Planning for the Future

Jennie Hoffman

How do I deal with this totally new threat?

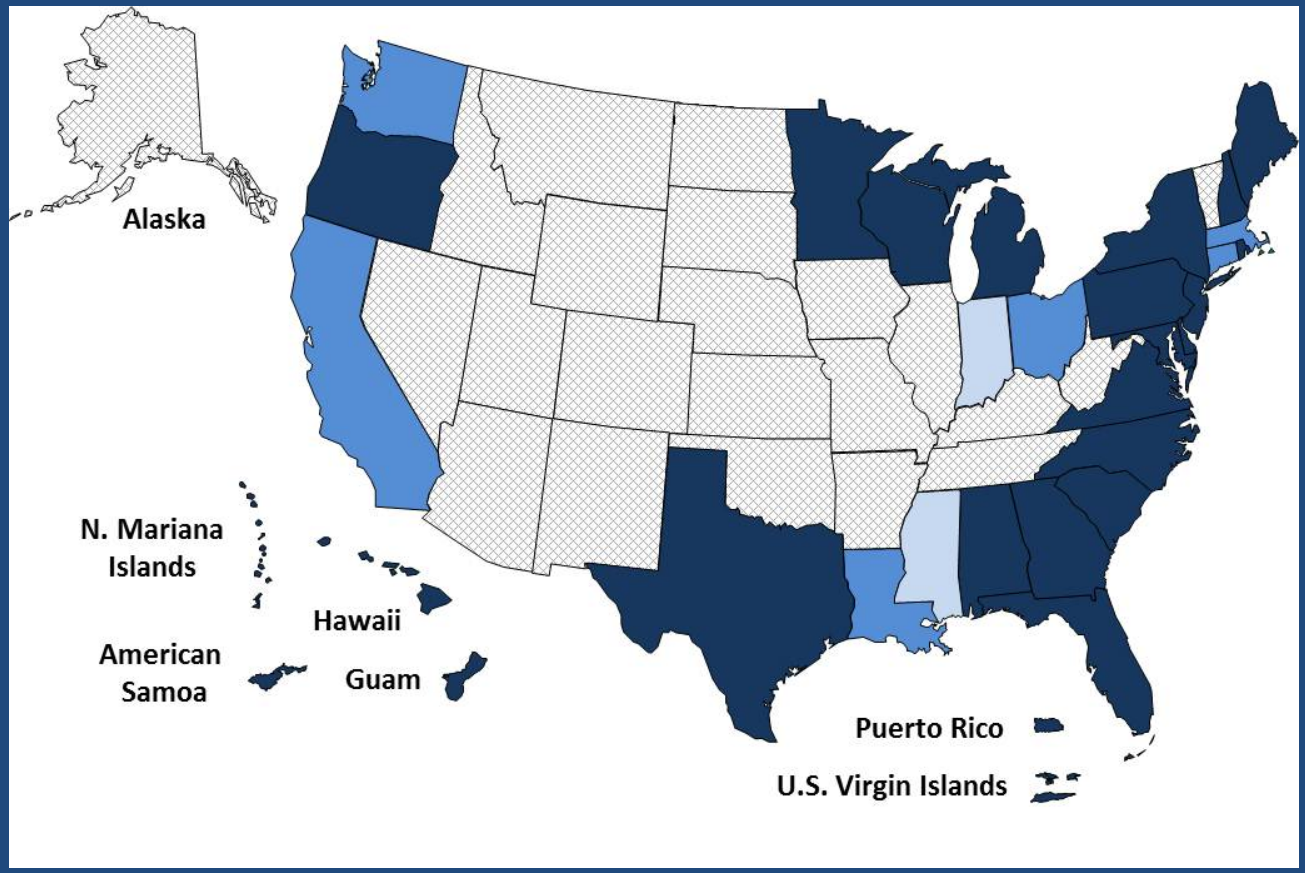
vs.

What do I do, and how should I adjust that for the reality of climate change?

Policy and analysis

Coastal No-Build Zones

Figure 1: Role of Coastal States in Regulating Ocean and Great Lake Shorefront Development



Adapting Building Standards and Zoning

Short-term vs. long-term costs

Table 2. Construction Costs of Kosrae Road Section RS4 (6.6 km section to be built).

