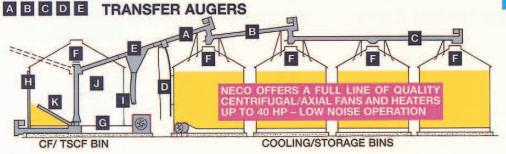
ACCESSORIES.



- Transfer Auger In-Line Sampler: With Spring-return Gate, 20' (6.1M) Plastic tube and 25' (7.6M) of Cable
- E 5' (1.5M) In-Line Screening Section for cleaning Corn (Maze): 4" or 6" (100 or 200mm) with 8' (2.5M) Tube/Auger, Diverter Boot, Connecting Shaft and

A Continuous-Flow Transfer Augers:

• For Circu-Flow the option of either a HD 4" (100mm) transfer auger system or a 6" (150mm) with oil-enclosed reducer drive.

Dual-Sweep Circu-Flow uses a direct drive 6" (150mm) transfer auger system.

Super-Flows or Twin-Sweep Super-Flows can use 6" (150mm) All-Purpose transfer augers.

· Commercial-Flow can use an 8" (150mm) All-Purpose transfer auger system.

B Secondary Transfer Augers:

Full line of secondary auger systems are available for all models, featuring flow-thru hopper inlets and adjustable support brackets.

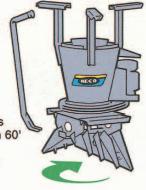
C Hanger Bearing Transfer Augers:

6" or 8" (150-200mm) hanger bearing transfer augers can be utilized for long spans across several bins.

Grain Spreaders

Easily adjusted from the bin top hatch with the provided Adjusting Tool.

Three Models available for bins from 18' through 60' diameter with capacities up to 6000 BPH.



ADJUSTABLE FLOW CONTROL GATES AND **DUAL PANS WITH ADJUSTABLE FINS**

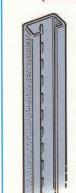
G Intermediate Floor Support Channels

These are required on all channel-locking floors when using rail & post systems or concrete block floor support systems.





H Bin Wall Stiffeners-REQUIRED (EXTERIOR WALL)

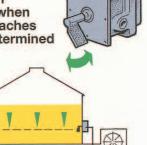


Flow patterns of grain set up by use of NECO Flow Systems causes extra stresses on the bin walls. To insure against possible bin wall collapse, stiffeners are recommended for full sidewall height. Consult with the bin manufacturer for their recommendations.

Pre-punched for 2-2/3 corrugation and are 93-1/4" (2.37M) tall

Bin Level Switch

Automatically shuts off burner when grain reaches a predetermined level.



Easy-Install Bin liners

SOLVE WET-WALL PROBLEMS THE EASY WAY WITH NECO'S REVOLUTIONARY PREPUNCHED SECTIONAL LINERS

24 GAUGE **GALVANIZED**



A further benefit of installing NECO Bin Liners is the reduced requirement of bin stiffeners. It is usually only necessary to use a short stiffener (48", 1.2M high) for each bin sheet around the bin (112.5"- 2.86M spacing).

WARNING ...



DO NOT ENTER BIN WHEN POWER IS SUPPLIED TO THE NECO CONTINUOUS-FLOW SYSTEM. DO NOT START MOTOR IF BELT AND PULLEY GUARD IS NOT PROPERLY SECURED IN PLACE. DO NOT MODIFY OR ALTER ANY NECO CONTINUOUS-FLOW SYSTEM OR USE IT IN ANY MANNER

NOT IN ACCORDANCE WITH THE INSTALLATION AND OPERATING INSTRUCTIONS.

IMPORTANT: FAILURE TO HEED THE ABOVE WARNINGS WILL RESULT IN SERIOUS INJURY OR DEATH.

NECO FLOW SYSTEMS HAVE A ONE YEAR.

NECO, Nebraska Engineering Co. A Division of GLOBAL Industries, Inc. 9364 N. 45th St. • Box 12277 • Omaha, NE 68152 IMITED WARRANTY. SEE YOUR DEALER FOR DETAILS.

1-800-367-6208 402-453-6912 • FAX 402-453-0471

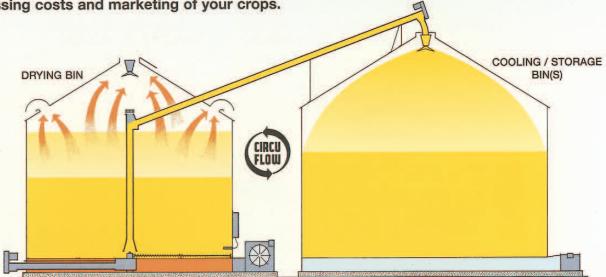
www.necousa.com • email: sales@necousa.com



A Division of GLOBAL Industries, Inc.

