

THE NEXT GEN OF TILLAGE



SALFORD HALO



CONTENTS

Table of contents.....	02
Who we are	03
About HALO	04
Common Features	05
HALO HSD	06
HALO AerWay	10
Agronomy	14
Research & Development	15
HALO HSD Model Specifications	16
HALO AerWay Model Specifications.....	18



SALFORD

MISSION

WE BUILD MACHINERY THAT FEEDS THE WORLD.

VISION

TO PRODUCE HIGH-QUALITY, DURABLE FARM EQUIPMENT WITH A PERFORMANCE ADVANTAGE

VALUES

INTEGRITY
OUR PEOPLE
CUSTOMER FOCUS
INNOVATION
SUSTAINABILITY
ENJOYING THE JOURNEY



‘SALFORD HALO IS BUILT ON A LEGACY OF INNOVATION’

Geof Gray, President Salford Group Inc.

“HALO is Salford’s next generation of tillage machine; A ground up redesign of frame technology that incorporates new combinations of ground engaging equipment, narrow transport, and single point adjustments for faster, easier field setting.

HALO takes advantage of the latest in heavy equipment technology to advance Salford’s legacy for durability and performance, employing maintenance free components and the latest in hydraulics and seal technology.”

- Geof Gray, President of Salford Group Inc.

ABOUT HALO

HALO is Salford's new high-speed tillage platform. One frame design engineered to carry multiple ground engaging tillage modules.

Salford customers challenged us to create a close coupled tillage implement designed for high speed and a narrow transport that was built with Salford durability and ease of use.

Salford's passion for engineering and product development is strong and we

saw an opportunity to create a whole new product line.

The HALO is a close coupled frame that carries front and rear tillage modules followed by a selection of rear finishing attachments. The HALO's forward folding frame is engineered for narrow road transport for safer and easier travel to, from and between fields.

HALO has 2 distinct tillage options, the **HALO HSD**, high speed disc, and the **HALO AerWay**, aeration vertical tillage tool. However, that is only the beginning! More HALO tillage modules are being developed and new finishing options and attachments are being tested.



REAR FINISHING OPTIONS

Salford is renowned for their tillage equipment finishing tools. HALO finishing options vary by model.



600/50R22.5 TIRES

Provide maximum floatation in the field and make for safe transport on the way to the field and between farms.



EASY TO SET

Set your operating depth and finishing system pressure in seconds. HALO uses simple single point hydraulic controls for fast, easy setup.

COMMON FEATURES

HEAVY FRAME FOR MULTIPLE GROUND ENGAGING OPTIONS

HALO's rectangular main frame is 6" by 6" tubular steel, 3/8" thick. All frame members are capped for maximum durability and longevity. The front and rear mainframe bars are designed to carry multiple different tillage modules. HALO's tongue is 6" by 8" on 2-piece frame models, and 6" by 10" on 3-piece frame models.



CONSTANT FLOW HYDRAULIC WING DOWN PRESSURE

HALO's wings can be run with active down pressure. This keeps the machine operating level from side to side and ensures wings stay engaged in tough conditions.



SINGLE POINT HYDRAULIC CONTROLS

HALO uses single point depth control for the machines operating depth, making for fast, easy adjustments to the tillage action. The rear finishing system also uses single point hydraulic control to regulate down pressure. This allows operators to quickly adapt to field conditions.



MAIN FRAME PITCH INDICATOR

HALO's mainframe has a large pitch indicator that can be easily seen from the cab.



COLOR CODED OPERATOR CONVENIENCE CENTER

Salford implements feature a color coded operator's convenience center that manages and protects the hydraulic hoses and lighting connection. The operator's manual is also housed here in a weather proof container. Hydraulic hose grips are color coded to make for fast, easy connection to the tractor.



HALO HSD





The HALO HSD is engineered for level operation at speed and with the clearance needed for tough conditions.

