



# U.S. Operators' Perspective on Nuclear Liability

OECD/NEA Workshop

*Nuclear Damages, Liability Issues, and  
Compensation Schemes*

# Overview

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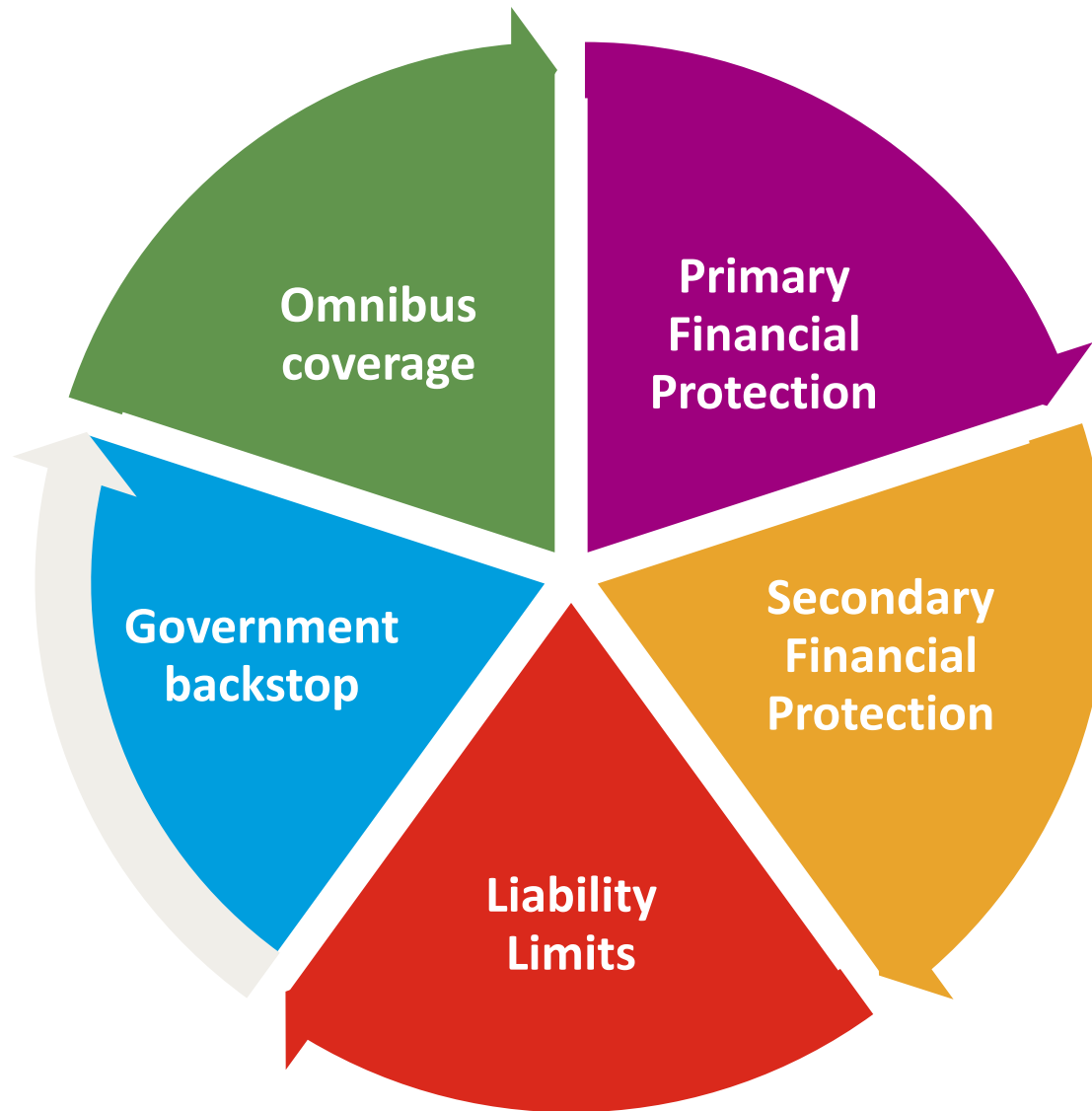
- Overview of Nuclear Liability in the U.S.
- Nuclear Liability in Practice
- Coverage for Other Risks
- Topics of Interest to U.S. Operators



