OBSERVATIONS

ON THE STATE OF THE

ABORIGINAL INHABITANTS OF NEW ZEALAND.

BY

F. D. FENTON,

THE COMPILER OF THE STATISTICAL TABLES OF THE MAORI POPULATION.

NOTE.—The object of the publication by the Government of this Paper is to draw attention to the state of the Native Population,—especially to its decrease in numbers,—with a view to invite inquiry as to the cause, and suggestions of a remedy.

AUCKLAND:

PRINTED BY W. C. WILSON, FOR THE NEW ZEALAND GOVERNMENT,
AT THE PRINTING OFFICE, SHORTLAND CRESCENT, AUCKLAND.

1859.

OBSERVATIONS

ON THE STATE OF THE

ABORIGINAL INHABITANTS OF NEW ZEALAND.

BY

F. D. FENTON,

THE COMPILER OF THE STATISTICAL TABLES OF THE MAORI POPULATION.

NOTE.—The object of the publication by the Government of this Paper is to draw attention to the state of the Native Population,—especially to its decrease in numbers,—with a view to invite inquiry as to the cause, and suggestions of a remedy.

AUCKLAND:

PRINTED BY W. C. WILSON, FOR THE NEW ZEALAND GOVERNMENT,

AT THE PRINTING OFFICE, SHORTLAND CRESCENT, AUCKLAND.

1859.

TABLE

SHOWING, AS FAR AS CAN BE ASCERTAINED

THE

ABORIGINAL NATIVE POPULATION

OF

NEW ZEALAND.

TABLE SHOWING (AS FAR AS CAN BE ASCERTAINED) THE ABORIGINAL NATIVE POPULATION OF NEW ZEALAND.

PROVINCES AND DISTRICTS.	Males.			Females.			Totals.
	Under 14.	Above 14.	Total.	Under 14.	Above 14.	Total.	
PROVINCE OF AUCKLAND.							
Ahipara	95	328	423	93	146	239	662
Muriwhenua	15	55	70	12	25	37	107
Mongonui	78	280	358	83	194	277	635
Kaitaia	112	192	304	78	202	280	584
Wangaroa	51	143	194	44	136	180	374
Hokianga	317	1,289	1,606	252	931	1,183	2,789
Kaikohe	38	112	150	25	78	103	253
Te Waimate and Te Kawakawa	129	410	539	100	271	371	910
Bay of Islands	108	342	450	72	209	281	731
Wangarei	79	154	233	79	117	196	429
Ngunguru	40	70	110	40	50	90	200
Upper Kaipara	70	150	220	60	110	170	390
Lower Kaipara	57	250	307	43	140	183	490
Central Waikato	170	213	383	139	166	305	688
Lower Waikato	389	641	1,030	223	476	699	1,729
Lower Waipa	66	148	214	30	48	78	292
Central Waipa	106	239	345	83	192	275	620
Aotea	32	131	163	45	130	175	338
Whaingaroa..	80	155	235	48	141	189	424
„ Sea Coast to Waikato ..	35	67	102	16	58	74	176
Kawhia	109	221	330	73	167	240	570
Upper Waipa	207	409	616	165	301	466	1,082
Mokau and ditto	237	639	876	184	443	627	1,503
Rangiaowhia	154	364	518	148	297	445	963
Horotiu	179	565	744	177	478	655	1,399
„ Upper	100	245	345	90	100	190	535
Thames	281	531	812	228	388	616	1,428
Auckland City	10	68	78	18	61	79	157
Waitemata	43	143	186	27	72	99	285
Gulf of Hauraki	26	104	130	19	65	84	214
Te Wairoa	37	88	125	31	74	105	230
Coromandel	48	116	164	60	127	187	351
Mercury Bay	11	20	31	9	16	25	56
Manukau	121	204	325	87	179	266	591
Mangawhai	24	40	64	14	27	41	105
Carried forward	3654	9126	12,780	2895	6615	9510	22,290

TABLE SHOWING (AS FAR AS CAN BE ASCERTAINED) THE ABORIGINAL NATIVE POPULATION OF NEW ZEALAND—*continued.*

PROVINCES AND DISTRICTS.	Males.			Females.			Totals.
	Under 14.	Above 14.	Total.	Under 14.	Above 14.	Total.	
PROVINCE OF AUCKLAND—*continued.*							
Brought over	3654	9126	12,780	2895	6615	9510	22,290
Turanga, Hick's Bay, &c. (estimated) ..	..*	..*	4,050	..*	..*	2,750	6,800
Turanga .. .. do. ..	..*	..*	550	..*	..*	450	1,000
Rotorua, Maketu, Tarawera, &c. do. ..	..*	..*	1,210	..*	..*	1,050	2,260
Whakatane, Opotiki, &c. do. ..	..*	..*	1,960	..*	..*	1,880	3,840
Taupo .. .. do. ..	180	900	1,080	120	800	920	2,000
Not detailed	..*	..*	..*	..*	..*	..	26
Waikato, Strangers in..	..	..	..	..	..	..	53
Totals in Province of Auckland ..	..	..	..	..	..	..	38,269
PROVINCE OF NEW PLYMOUTH.							
Cape Egmont North to the Patea R. South..	170	550	720	155	460	615	1,335
Te Poutoko to Hauranga	11	45	56	7	31	38	94
Hamapari to Mokotunu	15	51	66	9	21	41	107
Warea	20	55	75	11	40	51	126
Okawa to Tipoka	14	39	53	9	22	31	84
Waitaha to Pungaereere	6	18	24	7	10	17	41
Te Takapu to Te Umuroa	13	44	57	8	23	31	88
Waiaua to Otumatua	3	1	4	0	1	1	5
Te Kawau, Te Hua, Mangati, Moturoa, &c. ..	33	146	179	30	104	134	313
Te Taniwha, &c.	8	44	52	9	28	37	89
Huirangi, Waitara, &c.	52	321	373	51	179	230	603
Mangoraka and Waiongana	21	71	92	4	34	38	130
Totals in Province of New Plymouth ..	366	1,385	1,751	300	964	1,264	3,015
PROVINCE OF WELLINGTON.							
Waitotara	51	154	205	44	121	165	370
Lower Wanganui	75	202	277	69	168	237	514
Middle Wanganui	271	964	1,235	236	739	975	2,210
Upper Wanganui	63	169	232	63	139	202	434
Tributaries of the Wanganui	67	164	231	56	142	198	429
Rangitikei	94	248	342	85	220	305	647
Rangitikei to Manawatu	81	322	403	66	187	253	656
Manawatu	4	26	30	5	18	23	53
Manawatu to Otaki	75	252	327	70	176	246	573
Otaki	47	175	222	39	120	159	381
Waikanae to Porirua	46	174	220	34	126	160	380

Porirua

* Information not obtained.

TABLE SHOWING (AS FAR AS CAN BE ASCERTAINED) THE ABORIGINAL NATIVE POPULATION OF NEW ZEALAND—*continued.*

PROVINCES AND DISTRICTS.	Males.			Females.			Totals.
	Under 14	Above 14	Total,	Under 14	Above 14	Total.	
PROVINCE OF WELLINGTON—*continued.*							
Porirua	11	41	52	6	45	51	103
Upper Hutt	18	53	71	16	37	53	124
Lower Hutt	47	188	235	41	120	161	396
Wellington	3	33	36	3	24	27	63
Wairarapa Coast	56	125	181	45	83	128	309
Wairarapa Valley	73	111	184	56	101	157	341
Castle Point and Northwards	19	57	76	13	27	40	116
From Table Cape to Ahuriri	464	1,079	1,543	419	882	1,251	2,794
Ahuriri to Takitaki River	101	289	390	82	208	290	680
Takitaki to Porangahau	27	84	111	20	68	88	199
Totals in Province of Wellington ..	1,693	4,910	6,603	1,468	3,701	5,169	11,772
PROVINCE OF NELSON.							
Town of Nelson	..	6	6	..	3	3	9
Suburban North	7	7	14	3	7	10	24
Motueka	12	59	71	12	43	55	126
Massacre Bay and the Coast from Sandy Bay to West Wanganui ..	20	112	132	17	60	77	209
Coast from Wakapuaka to Pelorus, with D'Urville's Island ..	39	30	119	20	28	48	167
Queen Charlotte's Sound and Port Gore ..	27	170	197	20	119	139	336
Pelorus and Kaituna	15	47	62	12	27	39	101
Wairau and Port Underwood	13	78	91	5	52	57	148
Totals in Province of Nelson † ..	133	556	692	89	339	428	1,120
PROVINCE OF CANTERBURY.							
Turao	59	247	306	48	190	238	544
Not detailed	..*	..*	43	..*	..*	51	94
Totals in Province of Canterbury ..	59	247	349	48	190	289	638
PROVINCE OF OTAGO.							
New River and Oue	5	13	18	6	8	14	32
Jacob's River	14	26	40	12	24	36	76
Orauka	11	21	32	12	25	37	69
Moeraki	12	57	69	7	40	47	116
Waikouaiti	14	50	64	6	38	44	108
Otago	9	37	46	11	30	41	87

* Information not obtained.

† Taken from the statistics for 1855, published by the Provincial Government at Nelson. The numbers are believed be now somemhat less.

TABLE SHOWING (AS FAR AS CAN BE ASCERTAINED) THE ABORIGINAL NATIVE POPULATION OF NEW ZEALAND—*continued.*

PROVINCES AND DISTRICTS.	Males.			Females.			Totals.
	Under 14.	Above 14.	Total.	Under 14.	Above 14.	Total.	
PROVINCE OF OTAGO—*continued.*							
Taieri	3	11	14	4	13	17	31
*———	1	1	2	2	2	4	6
Totals in Province of Otago ..	69	216	285	60	180	240	525
Stewart's Island and Ruapuke (estimated) ..	..	..	110	..	..	90	200
Chatham Islands	..	..	247	..	..	263	510
General Totals	..	..	31,667	..	..	24,303	56,049

* Name not given.

MEMORANDUM No. 1.

(CONCERNING THE CENSUS OF 1858.)

The accompanying statistical compilation of the Maori population has been prepared from returns furnished by local collectors, to whom limited districts of enquiry were respectively assigned. The gentlemen employed were selected from among those whose pursuits bring them into constant intercourse with the Native race, and who are therefore best able to acquire the information desired, without exciting jealousy or suspicion. Mode of enumeration.

As the value of these statistics is proportionate to the degree of reliance which they are entitled to, the following remarks are extracted from the reports of the collectors in order to enable the reader to form his own opinion on the subject. Value of information.

Mr. Halse (Taranaki)—speaks of "the prejudice with which the Natives regard any attempt to form an estimate of their number" as an impediment to the more speedy accomplishment of his task.

The Rev. Mr. Reimenschneider, (Taranaki):—"From my long connexion and intimate acquaintance with the Taranaki tribes I have been enabled to collect the above facts and figures, which I believe to be—more especially as regards the population itself—as true and correct as it can be ascertained. Owing to the very unfavorable prejudice with which the Natives are wont to regard, and to meet anything, on the part of the Government and the Europeans generally, which is calculated to form an estimate of their number and possessions, it is a matter of exceeding great difficulty to obtain a census of them, such as is exact in every point and item."

Mr. Smith, (Auckland) :—"The accuracy of these returns (Kaipara, Thames, Manukau, &c.,) may be relied on, the data upon which they are founded having been ascertained with care." With respect to the population of the Rotorua District, he says, "The Rev. C. M. Spencer, who has undertaken to fill up returns for Rotorua and Tarawera, informs me that he has hitherto found it impossible to complete the task, owing, in some measure, to reluctance on the part of the Natives to communicate the requisite information, and also to the fact that the population is scattered and fluctuating."

Mr. St. Hill, (Wellington, &c.) :—"Mr. Buller has been most careful in procuring the requisite information within a radius of about 20 miles from Wellington."

Major Durie, (Wanganui, &c.) :—"The information may be depended upon as being as correct as the circumstances will allow."

Mr. Fenton, (Waikato) :—"During my enquiries as to the population, I met with less suspicion than I expected, only one tribe entirely refusing information."

Mr. White, (Mongonui, &c.) :—"The utmost care in my power has been exercised to insure these returns being as correct as possible. Every settlement has been visited, and, much to my surprise, the information sought has been freely given by the Natives."

Mr. Hamilton, (Canterbury) :—"With the exception of the very slight information obtained by myself respecting Arahura, these returns are summaries of a carefully detailed statement prepared by his Honor Mr. Fitzgerald, in which the name of each Maori in the province is shown."

Mr. Wardell, (Turanga, &c.) :—"I have used every effort to make these returns complete, but it is a matter of great difficulty to obtain true statistics in matters connected with the Native population, as they are generally suspicious of any enquiries as to their numerical strength or social position, and ill-disposed to afford the necessary information ; but I believe the inclosed returns to approximate as near the truth as is possible without a systematic census being taken."

The Rev. Mr. Taylor, (Whanganui and Taupo) :—"I have taken the census with very great care, correcting it with previous ones taken at intervals during the last 15 years, and I can therefore vouch for its correctness."

Mr. Johnson, (Wangarei, &c.) :—"The returns of population and stock are tolerably accurate."

The remaining enumerators have made no allusion to the accuracy or otherwise of the information supplied by them.

From the foregoing remarks a favourable estimate of the value of the census may be formed. Still it is evident that elements of uncertainty must exist in information, obtained for the most part in a somewhat cursory manner, from a people to whom thought is often an exertion, and who have little idea of the age of even the younger branches of their own families. The division of the population into two classes—of non-adult and adult—not so

trustworthy as the numbers of the total population.

The total numbers, male and female, may, I believe, be received without distrust. Those given for the Province of Canterbury are absolutely accurate; those for Nelson and Otago, a close approximation. The statistics of the population of the Provinces of the Northern Islands are also presented as trustworthy, with the exception of those for some portion of Auckland, in which the numbers are merely estimates, and are stated as such.

The division at the age of fourteen into two classes—Adult and Non-Adult—must not be regarded as equally correct, necessarily depending on the varying conjecture of the individual collector, or the still more uncertain fancy of his Native deputy.

Value of the information as to stock and crops.

The returns, as to the population, are complete, purporting to contain the whole aboriginal population of the colony, (except the Chatham Islands,) but the information as to the amount of stock, and the area of land under native cultivation, is defective and in some cases manifestly erroneous. For instance, at Kaipara Lower, the number of acres in cultivation for wheat, barley, oats, maize, potatoes, and garden, is stated to be 1779; the number devoted to "other crops" 870. The formation of even an approximate estimate, among unsurveyed lands, is not to be expected.

There is even reason to think, that any comprehensive scheme to obtain precise information on these subjects would, for some years to come, be rendered nugatory by the ignorance and suspicion of the Maori themselves. The operation of these impediments to statistical knowledge has not been unfelt even in England, and offers much greater obstruction to inquiry in New Zealand, where any proceedings having reference to land are viewed with peculiar suspicion. "There is reason to believe," says Mr. Porter, in his valuable work *The Progress of the Nation*, "that if any comprehensive measure were adopted by the Government, with a view to ascertain the actual condition of the country, as regards its agriculture, so much jealousy and so many groundless fears would be excited in the minds of the persons from whom the information must be sought, that the returns obtained would be extremely erroneous, or so incomplete as to be of little value."

The remarks in this memorandum, therefore, are confined to the question of population.

MEMORANDUM No. 2.

(CONCERNING THE ALLEGED DECREASE OF THE MAORI POPULATION.)

Opinions of the enumerators as to the progress of the population.

The continuous decrease, in numbers, of the Native race is, I believe, admitted by nearly all those who have had the means of forming an original opinion on the subject.

Before entering upon the question of cause, it may be well to quote the remarks of those census collectors who have offered any opinion as to the fact. The reasons assigned by them in support or explanation of their opinions will be found in a subsequent part of this memorandum.

Mr. Heaphy :—"I have long considered that the Maori population was over-estimated as to number, and also that it was fast diminishing. The papers will show that, for the area occupied, it is scanty in the extreme, and that the relative proportion of females to males, and of children to adults, is such as to indicate, as far as the data go, the extinction of the race in a few generations."

Mr. Smith :—"The Ngatiwhakaue tribes are very rapidly on the decrease."

Mr. Kemp, (Bay of Islands) :—"A perceptible increase in the population has taken place over many previous years, and the deaths are less frequent."

Mr. Halse :—"I am unable to report in any way favourably of the general condition of the Natives of the New Plymouth District."

The Rev. Mr. Reimenschneider :—"In 1847, the number of souls in this district amounted to no less than 900 and upwards. Their decrease to the present number (588) has resulted from *no other cause but mortality*. There have been no removals to other parts of the country, but, on the contrary, there has been, more or less, a continued influx of Taranaki Natives, who, at different times and in various parts of the island, have been released from slavery, and have come back and taken their permanent abode here. But for this circumstance, the figures in the above schedule would have been considerable less than they now stand. One-third at least of the whole population adult are men and women, who are under the decay of nature from old age and who gradually disappear. Mortality is keeping on in steady progress among the whole population, but the most striking feature connected with it is, that it predominantly affects and carries off the younger and youngest people of both sexes. In proportion to the number of deaths that occur, the number of births are, (and have been for more than the last ten years,) far too inadequate to counteract the decrease of the numerical strength of this tribe, so as to secure to it (this tribe) a permanent, or even a long-continued existence as such."

The Rev. Mr. Snackenberg :—"They are less sickly than some others, I think, but are, nevertheless, decreasing."

The three last named gentlemen speak of the same district,—that district which has been more peculiarly agitated by intestine commotions, and the attendant distresses, all tending to shorten life. Their opinions can, therefore, be held to have little general value, and must be construed as applicable only to that portion of the country of which they speak.

Mr. Kemp's remark appears to apply merely to the past year, as compared with previous years. The increase must be very great indeed, that can produce perceptible effects in one year.

Absense of previous official information.

The absence of any previous official census of the Maori population deprives the present enumeration of much of the value that would otherwise belong to it, as affording a certain means of ascertaining the rate at which the people are increasing or decreasing, by comparison with their numbers in previous years. This deficiency has, in some measure, and to a certain extent, been supplied by the kindness of the Reverend Messrs. Maunsell, Ashwell, and Morgan, the resident Church of England Missionaries of the Waikato District, who have furnished the writer with a copy of a very perfect nominal census of the people in that great district, for the year 1844, in which, fortunately, the age of division into adult and non-adult members, is the same as in the census now under consideration. The period of time which has since elapsed, being just 14 years, further simplifies investigation, and affords a very easy proof that all the children, now members of the tribes which these gentlemen numbered, who do not appear in the census of 1844 (immigrants excepted) must be under the age of 14 years.

Census taken by the missionaries in 1844.

Comparison of population of 1844 with that of 1858.

With a view to remove the doubt which must attend all calculations based upon figures the perfect accuracy of which is not known, and to obviate the uncertainty which must diminish the value of inferences drawn from premises which are not thoroughly established, recourse has been had to the census above named, and the number of deaths and emigrations amongst the persons then enumerated have been ascertained, in certain tribes indiscriminately taken for the purpose, and also the number of births and immigrations, since the enumeration of 1844.

Certain tribes taken for minute examination.

As all persons conversant with Maori affairs are aware of the great difficulty of obtaining information from, or respecting them, characterized by that great accuracy without which statistics are almost worthless; and as perfect credit will, consequently, not be attached to the information thus obtained, unless evidences of care and caution are abundantly given, the names of the persons alive in 1844 and 1858 respectively, with the whole process gone through, is furnished in the annexed statements.

It may be mentioned, that all the tribes selected for this minute examination, occupy very healthy situations, though of varying physical character, and have made no important migrations during the interval of 14 years, with the exception of Ngatikarewa, who have crossed the river, and a few of Ngatikahu and Tekaitutai, who partially reside now at Tuakau. Ngatitahinga and Ngatikarewa, occupying villages near the mouth of the Waikato, are abundantly supplied with saltwater fish,—Ngatitipa obtain a considerable portion of their food from the same source. Ngatikahu and Tekaitutai form parts of a large tribe, Ngatipou, long celebrated for the value of their eel-preserves; and to the abundance of that food, thence obtained, is attributed the fact, that the members of that tribe are, physically, the largest, and apparently the most healthy, of any Maori in the district. Te Ngaungau, so called from their quarrelsome disposition in former times, inhabit the central plain of Waikato, around Paetai, and, also, obtain large quantities of eels from the adjoining Lake Waikari—Ngatiwhauroa reside on the belt of sandy soil, bordering the river, where it passes through the gorge of the Taupiri range of mountains. The Ngatimahuta people the banks of the lower Waipa for twenty miles, following the serpentine course of the river; and Ngatihinetu and Ngatiapakura are well known as the great wheat-producing tribes cultivating the fertile district around Rangiaohia.

In fact, the food and habits of the people included in this investigation differ in no material matter from those of the great bulk of the aborigines, with the exception that the Rangiaohia people commenced at an earlier period the cultivation of wheat, and continue, to a greater extent than most tribes, the consumption of flour as an ordinary article of food.

It will be observed, that several of the male adults of the tribes Ngatikahu and Ngatitipa are recorded as "shot." These lives were lost at the battle of Te Ihutaroa, in 1846; but the Europeans who then resided near the scene of action, and were in daily intercourse with the people, agree in the opinion that none of the usual evils of a state of war seriously affected the general population, and that the deaths resulting therefrom, were, in fact, confined to those which occurred in the field.

Unfortunately, it cannot be alleged, that the presence of deaths by violence, in these statements, will reduce the cases taken to exceptional ones.

These statements are subsequently referred to as Table No. 1.

I.

TABLE I.

NOTE.—In the succeeding Statements the letters annexed to the names of the Adult Females mean:—*a* has born children who lived; *b* has born children who died; *c* barren.

The first column of figures is a consecutive numbering of the Adult Males; the second column the same of the Adult Females; the third column indicates the number of the Male who was or is the Husband of the Female; the fourth column and the fifth column contain the number of the Adult Female who is the Parent of the Child opposite which the figure is written. When no figure is written, the name of the Mother is not contained in the list.

TABLE shewing the Names of the Adult and Non-Adult Members of the Tribe NGATIKAREWA, residing near Waikato Heads, in 1844, with the survivors in 1858.

Adult in 1844.								Non-Adult in 1844.					
Males.			Females.					Males.			Females.		
Number.	In 1844.	Alive in 1858, with new name (if so.)	Number.	In 1844.	Number of Husband.	Alive in 1858, with new name (if so.)		In 1844.	Number of Mother.	Alive in 1858, with new name (if so.)	In 1844.	Number of Mother.	Alive in 1858, with new name (if so.)
1	Toke	Toke	1	Tiraha	4,3	Tiraha	*b*	Whitikaho	2	Whitikaho	Te Kau	2	
2	Amohau	(Shot)	2	Te Ata	3	Te Ata	*a*	Wiremu	14	Wiremu	Kaiwaka	14	Kaiwaka.
3	Ngakete	Ruhiana	3	Arohaki	4,3	Arohaki	*a*	Hori	5	Hori			
4	Pakanae	Pakanae	4	Hara	3	Hara	*a*	Paingahuru	2				
5	Hone	...	5	Rangihau	3	Rangihau	*a*						
6	Hokohinu	Hokohinu	6	Hinewera	7	Hinewera	*b*						
7	Pangonui	...	7	Heka		Heka	*c*						
8	Te Putu	Te Putu	8	Hua		Hua	*a*						
9	Rapana	Emigrated	9	Ngahuia	5	Ngahuia	*c*						
			10	Harata			*c*						
			11	Te Reinga			*b*						
			12	Hana			*c*						
			13	Tohitu			*a*						
			14	Makarini			*a*						
			15	Kaupapa			*c*						

SUMMARY.

