IRISH TEXTILE JOURNAL

WITH WHICH IS INCORPORATED
THE BELFAST LINEN TRADE CIRCULAR

DEVOTED TO
THE INTERESTS OF THE IRISH TEXTILE INDUSTRIES, AND TO
THE PROMOTION OF TECHNICAL INSTRUCTION.
PUBLISHED ON THE 15TH OF EACH MONTH.

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HIGHEST AWARD (MEDAL) MELBOURNE, 1880
HIGHEST AWARD, PHILADELPHIA, 1876
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<table>
<thead>
<tr>
<th>Diameter (feet)</th>
<th>Length (inches)</th>
</tr>
</thead>
<tbody>
<tr>
<td>30</td>
<td>8</td>
</tr>
<tr>
<td>30</td>
<td>7</td>
</tr>
<tr>
<td>28</td>
<td>7</td>
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<tr>
<td>26</td>
<td>7</td>
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<td>24</td>
<td>6</td>
</tr>
</tbody>
</table>

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The Irish Textile Journal

WITH WHICH IS INCORPORATED

The Belfast Linen Trade Circular.

ESTABLISHED 1859. [REGISTERED] NEW SERIES 1886

Vol. VII. Belfast, October 15th, 1892. No. 82.

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Articles

It must also be borne in mind that though values show an increase this year, quantities are still larger, as it is known that lower-priced goods are being taken by the States.

As to coming to the Board of Trade returns for the United Kingdom, we have been recording a considerable increase for months past, the month of September and nine months of the year being as follows:

<table>
<thead>
<tr>
<th>Month of September</th>
<th>Nine Months to September 10th</th>
</tr>
</thead>
<tbody>
<tr>
<td>1890 ..... 7,101,200</td>
<td>6,876,200</td>
</tr>
<tr>
<td>1891 ..... 7,243,500</td>
<td>7,316,500</td>
</tr>
<tr>
<td>1892 ..... 7,243,600</td>
<td>7,875,000</td>
</tr>
<tr>
<td>1893 ..... 7,707,600</td>
<td>7,316,500</td>
</tr>
<tr>
<td>1894 ..... 7,743,200</td>
<td>7,875,000</td>
</tr>
</tbody>
</table>

The foregoing statistics will completely refute all sensational statements as to the decline of the linen trade in the United States.

Development of South American Trade.

Our Manchester correspondent calls attention to the enterprise of some well-known English machinists who have recently established a new company at Buenos Ayres, for the purpose of promoting the sale of British manufactures, chiefly machinery, in the region of the River Plate. He points out that textile manufacturers should follow the example, and show more energy in opening up undeveloped markets. An Export Company for pushing the sale of British and Irish Textiles would, if properly managed, be very useful to our manufacturers. In point of fact it would be a subject which would and doubtless in new countries or places, where it would be far too expensive to send representatives of individual firms, many of our manufacturers might be able to find a profitable outlet for their goods by means of an agency of this kind, in which, as shareholders, they had a direct interest.

The establishment of a large joint-stock co-operative agency of the kind would, no doubt, provoke the jealousy of private distributing firms; but in an extensive region, where a large amount of ground was unsold, or only very feebly worked, this opposition would not count for much.

Royal Dublin Society.

In a paragraph which appeared in the Farmer's Gazette for last week, we observed that a vacancy has taken place in the office of Agricultural Superintendent of the Royal Dublin Society, through the resignation of Mr. Macdonald—what is believed to be the main reason why Belfast would not exhibit to any extent. Others were mentioned, but the greatest stress was laid upon this, that the duties were now "actually prohibitive." This statement was endorsed by at least one of our daily papers in the faces of statistics having a directly opposite bearing. It need scarcely be wondered at that a Dublin paper, not taking the trouble to consult official returns, should have reported a decline in the Belfast linen exports to the United States, when those who should have been better informed gave colour to the statement. It appears some sensational reports have been circulated in the American press on this subject, in consequence of this Dublin announcement. We dare say that in the Southern and Western States such may obtain currency, but the statistical returns which are published every week in many of the New York papers will quite disprove statements of the kind in that quarter. From exchanges to hand this week we give the most recent figures in reference to the manufactures of flax imported into New York from Europe and America:

<table>
<thead>
<tr>
<th>Declared Value for Eight Months to August 1891 and 1892</th>
</tr>
</thead>
<tbody>
<tr>
<td>Entered for consumption, 1891</td>
</tr>
<tr>
<td>Do. for warehousing, 1891</td>
</tr>
<tr>
<td>Total entered at New York, 1891</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>For Week Ended 30th September 1891 and 1892</th>
</tr>
</thead>
<tbody>
<tr>
<td>Entered for consumption, 1892</td>
</tr>
<tr>
<td>Do. for warehousing, 1892</td>
</tr>
<tr>
<td>Total entered at New York, 1892</td>
</tr>
</tbody>
</table>

Agricultural Education.

At a recent meeting of the Cork Corporation the following resolution was unanimously adopted:—"That as this country depends for its prosperity mainly on the success of its agriculture, and especially on the dairy industry, it is essential that the Government should take prompt steps to organize a thorough system of agriculture and dairy education, which should be best promoted by the establishment of an Irish Department of Agriculture; that copies of this resolution be sent to Mr. Gladstone, Mr. Morley, and the Irish members, and that other public boards be asked to cooperate in the demand." The various public boards throughout Ireland ought to follow the above example, and agitate for the formation of an Agricultural Department to work with some degree of energy in the direction indicated. It is hopeless to look for reform under the National Board administration.
Agricultural Regeneration.

THE press notices of the article on a Joint-Stock Farming contained in our number last week seems to have been almost unanimously favourable. There are now numbers of people familiar with the idea of limited-liability farming, and a large proportion of them probably readily give full consideration to any feasible proposal, when the scheme has been put into shape and prepared for a start; some of them, we may fairly assume, ready to support it. Scarcely a doubt has dimmed the anticipations of success which the suggestion is admitted to justify. On the contrary, confidence is expressed in the prosperous future of such a system of farming, that a great many farmers who would not think of going in along and turning it into money. But while the pessimists are correct in their view that the prevention of waste in squandered land, duplicated labour, and all the hundred-and-one details of mismanagement which have helped to make farmers poor, and what is more in any process of production might be expected to pay, first a fair, and in a very short time a good profit. Low prices notwithstanding, there is money to be made by farming in Ireland; there is still more money to be made out of the direct supply of dairy and other food products; and with these and a number of other considerations, the name of the Company would be well borne.

There is a good return to be had, as Mr. Pringle's important letter on another page points out, in the prevention of waste on farms. How much has science effected in recent years in the utilisation of waste products, and what splendid service has it rendered to industry, in reclaiming and using fresh necessaries of manufacture, which for generations, and in some instances for centuries, had been run away into streams or sewers! The subject is most engaging and attractive, and a fair-sized book has already been devoted to it. Great fortunes have been made out of materials which had come to be looked upon as the outcasts of industry, some of which had been regarded as nuisances and only fit for destruction, but that some of them, again, defied destruction, and accumulated in organic heaps until the inventive mind came along and turned them into money. But what case among all the brilliant economists could compare with the prevention of waste in squandered land, duplicated labour, and all the hundred-and-one details of mismanagement which have helped to make farmers poor? What was to be expected in any process of production could equal in worth the interception of waste in sales and values, which has made jobbers and agents and middlemen rich! Anyone can calculate the profit which the butcher makes off the farmer in buying prime beef at the recent official quotation of £10 5s. per lb. by what is paid for a joint for the table.

Profit and hard cash furnish the main motives with which this proposal has been put forward. Unless there appeared to be, not million in it, but the prospect of good dividends, the subject would have had no place in these pages. But, at the same time, we keep steadily in view the inestimable benefit of the success of such a Company, as an example. Proof in black-and-white, on matter-of-fact balance sheets, of the possibilities of what Mr. Pringle happily calls agricultural regeneration, would have, in the first place, an immense effect upon the fortunes of the country. The interdependence of agriculture and manufactures is not even yet sufficiently recognised. Although not written of this country, it is true to the letter everywhere, that it is “upon the productivity of our agriculture and the prosperity of our farmers that the entire wealth and prosperity of the whole nation depend. The trade and commerce of this country of which we so proudly boast, the great transportation facilities so greatly developed during the past quarter of a century only are all possible because the farming industry of them all, agriculture, has called them into being. Even the product of our mines is only valuable because of the commerce and the wealth created by agriculture. These are strong assertions, but they are assertions fully justified by the facts, and recognized by the world over by the highest authorities in political economy.” This is, then, emphatically an industrial question, and we should share all round in any success which the Company might achieve, or any improvement which it might initiate. In the next place, the published and demonstrated results of scientific land culture would have surely have—could hardly help but have—an immediate and—in a compound noun after the German fashion—an earnestly-to-be-desired effect upon our educational system.

