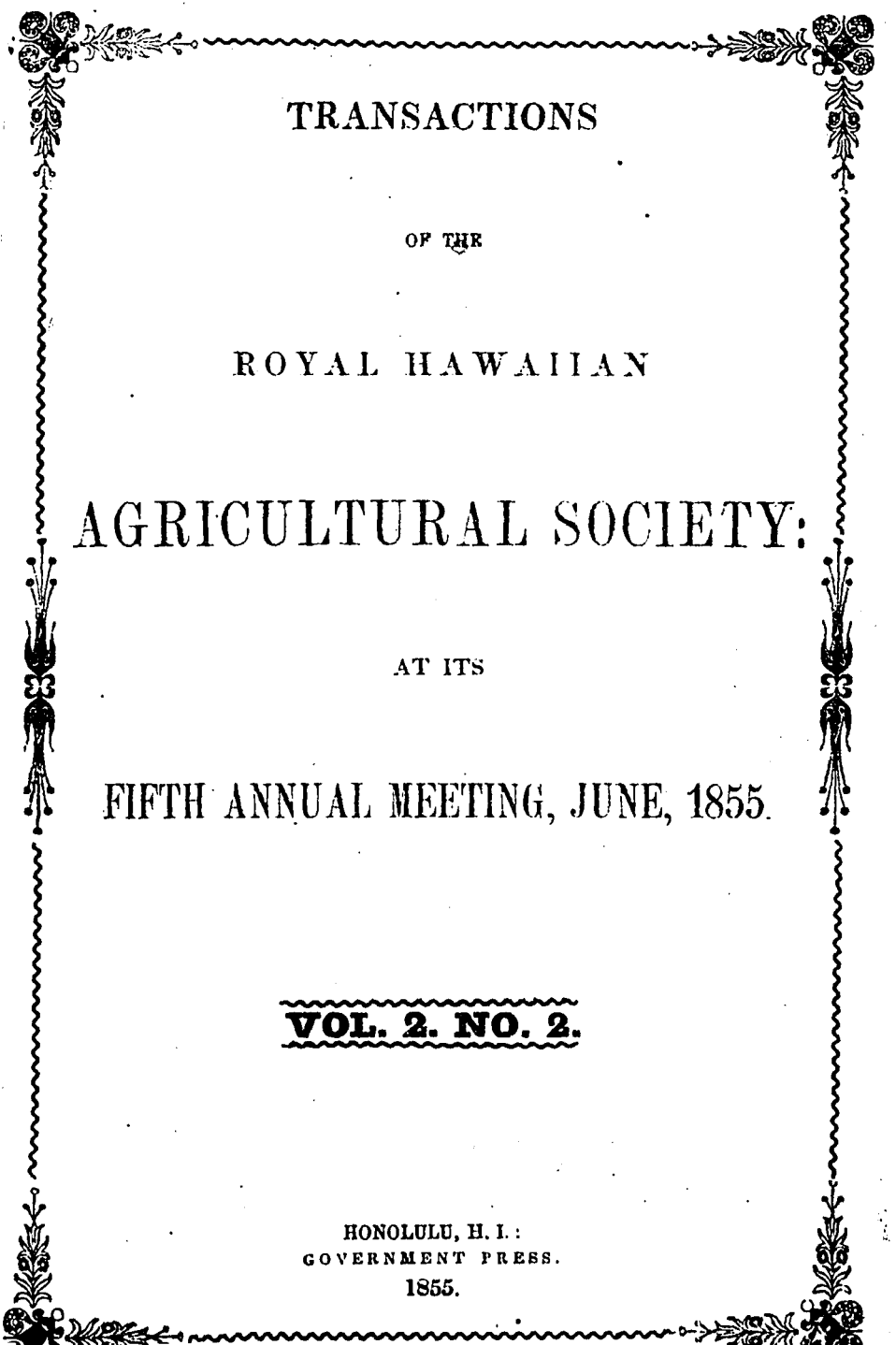




TRANSACTIONS

OF THE

ROYAL HAWAIIAN

AGRICULTURAL SOCIETY:

AT ITS

FIFTH ANNUAL MEETING, JUNE, 1855.

VOL. 2. NO. 2.

HONOLULU, H. I.:
GOVERNMENT PRESS.
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LIST OF OFFICERS FOR 1855.

JAMES F. B. MARSHALL, *President.*

BENJ. PITMAN,	Hawaii,	} <i>Vice Presidents.</i>
P. CUMINGS,	"	
L. L. TORBERT,	Maui,	
C. B. ANDREWS,	Molokai,	
R. W. WOOD,	Oahu,	
S. BURBANK,	Kauai,	

GEORGE WILLIAMS, *Treasurer.*

JOHN MONTGOMERY, *Corresponding Secretary.*

E. O. HALL, *Recording Secretary.*

S. N. CASTLE,	} <i>Executive Committee.</i>
H. A. FAIRBANKS,	
A. B. BATES,	
C. R. BISHOP,	
B. F. SNOW,	

ANNUAL MEETING
OF THE
R. H. AGRICULTURAL SOCIETY.

HONOLULU, June 12, 1855.

The Society met according to adjournment, at the Armory of the Hawaiian Guards, Mauna Kilika, the Court Room being occupied by the House of Nobles.

The President of the Society, Hon. W. L. Lee, being absent, it was unanimously voted that R. W. Wood, M. D., Vice President for Oahu, take the Chair, and preside over the Annual Meeting.

The reading of the minutes of the last session, was dispensed with, except the resolution of adjournment which was to the 2nd Tuesday in June 1855.

On taking the Chair, Dr. Wood read a brief Report of the proceedings of the Board of Managers, which was accepted.

The Treasurer read his Report which was accepted.

On motion of Mr. Marshall, it was voted that the Chair appoint a Committee of three to nominate Judges for the Fair to be held to-morrow. Messrs. Marshall, Castle and Robertson were appointed.

The Reports of Standing Committees were called for, and read.

A communication from Dr. Frick on the subject of Indigo was read, which elicited some discussion, and the announcement that Indigo was first introduced into the Islands by Dr. Serriere in 1827-8 from Batavia, and afterwards by Dr. Rooke in 1840 from Calcutta; this latter did not thrive. The former has spread over the Islands spontaneously, so as to be a nuisance in many places.

On motion of Rev. S. C. Damon,

Voted that Dr. Frick's communication be published in the transactions.

On motion of Mr. Bates,

Voted, that a Committee of three be appointed to enquire what measures can be adopted by this Society to ascertain whether the manufacture of Indigo is practicable at these Islands. Messrs Rooke, Montgomery and Bates were chosen.

The Committee to nominate Judges for the Fair, reported a list which was accepted.

In view of the delay in receiving notice of appointments on Committees it was voted,

That the Corresponding Secretary notify the Chairman of each Standing Committee of his appointment as soon as made by the Board of Managers.

On motion of Mr. Castle,

Adjourned till $\frac{1}{2}$ to 8 this evening to hear the Annual Address at the Bethel.

Met at the Bethel pursuant to adjournment, where a large audience assembled. An eloquent address was delivered by Hon. G. M. Chase, U. S. Consul at Lahuina.

On motion of Hon. R. C. Wyllie, a vote of thanks was passed to Mr. Chase, with a request for a copy in the English and Hawaiian languages for publication in the transactions of the Society.

Adjourned to Tuesday morning at 12 o'clock, at the Armory.

On Wednesday, the Fair took place as usual. The Exhibition fell far short of former years, not so much in quality as in quantity and variety. This was owing to several untoward circumstances, among the principal of which were the absence of the President, who had generally taken the burden of the work on his own shoulders, and the cessation, temporary it is to be hoped, of the steam communication between the Islands which rendered it difficult for Exhibitors either to come or send their products to Honolulu. At 8 o'clock the distribution of the prizes awarded at the Exhibition of the previous year, took place. The Goblets, Cups, Medals, Plate and Books were much admired and were superior to those of any previous year. After the prizes were distributed, the auction took place and went off with much spirit.

On Thursday, June 14th, the Society met at the Armory, pursuant to adjournment. The awards of Premiums at yesterday's Exhibition were read by the Committees.

The Society then proceeded to the choice of Officers for the ensuing year. The following were duly elected:

JAMES F. B. MARSHALL, *President*.

B. Pitman, Hawaii, *Vice President*.

P. Cumings, Hawaii, " "

L. L. Torbert, Maui, " "

C. B. Andrews, Moioikai, " "

R. W. Wood, Oahu, " "

S. Burbank, Kauai, " "

George Williams, *Treasurer*.

John Montgomery, *Corresponding Secretary*.

E. O. Hall, *Recording Secretary*.

S. N. Castle, *Executive Committee*.

H. A. Fairbanks, " "

A. B. Bates, " "

C. R. Bishop, " "

B. F. Snow, " "

The following Resolutions were adopted:

Resolved, That whereas Hon. W. L. Lee, President of the R. H. A. Society, since its formation has especially merited our commendation and favor by his assiduity and success in sustaining the Institution by his personal influence and labor, as a testimonial of our appreciation of his efforts, the Board of Managers be directed to procure a suitable Goblet to be presented to Hon. W. L. Lee at the next Annual Meeting.

Resolved, That the Board of Managers be requested to take into consideration, whether the interests of the Society would not be promoted by importing Garden Seeds, and offering inducements to practical Gardeners to immigrate to the Islands, and if so, adopt some measures to accomplish that end.

Resolved, That the thanks of the Society be presented to Mr. J. H. Brown and the other members of the Committee of arrangements; for the Fair; for the efficient manner in which they have performed their duties.

Resolved, That the thanks of the Society be presented to Dr. Wood, Vice President for Oahu, for the able manner in which he has presided at this meeting.

Resolved, That the thanks of the Society be presented to the Hawaiian Guards for the use of their Armory for the Society's meetings.

Resolved, That the thanks of the Society be presented to Rev. S. C. Damon for the use of the Bethel for the Annual Address.

Resolved, That Capt. Sterret, of U. S. S. Decatur, receive the thanks of the Society for the use of the awnings furnished by him for the Exhibition.

Resolved, That the Board of Managers be empowered to alter the time of the annual meeting, if in their judgment the interests of the Society will be promoted thereby.

On motion,

Voted, that this Society do now adjourn till the next Annual Meeting, the time for which shall be fixed by the Board of Managers.

REPORT OF THE PROCEEDINGS OF THE BOARD OF MANAGERS.

By R. W. Wood.

Gentlemen of the R. H. Agricultural Society:

By our constitution it is made the duty of the President of the Society to render a report of its proceedings for the current year, and to deliver, or cause to be delivered, an address at the annual meeting.

But in the absence of the President, the constitution makes no provision for the discharge of those duties by a substitute.

The Hon. W. L. Lee, who has continued to preside over the interests of the Society, since its organization in 1850, is now absent, on a mission to the United States, which, if successful, will be likely to give an impetus to Hawaiian Agriculture, equal to the desire of its warmest friends.

Owing to the ill health of the President, and the heavy pressure upon him, of his public duties, since the last annual meeting, the Board of Managers have been deprived of the usual amount of service of one of its most efficient members, who has been accustomed both to plan, as well as to execute nearly all the work, devolving

upon them. And in view of the comparatively small amount of business transacted in his absence, the other members of the Board have been deeply impressed with the extent of their indebtedness to his untiring exertions, for any advantages the Society, since its organization, may have derived from their action. Consequently, the task which they have assigned me of rendering to the Society an account of their proceedings, is comparatively an easy one.

Previously to the departure of Judge Lee, the Board of Managers were informed that he had been empowered to negotiate a treaty of reciprocity, between this government and that of the United States, on the basis of the reciprocity act, passed by the Hawaiian Legislature, on the 25th of May 1852, and believing that such a treaty would be mutually advantageous both to the agricultural and commercial interests of these Islands, and the neighboring states of Oregon and California, they held a meeting, at which a Committee was appointed to wait on the Hon. D. L. Gregg, Commissioner of the United States, to solicit his friendly coöperation.

The Committee were gratified to learn that Mr. Gregg, having had his attention called to the subject of their interview with him, by Mr. Wyllie, was prepared to make favorable representations, in presenting the proposed treaty to the attention of his Government.

In accordance with a Resolution of the Board, at a meeting held in November last, 158 prizes have been offered to be awarded at the approaching Fair, at a cost to the Society of about one thousand dollars.

The premiums awarded at the last Annual Exhibition, have, with one or two exceptions, been received, and are now ready for distribution; and for the improved designs, and superior mechanical execution of the cups and medals, as well as for the comparatively low cost at which they have been obtained, the Society is indebted to the services of J. F. B. Marshall, Esq.

At a meeting of the Board, held in June last to consider the subject of introducing improved foreign stock, it was ordered, that the Society take one half interest in a Devon Bull and Heifer, with the condition, that on their arrival at the Islands, they should be offered to the subscribers to the remaining half interest, at cost; and that in case of their refusal to accept them on these terms, they should be disposed of at public auction.

The cattle arrived in February last on the ship Vancouver, in good condition, and were the admiration of our best judges of stock. Their increase, on the passage, (that of a bull calf) nearly paid the expense of their transportation from Boston to Honolulu.

For the introduction of this desirable breed of cattle into the Islands, the Society is largely indebted to the disinterested services of B. P. Johnson of Albany N. Y., in selecting them, and also to Messrs H. A. Pierce, and C. Brewer of Boston, for their friendly interest and co-operation in forwarding them to the Islands. Notwithstanding their actual cost in Boston, \$706, exceeded that at which they had here been estimated, by upwards of \$400, the Society has been reimbursed for its outlay, by the subscribing members, J. Montgomery Esq., and myself.

An increasing interest has been apparent, the past year, in the introduction of improved stock. And in reference to this subject, I beg to call the attention of the Society to the recommendation of the President, in his last Annual Report, that we appropriate a less sum for premiums and a larger one for the importation of stock.

For information in respect to the individual experience, the year past, of farmers, planters and stock growers as well as to the present condition and prospects of the various agricultural interests of the Islands, which it has been the custom of the President to notice in his Annual Report, I beg to refer you to the Standing Committees who, it may be hoped, are fully prepared to report.

By a comparison of the present improved and extended cultivation and stock growing at these Islands, with that which existed prior to the organization of this Society, there is sufficient occasion for mutual congratulation, at the success which has apparently crowned its efforts.

In our experience of the past, there is not wanting encouragement for renewed exertions. In the present, there are reasonable grounds of hope for a brighter future.

REPORT OF TREASURER.

BY GEORGE WILLIAMS.

Mr. President, and Gentlemen of R. H. Agricultural Society:

As Treasurer of your useful body, I have the pleasure to make known to you the continued prosperity of our finances. More than \$800 have been paid for premiums, and \$600 have been added to our invested funds, yet we have over \$500 remaining on hand. Had all the subscribers paid their dues for the present year, our receipts would have been much greater; but many have allowed the year to slip by without doing so, although a majority, no doubt, feel an interest in the object of our organization. It is to be hoped that members will be more prompt the coming year and pay when called on. No life members have been added to our list during the present year.

In the month of January, I made a report of the receipts and disbursements to the Minister of the Interior, as provided by the Act of June 18th, and received from the Hawaiian Treasury the sum of \$500.

With the amount of cash on hand, the sum to be received from the Government, the large amount of interest, fees of membership, ect , we shall certainly be able to pay all expenses and add \$1000 to our investments.

The receipts and disbursements have been as follows:

RECEIPTS.

Cash on hand from last year,	-	-	-	-	\$503 01
8 Annual Members 4th year.	-	-	-	-	- 40 00
Cash from Natives for exhibiting Steers,	-	-	-	-	1 00
Cash received for extra cost of Premium,	-	-	-	-	2 50
Nett proceeds of auction sale June 14th,	-	-	-	-	231 00
Interest on Loans,	-	-	-	-	428 73
Loans Returned,	-	-	-	-	1400 00
Cash from Hawaiian Treasury,	-	-	-	-	500 00
Cash for Society's interest in imported Stock,	-	-	-	-	856 44
Cash received from 187 Annual Members,	-	-	-	-	685 00
Sales of "Transactions,"	-	-	-	-	7 50
					————\$4150 18

TRANSACTIONS OF THE

DISBURSEMENTS.

Cash paid for Premiums,	-	-	-	-	-	\$437 75
Bill of tin pans used at Fair,	-	-	-	-	-	7 25
Posters 5,25, freight on Premium 8 79,	-	-	-	-	-	14 04
Cash Premium,	-	-	-	-	-	15 00
Binding Vol. I of "Transactions,"	-	-	-	-	-	18 75
Cash paid for Premiums,	-	-	-	-	-	332 90
Cash paid for Stock,	-	-	-	-	-	256 44
Painting Flower-Stand,	-	-	-	-	-	3 00
Certificate of Membership, to Auctioneers,	-	-	-	-	-	10 44
Expense of Annual Meeting,	-	-	-	-	-	73 04
Diplomas etc.,	-	-	-	-	-	13 00
Cash for Carolina Potatoes for seed,	-	-	-	-	-	28 95
Binding 250 copies "Transactions."	-	-	-	-	-	30 00
Printing 500 do. do.	-	-	-	-	-	348 97
Postage on "Transactions" to the United States,	-	-	-	-	-	11 60
Loaned on Note and Mortgage 2 years, at 12 per cent,	-	-	-	-	-	2000 00
Cash Premiums	-	-	-	-	-	20 00
Balance on Hand,	-	-	-	-	-	529 49
						—————\$4150 18

Respectfully submitted.

LIST OF JUDGES CHOSEN TO AWARD PREMIUMS FOR THE FAIR 1855.

ON CATTLE.

M. C. Monsarrat, Thos. Cummings, John Rives, John Li, G. P. Judd.

ON HORSES.

L. L. Torbert, G. Reiners, W. C. Lunalilo, E. Moll, L. H. Anthon.

ON SHEEP AND SWINE.

J. E. Barnard, J. Montgomery, G. W. Maxey, J. I. Dowsett, J. Dudoit.

ON POULTRY AND DAIRY.

P. J. Gulick, W. P. Alexander, J. E. Chamberlain, H. M. Whitney, A. B. Bates.

ON SUGAR, SYRUP AND COFFEE.

W. A. Aldrich, Ira Richardson, J. F. Colburn, W. Goodale, J. W. Austin.

ON GRAIN, FLOUR, SEEDS AND FIELD CROPS.

C. R. Bishop, R. Armstrong, L. Andrews, Jr, C. S. Bartow, W. Webster.

ON FLOWERS.

S. P. Ford, J. H. Wood, B. F. Snow, H. Stangenwald, D. L. Gregg.

ON FRUIT AND VEGETABLES.

C. G. Hopkins, L. Kamehameha, C. W. Vincent, W. H. Pease, H. Rhodes.

ON FARM IMPLEMENTS, AND DOMESTIC MANUFACTURES &C.

R. A. S. Wood, O. H. Gulick, C. Brewer, 2nd, Thos. Spencer, J. C. Spalding.

ON MISCELLANEOUS ARTICLES.

J. Fuller, J. Richardson, E. H. Allen, T. C. B. Rooke, D. M. Watson.

THURSDAY, June 14.

The Reports of the several Committees to award premiums were presented, and were as follows:—

REPORT OF THE COMMITTEE ON CATTLE.

BY M. C. MONSARRAT.

Mr. President, and Gentlemen of R. H. Agricultural Society:

No imported stock, Class I, or native crossed between imported and native cattle, Class II, were exhibited. (See list of premiums for the years 1854 and 1855.

The only animals on the ground were one fine yoke of working oxen, 7 and 8 years old; one fat ox, age not stated; one cow and heifer. All of native breed.

Your Committee, in the belief that Class II, was intended to embrace native stock, as well as that mixed with imported, are of opinion, that the animals exhibited are entitled to consideration, and trusting to the well known liberality of the Society, we award for the oxen, No. 123, \$5 or a large medal.

For the fat ox No 125, \$5 or a large medal.

REPORT OF THE COMMITTEE ON HORSES.

BY L. L. TORBERT.

Mr. President, and Gentlemen of the R. H. Agricultural Society:

Your Committee on horses report as follows:

CLASS I.—IMPORTED HORSES.

18. Best blood Stallion over 4 years old, Capt Meek's "Oregon;" as he has carried off the first prize before, we award a certificate.

19. Best blood Mare over 7 years old, Mr. L. H. Anthon's "May Fly." (119.)

20. Stallion horse of all work, over 4 years old, none entered.

21. Best brood Mare of all work, over 4 years old, Capt. J. Meek's "Lady Eleanor," (113.)

22. Best Stallion, draught, over 4 years old, none entered.

23. Best brood Mare, draught, over 4 years old, Mr. Bullions' black Mare, (No. 95.)

CLASS 2.—NATIVE HORSES.

24. Best Stallion over 3 years old, Capt. J. Meek's "Young Oregon," 109.

25. Best brood Mare with foal at her foot, over 3 years old, Mr. J. G. Lewis' bay Mare, (97.)

26. Best Stallion over 2 years old, Capt. J. Meek's sorrel stallion, (111.)

27. Best Mare over two years old, Mr. Asher B. Bates' Mare (102.)

COLTS.