AUTOMATIC CONTINUOUS-FLOW IN-BIN GRAIN DRYING SYSTEMS

Dry and store your grain on your farm to save time and money. Dry your grain evenly, efficiently, and automatically with one of NECO's In-Bin Continuous-Flow Systems. Retain control of the processing costs and marketing of your crops.



FIVE DIFFERENT SYSTEMS AVAILABLE TO MEET YOUR INDIVIDUAL NEEDS:

CIRCU-FLOW

- Maximum Continuous-Flow Unloading Capacity of 200 BPH, (300 BPH with H.C. Sweep).*
- Sweep discharges grain up a 6" (150mm) center vertical, which allows for transfer or re-circulation of grain.
- Includes an under-floor unloading auger for the bin with options of 6"or 8" (150-200mm), horizontal or vertical discharge.

DUAL-SWEEP CIRCU-FLOW

- Maximum Continuous-Flow Unloading Capacity of 500 BPH*.
- Twin Sweeps discharge grain up an 8" (200mm) center vertical, which allows for transfer or re-circulation of grain.
- Includes an 8" (200mm) under-floor unloading auger for the bin with options of horizontal or vertical discharge.

SUPER-FLOW

- Maximum Continuous-Flow Unloading Capacity of 650 BPH*.
- A single large tapered sweep discharges the dried grain through under-floor auger.
- Includes an under-floor unloading auger with options of 6"or 8" (150-200mm), horizontal or vertical discharge.

TWIN-SWEEP SUPER-FLOW

- Maximum Continuous-Flow Unloading Capacity of 700 BPH*.
- Two tapered sweeps discharge the dried grain through the under-floor auger.
- Includes an under-floor unloading auger with options of 6"or 8" (150-200mm), horizontal or vertical discharge.

COMMERCIAL-FLOW

- Maximum Continuous-Flow Unloading Capacity of 1500 BPH*.
- Two large tapered sweeps discharge the dried grain through the under-floor auger.
- Includes an 8" (200mm) under-floor unloading auger with oil enclosed speed reducer drive.
- · Optional vertical discharge features a separate motor drive.

*Drying Capacity is determined by factors beyond the Flow System. Flow Systems aid in the drying process by removing the driest grain as soon as it is dry and by loosening the grain for better airflow. Other factors involved in determining the drying capacity: the amount of moisture to be removed, the temperature of the drying air, the bin diameter, the depth of grain, the size and type of fans, the kind of grain to be dried, the amount of foreign material in the grain, and the ambient conditions. Consult NECO for estimated drying capacities of a particular system.

NFS032602

FLOW DRYING

All the Flow Systems are based around a simple principle that by taking the dried grain out of the drying bin as soon as it is dried you can boost efficiency and capacity of grain drying while at the same time maintaining grain quality. This principle utilizes the basic drying principles of Counter Flow Drying and Dryeration to make a uniquely efficient system for drying grain.

Counter Flow Drying involves moving the grain though the dryer in a direction opposite to the flow of the heated air. The wet grain is deposited in the drying bin where it begins to be exposed to the drying air. As harvest continues more wet grain is added to the bin where the drying air flows through it removing moisture as the air's capacity to hold more moisture permits. The grain closest to the floor is dried and it is removed. The wetter, partially dried, grain from above moves closer to the drying floor where the hottest air has the ability to quickly finish drying this layer, after which it is removed...starting the whole process all over.

Dryeration involves taking the grain out of the dryer hot and putting it in another storage structure equipped with a fan that allows for cooling the grain slowly. This slow cooling raises the temperature of the air allowing it to have the capacity to remove more moisture. Because of the relatively low volume of airflow the air has the ability of removing another 1% to 2% moisture content out of the grain with relatively little cost. Since the last few points of moisture do not have to be removed in the dryer, this principle also increases the dryer's capacity. Since the last few points of moisture are the hardest to get out, efficiency is further enhanced.

All NECO Flow Systems utilize specially designed tapered sweeps that are capable of removing an even layer of grain off of the drying bin floor. As the dried grain above the drying floor reaches a certain depth, an automatic sensor starts the Flow System, which slices this layer of dried grain off the floor. This process further enhances the drying process because it loosens the grain above allowing more air to flow through the grain increasing drying capacity and efficiency.

The array of 5 different Flow Systems, along with different bin sizes and fan and heater combinations, give the customer an endless array of options to meet their individual requirements.

FEATURES FOR ALL NECO FLOW SYSTEMS...

DELUXE AUTOMATIC CONTROLS

Includes a thermostat based dryer control to automatically monitor and control the moisture content of the grain discharging from the NECO Flow System. It also contains all the motor starters and fuses for the Flow System motors as well as the transfer augers. Built into the control is a timer to allow the transfer auger motors to run for a time after the Flow System shuts down due to higher than desired grain moisture content. This allows the transfer augers to clean out, so they will not start under a load.