	Adult.		Non-Adult.		Total.	
	Males.	Females.	Males.	Females.	Males.	Females.
Total Population in 1844 .	9	15	4	2	13	17
Deduct emigrated to 1858 .	1	0	0	0	1	0
Numbers for comparison .	8	15	4	2	12	17
Deaths between 1844 and 1858	3	6	1	1	4	7
Surviving in 1858 . . .	5	9	3	1	8	10

II.

TABLE shewing the Names of the Adult and Non-Adult Members of the Tribe NGATIKAREWA in 1858.

Adult.					Non-Adult.			
No.	Males.		No.	Females.	No. of Mother.	Males.	No. of Mother.	Females.
	Adults in 1844.		1	Tiraha *b*	2	Paengahuru	2	Te Kau
1	Ngakete or Ruhiana		2	Te Ata *a*	2	Infant		
2	Pakanae		3	Arohaki *a*	3	Hohua		
3	Toke		4	Hara *a*	14	Muriwhenua		
4	Hokohinu		5	Rangihau *a*	8	Kaipuke		
5	Te Puta		6	Hinewera *b*	8	Kapihana		
			7	Heka *c*	8	Pokaiaka		
6	Whitikaho	Non-Adult in 1844	8	Hua *a*	16	Erietera		
7	Wiremu		9	Ngahuia *c*				
8	Hori		10	Kaiwaka				
9	Kima	Immigrated.	11	Mata *c*				
10	Tipene		12	Hariata				
11	Tainoa		13	Harata *c*				
			14	Hopai Immigrated. *a*				
			15	Riripeti *a*				
			16	Huihuiora *a*				
			17	Ngareti *c*				

SUMMARY.

	Adult.		Non-Adult.		Total.	
	Males.	Females.	Males.	Females.	Males.	Females.
Total Population in 1858 .	11	17	8	1	19	18
Deduct Immigrants . .	3	7	0	0	3	7
Population for comparison .	8	10	8	1	16	11

Number of adult Females who have born issue, now living	8
Ditto ditto ditto dead	2
Ditto barren	5
Ditto productiveness unascertained	2

III.

TABLE showing the Names of the Adult and Non-Adult Members of the Tribes NGATIKAHU and TEKAITUTAI, sub-divisions of NGATIPOU, residing at Tuakau, Te Kakenga, Te Onewhero, and elsewhere, in the year 1844, and the survivors in 1858.

Adult in 1844.							Non-Adult in 1844.					
Males.			Females.				Males.			Females.		
Number.	In 1844.	Alive in 1858, with new name (if so.)	Number.	In 1844.		Number of Husband.	Alive in 1858, with new name (if so.)	In 1844.	Number of Mother.	Alive in 1858, with new name (if so.)	In 1844.	Number of Mother.	Alive in 1858, with new name (if so.)
1	Ihaka	Ihaka	1	Rangioke	*a*	1	Rangioke	Heta	13	Heta	Mihipepene	12	
2	Potoromu	Potoromu	2	Hera	*a*	2	Hera	Hohepa	13	Hohepa	Roka	13	Mihipepene
3	Wairemu Tawhio	W. Tawhio	3	Kuraiti	*a*	5	Kuraiti	Erueti	2	Erueti	Mihi Korama	2	Roka
4	Te Waka	Te Waka	4	Wariwari	*a*	13	Wariwari	Ihaka	3	Ihaka	Ani	2	Mihi Korama
5	Hohua Taitani	H. Taitani	5	Hemuata	*c*	7	Hemuata	Pokiwaho	9	Pokiwaho	Ripora	13	Ani
6	Rupene	Rupene	6	Riria	*c*	9	Riria	Te One	9	Te One	Mata Ripeka	13	...
7	Hemi	Hemi	7	Wekuweku	*a*	14	Wekuweku	Rerehau	9	Rerehau	Pirihira	3	...
8	Taukawe	Taukawe	8	Potohaka	*a*	15	Potohaka	Rahoroi	10	Rahoroi	Nohomari	23	...
9	Korongi	Korongi	9	Makehu	*a*	10	Makehu	Pukeiti	11	Pukeiti	Hana	18	...
10	Nitiniti	Nitiniti	10	Kumenga	*a*		Kumenga	Tinipaketi	18	Tinipaketi	Mere Paora	44	...
11	Te Aria	Te Aria	11	Rangiutaina	*a*	18 / 32	Rangiutaina	Matene	24	Matene	Erihapeti		Mere Paora
12	Te Tewe	Te Tewe						Hongihongi	slave	Hongihongi	Kawatania		Erihapeti
13	Horopapera	...	12	Punanga	*c*	19	Punanga	Utika	13	...	Rangirerewa		Kawatania
14	Poihakene	...	13	Miriama	*a*	13	...	Henare	2	...	Pukapuka	32	Rangirerewa
15	Ngarere	...	14	Te Iti	*c*	8	...	Infant	13	...	Wahine	41	Pukapuka
16	Pona	...	15	Te Wai	*c*	16	...	Pokepoke	8	...	Rangitawara		Wahine
17	Parihi	...	16	Turituri	*c*		...	Ngamako	10	...	Toitoi	41	...
18	Ngatake	...	17	Kita	*b*	20	...	Teiakaha	23	...			Emigrated
19	Huke	...	18	Tahuhu	*a*		...	Te Pepene		Te Pepene			
20	Taitoko	...	19	Tao	*b*		Tao	Hoeta		Hoeta			
21	Te Rato	...	20	Pona	*a*		Pona	Eparaima		Eparaima			
22	Haki	...	21	Taira	*c*		...	Iraia	1	Iraia			
23	Mahanga	Emigrated	22	Tete	*c*		...	Tinga	43	Tinga			
24	Paora	Paora	23	Uaha	*a*	23	Emigrated	Hone	34	Hone			
25	Hetaraka	Hetaraka	24	Rangihaere	*a*		do.	Pina	39	Pina			
26	Ahiwera	Ahiwera	25	Rehara	*a*		do.	Patoromu	30	...			
27	Hakere	Hakere	26	Waimatao	*a*	40, 6	Waimatao	Motumotu	1	...			
28	Parera	Parera	27	Ngawiki	*a*	24	Ngawiki	Toetoe	41	Emigrated			
29	Katipa	Katipa	28	Meri	*a*	26	Meri						
30	Ihakara	Ihakara	29	Parewai	*c*	41	Parewai						
31	Hoe	Hoe	30	Hi	*a*	29	Hi						
32	Hoera	Hoera	31	Pukewahine	*a*		...						
33	Tapahi	Tapahi	32	Onewhero	*a*	37	Onewhero						
34	Enoka	...	33	Meri Paora	*a*		Meri Paora						
35	Rohutu	...	34	Rangikapu	*a*		Rangikapu						
36	Kerehoma	(Shot)	35	Rangitakahia	*c*	27	Rangitakahia						
37	Hiahia	(Shot)	36	Potopoto	*c*		Potopoto						
38	Waitara	(Shot)	37	Hineore	*c*		Hineore						
39	Ohaia	(Shot)	38	Ngaingai	*b*		Ngaingai						
40	Wiremu Ahiwera	(Shot)	39	Ngatiti	*a*		Ngatiti						
41	Waikato	...	40	Kihikihi	*b*		Kihikihi						
			41	Makehu	*a*		Makehu						
			42	Ngati	*c*		Ngati						
			43	Rangihapu	*a*	33	...						
			44	Mata Paora	*a*		...						

SUMMARY.

	Adult.		Non-Adult.		Total.	
	Males.	Females.	Males.	Females.	Males.	Females.
Total Population in 1844 . .	41	44	28	17	69	61
Deduct Emigrations to 1858 .	1	3	1	1	2	4
Numbers for comparison . .	40	41	27	16	67	57
Deaths between 1844 and 1858 .	18	11	8	6	26	17
Surviving in 1858 . . .	22	30	19	10	41	40

TABLE showing the Names of the Adult and Non-Adult Members of the Tribes NGATIKAHU and TEKAITUTAI in the year 1858.

Adult.					Non-Adult.				Adult.					Non-Adult.	
Number.	Males.	Number.	Females.		Number of Mother.	Males.	Number of Mother.	Females.	Number.	Males.	Number.	Females.		Males.	Females.
1	Ihaka	1	Rangioke	*a*	9	Eparaima	2	Mata	22	Tinipaketi	22	Hi	*a*		
2	Patoromu	2	Hera	*a*	19	Paketai	2	Meri	23	Matini	23	Onewhero	*a*		
3	Wiremu Tawhio	3	Kuraiti	*a*	10	Ngahuka	11	Ngarohi	24	Hongihongi	24	Mere Paora	*a*		
4	Te Waka	4	Wariwari	*a*		Nihotahi	9	Moke	25	Paora	25	Kangikapu	*a*		
5	Hohua Taitani	5	Hemuata	*c*		Iehu	18	Ruku	26	Hetaraka	26	Rangitakahia	*c*		
6	Rupene	6	Riria	*c*	18	Apihai	18	Atereti	27	Ahiwera	27	Potopoto	*c*		
7	Hemi	7	Wekuweku	*a*	19	Hoeta	19	Hara	28	Hakere	28	Hineore	*c*		
8	Taukawe	8	Potohaka	*a*	19	Paora	19	Ngarongo	29	Parera	29	Ngaingai	*a*		
9	Korongi	9	Makehu	*a*	11	Enoka	21	Ngawiki	30	Katipa	30	Ngatiti	*a*		
10	Nitiniti	10	Kumenga	*a*	15	Boy	23	Huhana	31	Ihakara	31	Kihikihi	*b*		
11	Te Aria	11	Rangiutaina	*a*	11	Mu	24	Tepaea	32	Hoe	32	Makehu	*a*		
12	Te Tewe	12	Punanga	*c*	11	Boy	30	Girl	33	Hoera	33	Ngati	*c*		
13	Heta	13	Mihipepene	*b*			7	Maraia	34	Tapahi	34	Mere Paora			
14	Hohepa	14	Roka	*c*					35	Te Pepene	35	Erihapeti	*c*		
15	Erueti	15	Mihi Korama	*a*					36	Hoeta	36	Kawatania			
16	Ihaka	16	Ani						37	Eparaima	37	Rangirerewa			
17	Pokiwaho	17	Waimatao	*a*					38	Eraia	38	Pukapuka			
18	Te One	18	Ngawiki	*a*					39	Tinga	39	Mihi Niumana (img.)			
19	Rerehau	19	Meri	*a*					40	Hone	40	Tao	*b*		
20	Rahoroi	20	Parewai	*c*					41	Puia	41	Pona	*a*		
21	Pukeiti	21	Wahine	*a*					42	Tangataware (img.)					

SUMMARY.

	Adult.		Non-Adult.		Total.	
	Males.	Females.	Males.	Females.	Males.	Females.
Total Population in 1858 . .	42	41	12	13	54	54
Deduct Immigrants . . .	1	1	0	0	1	1
Population for comparison . .	41	40	12	13	53	53

Number of Females who had issue now living	22
Ditto Ditto dead	3
Ditto barren	11
Ditto productiveness unascertained or unknown	5

IV.

Table showing the Names of the Adult and Non-Adult Members of a part of the Tribe Ngatitipa, residing near Waikato Heads, in 1844, with the survivors under their new name (if so) in 1858.

Adult in 1844.

Males.

Number.	In 1844.	Alive in 1858, with new name (if so.)
1	Kukutai	..
2	Moihi	Moihi
3	Poihipi	..
4	Hurori	Huramakape
5	Porima	Waata Kukutai
6	Ngakape	Paraone
7	Te Raoka	Nui
8	Tuahine	Emig. to Ahuriri
9	Kiritewai	Te Kihirini
10	Te Haramite	..
11	Te Oro	..
12	Tekaku	Te Warerahi
13	Panekuhukuhu	Te Reweti
14	Kirea	..
15	Te Waina	Emig. to Hauraki
16	Takaroki	Netana
17	Peho	Ngaone
18	Hoihoi	..
19	Ngakaheru	..
20	Tui	Tui
21	Pungapunga	..
22	Tawharu	..
23	Epanaia	(Shot)
24	Ngama	Pana
25	Pairama	Pairama
26	Toa	Toa
27	Whangapo	Whangapo
28	Terangi	..
29	Tu	Tukaweora
30	Te O	..
31	Pomare	Teira
32	Ihaia	Ihaia
33	Maka Taurangarahi	M. Taurangarahi
34	Tame	(Shot)
35	Ngapake	..
36	Erueti	..
37	Tarera	(Shot)
38	Te Mititai	..
39	Whakawhiti	..
40	Te Reinga	(Shot)
41	Pouaka	Arama Karaka
42	Kemo	Kemo
43	Ngataru	Nini
44	Tawa	..
45	Huka	Nikora
46	Mahia	..
47	Rahuikawau	..
48	Maruite	..
49	Pokepoke	Heta
50	Ruka	Ruka
51	Nini	(Shot)
52	Paramene	Paramene
53	Karena	Karena
54	Heta	..
55	Unahi	Emig. to Hauraki
56	Marae	Petene
57	Rawiri	Rawiri
58	Aperahama	..
59	Te Matenga	..
60	Urupiro	..
61	Te Wahatahi	..
62	T. Te Momi	Tamati Temomi
63	Patoromu	..
64	Tana	More
65	Epapara	..
66	Matai	Pita
67	Apoharama	..
68	Kima	Kima
69	Heremaia	..
70	Ropati	Ropati
71	Hohepa	Hohepa
72	Henare	Henare
73	Te Whareone	Te Whareone
74	Kae	..
75	Te Hari	..
76	Te Whaukotuku	..
77	Maru	..

Females.

Number.	In 1844.		Number of Husband.	Alive in 1858, with new name (if so.)
1	Kahuhina	a	1	Emig. to Kaipara
2	Karoraina	a	2	..
3	Rangiako	a	3	Hariata
4	Erihapeti	a	4	Erihapeti
5	Hara	a	5	Hara
6	Mianga	a	6	Maraea
7	Kiwakiwa	a	8	..
8	Te Reaunga	a	9	Terira
9	Ruhia	a	10	Ruhia
10	Hine	c	11	Hiria
11	Kiri	a	14	..
12	Paemata	a	16	Ramari
13	Kahu	c	18	Matataia
14	Patuere	b	20	..
15	Te Wae	b	17	..
16	Wikitoria	a		..
17	Rongokino	b		..
18	Mano	c		..
19	Parenake	c	64	Mereri
20	Te Ata	a		..
21	Takutai	c	43	Oriwia
22	Muhu	b	22	..
23	Muhukai	a		..
24	Rea	a		Rea
25	Te Amorangi	c	24	Roka
26	Roka	a	25	Roka
27	Nohinohi	a	26	..
28	Moketata	a	26	Rahapa
29	Rangione	a	27	..
30	Te Arataki	b		..
31	Puna	c		..
32	Meri	b		Meri Ngataru
33	Tuoi	b		Tamara
34	Anipatene	a	32	Anipatene
35	Kahakore	c	45	Pinina
36	Ngaki	b	35	Rihitia
37	Rato	a		Emig. to Auckland
38	Turia	a	35	Turia
39	Kirikiri	c	35	Kirikiri
40	Rahitapu	b	35	..
41	Uruherea	c	35	Emig. to Pukaki
42	Ngamanewha	c	35	..
43	Maata	c	36	Maata
44	Pirihira	a	37	..
45	Kiterina	c	39	Emig. to Ihumatao
46	Katene	a	41	Katene
47	Te Oko	c	42	Emig. to the Pakeha
48	Whakataha	a	43	..
49	Taiki	a	44	..
50	Te Hameme	a	46	Te Hameme
51	Ngakumu	c		Emig. to Manukau
52	Kaunga	b		..
53	Ripora	a	42	..
54	Rangitarona	a		Rahera
55	Hira	a	42	..
56	Hariata	a		..
57	Whango	b		Whango
58	Rangiwawae	c		..
59	Ngawhiti	a		Mere Kataraina
60	Hepi	a	50	..
61	Kaitupeka	a	51	..
62	Tihi	a	52	..
63	Raiha	a	54	Raiha
64	Ema	a		Emig. to Hauraki
65	Erihapeti	a	58	..
66	Matehaere	b	59	Emig. to Hauraki
67	Ngarere	c	60	Ngarere
68	Karoraina	b	60	Emig. to Taranaki
69	Huihana	a	63	..
70	Tipao	c	64	Emig. to Taranaki
71	Riripeti	a	65	Emig. to Maioro
72	Te Kuraituhi	b	67	Turuhira
73	Hererunga	c		..
74	Tiwhana	c		Tiwhana
75	Pohoi	c		..
76	Kahumatie	b	52	Kahumatie
77	Kare	a		..
78	Haehae	c		Rutu
79	Te Turi	a	50	Te Turi
80	Metitiria	b		..
81	Ripora	c	72	Ripora
82	Whati	a	73	Ngawai
83	Raetoka	b		..
84	Morungarunga	b		..
85	Tawahi	a		Tawahi
86	Pare	a		..
87	Rangiwhakapuru	c	62	Hera
88	Towhanga	a		Namaha
89	Whakaneke	b		

Non-Adult in 1844.

Males.

Number of Mother.	In 1844.	Alive in 1858, with new name (if so.)
1	Pohepohe	Hori
1	Tautehapa	Te Warena, Tautehapa
2	Hori	..
5	Moke	Maraku
5	Hikaka	..
6	Arumihi	Ngaruawahie
9	Henare	Henare
	Paora	..
	Te Amohau	Epanaia
27	Haereroa	Hohapata
27	No name	..
28	Mangungu	..
34	Rapata	Rapata
44	Henare	..
44	Nikora	..
44	Matiu	..
46	Te Aho	Wiremu
48	Rewharewha	..
49	Matawaerenga	..
50	Purumene	..
61	Toha	..
62	Toroheti	..
62	Ngawhao	Tehena
65	Raiwete	..
65	Ihimaere	Ihimaera
82	Piti	Piti
	Rawiri	..

Females.

Number of Mother.	In 1844.	Alive in 1858, with new name (if so.)
1	Hineonea	Em. to Whatawhata
2	Hara	Hara
2	Heni	Heni
4	Ngamako	Tiriti
5	Ngamote	..
5	Infant	..
9	Wahinehe	Peti Ramari
	Miriama	..
	Erihapeti	..
	Te Paea	..
28	Ngarete	..
29	Tinipouaru	..
38	Ngahuia	Mere Ponamu
	Tiria	Miriama
49	Akenihi	Akenihi
55	Rora	
56	Rangikanoa	
60	Kaone	Hepi
61	Miti	Miti
61	Kanamo	Hariata
62	Rihi	..
	Ponuwhatau	..
88	Puku	Peaterihi

[Continued

V.

NGATITIPA TRIBE—*continued.*

SUMMARY.

	Adult.		Non-Adult.		Total.	
	Males.	Females.	Males.	Females.	Males.	Females.
Total Population in 1844 . .	77	89	27	23	104	112
Deduct Emigrated to 1858 . .	3	11	0	1	3	12
Basis for Statistical comparison .	74	78	27	22	101	100
Deaths between 1844 and 1858 .	37	38	15	11	52	49
Living in 1858	37	40	12	11	49	51

TABLE shewing the Names of the Adult and Non-Adult Members of the same part of the NGATITIPA Tribe, in 1858.

Adult.			No. of Mother in previous Table.	Non-Adult.		
Number.	Males.	Females.		Males.	Number of Mother.	Females.
Adult in 1844. 1	Moihi	Hariata	1	Pinitana	54	Tarati
2	Huramakape	Erihapeti	54	Poihipi	5	Tepaea
3	Waata Kakutai	Hara	54	Reweti	59	Kiriana
4	Paraone	Maraea	2	Mita	7	Hemaima
5	Nui	Terira	†	Pane	12	Maata
6	Te Kihirini	Ruhia	3	Tihata Kukutai	12	Harongi
7	Te Whareraki	Hiria	4	Te Teira	25	Hana
8	Te Rewett	Ramari	7	Hami	25	Makueta
9	Netana	Matataia	7	Heta	48	Miti
10	Ngaone	Mereri	9	Utika	48	Harete
11	Tui	Oriwia	25	Winiata	46	Ripeka
12	Pana	Rea	48	Poihi	65	Infant
13	Pairama	Roka	46	Wiremu	50	Rerepo
14	Toa	Roka	46	Nuitana	82	Wenerei
15	Whangapo	Rahapa	53	Eketu o te rangi		Hara, daughter of Kakato, an immigrant
16	Tukaweora	Mere Ngataru	61	Waipehe		
17	Teira	Tamara	61	Matiu		
18	Ihaia	Anipatene	65	Kima		
19	M. Taurangarahi	Pimina	82	Herepiniha		
20	Arama Karaka	Rihitia	82	Mo e		
21	Kemo	Turia	61	Harawira		
22	Nini	Kirikiri	62	Tangatakino		
23	Nikora	Maata	63	Paratene		
24	Heta	Katene		Henare, son of Kakato, an immigrant		
Immigrated. 25	Topi	Meri		Aramakaraka		Rahera
26	Whamahi	Tepaea		Hira		Infant
27	Hone Piha	Maata		Penata		Tamara
28	Wetere Kawana	Haara		Taati		Miriama
29	Karaka Te Au	Hara		Pehi		Hera
30	Taiwhati	Piko		Raihana		Tiriti
31	Hohua Tamawhare	Ramarihi		Peneharara		Maata
32	Kaiwhata	Riripeti				
33	Pohe	Ripeka				
34	Pana Amohau	Kahuone				
35	Poutotara	Mere				
36	Remirahurahu	Kakato (56)				
37	Matiu Tuwehewehe					
38	Horomona					
39	Nehukaru					
40	Wiremu					
41	Tanga					
42	Puniu					
43	Kirimangungu					
44	Paeturi					
45	Karapu					

Adult—*continued.*			Non-Adult—*continued.*		
Number.	Males.	Females.	Number of Mother.	Males.	Females.
Adult in 1844. 46	Ruka	Te Hameme	‡	Kapihana	
47	Paramene	Rahera	‡	Paora	
48	Karena	Whango	‡	Apeta	
49	Petene	Mere Kateraina*			
50	Rawiri	Raiha			
51	T. Te Momi	Ngarere			
52	More	Turuhira			
53	Pita	Tiwhana			
54	Kima	Kahumatie			
55	Ropati	Rutu			
56	Hohepa	Te Turi			
57	Henare	Ripora			
58	Whareone	Ngawai			
		Tawahi			
		Hera			
		Namaha			
Non-Adult in 1844. 59	Hori	Hara			
60	Te Warena	Heni			
61	Maraku	Tiriti †			
62	Ngaruawahie	Peti Ramari			
63	Henare	Mere Poumamu			
64	Epanaia	Miriama			
65	Hohapata	Akenihi			
66	Rapata	Hepi			
67	Wiremu	Miti			
68	Tepene	Hariata			
69	Ihimaera	Peaterihi ‡			
70	Piti				

SUMMARY.

	Adult.		Non-Adult.		Total.	
	Males.	Females.	Males.	Females.	Males.	Females.
Total Population in 1858 . .	70	63	34	22	104	85
Deduct Immigrated . .	21	12	7	7	28	19
Population for comparison . .	49	51	27	15	76	66

Number of Adult Females in the foregoing Table who have had issue now living	46
Ditto ditto ditto dead	19
Ditto ditto barren	24
Ditto ditto productiveness unknown	0

The woman marked thus * has four half-castes,—Hone, Tehira, Harata, Ruhi.

