



# INVESTOR PRESENTATION

ESCO TECHNOLOGIES INC.



# **Forward Looking Statement**

Statements regarding the future impacts of and the Company's response to COVID-19 and its variants, the Company's results, revenue growth, cash generation, the strength of the Company's end markets, the success of acquisition efforts, the ability of the Company to expand globally, performance improvements, increases in shareholder value, investments, the timing of sales, cost reductions, increase in the demand for electricity, increase in new wind capacity, predicted growth drivers, the expected size and timing of the SLS program, the Virginia and Columbia Class submarines, the success of product development and related launch efforts, and other statements contained herein which are not strictly historical are considered "forward-looking" statements within the meaning of the safe harbor provisions of the federal securities laws. Investors are cautioned that such statements are only predictions and speak only as of the date of this presentation and the Company undertakes no duty to update. The Company's actual results in the future may differ materially from those projected in the forward-looking statements due to risks and uncertainties that exist in the Company's operations and business environment including, but not limited to: the risk factors described in Item 1A of the Company's Annual Report on Form 10-K for the fiscal year ended September 30, 2022; the duration and impacts of COVID-19, its variants and related vaccine mandates including without limitation to the Company's workforce, its customers, its suppliers, and its end markets; global economic conditions impacting commercial aerospace; defense budgets; the availability of select acquisitions on acceptable terms; the success of profit improvement actions; weakening of economic conditions in served markets; shortages of critical components; changes in customer demands or customer insolvencies; competition; intellectual property rights; containment of engineering and development costs; the performance of the Company's international operations; increased tensions between the US and China resulting in the imposition of sanctions or other actions; unforeseen charges impacting corporate operating expenses; technical difficulties; delivery delays or defaults by customers or suppliers; termination for convenience of customer contracts; timing and magnitude of future contract awards; performance issues with key suppliers and subcontractors; labor disputes; material changes in the costs of or tariffs imposed upon certain raw materials; the impacts of natural disasters and climate change; changes in laws and regulations including changes in accounting standards and taxation requirements; costs relating to environmental matters arising from current facilities, former facilities, and their related operations; uncertainty regarding the ultimate resolution of current disputes, claims, and litigation; and the Company's successful integration of newly acquired businesses.



# **ESCO consists of 3 Business Segments**

- > Our Aerospace & Defense (A&D) companies provide highly-engineered hydraulic filtration systems, fluid control valves, machined components, and metal finishing for the aerospace, space and defense industries. In addition, we design and manufacture complex shock and vibration dampening tiles and signature reduction solutions that enhance the stealth capabilities of U.S. Navy submarines and surface ships.
- > Our **Utility Solutions Group (USG)** provides industry-leading diagnostic, protection testing, and condition monitoring equipment, consulting and laboratory testing services, and data analytics vital for maintaining electric grid reliability and renewable energy project development.
- > Our RF Shielding and Test (Test) business is an innovative supplier of test and measurement systems and shielded enclosures. Our comprehensive energy testing and management solutions identify, measure and contain magnetic, electromagnetic and acoustic energy, creating an environment that isolates and controls energy emissions to insure immunity, compatibility, and compliance with regulatory and industry-defined standards.

