These views are confirmed by the conduct of the London dairy-men. While they acknowledge that the Alderneys yield the best milk, they keep none of them, whatever they may pretend, because these animals are peculiarly delicate, and more especially because they cannot, after being used as milkers, be fattened for the butcher. The York and Durham cows suit them best.

In certain constitutions, however, and to a certain extent, there is a compatibility between fattening and milking.

Mr. Knight says, the disposition to give much and rich milk, and to fatten rapidly, are to some extent at variance with each other; but I have seen cases in which cows which have given a great deal of rich milk have given birth to most excellent oxen, the cows themselves, however, always continuing small and thin whilst giving milk.

I very confidently believe in the possibility of obtaining a breed of cows which would afford fine oxen, and would themselves fatten well; but as great milkers require much more food than others, the farmer who rears oxen, does not think much, perhaps not enough, about milk, and is in the habit (which is certainly wrong,) of breeding his bulls from cows which have become his best, owing only to their having been bad milkers.

In the selection of bulls, besides attending to those properties which belong to the male, we ought to be careful also, that they are descended from a breed of good milkers, at least if we wish the future stock to possess this property.

Water Rotted Hemp,

Being worth considerable more in market than dew-rotted, we insert the following instructions from the Kentucky Farmer :—

The first thing to be done in making preparation for the business of water-rotting hemp, is the formation of suitable vats or pools. These will generally be most conveniently and easily made upon some *small* stream of water. A *small* stream constantly fed by a few good springs is recommended; because, having once filled the vats, it will afford an ample supply of water without subjecting the farmer to the inconvenience and injury which a large and rapid stream would obviously occasion, both by its deposities of mud upon the hemp, and the violent action of its current on the embankments of the vat. A solid limestone bottom is an advantage, contributing as it does, to the clealiness of the business. Our numerous small streams or "*branches*," afford us the opportunity of selecting a site combining all these advantages. In selecting a place for the vats, it would be better to choose a position to the North-east of the dwelling-house, so that our prevailing South-west winds may carry off the unpleasant, if not unwholesome effluvia arising from hemp as it rots. Having, on consideration of all circumstances made choice of a site, the vats should be dug about 3 feet deep, and should be about 6 feet long, and 40 feet broad. These dimensions may, of course, vary at pleasure; but this size would probably be most convenient, as it could be filled or emptied by two hands in one day. Such a vat would hold the produce of about two acres of hemp of an average quality. Several vats would probably be necessary; and if so, they should be dug adjoining each other, leaving only the embankment as a passway between them.

Having dug the vats, an outlet should be formed for the stream, by opening a channel *over* the lower embankment some five or six inches deep. The bottom of this channel should be covered with plank or stone, to prevent the injurious action of the current. Nothing remains to complete the vats except to make a platform large enough to hold an ordinary slide and two persons, across that *corner* of the vat nearest to the field on which you intend spreading the hemp when taking from the vats.

Having thus completed the vats, a quantity of plank about 8 inches broad, and about 10 feet long, should be procured, sufficient to cover the vats, leaving spaces of about one foot in width, between the two rows of plank. A large quantity of stone should also be quarried and hauled to the vats. The plank and stone are to be used as hereafter directed, for the purpose of sinking the hemp in the water.

These preparations being made, the farmer will be ready to begin the operation of rotting the hemp, as soon as it has been cut and slightly cured. If he has laborers enough employed to cut his hemp in proper season, and to haul it to the vats, to put it in, take it out and put it in every six or seven days, he may save entirely the expense and trouble of stacking it. I will suppose, however, that the farmer has only such a force as will enable him to cut and stack his hemp, in proper time and in the usual manner. In this event, he must be careful not to permit his hemp to be blackened by rains before it is taken up and slackened; as this is thought not only to destroy the favorite color of water-rotted hemp, but to injure materially the strength of its fibres. Having been engaged some 3 or four days cutting hemp, the farmer should have all the hemp which is sufficiently cured, carefully tied in small straight bundles, and stacked in the usual manner. The whole crop should be cut, tied, and stacked in this way.