28 & 29. none entered.

GELDINGS.

30. Best gelding, Mr. J. Dominis, (85.)

31. 2d. best gelding, Mr. W. S. Allen's, (87.)

It was hard to decide between those exhibited by Mr. Moffitt, and those to which we have given the premiums, and we think Mr. Moffitt entitled to a premium too.

We noticed an imported gelding belonging to Mr. L. H. Anthon, which is a noble animal and we recommend the same to your attention.

Mr Paul Manini entered a grey stallion 3 years old, sired by S.

Thompson's imported stud, which we recommend to your consideration; he being a fine and strong horse.

There was a native stallion belonging to Messrs. Brown which we did not notice until after the judges had separated, but which we think about as good as the best. This stallion is from "Oregon," and has many excellent qualities.

Some horses were brought to the fair after the time fixed for the entry, and so we could not take notice of them; we regret it the more as some of them were very valuable animals.

Respectfully submitted.

REPORT OF THE COMMITTEE ON SHEEP AND SWINE.

By JNO. MONTGOMERY.

The Committee appointed to judge and report on Sheep and Swine, beg to report as follows:

We do not consider any of the sheep exhibited to be of sufficient merit or quality to enable us to award a prize.

In pigs the competition was very limited; only three being exhibited. The Black Berkshire Boar imported, No. 135, was a very fine specimen, and we consider him well entitled to the first prize.

Two native Sows, No. 165, were exhibited; and we consider them to be of good quality and entitled to the first prize.

For the Committee.

In addition to the above award, your Committee beg to add that a number of excellent fleeces of wool of superior quality were exhibited, and we award premiums to the following numbers, viz: 72, 73 and 74.

REPORT OF THE COMMITTEE ON GRAIN, FLOUR, SEEDS AND FIELD CROPS.

By W. WEBSTER.

To the President and Members of the R. H. A. Society:

GENTLEMEN:—Your Committee on Grain, Flour, Seeds and Field

Crops, having examined the different samples of the above products exhibited, have awarded premiums to the following, as numbered at the exhibition:

Sample No. 44, best sample of Wheat, \$10 or a silver cup.

“ No. 76, “ “ 20 ears Indian Corn, \$5 or medal.

“ No. 77, “ bushel Indian Corn, \$5, or medal.

“ No. 106, “ variety of Beans, \$5 or medal.

No certificates or descriptions of the modes of culture, &c., as required by the Society, have been forwarded by the owners of the following samples, but your Committee would recommend premiums to be awarded as follows:

For sample No. 42, best crop of wheat, not less than two acres, \$15 or a cup.

This sample your Committee are informed was raised by a native named Kekaha, a member of the auxiliary society on East Maui, at Makawao, and was from a field of 50 acres, producing about 23 bushels per acre. Although this falls two bushels per acre short, according to the Society's rule, still your Committee are of opinion that as a reward of industry and a stimulant to further exertion, the award will be beneficial.

Sample No. 67, best sample of Irish potatoes, \$5 or medal.

This is the only sample of Irish potatoes exhibited, and is a fair one.

Sample No. 1, best sample of Tobacco, \$10 or a cup.

This is a sample from the plantation of Messrs. Archer & Gruben, of Wainea, Kauai, and is from a field of 30 acres. There is no account of the cultivation of the crop along with the sample, but as one of the partners wrote an able report on the subject, as published in last year's transactions of the Society, your Committee consider that the above premiums ought to be awarded.

Your Committee would also recommend that a premium of \$10 or a cup be awarded to the party, (if eligible,) who manufactured the excellent samples of wheat flour and Indian corn meal exhibited.

Two small samples of Hawaiian cigars were exhibited by Mr. Montgomery, put up in a neat and business-like manner, but not in a sufficient quantity to entitle them to a premium.

Your Committee regret to state that for many of the premiums offered by the Society there were no competitors, and that so far as this branch of the exhibition is concerned, it will not compare favorably with that of last year.

Respectfully submitted.

REPORT OF THE COMMITTEE ON SUGAR, SYRUP, AND COFFEE.

By J. W. AUSTIN.

To the President of the Royal Hawaiian Agricultural Society:

The Committee appointed to award the premiums for the best samples of Sugar, Syrup and Coffee exhibited, would respectfully report as follows:

SUGAR.

They award the first premium of \$15 or a silver goblet, for the best one hundred pounds of Muscovado Sugar, exhibited in lot No. 50;—being a sample of twenty tons manufactured at Makawao, Island of Maui, during the present year.

The sample of sugar marked 51 was of good quality, and refined by means of animal charcoal imported from the United States; but the Committee were unable to award a premium for this sample, as the quantity required for a premium was not exhibited.

COFFEE.

The Committee award the first premium of \$10 or a silver cup for the lot marked 5, being a sample of the crop raised at Napoopoo, District of Kona, Hawaii, during the past year. This coffee was of fine quality and very aromatic.

The Committee were unable to award a premium for the lot marked 136, being a sample of coffee raised at Hanalei, Kauai, as the requisite quantity was not exhibited; but they would remark, that this coffee was of fine quality, well cleaned, and worthy of a premium, if the requisitions of the Society had been complied with.

SYRUP.

There was no syrup exhibited for a premium.

Respectfully submitted.

REPORT OF THE COMMITTEE ON POULTRY, DAIRY AND CHEESE.

BY A. B. BATES.

To the President of the Agricultural Society:

The Committee of judges on Poultry, Dairy and Cheese, respectfully report, that the show in this department, did no credit to the Society, though all the articles exhibited were excellent, without exception. It is known that there are several varieties of poultry upon the Islands in good condition and thriving, and it is to be regretted that sufficient interest has not been excited to induce the owners to have them at the fair. There was but one lot of hens and one lot of ducks for the Committee to examine.

Horace G. Crabb presented for our consideration one cock and two hens of the Shanghai Breed, which the Committee regard as entitled to a premium for their superior merit. The stock was procured from the American steamer *Susquehanna* on her way home from Japan, and the specimens of them produced here evidently were reared with great care. Mr. Crabb states to the Committee, the young hens are to a feather exactly alike, and also the young cocks; the fowls on exhibition will be five months old on the 16th June, inst., and that the largest of the pullets has laid 17 and the other 25 eggs. Before the exhibition closed another egg was found in the coop. The Committee are of opinion they should take the prize offered for "best lot of poultry owned by exhibitor," \$5 or a silver medal.

A Japan hen exhibited by Miss Emma Smith attracted the attention of the Committee as a singular curiosity, being covered with feathers appearing like hair. It is doubtful whether the introduction of the stock is desirable.

There was but one lot of ducks on exhibition, and they belonged to Jas. I. Dowsett. They came of the Muscovy stock and are fine specimens. Two of them, one drake and one duck, were four months old; the drake is estimated to weigh 6 or 7 pounds. Another duck was accompanied with 24 ducklings of her hatching. The committee award to Jas. I. Dowsett the premium offered for best lot of Muscovy ducks, thinking it would have been difficult for him to have been beaten whatever may have been the competition.

There was but one specimen of butter exhibited, which was accom-

panied with no statement of how it was produced. It was of fair quality, but not superior to the butter frequently in market. It was not thoroughly worked, and had it been necessary for the Committee to ascertain its weight, a liberal allowance should have been made for the weight of the salt it contained more than necessary to preserve a fine specimen. Butter of the finest quality in color, taste and consistency may be made upon the Islands, for such specimens have been seen by some members of the Committee, bought in the market, and until they are produced at the Fair, the Committee think they will not be justified in awarding a premium.

Whether cheese of first quality can be produced upon the Islands may be problematical; but no specimen was found at the Fair meriting a special commendation, much less a premium.

The lady on Kauai who usually has a specimen at the Fair is entitled to praise for her perseverance, and it is to be hoped before another year has elapsed, fine specimens may be produced from the many herds upon the several Islands.

REPORT OF THE COMMITTEE ON FLOWERS.

By J. H. WOOD, Acting Chairman.

Mr. President, and Gentlemen of the R. H. Agricultural Society:

Your Committee appointed to examine and award premiums on flowers exhibited to day having, in the absence of its chairman, attended to the duty assigned them according to the best of their ability, respectfully beg leave to submit the following report:

To those present at the exhibition we need not say the display of flowers was large and very beautiful; showing the introduction and successful cultivation of very many choice varieties since our last annual fair,—eliciting universal admiration, richly merited, and showing a greater improvement in this department than any other.

Your Committee award as follows:

For the best collection and greatest variety, first premium to No. 110.

For 2d “ “ “ 2d “ No. 138.

For 2d best Floral Design we award the premium to No. 53, as being the most skillfully executed; but would avail ourselves of the dis-

cretionary power to award premiums for articles of merit not enumerated, and award a premium for Floral Design No. 16, as exhibiting more originality of design than either of the others.

For the best Boquet, premium to No. 92.

For the greatest variety of roses, premium to No. 110.

There being no basket of flowers exhibited, your Committee can only regret being unable to award the premium offered for that purpose.

Your Committee are decidedly of opinion, and would suggest, that a larger number of premiums should be offered in this department—at least first and second premiums for each of the collections enumerated the present year; and would suggest the propriety of one or two premiums for the best Dahlias—likewise a premium for the introduction of the Nymphaea, or white pond lilly.

While but one premium is offered, there is a feeling—and a legitimate one, too—among the humbler class of floral cultivators, that it is useless for them to attempt competition with amateur florists upon an extended scale,—the consequence is, competition is not induced, and the Society loses the gratification anticipated, and fails to promote the object designed.

Your Committee also believe the Society can well afford to offer an extended list of premiums in this department, when we consider the amount of sales from this source yearly.

Although professedly an agricultural society, we think its members and the community are fully aware of the importance and interest which flowers have ever contributed to our annual exhibitions, aside from the *daily* pleasure of living, riding, and walking among beautiful flower gardens, filling the air with their fragrance, delighting the eye with their delicate beauty, and raising the thoughts to the great Author.

Respectfully submitted.

REPORT OF THE COMMITTEE ON FARM IMPLEMENTS AND DOMESTIC MANUFACTURES.

By R. A. S. Wood.

To the President and Gentlemen of the Royal Hawaiian Agricultural Society:

The Committee appointed to judge of and award premiums on Farm Implements and Domestic Manufactures, beg to report that they have awarded as follows, viz:

No. 1. Best specimen of Ox Yoke to A. Philips; as they consider this specimen, (although not so highly finished as home manufacture,) to be superior for the purpose on these Islands.

No. 46. They notice with much satisfaction three specimens of Grass Hats, which would command a good market in large quantities.

No. 3. Fine specimens of Salt from Puuloa. There being little or no competition in this greatly required article, yet we feel bound to award a premium for this specimen, shewing further progress in quality on former years.

Crochet work by Miss H. B. Judd. Your Committee award a premium for this beautiful specimen.

Barrel of Beef, by L. L. Torbert. There was but one specimen, yet your Committee also feel bound to award a premium for this very superior article, regretting that this important article is not more extensively packed.

All which is respectfully submitted.

REPORT OF JUDGES ON MISCELLANEOUS ARTICLES.

By J. FULLER.

Among the various articles coming under our observation, we noticed with the greatest interest the samples of Indigo, No. 47. The presence of this article in our Fair as an Island production, is peculiarly significant. It points to a source of wealth to this country of incalculable value.

In different districts of these Islands there are many miles in extent covered with Indigo plant, growing in the greatest luxuriance,

without cultivation. Why shou'd this source of wealth remain undeveloped? Why should this plant, which is better than a mine of gold to the country, remain simply a pest to the grazier and agriculturalist? We have time is near when the manufacture of indigo shall become one of the important branches of industry upon the Hawaiian Islands.

We award a premium of \$15 for the indigo.

No. 71 is a very fine silver mounted Saddle, representing a branch of industry of considerable importance, when we consider the large number of saddles imported and sold in this market. We award a premium of \$5.

Also a diploma be awarded to Dr. Judd for the fine specimens of Arrow Root exhibited.

Two collections of land shells, exhibited by Drs. Frick and Newcomb, are worthy of notice, as indicating the progress of this interesting branch of science in this remote part of the world.

No. 116, a pair of gold fish, a lively and beautiful ornament to the Fair, which we recommend to your favorable notice.

No. 80, a sample of 100 tons of *Guano*, we recommend to the attention of the society, and particularly to those engaged in agriculture and gardening.

We would also call your attention to a fine sample of native cotton exhibited by Mr. Oudinot; it is pronounced by a gentleman acquainted with the article, to be equal to the New Orleans staple.

In conclusion we would not pass unnoticed the highly finished and beautiful working sewing machines exhibited by Mr. Wood. May the "Crispin family," with such assistance, never fail to furnish all Hawaiians with durable and elegant shoes.

ABSTRACT OF PRIZES AWARDED.

Rev. S. Waimalu, best Working Oxen, \$5 or medal.

Rev. S. Waimalu, best Fat Ox, \$5 or medal.

John Meek, best Blood Stallion, "Oregon" a certificate.

L. H. Anthon, best Blood Mare, "May Fly" \$10 or a cup.

J. Meek, best Brown Mare, all work, "Lady Eleanor" \$10 or plate.

- J. C. Bullions, best Draught Mare, \$10 or cup.
 J. Meek, best Stallion over 3 years, "Young Oregon," \$10 or cup.
 J. G. Lewis, best Blood Mare and foal, \$10 or cup.
 J. Meek, best Stallion over 2 years, \$5 or cup.
 A. B. Bates, best Mare, over 5 years, Youatt on the horse.
 J. O. Dominis, best Gelding \$5 or cup.
 W. S. Allen, 2nd best Gelding, Youatt on the horse.
 Messrs. Brown, best Native Stallion, silver medal.
 J. Meek, best Imported Boar, \$5 or medal.
 W. Webster, best Native Sow, \$5 or medal.
 R. Moffitt, best Wool, 3 Fleeces, \$5 or medal.
 H. G. Crabb, best lot of Poultry, \$5 or medal.
 J. I. Dowsett, best Muscovy Ducks, \$3 or Book on fowls.
 East Maui Plantation, best 100 lbs. Sugar, \$15 or Goblet.
 Cumings & Hall, best Coffee, \$10 or cup.
 M. M. Gower, best wheat, \$10 or cup.
 J. S. Emerson, best 20 ears Corn, \$5 or medal.
 J. S. Emerson, best Beans, \$5 or medal.
 Kekaha, best Crop of Wheat, \$15 or cup.
 F. A. Oudinot, best Irish Potatoes, \$3 or book.
 Lolohi, best Sweet Potatoes, \$3 or book.
 Archer & Gruben, best Tobacco, \$10 or cup.
 Hawaiian Steam Flour Co., best Flour and Meal, \$10 or cup.
 Mrs. J. Makee, best Variety of Flowers, \$10 or cup.
 Wm. Hildebrand, 2nd best Variety of Flowers, medal.
 Mrs. G. P. Judd, best Floral Design, a pair of vases.
 A. McKibben, 2nd best Floral Design, a bronze medal.
 Mrs. Wm. Ladd, best Boquet, silver boquet holder.
 Mrs. J. Makee, best Variety of Roses, silver boquet holder.
 J. H. Wood, greatest number of Fruit Trees planted, Downing's
 Fruit Culture.
 A. Philips, Lihue Plantation, best Ox Yoke, \$5 or medal.
 Mrs. Halekai, best Hats, \$5 or medal.
 C. W. Vincent, best Salt, \$15 or cup.
 Harriet B. Judd, best Crochet Work, \$2 or diploma.
 L. L. Torbert, best Salted Beef, \$5.

- D. Frick, best Indigo, \$15.
Robinson & Hughes, best Saddle \$5.
G. P. Judd, best Arrow Root, diploma.
F. A. Oudinot, best Collection of Vegetables, \$10 or cup.
J. T. Gower, best Peaches, \$5 or medal.
M. Halstein, best Carrots, \$3 or book.
F. A. Oudinot, best Cabbage, \$3 or book.
F. A. Oudinot, best Egg Plants, \$3 or book.
Mrs. Whitney, best Raisins, \$3 or book.
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ADDRESS OF HON. G. M. CHASE.

To the Royal Hawaiian Agricultural Society:

Why I have been selected to discourse to you upon the important subject of agriculture in these Islands, I do not know. I do know, as you probably all know, that I am a stranger to the productions of a tropical soil. I have never even seen your cane fields and sugar mills. I have never visited your coffee plantations, nor learned from observation the amount of science and labor bestowed in the cultivation of your wheat farms. Although surrounded by them, I have not yet learned the science of patting and treading taro patches, which every where exhibit a vast amount of agricultural labor. Of what can I then speak to you understandingly, for to these your attention, your labor and your capital are mostly devoted? As I cannot have the benefit of your answer to this question, I will content myself with the benefit of your indulgence if I wander a little from what you may deem appropriate to the occasion.

I have never seen your Constitution and By-Laws, but I presume the Society is made up of both native and foreign population, and that the interests of both are equally cared for. I design my remarks mainly for the benefit of natives. I should feel proud if I could awaken in them an interest on this subject, corresponding to the interest felt and exhibited by those who ought to be considered but grafts upon the trunk of their society. I know the language I employ is not generally understood by them, and that few if any of them are present to hear me. But if I advance anything worthy of their regard, I

doubt not they have friends and representatives here, to whom I may as well speak, who will disseminate the seed which is worthy of cultivation. I trust what I may say will not be uninteresting to my foreign friends engaged in promoting the objects of this society, as their interests are indeed identical with the interests of all.

I would contemplate these Islands as an infant state, just emerging from the heart of the vast commercial ocean, on whose bosom the mariner of every country is now unfurling sail, or feeding fire in the hot pursuit of wealth and fame. Blessed by Providence beyond example, perhaps, on the habitable globe, with a genial climate; while the rays of the hot sun are not permitted to reach its soil without being cooled and moistened by the breath of the salubrious trades, this young state begins its existence with the inestimable promise of health. It guarantees long life to the industrious and temperate—promises comfort and ease to those who would retire from the struggles of business, and whispers hope to the despairing invalid.

It is here a remarkable but well settled fact, that owing to the almost never ceasing current of the ocean air upon the land, the man whose system has been matured and braced in the cold clime of the north, can labor comfortably in the hot noon-day sun, as he can do in no other country of the same latitude.

Nor is labor here without its reward to the individual and the state. I shall dwell upon this topic by and by. I refer to it here merely to show that this young state has resources which can be profitably called out to render it useful and important to the commercial world, and thereby to itself.

The mariner needs repose. That element, to whose bosom he has wedded his life, will not promise him continuous health from his ever indulgence of her embrace, but cautions him at periods to snuff the breezes of *terra firma*, and partake the fruits of that element from which his being sprang. The noble ships, in plowing this vast field of waters, need recruits, fresh provisions, vegetables, fruits, perhaps repairs, and often a pillow and nurse for her sick and wounded.

This young state peers up in her central position, and has capacity and convenience to supply all. Her position and safe harbors, put her beyond the influence of competition and if her resources are duly developed, she must soon and forever be the great hotel, depot and market place of the Pacific.

From any thing which has yet been, we cannot estimate the importance of this market place. The Commerce of the Pacific is yet in infancy. Long years will not elapse before the iron horse of the Atlantic will be heard rushing through the Rocky mountains to the Pacific, to meet and there exchange burthens with its kindred mermaid-filly from Japan and China, via. the Sandwich Islands. Then scarcely a day will dawn which will not bring to your harbors foreign ships seeking supplies and recruits, and cargoes of your Island productions. Nor shall these drive away the whalemén, but render the inducement much stronger for their semi-annual return.

Are you prepared for this time? Have you resources which will enable you to supply wants which will thus bring you valuable customers, and make you neighbors with the whole world? I assert you have; and I propose to consider the question, Where is the key to unlock these resources, and the importance of your turning it.

You hold this key in your own hands. Your social enjoyments and welfare, your health and your morals call upon you to use it. The present and future condition of your state—its growing wants, its independence, its claim for rank among the nations—require you resolutely and manfully to turn this key. As you do so, the herds upon your mountains will multiply and become docile; the highlands will proudly wave their cereal locks, and the rich valleys will not only blossom like the rose, but pour forth their ripe abundance to fill the lap of the husbandman. Turn then this key! Its first influence will be to give comfort and wealth to individuals; its sure result will be to create resources for your state, to pay off its debts and fill its treasury; to defend your independence, to erect your school houses and maintain your schools; to build your roads and bridges, and to attract the artizan and laborer from other shores to share in and add to your prosperity.

You no doubt anticipate me in my reference to this key. *It is Agriculture*; that ancient and honorable occupation which lays at the foundation of all the wealth and prosperity of the world—indeed, which has given to the world all its real wealth—which has furnished our race, and still promises it, the greatest degree of physical health and perfection, and which, by its compatibility with our moral sentiments, secures to us the best preparation for the life which is to come.

