



BWXT and a Nuclear Industry Perspective

U.S Nuclear Infrastructure Council – July 13, 2016

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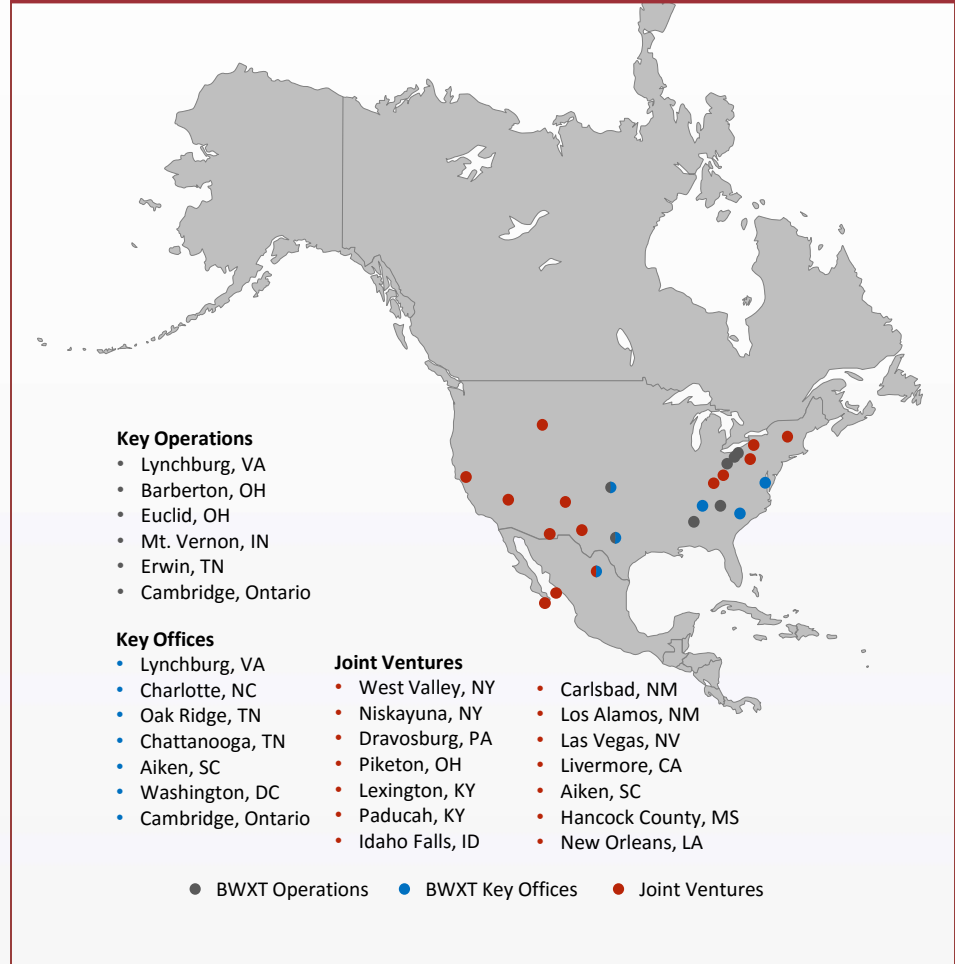
President, Technical Services & Nuclear Energy Groups, BWX Technologies, Inc.

BWXT Company Profile

Company Overview

- \$1.4 billion in revenues (FY2015)
- \$3.7 billion market cap
- Operates six major manufacturing facilities
- ~5,500 employees worldwide
- ~4,000 employees hold security clearances from NRC, DOE and DOD
- Skill sets include scientists, engineers, machinists, technicians and administrators
- Nuclear Regulatory Commission (NRC) licenses for our nuclear fuel facilities in Lynchburg, VA and Erwin, TN
- Two mfg. facilities are ASME N-Stamp certified; 2 NRC Licensed Cat 1 facilities
- Headquarters in Lynchburg, VA
- NYSE: BWXT

Locations



Note: All employee figures as of March 31, 2016.

