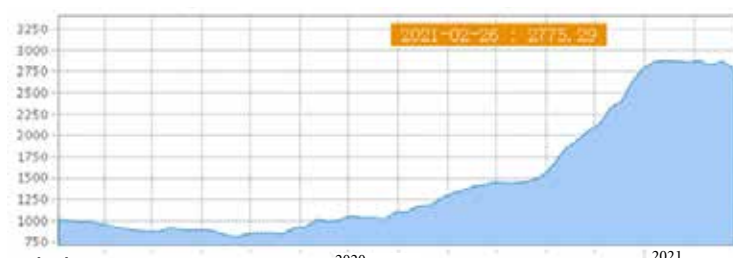


## Covid related shipping headaches continue



Shanghai Containerised Freight Index (SCFI) reflecting spot rates of Shanghai export container market.

**Y**ou may recall in our last issue we mentioned the challenge of importing products because of shipping difficulties. Well, the situation hasn't improved!

In normal times, if goods are ready, it may take 1 to 2 weeks for goods to depart port, with shipping times about 3 weeks from China and 4 weeks from India. Then from the port to our warehouse, maybe 2 days.

Recently all of these transport times have virtually doubled with little reprieve expected until possibly mid year.

Factors creating these problems are:

- ☐ Lack of capacity due to relatively few ships or containers
- ☐ Chaos at the ports

### LACK OF SHIPS

Expected consumer uncertainty due to Covid-19 in the first half of 2020 caused shipping lines to reduce their shipping capacity by up to 7 million tons. Instead, consumers have gone mad with a massive and frenzied retail therapy bender.

So shipping capacity is down but demand has increased.

### LACK OF CONTAINERS

Many ports around the world have simply run out of empty containers. Containers remain stuck in ports and are just not freely circulating in normal time frames due to lockdowns and disruptions.

Shipping companies have previously utilised quiet periods to collect these empty containers but at present there has been no quiet period.

In the meantime the shortage of equipment and space on boats has created a bidding war for the limited capacity available.

### PORT ISSUES

Busy shipping schedules, that are commonly disrupted are causing ships to arrive in surges - and combined with shutdowns at some ports, are creating chaos and gridlocks.

Aside from the origin and destination ports, there are those in between to contend with as few shipments come directly to Western Australia. Most ships from China, for example, transship cargoes in ports like Singapore.

In previous years the containers were very quickly loaded onto the ship for the final leg of the journey, however, enormous congestion at these ports too, has left cargo stranded.

### WHAT DOES IT ALL MEAN TO YOU?

Short term problems with shipping logistics have forced shipping costs up. In the longer term it is another reason for farmers to rethink how they manage their purchasing and supply of inputs.

Farmers organising themselves earlier means they can either take advantage of stock already on hand or at least place themselves higher in waiting queues for new stock.

To manage uncertain supply, farmers would benefit by carrying larger amounts of buffer stock to ensure they have products likely to be needed.

