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PFP to Slab-On-Grade	234-5Z, remaining PRF	Final Demolition of PFP structures	High	High	High	Yes		Completes PFP (Plutonium Finishing Plant) to slab-on-grade; reduces minimum safe costs (min-safe), and eliminates continual risk to surrounding area from residual contamination
IDF (Integreated Disposal Facility) Permitting and Opeartion	Permitting and documentation updates	Permitting modifications and ready to receive DFLAW	High	High	High			Critical permitting and operation to receive DFLAW (Direct Feed Low Activity Waste) waste receipts *Note: Risk reduction, mortgage reduction are based on tank waste related rating*
Sludge Removal	100K Sludge Transfers to T Plant	Removal of all sludge to T Plant	High	High	High	Yes		Removes primary threat of contamination release from KW Basin to the Columbia River; reduction in min-safe costs
100KW Basin Deactivation	105KW Basin Deactivation	Sand & Garnet Filter Removal	High	High	High	Yes		Stabilizes basin and places it into safe configuration for demolition; reduction in min-safe costs
	105KW Basin Deactivation	Characterization/re-packaging of waste/removal	High	High	High	Yes		
	105KW Basin Deactivation	Remove basin water/grout stabilize	High	High	High	Yes		
Management of Cesium and Strontium Capsules (MCSC) Project W-135	WESF Capsule removal	Design Dry Storage Casks and Removal approach	High	High	High	Yes		Removal of capsules that contain ~1,000,000 Curies of Cesium/Strontium (Cs/Sr) to a safer configuration at dry storage facility; reduction in min-safe costs
	WESF Capsule removal	Remove Cs/Sr capsules from WESF and transfer to new casks	High	High	High	Yes		
	Dry Storage Permitting & Construction	Permitting and Construction Dry Storage Facility	High	High	High			
PUREX Tunnel	PUREX Storage Tunnels #2	Perform Tunnel Grouting Activities to Stabilize	High	High	High	Yes		High radioactive inventory, potential for release similar to PUREX Tunnel #1, Engineering Evaluation concluded potential for failure
300 Area Waste Site Remediation	300-296 Waste Site Source Removal	300-296 Source Removal	High	Med	High	Yes		Removal of highly contaminated soil from beneath the 324 Building; reduces monitoring costs and enables final deactivation of the facility
Legacy Waste Processing & WIPP shipments	Commercial Waste Repackaging	Outside Storage Area A legacy waste processing	High	Med	High	Yes		Removes and Treats legacy waste currently stored at the Central Waste Complex (CWC); eliminates potential for off-normal events, and reduces ongoing inspection and maintenance costs
PUREX Complex Risk Mitigation	PUREX Ancillary D&D	PUREX North Tank Farm D&D & RCRA closure	Med	High	High	Yes		Eliminates asbestos risk, closes 2 RCRA (Resource Conservation & Recovery Act) TSDs (Treatment, Storage, and/or Disposal); reduces ongoing asbestos repair costs, establishes initial phase of future demolition of PUREX Annex and demolition prep of PUREX
External Structures Risk Mitigation	Inactive structures >60 years old	Interim Stabilization Z-9 Crib and Z-361 tank	High	High	Low	Yes		Interim stablizations of sites at high risk for collapse or other releases. Cost savings/avoidance by preventing collapse and potential response action, potential impacts to surrounding facilities. 216-Z-9 crib contains 59,000 grams of Plutonium
D&D Facilities and Legacy Alpha Reduction	224B D&D	Cell Cleanout (plutonium) Building D&D	High	Med	Med	Yes		Unknown conditions in hot cells; Deactivation and Demolition (D&D) of remaining alpha facilities at Hanford; avoids ongoing maintenance costs and potential roof repairs
	224T D&D	Cell Cleanout (plutonium) Building D&D	High	Med	Med	Yes		

