iNTrench™

Sports turf

iNTrench™ is a liquid fertiliser which provides controlled nitrogen release based on PiNT™ technology. It is specifically designed for professional sports turf.

Benefits of iNTrench

- Prolonged nitrogen availability – up to 10 weeks
- Rapid and persistent greening with better blade colour than competitors
- Excellent overall visual quality
- Reduced N application rates and minimal nitrate leaching
- Good turf safety even at high temperatures
- Formulated with calcium (iNTrench Ca) or potassium (iNTrench K).

Nutrient content

Nutrient	iNTrench K %w/w	iNTrench K g/L	iNTrench Ca %w/w	iNTrench Ca g/L
Total nitrogen (N) [of which nitric]	15 [1.3]	180 [15]	15 [5]	202 [67]
Potassium oxide (K_2O)	7	84	–	–
Calcium (Ca) [calcium oxide (CaO) equivalent]	–	–	7 [9.8]	94 [132]
Boron (B)	–	–	0.17	2.3

PiNT™

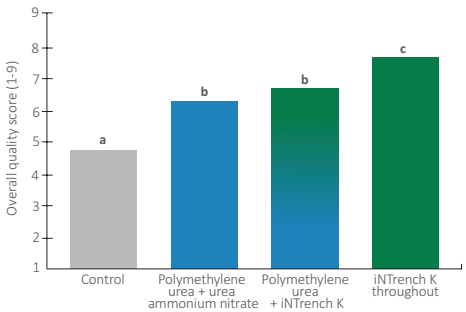
Advanced nitrogen technology

PiNT is a stabilised ureic/cation complex, providing a controlled release of ammonium which can be converted to nitrate. This managed release maximises N availability whilst minimising leaching and volatilisation, without the need for urease inhibitors.

Independent trials

iNTrench delivers as a supplement or solo treatment

A trial, at Michigan State University in the US on mixed bentgrass and *Poa annua,* substituted iNTrench K for a polymethylene urea base application (36.6 kg/ha of N), and/or a urea ammonium nitrate 'spoon-feed' (4.9 kg/ha), over a 7 week period. The turf quality was significantly better (P<0.05) when iNTrench K was used throughout. Bars with different letters are significantly different to each other (P<0.05).



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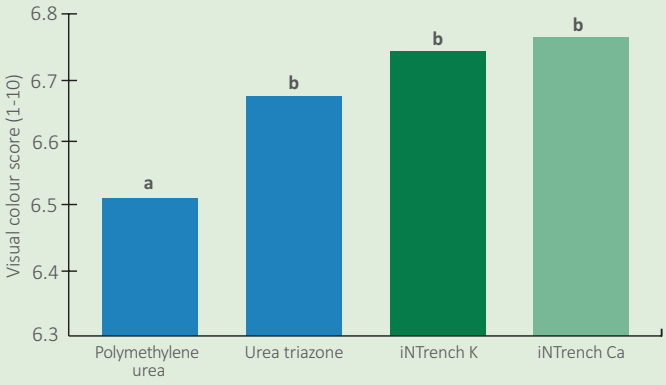
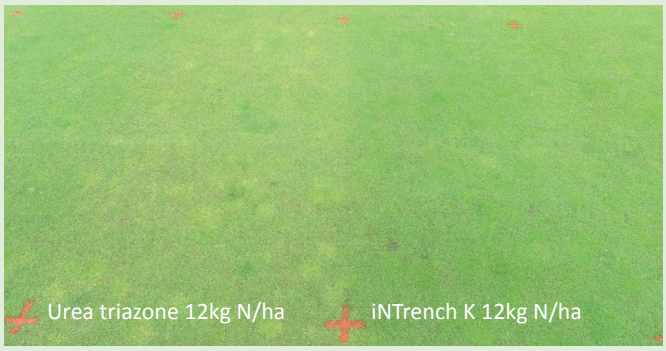
Better colour and quality

A trial, carried out at the Sports Turf Research Institute (STRI) in the UK, compared iNTrench Ca and iNTrench K to two competitor products. The graph shows iNTrench delivered a statistically significant (P<0.05) increase in visual colour score, compared to polymethylene urea, and numerically better visual colour scores than urea triazone when the same rate of N was applied (6, 12 or 24 kg/ha). Bars represent the average of the three N rates.

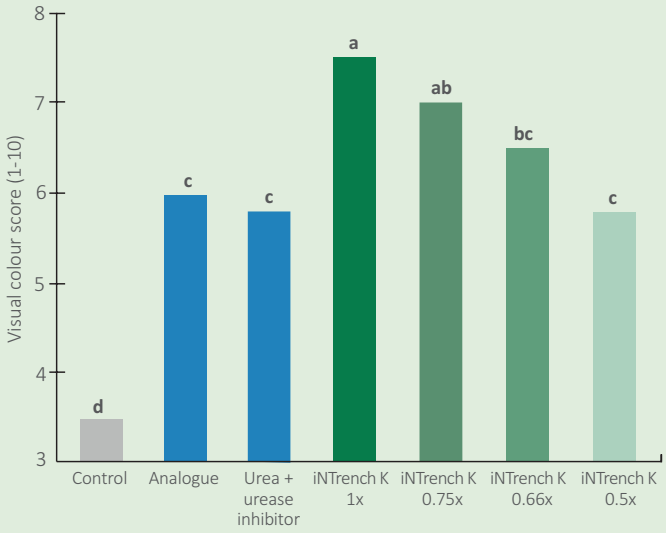




STRI trial conducted in the UK. Photo taken six weeks after initial applications.

iNTrench performs even at lower rates

In a trial on *Poa annua* at Pebble Beach, California, iNTrench K was compared with untreated plots, an analogue fertiliser (which comprised of potassium nitrate and ammonium sulphate), and a competitor product with a urease inhibitor. When the same amount of N was applied (39 kg/ha), the turf colour was significantly better with iNTrench K (P<0.05). Even when lower application rates of iNTrench K were used, the colour scores were still comparable to those from the analogue and competitor treatments.



Directions for use

Apply 20-100 L/ha to achieve desired N input. Use first in the spring when new growth appears, repeat every 4-10 weeks to maintain growth and quality. Due to the improved efficiency of N delivery and uptake, iNTrench can be applied at 25% to 33% less nitrogen than conventional slow release N products. For more detailed advice, consult your agronomist.

Application rate (L/ha)	N Input (kg/ha)		Water rate (L/ha)
	iNTrench K	iNTrench Ca	
20	3.6	4.0	300-600
60	10.8	12.1	300-600
100	18.0	20.2	300-600

Tank mixing

iNTrench is compatible with most pesticides, adjuvants and foliar fertilisers. Mixing iNTrench Ca with products containing high levels of sulphate or phosphate may cause precipitation. Always conduct a jar test before use to ensure physical compatibility.

iNTrench™ PiNT™

Find more information on our PiNT technology products for turf at: www.plantimpact.com

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