



2027

Sunflower Hybrid & Market Guide



Proven Performance. Trusted Genetics.



Choosing the right sunflower hybrid starts with your acres, your field conditions and the market you are growing for. Nufarm sunflower hybrids bring proven genetics to U.S. growers, with U.S.-bred, U.S.-tested performance built to help support reliable yield, high oil potential and strong return on investment. High Oil content increases the opportunity for a strong return on investment.

Bred and tested in the heart of the U.S. sunflower region, with R&D based in Breckenridge, Minn., and support from the Nufarm Innovation Center in Sacramento, Calif., Nufarm develops sunflower hybrids for the real challenges growers face in the field. Our hybrids offer advanced downy mildew resistance, Phomopsis tolerance and herbicide-tolerant options to help you manage weed and disease pressure, protect

yield potential and match seed to your field strategy.

From high oleic to conoil (dehull) and confection, Nufarm offers a wide range of maturities, sizes and oil profiles to support today's sunflower market opportunities. Tested on acres like yours, Nufarm sunflowers help you compare options with confidence and choose hybrids built for your fields, your season and your bottom line.

Herbicide Tolerant Traits

Sunflowers are a non-GMO crop. Through years of selective breeding techniques, Nufarm uses trait introgression methods to incorporate the the Clearfield®, Clearfield® Plus and ExpressSun® traits into the majority of our hybrids to help growers manage weeds.



Clearfield®
Production System for Sunflower

The Clearfield® Production System for sunflowers offers broad-spectrum control of grass and broadleaf weeds, including ACCase-resistant types. It pairs high-yield hybrids with Beyond® Xtra herbicide tolerance for effective postemergent weed control in any tillage system.



Clearfield® Plus
Production System for Sunflower

Maximize sunflower yields with the Clearfield® Plus Production System. Paired with Beyond® Xtra herbicide and methylated seed oil, it tackles tough weeds more effectively.

ExpressSun®
trait

ExpressSun® hybrids tolerate Express® herbicide, delivering broadleaf weed control, improved yield potential, and cost-effective management with full re-cropping flexibility.

SUNFLOWER MARKETS

While the vibrant, strong sunflower is recognized worldwide for its beauty, it is also an important source of healthy edible oil and protein meal. As one of the world's leading oilseed crops, sunflower oil is a valued and healthy vegetable oil. Sunflower seeds are also enjoyed as a healthy snack and nutritious ingredient to many foods.



OIL

Approximately 75% of sunflowers grown are utilized for the oil that can be extracted from the seeds. Sunflower oil is naturally made up of a combination of monounsaturated, polyunsaturated, and low levels of saturated fat. Oil sunflowers are generally classified based on their oleic (monounsaturated fat) content. Oil sunflowers that are not used for oil extraction purposes can also be used in producing high quality bird food.

Primary categories of commercially available hybrid seeds

High Oleic: Oleic levels greater than 82%
(common minimum crush requirement)



CONOIL (DEHULL)

The dehull market requires processors to mechanically remove the hull and separate the kernel to be sold as a raw ingredient or roasted for snacking. The shell of conoil type sunflower seeds (a cross between confection and oilseeds) is the easiest to separate.



CONFECTION

This highly recognizable black and white seed serves as a tasty and healthy snack. Confection sunflower hybrids are planted at a lower population in the field to grow longer more plump seeds. The largest of the seeds get sold to the in-shell market, like what you eat at baseball games, while the smaller seeds are utilized in the dehull market.

High Oleic

Developed in the U.S., our high oleic oil sunflower hybrids deliver strong agronomics, high yields, and excellent oil content. The oilseed crush industry requires a minimum oleic level ranging from 82% to 85%.

While oleic levels can vary year to year due to environmental pressure, Nufarm sunflower hybrids target a minimum oleic level of 85% or higher, with some hybrids reaching greater than 90% oleic acid.

High oleic sunflower oil has a neutral taste and provides excellent stability without hydrogenation for the food industry and high oleic sunflower oil offers a trans fat free oil solution for end use customers. High-oleic sunflower oil is also being used in many of the new plant-based food products.

N4H337 E

NEW

MATURITY: Medium-Early

MARKET: High Oleic

TRAIT: ExpressSun

DMR: Yes

ExpressSun®
trait

N4H337 E is part of Nufarm's ever evolving Express portfolio. This hybrid's outstanding plant health starts off with resistance to all known downy mildew strains and plant health does not stop. This hybrid has a wonderful disease tolerance package that helps keep it growing strong through the season. Growers can count on high yields with this healthy hybrid.