Does it not furnish the world its wealth? It feeds the artizan and the manufacturer; it loads the ships of commerce; it is the great producer and provider for all trades, professions and occupations. It is the great wheel which directs, regulates and controls the business of the world. It may as well be said to be the Autocrat of the business world, as that the Czar of Russia is the Autocrat of the millions of serfs, who smile in his favors or tremble under his frowns.

It is said of Alexander that he conquered the world—of Napoleon, that he came near conquering Europe, because these mighty men paid, supported, controlled and directed the forces which brought about the results. So with greater truth may it be said of agriculture, as it feeds and supports all other kinds of business, and no one can live without it, so it controls the world. To come nearer home, it is said an illustrious chief of these Islands, of a few generations past, for no other avowed or conceivable object than ostentation, built a road some fifty feet wide, and paved it with flag stones, all round the Island of Maui, a distance estimated one hundred and fifty miles, parts of which road still remain entire to attest the truth of the tradition and the existence of the wonderful work.

Now, may it not with equal truth be said, when the agricultural resources of East Maui shall be fully developed; when she shall not only feed the population of the Islands with bread, but also the whaling fleet and merchantmen calling here for supplies—when she shall supply our markets with all kinds of vegetables and fruits which are produced any where between the poles and the equator, that the agriculture of that Island, as it shall bring wealth to individuals, and consequently resources to the government, will build roads, if not costing as much labor as that built by the great chief, of much more benefit; will build and employ vessels of commerce, churches and school houses, wharves and store houses, mills and workshops, and what is still more important, will populate that Island with a hardy, intelligent, virtuous, independent, happy people.

Agriculture will do *everything* for man. It will not only feed and clothe him, secure him health and long life, making his bread sweet and his sleep sound—give him independence of thought and action, but its pursuit is a medium through which thought and contemplation perpetually flow to the creator of the earth and of its wonderful pro-

ductions. *God is a co-laborer with the agriculturist*—his companion and never-tiring, never-failing friend. The one plants while the other moistens with His showers, and warms with His sun the seed, and makes His earth produce the rich foliage, the beautiful blossom and the hundred fold increase. In all this the latter exacts no share.—He gives all to the husbandman, and is ever ready to repeat and enlarge His beneficent favors.

And where on earth has this great friend of the agriculturalist been more bountiful in His gifts than in these Islands? He has provided a soil and climate for the growth of every thing. The florist may transfer here all the pride and beauty of the northern garden, to vie with the perennial charms of the blooming tropics. The kitchen purveyor may pluck the mango and the orange as he goes through the garden to gather the beets and carrots, the cabbage and Lapland turnip, the cucumber and lettuce, and the bread-fruit and banana for his dinner, while he will not forget the huge melon, the pine apple, and the delicious grape and fig for his dessert. Fields of wheat, barley, oats and corn, producing in quantity, per acre, beyond a parallel, may be seen waving their golden tassels surrounded by fields of sugar cane. The reaper of these fields may rest his limbs and cool his body in the shade of the coffee tree, while he sends the native boy up the lofty, limbless cocoa nut tree for milk to quench his thirst. The yam and the sweet potatoe, without complaining of foreign influence or naturalization laws, or forming “Know Nothing” societies, nestle in their expanding growth in the same soil with the Irish potatoe.

Such, in these Island oases of this desert of waters, has been the favoritism of Providence in providing a soil and climate for the growth of every thing, and in directing the salubrious winds of the ocean to fan perpetually the brow of labor, and bear away upon their wings all miasmatic influences which, in other countries of the same latitude, so generally prey upon health and life. And shall such propitious Providence be answered as the servant of old answered, “*Lord, I went and hid thy talent in the earth: lo, there thou hast that is thine?*”

Not so: bring out the increase a hundred, yea, a thousand fold. Remember the key. Turn it and receive the glorious reward—a reward, the enjoyment of which will not be lessened to you because it will descend to your children doubled in value, and will increase the

numbers of your posterity in the ratio of the present and past decrease of your people. It will plant upon the cheeks of your maidens the rose of health, a reflection of the blushes of which will be a palisade for the protection of virtue, while your young men will rival your chiefs of ancient renown in athletic hardihood, pride and ambition, *and your childrens' children will rise up and call you blessed.*

Turn then this key. Your old folks will love to do it. It will be for them a pastime in the season of their dotage, while your *kamaliis* will be their companions to lighten what then will be a toil, and share what will be of amusement and reward. The ribald song and idle gossip will soon give place to the rustic chorus of the plowboy, and the rural melody of the milk-maid. The herdsmen and shepherds of your thousand hills will radiate the healing virtues of pastoral life upon the surrounding vallies; and the sailor, if he carries disease from your shores, will have to look for its origin in some other country, or in the excessive indulgence of your rich fruits, or in the intoxication caused by the use of *imported* poison. The Sabbath will be a day of rest and worship. The night will be a season of repose and sleep, and every day under this perpetual summer sky, will find here the most happy, as they are the most favored people of the earth.

Rise then and turn this key to your deliverance. Palsied be the hand that has undertaken to write "mene tekell" &c., upon the walls of your nation's palace. Disappoint the evil auguries which float along the wake of your career. Tear down the ensign which streams above the march of your physical being from van to rear, on which is emblazoned the prediction of your sure and early extinction as a race, from causes which add no honor to your name and history. Gladden the hearts of those well tried foreign friends who have so long and earnestly reiterated from the bosoms of their love for you, the doleful ejaculations, "*why will ye die!*" Above all honor and obey that God whose partial bounty has signalized His care and regard for this people, and whose terrible warnings of his displeasure at the ingratitude of his children, cannot always be unheeded with impunity.

Let us take a practical view of this subject. Let us make a working survey, as the Rail Road folks say. I shall be excused for being plain, in treating a subject which is plain. One who was born on the banks of the Connecticut, and who spent his early life among the hills

and valleys of the Green Mountains, where the wealth, intelligence and independence of the farmers show that they have successfully contended against a rugged soil and cold climate; cannot be expected to pronounce a eulogy upon the agriculture or inhabitants of the Sandwich Islands. The surgeon probes the wound which he would heal. The law-maker first considers the evil and then enacts the remedy. The divine pictures to us the serpent in the garden, and then points to the Cross. So let us look at these Islands as they are and have been, and then consider what they should be.

The prosperity of every nation begins with its industrial classes.—No nation can be called wealthy and prosperous, whose masses are poor and indolent—nor intelligent whose children are not provided with schools—nor moral whose matrons and daughters are not the vestals of virtue. How does this young state in these respects? It is now time to try the question. Ignorance should no longer plead against responsibility. Three great nations have long ago sent here specimens of their enterprise, their learning, their arts, their industry, their highest virtue and piety, and perhaps of their worst crimes. These representatives have long mingled, almost daily with this people, while the numerous whalers have semi-annually returned laden with the wealth of their daring enterprise. The stimulant of example to industry, wealth and prosperity, has long been here. *Has it permeated the native masses?* I am happy that I can be spared the pain of answering. Let the road side answer. Let the beautiful, uncultivated valley and plain, the primeval forest, the crumbling adobe walls, the ruins of kalo patches like those who formerly wrought them asleep in the shade; let the untamed bullock, the unshorn flocks, the jaded and mangled horse, the empty market houses, the half nakedness of the people and the idleness of youth, give the pantomimic answer which will be more graphic and impressive, than any opinion of mine.

Let the speeches from the throne, the reports of the Judicial and Cabinet officers of the Government, especially the reports of the distinguished and beloved Chief Justice and Chancellor tell the melancholy story of that vice, the existence and prevalence of which not only tarnishes the fame and reputation of Hawaiian mothers, wives and daughters, but threatens to annihilate their race. I need not say

more upon this subject. They who have eyes to see, and ears to hear may see and hear enough without listening to me.

I will speak upon the subject of Hawaiian school education. The success which has attended the efforts and means of educating youths in the native language, entitles the Government, the teacher and the pupil to praise. If like improvements had been made in the arts, agriculture, manners, industry, and virtues of the people, this day would have witnessed other and grander scenes and ceremonies, called forth other actors and sentiments, and infused greater hope and pride into the bosom of humanity.

As a specimen of the higher order of schools, the one at Lahaina-luna, may be referred to with pride. New England would hardly be able to exhibit from one school eighty boys of better appearance and manners. It would seem as if the influence of such schools would arouse the people from their apathy—would stimulate the pride of Hawaiians to give their name and state a worthier rank among the civilized nations of the earth.

But though success has attended education in the native language, and its consequences have been beneficial to the people, yet measurably it has been a failure in the great object to be effected. To bring up the nation—to preserve and continue the vitality of the race, to give importance and success to the rank and pursuits of the people, and secure the least chance of competition, or even preservation, in the present overwhelming electric career of other nations, *the Hawaiian language must be abandoned*. It will sink all who cling to it.—Their fate will be as the pebbles stirred up by the rushing of the mountain torrent, till sooner or later they will find a lodgment in the bottom, while the rushing waters will roam on burying and concealing all beneath.

The Hawaiian language has no history. It has no literature and never can have. The time will never be when the histories and literature of the world will be translated into this language. Then what is to be done? Are the great lights and guides of other days, and those which now and will hereafter spring up to illumine the vast firmament with philosophic truths, all to be shut out from this people? It must be so if this language is not changed. It has no windows through which to look from its solitary confinement, upon the wisdom of past

and passing time. The great nations of the civilized world are rapidly advancing in the improvements of the arts, the discoveries and developments of science, and in correct theories of the government of man. A great nation in its rapid strides to wealth, prosperity and power, has just now visited yonder shore, and is exhibiting its wonderful progress. It carries triumph wherever it goes—not of force or fraud, but of the arts of independence, of enterprise, of reason and right, appealing to the mind of man. Already its language and principles of law and Government have sought these Islands, and indeed are planted here. Its language is employed as the medium of legislative mandates and of judicial construction and authority. Its use is becoming familiar, if not necessary to all the organs of power, and in all the transactions of important business affairs. Having got such a permanency, will this language die? Rather will it daily increase in its influence and use, and finally control the destinies of this people? *It most certainly must*, and those who ignore it will sink under its extending power. Those who adopt it will be embraced in the ranks of its enterprising masters, and will at once enter for improvement into the vast libraries and laboratories of human knowledge. The present in this respect brings up that “tide in the affairs of men” which is destined to “lead on to fortune,” and “leave not a wreck behind” of those over whom it rolls.

Let me now propose and consider what should be done for the interests and upbuilding of this young state. Too great importance cannot be attached to a system of common schools. Let every Island be divided into school districts, required to have a local superintendent, whose duty it shall be to have an open school a fixed proportion of time, in which shall be taught the English language and nothing else. Let all other practicable means be used to encourage and promote the general use of this language.

Two great desiderata which have here long occupied the earnest attention of public men and philanthropists, are the promotion of sexual virtue, and the industry of the people.

In relation to the former, I doubt the efficacy of *intense* legislation in promoting the object. These are crimes of which it has with truth been said, they are so revolting to our feelings that legislating against them, is of itself an evil, for it presumes, what would not otherwise

be presumed, their commission, There is danger in this case that legislation will be carried so far as to create a public impression of almost a total disregard of this virtue, and the sense of modesty, pride and decorum, which should be the higher law upon this subject, will be blunted if not destroyed.

The great remedy for this, and many other evils, will be found in the successful promotion of the other object—the industry of the people. Here is the field for labor. Here should be combined and concentrated all remedial efforts.

Though the saying, that idleness is the parent of mischief, is stated as a truism, it cannot be too often considered. It is the seminary of almost every vice. Its pupils and votaries go on from branch to branch until they graduate in grog shops, gambling and other vicious houses, in hospitals, in prisons and on the gallows. Who can tell what a world of sin and suffering might have been avoided, if our mother Eve had been included jointly with Adam, in the command to “keep and dress the garden.” Any industrious employment might have removed and protected her from the low temptation of the serpent. Being idle she listened; listening she yielded; yielding, the womb of Time, and perhaps the ages of Eternity, were made to inflict and perpetuate upon her unoffending race, the punishment of her disobedience.

O Industry! How can its blessings be too highly valued? Its sweat is the dew of health. Its bread is ever a feast to the body.—No dreams but those of delight disturb its healthful sleep. Its offsprings are a happy heart, a healthy appetite, a downy pillow. Its rewards are wealth, long life and all the fruits of virtue.

To promote industry, the great panacea in these Islands, agriculture must be brought up. Instead of there being one society, and that here for all the Islands; each Island should either have a branch or an independent society; and should hold annual Fairs at home. Perhaps it would be best to have an Agricultural Congress of Representatives from all the Island Societies, held here annually immediately after the Fairs in the several Islands. The details and minutia I will not go into. But it must be apparent that a general interest can be awakened only by stimulating and encouraging the people at their homes, and by giving them convenient opportunities to exhibit their productions, and compete for premiums and rewards.

The Government should move in this matter. To encourage the creation of a fund to be devoted to premiums, Government should appropriate an amount equal to what individuals in each Island raise for the same purpose. It should establish also, at least for the present, a system of bounties to be offered and given for the production of certain agricultural articles, the encouragement of which will be beneficial to the interests of the state in respect to exports, and a home market. For instance the articles of wheat, sugar, coffee, wool, tobacco, corn and all other grains, salted beef and pork and such articles as oranges bananas and other fruits and vegetables, which are raised *and actually exported* or *furnished for export*, should be considered by the Government with reference to the question of bounty.

Instead of prohibiting the manufacture of wine from the grape, as was the case till quite recently, I am of opinion it should be encouraged by the Government. I am clearly of opinion that the least amount of drunkenness exists in wine producing countries, yet I forbear on this occasion going into facts and statistics to prove it. I however will say that I limit my remarks to the rural districts and do not include the large commercial places in those countries. For example the city of Paris consumes a vast amount of distilled liquors, and consequently has a vast amount of drunkenness; while the interior, or rural districts where the wine is produced consume but little distilled drinks and consequently have but little intoxication or crime arising from intoxication.

There are very considerable parts of these Islands admirably calculated for the production of the grape. The soil is the right kind. The vine produces in size, weight and quantity of fruit so abundantly as to be hardly equalled in the world. The climate at the time the fruit ripens and is gathered, is uniformly dry, and consequently the great damage and loss by rains on the ripened fruit which are more or less suffered in other countries, can never occur here.

Why should not the Grape culture be immediately commenced for the purpose of supplying your own market with what wine it requires, and excluding importations, and for the purpose of exporting the grape and the wine? Of the wine produced, there would undoubtedly be drank here a proportion. What would be the effect? The great

evil arising from the drinking of wine, or other liquors is intoxication. If therefore the amount drank is larger but the intoxication less, the evil is diminished. Who can doubt that ten times the quantity of the pure juice of the grape can be drank without producing the intoxication and delirium which are produced from the quantity now drank of the miserable poisonous compounds in use? The best wines which are imported and used here, probably contain more than one fifth alcohol, or something, as a substitute, worse. While the use of these poisonous compounds inflames a thirst for a repetition of the dose, the unadulterated juice of the grape, if it stimulates or even intoxicates, does not leave that stinging poisoned thirst behind, which leads the victim to that delirium, the only cure of which, is its own horrid conquest of life.

I would not encourage or justify the use, as a beverage, of pure wine or pure alcohol. But I may properly compare the evils of such with the evils of tobacco-beer, or, what is little better, imported liquors and wines. While the former exhilarates, the latter stupefies and destroys. The effect of one is like an elastic material which will stretch and return to its original place. The other will expand, and in doing so loses its power to return. The one like steel will spring back to its place. The other like iron remains fixed as it is bent. The one prepares the sight to transform the twinkling stars into suns and moons with multiplied numbers, the other will have nothing seen there but a chaos firmament lighted only by the gleam of demon figures. The one produces a fool with lucid intervals, the other a maniac with only brute intervals.

I insist that the greatest obstacle to temperance and the greatest cause of intemperance, is not in the amount of alcoholic and fermented liquors drank, but in the poisonous ingredients with which they are alloyed. Will any one therefore deny me that the manufacture of pure home wine which will need no alcohol for its preservation, will do the great good of very soon preventing the importation and manufacture of the vile drinks which are now so much used here? I think not; and I feel certain that in such event, intoxication will be lessened. Then let the government favor this home industrial pursuit and guard by strict laws against all abuses of the privilege.

Another question is, will the people go into the business? I think

of all others it is *the* business they will go into, and the business which will establish industrious habits in those districts where it is carried on. My reasons are, that the grape growing needs no capital—soon yields its fruit after being planted, and undoubtedly with more profit on the amount of labor expended, than any other production. Every vineyard may not have a wine press. Every vine will produce in the grape a marketable article. There will be no want of small capital to invest in manufacturing the wine. One man will make the wine, from grapes raised by twenty others. He will pay a fixed price for the grape, so that it will at all times command a staple price. This is the great thing wanted. The native raises nothing now which has any fixed certain value, except perhaps in this town. If his melon gets ripe on Saturday he may sell it for three reals, if not till Monday he may need two to get *one* real. So of almost every thing used by foreigners. There is no reliable market. Even potatoes the great article for whale ships, one month may sell in the districts where they are raised for two and three dollars. The next month when the ships are gone, they will be down to half a dollar. No wonder the native is discouraged from investing his labor in so uncertain a reward, and drops back into indolence by the side of his calabash of poi. Let him know, as he will, when he plants and when he trims his vine, that he will certainly in due time, receive a remunerating price for his labor, and I doubt not that very soon, every humble homestead will be nothing but a grape arbor, under which habits of industry will betoken a happy change in the domestic circle.

I will not dwell longer upon this subject, although I should like to demonstrate, that large profits would be derived from the grape culture,—that both in the grape and in the wine, principally in the latter, export articles would be produced, which in a short time would exceed in value, probably, all other exports of the Islands, and that consequently government, in its present condition, is more interested in this production than all others. I congratulate the people upon the fact, that an effort is now being made by a gentleman, who has recently arrived from the coast with several thousand slips of foreign grapes to introduce and extend their cultivation here,—an operation

and investment which I consider more important to the future prosperity of the Sandwich Islands, than if every slip were a slug.

Whose eye is upward turned and fixed,
His feet lag not in the ascent.

Whether the culture of the grape, sugar, coffee, wheat or anything else is most desirable for the prosperity of the people, there needs a fixed purpose and will in the undertaking. As I have before represented, nature waits for the co-operation of man to send forth from the earth, in these Islands almost every vegetable abundantly. She will not do *all* the work alone.

If agriculture has produced the greatest degree of wealth and prosperity in other countries, it offers higher here. Nothing but energy and labor have been wanting, nothing else is now wanting, to give to these Islands pre-eminent success in all branches of agriculture.

The New Orleans sugar planter could realize a greater profit on an investment here, than in the bottom lands of Louisiana. "What and pay thirty per cent on sugar exported to the coast?" I shall be asked. I have no doubt of it, and those who have gone into the business here, and who complain of hard times, by taking into consideration the yield of sugar per acre, the labor and risk of planting the cane every season in Louisiana, the certainties and uncertainties and the expense of the crop, and the prices current on the two coasts of the American Continent, will be compelled to admit the fact.

I say the same of the coffee planter in the West Indies in relation to an investment in his business here.

And how is it in relation to raising wheat here? In Ohio, Michigan and Illinois an average yield of wheat is but little over fifteen bushels per acre. The farmers on East Maui look for over thirty. They always expect twenty-five, and are sure of over twenty. The average price of flour in New York and Boston, good and bad for a series of years, it is estimated will not exceed six dollars per barrel, and yet those western farmers who supply those cities get wealthy. What a picture it is, which shows us on this day contributing to that wealth, by eating their flour, while the land is cheap and idle, and the labor unemployed which should be employed, and would be rewarded by almost double the quantity of wheat per acre, and more than double the

price of flour per barrel. Add to this, that the farmer here has almost double the time in the year to work his crop and land. His team costs him comparatively little or nothing, and the keeping really nothing. Those western farmers, as they are called on the Atlantic, more or less bread the world. *We* do not bread ourselves.

The farmers of New England raise beef by pasturing their cattle in the summer, and raising hay, grain and vegetables to feed them with in barns and stables during the four, five or six months of winter. They drive their cattle, when raised and fatted, to Boston market where the beef is salted. That same beef is disposed of to feed eight thousand men, now and constantly engaged in taking whales in and about this ocean, consuming thirty-six barrels of beef every day, or thirteen thousand barrels every year, while here in the very highway to the whale ground—yea almost in the centre of the flurry of the occupation, where the whalemén come up from their contests in the deep, as it were, to *spout* twice a year, is a group of Islands, containing in their luxuriant hills and vales, plenty of tame and wild cattle, raised and fatted without the care of man, which ought to supply and feed these eight thousand whalemén, or a great part of them, with the best beef in the world every day in the year.

