### ANNUAL REPORT

### The Royal Society of Tasmania 1919

### Patron:

HIS MAJESTY THE KING.

### President:

HIS EXCELLENCY SIR FRANCIS NEWDEGATE, K.C.M.G., GOVERNOR OF TASMANIA.

### Vice-Presidents:

E. L. PIESSE, B.Sc., LL.B. L. RODWAY, C.M.G.

### Council:

(Elected March, 1919).

A. H. CLARKE, M.R.C.S., L.R.C.P. (Chairman) W. H. CLEMES, BA., BSc.

W. E. L. CROWTHER, D.S.O., M.B. (elected August, 1919) L. DECHAINEUX

T. W. FOWLER

J. L. GLASSON, M.A., D.Sc.

J. A. JOHNSON, M.A.

L. II. LINDON, M.A. (resigned,

July, 1919) L. RODWAY, C.M.G.

C. C. THOROLD, M.A.

### Hon. Treasurer:

L. RODWAY.

### Auditor:

R. A. BLACK.

### Secretary and Librarian:

CLIVE E. LORD

### LIST OF MEMBERS.

### Honorary Members:

David, T. W. Edgeworth, C.M.G., B.A., F.R.S., F.G.S.

Professor of Geology and Physical G ography in the
University of Sydney. The University, Sydney.

Mawson, Sir Douglas, B.E., D.Sc. Adelaide.

Shackleton, Sir Ernest H., Kt., C.V.O., F.R.G.S., F.R.A.S. 9 Regent-street, London, S.W., England.

Spencer, Sir W. Baldwin, K.C.M.G., M.A., F.R.S. Melbourne.

### Ordinary, Life, and Corresponding Members:

"C," Corresponding Member.

- $^{\alpha}\mathrm{L},^{\alpha}$  . Member who has compounded subscriptions for life,
  - Member who has contributed a Paper read before the Society.
- t, Member who has been elected a member of the Council.

Year of Election.

- 1916 Ansell, M. M., B.A. The Registrar. The University, Hobart.
- 1918 L Avery, J. Electrolytic Zinc Co. Risdon.
- 1908 L Baker, Henry D. Co American Consulate, Hobart.
- 1887 Barelay, David. 143 Hampden Road, Hobart.
- 1890 \*Beattie, J. W. 1 Mount Stuart Road, Hobart.
- 1918 Bellamy, Herbert, City Engineer, Town Hall, Hobart.
- 1901 G Benham, W. B., M.A., D.Sc., F.R.S., F.Z.S.
  Professor of Biology, University of
  Otago. Dunedin, New Zealand.
- 1903 Bennett, W. II. "Ashby," Ross.
- 1918 Bennett, A. E. "Ashby," Ross.
- 1900 Bennison, Thomas. 29 Cromwell Street, Hobart.
- 1918 Bennison, E. A. Napoleon Street, Battery Point.
- 1918 Bisdee, E. O. Lovely Banks, Melton Mowbray.
- 1912 \*Black, R. A. Chief Clerk, Department of Agriculture. 50 High Street, Queenborough.
- 1909 \*Blackman, A. E. Franklin.
- 1918 Bowling, J. "Clovelly," Risdon Road.
- 1892 C Bragg, W. H., M.A., F.R.S. Professor of Physics in University College, London.

158	LIST OF MEMBERS.
Year of Election.	
1917	Brettingham-Moore, Dr E., M.B., Ch.M. Macquarie-street, Hobart.
1911	Brooks, G. V. Director of Education. Education Department, Hobart. Brownell, F. L. "Leura," Main Road, Moonah.
1907	Brownell, F. L. "Leura," Main Road, Moonah.
1918	Bryer, J. R. Taroona.
1918	Burbury, Alfred, "Glen Morey," Antill Ponds.
1919	Burbury, Charles. "Inglewood," Andover.
1918	Burbury, Frederick. "Holly Park," Parattah.
1919	Burbury, Gerald. "Syndal," Ross.
1919	Burbury, T. J. "Park Farm," Jericho.
1909	†*Butler, W. F. D., B.A., M.Sc., LL.B. Bishop Street, New Town.
1917	Butters, J. H. Chief Engineer and Manager State Hydro-Electric Department, Ho- bart.
1919	Chapman, A. D. 105 Macquarie Street.
1912	Chapman, A. D. 105 Macquarie Street. Chapman, J. R. Holebrook Place, Hobart.
1901	C Chapman, R. W., M.A., B.C.E. Elder Professor of Mathematics and Mechanics in the University of Adelaide. The University, Adelaide.
1913	Chepmell, C. H. D. Clerk of the Legislative Council. 23 Swan Street, Hobart.
1896	†*Clarke, A. H., M.R.C.S. L.R.C.P. Macquarie Street, Hobart.
1918	Clarke, T. W. H. Quorn Hall, Campbell Town
1887	†Clemes, Samuel. Principal of Leslie House School. Clare Street, New Town.
1910	†*Clemes, W. H., B.A., B.Sc. Leslie House School, Argyle Street, New Town.
1918	Conlon, A. Agricultural Department, Hobart.
1917	Copland, D. B., M. A. Lecturer in History and Economics, the University, Hobart.
1919	Crawford, R. N. Secretary for Education. Education Department, Hobart.
1917	Cullen, Rev. John. Macquarie Street, Hobart.
1918	*Cummins, W. H., A.I.A.C. Greenlands
1919	Avenue, Sandy Bay.  †*Crowther, W. L., D.S.O., M.B. Macquarie Street, Hobart.
1884	Davies, The Hon. C. E., M.L.C. "Lyndhurst," New Town Road, New Town.

