

GISELA PÖSGES & MICHAEL SCHIEBER



# The Ries Crater – Museum Nördlingen



Museum Guide

Academy Bulletin Nr. 253  
Bavarian Academy  
for Teacher Training  
Dillingen 1997

pfeil

# **The Ries Crater Museum Nördlingen**

## **Museum Guide**

**Academy Bulletin Nr. 253  
Bavarian Academy for Teacher Training Dillingen**

**By GISELA PÖSGES & MICHAEL SCHIEBER**

Translated by  
**PETER SCHERER**  
Max-Planck-Institute for Chemistry,  
Dep. Cosmochemistry, Mainz, Germany  
and  
**ALBERT PÖSGES**  
Neuss

with 1 topographical map,  
1 geological map and 46 figures

Die Deutsche Bibliothek – CIP-Einheitsaufnahme

The Ries Crater Museum Nördlingen : museum guide /  
by Gisela Pösges & Michael Schieber. Transl. by Peter Scherer  
and Albert Pösges. - München : Pfeil, 1997  
(Academy bulletin / Bavarian Academy for Teacher Training  
Dillingen ; Nr. 253)  
Dt. Ausg. u.d.T.: Das Rieskrater-Museum Nördlingen  
ISBN 3-931516-22-9

Front Cover

*Ries Crater Museum Nördlingen: Room B, Planetology*

Back Cover

*Quarry Aumühle: Bunte Breccia*

Copyright © 1997 by Verlag Dr. Friedrich Pfeil, München  
Dr. Friedrich Pfeil, Postfach 65 00 86, D-81214 München

The contributions published in this book are copyrighted.  
Translations, reprints – even of each illustration –, reproductions made photomechanically  
or in a similar way or by tape recording, lectures, radio, and television programmes  
as well as storages in data processors – even in an abridged version – are reserved for the publishers  
and require their written permission.

Satz und Litho: Verlag Dr. Friedrich Pfeil, München  
Satzbelichtung: Pre Press Studio, München  
Druck: grafik + druck GmbH Peter Pöllinger, München  
Buchbinder: Thomas, Augsburg

Printed in Germany  
ISBN 3-931516-22-9

## Contents

Preface .....	6
PÖSGES, GISELA and SCHIEBER, MICHAEL Guide through the Ries Crater Museum Nördlingen	
Room A: Introduction	
“Large Impact Crater” Nördlinger Ries – Result of a cosmic catastrophe about 15 million years ago .....	7
Room B: Planetology .....	11
Room C1: Mechanics of crater formation .....	25
Room C2: The geology of the Ries prior to the impact	31
Room D: The Ries event and its consequences .....	35
Room E1: The Ries Lake .....	48
Room E2: Utilization of the Ries Crater .....	59
Room F: History of Ries research .....	65
Appendix: Phases of the crater formation .....	70
References .....	74