HALO HSD's individually mounted blades allow for maximum residue and soil flow, while the angled blade mounting arms are designed to keep the HALO HSD at depth in hard ground. HALO HSD has advanced hydraulic systems that are simple to operate.

Fore/aft levelling, active down pressure, single point depth control, and finishing systems all have hydraulic adjustment that are easy to use.

In the summer of 2020 the mid-west US faced a devastating derecho storm. The high speed winds from the derecho spawned an outbreak of low-class tornadoes. In addition, certain areas reported torrential rain and large hail.

This corn in Iowa was downed by the storm and the producer was not able to harvest their crop. The HALO HSD was able to clear the high volume of corn in the field, size the residue, and level the field. (Image below)

HALO HSD - Derecho Storm

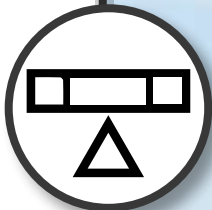


FEATURES & BENEFITS



HIGH SPEED & HIGHLY DURABLE

High Clearance: Independently mounted blades allow for excellent soil and residue flow through the machine. Excellent obstacle protection: Independently mounted blades with rubber torsion suspension are capable of 7.5" of travel for obstacle protection in rough and rocky conditions. Each 22" blade faces rocks and obstacles on their own which lessens the load put on the HALO HSD frame.



SUPERIOR LEVELING

HALO HSD's superior leveling power starts with blades on a compound angle which helps the high speed disc's blades bite into the soil and stay at depth. The option to run the wings with active down pressure and in neutral on the fore/aft hydraulic circuit keeps the HALO level from front to back and side to side, even in tough, uneven ground. Last but not least Salford's finishing options are industry leaders for leveling and durability.



EASY TO OPERATE

The HALO HSD is simple to set! Single point depth control, hydraulic fore/aft leveling and a single point control for setting pressure on the finishing tool.

The operator convenience station keeps implement connections protected, organized and at the operator's finger tips. The color coded hose grips take out the guess work when connecting Salford implements to the tractor.

The HALO's narrow forward fold design makes the machine safe and easy to transport.



LOW MAINTENANCE DESIGN

Durable, sealed blade hubs make for much less maintenance on the HALO. However, the blade hubs can be rebuilt to save cost on seasonal maintenance.

The HALO has three sets easily accessible grease points, the main frame hinges, axles and roller frames.



HALO *AerWay*



HALO AerWay combines Salford's industry leading AerWay deep tine aerators with Salford's high clearance independent blade mounts, and finishing systems for the best in soil aeration and residue management.

This unique machine is designed to run up to 8 inches deep with AerWay's unique forged Shattertine. The Shattertine's are spaced 10" apart to cut through residue and fracture the soil vertically as well as horizontally, relieving compaction. The tine itself is shaped to bite into the soil and fracture the ground, improving air and water infiltration. The gang angle settings allow the operator to quickly increase or decrease how aggressive the operation is. The HALO AerWay's wavy coulter blades run on either side of the tines, further sizing residue and beginning to close the pockets left by the Shattertines.

The coulter angle is also adjustable, allowing for straight residue cutting or more aggressive levelling power.

The HALO AerWay is followed by double 14 inch rollers controlled by a single point hydraulic pressure system. The new level linkage helps follow ground contours and has a tighter design with fewer parts for easy maintenance and narrow transport.



FEATURES & BENEFITS



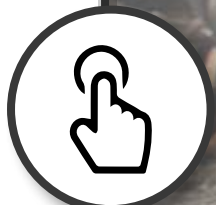
HIGH SPEED & HIGHLY DURABLE

Excellent obstacle protection. HALO AerWay's front gang of Shattertines is protected by a C-Flex hanger. The second row of individually mounted blades have rubber torsion suspension that are capable of up to 7.5 inches of vertical travel for obstacle protection in rough and rocky conditions. Each blade faces rocks and obstacles independently which lessens the load put on the HALO AerWay frame.



