

The Nitrogen Plan is available on the browser in the **'Fertiliser/Slurry Application'** option. The aim of this planner is to help farmer track nitrogen application as well as recommending amounts of Nitrogen to be applied each month. There are three simple steps in creating a plan;

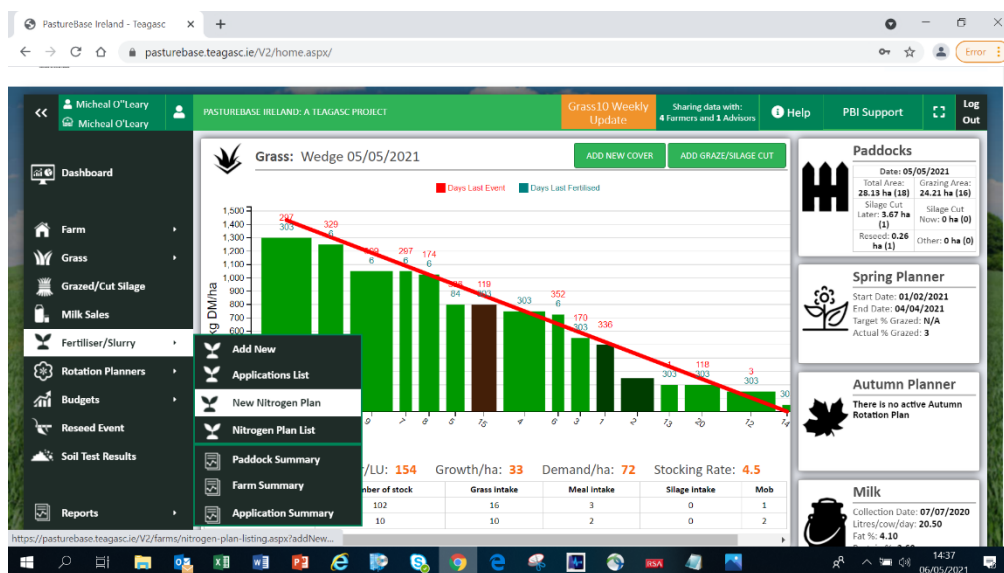
1. Calculate the amount of slurry available on the farm
2. Allocate your paddocks to a particular use (grazing, grazing + 1 cut etc)
3. Choose the fertiliser product and the amount of slurry to be applied

Once a plan is created you can track target versus actual in three different reports (Slurry N, Chemical N and Total N)

We recommend all farmers to complete a plan and start recording fertiliser and slurry application on PBI.

Creating a Nitrogen Plan

Select **'New Nitrogen Plan'** in the **'Fertiliser/Slurry Application'** option.



Enter the name of the plan, the year and the amount of chemical nitrogen fertiliser per hectare you want to apply and select **'Continue'**. The name of the plan needs to be unique.

Create Nitrogen Plan

Plan Name: *

Year: *

Total kg of Chemical N/ha: *

CANCEL

CONTINUE

Setup Screen – Slurry Calculation

The **'Setup'** screen is now displayed. First the amount of slurry available on the farm is calculated. See below. This is only the amount of slurry solely produced by livestock. Other sources for example, silage effluent tanks, collecting yards, imported slurry etc are not included, however, the figures can be manipulated in order to include these.

Different stock types can be added to the list and the number of stock and the number of weeks the livestock are housed need to be entered. The total amount of slurry on the farm is calculated in cubic meters and in gallons on the top right hand corner of the screen.

Nitrogen Plan 2021 Test SAVE SAVE & CONTINUE

Slurry Calculation Farm Total (m³): 0 Farm Total (gallons): 0

NAME	NUMBER OF STOCK	WEEKS HOUSED	WEEKLY CUBIC METERS	STOCK TYPE TOTAL (m ³)	
Spring Milkers	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0.33"/>	0	ADD NEW STOCK Delete
0 - 6 months	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0.08"/>	0	Delete
6 - 12 months	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0.15"/>	0	Delete
1 - 2 years	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0.2"/>	0	Delete
Stock Bull	<input type="text" value="0"/>	<input type="text" value="0"/>	<input type="text" value="0.26"/>	0	Delete

Setup Screen – Paddock Allocation

The next step is to allocate each paddock to a use, i.e. what is the paddock going to be used for? There are five options; grazing, grazing + 1 cut of silage, grazing + 2 cuts of silage, grazing >25% clover and not included. All paddocks will default to 'grazing'. The paddock usage is required as there are different nitrogen regimes for each option. See below paddock 2 is used for calves and it is not included in the nitrogen plan. Paddock 1, 3 and 5 are used for grazing while paddock 4 for grazing + 1 cut of silage etc. Please note there is also a tick box if slurry is going to be applied on the paddock. Again by default all the paddocks are selected.

