BUCHER
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CONSOLIDATED MECHANICAL FEEDERS

STANDARDIZED & SIMPLIFIED

- Wider operating range using standard components.
- One plunger mechanism for both series of feeders.
- Reduced maintenance costs due to reduction in parts inventory.
- Standardization on latest model and design components.

EMHART has consolidated its mechanical feeder systems. Combinations of mechanisms and related components have been reduced while the range of possible tonnage and applications has been preserved.

This consolidation has led to the creation of two types of mechanical feeder systems: the 81 Feeder for small ware, and the 503/515 Feeder for large ware.

New Feeder Series	Former Feeder Series
81 Feeder, Small (5-75 USTPD)	81, 144 and 194 Feeders
503/515 Feeder, Large (50-150 USTPD)	503 and 515 Feeders

FEEDER SPECIFICATIONS

Mechanical Feeders	Specification	Drawing Group
81 Feeder Master List 81-D-465 (Use Sales Questionnaire 81-465-M)	5 in. Equip. SG	1
	5 in. Equip. 3 in. DG	2
	7 in. Equip. SG	3
	7 in. Equip. 3 in. DG	4
	7 in. Equip. 4-3/8 in. DG	5
	5 in. Equip. H28	6
	8 in. Equip. 3 in. TG	7
503/515 Feeder Master List 503-D-250 (Use Sales Questionnaire 503-250-M)	7 in. Equip. SG 503 Spout	1
	7 in. Equip. 4-3/8 in. DG 503 Spout	2
	10 in. Equip. SG 503 Spout	3
	10 in. Equip. 4-3/8 in. DG 503 Spout	4
	10 in. Equip. 5 in. DG 503 Spout	5
	10 in. Equip. 3 in. TG 503 Spout	6
	10 in. Equip. SG 515 Spout	7
	10 in. Equip. 4-3/8 in. DG 515 Spout	8
	10 in. Equip. 5 in. DG 515 Spout	9
	10 in. Equip. 3 in. TG 515 Spout	10

EXPLANATION OF FEEDER IMPROVEMENTS

The Consolidated Feeders use standardized components for a wider operating range. This reduces the customer's spare parts inventory, simplifies repair and replacement procedures, and reduces long term maintenance costs. Further simplification is achieved through the use of a single plunger mechanism for both series of feeder, with similar benefits. The standardization of the feeder components makes use of the latest model designs to optimze performance.

The Component Breakdown on the following page lists Shear and Tube designations for the Consolidated Mechanical Feeders. Please note these specifications.

COMPONENT BREAKDOWN

	Major Components	81 Feeder	503/515 Feeder
Tonnage Pull		5-75 TPD	20-150 TPD
Equipment Size		5 in. Orifice Equip. SG & 3 in. DG 7 in. Orifice Equip. SG, 3 in. DG and 4-3/8 in. DG 8 in. Orifice Equip. 3 in. TG	7 in. Orifice Equip. SG and 4-3/8 in. DG 10 in. Orifice Equip. SG, 4-3/8 in. DG, 5 in. DG and 3 in. TG
Equalizing Section	Steel Casing Refractory Hoist Refractory transition channel sizes Front Plates	46 in. Or 62 in. Wide 510-D-9 Hoist and Support 16 in. X 14 in. & 26 in. X 14 in. (46 in. Wide Case) 26 in. X 18 in. (46 in. Case) 36 in. X 18 in. (62 in, Wide Case) Front plate to suit refractory size (4 plates)	62 in., 72 in. and 81 in. Wide 510-D-9-Hoist and Support 36 in. X 22 in. (62 in. Wide Case) 42 in. X 22 in. & 42 in. X 24 in. (72 in. Wide Case) 48 in. X 24 in. (81 in. Wide Case) Front plates to suit refractory size (4 plates)
Spout Casing	Cast Iron Casing (3 Total Casings) Spout Refractory Orifice Equipment Spout Covers	81-D-260 Standard and Deep (2 Casings) 14 in. and 18 in. Wide Spout Refractory 5 in., 7 in. and 8 in. Orifice Equipment Sizes Standard Insulation Covers for 5 in. - 8 in. Tubes	503-D-25 Standard (add spacer for 515 deep)(1 Casing) 22 in. and 24 in. Wide Spout Refractory 7 in. and 10 in. Orifice Equip. Sizes Standard Insulation Covers for 7 in. - 11 in. Tubes
Plunger Mechanism	Basic Mechanism Mech. Box & Frame Plunger Linkage Plunger Chuck Plunger Carrier Drive Mechanism	503-D-210 Basic Feeder Mechanism 503-D-321 Mechanism Box 503-D-323 7 in. Stroke as Standard 503-D-57 Plunger Chuck 81-D-609 Plunger Carrier 503-D-126 Drive Components for 191-D-7495 Reliance Drive	503-D-210 Basic Feeder Mechanism 503-D-321 Mechanism Box 503-D-323 7 in. Stroke as Standard 503-D-57 Plunger Chuck 81-D-85 Plunger Carrier 503-D-126 Drive Components for 191-D-7495 Reliance Drive

COMPONENT BREAKDOWN, CONT'D

	Major Components	81 Feeder	503/515 Feeder
Tube Mechanism	Basic Tube M Mech.	555-D-55 Gear Driven Tube Mechanism 194-D-131 Gear Driven Tube Mechanism	555-D-55 Gear Driven Tube Mechanism 503-D-127 Gear Driven Tube Mechanism
	Tube Quick Release	555-D-1 Self Centering Type (5 in. -8 in. Dia.) 194-D-159 Self Centering Type (5 in. -8 in. Dia.)	555-D-254 Self Centering Type (11 in.) 555-D-1- Self Centering Type (7 in. -10 in. Dia. Tubes)
	Refractory Tube Size	5 in. -8 in. Tube Refractory	7-11 in. Tube Refractory
	Tube Height Mech.	555-D-3 Height Adjusting Mechanism 194-D-134 Height Adjusting Mechanism (Manual or Electric)	555-D-3 Height Adjusting Mechanism (7 in. -11 in. Dia. Tubes) 194-D-134 Height Adjusting Mechanism (Electric)
	Tube Height Control	555-D-201 Control	555-D-201 Control
Shear Mechanism	Servo Shear	565-D-1 Servo Shear Mechanism	565-D-1 Servo Shear Mechanism
	Arcuate Shear	503-D-202 Arcuate Shear Mechanism	503-D-202 Arcuate Shear Mechanism
	Auto Retractor	81-D-370 Automatic Shear Retractor	81-D-370 Automatic Shear Retractor
	Shear Spring	503-D-333 Shear Air Spring 81-D-457 Mechanical Spring (H-28 and Press Application)	503-D-333 Shear Air Spring

For further information, contact your EMHART GLASS representative