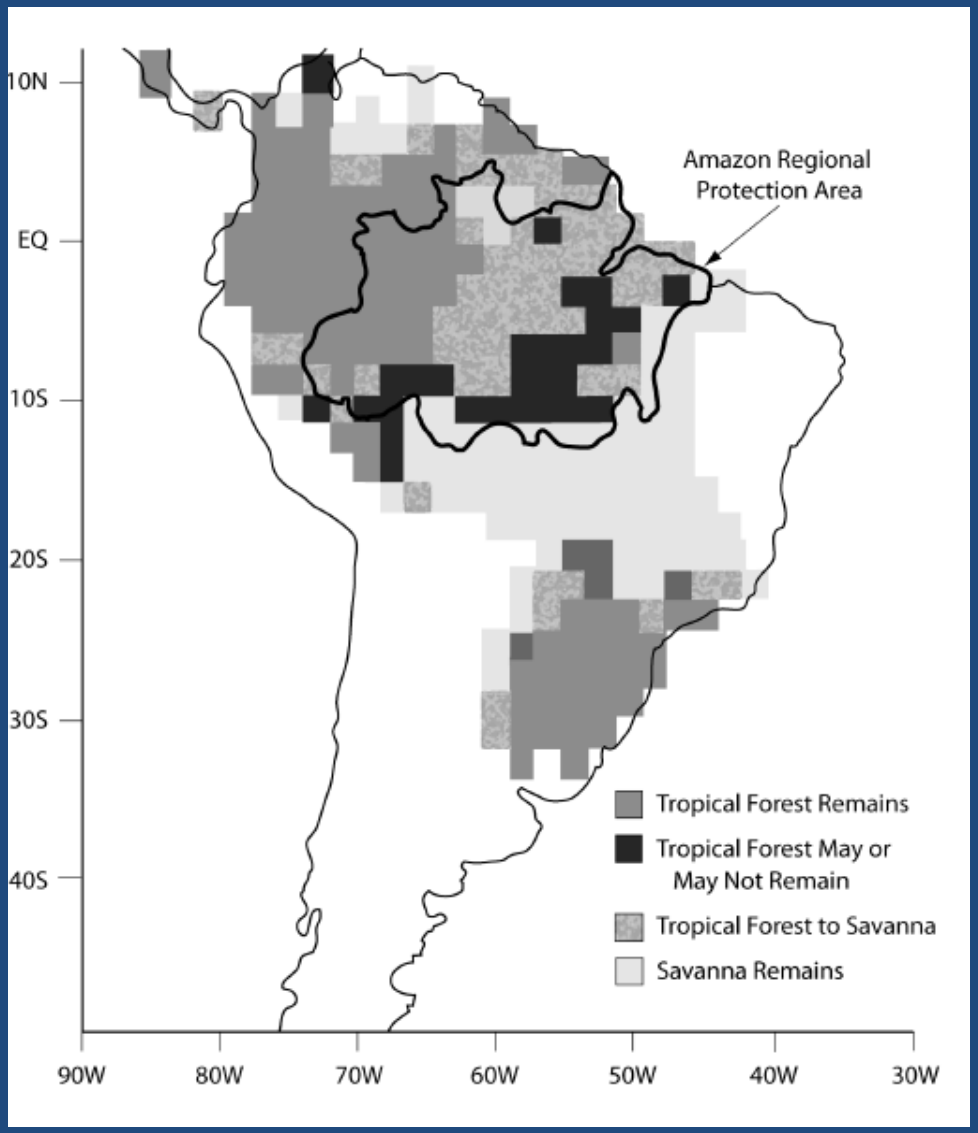
	Original Design	**Climate Proofed Design**
Road Surface	$1,254,414	$1,254,414
Drainage Works	$ 640,233	$1,151,397
Total	$1,894,647	$2,405,811
Incremental Cost		$511,000

Table 3. Total construction, maintenance, repair costs Section RS4 (6.6 km section to be built)