V	LIST OF MEMBERS. 159
Year of Election.	
1919	Davies, H. Warlow-, C.E. "Abermere," Mount Stuart.
1908	†Dechaineux, Lucien. Principal of Technical
1903	School, Hobart.  Delany, Most Rev. Patrick. Archbishop of
1892 C	Hobart. 99 Barrack Street, Hobart. Dendy, A., D.Sc., F.R.S., F.L.S. Professor of Zoology in the University of London (King's College). "Vale Lodge," Hamp- stead, London, N.W.
1916	Downie, W. A. Headmaster, Central School, Hobart.
1919	Elliott, E. A., M.B. Macquarie Street.
1918	Ellis, F. Education Department, Hobart.
1919	Erwiu, H. D., B.A. Christ's College, Hobart.
1918	Evans, L. Acting Director of Agriculture, Hobart.
1902	Finlay, W. A. 11 Secheron Road, Hobart.
1918	Finlay, G. W. "Baskerville," Campbell Town.
1918	Fletcher, C. E. Education Department, Hobart.
1909	†*Flynn, T. Thomson, B.Sc. Ralston Professor of Biology in the University of Tas- mania.
1890 L	
1905 L	Foster, J. D. "Fairfield," Epping.
1913	Foster, J. D. "Fairfield," Epping. †Fowler, T. W., M.Inst.C.E. Clare Street, New Town.
1918	Gatenby, R. L. Campbell Town.
1908	†*Giblin, Major L. F., D.S.O., B.A. Government Statistician, Davey Street.
1918	Gillett, Henry. "Wetmore," Ross.
1913	
	†*Glasson, J. L., M.A., D.Sc. Lecturer in Physics in the University of Tasmania. The University, Hobart.
1907	Gould, Robert. Longford.
1918	Gould, J. W. Tramway Department, Hobart.
1905 I	Grant, C. W. "High Peak," Huon Road.
1913	* Hardy, G. H. Hurlstone. C/o Australian Mus- eum, Sydney.
1918	Harrap, Licut-Colonel G. E. Launceston.
1898	Harrison, M. W. Glenorchy.

	· ·
160 Year of Election.	LIST OF MEMBERS.
1893	Harvey, W. A., M.B. 154 Macquarie Street Hobart.
1902	
1913	Hawson, Edward. "Remine," 174 Argyle Street, Hobart.
1919	Hay, Rt. Rev R. S. Bishop of Tasmania Bishopscourt, Hobart.
1919	' Headlam, Robert. "Glen Esk," Conara.
1915	Hickman, V. V., B.Sc. Garden Road, Albert
1010	Park, Moonah.
1919	Higgins, Dr. P. Campbell Town.
1913	Hills, Loftus, M.Sc. Government Geologist Launceston.
1914	Hitchcock, W. E. Moina.
1908	Hogg, G. H., M.D., C.M. 37 Brisbane Street Launceston.
1909	*Hutchison, H. R. 1 Barrack Street, Hobart
1913	Ife, G. W. R., LL.B. Summerhill Road, Ho
1919	bart. Irby, J. R. Conservator of Forests. Lands Department, Hobart.
1898	*Ireland, E. W. J., M.B., C.M. Launceston General Hospital.
1918	Innes, H. S. 71 Davey Street, Hobart.
1919	Jackson, Geo. A. Tregear's Building, Collins Street.
1906	*Johnson, J. A., M.A. Principal of the Philip Smith Training College, Hobart. "Wharepuke." Argyle Street, New Town
1911	Keene, E. H. D. Tantallon, Tarleton (A.I.F.
1910	Kermode, R. C. "Mona Vale," Ross.
1918	Kermode, Lewis Q., B.A. Birkdale, Lanca- shire, England.
1905	Kerr, George. 165 Campbell Street, Hobart.
1913	Knight, J. C. E. "Windermere," Claremont.
1918	Knight, C. E. L., B.Sc. Claremont.
1919	Knight, H. W. National Mutual Buildings,
1919	Macquarie Street.  Leahy, F. T. Electrolytic Zinc Company,
1887	Risdon.  †Lewis, Sir Neil Elliott, K.C.M.G., M.A., B.C.L., LL.B., M.H.A. "Werndee," Augusta Road, New Town.