TABLE shewing the Names of the Adult and Non-Adult Members of the Tribe NGATITAHINGA (Te Weera), residing near Waikato Heads, in the Year 1844, and the Survivors in 1858.

Adult in 1844.						Non-Adult in 1844.					
Males.		Females.				Males.			Females.		
In 1844.	Alive in 1858, with new name (if so.)	In 1844.		Number.	Alive in 1858, with new name (if so.)	In 1844.	No. of Mother.	Alive in 1858, with new name (if so.)	In 1844.	No. of Mother.	Alive in 1858, with new name (if so.)
Ngakani	Ngakani	Ngaahi	*a*	1	Ngaahi	Tukotahi	17	Tukotahi	Mere	17	Mere
Tamihana	Tamihana	Te Wai	*a*	2	Te Wai	Te Rei	17	Te Rei	Mananoa	17	Miriama
Hemi	Hemi	Topaea	*c*	3	Topaea	Ngawaka	9	Ngawaka	Mihipepene	18	...
Ihaka	Ihaka	Pirimako	*a*	4	Pirimako	Hori	4	...	Infant	4	..
Paora	Paora	Mata	*c*	5	Mata	Hapiata	4	...			
Hoete	Hoete	Kateraina	*b*	6	Kateraina	Hori	19	...			
Te Hura	Te Hura	Oriwia	*a*	7	Oriwia	Pehimana	20	...			
Rapata	Rapata	Ohoturi	*a*	8	Ohoturi	Hone	22	...			
Waka	...	Parekaina	*a*	9	Parekaina						
Manihera	...	Rereatua	*a*	10	Rereatua						
Koi	...	Nganui	*c*	11	Nganui						
Kereopa	...	Mihirangi	*c*	12	Mihirangi						
Hohua	...	Motai	*c*	13	Motai						
Mehuana	...	Pakia	*b*	14	Pakia						
Kahukoti	...	Riria		15	Riria						
Tarahou	...	Tawhirione	*c*	16	...						
Tuari	Emigrated	Mihipoata	*a*	17	...						
Putoetoe	Ditto	Karoraina	*a*	18	...						
Raharuhe	Ditto	Tauwhanga	*a*	19	...						
Karaka	Ditto	Ngaraka	*b*	20	...						
		Mere	*b*	21	...						
		Hoana	*a*	22	...						
		Piko	*a*	23	...						
		Eribapeti	*a*	24	...						
		Huhana	*c*	25	..						
		Tuna	*a*	26	...						
		Rongokore	*c*	27	...						
		Hinewaikohi	*c*	28	...						

SUMMARY.

	Adult.		Non-Adult.		Totals.	
	Males.	Females.	Males.	Females.	Males.	Females.
Total Population in 1844 . .	20	28	8	4	28	32
Deduct Emigrations to 1858 .	4	0	0	0	4	0
Numbers for comparison . .	16	28	8	4	24	32
Deaths between 1844 and 1858	8	13	5	2	13	15
Surviving in 1858	8	15	3	2	11	17

Number of adult Females named in the above table who have born children now living 14
Ditto ditto ditto ditto ditto dead 4
Ditto ditto ditto barren 9
Ditto productiveness unascertained or unknown 1

TABLE shewing the names of the Adult and Non-Adult Members of the Tribe NGATITAHINGA, in 1858.

Adult.				Non-Adult.			
No.	Males.	No.	Females.	No. of Mother.	Males.	No. of Mother.	Females.
1	Ngakani	1	Ngaahi	2	Te Tuhi	4	Mata
2	Tamihana	2	Te Wai	6	Ngaki	8	Ani
3	Hemi	3	Topaea	6	Puaha		Roka
4	Ihaka	4	Pirimako	6	Te Whareroa		Turuhira
5	Paora	5	Mata	4	Hirini	7	Infant
6	Hoete	6	Kateraina	7	Tamehana	18	Pirihira } immigrants
7	Te Hira	7	Oriwia	13	Iringa	18	Apikeira } immigrants
8	Rapata	8	Ohoturi		Pohipohi (son of Tauwhanga, dead)		
9	Herewini Tukotahi	9	Mere				
10	Hairuha Ngawaka	10	Miriama	18	Wiremu } immigrants.		
11	Te Rei	11	Riria	18	Watene } immigrants.		
		12	Parekania				
		13	Rereatua				
		14	Nganui				
		15	Mihirangi				
		16	Motai				
		17	Pakia				
		18	Karoraina Tohu (an immigrant)				

SUMMARY.

	Adult.		Non-Adult.		Total.	
	Males.	Females.	Males.	Females.	Males.	Females.
Total Population in 1858 . .	11	18	10	7	21	25
Deduct immigrants	0	1	2	2	2	3
Population for comparison .	11	17	8	5	19	22

VII.

Statement of Adult and Non-Adult Members of the Tribe **Te Ngaungau**, for the year 1844: showing the Deaths since that year (marked *), the Emigrations (marked †), the abstractions of Females by the Pakeha (marked ‡), and the surviving persons born since 1844.

Adult.			Non-adult.	
Males.	Females.		Males.	Females.
* Te Pake	* Mata	a	Hori Te Pake	Peti
Hone Kingi	• Turia	c	* Whengamatau	Hara
† Taratauapa	† Ngeru	a	Rihari	Hera
Hirini	† Mata	a	• Pepe	Hariata
† Hami	Roka	c	Karaka	Mata
Paora Puni	Mereana	a	Matena	Rewa
Reihana	† Rite	a	† Perereka	* Tokomapuna
Iharaira	Ngawaro	b	Rokena	* Pepe
* Ikeike	* Te Wahine	a	* Aputaki	• Rongo
* Tau	* Tiki	a	Wiremu	• Meri
Ngapukapuka	Ngapire	a	Ewena	
Kutikuti	Paia	a	Tangiora	
Materato	• Taukawe	a	Porutu	
Motutarata	* Hemoata	c	Rapata	
Hemi	Pirihira	a		
Heta	• Peti	c		
Eruera	* Meri	a		
Reiroa	† Ripika	a		
Te Okioki	* Turuhira	b		
Tarawhiti	Rangiuaina	b	Born since 1844 and alive in 1858.	
Reweti	• Peti	b		
* Hamiora	† Ngaki	b		
† Hakiaha	* Waitara	b	Pene	Hera
Raniera	* Makereta	b	Tamati	Mere
Ahimaroki	Tarepa	c	Paora	Karito
† Iraia	Mata	a	Raniera	Karo
Puhipuhi	Mata Paipa	a		Rona
* Penehamene	* Karito	c		Riria
Ngakomuru	Kawe	a		Merepeka
† Tewani	Poti	c		Paea
Tewhana	Kuao	b		Hana
Maihi	Kohutopuni	a		Pepe
* Pene	Taka	b		
Ngakuku	• Kari	b		
* Karapu	* Meke	a		
Karapuha	• Pareaute	c		
Nganiho	• Karo	a		
* Pita	Riripeti	c		
* Whaoko	Whakai	a		
Pouaka	Ngawai	a		
* Hohua	Kumeroa	c		
* Hapatake	Whakaheke	a		
• Tarapuhia	Tukupu	a		
* Te Huirama	• Waitutu	a		
* Te Tana	Hera	a		
* Te Puha	† Mata	a		
• Paratoinga	Mere oti	c		
* Teruakoiwi	* Ngahake*	a		
* Waata	Tingatinga	c		
* Wiremu	† Ngaraihi	a		
* Terowitu	† Onekino	a		
Ngaraiti	Hariata	a		
Kepe	Ripora	a		
† Tengengero	* Huhana	a		
* Erietera	Wife of Tewhana	c		
	Napa	c		
	Harongi	c		

• *Had a half-caste child.*

Summary of the foregoing Statement.

	Adult.		Non-adult.		Total.	
	Males.	Females.	Males.	Females.	Males.	Females.
Total population of 1844	55	57	14	11	69	68
Deduct emigrants	7	8	1	1	8	9
Numbers for comparison	48	49	13	10	61	59
Deaths between 1844 & 1858...	20	20	3	4	23	24
Surviving in 1858	28	29	10	6	38	35
Population of 1858	38	35	4	10	42	45

Number of wives with issue living	32
Number of wives with isssue dead	10
Number of wives barren	15
	57
Females abstracted by the pakeha	0

VIII.

Similar STATEMENT respecting the Tribe NGATIWHAUROA.

ADULT.			NON-ADULT.	
Males.	Females.		Males.	Females.
P. Urakia	Ka Urakia	a	Poari Urakia	† Pirihira Urakia
Piripi Tikirahi	Ripeka Tikirahi	a	* Erueti Tikirahi	Rora Urakia
Mohi Haki	Hiria	a	Paora ditto	* Pinina Urakia
Wi. Tanewa	Miriama Haki	a	* Hamiora Haki	Karoraina Urakia
* Aparahama Kimi	Hara Tanewha	a	* Erueti Tanewa	Ameria Urakia
* Hemera Huhua	Ngapongo	a	Hori Tanewa	* Tepaea Tikirahi
* Hohua Kikiki	* Takahi Kimi	c	* Ahimerika Tanewa	Harata Tikirahi
* Ihaka Ngongo	* Rahara Ruamanu	c	Mohi Tanewa	* Materia Haki
* Niko Wairoa	* Parau Kikiki	c	* Pepe Wairoa	Meri Ngapongo
* Heroa	* Ikamakutu	b	Hakaraia Tana	* Turuhira Hopa
Ruamano	Korama Piapaka	c	* Hohua Ngakoura	Harata Wairoa
Heremaia Tana	Hapa	b	* Pepe Ngakoura	Katarina Wairoa
Rawiri Wareiro	* Erihapeti Hopa	a	* Rao	Rora Hona
* Ihaia	Meri Wairoa	a	* Manahe Puraho	
Timoti Ngakoura	* Ramaria Rangim.	c	Rupene Te Whana	
* Rangimaunu	Te Ao Wareiro	a	Penehamene Hopa	
† Pepeni Rapaka	* Moro	a	Rawiri Puraho	
Hona	* Tekoro	c		
* Natanahira	* Hinawera	c		
Hona Tana	Mere Hopa	a		
* Tamati	Tepaea Tanu	a		
Hopa	Makereta Ruam.	a		
Eparaima Puraho	Hera Puraho	a		
Manahe Kohimutu	* Mihipoata	a		
Ngarua (of Ngatihaua, 2nd husband of Meri Wairoa)				
			Born since 1844, and alive in 1858.	
			Te Hira Tikirahi	Meri Tikirahi
			Takerei Tikirahi	Roka Tikirahi
			Te Wiremu Haki	Katene Haki
			Erueti Tanewa	Pepe Haki
			Paora Wairoa	Riria Hopa
			Reihana Wairoa	Haruta Hopa
			Natanahira Tana	Ema Hopa
			Penehamene Tana	Rawinia Tana
			Te Huirama Tana	Pepe Tana
			Hohani Ruamano	Metiria Ruamano
			Pepe Ruamano	Huhana Ruamano
			Hohepa Puraho	Roka Hona
			Huia Puraho	Raiha Puraho

N.B.—The husband of Meri Wairoa is included, though belonging to Ngatihaua, because their children appear in the list.

N.B.—Besides three half-caste children from Urakia's daughter.

Summary of the foregoing Statement.

	ADULT.		NON-ADULT.		TOTAL.		
	Males.	Females.	Males.	Females.	Males.	Females.	Total.
Total population of 1844 . .	25	24	17	13	42	37	79
Deduct Emigrants	1	0	0	0	1	0	2
Deduct gone to the pakeha . .	0	0	0	1	0	1	
Numbers for comparison . .	24	23	17	12	41	36	77
Deaths since 1844	10	11	9	4	19	15	34
Survivors in 1858	14	12	8	8	22	21	43
Population in 1848	22	21	13	13	35	33	68

Number of Wives with issue living	15
Ditto ditto dead	2
Ditto barren	7
Females gone to the Pakeha	1

IX.

Similar STATEMENT respecting part of the Tribe NGATIMAHUTA.

ADULT.		NON-ADULT.	
Males.	Females.	Males.	Females.
Takerei Te Rau	Ngaoko Te Rau	Mekata Te Rau	Tepaea Terau
Karaka Ngaiwi	Ramomi Te Rau	* Tupuna Ngaiwi	Hoana Ngaiwi
Matiaha Ngareto	* Ripeka Ngaiwi	Ngaiwi	Hariata Ngaripo
* Patara Ngaroi	Ripora Ngareto	Nepe Ngareto	Ripeka Tarua
Paora Te Tarua	Tarita Ngaroi	Heperi Tarua	Turia Ngahuru
Tama Te Tarua	* Pahimata Taharua	* Ripata Pakapaka	* Pe e Ikapoto
* Horuri Ngautoka	Ripeka Ngautoka	Mahi Pakapaka	* Huhana Rore
* Pakapaka	* Hia Pakapaka	Hori Reti	Ku Mangapiko
* Hemera Te Ngahuru	* Haeata Ngahuru	Tamati Tipati	Wawata Mangapiko
Reti	* Turia Reti	* Rawiri	Pepe Waipa
Tarapini Te Matao	* Moetara Toro	Ngakoti	Mere te Ipu
* Wahapu	* Karaihi Ikapoto	Pepe Piko	Hera te Ipu
Niko Ikopoto	* Kuia	Paringaringa Piko	* Mirika Wahanui
Pene Toro	* Mia	Maruhua Te Puaha	* Harona Moninoa
Hihi	* Kangahikau	* Tepene Te Puaha	* Mere Papuwha
Pairama Rore	* Pahire	Hone Te Puaha	Rora Tepuke
* Hika	Mere Taihaku	Keremeneta Te Puaha	* Huhana Tepuke
Ngataru	Ngatiti Tetaheha	* Karaka Powaka	Poi Rohi
Anaru	* Hera Taumaihi	Erueti Powaka	
Matiu Taihako	Mere Taumaihi	* Hakaraia Te Ipu	
* Hemi Tetaheha	* Turia Taumaihi	* Pepe Ngapiko	
* Rihi Taumaihi	Merepeti Kukeke		
* Karipu Ngapipi	* Ngawari Tepoporo		
* Rauiri Kukeke	Mangapiko		
* Poporo	* Taumata Mangapiko		
* Mangapiko	* Mowiti Wakano		
Te Wata	Tipotipo		
Karewhati	Ruarua Ngangoto		
* Whakano	Hemota Waipa		
Tirata	Hana Maungaotama		
Ketekete	Ngapipi		
Ngahaka	Hera Tepuaha		
Rawiri Waipa	* Hoana Powaka		
Maungaotama	Hera Te Ipu		
Tahupirau	* Meri Wahanui		
Pene Puaha	† Roka Moninoa		
Neha Powaka	Ripeka		
Wi Te Ipu	* Muruki		
Horomana Wahanui	Hana Rowawa		
† Timoti Moninoa	Waiho		
Hoera	* Hariata Kapua		
* Harione Rowawa	Miriama Kapua		
Tamarua	* Kara Tapuwha		
Rohi	Hara Kumete		
* Ngapiko	Maikaru Tepuke		
Haira	* Rohirohi		
Tamati Kapua	Hera Tewarekura		
Tapuwha	* Peti Te Wakaihi		
Wetere	* Ramari Ngawaka		
Watarauhe Te Puku	Harata Koinaki		
† Wiremu Kumete	Kataraina Te Aitu		
† Tiorea			
* Ngatimahuta			
Horomona			
† Kercopa Wharepouri			

Born since 1844, and alive in 1858.

Males.	Females.
Ruru Petuere	Hera
Takotokino Tetaheha	Tepaea Taumaihi
Ngaraka Tetaheha	Tepaea Mere Taumaihi
Reni Tetaheha	Mere Waipa
Te Iwi Taumaihi	Karo Waipa
Taiamai Taumaihi	Mere Te Ipu
Mohi Waipa	Hoana Muruki
Karaka Mangaotama	Hira Waiho
Hiakai Tepuaha	Konaiti Tepuke
Hone Rowawa	
Hohepa Waiho	
Aparahama Waiho	
Paora Tapuwha	
Tepore Tapuwha	
Rapana Tepuke	
Tamutaku Tepuke	
Reihana Tepuke	
Puhipi Te Wharekura	
Erueti Te Wharekura	

N.B.—The husband of Wharekura is included, though belonging to and living with Ngatihaua, because she and several children appear amongst Ngatimahuta.

Summary of the foregoing Statement.

	ADULT.		NON-ADULT.		TOTAL.	
	Males.	Females.	Males.	Females.	Males.	Females.
Total Population of 1844	55	50	29	19	84	69
Deduct Emigrants	4	1	0	0	4	1
Numbers for comparison . . .	51	49	29	19	80	68
Deaths since 1844	16	24	8	6	24	30
Survivors in 1858	35	25	21	13	56	38
Population in 1858	56	38	19	9	75	47

X.

Similar STATEMENT respecting the tribes NGATIKOURA, PATUKOKO, NGATINAENAE, and NGATIRURU (part).

ADULT.

Males.

* Mokorou
Heremaia Tepuahi
† Piripi Monahi
* Raihia Rahanui
* Raniera Hakiri
Wiremu Tara
Horomona Maruhau
Tuituha Hori
† Maru
* Watarauhe Hamaka
* Tanutanu
Te Tiwa
Hakopa Ngaruhi
Hoani Awaiti
Hikoia
Ihirangi
* Hoihoi
* Ahinui
Ngakuru
Ngauku
Tarawheti
Ngakete
† Papahia (Taranaki)
Atuawera
Ririkotahi
Titipa
Kiwi
Repo
* Katete
* Huirua
Horoparera (unknown)
Taungahuru
Taurua Te Tera
Papaka
Pihanga (unknown)
Titaha
* Ngawetu
† Ngataro
Wa Mihaka
* Ringaringa
* Pukapuka
* Whakatau
Pita Te Kawa
Paora Ngahuku
* Haroa
Ihikera Pehikohuru
Rupene Punga
* Parakiri
* Ngawake
Hemi Waikato
Mere
Watena
Matena Kopua
Mungumungu
Taraimia
Tikapa Pirika
Tangatahe
* Rangiirika
† Whiua
* Ngawhai
* Hone Hatoitoi
Tamehana Ngaruhi
Pehi
Parareka
Nganiha
Haki
* Hararu
Ngametu
* Waiata Kaiamo
† Muruki
* Rahoroi
* Hokoraukawa
† Takikapura
Kimahore
* Hurukawau
* Wi Hopihana
Rangitoro
* Pohekino
* Tito
Takahia Ngahuhu

Females.

Karoraina Mokorou *a*
* Ngawaro *c*
Ngahopi *a*
Kumara *a*
Watewate *c*
* Ngamaha Puahi *c*
* Tamara Tara *a*
Rangikaurako *a*
* Ruta Tara *a*
* Riria Maruhau *c*
* Hana Hori *c*
* Harata Maru *c*
Kahu Watarauhe *a*
Turuhira Ngaruhe *c*
* Karoraina Anea *a*
* Hoana Kiriahi *b*
Mere Ngaro *a*
* Rakapa *b*
* Rauroha *c*
† Ngahora
* Waikauri *a*
Erana Hopihana* *a*
Miriama Awaiti *c*
* Iroikoia *c*
* Rangiwai *c*
* Pikonoa Ahinui *c*
Rangimania Ngakuru *a*
* Tukuhare Ngauku *a*
* Monoa *a*
Tarutu Titipa *c*
* Ruhiruhi Tekiwi *b*
Kurapopo Repo *c*
* Ngakohu Katete *c*
Keteriki Taungahuru *a*
Riria Taurua *a*
† Hurikino Mihanga
* Netangata Titaha *a*
Kakangawhetu *c*
* Ngaone Ngataro *a*
Te waangapaira Towai *a*
Tahuti (unknown)
Kopa (unknown)
* Kahupora *c*
* Hamunui *b*
* Ngapairangi *c*
Rangitaiki (unknown)
* Hoana Ngia *c*
* Parehuia *c*
* Parehuia Whakatau *c*
Pure *b*
* Pirihira Te Kawa *b*
Mihi Nahuhu *a*
Merene Haroa *a*
Raparapa Pehikohuru *c*
* Hoana Punga *c*
* Ripeka Ngawaki *c*
Ngapiri Waikato *c*
Irihapeti Temere *a*
Reihara Ahukaramu *a*
Ngareti Tekopua *a*
Hirenawe Mangumangu *a*
* Ngatapu Taraimia *b*
* Rohata Taraimia *a*
Anipatene Hatoitoi *c*
Ruria Ngaruhi *a*
* Rakura Pehi *c*
* Irihapeti Parareka *a*
* Nopinopi Urukawau *c*
† Peneti Nganiho
* Pairoa Ngaketi *b*
* Rarata Ngaketi *a*
* Roka Haki *c*
Hunuru *c*
* Nakinaki Hararu *a*
* Iria Ngamotu *b*
* Waitutu Waiata *c*
* Hei Moruki *c*
* Tautoka Rahoroi *c*
* Patu Rahoroi *b*
Erihipeti Hokoraukawa *c*
* Ngangero *c*
* Pukauwai *b*
Kokuhu *a*
Teo *c*
† Aomaringiringi
* Kauahore Roka *c*
* Ahipoaonui Tito *c*

NON-ADULT.

Males.

Hemi Mokorou
Mangatautari Mokorou
* Puangi Mokorou
* Rawiri Tara
* Pene Ngaruhi
Awaitaia
* Hetaraka Ngaio
Rapata Ngaio
Pungahuru Ihirangi
* Puata Ngakuru
Waenganui Ngauku
Taheha Ngauku
Maungawhea Ngauku
Heahea Huirua Powhero
Hakihaki
* Ngorongoro Taungahuru
† Panekoki Titaha
* Katipo Ngataro
* Rako Ngataro
* Hauotu
* Taiaha
* Potae
* Hori Te Mere
* Karokaro Mungungu
* Poroniki Taraimia
* Tinipoaka Taraimia
Tohora Parareka
* Warehaikiha Nganiho
* Te Kekeno Ngakete
Te Nahu Ngakete
* Urehina Ngakete
Ririkotahi Hararu
Hakiri Hararu
* Eruena
Tamati Rangitoro
* Erueti Te Kawa
* Wi Te Kawa
* Pene Te Kawa
* Hokoraukawa
* Mokorou Tito

Females.

* Puka
* Mere Wahatapuhe
* Hareti Wahatapuhe
* Maata Wahatapuhe
Rawinia Mokorou†
Rawinia Waikauri
Rihipihi Mungumungu
* Ngawari Taraimia
Rangiwawa Mokorou
Iwikiraukawa Mokorou
* Hemaima Hamaka
* Hohana Hamaka
Anipatene Hamaka
Koripi Ngaio Ngauta‡
* Ngakino Huimoi
Kerokero Ngakuru
* Ngangoi Ngakuru
Ngarama Ngakuru
‡ Pakiteahu Moana
* Koke Ngauku
Hinekino Papaku
* Ngakari Titaha
* Ngamaha Te Kawa
* Erihapeti Ngahuhu
Hera Ngahuhu
Merepeti Te Mere
Hera Ahukarama
Ripeka Ngaruhi
* Tiakikai Rahoroi
Eripeti Hokoraukawa

Children of the foregoing Adults and Non-adults born since 1844 and alive in 1858.

