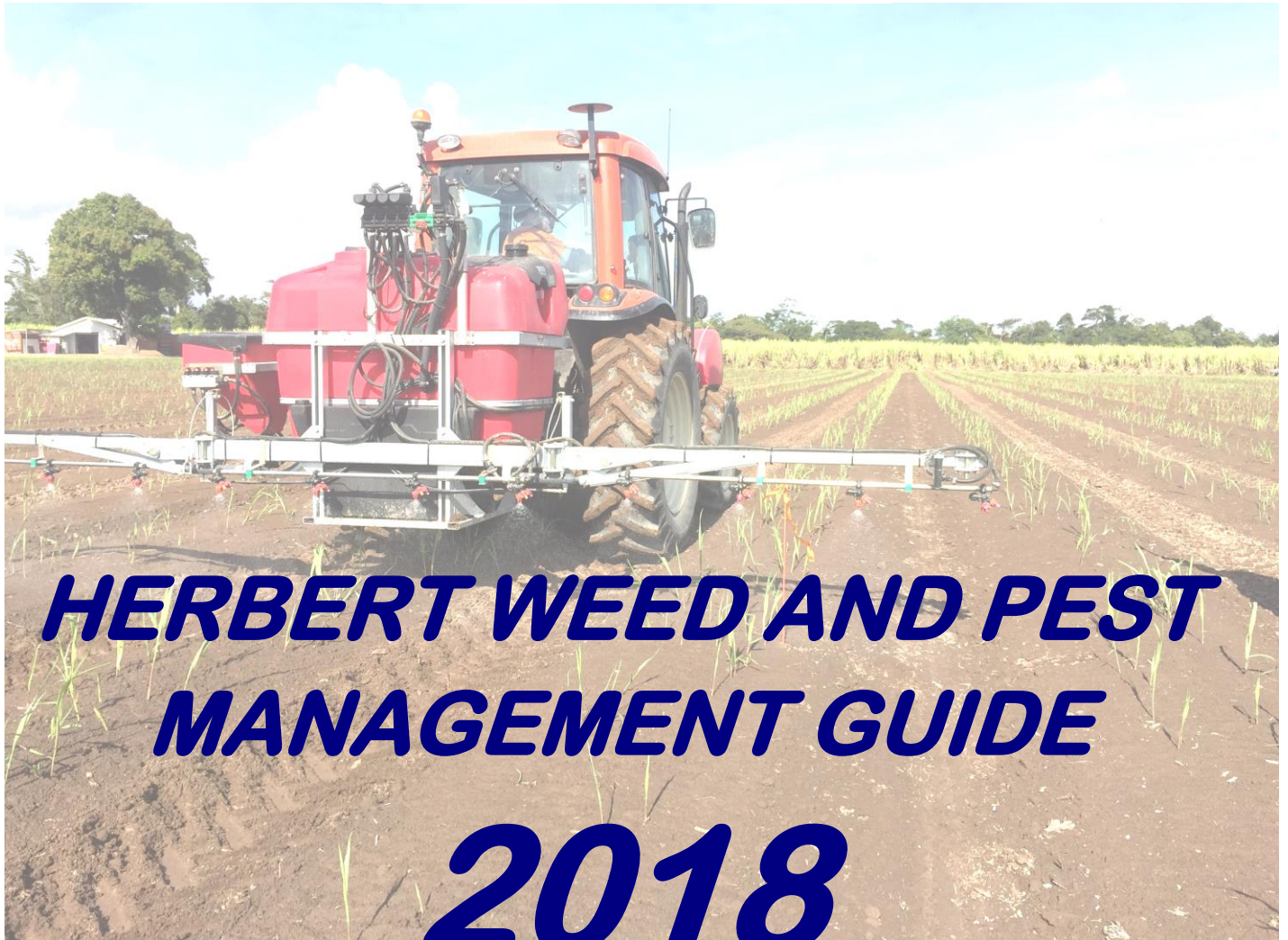




HCPSL

Herbert Cane Productivity Services Ltd.