DRY-RITE DRYER CONTROL

The Dry-Rite is a unique computer drying control that, when used with the Deluxe Automatic Control Box, electronically measures the

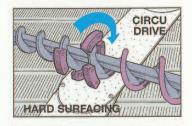


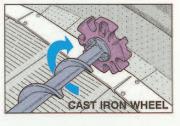
use with digital display that guides you every step. The Dry-Rite gives you a printout of the systems operation every time the moisture reading is taken.

TAPERED SWEEP AUGERS



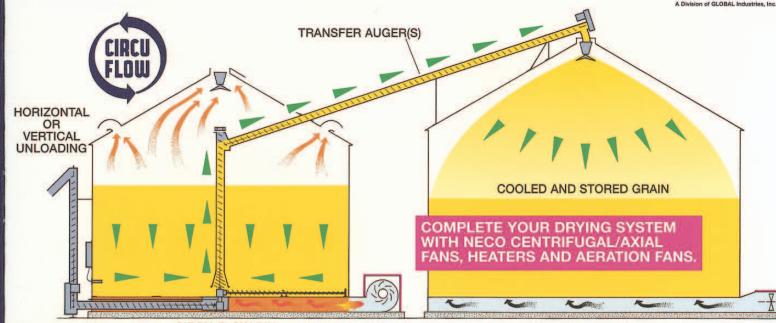
Each Tapered Sweep Auger is precision cut to a formula that matches the amount of grain it removes to the amount of grain that is stored in that portion of the bin. This allows the sweep to take an even slice of grain off the floor while maintaining the grain in a level manner within the bin. Evenness of grain removal is imperative to providing both uniform moisture content of the grain as well as maintaining levelness of the grain within the bin. Without the grain remaining level, distribution of airflow through the grain would be compromised. All tapered sweeps are mounted on 1-1/4" cold finished shafting for extra strength. They feature a special 6 bolt flexible coupling to attach them to the gearbox. This flex coupling takes stress off of the sweep as well as the gearboxes. The Circu-Drive is a U.S. Patented propelling mechanism that is located in the center of the sweeps (Optional on standard Circu-Flow). This extra propelling mechanism works in conjunction with the standard cast iron wheel on the end of the sweep. It allows the sweep to travel around the bin at a faster more uniform rate. Because the sweep travels faster it takes a thinner slice of grain off the floor. Also since the sweep travels around the bin more quickly it loosens the grain more quickly providing more airflow for faster drying. A special wear track is provided for both the outside cast iron wheel as well as the Circu-Drive to avoid damage to the drying floor and provide a level surface for the drive wheels to run on. All tapered sweeps are hard surfaced on the face of the augers for up to three times the life of a non-hard surfaced auger.





CIRCU-FLOW IN-BIN DRYING SYSTEM

THE ORIGINAL NECO FLOW SYSTEM



CIRCU-FLOW BIN

COOLING/STORAGE BIN

The Circu-Flow System features a single tapered sweep with a 6" (150mm) diameter center vertical auger. This center vertical auger allows for transfer of the grain up the center of the bin for conveyance to another bin for cooling or, on the last bin full, the transfer auger can be left off for re-circulation. This allows you to easily dry and store the last bin full of grain in the drying bin. The continuous-flow transfer capacity is approximately 200 BPH. However, with an optional High Capacity Tapered Sweep this capacity can be boosted to 300 BPH. The Circu-Flow, as do all NECO Flow Systems, features heavy-duty construction throughout.

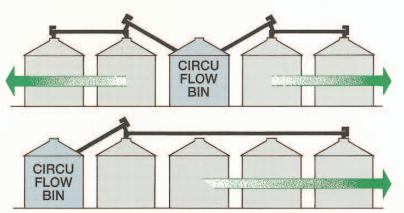
ADDED FEATURE Your drying bin ca

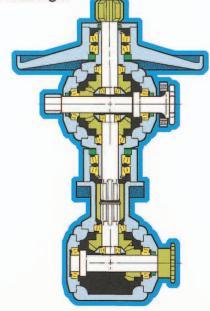
Your drying bin can be used for storage on the last bin load. When the Transfer Auger(s) is off, the grain is automatically re-circulated. Final moisture level is attained through the re-circulation basis.

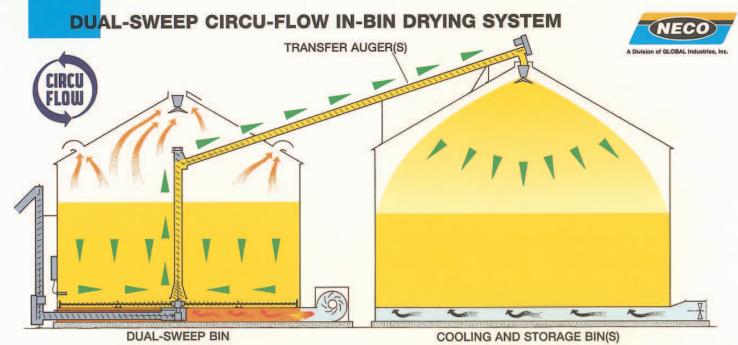
THE HEART OF THE SYSTEM is a pair of extra heavy gear boxes with forged hardened gears, stress-proof shafts, flexible couplings and grease fittings on all of the thrust bearings. Center Auger weight is supported by the extra large thrust bearings.