The German, by the way, has a very expressive name for his technical schools. They are to him real schools, where children are fitted, as well as may be, for the work which may fall to them in the world, and equipped to encounter the stern realities of life which they must face. Real schools are sadly needed in Ireland. So far as practical teaching and ends are concerned, the National Schools are Pretence Schools. We ask for means of livelihood, and the rudiments of industrial education, and the Board of Education gives us book-learning and a smattering of accomplishments. To expose the defects and shortcomings of the system would be but to stare the evil, and there is no defence of it. It is true that the National Board is beginning to find out that there are blinelines and imperfections in its practice; and how grave must the occasion be, if glaring the faults, when a suspicion of anything less than insufficiency can
reach those which have in charge the training of our children! At the rate that light is breaking in on the system, we may get a change in the policy of the Board in the course of a century or so, which would bring us near the new Boston of Mr Bellamy’s book in point of view. As we have in Irish education just what an eminent philosopher said the British nation could never be brought to tolerate—an inutility. A pretty experiment which was once popular, as serving to show perfect control of the most powerful machinery, set the mighty Nasmyth hammer to crack a nut. It was only a play-ful illustration of the supremacy of man, and the hammer, of course, was generally at work, dealing blows which shook the earth, and fashioning huge appliances with force which Cyclops himself might have envied. That is exactly what Irish education might do, but it keeps us out-cracking. The success of a Farming Company, showing the value of treatment and methods which the Board will only teach in theory, and not much of that, would give fresh impetus to practical education. It would hurry up imperative reform, so that young Irishman might be taught to grow potatoes properly; and there is plenty of room even for that.

At this point, another objection to the proposed Company disappears. It must be borne in mind, we are told, that persons interested in the financial welfare of a Joint-Stock Farming Company will not jump at the idea of letting the secrets of their success be known. We shall be very glad if the Company natches the stage of deciding upon such particulars as will be attempted, and what alone it will determine to hold fast. But, in certainly the greater part, and to an extent which it would be ample room for a good technical school, it would proceed on already-established and approved lines; but, lack! lines which are far too much neglected or unknown. It might go about this part of its work by taking pupils or apprentices to be trained in and for its own service as might be required, ready or to be ready for good appointments elsewhere. It would hope to be the pioneer of thorough agricultural reform, and to find out and make fit many men able and competent to carry on, continue, and extend its work, and, both because of its early start and established position, as well as by reason of the extensive and almost inexhaustible markets open to all, would have little fear of being ousted from its position. It would probably foster many minor undertakings, and, if it succeeded in establishing its own shops in large towns, might expect to do a large collecting business, by which many localities would be supplied, and many dependent industries developed. It would be an object-leasing in acres, and show openly the use which might, and would be, made of them, and it would carry out, to the fullest possible extent, but in a trade still open to enterprise, the business of direct distribution. It would make money with both hands. It would be a public gain in its working and by its teachings. Without being over-sanguine, it is seen, and admitted, too, by qualified critics, that there is a risk of indefinable investment, and there are hardly any bounds to the trade which might be hopeless, and the good which it might accomplish. In wise and enterprising hands, with enthusiasm behind it, and the popular American virtue of stick-to-itiveness carrying it on, such a Company would become an institution which Ireland might be proud.

To what has already been advanced, with Mr Pringle’s admirable letter seconding these suggestions, there can be little to add; but we hope, with all earnestness, that the impression already made will not be allowed to lose strength, without some positive steps being taken to ascertain what measure of public support would be given to a scheme which has in it so much promise of utility and profit.

Leeds Association of Engineers.

At the first ordinary meeting of the session of this society lately held, the president (Mr. Robert Lapton) in his opening address referred to the remarks of the President of the Leeds Chamber of Commerce on the state of trade, and deprecated the tendency to give a bad impression in busy times by making out that what is not good as it really was, a good was easiest to obtain when work was brisk, and a good appearance should therefore be maintained. Leeds was now in the first rank in the engineering world. Makers of marine engines, traction engines, blowing engines, and hydraulic machinery had come to the forefront. Textile machinery had been made in Leeds for fully fifty years for all parts of the world, and material and the best of machinery tools were also produced. From 12,000 to 14,000 people in Leeds were employed in these branches of the trade. There was ample scope, he added, for new inventions and new attention to a hundred conscientious workers. He thought it was a machine for drilling squares and other angular holes in metal. Messrs. W. E. Wood, Towler, Craiger, Scriven, Tempest, Drake, Atkinson, and Blackbern also addressed the meeting on the various points raised on the request of thanks, proposed by Mr. Craiger and seconded by Mr. Wood, was accorded to him.
increase its profits as time passed. At present, land is easily taken and stock very cheap. Entry to a farm is a light undertaking, with eves at 30s., and two-year-olds look at £20. These prices might last long, and those who buy in a low market cannot reap the advantage.

Apart from these considerations, the benefit to Irish agriculturists of following the doing and watching the proceedings of a well-managed enterprise, where industry and skill are pitted against foreign competition, would be immense. That demonstration in high-class farming is sorely needed in Ireland we agree, and if demonstration be supported by a fair return on capital, as declared by the balance-sheet, the prospects of Irish agriculture will gradually rise above the sphere of charity in times of stagnation, and Uncle Sam's need in years, 1892.

Your article is well worthy of the prominent place it occupies in the Irish Textile Journal, and I join with you in hoping that the proposal to establish an Irish Joint-Stock Farming Company may take root and grow.—I am, sir, yours faithfully,

R. HUNTER PRINGLE.

54, York Road, Kingstown,
20th Sept., 1892.

Practical Notes on Textiles: Linen Processes, &c.

IV.

(SPECIALLY WRITTEN FOR THIS JOURNAL.)

Difficulties to contend with.

STAINS and damages of various kinds are often beyond the power of a bleacher to either contend with or remedy, whilst others may be owing to some defect in the process. Iron stains are the most common, and exceedingly troublesome. They appear in the shape of red spots, larger or smaller in extent, but rarely definite, and until the pieces are fully bleached. Their origin is often a vexed question, not easily determined. The machinery may be the cause; if the valet de chambre be kept in order and clean by whitewash, &c., these stains will result. Any machine of iron must be kept free from rust.

Remedy for Water Impurities.

In our September issue we briefly alluded to the water used in bleaching being impregnated with iron; some waters contain so much that they are positively injurious. There is a means of rendering lime in water comparatively harmless, and at the same time precipitating the iron and magnesia salts. Caustic soda, if really pure, will be found an antidote. One quarter of an ounce per gallon is sufficient; in the case of waters but sparingly impregnated with impurities, one-sixteenth of an ounce per gallon has been found effective.

The quantity required may be roughly estimated by adding the eighth of an ounce of pure powdered caustic soda to a gallon of water ; boil, and put to settle for a time; pour off the clear water, and add another eighth of an ounce of caustic soda. If the water remains clear, then the first quantity of soda will be found ample; but if mud remains, the second eighth of an ounce will be found necessary. Large tanks are not readily requisite—although there are very few establishments without some provision for holding a few hours' supply of water—the powdered caustic soda could easily be put in proportion to the contents. If a tank holds 500 gallons, and the water is found to require one-eighth ounce of caustic soda per gallon, then four ounces will be the quantity required. The caustic soda of commerce is very impure, containing, besides other impurities, common salt, so that the use of this form of soda would do more harm than good. Pure powdered caustic soda dissolves at once; a slight motion is sufficient to mix it thoroughly with the water; or the soda may be placed in a tank before it is filled, and the water running in will mix it thoroughly; or the caustic may be put with the water in any vessel before the goods are entered.

Oil Stains, &c.,

are common, and take the form of yellow stains extending in streaks along the piece or in patches. In many instances they do not show until the goods have been sold, when complaints will be received of imperfections. These stains are not always due to the bleacher; in fact, they are the consequence of cheap sizing compositions used in preparing the warps for weaving, and also from the lubrication of the machinery with mineral oils, which resist the bleaching process. It would be a decided gain, in many ways more than one, if the lubricants used in spinning and weaving contained a fair proportion of fatty oils, such as olive, rape, or cocoa nut about ten per cent., would suffice.

Alkaline Bath.

The hot alkaline bath is considered to have a tendering effect upon the fibre in bleaching; so that some bleachers substitute for the alkali a bath slightly acidulated either with sulphuric or hydrochloric acid.

following this up by a bleaching process with hypochlorite of soda, especially for yarns. The backs, strung on a rod, are plunged for five or ten minutes at the most in a solution of hypochlorite of soda, 4–5 parts per cent., then rinsed and drained, and bleached in chloride of soda, 2 degrees, until the desired shade is obtained—cream-white—then again rinsed and drained. A wash with a bath of sulphuric acid, 1–3 degrees, is then given, to remove the yarn, which is afterwards aired and drained. Hydrochloric acid may be used in this process with the same degree of concentration, or the two acids may be alternated, thus giving a bath of tints. Two baths of the sulphuric will give cream white; a bath of hydrochloric, followed by a bath of sulphuric, gives a half white; or two baths of hydrochloric give a yellow cast. These shades or tints are not dull, and go on passing through soda. This is a patent process, and the patentees (J. W. Delescluze & Co., France, 1891) claim that the thread is remarkable for brilliancy and suppleness, without being commonly starched.