**Do not apply unregistered herbicides / pesticides to
or within your sugarcane crop**

*Costing are based on information as at March 2017
Prices are a guide only and can be used to compare the likely
cost of treatment options*


*There may be other suitable products registered for use in cane in
Queensland which are not included in the following document.*

*To view the full list of registered products for use in cane in
Queensland refer to the APVMA website*

BROADLEAF WEED CONTROL

(GST inclusive)

Situation	Herbicide	Rate	Cost/ha	Water Rate L/ha
Broadleaf weeds	Atrazine 900 WG +2,4-D Amicide® Advance 700	1.1 – 2.2kg/ha + 1.2 L/ha	\$17 - \$26	110 – 250
	MCPA 750 +Dicamba 700 WG (Na salt)	0.93L/ha +0.56kg/ha	\$31	100 – 250
	MCPA 750 +Starane™ Advanced	0.93L/ha + 0.8L/ha	\$34	100 – 400
	Dicamba 500 +Atrazine 900 WG	0.28L – 0.32L/ha +1.0 kg/ha	\$17- \$18	100 – 250
	Dicamba 500 +2,4-D Amicide® Advance 700	0.56L/ha + 0.7L/ha	\$21	100 – 250
Broadleaf weeds + sicklepod	Dicamba 700 WG (Na salt) + Atrazine 900 WG	0.74kg/ha + 1.1kg	\$???	100 - 250
	Valor®500 WG + Atrazine 900 WG	90g – 120g/ha + 1.5kg/ha	\$27 - \$33	250 +
Hard to kill broadleaves, vines	2,4-D Amicide® Advance 700 + Starane™ Advanced +Atrazine 900 WG	1 – 1.5L/ha 0.8L/ha +1.1 – 2.2kg/ha	\$36 - \$47	100 +
Broadleaf weeds, vines & GSP	Starane™ Advanced +2,4-D Amicide® Advance 700	0.8 L/ha + 0.7L/ha	\$25	100 – 400
	Starane™ Advanced +Atrazine 900 WG	0.8L/ha + 1.1 – 2.2 kg/ha	\$29 - \$37	100 – 400
Milkweed + other broadleaf weeds	Starane™ Advanced +Atrazine 900 WG	1.8 L/ha + 2 kg/ha	\$62	100 – 400
For sicklepod	Tordon™ 75-D + 2,4-D Amicide® Advance 700	0.8L/ha + 0.7L/ha	\$17	200 +
For large sicklepod	Tordon™ 75-D + 2,4-D Amicide® Advance 700 + Starane™ Advanced	0.8 L/ha + 0.7 L/ha + 0.8 L/ha	\$37	200 +
Broadleaf weeds & some grass (over the top of cane up to the 6-leaf stage or as a directed spray)	Krismat® WG + 2,4-D Amicide® Advance 700	1.5kg/ha +0.7L/ha	\$60	150 -250
Grass & broadleaf weeds (Directed application)	Barrage / Bobcat® Combi WG + Gramoxone® 250	0.9kg/ha + 1.2-1.6L/ha	\$28 - \$32	250 – 350
Grass & broadleaf weeds (Directed application)	Gramoxone® 250 + Diuron 900 DF + 2,4-D Amicide® Advance 700	1.6 L/ha + 0.5 kg/ha + 0.7 L/ha	\$25	250 –
Small grass & broadleaf weeds. (may cause phytotoxicity)	Gesapax Combi® 500 SC + Diuron 900 DF	6.0 L/ha +0.5 kg/ha	\$33	250 – 400

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PRE- EMERGENT WEED CONTROL

Add Gramoxone® 250 when weeds are present (Directed application)

