

Prosiect Twyni Byw Sands of LIFE Project

DUNIAS Workshop Belgium, May 2022 Invasive Alien Species Management



SoLIFE: LIFE 17 NAT/UK/000023

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Sands of LIFE and NRW Management Methods for Invasive Alien Species



Rosa rugosa

Cut to reduce volume and mulch arisings if tall and woody.

Spray re-growth with glysohphate in following active growing season

Rake away dead matter to bare sand (where appropriate)







Young Sea Buckthorn *Hippophae rhamnoides* (or other wood species) – Herbicide spray (glyphosate) with quad-mounted spray in autumn as sap is drawing down



Larger sea buckthorn – cut with clearing saws and paint stumps individually with glyphosate. Leave arisings on site in hollows.

Plucking out Sea buckthorn by the roots with excavator at Laugharne-Pendine Burrows



Technique also used on native scrub and cotoneaster

Pulling Sea buckthorn with a specialised grab
– follow up with glyphosate spray for any regrowth







Chip and remove to biomass plant – specialist chipper.
Or burn but can cause community complaints.

Phormium – hand digging and remove off site. No herbicide.





Bamboo

Dig out roots with excavator. Extended well beyond visible shoots to ensure all removed. Riddle sand & pick out individual roots. Bagged up and removed off site. Follow up by pulling up regrowth (currently none)



Clematis

If woody, cut and clear winter before and fresh regrowth.

Herbicide spray – 2 applications 6 weeks apart – ideally when close to flowering.

Pulled leaves into a central area to minimise collateral damage.

Follow up: Brush-cut dead material and raked away debris into piles to create bare sand.





Corsican Pine *Pinus nigra* saplings

Brush cut – no further treatment

**Removal of *Crocrosmia* at Tywyn Aberffraw,
with mini-digger. Bagged up and removed
from site**



Initially looked good but soon grew back!



Herbicide: Cut thick growth/thatch in winter and mulch down
In spring spray leaves with glyphosate.
Follow up spray in 6 weeks.
Mulch dead arisings.

**Multi-stage whole habitat restoration approach
On Cotoneaster, Thuja, native scrub etc**





Pluck out woody scrub. Or cut and treat with herbicide.
Remove arisings and any fallen logs and brash and bury nearby.
Excavate stumps.
Scrape away all surface vegetation and organic rich sand.







Lessons learnt - herbicide



- Herbicide is often the most practical and cost effective option.
- Not all contractors are good at herbicide application.
- Some species are said to be very resistant to treatment but failure can often be the result of poor application (e.g. before rain, wrong strength, missed application, wrong time of year)
- Need to think how you set up contract for payment, should there be failures.
- Treat throughout the year. There may be an optimal time to treat, but if you limit your window too much you won't get through your work programme.
- Herbicide requires a lot of paperwork from your contractor (COSHH, daily records, certification).
- As a contract manager you need some training to ensure you can oversee competently.

Lessons learnt – general



- Monitor site for establishing IAS – deal with it early.
- Follow up treatment over at least 1 or 2 years is required from most methods.
- Monitoring aftermath is essential to check for herbicide take and subsequent regrowth.
- May require specialist waste disposal which is costly.
- Removal from site can cause spread – need to cover securely. Leaving on site may be safer.
- Keep an open mind about methods. Adapt your management based on experience.

Diolch

Thank you