

**SECOND GEOLOGICAL SURVEY OF
PENNSYLVANIA: 1874. PRELIMINARY
REPORT OF THE MINERALOGY OF
PENNSYLVANIA; WITH AN APPENDIX
ON THE HYDROCARBON COMPOUNDS**

Published @ 2017 Trieste Publishing Pty Ltd

ISBN 9780649691692

Second Geological Survey of Pennsylvania: 1874. Preliminary Report of the Mineralogy of Pennsylvania; With an Appendix on the Hydrocarbon Compounds by F. A. Genth & Samuel P. Sadtler

Except for use in any review, the reproduction or utilisation of this work in whole or in part in any form by any electronic, mechanical or other means, now known or hereafter invented, including xerography, photocopying and recording, or in any information storage or retrieval system, is forbidden without the permission of the publisher, Trieste Publishing Pty Ltd, PO Box 1576 Collingwood, Victoria 3066 Australia.

All rights reserved.

Edited by Trieste Publishing Pty Ltd.
Cover @ 2017

This book is sold subject to the condition that it shall not, by way of trade or otherwise, be lent, re-sold, hired out, or otherwise circulated without the publisher's prior consent in any form or binding or cover other than that in which it is published and without a similar condition including this condition being imposed on the subsequent purchaser.

www.triestepublishing.com

F. A. GENTH & SAMUEL P. SADTLER

**SECOND GEOLOGICAL SURVEY OF
PENNSYLVANIA: 1874. PRELIMINARY
REPORT OF THE MINERALOGY OF
PENNSYLVANIA; WITH AN APPENDIX
ON THE HYDROCARBON COMPOUNDS**

The Branner Geological Library



LELAND STANFORD JUNIOR UNIVERSITY

Wat
J. C. Branner
SECOND GEOLOGICAL SURVEY OF PENNSYLVANIA:

1874.

PRELIMINARY REPORT

ON THE

MINERALOGY OF PENNSYLVANIA,

BY

F. A. GENTH.

WITH AN APPENDIX

ON THE

HYDROCARBON COMPOUNDS,

BY

SAMUEL P. SADTLER.

HARRISBURG:

PUBLISHED BY THE BOARD OF COMMISSIONERS
FOR THE SECOND GEOLOGICAL SURVEY.

1875.

ST

MICROFILMED AVAILABLE

M/Pres. 87

Entered, for the Commonwealth of Pennsylvania, in the year 1875, according
to acts of Congress,
By JOHN B. PEARSE,
Secretary of the Board of Commissioners of Geological Survey.
In the Office of the Librarian of Congress, at
WASHINGTON, D. C.

209032

STANFORD LIBRARY

Electrotyped by
COLLINS & M'CLESTER,
PHILADELPHIA.

Printed by
B. F. MEYER, State Printer,
HARRISBURG, PA.

BOARD OF COMMISSIONERS.

His Excellency, JOHN F. HARTRANFT, *Governor*,
and *ex-officio* President of the Board, Harrisburg.

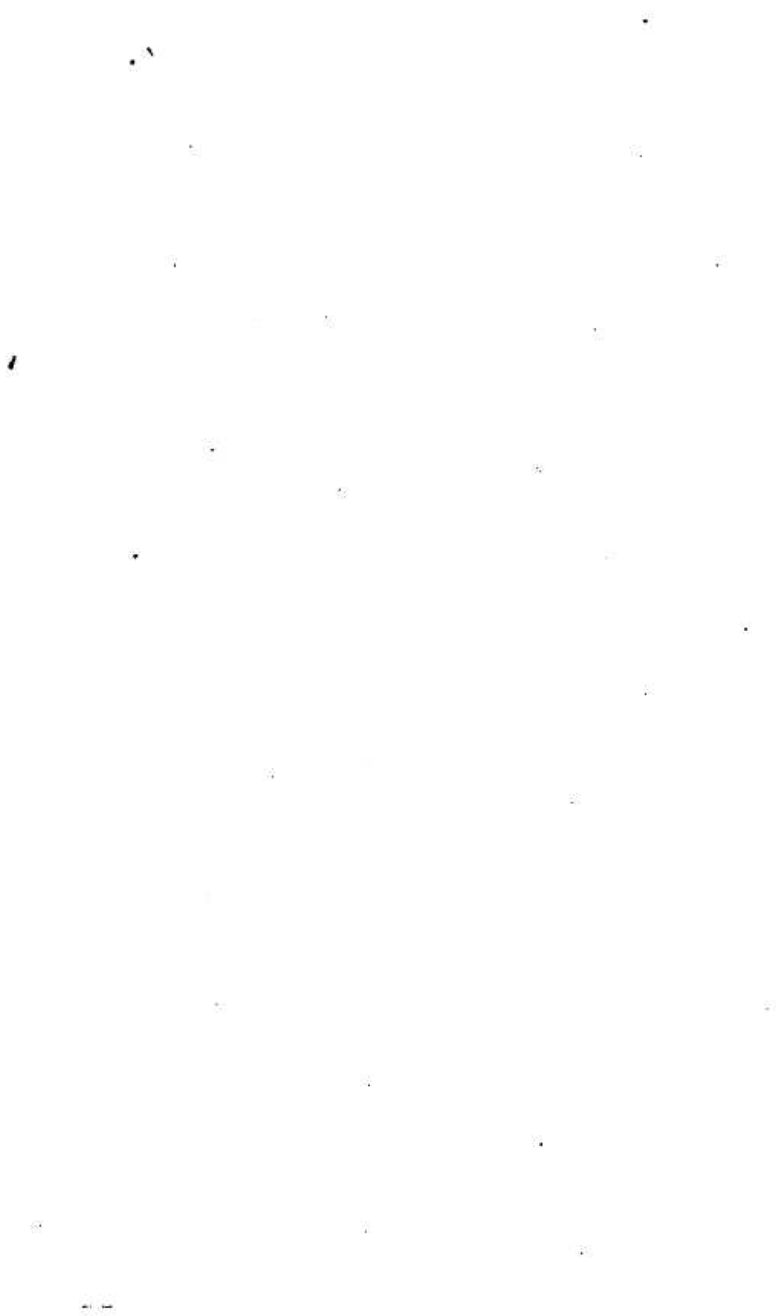
ARIO PARDEE, - - - - -	Hazleton.
WILLIAM A. INGHAM, - - - - -	Philadelphia.
HENRY S. ECKERT, - - - - -	Reading.
HENRY M'CORMICK, - - - - -	Harrisburg.
JAMES MACFARLANE, - - - - -	Towanda.
JOHN B. PEARSE, - - - - -	Philadelphia.
ROBERT B. WILSON, M. D., - - - - -	Clearfield.
HON. DANIEL J. MORRELL, - - - - -	Johnstown.
HENRY W. OLIVER, - - - - -	Pittsburg.
SAMUEL Q. BROWN, - - - - -	Pleasantville.

