UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
WASHINGTON, DC 20460

OFFICE OF CHEMICAL SAFETY
AND POLLUTION PREVENTION

January 26, 2023

Rebecca Clemmer
Regulatory Manager
UPL NA Inc.
630 Freedom Business Center, Suite 402
King of Prussia, PA 19406

Subject: Registration Review Label Amendments Incorporating Mitigation Measures from the Interim Decisions for S-Metolachlor and Mesotrione and the National Marine Fisheries Services' (NMFS) Biological Opinion on the Effects of S-Metolachlor on Pacific Salmonids
Product Name: Coyote Herbicide
EPA Registration Number: 70506-338
Application Date: 5/11/2021, 8/18/2021, and 4/4/2022
Decision Number: 575572, 583116, and 588846

Dear Rebecca Clemmer:

The Agency, in accordance with the Federal Insecticide, Fungicide and Rodenticide Act (FIFRA), as amended, has completed reviewing all the information submitted with your application to support the Registration Review of the above referenced product in connection with the S-Metolachlor and Mesotrione Interim Decisions. The Agency has concluded that your submission is acceptable.

This letter also addresses the label mitigation resulting from the NMFS' Biological Opinion on the effects of S-Metolachlor on Pacific salmonids. The Agency has concluded that your submission is also acceptable. The label referred to above, submitted in connection with registration under FIFRA, as amended, is acceptable.

Should you wish to add/retain a reference to the company's website on your label, then please be aware that the website becomes labeling under the Federal Insecticide Fungicide and Rodenticide Act and is subject to review by the Agency. If the website is false or misleading, the product would be misbranded and unlawful to sell or distribute under FIFRA section 12(a)(1)(E). 40 CFR 156.10(a)(5) list examples of statements EPA may consider false or misleading. In addition, regardless of whether a website is referenced on your product's label, claims made on the website may not substantially differ from those claims approved through the registration process. Therefore, should the Agency find or if it is brought to our attention that a website contains false or misleading statements or claims substantially differing from the EPA approved registration, the website will be referred to the EPA's Office of Enforcement and Compliance.

A stamped copy of your labeling is enclosed for your records. This labeling supersedes all previously accepted labeling. You must submit one copy of the final printed labeling before you release the product for shipment with the new labeling. In accordance with 40 CFR 152.130(c), you may distribute or sell this product under the previously approved labeling for 12 months from the date of this letter. After 12 months, you may only distribute or sell this product if it bears this new revised labeling or subsequently approved labeling. "To distribute or sell" is defined under FIFRA section 2(gg) and its implementing regulation at 40 CFR 152.3.

If you have any questions about this letter, please contact Quinn Gavin at gavin.quinn@epa.gov.

Sincerely,

Linda Arrington, Branch Chief
Risk Management and Implementation Branch 4
Pesticide Re-Evaluation Division
Office of Pesticide Programs

Enclosure

Sale, use, and distribution of this product in Nassau and Suffolk Counties in the State of New York is prohibited.

s-metolachlor	**GROUP**	**15**	**HERBICIDE**
mesotrione	**GROUP**	**27**	**HERBICIDE**

Coyote™ Herbicide

A Pre-emergence and Post-emergence Herbicide for Control of Annual Grass and Broadleaf Weeds in Field Corn, Seed Corn, Sweet Corn, Yellow Popcorn and Grain Sorghum

Active Ingredients*:

S-metolachlor: (CAS No. 87392-12-9)	36.80%
Mesotrione: (CAS No. 104206-82-8)	3.68%
Other Ingredients:	59.52%
Total:	100.00%

*Active ingredients per gallon: *S*-metolachlor 3.34 pounds, mesotrione 0.33 pounds.

KEEP OUT OF REACH OF CHILDREN

CAUTION

FIRST AID	
If on skin or clothing	• Take off contaminated clothing. • Rinse skin immediately with plenty of water for 15-20 minutes. • Call a poison control center or doctor for treatment advice.
If swallowed	• Call a poison control center or doctor immediately for treatment advice. • Have person sip a glass of water if able to swallow. • Do not induce vomiting unless told to do so by the poison control center or doctor. • Do not give anything by mouth to an unconscious person.
If in eyes	• Hold eye open and rinse slowly and gently with water for 15-20 minutes. • Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. • Call a poison control center or doctor for treatment advice.
If inhaled	• Move person to fresh air. • If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-mouth, if possible. • Call a poison control center or doctor for further treatment advice.
Have the product container or label with you when calling a poison control center or doctor, or going for treatment. For emergency medical treatment, contact Rocky Mountain Poison and Drug Safety at 1-866-673-6671.	

FOR CHEMICAL EMERGENCY: Spill, leak, fire, exposure, or accident, call CHEMTREC 1-800-424-9300

UPL NA Inc.
630 Freedom Business Center, Suite 402
King of Prussia, PA 19406 • 1-800-438-6071

EPA Reg. No. 70506-338
EPA Est. No.

ACCEPTED
Jan 26, 2023
Under the Federal Insecticide, Fungicide and Rodenticide Act as amended, for the pesticide registered under EPA Reg. No. 70506-338

[optional wording for use on commercial labeling; location on printed labels may vary:
"See inside for additional Precautionary Statements and complete Directions for Use";
"See attached booklet for additional Precautionary Statements and complete Directions For Use";
"See containers inside for additional Precautionary Statements and complete Directions For Use".]

PRECAUTIONARY STATEMENTS

Hazards to Humans and Domestic Animals

Caution. Harmful if absorbed through skin. Harmful if swallowed. Causes moderate eye irritation. Avoid contact with skin, eyes, clothing. Wash thoroughly with soap and water after handling and before eating, drinking, chewing gum, using tobacco, or using the toilet.

Personal Protective Equipment (PPE)

Some materials that are chemical resistant to this product are listed below.

Mixers, Loaders, Applicators and other handlers must wear:

- Long-sleeved shirt and long pants
- Waterproof gloves
- Protective eyewear
- Shoes plus socks

Follow manufacturer's instructions for cleaning/maintaining PPE. If no such instructions for washables, use detergent and hot water. Keep and wash PPE separately from other laundry.