Takoki Rangikamanga
Wiremu Hopihana
Whakatau Taungahuru
Te Taka Ngataro
Hone Ngataro
Honana Ngataro
Aporo Waikauri
Te Wharepouri Waikauri
Reihana Mihaka
Takahia Ngahuhu
Henare Ngahuhu
Hori Ngahuhu
Rupene Haroa
Tamati Haroa
Hihona Temere
Matena Te Kopua
Paora Taraimia

Hariata Rangikamanga
Nganehu Tara
Hananui Watarauhe
Hemaima Watarauhe
Mere Hopihana
Pareaute Ngahuru
Raima Taurua
Ruhia Ngataro
Hererunga Ngataro
Rawinia §
Hera Ngahuhu (2nd)
Mere Te Mere
Meturia Te Kopua
Tiriana Te Kopua
Mari Taraimia
Ramariho Parareka
Rahera Ngakete
Hina Ngamotu
Turuhira Hounui
Naneho Ngakuru
Hera Ahukaramu
Mere Titaha

* This woman has had 15 children, 3 of whom are now living, 2 natives and 1 half-caste. The dead 12 were Maori.

† Married to a white man, by whom she had two children. Is now living with a Maori husband.

‡ Has one half-caste. She is now living with a Maori husband.

§ Daughter of Rawinia Mokorou.

XI.

Summary.

	Adult.		Non-Adult.		Total.		
	Males.	Females	Males.	Females.	Males.	Females.	Total.
Population in 1844 . . .	80	87	40	30	120	117	237
Emigrated	7	4	1	0			
Abstracted by the Pakeha .	0	0	0	1	19	8	18
Unknown	2	3	0	0			
Numbers for comparison . .	71	80	39	29	110	109	219
Deaths since 1844 . . .	27	48	24	14	51	62	113
Surviving in 1858 . . .	44	32	15	15	59	47	106
Poulation of 1858 . . .	59	47	17	22	76	69	145

Similar Statement respecting the Tribes Ngatiapakura and Ngatihinetu residing at Rangiaohia.

Adult.			Non-Adult.	
Males.	Females.		Males.	Females.
Kahawai	Ngakawa Kahawai	c	Mura	Wikitoria
Ngakino	Mihi Kahawai	c	Unahi	Mura
Kiripakoko	Mio Kahawai	a	Pungerehu Hongihongi	Taringamoka Ngakino
Mura	* Ngahuia Totara	c	Paketara Hongihongi	Ngape
* Totara	Pekirere Mura	a	* Watene Iwingaro	Kirimahunu Rori
Rori	Neke Ngakino	a	* Eruera Ringahuhu	* Paia Tihinui
Tuahu Kahawai	Towhinga	c	Pauinga	* Turama Tihinui
Piri Kahawai	Kuia Kiripakoko	a	Pauinga	* Kuini Hongihongi
Ngarimu	Ika	c	Pauinga	* Wirahiko Rongotoa
Aperahama Penga	Ngapo	c	Pauinga	Mere Ringahuhu
Teporia	* Tatai	a	* Pehikohuru Tehe	* Pauinga
* Wareponga	Irihapeti Ruinga Totara	c	Tawhio	Pauinga
Tihinui (Takirau)	* Rangikikiwa Tuahu	a	Tawhio	Tawhio
Hongihongi	Kui Rori	a	* Ngohi Whakapo	Tawhio
Taukawa	Pohipi	c	Rini Ruaki	Okewa
Tarete	* Moni Ngarima	c	* Ngaki Mataikapua	Tumuange
Witiki	* Ngawewe Teporia	a	* Ihaka Notara	Pokepoke Ruaki
Rongotoa	Horoia Wareponga	a	* Karitawa	Girl Ruaki
Taipuhi	Ranginohia Wareponga	c	* Tumata	* Rangiweoro Awakeri
Toko	Kerepo Wareponga	a	Tahawai Tangahoe	* Nana
* Ngakao	Taukitua Tihinui	b	* Koipu Waraunga	* Rangikaho Pakanui
Taramu	WakamateHongihongi	a	Tahiiwi Moananui	* Koipu
* Harihari	HeraHongihongi	a	Hamara Wangamata	Meri Tangahoe
Pirini	NgakauriHongihongi	a	Ngehe Wangamata	* Rangaiohia Waraunga
Paratene Iwingaro	Hoine Witiki	c	* Kokorewhenua	* Raro Waraunga
Paraone Iwingaro	* Kia Rongotoa	b	* Ngapatu Warang i	Mihikeno Moananui Wangamata
Rawiri Ringahuhu	Huhia Ngakao	c	Takikake Warangi	* Araruri Nani
Pauinga	Rangiora Taramu	a	Ruaki Hore	Kiwera Hore
Tikotiko	Kataraina Iwingaro	a	Wetoweto Hukanui	Taehuri Hore
* Tehe	Huihana Ringahuhu	a	Ngara Ngaehe	Makimaki Hukanui
Tawhio	Ngo Pauinga	a	* Mohiti Te Kohi	* Rewa Parinui
Naihi	Ngapake Tikotiko	a	Waru Tikona Ponaute	Tarati Ruawari
* Okewa	Karihi Tehe	c	Ihiti Ponaute	Rauinga Ngacho
Karahe	* Himo Tawhio	a	* Painui	Tihoi Hura
Hukarere	Pukematai Naihi	b	Kau Tuhua	Nanapi Kohi
* Makitawa	Hingara Okewa	a	Kiwa Nohomotu	Hanga
* Ponui	Karahe	a	Tipa Nohomotu	Hanga
Koutu	Tokatoka Makitau	c	* Raupatu	† Rangihaeremarie Pumai
Kaweka	* Oke Koutu	a	Raupatu	Tio Raupatu
Hioi	Puna Kaweka	a	Raupatu	Raupatu
Keu	Keu	a	* Wani Rewarewa	Kiri
Watu	* Hoine Weropu	c	* Tuhua Hamanu	Hamanu
Weropu	Rangimanako Tumuange	b	Hamanu	Ngeua
Mangai	Kaikero Kapa	a	Mouhaere Piritaha	Ngeua
Tumuange	* Tuhuahi Kanohi	a	Puka Piritaha	* Rangipiata Piritaha
Rangiorakawekawa	* Hirere Taiko	c	Matiu Piritaha	Paea Rewharewha
Kapa			Taiuri Hore	* Warangi Tutaki
Kanohi			Te Hemara Toinako	† Tarore Tiaho
Taiko Ngakino			Heketanga Poa	

Continued

Adult.		Non-Adult.	
Males.	Females.	Males	Females.
Hu Rori	Rongotoa b	* Tahurae Poa	Tahuora
Rongotoa	Rangiwakapo a	* Taumaihi Pauroa	Tahuora
Wakarua	Ngaoko Ruaki a	Nikahere Pehitahi	Arawata
Kaewa	* Rangimako Parinui b	Kahira Pehitahi	Pure
Awio	Pokere b	Hou Rakau (Taati)	Pari Paenga
Mata	Oko Waitara b	Puku	Kiri
Wakapo	* Irihia Notara b	* Ngaiwi Hekemona	Makirina
Roria Wakapo	Kukume Riki c	* Paia Hekemona	Mere Pawaroa
Ruaki	* Kahutaiki Karitawa b	Petera Manuka	Mere Hemi
Petara Parinui	Meroiti Mateara c	* Hiakai Ngaewe	* Ngaruma Whenua
Mataikapua	Kaka Pokipoki c	* Watatiri Ngaewe	* Te Unuunu
Waitara	Mara Ruapeka c	Ao Tahuora	Parekoaka Ngawai
Riki	* Kiore Tawera a	Kohirehe Warau	‡ Hauata Rahapa
Karitawa	* Hapua Paengatai a	* Ikawera Tupara	* Miriama Tarahanga
Ngarata	Ngarewa Awakeri b	Parou Warau	Mangarepo Matiu
Waterea Mateara	Himinere Nakunaku c	Korowai Warau	Rangitarere Matiu
* Pokipoki	Rangiaoatea Kariri c	Muhi	Mere Tahua
Mako	Tauinga Puia c	Hari Wakarawe	Matire Tahua
* Karaka Ruapeka	Ahipawanui Pure a	Ahimarae Tukituki	* Mata Parakiwai
* Tawera	Hineahi Noho a	Arawata	* Hopepia Kau
* Paengatai	Ruihi Kaiwhara a	Pure	Ripeka (immigrant)
Awakeri	Ra Kurupai c	Reihana Te Paenga	* Pepe Pukeri
Tara	Keke Nana c	Pahere	* Mere Ngataua
* Nakunaku	Ngira Tumata b	Ahikai	† Rora Ukui (Taranaki)
* Kariri	Pia Tumata b	Tiaho	* Pepe
Hetaraka Puia	* Paretawainga Pakanui a	Tiaho	Nanehu Ruhia
* Pure	* Rotowai Koipu a	* Peneamine (Peka)	* Riria Ruka
Kato	Raupeti Kapuni c	* Ngahongaho Ngawai	‡ Riripeti Ruka
Hana	Kumanu Tio c	* Pepe Notara	Rora Ngamuka
* Noho	Uhia Tangahoe a	Tamati Herehere	Heni Ngatuhe
Puitangata	Wa Hikuhiku a	Heta Iwingaro	* Ruaea Warekahika
* Raiwara	* Tahitahi Waraunga b	Tawhiwhi Rahapa	* Hoki
* Kurupai	Urunui Ariki c	* Tongi Taituha	Hoki
Nana	Noaia Moananui a	* Moerangi Taituha	* Kahukoka Wharau
Maumate	Rangikaho Wareumu a	* Mangawika Te Ahu	* Tia Tupara
Tumata	Parepare Ngatorotu a	Te Kopa Tarore	
Taka	Mere Urututu a	Tarore	
Ikeike Taka	Pekarimu Wangamata a	Wata	
Hakirau	Rangikaho Tukituki a	Wata	
Hona Pakanui	Pito Tika a	* Hohepa Kuwaha	
* Ngahongaho	Matarita Raunga b	Hoani Pongo	
Ngawahie	Ngamihi Nani a	Onekura	
Namunamu	* Pani Waka Whenua b	* Peneamine One	
Hori	Kapuranaiti Herehere	* Hohepa Patuuri	
* Koipu	* Ara Warangi b	* Moerangi Wahiawa	
Kapuni	* Piki Warangi a	* Heta Hemi	
Tu	* Tioro Tama c	* Hoani Hemi	
* Peiora	Raoa Rima c	* Pumipi Tarahanga	
Mangeo	* Rangihaerewa Hore a	* Tamehana Taumata	
Iwi	Ramarihi Arahi c	* Eriwera Kau	
Tangahoe	Rangituturu Hukanui a	Hohua Tahua	
Hikuhiku	Tairite Waraunga c	Reweti Tahua	
Puaha	Pohata Ngapoi b	Hamiora Tahua	
Waraunga	* Ngakai Ngaehe a	Ratimea Tahua	
Ariki	Tapahia a	* Heremaia Pukeri	
* Moananui	Meria Hura a	* Manga Pukeri	
Wareumu	Kitakita Maungapourua c	Teretui Ngataua	
Torowai	* Pehu Pohut c	* Kopa Ngataua	
* Tahimarae	Ia Koki a	† Manga Ukui (Taranaki)	
Ngatorotu	Hautu Painui a	Tape	
* Urututu	Petuna Ponaute a	Warekoka	
* Aotea	Wanga Tionga a	* Wiremu Warekaua	
Ngara	* Tamanga Paretoenga a	Wakatapohu Auahi	
Ngangaia	Pakakutu Weata c	Rourou Auahi	
Wangamata	Ngahieke Aoatea c	Heta Whanga	
* Atama Roiroi	Hamaka Hangi a	Ngehengehe Whanga	
Tukituki	* Nohinohi Pumai a	Mokena Whanga	
Tika	Ramorunga Nohomotu a	* Hurori Te Po	
Pototara	Ngarorere Nohomotu a	Wharau	
Wirihana Raunga	* Parekiore Raupatu a		
Nani	Taua Kiri a		
* Ngakete	* Ngamuka Rewarewa c		
Wenua	* Tini Hamanu b		
Tipene Wataraite	Ihunoko Ngeua c		
Herehere	Ngawai Piritaha a		
Warangi	* Ngaponi Manako a		
Taukino	Atete Turimanu c		
Tama			

Continued

Adult.			Non-adult.	
			Issue born since 1844 and alive in 1858.	
Males.	Females.		Males.	Females.
Rima	Taunoa Horo	b	Mio Kahawai	Mio Kahawai
Taukino Whenua	Hemoata Huhu	a	Mio Kahawai	Kahawai
Ranginui	Kete Ruawari	a	Pa Mura	Marata Kiripakoko
Hore	Pire Poa	a	Mura	Mariana Tatai
Hoia	* Terenui Toa	b	Mura	Marata Tuahu
Piko Taukino	* HaniRaurekau	c	Kerepo Wareponga	Kerepo Wareponga
* Piripi Te Arahi	Rato Pehitahi	c	Te Watene Hongihongi	Kerepo Wareponga
Hukanui	Nuitirene Rakau	c	Wiremu Hongihongi	Ngo, Pauinga
Penetita Waraunga	Hananui Ngakawena	c	Hongihongi	Nga, Tikotiko
Himiona Ngapoi	Taupoki Ngahoko	a	Taramu	Raiho Koutu
Ngaehe	Hapupu	a	Ngo Pauinga	Keu
Tapahia	Kurarenga Ahikuku	c	Pauinga	Whakapo
Hakaria Hura	‡ Iro Ratapu	a	Ngai. Tikotiko	Whakapo
* Maungapourua	Puku	a	Tikotiko	Ruaki
* Pumatete	* Hera Pa	c	Keu	Mura
* Pohutu	Hane Hekemona	c	Whakapo	Tari Ngakino
* Tahuna	Tini Rewarewa	b	Mura	Kiri Rori
Weta	Tekeuenga Tutaki	a	Kirimahunu Rori	Taukitu Raiwhara
Wana Kohi	* Ngapoti Waru	a	Rori	Ro. Koipu
* Painui	* Patumu Waru	c	Okewa	Ro. Koipu
Romana Ponaute	* Ngaponu Manako	a	Paketara Hongihongi	Uh. Tangahoe
Ruka Tionga	Ngakuta Parakaka	c	Wikitoria	Uh. Tangahoe
Kawau	Tirakakara		Wikitoria	Rau, Wareumu
Kaipuke	Matarita Ngaewe	c	Ahi, Pure	Rau, Wareumu
Moremore	Tarore Tiaho	a	Pure	Pa. Ngatorotu
Hohepa Paratcenga	Moao Tahuora	a	Pure	Pa. Ngatorotu
Hoani Weata	Wairua Ware Tamahana	c	Tetupu Noho	Urututu
* Hiako	* Peitu	c	Raiwhara	Urututu
* Aoatea	Ngahopi Arawata	c	Ro, Koipu	Urututu
Hangi	* Fohau Arawata	c	Urututu	Tika
Pumai	Pawanui Pure	a	Urututu	Ripeka Hore
Tuhua	Tamairere Nakunaku	c	Ra, Tukitukii	Rang. Hukanui
* Rako	Rangiaoatea Kari	c	Tukituki	Rang. Hukanui
Nohomotu	Mihikau Paenga	a	Tika	Me. Huria
Raupatu	Kahuraotau Tiniuhi	c	Tamati Herehere	Wewe Parinui
Toekotahi Raupatu	* Naho Ahikai	c	Te Kingi Pihi Warangi	Wa. Tionga
Kiri	Rangikino Tiaho	a	Hopa Hore	Wa. Tionga
Uriwai	* Ngongi Ngawewe	a	Te Hope Hore	Ta Paratoenga
* Rangihaeremarie	* Pehu Ngatara	c	Rangi, Hukanui	No. Pumai
Rewarewa	Koni Anga	c	Hukanui	No. Pumai
Hamanu	Tawa Kiri	a	Hukanui	Ra. Nohomotu
Ngewa	Tekunanu Piripoai	c	Makim. Hukanui	Ngar. Nohomotu
Piritaha	Pua	c	Tapahia	Ta. Kiri
* Manako	Taukaka Pukeiti	c	Tapahia	Nga. Piritaha
Turimanu	Honi Tepura	a	Ia Kohi	Tek. Tutaki
Taotao	Karangi Manuka	b	Ta Paratoenga	Tek. Tutaki
* Horo	AkamorungaManuka	c	Ha. Hangi	Heket. Poa
* Huhu	Te Kari Manuka		Hangi	Riwi Pawaroa
Ruawari	Mihi Peka	b	Ra. Nohomotu	Rihana Pawaroa
Poa	Matu Patuuri	c	Kau Ngar, Nohomotu	Ngahipi
* Toa	Kataraina Mohi	b	Kau Ngar, Nohomotu	Ngahipi
Raurekau	* Kataraina Iwingaro	a	Ta, Kiri	Makirina Ngamuka
Pehitahi	Raiha Tiha	a	Nga, Piritaha	Tepaea Tahua
* Rakau	Ripeka	c	Petara Manako	
* Kakeha	* Tuhirapa	a	Penehamene Hapupu	
Ngakawena	* Kurapa	b	Pukepuke Ngawewe	
Hoki	* Pura Whenua	a	Heketara Poa	
Ngahaho	Mereana	c	Te Wirihana	
Korikori	Roka	b	Pawaroa	
* Hapupu	Rahapa	a	Mato Unuunu	
* Ahikuku	Ripora	a	Tawhiwhi Rahapa (bastard)	
Ratapu	Hariata	a	Iwingaro	
* Ringi	Meri	a	Pepe Nanehu Ruhia	
* Ngakani	Hoturoa	a	Pepe Nanehu Ruhia	
Hoki	* Paretawiringa Ngawai	a	Karaha Wharekahika	
Koutu	‡ Riria		Ngai Te Auahi	
Puku	* Ngariki	b	Te Auahi	
Heiarero	* Horonga	c	Pepe Ratimea Tahua	
Ngawari	Tangi	c	Ruhia	
* Pokirangi	† Teremoana	a		
Aperahama	* Tauranga	b		
* Hekemona	Ngahipi	a		
Rewarewa	Taminga Puia	c		
Tutaki	Miriama Taituha	b		
* Te Anini	Kohatu Ahu	c		
Te Waru	Katerina Pongo	a		
Manuka	Turuhira Tarahanga	a		
Ngatohu Manuka	Raharaha Taumata	b		
	Nganiui Matiu	a		

Continued

Adult.		Non-Adult.	
Males.	Females.	Males.	Females.
Parakako	† Hiria Tanupo *c*		
Rotoiko Ngaewe	Ramarihi Arahi *c*		
Waiukau	* Mere Wharewi *b*		
Tiaho	* Parakiwai *b*		
Tahuora	* Uru Kau *b*		
Raharaha	Hareata Tahua *a*		
* Waretamahana	Erihapeti Tahua *a*		
Hoki	Akuira Kape *a*		
Manihi	† Inewairoro Ukui (Taranaki) *a*		
* Warau	* Rihia Ngoto *a*		
Wiremu Tupara	Toki Pukeri *b*		
* Aramatai	* Kataraia Whangai *b*		
* Wakaraue	Ruhia *a*		
Ngarini	Timotimo Ngamuka *a*		
* Warau	Riana Ngatuhe *a*		
Ngaine	Ngakawhi Toetoe *c*		
* Tamarua	Teremoana Toetoe *b*		
* Kopikopi	Parehou Te Auahi *a*		
Muhi	* Rangikapuhia		
* Wakarawe	Pekarimu Whanga *a*		
* Kahukaka	* Te Ati Ahipaura *c*		
* Pai	* Te Kenui *b*		
Tukituki	Mata Karaka *c*		
Takai	* Waikaukau Hoki		
Horaia	* Tai Manihi		
* Tahora	* Pai Wharau		
Ngawai	* Kahukaka Tupara		
Ngara	* Ngaremu Wakaraue		
Ngaoko	Kahutaiki Wakaraue		
Kara	Pai		
Teria	Mere Pai		
Arawata	* Ngamoro Takai		
Toko	Ngoto Horaia		
Tara	Towatowa Tahora		
* Pure	* Tiu Ngaoko		
Kato			
Hakirau			
* Ngapatu			
Ra			
* Nakunaku			
Kari			
Hautu			
Pari			
Pahere			
* Hamaona Tiniuhi			
† Hape			
* Ahikai			
Tamahana Taka			
Tiaho			
Parera			
Ngawewe			
* Ngatara			
Ngatara			
Anga			
Ngawini			
Kiri			
Ihi			
Wata			
Mangaora			
Huira			
* Mangawika Ahu			
* Onekura			
Hoani Patuuri			
Taituwa Wahiawa			
* Mohi Hemi			
Tamati Tarahanga			
Matenga Taumata			
Matiu			
† Hakopa Tanupo (Taranaki)			
* Piripi Arahi			
Hone Warewi			
Mehana Kiriwera			
Natanahira Kau			
Reweti Tahua			
Haimona Pita Kape			

Continued

Adult.		Non-Adult.	
Males.	Females.	Males.	Females.
† Paiuru Ukui (Taranaki)			
Hetaraka Ngoto			
* Paora Pukeri			
Tiha			
* Kereopa			
Kena			
Ruka			
Henare Ngamuka			
* Wiremu Ngatuhe			
Toetoe			
Te Auahi			
Warekahika			
Wangai			
Raniera			
Hakiaha Warenikau			
* Herewini Ahipaura			
Whanga			
Taituha			
* Ahipaura			
* Hone Pumipi Te Po			
* Karaka			

Summary of the foregoing Statement.

	Adult.		Non-Adult.		Total.		
	Males.	Females.	Males.	Females.	Males.	Females.	Total.
Population in 1844 . . .	301	237	118	84	419	321	740
Emigrated	3	4	1	3	4	11	15
Abstracted by the pakeha . .		2		2			
Numbers for comparison . .	298	231	117	79	415	310	725
Deaths since 1844	81	67	43	28	124	95	219
Residue	217	164	74	51	291	215	506
Population in 1858	291	215	70	54	361	269	630

Number of Wives with issue alive	107
Ditto whose issue are all dead	38
Ditto barren	75
	222
Females abstracted by the Pakeha	4

In order to give a condensed view of the information contained in the previous pages, with reference to the movement of the population during the interval between 1844 and 1858, the annexed table has been prepared.

TABLE II.

TABLE showing the state of the Population of certain Tribes in the District of Waikato in the year 1844, as compared with the Population of the same Tribes in the year 1858, with the per centage decrease thereon.