TRUE VERTICAL TILLAGE

The perfect pair of Shattertine soil aeration followed by independently mounted 13 wave coulters. The Shattertines begin to size residue while they penetrate up to 8 inches deep, loosening the soil and fracturing the ground around and below the tines. The pockets created by the tines increase soil's air and moisture storage capacity, promoting deeper root development and allowing fertilizer to disperse in the root zone. The Shattertines are followed by the 13 wave coulters, which further resize crop residue and begin to level and mellow the pockets created by the tines. Finally the rolling baskets finish the job, pinning residue, sizing soil clods and leveling the surface to prepare a seedbed.



EASY TO OPERATE

The HALO AerWay is simple to set! Single point depth control, hydraulic fore/aft leveling and a single point control for setting pressure on the finishing tool. The operator convenience station keeps implement connections protected, organized and at the operator's finger tips. The color coded hose grips take out the guess work when connecting Salford implements to the tractor. The HALO's narrow forward fold design makes the machine safe and easy to transport.



LOW MAINTENANCE DESIGN

The heavy duty trunnion bearings on the Shattertine gang are maintenance free. Durable, sealed blade hubs make for much less maintenance on the HALO. The blade hubs can be rebuilt to ensure long life hubs. The HALO has three sets easily accessible grease points, the main frame hinges, axles and roller frames.

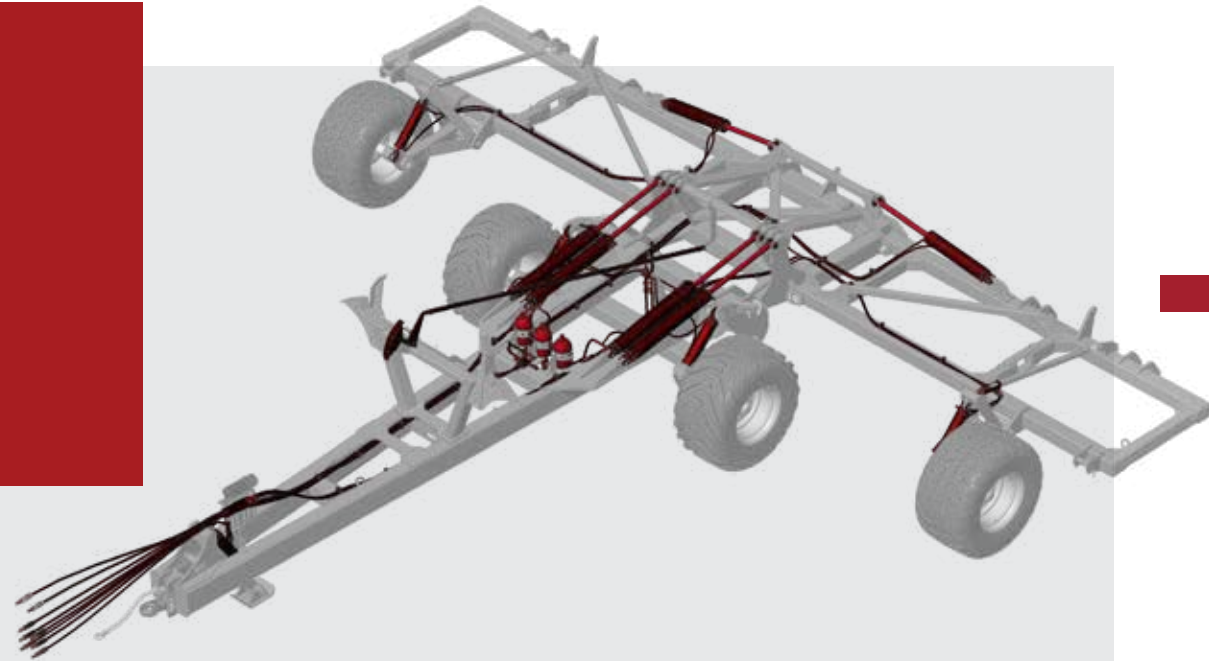


AGRONOMY



UNIFORM RESIDUE MANAGEMENT

HALO's ground engaging equipment and finishing systems condition residue by sizing and evenly distributing it. The prepared residue breaks down faster and helps planters and seed drills run quickly and efficiently. HALO models uniformly mix the soil and residue uniformly so that planters achieve good seed to soil contact.