Y	88	ur	of	
El	ec	ti	on	

1912 †Lindon, L. H., M.A. "The Lodge," Park Street, Hobart.

1900 Lines, D. H. E., M.B., Ch.B. Archer Street, New Town.

1875 C Liversidge, Professor Archibald, M.A., LL.D., A.R.S.M., F.R.S., F.I.C., F.C.S., F.G.S., F.R.G.S. "Fieldhead," Coombe Warren, Kingston, Surrey, England.

1913 †\*Lord, Clive E. Curator and Secretary of the Tasmanian Museum, Hobart. "Cliveden," Mt. Nelson Road, Sandy Bay.

1912 McAlister, Miss M. K. Rosetta.

1893 MeAulay, Alexander, M.A. Professor of Mathematics in the University of Tasmania. The University, Hobart.

1902 C Maiden, J. H., I.S.O., F.R.S., F.L.S. Director of Botanic Gardens, Sydney, and Government Botanist of New South Wales. Botanic Gardens, Sydney.

1918 Mansell, A. E. Melton Mowbray.

1918 Martin, Colonel W., V.D. Launceston.

1919 Masters, W. E., B.A., LL.B. Box 22, G.P.O., Hobart.

 Mather, J. F. 1 Mount Stuart Road, Hobart.
 Mackay, J. H. Professor of Engineering. The University of Tasmania, Hobart.

1919 Mackay, A. D., B.Sc., M.M.E. 4 Fawkner Street, South Yarra, Victoria.

1895 \*May, W. L. "Forest Hill," Sandford.

1909 Millen, J. D. Mount Bischoff Mine, Waratah.

1907 Miller, Lindsay S., M.B., Ch.B. 156 Macquarie Street, Hobart.

1894 L Mitchell, J. G. "Ellesmere," Jericho.

1913 Mitchell, P. H., B.A. Headmaster of the State High School, Hobart. 2 Ashfield Street, Queenborough.

1911 Montgomery, R. B. Davey Street, New Town.

1918 Murdoch, Thomas. Montpelier Road, Hobart.

1882 Nicholas, G. C. "Cawcod," Ouse.

1918 Nicholls, Sir Herbert, Kt. Chief Justice of Tasmania. Pillinger Street, Queenborough.

1910 Nicholls, H. Minchin. Government Microbiologist, Department of Agriculture.

Macquaric Street, Hobart.

162 Year of Election.	LIST OF MEMBERS.
1919	Nicolson, Norman. "Streanshalh," Campbell
1917	*Town. Oldham, N., J.P. New Town.
1919	Oldmeadow, H. E. R. "Lowes Park," Wood-
1010	bury.
1908	Parsons, Miss S. R. 190 Davey Street, Hobart.
1902	†*Piesse, E. L., B.Sc., LL.B. 39 Broadway, Camberwell, Victoria.
1910	Pillinger, James. 4 Fitzroy Crescent, Hobart.
1918	Pitt, Frank C. K. "Glen Dhu," The Ouse.
1919	Pitt, C. F. Campbell Town.
1908	Pratt, A. W. Courtney. "Athon," Mt. Stuart Road, Hobart.
1917	Raamsdonk, I. N. Lecturer in Modern Languages, the University, Hobart.
1919	Riggall, Captain A. Hortin, D.S.O. Tun- bridge.
1919	Robertson, J. Moore. Sandy Bay.
1918	Robertson, T. W. Box 93, G.P.O., Hobart.
1919	Rowland, E. O. Secretary Public Service Board, Hobart.
1884	†*Rodway, Leonard, C.M.G. Government Botanist of Tasmania. Macquarie Street, Hobart.
1913	Ross, Hector. Sheriff of Tasmania. Elphin- stone Road, Hobart.
1915	Ross, J. Head Teacher, New Town School, New Town (A.I.F.).
1896	Scott, R. G., M.B., Ch.M. 172 Macquarie Street, Hobart.
1919	Sharland, A. Campbell Town.
1892 C	*Shirley, John, D.Sc. Principal, Teachers' Training College, Queensland. "Coot-
1901	tha," Bowen Hills, Brisbane. Shoobridge, Canon G. W. 3 Molle Street, Hobart.
1917	Slaytor, C. H., F.I.C. Haxey, Doncaster, England.
1919	Smith, G. O. Town Hall, Hobart.
1919	Smith, G. O., Mrs.
1901	Smith, R. Greig-, D.Sc. Linnean Hall, Eli-
1919	zabeth Bay, Sydney. Snowden, Colonel R. E. "Minallo," West
1896 I	Hobart.  *Sprott, Gregory, M.D., C.M. Macquarie Street, Hobart.

