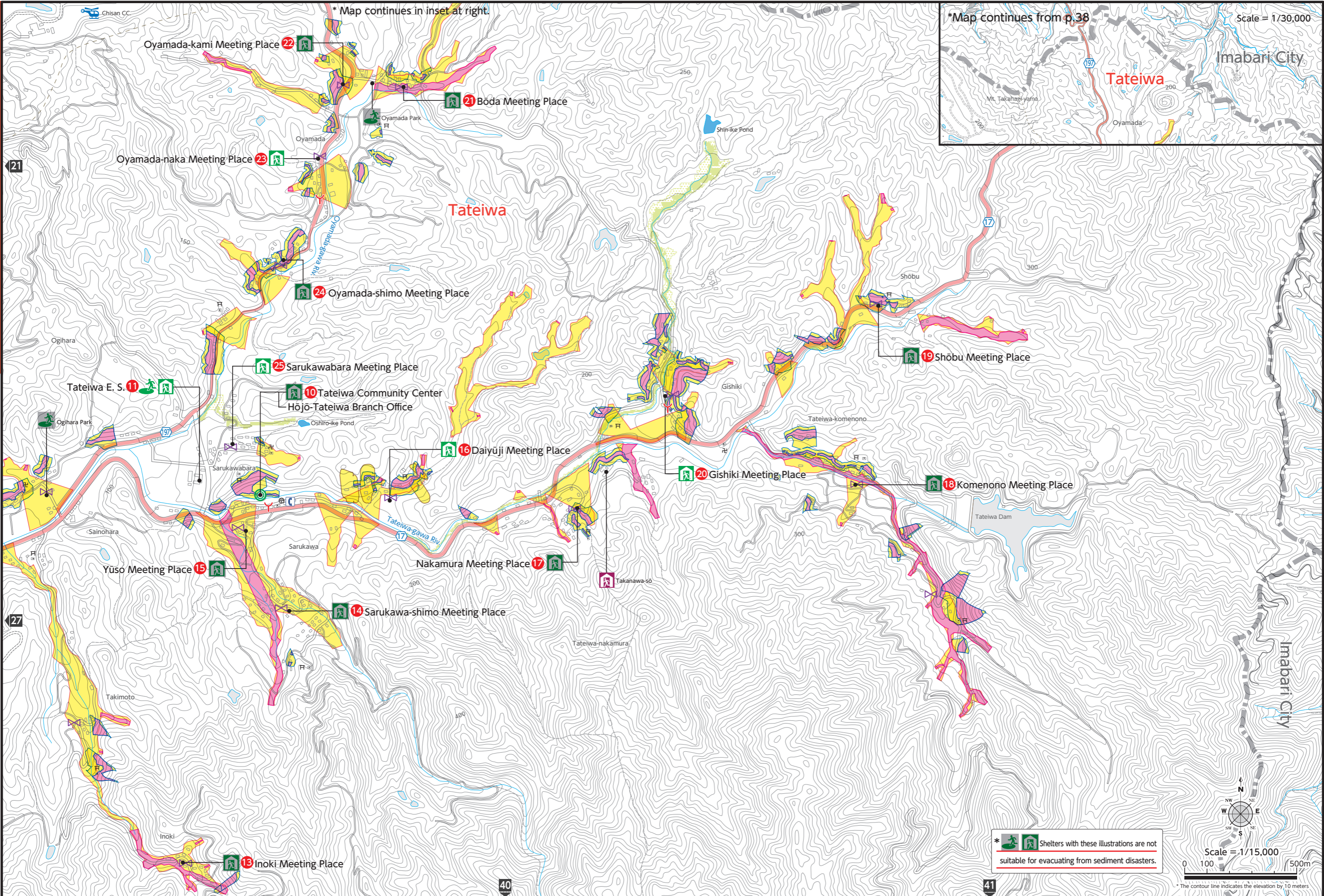
- Hazard zone (steep slope)
- Hazard zone (debris flow)
- Hazard zone (landslide)
- Extreme hazard zone (steep slope)
- Extreme hazard zone (debris flow)

(Caution Required Reservoirs / Expected Reservoir Flooding Inundation Zones)

