INDUSTRIAL NOTES.

The opening of the present school year finds the following industrial teachers attached to the General Office of the Bureau of Education: Mr. Bruce Ingersoll, inspector of trade schools, devoting special attention to the provincial woodworking shops; Mr. Luther Parker, industrial inspector: Mr. Leroy Sawyer, industrial inspector, devoting special attention to municipal woodworking shops: Mr. North H. Foreman, inspector of school gardens and sites: Mr. John F. Minier, industrial supervisor with traveling exhibit; and Mr. O. S. Hershey, inspector of

Mr. H. E. Cutler, the industrial supervisor who visited the provinces during the last school year in connection with the traveling industrial when he will return. Mrs. Carrie E. Anderson, who has been attached to the General Office as industrial supervisor, has been given permanent station in Bulacan.

In connection with the general program for visits of industrial supervisors and inspectors to the provinces, a plan has also been worked out whereby it will be possible for the General Office to furassistants well qualified along certain special lines. In some cases the Filipino assistants will accompany they will be sent out on special detail to provincial normal institutes; and in others they will be assigned to school divisions for a period to assist division superintendents in organizing work along their own particular lines.

Itineraries covering the general program of industrial supervision from the General Office have already been worked out. It will still be possible to furnish special assistance in most cases where it is desired. and division superintendents are asked to present their needs to the

At the opening of the present school year in June the Director of Education named a number of industrial supervisors for the various school divisions of the Islands. Wherever it was possible to do so. one supervisor was designated for each division. The work which has been done along industrial lines during the past year has developed a very efficient corps of instructors in certain localities. The problem of using the particular training and knowledge of these specialists has made it seem advisable to place them in a position in which their work will be at least as wide as the school divisions to which they are assigned. Working in coöperation with the division superintendent. they will have general charge of the direction of industrial work for the division, the distribution of industrial information, the collection and identification of materials, the ardling of exhibits. In another way the work of the industrial supervisor matbe far broader than the limits of the school division in which he is located. and those who will may find an excellent opportunity for rendering

valuable service to the Bureau and to the Islands by investigations and experiments which they may make. The natural medium for the distribution of such information will be in the columns of THE PHILIPPINE (CRATEMAN, and one of the duties of industrial supervisors will be the submission of monthly statements covering the industrial operations of the divisions in which they are located, including such notes, suggestions, and prepared articles as they may have to offer.

The Bureau of Education has taken another step in the campaign for a better food supply for the masses of the people. Although corn contests are quite common in many parts of the United States they have never yet been tried on an extensive scale in the Philippines. With the opening of the present school year teachers and pupils all over the Islands are being asked to take part in a corn contest which will be conducted by the Bureau of contest are being given publicity through instructions issued by the General Office. This is the pioneer movement of its kind in the Orient.

Corn is known in all parts of the Islands and is used as a human food to some extent. However, the acreage devoted to corn is very small; the total production of corn is very inconsiderable when compared with the rice crop; and the production per acre is surprisingly low. These conditions need not be so; the introduction of modern methods of seed selection and cultivation will increase the vield enormously, and the emphasis which is now being given to effect of interesting the people all over the Islands in the possibilities of corn as a food. The present school contest is expected to accomplish a great deal in the campaign. It is hoped that by fostering the growth of corn and by spreading information as to its uses, much land which is now idle will soon be producing, and the critical seasons between rice harvests, when lack of food is no uncommon thing, and those too frequent preiods when drought and consequent rice shortage mean hunear and famine, will be unknown.

There will soon be ready for distribution a new pamphlet on corn. prepared in the General Office, which corn growing and will tell many of the appetizing ways in which this cereal can be prepared as a food. The pamphlet will be sent out quite generally and teachers and pupils will be called upon to bring the information contained in it to the attention of the people. Also, copies of Duggar's Southern Field Crops have been sent out to each school division. Much helpful information can be secured from the chapters devoted to corn; it contains many useful passages which will assist in judging the difference between good and bad seed corn.

