

Treating Disease



Summary

“Treating Disease” is a stand-alone interactive component of the *Nanomedicine* exhibition. Visitors read about cutting-edge medical treatments that are being developed with nanotechnology.

Gold Nanoshells

The tabletop interactive, Gold Nanoshells, demonstrates how tiny nanoparticles (gold nanoshells) are being used to destroy cancerous tumors. Visitors inject gold nanoshell marbles into the bloodstream and watch as the gold nanoshells are absorbed by cancerous cells. The visitor then activates an infrared laser and watches as the laser heats up and kills the tumor cells while leaving the healthy tissues unharmed.

This multimedia static exhibit consists of one copy panel, the tabletop Gold Nanoshells interactive, and a flat-screen monitor slideshow that can be updated to keep the exhibit content current and relevant. Like all of the exhibit components in the *Nanomedicine* package, headphone listening stations with both English and Spanish audio description labels are included. These audio labels serve two functions—to explain the “Big Idea” content of the exhibit and to provide illustrative descriptions of the interactive experience.

Learning Goals

- Nanomedicine treatments use materials that are as small (or even smaller!) as the tiniest parts of cells in the body.
- New nano treatments may work better and have fewer side effects than current medical treatments.
- One example of nanomedicine is the use of gold nanoshells to kill cancerous cells without harming healthy cells.

Exhibit Details

Audience: 11 and up

Exhibit Format: Stand-Alone Exhibit Component
Part of *Nanomedicine* Exhibit package

Exhibit Dimensions: 65 ½”w x 32 ½”d x 78”h