### Farm Chemicals



Good surfactants make a good glyphosate  
**Page 3**

### Farm finance



Protect your interest with PPSR  
**Page 4**

### Weed control



Know the WeedSmart 'Big Six'  
**Page 5**

### Care for your health



Skin exposure to pesticides - something to avoid  
**Page 6**

# 4Farmers Products

with cross reference to similar trade name products

## Herbicides

2,4-D Amine 625  
2,4-D Ester 680  
2,4-D Ester 800  
2,4-D plus Picloram  
Amitrole 250  
Atrazine 600SC, 900WG  
Bromacil 800  
Bromox MA  
Bromoxynil 200  
Bromoxynil/ Diflufenican  
Brown Out 250  
Butafenicil 200  
Butroxydim 250 WG  
Carfentrazone 240EC  
Carfentrazone 240EW  
Chlorsulfuron 750 WDG  
Clethodim 360 EC  
Clodinafop 240 EC  
Clopyralid 300  
Cyanazine 900 WDG  
Dicamba 500  
Diclofop-Methyl 500 EC  
Diflufenican 500  
Diquat 200  
Diuron 900 DF  
Fluazifop 212  
Flumetsulam 800 WG  
Fluroxypyr 200  
Glufosinate-Ammonium 200  
Glyphosate 450 MEA  
Glyphosate 510  
Glyphosate 540  
Glyphosate 570  
Glyphosate 875 WDG  
Haloxypyr 520  
Ipic 240  
Imazamox 700 WG  
Imazethapyr 700 WG  
I-PYR 750  
Linuron 450  
LV MCPA 570  
LVE MCPA/ Diflufenican  
MCPA 750  
MCPA/Picloram  
Mesosulfuron 30  
Metolachlor 960  
Metribuzin 750 WG  
Metsulfuron Methyl 600 WDG  
Oryzalin 500  
Oxyfluorfen 240 EC  
Paraquat 250/300  
Pendimethalin 440  
Picolinafen 750 WG  
Propyzamide 500 SC,WG  
Prosulfocarb 800 EC  
Quizalofop-p-ethyl 100  
Simazine 900 WG  
Sulfometuron 750 WG  
s-Metolachlor 960 EC  
Sulfosulfuron 750  
Terbuthylazine 750/875 WG  
Terbutryn SC  
Tralkoxydim 400 WG  
Tri-allate 500 EC  
Triasulfuron 750  
Tribenuron Methyl 750  
Triclopyr 755  
Trifluralin 480

## Similar Product

Amicide 625<sup>®</sup>  
Estercide Xtra 680<sup>®</sup>  
Estercide 800  
Tordon™ 75-D  
Amitrole T<sup>®</sup>  
Gesaprim<sup>®</sup>  
Uragran<sup>®</sup>  
Bromicide MA<sup>®</sup>  
Bromicide 200<sup>®</sup>  
Jaguar<sup>®</sup>  
Spray.Seed<sup>®</sup>  
LogranB<sup>®</sup>  
Factor<sup>®</sup>  
Hammer<sup>®</sup>  
Affinity Force<sup>®</sup>  
Glean<sup>®</sup>  
Select<sup>®</sup>  
Topik<sup>®</sup>  
Lontrel<sup>®</sup>  
Bladex<sup>®</sup>  
Dicer 500<sup>®</sup>  
Hoegrass<sup>®</sup>  
Brodal<sup>®</sup>  
Reglone<sup>®</sup>  
Various  
Fusilade<sup>®</sup>  
Broadstrike<sup>®</sup>  
Starane™  
Basta<sup>®</sup>  
Roundup<sup>®</sup>  
Roundup<sup>®</sup>  
Roundup<sup>®</sup>  
Roundup Ultra<sup>®</sup> MAX  
Roundup Dry<sup>®</sup>  
Verdict<sup>®</sup>  
Flame<sup>®</sup>  
Raptor<sup>®</sup>  
Spinnaker<sup>®</sup>  
Arsenal<sup>®</sup>  
Linurex<sup>®</sup>  
LVE Agritone<sup>®</sup>  
Tigrex<sup>®</sup>  
Agritone<sup>®</sup>  
Trooper 242<sup>®</sup>  
Atlantis<sup>®</sup>  
Dual<sup>®</sup>  
Lexone<sup>®</sup>, Sencor<sup>®</sup>  
Ally<sup>®</sup>  
Surflan<sup>®</sup>  
Goal<sup>®</sup>, Striker<sup>®</sup>  
Gramoxone<sup>®</sup>  
Stomp<sup>®</sup>, Argo<sup>®</sup>  
Sniper<sup>®</sup>, Tropico<sup>®</sup>  
Kerb<sup>®</sup>, Edge<sup>®</sup>, Rustler<sup>®</sup>  
Arcade<sup>®</sup>, part Boxer Gold<sup>®</sup>  
Targa<sup>®</sup>  
Gesatop<sup>®</sup>  
Oust<sup>®</sup>  
Dual Gold<sup>®</sup>  
Monza<sup>®</sup>  
Terbyne 750<sup>®</sup>  
Igran<sup>®</sup>  
Achieve<sup>®</sup>  
Avadex<sup>®</sup>  
Logran<sup>®</sup>  
Express<sup>®</sup>  
Garlon<sup>®</sup>  
Treflan<sup>®</sup>

