

# Ancient Orogens and Modern Analogues

The Geological Society of London  
**Books Editorial Committee**

**Chief Editor**

BOB PANKHURST (UK)

**Society Books Editors**

JOHN GREGORY (UK)

JIM GRIFFITHS (UK)

JOHN HOWE (UK)

PHIL LEAT (UK)

NICK ROBINS (UK)

JONATHAN TURNER (UK)

**Society Books Advisors**

MIKE BROWN (USA)

ERIC BUFFETAUT (FRANCE)

JONATHAN CRAIG (ITALY)

RETO GIERÉ (GERMANY)

TOM MCCANN (GERMANY)

DOUG STEAD (CANADA)

RANDELL STEPHENSON (UK)

**IUGS/GSL publishing agreement**

This volume is published under an agreement between the International Union of Geological Sciences and the Geological Society of London and arises from IGCP 453 project entitled 'Ancient orogens and modern analogues'.

GSL is the publisher of choice for books related to IUGS activities, and the IUGS receives a royalty for all books published under this agreement.

Books published under this agreement are subject to the Society's standard rigorous proposal and manuscript review procedures.

It is recommended that reference to all or part of this book should be made in one of the following ways:

MURPHY, J. B., KEPPIE, J. D. & HYNES, A. J. (eds) 2009. *Ancient Orogens and Modern Analogues*. Geological Society, London, Special Publications, **327**.

DOSTAL, J., KEPPIE, J. D. & FERRI, F. 2009. Extrusion of high-pressure Cache Creek rocks into the Triassic Stikinia-Quesnellia arc of the Canadian Cordillera: implications for terrane analysis of ancient orogens and paleogeography. In: MURPHY, J. B., KEPPIE, J. D. & HYNES, A. J. (eds) 2009. *Ancient Orogens and Modern Analogues*. Geological Society, London, Special Publications, **327**, 71–87.

GEOLOGICAL SOCIETY SPECIAL PUBLICATION NO. 327

# Ancient Orogens and Modern Analogues

EDITED BY

J. B. MURPHY

St Francis Xavier University, Canada

J. D. KEPPIE

Universidad Nacional Autonoma de Mexico, Mexico

and

A. J. HYNES

McGill University, Canada

2009

Published by  
The Geological Society  
London

## THE GEOLOGICAL SOCIETY

The Geological Society of London (GSL) was founded in 1807. It is the oldest national geological society in the world and the largest in Europe. It was incorporated under Royal Charter in 1825 and is Registered Charity 210161.

The Society is the UK national learned and professional society for geology with a worldwide Fellowship (FGS) of over 9000. The Society has the power to confer Chartered status on suitably qualified Fellows, and about 2000 of the Fellowship carry the title (CGeol). Chartered Geologists may also obtain the equivalent European title, European Geologist (EurGeol). One fifth of the Society's fellowship resides outside the UK. To find out more about the Society, log on to [www.geolsoc.org.uk](http://www.geolsoc.org.uk).

**The Geological Society Publishing House** (Bath, UK) produces the Society's international journals and books, and acts as European distributor for selected publications of the American Association of Petroleum Geologists (AAPG), the Indonesian Petroleum Association (IPA), the Geological Society of America (GSA), the Society for Sedimentary Geology (SEPM) and the Geologists' Association (GA). Joint marketing agreements ensure that GSL Fellows may purchase these societies' publications at a discount. The Society's online bookshop (accessible from [www.geolsoc.org.uk](http://www.geolsoc.org.uk)) offers secure book purchasing with your credit or debit card.

To find out about joining the Society and benefiting from substantial discounts on publications of GSL and other societies worldwide, consult [www.geolsoc.org.uk](http://www.geolsoc.org.uk), or contact the Fellowship Department at: The Geological Society, Burlington House, Piccadilly, London W1J 0BG: Tel. +44 (0)20 7434 9944; Fax +44 (0)20 7439 8975; E-mail: [enquiries@geolsoc.org.uk](mailto:enquiries@geolsoc.org.uk).

For information about the Society's meetings, consult *Events* on [www.geolsoc.org.uk](http://www.geolsoc.org.uk). To find out more about the Society's Corporate Affiliates Scheme, write to [enquiries@geolsoc.org.uk](mailto:enquiries@geolsoc.org.uk).

Published by The Geological Society from:

The Geological Society Publishing House, Unit 7, Brassmill Enterprise Centre, Brassmill Lane, Bath BA1 3JN, UK

(Orders: Tel. +44 (0)1225 445046, Fax +44 (0)1225 442836)

Online bookshop: [www.geolsoc.org.uk/bookshop](http://www.geolsoc.org.uk/bookshop)

The publishers make no representation, express or implied, with regard to the accuracy of the information contained in this book and cannot accept any legal responsibility for any errors or omissions that may be made.

© The Geological Society of London 2009. All rights reserved. No reproduction, copy or transmission of this publication may be made without written permission. No paragraph of this publication may be reproduced, copied or transmitted save with the provisions of the Copyright Licensing Agency Ltd, Saffron House, 6–10 Kirby Street, London EC1N 8TS, UK. Users registered with the Copyright Clearance Center, 222 Rosewood Drive, Danvers, MA 01923, USA: the item-fee code for this publication is 0305-8719/09/\$15.00.

### British Library Cataloguing in Publication Data

A catalogue record for this book is available from the British Library.

ISBN 978-1-86239-289-2

Typeset by Techset Composition Ltd, Salisbury, UK

Printed by MPG Books Ltd, Bodmin, UK

### Distributors

#### *North America*

For trade and institutional orders:

The Geological Society, c/o AIDC, 82 Winter Sport Lane, Williston, VT 05495, USA

Orders: Tel. +1 800-972-9892

Fax +1 802-864-7626

E-mail: [gsl.orders@aidcv.com](mailto:gsl.orders@aidcv.com)

For individual and corporate orders:

AAPG Bookstore, PO Box 979, Tulsa, OK 74101-0979, USA

Orders: Tel. +1 918-584-2555

Fax +1 918-560-2652

E-mail: [bookstore@aapg.org](mailto:bookstore@aapg.org)

Website: <http://bookstore.aapg.org>

#### *India*

Affiliated East-West Press Private Ltd, Marketing Division, G-1/16 Ansari Road, Darya Ganj, New Delhi 110 002, India

Orders: Tel. +91 11 2327-9113/2326-4180

Fax +91 11 2326-0538

E-mail: [affiliat@vsnl.com](mailto:affiliat@vsnl.com)