Practical Notes on Textiles: Linen Processes, &c.

Bleachers.

Almost every bleacher has his methods, differing in detail, but without changing the principles upon which the process of bleaching depends. The working pressure of the steam used for kiers from ten to fifteen pounds, will require more change, and the boilings more frequent or longer than where the steam ranges from twenty to thirty pounds. Then, again, the strength of the alkaline used must and will have a very potent influence on quantity required. Common sense shows us that if we take more caustic soda at 60 per cent., than at 76 per cent., a great deal more in proportion to the actual strength of the alkali; the amount of impurities in the 60 per cent. alkali causes a more thorough washing, and the finish will not be uniform. A good farina can only undergo fermentation with difficulty; if it will not settle from water in a quarter of an hour it is too poor and risky for use. Wheat starch requires longer and more careful boiling; it ought to be first mixed in cold water, then brought to boiling point for fifteen minutes' duration by a pressure of steam at 15 lbs., which will give the full strength of the starch. If a mixture of that and potato starch be used, boil the wheat starch first, cool it off to 180° F., mix in the farina, and boil up. There is some difficulty in calendering goods starched only; a little potato starch is beneficial, but not to five per cent. of the weight of starch, in accordance with the degree of calendering required. If more tallow than the above is used, the cloth will look like cotton and feel greasy. Farina gives a harder finish than wheat starch, but it will not give the same brightness, and becomes sooner dull and lifeless.

To Bleach without Chlorine.

Another process for which provisional protection has been obtained is stated to be as follows—The fabric is boiled in a solution of 2 lbs. of caustic soda to 100 gallons of water, cooled, rinsed, and then placed in a bath of 14 to 40 parts of permanganate of potash or potassium permanganate in 100 of water; it is left for 60 seconds, and placed for a few minutes in a bath of sulphurated borax made by passing SO4 sulphuric acid through a bath of 3 lbs. of borax in 20 gallons of water; half a ton of gums or fibrous material would require 6 lbs. of borax and an indefinite amount of sulphur. The materials, after passing through the last bath, are thoroughly washed and dried. It has often been suspected that incomplete washing causes discolouration and tendering. This is the main correct; but there is also another cause scarcely ever noticed. The bath being emptied, the cloth not being immediately washed, or left overnight, a lime settletia upon the fibres. Contact with the warm sides of the bath dries the lime into the fibres. The final steaming causes this lime to attack the material and produce yellow spots wherever it is deposited.

Tinting.

This is done by working in warm liquor and blue; a little soap added will give a rotundity to the threads, though it is not necessary. The tinting matters are found in ultramarine, indigo, Prussian blue,
small, and many of the coal-tar blues. Acids will discolor ultramarine; otherwise it is fast to light and alkalis. No doubt, by careful treatment, specks or other defects may be avoided. Indigo is free from specking, but great care must be taken to wash out every trace of chemie; light and air, however, will interfere with the present. Exposure to air is a fine powerful tint; the action of acids or chemie has no effect upon it, but alkali or soap liquor turns it brown. Smuts would be the perfection of a bleacher’s tinting materials, being fast to alkali and soap liquor, and, light, but it is heavy and very liable to specking, giving a disagreeable tone to goods. Coal-tar blues generally turn a rusty hue if brought in contact with soap liquor. A yellow coal-tar colour. Thioxamine R., is found useful. It takes the place of indigo extract, being very much faster to light and air.

Bleaching by Electricity.

We may now turn our attention to the very latest improvements attempted to make bleaching a commercial success. By the liberation of chlorine under the action of an electric current, Messrs. Cross and Bavan some four or five years ago found that a solution of magnesium chloride, electrolysed by the current, delivers active oxygen of strong oxidising properties, and that a smaller quantity of this bleaching oxygen effects the purpose than the ordinary bleaching powder. The new process being one-third cheaper, the electrolysed solution was made to circulate through a specially constructed bleaching tank, and act by a current of electricity. Without going into the full history of the ideas and experiments which have led up to the use of electricity as a bleaching agent, we may briefly allude to prolonged experiments by M. Naoulin and Herrnstein on sodium chlorate, which was re-lined with a glass lining for the making of chlorate, and then for magnesium chloride, as a bleaching salt. In the Hermite process the electroliser is made of galvanised cast-iron—a pipe pierced with a number of holes running along the bottom; by this means the reaction occurs on the cathode, the cathodes consist of a number of discs of zinc mounted on two spindles, which slowly rotate; between each pair of discs is an anode plate of platinum coated with chlorine. In some cases a number of spools are used instead of the discs, and the reaction is carried out in a box lined with carbon. French blue is a good conductor, cheap, and able to resist the attacks of electrolysis products. Carbon seems to be the most suitable for the purpose, and is now commonly employed. These processes have been protected by a number of patents overrunning each other, and are still being followed up. Further details in our next communication.

The Industries of Ulster.

(Lake a Special Conducitor.)

NARNE. PART I.

It has become almost habitual with writers on the English side of the channel, when referring to the trade of Ulster—manufacturing and mercantile—to write as if all the industrial enterprise of the provinces was confined to the city of Belfast. The habit is so often shared, by those on this side, especially in the South. The rapid and almost unexampled growth of Belfast, and the prosperity of Ulster, which has attended her numerous industries, new and old, to a great extent account for the fact that this increase of manufacturing industry throughout the counties of northern Ireland, has been almost completely overlooked. The town of Larne, by no means one of the most striking examples that might be adduced, may be taken as an instance of almost unnoticed industrial growth. Everyone has heard of Larne in connection with the Northern mail route as one of the termini of the shortest sea passage to Scotland and England, and has read of its noble harbour and shipping facilities; many know Larne as a rising seaside resort, with its charming surrounding scenery, and as a centre from which the tourist may, on the magnificent coast road, explore the romantic and beautiful Glens of Antrim, or visit other scenes of interest in the neighbourhhood; but how many people have ever read or thought of Larne as an important manufacturing centre? And yet, in Larne, the industrial point of view, Larne is worthy of note, and if it were situated in the South or West of Ireland, instead of Ulster, the entire kingdom would have heard of its progress. It may not be a centre of great industrial development, but it is interesting and instructive to many readers on both sides of the channel to describe from time to time in the pages of this Journal some of the striking but less known scenes of industrial activity in the Northern Province.

The linen trade, in several of its branches, has been carried on in the vicinity of Larne from a very early period in the history of the manufacture down to the present day. The spinning and bleaching of yarns, linen manufacturing and the bleaching of linen, and the export of trade, have all at one period or other been located here; and though for a length of time little effort seems to have been made to notice the little business which seems to have been left; the original linen and damask industry, with the products of health and development and extension have not been wanting. The latest addition to the textile trade of the neighbourhood has been made by the erection of a power-looming linen factory by the Larne Weaving Company, the proprietors of which are the Messrs. Brown, sons of James Brown, of Holywood, who, for many years, engaged in the linen trade. The factory is most conveniently situated, overlooking the Larne and the Carron Harbour, and within easy distance of both. The building was begun less than three years ago, and the works have been in full operation for a little over two years. The premises are most compactly planned, the yarn and cloth store, winding rooms, and weaving sheds being so arranged as to afford the fullest facilities for the business of expedite; and the entire plant and apparatus are of the most modern construction. The machinery of the winding rooms, which at present contain above 300 spindles, was supplied by a Glasgow firm. In the weaving sheds there are at present close upon 100 power-looms, and an additional number have been contracted for, and will be erected immediately. The goods manufactured embraces a somewhat wide variety of all-linen and union cloths. Narrow cloths, gossamer cloths, etc., for the United States markets are largely produced, and an extensive business is also being done in the manufacture of 31 to 39-inch coloured and patterned goods for the home trade, and a number of looms are kept constantly engaged in the weaving of 36-inch union douilles, which are purchased largely by the American market.

No difficulty whatever has been experienced as regards the supply of labour. Some weavers from other districts have sought and found employment here, and a plentiful supply of workers can be obtained from among the people of the county, who have proved themselves apt learners, and have been easily trained to the work. The Messrs. Brown express themselves as being highly pleased with the result of their venture in the manufacture of linen in Larne, and hope to anticipate a still further extension of their productive power than that above alluded to. Possessing practical ability and skill, they have conducted the business so far with enterprise and success, and have already made a name for themselves for the excellence of their productions.