70%  
formulated in  
Australia  
by 4Farmers

## Seed Treatments

Fipronil 500  
Fluquinconazole  
Imidacloprid 600  
Imid-Triadimenol  
Iprodione 500  
Metalaxyl-M 350  
Procymidone 500  
Tebuconazole 25T  
Triadimenol150 SC  
Triadimenol150 + (Powder)  
Triticonazole 200C

## Similar Product

Cosmos<sup>®</sup>  
Jockey Stayer<sup>®</sup>  
Gaucho<sup>®</sup>, Emerge<sup>®</sup>  
Zorro<sup>®</sup>  
Rovral<sup>®</sup>  
Apron XL<sup>®</sup>  
Sumislex<sup>®</sup>  
Raxil<sup>®</sup>  
Baytan C<sup>®</sup>  
Baytan C<sup>®</sup>  
Real 200<sup>®</sup>

## Fungicides

Azoxystrobin 250 SC  
Azoxystrobin 500 WG  
Azoxy Cypro  
Carbendazim 500 SC  
Chlorothaloril 720  
Epoxiconazole 125  
Flutriafol 500 SC  
Iprodione 500  
Mancozeb 750 WG  
Procymidone 500  
Propiconazole 500  
Pyraclostrobin 250 EC  
Tebuconazole 430 SC  
Tebuconazole 800 WG  
Triadimefon 500 Dry  
Triadimenol 250

## Similar Product

Amistar WG<sup>®</sup>  
Amistar WG<sup>®</sup>  
Amistar Xtra<sup>®</sup>  
Bavistin<sup>®</sup>, Spin<sup>®</sup>  
Bravo<sup>®</sup>  
Opus 125<sup>®</sup>  
Impact<sup>®</sup>, Intake<sup>®</sup>  
Iprodione Aquaflow<sup>®</sup>  
Penncozeb 750 DF<sup>®</sup>  
Sumislex<sup>®</sup>  
Tilt<sup>®</sup>, Throttle<sup>®</sup>  
Opera<sup>®</sup>, Cabrio<sup>®</sup>  
Folicur<sup>®</sup>, Turbulence<sup>®</sup>  
Folicur<sup>®</sup>, Turbulence<sup>®</sup>  
Unique to 4Farmers  
Bayfidan<sup>®</sup>, Shavit<sup>®</sup>

## Insecticides

Alpha-Cyper 100EC  
Alpha-Cyper 250SC  
Al Phosphide tablets, blankets  
Bifenthrin 300 EC  
Chlorpyrifos 500  
Dimethoate 400  
Fenamiphos 400  
Fipronil 800 WG  
Fumigation Blanket  
Imidacloprid 200  
Lambda-Cyhalothrin 250 SC  
Omethoate 290  
Pirimicarb 500 WG

## Similar Product

Dominex<sup>®</sup>  
Alpha Forte 250<sup>®</sup>  
Phostoxin<sup>®</sup>  
Talstar<sup>®</sup>  
Lorsban<sup>®</sup>  
Rogor<sup>®</sup>  
Nemacur<sup>®</sup>  
Regal<sup>®</sup>  
Celphide Fumigation Blanket<sup>®</sup>  
Confidor<sup>®</sup>  
Karate Zeon<sup>®</sup>  
Le-mat<sup>®</sup>  
Aphidex<sup>®</sup>, Pirimor<sup>®</sup>

## Vertebrate & Mollusc

Zinc Phosphide Mouse Bait  
Strychnine Alkaloid Crystals  
1080 Vermin Baits  
1080 Liquid  
Metaldehyde Snail/Slug Bait  
Iron Chelate Snail/ Slug Bait \*RP