User Safety Recommendations

Users should:

- Wash hands before eating, drinking, chewing gum, using tobacco, or using the toilet.
- Remove clothing/PPE immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing.
- Remove PPE immediately after handling this product. Wash the outside of gloves before removing. As soon as possible, wash thoroughly and change into clean clothing.

Engineering Control Statements

When handlers use closed systems or enclosed cabs, in a manner that meets the requirements listed in the Worker Protection Standard (WPS) for agricultural pesticides [40 CFR 170.240(d)(4-6)], the handler PPE requirements may be reduced or modified as specified in the WPS.

Environmental Hazards

For terrestrial uses: Do not apply directly to water, to areas where surface water is present, or to intertidal areas below the mean high water mark. Do not contaminate water when disposing of equipment wash water or rinsate.

Reporting Ecological Incidents: to report ecological incidents, including mortality, injury, or harm to plants and animals, call UPL NA Inc. at 1-800-247-1557.

Ground Water Advisory

S-metolachlor and mesotrione are known to leach through soil into groundwater under certain conditions as a result of label use. These chemicals may leach into groundwater if used in areas where soils are permeable, particularly where the water table is shallow.

Surface Water Advisory

This product may impact surface water quality due to runoff of rain water. This is especially true for poorly draining soils and soils with shallow ground water. This product is classified as having high potential for reaching surface water via runoff for several months or more after application. A level, well-maintained vegetative buffer strip between areas to which this product is applied and surface water features such as ponds, streams, and

springs will reduce the potential loading of s-metolachlor and mesotrione from runoff water and sediment. Runoff of this product will be reduced by avoiding applications when rainfall or irrigation is expected to occur within 48 hours.

NON-TARGET ORGANISM ADVISORY: This product is toxic to plants and may adversely impact the forage and habitat of non-target organisms, including pollinators, in areas adjacent to the treated site. Protect the forage and habitat of non-target organisms by following label directions intended to minimize spray drift.

Mixing/Loading Instructions

Care must be taken when using this product to prevent back siphoning into wells, spills, or improper disposal of excess pesticide, spray mixtures, or rinsates.

Check valves or antisiphoning devices must be used on mixing equipment.

This product may not be mixed/loaded or used within 50 ft. of wells, including abandoned wells, drainage wells, and sink holes. Operations that involve mixing, loading, rinsing, or washing of this product into or from pesticide handling or application equipment or containers within 50 ft. of any well are prohibited, unless conducted on an impervious pad constructed to withstand the weight of the heaviest load that may be positioned on or moved across the pad. Such a pad shall be designed and maintained to contain any product spills or equipment leaks, container or equipment rinse or wash water, and rain water that may fall on the pad. Surface water shall not be allowed to either flow over or from the pad, which means the pad must be self-contained. The pad shall be sloped to facilitate material removal. An unroofed pad shall be of sufficient capacity to contain at a minimum 110% of the capacity of the largest pesticide container or application equipment on the pad. A pad that is covered by a roof of sufficient size to completely exclude precipitation from contact with the pad shall have a minimum containment capacity of 100% of the capacity of the largest pesticide container or application equipment on the pad. Containment capacities as described above shall be maintained at all times. The above-specified minimum containment capacities do not apply to vehicles when delivering pesticide shipments to the mixing/loading site.

Physical and Chemical Hazards

Do not use or store near heat or open flame.

DIRECTIONS FOR USE

It is a violation of Federal law to use this product in a manner inconsistent with its labeling.
Do not apply this product in a way that will contact workers or other persons, either directly or through drift. Only protected handlers may be in the area during application. For any requirements specific to your state or tribe, consult the agency responsible for pesticide registration.

Endangered Species Protection Requirements:

It is a Federal offense to use any pesticide in a manner that results in an unauthorized “take” (e.g., kill or otherwise harm) of an endangered species and certain threatened species, under the Endangered Species Act section 9. When using this product, you must follow the measures contained in the Endangered Species Protection Bulletin for the area in which you are applying the product. You must obtain a Bulletin no earlier than six months before using this product. To obtain Bulletins, consult http://www.epa.gov/espp/, call 1-844-447-3813, or email ESPP@epa.gov. You must use the Bulletin valid for the month in which you will apply the product.

AGRICULTURAL USE REQUIREMENTS

Use this product only in accordance with its labeling and with the Worker Protection Standard, 40 CFR part 170. This Standard contains requirements for the protection of agricultural workers on farms, forests, nurseries, and greenhouses, and handlers of agricultural pesticides. It contains requirements for training, decontamination, notification, and emergency assistance. It also contains specific instructions and exceptions pertaining to the statements on this label about personal protective equipment (PPE), and restricted-entry interval. The requirements in this box only apply to uses of this product that are covered by the Worker Protection Standard.

Do not enter or allow worker entry into treated areas during the restricted-entry interval (REI) of 24 hours. Exception: If the product is soil-injected or soil-incorporated, the Worker Protection Standard, under certain circumstances, allows workers to enter the treated area if there will be no contact with anything that has been treated.

For early entry to treated areas that is permitted under the Worker Protection Standard and that involves contact with anything that has been treated, such as plants, soil and water, wear:

- Long-sleeved shirt and long pants
- Waterproof gloves
- Shoes and socks

PRODUCT INFORMATION

Coyote can be used in yellow popcorn, sweet corn and grain sorghum for pre-emergence control of many annual grass and broadleaf weeds.

Coyote can also be used in field corn and seed corn for pre-emergence and post-emergence control of many annual grass and broadleaf weeds.

Applied according to use directions and under normal growing conditions, Coyote will not harm the treated crop. During germination and early stages of growth, environmental conditions or other factors that favor poor or slow growth can weaken crop seedlings. Use of Coyote under these conditions can result in crop injury.

A list of weeds controlled can be found in Tables 1 and 2. In order to effectively control most grass weed species, Coyote must be used prior to weed emergence.

Restrictions

- Do not apply this product through any type of irrigation system.
- Do not use flood irrigation to apply or incorporate this product.
- Do not apply Coyote by air.
- Do not contaminate irrigation water used for non-labeled crops or water used for domestic purposes.
- Do not apply under conditions which favor runoff or wind erosion of soil containing this product to non-target areas.
- To prevent off-site movement due to runoff or wind erosion:
    - Do not treat powdery dry or light sandy soils when conditions are favorable for wind erosion. Under these conditions, ensure that the soil surface has been settled by rainfall or irrigation.
    - Do not apply to impervious substrates such as paved or highly compacted surfaces or frozen snow covered soils.