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B PLANT Complex Risk Mitigation	Retired Canyon Ventilation System Stabilization	Grout Stabilize the Legacy Ventilation System, including sand filter, HEPA filter, Vaults	High	Med	Med	Yes		Retired Ventilation system & related filters and vaults contain ~200,000 Curies of Cs/Sr, prevents potential intrusion leading to off-normal events near B Plant
PUREX Complex Risk Mitigation	PUREX Interior Risk Reduction	PUREX N Cell Glovebox Removal	High	Med	Med			Removal of Plutonium Source inside PUREX, places N cell in safe configuration to avoid risk to ventilation; reduces surveillance and maintenance costs
External Structures Risk Mitigation	PW-1/3/6 ROD implementation	Construct and Removal of plutonium Sites (includes 216-Z-9)	High	Med	Med	Yes		Final remediation of 216-Z-9 crib which contains 59,000 grams of Plutonium; ROD (Record of Decision) implementation for PW-1/3/6; reduces surveillance costs and avoids potential off-normal event from collapse
		Settling Tank interim stabilization and final remediation	High	Med	Med	Yes		ROD implementation for tanks in PW-1/3/6; reduces surveillance costs and avoids potential off-normal event from collapse
		Z Cribs Interim Stabilizations and final remediation	High	Med	Med	Yes		Interim stabilization of cribs containing high plutonium; ROD implementation for PW-1/3/6; reduces surveillance costs and avoids potential off-normal event from collapse
	Filter Systems >60 years old	291-B, 291-S, 291-T, 291-U, PUREX *Some are active*	High	Med	Med	Yes		Stabilization of inactive ventilation systems would prevent potential collapses and prevent off-normal events impacting nearby facilities; replace aging active systems; reduces surveillance and maintenance costs; 291-U required to complete U Canyon demolition
	Underground Vaults and Settling Tanks	WR Vault, 9 tanks	High	Med	Med	Yes		Stabilization and remediation of WR Vault next to U Canyon; stabilization of U-361, B-361, and T-361 tanks; reduces surveillance costs; required to complete U Canyon demolition
RCRA Rev. 9 Permit Renewal Effort	Prepare Closure Plans	276BA Tank (B Plant) 203A, 211A Tank farm removal (PUREX North)	Med	High	Med	Yes		Closure permits to allow complete removal of tanks outside B-Plant and PUREX North; reduction in surveillance and maintenance costs from failing asbestos on tanks
REDOX Complex Risk Mitigation	REDOX Interior Risk Reduction	Characterization/Cold & Dark Mods; Waste and Asbestos removal	High	Med	Low	Yes		Places facility in long-term stable condition; mitigates increasing costs at REDOX for surveillance and maintenance
		REDOX Canyon Entry to Investigate/document conditions	High	Med	Low	Yes		Determine current conditions to determine if further mitigating activities are necessary; proactively identifies any potential for additional mitigating activities
		Plutonium Loadout Hood Removal and final Demo Prep	High	Med	Low	Yes		Removal of remaining plutonium sources at REDOX; avoid contamination spread increasing cleanup costs; reduction in surveillance and maintenance costs
Legacy Waste Processing & WIPP shipments	M-91 Facility Waste Processing	Design M-91 treatment capabilities	Med	Med	High	Yes		Processing of Transuranic (TRU) legacy waste; reduces surveillance and maintenance costs
	M-91 Facility Waste Processing	Construct M-91 and Treat legacy waste	Med	Med	High			
External Structures Risk Mitigation	Wooden structures >60 years old	B Cribs Interim Stabilizations	High	Med	Low	Yes		Stabilization to prevent potential collapses and off-normal events impacting nearby facilities; reduces surveillance and maintenance costs at aging structures
		C Cribs Interim Stabilizations	High	Med	Low	Yes		
		S Cribs Interim Stabilizations	High	Med	Low	Yes		