Every school will be expected to have entries in this context. Teachers should secure their seed corn and be ready to plant as soon as the conditions of the context reach them. The contest will be a school affair and each corn plot which is entered must be supervised by a teacher. Suitable awards have been provided for the winners of the context in the several school divisions, and the results obtained will be given due publicity.

ublicity

For several years past the Bureau has distributed garden seeds for school purposes. Following this practice a limited supply of seeds has been purchased for the present school vear and will be ready for distribution about the middle of September. Seeds may be purchased in the local market to supplement the supply furnished by the Bureau.

Most of the seeds which will be distributed by the Government are for plants which have been but reare receiving due attention, the vegetables which are common to the locality should in no wise be neglected. Cultivation will often produce a marked improvement in the common native vegetables; frequently such improved native vegetables are better in quality than those raised from imported seed; and almost invariably plants from imported seed so deteriorate before they become acclimated that new seed must constantly be introduced.

The school garden may be producing every month. During the for the successful cultivation of foreign vegetables, pechay, lettuce, mustard, endive, and other plants grown for their leaves thrive well and the time may be utilized in the planting and cultivation of native plants. The seeds distributed by the Bureaus of Education and Agriculture are chiefly imported seeds and soon become infertile unless they are carefully preserved or planted as soon as they are received. Garden seeds deteriorate very rapidly when exposed to the warmth and moisture

In the preparations which were made for the educational features of the fifth Teachers' Vacation Assembly, held in Baguio during the months of April and May, more than usual attention was given to the subject of industrial instruction. Each year there are evolved in the industrial classes of the Bureau many ideas and models of thusual merit.

The problem of spreading correct information on them finds one ready solution in the annual teachers' assembly at Baguio. In so brief a period and under existing circumstances no attempt could be made to teach even a considerable number of the many lines of work which are refollowed out in the schools and only those newly-developed features which seemed to offer exceptional opportunities were treated. The courses given included the following lines: basketry, hand weaving, hemp work. Irish crochet, lace and embroidery, and domestic seience.

The teachers who had charge of these several branches were experts in their lines; they were assisted by a corps of Flippino industrial teachers who understood their work thoroughly. Material for practice work was provided by the Bureau and a regular course of instruction was carried out. In all cases exhibits of the latest improved models and patterns were on display throughout the session.

The course in basketry was under the direction of Mr. Horace E. Cutler, under whom the now famous Polangui baskets were developed in the town of that name in Albay Province. Instruction covered the various sorts, hexagonal weave baskets, and the Zambales baskets. Mr. John F. Minier had charge of the course in hand weaving, which included the making of mats, pocketbooks, doilies, cushions, and numerous other useful small articles. The newly-introduced abacá work, which seems to offer such unusual possibilities as a school industrial line, was under the direction of Mr. Joseph H. Loughran. Instruction was given particularly in macramé bags, lace bags, footstools, hand bags, cushions, and slippers. The dyeing of abacá fibers was also given attention. Mrs. Pearl F. Spencer was in the charge of the work in Irish crochet. Her course was a very popular one. The course in lace making and embroidery was conducted by Miss Fannie McGee and her assistants. Mrs. Alice M. Fuller gave a seriese of talks and demonstrations on domestic science work among Filipino girls.

The enrollment in all of these classes was good. A large number of the men and practically all of the women took at least two of these courses. As examples it may be stated that 95 teachers enrolled during the season in the course in hemp work and more than 40 women took advantage of the opportunity for learning Irish crochet. It is expected that notable and prompt results will be realized from these courses given with Powition.