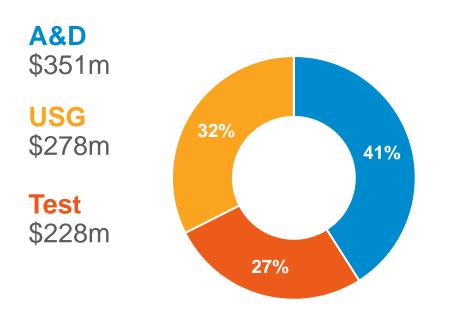


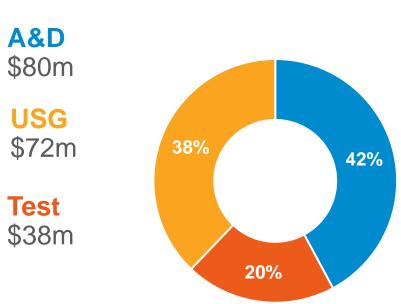
# FY'22 Financial Results<sup>(1)</sup>

**Dollars in Millions** 

Sales \$858m

# Segment EBITDA - As Adjusted<sup>(1)</sup> \$190m

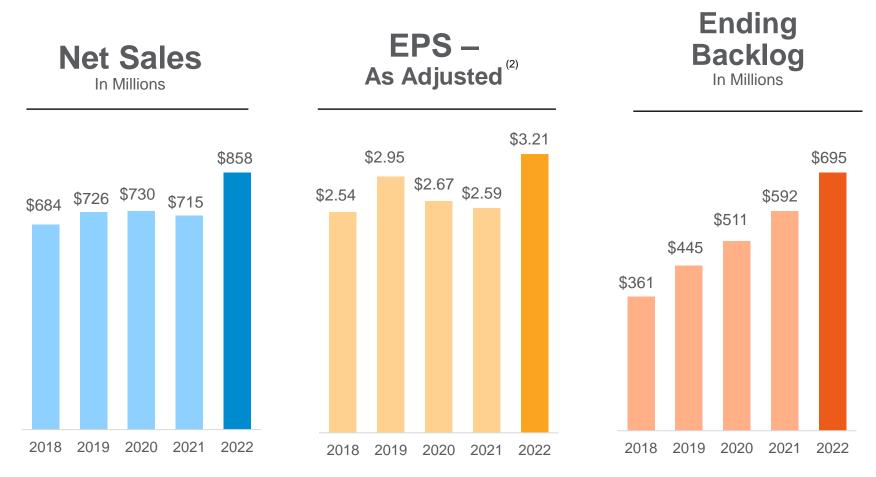




1) Excludes \$29 million of Corporate costs and \$2 million of charges associated with the Altanova and NEco acquisition inventory step-ups, severance at VACCO and NRG, and Corporate acquisition and management transition costs. See page 31 for supporting detail.



# **5 Year Results from Continuing Operations**<sup>(1)</sup>



1) Excludes Discontinued Operations – Technical Packaging Segment sale completed 12/31/19. See Page 31 for supporting detail.

2) See page 31 for GAAP reconciliation .



# **ESCO** Defined

ESCO is a global provider of highly-engineered products and solutions serving diverse and growing end-markets

- > Shared characteristics
  - Technology driven products and services
  - Market leader across several niche markets
  - Deep and broad engineering and operating expertise
  - Global presence in served markets



# **ESCO Investor Fundamentals**

## > Positioned for Continuing Revenue & EBITDA Growth

- A&D Navy and space programs, commercial aero recovery
- USG Infrastructure investment (Inflation Reduction Act), renewables, and expansion of geographic footprint
- Test Strong technology driven end-markets (5G, Electric Vehicles, Autonomous Vehicles)
- Strong Balance Sheet Allows Investment in Existing Businesses and Pursuit of Acquisition Opportunities
  - Capital investment to improve operating efficiency & expand product offerings
  - Acquisitions to supplement growth, accretive to EBITDA and EPS
- Commitment to Cost Structure Optimization and Cash Flow Management
- > Return on Invested Capital (ROIC) Focus Management and Shareholder interests aligned



# **Continuing Pursuit of M&A to Support Growth**

- > Characteristics we are looking for:
  - In our core businesses or markets, or really near
  - Strong market positions
  - Leadership in niche markets
  - Technology driven products or services
  - Reasonably predictable revenue streams
  - Solidly profitable
  - Clearly defined growth opportunities
  - Synergistic to core business platforms



