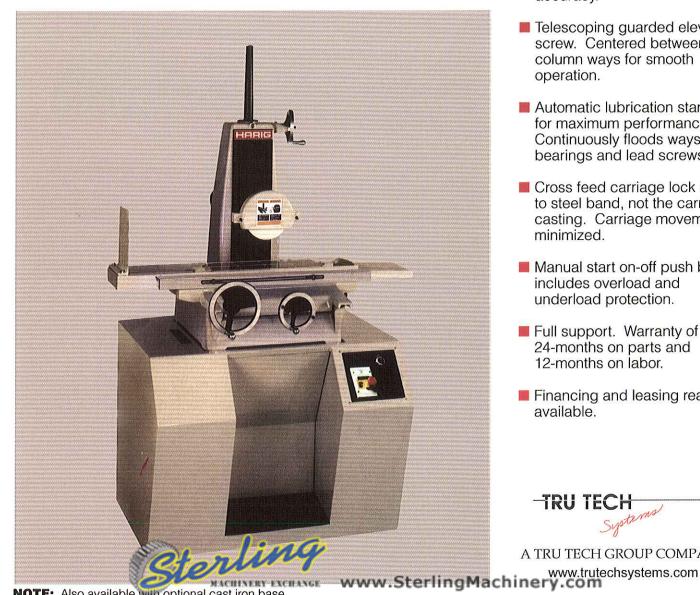


HARIG® 612 • 618 **Hand Feed Surface Grinders**

- Rugged Construction
- **Hand Scraped** Ways
- **Long Life** Accuracy
- **Made in the** U.S.A.

- Rugged construction. Long life accuracy. One-piece cast column, heavily ribbed for rigidity. All castings are 30,000 psi graphitic iron to resist deflection under load.
- Hand scraped cast iron ways standard. Tool steel, chrome plated or ceramic filled Teflon® ways are optional.
- Table and carriage castings cover ways even when table is fully extended.
- Temperature compensating spindle housing and removable 3 in. diameter cartridge-type 1-1/2 HP spindle with preloaded Class 7 duplex bearings.
- Choice of table drive. Harig® 612 and 618 Hand Feed Surface Grinders can be ordered with rack and pinion or cable drive.
- Hardened and ground screws. Assure long life and consistent accuracy.
- Telescoping guarded elevating screw. Centered between column ways for smooth operation.
- Automatic lubrication standard for maximum performance. Continuously floods ways, bearings and lead screws.
- Cross feed carriage lock clamps to steel band, not the carriage casting. Carriage movement is minimized
- Manual start on-off push button includes overload and underload protection.
- Full support. Warranty of 24-months on parts and 12-months on labor.
- Financing and leasing readily available.



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NOTE: Also available with optional cast iron base.

HARIG® 612 • 618 Hand Feed Surface Grinders 6 x 12 in. or 6 x 18 in. platen

Long life accuracy

1	lar	ig	* Hand	Feed	Machine	S	pecif	icat	ions

Longitudinal travel Cross feed travel Vertical working height (under 7" wheel) Platen work area Grinding wheel furnished Grinding wheel maximum capacity Elevating handwheel grad. Cross feed handwheel grad. Spindle motor Spindle speed Floor area cabinet Floor area operating space Net weight of machine Weight, domestic crated Weight, export boxed

Export box dimensions Note: Specifications subject to change without notice.

12-3/4 in. (324 mm) 6-3/4 in. (171 mm) 12 in. (305 mm) 6 x 12 in. (152 x 305 mm) 7 x 1/2 x 1-1/4 in. I.D. (178 x 13 x 32 mm) 8 x 1-1/4 x 1-1/4 in. I.D. (203 x32 x 32 mm) 0.0001 in. (0.0025 mm) 0.001 in (0.02 mm) 1-1/2 HP (1.125 kW) 3450 RPM @ 1-1/2 HP, 60Hz 21 x 25 in. (533 x 635 mm) 48 x 45 in. (1219 x 1143 mm) 850 lbs. (385 kg) 900 lbs. (408 kg) 1200 lbs. (544 kg)