As early as possible after securing his hemp, the farmer should begin the business of rotting it. This is important, because that has much influence in hasting the process of rotting. In warm weather, the hemp will be ready to take out of the vats in five or six days; and will not swell so badly, whereas in winter it will sometimes require two months immersion in the water; and the business of filling and emptying the vats and spreading the hemp will then be most laborious, unpleasant, and unhealthy. This, any one can understand, by imagining himself engaged, on a raw cold day in January, in breaking the ice over a vat of hemp, which has been slowly rotting for sixty days; in lifting out the astonishing heavy bundles of this 'putrid mass,' and then spreading it wet, cold, and stinking on the ground. It may with more propriety be said that in summer, or fall, the gum which causes the fibres to adhere to the stalk is *dissolved*, than, that the hemp is *rotted* by the heat and water.

The first operation, when the farmer is ready to begin rotting his hemp, is to haul it to the vats. Carts are the most convenient vehicles for this purpose, as they can be at once unloaded by tilting up. Two hands with two carts should work together, as one should stand upon the stack while loading and hand the bundles to the other on the cart. A light but strong frame, should be fitted on the cart body, extending about 18 inches wider on each side, and 2 feet longer at each end than the body. It may be made by any one with a saw, auger, and hatchet. Take two pieces of scantling about 6½ feet long, to lay *across* the cart body before and behind; pin to the end of these, two pieces of wood or plank long enough to extend two feet before and behind the body, and connect the ends of these two last mentioned pieces with strips of plank, and the frame is complete. Pins put into the cross of the scantling, will keep the frame steady and prevent it from slipping on the body. It is astonishing how much more hemp or hay can be carried on these frames, than on cart bodies without them. Any farmer will be well paid for the trouble and expense of making them.

Two hands will generally put the hemp in the vats as fast as two will haul it. Those engaged in putting in the hemp, should proceed as follows :—Beginning on one of the sides opposite the platform, they should take the bundles of hemp and lay them down side by side in the water, the buts next to the bank, and the points straight out into the vat. Having laid down one row, begin as before, and lay another on top of the first, exactly in the same manner as before, except that the buts should be one foot further in the vat.—When the 2nd row is completed about one foot of the buts of the 1st row will be visible and the points of the 2nd or upper row will extend about one foot beyond the 1st. Lay down a third row, putting the buts about one foot further than those of the 2nd. When three rows have been laid down, lay plank across them and the laborer can stand upon it and put down other rows. In this manner, putting down three or four rows, and then laying plank across, the whole vat may be filled, without the laborer being under the necessity of wetting even his feet. The whole operation strongly resembles the mode in which shingles are placed upon a roof. A bulk of hemp, three or four bundles deep, will, when crossed with plank, form a raft which will support a man.

The distance that the buts of one row projects beyond those of the adjoining row, should vary to suit the depth of the vat, the length of the hemp and size of the bundles. If the hemp were seven feet long, and the but ends of each row showed one foot, then it is evident that the vats would be filled with a bulk of hemp six bundles deep, which would probably average with ordinary bundles, about 3 feet in depth when first put in, but which would be diminished after laying in the water sometime. Any one however, will soon learn to apportion this so as to suit the depth of the vats and the quality of his hemp.

This arrangement of the bundles of hemp in the vats, will evidently leave the *tops* at the bottom of the vat, and the buts at the surface. This is proper; because the buts being more difficult to rot, should be placed nearer the surface where the greater heat of the water expedites the process of decomposition. A uniform and regular rot is the consequeuce of this mode of arranging the hemp in the vats.

Having thus put in the hemp, and of course having crossed it with plank, the next operation is to sink it just to the surface of the water with stone. It had better be slightly above than below the surface, because as soon as saturated with the water it will sink lower. The stone should not be larger than one man can readily carry, because the necessity of having two men to lift one stone, would accumulate so much weight upon the different plank as they walked over them, as to sink them in the water. The laborers cannot with such large stone '*weight*' down the hemp as soon as with smaller, nor can they escape if they use such with dry feet. For the same reason logs of wood are still more objectionable. In '*weighting down*,' carry the stone to the farthest plank first, and sink it sufficiently, than the next, and so on in succession till completed. This mode will evidently permit the laborer to keep himself dry, by stepping on the unloaded plank, while carrying stone to the farthest.

Having in this manner sunk the hemp in the vats, it will require no additional labor till ready to be taken out, except that the farmer should by any means neglect *seeing* that the hemp is completely immersed in the water. This may *not* be the case from two causes. First, the weight of stone may not be sufficient, in which case the remedy is obvious, and secondly, the water may not be enough to cover all the hemp which being weighed to the bottom, is stationary. The remedy for this, should be found in the proper construction of the vats. The *outlets* for the water should be some five or six inches below the upper surface of the embankment.