I have seen four quarters of a bullock hanging in a butcher's shop in the port where I am stopping, which weighed fourteen hundred pounds, and this was no uncommon sight in that shop, yet if those quarters were hung in Boston or New York markets, their richness would have attracted the notice, if not wonder, of every butcher and drover who should see them. It is estimated there are now from 12 to 15 thousand bullock who have no owner, fattening on the hills of the Island of Hawaii, hundreds of which no doubt would furnish handsomer beef than that just spoken of. But it matters not whether the cattle are tame or wild, the tame ones cost but little more, and yet the beef which is raised and fattened upon the toil of man, in the cold climes, far off on the shores of the Atlantic, is brought here, at great expense, to supply our market.

In New York and New England, where the expense of feeding cows is greater than any other stock, the farmer is content to get in one year and another, on an average a real a pound for butter. We pay here anywhere from half a dollar and upwards per pound for Island

butter, while the cows (and they are numerous every where,) which supply the material for it, never desired or had a mouthful of food from the hand or enclosure of man.

So I might go on multiplying comparisons of the cost and price of the long list of agricultural productions of the two countries, which would not materially vary the pictures I have already given. How would the pictures look, if in the centre of each group I should finish the comparisons, by a picture representing the moral, intellectual, pecuniary and physical conditions of the farmers of New York and New England, and on the other hand of the people of the Hawaiian Kingdom. I will leave this part of the picture to be drawn at some future time, when I hope its truthfulness will more redound to the honor of *this people*, and manifest the great good and usefulness of this society.

It is however, proper for me to say that the farmers of the United States, with all their hardships of soil and climate, realizing not half the compensation for agricultural labor, which could be realized here are, as a class, the most independent, intelligent and happy people on this great globe. I make this statement, not for any invidious distinction, nor a vain boast of excellence in my countrymen, but to inspire energy, ambition and industry in those more favored in position and natural advantages.

If it is said that capital is wanted, I reply that generally in agricultural pursuits, labor is capital, and of that there is no want. Energy and industry will bring this out. Foreigners who have invested in the larger operations of raising sugar, coffee, wheat, &c., will be encouraged to continue, and others will be encouraged to join them, if there is on the part of the natives a corresponding energy, industry and spirit of encouragement. The foreigner to make headway in these operations needs the co-operation of the native power in other branches and pursuits, and in legislative protection and encouragement. But let the dormant energies of the people be waked up,—let the key which I have often referred to be turned, and you will unlock treasures of gold—an abundance of capital.

To the natives I appeal as possessing this power. You hold most of the lands in the fields and in the town. You control the Legislature of the state. You have the numbers and the physical power. It is understood you are unwilling to put your ship of state under

convoy with the great fleet of the American Continent, now sailing by on its rapid way to power and glory.

You choose to manage your affairs your own way. Therefore you take the responsibility, and at this enlightened day, with such resources as are under your control, *this responsibility is great*. The civilized world has a moral claim upon you which can be satisfied only by your unlocking these resources. *They must be unlocked!* Nature, confined in the cerements of your rich soil, and under the fructifying rays of this tropic sun, is ready to burst her bonds. Art stands ready to lend a hand; Time will not much longer wait for you; the foreigner is amongst you, and offers his purse and his palm for the toil. The celebration of this day, the history and work of this society, and the improvements of other foreigners in the Islands, show you how much the foreigner has done to promote the object. I leave you to point out what else has been done in the matter of improvement of your soil.

Your physical, moral and national being now depend upon your action. Rise, therefore, like the strong man from his sleep, and go forth to the delightful work of improving the soil till it shall be *what it can be, what it must be*,—the land of rich fields and farms, of flowers, of fruits, of beautiful groves and trees, *of wealth and happiness*.

I can have no other hope than that this destiny may be soon worked out, and no other wish than that this people, with whom I am pleasantly sojourning, may work it out. In all of these beautiful isles, where the flowering spring and the mellow autumn are twined in one perpetual embrace, with combined locks flowing to the never-dying breath of Ocean's winds, I would have every man—no matter of what hue, or tongue, or origin—a PATRIOT BRAVE, an INTELLECTUAL CHIEF, an AGRICULTURAL KING!

REPORT ON THE SWEET POTATOE, (*Convolvulus Batata*.)

By T. C. B. ROOKE.

By an omission, which I think might be remedied, I was in ignorance, like others on other subjects, that I had been appointed on this Committee until the proceedings of last year were published and sent

me. If previously informed I trust that I could have prepared an article more worthy of your attention.

Simple as the subject for the report of this Committee appears to be, it is one on which much time and research may be expended by the curious, and more extensive and amusing than many would suppose, if their attention has not been previously attracted to the subject.

In former times, when these isolated Islanders had few objects to attract their attention beside their clanish wars, all observations of the phenomena of nature were minutely and carefully noted. The greater part of these observations are now nearly forgotten, or only remembered by the few survivors of the olden time, and still existing metrical legends. But although long neglected, it is astonishing to witness with what eagerness and vigor of memory these subjects are discoursed on with any one who will enter their humble habitations, adapt himself to their simple manners and language, and lead the conversation to the subject on which he wishes to gain information.

Among other familiar subjects formerly observed with the most careful minuteness were Botany and Astronomy, but of which the mass are now entirely ignorant; and the remnants of the knowledge once common, is now only preserved among a few old fishermen and farmers, while the appreciation of dollars and cents is in the ascendant.

Under the head of botanical or horticultural observations, were those bestowed on the culture of the numerous varieties of the sweet potatoe or *uala*. It was, next to the *kalo*, the staple food of the inhabitants, and in the culture of the different varieties, their nice distinctions were carefully marked, for while they had an overflowing population, these observations became a subject of vital importance. An ordinary botanist would hardly draw a line between the several varieties as marked by the aborigines; but by my own observation, I know that they are perfectly distinct, and propagate a similar variety when transplanted into different localities. The variations are as marked as those of dahlias, geraniums or tulips. It was of material consequence to notice which kind was the most profitable produce in different regions, aspects and soils.

I have endeavored to collect a list of a few varieties of the indigenous kinds, not noticing any of those recently imported since the

discovery of the Islands by Capt. Cook, with a tabular description of them. Generally the antiquity of these varieties is established by the tales or legends connected with their names; and in some instances, the very localities they are derived from are mentioned.

My attention was first called to this subject in 1840, when on an excursion to Waianae on this Island, in company with that most respected clergyman, the Rev. A. Bishop. An old inhabitant there enumerated to me thirty-two varieties with which he was acquainted. I scarcely believed him at the time, but shortly after my return I had more than twenty of them growing at Waolani; and have since procured (in 1849) some very fine plants of other varieties from Kalau-papa, on the Island of Molokai, and others from the Island of Niihau, since which time I have not paid any attention to the subject.

In submitting the following list, which is arranged alphabetically, I will remark that some of the varieties have different names on the various islands of the group; I have, therefore, been careful to confine myself to the names known on the Island of Oahu—and there even they have sometimes two or more names for the same variety, although synonymous, as for instance, *Haulilani*, (fallen from heaven,) is also called *Helelei*, (scattered, as in a shower,) &c.

The legends attached to some of the names are amusing, but often indecent, as most legends among the lower classes are. I will endeavor to mention some of the best known varieties, but there are many others with which I am unacquainted.

NAME.	Exterior.	Interior.	Leaf and stalk.	Root.	Observations.
Apo,	Dark,	Red'ish,	Purple,	Firm,	Moist soils.
Awapuhi,	"	White,	Divided, purple,	Hard,	Wild, very small.
Auono,	White,	"	Green, undivided,		Anywhere.
Eepuu,	"	"	" divided,		Kula lands.
Okohola,	Dark,	Yellow,	Divided, dark,	Firm,	
Ulu,	Purple,	White,	" purpleish,		
Huamoa,	White,	Yellow,	Undivided, round,	Firm,	Anywhere.
Helapa,	"	"	Divi'd, light green,		Valleys and plains,
Hualilili,	Yellow,	White,	" green,	Hard,	Kula lands, very
Heenuau,	"	"	Undivided, green,	Firm,	Rich soil. [sweet.
Helelei,	"	"	" dark,	Soft,	Stony ground.
Heakeziule,	White,	Yellow,	Round, green,	Hard,	Anywhere.
Hoolulelule,	"	"	Divided, "	Soft,	"
Heunaheuhū,	Yellow,	White,	Undivided "	Very hard,	"
Hepaa,	White,	"	Divided, "	Hard,	Rich soil.
Hawaii,	Dark,	Dark,	" dark,	"	Light soil.
Halonaiipu,	"	Yellow,	" "	Firm,	"
Hookeo,	"	White,	" "	"	"
Kekake,	Purple,	"	" "	Hard,	Kula lands.
Kihipoipoi,	Yellow,	"	Undivided, green,	"	"
Kihilumanamana,	"	"	Divi'd, light green,	"	" keeps well.
Kipawale,	Red'ish,	"	Undivided, "	Firm,	Rich Soil.
Kekawowo,	"	"	Divided, dark,	"	"
Koali,	White,	"	Undivided, "	Hard,	Stony ground, long vines, hardy.
Knukaele,	Yellow,	"	Divided, spotted,	Firm,	Anywhere.
Kekoha,	White,	"	Undivided, green,	Soft,	Cultivated ground.
Kuunahawela,	"	Yellow,	" light "	Firm,	Anywhere.
Kalakeokeo,	Red'ish,	White,	Divided "	"	Taro patch banks.
Kawelo,	Orange,	"	"	Not good,	Anywhere.
Kawao,	Dark,	"	" purpleish,	Hard,	
Kekakeelele,	"	"	" "		Good soil, very
Koumi,	"	"	" dark,	Soft,	" " [large.
Kekokoakeawe,	Light,	Dark,	" purple,		" good for
Kanika,	Dark,	"	" dark,	Floury,	Light soil. [poi.
Laholā,	Orange,	White,	Undivided, "	Soft,	Anywhere.
Lihilihipalu,					
Laholile,	Dark,	Dark,	" "	Floury,	Good soil.
Likolehun,	"	Red'ish,	Divi'd, dark green,	"	"
Lilimolina,	"	Dark,	" "	Firm,	Light soil.
Maunapohaku,	"	Red'ish,	" "	Hard,	Moist places.
Nukulehu,	"	White,	" purpleish,	Floury,	Good soil.
Pauu,	White,	"	" dark,	Firm,	Large, knobby, hog
Puhi,					[food.
Paiowea,	Dark,	Orange,	" "	Hard,	Light soil.
Palama,	"	"	" "	Firm,	
Palaknia,	"	Dark,	" "	"	
Waipalupalu,	Yellow,	White,	Undivided, "	Soft,	Anywhere, foreign-
Wailaulau,	White,	"	" "	Hard,	[ers' favorite.
Wehiwa,	Dark,	"	Divided, "	Firm,	Good soil, large.
Uahiapale,	"	Dark,	" "		

The mode of propagation in use with the natives is similar to that of the cabbage—from slips taken from the strong thriving plant. The nasturtium is also propagated in the same way; the slips or portions of the vine are set out by threes or fours in a hill. The cultivation, when the plough is not employed, is that of holeing and hilling. Sometimes the hills are covered with small pieces of lava, which not only prevents evaporation, but defends the roots from the attacks of poultry, &c. After this, if ordinary care is bestowed on the soil, they will generally return two or three crops within eight months. Of course the first crop is the best, but the second is often good. They are respectively called the *uhai*, 2d the *kuapue*, and the 3d the *kalina*.

Of their nutritious qualities little need be said. The quantity of saccharine matter contained in them, vouches for it. When baked in the native manner, and made into poi, it forms a light, nutritive and delicious repast for those who use it, unaccompanied with the replete sensation occurring after a meal of the same article prepared from *kalo*. When left for a time to ferment slightly, it is light and exhilarating; but a still longer time of fermentation, renders it intoxicating. It is much to be regretted that in some districts, I may say the whole of some districts, the entire crop is perverted from its proper use, and dedicated, not to Ceres, but to Bacchus, as the statements made by the Honorable member for Ewa, during the late session of the Legislature, will tend to prove. This is a cause of much regret to all those who have the welfare of the native race at heart. It appears to be one of those irremediable evils, which, if overcome at all, can only be done by instilling a moral sense of the disreputability of such conduct into the aborigines.

The sweet potatoe, although an article of food, is not without its medicinal qualities; and there are many of those who are afflicted with an obstinate costive habit, who are relieved by a dietetic use of this valuable vegetable. If viewed as an article of profit, I think I may say that no vegetable cultivated on this group yields a larger produce, provided that the ordinary care of loosening the soil and keeping it well weeded is observed; and we always have a demand for the supply of foreign markets and for shipping, larger than we are able to meet, and the crops may be so managed that they may be mature when the demand is greatest.

The only diseases with which I am acquainted that are any drawback to its cultivation, are a blight called by the natives *makika*, and another called *poonalu*; and its only enemies are the caterpillar and grub, which, as cultivation extends, will gradually disappear.

REPORT ON SEEDS.

By J. MONTGOMERY.

There is, perhaps, no branch of the interesting and important science of agriculture more important or more interesting than seeds; and the many phases in which it presents itself to the mind, would furnish material for a much more elaborate and lengthy essay than would be appropriate for this occasion. We presume the more practical and the less speculative a report on this subject can be made, it will be the more appropriate and acceptable.

We shall not, therefore, enter upon the interesting subject of the various changes which the seed undergoes in the process of germination and formation of the embryo plants, but proceed to a consideration of some of the more important practical details in connexion with its growth and progress to maturity.

The reproduction of plants in successful seasons is effected in various ways, the chief of which is by seeds, by which a vast majority of them are propagated. It will not be, therefore, out of place here to point out to your consideration some of the more important conditions requisite to secure success in this most important branch of agriculture.

In the first place, plants from which it is intended to save seeds for future sowing, ought to be always carefully examined, so as to ascertain that they are the best and most genuine of their sort, and free from all risk of intermixture of the pollen or fecundating agent of other plants of the same class, which always produce hybrids or mongrels of mixed, impure, and of course, inferior quality. Of the truth of this proposition, abundant evidence is furnished by the every day experience of us all, as the miserable melons with which our market is daily supplied by natives, and which, by the process of intermixture I have alluded to, have now become a mixture of the original melon

and the squash, pumpkin and cucumber, so that it is too frequently difficult to decide which of them has imparted most of its qualities to degenerate offspring of respectable ancestors, which, with a little care, might have been made to preserve the original good qualities of the fruit from which it has sprung.

Similar evil consequences always result from similar causes in other departments, although not always so palpably manifest to our senses, and a little investigation into the important subject will soon prove to the satisfaction of the enquirer, that no department of agriculture or horticulture will better or more amply repay the care and attention bestowed upon it, than a careful separation of plants of the same class from which it is intended to propagate seeds for future crops, and a careful selection of the best plants reserved for seed.

It may be objected to what we have said, that in this country the almost total absence of bees and other insects which elsewhere convey the pollen from plant to plant, render these precautions unnecessary, but to such we would reply that in point of fact, there are some bees and abundance of moths, ants, and other insects, which achieve the work with considerable efficacy; and moreover, that of late, and I think since the last meeting of this society, there have arrived among us a colony of wasps, which have already propagated themselves to a vast extent, and which are constantly to be seen penetrating the flowers of all plants in search of food, and which, of course, are a more efficient medium of conveying the fecundating principle than any we have yet had here. They threaten to be of serious injury to fruits of all kinds, as is manifested by my papayas, which are now for the first time perforated and excavated by these pests of society.

The facility with which genuine seeds, when ascertained to be genuine, can be propagated, as well as the large per centage of profit which their careful selection yields to the farmer, are subjects well worthy of his grave consideration. The former is well illustrated by Mr. Sherrieff, one of the most eminent and successful of the far-famed East Lothian farmers, who having remarked one particularly vigorous and fine plant of wheat in one of his extensive fields, marked it out, and carefully collected 63 ears, which yielded 2,478 full pickles of superior grain, which he carefully sowed apart from all risk of con-

tamination, and cultivated with equal care, and in the fourth year the produce was 40 quarters of splendid grain.

In like manner he selected a superior Swedish Turnip, the produce from the seed of which, on the third year, would have sufficed to supply seed for the entire of the British market.

Mr. Sherrieff calculated that the increased yield of his crops from the seed so carefully collected and propagated, exceeded 10 per cent.

The next condition requisite to the production of good seed, and the propagation of good crops from it, is, that the plant from which the seed is to be saved shall have arrived to a perfect and healthy maturity, and that the seed should be fully ripened and matured.

Seeds which have not reached maturity may indeed still possess the power of germinating, but the young plant produced from them will be sickly and feeble, and retain a disposition to decrease, and there is great danger that it will entirely perish, and even if it survive, it is pretty certain to yield a small crop of inferior quality.

The preservation of seeds after they have been matured and collected is another important consideration. After being gathered, seeds should be carefully dried before being put away, and not only ought the moisture inherent in the seeds, but also such as they may have absorbed, if possible, to be extracted from them, otherwise we shall run the risk of having the seeds heating or undergoing the first process of germination, to which moisture is the chief agent. Spreading seeds to dry, and frequent turnings are of much value in thoroughly freeing them from moisture, and when so dried, they ought to be carefully stored, and so far as possible secured against all access to damp. It would be superfluous to demonstrate to this intelligent body, that heated seeds are deteriorated in quality, and that to use them for raising future crops would be little better than labor lost.

Some kinds of seeds retain their germinating powers with wonderful tenacity, and will withstand cruel treatment which would be totally destructive to others; and some are of so delicate a nature that all the attempts heretofore made have failed to carry them to our shores in a sound state. All of us, I presume, have experienced the sad disappointments to which I have myself been a frequent victim, in importing large numbers of seeds most desirable to cultivate here, but of which only a very small proportion retain their vital powers on arrival.

This leads us to the consideration of the question—the importance of which in this remote land can hardly be exaggerated—How is this difficulty to be overcome, and what is the best method of preparing and transporting seeds to distant lands, and the extensive ranges and changes of temperature?

Many experiments have been tried and suggestions made on this point, and all who have discussed the subject concur in one point, viz: that all seeds intended for transport ought to be fully ripened and carefully dried before packing.

Of the various plans of packing seeds adopted by all experimenters, perhaps as successful as any other has been the plan of placing them in layers in sand very carefully dried, and all enclosed in airtight cases, by which means their germinating powers have been retained for long periods and through great varieties of temperature. Charred saw dust has also proved a good medium. The charring is necessary to destroy all insect larvæ and eggs, as well as to dispel the moisture.

Oleaginous and juicy seeds which are liable to become soon rancid are most difficult of transport. These must be packed separate from each other, and some will carry best in their own seed pods. One method has been tried which has proved commonly successful, viz:—covering the seeds with a solution of Gum Arabic, which, when dry, forms a firm and impervious coat of varnish, which effectually excludes the air as well as moisture, without the presence of which the seeds can undergo no deleterious change. This plan has been perfectly successful in saving eggs for many months, if applied while the egg is yet warm, and before the atmosphere has penetrated the shell, by the cooling and collapse of its contents, and there is every reason to suppose that it would be equally efficacious in the saving of seeds, certainly not more perishable than eggs.

The subject being of the greatest possible importance to the society and to the public of these Islands, we would strongly recommend it to their serious and attentive consideration.

We are not aware that, during the past year, much of novelty has been achieved in the introduction of new and valuable seeds, but we are informed that an important fact has been ascertained by Mr. Townsend, who has, we learn, succeeded at length in producing seed

from the sugar cane, long found impracticable here. His success in this department ought to, and we hope will, prove a stimulus to others to go and do likewise.

REPORT ON BIRDS, BEES, INSECTS AND WORMS,

By J. W. MARSH.

To the President and Members of the R. H. Agricultural Society, for the year 1855:

Your Committee would respectfully report, that with regard to insects and worms, although they have made some observations and many inquiries, they have not received sufficient new information of the habits or habitats of any one species, or of the best modes of destroying such as are injurious, to warrant them in occupying your attention therewith. Their observations and theories require much farther verification than they have yet received to be at all reliable. The most satisfactory information the Committee have met with, is already contained in the "Report on Worms and other vermin injurious to vegetation," made to this Society in the year 1852, by Dr. Newcomb.

It is evident that we need much more systematic and careful observation of our worms and insects before we can be in possession of the data requisite for opening an effective campaign against them. It will be of little use to declare a war of extermination, and marshal our forces, till we know something of the retreats and modes of warfare of the enemy. Your Committee, therefore, would respectfully recommend that each member of this Society consider himself a special committee of one for the observation and study of the habits, habitats and metamorphoses of such insects, worms and other vermin as may fall in his way.

It is, however, obvious to remark, that while the number and variety of injurious animals of these classes, is constantly augmented by fresh supplies from abroad, the insectivorous and vermivorous reptiles, insects, and birds by no means increase in a like ratio, and will not, unless special pains are taken to introduce them. The plant devouring

worms, have in the economy of nature, a great purpose to subserve, in effecting the interchange of elements in the soil requisite for its best preparation for the uses of man. Against an excess of them, nature has herself, in countries designed for human habitation, provided a remedy in the admirable self-compensating machinery of the animal kingdom, the different parts of which, so beautifully check and balance each other, while all work together to the preparation of the earth for human use; the whole giving way to civilized and cultivated man, as he acquires the wisdom and the art to assert his supremacy, and take his proper position. This group of Islands seems to have been upheaved from its Plutonic and Neptunic birth-place in some of the last expiring struggles between Old Chaos* and Dame Nature's cosmic forces, and not to have been designed for the residence of man, at least till after the expiration of thousands of geologic years, yet in the future. It is not strange therefore, that we find here, along with a small supply of soil, amid an abundance of its crude material also a superabundance of worms and a scarcity of birds and beasts.