The manufacture of paper is not one of the textile trades, though indirectly allied to them, especially when, as in the case at present under notice, the chief consumers of the produce are the linen and woven trade. The Oldenfield Paper Mills—whether the title be taken from the historical ruin visible from the mills across the bend of the bay, or from the character of the soil, or some of pariah or other word, the Oldenfield Paper Mills—were erected a few years since, and filled with new machinery of the most modern type, by a firm who, after carrying on the manufacture with a certain amount of success, gave up the business to others. The change of partners, however, has not increased the difficulties between the partners. They have recently become the property of Messrs. Gifford, Beers & Company, who entered upon possession a month ago, and who made their first roll of paper on the present month. The mills are situated adjacent to the termini of the Larne and Belfast and of the Larne and Ballymena railways, and in the short distance of the harbour, which can be reached by the double advantage of cheap transit for the raw material by sea, and for the manufactured article by both sea and land. Surrounding them is a very considerable space for storage, but not more than is likely to be fully needed, there being at present in store raw material fully 400 tons of wood pulp, and about 150 tons of linen rags, old rope, and manilla. The machinery at present in work is capable of turning out 100 tons of paper per month—an output the proprietors have reason to expect they will have no difficulty in finding ready sale for. The motive power is supplied by tandem condensing engines built by Victor & Company (Limited), and indicating 400 horse-power. A complete set of manilla ropes for driving the main shafts and rag engines is being at this moment manufactured for the firm by the Belfast Woollen Weaving Company (Limited). The entire concern is lit up by electric light.

Space will not permit of our giving a detailed account of the various processes of the manufacture, and it is, therefore, unnecessary to do more than touch on the different stages, from that in which the raw material is put into the chopping and dusting machines, in which it is torn into fragments and cleansed from impurities. It may be noted that this process is carried out by means of a pulper, all the pieces being reduced to fibres by means of a pulper, up to a pressure of 900 lbs.; thence again into the rag engines, of which there are six, in each successive one of which it assumes a clearer hue; again into a further "agitator," from which it emerges by elevators depressed by means of a suction engine, then passing through a pulp press and shade required; flowing finally over infinitely fine wire meshes, with suction fittings to abstract the water, until it reaches the enormous cylinders, from which it is taken in rolls of paper 92 inches in width.
INCE last report an improved feeling has sprung up in trade, and though buyers are exercising much caution in the placing of orders, there is, on the whole, more doing both on home and export account.

FLAX.

The quality of this season's Irish flax is still reported as very disappointing to the spinner. To the farmer also, though the range of prices is bountiful, the yield is turning out unusually small for so far. The season both at home and on the Continent was unfavourable for flax-growing, so that good raw material is likely to be scarce, and to hold to a high level of prices for some time to come. The following market reports have been received from our correspondents since 29th ult.:

September 29th.—MACHERAFIELD—20 tons of milled, prices ranging from 4/6 to 6s., bulk of which was of medium description; any choice lots offered eagerly sought after, inferior slow of sale. NEWAY—15 tons of milled, prices from 6s. to 7s.; fair attendance; demand quiet. NEW—20 tons of milled in local market this morning, which sold from 7s. to 8s. per cwt.; quality much below last week's. OCTER—COLEMAN—20 tons of milled, prices from 8s. to 9s. 6d. per cwt.; bulk of medium quality; demand steady. COOKSTOWN—50 tons of milled, prices from 8s. to 9s.; full of which was of inferior quality, and which varied in price from 4/6 to 6s. 6d.—BALLYMONE—58 tons of milled, prices ranging from 6s. to 7s.; market well attended by buyers and demand brisk; all flax bought. NEW—20 tons of milled, prices rising from 4/6 to 7s. 6d.; bulk of poor quality; fair attendance of buyers; no change as regards prices. 7d.—EDENDERRY—150 tons of milled, which sold from 4/6 to 7s.; quality market well attended, but demand small. 12s.—LINNENERS—5 tons of milled, which varied in price from 5s. to 5s. 6d.; one lot of fairly good flax, remainder only medium quality. Owing to the scarcity of flax this locality there will only be two markets in the month, after the 26th inst.

The Registrar-General has supplied the following return of the acreage under flax in Ireland in 1891 and 1892:

<table>
<thead>
<tr>
<th>Year</th>
<th>Acres</th>
</tr>
</thead>
<tbody>
<tr>
<td>1891</td>
<td>74,665</td>
</tr>
<tr>
<td>1892</td>
<td>70,642</td>
</tr>
</tbody>
</table>

YARNS.

A very steady consumptive demand has been kept up for line yarns since last month, and the turnover was sufficient to keep production in check. Spinners have held very firmly to their quotations, no change being reported since previous list, fine numbers being harder to buy. The action of some dealers in selling at less than quotations did not influence producers, who, in the face of dear flax, were unable to make concessions. In a few numbers of coarse yarns of very common quality prices have been relatively more plentiful now.

BROWN POWER AND HAND-LOOM LINENS.

Though manufacturers are now getting a few more orders for light linens for bleaching and dyeing, they have not been able to secure any better prices. The trade in flax, line, and stocks is here controlled. Markets and heavy makes of plain linens are also in somewhat better demand. Ballymena makes have, however, been slowly bought of late, and stocks, owing to small production at harvest season, are in smaller compass. County Down linens have had good attention, and quotations for the several qualities are well maintained. For roughs, tailors' linens, and brown goods of this class there has improved demand. Towelling, glass-cloth, and crash have also come in for a considerable share of attention, as the export trade in these has been improving. Union makers of these goods are selling pretty freely. Linen handkerchiefs are still very slowly moving, but there seems to be an improving demand springing up for cambrics, not only in power but hand-loom makes. Damasks and diapers, though not brisk, have been in rather better request of late. On the whole, compared with the very dull state of trade for a long time, the manufacturing end has brightened up a little within the past week or two.

BLEACHED AND FINISHED LINENS.

Home Trade.—An improved inquiry is generally reported in this branch of trade, and though not much increase in business has followed, there are indications of a recovery from the long period of dullness previously recorded.

Continental.—With the exception of Germany, which is taking a larger supply of linens—the Board of Trade returns show an increase of 35 per cent. over September, 1891—all other European markets are very dull, and exports have fallen off somewhat compared with last year.

United States.—Advises speak of a very fair season's trade at the other side, and several buyers have been here and bought pretty freely for spring account. The shipment of piece goods, by official returns, again show a marked improvement, the quantity being upwards of 19 per cent. over September, 1891.

Other Markets.—The foreign trade for Indian is fairly good, though the returns for last month are not so full; still, for the nine months of the year there is a distinct improvement on last year. The British North American trade is also expanding, official returns showing an increase of 37 per cent. compared with September, 1891. British East Indian market is taking more goods, but the Central and South American markets, as well as the Australian, are all more or less smaller.

For the nine months ended 30th September, the total quantity of linen piece goods exported from the United Kingdom shows an increase of 24 per cent. and value of 25 per cent compared with the same period last year.

### Prices Current for ordinary Line and Tow Wefts. October 14th, 1892.

<table>
<thead>
<tr>
<th>Line</th>
<th>14</th>
<th>16</th>
<th>18</th>
<th>20</th>
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<th>90</th>
<th>95</th>
<th>100</th>
<th>105</th>
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</table>

These prices are per bundle of 40,000 yards of grey Yarn, subject to the usual discount for cash.

Ballylorno Woollen Mills.

A very successful beginning has been made towards establishing the manufacture of Irish woollens in the Larne district by the erection of a well-equipped weaving factory at Ballylorno, about a mile distant from the town. The factory is built on a tributary of the Inver river, and is well supplied with an abundance of water for driving and manufacturing purposes. The proprietors are Messrs. J. & S. Boyd & Co., also trading as the Shamrock Weaving Company, who for some years previous to the erection of the present factory in the autumn of 1890, carried on the woollen manufacture on a smaller scale at Mountpottinger, Belfast, in premises adjoining the hand-knittery of Messrs. Thomas Pullman & Co. As the amount of business offering was from the first greater than their productive power could keep pace with, and any considerable extension at Mountpottinger being found impracticable, the Messrs. Boyd transferred the scene of their operations to Ballylorno, who, on a much more favourable site, comprising two and a-half acres, for building upon, had then presented itself. The factory is commodious and well arranged, and has been supplied with all woolen manufacturing appliances of the most improved and newest construction. The machinery of the preparing rooms and the weaving sheds is all of the most modern quality.

Ballylorno is a very complete and well-appointed factory, and has been from the beginning engaged on orders to the full extent of its productive power. (To be continued.)
## Exports of Linen Yarns and Linens from the United Kingdom for the Month ending 30th September, 1899; and in the Nine Months ending 30th September, 1899, compared with the corresponding periods of the Years 1890 and 1891.