<i>GST Inclusive</i>				
Situation	Herbicide	Rate	Cost/ha	Water Rate L/ha
Grasses & Broadleaf weeds	Stomp® Xtra + Atrazine 900 WG	2.2 -3.3L/ha +1.7 – 2.2 kg/ha	\$48 - \$69	200 +
Grasses & Broadleaf weeds Add knockdowns for larger weeds (Directed application)	Gesapax Combi® 500 SC	6 – 8L/ha	\$26 - \$35	110+
	Flame® 240 + Atrazine 900 WG	300 – 400ml/ha +2.2 kg/ha	\$35 - \$41	200 +
	Flame® 240 + Stomp® Xtra	300 – 400ml/ha +2.2 lt/ha	\$52 - \$67	200 +
	Balance® 750 WG + Atrazine 900 WG	200g/ha +2.2 kg/ha	\$46	250 +
	Balance® 750 WG + Diuron 900 DF	200g/ha +0.5 kg/ha	\$31	250 +
	Mentor® WG (Soccer, Tomahawk, Metribuzin) + Balance® 750 WG	0.64kg – 2.0kg/ha + 150 – 200g/ha	\$42 - \$92	250 +
	Mentor® WG (Soccer, Tomahawk, Metribuzin) + Stomp® Xtra	0.64kg – 2.0kg/ha +2.2L/ha	\$64 - \$98	250 +
	Mentor® WG (Soccer, Tomahawk, Metribuzin) +Ametrex® 800 WG	0.64kg – 2.0kg/ha +2 kg/ha	\$67 - \$111	250 +
	Mentor® WG (Soccer, Tomahawk, Metribuzin) +Diuron 900 DF	0.64kg – 2.0kg/ha +0.5 kg/ha	\$26 - \$70	250 +
	Bobcat® i-MAXX + Gramoxone® 250	2.9L - 3.8L + 1.6L	\$57 - \$86	400 – 600
	Krismat® wg + Diuron 900 DF	1.5 – 2.0kg/ha +0.5 kg/ha	\$61 - \$80	250 – 400
	Metolachlor 960 EC (Clincher Plus, Chaser) + Atrazine 900 WG	2.175 – 2.7L/ha +1.5 – 2.0 kg/ha	\$31 - \$40	110 +
	Metolachlor 960 EC (Clincher Plus, Chaser) + Diuron 900 DF	2.175 – 2.7L/ha + 0.5kg/ha	\$26 - \$30	250 - 400
	Metolachlor 960 EC (Clincher Plus, Chaser) + Ametrex® 800 WG	2.175 – 2.7L/ha + 1.1kg/ha	\$45 - \$50	100 +
	DUAL GOLD 960 + Atrazine 900 WG	1.45 – 1.8L/ha + 2-2.5kg/ha	\$36 - \$45	110 +
	DUAL GOLD 960 + Mentor® 700 WG (Soccer, Tomahawk, Metribuzin)	1.8L/ha +1.5kg/ha	\$73	250 +
	Valor®500 WG	350g – 700g/ha	\$60 - \$120	200 +


Aim for water rates of a minimum of 200 + lt/ha for pre-emergence herbicides.

INTER ROW WEED MANAGEMENT

<i>GST Inclusive</i>				
Situation	Herbicide	Rate	Cost/ha	Water Rate L/ha
Grasses & Broadleaf weeds <i>Inter row application with a shielded or hooded sprayed or Blair Spray bar (Directed application)</i>	Weedmaster ARGO 540	1.2 – 5L/ha	\$9 - \$38	80
	Roundup Ultramax	1.1 – 4.7l/ha		80
	DalaPon740 SP(2,2-DPA)	4.0 – 10.0 kg/ha	\$86 - \$215	150 – 300
Grasses & Broadleaf weeds <i>Inter row application with a shielded or hooded sprayed</i>	Basta	1L – 5L	\$15 - \$76	300 – 500
Grasses & Broadleaf weeds <i>Directed application ONLY-Blair Spray bar</i>	Basta	1L – 3L	\$15 - \$45	300 - 500
Sour Grass control (for patches only) (Directed application)	DalaPon740 SP(2,2-DPA) + Daconate® 800 (MSMA)	5.0kg/ha +3L/ha	\$151	300 +

NUT GRASS CONTROL (In crop)

<i>(GST inclusive)</i>				
Situation	Herbicide	Rate	Cost/ha	Water Rate L/ha
Blanket application	Sempra® Herbicide	65 – 130g/ha	\$44 - \$ 88	80 +
Directed application	Krismat® WG +2,4-D Amicide® Advance 700	1.5kg/ha +0.7L/ha	\$60	150 – 250