Year of		LIST OF MEMBERS.
Election		
1919		Stevenson, Miss F. "Leith House," New Town.
1896	L	Sticht, Robert, B.Sc., E.M. Mount Lyell
		Mining and Railway Co. Ltd., Queen
1010		Street, Melbourne.
1913		Susman, Maurice. 88 Murray Street, Hobart.
1907		Tarleton, J. W. 108 High Street, Queen- borough.
1887		*Taylor, A. J. Librarian of the Tasmanian
		Public Library. 28 D Arcy Street, Hobart.
1918		Taylor, Walter E. Elboden Street, Hobart.
1892	С	*Thomson, G. M., F.L.S. Duncdin, New Zea-
1918		land. Thorald C.C. M.A. Hutshing School Hobert
		Thorold, C. C., M.A. Hutchins School, Hobact.
1918		Walch, Percy. King Street, Sandy Bay.
1901	C	Wall, Arnold, M.A. Professor of English Lan-
		guage and Literature in Canterbury
1913		College. Christchurch, New Zealand. Wardman, John. Superintendent of the
1010		Botanical Gardens. Botanical Gardens.
		Hobart.
1918		Waterhouse, G. W., B.A., LL.M. Cantab.
		Messrs. Ritchie and Parker, Alfred
1610		Green and Co., Launceston.
1918		Watt, W. The Observatory, Hobart.
1918		Weber, A. F. Lands Department, Hobart.
1919		Williams, T. H. Electrolytic Zinc Company, Risdon.
1901		Wise, H. J. Lambert Avenue, Sandy Bay.
1.01		Wise, II. o. Lambert Avenue, Randy Day.

Members are asked to inform the Secretary of any change of address or other necessary correction.

- 1

### ANNUAL REPORT.

In accordance with Rule 39, the Council present a report of the Proceedings of the Society for 1919.

### The Council and Officers.

The Annual General Meeting was held on the 10th March. Eleven nominations being received for membership of the Council, an election was held, with the result that the following nine members were elected as the Council for 1919:—Dr. A. H. Clarke, Dr. J. L. Glasson, Messrs. W. H. Clemes, L. Dechaineux, T. W. Fowler, J. A. Johnson, L. H. Lindon, L. Rodway, C. C. Thorold.

The Council at the first meeting elected the following officers:—Dr. Clarke (Chairman), Mr. L. Rodway (Hon. Treasurer), Mr. Clive Lord (Secretary and Librarian).

The Council elected Dr. Clarke, Messrs. Clemes. Dechaineux, Johnson, Lindon, and Rodway, to be trustees of the Tasmanian Museum and Botanical Gardens.

During the year Mr. Lindon resigned, and Dr. W. L. Crowther was elected in his place.

Eleven Council meetings were held during the year the attendance being as follows:—Mr. Rodway 11, Mr. Johnson 10, Mr. Fowler 9, Mr. Clemes 8, Mr. Thorold 8, Dr. Clarke 7, Dr. Glasson 6, Mr. Dechaineux 6, Mr. Lindon (resigned July) 6, Dr. Crowther (elected August) 3

### Meetings.

Eight ordinary meetings and one special meeting were held during the year. The outbreak of pneumonic influenza in September and October interfered with the programme of lectures, but notwithstanding this the session, generally speaking, was a successful one. Many instructive papers were read, and the meetings were well attended.

### Membership.

It is satisfactory to record a substantial increase in the membership of the Society. The roll at the end of the year showed that there were four honorary members, eleven corresponding members, seven life members, and one hundred and forty-two ordinary members. A number of the new subscriptions do not become due until next year, but when they are received they will add very materially to the financial strength of the Society. Library.

The Library of the Society now contains over 13,000 volumes, in addition to a large number of pamphlets and other documents. Many of these are of great value, and the upkeep of the Library is becoming an increasing tax on the Society's resources. An extension of the present Library accommodation is becoming a necessity. Owing to the risks of transportation no books have been purchased for several years past with the money derived from the Morten Allport Memorial Fund, but next year it is proposed to acquire a number of volumes with the income obtained from this fund.