618

20 in. (508 mm) 6-3/4 in. (171 mm) 11-3/4 in. (298 mm) 6 x 18 in. (152 x 457 mm) 7 x 1/2 x 1-1/4 in. I.D. (178 x 13 x 32 mm) 8 x 1-1/4 x 1-1/4 in. I.D. (203 x 32 x 32 mm) 0.0001 in. (0.0025 mm) 0.001 in. (0.02 mm) 1-1/2 HP (1.125 kW) 3450 RPM @ 1-1/2 HP, 60Hz 40 x 31 in. (1016 x 787 mm) 69 x 45 in. (1753 x 1143 mm) 1250 lbs. (567 kg) 1325 lbs. (601 kg) 1600 lbs. (726 kg) 76 x 55 x 45 in. (1.9 x 1.4 x 1.1 m)

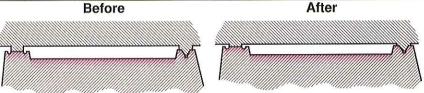
Harig® Features that prolong accurate machine life:

Vee and flat ways

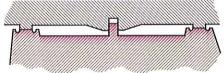
Wear-compensating vee and flat ways maintain a perfect fit for the life of your grinder for both cross and longitudinal travel. This is extremely important in shoulder and slot grinding. Diagram (A) illustrates how vee and flat way design compensates for wear and maintains perfect fit. Conventional ways shown in (B) illustrate how side clearance increases with wear permitting the table to "yaw" under side pressure.

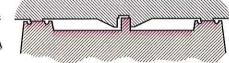
Before

76 x 45 x 45 in. (1.9 x 1.1 x 1.1 m)



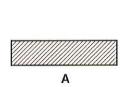
A - Harig® Vee and Flat Way Construction



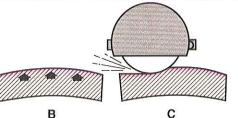


B - Conventional "Dresser Drawer" Way Construction

Hand scraped ways



(A) Harig hand scrapes cross. longitudinal and column ways for absolute flatness. (B) Grinding ways



cause heat expansion which bows the way surface toward the wheel. (C) The crest of this bow is ground off. (D)

When the casting cools, there is a slight depression. (E) Hand scraping brings ways back to absolute flatness.



Harig Products, Inc. *** Big Timber Road ** Elgin, IL 60123 • (847) 695-1000 • Fax: (847) 695-1043

Safety Notice: Harig Products, Inc. provides protective devices for the safe use of this equipment. Operation of this equipment may cause injury if the protective devices are provided with all machines offered by Hang Products Inc. and recommender safe grace improcedings must be adhered to. removed. A comprehensive safety manu



HARIG[®] 612 & 618 Ball Way Surface Grinders

- Finger Tip Operation
- Hand Scraped Ways
- Lasting Performance Accuracy
- Made in the U.S.A.
- Rigid construction. One piece cast column construction, heavily ribbed 30,000 psi graphitic iron to resist deflection under load.
- Smooth-gliding, cable-driven table using precision ball bearings to evenly distribute workloads.
- New crossfeed drive features positive lubrication and easy backlash adjustments.

- Cast iron base extended to the floor. Three point leveling system.
- Automatic lubrication standard. Harig's unique automatic FLO- CLEAN LUBRICATION SYSTEM continuously floods filtered lubrication to the column, carriage and table ball ways.
- Temperature compensating spindle housing for consistent accuracy. The direct drive 3-inch-diameter spindle features Class 7 preloaded duplex bearings.
- The Harig Ball Way has hardened balls accurate to 5 millionths. Rollers are generally limited to 25 millionths accuracy. Balls deflect dirt aside, unlike rollers which may roll over it, causing finish and surface accuracy variations.
- Lock up longitudinal table travel by flipping lever. Turn a thumb screw to lock cross feed travel.
- Manual start on-off push button includes overload and underload protection.
- Full support. Warranty of 24 months on parts and 12 months on labor.
- Financing and leasing readily available.