If, nevertheless, with our spirit of unrivalled daring, gathered from Gallic vivacity, Teutonic perseverance, and Anglo Saxon energy, tempered together by an infusion of Hawaiian *nonchalance*, we are *determined* to force nature up to our time, instead of waiting for hers; if we *will* and *must* make the lava bloom, and the desert blossom, in spite of nature, worm and insect, we must at least submit to the policy of overcoming nature by nature.

We cannot at present, except in a few and small localities, exterminate the grubs by careful and thorough culture which is the humane and effectual mode of disposing of them, but we can hold them in check and diminish their numbers, by cherishing such reptiles, insects, birds and quadrupeds as are already our allies, and by introducing others to co-operate with them.

The dragon-flies, spiders, lizards and some other insects and reptiles already do good service in destroying flies and moths, and should be protected. Of the toads and frogs which elsewhere afford such valuable assistance to the gardener and farmer, we have none. The importation of them might well deserve the attention of this Society,

* It is not intended here to soberly recognize the reality of that most irrational figment of the human understanding.

not only for the insects they would devour, but for the addition they would make to our supplies of music and of food.

The hedgehog would confer the two fold benefit of destroying vermin, and occasionally pricking the noses of Hawaiian curs. The different species of moles, also, while engaged in a philosophic pursuit of grubs and larvæ would supply a stimulus to industry for Hawaiian youth, excite them to skill in the noble art of digging, and prepare them for profitable toil in California. Such benefits would certainly more than counterbalance the damage from occasional perforations of kuaonas, and the draining of kalo patches.

Some species of snakes are very destructive to insects and terrestrial mollusks, and the Committee would earnestly recommend their introduction—did they not stand in awe of St. Patrick and the ladies.

Of native Hawaiian birds there are supposed to be some fifty different species, but in the absence of information regarding their habits, and even a catalogue of the species, we cannot well determine which of them are most beneficial to the agriculturist—though the Kolea or Plover must hold a prominent place.

Scientific visitors from abroad who have obtained information regarding Hawaiian Ornithology, appear to have, for the most part, sedulously carried it away with them. A collection of Hawaiian birds here, with information respecting their habits, and a record of the introduction of new species, is still a desideratum. A large proportion of the native species, however, belong to the family of honey eaters and accomplish comparatively little in the destruction of the insects that trouble the farmer.

On the coast, in Oregon, California and farther south, there are many species of the Finch family and of the Fly catchers, which could probably be introduced at a small expense and which would be of not a little service, while they would do no harm to fruit or grain.

Many of the thrushes would be very useful, while some of them are excellent songsters. The American and Chinese mocking birds would probably be preferable as musicians even to the frogs above mentioned.

The California quail has been introduced, and is said to be increasing rapidly on the other side of this Island, to the advantage both of the sportsman and the farmer.

The Committee are aware that this, the feathered department of their subject, opens up a wide and interesting field for discussion, but into it they do not dare to venture fully. Though the topic is light and airy, such a discussion would probably prove more wearisome to members than even a bird-hunt on the Waianae mountains. There is truth also in the statement that "any subject is *inexhaustible* when fully treated of, that is, when treated doctrinally and practically, analytically and synthetically, historically and morally, critically, popularly and eloquently, exegetically and esthetically, logically; neologically; etymologically, archaiologically, or, summing up all in one, doctor-ologically." Such full treatment, therefore, the Committee decline, finding a satisfaction in the reflection that their successors will have abundant room for fresh investigation and for—manuscript.

Respecting bees, the Committee have to say that they have not seen or heard of any of those interesting creatures for some time, nor anything more nearly resembling them than the wasps which have lately so multiplied among us. Believers in the theory of equivocal generation may fancy that these latter, demi-savages as they are, will, in our genial climate develope into the more civilised and civil bee. Your Committee are of opinion that they will *not*.

If we wish real, *bona-fide*, working, honey-bees, we must continue to import them.

While on the subject of bees, the Committee cannot forbear commending the character of that virtuous and industrious insect, to the consideration of the several members of this society when next engaged in the preparation of Annual Reports.

In conclusion, it should be stated, that of the five members of this Committee, two have within the last year gone to the United States, "leaving not a report behind," a third regrets that he is unable to communicate anything of value, fourth intimates that he is not a member of the society and does not wish to be—while the fifth pleads guilty to a very general and particular ignorance on all the given topics, protests that he did not know of his appointment till the eleventh hour, and declares that he can't and won't write a report. The Committee, therefore, have no report to offer.

Respectfully submitted.

REPORT OF COMMITTEE ON KALO AND GARDEN
VEGETABLES.

By A. B. BATES.

To the President of the Agricultural Society:

Charged with James Makee, Z. Kaauiwai, A. Adams, and Wm. Ap Jones, as a Committee on "Kalo and Garden Vegetables" with the duty of reporting to the Society, the undersigned, without having had an opportunity to confer with any of his associates, would respectfully submit the following observations.

The Kalo, or Taro Plant, so well known to all who are familiar with the diet of the Native Race, has attracted the attention of the casual observer, and its use and culture have been a fruitful subject for the traveler, and all who stand in dread of deleterious miasmas, without any knowledge of the culture of the plant, to comment upon. Descriptions of its form and use, are so often attempted by scribblers for the public press, and the "patches" in which it is grown having been so frequently delineated and denounced, they merit no especial notice of the Society.

While it is acknowledged to be the staple food of nine tenths of the population of the Islands, it matters not whether it merits the praise or condemnation of the few. If properly cultivated and cooked, it is conceded to be a wholesome diet, and one furnished at a cheap cost. That being the fact, the prejudices of those who would dry up the patches in which it is grown cannot avail, and kalo in some form will continue to be the food of the people.

How it is to be most successfully cultivated, is then a subject of no little importance.

The Chairman of the Committee upon Kalo, last year reported to the Society, that "when kept under constant cultivation, Kalo patches need never to be fallow, but the seed needs to be changed frequently &c." If it is to be inferred from this statement, that Kalo patches, kept under constant cultivation *without* being supplied with *manure*, need never to lie fallow, I am of the opinion that it is a mistake. Experience teaches that no soil, however rich, can sustain successive crops of any vegetables without exhaustion. Alluvial soils and plains receiving the wash from elevations in their rear, may continue for several years productive, but in the end they refuse to work

without food. Science demonstrates the causes—and the wise cultivator of the soil will forbear making drafts on the future for present comfort, and will not exhaust a virgin soil that it may in old age be unproductive;—and although many of the cultivators of Kalo are ignorant of the laws of nature, and neglect to heed them when they admonish to labor to provide against a future want, there are a few whose observation and prudence have impelled them to make a return to their mother earth for the food she gives them. Wherever in the vicinity of Honolulu a large crop of kalo has been produced, I think upon enquiry it will be ascertained that its cultivation was directed by one who has some knowledge of the process of vegetation, though it may not have been acquired in the schools. The land has been either allowed to remain fallow and the abundant vegetation sustained by it, while so remaining, has not been removed, but incorporated into the soil as decomposed matter, or foreign substances have been supplied to it, which have furnished materials for making up the deficiencies caused by successive crops.

Not from my own experience, but upon the testimony of others, and my observation, I do not hesitate to declare that it is an error to believe that kalo lands “need never to lie fallow.” If the proper manure was always accessible and could be applied at cheap cost, it may be true, but not otherwise.

My neighbor, Mr. Livingston, a colored man, who has had a long experience in the cultivation of kalo, called my attention a short time since to a kalo patch on Nuuanu road, upon which he had experimented by the use of the manure from his hog pen, for the want of better, with remarkable success—having only a small supply, he applied it to a portion of his patch by placing it on the hills when he planted the *hulis* (seed) in the ground, and at the time when he directed my attention to the difference of growth of the portion manured and that which had been cultivated in the ordinary way, it was very apparent. He also advised me that the kalo which had been stimulated in its growth, came to maturity three or four months before or in advance of the other, and was of a very superior quality. This is the only instance of applying manure to kalo that has come under my observation, and I regret that the results were not seen by all who cultivate the plant, as I am clearly of the opinion that it will as well

repay the costs to use manure in the cultivation of it, as any other vegetable. I know it is a common opinion that the soil of the islands is inexhaustible, and that manure is not worth cost of saving—but wherever it has been in use in the kalo patches or kula lands its value has been manifested. There is a striking exhibition of its fertilizing effect on a grass plot in Honolulu, where it was deposited in heaps and allowed to remain a while, and afterwards spread over the land—where the manure in a body was permitted to leach, the grass is luxurious and green, while on the remaining portion of the plot it is dwarfed and dingy. Experience, I think, will prove that the laws of nature are uniform, and that the soil of the islands under all circumstances will be benefitted by the application of science to its cultivation and improvement.

How manures are to be most successfully applied upon kalo patches is yet to be learned, but a limited knowledge of their application upon dry land suggest to my mind that the first experimenter lost a large portion of its fertilizing effect. It is known that kalo patches are usually formed upon different grades, and that the water is allowed to run from the higher to the lower, leaving only a supply as it passes. The properties of the manure being soluble, if it is deposited in the upper patch, they will be washed to the lower, and so diffused as to be scarcely perceptible. Should any one therefore feel disposed to experiment on their use, I would suggest that the patch upon which they may be applied should not be made a thoroughfare for a water course, but supplied with water as it may need, allowing the surplus to pass around. In that way the entire fertilizing effect would be realized throughout the single patch, and generally though not equally diffused, in case the manure was not properly distributed.

Garden vegetables as yet have not received the attention of a practical intelligent gardener in this vicinity to my knowledge. Mr. Montgomery who has so often been justly complimented for his liberal expenditure of money, and for his horticultural taste, has done more perhaps than any other individual to increase the variety and improve the quality of garden vegetables. But his professional duties are incompatible with that attention which is required to make a vegetable garden profitable. He has produced a fine quality of almost all the varieties of culinary plants, but at a cost for which he could not be

remunerated without directing his gardener to sell at a price not within the reach of all. The result has been that a limited market has been found, and a wrong impression has obtained that under no circumstances would a vegetable garden be successful.

I am firmly of the opinion that every man is especially fitted for some particular trade or profession, and that when he steps aside to gratify his taste, or profit thereby, he is liable to be disappointed. A man may be a very good merchant but an unprofitable mechanic—a learned lawyer but an unthrifty gardener—he may not have chosen the occupation or profession suited to his taste, but the habits formed in acquiring his education as a merchant or lawyer are incompatible with the duties that devolve upon a mechanic or horticulturist. A professional man who undertakes to cultivate the soil does it by proxy and gives only his leisure moments to observing what those in his employ have done in his absence. A lawyer would expect but small returns from his office, if left in charge of clerks, and he should anticipate no better result from his garden in the hands of unskilful Chinamen or natives, though directed by one possessing the science of horticulture.

It has been demonstrated by Mr. Montgomery, that many of the most desirable culinary vegetables may be successfully grown in the vicinity of Honolulu—and that being the fact if they were cultivated by an interested gardener who could use the spade and hoe, I think he could furnish them at prices that could command a market. My worthy neighbor, Captain Adams, who had almost or quite seen three score and ten years before he devoted his time to his garden, has also successfully cultivated a large variety of vegetables, and merits commendation for his success. But a man who is too old to be a sailor—who has spent the largest portion of his life on the deck of a ship—should not expect to make the cultivation of a vegetable garden profitable in dollars and cents. I hope Captain Adams is receiving a rich reward for the efforts he is making to test the capabilities of Hawaiian soil to produce exotic vegetables, in the feeling that he is proving to others that they can be grown, which may induce the young and experienced gardener to plant and receive a compensation for his labor.

Though it has been assumed as true that a garden cannot be made profitable, I am not yet ready to yield to that opinion.

While garden seeds are exorbitantly high, and no practical gardener is in the kingdom willing to work with his hands, with the experience of Mr. Montgomery and Captain Adams, that all desirable variety of vegetables may be grown, I think it should not be conceded that garden vegetables cannot be profitably produced, and at prices at which they could be sold.

Would it not be well for the Society to devote a portion of its funds to the importation of garden seeds, as well as improved stock, and could not the influence of the institution be well exerted to induce laboring gardeners to emigrate to Honolulu through some of the corresponding members of the Society. A good garden soil we have—a hungry and liberal community are in want of the variety of vegetables that may be produced, and if the Society can furnish the seeds, and by its influence induce the laborers necessary to plant and cultivate a garden to emigrate to us, I think our market will no longer remain without vegetable stalls.

As I have before said in a report to this Society, the natives are apt scholars in learning how to cultivate the soil, and could we have a good gardener to set them an example, I think they would profit by it. A native who was a neighbor to Mr. Janion (when cultivating by the hands of a foreigner, a garden in Nuuanu Valley) by observation has learned that something besides beans and melons and cucumbers may be cultivated for sale to the foreigners, and I have on several occasions had my table supplied from his garden with various other varieties. One good garden managed and tilled by two or three intelligent foreigners I think would soon find competitors—and could the Society in any way promote its establishment by money or otherwise, I think we should soon see a return for the expenditure.

REPORT ON ARROW-ROOT.

BY WM. REYNOLDS.

MALU MALU, KAUAI, June 1st, 1855.

To the President pro-tem of the Royal Hawaiian Agricultural Society.

It has been very recently and by accident, that I learned I was Chairman of the Committee on Arrow-Root for this year, and I have therefore only the meagre results of my own limited experience to offer as a report.

In May 1851, twenty-odd acres of Arrow-Root were planted at this place, in a field just cleared of shooting corn by the cut worm. It was rather late in the season, but nevertheless, the whole planting came up in six weeks, and was carefully weeded until October, after which time the grass was allowed to grow amongst it, as it seemed to require shade.

In January, when the stalks turn yellow, die and fall, and which is the time for digging the crop and manufacturing it, it was evident that there was not yield enough for a harvest, and the field lay over for gathering the next season.

(In reading Mr. Pitman's report for last year, I perceive that he recommends leaving the ground uncleared, and also states, that Arrow-Root will not yield a crop the first year of planting. Before I saw this paper, I attributed the small growth here, to the lateness of the period of planting.)

In May the stalks shoot out again, from the tubes left in the ground; and the appearance of these, in the field among the grass was earlier, and their growth is now more thriving than that of some in the garden, which has been kept weeded and clean.

That Arrow-Root is a profitable crop to raise upon these Islands, I have no doubt. It has no insect enemies to prey upon it; so far as my knowledge and inquiries go. Cattle will not feed upon the stalks, nor will hogs, or cats, or mice touch the root. The natives understand the planting, gathering and manufacture of it, and all these operations require but a small outlay.

There is always a demand for the pure article in New York, and so limited is the supply that adulteration is largely practiced in first hands. Genuine Arrow-Root can hardly be found in the interior towns

of the United States. The Bermuda root obtains the preference and commands a high price.

We have made here for our own use, from the mountain growth, as finely flavored fecula as the best Bermuda or Florida Arrow-Root affords, both of which I have had the opportunity of testing upon the spot. I am therefore of opinion that with proper care and cleanliness in the preparation, packing and shipment of the Hawaiian articles, it will compete successfully with any other in the market.

The root is also cultivated extensively and successfully upon the Island of St. Vincent, where every precaution is taken to produce a soft and pure fecula. Well adapted machinery for crushing and straining; hot houses for drying, arranged with railways and cars to run the drying pans out in the sun, and in again, under the glazed roof, in case of rain; the pans covered with white gauze to keep out dust and insects; german silver implements for skimming and packing, to avoid all contact of the hands; clean barrels or tin boxes, lined with white paper, which is attached with Arrow-Root paste for containers, are among the means adapted to ensure purity in the manufacture. Finally, in shipping the packages to England they are never allowed to go in the hold or to be stowed near sugar, or any other freights, which might injure the contents effluvia. Perhaps not one of these conditions has ever been complied with in Hawaii.

Arrow-Root, as a nutritious diet, ranks high among all the varieties of food used by man. Liebig places this in a remarkable point of view, when he states "that 15 pounds of flesh contain no more carbon for supplying animal heat by its combustion, into carbonic acid in the system, than 4 pounds of starch; and that if a savage with one animal and an equal weight of starch, could maintain life and health for a certain number of days, he would be compelled if confined to flesh alone, in order to procure the carbon necessary for respiration, during the same time, to consume *five* such animals."

Respectfully submitted.

REPORT ON INDIAN CORN.

BY. J. S. EMERSON.

Gentlemen of the Royal Hawaiian Agricultural Society:

Not having seen a copy of the transactions of our Society for the past year till within a very few days, nor of my appointment on the committee on Indian Corn, I have directed no special attention to the subject during the past season; and therefore can make only a few observations such as common experience may suggest.

In the cultivation of corn at these Islands, there is one thing that may be considered settled, viz., Time it right and a good crop may be expected in any situation adapted to its growth. But as the time for planting varies in different localities, and in many, must be varied to suit the rainy season whenever it may come, experience will be needed to guide in the matter. In some places the salt spray will ruin the crop if planted too early, in others the worms will take it, if planted too late; in others still the corn will be likely to be inundated if planted early and drains are not made adequate to let off the superfluous water; again, worms, caterpillars, or drought stand ready, in most places, to ruin the crop, if planted too late. To avoid all these evils the cultivator of Indian corn must study his locality with care to guard against the particular evils to which he is there exposed. In localities where there is a sufficient degree of moisture in the soil the year round to vegetate and mature the crop, the season, when winds from the sea, and worms do not prevail is the time to plant corn. This on the windward side of Oahu is from March to May usually.

But in Waialua corn planted later than March will rarely come to maturity; if it escapes worms and caterpillars it will be likely to be destroyed by lice or by excessive heat. The past winter 20 or 30 acres were planted in the month of December, but, being low and flat, and not drained, nearly the whole was destroyed by floods and standing water. Between the month of January and March the almost continued rains prevented any possibility of cultivating our flat lands; sandy soils, or sloping hill sides only would admit of being worked to advantage. The experience of the past season leads to the conclusion that all our flat lands intended for cultivation should be well drained, so as to allow no standing water.

Very much land, which is now mirey in the winter and baked and

cracked in the summer, if well drained and deeply ploughed would be very productive soil ; but, at the present time, it produces nothing but moss or a small kind of rush. If we would raise corn on such land, deep draining and deep ploughing and early planting—say in December or January, are requisite for Waialua—as we here are not as subject to injurious winds and salt spray as they are on the Koolau coast.

The grub worm and the caterpillar, which are our great pests, do not appear to diminish by continued cultivation of the soil. The writer has two enclosures almost adjoining each other ; the one of which has been planted 7 or 8 years, and generally with corn, and always with good success ; the other of these enclosures after the first crop has been uniformly cut off by the worms and caterpillars—has frequently been planted during the season, but without success. The reason why the worms take the crop from one of these enclosures and leave it on the other is a mystery yet to be explained.

He who will invent any practicable method of destroying these vermin, or of circumventing them will be a great benefactor to the corn grower as well as to the corn consumer. If a crop could be safely depended upon, and there were no fear of worms or vermin, the article could be afforded at half its present price in the market.

In this age of wonderful inventions can not a practicable method be discovered of destroying these animals, our greatest enemy in almost every branch of agriculture at these Islands ? I would suggest that a standing premium of \$500 be offered, to be awarded by the officers of the Society to any one, in any country, so soon as he shall demonstrate a feasible and effectual method of destroying these animals, or their influence for one year on a given piece of land, say one acre or more.

REPORT ON POULTRY.

BY WM. LADD.

Your Committee would respectfully report, as the result of their efforts, a communication from H. W. Fairbanks Esq.

MONTROSE PLACE, June 8th, 1855.

Wm. Ladd Esq. My Dear Sir:

In answer to your enquiries a few days since while visiting my poultry yard relative to the best method of treating fowls that they may be profitable, I gladly give you all the information that I am possessed of after so limited an experience as I have had.

FIRST,—THE CONSTRUCTION OF THE HOUSES.

My stock consists of about one hundred laying hens, and which I now keep in four separate apartments three of which are nineteen feet in length by sixteen in breadth, and six and one half feet high, and in each of which I keep fifteen laying hens with one cock. The fourth house is more than double the size of the others, but I intend to divide it into smaller apartments. My short experience teaches me that hens lay better, and are more healthy living in *families* of ten to fifteen, with but one recognized *head* of the household than in *communities* with several heads who are constantly waging war with each other for the supremacy, thus disturbing the female portion of the family in the enjoyment of their *necessary* rights and privileges, and destroying the *practical* operations of the Fourier or social system so far as chickens are concerned.