### COUNTRIES.

<table>
<thead>
<tr>
<th>COUNTRIES</th>
<th>MONTH ENDED 30th SEPTEMBER</th>
<th>NINE MONTHS ENDED 30th SEPTEMBER</th>
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<tbody>
<tr>
<td></td>
<td>Quantity</td>
<td>Declared Value</td>
</tr>
<tr>
<td></td>
<td>1890</td>
<td>1891</td>
</tr>
<tr>
<td>Linen Yarns</td>
<td></td>
<td></td>
</tr>
<tr>
<td>To Germany</td>
<td></td>
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</tr>
<tr>
<td>Holland</td>
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<tr>
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<tr>
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<tr>
<td>Other Countries</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

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| Linen Manufacturers      |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| To Germany               |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Holland                  |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Belgium                  |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| France                   |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Spain and Canary Islands |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Italy                    |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| United States            |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Other Countries          |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Total                    |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |

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| Fico Goods of All Kinds  |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| To Germany               |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Holland                  |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Belgium                  |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| France                   |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Spain and Canary Islands |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Italy                    |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| United States            |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Other Countries          |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Total                    |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |

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| Total Plain, Un-       |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| bleached, or Bleached  |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Total Check'd, Pinted,  |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Dyed, and Damask'd or   |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Diapers, &c.            |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Total of Fico Goods     |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |

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| Total of Fico Goods     |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Lbs.                    |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
|                          | 1890 | 1891 | 1892 | £  | £  | 1890 | 1891 | 1892 | £  | £  | 1890 | 1891 | 1892 | £  | £  |
|                          |      |      |      |    |   |      |      |      |    |   |      |      |      |    |   |
|                          |      |      |      |    |   |      |      |      |    |   |      |      |      |    |   |

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| Total of Linen Manufactures |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| To Germany                 |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Holland                    |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Belgium                    |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| France                     |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Spain and Canary Islands   |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Italy                      |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| United States              |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Other Countries            |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |
| Total                      |          |                |        |   |   |        |        |        |   |   |        |        |        |   |   |

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**Imports of Flax—Dressed, Undressed, and Tow or Codilla of:**

<table>
<thead>
<tr>
<th>COUNTRIES</th>
<th>MONTH ENDED 30th SEPTEMBER</th>
<th>NINE MONTHS ENDED 30th SEPTEMBER</th>
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### Notes:

- The data above includes exports of linen yarns and linens from the United Kingdom for the month ending 30th September, 1899, and in the nine months ending 30th September, 1899, compared with the corresponding periods of the years 1890 and 1891.
- The data is presented in various categories such as Linen Yarns, Linen Manufacturers, Total Linen, Total Fico Goods, Total Linen Manufactures, Imports of Flax, and more.
- The values are given in terms of quantity and declared value.
Irishe Dyeing Trade.
The course of trade in dress goods continues to favour Irish manufacturers of twed goods; for while the demand for cheviots, in forty to forty-two inch widths, from a shilling to one-and-sixpence per yard, has fallen off considerably, the better-priced tweds from two-and-sixpence per yard for wide widths, in the production of which the Irish makers excel, are in strong request. There is every indication, however, that they would look out for the look-out, and a similar fate may overtake the better edge of the trade if the present lines are too much run upon. Rough-faced tweds of all shades, in extra weights, and heavy-bearer-like cloths, for winter, are selling freely.

The Making-up Trades.
The Shirts and Collar Branches.
HE shirt factories are very busily employed on wool goods, repeat orders for which are coming forward on a satisfactory scale, both from the local trade and from the houses across the channel. All wool fancy flannels are selling freely, especially in the better qualities; union flannels and the lower qualities of all-wool goods have been to a large extent displaced by twill Shirtings, very useful and effective in which are being produced at moderate prices by the Scotch manufacturers.
The leading makers-up have all but completed their arrangements for the coming spring and summer season, and have purchased all the prints and woven cotton goods of various kinds. Grandfords have been in large demand, and there have been considerable quantities of Harvards and Oxford contadors called for. It is regrettable to find so little in the way of linen or union Shirtings being offered. Irish manufacturers have been very successful in the production of union woven-coloured checks and smart aprons and pinfore cloths that one would have thought they would have made a strong effort to produce something on similar lines for the shirt factories, especially as the consumption would be so exceedingly large if suitable shirts were produced.

The Cutters' Union.
The disagreement between a few of the leading collar and cuff houses and their cutters has been brought to an end by the employers acceding to the demand of the cutters' union, and granting the minimum rate of wages asked for. The attempt to found some kind of "masters' association" has not, for so far, been very successful. The chief difficulty in the way seems to be that the interests of the various sections of makers-up employing cutters are far from being identical. For instance, the apron and pinfore manufacturers use cutting machines—revolving steel bands driven by gas or steam power—while some of the collar and cuff makers still cut by hand, using the block and knife, and others cut partly by hand and partly by machine. While there is little community of interest among the employers, the action of the cutters union affects all cutters howsoever engaged. In the majority of factories the minimum rate demanded was already being paid, in some cases very much more.

The Pinfore Manufacturing.
The manufacture of ready-made clothing is making steady, though somewhat slow progress in Belfast, and there are rumours that a further extension to production is in contemplation. A considerable proportion is being done in men's suits and trousers, which Irish serges and Irish tweed suitings play a satisfactorily prominent part. It is, however, in the manufacture of private clothing that the real development has taken place. At present, in a number of the factories, a very smart trade is being done, principally in sailor suits and Norfolk suits for the London market. The materials chiefly used is blue serge of a low quality, and tweeds of slight make and moderate price. The same classes of goods are also used for the summer season, in addition to which linen drills, plain and striped, are cut up in considerable quantities.

The Irish Cotton Trade.
The manufacture of union cotton goods continues to have the support of the consumer class of fabrics, but the sales during the month comprise the Nos. 10 to 24. The manufacture of union cotton goods continues to draw the attention of the consumer throughout the North of
Ireland, and several makes of goods which were formerly manufactured entirely of linen yarns are now being turned out in enormous quantities in silk, so much so, indeed, that the looms in some factories are working almost exclusively on these goods. The demand for union roughs and union crashes continues fairly active, both for export and home; and strong improvement in the American shipbuilding and American trades, the general tone of the market has strengthened considerably. A tolerably good demand exists for union white and glass-cloths, which are being shipped in fairly large quantities. The demand for union dresses is not as strong as could be desired, but there is now the appearance of an increased trade in this article. The manufacture of union damasks is slightly larger, and there is the prospect of a further development in these goods. A fair proportion of looms continues to run on cheap white union crashes (bleached in the yarns), but the prices of this article are so much cut off that only very small profits are obtainable, and sometimes the manufacturer finds it difficult to even get cost out. There is very little doing at present in union handkerchiefs, the demand being extremely weak, owing principally to the cheapness and variety offering in the cotton article, while those requiring the superior description of goods prefer genuine linen cambrics.

Cotton Cambrics, &c.—Considerably more has been doing since last report in cotton cambric goods, the improvement in the American business having lent an impetus to the printed handkerchief trade, but the increase in the importation of these goods has not been so large as might at first sight be expected, as the printing and making-up of cotton handkerchiefs was continued during the slackness that prevailed during the past ten or twelve months, and the stocks on hands were abnormally large. These are now, however, considerably reduced, and all that is required are some new designs and styles to assent to the old ones. The demand from the American market has brightened up for fancy printed cotton handkerchiefs, and those firms which were comparatively idle for the past eight or nine months are now sufficiently busy to keep all their hands going. Machine-embroidered handkerchiefs are likewise in request, these goods having shared in the general improvement in the American business. Quietness still continues in the house market for all classes of cotton handkerchiefs, unless perhaps for cheap stock lots, which sell readily enough if offered at sufficiently low rates. Altogether, however, the outlook has somewhat improved, especially with the shipping houses of Manchester and London. There is likewise more inquiry from the Continent for fancy printed handkerchiefs, and some definite orders have been already received. The trade prospects in general are looking more cheerful.

Silo's and Poplins.

Demand for these is without special anent. Actent these latter textiles, “A Poplin Weaver” has been addressing the public through the medium of a letter to the public. He says that the summer season has been a very dull one for the operatives of this Irish manufacture. He, consequently, in view of the changing season, appeals to the ladies to patronise this fabric for their winter costumes. Velvets, he says, and whole silks, satins, serge, and ribbons, have, as far as manufacturing goes, disappeared out of Dublin, hence his appeal for support to the last remaining one—poplin. This poplin weaver believes that “a few prominent ladies in Dublin and the provinces would take up the cause of the Dublin poplin operatives, and endeavour to create a greater desire for its use, their example would be followed and appreciated.” This, no doubt, is a good idea and example would act to a certain extent. Though poplin appears expensive at first, its price, calculated by its wear, is, in fact, ridiculously low. In the estimation of ladies, however, it lasts too long a time merely of the present day. They prefer the cheaper woollen and cotton materials, as they can buy three or four dress lengths of these for one of poplin, and so have the variety. Perhaps this is an argument in the favour of the people who would think that matrons might not go with the stream in this respect, but include a serviceable poplin among their wardrobe. I look, however, far more, and if the demand is to be increased, the production of clerical robes, furniture cloth, curtains, portières, &c., and if this branch of the manufacture was energetically pushed, a deserving and artistic industry might as long be in a much more flourishing state than it is at present.

The Technical Schools.

- The autumn session at the schools has commenced. As yet the Kevin Street establishment is the only one. Although the Corporation has decided to provide funds for the Technical School in the northside of the city, yet as this action was only taken in July, it was too late for the Governors to obtain premises in time to open this Winter. The Kevin Street Schools are very well equipped, and an institution both in science and art are such as to be of benefit to every student, male or female, no matter what their particular occupation may be. At the request of many persons interested in that industry, the Governors have decided to open a class in laundry work, a need which they say is much felt in the city. They have also decided to complete the course of instruction in the commercial department—added classes in commercial penmanship and German. These additional classes should enable our home-born clerks to compete on better terms with the imported article, and no doubt these educational additions to the schools will be popular features during the present session. Above all would I urge upon students the necessity for regular attendance. This is a matter of vital importance, and it is one to the achievement of which managers of technical schools should give their most earnest attention.