SECRETARY OF THE BOARD

JOHN B. PEARSE, - - - - - Philadelphia.

STATE GEOLOGIST

PETER LESLEY, - - - - - Philadelphia.



PROF. J. P. LESLEY,

State Geologist:

SIR:—In obedience to instructions, I have prepared and have now the honor to submit the accompanying *Preliminary Report* on the Minerals found in the State of Pennsylvania.

The time which has elapsed since the organization of the Geological Survey of the State was so short that hardly anything more could be done than to give a list of localities where the different mineral species have been found. As the occurrence of minerals is often accidental, and comparatively very few only can be secured by a search at the locality, I had, besides visiting some of the most important mineral regions, to a great extent to depend upon the observations, labors and the good will of others.

Pennsylvania being rich in private collections of great value, fortunately owned by friends and supporters of the geological survey, I have met with the most cordial reception everywhere, and was permitted to examine the specimens and take notes of their occurrences. Only by this generous assistance, which I have received from so many, I was able to accomplish my task.

To all who have aided me I wish to express my deep gratitude for their disinterested and very liberal support: to Mr. Wm. W. Jefferis, of West Chester, whose magnificent cabinet is very rich in many beautiful specimens from Lancaster, Chester and Delaware counties, the localities of many of which are now exhausted, and who has undoubtedly the best knowledge in the State of the mineral occurrences in this region, I am especially indebted for their revision.

I gratefully acknowledge the aid which I have received from Col. Joseph Willcox, of this city, who has paid special attention to the exploration of Delaware county, and who showed me the principal localities of this county, besides largely contributing from his fine cabinet, specimens for fuller investigation.

(B. i)

To Mr. Theodore D. Rand, who for many years has made the mineralogy of the neighborhood of Philadelphia a careful study, and who is better informed on this subject than anybody else I am under great obligations not only for a complete list of the localities of this vicinity; but also for specimens for examination, which he has presented me from his cabinet, so rich in local occurrences, and for visiting with me some of the principal localities near this city.

Prof. W. Theodore Roepper of Bethlehem, the accomplished mineralogist and analytical chemist, not only showed me the occurrences in the neighborhood of Bethlehem, especially in Lehigh and Northampton counties and gave me the localities of many others, but he liberally contributed very valuable analytical results, not yet published.

Mr. Samuel Tyson, of King of Prussia, furnished me with a list of Pennsylvania minerals in his fine cabinet, and was the first to call my attention to the interesting locality of zeolites at Fritz's Island, of which he presented me with good specimens; a still larger number and the best which have been found were very liberally supplied by Mr. H. W. Hollenbush, of Reading, who also sent me a list of Berks county localities.

Many thanks are due also Mr. Joseph Wharton, of Philadelphia, to Dr. John M. Cardesa, of Claymont, Delaware, to Dr. George Smith, of Upper Darby, and Mr. Lewis Palmer, of Media, Delaware county, to Mr. C. M. Wheatley, of Phoenixville, Mr. J. Taylor Boyd, of Cornwall, Lebanon county, and to many others.

To Mr. E. Mortimer Bye, of Wilmington, Delaware, I am especially indebted for very valuable services which he has rendered in accompanying me to the principal chrome ore localities of Lancaster and Chester counties, and for the statistics of chrome ore operations.

The main object of this preliminary report being to prepare as complete a list of mineral occurrences in Pennsylvania as the information which we possess at present, permits, I have endeavored to make this as full as possible, omitting only such as are on account of their wide distribution found almost everywhere, and such as form constituents of rock-masses, and which therefore occur wherever the latter are found. The number of