- Express® herbicide tolerant
- Excellent stalk and root strength
- Great early season emergence
- Excellent oil
- Advanced downy mildew resistance

Growers asked for it and Nufarm's research staff produced it. For years growers have been asking for a Group 3, Express, Advanced DMR, high oleic, high-yielding hybrid and boy did we create a good one. Don't wait long to place your order for 2027. Although N4H337 E is new for 2027, our early testing has shown it at the front of the pack for not only yield but oil content as well.

N4H161 CL

MATURITY: Ultra-Early/Group 1

MARKET: High Oleic

TRAIT: Clearfield

DMR: Yes

 **Clearfield®**
Production System for Sunflower

This ultra-early high oleic is the perfect hybrid for Northern climates with short growing seasons or in the High Plains for a double crop option. With a shorter plant height, N4H161 CL has excellent root strength and late season plant health.

- Beyond® Xtra herbicide tolerant
- Earliest maturity in the Nufarm lineup
- Shorter plant height
- Excellent yield and oil content for maturity
- Resistant to multiple races of downy mildew

N4H161 CL is the industry's earliest sunflower hybrid currently sold in the U.S. and Canada. Not only is it early, but N4H161 CL also has excellent stalk and root strength coupled with short plant height, giving growers the option to spray insecticides and desiccants with their ground rigs, eliminating expensive applicator bills.



N4H205 E

MATURITY: Early/Group 2

MARKET: High Oleic

TRAIT: ExpressSun

DMR: Yes

ExpressSun®
trait

N4H205 E is a wonderful early option for your operation, with multiple advanced Downey Mildew Resistance (DMR) genes, lightning-fast dry down, and exceptional stalk and root strength. All without sacrificing yield or oil with this early powerhouse of a hybrid

- Express® herbicide tolerant
- Excellent yield and oil content
- Strong stalks and roots
- Fast drydown
- Advanced downy mildew resistance

From Start to finish N4H205 E is one of the healthiest hybrids in our portfolio; its multiple-strain downy mildew resistance gives it a leg up out of the ground, and its excellent plant health keeps it strong throughout the growing season.

High Oleic

N4H422 CL

MATURITY: Medium-Early

MARKET: High Oleic

TRAIT: ExpressSun

DMR: Yes



Clearfield®
Production System for Sunflower

N4H422 CL will not disappoint. Best suited for the northern growing regions, this hybrid performs well from east to west. N4H422 CL impresses producers all season long with its early season emergence and excellent oleic content at harvest.

- Beyond® Xtra herbicide tolerant
- Strong stalk and roots
- Excellent late season plant health
- Solid test weight
- Resistant to multiple races of downy mildew

If you are looking for a hybrid with outstanding plant health, great stalk and root strength, look no further. Year in and year out, N4H422 CL handles some of the toughest environments and conditions that our growers can put it through, whether your area is prone to white mold, downy mildew or phomopsis, N4H422 CL's disease resistance package is an exceptional option for your farm.

N4H490 E

MATURITY: Medium

MARKET: High Oleic

TRAIT: ExpressSun

DMR: Yes

ExpressSun®
trait

N4H490 E is part of Nufarm's expanding Express® portfolio. It's also the first of many products coming down the pipeline with advanced downy mildew resistance. This high oleic oilseed is able to compete in the field with its root strength, excellent oil content and yield.

- Express® herbicide tolerant
- Very competitive yield across regions
- Excellent test weight and oil content
- Strong stalks and roots
- Advanced downy mildew resistance

N4H490 E was released in 2022, and sales for this hybrid continue to grow annually due to consistency on oleic levels and high yield. N4H490 E also boasts an impressive resume when it comes to agronomics; this hybrid has genetic downy mildew resistance, excellent plant health, great stalk and root strength, and lightning-fast dry down. Combining all of the great features will provide your operation with the best of both worlds – high oleic levels and high yields maximizing the ROI on your farm.



N4H470 CLP

MATURITY: Medium
MARKET: High Oleic
TRAIT: Clearfield Plus
DMR: Yes



Clearfield® Plus
 Production System for Sunflower

N4H470 CLP delivers an all around win on the farm. With excellent agronomics including solid stalks and roots, plus the added benefits of downy mildew resistance and improved weed control with the Clearfield® Plus production system, growers will achieve solid yields and top-end oil content.

- Beyond® Xtra herbicide tolerant Clearfield® Plus for improved weed control
- Consistently strong yield and oil content
- Excellent stalk and root strength and good late season plant health
- Resistant to multiple races of downy mildew

When it comes to oleic levels, no hybrid in the marketplace has a more consistent story, with both growers and processors boasting about the oil levels of this hybrid constantly coming in at 50% or above. If you want to not only haul the most pounds but also want to haul in the most oil, look to N4H470 CLP to get it done on your operation.

Conoil (Dehull)

The conoil seed type is the most versatile of the sunflower seed types and offers opportunities across multiple markets including kernel, oil, confection and bird food. This seed is generally higher in oil content than confection seeds.