BWXT Segments



Nuclear Operations Group 2015 Revenue: \$1,180M

- Designs / manufactures critical components and nuclear fuel for U.S. Navy
 - VA-Class Submarine
 - OH-Class Replacement
- Owns / operates the only two NRC-licensed commercial facilities in U.S. authorized to handle / process high-enriched uranium (HEU)
- Downblends HEU for govt. / commercial use

Attributes

- Long duration contracts
- Well-defined / disciplined approach to capital expenditures
- Stable customer/cash flows



Technical Services Group 2015 Revenue: \$84M

- Manages / operates govt.-owned facilities supporting defense, nuclear non-proliferation and advanced technology development programs
- Decommissioning, decontamination and clean up of legacy radiological / hazardous waste and commercial facilities
- Environmental management

Attributes

- Long duration contracts
- Limited working capital
- Stable customer
- Stable cash flows








Nuclear Energy 2015 Revenue: \$155M

- Designs / fabricates components and systems for commercial nuclear industry
- Provides related plant inspection and maintenance services
- Delivers advanced commercial nuclear power technologies including nuclear systems and plant design





Attributes

- Positioned for upside to business cycle
- Focused on high, value-add segments of addressable markets

Nuclear Operations

	NFS	NOG-E	NOG-L	NOG-B	NOG-MTV
Facility					
Location	Erwin, TN	Euclid, OH	Lynchburg, VA	Barberton, OH	Mount Vernon, IN
Employees (Approx)	710	290	2,200	660	200
Manufacturing Capacity (Approx Sq Ft.)	271,000	285,000	930,000	800,000	580,000
Products	<ul style="list-style-type: none"> Fuel Material 	<ul style="list-style-type: none"> Control Rod Drive Mechanisms 	<ul style="list-style-type: none"> Naval Reactors 	<ul style="list-style-type: none"> Heavy Components 	<ul style="list-style-type: none"> Heavy Components





Technical Services

	National Laboratories	Waste Management	D & D	Manufacturing
Function				
Locations	<ul style="list-style-type: none"> Idaho National Lab Lawrence Livermore Los Alamos Nevada Nat. Security Site Oak Ridge TSG Corporate 	<ul style="list-style-type: none"> DUF6 Conversion Services Advanced Mixed Waste Treatment Plant Waste Isolation Pilot Plant Savannah River Remediation Isotek 	<ul style="list-style-type: none"> BLEU D&D (NFS) Naval Reactors D&D Portsmouth GDP West Valley D&D 	<ul style="list-style-type: none"> SACOM
Employees & Affiliates (approx)	<ul style="list-style-type: none"> 16 Employees 28 Affiliates 	<ul style="list-style-type: none"> 15 Employees 22 Affiliates 	<ul style="list-style-type: none"> 260 Employees 35 BU Employees 2 Affiliates 	<ul style="list-style-type: none"> 2 Employees
Site Employees (approx)	<ul style="list-style-type: none"> 22,650 	<ul style="list-style-type: none"> 3,775 	<ul style="list-style-type: none"> 2,530 	<ul style="list-style-type: none"> 900
Square Miles (approx)	<ul style="list-style-type: none"> 2,310 	<ul style="list-style-type: none"> 328 	<ul style="list-style-type: none"> 11 	<ul style="list-style-type: none"> 217 (195 is buffer)
Primary Function	<ul style="list-style-type: none"> Nuclear Operations Security Emergency Response Safety Analysis/Quality 	<ul style="list-style-type: none"> Prime Contractor Operations and Maint Waste Management ES&H 	<ul style="list-style-type: none"> Prime Contractor D&D Operations and Maint Waste Management 	<ul style="list-style-type: none"> NASA Customer Management and Operations

Notes:

- 1) Data as of April 1, 2015.
- 2.) BU = Bargaining Unit

Nuclear Energy

	NE Corporate and New Plants	Nuclear Services	Intech and Nuclear Services Tooling	BWXT Canada
Facility				
Locations	Lynchburg, VA	Lynchburg, VA	Chattanooga, TN	Cambridge, Ontario CN
Employees (approximate)	73 <ul style="list-style-type: none"> • 63 Full time • 1 Part time • 9 Staff Aug 	63 <ul style="list-style-type: none"> • 40 Full time • 23 Part time 	72 <ul style="list-style-type: none"> • 21 Full time • 51 Part time 	603 <ul style="list-style-type: none"> • 314 Full time • 289 BU Employees
Products/ Services	<ul style="list-style-type: none"> ▪ Engineering Design Center ▪ Commercial Nuclear Fuel ▪ mPower ▪ Gen IV Reactor Design ▪ Ops Support ▪ Corporate Management (Charlotte) 	<ul style="list-style-type: none"> ▪ Steam Generator Services ▪ Field Inspection Services ▪ Outage Support ▪ Tube Inspections ▪ Plugging 	<ul style="list-style-type: none"> ▪ Tooling Design and Fabrication ▪ BOP Services 	<ul style="list-style-type: none"> ▪ Component Design ▪ Manufacturing ▪ Engineering Services ▪ Steam Generator Services ▪ Heat Exchanger Services ▪ Reactor Services ▪ Component Replacement Services

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BWXT Nuclear Energy Portfolio

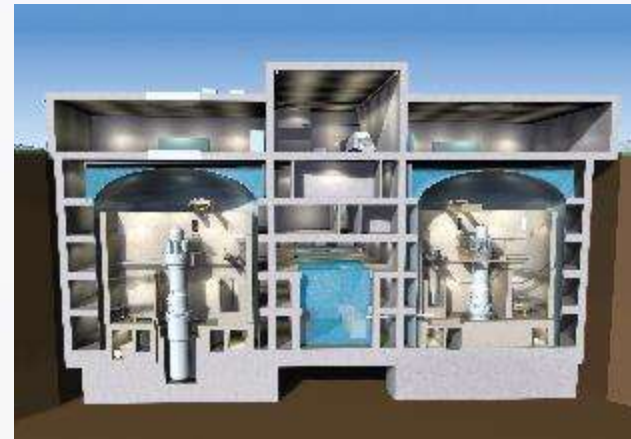
Overview

- Approximately 800 employees
- Designs, engineers and manufactures complex components, fuel and systems including SMR and advanced reactors
 - Supplied more steam generators than any competitor worldwide
 - In North America, single largest commercial nuclear manufacturer and largest clean room
- Provides specialty nuclear plant maintenance services
 - Steam generator inspection / repair – lowest dose and schedule in industry
 - Balance of plant heat exchanger inspection / repair
 - Premier Canadian nuclear services



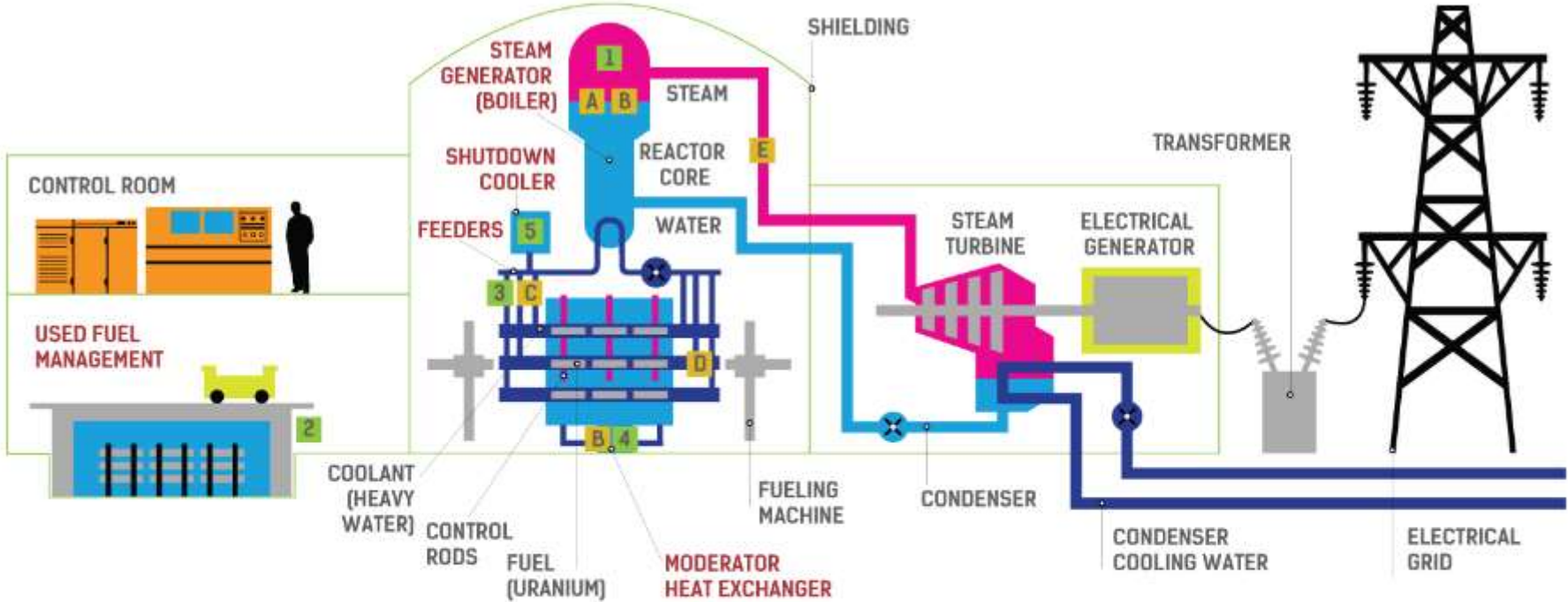
BWXT's Rich History in Designing / Manufacturing Nuclear Components