# **AEROSPACE & DEFENSE**



#### **AEROSPACE & DEFENSE**

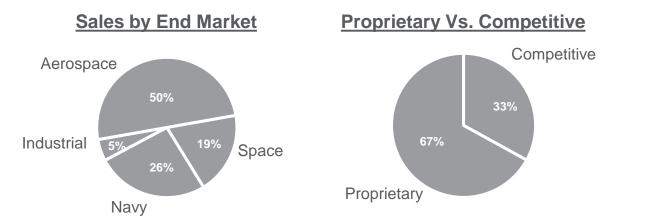


### **Overview**

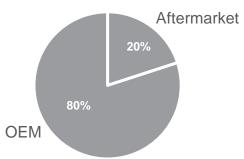
- Provides highly-engineered products and solutions to the Aerospace, Navy, Space & Industrial markets
- > 2022 Revenue up 12% to \$351M
  - 10% Organic Growth Recovery of commercial aero + strength in Navy and space
  - 2% Growth from NEco Acquisition
- 2022 Adjusted EBITDA Margin of 22.8% (+1.4% over prior year)
- > Long term programs (20 40 years)
  - Production, Aftermarket, Repairs & Spares







#### **OEM Vs. Aftermarket**



# Aerospace

#### **PTI Technologies**

- Leading provider of filtration systems and components for commercial, military and business aircraft
  - Hydraulic, Fuel and Air filtration modules/manifolds, filter elements & indicators
  - 2021 NEco Acquisition adds miniature electro-explosive components and subsystems

#### Crissair

 Industry leader in a wide range of products from miniature fluid control valves and components to large manifold assemblies for the aerospace, defense and space industries

#### **Mayday Manufacturing**

- Leading build-to-print manufacturer of mission-critical bushings, pins, sleeves and precise-tolerance machined parts for the aerospace industry
- > Full-service metal processor anodizing, cadmium and zinc-nickel plating, organic coatings, non-destructive testing and heat treatment



# Navy & Space

#### **VACCO** Industries

- Leading supplier of specialty valves, filters, and fluid control products for vital Navy and space programs
  - Navy air and water valves and manifolds for submarines / Critical Quiet Technology
  - Space fluid control/propulsion components for launch vehicles, crew capsules, and satellites

#### **Westland Technologies**

- Designs and manufacturers elastomeric signature reduction solutions to enhance Navy platform survivability
  - Complex tiles and shock and vibration dampening systems that reduce acoustic signatures and modify signal emissions on submarines and surface ships

#### **Globe Composite Solutions**

- Vertically integrated supplier of mission critical composite-based products for Navy and industrial customers
  - Navy Special Hull Treatment (SHT) & baffle panels to increase stealth capabilities of submarines
  - Industrial shielding for security, material handling, and marine applications.

#### **AEROSPACE & DEFENSE**

# **Growth Drivers**

> Large and well-defined addressable markets

#### > Aerospace

- Commercial Aero recovery continuing
  - Narrow body strength / Wide body production not back to pre-pandemic levels
- Military Aero remained strong during pandemic new opportunities
- 2022 order strength and ending backlog are positive signs

#### > Space

- Space Launch System (SLS) Production Hardware ~\$30M-\$35M per launch
  - Successful launch of Artemis 1 December 2022
- Double Asteroid Redirection Test (DART) September 2022
- Satellites Shift to smaller satellites / cubesats / Micro-Propulsion Systems (MiPS)

#### > Navy

- Submarines Quiet/Non-Quiet Valves & Manifolds, Special Hull Treatment (SHT), and Vibration and Sound Dampening components
  - Virginia Class Program well funded Navy procuring 2 per year / Plan for 66 subs
    - Block IV 10 subs (boats 19-28) 5 launched / 5 under construction
    - Block V 10 subs (boats 29-38) first 6 boats under construction
    - Shipset Content ~\$28M including Virginia Payload Module (added boat 30)
  - Columbia Class Ohio Class replacement Navy's top priority
    - Plan to build 12 Subs / Procured 1<sup>st</sup> boat in 2021 / Plan to procure 2<sup>nd</sup> boat in 2024
    - Shipset Content Some content secured / remainder TBD
  - Spares & Repairs above trend growth though 2027
- Surface Ships Aircraft Carriers & Destroyers Signature reduction solutions





