

100-Year Design Elevation Maps Questions and Answers

Q1. What is the Corps releasing today?

A1. The Corps is releasing maps that show a range of elevation levels for the 100-year greater New Orleans HSDRRS, as of Feb. 7.

Q2. How will these elevation levels be used?

A2. The information will help the Corps prepare designs, plans and specifications, and cost estimates to upgrade the 325-mile HSDRRS.

A2a. In addition, these design elevations have been provided to our contracting partners to develop the architectural design and engineering plans for the levees/structures for the greater New Orleans HSDRRS.

Q3. How were the design elevations developed?

A3. Hydraulic and coastal engineers from the Corps used output from storm surge, wave and wave overtopping models to compute preliminary 100-year design elevations.

Q4. What do you mean by “100-year elevations”?

A4. “100-year elevation” refers to a design elevation that would reduce risk from a hurricane event producing a surge height that has a one percent chance of being equaled or exceeded in any given year.

Q5. How have these design elevations been validated?

A5. The process and elevations have undergone a rigorous technical review. The review panels included subject experts from industry, ASCE, USACE, FEMA, and several universities.

Q6. Haven’t risk maps and cost estimates already been developed for the 100-year protection system? How was that information developed without these design elevations?

A6. The risk maps and cost estimates were developed using a preliminary view of these data. The information being released today is more precise; however, it still uses a range of elevations rather than an exact number. This gives designers the necessary flexibility to develop the best engineering solutions for hurricane damage risk reduction.

Q7. Will the maps and cost estimates be redone using this latest information?

A7. The 100-year design elevations maps will be updated once final designs are complete. Cost estimates will not vary significantly with this information.

Q8. Then what is the value of this information?

A8. Again, the elevation levels are critical to project design. However, the Corps will also consider alternatives to higher levees/structures, such as breakwaters and wave berms, which can impact final elevation.

Q9. Will these elevations provide a means for evaluating the system once construction is completed?

A9 Yes. When the HSDRRS is completed in 2011, the elevations will provide the levels of protection necessary for certification in the National Flood Insurance Program.