Resistance Management

Coyote is a combination of *S*-metolachlor (Group 15 herbicide) and mesotrione (Group 27 herbicide). With two herbicide active ingredients and two modes of action Coyote Herbicide can be an effective component of a weed resistance management strategy.

Naturally occurring biotypes of certain broadleaf weed species with resistance to triazines, ALS, PPO, glycine (glyphosate) and HPPD herbicides are known to exist. If biotypes of weeds resistant to triazines, ALS, PPO and glycine inhibitors are present in the field, this herbicide is capable of controlling or partially controlling them if they are listed in Tables 1 and 2. Should resistant individuals dominate the weed population, appropriate resistance management strategies should be followed. Any weed population may contain or develop plants naturally resistant to Coyote Herbicide and other Group 15 and 27 herbicides. Weed species with acquired resistance to these Groups may eventually dominate the weed population if Group 15 and 27 herbicides are used repeatedly in the same field. Appropriate resistance-management strategies should be followed.

To delay herbicide resistance take one or more of the following steps:

- Rotate the use of herbicides within a growing season sequence or among growing seasons with different herbicide groups that control the same weeds in a field. Whenever possible incorporate multiple weed control practices such as mechanical cultivation, biological management practices, and crop rotation.
- Use tank mixtures with herbicides from a different group if such use is permitted; where information on resistance in target weed species is available, use the less resistance-prone partner at a rate that will control the target weed(s) equally as well as the more resistance-prone partner. Consult your local extension service or certified crop advisor if you are unsure as to which active ingredient is currently less prone to resistance.
- Adopt an integrated weed-management program for herbicide use that includes scouting and uses historical information related to herbicide use and crop rotation, and that considers tillage (or other mechanical control methods), cultural (e.g. higher crop seeding rates; precision fertilizer application method and timing to favor the crop and not the weeds), biological (weed-competitive crops or varieties) and other management practices.
- Scout fields before application to identify the weed species present and their growth stage to determine if the intended application will be effective. Scout after herbicide application to monitor weed populations for early signs of resistance development. Indicators of possible herbicide resistance include: (1) failure to control a weed species normally controlled by the herbicide at the dose applied, especially if control is achieved on adjacent weeds; (2) a spreading patch of non-controlled plants of a particular weed species; (3) surviving plants mixed with controlled individuals of the same species. If resistance is suspected, prevent weed seed production in the affected area by an alternative herbicide from a different group or by a mechanical method such as hoeing or tillage. Prevent movement of resistant weed seeds to other fields by cleaning harvesting and tillage equipment when moving between fields, and planting clean seed.
- If a weed pest population continues to progress after treatment with this product, discontinue use of this product and switch to another management strategy or herbicide with a different mode of action (MOA), if available. Treat weed escapes with an herbicide with a different MOA or use non-chemical methods to remove escapes. To the extent possible do not allow weed escapes to produce seeds, roots, or tubers.
- Contact your local sales representative, crop advisor, or extension agent to find out if suspected resistant weeds to this MOA have been found in your region. If resistant biotypes of target weeds have been reported, use the application rates of this product specified for your local conditions. Tank mix products so that there are multiple effective mechanisms of action for each target weed. Contact UPL NA at 1-800-438-6071.

Integrated Pest (Weed) Management

Coyote may be integrated into an overall weed and pest management strategy. Follow practices known to reduce weed development (tillage, crop competition) and herbicide use (weed scouting, proper application timing, banding and rotations) wherever possible. Consult local agricultural and weed authorities for additional Integrated Pest Management strategies established for your area.

APPLICATION INFORMATION

Ground Application

Ensure that spray nozzles are uniformly spaced, the same size and type, and provide accurate and uniform application. Use spray nozzles that deliver medium to coarse droplet size to provide good coverage and avoid drift.

Ensure that all in-line strainer and nozzle screens in the sprayer are 50-mesh or coarser.

Always ensure that agitation is maintained until spraying is completed, even if stopped for brief periods of time. If the agitation is stopped for more than 5 minutes, re-suspend the spray solution by running on full agitation prior to spraying.

Pre-emergence Applications

Apply Coyote pre-emergence with a carrier volume of 10-80 gals./A.

Post-emergence Applications

Good weed coverage is essential for optimum weed control. Apply in a spray volume of 10-30 gals./A. When weed foliage is dense, use a minimum spray volume of 20 gals/A. Flat fan nozzles will provide optimum post-emergence coverage. Do not use floodjet or venturi type nozzles or controlled droplet application equipment for post-emergence applications. Use only clean water as the carrier when applying Coyote after crop emergence.

Aerial Application

Do not apply Coyote by air.

SPRAY DRIFT MANAGEMENT

MANDATORY SPRAY DRIFT MANAGEMENT

Ground Boom Applications

- Do not release spray at a height greater than 3 feet above the ground or crop canopy.
- Applicators are required to select the nozzles and pressure that deliver medium or coarser droplets (ASABE S572).
- Do not apply when wind speeds exceed 15 mph at the application site.
- Do not apply during temperature inversions.

Boomless Ground Applications:

- Applicators are required to select the nozzle and pressure that deliver a medium or coarser droplet size (ASABE S572.3) for all applications.
- Do not apply when wind speeds exceed 15 mph at the application site.
- Do not apply during temperature inversions.

SPRAY DRIFT ADVISORIES

THE APPLICATOR IS RESPONSIBLE FOR AVOIDING OFF-SITE SPRAY DRIFT. BE AWARE OF NEARBY NON-TARGET SITES AND ENVIRONMENTAL CONDITIONS.

IMPORTANCE OF DROPLET SIZE

An effective way to reduce spray drift is to apply large droplets. Use the largest droplets that provide target pest control. While applying larger droplets will reduce spray drift, the potential for drift will be greater if applications are made improperly or under unfavorable environmental conditions.