Residence.	Tribe, or Part of Tribe.	Population in 1844, after deduction of Emigrants and persons now unknown.				Deaths between 1844 and 1858.				Residue in 1858 of Population of 1844.				Population of 1858, (Immigrants excluded.)				Increase in 14 years, 1844 to 1858.				Decrease in 14 years, 1844 to 1858.				Population.				Total Population.		Decrease in 14 years.		Total decrease in 14 years.	Per Centage Decrease in 14 years, 1844 to 1858.						
		Adult.		Non-Adult.		Adult.		Non-Adult (1844.)		Adult.		Non-Adult (1844.)		Adults and Non-Adults of 1844. Adult in 1858.		Persons born since 1844, and living in 1858. Non-Adult.		Adult.		Non-Adult.		Adult.		Non-Adult.		In 1844.		In 1858.							Adult.		Non-Adult.		Total.		
		M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	M.	F.	1844	1858	M.	F.		M.	F.	M.	F.	M.	F.	Total.
1. Waikato Heads	Ngatitahinga	16	28	8	4	8	13	5	2	8	15	3	2	11	17	8	5	0	0	0	1	5	11	0	0	24	32	19	22	56	41	5	10	15	31·25	39 28	..	inc.	20·83	31·25	26·78
2. Te Kakenga Tuakau, &c.	Ngatipou (Kahu and Te Kaitutai)	40	41	27	16	18	11	8	6	22	30	19	10	41	40	12	13	1	0	0	0	0	1	15	3	67	57	53	53	124	106	14	4	18	inc.	2·43	55·55	18·74	20·89	7·01	14·51
3. Taupari, &c.	Ngatitipa	74	78	27	22	37	38	15	11	37	40	12	11	49	51	27	15	0	0	0	0	25	27	0	7	101	100	76	66	201	142	25	34	59	33·78	34·61	..	31·81	24·75	34·00	29·35
4. Maioro	Ngatikarewa	8	15	4	2	3	6	1	1	5	9	3	1	8	10	8	1	0	0	4	0	0	5	0	1	12	17	16	11	29	27	inc. 4	6	2	..	33 33	inc.	50·00	inc.	35·29	6 89
5. Paetai	Te Ngaungau	48	49	13	10	20	20	3	4	28	29	10	6	38	35	4	10	0	0	0	0	10	14	9	0	61	59	42	45	120	87	19	14	33	20·83	28·57	69·23	..	31·31	23·72	27·50
6. Kahumatuku	Ngaiwhauroa	24	23	17	13	10	11	9	4	14	12	8	9	22	21	13	13	0	0	0	0	2	2	4	0	41	36	35	34	77	69	6	2	8	8 33	8·69	23·53	..	14·63	5·55	10·38
7. Kihikihi Tiraki Whatawhata, &c.	Ngatiruru N. Koura N. Naenae Patukoko	71	80	39	29	27	48	24	14	44	32	15	15	59	47	17	22	0	0	0	0	12	33	22	7	110	109	76	69	219	145	34	40	74	16·90	41·25	56·41	24·13	30·90	36·69	33·78
8. Lower Waipa	Ngatimahuta	51	49	29	19	16	24	8	6	35	25	21	13	56	38	19	9	5	0	0	0	0	11	10	10	80	68	75	47	148	122	5	21	26	inc.	22·44	34·48	52·63	6·25	30·88	17·56
9. Rangiaohia	Ngatiapakura Ngathinetu	298	231	117	79	81	67	43	28	217	164	74	51	291	215	70	54	0	0	0	0	7	16	47	25	415	310	361	269	725	630	54	41	95	2·34	6·92	40·17	31 64	13·01	13·22	13·10
	Total...	630	594	281	194	220	238	116	76	410	356	165	118	575	474	178	142	6	0	4	1	61	120	107	53	911	788	753	616	1699	1369	158	172	330	8·73	20·20	36 65	26·80	17·34	21·82	19·42

Total number of Deaths in 14 years.. 650

Total number of surviving births 320

The following statement shows the numbers of adult women named in the foregoing tables in three classes. First, the number of those who have born children or a child still living; second, the number of those who have born children, none of whom survive; and third, the numbers of those who are barren. The numbers of those whose procreative powers are stated to have not yet been tested, are omitted.

Reproductive power of Maori females.

TABLE 3.

	Ngatitipa.	Ngatikarewa.	Ngatikahu, &c.	Ngatitahinga.	Te Ngaungau.	Ngativhauroa.	Ngatikoura, &c.	Ngatihinetu, &c.	TOTAL.
Number of wives whose issue are living	46	8	22	14	32	15	31	107	221
Do. do. dead	19	2	3	4	10	2	11	38	68
Do. barren	24	5	11	9	15	7	38	75	155
									444

The number of adult women, whose re-productive powers are stated to be not yet ascertained, are omitted from the above list, because, in the first place they would have no effect on the general result; and, in the next place it is very questionable whether there exists amongst the Maori any adult female, who has not been placed in a position to afford opportunity for the operation of her powers of reproduction, those living in schools excepted.

In order to throw some light upon the question of, how far the prolificness of marriages is affected by the consanguinity of the parties, and as to the number of children of each marriage, and the proportion of the children dead to the children living, the following table has been constructed.

Prolificness of marriages as affected by the consanguinity of the parties.

The information contained therein is confined to too limited a number of women to claim much attention, the difficulty of arriving at the facts having restricted inquiry. However, as far as it goes, it does not manifest in a very marked manner the effect of consanguinity in the parties; but the large number of children who have died in proportion to those who have survived is sufficiently striking; especially when it is remembered that many of those now alive are still very young, and some of them have the most fatal period of life yet to pass through.

General laws regulating progress of population.

Before further investigating the preceding tables, or attempting to draw inferences therefrom, it will be well to allude briefly to the general laws which regulate the increase or decrease of population, as deduced from facts by the authoritative writers on the subject.

Mr. Malthus says, "The great check to the increase of plants and animals we know from experience, is the want of room and nourishment; and this experience should direct us to look for the greatest actual increase of them in those situations where room and nourishment were most abundant. On the same principle, we should expect to find the greatest actual increase of population in those situations where, from the abundance of good land, and the manner in which its produce is distributed, the largest portion of the necessaries of life is

Table 4.

Table showing the Names of a Number of Females, taken indiscriminately from the Village of Tihorewaru, with their probable ages, Names of their Husbands, Number of Male and Female Children, dead and alive, the Tribe of the Female and of the Husband, with the degree of consanguinity.

Name of Female.	Name of Husband.	Children alive.		Children dead.		Tribe of Female.	Tribe of Husband.	Relationship (Consanguity.)	Probable age of Woman.	Remarks.
		Male.	Female.	Male.	Female.					
Haara	Kukutai	1	0	6	0	Ngatitipa	Ngatitipa	First Cousin, once removed	33	
Katene	Karaka	2	2	2	1	Do.	Do.	First Cousin	28	
Rahera	Remi	1	1	1	1	Do.	Do.	Do.	26	
Tiriti	Reweti	0	1	0	1	Do.	Do.	Do.	25	
Roka	Pairama	1	2	2	3	Ngatiwhatua	Ngatiwhakaue	None	35	
Ramari	Takaroki	1	2	3	0	Te Kawerau	Taranaki	None	35	
Ngawai	Whareirohia	3	1	2	1	Te Watuhuhi	Te Watuhuhi	First Cousin	35	
Ruhia	Poungongi	3	1	2	3	Ngatikahu	Ngatirare	None	35	
Peti	Hurori	1	2	2	2	Ngatitahinga	Ngatitipa	Distant	45	
Mere Kateraina	Nui	0	1	0	1	Ngatitipa	Do.	Do.	38	Has four half-castes alive.
Miriama	Epiha	2	0	1	2	Do.	Te Maungaunga	Do.	30	
Turia	Ngapaka	0	2	1	0	Ngatimaniapoto	Ngatitipa	None	46	
Hariata	Ngarau	3	3	3	3	Ngatirura	Do.	None	50	
		18	18	25	18					

actually awarded to the mass of the society. All animals, according to the known laws by which they are produced, must have a capacity of increasing in a geometrical progression. It may be safely asserted, therefore, that population, when unchecked, increases in a geometrical progression of such a nature as to double itself every twenty-five years."

Increase of population of United States by reproduction.

Thus, the white population of the United States, according to an official census made in 1790, was found to be 3,164,148. By a census in 1800 it was found to have increased to 4,312, 841. It had increased, then, during the ten years, at a rate equal to 36·3 per cent.—a rate which, if continued, would double the population in twenty-two years and less than one-half. According to a census in 1810 the white population was found to be 5,862,092, which gives a rate of doubling in about twenty-two and a half years. According to the fourth census in 1820, the white population was found to be 7,861,710, which, compared with the population of 1810, gives an increase at the rate of 34·1 per cent., a rate of progress which, if continued, would double the population in twenty-three years and seven months.

The immigration into the United States during these periods did not reach an average of 10,000 per annum. Our official accounts of the number of emigrants to the United States from Ireland and Great Britain during the ten years from 1812 to 1821 inclusive give an average of less than 7000. The official American accounts tend to confirm this average: and, allowing fully for the emigrants from the other European countries, the general average during the years stated will still be under the 10,000.—(*American National Calendar.*)

If then the periods of doubling mentioned above are compared with twenty-five years, the difference will be found to be such as fully to cover all the increase of population which would have taken place from immigration.

Comparison of progress of coloured portion of the population of New Zealand with that of the white population of the United States.

Reference has been made to the United States for the establishment of the law which would regulate the increase of the human race under the most favourable circumstances, because none of the checks which exist in countries of ancient civilization and circumscribed limits have as yet much force there in resisting the natural tendency of mankind to increase. Moreover, there is a remarkable analogy of physical conditions between the inhabitants of North America and the people of this country. A similar abundance of fertile soil, extreme facility in obtaining the necessities of existence, and a climate of even greater salubrity, place the aboriginal inhabitants of New Zealand in circumstances of similar advantage for developing to the utmost the powers of rapid increase possessed by the human race generally. It is unnecessary to refer to the checks which operate so powerfully in retarding the quick increase of population in countries where the difficulty of procuring the necessities of life compel prudence, or where the narrow limits of cultivable soil render great advance impossible, as none of these checks can have power to exercise any such retarding influence in New Zealand.

Instead however of finding a rate of increase in the aboriginal population similar to or approaching that of the United States, viz., about 35 per cent. on the average for every ten years during the years mentioned, the foregoing tables show that the population referred to therein, decreased at the rate of 19·42 per cent. in fourteen years, or nearly one-fifth of the total numbers disappeared during that period. The average loss per annum is 1·38, or above $1\frac{1}{3}$ per cent. If we deduct 5·52, the percentage rate of decrease for the uneven four years, from 19·42, the percentage rate of decrease for fourteen years, (a process not strictly correct, for the law of increase being in a geometrical progression, the decrease should be similarly calculated) we have 13·90 the percentage rate of decrease for a period of ten years.

Table of progress of population in certain countries.

The following table exhibits the percentage increase of population in the countries named, that has occurred in each decennary or other period stated. The figures relating to New Zealand are taken from the statistics of New Zealand compiled by Dr. Bennett and published by the Government in 1858.

TABLE 5.

Remarks.	Country.	Ten Years ending 1811.	Ten Years ending 1821.	Ten Years ending 1831.	Ten Years ending 1841.	The Year 1856.	Average p. c. Increase in 10 years.
	England	14·50	18·05	16·24	14·5	..	15·82
	Wales	12·97	17·27	12·36	13·	..	13·9
	Scotland	12·92	15·93	13·	10·8	..	13·16
	Ireland	..	..	14·19	..	..	14·19
	United States	36·	34·1	33·5	32·6	..	34·05
Deducting excess of Immigrants over Emigrants	Auckland Province ..	..	..	..	..	23·72	237·2
do.	Wellington do. ..	..	..	..	..	11·79	117·9
do.	Nelson do. ..	..	..	..	..	6·4	64·
Not deducting do.	Otago do. ..	..	..	..	..	13·14	131·4
do. do.	New Plymouth do. ..	..	..	..	..	17·74	177·4
	Canterbury do. ..	..	..	..	..	15·2	152·
	Average of New Zealand						
	White Population ..	..	..	..	..	..	146·6
	Colored Population ..	..	..	..	Dec	rease	13.9

The excess of immigration for the Provinces of New Plymouth and Canterbury is not deducted in the above table as the New Zealand Statistics are incomplete in this particular.

Remarkable increase of the white population of New Zealand.

The result of this table is to show that the rate of greatest increase in the amount of population, under favourable circumstances, according to the general law deduced by Mr. Malthus, is far exceeded by the wonderful advance of the white population of this country.

It is difficult however to reconcile the statistics quoted with others in the abstract of 1858. For example, the number of births in the Province of Auckland for the year cited (1856) is stated to be 486, and the number of deaths 163, leaving a surplus in favour of increase, of 313. This supply accounts for a very small proportion of the increase to the general population; and as the excess of immigration over emigration for the same year is only 375, we have accounted for only 618, whereas the actual increase in numbers in the year appears to be 3244. It is not evident from what source the large balance unaccounted for, viz., 2546, can have been drawn.

Whether the census of 1855 is defective, or that of 1856 excessive, or whether a much larger amount of the increase is due to an irregular immigration of which no account can be taken, is a question the discussion of which is not within the intention of this paper.

The very high rates of increase stated for the white portion of the population appear in strong contrast with the actual and large decrease which appears to be the condition of the colored portion.

The regular decrease in the rate of increment of population in the United States shows the certain effects of the gradual operation of the checks to multiplication to which a country is subject as it becomes more thickly peopled, and room for expansion therein more restricted.

Relation of the sexes.

The following table will afford the means of comparing the proportion between the sexes which exists among the aboriginal inhabitants of this country with that obtaining in other countries whose populations are increasing. The figures relating to Great Britain and Ireland are taken from the Parliamentary Abstract of Population Returns for 1831; those relating to other countries from Mr. Porter's *Progress of the Nation;* and those relating to the white population of New Zealand from the Abstract of 1858.

TABLE 6.

Country.	Numbers.		Centesimal Parts.		Centesimal Excess.	
	Males.	Females.	Males.	Females.	Males.	Females.
England	6,376,627	6,714,378	48·71	51·29	...	2·58
Wales	394,563	411,619	48·94	51·06	...	2·12
Scotland	1,114,816	1,250,298	47·14	52·86	...	5·72
Army, Navy, &c.	277,017					
Great Britain (including Army, &c.)	8,163,023	8,376,295	49·36	50·64	...	1·28
Ireland	3,794,850	3,972,521	48·85	51·15	...	2·3
Guernsey	11,983	14,145	45·86	54·14	...	8·28
Jersey	17,006	19,576	46·49	53·51	...	7·02
Man	19,560	21,440	47·71	52·29	...	4·58
United Kingdom	12,006,452	12,403,977	49·18	50·82	...	1·64
France	...	...	48·94	51·06	...	2·12
Spain (in 1803)	..	...	49·72	50·28	...	·56
United States (in 1820), free Whites	3,995,053	3,866,657	50·82	49·18	1·64	...
Auckland (1856)	8,531	6,804	55·64	44·36	11·28	...
New Plymouth	1,334	1,144	54·19	45·81	8·58	...
Wellington	5,781	4,471	56·38	43·62	12·76	...
Nelson	4,048	3,461	53·91	46·09	7·82	...
Canterbury	3,552	2,608	57·66	42·34	15·32	...
Otago	2,100	1,696	55·32	44·68	10·64	...
New Zealand White Population ...	25,356	20,184	55·51	44·49	11·02	...
Ditto Colored Population (examined)	753	616	55·	45·	10·	...
Ditto ditto (Total) ...	31,667	24,3[illegible]3	56·49	43·51	12·98	...

On reference to that part of the New Zealand Statistics which shows the emigration and immigration there appears a very large gain to the male portion of the population, relatively to the female portion, resulting from the constant operation of those processes, amply sufficient to account for the irregular disproportion between the sexes which the above table shows to exist among the white portion of the population of New Zealand. The slight disproportion in the United States may also be attributed to the same cause.

It seems therefore to be a natural law that a population in a healthy state, and not influenced by immigration, should possess a slight excess of females. Tested by this rule the colored portion of the population displays a remarkably abnormal condition.

Tests of increase of population.

Any accelerated increase of a population must result, (excluding immigration,) either from an increased proportion of births, that is, births calculated with relation to the numbers

of the people, or to a diminished proportion of deaths, that is, to the more tardy passing away of a generation; and an ordinary increase must result from a regular addition to the population of births more than compensating for the loss sustained by deaths, and conversely.

"The proportionate number of children born cannot be taken (alone) as a test of the condition of the people. It is well known that in climates where the waste of human life is excessive, from the combined causes of disease and poverty affecting the mass of the inhabitants, the number of births is proportionately greater than is experienced in communities more favourably circumstanced. Frequently, indeed, almost always in old settled countries, the proportionate number of births decreases with the advance of civilization, and the more general diffusion of the conveniences and luxuries of life. In fact, the population does not so much increase because many are born, as because few die." *(Progress of the Nation.)*

We should expect to find, then, that the Maori population would exhibit a greater mortality, and a compensating superabundance of births, relatively to the total number of the people, than are found to obtain in countries of old settlement and more advanced social habits.

Proportions of births and deaths.

The following statement of the annual proportion of births and deaths relatively to the whole population, in the different countries named, will afford a view of the comparative mortality, and reproduction therein. The figures relating to the European countries were communicated by Sir Francis D'Ivernois to Mr. Rickman, the compiler of the Imperial Population Abstract above referred to; those relating to New Spain are taken from Mr. Humboldt's account of that country.

TABLE 7.

England and Wales,		one death in	59	one birth in	34
Sweden and Denmark			48		31½
Holland and Belgium			43		30
France			40		32·4
United States			37		19
Wurtemburg			33		27.1
New Spain			30		17
Auckland	(1856)		94·08		31·55
New Plymouth	"		177·70		20·39
Wellington	"		105·69		25·18
Nelson	"		125·15		28·33
Canterbury	"		116·22		21·38
Otago	"		199·78		24·97
New Zealand—White population			136·44		25·30
Ditto Coloured do.			33·04		67·13

The proportions of the births and deaths among the colored portion of the population of New Zealand are calculated from the tables contained in the previous pages of this memorandum, and will perhaps be thought inapplicable to the circumstances of the people at large. In case a higher value is attached to the information, which, although gained concerning a portion only of the population, is perfectly accurate as far as it goes, it will be well to correct an error which is in reality contained in the above figures, although it is one which with the present information cannot be perfectly removed.

The number of children who have been born and have died between 1844 and 1858 does not appear in the tables, nor can it be certainly ascertained. Judging, however, from the facts as set forth in Table 4, the number who have died cannot be less than a number equal to those who have lived. That this estimate is moderate may be learnt from the following facts. In Saxony one half the children born die under 14 years of age. From Mr. Hickman's tables of 1831 we learn that of 3,938,496 persons buried in England and Wales, during the 18 years from 1813 to 1830, there died under the age of 14 of every thousand males 483, and of every thousand females 424.

If then the number of children under the age of 14 years alive at any given period be taken at one half of those born, the relative annual number of births among the colored population will be augmented to one in 33·56, and the relative annual number of deaths to one in 22·14; giving a more healthy appearance to the statistics, although displaying a rate of mortality nearly half as much again as that existing in the tropical country of New Spain, with a trifle more than half the births. Compared with the white population of this country the contrast is still more striking; the former showing nearly 1½ times the relative number of births, and considerably less than one-sixth the relative number of deaths.

Relative numbers of each sex born.

Although it has been previously established as a natural law that at any given time in a population in a normal condition and unaffected by emigration or immigration there will be an excess of females, yet it also appears that the number of males actually born is larger than that of the females.

The following table exhibits the number of registered births in England and Wales, and New Zealand, during the respective years mentioned.

TABLE 8.

Country.	Year.	Males.	Females.	Excess of Males.
England and Wales	1810	152,591	146,262	6329
Ditto	1815	176,233	168,698	7535
Ditto	1820	176,311	167,349	8962
Ditto	1825	192,003	183,050	8953
Ditto	1830	194,200	187,860	6340
New Zealand	1855	766	694	72
Ditto	1856	904	818	86

Of the population of 3,938,496 mentioned in a previous part of this paper as having been buried in England and Wales during 18 years, 1,996,195 were males, and 1,942,301 females, exhibiting an excess of male deaths and births of 53,894; of this population of 3.938,496 persons, there died under five years of age, males 736,039, females 622,903, or at the rate of 369 males in each thousand, and 321 females in each thousand ; showing out of the above total number an excess of deaths of males under five years of age of 113,136, and entirely changing the proportions of the sexes among the survivors, which now appear 1,260,156 males and 1,319,398 females.

The mortality of females is slightly in excess of that of the males, during the period whilst the process of reproduction is going on, that is, from the age of 19 to 49, but is never sufficient to rechange the relative numbers of the sexes, caused by the excessive mortality of males under five years of age; and from the age of 50 upwards, the proportionate number of male deaths is constantly greater than that of female deaths until the female survivors at 100 years of age are to the male survivors exactly as two to one.

The period during which this remarkably superior mortality of male children extends may be furthur reduced by reference to the tables compiled by Mr. Finlayson, with the view to ascertain the average expectation of life at the various ages for the purposes of life insurance. The relative numbers of the sexes born do not change during the first year of existence. Out of each 1000 male children born 981 are alive at the expiration of one year, and exactly the same number of female children survive out of the same number born; so that the excessive mortality of the males takes place between the ages of one and five years.

The knowledge or experience of the writer with respect to the early habits and characteristics of children does not extend to enable him to offer any suggestions as to the causes of this phenomenon; but the fact is clear that between the ages of one and five years male children are more liable to disease and death than female children.

Hence it will be gathered that the natural law regulating the proportions of the sexes reproduced is, that a larger number of male children should be born than of female children, the actual proportions being 100 : 97·3, and that from delicacy of constitution, or greater liability to disease during infancy, the mortality of the males should during the last four years of the first lustrum of life exceed that of the females, the actual proportion of deaths being during that period 369 males, 321 females. At 5 years of age the surviving males are to the surviving females as is 100 to 104·7.

The application of this law to the elucidation of the state of the population of the aborigines of this country exhibits an entirely irregular proportion of the sexes as obtaining amongst that people. The number of each sex born it is impossible to ascertain, but the male children born must be far too greatly in excess of the females, for, notwithstanding the higher mortality to which the former sex is liable during infancy, the number of males surviving continues greatly to preponderate over that of the females. Out of an existing population of 1369 persons, 753 are males, and 616 females, and out of a total population of 56,049 persons, (which, however, has undergone less careful enumeration,) 31,667 are males, and 24,303 females.

Relative numbers of adults and non-Adults.

Referring again to Table No. 2, in order to ascertain the numerical relation which the non-adult population amongst the Maories bears to the adult population, we find :—

TABLE 9.

	Population in 1844.					Population in 1858.				
	Males.		Females.		Total.	Males.		Females.		Total.
	Adult.	Non-Adult.	Adult.	Non-Adult.		Adult.	Non-dult.	Adult.	Non-Adult.	
	630	281	594	194	1,699	575	178	474	142	13 69
Centesimal Proportions	37·08	16·54	34·96	11·42	100	42·	13·	34·63	10·37	100

		In 1844.	In 1858.
The non-adult males are to the total adults of both sexes	One in	4·35	5·89
Do. females do. do.	One in	6·3	7·38
The total non-adults of both sexes do.	One in	2·57	3.27

Exhibiting with respect to both sexes an advance of the dilapidation during the 14 years, in the proportion of the non-adult to the adult population, as far as regards the tribes taken for minute investigation. The adult females have nearly maintained their relative numbers, but the change in the proportion of the adult and the non-adult males is very marked. A reference to the population abstract of Great Britain would afford information as to the numerical relation which the persons under 14 years of age should bear to those upwards of 14 in a population in a healthy state, but that paper is not now accessible to the writer. An approximation, however, will be attempted.