The Irish Industries Association.

This useful body has found a generous patron in Lord Houghton, the new Vicerey. It seems from the last meeting of the financial committee that, prior to Lord Houghton’s departure from London, he and his sister, Mrs. Hanniker, visited the London depot of the Association, and placed large orders for chalk, Irish b troch, costumes of Irish linens, and unshorn Irish linens, in their hands for execution. Besides this, the day after the Viceregal arrival in Dublin, His Excellency’s daughters visited the Suffolk Street depot, and made further purchases of this Irish industry and generous action, and the poor workers of the South and West will benefit. The Chicago Committee also seem to be getting on well with their labours. The Committee for Ireland has also been in publishing exhibits. Of this, £8,000 has gone for lace and crochet, and has been the care taken in the selection, that this exhibit will be the finest and most complete display of Irish manufactures the Committee paid great attention to the designs from which these lace have been worked. Special designs were prepared by the students in the Dublin, Cork, and Convect Schools of Art. These again were submitted to Mr. Cole, Mr. Brenan, and Mrs. Power-Lalor for approval before use, and every care is being exercised in the supervision of the workers. It is also gratifying to know that Mr. Peter White’s last visit to America has resulted in business. The Carrickmacross school has received an order for 500 yards of appliqued and guipure, chosen from designs by students of the Dublin and Cork schools from which “trial pieces” had been made—proof positive of the advantage of “samples” even in an industry such as that of lace. To Clones Mr. White brought an order for 1,000 yards of crochet; to New Ross a large order has been sent for needlepoint lace, and to Limerick a smaller order for tambour and run work.

Weaving in Mayo.

The Countess of Lucan is making a vigorous effort to develop and revite the industrial resources of County Mayo. She is promoting the spinning and weaving industries in several localities, and has hitherto considerably benefited the peasants. In one instance the Countess has in mind, and the Countess intends to dispose of the products of their toil in London, and hand the proceeds over to those who had done the work. In private, personal efforts of this sort, such as this, will tell in the long run, and industry is to be revived amongst the Irish people, it will have to be to a great extent by widely separated private efforts. To get at the heart of the evil of idleness, it is useless to attempt only centres such as Limerick, &c., where the idleness of the people to be fought does not prevail, and where industry has to a great extent been established; but far away in the wilds of the West, there is no means of getting to the people—the people who should be workers—except by individual effort; hence the value of the Countess’s action. May many follow her example, and extend the benefits of encouragement to other parts of the country.

For the second time, Mr. J. Brench, R.H.A., head-master, has succeeded in obtaining the exhibition in Dublin of the prize studies from the various schools in the United Kingdom. It was in 1889 that, for the first time, this genuinely instructive and popular display was granted him in Dublin. In the course of a year some 500 or 600 pupils pass through the classes at the Dublin school, and it will at once be obvious of what advantage it is to them to be able to see the best examples of work from other schools, especially for the unsuccessful competitors to study the works of those who have succeeded in beating them. As such they are of great value to both teachers and pupils of art reached South Kensington; not of these about 5,000 were allowed to compete, and just over 500 prizes were awarded; but of the 600 prize works 300 are on view in Dublin, including, of course, some of the best works which were employed under the usual, as successful as any other in winning the approbation of the examiners. I have no fear that the number of prize-winners from
DUBLIN will decrease; but it is pleasant to note that Mr Brenan is determined to use every effort to increase his successes. Such exhibitions as the present one are sure to be followed by good results. Unless I am very much mistaken, when, three years ago, such an exhibition took place, the immediate results were marked. It stimulated the students to renewed effort, fired their ambition by seeing what was being done elsewhere, and very much improved their production so as to what was necessary before; as a consequence, much improvement could be secured. The same results will be found to follow now, and the session just opening at the School of Art will be found, no doubt, to reflect, in the exertions of the pupils and their improved results, evidence of the influence of seeing all that is best worth seeing in the work of rival schools. They will also, doubtless, try to compensate, by the energy and interest they will display, the arduous exertions which were necessary on the part of their headmaster before he could obtain for Dublin the privilege of having the prize works on view.

JERSEY.—The linen cambic and linen trade in this district now shows some signs of improvement; this event was long looked for, and will be received with gladness should it continue. Some manufacturers are now employing more hands. Linen cambic for homestead goods is receiving better attention, but hand-loon woven border goods are not yet much wanted. Power-loom manufacturers are also getting into a somewhat better position as to orders. The turn-out from hand-loon weavers from all parts is very small inasmuch as the summer months are between labour is over. Linen handkerchiefs (of boiled yarns) are also in better demand, and some manufacturers have now fair orders in work on these goods. Most of the Silks are in pretty well-employed. It must, however, be added that hand-loon bird-eye diapers have been in good request, and so have damask cloth embroidered and fancy, pillow shams, tea-cloths, combs and borders, which is cheering news, after the long spell of extremely dull trade all round here.

English.

BARNLEY.—Business in this district has varied little from last report, trade being in some branches fairly good, and in others only quiet. The insecurity still felt as regards the state of the various South American countries has a depressing effect on some kinds of linens. Drills, in other descriptions, are generally feeling the effects of the trade in the countries up to two years ago were good customers. Damasks have not improved further in demand, but the new designs in lighter materials are fully expected to be well taken. Chamber linens and table napkins are no longer in demand, but the production at present is below what it was a few months ago. Bleached hucks in the piece are selling steadily. In towelling, in roller, twilled, bordered, coloured, fancy, and other kinds, production has been about equal to demand, the latter having been fairly good. A rather quiet business has been done in drabets, bluettes, hangings, rubbers, and saddles' linens. Narrow linens have not been in so much favour as recently, but the demand is still, on the whole, good, when compared with some of the other branches of the linen trade. Manufacturers generally are looking for an all-round improvement in trade, and are sanguine that business during the remainder of the year will be up to the average.

BRADFORD. A decided better feeling has been apparent in trade in this district during the past three months, and the business has not been of a greatly increased volume, still it has been such that those engaged in the textile branches are in hopes of a speedy improvement. Spotters are certainly in a much better position than they were a few weeks ago, both as regards orders and prices; for although the latter are not quite as high, with the exception of Botany and Genappe yarns, still there is certain a firmness that denotes higher prices, and merchants seem more inclined to view the matter from the spinners' point of view, especially since the various classes of woofs at the London sales have gone at rather higher rates, and have given a firmer tone to prices of woofs in this district. The wool branches have been called upon for more raw material by spinners than was the case a few weeks ago, but the demand is still simply of a consumptive character, and spinners only purchase in quantities to suit their actual requirements. The piece departments are the least satisfactory of any branch, as they are somewhat in advance of the inquiries do not result in an increased volume of business. The export trade is only quiet, and the home business is little better. Possibly the volume of trade could be increased, prices offered.

LEEDS.—In this district, with slight exception, business has been quieter. The condition of trade generally throughout the country is of a depressing character, and, of course, this has a great effect upon the woolen trade. In both of this country's industries are necessities, although for a long time past have kept the lead in demand, have shown a falling off recently; but dyers are still having a good run, and anything of a novel character, designs, colours, &c., are still doing fairly well with a ready sale. In mantle cloths, a fairly good demand is expected from the new patterns now being produced, but just at present there is a bull in business, owing to the increase between Tweeds and chevets; goods have sold moderately; but prices offered are very low, and this seems at present to be the chief drawback to more business being done, and especially this is the case in the lower makes of fabrics. In the ready-made clothing branches trade is of a rather erratic character, while for some firms have recently secured good orders as far as bulk goes, others have few on hand; but nearly all manufacturers complain of the low selling price of the goods done up in retail, which is causing a great amount of business. The United States demand has recently shown a cheerful increase, as has also South Africa.

MANCHESTER.—The Pawson-Leaf sale, though well advertised, attracted comparatively few buyers to London from the North of England, and upon the linen trade the best effect of the offering was felt. Drapers in this district do not care to take advantage of sales in the South, especially where heavy goods are concerned, as it is found this market presents far superior facilities for advantageous buying. This is particularly true of such makes as roughs and hessians.

The Linen Market.

There has been a steady demand of late for crashes and towellings generally in the home trade, and some fair orders have been booked on Canadian account. Some of the local agents have been very successful in the Toronto and Montreal trade during the past few weeks, many respectable "lines" having been booked for those markets. Business can be picked up easily enough for the Dominion, but there are frequent difficulties about credit. Where there are not likely to be difficulties of a financial character, competition for orders is keen.

Local representatives of Belfast houses are having a hard time of it just now. Their South American connections are very backward, and they struggle for orders because in the view of the Ricic market there is not much doing, owing to the absurd quarantine regulations imposed by the Brazilian Government since the commencement of the cholera scare.

South American Markets.