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SPOT SPRAYING

Situation	Herbicide	Rate
Perennial grasses (including guinea grass)	Barrage / Bobcat® Combi WG	1 kg/ 100L of water
Perennial grasses (including guinea grass)	Daconate® (MSMA) (Best results in hot dry conditions with Temperature above 25° C)	1.1 L/ 100 L of water
Perennial grasses (including guinea grass)	Daconate® (MSMA) + Barrage / Bobcat® Combi WG (Best results in hot dry conditions with Temperature above 25° C)	1.1 L + 0.9 kg/ 100L of water
Perennial grasses (including guinea grass)	Glyphosate 540 K	0.9 – 1.3 L/100L of water
Sicklepod	Tordon™ 75-D +2,4-D Amine 625	300ml + 150ml/ 100L of water
Perennial grasses (Including guinea grass and vines)	Asulox® + Actril® DS (needs temperature above 17° C & 80% humidity for best results)	2L + 200mls / 100 L of water
Perennial grasses (including guinea grass, couch grass, phragmites & sorghum)	DalaPon740 SP(2,2-DPA) <i><u>Follow up spraying may be necessary thoroughly wet plant - high water rate</u></i>	1Kg/ 100L of water
Perennial grasses (including guinea grass, couch grass, phragmites & sorghum)	DalaPon740 SP(2,2-DPA) + Daconate® 800(MSMA) <i><u>Follow up spraying may be necessary thoroughly wet plant - high water rate</u></i>	1kg +1.1L/100L of water
Perennial grasses (including guinea grass stools, couch grass, phragmites & sorghum)	DalaPon740 SP(2,2-DPA) + Daconate® 800(MSMA) <i><u>Follow up spraying may be necessary thoroughly wet plant - high water rate</u></i>	2kg +3L/100L of water
Perennial grasses (including guinea grass)	Krismat® WG + Daconate® 800 (MSMA)	2kg +3L/ 100L of water
Perennial grasses (including guinea grass)	Daconate® 800 (MSMA) + Balance® 750 WG	1L +50g/100L of water
Perennial grasses (including guinea grass)	Mentor® 700 WG + Balance® 750 WG + Daconate® 800(MSMA)	2kg +200g +2L

Spot Spraying

Follow up spraying may be necessary to achieve a good control

When using DalaPon (2,2-DPA) use very high water rates thoroughly wet target 1000L/ha

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GENERAL WEED CONTROL

“Salvage Operation”


Established Grass and broadleaf weeds in Ratoon (>10cm tall)

			<i>(GST inclusive)</i>	
Situation	Herbicide	Rate	Cost/ha	Water Rate L/ha
Can be applied over cane (4-5 leaf stage or larger) <ul style="list-style-type: none"> Will burn cane foliage 	Daconate® 800 (MSMA) + Diuron 900 DF	3L/ha + Diuron 0.5kg/ha	\$50	300 +
Can be applied over cane <ul style="list-style-type: none"> May burn cane foliage 	Asulox® + 24-D Amicide Advance 700	5.5 – 8.5 L/ha +1.5 L/ha	\$126 - \$189	200 - 400

Small Grass (3-4 leaf), broadleaf weeds and vines

<i>(GST inclusive)</i>				
Situation	Herbicide	Rate	Cost/ha	Water Rate L/ha
Can be used over cane <ul style="list-style-type: none"> Burns cane foliage Up to 6 weeks' pre-em 	Gesapax Combi® 500 SC + Diuron 900 DF +2,4-D Amicide® Advance 700	6 L/ha +0.5 kg/ha +0.8L/ha	\$40	250 – 400
Can be used over cane <ul style="list-style-type: none"> * 4-5 leaf stage * Burns cane foliage 	Ametrex® 800 WG + 2,4-D Amicide® Advance 700	2 – 2.5kg/ha + 1.6L/ha	\$58 - \$70	100 – 250
Can be used over small cane <ul style="list-style-type: none"> ➤ May burn cane foliage 	Krismat® WG +2,4-D Amicide® Advance 700	1.5 – 2.0kg/ha +0.7L/ha	\$60 - \$79	150 – 250