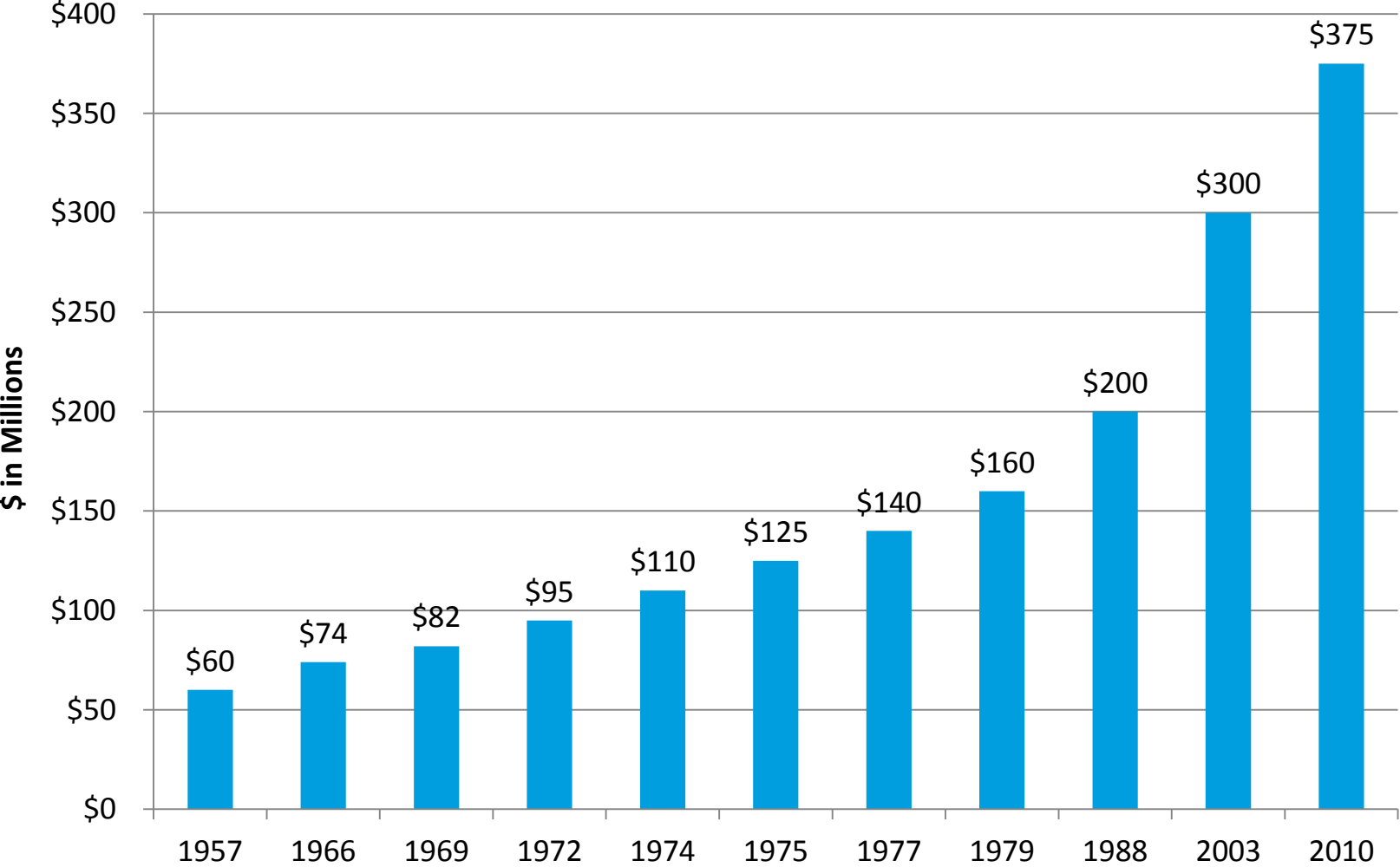
# Price-Anderson Act Overview

# Comprehensive Nuclear Liability Scheme

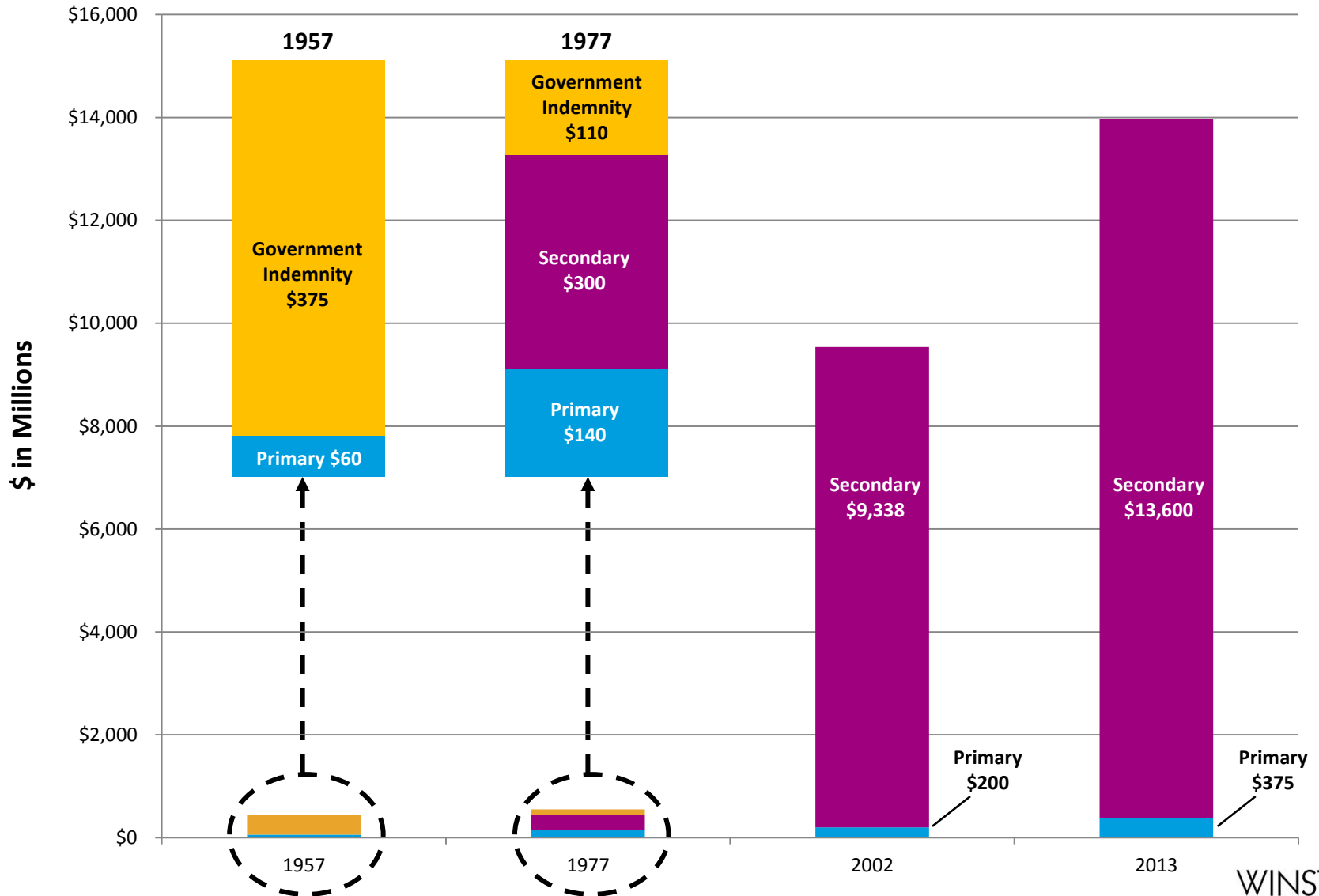
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# Primary Financial Protection Policy Limits



# Total Amount of Coverage Available





# Price-Anderson in Practice

# American Nuclear Insurers (ANI)

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## Joint Underwriting Association

- Provide nuclear liability insurance to U.S. commercial nuclear risks
- Reinsurance for other nuclear pools and mutual insurers

## Guidelines

- Rating of “A-” or better
- Policyholders’ surplus (PHS) >\$100 million
- <10% of PHS committed to ANI’s Domestic Syndicate

## Policies

- Insures every nuclear power plant in U.S.
- Insures other fuel cycle facilities
- Insures other nuclear suppliers and transporters