## Similar Product

MouseOff<sup>®</sup>

## Adjuvants & Products

Ammonium Sulphate  
Boom Clean Dry  
Citric Acid  
Farm Pro 700  
Penetrator  
Speedy Spray  
Spray Foam Marker  
Sunshade Spray Adjuvant  
Take Up  
Turbo Charge  
Wetter 1000

## Similar Product

Liase<sup>®</sup>  
  
LI 700<sup>®</sup>  
Pulse Penetrant<sup>®</sup>  
Hasten<sup>®</sup>  
Spray Foam Marker  
AntiEvap<sup>®</sup>  
Uptake<sup>®</sup>  
Supercharge<sup>®</sup>

## Plant Health

Zn Chelate EDTA 14%  
Cu Chelate EDTA 14%  
Mn Chelate EDTA 12.5%

# The difference between glyphosates? Surfactants make a major difference!

**The difference in grams active per unit is the obvious difference in Glyphosates; and all things being equal Glyphosate is Glyphosate.**

However, there are significant differences in the end use formulation. Some of these make little difference, others a vast difference.

## SOURCE OF TECHNICAL

Glyphosate Technical Grade Active Consistent (TGAC) can be manufactured in different ways; the most common production method being the "glycine route". This produces a product of at least 95% purity.

Another production process is the 'IDA route' that produces a higher quality product of at least 97% purity and is slightly more expensive.

A product with fewer impurities might be better in some circumstances, but in general, for the end user, the difference is probably very small if any.

## SALT

Glyphosate TGAC comes in the form of a white powder that is efficacious on its own but low solubility makes it unsuited to being mixed to high concentrations.

Solubility at 25°C is approximately 12g/L and drops by about 2g/L for each 5°C drop in temperature.

Thus, Glyphosate TGAC mixed at 12g/L to apply 900g ai (active ingredient)/ha would require 75L/ha water volume and approximately double that volume if the temperature dropped to 10°C.

Converting Glyphosate into a form of salt means it can be conveniently delivered in a liquid form and easily mixed in high concentrations with water. The salt determines the concentration of active ingredient that can be achieved in the final product.

The salt portion of the formulated product can also allow for more effective penetration into the leaf.

There are several types of Glyphosate salts but the most common are;

**Isopropyl amine (IPA)** – The most common salt typically used in Glyphosate 360g/L, 450g/l and up to 510g/L. Its manufacturing disadvantage over MEA and K (potassium) salts is that the IPA raw ingredient is flammable.

**Monoethanolamine (MEA)** – Concentrations like IPA Glyphosate

**Potassium (K)** – Has the advantage of being able to produce liquid concentrate of Glyphosates of 540g/L and 570g/L.

**Mono ammonium (MA)** – Used to produced highly concentrated granular Glyphosate up to 875g/kg.

Salts do not have an impact on the herbicide's activity since only the Glyphosate acid acts at the target site within the plant. There is little to suggest any difference in performance between all the Glyphosate salts themselves or added benefit if they are mixed. The MA salt possibly performs fractionally better than others in some situations.

## SURFACTANT

All registrations of liquid Glyphosate usually contain a surfactant, but it is the quality and quantity of these surfactants that make Glyphosate performance differ vastly.

The type or quantity of a surfactant have not been required to be put on a label or SDS as they are not the active ingredient nor regarded as sufficiently toxic or hazardous.

In general the traditional IPA 450g/L Glyphosates use a tallow amine ethoxylate (TAE) and polyethylene glycol (PEG) surfactants. Some importers from China use alkyl poly glycoside (APG) known to be a notoriously poor wetter that cuts costs by around A\$0.30/L. Glyphosates like 4Farmers 510 or 570 use high quality synthetic surfactants of which there a whole raft of types.