Immediately after the close of the exhibit at the First Philippine Exposition in February, in which the Irish crochet exhibit of Mrs. Pearl F. Spencer, of Tabaco, Albay, had been the subject of unusual attention. at the request of the Director of Education Mrs. Spencer embarked for Shanghai, China, to make an investigation of the Irish crochet industry at that center and particularly at the famous Siccawei Convent. The object was to discover the methods which are followed in giving instruction in this branch about Shanghai, the plans for the extension of the industry among the people and for keeping them in touch with the most up-to-date requirements along these lines, to secure samples of the most recent designs, patterns, and materials which are used in the Chinese work, prices and markets for the goods. While in Shanghai Mrs. Spencer inspected very carefully the work

of the women at the Siccawei Convent. She discovered that much of the product is handled by brokers in the city. Before she left on this trin she was authorized to purchase a number of samples of work which she thought would be useful in carrying on the instruction in the Philippines; her purchases, amounting to #319.25, included collars and cuffs, hags, haby bonnets, etc. Upon her return, the sample articles which she at the Teachers' Camp in Baguio and at the close of the session they were taken into the Bureau of Education museum, of which they now form a part. They will be used as may seem best for the furtherance of instruction in Irish crochet work in the schools.

step toward introducing into the homes of the people an industry which has been developed successfully in the schools was taken in the Province of Albay. This was in the introduction of Irish crochet among the people. It has been demonstrated that Filipino women can they can earn from #0.80 to #1 per day at it. The market for the goods which can be produced is ample, and with the industry in the stage which it had reached by the close of schools in March it was thought that an here the first experiment at extending the work of the school girls among the townspeople.

Authority was granted by the Director of Education for the appointment of a number of temporary Insular teachers to conduct classes in Irish crochet for adults during the long vacation. These teachers were chosen from among the most apt pupils who had been developed by Mrs. Pearl F. Spencer in her work during the year. The classes were organized under the direction of Mrs. Spencer, who had just returned from Shanghai, where she had investigated the methods for carrying on this sort of work in that center. The first class was established in the town of Tabaco. and the work was later extended to other towns of the Province of Albay, until 12 teachers were employed in this manner. Pupils of to these special classes. The aim take up the work immediately in their homes in order to secure an income for the support of themselves and their families. Four days after the classes were started there were 300 women enrolled in them in ten

In order to stimulate special interest in the work a public meeting had been arranged for the town of Thanco, at which some P2,000, which was the share of the Tahaco girls in the Irish crochet sales at the Exterior to the town of the town of the town of the girls of the intermediate and primary grades. At the same time the proposed special vacation class for adults was explained to the people, who, was explained to the people, who, with such concrete evidence of the with such concrete evidence of the them, would appreciate more fully the value of the new household industry which was offered to them.

For a result of these comments of the classes and the adoption of Itels crochet as a bousehold industry among the women, Mr. G. W. Caul, kins, who was the division superins tendent of schools for Albay at the time, looked forward to exports of Irish crochet articles from Albay to the value of P100,000 during the year beginning July 1, 1912.

A METHOD OF DYEING NITO BLACK.

As a rule the nito stem is not uniformly black; it is generally much darker at the butt end than toward the tip; again it is often streaky, with greenish-white lines trunning lengthwise. This irregular and uneven color is a serious detriment in its employment for basket work. To remedy this, dyeing and smoking are frequently resorted to. The following is a process which will give successful results.

Take a young coconut about half grown (the green, not the red variety) and cut it into small pieces. Secure a cross-section of sapang (Sibucao) wood-a piece of the trunk is best-about a foot long, and split it lengthwise into thin and sapang strips in a pot or can, with about a gallon of water, and boil for half an hour. Then take the nito and place it in the solution, boiling for about twenty minutes. Afterwards remove the nito and bury it in moist mud, where it should be left for half a day. It may then be removed and cleaned by washing. It will be found to have a deep, jet

Rattan, bamboo, and banban may also be dyed in the same manner.

As a substitute for the mud bath, lime may be employed in the dy mixture. A small amount should be added to the dyeing solution after the coconut and sapang have been boiled together and the material then placed in the solution and boiled. As a rule, this method will give as satisfactory a color as the first.