A new firm—the Camper's & Fabricates Engloses—has been established at Buenos Ayres for the purpose of encouraging the sale of British products in the Plate region. The active partners are twelve well-known house, included amongst whom is a firm well known to readers of the Irish Textile Journal—that of Messrs. Galloway & Co., of this city. Messrs. Robinson & Sons, and J. W. Barlow, both of Bouchdale, are also amongst the partners, whose names include some of the most highly-respected concerns in the kingdom. From what I have been able to learn of the constitution of the English Manufacturers' Export company, the machinery is showing as at present the most striking feature in its constitution. No Irish or Scotch firms are, from what I have been able to ascertain, a capital of £50,000 has been subscribed, and the Buenos Ayres manager is Mr. A. G. Fudren, of Messrs. Blackburn & Co. The scheme of forming such companies is one which should interest Belfast men. In the case of the English Manufacturers' Export Company, the project is not an experimental one, the concern having taken over the business of Messrs. N. York & Co., of the Calle Balazece. I believe that the German export companies have not been uniformly successful, and the opinion seems to prevail in this country that individual energy is the best thing to rely upon in promoting our foreign trade. A company for pushing the sale of British and Irish textiles might prove useful, even, in such important centres as Buenos Ayres or Rio. Even in the case of manufacturers who send out their own travellers to South or Central America—amongst whom some British firms may be included—such an organisation might prove useful. One cannot think of the world with trade, and it is generally devoted to its interests. It may be added that there has been a heavy falling off in the local machinery trade with Brazil and the Argentine Republic during the present year.

Irish and other Woollens.

The remarks in last month's Journal regarding the activity in the Irish woolen trade should give great satisfaction to friends of Ireland, insomuch as on this side of the channel woolen industry is in a depressed condition. Irish goods have now made for themselves firm friends in many of the most important buying houses in the country. There is room for goods such as that made on Irish looms, provided the designs are right, and on this score there has certainly been an improvement of late. Soft finishes are still favourites amongst home trade buyers, and there is sure to be a run on Irish goods while fashion leans in this direction. The medium-class trade offers splendid inducements to Irish manufacturers. Yorkshire and Scotch competition is keenest in this trade, it is true; but, on the other hand, there is no country more actively devoted to its interests. Some of our ready-made clothing manufacturers are now regularly consuming large quantities of clothes in every respect, as far as quality are concerned, to the best goods competition is the custom to term the "West End" trade. Four and five guineas ready-made suits are by no means unusual now. It is an error to suppose that quality is the only consideration with these buyers. The trade is improving its processes every year, and in Leeds, Manchester, and London, where the business is chiefly carried on, the English manufacturers are in the habit of sending out their own samples to their customers, and the goods are thus shown to the best medium cloth at a reasonable price. Reliance upon a high-class trade can only extend to a certain point, and a few additions they have done which work a considerable change in this respect. It is a matter of output. Larger productive houses would force an appeal to the medium and even lower branches of the trade.
LONDON.—For the closing part of September the reports of the trade generally were more hopeful, but it is greatly to be feared that the extra business done was in a great measure due to the extra efforts put forth during that time by the city houses. The fact that houses of Pawsers & Leads, Limited, had announced a special sale, which lasted over a week, stirred up certain other houses, which, while they made no public announcement, were whipping their customers in from all corners, and put a good temperature on their goods, which showed signs of continuing, until the atmosphere became again the enemy of the trade, and the result was a relapse in many of the departments. Fainted cheer on the Pawsers’s trade was spurt in the silk trade, which is likely to last for some time, and this, in its turn, has given the market some life. Prices for certain materials have not been so strong for many years when the Irish poplin trade I learn that during the last few months there has been a greater demand for this once very popular material. Some of the Dublin manufacturers have been exerting themselves specially, and have brought out a charming tartan pattern which promises to take a lead. There is no reason why this industry should not regain some of its old position if a little more interest was thrown into the production. Linen Yarn. The Board of Trade returns which have been issued for September show again a decided falling off in our export trade; but there is a slight improvement as compared with previous months of this year. It is a noteworthy fact that the greatest decrease is shown in textile fabrics, while the only export which has held its own and gained is the chemical trade. Some timid people have been attributing this increase to the extension of manufactures abroad. Of course it is only an assumption, as there is really no basis for the calculation. The decrease in the export trade is entirely due to the unsatisfactory state of most of our colonial markets, and the consequent curtailment of business. The markets which have shown an appreciable increase in their purchases have been Bombay, Bengal, Burma, and Egypt. Consignments to Chili, Brazil, and Argentina have been on a much larger scale than for some months past. Strange, too, the shipments to the United States, West Indies, and British North America have decreased. Generally speaking, Continental trade is going on at a slower pace, and there has been a falling off in our shipments to the British possessions in South Africa and the West Coast of Africa. Australia, however, registers the largest increase with relatively speaking. The city houses are already busy preparing for the Christmas trade. Novelties are required, so there is a chance for the ingenuity of the Ulster manufacturers in which the British trade should be well compassed. Continental house buyers, German, French, and Swiss houses are not behind at this time of the year, and they are making rapid strides on the London market. The rumours which were recently spread by certain Irish papers as to the state of the linen trade, and the threatened embar- rassments, did not do Belfast a good turn at the time. It may interest house to note that for two days the discount market looked abt. by houses, which is quite unusual; and the timidity of brokers was increased by London papers taking up the cry of the Belfast market, and printing in extenso what had already created a good deal of disturbance. At the present time they are making up to one hand which the market is being weak and a hundred ears pricking in the financial quarters of London; and if only those who set these rumours astir knew how far-reaching the conse- quences of such a move as the above are. The Milk Street trade shows very little improvement, but a quiet steady business is maintained; if there has been any improvement, it has been in specialties which ought to be moving out for the Christmas trade and collar and collar trade, particularly round about Taunton and district of Somerset, is reported to be fair. There is no much demand for the finer makers of linens. We are still looking forward to better days in the city, but they are slow in coming round。

DUNDER.—There is rather more doing in this district of late, and prospects are altogether more cheerful. Flax.—Though demand is not by any means active, there is a moderate amount doing to meet consumers’ needs for short periods, and prices are without change. Business is mainly restricted to the wants of manufacturers from day to day, who, looking for lower rates, are unwilling to operate in advance of their ordinary requirements. Prices may be said to be quite steady all round. Linens.—The home trade, which had been very dull for a long period, is looking up a little now, and on export account orders, more especially for the United States, have been more numerous. The declared value of linen exports through the American Consulate at Dunfermline for the year to September 30, shows an improvement of over 20 per cent. compared with previous year. In the Jute yarn and cloth branches there is a fair business passing, and prices are better.

Continental.

LANDESHUT, October 5th.—The Yarn Exchange on 5th inst. was not so well attended, and therefore only little business was done. Spinners adhere to their former quotations and show a tendency to raise the prices slightly. On the whole, the business is better. Parties are entering into large contracts, as they believe that the new flax crop will bring an alteration of prices; although to all appearance the new crop will hardly make any difference, as the quality is good, but the quantity seems to be less than last year’s crop. Linens.—Most of the power-looms are well employed. Hand-loom weavers still produce very little, owing to the worsted weavers continuing favourable for field work.

Next Exchange on 3rd November.

United States Market.

From our Special Correspondent.

New York, September 30th, 1892.

Though the business reports from Belfast are not of an exhilarating nature, nor helped along by any of the stories of failures, we don’t meet with much discouraging talk on behalf of linen goods affairs in this market. A fair volume of trade is in progress, and any unsettle- ment of prices has yet to be reported—that is to say, anything definite. There was a rumour early this week to the effect that some cutting had been done on 4 1/4 linens at Troy, but it needs investigation; and as four linen house representatives were there together one day recently, it may be inferred that they are Trojans ‘working’ some of the young manufacturers fully. But the boys should take heart and not be discouraged by wild rumours.

The second week of next month will be a poor one in all businesses at this city. Its Monday, Tuesday, and Wednesday will be given up to the Columbus celebration, and though Wednesday is the only one defined as a “legal holiday,” the others will distract the business where it is. On “to see the procession”—there will be some of kind each day—will be the thought of all minds, and business will practically be suspended. The echoes will last through the rest of the week, as every wise man’s son doth know. Our line Broadway is already in the primary stages of decoration, and the city will soon be gay with bunting. That Columbus did a good turn for the Irish is now generally admitted—and he was a foreigner, too.

The British mind might as well fold its arms and rest contentedly as unpleasant circumstances will permit over the matter of the tariff. It comes high, but we must have it. It will remain upon the national statute books, though some of its inoffensiveness may be eliminated. There is no free trade party, as such, in the Democratic party, largely—as the North—composed of the working men of the country, dare not preach complete free trade, nor anything near to it. Is it not strange, then, to find in the current administration, it is the Department of war, that the Democracy are fighting for absolute free trade, and prognosticating the “entire removal of the slightest vestige of protection” as the consequence of Mr. Cleveland’s alleged policy? Anything could not be written, though it may carry crumbs of comfort to depressed British manufacturers. Of all the countries of the civilized world this is now the most prosperous, and the confidence in the future is remarkable in its own history, as all the official statistics of commerce, trade, and manufacture bear abundant witness. Free trade is not in our calculations.