Mr. Porter states that, "in the enumeration of 1821, the males under 20 were 3,072,392, upwards of 20:—3,002,200, including all the males whose ages were then ascertained. In the enumeration of 1831, the males known to be under 20 were 3,941,495—upwards of 20, 3,944,511 (the army and navy, &c., are not included)." The number of male persons under 20 years of age, alive at any period, would thus appear to be about equal to that of those who are upwards of 20. An approximation to the relative numbers of the males upwards of 21, and of those under 21 years of age, amongst the Maories, may be obtained by deducting one half of the number of the survivors of the non-adult males of 1844, and adding them to the non-adult males of 1858. This process affords a considerable advantage, in the calculation, on the side of the non-adults, for the number of children under 7 years of age in any population are more numerous than those between the ages of 7 and 14; and, moreover, the division between the classes is made at 21, instead of at 20. Notwithstanding, however, these advantages in the calculation, the comparison exhibits a great deficiency of non-adults. Of 281 non-adults enumerated in 1844, 165 survive. The non-adult males of 1858 amount to 178. This number, added to one half of the surviving non-adult males of 1844, yields 260·5 an approximation to the number of males under the age of 21 years in the population taken for minute examination. The adult males enumerated in 1858 are 575. Deducting from this number 82·5, *i. e.*—one-half the number of the surviving non-adult males of 1844, we obtain 492·5 as a similar approximation to the number of males upwards of 21. Thus the comparison, (with the advantages to the non-adults before named,) appears 260·5 non-adults, 492·5 adults, or 1 : 1·88, instead of 1 : 1;—exhibiting in a striking manner the extreme relative paucity of youth.

Produce of each sexual union.

To estimate the prolificness of marriages, or sexual unions amongst the Maories is, from the irregular habits of the people, an impossibility; and it would be very difficult to attain to even an approximation of the average productiveness of each female.

The most commonly actuating motive for the dissolution of marriages or unions is the failure of issue. The desire of children is very great amongst the Maori women. One connexion, however, is no sooner severed than another is formed; indeed, frequently the dissolution is caused by foregone preference for another mate It may therefore be considered that the knowledge of the prolificness of each female will, for the purposes of these researches, be tantamount to the knowledge of the prolificness of each marriage.

Of the females contained in Table 1, a considerable number were widows in 1844, and past the age when they would be liable to incur the responsibilities of parentage; and several of the persons of both sexes appearing in the "adult" columns are the children of other persons appearing in the same columns. Table 4 was constructed merely for the purpose of ascertaining the numerical relation between the children born and the children surviving, and none but women who have produced issue appear therein. Some knowledge, however, of the productive power of the Maori females may be gained from an examination of Table 3, in which the general result of their procreative efforts is recorded.

Reproductive power of Maori females.

M. Muret found that "at Vevay, where the proportion of marriages to births, in the registers, was as 10 to 39, 375 mothers had had 2093 children born alive, by which it appears that each mother had produced 5.55 births. "But these," Mr. Muret observes, "were all mothers, which is not the case of all married women. Allowing, however, for the usual proportion of barren wives at Vevay, which was about 20 out of 478, it appears that the married women, one with another, must have had 5·3 births. Yet this was in a town where, he estimates, that the inhabitants do not enter into the marriage state at the time when nature calls them, nor, when married, always have as many children as they might have."—*(Enc. Brit. Tit. Population).*

The average prolificness of marriages in England and Wales is calculated by Mr. Malthus at 5.26 births.

Although it is impossible, as before observed, from the absence of perfect information, to apply this test of reproductive power to the women of the race under consideration, it will be at once manifest from the Table numbered 1, and the collected statement called Table 2, that

the average produce of the 500 (about) women who are there enumerated, and who have had the opportunity of reproducing their species, must be greatly below the recognized standard, when the whole population, including themselves, their husbands, and parents (sometimes,) does not amount to 1400, and the number of surviving non-adults of both sexes scarcely exceeds 300. The normal production would amount to about 2,500.

Again, taking the proportion of barren to productive females which appeared at Vevay, according to M. Muret, as an average which may form a rule, and adapting this proportion to the statement, Table 3, we have

Usual average of barren to productive females 20 in 487, or 1 in 24·35
Maori .... 155 in 444, or 1 in 2·86.

Manifesting that the general presence of the procreative power among the Maori females is slightly more than one-ninth of that among females belonging to communities of which the population is increasing. If, to this conclusion is added the fact that of the 444 women who form the subject of this deduction the children of 68 have not survived to the present time, no doubt can exist that the exertion of more than ordinarily prolific powers on the part of the productive 221 cannot suffice to compensate for the want of fecundity, or the deficient energy, of the remaining 223.

Diminution of the Maori population.

Generally imperfect as the statistical knowledge relating to the aboriginal population of this country confessedly is, or, where perfect, embracing such a limited portion of the people, and so inconsiderable an extent of country, as scarcely to afford certain bases whence to draw perfectly reliable influences applicable to the whole race, it is, notwithstanding, suggested that the foregoing calculations are of a character, and the information on which they are grounded are of sufficient value to afford certain evidence that the numbers of the people are diminishing, and must continue to diminish until the causes of the singular characteristics are discovered and removed. Indeed, as the table contained in page 10 et seq. manifest, in every tribe in which a minute investigation has been undertaken, and a comparison instituted between a population existing in 1844 and the remnant of that population in 1858, increased by the births that have been produced thereby during the interval, the results have been the same in character, differing from each other only in the rate of loss. Of the tribes thus experimentally taken as examples some reside on the seashore, others 10 and 20 miles therefrom on the borders of the Waikato river, others again in the inland plains about Lake Waikari, and the fertile banks of the Waipa, and the wheat-producing plateau of Rangiaohia have furnished other instances, all showing a similar result, and all manifesting the existence of the same abnormal conditions. The peculiar characteristics of want of fecundity of the females, extraordinary inequality of the sexes among the non-adult population in a directly inverse order to that obtaining in other countries not influenced by immigration, the extreme mortality among the children, the great paucity of births, together with a rate of mortality of both adults and non-adults far higher than any average known in temperate climates, must tend to produce a conviction in the mind, that so long as so many and such powerful causes antagonistic to increase of population exist, and simultaneously operate, any result except a decrease is impossible. That these peculiarities are not local is proved by the fact that the examplar tribes reside in some cases above 100 miles apart, subsisting mainly on different food, and engaged comparatively in different pursuits. Nor, indeed, is anything more striking in the contemplation of the present aspect of the Maori population than the fact that under varying circumstances, engaged in different employments, in localities of widely different physical character, the manifestations are so generally similar.

Numbers of the people in future years.

The following table exhibits the numbers of the total aboriginal population of the present year, and the numbers to which at the present rate of decrease it will have diminished, in the years mentioned. The calculations are made in periods of 14 years, being, perhaps, a term equal to half the duration of a generation.

TABLE 10.

Year.	Total Population.	Rate of Decrease.	Decrease during the ensuing period.
1858	56,049	19·42 per centum per 14 years.	10,884·71
1872	45,164·29		8,770·9
1886	36,393·39		7,067·59
1900	29,325·8		5,695·07
1914	23,630·73		4,589·08
1928	19,041 65		3,697·88
1942	15,343·77		2,979·76
1956	12,364·01		

The subsequent table shows the numbers of the white and colored population respectively of each of the three Provinces of the northern island of New Zealand in the several years mentioned, at the present rates of increase and decrease respectively; the excess of immigration over emigration for the white population being taken at the mean ratio of the years 1854, 1855, and 1856, and the white population for 1858 being ascertained from that of 1856 by adding an accretion for two years at the mean ratio of increase of the same years; the military and their families being excluded.

TABLE 11.

Year.	Province of Auckland.		Province of Taranaki.		Province of Wellington.	
	Colored.	White.	Colored.	White.	Colored.	White.
1858	38,269	18,716·48	3,015	2,871·76	11,772	Returns imperfect. Caret—1853.
1872	30,837·17	51,614·12	2,429·49	6,521·69	9,486	
1886	24,848·6	141,938·83	1,957,66	14,804·23	7,644	
1900	20,023·01	390,331·78	1,577·49	33,605·6	6,159·54	

The figures in the above table, as respects the increase of the white population by reproduction have been obtained by calculating the increase in triennial periods, (the duration of time from which the mean ratio is drawn,) on the principles of a geometric progression, that is, a series of numbers increasing by multiplication. Thus each consecutive term of the series is obtained, by the addition to the term immediately preceding, of a number obtained by the multiplication of that preceding term by the fraction representing the mean ratio of increase. For the Province of Auckland this fraction is for the period of three years, $\frac{3121}{10000}$ or 31·21 per cent.; for Taranaki, it is $\frac{1229}{10000}$ or 12·29 per cent.; and for Wellington..... But this process would be manifestly unjust if applied to the increase of population caused by the excess of immigration over emigration. The triennial increment, therefore, derived from this source has been treated as an arithmetical series, and has been included in the calculations by the addition, at each of these periods, of the number which formed the mean ratio of excessof immigration over emigration during the three years taken. When once added to the general population, the increase by the operation of these processes will follow the same rules as the original population of which it now forms part, that is, will be governed, as to its future effect on the numbers, by the principles of geometric progression.

The figures thus resulting, for the white population, will probably be somewhat below what the political economist might expect, in consequence of this adoption of a fixed quantity as the periodical quantum of immigration, for, although the accession to the numbers of the people by the operation of the processes of immigration and emigration, will, relatively to the numbers of the total population, gradually diminish, yet there will probably be for many years to come a small actual increase.

Notwithstanding that the decline of the numbers of the people appears at the present rate of decrease to be very rapid, there is reason to fear that a population which has once reached such a state of decrepitude as that exhibited by the Maori inhabitants of this country will, from causes strictly intrinsic, proceed to its final catastrophe at a greatly accelerated pace, unless, indeed, the causes of decay be ascertained and removed. Moreover, the history of the relations of the white with the colored races in other countries where they have come into contiguity must suggest the apprehension that when the relative numbers of each become such as to banish the necessity for respect and caution in the conduct of the former to the latter, other causes of diminution will begin to operate, the ultimate result of which will be the speedy obliteration of the colored race from the list of peoples.

Time of commencement of causes of decrease.

The causes which have induced this singular retrograde movement in the numbers of the people seem to be of comparatively recent operation. It is 19 years since Bishop Broughton noticed the gradual depopulation of New Zealand, and enquired into its causes; but it is manifest that his lordship's opinion was founded on nothing more trustworthy than mere supposition, and, perhaps, the casual testimony of those most acquainted with the people. The actual numbers of the sexes of the adults in 1844 preponderate in favour of the males, and, it will be observed, that the abnormal proportions had then became more marked, as regards the non-adults. But the adult population of 1844 must have lived in 1830, and the majority of them would have been adult in that year, and have existed, in the prime of life, during the preceding decade. These had passed through the disastrous period of the Ngapuhi wars of Hika; and the immense losses which where then sustained, and which would affect the males in greater proportion than the females, would increase the singularity

of this condition, did not the large number of female children who were sacrificed during the troublous times of the early part of this century, perhaps, balance the losses which the males sustained by war. That the consumption of human life in these wars was exceedingly great, not relatively to the numbers of the people only, but actually, may be gathered from the fact, that the siege and capture of Matakitaki on the Waipa is believed to have cost 2000 lives. Of these a great majority were males, the females being for the most part kept as prisoners. On the other hand, the custom of infanticide was very extensive, and chiefly affected the females. A mother flying with her friends from the pursuit of the enemy killed her female child because it encumbered her flight, but she usually submitted to the inconvenience rather than destroy the male child which public opinion had decided should be carefully preserved, to augment in future years the strength, and contribut to the security of the community, or to revenge the insults to which his parents had been subjected. This custom not only influenced the numbers of the non-adults of 1844, but had previously operated on the population then adult.

It is, however, at this time, impossible to say whether war most diminished the numbers of the males, or infanticide the number of the females. Although it is possible that the disproportion of the sexes actually born may have commenced at an earlier period than 1830, it is probable that the loss to the males by war was amply compensated by the diminution of the numbers of the females from infanticide. One fact is certain, although the exact period of the commencement of this singular condition of the disproportion of the sexes cannot be demonstratively fixed, it is quite clear that this cause of decrease was in full operation, during the years 1830 to 1844, when the non-adult population of 1844 was being produced, and has continued with great energy up to the present time.

Maori opinions on the date of commmencement of decrease.

The unfruitfulness of women is likewise a recent characteristic, if the Maories are to be believed when speaking on this subject. And this must be so, otherwise it is impossible to account for the great increase of the population during the twenty generations which the Maories have passed through in this country,—an increase which has taken place notwithstanding the considerable expenditure of life caused by perpetual wars, and in spite of the constant operation of numerous other influences calculated to check the increase of numbers, and shorten the duration of life. The "rude forefathers of the hamlet" were, according to the universal consent of their existing representatives, blessed with prolific wives, and not seldom with several, all producing simultaneously. Absence of issue from a union was not indeed unknown in former times, but the desire of children was always strong in the breast of the Maori female, and she was usually held in respect according to the number of children with which she had strengthened her tribe.

The ancient remedy for absence of children was wont to be a solitary resort by the unfortunate woman to the mountains, and urgent invocations in a loud voice to those particular immortal gods who were supposed to preside over these matters, a proceeding which, it will scarcely be wondered at, was sometimes followed by the desired result.

Similarly the great mortality of children and the alleged abbreviation of life among adults is affirmed to be of recent commencement. The popular belief is, that in former times the great majority of the children born survived to marry, and the married were all distinguished for unbroken health, and for a physical stature and strength compared with which the attributes of the present generation appear very insignificant indeed. Doubtless these ideas, common more or less to all humanity, may be traced to the same feeling of affectionate regard for bygone days which causes the Englishman still to regret the good days which existed in "merrie England in the olden time;" those "days of cottier cultivation, when, as the poet ignorantly laments, 'every rood of ground maintained its man."'

Causes of decrease

The causes of the decrease of the population are adverted to by several of the enumerators and, as appears to be the fate of every affair connected with Maories, the opinions are various and conflicting. As the subject of the causes of the disease is intimately connected with that of the social condition of the people the extracts now made will embrace the remarks of the enumerators on that subject also.

Opinions of Enumerators thereon.

Mr. White: "I regret that I cannot report any very marked improvement in their condition, except in a few instances in farming; but there is a marked decrease of quarrels amongst themselves, on their old prejudices and customs, and a general desire of improvement, which they want the energy to carry out. From my observation, I believe the natives of the North to be more indolent than those of other portions of New Zealand, and also the most peaceful and loyal."

Mr. Kemp, after speaking of "a perceptible increase," as before quoted, says, "The natives attribute this in a great measure to the disuse of mercurial and other strong medicines, which, at the same time, their diet, clothing, and employment have approached more nearly to that of the Europeans. 2ndly. In their general social state, it will be gratifying to the Government to find, that they are in the enjoyment of many European comforts."

Mr. Halse: "For nearly 4 years, they" (the Taranaki natives) "have been engaged in a struggle in asserting their claims to the land, which has always been a subject of contention with them, and the mortality from this cause has been considerable. Not that many natives have fallen, but the harassing nature of the struggle, the misery and privations under-

gone, from the confinement of fortified pas, all tend to shorten life. To this, is to be added the mortality amongst the children and youth of both sexes. As a rule, medical aid is declined by them, and those who enter the colonial hospital, either go when their diseases are far advanced, or refuse to remain sufficiently long there, to benefit by the treatment and change.

"An increasing taste for spirit drinking is prevalent amongst both sexes, but more particularly with the young, who resort to all kinds of devices to obtain it. The difficulty of checking this by information arises from the aversion of the natives to give evidence. The supplies are understood to be usually obtained through a third party without the knowledge of the landlord, and drinking is likewise indulged in at the native pas."

Rev. C. H. Snackenberg: "The greatest cause of decrease, I believe, is *uncleanness*, inwardly and outwardly, in diet, dress, and habitation, in body and mind, in all their thoughts words, and actions."

Mr. Fenton: "In my opinion the social condition of the Maories is inferior to what it was five years ago. Their houses are worse, their cultivations more neglected, and their mode of living not improved. The mills in many places have not run for some time, and the poverty of the people generally is extreme.

"At the same time there has appeared a remarkable activity of mind, directed to the development of political ideas, and the establishment of a system of government, which will be productive of good or ill, according to the channel in which it permanently directs itself. Employment of this intellectual energy is now a political necessity, for the Maories are utterly unable, without direction, to found and continue any system which will supply rules of action calculated to make them good citizens, and useful colonists."

Mr. Heaphy enters at length into the question of the decrease of the people, and suggests many causes. His remarks are valuable and suggestive. He says: "The tribes, which I refer to, being those which are in most frequent communication with the largest European settlement in New Zealand, I was particular in examining whether the cause of decrease was connected with the neighbourhood of Europeans.

"The cohabitation of the Maori women with white settlers, and their habits of prostitution in Auckland, must have some effect, undoubtedly, in keeping down the numbers, but it is quite inadequate, as a cause, for the general diminution, which is everywhere apparent. From the proportionate scarcity of women about the Thames, Coromandel, and Waiheke Districts, it became interesting to ascertain whether their paucity of numbers in the native villages, arose from their congregation in Auckland. The returns, however, show that there are at the most, but twenty three women, withdrawn from the native settlements to the town; a number entirely inadequate to account for the scarcity of women and children on the coast.

"Half-caste children being included in the returns, it becomes evident that cohabitation with the whites is not a sufficient cause for the diminution.

"Of diseases introduced amongst aboriginal races, by contact with Europeans, the small pox, syphilis, and measles are those which have most depopulated. But, in New Zealand, the small pox has not appeared; the syphilis assumes, in the natives, so mild a form, and is so easily eradicated, that the writer never heard of a fatal case; and the measles, which have once passed over this province, were not more marked in their effect amongst the natives, than amongst the whites. Dr. McGauran states, that from his long experience in the Colony, and connexion with the hospital, he is convinced that diseases contracted by Maories from Europeans, do not, in the former, assume a violent or dangerous character. The native constitution appears to have the power of throwing off syphilitic disorders, with but slight medical aid, and secondary symptoms are almost unknown. Scrofulous diseases, hereditary in the race, appear, on the other hand, to be of a most fatal character, manifesting itself in a great variety of forms. Pulmonary disease is the chief cause of mortality.

"Of the other causes, intemperance is generally the most fatal amongst the natives of countries colonized, but with the Maories, intoxication, though an increasing, is only an *occasional*, not an habitual excess, and can have but a very slight share in contributing to the decrease."

The constitutional unproductiveness of the women appears to be the chief cause of the want of numbers. The habits of the women in following laborious pursuits, and especially in carrying heavy loads, not only shortens life, but in a greater degree, abridges that period over which they may become mothers.

European clothing, heaped on the native one day, to be cast aside the next, and replaced by a thin blanket or sheet, must tend to the increase of lung disease.

Abortion, produced by artificial means, appears to be far from uncommon.

While aware of our duty in administering to the well-being of the Maori, and guarding him against those diseases and evils that must tend to depopulate, one cannot overcome the conviction that the race is "run out," and that after two or three generations, a remnant only will represent the people. Has isolation been the cause? I am not aware that the fact of New Zealand being the (populated) island most remote in the world from any other populated country, has attracted the attention of naturalists. May an infusion of fresh blood not be necessary to restore prolificacy? Amongst the island of Melanesia, where communication from group to group is easy, the villages teem with children, and young mothers, with several

young children hanging about them, are met continually, notwithstanding the effects of disease and the insecurity of perpetual warfare.

Where native women, after an irregular life in Auckland of a year or two, cohabit regularly with a white man, large half-caste families are the result. On the Coromandel coast the children of a few white settlers exceed in number those of the Maori tribe, amongst which they live.

An opinion obtains among the faculty in Europe that the reproductive functions are materially injured by the continual use of tobacco. Be this established or otherwise, there can be no doubt that the constant habit of smoking, in young girls, must be injurious in a high degree, to the Maori population.

Feeding infants, at the time of their weaning, upon decomposing potatoes and Indian corn, and upon heavy and indigestible flourcake, a universal practice among them, must be very prejudicial."

Ordinary checks on increase of populations.

The difficulty of procuring in adequate plenty the necessaries of life in tolerably peopled countries has two effects. It either indisposes the greater number of people to marry early, and this effect writers on population call the prudential or preventive check; or it disables them from rearing in health the greatest families, and this is named the positive check. How powerful must be the operation of these checks in many of the well-peopled countries may be judged from an example taken from Europe, where judicial authority has been interposed to compel regard to them. "In Bavaria, marriage is not allowed between people without capital, unless with the previous permission of those who manage the poor institutions of the district. Clergymen who marry such people without that permission, are liable for their maintenance, in case of their becoming chargeable. This restriction is assigned as one great cause of th want of any excess of population in Bavaria, and of the general absence of extreme poverty and misery in that country." It is obvious that neither of these checks, whose joint operation is so powerful an obstacle to increase in Europe, and all well peopled countries, can have any effect in New Zealand as regards the aborigines. Possessing abundance of good land, with ready markets for the disposal of agricultural produce and the purchase of clothing, and other appliances necessary to comfort and health, and easy means of transit to and from the markets, neither of these checks can exercise any retarding influence to the rapid growth of the people. Moreover inhabiting a country whose climate is salubrious beyond a parallel there exist no physicial reasons why the Maories should not exhibit an increase of their numbers at the highest rate of which the human race under the most favorable circumstances is capable.

Theory of disappearance of colored races before the white race.

The theory that the colored race must fade away before the white race can receive little confirmation from the present decay of this population, for the great evil existed, as we have seen, in full force during the decade of years ending 1840, a period antecedent to the colonization of the country, when the whites were insignificant in numbers and sparsely located.

At Rangiaohia, which has for many years been the residence of more Europeans than are or ever have been contained in the whole of the remaining part of the Waikato district, the decrease of the population is 33 per cent below the general average.

Moreover, the theory named has never been satisfactorly established as a law of nature. The idea that the inferior race is ordained by some mysterious but certain natural law to dwindle and fade away in the presence of the race of superior physical endurance and greater intellectual energy, like the low vegetation in the neighbourhood of the baleful upas tree, receives little confirmation from facts. That the red races of North America have gradually receded before the encroaching perseverance of the white race, and have in many instances entirely disappeared, is not to be held to be the consequence of the simple presence of the latter, but is to be attributed not only to the extermination over extensive districts, of the game which forms the principal article of subsistence to a nation of hunters, but in a greater degree, to the destructive effects of intemperance, European diseases, and exterminating wars waged not only between the races, but among themselves. In localities where these causes of depopulation have had no or only a partial operation, or where the people have been induced to adopt the habits of civilization, the North American Indians have increased, and show every sign of a healthy growth and prolonged existence.

Prosperous condition, as to numbers, of the Red Indians in Red River Settlement.

According to a statement of the Bishop of Rupert's Land, published in the Church Missionary Intelligencer of March, 1858, the Red River settlement, the principal among those placed far in the wilds of the North Western Regions, contains a population of 6,523 being an increase in 7 years of 1292, or an average annual rate of increase of 1 in 28·43 of the whole population at its present numbers. If this increase could be attributed wholly to reproduction it would exhibit a rate superior to that obtaining in England and Wales, equal to that of Nelson, and nearly equal to the mean annual rate of the whole of the white population of New Zealand. But, either a large proportion of this increase must be due to the immigration of the wandering tribes who would gradually cluster around the locality where order reigned and where the necessities of life existed in greatest abundance, or a great proportion of the people must still be heathen, for during a period of 15 years the registered baptisms amounted only to 545, while the registered burials were 308. This, however, shows an excess of births over deaths in the proportion of one death to 1·77, or slightly more than 1¾, births. 1900

half-castes are included in the above population, one of whom is the chief Magistrate of the village.