EASY TO EXPAND AS YOUR OPERATION GROWS:







The Dual-Sweep Circu-Flow system features two tapered sweep augers and an 8" (200mm) diameter center vertical auger. This center vertical auger allows for transfer of the grain up the center of the bin for conveyance to another bin for cooling, or on the last bin

full, the transfer auger can be left off for re-circulation. This allows you to easily dry and store the last bin full of grain in the drying bin.

The continuous-flow transfer capacity is approximately 500 BPH. The Dual-Sweep Circu-Flow, as do all NECO Flow Systems, features heavy-duty construction throughout.

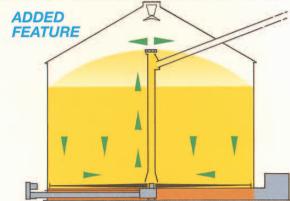
SIMPLE OPERATION because it is easy to use and it is automatic. A sensing probe located only 12" (300mm) above the floor monitors the drying temperature to activate the Automatic controls. Once the settings are made no further attention is required. Dried grain moisture levels will be uniform and within one or two points with the Automatic Controls and even more precise with the Dry-Rite System. Harvest can proceed at full speed and if grain is coming in faster than it can be dried, the whole bin can be used for holding. The Dual Sweep can operate around the clock if needed. Transfer of the grain to cooling bins is automatic without slowing the harvest.

LOW COST DRYING because the grain is pulled off the floor as soon as it is dry - no heat is wasted in over drying. Drying air is saturated when exhausted and the grain depth allows the air to absorb all the moisture it can possibly hold. Full saturation is essential for economical drying. The Dual-Sweep Circu-Flow operation keeps the grain loose to speed the drying process.

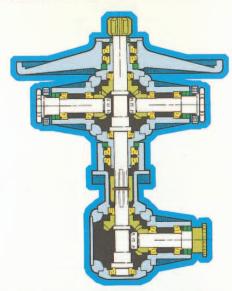
HIGH CAPACITY DRYING

Grain dries quickly with the Dual-Sweep because:

- 1. Two sweep augers more than doubles the continuous flow unloading capacity of the Original Circu-Flow.
- 2. Dual sweep operation keeps the grain loose so that air passes through it readily.
- 3. Drying air has a large area of exposure to grain.
- 4. Grain will be at the right depth to utilize all the drying capacity of the air.



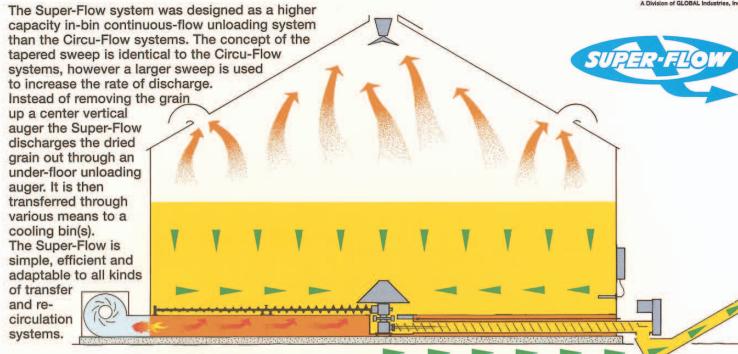
Your Dual-Sweep bin can be used for storage on the last bin load. When the Transfer Auger(s) are off, the grain is automatically re-circulated. Final moisture level is attained through the re-circulation basis.



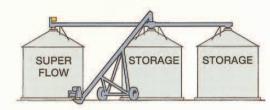
THE HEART OF THE SYSTEM is a pair of extra heavy gear boxes with forged hardened gears, stress-proof shafts, flexible couplings and grease fittings on all of the thrust bearings. This system is more refined and heavier than the Circu-Flow system.

SUPER-FLOW IN-BIN DRYING SYSTEM

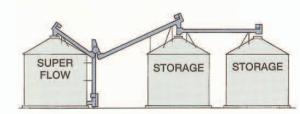




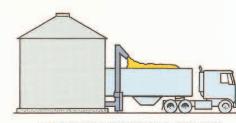
BY USING NECO MATERIAL HANDLING SYSTEMS, YOUR SUPER-FLOW CAN BE **USED FOR STORAGE AFTER THE OTHER** STORAGE IS FULL.