Controlling Droplet Size – Ground Boom

- Volume – Increasing the spray volume so that larger droplets are produced will reduce spray drift. Use the highest practical spray volume for the application. If a greater spray volume is needed, consider using a nozzle with a higher flow rate.
- Pressure – Use the lowest spray pressure recommended for the nozzle to produce the target spray volume and droplet size.
- Spray Nozzle – Use a spray nozzle that is designed for the intended application. Consider using nozzles designed to reduce drift.

BOOM HEIGHT – Ground Boom

For ground equipment, the boom should remain level with the crop and have minimal bounce.

SHIELDED SPRAYERS

Shielding the boom or individual nozzles can reduce spray drift. Consider using shielded sprayers. Verify that the shields are not interfering with the uniform deposition of the spray on the target area.

Boomless Ground Applications:

- Setting nozzles at the lowest effective height will help to reduce the potential for spray drift.

TEMPERATURE AND HUMIDITY

When making applications in hot and dry conditions, use larger droplets to reduce effects of evaporation.

TEMPERATURE INVERSIONS

Drift potential is high during a temperature inversion. Temperature inversions are characterized by increasing temperature with altitude and are common on nights with limited cloud cover and light to no wind. The presence of an inversion can be indicated by ground fog or by the movement of smoke from a ground source or an aircraft smoke generator. Smoke that layers and moves laterally in a concentrated cloud (under low wind conditions) indicates an inversion, while smoke that moves upward and rapidly dissipates indicates good vertical air mixing.

WIND

Drift potential generally increases with wind speed. AVOID APPLICATIONS DURING GUSTY WIND CONDITIONS.

Applicators need to be familiar with local wind patterns and terrain that could affect spray drift.

MIXING PROCEDURES

Either water or liquid fertilizers, (excluding suspension fertilizers,) may be used as carriers for pre-emergence applications. If fluid fertilizers are used, a compatibility test must be done. Even if Coyote is physically compatible with a fluid fertilizer, constant agitation is necessary to maintain a uniform mixture during application. Once the crop has emerged, use only clean water as the carrier when applying Coyote.

The spray tank must be clean, thoroughly rinsed and decontaminated before adding either Coyote alone or with tank-mix partners. If water is used as the carrier, use clean water.

Always refer to labels of other pesticide products for mixing directions and precautions which may differ from those outlined here. Use in accordance with the most restrictive of label restrictions and precautions. Do not exceed label dosage rates. This product may not be mixed with any product containing a label prohibiting such

mixing. Do not tank mix Coyote with any other insecticide, fungicide, fertilizer solution, or adjuvant not listed on the label without testing compatibility, as poor mixing may result. Test the compatibility of any tank-mix combination on a small scale such as a jar test before actual tank mixing.

Mix only as much spray solution as needed.

Mixing Instructions for Adding Coyote to the Spray Tank

1. Only use sprayers in good operating condition with adequate agitation. Ensure the sprayer is cleaned according to instructions on label of the product used prior to use of Coyote.
2. Begin to fill sprayer tank or premix tank with clean water and engage agitator. Continue agitation throughout the entire mixing and spraying procedure.
3. When the sprayer or premix tank is half full of water, begin to add the mixture components.
4. If ammonium sulfate (AMS) is added, continue agitation until completely dispersed.
5. If a wettable powder or dry flowable formulation is used, add it to the tank slowly. Mixing and compatibility may be improved when a wettable powder or dry flowable is diluted with water before adding to the tank. Agitate during the procedure.
6. If a flowable formulation is used, add it to the tank slowly.
7. Add Coyote slowly to the tank.
8. Add any other liquid tank-mix products next with emulsifiable concentrates last.
9. Add an adjuvant last, if needed.
10. Complete filling the sprayer tank and continue agitation.
11. Apply as soon as possible after spray mixture is prepared. Do not leave mixture in spray tank overnight without agitation.

If Coyote is added to the spray tank via induction, compatibility may be compromised. If an induction tank (or similar equipment) is used, add each product separately and allow each to disperse into the spray tank before adding the next product. For best tank-mix compatibility, rinse the induction tank with water before adding each component.

It is recommended that Coyote not be added to the spray tank via in-line injection.

Compatibility Test

A compatibility test is recommended before tank mixing to ensure compatibility of Coyote with fertilizer carriers or other pesticides. The following test assumes a spray volume of 25 gals./A. For other spray volumes, make appropriate changes in the ingredients.

Nitrogen solutions or complete liquid fertilizers, excluding suspension fertilizers, may replace all or part of the water in the spray. Because liquid fertilizers vary, even within the same analysis, always check compatibility with pesticide(s) before use. Incompatibility of tank mixtures is more common with mixtures of fertilizer and pesticides.

Compatibility Test Procedure

1. Add 1.0 pt. of carrier (fertilizer or water) to each of two 1 qt. jars with tight lids. Use the same source of water that will be used for the tank mix and conduct the test at the temperature the tank mix will be applied.
2. To one of the jars, add 1/4 tsp. or 1.2 milliliters of a compatibility agent approved for this use (1/4 tsp. is equivalent to 2.0 pts./100 gals. spray). Shake or stir gently to mix.
3. To both jars, add the appropriate amount of pesticide(s) in their relative proportions based on label rates. If more than one pesticide is used, add them separately as described in the Mixing Procedures section of this label. After each addition, shake or stir gently to thoroughly mix.
4. After adding all ingredients, put lids on and tighten, and invert each jar ten times to mix. Let the mixtures stand 15-30 minutes and then look for separation, large flakes, precipitates, gels, heavy oily film on the jar, or

other signs of incompatibility. Determine if the compatibility agent is needed in the spray mixture by comparing the two jars. If either mixture separates, but can be remixed readily, the mixture can be sprayed as long as good agitation is used. If the mixtures are incompatible, test the following methods of improving compatibility: (a) slurry the dry pesticide(s) in water before addition, or (b) add 1/2 the compatibility agent to the fertilizer or water and the other 1/2 to the emulsifiable concentrate or flowable pesticide before addition to the mixture. If incompatibility is still observed, do not use the mixture.

5. After compatibility testing is complete, dispose of any pesticide wastes in accordance with the Storage and Disposal section in this label.

Cleaning Equipment After Application

Special attention must be given to cleaning equipment before spraying a crop other than field corn.