Paddock Allocation

CODE	NAME	AREA	APPLY SLURRY	Paddock Usage
2	2	1.87	<input checked="" type="checkbox"/>	Not included
1	1	1	<input checked="" type="checkbox"/>	Grazing
3	3	1.042	<input checked="" type="checkbox"/>	Grazing
5	5	1.042	<input checked="" type="checkbox"/>	Grazing
4	4	2.36	<input checked="" type="checkbox"/>	Grazing + 1 Silage Cut
6	6	0.702	<input checked="" type="checkbox"/>	Grazing + 1 Silage Cut
7	7	0.698	<input checked="" type="checkbox"/>	Grazing + 2 Silage Cut
8	8	1.16	<input checked="" type="checkbox"/>	Grazing > 25% Clover
9	9	2.412	<input checked="" type="checkbox"/>	Grazing
10	10	1.407	<input checked="" type="checkbox"/>	Grazing

Summary Table

Under the paddock list is the summary table. This breaks down the paddocks on the farm into the different paddock usage.

Paddock Usage	No of Paddocks	Area of Paddocks	% of Farm
Grazing	8	13.4	48
Grazing + 1 Silage Cut	4	5	18
Grazing + 2 Silage Cut	4	6.7	24
Grazing > 25% Clover	1	1.2	4
Paddocks Not Included	1	1.9	7

Percentage of Nitrogen to be applied per month table

This table shows the total amount of chemical nitrogen per hectare to be applied. These values can be updated at any time. Adjacent to this is the percentage of total nitrogen to be applied per month. In the example below, 11% of 250kg N will be applied in Jan/Feb, 11% in March and 14% in April. If fertiliser application is not possible in Jan/Feb for example, this box can be updated from 11% to 0%. All the other months will then subsequently update to ensure the total is 100%

% of N applied per month										
Paddock Usage	Total Chemical N/ha	Jan/Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Total
Grazing	250	11	11	14	16	15	12	8	13	100
Grazing + 2 Silage Cut	250	11	40	0	0	39	0	0	10	100
Grazing + 1 Silage Cut	250	11	41	0	0	15	12	8	13	100
Grazing > 25% Clover	250	18	18	21	12	5	12	6	8	100

The next step is to select 'Save & Continue'

Formulating a Nitrogen Plan

On the screen below slurry application will need to be entered (green area), followed by chemical nitrogen. The first section is for 'grazing' then 'grazing + 1, cut of silage' etc. The 'Organic Application Method' needs to be selected and different methods have different amounts of nitrogen available and there is more nitrogen available in the spring when compared to summer slurry. The application rate in 'gallons per acre' is also required. The 'kg N/ha' and 'units of N/acre' are then calculated.

For each month a chemical fertiliser product needs to be selected. The percentage of nitrogen in the product is displayed. The number of 50kg bags per acre are also calculated. The percentage of total chemical nitrogen can be edited in this screen also if required. Once the slurry and chemical nitrogen products are selected for each month the next step is to start the 'grazing + 1 cut of silage' etc.

Paddock Usage: Grazing	No. of Paddocks: 12	Area of Paddocks (ha): 18.84	Percentage of Farm Area: 67	Available Slurry (Gallons): -106774
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TOTAL AMOUNT OF CHEMICAL N 240	JAN/FEB	MARCH	APRIL	MAY	JUNE	JULY	AUGUST	SEPTEMBER	OCTOBER
Organic Application Method	Spr - D B	Select...	Select...	Select...	Select...	Select...	Select...	Select...	Select...
Gallons per Acre	2500								
kg N / ha	26.5								
Units of N / Acre	21.5								
Total Organic kg N/ha YTD	26.5	26.5	26.5	26.5	26.5	26.5	26.5	26.5	26.5
Chemical Fertiliser	Urea	18-6-12	Urea	27-2-5-5	Urea	Urea	Urea	10-10-20	
% of N	46	18	46	27	46	46	46	10	
% of Total Chemical N to Apply	11	11	14	16	15	12	8	13	
Target kg N/ha	26.4	26.4	33.6	38.4	36	28.8	19.2	31.2	
Target Units N/acre	21.5	21.5	27.3	31.2	29.3	23.4	15.6	25.4	
Number of bags/acre	0.5	1.2	0.6	1.2	0.6	0.5	0.3	2.5	
Total Chemical kg N/ha YTD	26.4	52.8	86.4	124.8	160.8	189.6	208.8	240	