USING A PORTABLE AND OVERHEAD AUGER



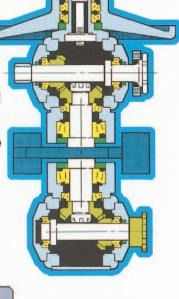
USING AN EXTRA TALL VERTICAL UNLOADER WITH OVERHEAD AUGERS

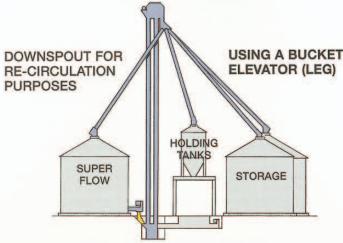


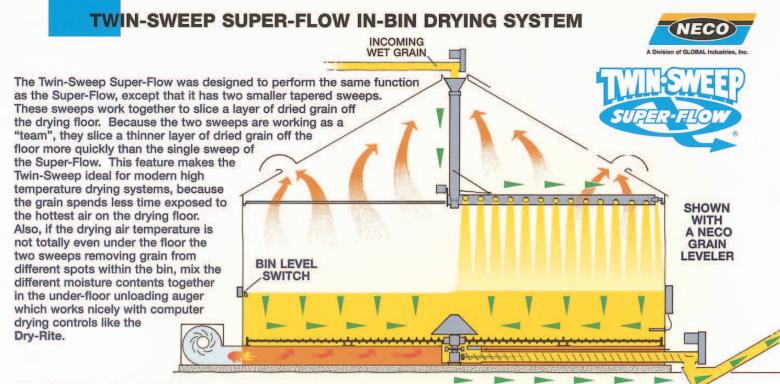
A 6" X 13" VERTICAL TRUCK LOADING AUGER IS AVAILABLE

THE HEART OF THE SYSTEM

is a pair of extra heavy gear boxes with forged hardened gears, stress-proof shafts, flexible couplings and grease fittings on all thrust bearings. Rotating Center Paddles to deliver the grain to the under-floor unloading auger.







The Ultimate Grain Drying System

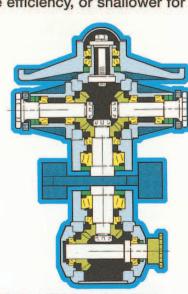
Now team up the NECO Leveler with a NECO Bottom Unloading In-Bin Continuous-Flow Drying System (Super-Flow, Twin-Sweep Super-Flow, or Commercial-Flow) to create the "Ultimate Drying System"!

Deeper grain depths with in-bin drying systems cause air restrictions that lower their drying capacity. The secret to high capacities of stand-alone continuous-flow dryers is a shallow layer of grain, thus obtaining a high volume of airflow per bushel of grain. With in-bin drying systems, operated at shallow depths, small variations in depth can result in uneven drying. Standard grain spreaders don't provide level enough spreading for use with shallow grain depths. Because of the exceptional leveling capabilities of the NECO Grain Leveler we can put a very shallow layer of grain in a bin that has both even depth and equal distribution of the fines. With this system combination you utilize a separate wet holding bin, just like with a stand-alone dryer. A Bin Level Switch, positioned on the drying bin wall, automatically triggers a conveyor to add more wet grain when the grain depth drops below a certain level, chosen by you, deeper for more efficiency, or shallower for more capacity.

The Ultimate Drying System Features:

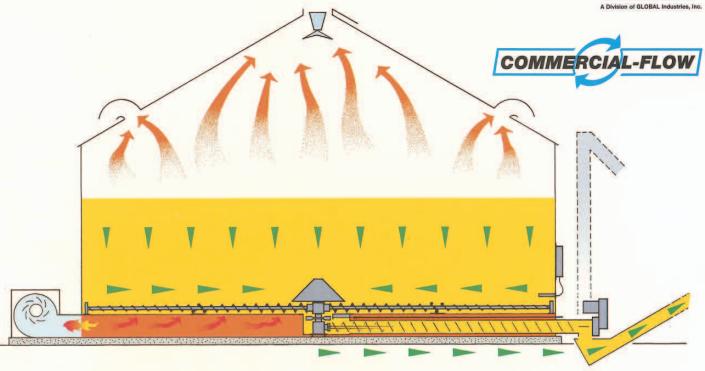
- No exhaust screens (like stand-alone dryers) to plug with fines reducing capacity and efficiency and increasing the risk of fires.
- You choose to set up the dryer for more efficiency or higher capacity.
- Utilize your continuous-flow dryer as a storage bin after harvest.
- Less moving parts.
- Ability to add fans and heaters at a later date for even greater capacity.
- Higher grain quality and test weights associated with bin dryers.
- Uses common parts that have been around for many years.
- Lower cost than comparable capacity continuous-flow dryers.
- Many times you can use existing structures to save even further costs.
- Totally automatic operation with optional controls.
- Simple, no complicated counter weights or winches to fool with.

extra-heavy gear boxes with forged hardened gears, stressproof shafts, flexible couplings, and grease fittings for all thrust bearings. Rotating Center Paddles to deliver the grain to the under-floor unloading auger.



