



The Business of Nanotech

## Regulatory Risk Management in Nanotechnology: Proactive Steps to Take Now for Security in the Future



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## Keys to Understanding Nanotech Regulatory, Products Liability, and Public Policy Issues



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## Origins of Nanotechnology

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“What would happen if we could  
arrange the atoms one by one the  
way we want them” ?

Richard P. Feynman  
December 29, 1959



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# Snapshot of Nanotech Today

- 57 million Google hits
- Featured in President's State-of-the-Union Address
- Growing investment (\$2 billion as of 2006)

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## What constitutes nanotechnology?

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## Nanotech Industry Models

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- “Top Down”
- “Bottom Up”
  - Nanoscale engineering
  - “Self-assembly”



## Products Incorporating Nanotechnology

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- Health and beauty aids
- Textile fibers
- Sports equipment
- Food-Related Applications
- Electronics
- Energy generation/transmission
- Medical devices
- Computing



## Two Fundamental Features of Engineered Nanomaterials

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- Size: Incredibly small
- Variety: Incredibly diverse



## Regulatory/Public Policy Considerations

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- Political perception/pressures
- Research vacuum
- Multiplicity of materials/products/processes



## Historical Analogs?

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- Superconductivity
- GMOs
- Industrial Revolution