# // UTILITY SOLUTIONS GROUP

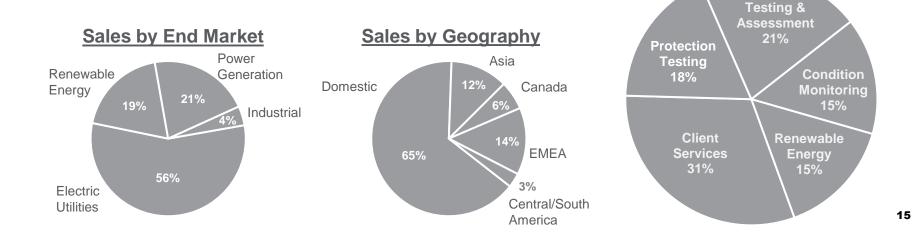




## **Overview**

- > Doble provides industry-leading diagnostic test equipment, software, and services to maintain and optimize electric power infrastructure performance
  - Doble brand has a strong domestic market share and perception of trusted excellence and independence -3<sup>rd</sup> party extension of utility's organization
  - Doble "Knowledgebase" statistical database utilized for baseline and trend analytics
  - Recent acquisitions expand product offerings & geographic reach
    - Altanova expands presence in EMEA & Asia 26% of USG Revenue in 2022 vs 18% in 2021
    - Phenix adds commercial and industrial customers
- NRG products serve multiple stages of wind and solar energy project development and energy production optimization
- > 2022 Revenue up 37% Organic +14%, Altanova/Phenix +23%
- > 2022 Adjusted EBITDA Margin of 25.9%







# **Protection Testing**

- > Power System Simulators Diagnostic equipment and software solutions for the verification of system protection
  - **Doble F8 Series** New modular, configurable power system simulator for both conventional and digital protection testing applications
  - Doble F6150 Power system simulator to test relays and schemes
  - Manta MTS-5100 All-in-one relay test set
  - Protection Suite Software Data management software for analyzing, storing and reporting to regulatory agencies

Protection Suite Software







MTS-5100 Protective Relay Test System



#### UTILITY SOLUTIONS GROUP



# **Condition Monitoring Products (Online Solutions)**

- > doblePRIME™
  - Transformer condition monitoring system
  - Remote access to overall transformer health
  - Modular Design
    - Dissolved Gas Analysis (DGA) **Calisto™ Monitors** detection and diagnosis of impending failures
    - Cable Monitoring Calisto<sup>™</sup> Cable Condition Monitoring helps customers prevent major faults in transmission and distribution cables
    - Bushings **doblePRIME IDD™** detects deterioration in bushings and abnormalities in insulation
    - Partial Discharge (PD) **doblePRIME PD Guard™** monitors PD in transformers, rotating machines, cables, and switchgear
  - **doblePRIME Analytics**<sup>™</sup> aggregates data from monitored devices for a comprehensive view of asset conditions
  - INSIDEVIEW®
    - Evaluates over 130 laboratory tests on liquid and solid insulation provides advanced DGA, oil quality and paper degradation analytics to optimize asset health and predict failures





Calisto<sup>™</sup> Cable Condition Monitoring Solutions





# **Testing & Assessment - Offline**

- M7100 High-Voltage (HV) Asset Analyzer >
  - Complete solution automates tests previously performed by several instruments reducing testing time and technician ladder trips
  - Doble Test Assistance (DTA) Software collection, analysis and management of Doble M-Series test results
- Sweep Frequency Response Analyzer (SFRA) >
  - M5500<sup>™</sup> & SFRA 6 Software powerful new tools provide faster analysis of mechanical integrity within HV transformers
- **Circuit Breaker Testing** >
  - Vanguard offers a complete line of circuit breaker test equipment