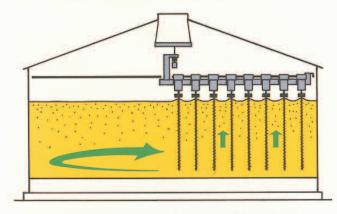
THE HEART OF THE TWIN-SWEEP SYSTEM is a pair of COMMERCIAL-FLOW IN-BIN DRYING SYSTEM



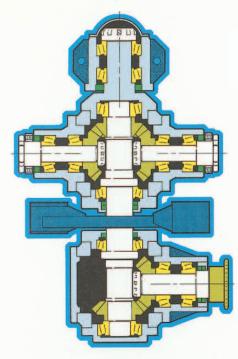


The Commercial-Flow system utilizes two large tapered sweeps to remove grain from the bin at the rate of approximately 1500 BPH. Like the Super-Flow systems, the Commercial-Flow removes the grain out through the 8" (200mm) under-floor unloading auger that is equipped with an oil-enclosed speed reducer drive. It features a set of extra heavy-duty gear boxes, with 2.25" (57mm) shafts & bearings, designed specifically for rugged commercial use. The Commercial-Flow is designed for bins up to 48' (18.3m) in diameter. A motor driven Vertical Truck Auger is available.

DO YOU HAVE A BATCH DRYING SYSTEM? **CONVERT YOUR STIRRING MACHINE** SYSTEM TO A DUAL SYSTEM.



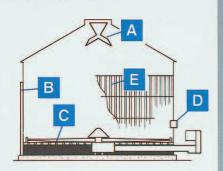
If you have a drying bin equipped with a stirring machine, it can be updated into an **Automatic Continuous-Flow Drying System** by simply installing a NECO Super-Flow, Twin-Sweep Super-Flow or Commercial-Flow. With both a stirring machine and **NECO Flow System operating together the** stirring machine will further loosen up the grain, thus increasing airflow. This is especially important when drying at deeper grain depths. The last bin full can be dried using the stirring machine only.



THE HEART OF THE SYSTEM is a pair of super heavy gear boxes with heavy forged hardened gears, large stress proof shafts, flexible couplings, double seals, and grease fittings on all thrust bearings. Rotating center Paddles deliver the grain to the under-floor unloading auger.

Let us put an Ultimate Drying System together for you today!

ACCESSORIES



A GRAIN SPREADERS

All NECO grain spreaders utilize compression springs to hold the throwing fins in proper position. This allows the operator to make adjustments without the need to loosen or remove bolts or to climb into the bin. NECO spreaders can be adjusted from the fill hatch with the special tool provided.

Adjustable flow control gates

Up To 5400 BPH

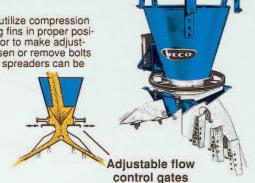
ports, consult with

the floor manufacturer when

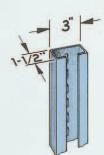
using these type

Model SP3-A Up To 3000 BPH Model SP3-A PLUS Up To 3500 BPH

provide a superior spreading



B BIN WALL STIFFENERS (Required)



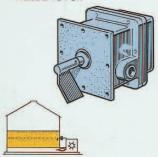
Flow patterns with in-bin continuous flow systems set up extra stresses on the walls of the grain bin. To prevent possible bin failure NECO recommends the use of stiffeners on bins equipped with a Twin-Sweep Super-Flow.

INTERMEDIATE SUPPORT CHANNELS

Moving grain in in-bin continuous flow systems causes extra stress on the drying floor. NECO intermediate supports channels are 7' long. They strengthen channel lock floors between the ribs. They are required when rails systems or concrete blocks are used to support the floor. Intermediate floor support channels are not usually required and will not work with free standing leg sup-

D BIN LEVEL SWITCH

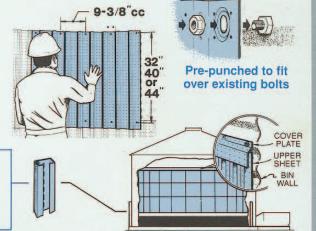
Automatically shuts off the burner when grain drops below a designated level.



PERFORATED BIN LINERS

Solve wet-wall spoilage problems the easy way with NECO's revolutionary concept in liner design.

- Easy to install
 24 gauge galvanized (60% heavier)
- Pre-punched to install on existing bin bolts. No drilling!
- Added benefit! Reduces the need for stiffeners when used with in-bin continuous flow drying systems. Use 1-1/2 ring stiffeners, 1 per bin sheet around bin, when a liner is installed. This is instead of the standard requirement of 6 rings of stiffeners, 2 per bin sheet around the bin without a bin liner



WARNING...