The best plan for nests are boxes arranged upon the side of the coop about three feet from the ground, and so large that the hen may hide himself from the *public gaze* while producing the desired egg. My houses are constructed of lathes and pickets, except over the nests and roosts, which are protected from the rain by a shingled and boarded roof.

SECOND,—THEIR FOOD.

In the morning I give them wheat, wash out their water tubs, and keep a good supply of water in them throughout the day, and occasionally add a little powdered lime. At nine or ten o'clock I give them melons or ripe cucumbers cut fine. At noon their food is corn meal and water, and once or twice per week add a little black pepper. Late in the afternoon I give them the swill from the kitchen which has accumulated within the past twenty four hours.

Their nests are cleaned once a week, as well as their houses, and I give them a plenty of grass, gravel and fresh beef.

THIRDLY,—SITTING HENS.

Many persons have asked me "what do you do with your hens who have a strong desire to become mothers?" For that class of *unfortunates* I have a separate apartment, and when the hen makes her wishes known by deliberately remaining upon her nest an unreasonable time, I cause her to be removed to the "prison," keep a supply of water by her side, give her one feed in the morning and leave her the balance of the twenty-four hours to her own unhappy meditation. Most likely in ten days she will overcome her former desires, and be ready to return to her house again to resume her former duties.

To those favored ones who are chosen to be the honored instruments of adding to the desired population of the chicken world, I assign a separate house for *their* three weeks probation.

FOURTH,—YOUNG CHICKENS.

Having been unsuccessful in a prior attempt to raise the desirable article, owing to a great abundance of cats and rats, I have now constructed a house of the size of the first named, and which is boarded tight about three feet from the ground all around, the object being to prevent the chickens from coming out, and cats and rats from going in. The upper part of the walls are of laths one half-inch apart, and the top of pickets, perhaps two inches apart, thus giving light and air. Within, arranged around the walls each mother has her separate apartment with her "darlings," the mother being confined to her room, while the youngsters are allowed to run at large. Having had this operation but about ten days, I cannot give the result, but at the last report from the "nursery," both the "mother and children" were doing "as well" "as could be expected."

As to the prospects of the establishment in February, March and April, I found that with eggs at 50 cents per dozen, and wheat 2 cents per lb., my fowls netted me \$30 per month, and in my opinion that will be about the average for the year—at the present time they are not doing quite as well, but the increase of price for eggs and chickens during the shipping season, will quite make up the average as stated above.

Respectfully your's,

H. W. FAIRBANKS.

The following facts derived from the Report of the late "National Poultry Show," held in the City of New York, will be found interesting, if not useful :

INFORMATION ABOUT POULTRY.

At the late Annual National Poultry Show at New York, the following conversation occurred between Exhibitors. The facts are interesting, and may be useful to many of our readers :—

Mr. Robinson spoke of the great improvement that had taken place in the appearance of the poultry shown since the last show—in fact, the first premiums have been awarded to chickens of the premium fowls of last year. It is really gratifying, said he, to think that the great, long-legged, awkward Shanghais that were first imported, have been improved by careful breeding into a very snug, well-shaped breed, many of which will weigh over ten pounds. There is no telling what may yet be made of our domestic poultry, if men continue to be encouraged in the march of improvement by such exhibitions and liberal premiums as are given by the National Poultry Society, which is doing incalculable good, for it fosters a hitherto neglected branch of American industry, which adds much to the happiness of the most helpless portion of the family—the women and children. Mr. R. said that the increase in the poultry trade of this City was surprising—it never had been as large as this winter. A single commission-house (Miller and Having) have been selling twenty-five tons a week all the season ; and this is only one of many in the trade.

Mr. Platt, of Albany, said he found pure breed Shanghais, when well fatted, as good as any breed whatever for the table. It is common to see spring chickens now, in the fall market, weighing 4 and 5 lbs. each. The Chairman says we sell poultry by the ton ; it is an object then to have those that make weight.

Mr. North, of New-Haven—the Chairman spoke of the benefits of poultry raising to the household. Yes, chickens and children are always associated, and I have no doubt that many a boy might have his mind so engaged by a present of a pair of fowls, that it would lead him into habits of industry and self-reliance. I thus raised funds for my education. I raised the first season 149 chickens and 46 turkeys, paying all expenses and laying a nest-egg in the savings' bank. It

elevates and improves the character of a child to own and have the care of fowls. I sold, last season, the eggs of one hen at a shilling each, to the amount of \$64. Poultry-raising is good for the mind and the purse.

Mr. Wilcox, of Ohio, asked if a cross of Shanghai and Dorking would be an improvement.

Mr. McCormick—I do not approve of crossing one variety upon another. The Shanghais are the toughest chickens to raise of any I have ever tried. A cross upon common fowls will improve the chickens, pure blood should be kept as breeders.

Mr. Johnson (of Paterson)—It is objected that Shanghais eat largely. So they must, to grow so large. Our Jersey farmers have mixed Shanghais with common fowls, and the result is, they never had so many tons of poultry to send to this market in any year as this. I like a variety of sorts, but would not cross them. I have a Golden Hamburg hen that laid eggs enough to average six a week from February to October. The combs of this variety are very large and handsome, and they will not freeze if you have a good place for them. I like a shed open to the South for day time. I like these remarks we hear at this meeting—they may encourage others as I have been encouraged. I make money. I gave \$30 for a pair and sold eggs enough at 12½c. to pay cost and get a good stock in one season. I have twenty-seven varieties.

Mr. North—I had a Hamburg hen that laid every day from Feb. to October. They are a good kind. They were formerly called English Red-top. I built a cellar, with a glass roof, and good ventilation, for my hens at a cost of \$300, and it pays well. I get eggs all winter. I feed my fowls in part with carrots chopped fine and mixed with meal or other food. I never saw anything so good to make them look healthy and lay freely, as carrots. I wish the advantage of using such food for fowls could be universally known.

The Chairman—The reason that carrots are good for laying hens is, that chemically considered, they contain more of the substance necessary to form eggs, than any other food. They are nutritious for man, beast or fowl. One bushel of carrots contains more food than a hundred cart loads of turnips. Mr. North says they are 28 cents a

bushel in Connecticut. Here the poor pay \$2 50 a bushel for potatoes. If it was only fashionable to eat carrots, how much more nutriment they would get for less money. Carrots are exceedingly valuable used in soup. Fowls should always be fed with vegetables in winter. I am glad to hear that carrots prove so valuable.

Mr. Case, of Jamaica—I would raise Shanghais if for nothing else, just to hear them crow. But I find the hens are the greatest layers of any sort I have ever seen.

Mr. Long, of Morrisania—A Shanghai hen hatched four chickens, and soon began to lay, and after a time began to set, the four chickens sitting with her. She hatched 14 or 15 eggs, and both broods ran together, and in a short time commenced laying again, keeping us in eggs while raising her broods.

Henry Betts, of Wallingford—I have bred Golden Hamburgs 22 years. I find no difficulty in raising them, and they are more ornamental on a place than Shanghais, and as good layers. I got 203 eggs from one hen in ten months.

The Chairman said that the cheapest ornaments of a rural place are birds; not only useful laying birds, but such beautiful fancy birds as are to be seen in this exhibition. A variety of birds upon a place enlivens it and gives pleasure to all who behold them. Show me a man that hates the sight of domestic poultry upon his premises, and you need go no further to find a man who does not love women and children.

Mr. Johnson recommended raw onions and cabbage to fowls in winter to promote health.

Another gentleman recommended lard scraps and pounded oyster shells. He finds a cross a cross of Dorking and Malay fowls a very good sort. They weighed, dressed, 14 lbs. a pair. Some of his hens had laid two eggs a day.

Mr. Platt—I would rather burn the oyster-shells. Lime is indispensable. Hens cannot make egg-shells without it. I am pleased to hear the subject broached of the value of birds for ornamental purposes. There are birds here that would adorn a palace.

The Secretary—I hope we shall be able next year to fill the Crystal Palace with a show of such fine birds as fills the great halls of this

Museum. In conclusion, Mr. Chairman, I move a vote of thanks from all the members of the National Poultry Society to P. T. Barnum, the President, for the interest he has taken to promote our successful exhibitions, and foster improvements in domestic poultry throughout America, by calling the attention of multitudes to its importance that otherwise might have never thought upon the subject.

It has been recommended by some experimentalists to keep laying hens constantly shut up, and entirely separated from the male.

For under such circumstances they will produce a much larger number of eggs, and will not have any disposition to set.

Lime sprinkled occasionally on the nests, particularly when the hen is about to set, will prevent all injury from vermin.

Respectfully submitted.

REPORT ON FLOWERS.

By W. HILLEBRAND, M.D.

The cultivation of flowers and ornamental plants in general has, during the past year, made a steady, though perhaps little noticed, progress. A considerable number of new plants has been introduced while the circle of amateurs of this special branch is extending in the same measure, as our foreign population is increasing, and the idea of making their abode here a permanent one, is gaining ground amongst them. A flower-garden is so intimately associated with the idea of home, that in the minds of many the latter can hardly be thought of without the accompaniment of the former. A mighty stimulus to the cultivation of our gardens has been lately given in Honolulu by the act of the authorities granting the supply of water from the government works to private individuals. Henceforth it is to be hoped, that the many arid grounds round the habitations of our citizens will soon be filled with fresh verdure and fragrant flowers, for under our blessed sky it hardly requires anything but moisture to make even a poor soil yield what you please. Besides, manure is abundant. It might be well for us if those grounds were employed in the indicated manner, instead of being crammed with a motley

assemblage of small low huts and shanties, unfit by human beings, to be inhabited for any length of time without detriment to their health, and attended with all the oblige accumulation of filth and dirt, which promise, before long, to engender a host of diseases that will soon do away with Honolulu's great reputation for salubrity. Whoever believes I exaggerate, is requested to take a walk through our streets during a calm summer-night, when he is not likely to be affected with a catarrh of his nostrils. But against the ferocious god of the dollar it is in vain to preach. We have been promised a city charter. May the city fathers in embryo keep their eyes and noses open! A few stringent regulations will not be out of place. I have perhaps strayed from my theme, which was on flowers, but allow me for this time to speak of fragrance and stench in one breath, for I mean to expel the latter by the former.

I would avail myself of this opportunity to throw out a few remarks with regard to the improvement of this special and other cognate branches of our society. The introduction of new plants, ornamental as well as useful ones, is a most important object. Our climate is peculiarly favorable to the development of all the productions of tropical and of most temperate latitudes. Numbers of cereals, oil-producing plants, fruit-trees, garden-vegetables, pasture-plants, which might be cultivated to great advantage, do not exist here yet. A particular committee of our society, composed of individuals who take a real interest in its subject should be intrusted with its furtherance. Government could lend its aid by instructing the King's Commissioners in different parts of the world, to send from time to time seeds of the useful and ornamental productions of the countries where they reside. Likewise, I feel assured, the representatives of foreign nations would, with pleasure, express to the commanders of national vessels cruising in the Pacific and Eastern seas, who have to touch here occasionally, the obligation they would lay us under by collecting in intermediate ports what might be useful to us. Private individuals might invite their correspondents to contribute a mite. To mention only one instance amongst many: the bananas growing on our islands are (with exception of two lately introduced from Tahiti) only of two kinds, and these very poor ones, while both Continents, East and West, and island groups South,

abound with varieties of the choicest kinds, with the delicious fruits of which ours can hardly compare. How is it that the plantain of the West Indies and Central America, on which hundred thousands of human beings rely as almost their sole food, is not yet seen here? But the most efficient way of all would be, to place us in a situation where we can offer equivalents for what we receive. And this might be effected by an institution, which in so many respects would prove useful and interesting—I mean a botanical garden—which would collect in a limited space the productions of our islands and other countries. Our island flora, although not as rich as that of most other tropical countries, yet possesses the great charm of novelty. Only a few scattered species of Hawaiian plants are found in the richest botanical gardens of Europe and America. In all of them there exists a great desire to make acquisitions from this quarter, and they would undoubtedly make compensation in the most liberal manner. If this garden at the same time were managed as a nursery, where useful new importations be first deposited, tried and studied, and from which they would be distributed gratis and with proper instructions, to the population, it would become a source of great benefit. Besides, such an institution would raise our credit abroad, and throw a lustre upon the government under which it originates, for it is only in highly civilized nations that science is fostered systematically. It would be superfluous to bring into account the gratification, which a park-like garden, filled with flowers and rare trees, open to the public at certain hours of the day, would offer to our citizens, and before all, our ladies. Is our government so poor that it cannot devote a few acres of its many waste lands to the purpose of a botanical garden? is there not plenty of water round Honolulu to irrigate it with facility? and are there not constantly prisoners in the fort who could do the necessary work there in the most economical way? Perhaps it would not be difficult to find in our number a gardener who willingly would take the establishment under his care, even without salary, if the difficulty should lay here.

The British Government has erected botanical gardens in nearly all its colonies, estimating justly their great importance in raising the agricultural resources.

In the meanwhile your humble reporter has taken upon himself to execute, on a limited scale, the idea just thrown out. Owing to the mediation of a highly esteemed friend, he has been placed in correspondence with the great botanical gardens of Paris and Rio Janerio, from both of which he expects annual remittances of seeds, in return for which he has to supply them with the productions of our islands. As he considers a private transaction of this kind of greater than individual interest, he would avail himself of this opportunity to make an appeal to such of our country residents and farmers who take an interest in the advancement of agriculture and horticulture, to send him from time to time ripe seeds of plants growing in their neighbourhood, if possible, with the native names. Those from the mountains and recesses of the valleys are most desired. Every remittance of this kind will be compensated by a parcel of new foreign seeds, either useful or ornamental, according to option.

In conclusion, I would suggest the propriety of lining the principal streets in and near Honolulu with fine shade trees. As to Nuuanu road I should recommend to beset its sides with representatives of all large shade and timber trees, which are found on our islands. The high winds, sweeping over said road, would, it must be admitted, prove a great obstacle in the beginning—but, I imagine, their force could, in a great measure, be broken by setting out at the commencement from distance to distance some hardy-growing tree, as the hau or fig, which would afford a shelter to the tender ones, and might be removed subsequently, after having performed its office. There is abundance of water, and the growth of the trees, it is to be hoped, would be rapid. King-street is broad and hot enough to be benefitted for appearance and comfort's sake. The same holds good of other streets. Another consideration of importance should urge us to make a quick beginning. The succulent branches of a living tree are an effective barrier to the spread of fire.

REPORT ON LABOR AND POPULATION.

By W. HILLEBRAND, M.D.

GENTLEMEN :—It is a matter of regret to me, that on a subject of such importance as that of the present committee, I have been left alone to a task, for which every one of my fellow-members would, from their greater experience, have been better qualified. The name of your committee is, "on Labor and Population." As far as I understand it from the juxtaposition of these two great elements of agricultural interests, you want me to speak of the latter in its bearing on the former. Otherwise, the subject would become too wide and extensive and appear out of place.

The sources of labor, which present themselves to our farmers and planters are first and principally our native population. Up to a few years ago it was their only dependence, their only means. It was found insufficient, as was attested by the general complaints of agriculturists, and fully borne out by the neglect of some and the abandonment and total ruin of other estates, some of them after their beginning, others after having been raised by dint of individual perseverance and outlay of capital to a degree, where they soon would have supported themselves, if the unmeasuredly rising wages had not proved a tub of the Danaides to the despairing planter. Whence this great distress? The causes are too well known, have been too often and ably discussed here in your society and elsewhere. I almost fear to be accused of trueisms, and still I deem it my duty to bring some of them up again, and if it were only, to consider from a new point of view, the object plainly conspicuous to all.

Foremost of all, stands the scarcity of our population. The Hawaiian nation, which, 70 years ago was estimated variously at from 200,000 to 400,000, now only counts 72,000, a decrease within this period of at least 2-3. Vast tracts of land do not harbor a human soul; fertile kalo lands, once under cultivation, are left to the rule of grass and weeds. The island of Kauai, remarkable for the productiveness of its soil and capable to sustain a population of at least 100,000, contains only 6000. It is not to cruel and devastating wars that we have to attribute this unparalleled falling off in so short a time. The wars of Kamehameha I., however energetic they were

carried on, cannot in the remotest degree be compared, so far as waste of life is concerned, with those of modern civilized nations. And it is after those wars, moreover after the blessings of civilization were transferred hither, that the blight falls most mercilessly on this doomed people. The cause of the evil is an internal one, not caused but increased by external influences. Its investigation resolves itself naturally into these two questions ; the scarcity of births and the frequency of deaths.

What is the cause of the rapid increase of other more favored nations ? Few will deny, that it is a result of that great moral and social institution—called family. In proportion as the family is held sacred and inviolate, the numbers, the strength and wealth of a nation will increase. It is not only a moderator and director to human inclinations, engendering and fostering the brightest inspirations of the human soul, love and charity, restraining passion, and steadying the aim of life, but a most useful stimulant to parents, in straining their activity to provide for the future of themselves and their offspring. Fertility and health accompanying it. How does the family stand with the people ? I fear, with the great majority it is an empty word—I am not sure, if they have a word for it at all. Conjugal and filial love are only faintly developed in consequence. The degraded state of woman in their ancient institutions certainly lays at the bottom of this great defect, and unfortunately the first contact with white men did anything, but shake their primeval ideas. That class of people who first came amongst them, be it transitorily or permanently, being, with few honorable exceptions, of the lowest class, did their best, still more to pervert the moral depravity, christianity has certainly mended the evil, but you will all agree that its agency, up to their time, is far from having accomplished its end. I do not hesitate to say, that marriage with most is little more than a formality, that sincere conjugal attachment is only cultivated by few, and that the word “home” is hardly understood by any of them. Laciviousness is the order of the day, disease and sterility follow in its wake ; children are considered a burthen by too many. But is there no remedy against this canker ? Shall such a state of things continue until the last scion of this interesting race is swept away ? Teaching

by school and pulpit has been exercised now thirty years and more, and, although I imagine that, combined with a practical detailed and persevering surveillance on the part of the spiritual leaders, more might be effected, yet of itself alone it is insufficient.

The corner-stone of the fine temple "family" is, in my opinion, a homestead. The family is exclusive; it has a tendency to concentrate itself, to seclude itself from the community. If you want to create a family, call into existence the conditions under which it will thrive, and you may be sure that, when the grain is sown, it will grow. Give your native a homestead and bind him to it, give it to him restrictively; under certain conditions, which will not allow him to leave it for any length of time or to alienate it. Make these conditions of a kind that they will confer a real, a permanent benefit on him, and he will soon learn to appreciate them. In this place I cannot but reclaim from the abuse, superficial modern philosophising and theorising has heaped upon it, an institution of by-gone ages—I mean feudalism. Feudalism fixed the tenant to his ground by obliging him to yield a portion of its products to the landlord; it bound him to till the soil—attaching it to his family by descent, it prevented him from squandering it. It was the best stepping-stone from barbarism to the free institutions of civilization, eminently calculated to change the savage propensities of roving and warfaring tribes to the settled habits of an agricultural people. Together with the moral principles of christianity and the veneration in which woman was held amongst all Germanic nations, it contributed greatly to establish the family on the firm basis, for which they are still remarkable. Feudalism was oppressive when it was exercised by petty nobles; it was mild where its sway was held by princes or ecclesiastical dignitaries. You have had feudalism here swayed by a number of chiefs, and not influenced by christianity. It was oppressive, tyrannical no doubt. And yet, I think it contained a germ for a better state of things. You have abolished it at once, raised the enslaved and oppressed people at once to the full enjoyment of liberty and self-government, which has been the fruit of long protracted struggles to your own nations. Has it been for their better, for their best? I doubt.

Suppose a different plan had been followed, and what capital op-

portunity offered itself when our late generous king converted all feudal titles in fee simple ! Suppose the fealty of the people had been merely shifted, had been transferred from the chiefs to the king, or say rather, to the state, the great community of all ! The native would have received his land, not in fee simple, but as inalienable property of himself and descendants under condition that he should constantly keep the whole or part under cultivation, (or it would revert to the fief-holder, the state) and exhibit such either before specially appointed inspectors, or by selling a certain amount to the state (as is the practice with the Dutch in Java) ! Would not such an arrangement have secured him a fixed homestead ? would it not have trained him to habits of industry and regularity of life ? would it not thereby have estranged him to idleness and its concomitant host of vices ? would it not, in fine, have created him a family ?

This opportunity has passed unimproved, but has it passed irretrievably ? I think not. There are immense tracts of lands still in the hands of the state and its principal leaders which lay unproductive, and will lay so for a number of years. It would require only a very moderate degree of abnegation on their part to transfer all superfluity to the still numerous class of landless natives, under conditions like the above-mentioned, and a modest portion of intelligence to perceive that it would turn out to their own profit. True, it would be a step backward in our political reform career, but it behoves a prudent man, when a precipitous race has carried him to the brink of a precipice, to retreat for a while and rest until he has gathered strength enough to leap over it. All precipitation in social advancement is ruinous ; the development of mankind effects itself in slow measured steps. That our natives are yet unfit for a free constitutional form of government, I think, is obvious.

