

# Achieve the **highest-quality**, solvent-free product



# VACUUM DESOLVENTIZER STRIPPER<sup>™</sup> (VDS)







# CPM Crown's wide range of Drying & Desolventization technologies is now even larger.

Achieve a high-quality, solvent-free product when you partner with Crown for drying and desolventization. As a leader in oilseed extraction for 70 years, Crown provides the technical expertise, guidance and proven technologies to improve current processes and develop new products. With Crown's Global Innovation Center and state-of-the-art pilot plant, you can test evaporation of water or solvent using a full range of drying and desolventization equipment, including the continuous, indirect vacuum desolventizing by Crown's new Vacuum Desolventizer Stripper.

Crown offers a confidential, real-world environment for identifying your best drying and desolventization options. Choose Crown's superior innovation, equipment and aftermarket support to maximize product quality and yield more sustainably and cost-effectively.

# For every application, **a proven solution**.

Use CPM Crown's expertise & Innovation Center to determine your optimal solution for maximizing product yield and minimizing process costs.



# Vacuum Desolventizer Stripper (VDS)

Continuous indirect vacuum drying or desolventization for temperature sensitive products. Low operating temperature.

#### **Benefits**

- · Minimizes product denaturization and discoloration
- · Continuous and scalable
- · Lowest steam consumption
- First in, first out
- Full solvent recovery
- Smaller footprint: desolventizer and stripper are built into one unit (not 2 separate pieces)



# Flash Desolventization System (FDS)

Primary Drying Step

Direct contact system with full solvent recovery and very short residence times (a few seconds).

#### Benefits

- Short residence time and full solvent recovery
- Minimal product denaturization and discoloration
- · Applicable for solvent laden materials



## **Vertical Flash Dryer**

For temperature sensitive products where minimum heat input is desired, Maintains particle size with less energy expenditure.

#### **Benefits**

- Preserves particle size
- Energy efficient, low operating cost
- Great for water wet products handles input products with up to 90% moisture content
- Direct contact pneumatic conveying
- Minimal product denaturization and discoloration
- Compact



### Down Draft Desolventizer (DDD)

Primary Drying Step

For larger particles that require extended residence times for drying. Gentle heat treatment of the products.

#### **Benefits**

- Suitable for solvent laden products (oilseed proteins, white flakes, etc.)
- · Minimal breakage of end product
- Minimal product denaturization and discoloration
- Compact, indirect dryer
- Low electrical and steam consumption

· Direct contact pneumatic conveying dryer



## **Milling Flash Dryer**

For applications where a fine end product is desired.

#### **Benefits**

- Great for water wet products handles products with up to 90% moisture content
- Direct contact pneumatic conveying no moving parts in contact with material
- Fine end product
- Minimal product denaturization and discoloration
- Compact



### Vacuum Stripper

Secondary Drying Step

Provides the extended residence time at conditions to fully desolventize products without thermal degradation.

#### **Benefits**

- Operates under vacuum to preserve product quality (protein & color)
- · Add stripping agents to achieve low ppms (if needed)
- Ability to vary operating conditions to produce several products
- Repeatable results
- · Can follow any primary dryer

# For game-changing innovation, partner with Crown.

CPM Crown's Global Innovation Center is a facility unlike any other. A fully functional 15,000 sq. ft. pilot plant, analytical lab and training facility, the GIC offers piloting capabilities from benchtop lab scale to multiple tons per day of continuous production, simulating real life and enabling customers to develop and test new product concepts in a confidential, controlled environment. The GIC has capabilities in preparation, extraction, desolventizing, drying, deodorizing, refining, fat splitting, renewable diesel and specialty extraction (including Hemp CBD Oil). Crown's technical expertise, R&D and full lifecycle process provide guidance and support at every step from feasibility, trials and custom processing to commercial-sized operations and aftermarket.



# Feeding, Fueling and Building a Better World.