DO NOT – ENTER BIN WHEN POWER IS SUPPLIED TO THE TWIN-SWEEP SUPER-FLOW SYSTEM.

DO NOT – START ANY MOTOR IF BELT AND PULLEY GUARDS ARE NOT PROPERLY SECURED IN PLACE.

DO NOT – MODIFY OR ALTER THE TWIN-SWEEP SUPER-FLOW SYSTEM AND TRANSFER SYSTEM OR USE IT IN ANY MANNER NOT IN ACCORDANCE WITH THE INSTALLATION AND OPERATING INSTRUCTIONS.

FAILURE TO HEED THE ABOVE WARNINGS WILL RESULT IN SERIOUS INJURY OR DEATH!

NECO a division of TIC United Corp. 9364 No. 45th Street Omaha, Nebraska 68152 Phone: 402-453-6912 FAX: 402-453-0471



HIGH CAPACITY DRYING - UP TO 16,800 BUSHELS PER DAY POSSIBLE*

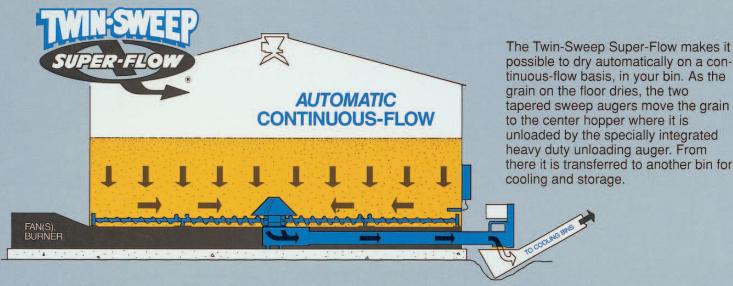
*based on 42' diameter bin with a NECO Grain Leveler, 2-30 HP NECO fans and heaters operating at 180 degree plenum temperature, removing 5 points of moisture and operated at a constant grain depth of 18". Note this system would require a separate wet holding bin.

- The Twin-Sweep Super-Flow removes a thin layer of dried grain off the drying floor as soon as it is dry in 1/2 the time it takes with a single sweep machine.
- By removing the bottom layer of grain the entire mass is loosened up allowing more air to flow through, increasing drying speed.
- With a Twin-Sweep Super-Flow the drying bin also acts as a wet holding bin eliminating the need for a separate structure.
- Twin sweeps bring grain in from two sides of the bin at the same time blending out variations in moisture which often occur because of differences in heat under the floor. This is especially beneficial when utilizing an "in the flow" moisture sensor such as the NECO Dry-Rite.

Efficient Drying

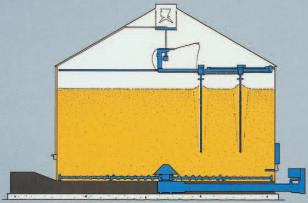
Since the drying air is going through the wet grain held in the Twin-Sweep Super-Flow bin, you get maximum benefit, fully utilizing all its potential for drying.

Because the Twin-Sweep Super-Flow can be installed in relatively large diameter bins, higher drying capacities are obtainable. This is possible because of the large surface area through which high volumes of air can pass.



IT'S AUTOMATIC

A sensing device just above the drying floor monitors the discharge air temperature and uses this information to control grain removal. Incoming grain moisture may vary; however its moisture content will be uniform after drying, automatically. FULL SPEED – Harvest can proceed without regard for the drying rate. If the grain is coming out of the field faster than it is being dried, the whole bin can be used for wet holding. Removal of the grain takes place automatically, without interruption of the harvest.



CONVERT YOUR BATCH DRYING BIN TO A CONTINUOUS FLOW SYSTEM...

If you have a bin equipped with a stirring machine, it can be updated into a Automatic Continuous Flow drying system by simply installing a Twin-Sweep Super-Flow. With both systems operating together the stirring machine will further loosen the grain, increasing air flow. This is especially important when drying at deeper grain depths. The last bin full can be dried using the stirring machine. Eliminate all the lost time to handle the grain in a batch system; enjoy all the benefits of fully automatic operation with a NECO Twin-Sweep Super-Flow.

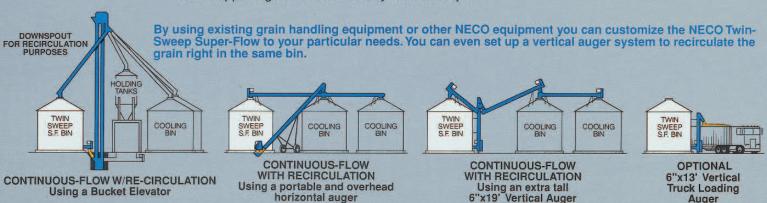
AUTOMATIC CONTROLS ALLOWS FOR A 24 HOUR DRYING DAY.