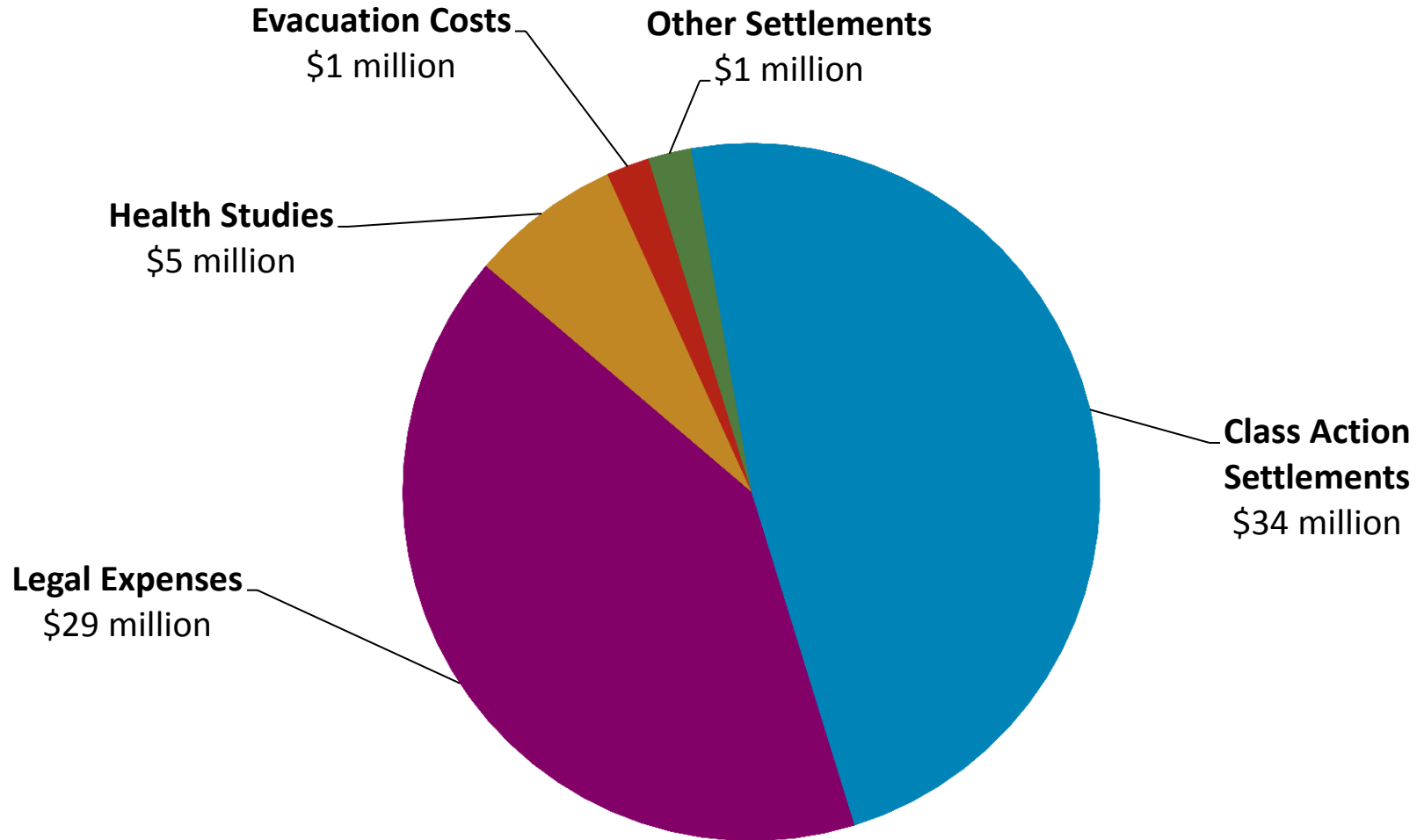
# Claim History

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- According to ANI, between 1957-2012:
  - Claims Defended            237
  - Paid Indemnity                \$65.2 million
  - Paid Expense                 \$288.4 million
  - Total Paid                     \$353.6 million
- Claims asserted by public typically involve normal plant operations
- Claims asserted by workers typically involve alleged exposure incidents
- Three Mile Island is only claim involving a significant nuclear incident

# Total Payments for TMI Accident

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**Total Payout for TMI = \$71 million**



# Coverage for Other Risks

# Summary of Coverage

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## Primary and Secondary Insurance

- Public Liability
- Excludes “Acts of War” but covers terrorism
- Includes offsite environmental for ENO or transport accident

## Required Property Insurance

- Losses to nuclear facility, including land, buildings, equipment
- On-site environmental clean-up

## Other Policies

- Accidental Outage
- Master Workers Policy
- Suppliers’ and Transporters’ Policy
- Offsite environmental cleanup (non-ENO)