		T Cribs Interim Stabilizations	High	Med	Low	Yes		
		U Cribs Interim Stabilizations	High	Med	Low	Yes		
	Stacks >60 years old	Inactive Stack Demolition	High	Med	Low	Yes		
	Tanks >60 years old	CX Tanks Stabilization	Med	Med	High	Yes		

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Tank Farms Legacy Structures	Underground Vaults	204-AR Vault, contains 1 catch tank	Med	Med	High	Yes		Stabilization and remediation of legacy inactive vault at the tank farms. Prevent tank release/intrusions and potential response action, potential impacts to surrounding facilities
324 Building	324 Building D&D	324 Building D&D	Low	High	High	Yes		Final demolition of facility; reduces surveillance and maintenance costs
D&D 200 Area Ancillary Facilities	242B/BL D&D	Pool Cell cleanout, and D&D	Med	High	Low	Yes		Continued animal intrusion into building near B Farm; reduces surveillance and maintenance costs
100K Area Closure Project	100K Soil Sites Removal	Complete K area waste remediation	Med	Med	Med			Removal of Contamination Source, allows for soil remediation and final K Area Closure
	D&D of 100K structures	Asbestos Removal, D&D	Med	Med	Med			Demolition of 100K Structures to allow for final K Area Remediation; removes asbestos; reduces surveillance costs
	105-KE/105-KW ISS	105-KE ISS	Med	Med	Med			Final long-term safe configuration; reduces surveillance costs and potential repairs
PUREX Complex Risk Mitigation	PUREX Interior Risk Reduction	PUREX Demo Prep	Med	Med	Med			Reduction in surveillance and maintenance costs as facilities age; removes equipment/asbestos and places in safe configuration
Legacy Waste Processing & WIPP shipments	Waste Treatment	PFP Waste Processing	Med	Med	Med			Avoid long-term storage and risk from unprocessed waste from PFP
	Commercial Waste Repackaging	Legacy Drum Waste Repackaging/Processing	Med	Med	Med	Yes		Drum degradation leading to worker risk in CWC storage; reduction in surveillance costs; avoidance of off-normal events
	WIPP Certification and Shipments	Audits and TRU waste shipped to WIPP	Med	Med	Med			Permanently removes legacy waste from Hanford Site; reduction in surveillance costs
Ground Water (GW) Pump & Treat	Central Plateau Pump-and-Treat	UP-1/BP-5 well expansion and remediation	Med	Med	Med			Reduction of contaminated groundwater in 200 East Area
	100K Pump-and-Treat	Complete remedial Action at 100K	Med	Med	**Med**			Plume containment and groundwater remediation near Columbia River
	100-D/H Pump-And-Treat	Complete remedial Action at 100-D/H	Med	Med	Med			
	Modeling and documentation updates	Modeling to support Central Plateau decisions	Med	Med	Med			Analysis to support cummulative impact evalution, biomobilization and biointrusion studies
External Structures Risk Mitigation	Tanks >60 years old	iMUST Tank Stabilizations: 51 in 200East 60 in 200West	Med	Med	Med	Yes		Miscellaneous tanks (iMUST) in the 200 Area; potential impacts from tank release/intrusions and response actions
Tank Farms Legacy Structures	244-AR Vault	244-AR Vault with 3 process cells and 4 tanks	Med	Med	Med	Yes		Stabilization and remediation of legacy inactive vaults at the tank farms. Prevent tank release/intrusions and potential response action, potential impacts to surrounding facilities
	244-CR Vault	244-CR Vault with 4 process cells containing 4 tanks	Med	Med	Med	Yes		
	244-BXR Vault	244-BXR Vault with 4 process cells containing 4 tanks	Med	Med	Med	Yes		
	244-TXR Vault	244-TXR Vault with 3 process cells containing 3 tanks	Med	Med	Med	Yes		
	244-UR Vault	244-UR Vault with 3 process cells containing 4 tanks	Med	Med	Med	Yes		

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Waste Evaporator	242-T Evaporator	D&D of Facility (Inactive)	Med	Med	Med	Yes		Final demolition of facility; reduces surveillance and maintenance costs