<i>(GST inclusive)</i>				
Situation	Herbicide	Rate	Cost/ha	Water Rate L/ha
Cane early spiking or as directed	Gramoxone®250	1.2 – 1.6 L/ha	\$9 - \$12	250 – 350
	Sprayseed®250	1.6 – 3.2 L/ha	\$18 - \$36	150 – 200
	Gramoxone®250 + Diuron 900 DF	1.2 – 1.6 L/ha + 0.5 kg/ha	\$15 - \$18	250 - 350
	Daconate® 800 (MSMA)	3.0 – 6.0 L/ha	\$43 - \$ 86	300 +
	Daconate® 800 (MSMA) + Diuron 900 DF	3.0 L/ha +0.5 kg/ha	\$49	300 +
	Ametrex® 800 WG	2.8 kg/ha	\$66	100 +
	Mentor® 700 WG +Gramoxone®250	0.85 kg/ha +1.2 L/ha	\$36	250 - 350

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FALLOW MANAGEMENT/RATOON SPRAYOUT

Situation	Herbicide	Rate	<i>(GST Inclusive)</i>	
			Cost/ha	Water Rate L/ha
Cane control in Fallows Cane should be fully emerged and actively growing (+ annual and perennial weeds)	Weedmaster® DST 470	4.6 – 6.9L/ha	\$29 - \$44	80 +
Follow up Cane control in Fallows Cane should be fully emerged and actively growing (+ annual and perennial weeds)	Weedmaster® DST 470	3.5L/ha	\$22	80 +
Cane control in Fallows Cane should be fully emerged and actively growing (+ annual and perennial weeds)	Weedmaster® ARGO® 540	4 – 6L/ha	\$31 - \$46	80 +
Follow up Cane control in Fallows Cane should be fully emerged and actively growing (+ annual and perennial weeds)	Weedmaster® ARGO® 540	3.0 L/ha	\$23	80 +
If broadleaf weeds are present add a compatible broadleaf herbicide such as 2,4-D Advance 700 or Starane® Advanced <u>or both</u>				
Broad spectrum control in Fallows (annual grass, vines, sicklepod etc)	Sprayseed® 250 + 2,4-D Amicide® Advance 700	1.6 – 3.2 L/ha +1L/ha	\$24 - \$42	150 – 250
Control cane volunteers & grasses Controls grasses in legume crops	Fusilade Forte™ 128 EC	0.82 –1.65L/ha	\$52 - \$104	50 – 100
Control cane volunteers & grasses Controls grasses in legume crops Use with Uptake spraying oil	Verdict™ 520	150 – 800ml/ha	\$8 - \$40	50 – 100
Broad spectrum control in Fallows (annual & perennial grass, vines, & broadleaf weeds)	Basta®	1 – 5L/ha Or 500mls/100L for spot spraying	\$15 - \$76 \$7.50/100L	300 – 500
Broad spectrum control in Fallow & for cane inter row application (annual & perennial grass (Sour grass) & phragmites)	DalaPon 740 SP(2,2-DPA)	4– 10kg/ha Or 1kg/100L for spot spraying	\$86 - \$216 \$22 / 100L	300 +

Always read the product label before using any pesticide!

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PESTICIDES

Fungicides for planting

			<i>(GST inclusive)</i>
Product	Pack size	Application Rate	\$/200L mix
Shirtan® 120	5L	250mL/200L applied	\$25.25
Throttle® 500	5 L	20mL/200L applied	\$0.72
Bumper®250 EC	5 L	40mL/200L applied	\$1.32
Tilt® 250 EC	5 L	40mL/200L applied	\$1.08
Sinker®	5L	500ml in 350L/ha 50ml/ 100L for dip	\$32.60/ha \$3.26/100L dip

Insecticides


				<i>(GST inclusive)</i>
Product	Pack size	Insects controlled	Application rate	Cost/ha
Lorsban™ 500 EC	20L	Armyworms	700 – 900mL/ha	\$8 - \$11
		Australian plague Locusts	350 mL/ha	\$4
		Spur-throated locust	1.25 – 1.5L/ha	\$15 - \$18
		Symphylids – Soil applied at planting	2.0L/ha	\$24
		Wireworms - Soil applied at planting	1.5L/ha	\$18
Regent® 200 SC or Albatross 200 SC	1L	Wireworms- Soil applied at planting	1.1 – 1.8mL/100M row or 73 – 120mL/ha	\$0.16 - \$0.27 \$10.90 - \$17.90
Pyrinex® Super	20L	Wireworm- Soil applied at planting	1.88L/ha	\$21.10
Talstar® 250 EC or Astral 250 EC	5L	Wireworms- Soil applied at planting	2.25mL/100M row or 150mL/ha	\$0.07 \$4.26

