

to cotton, and, from the difference in the structure of the fibres of the two plants, it is obvious that the same materials would produce different shades of colour upon the two substances. The mode of treating the flax fibre pursued by M. Claussen, which we stated a few days since, that of destroying its cylindrical character, and changing it into a cotton-like substance, completely obviates this difficulty and renders perfectly easy that which would otherwise have been impracticable viz, the imparting an equal and uniform colour to yarns formed from a mixture of the two substances.—As a practical proof of this, several bundles of yarn spun from equal proportions of flax and cotton, and dyed in various colours, have been submitted to us, after the most minute inspection has not enabled us to detect any of the different cases of shade or colour which might have been expected in yarns composed of two such different materials. As a proof of the perfect command which M. Claussen possesses over the materials with which he deals, we may state that some samples were also shown to us of yarns spun from the pure flax fibre, prepared to mix with silk, and dyed in colours possessing all the brilliancy and lustre peculiar to those of that material.

Whatever improvements may yet be made in the preparation of these materials and in the various details required to ensure perfection, nothing now remains to be done, so far as the principle of adapting flax to cotton or wool machinery and of dying the yarns or fabric is concerned, and we sincerely trust that our agriculturists will not neglect the immense market which these discoveries are calculated to open up for any amount of flax which they may produce. Flax may be grown upon almost any soil; all the objections that are previously entertained against its growth, on the ground either of its exhaustive character or the difficulty of its preparation for market, are now removed; and it has been proved to demonstration, by Mr. Warnes and numerous other agriculturists in England and Ireland, that it is a highly remunerative crop.

With respect to this demand for the article we need only say that one thousand tons of cotton are required daily as food for the factories of Manchester, and if but one-half of that enormous demand can be supplied by flax, the produce of 2,000 acres daily, or 700,000 annually, will be required, while not less than 500,000 acres are wanted to furnish the quantity now consumed in our linen manufactures and which with but a trifling exception, is derived from foreign countries. So far as the manufacturers are concerned the question now asked is not, "will the experiment succeed?" but, "whence shall we be able to get the necessary supply of flax?" Several of the leading manufacturers of Manchester and its neighborhood have already expressed their determination to sow large portions of their land and with flax. This conduct on their part is well calculated to inspire confidence in our agriculturists, and should induce them to endeavour to obtain possession of the new market thus called into existence, before it shall have been occupied by the foreign producer. A supply of the raw material must be obtained by the manufacturer; his mill must be kept at work! and unless some steps be immediately taken in the matter, our farmers will by their supineness, have given to foreign countries the same monopoly in the supply of flax for the cotton and woollen, as they now possess in the linen manufactures of the country.

FLAX COTTON.

We have seen a specimen of the cotton produced from flax, and it exactly resembles the ordinary cotton only that it appears to be much more lustrous.

LINEN AS A SUBSTITUTE FOR COTTON.—The *Maysville, Ky., Post Boy*, referring to the recent interest which has been awakened in the public mind by the experiment now making with a view to substitute flax for cotton, says:—"We have a sample before us of 'flax cotton' which is as white and soft, and fine as any cotton, but of a richer and more glossy silk-like appearance, and which evidently can be spun into very fine yarns as cheaply as cotton. Now this material can be produced from unrotted flax for seven cents per pound! And we know that unrotted flax can be procured so that the lint shall stand at one and a half cents a pound, leaving a pretty wide margin for the preparation to bring the material to seven cents. It is known that there is no object in growing cotton for a less sum, so that it is far from being an impossibility that linen may yet be produced as cheap as cotton.

We understand that the inventor, Dr. Leavett, and his associates, are making their arrangements to bring out their inventions promptly and vigorously; that they throw them wide open to the public, and afford every facility possible for the establishment of linen factories, by contracting to furnish the machinery as expeditiously as possible, at fair prices, and with such guarantees as the safety of the manufacturers will require. They propose to put out different parts of this work in different machine shops throughout the country, east or west, near where the factories are to be built, as is frequently done with cotton factories, so that as little delay as possible may be occasioned in getting factories into operation.

We also understand that they are now in negotiation with several companies who are preparing to go into the business.—*Cin. Gazette.*

STRONG VITALITY OF SOME VARIETIES OF WEED-SEEDS.—A correspondent of the *Al. Cultivator* says:—

The garden which I occupy had been neglected before it came under my care in the autumn of 1842.—There was in it a small triangular plat, of less than two square rods, surrounded by gooseberries. This I found covered with the yellow dock. It has now been under cultivation for eight years, and has occasionally been deeply spaded. I think it fully within the limits of truth to say that I have destroyed upon it three crops of young plants each year; *and the end is not yet.*—The fact obviously is, that each year of cultivation has thrown up seeds that had previously lain too deep cast and removed from the air to germinate. All seeds have not this strong vitality. Corn and beans deeply planted will speedily rot, but potatoes and peas will grow from any depth at which they ever become buried by the deepest cultivation.

Let farmers beware how they neglect a crop of weeds under the impression that a little extra cultivation, the next year, will make up the difference. It may be so with some varieties, but with many it will not, as they will discover, to their expense and sorrow, in long subsequent years. Query? Who has experimented on this subject, and will give the public a table exhibiting the different vitality of weed-seeds.

EFFECTS OF RAILROADS ON AGRICULTURAL PRODUCTS.—The effects of railroads in modifying the agriculture of different sections, is illustrated by the example of Massachusetts. Since 1840, about 800 miles of railroads have been laid in that state. According to the returns of the assessors, it appears that the number of horses in the state, has increased from 60,030 in 1840, to 74,060 in 1850. This is remarkable, especially when we consider the fact that the railroads have