IMPROVE GERMINATION & EMERGENCE

HALO is engineered for level operation in tough conditions and the hydraulic system is designed to prevent "hopping" in the field at high speeds, which is a common issue with similar frame designs. Keeping uniform depth helps planters and seed drills run smoothly at higher speeds and improves uniform germination and emergence.



SUPERIOR FINISH

Salford tillage equipment is renowned for their finishing systems. HALO offers a variety of finishing options and simple hydraulic pressure adjustment to quickly create the ideal field finish in almost any soil and residue conditions.

RESEARCH & DEVELOPMENT

HALO has undergone Salford's most rigorous product testing to date. The Halo has been field-tested over several years across 12 US States and 4 Canadian provinces. Confirming this tillage machine can withstand the challenging North American terrains where our customers will use this machine in.



While units were being tested in the field Salford engineers improved individual HALO components through extensive "torture" testing at Salford's R&D facility.

Among many tests HALO coulter arms and suspension were cycle tested for:

- side load forces
- obstacle clearance
- component fatigue



Salford's product development team ensured each model was subjected to various conditions; dry-hard ground, wet soil and frozen fields.

HALO blade hubs have ran over **4000** hours on Salford's test bench. In order to test the bearings and seals hubs were ran continuously submerged in mud and ran in dry abrasive soils. Test hubs were also frequently rebuilt to prove their overall longevity.

HALO models were tested in various residue conditions from high volume corn and vine crops, like peas, to fields that were already tilled.

HALO's finishing systems were independently cycle tested for bearing longevity and durability.



STANDARD FEATURES

- HP Requirements of 12-18 HP/FT depending on working depth.
- Working depth 3-5"
- Operating speed of 8.5 mph min up to 14 mph
- Front row blades on compound 14° open angle & 22" smooth low concavity blades
- Hydraulic fore/aft levelling
- Net 5" spacing; 10" spacing per row
- 4 piece rubber torsion suspension on coulter mounts
- Hydraulic wing down pressure / Accumulator protection on tilt
- Hydraulic single point depth control
- Hydraulic single point finishing tool pressure
- Rear row blades on compound 17° open angle & 22" notched low concavity blades
- Blade hubs: Double tapered roller bearing, multi-lip sealed, maintenance free, rebuildable

HALO HSD MODEL SPECS

MODEL SIZE	20 ft.	25 ft.	30 ft.	35 ft.	40 ft.
APPROX. WEIGHT (LBS.)	15,440	19,300	26,100	27,800	29,100
DRIVING INTERVAL	19 ft. 1 in.	24 ft. 1 in.	29 ft. 1 in.	34 ft. 1 in.	39 ft. 1 in.
CONCAVE BLADES	48	60	72	84	96
TRANSPORT HEIGHT ROLLERS EXTENDED ROLLERS RETRACTED	12 ft. 5 in. 13 ft. 6 in.	12 ft. 6 in. 13 ft. 7 in.	13 ft. 10 in. 14 ft. 11 in.	12 ft. 11 in. 14 ft. 0 in.	13 ft. 3 in. 14 ft. 4 in.
TRANSPORT WIDTH ROLLERS EXTENDED/ ROLLERS RETRACTED	11 ft. 8 in. 11 ft. 3 in.	11 ft. 8 in. 11 ft. 3 in.	13 ft. 4 in. 11 ft. 11 in.	13 ft. 4 in. 11 ft. 11 in.	13 ft. 4 in. 11 ft. 11 in.
FRAME SECTIONS	2		3		
MAINFRAME STRUCTURE	6 in. x 6 in. tubular steel		6 in. x 6 in. tubular steel		
HITCH STRUCTURE	6 in. x 8 in. tubular steel		6 in. x 10 in. tubular steel		
TIRES, MAINFRAME	600/50-22.5, 10 bolt hub		600/50-22.5, 10 bolt hub		
TIRES, WINGS	N/A		600/50-22.5, 10 bolt hub		
DRAWBAR HITCH	CAT 4		CAT 5		
JACK	8,000 lbs. manual jack		Hydraulic jack with manual ball valve		
HYDRAULIC REMOTE VALVES REQUIRED	4		5 (includes hydraulic jack)		