Greyback Cane Grub

			<i>(GST inclusive)</i>
Product	Pack size	Application Rate	Cost/ha
SuSCon® Maxi i-tel	15kg	10 – 15kg/ha	\$268 - \$402
Confidor® Guard	10L	1.05 – 1.45L/ha	\$42 - \$58

[Calibration sheets can be found on the HCPSL Web site](#)

[HCPSL Web site: www.hcpsl.com](http://www.hcpsl.com)

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HCPSL

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HANDY HINTS AND PRACTICAL INFORMATION TO IMPROVE YOUR WEED MANAGEMENT



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APPLICATION CHECK LIST

HAVE YOU CHECKED THE PRODUCT LABEL?

- ✓ *Has Herbicide Sprayer been calibrated for this spraying season?*
 - *Less than 10% variance between nozzle output*
- ✓ *Spray pattern in crop.*
 - *Insure spray is adequately covering targeted area*
- ✓ *Water quality – check label or water quality handout sheet*
 - *Do you know your water quality (if not – test)*
 - *Check required water quality for each chemical*
 - *Adjust pH if required*
 - *Correct nozzle type for product being used*
 - *Check your label for correct droplet size requirements for herbicides being used.*
- ✓ *Avoid spraying in the heat of day. (except for Daconate)*
 - *Reduce drift to increase spray reaching target*
- ✓ *Apply Chemical to consolidated soil profile if possible.*
 - *Soil movement/settling may result in untreated areas*

INCORPORATION OF PRODUCT

- All pre-emergent herbicides except Balance® 750 WG need some form of incorporation
- Incorporation can be by mechanical, irrigation, rainfall or applying to moist soil
- Always check label for timing of incorporation
- Hot bare soils can reduce the effectiveness of residual

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CALIBRATION

Regular calibration of all spraying application equipment is essential to be able to:

- To apply the specified amount of product
- Apply the required volume of water
- To ensure evenness of application
- Avoid environmental contamination
- Comply with label directions


**Refer to the HCPSL website hcpsl.com for
information sheets on calibration of all types
of application equipment**

PRODUCTS:

Flame® 240: (*imazapic present as the ammonium salt*)

- UV stable and can remain on soil service.
- Product activated by rainfall/irrigation; weeds may emerge prior to activation and require additional control methods.
- Lower rates for lighter textured soils
- Levels of weed controlled may be reduced by high organic matter soils and recent application mill mud/ash
- Ensure good calibration and accurate measurement of product.
- DO NOT apply more than 400 ml/Ha per season.
- Good for nutgrass control
- Must be irrigated/rained into soil profile to work efficiently on target
- Avoid water with a high iron content

HELPFUL HINT - always use a knockdown such as paraquat to minimise the adsorption of Flame® into the cane plant

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Balance® 750 WG: (isoxaflutole)

- UV stable and can remain on soil service for extended periods of time.
- Product activated by rainfall/irrigation; weeds may emerge prior to activation and require additional control methods.
- Effective for control of problem perennial grasses in Out of Hand blocks.
- Apply higher rates for long-term control.
- DO NOT use in sodic soils.
- Consider soil cation exchange capacity (CEC) and organic carbon levels (OC) before application;
- CEC above 4.5 meq/100g
- Or if Organic Carbon levels are below 1.0%, CEC needs to be above 9meq/100g

HELPFUL HINT - always use a knockdown to minimise the absorption of Balance® into the crop

Note: No restriction on repeated use of product

Soccer® 700 WG: (metribuzin)


- Use as a tank mix where there is a broad spectrum of grass and broadleaf weeds
- Ensure good incorporation for target death
- Incorporate by rain or irrigation before 10 days
- Do not irrigate within 48 hrs of application
- Use top end label rates for extended vine control
- Use at least 250 litres of water/Ha

