Miscellaneous.

To Make Farm Life Attractive.

1. By less hard work. Farmers often undertake more than they can do well, and consequently work too early and too late.

2. By more system. The farmers should have a time to begin and stop labour. They should put more mind and machinery into their work. They should theorize as well as practice, and let both go together. Farming is healthy, moral and respectable; and in the long run may be made profitable. The farmer should keep good stock, and out of debt

3. By taking care of health. Farmers have a healthy variety of exercise, but too often neglect cleanliness, eat irregularly and hurriedly, sleep in ill-ventilated apartments, and expose themselves needlessly to cold.

4. By adorning the home Books, papers, pictures, music and reading, should all be brought to bear upon the indoor family entertainments; and neatness, comfort, and order, shrubbery, flowers, and fruit, should harmonise all without. There would be fewer desertions of old homesteads if pains were taken to make them agreeable. Ease, order, health and beauty, are compatible with farm life, and were ordained to go with it.—*Western R[illegible]*.

Useful Rules for Farmers

TO MEASURE HAY.

To measure the solid contents of different shaped stacks *exactly*, would require too complicated a process for general use; the following methods will give results sufficiently true for all practical purposes.

1. *In a mow*—Multiply length, breadth, and height in feet, and the product will be the number of cubic feet contained.

2. *In a round stack with a conical roof*—Multiply the mean circumference by ·0533, and add to the product the perpendicular height to the eaves; this gives a computing height. Then multiply the square of the circumference by ·08 and again by the computing height, and this product will give the solid contents in the stack.

Example—Required the number of cubic feet in a round stack with conical roof. The stack is 40 feet in mean circumference, and its perpendicular height to eaves is 12 feet; 40 x ·0533 = 2 132. To this add 12, and we have for result 14·132, the computing height. Now the square of 40 is 1600; multiply 1600 by ·08, and we have 128. Now, multiply 128 by 14·132, and we have 1808 896, the number of cubic feet in the stack.

3. *Oblong stack*—If the stack be oblong, with a roof in form of a triangular prism, to the perpendicular height of stack to the eaves add one fourth of its mean breadth for the computing height; then multiply computing height by the mean breadth, and again by length, and the result will be the solid contents of the stack.

Example—Required, the number of cubic feet in a stack, with a roof in shape of a triangular prism, the stack being 15 feet across, and its perpendicular height to eaves being 12 feet, and its length 30 feet. One-fourth of 15 (mean breadth) is 3·75; add to this 12, and we have 15 75, which is the computing height; multiply 15 75 by 15 and we have 236·25. Now, multiply 236·25 by 30, and we have 7087·50 cubic feet in the stack.

When we have discovered the number of cubic feet in a stack or mow, we proceed to assign a given number of cubic feet to, say a ton of hay. In stacks that have lain over the year, about 343 cubic feet, or 7 feet every way, will make a ton of timothy hay; and 275 cubic feet or 6½ feet every way, of clover hay. In the mow about 729 cubic feet or 9 feet every way will contain a ton of old hay, and about 10 feet every way a ton of new hay.

These are not, however, by any means arbitrary rules, as much depends upon the quality of hay, and the manner of putting it in the barn or stack, but they are as true as can be obtained, without going into any elaborate calculation.

[illegible]

To find the number of gallons contained in a vessel by measurement of said vessel:

If the length, breadth, and depth of a vessel be measured in inches and multiplied together, the product divided by 277.274 will give the number of gallons that the vessel will contain.

When the vessel is very long, narrow and shallow, take the length in feet, the breadth and depth in inches, and divide by 23 106.

When the vessel is very narrow one way, broad and deep, take the narrow way in inches, the breadth and depth in feet, and divide by 1.925.

When all the dimensions are measured in feet, divide by .16.

For cylindrical vessels, circular wells, pipes, &c.:—

Take depth and diameter in inches and divide by 353.

Take depth in feet and diameter in inches and divide by 29.4.

Take depth in yards (or length as in pipes) and diameter in inches, and divide by 9.8.

Take depth in inches and diameter in feet and divide by 2.45.

Take depth and diameter in feet and divide by .204

MEASURING LOGS

To get the *exact* contents of a log, measure round the tree at the middle, square the result, and multiply it by .0795, and the product by the full length of the log, but practically it is sufficient to square the girth at midway, divide result by 4. and multiply the product by the full length.

NUMBER OF PLANTS IN AN ACRE.

The following table shows the number of plants that an acre will hold at different distances apart each way, and is useful in computing the number of cabbages, &c., required to plant a given space of ground :—

Distance between plants each way Ft.	In.	Number of plants in an acre
10	0	[illegible]
9	9	[illegible]
9	6	482
9	3	[illegible]
9	0	537
8	9	[illegible]
8	6	[illegible]
8	3	[illegible]
8	0	[illegible]
7	9	[illegible]
7	6	774
7	3	825
[illegible]	0	889
	9	956
6	6	[illegible]
6	3	1115
6	0	1210
5	9	1317
5	6	[illegible]
[illegible]	3	1584
5	0	[illegible]
4	9	[illegible]
4	6	2151
4	3	[illegible]
4	0	2722
[illegible]	9	[illegible]
3	6	[illegible]
3	3	[illegible]
3	0	4840
2	9	[illegible]
2	6	[illegible]
2	3	[illegible]
2	0	10890

Preventive of the Decay of Wood

Experiments have been carried on in Paris for a long time in the intent of finding out a means of preserving palings, posts, etc., from decay. As a result of five years' experience, a paint is recommended which at the same time possesses the advantage of being impervious to water. It is composed of fifty parts of tar, forty parts of finely crushed chalk, five hundred parts of fine, white hard sand, four parts of linseed oil, one part of the red oxide of copper in its native state, and finally, one part of sulphuric acid.

In order to manufacture the paint from this multiplicity of materials, the tar, chalk, sand and oil are first heated in an iron kettle; the oxide and sulphuric acid are then added with a good deal of precaution. The mass is then carefully mixed. It is now ready for use, and must be applied while hot. In coating the timber a stiff brush is used. After this paint has cooled and dried, it forms a coating or varnish quite as hard as stone

A correspondent writing to the New York Farmers' Club says that he has known a very foul cask to be entirely cleansed by filling it with dry earth and leaving it four or five days. The earth treatment, followed by scalding lime-water, will sweeten anything but a very old and rancid tub.