Equipment Cleaning Procedure

1. Flush tank, hoses, boom, and nozzles with clean water.
2. Prepare a cleaning solution of 1 gal. household ammonia per 25 gals. water. Other commercial spray tank cleaners may be used.
3. Use a pressure washer to clean the inside of the spray tank with this solution. Take care to wash all parts of the tank, including the inside top surface. If a pressure washer is not available, completely fill the sprayer with the cleaning solution to ensure contact of the cleaning solution with all internal surfaces of the tank and plumbing. Start agitation in the sprayer and thoroughly recirculate the cleaning solution for at least 15 minutes. All visible deposits must be removed from the spraying system.
4. Flush hoses, spray lines, and nozzles for at least 1 minute with the cleaning solution.
5. Remove boom end caps and flush dead space areas, with water, then replace caps.
6. Dispose of rinsate from steps 1-5 in an appropriate manner, according to all local State and federal regulations.
7. Repeat steps 2-6.
8. Remove nozzles, screens, and strainers and clean separately in the ammonia solution after completing the above procedures.
9. Rinse the complete spraying system with clean water.

WEEDS CONTROLLED

When applied as directed, Coyote will control or suppress the weeds listed in Tables 1 and 2.

If a significant rainfall does not occur within 7 days after a pre-emergence application, weed control may be decreased.

When weeds are stressed or not actively growing due to drought, heat, lack of fertility, flooding, or prolonged cool temperatures, post-emergence control can be reduced or delayed.

Table 1. Weeds Controlled or Partially Controlled Pre-emergence by Coyote

Common Name	Scientific Name	C = Control PC = Partial Control
Amaranth, Palmer	*Amaranthus palmeri*	C
Amaranth, Powell	*Amaranthus powellii*	C
Barnyardgrass	*Echinochloa crus-galli*	C
Buffalobur	*Solanum rostratum*	C
Carpetweed	*Mollugo verticillata*	C

Common Name	Scientific Name	C = Control PC = Partial Control
Cocklebur, common	*Xanthium strumarium*	PC
Crabgrass, large	*Digitaria sanguinalis*	C
Crowfootgrass	*Dactyloctenium aegyptium*	C
Cupgrass, prairie	*Eriochloa contracta*	C
Cupgrass, Southwestern	*Eriochloa acuminata*	C
Cupgrass, woolly	*Eriochloa villosa*	PC
Foxtail, giant	*Setaria faberi*	C
Foxtail, green	*Setaria viridis*	C
Foxtail, robust (purple, white)	*Setaria viridis*	C
Foxtail, yellow	*Setaria pumila*	C
Galinsoga	*Galinsoga parviflora*	C
Goosegrass	*Eleusine indica*	C
Jimsonweed	*Datura stramonium*	C
Johnsongrass, seedling	*Sorghum halepense*	PC
Kochia	*Kochia scoparia*	PC
Lambsquarters, common	*Chenopodium album*	C
Millet, foxtail	*Setaria italica*	C
Millet, wild proso	*Panicum miliaceum*	PC
Morningglory, ivyleaf	*Ipomoea hederacea*	PC
Morningglory, entireleaf	*Ipomoea hederacea*	PC
Nightshade, black	*Solanum nigrum*	C
Nightshade, Eastern black	*Solanum ptycanthum*	C
Nightshade, hairy	*Solanum sarachoides*	C
Nutsedge, yellow	*Cyperus esculentus*	C
Panicum, browntop	*Panicum fasciculatum*	C
Panicum, fall	*Panicum dichotomiflorum*	C
Panicum, Texas	*Panicum texanum*	PC
Pigweed, redroot	*Amaranthus retroflexus*	C
Pigweed, smooth	*Amaranthus hybridus*	C
Purslane, common	*Portulaca oleracea*	C
Pusley, Florida	*Richardia scabra*	C
Ragweed, common	*Ambrosia artemisiifolia*	PC
Ragweed, giant	*Ambrosia trifida*	PC
Rice, red	*Oryza sativa*	C
Sandbur, field	*Cenchrus incertus*	PC
Shattercane	*Sorghum bicolor*	PC
Sida, prickly	*Sida spinosa*	PC
Signalgrass, broadleaf	*Brachiaria platyphylla*	PC

Common Name	Scientific Name	C = Control PC = Partial Control
Smartweed, ladysthumb	*Polygonum persicaria*	C
Smartweed, Pennsylvania	*Polygonum pensylvanicum*	C
Sprangletop, red	*Leptochloa filiformis*	C
Velvetleaf	*Abutilon theophrasti*	C
Waterhemp, common	*Amaranthus rudis*	C
Waterhemp, tall	*Amaranthus tuberculatus*	C
Witchgrass	*Panicum capillare*	C

Table 2: Weeds Controlled or Partially Controlled by Post-emergence Applications of Coyote

When applied post-emergence, Coyote will provide control or partial control of small emerged broadleaf weeds (less than 3 inches) but will not provide consistent or effective control of weeds identified as resistant to post-emergence HPPD inhibitors.

Common Name	Scientific Name	C = Control PC = Partial Control
Amaranth, Palmer	*Amaranthus palmeri*	C
Amaranth, Powell	*Amaranthus powellii*	C
Buffalobur	*Solanum rostratum*	C
Carpetweed	*Mollugo verticillata*	C
Cocklebur, common	*Xanthium strumarium*	C
Dandelion	*Taraxacum officinale*	PC
Galinsoga	*Galinsoga parviflora*	C
Hemp	*Cannabis sativa*	C
Horsenettle	*Solanum carolinense*	C
Horseweed (marestail)	*Conyza canadensis*	C
Jimsonweed	*Datura stramonium*	C
Kochia	*Kochia scoparia*	PC
Lambsquarters, common	*Chenopodium album*	C
Morningglory, entireleaf	*Ipomoea hederacea*	PC
Morningglory, ivyleaf	*Ipomoea hederacea*	PC
Mustard, wild	*Brassica kaber*	C
Nightshade, black	*Solanum nugrum*	C
Nightshade, Eastern black	*Solanum ptycanthum*	C
Nightshade, hairy	*Solanum sarachoides*	C
Nutsedge, yellow	*Cyperus esculentus*	PC
Pigweed, redroot	*Amaranthus retroflexus*	C
Pigweed, smooth	*Amaranthus hybridus*	C
Pokeweed	*Phytolacca americana*	C
Potatoes, volunteer	*Solanum* spp.	C