# **Testing & Assessment - In-Service**

- > PDS100/200 – PD Surveyors
  - Identify and analyze radio frequency (RFI) and electromagnetic (EMI) emissions associated with faulty or degraded insulation
- Spark P3 New Universal PD & EMI Analyzer >
  - Uses a software defined radio signal detector to identify characteristics of insulation deterioration that could lead to the failure of HV equipment
- **Myrkos** Portable DGA Lab quality DGA in the field >







# **Doble Client Services**

#### > Doble Knowledgebase

- Statistical database utilized in analysis of utility asset test results
- > 60 million test results on over 100,000 types of apparatus
- Independent broker / brand agnostic
- > Security & Compliance
  - Doble Universal Controller™ (DUC)
    - Hardware Sale followed by multi-year service agreement
    - Ultra-rugged tablets/laptops for field applications
    - NERC/CIP compliant transient cyber asset solution
- > Equipment Leasing
  - HV test equipment leasing program / recurring revenue
- Consulting & Testing Services
  - Allows customers to outsource diagnosis and assessment of critical assets
- Conferences & Training
  - International Conference of Doble Clients Brings together power industry peers for education, discussion, and collaboration on asset management, operational concerns, and diagnostic approaches to asset optimization
  - Industry leader in training and education for the electric power industry
- > Laboratory Services
  - Fully equipped labs provide a wide variety of testing and diagnostic services
    - Oil Analysis, Forensic Analysis, DGA, Insulation Testing & HV Testing



Doble Universal Controller™



#### UTILITY SOLUTIONS GROUP



# **Renewable Energy (NRG Products)**

- > Wind & Solar
  - Data Loggers Collect and store data from meteorological sensors and other devices
    - SymphoniePRO® / LOGR-S
  - Met Sensors Anemometers, Pyranometers & Wind Vanes
  - Towers Sensors are mounted on galvanized steel NRG Towers
- > Wind
  - Light Detection & Ranging (LIDAR) Remote sensing equipment utilized in Wind Resource Assessment (WRA), turbine optimization, and weather applications
    - Reliable data at a range of heights ideal as turbine height increases
  - Bat Deterrent Systems
    - Pioneering technology to support bat conservation
    - Emits ultrasonic acoustic field to discourage bats from entering airspaces
- Solar
  - Solar Resource Assessment (SRA) Pre-construction resource assessment solution for utility-scale photovoltaic (PV) solutions
  - Solar Resource Monitoring (SRM) Performance monitoring and optimization system for solar installations





#### UTILITY SOLUTIONS GROUP

#### **Growth Drivers**

- Increasing Demand for Power
  - Electricity demand expected to double by 2050 (U.S. Energy Information Administration)
- > Aging Infrastructure Increasing need for Asset Surveillance
  - Average age of large power transformers (handle 90% of U.S. electricity flow) is >40 years (U.S. Dept of Energy)
- > Drive for more Resilient Power Systems
  - Infrastructure upgrades needed to protect grid from increasingly intense weather events
  - Failure rate of large power transformers increasing costly outages / utility fines & penalties
- > Transition to Renewable Energy
  - Global de-carbonization commitments Renewables + Electrification of Transportation
  - International Energy Agency Renewables 2021 & May 2022 Reports
    - Renewable electricity capacity forecasted to increase by >60% from 2020 to 2026 (China, Europe, U.S. & India driving 80% of growth)
    - Solar & onshore wind are least expensive ways to add electricity generation in most countries today
    - Renewables projected to account for 95% of net increase in global power capacity through 2026
- Conversion to Condition Monitoring Solutions
  - Grid management trending towards digitization and online monitoring solutions
- > Increasing Regulatory Compliance Requirements
  - North American Electric Reliability Corporation Critical Infrastructure Protection (NERC CIP)
- > Expanding New Products and Software Solutions
  - New Product Introductions F8000, DUC<sup>™</sup>, SFRA 6 Software, Calisto<sup>™</sup> R9, Protection Suite Software, INSIDEVIEW<sup>®</sup>, PowerBase<sup>™</sup>
  - Acquisitions expanded product offerings (partial discharge, cable/switch gear/battery monitoring, HV test equipment)
- > Global expansion
  - Altanova provides USG with an international platform to pursue overseas business (in the local time zone, language and currency)