Atrazine 900 WG:

- Must be incorporated within 10 days or pre-emergent control will be reduced
- Not to be used within 60 metres of a permanent lake or dam or 20 metres from natural water course
- Max rate of 3kg/ha of active per any 12-month period
- Good for pre-and post-control for some annual grasses and broadleaf weeds
- Water pH needs to be less than 8
- Effectiveness greatly reduced by hard water

Ametryn

- Recommended water pH greater than 6
- Good quality water with no clay particles

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Gramoxone®250 and Sprayseed®250 (paraquat/diquat)

- **WARNING:** this is an S7 chemical and extreme care must be taken when handling and using
- Systemic activity is enhanced if applied late in day or at night
- Commonly used for crop safety to reduce potential phytotoxicity of post emergent herbicides consider adding paraquat to the mix. (Amount dependent on weed size).
- pH greater than 8 may adversely affect results

2,4-D (various formulations) plus MCPA, Starane™ Advanced:

- Ensure high water rates and avoid spraying in the heat of the day to minimise crop damage
- Ensure correct droplet size for product in use
- Seek advice for varietal susceptibility (SRA 3, Q226, Q240, Q183 are susceptible)
- Avoid drift onto neighbouring crops, public places & neighbouring gardens

Recommended water pH between 4 – 6

DalaPon740 SP: (2,2-DPA)

- Selective systemic herbicide for control of annual and perennial grasses
- Absorbed through roots and leaves and translocated throughout the plant (pre-and post-emergent effect)
- Add a non-ionic surfactant
- Use high water volumes for best result

Basta: Glufosinate-Ammonium


- Non-selective activity against many annual & perennial broadleaf weeds & grasses
- Absorbed through plant foliage and green stems.
- Not significantly translocated through as an active herbicide through the plant, only kills parts of green plants that is contacted by spray
- Compatible with most residual herbicides (ref to label)
- Used with Spray hoods/shields for crop safety
- Can be used as a spot spray (ref to label)

Bobcat® i-MAXX: Hexazinone + Imazapic

- Residual herbicide for grass and broadleaf weeds
- Dual mode of action for resistance management
- Always tank mix Bobcat®i-MAXX with 1.6L/ha Paraquat 250 (Gramoxone 250) for added control of emerged weeds
- Use lower rates on lighter sandy type soils

Valor®500 WG: Flumioxazin

- It can either be used with knockdown herbicides to improve broadleaved weed control, or at higher rates for residual control.
- It won't be broken down by the sun before it can be incorporated into the top of the soil for at least three weeks.

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Glyphosphates:

Addition of a compatible 2,4-D or Starane Advance will assist broadleaf control; Seek advice or check compatibility chart


Glyphosate Formulations

Trade Name (examples)	Active ingredient	2,4-D compatibly	Directions for use
Glyphosate® CT Gladiator® Wipe Out®	Isopropylamine salt 360-540g/L	2,4-D Surpass® 475, Estercide® Xtra 680 <u>Amicide® Advance</u> <u>700</u>	Do not use spray oils Controls a broad range of grass and broadleaf weeds
Credit®* Weedmaster® Duo	Isopropylamine and Mono-ammonium salts 360-540g/l	2,4-D LV Ester Surpass® 475	Do not use spray oils Controls a broad range of grass and broadleaf weeds
Roundup® Attack™ Touchdown® Hi Tech Wipe-Out® Accelerate Gladiator OptiMAX Glyphosate 495K	Potassium salt 495-570g/L	2,4-D LV Ester Surpass® 475 Zulu® 300	Controls a broad range of grass and broadleaf weeds Do not add oils as wetters except where they may be required for another herbicide in the mixture being applied
Roundup® DST Weedmaster® DST®	Potassium and mono-ammonium salts 470g/L	2,4-D LV Ester 680 Surpass® 475 <u>2,4D Advance 700</u>	Do not use spray oils Controls a broad range of grass and broadleaf weeds
Weedmaster® ARGO®	Potassium and Isopropylamine salts 540g/L	2,4-D LV Ester 680 Surpass® 475 <u>2,4-D Advance 700</u>	Do not use spray oils Controls a broad range of grass and broadleaf weeds. Registered for inter row spraying in cane
Glyphosate 700SG Ken-Up® Dry 680 WG Glyphosate 875	Mono-ammonium salt 680-875g/kg	2,4-D LV Ester 680 Surpass® 475	Do not use spray oils Controls a broad range of grass and broadleaf weeds
Wipe-Out® Plus	Monoethanolamine salt 510g/L	2,4-D LV Ester Surpass® 475 Zulu® 300	Do not use spray oils Controls a broad range of grass and broadleaf weeds
Innova Roundup trimesium 480	Trimesium salt 480g/L	No mention of 2,4-D use on the label	Controls a broad range of grass and broadleaf weeds

