

# Damage & restoration in affected rivers and coasts

River Bureau  
As of 10:00, 10 May 2011

**[Rivers]** As of 10:00, 10 May 2011, damage has been confirmed at 2,115 river sites under state management. Out of those, 53 sites in 6 river systems have been selected for emergency restoration projects, of which 13 are currently underway and 40 already completed.

**[Coasts]** About 190km coastal levees (300km in total length) have been confirmed to suffer total or partial destruction along Iwate, Miyagi and Fukushima coasts based on provisional investigation using aerial footage from helicopters.

Bureau	River system	Emergency restoration		
		Investigation	Underway	Completed
Tohoku	Mabuchigawa			
	Abukumagawa		3	3
	Natorigawa			
	Kitakamigawa		5	9
	Narusagawa		5	4
	Takasegawa			
	sub-total		13	16
Kanto	Kujigawa			2
	Arakawa			
	Nakagawa			2
	Tonegawa			20
	sub-total			24
Total			13	40

## Levee breach



14 March: single-lane construction road restored



6 April: the road widened to have two lanes.



Emergency project restored access to isolated Kanaya District located downstream.

Construction road widened enabling two-way traffic possible.



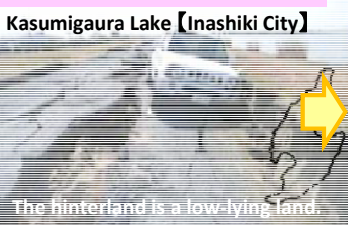
## Levee collapse



## Levee crack



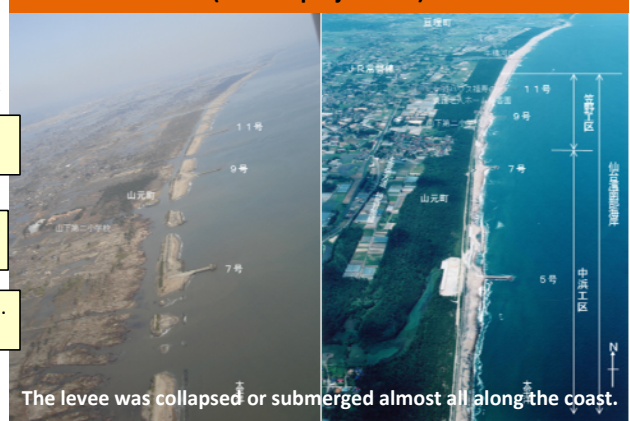
## Levee sinking



## Levee slope failure



## Damage along southern Sendai Bay coast (Bureau project site)



Bureau	Coast	Project status		
		Under investigation	Underway	Completed
Tohoku	Southern Sendai Bay coast		1	
	Total		1	

The photos show only major damage among affected sites.

- Affected sites requiring emergency measures (river levees, etc.)  
(red: underway, blue: completed)
- Areas with levees having some damage
- Areas with coastal levees having major damage