



Elevated Family Home Pays Off

Full Mitigation Best Practice Story

Indian River County, Florida



Vero Beach, FL - In 1998, Scott and Susan Deal decided to add a bedroom to their existing home for their growing family. But their building permit was denied. The local floodplain ordinance, adopted by the city, required that existing structures with the lowest floor built below the required base flood elevation (BFE) be elevated to or above the required BFE when substantial additions or alterations are to be done or if the structure has been substantially damaged. The Deal home was 1 foot below the required BFE.

“When I first found out about the requirements, I was exasperated,” Scott related. “The house had been here forty-eight years without flooding. Why should I have to go through all this when all I wanted to do was add one bedroom?”

To comply with the local ordinance, the Deals had three choices: keep their existing home without substantial addition or alteration; demolish their home, clear and fill the lot, and build a completely new house; or elevate the existing house and fill in the area below the structure to meet the requirement. Working with a local contractor, the Deals secured plans and estimates and found that to demolish the house, clear and fill the lot would cost \$25,000, plus the cost of building the new house. For approximately \$40,000, they could elevate the existing structure 16 feet above the BFE. This elevated level would far exceed the requirement and allow a space underneath to build a first floor.

The Deals chose to elevate their existing house, funding the project themselves. While preserving the 2,800 square feet of space, they built a first floor underneath that is 1 foot above the required BFE. “For an additional \$15,000, we gained 2,800 square feet, protected against flooding, and even kept the roof in place. We built a new whole roof over it,” the Deals explained. Incorporating covered porches, steps, and architectural details created a well-integrated appearance. According to Scott, “From start to move-in date took 10 months, a lot of patience, and an excellent contractor.”

Before we started this project, stated Scott, “We weren’t flood conscious, flooding wasn’t a problem. But now, with [Hurricane] Frances,” he continued, shaking his head. “The others, who didn’t [elevate their houses], it’s sad, terrible, what happened. I’m talking flooding you have to clear out with a shovel. There’s river mud a foot deep in some houses. Our house is the only one on the street with no flood damage. We’re glad the floodplain [regulation] made us elevate the house, and avoided a loss or damage to our property and contents of at least \$45,000 from Hurricane Frances due to flooding. It was definitely worth it to raise the elevation.”

Activity/Project Location

Geographical Area: **Single County in a State**

FEMA Region: **Region IV**

State: **Florida**

County: **Indian River County**

City/Community: **Vero Beach**

Key Activity/Project Information

Sector: **Private**
Hazard Type: **Flooding**
Activity/Project Type: **Elevation, Structural**
Activity/Project Start Date: **02/1998**
Activity/Project End Date: **02/2004**
Funding Source: **Homeowner**

Activity/Project Economic Analysis

Cost: **\$40,000.00 (Estimated)**
Non FEMA Cost:

Activity/Project Disaster Information

Mitigation Resulted From Federal
Disaster? **No**
Value Tested By Disaster? **Yes**
Tested By Federal Disaster #: **No Federal Disaster specified**
Year First Tested: **2004**
Repetitive Loss Property? **Unknown**

Reference URLs

Reference URL 1: <http://www.floridadisaster.org/BRM>
Reference URL 2: <http://www.floodsmart.gov>

Main Points

- Homeowners elevated home above base flood elevation (BFE)
- The Deals chose to elevate their existing house, funding the project themselves. While preserving the 2,800 square feet of space, they built a first floor underneath that is 1 foot above the required BFE. "For an additional \$15,000, we gained 2,800 square feet, protected against flooding, and even kept the roof in place."
- With their new elevated home, the Deals were the only ones on their block who didn't experience damage from Hurricane Frances.