Enterprise Asset Management -INSIDEVIEW®



Protection

Testing - F8000

**Power Simulator** 

Condition Monitoring -Calisto™ DGA Monitors



Solar Resource Assessment Systems

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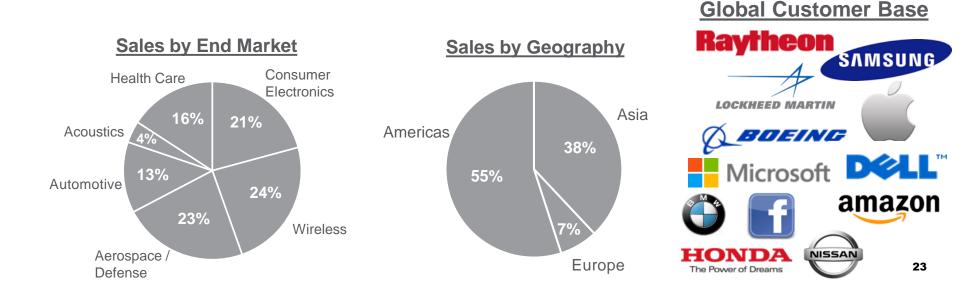
# **//** RF SHIELDING & TEST



#### **RF SHIELDING & TEST**

### **Overview**

- Provides test and measurement systems that identify, measure and contain magnetic, electromagnetic and acoustic energy
  - Products create an environment that isolates and controls unintended energy emissions to insure immunity and compatibility during new product development
- > Provides medical, electromagnetic pulse (EMP), and industrial shielding
- > 2022 Revenue up 15%
  - Driven by strength in test & measurement, medical shielding & powerline filters
- > 2022 Adjusted EBITDA of 16.7%
  - Up slightly despite wage and material inflationary pressures



#### **RF SHIELDING & TEST**

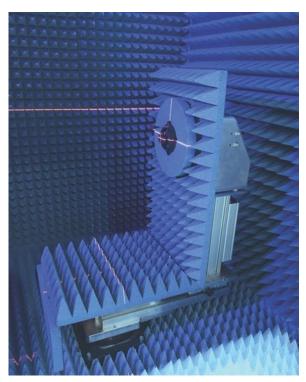


### **Diverse Product Offerings**

#### **Shielded Doors**



#### **Chambers/Systems**



Antennas & Test Accessories

#### Shielded Intraoperative MRI Suites



#### **Power Line Filters**







TE MAN LOUIS

- > Consistent order strength supporting solid backlog
  - Pipeline remains strong Record orders in 2022 strength across all end-markets
- Increasing electronic content
  - Increased content with higher frequencies and functionality (5G / Electric Vehicles)
  - Increased Electronic / RF "Pollution" = Interference
- > Increasing wireless communication
  - The Internet of Things Everything connected wirelessly
  - Autonomous Vehicles
- > Power Line Filters (Red Edge<sup>™</sup> Pulse Protection)
  - Used to ensure clean power is provided to buildings & is free of unwanted transient energy such as electromagnetic pulses (HEMP/EMP)
  - Prevents damage to critical equipment due to energy bursts on power lines
  - Broad market applications commercial, military & government
- International Growth
  - Increasing development / manufacturing of electronics overseas
  - Increasing international requirements for electromagnetic compatibility (EMC) testing
    - Significant increase in EMC chambers in China





# SUMMARY

#### **ESCO TECHNOLOGIES**



# Wrap-up

- > We have confidence in our well-tested operating model
  - 3 solidly profitable business segments with diverse endmarket exposure and solid organic growth prospects
- Strong rebound in commercial aerospace and electric utility markets in 2022 – more runway
  - Record orders and year-end backlog
- > Plan to continue to supplement growth with small to mid-size M&A
  - Balance sheet and Management bandwidth to make this happen
- > ROIC Focus Management and Shareholder interests aligned