Common Name	Scientific Name	C = Control PC = Partial Control
Purslane, common	*Portulaca oleracea*	PC
Pusley, Florida	*Richardia scabra*	C
Ragweed, common	*Ambrosia artemisiifolia*	C
Ragweed, giant	*Ambrosia trifida*	C
Sida, prickly	*Sida spinosa*	PC
Smartweed, ladysthumb	*Polygonum persicaria*	C
Smartweed, Pennsylvania	*Polygonum pensylvanicum*	C
Thistle, Canada	*Cirsium arvense*	PC
Velvetleaf	*Abutilon theophrasti*	C
Waterhemp, common	*Amaranthus rudis*	C
Waterhemp, tall	*Amaranthus tuberculatus*	C

ROTATIONAL CROPS

When Coyote is applied as directed on this label, follow the crop rotation intervals in Table 3. If Coyote is tank mixed with other products, follow the most restrictive product's crop rotation interval. The rotational interval is the time between application of Coyote and the planting of the next crop.

Table 3. Crop Rotational Intervals

Crop	Rotational Interval[1]
All corn types and grain sorghum[2]	Anytime
Cereals (barley, oats, rye, wheat)	4.5 months
Cotton, peanuts, potatoes, and soybeans	The spring following application
Beans (dry and snap), cucurbits, peas, red clover, sugar beets, tomatoes and all other rotational crops	18 months

[1]Time between application and planting of the rotational crop

[2] Grain sorghum must be seed treated with a safener to tolerate *S*-metolachlor

CORN USE DIRECTIONS

Apply Coyote for pre-emergence control of many annual grass and broadleaf weeds in field corn, seed corn, sweet corn and yellow popcorn. Coyote may also be applied post-emergence for the control of broadleaf weeds in field corn and seed corn. Do not apply Coyote to yellow popcorn or sweet corn after the crop has emerged, or crop injury may occur. Refer to Tables 1 and 2 for a list or weeds controlled or partially controlled by Coyote.

Coyote Application Timings

Burndown for Reduced Tillage Situations

In reduced or no-till corn and before the crop has emerged, Coyote can be applied alone or in tank mixture with Gramoxone Inteon, Touchdown brands, Roundup brands or other registered herbicide for burndown of existing weeds. Refer to Tables 1 and 2 for specific weeds controlled by Coyote. Read and follow all product labels for specific use directions and information on weeds controlled. Always follow the most restrictive directions for any product used in tank mixes.

Preplant and Pre-emergence

Coyote may be applied preplant (up to 14 days prior to planting) or pre-emergence in field corn, seed corn, sweet corn and yellow popcorn.

Post-emergence

Coyote may be applied in field or seed corn after emergence until the plants reach 30 inches in height or up to the 8-leaf stage of corn growth. Use only clean water as the carrier when applying Coyote after crop emergence. Do not apply post-emergence in liquid fertilizer or severe crop injury will occur. Do not apply Coyote to emerged yellow popcorn or sweet corn, or severe crop injury may occur. Always follow the most restrictive directions for any product used in tank mixes.

Adjuvants

Applications Prior to Corn Emergence

Any adjuvant approved for use with herbicides applied to corn may be used at a pre-emergence or preplant timing, i.e. where the corn crop has not yet emerged, to increase burndown activity on existing weeds.

Applications After Corn Has Emerged

When applying Coyote post-emergence to corn, add either a non-ionic surfactant (NIS) or crop oil concentrate (COC). When using a NIS, add at 0.25% v/v (1 qt./100 gals.). When using a COC, add at a rate of 1% v/v (1 gal./100 gals.) or the equivalent of 1 gal./100 gals. The use of COC will provide more consistent weed control than an NIS but may also result in temporary crop injury.

In addition to NIS or COC, a nitrogen based adjuvant may also be added to increase consistency of weed control. The use of nitrogen based adjuvants (AMS or UAN) will increase the risk of temporary crop injury.

Do not use methylated seed oil (MSO) with Coyote when applied alone to emerged field corn, or when Coyote is applied as a post-emergence tank mixture with other products.

Coyote Use Rates

Apply Coyote at a rate of 2.0-2.4 qts./A for control or partial control of the weeds listed in Tables 1 and 2. The soil organic matter content of the field on which Coyote is to be applied must be known.

Table 4. Coyote Use Rates in Corn

% Organic Matter	Coyote Use Rate
<3%	2.0 qts./A
≥3%	2.4 qts./A

Poor weed control may result if Coyote is applied on soils with greater than 10% organic matter.

Tank-Mix Combinations

Pre-emergence (Applied Before the Crop has Emerged)

Tank-mix partners listed in Table 5 may be used in conventional, reduced, or no-till systems and be applied by the same methods and at the same timings as Coyote unless otherwise specified in the tank-mix product label. Follow all instructions, precautions, and restrictions on tank-mix product labels.

It is the pesticide user's responsibility to ensure that all products are registered for the intended use. Read and follow the applicable restrictions, limitations, and directions for use on all product labels involved in tank mixing. Users must follow the most restrictive directions for use and precautionary statements of each product in the tank mixture.

Table 5: Coyote Tank Mixtures for Pre-emergence Applications in Corn

Tank Mix[1]	Objective
Solo atrazine products (eg. AAtrex®) atrazine products	Improved broadleaf and grass weed control
Gramoxone Inteon®)	Burndown existing weeds
Metribuzin solo products (eg.Tricor®, MetriCor®)	Improved broadleaf weed control
Simazine products (eg. Princep®)	Improved broadleaf and grass weed control
Glyphosate products (eg. Touchdown® , Roundup®)	Burndown existing weeds
2,4-D	Burndown existing weeds
Lambda-cyhalothrin insecticides (eg.Warrior II, Lambda-Cy)	To control insects, such as cutworm

[1]Refer to tank-mix product label for use rates.

Post-emergence (Applied After the Crop has Emerged)

Tank-mix products listed in Table 6 may be used in conventional, reduced, or no-till systems and be applied by the same methods and at the same timings as Coyote unless otherwise specified in the tank-mix product label. Follow all instructions, precautions, and restrictions on tank-mix product labels. Perform a compatibility test.