400 Area (FFTF)	FFTF and Legacy Support Structures	Final closure of area, Sodium waste in interim storage	Med	Med	Med			Final closure of facility; reduces surveillance and maintenance costs; prevents off-normal event from sodium waste
Management of Cesium and Strontium Capsules (MCSC) Project W-135	WESF Deactivation	WESF	Low	High	Med			Places WESF (Waste Encapsulation and Storage Facility) in long-term surveillance and maintenance; reduction in minimum safe costs
200 Area Remediation	M-37 TSD Closures	Closure of RCRA units (A-29 Ditch, A-36B Crib, A-37-1 Crib, B-63 Trench, B Pond, S Pond, CX Tanks, Hexone Tanks)	Med	Low	High	Yes		Final RCRA closure of contaminated cribs, ponds, ditches, tanks; reduces surveillance costs
RCRA Rev. 9 Permit Renewal Effort	Prepare Part B documentation in support of RCRA Rev. 9 issuance	CWC, Outside Storage Areas, WRAP, T Plant, Trenches 31/34	Low	Med	High			Issues RCRA Revision 9 permit and obtains final permit for facilities currently operating in interim status; compliance with Agreed Order
100 Area Final RODS	100-NR-2	RI/FS revision and Proposed Plan	Low	Med	High			Final remedial decision at 100-N Area at River Corridor; reduces maintenance costs when remedial action is completed
External Structures Risk Mitigation	Air Tunnels/Vent Lines >60 years old	Stabilize Exhaust Ducts at facilities in 200 Area	Med	Med	Low	Yes		Prevent collapse and potential response action, potential impacts to surrounding facilities
	Encased/Buried Pipelines >60 years old	Stabilize Process Transfer lines at facilities in 200 Area	Med	Med	Low	Yes		Prevent collapse and potential response action, potential impacts to surrounding facilities
	Tanks >60 years old	200-E-14, 216-BY-201, 216-TY-201	Med	Med	Low	Yes		Prevent tank leaks and/or intrusions, potential impacts to surrounding facilities
Waste Evaporator	242-A Evaporator	Tanks, equipment in lined vault. Upgrades to maintain capacity (Active)	Med	Med	Low	Yes		Upgrades on aging facility that handles tank waste, avoidance of off-normal events
	242-S Evaporator	D&D of Facility	Med	Med	Low	Yes		Residual chemical and radiological Inventory; reduction in surveillance costs
Environmental Support Lab D&D	6266L/600 area	D&D of Facility	Med	Med	Low			Removes contaminated structures in 600 Area
Water Treatment Facility	200 Area Water Treatment Facility	Install new facility and D&D aging 1944 facility (currently active)	Med	Med	Low	Yes		Contains <2,500 lbs. Chlorine with potential release of chlorine gas inhalation; avoidance of off-normal events
100K Area Closure Project	105KW Basin Removal	Remove entire basin and contamination (if found)	Med	Low	Med			Permanent removal of structure and asbestos; K Area closure and waste site remediation; reduction in surveillance requirements
	105-KE/105-KW ISS	Waste Site stabilization from KE basin leak	Med	Low	Med			Final remediation of waste site due to leak at 105-KE Basin

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B PLANT Complex Risk Mitigation	B Gallery Stabilization and RI/FS	Characterization/Known contamination fixes	Med	Low	Med			Known contamination investigation and repair; reduction in ongoing maintenance costs
PUREX Complex Risk Mitigation	PUREX North Annex D&D	PUREX Annex D&D, RCRA closure of tank	Med	Low	Med	Yes		Cleanout interior of PUREX Annex and D4 structure; removal of contaminated equipment & Piping, Transite removal (~100,000 m2), reduction in ongoing maintenance costs
200 Area Remediation	PW-1/3/6 ROD implementation	Remediate the 200 East Area Waste Sites	Med	Low	Med	Yes		Implements PW-1/3/6 ROD which remediates waste sites in 200 East Area