# FINANCIAL HIGHLIGHTS



### FY'22 Segment Performance (\$ in Millions)

	Net Sales	EBIT <sup>(1)</sup>	(2) Adjustments	D&A	EBITDA As Adjusted	EBITDA Margin
A&D	\$ 351.4	\$ 68.4	\$ 0.6	\$ 11.1	\$ 80.1	22.8%
USG	278.4	57.6	0.5	13.9	72.0	25.9%
Test	227.7	32.6	-	5.4	38.0	16.7%
Segment Totals	857.5	158.6	1.1	30.4	190.1	22.2%
Corporate	-	(47.3)	0.6	17.9	(28.8)	
Continuing Ops	857.5	111.3	1.7	48.3	161.3	18.8%
EBITDA Reconciliation						
Less D&A					(48.3)	
Less Interest					(4.9)	
Less Income Tax					(24.5)	
Net Earnings – As Adjusted					\$ 83.6	9.7%

(1) See page F-26 in the 2022 Form 10-K

(2) Excludes \$0.6 million of acquisition and management transition costs at Corporate, \$0.5 million of Altanova acquisition inventory step-up and NRG severance charges within the USG segment, and \$0.6 million of NEco acquisition inventory step-up and VACCO severance charges within the A&D segment.



#### Financial Highlights (\$ in Millions)

	2018	2019	2020	2021	2022
Net Debt	\$190	\$223	\$10	\$98	\$55
Leverage Ratio	1.7X	1.7X	.5X	1.0X	.8X
Debt-to-Capital	22%	26%	6%	13%	13%
Available Liquidity	\$484	\$519	\$728	\$587	\$589
Cash from Operating Activities <sup>(1)</sup>	\$84	\$101	\$109	\$123	\$135
FY 2022 Backlog <sup>(1)</sup>	Beginning Backlog	Orders	Sales	Ending Backlog	Book- to-Bill
<b>FY 2022 Backlog</b> <sup>(1)</sup> A&D	0 0	Orders 392.5	Sales 351.4	0	
	Backlog			Backlog	to-Bill
A&D	Backlog 367.2	392.5	351.4	Backlog 408.3	to-Bill 1.12

1) Excludes Discontinued Operations - Technical Packaging Segment sale completed 12/31/19.



### **Discontinued Operations and Adjustments to Earnings Detail**

Technical Packaging (Divested 12/31/19)	2018	2019	2020	2021	2022
Sales (\$ in Millions)	87.9	86.9	-	-	-
Ending Backlog (\$ in Millions)	15.5	13.0	-	-	-
EPS – As Adjusted	\$0.23	\$0.13	\$2.93 <sup>(1)</sup>	-	-
Segment EBITDA – As Adjusted Cont Ops	2018	2019	2020	2021	2022
EBITDA	134.5	150.6	84.5	125.0	159.6
Corporate Costs	24.0	26.8	25.0	25.2	28.8
Discrete Adjustments	4.8	0.6	48.9	6.0	1.7
Disc Ops – Technical Packaging	(10.9)	(10.1)	-	-	-
Segment EBITDA – As Adjusted Continuing Ops	152.4	167.9	158.4	156.2	190.1
EPS – As Adjusted Continuing Ops	2018	2019	2020	2021	2022
GAAP EPS	\$3.54	\$3.10	\$3.81	\$2.42	\$3.16
Discrete Adjustments	\$0.17	(\$0.02)	\$0.24	\$0.17	\$0.05
Pension Plan Termination	-	-	1.55	-	-
U.S. Tax Reform	(\$0.94)	-	-	-	-
Disc Ops – Technical Packaging	(\$0.23)	(\$0.13)	(\$2.93) <sup>(1)</sup>	-	-
EPS – As Adjusted Continuing Operations	\$2.54	\$2.95	\$2.67	\$2.59	\$3.21



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