Table 6: Coyote Tank Mixtures for Post-emergence Applications in Field Corn

Tank Mix[1,2]	Objective
Solo atrazine products (eg. AAtrex®)	Improved broadleaf and annual grass weed control
Rimsulfuron products (eg. Accent® Q , Basis®)	Emerged grass control
Solo glufosinate products (eg. Liberty® / Interline® / Ignite®)	See instructions under “Coyote Programs in LibertyLink® Corn” section of this label
NorthStar®	Improved broadleaf and grass weed control
Peak®	Improved broadleaf and grass weed control
Resolve® Q	Emerged grass control
Glyphosate products approved for use on Roundup Ready® corn (eg. Roundup Brands, Touchdown)	See instructions under “Coyote Programs in glyphosate tolerant Corn” section of this label
Spirit®	Improved broadleaf and grass weed control
Status®	Emerged grass control
Steadfast® Q	Emerged grass control
Lambda-cyhalothrin insecticides (eg.Warrior II, Lambda-Cy)	To control insects, such as cutworm

[1]Refer to tank-mix product label for use rates.
[2]Consult the “Mixing Procedures” section of this label for further information when applying Coyote in tank mixture to emerged field corn.

Coyote Programs in Glyphosate Tolerant Corn

Coyote may be applied post-emergence at a reduced rate (but not lower than 1.6 qts./A) in tank mixture with a solo glyphosate product (e.g. Touchdown or Roundup brands) that is registered for use over-the-top in glyphosate tolerant field corn (e.g. Roundup Ready or Agrisure® GT Corn). To minimize weed competition with the crop, target the application of this mixture to weeds in the 1 to 2 inch range. If the glyphosate product has a built-in adjuvant system (i.e. the product label does not ask for additional adjuvant), only spray-grade ammonium sulfate (AMS) at 8.5 lbs./100 gal. may be added to this mixture. If the glyphosate product label calls for an adjuvant in addition to AMS, add a non-ionic surfactant (NIS) at 0.25% v/v and AMS to this spray mixture. Do not add urea

ammonium nitrate (UAN), crop oil concentrate (COC), or methylated seed oil (MSO) type adjuvants to these mixtures, or crop injury may occur. Follow all directions for use and restrictions on the glyphosate product label.

Alternatively, Coyote may be applied pre-emergence at a reduced rate (but not lower than 1.6 qts./A) as part of a two-pass weed control system when followed by a post-emergence application of a glyphosate based product in glyphosate tolerant corn (e.g. Roundup Ready or Agrisure GT Corn). When used in this way, Coyote will provide reduced competition of the weeds listed in Table 1 for a period of 30 or more days, thus improving the timing flexibility and effectiveness of the glyphosate based product application. Follow all directions for use and restrictions on the glyphosate product label.

Coyote may be applied pre-emergence at 1.0-1.2 qts./A as part of a two-pass weed control system when followed by Halex™ GT in glyphosate tolerant corn (e.g. Roundup Ready or Agrisure GT Corn). Apply Coyote at 1.0 qt/A on soils with <3% OM and 1.2 qt/A on soils with ≥3% OM. Follow all directions for use and restrictions on each product label.

Coyote Programs in LibertyLink Corn

Coyote may be applied post-emergence at a reduced rate (but not lower than1.6 qts./A) in tank mixture with glufosinate products (e.g. Liberty, Interline, Ignite)and applied over-the-top in field corn designated as LibertyLink. To minimize weed competition with the crop, target the application of this mixture to weeds in the 1 to 2 inch range. Ammonium sulfate (AMS) may be added as a spray adjuvant as directed on the glufosinate label. However, AMS must be the only adjuvant added to this tank mixture. Do not add urea ammonium nitrate (UAN), crop oil concentrate (COC), non-ionic surfactants (NIS), or methylated seed oil (MSO) type adjuvants to these mixtures, or crop injury may occur. Follow all directions for use and restrictions on the glufosinate product label.

Alternatively, Coyote may be applied pre-emergence at a reduced rate (but not lower than 1.6 qts./A) as part of a two-pass weed control system when followed by a post-emergence application of glufosinate products (e.g. Liberty, Interline, Ignite) in field corn designated as LibertyLink. When used in this way, Coyote will provide reduced competition of the weeds listed in Table 1 for a period of 30 or more days, thus improving the timing flexibility and effectiveness of the glufosinate application. Follow all directions for use and restrictions on the glusosinate product label.

Restrictions for all Corn Uses

- Do not apply more than 2.4 qts. of Coyote per acre per year.
- Do not apply Coyote to corn that is greater than 30 inches tall or corn that is larger than the 8-leaf stage of growth.
- Do not graze or feed corn forage from treated areas for 45 days following post-emergence application.
- Do not harvest corn for forage, grain, or stover within 45 days after a post-emergence application of Coyote.
- Do not make post-emergence applications of Coyote in a tank mix with any organophosphate or carbamate insecticide, or severe corn injury may occur.

Precautions for all Corn Uses

Coyote applied post-emergence to corn that has received an at-planting application of Counter® or other organophosphate insecticide can result in severe corn injury. Environmental conditions that favor poor or slow corn growth will increase the risk or severity of the corn injury.

Post-emergence corn applications of any organophosphate or carbamate insecticide within 7 days before or 7 days after a Coyote application can result in severe corn injury. Environmental conditions that favor poor or slow corn growth will increase the risk or severity of the corn injury.

GRAIN SORGHUM USE DIRECTIONS

Coyote can be applied preplant nonincorporated (up to 21 days before planting) up through pre-emergence for weed control in sorghum that was seed-treated with a safener that provides tolerance to *S*-metolachlor (e.g. Concep® III). For a listing of weeds controlled or partially controlled, refer to Table 1.

Apply Coyote at a rate of 2.0 qts./A as a broadcast nonincorporated spray beginning at 21 days before planting and up through planting but before sorghum emergence. Applying Coyote less than 7 days before sorghum planting will increase the risk of crop injury, especially if irrigation or rainfall is received following the application. Injury symptoms include temporary bleaching of newly emerging sorghum leaves or, in extreme conditions, stunting or partial stand loss. Applying Coyote more than 7 days (but not more than 21) prior to sorghum planting will reduce the risk of crop injury.