HALO HSD - FINISHING OPTIONS

Standard 23" round bar cage roller

AVAILABLE 2021 - Optional rubber packer roller with scraper system





HALO AerWay

MODEL SPECS

MODEL SIZE	20 ft.	25 ft.	30 ft.	35 ft. & 40 ft.
APPROX. WEIGHT (LBS.)	18,580	20,780	24,930	COMING SOON
DRIVING INTERVAL	20 ft.	25 ft.	30 ft.	
ROWS OF SHATTERTINES	24	30	36	
13 WAVE COULTERS	25	31	37	
TRANSPORT HEIGHT ROLLERS EXTENDED ROLLERS RETRACTED	12 ft. 7 in. 13 ft. 10 in.	12 ft. 9 in. 13 ft. 11 in.	13 ft. 11 in. 15 ft. 2 in.	
TRANSPORT WIDTH ROLLERS EXTENDED/ ROLLERS RETRACTED	12 ft. 2 in. 11 ft. 3 in.	12 ft. 2 in. 11 ft. 3 in.	13 ft. 10 in. 12 ft. 4 in.	
FRAME SECTIONS	2		3	
MAINFRAME STRUCTURE	6 in. x 6 in. tubular steel		6 in. x 6 in. tubular steel	
HITCH STRUCTURE	6 in. x 8 in. tubular steel		6 in. x 10 in. tubular steel	
TIRES, MAINFRAME	600/50-22.5, 10 bolt hub		600/50-22.5, 10 bolt hub	
TIRES, WINGS	N/A		600/50-22.5, 10 bolt hub	
DRAWBAR HITCH	CAT 4		CAT 5	
JACK	8,000 lbs. manual jack		Hydraulic jack with manual ball valve	
HYDRAULIC REMOTE VALVES REQUIRED	4		5 (includes hydraulic jack)	

HALO AerWay - FINISHING OPTIONS

Standard double 14" rollers on level linkage

STANDARD FEATURES

- HP Requirements of 10-16 HP/FT depending on working depth.
- Working depth up to 8" on tines, 4" on blades
- Operating speed of 8.5 mph min up to 12 mph
- Front row 8" AerWay Shattertine on manually adjustable angle - 2.5", 5" and 7.5"
- Rear row 13 wave straight blades on manually adjustable angle - 0°, -1.5° and 03°
- Hydraulic single point depth control
- C-Flex suspension on AerWay gangs, 4pc rubber torsion suspension on coulters
- Hydraulic single point finishing tool pressure
- Hydraulic fore/aft leveling with accumulator protection on tilt
- Sealed maintenance free Trunnion bearing on AerWay gangs; Multi-lip sealed, maintenance free re-buildable hubs on coulters
- Net 5" spacing; 10" spacing per row; 10" spacing center on tines, 10" spacing on blades (offset)

CONTACT US

See our full line of products and find your local dealer at salfordgroup.com
Osceola, Iowa • Cornelia, Georgia • Salford, Ontario • Elie, Manitoba • 1-866-442-1293

SALFORD



@salfordgroup



Products and specifications subject to change without notice and without liability therefore. Images may include optional equipment.
Salford® is a registered trademark of Salford Group Inc. Copyright© 2020 Salford Group Inc. 2020.10
10094522 - LITERATURE, SALFORD, HALO.