# Nuclear Property Insurance (On-Site)

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- On-site property insurance required for each reactor site
  - Policy from Nuclear Electric Insurance Limited (“NEIL”)
  - Provide all-risk property insurance, including insurance for on-site environmental clean-up costs
  - Priority to stabilizing damaged reactor and cleaning site

Coverage	Required	Available
NEIL Primary Property	\$500 million	\$500 million
NEIL I (Accidental Outage)	\$0	\$490 million
NEIL II (Excess Property and D&D)	\$506 million	\$2.25 billion

# Other Types of Claims

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- Worker claims
  - Licensee employees covered by worker's compensation as exclusive remedy
  - Other workers (employees of vendors and suppliers)
    - Within definition of “public liability” and omnibus coverage
    - Separate Master Worker Policy
- Offsite environmental clean-up costs
  - Not covered by the as-issued Facility Form policy
  - Covered for ENO or transportation accident
  - May purchase separate policy
  - On-site clean-up covered under property policy

# Non-Reactor Facilities/Vendors

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- For nuclear installations not required to maintain Facility Form policy or indemnity
  - Includes fuel fabrication and conversion facilities
  - Operator may purchase Facility Form policy
  - Liability limit at operator's discretion
- If supplier/vendor provides services/equipment to nuclear facilities:
  - Supplier's and Transporter's ("S&T") policy available
  - Covers products or services at other nuclear facility
  - Excess above Facility Form policy
  - Subject to policy limits



# Topics of Interest



# Terrorism and Acts of War

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- “Public liability” excludes “claims arising out of an act of war”, but...
- ANI policies currently cover terrorist attacks
  - On January 1, 2002, increased premiums by 30%
  - Terrorism Risk Insurance Act (“TRIA”): U.S. government program provides reinsurance coverage for terrorist attacks
- NEIL policies cover terrorist attacks
  - Subject to limits for subsequent attack within 12 months
  - War exclusion applies only to overt acts of governments

# Small Modular Reactors

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- Qualify as a single unit
  - Combination of 2 or more facilities at a single site
  - Capacity 100-300 MWe each and < 1300 MWe combined
- Specific costs or formula for reactors < 100 MWe

Output	Units/Site	Primary	Secondary	Indemnity
311 MWe	1	\$375M	\$121M	\$0
311 MWe	2	\$375M/site	\$121M/unit	\$0
125 MWe	1	\$375M	\$121M	\$0
125 MWe	2	\$375M/site	\$121M/site	\$0
125 MWe	4	\$375M/site	\$121M/site	\$0
45 MWe	1	\$50M	\$0	\$500M
45 MWe	12	\$50M	\$0	\$500M
25 MWe	1	\$28M	\$0	\$500M
25 MWe	2	\$28M	\$0	\$500M

# Decommissioned Reactors

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- Each “licensee” must have primary and secondary financial protection
  - Required for permanently shut down and defueled reactor
  - Even “possession-only” (non-operating) reactors
- NRC has discretion to reduce primary financial protection and eliminate retrospective premium
  - Depends on risk/hazards
  - Full level required immediately after shutdown, reduced over time
- May affect total amount of financial protection



# Conclusions

# Assessment of Nuclear Liability in U.S.

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- Comprehensive liability scheme
  - Reactor operators pay for insurance
  - Government only has role if liability limits exceeded
- Coverage is adequate
  - Primary financial protection never exceeded
  - Public has paid nothing to date
- Significant experience with liability coverage
  - In place for more than 50 years
  - Many examples of coverage in practice, including TMI
- Other risks adequately covered by additional insurance policies



Questions?



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### Practice

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### Education

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### Bar Admissions

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Tyson Smith is a partner in the firm's Washington, DC and San Francisco offices who has concentrated his legal practice in the area of nuclear energy regulation since 2003.

Mr. Smith represents and provides advice to clients regarding compliance with the regulations of the U.S. Nuclear Regulatory Commission. He has been extensively involved in initial licensing of new nuclear facilities, including commercial power reactors and uranium enrichment facilities. He regularly assists clients throughout the nuclear fuel cycle in licensing, compliance, and enforcement matters.

Prior to joining the firm, Mr. Smith served as an attorney for the U.S. Nuclear Regulatory Commission.

Mr. Smith is a member of the American Bar Association and served as chair of the Special Committee on Nuclear Power in the ABA's Section of Environment, Energy, and Resources. Mr. Smith was ranked in Chambers USA 2013 as one of the nation's top lawyers in the nuclear energy regulatory and litigation practice.