### Education Section.

Chairman: L. Dechaineux.

Hon. Sec.: W. H. Clemes, B.A., B.Sc.

Owing to the Influenza Epidemic only four meetings of this Section were held. The following papers were read and discussed:—

"The Training of the Emotions and the Will at the Primary Stage," by L. Dechaineux.

"The Training of the Emotions," by J. A. Johnson, M.A.

"The Training of the Will," by S. Clemes.

### Obituary.

It is with regret that the Society has to record the death of the following members during the past year:—

- H. L. Roberts, of "Beaumaris." Hobart. (Elected a member in 1864.)
- W. H. Twelvetrees, of Launceston. Government Geologist of Tasmania. (Elected a member in 1896.)
- G. E. Brettingham-Moore, of Hobart. (Elected a member in 1900.)
- Donald McKinnon, of "Dalness," Evandale. (Elected a member in 1918.)
- John Taylor, of "Winton," Campbell Town. (Elected a member in 1918.)

### W. H. TWELVETREES, F.G.S.

W. H. Twelvetrees was born in Bedfordshire, England, in 1848. In 1871 he was employed at the Viskrensensky copper mines and smelting works in Eastern Russia, and remained there for nine years. He was stationed at the

Lidjessie silver mines in Asia Minor from 1882 until 1884. He then became general manager of these mines, and remained in the district until 1891, when he came to Tasmania. He soon began to take an interest in public affairs, and was secretary of the first exhibition at Launceston, which was held in the Albert-hall in 1892. In 1899 he was appointed Government Geologist and Chief Inspector of Mines. He carried out the duties of the combined officers until 1914, when the inspection of mines was made a separate branch of the Mines Department. Since 1914 he held the position of Government Geologist and Director of the Geological Survey of Tasmania, and continued his work practically to the time of his death.

During his regime, the work in his branch of the Department grew in volume and importance. The Geological Gallery, at Launceston, established in connection with the Geological Survey, will always stand as a me-

morial to his enthusiastic work.

His connection with various scientific societies is well known, and his many valuable contributions in the shape of scientific writings will ever serve to remind geologists and others of his work.

Owing to his death the State has lost a valuable servant, this Society a prominent member, and many of the remaining members have lost a personal friend. Mr. Twelvetrees's kindly nature led him to be honoured and respected by all classes of people, and his loss will be felt far beyond the realm of the scientific world.

## ROYAL SOCIETY OF TASMANIA

### GENERAL ACCOUNT. RECEIPTS AND EXPENDITURE, 1919.

RECEIPTS.			PAYMENTS.		F	». م.	
Balance brought forward Subscriptions:	20 5 4	Papers and Proceedings;	:	:	£	9	
Current, 83 at £1/1 £87 3 0	3 0	(Part)	:	0 91 195			
Arrears, 1 at £1/1/ 1	0 -	1919 (Part)		105 13 4			
Advance, 1 at £1/1 1	0 -		1		167	9	
han-i-symmetria	0 9 88	Expenses of Meetings	:	:	56	5 2	
Government Grant in aid of Printing	0 0 001		:	:	19	- 0	
rellaneous	6 † 61	:	:	:	- 1	1 14 0	
		Lantern and Operator .	:	:	2/	0 0	
	£228 15 1	Postages and Petty Cash .	:	:	œ	5 10	
Dr. Balance, 1919	58 18 5	Miscellaneous	:	:	8-	0 6	
		Bank Charges, etc	:	:	21	 	
	1						
	£279 13 6				£279 13 6	3 6	
						-	

# MORTON ALLPORT MEMORIAL FUND ACCOUNT,\* 1919.

£ 8, d.		£49 14 3
i		
:		
N. T. N.		
PAYMENTS.		
<u> </u>		
0		
to 192		
39 19 3 Balance to 1920		
£ s. d.	9 15 0	14 3
9 Gg	50	£49 14 3
Balance brought forward 1st Jan., 1919 Interest received from Perpetual Trustee Co.— 5 per cent. on £200 War Loan £10 0 0 Less Trustee Co. Commission 0 5 0		T. T.

<sup>£200</sup> was raised by Public Subscription in 1878 to establish a Memorial to the late Morton Allport. The Fund was invested in the name of the Perretual Trustees, Executors, and Agency Co. of Tasmania Ltd., and the income is used for the purchase of Books for the Library of the Society.

Audited and found correct,
R. A. BLACK, Hon. Auditor.
15th Jan., 1920.

L. RODWAY, Hon. Treasurer. CLIVE LORD, Secretary. January 7th, 1920.