I said before, the family is exclusive. It certainly cannot thrive where numerous married couples are housed together under one roof, in one room, only separated by a moveable curtain, and sometimes not even that. It cannot fail that such circumstances will prove a hot-bed of vice and licentiousness—that it will infect for life the tender soul of the innocent child. But such is the rule in and round Honolulu. Has the state no right to do away with such a mischievous state of things ? can it not enforce the separation of married

couples ? since, if principles of liberty, personal rights, etc., should stand in the way it would be better to throw them over board at once.

Another question : Has the state no right to remove women who repair to the large seaports with the evident and avowed intention to make their living by prostitution, nay, horrible dictu, are even sent there for this purpose by parents and husbands—has it no right to send them back from whence they came ? A salutary law to this effect has been proposed for years in succession, and constantly defeated by the ostensible plea of infringement on personal rights. Now there is to a philanthropic mind only one alternative, either openly tolerate prostitution and control it, and try thereby to lessen as much as possible the great evils flowing from it, or endeavor to suppress it—take up every prostitute, send her to a house of correction, or remove her from the sphere of her activity—that is, from cities. Not to acknowledge and yet tolerate it, is certainly the worst course to be taken. To hunt up and expose to the public eye their trespasses is highly demoralising, to convert them into a source of public revenue is abominable, is disgusting. A vagrancy law, like the one proposed by Mr. Wyllie, turning away from the seaports any one who cannot show that he earns his living in an honest manner would have another salutary effect in removing those many male idlers who might be useful at home, and are a burthen here to their more industrious friends, on the products of whose labor they feed.

Before this I alluded to the sterility of native women as a consequence of their libidinous habits. A kindred cause of the decrease of the population is the frequent occurrence of abortion and still-born children. In a great measure this evil emanates from the same source as sterility, the diseased taint of the mother being imparted to the fruit, and dooming it to destruction either before or shortly after birth. But this is not the sole cause. The state of pregnancy is feared and hated by too many women, as debarring them from the pursuit of their pleasures and, besides, the care of tending and nursing an infant is so onerous, that it should be avoided at any rate. I am informed that there exists a class of old hags who make it a regular business to administer relief to fair applicants in this line, often at the expense of their lives. From my own experience I can

assert that the baneful influence of horse-riding on gestation is so well known as always to be resorted to as the first expedient. Many old residents even maintain that infanticide is a common practice. Has our criminal code no provisions against these homicidal abuses? If it has, have measures been taken to bring them to the notice of the natives, who certainly have only a faint consciousness of the sinfulness of these proceedings. Likewise have the mothers been instructed by writing and word in sound hygienic principles of treatment of their infants, for ignorance and disregard of these prove almost as pernicious as the former causes. Whoever sees a tender babe of a few months fed on the coarse food of adults, and unprotected from the vicissitudes of the atmosphere, even while under actual sickness, will acknowledge the importance of my recommendation.

Finally, do not delay the erection of hospitals for the sick any longer. Humanity demands it imperatively. The native who falls sick is left to chance and the efforts of his own nature, and too often he is even deprived of the benefit of the latter by the mischievous interference of native doctors. Even when he falls under the hands of a regular physician, so many obstacles present themselves in the way of faulty habits, bad food and dwelling, want of proper nursing, impossibility of applying many remedial agents, prejudice, etc., that the endeavors of the latter are only too often rendered fruitless. A hospital would remove these obstacles at one sweep: a great saving of life must be the result. But, if you erect hospitals, make them so as to answer the purpose, do not from the beginning stifle the institution by half doings, by treating it as a financial operation. Locate them in salubrious and pleasant situations where there is a good supply of water—surround them with fine trees and shrubs so as to render them attractive—appoint proper officers who understand the habits and language of the natives, and possess their confidence, allow the inmates to follow their accustomed habits so far as it does not conflict with order and cleanliness. With such qualities these houses will be eagerly sought after by the sick natives in spite of prejudice, if any exist. I, for my part, have always found that the native is anxious to obtain medicine from a foreign physician whenever he can have it gratis.

In connexion with hospitals allow me to recommend another measure, the utility of which is eminently proved by the experience made in the larger cities of Continental Europe—the control, if not of prostitution, at least of its child, syphilis. There is probably no place on earth where this disease is so wide spread as here. It is no random assertion, but one based on experience and approximative calculation, that in 10 natives 9 have been infected with this disease at one time or another of their life. Happily the disease does not produce as great ravages here as it does in northern climates, or this nation might have ceased to exist before this. But, as it is, its effects are fearful. If not immediately, certainly by its mediate consequences on the general system which, contaminated and enfeebled, is no longer able to resist any other accidentally supervening disease, it is the cause of hundreds of deaths annually. Now there is hardly a disease in the whole dominion of Pathology, which is so accessible to treatment as this—even its most aggravated forms are amenable to cure or great amendment. If, in addition to this, you consider that one constitutional taint, if left to itself, will steadily become worse and worse, and pass over from parent to child, you will conceive the importance of some measure to arrest its progress. The remedy consists simply in the obligation of every infected person to submit to medical treatment. A special ward in the hospital, a general dispensary, a few police regulations and the co-operation of the police force are all the necessary machinery. Regular attendance at the dispensary or confinement in the ward has to be enforced until cure is effected. The natural feeling of revenge of an infected person against those who conferred the disease, and the absence of all shame with regard to it in Hawaii nei, where no stigma is attached to it, will render the execution of the plan comparatively easy. Of course the obnoxious moekolohe law has to be abrogated before any practical benefit can be expected from the measure—and if only half the ingenuity exerted by the native police in ferreting out moekolohe were applied in the new indicated direction, they would, if not more respectable, certainly become infinitely more useful. In Berlin, statistics show that control of prostitution has, in one year, dismissed syphilis in the army by one-fourth, and generally by one-fifth. Here we might reasonably anticipate still greater results.

Gentlemen, I have detained you so long with treating the question of the decline of the native population, and my ideas for remedying it, because this subject is most familiar to me, and has for some time attracted my attention. It is, in my opinion, the most important part of the subject of your Committee, as the natives will, for a long time, have to be looked upon as the principal source of labor and agricultural production. Any attempt to increase this source and make it more available, must therefore be of vital interest to our agriculturists. Our natives possess a sturdy, vigorous frame, great muscular power, and can endure hunger and thirst for a great length of time. They pass for indolent, and certainly are so. But are they so from innate character, or by habit. The many instances of industrious and thriving men amongst them do not justify us in saying that they cannot be laborious. As seamen they are eagerly looked for by captains of whale-ships, and I never have heard that they are complained of, when on board, as being idle and lazy. On the contrary, they are liked for their docility and obedience. If they are indolent therefore, they are so from bad habit, from want of necessity and stimulus. These can be removed and supplied.

It is to be feared that the tendency to a standing military establishment, which has sprung up of late, will make the want of labor still greater. Many hundreds of useful hands are thereby made unavailable; the militia law even goes so far as to take the whole working male population from their fields one day every month. And it cannot be asserted in favor of our military institution, that it will train the young men to habits of order and accuracy, for old and young are taken indiscriminately, and the way in which the concern is carried on is little calculated to work this way. Besides, a soldier's life in peace is considered everywhere as a school of idleness. It seems singular that we, who have no neighbors but the mighty nations of the ocean, with whom we cannot compete, and whose own interests and jealousies prompt them to maintain our independence, should burthen ourselves with an expensive military establishment. Against pirates the satisfaction of the white population with our Government is a sufficient guarantee; annexation—fillibusters—if there really have been any prospecting—were called into existence by the vacillating conduct of the Government itself, and at all events, would find their suffi-

cient counterpoise in the treaty stipulations of the three maritime nations. A great inconvenience in the employment of natives is felt from their instability and fickleness. When you take a native in service to day, he may leave before the week is out, if he pleases. In Germany it is a general rule for servants to bind themselves for six months. How far anything may be done here, I leave to those practically versed with these matters.

One word with regard to Chinese coolies. As the case stands at present, they are a real benefit to the planters and foreigners in general, and will remain indispensable for a long time. As house servants they are particularly valuable. But it is a question, whether their constant increase in this country is not fraught with evil. Their moral degradation, thievish propensities and turbulence render them an undesirable admixture to the social stock of our islands. The Chinese never amalgamates with other races; but, like the Jew, retains his national habits and characteristics. He imparts more than he accepts. So long as no females of their own race migrate hither, the evil may be considered remediable, and perhaps it may be asserted, in their favor, that their intermixture with Hawaiians will impart to these some of their industrious habits. But it is a fact that, wherever they have been allowed to accumulate in large numbers out of their country, they have been productive of mischief. On the Philippine Islands they have repeatedly started bloody rebellions and wholesale massacres, while the white inhabitants of Singapore even now live under constant anxiety and fear of similar occurrences. In March last about 180 more were imported by Mr. Graves, most of them fine and healthy-looking young men, who have given general satisfaction.

The introduction of white laborers from Europe on the same footing as coolies cannot be thought of. But I imagine Government would do well to encourage German immigration. If anything, the dispersion of German farmers and gardeners over the country would be calculated to open the rich sources of its productiveness. Their example of industry on the natives would exert a wholesome stimulus in these. Liberal grants of land and some arrangements for procuring a cheap passage would undoubtedly attract hundreds of industrious men from Germany, where the islands of the Pacific appear in the light of the gardens of the Hesperides. Respectfully submitted.

COMMUNICATION FROM H. M. WHITNEY, ESQ.

Dr. R. W. Wood, President of the Royal Hawaiian Agricultural Society:

SIR:—I beg to suggest to the Society a change in some of the premiums now made, and for that purpose would offer the following resolution for the consideration of the Society:

Resolved, That the sum of Five Hundred Dollars, which this Society receives from the Hawaiian Government, be set apart for five premiums of One Hundred Dollars each to be awarded annually for the following articles of Hawaiian produce.

Indigo—best sample of 100 lbs., \$100,00.

Cotton Wool—best sample of 100 lbs., \$100,00.

Wool—best, not less than 1000 lbs., \$100,00.

Cigars—best, not less than 10,000, \$100,00.

Wheat—best and largest produce of 25 acres, \$100,00.

All the above to be the produce of the twelve months preceding the day of exhibition. The Society shall not be bound to award the premiums unless there is competition for the same.

I need not stop to urge reasons for the Society's taking some such liberal and decisive steps to foster and encourage the cultivation of these valuable but now almost neglected products of the Islands. The reasons must be apparent to each member. The Society will not be called to award the sums unless there is competition for the same, and when so liberal a standing reward is given it *must* have some effect in inducing attempts to merit them.

The list might be increased by the addition of coffee, sugar, and perhaps articles equally meritorious, but I have only thought best to include those articles which appear to need the assistance of the Society, and to the extent of the \$500 alluded to.

I remain sir,

Your obedient servant.

Honolulu, June 13th, 1855.

Referred to the Board of Managers for consideration.

NOTES UPON HAWAIIAN INDIGO

By D. FRICK, L.L.D., MANUFACTURING CHEMIST.

The wild *Indigofera* of the Island of Oahu belongs to the species called *Indigofera disperma*, which is cultivated in the East Indies and in America. It is among the fifteen members of the Indigo family. The highest and most woody shrub produces less coloring substance than the *Indigofera tinctoria*, which is chiefly cultivated on St. Domingo, Madagascar, Mauritius, Malabar, &c., but its quality is superior to the latter—and its commercial name is *Guatincala Indigo*. When cultivated, it abandons to the maceration above one-third more of Indigo than there can be obtained from the same plant in its wild condition. Nos. 1 and 2 of our samples may be considered as the best qualities drawn from this plant; Nos. 3, 4 and 5 are varieties in which the quantity has nearly been doubled, but at the expense of beauty and brightness. The first numbers are generally preferred as a dye for silk, the others are very applicable to cotton and to wool.

This *Indigofera disperma* seems particularly adapted for cultivation in these Islands on account of its long stalks that keep the head of the plant at a proper distance from the dampness that reigns here for many months, especially about the blossom times of the first crop which is always the richest. A lower plant with a heavy foliage would be exposed to be injured by the continual rains that soak the soil for such a long period of the year; for even in this sort of *Indigofera* too much rain reduces the product of Indigo, since the great strength of vegetation in this case is spent upon the wood; sunshine on the contrary, is a most powerful auxiliary to increase the coloring matters, when the soil, as here, is light and moist during a great part of the year. Usually two crops are obtained in America, in other parts 3 and 4 are cut yearly, but we have not to examine for the present, the question of cultivation, as we will be satisfied for some time to come, to make use of what Providence has so abundantly sown in this archipelago.

Our works established in Nuuanu Valley are for several reasons, not in a favorable locality, above all on account of the sudden winds and showers that stop the progress of our fermenting vats, by lowering the requisite temperature; these obstacles created a difficulty for ascer-

taining the time to be allowed for the first operation ; we succeeded, however, in obviating it by the means of an instrument to which we gave the name of *Indigometer*.

The proximity to Honolulu of the spot which we have chosen, the fertility of the neighborhood in which we have set up our vats, the abundance of clear water are advantages that we are desirous of retaining, at any cost of additional trouble, and we contemplate erecting by and by, a shed against the excess of the variableness of the weather.

We were happy enough to solve another question which was that of the inequality of the produce, and we can assert now, that in spite of the many causes that tend to prevent the production of a constant superior quality, we have by the assistance of chemistry, adopted fixed rules by which, if we do not always produce the same quantity, we obtain a very satisfactory quality.

Compression and dessication are both operations that require much care, for upon them depend the lightness, the brittleness, and the brightness of the cakes. Our desire to represent at the exposition of the R. H. A. S. a series of sufficient samples of our Indigo has obliged us to hurry our dessicating operation.

The limited scale of our manufacture, and the short time elapsed since the beginning of our manipulations, will not allow us, as yet, to speak with any degree of certitude of the proportions of this pigment obtained from a given quantity of plants, but we trust that our humble ambition will be amply satisfied hereafter with the results of this enterprise, to which we are devoting all the resources of our capacities, our courage and our perseverance ; and we are confident that the example of our efforts will not be lost for the welfare of this country.

Chemical explanation of the difference existing between the five samples produced at the above-named exposition.

No. 1—Indigo, in imitation of the Bengal, obtained by neutralizing all foreign principles in the maceration.

No. 2—Indigo, same as No. 1, but hastened in its dessication.

No. 3—Indigo, similar to the white-coated East Indian, submitted to a double action of oxygen.

No. 4—Indigo, precipitated in conjunction with the yellow and brown coloring matters in the plant.

No. 5—Indigo, from vats disturbed by the variability of the temperature.

There is a No. 7 representing a specimen of stone-blue paste, in which the coloring principle is also borrowed from our Indigo.

COMMUNICATION FROM MR. HELSTEIN.

MANOA VALLEY, June 11, 1855.

Gentlemen of the Hawaiian Agricultural Society, Honolulu :

At the eleventh hour (not being aware before the night of your annual conference) I beg leave to lay before your honorable body a petition, not on my behalf individually, but, as I suppose, on behalf of the general agricultural interests of this country.

Should my communication lack in detail or logical reasoning, should it be deficient in correctness of style or form, you will forgive the plain farmer.

Allow me to, but briefly, remark on those points which I would respectfully offer to your kind consideration. The lands in these valleys, I have found, are none of them inferior to some of the best bottom lands in the Western states, not only in deepness of soil, but also in richness and what is termed mould. When I, about one year ago, induced by the fine climate and the richness of soil, intended to devote my remaining years to a farmer's life, I was often and repeatedly advised to leave well alone, follow my then business, and abstain from farming, "*because it is no use, the worms will destroy every thing and eat you out and out.*" I resolved to try—I have uncensuringly battled with them and waged war against them, with lime and ashes, and soap-suds and coal-tar, and everything destructive, but I must at last assert, that although frequent working and turning over of the land, and keeping the weeds down is of some, and not very little, influence, still the ravages of the worms and insects are fearful. As long as the worm is the master and ruler of every farming enterprise, as long as success or failure depends so to say on the will of those destructive insects, men of fortune and ability will hold back to invest their money in enterprises which are subject to total failure from

insects and worms, the existence of which and their ravages no power, no industry and attention can oppose. It would be too long to enumerate the different species of worms or larvæ, but it is sufficient to state that there exists only one effective and sure remedy against this evil, which increases with every year, increases with every acre of land brought into cultivation, increases with every new species of plant introduced in those islands, every plant calling forth its own particular enemies and gormandisers. There is only one sure, effective, and absolute means to effectually diminish and in course of a few years almost to annihilate those small, almost invisible, but insidious and therefore invincible enemies of every agricultural enterprise. Those means are the introduction of birds, such as the sparrow, the bluebird, the wren, the jay, the robin, and even the blackbird and woodpecker. Never mind, let the blackbird eat a grain of corn, 3 or 4, or perhaps a dozen ears, he repays his board a hundredfold. It is only the fool who throws away a dollar to save a dime. It would be preposterous in me to remark on the delights which those feathered songsters would impart not only to mankind, not only to the citizen when he travels to the valleys for a little fresh air, but especially to the farmer, when the rising sun greets him in the field. How still, how cheerless, how silent those beautiful valleys now!

Give us birds! Gentlemen! give us birds—those tiny, small, but all powerful protectors of agriculture. Without these, agriculture on these islands will never rise above insignificance. Despair will follow every enterprise as long as vermin and insects have the mastery over every effort. Agriculture wants protectors! Give us birds—the most effective—either by legislative enactments and appropriations, or by any other means your honorable body may devise.

Most respectfully, your ob.^t servant.

REPORT OF SELECT COMMITTEE ON THE SUBJECT OF INDIGO.

Your Committee appointed to inquire into the practicability of making Indigo a profitable article of exportation, beg leave to report:

That from inquiries made of Dr. Frick, we find that under the favorable circumstances in which he is acting, Indigo of good quality and of ready sale to certain merchants here, can be made at a reasonable profit. But that if it is required to be carried on in an extensive scale, including the purchase or renting of land, cultivation of the plant, and erection of works, &c., &c., they fear that the very high price of labor, as it is at present, to be procured on the islands would nearly, if not entirely, absorb all the profits.

Many parts of the islands are covered, to a large extent, with the wild Indigo which, if manufactured carefully, either by the owners of the soil or permission was given to others to use it, in the same manner in which Dr. Frick is working, it would be a blessing to the islands to let them eradicate it if possible, and thereby restore many tracts of land to the more profitable purpose of pasturage.

On the whole they are inclined to recommend the encouragement of the manufacture at present as an experiment, the more especially as they are informed that Mr. Green and Messrs. Krull & Moll, and also the agent of the H. H. B. Company have promised to take any amount that may be made at the current price of each quality, believing that it will answer as a good remittance.

They have also ascertained, as far as possible, what the price of *manufacturing only* of the article will be, which appears to be, for the best quality with 24 vats at work $87\frac{1}{2}$ cents per lb., with 50 vats at work $62\frac{1}{2}$ cents per lb., the inferior qualities at a lesser rate.

T. C. B. ROOKE.

JNO. MONTGOMERY.

LIST OF STANDING COMMITTEES FOR 1855-6.

1. On SUGAR.—R. W. Wood, E. O. Hall, W. H. Rice, C. R. Bishop, L. L. Torbert.
2. On COFFEE.—R. C. Wyllie, B. Pitman, P. Cummings, G. Wundenberg, W. A. Aldrich.
3. On WHEAT and OATS.—E. Bailey, J. T. Gower, A. G. Thurston, H. M. Whitney, E. H. Allen.
4. On GRAPE-VINE.—F. A. Oudinot, G. B. Rowell, R. G. Davis, G. D. Gilman, D. Baldwin.
5. On VEGETABLES.—J. Montgomery, G. M. Chase, A. P. Everett, H. M. Fairbanks, F. A. Oudinot.
6. On INDIGO.—D. Frick, T. C. B. Rooke, S. C. Damon, W. H. Pease, J. W. Marsh.
7. On ARROWROOT.—G. P. Judd, J. Hardy, B. Pitman, H. A. Widemann, L. Andrews.
8. On BUTTER.—E. O. Hall, D. McBryde, B. W. Parker, H. A. Widemann, J. P. Parker.
9. On TOBACCO.—W. L. Lee, J. Montgomery, R. W. Wood, M. C. Monsarrat, A. Archer.
10. On SALT.—L. L. Torbert, D. Frick, T. Spencer, W. L. Green, G. P. Judd.
11. On FLOUR.—C. C. Harris, J. Hardy, E. Bailey, D. M. Weston, A. G. Thurston.
12. On HORTICULTURE.—G. M. Chase, E. P. Bond, E. G. Beckwith, Wm. Ladd, J. Montgomery.
13. On FLORICULTURE.—J. H. Wood, W. Hillebrand, H. M. Whitney, M. Beckwith, C. R. Bishop.
14. On CATTLE.—R. Moffitt, G. P. Judd, S. Burbank, J. P. Parker, H. Prendergast.
15. On HORSES.—J. I. Dowsett, S. P. Ford, T. Cummins, J. O. Dominis, G. Reiners.
16. On SHEEP and WOOL.—R. Moffitt, T. Cummins, E. Sparks, J. I. Dowsett, R. W. Wood.
17. On SWINE.—L. L. Torbert, H. W. Fairbanks, D. McBride, Wm. Webster, G. Rhodes.
18. On POULTRY.—H. M. Whitney, A. B. Bates, L. Smith, P. J. Gulick, W. H. Rice.
19. On BIRDS and BEES.—A. Bishop, W. Chamberlain, E. P. Bond, R. Armstrong, G. E. Beckwith.
20. On SEASONS.—J. S. Emerson, T. C. B. Rooke, W. H. Pease, W. L. Lee, B. Pitman.
21. On SOILS.—L. Andrews, W. Webster, W. H. Pease, D. Frick, J. S. Emerson.