N5H493 CL

MATURITY: Medium

MARKET: Dehull

TRAIT: Clearfield

DMR: No

N5H493 CL, Nufarm's first high oleic conoil bred specifically with the dehull market in mind. With excellent standability, fast dry down and Beyond® Xtra herbicide tolerance, fields will be clean and standing straight into harvest.

- Beyond® Xtra herbicide tolerant
- Processor preferred for the dehull high oleic market
- Striped seed with excellent hullability
- Shorter plant height with high yield
- Confection planting seed



Clearfield®
Production System for Sunflower

Both processors and growers agree if you are planting conoils on your operation, you need to be growing N5H493 CL! With industry-leading yield, test weight, size and plant health, N5H493 CL is an excellent option to maximize ROI on your operation.

Confection

Confection sunflowers are grown to meet the specific needs of processors in the in-shell snack market.



PANTHER DMR

MATURITY: Early
MARKET: Confection
TRAIT: None
DMR: Yes

Panther DMR offers confection growers excellent yield potential and high test weight. Known for its very early maturity and great standability, this processor preferred hybrid with downy mildew resistance is a perfect fit for northern growers.

- Very high percentage of large seed
- High yield and test weight
- Shorter height, uniform plant type
- Very early flowering
- Resistant to multiple races of downy mildew

Year in and year out, Panther DMR's early maturity and excellent plant health provides growers with high yields and earlier harvest than the competition without sacrificing yield. When it comes to agronomics, Panther DMR has got it, starting out with DMR protection, great seed sizing, high test weight and excellent full-season plant health.

nufarm Sunflower Hybrid Characteristics

	HIGH OLEIC			
PRODUCT	N4H161 CL	N4H205 E	N4H337 E NEW	N4H422 CL
MATURITY	ULTRA- EARLY/Group 1	EARLY	MED-EARLY	MED-EARLY
SPECIALTY TRAITS	Clearfield/DMR	ExpressSun/DMR	ExpressSun/DMR	Clearfield/DMR
YIELD FOR MATURITY	8	8	8	8
ROOT RATting	8	8	7	9
STALK RATING	7	8	8	9
TEST WEIGHT	8	7	8	8
DRY DOWN	5	9	7	7
OIL CONTENT OR SEED TYPE	6	9	8	7
UNIFORMITY AT FLOWER	8	8	9	8
LATE SEASON PLANT HEALTH	8	7	8	8
EMERGENCE	8	8	8	8
ADDITIONAL MARKET(S)	Bird Food	Bird Food	Bird Food	Bird Food
PLANT HEIGHT	3	6	6	8
DROUGHT TOLERANCE	7	7	7	8

Hybrid Rating Scale 1=Poor, 9=Excellent Plant Height Rating Scale 1=Shortest, 9=Tallest

	HIGH OLEIC		CONOIL (DEHULL)	CONFECTION
PRODUCT	N4H470 CLP	N4H490 E	N5H493 CL	PANTHER DMR
MATURITY	MEDIUM	MEDIUM	MEDIUM	EARLY
SPECIALTY TRAITS	Clearfield Plus/DMR	ExpressSun/DMR	Clearfield	DMR
YIELD FOR MATURITY	8	9	8	8
ROOT RATting	8	7	8	7
STALK RATING	8	7	8	8
TEST WEIGHT	8	8	6	8
DRY DOWN	7	6	7	7
OIL CONTENT OR SEED TYPE	9	8	3	LT
UNIFORMITY AT FLOWER	9	9	8	7
LATE SEASON PLANT HEALTH	8	8	7	7
EMERGENCE	8	8	7	7
ADDITIONAL MARKET(S)	Bird Food	Bird Food	High Oleic	See Contract
PLANT HEIGHT	7	8	6	6
DROUGHT TOLERANCE	7	8	7	6

Hybrid Rating Scale 1=Poor, 9=Excellent Plant Height Rating Scale 1=Shortest, 9=Tallest

MORE CONFIDENCE. EVERY ACRE.

Sunflowers reward the right decisions – the right hybrid, the right agronomic approach, the right partner.

You grow in conditions that don't forgive bad choices. Variable seasons, processor quality requirements, and the pressure to hit consistent yield and oil content year after year. The hybrids you plant need to be built for that reality, not just tested somewhere else and sold in your area.

That's why every Nufarm sunflower hybrid is U.S.-bred, U.S.-tested, and validated against the specific challenges of your region. When you need high-oleic performance that opens doors to premium markets, we have the genetics to get you there. When you need answers in the field, our agronomists are close by – not at a call center.

From the seed you select to the crop you deliver, our team is here to support you, helping you reduce your risk and strengthen your confidence at every step.

Talk to your local Nufarm representative today to build a hybrid plan that fits your fields.



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