If Coyote is applied before planting, minimize disturbance of the herbicide-treated soil barrier during the planting process in order to lessen the potential for poor weed control in the disturbed soil zone.

Coyote may also be applied as a split application to grain sorghum. For a split application program, apply 1.0-1.25 qts./A of Coyote as a non-incorporated preplant (7-21 days before planting), followed by a second Coyote application at a rate of 0.75-1.0 qts./A as a pre-emergence application prior to sorghum emergence. The total amount of Coyote applied in the split application program cannot exceed 2.0 qts./A.

If weeds are present at the time of application, add a nonionic surfactant (NIS) type adjuvant at a rate of 0.25% v/v **or** a crop oil concentrate (COC) at a rate of 1% v/v to the spray solution. In addition to COC or NIS, a spray grade UAN at a rate of 2.5% v/v **or** AMS at a rate of 8.5 lbs./100 gals. of spray may be added to the solution for improved control of emerged weeds. If weeds are not emerged at the time of application, no additives are required.

Restrictions for Grain Sorghum Uses

- Do not apply more than 2.0 quarts of Coyote per acre per year.
- Do not apply Coyote to sorghum grown on sandy soils (sand, sandy loam, or loamy sand).
- Do not apply Coyote to emerged grain sorghum or severe injury will occur.
- Do not use Coyote in the production of forage sorghum, sweet sorghum (sorgo), sudangrass, sorghum-sudangrass hybrids, or dual-purpose sorghum.
- Sorghum seed must be treated with a seed safener that provides tolerance to *S*-metolachlor (e.g. Concep III) prior to planting, or severe crop injury may occur.
- In the state of Texas, do not apply Coyote to sorghum grown south of Interstate 20 (I-20) or east of Highway 277.

STORAGE AND DISPOSAL

Do not contaminate water, food, or feed by storage or disposal.

Pesticide Storage

Keep container tightly closed when not in use. Do not store near seeds, fertilizers, or food stuffs. Do not store below 32°F. Keep away from heat and flame.

Pesticide Disposal

Open dumping is prohibited. Waste resulting from the use of this product may be disposed of on site or at an approved waste disposal facility. Rinse spray equipment. Pesticide wastes are acutely hazardous. Improper disposal of excess pesticide, spray mixture, or rinsate is a violation of Federal law. If these wastes cannot be disposed of as described above, contact your State Pesticide or Environmental Control Agency, or the Hazardous Waste Representative at the nearest EPA Regional Office for guidance.

Container Handling [less than 5 gallons]

Non-refillable container. Do not reuse or refill this container. Offer for recycling if available. Triple rinse container (or equivalent) promptly after emptying. Triple rinse as follows: Empty the remaining contents into application equipment or a mix tank. Drain for 10 seconds after the flow begins to drip. Fill the container 1/4 full with water and recap. Shake for 10 seconds. Pour rinsate into application equipment or a mix tank or store rinsate for later use and disposal. Drain for 10 seconds after the flow begins to drip. Repeat this procedure two more times. Then offer for recycling if available or puncture and dispose of in a sanitary landfill, or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

Container Handling [greater than or equal to 5 gallons]

Refillable container. Refill this container with pesticide only. Do not reuse this container for any other purpose. Cleaning the container before final disposal is the responsibility of the person disposing of the container. Cleaning before refilling is the responsibility of the person refilling. To clean container before final disposal, empty the remaining contents from this container into application equipment or mix tank. Fill the container about 10 percent full with water. Agitate vigorously or recirculate water with the pump for 2 minutes. Pour or pump rinsate into application equipment or rinsate collection system. Repeat this rinsing procedure two more times. Then offer for recycling if available or puncture and dispose of in a sanitary landfill, or by incineration, or by other procedures approved by state and local authorities.

DO NOT USE CONTAINERS FOR THE STORAGE OF FOOD, FEED, OR DRINKING WATER

IMPORTANT INFORMATION

READ BEFORE USING PRODUCT

CONDITIONS OF SALE AND LIMITATION OF WARRANTY AND LIABILITY

NOTICE: Read the entire Directions for Use and Conditions of Sale and Limitation of Warranty and Liability before buying or using this product. If the terms are not acceptable, return the product at once, unopened, and the purchase price will be refunded.

The Directions for Use of this product reflect the opinion of experts based on field use and tests, and must be followed carefully. It is impossible to eliminate all risks associated with the use of this product. Crop injury, ineffectiveness or other unintended consequences may result because of such factors as manner of use or application, weather or crop conditions, presence of other materials or other influencing factors in the use of the product, which are beyond the control of UPL NA Inc. or Seller. Handling, storage, and use of the product by Buyer or User are beyond the control of UPL NA Inc. and Seller. To the extent consistent with applicable law, all such risks shall be assumed by Buyer and User, and Buyer and User agree to hold UPL NA Inc. and Seller harmless for any claims relating to such factors.

TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, UPL NA INC. AND SELLER MAKE NO WARRANTIES OF MERCHANTABILITY OR OF FITNESS FOR A PARTICULAR PURPOSE NOR ANY OTHER EXPRESS OR IMPLIED WARRANTY EXCEPT AS STATED ON THIS LABEL.

To the extent consistent with applicable law, UPL NA Inc. or Seller shall not be liable for any incidental, consequential or special damages resulting from the use or handling of this product and **THE EXCLUSIVE REMEDY OF THE USER OR BUYER, AND THE EXCLUSIVE LIABILITY OF UPL NA INC. AND SELLER FOR ANY AND ALL CLAIMS, LOSSES, INJURIES OR DAMAGES (INCLUDING CLAIMS BASED ON BREACH OF WARRANTY, CONTRACT, NEGLIGENCE, TORT, STRICT LIABILITY OR OTHERWISE) RESULTING FROM THE USE OR HANDLING OF THIS PRODUCT, SHALL BE THE RETURN OF THE PURCHASE PRICE OF THE PRODUCT OR, AT THE ELECTION OF UPL NA INC. OR SELLER, THE REPLACEMENT OF THE PRODUCT.**

UPL NA Inc. and Seller offer this product, and Buyer and User accept it, subject to the foregoing conditions of sale and limitations of warranty and of liability, which may not be modified except by written agreement signed by the duly authorized representative of UPL NA Inc.