22. On MANUFACTURES.—R. A. S. Wood, A. Archer, J. T. Gower, A. G. Thurston, S. N. Castle.
23. On MACHINERY.—R. W. Wood, Wm. Ladd, D. M. Weston, C. C. Harris, W. L. Green.
24. On AGRICULTURAL STATISTICS.—R. Armstrong, J. Bartlett, G. Rhodes, B. Pitman, P. Cummings.
25. On COMMERCIAL STATISTICS.—W. Goodale, B. Pitman, P. Cummings, C. S. Bartow, Geo. Pflugger.
26. On ROADS and INTER-ISLAND NAVIGATION.—R. C. Wyllie, W. Webster, T. Metcalf, L. L. Torbert, H. Prendergast.
27. On LABOR and POPULATION.—W. L. Lee, Lot Kamehameha, G. M. Robertson, W. H. Rice, R. Armstrong.
28. On the CUT-WORM and OTHER INJURIOUS VERMIN.—V. Knudsen, C. B. Andrews, J. W. Smith, W. Hillebrand, J. Montgomery.

LIST OF PREMIUMS

FOR THE ANNUAL SHOW AND FAIR TO BE HELD AT
HONOLULU, ON WEDNESDAY, THE 11TH OF JUNE,
1856.

CATTLE.

- 1 Best imported Bull, Silver Cup or \$15.
- 2 2nd-best " " " " or 10.
- 3 Best " Cow, " " or 10.
- 4 2nd-best " " Silver Medal or 8.
- 5 Best Native Bull " " or 8.
- 6 2nd-best " " Bronze " or 5.
- 7 Best Native Cow, Silver " or 8.
- 8 2nd-best " " Bronze " or 5.
- 9 Best yoke of Working Oxen, to be exhibited in the yoke, Silver Medal or \$8.
- 10 Best Milch Cow, Silver Medal or \$8.
Cow to be kept on grass only.
Time of trial from May 1st to June 1st.
Statement to be furnished containing, 1st—The age and breed of the cow, and time of calving. 2nd—The quantity of milk in weight, and also of butter during the trial. 3rd—At least 10 lbs. of the butter, and the statement to be verified by affidavit of competitor and other persons conversant with the facts.
- 11 Best Fat Ox over 4 years, Bronze Medal or \$5.
- 12 " " Steer under 4 years " " or 5.
- 13 " " Cow over 4 " " or 5.

HORSES.

- 14 Best Imported Stallion, Silver Cup or \$15.
- 15 2nd-best " " " " or 10.
- 16 Best " Mare, " " or 10.
- 17 2nd-best " " Silver Medal or 8.
- 18 Best Native Stallion, Silver Cup or 10.
- 19 2nd-best " " Silver Medal or 8.
- 20 Best " Mare, " " or 8.
- 21 2nd-best " " Bronze " or 5.
- 22 Best " 1 year old Stallion, Bronze Medal or \$5.
- 23 " " 1 " " Mare, Book or \$3.
- 24 " " Gelding, Bronze Medal or \$5.
- 25 " pair of Horses, to be exhibited in harness, Silver Cup or \$10.

SHEEP.

- 26 Best Imported Ram, Silver Cup or \$10.
- 27 2nd-best " " Silver Medal or 8.

- 28 Best 2 imported Ewes, Bronze Medal or \$5.
- 29 2nd-best 2 imported Ewes, Book or \$3.
- 30 Best Native Ram, Bronze Medal or 5.
- 31 " 2 " Ewes, Book or 3.
- 32 " 3 " Fleeces, Bronze Medal or \$5.

SWINE.

- 33 Best Imported Boar, Bronze Medal or \$5.
- 34 2nd-best " " Book or 3.
- 35 Best " Sow, Bronze Medal or 5.
- 36 2nd-best " " Book or 3.
- 37 Best lot of pigs under 10 months, Bronze Medal or \$5.

POULTRY.

- 38 Best lot of Poultry owned by exhibitor (statement to be verified by affidavit, Bronze Medal or \$5.
- 39 Best lot of Turkeys, " " or 3.
- 40 " " of Muscovy Ducks, Book or \$3.
- 41 " " of Geese, Book or 3.

DAIRY.

- 42 Best lot of Butter made from 5 cows in 30 consecutive days, 20 lbs. of it to be exhibited in wooden or stone containers, Silver Cup or \$10.
- 43 2nd-best ditto ditto ditto, Silver Butter Knife or \$5.
- 44 Best 3 firkins of Butter, 50 lbs. each, Silver Cup or \$10.
- 45 " sample of " 20 lbs. " Bronze Medal or \$5.
- 46 " Cheese, Bronze Medal or \$5.

SUGAR AND SYRUP.

- 47 Best 100 lbs. Muscovado Sugar, an average sample of not less than 15 tons, to be shown by certificate of the competitor and one other person conversant with the facts, Silver Cup or \$15.
- 48 2nd-best do. do. do., Silver Cup or \$10.
- 49 Best 100 lbs. made by any process, Silver Medal or \$8.
- 50 " 10 gallons Syrup, a fair sample of 10 bbls., to be shown by certificate, Silver Medal or \$8.

COFFEE.

- 51 Best 75 lbs. of Coffee, a fair sample of 2000 lbs., Silver Cup or \$10.
- 52 2nd-best. 75 lbs. of Coffee, a fair sample of 2000 lbs., Silver Medal or \$8.

GRAIN AND SEEDS.

- 53 Best sample of Wheat, half bushel, Silver Cup or \$10.
- 54 2nd do. " " " " Medal or 8.
- 55 3rd do. " " " " Bronze " or 5.
- 56 4th do. " " " " Book, or 3.
- 57 Best 20 ears Indian Corn, Bronze Medal or 5.
- 58 " bushel " " " " or 5.

- 59 Best half-bushel of Oats, Bronze Medal or \$5.
 60 " " of Barley, " " or 5.
 61 " peck White Beans, " " or 5.
 62 " variety of " " " or 5.
 63 " sample of newly introduced Grain, valuable to the farmer, Bronze Medal or \$5.
 64 Best variety of Garden Seeds raised here, Silver Medal or \$8.

FIELD CROPS.

- 65 Best crop of Wheat, not less than 2 acres, or 25 bushels to the acre, Silver Cup or \$10.
 66 Best crop of Indian Corn, do. do. do., Silver Cup or \$10.
 67 " " of Barley, " " " " Medal or 8.
 68 " " of Oats, " " " " " or 8.
 69 " " of White Beans, not less than half an acre, Bronze Medal, or \$5.
 70 Best crop of Irish Potatoes, not less than 2 acres, Silver Cup or \$10.
 71 Best half acre of Tobacco, with account of cultivation, Silver Cup or \$10.
 72 Best half acre of Broom Corn, Bronze Medal or \$5.

N.B. Statements must be furnished by applicants for premiums on field crops: 1st—Previous crop, if any, and how manured. 2nd—Quantity of manure on the crop, manner of its application, quantity and kind of seed used. 3rd—Detailed account of expense of cultivation. 4th—A sample of the product must be exhibited. 5th—The land must be measured, and the survey verified by affidavit.

VEGETABLES.

- 73 Best and greatest variety of Vegetables raised by Exhibitor, Silver Cup or \$10.
 74 2nd-best do. do. do. do., Silver Medal or \$8.
 75 Best Sweet Potatoes, from foreign seed, Silver Medal or \$8.
 76 " 10 Heads Kalo, Bronze Medal or \$5.
 77 2nd-best " " Book or \$3.
 78 Best 12 Stalks Celery, Book or \$3.
 79 " 12 Heads Cauliflower, Book or \$3.
 80 " 12 White Table Turnips, " or 3.
 81 " 12 Carrots, " or 3.
 82 " 6 Table Beets, " or 3.
 83 " 12 Radishes, " or 3.
 84 " 12 Cucumbers, " or 3.
 85 " 12 Parsnips, " or 3.
 86 " 6 Heads of Cabbage, " or 3.
 87 " 5 " of Lettuce, " or 3.
 88 " 12 Tomatoes, " or 3.
 89 " Bunch of double Paisley, " or 3.
 90 " 3 purple Egg Plants, " or 3.

- 91 Best 12 Onions, (seedlings) Book or \$3.
- 92 " 3 Squashes, " or 3.
- 93 Largest Squash or Pumpkin, " or 3.
- 94 Best bushel of Irish Potatoes, " or 3.
- 95 " " of Sweet " " or 3.
- 96 " variety of " " or 3.

FRUITS.

- 97 Best 12 Peaches, Bronze Medal or \$5.
- 98 2nd-best " Book or 3.
- 99 Best dish of Grapes, Brnz. Medal or 5.
- 100 " 12 Turkey Figs, Book or 3.
- 101 " 12 Figs of any kind " or 3.
- 102 " 5 Water Melons, Bronze Medal or \$5.
- 103 Largest do., Book or 3.
- 104 Best 5 Musk Melons, Book or 3.
- 105 Largest 1 " " or 3.
- 106 Best 12 Oranges, Bronze Medal or 5.
- 107 " 6 Lemons, " " or 5.
- 108 " Bunch Bananas, Book or 3.
- 109 2nd-best " " " or 2.
- 110 Best 6 Mangoes, " or 3.
- 111 " 6 Pine Apples, Bronze Medal or 5.
- 112 " 6 Chirimoyas, Book or 3.
- 113 " Alligator Pears, " or 3.

Books will be awarded by the Judges at their discretion, for choice fruits and vegetables not enumerated. The fruits and vegetables for which premiums are awarded, are to be at the disposal of the Society.

No person can receive but a single premium on the same fruit. Premiums will not be awarded unless the samples exhibited are deemed meritorious by the Judges.

FLOWERS.

- 114 Best collection and greatest variety of Flowers, Silver Cup or \$10.
- 115 2nd-best do. " " " of " " Medal or \$8.
- 116 3rd-best do. " " " of " Bronze " or 5.
- 117 Best Floral Design, Silver Medal or \$8.
- 118 2nd-best " " Bronze " or 5.
- 119 3rd best " " Book or 3.
- 120 Best Boquet, Pair of Vases or 5.
- 121 2nd-best " Boquet Holder or 3.
- 122 Best arranged Basket of Flowers, Boquet Holder or \$3.
- 123 2nd-best " " of " Book or 3.
- 124 Greatest variety of Roses.

Discretionary premiums will be allowed in addition to the above. The flowers to be at the disposal of the Society.

FARM IMPLEMENTS, &c.

125	Best domestic manufactured Harrow, Bronze Medal or \$5.
126	" " " Cultivator, " " or 5.
127	" " " Ox Cart, Silver " or 8.
128	" " " Ox Yoke, Bronze " or 5.
129	" " " Churn, " " or 5.

DOMESTIC MANUFACTURES.

130	Best dom. manufactured 1 doz. Brooms, Bronze Medal or \$5.
131	" " " 3 Hats, " " or 5.
132	" " " 3 Door Mats, " " or 5.
133	" " 3 Floor, Table or Sleeping do., " " or 5.
134	" pair Knit Stockings, Book or \$3.
135	" Linen Bosom Shirt, " or 3.
136	" Ornamental Needle Work, Book or \$3.
137	" worked Ottoman Cover, Diploma or 2.
138	" " Chair Cushion and Back, Diploma or \$2.
139	" variety of Worsted Work, " or 2.
140	" worked Collar and Handkerchief, " or 2.
141	" 2 lamp-stand Mats, " or 2.
142	" Ornamental Shell or Fancy Work, " or 2.
143	" Specimen Leather Flowers, " or 2.
144	" Salted Beef, sample of 20 bbls., Silver Cup or \$10.
145	" " Tongues " of 5 " " Medal or 8.
146	" Bacon, dom. man, 100 lbs., " " or 8.
147	" Soap, " " 100 " " Bronze " or 5.
148	" 100 Cigars, sample of 10,000, Silver Cup, or 10.
149	" Pickles, " of 5 bbls., " Medal or 8.
150	" Salt, " of 20 " " " or 8.
151	" Indigo, " of 5 lbs., " " or 8.
152	" Arrow Root, " of 200 " " " or 8.
153	2nd-bst. " " " of " " Bronze " or 5.
154	Best Poha Jelly or Marmalade, " " or 5.
155	" Guava " or " " " or 5.
156	" Tanned Native Goat Skin, " " or 5.
157	" " " Cow-hide, " " or 5.
158	" Boots made of nat. tan'd leather " " or 5.
159	" Shoes " of " " " " or 5.
160	" Saddle " at the Islands, " " or 5.
161	" Bridle " at the " " Book or 3.
162	" Bread " of Hawaiian Flour, Cup or \$10.
163	2nd-bst. " " of " " Medal or 8.
164	3rd-bst. " " of " " " or 5.

REQUIREMENTS FROM COMPETITORS.

All exhibitors, except ladies, and natives who are members of auxiliary societies, paying their subscription fees into the parent Society, must become members of the society, in order to take a premium, and

must have their articles and animals *entered on the Secretary's Books, not later than TUESDAY, JUNE 10th, 1856.*

All articles for exhibition must be delivered to the Committees appointed for the reception and arrangement of articles as early as Wednesday morning, 9 o'clock, A.M., except flowers, which will be received until 10 A.M.

Horses and all other animals must be brought to the ground as early as half-past 10 o'clock, A.M.

Persons intending to exhibit are specially requested to forward their entries to the Secretary at the earliest date possible, as it will greatly facilitate the business of the show and the making of the preliminary arrangements necessary thereto.

Articles or animals removed from the ground before the close of the exhibition, (except by permission of the President) cannot receive a premium though awarded.

Articles and animals will be numbered as they are received, and not labeled as heretofore, and prize cards or flags will be attached to the successful articles or animals immediately after the decision of the Judges.

INSTRUCTIONS FOR THE JUDGES AND SUPERINTENDENTS.

The Judges will meet on the grounds precisely at 11 o'clock, on Wednesday, receive the list of entries, and then proceed to decide upon the merits of the different articles and animals submitted to them, reference being made to the numbers affixed to each.

A Superintendent will attend each set of Judges, point out the different articles and animals to be examined, and attach prize cards or flags to the successful articles and animals.

The Judges will report not only the animals entitled to premiums, but also those *next in merit* in each class, to meet the contingency of any objection that may be made to the awards. They will also report any animals which in their opinion deserve special commendation.

In all articles on exhibition where competition is not made, the Judges *shall withhold premiums*, unless the article is of such superior merit as to be entitled to the award.

In all cases the *Diploma* of the Society is to be awarded *ONLY as evidence of SUPERIOR MERIT.*

Animals, implements and articles which have heretofore received the first premium of the Society may be allowed to compete, and if adjudged superior to any other on exhibition, will be awarded the *Certificate* of the Society to that effect, or the *Diploma* of the Society, at the option of the exhibitor.

NAMES

OF THE MEMBERS OF THE ROYAL HAWAIIAN AGRICULTURAL SOCIETY.

LIFE MEMBERS.

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Hubertson, Geo. Fred.	Montgomery, John
Janion, Robt. C.	Peirce, Henry A.
Kamehameha, H. H. Prince Lot	Pitman, Benj., Vice-Consul for
Kenway, Geo. S.	Chile.
Lee, Wm. L., H. H. M.'s Chief	Wood, R. W.
Justice.	Wyllie, R. C., H. H. M.'s Min.
Makee, Jas.	of Foreign Relations.
Marshall, Jas. F. B.	

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Adams, D.	Bal, Eugene
Aldrich, W. A.	Baldwin, D.
Alexander, W. P.	Barnard, J. C.
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Finance.	Bates, A. B., H. H. M.'s Law
Allen, William	Adviser.
Andrews, C. B.	Beckwith, G. E.
Andrews, L., sen., H. H. M.'s	Bishop, C. R.
Judge of Probate.	Bond, E. P.
Andrews, L., jun.	Brewer, C., 2nd.
Archer, A.	Brinchley, J. L.
Armstrong, R., H. H. M.'s Min.	Brown, J. H.
of Public Instruction.	Burbank, S.
Austin, J. W.	Brown, M.
Anthon, L. H., Royal Danish	Burdick, James A.
Consul.	

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 Cartwright, A. J., jun.
 Castle, S. N.
 Chamberlain, J. E.
 Chamberlain, W.
 Chancerel, V.
 Clark, E. W.
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 Coady, Richard
 Coan, Titus
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 Crosswell, H. J. G.
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 Peru.
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 Dominis, Jno. O.
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 Dowsett, S. H.
 Dwight, S. G.
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 Fornander, Abraham
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 Fuller, J.

Gilman, G. D.
 Goodale, W., Collector-General.
 Gower, G. D.
 Gower, J. T.
 Green, J. S.
 Green, W. L.
 Gulick, P. J.
 Gregg, D. L., U.S. Commissioner.

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 and Norway.
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 Hanks, Fred. L.
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 Harris, C. C.
 Hatcher, J.
 Heuck, C. T.
 Hillebrand, Wm.
 Hoffmann, Ed.
 Hoffmeyer, S.
 Holdsworth, H. S. H.
 Holt, R. W.
 Hopkins, Chas. G., Director of
 the Government Press.
 Howland, H. S.
 Humphreys, Wm.

Ii, Jno., Associate Justice, Sup.
 Court.
 Ingraham, G. B. C.

Janion, Jno.
 Johnson, Ed.
 Johnson, Samuel
 Johnson, W. H.
 Jones, Wm. Ap
 Judd, C. H.
 Judd, G. P.

Knudsen, V.
 Kaauwai, D.
 Kekaulahao, J.

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 Lawrence, Robert
 Lewers, C. H.
 Luce, Geo. H.

McFarlane, H.
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 Manini, F. P.
 Manini, Paul
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 McLean, Geo.
 McDuffie, A. J.

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 Mossman, Thos., sen.
 Macy, Geo.
 Moch, J. A.
 Melchers, G. C.
 Moll, Ed.
 McConnell, Geo.
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Neilson, H. A.
 Newcomb, Wesley

Oudinot, G. A. —

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 Pfluger, J. C., Act. Consul for Sweden and Norway, Bremen and Hamburg.
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 Reiners, Gustave
 Reynolds, Steph.
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 Rhodes, Henry
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 Rice, W. H.
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 Richardson, John
 Risely, Geo.
 Ritson, John
 Rives, Jno. L.

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 Robinson, Jas.
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 Smith, J. M.
 Snodgrass, W. K.
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 Spalding, J. C.
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 Spencer, Steph.
 Stangenwald, Hugo
 Strong, Rev. J. D.
 Sumner, Wm.
 Swinton, Henry

Thomas, G.
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 Torbert, L. L.
 Treadway, P. H.

Vincent, C. W.
 Von Holt, H.

Webster, Wm.
 Weston, D. M.
 Whitney, H. M.
 Whittlesey, E.
 Wideman, H. A.
 Williams, Geo.
 Wond, Wm.
 Wood, J. H.
 Wood, R. A. S.

Young, John, H. H. M.'s Min. of the Interior.

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 Dennison, Capt. Sir Wm., R. E., Lieut.-Governor of V. D. Land.
 Dickson, Geo. Fred., London, England.
 Ellsworth, Hon. Henry L., Indiana, U. S. A.
 Emmons, Prof. Ebenezer, Albany, N. Y.
 Ewbank, Hon. Thos., U. S. Commissioner of Patents, Washington, D. C.
 Grey, Sir George, Governor of New Zealand.
 Henry, Joseph, L. L. D., Smithsonian Institute, Washington, D. C.
 Hooper, Wm., San Francisco, Cal.
 Johnson, B. P., Albany, N. Y.
 Johnson, — M. D., Tahiti.
 Lee, Hon. D., Georgia, U. S. A.
 Petton, John M., N. Orleans, U. S. A.
 Seaman, Berthold, London, England.
 Skinner, John S., Washington, D. C.
 Teschmaker, Jas. E., Boston, U. S. A.
 Vattermare, Alex., Paris, France.
 Velasquez, Don Jose Maria, Havana.
 Warren & Son, San Francisco, Cal.
 Mueller, Ferd., Melbourne.
 Klee, Mons., Guatemala.

ERRATA.—Page 75, 2 lines from the bottom, instead of diminished syphilis * * * * * one-fifth, read reduced syphilis in the army in one year to one-half, and in four years to one-seventh.

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