Tank Farms Legacy Waste Handling	219-S Waste Handling Facility	3 tanks in underground concrete vault, an operating gallery, sampling room supporting 222-S labs (Active Facility)	Med	Low	Med			10,000 gallons stored in aging vaults when in use; potential threat as facility ages
REDOX Complex Risk Mitigation	REDOX Ancillary D&D	Ancillary D&D	Low	Med	Med	Yes		Permanent removal of structure and asbestos; reduction in surveillance requirements
RCRA Rev. 9 Permit Renewal Effort	Prepare Closure Plans	A-29 Ditch, A-36B Crib, A-37-1 Crib, B-63 Trench, B Pond, S Pond, CX Tanks, Hexone Tanks	Low	Low	High			Issues RCRA Revision 9 permit and final closure plans for units in the 200 Area and 300 Area
	Prepare Closure Plans	324 Building D&D	Low	Low	High			
	Prepare Closure Plans	Burial Grounds	Low	Low	High			
	Prepare Closure Plans	Canyon TSDs	Low	Low	High			
200 Area RI/FS and RODs	RI/FS Process 200 Area	U Area, PFP Area, remaining 200 West Area (200-WA-1/200-IS-1)	Low	Low	High			Completes RI/FS (Remedial Investigations and Fesibility Studies) investigation at 200 Area waste sites. Includes final remedial action
	RI/FS Process 200 Area	200 East area (200-IS-1/200-EA-1)	Low	Low	High			
	RI/FS Process 200 Area	200-SW-2 CERCLA burial grounds	Low	Low	High			
	RI/FS Process Canyons	REDOX	Low	Low	High			RI/FS work plans and remedial investigations to reach final decision on canyons. Includes final remediation (following demolition preparatory activities)
	RI/FS Process Canyons	B Plant	Low	Low	High			
	RI/FS Process Canyons	PUREX	Low	Low	High			
100 Area Final RODS	100-BC-1 Final ROD	ROD	Low	Low	High			Obtains final remedial decisions and actions at River Corridor
	100-KR-4 Final ROD	RI/FS revision and Proposed Plan	Low	Low	High			
200 Area Remediation	MG-1/MG-2 Waste Sites	Remediation of 200 Miscellaneous Area Waste Sites	Low	Low	High			Remediation at 200 Area miscellaneous waste sites

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GW Pump & Treat	Central Plateau Pump-and-Treat	ZP-1 treatment	Med	Low	Low			Reduction of contaminated groundwater in 200 West Area
100 Area ISS Reactors	5 "cocooned" reactors	Reactor core placed in long-term safe configuration	Med	Low	Low			Final removal of reactor cores and cleanup at River Corridor
D&D Facilities and Legacy Alpha Reduction	B Plant Ancillary D&D	D&D of B Plant Ancillary	Low	Med	Low			Demolition of B Ancillary facilities reduces surveillance cost
	231Z D&D	Regulatory Paperwork and D&D	Low	Med	Low			Demolition of 231Z; reduces surveillance cost
PFP Slab Removal	242-Z and PRF	Characterization and Slab Removal	Low	Med	Low			Characterizes slabs after PFP above-grade structure is demolished; removing slab avoids surveillance costs
External Structures Risk Mitigation	Cross-Site Steamlines	Asbestos Removal, D&D	Low	Med	Low	Yes		Failing asbestos and employee concerns; reduces surveillance and maintenance costs
Canyon ROD Implementation	U Canyon	Final demolition, construction of barrier	Low	Med				Completes U Canyon ROD requirements, including demolition and cap installation
200 Area Remediation	Hexone Tank Closure	Hexone Tanks RCRA closure	Low	Low	Med			Final RCRA closure of tanks; tanks are grout stabilized and are low risk outside REDOX facility
100 Area Final RODS	100-D/H groundwater	RD/RAWP	Low	Low	Med			Final remedy at River Corridor groundwater units
	100-BC-1 groundwater	RD/RAWP	Low	Low	Med			
200 Area Remediation	PW-1/3/6 ROD implementation	Design Process for PW-1/3/6	Low	Low	Med			Begins capital asset process for PW-1/3/6 final remediation; required to build and construct remedy values at >1 Billion lifecycle costs
618-11 Remediation	618-11	Final remediation of waste site	Low	Low	Med			Remediate waste sites adjacent to Energy Northwest

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