- BWXT began manufacturing commercial nuclear reactors in the 1960s
 - Once-through design
- Today / 50+ years later:
 - Full range of products and services
 - CANDU
 - Replacement nuclear pressure vessel components
 - Ancillary / related nuclear products
 - mPower / SMR technology
 - Gen IV – advanced reactor technology



Nuclear Energy

Summary of Products & Services



EQUIPMENT

SERVICES



Gen IV and Emerging Reactor Technology

■ mPower technology developer

- Simplified, passive, modular light-water PWR
- 195MWe, built in twin packs
- Descendant of the BWXT maritime program: nuclear powered merchant ship, Otto Hahn
- Continuing to be developed

■ Supporting many of the other Gen IV technology developers

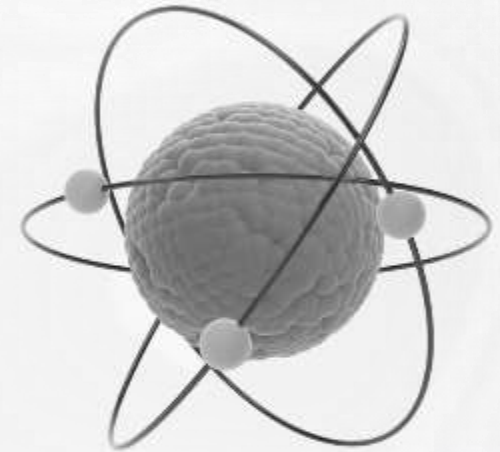
- Fuel design and manufacturing
- Systems engineering and program management
- Licensing
- Component design and manufacturing

■ Market realism



Nuclear Energy's Intangible Benefits

- Grid stability
- Price certainty and stability
- Runs when needed with fuel on-site
- Clean, carbon-free
- National security
- Energy security
- Fuel and technology diversity (portfolio value)
- Anchors local community
- Creates jobs
- Large and reliable base



The opportunity cost that goes unmeasured: Safe, secure, reliable electricity 24/7 plus...

Adapted from NEI Briefing to Wall Street, Jan. 2015; original provided by courtesy of NEI.

Energy Policy and Outlook

- Energy Policy Act 2005
- Currently no credit given for commercial nuclear power's intangible benefits
- Renewables substantiality subsidized by state and federal governments
- Regulatory / Legislative
- Short-term economics driving decisions



Challenges for New Nuclear Deployment

- Safety culture
- Bridging the gap between licensing and FOAK deployment
 - Covering the non-recurring DDE
- Economics of operations in non-regulated environments
- Availability and quality of supply chain
- Standardization
- Regulation
- Workforce
- Safety and performance
- Competing with sovereign and international governments