- Rain Gauge
- Caution Required Reservoir
- 0.5m and over
- Under 0.5m

Tateiwa

Tateiwa



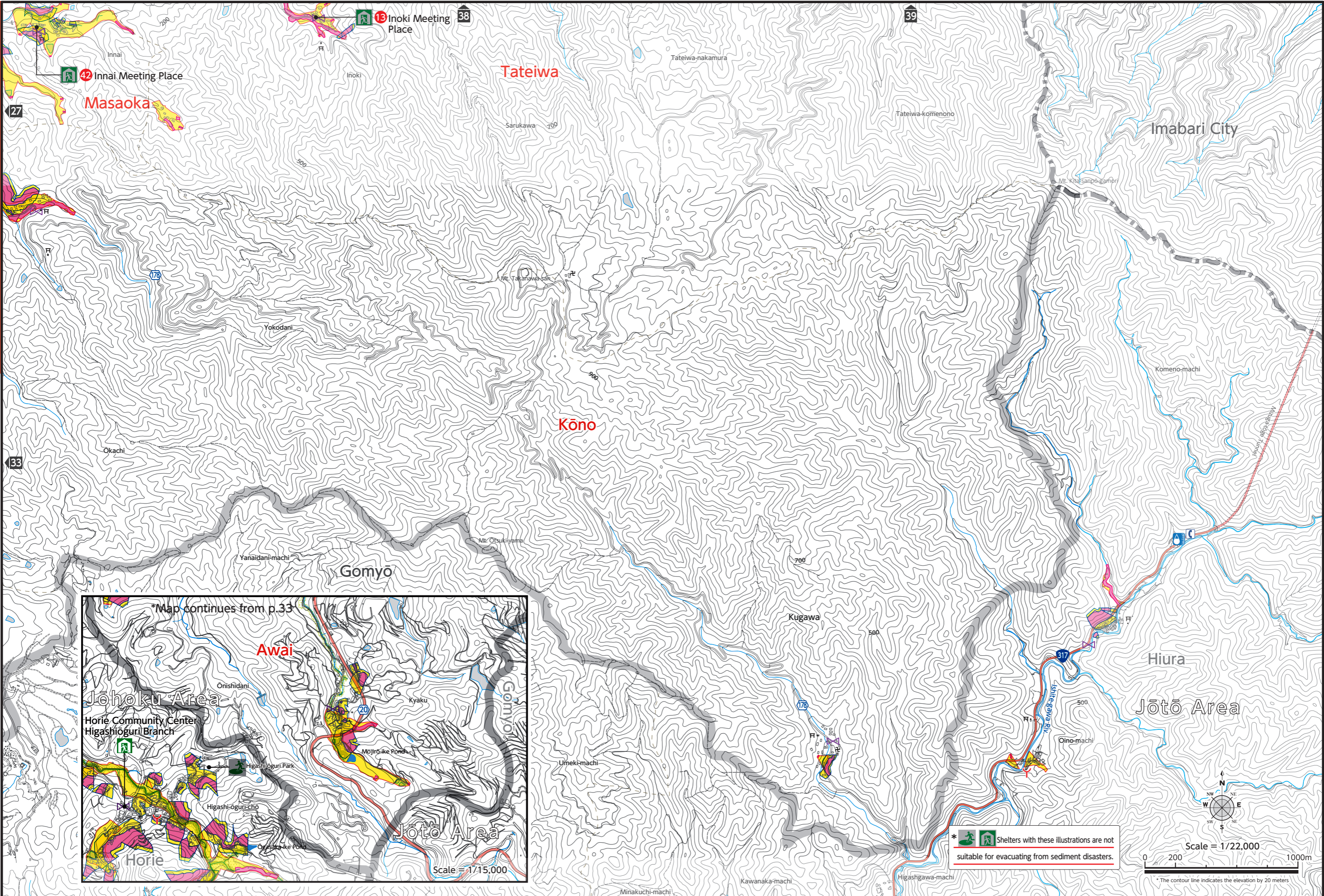
Sediment Disasters / Reservoir Flooding

Sediment Disasters / Reservoir Flooding

Hōjō Area 40 LANDSLIDE, etc. / RESERVOIR	Designated Emergency Evacuation Site	City Hall / Branch Office	Police Station Koban / Chuzai-sho	Emergency Helicopter Landing-pad	Emergency Transportation Route	National Road	Prefectural Road	
	Designated Evacuation Shelter	Fire Station / Branch	Emergency Medical Facility	Underground Shopping Center / Underpass	Major Evacuation Route	Bank / Shinkin Bank	Post Office	
	Welfare Evacuation Shelter	Civilian Firefighters' Pump Storage	Emergency Broadcast System (Announcement / Siren)	Payphone (outdoors)	Intersection Name	Shrine	Temple	
	(Sediment Disaster Hazard Zones / Sediment Disaster Special Hazard Zones)							
	Hazard zone (steep slope)	Extreme hazard zone (steep slope)						
	Hazard zone (debris flow)	Extreme hazard zone (debris flow)						
	Hazard zone (landslide) (Not applicable)							
			(Caution Required Reservoirs / Expected Reservoir Flooding Inundation Zones)					
	Rain Gauge	Caution Required Reservoir	0.5m and over					
		Reservoir that could flood homes, etc. in case of a breach	Under 0.5m (Not applicable)					
			Hōjō Area					
			41					
			LANDSLIDE, etc. / RESERVOIR					

Tateiwa / Masaoka / Kōno / Awai

Tateiwa / Kōno



Sediment Disasters / Reservoir Flooding

Sediment Disasters / Reservoir Flooding

* Shelters with these illustrations are not suitable for evacuating from sediment disasters.

Scale = 1/22,000
 0 200 1000m
 * The contour line indicates the elevation by 20 meters