Ensure water pH is 4.5 – 6 (add a buffer to adjust the pH)

Ensure good water quality (CLEAN WATER)

Keep water rates less than 150L/Ha

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CHEMICAL MIXING ORDER FOR APPLICATION EQUIPMENT

*Know your water quality
Have it checked on a regular basis?*

STEP	PRODUCT EXAMPLE
⇒STEP 1. Fill tank with water to 60-80% full. Run pump for water agitation	
⇒Step 2 . Add any water conditioners if water testing indicates they are required	Bonus [®] , Liase, LI 700 [®]
⇒Step 3 . Add Dry Flowable Granules	Diurex [®] , Velpar [®] K4 [™] DF [®] Atradex [®] , Soccer [®] , Ametrex [®] 800WG, Balance [®] 750WG
⇒Step 4. Add any Suspension concentrates (flowables)	Gesapax [®] Combi, Diuron flowable
⇒Step 5 Add a wetting agent at this stage if an EC (Emulsifiable Concentrate) is to added next	Activator 90 [®] , Agral, LI-700 [®]
⇒Step 6. Add Emulsifiable Concentrate (if being used)	Trifluralin [®] X, Stomp [®] Xtra
⇒Step 7. Add Water soluble concentrates and or Aqueous solutions	2,4-D Amicide [®] Advance 700, Sprayseed [®] 250 Gramoxone [®] 250 Dicamba 500 MCPA 500 Glyphosate
⇒Step 8 Add a Wetting agent if not previously added at Step 2 or at Step 5.	Activator 90 [®] , Agral, LI-700 [®] (Non-ionic surfactant) or Oils
⇒Step 9 Complete filling the tank with water	


NB. There are other products that may be used that are not listed in the above table

REEF WISE FARMING

- ✓ Follow label rate and application timing for your cane growing region
- ✓ Diuron, Velpar, Ametryne and Atrazine all per label for your region
- ✓ Frequency of application refers to any 12-month period
- ✓ Ensure recordkeeping is adequate and up-to-date

Always read the product label before using any pesticide!

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CALIBRATION OF A HERBICIDE SPRAYER

Date of Calibration:.....

Steps of calibration

1. Select your tractors' gear and engine RPM for your preferred application speed. Record the details below:

- A) Tractor ID:
- B) Gear:
- C) Engine RPM: Pressure:
- D) Record your time to travel 100 metres. (Check at least twice.)
Seconds:

2. Collect output of the **nozzle/s or each dropper or Irvin leg in Litres** for the time recorded in **1-E)**. (Stationary calibration)

Nozzle 1	Nozzle 2	Nozzle 3	Nozzle 4	Nozzle 5	Nozzle 6		
L	L	L	L	L	L	Total	L
Nozzle 7	Nozzle 8	Nozzle 9	Nozzle 10	Nozzle 11	Nozzle 12		
L	L	L	L	L	L	Total of all nozzles	L

3. Determine the treated area: in **Square Metres(M²)**

Total boom Width sprayed M		100 M		M²
	X	100 M	=	

4. Calculate the application rate of water/ha

Total Output of nozzles		Spray Area M²		Spray Rate
L	÷	M ²	x 10000 =	L/Ha

5. Calculate how much herbicide to add to your spray tank

Tank Volume		Spray Rate		Product Rate		Herbicide in Tank
L	÷	L/Ha	x	L/Ha	=	L

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