The automatic controls for the Twin-Sweep Super-Flow eliminate "baby sitting" your drying operation and allow you to *dry all night*. A probe, mounted just above the sweep augers, senses the temperature of the discharge air enabling the automatic control to accurately and automatically regulate the drying process.

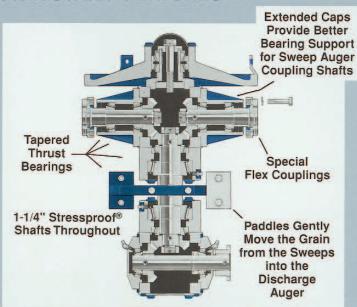
Standard controls include a contractor and fuse blocks for the Twin-Sweep Super-Flow and a transfer auger motor, a thermostat, a probe bracket, and switches to operate the main motor, a transfer auger motor and a filling grain spreader. In addition, the optional Deluxe Automatic Controls also include overload heaters to protect motors, and an E-Z start timer to let the transfer auger clean out after the Twin-Sweep Super-Flow shuts down. It also includes lights to show when the Twin-Sweep Super-Flow is in operation.



NEW!!! Dry-Rite Dryer Control is an optional computerized system that automatically monitors the grain's moisture content as it discharges from the Twin-Sweep Super-Flow. It gives a digital reading of the moisture of the grain as it is coming out of the dryer. Its computer logic can optimize the drying parameters to give maximum capacity of the dryer while maintaining the operator's desired grain moisture content. Furthermore it provides the operator with a printout of what has been happening while he was away from the dryer.



TWIN SWEEP FEATURES



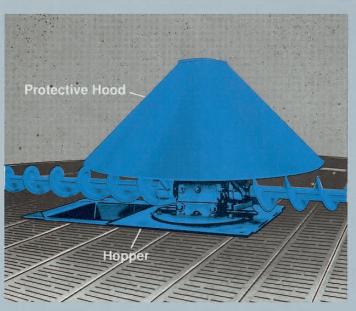
"The Heart" of the system is a pair of extra heavy gearboxes with every design feature aimed at assuring a long trouble free life. Forged and hardened gears, 1-1/4" Stress-proof shafts, tapered roller bearings, spring loaded double lip grease seals. Also gearboxes have pressure relief fittings to protect the seals from pressure buildup. Gearboxes have a special arrangement where the weight of the grain above the hopper is supported on 1-3/4" tapered roller bearings located on the caps of the gearboxes. This allows for the weight of the grain sitting over the unit to be transferred through the gearbox castings.



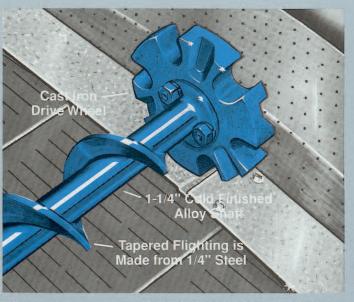
Circu-Drive — This exclusive propelling mechanism (U.S. Patent re29,309) helps the tapered sweep augers to travel around the bin floor in a shorter time and allows the augers to move at a more uniform rate when they encounter moisture variations. With Circu-Drive, the sweep augers take a thinner slice of dried grain off of the floor resulting in a more uniform moisture content.

Hard Surfaced Flighting – Hard surfacing is bonded to the face of the tapered sweeps flighting by a special heat process. The hard surfacing provides up to 4 times the wear compared to a plain auger.





A large center hopper fabricated from 11 ga. (1/8" thick) steel houses the gearboxes and unloading auger intake. Special 3/8" thick plates support the gearboxes. The hopper and gearboxes are leveled on the bin's concrete pad by four 1" threaded rods. A protective hood assures that only the grain brought in by the tapered sweep augers is discharged. This assures level unloading of the grain during the drying process. The Twin-Sweep Super-Flow unloading capacity is 700 BPH while operating in the continuous flow unloading mode with the tapered sweeps. Tapered sweep capacity is properly coordinated with the standard 6" unloading auger. This auger has an unloading capacity of approximately 800 BPH when unloading through the slidegate. An optional 8" unloading auger is available that boosts unloading through the slidegate to approximately 1600 BPH. The 8" unloading auger does not change the unloading rate with the tapered sweeps. Although we have designed this 8" auger to be as heavy as possible it may not run as smoothly as the 6" auger when unloading on a continuous flow basis while utilizing the tapered sweeps.



Tapered Sweep Augers feature flighting rolled from 1/4" thick steel. The specially designed computer generated taper allows them to remove a thin even slice of dried grain off the floor as soon as it is dry. The shafts of these sweeps are manufactured from 1-1/4" diameter cold finished alloy steel bar. Each sweep attaches to the gearbox with a special flex coupling for smooth stress free operation. The sweeps are propelled around the bin by means of two drive wheels located on each sweep. These wheels move the sweeps around the bin riding on 1/8" thick wear tracks.