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www.SterlingMachinery.com



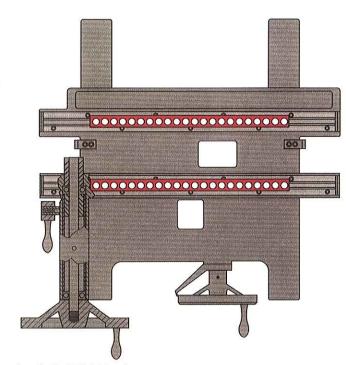
HARIG® 612 618 Ball Way Surface Grinder Specifications

6 x 12 in. or 6 x 18 in. platen Performance accuracy that lasts

Specifications	612	618

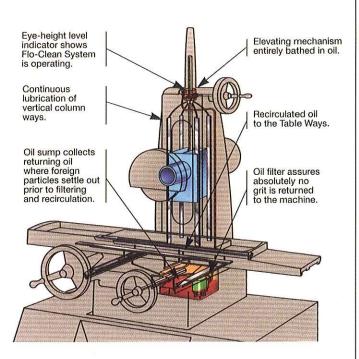
Cable longitudinal table drive	Standard	Standard
Longitudinal travel	123/4 in. (324 mm)	20 in. (508 mm)
Cross feed travel	6 ³ / ₄ In. (171 mm)	6 ³ / ₄ In. (171 mm)
Vertical working height (under 7 in. wheel)	12 in. (305 mm)	113/4 in. (298 mm)
Platen work area	6 x 12 in. (152 x 305 mm)	6 x 18in. (152 x 457 mm)
Grinding wheel furnished	7 x ¹ / ₂ x 1 ¹ / ₄ in. I.D. (178 x 13 x 32 mm)	7 x ¹ / ₂ x 1 ¹ / ₄ in. I.D. (178 x 13 x 32 mm)
Grinding wheel maximum capacity	8 x 1 ¹ / ₄ x 1 ¹ / ₄ in. I.D. (203 x 32 x 32mm)	8 x 1 ¹ / ₄ x 1 ¹ / ₄ in. I.D. (203 x 32 x 32mm)
Elevating handwheel grad.	0.0001 in. (0.0025 mm)	0.0001 in. (0.0025 mm)
Cross feed handwheel grad.	0.001 in. (0.02 mm)	0.001 in. (0 02 mm)
Spindle motor	11/2 HP (1.125 kW)	1 ¹ / ₂ HP (1.125 kW)
Spindle speed	3450 RPM @ 11/2 HP, 60Hz	3450 RPM @ 11/2 HP, 60Hz
Floor area cabinet	29 x 29 in. (737 x 737 mm)	29 x 29 in. (737 x 737 mm)
Floor area operating space	48 x 45 in. (1219 x 1143 mm)	69 x 45 in. (1753 x 1143 mm)
Net weight of machine	1150 lbs. (522 kg)	1350 lbs. (599 kg)
Weight, domestic crated	1330 lbs. (603 kg)	1530 lbs. (694 kg)
Weight, export boxed	1450 lbs. (658 kg)	1650 lbs. (748 kg)
Export box dimensions	76 x 55 x 45 in.(1.9 x 1.4 x 1.1 m)	76 x 55 x 45in.(1.9 x 1.4 x 1.1 m)

NOTE: Specifications Subject to Change Without Notice.



Longitudinal Table Travel: Harig's smooth cable drive Ball Way design is protected from contamination with front and rear seals.

Automatic Lubrication System: Harig's exclusive Flo-Clean Lubrication System continuously floods ways, bearings and leadscrews with recirculated filtered oil.