Even if the surfactant package is listed in the herbicides ingredients or an analysis is performed on a sample, to compare and contrast the different packages is difficult and fraught with danger. It is not as straightforward as comparing surfactant percentages; as understanding the type of wetter is critically important. Even between say a group of TAE based Glyphosates, there are nuances that make them differ!

Ask your supplier what they know of the surfactants in their glyphosate and at least check that it is not APG.

The addition of a non-ionic wetter in certain conditions could improve any Glyphosate; "a high tide lifts all boats".

However, adding a wetter to a Glyphosate with an inferior surfactant package cannot be counted on to match the surfactant package contained in a better quality Glyphosate.

## SURFACTANT IMPORTANT

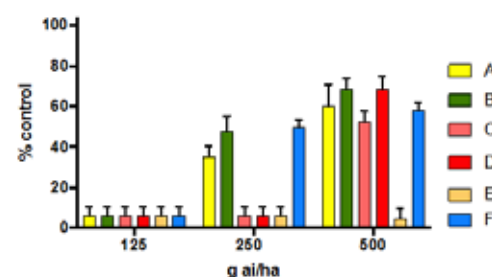
The differing performance of surfactant packages will usually go unnoticed except in one of the following conditions;

- ◇ Marginal spray rates for the size and condition of weeds.
- ◇ Environmental conditions for spraying are less favourable.
- ◇ Resistance of some level and weeds are not fully susceptible.

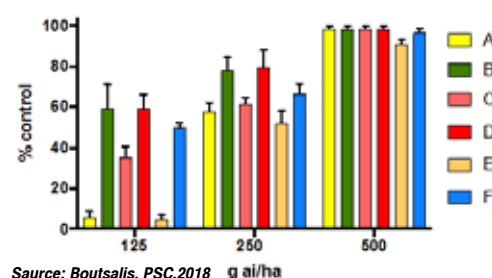
Spraying a good rate of Glyphosate with no wetter can easily kill small, glyphosate susceptible weeds in favourable conditions.

The value of a Glyphosate with a better quality surfactant killing resistant Ryegrass has been demonstrated in independent research that compared six different products - see illustrated below (reported 4Front front page spring 2018).

### Glyphosate resistant ryegrass



### Susceptible ryegrass



Source: Boutsalis, PSC, 2018

As well as efficacy, the surfactant package contained in a Glyphosate will make a significant difference to tank mix compatibility.

## CONCLUSION

The biggest difference between Glyphosates is the quality of the surfactant package they contain.

Under challenging spray conditions, particularly where herbicide resistance is noted, the differences can be stark.

All 4Farmers liquid Glyphosates contain good amounts of quality surfactants.

The most superior surfactant packages are contained in the 4Farmers 510 and 570g/l products and are well worth their small premium price in tough marginal conditions.

# Have you considered protecting your interests with the PPSR?

**W**hen selling something like grain, do you secure payment for that asset by registering your interest in it on the Personal Properties Security Register (PPSR)?

Registering your security interest on the PPSR is optional - but if it is not registered then you risk losing your goods and being left out of pocket.

## WHAT IS THE PPSR?

The Personal Property Securities Act (PPSA) is federal legislation which came into effect on the 30th January 2012 which changes the way security interests in personal property assets are governed. A security interest is an interest in an asset that in substance secures payment of a debt or obligation.

The PPSR is the official government register of security interests in personal property – these are debts or other obligations that are secured by personal property. It's an online noticeboard accessible to the general public 24/7.

The PPSR replaced many state-based registers, such as REVS and other vehicle registers and the ASIC Register of Company Charges, to form one national register.

When someone registers a security interest on the PPSR, they are letting the world at large know that they claim to have a security interest over certain personal property.

## TYPES OF SECURITY INTERESTS

A retention of title (ROT) clause in a contract establishes that a purchaser may take possession of property but does not acquire title to the property from the seller until the full purchase price is paid. This creates a security interest known as a Purchase Monies Security Interest (PMSI).

Registering the security interest on the PPSR created by the ROT clauses provides a more secure path to enforcing payment of the underlying debt.

