# Mixing and Compatibility Guide



Overwatch® Herbicide has been tested and is physically compatible in a two way mix with most commonly used crop establishment herbicides and insecticides. To ensure successful tank mixing and application, it is important to use the correct mixing order, follow sound mixing practices and avoid over filtering. If the intended tank mix is not listed in the table below, carefully perform a compatibility jar test to help determine any potential physical incompatibility OR compatibility issues before mixing at full scale.

This is particularly important when the tank mix consists of more than two products.

### Top Tips for Mixing and Compatibility

- ▼ Take your time and be patient. Many incompatibility issues and mixing problems are caused simply by rushing the process. Trying to add all your products into the spray tank before it fills should not be your objective when undertaking complex mixes.
  - Fill the spray tank to 70% of its capacity with water before introducing any products. Starting with more water will increase the chance of a successful tank-mix.
  - Allow enough time for products to fully disperse in the tank before adding the next product.
  - Effective agitation when filling, in transit and spraying is critical as it improves compatibility and prevents settling.
  - FMC recommends using a spray volume of no less than 80 L/ha.
- Over filtering may cause sprayline blockages
  Check the recommended in-line filtration is appropriate for the nozzle being used. FMC recommends no finer than 50 mesh in-line and nozzle filters and 02 nozzles or greater (e.g. 025, 03, etc) when using Overwatch® Herbicide.
- Simplify the mix.
  - The complexity of the chemistry and potential for mixing issues increases with each additional component.

- Only ever add one product at a time when filling. Always add products to water. Never add neat products together.
- Not all products are created equal:
  - There are minor (and sometimes major) differences between formulations of products with the same active ingredient.
  - Overwatch® Herbicide is not physically compatible with most high-load glyphosate formulations present as the potassium salt.
  - FMC recommends using quality products from reputable manufacturers.
  - Understand the formulation types of each product being mixed and adhere to mixing order recommendations as described in the table below.
- When Overwatch® Herbicide is applied in conjunction with other herbicides refer to label for further details. It is the responsibility of the end-user to understand all risks associated with using other herbicides in a tank-mix with Overwatch® Herbicide. Ensure that all precautions on the label of the tank mix partner are closely followed.

# **Recommended Mixing Order**

Step	Mixing Sequence	Product examples	Tips
1	Clean tank and flush lines as per the most rigorous cleaning method stated on previous mix products label		The residual product in lines may be enough to cause antagonism, resulting in filter blockages
2	Fill tank to 70% capacity maintaining constant agitation. DO NOT over agitate!		Use best available water source and maintain tank agitation when filling
3	Add water conditioners	Ammonium sulphate	Avoid oil based products
4	Add Water Dispersible Granules (WG) or Dry flowable products (DF)	Rustler® 900 WG, Sharpen#, Sakura# 850 WG, Simanex# WG, Atrazine 900 WG	Add slowly and fully disperse granules before adding the next product
5	Add Flowable or Suspension Concentrates (SC)	Overwatch® Herbicide, Rustler® SC,	Add slowly to tank
6	Add Emulsifiable Concentrates (EC)	Hammer®, Trifluralin, Tri-allate, Dual Gold#, Boxer Gold#, Countdown#	Add slowly. Solvent based products still require time to fully disperse in the tank
7	Fill tank to 90% capacity with good agitation		
8	Add Water Soluble Concentrates (SL)	Nufarm Glyphosate 450 SL, Paraquat 250, Amicide# Advance, Spray.Seed#	It is critical to add these products only when all other products are fully dispersed in the tank
9	Add Surfactants and oils	Parachute®, BS1000#, Uptake#	Note: Gramoxone# PRO has a different mixing order to other paraquat products
10	Fill tank to 100% and maintain good agitation		Do not allow mixtures to settle or stand for prolonged periods





# Overwatch® Herbicide Compatibilities

Product formulations listed may have changed since physical compatibility testing was conducted. These changes are outside FMC's control and may make the new formulation physically incompatible with Overwatch® Herbicide. FMC recommends applying all tank mixes under constant agitation. Physical compatibility does not always guarantee biological compatibility and should be undertaken only after careful consideration.