It seems, then, that the simple contiguity of the white race cannot be alleged as a cause of the decrease of the people. It is true that the evil conditions have increased in the population under consideration generally during the last period of 14 years, but the causes existed, as we have seen, previously to 1840, and an augmented energy in their action must be attributed to the ordinary operation of the principle of geometric progression which governs population rather than to the existence of a new element which could have as little effect in increasing, as it had in originating these causes. That the evil has increased may be seen by a comparison of the relative numbers of the adults, and non-adults, in 1844 and 1858 respectively. In 1844, the total population examined amounted to 1699, of whom 475 were non-adult, giving a proportion of 1 non-adult to 2·57 adults. In 1858 the total population is 1369, of whom 320 are non-adult, showing a proportion of 1 non-adult to every 3·27 adults. On the other hand, the relation of the sexes of the non-adults in the latter year is slightly improved, as compared to the relation which they had to each other in 1844.

Centesimal proportions of the sexes of the non-adult population :—

	Males.	Females.	Total.
In 1844	59·15	40·85	100
In 1858	55.63	44·37	100

Abstraction of females by the whites.

Nor can the number of females abstracted from the Maori population to form unions with males of the white race be assigned as a cause of the decrease. The total amount thus taken is quite insignificant compared with the total number of the females. Thus we find that in the town of Auckland 23 women only are thus absorbed, some of whom are half-castes. Out of the population contained in Table 1, containing in 1844, 788 females, and in 1858, 616 females, 8 have been abstracted, of whom 2 re-appear amongst the 23 resident in Auckland.

Moreover, with reference to this particular interference, compensation is to a great extent afforded by the half-caste females who return to the people of their mothers, and form alliances which produce offspring more than sufficient to replace the loss originally sustained.

Theory of barrenness of colored female, after sexual intercourse with white male.

The theory of M. Strzelecki, that a colored female having had sexual intercourse with a white is thenceforth incapable of propagating her own race is quite false as regards the colored race under consideration. Several instances appear in Table 1, in which females have had children by males of both races, and, as a rule, the production by the Maori husband has been subsequent to the birth of children by the European husband. Instances even are not unfrequent of women, who, having for years indulged in the towns in that irregular and mercenary intercourse which is supposed to be utterly destructive of the powers of reproduction, have returned to their native valleys, and given proof that their procreative functions have not suffered material injury. Doubtless, the Maori population to a certain extent suffers by the necessity which seems to have been imposed by usage upon them, of yielding the supply of females who are to minister to the irregular appetites of the town populations; but the numbers affected by this drain are so small, being only 23 for Auckland the largest of the European settlements, that a sensible check to population can scarely be attributed to this cause even if the future fecundity of these females were utterly destroyed, which is not the case.

European diseases.

If we seek amongst the diseases introduced by the whites for the cause of decrease which has operated for so many years back, we shall be equally dissatisfied with any or all of these checks to population, as an explanation of the phenomenon. Dr. Thompson of H.M. 58th Regiment, an indefatigable enquirer into the physical characteristics and condition of the aboriginal race and whose opportunities of observation cause much value to attach to his opinion, has instituted researches into this branch of our subject, and has recorded much important information to which reference may be had.

Any remarks which might be made on this subject can have little force from any other than a professional man. The statement of Mr. Heaphy and the opinion of Dr. McGauran, quoted supra, entirely agree with the observation of the writer, with the exception that the effects of the measles which swept through the country in 1853 appear to be much underrated, and that the supposition of the existence of the practice of causing abortion by artificial means is quite incorrect. Neither this crime, nor the cognate one of infanticide, is more general among the Maories, or has been for many years, than amongst the Europeans; on the contrary, the desire for living offspring is very great.

The small pox which was so terrible a scourge to the nations of Europe before the discovery of vaccination and which nearly destroyed many of the hunting tribes of North America, has not made its appearance in New Zealand, nor has any other European disease

produced any effects more marked than those which usually attend the visitation of certain epidemics in Europe.

Nor, indeed is it among the causes of mortality of the adults that the reason for the decrease of the population is to be sought, so much as in the want of fecundity of the females and the extreme unhealthiness of the children actually born. As has been previously shown the average number of deaths in relation to the total population, although very high, is not so remarkable as the relative paucity of surviving births. Thus, taking the annual mortality in New Spain at 1 in 30, and the annual additions to the population at 1 in 17, the mortality of the New Zealanders, 1 in 22¼, does not present so striking a contrast as the dificiency of births, only 1 in 33½. It is true that the early deaths and early marriages of a tropical climate, and the consequent rapid passing away of each generation, scarcely render New Spain a case for instituting a comparison ; but, as the population of that country was, according to M. Humboldt, increasing at the time he made his observations at a rate to double itself in 29 years, a rate of progress very remarkable in a country already tolerably well peopled, there is abundant margin left for allowances of every description. Amongst the Maoris also, unions between the sexes commence at a very early period, and, although the average duration of life is unknown or the average expectation of life at any period of it, the great number of men still living who can speak of and describe events that happened thirty years ago, in which they moved and took part as the mature adults of that day, must lead us to suppose that the Maori enjoys in common with the European the advantage which a temperate climate possesses over a tropical one in the prolongation of human life when unchecked by more powerful antagonistic influences.

Use of spirituous liquors.

The remarks of Mr. Heaphy leave little unsaid on the subject of intemperance. The use of spirituous liquors *may* have exercised some influence prejudicial to the increase of the people, especially amongst women in a state of pregnancy, but this is not *known* to be the case. In the great district of the Waikato and its tributaries, whence the information forming the basis of the preceding calculations has been derived, the quantity of spirits consumed has been small, and has not produced the slightest effect, either on the increase or the habits of the people. In fact, a reference to Table 2 will show that while the total adult male population has decreased at a rate of 17·34 per cent, and in some cases at rates above 30 per cent, the particular adult male population of Rangiaohia has suffered a diminution of only 2·34 per cent. Yet more spirits have been consumed in that village than in the whole of Waikato put together. I am informed by Mr. Carleton, the member of the House of Representatives for the Bay of Islands, that the consumption of spirits in that district which was at one time very great has materially diminished during the last two years, although the same facilities for obtaining spirits exist as heretofore. The fact is that the use of spirits has had no effect upon the numbers of the people. The spirit drinker is the exception, and the opportunities of procuring the stimulant in quantities sufficient to operate injuriously on the whole race, do not exist.

Use of tobacco.

The opinion which the faculty entertain as to the material injury which the reproductive functions suffer from the continued use of tobacco must be entitled to respect, but it is somewhat remarkable that the aboriginal race of New Zealand should be held to be the only one that exhibits on an extensive scale clear proofs of the theory. The Maori women cohabiting with Europeans consume more tobacco than those remaining in the native settlements, simply because they can procure more, yet their production of children is increased in a similar ratio. Families of 6, 9, and even 13 half-caste children are met with forming living evidence of the fallacy of this doctrine, at least as applicable to this country.

It appears then that it cannot be directly proved that the causes of the decrease of the Maori race arise from the contiguity of the Europeans, nor from any diseases introduced by, or habits contracted from them.

Still, many facts appear on record which tend to show that by some mysterious law of nature the intercourse of persons may cause disease, even where both parties are in perfect health, more especially in cases where the parties are of entirely distinct race.

The following observations, extracted from Darwin's *Naturalist's Voyage* (Beagle), will elucidate my meaning :—

"The Rev. J. Williams, in his interesting work, *Narrative of Missionary Enterprise*, says, 'The first intercourse between natives and Europeans, is invariably attended with the introduction of fever, dysentery, or some other disease, which carries off numbers of the people.' Again he affirms 'It is certainly a fact, which cannot be controverted, that most of the diseases which have raged in the islands during my residence there, have been introduced by ships ; and what renders the fact remarkable is, that there might be no appearance of disease among the crew of the ship which conveyed this destructive importation.'

"This statement is not so extraordinary as it at first appears, for several cases are recorded of the most malignant fevers having broken out, although the parties themselves who were the causes, were not affected. In the early part of the reign of George III, a prisoner who had been confined in a dungeon, was taken in a coach with four constables

before a Magistrate, and although the man himself was not ill, the four constables died from a short putrid fever, but the contagion extended to no others. From these facts it would almost appear that the effluvium of one set of men shut up for some time together was poisonous when inhaled by others, and possibly more so if the men be of different races.

"Captain Beechey (ch. 4, vol. 1,) states that the inhabitants of Pitcairn's Island are firmly convinced that after the arrival of every ship, they suffer from cutaneous and other disorders. He attributes this to the change of diet during the time of the visit. Dr. McCulloch (Western Isles, vol. 2, p. 32) says, it is asserted that on the arrival of a stranger, (at St. Kilda) all the inhabitants, in the common phraseology, catch a cold. In Vancouver's voyage, there is a somewhat similar statement with regard to Otaheiti. Dr. Dieffenbach states that the same fact is universally believed by the inhabitants of the Chatham Islands, and in part of New Zealand. It is impossible that such a belief should have become universal in the northern hemisphere, at the Antipodes, and in the Pacific, without some good foundation."—(*Naturalist's voyage*, p. 436.) Original note to the above.

Captain Beechey's statement about Pitcairn's Island is corroborated by a gentleman of my acquaintance, who, with four others, passed three weeks there in the year 1850. He received letters from the island shortly after his departure stating that the people had suffered severely from influenza. But there had been no change of diet during the time of the visit.

The celebrated traveller, Dr. Livingstone, makes a similar observation. He says, "The Boers, under Potgeiter, visited Delgoa Bay for the first time about ten years ago, in order to secure a port on the East Coast for their Republic. They had come from a part of the interior, where the disease called croup occasionally prevails. There was no appearance of disease amongst them at the period of their visit, but the Portuguese inhabitants of that Bay found that they had left it among them, and several adults were cut off by a form of the complaint called *Laryngismus stridulus*, the disease of which the great Washington died. Similar cases have occurred in the South Sea Islands. Ships have left diseases, from which no one on board was suffering at the time of their visit."—(*Missionary Travels and Researches in South Africa*, by David Livingstone, L.L.D., D.C.L., p. 649, Ed. 1857.)

Maori opinions on causes of decrease.

The Maories themselves attribute their decadence, in some measure, to the introduction of new food and clothing, and the attendant change of habits. They affirm that in former times when their custom was to walk abroad with little clothing, and to pursue their ordinary occupations in a state of almost nudity, their skins thickened and became insensible to the effects of cold or heat, and moreover, that in those happy days, when fernroot and the root of the wild convolvulus formed the staple of their diet, their physicial strength and endurance was great, their health unbroken, and their appetites much more worthy of notice than at present. This latter manifestation, though difficult of belief, may be true, and, in fact, the direct consequence of their insufficient clothing and the greater degree of cold to which they were subjected. Baron Liebig, in his *Animal Chemistry*, says, "Our clothing is in reference to the temperature of the body, merely an equivalent for a certain amount of food. The more warmly we are clad, the less urgent, up to a certain point, becomes the appetite for food, because the loss of heat by cooling, and consequently the amount of heat to be supplied by the food is diminished.

"If we were to go naked like certain savage tribes, or if, in hunting and fishing we were exposed to the same degree of cold as the Samoyedes, we should be able with ease to consume 10 lbs. of fish or flesh, and perhaps a dozen of tallow candles into the bargain, daily, as warmly clad travellers have related with astonishment of these people."

Effect of vegetable diet.

The Maoris subsist mainly on a vegetable diet, and it has been alleged that this fact will, to some extent, explain the deficiency of vigour which appears to exist in the reproductive powers of the race. Resorting again to comparisons with other countries to ascertain the amount of respect to which this idea is entitled, we find in the life of Francis Xavier, "The Japanese, like all other people who believe in the metampsychosis, live on vegetable food."

We learn from returns transmitted by English consuls in consequence of enquiries made through Lord Palmerston by the Poor Law Commissioners the following facts relating to some of the principal countries of Europe:—In Norway, "the poor consume very simple food; salt herrings, oatmeal porridge, potatoes, and coarse oatmeal bread, forming the principal part of their diet: once or twice a week, they may obtain a piece of bacon or salt meat, and those who live on the coast, or near to rivers or lakes, procure fresh fish."

In Sweden, "agriculturists in the southern provinces live upon salt fish and potatoes, in the northern provinces porridge and ryebread form their food. Artisans are sometimes able to procure a little meat."

In Denmark, "the principal food of the labouring people is ryebread, groats, potatoes, coffee, butter, cheese, and milk."

In Mecklenburg, "with these advantages they are able to procure a sufficient quantity of good sound food, and occasionally to indulge in the use of meat, which falls to the lot of the working classes in very few of the countries on the continent of Europe."

In France, "the food varies in different districts. Throughout the district called Landes the food consists in ryebread, soup made of millet, cakes made of Indian corn, now and then some salt provisions and vegetables, rerely if ever, butchers' meat. In other parts, they eat wheaten bread, soup made with vegatables and a little lard or grease, twice a day, potatoes and other vegetables, but seldom butchers' meat."

In England, in answer to the question, "Could a labourer, his wife, and four children, subsist on the aggregate earnings of the father, mother, and children, and if so, on what food?" 491 parishes replied "with meat," and 125 parishes, "barely or without meat."

In Ireland, the food of the labouring classes consists mainly of potatoes and milk, according to Carlton and other popular writers on that country.

That a vegetable diet is sufficient to maintain man not only in perfect health but in a condition to undergo the utmost amount of fatigue and hardship, may be learned from the fact that, during the stupendous exertions made by the Arabians during their wonderful career of conquest under Mahomet and his successors, their ordinary diet did not include animal food. "They knew nothing of the luxuries of the pampered Greeks, and were prohibited the use of wine. Their drink was water, their food principally milk, rice, and the fruits of the earth, and their dress the coarse garments of the desert."—(Irving's *Successors of Mahomet.*)

It is needless to search for further facts among the dense populations of Asia, to prove that the human species may exist in perfect health, and multiply, whilst subsisting on a diet of which animal food forms but a small part. And it is equally difficult to conceive that a change from comparative nakedness to a state of comfort, as regards clothing, not far, if at all, inferior to that obtaining among the labouring classes of Europe, can have exercised a prejudical effect on the general health of the people.

In fine, the fact that a retrograde movement in the numbers of the people had fully commenced, and had produced very sensible effects before these supposed causes of decrease came into operation, must form an insuperable obstacle to the logical maintenance of the position, that the decrease is attributable to the lack of animal food, or to the adoption of European clothing.

Causes of decrease sought for among habits proper to the Maories.

If we search for the causes of the decrease of the people amongst habits which are purely internal, next in order after the depopulating intestine wars, we should probably place the frequent custom of infanticide. That this custom was a very important obstacle to the proper increase of the Maori race may be believed from the fact that the writer has met with instances of women who have destroyed four, six, and even seven children, offspring of themselves, and mostly females. However, the universal testimony of those best qualified to judge, is conclusive that this custom has for many years been almost extinct. Probably the year 1835 may be named as the period of its ceasing to exist. Rare instances have occurred since that date, but utterly insufficient in number to have any serious effect on the state of the population.

Wars.

At a somewhat later period large wars also terminated; the expeditions of the Waikato tribes against Taranaki in 1836 and 1837, and the struggle of the same great sept with Ngatiwhakaue, commencing in the year 1835 and ending in 1839, being the last undertakings of any importance. The seige and capture of Kaipaka near Rangiachia by the chief William Naylor Te Awaitaia and his confederate tribes had proceeded these operations. The battle of Te Ihutaroa to which reference has been previously made and in which the Ngatitipa contested the ownership of about 20 acres of land with Ngatipou, occurred in 1846, and occasioned the death of 33 individuals some of whom appear in the previous Tables; but peace immediately ensued, and the effects of the contest did not extend beyond those who died on the field. The numerous petty wars which, during the past two or three years, have caused some loss to the coast tribes on both sides of the northern island, have had no effect on the people of Waikato who have been peculiarly the object of this enquiry.

Promiscuous sexual intercourse.

Illicit commerce between the sexes, although considerable at the present time, was much more extensive in former periods. The Maoris are unanimous in representing sexual intercourse as extremely promiscuous during the times when several families inhabited one large house. Captain Cook remarked the prevalence of this vice:—"Amongst the females, chastity is lightly esteemed." And whatever alteration the habits of the people have lately undergone respecting this particular habit has been for the better. Therefore, to whatever degree the fecundity of females may be affected by practices of this nature, the question of the present decline of numbers cannot be solved by adducing as a cause a habit which was more general during periods when the race was increasing.

Low social habits.

The want of cleanliness in the extended sense in which the word is used by Mr. Schnackenberg, though by itself insufficient to account for the extraordinary mortality to which the New Zealanders have lately become subject, will, joined to the other habits which characterize a low state of civilization have considerable effect in shortening the duration of human life. The gradual prolongation of life in England as the manners and condition of the people have improved is very remarkable. The estimated proportion of deaths in the course of the 18th century, were:—

In the ten years ending	1700	one in	$39\frac{1}{2}$
"	1710	"	$36\frac{1}{10}$
"	1720	"	$35\frac{1}{2}$
"	1730	"	$31\frac{1}{10}$
"	1740	"	$35\frac{1}{5}$
"	1750	"	$40\frac{3}{4}$
"	1760	"	$41\frac{1}{4}$
"	1770	"	$41\frac{1}{5}$
"	1780	"	$41\frac{1}{2}$
In the five years ending	1785	"	$41\frac{3}{4}$
"	1790	"	$45\frac{1}{5}$
"	1795	"	$47\frac{1}{5}$
"	1800	"	$47\frac{3}{4}$
And for the ten years preceding	1811	"	$53\frac{3}{4}$
"	1821	"	$60\frac{1}{2}$
"	1831	"	$58\frac{1}{2}$

Showing a continually decreasing mortality. "This effect, says Mr. Porter, "so strongly indicative of amendment in the condition of the people, must be attributed to the concurrence of various causes, among these may be mentioned the less crowded state of our dwellings, the command of better kinds of food and medical attendance, the superiority and cheapness of clothing, and probably, also more temperate habits and greater personal cleanliness. One influential cause of the diminished rate of mortality will be found in the introduction of vaccination which has had so powerful an effect in reducing the rate of mortality among children, besides which the extensive drainage which has been going forward in that part of the country, which, owing to the presence of stagnant waters, was once productive of intermittent fevers, has added to the general healthiness of the country."

Similarly, Rangiaohia presents to our notice a decrease of 13·10 per cent on its total population as compared with 19·42, the per centage loss sustained by the total population of the district over which these enquiries have extended, and that place has been noted as the earliest in commencing the cultivation of wheat, and adopting, as far as they have been adopted, European clothing and habits.

Life prolonged, but number of births not increased by improvement in social condition.

But it does not apear that the improvements of civilization have a similar effect upon the number of births, at least in old and well peopled countries. Thus in England :—

For the ten years preceding	1811	the births were	one in	$31\frac{1}{3}$
"	"	the deaths	"	$53\frac{3}{4}$
"	1821	the births	"	$31\frac{3}{4}$
"	"	the deaths	"	$60\frac{1}{2}$
"	1831	the births	"	$34\frac{1}{2}$
"	"	the deaths	"	$58\frac{1}{2}$

"Thus the number of births have decreased and is still decreasing in proportion to the amount of population in England." It would seem however that this diminution of the number of births is the effect of the checks before alluded to which operate very powerfully in England, and that this symptom should not appear in this country where these checks can have no obstructing influence whatever. In thinly peopled but fertile countries, as in all newly settled states, a great proportion of births should be looked for as a natural manifestation.

Hence, notwithstanding the presence of injurious habits, and a low state of civilization, we should expect to find among the population under consideration, large annual additions to the numbers more than sufficient to replace the loss caused by a greater rate of mortality than would characterize a people of improved habits. "Circumstances," says Mr. Porter, "which have increased the rate of mortality, have always tended to increase, likewise the number of births. In Ireland, population increases almost as fast as in England, and mortality diminishes in its rate, yet the people improve but little in condition."

Comparison with Ireland.

It would be difficult at once to perceive any reason why the Maori population should not increase at a rate at least equal to that of the labouring classes of Ireland. The food of the two people is similar, with the exception that the Irish peasant obtains milk and does not eat putrid food. The climates are similarly salubrious, the soils equally fertile, and the state of cleanliness, both as regards person, clothing, and habitations, affords, according to Carlton and other writers who have depicted Irish peasant life, no striking point of difference.

Moreover, the pursuits of the great bulk of the Irish people resemble those of the New Zealanders, that is, are connected with the cultivation of the soil. "Out of a population consisting of 1,385,066 families, Ireland employs in the pursuit of agriculture the labour of 884,339 families, being at the rate of 638 in each 1000, or nearly two-thirds of the inhabitants. In Ireland the system of parcelling out the land to numerons cottiers, whose scanty means do not enable them to grow more than suffices *for their own consumption*, while the stipulated rent is frequently paid by labour and not in money, prevails to an extent which renders it one of the most fruitful sources of misery to that country. Out of 106,608 males, twenty years old, occupying land in Ireland in 1831, more than three fourths (87,819) came under the class just described. Yet the population, which in 1821, was 6,801,827 had increased to

7,767,401 in 1831, showing an advance nearly as great as that of England, and greater than that of Scotland and Wales."—(Porter's *Progress of the Nation.*)

It would thus appear that a low social condition does not necessarily prevent the growth of the numbers of the people at a rate equal to, or even greater than, that obtaining in countries of more advanced habits or greater modicum of comfort.

If further proof is needed, an extreme case may be found in the slave states of North America, where labour is extremely severe and misery of every description most abundant.

The following statement will show the progress of the numbers of the colored inhabitants of the three principal slaveholding states during the decennial periods mentioned:—

	1820.	1830.	1840.
North Carolina.....	296,017	215,601	245,817
South "	258,475	315,401	327,038
Georgia.....	149,656	217,531	280,944

It would appear then that the simple reason alleged by Mr. Snackenberg for the diminution of the numbers of the people, although sufficient when acting simultaneously with other habits of a similar character appertaining to a low social condition, to shorten the average expectation of life at the time of birth, yet does not extend to prevent the compensating increased number of births. In fact the effect of the action of these conditions appears to be simply to abbreviate the duration of life without interfering with the increased number of births, which, as in the case of New Spain, seems to accompany a greater mortality, or in other words to cause the more speedy disappearance of a generation, but not to affect the maintenance and due advancement of the numbers of the people.

Mortality amongst children, caused by low social habits and unfit food.

The proposition of Mr. Snackenberg taken in its extended sense as applying to a generally low social and moral condition appears to apply with greater force to the non-adult than to the adult members of the population. That the mortality among the youth of both sexes under the age of 14 is very great, not only relatively to the total population, but actually, a reference to Tables 1 and 2 clearly manifests. Out of a total number of persons of both sexes under 14 years of age in 1844 of 475 only 283 have survived to the present time, exhibiting a loss of upwards of 40 per cent. And if it is considered that to supply these 475 a number of births must have taken place of which, judging from Table 4 and the previous enquiries on this subject, one half died before the enumeration, leaving 475 as the survivors, the loss to the non-adult population appears astonishing, amounting to above 70 per cent. Of 15 children, 8 male and 7 female, who, at the taking of the census in 1844 were infants unnamed and who appear in the statements called Table 1 as "pepe" or "infant," only 2 now remain alive, 1 male and 1 female.

There can be little doubt that unwholesome food and insufficient clothing must be much more prejudicial in their effects on the young than on those who, besides possessing the greater vitality of manhood, have proved the strength of their constitutions by living through these hardships. The great amelioration which care and attention affect in the health of the young may be gathered from a table compiled by Dr. Mitchell with reference to the children in Christ's Hospital, and quoted by Mr. Porter in his work so often referred to. It will be seen from the return annexed how exceedingly small the rate of mortality has been in that establishment throughout the period referred to, viz. from 1813 to 1833. "This circumstance shows how very instrumental in preserving life during the years of childhood, are substantial clothing, an abundance of wholesome food, good lodging, healthful exercise in the hours allowed for recreation, and immediate attention on the first appearance of sickness under the care of skilful medical men."