One single registration of a PMSI can cover multiple sales over time to the same entity.

There could be circumstances where a registration of a PMSI is not fool proof. Another useful instrument is an "all present and after acquired property" (APAAP) security interest.

An APAAP essentially puts a charge on current or future property of an entity. Most APAAPs are 'without exception' so cover all property.



Before the PPSR, these were commonly known as 'fixed and floating charges'.

## PRIORITY

PMSI's will usually have higher priority than other types of security interests over the same item of property because credit was given to allow purchase of these goods in the first place.

For example; a farmer who has registered a PMSI on grain sold to a buyer that has become insolvent has priority to that grain before a bank with an APAAP security even though the APAAP has been registered earlier. Other APAAP registrations will take priority in order of the earliest date registered and unsecured creditors last.

## 4FARMERS SECURITY

Like a farmer wanting the peace of mind to secure payment for what they sell, it is only prudent that a supplier would have a signed agreement with terms and conditions with all their clients.

In 4Farmers Terms of Supply at clause 11.1, 4Farmers retains title to the goods we sell until they have been paid for in full.

This creates a PMSI security interest.

In the case of crops or livestock, if a supply of inputs like chemicals made on retention of title terms is used by the purchaser to grow or develop their crops or livestock, the supplier of the input has a special agricultural priority (ahead of other security interests) in the crop or livestock itself.

Further, clause 11.2 of 4Farmers Terms of Supply establishes 4Farmer's right to register

an APAAP security without exception. This is useful in the event the PMSI fails to adequately secure 4Farmers debt.

An APAAP security registration has no impact on a farmer's day to day operations nor requires them to deal with an APAAP registrant. The APAAP is only of consequence if the farmer defaults on payments and a supplier has the right to enforce their security.

If refinancing, a new bank may insist on registering its APAAP first in which case other registrants will need to lift their registration.

## CONCLUSION

Farmers should make sure that what they sell is done with signed contracts with suitable terms and conditions, and in-particular to have ROT clauses.

Signed contracts may not be enough to rely on to enforce your interests. Interest in assets sold should be registered on the PPSR to mitigate the risk in the event of default.

Likewise, security interests registered by providers to your own business should be accepted as normal prudent business practice by them.

For more information readers should go to [www.ppsr.gov.au](http://www.ppsr.gov.au). Readers should not solely rely on the information in this article. It would be best to seek professional advice relevant to your particular situation.

# The WeedSmart Big 6

Weeds and herbicide resistance are best managed with an integrated weed management (IWM) plan.

The WeedSmart Big 6 strategy is a useful check list that can be used to prompt growers to consider using a selection of the many available weed control tools.

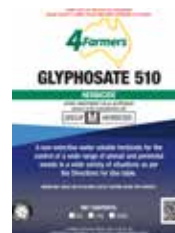


## 1. ROTATE CROPS AND PASTURES

A diverse rotation including crops and pastures allows a similarly diverse range of herbicides and management strategies to be used. In contrast growing the same crop consecutively limits the flexibility to use different herbicide groups and control measures.

## 2. DOUBLE KNOCK

After hitting weeds one way, punch out survivors with a different swing (strategy) in the same season. The best example of this is where practical follow Glyphosate with Paraquat (or another knockdown like Glufosinate) a few days later.



## 3. MIX AND ROTATE HERBICIDE GROUPS

Rotating herbicides buys you time, mixing herbicides buys you extra shots, mixing and rotating herbicides buys you time and shots. You can also ensure the risk of resistance is lower by always using full rates of both herbicides when mixing.

## 4. STOP WEED SEED SET

Leave no seed to germinate the following season!

Stopping weed seed set is a critical strategy to manage herbicide-resistant weeds. Reducing the seed bank prevents resistance evolution and prolongs the life of the selective herbicides. This includes pre harvest 'crop topping' applications - for example with Diquat.



## 5. CROP COMPETITION

The stronger your crop is, the less chance weeds have to compete!