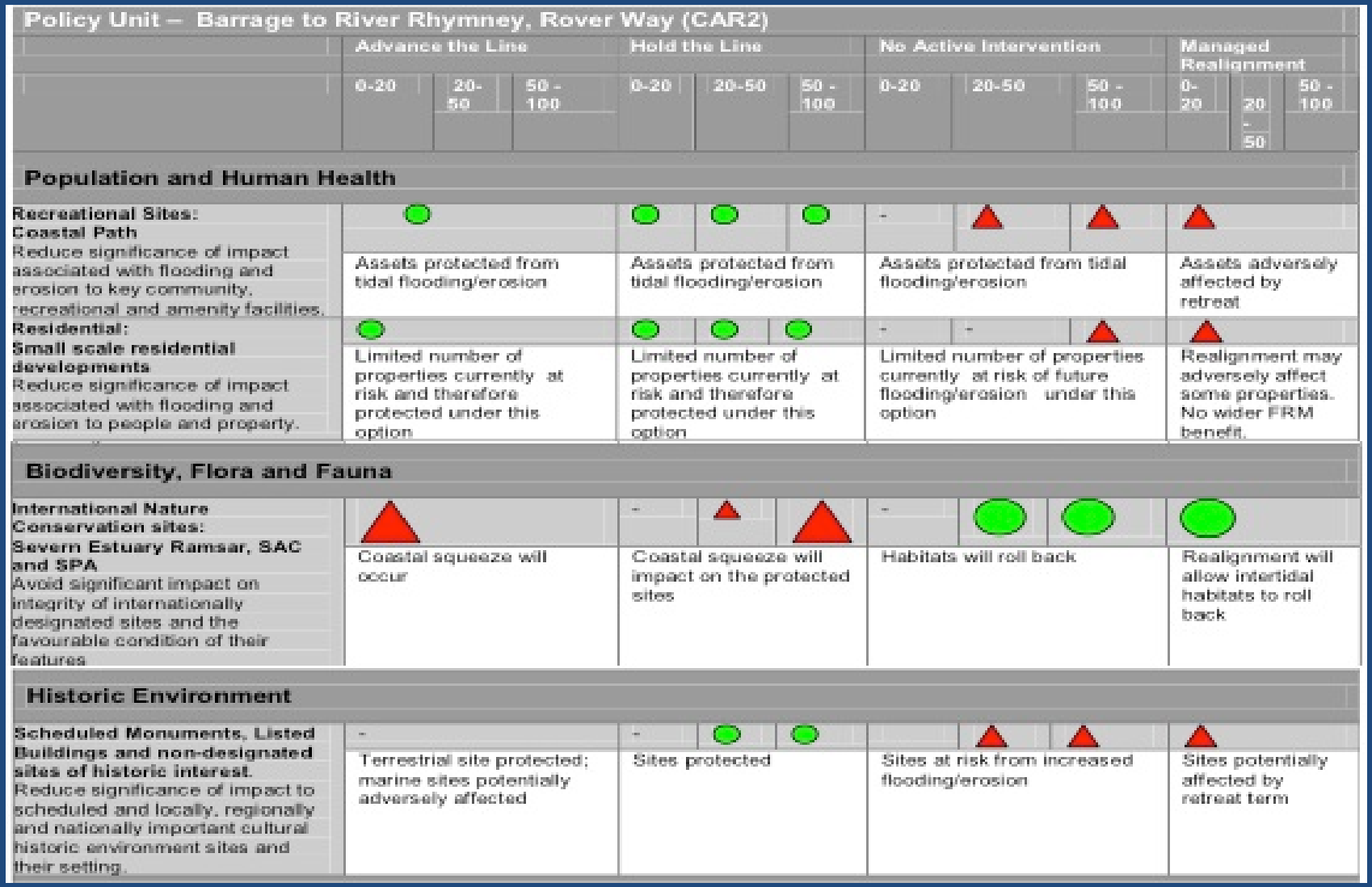
	Original design	**Climate proofed design**	**Net Benefit**
No climate change	$4,475,000		
With climate change	$7,803,000	$4,986,000	$2,817,000
Internal rate of return			11%

Community discussions

The risks of ignoring climate change



Making tradeoffs visible



Policy Unit – Barrage to River Rhymney, Rover Way (CAR2)

	Advance the Line			Hold the Line			No Active Intervention			Managed Realignment		
	0-20	20-50	50 - 100	0-20	20-50	50 - 100	0-20	20-50	50 - 100	0-20	20 - 50	50 - 100
Population and Human Health												
Recreational Sites: Coastal Path Reduce significance of impact associated with flooding and erosion to key community, recreational and amenity facilities.			Assets protected from tidal flooding/erosion			Assets protected from tidal flooding/erosion	-		Assets protected from tidal flooding/erosion			Assets adversely affected by retreat
Residential: Small scale residential developments Reduce significance of impact associated with flooding and erosion to people and property.			Limited number of properties currently at risk and therefore protected under this option			Limited number of properties currently at risk and therefore protected under this option	-	-	Limited number of properties currently at risk of future flooding/erosion under this option			Realignment may adversely affect some properties. No wider FRM benefit.
Biodiversity, Flora and Fauna												
International Nature Conservation sites: Severn Estuary Ramsar, SAC and SPA Avoid significant impact on integrity of internationally designated sites and the favourable condition of their features			Coastal squeeze will occur	-		Coastal squeeze will impact on the protected sites	-		Habitats will roll back			Realignment will allow intertidal habitats to roll back
Historic Environment												
Scheduled Monuments, Listed Buildings and non-designated sites of historic interest. Reduce significance of impact to scheduled and locally, regionally and nationally important cultural historic environment sites and their setting.	-		Terrestrial site protected; marine sites potentially adversely affected	-		Sites protected			Sites at risk from increased flooding/erosion			Sites potentially affected by retreat term

Stillwell Hall, Fort Ord

Thu Aug 29 12:58:35 2002

Photos from http://www.californiacoastline.org/

Fri Oct 28 13:25:44 2005