Product	Product Active Ingredient	Product Formulation Type	Physical Compatibility with Overwatch® Herbicide
Herbicides			
Adama Diuron 900 WG	Diuron	WG	Compatible
Amicide <sup>#</sup> Advance 700	2,4-D Amine	SL	Compatible
Avadex Xtra <sup>#</sup>	Tri-allate	EC	Compatible
Boxer Gold <sup>#</sup>	Prosulfocarb, S-metolachlor	EC	Compatible
Tenet <sup>#</sup> 500	Metazachlor	SC	Compatible
Countdown <sup>#</sup>	Prosulfocarb	EC	Compatible
Crucial <sup>#</sup>	Glyphosate (Potassium, mono-methylamine and mono-ammonium salts)	SL	Constant agitation required
Devrinol-C <sup>#</sup> WG 500	Napropamide	WG	Not compatible
Dropzone <sup>#</sup>	2,4-D Amine	SL	Not compatible
Dual Gold <sup>#</sup>	S-metolachlor	EC	Compatible
Gladiator <sup>#</sup> CT	Glyphosate (Isopropylamine salt)	SL	Constant agitation required
Gladiator OptiMAX	Glyphosate (Potassium salt)	SL	Not compatible
Gramoxone# 360 Pro	Paraquat	SL	Constant agitation required
Hammer <sup>®</sup> 400 EC	Carfentrazone	EC	Compatible
Impose <sup>#</sup>	Imazapic	SL	Compatible
Ken-Trel <sup>#</sup> 300	Clopyralid	SL	Compatible
Knockout Extreme <sup>#</sup> 540	Glyphosate (Potassium salt)	SL	Constant agitation required
	j. , , , , , , , , , , , , , , , , , , ,	SL	
Liberty# Herbicide	Glufosinate-ammonium		Compatible
Mentor# WG	Metribuzin	WG	Compatible
Panzer 540K	Glyphosate (Potassium salt)	SL	Not compatible
Roundup <sup>#</sup> UltraMAX	Glyphosate (Potassium salt)	SL	Not compatible
Reflex <sup>*</sup>	Formesafen	SL	Compatible
Rustler Selective Herbicide	Propyzamide	SC	Compatible
Rustler 900 WG Herbicide	Propyzamide	WG	Compatible
Sakura <sup>‡</sup> 850 WG	Pyroxasulfone	WG	Compatible
Sakura <sup>#</sup> Flow	Pyroxasulfone	SC	Compatible
Sharpen <sup>#</sup>	Saflufenacil	WG	Compatible
Shirquat <sup>#</sup> 250	Paraquat	SL	Compatible
Simanex <sup>#</sup> 900 WG	Simazine	WG	Compatible
Spray.Seed <sup>#</sup> 250	Diquat, Paraquat	SL	Compatible
Terbyne <sup>#</sup> Xtreme 875WG	Terbuthylazine	WG	Compatible
Trilogy <sup>#</sup>	Trifluralin	EC	Compatible
Triflur <sup>#</sup> X	Trifluralin	EC	Compatible
Ultro <sup>#</sup>	Carbetamide	WG	Constant agitation required
Valor# 500 WG	Flumioxazin	WG	Compatible
Weedmaster ARGO	Glyphosate (Potassium and isopropylamine salts)	SL	Constant agitation required
Weedmaster DST	Glyphosate (Potassium and mono-ammonium salts)	SL	Constant agitation required
Insecticides	dispriosate (i otassiam and mono animoniam saits)	OL	Constant agitation required
Imidan <sup>#</sup>	Phosmet	EC	Compatible
Le-mat <sup>#</sup> 290 SL	Omethoate	SL	Compatible
Pyrinex Super Insecticide			
	Chlorpyrifos, Bifenthrin	EC	Compatible
Talstar® 250 EC	Bifenthrin	EC	Compatible
Trojan® Insecticide	Gamma-cyhalothrin	CS	Compatible
Adjuvants / Other			100000000000000000000000000000000000000
Hot-Up <sup>#</sup>			Not compatible
Hasten ** Spray Adjuvant			Constant agitation required
Spreadwet <sup>#</sup> 1000			Compatible
Outright <sup>#</sup> 770			Not compatible
On Coarse® DRA (Drift Reducing Agent)			Compatible

<sup>\*</sup>Contact your local FMC representative if requiring further compatibility advice. \*\*This document will be updated periodically with additional mix partners as new supporting data becomes available.

For further details, visit ag.fmc.com/au ALWAYS READ AND FOLLOW LABEL DIRECTIONS. FMC, the FMC logo, Overwatch, Rustler, Parachute, Hammer, Talstar, Trojan and On Coarse are registered trademarks of FMC Corporation and/or an affiliate.© 2024 FMC Corporation. All rights reserved. 01/2024. # Non FMC Trademarks.