Period.	Average number of children.	Deaths.
1814 to 1818	..... 1026	51
1819 to 1823	..... 1038·6	44
1824 to 1828	..... 1082·4	40
1829 to 1833	..... 1134	36

It thus appears that in the first five years, viz. from 1814 to 1818, the annual mortality was 1 in 100, that in the next five years from 1819 to 1823 the rate was only 1 in 118, that in the five years from 1824 to 1828 it was further diminished to 1 in 135, and that in the last quinquennial period the annual mortality was no greater than 1 in 157½ of the children.

The average annual number of children in the establishment during the last three periods, embracing a duration of time of 15 years, was 1085, and the average annual number of deaths was 8, exhibiting an average annual mortality of 1 in 135½, or 1 in 9 1-30th for the whole period of 15 years.

Among the 475 maori children who appear in the census of 1844 192 deaths have taken place during a period of 14 years, or, the mortality has been at the rate of 1 in 2½ for the whole period, or 1 in 34 2-3rd annually. An error will be apparent in this comparison, for every year as it passed by would add a certain number of these 475 children to the class of of adults or persons about 14 years of age, and all the survivors are now upwards of 14. This error, however, operates in favour of the health of the Maoris in the comparison, for the ordinary mortality is much greater among persons under the age of 14 years, than among the class between 14 and 28. According to the tables compiled by Mr. Finlayson for the purpose of ascertaining rates of life insurance, it appears that out of 10,000 persons of both sexes born

in Carlisle 3665 died under the age of 14 years, while, of the remaining 6335 persons only 587 died between the ages of 14 and 28.

The average annual number of children in the school conducted by the Rev. J. Morgan, at Otawhao, near Rangiaohia, during the period extending from 1849 to 1858 has been 54, deducting those who did not remain 6 months in the establishment. The total number of deaths that have occurred among these children, including those who returned to the native settlement on the approach of death, as the custom is, have been 4 maoris and 2 calf-castes ; total 6. Thus the mortality in this establishment during the whole period of its existence has been 1 in 9, or an average annual mortality of 1 in 81.

The average rates of annual mortality among these three classes of non-adults will thus appear contrasted :—

In Christ's Hospital.....	one death annually in	135½
In the Otawhao School.....	"	81
In the Native Villages.....	"	34¾

These facts tend to show how greatly the expectation of life may be increased during the years of childhood by good lodging and abundance of wholesome food, combined with a rational mode of discipline both moral and medical. And this great improvement as regards the health of the children in the Otawhao establishment has been obtained, notwithstanding the extreme scantiness of their clothing which, especially during the winter when the thermometer during the night frequently registers 27 ° and even 25 ° Fahrenheit, is utterly inadequate to retain the proper amount of animal heat. The only peculiarity of the food consumed by these children is that the staple is wheat and wheaten flour instead of potatoes, and at all seasons of the year abundance of milk is supplied to them.

Had the rate of mortality which forms the rule in Mr. Morgan's school obtained amongst the children in the native settlements during the last 14 years, the deaths between 1844 and 1858 would have been 82 instead of 192. The effect which such a beneficial change in the health of the young must have upon the movement of the entire population is too apparent to need remark.

It will appear then that, with the exception of the debased social habits which usually attend a low condition of civilization, the previous enquiries have failed to discover any causes whose operations have been sufficiently influential to account for the extraordinary symptoms which have characterized the aboriginal people of this country from a period commencing about the year 1830. The causes of decrease usually assigned have been successfully investigated, and have failed to afford any satisfactory explanation of the phenomenon.

Causes of decrease suggested.

The suggestions which follow are tendered with much hesitation and will be made with great brevity, not indeed with the desire that they may be accepted as a conclusive determination of the enquiry, but rather with the hope that some member of the medical profession may be induced with the aid of the foregoing facts and figures, to examine into the whole question for the proper solution of which that peculiar knowledge is necessary which the faculty alone possesses.

Doctrine of special providential interference.

A doctrine has been asserted and has found favor with some, that as nations rise and fall, and populations increase and decrease at the will of the Divine Providence, peculiar facts such as those which form the subject of this enquiry may be simply attributed to the exercise of such a Divine decree. It is, however, a characteristic of the plan of management under which the affairs of the world are administered, that the will of Providence is always carried into effect by ordinary means, and the most extraordinary results may be traced to the operation of simple natural causes. The laws which govern the reproduction of the human species are, it must be admitted, very obscure, but it is not reasonable on that account to relieve ourselves from the difficulty by resorting to the doctrine of special providential interferences. Even in individual cases we may recall singular instances of eccentricity in Nature's operations with respect to reproduction, many of which are as worthy to be attributed to a suspension of Nature's laws, as the present position of the Maori population.

Thus, we read in the Greek History of the twenty daughters of Danaus and these are matched by as many wives of another man. Bruce tells us that women in Eastern countries have children only for nine years; yet how prodigiously their populations have extended. Gideon had no fewer than 70 sons by his wives, besides 1 by his concubine. Bruce says, "the Imam of Sama was not an old man when I was in Arabia Felix in 1769, but he had 88 children then alive, of whom only 14 were sons. The Priest of the Nile had 70 and odd children, of whom, as I remember, above 50 were daughters. Gibbon says in his history, "the total amount of this imperfect calculation," (of the people of the Roman empire in the time of Claudius) "would rise to about 120 millions of persons, a degree of population which possibly exceeds that of modern Europe." The curious enquirer who is anxious to ascertain the increase or decrease of the population of Europe during 1700 years, must calculate whether the addition of Northern Europe is a compensation for the loss of the African and Asiatic provinces of the Roman empire. The population of England and Wales decreased during the decade of years ending 1710, the population in 1700 being 5,134,516, and in 1710, 5,066,516. Henry VIII had

six wives and three children. Solomon had 500 wives and 1 son. And amongst the married ecclesiastics of England the number of children born to a clerk seems to increase in an inverse ratio with the value of his living.

Use of putrid corn commenced about 1830.

In order to discover what these natural causes of decrease have been and are, we should, on the supposition that the retrograde change in the progress of the population commenced about the year 1830, first enquire whether any marked change took place in the habits or food of the people at about that period. And it is remarkable that about that time the discovery of the art of manufacturing putrid corn by continued steeping in water was made. From the date of that event this food eaten in a state of most offensive putrescence passed rapidly into general use, not merely as an occasional delicacy as in the case with dried sharks and other matter used as food in a semidecayed state both here and in the Polynesian Islands, but as a universal daily staple of diet. Every Maori who has attained the age of 40 years can remember the introduction of this noxious substance, and it is remarkable that at Rangiaohia where it began first to grow into disfavour, displaced by the wheat which under the energetic encouragement of the Rev. J. Morgan rose into notice, and gradually displaced the "kaanga kopiro," the decrease of the population has been 33 per cent. below the general average.

The date of this unhappy discovery was more perfectly fixed by an enquiry made from a female Ngapuhi slave, on whose arm was tattooed "J. T. (Anchor) 1824." This record proved to have been made by a sailor with whom the woman cohabited for a short time in the Bay of Islands, and, in reply to a question, she stated that this unwholesome food was discovered and brought into use a few years after that inscription was made.

Without attempting to ascribe any effects to the continued and large use of putrid corn as an article of food, an attempt to which neither special education nor knowledge subsequently acquired render me competent, I will simply quote from Baron Liebig's "Animal Chemistry," some observations which seem pertinent to this subject.

"By the recognition of the cause and propagation of putrefaction in complex organic atoms, the question of the nature of many contagions and miasms is rendered capable of a simple solution, and is reduced to the following.

Do facts exist, which prove that the state of the transformation or putrefaction of a substance is propagated likewise to any parts or constituents of the living body; that by contact with the putrefying body, a state is induced in those parts, like that in which the particles of the putrefying body themselves are? The question must be answered decidedly in the affirmative. . . . It is a fact that the use of several kinds of food, as flesh, ham, sausages, in certain states of decomposition, is followed in healthy persons by the most dangerous symptoms, and even by death. . . . . Lastly, it is a universal observation that the origin of epidemic diseases is often to be traced to the "putrefaction of large quantities of animal and vegetable matters; that miasmatic diseases are endemic in places where the decomposition of organic matter is constantly taking place, as in marshy and moist localities; that they are developed epidemically under the same circumstances after inundations; also in places where a large number of people are gathered together with insufficient ventilation, as in ships, prisons, and besieged places." (Heule, Untersuchungen, p. 54.) Again, p. 57. "But we can never so surely predict the arising of epidemic diseases, as when a marshy surface has been dried up by continued heat; or when extensive inundations are followed by intense heat.

"Hence according to all the rules of scientific investigation, the conclusion is fully justified, that, in all cases where a process of putrefaction precedes the occurrence of a disease, or where the disease can be propagated by solid, liquid, or aeriform products of disease, and where no nearer cause of the disease can be discovered, the *substances in a state of decomposition* or transformation must be regarded as being, in consequence of that state, the proximate causes of the disease." Vide, however, the whole of Part II. on the metamorphoses of the animal tissues.

It is admitted that the continued use of salt meat or inferior food causes the most surprising changes in the vital processes, and, in particular, that it is a fruitful source of scrofula. This disease, developing itself in various forms;—tumours, tabes mesent., and consumption and other long diseases, besides a general prostration of vital energy both mental and physical has been, and is, the great destructive agent that has made such frightful inroads into the numbers of the Maori people. In fact, the Maori constitution appears to be rotten. A slight attack of illness, which would scarcely detain the European from his ordinary occupations, strikes down the Maori, and the prostration is so complete that permanent recovery is the exception.

Will not the saturation of the whole system with this fearful disease solve also, in some measure, the problem of the unprolificness of the females, an equal share in the want of vigour being ascribed from the same cause to the males?

These suggestions are made with the greatest diffidence, and only with the hope before expressed that practical medicine will decide whether this view is just, or whether it must be rejected.

Long continued intermixture of food.

One other cause of depopulation suggests itself to the mind of the writer;—the constant intermixture of blood during the twenty generations that the Maoris have occupied this

country. In the ranks of the lower animals, it is known, that breeding "in and in" for two or three generations is quite sufficient to take from the race house his speed, from the game-cock his courage and activity, from the dog his strength, and from all their health and energy. Does not the same natural law govern the human species?

How completely and constantly this handful of people have intermingled may be judged from the appended statement, in which the names of many wellknown chiefs of tribes, now far separated and sometimes hostile, may be recognized as relatives of each other, and in fact forming one large family. The scheme might easily be extended until the entire population was included. Had the various intermarriages been added a pefectly intermixed plan of consanguinity would have been exhibited. If such is the condition of the aristocracy, how constantly and intimately the persons of inferior rank must have interfused whose opportunities of marrying were usually confined to their own tribe. Appendix B.

The words "run out" present no definite meaning to the philologist, but the confused idea which they suggest to the mind of a race of animals whose higher physical qualities have disappeared and whose chief characteristics are utter loss of energy and vital force, is perfectly realised by the present aspect of the aborigines of this country.

In concluding this branch of the subject, I may remark that it is possible that another cause of decrease may be found entirely overriding all those previously suggested. There may be a law of nature, mysterious and inscrutable, under which no species can perpetuate itself beyond a certain period. We know that races of plants and of animals have died out, while the almost simultaneous extinction of large families, possibly widely scattered over the world, is a recognized fact. If families die out in accordance with this mysterious dispensation why should not also nations?

Remedies.

It can scarcely be questioned, that it is one of the duties of a government to use every endeavour not only to encourage the people under its care in the growth of civilization and respect for the laws, but also to direct and assist them in the attainment of such material advancement as is necessary to the preservation of the public health, and the proper increase of its numbers. It is true that prudence cannot be enforced by laws, without a great violation of natural liberty, and a risk of producing more evil than good. But still the very great influence of a just and enlightened government, and the effect of perfect security of property in creating habits of prudence, cannot for a moment be questioned.

It will perhaps be considered out of place, in a bare investigation of this character to refer to measures which may be adopted for the successful recuperation of this population, especially as it is a matter of great difficulty to examine questions of this nature without touching upon matters which belong rather to the politician than to the collator of statistics. But brief allusion may be not unfitly made to what appears to be the principal "conclusion of the matter."

Besides the measures which have lately been sanctioned by the legislature for imparting to the New Zealanders the benefits of law and civil institutions, the remedies to be employed for arresting the decay of the race must be directed to the improvement of their social condition by giving security and performance to their possession and occupation of land; and encouraging the growth of grass, so as to augment their material resources and enable them to obtain better food and clothing. There are, in the case of the Maoris, no pre-existing impediments to the accomplishment of these objects. Unlike the hunting races of the New World or the shepherd tribes of Asia, they have already, from the physical character of the country, and the utter absence of game and animals of the chase, been impelled into the position from which civilization takes its first upward step. And the lands are already assigned definitively to certain owners, although the boundaries of territorial rights are uncertain, and the titles are generally obscure and often conflicting. Still, the principle is recognized and national, and towards the carrying out of any scheme of advancement of social condition or settlement of titles to land, the people themselves are most anxious to give their aid.

Under the above definition are included all those measures of amelioration which a government, without exceeding its legitimate functions, may be fitly called upon, and qualified to undertake.

Thus, by giving security and permanence to the occupation and possession of land, will be achieved the grand requisite of civilization, fixity of residence. Good houses, intended to endure, will arise on land of which the tenure seems secure, and which may descend with its improvements to the children of the tenant whose labour is making it of value. By the exercise of the power of alienation a class of European settlers will be brought amongst them, who will by example and instruction wean the Maoris from their present desultory plan of agriculture to a system based upon the feeling of a perpetual right in the cultivator and his successors, and, who will moreover cause them to apprehend, that the secret which they have for many years been trying to find out, viz:—the art of living without labour, is one which will never be discovered. Permanent fences will be recognized as a necessity. The cultivated grasses, which will immediately follow or which may precede the division and legal

tenure of land, will maintain sheep to furnish an annual income from their wool, and cows, whose milk will supply a nutritious food to the young and may reduce the mortality among that class of the population to the rate obtaining in the Otawhao establishment.

The diversion of the habits of the people into new and unprofitable channels such as results from the possession of a breed of light horses fit only for tribes of hunters, or the ownership of seagoing vessels which they are incompetent to manage, and which not uncommonly end a short career in loss and disappointment, is not so beneficial a direction of their energies as the encouragement and instruction of their natural tastes and ancient habits as cultivators of the soil.

To enlarge upon these subjects in this paper would be out of place. A quotation, however, is added forming the remainder of Mr. Heaphy's report, as that gentleman's reflections seem to have terminated in the same conclusion which has already been frequently expressed in writing by the collator in other papers. "I find," he says, "a population of 235 Maoris with a cultivated area of 168 acres. These 235 souls occupied an area of 35,000 acres of waste land, or in a proportion of 149 acres to each soul. The area of cultivated land appears to be low, but the Maori has no idea of turning old cultivations to account. They are suffered to become overgrown with dock or thistle, and after a few months' neglect have no claim to be included in the statistics of cultivated land. I am aware that any matured plan for the amelioration of the condition of the Natives should be governed by the results deduced from the whole census on its completion; but I cannot omit now suggesting that every means should be taken to induce the Maories to turn into pasture their old cultivations.

For the 168 acres of cultivated land included in the returns, there are about 1000 acres of old clearings, all of which, before the weeds had made head, would have been eminently adapted for grass. and would have required but little after attention or culture. These are now the strong holds of the burr, and no wool can be usefully grown in their vicinity. On grass lands so situated, always in convenient places and near their villages, the natives might easily maintain a sufficient number of cows to afford a wholesome and nutritious food for their children; milk instead of dried shark and stinking corn.

While land and cultivations are in common, and while the native has no sole and *individual* interest in the land cultivated and the locality inhabited, the incentive to steady industry will not overcome the propensity to roving and idleness. Securing to an individual by means of a crown grant his holding, even if it be but a small area, will, in inducing continued residence on the spot, its improvement year by year, and the natural collection around it of the appliances which lead to comfort;—such security of tenure, will, I believe, conduce more to the improvement of the Maori, than any plan that has yet been proposed, and will cause him and his successors to respect the laws of the power, which in their first exercise secured to him a status and an independence, an immunity from the encroachments of chief or tribe."

Appendix. A. A simple scheme for settling the Native title to land somewhat analagous to the system pursued by our Anglo-Saxon forefathers* is appended to this paper, the operation of which would be simple and without risk to the European government or people;—the whole management and responsibility of the transaction resting with the Maori alone, *guided* only by the judicial officer of the district. The operation of this machinery would be slow, as none but the valuable lands would probably be desired to be enrolled, the mountainous or barren districts being left for pigruns or sale to the government. But no plan can effect this great object with speed. It must be remembered that the process of separating common titles and apportioning lands is not yet completed even in England. The number of acres of common land brought into cultivation, from the beginning of the reign of George III. to the end of the year 1834, was 6,840,540: and the number of Enclosure Acts passed by the legislature for this purpose during the period, was 3,742; and the process is still going on.

The devotion of the abandoned lands to pasture, and the expediency of encouraging generally among the Maoris the cultivation of the artificial grasses, has already been urged by the writer in other papers. This question is of very great and varied importance, embracing a much wider field than the simple recuperation of a population, or the retardation of its decay though in itself an object of sufficient magnitude to warrant exertion for its attainment.

In concluding this memorandum it should be stated, as an apology for defects and want of consecutiveness therein, that it has been written in circumstances often of considerable mechanical inconvenience and adverse to the elaboration, or even the retention of a connected train of thought,—circumstances, the difficulty of which has been increased, by the impossibility of access to many necessary documents and books of reference.

FRAS. D. FENTON,
R. M.

Waikato, August, 1858.

---

* See Hallam's History.

APPENDIX A.

SCHEME FOR THE PARTITION AND ENFRANCHISEMENT OF LANDS HELD UNDER NATIVE TENURE.

Crown Grants cannot except in rare instances be issued, even in cases where sole and unencumbered ownership is clear and undisputed, for the Native owner will not accede to a proceeding which infers that his own title is imperfect.

The instrument of primary assurance must therefore be in the nature of a certificate testifying that the parties named therein are the owners of the lands therein described.

It is further premised that no certificate should be issued until due enquiry has made it clear that the right parties have been discovered, and that no adverse claims are outstanding.

Inasmuch as the dignity of the Crown will be as much concerned in defending the title under a certificate when issued by itself, as under a Crown Grant, (if such could be made), time should elapse between the award of ownership made in pursuance of the enquiries hereafter explained, and the issue of the instrument which testifies to it, and during that interval *certain acts of ownership should be done and committed.* In the meantime, the whole conduct of the investigations and the responsibilities of them, as well as the duty of maintaining the award, should be thrown upon the Maories, so that the dignity of the Crown should in no case be compromised, or its interference be needed. This principle has already been recognized by the legislature in the recent measures for providing civil institutions, viz. :—The Native Circuit Courts Act, 1858, and The Native Districts Regulation Act, 1858.

For this. purpose and with this view the investigation must be *purely local.* Indeed it is very questionable whether the suspicions of the people will allow them to permit the adjudication of their lands in purely European Courts, or otherwise by purely European machinery.

No machinery can be invented more admirably adapted for the performance of the duty of investigation of the ownership and the partition of the common lands of the country, than the species of Court Leet and Great Court Baron recently created by the Native Circuit Courts Act 1858.

The proceedings must be authoritative. Negotiation and diplomatism will have no force, and no public support.

The process of legalizing tenure may be as as follows : At each Court House established under the last named Act will be deposited a book of Record, for the purpose of registering therein the names of owners who have been recognized, and the boundaries of the land of which they have been decreed the owners.

Any tribe, subdivision of a tribe, or individual, desiring to have their or his land defined by metes and bounds and registered in the Court Roll, must give notice of such desire to the Native Magistrate, (called in the Act a Native Assessor,) of the locality,—specifying in such notice the names of the claimants, and the description of the land.

If, after discussion between the European Magistrate and the Native Magistrate, there appears to be no matter in the claim likely to create political difficulties, the Resident Magistrate causes the claim to be entered on the Court Roll and affixed to the door of the Court House, and circulated in such other ways as will give publicity thereto, adding also a notice to the public that adverse claims must be immediately sent in to him, delivered to the Native Magistrate of the locality.

If no adverse claims appear, or such only as admit of adjudication, notice is given to all the parties, and affixed to the door of the Court House, that on the day named in such notice the title to the land will be investigated. If, however, the adverse claims sent in appear likely to create undue excitement or insuperable difficulty, no immediate day of hearing will be fixed by the Resident Magistrate, but notice must be given that the matter is adjourned for the present.

On the day of hearing, (not being a court day), the Resident Maagistrate causes an uninterested Jury to be summoned, after the manner of the constitution of a Criminal Jury in the Native Circuit Courts Act, 1858. He, with the Native Magistrates of the locality (unless interested, when others must be sought), and the Jury, hears the speakers or witnesses in the Court House, first of the claimants and then of the opponents, and in fact conducts the case as an enquiry before the Commissioners under an Act for inclosing lands of common would

be conducted in England. At the conclusion, the Jury, (assisted if necessary by the Resident Magistrate) gives a verdict that the claimant is entitled to the land, or otherwise as the case may be, or that the land be divided among the contending claimants. In the latter case, the Resident Magistrate and Native Magistrates assisted by the Jury proceed to make partition of the land, and in any case cause all sufficient posts and boundary marks to be set up.

The proceedings and the verdict are entered on the Court Roll, signed by the Court and all the parties. A copy of this roll will be evidence of Native title, and will be the title deed.

In case a tribe having had their land enrolled desire that it be further divided amongst subdivisions, or again amongst individuals, the same process must be followed, and record similarly must be made.

All subsequent alienations, or change of ownership by descent or otherwise, must be presented by a Jury at a Court Leet, and entered on the Rolls, the previous copy being surrendered, and a fresh one issued.

Thus will be established a very tractable tenure resembling the copyhold or base tenure of England, each District of a Court representing a Manor.

Whenever land is proposed to be alienated to a pakeha, a certificate of title from the Crown can be issued with ease to the Native proprietor whose name appears at the time on the Rolls of the Court as the owner, all doubt as to title and boundaries having been removed by the foregoing operations. On the transfer of this certificate to the purchasing pakeha, and the issue of a Crown Grant to such purchaser, must be paid the sum due to the Crown for the release of its right of pre-emption ; a right which cannot at present be foregone, as by the recent Imperial Act the whole territorial revenue is mortgaged to the Crown. In case the Native Territorial Rights Bill, 1858 receives the Royal assent, the payment for this release of the pre-emptive right must be at the rate of ten shillings per acre, but for many reasons it appears to the writer that a sum calculated *ad valorem* on the purchase money, would be far preferable. The expense of the survey, which would on the occasion of this final extinction of Native rights become necessary, would be a simple matter of bargain between vendor and purchaser.

It would however be far better, if Native surveyors were educated in the manner proposed elsewhere, specially for the performance of the duty of surveying common native lands. A class of educated native surveyors would smooth away many difficulties.

Appendix B.

SKETCH SHOWING THE AFFINITY OF SUNDRY CHIEFS AND TRIBES IN THE NORTHERN ISLAND OF NEW ZEALAND, 1858.