Paddock Usage: Grazing + 1 Silage Cut	No. of Paddocks: 2	Area of Paddocks (ha): 1.97	Percentage of Farm Area: 7	Available Slurry (Gallons): -106774
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TOTAL AMOUNT OF CHEMICAL N 240	JAN/FEB	MARCH	APRIL	MAY	JUNE	JULY	AUGUST	SEPTEMBER	OCTOBER
Organic Application Method	Select...	Spr - D B	Select...	Select...	Select...	Select...	Select...	Select...	Select...
Gallons per Acre		3000							
kg N / ha		31.8							
Units of N / Acre		25.9							
Total Organic kg N/ha YTD	0	31.8	31.8	31.8	31.8	31.8	31.8	31.8	31.8

Reports

At the top of the Nitrogen plan screen there are three reports in blue; 'Slurry', 'Chemical N' and 'Total N'. These reports display the target monthly nitrogen to be applied versus the actual nitrogen applied on a per paddock basis. It is important that fertiliser and slurry applications are recorded on PastureBase Ireland and are kept up to date. These reports can then be exported to excel or PDF.

PASTUREBASE IRELAND: A TEAGASC PROJECT	Grass10 Weekly Update	Sharing data with: 4 Farmers and 1 Advisors	Help	PBI Support	Log Out
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Nitrogen Plan 2021 Test

Slurry	Chemical N	Total N	Export to Excel	Export to PDF	PLAN SETUP	SAVE
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Total N

Farm Summary - Target / (Actual)

[CLOSE](#)
[Export to Excel](#)
[Export to PDF](#)

CROP TYPE	AREA (HA)	JAN/FEB (KG N/HA)	MARCH (KG N/HA)	APRIL (KG N/HA)	MAY (KG N/HA)	JUNE (KG N/HA)	JULY (KG N/HA)	AUGUST (KG N/HA)	SEPTEMBER (KG N/HA)	OCTOBER (KG N/HA)	TOTAL (KG N/HA)
Grazing	18.84	49 (5)	28 (0)	35 (7)	40 (0)	38 (0)	30 (0)	20 (0)	33 (0)	0 (0)	271 (12)
Grazing + 1 Silage Cut	1.97	28 (0)	103 (0)	0 (0)	0 (0)	38 (0)	30 (0)	20 (0)	33 (0)	0 (0)	250 (0)
Grazing + 2 Silage Cut	5.92	28 (0)	100 (0)	0 (0)	0 (0)	98 (0)	0 (0)	0 (0)	25 (0)	0 (0)	250 (0)
Grazing > 25% Clover	1.41	45 (0)	45 (0)	53 (27)	30 (0)	13 (0)	30 (0)	15 (0)	20 (0)	0 (0)	250 (27)
Total	28.14	42 (4)	49 (0)	26 (6)	28 (0)	49 (0)	24 (0)	16 (0)	30 (0)	0 (0)	264 (10)

Grazing

Paddock	AREA (HA)	JAN/FEB (KG N/HA)	MARCH (KG N/HA)	APRIL (KG N/HA)	MAY (KG N/HA)	JUNE (KG N/HA)	JULY (KG N/HA)	AUGUST (KG N/HA)	SEPTEMBER (KG N/HA)	OCTOBER (KG N/HA)	TOTAL (KG N/HA)
2	1.87	28 (0)	28 (0)	35 (0)	40 (0)	38 (0)	30 (0)	20 (0)	33 (0)	(0)	(0)
1	1	28 (0)	28 (0)	35 (0)	40 (0)	38 (0)	30 (0)	20 (0)	33 (0)	(0)	(0)
3	1.042	28 (0)	28 (0)	35 (0)	40 (0)	38 (0)	30 (0)	20 (0)	33 (0)	(0)	(0)
5	1.042	54 (28.3)	28 (0)	35 (0)	40 (0)	38 (0)	30 (0)	20 (0)	33 (0)	(0)	(28.3)