Harig Products, Inc. 1875 Big Timber Road. Elgin JL 60123 6 (847) 695-1000 Eax: (847) 695-1043



HARIG® 612-618 **Hydraulic Surface Grinders**

- **Effortless** Grinding
- **Quality Construction**
- **Hand Scraped** Ways
- Made in the
- Power longitudinal feed for effortless grinding. Low pressure, no-surge hydraulic system for powered longitudinal table travel. Built-in "hydraulic cushions" for smooth table reversal. Safety interlock keeps handwheel from turning when power feeding.
- Front-mounted speed control for powered longitudinal feed. Table speed infinitely variable from 3 fpm to 70 fpm.
- Cross feed carriage lock clamps to steel band, not the carriage casting. Minimizes carriage movement.
- Longitudinal handwheel disengages rack and pinion to prevent handwheel rotation when power feed is operating.
- Cartridge-type 1 1/2HP spindle with preloaded Class 7 duplex bearings. Temperature compensating spindle housing.
- Quality construction. One-piece cast column. Quality construction 30,000 psi graphitic gray iron casting to resist deflection under load.
- Automatic lubrication for long life accuracy. Harig's exclusive Flo-Clean Lubrication System, unlike most grinders, delivers more than an occasional shot of oil to the ways, bearings and lead screws. It continuously floods ways, bearings and lead screws with recirculated filtered oil.
- Manual start on-off push buttons include overload and underload protection.
- Full support. One year limited warranty-in writing-on all components.
- Financing and leasing readily available.



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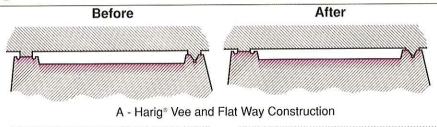
HARIG® Hydraulic Grinder 6"x12" or 6"x18" platen Power longitudinal feed

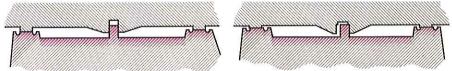
Harig® Hydraulic Machine Specifications	612	618 20in. (508mm)	
Longitudinal travel	12-3/4in. (324mm)		
Longitudinal table speed	3 fpm-70 fpm (.9m/min21.3m/.min.)	3 fpm-70 fpm (.9m/min21.3m/min.)	
Cross feed travel	6-3/4in. (171mm)	6-3/4in. (171mm)	
Vertical working height (under 7" wheel)	12in. (305mm)	11-3/4in. (298mm)	
Platen work area	6x12in. (152x305mm)	6x18in. (152x457mm)	
Grinding wheel furnished	7x1/2x1-1/4in. I.D. (178x13x32mm)	7x1/2x1-1/4in. I.D.(178x13x32mm)	
Grinding wheel maximum capacity	8x1-1/4x1-1/4in. I.D. (203x32x32mm)	8x1-1/4x1-1/4in. I.D. (203x32x32mm)	
Elevating handwheel grad.	.0001in. (.0025mm)	.0001in. (.0025mm)	
Cross feed handwheel grad.	.001in. (.02mm)	.001in. (.02mm)	
Spindle motor	1-1/2 HP (1.125kW)	1-1/2 HP (1.125kW)	
Spindle speed	3450 RPM @ 1-1/2 HP, 60 Hz	3450 RPM @ 1-1/2 HP, 60Hz	
Floor area cabinet	21x25in. (533x635mm)	40x31in. (1016x787mm)	
Floor area operating space	51x45in. (1295x1143mm)	72x45in. (1829x1143mm)	
Net weight of machine	985lbs. (447kg)	1360lbs (617kg)	
Weight, domestic crated	1035lbs. (469kg)	1435lbs. (651kg)	
Weight, export boxed	1335lbs. (605kg)	1710lbs. (776kg)	
Export box dimensions	76x55x45in. (1.9x1.4x1.1m)	76x55x45in. (1.9x1.4x1.1m)	

Harig® Features that prolong accurate machine life:

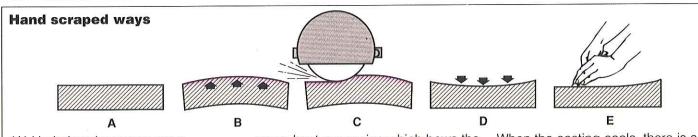
Vee and flat ways

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