A competitive crop will suffer less yield loss at the hands of the weeds and will also reduce the seed set of weeds compared to an un-competitive crop. In other words; more crop, fewer weeds.

## 6. HARVEST WEED SEED CONTROL

Remove weed seeds at harvest to minimise germination in the following season. Capture weed seed survivors at harvest using chaff lining, chaff tramlining, chaff carts, narrow windrow burning or weed seed impact mill.



### Additional WeedSmart Wisdom:

- Maintain herbicide rates
- Ensure herbicides are applied correctly; correct nozzles, adjuvants and water rates
- Use clean seed at sowing
- Don't allow resistant weeds to evolve on fence lines and boundaries
- Test for resistance
- Don't let visitors bring in weeds on their vehicles

Source; www.weedsmart.com.au

# Skin exposure to pesticides: It's something farmers should be wary of!

**D**ermal, or skin exposure, accounts for about 90% of all exposure farmers receive from pesticides.

It can occur any time a pesticide is mixed, applied, or handled, and it is often undetected.

## SERIOUSNESS

The seriousness of dermal exposure depends upon the dermal toxicity of the pesticide, rate of absorption through the skin, the size of the skin area contaminated, the length of time the material is in contact with the skin, and the amount of pesticide on the skin.

## RATES OF ABSORPTION

Rates of absorption through the skin are different through different parts of the body.

Using absorption through the forearm (1.0) as the standard, absorption is more than 11 times faster in the lower groin area.

Absorption in the genital area is rapid enough to approximate the effect of injecting the pesticide directly into the bloodstream.

## PROTECTION

Even with unscheduled chemicals that are considered more innocuous (eg Simazine), the basic safety directions are to avoid contact with the skin.

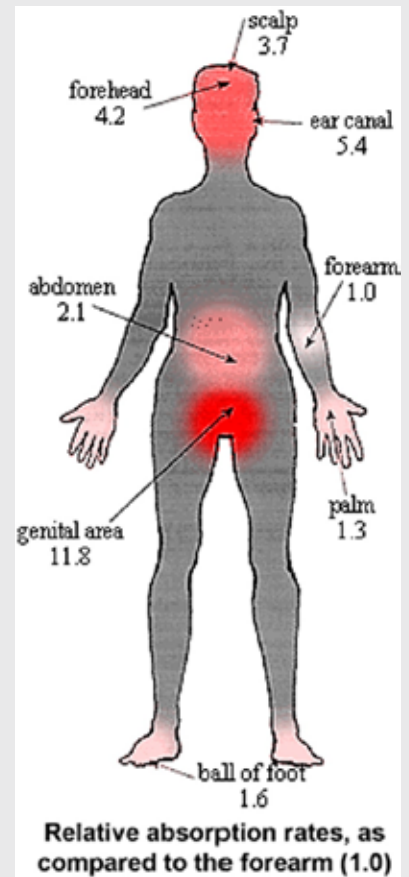
Baseline Personal Protective Equipment (PPE) is to appropriately cover the body from head to toe including;

## STANDARD ITEMS

- ✓ Hat or appropriate head covering
- ✓ Face shield or goggles
- ✓ Long sleeve shirt and long pants
- ✓ PVC apron
- ✓ Elbow length PVC gloves
- ✓ Chemical resistant footwear

## OTHER PRECAUTIONS

- ✓ Always wash after use with soap and water
- ✓ Clean PPE equipment daily
- ✓ Launder clothes separately to household
- ✓ Remove clothing immediately if any spills on to clothes and wash the body area



Ref: Science of the Total Environment (Elsevier.com)

For chemicals with higher scheduling and greater risks, naturally the precautions taken will increase.

## Your order is just a phone call away!

**4FARMERS can supply chemicals to anywhere in Australia**

Simply call your local 4Farmers distributor – or if there's no distributor in your area call the head office – so easy!

**Head Office 1800 038 445  
www.4farmers.com.au**

**70% formulated in Australia by 4Farmers**