At various times during the last few months letters have been received from Mr. George N. Briggs, representative of the Director of Education in the United States in the selection of new teachers, as to the disposition which has been made

of the exhibit of industrial work from Philippine schools which was sent back to the United States to be exhibited at the Mohonk Conference. Due to unfortunate delays in shipping at San Francisco, the exhibit did not reach the Mohonk Conference as intended and failed in its initial object. However, Mr. Briggs himself took charge of the exhibit and had it placed on display As soon as this work of the Philinnine schools was brought to the attention of the public there was at once a great demand for the exhibit as a feature of several of the prominent educational institutions and gatherings of the year. The high class product and the possibilities for its further development created quite a sensation; the work was far superior to anything which has yet been produced by public schools in the United States. At the conference of the National Society for the Promotion of Industrial Education, held in Cincinnati in 1911, a gathering which was attended by the most prominent educators from all parts of the United States, the exhibit received of much discussion.

Perhaps the most notable attention which the exhibit received was its display during the months of February and March at the Teachers' College of Columbia University in New York. The various articles were displayed in nine exhibit cases and the university issued a 6-page folder describing the exhibit in considerable detail.

In this manner the work of the Philippine schools has been brought before the educators of the United States in a very concrete manner. This exhibit, which continues to be known in this office as the Mohnuk exhibit, is still in the United States in charge of Mr. Briggs.

The Director of Agriculture has stated that it will be the policy of the Bureau of Agriculture again this year to supply seeds generally upon individual requests to teachers and pupils of the public schools. During a portion of the past year as many as 1,000 requests per month were filled; many of these were from pupils of the public schools.

In taking advantage of this offer of the Bureau of Agriculture for the coming school year, teachers and pupils should remember that collection V-2 as noted below is supplied to teachers and collection V-6 is intended for pupils. The other collections are for farmers with one hectare or more of land under cultivation, and will not, as a rule, be furnished to other persons. In every case the name and address of the applicant should be clearly written. The letter of request should state whether the writer is a teacher, a student or a farmer, and what collection is desired. All communications should be addressed to the Director of Agriculture, Manila.

The following is a complete list of the various collections of seeds distributed by the Bureau of Agriculture:

V-1 (for coöperating planters).— Beans, beets, cabbage, carrot, eggplant, endive, lettuce, mustard, okra, onion, pechay, pepper, radish, tomato, turnip, papaya, peas.

V-2 (for teachers and planters).— Beans, beets, cabbage, carrot, eggplant, lettuce, mustard, onion, okra, pechay, radish, tomato, turnip, peas.

V-3 (salad vegetables).—Condol, endive, lettuce, mustard, pechay, pepper, spinach, squash, parsley, peanuts.

V-4 (for hacenderos).—Batao, bean, Lyon bean, corn, mongo, cowpeas, patane, sorghum.

V-5 (forage seeds).—Italian rye grass, billion-dollar grass, molasses grass, Colorado grass, Lyon bean, sumac sorghum, redtop, new era cowpeas, Natal grass, Rhodes grass. V-6 (for students).—Lettuce,

pepper tomato, eggplant, peas.

grass, Paspalum grass, and Paragrass roots.

V-8 (foreign exchanges).—Lyon bean, seguidillas, patane, batao, tobacco, squash, condol.

The Director of Agriculture states that roots of guinea grass, which is a valuable forage plant, will be furnished in small quantities free upon application. For enough roots to plant one hectare of ground a charge of P15 will be made.

The Bureau of Agriculture announces that a fresh supply of Hawaiian papaya seed has been received and is ready for distribution. When requested, Circular No. 6, on Cultural Directions for Papaya, will be sent with the seeds.

A recent introduction of the Bureau of Agriculture is the roselle, a plant which, though known in Java 250 years ago, is only now finding its way into the Philippines. It is used chiefly for jellies and preserves and strongly resembles the cranberry. It is very simple and easy of cultivation. Seeds of the roselle may be obtained from the Bureau of Agriculture free upon application by anyone interested in it; printed directions for planting will be included with each package.

ers and pupils to produce articles of too varied types and designs, the division superintendent for Ilocos Norte states in a circular: "The dustrial work, but it can never do their own fancies as to what they are to make. * * * if 100 whips or baskets are made of uniform size. shape, design, and workmanship, and of the same materials, the supervising teacher can sell the bunch at a uniform price and secure buyers by furnishing a single sample." In Ilocos Norte types which have not already been recognized as standard must be submitted to the division superintendent for approval before they may be extensively taken up.