BAKERY TECHNOLOGY UPDATE

WINTER 2000

Out With the Old, In With the New Updated, high-tech designs for 21st century sheeting

Happy New Year! With a new year and a new century on the calendar, it seems the perfect time to look at how one of baking's oldest automated processes continues to evolve and improve.

The advent of powered dough sheeters, originally called "dough brakes", simulated the action of a rolling pin. Not only did they relieve aching arms and backs, but provided an economical means of continuous and precision gauging of dough. Efficient, dependable sheeters are a requirement in modern production lines.

New Year, New Options

New sheeting advances offer Year 2000 industrial bakers more control, more productivity and more flexibility *without* taking up more floor space. Exciting Moline developments include:

- WideRoll™ Sheeter designs up to 1800 mm wide
- High resolution roller adjustment
- Direct drive cascade speed control
- Severe duty construction

These features have expanded the applications for industrial sheeting lines from sweet goods to specialty breads and snack foods with meat fillings.

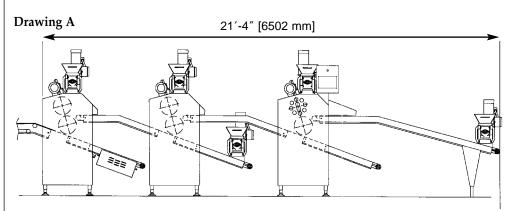
In this issue

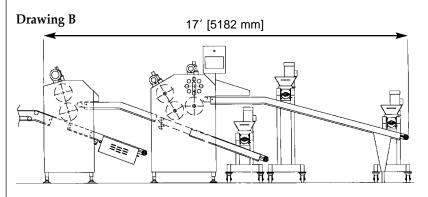
- Dough Reduction

 Sheeting advances from Moline start new year off with a bang
- "C" the light
 C-Frame mounting for make-up accessories
- Sheeting up close & personal Request Moline's Sheeting Video and view our products for yourself

Touch screen operator interfaces and cascade control logarithms simplify product changeovers and automate what would otherwise be tedious adjustment procedures.

Moline has created a standard 10-inch roller diameter design platform that has spawned three new products for industrial applications. Production lines configured with traditional 2-Roll Sheeters or new Dual or Satellite Sheeters offer tremendous flexibility and conserve on floor space compared to previous alternatives (see Drawings A and B).







Continued from page 1

2-Roll Sheeting

Simplicity in design and few moving parts make 2-Roll Sheeting ideal for hazardous and washdown duty environments. Normally chosen as the final sheeter in a production line, it is

This is a great option for primary sheeting of laminated dough requiring rapid yet gentle reduction, and it is available with severe duty features as well. Moline equipment is designed for easy sanitation and is available to meet and exceed USDA standards. Sealed

Washdown Duty Sheeter

electrical components, stand-off mounting and continuous welds are among the features that permit direct, high pressure washdown cleaning.

The satellite sheeter doesn't consume precious floor space either; it fits within the same footprint as the 2-Roll Sheeter using Moline's 10" design platform.

Dual Sheeter Technology

Satellite Sheeter, Washdown Duty

Moline's Dual Sheeters pack a powerful punch within a compact machine. Drive components such as bearings and gearboxes are now available with high horsepower ratings in small packages. This advancement has allowed Moline's engineers to design two sheeting stations, once again using our proven 10" diameter platform, into one compact frame. The Dual Sheeter requires only 40" of floor space

structurally rigid and offers the

most control over all available widths.

High resolution worm gear roller opening adjustments are easy to operate, with rollers that can weigh over 1000 pounds. The 2-Roll is nominally rated at 2:1 reduction, but ratios can vary depending on dough density and line speed.

Satellite Sheeting

Moline's satellite sheeter delivers high-reduction capability – as much as 6:1 – with its high speed, multi-roll head.

and is available in 3 configurations to best fit the needs of your line. Twin Satellite heads provide the highest reduction capability in the industry at a ratio of up to 36:1 (Drawing C).

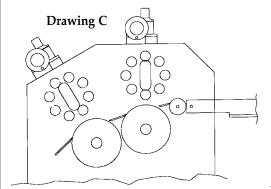
Our most popular configuration, shown in Drawing D, offers reduction capability up to 12:1. It consists of one Satellite station and one 2-Roll station and is often used as the primary sheeter following stressless dough sheet forming.

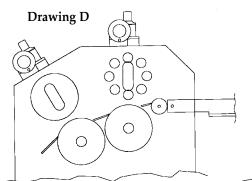
Drawing E illustrates a Dual Sheeter assembled with two, traditional 2-Roll heads for precision sheeting up to 4:1.

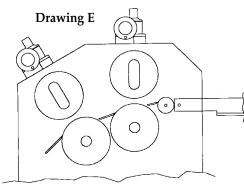
Why not greet the new millennium with details on the newest sheeting technology from Moline? Call us for more information at (800) 767-5734 or to request a copy of our Sheeting Systems Video.



Dual Sheeter Configurations







Get Your Sheeting Video!

From Rotor Extruder to Tri-Roll former to Dual Sheeter and everything in between, Moline has the goods on dough sheet forming and sheeting. But don't take our word for it. See for yourself with a video entitled "Moline Sheeting *Systems – Moline is your sheeting* solution."



With a time investment of less than ten minutes, you can take an in-depth look at our full line of sheeting technology, including the new YOGA II. Call today and we'll gladly forward a copy out to you.

Make-up Accessories on Mobile C-Frames Mounting alternative offers advantages over fixed

Moline manufactures a complete line of make-up accessories – flour dusters, filling depositors, trim removal conveyors, cutting areas, extruders, dough feed systems and more. Most are available with a "C-Frame" mounting which is outfitted with casters for easy positioning over a make-up line.

The reasons for choosing C-Frame mounting include simpler removal for clean-up. For example, flour dusters such as the one shown in Drawing F can be moved away from the line during wet cleaning. Producers thereby eliminate dusting pattern problems

associated with dusters exposed to high humidity and overspray conditions.

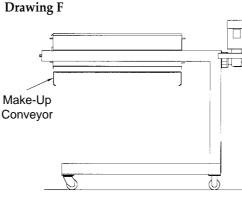
C-Frames also provide protection for both equipment and workers. They help prevent equipment damage that may normally occur during transit, and they also protect operators from having to lift heavy equipment.

Last, but certainly not least, C-Frames boost efficiency by making product changeover quicker and easier. If you are interested in exploring the advantages of C-Frame mounted accessories, contact Moline at (800) 767-5734.



Dry Topping Dispenser







24-hour Technical Service Hotline (218) 725-2090