One who has been out of the handicraft trade for a few years is a visit to a importer’s stock, and a run through it, impresses upon him the fact that a great change has taken place in textile representation. From
coarse and including medium qualities, cotton has superseded flax to a wonderful extent. Six to eight years ago cotton handkerchiefs were known only in the coarse counts, and they were sold to the jobbing trade almost solely; and not many years previous to eight years ago, few handkerchief importers would admit the cotton wares to their stocks, as the best retailers refused to handle them at all. At this writing, the mill article constitutes two-thirds of all the handkerchiefs sold for ladies' wear. The best flannel is still thin in enormous quantities. They wear out fast, but they look "cheap for the money," and they take embroidery and printing in the best fashion. In men's wares our fine men's furnishing trade has saturated its cotton prints, on which it makes a handsome profit at 7½d. each.

So flax is no longer king in this portion of the linen trade. Business is good in general handkerchief stocks. Embroidered goods in white hold to their popularity, and will for a long time, it would seem. Initials are having the best season in many years. The McMeekan concern, recently dissolved, will retire from the business. As against this retirement we have a new account about to be established, and a new house to be formed early in '93. In addition, Robb, Capper & Co. have opened a New York office for the purpose of carrying stock, and Glass & O'Flaherty's manufacturers have taken a fresh hold of life. So the handkerchief field seems to be worth the exploiting; and between the Irish and the Swiss the merry war continues over the muslin embroideries.

NATIONAL REGISTRATION OF PLUMBERS.

This important movement in behalf of Sanitary Reform is making good progress, as the Annual Congress, lately held at Dundee, fully testifies. On that occasion a large number of delegates attended from all the important centres of trade throughout the kingdom, in addition to a considerable number of professional men, sanitary authorities, and experts. To render the registration movement more popular among competent workmen, the Glasgow Council suggested that, to induce a larger number of men to apply for registration, the condition of undergoing an examination might be suspended in the case of master plumbers who were twelve years engaged in the trade, and who could satisfy the Council as to their qualifications. Ultimately it was settled, that being in the trade for ten years and otherwise qualified would be sufficient without examination.

The object of the importance of a technical and practical training for plumbers, and said there was often very great difficulty experienced in getting a suitable master, and that it would be well to consider whether a science teacher should not be associated and work with the practical teacher of plumbing.

Mr. Coles, of the Worshipful Company of Plumbers, pointed out the special and absolute need that existed for workmen of this class being technically educated. They stood in such a unique position as craftsmen, inasmuch as they were not only engaged not only with the property but the lives and health of the community. Unlike members of other callings, the operative plumber was frequently called upon to carry out most responsible work without the supervision or inspection of employer or foreman. It was therefore necessary that he should have as much technical instruction as would qualify him to deal effectively with the complicated and difficult problems which arose in connection with the remedying of sanitary defects. In fact, he thought the operative plumber should have as much technical knowledge as was required by foremen in other callings.

A resolution to the following effect was passed:

"That this congress of representatives of public sanitary authorities, medical profession, educationists, and plumbers, is of opinion that the technical education of plumbers is a matter of national importance, the provision of which is exceptionally difficult and costly, and is essential to the preservation of the public health that such education should be promoted in all districts, and that the special claims for financial aid should be brought prominently before the attention of municipal corporations and county councils who have funds at their disposal by Act of Parliament for educational purposes."

RECIPIES.

FOR WASHING LINENS.—Dissolve a little pipe-clay in warm water in the wash tub, or rub a little of the clay with the soap, and the result will be a great improvement in colour of the linen, more especially where facilities do not exist for out-door drying. Linen which has been much soiled can in this way be cleaned with half the labour, as well as effecting a considerable saving in soap.

Drum Recipe.—For rose on 11 lbs.—Work in a boiling hot bucket of 7 oz. tannin and 2½ oz. cured soap; add to the water the solution of 3 oz. of tin crystals, and dye with ½ to ¾ oz. saffronine at 110° Fah.

For coloring linen, the following recipes are recommended:

The Irish Textile Journal.

Thursday, October 15th, 1892.

Chemicals and Dyers.

There has been quite an excited market in the Alkali trade, owing to the extraordinary demand for Bleaching Powder, and it is reported that as much as £10 10s. has been paid for prompt delivery, whilst £7 is quoted for next month's delivery. Caustic and Ash areundoubtedly flat, and with a remarkable shrinkage in the volume of business doing. Sulphate of Ammonia appears to have a better prospect, and is to-day quoted at least 5s. higher. There is an excellent inquiry from the Continent, and it looks as if it were again coming into popular favour at the expense of Nitrate of Soda, the latter, notwithstanding the lessened shipments, continues to drop.

There is a better demand for Potash Salts, and Chlorate is selling at a fraction better price. The demand for Bichromate has improved, and a fair business is doing. Oxalic Acid is in good request, but the competition of makers has brought the price down 5½. Sulphate of Copper, Tin Salts, Chloride of Zinc, Barium products, Epsom Salts, are all easier, with a slack market.

Tar products show a little more life, and the demand for Carbolic Acid, for disinfecting purposes, appears to have cleared the market of the glutted stocks of which it existed. Benzoles are a shade better, but Alienines, Alienine, and Dyes generally are weak and difficult to sell.

Prizes.—Dyes.—Alienine, 8d.; Alienine Oil, 6½d.; Ammonia Salts, 6d.; Magentas, ½d. to 3½d.; Scarletas, 1½; Chrysoidine, 2½; Blue, from 3½.; Picric Acid, 16d. Ammonia.—Liquid Ammonia, 1½d. Carbontone of Ammonia, 8d.; Murate of Ammonia, 2½d.; Sulphate of Ammonia, £10 10s. Alkalis.—Bicarbonate of Soda, £7; Caustie Soda (77), £11 10s.; Soda Ash, 1½d.; Caustie Potash, £19; Sulphate of Soda, 25½; Soda Crystals, about 8d.; Sundries.—Acid Carbolic, 1½; Citric Acid, 1½; Oxalic Acid, 3½ d., less 5½; Tin Salts, 5½d.; Sulphate of Copper, £14 10s.; Bleaching Powder, £10; Borax, £2; Nitrate of Soda, £8 12s. 6d.; Carbolic Crystals, 4d.; Epsom Salts, 3½d.

Select List of Applications for Patents relating to Textile Fabrics.


K. G. A. HATCHER, London, No. 14,710.—"Improvements in machinery for breaking or scouring flax and similar fibrous materials."

15th August, 1892.

JOHN BISHOP, Halifax, No. 25,223.—"Improvements in machinery for feeding flax tow, or similar fibres to carding and other like machines."

24th August, 1892.

J. H. BOURNE and A. BALFOUR, Dundee, No. 10,358.—"Improvements on the mode of dragging or tempering spinning bobbins on spinning frames, and an arrangement for releasing springs for tempering bobbins."

25th August, 1892.

W. HARBAGE and W. KAYE, London, No. 15,440.—"Improvements in the construction of bands or shafts for hackling and other machines."

27th August, 1892.

C. BRALLISONCOURT, London, No. 15,510.—"Improvements in machines for combing long fibres."

29th August, 1892.


3rd September, 1892.

A. W. MERCALP and W. J. HEMING, Halifax, No. 15,685.—"Improvements in machinery for preparing flax and jute and other fibres."

5th September, 1892.

J. V. EYES, Belfast, No. 16,693.—"Improvements in covers for the feet of spindles in spinning, doubling, twisting, and similar machines."

17th September, 1892.

SPECIFICATIONS PUBLISHED.

The specifications of the following patents have been printed and published during the month, and copies thereof may now be obtained at the uniform price of 1½., which includes postage.

1891.

J. C. WALKER and J. E. STEPHENSON, Shipley, York, No. 15,703.—"Improvements in screw-gill machinery for operating upon fibrous materials."

16th September.

G. STANNARD, Stretford, near Manchester, No. 16,728.—"Improvements in or relating to picking bands or strap for looms."

1st October.

L. TAYLOR, Oldham, No. 19,526.—"Improvements in means for fabricating the footstep bearings of spindles employed in textile machinery."

11th November.

D. BARTLEY, D. BARTLEY, and J. B. BARTLEY, Rivington, near Accrington, No. 20,931.—"Improvements in or connected with machinery for milling woolen or other woven or felted fabrics."

18th November.

1892.


25th January.

C. SIMON, Switzerland, No. 7,857.—"An improved machine for winding yarn or thread."

25th April.
ENTWISLE & GASS, Ltd.

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All kinds of Machines for Bleaching, Dyeing, Printing and Finishing Cotton Fabrics and Cotton Yarns.

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Braidwater Spinning Company, Ballymena.
Lismantulan Bleaching Company, Ballymena.
York Street Spinning Co.'s Cotton, Henry St.
White's Mill, Muckamore, &c., &c.

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Fries, Tweeds, Blankets, and Flannels.


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